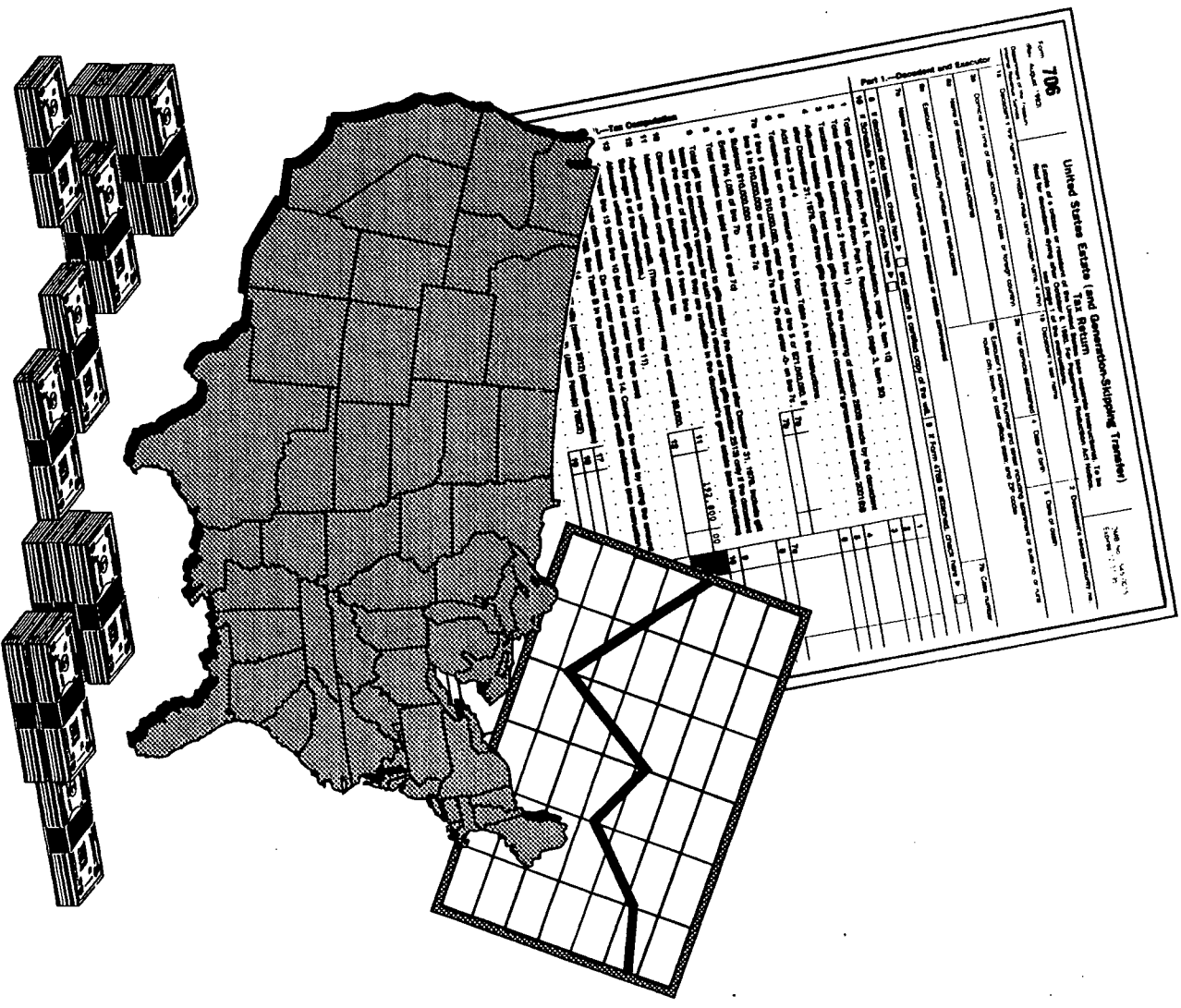


Statistics of Income

Compendium of Federal Estate Tax and Personal Wealth Studies



Compendium of Federal Estate Tax and Personal Wealth Studies

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Webster's Dictionary defines *compendium* as "A work treating in brief form the important features of a whole field of knowledge." This is a compendium in the true sense of the word. The Statistics of Income Division (SOI) of the Internal Revenue Service has assembled for the first time the complete record of its efforts to estimate the wealth of the Nation's living population using Federal estate tax returns. In addition, papers are presented discussing the most recent Federal estate tax studies, as well as new tabulations of historical estate tax data collected between 1963 and 1990. Apart from assembling statistical data, this compendium also includes methodological information essential to the understanding and further development of estate tax and personal wealth estimates. Even the graphic at the lower left on this page comes from an early SOI estate tax report. It appears at the beginning of each major section in this Compendium.

This book is, however, more than a compendium of papers; it is also a compendium of effort by SOI staff and outside scholars. Many dedicated workers in IRS Service Centers throughout the country, particularly Ogden, Utah, have, over the years, performed the difficult task of capturing the data used as the foundation for all of the papers presented here. Paul Arnsberger provided the book's cover, graphics, and assisted with the overall design and layout. Dorothy Wallace patiently compiled statistical tables. Michael Alexander, Jim Hobbs, Marvin Schwartz, Elizabeth Nelson and Beth Kilss provided helpful comments and suggestions.

Thanks are also due to Rick Schoff of The Foundation Center for giving SOI permission to reprint material for this compendium, and to Dr. David Joulfaian, Louise Woodburn, Dr. James Smith and Daniel Skelly for their contributions. Finally, special thanks to Dr. Jeffrey Rosenfeld for his editorial and analytical expertise as well as his energy and enthusiasm, all of which helped to make this book a reality.

Lastly, Dr. Fritz Scheuren deserves particular recognition for his contributions to this book. Indeed, it is due to his support and vision that SOI's estate and personal wealth program has evolved to its present form. He was the first SOI analyst to produce estimates of wealth using estate tax data, and later, as director of the SOI Division, he shepherded many improvements in both the sample design and estimation methodology. He has made innumerable contributions to the field of statistics in general, and, particularly in the development of wealth data sources for use in public policy planning. His guidance and support, as well as the preface and methodological articles he contributed, have helped make this book special.

These efforts, like the compendium itself, prove that the whole is indeed greater than the sum of its parts.

Barry W. Johnson,
General Editor
March 1994

Compendium



Compendium of Federal Estate Tax and Personal Wealth Studies

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Preface

U.S. Federal taxation of asset transfers at death began in 1916. Since the beginning of the tax, the Statistics of Income (SOI) program of the Internal Revenue Service has prepared informative summaries at fairly regular intervals from the estate tax returns filed. These SOI tabulations and accompanying interpretive material have, over the years, appeared in many forms — ranging from a chapter in the annual Statistics of Income reports to a separate supplementary report series. Estate tax statistics are now published in the quarterly *SOI Bulletin* and available electronically through the SOI Electronic Bulletin Board ((202) 874-9574).

In some ways, this Compendium might be thought of as a part of a set of publications. The second volume in the set, tentatively entitled *The Estate Fact Book, 1916-1950*, provides details of the estate tax in its early years. This “Fact Book” is based on a reprocessing of the old estate returns which IRS had retained in storage. It, therefore, provides an opportunity to give a modern look to the work done, often by hand or with punchcard tab equipment in the days before computers. The Fact Book is planned for early 1995 and should be available both on paper and in an electronic form.

Despite the long history of the estate tax and its SOI statistics, this is the first Compendium to be produced. Brought together here are not only data taken directly from the returns, but also estimates prepared from them of the asset holdings of the wealthy. Some time series information is included; however, the emphasis is on recent results. Not only does the present Compendium emphasize estate statistics from the last few decades, but it also gives notable prominence to the role estate tax returns have had in estimating the wealth of the wealthy. Wealth statistics in the United States have a long lineage — quite apart from the estate tax; nonetheless, it has been true, and remains true today, that they simply have not been given the attention of their natural complement, income statistics.

Aside from estate tax estimates of wealth, sustained efforts to balance overall U.S. income and wealth statistics have been largely lacking. Two big exceptions are the Survey of Income and Program Participation (SIPP) and the Survey of Consumer Finances (SCF).

Begun in the 1970's and conducted by the Census Bureau, SIPP has become an important regular source of information on the assets held by households. While it provides some insight, SIPP's uses for wealth estimates are somewhat limited, since wealth is highly concentrated and SIPP is not stratified by wealth (or income). It does not really address (nor was it intended to) the holdings of the very rich.

Fortunately, the Federal Reserve Board (FED) decided to resume, in the early 1980's, its Survey of Consumer Finances (SCF). The first such survey done by the FED was in 1963. At that time, IRS assistance was obtained to construct a frame to allow for oversampling of the well-to-do. The early cooperative efforts between IRS and the Federal Reserve Board in the 1960's were resumed in the 1980's (with, of course, suitably updated and made even more stringent procedures to protect taxpayer's rights to privacy and confidentiality). The modern SCF represents, at present, the best source for those interested in looking at the wealth distribution as a whole — particularly at the full range of asset holdings across net worth classes. Some of the work done by SOI staff on the Survey of Consumer Finances appears in this Compendium. The SCF, though, is not a primary focus here; instead, the wealth statistics presented come mainly from estate tax returns and are based on the estate multiplier method.

The so-called estate multiplier method was devised in the 19th century as a way of using death duty tax records to estimate wealth in Great Britain and France. To obtain an estimate of the wealth of the living, the decedent's wealth was multiplied by the inverse of the mortality rate for the individual. Overall mortality rates were used initially. Later on, these were adjusted for social class differentials and characteristics of obvious importance to mortality rates, like age and sex.

Preface

There is some evidence that SOI tabulations, from the beginning, may have been designed for possible use in estimating personal wealth. Dr. Edward White, the first Director of the SOI programs, probably knew of the estate multiplier method. For one thing, much of what was done at IRS in those early days was modeled after Great Britain's Inland Revenue, which had an active program based on estate duty records. Another source of supporting information, besides the tables themselves, is the important role that the *Journal of the American Statistical Association (JASA)* had in the founding of the SOI program. In December 1915, *JASA* published complete income statistics from the tax returns filed in 1913, the first year of the modern income tax. Not incidentally, that *JASA* article by Roland Falkner recommended the legislation passed in 1916 that established SOI. In its earlier volumes, dating back to at least the 1890's, *JASA* had articles on the estate multiplier method.

Estate tax wealth estimates were not actually produced in the SOI program until the 1960's. Prior to that, the work had been done by independent scholars, like Robert Lampman. In fact, it was on the initial SOI wealth estimates, done for 1962 (included in this Compendium) that I got my start as a statistician in IRS. Since then, estimates of personal wealth have appeared at regular intervals as part of the SOI program. One contribution of this Volume is that it brings together the highlights of that nearly thirty-year effort.

It seems fitting to dedicate this Volume to two friends from those days, now long ago: Staunton Calvert and Jim Smith, both of whom labored mightily to start the SOI wealth series. Also, it is appropriate to commend to you those who still labor to produce estate and wealth statistics. In particular, I hope that, under the leadership of Barry Johnson and Marvin Schwartz, supported by Louise Woodburn, Elizabeth Nelson, Cathy Deale, Mike Alexander, and Dan Skelly (among others), this important SOI tradition will continue.

Fritz Scheuren, Ph.D.

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*Estate Tax
Data*



CHAPTER 1

Estate Tax Data

Introduced by David Joulfaian, Ph.D

Administrative records have long been used for evaluating tax policy and analyzing economic behavior. These include estate tax records, as well as individual and corporate tax records compiled by the Statistics of Income (SOI) Division of the Internal Revenue Service. Estate tax records are particularly useful for policy making because they represent the only comprehensive source of information on decedents, their estates, and beneficiaries.

Estate tax data have proven to be an invaluable source of information to policy analysts. These records contain detailed information on asset composition and portfolio holdings, jointly held assets, life insurance proceeds, estate administration expenses, and state and foreign death taxes. They are the quintessential component of the estate tax simulation model, which is used by the Office of Tax Analysis (OTA) at the U.S. Treasury Department to evaluate and estimate the effects of enacted and proposed estate tax legislation, including changes in tax rates, exclusions, deductions, and tax credits, and has been used extensively in the revenue estimation process by OTA.

In addition to their role in the legislative process, estate tax records have been employed in studies of various facets of economic behavior. A number of studies, for instance, have examined patterns of charitable giving and their determinants. This topic is especially interesting as fewer than 10,000 estates gave more than the combined gifts of all corporations in 1990; the contributions from this handful of estates exceeded 10 percent of the total reported by all 29 million taxpayers claiming a deduction for such gifts on their individual income tax returns. Several charitable bequest studies are presented in Chapter 2.

When combined with income tax returns, estate tax records provide interesting insights into the pre-death behavior of decedents. The earliest study using such data is that by Eugene Steuerle, who studied the relationship between realized income and wealth. Steuerle also studied the lifetime charitable contributions by estate tax decedents and their relationship to bequests at death. These studies are reprinted in Chapters 3 and 2, respectively. In a later study, and using similar data, Auten and Joulfaian (1993) examined the effect of estate taxes on lifetime charitable contributions.

Estate tax records also provide information on the division of an estate among the living beneficiaries. In a study of bequest division, Joulfaian (1993) examined the pattern of inheritances received by beneficiaries. When combined with the income tax returns of the heirs, estate tax records allow for the study of the effects of inheritances on the recipient's behavior. In a recent study, for example, Holtz-Eakin, Joulfaian and Rosen (1993) examined the effects of inheritance on the recipient's labor force participation and earnings.

In summary, estate tax records provide a unique source of data on wealth holdings and the patterns of bequests. They represent the only source of information for use in examining estate tax policy and provide the most reliable information on the division and distribution of bequests.

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Estate Tax Returns, 1983

by Mary F. Bentz

Estate tax returns filed during 1983 for deaths occurring primarily in 1982 were the first to reflect the tax reductions introduced by the Economic Recovery Tax Act of 1981 (ERTA). Taking into account the normal growth in the number of estates, the higher estate filing threshold mandated by ERTA resulted in a decrease in excess of the actual 16-percent fall in the overall number of returns filed from 1982 to 1983. While 119,864 decedents reported assets exceeding the filing threshold in 1982, only 100,890 decedents were subject to filing a return in 1983. However, 1983 filings showed more wealthy decedents: The number of returns reporting a gross estate of at least \$300,000 increased from 59,597 to 63,251 in 1983. These returns had assets totaling \$50.4 billion, up from the \$45.4 billion reported for 1982.

Despite a rise in both the number and wealth of these estates, the total estate tax liability decreased from \$6.2 billion in 1982 to \$5.2 billion in 1983. ERTA's liberalization of estate tax law was the major factor in reducing the tax liability. In 1983, over \$24 billion in allowable deductions reduced the taxable portion of the \$50 billion in total gross estate to \$26 billion. For 1982, about \$18 billion in

deductions was claimed against more than \$45 billion in assets with a final taxable amount of \$27.6 billion (Figure A).

Of the 63,251 estate tax returns filed during 1983 with \$300,000 or more of gross estate, 35,148, or 55 percent, were taxable (that is, had an estate tax due after credits), with a total gross estate of \$32.6 billion. Nontaxable returns had \$17.8 billion of gross estate (Figure B).

The asset composition of the estates varied considerably with the size of the estate. For estates of \$500,000 to \$1 million, real estate was the most important asset, accounting for 31 percent of all assets. Corporate stock and cash, at 20 percent and 15 percent, respectively, were the next most important components of these estates.

In contrast, corporate stock was the most important asset in the portfolios of those decedents with estates of \$1 million or more in assets. While corporate stock made up 31 percent of total asset holdings for these decedents, real estate represented only 21 percent. Lifetime gifts and bonds, representing 12 percent and 10 percent, respectively, of the

Figure A.--Number of Returns, With Gross Estate of \$300,000 or More, Gross Estate, Taxable Estate, and Estate Tax, 1982 and 1983

[All figures are estimates based on samples--money amounts are in millions]

Item	1982	1983	Change, number or amount	1982 to 1983 (percent)
	(1)	(2)			(3)	(4)
Number of returns	59,597	63,251	+3,654	+6%
Gross estate	\$45,412	\$50,390	+4,978	+11
Total deductions ¹	17,897	24,322	+6,425	+36
Taxable estate	27,568	26,235	-1,332	-5
Estate tax before credits	9,775	9,265	-510	-5
Estate tax after credits	6,226	5,170	-1,056	-17

¹Deductions may exceed gross estate on some returns.

Figure B.--Summary Statistics by Tax Status

[All figures are estimates based on samples--numbers of returns are in thousands; money amounts are in millions]

Item	Total	Taxable	Nontaxable
	(1)	(2)	(3)
Number of returns	63,251	35,148	28,103
Gross estate ¹	50,390	32,618	17,772
Real estate	12,009	7,078	4,931
Bonds, total	4,050	3,187	863
Federal savings	314	239	75
Other Federal	1,359	1,155	204
State and local	1,978	1,524	454
Corporate and foreign	399	269	130
Corporate stock	11,510	8,301	3,209
Cash	5,878	4,096	1,783
Notes and mortgages	1,904	1,094	810
Life insurance	1,952	650	1,302
Annuities	430	126	305
Noncorporate business assets	2,060	1,337	723
Household goods and other assets	2,079	1,453	626
Lifetime transfers	4,729	3,321	1,409
Total deductions	24,322	9,639	14,683
Funeral and administrative expenses and orphans deductions	1,602	1,319	283
Debts and mortgages (allowable)	3,210	1,758	1,452
Charitable bequests	2,545	1,611	935
Marital deduction	16,965	4,952	12,013
Taxable estate	26,235	22,979	3,256
Estate tax before credits	9,265	8,361	904
Total tax credits	4,095	3,191	904
Allowable unified credit	3,151	2,260	891
State death taxes	848	843	5
Other tax credits	96	87	8
Estate tax after credits	5,170	5,170	-

¹Asset detail does not add to total gross estate since it is not required to be reported for the estates of decedents with \$500,000 or less of gross estate who died after December 31, 1981.

total reported assets, were the next most important components of the estates of millionaires. Cash was considerably less important in the portfolios of wealthier decedents, making up only 8 percent of their total assets (see Figures C and D).

For returns filed in 1983, real estate exceeded corporate stock as the largest component of the total gross estates of those returns with \$300,000 or more in assets. (See the Data Sources and Limitations section for a discussion of the asset composition of returns with gross estate of \$500,000 or less.) This change in the composition of assets can be

traced over several years. For example, corporate stock, which represented 43 percent of all assets for 1972, fell to 25 percent of all assets by 1982. Meanwhile, real estate grew from 16 percent to 26 percent during the same period. This change may not be due so much to an actual shift in asset preferences as to changes in the value of certain assets. While the value of real estate reported on estate tax returns quadrupled from 1972 to 1982, the value of corporate stock increased by only about 34 percent. This reflects both the rising prices in the real estate market and the lack of growth in the stock market over that same period.

Figure C
Composition of Gross Estate by Size

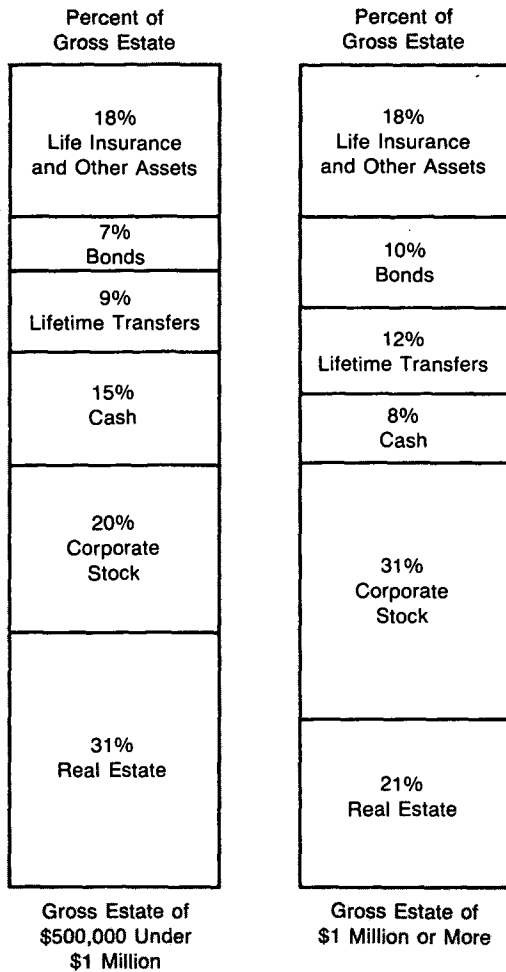
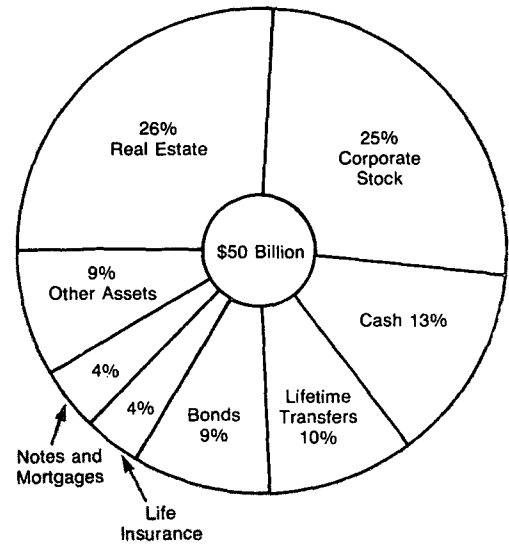


Figure D
Composition of Total Gross Estates



BRIEF HISTORY OF THE ESTATE TAX

The modern estate tax has been in effect since 1916. However, estate or inheritance taxes were instituted periodically in this country much earlier, usually as a temporary emergency measure to raise revenue during wartime. These taxes took the form of excises on transfers of wealth in order to avoid presumed constitutional restrictions on the direct taxation of wealth.

The first Federal involvement with a death tax dates to 1797 when, during a time of undeclared naval warfare with France, Congress levied a stamp tax on legacies, probates of

wills, and letters of administration. The stamp tax was repealed in 1802 when the crisis subsided. The death tax was reinstated again during the Civil War when from 1862 to 1870 an inheritance tax was imposed on an individual's privilege of inheriting real and personal property from a decedent. Rates varied with the relationship to the decedent of each heir, with a maximum tax rate of 6 percent of the inheritance. The Spanish-American War was the impetus for the next death tax, provided for under the War Revenue Act of 1898. This was the first true estate tax, levied not on the inheritors, but on the decedent for the privilege of leaving property to his or her heirs. The tax followed a graduated rate scale according to the amount of the bequest and the relationship of the heir to the decedent, with tax rates up to 15 percent with an exemption for estates under \$10,000. Fourteen years passed between the repeal of this wartime estate tax in 1902 and the beginning of the modern estate tax in 1916.

Today's estate tax was instituted by the Revenue Act of 1916, 3 years after the inception of the modern income tax in 1913. No longer necessary strictly for wartime revenue, the estate tax was to serve the dual purposes of producing revenue and redistributing wealth.

The 1916 legislation specifically levied the tax on the transfer of assets from the decedent to the heirs rather than on the value of assets

distributed to individual beneficiaries, making the levy an estate tax, not an inheritance tax. The relationship of the beneficiary to the decedent had no bearing on the tax liability; the tax ranged from 1 percent on small estates to 10 percent on estates greater than \$10 million, with a \$50,000 exemption. The basic structure has remained intact since 1916, although there have been some modifications to the tax since then. In particular, certain provisions have been added to provide for the special treatment of family farms and to include a deduction for bequests to the surviving spouse. See the text below for an explanation of the marital deduction for married decedents.

THE ECONOMIC RECOVERY TAX ACT OF 1981

Estate tax returns filed during 1983 were the first to reflect the tax reductions introduced by the Economic Recovery Tax Act of 1981 (ERTA). ERTA's changes to estate tax law took effect for decedents dying after December 31, 1981. As returns for individuals dying in 1982 were not generally filed until 1983, the estate tax return information for 1983 provides us with the first opportunity for analyzing the impact of ERTA.

The major estate tax changes made under ERTA were an increase in the unified credit for estate taxes, an elimination of the monetary ceiling on the estate tax marital deduction, and a reduction in the maximum estate tax rate. These provisions are described in greater detail in the following sections.

Unified Credit Increase

ERTA provided for a gradual increase in the unified credit, so called because it is used (in lieu of an exemption) for both estate and gift tax purposes as a dollar-for-dollar reduction of the estate or gift tax. (For a further explanation of the unified credit, see the Definitions section.) The unified credit was increased from the \$47,000 in effect for individuals dying in 1981 to a \$192,000 credit for those dying in 1987. In addition, the estate tax filing requirements were revised upward to reflect the increased unified credit amount; the filing requirement is that amount the tax on which is equal to the credit. If the gross estate of a decedent dying in 1981 exceeded \$175,000, an estate tax return was required to be filed. This figure was increased to \$225,000 in 1982, and will rise to \$600,000 for decedents dying in 1987 and thereafter. Upward adjustments in the unified credit and the filing requirement are to be phased in over a 6-year period as follows:

<u>Year of death</u>	<u>Unified credit</u>	<u>Filing requirement</u>
1981	\$47,000	\$175,000
1982	62,800	225,000
1983	79,300	275,000
1984	96,300	325,000
1985	121,800	400,000
1986	155,800	500,000
1987 and later	192,800	600,000

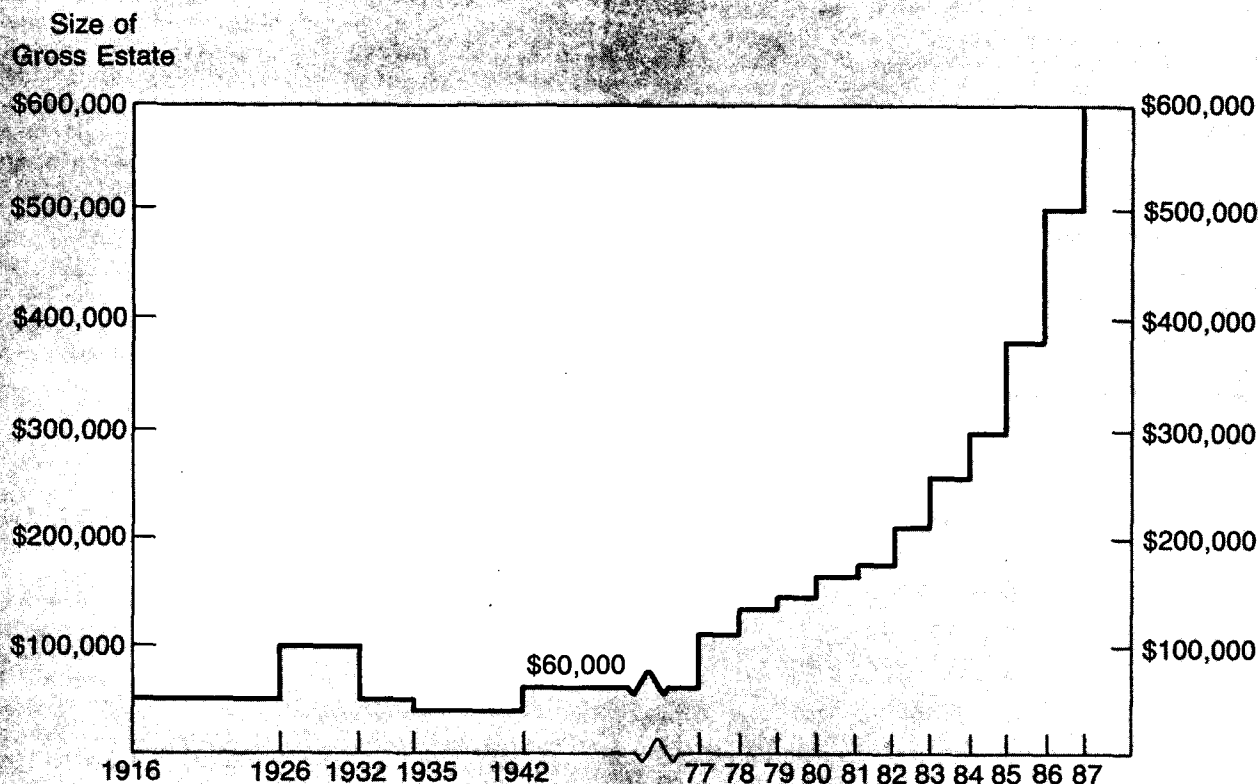
The increase in the estate filing requirement was part of a move begun in 1976 to return the scope of the tax to its original intent. The \$60,000 filing requirement in effect almost continuously for 60 years required returns from sizeable estates held by only a small percentage of individuals in the early years. However, in more recent years up to 1976, the \$60,000 filing requirement subjected the estates of many not-so-wealthy people to the tax as well. Figure E shows the filing requirements in effect since the inception of the tax in 1916. The following chart illustrates the percentage of total decedents for whom estate tax returns were filed in selected years.

<u>Year of filing</u>	<u>Returns filed as a percentage of all deaths (in previous years)</u>
1926	1.1%
1966	5.3
1977	10.5
1983	5.1

In the highest year, 1977, the 200,747 returns filed for citizens and resident aliens represented 10.5 percent of the 1,909,000 deaths occurring in 1976. With the recently increased filing requirement, it is expected that a smaller percentage of all decedents will be subject to the tax. As a result of the increased filing threshold, the number of estate tax returns filed decreased from 119,864 in 1982 to 100,890 in 1983. Returns filed in 1983 represented only 5.1 percent of the deaths occurring the previous year.

The effect of the increased unified credit amount will be to decrease the estate tax burden on those estates subject to the tax. The estates benefiting the most from the unified credit increase will be those with low to medium wealth. In these cases, the unified credit will serve to eliminate or decrease substantially the tax due.

Figure E
Estate Tax Return Filing Requirements
1916-1987



Unlimited Marital Deduction

In community property states, property accumulated by a person during marriage belongs equally to that person and to the spouse regardless of which spouse holds legal title. In effect, only half as much property is included in the estate of a married decedent from a community property state as would appear in the same estate under common law. The estate tax marital deduction was enacted in 1948 to promote more equal treatment of estates in community property and common law states.

From 1977 until 1981, the allowable estate tax marital deduction was equal to the greater of \$250,000 or half the adjusted gross estate for property passing to a decedent's spouse. ERTA did away with the monetary ceiling on the estate marital deduction for the estate of decedents dying after 1981. Under the new law,

unlimited amounts, except for certain terminable interests (bequests of income for life), can be transferred to a surviving spouse free of estate tax. The effect of the unlimited marital deduction has been to decrease substantially the taxable estates of married decedents.

The marital deduction was by far the largest of all deductions reported in 1983, accounting for 70 percent of total deductions. This deduction was even more important for nontaxable estates. For those estates reporting no estate tax, the marital deduction represented 82 percent of the total deductions. The following chart shows the total number of returns compared to the number of returns electing the marital deduction, by tax status. While only 44 percent of all 1983 returns were exempt from the estate tax, 79 percent of those returns for which the marital deduction was claimed paid no tax.

	Total	Returns with marital deduction
All returns	63,251	32,247
Taxable	35,148	6,893
Nontaxable	28,103	25,354

Reduction in Maximum Tax Rate

Before 1981, the highest estate tax rate was 70 percent on assets in excess of \$5 million. The Act allowed a reduction in this rate to 50 percent, in 5-percent increments over a 4-year phase-in period. However, the recently enacted Tax Reform Act of 1984 delays the reduction 3 years, keeping the top rate at 55 percent through 1987, and reducing the rate to 50 percent for 1988 and later years. The following chart shows the new tax rate schedule:

<u>For decedents dying in:</u>	<u>The maximum tax rate will be:</u>
1982	65% on assets in excess of \$4 million
1983	60% on assets in excess of \$3.5 million
1984-1987	55% on assets in excess of \$3 million
1988 and thereafter	50% on assets in excess of \$2.5 million

SUMMARY

Estate tax returns filed in 1983 provided financial data about the wealthiest 3 percent of all decedents. In 1983, 63,251 decedents with individual estates valued at more than \$300,000 reported a combined \$50 billion in assets. Real estate was the most important component of the estates of these decedents, amounting to \$12 billion, or 26 percent of their total assets. The value of corporate stock nearly equalled that of real estate, with \$11.5 billion, or 25 percent of the assets. While the relative importance of these two assets in the total \$50 billion was very close, a distinction can be seen between the portfolios of small and large wealthholders. Individuals with \$500,000 to \$1 million in assets were more likely to hold larger amounts of real estate, while millionaires held more of their assets in the form of corporate stock.

While decedents filing estate tax returns in 1983 were wealthier than those filing in previous years, their tax liability decreased

from past years. This is a result of the tax law changes introduced by the Economic Recovery Tax Act of 1981 (ERTA), which reduced estate taxes and shifted the tax burden away from smaller wealthholders for individuals dying after 1981. ERTA's liberalization of rules covering filing requirements, deductions and credits allowed many of the smaller estates to reduce substantially or eliminate their tax liability. Also benefiting from ERTA were the estates of married decedents, for which an unlimited deduction equal to the amount of the bequests to the surviving spouse was allowed to decrease the taxable estate. All estates benefited from a lower marginal tax rate and an increased amount of credits allowed against the estate tax. These trends are expected to continue as the tax reductions introduced by the Economic Recovery Tax Act of 1981 (ERTA) take full effect.

DEFINITIONS

Brief definitions of some of the terms used in the tables are provided below:

Adjusted taxable estate.--Adjusted taxable estate was equal to the sum of total taxable estate and adjusted taxable gifts.

Adjusted taxable gifts.--Certain gifts made during the life of an individual who died before 1982 were automatically included in the gross estate. However, for the estate of an individual who died after 1981, gifts were not generally included in the gross estate. In these estates, the gifts were included in the amount of the adjusted taxable gifts and combined with adjusted taxable estate for the purposes of determining the tentative tax.

Alternate value of gross estate.--All property included in the gross estate could be valued at one of basically two points in time. While the value of the gross estate at the date of death determined whether an estate tax return was required to be filed, the executor of the estate had the option of valuing the estate as of the date of death or six months after the decedent's death. (Any property sold, exchanged or otherwise disposed of within six months was valued as of the date of the disposition.)

Bequests to surviving spouse.--Bequests to surviving spouse was equal to the value of property interests passing from the decedent to the surviving spouse.

Date-of-death value of gross estate.--The amount of property in this category was the fair-market value of all the assets at the death of the decedent. Although this value was used as a criterion for filing an estate tax return, it was not the only measure that could be used in valuing property for estate tax purposes. See also "alternate value."

Estate tax after credits.--This was the tax liability of the estate remaining after subtraction of credits for state death taxes, foreign death taxes, and Federal gift taxes on pre-1977 gifts paid by the decedent or paid by a spouse or other transferors whose death preceded the decedent's. In addition, a "unified credit," graduated according to the year of death and a "credit" for gift taxes paid on post-1976 gifts, is allowed. See also "unified credit."

Estate tax before credits.--This was the tax obtained by applying the graduated estate tax rates to the adjusted taxable estate and reducing the tax by the amount of gift taxes previously paid. The rates ranged from 18 percent on the first \$10,000 of taxable estate up to 70 percent of taxable estates of \$5 million or more. The Economic Recovery Tax Act of 1981 (ERTA) introduced a graduated reduction in the tax rates. See the section entitled Reduction in Maximum Tax Rate for more details.

Gift taxes previously paid.--Credit was allowed against the estate tax for the Federal gift tax paid on a gift made by a decedent before 1977. No credit, separate from the unified credit, was allowed for any gift tax paid on gifts made after 1976.

Gross estate.--An estate tax return was required in the case of every decedent whose gross estate exceeded the legal filing requirement in effect for the year of death. For estate tax purposes, the gross estate included all property or interests in property before reduction by debts (except policy loans against insurance) and mortgages, or by administration expenses. Included in the gross estate were such items as real estate, tangible and intangible personal property, certain lifetime gifts made by the decedent, property in which the decedent had a general power of appointment, the decedent's interest in annuities receivable by the surviving beneficiary, the decedent's share in community property, life insurance proceeds (even though payable to beneficiaries other than the estate), dower or curtesy of the surviving spouse (inherited property), and, with certain exceptions, joint estates with right of survivorship and tenancies by the entirety.

Jointly owned property.--Jointly owned property was property held by the decedent with another person or persons with rights of survivorship. Jointly owned property is reflected in each of the property types shown in this article and, in addition, is shown separately (in total only) in Table 1.

Lifetime transfers.--Included in this item were two categories of gifts that, by law, had to be reported in gross estate: gifts taking effect at death, and gifts of property in which the decedent retained some rights.

Marginal tax rate.--See the discussion under "Taxable estate."

Marital deduction.--The marital deduction is a deduction from the gross estate of the value of property that is included in the gross estate but that passes to the surviving spouse.

Net worth.--Net worth was equal to the total gross estate less debts and mortgages.

Nontaxable returns.--Nontaxable returns were those with no estate tax after credits.

Tax on prior transfers.--A tax credit was allowed for Federal estate tax paid on property received by the decedent or the estate from a transferor who died within 10 years before, or 2 years after, the decedent. The credit was intended to lessen the burden of double taxation between successive estates whose owners had died within a short period of time. Depending on the time that has elapsed between the deaths, a credit is allowed for all or part of the Federal estate tax paid by the transferor's estate with respect to the transfer.

Taxable estate.--Taxable estate is the base to which the graduated Federal estate tax rates are applied in computing the estate tax before credits. Taxable estate is equal to the value of the gross estate less deductions allowed for the following: funeral and administrative expenses; casualty and theft losses; debts, mortgages, losses, and other claims against the estate, including pledges to charitable organizations; an orphan's deduction (for the estates of individuals dying before 1982); and the marital deduction.

Taxable returns.--Taxable returns were those with an amount of estate tax after credits.

Unified credit.--The unified credit, so called because it is used for both estate and gift tax purposes, is applied as a dollar-for-dollar reduction of the estate tax. The credit must be used to offset gift taxes on lifetime transfers made after 1976. However, to the extent it is so used, the amount of credit available at death is reduced.

DATA SOURCES AND LIMITATIONS

The data provided in this article are based on a sample, selected before audit, of 19,122 Federal estate tax returns filed during 1983. The sample, which represents approximately 63,000 decedents, was limited to those returns with at least \$300,000 of gross estate because of the annual increase in the filing requirement and in order to facilitate comparison with previous years' returns reporting this level of wealth.

Because the data are based on a sample of estate tax returns filed with the Internal Revenue Service (IRS), they are subject to sampling as well as nonsampling error. The following table below presents an estimate of the sampling error for IRS data expressed as a coefficient of variation (C.V.). The approximate coefficients of variation shown here are intended only as a general indication of the reliability of the data. See the Appendix for further discussion of SOI sample procedures and data limitations.

<u>Estimated Number of Returns</u>	<u>Approximated Coefficient of Variation</u>
302,650	0.02
48,420	0.05
12,110	0.10
3,030	0.20
1,940	0.25
990	0.35
480	0.50

Only about 19 percent of the estate tax returns filed during 1983 were for persons dying in 1983. Because the executors of most estates take advantage of the full 9-month period within which the return must be filed and the tax must be paid, most returns are not received at IRS service centers until at least 9 months after the person's death. In addition, those estates that petition for and receive approval for an extension of time to file need not submit the return until 6 months after the original filing deadline.

Delinquency can also cause a delay in filing. For these reasons, the majority (approximately 75 percent) of the returns filed during 1983 were for deaths occurring in 1982. The following chart shows the number and percentages of decedents by year of death, for returns filed in 1983.

<u>Year of death</u>	<u>Returns filed in 1983</u>	
	<u>Number</u>	<u>Percent of total</u>
1980 or prior year ...	471	0.7%
1981	3,040	4.8
1982	47,493	75.1
1983	12,247	19.4
Total	63,251	100.0

Noted that the sum of the asset amounts for those returns with \$300,000 to \$500,000 of gross estate will be less than the total gross estate amount for this group, the reason being that detailed asset information is not required to be filed for decedents who died after December 31, 1981, and left a gross estate of \$500,000 or less. However, some or all of this information may have been supplied voluntarily. In fact, about \$9.4 billion of the total \$13.2 billion in assets belonging to this group has been allocated to the proper asset amounts.

While detailed deduction information is also not required to be supplied for estates of \$500,000 or less, deduction amounts can be obtained from other information reported on the return. However, because some adjustments had to be made, deduction amounts otherwise reported as "administrative expenses and losses" have been included with "funeral expenses and orphan's deductions."

ADDITIONAL INFORMATION

Additional information on estates may be obtained by writing to the Statistics of Income Division, D:R:S, Internal Revenue Service, Washington, DC 20224.

Table 1.--Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax and Tax Credits, by Size of Gross Estate

[All figures are estimates based on samples--money amounts are in thousands of dollars]

Size of gross estate	Number of returns	Gross estate	Type of property							
			Real estate		Corporate stock		Cash		Bonds	
									Total	
			Number	Amount	Number	Amount	Number	Amount	Number	Amount
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	
All returns, total	63,251	50,390,376	43,302	12,009,136	40,263	11,509,783	51,126	5,878,497	26,946	4,049,886
\$300,000 through \$500,000	34,744	13,195,025	19,488	2,977,255	17,298	1,422,891	23,316	2,006,649	11,071	623,937
Over \$500,000, total	28,507	37,195,351	23,814	9,031,882	22,965	10,086,892	27,810	3,871,848	15,875	3,425,949
\$500,001 under \$1,000,000	19,266	13,191,296	16,136	4,082,737	14,848	2,683,597	18,725	2,008,199	9,927	970,929
\$1,000,000 under \$2,500,000	6,944	10,150,330	5,732	2,520,536	6,114	2,725,261	6,815	1,098,878	4,492	1,006,581
\$2,500,000 under \$5,000,000	1,625	5,572,915	1,363	1,370,227	1,391	1,653,187	1,607	341,439	970	457,119
\$5,000,000 under \$10,000,000	446	3,011,997	392	519,830	404	1,006,736	440	187,624	319	370,799
\$10,000,000 or more	226	5,268,813	191	538,552	209	2,018,111	222	235,707	167	620,520
Taxable returns, total	35,148	32,618,190	23,439	7,077,995	23,190	8,300,678	29,097	4,095,546	16,970	3,187,018
\$300,000 through \$500,000	17,105	6,589,336	8,755	1,362,281	8,520	761,892	11,358	1,191,065	5,943	373,943
Over \$500,000, total	18,043	26,028,854	14,684	5,715,714	14,670	7,538,786	17,739	2,904,481	11,026	2,813,075
\$500,001 under \$1,000,000	11,678	8,019,479	9,440	2,233,217	9,109	1,741,538	11,467	1,446,729	6,686	727,273
\$1,000,000 under \$2,500,000	4,589	6,747,093	3,770	1,687,500	4,020	1,837,520	4,513	813,006	3,127	751,972
\$2,500,000 under \$5,000,000	1,223	4,239,131	993	1,004,407	1,034	1,375,750	1,211	270,501	798	393,740
\$5,000,000 under \$10,000,000	357	2,397,107	311	368,304	323	805,236	353	158,597	267	346,304
\$10,000,000 or more	195	4,626,044	169	422,286	185	1,778,742	194	215,647	148	593,787

Size of gross estate	Type of property--Continued						Type of deductions			
	Bonds--Continued			Lifetime transfers		Other property	Total	Funeral expenses and orphans deduction		Administrative expenses and losses
	State and local		Other							
	Number	Amount	Amount	Number	Amount	Amount	Amount	Number	Amount	Amount
(11)	(12)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	
All returns total	13,636	1,977,985	2,071,900	8,671	4,729,348	8,425,840	24,321,929	59,187	345,625	1,256,035
\$300,000 through \$500,000	4,262	164,339	459,598	2,684	513,852	1,862,554	5,473,781	32,139	206,764	240,110
Over \$500,000, total	9,374	1,813,646	1,612,303	5,987	4,215,495	6,563,287	18,848,148	27,048	138,862	1,015,925
\$500,001 under \$1,000,000	5,193	406,475	564,454	3,577	1,235,198	2,210,636	5,732,397	18,165	74,562	361,352
\$1,000,000 under \$2,500,000	3,021	524,154	482,427	1,702	1,074,534	1,724,541	4,862,451	6,666	29,374	258,144
\$2,500,000 under \$5,000,000	778	293,128	163,991	455	674,413	1,076,529	2,903,434	1,571	30,168	139,631
\$5,000,000 under \$10,000,000	250	222,352	148,448	154	393,599	533,408	1,689,640	430	3,057	96,670
\$10,000,000 or more	132	367,537	252,983	99	837,751	1,018,171	3,660,225	215	1,702	160,129
Taxable returns, total	8,544	1,523,897	1,663,121	5,759	3,320,625	4,659,337	9,639,119	34,450	227,377	1,091,267
\$300,000 through \$500,000	2,125	83,186	290,757	1,478	320,419	602,744	651,529	16,808	129,244	175,268
Over \$500,000, total	6,419	1,440,711	1,372,365	4,281	3,000,206	4,056,593	8,987,590	17,641	98,132	916,000
\$500,001 under \$1,000,000	3,477	276,534	450,739	2,536	848,891	1,021,831	1,491,056	11,410	45,334	308,829
\$1,000,000 under \$2,500,000	1,953	362,576	389,396	1,248	713,688	943,408	1,787,024	4,493	20,310	229,946
\$2,500,000 under \$5,000,000	655	243,029	150,710	282	417,564	777,169	1,608,293	1,198	28,334	131,981
\$5,000,000 under \$10,000,000	214	205,230	141,074	132	330,228	388,438	1,080,255	353	2,600	93,719
\$10,000,000 or more	120	353,342	240,444	84	689,834	925,749	3,020,962	187	1,554	151,525

Table 1.--Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax and Tax Credits, by Size of Gross Estate--Continued

[All figures are estimates based on samples--money amounts are in thousands of dollars]

Size of gross estate	Type of deduction--Continued								Taxable estate	
	Debts and mortgages (allowable)		Charitable bequests		Marital deduction					
					Year of death of decedent					
					1981 or prior years		1982 or later			
	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount
(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)	(29)	(30)	
All returns, total	53,979	3,209,924	9,949	2,545,408	1,935	766,473	30,312	16,198,462	55,588	26,235,379
\$300,000 through \$500,000	28,350	576,785	4,711	304,441	1,419	325,084	15,790	3,820,598	29,707	7,766,882
Over \$500,000, total	25,629	2,632,726	5,238	2,240,967	516	441,390	14,522	12,377,864	25,881	18,468,497
\$500,001 under \$1,000,000	17,163	775,568	3,043	350,107	293	84,893	9,603	4,085,916	17,274	7,522,747
\$1,000,000 under \$2,500,000	6,274	696,079	1,436	361,381	**189	**210,972	**4,561	**5,225,638	6,398	5,316,918
\$2,500,000 under \$5,000,000	1,549	552,828	465	261,670	**	**	**	**	1,567	2,688,045
\$5,000,000 under \$10,000,000	428	285,264	184	265,266	20	46,250	233	993,132	423	1,331,127
\$10,000,000 or more	215	323,400	110	1,002,544	14	99,273	125	2,073,177	219	1,609,660
Taxable returns, total	32,553	1,757,911	6,804	1,610,890	610	461,807	6,283	4,489,868	35,148	22,979,069
\$300,000 through \$500,000	15,422	174,667	2,716	48,907	115	27,090	1,515	96,353	17,105	5,937,806
Over \$500,000, total	17,131	1,583,244	4,088	1,561,983	**495	**434,716	**4,768	**4,393,515	**18,043	17,041,264
\$500,001 under \$1,000,000	11,001	335,582	2,278	103,544	**	**	**	**	**	6,528,423
\$1,000,000 under \$2,500,000	4,400	379,445	1,151	179,304	**	**	**	**	**	4,960,069
\$2,500,000 under \$5,000,000	1,191	413,057	396	154,823	**	**	**	**	**	2,630,838
\$5,000,000 under \$10,000,000	349	186,419	161	185,947	**	**	**	**	**	1,316,853
\$10,000,000 or more	189	268,741	102	938,363	**	**	**	**	**	1,605,081

Size of gross estate	Adjusted taxable gifts		Adjusted taxable estate	Estate tax before credits	Tax credits				Estate tax after credits	
	Number	Amount			Amount	Amount	Amount	Amount	Amount	Amount
			Total tax credits	Allowable unified credit									State death taxes	Other
(31)	(32)	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)	
All returns, total	2,905	247,948	26,483,327	9,264,784	4,094,754	3,151,022	847,968	95,763	35,148	5,169,985
\$300,000 through \$500,000	763	40,244	7,807,125	2,282,193	1,710,684	1,612,915	87,799	9,969	17,105	571,509
Over \$500,000, total	2,141	207,704	18,676,202	6,982,591	2,384,070	1,538,106	760,169	85,795	18,043	4,598,476
\$500,001 under \$1,000,000	1,005	73,673	7,596,420	2,385,512	1,184,232	1,006,063	150,628	27,541	11,678	1,201,280
\$1,000,000 under \$2,500,000	609	47,476	5,364,394	1,892,106	618,024	395,651	186,618	35,754	4,589	1,274,037
\$2,500,000 under \$5,000,000	337	45,627	2,733,671	1,119,268	254,368	96,648	144,672	13,049	1,223	864,899
\$5,000,000 under \$10,000,000	107	17,171	1,348,298	656,402	129,886	26,090	99,702	4,094	357	526,516
\$10,000,000 or more	83	23,758	1,633,419	929,304	197,559	13,654	178,549	5,356	195	731,745
Taxable returns, total	2,213	198,029	23,177,098	8,360,506	3,190,521	2,260,299	842,761	87,461	35,148	5,169,985
\$300,000 through \$500,000	452	19,644	5,957,450	1,782,116	1,210,607	1,117,281	85,698	7,627	17,105	571,509
Over \$500,000, total	1,761	178,385	17,219,648	6,578,390	1,979,914	1,143,018	757,064	79,832	18,043	4,598,476
\$500,001 under \$1,000,000	863	68,448	6,596,871	2,109,340	908,060	733,731	148,616	25,713	11,678	1,201,280
\$1,000,000 under \$2,500,000	509	42,387	5,002,456	1,791,110	517,074	297,966	185,887	33,221	4,589	1,274,037
\$2,500,000 under \$5,000,000	211	27,499	2,658,337	1,097,744	232,845	76,660	144,379	11,807	1,223	864,899
\$5,000,000 under \$10,000,000	101	16,797	1,333,649	652,257	125,742	22,372	99,635	3,735	357	526,516
\$10,000,000 or more	77	23,253	1,628,335	927,938	196,193	12,290	178,547	5,356	195	731,745

**Data combined to avoid disclosure of information for specific returns.

NOTE: Asset detail does not add to total gross estate since it is not required to be reported for the estates of decedents with \$500,000 or less of gross estate, who died after December 31, 1981. To the extent that this information was filed voluntarily, it is presented in this table. Detail may not add to total because of rounding.

Table 2.--Gross Estate by Type of Property, and by Size of Net Worth
 [All figures are estimates based on samples--money amounts are in thousands of dollars]

Size of net worth	Number of returns	Gross estate	Debts and mortgages		Net worth	Type of property			
			Number of returns	Amount		Real estate		Bonds	
						Number of returns	Amount	Number of returns	Amount
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	
Total 1/.....	63,251	50,390,375	53,999	3,228,740	47,161,635	43,302	12,009,135	26,946	4,049,885
Deficit and under \$300,000 1/.....	4,520	1,706,793	4,520	611,013	1,095,780	3,247	708,128	731	20,804
\$300,000 under \$500,000 1/.....	32,287	12,833,486	25,913	537,396	12,296,089	18,134	2,889,995	10,926	636,335
\$Over \$500,000, total.....	26,442	35,850,095	23,564	2,080,329	33,769,765	21,918	8,411,010	15,287	3,392,743
\$500,001 under \$1,000,000.....	18,048	12,934,426	15,944	662,629	12,271,796	15,028	3,864,272	9,701	971,987
\$1,000,000 under \$2,500,000.....	6,365	10,061,444	5,695	731,427	9,330,017	5,196	2,571,180	4,218	1,009,491
\$2,500,000 under \$5,000,000.....	1,430	5,034,190	1,354	269,749	4,764,440	1,177	1,038,780	932	468,591
\$5,000,000 under \$10,000,000.....	401	2,874,010	383	183,900	2,690,110	350	474,400	284	356,106
\$10,000,000 or more.....	196	4,946,023	185	232,621	4,713,401	165	464,376	150	586,566

Size of net worth	Type of property--Continued								
	Bonds--Continued								
	Federal savings		Other Federal		State and local		Corporate and Foreign		
	Number of returns	Amount	Number of returns	Amount	Number of returns	Amount	Number of returns	Amount	
(10)	(11)	(12)	(13)	(14)	(15)	(16)	(17)		
Total 1/.....	8,088	313,943	9,229	1,358,892	13,636	1,977,985	11,779	399,065	
Deficit and under \$300,000 1/.....	202	2,959	153	6,419	373	8,184	147	3,238	
\$300,000 under \$500,000 1/.....	3,691	93,222	3,861	266,646	4,119	168,166	4,573	108,299	
\$Over \$500,000, total.....	4,194	217,759	5,213	1,085,825	9,141	1,801,632	7,057	287,526	
\$500,001 under \$1,000,000.....	2,921	146,928	3,037	297,160	5,210	407,775	4,445	120,121	
\$1,000,000 under \$2,500,000.....	965	43,287	1,658	339,806	2,829	533,417	2,100	92,979	
\$2,500,000 under \$5,000,000.....	239	15,365	317	129,066	755	291,322	328	32,836	
\$5,000,000 under \$10,000,000.....	44	11,220	128	118,514	229	213,588	111	12,783	
\$10,000,000 or more.....	23	957	71	201,276	117	355,526	69	28,805	

Size of net worth	Type of property--Continued								
	Corporate stock		Cash		Notes and mortgages		Life insurance		
	Number of returns	Amount	Number of returns	Amount	Number of returns	Amount	Number of returns	Amount	
	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	
Total 1/.....	40,263	11,509,782	51,125	5,878,496	19,956	1,904,021	36,974	1,952,038	
Deficit and under \$300,000 1/.....	2,364	102,471	3,413	130,890	1,348	87,784	3,160	183,027	
\$300,000 under \$500,000 1/.....	16,420	1,465,053	21,885	1,987,058	6,816	338,941	18,886	787,471	
\$Over \$500,000, total.....	21,476	9,942,257	25,825	3,760,546	11,789	1,477,294	14,926	981,539	
\$500,001 under \$1,000,000.....	14,087	2,706,380	17,569	2,015,091	7,682	563,557	10,065	545,470	
\$1,000,000 under \$2,500,000.....	5,637	2,691,458	6,253	1,019,468	2,956	465,375	3,660	301,938	
\$2,500,000 under \$5,000,000.....	1,207	1,628,008	1,414	350,254	804	218,918	854	71,161	
\$5,000,000 under \$10,000,000.....	362	1,011,080	395	155,497	223	107,669	234	44,322	
\$10,000,000 or more.....	182	1,905,329	192	220,234	122	121,774	112	18,646	

Size of net worth	Type of property--Continued								
	Annuities		Noncorporate business assets		Household goods and other assets		Lifetime transfers		
	Number of returns	Amount	Number of returns	Amount	Number of returns	Amount	Number of returns	Amount	
	(26)	(27)	(28)	(29)	(30)	(31)	(32)	(33)	
Total 1/.....	7,575	430,463	14,828	2,060,145	47,866	2,079,169	8,671	4,729,347	
Deficit and under \$300,000 1/.....	532	11,047	1,197	71,598	3,091	47,405	230	44,768	
\$300,000 under \$500,000 1/.....	2,910	98,743	5,060	270,372	20,232	344,227	2,663	526,254	
\$Over \$500,000, total.....	4,131	320,670	8,568	1,718,174	24,540	1,687,535	5,776	4,158,323	
\$500,001 under \$1,000,000.....	2,972	201,233	5,292	358,989	16,785	474,243	3,488	1,233,202	
\$1,000,000 under \$2,500,000.....	921	81,173	2,289	500,806	5,780	357,577	1,616	1,062,974	
\$2,500,000 under \$5,000,000.....	147	22,089	687	382,743	1,392	190,612	443	665,029	
\$5,000,000 under \$10,000,000.....	57	13,249	199	167,049	393	163,118	138	381,515	
\$10,000,000 or more.....	32	2,925	100	308,586	189	501,984	90	815,600	

1/Asset detail does not add to total gross estate since it is not required to be reported for the estates of decedents with \$500,000 or less of gross estate who died after December 31, 1981. To the extent that this information was filed voluntarily, it is presented in this table.
 NOTE: Detail may not add to total because of rounding.

Estate Tax Data

Table 3.--All Decedents: Number of Returns and Gross Estate, by Sex and Marital Status of Decedent, and by Size of Gross Estate

[All figures are estimates based on samples--money amounts are in thousands of dollars]

Marital status and size of gross estate	All decedents				Male decedents	
	Number of returns	Gross estate	Estate tax after credits		Number of returns	Gross estate
			Number of returns	Amount		
	(1)	(2)	(3)	(4)	(5)	(6)
All decedents, total.....	63,251	50,390,376	35,148	5,169,985	38,774	32,429,386
\$300,000 through \$500,000.....	34,744	13,195,025	17,105	571,509	20,613	7,796,981
\$500,001 under \$1,000,000.....	19,266	13,191,296	11,678	1,201,280	12,108	8,308,250
\$1,000,000 or more.....	9,241	24,004,055	6,364	3,397,196	6,053	16,324,155
Married decedents, total.....	33,835	28,552,205	8,210	1,347,915	28,434	24,484,130
\$300,000 through \$500,000.....	17,851	6,714,958	2,048	43,363	14,781	5,571,839
\$500,001 under \$1,000,000.....	10,651	7,355,501	3,521	244,136	9,051	6,240,000
\$1,000,000 or more.....	5,333	14,481,745	2,641	1,060,416	4,602	12,672,291
Widowed decedents, total.....	22,822	16,643,974	21,438	2,948,505	6,538	4,792,632
\$300,000 through \$500,000.....	13,203	5,046,732	12,181	426,070	3,760	1,424,793
\$500,001 under \$1,000,000.....	6,698	4,537,749	6,436	773,455	1,935	1,297,715
\$1,000,000 or more.....	2,922	7,059,493	2,821	1,748,981	843	2,070,124
Single decedents, total.....	4,171	3,164,920	3,399	525,194	**3,802	**3,152,624
\$300,000 through \$500,000.....	2,418	944,034	1,852	71,056	**2,073	**800,349
\$500,001 under \$1,000,000.....	1,081	719,638	926	101,049	**1,121	**770,535
\$1,000,000 or more.....	672	1,501,248	620	353,088	**608	**1,581,740
Other decedents, total 1/.....	2,423	2,029,278	2,101	348,370	**	**
\$300,000 through \$500,000.....	1,272	489,301	1,023	31,019	**	**
\$500,001 under \$1,000,000.....	836	578,407	795	82,640	**	**
\$1,000,000 or more.....	315	961,570	282	234,711	**	**

Marital status and size of gross estate	Male decedents--Continued		Female decedents			
	Estate tax after credits		Number of returns	Gross estate	Estate tax after credits	
	Number of returns	Amount			Number of returns	Amount
	(7)	(8)	(9)	(10)	(11)	(12)
All decedents, total.....	15,661	2,506,160	24,478	17,960,990	19,488	2,663,825
\$300,000 through \$500,000.....	6,115	195,602	14,130	5,398,044	10,991	375,907
\$500,001 under \$1,000,000.....	5,860	530,683	7,158	4,883,046	5,818	670,597
\$1,000,000 or more.....	3,686	1,779,875	3,189	7,679,900	2,678	1,617,321
Married decedents, total.....	6,510	1,156,205	5,401	4,068,075	1,701	191,711
\$300,000 through \$500,000.....	1,234	25,904	3,070	1,143,120	814	17,460
\$500,001 under \$1,000,000.....	2,966	204,277	1,600	1,115,501	554	39,859
\$1,000,000 or more.....	2,309	926,024	731	1,809,454	332	134,392
Widowed decedents, total.....	6,071	809,522	16,284	11,851,342	15,367	2,138,982
\$300,000 through \$500,000.....	3,394	122,395	9,443	3,621,939	8,787	303,674
\$500,001 under \$1,000,000.....	1,864	214,150	4,763	3,240,034	4,572	559,305
\$1,000,000 or more.....	813	472,977	2,078	4,989,369	2,008	1,276,003
Single and other 1/decedents, total..	**3,079	**540,432	**2,792	**2,041,574	**2,420	**333,132
\$300,000 through \$500,000.....	**1,486	**47,302	**1,617	**632,986	**1,390	**54,773
\$500,001 under \$1,000,000.....	**1,030	**112,257	**796	**527,510	**692	**71,432
\$1,000,000 or more.....	**563	**380,873	**379	**881,078	**339	**206,926

1/Includes legally separated, divorced, and "Marital Status Unstated" decedents.

**Data combined to avoid disclosure of information for specific returns.

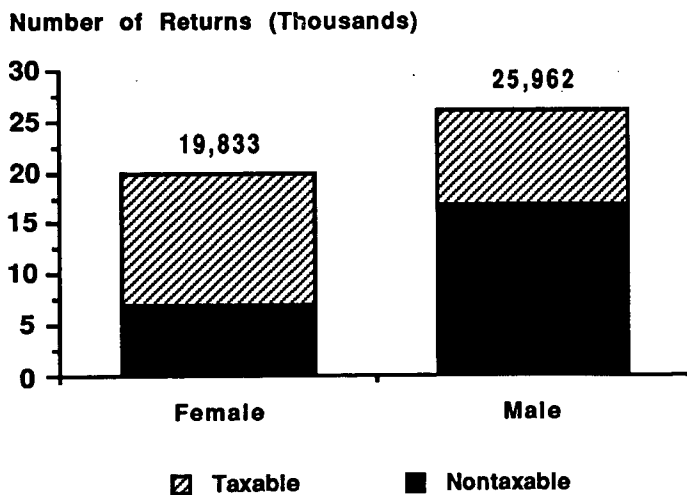
NOTE: Detail may not add to total because of rounding.

Estate Tax Returns, 1986-1988

by Barry W. Johnson

There were an estimated 45,800 U.S. citizens who died in 1986 with gross estates above \$500,000. These decedents made up almost 2.2 percent of the total U.S. decedent population for 1986 and had a combined total gross estate of over \$66 billion [1]. Their executors claimed over \$30 billion in allowable deductions. Just under half of these returns (or 22,000) were taxable, reporting a tax liability that totalled almost \$6.3 billion (see Figure A).

Figure A
1986 Decedents: Number of Returns by Sex and Tax Status



BACKGROUND

The Internal Revenue Service's Statistics of Income Division (SOI) samples estate tax returns in order to evaluate the effects of tax policies and to provide annual estimates of the financial characteristics of estate tax filers. Currently, an estate tax return can be filed up to 9 months after a decedent's death; a six month extension is available beyond

that. Thus, returns for a particular year of death may be filed over a period of several years. This means that the sample must span several years if estimates of a specific year of death are desired.

Year of death estimates are desirable for several reasons. Because of filing extensions and other delays, returns filed in any given year can represent decedents who died in many different years. This means that the estate tax return data for a filing year can reflect different economic and tax law conditions. By concentrating on a single year of death, these limitations can be overcome, making it possible to study the data in the context of a single time period.

This article presents data from returns filed in 1986-1988, focusing on 1986 as the year of death. Data for each of these filing years are also presented to facilitate comparisons with past SOI data, which presumed that filing year data were, in general, for decedents who had died the previous year. The main objective of the analysis, however, is to present an accurate portrayal of the estates of decedents who died in a specific year, 1986, regardless of when returns for their estates were filed [2].

History of the Estate Tax

The modern estate tax has been in effect since 1916. Estate and inheritance taxes, however, had been instituted periodically before this, usually to raise revenue during wartime. The estate tax is a tax on the transfer of assets from the decedent rather than on the value of assets inherited by a decedent's beneficiaries. The purpose of the tax is to raise revenue and to redistribute wealth in order to prevent the concentration of wealth [3]. While rates and filing requirements have varied since its inception, there

*Foreign Special Projects Section. Prepared under the direction of Michael Alexander, with assistance from Marvin Schwartz, Elizabeth Nelson, and Louise Woodburn.

have been relatively few changes in the structure of the estate tax. Some modifications to the law have included a deduction for bequests to the surviving spouse and allowing for alternate valuation of assets should their value decrease shortly after death [4].

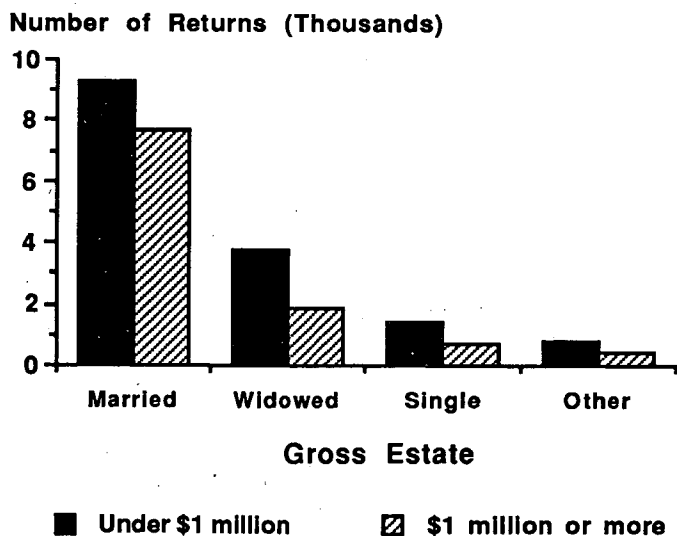
The most recent changes to the tax rates and filing requirement were due to the Economic Recovery Tax Act of 1981. This Act provided for increasing the filing requirement from \$175,000 in 1981 to \$600,000 by 1987. The top tax rate was to be lowered from 70 percent to 50 percent by 1985. Subsequent tax law changes have sustained a maximum rate of 55 percent until 1993. (For a more detailed summary of estate tax law changes, see Appendix I.)

1986 DECEDENTS

Males accounted for about 57 percent of the estate tax returns filed for 1986 decedents. The majority of these men were married, nearly half of whom had gross estates of \$1 million or more (see Figure B). In fact, the average size of a married male decedent's gross estate was \$1,715,216. Only 36 percent of returns filed for all male decedents showed any estate tax; as a group, they accounted for about 45 percent of the total tax reported.

Figure B

1986 Male Decedents: Number of Returns by Size of Gross Estate and Marital Status

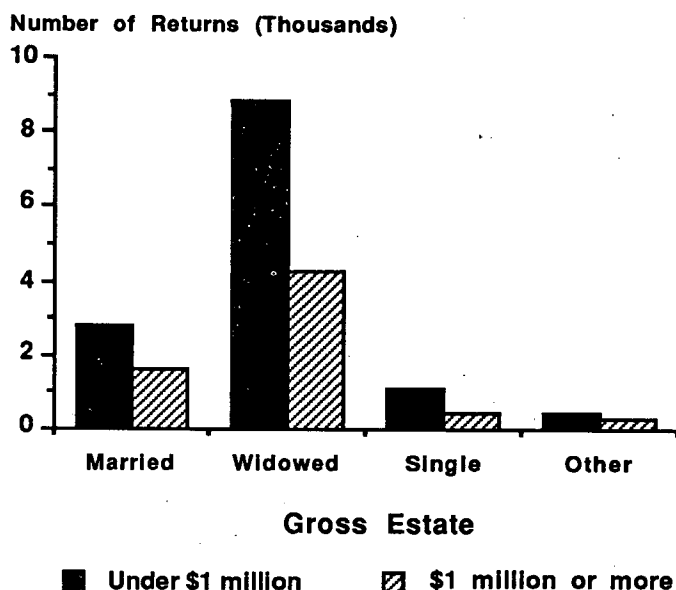


The majority of female decedents, on the other hand, were widowed (see Figure C). Although as a group women made up only 43 percent of the total

1986 estate tax population, 64 percent of their returns were taxable. Women accounted for almost 55 percent of the total estate tax reported, although their estates accounted for only 38 percent of the aggregate gross estate for 1986.

Figure C

1986 Female Decedents: Number of Returns by Size of Gross Estate and Marital Status

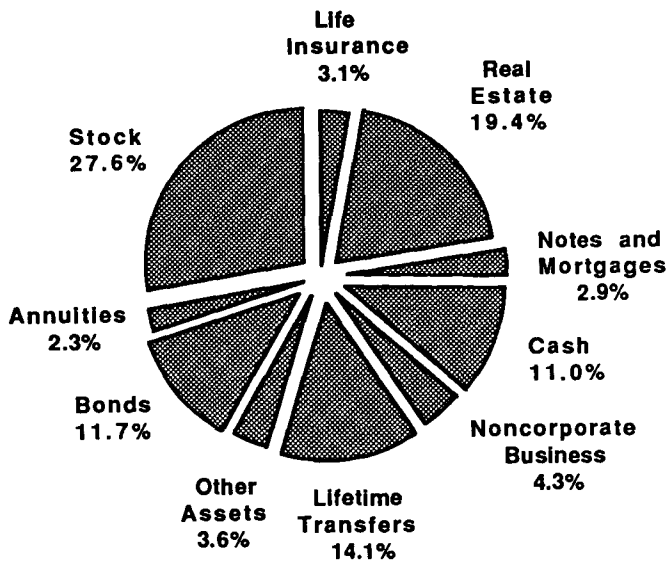


It is not surprising that the majority of female decedents were widowed, given that women in general have longer life expectancies than their male counterparts. The majority of married decedents leave the bulk of their estates to their spouses, thereby deferring some or all of the estate taxes until the death of the surviving spouses. Therefore, it is understandable that widowed female decedents would bear a larger share of the tax burden. It is interesting, however, that the average size of their estates was \$1,265,472, considerably lower than that of married male decedents. In fact, only about a third of widowed women had gross estates of \$1 million or more, again, far fewer than married men. It is not likely that these differences can be attributed entirely to consumption of the estate due to normal living expenses. This suggests (1) that many married men leave substantial bequests to survivors other than their spouse, and (2) that widowed women may be inclined to pass on property through gifts during their lifetime, rather than waiting until their deaths.

Assets

Overall, corporate stock, including the value of stock in closely held corporations, made up the largest portion of the total gross estate of 1986 decedents, almost 28 percent (see Figure D). Real estate was the second largest asset type, accounting for about 19 percent of gross estate. Lifetime transfers (for a definition, see Appendix II), bonds, and cash, in that order, accounted for substantial portions of the remaining gross estate for 1986 decedents.

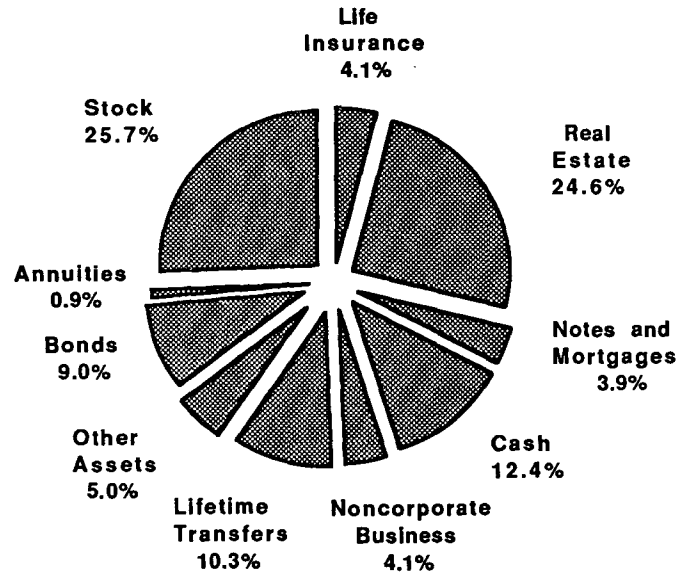
Figure D
1986 Decedents: Composition of Total Gross Estate



A comparison of 1986 decedent data with data for 1982 decedents shows that the value of corporate stock, as a percentage of gross estate, has been almost constant (see Figure E) [5]. The value of real estate, however, decreased significantly between these two years. The decline in real estate for 1986 seems to have been offset by an increase in bond holding, specifically in tax-free municipal bonds, and in annuities, which include individual retirement arrangements (IRA's), Keogh self-employed retirement plans, and other tax deferred retirement instruments. Taxable transfers of property during the decedent's life also increased significantly. It is also interesting to note that the principal asset type for decedents with less than \$1 million in gross estate, in both years, was real estate, not stock.

Figure E

1982 Decedents: Composition of Total Gross Estate

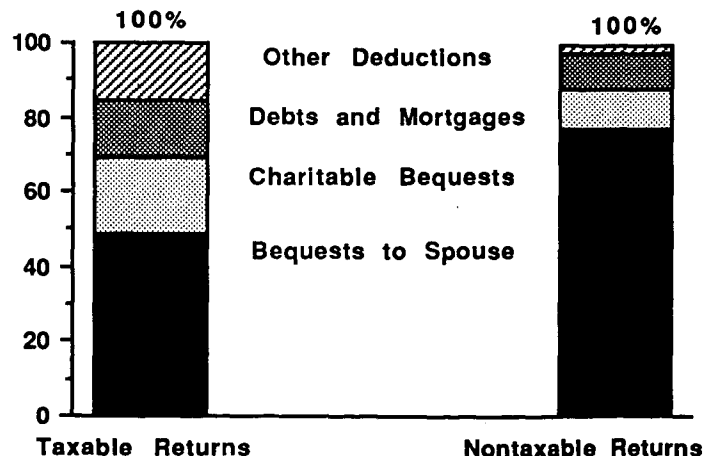


Deductions

The largest single deduction for 1986 decedents was for bequests to the surviving spouse. Under the current law, the executors of an estate for a decedent dying after 1981 can take an unlimited deduction from total gross estate for assets left to the surviving spouse. This deduction accounted for about 78 percent of the total allowable deductions for estates with no tax liability, and for almost 50 percent of the deductions for taxable estates (see Figure F). Bequests to charities were the second most significant

Figure F

1986 Decedents: Total Deductions by Tax Status



deduction, accounting for 10 percent of allowable deductions for nontaxable returns and 20 percent for taxable. Estates with no tax liability gave more (as a percentage of their gross estates) to charities (7.5 percent) than did taxable estates (5.2 percent). Overall, decedents with larger gross estates, regardless of their tax status, tended to give a larger percentage of their assets to charities.

Alternate Valuation

Estate tax law allows for the valuation of assets at their value up to six months after the date of death if there is a decline in the value of some assets immediately following the decedent's death. (For a definition, see Appendix II.) Figure G shows data for all returns filed between 1986 and 1988, which include decedents who died in several different years. For 1986 decedents, 2,441 estates, or 5.4 percent, chose to use alternate valuation. The result was a decrease in the estate tax after credits from \$912 million to \$838 million, a savings of about 8 percent [6].

Because this analysis is limited to only those returns filed between 1986 and 1988, these data represent only a portion of those dying in 1987. However, even this advanced look at 1987 decedents shows that a much greater number of these estates (about 16 percent of those returns filed) elected alternate valuation. The use of alternate valuation for these decedent's returns caused reductions in their aggregate gross estate and estate tax after credits which were considerably higher than the corresponding reductions in the other years. This is almost certainly attributable to the dramatic decline in stock values which occurred in October of that year.

FILING YEAR DATA

Although data by year of death are clearly superior for many applications, data by filing year are not without merit. One of the chief benefits of filing year data is that they are available relatively quickly, unlike year of death data, which must be gathered over a period of several years. Availability of data on a timely basis is particularly important for tax administration and for analyzing the effects of changes in tax policies. Given that about two-thirds of the returns filed in a particular year are for decedents who died in the previous year, filing year data can be easily adapted for this type of analysis.

In 1988, almost 41,000 estate tax returns were filed; their combined total gross estate was about \$69 billion. This was nearly 27 percent more than the number of filers and combined gross estate reported in 1986 (see Figure H).

Converting all figures to 1986 dollars to adjust for the effects of inflation shows a true increase over this period of 16 percent in both the number of filers and size of gross estate [7]. Total deductions increased by about 15 percent. Estate tax before credits was over \$13 million in 1988, almost 18 percent higher than 1986. However, for the same period, estate taxes after credits fell nearly 6 percent. The drop in tax liability may be due, in part, to an increase in the unified credit during this period from \$121,800 for those dying in 1985 (filed mainly in 1986), to 192,800 for those dying after 1986 (see Appendix I).

SUMMARY

While the number of U.S. decedents with gross estates above \$600,000 (the filing requirement after

Figure G.—Returns with Gross Estate of \$500,000 or More at Time of Death: Use of Alternate Valuation Method by Year of Death, 1985 or prior through 1988

[Amounts are in millions of dollars]

Item	Year of death			
	1985 or prior ¹	1986 ²	1987 ¹	1988 ¹
	(1)	(2)	(3)	(4)
All returns	38,746	45,330	39,719	7,124
Returns with alternate valuation used:				
Number.....	1,356	2,441	6,281	623
Percentage of total returns.....	3.5%	5.4%	15.8%	8.7%
Total gross estate, date of death value.....	\$2,499	\$4,729	\$11,820	\$1,114
Total gross estate, alternate value.....	2,398	4,573	11,094	1,076
Percentage reduction in gross estate.....	4.0%	3.3%	6.1%	3.4%
Estate tax after credits (based on date of death value).....	\$488	\$912	\$2,345	\$217
Estate tax after credits (based on alternate value).....	437	838	1,999	198
Percentage reduction in tax.....	10.5%	8.1%	14.8%	8.8%

¹ Data represent only a portion of each of these populations because they are based only on returns filed in 1986-1988.

² In order to make them more comparable to the data shown for other years of death, 1986 data in Figure G have not been adjusted for missing returns (see the section on "Data Sources and Limitations").

Figure H.—Returns with Gross Estate of \$600,000 or more: Number of Returns, Gross Estate, Taxable Estate, and Estate Tax, by Filing Year, 1986–1988

[Amounts are in millions of dollars]

Item	Year of death			Percentage increase, 1986–1988
	1986	1987	1988	
	(1)	(2)	(3)	(4)
Number of returns	32,312	37,573	40,860	26.5%
Total gross estate.....	\$54,441	\$62,455	\$69,065	26.9
1986 constant dollars:				
Number of returns	33,597	37,459	39,057	16.3
Total gross estate	\$56,770	\$62,233	\$65,856	16.0
Total deductions	27,660	29,665	31,851	15.2
Taxable estate	29,246	32,841	34,157	16.8
Estate tax before credits	11,389	12,864	13,413	17.8
Estate tax after credits	6,446	6,328	6,090	-5.5

1986) increased over the period 1986-1988, along with the size of their aggregate total gross estate, the estate tax actually declined in real terms. For 1986 decedents, males, most of whom were married at the time of death, outweighed females both in terms of the number of filers and overall size of gross estate. Female decedents, however, most of whom were widowed, accounted for a larger share of the tax. Real estate was the most significant asset for decedents with less than \$1 million in total gross estate, but corporate stock supplanted it for wealthier decedents. The bequest to the surviving spouse was the largest deduction and was used by many executors to defer much or all of the tax owed on an estate until the death of the other married partner.

DATA SOURCES AND LIMITATIONS

The data presented in this article are estimates based on samples of returns filed in 1986, 1987, and 1988. These samples were limited to returns filed for decedents dying after 1981 with total gross estates of at least \$500,000. The sample for the 1986 filing year included 4,575 returns out of a total population of 42,172. In 1987, the year most returns for 1986 decedents were filed, 11,257 returns were sampled out of a total of 45,119. There were 5,437 returns out of 43,683 sampled during the 1988 filing year. The combined 1986-1988 sample contained 13,694 returns filed for 1986 decedents.

Sample Design

Estate tax returns were statistically sampled while the returns were being processed for administrative purposes, but before any audit examination. Thus, returns were selected on a flow basis using a stratified random probability sampling method, whereby the sample rates were preset based on the desired sample size and an estimate of the population. Current plans for estate tax statistics are based

on recurring cycles of 3 or 4 years, focusing on years of death ending in 2, 6, and 9 every decade (1982, 1986, 1989, ...), so that returns filed in consecutive years are combined to produce statistics for those specific years of death.

This structure accommodates the filing requirements which allow an estate to file an estate tax return up to 9 months after the decedent's death, although an additional 6 month extension is often attainable. Thus, the return for a decedent who died in December 1986 might not be timely filed until March 1988. The sample focuses on year of death rather than filing year to parallel the effective dates of tax law changes. Estate tax data based on year of death can also be more accurately used as the basis for computing wealth estimates of the living population by using the Estate Multiplier Technique [8]. Data gathered during the 1986-1988 filing years focus on 1986 decedents. Additionally, they can be used to estimate the financial characteristics of those filing in each of these three years.

Stratification Variables

Estate tax return data are collected using a stratified sample, the basic nature of which has not changed since it was first implemented in 1982. The design has three stratification variables: year of death, age at death and total gross estate. For the 1986-1988 filing years, the year of death variable is separated into 2 categories: 1986 year of death and non-1986 year of death. Age was broken down into four categories: under 40, 40 under 50, 50 under 65, and 65 and older (including age unknown). Total gross estate was limited to three categories: \$500,000 under \$1 million, \$1 million under \$5 million, and \$5 million or more. The non-1986 portion of the sample included only those decedents dying after 1981 with total gross estates of \$500,000 or more. Sampling rates ranged from 7 to 100 percent [9].

1986 Decedent Population Estimates

An examination of year of death by filing year for returns filed from 1982 through 1988 revealed that almost 99 percent of all returns for decedents dying in a given year are filed by the end of the second calendar year following the year of death. Further, the decedent's age at death and the length of time between the decedent's date of death and the filing of an estate tax return are related. It was therefore possible to adjust the sample weights of the 1986 decedents within age group to account for returns not filed within a 3 year period and, thus, unavailable for this sample.

Limitations

Because the data in this article are estimates based on samples, they are subject to sampling as well as nonsampling error. In order to use the statistical data properly, the magnitude of the potential sampling error should be considered. Estimates of the coefficients of variation (CV's) for frequency estimates can be obtained by writing the author at the following address:

Internal Revenue Service,
Statistics of Income Division, R:S:F
P.O. Box 2608
Washington, DC 20013-2608

APPENDIX I

TAX LAW CHANGES, 1981-1987

The data reported in this article have been influenced by three major pieces of tax legislation: the Economic Recovery Tax Act of 1981, the Tax Reform Act of 1986, and the Revenue Act of 1987.

Economic Recovery Tax Act of 1981

Changes in estate tax law as a result of the Economic Recovery Tax Act of 1981 applied to decedents who died after December 31, 1981. The major tax law change resulting from this Act was a gradual increase in the unified credit (see Appendix II), from \$47,000 in 1981 to \$192,800 by 1987. This had the effect of gradually increasing the filing requirement from \$175,000 to \$600,000. Figure I gives the filing requirements and associated unified credits for each of the years of death included in the 1986-1988 SOI sample.

This Act also abolished limits on the allowable

Figure I.—Unified Credit and Filing Requirements, by Year of Death

Year of death	Unified credit	Filing requirement
1982	\$ 62,800	\$225,000
1983	79,300	275,000
1984	96,300	325,000
1985	121,800	400,000
1986	155,800	500,000
1987 and thereafter	192,800	600,000

deduction for assets bequeathed to the surviving spouse, such that, all assets could be transferred to the spouse tax free. Additionally, the maximum estate tax rate was reduced from 70 percent on net (taxable) estate in excess of \$5 million in 1981, to 50 percent on net (taxable) estate in excess of \$2.5 million by 1985 [10]. The Tax Reform Act of 1984 delayed this reduction 3 years, keeping the highest rate at 55 percent on net (taxable) estate in excess of \$3 million, until 1987.

Tax Reform Act of 1986

The Tax Reform Act of 1986, first applicable to decedents dying in 1987, resulted in modifications to the tax treatment of "generation skipping trusts" (GST). These are trusts which provide for the splitting of benefits between two or more generations that are younger than the generation of the persons establishing the trusts; i.e., the "grantors." The changes simplified the tax rates and increased the amount a grantor can transfer into a GST tax free, known as the "specific exemption," from \$250,000 to \$1,000,000. Three specific "taxable events" were also defined: the distribution of property (income or corpus) from the trust to a beneficiary, a termination or expiration of a beneficiary's interest in a trust (usually due to death), or a direct skip or outright transfer of property to a person at least two generations younger than the grantor.

A third outcome of the 1986 Act was the establishment of the employee stock ownership plan (ESOP) deduction. It provided for a tax deduction equal to 50 percent of the proceeds resulting from the sale (by the estate) of employer securities back to the ESOP or to an eligible worker-owned cooperative (EWOC) [11].

Revenue Act of 1987

The Revenue Act of 1987 applied to decedent's dying after 1987. This Act delayed the reduction of the top estate tax rate from 55 percent to 50 percent until after 1992. It also phased out the graduated rates and unified credit for taxable estates larger than

\$10,000,000. This was achieved by adding 5 percent of any amount of taxable estate in excess of \$10,000,000 but not over \$21,040,000 to the estate tax before credits. At the \$21,040,000 level, the effects of the graduated rates and the unified credit are completely recaptured such that the entire estate is taxed at the maximum rate of 55 percent. (The additional tax was limited to taxable estates in excess of \$10,000,000 but not over \$18,340,000 for decedents dying after 1992 due to the lowering of the maximum estate tax rate to 50 percent by 1993.)

"Estate freeze" legislation was a third area affected by the Revenue Act of 1987. These "freezes" occur when an older family member transfers a disproportionately large share of the potential future appreciation in a family business (usually in the form of common stock) to a younger family member, but retains a disproportionately large share of the income or rights. This "freezes" the value of the company includable in the older family member's estate at its value on the date of the transfer. The 1987 legislation provided for including the full date-of-death value of any property transferred after December 17, 1987, in the older decedent's gross estate when this occurred.

Finally, the use of the ESOP deduction was more carefully defined and its use somewhat restricted in many cases. The deduction was limited to 50 percent of the taxable estate, with overall reduction of the estate tax due to this deduction limited to \$750,000 [12].

APPENDIX II

DEFINITIONS

Brief definitions of some of the terms used in the tables are provided below:

Adjusted Taxable Estate.--Adjusted taxable estate was equal to the sum of total taxable estate and adjusted taxable gifts.

Adjusted Taxable Gifts.--Certain gifts made during the life of an individual who died before 1982 were automatically included in the gross estate. However, for the estate of an individual who died after this, these gifts were not generally included in the gross estate. In these estates, the gifts were included in the amount of the adjusted taxable gifts and combined with adjusted taxable estate for the purposes of determining the "estate tax before credits."

Alternate Value of Gross Estate.--All property included in the gross estate could be valued at one of two points in time. While the value of the gross estate at the date of death determined whether an estate tax return had to be filed, the executor of the estate had the option of valuing the estate as of the date of death or 6 months thereafter. (Any property sold, exchanged or otherwise disposed of within 6 months was valued as of the date of the disposition.)

Annuities.--These were investments for which a person receives a fixed income for a set period of time and include assets related to pensions or retirement such as equity in a Keogh self-employed retirement plan or in individual retirement arrangements (IRA's).

Bequests to Surviving Spouse.--This was equal to the value of property interest passing from the decedent to the surviving spouse and was taken as a deduction from the "total gross estate."

Date-of-Death Value of Gross Estate.--The amount of property in this category was the fair-market value of all the assets at the time of death of the decedent. Although this value was used as a criterion for filing an estate tax return, it was not the only measure that could be used in valuing property for estate tax purposes. See also "alternate value of gross estate."

Estate Tax After Credits.--This was the tax liability of the estate remaining after subtraction of credits for State death taxes, foreign death taxes, and Federal gift taxes previously paid. In addition, a "unified credit," graduated according to the year of death and a "credit" for gift taxes paid on post-1976 gifts, is allowed. See also "unified credit."

Estate Tax Before Credits.--This was the tax obtained by applying the graduated estate tax rates to the adjusted taxable estate reduced by the amount of Federal gift taxes previously paid.

Federal Gift Taxes Previously Paid.--Credit was allowed against the estate tax for the Federal gift tax paid on a gift made by a decedent before 1977. No credit, apart from the unified credit, was allowed for any gift tax paid on gifts made after 1976.

Lifetime Transfers.--Included were two categories of gifts that, by law, had to be reported in total gross estate: gifts taking effect at death, and gifts of property in which the decedent retained some rights during his or her lifetime.

Net Worth.--Net worth was equal to the total gross estate less debts and mortgages.

Nontaxable Returns.--Nontaxable returns were those with no estate tax after credits.

Other Tax Credits.--The sum of all tax credits (other than the unified credit) taken as a deduction against the estate tax before credits. Those include credits for State death taxes, foreign death taxes, Federal gift taxes and taxes on prior transfers.

Tax on Prior Transfers.--A tax credit was allowed for Federal estate tax paid on property received by the decedent or the estate from a transferor who died within 10 years before, or 2 years after, the decedent. The credit was intended to lessen the burden of double taxation between successive estates whose owners had died within a short period of time. Depending on the time that elapsed between the deaths, a credit is allowed for all or part of the Federal estate tax paid by the transferor's estate with respect to the transfer.

Taxable Estate.--Taxable estate is the base to which the graduated Federal estate tax rates are applied in computing the estate tax before credits. Taxable estate is equal to the value of the "total gross estate" less deductions for the following: funeral and administrative expenses; casualty and theft losses; debts, mortgages, losses and other claims against the estate, including pledges to charitable organizations; bequests to the surviving spouse; and the ESOP deduction (included in the statistics for "other expenses and losses").

Taxable Returns.--Taxable returns were those with an amount of estate tax after credits.

Total Gross Estate.--An estate tax return was required in the case of every decedent whose gross estate exceeded the legal filing requirement in effect for the year of death. For estate tax purposes, the gross estate included all property or interest in property before reduction by debts (except policy loans against insurance) and mortgages, or by administrative expenses. Included in the gross estate were such items as real estate, tangible and intangible personal property, certain lifetime gifts made by the decedent, property in which the decedent had a general power of appointment, the decedent's interest in annuities receivable by the surviving beneficiary, the decedent's share in community

property, life insurance proceeds (even though payable to beneficiaries other than the estate), dower or courtesy of the surviving spouse (inherited property), and, with certain exceptions, joint estates with right of survivorship and tenancies by the entirety.

Unified Credit.--The unified credit, so called because it is used for both estate and gift tax purposes, is applied as a dollar for dollar reduction of the estate tax. (The unified credit represents the amount of tax on that part of gross estate which is below the filing requirement.) The credit must be used to offset gift taxes on lifetime transfers made after 1976. However, to the extent it is so used, the amount of credit available at death is reduced.

NOTES AND REFERENCES

- [1] Based on the number of deaths of U.S. residents in 1986 as reported by the National Center for Health Statistics.
- [2] All data for 1986 year of death will be for decedents with \$500,000 or more in total gross estate, the filing requirement for that year of death. Data presented for the 1986, 1987, and 1988 filing years will be for decedents with \$600,000 or more in gross estate, the filing requirement for decedents dying after 1986.
- [3] Office of the Secretary of the Treasury, Office of Tax Analysis, *Legislative History of Death Taxation in the United States, 1963*, Unpublished Manuscript.
- [4] Bentz, Mary, "Estate Tax Returns, 1983," *Statistics of Income Bulletin*, Fall 1984, Volume 4, Number 2.
- [5] 1982 figures were converted to constant 1986 dollars using the implicit price deflator for gross national product, *Economic Report of the President*, U.S. Government Printing Office, Washington, DC, 1990. Only returns with \$500,000 or more of gross estate in 1986 dollars were included.
- [6] The reduction in estate tax for decedents using alternate valuation was estimated using the value of all assets on the date of death as reported on their returns.

- [7] Figures for each filing year were converted to constant 1986 dollars based on decedents' dates of death, using the implicit price deflator for gross national product.
- [8] Schwartz, Marvin, and Johnson, Barry, "Estimates of Personal Wealth, 1986," *Statistics of Income Bulletin*, Spring 1990, Volume 9, Number 4.
- [9] Woodburn, Louise, and Johnson, Barry, "Analyzing the Weighting Strategy for the Statistics of Income 1987 Estate Study," *American Statistical Association Proceedings*, 1989, Section on Survey Research Methods.
- [10] *Impact of the Economic Recovery Tax Act of 1981 on Estate Planning and Administration*, Program Material, California Continuing Education of the Bar, Berkeley, CA, 1982.
- [11] U.S. Congress, Joint Committee on Taxation, *General Explanation of the Tax Reform Act of 1986*, 1987.
- [12] *A Complete Guide to the Revenue Act of 1987*, Prentice Hall, Paramus, NJ, 1988.

Table 1.—Returns Filed in 1986: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate

(Estimates are based on samples—money amounts are in thousands)

Size of gross estate	Number of returns	Gross estate	Type of property ¹			
			Real estate		Corporate stock	
			Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)
All returns, total	42,125	59,805,047	32,806	12,361,635	33,747	17,029,085
\$500,000 under \$600,000	9,860	5,410,957	7,652	1,254,260	7,551	1,120,177
\$600,000 under \$1,000,000	17,149	13,024,272	12,864	2,969,008	13,493	2,929,218
\$1,000,000 under \$2,500,000	11,044	16,417,148	8,775	3,546,220	9,158	4,234,207
\$2,500,000 under \$5,000,000	2,819	9,732,378	2,429	2,390,843	2,437	2,775,647
\$5,000,000 under \$10,000,000	863	5,789,508	751	985,747	767	2,174,287
\$10,000,000 or more	390	9,430,785	334	1,215,556	343	3,795,549
Taxable returns, total	23,731	37,639,623	17,172	7,004,646	18,790	11,845,773
\$500,000 under \$600,000	5,031	2,764,310	3,553	567,542	3,885	628,786
\$600,000 under \$1,000,000	9,223	7,003,677	6,346	1,467,475	6,867	1,608,301
\$1,000,000 under \$2,500,000	6,798	10,236,947	4,888	2,188,970	5,708	2,888,550
\$2,500,000 under \$5,000,000	1,780	5,998,095	1,602	1,254,600	1,536	2,027,232
\$5,000,000 under \$10,000,000	594	3,988,457	518	659,733	527	1,447,025
\$10,000,000 or more	305	7,648,138	264	866,326	267	3,245,878
Nontaxable returns, total	18,393	22,165,424	15,634	5,356,989	14,957	5,183,312
\$500,000 under \$600,000	4,828	2,646,647	4,100	686,718	3,666	491,391
\$600,000 under \$1,000,000	7,927	6,020,595	6,518	1,501,533	6,626	1,320,917
\$1,000,000 under \$2,500,000	4,245	6,180,201	3,887	1,357,250	3,450	1,345,656
\$2,500,000 under \$5,000,000	1,038	3,734,283	826	1,136,243	901	748,414
\$5,000,000 under \$10,000,000	269	1,801,051	233	326,014	239	727,261
\$10,000,000 or more	85	1,782,647	70	349,230	76	549,671

Size of gross estate	Type of property ¹ (continued)							
	Federal savings bonds		Other Federal bonds		State and local bonds		Corporate and foreign bonds ¹	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
All returns, total	6,308	321,594	10,365	1,656,896	16,806	3,927,904	10,350	408,766
\$500,000 under \$600,000	1,851	67,462	2,526	199,878	2,778	215,993	1,948	64,623
\$600,000 under \$1,000,000	2,945	102,242	4,461	393,036	6,616	666,386	3,843	166,470
\$1,000,000 under \$2,500,000	1,196	81,795	2,014	249,980	5,217	1,174,120	3,366	76,249
\$2,500,000 under \$5,000,000	207	63,555	998	392,054	1,448	624,985	855	44,652
\$5,000,000 under \$10,000,000	83	5,386	248	133,953	508	524,669	212	18,784
\$10,000,000 or more	27	1,155	117	287,995	239	721,750	125	37,986
Taxable returns, total	3,728	233,223	6,726	1,129,474	9,633	2,669,581	6,478	270,596
\$500,000 under \$600,000	896	27,595	1,429	82,205	1,246	86,545	1,293	54,079
\$600,000 under \$1,000,000	1,731	63,814	2,770	273,718	3,611	403,510	2,069	98,896
\$1,000,000 under \$2,500,000	840	76,563	1,513	183,390	3,202	771,458	2,331	49,349
\$2,500,000 under \$5,000,000	173	59,471	703	223,817	1,040	402,626	528	23,390
\$5,000,000 under \$10,000,000	64	4,718	208	110,840	335	364,444	158	15,756
\$10,000,000 or more	24	1,062	103	255,504	198	640,998	99	29,125
Nontaxable returns, total	2,580	88,372	3,639	527,422	7,173	1,258,323	3,872	138,170
\$500,000 under \$600,000	955	39,867	1,097	117,673	1,532	129,448	655	10,544
\$600,000 under \$1,000,000	1,214	38,428	1,691	119,319	3,005	262,876	1,774	67,574
\$1,000,000 under \$2,500,000	356	5,232	502	66,591	2,015	402,662	1,035	26,900
\$2,500,000 under \$5,000,000	34	4,084	295	168,236	407	222,360	327	21,262
\$5,000,000 under \$10,000,000	19	668	40	23,113	172	160,226	55	3,028
\$10,000,000 or more	3	92	13	32,490	41	80,753	26	8,861

See footnote at end of table.

Table 1.—Returns Filed in 1986: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—(Continued)

[Estimates are based on samples—money amounts are in thousands]

Size of gross estate	Type of property ¹ (continued)							
	Cash		Notes and mortgages		Life insurance		Annuities	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(15)	(16)	(17)	(18)	(19)	(20)	(21)	(22)
All returns, total	40,957	6,853,250	14,663	1,917,115	23,741	1,866,223	11,244	1,349,834
\$500,000 under \$600,000	9,582	1,272,978	2,998	185,034	5,489	246,782	2,412	115,469
\$600,000 under \$1,000,000	16,569	1,962,719	5,436	465,190	9,819	669,732	4,446	424,826
\$1,000,000 under \$2,500,000	10,762	1,967,223	4,096	518,237	6,500	636,024	3,227	599,834
\$2,500,000 under \$5,000,000	2,813	847,626	1,460	357,904	1,223	173,768	862	101,277
\$5,000,000 under \$10,000,000	850	353,970	446	145,415	489	88,900	202	64,763
\$10,000,000 or more	381	448,734	228	245,335	221	51,017	94	43,666
Taxable returns, total	23,165	4,618,460	8,513	1,167,911	11,093	559,341	3,848	440,930
\$500,000 under \$600,000	4,876	786,930	1,715	107,627	2,293	56,974	811	29,458
\$600,000 under \$1,000,000	9,015	1,270,845	2,993	242,489	4,010	162,813	1,098	59,676
\$1,000,000 under \$2,500,000	6,611	1,365,257	2,535	341,360	3,655	182,631	1,246	220,734
\$2,500,000 under \$5,000,000	1,778	556,813	773	220,625	676	58,618	512	61,091
\$5,000,000 under \$10,000,000	584	260,631	325	99,604	291	58,885	112	32,795
\$10,000,000 or more	301	377,984	172	156,207	170	39,421	69	37,177
Nontaxable returns, total	17,792	2,234,790	6,150	749,204	12,647	1,306,882	7,396	908,904
\$500,000 under \$600,000	4,707	486,047	1,282	77,408	3,196	189,808	1,601	86,011
\$600,000 under \$1,000,000	7,554	691,874	2,443	222,702	5,810	506,919	3,348	365,150
\$1,000,000 under \$2,500,000	4,151	601,966	1,561	176,877	2,845	453,393	1,982	379,101
\$2,500,000 under \$5,000,000	1,034	290,813	687	137,279	547	115,150	350	40,186
\$5,000,000 under \$10,000,000	265	93,340	121	45,811	198	30,016	91	31,968
\$10,000,000 or more	80	70,750	56	89,128	52	11,597	25	6,490

Size of gross estate	Type of property ¹ (continued)					
	Noncorporate business assets		Household goods and other assets		Lifetime transfers	
	Number	Amount	Number	Amount	Number	Amount
	(23)	(24)	(25)	(26)	(27)	(28)
All returns, total	11,202	2,069,860	38,017	2,346,169	8,581	7,696,716
\$500,000 under \$600,000	1,985	71,380	8,319	182,463	1,308	414,458
\$600,000 under \$1,000,000	4,005	333,726	15,433	471,664	3,501	1,470,053
\$1,000,000 under \$2,500,000	3,613	583,716	10,274	725,689	2,706	2,023,854
\$2,500,000 under \$5,000,000	1,020	270,364	2,787	427,553	625	1,262,150
\$5,000,000 under \$10,000,000	378	333,458	826	204,844	255	755,332
\$10,000,000 or more	202	477,216	377	333,955	185	1,770,869
Taxable returns, total	5,450	1,044,364	21,359	1,513,033	5,741	5,142,291
\$500,000 under \$600,000	868	28,534	4,087	87,792	728	220,242
\$600,000 under \$1,000,000	1,524	88,735	8,288	249,870	2,454	1,013,536
\$1,000,000 under \$2,500,000	2,086	279,637	6,341	406,782	1,790	1,282,268
\$2,500,000 under \$5,000,000	574	113,401	1,772	347,868	420	648,542
\$5,000,000 under \$10,000,000	252	196,720	576	158,415	192	578,893
\$10,000,000 or more	146	337,338	296	262,307	156	1,398,810
Nontaxable returns, total	5,752	1,025,495	16,657	833,135	2,840	2,554,425
\$500,000 under \$600,000	1,117	42,846	4,232	94,671	581	194,216
\$600,000 under \$1,000,000	2,481	244,991	7,146	221,794	1,047	456,518
\$1,000,000 under \$2,500,000	1,527	304,080	3,934	318,908	916	741,586
\$2,500,000 under \$5,000,000	446	156,963	1,015	79,685	205	613,608
\$5,000,000 under \$10,000,000	126	136,738	250	46,430	63	176,439
\$10,000,000 or more	56	139,878	81	71,648	29	372,059

See footnote at end of table.

Table 1.—Returns Filed in 1986: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—(Continued)

[Estimates are based on samples—money amounts are in thousands]

Size of gross estate	Type of deductions							
	Total allowable deductions		Funeral expenses		Executors' commissions		Attorneys' fees	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)
All returns, total	42,124	28,312,932	39,318	177,351	15,615	533,565	27,200	591,174
\$500,000 under \$600,000	9,860	1,745,578	8,869	34,701	3,029	37,552	6,156	62,408
\$600,000 under \$1,000,000	17,148	5,073,628	16,279	66,670	6,079	101,782	10,847	145,660
\$1,000,000 under \$2,500,000	11,044	7,376,246	10,275	51,428	4,485	142,835	7,193	164,725
\$2,500,000 under \$5,000,000	2,819	5,016,097	2,698	15,820	1,355	92,395	2,122	91,213
\$5,000,000 under \$10,000,000	863	3,017,281	823	5,369	455	67,877	597	53,332
\$10,000,000 or more	390	6,084,101	374	3,364	213	91,123	286	73,835
Taxable returns, total	23,730	10,372,995	23,113	98,407	13,047	480,838	20,793	498,292
\$500,000 under \$600,000	5,031	187,764	4,885	17,838	2,281	28,489	4,239	43,158
\$600,000 under \$1,000,000	9,222	705,436	9,065	34,016	5,084	89,448	8,289	116,287
\$1,000,000 under \$2,500,000	6,798	2,276,971	6,581	29,612	3,972	131,688	5,900	143,400
\$2,500,000 under \$5,000,000	1,780	1,582,387	1,700	10,523	1,096	79,252	1,582	75,510
\$5,000,000 under \$10,000,000	594	1,300,729	582	3,856	419	64,543	531	49,791
\$10,000,000 or more	305	4,319,708	299	2,563	196	87,418	251	70,147
Nontaxable returns, total	18,393	17,939,937	16,205	78,944	2,568	52,727	6,407	92,882
\$500,000 under \$600,000	4,828	1,557,814	3,984	16,863	748	9,063	1,917	19,251
\$600,000 under \$1,000,000	7,927	4,368,192	7,214	32,654	995	12,335	2,558	29,374
\$1,000,000 under \$2,500,000	4,245	5,099,275	3,694	21,816	513	11,147	1,293	21,325
\$2,500,000 under \$5,000,000	1,038	3,433,710	998	5,297	259	13,142	540	15,703
\$5,000,000 under \$10,000,000	269	1,716,552	240	1,513	36	3,334	66	3,541
\$10,000,000 or more	85	1,764,393	75	801	18	3,706	34	3,688

Size of gross estate	Type of deductions (continued)							
	Other expenses and losses		Debts and mortgages		Charitable bequests		Bequests to surviving spouse	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(37)	(38)	(39)	(40)	(41)	(42)	(43)	(44)
All returns, total	31,337	370,141	35,890	2,941,675	7,835	3,573,298	20,010	20,125,729
\$500,000 under \$600,000	7,177	29,957	7,975	168,437	1,647	142,739	3,891	1,269,784
\$600,000 under \$1,000,000	12,847	76,026	14,314	527,306	3,073	518,105	7,866	3,638,079
\$1,000,000 under \$2,500,000	8,284	112,004	9,764	937,079	2,047	563,494	5,837	5,404,682
\$2,500,000 under \$5,000,000	2,082	61,795	2,650	492,645	580	665,076	1,701	3,597,154
\$5,000,000 under \$10,000,000	638	39,088	819	292,578	310	389,902	470	2,169,135
\$10,000,000 or more	309	51,271	368	523,630	177	1,293,982	244	4,046,895
Taxable returns, total	22,220	324,090	21,863	1,435,279	5,339	1,858,189	4,284	5,677,899
\$500,000 under \$600,000	4,724	21,180	4,467	52,493	1,114	8,995	301	15,611
\$600,000 under \$1,000,000	8,703	58,007	8,480	190,417	1,852	76,137	953	141,124
\$1,000,000 under \$2,500,000	6,325	99,528	6,348	417,525	1,524	112,242	1,912	1,342,978
\$2,500,000 under \$5,000,000	1,645	58,698	1,692	239,777	429	350,149	735	768,478
\$5,000,000 under \$10,000,000	551	37,328	582	183,198	263	248,123	219	713,890
\$10,000,000 or more	271	49,351	293	351,868	157	1,062,542	164	2,695,818
Nontaxable returns, total	9,117	46,050	14,027	1,506,396	2,496	1,715,108	15,727	14,447,830
\$500,000 under \$600,000	2,452	8,777	3,508	115,944	533	133,744	3,590	1,254,173
\$600,000 under \$1,000,000	4,144	18,019	5,834	336,889	1,222	441,968	6,913	3,496,955
\$1,000,000 under \$2,500,000	1,959	12,476	3,415	519,554	523	451,252	3,926	4,061,704
\$2,500,000 under \$5,000,000	437	3,097	958	252,868	151	314,927	966	2,828,676
\$5,000,000 under \$10,000,000	87	1,761	237	109,380	47	141,779	251	1,455,245
\$10,000,000 or more	38	1,920	75	171,762	20	231,439	81	1,351,077

See footnote at end of table.

Table 1.—Returns Filed in 1986: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—(Continued)

[Estimates are based on samples—money amounts are in thousands]

Size of gross estate	Taxable estate		Adjusted taxable gifts		Adjusted taxable estate	
	Number	Amount	Number	Amount	Number	Amount
	(45)	(46)	(47)	(48)	(49)	(50)
All returns, total	38,054	31,634,721	3,650	438,433	38,124	32,073,154
\$500,000 under \$600,000	8,571	3,677,406	348	27,318	8,572	3,704,724
\$600,000 under \$1,000,000	15,212	7,987,893	667	51,858	15,266	8,039,751
\$1,000,000 under \$2,500,000	10,337	9,120,395	1,533	173,350	10,354	9,293,745
\$2,500,000 under \$5,000,000	2,715	4,723,645	650	56,195	2,717	4,779,839
\$5,000,000 under \$10,000,000	837	2,772,242	276	53,491	839	2,825,733
\$10,000,000 or more	382	3,353,142	177	76,221	385	3,429,362
Taxable returns, total	23,716	27,266,628	2,991	386,429	23,731	27,653,057
\$500,000 under \$600,000	5,031	2,576,546	*246	*21,894	5,031	2,598,440
\$600,000 under \$1,000,000	9,223	6,298,241	513	43,127	9,223	6,341,368
\$1,000,000 under \$2,500,000	6,783	7,959,976	1,209	147,012	6,798	8,106,988
\$2,500,000 under \$5,000,000	1,780	4,415,707	629	53,909	1,780	4,469,616
\$5,000,000 under \$10,000,000	594	2,687,728	238	48,274	594	2,736,002
\$10,000,000 or more	305	3,328,430	155	72,214	305	3,400,644
Nontaxable returns, total	14,338	4,368,093	659	52,004	14,402	4,420,097
\$500,000 under \$600,000	3,540	1,100,860	*101	*5,424	3,541	1,106,284
\$600,000 under \$1,000,000	5,990	1,689,652	*154	*8,731	6,043	1,698,383
\$1,000,000 under \$2,500,000	3,554	1,160,419	323	26,338	3,556	1,186,757
\$2,500,000 under \$5,000,000	935	307,937	21	2,286	937	310,223
\$5,000,000 under \$10,000,000	244	84,513	38	5,218	246	89,731
\$10,000,000 or more	77	24,712	22	4,007	80	28,718

Size of gross estate	Estate tax before credit		Allowable unified credit		Other tax credits		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(51)	(52)	(53)	(54)	(55)	(56)	(57)	(58)
All returns, total	38,134	12,074,359	38,033	4,243,093	25,166	1,448,193	23,731	6,383,073
\$500,000 under \$600,000	8,572	1,148,731	8,572	941,185	5,491	57,812	5,031	149,734
\$600,000 under \$1,000,000	15,266	2,588,502	15,219	1,652,598	9,670	176,293	9,223	759,611
\$1,000,000 under \$2,500,000	10,354	3,293,994	10,301	1,195,012	7,168	333,522	6,798	1,765,460
\$2,500,000 under \$5,000,000	2,717	1,964,293	2,717	309,254	1,910	257,912	1,780	1,397,128
\$5,000,000 under \$10,000,000	839	1,326,867	839	99,871	621	222,930	594	1,004,066
\$10,000,000 or more	385	1,751,972	385	45,173	306	399,723	305	1,307,076
Taxable returns, total	23,731	10,747,687	23,631	2,932,540	23,233	1,432,073	23,731	6,383,073
\$500,000 under \$600,000	5,031	815,856	5,031	612,060	4,851	54,062	5,031	149,734
\$600,000 under \$1,000,000	9,223	2,081,050	9,175	1,152,071	9,025	169,369	9,223	759,611
\$1,000,000 under \$2,500,000	6,798	2,936,763	6,745	841,908	6,690	329,395	6,798	1,765,460
\$2,500,000 under \$5,000,000	1,780	1,870,358	1,780	216,366	1,776	256,864	1,780	1,397,128
\$5,000,000 under \$10,000,000	594	1,300,008	594	73,240	589	222,702	594	1,004,066
\$10,000,000 or more	305	1,743,652	305	36,895	301	399,682	305	1,307,076
Nontaxable returns, total	14,402	1,326,672	14,402	1,310,553	1,933	16,120	—	—
\$500,000 under \$600,000	3,541	332,875	3,541	329,125	639	3,750	—	—
\$600,000 under \$1,000,000	6,043	507,452	6,043	500,527	645	6,924	—	—
\$1,000,000 under \$2,500,000	3,556	357,232	3,556	353,104	478	4,127	—	—
\$2,500,000 under \$5,000,000	937	93,935	937	92,887	134	1,048	—	—
\$5,000,000 under \$10,000,000	246	26,859	246	26,631	32	228	—	—
\$10,000,000 or more	80	8,320	80	8,278	5	42	—	—

¹ The types of property shown in columns 3 through 26 exclude lifetime transfers shown in columns 27 and 28.

* Estimate should be used with caution because of the small number of sample estate returns on which it is based.

NOTE: Detail may not add to totals because of rounding.

Table 1B.—Returns Filed in 1987: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate

[Estimates are based on samples—money amounts are in thousands]

Size of gross estate	Gross estate		Type of property ¹			
	Number	Amount	Real estate		Corporate stock	
			Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)
All returns, total	45,113	66,564,120	35,519	12,826,579	34,987	18,667,760
\$500,000 under \$600,000.....	7,546	4,137,905	5,803	1,038,839	5,495	829,035
\$600,000 under \$1,000,000.....	20,148	15,282,203	15,597	3,690,249	15,225	3,531,641
\$1,000,000 under \$2,500,000.....	12,976	18,968,685	10,568	4,173,277	10,561	4,905,480
\$2,500,000 under \$5,000,000.....	2,959	10,196,669	2,315	1,632,661	2,410	3,043,895
\$5,000,000 under \$10,000,000.....	1,000	6,721,123	831	1,047,989	867	2,304,538
\$10,000,000 or more.....	484	11,257,535	404	1,243,564	429	4,053,172
Taxable returns, total	21,335	37,758,944	15,907	6,274,688	16,969	11,809,870
\$500,000 under \$600,000.....	1,511	864,256	1,003	169,628	1,113	204,261
\$600,000 under \$1,000,000.....	10,113	7,727,584	7,381	1,760,126	7,828	2,003,033
\$1,000,000 under \$2,500,000.....	6,884	10,178,448	5,350	2,040,731	5,669	2,971,456
\$2,500,000 under \$5,000,000.....	1,816	6,291,095	1,347	861,764	1,474	1,846,195
\$5,000,000 under \$10,000,000.....	663	4,486,060	538	618,985	574	1,586,613
\$10,000,000 or more.....	349	8,211,502	288	823,455	311	3,198,313
Nontaxable returns, total	23,778	28,805,176	19,612	6,551,891	18,019	6,857,890
\$500,000 under \$600,000.....	6,035	3,273,649	4,799	869,211	4,382	624,774
\$600,000 under \$1,000,000.....	10,036	7,554,619	8,216	1,930,124	7,397	1,528,607
\$1,000,000 under \$2,500,000.....	6,093	8,790,237	5,218	2,132,546	4,892	1,934,024
\$2,500,000 under \$5,000,000.....	1,143	3,905,574	968	770,898	936	1,197,699
\$5,000,000 under \$10,000,000.....	338	2,235,063	294	429,004	294	717,925
\$10,000,000 or more.....	135	3,046,034	117	420,109	119	854,859

Size of gross estate	Type of property ¹ (continued)							
	Federal savings bonds		Other Federal bonds		State and local bonds		Corporate and foreign bonds ¹	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
All returns, total	6,552	289,692	9,990	1,658,980	18,361	5,028,636	10,679	567,412
\$500,000 under \$600,000.....	1,153	52,976	1,512	144,140	1,994	165,604	1,435	42,826
\$600,000 under \$1,000,000.....	3,454	134,678	4,510	447,566	7,289	847,363	4,954	203,723
\$1,000,000 under \$2,500,000.....	1,603	78,326	2,973	461,775	6,519	1,589,636	3,154	146,333
\$2,500,000 under \$5,000,000.....	215	11,926	611	196,043	1,679	924,554	728	77,379
\$5,000,000 under \$10,000,000.....	77	5,581	254	162,587	588	633,913	275	55,733
\$10,000,000 or more.....	50	6,205	129	246,869	292	867,566	133	41,417
Taxable returns, total	3,322	173,621	5,360	1,041,870	9,463	3,282,443	5,699	318,375
\$500,000 under \$600,000.....	167	13,040	379	34,410	441	50,516	328	10,768
\$600,000 under \$1,000,000.....	1,933	85,312	2,419	226,866	3,635	480,268	2,679	101,259
\$1,000,000 under \$2,500,000.....	1,005	57,540	1,876	306,335	3,632	942,484	1,939	91,941
\$2,500,000 under \$5,000,000.....	124	8,092	391	151,726	1,126	657,222	456	54,639
\$5,000,000 under \$10,000,000.....	55	4,649	196	130,093	412	489,491	195	29,389
\$10,000,000 or more.....	37	4,988	98	192,440	217	662,461	102	30,379
Nontaxable returns, total	3,230	116,070	4,630	617,109	8,898	1,746,193	4,981	249,037
\$500,000 under \$600,000.....	986	39,935	1,133	109,730	1,552	115,087	1,107	32,059
\$600,000 under \$1,000,000.....	1,521	49,366	2,092	220,699	3,654	367,095	2,275	102,465
\$1,000,000 under \$2,500,000.....	598	20,786	1,097	155,440	2,888	647,152	1,214	54,392
\$2,500,000 under \$5,000,000.....	91	3,834	220	44,317	553	267,332	272	22,740
\$5,000,000 under \$10,000,000.....	22	932	58	32,494	176	144,422	80	26,344
\$10,000,000 or more.....	13	1,216	31	54,429	75	205,105	31	11,038

See footnote at end of table.

Table 1B.—Returns Filed in 1987: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—(Continued)

[Estimates are based on samples—money amounts are in thousands]

Size of gross estate	Type of property ¹ (continued)							
	Cash		Notes and mortgages		Life insurance		Annuities	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(15)	(16)	(17)	(18)	(19)	(20)	(21)	(22)
All returns, total	43,726	7,212,155	13,290	1,823,663	24,489	1,989,999	11,981	1,494,069
\$500,000 under \$600,000	7,308	885,749	1,883	125,165	4,348	181,981	1,991	112,099
\$600,000 under \$1,000,000	19,535	2,605,210	5,300	418,789	10,498	642,247	4,701	389,101
\$1,000,000 under \$2,500,000	12,588	2,201,177	4,356	580,374	7,107	741,489	3,971	565,103
\$2,500,000 under \$5,000,000	2,860	710,316	1,109	271,028	1,700	257,014	892	260,140
\$5,000,000 under \$10,000,000	966	379,830	412	146,356	545	97,164	289	100,058
\$10,000,000 or more	469	429,873	229	281,951	291	70,104	137	67,567
Taxable returns, total	20,776	4,236,691	6,008	837,304	9,187	556,505	3,723	460,585
\$500,000 under \$600,000	1,457	197,331	315	24,513	652	20,307	323	13,578
\$600,000 under \$1,000,000	9,833	1,565,746	2,634	184,137	4,148	147,885	1,373	88,258
\$1,000,000 under \$2,500,000	6,749	1,483,110	2,016	245,614	2,965	190,808	1,368	158,730
\$2,500,000 under \$5,000,000	1,751	415,784	618	145,408	899	95,126	425	110,437
\$5,000,000 under \$10,000,000	645	259,021	258	92,592	325	48,576	152	44,232
\$10,000,000 or more	341	315,700	167	145,039	199	53,802	83	45,351
Nontaxable returns, total	22,951	2,975,464	7,282	986,360	15,302	1,433,494	8,257	1,033,484
\$500,000 under \$600,000	5,851	688,418	1,568	100,652	3,697	161,674	1,669	98,521
\$600,000 under \$1,000,000	9,702	1,039,464	2,666	234,651	6,350	494,362	3,327	300,843
\$1,000,000 under \$2,500,000	5,839	718,067	2,340	334,760	4,142	550,680	2,603	406,373
\$2,500,000 under \$5,000,000	1,109	294,532	491	125,620	801	161,888	467	149,703
\$5,000,000 under \$10,000,000	321	120,810	154	53,764	221	48,588	138	55,826
\$10,000,000 or more	129	114,173	62	136,913	91	16,302	54	22,217

Size of gross estate	Type of property ¹ (continued)					
	Noncorporate business assets		Household goods and other assets		Lifetime transfers	
	Number	Amount	Number	Amount	Number	Amount
	(23)	(24)	(25)	(26)	(27)	(28)
All returns, total	11,354	2,736,870	40,947	2,515,953	8,889	9,752,348
\$500,000 under \$600,000	1,408	86,783	6,775	153,612	968	319,095
\$600,000 under \$1,000,000	4,217	313,008	18,126	572,545	3,519	1,486,081
\$1,000,000 under \$2,500,000	3,861	636,369	11,903	682,510	2,846	2,206,834
\$2,500,000 under \$5,000,000	1,141	373,656	2,734	391,079	1,006	2,046,977
\$5,000,000 under \$10,000,000	456	352,830	943	291,349	345	1,143,195
\$10,000,000 or more	272	974,222	466	424,859	206	2,550,166
Taxable returns, total	4,297	1,119,790	19,397	1,484,381	4,602	6,182,818
\$500,000 under \$600,000	105	9,971	1,315	28,973	235	86,959
\$600,000 under \$1,000,000	1,671	112,039	9,073	292,221	1,775	680,432
\$1,000,000 under \$2,500,000	1,444	207,941	6,364	337,816	1,494	1,143,940
\$2,500,000 under \$5,000,000	605	181,611	1,673	261,438	699	1,501,653
\$5,000,000 under \$10,000,000	287	192,926	633	203,726	246	785,768
\$10,000,000 or more	184	415,302	339	340,207	153	1,984,066
Nontaxable returns, total	7,057	1,617,079	21,551	1,051,572	4,287	3,569,530
\$500,000 under \$600,000	1,302	76,812	5,460	124,639	733	232,136
\$600,000 under \$1,000,000	2,546	200,970	9,054	280,324	1,744	805,648
\$1,000,000 under \$2,500,000	2,417	428,428	5,538	344,694	1,352	1,062,894
\$2,500,000 under \$5,000,000	536	192,045	1,060	129,641	307	545,324
\$5,000,000 under \$10,000,000	169	159,904	311	87,623	99	357,426
\$10,000,000 or more	87	558,920	128	84,652	53	566,100

See footnote at end of table.

Table 1B.—Returns Filed in 1987: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—(Continued)

[Estimates are based on samples—money amounts are in thousands]

Size of gross estate	Type of deductions							
	Total allowable deductions		Funeral expenses		Executors' commissions		Attorneys' fees	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)
All returns, total	45,084	30,873,408	42,246	199,666	16,128	612,728	27,634	622,491
\$500,000 under \$600,000	7,521	1,267,861	6,996	29,628	1,988	24,442	4,155	39,369
\$600,000 under \$1,000,000	20,148	5,016,183	18,939	83,750	6,718	118,315	12,420	172,292
\$1,000,000 under \$2,500,000	12,972	8,528,280	12,091	57,306	5,211	178,440	8,166	189,086
\$2,500,000 under \$5,000,000	2,959	5,201,065	2,811	17,272	1,429	105,160	1,866	88,342
\$5,000,000 under \$10,000,000	1,000	3,541,001	946	6,255	526	78,933	685	58,627
\$10,000,000 or more	484	7,319,018	462	5,454	256	107,438	342	74,774
Taxable returns, total	21,330	9,769,281	20,683	96,751	12,387	513,325	18,567	494,473
\$500,000 under \$600,000	1,511	40,782	1,442	5,638	587	6,088	1,248	12,026
\$600,000 under \$1,000,000	10,113	614,134	9,797	41,567	5,357	95,049	8,766	132,106
\$1,000,000 under \$2,500,000	6,879	1,688,643	6,701	30,591	4,483	157,120	6,151	155,596
\$2,500,000 under \$5,000,000	1,816	1,668,236	1,764	10,611	1,262	89,368	1,533	76,239
\$5,000,000 under \$10,000,000	663	1,437,801	641	4,091	469	69,731	576	50,708
\$10,000,000 or more	349	4,319,685	339	4,253	230	95,968	293	67,798
Nontaxable returns, total	23,753	21,104,127	21,563	102,915	3,742	99,403	9,067	128,018
\$500,000 under \$600,000	6,010	1,227,079	5,554	23,991	1,402	18,354	2,908	27,343
\$600,000 under \$1,000,000	10,036	4,402,049	9,143	42,184	1,362	23,266	3,654	40,186
\$1,000,000 under \$2,500,000	6,093	6,839,637	5,390	26,715	728	21,320	2,015	33,490
\$2,500,000 under \$5,000,000	1,143	3,532,830	1,048	6,661	167	15,792	332	12,103
\$5,000,000 under \$10,000,000	338	2,103,200	305	2,164	58	9,202	109	7,919
\$10,000,000 or more	135	2,999,333	124	1,201	26	11,469	49	6,977

Size of gross estate	Type of deductions (continued)							
	Other expenses and losses		Debts and mortgages		Charitable bequests		Bequests to surviving spouse	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(37)	(38)	(39)	(40)	(41)	(42)	(43)	(44)
All returns, total	32,874	443,176	38,067	3,566,565	8,987	3,978,020	20,191	21,540,909
\$500,000 under \$600,000	5,337	23,272	6,119	154,099	1,297	93,154	2,795	903,963
\$600,000 under \$1,000,000	14,695	98,512	16,782	634,520	3,496	640,611	8,117	3,269,768
\$1,000,000 under \$2,500,000	9,537	114,431	11,122	990,639	2,875	858,208	6,730	6,155,216
\$2,500,000 under \$5,000,000	2,167	69,702	2,669	585,704	770	504,899	1,680	3,832,111
\$5,000,000 under \$10,000,000	755	45,019	919	434,473	338	402,273	572	2,586,744
\$10,000,000 or more	383	92,239	457	767,130	212	1,478,876	296	4,793,107
Taxable returns, total	20,380	356,981	19,457	1,461,378	4,886	1,797,661	2,927	5,050,236
\$500,000 under \$600,000	1,408	5,901	1,371	9,338	196	948	17	843
\$600,000 under \$1,000,000	9,687	70,076	8,982	156,463	1,872	50,399	605	68,473
\$1,000,000 under \$2,500,000	26,646	92,825	6,417	363,806	1,856	226,676	1,225	663,290
\$2,500,000 under \$5,000,000	1,708	58,601	1,712	249,955	515	178,285	646	1,005,438
\$5,000,000 under \$10,000,000	614	41,654	639	224,535	271	222,790	261	824,292
\$10,000,000 or more	317	87,923	337	457,281	177	1,118,563	173	2,487,899
Nontaxable returns, total	12,493	86,195	18,610	2,105,187	4,101	2,180,359	17,264	16,490,674
\$500,000 under \$600,000	3,929	17,371	4,748	144,761	1,102	92,206	2,778	903,120
\$600,000 under \$1,000,000	5,008	28,436	7,800	478,057	1,624	590,212	7,512	3,201,295
\$1,000,000 under \$2,500,000	2,891	21,606	4,705	626,833	1,019	631,531	5,506	5,491,926
\$2,500,000 under \$5,000,000	458	11,101	956	335,750	255	326,614	1,034	2,826,673
\$5,000,000 under \$10,000,000	141	3,365	280	209,938	67	179,483	312	1,762,452
\$10,000,000 or more	67	4,316	121	309,849	34	360,313	123	2,305,208

See footnote at end of table.

Table 1B.—Returns Filed in 1987: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—(Continued)

[Estimates are based on samples—money amounts are in thousands]

Size of gross estate	Taxable estate		Adjusted taxable gifts		Adjusted taxable estate	
	Number	Amount	Number	Amount	Number	Amount
	(45)	(46)	(47)	(48)	(49)	(50)
All returns, total	40,874	35,913,662	3,648	541,366	40,935	36,455,028
\$500,000 under \$600,000.....	6,490	2,911,369	265	18,846	6,511	2,930,215
\$600,000 under \$1,000,000.....	18,201	10,296,891	958	94,145	18,223	10,391,036
\$1,000,000 under \$2,500,000.....	11,914	10,515,784	1,238	153,989	11,922	10,669,773
\$2,500,000 under \$5,000,000.....	2,828	5,067,695	650	107,674	2,834	5,175,369
\$5,000,000 under \$10,000,000.....	969	3,180,200	317	78,092	972	3,258,292
\$10,000,000 or more.....	473	3,941,723	220	88,621	473	4,030,344
Taxable returns, total	21,335	27,989,656	2,550	447,123	21,335	28,436,779
\$500,000 under \$600,000.....	1,511	823,473	114	6,746	1,511	830,219
\$600,000 under \$1,000,000.....	10,113	7,113,447	581	71,841	10,113	7,185,288
\$1,000,000 under \$2,500,000.....	6,884	8,489,803	866	118,728	6,884	8,608,531
\$2,500,000 under \$5,000,000.....	1,816	4,622,858	558	96,819	1,816	4,719,677
\$5,000,000 under \$10,000,000.....	663	3,048,258	245	69,225	663	3,117,483
\$10,000,000 or more.....	349	3,891,816	185	83,765	349	3,975,581
Nontaxable returns, total	19,540	7,924,006	1,098	94,243	19,600	8,018,249
\$500,000 under \$600,000.....	4,979	2,087,896	151	12,100	5,000	2,099,996
\$600,000 under \$1,000,000.....	8,088	3,183,444	377	22,305	8,111	3,205,749
\$1,000,000 under \$2,500,000.....	5,030	2,025,981	372	35,261	5,039	2,061,242
\$2,500,000 under \$5,000,000.....	1,012	444,836	91	10,855	1,018	455,691
\$5,000,000 under \$10,000,000.....	306	131,942	72	8,867	309	140,808
\$10,000,000 or more.....	124	49,907	34	4,856	124	54,763

Size of gross estate	Estate tax before credit		Allowable unified credit		Other tax credits		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(51)	(52)	(53)	(54)	(55)	(56)	(57)	(58)
All returns, total	40,908	13,767,320	40,907	5,803,427	25,128	1,605,903	21,335	6,357,981
\$500,000 under \$600,000.....	6,502	904,276	6,502	864,104	2,713	24,831	1,511	15,340
\$600,000 under \$1,000,000.....	18,208	3,358,540	18,208	2,569,767	11,726	208,352	10,113	580,417
\$1,000,000 under \$2,500,000.....	11,920	3,765,036	11,920	1,728,627	7,595	362,303	6,884	1,674,104
\$2,500,000 under \$5,000,000.....	2,834	2,151,744	2,834	426,272	1,999	279,323	1,816	1,446,148
\$5,000,000 under \$10,000,000.....	972	1,525,621	971	144,448	726	255,002	663	1,126,172
\$10,000,000 or more.....	473	2,062,104	473	70,209	368	476,093	349	1,515,801
Taxable returns, total	21,335	11,296,781	21,334	3,373,581	20,949	1,565,211	21,335	6,357,981
\$500,000 under \$600,000.....	1,511	263,110	1,511	230,485	1,454	17,285	1,511	15,340
\$600,000 under \$1,000,000.....	10,113	2,368,463	10,113	1,597,965	9,886	190,077	10,113	580,417
\$1,000,000 under \$2,500,000.....	6,884	3,127,428	6,884	1,101,430	6,807	351,891	6,884	1,674,104
\$2,500,000 under \$5,000,000.....	1,816	2,010,307	1,816	286,829	1,797	277,329	1,816	1,446,148
\$5,000,000 under \$10,000,000.....	663	1,481,936	662	102,398	657	253,367	663	1,126,172
\$10,000,000 or more.....	349	2,045,537	349	54,474	348	475,262	349	1,515,801
Nontaxable returns, total	19,573	2,470,539	19,573	2,429,846	4,179	40,693	—	—
\$500,000 under \$600,000.....	4,991	641,165	4,991	633,619	1,259	7,546	—	—
\$600,000 under \$1,000,000.....	8,095	990,077	8,095	971,802	1,840	18,275	—	—
\$1,000,000 under \$2,500,000.....	5,037	637,609	5,037	627,197	788	10,412	—	—
\$2,500,000 under \$5,000,000.....	1,018	141,437	1,018	139,443	203	1,994	—	—
\$5,000,000 under \$10,000,000.....	309	43,685	309	42,050	69	1,635	—	—
\$10,000,000 or more.....	124	16,567	124	15,736	20	831	—	—

¹ The types of property shown in columns 3 through 26 exclude lifetime transfers shown in columns 27 and 28.
NOTE: Detail may not add to totals because of rounding.

Table 1C.—Returns Filed in 1988: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits,
by Size of Gross Estate

(Estimates are based on samples—money amounts are in thousands)

Size of gross estate	Gross estate		Type of property ¹				Corporate stock	
	Number (1)	Amount (2)	Real estate		State and local bonds		Number (5)	Amount (6)
			Number (3)	Amount (4)	Number (11)	Amount (12)		
All returns, total	43,683	70,625,351	35,077	13,564,791	18,521	5,823,077	9,391	471,854
\$500,000 under \$600,000	2,823	1,560,560	2,274	474,971	891	58,765	454	9,200
\$600,000 under \$1,000,000	21,347	16,364,752	16,647	4,128,234	8,509	1,071,945	4,285	130,063
\$1,000,000 under \$2,500,000	14,891	21,770,233	12,249	4,783,112	7,412	1,993,729	3,429	143,710
\$2,500,000 under \$5,000,000	3,070	10,399,816	2,606	1,795,203	1,753	951,320	826	41,888
\$5,000,000 under \$10,000,000	1,013	6,767,629	944	1,079,346	611	680,983	236	44,706
\$10,000,000 or more	541	13,742,360	457	1,303,925	344	1,066,335	160	102,288
Taxable returns, total	19,948	39,794,444	14,419	6,370,186	9,357	3,607,050	4,581	260,839
\$500,000 under \$600,000	251	141,453	189	30,945	114	11,107	40	1,629
\$600,000 under \$1,000,000	7,821	6,313,122	5,635	1,398,441	3,187	473,738	1,711	54,702
\$1,000,000 under \$2,500,000	7,804	11,517,333	6,108	2,421,743	4,118	1,192,139	1,900	77,962
\$2,500,000 under \$5,000,000	2,014	6,841,576	1,613	964,267	1,256	726,553	655	31,989
\$5,000,000 under \$10,000,000	387	4,468,104	319	652,990	430	508,545	161	28,642
\$10,000,000 or more	153	10,512,855	137	901,799	252	894,968	114	65,916
Non-taxable returns, total	24,735	30,830,907	20,658	7,194,605	9,164	2,216,028	4,810	211,015
\$500,000 under \$600,000	2,572	1,419,107	2,085	444,026	1,107	111,077	40	1,629
\$600,000 under \$1,000,000	13,525	10,071,630	11,011	2,729,794	4,118	1,192,139	1,900	77,962
\$1,000,000 under \$2,500,000	7,086	10,252,899	6,141	2,361,369	1,256	726,553	655	31,989
\$2,500,000 under \$5,000,000	1,056	3,558,240	994	830,935	430	508,545	161	28,642
\$5,000,000 under \$10,000,000	342	2,299,525	290	426,355	252	894,968	114	65,916
\$10,000,000 or more	153	3,229,306	137	402,126	252	894,968	114	65,916
All returns, total	6,225	243,307	9,239	1,539,252	18,521	5,823,077	9,391	471,854
\$500,000 under \$600,000	405	6,731	424	27,551	891	58,765	454	9,200
\$600,000 under \$1,000,000	3,512	138,879	4,372	375,662	8,509	1,071,945	4,285	130,063
\$1,000,000 under \$2,500,000	1,941	73,686	3,287	476,314	7,412	1,993,729	3,429	143,710
\$2,500,000 under \$5,000,000	235	15,337	783	193,203	1,753	951,320	826	41,888
\$5,000,000 under \$10,000,000	86	4,365	260	166,208	611	680,983	236	44,706
\$10,000,000 or more	46	4,308	133	300,315	344	1,066,335	160	102,288
Taxable returns, total	2,753	129,233	4,497	1,056,080	9,357	3,607,050	4,581	260,839
\$500,000 under \$600,000	44	60	63	4,260	114	11,107	40	1,629
\$600,000 under \$1,000,000	1,354	63,753	1,461	154,893	3,187	473,738	1,711	54,702
\$1,000,000 under \$2,500,000	1,102	45,070	2,069	349,048	4,118	1,192,139	1,900	77,962
\$2,500,000 under \$5,000,000	161	13,311	611	165,008	1,256	726,553	655	31,989
\$5,000,000 under \$10,000,000	89	3,070	183	121,126	430	508,545	161	28,642
\$10,000,000 or more	34	3,968	110	262,756	252	894,968	114	65,916
Non-taxable returns, total	3,471	114,074	4,742	483,172	10,164	2,216,028	4,810	211,015
\$500,000 under \$600,000	362	6,671	361	23,301	777	47,659	414	7,571
\$600,000 under \$1,000,000	2,156	75,126	12,911	220,769	5,322	598,207	2,574	75,361
\$1,000,000 under \$2,500,000	839	28,616	1,198	128,267	3,294	801,590	1,330	65,748
\$2,500,000 under \$5,000,000	73	2,026	172	28,195	496	224,767	171	9,899
\$5,000,000 under \$10,000,000	28	1,295	77	45,082	181	172,438	75	16,064
\$10,000,000 or more	12	339	23	37,559	92	171,367	46	36,372

See footnote at end of table

Table 1C.—Returns Filed in 1988: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—(Continued)

[Estimates are based on samples—money amounts are in thousands]

Size of gross estate	Type of property ¹ (continued)							
	Cash		Notes and mortgages		Life insurance		Annuities	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(15)	(16)	(17)	(18)	(19)	(20)	(21)	(22)
All returns, total	42,345	7,614,416	12,568	1,708,717	23,741	2,150,015	11,985	1,692,324
\$500,000 under \$600,000	2,651	287,350	732	43,308	1,542	78,240	663	48,067
\$600,000 under \$1,000,000	20,770	2,983,127	5,358	423,086	11,364	653,461	5,575	468,800
\$1,000,000 under \$2,500,000	14,456	2,563,887	4,631	499,506	8,210	907,625	4,441	744,786
\$2,500,000 under \$5,000,000	2,958	870,721	1,178	340,039	1,736	277,084	841	242,224
\$5,000,000 under \$10,000,000	982	432,952	396	146,162	576	138,173	300	112,813
\$10,000,000 or more	530	476,379	273	256,616	314	95,433	164	75,633
Taxable returns, total	18,581	4,163,744	5,414	790,485	8,312	562,926	3,367	469,984
\$500,000 under \$600,000	243	28,677	113	8,310	96	6,266	77	10,050
\$600,000 under \$1,000,000	7,700	1,412,541	2,011	168,294	3,292	103,574	1,022	58,942
\$1,000,000 under \$2,500,000	7,652	1,499,748	2,102	228,014	3,420	226,735	1,605	209,937
\$2,500,000 under \$5,000,000	1,957	559,413	775	153,268	967	113,370	421	106,768
\$5,000,000 under \$10,000,000	649	300,187	227	79,787	326	54,123	148	47,727
\$10,000,000 or more	380	363,179	186	152,812	211	58,857	93	36,560
Nontaxable returns, total	23,765	3,450,671	7,154	918,232	15,429	1,587,089	8,618	1,222,340
\$500,000 under \$600,000	2,408	258,673	619	34,998	1,447	71,974	586	38,018
\$600,000 under \$1,000,000	13,070	1,570,586	3,348	254,792	8,072	549,887	4,553	409,858
\$1,000,000 under \$2,500,000	6,804	1,064,139	2,529	271,491	4,790	680,890	2,836	534,849
\$2,500,000 under \$5,000,000	1,001	311,308	403	186,772	769	163,714	420	135,455
\$5,000,000 under \$10,000,000	333	132,765	168	66,374	250	84,050	151	65,086
\$10,000,000 or more	149	113,200	87	103,804	102	36,575	71	39,074

Size of gross estate	Type of property ¹ (continued)					
	Noncorporate business assets		Household goods and other assets		Lifetime transfers	
	Number	Amount	Number	Amount	Number	Amount
	(23)	(24)	(25)	(26)	(27)	(28)
All returns, total	10,916	2,519,361	39,374	2,547,407	9,382	11,112,065
\$500,000 under \$600,000	601	45,179	2,414	66,675	543	162,794
\$600,000 under \$1,000,000	4,232	311,230	18,890	444,483	3,897	1,771,873
\$1,000,000 under \$2,500,000	4,203	612,032	13,719	644,329	3,382	2,594,523
\$2,500,000 under \$5,000,000	1,124	504,852	2,889	442,114	939	1,504,782
\$5,000,000 under \$10,000,000	468	363,915	954	186,278	378	1,322,963
\$10,000,000 or more	287	682,153	509	763,528	243	3,755,131
Taxable returns, total	4,102	1,198,395	16,943	1,442,206	4,459	7,529,326
\$500,000 under \$600,000	**	**	224	5,131	**	**
\$600,000 under \$1,000,000	**1,440	**114,558	6,609	113,563	**1,417	**658,926
\$1,000,000 under \$2,500,000	1,549	239,284	7,202	292,656	1,898	1,607,321
\$2,500,000 under \$5,000,000	642	262,823	1,904	282,378	675	1,129,716
\$5,000,000 under \$10,000,000	279	186,018	637	120,551	279	940,767
\$10,000,000 or more	191	395,713	367	627,928	189	3,192,595
Nontaxable returns, total	6,814	1,320,966	22,431	1,105,202	4,924	3,582,739
\$500,000 under \$600,000	**	**	2,190	61,544	**	**
\$600,000 under \$1,000,000	**3,393	**241,850	12,281	330,920	**3,022	**1,275,741
\$1,000,000 under \$2,500,000	2,654	372,748	6,517	351,673	1,483	987,201
\$2,500,000 under \$5,000,000	482	242,029	985	159,737	265	375,066
\$5,000,000 under \$10,000,000	189	177,897	317	65,727	99	382,196
\$10,000,000 or more	96	286,441	141	135,600	54	562,536

See footnote at end of table.

Table 1C.—Returns Filed in 1988: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—(Continued)

[Estimates are based on samples—money amounts are in thousands]

Size of gross estate	Type of deductions							
	Total allowable deductions		Funeral expenses		Executors' commissions		Attorneys' fees	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)
All returns, total	43,596	33,523,907	40,274	197,547	15,408	632,595	25,702	604,906
\$500,000 under \$600,000.....	2,740	478,176	2,365	9,592	484	5,809	1,192	10,270
\$600,000 under \$1,000,000.....	21,346	5,400,451	19,875	91,062	6,449	117,683	12,302	161,456
\$1,000,000 under \$2,500,000.....	14,891	9,516,321	13,688	67,012	6,066	206,889	9,048	217,490
\$2,500,000 under \$5,000,000.....	3,070	5,071,318	2,884	18,939	1,548	100,423	2,081	88,041
\$5,000,000 under \$10,000,000.....	1,010	3,630,523	950	6,111	542	74,465	686	55,570
\$10,000,000 or more.....	541	9,427,118	512	4,830	319	127,326	392	72,080
Taxable returns, total.....	18,944	11,991,865	18,500	91,024	11,726	536,362	16,642	464,365
\$500,000 under \$600,000.....	251	9,363	251	1,313	*72	*574	235	2,612
\$600,000 under \$1,000,000.....	7,820	513,283	7,692	34,720	4,224	81,515	6,752	96,500
\$1,000,000 under \$2,500,000.....	7,804	1,825,270	7,584	35,315	5,237	183,640	6,939	178,786
\$2,500,000 under \$5,000,000.....	2,014	1,941,407	1,954	11,993	1,428	94,928	1,825	79,193
\$5,000,000 under \$10,000,000.....	668	1,440,787	645	3,944	476	65,419	558	46,853
\$10,000,000 or more.....	387	6,261,754	373	3,739	289	110,286	332	60,421
Nontaxable returns, total.....	24,651	21,532,042	21,774	106,523	3,682	96,233	9,060	140,541
\$500,000 under \$600,000.....	2,488	468,813	2,114	8,280	412	5,235	957	7,658
\$600,000 under \$1,000,000.....	13,525	4,887,168	12,183	56,342	2,225	36,168	5,550	64,955
\$1,000,000 under \$2,500,000.....	7,086	7,691,051	6,104	31,697	830	23,249	2,108	38,704
\$2,500,000 under \$5,000,000.....	1,056	3,129,911	930	6,946	119	5,495	256	8,848
\$5,000,000 under \$10,000,000.....	342	2,189,736	305	2,167	66	9,046	128	8,717
\$10,000,000 or more.....	153	3,165,364	138	1,091	30	17,040	60	11,659

Size of gross estate	Type of deductions (continued)							
	Other expenses and losses		Debts and mortgages		Charitable bequests		Bequests to surviving spouse	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(37)	(38)	(39)	(40)	(41)	(42)	(43)	(44)
All returns, total	30,762	489,134	35,547	3,252,149	8,376	4,822,104	20,593	23,539,610
\$500,000 under \$600,000.....	1,651	8,459	1,927	59,938	460	11,182	1,168	372,974
\$600,000 under \$1,000,000.....	14,858	88,004	16,989	617,632	3,545	561,261	9,154	3,765,013
\$1,000,000 under \$2,500,000.....	10,716	167,792	12,429	1,054,336	2,854	830,767	7,697	6,977,449
\$2,500,000 under \$5,000,000.....	2,304	81,093	2,755	468,237	956	695,734	1,690	3,625,448
\$5,000,000 under \$10,000,000.....	805	57,257	937	408,596	329	496,761	557	2,531,763
\$10,000,000 or more.....	427	86,529	512	643,410	232	2,226,399	327	6,266,963
Taxable returns, total.....	18,434	408,515	17,111	1,298,194	4,485	2,546,004	3,039	6,648,079
\$500,000 under \$600,000.....	251	1,026	191	3,441	**	**	**	**
\$600,000 under \$1,000,000.....	7,655	57,978	6,842	133,038	**1,382	**30,368	**538	**79,819
\$1,000,000 under \$2,500,000.....	7,613	143,396	7,198	373,699	1,922	205,462	1,299	704,973
\$2,500,000 under \$5,000,000.....	1,922	75,820	1,855	233,114	739	324,374	759	1,121,985
\$5,000,000 under \$10,000,000.....	639	49,228	647	195,821	256	248,103	253	831,420
\$10,000,000 or more.....	353	81,067	377	359,081	186	1,737,697	191	3,909,883
Nontaxable returns, total.....	12,329	80,619	18,436	1,953,954	3,891	2,276,101	17,553	16,891,531
\$500,000 under \$600,000.....	1,400	7,433	1,736	56,497	**	**	**	**
\$600,000 under \$1,000,000.....	7,203	30,026	10,146	484,593	**2,623	**542,075	**9,785	**4,058,168
\$1,000,000 under \$2,500,000.....	3,103	24,396	5,230	680,637	932	625,305	6,398	6,272,476
\$2,500,000 under \$5,000,000.....	382	5,273	900	235,123	218	371,360	932	2,503,464
\$5,000,000 under \$10,000,000.....	166	8,029	290	212,775	73	248,658	304	1,700,344
\$10,000,000 or more.....	74	5,462	134	284,330	46	488,703	135	2,357,080

See footnote at end of table.

Table 1C.—Returns Filed in 1988: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—(Continued)

[Estimates are based on samples—money amounts are in thousands]

Size of gross estate	Taxable estate		Adjusted taxable gifts		Adjusted taxable estate	
	Number	Amount	Number	Amount	Number	Amount
	(45)	(46)	(47)	(48)	(49)	(50)
All returns, total	39,480	37,250,179	4,582	918,247	39,551	38,168,426
\$500,000 under \$600,000	2,423	1,090,043	*129	*23,845	2,423	1,113,889
\$600,000 under \$1,000,000	19,153	11,016,864	1,468	188,435	19,180	11,205,300
\$1,000,000 under \$2,500,000	13,515	12,310,005	1,646	298,621	13,552	12,608,627
\$2,500,000 under \$5,000,000	2,894	5,349,486	764	142,292	2,894	5,491,778
\$5,000,000 under \$10,000,000	964	3,168,298	331	103,428	967	3,271,726
\$10,000,000 or more	531	4,315,482	244	161,625	535	4,477,107
Taxable returns, total	18,948	27,802,575	3,040	768,440	18,948	28,571,015
\$500,000 under \$600,000	251	132,090	*91	*20,252	251	152,342
\$600,000 under \$1,000,000	7,821	5,799,837	790	157,508	7,821	5,957,345
\$1,000,000 under \$2,500,000	7,804	9,692,061	1,151	230,707	7,804	9,922,768
\$2,500,000 under \$5,000,000	2,014	4,900,169	548	123,574	2,014	5,023,743
\$5,000,000 under \$10,000,000	671	3,027,317	269	88,323	671	3,115,640
\$10,000,000 or more	387	4,251,101	190	148,076	387	4,399,177
Nontaxable returns, total	20,531	9,447,604	1,542	149,807	20,602	9,597,411
\$500,000 under \$600,000	2,172	957,953	*39	*3,594	2,172	961,547
\$600,000 under \$1,000,000	11,331	5,217,027	678	30,927	11,359	5,247,954
\$1,000,000 under \$2,500,000	5,711	2,617,944	495	67,915	5,748	2,685,859
\$2,500,000 under \$5,000,000	881	449,317	215	18,718	881	468,035
\$5,000,000 under \$10,000,000	293	140,981	62	15,105	296	156,086
\$10,000,000 or more	143	64,382	54	13,549	147	77,930

Size of gross estate	Estate tax before credit		Allowable unified credit		Other tax credits		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(51)	(52)	(53)	(54)	(55)	(56)	(57)	(58)
All returns, total	39,550	14,486,522	39,550	6,559,535	21,956	1,627,742	18,948	6,299,236
\$500,000 under \$600,000	2,423	348,110	2,423	337,720	331	3,354	251	7,036
\$600,000 under \$1,000,000	19,180	3,625,396	19,180	3,112,637	9,804	174,897	7,821	337,858
\$1,000,000 under \$2,500,000	13,552	4,458,288	13,552	2,317,646	8,484	391,681	7,804	1,748,958
\$2,500,000 under \$5,000,000	2,894	2,271,984	2,894	521,863	2,214	316,877	2,014	1,433,244
\$5,000,000 under \$10,000,000	966	1,522,508	966	174,120	712	247,854	671	1,100,534
\$10,000,000 or more	535	2,260,235	535	95,550	410	493,079	387	1,671,606
Taxable returns, total	18,948	11,464,152	18,948	3,584,373	18,365	1,580,535	18,948	6,299,236
\$500,000 under \$600,000	251	49,200	251	39,693	219	2,471	251	7,036
\$600,000 under \$1,000,000	7,821	1,972,302	7,821	1,481,677	7,536	152,764	7,821	337,858
\$1,000,000 under \$2,500,000	7,804	3,610,349	7,804	1,480,058	7,580	381,330	7,804	1,748,958
\$2,500,000 under \$5,000,000	2,014	2,120,747	2,014	383,516	1,989	303,986	2,014	1,433,244
\$5,000,000 under \$10,000,000	671	1,474,446	671	126,717	660	247,195	671	1,100,534
\$10,000,000 or more	387	2,237,107	387	72,712	380	492,789	387	1,671,606
Nontaxable returns, total	20,601	3,022,370	20,601	2,975,163	3,591	47,207	—	—
\$500,000 under \$600,000	2,172	298,910	2,172	298,027	112	883	—	—
\$600,000 under \$1,000,000	11,359	1,653,094	11,359	1,630,960	2,268	22,133	—	—
\$1,000,000 under \$2,500,000	5,748	847,939	5,748	837,588	904	10,351	—	—
\$2,500,000 under \$5,000,000	881	151,237	881	138,346	225	12,891	—	—
\$5,000,000 under \$10,000,000	295	48,062	295	47,403	52	659	—	—
\$10,000,000 or more	147	23,128	147	22,838	30	290	—	—

¹ The types of property shown in columns 3 through 26 exclude lifetime transfers shown in columns 27 and 28.

* Estimates should be used with caution because of small number of sample estate tax returns on which it is based.

** Data combined to avoid disclosure of specific estate tax returns.

NOTE: Detail may not add to totals because of rounding.

Table 2.—Estate Tax Returns Filed for 1986 Decedents: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate

(Estimates are based on samples—money amounts are in thousands)

Size of gross estate	Gross estate		Type of property ¹			
	Number	Amount	Real estate		Corporate stock	
			Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)
All returns, total	45,795	66,018,791*	35,914	12,842,935	35,819	18,228,138
\$500,000 under \$600,000	9,237	5,065,341	6,889	1,189,239	6,647	1,014,062
\$600,000 under \$1,000,000	19,299	14,695,606	15,036	3,518,457	14,737	3,288,090
\$1,000,000 under \$2,500,000	12,923	19,040,854	10,447	4,173,128	10,531	4,834,170
\$2,500,000 under \$5,000,000	2,873	9,762,913	2,304	1,698,181	2,431	2,924,535
\$5,000,000 under \$10,000,000	993	6,679,195	835	1,017,124	860	2,351,401
\$10,000,000 or more	470	10,774,882	403	1,246,806	413	3,815,879
Taxable returns, total	21,961	37,788,887	16,255	6,535,931	17,364	11,560,923
\$500,000 under \$600,000	1,893	1,085,337	1,175	201,903	1,376	263,531
\$600,000 under \$1,000,000	10,158	7,758,044	7,406	1,802,952	7,802	1,878,204
\$1,000,000 under \$2,500,000	7,163	10,625,453	5,478	2,147,251	5,833	2,936,207
\$2,500,000 under \$5,000,000	1,739	5,890,919	1,353	917,011	1,474	1,824,429
\$5,000,000 under \$10,000,000	659	4,449,084	546	591,623	574	1,629,055
\$10,000,000 or more	350	7,980,050	296	875,190	306	3,029,499
Nontaxable returns, total	23,834	28,229,904	19,659	6,307,005	18,255	6,667,213
\$500,000 under \$600,000	7,344	3,980,004	5,714	987,335	5,271	750,531
\$600,000 under \$1,000,000	9,141	6,937,563	7,630	1,715,505	6,935	1,409,886
\$1,000,000 under \$2,500,000	5,761	8,415,401	4,969	2,025,877	4,698	1,897,963
\$2,500,000 under \$5,000,000	1,134	3,871,994	950	781,170	958	1,100,106
\$5,000,000 under \$10,000,000	334	2,230,111	289	425,501	286	722,347
\$10,000,000 or more	120	2,794,831	107	371,615	107	786,380

Size of gross estate	Type of property ¹ (continued)							
	Federal savings bonds		Other Federal bonds		State and local bonds		Corporate and foreign bonds ¹	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
All returns, total	6,586	303,843	10,405	1,751,046	18,980	5,150,526	10,447	552,899
\$500,000 under \$600,000	1,480	66,354	1,984	204,299	2,795	248,298	1,723	52,060
\$600,000 under \$1,000,000	3,048	126,387	4,361	437,933	7,268	878,916	4,444	156,306
\$1,000,000 under \$2,500,000	1,669	81,804	3,029	503,516	6,389	1,610,281	3,173	151,113
\$2,500,000 under \$5,000,000	258	17,363	643	223,730	1,648	965,107	711	54,109
\$5,000,000 under \$10,000,000	82	6,241	263	171,413	599	644,629	263	38,555
\$10,000,000 or more	48	5,693	125	210,154	282	803,295	133	100,757
Taxable returns, total	3,270	178,938	5,805	1,143,266	9,731	3,330,612	5,607	328,978
\$500,000 under \$600,000	215	18,011	470	42,256	561	67,710	381	14,103
\$600,000 under \$1,000,000	1,726	83,216	2,644	262,737	3,823	484,213	2,517	92,807
\$1,000,000 under \$2,500,000	1,083	57,981	1,953	352,665	3,652	998,940	1,981	95,364
\$2,500,000 under \$5,000,000	148	9,565	430	180,514	1,058	672,820	442	36,640
\$5,000,000 under \$10,000,000	60	5,294	206	132,990	421	477,877	187	26,209
\$10,000,000 or more	38	4,871	102	172,105	215	629,052	98	63,855
Nontaxable returns, total	3,316	124,905	4,600	607,780	9,249	1,819,914	4,840	223,921
\$500,000 under \$600,000	1,265	48,343	1,514	162,043	2,234	180,588	1,342	37,956
\$600,000 under \$1,000,000	1,322	43,171	1,717	175,196	3,444	394,703	1,926	63,499
\$1,000,000 under \$2,500,000	586	23,823	1,076	150,852	2,738	611,341	1,191	55,749
\$2,500,000 under \$5,000,000	110	7,799	212	43,217	590	292,287	269	17,469
\$5,000,000 under \$10,000,000	22	947	57	38,424	177	166,752	76	12,346
\$10,000,000 or more	10	822	23	38,049	66	174,243	34	36,902

See footnote at end of table.

Table 2.—Estate Tax Returns Filed for 1986 Decedents: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—(Continued)

[Estimates are based on samples—money amounts are in thousands]

Size of gross estate	Type of property ¹ (continued)							
	Cash		Notes and mortgages		Life insurance		Annuities	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(15)	(16)	(17)	(18)	(19)	(20)	(21)	(22)
All returns, total	44,318	7,236,935	14,050	1,889,548	24,893	2,014,350	12,212	1,515,481
\$500,000 under \$600,000	8,886	1,104,197	2,466	175,688	4,998	194,337	2,055	106,541
\$600,000 under \$1,000,000	18,673	2,456,851	5,318	409,031	10,312	666,386	5,022	429,066
\$1,000,000 under \$2,500,000	12,558	2,174,276	4,470	601,394	7,047	719,784	3,813	562,451
\$2,500,000 under \$5,000,000	2,779	693,959	1,153	286,224	1,712	248,753	896	255,072
\$5,000,000 under \$10,000,000	964	380,446	415	136,178	551	111,160	293	101,280
\$10,000,000 or more	457	427,205	228	281,033	273	73,930	133	61,071
Taxable returns, total	21,386	4,298,581	6,568	932,709	9,478	573,047	3,853	459,252
\$500,000 under \$600,000	1,817	260,325	416	28,697	729	15,008	316	14,859
\$600,000 under \$1,000,000	9,885	1,566,682	2,741	203,112	4,245	157,704	1,485	91,216
\$1,000,000 under \$2,500,000	7,009	1,453,711	2,310	299,728	3,078	205,580	1,389	155,496
\$2,500,000 under \$5,000,000	1,688	445,162	671	159,235	900	86,732	428	113,959
\$5,000,000 under \$10,000,000	644	262,622	258	84,231	335	54,138	152	42,193
\$10,000,000 or more	343	310,080	171	157,706	191	53,886	81	41,529
Nontaxable returns, total	22,932	2,938,354	7,482	956,839	15,415	1,441,303	8,359	1,056,229
\$500,000 under \$600,000	7,069	843,872	2,050	146,991	4,269	179,329	1,739	91,682
\$600,000 under \$1,000,000	8,787	890,170	2,576	205,919	6,067	508,681	3,536	337,850
\$1,000,000 under \$2,500,000	5,549	720,564	2,159	301,666	3,969	514,204	2,424	406,954
\$2,500,000 under \$5,000,000	1,092	248,798	482	126,989	812	162,021	468	141,113
\$5,000,000 under \$10,000,000	321	117,824	157	51,946	215	57,022	141	59,087
\$10,000,000 or more	114	117,125	57	123,327	82	20,045	52	19,542

Size of gross estate	Type of property ¹ (continued)					
	Noncorporate business assets		Household goods and other assets		Lifetime transfers	
	Number	Amount	Number	Amount	Number	Amount
	(23)	(24)	(25)	(26)	(27)	(28)
All returns, total	11,545	2,820,362	41,731	2,368,726	9,023	9,344,001
\$500,000 under \$600,000	1,593	78,892	8,272	196,490	1,292	434,885
\$600,000 under \$1,000,000	4,189	326,929	17,425	515,179	3,396	1,486,074
\$1,000,000 under \$2,500,000	3,851	631,604	11,974	657,843	2,898	2,339,489
\$2,500,000 under \$5,000,000	1,194	410,209	2,671	337,661	886	1,648,008
\$5,000,000 under \$10,000,000	451	364,085	937	257,072	345	1,099,610
\$10,000,000 or more	267	1,008,643	452	404,482	207	2,335,935
Taxable returns, total	4,487	1,179,945	19,965	1,339,610	4,770	5,927,092
\$500,000 under \$600,000	130	11,067	1,643	38,317	296	109,550
\$600,000 under \$1,000,000	1,677	121,055	9,079	250,449	1,857	763,695
\$1,000,000 under \$2,500,000	1,600	227,715	6,648	353,929	1,638	1,340,886
\$2,500,000 under \$5,000,000	611	187,897	1,623	198,296	573	1,058,659
\$5,000,000 under \$10,000,000	281	205,369	633	175,561	244	761,922
\$10,000,000 or more	188	426,841	339	323,058	163	1,892,379
Nontaxable returns, total	7,059	1,640,417	21,766	1,029,116	4,252	3,416,909
\$500,000 under \$600,000	1,463	67,825	6,628	158,173	996	325,334
\$600,000 under \$1,000,000	2,512	205,873	8,346	264,730	1,539	722,378
\$1,000,000 under \$2,500,000	2,251	403,889	5,326	303,914	1,260	998,603
\$2,500,000 under \$5,000,000	583	222,312	1,048	139,365	313	589,349
\$5,000,000 under \$10,000,000	170	158,716	304	81,511	101	337,688
\$10,000,000 or more	79	581,801	113	81,423	45	443,556

See footnote at end of table.

Table 2.—Estate Tax Returns Filed for 1986 Decedents: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—(Continued)

[Estimates are based on samples—money amounts are in thousands]

Size of gross estate	Type of deductions							
	Total allowable deductions		Funeral expenses		Executors' commissions		Attorneys' fees	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)
All returns, total	45,764	30,303,044	42,893	199,078	16,462	620,867	28,259	632,275
\$500,000 under \$600,000	9,212	1,352,386	8,570	34,990	2,476	30,170	5,282	49,740
\$600,000 under \$1,000,000	19,298	5,002,079	18,079	78,215	6,496	117,286	11,861	165,833
\$1,000,000 under \$2,500,000	12,920	8,385,878	12,135	58,905	5,297	181,220	8,244	195,001
\$2,500,000 under \$5,000,000	2,873	5,098,481	2,720	15,746	1,409	102,846	1,843	87,767
\$5,000,000 under \$10,000,000	992	3,574,426	944	6,023	529	78,363	695	61,883
\$10,000,000 or more	470	6,889,794	446	5,199	255	110,981	334	72,050
Taxable returns, total	21,955	9,662,935	21,315	98,318	12,525	523,644	18,982	500,634
\$500,000 under \$600,000	1,893	44,076	1,823	7,085	619	6,316	1,566	14,305
\$600,000 under \$1,000,000	10,157	632,672	9,835	41,330	5,352	96,620	8,669	129,220
\$1,000,000 under \$2,500,000	7,159	1,792,961	6,987	32,201	4,579	160,680	6,346	161,787
\$2,500,000 under \$5,000,000	1,739	1,580,586	1,694	9,681	1,275	93,341	1,528	76,676
\$5,000,000 under \$10,000,000	658	1,473,276	638	3,955	469	69,031	580	53,310
\$10,000,000 or more	350	4,139,365	339	4,065	231	97,655	292	65,336
Nontaxable returns, total	23,809	20,640,109	21,578	100,761	3,937	97,223	9,277	131,641
\$500,000 under \$600,000	7,319	1,308,310	6,747	27,905	1,858	23,854	3,716	35,435
\$600,000 under \$1,000,000	9,141	4,369,407	8,244	36,885	1,144	20,666	3,191	36,614
\$1,000,000 under \$2,500,000	5,761	6,592,917	5,148	26,704	717	20,540	1,898	33,214
\$2,500,000 under \$5,000,000	1,134	3,517,895	1,027	6,065	135	9,505	316	11,091
\$5,000,000 under \$10,000,000	334	2,101,150	306	2,068	60	9,332	115	8,573
\$10,000,000 or more	120	2,750,429	107	1,134	23	13,326	41	6,714

Size of gross estate	Type of deductions (continued)							
	Other expenses and losses		Debts and mortgages		Charitable bequests		Bequests to surviving spouse	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(37)	(38)	(39)	(40)	(41)	(42)	(43)	(44)
All returns, total	33,687	433,404	38,685	3,525,624	9,114	4,079,690	20,579	20,903,488
\$500,000 under \$600,000	6,643	32,092	7,361	156,518	1,509	130,691	3,226	918,267
\$600,000 under \$1,000,000	14,206	97,761	16,126	563,599	3,552	568,068	8,297	3,412,936
\$1,000,000 under \$2,500,000	9,583	118,290	11,221	1,009,471	2,745	875,956	6,566	5,963,172
\$2,500,000 under \$5,000,000	2,112	65,690	2,608	592,716	758	555,557	1,620	3,681,438
\$5,000,000 under \$10,000,000	769	44,299	922	434,044	350	396,303	580	2,625,062
\$10,000,000 or more	374	75,272	447	769,276	200	1,553,115	291	4,302,612
Taxable returns, total	20,982	341,272	20,047	1,487,861	5,075	1,965,048	3,195	4,742,136
\$500,000 under \$600,000	1,790	6,656	1,613	8,234	215	1,005	28	473
\$600,000 under \$1,000,000	9,735	70,472	9,140	163,391	2,030	52,188	729	79,451
\$1,000,000 under \$2,500,000	6,875	96,546	6,652	396,025	1,849	220,297	1,395	726,714
\$2,500,000 under \$5,000,000	1,644	56,080	1,668	255,981	527	211,974	593	872,829
\$5,000,000 under \$10,000,000	622	40,049	636	201,212	282	223,460	271	882,259
\$10,000,000 or more	316	71,468	340	463,018	172	1,256,124	181	2,180,410
Nontaxable returns, total	12,705	92,132	18,637	2,037,763	4,039	2,114,642	17,384	16,161,352
\$500,000 under \$600,000	4,854	25,436	5,748	148,284	1,294	129,686	3,198	917,794
\$600,000 under \$1,000,000	4,471	27,290	6,986	400,208	1,522	515,879	7,568	3,333,485
\$1,000,000 under \$2,500,000	2,708	21,744	4,569	613,446	897	655,659	5,171	5,236,458
\$2,500,000 under \$5,000,000	468	9,610	941	336,735	230	343,583	1,028	2,808,610
\$5,000,000 under \$10,000,000	147	4,250	287	232,832	68	172,843	309	1,742,804
\$10,000,000 or more	57	3,803	107	306,258	28	296,991	110	2,122,202

See footnote at end of table.

Table 2.—Estate Tax Returns Filed for 1986 Decedents: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—(Continued)

[Estimates are based on samples—money amounts are in thousands]

Size of gross estate	Taxable estate		Adjusted taxable gifts		Adjusted taxable estate	
	Number	Amount	Number	Amount	Number	Amount
	(45)	(46)	(47)	(48)	(49)	(50)
All returns, total	41,674	35,893,130	3,717	560,876	41,734	36,454,006
\$500,000 under \$600,000	8,299	3,730,164	303	21,164	8,312	3,751,328
\$600,000 under \$1,000,000	17,277	9,726,449	973	99,149	17,303	9,825,599
\$1,000,000 under \$2,500,000	11,946	10,710,369	1,320	166,751	11,955	10,877,120
\$2,500,000 under \$5,000,000	2,735	4,733,514	595	116,751	2,743	4,850,265
\$5,000,000 under \$10,000,000	958	3,105,189	312	72,057	961	3,177,246
\$10,000,000 or more	459	3,887,444	215	85,005	460	3,972,449
Taxable returns, total	21,961	28,125,945	2,679	464,923	21,961	28,590,869
\$500,000 under \$600,000	1,893	1,041,261	161	11,823	1,893	1,053,084
\$600,000 under \$1,000,000	10,158	7,125,369	647	74,601	10,158	7,199,969
\$1,000,000 under \$2,500,000	7,163	8,832,490	964	130,323	7,163	8,962,813
\$2,500,000 under \$5,000,000	1,739	4,310,333	477	103,360	1,739	4,413,693
\$5,000,000 under \$10,000,000	659	2,975,808	247	63,442	659	3,039,250
\$10,000,000 or more	350	3,840,686	183	81,374	350	3,922,060
Nontaxable returns, total	19,713	7,767,184	1,038	95,953	19,773	7,863,137
\$500,000 under \$600,000	6,407	2,688,903	143	9,341	6,419	2,698,244
\$600,000 under \$1,000,000	7,119	2,601,081	326	24,549	7,145	2,625,629
\$1,000,000 under \$2,500,000	4,783	1,877,879	356	36,428	4,792	1,914,307
\$2,500,000 under \$5,000,000	996	423,182	118	13,391	1,004	436,572
\$5,000,000 under \$10,000,000	299	129,382	64	8,615	302	137,996
\$10,000,000 or more	109	46,758	31	3,630	110	50,388

Size of gross estate	Estate tax before credit		Allowable unified credit		Other tax credits		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(51)	(52)	(53)	(54)	(55)	(56)	(57)	(58)
All returns, total	41,707	13,703,817	41,707	5,793,387	25,439	1,589,355	21,961	6,321,067
\$500,000 under \$600,000	8,303	1,166,292	8,303	1,115,240	3,564	32,340	1,893	18,711
\$600,000 under \$1,000,000	17,287	3,174,598	17,287	2,369,614	11,087	206,111	10,158	598,869
\$1,000,000 under \$2,500,000	11,953	3,846,213	11,953	1,694,576	7,797	373,217	7,163	1,778,417
\$2,500,000 under \$5,000,000	2,743	1,999,870	2,743	402,426	1,901	260,823	1,739	1,336,621
\$5,000,000 under \$10,000,000	961	1,484,652	961	142,860	723	247,118	659	1,094,673
\$10,000,000 or more	460	2,032,193	460	68,671	367	469,745	350	1,493,777
Taxable returns, total	21,961	11,286,710	21,961	3,414,511	21,563	1,551,124	21,961	6,321,067
\$500,000 under \$600,000	1,893	334,363	1,893	294,051	1,795	21,601	1,893	18,711
\$600,000 under \$1,000,000	10,158	2,371,531	10,158	1,581,102	9,999	191,556	10,158	598,869
\$1,000,000 under \$2,500,000	7,163	3,256,849	7,163	1,114,147	7,056	364,283	7,163	1,778,417
\$2,500,000 under \$5,000,000	1,739	1,865,215	1,739	269,777	1,712	258,817	1,739	1,336,621
\$5,000,000 under \$10,000,000	659	1,442,082	659	101,452	654	245,957	659	1,094,673
\$10,000,000 or more	350	2,016,671	350	53,983	348	468,911	350	1,493,777
Nontaxable returns, total	19,746	2,417,107	19,746	2,378,876	3,877	38,231	—	—
\$500,000 under \$600,000	6,410	831,929	6,410	821,189	1,770	10,739	—	—
\$600,000 under \$1,000,000	7,129	803,067	7,129	788,512	1,088	14,555	—	—
\$1,000,000 under \$2,500,000	4,790	589,363	4,790	580,429	741	8,934	—	—
\$2,500,000 under \$5,000,000	1,004	134,655	1,004	132,649	189	2,007	—	—
\$5,000,000 under \$10,000,000	302	42,570	302	41,408	69	1,162	—	—
\$10,000,000 or more	110	15,522	110	14,688	19	835	—	—

¹ The types of property shown in columns 3 through 26 exclude lifetime transfers shown in columns 27 and 28.
NOTE: Detail may not add to totals because of rounding.

Table 3.—Estate Tax Returns Filed for 1986 Decedents: Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Net Worth

[Estimates are based on samples—money amounts are in thousands]

Size of net worth	Gross estate		Type of property ¹			
	Number	Amount	Real estate		Corporate stock	
			Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)
All returns, total	45,795	66,018,791	35,914	12,842,935	35,819	18,228,136
Under \$600,000 ¹	11,087	6,519,877	8,515	1,750,205	8,009	1,218,554
\$600,000 under \$1,000,000.....	18,598	14,673,951	14,448	3,460,147	14,285	3,304,024
\$1,000,000 under \$2,500,000.....	12,103	18,596,196	9,691	3,953,691	9,900	4,783,134
\$2,500,000 under \$5,000,000.....	2,671	9,600,588	2,139	1,653,859	2,258	2,929,760
\$5,000,000 under \$10,000,000.....	910	6,469,221	761	960,934	794	2,337,326
\$10,000,000 or more.....	425	10,158,958	360	1,064,100	373	3,655,339
Taxable returns, total	21,961	37,788,887	16,255	6,535,931	17,364	11,560,923
Under \$600,000 ¹	2,311	1,367,616	1,482	298,606	1,699	328,017
\$600,000 under \$1,000,000.....	10,181	7,985,925	7,463	1,875,565	7,828	1,906,455
\$1,000,000 under \$2,500,000.....	6,899	10,616,507	5,256	2,101,470	5,633	2,927,762
\$2,500,000 under \$5,000,000.....	1,635	5,842,598	1,278	898,505	1,387	1,849,198
\$5,000,000 under \$10,000,000.....	614	4,335,992	507	586,894	535	1,612,209
\$10,000,000 or more.....	320	7,640,249	269	774,890	282	2,937,281
Nontaxable returns, total	23,834	28,229,904	19,659	6,307,005	18,255	6,667,213
Under \$600,000 ¹	8,777	5,152,261	7,033	1,451,599	6,310	890,536
\$600,000 under \$1,000,000.....	8,417	6,688,026	6,984	1,584,582	6,457	1,397,568
\$1,000,000 under \$2,500,000.....	5,204	7,979,689	4,436	1,852,220	4,267	1,855,372
\$2,500,000 under \$5,000,000.....	1,035	3,757,991	861	755,354	871	1,080,562
\$5,000,000 under \$10,000,000.....	297	2,133,229	254	374,039	258	725,117
\$10,000,000 or more.....	104	2,518,709	91	289,210	91	718,058

Size of net worth	Type of property ¹ (continued)							
	Federal savings bonds		Other Federal bonds		State and local bonds		Corporate and foreign bonds ¹	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
All returns, total	6,586	303,843	10,405	1,751,046	18,980	5,150,526	10,447	552,899
Under \$600,000.....	1,637	67,883	2,245	216,154	3,142	291,677	1,936	60,976
\$600,000 under \$1,000,000.....	2,979	127,092	4,257	445,348	7,288	894,122	4,368	151,963
\$1,000,000 under \$2,500,000.....	1,598	79,718	2,923	502,720	6,152	1,616,307	3,096	151,684
\$2,500,000 under \$5,000,000.....	250	17,800	615	220,725	1,569	954,661	670	49,802
\$5,000,000 under \$10,000,000.....	80	8,116	249	160,458	567	621,911	249	62,687
\$10,000,000 or more.....	41	3,233	116	205,640	262	771,847	128	75,786
Taxable returns, total	3,270	178,938	5,805	1,143,266	9,731	3,330,612	5,607	328,978
Under \$600,000.....	258	19,138	603	48,656	696	83,609	428	16,114
\$600,000 under \$1,000,000.....	1,727	83,616	2,596	272,121	3,849	495,728	2,539	93,247
\$1,000,000 under \$2,500,000.....	1,050	56,598	1,903	353,216	3,567	1,016,433	1,948	97,372
\$2,500,000 under \$5,000,000.....	139	9,980	413	171,536	1,016	660,424	419	32,655
\$5,000,000 under \$10,000,000.....	61	7,192	196	130,121	399	459,777	178	26,498
\$10,000,000 or more.....	34	2,414	94	167,616	203	614,641	95	63,092
Nontaxable returns, total	3,316	124,905	4,600	607,780	9,249	1,819,914	4,840	223,921
Under \$600,000.....	1,379	48,745	1,642	167,498	2,446	208,068	1,508	44,861
\$600,000 under \$1,000,000.....	1,252	43,477	1,661	173,227	3,439	398,395	1,829	58,716
\$1,000,000 under \$2,500,000.....	548	23,120	1,020	149,504	2,585	599,874	1,148	54,313
\$2,500,000 under \$5,000,000.....	111	7,820	201	49,189	553	294,237	252	17,147
\$5,000,000 under \$10,000,000.....	19	924	53	30,338	168	162,134	71	36,189
\$10,000,000 or more.....	7	819	22	38,024	59	157,206	32	12,694

See footnote at end of table.

Table 3.—Estate Tax Returns Filed for 1986 Decedents: Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Net Worth—(Continued)

[Estimates are based on samples—money amounts are in thousands]

Size of net worth	Type of property ¹ (continued)							
	Cash		Notes and mortgages		Life insurance		Annuities	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(15)	(16)	(17)	(18)	(19)	(20)	(21)	(22)
All returns, total	44,318	7,236,935	14,050	1,889,548	24,893	2,014,350	12,212	1,515,481
Under \$600,000	10,659	1,222,424	3,072	235,997	6,285	363,969	2,723	158,988
\$600,000 under \$1,000,000	18,014	2,455,593	5,258	428,524	9,770	634,169	4,786	428,545
\$1,000,000 under \$2,500,000	11,763	2,125,269	4,094	585,908	6,534	645,845	3,510	531,446
\$2,500,000 under \$5,000,000	2,585	682,894	1,050	258,776	1,566	219,520	823	250,812
\$5,000,000 under \$10,000,000	884	360,047	374	129,021	500	90,552	255	88,009
\$10,000,000 or more	413	390,708	201	251,322	238	60,295	116	57,680
Taxable returns, total.....	21,386	4,298,581	6,568	932,709	9,478	573,047	3,853	459,252
Under \$600,000	2,231	296,730	530	34,865	980	29,354	403	21,017
\$600,000 under \$1,000,000	9,909	1,593,998	2,829	222,064	4,212	172,252	1,516	96,779
\$1,000,000 under \$2,500,000	6,748	1,435,064	2,192	316,755	2,968	193,637	1,332	152,572
\$2,500,000 under \$5,000,000	1,584	434,280	622	135,572	839	89,482	398	113,433
\$5,000,000 under \$10,000,000	601	249,105	240	85,436	311	44,564	135	36,938
\$10,000,000 or more	313	289,404	154	138,018	168	43,756	69	38,514
Nontaxable returns, total	22,932	2,938,354	7,482	956,839	15,415	1,441,303	8,359	1,056,229
Under \$600,000	8,428	925,694	2,542	201,132	5,305	334,614	2,320	137,972
\$600,000 under \$1,000,000	8,105	861,595	2,428	206,460	5,558	461,916	3,270	331,766
\$1,000,000 under \$2,500,000	5,015	690,205	1,903	269,154	3,565	452,207	2,178	378,875
\$2,500,000 under \$5,000,000	1,001	248,614	428	123,203	728	130,038	425	137,379
\$5,000,000 under \$10,000,000	283	110,943	134	43,586	189	45,988	120	51,071
\$10,000,000 or more	99	101,303	47	113,304	70	16,539	47	19,166

Size of net worth	Type of property ¹ (continued)					
	Noncorporate business assets		Household goods and other assets		Lifetime transfers	
	Number	Amount	Number	Amount	Number	Amount
	(23)	(24)	(25)	(26)	(27)	(28)
All returns, total	11,545	2,820,362	41,731	2,368,726	9,023	9,344,001
Under \$600,000	2,303	158,412	9,935	258,376	1,469	516,262
\$600,000 under \$1,000,000	4,043	351,213	16,839	511,942	3,386	1,481,266
\$1,000,000 under \$2,500,000	3,459	597,140	11,212	636,146	2,817	2,387,186
\$2,500,000 under \$5,000,000	1,100	409,186	2,476	331,404	831	1,621,389
\$5,000,000 under \$10,000,000	404	339,043	861	252,304	326	1,058,811
\$10,000,000 or more	238	965,368	409	378,554	193	2,279,086
Taxable returns, total	4,487	1,179,945	19,965	1,339,610	4,770	5,927,092
Under \$600,000	233	21,307	1,995	45,184	338	125,018
\$600,000 under \$1,000,000	1,719	128,894	9,147	265,534	1,887	779,670
\$1,000,000 under \$2,500,000	1,541	228,596	6,401	349,563	1,624	1,387,468
\$2,500,000 under \$5,000,000	571	208,740	1,520	203,624	536	1,035,167
\$5,000,000 under \$10,000,000	257	184,489	593	175,025	234	737,745
\$10,000,000 or more	167	407,920	310	300,679	152	1,862,024
Nontaxable returns, total.....	7,059	1,640,417	21,766	1,029,116	4,252	3,416,909
Under \$600,000	2,070	137,105	7,940	213,192	1,131	391,244
\$600,000 under \$1,000,000	2,325	222,320	7,692	246,408	1,499	701,596
\$1,000,000 under \$2,500,000	1,917	368,543	4,811	286,583	1,193	999,718
\$2,500,000 under \$5,000,000	529	200,447	956	127,779	295	586,222
\$5,000,000 under \$10,000,000	147	154,555	268	77,279	93	321,066
\$10,000,000 or more	71	557,448	98	77,875	42	417,062

See footnote at end of table.

Table 3.—Estate Tax Returns Filed for 1986 Decedents: Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Net Worth—(Continued)

[Estimates are based on samples—money amounts are in thousands]

Size of net worth	Type of deductions							
	Total allowable deductions		Funeral expenses		Executors' commissions		Attorneys' fees	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(29)	(30)	(31)	(32)	(33)	(34)	(35)	(36)
All returns, total	45,764	30,303,044	42,893	199,078	16,462	620,867	28,259	632,275
Under \$600,000	11,062	2,314,348	10,302	43,012	3,014	39,020	6,385	65,123
\$600,000 under \$1,000,000	18,597	5,036,887	17,423	75,662	6,320	117,505	11,429	163,845
\$1,000,000 under \$2,500,000	12,100	8,086,443	11,375	55,347	5,096	181,938	7,798	191,901
\$2,500,000 under \$5,000,000	2,671	5,015,445	2,525	14,672	1,307	100,526	1,699	84,593
\$5,000,000 under \$10,000,000	909	3,450,683	865	5,724	490	76,614	644	60,304
\$10,000,000 or more	425	6,399,238	401	4,663	235	105,264	304	66,509
Taxable returns, total	21,955	9,662,935	21,315	98,318	12,525	523,644	18,982	500,634
Under \$600,000	2,311	91,879	2,228	8,804	855	8,879	1,938	18,352
\$600,000 under \$1,000,000	10,180	738,857	9,860	41,619	5,388	100,850	8,685	133,273
\$1,000,000 under \$2,500,000	6,896	1,833,339	6,732	31,137	4,445	161,938	6,128	161,473
\$2,500,000 under \$5,000,000	1,635	1,647,047	1,588	9,223	1,188	91,995	1,419	74,684
\$5,000,000 under \$10,000,000	613	1,430,216	597	3,914	433	65,157	544	51,187
\$10,000,000 or more	320	3,921,598	309	3,621	216	94,825	269	61,665
Nontaxable returns, total	23,809	20,640,109	21,578	100,761	3,937	97,223	9,277	131,641
Under \$600,000	8,752	2,222,469	8,074	34,208	2,159	30,141	4,447	46,770
\$600,000 under \$1,000,000	8,417	4,298,031	7,563	34,044	932	16,655	2,744	30,572
\$1,000,000 under \$2,500,000	5,204	6,253,104	4,644	24,210	651	20,000	1,670	30,428
\$2,500,000 under \$5,000,000	1,035	3,368,398	937	5,448	119	8,531	280	9,909
\$5,000,000 under \$10,000,000	297	2,020,467	269	1,810	57	11,457	101	9,117
\$10,000,000 or more	104	2,477,641	92	1,042	19	10,439	35	4,844

Size of net worth	Type of deductions (continued)							
	Other expenses and losses		Debts and mortgages		Charitable bequests		Bequests to surviving spouse	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(37)	(38)	(39)	(40)	(41)	(42)	(43)	(44)
All returns, total	33,687	433,404	38,685	3,525,624	9,114	4,079,690	20,579	20,903,488
Under \$600,000	7,966	42,183	9,212	858,641	1,675	143,537	4,084	1,217,831
\$600,000 under \$1,000,000	13,688	98,354	15,425	541,386	3,503	564,312	8,105	3,476,525
\$1,000,000 under \$2,500,000	9,025	118,071	10,401	776,689	2,668	875,547	6,120	5,887,358
\$2,500,000 under \$5,000,000	1,958	61,456	2,406	530,754	739	560,319	1,494	3,659,688
\$5,000,000 under \$10,000,000	713	42,360	840	334,196	340	396,886	518	2,534,600
\$10,000,000 or more	337	70,981	402	483,958	189	1,539,090	258	4,127,486
Taxable returns, total	20,982	341,272	20,047	1,487,861	5,075	1,965,048	3,195	4,742,136
Under \$600,000	2,190	8,526	2,031	44,636	272	1,655	72	2,114
\$600,000 under \$1,000,000	9,758	74,867	9,163	243,305	2,047	54,877	742	90,064
\$1,000,000 under \$2,500,000	6,625	98,027	6,388	385,926	1,797	219,138	1,416	775,903
\$2,500,000 under \$5,000,000	1,538	53,670	1,564	286,473	523	220,863	558	906,116
\$5,000,000 under \$10,000,000	581	38,117	591	163,749	274	226,402	245	881,691
\$10,000,000 or more	289	68,065	310	363,773	162	1,242,113	163	2,086,248
Nontaxable returns, total	12,705	92,132	18,637	2,037,763	4,039	2,114,642	17,384	16,161,352
Under \$600,000	5,776	33,657	7,181	814,005	1,402	141,882	4,012	1,215,717
\$600,000 under \$1,000,000	3,929	23,487	6,262	298,081	1,456	509,435	7,363	3,386,461
\$1,000,000 under \$2,500,000	2,400	20,044	4,013	390,764	872	656,409	4,704	5,111,455
\$2,500,000 under \$5,000,000	420	7,786	842	244,282	216	339,457	936	2,753,572
\$5,000,000 under \$10,000,000	132	4,243	249	170,447	66	170,483	274	1,652,910
\$10,000,000 or more	48	2,917	91	120,185	27	296,976	95	2,041,238

See footnote at end of table.

Table 3.—Estate Tax Returns Filed for 1986 Decedents: Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Net Worth—(Continued)

[Estimates are based on samples—money amounts are in thousands]

Size of net worth	Taxable estate		Adjusted taxable gifts		Adjusted taxable estate	
	Number	Amount	Number	Amount	Number	Amount
	(45)	(46)	(47)	(48)	(49)	(50)
All returns, total	41,674	35,893,130	3,717	560,876	41,734	36,454,006
Under \$600,000	9,740	4,340,150	402	29,473	9,758	4,369,623
\$600,000 under \$1,000,000	16,790	9,661,963	986	112,724	16,813	9,774,687
\$1,000,000 under \$2,500,000	11,289	10,521,204	1,271	154,181	11,299	10,675,385
\$2,500,000 under \$5,000,000	2,559	4,589,849	562	111,646	2,565	4,701,494
\$5,000,000 under \$10,000,000	878	3,020,011	301	71,830	881	3,091,841
\$10,000,000 or more	418	3,759,953	195	81,022	418	3,840,975
Taxable returns, total	21,961	28,125,945	2,679	464,923	21,961	28,590,869
Under \$600,000	2,311	1,275,737	191	16,272	2,311	1,292,009
\$600,000 under \$1,000,000	10,181	7,247,065	676	83,692	10,181	7,330,757
\$1,000,000 under \$2,500,000	6,899	8,783,166	955	124,900	6,899	8,908,066
\$2,500,000 under \$5,000,000	1,635	4,195,550	449	99,135	1,635	4,294,686
\$5,000,000 under \$10,000,000	614	2,905,776	243	63,282	614	2,969,058
\$10,000,000 or more	320	3,718,651	166	77,643	320	3,796,294
Nontaxable returns, total	19,713	7,767,184	1,038	95,953	19,773	7,863,137
Under \$600,000	7,429	3,064,413	211	13,201	7,447	3,077,614
\$600,000 under \$1,000,000	6,609	2,414,898	311	29,032	6,631	2,443,931
\$1,000,000 under \$2,500,000	4,390	1,738,038	316	29,282	4,400	1,767,319
\$2,500,000 under \$5,000,000	924	394,298	112	12,510	930	406,809
\$5,000,000 under \$10,000,000	264	114,235	58	8,549	267	122,783
\$10,000,000 or more	97	41,302	29	3,379	97	44,681

Size of net worth	Estate tax before credit		Allowable unified credit		Other tax credits		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(51)	(52)	(53)	(54)	(55)	(56)	(57)	(58)
All returns, total	41,707	13,703,817	41,707	5,793,387	25,439	1,589,355	21,961	6,321,067
Under \$600,000	9,746	1,357,954	9,746	1,294,982	4,140	38,555	2,311	24,417
\$600,000 under \$1,000,000	16,800	3,167,798	16,800	2,318,273	10,969	211,569	10,181	637,952
\$1,000,000 under \$2,500,000	11,297	3,798,567	11,297	1,609,512	7,524	376,801	6,899	1,812,252
\$2,500,000 under \$5,000,000	2,565	1,954,215	2,565	377,030	1,796	258,554	1,635	1,318,631
\$5,000,000 under \$10,000,000	881	1,455,465	881	131,161	672	244,551	614	1,079,753
\$10,000,000 or more	418	1,969,817	418	62,429	338	459,326	320	1,448,062
Taxable returns, total	21,961	11,286,710	21,961	3,414,511	21,563	1,551,124	21,961	6,321,067
Under \$600,000	2,311	410,400	2,311	359,204	2,208	26,778	2,311	24,417
\$600,000 under \$1,000,000	10,181	2,419,837	10,181	1,584,536	10,013	197,345	10,181	637,952
\$1,000,000 under \$2,500,000	6,899	3,254,076	6,899	1,073,333	6,804	368,489	6,899	1,812,252
\$2,500,000 under \$5,000,000	1,635	1,828,748	1,635	253,551	1,609	256,565	1,635	1,318,631
\$5,000,000 under \$10,000,000	614	1,417,641	614	94,433	610	243,455	614	1,079,753
\$10,000,000 or more	320	1,956,008	320	49,454	319	458,492	320	1,448,062
Nontaxable returns, total	19,746	2,417,107	19,746	2,378,876	3,877	38,231	—	—
Under \$600,000	7,435	947,555	7,435	935,777	1,931	11,777	—	—
\$600,000 under \$1,000,000	6,619	747,961	6,619	733,737	956	14,224	—	—
\$1,000,000 under \$2,500,000	4,398	544,491	4,398	536,179	721	8,312	—	—
\$2,500,000 under \$5,000,000	930	125,467	930	123,479	187	1,988	—	—
\$5,000,000 under \$10,000,000	267	37,824	267	36,729	63	1,096	—	—
\$10,000,000 or more	97	13,808	97	12,974	18	834	—	—

¹ Includes returns with negative net worth.

NOTE: Detail may not add to totals because of rounding.

Table 4.—Charitable Bequests and Their Components, by Filing Year and for 1986 Decedents

[Estimates are based on samples—money amounts are in thousands]

Size of gross estate, year	Total returns	Gross charitable bequests		Type of bequest			
				Arts and humanities		Religious	
		Number	Amount	Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
1986 filing year, total.....	42,125	7,835	3,830,617	847	140,682	4,965	380,936
\$500,000 under \$1,000,000.....	27,009	4,720	664,014	349	3,743	3,194	253,119
\$1,000,000 under \$5,000,000.....	13,862	2,627	1,235,312	421	106,899	1,537	62,513
\$5,000,000 or more.....	1,253	487	1,731,292	77	30,040	234	65,304
1987 filing year, total.....	45,113	8,987	4,048,928	613	162,103	5,596	501,116
\$500,000 under \$1,000,000.....	27,694	4,793	736,071	211	8,850	3,217	172,820
\$1,000,000 under \$5,000,000.....	15,935	3,645	1,384,745	310	28,916	2,140	224,252
\$5,000,000 or more.....	1,484	549	1,928,113	93	124,337	240	104,044
1988 filing year, total.....	43,683	8,376	4,869,500	811	171,603	5,203	630,702
\$500,000 under \$1,000,000.....	24,170	4,005	573,197	404	17,799	2,757	237,625
\$1,000,000 under \$5,000,000.....	17,960	3,810	1,544,002	325	96,842	2,214	269,990
\$5,000,000 or more.....	1,553	561	2,752,301	81	56,962	231	123,087
Year of death 1986 only, total.....	45,795	9,114	4,152,733	706	179,233	5,624	524,239
\$500,000 under \$1,000,000.....	28,536	5,061	700,980	287	10,415	3,393	176,433
\$1,000,000 under \$5,000,000.....	15,796	3,503	1,455,980	325	38,866	1,994	247,060
\$5,000,000 or more.....	1,463	550	1,995,773	94	129,953	237	100,747

Size of gross estate, year	Type of bequest (continued)								Total allowable charitable bequests
	Educational, medical, science		Social welfare		Private foundations		Other		
	Number	Amount	Number	Amount	Number	Amount	Number	Amount	
	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
1986 filing year, total.....	4,482	1,357,872	1,946	268,842	588	1,014,111	1,290	468,175	3,573,298
\$500,000 under \$1,000,000.....	2,656	224,138	998	110,837	206	25,189	835	46,987	660,844
\$1,000,000 under \$5,000,000.....	1,557	575,784	827	117,163	255	279,001	357	93,952	1,228,570
\$5,000,000 or more.....	269	557,950	121	40,841	126	709,922	97	327,236	1,683,884
1987 filing year, total.....	4,528	1,391,023	1,350	193,573	960	1,015,924	2,758	785,189	3,978,020
\$500,000 under \$1,000,000.....	2,200	329,682	700	56,084	408	75,447	1,403	93,187	733,765
\$1,000,000 under \$5,000,000.....	2,008	551,401	556	60,844	397	150,190	1,159	369,142	1,363,107
\$5,000,000 or more.....	320	509,941	94	76,644	154	790,287	196	322,859	1,881,149
1988 filing year, total.....	4,152	1,239,947	1,145	203,347	808	1,532,601	2,590	1,091,301	4,822,104
\$500,000 under \$1,000,000.....	1,779	167,202	476	29,293	257	47,005	1,278	74,274	572,443
\$1,000,000 under \$5,000,000.....	2,040	652,318	572	112,056	394	192,104	1,114	220,692	1,526,501
\$5,000,000 or more.....	334	420,427	97	61,998	156	1,293,492	198	796,335	2,723,160
Year of death 1986 only, total.....	4,637	1,256,083	1,315	225,667	927	1,228,233	2,628	739,278	4,079,690
\$500,000 under \$1,000,000.....	2,403	287,752	653	56,721	359	53,896	1,349	115,764	698,759
\$1,000,000 under \$5,000,000.....	1,921	611,288	563	81,885	411	173,584	1,088	303,298	1,431,513
\$5,000,000 or more.....	313	357,043	100	87,061	157	1,000,753	192	320,216	1,949,418

NOTE: Detail may not add to totals because of rounding.

Table 5.—Estate Tax Returns Filed for 1986 Decedents: Gross Estate, Taxable Estate, and Estate Tax, by State

[All figures are estimates based on samples—money amounts are in thousands of dollars]

State	Gross estate		Taxable estate		Estate tax before credits		State death tax credit		Estate tax after credits	
	Number of returns	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
Total	45,795	66,018,791	41,674	35,893,130	41,707	13,703,817	25,409	1,531,134	21,961	6,321,067
Alabama.....	511	714,168	452	333,829	452	120,709	230	10,258	198	47,217
Arizona.....	738	954,173	660	520,954	660	197,717	311	21,540	284	84,950
Arkansas.....	211	313,550	196	129,059	197	44,383	86	3,313	72	13,862
California.....	7,072	10,133,198	6,506	5,524,091	6,507	2,072,088	3,694	215,027	3,358	907,593
Colorado.....	598	714,572	553	378,868	553	137,490	235	11,179	219	49,577
Connecticut.....	1,077	1,724,878	1,008	997,304	1,008	397,325	770	54,464	618	199,586
Delaware.....	122	130,169	105	76,702	105	26,285	57	1,952	52	8,943
District of Columbia.....	191	390,058	185	250,498	185	107,046	136	16,535	132	65,566
Florida.....	3,992	6,796,207	3,682	3,375,899	3,693	1,310,820	2,105	147,649	2,027	637,829
Georgia.....	796	1,398,471	749	764,045	749	312,154	416	11,448	392	162,756
Hawaii.....	164	207,076	158	125,556	158	45,476	88	4,231	83	18,835
Idaho.....	169	155,613	149	85,756	149	29,378	*32	*1,665	*46	*7,256
Illinois.....	2,362	3,319,421	2,257	1,954,139	2,259	752,185	1,300	84,957	1,165	352,626
Indiana.....	718	846,863	644	520,328	644	193,002	430	20,004	346	80,228
Iowa.....	584	588,544	544	367,271	544	129,538	369	11,219	265	43,230
Kansas.....	479	578,542	426	341,753	426	127,371	323	13,623	268	52,156
Kentucky.....	519	677,841	441	378,546	441	143,175	286	14,404	208	65,537
Louisiana.....	461	601,617	453	395,189	453	151,013	335	15,459	265	70,145
Maine.....	178	224,009	167	147,601	167	55,611	112	5,847	80	25,691
Maryland.....	758	1,216,749	691	584,376	693	219,054	445	23,410	368	98,983
Massachusetts.....	1,316	1,853,657	1,231	1,058,916	1,243	397,632	906	42,692	741	184,655
Michigan.....	955	1,386,599	814	726,389	814	278,996	546	31,709	440	135,160
Minnesota.....	551	715,997	503	396,877	503	150,446	262	16,977	233	63,740
Mississippi.....	251	265,277	228	138,429	228	47,203	147	3,628	114	14,172
Missouri.....	795	1,293,010	739	652,913	739	249,796	446	28,650	394	117,924
Montana.....	91	101,335	88	57,101	88	19,306	47	1,177	*21	*5,458
Nebraska.....	319	385,325	296	206,787	296	73,695	158	6,790	152	28,729
Nevada.....	172	285,032	162	157,336	162	62,870	72	5,304	82	32,471
New Hampshire.....	233	329,523	215	168,641	215	62,762	117	6,194	102	27,261
New Jersey.....	1,883	2,571,924	1,592	1,269,517	1,591	471,326	1,027	46,330	868	210,837
New Mexico.....	153	223,332	137	113,234	137	43,175	76	4,910	76	20,451
New York.....	4,596	7,540,158	4,081	4,025,919	4,082	1,607,416	2,711	217,453	2,292	833,084
North Carolina.....	1,003	1,332,612	896	762,166	898	289,435	591	31,112	477	135,747
North Dakota.....	118	112,959	112	68,309	112	23,782	59	1,858	59	8,310
Ohio.....	1,768	2,165,870	1,604	1,279,898	1,608	473,701	1,184	48,358	838	197,130
Oklahoma.....	547	754,537	501	495,865	501	196,115	371	25,836	343	97,203
Oregon.....	377	676,449	343	302,487	347	115,950	248	14,733	168	51,581
Pennsylvania.....	1,855	2,493,798	1,713	1,516,985	1,713	581,050	1,215	69,322	997	277,970
Rhode Island.....	173	204,670	168	108,913	168	37,046	124	2,984	75	11,004
South Carolina.....	422	583,758	395	286,513	395	101,480	254	8,937	200	38,872
South Dakota.....	133	110,440	123	68,739	123	22,395	*93	*1,225	*65	*3,506
Tennessee.....	588	765,783	537	448,155	524	174,911	239	18,043	205	85,434
Texas.....	2,803	4,113,459	2,491	2,121,163	2,493	814,116	1,285	88,550	1,226	371,232
Utah.....	114	136,748	108	79,283	108	28,139	34	2,111	31	10,020
Vermont.....	62	104,509	62	65,382	62	26,915	23	4,012	21	14,576
Virginia.....	1,045	1,521,326	903	848,259	906	330,726	545	40,212	551	163,239
Washington.....	584	757,346	520	382,384	520	139,695	254	13,385	215	54,135
West Virginia.....	195	291,544	157	135,723	157	52,441	72	5,920	72	25,931
Wisconsin.....	774	993,447	737	571,447	737	212,397	463	21,720	355	90,020
Wyoming.....	91	99,263	90	56,306	90	19,663	57	1,738	57	6,788
Other areas ¹	130	163,392	101	71,332	101	27,415	24	1,078	44	11,861

¹ In general, includes returns of decedents who were citizens living abroad.

* Estimate should be used with caution because of the small number of sample estate tax returns on which it is based.

NOTE: Detail may not add to totals because of rounding.

Table 6.—Estate Tax Returns Filed for 1986 Male Decedents: Number of Returns and Gross Estate by Age and Marital Status of Decedent and by Size of Gross Estate

[All figures are estimates based on samples—money amounts are in thousands of dollars]

Marital status, size of gross estate	All decedents, total				Age of decedent			
	Gross estate		Estate tax after credits		Under 50 years			
	Gross estate		Estate tax after credits		Gross estate		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	
All decedents, total	25,962	40,819,136	9,222	2,858,417	1,288	1,949,911	334	89,915
\$500,000 under 1,000,000.....	15,287	10,608,765	4,417	219,424	737	526,019	135	5,758
\$1,000,000 or more.....	10,674	30,210,371	4,805	2,638,993	551	1,423,892	199	84,157
Married decedents, total	16,977	29,119,236	2,716	975,339	876	1,434,894	87	22,606
\$500,000 under \$1,000,000.....	9,313	6,535,768	661	24,069	471	337,731	*15	*330
\$1,000,000 or more.....	7,664	22,583,468	2,055	951,270	405	1,097,163	72	22,276
Widowed decedents, total	5,686	7,404,002	4,286	1,293,080	20	28,941	12	4,418
\$500,000 under \$1,000,000.....	3,772	2,596,577	2,483	143,910	*10	*7,597	*4	*279
\$1,000,000 or more.....	1,914	4,807,425	1,803	1,149,169	10	21,343	*8	*4,139
Single decedents, total	2,104	2,729,399	1,382	341,383	248	297,883	141	38,689
\$500,000 under \$1,000,000.....	1,409	941,031	809	32,534	170	117,214	74	3,022
\$1,000,000 or more.....	695	1,788,367	573	308,849	78	180,669	67	35,667
Other decedents, total	1,195	1,566,500	836	248,615	144	188,193	94	24,202
\$500,000 under \$1,000,000.....	794	535,389	463	18,911	85	63,476	42	2,128
\$1,000,000 or more.....	402	1,031,111	373	229,704	58	124,718	52	22,074

Marital status, size of gross estate	Age of decedent (continued)							
	50 to 59 years				60 to 69 years			
	Gross estate		Estate tax after credits		Gross estate		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)	
All decedents, total	2,630	4,100,601	574	148,154	5,271	7,804,118	1,184	325,067
\$500,000 under \$1,000,000.....	1,471	1,046,917	267	10,516	3,057	2,159,483	523	25,353
\$1,000,000 or more.....	1,159	3,053,684	307	137,639	2,213	5,644,635	661	299,714
Married decedents, total	2,040	3,342,116	196	43,414	4,247	6,590,108	411	148,049
\$500,000 under \$1,000,000.....	1,056	757,166	48	999	2,375	1,681,932	70	3,177
\$1,000,000 or more.....	985	2,584,950	148	42,415	1,872	4,908,176	341	144,873
Widowed decedents, total	107	107,269	69	11,853	396	437,707	339	64,608
\$500,000 under \$1,000,000.....	83	55,551	45	2,285	271	198,987	216	12,969
\$1,000,000 or more.....	24	51,718	23	9,568	125	238,720	123	51,639
Single decedents, total	234	289,005	169	37,262	325	425,960	228	64,857
\$500,000 under \$1,000,000.....	166	115,667	107	4,166	199	138,927	116	5,396
\$1,000,000 or more.....	68	173,338	62	33,096	126	287,033	112	59,461
Other decedents, total	249	362,211	141	55,625	303	350,343	207	47,553
\$500,000 under \$1,000,000.....	167	118,533	67	3,065	212	139,637	120	3,811
\$1,000,000 or more.....	82	243,678	74	52,560	91	210,706	86	43,742

See note at end of table.

Table 6.—Estate Tax Returns Filed for 1986 Male Decedents: Number of Returns and Gross Estate by Age and Marital Status of Decedent, and by Size of Gross Estate—(Continued)

[All figures are estimates based on samples—money amounts are in thousands of dollars]

Marital status, size of gross estate	Age of decedent (continued)							
	70 to 79 years				80 to 89 years			
	Gross estate		Estate tax after credits		Gross estate		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
All decedents, total	7,363	12,055,497	2,338	701,224	6,886	10,994,789	3,416	1,106,331
\$500,000 under \$1,000,000.....	4,454	3,057,748	1,127	55,996	3,982	2,729,101	1,652	82,186
\$1,000,000 or more.....	2,909	8,997,749	1,211	645,227	2,905	8,265,688	1,764	1,024,146
Married decedents, total	5,274	9,571,858	856	327,962	3,602	6,484,167	911	325,740
\$500,000 under \$1,000,000.....	2,972	2,065,816	211	7,356	1,877	1,310,569	209	7,739
\$1,000,000 or more.....	2,302	7,506,042	645	320,606	1,725	5,173,598	702	318,001
Widowed decedents, total	1,294	1,518,064	951	253,457	2,507	3,383,796	1,947	627,855
\$500,000 under \$1,000,000.....	891	606,629	558	34,737	1,616	1,104,588	1,121	60,617
\$1,000,000 or more.....	403	909,435	393	218,720	890	2,279,208	826	567,238
Single decedents, total	499	658,248	303	77,468	610	832,382	429	88,442
\$500,000 under \$1,000,000.....	366	239,702	196	8,216	396	251,904	262	9,792
\$1,000,000 or more.....	133	418,546	108	69,253	215	580,478	166	78,650
Other decedents, total	296	307,327	227	42,336	167	294,443	130	64,295
\$500,000 under \$1,000,000.....	225	143,601	162	5,688	**	**	**	**
\$1,000,000 or more.....	71	163,726	65	36,648	**	**	**	**

Marital status, size of gross estate	Age of decedent (continued)			
	90 years and over or unknown			
	Gross estate		Estate tax after credits	
	Number	Amount	Number	Amount
	(25)	(26)	(27)	(28)
All decedents, total	2,524	3,914,220	1,374	487,725
\$500,000 under \$1,000,000.....	1,586	1,089,498	713	39,616
\$1,000,000 or more.....	937	2,824,722	661	448,110
Married decedents, total	937	1,696,092	256	107,567
\$500,000 under \$1,000,000.....	561	382,553	*108	*4,469
\$1,000,000 or more.....	376	1,313,539	148	103,098
Widowed decedents, total	1,362	1,928,225	968	330,890
\$500,000 under \$1,000,000.....	901	621,225	539	33,024
\$1,000,000 or more.....	461	1,307,000	430	297,866
Single decedents, total	187	225,921	112	34,664
\$500,000 under \$1,000,000.....	112	77,617	*54	*1,941
\$1,000,000 or more.....	75	148,303	59	32,723
Other decedents, total	38	63,982	38	14,604
\$500,000 under \$1,000,000.....	**	**	**	**
\$1,000,000 or more.....	**	**	**	**

NOTE: Detail may not add to totals because of rounding.

* Estimate should be used with caution because of the small number of sample estate tax returns on which it is based.

** Data combined to avoid disclosure of information for specific estate tax returns.

Table 7.—Estate Tax Returns Filed for 1986 Female Decedents: Number of Returns and Gross Estate by Age and Marital Status of Decedent and by Size of Gross Estate

[All figures are estimates based on samples—money amounts are in thousands of dollars]

Marital status, size of gross estate	All decedents, total				Age of decedent			
	Gross estate		Estate tax after credits		Under 50 years			
	Number	Amount	Number	Amount	Gross estate		Estate tax after credits	
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
All decedents, total	19,833	25,199,655	12,739	3,462,650	294	388,817	108	21,419
\$500,000 under \$1,000,000	13,248	9,152,182	7,633	398,155	164	112,542	46	2,070
\$1,000,000 or more	6,585	16,047,472	5,106	3,064,495	130	276,275	63	19,348
Married decedents, total	4,418	6,057,303	945	271,030	184	255,041	30	3,731
\$500,000 under \$1,000,000	2,818	1,979,256	396	18,616	101	69,114	10	*399
\$1,000,000 or more	1,600	4,078,048	549	252,414	83	185,927	20	-3,332
Widowed decedents, total	13,105	16,584,017	10,270	2,876,724	39	37,198	29	3,912
\$500,000 under \$1,000,000	8,835	6,065,807	6,325	340,143	24	17,028	16	740
\$1,000,000 or more	4,270	10,518,210	3,944	2,536,581	14	20,170	13	3,173
Single decedents, total	1,543	1,574,326	918	156,933	38	59,827	30	9,722
\$500,000 under \$1,000,000	1,123	773,672	591	25,574	18	12,119	*11	*603
\$1,000,000 or more	419	800,655	327	131,359	21	47,707	19	9,119
Other decedents, total	768	984,008	607	157,963	34	36,751	19	4,054
\$500,000 under \$1,000,000	472	333,448	321	13,823	21	14,280	*8	*329
\$1,000,000 or more	296	650,560	286	144,141	12	22,471	11	3,725

Marital status, size of gross estate	Age of decedent (continued)							
	50 to 59 years				60 to 69 years			
	Gross estate		Estate tax after credits		Gross estate		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)	
All decedents, total	838	1,162,794	254	60,396	2,517	2,986,746	1,211	247,682
\$500,000 under \$1,000,000	515	357,648	124	5,355	1,692	1,184,041	710	32,970
\$1,000,000 or more	323	805,146	129	55,041	825	1,802,705	501	214,711
Married decedents, total	556	844,724	56	16,605	1,136	1,537,390	181	44,068
\$500,000 under \$1,000,000	325	228,330	*15	*457	724	522,674	79	4,748
\$1,000,000 or more	231	616,394	41	16,148	413	1,014,716	102	39,320
Widowed decedents, total	165	171,514	123	22,365	1,006	1,047,110	756	149,910
\$500,000 under \$1,000,000	120	83,848	79	3,933	709	482,076	471	23,143
\$1,000,000 or more	44	87,666	43	18,432	297	565,034	285	126,768
Single decedents, total	37	38,823	20	4,837	147	129,023	96	11,634
\$500,000 under \$1,000,000	*25	*16,215	*10	*142	109	74,202	61	2,706
\$1,000,000 or more	11	22,607	10	4,695	37	54,821	35	8,928
Other decedents, total	81	107,734	58	16,589	228	273,223	178	42,069
\$500,000 under \$1,000,000	45	29,255	*21	*823	150	105,089	99	2,374
\$1,000,000 or more	36	78,479	35	15,766	79	168,135	79	39,695

See note at end of table.

Table 7.—Estate Tax Returns Filed for 1986 Female Decedents: Number of Returns and Gross Estate by Age and Marital Status of Decedent and by Size of Gross Estate—(Continued)

[All figures are estimates based on samples—money amounts are in thousands of dollars]

Marital status, size of gross estate	Age of decedent (continued)							
	70 to 79 years				80 to 89 years			
	Gross estate		Estate tax after credits		Gross estate		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
All decedents, total	5,267	6,796,599	3,189	895,750	7,425	9,230,981	5,300	1,470,281
\$500,000 under \$1,000,000	3,571	2,467,452	1,906	97,893	4,990	3,429,092	3,223	177,759
\$1,000,000 or more	1,696	4,329,147	1,283	797,857	2,436	5,801,889	2,077	1,292,522
Married decedents, total	1,609	2,125,177	392	113,816	825	1,073,640	244	75,215
\$500,000 under \$1,000,000	1,057	745,886	171	6,974	548	376,072	**	**
\$1,000,000 or more	552	1,379,291	222	106,842	277	697,568	**	**
Widowed decedents, total	3,233	4,157,153	2,475	714,296	5,832	7,365,484	4,598	1,311,695
\$500,000 under \$1,000,000	2,235	1,521,467	1,540	81,924	3,891	2,677,341	2,817	158,775
\$1,000,000 or more	998	2,635,686	935	632,372	1,940	4,688,123	1,781	1,152,921
Single decedents, total	251	272,572	178	29,135	565	544,088	295	41,834
\$500,000 under \$1,000,000	166	115,795	*108	*4,661	427	293,977	212	9,624
\$1,000,000 or more	85	156,777	70	24,474	137	250,109	83	32,210
Other decedents, total	174	241,697	143	38,502	203	247,791	163	41,537
\$500,000 under \$1,000,000	113	84,304	*88	*4,333	**	**	**	**
\$1,000,000 or more	61	157,393	55	34,169	**	**	**	**

Marital status, size of gross estate	Age of decedent (continued)			
	90 years and over or unknown			
	Gross estate		Estate tax after credits	
	Number	Amount	Number	Amount
	(25)	(26)	(27)	(28)
All decedents, total	3,493	4,633,717	2,677	767,123
\$500,000 under \$1,000,000	2,317	1,601,407	1,623	82,109
\$1,000,000 or more	1,176	3,032,310	1,054	685,014
Married decedents, total	108	221,332	42	17,595
\$500,000 under \$1,000,000	*64	*37,180	**	**
\$1,000,000 or more	44	184,152	**	**
Widowed decedents, total	2,831	3,805,578	2,289	674,545
\$500,000 under \$1,000,000	1,855	1,284,047	1,402	71,629
\$1,000,000 or more	976	2,521,531	886	602,916
Single decedents, total	505	529,896	298	59,770
\$500,000 under \$1,000,000	377	261,363	187	7,837
\$1,000,000 or more	128	268,633	110	51,934
Other decedents, total	49	76,812	49	15,212
\$500,000 under \$1,000,000	**	**	**	**
\$1,000,000 or more	**	**	**	**

NOTE: Detail may not add to totals because of rounding.

* Estimate should be used with caution because of the small number of sample estate tax returns on which it is based.

** Data combined to avoid disclosure of information for specific estate tax returns.

Estate Tax Returns, 1989-1991

by Barry W. Johnson

In 1991, there were 53,576 Federal estate tax returns filed for U.S. decedents with gross estates at or above the \$600,000 filing requirement, an 80 percent increase over the number filed at an equivalent threshold in 1982. These decedents had a combined total gross estate of \$90.9 billion, almost 94 percent more, in real terms, than their 1982 counterparts. The group of U.S. decedents with gross assets of at least \$5 million changed the most, increasing in number by 137 percent, while the gross assets grew by almost 143 percent between 1982 and 1991. Some of this growth is attributable to a tax law change which took effect in 1982, allowing an unlimited deduction from gross estate for bequests to a surviving spouse, thus potentially increasing the wealth of decedents who were widows or widowers.

Background

The Federal estate tax is a tax on the transfer of assets from a decedent's estate to its beneficiaries and is therefore levied on the estate. Beginning in 1977, the tax on yearly gifts greater than \$10,000 made by living individuals and transfers made by a decedent's estate have been combined into a single tax, with a single lifetime tax credit, known as the unified credit. Since 1987, this credit has been \$192,800, which is equivalent to the tax on \$600,000 worth of assets, creating, in effect, a filing threshold of \$600,000 [1]. Tax rates are graduated and ranged from 16 to 55 percent in 1989-1991. Relevant changes to the estate tax law are discussed in the appendix to this article.

The executor of an estate has up to 9 months after a decedent's death to file a return; a 6-month extension is available beyond that. Thus, returns filed in a particular year will include some returns filed for decedents dying in that year, but will be primarily for decedents who died in the previous year. There will also be a small number of returns for decedents who died in earlier years.

Because the returns filed in a given year represent decedents who died in many different years, the resulting data reflect different economic conditions and may be subject to different tax law environments. It is, therefore, useful to study decedents who died in the same year, by combining returns filed over a period of several years. By concentrating on a single year of death, these limitations can be overcome.

This article presents data from returns filed in 1989-1991, focusing on decedents who died in 1989 (see Data

Sources and Limitations). Data for the 1991 Filing Year are also presented to facilitate comparisons with past data [2]. When data from different filing years are being compared, all dollar values are converted to constant 1989 dollars (based on the decedent's year of death) in order to lessen the effects of inflation on the resulting trends [3].

1989 Decedents

There were an estimated 50,376 decedents who died in 1989 with gross estates at or above the \$600,000 filing requirement. They represented approximately 2.3 percent of the total U.S. decedent population [4]. Together, their gross estates totaled almost \$87.7 billion (see Figure A).

Figure A

1989 Estate Tax Decedents, Selected Items, by Sex of Decedent

[Money amounts are in millions of dollars]

Item	All decedents	Male decedents	Female decedents
	(1)	(2)	(3)
Number of returns.....	50,376	28,031	22,345
Gross estate, date-of-death.....	87,684	52,469	35,215
Allowable deductions.....	38,488	28,761	9,727
Estate tax after credits.....	9,029	4,074	4,955

NOTE: Detail may not add to totals because of rounding.

Females accounted for approximately 44 percent of the 1989 estate tax decedents and for about 40 percent of the reported gross estate. The majority, 64 percent, of them were widowed; only 24 percent were married (see Figure B). Overall, the average value of their gross estates was almost \$1.6 million, slightly higher for married decedents than for those who were widowed, and much lower, \$1.3 million, for the 8 percent who were single at death.

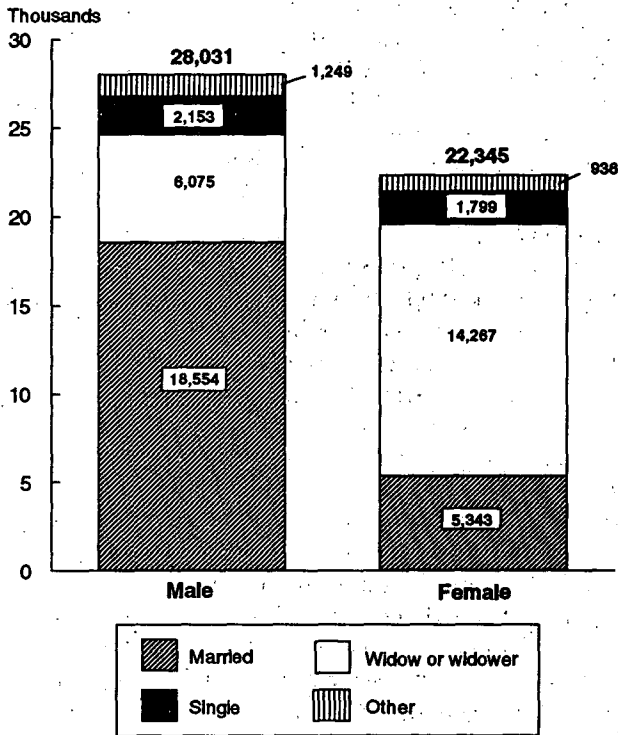
Over 66 percent of male estate tax decedents who died in 1989 were married and 22 percent were widowers. Male decedents who were married at the time of their death had an average gross estate of almost \$2.0 million, while widowers had an average estate of \$1.6 million. The average size of gross estate for those who were single was almost \$1.8 million, significantly higher than their female counterparts.

The average age at death for male decedents was 73.8 years. This was 2.0 years higher than the national average for all U.S. male decedents in 1989. For female decedents, the average age at death was 79.9 years, again higher than the national average for women, but by only 1.3 years. These results are not surprising because it is well documented that the wealthy live longer than the general

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Figure B

1989 Estate Tax Decedents, by Sex and Marital Status of Decedent



population due to factors such as safer work environments, better access to health care and better nutrition. It should also be noted that the gap between the average age of males and females for whom estate tax returns were filed, 6.1 years, was less than the 6.8 year average difference for the general population. This gap has been declining in the general population since the 1970's [5].

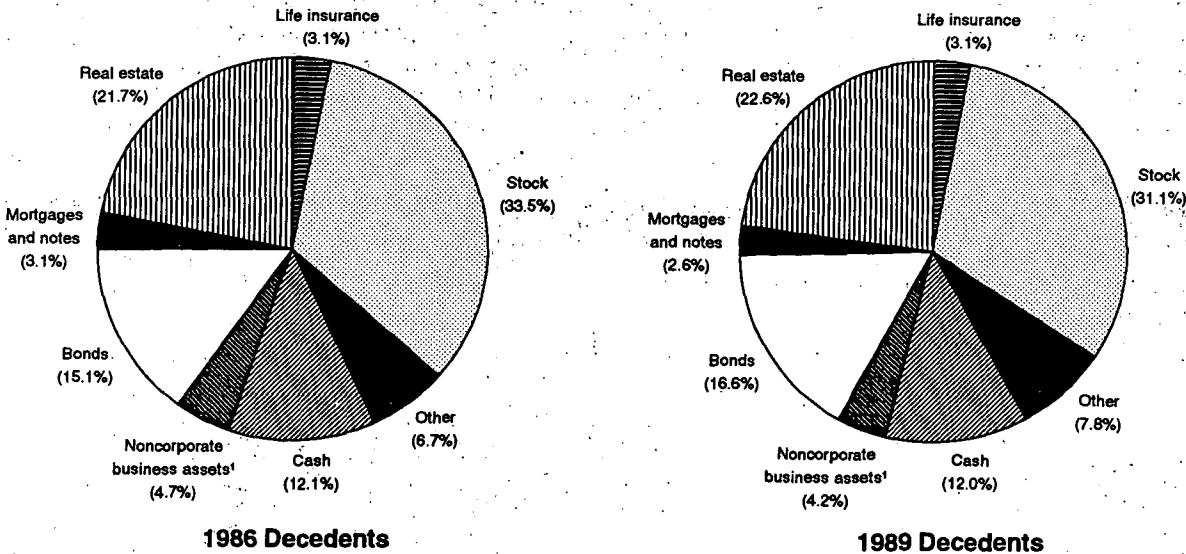
Although females made up a smaller portion of the total filers, estate tax returns filed for female decedents reported the largest estate tax liability, accounting for about 55 percent or almost \$5 billion of the total reported for all 1989 decedents. This is attributable mainly to the use of the unlimited marital deduction to postpone payment of estate taxes until the death of the second spouse. Because female decedents lived, on average, over 6 years longer than males, their estates are most often liable for the estate tax.

Assets

Overall, investments in corporate stock made up the largest share of gross estate for decedents who died in 1989, accounting for \$27.2 billion or about 31 percent (see Figure C). Of this amount, at least \$7.1 billion had been invested in closely held corporations [6]. Real estate holdings accounted for almost 23 percent of the total. Investments in corporate, foreign, and Federal or State and local Government bonds amounted to almost 17

Figure C

Composition of Gross Estate of 1986 and 1989 Decedents



¹ Includes farm assets and limited partnerships.

NOTE: All percentages are based on values converted to constant 1989 dollars.

percent of these estates; tax-exempt State and local Government bonds accounted for almost 68 percent of total bond investments. Cash was the fourth largest asset category, with a total of \$10.6 billion, which amounted to 12 percent of the total. The rest was distributed fairly evenly among the remaining categories. The category in Figure C labeled "other assets" includes well over \$1.1 billion in art investments.

A comparison of the composition of the estates of 1989 decedents with that of 1986 decedents shows little change. The percentage of assets held as corporate stock decreased from 33.5 percent to 31.1 percent, while the portions held as bonds and cash both increased. The popularity of mutual funds among investors increased notably between 1986 and 1989, with money market and bond funds experiencing the most growth [7]. This may have contributed to the increase in the percentage of assets held as cash, since money market mutual funds are included there. The increase in the relative amount held as real estate from 21.6 to 22.6 percent continues the trend observed in studies of 1982 and 1986 decedents [8].

Alternate Valuation

Federal estate tax law provides for the "alternate valuation" of an estate in the event that there is a decline in the value of the estate within 6 months of the decedent's death. If elected, the value of all assets must be reported on the tax return at both the date-of-death and alternate values. Alternate valuation must result in a net decrease in the value of the estate, even though some individual assets may actually have a higher value at the later valuation date.

Alternate valuation was elected for the estates of 4,710 decedents who died in 1989, or about 9 percent of all returns filed, lowering the value of these estates by over \$500 million (see Figure D). For estates electing alternate valuation, the value of corporate and foreign bonds

declined by about 19 percent, the largest change to any single asset category. The value of stock in closely held companies declined by about 13 percent. This is not surprising since many closely held corporations are small and much of their value is dependent on the reputation or skills of one or a few individuals, in this case, the skills of the decedent. It is notable that the alternate value of State and local Government bonds was actually higher, overall, than their value at the time of the decedent's death.

Deductions

As in the past, bequests to a surviving spouse accounted for the largest single deduction from total gross estate for 1989 decedents (see Figure E). In general, bequests made to a decedent's spouse are fully deductible from total gross estate. This deduction accounted for 79.1 percent of the total for estates with no tax liability and almost 50 percent of the deductions for taxable estates (i.e., those reporting a tax liability). The second most significant deduction was that for bequests to charities, accounting for 10.6 percent of total deductions for nontaxable estates and 22.5 percent for those reporting taxes. The category in Figure E labeled "other" includes deductions of \$242 million for funeral expenses, \$656 million for estate administration expenses and over \$1.6 billion (about 2 percent of total gross estate) for attorney and executor fees.

Charitable Bequests

Over 19 percent of all 1989 decedents made a charitable bequest. Estates with no tax liability reported a deduction for charitable bequests which was 7.3 percent of gross assets, in contrast to a deduction for charitable bequests of just 5.9 percent reported on returns showing a tax liability [9]. The fact that estates in the latter group did not elect to make a larger charitable bequest, thereby reducing their estate tax liability, suggests that tax incentives provide

Figure D

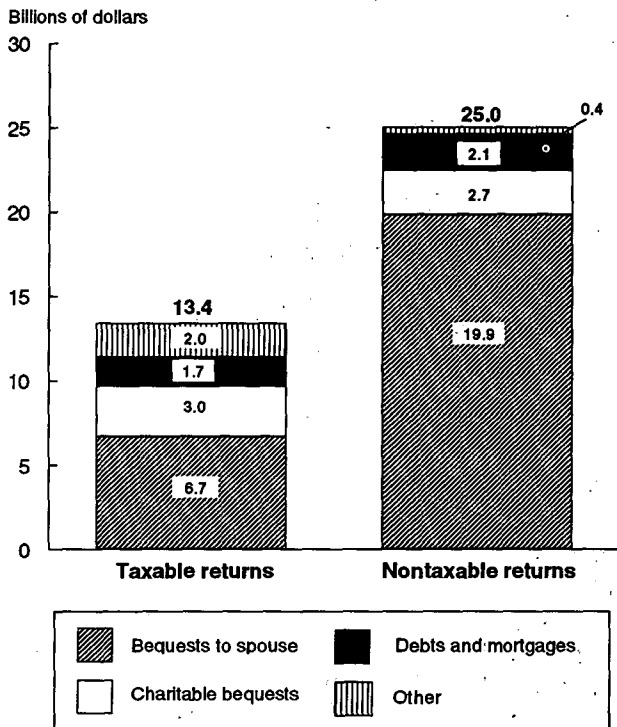
Date-of-Death and Alternate Values for Selected Assets Reported by Estates Electing Alternate Valuation, 1989 Decedents

[Money amounts are in thousands of dollars]

Selected assets	Date-of-death value	Alternate value	Percentage difference
	(1)	(2)	(3)
Total gross estate.....	11,485,203	10,973,073	-4.5
Real estate.....	1,673,619	1,600,858	-4.3
State and local Government bonds.....	1,548,988	1,563,207	0.9
Corporate and foreign bonds.....	158,667	126,521	-19.2
Closely held stock.....	1,295,785	1,128,747	-12.9
Other stock.....	3,577,951	3,358,688	-6.1
Noncorporate business assets.....	279,065	269,260	-3.5

Figure E

Deductions Claimed for 1989 Decedents, by Tax Status of Estate



only a part of the motivation for charitable giving [10].

Single decedents were the most likely to make charitable bequests; almost 55 percent of single female decedents and more than one-third of single male decedents made a bequest to charitable organizations (see Figure F). Over 29 percent of widowed females, the third most

philanthropic group, made a charitable bequest. In contrast, only about 8 percent of married male or female decedents included charities among the beneficiaries of their estates. These findings are indicative of the competition that can exist between family obligations and philanthropic goals.

Single decedents who made charitable bequests gave almost 44 percent of their net worth to charities. Single males, giving 49 percent of their net worth, were the most generous. Married decedents made the smallest bequests, giving only 11 percent of their net worth to charities. In general, male decedents gave a larger share of their net worth to charities than did females.

As a group, 1989 decedents gave almost \$5.8 billion to charities. Almost 60 percent of those making charitable gifts included religious organizations among their beneficiaries, making them the most frequently remembered group. However, the size of the individual bequests were, on average, smaller than those given to other organizations. The largest share of bequests from female decedents (nearly \$1 billion) went to organizations involved in education, medical care or scientific research (see Figure G). Male decedents favored private foundations, bequeathing them over \$1 billion. These are organizations established by the decedent or other family members which are usually involved in a variety of philanthropic activities. They are becoming increasingly popular because they afford the donor more control over the uses of gifts and often create a more lasting legacy [11].

Filing Year Data

Between 1982 and 1991, the number of estate tax returns filed for U.S. decedents with gross estates of at least \$650,000 increased by almost 81 percent [12,13]. The

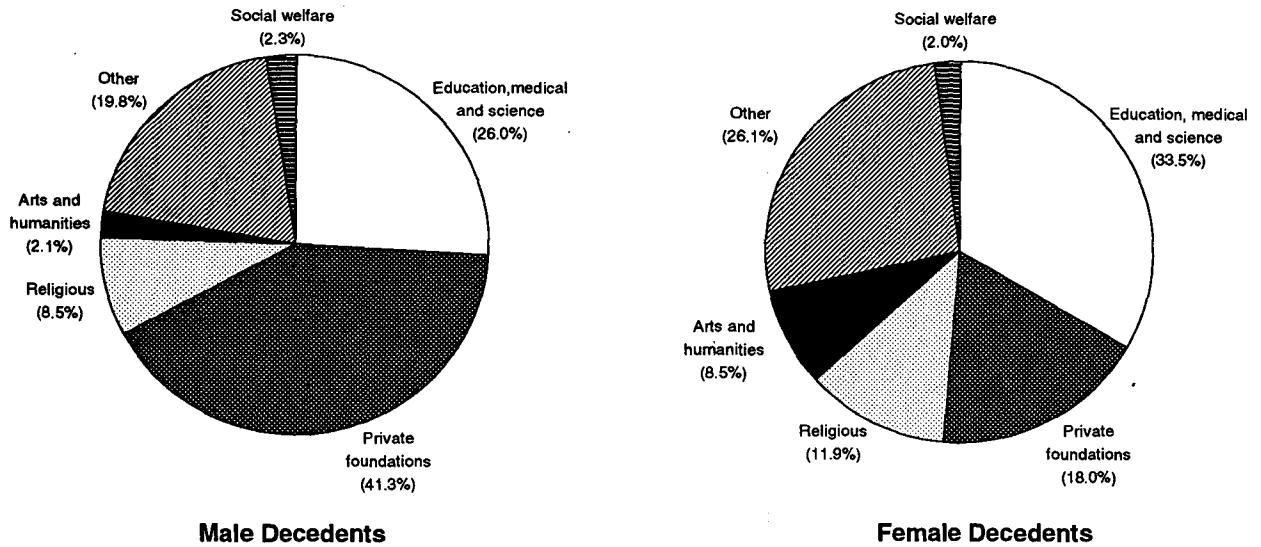
Figure F

Estates of 1989 Decedents with Net Worth of \$500,000 or More and with Charitable Bequests: Donors as a Percentage of All Decedents and Gifts as a Percentage of Net Worth, by Sex and Marital Status of Decedent

Marital status	All decedents		Male decedents		Female decedents	
	Percentage that were donors	Percentage of net worth given	Percentage that were donors	Percentage of net worth given	Percentage that were donors	Percentage of net worth given
	(1)	(2)	(3)	(4)	(5)	(6)
Total.....	19.5	23.7	14.3	22.9	25.9	24.6
Married.....	8.1	10.9	8.2	11.3	7.8	9.0
Widow or widower.....	26.9	24.6	25.1	26.0	29.1	24.1
Single.....	43.2	43.7	33.5	49.0	54.7	36.9
Other.....	21.7	32.7	18.9	36.2	25.6	29.2

Figure G

Recipients of Charitable Bequests, by Sex of 1989 Decedents



NOTE: Percentages are based on amounts of charitable bequests made by decedents

graph in Figure H shows the number of returns plotted along with gross assets, by filing year [14]. The difference in the slope of the two lines indicates that the value of assets held by this group has grown faster than the number of filers. A closer look at this increase shows that the number of filers with gross estates of less than \$5 million increased by about 80 percent between 1982 and 1991, as did the total value of the assets, meaning that most of the increase in total assets was due to the increased number of filers above this level of wealth (see Figure I). On the other hand, the number of returns filed for decedents with at least \$5 million in gross assets grew over 137 percent while the combined value of the assets increased about 143 percent over the same period.

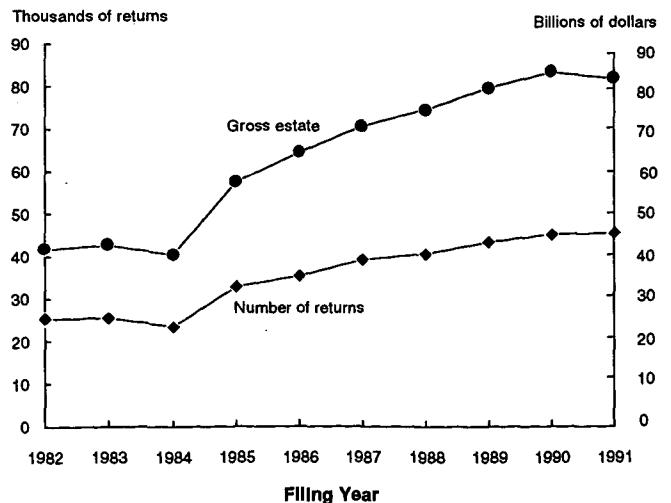
In contrast to the large increase in both the number and wealth of estate tax decedents during the period 1982-1991, the real value of tax generated by their estates rose by a more modest 30 percent (see Figure J). This relatively small change was due to several significant modifications to the estate tax law which took effect during the same period. These included the introduction of the unlimited deduction for assets left to a surviving spouse and the lowering of the top tax rate from 70 to 55 percent, and an increase in the unified credit.

Much of the growth in both the number of filers and the total wealth they held is partially attributable to the boom in both the real estate and stock markets during this

period. Another important factor may be the effect of the unlimited deduction from gross estate allowed for bequests to a surviving spouse. This law encourages a decedent spouse to leave the bulk of his or her estate to

Figure H

Number and Gross Estate for Decedents with Gross Estate of \$650,000 or More, Filing Years 1982-1991¹



¹ Gross estate is based on values converted to constant 1989 dollars.

Figure I

Estate Tax Returns Filed in 1982-1991: Number of Returns and Total Gross Estate, by Size of Gross Estate and Filing Year¹

[Numbers of returns are in thousands, money amounts are in millions of dollars]

Filing year	Total		\$650,000 under \$1,000,000		\$1,000,000 under \$5,000,000		\$5,000,000 or more	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
1982.....	25.1	41,638	12.4	9,773	11.9	20,928	0.8	10,937
1983.....	25.4	42,436	12.7	10,062	11.8	20,653	0.9	11,721
1984.....	23.3	40,303	12.2	9,713	10.1	18,483	1.0	12,107
1985.....	32.7	57,422	15.9	12,615	15.4	27,007	1.4	17,800
1986.....	35.2	64,399	16.7	13,210	17.0	32,325	1.5	18,864
1987.....	39.0	70,594	18.4	14,707	18.7	34,028	1.8	21,860
1988.....	40.5	74,502	18.2	14,560	20.7	37,151	1.7	22,792
1989.....	43.2	79,567	20.3	16,016	21.0	38,918	1.9	24,634
1990.....	45.1	83,258	21.2	16,856	21.9	39,535	2.0	26,868
1991.....	45.4	81,678	22.1	17,680	21.4	37,413	1.9	26,585
Percentage increase, 1982-1991.....	80.9	96.2	78.2	80.9	79.8	78.8	137.5	143.1

¹ Gross estate is based on values converted to constant 1989 dollars.

the surviving spouse, creating more, wealthier widows and widowers, thus increasing the number of returns subsequently filed after the death of the surviving spouse. Total assets owned by the U.S. household sector, as measured by the Federal Reserve Board's Flow of Funds accounts, grew by an inflation-adjusted 40 percent during 1982-1991. While it is not surprising that the value of assets owned by individuals at the upper end of the wealth distribution would increase at a rate higher than that of the

general population, some of the difference is certainly due to changes in bequest patterns.

Summary

Of the estimated 50,376 decedents who died in 1989 with gross assets at or above the \$600,000 filing requirement, 44 percent were female. While they owned only about 40 percent of the gross assets, their estates incurred almost 55 percent of the tax liability for all 1989 decedents. Female decedents had an average age at death of 79.9 years, 6.1 years more than that of male decedents.

Investments in corporate stock made up the largest share of gross estate for 1989 decedents, with real estate holdings accounting for the second largest share of the total. Estates of 1989 decedents held more of their assets as bonds and cash than did those of 1986 decedents. Tax-exempt State and local Government bonds accounted for the largest share of total bond holdings.

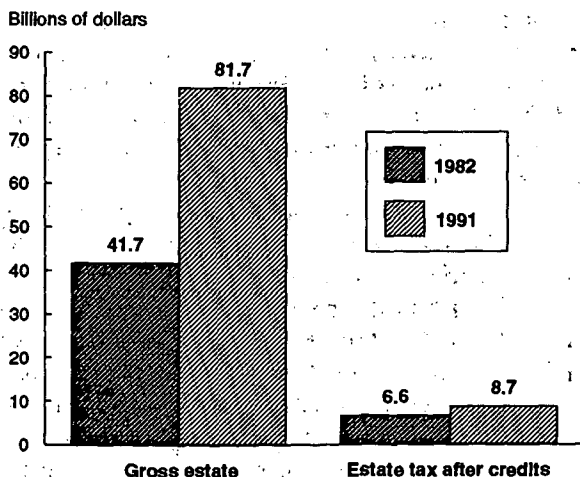
The number of estate tax returns filed for decedents with estates above a constant dollar threshold (\$650,000) increased 80 percent between 1982 and 1991. The number of estates with gross assets of \$5 million or more increased by 137 percent while the value of the assets grew by 143 percent. Because of significant revisions to the tax code, the relative amount of tax liability reported on all Federal estate tax returns increased by only 30 percent over the same period.

Data Sources and Limitations

The data presented in this article are estimates based on samples of Federal estate tax returns filed in 1989, 1990

Figure J

Gross Estate and Estate Tax After Credits for Returns Filed for Decedents with Gross Estates of \$650,000 or More, Filing Years 1982 and 1991¹



¹ Gross estate is based on values converted to constant 1989 dollars.

and 1991. These samples were limited to returns filed for decedents who died after 1981 with total gross estates of at least \$500,000. (A \$500,000 threshold was used in order to include any delinquent returns filed for decedents dying before 1987.) The sample for the 1989 Filing Year included 7,317 returns out of a total population of 48,097. In 1990, the year in which most returns for 1989 decedents were filed, 15,043 returns were sampled out of a total of 53,228. There were 6,991 returns out of 56,512 sampled during the 1991 Filing Year. Of the 26,351 returns sampled during 1989-1991, there were 17,571 returns filed for 1989 decedents.

Estate tax returns were statistically sampled while the returns were being processed for administrative purposes, but before any audit examination. Thus, returns were selected on a flow basis, using a stratified random probability sampling method, whereby the sample rates were preset based on the desired sample size and an estimate of the population. The design had three stratification variables: year of death, age at death and size of total gross estate. For the 1989-1991 Filing Years, the year of death variable was separated into two categories: 1989 year of death and non-1989 year of death. Age was disaggregated into five categories: under 40, 40 under 50, 50 under 65, 65 under 75, and 75 and older (including age unknown). Total gross estate was limited to three categories: \$500,000 under \$1 million, \$1 million under \$5 million, and \$5 million or more. Sampling rates ranged from 7 to 100 percent; returns for over half of the strata were selected at the 100 percent rate.

An examination of returns filed between 1982 and 1991 revealed that almost 99 percent of all returns for decedents who die in a given year are filed by the end of the second calendar year following the year of death. Further, the decedent's age at death and the length of time between the decedent's date of death and the filing of an estate tax return are related. It was therefore possible to predict the percentage of unfiled returns within age strata, using an ordinary least squares regression model. The sample weights were adjusted accordingly, in order to account for returns for 1989 decedents not filed by the end of the 1991 Filing Year.

Explanation of Selected Terms

Brief definitions of some of the terms used in this article are provided below:

Adjusted taxable estate.—Adjusted taxable estate was equal to the sum of taxable estate and adjusted taxable gifts.

Adjusted taxable gifts.—Certain gifts made during the life of an individual who died before 1982 were automati-

cally included in the gross estate. However, for the estate of an individual who died after 1981, these gifts were not generally included in the gross estate. Instead, they were added to the taxable estate, creating the "adjusted taxable estate" for the purposes of determining the "estate tax before credits."

Annuities.—These were investments for which a person received a fixed income for a set period of time. They include assets related to pensions or retirement, such as equity in a Keogh self-employed retirement plan or in individual retirement arrangements (IRA's).

Bequests to a surviving spouse.—This was equal to the value of property interests passing from the decedent to the surviving spouse and was taken as a deduction from the "total gross estate."

Closely held stock.—This is stock in any corporation which was not traded on a public stock exchange. It most often refers to a small corporation in which a decedent exercised a great deal of control as evidenced by a large percentage of ownership. It is shown separately because it is often difficult for executors to value such stock since it is not frequently traded and because the value of these companies is often very dependent on the personality or skills of their owners, and may change if the primary owner dies.

Estate tax after credits.—This was the tax liability of the estate remaining after subtraction of credits for State death taxes, foreign death taxes, taxes on prior transfers and Federal gift taxes previously paid. In addition, a "unified credit," graduated according to the year of death and a "credit" for gift taxes paid on post-1976 gifts, is allowed (see also "Unified credit").

Estate tax before credits.—This was the tax obtained by applying the graduated estate tax rates to the adjusted taxable estate reduced by the amount of Federal gift taxes previously paid.

Federal gift taxes previously paid.—Credit was allowed against the estate tax for the Federal gift tax paid on a gift made by a decedent before 1977. No credit, apart from the unified credit, was allowed for any gift tax paid on gifts made after 1976.

Lifetime transfers.—Included were two categories of gifts that, by law, had to be reported in total gross estate: gifts taking effect at death, and gifts of property in which the decedent retained some rights during his or her lifetime. (Lifetime transfers are shown in total as an information item in Tables 1 and 2; the types of property transferred are not shown separately, but are included instead in the property types comprising total gross estate.)

Net worth.—Net worth was equal to the total gross estate less mortgages and other debts.

Nontaxable returns.—Nontaxable returns were those with no estate tax liability after credits.

Other tax credits.—This is the sum of all tax credits (other than the unified credit) taken as a deduction from the estate tax before credits. Included are credits for State death taxes, foreign death taxes, Federal gift taxes and taxes on prior transfers.

Tax on prior transfers.—A tax credit was allowed for Federal estate tax paid on property received by the decedent or the estate from a transferor who died within 10 years before, or 2 years after, the decedent. The credit was intended to lessen the burden of double taxation between successive estates whose owners had died within a short period of time. Depending on the time that elapsed between the deaths, a credit was allowed for all or part of the Federal estate tax paid by the transferor's estate with respect to the transfer.

Taxable estate.—Taxable estate is the base to which the graduated Federal estate tax rates are applied in computing the estate tax before credits. Taxable estate is equal to the value of the "total gross estate" less deductions for the following: funeral and administrative expenses; casualty and theft losses; debts, mortgages, losses and other claims against the estate, including pledges to charitable organizations; bequests to the surviving spouse; and the "employee stock ownership plan" (ESOP) deduction (included in the statistics for "other expenses and losses").

Taxable returns.—Taxable returns were those with an amount of estate tax after credits.

Total gross estate.—An estate tax return was required in the case of every decedent whose gross estate at the time of death exceeded the legal filing requirement in effect for the year of death. For estate tax purposes, the gross estate included all property, or interests in property, before reduction by debts (except policy loans against insurance) and mortgages, or administrative expenses. Included in the gross estate were such items as real estate, tangible and intangible personal property, certain lifetime gifts made by the decedent, property in which the decedent had a general power of appointment, the decedent's interest in annuities receivable by the surviving beneficiary, the decedent's share in community property, life insurance proceeds (even though payable to beneficiaries other than the estate), dower or courtesy of the surviving spouse (inherited property) and, with certain exceptions, joint estates with right of survivorship and tenancies by the entirety. In this article, it almost always refers to the value of assets at the time of the decedent's death (see also "Total gross estate, alternate value" and "Total gross estate, tax purposes").

Total gross estate, alternate value.—All property included in the gross estate could be valued at one of two

points in time. While the value of the gross estate at the date of death determined whether an estate tax return had to be filed, the executor of the estate had the option of valuing the estate as of the date of death or 6 months thereafter. (Any property sold, exchanged or otherwise disposed of within the 6 months was valued as of the date of the disposition.)

Total gross estate, tax purposes.—This measure is used to define the valuation method used by the decedent's executor to calculate taxable estate and, ultimately, the estate tax liability, if any. If alternate valuation was elected, this will be the alternately valued amount of gross assets, otherwise, it will be the value of all assets (see "Total gross estate") at the time of the decedent's death.

Unified credit.—The unified credit, so called because it is used for both estate and gift tax purposes, is applied as a dollar-for-dollar reduction of the estate tax. (The unified credit represents the amount of tax on that part of gross estate which is below the filing requirement.) The credit must be used to offset gift taxes on lifetime transfers made after 1976. However, to the extent it is so used, the amount of credit available at death is reduced.

Notes and References

- [1] The Economic Recovery Tax Act of 1981 provided for the following increases in the Federal estate tax filing threshold and corresponding unified credit:

Year of death	Filing threshold	Unified credit
1982	\$225,000	\$ 62,800
1983	275,000	79,300
1984	325,000	96,300
1985	400,000	121,800
1986	500,000	155,800
1987 and thereafter	600,000	192,800

- [2] Data for the 1989 and 1990 Filing Years are available in the *Statistics of Income Bulletin*, Winter 1991-1992, Volume 11, Number 3, 1992.
- [3] All figures were converted to constant 1989 dollars using the implicit price deflator for gross domestic product, *Economic Report of the President, U.S. Office of Management and Budget*, 1993. Only returns with \$600,000 or more of gross estate in 1989 dollars were included.
- [4] National Center for Health Statistics, *Monthly Vital Statistics Report*, Volume 40, Number 8, Supplement 2, Washington, DC, January 7, 1992.
- [5] *Ibid.*

- [6] Untraded or closely held stock is identified from the descriptions of assets provided by executors on the Federal estate tax return. When such descriptions are too vague (or absent) to make a reasonable determination, amounts are included in the more general "other corporate stock" category. Therefore, the estimate of "closely held stock" presented in this paper should be considered extremely conservative.
- [7] Investment Company Institute, *1990 Guide to Mutual Funds*, 1990.
- [8] Johnson, Barry W., "Estate Tax Returns, 1986-1988," *Statistics of Income Bulletin*, Spring 1990, Volume 9, Number 4, 1990.
- [9] Because charitable bequests are included in deductions from gross estate, and therefore endogenous to the determination of taxable and nontaxable returns, the distinction between these groups should be viewed with caution. A generally accepted practice is to remove the deduction for charitable bequests from total deductions and then recalculate the estate tax liability in order to examine the effect of taxation on charitable giving. (See Joulfaian, David, "Charitable Bequests and Estate Taxes," paper presented at the Allied Social Science Annual Meetings, 1990.)
- [10] Johnson, Barry and Rosenfeld, Jeffrey, "Factors Affecting Charitable Giving: Inferences From Estate Tax Returns, 1986," *Statistics of Income and Related Administrative Record Research: 1990*, July 1992, pp. 55-62.
- [11] Meckstroth, Alicia, "Private Foundations and Charitable Trusts, 1989," *Statistics of Income Bulletin*, Winter 1992-1993, Volume 12, Number 3, pp. 24-62, 1993.
- [12] A constant dollar threshold of \$650,000 is used for this analysis because a constant dollar \$600,000 threshold actually falls below the current dollar filing threshold for decedent's dying in 1987 and 1988, thus providing incomplete information for those years. The slightly higher threshold eliminates this problem, giving a more accurate estimate of the changes from year to year. The threshold is applied to the "total gross estate" used for calculating Federal estate tax liability and may include the value of the estate at the time of the decedent's death, or its value 6 months later (see Explanation of Selected Terms, "Total gross estate, alternate value").
- [13] This analysis is limited to returns filed in 1982-1991 because Statistics of Income did not resume annual

studies of estate tax returns until 1982. The next most recent study was done for 1977, focusing mainly on returns filed for 1976 decedents, whose estates were subject to significantly different tax laws than those in effect for returns filed during 1982-1991.

- [14] Statistics of Income samples of estate tax returns filed in 1984 and 1985 focused primarily on decedents who died in 1982. Estimates of the general population of filers in each of these years are therefore subject to considerable sampling variability.

Appendix: Tax Law Changes Affecting 1989-1991 Estate Tax Statistics

The modern estate tax has been in effect since 1916. While the tax rates and filing requirements have changed from time to time, there have been relatively few changes in the basic structure of the estate tax since its inception. The data in this article have been affected by revisions included in the Technical and Miscellaneous Revenue Act of 1988, the Revenue Reconciliation Act of 1989, and the Revenue Reconciliation Act of 1990.

Technical and Miscellaneous Revenue Act of 1988

The Technical and Miscellaneous Revenue Act of 1988 made several important changes to existing estate tax law, including clarifying and revising rules applying to the deduction for bequests to a surviving spouse, bequests to grandchildren and transfers of interests in business enterprises to family members.

Estate Freeze Rules

An "estate freeze" occurs when a person transfers a share of property to another family member which has a disproportionately large share of the potential appreciation in an enterprise, while maintaining an interest or share in the income or rights in that enterprise. A common practice is for a parent to give the common stock in a closely held corporation to a child, while the parent retains the preferred stock. The parent would pay a gift tax for the value of the common stock (usually undervalued to minimize taxes) at the time of the transfer, while maintaining control of the company and an income for life. All future appreciation in the value of the company would increase the value of the common stock, effectively "freezing" the value of the company held by the parent at its value at the time of the transfer.

The estate freeze provisions of the 1988 Act provided that whenever such a transfer is made and any interest or share in the income or rights is retained by the transferor,

the value of the enterprise would be included in the transferor's estate. (Under prior law, the retained interest had to be disproportionately large for the freeze provisions to apply.) If the transferor was married, and chose to pass the retained interests to the surviving spouse, the freeze provisions would not apply until the death of the surviving spouse. In cases where a family member purchased the substantial interest from the transferor for "full and adequate consideration" using consideration (usually money) which was never acquired from the transferor, only a fraction of the value of the enterprise would be includible in the transferor's estate.

The 1988 Act provided several exceptions or "safe harbors" for business transactions which did not resemble retained life interests. The retention of "qualified debt" was one of these exceptions. In order to qualify, the debt must require fixed payment of principal and interest over a fixed term of not more than 15 years (30 years, if secured by real property). The debt could not grant voting rights, be convertible into an interest in the enterprise, nor be subordinated to the rights of general creditors. Similar exemptions existed when a transferor retained a debt incurred for the cash to start-up an enterprise, rights to purchase options or rights to sell or lease goods or property to the enterprise under certain conditions.

Other provisions of the Act pertaining to estate freezes provided for the treatment of later transfers, including transfer of the transferor's retained interest, as well as transfer of the original transferred property by the original transferee. In general, such events were treated as gifts, resulting in gift tax liability and adjustments to the value of the enterprise which would be includible in the transferor's estate.

Bequests of Property Interests to a Surviving Spouse

Under previous law, no marital deduction was allowed for estate interests passed to a surviving spouse unless the surviving spouse had a terminal interest in the property, i.e., control over the transfer of the property at the time of his or her death. The 1988 Act provided a marital deduction for life interests in property for which the surviving spouse had no terminal interest, as long as it was "qualified terminal interest property" (QTIP). QTIP is property in which the spouse has sole right to all income during his or her lifetime, payable at least annually, but no power to transfer the property at death. The Act permitted the marital deduction for such property because the QTIP would be included in the surviving spouse's gross estate through the QTIP election on the decedent spouse's estate tax return.

Non-Citizen Surviving Spouses

Prior to the 1988 Act, U.S. citizens and residents were allowed an unlimited deduction for the value of most property passing to a spouse, regardless of the surviving spouse's citizenship. Under the Act, transfers to a surviving spouse who is not a U.S. citizen would not qualify for the deduction, unless the property was placed in a "qualified domestic trust" (QDT) before the due date of the decedent spouse's estate tax return.

A QDT must satisfy the following requirements under the 1988 Act:

1. all trustees must be U.S. citizens or domestic corporations,
2. the surviving spouse must be entitled to all trust income and it must be payable at least annually,
3. the trust must fulfill requirements to ensure that its proceeds will be subject to U.S. estate tax upon the surviving spouse's death, and
4. the trust must be irrevocable.

Any distribution from the principal of the trust would be subject to estate tax as though the distributed assets had been included in the deceased spouse's estate. Likewise, if during the life of the surviving spouse a non-U.S. citizen or corporation became trustee of the QDT, the trust would be immediately subject to estate tax.

This section of the 1988 Act also provided for the inclusion of more than one-half of the value of any jointly held marital property in the estate of a decedent whose surviving spouse is not a U.S. citizen. Prior to this, only one-half of the value of such property was included in the gross estate of a decedent spouse, regardless of the actual amount of consideration provided by each spouse toward the purchase of the property. The 1988 Act removed this limitation when the spouse was not a U.S. citizen. In such cases, the included value would be based solely on the consideration supplied by the decedent spouse toward the original purchase of the property.

Generation Skipping Transfers

The 1986 Tax Reform Act contained a complete revision to the generation skipping transfer (GST) tax originally enacted in 1976. In a typical generation skipping transfer, a parent either places assets in an irrevocable trust, retaining an income interest in those assets, or provides for the creation of a testamentary trust at the time of his or her death. In either case, after the death of the parent, the transferor's children would be given a life income interest in the trust. After the death of the children, the income and principal of the trust would be passed to the original transferor's grandchildren. Assets originally placed in trust would be subject to gift or estate taxes at the time of

the transfer, but would not be taxable again, until the death of the grandchildren.

The GST tax provided for the imposition of a flat rate tax each time an income interest terminated, or a distribution was made from the principal of the trust, or a grandparent made a bequest to a grandchild whose parents were still living. The 1988 Act contained a number of clarifications and revisions to the generation skipping transfer (GST) tax as enacted by the 1986 Tax Reform Act. Most of these were brought about to ensure that the GST imposes a tax that is equivalent to the estate or gift tax that would have been imposed if the property were transferred outright to each successive generation.

Additional Provisions of the 1988 Act

1. Under previous law, the estate tax value of farmland could be specially valued as a farm, rather than as real estate generally. It must have been used by the decedent as a farm and must be maintained as a farm after the decedent's death. If the decedent had rented the land to a family member for farming, it would still qualify for special valuation; however, if the surviving spouse rented the land to a family member for farming after the decedent's death, it would not qualify. The 1988 Act allowed the surviving spouse to rent the farmland to a family member without violating the special use valuation provisions.

2. The 1988 Act required that the Internal Revenue Service update mortality tables and interest rates used to value annuities and interests for life or terms of years. The interest rate would be variable, based on the Federal midterm rate, and mortality tables were to be updated by December 31, 1989, and every 10 years thereafter.

3. The 1986 Tax Reform Act provided for the deduction of 50 percent of the qualified proceeds from the sale of employer securities to "employee stock ownership plans" (ESOP's) or eligible worker-owned cooperatives. The 1988 Act conformed rules governing the participation in such plans by surviving members of the decedent's family, the estate or related companies, to those applicable when a living taxpayer makes a similar sale. It also clarified the statutory period for accessing fines in the event that these rules were violated.

4. Loans of art work to charitable organizations would not be treated as transfers for gift tax purposes under the 1988 Act, provided that they were used in connection with the organization's tax-exempt function. The full value of such art would be included in the estate of its owner, even if it were on extended loan at the time of the owner's death.

Revenue Reconciliation Act of 1989

The Revenue Reconciliation Act of 1989 made relatively few changes to the estate tax law. The most significant change was the complete repeal of all provisions for a 50 percent deduction for sales of employer securities to ESOP's or worker-owned cooperatives. The only other significant changes dealt with revisions and clarifications to the 1988 rules regarding deductions for bequests to non-citizen spouses.

The 1989 Act revised the marital deduction by allowing for bequests to a non-citizen spouse through an irrevocable QDT, even in cases where the surviving spouse was only the life beneficiary of such a trust, without any terminal interests. It also provided that property passing to the surviving spouse would qualify for the marital deduction in the event that the non-citizen spouse became a U.S. citizen after the decedent's death, but before the decedent spouse's estate tax return had been filed, provided that the surviving spouse had been a U.S. resident at all times after the decedent's death. Finally, the 1989 Act permitted gifts from the decedent spouse to the non-citizen surviving spouse which had been used to purchase marital joint property to qualify as the surviving spouse's consideration in determining the value of such property to be included in the estate of the decedent spouse.

The 1989 Act included some modifications to the definition of a QDT. Only one trustee of the QDT needed to be a U.S. citizen, but that trustee would be required to approve all distributions. Not all of the income of the trust had to be paid to the surviving spouse, as long as the trust would qualify for a marital deduction if the surviving spouse had been a citizen. All deductions from gross estate (i.e., charitable bequests, debts and funeral expenses) were allowed when calculating estate tax on distributions from the QDT. In addition, distributions made due to hardship would not be subject to estate tax. Lastly, distributions made from the trust after a surviving spouse became a U.S. citizen would not be subject to tax as long as the surviving spouse had been a U.S. resident since the death of the decedent spouse.

Revenue Reconciliation Act of 1990

The Revenue Reconciliation Act of 1990 dealt mainly with modifications to existing rules regarding generation skipping transfers, deductions for bequests to non-citizen surviving spouses and estate freezes.

Estate Freeze Rules

The most significant estate tax consequence of the Revenue Reconciliation Act of 1990 was the repeal of the estate freeze legislation introduced in the Omnibus

Budget Reconciliation Act of 1987, along with all subsequent revisions. In its place, the new Act changed gift tax rules dealing with the valuation of gifts at the time of the transfer. The value of the gift was to be calculated as the value of the enterprise minus the value of the transferor's retained interest. By establishing specific rules for the valuation of the retained interest, the 1990 Act attempted to impose more control over the valuation of gifts.

Because the value of a retained interest is often based in large part on discretionary rights as to dividends, liquidation, conversion, calls or puts, these rights were given no value under the guidelines established by the 1990 Act unless they were only exercisable at specific times and for specific amounts. If such rights were unexecuted at the time of the decedent's death, their value would be included in the decedent's gross estate, even though after death they would have no value. In general, if a decedent's family owned more than 50 percent of an entity, the 1990 rules assumed that all retained interests would be exercised at their lowest possible value.

The 1990 Act did, however, provide certain exceptions to the valuation rules, as in the case where there are readily obtainable market quotes for valuing the transferred property. Similarly, if the retained interest was substantially the same as the transferred interest, the valuation rules generally did not apply.

Non-Citizen Spouses

The 1990 Act further modified the definition of a qualified domestic trust by eliminating the requirement that the U.S. citizen trustee approve all distributions from a QDT.

Instead, it gave that trustee the right to withhold the potential amount of estate tax on such a distribution. It allowed for the payment of Federal income tax on a QDT asset (such as on capital gains) from the principal of the trust without incurring additional estate tax. It also allowed foreign and State death tax credits against estate tax due on the QDT at the death of the surviving spouse, if the property for which the credit was allowed would have been part of the gross estate of a U.S. citizen. Finally, the deduction for a QDT was disallowed if the estate tax return was filed delinquent, i.e., more than 1 year after the due date (including filing extensions).

The rule for determining the value of marital joint property includible in the decedent spouse's estate was further relaxed under the 1990 Act. Any transfer from the surviving spouse which created a joint tenancy would be treated as consideration belonging to the surviving spouse, if the transfer would have constituted a gift had the donor been a U.S. citizen.

Generation Skipping Transfers

The 1990 Act also contained two minor revisions with regard to generation skipping transfer trusts. The first was to define distributions from the principle of the trust which were required by State law as nontaxable distributions, as long as such distributions were discretionary or pursuant to any to any State law substantially equivalent to the Uniform Gifts to Minors Act. The other was to require that the assets of a trust which terminate on the death of the beneficiary be includible in that person's gross estate in order for the trust to qualify as a generation skipping trust.

Table 1a.—Returns Filled in 1989: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate

[All figures are estimates based on samples—money amounts are in thousands of dollars]

Size of gross estate	Type of property										Other Federal bonds	
	Gross estate		Real estate		Closely held stock		Other stock		Federal savings bonds		Other Federal bonds	
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
All returns, total.....	45,695	77,997,246	38,921	18,538,751	5,793	5,561,423	36,819	18,975,558	6,899	363,344	13,581	2,527,240
\$600,000 under \$1,000,000.....	23,927	18,089,359	19,774	5,161,534	1,895	348,716	18,294	3,750,340	3,815	128,048	6,910	699,310
\$1,000,000 under \$2,500,000.....	16,135	23,814,138	14,103	6,210,406	2,450	935,680	13,463	5,376,600	2,421	168,823	4,750	645,244
\$2,500,000 under \$5,000,000.....	3,872	13,190,981	3,424	2,869,414	884	799,077	3,468	3,527,957	489	37,726	1,274	411,773
\$5,000,000 under \$10,000,000.....	1,170	7,969,456	1,063	1,523,416	350	813,344	1,051	2,266,766	127	11,853	403	243,151
\$10,000,000 under \$20,000,000.....	401	5,430,575	377	894,986	138	601,147	370	1,635,480	39	2,637	156	210,233
\$20,000,000 or more.....	191	9,502,738	181	1,776,994	75	2,062,828	173	2,418,415	9	18,257	87	317,529
Taxable returns, total.....	20,695	43,093,699	16,952	9,312,700	2,246	2,539,556	17,353	12,454,742	3,383	213,397	7,055	1,661,307
\$600,000 under \$1,000,000.....	8,626	6,920,534	6,672	1,797,295	419	62,919	6,726	1,749,278	1,432	53,267	2,690	270,054
\$1,000,000 under \$2,500,000.....	8,633	12,754,490	7,231	3,073,329	1,013	398,906	7,442	3,347,451	1,532	115,830	3,008	439,959
\$2,500,000 under \$5,000,000.....	2,209	7,489,663	1,980	1,598,014	478	436,035	2,051	2,412,164	269	14,722	852	288,391
\$5,000,000 under \$10,000,000.....	803	5,489,339	724	981,928	200	443,542	738	1,687,880	89	9,388	308	195,974
\$10,000,000 under \$20,000,000.....	285	3,681,051	262	517,086	86	375,091	265	1,287,530	**40	**20,180	**197	**466,930
\$20,000,000 or more.....	140	6,558,622	133	1,345,048	50	823,063	129	1,970,439	**	**	**	**
Non-taxable returns, total.....	25,000	34,903,547	21,969	9,226,051	3,548	3,021,867	19,466	6,520,816	3,516	149,947	6,526	865,933
\$600,000 under \$1,000,000.....	15,301	11,168,825	13,103	3,384,240	1,476	285,797	11,567	2,001,062	2,382	74,781	4,221	429,256
\$1,000,000 under \$2,500,000.....	7,502	11,059,648	6,871	3,137,077	1,437	536,774	6,021	2,028,149	869	52,993	1,743	205,285
\$2,500,000 under \$5,000,000.....	1,663	5,701,318	1,494	1,371,400	407	363,672	1,417	1,115,793	219	19,004	422	123,382
\$5,000,000 under \$10,000,000.....	367	2,480,117	340	541,488	150	369,802	313	578,887	38	2,465	95	47,177
\$10,000,000 under \$20,000,000.....	117	1,549,524	115	377,901	52	226,056	104	347,949	**8	**704	**46	**60,633
\$20,000,000 or more.....	50	2,944,116	47	433,946	25	1,239,766	44	447,975	**	**	**	**

Size of gross estate	Type of property—Continued											
	State and local bonds		Corporate and foreign bonds		Cash		Notes and mortgages		Life insurance		Annuities	
	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
All returns, total.....	24,082	8,469,938	14,214	1,037,760	45,299	9,114,333	14,153	2,033,209	24,695	2,563,662	14,223	2,306,623
\$600,000 under \$1,000,000.....	10,324	1,415,438	7,044	354,557	23,712	3,449,787	6,541	540,384	12,598	699,662	6,717	538,164
\$1,000,000 under \$2,500,000.....	9,731	2,776,084	5,278	287,237	16,041	3,106,623	5,235	624,964	9,175	1,034,685	5,517	1,044,622
\$2,500,000 under \$5,000,000.....	2,714	1,618,611	1,281	137,360	3,786	1,206,793	1,491	296,056	2,069	541,758	1,366	453,099
\$5,000,000 under \$10,000,000.....	853	1,100,318	390	61,284	1,161	608,267	556	229,407	677	166,056	402	152,104
\$10,000,000 under \$20,000,000.....	310	802,085	149	48,182	400	373,050	213	156,849	230	57,326	141	76,002
\$20,000,000 or more.....	150	757,402	70	149,159	190	369,812	117	185,549	116	64,165	60	45,933
Taxable returns, total.....	11,651	5,347,276	7,008	620,636	20,618	5,456,307	6,269	960,296	9,516	718,785	4,426	702,670
\$600,000 under \$1,000,000.....	3,594	547,763	2,611	129,860	8,613	1,616,917	2,271	191,063	3,913	112,973	1,570	91,910
\$1,000,000 under \$2,500,000.....	5,415	1,593,034	3,156	173,696	8,593	1,996,513	2,648	296,074	4,040	308,906	2,036	342,940
\$2,500,000 under \$5,000,000.....	1,667	999,675	791	93,555	2,190	804,784	752	85,877	909	126,753	478	128,779
\$5,000,000 under \$10,000,000.....	626	886,120	284	37,943	797	451,644	371	155,268	419	86,673	221	71,152
\$10,000,000 under \$20,000,000.....	234	688,524	111	38,216	285	299,623	140	110,280	153	28,806	82	37,577
\$20,000,000 or more.....	115	642,159	55	147,365	139	288,825	86	119,735	82	54,673	38	30,311
Taxable returns, total.....	12,431	3,122,662	7,206	417,144	24,682	3,656,025	7,885	1,072,913	15,379	1,844,877	9,797	1,607,253
\$600,000 under \$1,000,000.....	6,730	867,675	4,433	224,697	15,099	1,832,870	4,270	349,321	6,685	586,689	5,147	446,254
\$1,000,000 under \$2,500,000.....	4,316	1,193,050	2,121	113,541	7,448	326,890	2,588	326,890	5,135	725,789	3,481	701,682
\$2,500,000 under \$5,000,000.....	1,048	618,936	491	43,805	1,606	402,009	738	210,179	1,190	415,005	908	324,320
\$5,000,000 under \$10,000,000.....	226	214,197	106	23,341	363	156,623	185	74,139	258	79,382	181	80,952
\$10,000,000 under \$20,000,000.....	77	113,561	39	9,866	116	73,427	73	46,569	78	28,520	59	38,424
\$20,000,000 or more.....	35	115,243	15	1,794	50	80,987	31	65,814	34	9,492	22	15,621

Footnotes at end of table.

Table 1a.—Returns Filed in 1989: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—Continued

[All figures are estimates based on samples—money amounts are in thousands of dollars]

Size of gross estate	Type of property—Continued										Total allowable deductions				Type of deduction?	
	Noncorporate business assets		Farm assets		Limited partnerships		Other assets		Charitable bequests		Debts and mortgages		Bequests to surviving spouse		Funeral expenses	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount
All returns, total.....	7,961	2,201,687	2,911	307,601	5,688	671,131	41,405	3,321,667	45,668	35,652,798	42,382	210,301	20,788	4,925,373	20,788	25,034,779
\$600,000 under \$1,000,000.....	2,722	209,999	1,588	109,481	1,841	61,255	21,039	622,682	23,919	5,458,075	22,213	98,015	9,431	488,860	9,431	3,791,965
\$1,000,000 under \$2,500,000.....	3,269	479,434	987	64,648	1,460	159,404	14,898	869,674	16,135	10,048,758	14,860	77,439	6,279	1,055,428	6,279	7,391,786
\$2,500,000 under \$5,000,000.....	1,294	608,755	207	16,210	855	114,638	3,769	455,122	3,854	6,662,231	3,618	21,156	2,056	948,754	2,056	4,614,337
\$5,000,000 under \$10,000,000.....	414	300,444	80	22,126	334	116,587	1,120	354,353	1,170	4,157,712	1,111	8,232	660	428,671	660	3,037,322
\$10,000,000 under \$20,000,000.....	170	241,569	28	18,160	128	77,348	391	235,522	401	2,895,933	380	3,275	242	1,508,892	242	2,142,490
\$20,000,000 or more.....	91	361,487	22	76,975	72	141,919	187	754,314	180	6,528,069	180	2,163	121	1,508,892	121	4,056,879
Taxable returns, total.....	2,963	890,055	1,148	140,296	2,127	321,253	18,862	1,752,424	20,668	10,988,234	20,185	100,138	17,654	3,091,332	17,654	19,373,862
\$600,000 under \$1,000,000.....	640	41,228	452	13,987	403	12,078	7,594	230,343	8,617	470,552	8,417	36,195	474	26,304	474	35,146
\$1,000,000 under \$2,500,000.....	1,306	204,971	520	21,822	1,055	37,853	7,958	411,207	8,633	1,827,196	8,436	42,456	1,521	748,065	1,521	748,065
\$2,500,000 under \$5,000,000.....	585	189,844	85	3,333	319	50,070	2,115	257,665	2,192	1,651,750	2,146	12,000	609	236,654	609	818,969
\$5,000,000 under \$10,000,000.....	269	168,147	55	16,849	219	73,087	776	223,734	803	1,836,599	776	5,618	328	1,116,584	328	1,116,584
\$10,000,000 under \$20,000,000.....	108	120,096	19	10,850	28	28,380	282	166,760	285	1,497,628	277	2,318	128	870,819	128	870,819
\$20,000,000 or more.....	57	165,767	17	73,857	80	119,765	137	482,714	139	3,604,508	135	1,549	75	2,071,533	75	2,071,533
Non-taxable returns, total.....	4,998	1,311,631	1,763	167,304	3,561	349,879	22,542	1,569,243	25,000	24,884,564	22,196	110,163	17,654	3,091,332	17,654	19,373,862
\$600,000 under \$1,000,000.....	2,083	168,771	1,136	95,694	1,437	49,177	13,445	392,339	15,301	4,887,523	13,796	61,820	1,521	748,065	1,521	748,065
\$1,000,000 under \$2,500,000.....	1,963	274,462	467	42,827	6,941	121,551	6,941	488,467	7,502	8,122,562	7,502	34,983	609	236,654	609	818,969
\$2,500,000 under \$5,000,000.....	709	418,911	122	12,877	536	64,568	1,654	197,457	1,663	5,010,481	1,473	9,156	1,447	1,116,584	1,447	1,116,584
\$5,000,000 under \$10,000,000.....	145	132,297	25	5,277	115	43,470	345	68,762	367	1,498,305	335	856	332	1,920,798	332	1,920,798
\$10,000,000 under \$20,000,000.....	64	121,470	8	7,310	46	48,958	109	68,762	117	1,498,305	103	956	114	1,271,671	114	1,271,671
\$20,000,000 or more.....	34	195,720	5	3,118	22	22,154	49	291,600	50	2,924,581	44	634	45	1,985,546	45	1,985,546

Footnotes at end of table.

Table 1a.—Returns Filed in 1989: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—Continued
 (All figures are estimates based on samples—money amounts are in thousands of dollars)

Size of gross estate	Taxable estate		Adjusted taxable gifts		Adjusted taxable estate		Estate tax before credits	
	Number (48)	Amount (50)	Number (51)	Amount (52)	Number (53)	Amount (54)	Number (55)	Amount (56)
All returns, total.....	41,895	42,161,330	4,521	865,402	41,926	43,026,733	41,920	16,619,009
\$600,000 under \$1,000,000.....	21,721	12,684,992	1,343	128,689	21,723	12,813,682	21,721	4,150,268
\$1,000,000 under \$2,500,000.....	14,823	13,765,883	1,748	212,136	14,825	13,978,019	14,823	4,944,717
\$2,500,000 under \$5,000,000.....	3,647	6,513,859	788	181,714	3,665	6,695,573	3,665	2,777,961
\$5,000,000 under \$10,000,000.....	1,131	3,802,385	370	123,783	1,135	3,926,168	1,134	1,836,088
\$10,000,000 under \$20,000,000.....	391	2,421,774	173	75,211	393	2,486,985	392	1,263,280
\$20,000,000 or more.....	184	2,972,436	98	143,670	185	3,116,306	185	1,638,697
Taxable returns, total.....	20,695	32,018,652	3,177	731,531	20,695	32,790,183	20,695	13,366,237
\$600,000 under \$1,000,000.....	8,626	6,442,734	759	89,094	8,626	6,531,828	8,626	2,171,290
\$1,000,000 under \$2,500,000.....	6,633	10,796,973	1,269	158,871	6,633	10,955,845	6,633	3,987,210
\$2,500,000 under \$5,000,000.....	2,209	5,821,265	638	163,186	2,209	5,994,451	2,209	2,552,281
\$5,000,000 under \$10,000,000.....	803	3,636,712	295	110,616	803	3,747,328	803	1,779,297
\$10,000,000 under \$20,000,000.....	285	2,368,067	134	68,925	285	2,436,992	285	1,244,533
\$20,000,000 or more.....	140	2,952,900	82	140,839	140	3,093,740	140	1,631,626
Nontaxable returns, total.....	21,200	10,142,678	1,344	133,872	21,231	10,276,549	21,225	3,252,773
\$600,000 under \$1,000,000.....	13,095	6,242,258	585	39,595	13,097	6,281,853	13,095	1,986,978
\$1,000,000 under \$2,500,000.....	6,189	2,968,910	480	53,264	6,193	3,022,174	6,191	957,507
\$2,500,000 under \$5,000,000.....	1,436	692,594	150	18,528	1,456	711,122	1,456	225,679
\$5,000,000 under \$10,000,000.....	328	165,673	75	13,168	332	178,841	331	56,791
\$10,000,000 under \$20,000,000.....	106	53,707	39	6,286	108	59,993	107	18,747
\$20,000,000 or more.....	43	19,556	16	3,031	44	22,566	44	7,070
Allowable unified credit								
Number (57)	Amount (58)	Number (59)	Amount (60)	Number (61)	Amount (62)	Number (63)	Amount (64)	
41,920	7,184,483	24,799	1,967,669	20,695	7,466,948	10,970	12,797,378	
21,721	3,618,798	11,699	196,620	8,626	342,846	4,580	2,100,623	
14,823	2,600,559	9,365	458,327	8,633	1,885,826	4,402	3,558,071	
3,665	648,017	2,416	348,885	2,209	1,781,057	1,272	2,549,320	
1,134	209,813	688	288,795	803	1,327,479	428	1,457,521	
392	73,313	305	262,909	285	927,058	190	1,297,390	
185	33,984	145	402,132	140	1,202,581	97	1,634,452	
20,695	3,979,789	20,187	1,919,590	20,695	7,466,948	5,887	7,773,432	
8,626	1,659,849	8,316	169,591	8,626	342,846	1,772	853,027	
6,633	1,659,191	8,501	442,189	8,633	1,885,826	2,631	2,089,520	
2,209	495,589	2,156	345,654	2,209	1,781,057	752	1,335,693	
803	154,359	794	297,458	803	1,327,479	315	1,101,451	
285	54,632	281	262,643	285	927,058	138	938,239	
140	26,990	139	402,055	140	1,202,581	79	1,455,501	
21,225	3,204,694	4,611	49,079	-	-	5,283	5,023,947	
13,095	1,959,949	3,383	27,030	-	-	2,908	1,247,596	
6,191	941,368	864	16,139	-	-	1,771	1,468,552	
1,456	222,448	260	3,231	-	-	520	1,213,627	
331	55,453	74	1,337	-	-	113	356,070	
107	18,481	24	266	-	-	52	359,151	
44	6,984	6	76	-	-	18	379,951	
Size of gross estate								
Number (57)	Amount (58)	Number (59)	Amount (60)	Number (61)	Amount (62)	Number (63)	Amount (64)	
41,920	7,184,483	24,799	1,967,669	20,695	7,466,948	10,970	12,797,378	
21,721	3,618,798	11,699	196,620	8,626	342,846	4,580	2,100,623	
14,823	2,600,559	9,365	458,327	8,633	1,885,826	4,402	3,558,071	
3,665	648,017	2,416	348,885	2,209	1,781,057	1,272	2,549,320	
1,134	209,813	688	288,795	803	1,327,479	428	1,457,521	
392	73,313	305	262,909	285	927,058	190	1,297,390	
185	33,984	145	402,132	140	1,202,581	97	1,634,452	
20,695	3,979,789	20,187	1,919,590	20,695	7,466,948	5,887	7,773,432	
8,626	1,659,849	8,316	169,591	8,626	342,846	1,772	853,027	
6,633	1,659,191	8,501	442,189	8,633	1,885,826	2,631	2,089,520	
2,209	495,589	2,156	345,654	2,209	1,781,057	752	1,335,693	
803	154,359	794	297,458	803	1,327,479	315	1,101,451	
285	54,632	281	262,643	285	927,058	138	938,239	
140	26,990	139	402,055	140	1,202,581	79	1,455,501	
21,225	3,204,694	4,611	49,079	-	-	5,283	5,023,947	
13,095	1,959,949	3,383	27,030	-	-	2,908	1,247,596	
6,191	941,368	864	16,139	-	-	1,771	1,468,552	
1,456	222,448	260	3,231	-	-	520	1,213,627	
331	55,453	74	1,337	-	-	113	356,070	
107	18,481	24	266	-	-	52	359,151	
44	6,984	6	76	-	-	18	379,951	

¹ Excludes ESOP (Employee Stock Ownership Plan) deductions, but may include some amounts which were disallowed for the purpose of tax computations.

² Data combined to avoid disclosure of specific estate tax returns.

Note: Detail may not add to totals because of rounding.

Table originally appeared in the *SOI Bulletin*, Winter 1991-1992.

Table 1b.—Returns Filed in 1990: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate

[All figures are estimates based on samples—money amounts are in thousands of dollars]

Size of gross estate	Type of property											
	Gross estate		Real estate		Closely held stock		Other stock		Federal savings bonds		Other Federal bonds	
	Number of returns (1)	Amount (2)	Number (3)	Amount (4)	Number (5)	Amount (6)	Number (7)	Amount (8)	Number (9)	Amount (10)	Number (11)	Amount (12)
All returns, total	50,367	87,116,955	42,592	19,698,740	6,708	7,119,144	40,488	20,267,663	9,077	399,066	16,373	3,306,705
\$600,000 under \$1,000,000	26,095	19,912,482	21,594	5,644,519	1,991	395,647	20,090	3,673,528	4,592	213,718	8,113	818,104
\$1,000,000 under \$2,500,000	18,476	27,213,554	15,919	7,082,169	2,981	1,159,655	15,319	6,057,493	2,827	140,880	6,069	928,748
\$2,500,000 under \$5,000,000	3,768	12,835,879	3,241	2,660,954	1,016	954,980	3,230	3,504,513	441	23,964	1,333	463,457
\$5,000,000 under \$10,000,000	1,343	9,035,820	1,211	1,799,936	444	845,879	1,216	2,448,840	156	9,821	536	340,874
\$10,000,000 under \$20,000,000	441	5,980,490	402	1,102,190	157	671,261	404	1,757,281	38	8,222	199	288,338
\$20,000,000 or more	244	12,138,730	225	1,408,972	119	3,050,723	229	2,826,008	22	1,470	123	467,124
Taxable returns, total	23,104	50,976,708	18,375	9,380,774	2,318	4,635,583	19,529	13,925,697	3,758	205,972	8,649	2,263,356
\$600,000 under \$1,000,000	9,616	7,780,755	7,225	1,887,698	354	61,153	7,803	1,812,918	1,636	74,525	3,409	400,703
\$1,000,000 under \$2,500,000	9,824	14,564,484	8,033	3,449,452	1,065	441,389	8,469	3,661,389	1,682	100,289	3,709	612,243
\$2,500,000 under \$5,000,000	2,239	7,703,495	1,845	1,306,096	455	473,264	1,943	2,432,729	279	15,365	874	325,542
\$5,000,000 under \$10,000,000	902	6,100,619	801	1,096,113	252	480,200	825	1,857,822	120	7,461	395	277,927
\$10,000,000 under \$20,000,000	323	4,425,018	291	695,570	99	407,065	299	1,471,560	25	7,174	159	228,800
\$20,000,000 or more	199	10,402,337	181	945,846	94	2,772,511	190	2,488,279	16	1,158	104	420,142
Nontaxable returns, total	27,263	36,140,247	24,217	10,317,966	4,390	2,482,561	20,958	6,341,967	4,319	192,114	7,724	1,043,349
\$600,000 under \$1,000,000	16,479	12,131,727	14,369	3,756,822	1,637	334,494	12,288	1,860,611	2,956	139,194	4,705	417,402
\$1,000,000 under \$2,500,000	8,652	12,649,070	7,886	3,632,717	1,917	718,265	6,850	2,196,104	1,145	40,601	2,360	316,505
\$2,500,000 under \$5,000,000	1,529	5,132,384	1,396	1,354,859	561	481,715	1,287	1,071,794	162	8,599	459	137,915
\$5,000,000 under \$10,000,000	440	2,935,201	410	703,823	192	365,679	390	591,018	36	2,360	141	62,947
\$10,000,000 under \$20,000,000	118	1,555,472	111	406,621	105	285,721	105	285,721	13	1,048	40	61,597
\$20,000,000 or more	45	1,736,392	44	463,125	25	318,212	39	336,729	6	312	19	46,982

Size of gross estate	Type of property—Continued											
	State and local bonds		Corporate and foreign bonds		Cash		Notes and mortgages		Life insurance		Annuities	
	Number (13)	Amount (14)	Number (15)	Amount (16)	Number (17)	Amount (18)	Number (19)	Amount (20)	Number (21)	Amount (22)	Number (23)	Amount (24)
All returns, total	26,943	9,732,588	16,651	933,095	49,797	10,704,741	14,729	2,227,839	26,971	2,712,197	16,942	2,645,283
\$600,000 under \$1,000,000	11,675	1,704,511	8,109	304,355	25,813	4,068,984	6,421	494,636	13,445	806,819	8,196	732,691
\$1,000,000 under \$2,500,000	11,101	3,083,617	6,391	305,558	18,224	3,632,085	5,868	719,918	10,241	1,165,703	6,600	1,187,437
\$2,500,000 under \$5,000,000	2,637	1,797,087	1,348	78,369	3,742	1,210,624	1,445	313,231	2,113	408,509	1,394	373,149
\$5,000,000 under \$10,000,000	1,001	1,221,351	524	83,145	1,333	720,337	605	237,622	777	188,044	487	213,455
\$10,000,000 under \$20,000,000	340	763,193	165	44,748	440	410,521	232	124,631	240	59,845	163	85,718
\$20,000,000 or more	189	1,162,828	115	116,910	244	662,191	158	337,800	155	83,276	91	52,814
Taxable returns, total	13,722	6,348,891	8,673	584,934	22,954	6,436,239	6,776	1,263,092	9,895	744,246	5,351	813,732
\$600,000 under \$1,000,000	4,480	705,840	3,378	130,202	9,541	1,836,701	2,270	209,009	3,779	144,652	2,032	170,480
\$1,000,000 under \$2,500,000	6,418	1,862,355	3,818	207,293	9,766	2,316,610	2,980	353,850	4,288	291,852	2,322	309,988
\$2,500,000 under \$5,000,000	1,683	1,121,199	882	51,894	2,229	844,569	841	131,250	1,081	148,444	557	148,444
\$5,000,000 under \$10,000,000	718	909,008	378	54,602	897	535,558	389	148,493	472	83,507	266	102,044
\$10,000,000 under \$20,000,000	262	617,566	123	30,987	322	325,709	171	72,562	158	39,806	104	43,114
\$20,000,000 or more	160	1,041,922	95	109,956	199	577,092	125	282,946	117	53,179	70	39,652
Nontaxable returns, total	13,221	3,383,697	7,978	348,150	26,843	4,268,502	7,953	964,747	17,077	1,967,951	11,591	1,831,531
\$600,000 under \$1,000,000	7,194	998,671	4,731	174,153	16,272	2,232,283	4,151	285,627	9,666	662,167	6,164	562,201
\$1,000,000 under \$2,500,000	4,684	1,221,262	2,573	98,264	8,558	1,315,475	2,888	366,068	5,953	873,851	4,278	877,449
\$2,500,000 under \$5,000,000	954	584,888	466	26,475	1,514	366,055	604	117,000	1,031	277,259	837	224,705
\$5,000,000 under \$10,000,000	283	312,343	146	28,543	436	184,778	217	88,129	306	104,537	232	111,411
\$10,000,000 under \$20,000,000	78	145,627	42	13,761	118	52,069	61	52,069	82	20,039	59	42,604
\$20,000,000 or more	29	120,906	20	6,953	45	85,099	33	54,854	38	30,097	21	13,161

Footnotes at end of table.

Table 1b.—Returns Filed In 1990: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—Continued

[All figures are estimates based on samples—money amounts are in thousands of dollars]

Size of gross estate	Type of property—Continued										Total allowable deductions			Type of deduction ¹	
	Noncorporate business assets		Farm assets		Limited partnerships		Other assets		Total allowable deductions		Funeral expenses		Bequests to surviving spouse		
	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount	
All returns, total.....	9,552	2,479,436	3,754	238,630	6,487	824,867	45,621	3,828,974	50,333	36,915,108	46,508	250,215	(35)	(36)	
\$600,000 under \$1,000,000.....	2,814	258,668	1,215	88,836	2,101	67,586	22,944	639,880	26,067	5,939,531	24,046	119,499			
\$1,000,000 under \$2,500,000.....	3,706	610,366	1,212	88,830	2,798	174,205	17,088	877,381	18,471	11,165,830	17,088	91,482			
\$2,500,000 under \$5,000,000.....	1,191	401,518	239	20,867	897	175,272	3,608	449,384	3,768	7,004,082	3,469	22,228			
\$5,000,000 under \$10,000,000.....	511	380,577	91	22,298	432	156,642	1,301	367,000	1,343	4,644,211	1,262	10,462			
\$10,000,000 under \$20,000,000.....	193	254,871	38	6,154	163	109,834	429	293,623	440	3,282,242	414	3,835			
\$20,000,000 or more.....	137	573,437	24	12,145	97	141,328	241	1,201,705	244	6,879,213	228	2,708			
Taxable returns, total.....	3,289	1,262,482	1,480	72,965	2,725	434,336	20,926	2,604,409	23,071	13,143,237	22,472	119,334			
\$600,000 under \$1,000,000.....	758	98,900	634	15,126	608	22,117	8,236	210,723	9,589	554,840	9,335	45,316			
\$1,000,000 under \$2,500,000.....	1,413	204,694	601	25,546	1,229	75,082	9,120	452,450	9,819	1,980,042	9,563	48,736			
\$2,500,000 under \$5,000,000.....	567	157,021	144	12,460	438	104,173	2,173	292,257	2,239	1,771,454	2,174	13,189			
\$5,000,000 under \$10,000,000.....	311	212,283	59	10,476	260	68,384	883	266,741	902	1,968,228	879	6,889			
\$10,000,000 under \$20,000,000.....	134	185,612	27	6,688	112	63,405	317	234,400	322	1,768,772	312	2,862			
\$20,000,000 or more.....	106	403,972	15	5,669	78	101,176	197	1,157,857	199	5,159,902	190	2,332			
Non-taxable returns, total.....	5,263	1,216,954	2,274	165,664	3,762	390,531	24,695	1,224,565	27,262	25,771,872	24,035	130,880			
\$600,000 under \$1,000,000.....	2,056	159,768	1,517	73,710	1,492	45,469	14,708	142,581	16,478	5,384,682	14,711	74,183			
\$1,000,000 under \$2,500,000.....	2,292	405,672	610	62,784	1,569	99,123	7,978	424,931	8,652	9,185,787	7,506	42,746			
\$2,500,000 under \$5,000,000.....	624	244,497	95	8,407	459	71,099	1,435	157,127	1,529	5,232,628	1,285	9,039			
\$5,000,000 under \$10,000,000.....	201	168,294	33	11,822	171	88,258	418	110,259	440	2,735,984	383	3,563			
\$10,000,000 under \$20,000,000.....	59	69,259	11	2,496	51	46,430	112	59,223	118	1,513,470	102	974			
\$20,000,000 or more.....	31	169,465	9	6,476	19	40,152	44	43,868	45	1,718,311	38	376			
Size of gross estate	Type of deduction—Continued														
	Executors' commissions		Attorneys' fees		Other expenses and losses		Debts and mortgages		Charitable bequests		Bequests to surviving spouse				
	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount			
All returns, total.....	19,967	843,968	31,171	745,675	36,181	630,633	41,559	4,594,363	9,709	5,527,490	22,651	26,314,839			
\$600,000 under \$1,000,000.....	8,472	143,571	15,757	199,104	18,471	120,239	20,616	617,138	4,316	7,155,525	10,317	4,024,478			
\$1,000,000 under \$2,500,000.....	7,566	258,435	11,510	260,394	13,314	186,716	15,713	1,239,028	3,600	1,044,597	9,168	8,065,189			
\$2,500,000 under \$5,000,000.....	1,795	135,003	2,467	112,597	2,781	89,581	3,346	1,407,375	1,082	686,508	2,039	4,545,639			
\$5,000,000 under \$10,000,000.....	727	101,393	944	75,087	1,058	73,312	1,234	450,370	433	551,500	735	3,379,332			
\$10,000,000 under \$20,000,000.....	247	59,085	307	40,242	349	57,875	414	310,912	163	467,400	250	2,342,852			
\$20,000,000 or more.....	159	146,481	186	58,261	207	102,911	236	569,542	115	2,061,959	141	3,887,349			
Taxable returns, total.....	14,823	739,233	20,345	581,626	22,117	528,586	20,934	1,665,798	5,595	2,991,022	3,105	6,510,347			
\$600,000 under \$1,000,000.....	5,307	96,647	8,950	116,097	9,090	71,334	8,322	124,496	1,849	50,097	505	50,852			
\$1,000,000 under \$2,500,000.....	6,663	232,629	8,755	213,059	9,540	155,549	9,099	444,478	2,336	206,805	1,397	678,782			
\$2,500,000 under \$5,000,000.....	1,631	124,889	2,012	94,330	2,148	80,212	2,136	276,357	833	323,963	628	853,384			
\$5,000,000 under \$10,000,000.....	650	91,576	791	65,833	854	66,874	874	280,542	337	278,082	331	1,135,306			
\$10,000,000 under \$20,000,000.....	226	55,233	269	36,891	298	55,267	310	170,634	136	335,945	144	1,111,870			
\$20,000,000 or more.....	147	139,259	169	55,415	186	99,320	192	389,291	104	1,795,130	100	2,680,154			
Non-taxable returns, total.....	4,344	104,735	10,826	164,049	14,064	102,048	20,625	2,928,566	4,114	2,536,468	19,546	19,804,492			
\$600,000 under \$1,000,000.....	3,165	46,923	7,407	83,007	9,382	48,905	12,294	492,642	2,467	665,428	9,813	3,973,627			
\$1,000,000 under \$2,500,000.....	904	25,806	2,756	47,335	3,774	31,167	6,614	794,548	1,264	837,793	7,771	7,406,407			
\$2,500,000 under \$5,000,000.....	165	10,115	455	18,257	632	9,369	1,209	1,131,018	249	362,545	1,411	3,682,255			
\$5,000,000 under \$10,000,000.....	77	9,817	153	9,254	204	6,438	360	188,828	96	272,418	404	2,244,026			
\$10,000,000 under \$20,000,000.....	21	3,852	38	3,351	51	2,578	104	140,278	27	131,455	106	1,230,982			
\$20,000,000 or more.....	12	8,222	17	2,846	21	3,591	44	180,252	11	266,828	41	1,257,195			

Footnotes at end of table.

Table 1b.—Returns Filed in 1990: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax, and Tax Credits, by Size of Gross Estate—Continued

[All figures are estimates based on samples—money amounts are in thousands of dollars]

Size of gross estate	Taxable estate		Adjusted taxable gifts		Adjusted taxable estate		Estate tax before credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
All returns, total.....	46,464	48,586,417	4,855	1,152,548	46,516	49,718,965	46,469	19,463,342
\$600,000 under \$1,000,000.....	23,864	13,949,734	1,331	139,191	23,879	14,088,925	23,854	4,576,557
\$1,000,000 under \$2,500,000.....	17,082	15,975,881	1,817	270,221	17,103	16,246,102	17,084	5,749,661
\$2,500,000 under \$5,000,000.....	3,546	6,555,621	866	248,635	3,553	6,804,255	3,553	2,624,921
\$5,000,000 under \$10,000,000.....	1,303	4,329,719	488	143,967	1,306	4,473,887	1,306	2,080,640
\$10,000,000 under \$20,000,000.....	428	2,679,910	235	150,591	434	2,830,501	432	1,416,589
\$20,000,000 or more.....	240	5,075,582	139	199,943	240	5,275,495	240	2,804,975
Taxable returns, total.....	23,104	37,329,561	3,542	1,018,676	23,104	38,348,237	23,104	15,862,549
\$600,000 under \$1,000,000.....	9,616	7,188,240	890	115,094	9,616	7,303,334	9,616	2,429,488
\$1,000,000 under \$2,500,000.....	9,824	12,459,315	1,315	219,360	9,824	12,678,676	9,824	4,619,421
\$2,500,000 under \$5,000,000.....	2,239	5,874,866	633	218,476	2,239	6,093,342	2,239	2,597,687
\$5,000,000 under \$10,000,000.....	902	4,121,283	382	130,458	902	4,297,721	902	2,019,614
\$10,000,000 under \$20,000,000.....	323	2,628,995	196	136,469	323	2,767,464	323	1,397,645
\$20,000,000 or more.....	199	5,056,881	127	196,819	199	5,253,700	199	2,786,514
Non-taxable returns, total.....	23,361	11,236,856	1,313	133,872	23,412	11,370,729	23,365	3,600,793
\$600,000 under \$1,000,000.....	14,248	6,761,484	441	24,097	14,263	6,785,581	14,238	2,147,088
\$1,000,000 under \$2,500,000.....	7,258	3,516,566	502	60,861	7,279	3,567,428	7,260	1,130,240
\$2,500,000 under \$5,000,000.....	1,307	680,755	233	30,159	1,314	710,914	1,314	227,234
\$5,000,000 under \$10,000,000.....	400	208,456	86	13,510	404	221,966	404	70,827
\$10,000,000 under \$20,000,000.....	105	50,915	39	12,123	111	63,037	109	18,943
\$20,000,000 or more.....	41	18,671	12	3,124	41	21,795	41	6,461
Size of gross estate	Number	Amount	Number	Amount	Number	Amount	Number	Amount
Allowable unified credit	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
All returns, total.....	46,469	7,989,898	27,334	2,474,982	23,104	8,998,645	14,780,577	14,780,577
\$600,000 under \$1,000,000.....	23,855	3,964,413	12,648	220,624	9,616	3,917,710	5,167	2,426,771
\$1,000,000 under \$2,500,000.....	17,084	3,003,878	10,672	528,330	9,824	2,217,948	4,492	3,841,160
\$2,500,000 under \$5,000,000.....	3,553	653,606	2,501	368,321	2,239	1,802,983	1,174	2,057,205
\$5,000,000 under \$10,000,000.....	1,305	243,237	989	337,137	902	1,510,266	501	1,768,824
\$10,000,000 under \$20,000,000.....	432	80,574	341	292,468	323	1,043,547	204	1,434,614
\$20,000,000 or more.....	240	44,691	204	728,102	199	2,032,183	137	3,110,004
Taxable returns, total.....	23,103	4,447,366	22,372	2,416,527	23,104	8,998,645	5,756	9,557,788
\$600,000 under \$1,000,000.....	9,616	1,849,839	9,118	187,915	9,616	3,917,710	1,889	1,047,676
\$1,000,000 under \$2,500,000.....	9,824	1,892,485	9,632	508,983	9,824	2,217,948	2,382	2,161,152
\$2,500,000 under \$5,000,000.....	2,239	430,967	2,210	363,726	2,239	1,802,983	788	1,326,204
\$5,000,000 under \$10,000,000.....	901	173,535	893	336,012	902	1,510,266	337	1,199,980
\$10,000,000 under \$20,000,000.....	323	62,208	322	291,891	323	1,043,547	161	1,137,813
\$20,000,000 or more.....	199	38,331	196	728,000	199	2,032,183	118	2,684,954
Non-taxable returns, total.....	23,366	3,542,532	4,962	58,455	5,918	5,180,789	5,180,789	5,180,789
\$600,000 under \$1,000,000.....	14,239	2,114,574	3,529	32,709	3,187	1,378,095	1,378,095	1,378,095
\$1,000,000 under \$2,500,000.....	7,260	1,110,883	1,040	19,346	2,109	1,780,008	1,780,008	1,780,008
\$2,500,000 under \$5,000,000.....	1,314	222,639	291	4,595	386	731,001	731,001	731,001
\$5,000,000 under \$10,000,000.....	404	69,701	76	1,125	164	568,834	568,834	568,834
\$10,000,000 under \$20,000,000.....	109	18,366	19	577	43	296,801	296,801	296,801
\$20,000,000 or more.....	41	6,359	8	102	19	425,050	425,050	425,050

1. Excludes ESOP (Employee Stock Ownership Plan) deductions, but may include some amounts which were disallowed for the purpose of tax computations.
 Notes: Detail may not add to totals because of rounding.
 Table originally appeared in the SOI Bulletin, Winter 1991-1992.

Table 1c.—Estate Tax Returns Filed in 1991: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax and Tax Credits, by Size of Gross Estate¹

[All figures are estimates based on samples — money amounts are in thousands of dollars]

Size of gross estate	Number of returns	Gross estate, date-of-death	Real estate		Closely held stock		Other stock	
			Number	Amount	Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
All returns, total.....	53,576	90,934,303	45,642	19,934,381	8,530	6,516,816	41,997	20,570,884
\$600,000 under \$1,000,000.....	28,292	21,791,811	23,690	6,016,655	2,978	565,892	21,190	3,656,104
\$1,000,000 under \$2,500,000.....	19,795	28,950,841	17,059	7,417,310	3,749	1,249,328	15,934	5,896,960
\$2,500,000 under \$5,000,000.....	3,438	11,656,955	2,978	2,324,188	992	857,909	3,020	2,777,316
\$5,000,000 under \$10,000,000.....	1,321	8,918,158	1,225	1,726,003	489	982,569	1,180	2,224,754
\$10,000,000 under \$20,000,000.....	472	6,436,469	447	1,119,159	188	730,697	429	1,785,254
\$20,000,000 or more.....	259	13,180,070	243	1,331,066	134	2,130,421	243	4,230,495
Taxable returns, total.....	24,781	53,356,699	19,963	9,873,021	2,889	3,706,777	20,334	14,492,809
\$600,000 under \$1,000,000.....	10,875	8,839,901	8,321	2,044,914	649	159,272	8,339	1,730,792
\$1,000,000 under \$2,500,000.....	10,325	15,241,736	8,498	3,678,144	1,223	400,582	8,714	3,664,951
\$2,500,000 under \$5,000,000.....	2,161	7,541,352	1,829	1,296,263	524	405,381	1,978	2,195,831
\$5,000,000 under \$10,000,000.....	864	5,904,938	792	1,020,318	270	538,952	787	1,723,900
\$10,000,000 under \$20,000,000.....	351	4,801,508	330	757,591	116	439,430	323	1,528,218
\$20,000,000 or more.....	205	11,027,263	192	1,075,792	106	1,763,160	193	3,649,117
Nontaxable returns, total.....	28,796	37,577,604	25,679	10,061,360	5,642	2,810,039	21,663	6,078,075
\$600,000 under \$1,000,000.....	17,417	12,951,910	15,369	3,971,742	2,329	406,619	12,851	1,925,313
\$1,000,000 under \$2,500,000.....	9,470	13,709,105	8,561	3,739,166	2,526	848,747	7,220	2,232,009
\$2,500,000 under \$5,000,000.....	1,277	4,115,602	1,149	1,027,926	468	452,528	1,043	581,485
\$5,000,000 under \$10,000,000.....	457	3,013,220	433	705,685	219	443,618	393	500,854
\$10,000,000 under \$20,000,000.....	121	1,634,961	117	361,568	72	291,267	106	257,036
\$20,000,000 or more.....	54	2,152,806	51	255,274	28	367,261	50	581,379

Size of gross estate	State and local Government bonds		Federal Government savings bonds		Other Federal Government bonds		Corporate and foreign bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
All returns, total.....	29,442	10,527,938	8,329	375,991	17,222	4,151,495	15,845	1,015,879
\$600,000 under \$1,000,000.....	13,371	1,927,137	5,008	175,867	8,348	860,454	7,487	332,484
\$1,000,000 under \$2,500,000.....	11,940	3,405,768	2,686	154,463	6,587	1,200,920	6,458	333,368
\$2,500,000 under \$5,000,000.....	2,556	1,700,982	444	28,609	1,406	548,927	1,164	87,598
\$5,000,000 under \$10,000,000.....	1,011	1,251,920	140	10,209	526	374,349	457	56,132
\$10,000,000 under \$20,000,000.....	362	881,969	33	6,114	213	290,641	165	47,122
\$20,000,000 or more.....	202	1,360,162	17	728	143	876,204	114	159,175
Taxable returns, total.....	15,354	7,107,057	4,093	221,572	8,970	2,855,226	8,738	678,690
\$600,000 under \$1,000,000.....	5,790	956,877	2,073	86,717	3,399	400,500	3,583	197,157
\$1,000,000 under \$2,500,000.....	6,674	2,047,928	1,541	97,927	3,871	755,473	3,862	208,612
\$2,500,000 under \$5,000,000.....	1,753	1,250,850	349	23,028	1,035	396,963	760	62,186
\$5,000,000 under \$10,000,000.....	691	918,845	93	7,332	369	276,191	313	38,139
\$10,000,000 under \$20,000,000.....	283	694,855	25	5,915	179	256,131	130	42,488
\$20,000,000 or more.....	163	1,237,703	12	654	116	769,969	90	130,107
Nontaxable returns, total.....	14,088	3,420,881	4,236	154,418	8,252	1,296,269	7,106	337,189
\$600,000 under \$1,000,000.....	7,582	970,260	2,936	89,150	4,948	459,953	3,903	135,327
\$1,000,000 under \$2,500,000.....	5,266	1,357,840	1,146	56,536	2,716	445,447	2,596	124,756
\$2,500,000 under \$5,000,000.....	803	450,133	95	5,582	371	151,963	404	25,412
\$5,000,000 under \$10,000,000.....	319	333,076	47	2,877	157	98,159	143	17,993
\$10,000,000 under \$20,000,000.....	79	187,114	8	199	34	34,510	35	4,634
\$20,000,000 or more.....	39	122,459	5	75	27	106,236	24	29,066

Footnotes at end of table.

Table 1c. --Estate Tax Returns Filed in 1991: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax and Tax Credits, by Size of Gross Estate¹--Continued

[All figures are estimates based on samples -- money amounts are in thousands of dollars]

Size of gross estate	Cash		Mortgages and notes		Life insurance		Annuities	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
All returns, total.....	52,890	11,718,663	16,847	2,336,071	29,196	3,013,309	20,265	3,162,349
\$600,000 under \$1,000,000.....	27,881	4,563,938	8,007	634,669	15,405	932,810	10,321	1,000,943
\$1,000,000 under \$2,500,000.....	19,565	4,002,563	6,374	741,165	10,730	1,288,083	7,865	1,373,736
\$2,500,000 under \$5,000,000.....	3,400	1,270,133	1,441	297,077	1,942	461,811	1,342	396,388
\$5,000,000 under \$10,000,000.....	1,318	769,778	621	233,988	725	206,988	487	218,980
\$10,000,000 under \$20,000,000.....	469	467,158	238	154,433	247	75,741	165	124,742
\$20,000,000 or more.....	257	645,092	166	274,739	147	47,877	85	47,561
Taxable returns, total.....	24,564	7,231,277	7,291	1,103,240	10,674	781,860	6,709	1,074,725
\$600,000 under \$1,000,000.....	10,716	2,320,665	2,564	156,757	4,572	159,702	2,707	249,677
\$1,000,000 under \$2,500,000.....	10,272	2,557,194	3,136	316,367	4,423	319,544	2,919	415,288
\$2,500,000 under \$5,000,000.....	2,161	870,454	873	165,418	884	126,041	661	194,063
\$5,000,000 under \$10,000,000.....	862	559,371	411	141,741	419	100,813	255	101,733
\$10,000,000 under \$20,000,000.....	350	384,584	171	97,012	167	38,021	107	82,391
\$20,000,000 or more.....	203	539,010	136	225,945	109	37,740	60	31,573
Nontaxable returns, total.....	28,326	4,487,385	9,556	1,232,831	18,522	2,231,449	13,556	2,087,625
\$600,000 under \$1,000,000.....	17,165	2,243,273	5,444	477,912	10,833	773,108	7,615	751,266
\$1,000,000 under \$2,500,000.....	9,293	1,445,369	3,237	424,798	6,307	968,539	4,946	958,448
\$2,500,000 under \$5,000,000.....	1,239	399,680	568	131,659	958	335,770	681	202,325
\$5,000,000 under \$10,000,000.....	456	210,407	210	92,247	306	106,175	232	117,246
\$10,000,000 under \$20,000,000.....	119	82,574	67	57,421	80	37,720	58	42,351
\$20,000,000 or more.....	54	106,082	30	48,794	38	10,137	25	15,988

Size of gross estate	Farm assets		Limited partnerships		Other noncorporate businesses		Other assets	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(25)	(26)	(27)	(28)	(29)	(30)	(31)	(32)
All returns, total.....	3,727	343,086	6,900	969,362	9,058	2,400,948	53,576	3,897,134
\$600,000 under \$1,000,000.....	1,954	109,179	2,223	86,692	3,474	276,680	28,292	652,308
\$1,000,000 under \$2,500,000.....	1,358	100,859	3,171	262,714	3,829	584,219	19,795	939,388
\$2,500,000 under \$5,000,000.....	261	69,528	878	135,972	941	315,059	3,438	385,457
\$5,000,000 under \$10,000,000.....	92	17,299	389	128,147	481	329,224	1,321	387,817
\$10,000,000 under \$20,000,000.....	36	14,397	140	105,030	200	291,127	472	342,885
\$20,000,000 or more.....	26	31,824	100	250,807	133	604,639	259	1,189,279
Taxable returns, total.....	1,577	170,966	2,964	509,821	3,271	1,164,084	24,781	2,385,575
\$600,000 under \$1,000,000.....	609	35,046	713	31,620	928	73,648	10,875	236,559
\$1,000,000 under \$2,500,000.....	730	41,087	1,392	93,561	1,315	169,787	10,325	475,282
\$2,500,000 under \$5,000,000.....	137	45,454	448	69,218	511	188,161	2,161	252,043
\$5,000,000 under \$10,000,000.....	54	6,852	232	65,094	277	162,514	864	243,044
\$10,000,000 under \$20,000,000.....	27	13,693	99	55,963	135	144,588	351	260,629
\$20,000,000 or more.....	20	28,724	80	194,365	105	425,387	205	918,019
Nontaxable returns, total.....	2,150	172,121	3,936	459,541	5,787	1,236,864	28,796	1,511,560
\$600,000 under \$1,000,000.....	1,345	74,133	1,509	55,072	2,546	203,033	17,417	415,749
\$1,000,000 under \$2,500,000.....	629	59,762	1,779	169,153	2,514	414,432	9,470	464,106
\$2,500,000 under \$5,000,000.....	124	24,074	430	66,754	430	126,898	1,277	133,414
\$5,000,000 under \$10,000,000.....	37	10,347	156	63,053	205	166,710	457	144,773
\$10,000,000 under \$20,000,000.....	9	705	41	49,067	65	146,539	121	82,257
\$20,000,000 or more.....	6	3,101	20	56,442	28	179,252	54	271,261

Footnotes at end of table.

Table 1c.—Estate Tax Returns Filed in 1991: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax and Tax Credits, by Size of Gross Estate¹--Continued

[All figures are estimates based on samples -- money amounts are in thousands of dollars]

Size of gross estate	Total allowable deductions		Funeral expense deduction		Executors' commissions deduction		Attorneys' fees deduction	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
All returns, total.....	53,479	39,556,125	49,298	271,421	20,186	846,919	33,167	762,904
\$600,000 under \$1,000,000.....	28,196	6,081,021	25,852	129,178	9,749	178,336	17,164	211,973
\$1,000,000 under \$2,500,000.....	19,795	11,910,820	18,419	103,241	7,752	255,955	12,273	273,012
\$2,500,000 under \$5,000,000.....	3,438	5,658,991	3,109	20,621	1,609	111,231	2,298	98,840
\$5,000,000 under \$10,000,000.....	1,320	4,642,269	1,225	9,922	682	92,140	908	69,622
\$10,000,000 under \$20,000,000.....	472	3,483,131	448	4,692	268	74,141	338	44,600
\$20,000,000 or more.....	259	7,780,092	246	3,768	126	135,115	186	64,857
Taxable returns, total.....	24,746	14,130,947	24,052	132,710	14,870	700,051	21,649	581,594
\$600,000 under \$1,000,000.....	10,841	618,606	10,624	52,586	6,076	109,657	9,578	119,243
\$1,000,000 under \$2,500,000.....	10,325	2,083,861	10,001	53,785	6,445	210,933	9,049	217,470
\$2,500,000 under \$5,000,000.....	2,161	2,070,530	2,058	12,927	1,371	85,857	1,791	84,341
\$5,000,000 under \$10,000,000.....	863	1,810,840	830	6,758	615	85,172	766	61,677
\$10,000,000 under \$20,000,000.....	351	1,899,527	340	3,405	246	69,319	301	41,828
\$20,000,000 or more.....	205	5,647,584	199	3,248	116	129,113	165	57,035
Nontaxable returns, total.....	28,734	25,425,178	25,246	138,711	5,316	146,868	11,518	181,311
\$600,000 under \$1,000,000.....	17,355	5,462,415	15,228	76,592	3,673	68,679	7,586	92,730
\$1,000,000 under \$2,500,000.....	9,470	9,826,760	8,418	49,455	1,307	45,022	3,224	55,542
\$2,500,000 under \$5,000,000.....	1,277	3,588,461	1,051	7,693	238	15,374	508	14,499
\$5,000,000 under \$10,000,000.....	457	2,831,429	395	3,163	67	6,968	142	7,944
\$10,000,000 under \$20,000,000.....	121	1,583,605	108	1,287	22	4,823	37	2,773
\$20,000,000 or more.....	54	2,132,508	47	520	10	6,002	21	7,823

Size of gross estate	Administrative expenses and losses deduction		Debts and mortgages deduction		Charitable bequests deduction		Bequests to spouse deduction	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)
All returns, total.....	39,126	715,846	43,078	3,886,025	10,160	6,246,781	23,905	26,853,640
\$600,000 under \$1,000,000.....	20,287	151,726	21,756	730,562	4,856	532,364	10,892	4,147,099
\$1,000,000 under \$2,500,000.....	14,560	209,014	16,375	1,227,793	3,838	1,379,854	9,964	8,463,196
\$2,500,000 under \$5,000,000.....	2,670	93,048	3,062	556,573	899	666,478	1,914	4,119,631
\$5,000,000 under \$10,000,000.....	1,011	74,514	1,195	462,079	435	638,908	715	3,313,404
\$10,000,000 under \$20,000,000.....	384	78,906	440	342,377	202	474,196	263	2,464,219
\$20,000,000 or more.....	214	108,639	250	566,641	130	2,554,981	157	4,346,091
Taxable returns, total.....	24,116	560,190	22,023	1,745,409	5,580	3,422,090	3,478	6,996,230
\$600,000 under \$1,000,000.....	10,555	83,344	9,101	135,515	1,918	39,156	622	79,107
\$1,000,000 under \$2,500,000.....	10,152	162,095	9,494	454,390	2,377	250,255	1,518	734,952
\$2,500,000 under \$5,000,000.....	2,063	84,803	2,067	252,296	670	308,863	774	1,238,748
\$5,000,000 under \$10,000,000.....	828	68,854	824	227,525	327	305,383	307	1,055,470
\$10,000,000 under \$20,000,000.....	330	65,178	338	228,774	177	344,112	148	1,146,911
\$20,000,000 or more.....	187	95,915	200	446,908	112	2,174,322	109	2,741,043
Nontaxable returns, total.....	15,010	155,657	21,055	2,140,616	4,580	2,824,691	20,427	19,857,409
\$600,000 under \$1,000,000.....	9,731	68,383	12,655	595,047	2,738	493,209	10,270	4,067,992
\$1,000,000 under \$2,500,000.....	4,407	46,918	6,881	773,403	1,462	1,129,599	8,446	7,728,244
\$2,500,000 under \$5,000,000.....	608	8,244	995	304,277	228	357,615	1,139	2,880,883
\$5,000,000 under \$10,000,000.....	183	5,661	371	234,554	109	333,524	408	2,257,934
\$10,000,000 under \$20,000,000.....	54	13,727	102	113,602	25	130,084	115	1,317,308
\$20,000,000 or more.....	27	12,724	50	119,733	18	380,660	48	1,605,048

Footnotes at end of table.

Table 1c.—Estate Tax Returns Filed in 1991: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax and Tax Credits, by Size of Gross Estate¹--Continued

[All figures are estimates based on samples -- money amounts are in thousands of dollars]

Size of gross estate	Taxable estate		Adjusted taxable gifts		Adjusted taxable estate		Estate tax before credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(49)	(50)	(51)	(52)	(53)	(54)	(55)	(56)
All returns, total.....	49,696	50,807,204	5,968	1,725,001	49,669	52,524,764	49,866	20,317,565
\$600,000 under \$1,000,000.....	25,952	15,635,146	1,981	252,196	25,984	15,887,341	25,984	5,159,619
\$1,000,000 under \$2,500,000.....	18,526	16,933,694	2,181	388,030	18,627	17,312,304	18,627	6,114,918
\$2,500,000 under \$5,000,000.....	3,245	5,898,399	910	367,008	3,260	6,265,407	3,260	2,570,469
\$5,000,000 under \$10,000,000.....	1,268	4,206,445	495	212,463	1,280	4,418,908	1,278	2,051,832
\$10,000,000 under \$20,000,000.....	456	2,886,531	235	190,575	463	3,077,105	462	1,528,036
\$20,000,000 or more.....	250	5,246,989	165	316,730	254	5,563,718	254	2,892,691
Taxable returns, total.....	24,767	38,571,219	4,048	1,462,922	24,781	40,034,141	24,781	16,371,854
\$600,000 under \$1,000,000.....	10,875	8,138,992	1,064	155,738	10,875	8,294,730	10,875	2,761,823
\$1,000,000 under \$2,500,000.....	10,325	13,006,032	1,521	289,240	10,325	13,295,273	10,325	4,843,802
\$2,500,000 under \$5,000,000.....	2,146	5,358,202	744	351,054	2,161	5,709,256	2,161	2,392,439
\$5,000,000 under \$10,000,000.....	864	4,010,286	375	180,433	864	4,190,720	864	1,980,874
\$10,000,000 under \$20,000,000.....	351	2,833,358	196	178,478	351	3,011,836	351	1,508,781
\$20,000,000 or more.....	205	5,224,349	147	307,979	205	5,532,327	205	2,884,136
Nontaxable returns, total.....	24,930	12,235,985	1,920	262,078	25,088	12,490,642	25,085	3,945,711
\$600,000 under \$1,000,000.....	15,077	7,496,154	917	96,457	15,109	7,592,611	15,109	2,397,796
\$1,000,000 under \$2,500,000.....	8,201	3,927,662	660	96,790	8,302	4,017,031	8,302	1,271,116
\$2,500,000 under \$5,000,000.....	1,098	540,197	166	15,955	1,100	556,151	1,100	178,030
\$5,000,000 under \$10,000,000.....	404	196,159	121	32,029	416	228,188	414	70,958
\$10,000,000 under \$20,000,000.....	105	53,173	39	12,097	112	65,270	111	19,255
\$20,000,000 or more.....	45	22,640	18	8,751	49	31,391	49	8,555

Size of gross estate	Allowable unified credit		Other tax credits		Estate tax after credits		Lifetime transfers	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
All returns, total.....	49,862	8,671,228	28,466	2,546,038	24,781	9,100,290	12,901	18,137,032
\$600,000 under \$1,000,000.....	25,984	4,464,411	13,596	235,006	10,875	460,197	5,445	2,735,060
\$1,000,000 under \$2,500,000.....	18,627	3,250,077	11,034	540,038	10,325	2,324,799	5,276	4,890,956
\$2,500,000 under \$5,000,000.....	3,260	587,553	2,356	336,319	2,161	1,646,597	1,240	2,450,568
\$5,000,000 under \$10,000,000.....	1,276	235,094	918	338,072	864	1,478,665	552	2,029,398
\$10,000,000 under \$20,000,000.....	461	86,339	354	312,441	351	1,129,256	234	1,632,780
\$20,000,000 or more.....	253	47,753	208	784,161	205	2,060,777	153	4,398,269
Taxable returns, total.....	24,777	4,770,352	23,952	2,501,202	24,781	9,100,290	6,442	12,145,051
\$600,000 under \$1,000,000.....	10,875	2,091,820	10,235	209,802	10,875	460,197	1,971	1,084,296
\$1,000,000 under \$2,500,000.....	10,325	1,989,666	10,194	529,334	10,325	2,324,799	2,871	2,720,081
\$2,500,000 under \$5,000,000.....	2,161	416,334	2,127	329,507	2,161	1,646,597	893	1,860,993
\$5,000,000 under \$10,000,000.....	862	166,037	852	336,172	864	1,478,665	380	1,349,926
\$10,000,000 under \$20,000,000.....	350	67,211	343	312,314	351	1,129,256	192	1,277,710
\$20,000,000 or more.....	204	39,285	201	784,074	205	2,060,777	135	3,852,046
Nontaxable returns, total.....	25,085	3,900,875	4,514	44,836	--	--	6,459	5,991,981
\$600,000 under \$1,000,000.....	15,109	2,372,592	3,361	25,204	--	--	3,474	1,650,764
\$1,000,000 under \$2,500,000.....	8,302	1,260,411	840	10,704	--	--	2,405	2,170,876
\$2,500,000 under \$5,000,000.....	1,100	171,219	229	6,812	--	--	347	589,575
\$5,000,000 under \$10,000,000.....	414	69,058	66	1,900	--	--	173	679,472
\$10,000,000 under \$20,000,000.....	111	19,128	11	127	--	--	42	355,070
\$20,000,000 or more.....	49	8,468	7	88	--	--	18	546,223

¹ Gross estate and asset values are shown at their value on the decedent's date-of-death.

NOTE: Detail may not add to totals because of rounding.

Table 2.—Estate Tax Returns Filed for 1989 Decedents: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax and Tax Credits, by Size of Gross Estate¹

[All figures are estimates based on samples — money amounts are in thousands of dollars]

Size of gross estate	Number of returns	Gross estate, date-of-death	Real estate		Closely held stock		Other stock	
			Number	Amount	Number	Amount	Number	Amount
			(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
All returns, total.....	50,376	87,683,991	42,962	19,823,102	6,891	7,058,044	40,035	20,173,857
\$600,000 under \$1,000,000.....	26,092	19,946,407	21,754	5,651,896	2,060	414,703	19,691	3,718,224
\$1,000,000 under \$2,500,000.....	18,478	27,203,504	16,052	7,001,608	3,073	1,196,396	15,256	5,995,379
\$2,500,000 under \$5,000,000.....	3,685	12,475,627	3,229	2,690,879	999	962,068	3,171	3,233,173
\$5,000,000 under \$10,000,000.....	1,409	9,464,419	1,273	1,933,703	475	959,055	1,260	2,470,238
\$10,000,000 under \$20,000,000.....	462	6,253,492	420	1,152,052	163	666,706	421	1,875,130
\$20,000,000 or more.....	250	12,340,542	235	1,392,964	121	2,859,116	236	2,881,712
Taxable returns, total.....	23,158	51,424,960	18,679	9,628,781	2,475	4,457,069	19,381	13,755,486
\$600,000 under \$1,000,000.....	9,569	7,746,132	7,297	1,933,428	391	70,849	7,629	1,770,871
\$1,000,000 under \$2,500,000.....	9,920	14,683,302	8,202	3,480,722	1,140	447,176	8,459	3,793,793
\$2,500,000 under \$5,000,000.....	2,175	7,421,649	1,840	1,388,736	478	486,666	1,918	2,210,771
\$5,000,000 under \$10,000,000.....	949	6,424,488	845	1,192,733	267	541,752	866	1,899,802
\$10,000,000 under \$20,000,000.....	344	4,678,599	307	716,494	107	432,843	317	1,573,285
\$20,000,000 or more.....	201	10,470,790	187	916,668	92	2,477,783	192	2,506,965
Nontaxable returns, total.....	27,218	36,259,030	24,283	10,194,321	4,415	2,600,975	20,654	6,418,370
\$600,000 under \$1,000,000.....	16,523	12,200,274	14,457	3,718,468	1,669	343,854	12,061	1,947,353
\$1,000,000 under \$2,500,000.....	8,558	12,520,202	7,850	3,520,886	1,933	749,220	6,797	2,201,586
\$2,500,000 under \$5,000,000.....	1,510	5,053,978	1,389	1,302,143	521	475,402	1,253	1,022,403
\$5,000,000 under \$10,000,000.....	460	3,039,932	428	740,970	208	417,303	395	570,436
\$10,000,000 under \$20,000,000.....	118	1,574,893	112	435,558	58	233,864	104	301,845
\$20,000,000 or more.....	49	1,869,752	48	476,296	28	381,333	44	374,747

Size of gross estate	State and local Government bonds		Federal Government savings bonds		Other Federal Government bonds		Corporate and foreign bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
All returns, total.....	27,507	9,867,658	7,859	391,870	16,423	3,291,159	16,880	1,003,200
\$600,000 under \$1,000,000.....	12,023	1,784,675	4,444	208,138	8,092	825,656	8,285	336,088
\$1,000,000 under \$2,500,000.....	11,264	3,111,234	2,767	133,435	6,121	955,626	6,450	296,185
\$2,500,000 under \$5,000,000.....	2,619	1,707,919	437	29,316	1,343	442,945	1,319	94,722
\$5,000,000 under \$10,000,000.....	1,046	1,266,253	154	11,370	533	319,363	526	82,956
\$10,000,000 under \$20,000,000.....	351	796,822	37	8,237	208	302,447	183	43,521
\$20,000,000 or more.....	203	1,200,754	20	1,375	125	445,121	116	149,729
Taxable returns, total.....	13,840	6,456,750	3,733	211,919	8,706	2,244,363	8,771	640,394
\$600,000 under \$1,000,000.....	4,592	741,877	1,684	83,133	3,468	424,321	3,443	148,844
\$1,000,000 under \$2,500,000.....	6,405	1,874,719	1,626	92,408	3,696	627,438	3,869	195,079
\$2,500,000 under \$5,000,000.....	1,656	1,134,686	263	19,181	875	293,191	840	61,249
\$5,000,000 under \$10,000,000.....	743	957,103	121	8,931	393	253,206	385	54,992
\$10,000,000 under \$20,000,000.....	275	669,762	25	7,206	169	249,247	140	37,354
\$20,000,000 or more.....	168	1,078,603	14	1,059	106	396,959	95	142,875
Nontaxable returns, total.....	13,667	3,410,908	4,126	179,951	7,716	1,046,796	8,109	362,806
\$600,000 under \$1,000,000.....	7,431	1,042,798	2,760	125,004	4,624	401,335	4,842	187,244
\$1,000,000 under \$2,500,000.....	4,860	1,236,516	1,141	41,027	2,425	328,187	2,581	101,106
\$2,500,000 under \$5,000,000.....	963	573,233	174	10,135	468	149,754	479	33,472
\$5,000,000 under \$10,000,000.....	302	309,151	33	2,439	140	66,157	142	27,984
\$10,000,000 under \$20,000,000.....	76	127,060	12	1,031	39	53,200	43	6,167
\$20,000,000 or more.....	35	122,151	6	316	19	48,163	21	6,854

Footnotes at end of table.

Table 2.--Estate Tax Returns Filed for 1989 Decedents: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax and Tax Credits, by Size of Gross Estate¹--Continued

[All figures are estimates based on samples - money amounts are in thousands of dollars]

Size of gross estate	Cash		Mortgages and notes		Life insurance		Annuities	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
All returns, total.....	49,826	10,552,193	15,023	2,297,926	27,247	2,709,236	17,042	2,715,461
\$600,000 under \$1,000,000.....	25,792	3,901,993	6,651	518,184	13,704	841,543	8,187	728,280
\$1,000,000 under \$2,500,000.....	18,271	3,645,915	5,865	706,049	10,282	1,154,626	6,661	1,200,338
\$2,500,000 under \$5,000,000.....	3,651	1,137,546	1,455	334,109	2,056	375,851	1,425	412,574
\$5,000,000 under \$10,000,000.....	1,401	768,534	662	268,980	815	195,791	511	221,371
\$10,000,000 under \$20,000,000.....	461	403,010	236	128,462	243	67,514	164	100,459
\$20,000,000 or more.....	249	695,195	155	342,143	148	73,911	93	52,440
Taxable returns, total.....	23,028	6,400,796	6,786	1,268,694	10,160	775,575	5,451	843,592
\$600,000 under \$1,000,000.....	9,516	1,781,703	2,321	185,459	3,976	145,720	1,974	153,224
\$1,000,000 under \$2,500,000.....	9,862	2,359,194	2,890	326,589	4,406	315,427	2,406	328,487
\$2,500,000 under \$5,000,000.....	2,162	768,115	848	205,403	1,014	131,994	614	164,862
\$5,000,000 under \$10,000,000.....	944	570,337	431	174,827	491	94,145	281	107,960
\$10,000,000 under \$20,000,000.....	343	322,535	172	85,878	164	39,871	104	52,941
\$20,000,000 or more.....	200	598,913	124	290,538	109	48,418	72	36,119
Nontaxable returns, total.....	26,798	4,151,397	8,237	1,029,232	17,086	1,933,660	1,592	1,871,869
\$600,000 under \$1,000,000.....	16,276	2,120,290	4,330	332,726	9,727	695,823	6,213	575,057
\$1,000,000 under \$2,500,000.....	8,409	1,286,722	2,975	379,459	5,876	839,199	4,255	871,851
\$2,500,000 under \$5,000,000.....	1,489	369,431	607	128,706	1,042	243,857	812	247,712
\$5,000,000 under \$10,000,000.....	457	198,197	231	94,152	323	101,646	231	113,411
\$10,000,000 under \$20,000,000.....	118	80,475	64	42,584	79	27,643	60	47,518
\$20,000,000 or more.....	49	96,282	31	51,605	39	25,492	21	16,320

Size of gross estate	Farm assets		Limited partnerships		Other noncorporate businesses		Other assets	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(25)	(26)	(27)	(28)	(29)	(30)	(31)	(32)
All returns, total.....	3,680	275,204	6,431	815,871	8,553	2,629,996	45,924	4,079,215
\$600,000 under \$1,000,000.....	2,083	91,076	2,024	64,928	2,827	249,880	23,215	611,144
\$1,000,000 under \$2,500,000.....	1,195	85,198	2,814	175,356	3,746	642,401	17,123	903,759
\$2,500,000 under \$5,000,000.....	246	29,872	881	149,034	1,105	415,354	3,526	460,265
\$5,000,000 under \$10,000,000.....	96	28,232	452	168,630	532	395,817	1,366	374,326
\$10,000,000 under \$20,000,000.....	34	4,574	161	114,219	199	257,397	449	332,943
\$20,000,000 or more.....	26	36,253	99	143,706	143	669,347	246	1,396,778
Taxable returns, total.....	1,534	107,786	2,767	441,627	3,368	1,446,652	21,158	2,745,476
\$600,000 under \$1,000,000.....	661	16,554	585	20,617	782	94,885	8,357	174,649
\$1,000,000 under \$2,500,000.....	618	27,101	1,284	84,975	1,486	234,700	9,245	495,494
\$2,500,000 under \$5,000,000.....	156	14,670	426	82,180	527	170,996	2,095	288,948
\$5,000,000 under \$10,000,000.....	62	17,784	281	76,081	325	231,807	925	243,027
\$10,000,000 under \$20,000,000.....	23	3,577	108	51,409	137	171,293	336	264,906
\$20,000,000 or more.....	15	28,101	83	126,365	112	542,971	199	1,278,452
Nontaxable returns, total.....	2,146	167,418	3,664	374,244	5,184	1,183,344	24,766	1,333,739
\$600,000 under \$1,000,000.....	1,422	74,522	1,439	44,311	2,046	154,995	14,858	436,495
\$1,000,000 under \$2,500,000.....	578	58,097	1,529	90,381	2,260	407,701	7,878	408,265
\$2,500,000 under \$5,000,000.....	90	15,202	455	66,854	578	244,358	1,430	171,317
\$5,000,000 under \$10,000,000.....	34	10,448	171	92,549	207	163,810	440	131,299
\$10,000,000 under \$20,000,000.....	11	997	53	62,810	63	86,105	113	68,037
\$20,000,000 or more.....	11	8,152	16	17,340	30	126,376	47	118,325

Footnotes at end of table.

Table 2.—Estate Tax Returns Filed for 1989 Decedents: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax and Tax Credits, by Size of Gross Estate—Continued

[All figures are estimates based on samples — money amounts are in thousands of dollars]

Size of gross estate	Total allowable deductions		Funeral expense deduction		Executors' commissions deduction		Attorneys' fees deduction	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
All returns, total.....	50,333	38,488,473	46,368	241,962	19,078	864,345	30,925	747,197
\$600,000 under \$1,000,000.....	6,055	5,957,941	23,818	110,828	8,714	147,862	15,562	191,581
\$1,000,000 under \$2,500,000.....	8,473	11,060,184	17,180	92,141	7,474	250,976	11,482	263,904
\$2,500,000 under \$5,000,000.....	3,685	6,154,428	3,384	21,415	1,720	126,267	2,377	108,646
\$5,000,000 under \$10,000,000.....	1,409	4,947,719	1,315	10,735	751	104,949	982	77,685
\$10,000,000 under \$20,000,000.....	481	3,289,127	439	3,940	263	65,294	334	43,423
\$20,000,000 or more.....	250	7,079,074	232	2,904	157	168,898	187	61,957
Taxable returns, total.....	23,117	13,405,287	22,529	115,113	14,634	757,383	20,256	584,620
\$600,000 under \$1,000,000.....	9,534	537,341	9,294	40,771	5,421	99,722	8,303	110,406
\$1,000,000 under \$2,500,000.....	9,915	2,043,107	9,694	49,142	6,806	225,518	8,741	216,512
\$2,500,000 under \$5,000,000.....	2,175	1,731,719	2,100	12,515	1,551	116,473	1,922	91,378
\$5,000,000 under \$10,000,000.....	949	2,110,591	915	7,284	688	96,042	832	69,264
\$10,000,000 under \$20,000,000.....	343	1,754,956	333	2,942	244	61,260	289	39,628
\$20,000,000 or more.....	201	5,227,573	192	2,459	145	158,368	168	57,432
Nontaxable returns, total.....	27,217	25,083,186	23,840	126,849	4,444	106,963	10,669	162,577
\$600,000 under \$1,000,000.....	6,522	5,420,600	14,524	70,055	3,293	48,240	7,259	81,175
\$1,000,000 under \$2,500,000.....	8,558	9,017,078	7,488	42,999	867	25,457	2,741	47,392
\$2,500,000 under \$5,000,000.....	1,510	4,422,709	1,284	8,900	169	9,794	455	17,267
\$5,000,000 under \$10,000,000.....	460	2,637,128	400	3,451	83	8,907	150	8,421
\$10,000,000 under \$20,000,000.....	118	1,534,171	106	998	19	4,034	45	3,796
\$20,000,000 or more.....	49	1,851,500	40	445	12	10,530	19	4,526

Size of gross estate	Administrative expenses and losses deduction		Debts and mortgages deduction		Charitable bequests deduction		Bequests to spouse deduction	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(41)	(42)	(43)	(44)	(45)	(46)	(47)	(48)
All returns, total.....	36,031	655,575	41,766	3,820,775	9,792	5,667,277	23,075	26,534,685
\$600,000 under \$1,000,000.....	8,255	114,037	20,900	604,418	4,394	723,890	10,632	4,067,218
\$1,000,000 under \$2,500,000.....	3,378	186,857	15,630	1,184,976	3,587	987,595	9,283	8,104,895
\$2,500,000 under \$5,000,000.....	2,720	103,084	3,264	644,306	1,047	708,142	1,987	4,434,065
\$5,000,000 under \$10,000,000.....	1,088	80,806	1,294	506,000	456	571,140	782	3,594,998
\$10,000,000 under \$20,000,000.....	380	77,387	440	344,053	182	538,215	245	2,216,654
\$20,000,000 or more.....	208	93,403	238	537,023	124	2,138,294	146	4,116,855
Taxable returns, total.....	22,130	533,595	21,260	1,710,016	5,639	3,012,890	3,250	6,682,137
\$600,000 under \$1,000,000.....	9,013	64,911	6,532	119,602	1,850	43,196	531	58,732
\$1,000,000 under \$2,500,000.....	9,627	149,009	9,209	454,931	2,392	219,129	1,493	728,852
\$2,500,000 under \$5,000,000.....	2,089	92,141	2,076	280,213	770	273,808	623	856,590
\$5,000,000 under \$10,000,000.....	896	75,330	917	303,959	361	300,032	361	1,257,921
\$10,000,000 under \$20,000,000.....	322	63,137	334	189,465	155	371,133	140	1,027,230
\$20,000,000 or more.....	184	89,066	192	361,846	112	1,805,592	102	2,752,811
Nontaxable returns, total.....	13,901	121,980	20,506	2,110,759	4,152	2,654,387	19,825	19,852,548
\$600,000 under \$1,000,000.....	9,242	49,126	12,367	484,816	2,544	680,693	10,100	4,008,485
\$1,000,000 under \$2,500,000.....	3,751	37,848	6,421	730,046	1,196	768,466	7,790	7,376,042
\$2,500,000 under \$5,000,000.....	632	10,943	1,189	364,093	278	434,335	1,364	3,577,475
\$5,000,000 under \$10,000,000.....	192	5,476	377	202,041	95	271,108	421	2,337,077
\$10,000,000 under \$20,000,000.....	59	14,249	106	154,587	27	167,082	105	1,189,424
\$20,000,000 or more.....	24	4,337	46	175,177	12	332,703	44	1,364,044

Footnotes at end of table.

Table 2.—Estate Tax Returns Filed for 1989 Decedents: Gross Estate by Type of Property, Deductions, Taxable Estate, Estate Tax and Tax Credits, by Size of Gross Estate¹—Continued

[All figures are estimates based on samples — money amounts are in thousands of dollars]

Size of gross estate	Taxable estate		Adjusted taxable gifts		Adjusted taxable estate		Estate tax before credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(49)	(50)	(51)	(52)	(53)	(54)	(55)	(56)
All returns, total.....	46,556	48,851,611	5,110	1,172,025	46,622	50,023,636	46,594	19,595,663
\$600,000 under \$1,000,000.....	23,776	13,977,740	1,499	165,263	23,794	14,143,003	23,780	4,595,817
\$1,000,000 under \$2,500,000.....	17,217	16,103,646	1,916	293,279	17,244	16,396,925	17,234	5,803,571
\$2,500,000 under \$5,000,000.....	3,512	6,326,182	838	228,317	3,520	6,554,499	3,520	2,711,584
\$5,000,000 under \$10,000,000.....	1,361	4,445,749	475	153,155	1,367	4,598,905	1,366	2,141,109
\$10,000,000 under \$20,000,000.....	447	2,943,180	237	158,559	452	3,101,739	450	1,556,959
\$20,000,000 or more.....	243	5,055,114	146	173,451	244	5,228,565	244	2,786,624
Taxable returns, total.....	23,158	37,527,004	3,608	1,009,956	23,158	38,536,960	23,158	15,955,617
\$600,000 under \$1,000,000.....	9,569	7,177,864	943	125,411	9,569	7,303,275	9,569	2,431,156
\$1,000,000 under \$2,500,000.....	9,920	12,548,395	1,349	237,209	9,920	12,785,604	9,920	4,656,644
\$2,500,000 under \$5,000,000.....	2,175	5,639,820	610	193,430	2,175	5,833,249	2,175	2,481,754
\$5,000,000 under \$10,000,000.....	949	4,233,925	375	135,655	949	4,369,581	949	2,068,166
\$10,000,000 under \$20,000,000.....	344	2,891,558	200	148,835	344	3,040,391	344	1,538,329
\$20,000,000 or more.....	201	5,035,444	130	169,416	201	5,204,659	201	2,779,569
Nontaxable returns, total.....	23,398	11,324,607	1,502	162,069	23,464	11,486,676	23,436	3,640,046
\$600,000 under \$1,000,000.....	14,206	6,799,876	556	39,852	14,225	6,839,729	14,211	2,164,662
\$1,000,000 under \$2,500,000.....	7,298	3,555,251	567	56,070	7,325	3,611,321	7,314	1,146,928
\$2,500,000 under \$5,000,000.....	1,337	686,362	228	34,888	1,345	721,250	1,345	229,830
\$5,000,000 under \$10,000,000.....	412	211,824	100	17,500	418	229,324	417	72,942
\$10,000,000 under \$20,000,000.....	103	51,624	36	9,724	108	61,348	106	18,830
\$20,000,000 or more.....	42	19,670	15	4,035	43	23,705	43	7,055

Size of gross estate	Allowable unified credit		Other tax credits		Estate tax after credits		Lifetime transfers	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(57)	(58)	(59)	(60)	(61)	(62)	(63)	(64)
All returns, total.....	46,594	8,048,764	27,338	2,518,411	23,158	9,028,679	12,168	15,156,252
\$600,000 under \$1,000,000.....	23,781	3,980,536	12,445	218,928	9,569	396,550	5,339	2,525,982
\$1,000,000 under \$2,500,000.....	17,234	3,039,700	10,870	534,439	9,920	2,229,427	4,736	4,172,051
\$2,500,000 under \$5,000,000.....	3,520	643,897	2,444	347,839	2,175	1,719,846	1,222	2,334,042
\$5,000,000 under \$10,000,000.....	1,366	254,804	1,018	346,356	949	1,539,947	522	1,018,509
\$10,000,000 under \$20,000,000.....	450	84,289	357	326,230	344	1,146,441	214	1,527,338
\$20,000,000 or more.....	243	45,537	203	744,619	201	1,996,467	134	2,678,329
Taxable returns, total.....	23,157	4,463,256	22,502	2,463,672	23,158	9,028,679	5,836	9,567,162
\$600,000 under \$1,000,000.....	9,569	1,844,619	9,135	189,982	9,569	396,550	1,864	992,634
\$1,000,000 under \$2,500,000.....	9,920	1,911,915	9,744	515,296	9,920	2,229,427	2,533	2,278,483
\$2,500,000 under \$5,000,000.....	2,175	419,018	2,147	342,889	2,175	1,719,846	794	1,489,092
\$5,000,000 under \$10,000,000.....	949	182,911	938	345,308	949	1,539,947	359	1,360,535
\$10,000,000 under \$20,000,000.....	344	66,220	341	325,669	344	1,146,441	171	1,231,815
\$20,000,000 or more.....	200	38,574	196	744,528	201	1,996,467	115	2,214,593
Nontaxable returns, total.....	23,437	3,585,508	4,836	54,739	—	—	6,332	5,589,090
\$600,000 under \$1,000,000.....	14,212	2,135,917	3,310	28,946	—	—	3,475	1,533,348
\$1,000,000 under \$2,500,000.....	7,314	1,127,785	1,126	19,142	—	—	2,203	1,893,558
\$2,500,000 under \$5,000,000.....	1,345	224,879	297	4,951	—	—	428	844,950
\$5,000,000 under \$10,000,000.....	417	71,894	80	1,049	—	—	164	557,974
\$10,000,000 under \$20,000,000.....	106	18,069	16	561	—	—	44	295,524
\$20,000,000 or more.....	43	6,964	7	91	—	—	18	463,737

¹ Gross estate and asset values are shown at their value on the decedent's date-of-death.

NOTE: Detail may not add to totals because of rounding.

Table 3.—Estate Tax Returns Filed for 1989 Decedents: Debts, Net Worth, Types of Property, Charitable Deductions and Estate Tax, by Size of Net Worth¹

[All figures are estimates based on samples — money amounts are in thousands of dollars]

Size of net worth	Number of returns	Gross estate, date-of-death	Debts and mortgages		Net worth		Real estate	
			Number	Amount	Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
All returns, total.....	50,376	87,683,991	41,766	3,820,775	50,376	83,863,215	42,962	19,823,102
Under \$600,000 ²	1,639	1,318,459	1,639	607,199	1,639	711,261	1,472	646,570
\$600,000 under \$1,000,000.....	25,894	20,441,235	20,702	722,348	25,894	19,718,887	21,642	5,806,104
\$1,000,000 under \$2,500,000.....	17,446	26,680,322	14,598	1,018,011	17,446	25,662,312	15,077	6,696,535
\$2,500,000 under \$5,000,000.....	3,426	12,129,294	3,006	487,697	3,426	11,641,596	2,989	2,540,647
\$5,000,000 under \$10,000,000.....	1,310	9,131,799	1,195	370,926	1,310	8,760,872	1,176	1,820,588
\$10,000,000 under \$20,000,000.....	426	6,002,840	404	245,051	426	5,757,789	385	1,053,505
\$20,000,000 or more.....	235	11,980,042	223	369,544	235	11,610,498	221	1,259,153
Taxable returns, total.....	23,158	51,424,960	21,260	1,710,016	23,158	49,714,944	18,679	9,628,781
Under \$600,000 ²	29	18,485	29	2,650	29	15,835	--	--
\$600,000 under \$1,000,000.....	10,070	8,327,584	9,034	226,909	10,070	8,100,675	7,774	2,159,518
\$1,000,000 under \$2,500,000.....	9,593	14,683,568	8,883	503,364	9,593	14,180,205	7,914	3,446,911
\$2,500,000 under \$5,000,000.....	2,051	7,310,431	1,952	283,818	2,051	7,026,612	1,729	1,359,028
\$5,000,000 under \$10,000,000.....	900	6,272,255	867	226,083	900	6,046,173	796	1,131,404
\$10,000,000 under \$20,000,000.....	322	4,531,975	311	167,410	322	4,364,565	286	695,141
\$20,000,000 or more.....	193	10,280,662	184	299,783	193	9,980,879	180	836,779
Nontaxable returns, total.....	27,218	36,259,030	20,506	2,110,759	27,218	34,148,272	24,283	10,194,321
Under \$600,000 ²	1,610	1,299,974	1,610	604,549	1,610	695,425	1,472	646,570
\$600,000 under \$1,000,000.....	15,824	12,113,651	11,669	495,439	15,824	11,618,212	13,869	3,646,586
\$1,000,000 under \$2,500,000.....	7,852	11,996,754	5,715	514,647	7,852	11,482,107	7,163	3,249,624
\$2,500,000 under \$5,000,000.....	1,375	4,818,863	1,053	203,879	1,375	4,614,984	1,260	1,181,620
\$5,000,000 under \$10,000,000.....	411	2,859,543	328	144,843	411	2,714,700	380	689,184
\$10,000,000 under \$20,000,000.....	104	1,470,865	92	77,641	104	1,393,225	99	358,364
\$20,000,000 or more.....	42	1,699,380	38	69,761	42	1,629,619	41	422,374

Size of net worth	State and local Government bonds		Federal Government savings bonds		Other Federal Government bonds		Corporate and foreign bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
All returns, total.....	27,507	9,867,658	7,859	391,870	16,423	3,291,159	16,880	1,003,200
Under \$600,000 ²	344	36,387	135	5,548	218	19,675	236	9,458
\$600,000 under \$1,000,000.....	12,138	1,826,001	4,459	209,051	8,117	836,742	8,310	339,693
\$1,000,000 under \$2,500,000.....	10,967	3,093,293	2,649	128,447	5,948	950,114	6,287	289,394
\$2,500,000 under \$5,000,000.....	2,523	1,701,548	416	27,930	1,300	433,076	1,257	93,194
\$5,000,000 under \$10,000,000.....	1,004	1,260,877	147	11,447	518	326,120	506	79,865
\$10,000,000 under \$20,000,000.....	333	774,880	33	8,074	201	283,856	172	43,296
\$20,000,000 or more.....	198	1,174,672	20	1,375	120	441,577	112	148,300
Taxable returns, total.....	13,840	6,456,750	3,733	211,919	8,706	2,244,363	8,771	640,394
Under \$600,000 ²	9	494	--	--	--	--	12	195
\$600,000 under \$1,000,000.....	4,820	787,920	1,764	88,743	3,599	439,143	3,560	155,194
\$1,000,000 under \$2,500,000.....	6,264	1,861,800	1,567	68,182	3,609	634,029	3,792	191,158
\$2,500,000 under \$5,000,000.....	1,600	1,136,130	252	17,880	846	285,166	806	59,685
\$5,000,000 under \$10,000,000.....	720	962,914	113	9,008	386	248,783	377	55,207
\$10,000,000 under \$20,000,000.....	263	652,380	23	7,048	165	243,828	132	37,182
\$20,000,000 or more.....	165	1,053,112	14	1,059	101	393,414	92	141,773
Nontaxable returns, total.....	13,667	3,410,908	4,126	179,951	7,716	1,046,796	8,109	362,806
Under \$600,000 ²	336	35,893	135	5,548	218	19,675	224	9,262
\$600,000 under \$1,000,000.....	7,318	1,038,081	2,694	120,308	4,518	397,599	4,749	184,499
\$1,000,000 under \$2,500,000.....	4,703	1,231,493	1,082	40,265	2,339	316,086	2,495	98,236
\$2,500,000 under \$5,000,000.....	923	563,418	164	10,050	453	147,910	451	33,509
\$5,000,000 under \$10,000,000.....	284	297,962	34	2,439	132	77,337	129	24,858
\$10,000,000 under \$20,000,000.....	70	122,500	10	1,026	36	40,028	39	6,115
\$20,000,000 or more.....	33	121,560	6	316	19	48,163	20	6,527

Footnotes at end of table.

Table 3.—Estate Tax Returns Filed for 1989 Decedents: Debts, Net Worth, Types of Property, Charitable Deductions and Estate Tax, by Size of Net Worth—Continued

[All figures are estimates based on samples — money amounts are in thousands of dollars]

Size of net worth	Closely held stock		Other stock		Cash		Mortgages and notes	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
All returns, total.....	6,891	7,058,044	40,035	20,173,857	49,826	10,552,193	15,023	2,297,926
Under \$600,000 ²	251	41,002	862	88,910	1,568	119,104	505	53,434
\$600,000 under \$1,000,000.....	2,137	454,682	19,674	3,774,409	25,629	3,942,865	6,731	550,349
\$1,000,000 under \$2,500,000.....	2,871	1,226,599	14,621	6,013,084	17,271	3,583,018	5,507	681,625
\$2,500,000 under \$5,000,000.....	943	954,503	2,979	3,181,862	3,396	1,098,568	1,328	339,150
\$5,000,000 under \$10,000,000.....	428	902,343	1,187	2,450,590	1,303	734,396	584	232,603
\$10,000,000 under \$20,000,000.....	148	639,659	390	1,844,652	425	394,956	215	127,119
\$20,000,000 or more.....	112	2,839,256	222	2,820,349	234	679,286	143	313,646
Taxable returns, total.....	2,475	4,457,069	19,381	13,755,486	23,028	6,400,796	6,786	1,268,694
Under \$600,000 ²	9	608	29	8,588	29	5,752	—	—
\$600,000 under \$1,000,000.....	460	95,413	7,995	1,826,416	10,016	1,860,414	2,522	213,171
\$1,000,000 under \$2,500,000.....	1,114	489,886	8,218	3,828,614	9,537	2,332,612	2,807	330,452
\$2,500,000 under \$5,000,000.....	461	482,122	1,827	2,168,595	2,039	747,420	789	218,323
\$5,000,000 under \$10,000,000.....	246	507,018	831	1,911,066	894	547,139	391	145,530
\$10,000,000 under \$20,000,000.....	97	411,797	295	1,518,899	321	317,673	160	86,243
\$20,000,000 or more.....	88	2,470,225	185	2,493,308	192	569,785	116	274,975
Nontaxable returns, total.....	4,415	2,600,975	20,654	6,418,370	26,798	4,151,397	8,237	1,029,232
Under \$600,000 ²	242	40,394	933	80,323	1,539	113,352	505	53,434
\$600,000 under \$1,000,000.....	1,677	359,269	11,679	1,947,993	15,613	2,082,451	4,209	337,177
\$1,000,000 under \$2,500,000.....	1,757	736,713	6,403	2,184,470	7,734	1,250,406	2,700	351,173
\$2,500,000 under \$5,000,000.....	482	472,380	1,152	1,013,267	1,358	351,148	539	120,828
\$5,000,000 under \$10,000,000.....	182	395,325	355	539,524	409	187,256	203	87,073
\$10,000,000 under \$20,000,000.....	51	227,862	95	325,753	104	77,283	55	40,877
\$20,000,000 or more.....	24	369,032	36	327,041	42	89,501	26	38,671

Size of net worth	Life insurance		Annuities		Farm assets		Limited partnerships	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(25)	(26)	(27)	(28)	(29)	(30)	(31)	(32)
All returns, total.....	27,247	2,709,236	17,042	2,715,461	3,680	275,204	6,431	815,871
Under \$600,000 ²	1,072	123,878	616	39,569	184	17,403	179	13,379
\$600,000 under \$1,000,000.....	13,565	885,318	8,167	752,198	2,052	91,066	2,073	71,068
\$1,000,000 under \$2,500,000.....	9,635	1,066,477	6,252	1,186,794	1,085	76,094	2,713	172,781
\$2,500,000 under \$5,000,000.....	1,881	347,354	1,296	378,473	221	27,852	807	150,342
\$5,000,000 under \$10,000,000.....	735	165,280	477	213,162	80	22,210	417	156,088
\$10,000,000 under \$20,000,000.....	223	51,820	147	96,710	36	10,855	150	114,341
\$20,000,000 or more.....	136	69,107	87	48,555	21	29,725	92	137,871
Taxable returns, total.....	10,160	775,575	5,451	843,592	1,534	107,786	2,767	441,627
Under \$600,000 ²	17	1,026	9	1,397	—	—	—	—
\$600,000 under \$1,000,000.....	4,239	184,772	2,129	169,544	718	21,100	664	27,451
\$1,000,000 under \$2,500,000.....	4,246	301,171	2,317	334,013	579	24,710	1,252	82,313
\$2,500,000 under \$5,000,000.....	950	129,997	565	149,513	142	13,695	407	82,033
\$5,000,000 under \$10,000,000.....	454	79,322	268	105,097	60	16,850	260	72,999
\$10,000,000 under \$20,000,000.....	151	32,418	93	49,686	21	3,340	104	51,099
\$20,000,000 or more.....	104	46,868	70	35,341	14	28,091	80	125,732
Nontaxable returns, total.....	17,086	1,933,660	11,592	1,871,869	2,146	167,418	3,664	374,244
Under \$600,000 ²	1,055	122,852	608	38,172	184	17,403	179	13,379
\$600,000 under \$1,000,000.....	9,326	700,546	6,038	583,654	1,333	69,966	1,409	43,618
\$1,000,000 under \$2,500,000.....	5,389	765,306	3,935	852,782	506	51,383	1,461	90,468
\$2,500,000 under \$5,000,000.....	931	217,357	731	228,960	80	14,157	400	68,309
\$5,000,000 under \$10,000,000.....	282	85,958	209	108,065	21	5,360	157	83,089
\$10,000,000 under \$20,000,000.....	72	19,402	54	47,024	15	7,515	46	63,242
\$20,000,000 or more.....	31	22,240	17	13,214	7	1,635	12	12,139

Footnotes at end of table.

Table 3.--Estate Tax Returns Filed for 1989 Decedents: Debts, Net Worth, Types of Property, Charitable Deductions and Estate Tax, by Size of Net Worth¹--Continued

[All figures are estimates based on samples -- money amounts are in thousands of dollars]

Size of net worth	Other noncorporate businesses		Other assets		Charitable bequests deduction		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(33)	(34)	(35)	(36)	(37)	(38)	(39)	(40)
All returns, total.....	8,553	2,629,996	45,924	4,079,215	9,792	5,667,277	23,158	9,028,679
Under \$600,000 ²	290	53,749	1,458	50,393	109	14,004	29	3,644
\$600,000 under \$1,000,000.....	2,945	278,601	23,102	623,089	4,425	723,300	10,070	433,626
\$1,000,000 under \$2,500,000.....	3,503	634,818	16,158	881,249	3,496	985,706	9,593	2,270,544
\$2,500,000 under \$5,000,000.....	1,010	406,016	3,293	448,779	1,033	720,206	2,051	1,712,325
\$5,000,000 under \$10,000,000.....	497	393,217	1,265	363,013	433	570,594	900	1,529,973
\$10,000,000 under \$20,000,000.....	174	226,842	417	332,276	175	517,099	322	1,111,638
\$20,000,000 or more.....	133	636,753	231	1,380,417	120	2,136,367	193	1,966,930
Taxable returns, total.....	3,368	1,446,652	21,158	2,745,476	5,639	3,012,890	23,158	9,028,679
Under \$600,000 ²	--	--	29	425	9	473	29	3,644
\$600,000 under \$1,000,000.....	884	106,179	8,827	193,605	1,938	44,530	10,070	433,626
\$1,000,000 under \$2,500,000.....	1,450	240,319	8,939	497,398	2,334	228,462	9,593	2,270,544
\$2,500,000 under \$5,000,000.....	491	173,172	1,982	285,672	759	274,462	2,051	1,712,325
\$5,000,000 under \$10,000,000.....	314	239,444	874	240,473	343	303,185	900	1,529,973
\$10,000,000 under \$20,000,000.....	123	160,486	317	264,755	149	358,112	322	1,111,638
\$20,000,000 or more.....	106	527,053	191	1,263,149	108	1,803,664	193	1,966,930
Nontaxable returns, total.....	5,184	1,183,344	24,766	1,333,739	4,152	2,654,387	--	--
Under \$600,000 ²	290	53,749	1,430	49,969	101	13,531	--	--
\$600,000 under \$1,000,000.....	2,061	172,422	14,275	429,484	2,487	678,770	--	--
\$1,000,000 under \$2,500,000.....	2,054	394,500	7,219	383,851	1,162	757,244	--	--
\$2,500,000 under \$5,000,000.....	519	232,844	1,311	163,107	274	445,743	--	--
\$5,000,000 under \$10,000,000.....	183	153,774	391	122,540	90	267,409	--	--
\$10,000,000 under \$20,000,000.....	51	66,356	100	67,520	26	158,987	--	--
\$20,000,000 or more.....	26	109,700	39	117,268	12	332,703	--	--

¹ Gross estate and asset values are shown at their value on the decedent's date-of-death.

² Includes estates with negative net worth.

NOTE: Detail may not add to totals because of rounding.

Table 4.—Estate Tax Returns Filed for 1989 Decedents: Gross Estate and Charitable Bequests, and Recipients of Charitable Bequests, by Sex and Marital Status of Decedent

[All figures are estimates based on samples — money amounts are in thousands of dollars]

Sex, marital status	Number of returns	Gross estate, tax purposes ¹	Gross charitable bequests		Arts and humanities		Religious	
			Number	Amount	Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
All decedents								
Total.....	50,376	97,171,506	9,792	5,765,620	922	313,928	5,810	590,480
Married.....	23,897	44,748,218	1,938	784,198	134	20,169	1,111	58,787
Widow or widower.....	20,342	32,128,779	5,878	3,053,567	534	234,344	3,509	363,701
Single.....	3,952	8,116,650	1,704	1,472,598	207	53,057	968	125,015
Other.....	2,185	4,177,859	474	455,259	46	6,358	221	44,977
Female Decedents								
Total.....	22,345	34,898,047	5,785	2,974,542	561	254,155	3,570	354,017
Married.....	5,343	8,576,131	414	97,508	26	3,681	253	6,751
Widow.....	14,267	22,328,799	4,148	2,130,494	379	214,889	2,572	242,149
Single.....	1,799	2,334,374	964	543,354	137	34,638	622	72,911
Other.....	936	1,659,743	239	203,188	18	947	122	32,206
Male Decedents								
Total.....	28,031	52,273,459	4,007	2,791,078	361	59,773	2,240	236,463
Married.....	18,554	36,172,087	1,524	686,691	107	16,488	858	50,036
Widower.....	6,075	9,799,980	1,528	923,074	155	19,455	937	121,553
Single.....	2,153	3,782,278	720	929,242	70	18,419	345	52,104
Other.....	1,249	2,519,116	235	252,070	29	5,411	99	12,771
Sex, marital status	Educational, medical and sciences		Social welfare		Private foundations		Other	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
All decedents								
Total.....	5,133	1,721,904	1,086	123,234	576	1,688,244	3,444	1,327,831
Married.....	947	165,819	157	16,255	131	375,063	643	150,105
Widow or widower.....	2,971	1,070,852	706	64,379	285	690,295	1,970	629,996
Single.....	980	419,711	191	38,513	124	432,655	642	403,646
Other.....	234	65,521	33	4,087	35	190,231	189	144,084
Female Decedents								
Total.....	2,999	997,672	671	59,219	286	534,708	2,117	774,771
Married.....	169	23,773	41	1,449	20	13,929	163	47,923
Widow.....	2,129	752,357	497	44,527	191	393,246	1,452	483,325
Single.....	594	198,521	108	11,821	64	90,357	404	135,105
Other.....	107	23,021	25	1,422	12	37,175	98	108,417
Male Decedents								
Total.....	2,134	724,232	415	64,014	289	1,153,536	1,327	553,060
Married.....	778	142,046	115	14,806	111	361,134	480	102,182
Widower.....	842	318,495	209	19,852	94	297,048	518	146,871
Single.....	386	221,190	83	26,692	61	342,298	238	268,540
Other.....	128	42,501	8	2,665	23	153,056	81	35,667

¹ Gross estate is shown at the value used to determine estate tax liability. The value could be determined as of date-of-death or 6 months thereafter (i.e., alternate valuation method).

NOTE: Detail may not add to totals because of rounding.

Table 5.—Estate Tax Returns Filed for 1989 Decedents: Gross Estate, Deductions and Estate Tax, by State of Residence

[All figures are estimates based on samples — money amounts are in thousands of dollars]

State	Number of returns	Gross estate, tax purposes ¹	Total allowable deductions		State death tax credit		Estate tax after credits	
			Number	Amount	Number	Amount	Number	Amount
			(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total.....	50,376	87,171,506	50,333	38,488,473	27,292	2,411,750	23,158	9,028,679
Alabama.....	442	710,407	442	298,205	216	17,067	196	79,020
Alaska.....	55	78,262	55	35,958	12	1,251	11	5,310
Arizona.....	625	899,394	625	372,825	307	19,798	270	78,925
Arkansas.....	295	445,245	295	207,440	150	7,865	147	35,011
California.....	9,382	15,495,688	9,376	6,583,020	4,698	392,850	4,252	1,530,634
Colorado.....	507	775,091	507	321,187	267	18,515	236	71,321
Connecticut.....	1,295	2,142,916	1,295	1,051,191	760	50,230	546	192,469
Delaware.....	186	260,347	186	120,000	104	4,801	71	18,851
District of Columbia.....	159	435,238	159	153,064	103	21,808	91	76,766
Florida.....	4,580	9,896,316	4,580	4,570,919	2,431	335,789	2,110	1,167,744
Georgia.....	900	1,534,241	900	719,669	439	35,137	400	138,328
Hawaii.....	319	570,562	319	207,851	193	21,832	168	79,917
Idaho.....	135	159,073	135	84,673	49	1,328	30	4,674
Illinois.....	2,465	4,240,581	2,448	1,882,788	1,247	102,990	1,163	415,027
Indiana.....	590	1,229,325	590	570,026	295	43,981	240	147,221
Iowa.....	618	695,776	618	269,825	331	11,780	231	43,838
Kansas.....	530	740,337	530	283,718	268	21,384	189	72,108
Kentucky.....	503	785,529	503	294,595	304	23,699	219	94,029
Louisiana.....	389	707,140	389	333,058	253	17,549	173	67,447
Maine.....	312	416,300	300	121,061	207	11,543	200	48,407
Maryland.....	943	1,443,847	943	630,974	562	34,341	442	135,121
Massachusetts.....	1,477	2,388,681	1,477	1,109,081	870	61,313	621	219,105
Michigan.....	1,212	1,852,852	1,212	789,428	761	41,597	603	159,567
Minnesota.....	710	1,046,253	710	361,619	407	35,069	347	128,278
Mississippi.....	284	398,600	284	182,599	123	7,377	98	30,014
Missouri.....	971	1,786,126	971	726,405	599	60,795	560	209,682
Montana.....	115	142,826	115	40,946	46	4,736	46	18,467
Nebraska.....	384	427,663	384	180,495	217	6,552	185	22,167
Nevada.....	213	306,830	213	147,120	112	4,462	90	16,758
New Hampshire.....	291	355,242	291	139,767	152	6,757	143	25,351
New Jersey.....	1,948	3,238,128	1,948	1,601,904	854	63,614	873	277,975
New Mexico.....	149	247,101	149	87,112	73	7,845	68	32,436
New York.....	4,476	9,516,901	4,467	4,639,511	2,682	297,359	2,195	1,059,675
North Carolina.....	1,018	1,565,910	1,018	685,347	561	34,584	492	148,738
North Dakota.....	155	144,222	155	53,004	54	1,301	50	3,693
Ohio.....	1,721	2,650,529	1,721	1,089,453	1,163	67,523	856	255,706
Oklahoma.....	431	758,579	431	253,534	293	33,106	246	114,505
Oregon.....	395	538,643	395	211,065	219	11,329	204	42,586
Pennsylvania.....	2,167	3,802,647	2,167	1,563,053	1,431	133,474	1,006	459,914
Rhode Island.....	263	298,734	263	69,010	206	9,956	133	35,030
South Carolina.....	594	710,115	594	337,541	258	10,363	221	40,225
South Dakota.....	100	113,014	100	77,600	36	854	7	2,506
Tennessee.....	581	1,159,998	581	580,935	255	34,729	250	117,757
Texas.....	2,366	4,360,937	2,366	1,954,976	1,097	122,522	1,004	480,149
Utah.....	103	281,876	103	139,244	68	9,095	56	36,079
Vermont.....	104	135,615	104	45,149	59	3,357	57	14,517
Virginia.....	1,137	2,210,619	1,137	1,054,142	583	58,037	537	232,512
Washington.....	858	1,502,602	858	561,829	405	53,072	329	196,371
West Virginia.....	155	229,788	155	98,053	81	5,167	81	21,341
Wisconsin.....	591	987,860	591	452,131	349	24,099	302	89,738
Wyoming.....	100	145,584	100	55,882	62	3,347	58	16,258
Other areas ²	79	205,395	79	88,491	22	2,820	55	20,409

¹ Gross estate is shown at the value used to determine estate tax liability. The value could be determined as of date-of-death or 6 months thereafter (i.e., alternate valuation method).² U.S. citizens domiciled abroad.

NOTE: Detail may not add to totals because of rounding.

Table 6.—Estate Tax Returns Filed for 1989 Male Decedents: Gross Estate and Estate Tax, by Age and Marital Status of Decedent and Size of Gross Estate

[All figures are estimates based on samples -- money amounts are in thousands of dollars]

Marital status, size of gross estate	Total				Age of decedent			
	Gross estate, tax purposes ¹		Estate tax after credits		Gross estate, tax purposes ¹		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
All decedents, total.....	28,031	52,273,459	9,807	4,073,868	1,382	2,716,132	360	119,979
\$600,000 under \$1,000,000.....	13,567	10,472,833	3,511	145,050	626	488,755	81	2,744
\$1,000,000 or more.....	14,464	41,800,626	6,096	3,928,818	756	2,227,377	278	117,235
Married decedents, total.....	18,554	36,172,087	2,704	1,384,107	888	1,700,853	68	26,883
\$600,000 under \$1,000,000.....	8,354	6,508,985	477	17,668	383	303,624	5	129
\$1,000,000 or more.....	10,200	29,663,103	2,227	1,366,439	505	1,397,229	63	26,755
Widowed decedents, total.....	6,075	9,799,980	4,694	1,765,885	20	22,632	11	1,704
\$600,000 under \$1,000,000.....	3,451	2,635,337	2,209	95,747	11	8,628	4	66
\$1,000,000 or more.....	2,624	7,164,642	2,485	1,670,139	8	14,004	7	1,638
Single decedents, total.....	2,153	3,782,276	1,412	470,591	340	790,235	207	65,529
\$600,000 under \$1,000,000.....	1,184	903,310	605	22,998	162	124,484	53	2,061
\$1,000,000 or more.....	969	2,878,966	807	447,594	178	665,751	155	63,468
Other decedents, total.....	1,249	2,519,116	797	453,284	134	202,412	73	25,863
\$600,000 under \$1,000,000.....	578	425,200	220	8,638	69	52,019	20	489
\$1,000,000 or more.....	671	2,093,915	577	444,646	65	150,394	53	25,374

Marital status, size of gross estate	Age of decedent—Continued							
	50 under 60 years				60 under 70 years			
	Gross estate, tax purposes ¹		Estate tax after credits		Gross estate, tax purposes ¹		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)	
All decedents, total.....	2,484	4,493,199	513	168,777	5,543	9,976,966	1,206	406,597
\$600,000 under \$1,000,000.....	1,067	831,214	154	4,655	2,539	1,973,634	368	13,202
\$1,000,000 or more.....	1,417	3,661,984	359	164,122	3,004	8,003,332	838	393,395
Married decedents, total.....	1,894	3,561,575	135	41,239	4,430	8,255,831	424	140,068
\$600,000 under \$1,000,000.....	738	584,047	12	302	1,945	1,528,903	63	1,165
\$1,000,000 or more.....	1,156	2,977,528	123	40,937	2,485	6,726,928	362	138,903
Widowed decedents, total.....	76	86,665	47	9,008	412	560,706	313	85,648
\$600,000 under \$1,000,000.....	48	35,925	21	568	223	170,363	134	5,696
\$1,000,000 or more.....	28	50,740	25	8,442	189	390,344	179	79,952
Single decedents, total.....	264	341,270	170	33,421	356	488,570	240	61,842
\$600,000 under \$1,000,000.....	165	123,908	79	2,030	207	154,086	110	4,085
\$1,000,000 or more.....	100	217,362	91	31,390	149	334,484	130	57,757
Other decedents, total.....	249	503,689	162	65,109	345	671,858	229	119,039
\$600,000 under \$1,000,000.....	116	87,335	41	1,756	163	120,282	61	2,256
\$1,000,000 or more.....	133	416,354	120	63,352	182	551,576	168	116,783

Footnotes at end of table.

Table 6.—Estate Tax Returns Filed for 1989 Male Decedents: Gross Estate and Estate Tax, by Age and Marital Status of Decedent and Size of Gross Estate—Continued

[All figures are estimates based on samples — money amounts are in thousands of dollars]

Marital status, size of gross estate	Age of decedent—Continued							
	70 under 80 years				80 years and over			
	Gross estate, tax purposes ¹		Estate tax after credits		Gross estate, tax purposes ¹		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
All decedents, total.....	8,045	14,983,225	2,383	1,032,187	10,577	20,103,937	5,145	2,346,348
\$800,000 under \$1,000,000.....	3,939	3,028,950	775	29,521	5,397	4,150,280	2,132	94,828
\$1,000,000 or more.....	4,106	11,954,275	1,608	1,002,647	5,180	15,953,657	3,012	2,251,420
Married decedents, total.....	5,749	11,471,077	808	425,774	5,593	11,192,752	1,269	750,143
\$800,000 under \$1,000,000.....	2,836	2,049,462	108	2,651	2,651	2,042,949	291	13,421
\$1,000,000 or more.....	3,113	9,421,615	701	423,123	2,942	9,139,803	978	736,722
Widowed decedents, total.....	1,439	1,928,152	1,075	304,879	4,128	7,201,824	3,248	1,364,646
\$800,000 under \$1,000,000.....	871	860,413	535	21,216	2,298	1,780,009	1,515	68,202
\$1,000,000 or more.....	568	1,267,739	540	283,663	1,831	5,441,816	1,733	1,296,443
Single decedents, total.....	553	968,066	318	170,736	638	1,194,136	479	139,064
\$800,000 under \$1,000,000.....	311	230,837	111	4,813	339	269,995	252	10,008
\$1,000,000 or more.....	243	737,228	205	165,923	299	924,141	227	129,056
Other decedents, total.....	304	615,931	184	130,777	218	525,225	149	92,496
\$800,000 under \$1,000,000.....	121	88,238	23	840	109	77,328	75	3,296
\$1,000,000 or more.....	183	527,693	162	129,937	108	447,896	74	89,199

¹ Gross estate is shown at the value used to determine estate tax liability. The value could be determined as of date-of-death or 6 months thereafter (i.e., alternate valuation method).

NOTE: Detail may not add to totals because of rounding.

Table 7.—Estate Tax Returns Filed for 1989 Female Decedents: Gross Estate and Estate Tax, by Age and Marital Status of Decedent and Size of Gross Estate

[All figures are estimates based on samples — money amounts are in thousands of dollars]

Marital status, size of gross estate	Total				Age of decedent			
	Gross estate, tax purposes ¹		Estate tax after credits		Gross estate, tax purposes ¹		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
All decedents, total.....	22,345	34,898,047	13,551	4,954,811	354	554,191	102	30,691
\$600,000 under \$1,000,000.....	12,656	9,556,228	6,167	260,848	168	129,769	33	1,035
\$1,000,000 or more.....	9,689	25,341,821	7,385	4,693,963	188	424,422	69	29,657
Married decedents, total.....	5,343	8,576,131	1,016	364,790	230	363,474	28	8,400
\$600,000 under \$1,000,000.....	2,862	2,179,841	325	11,323	97	77,313	4	167
\$1,000,000 or more.....	2,481	6,396,290	691	353,467	134	306,161	24	8,233
Widowed decedents, total.....	14,267	22,328,799	10,818	4,022,406	29	42,540	17	7,146
\$600,000 under \$1,000,000.....	8,176	6,163,717	5,056	220,408	20	14,983	8	259
\$1,000,000 or more.....	6,091	16,165,083	5,762	3,801,998	9	27,557	9	6,887
Single decedents, total.....	1,799	2,334,374	1,091	260,981	36	46,795	27	3,736
\$600,000 under \$1,000,000.....	1,109	839,000	551	18,813	19	14,666	12	429
\$1,000,000 or more.....	690	1,495,374	540	242,168	18	32,129	14	3,307
Other decedents, total.....	936	1,658,743	627	306,634	59	81,382	30	11,410
\$600,000 under \$1,000,000.....	509	373,668	235	10,304	31	22,806	8	180
\$1,000,000 or more.....	427	1,285,075	392	296,331	28	58,576	22	11,230

Marital status, size of gross estate	Age of decedent—Continued							
	50 under 60 years				60 under 70 years			
	Gross estate, tax purposes ¹		Estate tax after credits		Gross estate, tax purposes ¹		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)	
All decedents, total.....	854	1,268,725	252	61,210	2,550	4,088,895	1,008	352,812
\$600,000 under \$1,000,000.....	435	333,565	90	3,088	1,401	1,074,539	421	16,107
\$1,000,000 or more.....	418	935,160	163	58,125	1,148	3,014,356	587	336,705
Married decedents, total.....	546	886,442	49	12,242	1,400	2,316,547	189	57,988
\$600,000 under \$1,000,000.....	261	205,284	9	191	726	568,361	51	1,883
\$1,000,000 or more.....	285	681,158	40	12,052	675	1,750,186	138	56,105
Widowed decedents, total.....	144	186,945	101	25,470	831	1,172,825	600	199,273
\$600,000 under \$1,000,000.....	82	61,547	42	1,774	496	372,764	280	11,227
\$1,000,000 or more.....	63	125,398	58	23,696	335	799,860	320	188,046
Single decedents, total.....	65	64,372	36	5,356	127	153,839	84	18,671
\$600,000 under \$1,000,000.....	46	33,724	20	745	81	63,503	42	1,218
\$1,000,000 or more.....	19	30,649	16	4,611	45	90,336	42	17,454
Other decedents, total.....	98	130,966	66	18,142	192	445,884	136	76,879
\$600,000 under \$1,000,000.....	47	33,010	18	376	98	71,910	49	1,779
\$1,000,000 or more.....	51	97,956	48	17,766	93	373,974	87	75,101

Footnotes at end of table.

Table 7.—Estate Tax Returns Filed for 1989 Female Decedents: Gross Estate and Estate Tax, by Age and Marital Status of Decedent and Size of Gross Estate—Continued

[All figures are estimates based on samples — money amounts are in thousands of dollars]

Marital status, size of gross estate	Age of decedent—Continued							
	70 under 80 years				80 years and over			
	Gross estate, tax purposes ¹		Estate tax after credits		Gross estate, tax purposes ¹		Estate tax after credits	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	
All decedents, total.....	5,714	8,348,340	3,330	1,176,988	12,874	20,637,896	6,859	3,333,109
\$800,000 under \$1,000,000.....	3,423	2,585,018	1,617	69,446	7,230	5,433,336	4,008	171,175
\$1,000,000 or more.....	2,290	5,763,323	1,713	1,107,542	5,644	15,204,560	4,853	3,161,934
Married decedents, total.....	1,710	2,634,874	394	164,151	1,457	2,354,794	357	122,006
\$800,000 under \$1,000,000.....	991	757,775	169	7,346	789	573,108	92	1,736
\$1,000,000 or more.....	719	1,877,099	225	156,805	668	1,781,686	265	120,272
Widowed decedents, total.....	3,407	4,869,042	2,568	881,489	9,856	16,057,647	7,531	2,909,029
\$800,000 under \$1,000,000.....	2,062	1,548,354	1,273	54,612	5,517	4,166,068	3,452	152,537
\$1,000,000 or more.....	1,346	3,320,688	1,295	826,877	4,339	11,891,579	4,079	2,756,492
Single decedents, total.....	336	422,018	190	49,620	1,234	1,647,350	754	183,598
\$800,000 under \$1,000,000.....	219	162,079	95	2,689	744	565,028	381	13,732
\$1,000,000 or more.....	117	259,938	95	46,932	491	1,082,322	373	169,865
Other decedents, total.....	260	422,406	178	81,728	327	578,104	216	118,475
\$800,000 under \$1,000,000.....	152	116,810	79	4,800	180	129,132	80	3,170
\$1,000,000 or more.....	108	305,597	99	76,928	147	448,972	136	115,305

¹ Gross estate is shown at the value used to determine estate tax liability. The value could be determined as of date-of-death or 6 months thereafter (i.e., alternate valuation method).

NOTE: Detail may not add to totals because of rounding.

Analyzing the Weighting Strategy for the Statistics of Income 1987 Estate Study

by R. Louise Woodburn and Barry W. Johnson

ABSTRACT

The Internal Revenue Service's Statistics of Income Division (SOI) samples estate tax returns annually in order to provide regular estimates of the financial characteristics of estate tax filers. Currently, an estate tax return can be filed up to 9 months after a decedent's death and extensions are frequent beyond that. This makes it necessary to emphasize a single year of death over a three-year period, if estimates of a specific year of death are desired. The SOI estate program is designed such that a focus year of death occurs every 3rd or 4th year. These data are also used to estimate the wealth of the living population.

This paper will briefly examine the sample design for the 1987 Estate Study, as background to a discussion of weighting strategies. For the sample representing the 1987 filing year, post-stratification was investigated as a method of increasing the precision of estimates. A detailed comparison of the resulting variances attributable to each set of weights is presented.

I. HISTORY OF THE ESTATE TAX

The modern Estate Tax has been in effect since 1916. Estate and inheritance taxes, however, had been instituted periodically before this, usually to raise revenue during wartime. The estate tax is a tax on the transfer of assets from the decedent rather than on the value of assets inherited by a decedent's beneficiaries. The purpose of the tax is to raise revenue and to redistribute wealth in order to prevent the concentration of wealth in a small number of dynastic families. Initially, the tax rates ranged from 1 percent to 10 percent, with an exemption of \$40,000. The tax rates have varied widely over the years depending on revenue needs. The exemption remained between \$40,000 and \$60,000 until 1976 when it was raised to \$175,000 as a part of that year's tax reform legislation. The basic structure of the tax has remained intact since 1916, although there have been modifications to the tax law since then. In particular, certain provisions have been added to allow for alternate valuation of assets should their value decrease shortly after death, and to include a deduction for bequests to the surviving spouse.

Changes in estate tax law as a result of the Economic Recovery Tax Act of 1981 took effect for decedents who died after December 31, 1981. The major tax law changes as a result of this act were an increase in the basic exemption, gradually, from \$175,000 in 1981 to \$600,000 by 1987. This act also abolished limits on the allowable deduction for assets bequeathed to the surviving spouse, and reduced the maximum estate tax rate from 65% on assets in excess of \$4,000,000 in 1981, to 50% on all assets in excess of \$2,500,000 by 1988 (Bentz, 1984).

II. SAMPLE DESIGN

The Statistics of Income Division compiles a sample of the estate tax returns filed each year in order to estimate their characteristics. The sample selection occurs while the returns are being processed for revenue purposes. Thus, returns are selected on a flow basis using a Poisson probability sampling method where the rate is set a priori based on the desired sample size and an estimate of the population. The current estate study is designed to cycle every three or four years; that is, returns filed in three consecutive years are combined to create a file which focuses on a specified year of death.

This structure accommodates the filing requirements which allow an estate up to 9 months after the decedent's death to file an estate tax return. (An additional 6 months extension is often attainable.) For example, the return for a decedent who died in December 1986 might not be filed until March 1988. The sample focuses on year of death rather than filing year to parallel tax law changes. The estate tax data are also used to compute wealth estimates of the living population by using the Estate Multiplier Technique (see Schwartz, 1983).

The 1987 Estate Study is the second year in a 3-year program concentrating on 1986 year of death decedents. Thus, most of the returns filed in 1987 correspond to decedents with a 1986 year of death. The combined filings for 1986-1988 will contain virtually complete information on 1986 decedents, so that research can be conducted concerning those persons dying in 1986 whose estates required the filing of an estate tax return. Additionally, each of the annual estate studies are designed so that good estimates of the financial characteristics of those filing in the respective year are available.

Stratification Variables

Data for the Estate Study is collected through a stratified sample design; the basic nature of which has not changed since it was first implemented in 1982. The design has 3 stratification variables:

- Year of Death of decedent (YOD);
- Age at Death of decedent (AGE); and
- Total Gross Estate (TGE).

For the 1987 Estate Study, the YOD variable is separated into 2 categories: 1986 year of death and non-1986 year of death. The AGE and TGE variables are noted in Figure 1. The unbounded categories for the TGE variable and the category corresponding to the youngest age group are selected with certainty. In fact, in the 1987 study, 15 out of the 24 categories are selected with certainty.

The goals of the users of the estate data influenced the calculation of the sampling rates

Figure 1.--Stratification Categories for the 1987 Estate Study

<u>AGE AT DEATH CATEGORIES</u>	
Under 40 years	
40 under 50 years	
50 under 65 years	
65 years and older, or age unknown	
<u>TOTAL GROSS ESTATE CATEGORIES</u>	
\$500,000 under \$1,000,000	
\$1,000,000 under \$5,000,000	
\$5,000,000 or more	

for the non "take-all" categories. In particular, adjustments were made to account for the wealth estimates which are desired for the living population as opposed to the population filing estate tax returns. This was done by using an estimate of the living population when determining the strata allocation using the Neyman allocation scheme (Cochran, 1977). The significance of this adjustment is that the distribution over age of the estate population is heavily concentrated in older persons, while that of the living population has, necessarily, a higher proportion of younger persons.

Adjustment of Sample Weights Due to Misclassification

As mentioned earlier, the estate sample is selected during revenue processing. This means that the information coded for the initial revenue processing is the information which determines the assignment of a return to a stratum. When the returns selected for the study undergo a complete edit, misclassification errors sometimes appear. For the 1987 estate study, the misclassification rate in the selected returns was .016. These errors influence the calculation of sample weights in two ways:

- First, if an adjustment is made to the stratum assignment of a return, how should the corresponding population counts be adjusted?
- Second, how should the uncertainty in the distribution of the population over the different sampling categories be represented?

The first concern has been addressed for the 1987 estate study and the decisions are discussed below. The second concern will be researched at a later time and is not discussed further in this paper. (See Mulrow and Jones, 1989, for a discussion of similar misclassification errors in the SOI Corporation Study).

Since the assignment of a return to a stratum depends on the values of the TGE, AGE, and YOD variables, there are several factors which could contribute to its misclassification. For the 1987 study, there were 181 misclassified returns; 63 were due solely to an incorrect calculation of age at death, and 116 were due solely to adjustments in the calculation of the

total gross estate (total gross estate often increases during SOI editing as assets which were valued net of any related indebtedness are revalued at their gross value). No returns required both a change in age at death and total gross estate.

Of the 63 changes due to a miscalculation of the AGE variable, 42 were due to transcription errors during administrative processing which transformed decedents older than 100 into children. The most notable changes in TGE were 4 returns whose total gross estate changed from the lowest TGE category to the unbounded TGE category.

To determine if any adjustment was necessary to the misclassified returns, the effects of the misclassification on the desired estimates of total gross estate and other financial variables were considered. It was decided to adjust only the stratum assignment of those 4 returns which were initially assigned to the lowest total gross estate category, but should have been assigned to the highest TGE category. That is, the total gross estate changed from between \$500,000 under \$1,000,000 to over \$5,000,000.

The sample design is such that returns with total gross estate over \$5,000,000 are included with certainty. The above 4 sampled returns were sampled in a "take some" stratum that would be assigned a sample weight greater than one; however, such a weight assignment affects both population and financial estimates. The question becomes, how should the population counts be adjusted to account for the movement of the misclassified return?. There are two models which we considered:

- The misclassification is modeled as though the misclassified returns in the sample were the only misclassified returns in the population. (In this case the adjustments to the population are unweighted.)
- The misclassification is modeled to account for similar misclassification on unsampled returns. (In this case the population count adjustments correspond with the sampling weight of the misclassified return.)

To investigate which population adjustment to make, the distribution over age of the returns with total gross estate \$5,000,000 or more was considered. Distributional information from the 1982-1984 Estate Studies and that for the 1986 Estate Study was used for this investigation. The distribution over age implied under each of the aforementioned models was compared to that of data for prior years. These distributions are depicted in Figure 2 below. The approach taken was that an unweighted adjustment was presumed correct unless the evidence strongly favored a weighted adjustment. That is, we assumed no misclassification among the unsampled returns since this had the smallest variance impact, provided there was no strong evidence that bias would result. The data from 1987 under these different assumptions are denoted: 1987 Unweighted and 1987 Weighted in Figure 2.

This table shows that a weighted adjustment to the population counts leads to a much higher proportion of those age 65 and over than had

FIGURE 2. -- ESTIMATED PERCENT DISTRIBUTION OVER AGE FOR DECEDENTS WITH TOTAL GROSS ESTATE OVER \$5,000,000

FILING YEAR	AGE AT DEATH			
	under 40	40 under 50	50 under 65	over 65, unknown
1982	.010	.035	.156	.799
1983	.006	.034	.237	.723
1984	.007	.021	.239	.733
1986	.011	.033	.143	.813
1987-unweighted	.003	.041	.137	.819
1987-weighted	.002	.036	.118	.844

been estimated for the previous years. Although such a distributional shift is not infeasible, the population counts created using the unweighted adjustment are more attuned to the counts from prior years. Thus we decided to use the unweighted adjustment for the population counts.

III. POST-STRATIFICATION

Selection of the estate sample is based on information captured during revenue processing of the return. Because these data are mainly accounting data, the sample selection has been somewhat limited by a lack of demographic data on the tax filers. As a result, it may be that the 3 stratifiers, (YOD, TGE, and AGE) may not provide for the most homogenous groupings of the estate population. Further, because the distribution of estate tax filers is continuously changing, particularly in light of recent tax law changes, the sample may not adequately represent all groups for which estimates are desired. Post-stratification was considered as a means of improving the overall estimates and of investigating the representation of selected groups in the population.

It was decided to limit this investigation to 3 variables: tax status (taxable or nontaxable), sex, and filing region (as an approximation of a decedent's state of residence). It was hoped that post-stratification using one or more of these characteristics, within the framework of the original sample design, would make the estimates more precise. Data on the entire population were available at the end of the processing year. Population counts were obtained for each of the 3 variables under investigation from the Internal Revenue Service's Return Transaction File (RTF). These counts were used to calculate a post-stratified weight. Estimates were then generated for a number of different variables using both the sample and post-stratified weights.

Estimation Methodology

The sampling distribution conditional on the stratum sample sizes actually attained was chosen. The formulas used for estimating the mean and variance are as follows:

$$\hat{y} = \sum_h \frac{N_h}{N} \bar{y}_h ;$$

$$V(\hat{y}) = \frac{1}{N^2} \sum_h N_h \frac{(N_h - n_h)}{n_h} S_h^2 ;$$

$$\hat{y}_{ps} = \sum_{hm} \frac{N_{hm}}{N} \bar{y}_{hm} ; \text{ and}$$

$$V(\hat{y}_{ps}) = \frac{1}{N^2} \sum_{hm} N_{hm} \frac{(N_{hm} - n_{hm})}{n_{hm}} S_{hm}^2$$

h = 1,2,...,24
m = 1,2,...,M.

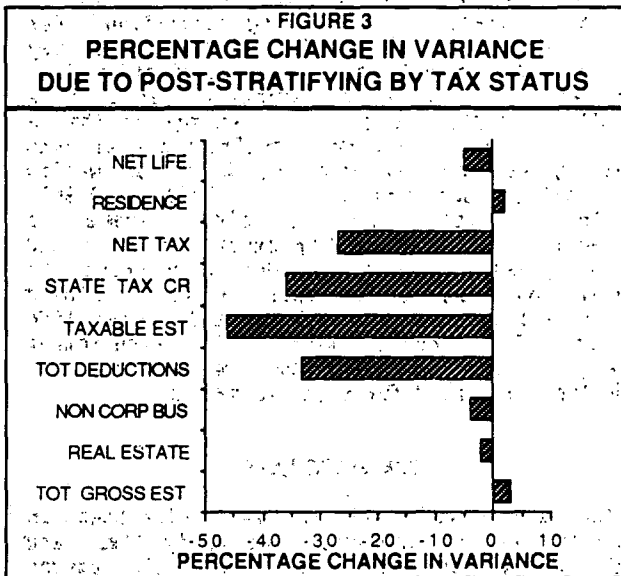
Here h represents the sampling strata and m represents the post-strata within sampling strata, M the total number of post-strata, is constant over h. The subscripted variables n, N, y, and s² refer in the traditional manner to the sample, population, calculated mean and variance for the stratum or post-stratum of interest. The overall estate population is referred to by N. (Holt and Smith, 1979). The variance was used to compare the estimates. (Note: the population counts in the post-strata are assumed known, thus justifying the use of the variance as opposed to the mean squared error to compare the estimates. Only in the case where categorizing by sex is there cause for concern about bias caused by uncertainty of the population totals.)

Comparing the Different Weighting Strategies

The estimates of nine different financial variables from the estate tax file were compared using the different weighting strategies. The estimates derived from the original stratified design were used as a base for comparison. For each of the post-stratified variables considered, the percent change in variance with respect to the variance of the corresponding estimate using the original weight was calculated. The financial variables considered were: total gross estate, real estate, noncorporate business assets, total deductions, net taxable estate, state death tax credit, net tax due, value of personal residence and net value of life insurance. The results for each post-stratification variable considered are detailed below.

Tax Status

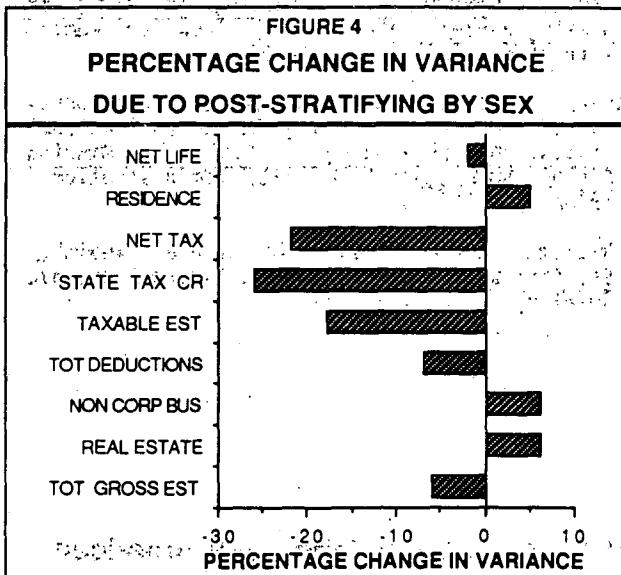
A variable, TAX, was assigned to each individual in both the sample and the population by looking at the variable, "net estate tax after credits." If this variable was greater than zero, then the return was classified taxable; otherwise it was considered nontaxable. Figure 3 shows the percent change in variance between estimates generated using the original weight and post-stratified weight based on the tax status. The variance of the estimates was reduced for seven of the nine variables examined. As one might expect, the greatest reductions in variance were attained for those variables relating to the computation of the estate tax. The variances of estimates relating to the calculation of gross estate and



its component assets were less affected by the post-stratified weight, actually increasing slightly in two cases.

Sex

Because there was no code for sex on the Return Transaction File, it was necessary to assign these codes manually to the whole population based on the decedent's first name. If the first name was not easily classifiable, as in the names "Terry" or "Lee," then a determination was made based on the frequency of appearance and sex assigned to that name on a listing of 1986 estate tax filers for which the sexes were known with certainty. At the completion of this manual task, there were only .6% of the returns for which a SEX could not be determined. The number of unknown returns was later distributed across the SEX categories with



probability equal to the observed population proportion of males and females.

A comparison of the resulting sex codes with the sex codes present on the 1987 SOI sample (which had been assigned using the decedent's death certificate) revealed an effective misclassification rate (excluding unknowns) of .2%. This misclassification, as well as any bias introduced by using different methods to assign the sex to the sample and the population, are ignored here, but will be investigated in the future.

Post-stratifying by sex significantly reduced the variance of the estimates, although not as much as seen previously in the tax status case (see Figure 4). Again, the greatest improvements were achieved for the variables related to tax computation. The precision of estimates of total gross estate improved, while those of its components did not. This suggests that while the size of gross estate may be somewhat dependent on the sex of the decedent (it is, on average, larger for male decedents), its components are not.

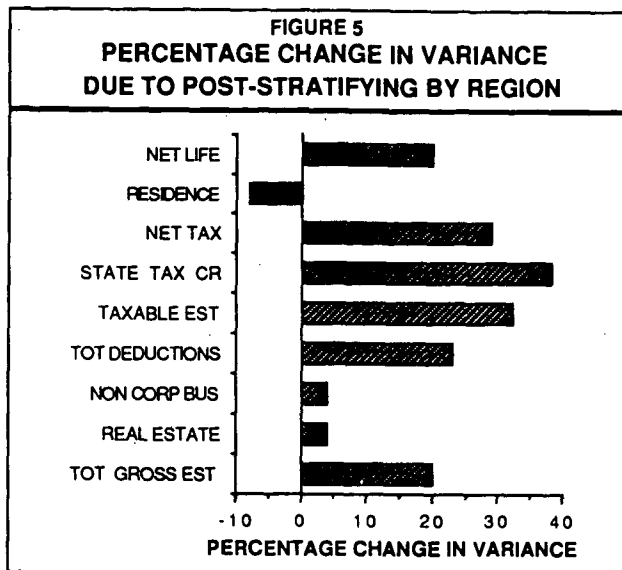
Region

A value for region was determined for the population based on the location of the 10 IRS Service Centers in which the returns were filed. Unfortunately, although most of the areas under the jurisdiction of a service center are geographically related, a few of them are responsible for geographically unrelated areas in an effort to distribute the volume of all returns more equally among the centers. Likewise, some of the regions cover a large geographic area which is relatively sparse in population, while others are responsible for smaller, more densely populated areas. Further, an examination of the sample data revealed that some of the sample sizes within region and original sample strata were quite small. In such cases, it was necessary to collapse post-strata across regions for weighting purposes. All of these factors probably contributed to the poor results obtained here.

Post-stratifying by region failed to achieve any reduction in the variation of the estimates over the sample weight for all but one variable, value of the personal residence (see Figure 5). In fact, using this weight increased the variance of one estimate by almost 30 percent.

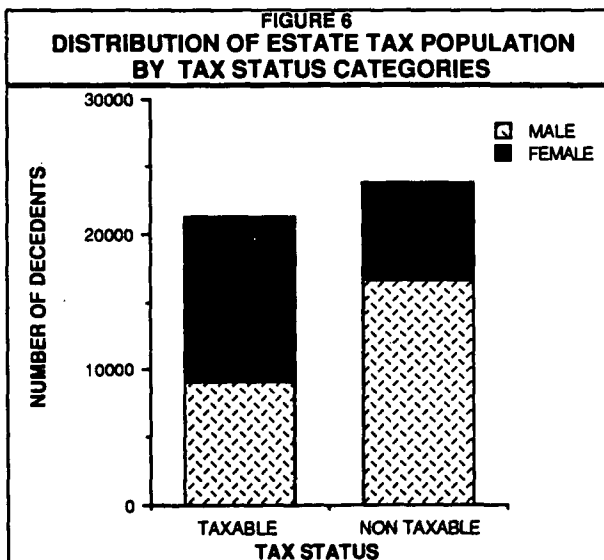
V. CONCLUSIONS/FUTURE RESEARCH

Overall, the greatest reductions in the variance of estimates created using post-stratified weights were achieved using tax status as the post-stratifying variable. While weights post-stratified by the decedent's sex did achieve notable results, the cost of obtaining the population counts and the associated uncertainty introduced by the process of determining the sex make it less desirable as a post-stratifying variable. It is also likely that the results obtained were due, in part, to the similarities of these groupings with those obtained when post-stratifying by tax status. Almost 2/3 of nontaxable decedents were male, while female decedents made up the majority of



taxable decedents (see Figure 6). This is probably due to the large number of married decedents, most of whom took advantage of a provision in the estate tax law which allows for an unlimited tax deduction for bequests to the surviving spouse, which is most often the female partner.

If the sole objective of the estate study were to calculate estimates concerning the estate tax return population, then adding tax status as a stratification variable would suffice. However,



the estate tax data are also used to compute wealth estimates of the living population. For this process, post-stratification by sex may prove doubly beneficial. An investigation into the effects of the post-stratified weights on wealth estimates is planned. It may be that a process using raking ratio estimation with both tax status and sex will be best for wealth estimation (Scheuren and Oh, 1978a, 1978b). Further investigation is also needed to determine if the existing strata for age and total gross estate still adequately group the population. It may be that inflation, higher stock and real estate prices, and longer life expectancies, coupled with filing requirement changes, will require the modification or addition of strata for these variables.

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Selected Components of Estate Portfolios, 1916-1990

Introduced by Jeffrey P. Rosenfeld, Ph.D

The tabulated data presented in this section, with the exception of table 1, were created using original SOI microdata files. Because of changes in the information reported on the Federal estate tax returns (Form 706) and changes in the data items included in SOI studies over time, some values may not be present in some years. Data items have been chosen which are as conceptually similar as possible, given the length of the time series presented and the magnitude of the changes in the estate tax law which occurred over the period. All data are presented as they were originally published (current dollars) and in constant 1987 dollars (based on the Implicit Price Deflator for Gross National Product). The following discussion is limited to constant dollar units because they permit more detailed comparisons across filing years.

Table 1 presents items of gross estate, deductions, tax credits, and net tax for selected years between 1916 and 1958 in current dollars. The data were taken from tables originally published in early SOI reports. The main function of this table is to remind the reader that SOI has collected and published Federal estate tax data regularly since the inception of the tax. More recently, SOI has taken a renewed interest in these historical returns through its Intergenerational Wealth Study. The purpose of this study is to capture microdata from estate tax returns filed since 1916 in a machine-readable format in order to study the effects of bequests on the wealth of future generations and the overall economy. So far, data have been collected from nearly all returns filed between 1916 and 1950. SOI plans to publish a book of tables, papers, and other detail of the estate tax produced from this database sometime in 1995.

Table 2 shows that the number of estate tax filers with total gross estate of at least \$600,000 in current 1987 dollars has steadily increased over the period 1963-1990. However, the percentage of estates valued at \$1 million or more for decedents filing Form 706 remained relatively constant, accounting for about 48 percent of the total estate tax returns filed. There is a steady increase in the value of taxable estates throughout this period. However, Table 2 shows that, between 1963 and 1990, tax dollars represent a steadily declining proportion of the taxable estate. This is due mainly to several important changes in the tax law, including the introduction of an unlimited marital deduction, creation of the unified estate and gift tax credit, and a reduction of the top estate tax rate.

Table 3 describes selected components of gross estate. Real estate and corporate stock comprise the two most significant components of gross estate in every filing year shown. The percentage of total assets held as real estate increased from almost 16 percent to almost 23 percent between 1963 and 1990, while the percent of total assets held as corporate stock fell from 52 percent to 31 percent. Bonds made up an increasingly large proportion of the estates of decedents with gross estates of \$600,000 or more (in constant 1987 dollars), rising from almost 10 percent to nearly 17 percent over the period, with much of that growth due to investments in tax-free state and local government bonds. The percentage held as cash also rose from just over 8 percent to about 12 percent, primarily due to the advent of money market mutual funds, counted here as 'Cash.' The mutual funds combine the liquidity of checking accounts with the higher returns of market investments and have become extremely popular.

Table 4 gives state-by-state statistics on decedents filing Form 706 in selected filing years, 1963-1990. It should be noted that statistical samples drawn for SOI studies of Form 706 do not use "State of Residence" as a selection criteria and, therefore, estimates for individual states can be subject to considerable sampling variance from year to year. The data show that some states, notably Florida, Texas, and California, more than doubled the number of decedents filing Form 706; the amount of wealth in decedents' estates also doubled over the period. Other states showed little or no increase in either the number of decedents for whom a Form 706 was filed or the value of the decedents' estates. Most significant in this group were New York and Illinois, where the number of decedents and total value of their gross estates (expressed in constant 1987 dollars) are not much different for 1963 and 1990.

Table 5 provides regional comparisons of total gross estate and shows the steady shift in wealth and population to Sunbelt states.

Table 1.--Estate Tax Returns for Selected Years: Gross Estate by Type of Property, Deductions, Tax Credits, and Tax Liability

(Money amounts are in thousands of dollars)

Item	Years				
	1916-21	1926	1936	1946	1958
Number of returns	42,230	9,353	15,037	20,899	55,685
Gross estate, total	8,785,642	3,099,796	2,767,739	4,224,210	11,648,017
Real estate.....	--	573,454	445,059	763,631	2,509,159
Federal Government bonds	--	116,918	143,588	378,936	553,896
State and municipal bonds.....	--	116,969	168,154	164,925	351,616
Other bonds.....	--	230,897	195,820	111,184	109,614
Corporate stock.....	--	1,223,992	1,165,585	1,621,747	4,984,850
Cash.....	--	(¹)	(¹)	439,812	1,152,029
Mortgages and notes	--	357,271	396,790	137,307	414,904
Taxable insurance	--	42,455	73,316	289,003	651,876
Interest in unincorporated business.....	--	--	--	149,571	--
Other	--	437,840	179,427	168,094	920,073
Total deductions	3,476,983	1,443,542	2,215,858	1,941,919	7,291,220
Funeral and administration expenses.....	1,033,408	129,579	137,760	193,836	497,407
Debts and mortgages	--	310,596	410,966	231,544	604,739
Support of dependents.....	--	--	--	24,359	2,176,137
Net losses during administration.....	--	--	--	263	1,762
Charitable bequests	264,492	130,975	126,571	185,627	668,900
Property previously taxed	67,583	73,482	37,411	54,280	--
Specific exemptions.....	2,111,500	798,910	1,503,150	1,252,010	3,341,100
Other deductions.....	--	--	--	--	1,175
Disallowed deductions	--	--	--	2,972	6,193
Allowable deductions.....	3,476,983	1,443,542	2,215,858	1,938,947	7,285,027
Total tax before credits	--	100,531	--	693,590	1,346,297
Total tax credits	--	59,600	--	71,623	160,677
Total liability	351,138	40,931	305,784	621,967	1,185,620

¹ Cash and mortgages are combined.

Table 2A.—Gross Estate, Allowable Deductions, Taxable Estate, and Net Tax in Current Dollars

(Money amounts are in thousands)

Filing year	Size of gross estate	Total gross estate		Allowable deductions		Taxable estate		Estate tax	
		Number	Amount	Number	Amount	Number	Amount	Number	Amount
1963	Total	78,393	17,007,239,270	78,393	10,330,054	55,207	7,070,827	54,966	1,840,972
	Under 1 million	76,624	12,752,479,737	76,624	8,663,452	53,482	4,481,053	53,241	946,331
	1 under 5 million	1,635	3,004,563,103	1,635	1,123,013	1,592	1,883,107	1,592	578,952
	5 million or more	134	1,250,196,430	134	543,590	133	706,667	133	315,689
1966	Total	97,321	21,810,403,791	97,321	12,658,063	67,709	9,152,340	67,386	2,412,191
	Under 1 million	94,919	15,927,072,395	94,919	10,298,316	65,345	5,628,756	65,026	1,195,887
	1 under 5 million	2,220	4,027,753,793	2,220	1,492,967	2,183	2,534,787	2,179	775,714
	5 million or more	182	1,855,577,603	182	866,781	181	988,797	181	440,590
1970	Total	133,348	29,537,830,160	133,348	18,580,999	93,190	11,610,131	77,558	2,981,646
	Under 1 million	130,518	21,767,992,160	130,518	14,906,463	90,413	7,513,217	74,789	1,572,269
	1 under 5 million	2,595	4,731,270,000	2,595	1,827,462	2,543	2,905,381	2,538	883,647
	5 million or more	235	3,038,568,000	235	1,847,074	234	1,191,533	231	525,730
1973	Total	175,289	38,677,415,305	175,289	23,830,968	121,351	15,710,322	120,851	4,110,508
	Under 1 million	171,265	28,460,249,072	171,265	19,464,705	117,415	9,856,124	116,920	2,070,998
	1 under 5 million	3,708	6,759,141,544	3,708	2,620,697	3,628	4,141,434	3,623	1,261,080
	5 million or more	316	3,458,024,689	316	1,745,565	308	1,712,764	308	778,430
1977	Total	200,732	48,198,806,515	200,717	28,063,856	148,178	20,902,824	139,103	4,978,755
	Under 1 million	196,208	36,195,484,844	196,193	22,473,531	143,738	14,486,691	134,683	2,764,308
	1 under 5 million	4,209	7,485,288,942	4,209	2,846,710	4,135	4,641,260	4,117	1,404,684
	5 million or more	315	4,518,032,729	315	2,743,614	305	1,774,873	303	809,763
1983 ¹	Total	56,518	44,651,850,718	56,463	21,832,670	49,554	22,972,768	30,963	4,487,307
	Under 1 million	48,443	23,662,393,893	48,394	10,229,718	42,047	13,533,952	25,399	1,556,671
	1 under 5 million	7,470	13,314,504,771	7,464	6,586,239	6,927	6,771,599	5,064	1,788,964
	5 million or more	605	7,674,952,054	605	5,016,714	580	2,667,217	500	1,141,673
1987	Total	45,113	66,564,119,602	45,084	30,873,408	40,874	35,913,662	21,335	6,357,981
	Under 1 million	27,694	19,420,107,888	27,669	6,284,044	24,691	13,208,260	11,624	595,756
	1 under 5 million	15,935	29,165,353,352	15,930	13,729,345	14,742	15,583,479	8,699	3,120,251
	5 million or more	1,484	17,978,658,361	1,484	10,860,019	1,441	7,121,923	1,011	2,641,973
1990	Total	53,168	88,146,915,536	53,010	39,327,869	48,948	49,713,817	23,216	9,005,472
	Under 1 million	29,081	21,596,048,873	28,930	6,383,736	26,534	15,246,735	9,862	409,291
	1 under 5 million	22,078	39,766,990,125	22,073	18,158,061	20,463	22,449,835	11,948	4,033,607
	5 million or more	2,009	26,783,876,539	2,008	14,786,072	1,952	12,017,248	1,405	4,562,574

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

Table 2B.—Gross Estate, Allowable Deductions, Taxable Estate, and Net Tax for Returns with Total Gross Estates of at least \$600,000 in Constant 1987 Dollars

(Money amounts are in thousands)

Filing year	Size of gross estate	Total gross estate		Allowable deductions		Taxable estate		Estate tax	
		Number	Amount	Number	Amount	Number	Amount	Number	Amount
1963	Total	28,446	49,371,101	28,446	23,843,280	27,290	25,657,540	27,200	7,081,668
	Under 1 million	14,551	11,083,068	14,551	7,233,830	13,730	3,924,677	13,669	730,744
	1 under 5 million	12,600	23,264,589	12,600	10,680,655	12,297	12,633,422	12,268	3,115,046
	5 million or more	1,295	15,023,445	1,295	5,928,794	1,263	9,099,442	1,263	3,235,877
1966	Total	32,996	59,078,199	32,996	28,028,435	31,785	31,049,763	31,671	8,689,819
	Under 1 million	16,593	12,626,670	16,593	7,953,587	15,787	4,673,082	15,706	891,078
	1 under 5 million	14,841	27,742,358	14,841	12,451,685	14,455	15,290,673	14,425	3,820,761
	5 million or more	1,562	18,709,172	1,562	7,623,163	1,543	11,086,009	1,540	3,977,980
1970	Total	36,343	63,884,340	36,343	31,743,457	35,166	32,245,602	34,667	9,007,995
	Under 1 million	18,885	14,338,067	18,885	8,552,344	18,166	5,841,748	17,770	1,178,994
	1 under 5 million	15,982	29,358,536	15,982	13,174,218	15,552	16,230,312	15,454	4,105,594
	5 million or more	1,476	20,187,736	1,476	10,016,895	1,448	10,173,542	1,443	3,723,407
1973	Total	37,266	64,055,986	37,266	29,515,085	36,043	34,640,247	35,974	10,035,582
	Under 1 million	19,610	14,822,268	19,610	8,181,933	18,811	6,699,571	18,771	1,445,909
	1 under 5 million	16,050	29,781,267	16,050	12,710,239	15,661	17,107,420	15,635	4,454,211
	5 million or more	1,606	19,452,451	1,606	8,622,912	1,570	10,833,256	1,568	4,135,462
1977	Total	32,994	52,449,189	32,987	23,655,541	32,359	28,832,310	31,267	8,227,247
	Under 1 million	18,506	14,051,521	18,500	6,565,261	18,134	7,505,133	17,152	1,632,145
	1 under 5 million	13,431	23,991,484	13,430	9,423,043	13,191	14,585,678	13,084	3,891,407
	5 million or more	1,058	14,406,185	1,058	7,667,236	1,034	6,741,500	1,030	2,703,695
1983 ¹	Total	28,452	44,390,833	28,419	22,614,493	25,679	21,928,860	17,576	5,284,089
	Under 1 million	15,693	11,957,483	15,673	5,289,181	13,898	6,739,001	9,009	928,604
	1 under 5 million	11,840	20,690,910	11,827	9,853,553	10,896	10,903,853	7,803	2,592,910
	5 million or more	919	11,742,440	919	7,471,759	884	4,286,006	764	1,762,576
1987	Total	42,274	72,716,133	42,270	34,070,006	38,496	38,892,331	21,292	7,098,638
	Under 1 million	21,721	16,750,188	21,721	5,296,322	19,499	11,520,315	9,999	479,780
	1 under 5 million	18,731	34,089,767	18,726	15,677,122	17,228	18,588,600	10,047	3,405,617
	5 million or more	1,822	21,876,179	1,822	13,096,562	1,769	8,783,416	1,247	3,213,241
1990	Total	49,850	86,229,543	49,816	39,003,981	45,914	48,149,829	23,102	8,978,708
	Under 1 million	25,933	19,828,961	25,905	6,010,767	23,654	13,849,492	9,777	406,833
	1 under 5 million	21,902	39,533,103	21,897	18,103,150	20,300	22,303,459	11,913	4,021,734
	5 million or more	2,015	26,867,480	2,014	14,890,064	1,960	11,996,878	1,412	4,550,141

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

Table 3A.—Gross Estate and Selected Components, by Size of Gross Estate in Current Dollars

(Money amounts are in thousands)

Filing year	Size of gross estate	Total gross estate		Real estate		Corporate stock		State and local bonds	
		Number	Amount	Number	Amount	Number	Amount	Number	Amount
1963	Total	78,393	17,007,239	62,498	3,395,988	63,342	7,712,483	(²)	(²)
	Under 1 million	76,624	12,752,480	61,102	3,058,532	61,605	4,956,774	(²)	(²)
	1 under 5 million	1,635	3,004,563	1,281	282,848	1,603	1,885,798	(²)	(²)
	5 million or more	134	1,250,196	115	54,608	134	869,910	(²)	(²)
1966	Total	97,321	21,810,404	76,297	4,271,331	75,790	9,107,006	6,361	514,279
	Under 1 million	94,919	15,927,072	74,439	3,752,155	73,516	5,677,469	5,176	157,977
	1 under 5 million	2,220	4,027,754	1,707	377,210	2,098	2,290,490	1,064	223,471
	5 million or more	182	1,855,578	151	141,966	176	1,139,047	121	132,831
1970	Total	133,348	29,537,830	102,594	6,041,459	93,305	10,455,512	7,778	560,392
	Under 1 million	130,518	21,767,992	100,409	5,312,845	90,669	6,581,187	6,440	200,105
	1 under 5 million	2,595	4,731,270	1,983	520,290	2,407	2,453,004	1,192	226,871
	5 million or more	235	3,038,568	202	208,324	229	1,421,321	146	133,416
1973	Total	175,289	38,677,415	136,574	8,758,870	121,352	12,146,273	10,069	831,000
	Under 1 million	171,265	28,460,249	133,378	7,506,210	117,655	7,149,557	8,246	292,997
	1 under 5 million	3,708	6,759,142	2,940	890,586	3,399	3,160,513	1,635	373,734
	5 million or more	316	3,458,025	256	362,075	298	1,836,202	188	164,270
1977	Total	200,732	48,198,807	162,637	13,402,444	133,008	13,951,033	14,476	1,402,289
	Under 1 million	196,208	36,195,485	158,915	11,675,812	128,658	7,625,452	12,034	485,114
	1 under 5 million	4,209	7,485,289	3,452	1,406,070	4,038	3,345,932	2,233	615,555
	5 million or more	315	4,518,033	270	320,563	312	2,979,650	209	301,620
1983 ¹	Total	56,518	44,651,851	40,321	11,047,334	38,695	12,262,434	13,561	2,207,570
	Under 1 million	48,443	23,662,394	33,248	6,595,066	31,140	4,268,036	9,447	600,051
	1 under 5 million	7,470	13,314,505	6,527	3,466,682	6,967	4,513,048	3,721	916,439
	5 million or more	605	7,674,952	545	985,585	588	3,481,351	393	691,080
1987	Total	45,113	66,564,120	37,484	14,366,419	37,893	22,917,170	20,980	6,587,150
	Under 1 million	27,694	19,420,108	22,473	5,062,454	22,296	4,957,674	10,417	1,243,705
	1 under 5 million	15,935	29,165,353	13,682	6,537,525	14,176	9,831,676	9,513	3,270,516
	5 million or more	1,484	17,978,658	1,330	2,766,440	1,421	8,127,820	1,051	2,072,929
1990	Total	53,168	88,146,916	45,003	20,204,782	44,178	27,196,790	27,914	9,790,188
	Under 1 million	29,081	21,596,049	24,162	6,247,335	22,876	4,321,249	12,779	1,802,866
	1 under 5 million	22,078	39,766,990	19,022	9,686,743	19,385	11,518,331	13,619	4,846,867
	5 million or more	2,009	26,783,877	1,819	4,270,704	1,917	11,357,210	1,517	3,140,454

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

² Data not available for 1963

Table 3A.--Gross Estate and Selected Components, by Size of Gross Estate in Current Dollars
--Continued

(Money amounts are in thousands)

Filing year	Size of gross estate	Federal savings bonds		Other Federal bonds		Corporate & foreign bonds		Total bonds	
		Number	Amount	Number	Amount	Number	Amount	Number	Amount
1963	Total	(²)	(²)	(²)	(²)	(²)	(²)	44,001	1,473,527
	Under 1 million	(²)	(²)	(²)	(²)	(²)	(²)	42,508	885,033
	1 under 5 million	(²)	(²)	(²)	(²)	(²)	(²)	1,373	381,740
	5 million or more	(²)	(²)	(²)	(²)	(²)	(²)	120	206,754
1966	Total	34,079	443,963	10,448	388,797	15,158	138,595	48,497	1,485,634
	Under 1 million	33,405	420,904	9,537	197,538	14,225	107,322	46,639	883,741
	1 under 5 million	636	20,882	827	121,160	851	23,671	1,698	389,184
	5 million or more	38	2,177	84	70,099	82	7,602	160	212,709
1970	Total	34,764	547,215	14,727	746,198	20,257	299,195	57,238	2,153,001
	Under 1 million	34,123	523,057	13,533	393,773	19,120	233,319	55,075	1,350,255
	1 under 5 million	600	23,037	1,069	211,415	1,022	50,132	1,960	511,455
	5 million or more	41	1,121	125	141,010	115	15,744	203	291,291
1973	Total	49,376	662,088	15,414	966,152	34,190	586,338	81,727	3,045,578
	Under 1 million	48,498	633,049	13,894	443,655	32,468	485,222	78,696	1,854,923
	1 under 5 million	821	25,702	1,372	319,099	1,580	71,330	2,759	789,865
	5 million or more	57	3,337	148	203,398	142	29,785	272	400,790
1977	Total	53,238	940,885	20,949	1,490,299	41,106	819,888	93,433	4,653,360
	Under 1 million	51,972	747,779	18,874	758,412	39,056	678,017	89,753	2,669,322
	1 under 5 million	1,191	138,529	1,903	462,002	1,898	108,041	3,402	1,324,127
	5 million or more	75	54,576	172	269,885	152	33,830	278	659,911
1983 ¹	Total	7,919	315,818	9,886	1,516,158	11,997	428,046	26,620	4,467,592
	Under 1 million	6,510	242,746	7,424	619,983	9,233	242,642	20,865	1,705,422
	1 under 5 million	1,330	58,778	2,216	517,643	2,553	134,534	5,268	1,627,394
	5 million or more	78	14,294	246	378,532	211	50,870	487	1,134,776
1987	Total	6,820	308,356	11,973	2,199,353	12,053	690,125	30,531	9,784,985
	Under 1 million	4,760	197,856	7,146	798,091	7,115	289,661	17,652	2,529,312
	1 under 5 million	1,924	97,777	4,339	836,835	4,453	278,921	11,677	4,484,049
	5 million or more	135	12,724	488	564,428	485	121,543	1,201	2,771,624
1990	Total	8,476	413,268	17,128	3,356,587	17,259	946,134	38,358	14,506,176
	Under 1 million	5,047	231,986	8,983	890,392	8,813	319,792	19,749	3,245,036
	1 under 5 million	3,219	161,890	7,287	1,370,754	7,656	382,294	16,895	6,761,805
	5 million or more	211	19,391	858	1,095,441	790	244,048	1,714	4,499,335

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

² Data not available for 1963

**Table 3A.—Gross Estate and Selected Components, by Size of Gross Estate in Current Dollars
—Continued**

(Money amounts are in thousands)

Filing year	Size of gross estate	Cash		Mortgages & notes		Life insurance		Farm & noncorp business	
		Number	Amount	Number	Amount	Number	Amount	Number	Amount
1963	Total	76,301	1,838,269	25,544	629,157	45,249	928,947	(²)	(²)
	Under 1 million	74,537	1,642,646	24,804	539,752	44,228	854,441	(²)	(²)
	1 under 5 million	1,630	156,825	677	66,651	950	65,149	(²)	(²)
	5 million or more	134	38,798	63	22,754	71	9,357	(²)	(²)
1966	Total	94,508	2,604,512	30,715	718,812	55,257	1,092,202	23,531	549,004
	Under 1 million	92,124	2,304,515	29,663	615,935	53,966	1,012,723	22,828	447,539
	1 under 5 million	2,203	231,053	968	88,525	1,215	68,561	643	78,989
	5 million or more	181	68,944	84	14,353	76	10,918	60	22,476
1970	Total	125,551	4,244,355	38,760	1,048,829	75,885	1,573,905	25,373	821,970
	Under 1 million	122,755	3,860,408	37,448	901,587	74,296	1,471,612	24,519	593,947
	1 under 5 million	2,561	296,282	1,188	113,494	1,459	83,943	749	130,827
	5 million or more	235	87,665	124	33,748	130	18,350	105	97,196
1973	Total	169,785	6,056,351	48,958	1,415,812	103,901	2,188,236	28,895	886,897
	Under 1 million	165,806	5,559,978	47,031	1,176,113	101,632	2,036,265	27,782	627,773
	1 under 5 million	3,664	405,939	1,751	195,106	2,091	131,529	1,000	172,717
	5 million or more	315	90,434	176	44,593	178	20,442	113	86,408
1977	Total	196,171	8,816,248	51,976	1,823,866	124,659	2,712,657	26,203	1,047,023
	Under 1 million	191,676	8,093,264	49,724	1,455,616	122,081	2,535,413	24,840	689,080
	1 under 5 million	4,180	585,003	2,073	243,360	2,404	153,465	1,242	228,247
	5 million or more	315	137,981	179	124,890	174	23,779	121	129,696
1983 ¹	Total	46,329	5,521,620	18,496	1,769,766	33,992	1,892,965	13,965	1,709,653
	Under 1 million	38,309	3,758,867	14,378	862,191	29,099	1,382,257	10,674	611,458
	1 under 5 million	7,417	1,344,376	3,736	655,908	4,530	436,437	2,964	526,335
	5 million or more	603	418,377	382	251,666	363	74,272	326	571,859
1987	Total	44,376	7,809,879	14,226	1,976,191	24,716	2,031,574	12,048	3,109,006
	Under 1 million	27,229	3,701,993	7,686	575,688	14,945	833,949	5,975	446,003
	1 under 5 million	15,676	3,176,222	5,844	925,503	8,931	1,025,259	5,283	1,111,046
	5 million or more	1,471	931,664	696	475,000	840	172,367	791	1,551,957
1990	Total	52,546	11,033,317	15,589	2,276,228	28,516	2,772,543	16,582	3,590,060
	Under 1 million	28,748	4,417,721	7,293	553,463	15,118	867,850	7,297	469,474
	1 under 5 million	21,800	4,826,277	7,303	1,042,524	12,234	1,573,627	8,104	1,473,624
	5 million or more	1,998	1,789,319	992	680,241	1,163	331,066	1,181	1,646,962

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

² Data not available for 1963

Table 3A.—Gross Estate and Selected Components, by Size of Gross Estate in Current Dollars
—Continued

(Money amounts are in thousands)

Filing year	Size of gross estate	Annuities		Other assets		Total lifetime transfers	
		Number	Amount	Number	Amount	Number	Amount
1963	Total	8,219	81,339	68,264	947,528	(²)	(²)
	Under 1 million	7,980	70,478	66,540	744,824	(²)	(²)
	1 under 5 million	214	8,469	1,591	157,082	(²)	(²)
	5 million or more	25	2,393	133	45,622	(²)	(²)
1966	Total	8,073	94,640	80,939	344,335	6,077	198,416
	Under 1 million	7,828	85,994	78,642	268,228	5,912	159,132
	1 under 5 million	228	7,977	2,119	46,577	151	17,490
	5 million or more	17	669	178	29,530	14	21,793
1970	Total	8,550	113,939	93,180	847,459	15,444	2,246,971
	Under 1 million	8,310	103,921	90,517	622,064	14,785	979,643
	1 under 5 million	218	7,865	2,432	130,354	599	483,832
	5 million or more	22	2,153	231	95,041	60	783,496
1973	Total	14,203	197,884	151,316	1,320,544	20,803	2,718,715
	Under 1 million	13,807	174,421	147,406	1,013,773	19,700	1,408,489
	1 under 5 million	361	21,792	3,599	239,370	997	760,449
	5 million or more	35	1,670	311	67,402	106	549,776
1977	Total	17,533	254,688	173,542	1,727,508	25,321	3,234,132
	Under 1 million	17,099	226,418	169,171	1,266,047	24,108	1,959,152
	1 under 5 million	403	25,038	4,060	271,941	1,113	856,892
	5 million or more	31	3,232	311	189,519	100	418,089
1983 ¹	Total	6,904	409,408	43,364	2,232,182	7,520	3,939,029
	Under 1 million	5,657	272,848	35,747	867,352	5,459	1,415,452
	1 under 5 million	1,161	121,058	7,022	623,267	1,837	1,401,414
	5 million or more	86	15,502	594	741,563	224	1,122,163
1987	Total	12,078	1,513,395	41,412	3,055,498	8,889	9,752,348
	Under 1 million	6,723	505,868	25,100	807,166	4,486	1,805,175
	1 under 5 million	4,918	835,969	14,875	1,238,103	3,851	4,253,811
	5 million or more	437	171,558	1,437	1,010,229	551	3,693,361
1990	Total	17,656	2,685,429	47,957	3,881,593	11,998	14,868,376
	Under 1 million	8,924	774,582	25,465	699,341	5,543	2,600,934
	1 under 5 million	7,980	1,559,104	20,540	1,324,955	5,613	5,954,000
	5 million or more	751	351,744	1,952	1,857,297	842	6,313,442

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

² Data not available for 1963

Table 3B.—Gross Estate and Selected Components, by Size of Gross Estate for Returns with Total Gross Estates of at least \$600,000 in Constant 1987 Dollars

(Money amounts are in thousands)

Filing year	Size of gross estate	Total gross estate		Real estate		Corporate stock		State and local bonds	
		Number	Amount	Number	Amount	Number	Amount	Number	Amount
1963	Total	28,446	49,371,101	22,688	7,727,190	25,922	25,861,630	(²)	(²)
	Under 1 million	14,551	11,083,068	11,710	2,713,747	12,790	4,149,871	(²)	(²)
	1 under 5 million	12,600	23,264,589	9,943	3,889,550	11,860	11,911,483	(²)	(²)
	5 million or more	1,295	15,023,445	1,035	1,123,893	1,272	9,800,275	(²)	(²)
1966	Total	32,996	59,078,199	26,061	9,122,943	29,342	28,757,362	4,994	1,900,169
	Under 1 million	16,593	12,626,670	13,300	3,040,706	14,249	4,405,082	1,019	58,615
	1 under 5 million	14,841	27,742,358	11,555	4,527,436	13,613	13,329,445	3,152	655,355
	5 million or more	1,562	18,709,172	1,206	1,554,801	1,480	11,022,835	823	1,186,199
1970	Total	36,343	63,884,340	28,294	10,162,293	31,062	27,288,337	5,942	1,780,251
	Under 1 million	18,885	14,338,067	14,838	3,447,275	15,482	4,508,684	1,485	91,286
	1 under 5 million	15,982	29,358,536	12,307	5,005,135	14,197	12,724,389	3,696	728,217
	5 million or more	1,476	20,187,736	1,149	1,709,883	1,383	10,055,264	760	960,749
1973	Total	37,266	64,055,986	29,305	11,248,815	32,026	25,891,613	6,716	2,163,152
	Under 1 million	19,610	14,822,268	15,562	3,699,241	16,310	4,125,499	1,796	150,434
	1 under 5 million	16,050	29,781,267	12,454	5,428,823	14,218	11,826,693	4,067	956,045
	5 million or more	1,606	19,452,451	1,289	2,120,750	1,497	9,939,421	853	1,056,673
1977	Total	32,994	52,449,189	27,323	11,566,229	28,986	21,324,116	8,274	2,653,647
	Under 1 million	18,506	14,051,521	15,307	4,347,803	15,614	3,768,463	2,730	210,967
	1 under 5 million	13,431	23,991,484	11,110	5,732,167	12,335	8,966,341	4,884	1,337,881
	5 million or more	1,058	14,406,185	907	1,486,259	1,037	8,589,311	660	1,104,799
1983 ¹	Total	28,452	44,390,833	24,148	11,188,085	23,938	14,250,899	9,902	2,673,855
	Under 1 million	15,693	11,957,483	12,899	3,843,018	12,219	2,477,655	4,001	366,028
	1 under 5 million	11,840	20,690,910	10,412	5,798,732	10,825	6,336,579	5,274	1,254,757
	5 million or more	919	11,742,440	837	1,546,334	894	5,436,665	628	1,053,070
1987	Total	42,274	72,716,133	35,188	15,619,168	35,658	25,194,930	20,273	7,304,719
	Under 1 million	21,721	16,750,188	17,530	4,319,374	17,386	4,233,744	8,323	1,103,639
	1 under 5 million	18,731	34,089,767	16,007	7,712,137	16,560	11,267,957	10,652	3,679,272
	5 million or more	1,822	21,876,179	1,651	3,587,657	1,712	9,693,229	1,298	2,521,808
1990	Total	49,850	86,229,543	42,296	19,612,635	41,791	26,867,639	26,746	9,648,303
	Under 1 million	25,933	19,828,961	21,593	5,671,219	20,590	4,025,242	11,744	1,703,610
	1 under 5 million	21,902	39,533,103	18,877	9,622,531	19,288	11,479,568	13,498	4,823,589
	5 million or more	2,015	26,867,480	1,827	4,318,885	1,913	11,362,830	1,504	3,121,104

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

² Data not available for 1963

Table 3B.—Gross Estate and Selected Components, by Size of Gross Estate for Returns with Total Gross Estates of at least \$600,000 in Constant 1987 Dollars—Continued

(Money amounts are in thousands)

Filing year	Size of gross estate	Federal savings bonds		Other Federal bonds		Corporate & foreign bonds		Total bonds	
		Number	Amount	Number	Amount	Number	Amount	Number	Amount
1963	Total	(²)	(²)	(²)	(²)	(²)	(²)	18,557	4,769,883
	Under 1 million	(²)	(²)	(²)	(²)	(²)	(²)	8,519	677,386
	1 under 5 million	(²)	(²)	(²)	(²)	(²)	(²)	8,942	1,953,817
	5 million or more	(²)	(²)	(²)	(²)	(²)	(²)	1,096	2,138,680
1966	Total	11,337	787,253	6,291	1,318,770	8,142	408,429	19,419	4,414,621
	Under 1 million	5,909	328,915	2,153	132,177	3,154	87,173	8,684	606,879
	1 under 5 million	5,002	396,483	3,512	551,125	4,380	231,008	9,504	1,833,971
	5 million or more	426	61,856	626	635,468	608	90,248	1,231	1,973,771
1970	Total	9,340	735,323	8,080	2,115,386	9,865	680,000	20,629	5,310,959
	Under 1 million	4,968	328,820	2,982	257,109	4,086	156,132	9,344	833,348
	1 under 5 million	4,072	361,818	4,430	923,490	5,155	359,907	10,119	2,373,432
	5 million or more	300	44,685	668	934,786	624	163,960	1,167	2,104,180
1973	Total	10,108	635,626	7,819	2,308,037	12,793	981,146	22,875	6,087,961
	Under 1 million	5,684	303,686	3,012	265,241	5,858	308,645	11,008	1,028,006
	1 under 5 million	4,110	299,181	4,123	965,155	6,231	505,378	10,591	2,725,758
	5 million or more	314	32,759	684	1,077,641	704	167,124	1,276	2,334,197
1977	Total	8,992	852,401	9,018	2,478,358	12,389	890,052	21,754	6,874,457
	Under 1 million	4,980	228,802	3,846	402,272	6,315	305,748	11,126	1,147,790
	1 under 5 million	3,738	411,810	4,632	1,179,558	5,582	459,669	9,718	3,388,918
	5 million or more	274	211,788	540	896,529	492	124,634	910	2,337,750
1983 ¹	Total	4,765	296,959	6,290	1,646,474	7,799	429,727	16,802	5,047,015
	Under 1 million	2,616	170,096	2,880	331,340	3,435	122,145	8,225	989,608
	1 under 5 million	1,951	105,956	3,084	782,762	4,083	229,108	7,821	2,372,584
	5 million or more	198	20,907	327	532,372	282	78,474	755	1,684,823
1987	Total	6,327	327,213	11,319	2,381,967	11,441	741,744	28,891	10,755,642
	Under 1 million	3,828	154,881	5,636	665,121	5,644	262,543	13,859	2,186,184
	1 under 5 million	2,344	157,384	5,136	1,062,952	5,240	331,551	13,562	5,231,159
	5 million or more	154	14,948	546	653,894	557	147,650	1,471	3,338,299
1990	Total	8,055	386,616	16,164	3,278,020	16,491	912,127	36,436	14,225,066
	Under 1 million	4,662	205,499	8,108	823,168	8,106	289,902	17,994	3,022,179
	1 under 5 million	3,185	161,890	7,196	1,358,766	7,599	378,042	16,731	6,722,287
	5 million or more	208	19,227	861	1,096,086	786	244,183	1,711	4,480,600

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

² Data not available for 1963

Table 3B.—Gross Estate and Selected Components, by Size of Gross Estate for Returns with Total Gross Estates of at least \$600,000 in Constant 1987 Dollars—Continued

(Money amounts are in thousands)

Filing year	Size of gross estate	Cash		Mortgages & notes		Life insurance		Farm & noncorp business	
		Number	Amount	Number	Amount	Number	Amount	Number	Amount
1963	Total	27,999	4,141,335	10,981	1,640,894	17,386	2,272,594	(²)	(²)
	Under 1 million	14,241	1,407,323	5,334	510,984	8,913	887,930	(²)	(²)
	1 under 5 million	12,465	2,077,777	5,097	820,656	7,730	1,146,013	(²)	(²)
	5 million or more	1,293	656,235	550	309,254	743	238,650	(²)	(²)
1966	Total	32,434	5,337,200	12,773	1,726,236	19,295	2,303,098	9,270	1,460,924
	Under 1 million	16,265	1,787,053	6,007	505,212	9,889	944,745	4,619	416,516
	1 under 5 million	14,619	2,645,007	6,071	912,187	8,565	1,136,126	4,193	728,869
	5 million or more	1,550	905,140	695	308,837	841	222,226	458	315,539
1970	Total	35,116	6,400,503	14,177	2,013,908	21,259	2,434,005	9,382	1,961,183
	Under 1 million	18,049	2,335,276	6,835	644,023	11,211	1,036,988	4,563	451,011
	1 under 5 million	15,605	3,227,434	6,649	1,049,153	9,213	1,179,269	4,345	916,562
	5 million or more	1,462	837,793	693	320,732	835	217,748	473	593,611
1973	Total	36,603	6,327,998	15,354	2,167,897	21,874	2,359,698	8,865	1,679,413
	Under 1 million	19,214	2,518,426	7,647	685,157	11,678	1,010,276	4,450	379,154
	1 under 5 million	15,797	3,079,686	6,906	1,074,788	9,291	1,143,768	3,924	812,587
	5 million or more	1,592	729,887	801	407,952	905	205,654	491	487,673
1977	Total	32,627	5,840,838	13,606	1,979,883	19,526	1,675,987	8,143	1,474,510
	Under 1 million	18,261	2,514,401	7,005	636,826	11,066	761,443	4,160	339,501
	1 under 5 million	13,312	2,729,960	6,010	937,103	7,854	789,702	3,593	692,854
	5 million or more	1,054	596,476	591	405,954	606	124,842	390	442,156
1983 ¹	Total	27,290	5,060,260	12,320	1,913,779	17,060	1,565,750	9,389	1,986,797
	Under 1 million	14,616	2,016,686	6,010	476,067	9,365	668,350	4,261	354,925
	1 under 5 million	11,758	2,383,380	5,717	1,059,933	7,116	765,161	4,695	815,792
	5 million or more	916	660,195	593	377,778	578	132,239	433	816,080
1987	Total	41,579	8,331,349	13,449	2,157,023	23,076	2,218,178	11,485	3,448,287
	Under 1 million	21,349	3,224,881	6,037	490,655	11,607	729,728	4,824	399,996
	1 under 5 million	18,425	3,941,692	6,585	1,086,956	10,417	1,251,212	5,749	1,194,476
	5 million or more	1,806	1,164,776	827	579,412	1,052	237,238	912	1,853,815
1990	Total	49,269	10,575,695	14,641	2,225,411	26,769	2,718,690	15,598	3,555,470
	Under 1 million	25,629	3,996,336	6,428	508,028	13,478	811,463	6,392	421,602
	1 under 5 million	21,635	4,782,259	7,216	1,025,724	12,115	1,570,981	8,011	1,470,946
	5 million or more	2,005	1,797,100	998	691,659	1,176	336,245	1,195	1,662,923

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

² Data not available for 1963

Table 3B.—Gross Estate and Selected Components, by Size of Gross Estate for Returns with Total Gross Estates of at least \$600,000 in Constant 1987 Dollars—Continued

(Money amounts are in thousands)

Filing year	Size of gross estate	Annuities		Other assets		Total lifetime transfers	
		Number	Amount	Number	Amount	Number	Amount
1963	Total	3,274	200,622	26,295	2,756,952	(²)	(²)
	Under 1 million	1,603	66,202	13,140	669,623	(²)	(²)
	1 under 5 million	1,501	98,031	11,885	1,367,262	(²)	(²)
	5 million or more	170	36,389	1,270	720,068	(²)	(²)
1966	Total	3,180	198,129	29,394	823,103	2,371	450,449
	Under 1 million	1,553	69,604	14,458	210,208	1,131	126,688
	1 under 5 million	1,477	108,205	13,433	366,707	1,135	194,843
	5 million or more	150	20,320	1,503	246,188	105	128,918
1970	Total	2,551	172,713	30,277	1,858,718	5,958	6,289,035
	Under 1 million	1,215	56,290	14,982	428,425	2,674	601,072
	1 under 5 million	1,203	96,221	13,890	828,383	2,907	1,961,406
	5 million or more	133	20,201	1,405	601,910	377	3,726,558
1973	Total	3,327	237,366	34,699	2,106,166	7,285	6,043,947
	Under 1 million	1,762	77,767	17,931	494,446	3,377	834,834
	1 under 5 million	1,409	127,638	15,199	1,115,908	3,430	2,491,843
	5 million or more	156	31,960	1,569	495,813	478	2,717,270
1977	Total	2,860	193,507	30,753	1,913,491	6,962	4,711,109
	Under 1 million	1,519	72,204	16,948	474,170	3,481	906,803
	1 under 5 million	1,240	101,137	12,766	846,455	3,162	2,309,309
	5 million or more	101	20,166	1,039	592,866	319	1,494,997
1983 ¹	Total	4,488	421,140	25,905	2,457,276	5,397	4,581,466
	Under 1 million	2,451	171,472	13,791	459,868	2,369	870,376
	1 under 5 million	1,918	218,331	11,211	940,420	2,731	2,094,887
	5 million or more	119	31,337	903	1,056,988	298	1,616,203
1987	Total	11,313	1,635,907	38,804	3,355,646	8,606	10,758,244
	Under 1 million	5,215	427,484	19,625	738,141	3,543	1,575,216
	1 under 5 million	5,554	978,551	17,417	1,425,625	4,391	4,592,892
	5 million or more	544	229,872	1,762	1,191,880	673	4,590,136
1990	Total	16,872	2,640,031	45,047	3,808,907	11,593	14,707,477
	Under 1 million	8,205	733,707	22,746	639,187	5,188	2,460,755
	1 under 5 million	7,916	1,554,742	20,343	1,304,066	5,567	5,929,947
	5 million or more	751	351,583	1,958	1,865,655	838	6,316,775

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

² Data not available for 1963

Table 4A.—Number of Decedents and Size of Gross Estate, by State in Current Dollars

(Money amounts are in thousands)

State of residence	Filing year					
	1966		1970		1977	
	Number	Amount	Number	Amount	Number	Amount
Total.....	32,996	15,534,636	36,343	19,397,481	32,994	25,490,479
Alabama.....	280	138,594	300	126,096	352	254,073
Alaska.....	9	2,827	27	8,805	26	18,669
Arizona.....	232	101,097	289	128,115	319	201,711
Arkansas.....	197	72,915	268	96,529	257	154,035
California.....	3,710	1,809,511	4,126	2,277,949	3,368	3,358,661
Colorado.....	332	145,895	400	189,809	361	249,589
Connecticut.....	785	477,437	919	632,023	677	552,011
Delaware.....	117	91,831	142	163,923	103	57,250
Florida.....	1,462	612,218	1,874	993,077	2,339	1,752,510
Georgia.....	402	182,137	570	263,108	580	419,932
Hawaii.....	69	37,043	128	57,268	91	65,087
Idaho.....	82	25,975	86	28,463	100	55,587
Illinois.....	2,391	1,060,325	2,304	1,115,095	2,816	1,901,364
Indiana.....	655	221,207	777	318,653	852	757,755
Iowa.....	551	174,940	707	231,326	918	484,078
Kansas.....	504	165,596	548	209,863	593	402,730
Kentucky.....	395	142,423	416	230,954	355	243,193
Louisiana.....	274	112,851	351	142,581	323	226,924
Maine.....	191	81,735	206	101,120	125	86,614
Maryland.....	884	418,173	939	527,160	822	548,260
Massachusetts.....	1,118	565,738	1,223	733,400	783	561,945
Michigan.....	1,136	479,233	1,243	628,076	929	801,760
Minnesota.....	500	222,086	559	267,881	503	310,196
Mississippi.....	185	68,384	261	109,045	226	142,149
Missouri.....	763	382,918	890	368,981	826	610,265
Montana.....	143	41,820	159	53,464	125	81,805
Nebraska.....	350	119,378	411	141,842	483	296,240
Nevada.....	68	47,273	90	44,241	69	224,227
New Hampshire.....	123	63,381	140	72,256	144	92,988
New Jersey.....	1,462	671,039	1,446	745,674	1,160	807,807
New Mexico.....	90	47,077	96	50,331	86	65,576
New York.....	4,409	2,628,212	4,396	3,421,824	2,930	2,768,819
North Carolina.....	516	201,552	705	334,562	606	416,307
North Dakota.....	100	28,996	102	32,484	154	72,754
Ohio.....	1,621	767,676	1,704	903,343	1,440	1,080,601
Oklahoma.....	371	179,568	427	192,802	457	345,886
Oregon.....	284	104,611	325	153,924	310	188,545
Pennsylvania.....	2,043	949,089	2,175	1,123,803	1,613	1,169,034
Rhode Island.....	180	106,699	160	134,148	134	102,926
South Carolina.....	233	91,421	240	112,898	280	194,663
South Dakota.....	90	30,394	106	34,326	146	72,019
Tennessee.....	384	150,690	468	230,400	483	522,321
Texas.....	1,120	586,663	1,363	660,533	1,491	1,206,928
Utah.....	78	33,281	76	28,331	94	56,155
Vermont.....	95	43,782	77	40,566	63	44,280
Virginia.....	597	264,072	602	293,172	709	485,518
Washington.....	432	180,848	488	208,335	449	293,832
West Virginia.....	182	72,968	168	62,820	153	103,797
Wisconsin.....	647	234,222	703	289,852	542	402,268
Wyoming.....	69	21,095	91	38,512	110	63,124
Other areas.....	79	75,740	71	43,742	120	115,712

Footnotes at end of tables

Table 4A.—Number of Decedents and Size of Gross Estate, by State in Current Dollars—Continued

(Money amounts are in thousands)

State of residence	Filing year					
	1983 ¹		1987		1990	
	Number	Amount	Number	Amount	Number	Amount
Total	28,452	34,314,540	42,274	65,089,101	49,850	86,266,789
Alabama.....	244	268,113	419	677,193	439	756,695
Alaska.....	25	31,931	46	69,998	91	122,064
Arizona.....	485	500,696	629	970,591	493	751,097
Arkansas.....	190	209,885	160	285,072	243	397,491
California.....	2,026	3,105,986	6,538	9,836,221	8,896	15,083,035
Colorado.....	478	707,073	449	586,531	582	775,986
Connecticut.....	718	1,029,237	995	1,634,700	1,251	1,982,945
Delaware.....	63	72,948	84	111,539	163	262,894
Florida.....	3,074	3,811,599	3,682	6,722,410	4,299	9,691,079
Georgia.....	378	472,776	871	1,863,534	830	1,443,722
Hawaii.....	30	35,197	114	180,889	326	556,285
Idaho.....	71	72,800	86	106,583	118	149,601
Illinois.....	2,038	2,304,207	2,274	3,272,968	2,473	4,019,901
Indiana.....	436	500,413	539	743,632	688	1,285,297
Iowa.....	896	675,002	434	492,188	672	741,701
Kansas.....	544	704,863	376	546,636	427	615,961
Kentucky.....	225	284,127	471	651,910	494	807,259
Louisiana.....	326	407,518	438	564,447	395	589,559
Maine.....	91	106,355	177	211,700	263	382,085
Maryland.....	646	753,816	896	1,492,817	1,209	2,226,019
Massachusetts.....	647	748,825	1,522	2,041,637	1,519	2,377,405
Michigan.....	891	943,040	888	1,266,448	1,062	1,633,457
Minnesota.....	449	470,209	581	869,824	709	1,080,044
Mississippi.....	173	157,324	240	296,922	255	391,841
Missouri.....	882	1,068,644	947	1,566,514	994	1,891,271
Montana.....	117	148,388	69	85,897	113	164,846
Nebraska.....	435	399,056	257	329,046	261	309,257
Nevada.....	87	113,677	149	308,387	187	302,509
New Hampshire.....	170	199,665	355	445,075	293	449,196
New Jersey.....	870	916,714	1,951	2,661,435	2,053	3,337,173
New Mexico.....	55	63,126	81	167,483	178	276,721
New York.....	2,081	3,095,472	4,085	7,360,793	4,804	9,471,609
North Carolina.....	414	472,179	916	1,429,512	1,087	1,703,424
North Dakota.....	206	191,793	71	74,054	135	132,306
Ohio.....	1,112	1,175,303	1,645	2,108,787	1,732	2,536,595
Oklahoma.....	535	562,501	542	703,345	457	744,935
Oregon.....	355	328,672	350	458,050	366	501,728
Pennsylvania.....	1,280	1,370,197	1,748	2,609,632	2,214	3,929,922
Rhode Island.....	80	77,114	112	148,164	198	305,825
South Carolina.....	192	209,375	287	482,229	587	750,390
South Dakota.....	85	72,654	75	69,923	164	155,752
Tennessee.....	285	331,406	494	714,349	540	1,130,340
Texas.....	2,307	2,919,663	2,717	4,141,446	2,463	4,407,090
Utah.....	171	501,452	104	126,166	176	281,123
Vermont.....	55	57,546	85	141,446	83	114,426
Virginia.....	398	484,464	987	1,535,789	1,138	2,131,613
Washington.....	409	392,161	473	671,184	715	1,396,739
West Virginia.....	94	100,290	159	313,193	274	330,687
Wisconsin.....	365	407,428	566	764,807	579	1,067,415
Wyoming.....	202	176,508	88	99,100	114	158,074
Other areas.....	69	105,152	54	76,908	51	162,401

¹The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

Table 4B.--Number of Decedents and Size of Gross Estate, by State for All Returns with Total Gross Estates of at least \$600,000 in Constant 1987 Dollars

(Money amounts are in thousands)

State of residence	Filing year					
	1966		1970		1977	
	Number	Amount	Number	Amount	Number	Amount
Total.....	32,996	59,078,199	36,343	63,884,340	32,994	52,449,189
Alabama.....	280	529,225	300	415,565	352	526,104
Alaska.....	9	10,867	27	28,766	26	38,975
Arizona.....	232	384,374	289	421,267	319	415,389
Arkansas.....	197	278,702	268	317,678	257	316,093
California.....	3,710	6,886,946	4,126	7,510,535	3,368	6,938,062
Colorado.....	332	550,300	400	624,034	361	510,862
Connecticut.....	785	1,806,012	919	2,085,788	677	1,133,609
Delaware.....	117	344,968	142	542,171	103	117,917
Florida.....	1,462	2,326,771	1,874	3,271,963	2,339	3,609,547
Georgia.....	402	695,180	570	866,674	580	866,179
Hawaii.....	69	140,777	128	189,541	91	134,484
Idaho.....	82	99,122	86	93,726	100	115,418
Illinois.....	2,391	4,037,716	2,304	3,673,987	2,816	3,912,676
Indiana.....	655	841,180	777	1,044,002	852	1,539,360
Iowa.....	551	666,869	707	756,379	918	991,039
Kansas.....	504	630,887	548	688,141	593	825,937
Kentucky.....	395	541,523	416	760,053	355	497,100
Louisiana.....	274	430,834	351	469,738	323	470,891
Maine.....	191	309,285	206	332,659	125	177,515
Maryland.....	884	1,588,949	939	1,733,365	822	1,129,757
Massachusetts.....	1,118	2,150,982	1,223	2,419,231	783	1,157,277
Michigan.....	1,136	1,827,225	1,243	2,070,321	929	1,649,838
Minnesota.....	500	847,781	559	882,774	503	636,761
Mississippi.....	185	259,537	261	356,943	226	293,221
Missouri.....	763	1,458,577	890	1,221,251	826	1,254,446
Montana.....	143	159,224	159	175,172	125	168,775
Nebraska.....	350	453,305	411	464,822	483	607,805
Nevada.....	68	180,262	90	145,411	69	464,726
New Hampshire.....	123	239,933	140	237,961	144	192,414
New Jersey.....	1,462	2,552,370	1,446	2,456,027	1,160	1,666,396
New Mexico.....	90	179,933	96	166,872	86	134,752
New York.....	4,409	9,983,042	4,396	11,268,603	2,930	5,709,918
North Carolina.....	516	768,544	705	1,103,089	606	856,046
North Dakota.....	100	110,088	102	105,875	154	147,168
Ohio.....	1,621	2,915,749	1,704	2,972,133	1,440	2,219,388
Oklahoma.....	371	684,356	427	629,792	457	704,659
Oregon.....	284	398,103	325	506,456	310	387,434
Pennsylvania.....	2,043	3,601,409	2,175	3,712,197	1,613	2,410,389
Rhode Island.....	180	406,091	160	442,860	134	211,111
South Carolina.....	233	349,748	240	370,563	280	399,566
South Dakota.....	90	115,474	106	112,033	146	147,755
Tennessee.....	384	573,100	468	759,356	483	1,050,270
Texas.....	1,120	2,240,332	1,363	2,168,927	1,491	2,495,985
Utah.....	78	127,253	76	93,250	94	116,220
Vermont.....	95	165,902	77	134,193	63	90,422
Virginia.....	597	1,001,989	602	967,276	709	996,940
Washington.....	432	686,351	488	684,648	449	601,359
West Virginia.....	182	278,219	168	206,380	153	213,746
Wisconsin.....	647	892,077	703	952,199	542	824,667
Wyoming.....	69	80,277	91	126,971	110	132,057
Other areas.....	79	290,481	71	144,720	120	240,764

Footnotes at end of tables

Table 4B.—Number of Decedents and Size of Gross Estate, by State for All Returns with Total Gross Estates of at least \$600,000 in Constant 1987 Dollars—Continued

(Money amounts are in thousands)

State of residence	Filing year					
	1983 ¹		1987		1990	
	Number	Amount	Number	Amount	Number	Amount
Total	28,452	44,390,833	42,274	72,716,133	49,850	86,229,543
Alabama.....	244	347,456	419	759,075	439	755,992
Alaska.....	25	41,362	46	79,314	91	125,294
Arizona.....	485	654,947	629	1,083,780	493	752,391
Arkansas.....	190	273,418	160	319,004	243	399,507
California.....	2,026	4,013,411	6,538	11,011,120	8,896	15,108,402
Colorado.....	478	902,587	449	658,231	582	775,805
Connecticut.....	718	1,314,981	995	1,826,059	1,251	1,972,556
Delaware.....	63	94,493	84	124,349	163	260,994
Florida.....	3,074	4,979,290	3,682	7,506,489	4,299	9,711,148
Georgia.....	378	612,713	871	2,080,184	830	1,438,107
Hawaii.....	30	45,633	114	202,255	326	559,545
Idaho.....	71	94,301	86	119,398	118	150,034
Illinois.....	2,038	2,980,016	2,274	3,657,004	2,473	4,018,036
Indiana.....	436	649,159	539	830,901	688	1,276,788
Iowa.....	896	860,388	434	547,011	672	735,186
Kansas.....	544	908,134	376	610,750	427	619,388
Kentucky.....	225	367,292	471	727,789	494	798,000
Louisiana.....	326	527,349	438	634,345	395	590,558
Maine.....	91	137,765	177	235,603	263	382,370
Maryland.....	646	966,224	896	1,662,703	1,209	2,234,027
Massachusetts.....	647	965,734	1,522	2,273,320	1,519	2,368,774
Michigan.....	891	1,229,207	888	1,418,529	1,062	1,633,823
Minnesota.....	449	608,731	581	965,485	709	1,074,277
Mississippi.....	173	203,173	240	331,426	255	391,366
Missouri.....	882	1,368,121	947	1,736,737	994	1,890,738
Montana.....	117	191,889	69	95,950	113	165,416
Nebraska.....	435	512,851	257	367,766	261	309,005
Nevada.....	87	147,251	149	347,215	187	303,855
New Hampshire.....	170	252,594	355	492,161	293	446,749
New Jersey.....	870	1,181,319	1,951	2,980,166	2,053	3,347,957
New Mexico.....	55	81,494	81	187,447	178	273,629
New York.....	2,081	4,023,004	4,085	8,232,356	4,804	9,494,895
North Carolina.....	414	610,643	916	1,592,458	1,087	1,695,551
North Dakota.....	206	244,020	71	83,065	135	132,293
Ohio.....	1,112	1,520,279	1,645	2,349,125	1,732	2,521,957
Oklahoma.....	535	726,113	542	782,336	457	745,442
Oregon.....	355	421,264	350	509,020	366	497,900
Pennsylvania.....	1,280	1,759,713	1,748	2,914,843	2,214	3,909,513
Rhode Island.....	80	99,889	112	165,646	198	303,771
South Carolina.....	192	271,155	287	539,180	587	746,443
South Dakota.....	85	94,111	75	78,302	164	153,329
Tennessee.....	285	429,250	494	796,226	540	1,126,641
Texas.....	2,307	3,785,748	2,717	4,636,537	2,463	4,398,789
Utah.....	171	633,133	104	141,455	176	282,998
Vermont.....	55	74,586	85	156,677	83	114,173
Virginia.....	398	625,081	987	1,713,990	1,138	2,126,552
Washington.....	409	508,339	473	750,012	715	1,397,711
West Virginia.....	94	129,909	159	348,438	274	328,030
Wisconsin.....	365	527,972	566	857,005	579	1,061,497
Wyoming.....	202	259,040	88	111,197	114	157,093
Other areas.....	69	134,306	54	86,701	51	165,252

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

Table 5A.--Regional Comparisons of Total Gross Estate, Selected Years in Current Dollars

(Money amounts are in thousands)

Filing year	Size of gross estate	Total gross estate					
		Total		Sunbelt		Frostbelt	
		Number	Amount	Number	Amount	Number	Amount
1963	Total	78,393	17,007,239	(²)	(²)	(²)	(²)
	Under 1 million	76,624	12,752,480	(²)	(²)	(²)	(²)
	1 under 5 million	1,635	3,004,563	(²)	(²)	(²)	(²)
	5 million or more	134	1,250,196	(²)	(²)	(²)	(²)
1966	Total	97,321	21,810,404	30,687	7,036,084	66,634	14,774,320
	Under 1 million	94,919	15,927,072	29,928	5,215,312	64,991	10,711,760
	1 under 5 million	2,220	4,027,754	708	1,268,181	1,512	2,759,573
	5 million or more	182	1,855,578	51	552,591	131	1,302,987
1970	Total	133,348	29,537,830	43,600	9,861,679	89,748	19,676,151
	Under 1 million	130,518	21,767,992	42,587	7,464,507	87,931	14,303,485
	1 under 5 million	2,595	4,731,270	945	1,744,888	1,650	2,986,382
	5 million or more	235	3,038,568	68	652,284	167	2,386,284
1973	Total	175,289	38,677,415	(²)	(²)	(²)	(²)
	Under 1 million	171,265	28,460,249	(²)	(²)	(²)	(²)
	1 under 5 million	3,708	6,759,142	(²)	(²)	(²)	(²)
	5 million or more	316	3,458,025	(²)	(²)	(²)	(²)
1977	Total	200,732	48,198,807	71,878	18,800,503	128,854	29,398,303
	Under 1 million	196,208	36,195,485	70,057	13,311,590	126,151	22,883,894
	1 under 5 million	4,209	7,485,289	1,681	2,981,107	2,528	4,504,181
	5 million or more	315	4,518,033	140	2,507,805	175	2,010,227
1983 ¹	Total	56,518	44,651,851	22,569	18,805,232	33,949	25,846,619
	Under 1 million	48,443	23,662,394	19,161	9,558,427	29,281	14,103,967
	1 under 5 million	7,470	13,314,505	3,131	5,588,751	4,339	7,725,754
	5 million or more	605	7,674,952	276	3,658,054	329	4,016,898
1987	Total	45,113	66,564,120	21,094	32,462,964	24,019	34,101,156
	Under 1 million	27,694	19,420,108	12,542	8,836,035	15,152	10,584,073
	1 under 5 million	15,935	29,165,353	7,783	14,207,392	8,152	14,957,961
	5 million or more	1,484	17,978,658	769	9,419,538	715	8,559,121
1990	Total	53,168	88,146,916	25,276	43,290,533	27,891	44,856,383
	Under 1 million	29,081	21,596,049	13,615	10,108,692	15,466	11,487,356
	1 under 5 million	22,078	39,766,990	10,642	19,377,639	11,436	20,389,351
	5 million or more	2,009	26,783,877	1,019	13,804,202	990	12,979,675

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

² Data not available.

Table 5B.—Regional Comparisons of Total Gross Estate, Selected Years for Returns with Total Gross Estates of at least \$600,000 in Constant 1987 dollars

(Money amounts are in thousands)

Filing year	Size of gross estate	Total gross estate					
		Total		Sunbelt		Frostbelt	
		Number	Amount	Number	Amount	Number	Amount
1963	Total	28,446	49,371,101	(²)	(²)	(²)	(²)
	Under 1 million	14,551	11,083,068	(²)	(²)	(²)	(²)
	1 under 5 million	12,600	23,264,589	(²)	(²)	(²)	(²)
	5 million or more	1,295	15,023,445	(²)	(²)	(²)	(²)
1966	Total	32,996	59,078,199	11,143	19,478,299	21,853	39,599,900
	Under 1 million	16,593	12,626,670	5,557	4,230,203	11,036	8,396,467
	1 under 5 million	14,841	27,742,358	5,100	9,502,748	9,741	18,239,610
	5 million or more	1,562	18,709,172	486	5,745,348	1,076	12,963,824
1970	Total	36,343	63,884,340	13,141	21,844,571	23,202	42,039,769
	Under 1 million	18,885	14,338,067	6,787	5,169,223	12,098	9,168,844
	1 under 5 million	15,982	29,358,536	5,838	10,772,492	10,144	18,586,045
	5 million or more	1,476	20,187,736	517	5,902,856	959	14,284,881
1973	Total	37,266	64,055,986	(²)	(²)	(²)	(²)
	Under 1 million	19,610	14,822,268	(²)	(²)	(²)	(²)
	1 under 5 million	16,050	29,781,267	(²)	(²)	(²)	(²)
	5 million or more	1,606	19,452,451	(²)	(²)	(²)	(²)
1977	Total	32,994	52,449,189	12,739	22,029,528	20,255	30,419,661
	Under 1 million	18,506	14,051,521	6,978	5,304,125	11,528	8,747,396
	1 under 5 million	13,431	23,991,484	5,326	9,530,510	8,105	14,460,974
	5 million or more	1,058	14,406,185	436	7,194,893	622	7,211,292
1983 ¹	Total	28,452	44,390,833	11,915	19,360,157	16,538	25,030,675
	Under 1 million	15,693	11,957,483	6,324	4,877,026	9,369	7,080,457
	1 under 5 million	11,840	20,690,910	5,121	8,612,733	6,719	12,078,177
	5 million or more	919	11,742,440	470	5,870,399	449	5,872,041
1987	Total	42,274	72,716,133	19,912	35,610,171	22,362	37,105,963
	Under 1 million	21,721	16,750,188	9,881	7,650,348	11,840	9,099,840
	1 under 5 million	18,731	34,089,767	9,089	16,517,673	9,642	17,572,094
	5 million or more	1,822	21,876,179	942	11,442,150	880	10,434,029
1990	Total	49,850	86,229,543	23,620	42,366,375	26,230	43,863,168
	Under 1 million	25,933	19,828,961	12,022	9,203,666	13,911	10,625,295
	1 under 5 million	21,902	39,533,103	10,571	19,273,430	11,331	20,259,672
	5 million or more	2,015	26,867,480	1,027	13,889,279	988	12,978,201

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

² Data not available.

CHAPTER 2

Charitable Bequests

Introduced by Daniel Skelly

Statistics of Income (SOI) periodically collects data and publishes statistical analyses of estate tax returns. The Form 706, *Estate Tax Return*, provides information on charitable bequests, portfolio composition, and other data on decedents and their beneficiaries. Wealth, tax rates, age, and marital status are thought to be important indicators of giving at death [1]. These factors, as well as individual values and beliefs, predispose individuals to make charitable bequests. Tax incentives can also affect the amount given as well as the timing and type of bequests. During the 1980's, for example, charitable bequests as a percentage of gross estate remained in the range of six percent.

Total giving to charities in 1990 was nearly \$123 billion, or about two percent of the Gross National Product (AAFRC, 1987: *Giving USA: Estimates of Philanthropic Giving in 1986 and the Trends They Show*). The majority of these gifts were by individuals, both directly (83.1 percent) and through bequests (6.4 percent). Total bequests to charities amounted to \$7.8 billion in 1986.

There are three papers in this section that focus on the charitable bequests. The Steuerle study examines patterns of giving among wealthy individuals. It looks at income tax returns of decedents just prior to death (one or two years prior to death). Steuerle examines the relationship between charitable giving and income, and charitable giving and wealth. He finds that top wealthholders tend to give away only a tiny percentage of wealth during their lifetime.

One important inference is that wealth seems to play only a limited role in determining the amount given during one's lifetime, except to the extent that it increases realized income. Wealth, on the other hand, is an important determinant of charitable bequests. Those with greater amounts of wealth tend to give both greater absolute amounts and larger percentages of their estates to charitable causes.

The article by Johnson and Rosenfeld examines social and economic factors that affect charitable giving, particularly those factors that may influence an individual's decision to make a charitable bequest. The presence of a surviving spouse and other dependents compete directly with charities as beneficiaries. This is demonstrated by the importance of marital status and, to a lesser degree, age, as determinants of charitable giving. Decedents with higher net worth are better able to meet these competing needs. The sex of the decedent plays a role as well. Tax policy also plays a significant role in determining the timing and form of gifts and affects the amount given. Specifically, a variety of psychological and social influences seem to play a large role.

The paper by Joulfaian examines the role of the estate tax in influencing both the amount as well as the diversification of charitable bequests for wealthy individuals. The paper focuses on the pattern of aggregate charitable bequests, bequests to certain categories of charitable organizations, as well as the effect of the estate tax deduction on the different categories of charitable bequests. Data show that bequests generally benefit, at most, one or two categories of charitable organizations. The findings suggest higher tax rates induce more giving and increase the number of categories of charitable bequests. The results also indicate that the pattern of bequests is influenced by terminal wealth and its composition, and by marital status, age and gender.

1 Joulfaian, D. "Charitable Bequests and Estate Taxes," *National Tax Journal*, 1991 and Johnson, B. and Rosenfeld, J. "Examining the Factors that Affect Charitable Giving." *Trusts and Estates*, August 1991.

Charitable Giving Patterns of the Wealthy

by C. Eugene Steuerle, Ph.D.*

Although a fair amount of research has been done on the relationship of charitable giving to individual income, much less is known about the relationship of giving to wealth.¹ Few data are available on the charitable donations of the wealthy, especially the relationship of their lifetime giving to giving via bequest. The combined patterns of lifetime giving and bequests reveal some of the motivations behind individual charitable activity, especially by those who held significant wealth at the time of their death.

This study examines patterns of giving among wealthy individuals. The principal data are a sample of 4,143 estate tax returns filed in 1977 (for deaths generally in 1976 and 1977), matched with the income tax returns of decedents in years just prior to death, from 1974 through 1976. Each estate generally had assets worth \$60,000 or more (\$120,000 or more for decedents dying in 1977).

The 4,143 estate tax returns used for this study constitute 1 out of 10 of the more than 41,000 returns used in *Statistics of Income-Estate Tax Returns* (U.S. Department of the Treasury, Internal Revenue, 1979) and for related wealth studies (Schwartz, 1983). In many cases, however, matching income tax returns could not be found or were not filed for these decedents. In addition, since

information on charitable giving during life was to be examined, only returns filed by itemizers were often useful. This study, therefore, usually focused attention on those decedents from whom there was available income tax information from the year prior to death or on persons in this latter group who actually itemized.

Under ideal conditions, one would want to examine a data set that was free of measurement errors, possible sample selection bias, and similar statistical problems. Unfortunately, no such data on wealth-holders exist. Instead, capital income reported on income tax returns or in surveys is poorly measured, perhaps much worse than wealth reported on estate tax returns. The data used in this study also have several limitations. First, accounting for wealth takes place in a period different from that in which income tax returns are filed. Charitable giving in one year is thus compared to wealthholding in the following year (at the time of death). Wealth transfers, consumption out of wealth, or wealth accumulation out of income could have occurred between the points at which measurements were made. Moreover, charitable giving in the year prior to death may be atypical.

For tax accounting reasons, wealth is also likely to be understated. Valuations for estate tax purposes are typically low for reported assets, especially businesses, farms, houses, and other non-liquid or infrequently traded assets. Estimates must be reasonable, but there is a strong incentive to provide the lowest among available choices. In addition, much wealth from life insurance or pensions does not pass through estates, so estimates of value of estates and inheritances are often understated. Finally, estate tax returns reveal only the wealth of the decedent; in cases where comparisons are made with income tax returns of joint filers, the wealth (and charitable bequests) of only one spouse are contrasted with the annual lifetime charitable giving of both spouses.²

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¹ Wealth data actually improves our understanding of the relationship of giving to income. Previous research (Steuerle, 1985a) has indicated that the relationship of realized, and therefore measurable, income to wealth is poor and that most real income from capital is not recognized by individuals. As a consequence, most existing research on the relationship of giving to income must make use of an income measure that understates true economic income.

² Unless otherwise noted, charitable giving made at death will be referred to specifically as "charitable bequests" whereas the term "charitable contributions" will

TABLE 7-1.
DECEDENTS' (PRIOR YEAR) CHARITABLE CONTRIBUTIONS AS A PERCENTAGE
OF GROSS INCOME SUBJECT TO TAX (GIST) BY
SIZE OF GIST AND BY SIZE OF NET WORTH

GIST	Total number contributing	Charitable contributions (\$000)	GIST (\$000)	% Charitable contributions/GIST
Zero or negative	53	8.5	-4,284	—
\$1-\$2,499	77	2.5	107	2.3
\$2,500-\$4,999	177	10.8	678	1.6
\$5,000-\$7,499	260	41.3	1,622	2.6
\$7,500-\$9,999	227	61.8	1,967	3.1
\$10,000-\$14,999	377	92.9	4,712	2.0
\$15,000-\$19,999	299	141.8	5,213	2.7
\$20,000-\$29,999	429	262.2	10,546	2.5
\$30,000-\$49,999	497	668.1	19,412	3.4
\$50,000-\$99,999	351	862.2	23,937	3.6
\$100,000 or More	177	3,983.2	36,498	10.9
Total all classes	2,924	6,135.3	100,408	6.1

PATTERNS OF GIVING

As indicated in Table 7-1, charitable giving as a percentage of income tends to decrease as income increases, but it increases once income rises above middle-income levels.³ A contrast of charitable bequests with net worth also tends to show a slight U-shaped pattern (Table 7-2). Thus, giving relative to net worth declines slightly as net worth increases toward \$500,000, then rises significantly as net worth increases. The wealthiest decedents -- those with \$2.5 million or more of net worth -- have by far the highest rate of giving, donating almost one-fifth of their net worth to charity.

TABLE 7-2.
CHARITABLE BEQUESTS AND NET WORTH

Amount of net worth	Total number	Charitable bequests (\$ millions)	Total net worth (\$ millions)	% Charitable bequests/net worth
<\$100,000	578	5.3	36.1	14.8
\$100,000-\$249,999	990	5.3	161.9	3.3
\$250,000-\$499,999	476	4.0	170.1	2.4
\$500,000-\$999,999	601	17.1	406.6	4.2
\$1,000,000-\$2,499,999	231	25.0	335.3	7.5
\$2,500,000 or more	48	80.6	414.8	19.4
All net worth classes	2,924	137.3	1,524.6	9.0

Tables 7-1 and 7-2 confirm information that is available from separately published statistics on income and estate tax returns. A more useful and

refer to the annual contributions made during the year before death of the decedent.

³ The data show results somewhat similar to those found in earlier studies of charitable contributions (see Clotfelter and Steuerle, 1981).

original contrast can be made among estate tax returns with itemized deductions in the year prior to death and other populations of returns. Table 7-3 presents estimates for four different groups of returns on which deductions were itemized, mainly in 1975: first, those from the estate-income match with \$120,000 or more in assets; second, all decedents with \$120,000 or more in assets (the estate tax population); third, all top wealthholders (defined as all living persons holding assets valued at \$120,000 or more); and, fourth, all returns, regardless of wealth, that itemized deductions in 1975.⁴

Reading across Table 7-3 from the estate-income match toward the population of all itemizers, average income and average wealth fall. The rate of giving also drops, although the difference in rates of giving between top wealthholders and all itemizers (3.6 percent and 2.9 percent, respectively) is perhaps not as much as one might have suspected. Some differences, such as the rates of giving of estate tax returns as opposed to those of all top wealthholders, should be attributed to differences in average age. At given income and tax rates, the elderly have been shown to give more than younger groups.

Another revealing statistic from Table 7-3 (similar statistics can also be derived by comparing Tables 7-1 and 7-2) is that top wealthholders tend to give away only a tiny percentage of wealth during their lifetimes. Contributions represent slightly less than 1/2 of 1 percent (between 0.41 percent and 0.46 percent) of net worth. This relatively small amount

⁴ To obtain the second and third groups, returns in the estate-income match are actually "reweighted." In the former case, recall that each return in the estate-income match actually represents (or is selected from) a much larger group of estate tax returns. In the latter case, a technique referred to as the estate multiplier is used, and each deceased person of a given age is taken to represent a portion of the living population, with the weight or number of persons so represented being determined by the probability of dying at that age. By using this technique, we are able to derive estimates of the wealth and charitable contributions of all top wealthholders, not just those who have died in a particular year. As can be seen in the table, for instance, the wealthy have net worth in excess of \$1 trillion, whereas the wealthy who filed estate tax returns in 1977 have net worth of only about \$19 billion.

TABLE 7-3.
CHARITABLE GIVING FOR VARIOUS POPULATIONS OF ITEMIZERS

	Estate income file ^a	Estate tax returns ^a	All top wealthholders ^a	All returns itemizing in 1975 ^a
Total (\$ million)				
Annual charitable contributions	5.8	84.6	4,351	15,343
Charitable bequests	122	1,409	—	—
Adjusted gross income	78.7	1,573	127,019	532,611
Net worth	1,240	19,146	1,091,960	—
Number of tax returns	1,541	48,350	4,063,740	26,074,061
Average per return (\$)				
Annual Charitable contributions	3,764	1,750	1,115	590
Charitable bequests	79,169	29,141	—	—
Adjusted gross income	51,071	32,534	31,257	20,427
Net worth	804,672	395,988	268,708	—
Rates of Giving (%)				
Contributions/AGI	7.4	5.4	3.6	2.9
Contributions/net worth	0.46	0.44	0.41	—

^a Restricted to estate tax returns with \$120,000 or more of gross estate.

TABLE 7-4.
CHARITABLE BEQUESTS (ESTATE TAX) AS A MULTIPLE OF CHARITABLE CONTRIBUTIONS (INCOME TAX), IN THOUSANDS OF DOLLARS

Size of charitable contributions	Number	Charitable contributions	Estate tax bequests	
			Total	As a multiple of contributions
Nonitemizers	1,035	—	10,243	—
No contributions	212	—	7,558	—
\$1-\$249	388	47	7,360	156.5
\$250-\$499	308	110	2,781	25.2
\$500-\$999	359	252	8,715	34.6
\$1,000-\$2,499	342	550	8,096	14.7
\$2,500-\$4,999	132	461	4,974	10.8
\$5,000-\$9,999	75	494	22,819	46.2
\$10,000-\$24,999	49	715	9,952	13.9
\$25,000 or more	24	3,506	54,841	15.6
Total all classes	2,924	6,135	137,338	22.4

⁵ In another study for this project, Boris has found that, at least for gifts to foundations, the ratio for lifetime giving to bequests tended to be higher in the years before 1970.

is fairly constant among the different categories of wealthholders shown in the table.

Table 7-4 compares charitable bequests with charitable contributions listed on income tax returns in the year prior to death. In the aggregate, charitable bequests represent over 20 times the amount of charitable contributions in a single year.⁵ At first, one might suspect that this ratio would be high only for those taxpayers who had been less generous than average during their lifetimes. The ratios of charitable bequests to charitable giving, however, are high

⁵ In another study for this project, Boris has found that, at least for gifts to foundations, the ratio for lifetime giving to bequests tended to be higher in the years before 1970.

even for those taxpayers who appear to have been relatively generous during their lifetimes. Those who gave more than \$25,000 in annual gifts, for instance, fall into the classification of the most generous of lifetime givers, yet even they gave 15.6 times as much in the year of their death as during the previous year. Although not shown in Table 7-4, this phenomenon is not confined to the year prior to death. When returns from two years prior to the respondent's death are examined, a similar result is obtained.⁶

One important inference from Tables 7-3 and 7-4 is that wealth seems to play only a limited role in determining the amount given during one's life, except perhaps to the extent that it increases realized income. Nonetheless, it is an important determinant of charitable bequests, as those with greater amounts of wealth tend to give both greater absolute amounts and larger percentages of their estates to charitable causes.

TABLE 7-5.
DISTRIBUTION OF PERSONS BY SIZE OF CHARITABLE CONTRIBUTIONS AND CHARITABLE BEQUESTS

Size of charitable contributions	No charitable bequests	Size of charitable bequests				Total
		\$1-\$50,000	\$50,000-\$250,000	\$250,000-\$1 million	\$1 million or more	
No charitable contributions or nonitemizers	1,075	125	30	14	3	1,247 ^a
\$1-\$999	881	128	30	12	4	1,055
\$1,000-\$9,999	419	89	22	13	6	549
\$10,000-\$24,999	23	11	6	6	3	49
\$25,000 or more	11	2	4	2	5	24
Total	2,409	355	92	47	21	2,924

^a Includes 1,035 nonitemizers

Table 7-5 displays the distribution of charitable amounts given during life by size of charitable bequests. Many persons who are very generous in death can clearly be seen to have given little or nothing in the way of lifetime gifts. For instance, 13 of 21 persons bequeathing \$1 million or more to charity actually gave less than \$10,000 in annual

⁶ This is the only way that one can check whether giving in the year before death displays any peculiar pattern. No further information is available on total lifetime patterns of giving or even on giving several years before death.

gifts.⁷ In contrast, many who were relatively generous during life made few or no contributions at time of death. Thus, of the 24 individuals who contributed more than \$25,000 in annual giving, 11 made no charitable bequests whatsoever.

Table 7-6 presents charitable contributions and bequests as percentages of income and net worth, rather than in dollar amounts. The result of both Tables 7-5 and 7-6 are broadly similar. For instance, of 32 persons who made annual contributions of over 40 percent of their income, 19 left no charitable bequests. At least in percentage terms, however, Table 7-6 indicates that givers may be more likely to give a high percentage of their estate than of their income to charity. Thus, 101 (or 3.4 percent of these returns) gave away 40 percent or more of net worth at death, but only 32 (or 1.1 percent) gave away more than 40 percent of income.⁸

TABLE 7-6.

DISTRIBUTION OF PERSONS BY CHARITABLE CONTRIBUTIONS AS A PERCENTAGE OF INCOME AND CHARITABLE BEQUESTS AS A PERCENTAGE OF NET WORTH*

Charitable contributions as % of income	No charitable bequests	Charitable bequests as % of net worth				Total
		0.01-3.00	3.01-20.00	20.01-40.00	40.00 or More	
No charitable contributions or nonitemizers	1,075	97	26	11	38	1,247*
0.01-3.00	834	90	23	9	29	985
3.01-20.00	450	79	39	12	22	602
20.01-40.00	31	3	7	2	7	50
40.00 or more	19	4	3	1	5	32
Total	2,409	273	98	35	101	2,916^b

* Income is measured by gross income subject to tax.

^a Includes 1,035 nonitemizers.

^b Total differs slightly from Table V because returns reporting positive charitable contributions and negative income are excluded from this table.

Both Tables 7-5 and 7-6 confirm that the pattern of large bequests and small annual contributions is the prevalent behavior for most taxpayers who make large bequests. Thus, lifetime giving and bequest giving are not great predictors of each other.

⁷ Nonitemizers give less than \$2,600 to charity -- the maximum standard deduction in 1975 -- or else they would itemize.

⁸ Of returns reporting both positive contributions and positive bequests (thus excluding both nonitemizers and those not adequately planning for death), the ratio is roughly similar: 63 with bequests of 40 percent or more of net worth by only 13 with contributions of 40 percent or more of income.

ECONOMETRIC RESULTS

Table 7-7 represents a more rigorous analysis of lifetime giving. Some common econometric techniques are used to explain charitable contributions reported on income tax returns.⁹ Income, price of giving, and other dependent and independent variables are defined in roughly the same way as is in many recent econometric studies. The principal difference between this study and most previous studies is that net worth is added as a variable.

TABLE 7-7.
EQUATIONS EXPLAINING CHARITABLE CONTRIBUTIONS[†] REPORTED ON INCOME TAX RETURNS

Independent variables	Equation					
	1	2	3	4	5	6
ϵ_n Net worth			.09 (.05)			-.07 (.07)
ϵ_n Price		-2.15* (.24)	-2.04* (.25)		-2.47 (.20)	-2.44 (.20)
ϵ_n Realized income	.98* (.05)	.41* (.08)	.37* (.08)			
ϵ_n Economic income				.82* (.05)	.28* (.06)	.36* (.10)
Married	-.55* (.10)	-.58* (.10)	-.60* (.10)	-.67* (.11)	-.62* (.10)	-.61* (.10)
Dependents	.33* (.12)	.37* (.12)	.37* (.12)	.30* (.13)	.36* (.12)	.34* (.12)
Age unknown	1.51* (.65)	1.32* (.63)	1.20 (.63)	1.35* (.66)	1.22 (.63)	1.29* (.64)
Age between 35 and 49	.12 (.51)	-.001 (.50)	-.06 (.50)	-.01 (.52)	-.06 (.50)	-.02 (.50)
Age between 50 and 64	.48 (.48)	.32 (.47)	.25 (.47)	.45 (.49)	.27 (.47)	.33 (.47)
Age 65 or over	.76 (.48)	.63 (.47)	.53 (.47)	.92 (.49)	.66 (.47)	.75 (.48)
Intercept	-4.47	.442	-2.36	-3.13	1.46	1.57
r ²	.241	.280	.282	.206	.277	.278

[†] Standard errors are shown in parentheses.

* Significant at the .05 level.

In equation 1 (Table 7-7), charitable contributions are defined as a function of income, age, marital status, and the presence of dependents, but not of price (or taxes) or net worth.¹⁰ The income measure used here, however, is not economic income but rather the income reported by the taxpayer on the tax return. Thus, this equation follows most previous studies of charitable giving by using the

⁹ See, for instance, Clotfelter and Steuerle (1981) and Feldstein and Taylor (1976).

¹⁰ Only 11 percent of itemizers had no contributions. As is typical in charitable studies with such a high percentage of positive givers, ordinary least square rather than a Tobit or similar regression technique was used.

amount of income realized or reported by the individual as the measure of income. Note that the coefficient for the income variable, 0.98, is very close to 1.00, implying that giving as a percentage of this realized income will stay fairly constant after controlling for age, marital status, and presence of dependents. For instance, if income increases from \$10,000 to \$100,000, the rate of giving would be predicted to fall less than 5 percent. When taxes (or price) are added to the model, however, the coefficient of income is decreased significantly, while the price coefficient increases in absolute value (see equation 2). This result is again consistent with previous studies. Because price and income are highly correlated, of course, interpretation is difficult, and it is always possible that the regression attributes to changes in price some of the effect of the changes in income and vice-versa.

Equation 3 goes one step further and adds net worth as a variable. The results are changed only trivially from equation 2, and the coefficient for net worth fails to meet the statistical test of significance at the .05 level. Even if significant, the size of the coefficient indicates that an increase in net worth, all other things being equal, would have only a small effect on charitable contributions. For instance, if net worth increased 20-fold from \$50,000 to \$1 million, giving would be predicted to increase only by 31 percent.

The low coefficient on net worth is actually quite similar to that obtained by Feldstein and Clotfelter (1976) in survey data from the 1963 and 1964 surveys conducted by the Board of Governors of the Federal Reserve System (coefficient = .095; standard error = .057). The coefficient on net worth obtained here is slightly higher than that obtained by Dye (1977), who used a 1974 national sample of household giving behavior of low- and middle-income taxpayers interviewed by the Survey Research Center at the University of Michigan (coefficient = .05; standard error = .01).¹¹ Although wealth and income from capital tend to be understated significantly in surveys, regressions run on these

data sets have tended nonetheless to show the same price and income elasticities as have similar regressions run on tax returns. Perhaps it is not surprising that the wealth elasticities would have the same tendency to be small or insignificant.

Because recognition of income from capital is largely a discretionary event (Steuerle, 1985b), recognized income from capital is actually a very poor measure of real income from capital. Much of the total return to capital, especially of top wealth-holders, is accrued in the form of unrecognized capital gains. In equations 4, 5, and 6, therefore, recognized income from capital is replaced with an estimate of the economic income from capital. The latter measure is obtained essentially by multiplying net worth by 5 percent and adding that income to labor income. Estimated income from capital is closer to an expected return from capital, as assets will fluctuate in value from year to year. Nonetheless, it is a more accurate measure of the well-being of the household than is a recognized income measure that is unadjusted for the presence of accrued capital gains and for the effect of inflation on the measure of income from capital.

When economic income is substituted for recognized income, the income elasticity tends to fall. In equation 4, the income elasticity is .82. Unlike equation 1, where the rate of giving out of income tends to stay constant, an elasticity of .82 implies that as income rises from \$10,000 to \$100,000, the rate of giving falls by over one third. Since there is no separate price variable in equations 1 and 4, the income elasticity really reflects the combined effect on charitable giving of both an increase in income and a likely increase in tax rates. Thus, when recognized income goes up, so do tax rates, while an increase in economic income, if not recognized, would involve no simultaneous increase in taxes. In equations 5 and 6, price is added back as a variable. When these equations are compared to equations 2 and 3, the price effect can be seen to be stronger in those equations that use economic income as a variable, while the income effect is somewhat weaker in equation 5. Equation 6 must be interpreted with caution since the economic income variable is measured in part from the net worth variable, so that one cannot really separate out the income from the net worth effect.

¹¹ Households did not report actual net worth in the Michigan survey, but only classified themselves as falling in certain groups.

The results demonstrate that individual lifetime giving may tend to be a function more of recognized income than of economic income. Individuals may be much more likely to give out of cash income than they are to give out of accrued gains in the value of corporate stock or land. By the same token, tax incentives from charitable giving do not apply to income that is never recognized.

In order to interpret further this data on charitable giving, Table 7-8 presents wealth and income information for the sample of top wealthholders. What becomes apparent almost immediately is that the ratio of income to wealth of top wealthholders declines significantly as wealth increases. Gross capital income subject to tax is only 2.2 percent of wealth for decedents with wealthholdings of \$2.5 million, while it is 5.9 percent of wealth for those with wealthholdings of \$250,000 to \$500,000. These results arise in large part because persons with lesser amounts of wealth often receive a greater percentage of their capital income in the form of interest and dividends. Those with greater amounts of wealth tend to hold real estate and corporate stock, and returns from these assets are often deferred or never realized for tax purposes.

What this declining ratio of income to wealth also suggests is that the difference between economic income and recognized income tends to increase as wealth increases. To the extent that individuals are more likely to give out of their recognized income, top wealthholders will be those who are most affected by the increasing gap between economic and recognized income.

Effect on Giving of Other Demographic Factors

Except for the effect of marriage, other variables in all the equations in Table 7-7 tend to show the same effects as those reported in previous econometric studies. Giving increases significantly with age. Since the estate-income match contains information on much more elderly individuals than do most surveys or samples of tax returns, the "age unknown" category is likely to be comprised primarily of persons aged 55 or older. Hence, the significance of the age coefficient for this group confirms a significant increase in giving with age, all other things being equal. Moreover, the coefficients for

other groups tend to increase with age, and their failure to be significant at the .05 level is probably simply a function of the limited number of returns of younger ages.

Giving also tends to increase with the presence of dependents, a result consistent with the notion that those with dependents are likely to give more because they or their children are involved with more institutions, such as schools or clubs. While marriage has a negative effect on giving, as opposed to the positive effect revealed in most previous studies, these other studies do not include so many elderly. A logical reconciliation of results is that, among nonelderly persons, marriage is likely to increase lifetime giving, but elderly persons are more likely to become more cautious with their giving if they are planning for the future care of their spouses.

CONCLUSIONS

This study reveals a number of patterns of charitable activity among top wealthholders. While top wealthholders as defined here comprise only a small part of the total population, they are the persons most likely to give large enough amounts to start new charities or foundations or to undertake new enterprises with existing charities. Several conclusions are particularly relevant for the charitable sector; giving by top wealthholders at death tends to be much larger than annual giving during life; wealth has only a limited effect on lifetime giving; and giving is more likely to take place out of realized income than out of economic income. These observations are consistent with each of the following hypotheses or explanations, none of which are mutually exclusive:

1. For the very wealthy, charitable giving may compete less with consumption than with wealthholding itself. Indeed, wealthholding confers such benefits on individuals that they reveal a willingness to pay additional taxes to hold onto wealth that most likely will never be consumed.
2. Many persons may not take maximum advantage of the tax laws, either because they are ignorant of opportunities available to them or because existing legal mechanisms for encouraging giving to charity are insufficient.

TABLE 7-8.

ALL DECEDENTS: GROSS CAPITAL INCOME SUBJECT TO TAX AS A PERCENTAGE OF WEALTH (IN THOUSANDS OF DOLLARS)

Size of Wealth	Total number	Average wealth	Average gross capital income	Gross capital income as a percentage of wealth	Gross capital income subject to tax as a % of wealth					
					Zero or negative			Under 3 percent		
					Number	Wealth	Gross capital income	Number	Wealth	Gross capital income
Under \$100,000	519	72	9	12.4	41	3,269	-43	120	9,620	140
\$100,000 under \$250,000	980	164	10	6.1	66	10,460	-140	263	42,429	547
\$250,000 under \$500,000	445	344	20	5.9	22	7,597	-139	102	35,261	532
\$500,000 under \$1,000,000	668	675	34	5.1	39	25,608	-775	168	114,206	1,273
\$1,000,000 under \$2,500,000	255	1,458	70	4.8	18	25,638	-144	75	110,868	1,656
\$2,500,000 or more	57	8,272	183	2.2	9	48,197	-578	23	314,916	1,211
All decedents	2,924	563	26	4.5	195	120,770	-2,116	751	627,302	5,361

Gross capital income subject to tax as % of wealth (continued)

Size of wealth	3 percent under 5 percent			5 percent under 7 percent			7 percent under 10 percent		
	Number	Wealth	Gross capital income	Number	Wealth	Gross capital income	Number	Wealth	Gross capital income
Under \$100,000	99	7,930	315	57	4,340	260	48	3,850	331
\$100,000 under \$250,000	235	39,291	1,541	161	27,583	1,623	98	15,943	1,360
\$250,000 under \$500,000	109	37,055	1,487	92	31,282	1,808	54	18,931	1,575
\$500,000 under \$1,000,000	204	139,757	5,692	119	78,818	4,628	70	47,243	3,852
\$1,000,000 under \$2,500,000	93	134,038	5,337	29	41,848	2,436	22	32,441	2,618
\$2,500,000 or more	14	71,788	2,591	7	24,838	1,462	2	6,128	507
All decedents	754	429,860	16,964	465	208,707	12,216	294	124,534	10,244

Gross capital income subject to tax as % of wealth (continued)

Size of wealth	10 percent under 15 percent			15 percent or more		
	Number	Wealth	Gross capital income	Number	Wealth	Gross capital income
Under \$100,000	42	2,968	358	112	5,192	3,237
\$100,000 under \$250,000	81	13,338	1,579	76	11,969	3,232
\$250,000 under \$500,000	40	14,490	1,716	26	8,398	1,916
\$500,000 under \$1,000,000	39	25,314	3,059	29	19,720	4,627
\$1,000,000 under \$2,500,000	11	17,137	1,925	7	9,790	3,999
\$2,500,000 or more	—	—	—	2	5,645	1,751
All decedents	213	73,247	8,636	252	60,716	18,761

3. Tax incentives are offset significantly, at least for top wealthholders, by the prior tax incentive not to recognize income in the first place.

Each of these possible explanations is discussed briefly in the paragraphs that follow.

Charitable Giving Versus Wealthholding.

At death, individuals can either give their assets to charity or to other individuals, but they can no longer consume their own wealth. Individuals who accrue substantial holdings often demonstrate that they are not likely to consume all their wealth during their lifetimes; they have chosen not to buy annuities or engage in other behavior that would maximize lifetime consumption and minimize their holdings at the time of their death. Many researchers would argue that such behavior indicates that the life cycle model provides only limited information on the ways in which individuals save and consume. For instance, the elderly as a group tend to increase, not decrease, their net worth as they age (Menchik and David, 1983). Even if one believes that the life cycle hypothesis explains the consumption behavior of most individuals, however, those with the greatest amount of wealth at death will be those for whom the hypothesis most likely will be inapplicable.

Seen in this light, lifetime charitable giving among top wealthholders must be viewed in part not as competing with consumption, but with the maintenance or accrual of wealth itself. This wealthholding provides increased power, prestige, control over existing assets or businesses, insurance over unforeseen events, and the option of making future decisions with respect to the transfer, investment, or disposition of the wealth.

The substantial increase in charitable giving at time of death is consistent with this notion. Many top wealthholders may be much more willing to make charitable bequests simply because wealth accumulation or retention is no longer an alternative. In effect, at death some transfer must be made either to charity or to other persons.

What makes this pattern of giving even more remarkable is that lifetime giving almost always has more tax advantages than posthumous giving. Both

income and estate taxes are lessened in the former case, whereas bequests involve only estate tax reduction. Additional income tax savings could be used to increase consumption without any decrease in total charitable contributions, or to increase total charitable contributions without any decrease in consumption. Put another way, the only benefit from the increased taxation is a lengthening of the period of time in which the person holds onto the wealth. Thus, wealthholding appears to confer advantages on persons other than increased consumption, either for themselves or for their heirs.

Taking Advantage of the Tax Laws

An alternate explanation of this same tax behavior is that individuals are either ignorant of the tax laws or that the existing mechanisms for taking advantage of these laws, such as provisions for trusts, are either inadequate or too costly to use. Ignorance of complicated tax laws is a common phenomenon that cannot be disregarded. Trusts may be costly to set up and may be avoided for this reason, especially by those with lesser amounts of wealth. Certainly many individuals, including some of the most wealthy, have been found to plan inadequately for their estates.

To the extent that this is true, it offers the prospect that additional efforts by the charitable sector could increase giving. Existing methods of approaching wealthy individuals may simply be inadequate. If charitable giving provides a sense of well-being to the giver, then perhaps it needs to be better "advertised" and "packaged." The dissemination of information about optimal tax planning may also be poor, inefficient, or expensive.

If persons hold onto wealth not only for future consumption, but also for the insurance, power, and security it brings, then existing legal vehicles for making donations to charity during one's lifetime may not adequately appeal to potential donors.

A charitable remainder trust, for instance, may be well geared to the consumption needs of a donor, but what if the potential donor has little concern with future consumption patterns and simply wants to maintain control over his wealth? Perhaps better forms of trust or legal vehicles could be developed to take care of the lifetime needs of the giver.

Charitable Incentives and the Recognition of Income

A third explanation for the charitable behavior revealed in this study is that lifetime giving is affected significantly by the tendency not to recognize income in the first place. Top wealthholders hold most of their assets in the form of corporate stock and real estate and do not recognize many of the returns from those investments. This may affect charitable giving in two ways. First, to the extent that charitable giving is more likely to take place out of cash and liquid assets, it may be reduced where the income from assets flows through in less liquid forms. Second, since recognition of capital income at the individual level is largely a discretionary event, tax incentives to give will only apply to that income for which such discretion is exercised. For income that is not recognized or is sheltered by artificial losses, the price effect is basically zero. For many taxpayers, therefore, the existing tax system may discourage the recognition of income so much that a charitable incentive applies only to a small portion of the true economic income of the taxpayer.

An example may help to clarify why tax incentives for lifetime charitable giving by the very wealthy may be minimal. According to Table 7-8, taxpayers with \$2.5 million or more of wealth recognize about 2.2 percent of wealth as gross capital income subject to tax. For a taxpayer with \$8.3 million of wealth, this implies income subject to tax of about \$180,000. Suppose other deductions and income offset each other, so that total income against which charitable deductions are allowed also equals \$180,000. Then the maximum amount of charitable contributions which can be given and still result in a current tax deduction is \$90,000, or only about 1 percent of wealth. For gifts of appreciated property or gifts to nonoperating foundations, the maximum tax incentives apply at even lower percentages of income.

In effect, taxes can induce individuals to give only to the extent that their income is taxable. Given the fact that many of the very wealthy realize only a small part of their capital income, there is only a limited income tax incentive for them to donate significant portions of their wealth to charity during their lifetimes.

The lifetime giving patterns of the wealthy might reasonably be explained by any of the three reasons offered here: the advantages of wealthholding itself, inadequate planning or ignorance of the tax laws, and limited lifetime incentives when income is not recognized in the first place. I would argue that all three are important and interact to explain the charitable giving patterns of the wealthy.

SUMMARY

Wealth is an important factor in deathtime giving, but it plays only a limited role in determining the amount of giving during life. The ratio of charitable bequests to charitable giving during a prior year of life is very high for all classes of wealthy taxpayers, both those who are generous during life and those who are not. Lifetime and deathtime giving, moreover, are not found to be great predictors of each other. Many with little lifetime giving are very generous at death, and many who are very generous during life give nothing out of their wealth at death.

Regression analysis confirms the weakness of net worth as an explanatory variable for lifetime giving. Taxes (price), income, age, and marital status, on the other hand, remain significant predictors. People are also more likely to give out of realized income than out of economic income. Giving out of realized income, of course, may be induced both because charitable deductions can reduce tax only to the extent that income is realized and because individuals may be more likely to give out of liquid than non-liquid assets.

There are three possible explanations for this observed pattern of giving by top wealthholders. First, wealthholding itself may confer on individuals substantial independent benefits such as increased options with respect to future decisions, insurance against unforeseen events, prestige, and control. In fact, many people demonstrate that they are willing to pay additional taxes to hold temporarily onto wealth that neither they nor their heirs will consume. Second, some persons may not take maximum advantage of the tax laws because of ignorance of the opportunities available to them or because of the inadequacy of existing legal mechanisms. Finally, existing income tax incentives to give are offset

significantly by the prior incentive not to recognize income in the first place.

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Charitable Bequests and Estate Taxes

by David Joulfain, Ph.D

ABSTRACT

This paper examines the effects of the estate tax on charitable bequests using estate tax records for decedents in 1986 filed during the years 1986 through 1988. It focuses on the pattern of aggregate charitable bequests, bequests to six categories of charitable organizations, as well as the effect of the estate tax deduction on the number of categories of charitable bequests. The findings suggest that higher tax rates induce more giving and increase the number of categories of bequests. The results also indicate that the pattern of bequests is influenced by the terminal wealth and its composition, and by marital status, age, and gender.

I. Introduction

CHARITABLE bequests are an important source of philanthropic support. About 700 of the estates of decedents in 1986 alone, for instance, contributed over \$175 million to the arts and humanities, or over one-half the combined budgets of the National Endowment for the Arts (NEA) and the National Endowment for the Humanities.¹ Despite their importance, relatively little attention has focused on the pattern and determinants of charitable bequests and the role of the estate tax.

The estate tax provides a deduction for charitable bequests. While there is some consensus regarding the effects of the personal income tax on charitable contributions², the evidence on the effects of the estate tax on charitable bequests is scant and mixed. There are three major questions that need to be addressed. First, what is the impact of the estate tax on the level of giving? Given that the Federal government provides a tax subsidy of over \$1.5 billion in the form of an estate tax deduction for charitable bequests,³ it is

important to evaluate whether the deduction induces additional giving. Second, how does the tax affect the pattern of giving to different types of charitable organizations? Finally, how does the tax system affect the number of categories of charitable bequests? This last question is particularly important in light of the striking empirical fact documented below that most bequests involve at most one or two types of organizations.

In this paper I analyze recent patterns of charitable bequests with an emphasis on its determinants and the observed incompleteness in giving. I focus on the estates of decedents in 1986 while the most recent studies focused on decedents in 1976 (Clotfelter 1985, p. 241) and Connecticut decedents in the 1930s and 1940s (Barthold and Plotnick 1984). Furthermore, I study the pattern of six categories of bequests. These include bequests to (1) the arts and humanities, (2) religious, (3) education, medical, and scientific research, (4) social welfare, (5) foundations, and (6) other types of donees. I also evaluate the effects of the estate tax on the number of categories of bequests.

The results support the view that the estate tax deduction stimulates charitable bequests. All categories of charitable bequests are found to be responsive to the estate tax. However, the results suggest that bequests to the arts and humanities, social welfare, and foundations are the least price responsive. Furthermore, the estate tax deduction also reduces the incompleteness in bequests in that the number of donees rises as the tax price declines. In addition, the results also show that bequests rise with wealth and age, and that women bequeath more than men.

II. Estate Tax and Other Determinants of Bequests

In a model of lifetime utility maximization, an individual's utility, with appropriate discounting, is determined by his

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own lifetime consumption (C_L), the consumption or endowment of relatives and heirs (C_H) which is determined by gifts (G) and inheritances (B) from parents, and the own-endowment of such relatives (W_H)⁴, charitable contributions (CC), and charitable bequests (CB).⁵

The parent's lifetime preferences can be presented by the following utility function:

$$U(C_L, C_H, CC, CB). \quad (1)$$

The individual faces a budget constraint which requires that the sum of consumption, gifts (G) and bequests to relatives (B), and charitable contributions and bequests not exceed the individual's lifetime wealth (W), or

$$P_L C_L + P_G G + P_B B + P_{CC} CC + P_{CB} CB \leq W. \quad (2)$$

The individual selects the amounts of consumption and transfers to relatives and charity by maximizing (1) subject to (2) and the heirs' budget constraint:

$$C_H \leq W_H + G + B. \quad (3)$$

Solving for the first-order conditions and invoking the implicit-function theorem yields the following equation for charitable bequests:⁶

$$CB = CB(P_L, P_G, P_B, P_{CC}, P_{CB}, W, W_H). \quad (4)$$

Given income tax rate t and estate and gift (unified transfer) tax rate e , and after setting the price of consumption to 1, the price variables are:

$$P_L = 1$$

$$P_G = 1 + e$$

$$P_B = (1 + \pi)[(1 - e)(1 + i)]^{-1}$$

$$P_{CC} = 1 - t$$

$$P_{CB} = (1 + \pi)(1 + i)^{-1}$$

where π is the inflation rate defined as $(1 + p)^L - 1$, i is the interest rate also de-

defined as $(1 + r)^L - 1$, with p and r being the annual inflation and discount rates respectively, and L is life expectancy. Note that the above formulation and prices are similar to those in Boskin (1976) except for the price of lifetime gifts (P_G).⁷

In principle it would be desirable to estimate (4) with all the appropriate right-hand-side variables. However, our data do not capture all of the explanatory variables. Consequently, the demand function (4) for charitable bequests would have to be reduced to the form

$$CB = f(P_{CB}, W) \quad (5)$$

where P_{CB} is the price of charitable bequests defined as $1 - e$ with the price of gifts at death (P_B) normalized at 1, and W is "bequeathable" wealth held at death. The implications of (5) are somewhat different from those of (4) since the focus is on how one allocates terminal and not lifetime wealth between bequests to family and charitable bequests.

Four previous econometric studies have attempted to estimate (5) and gauge the effect of the estate tax. McNees (1973), using the Internal Revenue Service 1957-59 estate tax file for decedents with gross estate over \$60,000, found taxes to be a significant factor determinant of bequests. McNees used ordinary least squares in evaluating the determinants of bequests and the tax rate (not price) was used as a right-hand-side variable. Furthermore, all returns showing no bequests were dropped from the sample used to estimate the parameters.

Using the same data as in McNees, Boskin (1976) estimated Tobit regressions of contributions. Using a linear functional form, Boskin found an elasticity of giving with respect to the tax price of -1.2 , calculated at the mean. Boskin also studied the pattern of giving using 1969 estate tax data and reported a price elasticity of -2.0 . When Boskin distinguished bequests by type of donee on the 1957-1959 file, the price elasticity ranged from -0.7 to -2.0 for bequests to religious, education-scientific, and health and social welfare organizations, and -1.8 to -5.2 for other categories. The wealth

elasticity ranged from 0.2 to 0.7 depending on the type of donee. Wealth was defined as the adjusted disposable estate.

Using a pooled sample of grouped data available by estate class for the period 1948 to 1963, Feldstein (1977) reported great variance in the estimated elasticities, which ranged from -4.0 to -0.1 . Wealth was measured in terms of gross estate before debts and other offsets. Recently, Barthold and Plotnick (1984) analyzed Connecticut probate records for decedents during the 1930s and 1940s. They estimated Tobit regressions in logarithmic specification. Their findings challenged the conventional view in that they found the estate tax price to have no significant effect on charitable bequests. Gross estate or total assets were used as a measure of wealth and the tax rate reflected both federal and state tax laws.

In the latest study, Clotfelter (1985, p. 241) used 1976 estate tax return data for decedents with gross estates over \$60,000 but limited to net estates over \$5,000. Using logarithmic specification, he reported an elasticity with respect to the tax rate of -2.79 and -1.67 , and with respect to the size of wealth of 0.18 and 0.42, depending on the definition of wealth. The results also show that charitable bequests rise with the age of the decedent and that they are greatest for the never-married single, followed by separated and divorced, and widowed, respectively. Clotfelter also studied the determinants of giving using different population strata and specifications.

This paper complements the existing literature and overcomes some of its limitations in several ways. First, it uses recent data on bequest patterns (1986), which are more relevant to tax policy. Second, and for the first time ever, the paper employs combined data from estate tax returns (Form 706) and returns filed by life insurance companies (Form 712) for decedents, which provide broader measures of bequeathable wealth. This is especially true when compared to wealth from probate records, which may understate wealth reported on tax returns by over 25 percent (mainly Schedule G and Form 712 information). Third, the data

employed provide greater detail on categories of bequests and allow for the study of the tax effects on the level of giving to individual categories and the number of categories as well.

III. Data Sources and Construction of Variables

A. Data

This paper uses data on decedents in 1986 provided by the Statistics of Income Division of the Internal Revenue Service. The data for 1986 decedents are compiled by combining three random samples of estate tax returns (Form 706) filed during the years 1986 to 1988. The samples for each of the three years are stratified by size of estate, age, and whether the individual died in 1986.⁸

The data contain information on 12 categories of assets held at death and lifetime transfers, debts, funeral expenses, attorney fees and executor commissions, life insurance policy loans, and other estate administration expenses, among others. It also includes information on jointly-owned property, community property, and life insurance owned by others and excluded from the estate,⁹ among others. All assets are reported, regardless of whether they were held directly, in trusts, or subject to a power of attorney. Demographic information is also available on the file. These include age, marital status, sex, state residency, date of death of spouse for widowed decedents, among others.

The individuals in this sample, after adjusting for inflation, are somewhat wealthier than those with gross estates over \$60,000 studied in Boskin (1976) and Clotfelter (1985, p. 241), but comparable to those in Barthold and Plotnick (1984). Only estates with assets over \$500,000 were required to file in 1986. Few returns below this threshold were filed. Since the Paperwork Reduction Act does not require complete reporting of information on such returns, they were dropped from the sample. Other returns dropped are those with unknown age or those age 30 or under (mostly minors). I also dropped

those with bequeathable wealth under \$5,000, as well as those who bequeathed their entire estate to charity (about 50 estates). The resulting sample consists of 13,492 returns, or 218 less than the original sample of 13,710 returns.¹⁰

B. Tax Price

The price per dollar of charitable bequest is defined as one minus the marginal tax rate. The marginal tax rate is constructed as follows. For each estate, the tax liability is computed using 1986 tax law. First, the total estate tax liability is computed in the absence of charitable bequests. Second, \$1,000 in charitable bequests are assumed for all estates, and the estate tax liability is recalculated. Next, the marginal rate is computed as the change in tax liability divided by 1000. This procedure, which is consistent with that followed in earlier papers (see McNeese 1973, Boskin 1976, and Clotfelter 1985, p. 241) leads to an exogenous tax price variable. State and local taxes are ignored.¹¹

The estate tax Code effective in 1986 is drastically different from provisions effective during the years studied by Clotfelter, Boskin, and McNeese, as well as Barthold and Plotnick. First, the 1976 Act, effective for decedents dying after 1976, unified the estate and gift taxes. As a result, all lifetime gifts—directly or through trusts—are aggregated with taxable estate to determine a tentative estate tax. The tentative estate tax is computed using a unified tax rate schedule, and a credit is provided for any gift taxes on the lifetime transfers.

Second, the 1981 Act reduced the maximum tax rate from 70 percent to 55 percent. It raised the exemption level to \$500,000 in 1986 (\$600,000 in 1987 and thereafter) from \$60,000 in 1976. Third, after 1976, certain real property used in a farm or other trade or business can be valued based on its actual use rather than the market value. The value of a farm based on its crop yield can be considerably lower than its market value based on development potential. The valuation difference, however, is limited to \$750,000.

Fourth, the 1981 Act provided for a

marital deduction equal to the spousal bequest—also referred to as the unlimited marital deduction. Under previous law, the deduction for such bequests was limited to the greater of one-half of the adjusted gross estate or \$250,000. For such returns, spousal bequests were assumed to remain unaltered in computing the tax liability in the absence of charitable bequests. Implicitly, this treatment assumes that such transfers would be taxed at the spouse's death in any event (see Clotfelter 1985, p. 249). Fifth, the 1984 Act repealed the \$100,000 exclusion for the value of interests under qualified and individual retirement (IRAs) plans.¹²

C. Categories of Bequests

In previous research, Boskin (1976) and Barthold and Plotnick (1984) studied the determinants of giving to four categories of beneficiaries. These included bequests to (1) religious, (2) education-scientific, (3) health and social welfare, and (4) other organizations. In this paper six categories of giving are studied: (1) arts and humanities, (2) religious, (3) education, medical, and scientific, (4) social welfare, (5) foundations, and (6) other categories of bequests. The breakdown into these categories provides greater insights into patterns of giving and also reduces aggregation bias.

In select instances, the sum of the bequests or the gross contributions may exceed the actual deduction. This situation arises when a non-profit organization assumes the estate tax liability of the decedent. When an individual bequeaths a fraction of his estate to charity with the stipulation that the non-profit organization assume the estate tax liability, the actual (net) charitable bequests (gross bequest less estate tax) will fall short of the gross bequest. As a result, and when appropriate, the six categories of bequests are scaled down in order to sum to the net contribution or actual deduction.

D. Wealth Measure

Wealth is defined as the adjusted disposable estate. In many ways, this is

identical to Clotfelter's (1985, p. 241) definition of net estate, defined as total assets less debts, estate expenses, and the tax liability in the absence of bequests. Two categories of lifetime transfers are recognized in defining wealth. The first includes transfers with certain retained interests or powers (revocable trusts and others). These transfers are treated as part of the decedent's estate, although such assets are not part of the "probate" estate.¹³ The second category of transfers generally includes outright gifts such as irrevocable trusts or direct gifts and are not included in the decedent's estate. It should be noted that lifetime transfers can be essential to the computation of tax liability under the current unified transfer tax structure.¹⁴ Our measure of wealth is also defined to include proceeds from life insurance policies not owned by the decedent and not included in the gross estate (reported on Form 712 by insurance companies). It is not unusual for a person to pay the premiums on policies owned by the spouse, children, or trusts formed to their benefit.

Table 1 provides a summary of selected statistics for all observations in the sample as well as those with charitable bequests. The average disposable wealth of decedents is about \$1.9 million. About 31 percent are widowed and slightly over 50 percent are married. Almost 10 percent are age 90 or over, and those in their 80s, 70s, and 60s each make up 20 percent of the sample. The average charitable bequest is about \$190,000. The average is greatest for foundations and lowest for social welfare organizations and the arts and humanities. The average number of categories of bequests is 0.341. Individuals in this sample face a first-dollar tax price of 0.75. The second column in Table 1 provides mean statistics conditional on giving. It shows that an individual with charitable bequests is on average wealthier, older, is female, and faces a lower tax price with a mean of 1.8 categories of bequests.

IV. Empirical Estimates of Bequests

Fewer than 20 percent of the individuals in the sample made bequests to char-

ity. In the case of certain categories of bequests, fewer than two percent gave anything (arts and humanities). Hence, limited dependent variable methods are appropriate. Following standard practice, it is assumed that the observed bequest, Y , takes the form:

$$Y = \beta_i'x_i + u_i \quad | \text{ if } \beta_i'x_i + u_i > 0 \quad (6)$$

$$= 0 \quad | \text{ if } \beta_i'x_i + u_i \leq 0 \quad (6')$$

where x_i represents explanatory variables with β_i' coefficients, and u_i is a censored normally distributed error term. Given these assumptions, (6) can be estimated using the Tobit model. This is done for total bequests as well as bequests to six categories of donees.

The dependent variable is defined as the natural logarithm of bequests (plus 1). The right-hand-side variables x_i include the log of wealth, dichotomous variables for marital status, age, and gender, as well as the log of the tax price (1 minus the tax rate). While other variables such as the income of survivors (see Becker and Tomes 1979, p. 1156) and their relationship to the decedent, religious affiliation, education, and occupation among others, may significantly influence the amount of giving, the SOI data do not contain such variables for all filers.¹⁵ Conceivably, age and marital status may act as proxy for the number of survivors, while additional variables used, such as the shares of life insurance and family businesses (non-corporate business and farms) in "bequeathable" wealth, along with the demographic variables, may capture the endowments or the dependence of the survivor on the decedent's lifetime income, especially in the case of the spouse.

Table 2 presents the estimates from Tobit regressions. It reports the regression coefficients and their respective t-tests as well as other relevant statistics at the bottom of each table. The following is a summary of the results:

Wealth: As measured by the disposable estate, wealth has positive effects on total bequests. Wealth also influences bequests to the arts and humanities, education-scientific organizations, social welfare or-

TABLE 1
SUMMARY STATISTICS FOR SAMPLE OF ESTATE TAX RETURNS

Item	Mean	Conditional Mean
Wealth	1905900	2582600
In Wealth	14.018	14.220
Widow	0.305	0.514
Single	0.072	0.148
Separated	0.002	0.002
Divorced	0.051	0.045
Age over 90	0.095	0.217
Age 80 to 90	0.239	0.390
Age 70 to 80	0.207	0.221
Age 60 to 70	0.216	0.103
Sex (male)	0.639	0.486
Insurance Share of Wealth	0.094	0.027
Business Share of wealth	0.056	0.030
First-dollar Price	0.748	0.584
Last-dollar Price	0.767	0.680
In First-dollar Price	-0.333	-0.559
In Last-dollar Price	-0.307	-0.429
Bequests:		
Total	189910	1003200
Arts & Humanities	10876	57456
Religious	15127	79914
Research	45804	241970
Social Welfare	9316	49214
Foundations	76436	403790
Other	32347	170880
In (Bequests):		
Total	2.078	10.975
Arts & Humanities	0.197	1.039
Religious	0.991	5.236
Research	1.101	5.817
Social Welfare	0.294	1.551
Foundations	0.317	1.676
Other	0.602	3.179
Number of Categories	0.341	1.800

ganizations, foundations, and other categories of giving. Interestingly, wealth does not significantly influence bequests to religious organizations but greatly influences giving to education-scientific organizations followed by foundations and other categories. The elasticity of bequests with respect to wealth is 0.23, toward the lower end of the 0.18 to 0.42 range reported in Clotfelter (1985, Table 6.9). It is lower than the 0.4 estimate in Barthold and Plotnick as well as Boskin's estimates of 0.52 to 1.1 using 1957-59 data and 0.4 using 1969 data.¹⁶

Marital Status: Consistent with previous findings, single decedents leave larger bequests to charity than their mar-

ried counterparts. In the case of social welfare, divorced and separated decedents are also found to leave greater bequests to charity. The bequests of widowed decedents are about the same as those of married decedents. The expected bequests of single decedents exceed those of married decedents by a factor of 2.3. The expected bequests of separated and divorced decedents are about the same as those of married individuals, except for giving to other categories.¹⁷ Generally, these results are consistent with those in Clotfelter (1985), partially consistent with those in Barthold and Plotnick (1984), and different from those in Boskin (1976).

Age: Again consistent with the existing

literature, charitable bequests rise with age. Those in their 90s gave 40 percent more than those in their 80s; those in their 80s gave 36 percent more than those in their 70s; and those in their 70s gave 76 percent more than those in their 60s.¹⁸ These results are consistent with those in Clotfelter (1985). Boskin (1976) reported that those under the age of 65 contributed less to charity, while Barthold and Plotnick (1984) failed to find a significant relationship.

Sex: Women bequeath more to charity than men.¹⁹ This is true for total bequests as well as bequests to individual categories. An exception is bequests to foundations, where sex is found to be insignificant. The expected total bequests of male decedents are about 17 percent below those of female decedents. This result is similar to that in Clotfelter (1985) but different from that in Barthold and Plotnick (1984). Boskin (1976, p. 39) found that sex was not an important determinant of bequest behavior.

Price: The coefficient on the price variable is negative and significant in all the regressions. The elasticity for total bequests is estimated at -3.00 , slightly larger (in absolute value) than that of -2.79 in Clotfelter (1985). For the various categories of bequests, I find giving to the arts and humanities, social welfare, and foundations to be the least price sensitive.²⁰ Overall, these results confirm the earlier findings in McNeese (1973), Boskin (1976), and Clotfelter (1985) on the tax-induced effects of bequests, and contradict the findings in Barthold and Plotnick (1984). The findings on foundations also contradict the conjecture of a high elasticity in Boskin (1976, p. 44)²¹ The 1969 Act, of course, changed the tax treatment of foundations, which could explain some of the difference.

Other variables: The expected bequest declines with the life insurance and family business shares of wealth. Insurance policies are purchased to provide for the well-being of the surviving spouse and other heirs, and, as such, the greater the relative proceeds from life insurance policies the smaller is the charitable be-

quest. Similarly, individuals with family businesses and farms have a strong affinity to keep such entities within the family and, as a result, leave less to charity.

V. Bequest Incompleteness

Undoubtedly, the congressional intent for allowing a deduction for charitable bequests, coupled with the tax-exempt status of recipient organizations, is to promote giving to all such entities. Yet, our data show a lack of diversification in the categories of bequests. Of the 13,492 estates in our sample, 2,554 estates had bequests. Of these, 1,307 reported one category of beneficiary, 693 reported two categories, 365 reported three categories, 142 reported four categories, 41 reported five categories, and 6 reported six or more categories.

This section focuses on the observed incompleteness of giving (or lack of diversity in bequests). The data show that most bequests benefit at most one or two categories of charitable organizations. This is not only puzzling but has interesting implications given congressional intent. The central issue that needs to be addressed is whether the number of categories of bequests is responsive to the tax price and the deductibility of charitable bequests. Another issue, of course, is why there is so little diversification to begin with, and why altruism is limited to one or two types of charities.

The only study to come close to addressing this issue is Barthold and Plotnick (1984) based on probate data from the 1930s and 1940s for Connecticut decedents. They presented a model of "categorical choice" (pp. 231-233) and estimated multinomial logit equations for five groups giving to zero, one, two, three, or four categories of bequests. Barthold and Plotnick's results (Table 5) indicate that while the estate tax and size of estate may increase the odds of giving, the tax price and wealth are not significant determinants of the number of categories of bequests.

To address determinants of the number of categories of bequest and validate the

TABLE 2
TOBIT ESTIMATES OF CHARITABLE BEQUESTS
DEPENDENT VARIABLE = $\ln(1 + \text{BEQUESTS})$

	Total	Arts and Humanities	Religious	Ed., Med. Research	Social Welfare	Foundations	Other
Constant	-48.405 *	-122.292 *	-27.321 *	-59.646 *	-85.951 *	-157.842 *	-78.563 *
In Wealth	12.557	8.893	5.129	10.318	7.596	11.848	9.773
Widow	1.610 *	4.541 *	-0.412	1.735 *	1.972 *	6.296 *	2.259 *
Single	5.870	5.020	1.075	4.245	2.562	7.394	4.045
Divorced	0.897	-0.567	0.739	0.894	1.317	0.603	1.930
Age Over 90	1.649	0.305	1.015	1.106	0.863	0.341	1.743
Age 80 to 90	8.507 *	12.395 *	6.804 *	8.789 *	11.103 *	11.778 *	9.004 *
Age 70 to 80	12.473	5.709	7.475	8.828	5.967	5.438	6.569
Age 60 to 70	0.809	0.343	0.054	0.125	4.279	5.323	4.118 *
Sex	0.929	0.111	0.045	0.095	1.749	1.917	2.405
Insurance	11.246 *	8.387 *	12.873 *	10.158 *	16.339 *	13.778 *	12.362 *
Business	14.372	3.113	11.649	8.830	6.128	4.927	7.386
In Price	8.703 *	6.832 *	10.617 *	7.564 *	14.227 *	11.634 *	10.177 *
Sigma	12.485	2.743	10.554	7.321	5.645	4.518	6.600
Log-Likelihood	6.511 *	3.407	8.059 *	5.325 *	10.885 *	7.107 *	6.671 *
Z	9.305	1.332	8.009	5.110	4.292	2.721	4.274
F(Z)	2.460 *	1.310	3.035 *	1.342	5.997 *	2.280	3.261 *
Observations	3.485	0.489	2.956	1.257	2.290	0.834	2.038
Number Positive	-1.292 *	-5.794 *	-1.301 *	-1.938 *	-2.324 *	-0.753	-1.629 *
	3.261	4.245	2.496	3.307	2.150	0.573	2.075
	-5.023 *	-14.197	-7.361 *	-4.354	-22.808 *	-5.626	-12.608 *
	2.998	1.611	2.766	1.763	2.347	0.825	2.677
	-4.349 *	-13.548 *	-4.827 *	-8.270 *	-6.428	-1.858	-6.490 *
	3.308	2.225	2.557	3.742	1.552	0.486	2.253
	-21.416 *	-27.143 *	-17.881 *	-23.009 *	-21.256 *	-30.933 *	-23.371 *
	20.791	6.467	12.560	14.420	6.516	8.002	10.235
	13.275 *	20.832 *	14.881 *	16.544 *	20.048 *	23.035 *	18.404 *
	59.194	17.806	42.345	42.123	21.903	-20.929	31.125
Log-Likelihood	-13368	-1942	-8185	-8224	-2818	-2594	-5111
Z	-1.08	-2.46	-1.49	-1.49	-2.26	-2.30	-1.88
F(Z)	0.1401	0.0069	0.0681	0.0681	0.0119	0.0107	0.0301
Observations	13492	13492	13492	13492	13492	13492	13492
Number Positive	2554	267	1401	1383	401	364	781

* Significant at least at the 5% level. Absolute t-statistics are reported below coefficients.

Elasticities:

Wealth	0.23	0.03	-0.03	0.12	0.02	0.07	0.07
Price	-3.00	-0.19	-1.22	-1.57	-0.25	-0.33	-0.70

Ratios:

Widow	13.4%	-0.4%	5.2%	6.3%	1.6%	0.6%	6.0%
Single	229.3%	8.9%	58.9%	81.9%	14.1%	13.4%	31.1%
Divorced	12.0%	0.2%	0.4%	0.9%	5.2%	5.9%	13.2%
Age 90 over 80	42.8%	1.1%	16.6%	19.3%	2.5%	2.3%	6.8%
Age 80 over 70	35.9%	2.4%	19.0%	16.5%	4.1%	5.0%	11.1%
Age 70 over 60	76.4%	1.5%	40.8%	31.2%	6.0%	5.3%	10.8%
Sex	-16.6%	-3.9%	-8.5%	-12.4%	-2.7%	-0.8%	-4.8%

congressional intent, I estimate a multinomial logit model. Since seven outcomes are possible, the bivariate logit model, of course, is not appropriate. Table 3 provides results from multinomial logit regressions on the number of categories of giving. The number of donees ranges from one to six or more, with the coefficients for no bequests set to zero. The results show that the tax price variable is highly significant and has a negative sign consistent with the Tobit results earlier. Furthermore, the coefficient on the price increases in absolute value as one moves from column 1 to column 6 of Table 3. Ap-

parently, the estate tax by inducing bequests also leads to an increase in the number of donees. Generally, and consistent with the Tobit results above, the number also rises with wealth and age as evident from the size and sign of their respective coefficients. Furthermore, women (up to four categories) as well as single (up to five categories) individuals seem to give to a larger number of donees.

A reasonable alternative to the multinomial logit model is to apply econometric methods associated with count data such as the Poisson model. Here, the dependent variables Y_1 through Y_7 , with

TABLE 3
DETERMINANTS OF THE NUMBER OF CATEGORIES OF CHARITABLE BEQUESTS

	Multinomial Logit Model						Poisson Model
	Number of Categories						
	1	2	3	4	5	6	
Constant	-5.146 *	-7.410 *	-10.825 *	-13.536 *	-35.378	-29.505	-4.579 *
	7.349	7.723	8.972	6.770	0.006	0.006	13.731
In Wealth	0.070	0.147 *	0.337 *	0.414 *	0.517 *	0.076	0.096 *
	1.374	2.095	3.876	2.797	2.070	0.104	3.948
Widow	-0.031	0.225	0.131	0.142	0.301	-1.112	0.077
	0.317	1.675	0.727	0.471	0.571	0.969	1.601
Single	0.890 *	1.329 *	1.301 *	1.943 *	2.301 *	0.806	0.815 *
	7.400	8.356	6.005	5.921	4.127	0.580	14.696
Divorced	-0.192	0.409 *	0.218	0.466	0.735	-17.589	0.143
	1.163	1.974	0.701	0.983	0.859	0.002	1.784
Age Over 90	1.517 *	1.835 *	2.540 *	2.321 *	20.192	17.896	1.478 *
	11.379	9.653	8.636	4.640	0.003	0.003	20.246
Age 80 to 90	1.130 *	1.617 *	1.877 *	2.224 *	19.991	17.026	1.294 *
	9.441	9.261	6.581	4.635	0.003	0.003	18.728
Age 70 to 80	1.017 *	1.063 *	1.574 *	1.179 *	19.489	17.257	1.004 *
	8.400	5.780	5.408	2.285	0.003	0.003	14.054
Age 60 to 70	0.444 *	0.488 *	0.372	0.831	18.178	-0.249	0.434 *
	3.419	2.454	1.088	1.524	0.003	0.000	5.499
Sex	-0.141 *	-0.147	-0.444 *	-0.898 *	-0.296	-1.130	-0.215 *
	2.024	1.611	3.552	4.403	0.840	1.153	6.475
In Price	-2.913 *	-2.998 *	-2.803 *	-3.847 *	-5.179 *	-9.135	-2.482 *
	15.298	10.480	7.338	5.081	3.332	1.920	23.675
Log-Likelihood	-8203						-9066
Observations	13492						13492
Number Positive	1307	693	365	142	41	6	2554

* Significant at least at the 5% level. Absolute t-statistics are reported below coefficients.

values ranging from 0 through 6 types of donees, are assumed to have independent Poisson distributions with parameters λ_1 through λ_7 . The probability of Y_i equal to some value j , is given in (7):

$$\text{Prob}(Y_i = j) = e^{-\lambda_i} \cdot \lambda_i^j / j! \quad (7)$$

Further assuming that the lambda's are log-linearly dependent on x_i , the right-hand-side variables, then

$$\ln \lambda_i = \beta_0 + \sum \beta_i x_i \quad (8)$$

The results from this Poisson regression reported in Table 3 are qualitatively similar to those obtained from the multinomial logit. The number of categories of bequests rises with wealth and declines with price. The elasticity of the expected number of categories is 0.1 with respect to wealth and about -2.5 with respect to price. The expected number is also higher for single as well as female individuals, and rises with age. Similar results were obtained when censored Poisson and binomial regressions were estimated (not reported).

Both the multinomial logit and the poisson models provide evidence on the effects of the estate tax price on diversity in bequests. The coefficients in the logit model are significant except for the number of donees being equal to six or more (only 6 such cases exist). Similarly, the tax price coefficient from the Poisson model again suggests that the estate tax deduction reduces the degree of incompleteness in giving and leads to greater diversity in bequests.

VI. Conclusion

This paper examined the role of the estate tax in influencing the amount as well as the diversification of charitable bequests for wealthy individuals. It used estate tax data for decedents in 1986 with returns filed during the years 1986 through 1988. It studied the determinants of bequests in the aggregate as well as by type of donee. The paper also ad-

ressed the effects of the estate tax on the diversity of charitable bequests.

The results suggest that higher estate tax rates raise the size of charitable bequests of all categories. Furthermore, results from multinomial logit and Poisson models indicate the estate tax and the deductibility of bequests lead to a diversification in giving. These indicate that the tax price is a significant determinant of the number of categories of bequests.

ENDNOTES

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¹See Johnson (1990, p. 56), Office of Management and Budget (1987, I-Z73-77) and U.S. Department of Commerce (1988, p. 225).

²See Clotfelter (1985, Table 2.12) and Fullerton (1990, p. 18-22) for a review of the literature.

³See Office of Management and Budget (1991, A-75).

⁴See Becker and Tomes (1976 and 1979). Also see Kotlikoff (1988, p. 53).

⁵His utility may also be determined by donations by others (R) as well government spending (G). See Kingma (1989) for a review of the literature on the crowding-out effect of government spending, the effect of donations by others, and the various models of giving. It should be noted that since a portion of government spending is in the form of matching grants, G may operate through the price of giving as well.

⁶Both W and W_H are held constant. Estate taxes, however, may affect the labor supply behavior of both parents and children.

⁷Since the gift tax is exclusive, the proper price should be $1 + e$ and not $1/(1 - e)$ as in Boskin. Consider a parent with $e = 0.50$ making a gift of \$1.00 to his daughter. In this case the tax is \$0.50 and is paid by the parent. The daughter receives \$1.00 and Treasury receives \$0.50. The total transfer is actually \$1.50, but the tax is based on \$1.00, in sharp contrast to the way tax liability is computed under the income and estate taxes. In this example, the price of a \$1.00 gift is \$1.50 and not \$2.00 as it would be under Boskin's measure. Another potential adjustment may capture the differential in the income tax rates between parent and children subjected to income streams from gifted assets. See Bernheim (1987). A further adjustment may involve the tax treatment of capital gains, since step-up in basis is provided for bequeathed property but denied for lifetime transfers.

⁸See Johnson (1990) for further detail.

⁹Life insurance proceeds excluded from estate are obtained from Form 712 reported by insurance companies to the IRS.

¹⁰Note that the empirical results presented below are robust with respect to these deletions.

¹¹Unlike the income tax, the federal estate tax provides dollar-for-dollar credit for state death taxes and smooths out (eliminates in most cases) cross-state differences in tax burdens. In any event, computing state tax liabilities is an extremely difficult task. For states with a "pick-up" tax only, the computation is straightforward and essentially redundant. For the remaining states, however, one does not only have to consider the diverse tax treatment of wealth transfers but also has to identify the location of the property. The state tax liability reflects the size of wealth, the relationship to heirs (in case of inheritance taxes), and the state in which the property is located and whether it is tangible or intangible, since states tax property located within their borders. It should be noted that 24 states and the District of Columbia have a "pick-up" tax only, 7 have estate and "pick-up" taxes, and 19 have inheritance and "pick-up" taxes (or allowable federal credit for state death taxes). See Advisory Commission on Intergovernmental Relations (1988). For the less wealthy, especially those not required to file federal tax returns, state taxes may influence bequest behavior since the federal tax credit may not be available.

¹²Interestingly, this treatment is ignored in studies investigating the determinants of IRA contributions and effects on savings. See Skinner and Feenberg (1990) for a review of the literature.

¹³Aside from excluding certain assets such as those in trusts, probate data also suffer from valuation deficiencies necessary to computing estate tax liabilities.

¹⁴If the unified credit is fully used in reducing an individual's gift taxes, then wealth held at death will not benefit from the exemption.

¹⁵Select information on heirs is available for estates with assets of \$5 million or more.

¹⁶Elasticity coefficients are estimated as $F(z)*b$, where $F(z)$ computed as $\sum B_i X_i / \text{Sigma}$ is the cumulative normal distribution representing the probability of observing a bequest > 0 , b is the Tobit regression coefficient for the right-hand-side variable of interest, B_i represents each of the reported coefficients, and each X_i is the value of the right-hand-side variables at the mean. See McDonald and Moffitt (1980).

¹⁷These ratios are reported at the bottom of Table 2 and are computed as $e^{F(z)b}$.

¹⁸These ratios are computed as $e^{F(z)(b_i - b_{i-1})}$, where i is an age class and $i - 1$ is the previous (younger) class.

¹⁹A possible explanation for this outcome is that women on average have fewer (dependent) heirs since they tend to outlive their spouses.

²⁰Since the regressions are specified in nonlinear form, the elasticities from the separate regressions cannot be aggregated to the total. We have explored the estimation of a system of demand equations for the six categories (the 7th missing equation is bequests to heirs) to constrain the regressions. Such endeavor has proven very difficult given the number of categories and the severe censoring nature of the data (see Deaton 1986, p. 1808, for instance). When we used

a linear specification, the following price elasticities for total bequests and the six separate categories were obtained:

-0.70 - 0.49 -1.22 -1.18 -0.61 -0.26 -0.80

where the elasticity coefficients of the separate categories roughly aggregate to that of the total. Note that the wealth elasticity under the linear specification, though significant, is about 0.02. Also see Clotfelter (1985, p. 245). Results from semi-log specified regressions were not dramatically different from those reported in Table 2.

²¹Bequests to foundations were combined with "other" bequests in the 1957-1959 data used in Boskin (1976). The finding of a high elasticity (-1.8 to -5.20) for the "other" category was implicitly attributed to private foundations.

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Factors Affecting Charitable Giving: Inferences From Estate Tax Returns, 1986

by Barry W. Johnson and Jeffrey P. Rosenfeld, Ph.D

INTRODUCTION

Analysis of Federal Estate Tax Returns (Forms 706) filed for 1986 decedents shows the interplay of social and economic factors on bequest decisions. Data from 706 returns show that marital status, gender and social class are important predictors of charitable giving. These factors, coupled with individual values and beliefs, predispose a person to make a charitable bequest. Tax incentives can also affect the amount given, as well as the timing and form of such bequests.

Total giving to charities in 1986 was nearly \$92 billion, or about 2 percent of the Gross National Product (AAFR, 1987: Giving USA: Estimates of Philanthropic Giving in 1986 and the Trends They Show). The majority of these gifts were given by individuals, both directly (82.2%) and through bequests (6.7%). Total bequests to charities amounted to \$6.2 billion in 1986. These bequests can have a significant impact on recipient organizations.

Data on the charitable bequests of wealthy decedents dying in 1986 are presented in Table 1 [1]. As a group, these "top wealthholders" gave \$4.1 billion, and accounted for about 71 percent of all such bequests made by U.S. decedents (Giving USA, 1987). Nine percent of the estate tax decedents made gifts of \$1 million or more. These large gifts totalled nearly \$3 billion, or about 72 percent of the charitable bequests made by top wealthholders. The majority of the remaining decedents represented in Table 1 made bequests of less than \$250,000. Even so, the sum of these "small" bequests was over \$200 million. It is no wonder that organizations expend considerable fund raising effort to garner bequests.

Table 1. — 1986 Decedents, Charitable Bequests by Size of Bequest
[All figures are estimates based on samples—money amounts are in thousands of dollars]

Size of Bequest	Decedents ¹		Bequests	
	Number	Percent	Amount	Percent
Total	8,990	100.0%	\$4,148,944	100.0%
Under \$250,000	6,491	72.1	207,147	5.0
\$250,000 Under \$500,000	645	7.2	235,994	5.7
\$500,000 Under \$1,000,000	1,039	11.6	723,519	17.4
\$1,000,000 Under \$10,000,000	778	8.7	1,680,865	40.6
\$10,000,000 or More	37	0.4	1,299,418	31.3

¹Includes all U.S. estate tax decedents making charitable bequests, with net worth of \$500,000 or more.

1986 DECEDENTS

The bequest data examined in this article were gathered by the Internal Revenue Service's Statistics of Income Division (SOI). SOI samples estate tax returns annually in order to evaluate the effects of tax policy and to provide annual estimates of the financial characteristics of estate tax filers. Currently, an estate tax return must be filed within 9 months of a decedent's death; a six-month extension is available beyond that. Thus, returns for a particular year of death may be filed over a period of several years. This article presents data from returns filed in 1986-1988, focusing on 1986 as the year of death. A Federal estate tax return was required for all 1986 decedents with at least \$500,000 in total gross estate at the time of their death; the top tax rate was 55 percent.

There were an estimated 45,800 U.S. citizens who died in 1986 with gross estates above the \$500,000 filing requirement, representing only about 2.2 percent of the U.S. decedent population [2]. These decedents had a combined gross estate of over \$66 billion. Over 56 percent of them were male, most of whom were married; most of the female decedents were widowed. The average age at death for males and females was 73.8 and 79.5, respectively.

Almost 20 percent of these 1986 decedents made bequests to charitable organizations. These bequests accounted for slightly over 24 percent of their net estates. (Net estate, or net worth, is defined as total assets, including life insurance owned by the decedent and certain lifetime transfers, minus debts [3].) The average (mean) bequest amount was \$461,000. The minimum bequest value was \$100 and the maximum, well over \$150 million. Gender and net worth are the two most important variables for predicting the value of bequests.

Female decedents were almost twice as likely as males to make bequests to charitable organizations. Table 2 shows that their rate of charitable giving exceeds the rate for men and also exceeds the aggregate rate for all decedents. It also illustrates that, regardless of sex, the likelihood of making a charitable bequest increases significantly as net worth rises.

Table 2. — Charitable Donors as a Percent of Estate Tax Decedents by Sex and Size of Net Worth, 1986

[All figures are estimates based on samples]

Size of Net Worth	All Decedents ¹		Male Decedents ¹		Female Decedents ¹	
	Number	Percent	Number	Percent	Number	Percent
Total	8,990	20.4%	3,766	15.2%	5,224	27.0%
\$500,000 Under \$1,000,000	5,054	18.1	1,903	12.8	3,151	24.1
\$1,000,000 Under \$2,500,000	2,668	22.0	1,196	16.5	1,472	30.2
\$2,500,000 Under \$5,000,000	739	27.7	366	20.8	373	41.0
\$5,000,000 or More	529	39.6	302	35.1	227	47.8

¹Includes all U.S. estate tax decedents making charitable bequests, with net worth of \$500,000 or more.

Almost half the women and 35 percent of the men in the highest net worth group made bequests to charities. This may be due to the ability of larger estates to adequately provide for family members and make a significant gift, or to the lower cost of charitable giving incurred at the higher tax rates.

While the likelihood of making a charitable bequest increases significantly with the size of net worth, regardless of sex, Table 3 suggests that net worth does not substantially influence the relative amount given by female decedents. Women, on average, give about 24 percent of their net estates. The charitable giving of male decedents is more sensitive to net worth. Their giving, as a percentage of net estate, almost doubles, from 16 percent for those in the lowest net worth category, to 30 percent in the highest. Interestingly, while women are more likely to make a charitable bequest, and those with net worth less than \$5 million gave more than men, men in the largest net worth category gave away a larger percentage of their estates.

Marital Status

Married decedents of both sexes were the least likely group to make a charitable bequest; their bequests, as a percentage of net worth, were also the smallest, averaging about 14 percent for females and 19 percent for males (see Table 4). Widowed decedents were more than twice as likely to make charitable gifts, giving away just over 23 percent of their net estates. Single decedents were the most likely to make be-

quests and gave the largest percentage of their estates. It is worth noting the difference in the bequest behaviors of separated or divorced male and female decedents. The amount given by males in that group resembles that of their married counterparts, while the amount bequeathed by separated or divorced females parallels the behavior of widows.

The data in Table 4 indicate that a greater percentage of women make these bequests. The large percentage of widowed women can be explained by the fact that married women often outlive their husbands. The charitable giving of widows often represents the bequest desires of both spouses. They choose to make their charitable gifts after the death of the second spouse, having first provided for dependents and taken full advantage of the unlimited marital deduction.

Today's cohort of wealthy women age 65 and over tend to be very traditional and, as a result, may be more fiscally conservative (Odendahl, 1987). They tend to allow financial advisors to have a large role in their money management (Odendahl, 1987). They are also more likely to make lifetime gifts, as well as charitable bequests because very wealthy women have traditionally been more involved with philanthropic activities than either men or their less wealthy counterparts.

The above observations seem consistent with the findings of other researchers (see, for example, Joulfaian, 1990 and

Table 3. — Charitable Bequests as a Percentage of Net Worth, by Sex and Size of Net Worth, 1986

[All figures are estimates based on samples—money amounts are in thousands of dollars]

Size of Net Worth	All Decedents ¹		Male Decedents ¹		Female Decedents ¹	
	Amount	Percent	Amount	Percent	Amount	Percent
Total	\$4,146,944	24.3%	\$2,159,824	24.5%	\$1,987,120	24.1%
\$500,000 Under \$1,000,000	704,496	20.1	220,774	16.3	483,722	22.5
\$1,000,000 Under \$2,500,000	883,421	22.0	342,501	18.9	540,920	24.6
\$2,500,000 Under \$5,000,000	577,015	22.6	267,651	21.2	309,365	24.0
\$5,000,000 or More	1,982,012	28.5	1,328,898	30.4	653,114	25.1

¹Includes all U.S. estate tax decedents making charitable bequests, with net worth of \$500,000 or more.

Table 4. — Donors As A Percentage of All Estate Tax Decedents, Gifts As A Percentage of Net Worth, By Sex and Marital Status, 1986

Marital Status:	All Decedents ¹		Male Decedents ¹		Female Decedents ¹	
	% Donors	% Given	% Donors	% Given	% Donors	% Given
Total	20.4%	24.3%	15.2%	24.5%	27.0%	24.1%
Married	9.6	18.1	9.2	19.1	11.4	13.8
Widowed	28.3	24.0	26.9	25.8	29.0	23.3
Single	42.7	43.7	32.2	46.0	56.0	40.6
Divorced/Separated	18.5	22.0	15.8	16.2	22.4	28.6

¹Includes all U.S. estate tax decedents making charitable bequests, with net worth of \$500,000 or more.

Boskin, 1976). While Boskin found that sex was relatively unimportant, he notes that marital status, particularly the difference between married and unmarried decedents was statistically significant. A surviving spouse and dependents take precedence over charitable bequests, particularly among younger decedents.

Age

The size of charitable bequests, relative to estate size, increases with the age of the decedent (see Table 5). As potential heirs age and develop their own fortunes, benefactors are freer to substitute charitable for non-charitable beneficiaries. The 1986 decedents in our sample who were under 60 years of age gave almost 14 percent of their net estate to charity. Those in their 70's gave nearly 60 percent more than those in their 60's. Decedents in their 80's gave about 5 percent more than those 10 years their junior. Those in their 90's gave an additional 7 percent over the octogenarians. The relationship between age and giving, as with that of sex and giving, must be interpreted cautiously, however. The potential collinearity of these variables with marital status blurs the separate influences of these factors on philanthropic decisions.

Beneficiaries

For analytical purposes, bequests to recipient organizations were placed into one of the following categories: Arts and Humanities; Religious; Educational, Medical or Scientific; Social Welfare; Private Foundations; or Other. In 1986,

Table 5. — Number of Benefactors, Net Worth, Charitable Bequests and Bequests As A Percentage of Net Worth, By Age At Death
[All figures are estimates based on samples—money amounts are in thousands of dollars]

Age At Death	Number ¹	Net Worth	Bequest	Percent
Total	6,990	\$17,033,439	\$4,146,944	24.3%
Under 50	64	99,650	13,627	13.7
50 Under 60	185	399,368	53,855	13.5
60 Under 70	701	1,139,199	171,688	15.1
70 Under 80	2,007	4,545,496	1,097,118	24.1
80 Under 90	3,820	7,013,895	1,772,626	25.3
90 And Older	2,212	3,835,830	1,038,030	27.1

¹Includes all U.S. estate tax decedents making charitable bequests, with net worth of \$500,000 or more.

foundations received almost \$1,228,233, including 63 percent of the largest gifts (those of \$10 million or more), while organizations involved with education or medical and scientific research, usually private colleges and universities, were the favored beneficiaries of estates making smaller contributions. Religious organizations received bequests from the greatest number of decedents, but ranked fourth in the amount received.

Approximately 42 percent of bequests from male decedents went to private foundations (see Figure 1) [4]. Educational, medical or scientific organizations were their second most frequent recipients. Forty percent of the bequests made by female decedents went to educational organizations. They also gave more to religious organizations than men. Foundations ranked third on the list of charitable beneficiaries.

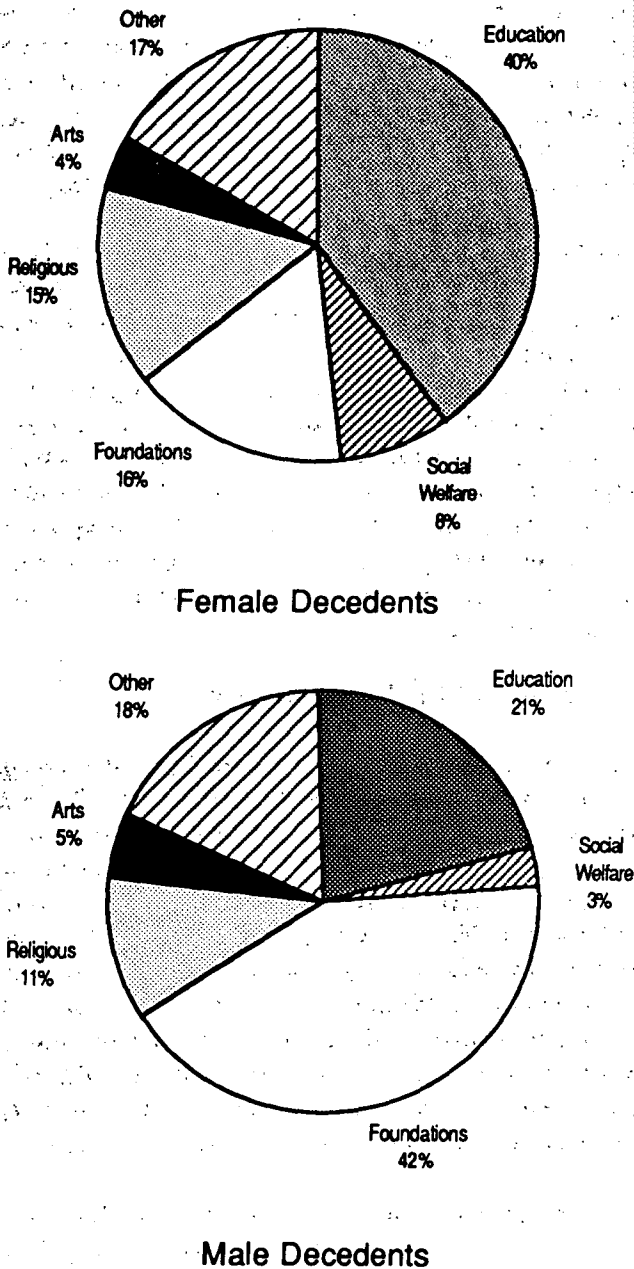
ATTITUDINAL FACTORS

The decision to make a charitable bequest is shaped by economic, social, and psychological factors. Boskin (1976), writing on motives for charitable giving, identifies the following economic factors: savings and consumption habits, lifetime gifts, lifetime contributions, and non-charitable bequests. The tax treatment of contributions affects the relationship of these factors. Along with these economic considerations are social factors which impact on charitable giving. The testamentary behavior of wealthy people is shaped by social norms and values (Schervish, 1986), community standards and peer pressures, as when, for example, charitable giving becomes a way of "Keeping Up With The Joneses" (Rosenfeld, 1991).

There is also a psychological component to charitable giving. Survey data show that many wealthy benefactors give out of desire to share their wealth with others who are less fortunate. Gifts are made to organizations involved with issues of personal interest or concern to the donor. Values instilled through religious involvement seem to play an important role for these donors. Consistent with this theme is the finding that people who make charitable bequests frequently believe in the efficacy of individual effort, rather than government, to address social problems (Boris, 1987).

On the other hand, bequests to colleges, museums, or hospitals are often motivated by what psychologist Eric Erikson has called "generativity": the desire to build something which will perpetuate the work or memory of the donor, or the donor's family (Erikson, 1950; 1982)[5]. Charitable giving can also be less than altruistic, as when motivated by guilt. There are also pragmatic motives for charitable giving. These include bequests to organizations (such as colleges or

Figure 1
Beneficiaries of Charitable Bequests
by Sex of Benefactor, 1986



universities) from which a business or a family will benefit (Schervish, 1987). Whatever the motive, the decision to make a charitable bequest typically occurs late in life for most wealthy individuals.

Sociological research confirms that top wealthholders put their energies into acquiring and accumulating wealth until relatively late in life. Only after they feel financially secure -- often at about the time they contemplate retirement -- do they become more involved with the social, political and philanthropic causes which will eventually motivate their charitable bequests (Rosenfeld, 1980, 1991).

Foundations

Foundations are typically formed by white, Protestant males over the age of 50 who are married and have children. Most were set up in the 1950's and 60's, although some continue to be formed today, primarily through bequests. The Survey on Foundation Formation, Growth and Termination found that the primary reason for establishing a foundation was to have a means of giving systematically in an area philosophically important to the founder (Odendahl & Boris, 1986). It is also a way of maintaining control over the uses of their contributions. There are a variety of other motives for setting up a foundation. Among these are concern for the welfare of others, feelings of social responsibility, and tax considerations.

Foundation formation may be particularly sensitive to changes in tax rates (Boskin, 1976). The decline in foundation formation following the 1969 Tax Reform Act, which eliminated some of the tax advantages afforded gifts to foundations, may reflect this economic fact. Ever since 1969, wealthholders have established fewer foundations, but continue making bequests to existing foundations. The costs involved in setting up a foundation, both in terms of personal involvement and capital, in the absence of tax advantages, has encouraged wealthholders to make bequests to existing foundations while finding other ways to achieve their lifetime philanthropic goals.

THE CHARITABLE DEDUCTION

There has been much debate over the effectiveness of the charitable deduction allowed for both the Federal income and estate tax. Economists argue that a significant amount of charitable behavior depends on these deductions. According to this line of reasoning, the tax and the deduction have two opposing effects. First, the tax reduces the estate available for division between potential heirs and charities. This is known as the wealth effect and should have a negative effect on gifts to charity. Second, the deduction reduces the price of giving to charity relative to giving to a non-charity which should encourage charitable giving. This is called the price effect because the price of each additional dollar given to charity, relative to a non-charity, is only \$1 - the marginal tax rate (the

amount of tax savings attributable to the deduction) (Boskin, 1976). Thus, in the highest tax bracket, the cost of a dollar given to charity, rather than a non-charity, is only \$.45 (\$1 - .55). The progressive structure of the tax rates suggests that both the wealth and price effects increase with the size of the taxable estate. The magnitude of these effects determines the effect of changes in the tax system on charitable giving (Boskin).

Survey research (Independent Sector, 1990) indicates that tax consequences are not a major consideration when people decide to make charitable gifts. Ninety percent of respondents surveyed in 1986 said they would not change their charitable giving patterns in 1987 in response to the limits placed on both the valuation of assets given to charity and on the relative size of the charitable deduction as a part of the Tax Reform Act of 1986. Only 2 percent of the respondents in the sample attributed their charitable giving to tax incentives, while 37 percent said they gave because of strong feelings toward a particular charity.

A series of focus groups with estate-planning professionals confirm that taxes affect the level and timing of a gift, but not the decision to make a gift. In 1986 and 1989, the Statistics of Income Division of IRS conducted focus groups with estate-planning professionals to discuss a wide range of issues associated with charitable giving. Estate planners, accountants, and bank trust officers who work with affluent clients say that these clients come to them with pre-existing goals concerning charitable bequests. They rarely suggest charitable giving as a tax savings option. This finding is consistent with the survey research mentioned earlier, and helps put taxes, as incentives or constraints on charitable giving, in perspective. They affect timing and level of charitable giving. By examining price elasticities, it is possible to measure this effect.

Empirical Studies

In order to examine the effects of taxes on charitable bequests, a measure of the change in giving associated with a change in the tax rate is needed. This measure is known as the price elasticity of charitable giving. An elasticity greater than 1 (in absolute terms) means that a change in the tax rate stimulates a relatively larger change in the amount bequeathed. In that case, the tax is said to be an efficient means of stimulating behavior. If, on the other hand, the elasticity is less than 1, it can be argued that the deduction is inefficient, as the loss in revenue is not made up by gifts to charity; in this case, charities would fare better if the deduction were abolished, and instead, the government were to distribute tax revenue directly to them.

Several economists have used both Federal estate tax returns and state probate records to quantify the effects of taxes on giving (for a more complete discussion see Joulfaian, 1990, or Clotfelter, 1985). Two separate studies using 1957-59, 1969, and 1976 Federal estate tax data showed a price elasticity of charitable bequests greater than one for small and moderate size estates (Boskin, 1976 & Clotfelter, 1985). Elasticities very close to 1 were calculated for the very largest estates, leading to the conclusion that the tax deduction was efficient for all but the very wealthy. Both concluded that eliminating the deduction would sharply curtail charitable bequests and increase bequests to heirs. A reduction in tax rates would have a similar, although less severe, effect.

Joulfaian (1990) obtained similar results using 1986 data. His research is significant because it suggests that the scope of charitable giving is influenced by tax incentives. Joulfaian found that the number of different charities included in the benefactor's estate-plan increased as the marginal tax rate faced by the estate rose. He also described differential giving (i.e. to the arts, to education, to foundations, etc.) based on marginal tax rates. Between 1976 and 1986 the value of charitable bequests (as described in the following section) declined significantly. Joulfaian's study suggests that the effects of this decline were distributed unevenly across charitable sectors.

Charitable Giving, 1976 and 1986

Tax reforms in 1976 and 1982 have significantly changed the composition of the estate tax population. The filing requirement in 1976 was \$60,000 and the top tax rate was 77 percent. As a result of reforms, the maximum rate was lowered to 55 percent and the filing requirement raised to \$500,000 by 1986, and ultimately to \$600,000 for decedents dying in 1987 and later. The tax law was also modified in several other ways, the most significant being the creation of the unlimited marital deduction, replacing the previous deduction, which was limited to one half the value of the decedent's gross estate. It was predicted that these changes would have a significant impact on charitable bequests.

Table 6 presents selected data for decedents dying in 1976 and 1986 with gross estates of at least \$500,000 in constant 1986 dollars [6,7]. The number of filers in this group and their aggregate net worth increased about 45 percent over the period. The percentage of filers making a charitable bequest has remained fairly stable, declining slightly from just over 22 percent of all decedents in 1976 to nearly 20 percent in 1986. The value of charitable bequests, relative to the size of net worth, however, has declined significantly. In 1976, over 10 percent of aggregate net worth was bequeathed to charities;

Table 6. — Decedents With Estates Valued at \$500,000¹ or More, 1976 and 1986 Years of Death²

[All figures are estimates based on samples—money amounts are in thousands of dollars³]

Item	1976 YOD ²	1986 YOD
Total Number of Filers	31,772	45,800
Aggregate Net Worth	\$45,377,360	\$66,018,791
Filers Making Charitable Bequests	7,020	9,114
Percent Filers Making Bequests	22.1%	19.9%
Aggregate Charitable Bequests	\$4,613,320	\$4,152,733
Bequests as a Percent of Net Worth	10.2%	6.3%

¹Constant 1986 dollars.

²1976 year of death is represented by returns filed in 1977.

³Table includes decedents with net worth less than \$500,000.

that percentage fell to just 6.3 percent in 1986. The actual amount given decreased about 10 percent in real terms over the period.

It is certainly an oversimplification to attempt to describe the charitable giving behavior of U.S. decedents solely in terms of the effects of taxes. The fact that only 23 percent of all decedents whose estates' incurred tax liabilities made charitable bequests says that taxation is, at best, an imperfect inducement for philanthropic activity. The above data, however, show that their influence can be significant.

CONCLUSION

The decision to include philanthropic bequests among the beneficiaries of an estate is dependent on many factors. Specifically, a variety of psychological and social influences seem to play a large role. The presence of a surviving spouse and other dependents compete directly with charities as beneficiaries. This is demonstrated by the importance of marital status and, to a lesser degree, age, as a determinant of charitable giving. Decedents with higher net worth are better able to meet these competing needs. The sex of the decedent plays a role as well, particularly in today's cohort of very wealthy older women, where social changes brought about by the women's movement have been less pervasive (Odendahl, 1987). Tax policy also plays a significant role in determining the timing and form of gifts and affects the amount given. Even here, though, net worth, obligations, potential heirs, and the liquidity of the estate are key factors as well.

A number of researchers are currently studying philanthropic behavior by tracking individuals over periods of time, rather than using traditional cross sectional data (see Auten and Randolph, 1990 and Steinberg, 1990). The assumption underlying this approach is that an individual's charitable giving represents a structured, long term goal. Likewise, charitable bequests can best be understood as expressions of giving which had been socially and economically structured earlier in the decedent's life. Future research on charitable

giving will make more systematic connections between bequests at the end of a lifetime, and charitable giving throughout life.

ACKNOWLEDGMENTS

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NOTES

- [1] The data presented here are for 1986 decedents who were required to file a Federal estate tax return because their gross estate at the time of death was at least \$500,000. Additionally, returns for decedents with net estates valued at less than \$500,000 have been removed from the sample for this analysis. The charitable bequests examined here are those intended as a deduction from gross estate as reported on Schedule O of Form 706. When there is no estate tax due, as when the unlimited marital deduction is used, small charitable bequests are often omitted from the form, or are reported with the other beneficiary data on page 2 of the return; these will be absent from our estimates.
- [2] Based on the number of deaths of U.S. residents in 1986 as reported by the National Center for Health Statistics.
- [3] Researchers have used various measures of wealth to study charitable giving. These include: total gross estate (Bartold & Plotnick); economic estate - total gross estate minus estate expenses and taxable lifetime transfers; adjusted economic estate - economic estate less the amount of tax that would have been owed in the absence of a charitable bequest (Boskin); and adjusted disposable estate - adjusted economic estate plus taxable lifetime transfers (Clotfelter; Joulfaian). Economic estate most closely approximates the actual estate available for a charitable bequest. However, the expenses related to a decedent's death and the administration of the estate are often reported on the decedent's final income tax return rather than on the Form 706. This may be particularly true when an estate is non-taxable, as when there is a large bequest to the surviving spouse or charity. Therefore, although net worth overstates the amount of estate available for distribution, it has less potential for introducing a bias due to reporting practices.

- [4] Bequests to foundations are ultimately used to support other organizations. For example, in 1986 foundation gave over 2.2 billion dollars to the following types of organizations (expressed as a percentage of their total giving): Welfare - 26.9%, Education - 21.9%, Health - 20.5%, Cultural Activities - 14.7%, Social Science - 8.8%, Science - 6.4%, and Religion - 1.3% (Source: The Foundation Grants Index, 18th Edition, Foundation Center, 1989.)
- [5] Erikson says that generativity is an important developmental task during adulthood.
- [6] All dollar amounts were converted to constant 1986 dollars using the implicit price deflator for gross national product, *Economic Report of the President*, U.S. Government Printing Office, Washington, DC, 1990. Only returns with \$500,000 or more of gross estate in 1986 dollars were included.
- [7] 1976 year of death data are represented by data collected during tax year 1977, *Statistics of Income-1976, Estate Tax Returns*, U.S. Government Printing Office, Washington, DC, 1979.

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Charitable Giving 1963-1990, (Selected Years)

Introduced by Jeffrey P. Rosenfeld, Ph.D

Data from the Federal estate tax return (Form 706), show important long-term trends and patterns in charitable giving. The following 3 tables provide an overview of decedents and their charitable bequests for selected years, 1963-1990. All of the tables were created using original SOI microdata files. Because of changes in the information reported on the Form 706, and changes in the data items included in SOI studies over the years, some values may not be present in some years. Data items have been chosen which are as conceptually similar as possible, given the length of the time series presented and the many changes in the estate tax law which occurred over the period. All data appear as they were originally published (current dollars) *and* in constant 1987 dollars (based on the Implicit Price Deflator for GNP); this analysis is based only on the constant dollar amounts.

Table 1 compares charitable giving based on data from Form 706 for selected years, 1963-1990. The table shows net worth and charitable bequests, by sex, making it possible to compare charitable giving by men and women with estates valued at \$600,000 or more (in constant 1987 dollars). In 1963, the gender differences in charitable giving were slight. About 51 percent of decedents leaving charitable bequests were male and 49 percent were female. But by 1990, the gender difference was significantly greater for decedents with estates valued at \$600,000 or more. About 61 percent of decedents making charitable bequests in 1990 were women, and only 39 percent were men. This increase can be partly ascribed to changes in the tax code which allowed for an unlimited deduction from gross estate for property bequeathed to the surviving spouse (typically the female spouse). This creates an incentive to postpone bequests to charities so that such bequests can be used as tax deductions against the surviving spouse's estate. Total net worth for male decedents was typically larger than total net worth for female decedents throughout the 27-year period, but women left proportionately more of their estates to charities during each of the filing years included in Table 1.

Table 2 compares charitable giving for decedents based on sex, marital status and net worth, 1963-1990 (selected years). The data allow comparisons of charitable giving for men and women. Based on data from Form 706, decedents who made charitable bequests were often single. In fact, SINGLE was the modal category of marital status for both male and female decedents during each of the filing years included in Table 2. The proportion of net worth given to charities was very similar between men and women, despite the fact that single men, on average, tended to have greater net worth than single women throughout this time period.

Table 3 compares charitable giving for decedents based on age, sex and net worth. The data, based on Form 706 in selected filing years, show that woman aged 75 and older were more likely to make a charitable bequest than women in any other age group. It also shows that older women, as a group, gave a higher percentage of their net worth to charitable institutions. The pattern is similar for men. Older men were more likely to make a charitable bequest and, of those who made such bequests, older men, as a group, bequeathed a larger percentage of their net worth. Men, regardless of age, were less likely to make charitable bequests than women.

Table 1A.—Charitable Bequests, by Sex of Decedent and Net Worth, in Current Dollars

(Money amounts are in thousands)

Filing year	Charitable bequests		Net worth		Charitable bequests, males		Net worth, males		Charitable bequests, females		Net worth, females	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount
1963.....	11,881	876,030	78,393	16,129,099	5,495	413,123	49,604	10,117,539	6,386	462,907	28,789	6,011,560
1966.....	13,823	1,195,576	97,321	20,678,977	6,251	558,689	61,508	13,007,319	7,572	636,887	35,813	7,671,658
1970.....	16,724	2,129,599	133,599	27,967,696	7,544	825,334	83,266	17,396,659	9,179	1,304,265	50,333	10,571,038
1973.....	21,198	1,989,173	175,363	36,448,018	8,999	914,208	109,246	22,916,977	12,199	1,074,964	66,118	13,531,041
1977.....	24,396	2,994,964	200,732	45,435,204	11,258	1,952,419	124,411	29,086,605	13,139	1,042,545	76,320	16,348,599
1983 ¹	9,023	2,333,990	56,518	41,911,956	3,995	1,097,388	35,025	26,848,126	5,028	1,236,602	21,493	15,063,831
1987.....	8,987	3,978,020	45,113	62,997,555	3,903	2,026,249	25,664	38,281,516	5,084	1,951,771	19,449	24,716,039
1990.....	9,993	5,538,523	53,168	83,456,364	3,923	2,578,835	29,201	48,846,321	6,070	2,959,688	23,967	34,610,042

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

Table 1B.—Charitable Bequests, by Sex of Decedent and Net Worth for Returns with Total Gross Estate of \$600,000 or More, in Constant 1987 Dollars

(Money amounts are in thousands)

Filing year	Charitable bequests		Net worth		Charitable bequests, males		Net worth, males		Charitable bequests, females		Net worth, females	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount
1963.....	6,167	3,186,130	28,446	46,705,391	3,165	1,537,008	18,787	29,418,865	3,002	1,649,122	9,659	17,286,526
1966.....	7,185	4,147,296	32,996	55,818,382	3,586	1,989,220	21,647	35,272,772	3,599	2,158,076	11,349	20,545,610
1970.....	7,669	6,386,560	36,343	59,916,268	3,973	2,467,738	23,963	37,497,636	3,696	3,918,821	12,381	22,418,632
1973.....	7,809	4,725,977	37,266	59,760,743	3,851	2,236,337	24,258	37,950,887	3,958	2,489,640	13,007	21,809,856
1977.....	7,174	5,263,495	32,994	48,856,517	3,610	3,644,854	21,648	32,156,044	3,564	1,618,641	11,346	16,700,473
1983 ¹	5,019	2,702,260	28,452	41,413,182	2,295	1,299,709	18,279	27,218,038	2,723	1,402,552	10,173	14,195,144
1987.....	8,441	4,394,526	42,274	68,778,142	3,748	2,246,770	24,157	41,974,526	4,693	2,147,755	18,118	26,803,616
1990.....	9,607	5,518,339	49,850	81,530,546	3,786	2,568,363	27,424	47,882,753	5,821	2,949,976	22,426	33,647,793

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

Table 2A:--Decedents Making Charitable Bequests, by Sex, Marital Status, and Net Worth, for Selected Years, in Current Dollars

(Money amounts are in thousands)

Female decedents						
Filing year	Marital status	Number of donors	Percent of all decedents	Net worth	Charitable bequests	Percent donated
1963	Married	545	9	268,721	35,802	13
	Widowed	4,012	22	1,386,299	268,827	19
	Single	1,667	42	441,490	138,829	31
	Other ²	162	19	64,369	19,449	30
1970	Married	789	7	353,179	48,893	14
	Widowed	5,671	18	2,698,192	1,034,012	38
	Single	2,422	38	615,997	195,111	32
	Other	297	17	96,668	26,249	27
1973	Married	964	6	545,097	84,808	16
	Widowed	7,684	19	2,793,994	641,082	23
	Single	3,005	40	734,091	223,296	30
	Other	546	19	296,893	125,778	42
1977	Married	1,285	7	552,813	85,211	15
	Widowed	8,312	18	3,193,696	683,717	21
	Single	3,031	37	797,614	220,473	28
	Other	512	17	189,364	53,144	28
1983 ¹	Married	314	7	465,439	51,377	11
	Widowed	3,813	26	3,734,853	901,760	24
	Single	776	49	570,702	239,741	42
	Other	126	16	233,913	43,723	19
1987	Married	434	10	984,165	155,759	16
	Widowed	3,539	28	5,860,596	1,294,945	22
	Single	990	54	1,079,909	437,887	41
	Other	121	20	273,564	63,179	23
1990	Married	405	8	1,109,888	126,969	11
	Widowed	4,380	28	8,529,568	2,165,224	25
	Single	1,070	56	1,443,372	473,982	33
	Other	215	22	600,446	193,513	32
Male decedents						
1963	Married	2,511	7	1,390,037	206,615	15
	Widowed	1,822	20	558,621	101,582	18
	Single	995	28	296,018	93,623	32
	Other	167	16	48,019	11,302	24
1970	Married	3,361	6	2,354,590	339,524	14
	Widowed	2,452	17	971,197	288,531	30
	Single	1,479	25	461,561	149,967	32
	Other	252	13	119,046	47,312	40
1973	Married	3,797	5	2,649,863	359,402	14
	Widowed	3,032	16	1,166,144	303,510	26
	Single	1,697	23	545,189	176,863	32
	Other	473	14	196,428	74,433	38
1977	Married	5,559	6	3,133,186	451,232	14
	Widowed	3,470	15	1,504,165	450,767	30
	Single	1,843	23	593,448	184,327	31
	Other	386	11	1,003,295	866,093	86
1983 ¹	Married	2,006	8	3,241,645	400,757	12
	Widowed	1,147	20	1,244,772	399,221	32
	Single	692	35	649,220	183,736	28
	Other	149	11	233,825	113,673	49
1987	Married	1,466	9	4,785,796	694,833	15
	Widowed	1,630	29	2,954,580	833,310	28
	Single	619	30	1,127,921	448,252	40
	Other	188	16	272,840	49,854	18
1990	Married	1,505	8	5,788,218	661,190	11
	Widowed	1,430	23	3,322,905	800,442	24
	Single	724	32	1,887,575	887,052	47
	Other	264	20	609,121	230,151	38

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

² The category 'Other' includes separated and divorced decedents, as well those for whom marital status was not known.

Table 2B:--Decedents Making Charitable Bequests, by Sex, Marital Status, and Net Worth, for Returns with Total Gross Estates of \$600,000 or More, Selected Years, in Constant 1987 Dollars

(Money amounts are in thousands)

Female decedents						
Filing year	Marital status	Number of donors	Percent of all decedents	Net worth	Charitable bequests	Percent donated
1963	Married	307	16	992,221	136,529	14
	Widowed	1,934	31	4,798,443	967,274	20
	Single	674	54	1,413,496	474,185	34
	Other ²	87	28	230,798	71,134	31
1970	Married	383	15	1,027,752	146,226	14
	Widowed	2,429	31	7,688,055	3,180,769	41
	Single	757	54	1,444,794	512,671	35
	Other	128	28	262,030	79,155	30
1973	Married	405	15	1,331,370	211,280	16
	Widowed	2,639	32	6,044,846	1,503,987	25
	Single	760	55	1,320,139	450,523	34
	Other	155	27	701,195	323,849	46
1977	Married	357	17	862,783	146,255	17
	Widowed	2,350	31	4,800,099	1,094,647	23
	Single	701	60	971,728	294,124	30
	Other	157	31	282,168	83,616	30
1983 ¹	Married	240	11	568,791	64,499	11
	Widowed	2,035	30	3,977,094	1,028,826	26
	Single	365	43	544,578	253,325	47
	Other	83	20	279,608	55,902	20
1987	Married	391	10	1,071,781	171,068	16
	Widowed	3,240	28	6,364,872	1,425,009	22
	Single	940	53	1,165,985	480,731	41
	Other	121	20	307,471	70,948	23
1990	Married	387	8	1,092,919	125,482	11
	Widowed	4,190	29	8,390,102	2,161,498	26
	Single	1,030	57	1,411,646	470,749	33
	Other	214	24	597,709	192,246	32
Male decedents						
1963	Married	1,694	12	5,283,432	812,078	15
	Widowed	899	30	1,899,905	356,249	19
	Single	487	40	1,003,718	327,686	33
	Other	85	23	163,247	40,996	25
1970	Married	2,222	12	7,232,140	1,064,142	15
	Widowed	1,058	28	2,701,209	846,348	31
	Single	572	38	1,197,609	415,532	35
	Other	121	25	350,744	141,716	40
1973	Married	2,090	12	6,706,375	942,895	14
	Widowed	1,070	27	2,569,186	719,354	28
	Single	544	39	1,144,312	398,395	35
	Other	147	21	436,070	175,693	40
1977	Married	1,984	12	5,336,360	814,258	15
	Widowed	995	28	2,353,674	783,118	33
	Single	508	38	837,290	274,634	33
	Other	123	21	2,001,562	1,772,844	89
1983 ¹	Married	1,149	8	3,809,351	505,317	13
	Widowed	648	24	1,369,895	473,029	35
	Single	414	44	702,215	185,373	26
	Other	85	12	270,707	135,989	50
1987	Married	1,434	9	5,332,938	777,402	15
	Widowed	1,563	30	3,255,070	922,454	28
	Single	567	30	1,230,783	492,819	40
	Other	185	17	303,514	54,095	18
1990	Married	1,483	8	5,775,707	657,196	11
	Widowed	1,359	24	3,277,032	799,059	24
	Single	705	33	1,873,208	879,141	47
	Other	240	19	597,856	232,967	39

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

² The category 'Other' includes separated and divorced decedents, as well those for whom marital status was not known.

Table 3A.—Decedents Making Charitable Bequests, by Sex, Age, and Net Worth, for Selected Years, in Current Dollars

(Money amounts are in thousands)

Female decedents						
Filing year	Age at death	Number of donors	Percent of all decedents	Net worth	Charitable bequests	Percent donated
1963	Under 40	187	21	34,086	7,140	21
	40 under 50	38	7	9,907	1,111	11
	50 under 65	479	13	169,282	36,994	22
	65 under 75	1,218	18	360,053	71,406	20
	75 and over ²	4,464	26	1,587,551	346,256	22
1970	Under 40	15	7	5,761	776	13
	40 under 50	49	5	20,553	1,835	9
	50 under 65	573	9	229,069	51,410	22
	65 under 75	1,719	15	1,178,115	743,155	63
	75 and over	6,824	22	2,330,538	507,089	22
1973	Under 40	28	6	11,616	1,454	13
	40 under 50	56	5	137,701	76,596	56
	50 under 65	723	8	234,418	47,556	20
	65 under 75	1,989	14	741,240	159,672	22
	75 and over	9,404	23	3,245,102	789,686	24
1977	Under 40	21	5	4,028	893	22
	40 under 50	77	7	29,834	3,464	12
	50 under 65	680	6	219,125	42,346	19
	65 under 75	2,136	13	721,731	143,192	20
	75 and over	10,224	21	3,758,768	852,649	23
1983 ¹	Under 40	7	6	10,730	2,590	24
	40 under 50	7	3	22,484	937	4
	50 under 65	299	12	253,883	55,793	22
	65 under 75	552	14	750,589	204,952	27
	75 and over	4,163	29	3,967,221	972,331	25
1987	Under 40	6	7	9,574	2,092	22
	40 under 50	10	5	14,783	674	5
	50 under 65	133	8	208,115	26,012	12
	65 under 75	645	18	1,183,099	358,659	30
	75 and over	4,290	31	6,782,663	1,564,335	23
1990	Under 40	6	7	6,564	24	0
	40 under 50	18	6	28,191	7,978	28
	50 under 65	120	6	389,072	132,877	34
	65 under 75	581	15	1,159,571	264,329	23
	75 and over	5,345	30	10,099,876	2,554,481	25

Footnotes at end of table

Table 3A.--Decedents Making Charitable Bequests, by Sex, Age, and Net Worth, for Selected Years, in Current Dollars--Continued

(Money amounts are in thousands)

Male decedents						
Filing year	Age at death	Number of donors	Percent of all decedents	Net worth	Charitable bequests	Percent donated
1963	Under 40	127	9	45,775	11,593	25
	40 under 50	49	2	29,252	3,098	11
	50 under 65	635	5	313,367	50,773	16
	65 under 75	1,469	10	576,283	80,058	14
	75 and over	3,215	17	1,328,017	267,600	20
1970	Under 40	14	1	3,628	486	13
	40 under 50	74	2	85,976	20,502	24
	50 under 65	756	4	367,751	47,119	13
	65 under 75	1,738	7	928,944	137,916	15
	75 and over	4,962	15	2,520,096	619,310	25
1973	Under 40	40	2	8,371	1,216	15
	40 under 50	100	2	66,545	28,148	42
	50 under 65	834	3	418,191	64,910	16
	65 under 75	2,119	7	1,072,716	165,664	15
	75 and over	5,905	13	2,991,802	654,272	22
1977	Under 40	62	2	15,758	971	6
	40 under 50	212	4	46,014	5,533	12
	50 under 65	1,380	5	435,573	48,682	11
	65 under 75	2,622	8	1,111,995	198,461	18
	75 and over	6,982	13	4,624,754	1,698,773	37
1983 ¹	Under 40	10	2	6,661	906	14
	40 under 50	26	2	34,425	2,374	7
	50 under 65	253	3	333,519	47,947	14
	65 under 75	945	11	1,373,085	163,816	12
	75 and over	2,761	17	3,621,773	882,346	24
1987	Under 40	14	5	11,046	3,326	30
	40 under 50	34	4	56,195	7,164	13
	50 under 65	268	5	551,793	81,883	15
	65 under 75	590	9	1,507,494	174,663	12
	75 and over	2,997	23	7,014,610	1,759,214	25
1990	Under 40	26	8	59,093	16,615	28
	40 under 50	77	7	392,048	268,829	69
	50 under 65	298	6	832,921	144,341	17
	65 under 75	540	7	1,837,181	264,553	14
	75 and over	2,981	19	8,486,576	1,884,498	22

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

² The category '75 and over' includes decedents whose age was not known.

Table 3B.—Decedents Making Charitable Bequests, by Sex, Age, and Net Worth, for Returns with Total Gross Estate of \$600,000 or More, Selected Years, in Constant 1987 Dollars

(Money amounts are in thousands)

Female decedents						
Filing year	Age at death	Number of donors	Percent of all decedents	Net worth	Charitable bequests	Percent donated
1963	Under 40	73	30	95,479	20,272	21
	40 under 50	21	11	34,160	3,287	10
	50 under 65	222	19	586,636	134,875	23
	65 under 75	550	26	1,200,604	241,597	20
	75 and over ²	2,136	36	5,518,079	1,249,092	23
1970	Under 40	6	12	16,363	2,423	15
	40 under 50	28	12	61,067	4,745	8
	50 under 65	235	16	654,216	157,049	24
	65 under 75	681	26	3,497,438	2,356,167	67
	75 and over	2,747	34	6,193,549	1,398,437	23
1973	Under 40	13	15	27,592	4,002	15
	40 under 50	15	8	372,828	213,441	57
	50 under 65	235	16	493,895	100,628	20
	65 under 75	633	24	1,620,843	359,361	22
	75 and over	3,063	36	6,882,391	1,812,207	26
1977	Under 40	5	11	4,771	1,621	34
	40 under 50	11	8	44,188	5,013	11
	50 under 65	138	13	311,154	61,301	20
	65 under 75	561	27	1,030,366	205,724	20
	75 and over	2,850	35	5,526,300	1,344,981	24
1983 ¹	Under 40	5	9	12,747	3,307	26
	40 under 50	4	3	26,924	1,179	4
	50 under 65	101	8	234,913	66,116	28
	65 under 75	348	20	877,800	244,236	28
	75 and over	2,264	32	4,217,687	1,087,714	26
1987	Under 40	6	7	10,839	2,348	22
	40 under 50	8	4	15,586	764	5
	50 under 65	123	8	226,770	28,922	13
	65 under 75	558	17	1,270,459	386,490	30
	75 and over	3,998	31	7,386,456	1,729,232	23
1990	Under 40	6	8	6,535	23	0
	40 under 50	17	6	27,804	7,977	29
	50 under 65	120	6	389,178	132,650	34
	65 under 75	552	15	1,138,185	261,752	23
	75 and over	5,126	31	9,930,674	2,547,573	26

Footnotes at end of table

Table 3B.—Decedents Making Charitable Bequests, by Sex, Age, and Net Worth, for Returns with Total Gross Estate of \$600,000 or More, Selected Years, in Constant 1987 Dollars—Continued

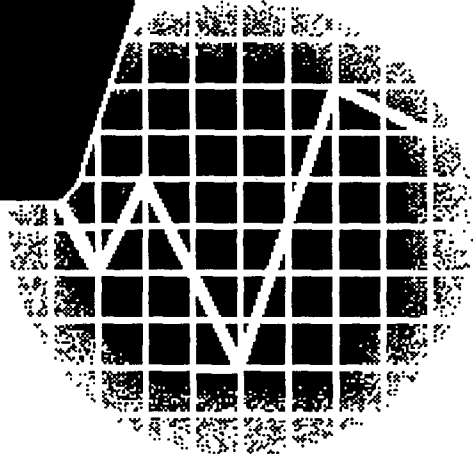
(Money amounts are in thousands)

Male decedents						
Filing year	Age at death	Number of donors	Percent of all decedents	Net worth	Charitable bequests	Percent donated
1963	Under 40	60	13	159,177	42,697	27
	40 under 50	28	4	109,922	11,055	10
	50 under 65	381	8	1,169,315	191,495	16
	65 under 75	858	15	2,090,184	291,384	14
	75 and over	1,838	26	4,821,704	1,000,377	21
1970	Under 40	6	2	8,860	1,552	18
	40 under 50	40	3	269,515	65,278	24
	50 under 65	427	8	1,093,158	128,663	12
	65 under 75	978	14	2,789,597	402,223	14
	75 and over	2,521	25	7,320,572	1,870,022	26
1973	Under 40	14	5	11,073	570	5
	40 under 50	49	5	170,915	76,767	45
	50 under 65	346	7	984,012	156,748	16
	65 under 75	966	14	2,590,309	406,477	16
	75 and over	2,475	23	7,099,633	1,595,775	22
1977	Under 40	17	6	21,133	1,657	8
	40 under 50	30	3	43,887	2,468	6
	50 under 65	317	7	594,323	57,849	10
	65 under 75	778	14	1,740,774	306,866	18
	75 and over	2,467	24	8,128,769	3,276,014	40
1983 ¹	Under 40	5	2	6,587	845	13
	40 under 50	20	3	42,353	3,064	7
	50 under 65	175	4	400,625	56,920	14
	65 under 75	549	12	1,598,345	189,081	12
	75 and over	1,547	19	4,104,258	1,049,800	26
1987	Under 40	13	4	11,840	3,292	28
	40 under 50	32	4	61,904	8,006	13
	50 under 65	254	5	614,136	90,029	15
	65 under 75	589	10	1,681,625	194,956	12
	75 and over	2,860	24	7,752,800	1,950,487	25
1990	Under 40	26	8	58,878	16,463	28
	40 under 50	74	7	391,368	268,882	69
	50 under 65	281	6	828,614	138,810	17
	65 under 75	528	8	1,830,077	264,081	14
	75 and over	2,876	20	8,414,865	1,880,128	22

¹ The 1983 sample excluded returns filed for decedents dying prior to 1982; these decedents accounted for approximately 8 percent of the returns filed in 1983. Therefore, these estimates understate the actual filing year totals.

² The category '75 and over' includes decedents whose age was not known.

*Personal
Wealth
Studies*



CHAPTER 3

Personal Wealth Data

The first paper in this section, "Personal Wealth Estimated From Estate Tax Returns, 1962," written by Dr. Fritz Scheuren, was the first in a series of SOI personal wealth reports. Originally presented as a book of about 80 pages, it remains the most comprehensive personal wealth report ever produced at SOI, containing a description of the estate multiplier methodology used to derive the estimates, an analysis of the data including numerous charts and tables, and a detailed discussion of the limitations of wealth estimates derived from Federal estate tax returns. The text of that report is faithfully reproduced here; however, only selected tables have been included due to space considerations.

The second and third papers, personal wealth estimates for 1969 and 1972, respectively, were also originally produced as books. However, the methodological sections and appendices of each drew heavily from the 1962 report. Therefore, only those sections which present "new" material are included here, along with a few basic tables. The entire reports for 1962, 1969, and 1972 are available from the SOI Statistical Information Office ((202) 874-0410). The remaining personal wealth papers are reprinted in their entirety.

The papers by Dr. Eugene Steuerle are based on a special data base which was a collation of estate tax returns, income tax returns of decedents in years before death, and income tax returns of heirs in years both prior to and following the death of their benefactor. These data provided a unique opportunity to look at the relationships between wealth and income as well as the effects of inheritances on income and employment. SOI is currently compiling similar data bases for decedents who died in 1989 and 1992. In addition to Federal income tax returns, these data bases will include gift and fiduciary tax returns filed for both decedents and beneficiaries.

Statistics of Income

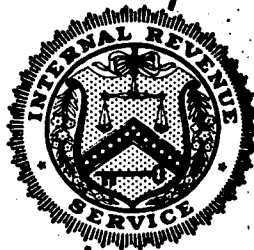
1962

Supplemental Report

by Fritz Scheuren, Ph.D

Personal Wealth

*Estimated from
Estate Tax Returns
filed during
calendar year 1963*



*Prepared under the direction of the
Commissioner of Internal Revenue
by the Statistics Division*

U. S. TREASURY DEPARTMENT

Internal Revenue Service • Publication No. 482 (7-67)

Introduction and summary

INTRODUCTION

This report, a supplement to *Statistics of Income-1962, Fiduciary, Gift and Estate Tax Returns*, provides estimates of the assets and demographic characteristics of individuals with gross holdings of \$60,000 or more in 1962. The report focuses on the age, sex and marital status of these "top wealthholders", as well as the size and composition of their wealth.

The estimates of the wealth of the living are based on Federal estate tax returns filed during 1963 for decedents with a gross estate of \$60,000 or more. Each decedent's estate was weighted by the inverse of the mortality rate appropriate to his age and sex, a device known as the "estate multiplier technique".¹ The underlying assumption is that "death" draws a random sample from the living population. A technically more precise way of looking at the estimates is that they represent all those for whom a Federal estate tax return would have been required had they died in 1962.

A number of problems associated with this approach are discussed in the technical appendix. However, mention of them is made at this time in order to provide an indication of the limitations imposed by the nature of the technique.

The estate tax return is an administrative document designed for the purpose of collecting taxes. It is also a rich source of economic information and draws notable strength from having been prepared from records, generally by highly skilled people and under exacting requirements of law. The wealth reported on the return is not however identical with what is ordinarily considered a man's personal wealth. One obvious difference is life insurance. The financial value of such insurance to a living person is its cash surrender value; the estate of a deceased person includes the insurance at its full face value. In the estimates presented insurance proceeds were adjusted so both equity and face values of insurance could be included in different concepts of wealth.

Perhaps the chief problem that confronts all applications of the estate multiplier technique is the lack of exact mortality rates appropriate to the wealthy. This deficiency is very important for there is much evidence to support the view that the mortality structure of the wealthy is more favorable than that for the general population. However, only an approximation to this structure could be made. The approximation, while reasonable, may contain biases which lead to under- or overestimates of the number and wealth of top wealthholders.

The report was intended to show the patterns of asset holdings among different age, sex, and marital groups of the wealthy. For this purpose the estimates are believed

to be fairly reliable. However, other uses of the present statistics, for example to study wealth concentration, may yield imprecise results. As mentioned, there are important differences in concept between wealth subject to the estate tax and the more usual notions of personal wealth. The estimation technique is approximate and may not be reliable for all purposes.

The estate multiplier technique is a potentially powerful research tool. Future studies will further refine this means of learning about the wealthy. In prospect are the use of better estimates of the mortality of the rich coupled with more study of the differences among the various measures of personal wealth.

SUMMARY

There were 4.1 million individuals with gross assets of \$60,000 or more in 1962, about 3.7% of the mid-year U.S. adult population. Table A shows that these "top wealthholders" had real estate, stocks and bonds, cash, notes, equity in life insurance, and other assets which totaled \$752 billion. They also had debts of \$82.7 billion leaving a net worth of \$669.3 billion.

About 1.8 million individuals had net worth of \$100,000 or more and 177,000 had net worth of \$500,000 or more. Corporate stock was the most heavily favored investment for both these groups. Real estate was the first choice for those with net worth of less than \$100,000.

Overall, corporate stock at \$325.8 billion was the largest single item in the top wealthholders' balance sheet. Real estate was second at \$188.0 billion. Together these two assets constituted more than two-thirds of all the assets of top wealthholders.

Three-fifths, or about 2.5 million, of the top wealthholders were men, with average asset holdings of \$173,000. The women were wealthier, however, with an average of \$196,000. More than half of the top wealthholders were married - 84% of the men and 48% of the women.

Table A. --1962 SUMMARY STATISTICS BY SIZE OF NET WORTH

Item	Total	Size of net worth			
		Under \$60,000	\$60,000 under \$100,000	\$100,000 under \$500,000	\$500,000 or more
	(1)	(2)	(3)	(4)	(5)
(Thousands)					
Number of top wealthholders.....	4,132	878	1,455	1,622	177
(Billion dollars)					
Total assets.....	752.0	54.8	126.7	329.0	241.5
Real estate.....	188.0	26.0	47.1	89.2	25.7
Bonds.....	47.9	1.0	5.7	17.7	23.6
Corporate stock.....	325.8	7.7	31.2	132.5	154.5
Cash.....	70.7	4.2	18.5	35.5	12.5
Notes and mortgages.....	30.4	1.4	7.0	15.5	6.5
Insurance equity.....	15.6	4.5	3.3	6.2	1.6
Other assets.....	73.5	10.0	14.0	32.4	17.2
Debts.....	82.7	23.3	13.7	28.5	17.2
Net worth (less deficit).....	669.3	31.5	113.0	300.5	224.3

NOTE: Detail may not add to totals because of rounding.

¹A history and bibliography are given in "Estimating the Wealth of Top Wealthholders from Estate Tax Returns", a paper by James D. Smith and Staunton K. Calvert of the Statistics Division, 1965 *Proceedings of the Business and Economic Statistics Section, American Statistical Association*, pp. 249-250, 260-261.

Top wealthholders tended to be in middle or later life. The average age for the men was 54 years, while the women were a little older, about 57.² The overall average ages for married, single and widowed top wealthholders are shown below.

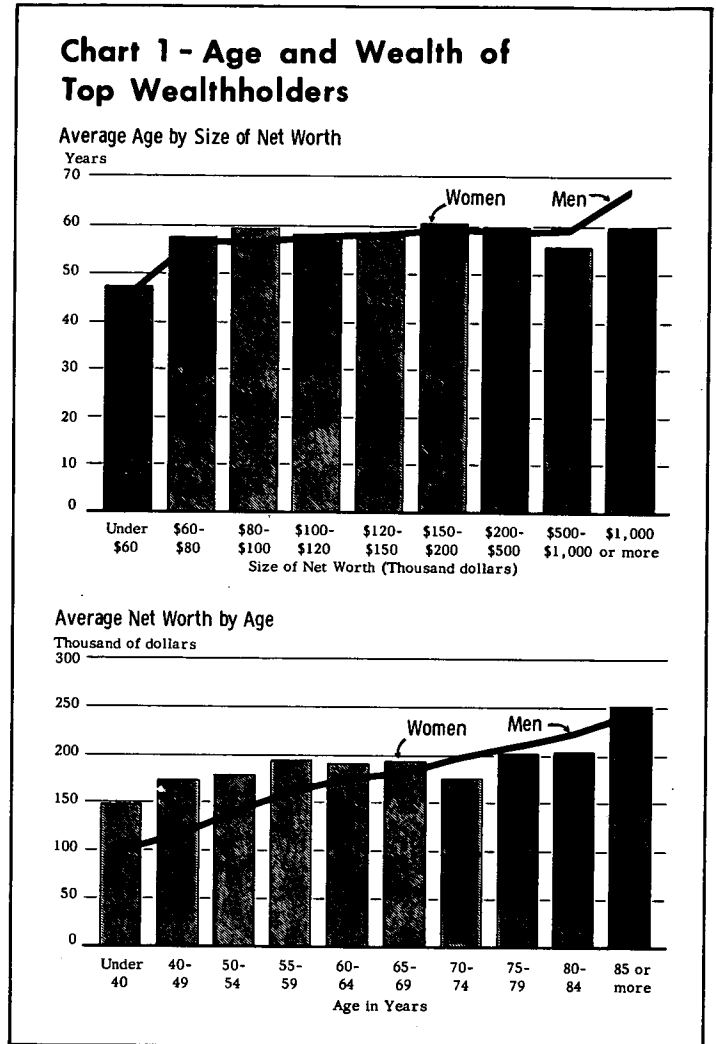
	Average age of top wealthholders (in years)	
	Men	Women
Married	53	52
Single	51	57
Widowed	68	70

Chart 1 shows the expected relation between age and the amount of wealth held. The pattern for men is fairly regular; men with net worth of less than \$60,000 averaged 45 years of age - for men worth \$1 million or more the average age was 67. The strength of this relationship is more dramatically highlighted by examining the average size of net worth for each age group. In fact, the net worth of male top wealthholders increases without a break from about \$100,000 for those under 40 to nearly \$250,000 for those 85 or older.

The chart also shows that while for female top wealthholders there is a tendency for wealth and age to increase together, this is much less pronounced than for men.

Not only does total wealth vary with age but so does asset composition. In general, there are marked differences in asset preferences related to age, sex, marital status and the size of wealth itself. These patterns and some possible reasons for them are discussed in the section which follows.

²Average ages shown in chart 1 and elsewhere in this report were computed using the actual ages of top wealthholders. Averages computed using grouped data (for example, in tables 22-23) would yield slightly different results.



Top wealthholders in 1962

MEN AND WOMEN - HOW THEY INVEST THEIR WEALTH

The summary in table B points up some of the more obvious differences between the holdings of men and women. For example, proportionally more men than women own real estate, notes and mortgages, insurance and annuities; women own more bonds and corporate stock. These overall differences are not very great except in the case of insurance where about 87% of the men had some insurance, versus only 46% of the women.

Men also have a much heavier debt burden than women with 14% of their total assets owed as debts and mortgages compared with less than 7% for women. In the investment pattern of men there is a greater emphasis on unincorporated business interests (included in "Other assets") and on real estate. These assets are included at their gross value in total assets. Debts against them, particularly mortgages on real estate, are by far the most important of the liabilities incurred by top wealthholders.

death of the husband and the coming of age of the children. Federal estate taxation favors this arrangement, in that up to half of the total value of the estate may be removed from taxation if the assets are bequeathed to the surviving spouse. These assets may then be transferred by gift at a considerable tax saving.

AGE AND ASSET COMPOSITION

Marked differences in asset composition exist among age groups. Chart 2 shows that there is a shift in the asset mix toward financial assets with advancing age, partly reflecting changed requirements.

Real estate reaches a peak in the 40 to 49 year age group both in the incidence with which it is held (88%) and in the share of total assets invested in it (29%). Real estate declines in appeal for older groups and for those age 85 or more it represents only 15% of their wealth. One of the first purchases for top wealthholders seemingly is the family home, thus real estate's importance for those under 50 years of age. However, further purchases of real estate do not keep pace with the acquisition of more wealth - in fact in many cases homes may be liquidated by older people in favor of other living arrangements.

There is a sharp decline in the holding of insurance as top wealthholders age, from 83% of all those under 40 to less than 30% of those 85 or more. This decline, of course, reflects the reduction in the need for protection as the family matures and as the amount of wealth held increases.

The holding of securities tends to increase from the under 40 age group to those 85 years old or older. Bonds exhibit the most dramatic rise, from 3 to 12 percent of total assets and from 39 to 61 percent of the top wealthholders. This may be due, in part, to the correlation between wealth and age. State and local bonds, whose interest is not subject to the Federal income tax, become attractive as wealth increases.

The gradual shift toward corporate stock with increasing age is probably due to a number of factors. Generally business activities decline with age so that there is a tendency to liquidate equity in sole proprietorships, partnerships and real estate in favor of less demanding forms of investment. Another factor already mentioned in connection with bonds is the relationship between age and wealth. The importance of corporate stock in a top wealthholder's asset composition seems to be directly related to the size of his wealth. Part of this relationship is reflected when looking at the asset composition of different age groups.

Table B. —ASSETS OF TOP WEALTHHOLDERS

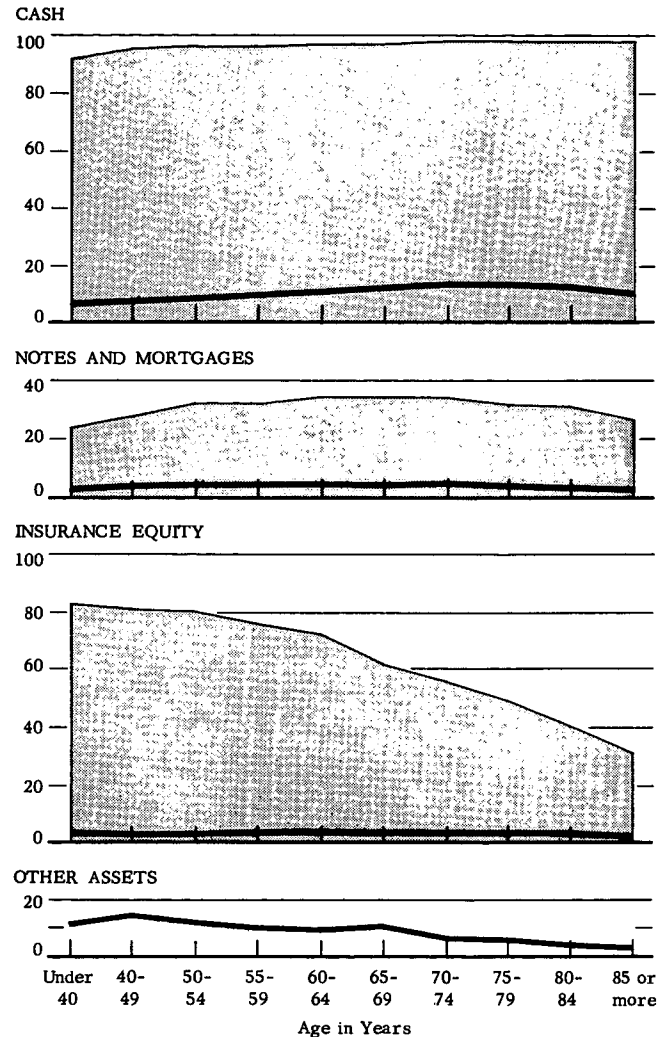
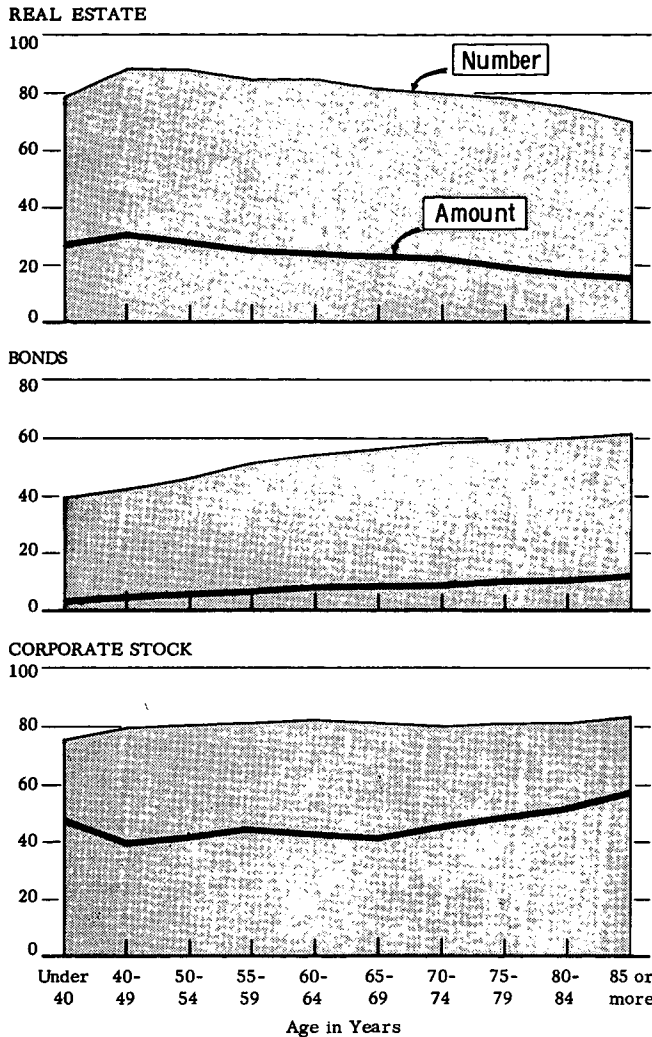
Item	Total		Men		Women	
	Number of top wealthholders	Amount	Number of top wealthholders	Amount	Number of top wealthholders	Amount
	(Thousands)	(Billion dollars)	(Thousands)	(Billion dollars)	(Thousands)	(Billion dollars)
	(1)	(2)	(3)	(4)	(5)	(6)
Total assets.....	4,132	752.0	2,539	439.1	1,594	312.9
Real estate.....	3,444	188.0	2,194	118.3	1,250	69.7
Bonds.....	2,021	47.9	1,175	23.5	846	24.4
Corporate stock.....	3,283	325.8	1,983	175.7	1,300	150.1
Cash.....	3,955	70.7	2,432	38.7	1,523	32.0
Notes and mortgages.....	1,279	30.4	803	19.8	476	10.6
Insurance equity.....	2,950	15.6	2,215	13.9	735	1.6
Other assets.....	(¹)	73.5	(¹)	49.1	(¹)	24.4
Annuities.....	463	4.9	323	3.6	141	1.3
Debts.....	3,655	82.7	2,280	61.7	1,375	21.0
Net worth (less deficit)...	4,132	669.3	2,539	377.4	1,594	291.9
Information items:						
Insurance face.....	2,950	95.6	2,215	86.5	735	9.0
Jointly owned property...	2,545	109.7	1,789	81.9	765	27.9
Powers of appointment...	45	6.6	11	0.7	34	5.9

¹Not available.

NOTE: Detail may not add to total because of rounding.

Further insight into differences between the holdings of men and women can be gained by looking at property held under a power of appointment, in this context the right to confer the enjoyment or use of property on oneself or anyone else even though "title" to the property is not held. More than 3 out of 4 wealthholders with such rights are women. Presumably the power is conferred to provide for these women during life and for them in turn to provide for others, their children perhaps. More frequently women may act as the conservator and temporary repository of family wealth in that period between the

Chart 2 - Number and Amount of Asset Holdings as a Percent of Total¹, by Type of Asset and Age Group



¹Number of top wealthholders with specified asset as a percent of the total number in each age group.
 Amount of top wealthholders holdings in a specified asset as a percent of total assets.

WEALTH AND ASSET COMPOSITION

Chart 3 highlights the marked differences in the asset composition of top wealthholders when arrayed by size of net worth. In fact a top wealthholder's asset preference seems to bear a direct relationship to his net worth. Real estate, for example, made up nearly half the assets for those with net worth of less than \$60,000; corporate stock only between 13 and 17 percent. For the 60,000 top wealthholders with net worth of \$1,000,000 or more, there was a complete change with real estate constituting between 7 and 9 percent of total assets while corporate stock had climbed to more than two-thirds of the total. In fact about one-third of all the corporate stock of top wealthholders is held by persons with assets of more than

Table C. —NUMBER AND ASSETS OF MILLIONAIRES UNDER THREE SEPARATE MEASURES OF WEALTH

Item	Net worth	Total assets	Gross estate
	(1)	(2)	(3)
Number of millionaires.....	60,000	67,000	71,000
	(Billion dollars)		
Total assets.....	156.5	167.7	170.8
Real estate.....	12.4	15.9	16.6
Bonds.....	16.8	17.1	17.2
Corporate stock.....	107.2	111.6	113.4
Cash.....	6.2	6.4	6.5
Notes and mortgages.....	3.6	5.2	5.3
Insurance equity.....	0.8	0.8	0.9
Other assets.....	9.6	10.6	10.9
Debts.....	12.0	17.6	18.4
Net worth (less deficit).....	144.5	150.1	152.4

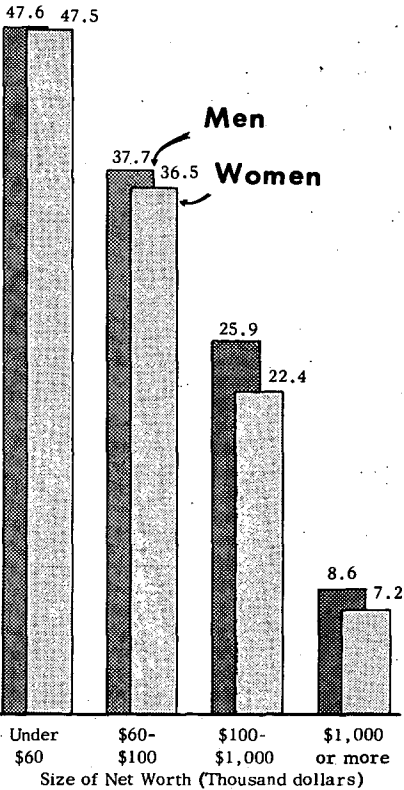
NOTE: Detail may not add to total because of rounding.

Chart 3 - Asset Composition and Size of Net Worth

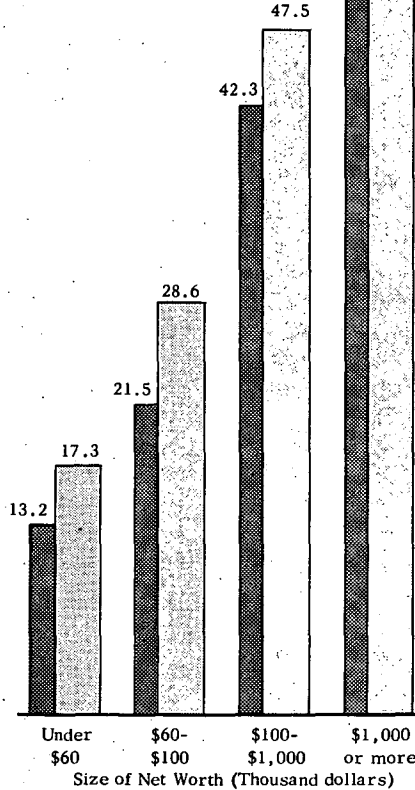


Percent of each asset to total assets

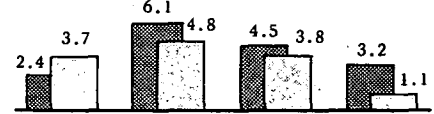
REAL ESTATE



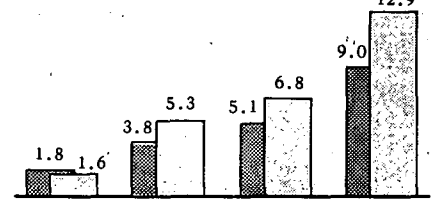
CORPORATE STOCK



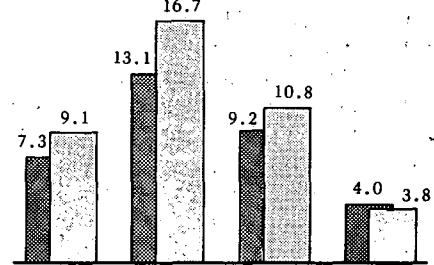
NOTES AND MORTGAGES



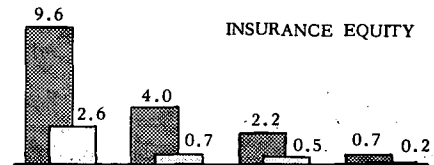
BONDS



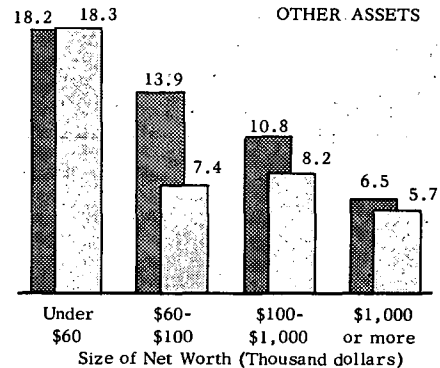
CASH



INSURANCE EQUITY



OTHER ASSETS



one million dollars, 36,000 of whom, as tables 20 and 21 show, are millionaires by virtue of stock alone.

CONCEPTS OF WEALTH

There are three major concepts or measures of wealth used in this report - net worth, total assets and gross estate. Each presents a different profile of the size of a top wealthholder's asset holdings. As table C shows, there were between 60,000 and 71,000 persons with

assets of more than one million dollars in 1962, depending on what measure of wealth is used.

Gross estate is the gross value of all assets including the full face value of insurance. There were 71,000 people in 1962 with gross estates of \$1,000,000 or more, an increase of more than 50 percent from the 47,000 in 1958.¹

¹In past wealth estimates, notably for 1958 - see table 32, gross estate was the only available size classifier. The 1962 wealth of top wealthholders is shown by size of gross estate in table 28.

Total assets, while still essentially a gross measure, is obtained by using the more appropriate equity value of the life insurance asset (tables 16-18). There were 67,000 individuals with total assets of \$1,000,000 or more.

Net worth, of course, is the level after all debts have been removed. Since it is the more usual concept of wealth, net worth is the major classifier in this report.

The relationship between these three levels of wealth is shown in tables 19, 29 and 30 in this report. Shifts in the size profiles between net worth and total assets are highlighted in table 19; between net worth and gross estate in table 30.

Table 29 may be especially useful in focusing on those with net worth of less than \$60,000. Of the 4 million people with a gross estate of \$60,000 or more in 1962, nearly half a million are included who did not have total assets of that amount. More than one-fifth of the wealthholders estimated in this report did not have a net worth of \$60,000 or more. This latter group, seven out of eight of whom were men, have large insurance policies or debts. They are also considerably younger than average - 46 years of age as compared to 58 years for wealthholders with net worth of \$60,000 or more. While of interest in themselves, they are clearly a special case and the reader may wish to treat them somewhat differently. With a few minor exceptions they are shown separately in the basic tables.

ASSET TYPES

The composition of wealth is related to age, sex, marital status, and the total amount of wealth held. For a number of reasons, the present report can only provide partial answers to the question of the direction and magnitude in which these influences interact. One limitation is that the asset categories are quite broad and not always very homogeneous.

Individual movements within an asset category may be obscured or confounded by other, perhaps opposite, tendencies. Even within such a relatively homogeneous cate-

gory as publicly traded stock, important but unobserved changes in portfolio composition may occur. Because of the graduated income taxes, there may be a shift toward growth stocks with lower yields as wealth increases.

The charts on the following pages give some idea of the direction and importance of the interaction of age, sex, marital status and size of wealth. Data for a more extensive analysis of asset composition will be found in tables 22-27.

In general, the size of a top wealthholder's net worth bears the most persistent and dominant relation to asset composition, particularly in the holding of insurance, stock, and real estate. Sex and age play less important roles but are useful classifiers of such assets as insurance which is considerably more common among men and the holding of bonds which is closely related to age. Single people also seem to differ in asset preference from the married and widowed. However, sometimes differences between groups are so small that it is impossible to determine whether the differences are due to anything more than sampling variability. A summary of these relationships and description of major shifts is presented with the charts which follow.

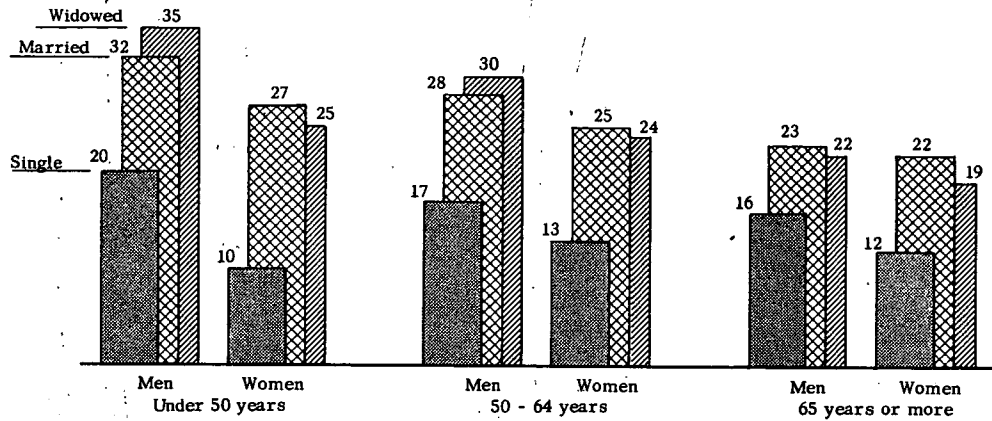
Each chart presents three profiles of the holding of a particular asset, or of debts. The proportion of the asset to total assets is shown for each marital group by age and by amount of wealth and also for each age group by size of holding, separately for men and women. As an illustration of how the charts might be used, consider the real estate holdings of single people. The chart for real estate on the next page shows that single men under 50 years of age have 20% of their total assets invested in real estate; single women under 50 only about 10%. In fact, for every age group and size of net worth single men own relatively more real estate than single women. The chart also shows that the real estate holdings decline for single men as they get older or wealthier. Finally, the chart reveals that single people always have a smaller proportion of their assets in real estate than married or widowed top wealthholders - this regardless of age, sex, or amount of wealth.

Chart 4 Real Estate

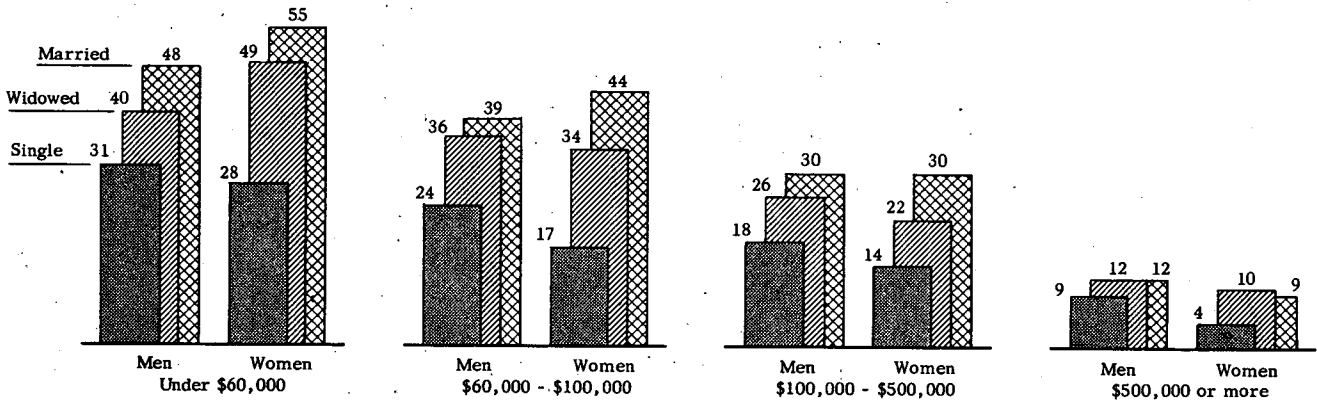
Holdings as a percent of total assets



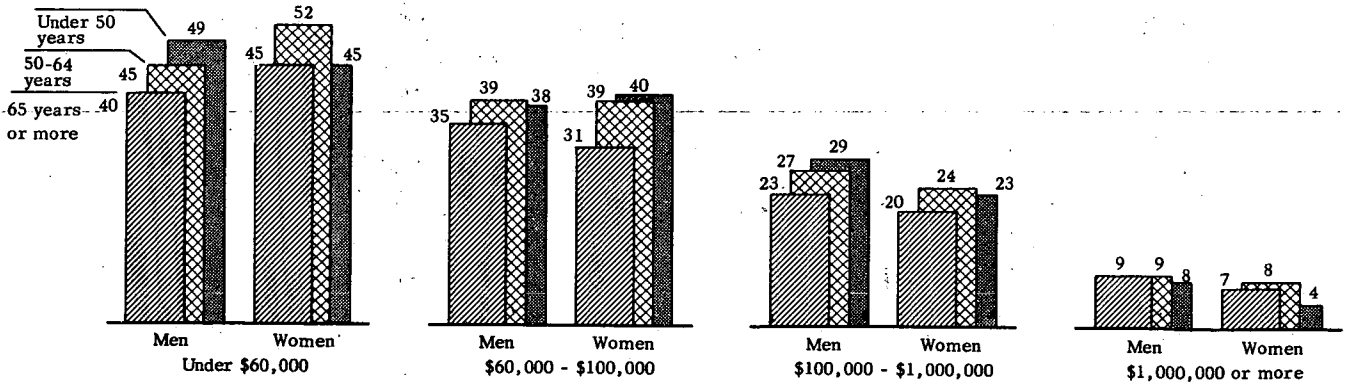
Marital Status by Age



Marital Status by Size of Net Worth



Age by Size of Net Worth



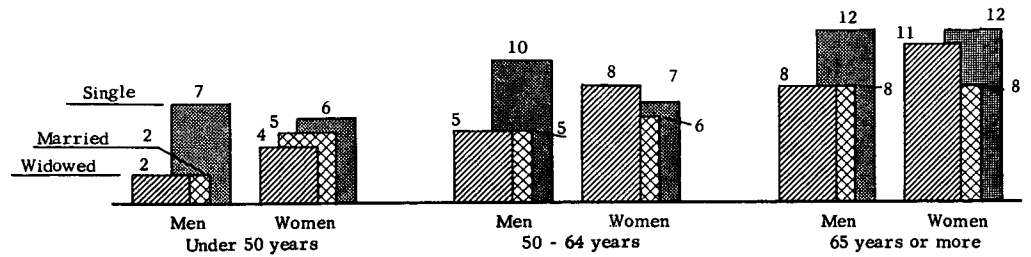
Younger men prefer real estate more than their elders. However, as wealth increases, age plays a less important role; in fact, millionaire men of all ages have about the same portion of their wealth, 8.6%, invested in real estate. Women 50 to 64 years of age generally prefer real estate more than their younger or older counterparts but this is not marked.

To summarize, real estate declines as a proportion of total assets as wealth and age increase, and is generally preferred more by men than by women. The preference is also related to marital status with single people having less of their wealth invested in real estate than do the married or widowed. The size of wealth, however, seems to be the most determining factor in an individual's preference for real estate.

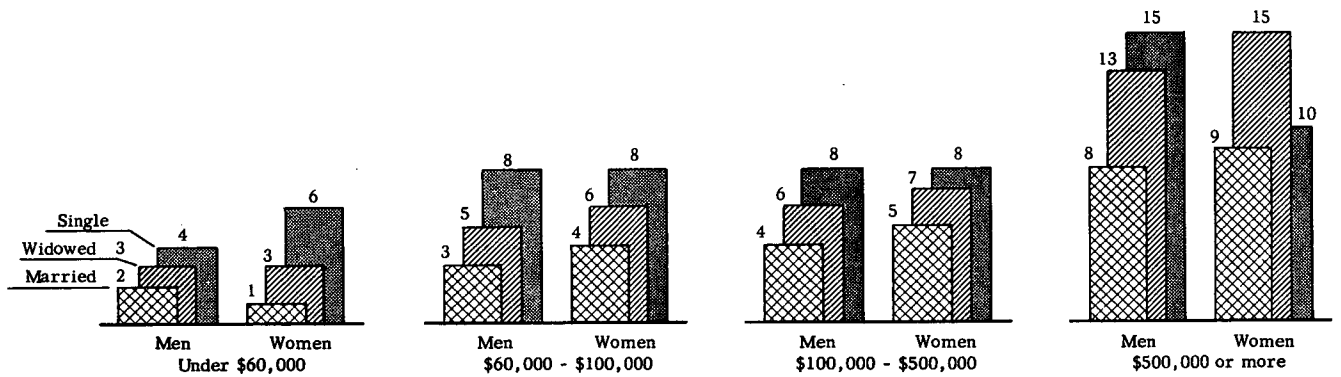
Chart 5 Bonds

Marital Status by Age

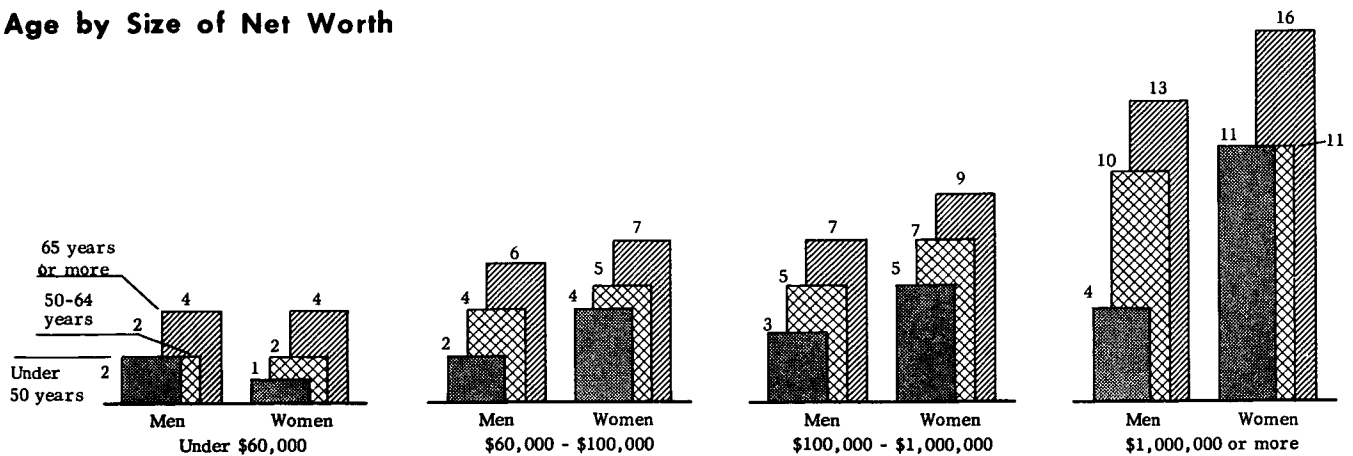
Holdings as a percent of total assets



Marital Status by Size of Net Worth



Age by Size of Net Worth



Bonds increase as a proportion of total assets as wealth and age increase, with women tending to hold more of this asset than men.

Single people prefer bonds more than any other group. Single men for example, always lead men in preference; however, single women are surpassed by widowed women 50-64 years of age, widows with net worth of \$1,000,000 or

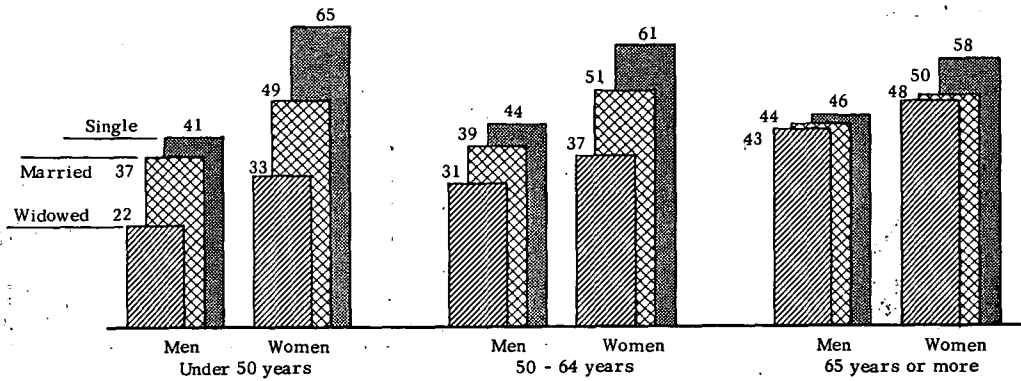
more, and even by married women 65 years or older. The holding of bonds is related about as much to age as to wealth: to wealth because of the tax benefits of holding State and local bonds; to age, independently of wealth, perhaps because of a tendency toward more conservative holdings as age increases.

Chart 6 Corporate Stock

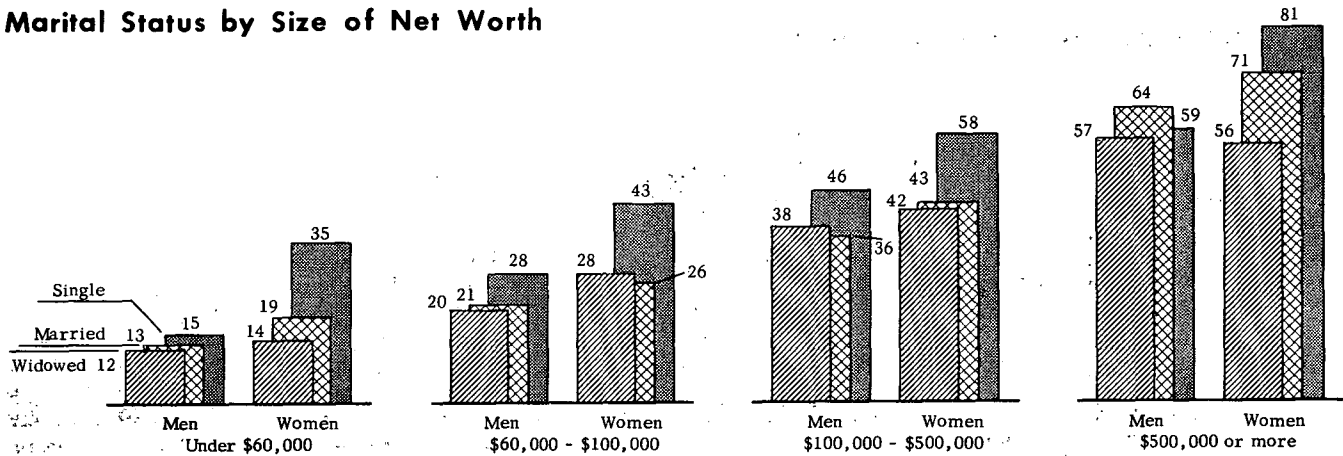
Holdings as a percent
of total assets.



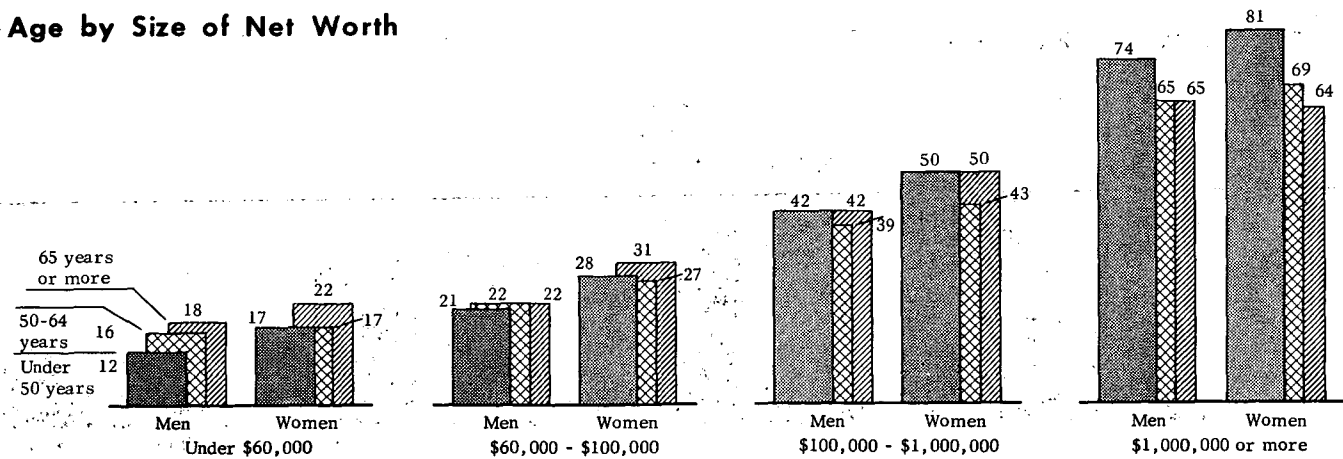
Marital Status by Age



Marital Status by Size of Net Worth



Age by Size of Net Worth



The importance of corporate stock increases as age and wealth increase, with wealth being the far more crucial index. As age increases the holding of stock tends more nearly to follow the same pattern in all marital groups. Women prefer stock more than men and single women more than any other sex-marital group, irrespective of

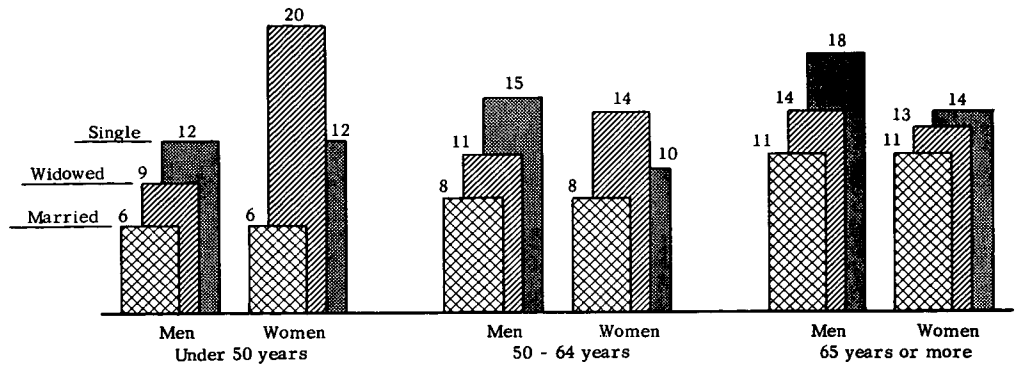
age or wealth. The long-term trend of appreciation in the value of stock may account for this asset being so heavily favored by the very wealthy. Regardless of age or marital status, corporate stock tends to be the predominate holding as wealth increases.

Chart 7 Cash

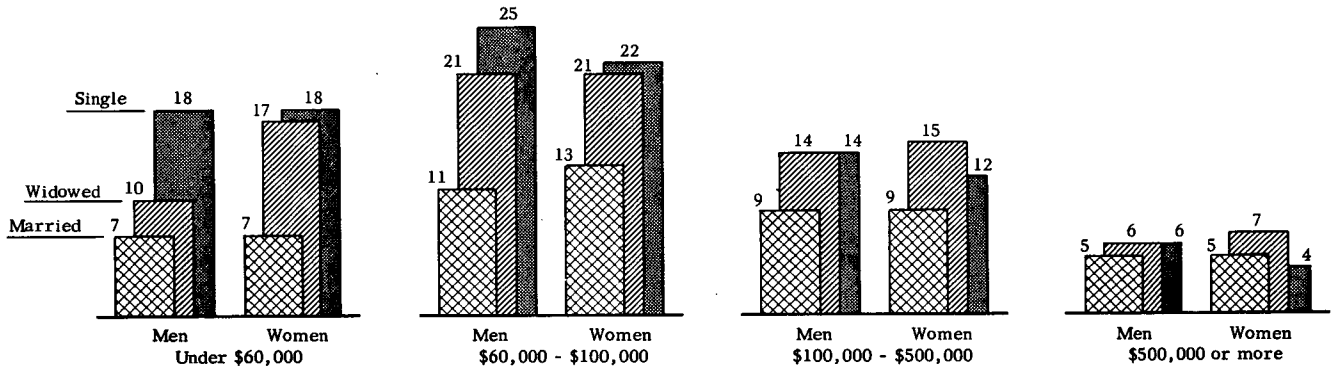
Holdings as a percent of total assets



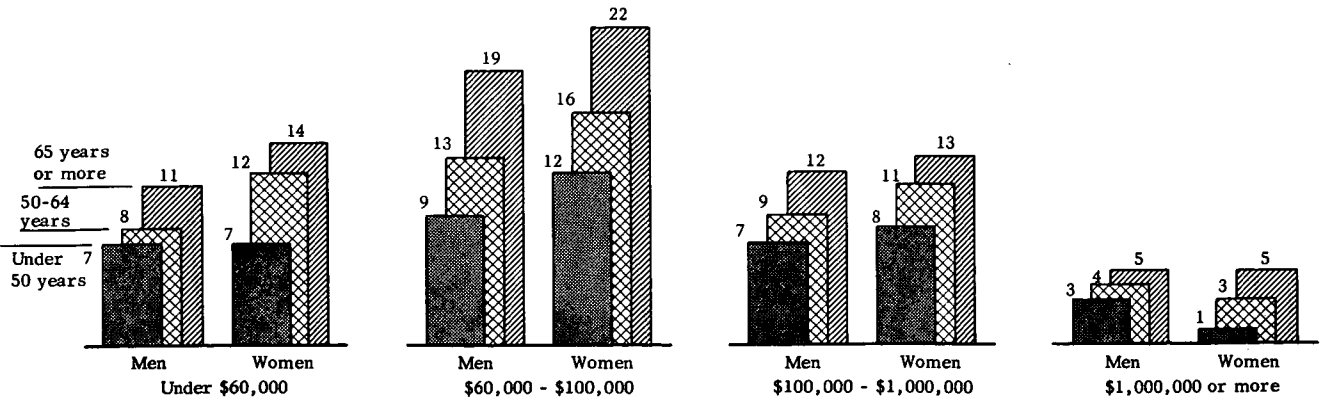
Marital Status by Age



Marital Status by Size of Net Worth



Age by Size of Net Worth



Cash tends to increase as a proportion of total assets as age increases. This pattern of holding is similar to that of bonds. Unlike bonds, however, it does not continue to increase as wealth increases. Cash reaches a peak for those worth between \$60,000 and \$100,000; it declines in importance thereafter.

Single people in general and single men in particular lead

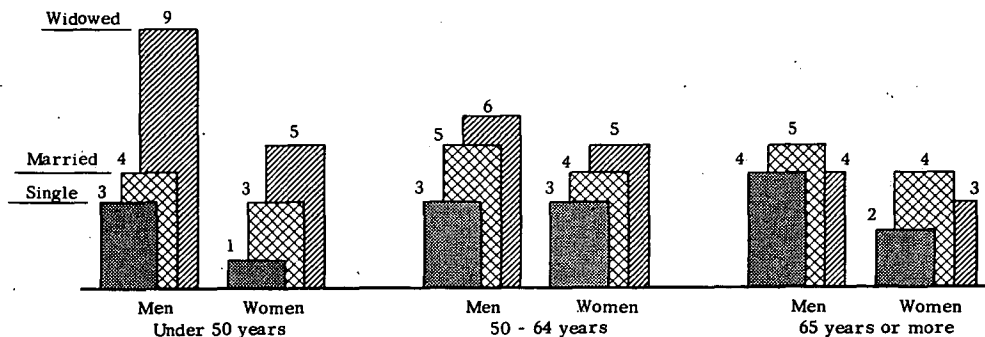
in the preference for cash. Overall, however, it is women who tend to prefer this asset. When wealth is held constant, female top wealthholders have proportionally more of their wealth in checking and savings accounts, etc., than do men. The one exception to this is women with net worth of one million dollars or more; they hold slightly less than their male counterparts.

Chart 8 Notes and Mortgages

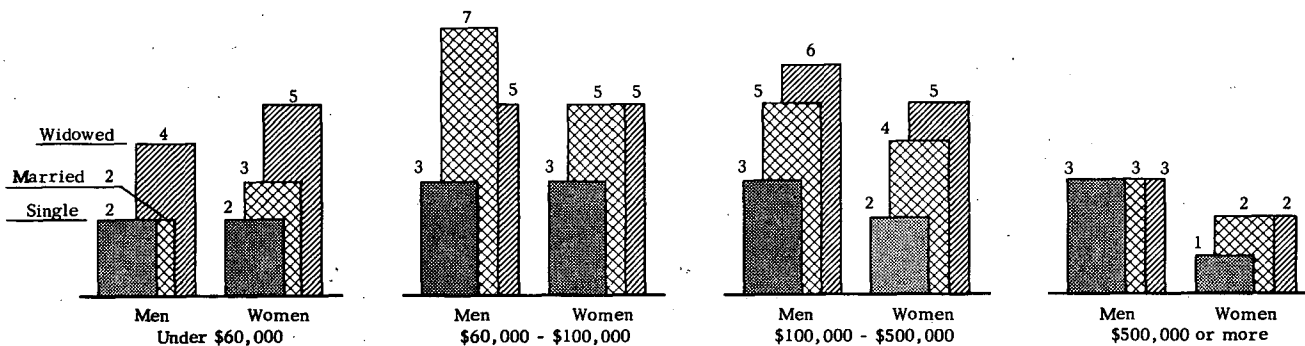
Holdings as a percent
of total assets



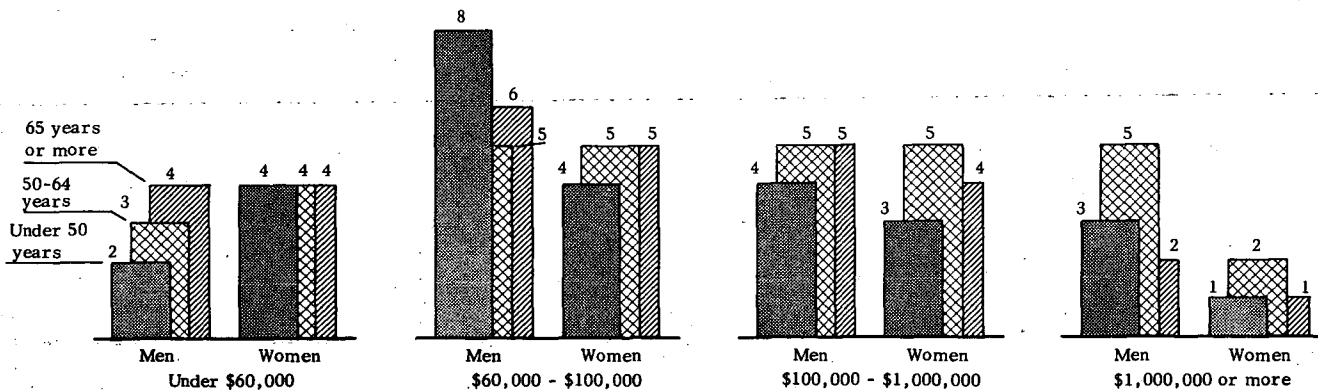
Marital Status by Age



Marital Status by Size of Net Worth



Age by Size of Net Worth



Single people hold less of their wealth as notes and mortgages than any other age-marital group. Notes increase in importance with age but decline as wealth increases; a pattern very like that of cash except these tendencies are not as marked.

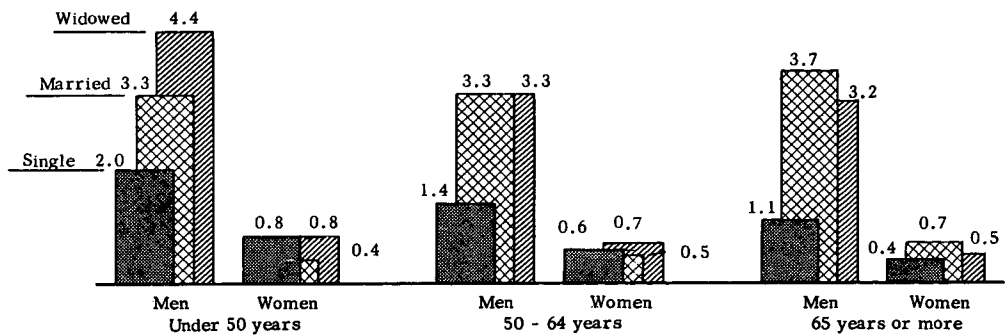
Overall, men prefer this asset more than women. However, women with net worth of less than \$60,000 hold relatively more than men. The decline in the importance of notes and mortgages as wealth increases is also sharper for women than for men.

Chart 9 Insurance Equity

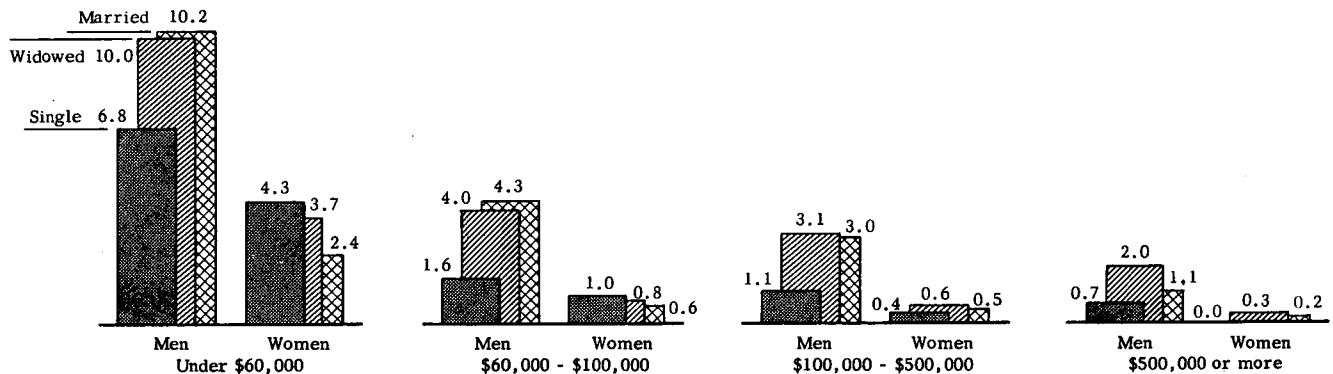
Holdings as a percent
of total assets



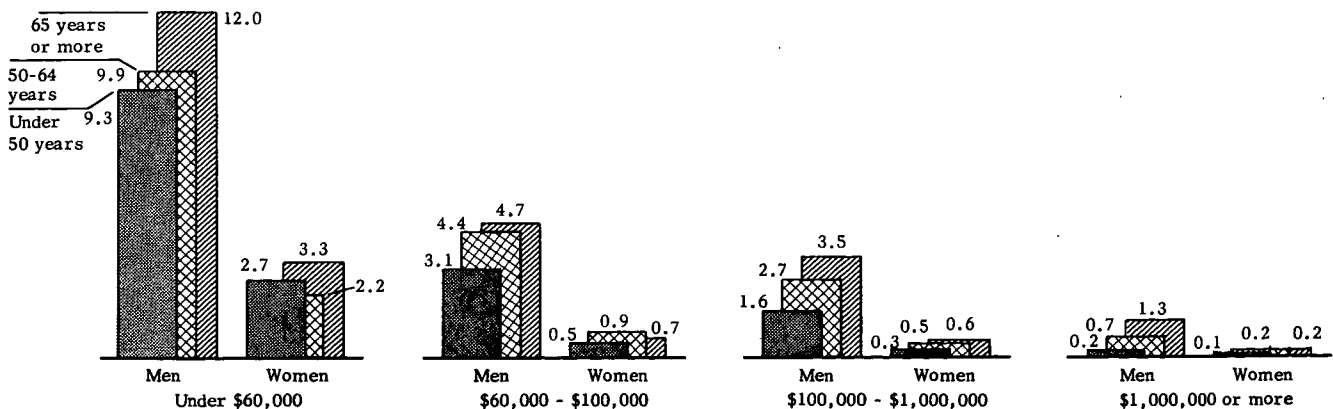
Marital Status by Age



Marital Status by Size of Net Worth



Age by Size of Net Worth



Insurance is never a very large part of the wealth of top wealthholders except for those under 40 years of age or with net worth of less than \$60,000. Of all the various types of assets, however, it is the most related to sex, being several times more important for men than women. In fact, for every age, marital status and size of net worth, men hold proportionally more insurance than women.

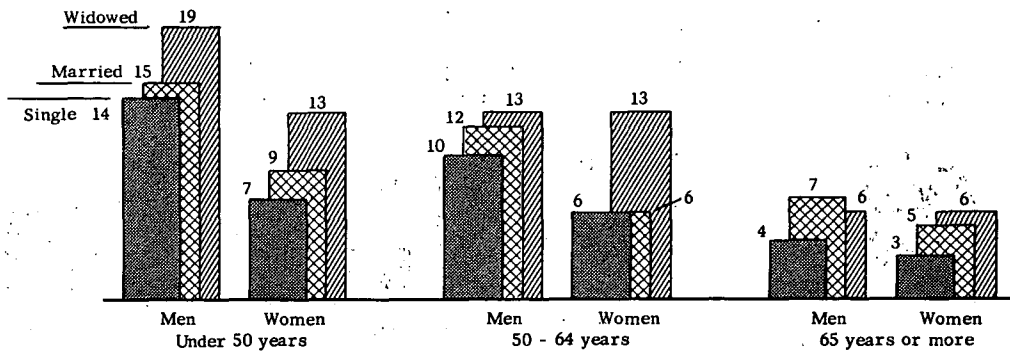
The chart shows that insurance equity increases as a proportion of total assets with age. The face value of insurance on the other hand declines with age. For example, for men with net worth of less than \$60,000 the face value of insurance declines from more than \$61,000 for those under 50 to less than \$18,000 for those 65 or more.

Chart 10 Other Assets

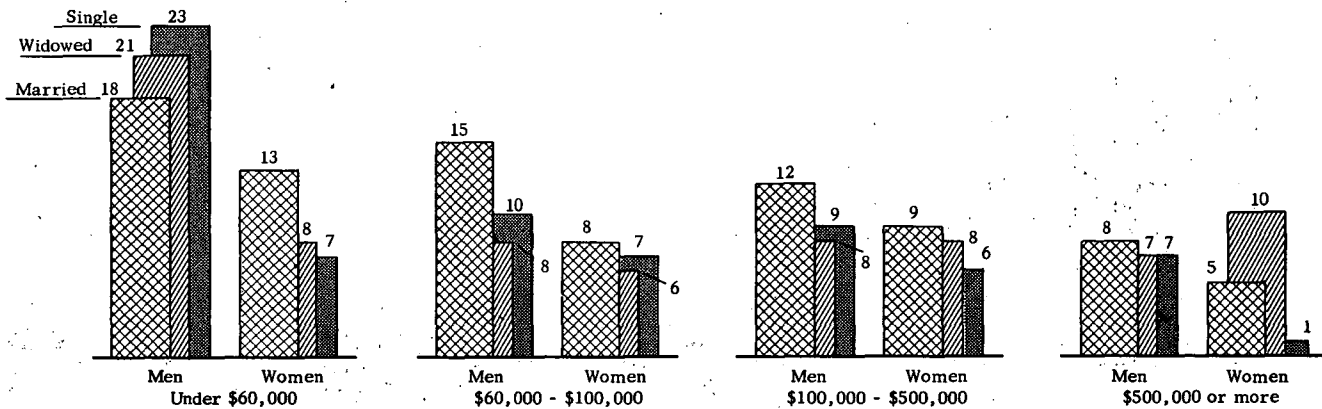
Holdings as a percent of total assets



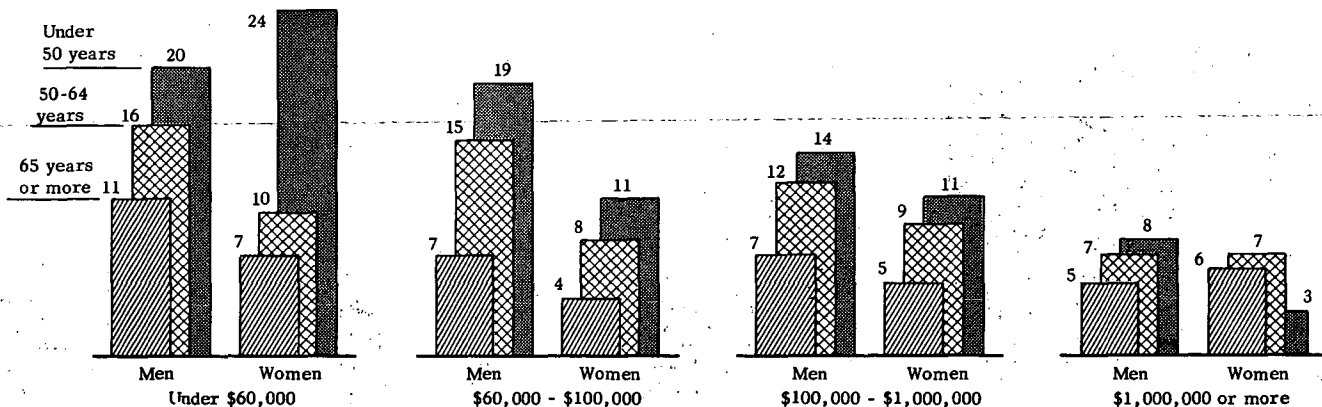
Marital Status by Age



Marital Status by Size of Net Worth



Age by Size of Net Worth



"Other assets" is not a very homogeneous category since it includes household goods, certain unincorporated business assets, trust interests, and annuities, to name a few of the major subgroups. Nonetheless, "Other assets" follows a regular pattern of decline with size of wealth. Some possible

reasons for this are that, while goods held for personal use probably increase absolutely as wealth increases, they decline as a percentage of total assets; another possibility is that sole proprietorship and partnership interests tend to be converted to other forms as wealth, and age, increase.

Chart 11 Debts

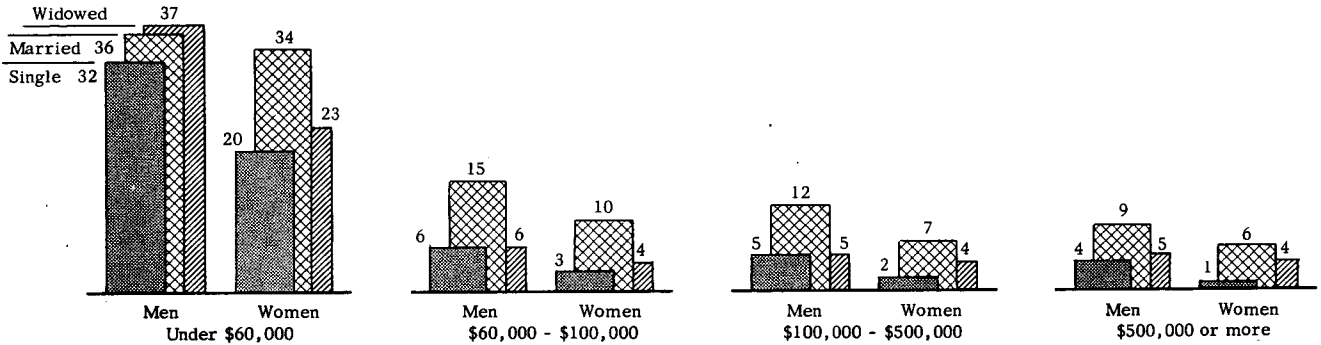
Percent
of total assets



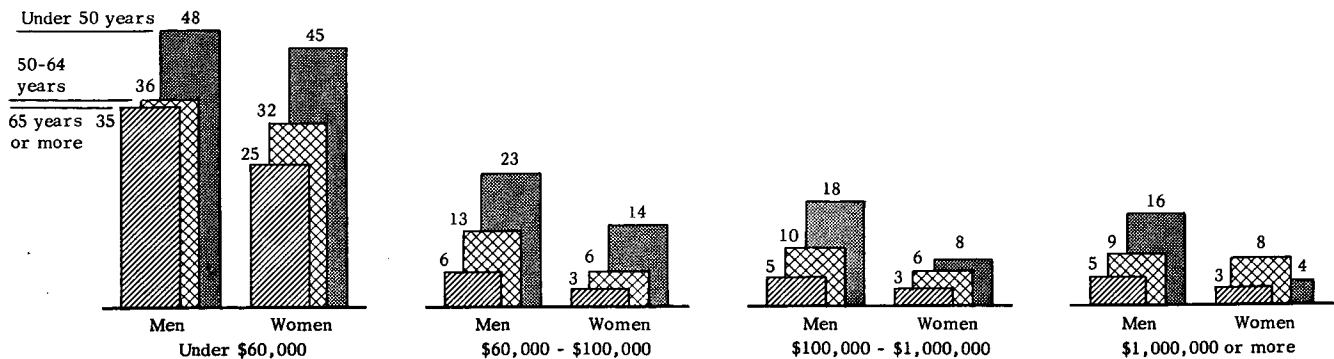
Marital Status by Age



Marital Status by Size of Net Worth



Age by Size of Net Worth



As age increases debts decline as a proportion of total assets. The burden is heaviest for the young perhaps because this is the period in life when expenses for home and family are at their peak. Married people, as expected, tend to carry the largest debt load; single people the smallest.

For every age, marital status, and size of net worth, the indebtedness of men is greater than that for women. When debts are looked at by size of total assets as in tables 17 and 18, men in every size class have about twice the debts of women. While debts decline sharply as a proportion of total assets as net worth increases, the pattern is considerably flatter when looked at by size of total assets itself.

2

Explanation of classifications and terms

CLASSIFICATIONS

Age, sex and marital status

Age was determined as year of death minus year of birth. This concept of age is closer to "insurance age" or age at *nearest* birthday than to actual age. Computing age as year of death less year of birth produces some inaccuracies in the weighting procedure but these are small and tend to be offsetting. For about 2% of the sample the age could not be determined by the procedures employed. This group is discussed on page 68.

Sex was determined from the name, information on next of kin and any other relevant data. For a very few returns for which the name and other information did not identify the decedent as male or female, sex was assigned as male.

Marital status was specified as married, single, or widowed. Divorced and legally separated individuals and those whose marital status could not be identified from the information shown on the return were coded as "other".

Size classifications

Four size classifiers are used for wealth in this report: gross estate, total assets, net worth and corporate stock. The first two are measures of total wealth and differ only in the way insurance is valued. Gross estate includes insurance at its full face value; total assets at its cash surrender value. Net worth, the major classifier in this report, is total assets less debts. In addition, the amount of corporate stock held is used as a size classifier in tables 20 and 21.

Since the adjustment of insurance is based on average ratios of cash surrender value to face value-appropriate only on an aggregate and not an individual return basis, the use of net worth and total assets as size classifiers introduces small inaccuracies probably not of particular importance due to the broadness of most classes.

State or place of residence

Table 31 shows the number and assets of top wealthholders residing in the 50 States and the District of Columbia. U. S. citizens domiciled abroad are shown in the category "Other areas".

This geographic distribution is based on the place in which the decedent was domiciled. It represents the place of residence of top wealthholders but is not necessarily indicative of the location of their wealth.

EXPLANATION OF TERMS

Top wealthholders

The estimated number of residents of the United States or U. S. citizens domiciled abroad with a gross estate of

\$60,000 or more. Technically, all those for whom a Federal estate tax return would have been required had they died.

Total assets

The gross value, not reduced by debts, of interests in real estate, bonds, stock, notes and mortgages, cash and other assets, except insurance. Although the full amount of insurance on the decedent's life is included for estate tax purposes, these wealth estimates take cognizance of the cash surrender value of the policies, that portion which was available during life. Except for the treatment of insurance, total assets represents total wealth, or "gross estate" as defined by law. "Total assets" suffers a small inconsistency in that it is net of loans against insurance but not of other indebtedness.

Debts

All debts, except policy loans on insurance, whether or not secured by mortgages. Included were mortgages on real estate; notes and other obligations whether or not secured by collateral; debts of an unincorporated business; property, income, and gift taxes accrued; amounts due to brokers; and unpaid charitable pledges (but not bequests). Two kinds of debts were included which are not appropriate to the estates of the living: debts incurred as a result of terminal illness and, in a very few cases, foreign death taxes and State death taxes paid on a charitable bequest.

Net worth

The total equity in all property, real, personal, tangible, and intangible, over which top wealthholders enjoyed beneficial ownership. Net worth differs from the net "personal wealth" enjoyed by top wealthholders principally because of the treatment accorded annuity and trust assets, and to a lesser extent because (1) foreign real estate was not generally included in estate tax wealth, and (2) the decedent's debts included certain death taxes and unpaid medical bills occasioned by terminal illness. See the discussion of property interests included, page 74.

Type of Asset

Real estate

The full value (not the equity) in real property owned or contracted to purchase, in general only if such property was situated in the United States. Included were the personal residence, commercial and business property from a sole proprietorship such as an apartment building or store; unused or improved property held for sale; farm lands including growing crops if not separately

valued. Accrued rent on real property was included with the value of the property.

The only foreign real estate included was shown on returns for decedents who died after October 16, 1962, and who had acquired foreign real estate, except generally by gift or inheritance, on or after February 1, 1962. The amount shown as real estate for U. S. citizens domiciled abroad (Table 31 "Other areas") is probably seriously understated by the exclusion of foreign real estate.

Bonds

Federal, State, municipal, corporate, and foreign bonds and notes. Included were Federal savings bonds; U. S. Treasury notes whether short or long-term; bonds issued by a State, U. S. possession, municipality or other government authority such as the Port of New York Authority, or the Federal Housing Administration; certificates of deposit issued for bonds; contracts to purchase bonds; convertible notes with coupons; debenture bonds; mortgage bonds (when one of a series); participating bonds; private bonds; scrip in connection with bonds; and units composed of stocks and bonds combined. Interest accrued on bonds was also included.

Corporate stock

Common, preferred, and debenture stock of domestic and foreign corporations. Included was stock traded on an exchange or over the counter, stock in a closely-held corporation, certificates of deposit issued for stock (street accounts), seat or membership in a stock exchange, contracts to purchase stock, scrip in connection with stock. Dividends accrued were included with the value of the stock.

Cash

Currency and coins on hand or in safety deposit boxes, checks, checking accounts, savings deposits including certificates, savings and loan accounts and postal savings accounts. Included were joint savings or checking accounts except, of course, the surviving tenant's contribution to the account, cash in a broker's account, Massachusetts cooperative bank shares, and defense and postal savings stamps.

Notes and mortgages

Promissory notes, loans, mortgages, trust deeds, and contracts to sell land. Included were certificates of deposit issued for mortgages, and items designated "bonds and mortgages" when the issue was not one of a series. Accrued interest on these obligations was included.

Life insurance equity

The cash surrender value of life insurance estimated as discussed in the text (See page 76.) by applying ratios to *life insurance face* computed from the Institute of Life Insurance's *1965 Study of Savings in Life Insurance*. This adjustment from face to equity was made using ratios appropriate on an aggregate and not an individual basis. Thus, the number of top wealthholders shown in the tables

as having equity in life insurance considerably overstates the actual number with such amounts. The frequency shown is more meaningfully interpreted as the number of top wealthholders that would have had insurance includable in their estate.

Other assets

Household goods, automobiles, clothing, jewelry, and other personal effects; accumulated and post mortem dividends from life insurance; royalties; patents; lump sum death benefits from Social Security; mineral rights if valued separately from real estate; the net value of sole proprietorship or partnership interests in assets other than real estate, cash, etc., such as accounts receivable, inventories, livestock, and machinery; remainder interest in a trust or estate; and the cash surrender value of *pensions or annuities* which were receivable by a surviving beneficiary except those specified under Section 2039(3) of the Internal Revenue Code and then only the proportion of the cash value which the decedent's contribution bore to the cost was included. Also included were certain *lifetime gifts*: (1) gifts taking effect at death; (2) gifts of property in which the decedent retained income rights; and of property over which the decedent retained the right to alter, amend, revoke, or terminate the enjoyment or use; and (3) transfers made by the decedent within three years prior to death, presumed to be in contemplation of death. See the discussion of property interests included, page 74.

Information Items

Life insurance face

The proceeds from insurance on the life of the decedent payable to his estate or over which the decedent had the power to change the beneficiary, cancel or assign the policy, to pledge the policy for a loan, etc. Included were death benefits paid by fraternal beneficial societies operating under the lodge system and the cash surrender value of policies the decedent owned on the life of another. "Life insurance" did not include the value of post mortem dividends and dividends accumulated at interest; these were included in "Other assets".

Jointly owned property

Property held by the decedent with his spouse as a tenant by the entirety, or with his spouse or other person as a joint tenant with right of survivorship. Included was the entire value of the property except that portion attributable to the contributions of the surviving joint tenant. Jointly owned property was allocated to the appropriate asset type as well as being shown separately.

Powers of appointment

Property over which the decedent held a *general* power of appointment, that is property over which the decedent did not have title but did have the power to designate who should enjoy it. To be included in the estate, a power of appointment must be exercisable in favor of the individual himself or his estate or the creditors of either. For

example, if property has been transferred in trust for the life of an individual, with a power to consume the entire principal of the trust, he has a general power of appointment. If the decedent designated himself as the beneficiary, the property interests, while included, lost their "character". Thus property was usually shown as held under a power of appointment only when the power had not been exercised. Powers of appointment were allocated to the appropriate asset type as well as being shown separately in table A.

Estate Tax Return Statistics

Estate tax return data represent estimates of the holdings of deceased top wealthholders. They also, of course, constitute the sample from which the characteristics of living top wealthholders were estimated. Summary statistics from the sample are shown in all the basic tables

and have been tabulated in considerably more detail in *Statistics of Income-1962, Fiduciary, Gift, and Estate Tax Returns*.

Gross estate

Property to the extent of decedent's interest therein at date of death, not reduced by mortgages, debts (except policy loans against insurance), or administrative expenses. Included were real estate situated in the United States (see "Real estate"), tangible and intangible personal property, certain lifetime gifts, generally joint estates with right of survivorship and tenancies by the entirety, property over which decedent had a general power of appointment, dower and courtesy of surviving spouse, proceeds from life insurance, and the decedent's interest in annuities receivable by a surviving beneficiary. Community property was included to the extent of the decedent's interest in such property.

SIZE OF NET WORTH

Table 1.—ALL TOP WEALTHHOLDERS
 [Number of top wealthholders, type of asset, information items, and estate tax return statistics]

Net worth	Number of top wealthholders	Total assets (Thousand dollars)	Debts		Net worth (Thousand dollars)	Type of asset					
			Number of top wealthholders	Amount (Thousand dollars)		Real estate		Bonds		Corporate stock	
						Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	
Total.....	4,132,207	751,974,453	3,654,689	82,711,864	669,262,592	3,443,739	188,034,656	2,021,035	47,940,293	3,282,693	325,813,740
Net deficit.....	25,080	4,519,388	25,080	5,983,498	-1,464,111	19,059	2,080,750	3,989	44,190	16,787	402,689
Under \$30,000.....	261,387	11,169,206	243,577	6,289,058	4,880,148	210,549	5,530,135	71,478	97,167	133,448	1,086,397
\$30,000 under \$40,000.....	147,430	8,619,906	138,418	3,440,098	5,179,808	133,525	4,352,625	50,250	127,905	108,199	1,132,913
\$40,000 under \$50,000.....	175,885	11,499,670	163,593	3,550,219	7,949,452	152,708	5,476,953	62,337	227,759	124,943	1,763,161
\$50,000 under \$60,000.....	268,444	18,953,798	247,642	4,039,634	14,914,164	236,608	8,599,954	97,451	461,203	197,007	3,312,440
\$60,000 under \$70,000.....	464,366	34,104,309	388,103	3,944,572	30,159,737	377,063	13,541,782	205,002	1,449,002	331,869	7,551,805
\$70,000 under \$80,000.....	396,926	32,586,875	326,412	2,855,697	29,731,178	321,688	11,714,404	197,707	1,566,976	301,809	8,197,561
\$80,000 under \$90,000.....	328,559	30,821,517	273,587	2,911,873	27,909,644	275,839	11,550,928	151,150	1,454,557	261,414	8,129,360
\$90,000 under \$100,000.....	265,582	29,210,417	218,892	4,025,465	25,184,952	222,468	10,272,385	121,472	1,200,708	206,805	7,276,532
\$100,000 under \$120,000.....	411,461	49,127,576	350,053	4,212,733	44,914,843	342,757	16,374,975	207,400	2,307,753	340,612	15,664,213
\$120,000 under \$150,000.....	387,513	57,028,716	340,933	5,310,485	51,718,232	320,476	18,192,488	213,422	2,758,512	333,829	19,183,542
\$150,000 under \$200,000.....	330,334	61,708,743	302,309	4,991,892	56,716,851	277,840	16,817,648	188,467	3,380,118	293,787	23,656,076
\$200,000 under \$300,000.....	295,559	80,096,345	276,548	8,338,920	71,757,425	247,519	21,497,759	182,096	4,107,853	274,305	33,362,796
\$300,000 under \$500,000.....	197,118	81,045,754	188,399	5,641,052	75,404,703	160,386	16,305,049	135,932	5,195,048	186,211	40,629,397
\$500,000 under \$1,000,000.....	116,994	84,991,695	111,952	5,145,715	79,845,980	95,043	13,351,770	83,420	6,720,042	113,214	47,302,324
\$1,000,000 under \$2,000,000.....	39,654	59,211,848	39,391	4,904,901	54,306,947	32,715	6,158,134	33,082	6,702,967	39,028	37,096,088
\$2,000,000 under \$3,000,000.....	9,554	25,270,707	9,554	1,966,820	23,303,887	8,139	2,263,109	7,397	2,674,298	9,071	16,597,946
\$3,000,000 under \$5,000,000.....	5,907	24,999,055	5,907	2,387,755	22,611,300	5,416	2,288,235	5,063	3,152,871	5,898	16,376,369
\$5,000,000 under \$10,000,000.....	2,673	18,850,381	2,556	918,151	17,932,230	2,200	1,007,011	2,548	2,306,161	2,673	12,889,787
\$10,000,000 or more.....	1,784	28,158,546	1,784	1,853,325	26,305,221	1,743	658,564	1,765	2,005,198	1,784	24,202,340

Net worth	Type of asset—Continued							Information items		Estate tax return statistics			
	Cash		Notes and mortgages		Life insurance equity		Other assets (Thousand dollars)	Life insurance face value (Thousand dollars)	Jointly owned property		Number of returns	Gross estate (Thousand dollars)	Net worth (Thousand dollars)
	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)			Number of top wealthholders	Amount (Thousand dollars)			
(12)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	
Total.....	3,954,846	70,669,443	1,278,918	30,413,041	2,950,289	15,568,396	73,534,876	95,552,607	2,545,110	109,726,570	78,393	17,007,239	15,548,462
Net deficit.....	21,941	158,606	5,525	149,555	23,110	180,025	1,503,572	1,566,261	12,073	617,299	137	29,796	-14,209
Under \$30,000.....	235,815	582,105	34,450	152,160	257,277	1,666,643	2,054,602	17,631,228	173,034	3,597,013	834	85,880	16,422
\$30,000 under \$40,000.....	135,449	576,692	26,247	112,599	141,598	843,022	1,474,149	8,064,847	111,922	3,022,576	717	70,962	25,423
\$40,000 under \$50,000.....	163,548	922,300	37,393	318,868	161,956	859,575	1,931,053	7,124,030	128,246	3,815,722	1,233	110,635	56,043
\$50,000 under \$60,000.....	256,160	1,948,142	59,715	714,137	229,735	921,362	2,996,559	6,292,165	168,161	5,174,728	2,923	234,301	164,119
\$60,000 under \$70,000.....	437,662	5,028,609	120,600	1,406,580	296,724	945,325	4,181,209	5,616,506	274,769	8,531,192	9,421	686,466	612,680
\$70,000 under \$80,000.....	380,119	5,417,268	109,579	1,332,331	262,394	863,228	3,495,107	5,048,209	236,792	8,289,545	8,357	690,359	625,282
\$80,000 under \$90,000.....	313,692	4,242,304	103,714	1,418,754	216,441	738,314	3,287,297	4,069,563	197,088	7,498,161	6,856	642,447	581,794
\$90,000 under \$100,000.....	255,515	3,837,879	84,893	2,826,648	174,057	713,255	3,083,010	4,067,763	168,087	7,246,472	5,773	607,632	547,428
\$100,000 under \$120,000.....	394,918	6,524,464	136,024	2,317,838	263,716	1,112,985	4,825,353	5,820,017	262,195	12,299,688	9,004	1,079,716	984,255
\$120,000 under \$150,000.....	374,626	7,085,747	136,804	2,821,169	264,668	1,231,695	5,755,559	6,255,709	243,806	12,825,067	8,662	1,266,505	1,156,919
\$150,000 under \$200,000.....	324,136	7,243,191	128,822	3,075,384	217,442	1,237,782	6,298,542	5,679,315	198,702	11,566,786	8,022	1,499,392	1,382,176
\$200,000 under \$300,000.....	290,852	7,810,341	131,646	3,955,269	200,725	1,479,189	7,883,134	7,186,036	170,583	10,707,752	7,022	1,841,577	1,699,817
\$300,000 under \$500,000.....	194,702	6,809,956	83,478	3,360,469	126,012	1,156,118	7,589,713	4,707,603	108,796	7,524,413	4,934	2,007,461	1,878,589
\$500,000 under \$1,000,000.....	116,495	6,297,903	52,234	2,889,009	77,224	859,439	7,571,207	3,610,176	64,359	4,517,075	2,870	2,071,055	1,954,044
\$1,000,000 under \$2,000,000.....	39,300	3,162,658	16,445	1,611,636	25,843	452,092	4,028,274	1,745,629	18,261	1,234,529	1,073	1,553,782	1,471,081
\$2,000,000 under \$3,000,000.....	9,554	1,303,263	5,333	690,989	5,898	155,539	1,585,563	651,574	4,633	769,662	263	671,759	636,140
\$3,000,000 under \$5,000,000.....	5,907	913,022	3,489	537,451	3,533	87,158	1,643,948	253,410	2,247	210,455	178	719,184	678,613
\$5,000,000 under \$10,000,000.....	2,673	561,370	1,312	293,090	1,404	38,608	1,754,354	102,243	927	240,835	84	587,891	558,763
\$10,000,000 or more.....	1,784	243,622	1,214	429,105	532	27,044	592,673	60,323	430	37,598	30	550,437	533,082

NOTE: Detail may not add to total because of rounding. Data in columns 22 - 24 are unweighted.

SIZE OF TOTAL ASSETS

Table 16. —ALL TOP WEALTHHOLDERS

[Number of top wealthholders, type of asset, information items, and estate tax return statistics]

Total assets	Number of top wealthholders	Total assets (Thousand dollars)	Debts		Net worth (Thousand dollars)	Type of asset					
			Number of top wealthholders	Amount (Thousand dollars)		Real estate		Bonds		Corporate stock	
						Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	
Total.....	4,132,207	751,974,453	3,654,689	82,711,864	669,262,592	3,443,739	188,034,656	2,021,035	47,940,293	3,282,693	325,813,740
Under \$60,000.....	495,364	20,891,067	435,449	5,112,315	15,778,752	397,060	8,372,568	182,908	538,234	321,776	3,033,403
\$60,000 under \$70,000.....	467,372	30,348,797	391,108	3,422,702	26,926,095	379,281	11,419,089	204,918	1,383,189	334,081	6,671,289
\$70,000 under \$80,000.....	437,217	32,725,256	366,703	3,414,100	29,311,157	358,160	12,189,947	204,904	1,571,519	314,288	7,737,134
\$80,000 under \$90,000.....	357,855	30,363,439	302,884	2,963,434	27,400,005	301,592	11,520,913	161,008	1,443,671	277,538	7,595,002
\$90,000 under \$100,000.....	293,532	27,895,010	246,842	2,843,566	25,051,444	244,977	10,447,562	135,770	1,256,621	226,973	7,095,535
\$100,000 under \$120,000.....	469,171	51,318,498	407,763	5,447,877	45,870,621	399,145	18,106,712	213,645	2,243,539	378,125	15,034,920
\$120,000 under \$150,000.....	446,708	59,655,669	400,128	6,586,452	53,069,217	379,061	19,729,864	222,382	2,715,344	373,701	19,386,539
\$150,000 under \$200,000.....	395,021	68,068,060	366,996	7,897,092	60,170,968	337,246	20,736,510	204,607	3,343,155	338,381	24,142,006
\$200,000 under \$300,000.....	331,008	80,254,620	311,996	8,962,141	71,292,479	280,590	21,938,005	194,081	4,222,187	300,059	32,891,177
\$300,000 under \$500,000.....	237,793	90,643,019	229,075	8,873,279	81,769,741	199,617	20,797,110	153,536	5,272,857	223,596	42,261,288
\$500,000 under \$1,000,000.....	133,727	92,134,213	128,685	9,594,521	82,539,692	109,722	16,910,562	90,010	6,856,022	127,976	48,392,533
\$1,000,000 under \$2,000,000.....	43,690	59,660,110	43,427	5,223,919	54,436,191	36,084	7,066,554	34,377	6,126,170	43,157	37,144,011
\$2,000,000 under \$3,000,000.....	10,417	25,226,441	10,417	2,792,302	22,434,139	8,919	3,360,277	7,871	3,188,257	9,717	14,383,332
\$3,000,000 under \$5,000,000.....	7,211	26,710,502	7,211	4,275,520	22,434,982	6,682	2,750,983	5,368	2,887,722	7,202	16,598,139
\$5,000,000 under \$10,000,000.....	4,277	27,047,526	4,159	3,164,129	23,883,397	3,797	1,914,938	3,823	2,832,560	4,277	18,693,010
\$10,000,000 or more.....	1,847	29,032,226	1,847	2,138,514	26,893,711	1,806	773,066	1,829	2,059,245	1,847	24,754,421

Total assets	Type of asset—Continued						Information items		Estate tax return statistics				
	Cash		Notes and mortgages		Life insurance equity		Other assets (Thousand dollars)	Life insurance face value (Thousand dollars)	Jointly owned property		Number of returns	Gross estate (Thousand dollars)	Net worth (Thousand dollars)
	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)			Number of top wealthholders	Amount (Thousand dollars)			
(12)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	
Total.....	3,954,846	70,669,443	1,278,918	30,413,041	2,950,289	15,568,396	73,534,876	95,552,607	2,545,110	109,726,570	78,393	17,007,239	15,548,462
Under \$60,000.....	460,247	2,320,832	62,641	304,768	495,364	2,957,649	3,363,613	27,754,020	351,495	7,071,561	2,751	221,653	113,038
\$60,000 under \$70,000.....	445,533	4,752,259	122,336	1,308,621	317,240	1,120,535	3,693,816	7,606,193	278,396	8,010,670	8,991	625,996	558,828
\$70,000 under \$80,000.....	413,625	5,434,771	108,042	1,270,069	289,117	997,609	3,524,207	6,425,018	268,060	8,646,135	8,573	678,406	611,601
\$80,000 under \$90,000.....	343,863	4,398,339	98,647	1,229,015	244,936	848,896	3,327,609	5,246,378	216,606	7,886,552	7,122	636,246	574,310
\$90,000 under \$100,000.....	280,211	3,925,282	90,891	1,279,364	193,564	735,476	3,155,169	4,187,697	182,537	7,443,631	6,007	598,366	540,706
\$100,000 under \$120,000.....	444,415	6,709,647	154,107	2,476,888	306,879	1,229,325	5,517,468	7,154,712	296,606	12,986,628	9,405	1,076,079	978,237
\$120,000 under \$150,000.....	425,780	7,137,004	152,297	2,840,022	309,367	1,388,890	6,458,003	7,640,223	273,897	13,450,549	9,214	1,284,877	1,164,842
\$150,000 under \$200,000.....	382,658	7,604,972	148,235	3,445,402	270,049	1,475,958	7,320,055	7,690,188	242,152	13,780,264	8,633	1,548,620	1,404,540
\$200,000 under \$300,000.....	323,826	7,741,338	142,074	3,656,851	229,050	1,588,321	8,216,738	7,827,491	200,590	13,181,922	7,574	1,898,368	1,727,100
\$300,000 under \$500,000.....	234,575	7,589,055	106,503	4,194,074	159,449	1,418,895	9,109,737	6,384,191	133,300	9,355,298	5,330	2,090,868	1,925,644
\$500,000 under \$1,000,000.....	133,025	6,610,030	59,395	3,175,731	90,974	959,521	9,229,813	4,414,371	71,109	5,144,923	3,062	2,133,508	1,989,111
\$1,000,000 under \$2,000,000.....	43,336	3,153,507	19,434	1,542,587	29,745	493,976	4,133,306	1,849,278	20,262	1,373,841	1,122	1,555,721	1,462,131
\$2,000,000 under \$3,000,000.....	10,417	1,432,730	6,360	723,277	6,934	169,233	1,969,336	748,176	4,924	745,149	290	706,019	660,071
\$3,000,000 under \$5,000,000.....	7,211	752,619	4,072	2,065,230	4,654	108,769	1,547,039	395,019	3,079	276,593	187	712,872	669,463
\$5,000,000 under \$10,000,000.....	4,277	838,743	2,608	438,121	2,386	47,402	2,282,756	166,243	1,618	333,705	100	663,156	618,669
\$10,000,000 or more.....	1,847	268,314	1,277	463,021	582	27,942	686,215	63,411	480	39,148	32	576,484	550,169

NOTE: Detail may not add to total because of rounding. Data in columns 22 - 24 are unweighted.

SIZE OF TOTAL ASSETS

Table 17.—MALE TOP WEALTHHOLDERS

[Number of top wealthholders, type of asset, information items, and estate tax return statistics]

Total assets	Number of top wealthholders	Total assets (Thousand dollars)	Debts		Net worth (Thousand dollars)	Type of asset					
			Number of top wealthholders	Amount (Thousand dollars)		Real estate		Bonds		Corporate stock	
						Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	
Total.....	2,538,643	439,112,075	2,280,050	61,730,100	377,381,976	2,193,743	118,317,986	1,174,904	23,510,517	1,982,588	175,731,484
Under \$60,000.....	444,329	18,704,667	394,385	4,860,440	13,844,227	362,533	7,670,501	162,508	448,224	287,712	2,539,647
\$60,000 under \$70,000.....	262,550	17,027,530	223,332	2,636,208	14,391,322	225,762	6,713,750	110,157	710,986	184,813	3,096,035
\$70,000 under \$80,000.....	234,704	17,577,572	201,034	2,335,950	15,241,622	200,494	6,712,561	107,865	728,763	169,697	3,529,838
\$80,000 under \$90,000.....	200,554	17,021,197	173,961	2,121,216	14,899,982	176,042	6,473,675	87,935	679,956	152,187	3,696,345
\$90,000 under \$100,000.....	173,487	16,486,130	149,534	2,078,777	14,407,354	150,501	6,378,597	78,817	678,369	136,325	3,683,183
\$100,000 under \$120,000.....	274,179	30,039,514	241,175	4,044,476	25,995,039	243,721	11,276,977	112,103	1,092,822	214,911	7,321,907
\$120,000 under \$150,000.....	256,874	34,210,295	235,650	4,465,700	29,744,595	229,696	12,058,592	121,682	1,452,313	210,193	9,705,360
\$150,000 under \$200,000.....	237,334	40,992,011	223,050	6,022,671	34,969,340	209,879	13,287,176	116,484	1,719,543	203,605	13,044,567
\$200,000 under \$300,000.....	206,344	49,852,792	195,013	6,756,719	43,096,072	181,316	14,398,985	113,851	2,241,681	186,946	19,055,796
\$300,000 under \$500,000.....	137,254	52,340,023	133,227	6,408,130	45,931,893	119,565	12,214,107	87,401	2,631,804	128,875	23,556,806
\$500,000 under \$1,000,000.....	74,280	50,439,308	73,181	6,417,200	44,022,108	62,491	10,534,675	48,239	3,275,983	71,360	25,876,950
\$1,000,000 under \$2,000,000.....	23,406	32,697,223	23,212	4,203,304	28,493,918	20,125	5,069,082	17,678	2,468,462	23,158	18,924,313
\$2,000,000 under \$3,000,000.....	6,139	14,978,969	6,139	2,294,940	12,684,029	5,070	2,226,812	4,598	1,914,826	5,606	7,869,279
\$3,000,000 under \$5,000,000.....	3,894	14,821,648	3,894	3,611,414	11,210,234	3,567	1,764,743	2,478	893,033	3,885	8,841,876
\$5,000,000 under \$10,000,000.....	2,079	13,615,771	2,027	1,517,053	12,098,719	1,767	938,053	1,891	1,013,648	2,079	10,072,459
\$10,000,000 or more.....	1,237	18,307,425	1,237	1,955,903	16,351,522	1,213	599,701	1,218	1,560,104	1,237	14,917,121

Total assets	Type of asset—Continued						Information items				Estate tax return statistics		
	Cash		Notes and mortgages		Life insurance equity		Other assets (Thousand dollars)	Life insurance face value (Thousand dollars)	Jointly owned property		Number of returns	Gross estate (Thousand dollars)	Net worth (Thousand dollars)
	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)			Number of top wealthholders	Amount (Thousand dollars)			
(12)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	
Total.....	2,431,873	38,689,790	803,060	19,784,096	2,214,938	13,943,166	49,135,035	86,513,268	1,780,268	81,874,760	49,604	10,799,320	9,572,454
Under \$60,000.....	414,978	1,887,103	58,838	267,219	444,329	2,745,480	3,146,494	25,790,029	334,625	6,837,180	2,553	207,883	103,390
\$60,000 under \$70,000.....	250,204	2,409,000	67,287	596,636	222,435	993,526	2,507,598	6,919,731	173,595	5,376,682	5,227	378,195	320,180
\$70,000 under \$80,000.....	224,103	2,644,730	57,595	636,644	195,625	883,668	2,441,368	5,761,361	162,226	5,434,818	5,122	418,027	361,201
\$80,000 under \$90,000.....	192,868	2,230,350	56,497	761,694	171,080	744,403	2,434,777	4,655,557	137,144	5,230,060	4,306	395,060	343,155
\$90,000 under \$100,000.....	166,447	2,066,961	54,428	710,713	144,040	654,144	2,314,164	3,745,309	120,987	5,226,387	3,661	374,292	325,667
\$100,000 under \$120,000.....	261,973	3,619,113	94,704	1,498,109	228,767	1,123,644	4,106,940	6,692,964	196,867	9,309,978	5,936	694,316	610,688
\$120,000 under \$150,000.....	246,188	3,790,036	93,387	1,643,926	217,668	1,237,398	4,322,671	6,790,503	184,368	9,662,505	5,945	845,028	743,916
\$150,000 under \$200,000.....	229,203	4,305,473	99,143	2,125,028	201,047	1,338,079	5,172,143	6,976,362	165,819	10,385,640	5,573	1,018,438	895,579
\$200,000 under \$300,000.....	201,348	4,557,272	92,742	2,346,744	176,780	1,418,507	5,833,803	6,935,416	146,361	10,812,566	4,896	1,243,157	1,098,040
\$300,000 under \$500,000.....	134,500	4,236,581	70,341	2,808,505	118,149	1,252,473	5,639,744	5,664,580	92,127	7,181,983	3,414	1,355,412	1,216,171
\$500,000 under \$1,000,000.....	73,655	3,260,142	37,118	1,963,037	63,763	852,652	4,675,869	3,888,339	46,500	4,107,673	1,914	1,340,123	1,221,248
\$1,000,000 under \$2,000,000.....	23,058	1,766,597	11,910	1,204,059	20,308	393,247	2,871,462	1,475,314	13,341	1,140,797	692	968,462	891,823
\$2,000,000 under \$3,000,000.....	6,139	965,395	3,794	515,786	5,284	154,730	1,332,141	698,366	3,375	690,904	174	426,407	390,384
\$3,000,000 under \$5,000,000.....	3,894	366,097	2,744	1,871,706	3,430	96,757	987,436	353,264	1,784	190,787	118	450,738	416,199
\$5,000,000 under \$10,000,000.....	2,079	404,553	1,567	382,715	1,791	34,776	769,569	114,938	920	256,658	53	354,998	327,384
\$10,000,000 or more.....	1,237	180,385	965	451,574	(1)	(1)	578,857	(1)	(1)	(1)	20	328,787	307,429

NOTE: Detail may not add to total because of rounding. Data in columns 22 - 24 are unweighted.
¹ Estimate is not shown separately because of high sampling variability.

SIZE OF TOTAL ASSETS

Table 18.—FEMALE TOP WEALTHHOLDERS

[Number of top wealthholders, type of asset, information items, and estate tax return statistics]

Total assets	Number of top wealthholders	Total assets (Thousand dollars)	Debts		Net worth (Thousand dollars)	Type of asset					
			Number of top wealthholders	Amount (Thousand dollars)		Real estate		Bonds		Corporate stock	
						Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	
Total.....	1,593,564	312,862,378	1,374,639	20,981,764	291,880,616	1,249,996	69,716,670	846,131	24,429,776	1,300,105	150,082,256
Under \$60,000.....	51,035	2,186,400	41,064	251,875	1,934,525	34,527	702,067	20,400	90,010	34,064	493,756
\$60,000 under \$70,000.....	204,822	13,321,267	167,776	786,494	12,534,773	153,519	4,705,339	94,761	672,203	149,268	3,575,254
\$70,000 under \$80,000.....	202,513	15,147,684	165,669	1,078,149	14,069,535	157,666	5,477,386	97,040	842,756	144,591	4,207,295
\$80,000 under \$90,000.....	157,301	13,342,242	128,922	842,218	12,500,023	125,549	5,047,237	73,073	763,715	125,351	3,898,657
\$90,000 under \$100,000.....	120,045	11,408,880	97,308	764,789	10,644,091	94,476	4,068,965	56,953	578,252	90,648	3,412,352
\$100,000 under \$120,000.....	194,991	21,278,984	166,588	1,403,401	19,875,583	155,423	6,829,735	101,542	1,150,717	163,214	7,713,013
\$120,000 under \$150,000.....	189,834	25,445,375	164,477	2,120,752	23,324,623	149,364	7,671,272	100,701	1,263,031	163,509	9,681,179
\$150,000 under \$200,000.....	157,686	27,076,049	143,946	1,874,421	25,201,628	127,366	7,449,334	88,123	1,623,612	134,776	11,097,439
\$200,000 under \$300,000.....	124,664	30,401,828	116,984	2,205,422	28,196,406	99,274	7,539,020	80,230	1,980,506	113,113	13,835,380
\$300,000 under \$500,000.....	100,539	38,302,996	95,848	2,465,148	35,837,848	80,052	8,583,003	66,135	2,641,053	94,721	18,704,481
\$500,000 under \$1,000,000.....	59,447	41,694,905	55,504	3,177,321	38,517,584	47,232	6,375,887	41,771	3,580,039	56,616	22,515,583
\$1,000,000 under \$2,000,000.....	20,284	26,962,887	20,214	1,020,614	25,942,273	15,959	1,997,471	16,699	3,657,708	19,999	18,219,697
\$2,000,000 under \$3,000,000.....	4,278	10,247,473	4,278	497,363	9,750,110	3,849	1,133,465	3,273	1,273,431	4,111	6,514,053
\$3,000,000 under \$5,000,000.....	3,316	11,888,854	3,316	664,106	11,224,748	3,115	986,240	2,890	1,994,688	3,316	7,756,263
\$5,000,000 under \$10,000,000.....	2,198	13,431,754	2,133	1,647,076	11,784,678	2,031	976,885	1,932	1,818,913	2,198	8,620,551
\$10,000,000 or more.....	611	10,724,801	611	182,612	10,542,189	593	173,365	611	499,142	611	9,837,300

Total assets	Type of asset—Continued						Information items				Estate tax return statistics		
	Cash		Notes and mortgages		Life insurance equity		Other assets (Thousand dollars)	Life insurance face value (Thousand dollars)	Jointly owned property		Number of returns	Gross estate (Thousand dollars)	Net worth (Thousand dollars)
	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)			Number of top wealthholders	Amount (Thousand dollars)			
(12)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	
Total.....	1,522,973	31,979,653	475,858	10,628,945	735,351	1,625,230	24,399,841	9,039,339	764,842	27,851,810	28,789	6,207,918	5,976,008
Under \$60,000.....	45,269	433,729	3,803	37,549	51,035	212,169	217,119	1,963,991	16,870	234,384	198	13,770	9,648
\$60,000 under \$70,000.....	195,329	2,343,259	55,049	711,985	94,805	127,009	1,186,218	686,462	104,801	2,633,988	3,764	247,801	238,648
\$70,000 under \$80,000.....	189,522	2,790,041	50,447	633,425	93,493	113,941	1,082,839	663,657	105,833	3,211,317	3,451	260,379	250,400
\$80,000 under \$90,000.....	150,995	2,167,988	42,150	467,321	73,856	104,493	892,832	590,821	79,462	2,656,491	2,816	241,186	231,154
\$90,000 under \$100,000.....	113,764	1,858,320	36,463	568,651	49,524	81,332	841,005	442,387	61,550	2,217,244	2,346	224,074	215,040
\$100,000 under \$120,000.....	182,442	3,090,534	59,403	978,779	78,111	105,681	1,410,528	461,747	99,740	3,676,650	3,469	381,764	367,549
\$120,000 under \$150,000.....	179,593	3,346,969	58,910	1,196,096	91,699	151,492	2,135,332	849,720	89,529	3,788,044	3,269	439,845	420,925
\$150,000 under \$200,000.....	153,454	3,299,499	49,092	1,320,374	69,002	137,879	2,147,912	713,827	76,333	3,394,624	3,060	530,182	508,961
\$200,000 under \$300,000.....	122,478	3,184,066	49,333	1,310,107	52,270	169,814	2,382,934	892,075	54,230	2,369,356	2,678	655,211	629,060
\$300,000 under \$500,000.....	100,075	3,352,474	36,161	1,385,569	41,300	166,422	3,469,993	719,611	41,173	2,173,316	1,916	735,457	709,473
\$500,000 under \$1,000,000.....	59,370	3,349,888	22,277	1,212,694	27,211	106,869	4,553,944	526,032	24,609	1,037,250	1,148	793,386	767,863
\$1,000,000 under \$2,000,000.....	20,278	1,386,910	7,524	338,528	9,436	100,728	1,261,844	373,964	6,921	233,044	430	587,259	570,307
\$2,000,000 under \$3,000,000.....	4,278	467,325	2,566	207,491	1,650	14,503	637,195	49,810	1,548	54,246	116	279,132	269,688
\$3,000,000 under \$5,000,000.....	3,316	386,522	1,328	193,524	1,224	12,012	559,604	41,755	1,295	85,806	69	262,133	253,264
\$5,000,000 under \$10,000,000.....	2,198	434,189	1,041	55,405	595	12,626	1,513,184	51,305	698	77,047	47	308,158	291,285
\$10,000,000 or more.....	611	87,928	(1)	(1)	(1)	(1)	107,359	(1)	(1)	(1)	12	247,698	242,740

NOTE: Detail may not add to total because of rounding. Data in columns 22 - 24 are unweighted.
 1 Estimate is not shown separately because of high sampling variability.

SIZE OF NET WORTH

Table 19.—NUMBER OF TOP WEALTHHOLDERS AND NUMBER OF RETURNS, BY SIZE OF TOTAL ASSETS

Net worth	Total		Size of total assets															
	Number of returns	Number of top wealth-holders	Under \$60,000		\$60,000 under \$70,000		\$70,000 under \$80,000		\$80,000 under \$90,000		\$90,000 under \$100,000		\$100,000 under \$120,000		\$120,000 under \$150,000		\$150,000 under \$200,000	
			(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)	(17)	(18)
Total.....	78,393	4,132,207	2,751	495,364	8,991	467,372	8,573	437,217	7,122	357,855	6,007	293,532	9,405	469,171	9,214	446,708	8,633	395,021
Net deficit.....	137	25,080	36	8,679	16	2,971	7	(¹)	12	1,219	5	(¹)	13	1,977	9	(¹)	13	1,924
Under \$30,000.....	834	261,387	604	218,065	71	13,863	44	11,283	20	2,786	24	3,563	18	3,831	25	3,821	14	2,327
\$30,000 under \$40,000.....	717	147,430	430	96,261	115	28,253	61	8,254	25	3,047	25	2,294	26	2,940	16	2,748	10	1,406
\$40,000 under \$50,000.....	1,233	175,885	637	84,558	282	43,101	128	20,487	62	9,202	46	6,372	45	7,386	16	2,148	13	1,925
\$50,000 under \$60,000.....	2,923	268,444	1,044	87,802	1,127	83,088	369	47,106	162	23,682	77	7,188	74	9,736	48	6,539	15	2,847
\$60,000 under \$70,000.....	9,421	464,366			7,380	296,095	1,368	87,996	327	31,440	143	17,312	108	16,544	66	11,379	17	2,159
\$70,000 under \$80,000.....	8,357	396,926					6,596	260,920	1,181	79,176	277	26,428	195	19,102	67	7,500	33	3,071
\$80,000 under \$90,000.....	6,856	328,559							5,333	207,305	987	63,887	329	37,041	132	12,654	59	6,107
\$90,000 under \$100,000.....	5,773	265,582									4,423	165,788	1,058	69,127	210	22,430	62	6,355
\$100,000 under \$120,000.....	9,004	411,461											7,539	300,488	1,191	85,672	209	20,083
\$120,000 under \$150,000.....	8,662	387,513													7,434	290,638	1,049	77,428
\$150,000 under \$200,000.....	8,022	330,334															7,139	269,390
\$200,000 under \$300,000.....	7,022	295,559																
\$300,000 under \$500,000.....	4,934	197,118																
\$500,000 under \$1,000,000.....	2,870	116,994																
\$1,000,000 under \$2,000,000.....	1,073	39,654																
\$2,000,000 under \$3,000,000.....	263	9,554																
\$3,000,000 under \$5,000,000.....	178	5,907																
\$5,000,000 under \$10,000,000.....	84	2,673																
\$10,000,000 or more.....	30	1,784																

Net worth	Size of total assets—Continued															
	\$200,000 under \$300,000		\$300,000 under \$500,000		\$500,000 under \$1,000,000		\$1,000,000 under \$2,000,000		\$2,000,000 under \$3,000,000		\$3,000,000 under \$5,000,000		\$5,000,000 under \$10,000,000		\$10,000,000 or more	
	Number of returns	Number of top wealth-holders	Number of returns	Number of top wealth-holders	Number of returns	Number of top wealth-holders	Number of returns	Number of top wealth-holders	Number of returns	Number of top wealth-holders	Number of returns	Number of top wealth-holders	Number of returns	Number of top wealth-holders	Number of returns	Number of top wealth-holders
(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)	(29)	(30)	(31)	(32)	(33)	(34)	
Total.....	7,574	331,008	5,330	237,793	3,062	133,727	1,122	43,690	290	10,417	187	7,211	100	4,277	32	1,847
Net deficit.....	13	2,390	6	(¹)	5	(¹)	1	(¹)	1	(¹)	-	-	-	-	-	-
Under \$30,000.....	9	(¹)	5	(¹)	-	-	-	-	-	-	-	-	-	-	-	-
\$30,000 under \$40,000.....	7	(¹)	2	(¹)	-	-	-	-	-	-	-	-	-	-	-	-
\$40,000 under \$50,000.....	3	(¹)	-	-	1	(¹)	-	-	-	-	-	-	-	-	-	-
\$50,000 under \$60,000.....	4	(¹)	2	(¹)	1	(¹)	-	-	-	-	-	-	-	-	-	-
\$60,000 under \$70,000.....	11	1,408	1	(¹)	-	-	-	-	-	-	-	-	-	-	-	-
\$70,000 under \$80,000.....	8	(¹)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
\$80,000 under \$90,000.....	13	1,283	3	(¹)	-	-	-	-	-	-	-	-	-	-	-	-
\$90,000 under \$100,000.....	17	1,474	2	(¹)	-	-	-	-	-	-	1	(¹)	-	-	-	-
\$100,000 under \$120,000.....	53	4,299	11	835	1	(¹)	-	-	-	-	-	-	-	-	-	-
\$120,000 under \$150,000.....	152	16,386	21	2,447	6	(¹)	-	-	-	-	-	-	-	-	-	-
\$150,000 under \$200,000.....	822	54,965	55	5,268	5	(¹)	1	(¹)	-	-	-	-	-	-	-	-
\$200,000 under \$300,000.....	6,462	244,628	538	47,342	19	2,683	3	(¹)	-	-	-	-	-	-	-	-
\$300,000 under \$500,000.....			4,684	180,200	245	16,412	4	(¹)	1	(¹)	-	-	-	-	-	-
\$500,000 under \$1,000,000.....					2,779	111,263	90	5,718	1	(¹)	-	-	-	-	-	-
\$1,000,000 under \$2,000,000.....							1,023	36,574	48	2,219	2	(¹)	-	-	-	-
\$2,000,000 under \$3,000,000.....									239	7,782	23	1,511	1	(¹)	-	-
\$3,000,000 under \$5,000,000.....											161	4,501	17	1,406	2	(¹)
\$5,000,000 under \$10,000,000.....													82	2,610	30	1,784
\$10,000,000 or more.....																

NOTE: Detail may not add to total because of rounding. Data in columns labelled "number of returns" are unweighted.
¹ Estimate is not shown separately because of high sampling variability.

SIZE OF CORPORATE STOCK.

Table 20.—MALE TOP WEALTHHOLDERS

(Number of top wealthholders, type of asset, information items, and estate tax return statistics)

Corporate stock	Number of top wealthholders	Total assets (Thousand dollars)	Debts		Net worth (Thousand dollars)	Type of asset					
			Number of top wealthholders	Amount (Thousand dollars)		Real estate		Bonds		Corporate stock	
						Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	
Total.....	2,538,643	439,112,075	2,280,050	61,730,100	377,381,976	2,193,743	118,317,986	1,174,904	23,510,517	1,982,588	175,731,484
No corporate stock.....	556,056	53,178,536	490,601	11,187,108	41,991,428	499,963	28,454,367	172,337	2,003,953	Not applicable	
Under \$500.....	164,209	16,271,632	150,192	4,055,391	12,216,242	152,621	9,345,931	66,407	583,130	164,209	31,732
\$500 under \$1,000.....	78,027	7,633,579	71,096	1,804,311	5,829,268	73,844	4,080,481	31,294	237,582	78,027	55,884
\$1,000 under \$1,500.....	55,135	5,429,107	49,043	1,064,342	4,364,765	51,384	2,935,825	23,530	205,853	55,135	67,021
\$1,500 under \$2,000.....	44,065	3,833,672	39,800	703,069	3,130,602	40,794	2,035,295	19,334	120,611	44,065	76,259
\$2,000 under \$3,000.....	71,359	6,623,143	64,084	1,185,834	5,437,309	66,035	3,078,431	31,756	239,895	71,359	174,594
\$3,000 under \$5,000.....	108,620	11,683,678	99,402	3,496,077	8,187,601	98,905	5,957,866	48,731	392,890	108,620	423,131
\$5,000 under \$10,000.....	162,447	16,901,693	142,617	2,547,685	14,354,008	150,311	7,520,345	86,623	830,316	162,447	1,190,576
\$10,000 under \$20,000.....	207,279	21,184,255	184,705	3,189,727	17,994,528	182,900	8,293,283	103,465	1,070,723	207,279	3,038,888
\$20,000 under \$30,000.....	166,150	18,309,674	148,704	2,548,454	15,761,220	143,091	6,278,435	86,843	958,019	166,150	4,130,302
\$30,000 under \$50,000.....	236,806	28,112,514	206,197	3,452,787	24,659,727	197,196	8,254,915	118,963	1,382,344	236,806	9,289,843
\$50,000 under \$100,000.....	328,231	49,537,859	290,563	5,401,253	44,136,607	255,937	11,083,405	164,428	2,237,137	328,231	22,220,238
\$100,000 under \$200,000.....	196,158	49,800,006	184,353	6,492,500	43,307,506	152,734	8,671,963	107,347	2,302,724	196,158	27,327,219
\$200,000 under \$300,000.....	65,466	26,214,063	61,806	2,360,011	23,854,053	50,341	3,428,480	43,158	1,670,150	65,466	15,897,779
\$300,000 under \$500,000.....	50,466	29,337,876	49,424	2,308,177	27,029,700	39,587	2,810,756	36,476	2,189,885	50,466	19,284,568
\$500,000 under \$1,000,000.....	28,938	28,257,597	28,321	2,977,516	25,280,081	22,238	2,181,199	19,200	2,331,894	28,938	19,812,934
\$1,000,000 under \$2,000,000.....	12,616	24,518,611	12,579	2,789,566	21,729,045	10,115	2,135,627	9,347	2,160,371	12,616	17,352,362
\$2,000,000 under \$3,000,000.....	2,405	7,579,800	2,405	496,478	7,083,322	2,030	281,494	1,899	671,133	2,405	5,733,523
\$3,000,000 under \$5,000,000.....	2,233	10,970,496	2,233	1,383,482	9,587,013	2,070	635,179	1,901	740,160	2,233	8,315,429
\$5,000,000 or more.....	1,979	23,734,284	1,927	2,286,333	21,447,950	1,649	854,710	1,864	1,181,749	1,979	20,309,199

Corporate stock	Type of asset—Continued										Information items			Estate tax return statistics		
	Cash		Notes and mortgages		Life insurance equity		Other assets (Thousand dollars)	Life insurance face value (Thousand dollars)	Jointly owned property		Number of returns	Gross estate (Thousand dollars)	Net Worth (Thousand dollars)			
	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)			Number of top wealthholders	Amount (Thousand dollars)						
(12)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)				
Total.....	2,431,873	38,689,790	803,060	19,784,096	2,214,938	13,943,166	49,135,035	86,513,268	1,780,268	81,874,760	49,604	10,799,320	9,572,454			
No corporate stock.....	514,637	6,816,940	147,346	3,300,783	456,123	2,152,306	10,450,190	17,043,505	366,163	16,111,120	9,842	1,193,971	1,012,681			
Under \$500.....	157,297	1,858,657	46,677	820,750	139,403	642,302	2,989,131	5,111,810	115,321	4,169,166	2,912	353,543	300,767			
\$500 under \$1,000.....	74,365	913,968	22,456	489,635	68,061	337,939	1,518,089	2,770,712	60,551	2,307,371	1,234	151,732	127,073			
\$1,000 under \$1,500.....	53,980	593,761	17,319	305,582	48,856	272,710	1,048,354	2,201,612	39,836	1,671,364	889	114,874	95,319			
\$1,500 under \$2,000.....	42,877	479,071	11,430	179,642	39,466	213,550	729,243	1,767,321	31,234	1,135,868	637	81,555	66,161			
\$2,000 under \$3,000.....	68,795	804,817	20,820	406,341	64,648	372,656	1,546,409	2,839,568	50,751	1,929,652	1,037	132,925	108,436			
\$3,000 under \$5,000.....	104,553	1,381,056	36,604	607,002	100,328	571,088	2,350,646	4,548,459	79,499	2,993,682	1,479	201,850	161,061			
\$5,000 under \$10,000.....	157,554	2,373,253	56,432	1,059,889	147,708	893,062	3,034,256	6,061,329	124,088	4,973,019	2,607	344,121	283,053			
\$10,000 under \$20,000.....	199,288	2,942,226	66,421	1,217,980	191,242	1,142,413	3,478,744	7,252,883	158,096	6,506,991	3,526	455,899	377,786			
\$20,000 under \$30,000.....	160,653	2,500,466	58,132	1,020,558	151,698	885,040	2,536,858	5,288,920	120,971	5,263,024	3,029	388,806	327,803			
\$30,000 under \$50,000.....	231,098	3,235,309	76,172	1,286,634	214,195	1,280,841	3,382,625	7,296,043	172,124	7,951,585	5,020	659,027	570,138			
\$50,000 under \$100,000.....	313,588	4,513,495	104,812	2,129,593	285,665	1,844,792	4,509,196	9,601,430	229,593	11,737,722	7,765	1,230,565	1,088,918			
\$100,000 under \$200,000.....	190,789	3,519,460	69,980	3,098,986	168,766	1,377,638	3,502,012	6,386,375	130,913	7,900,238	5,076	1,290,802	1,160,105			
\$200,000 under \$300,000.....	64,295	1,746,776	26,110	1,105,022	54,718	597,190	1,768,664	2,700,551	41,663	2,638,862	1,769	723,081	662,042			
\$300,000 under \$500,000.....	50,124	1,841,924	21,016	759,181	43,455	557,900	1,893,661	2,537,503	31,709	2,238,703	1,355	809,355	743,715			
\$500,000 under \$1,000,000.....	28,781	1,279,670	11,034	564,590	24,417	394,126	1,693,184	1,630,096	18,156	1,398,449	877	898,782	836,521			
\$1,000,000 under \$2,000,000.....	12,583	1,055,517	5,951	435,262	11,121	251,780	1,127,690	975,315	6,749	504,193	350	677,751	632,954			
\$2,000,000 under \$3,000,000.....	2,405	202,671	1,547	296,583	1,998	66,114	328,283	245,192	1,272	130,589	97	313,845	296,419			
\$3,000,000 under \$5,000,000.....	2,233	254,566	1,452	311,691	1,956	64,121	649,350	184,574			61	291,562	269,119			
\$5,000,000 or more.....	1,979	376,189	1,349	388,391	1,114	25,597	598,449	70,069	1,580	313,162	42	485,275	452,383			

NOTE: Detail may not add to total because of rounding. Data in columns 22 - 24 are unweighted.

AGE AND MARITAL STATUS

Table 24.—MALE TOP WEALTHHOLDERS WITH NET WORTH OF \$60,000 OR MORE

Age and marital status	Number of top wealth-holders	Total assets (Thousand dollars)	Debts			Net worth (Thousand dollars)	Type of asset				
			Number of top wealth-holders	Amount (Thousand dollars)	Amount (Thousand dollars)		Real estate		Bonds		Corporate stock
							Number of top wealth-holders	Amount (Thousand dollars)	Number of top wealth-holders	Amount (Thousand dollars)	
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	
Total.....	1,813,618	395,417,609	1,604,938	42,734,832	352,682,774	1,568,359	97,532,641	936,198	22,723,995	1,506,126	169,244,079
Married.....	1,479,639	330,599,204	1,306,886	38,322,232	292,276,972	1,324,472	84,180,344	743,052	17,354,079	1,243,716	121,524,635
Single.....	151,492	27,106,827	129,438	1,402,898	25,704,045	96,397	4,661,179	97,511	2,652,130	135,646	12,341,641
Widowed.....	137,407	27,000,599	126,044	1,411,317	24,295,642	114,585	6,275,863	79,737	1,922,145	107,738	10,191,992
Other.....	45,060	11,924,499	42,590	1,998,405	10,326,094	32,905	2,415,255	19,898	765,441	36,708	5,886,210
Under 40 years, total.....	183,827	46,669,391	167,877	8,672,346	38,106,796	148,129	11,179,097	82,804	1,045,693	158,761	25,191,741
Married.....	139,768	38,998,180	132,172	8,056,363	30,942,015	126,095	9,790,338	59,924	503,192	120,778	21,015,930
Single.....	36,461	6,984,761	28,107	334,014	6,650,747	16,715	879,597	22,070	481,679	30,385	3,372,139
Widowed.....	7,398	1,686,450	(1)	(1)	1,514,434	(1)	(1)	(1)	(1)	(1)	(1)
Other.....											
40 to 49 years, total.....	310,451	67,779,526	292,485	12,395,261	55,384,266	282,647	18,407,230	135,183	2,539,688	260,024	26,660,295
Married.....	270,635	58,985,574	255,853	11,174,966	47,810,610	251,080	16,705,521	114,206	1,960,709	228,745	22,389,390
Single.....	24,327	3,722,059	22,022	296,736	3,426,307	19,360	979,506	17,130	301,844	19,022	1,334,589
Widowed.....	6,034	1,521,823	5,619	133,662	1,388,151	5,282	278,930	2,134	9,621	8,827	10,101,386
Other.....	9,435	4,239,000	9,001	769,899	3,469,200	6,925	443,463	4,053	267,444	8,010	2,734,930
50 to 54 years, total.....	222,284	46,167,273	203,515	5,632,355	40,514,919	199,330	12,634,465	109,051	2,157,748	186,523	18,795,106
Married.....	198,316	41,660,593	181,325	5,227,725	36,432,870	181,938	11,664,427	96,115	1,804,721	167,249	16,739,886
Single.....	13,315	2,339,276	12,048	176,409	2,162,866	9,058	412,535	8,115	195,688	10,377	1,124,872
Widowed.....	4,692	707,838	4,438	99,179	668,658	3,290	221,760	2,991	33,998	3,921	260,580
Other.....	5,961	1,459,566	5,707	189,042	1,270,525	4,439	335,743	2,030	123,848	4,946	640,763
55 to 59 years, total.....	263,920	56,604,996	236,046	5,621,062	51,003,937	232,269	13,912,621	134,329	2,919,909	221,881	24,121,702
Married.....	232,775	50,809,376	208,004	5,126,936	45,682,440	209,723	12,663,467	120,776	2,409,572	197,474	21,990,108
Single.....	16,965	3,027,574	14,600	196,776	2,830,800	10,466	448,285	9,150	336,697	13,249	1,336,614
Widowed.....	8,225	1,826,732	7,765	191,992	1,635,361	7,765	520,035	4,727	145,111	6,820	611,230
Other.....	5,535	931,277	5,318	89,451	841,849	4,305	280,814	2,615	29,129	4,218	253,930
60 to 64 years, total.....	244,930	52,592,609	212,668	4,484,797	48,107,809	215,620	13,393,793	134,369	3,746,924	205,388	20,433,489
Married.....	211,731	46,114,083	182,088	3,986,611	42,127,472	189,004	11,867,175	116,587	3,274,621	179,768	17,990,239
Single.....	14,920	2,926,380	13,437	278,382	2,648,000	10,622	479,830	9,150	297,968	11,561	1,242,682
Widowed.....	20,361	3,609,639	18,883	181,971	3,427,660	11,809	650,050	6,619	103,766	9,732	789,182
Other.....	4,872	1,200,778	5,000	114,464	1,085,337	4,189	394,342	2,173	70,543	4,297	413,386
65 to 69 years, total.....	226,566	46,682,083	191,015	2,897,823	43,784,260	193,233	11,147,708	127,782	3,136,527	185,706	19,244,297
Married.....	186,413	39,547,415	172,807	2,449,489	37,097,924	162,427	9,279,350	103,972	2,784,188	154,156	16,461,611
Single.....	14,920	2,926,380	13,437	278,382	2,648,000	10,622	479,830	9,150	297,968	11,561	1,242,682
Widowed.....	20,361	3,609,639	18,883	181,971	3,427,660	11,809	650,050	6,619	103,766	9,732	789,182
Other.....	4,872	1,200,778	5,000	114,464	1,085,337	4,189	394,342	2,173	70,543	4,297	413,386
70 to 74 years, total.....	143,924	31,264,676	119,190	1,444,050	29,820,622	119,539	6,895,864	83,600	2,558,769	116,780	13,633,962
Married.....	110,427	24,730,265	89,024	1,095,250	23,635,013	94,324	5,614,434	63,649	2,000,399	90,631	10,769,035
Single.....	10,644	1,990,264	9,114	64,316	1,925,946	8,688	309,457	7,232	224,166	8,253	866,633
Widowed.....	20,049	3,800,439	18,542	238,342	3,562,095	16,286	816,355	11,406	377,235	15,877	1,670,993
Other.....	2,804	737,708	2,470	46,142	691,568	2,117	140,896	1,313	49,943	2,019	329,641
75 to 79 years, total.....	96,214	21,618,497	80,625	801,316	20,817,178	78,825	4,390,723	56,620	1,886,298	77,489	9,938,344
Married.....	65,290	13,487,314	59,074	605,733	14,881,440	55,300	3,094,566	38,410	1,257,183	53,289	7,405,531
Single.....	7,975	1,663,319	6,912	132,882	1,530,437	6,286	221,979	5,188	225,599	5,970	3,971
Widowed.....	21,415	4,016,335	19,221	132,882	3,883,483	17,121	917,341	11,992	377,235	16,869	1,670,993
Other.....	1,924	451,669	1,691	30,869	420,798	1,352	126,837	1,030	26,281	1,365	154,522
80 to 84 years, total.....	51,318	12,084,343	43,470	317,898	11,766,444	41,310	2,261,644	30,303	1,215,140	40,824	5,775,120
Married.....	28,854	7,235,198	23,274	210,005	7,025,195	23,928	1,350,765	17,235	765,892	23,364	3,545,893
Single.....	4,446	956,627	3,933	14,795	941,832	3,612	123,672	2,884	308,350	3,528	485,547
Widowed.....	17,262	3,628,929	15,606	83,084	3,545,846	13,806	742,132	9,884	300,990	13,401	1,634,706
Other.....	756	283,589	657	10,014	253,571	531	26,015	360	47,184	531	108,974
85 years or more, total.....	28,919	7,405,210	24,882	194,266	7,210,939	22,308	1,284,970	17,142	833,088	23,366	3,856,234
Married.....	11,160	3,185,583	9,036	82,239	3,103,344	9,067	535,400	6,619	363,082	9,246	1,727,138
Single.....	2,468	782,024	2,214	91,313	772,708	1,996	85,106	1,596	146,990	1,808	410,139
Widowed.....	14,882	3,357,927	13,214	100,451	3,257,476	11,227	642,978	8,722	320,690	11,808	1,682,761
Other.....	409	79,676	38	2,263	77,411	318	21,086	205	4,524	35	35,796
Age unknown, total.....	41,265	6,248,996	33,165	383,413	6,165,581	33,139	2,024,946	20,815	482,211	29,434	2,138,789
Married.....	24,290	4,245,763	18,268	310,638	3,935,125	21,486	1,312,871	11,729	229,220	17,956	1,509,745
Single.....	4,451	718,615	4,516	18,901	699,715	3,717	55,500	3,322	79,564	3,996	217,632
Widowed.....	9,654	1,349,921	8,615	31,006	1,318,913	8,357	428,629	5,036	166,230	6,542	374,579
Other.....	1,870	234,697	1,766	22,868	211,828	1,539	87,943	728	4,897	1,300	56,833

Footnote at end of table.

AGE AND MARITAL STATUS

Table 24. —MALE TOP WEALTHHOLDERS WITH NET WORTH OF \$60,000 OR MORE—Continued
 (Number of top wealthholders, type of asset, information items, and estate tax return statistics)

Age and marital status	Type of asset—Continued							Information items			Estate tax return statistics		
	Cash		Notes and mortgages		Life insurance equity		Other assets (Thousand dollars)	Life insurance face value (Thousand dollars)	Jointly owned property		Number of returns (Thousand dollars)	Gross estate (Thousand dollars)	Net worth (Thousand dollars)
	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)			Number of top wealthholders	Amount (Thousand dollars)			
(12)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	
Total.....	1,755,027	35,505,698	672,689	18,744,276	1,509,668	9,763,654	41,203,248	48,430,131	1,255,319	67,754,860	44,671	10,337,632	9,370,119
Married.....	1,426,874	26,972,313	563,640	16,120,833	1,288,351	8,579,521	35,867,471	43,664,135	1,159,459	65,449,597	31,730	7,602,520	6,786,600
Single.....	148,483	3,995,721	41,379	848,319	95,499	294,487	2,393,459	1,856,984	45,183	1,119,404	3,378	723,835	692,213
Widowed.....	135,140	3,403,633	49,883	1,241,603	95,155	721,324	1,920,597	1,791,109	39,584	895,614	8,664	1,790,880	1,695,761
Other.....	44,530	1,134,031	17,787	533,519	30,663	168,322	1,021,721	1,117,903	11,093	290,245	899	220,397	195,545
Under 40 years, total.....	171,676	2,063,676	58,495	1,197,539	164,080	752,966	5,275,846	8,227,657	110,147	4,357,687	242	70,918	50,169
Married.....	129,135	1,300,210	48,617	944,264	129,893	587,742	4,456,480	6,755,606	101,789	4,205,271	184	58,933	40,208
Single.....	34,943	717,806	8,358	131,473	27,348	80,325	721,747	923,279	8,358	152,416	48	9,513	7,965
Widowed.....	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	-	-	10	2,472	1,996
Other.....	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	-	-	-	-	-
40 to 49 years, total.....	300,659	5,125,622	118,515	3,873,216	280,518	1,091,603	10,081,869	12,547,111	221,409	11,076,090	1,212	305,734	215,629
Married.....	261,060	4,225,733	103,591	3,674,953	253,149	1,032,254	8,997,006	11,864,912	209,453	10,813,680	1,058	271,178	187,783
Single.....	24,327	475,327	7,665	88,258	16,468	24,493	159,239	281,550	8,556	219,596	91	14,499	12,487
Widowed.....	5,837	117,745	(1)	(1)	4,412	16,489	172,133	189,530	(1)	(1)	24	3,985	2,668
Other.....	9,435	306,817	5,163	74,548	6,489	18,367	393,491	211,119	(1)	(1)	39	16,072	12,691
50 to 54 years, total.....	214,551	3,715,491	83,056	1,995,035	201,360	863,142	6,005,290	7,253,265	166,490	9,274,318	1,753	414,489	319,509
Married.....	191,343	3,192,375	75,191	1,779,222	183,225	818,842	5,641,122	6,880,988	157,486	9,051,789	1,564	376,361	287,316
Single.....	12,935	323,923	3,678	77,112	9,258	17,418	177,732	146,371	5,199	101,449	105	19,466	17,057
Widowed.....	4,565	72,224	1,577	4,312	15,896	87,206	133,899	152,371	1,523	9,278	37	6,510	5,116
Other.....	5,708	126,969	2,410	122,035	4,565	10,986	99,230	92,317	2,282	111,802	47	12,152	10,020
55 to 59 years, total.....	256,070	4,771,771	97,987	2,800,055	234,127	1,547,865	6,501,096	7,233,015	194,286	11,016,687	3,127	738,030	604,315
Married.....	225,347	4,024,498	87,185	2,520,452	210,324	1,426,140	5,815,139	6,664,202	185,510	10,844,578	2,758	664,068	541,303
Single.....	16,627	435,345	4,725	94,624	12,324	39,263	347,364	183,476	4,472	95,966	201	37,697	33,661
Widowed.....	8,441	168,508	3,292	122,825	7,259	56,272	202,772	262,953	2,364	40,750	101	24,092	19,376
Other.....	5,655	143,420	2,785	62,154	4,220	26,190	135,821	122,384	1,940	35,393	67	12,173	9,975
60 to 64 years, total.....	237,913	5,019,962	94,400	3,076,408	209,653	1,590,593	5,329,433	5,465,938	180,307	10,550,245	4,958	1,143,074	973,841
Married.....	205,160	4,102,567	83,139	2,745,356	185,793	1,467,721	4,666,349	5,043,697	171,022	10,348,310	4,286	1,005,872	852,792
Single.....	16,672	483,314	4,198	111,567	10,077	44,762	378,383	153,824	4,792	120,883	302	61,446	56,377
Widowed.....	12,795	284,899	4,939	161,629	10,325	60,747	291,096	208,754	3,012	58,175	263	50,594	43,813
Other.....	5,286	149,182	2,124	57,856	3,458	17,363	109,145	59,663	1,481	28,877	107	25,162	20,759
65 to 69 years, total.....	221,123	5,222,723	87,058	2,282,690	179,155	1,590,680	3,757,462	3,769,379	160,977	9,638,871	6,743	1,454,192	1,303,098
Married.....	181,408	4,094,504	73,248	1,967,438	152,847	1,414,985	3,244,518	3,353,043	148,747	9,308,507	5,548	1,234,687	1,104,105
Single.....	16,750	471,212	4,098	114,806	7,525	30,438	126,208	72,127	6,104	159,555	444	80,379	75,614
Widowed.....	20,093	516,978	7,898	159,309	15,657	126,919	308,757	300,754	6,149	139,657	606	108,297	96,706
Other.....	4,872	140,029	1,814	41,137	3,126	18,338	77,979	43,455	1,377	31,117	145	30,829	26,673
70 to 74 years, total.....	140,518	3,645,050	54,937	1,518,734	107,232	1,034,020	1,976,280	1,876,607	97,200	5,517,310	7,343	1,638,131	1,521,456
Married.....	107,526	2,677,304	43,275	1,179,504	85,398	874,403	1,613,125	1,586,937	86,788	5,239,250	5,634	1,298,104	1,205,868
Single.....	10,547	375,187	2,921	80,506	5,391	24,718	92,876	44,845	3,607	103,565	543	102,878	98,566
Widowed.....	19,739	507,953	7,702	192,624	14,993	123,878	214,796	224,826	6,019	152,350	1,023	199,051	181,740
Other.....	2,706	84,606	1,039	66,100	1,450	11,021	55,483	19,999	786	22,141	143	38,098	35,282
75 to 79 years, total.....	94,448	2,710,336	35,357	909,590	65,406	697,649	1,085,553	1,066,743	59,766	3,214,968	7,126	1,628,713	1,542,015
Married.....	63,860	1,768,859	25,128	657,536	47,294	547,772	755,729	837,573	50,642	2,967,806	4,836	1,168,664	1,102,330
Single.....	7,483	279,713	2,177	54,132	3,067	16,043	73,927	24,528	2,271	72,442	561	123,838	120,846
Widowed.....	21,171	590,415	7,387	161,384	14,260	126,493	227,101	193,416	6,403	160,195	1,586	302,464	287,669
Other.....	1,934	71,349	665	36,538	785	7,341	28,796	11,226	430	14,525	143	33,747	31,170
80 to 84 years, total.....	50,274	1,446,229	18,830	512,130	30,897	351,558	522,521	448,420	28,413	1,382,162	5,702	1,353,467	1,307,378
Married.....	28,098	772,103	10,845	314,396	18,675	233,656	252,493	298,032	21,789	1,208,269	3,206	811,064	780,574
Single.....	4,410	182,294	1,368	26,487	1,597	8,402	24,510	10,717	1,287	50,272	494	106,550	104,647
Widowed.....	17,037	472,071	6,309	143,380	10,323	102,085	225,145	130,210	5,112	117,837	1,918	406,340	393,983
Other.....	729	19,761	308	27,867	342	7,415	20,373	9,461	225	5,784	84	29,513	28,174
85 years or more, total.....	28,396	834,135	9,673	223,594	14,609	148,655	222,927	189,613	13,276	582,941	5,670	1,460,031	1,413,910
Married.....	10,893	307,131	3,871	98,327	6,233	66,530	87,775	84,861	8,172	430,973	2,188	628,221	608,498
Single.....	2,442	104,356	683	17,276	719	4,897	13,054	6,247	586	16,709	484	153,602	151,512
Widowed.....	14,652	411,446	4,972	103,024	7,526	76,264	120,962	97,276	4,402	133,321	2,918	662,535	638,721
Other.....	409	11,202	147	4,967	131	964	1,136	1,229	116	1,938	80	15,673	15,179
Age unknown, total.....	39,499	950,703	14,381	355,285	22,631	131,089	445,881	352,383	23,048	1,143,581	795	130,446	118,799
Married.....	23,044	507,029	9,550	239,385	15,520	109,476	337,735	294,284	18,061	1,031,167	468	85,368	75,823
Single.....	5,347	147,244	1,508	52,078	1,765	3,728	22,919	10,020	1,351	26,547	105	13,967	13,441
Widowed.....	9,290	250,740	2,751	53,189	4,568	15,595	58,506	41,920	2,960	69,583	186	26,515	25,413
Other.....	1,818	45,690	572	10,633	778	2,290	26,411	6,159	676	16,284	36	4,596	4,082

NOTE: Detail may not add to total because of rounding. Data in columns 22 - 24 are unweighted.
 1 Estimate is not shown separately because of high sampling variability.

AGE AND MARITAL STATUS

Table 25.—FEMALE TOP WEALTHHOLDERS WITH NET WORTH OF \$60,000 OR MORE
 [Number of top wealthholders, type of asset, information items, and estate tax return statistics]

Age and marital status	Number of top wealthholders	Total assets (Thousand dollars)	Debts		Net worth (Thousand dollars)	Type of asset					
			Number of top wealthholders	Amount (Thousand dollars)		Real estate		Bonds		Corporate stock	
						Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	
Total.....	1,440,381	301,794,877	1,231,418	16,674,501	285,120,380	1,122,999	64,461,625	799,428	24,258,067	1,196,220	148,172,057
Married.....	671,057	150,083,784	522,983	10,714,473	139,369,305	561,581	35,970,674	338,739	9,621,432	558,334	76,705,297
Single.....	171,002	30,052,593	151,469	565,220	29,487,381	102,288	3,448,508	117,208	2,580,099	154,004	18,475,720
Widowed.....	522,527	104,367,890	484,727	4,317,082	100,050,810	407,262	21,318,254	306,552	9,843,683	421,789	45,818,532
Other.....	75,795	17,290,610	72,239	1,077,726	16,212,884	51,868	3,724,189	36,292	2,212,853	62,093	7,172,508
Under 40 years, total.....	158,215	31,237,673	134,366	2,157,307	29,080,367	105,979	6,922,785	83,589	1,631,281	143,290	17,207,625
Married.....	104,479	24,914,665	89,556	1,984,648	22,930,018	82,093	6,100,789	50,749	1,304,656	95,524	13,713,488
Single.....	35,823	3,814,144	26,897	39,354	3,774,791	10,450	266,129	26,868	204,292	34,331	2,533,554
Widowed.....	17,913	2,508,864	17,913	133,305	2,375,558	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)
Other.....											
40 to 49 years, total.....	221,018	48,103,634	189,546	4,199,440	43,904,192	186,929	11,851,300	110,311	2,687,326	185,088	22,557,316
Married.....	161,496	36,276,047	131,435	3,059,757	33,216,288	141,750	9,268,882	78,807	2,073,442	135,071	17,632,983
Single.....	15,135	2,620,022	14,730	123,941	2,496,081	11,080	315,223	9,699	172,722	13,919	1,710,451
Widowed.....	30,286	5,699,742	29,685	580,716	5,119,025	23,618	1,335,733	14,146	260,265	24,220	1,985,771
Other.....	14,101	3,507,823	13,696	435,026	3,072,798	10,481	931,462	7,659	180,897	11,878	1,228,111
50 to 54 years, total.....	151,622	32,664,719	126,354	3,025,727	29,638,991	130,521	7,993,466	82,593	2,701,226	125,573	15,258,057
Married.....	90,396	19,961,360	68,513	2,293,996	17,667,364	79,194	5,264,221	46,894	1,068,965	76,069	10,193,770
Single.....	15,111	2,535,574	14,070	86,836	2,448,738	10,422	403,404	9,121	221,596	13,028	1,409,785
Widowed.....	35,952	7,112,063	33,868	435,259	6,676,804	32,045	1,654,265	21,625	490,240	28,658	2,821,883
Other.....	10,163	3,055,722	9,903	209,636	2,846,085	8,860	671,576	4,953	920,425	7,818	832,619
55 to 59 years, total.....	192,911	41,931,791	164,850	2,045,349	39,886,440	153,588	9,177,206	103,379	2,759,855	157,466	20,279,138
Married.....	103,930	22,549,238	80,303	1,207,922	21,341,315	86,393	5,491,579	51,319	1,618,386	82,147	11,229,252
Single.....	17,907	5,196,380	16,614	57,291	5,139,090	13,107	467,592	11,631	190,659	15,876	3,841,781
Widowed.....	56,489	10,977,970	53,903	603,149	10,374,820	45,967	2,424,736	33,598	705,826	47,444	3,803,172
Other.....	14,585	3,208,203	14,030	176,987	3,031,215	8,121	793,299	6,831	244,984	11,999	1,404,933
60 to 64 years, total.....	181,483	38,245,654	151,813	2,095,293	36,150,366	145,575	7,902,879	100,872	3,340,567	149,359	18,531,771
Married.....	83,682	19,613,542	61,585	1,203,646	18,409,896	69,564	3,916,723	42,353	1,392,986	67,211	10,783,557
Single.....	19,233	3,229,824	17,698	84,596	3,145,229	13,198	477,798	13,811	341,559	16,880	1,607,052
Widowed.....	69,975	13,372,057	64,756	758,661	12,613,398	57,084	3,224,397	39,387	1,281,054	57,391	5,062,793
Other.....	8,593	2,030,231	7,774	48,390	1,981,843	5,729	283,961	5,321	324,968	7,877	1,078,369
65 to 69 years, total.....	178,890	37,195,593	151,735	1,407,054	35,788,539	138,678	7,578,479	103,777	3,631,356	145,630	17,589,561
Married.....	64,288	14,206,561	46,775	647,877	13,558,684	52,219	3,301,481	33,849	1,018,333	52,612	7,106,660
Single.....	19,548	3,936,324	17,908	48,163	3,888,162	13,382	459,307	13,513	550,137	17,185	2,310,603
Widowed.....	87,707	17,323,510	80,296	624,189	16,699,321	67,961	3,557,494	52,413	1,833,924	69,667	7,381,677
Other.....	7,347	1,729,198	6,756	86,825	1,642,372	5,116	260,197	4,002	228,962	6,166	790,621
70 to 74 years, total.....	126,648	23,542,646	110,197	608,258	22,934,391	97,288	4,819,936	75,641	1,996,961	101,854	11,146,389
Married.....	32,996	6,189,127	23,872	166,565	6,022,564	26,749	1,381,464	18,346	472,442	25,956	2,908,429
Single.....	14,943	2,376,441	13,374	34,096	2,342,346	10,467	374,178	10,499	206,744	13,212	1,272,101
Widowed.....	75,111	14,164,871	69,682	385,863	13,779,009	57,520	2,900,229	44,833	1,254,224	59,873	6,537,933
Other.....	3,598	812,207	3,269	21,734	790,472	2,552	164,065	1,963	63,551	2,813	427,926
75 to 79 years, total.....	92,633	19,579,512	81,616	520,230	19,059,284	68,820	3,474,567	56,316	2,215,529	75,464	9,793,585
Married.....	16,133	3,596,180	11,271	81,570	3,514,608	12,780	639,454	9,274	411,533	13,075	1,776,459
Single.....	12,663	2,230,329	11,545	32,191	2,198,140	8,213	279,716	8,488	245,157	11,133	1,247,703
Widowed.....	61,741	13,196,787	56,860	385,184	12,811,605	46,258	2,413,927	37,496	1,508,095	49,608	6,492,172
Other.....	2,096	556,216	1,940	21,285	534,931	1,569	141,470	1,058	50,744	1,648	277,251
80 to 84 years, total.....	57,927	12,247,187	51,407	212,284	12,034,896	40,174	1,916,423	35,297	1,300,488	48,245	6,694,025
Married.....	5,995	1,419,499	4,051	16,600	1,402,896	4,627	220,060	3,143	158,123	4,926	795,160
Single.....	8,513	1,740,688	7,674	18,164	1,722,519	5,100	175,622	5,927	204,273	7,685	1,032,262
Widowed.....	42,312	8,814,345	38,666	173,088	8,641,257	29,731	1,481,935	25,695	917,678	34,734	4,700,703
Other.....	1,107	272,655	1,016	4,432	268,224	716	38,806	532	20,414	900	165,900
85 years or more, total.....	38,765	10,162,808	34,969	198,463	9,964,347	25,146	1,289,260	24,330	1,296,914	32,844	6,042,685
Married.....	1,348	467,552	970	4,893	462,657	1,005	51,347	793	55,139	1,091	275,631
Single.....	6,697	1,615,492	6,140	16,820	1,598,676	3,601	126,173	4,493	169,024	5,991	1,078,773
Widowed.....	30,172	7,910,652	27,305	173,575	7,737,077	20,168	1,092,731	18,639	1,039,959	25,220	4,595,196
Other.....	548	169,112	554	3,175	165,937	372	19,009	405	32,792	542	93,085
Age unknown, total.....	40,269	6,883,660	34,565	205,096	6,678,567	30,301	1,535,324	23,323	696,564	31,407	3,071,905
Married.....	6,314	890,013	4,652	46,999	843,015	5,207	334,674	3,212	47,427	4,652	289,908
Single.....	5,429	757,375	4,819	23,768	733,609	3,268	103,366	3,158	73,936	4,764	311,655
Widowed.....	26,811	4,979,676	23,765	130,593	4,849,083	20,939	1,052,587	15,734	546,562	20,496	2,215,507
Other.....	1,715	256,596	1,329	3,736	252,860	887	44,697	1,219	28,639	1,495	134,835

Footnote at end of table.

AGE AND MARITAL STATUS

Table 25.—FEMALE TOP WEALTHHOLDERS WITH NET WORTH OF \$60,000 OR MORE—Continued
 (Number of top wealthholders, type of asset, information items, and estate tax return statistics)

Age and marital status	Type of asset—Continued						Information items				Estate tax return statistics		
	Cash		Notes and mortgages		Life insurance equity		Other assets (Thousand dollars)	Life insurance face value (Thousand dollars)	Jointly owned property		Number of returns	Gross estate (Thousand dollars)	Net worth (Thousand dollars)
	Number of top wealthholders	Cash amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)			Number of top wealthholders	Amount (Thousand dollars)			
(12)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	
Total.....	1,386,887	30,975,907	442,962	10,221,449	627,003	1,335,108	22,370,655	6,443,929	696,403	25,744,377	27,908	6,138,013	5,930,536
Married.....	628,458	11,692,770	208,135	4,978,464	321,601	626,145	10,489,006	3,675,924	429,984	20,100,869	5,823	1,308,794	1,237,988
Single.....	168,598	3,509,231	31,894	536,236	71,856	123,812	1,378,984	691,739	61,598	1,285,794	3,814	775,264	762,522
Widowed.....	514,758	14,233,434	179,412	4,128,068	201,766	532,700	8,493,211	1,739,895	183,931	3,943,482	17,439	3,658,422	3,742,756
Other.....	75,073	1,540,472	23,521	569,681	31,780	52,451	2,009,454	336,371	20,890	414,232	832	195,533	187,264
Under 40 years, total.....	149,260	2,612,434	41,797	869,687	80,605	93,960	1,899,901	1,080,027	70,156	2,328,991	105	21,588	19,484
Married.....	95,524	1,572,753	35,825	819,897	59,706	59,732	1,343,348	686,586	59,706	2,273,937	70	17,113	15,363
Single.....	35,823	521,100	(1)	(1)	14,928	22,210	261,162	255,301	(1)	(1)	24	2,711	2,530
Widowed.....	17,913	518,581	(1)	(1)	(1)	(1)	295,391	(1)	(1)	(1)	11	1,764	1,591
Other.....													
40 to 49 years, total.....	209,321	3,602,631	62,090	1,405,265	111,942	139,208	5,860,591	1,600,053	112,768	4,704,309	471	105,021	93,300
Married.....	150,610	2,182,171	45,153	996,390	78,848	95,980	4,026,203	1,103,193	96,011	4,420,796	342	79,037	70,680
Single.....	14,729	198,920	(1)	(1)	7,672	9,918	174,841	113,999	(1)	(1)	33	5,938	5,467
Widowed.....	29,881	939,817	10,286	332,856	18,574	23,111	822,187	265,635	9,686	173,581	67	13,082	11,205
Other.....	14,101	281,723	4,233	38,073	6,848	10,199	837,360	117,226	(1)	(1)	29	6,964	5,946
50 to 54 years, total.....	144,590	2,876,479	53,934	1,218,963	84,416	121,595	2,494,934	1,021,775	85,712	3,485,287	582	128,842	113,777
Married.....	84,145	1,351,995	31,263	635,533	50,279	80,550	1,366,332	676,874	62,262	2,982,688	347	78,918	67,820
Single.....	14,330	268,064	3,650	59,623	8,339	11,562	161,541	97,150	5,732	153,959	58	10,064	9,400
Widowed.....	35,952	1,072,417	15,111	346,759	19,803	21,529	704,968	180,910	14,330	281,355	138	27,914	25,631
Other.....	10,163	184,003	3,910	177,048	5,995	7,954	262,093	66,841	3,788	67,285	39	11,946	10,926
55 to 59 years, total.....	186,080	4,016,858	63,318	1,533,195	97,653	192,126	3,973,396	897,783	104,669	3,949,995	1,045	230,972	216,071
Married.....	98,577	1,874,739	31,382	684,787	52,611	111,477	1,539,011	520,919	71,995	3,304,828	563	124,372	115,608
Single.....	17,722	363,619	5,353	115,249	8,676	12,223	205,256	57,114	7,938	126,396	97	28,393	27,839
Widowed.....	55,381	1,423,512	21,784	602,376	30,090	62,514	1,955,830	292,126	19,568	401,712	306	60,712	56,202
Other.....	14,400	354,988	4,799	130,783	6,276	5,912	273,299	27,624	5,168	117,059	79	17,495	16,422
60 to 64 years, total.....	174,833	4,074,271	62,405	1,584,772	87,981	227,489	2,583,902	781,728	95,845	3,816,268	1,774	379,274	353,377
Married.....	78,669	1,684,600	26,803	843,869	38,463	92,146	899,663	316,652	56,253	2,979,639	818	193,920	179,961
Single.....	18,824	429,751	4,809	105,508	11,050	24,075	244,079	82,727	10,333	293,413	188	32,145	30,745
Widowed.....	69,054	1,804,849	28,133	570,767	34,988	101,445	1,326,748	348,599	26,395	511,448	684	133,130	123,298
Other.....	8,286	155,071	2,660	64,628	3,480	9,823	113,412	33,750	2,864	31,768	84	20,079	19,373
65 to 69 years, total.....	174,037	4,426,963	56,684	1,352,822	68,880	200,598	2,415,818	475,343	82,988	3,022,467	2,727	571,191	545,557
Married.....	61,140	1,413,762	18,892	494,465	24,009	82,621	1,289,236	195,785	42,181	2,101,239	980	218,289	206,685
Single.....	19,287	429,454	3,150	66,657	8,791	17,352	102,817	41,117	8,005	210,178	298	60,367	59,272
Widowed.....	86,394	2,416,785	32,278	735,278	33,325	92,534	1,305,820	219,272	31,029	683,862	1,337	266,008	254,564
Other.....	7,216	166,962	2,364	56,422	2,755	8,091	217,945	19,169	1,773	27,188	112	26,527	25,036
70 to 74 years, total.....	123,671	3,319,130	41,465	954,567	42,969	140,231	1,165,431	254,500	57,326	1,847,484	3,873	723,453	701,359
Married.....	31,294	812,630	10,367	287,492	10,432	54,170	272,500	98,313	22,563	1,054,228	1,009	190,620	184,178
Single.....	14,845	390,849	3,303	44,112	5,135	11,555	76,902	20,970	6,344	144,804	457	72,962	71,630
Widowed.....	73,966	2,030,576	26,618	580,046	26,487	71,656	790,207	130,044	27,273	623,121	2,297	434,961	421,377
Other.....	3,566	85,075	1,177	42,917	915	2,850	25,822	5,173	1,146	25,331	110	24,910	24,174
75 to 79 years, total.....	90,772	2,546,587	26,679	575,401	25,738	109,293	864,544	167,115	38,280	1,207,643	4,726	1,001,905	972,415
Married.....	15,426	451,146	4,901	129,887	4,332	30,618	157,085	46,815	10,584	550,135	823	184,305	179,316
Single.....	12,624	353,883	2,372	38,629	3,744	7,568	57,669	11,574	5,214	125,773	646	113,998	112,150
Widowed.....	60,704	1,677,936	18,661	394,785	17,093	69,779	640,091	106,696	21,579	512,874	3,150	675,190	653,654
Other.....	2,018	63,622	745	12,100	569	1,328	9,699	2,030	903	18,861	107	28,412	27,295
80 to 84 years, total.....	56,951	1,530,083	14,776	291,042	12,893	59,261	455,866	75,586	22,010	657,871	5,036	1,066,393	1,046,510
Married.....	5,719	175,661	1,336	33,689	1,095	5,515	31,293	7,036	3,729	180,757	521	123,569	121,990
Single.....	8,423	260,853	1,613	24,827	1,822	3,817	39,030	4,868	3,003	80,765	740	151,454	149,783
Widowed.....	41,749	1,055,300	11,606	228,587	9,756	49,234	380,909	62,794	14,826	384,214	3,679	767,644	751,414
Other.....	1,060	38,269	221	3,939	220	695	4,634	888	452	12,135	96	23,726	23,323
85 years or more, total.....	37,997	996,434	8,680	159,732	5,511	33,992	343,799	43,354	13,300	355,093	6,811	1,784,591	1,748,132
Married.....	1,326	60,357	384	8,442	165	8,564	8,071	10,922	878	48,198	236	82,439	81,169
Single.....	6,617	179,113	1,242	22,384	815	1,826	38,203	2,326	2,115	43,815	1,175	283,510	280,469
Widowed.....	29,448	741,311	6,903	126,163	4,508	23,573	291,703	30,069	10,107	255,753	5,293	1,388,973	1,357,381
Other.....	548	15,653	151	2,723	(1)	(1)	5,722	(1)	200	5,327	107	29,669	29,113
Age unknown, total.....	39,375	974,037	11,134	276,003	8,415	17,355	312,473	46,660	13,349	368,969	727	124,783	120,554
Married.....	6,028	112,956	1,829	44,013	1,661	4,772	56,264	12,829	3,822	204,424	114	16,212	15,218
Single.....	5,374	113,625	998	15,603	884	1,706	17,484	4,588	1,607	44,003	98	13,722	13,243
Widowed.....	26,258	711,879	8,032	210,431	5,649	10,833	231,877	29,125	7,645	115,252	484	90,216	87,529
Other.....	1,715	35,577	(1)	(1)	(1)	(1)	6,848	(1)	(1)	(1)	31	4,633	4,564

NOTE: Detail may not add to total because of rounding. Data in columns 22 - 24 are unweighted.
 1 Estimate is not shown separately because of high sampling variability.

STATE

Table 31.—ALL TOP WEALTHHOLDERS

[Number of top wealthholders, type of asset, information items, and estate tax return statistics]

State or residence	Number of top wealthholders	Total assets (Thousand dollars)	Debts		Net worth (Thousand dollars)	Men		Women		Type of asset					
			Number of top wealthholders	Amount (Thousand dollars)		Number of top wealthholders	Net worth (Thousand dollars)	Number of top wealthholders	Net worth (Thousand dollars)	Real estate		Bonds		Corporate stock	
										Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	
Total.....	4,132,207	751,974,453	3,654,689	82,711,864	669,262,592	2,538,643	377,381,976	1,593,564	291,880,616	3,443,739	188,034,656	2,021,035	47,940,293	3,282,693	325,813,740
Alabama.....	31,452	5,030,149	28,997	898,524	4,131,625	21,305	2,698,471	10,147	1,433,154	29,006	1,842,892	13,718	365,165	22,867	1,344,077
Alaska.....	1,140	212,225	1,135	5,770	206,455	1,063	188,997	(1)	(1)	1,055	113,043	(1)	(1)	898	43,394
Arizona.....	31,367	17,702,045	28,674	2,265,922	15,436,123	17,210	11,804,536	14,157	3,631,587	27,327	2,281,906	14,245	431,785	25,920	12,698,851
Arkansas.....	23,794	3,865,220	21,953	480,555	3,384,666	18,316	2,244,115	5,478	1,140,551	21,932	1,364,446	10,654	199,512	18,453	1,067,109
California.....	477,934	97,932,557	435,806	13,354,704	84,577,853	231,240	37,018,972	246,694	47,558,881	415,081	31,282,638	190,526	4,633,412	366,831	39,363,928
Colorado.....	54,422	8,380,266	49,110	1,029,427	7,350,840	35,769	3,717,773	18,653	3,633,067	49,626	2,835,830	20,412	364,207	38,189	2,683,720
Connecticut.....	79,826	15,426,647	74,345	1,118,925	14,307,722	48,000	7,562,015	31,826	6,745,707	63,921	3,024,061	44,967	1,303,535	70,613	8,166,861
Delaware.....	14,016	3,284,274	13,891	412,559	2,871,715	9,006	1,315,309	5,010	1,556,406	12,462	856,915	7,565	158,176	13,120	1,705,814
District of Columbia.....	21,166	4,422,889	18,940	341,253	4,081,634	9,920	2,395,504	11,246	1,686,130	14,114	794,739	11,158	248,002	18,403	2,039,933
Florida.....	153,053	28,006,614	129,762	3,500,984	24,505,629	95,572	15,198,557	57,481	9,307,072	130,999	8,190,761	59,041	1,276,734	120,813	11,280,980
Georgia.....	66,107	13,358,762	59,393	1,747,515	11,611,246	38,034	5,924,367	28,073	5,686,879	53,263	3,588,715	29,932	614,499	53,026	5,047,296
Hawaii.....	11,323	1,907,758	9,909	230,640	1,677,117	7,694	1,029,688	3,629	647,429	10,104	801,943	4,611	65,770	9,164	697,478
Idaho.....	11,595	1,809,368	11,248	225,119	1,584,251	5,426	799,249	6,169	785,002	10,540	599,062	4,618	44,780	9,955	675,389
Illinois.....	247,782	41,205,242	212,888	3,427,155	37,778,086	148,296	23,039,919	99,486	14,738,167	195,158	11,299,533	131,252	3,191,749	198,518	16,724,763
Indiana.....	84,737	12,936,681	76,025	993,918	11,942,762	60,904	7,750,555	25,833	4,192,207	76,879	3,480,570	38,792	843,544	63,744	5,451,035
Iowa.....	97,426	10,625,795	86,573	1,225,302	9,400,493	72,232	6,849,024	25,194	2,551,469	88,007	4,591,838	51,170	884,393	60,057	1,802,553
Kansas.....	62,533	8,753,520	45,889	813,319	7,940,201	43,417	5,433,162	19,116	2,507,039	57,997	3,395,871	36,522	455,500	49,814	2,156,396
Kentucky.....	40,496	6,070,119	39,063	663,767	5,406,351	25,302	3,309,137	15,194	2,097,214	37,265	1,742,923	22,560	589,775	31,075	2,156,030
Louisiana.....	42,758	7,031,993	39,695	833,516	6,198,477	24,354	3,062,384	18,404	3,136,093	39,668	2,598,158	21,364	663,509	36,630	1,762,125
Maine.....	17,323	3,674,435	16,468	318,081	3,356,354	9,630	1,832,731	7,693	1,523,623	14,374	450,726	9,771	628,232	16,244	1,823,685
Maryland.....	63,237	10,541,243	55,961	1,108,326	9,432,917	42,670	6,116,777	20,567	3,316,140	53,135	2,586,973	32,279	768,986	51,217	4,520,320
Massachusetts.....	115,680	21,466,588	108,282	2,092,525	19,374,062	70,485	11,264,340	45,195	8,109,722	86,023	3,782,053	54,885	1,559,198	100,827	11,053,202
Michigan.....	118,907	23,371,062	94,088	2,356,102	21,014,960	81,517	14,453,832	37,390	6,561,128	103,316	5,087,702	59,707	1,510,506	99,037	10,344,712
Minnesota.....	89,713	13,548,984	65,399	1,101,405	12,447,579	66,370	9,665,879	23,343	2,781,700	82,048	3,827,536	45,165	711,464	68,047	5,600,461
Mississippi.....	26,732	4,226,615	25,068	588,396	3,638,217	21,200	2,688,792	5,532	949,425	25,514	1,126,102	1,764	336,803	22,195	1,268,813
Missouri.....	69,935	13,389,217	61,852	1,147,633	12,241,583	46,802	8,203,581	23,133	4,038,002	60,674	2,917,887	37,124	1,042,486	53,745	6,280,161
Montana.....	20,952	2,309,553	18,310	205,676	2,103,877	14,135	1,317,472	6,817	786,405	19,117	860,541	9,544	151,046	15,883	499,829
Nebraska.....	45,140	6,048,599	37,702	625,648	5,422,913	32,569	3,897,954	12,571	1,524,959	42,843	2,602,637	24,537	497,859	30,521	1,162,728
Nevada.....	10,305	2,548,820	9,632	420,899	2,127,921	5,966	842,065	4,339	1,285,856	9,555	821,118	4,375	141,814	8,274	917,171
New Hampshire.....	11,751	2,797,773	10,425	271,994	2,525,780	7,871	1,949,915	3,880	575,865	8,591	353,443	5,411	324,483	10,469	1,262,677
New Jersey.....	183,998	28,937,971	160,610	2,633,564	26,304,408	115,494	16,242,122	68,504	10,062,286	141,266	6,020,209	99,581	1,935,094	149,761	13,294,774
New Mexico.....	14,874	1,866,383	13,782	558,083	1,308,302	7,375	851,181	7,499	456,491	14,173	677,905	9,544	59,453	12,044	567,618
New York.....	613,113	116,448,021	517,063	11,694,468	104,753,555	366,703	52,451,567	246,410	52,301,988	419,073	18,151,281	322,512	8,273,245	515,414	59,607,411
North Carolina.....	65,493	12,134,826	62,969	1,268,827	10,865,999	48,636	6,258,036	16,857	4,607,963	60,422	3,383,341	25,873	1,383,955	50,916	4,860,995
North Dakota.....	12,716	1,511,231	9,484	108,790	1,402,440	9,214	1,088,690	3,502	313,750	12,213	682,740	7,906	97,127	9,125	223,752
Ohio.....	186,089	33,937,606	170,380	4,411,215	29,526,392	110,405	15,670,686	75,684	13,855,706	152,588	7,155,494	98,225	2,514,727	153,564	14,904,100
Oklahoma.....	50,190	8,062,073	45,814	905,544	7,156,528	36,853	4,352,301	13,337	2,804,227	66,883	2,686,416	21,402	447,298	2,275,731	2,975,731
Oregon.....	42,627	6,636,354	39,406	890,018	5,746,335	29,077	3,838,075	13,550	1,908,260	37,758	2,122,778	18,814	263,947	30,355	1,829,259
Pennsylvania.....	220,402	45,329,360	200,763	3,748,253	41,581,108	144,896	23,985,823	75,506	17,595,823	181,673	7,447,815	129,253	1,371,258	186,895	24,803,226
Rhode Island.....	18,309	3,457,629	17,037	296,774	3,160,855	11,187	1,572,281	7,122	1,588,574	16,330	631,632	10,971	358,206	15,875	1,725,234
South Carolina.....	31,111	4,206,596	27,874	430,402	3,776,194	23,268	2,600,279	7,843	1,175,915	28,010	1,560,908	11,596	209,280	21,556	1,253,964
South Dakota.....	16,113	2,014,953	13,986	222,464	1,792,489	13,252	1,383,303	2,861	409,186	15,192	737,424	7,338	123,016	11,593	440,851
Tennessee.....	42,374	8,723,645	40,052	830,537	7,893,108	30,021	5,427,472	12,353	2,465,636	38,502	2,143,790	21,835	627,387	31,881	3,541,693
Texas.....	194,068	40,794,949	182,348	5,244,247	35,550,701	95,611	14,270,785	98,457	21,279,916	185,043	13,137,542	80,240	1,578,932	16,108,301	16,108,301
Utah.....	10,068	1,716,490	9,087	178,362	1,538,129	6,962	1,104,735	3,106	433,394	8,698	437,415	4,759	141,714	6,949	566,780
Vermont.....	8,026	1,041,372	7,050	96,112	945,259	5,368	541,828	2,658	403,431	7,386	213,151	4,222	55,172	6,036	510,799
Virginia.....	77,269	11,760,954	74,180	1,195,219	10,565,735	47,447	5,639,567	29,822	4,926,168	65,121	3,205,327	36,691	606,689	60,507	4,934,703
Washington.....	63,145	8,922,339	55,517	1,136,612	7,786,327	28,954	3,549,516	34,191	4,236,811	56,378	3,010,015	29,227	448,465	48,137	2,959,410
West Virginia.....	22,764	5,410,288	20,050	1,417,427	3,992,862	16,102	2,926,768	6,662	1,066,094	18,644	1,302,526	11,605	182,468	19,745	2,831,821
Wisconsin.....	97,673	12,260,304	83,949	1,201,344	11,058,961	66,572	7,373,094	31,101	3,685,867	86,982	3,203,927	56,105	710,797	72,660	4,525,908
Wyoming.....	9,027	2,220,169	8,604	329,120	1,891,049	6,942	1,482,688	2,085	408,361	8,787	690,964	3,895	52,957	6,606	858,874
Other areas ²	10,172	2,695,367	8,178	108,922	2,586,446	6,038	1,196,015	4,134	1,390,431	3,021	119,494	4,345	131,687	8,681	1,587,546

Footnotes at end of table.

STATE

Table 31.—ALL TOP WEALTHHOLDERS—Continued

(Number of top wealthholders, type of asset, information items, and estate tax return statistics)

State or residence	Type of asset—Continued							Information items		Estate tax return statistics			
	Cash		Notes and mortgages		Life insurance equity		Other assets (Thousand dollars)	Life insurance face value (Thousand dollars)	Jointly owned property		Number of returns	Gross estate (Thousand dollars)	Net worth (Thousand dollars)
	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)	Number of top wealthholders	Amount (Thousand dollars)			Number of top wealthholders	Amount (Thousand dollars)			
(16)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)	
Total.....	3,954,846	70,669,443	1,278,918	30,413,041	2,950,289	15,568,396	73,534,876	95,552,607	2,545,110	109,726,570	78,393	17,007,239	15,548,462
Alabama.....	29,232	400,888	9,640	286,484	25,850	171,474	619,167	1,105,063	14,372	460,870	537	125,775	110,477
Alaska.....	1,140	11,992	732	15,854	1,055	1,949	25,501	12,093	(1)	(1)	15	2,095	1,960
Arizona.....	29,900	571,403	18,208	622,232	17,050	59,393	1,036,475	350,549	16,400	647,671	458	124,326	110,643
Arkansas.....	22,983	409,778	10,689	181,893	16,867	94,545	547,938	632,698	13,380	581,753	391	73,376	64,489
California.....	462,657	8,675,257	198,388	5,093,482	295,379	1,020,868	7,862,967	6,937,883	275,453	11,508,883	8,646	1,946,469	1,800,537
Colorado.....	51,050	788,540	22,868	631,808	38,847	181,373	894,787	1,231,403	41,393	2,120,660	898	187,377	171,090
Connecticut.....	78,085	1,299,002	15,399	264,429	52,803	369,373	989,385	2,221,521	52,786	1,644,364	1,597	462,045	429,640
Delaware.....	13,678	220,420	3,548	107,944	11,167	82,322	152,682	508,541	9,980	827,995	203	100,545	94,628
District of Columbia.....	21,017	520,555	7,074	223,028	11,395	62,602	534,031	218,032	12,447	687,497	526	132,589	124,242
Florida.....	146,713	2,460,313	56,684	1,696,224	103,594	545,133	2,556,467	2,913,996	110,452	6,912,004	3,070	662,140	602,212
Georgia.....	62,024	937,839	21,724	537,822	53,492	460,699	2,171,892	3,328,289	14,547	258,808	939	214,933	183,985
Hawaii.....	10,994	137,262	2,190	29,983	8,296	35,886	139,436	273,017	9,268	567,435	156	39,527	35,334
Idaho.....	11,384	139,837	4,099	88,004	6,903	20,256	242,039	100,291	1,013	35,088	205	31,106	26,864
Illinois.....	236,412	4,286,730	58,091	1,277,589	175,039	952,201	3,473,373	5,287,571	184,923	9,732,301	5,564	1,166,776	1,077,426
Indiana.....	81,502	1,371,823	21,774	348,136	65,189	358,329	1,082,545	2,387,992	64,627	3,051,797	1,854	302,561	300,574
Iowa.....	95,026	956,800	37,454	581,859	69,523	265,611	1,542,743	1,655,356	68,647	2,167,754	2,344	301,232	276,660
Kansas.....	58,811	738,500	18,723	325,437	42,775	206,276	1,475,538	1,450,821	47,177	1,821,493	1,438	231,876	214,939
Kentucky.....	39,429	513,208	10,424	220,464	27,990	133,073	714,647	750,642	25,956	904,506	847	172,380	159,844
Louisiana.....	40,777	623,667	19,232	480,354	34,294	110,560	793,621	661,324	3,605	86,728	610	142,526	128,937
Maine.....	16,929	239,744	4,180	161,144	11,827	69,966	301,208	375,561	11,558	218,231	445	107,005	99,365
Maryland.....	61,768	1,067,865	17,307	316,263	47,273	303,380	977,455	1,856,209	51,487	2,885,725	1,258	278,854	255,233
Massachusetts.....	105,627	2,516,983	19,351	455,957	74,810	551,538	1,547,657	3,293,657	79,858	3,568,543	2,454	554,689	506,616
Michigan.....	113,637	2,132,250	42,182	1,057,027	89,985	592,626	2,646,235	3,415,318	90,057	5,639,421	2,230	498,255	452,608
Minnesota.....	81,312	1,591,272	31,270	542,790	71,199	365,022	910,437	2,349,934	70,210	2,999,912	1,767	315,021	290,467
Mississippi.....	25,014	334,468	9,483	198,709	22,534	127,757	833,964	942,079	8,255	192,024	390	75,280	64,185
Missouri.....	65,212	1,042,185	21,563	673,973	54,639	322,159	1,110,367	1,841,535	50,126	2,904,879	1,647	414,224	387,524
Montana.....	20,034	239,767	7,961	194,099	12,454	45,424	318,843	355,564	17,516	592,241	408	54,789	51,480
Nebraska.....	43,204	452,297	11,557	180,496	30,282	129,895	1,022,647	803,893	35,819	1,602,577	1,127	170,745	157,590
Nevada.....	9,885	215,269	5,099	194,261	7,271	11,840	247,345	4,334	4,334	381,421	128	37,759	34,403
New Hampshire.....	11,666	511,506	3,479	125,777	8,304	48,003	171,887	247,921	7,587	395,727	315	59,980	55,452
New Jersey.....	180,079	3,193,172	39,468	1,225,295	140,185	835,699	2,434,231	5,456,398	117,553	4,951,658	3,411	724,835	663,835
New Mexico.....	11,604	169,036	5,138	89,070	11,170	41,880	261,422	382,905	3,112	72,906	185	34,800	30,216
New York.....	586,433	12,421,472	133,257	2,982,778	427,070	2,472,840	12,538,994	14,273,859	390,989	14,640,395	10,395	2,636,769	2,394,782
North Carolina.....	62,908	806,085	20,635	358,821	52,473	280,160	861,470	1,857,445	39,866	1,668,338	1,138	244,502	219,908
North Dakota.....	12,411	205,946	4,067	48,851	9,101	31,328	221,487	191,951	10,177	371,387	280	34,931	32,247
Ohio.....	175,773	3,492,982	50,135	2,211,911	131,355	783,194	2,875,198	4,541,125	112,955	2,178,035	3,922	853,122	780,949
Oklahoma.....	48,072	1,008,132	15,124	274,026	36,572	231,253	1,139,219	1,491,582	31,011	1,197,794	933	175,214	155,826
Oregon.....	41,074	735,980	16,752	438,535	30,921	170,323	1,075,530	1,257,193	31,807	1,693,405	732	131,437	118,236
Pennsylvania.....	213,782	3,681,526	50,430	838,173	167,416	1,063,038	3,764,319	5,976,566	162,074	8,518,680	4,615	1,078,816	988,104
Rhode Island.....	17,194	333,326	4,380	60,035	12,434	76,421	272,777	463,798	12,112	522,501	381	96,316	89,342
South Carolina.....	29,221	420,450	11,953	176,341	25,726	117,623	468,028	722,119	11,799	146,966	525	98,328	88,546
South Dakota.....	14,216	153,435	5,918	96,682	11,112	45,684	418,061	306,994	12,016	466,427	50	50,811	46,772
Tennessee.....	41,378	778,562	16,715	587,505	33,941	240,382	804,322	1,543,273	23,461	830,043	786	210,865	187,661
Texas.....	189,025	3,447,779	85,737	1,845,779	142,473	437,292	4,239,804	3,001,120	10,737	169,618	2,927	617,412	559,530
Utah.....	7,349	290,298	2,755	94,667	8,056	37,803	147,814	234,781	8,738	671,449	202	39,555	36,254
Vermont.....	7,528	124,367	1,726	26,458	5,547	24,812	86,613	162,124	6,034	231,008	175	31,148	29,091
Virginia.....	73,791	953,526	27,877	477,223	60,389	305,840	1,277,647	1,867,278	45,560	1,506,387	1,272	257,518	232,393
Washington.....	60,539	884,295	28,645	441,115	48,972	139,398	1,040,243	904,867	20,248	296,681	1,052	184,718	169,686
West Virginia.....	21,741	226,020	7,347	238,121	19,282	97,920	531,410	687,528	14,394	411,277	392	86,577	79,061
Wisconsin.....	95,156	1,563,771	35,636	658,047	74,489	377,051	1,220,803	2,234,906	74,498	3,089,959	1,918	320,437	294,580
Wyoming.....	8,744	202,684	3,260	103,296	6,602	23,948	287,447	160,628	7,373	438,308	155	38,344	34,376
Other areas ²	9,735	169,656	1,600	26,789	6,922	35,443	624,750	253,469	4,739	151,519	153	50,531	47,663

NOTE: Detail may not add to total because of rounding. Data in columns 26 - 28 are unweighted.

¹ Estimate is not shown separately because of high sampling variability.

² U. S. citizens domiciled abroad. Persons who acquired U. S. citizenship solely by virtue of being a citizen of Puerto Rico or the Virgin Islands are not included.

Historical statistics

Selected statistics on top wealthholders for 1953 and 1958 are included in this section for purposes of comparison with the estimates for 1962. Table D shows that from 1953 to 1962 the number and wealth of top wealthholders has more than doubled: from 2 million top wealthholders with net worth of \$324 billion; to 4 million top wealthholders with net worth of \$669 billion. However, despite these dramatic increases in the overall aggregates, changes in asset composition have been very gradual.

Table D.--HISTORICAL STATISTICS 1953-1962

Item	1953	1958	1962
(Thousands)			
Number of top wealthholders, total.....	1,979	3,009	4,132
Men, total.....	1,330	1,936	2,539
Under 50 years.....	491	741	988
50 to 69 years.....	648	923	1,173
70 years or more.....	151	232	332
Age unknown.....	40	40	46
Women, total.....	648	1,073	1,594
Under 50 years.....	197	299	471
50 to 69 years.....	306	530	758
70 years or more.....	120	209	324
Age unknown.....	25	35	41
(Billion dollars)			
Total assets.....	355.9	542.0	752.0
Real estate.....	81.8	132.6	188.0
Bonds.....	35.6	35.6	47.9
Corporate stock.....	140.9	231.1	325.8
Cash.....	33.8	45.9	70.7
Notes and mortgages.....	12.5	20.5	30.4
Insurance equity.....	7.1	10.8	15.6
Other assets.....	44.2	65.5	73.5
Debts.....	31.8	49.6	82.7
Net worth (less deficit).....	324.1	492.4	669.3

NOTE: Detail may not add to totals because of rounding. Estimates of estate tax wealth for 1953 and 1958 were computed using white mortality rates in those years adjusted by the differentials shown in column 3 of table F. Except for differences in white mortality rates, the method was the same as that used in preparing the 1962 estimates.

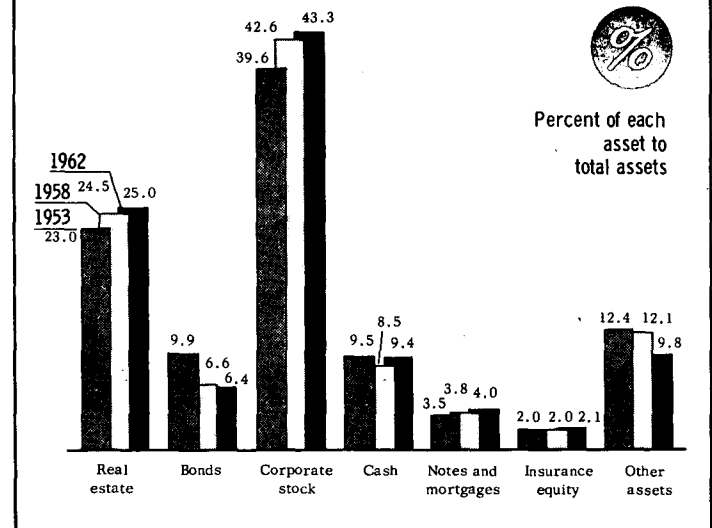
ASSET COMPOSITION

Chart 12 shows some shifting in the asset mix toward corporate stock and real estate and away from bonds. These changes may be due partly to changes in the relative prices of assets and not to real changes in preference. However, other explanations are possible. Top wealthholders have increased from about 2 percent of the adult population in 1953 to just less than 4 percent in 1962. The additional individuals included are relatively less rich and may have a somewhat different asset composition.

AGE, SEX, AND SIZE OF WEALTH

The distribution of top wealthholders by sex has shown a marked change. Women have become a larger proportion of top wealthholders. In 1953, just less than one-third of all top wealthholders were women, while in 1962 they were about 40 percent of the total. The age distri-

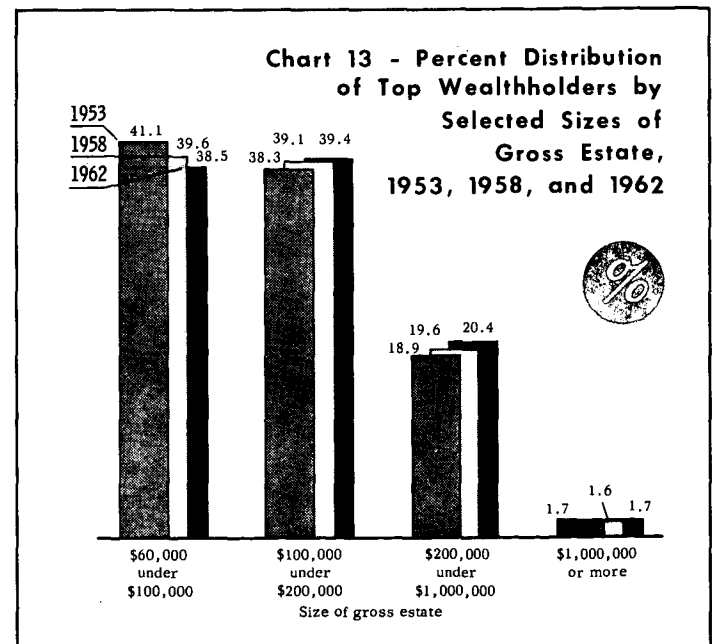
Chart 12 - Asset Composition, 1953, 1958, and 1962



bution has remained about the same with a slight increase in the older age groups, an increase more or less in line with the pattern for the adult population as a whole.

Similar to the distribution of top wealthholders by age, there has been little change in the distribution by size of gross estate. Chart 13 shows only a slight shift toward the middle ranges of wealth. In fact there was almost no change in the proportion of top wealthholders with a gross estate of \$1,000,000 or more. Table 32 which presents estimates for 1958 can be used with table 28 for 1962 to

Chart 13 - Percent Distribution of Top Wealthholders by Selected Sizes of Gross Estate, 1953, 1958, and 1962



get a more detailed view of shifts in the distribution of top wealthholders by size of gross estate.

LAW CHANGES 1953-1962

The estimates for 1953 top wealthholders are based on returns filed under the 1939 Internal Revenue Code as amended. The 1958 and 1962 estimates are based principally on returns filed under the 1954 Code. While many changes were made in the structure of the estate tax law by the 1954 Code, only a few of these affected the assets includable in "estate tax wealth".

In general, under the 1939 Code all proceeds from insurance on the life of the decedent were included if he owned the policy or paid the premiums on it. Under the 1954 Code, if the insurance had been assigned irrevocably to a beneficiary other than the estate it was not included even though the decedent may have paid the premium. Annuities included in estate tax wealth were also modified as is discussed on page 75. The estate tax law was further amended in 1962 to include foreign real estate but this provision has not had time to take much effect. None of these changes are believed to substantially alter the comparability of the statistics.

Table 32.—NUMBER AND WEALTH OF TOP WEALTHHOLDERS BY SIZE OF GROSS ESTATE, 1958--TOTAL, MALE, AND FEMALE

[Number of top wealthholders, type of asset, and estate tax return statistics]

Gross estate	Number of top wealthholders	Total assets (Thousand dollars)	Debts (Thousand dollars)	Net worth (Thousand dollars)	Type of asset								Life insurance face value (Thousand dollars)	Estate tax return statistics		
					Real estate (Thousand dollars)	Bonds (Thousand dollars)	Corporate stock (Thousand dollars)	Cash (Thousand dollars)	Notes and mortgages (Thousand dollars)	Life insurance equity (Thousand dollars)	Other assets (Thousand dollars)	Number of returns		Gross estate (Thousand dollars)	Net worth (Thousand dollars)	
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	
GRAND TOTAL																
Total.....	3,008,659	541,998,282	49,590,622	492,407,636	132,626,270	35,661,786	231,080,130	45,913,255	20,478,367	10,768,635	65,469,839	60,452,934	55,673	11,647,390	10,638,361	
\$60,000 under \$70,000.....	317,137	18,890,180	1,416,643	17,473,538	7,247,092	1,116,139	4,135,635	2,924,637	697,971	404,486	2,364,220	2,193,946	6,158	401,604	371,628	
\$70,000 under \$80,000.....	351,401	23,368,647	1,922,157	21,446,490	8,990,990	1,267,003	5,321,994	3,204,926	926,384	583,850	3,073,500	3,540,888	6,301	471,780	431,772	
\$80,000 under \$90,000.....	279,991	20,733,711	1,772,818	18,960,891	8,156,165	1,070,007	4,701,289	2,615,263	852,110	595,534	2,743,243	3,658,227	5,269	447,518	407,265	
\$90,000 under \$100,000.....	244,834	20,170,253	1,864,658	18,305,595	7,552,465	1,174,336	5,089,318	2,386,852	731,175	599,604	2,636,502	3,686,890	4,545	431,387	389,538	
\$100,000 under \$120,000.....	413,195	39,577,783	3,734,356	35,843,427	14,892,665	1,894,950	10,078,094	4,810,250	1,671,454	1,117,592	6,740,153	6,740,153	7,176	785,567	709,710	
\$120,000 under \$150,000.....	406,353	47,103,205	5,175,523	41,927,682	15,863,087	2,327,482	13,760,573	5,315,275	2,041,107	1,411,611	6,384,071	8,680,132	7,117	952,480	850,092	
\$150,000 under \$200,000.....	359,019	53,682,362	5,727,259	47,955,102	16,487,207	2,890,713	17,128,572	5,362,748	2,740,730	1,611,587	7,460,804	9,761,266	6,403	1,103,494	985,277	
\$200,000 under \$300,000.....	311,822	67,433,339	7,003,191	60,430,147	17,935,141	3,082,737	25,309,080	6,055,634	3,075,524	1,627,254	9,627,970	9,143,445	5,675	1,373,202	1,235,028	
\$300,000 under \$500,000.....	175,899	61,877,906	5,793,478	56,084,428	13,781,897	3,883,809	27,870,001	4,621,454	2,442,718	1,246,965	8,031,060	6,077,605	3,646	1,388,794	1,264,256	
\$500,000 under \$1,000,000.....	101,804	65,839,097	6,048,077	59,790,997	11,364,647	5,230,125	34,576,452	4,274,818	2,461,239	977,710	6,954,105	4,269,146	2,242	1,530,213	1,410,632	
\$1,000,000 under \$2,000,000.....	32,615	43,409,893	3,971,359	39,438,535	4,908,494	4,408,828	24,634,988	1,951,970	1,676,800	367,018	5,461,795	1,635,546	771	1,052,864	981,438	
\$2,000,000 under \$3,000,000.....	7,243	17,346,144	1,414,551	15,931,593	1,691,651	1,663,439	10,425,801	638,853	414,352	90,145	2,421,906	349,490	184	450,020	420,843	
\$3,000,000 under \$5,000,000.....	2,892	11,225,414	678,928	10,546,487	1,453,784	2,095,616	6,159,874	535,806	307,524	35,661	681,744	93,034	101	387,954	365,244	
\$5,000,000 under \$10,000,000.....	1,973	12,647,076	1,011,499	11,635,577	812,578	1,582,333	7,278,009	812,865	228,387	30,064	1,902,840	92,776	57	383,480	360,879	
\$10,000,000 or more.....	2,481	38,693,271	2,056,124	36,637,147	1,488,406	1,254,267	34,610,450	401,804	255,485	69,557	613,302	530,395	28	487,033	458,118	
MALE																
Total.....	1,936,031	315,189,838	37,028,608	278,161,229	86,254,622	18,199,133	115,200,788	27,351,690	13,869,745	9,897,140	44,416,720	55,733,596	36,458	7,733,357	6,866,122	
\$60,000 under \$70,000.....	174,458	9,754,346	962,402	8,791,944	3,972,480	538,277	1,629,913	1,297,562	374,033	354,637	1,587,444	1,999,843	3,555	232,057	207,834	
\$70,000 under \$80,000.....	208,920	12,936,274	1,458,398	11,477,876	5,193,195	634,066	2,423,046	1,645,875	483,418	522,270	2,034,404	3,244,355	3,812	285,607	252,277	
\$80,000 under \$90,000.....	173,614	11,937,821	1,290,902	10,646,918	4,917,459	560,159	2,191,152	1,433,030	514,344	541,399	1,780,279	3,370,892	3,369	286,254	252,307	
\$90,000 under \$100,000.....	158,019	12,170,683	1,380,352	10,790,332	4,741,759	630,905	2,504,370	1,390,419	443,724	548,253	1,911,253	3,381,586	2,972	282,177	245,980	
\$100,000 under \$120,000.....	272,741	24,626,449	2,893,285	21,733,164	9,808,724	1,088,171	5,244,755	2,743,135	965,588	1,027,644	3,748,432	6,197,218	4,769	522,267	454,099	
\$120,000 under \$150,000.....	281,732	30,902,938	4,258,687	26,644,251	11,039,592	1,419,761	7,752,977	3,235,352	1,251,851	1,317,066	4,886,339	8,119,497	4,810	644,206	554,077	
\$150,000 under \$200,000.....	251,568	35,355,830	4,478,703	30,877,126	11,131,952	1,766,347	10,195,453	3,464,678	1,888,702	1,523,499	5,385,199	9,382,872	4,431	763,434	658,128	
\$200,000 under \$300,000.....	209,592	43,364,598	5,405,410	37,959,188	12,139,032	2,099,916	15,118,972	3,919,412	2,158,312	1,521,610	6,407,344	8,605,382	3,957	957,171	834,563	
\$300,000 under \$500,000.....	115,786	39,485,360	4,370,769	35,114,591	8,999,281	2,105,149	17,083,353	2,940,132	1,138,132	1,146,010	5,373,303	5,471,054	2,537	966,277	856,424	
\$500,000 under \$1,000,000.....	63,426	40,157,638	4,720,350	35,437,287	8,140,363	2,695,613	19,541,123	2,635,495	1,820,505	889,836	4,434,703	3,935,260	1,515	1,031,240	926,519	
\$1,000,000 under \$2,000,000.....	19,395	25,354,010	3,017,911	22,336,099	3,173,926	2,258,331	14,220,819	1,281,733	1,275,546	336,233	2,807,422	1,503,264	495	674,909	615,042	
\$2,000,000 under \$3,000,000.....	3,769	8,879,999	1,299,968	7,580,031	1,380,256	720,677	4,082,264	277,692	385,745	84,814	1,948,551	316,236	124	301,459	274,595	
\$3,000,000 under \$5,000,000.....	1,318	5,257,888	258,182	4,999,706	675,546	756,702	2,953,705	308,958	229,079	28,427	305,471	62,104	54	210,033	198,764	
\$5,000,000 under \$10,000,000.....	1,315	8,531,449	907,415	7,624,033	684,949	669,929	4,635,064	667,667	223,687	26,703	1,623,448	79,884	38	256,674	237,120	
\$10,000,000 or more.....	378	6,474,555	325,873	6,148,681	256,109	255,131	5,623,822	110,550	17,077	28,739	183,127	64,148	20	319,592	298,393	
FEMALE																
Total.....	1,072,628	226,808,444	12,562,014	214,246,407	46,371,648	17,462,653	115,879,342	18,561,565	6,608,622	871,495	21,053,119	4,719,338	19,215	3,914,033	3,772,239	
\$60,000 under \$70,000.....	142,679	9,135,834	454,241	8,681,593	3,274,612	577,862	2,505,722	1,627,076	323,938	49,849	776,775	194,103	2,603	169,547	163,794	
\$70,000 under \$80,000.....	142,481	10,432,373	463,759	9,968,614	3,797,794	632,937	2,898,948	1,559,052	442,966	61,580	1,039,096	296,533	2,489	186,173	179,496	
\$80,000 under \$90,000.....	106,377	8,795,890	481,916	8,313,973	3,238,706	509,849	2,510,137	1,182,333	377,766	54,135	962,964	287,335	1,900	161,264	154,959	
\$90,000 under \$100,000.....	86,815	7,999,570	484,306	7,515,263	2,810,706	543,431	2,584,944	996,433	287,452	51,351	725,249	305,303	1,573	149,210	143,558	
\$100,000 under \$120,000.....	140,454	14,951,334	841,070	14,110,264	5,083,941	806,779	4,833,339	2,067,115	705,866	89,948	1,364,346	542,935	2,407	263,300	252,610	
\$120,000 under \$150,000.....	124,621	16,200,267	916,836	15,283,431	4,823,495	907,721	6,007,596	2,079,922	789,256	94,544	1,497,733	560,635	2,307	308,274	296,015	
\$150,000 under \$200,000.....	107,451	18,326,532	1,248,556	17,077,976	5,355,256	1,124,366	6,933,119	1,898,070	852,028	88,088	2,075,606	378,394	1,972	340,060	327,149	
\$200,000 under \$300,000.....	102,230	24,068,741	1,997,781	22,470,959	5,796,108	1,702,821	10,190,108	2,136,222	1,015,643	105,643	3,220,626	538,063	1,718	416,031	400,466	
\$300,000 under \$500,000.....	60,113	22,392,546	1,422,709	20,969,837	4,782,617	1,778,661	10,786,648	1,681,322	604,586	100,955	2,657,757	606,551	1,109	422,517	407,813	
\$500,000 under \$1,000,000.....	38,378	25,681,459	1,327,727	24,353,710	3,224,285	2,534,512	15,035,329	1,639,323	640,734	87,874	2,519,402	333,886	727	498,973	484,111	
\$1,000,000 under \$2,000,000.....	13,220	18,055,883	953,448	17,102,435	1,734,568	2,150,498	10,414,169	670,237	401,254	30,784	2,654,373	132,276	276	377,955	366,396	
\$2,000,000 under \$3,000,000.....	3,474	8,466,145	114,583	8,351,562	311,395	942,762	6,343,537	361,160	28,606	5,330	473,355	33,255	60	148,561	145,888	
\$3,000,000 under \$5,000,000.....	1,574	5,967,526	420,746	5,546,780	778,238	1,338,914	3,206,169	226,848	33,851	7,233	376,273	30,929	47	177,921	166,480	
\$5,000,000 under \$10,000,000.....	2,761	36,334,344	1,834,335	34,500,009	1,359,927	1,911,541	31,629,573	436,452	243,107	44,180	709,564	479,139	27	294,247	283,484	
\$10,000,000 or more.....																

NOTE: Detail may not add to total because of rounding. Data in columns 13 - 15 are unweighted.

A Estate multiplier technique

The use of the estate multiplier method of estimation assumes that "death draws a random sample of the living population". This assumption allows one to apply statistical theory to the result obtained by weighting estate tax return data by the inverse of the mortality rate characteristic of the demographic category to which the decedent belonged.

Death however is not a random event nor even one necessarily representative of the living population as a whole. The probability of "death's selection" of an individual depends on the particulars of his life state - his age and sex are usually taken as gross indicators of these conditions; however, other characteristics such as marital status, place of residence, and social class also play a role.¹

The estate multipliers used in making the present estimates have been adjusted to take account of only three characteristics - age, sex, and social class. The basic assumption made to prepare these estimates was that the probability of death for those with gross estates of \$60,000 or more (the estate tax filing floor) is approximately constant for each age and sex. Determining these "constants" and their inverses, the estate multipliers, is the subject of the rest of this section and the next one as well. However, before proceeding to a discussion of how these multipliers were devised something needs to be said about the validity of this assumption.

The method assumes that a top wealthholder with a net worth, for example, of \$100,000 has the same probability of being selected as a top wealthholder worth \$10,000,000 provided only that they are the same age and sex. If this is true, average holdings (or the percent distribution of holdings) computed from estate tax return data for each age and sex are unbiased estimates of the "true" averages in the living population of top wealthholders, *no matter what multipliers were chosen*. Two issues bear on this assumption.

The relationship between mortality and wealth is complex. Being wealthy, one presumably can obtain the best of care and therefore live longer than those who are not. While it is likely that a person worth \$10,000,000 would have resources available to provide a better way of life than an individual worth only \$100,000, such a gain in terms of mortality would probably be marginal. On the other hand in *becoming* wealthy the relationship between wealth and mortality may be reversed. Most of the male top wealthholders probably accumulated a great deal more of their wealth than they acquired through gift or inheritance. The relationship might be illustrated by the following example: A man inherits \$100,000 at age 21 and is able

through investments and additions to this wealth to double it every ten years. Even so to become a millionaire he would have to live to be more than 50 years old.

It seems reasonable that mortality and wealth may be related in such a way that mortality rates for each age and sex group are not constant, but vary somewhat depending on the wealth of the individual, with the result that the average asset holding for each age-sex group may understate the "true", underlying averages in the living population of top wealthholders.

SOCIAL CLASS AND MORTALITY

The chief problem that to date confronts all applications of the estate multiplier technique in the U. S. is the lack of exact mortality rates appropriate to the wealthy. As has been said before, there is much evidence to support the view that the rich do live longer. Whatever index of wealth is used - income, occupation, educational attainment, the holding of insurance assets, housing - all suggest a more favorable mortality structure for the wealthy. Only an approximation to this structure could be used to prepare the present estimates.

For the general population of the United States, annual mortality rates for age, color, and sex classifications are computed by the National Center for Health Statistics, Public Health Service, from its tabulations of registered deaths in conjunction with estimates of the population prepared by the Bureau of the Census. Mortality rates based on the more favorable experience of the wealthier segment of the population are not so readily available.

Occupation

Mortality rates by occupation for the United States have been published for 1890, 1900, 1930, and 1950. For 1950, the ratio of the mortality rates to the average rates, standardized for age, was tabulated for six occupational groups of men 20 to 64 years of age.² The ratios for white males in 1950 were as follows: Professional workers, 82%; technical, administrative and managerial workers, 84%; proprietors, clerical, sales and skilled workers, 96%; semiskilled workers, 97%; laborers, except farm and mine 120%; and agricultural workers, 83%.³ The favorable mortality of professional workers, 18% better than average, is accounted for in large measure by factors other than occupation and its hazards.

¹Division of Health Records Statistics, National Center for Health Statistics, *Life Tables for the Geographic Divisions of the United States: 1959-61* (Public Health Service Publication No. 1252, 1-3.) For death rates by marital status in 1962 and 1963, see the *Monthly Vital Statistics Report*, July 31, 1964, p. 24. See also Louis I. Dublin, Alfred J. Lotka, and Mortimer Spiegelman, *Length of Life: A Study of the Life Table* (New York: The Ronald Press, 1949).

²I. M. Moriyama and L. Guralnick, "Occupational and Social Class Differences in Mortality," *Trends and Differentials in Mortality*, 1955 Annual Conference, Milbank Memorial Fund, pp. 61-73. More extensive tabulations were also published in "Mortality by Occupation and Industry among men 20 to 64 years of age: United States, 1950," National Vital Statistics Division, *Vital Statistics - Special Reports*, 53, No. 2, September 1962.

³Computed from unpublished data underlying the Moriyama and Guralnick Study, cited by Arthur Pedoe, "Occupation, Social Class and Mortality," *Transactions of the Society of Actuaries*, May, 1960, p. 235.

While obviously male top wealthholders are not all members of a profession, their mortality may be typified by that of professional workers. However, classification problems discussed below limit occupational data particularly for the older age groups.

Classifications of mortality by occupation suffer three inconsistencies: (1) Differences between the reporting of occupation in the Census and on death certificates, (2) the treatment of retired persons and (3) mobility between occupational groups. The first affects the overall accuracy of the match of Census records and death certificates; the second becomes a serious problem in the older age groups, particularly after 54 years; and the third may cause much of the overlap in mortality rates after age 44 between professional, technical, administrative, skilled, and semiskilled workers, etc.⁴

The age-specific differences in the mortality of professional workers, hereafter called differentials, are probably affected by these problems of classification. The differentials for all professional workers - white and nonwhite, using the average for all occupations as a standard, were: ages 20 to 24 years, 49%; 25 to 34 years, 53%; 35 to 44 years, 66%; 45 to 54 years, 87%; 55 to 59 years, 94%; and 60 to 64 years, 97%. The extremely favorable mortality exhibited in age groups 20 to 44 is probably a rather direct reflection of the socio-economic advantage typical of those who enter the professions.⁵ While mortality differentials tend to narrow as age increases, the jump that occurs between the 35-44 year age group and the 45-54 year age group is probably due in part to an accelerator effect introduced by problems of classification.⁶

Housing, Income and Education

Studies of mortality rates have also been conducted, using the cost of housing as an index, which confirm the direction, if not the magnitude, of the relationship between "social class" and mortality.⁷ For Chicago in 1940, the mortality of white males whose housing was within the top fifth of Chicago's rental units (actual or imputed) was compared with that of the general white male population. The differentials were as follows: ages 20 to 29 years, 76%; 30 to 39 years, 66%; 40 to 54 years, 77%; 55 to 64 years, 87%; 65 to 74 years, 88%; 75 years or more, 99%.⁸ In the younger ages the mortality experience exhibited was not as favorable as that for professional workers, perhaps because a much larger portion of the population had been included, 20% versus about 4% for professional

workers. As with the occupational mortality data, with increasing age the position of the top group tended to approach the average; however, this was much more gradual than for professional workers. Again this difference may be due to classification problems inherent in occupational studies of mortality.

The most recent and most inclusive study of mortality differentials by social class are those for 1960, using both income and education as indices. Only preliminary estimates are currently available. While not yet reliable enough to deal with in detail, they also confirm a very strong relationship between mortality and social class.⁹

Insurance

Another indication of the relationship between social class and mortality may be inferred from data provided by the Metropolitan Life Insurance Company which has available the age-specific mortality of its predominantly male "Whole Life" policyholders insured for amounts of \$5,000 or more, omitting the first five years of experience after application to minimize the effect of medical selection. All recent estate multiplier estimates for the United States, including the present one, have also used this series, albeit in somewhat different ways, to measure the magnitude of the favorable mortality experience of the wealthy.

For his 1944 wealth estimates based on Federal estate tax returns, Horst Mendershausen used the series provided by Metropolitan Life for that year in much the same way as in the present report. However, since the 1944 tabulations made available to him by the Internal Revenue Service did not include separate data by sex, he was obliged to make an assumption which was probably incorrect, namely that top wealthholders had "the same relation of male to female mortality and the same sex ratio as in the white population of the United States."¹⁰ In 1953, 1958, and 1962 for each estate tax return for a woman there were two for men; in the U. S. white population the sex ratio of deaths was more nearly 1 to 1.¹¹ For this reason, Mendershausen may have overestimated the wealth of top wealthholders in 1944.

For 1953, Robert J. Lampman based his estimates on a composite of several series, including that provided by Metropolitan Life. In essence his technique involved the averaging of (1) the mortality experience of professional, technical, administrative and managerial workers for 1950, (2) 1953 white male mortality and (3) a synthetic series made by averaging the 1953 Metropolitan Life experience with that for male Ordinary life insurance policyholders (1950-1954).¹² For age groups up to 64 years he averaged the occupational and insurance data. For age groups 65 or older he averaged the white

⁴Moriyama and Guralnick, pp. 61-73. See also "The Comparability of Reports on Occupation from Vital Records and the 1950 Census," National Vital Statistics Division, *Vital Statistics - Special Reports*, 53, No. 1, June 1961.

⁵*Ibid.*, p. 69.

⁶Another explanation is also possible. The more favorable mortality at the younger ages may be due to better medical care which brings more impaired lives to the older ages. See *Transactions of the Society of Actuaries*, 17, part 1, p. 432 (1965).

⁷See for example Constantine A. Yeracaris, "Differential Mortality, General and Cause-Specific in Buffalo, 1939-1941," *Journal of the American Statistical Association*, December, 1955.

⁸Albert J. Mayer, "Differentials in Lengths of Life, City of Chicago: 1880-1940" (unpublished Ph.D. dissertation; University of Chicago) as cited by Horst Mendershausen, "The Pattern of Estate Tax Wealth," *A Study of Saving in the United States* (Princeton: Princeton University Press, 1956), III, p. 303.

⁹Evelyn M. Kitagawa and Philip M. Hauser, "Social and Economic Differentials in Mortality, United States, 1960," a paper presented at the Annual Meeting, Population Association of America, New York, April 29-30, 1966.

¹⁰Mendershausen, p. 301.

¹¹National Vital Statistics Division, Public Health Service, *Vital Statistics of the United States: 1962* (Washington: U.S. Government Printing Office, 1964), II-A, p. 1-38.

¹²The ultimate (unloaded) mortality experience underlying the 1958 CSO mortality table based on the experience of 15 large insurance companies between 1950 and 1954 policy anniversaries. (See footnote 17 of this section.)

mortality and insurance experiences. For women, the differences by age between the adjusted male mortality rates and all white males - the male mortality differentials - were applied to mortality rates for all white females.¹³

Lampman writes that he wanted to "bracket the possible range"; not so much to choose mortality rates appropriate to top wealthholders as mortality rates which excluded the poorer elements of the population.¹⁴ The effect of his multiple averaging was to achieve just this; however, it seems probable that the method leads to an understatement of the number and wealth of top wealthholders, for mortality appears to continue to improve as wealth increases - a large part of the gains, of course, occurring at the lower levels.

Table E shows the estimates obtained using the 1962 white mortality rates without adjustment and after applying the differentials computed by Lampman. While the absolute differences in the overall aggregates are great there are no appreciable differences in either the composition of wealth, nor, does it appear on other evidence, in the age-sex make-up of top wealthholders.

Table E.—ALTERNATIVE ESTIMATES FOR 1962

Item	Type of mortality assumed for top wealthholders		
	Mortality of Metropolitan Life insurance policyholders	Composite of mortality from insurance and occupation series	Unadjusted white mortality
	(1)	(2)	(3)
	(Thousands)		
Number of top wealthholders.....	4,132	3,482	2,976
	(Billion dollars)		
Total assets.....	752.0	630.1	544.9
Real estate.....	188.0	156.9	134.3
Bonds.....	47.9	40.7	36.1
Corporate stock.....	325.8	273.2	236.6
Cash.....	70.7	60.0	52.6
Notes and mortgages.....	30.4	25.3	22.1
Insurance equity.....	15.6	13.0	11.3
Other assets.....	73.5	61.0	51.9
Debts.....	82.7	69.0	56.9
Net worth (less deficit).....	669.3	561.1	488.0

NOTE: Detail may not add to total because of rounding. Data were estimated as explained in the text.

MORTALITY OF TOP WEALTHHOLDERS IN 1962

The mortality rates assumed to approximate the experience of male top wealthholders were those provided by Metropolitan Life. For female top wealthholders the differences by age between male insurance holders and all white males were applied to mortality rates for all white females. The adjusted rates, inverted, were used as the estate multipliers in producing the present estimates.

Adopting this approximation for devising the estate multipliers is equivalent to assuming that Metropolitan policyholders constitute a random sample of top wealthholders, or at least a sample taken from a population which has the same relative advantage with respect to mortality that is expected of top wealthholders. In examining this assumption the following questions may be

raised: (1) Does the choice of insurance as an index of wealth create a "health" bias? (2) Is the requirement that the size of the policy be at least \$5,000 too high a cut-off or too low? (3) Are there sex differences with respect to the more favorable mortality exhibited; or, put another way, does the fact that the Metropolitan experience is based on men bias the estimates for women? (4) Are Metropolitan policyholders somewhat unique - geographically for example?

From the limited information available that sheds light on these questions, it does seem that there probably is some upward bias introduced by using insurance as an index; a downward bias introduced by choosing \$5,000 as a cut-off and by assuming that the mortality rates of males and females respond to the same extent to economic class differences. These biases however are probably small, off-setting or both. The geographical concentration of Metropolitan Life's policyholders in the northeastern part of the U. S. creates no real problem, in fact it more or less duplicates the concentration of top wealthholders.

Health

The mortality rates provided by Metropolitan Life were based only on policyholders who had been insured for at least 5 years. (The mortality experience for the first 5 years was considerably more favorable than these rates for the same attained ages.) However, since selection into the \$5,000 "Whole Life" category was somewhat stricter than that for other categories of policyholders, 5 year's time could not be expected to eliminate entirely the initial health advantage. In attained age groups over 40 the policyholders had generally been insured for considerably longer than 5 years. Because this was not likely the case for those under 40, where the policyholders had been insured for an average closer to 5 years,¹⁵ the Metropolitan data for that group were not used. (See page 67.)

The effect of the initial medical selection still exists for those 40 years of age or older, but it is probably not serious. About 87% of the male top wealthholders owned life insurance. While no doubt some of this insurance was issued without a medical examination, the health differences between Metropolitan Life's policyholders and male top wealthholders cannot be very great.

Size of Insurance

The holding of whole life insurance in amounts of \$5,000 or more may not be a sufficiently discriminating indicator of wealth; it is certainly no longer a very exclusive category. About 56 percent of the Ordinary life insurance policies purchased in 1963 were for \$5,000 or more.¹⁶

Data from the Institute of Life Insurance's 1965 *Study of Savings in Life Insurance* indicate that, particularly for those under 60 years of age, the typical policy held by male top wealthholders is for \$5,000 or more. In this report the mean face amount of insurance shown in the estate tax returns of men ranges from a high of more

¹³Robert J. Lampman, *The Share of Top Wealth-Holders in National Wealth: 1922-56* (Princeton: Princeton University Press, 1962), pp. 44-53.

¹⁴*Ibid.*, p. 46.

¹⁵The help of Mortimer Spiegelman, Statistician, Metropolitan Life Insurance Company, is greatly appreciated both here and elsewhere in the discussion of Metropolitan Life's series.

¹⁶Institute of Life Insurance, *Life Insurance Fact Book*, (1964), p. 20.

than \$60,000 for those under 40 years to about \$13,000 for those 85 years or more. Still another indication that perhaps a higher cut-off would have been better is the close correspondence between the basic data underlying the 1958 Commissioner's Standard Ordinary Mortality table and Metropolitan Life's series after age 40.¹⁷ While the Metropolitan Life series reflects a somewhat more favorable mortality experience, the difference is not appreciable.

Female Mortality

The assumption has been made that, except for large initial differences which favor women, male and female mortality respond to the same extent to social class differences of the kind that exist between top wealthholders and the general population.

Women do respond more favorably than men with respect to socio-economic differences measured by differences in mortality between whites and nonwhites. The 1962 white female age-adjusted rate is 62% of the corresponding nonwhite rate; the white male rate 75% of the rate for nonwhite males.¹⁸

Historically, in response to general improvements in American life, female mortality has decreased faster than that for males. For example, from 1933 to 1962 the white female mortality rate, adjusted for age, dropped from 81% to 60% of the comparable white male rate.¹⁹ However, even at moderate levels of educational attainment or income, the effect of social class on mortality is considerably more ambiguous. Male and female mortality may decrease in a very similar way.²⁰ In any case the treat-

ment of female top wealthholders suffers from more uncertainty than that for males.

Regional Mortality

Although Metropolitan Life's policyholders are located throughout the United States and Canada, there is a large concentration in the northeastern part of the U. S. This concentration more or less corresponds to that for top wealthholders and probably creates no problem of bias. However, the question of regional differences in mortality rates is important for another reason. For the basic estimates in this report only national mortality rates were used. In table 31 where wealth estimates are made by State, under or overstatements may exist, especially for States with mortality rates quite different from the national average.

Overall Mortality

Top wealthholders constitute a very small proportion of the adult population, about 4% in 1962. To be a member of this select group is almost by definition to possess the best the economy has to offer in the way of material advantages. More important perhaps in estimating the mortality experience of this group is the fact that, for many members, their good health was essential to the accumulation of their wealth.

The overall mortality differentials assumed for top wealthholders in making the present estimates are quite favorable, perhaps more favorable than can be justified. For male top wealthholders the age-adjusted mortality differential was 71%, for females, 73%.

For men, the differential is lower than that obtained by comparing white male mortality with that for nonwhite males (75%). This seems unreasonable and may be taken as an indication that the estimates for male top wealthholders are too high. However since good health is much more important for male top wealthholders, many more of whom accumulate rather than inherit their wealth, the magnitude of the overstatement in the present estimates may not even be as great as this comparison implies.

On the other hand the overall differential for women, using the same test, does not seem unreasonable, in fact preliminary estimates of 1960 female mortality using education as an index suggest that the overall differential may be about right.²¹

²¹*ibid.*

¹⁷The 1958 CSO basic mortality table was increased by 5% to obtain male mortality experience and compared with the 1953 mortality experience of Metropolitan Life's "\$5,000 Whole Life" policyholders. See the *Transactions of the Society of Actuaries, October, 1958 Annual Meeting* (published in 1959), pp. 692, 695. For same statistics on the mortality experience on insurance policies for large amounts (cross-classified according to income "for a limited volume of data") see pp. 59, 68-69, "Mortality on Policies for Large Amounts," *Transactions of the Society of Actuaries: 1964 Reports of Mortality and Morbidity Experience*, June, 1965.

¹⁸National Vital Statistics Division, *Vital Statistics of the United States: 1962*, II-A. Computed from p. 1-4.

¹⁹*ibid.*

²⁰Kitagawa and Hauser, table 4. For the effect of social class differences between males and females in England, see Arthur Pedoe, "Occupation, Social Class and Mortality," *Transactions of the Society of Actuaries*, May, 1960, pp. 227-257.

B

Estate multipliers for 1962

The estate multipliers shown in table F, were devised by taking the inverse of the white mortality rates adjusted by differentials assumed to correct for the more favorable mortality experience of the wealthy. These differentials were based on the difference between white male mortality and the mortality of Metropolitan Life's predominantly male "Whole Life" policyholders.

The mortality rates obtained from the Metropolitan Life Insurance Company were computed by relating dollar amounts of policies due as death claims to insurance in force. Differences between mortality rates based on amounts of insurance, number of policies or number of lives are probably not significant. The only important effect of using amounts of insurance rather than lives is to increase the variability of the mortality rates.

Table F.—1962 WHITE MORTALITY RATES, WEALTH DIFFERENTIAL, AND ESTATE MULTIPLIERS

Attained age at death in years	White mortality rates (Deaths per thousand estimated midyear population)		Wealth differentials (Percent)	Estate multipliers	
	Male	Female		Male	Female
	(1)	(2)	(3)	(4)	(5)
20-39.....	1.9	1.0	69.29	759.6	1,492.5
40-44.....	4.1	2.3	72.35	337.1	600.9
45-49.....	6.9	3.7	66.69	217.3	405.3
50-54.....	11.5	5.6	68.55	126.8	260.5
55-59.....	17.7	8.1	66.93	84.4	184.8
60-64.....	26.7	12.9	75.77	49.4	102.3
65-69.....	41.2	21.1	72.27	33.6	65.6
70-74.....	57.5	34.4	88.78	19.6	32.7
75-79.....	85.0	58.2	87.46	13.5	19.6
80-84.....	130.5	101.8	85.23	9.0	11.5
85 or more.....	224.5	200.4	88.18	5.1	5.7
Age unknown.....	-	-	-	51.9	55.4

Source: 1962 white mortality rates, table 1-4, p. 1-6, *Vital Statistics of the United States 1962*, Vol. II (Mortality), Part A. Wealth differentials and weights derived from data provided by the Metropolitan Life Insurance Company as explained in the text.

To dampen this variability, age-specific differentials were constructed for both 1958 and 1962 using Metropolitan Life's mortality rates and white male rates for those years. The average of these differentials, shown as column 3 of table F, was then used to adjust the 1962 white mortality rates.¹ This procedure provided more reliable estimates of the estate multipliers for each age group than would have been obtained by using only the 1962 Metropolitan experience. However, had the 1962 experience been used alone, little difference would have resulted in the overall aggregates. An indication of this can be seen by looking at the 1962 estimates that resulted when the age-specific differentials for 1953, 1958 and 1962 were used.²

¹The differentials were weighted by white male population estimates for 1958 and 1962. Bureau of the Census, *Current Population Reports: Population Estimates*, Series P-25, No. 265, May 21, 1963.

²The age-specific differentials were constructed by comparing Metropolitan Life's mortality rates and white male rates for these years. These three sets of differentials were then applied to the 1962 white mortality rates to produce the estate multipliers. The method of treating top wealthholders under 40 years of age or of unknown age was the same as that used in making the basic estimates.

1962 Estimate based on	Number of Top Wealthholders (Thousands)	Total Assets (Billions)	Net Worth (Billions)
1953 differentials	4,115	\$ 747	\$ 663
1958 differentials	4,133	750	667
1962 differentials	4,127	753	672

Metropolitan Life's mortality rates are classified by "insurance age" or age at *nearest* birthday and not, as is the case with the white mortality rates, age at *last* birthday. For example, a man is ordinarily considered to be 40 years old during the whole of his 41st year; however under the insurance definition in effect for these data a man is considered to be 40 years old from 39.5 years to 40.5 years. Thus mortality rates from Metropolitan Life are based on a slightly younger group than the white mortality rates (no more than 1/2 a year however). Since the assignment of the decedent's age on the estate tax return was closer to nearest birthday, this difference tends to correct a discrepancy that would otherwise have existed in the estate multipliers. It does however somewhat overstate the differentials.

The fact that there were a few women among Metropolitan Life's policyholders - they were only predominantly male-will, in and of itself, produce a favorable differential when Metropolitan Life's mortality rates are compared with white male rates. However the overstatement in the present estimates due to this bias is believed to be 3 percent or less.³

In addition to the fact that Metropolitan Life's series is subject to sampling variability and that several minor inconsistencies exist when it is compared with white male mortality, the present estimates also suffer a loss of precision because of the treatment of top wealthholders under 40 years of age or unknown age. Overall, while it is difficult to quantify the bias of the estimation technique, it seems likely that the multipliers used tend to overstate the number and wealth of top wealthholders, perhaps by as much as 5%.

TOP WEALTHHOLDERS UNDER 40 YEARS OF AGE

Estimates for top wealthholders under 40 are not only subject to a large sampling variability because death draws a thin sample from the young, but also the estimating technique for this group is very approximate. The estate multipliers, one for each sex, were devised by applying to the average 1962 white mortality rate for the 20-39 year age group the average wealth or insurance differential in the 40-54 year age group.⁴ Differentials

³This estimate of the bias was derived by assuming that the proportion of females (by age) with insurance in amounts of \$5,000 or more was the same as that reported in the Institute of Life Insurance's 1965 *Study of Savings in Life Insurance*. These data were not, however, felt to be reliable enough to use in adjusting the basic estimates downward.

⁴The differentials were weighted by 1962 white population estimates. (See footnote 1 of this section.)

for 5 year age groups under 40, while available from Metropolitan Life, were not felt to be reliable both because of a possible health bias and also because of the thinness of the samples upon which they were based. Table G shows the effect of three other estimating techniques on the number of wealthholders under 40, their total assets, and their net worth. It also provides some indication of the estimating error for this group.

Table G.—TOP WEALTHHOLDERS UNDER 40 YEARS OF AGE: ALTERNATIVE ESTIMATES, 1962

Type of estimate	Number of top wealth-holders	Total assets	Net worth
	(Thousands)	(Billion dollars)	(Billion dollars)
	(1)	(2)	(3)
Basic estimate.....	653	94.9	76.3
Alternatives:			
Insurance differential, 5 year age groups.....	600	84.2	68.0
Occupational differential.....	649	89.7	72.8
Insurance regression.....	731	98.1	81.5

The "basic estimate" is that described above and used elsewhere in this report. For the first alternative, separate multipliers were computed for each five-year age group 20 to 39 by applying the overall insurance differential assumed for top wealthholders under 40, 69.29%, to the 1962 white mortality rates for each group and then inverting the result. For the few top wealthholders under 20 years of age the mortality rate for whites 15-19 years was adjusted and used. For the estimates based on occupation, again separate estate multipliers for each five-year age group were used, but in this case they were adjusted by 1950 occupational differentials based on men identified in the 1950 Census as white professional workers. These differentials were: 20-24 years, 53% - used for the "under 20" year age group as well; 25-34 years, 58%; 35-44 years, 74%.⁵ For the insurance regression, age was regressed against the log of the male multipliers, males 40 years of age or more. ($R^2 = .99+$) The linear fit was then extrapolated to age groups under 40 and the male multipliers derived directly. For females, the mortality differentials for males were applied to the 1962 white female mortality rates.

TOP WEALTHHOLDERS OF UNKNOWN AGE

The 78,393 estate tax returns supplying the basic data for the present estimates included 1,626 returns (2 percent) from which the ages of decedents at death were not obtainable by the procedures employed. Except for processing errors, the absence of age information was due to the absence from the return of a date of birth. The obvious fact that some decedents were born before adequate birth records were instituted in their birthplace raised the hypothesis that decedents of unknown age were typically somewhat older than other decedents. A small sample of returns without age information, filed in 1966,

⁵The overall differential for white professional workers 20-44 years of age was 70 percent. Computed from unpublished data provided by the National Vital Statistics Division, Public Health Service.

was drawn to test this hypothesis. The assumption was made that such returns would be only insignificantly different in this regard from those filed during 1963. Basically, indirect evidence available on the returns was used - such as the year in which the decedent's domicile was established, date of marriage, date of issuance of insurance policies, age of surviving children, grandchildren. The Social Security Administration provided a tabulation of the group for which indirect evidence was not conclusive. The sample did not indicate that age-unknown decedents were typically older than decedents of known age.

Two possibilities for weighting decedents of unknown age were then considered: (1) to assign them the overall average estate multipliers of the age-known decedents according to their sex--the adopted procedure--or (2) the more elaborate procedure of assigning the average multipliers of the age-known decedents according to their sex and gross estate size. The first procedure was that employed by Robert J. Lampman in making estimates for 1953. The second is a variation on the procedure employed by James D. Smith for his 1958 estimates.⁶

Weighting age-unknown decedents according to their sex and gross estate size would have yielded approximately 93,000 top wealthholders rather than the 87,000 shown in the basic tables of this report. Although age and estate size are correlated, especially for men, the average multipliers for each size of gross estate did not show a marked pattern. Because of this and because of the procedure's high cost, the simpler and perhaps sounder technique of assigning only one multiplier for each sex was adopted.

SAMPLING VARIABILITY

As mentioned the sample drawn by death may depart somewhat from a random sample of the living and some bias probably exists in the weighting procedure; however, the computation of the relative sampling variability of the present estimates, as if there had been no bias, may be of limited usefulness. Relative sampling variability is the sampling variability expressed as a percent of the estimate. The sampling variability at the one - standard deviation level, when added to and subtracted from the estimate, provides the upper and lower limits within which 2 out of 3 estimates based on similarly selected samples should fall. Table H presents the relative sampling variabilities of frequency estimates in general. In this report, estimates of amounts are usually more variable than the corresponding frequency estimates.

To allow the reader to assess the precision of the estimates in another way, a column, labeled "Number of returns", appears in every table giving the sample

⁶Robert J. Lampman, *The Share of Top Wealth-Holders in National Wealth: 1922-56* (Princeton: Princeton University Press 1962), pp. 53-54.

James D. Smith, "The Income and Wealth of Top Wealth-Holders in the United States: 1958." (unpublished Ph.D. dissertation, Department of Economics, University of Oklahoma at Norman, 1966), pp. 86-87. Smith's original procedure was to assign the estate multiplier for the age group in which the average age fell - here the more precise procedure of directly computing the average multiplier has been used.

Table H.—RELATIVE SAMPLING VARIABILITY AT THE ONE-STANDARD DEVIATION LEVEL OF THE ESTIMATED NUMBER OF TOP WEALTHHOLDERS

Number of top wealthholders	Top wealthholders by age in years			
	Under 50	50 to 64	65 or more	
	(1)	(2)	(3)	
	(Percent)			
1,000.....	(1)	(1)		26
2,000.....	(1)	(1)		19
3,000.....	(1)	37		15
5,000.....	(1)	29		12
7,000.....	(1)	25		10
10,000.....	(1)	21		9
15,000.....	32	17		7
20,000.....	28	15		6
30,000.....	23	12		5
50,000.....	18	9		4
75,000.....	15	8		3
100,000.....	13	7		3
200,000.....	9	5		2
500,000.....	6	3		2
1,000,000.....	4	3		1

¹Sample too small to yield reliable "upper limit" estimates of sampling variability.
 NOTE: The "upper limit" formula used to compute the approximate relative sampling variability estimates in this table provides somewhat higher estimates than those which would have been obtained by the use of the standard formula.

size supporting the statistics in each line. All estimates not supported by 10 or more returns have been footnoted or combined. Estimates based on less than 100 returns should be used with special caution.

Numbers of top wealthholders in the basic tables in this report are unrounded. Amount estimates are shown in the thousands of dollars. This convention has been followed to make it easier to use the tables and to preserve the accuracy of any combinations the reader may wish to make. However, this should not be construed as a presumption of the precision of the estimation technique.

Top Wealthholders Worth \$10 Million or More

Mention has already been made of the fact that the mortality rates for the wealthy may not be entirely independent of the size of their wealth. For the very rich, in addition to this source of possible understatement, the ordinary limitations of sampling variability are particularly great. The universe of wealthholders worth \$10 million or more is very sparsely populated, with asset holdings ranging up to and perhaps beyond \$1 billion.⁷

To look at this problem with a longer perspective, consider the number and gross estate of those with *gross estates* of \$10 million or more for three recent years.

	Number of Top Wealthholders (Thousands)	Gross Estate (Billions)	Number of Returns
1953.....	0.7	\$17.9	17
1958.....	2.5	38.7	28
1962.....	1.8	29.0	32

Because of the small sample that naturally arises from this small universe, the sampling variability was high in all these years. At the one-standard deviation level, the relative sampling variability of the number of top wealthholders with gross estate of \$10 million or more ranged from one quarter to more than one-half of the estimate.

⁷See for example Richard A. Smith "50-million-dollar men" *Fortune*, November, 1957, pp. 176 ff.

C Characteristics of the sample

The estimates for top wealthholders in this report are based on the 78,393 estate tax returns filed during 1963 for citizens and resident aliens with a gross estate of \$60,000 or more at death. In addition, there were 4,837 returns filed during 1963 which were excluded either because the gross estate at death was less than \$60,000 or because they were filed for nonresident aliens.

Of the returns excluded, 3,487 were filed for decedents whose gross estate was reported as less than the filing floor.¹ Such returns, while not required, can occur for many reasons. Often questions of return includability or valuation are involved which the executor, in seeking to discharge his liability for the payment of an estate tax, may wish reviewed by the Internal Revenue Service

¹For citizens and resident aliens, the filing floor was \$60,000; for nonresident aliens - \$2,000.

before he distributes the assets to the heirs. Jointly-held property and to some extent gifts in contemplation of death are the usual subject of such inquiries.

In making the present estimates, 1,350 returns for nonresident alien decedents were also excluded. Persons who acquired U. S. citizenship solely by virtue of being a citizen of Puerto Rico or the Virgin Islands are treated as nonresident aliens for estate tax purposes. Thus, to summarize, the estate tax returns used were all those for residents or citizens of the 50 States and the District of Columbia, filed during 1963, with gross estate at death of \$60,000 or more. In estimating the number and wealth of top wealthholders, these 78,393 returns have been treated as a sample drawn by death in 1962. However, they actually differ somewhat from this; the extent and importance of this difference is discussed below.

Chart 14 - Number of Estate Tax Returns Filed by Quarter, 1955-1966

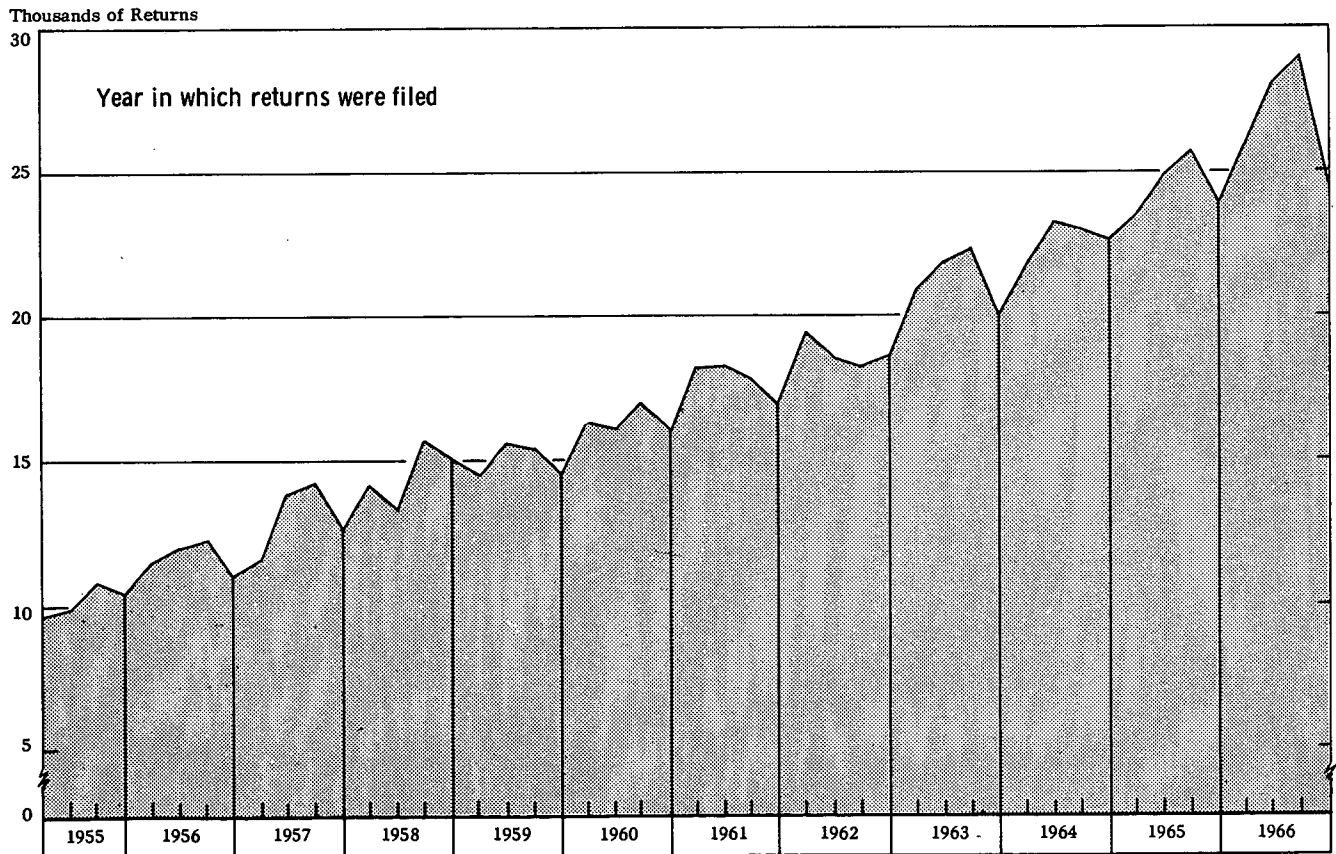
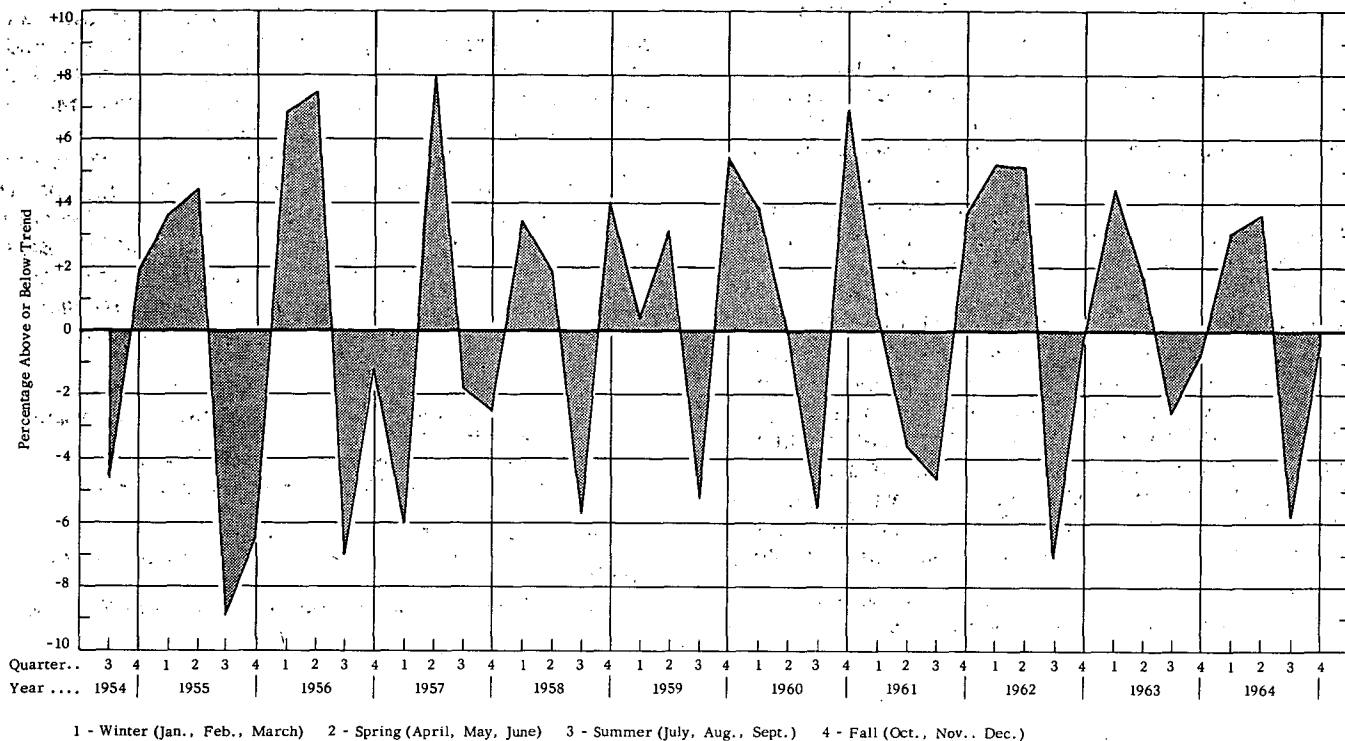


Chart 15 - Seasonal Pattern of Estate Tax Returns Filed by Year of Death

(Year of death assumed to be 15 months before filing)



FILING REQUIREMENTS

The executor or administrator of an estate is liable for filing the return usually within 15 months after the date of death, although an extension of up to 6 months can be granted. If 15 months elapsed before filing, the earliest date of death on the returns filed in calendar-year 1963 would be October 1, 1961, and the latest September 30, 1962. Since returns are filed throughout the 15 month period, the estates of some decedents who died in 1963 are also included. Not all returns are filed when due and there are some included for persons whose deaths ranged up to and over 10 years ago.² Past experience indicates that the bulk of the estates are for 1962 decedents. By and large, however, the best description of the period covered by the returns filed during 1963 is that they represent a sample drawn by death from October, 1961, to September 1962. Dating the valuations on the returns is often another matter, however.

TREND IN NUMBER OF RETURNS FILED

The flow of returns by quarter, shown in chart 14, provides some indication of the fluctuation inherent in statistics based on a year's filings and not on a year's deaths. The chart shows both a strong trend and a seasonal pattern as well.

²Information for returns filed during 1959 showed that about 11 percent were not filed within 15 months of the decedent's death.

The underlying causes are complex. Economic factors no doubt largely account for the series increasing trend. Death is a seasonal phenomenon and its effect on the statistics can be seen quite clearly when the trend is removed and the series is plotted by the quarter in which death occurred and not the quarter in which the return was filed.³

The seasonal pattern observed in chart 15 departs somewhat from that observed for all U. S. deaths.⁴ As expected, the summer months of July, August and September, generate the fewest filings. However, the mortality of top wealthholders shows no clear pattern between the fall, winter and spring, unlike deaths in the general population which occur with greatest frequency in the winter months. This difference may reflect in part at least, the imprecision of assigning the period in which death occurred; i.e., 15 months before filing. However, it probably also indicates some real difference between the mortality experience of the rich and the general population.

EXTENT OF COVERAGE

From several points of view, using a year's filings of estate tax returns rather than returns for a year's deaths is unsatisfactory. Limitations arise in the use of

³The trend values were obtained by a four-quarter moving average.

⁴Ira Rosenwaike, "Seasonal Variation of Deaths in the United States, 1951-1960," *Journal of the American Statistical Association*, September, 1966, pp. 706-719.

resulting estimates because they are arrived at by adding values reported for estate components that were determined at different points of time. Indeed, the component parts of the same estate may be valued at different points of time as discussed under "Time of valuation."

Unlike the usual sampling situation, no controls could be instituted to assure that the returns filed were actually taken at the prescribed rate, that is the mortality rate appropriate to the top wealthholders' age and sex. (See "Estate Multipliers.") Changes in economic conditions or even Internal Revenue collection and audit procedures, can induce artificial increases or decreases in the number of returns filed. For example, about one-third of the returns filed in 1959 were for persons who had died less than a year before the return was filed. Had economic conditions been less favorable in 1958, many more executors might have waited the full 15 months to determine whether it was advantageous to value the assets at death, as 97 percent did, or at a time later than death, as did the remaining 3 percent.⁵ Had executors waited the full 15 months before filing, between 10 and 15 percent of the returns filed in 1959 could have been filed in 1960.

⁵The provision of the law allowing alternate valuations is discussed in more detail under "Time of valuation" on page 76 of this report.

SAMPLE DATA FOR 1953, 1958, AND 1962

Table I summarizes the distribution of estate tax returns filed during 1954, 1959, and 1963 by the age and sex of the decedent. The age and sex groups shown formed the sample strata used to estimate the number and wealth of top wealthholders in 1953, 1958 and 1962.⁶

The "sample" in all these years was very large in the older age groups reflecting the advanced age at which top wealthholders die. In 1962, for example, the average age at death was 70 years for men and 76 years for women. Summary statistics from the sample are also shown in the basic and historical tables and have been published previously in considerably more detail.⁷

⁶For 1962 the 40 to 49 year age group was separated into two subgroups. The number of returns in each of these was:

40 to 44 years of age - 748 for men and 190 for women;
45 to 49 years of age - 1,332 for men and 372 for women

⁷*Statistics of Income-1953, Part I*, pp. 63-84.

Statistics of Income-1958, Fiduciary, Gift and Estate Tax Returns, pp. 50-83.

Statistics of Income-1962, Fiduciary, Gift and Estate Tax Returns, pp. 51-82.

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Table I.—ESTATE TAX RETURN DATA BY AGE AND SEX, 1953, 1958, AND 1962 BASED ON RETURNS FILED DURING 1954, 1959, and 1963

Age and sex	Number of returns	Total assets (Thousand dollars)	Debts (Thousand dollars)	Net worth (Thousand dollars)	Type of asset							Gross estate (Thousand dollars)	Insurance face (Thousand dollars)
					Real estate (Thousand dollars)	Bonds (Thousand dollars)	Corporate stock (Thousand dollars)	Cash (Thousand dollars)	Notes and mortgages (Thousand dollars)	Insurance equity (Thousand dollars)	Other assets (Thousand dollars)		
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
MEN													
1953, total.....	24,919	4,793,510	329,475	4,464,035	1,094,846	485,013	1,927,690	495,221	186,277	170,161	434,302	5,075,022	451,677
Under 40 years.....	285	33,802	5,726	28,076	9,104	1,831	10,893	2,567	1,051	892	7,464	43,185	10,274
40 to 49 years.....	1,213	169,167	27,810	141,357	49,680	9,327	52,577	13,142	5,661	3,585	35,195	206,886	41,303
50 to 54 years.....	1,477	222,029	29,773	192,256	59,237	13,796	75,582	22,244	9,617	4,726	36,827	256,880	39,580
55 to 59 years.....	2,370	383,331	45,788	337,543	99,320	30,833	132,562	36,983	16,505	12,693	54,435	430,059	59,423
60 to 64 years.....	3,200	566,990	57,158	509,832	142,223	48,628	204,565	57,763	21,735	22,601	69,475	621,952	77,561
65 to 69 years.....	3,683	716,917	48,072	668,845	162,333	60,396	287,845	75,551	31,867	31,591	67,334	760,222	74,896
70 to 74 years.....	3,563	735,259	37,086	698,173	154,327	77,155	311,167	75,753	28,386	32,385	55,786	761,703	58,829
75 to 79 years.....	3,369	706,515	26,494	680,021	144,382	73,760	314,317	75,595	28,166	27,643	42,652	721,165	42,294
80 to 84 years.....	2,630	579,301	18,151	561,150	126,898	74,534	242,717	63,674	20,388	19,903	31,187	584,797	25,399
85 years or more.....	2,378	569,781	23,129	546,652	109,820	85,940	264,999	58,012	16,789	11,259	22,962	572,890	14,368
Age unknown.....	751	110,418	10,288	100,130	37,222	8,813	30,466	13,937	6,112	2,883	10,985	115,283	7,750
1958, total.....	36,458	7,297,883	481,132	6,816,751	1,739,903	564,058	3,105,971	735,887	310,210	182,902	658,952	7,733,360	618,380
Under 40 years.....	410	45,529	8,666	36,863	13,862	1,685	15,487	2,534	2,249	1,574	8,138	62,082	18,128
40 to 49 years.....	1,651	216,794	39,769	177,025	67,186	9,108	66,035	15,690	8,408	5,564	44,803	275,333	64,103
50 to 59 years.....	5,054	864,662	113,582	751,080	244,960	45,770	299,079	71,569	38,304	25,610	139,370	980,700	141,647
60 to 69 years.....	10,113	1,993,826	148,863	1,844,963	505,805	128,489	789,668	198,121	91,065	65,156	215,522	2,121,154	192,485
70 to 79 years.....	10,487	2,098,859	100,692	1,998,167	483,614	174,558	911,088	235,872	97,802	44,426	151,507	2,185,677	131,244
80 years or more.....	7,982	1,967,740	62,300	1,905,440	385,343	196,988	992,481	198,470	66,865	37,504	90,089	1,992,763	62,527
Age unknown.....	761	110,473	7,260	103,213	39,133	7,460	32,141	13,631	5,517	3,068	9,523	115,651	8,246
1962, total.....	49,604	10,254,110	681,782	9,572,328	2,317,088	823,575	4,483,391	1,123,219	456,816	318,199	731,820	10,799,321	863,411
Under 40 years.....	588	78,885	18,883	60,004	23,156	1,658	35,060	3,875	1,938	3,049	10,189	110,958	35,121
40 to 49 years.....	2,080	318,538	74,446	244,092	99,911	9,955	110,656	23,488	15,000	8,006	51,521	402,767	92,235
50 to 54 years.....	2,467	409,498	62,201	347,297	121,056	18,027	155,540	32,656	16,837	10,303	55,079	485,486	86,292
55 to 59 years.....	3,932	722,931	84,405	638,526	187,400	35,606	294,417	60,967	34,406	24,286	85,849	812,343	113,698
60 to 64 years.....	5,744	1,117,701	107,880	1,009,821	293,104	77,247	422,814	106,644	64,061	38,647	115,857	1,211,679	132,625
65 to 69 years.....	7,266	1,426,944	98,953	1,327,991	346,739	100,872	582,475	159,264	69,361	51,832	116,401	1,497,995	122,883
70 to 74 years.....	7,694	1,619,753	84,710	1,535,043	361,734	131,336	700,122	188,462	78,730	55,840	103,530	1,665,348	101,435
75 to 79 years.....	7,807	1,619,163	62,472	1,556,691	332,826	140,205	739,424	202,943	68,125	53,667	81,973	1,647,606	82,110
80 to 84 years.....	5,808	1,349,846	37,450	1,312,396	254,354	135,232	643,160	161,501	57,206	39,749	58,643	1,360,823	50,726
85 years or more.....	5,758	1,458,646	39,967	1,418,679	254,986	163,945	737,519	164,522	43,989	29,702	43,989	1,466,848	37,904
Age unknown.....	880	132,203	9,415	122,788	41,822	9,492	42,204	18,897	7,169	3,118	9,501	137,468	8,382
WOMEN													
1953, total.....	11,777	2,323,740	71,409	2,252,331	456,850	336,344	1,054,933	249,815	7,024	11,476	147,298	2,336,714	24,473
Under 40 years.....	67	25,725	1,926	23,799	2,827	2,342	15,881	2,248	280	41	2,106	26,159	475
40 to 49 years.....	251	72,985	3,671	69,314	12,128	15,611	29,242	4,947	2,695	95	8,267	73,987	1,095
50 to 54 years.....	342	52,886	3,859	49,027	14,768	4,813	18,015	4,759	1,853	254	8,424	53,958	1,329
55 to 59 years.....	537	85,701	4,307	81,394	8,769	33,328	8,965	3,211	465	7,878	87,412	87,412	2,176
60 to 64 years.....	820	140,336	5,698	134,638	35,363	15,219	53,927	16,960	4,925	993	12,949	142,730	3,407
65 to 69 years.....	1,264	226,072	8,272	217,800	45,906	27,837	96,418	26,236	9,382	1,144	19,149	227,640	2,712
70 to 74 years.....	1,686	342,583	11,224	331,359	66,805	54,370	151,637	36,525	8,935	2,200	22,111	344,381	3,997
75 to 79 years.....	2,068	396,264	10,367	385,897	77,738	50,888	183,965	47,020	11,648	2,393	22,912	397,832	3,662
80 to 84 years.....	2,060	456,673	8,717	447,956	74,374	68,013	233,566	46,240	10,631	2,196	21,453	457,280	2,803
85 years or more.....	2,223	458,126	10,374	447,752	85,659	80,644	215,644	46,791	10,251	1,669	17,468	458,587	2,130
Age unknown.....	459	66,089	2,994	63,095	17,997	7,838	23,310	9,124	3,213	26	4,581	66,748	687
1958, total.....	19,216	3,895,372	123,559	3,771,813	768,598	451,285	1,892,380	416,063	104,648	15,084	247,314	3,914,023	33,732
Under 40 years.....	80	26,270	1,014	25,256	2,067	1,231	19,686	831	210	95	2,150	27,271	1,096
40 to 49 years.....	374	100,623	9,015	91,608	21,895	6,292	52,468	4,845	2,765	167	12,191	102,384	1,927
50 to 59 years.....	1,343	225,148	16,313	208,835	57,823	15,365	92,827	23,067	9,439	1,009	25,618	229,723	5,583
60 to 69 years.....	3,267	584,640	26,817	557,823	143,789	52,335	249,440	63,472	21,944	2,987	50,673	590,480	8,824
70 to 79 years.....	5,963	1,150,909	32,979	1,117,930	237,128	111,134	558,565	129,974	33,625	5,147	75,336	1,154,342	8,582
80 years or more.....	7,567	1,714,538	34,804	1,679,734	277,523	254,493	885,486	182,429	32,705	5,343	76,559	1,716,013	6,818
Age unknown.....	622	93,244	2,617	90,627	28,373	10,435	33,908	11,445	3,960	336	4,787	93,810	902
1962, total.....	28,789	6,172,352	196,358	5,975,994	1,078,903	649,954	3,229,092	715,050	172,341	29,970	297,042	6,207,918	65,537
Under 40 years.....	138	23,447	2,839	20,608	5,627	1,098	11,794	1,912	689	132	2,195	24,839	1,525
40 to 49 years.....	562	108,121	10,590	97,531	28,204	6,013	49,701	8,329	3,189	446	12,237	112,810	5,136
50 to 54 years.....	661	131,042	13,702	117,340	33,494	10,487	59,653	11,692	4,897	572	10,247	135,263	4,792
55 to 59 years.....	1,134	233,660	13,016	220,644	53,218	15,119	110,805	22,602	8,549	1,186	22,181	238,026	5,552
60 to 64 years.....	1,868	380,412	22,235	358,177	80,813	32,851	182,200	40,583	15,760	2,430	25,776	386,321	8,339
65 to 69 years.....	2,829	573,754	22,761	550,993	118,544	55,580	269,635	68,377	20,904	3,348	37,367	578,344	7,938
70 to 74 years.....	3,984	728,000	20,763	707,237	151,171	61,424	342,528	102,615	29,482	4,515	36,264	731,687	8,202
75 to 79 years.....	4,817	1,005,718	29,100	976,618	180,486	113,413	501,226	130,711	29,725	5,731	44,426	1,008,585	8,768
80 to 84 years.....	5,129	1,071,197	19,603	1,051,594	169,206	113,500	583,603	134,260	25,566	5,242	39,820	1,072,643	6,889
85 years or more.....	6,921	1,791,438	37,774	1,753,664	229,708	106,261	176,184	28,560	6,035	60,745	1,793,106	7,702	
Age unknown.....	746	125,563	3,975	121,588	28,432	12,623	55,586	17,785	5,020	333	5,784	126,124	894

NOTE: For 1953, 22 returns are included with gross estate of less than \$60,000. Also for 1958 data for the "Under 40" group were revised to correct a processing error. Insurance equity was computed using slightly more accurate ratios than those shown in table J. Detail may not add to previously published totals because of rounding.

D Characteristics of estate tax wealth

The estate tax return's use as a data source for the asset holdings of the wealthy is limited because the wealth reported on the return is not identical with what is ordinarily considered a man's personal wealth. The major differences between estate tax wealth and a more usual notion of personal wealth are summarized in chart 16.

Chart 16 - Estate Tax Wealth and Personal Wealth

Estate Tax Wealth

add	{	Foreign Real Estate
		Pension and Annuity Wealth Represented Only By An Income Right
		Trust Interests Represented Only By An Income Right
		Certain Community Property Interests
		Costs of Terminal Illness
subtract	{	Lifetime Gifts Presumed to Be In Contemplation of Death
		Remainder Interests In Certain Other Estates
		Difference Between Insurance Proceeds and its Cash Surrender Value

= Total Personal Wealth of Top Wealthholders

Some kinds of wealth enjoyed by living individuals, such as pensions, income rights in annuities and trusts, or foreign real estate holdings, were not generally required to be reported on the return. Other interests are included for estate tax purposes which are not part of a man's personal wealth, for example, certain lifetime gifts.

The fact that the assets are valued at or shortly after death may also change the size and composition of wealth. This is particularly important in the case of insurance for the full face value of the insurance is reported in the estate tax return and not the cash surrender value the asset had before death. There is also, of course, the effect of terminal illness reflected in either a smaller estate or a larger debt burden. Finally, there are important questions of ownership tied closely to property laws and there may be some inherent understatement of wealth because the returns used were unaudited.

PROPERTY INTERESTS INCLUDED

The Federal estate tax is a tax on the transfer of property interests at death. Property transferred before death without retained "strings" or property which ceases to have a value when death occurs is, of course, not subject to the tax. Thus to be shown on the estate tax return the property must have been owned by the decedent at death and have a value after his death. The one exception to this was gifts made during the three years before death, presumed to be in contemplation of death.

Usually the way in which ownership existed determined the portion of the property included. Property ownership could take several forms: (1) property owned jointly with right of survivorship; (2) property held under a *general* power of appointment; (3) property held solely by the decedent or as a tenant in common, in a partnership for example; (4) community property under the laws of the States of Arizona, California, Idaho, Louisiana, Nevada, New Mexico, Texas and Washington; and (5) certain property transferred during life by gift. The entire value of jointly owned property was included except that portion attributable to the contributions of the surviving joint tenant(s). Property held under a general power of appointment and property owned outright were included at their full fair market value.¹

Community Property

Under community property laws, generally whatever is acquired by the efforts of either husband or wife during marriage belongs to the marital community, not to the husband or wife separately. Property acquired either before marriage, or after marriage by gift or inheritance, usually remained the separate property of the spouse who acquired it and was taxed as such. For estate tax purposes half the community property is considered to be owned by each spouse. An exception to this occurs in New Mexico. If the husband predeceases the wife, one-half of the community property is includable in his estate. But following a court decision in 1931, if the wife dies first *no part* of the community property is includable in her estate.² This peculiarity of the law slightly understates the number and wealth of married female top wealthholders.

Lifetime Gifts

Two kinds of transfers are included by law: (1) Incomplete transfers - property interests given in such a way

¹If the decedent held a power of appointment under which he had authority only to confer the property upon some other person, then the value of the property was not includable. (For example, if the decedent possessed a power to appoint the property only to his own children.)

²*Hernandez V. Becker* (10th Cir., 1931).

that ownership was not actually relinquished during life. (2) Outright gifts made within three years of death presumed to be in contemplation of death. (See "Other assets".)

Wealth represented by a transfer which was not completed during life obviously should be included as belonging to the decedent. However the inclusion of outright gifts may cause an overstatement of the assets of top wealthholders. In fact, the wealth is not only assigned to the wrong person but the possibility of double-counting exists. This can occur when not only the donor but also the donee are top wealthholders.

It is likely that this source of overstatement is not a serious one for if the executor contended that outright transfers made within three years of death were not subject to the estate tax, they were not included in the present estimates. The inclusion of gifts actually made in contemplation of death may in part correct one of the biases introduced by using death as a method of sampling. Their inclusion can be viewed as an adjustment for the "non-random" point at which the sample has been drawn, for example, as a corrective for the effect of terminal illness.

Pensions and Annuities

In general, only a portion of the cash surrender value of a pension or annuity was included in the wealth estimates. The bulk of such interests enjoyed by top wealthholders are not required to be reported. Specifically excluded were Social Security benefits and interests payable only during life, or annuities purchased on or before March 3, 1931.³

Also excluded was the proportion of the cash value which the employer's contribution bore to the cost of pensions under qualified plans. This provision became effective in 1954. For 1960, about 10% of the returns having annuities showed an annuity under a qualified plan.⁴ If the annuity had been entirely paid for by the employer it was not reported at all. Qualified plans have probably become increasingly important.

Annuities received under nonqualified pension plans and contracts purchased directly from life insurance companies were included at their cash surrender value in the hands of the surviving beneficiaries. This value was measured in general by the age of the survivor(s). Since even in these cases the fair market value was altered by the occurrence of death, the amount shown as "Annuities" in table A is considerably smaller than the actual wealth enjoyed by top wealthholders from this source.

Trusts and Remainder Interests

If the decedent possessed a remainder interest in a trust or in another decedent's estate this wealth was included in his estate tax return. Further, if the decedent

himself had set up a trust *inter vivos* and had not relinquished ownership, its assets were also included.⁵

Although probably not serious, the inclusion of remainder interests in another decedent's estate creates some double counting of wealth. This occurs when returns for a top wealthholder and his heir(s) are both filed during the same year. For example, decedent A bequeathed his estate to his spouse B who died several months later. If the estate tax returns for both are filed in the same year, the wealth is obviously counted twice - but not necessarily all taxed twice.⁶

The only trust wealth enjoyed by top wealthholders and not included was that represented solely by an income right. It is quite problematical as to what portion of the total trust wealth is removed from the estate tax in this way. It seems likely, however, that the bulk of trust wealth is included either in the estate of the creator of the trust because he retained some "string" of ownership over it or as a remainder interest in the estate of a beneficiary.⁷

VALUATION

As has been said, the estate tax return as a source of economic information draws notable strength from having been reported from records, generally by highly skilled people and under exacting requirements of law. The person filing the return must answer many questions about the estate, present the value of each type of property in the estate, and attach copies of relevant documents. Examples are the will and trust instruments, income and balance sheet statements of sole proprietorships, partnerships, and closely-held corporations in which the decedent held an interest and any real estate appraisals made. A schedule, Form 712, was also required from insurance companies for each insurance policy on the life of the decedent. In short, the executor is required to prepare a complete catalogue of the decedent's assets, to state their fair market value and to describe how they were held: jointly owned, community property, etc.

For particularly hard-to-value assets, such as an interest in a partnership or closely-held corporation or real estate assets for which there is no ready market, the valuation may be subject to wide differences of opinion. Usually there is a financial stimulus for the executor to use the lowest value he thinks can be sustained. It is not uncommon therefore that valuations are increased when returns are subjected to audit. On the other hand, there are sometimes good financial reasons to select the higher rather than lower value of an asset. Because the

⁵Remainder interests in a trust or another estate were included in "Other assets". For trusts set up by the decedent the property in trust was allocated to real estate, stocks, bonds, etc. For the number of *inter vivos* and testamentary trusts see *Statistics of Income - 1962, Fiduciary, Gift and Estate Tax Returns*, pp. 24 and 26.

⁶Some measure of this bias is available (i.e., the prior transfer credit allowed in such cases). See *Statistics of Income - 1962, Fiduciary, Gift and Estate Tax Returns*, p. 55 (Definition) and p. 65.

⁷For the number of trusts over which the grantor retained some string to the income, see *Statistics of Income - 1962, Fiduciary, Gift and Estate Tax Returns*, p. 29. See also Gerald R. Jantscher, *Trusts and Estate Taxation* (Washington: The Brookings Institution, 1967).

³Lump sum benefits from Social Security for the decedent's funeral expenses - the maximum was \$255 - were included in other assets when reported.

⁴*Statistics of Income - 1960, Fiduciary, Gift, and Estate Tax Returns*, p. 55.

estate valuation establishes the basis for future taxation of the asset in the hands of the heirs, a higher basis may minimize income taxes so that while a higher estate tax is paid the net effect is a tax saving. For example, a higher basis for business property subject to depreciation will increase the allowable deductions for depreciation; a higher basis for property which the heirs intend to sell will minimize the capital gains tax paid on the difference between the estate tax return valuation and the selling price. Overall, however, asset valuations on the estate tax returns used in this study, which were unaudited, are probably somewhat understated.⁸

Time of Valuation

In general, asset prices change over time and for some assets, such as traded corporate stock, this change can be quite dramatic. Ideally, to prevent problems of aggregation, valuations should be made as of one date or in as narrow a time span as possible. However, using the estate tax returns filed during calendar-year 1963 instead of the returns for 1962 deaths, the time span is over 10 years with most of the returns having valuations made in the three-year period, 1961 to 1963.⁹

Even if the sample had been of a year's deaths, not all of the assets would have been valued during that year. In filing an estate tax return the executor could elect either of two methods for valuing the assets in the estate: (1) valuing all assets at date of death, or (2) valuing assets disposed of in less than one year at the date of disposition and all other property one year after death. The alternative provision, of course, does not apply to changes in valuation due solely to the passage of time which for example can occur in assets such as patent, copyright, and annuity interests.

Generally, but not always, if the estate is valued other than at date of death, the choice was made by the executor because assets in the estate decreased in value.¹⁰ However, even though a specific asset may decline in value, if other assets in the estate increased in value, the alternative open to the executor may not be advantageous.

Corporate Stock

It is likely that the availability of the alternative tends to minimize the value of assets with widely fluctuating market prices. Because of the overall importance of

corporate stock, changes in its value may be the single most important factor in the executor's choosing to value assets other than at date-of-death.¹¹

The history of the alternative seems to bear this out. Chart 17 compares the method of valuation on returns filed in three recent years with Standard and Poor's monthly common stock price index for the period 1957 to 1963. For the sake of simplicity, the returns are assumed to represent deaths occurring exactly 15 months before filing. The filing period is divided into two parts in the chart: the period in which death occurred and the period in which the assets in the estate might have been valued if the executor elected the alternative method.

From the comparison in the chart, it is highly probable that the choice of the alternative valuation bears a direct relationship to corporate stock prices. For 1959 filings, there was a continually rising stock price index, and only a small percentage of returns had alternative valuations. In contrast, for 1961 and 1963 filings, there were periods in which stock prices were lower than at death, making the alternative valuation advantageous.

In addition to the effect the alternative method may have on traded corporate stock, there is another valuation technique available to the executor which may also tend to minimize the stock's value--the so-called "blockage adjustment". If the decedent owned a sizable percentage of a corporation's traded stock, a downward adjustment of the stock's selling price was allowed if the executor could prove that in disposing of the stock the market price would be depressed.

Life Insurance

Life insurance in the estates of decedents is radically different in amount from the corresponding asset in the hands of the living. Through the cooperation of the Institute of Life Insurance, ratios of the following form were developed to reduce life insurance to a level appropriate to the living:¹²

Cash value of policy including cash value of dividend additions less indebtedness.

Face value of policy less indebtedness including dividend additions but excluding accumulations and post mortem dividends.

In previous wealth estimates based on estate tax returns, the only available measure of this ratio by age was that obtained for 1948 of policy reserves to total insurance in force based on the Ordinary life insurance policyholders of one large insurance company.¹³ Such ratios probably lead to an overstatement of life insurance equity.¹⁴ First,

¹¹For returns filed during 1966 the actual importance of the alternative on the values of both real estate and traded corporate stock will be available.

¹²The study was carried out by Mrs. Virginia Holran and Mr. Robert Chiappetta whose help is greatly appreciated.

¹³Horst Mendershausen, "The Pattern of Estate Tax Wealth" in *A Study of Saving in the United States* by Raymond W. Goldsmith, Dorothy S. Brady and Horst Mendershausen (Princeton: Princeton University Press, 1956), III, pp. 304-306.

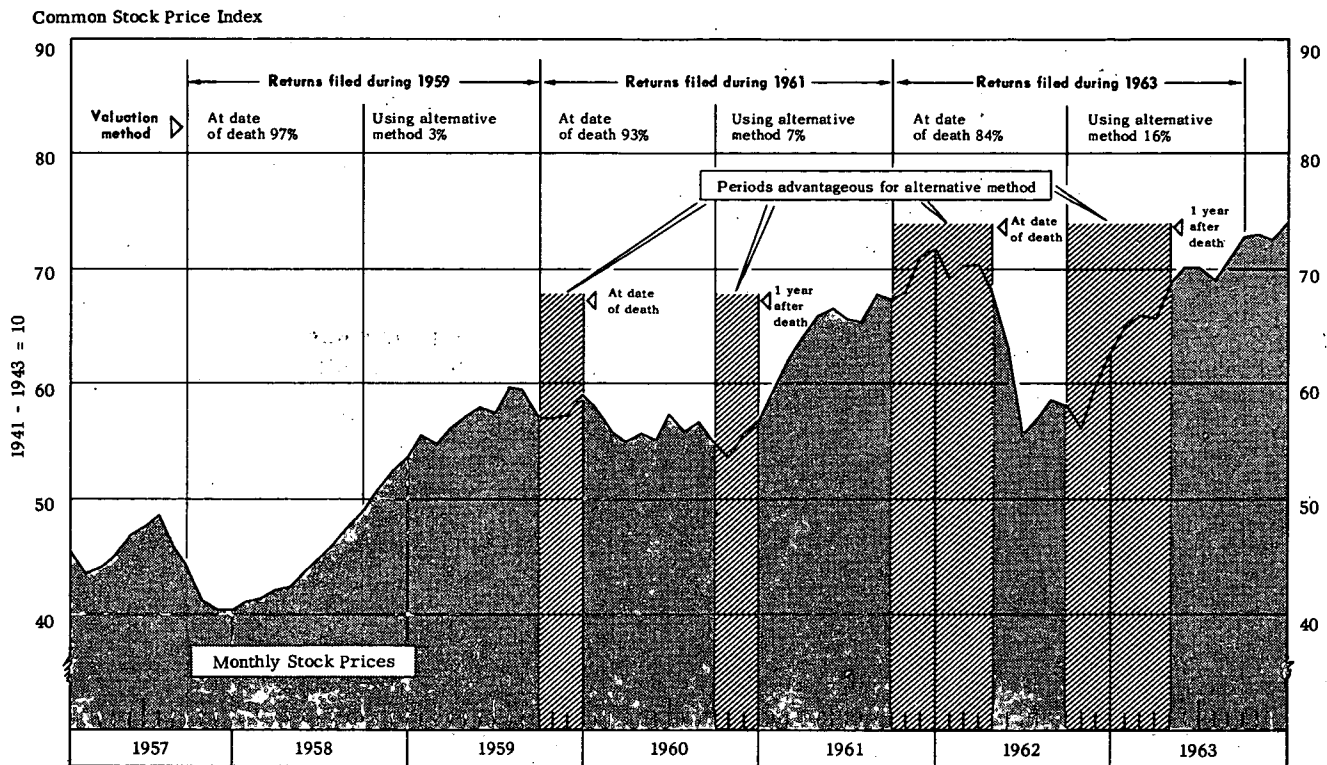
¹⁴The use of the overall average "reserve" ratio for all insurance holders, on the other hand, would lead to an understatement of top wealthholders equity even were this ratio the "true" ratio of equity to face because the general insurance population is younger than top wealthholders.

⁸It is difficult, if not impossible to quantify the downward bias in valuations shown on the unaudited returns used. C. Lowell Harriss estimated for 1941 that the bias was about 10%. (C. Lowell Harriss, "Wealth Estimates as Affected by Audit of Estate Tax Returns," *National Tax Journal*, December, 1949, pp. 316-333. His technique, when applied in a somewhat modified form to data for fiscal 1962, yielded about 10% as well.) The method he used is very approximate. It is based on the assumption that changes in valuation are the cause of additional taxes and assessments. However, it is likely that this is not always the case. Many audit adjustments in tax liability are due to the partial disallowance of marital and charitable deductions.

⁹For returns filed during 1966, a complete frequency distribution by year of death and year of valuation will be available.

¹⁰Of the 78,393 returns filed in 1963, there were 12,229 (16%) valued under the alternative method. The overall decline in gross estate was \$373 million, about 7% of the total date-of-death value on these returns. See *Statistics of Income - 1962, Fiduciary, Gift and Estate Tax Returns*, p. 66.

Chart 17 - Comparisons of Methods of Valuation of Corporate Stock with Monthly Stock Price Index*



*Standard and Poor's stock price index, 500 common stocks.

because they were based only on Ordinary insurance, but perhaps more importantly because they were based on all insurance holders and not just top wealthholders.

Two things seem to happen to the holding of insurance assets by the wealthy. First, insurance becomes a progressively less important asset as wealth increases. Second, borrowing against insurance is much more prevalent among top wealthholders than in the general insurance population.¹⁵ This is not surprising for the chief value of insurance is that it provides (1) an asset readily liquidated at death for the payment of funeral and other expenses occasioned by death and (2) funds for use by the decedent's family to supplement a generally smaller income - obviously considerations of less pressing importance for those with large property incomes and readily convertible assets.¹⁶

The ratios developed by the Institute for mid-1965 (covering the two-week period from July 19 through July 30, 1965) were used without adjustment on the returns filed during 1963; these ratios may have been different

in "1962" but no measure of this difference is available. Eleven life insurance companies participated in the study; these companies had 44 percent of the total Ordinary and Industrial life insurance and 43 percent of the total Group insurance in force in the United States as of December 31, 1964. The data collected related to insurance information on death claims for which a Form 712 was prepared. The form is required for each insurance policy on the life of the decedent when filing the estate tax return. A copy of it is shown on page 92.

The Institute's study was based primarily on policies for men; only fragmentary information was available for women - 2,802 or 93 percent of the 3,009 policies were for men. Only one set of ratios was used; however, if the data were available, one each for men and women might have been better.¹⁷ Also precluded by a lack of data were separate ratios for 5 year age groups under 50.¹⁸ The

¹⁵The ratio of policy loans to total insurance in force in the Institute of Life Insurance's 1965 Study of Savings in Life Insurance was 2.9%; the ratio in 1965 for all insurance holders was only 0.9% (computed from the 1966 Life Insurance Fact Book, pp. 19 and 88.)

¹⁶Liquidity, even among the very wealthy, can be a serious problem if assets are held in a family business not readily salable, particularly when a large estate tax must be paid.

¹⁷The overall ratio for women was 59.2% (considerably higher than that for men and women combined, due largely to the fact that the women were older at death). Although ratios for females were somewhat higher than for males in nearly all age groups, the difference due to sex was not statistically significant.

¹⁸The ratios in age groups under 50 years demonstrate the same tendency to increase with age as those 50 years or more. These ratios were: under 35, 2.0%; 35 to 39, 4.1%; 40 to 44, 7.7%; and 45 to 49, 12.7%. Because of the thinness of the samples upon which these estimates were based the relative sampling variability (at the 95% level) was excessive, ranging from 74% to well over 100%.

number of policies in the sample, the ratios used, and their standard errors are shown by age in table J.¹⁹

The reliability of the estimation of insurance equity can be judged for each age group using table J. Overall with-

Table J.—LIFE INSURANCE RATIOS

Attained age at death in years	Number of policies	Estimated ratio of equity to face	Absolute standard error of estimate	Relative sampling variability (95 percent level)
		(Percent)	(Percent)	(Percent)
	(1)	(2)	(3)	(4)
Total ¹	3,009	37.2	0.7	5.3
Under 50.....	224	8.7	1.6	52.5
50 to 54.....	201	11.9	2.0	46.1
55 to 59.....	356	21.4	2.8	26.2
60 to 64.....	466	29.1	2.8	26.2
65 to 69.....	399	42.2	2.9	19.0
70 to 74.....	457	55.1	2.0	10.0
75 to 79.....	471	65.4	1.3	5.6
80 or more.....	435	78.4	1.6	5.7

¹The overall ratio estimate, 37.2%, was used for decedents of unknown age. Source: Institute of Life Insurance 1965 Study of Saving in Life Insurance.

¹⁹The standard errors of the ratio estimates were calculated by first partitioning the total sample into five random groups and then constructing five sets of estimates, one for each group. The range, highest minus lowest estimate, was then divided by five to obtain an estimate of the standard error. To construct the relative sampling variability at the 95% level, the standard error was multiplied by the value of Student's "t" (2.78) for 4 degrees of freedom and divided by the ratio estimate.

out taking account of the variance in the estimate of total insurance face, total insurance equity would lie between \$12.9 and \$18.2 billion, in 19 out of 20 estimates prepared in the same way. If other sources of variation are considered, the interval would be somewhat wider.

While all insurance on the life of the decedent is reportable on the estate tax return, not all of it is included in the present estimates. Excluded were insurance policies in which the decedent did not have incidents of ownership. "Ownership" of insurance for estate tax purposes differs somewhat from what one would ordinarily expect. For example, the decedent was not necessarily considered to have owned the policy even though he may have paid the premiums. Conversely, if the decedent owned a policy on the life of another, the cash surrender value of that policy was included as life insurance face and inappropriately adjusted by the insurance ratios.²⁰ The result of this inconsistency is that life insurance, face or equity, is slightly understated.

²⁰There were only 85 returns filed in 1961 reporting nonincludable insurance. It is likely however that such insurance has become increasingly important. See *Statistics of Income - 1960, Fiduciary, Gift and Estate Tax Returns*, p. 54. Based on an advance study of the 1966 filings it appears that the cash surrender value of insurance on the lives of others constituted about 1% of total insurance face. It was probably even less than this for returns filed during 1963.

Personal Wealth Estimated From Estate Tax Returns, 1969

by Keith Gilmour and Charles Crossed

Introduction

This report provides estimates of the personal wealth of one segment of the country's population living in 1969. The estate tax returns filed during 1970 provided the sample from which these wealth estimates for the living were made. Estimates are provided for the portion of the living population in 1969¹ with gross estates of more than \$60,000, since the sample data were limited to decedents with that wealth level. The underlying assumption is that death draws a random sample from the living population. A technically more precise way of looking at the estimates is that they represent all those for whom a Federal estate tax return would have been required had they died in 1969. The technique used to make these estimates, called the "estate multiplier technique", relies on the fact that for the general population the mortality rate is known for each age and sex group. Therefore, if the number that died in each age/sex group were known, and the mortality rate were known, the population is simply the inverse of the mortality rate for each group.

The estate data which formed the basis for this report were published in *Statistics of Income—1969, Estate Tax Returns*, to which this volume is a supplement. This is the second personal wealth report to be published. The first, *Supplemental Report, Statistics of Income—1962, Personal Wealth*,² was based on Federal estate tax returns filed in 1963, and was published in 1967.

This report contains two sets of estimates of personal wealth. One set was computed using the mortality rates of those with \$25,000 or more in life insurance with one company. The other set of estimates was computed for the mortality experience of those with \$5,000 or more in life insurance with one company and is comparable to data published in the 1962 report.

At the time the 1962 report was published mortality rates for those with \$25,000 or more in life insurance were not available. Publishing both sets of estimates now was considered desirable for two reasons: (1) the difficult decision of determining which estimates approximate the true values can be deferred since convincing arguments can still be made for using either set; and (2) researchers interested in trends over

time can use the lower estimates which are comparable to previously published data. The tables which are directly comparable with the 1962 data are in the "Trends in Wealth-holding" section of this report.

The estate multiplier technique is discussed further in the Appendix, but some problems associated with the technique are discussed here to provide an indication of some of the limitations inherent in the wealth estimates for the "top wealthholder" population provided in this report. The term "top wealthholder" is used throughout this report to refer to those in the living population with a gross estate of more than \$60,000 in 1969.

Perhaps the chief problem that confronts all applications of the estate multiplier technique is the lack of exact mortality rates appropriate to the top wealthholder population. This deficiency is very important for there is much evidence to support the view that the mortality rates of those with economic well-being are more favorable than for the general population. On the basis of this evidence, which is discussed in detail in the Appendix, it is reasonable to assume that the mortality rates of top wealthholders are more favorable than the average mortality rates. The estimates based on the two different sets of mortality rates used in this report may represent a likely range of mortality for the top wealthholder group.

Other limitations associated with the estate multiplier technique that deserve early consideration relate to estate tax return reporting requirements and the wealth concepts or which measures are available.

Though the estate tax return is a rich source of economic information, generally prepared from records by highly skilled people and under exacting requirements of law, the wealth reported on the return is not identical with what is ordinarily considered a man's personal wealth. The financial value of life insurance to a living person, for example, is its cash surrender value; the estate of a deceased person includes the insurance at its full face value. In the estimates presented in this report, insurance proceeds were adjusted so both equity and face values of insurance could be included in different concepts of wealth.

Gifts and other transfers of wealth which were made by the decedent within three years of his death are included as part of his wealth in this report. Such wealth must be reported on the estate tax return on the theory that the transfer was made in contemplation of death.

Some duplication in wealth is included in these estimates to the extent that the estate returns of both benefactors and beneficiaries were filed in 1969. This is also true with respect to jointly held property which is included as wealth of one person.

¹ The time period for these estimates would center around the end of 1969 to the beginning of 1970 because 66 percent of the estate returns were for individuals who died in 1969; 19 percent for 1968 decedents, and 13 percent for 1970 decedents. In addition, the estimate period is pushed forward in time owing to the alternative valuation which permitted valuation of estates as of one year after death. About 30 percent of 1969 decedents' returns used alternative valuation.

² Internal Revenue Service Publication No. 482 (7-67), available from the U. S. Government Printing Office, Washington, D. C. 20402, price 65 cents.

Some types of wealth such as pensions, annuities, and trust interests, represented only by an income right of the decedent, and certain community property interests, are excluded from the estimates. Wealth is also affected by expenditures related to long-term illnesses.

The valuation of estate tax return assets may be understated for other reasons. The estimates are based on returns as filed for decedents, before audit, and assets for which no ready market exists could be undervalued by the executor in the interest of minimizing the estate tax. In addition, the option to use the alternative valuation had the effect of reducing reported wealth. For returns used in this report, those filed in 1970, the alternative method permitted valuation one year after death, or on date of disposal.

The estimates in this report should be relatively accurate with regard to showing the patterns of asset holdings among different age, sex, and marital status groups of top wealthholders. The estimates are less precise in terms of the absolute value of these asset holdings.

In summary, the estate multiplier technique is a potentially powerful tool, but further research in mortality rates appropriate to the subject population is needed. Future uses of the technique should also provide better measures of the personal wealth of the living which would include a more accurate determination of life insurance equity value, and allocate the lifetime transfers if they are included at all, to the appropriate asset item.

Summary of Findings

There were an estimated 9.0 million individuals in the living population in 1969 with gross assets of more than \$60,000. These 9.0 million top wealthholders represented about 7.4 percent of the mid-year U.S. adult population. More than 5.6 million of this group were men, while 3.4 million were women, representing 10 percent and 5 percent respectively, of the adult populations. Based on the "\$5,000 or more" mortality rates (life insurance policies of \$5,000 or more with one company), there were 8.2 million individuals in the top wealthholder group, which accounted for 6.7 percent of the adult U.S. population. The proportions of men

and women are about the same regardless of which mortality rates are used. A brief summary of the estimates, and the basic tables derived from the "\$5,000 or more" mortality rates are provided in the "Trends in Wealthholding" section of this report. Unless otherwise indicated, estimates in the text, tables, and charts are based on the more favorable "\$25,000 or more" mortality rates.

The top wealthholders had total assets valued at \$1.6 trillion and debts of \$0.2 trillion for a net worth of \$1.4 trillion. As indicated in table A, nearly three-fifths of the top wealthholders had a net worth of less than \$100,000. About 8 percent had a net worth in excess of \$300,000. Overall, corporate stock at \$551 billion was the largest single asset item in the top wealthholders' balance sheet. This was followed by real estate valued at \$428 billion. Two-fifths of the total value of real estate was held by those with net worth of less than \$100,000, three-fifths of the corporate stock was held by

Chart 1
Number of top wealthholders, net worth, average net worth for men and women, 1969

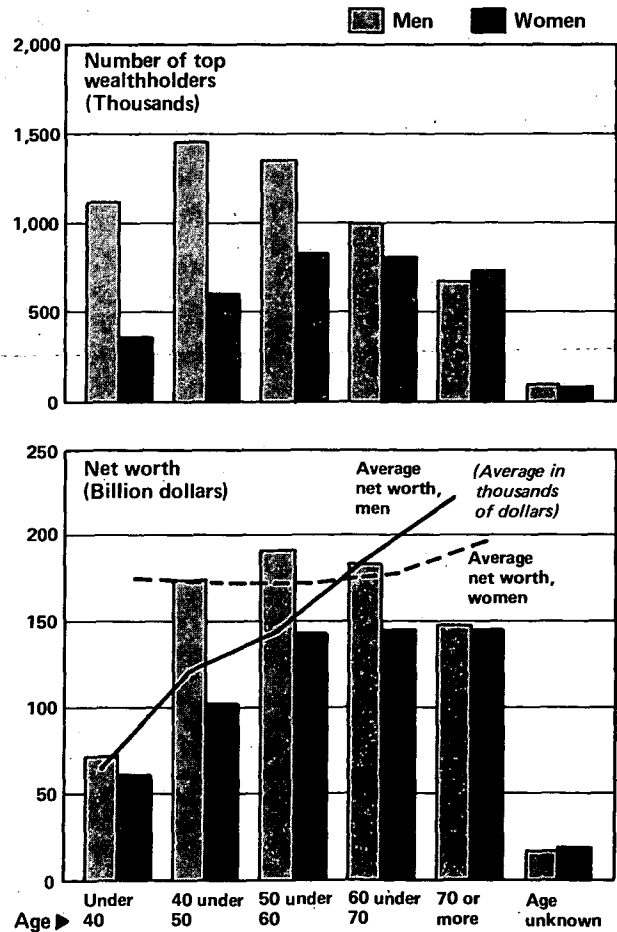


Table A.—NUMBER OF TOP WEALTHHOLDERS AND ASSET COMPOSITION, BY SIZE OF NET WORTH, 1969
 [All figures are estimates based on estate tax return samples]

Item	Total	Size of net worth				
		Under \$50,000	\$50,000 under \$100,000	\$100,000 under \$300,000	\$300,000 under \$1,000,000	\$1,000,000 or more
	(1)	(2)	(3)	(4)	(5)	(6)
Number of top wealthholders...thousands..	9,013	1,815	3,497	2,937	642	121
(Billion dollars)						
Total assets.....	1,580.6	94.5	301.8	516.0	345.3	323.0
Real estate.....	428.3	51.1	118.9	160.1	70.0	27.9
Corporate stock.....	551.4	9.7	55.7	153.8	151.4	180.8
Bonds.....	85.3	0.8	10.9	21.7	22.1	29.9
Cash.....	189.7	8.4	55.4	79.3	33.7	12.9
Notes and mortgages..	59.4	2.2	11.8	24.2	15.1	6.0
Insurance equity.....	31.0	7.8	8.7	9.4	3.6	1.3
Other assets.....	235.8	14.4	40.3	67.4	49.5	64.2
Debts.....	203.7	49.9	42.7	52.4	31.6	26.9
Net worth.....	1,377.0	44.6	259.1	463.6	313.7	296.1

NOTE: Detail may not add to totals because of rounding.

those with net worth of \$300,000 or more. Together these two asset items accounted for 60 percent of the total assets held by all top wealthholders.

Men comprised 63 percent of the top wealthholders and controlled 56 percent of the net worth. Women made up only 37 percent of the number but controlled about 44 percent of the net worth. As indicated by these figures, the net worth of women was higher than that for men, averaging \$179,000 compared to \$137,000 for men.

The pattern of wealth among men was closely correlated with age. As age increased the average net worth steadily increased, from \$63,000 for men under 40 to \$218,000 for men age 70 or more. The pattern for women is not as closely correlated to age, probably owing to the way wealth is obtained.

For the first three age groups shown in chart 1, the average net worth for women was virtually the same, \$171,000; with a gradual increase to \$195,000 for those over age 70.

On the average the women were older than the men. About one-fifth of the men and one-tenth of the women were under 40 years old. In the "70 or more" age group were only about 12 percent of the men compared to 22 percent of the women.

The vast majority of the male top wealthholders were married, over 83 percent, while less than 6 percent were widowed. This compares with 47 percent of the females who were married and 34 percent who were widowed. Single individuals accounted for about 8 percent and 11 percent of the male and female top wealthholders, respectively.

Top Wealthholders in Perspective

Concepts of Wealth

As indicated in the Introduction, this report provides estimates of the number and wealth of individuals with a "gross estate" of more than \$60,000 during 1969. The gross estate criterion is a Federal estate tax concept of wealth that does not conform to more usual definitions of wealth mainly because life insurance at face value is included as wealth of the decedent. Therefore, three measures of wealth are used throughout this report; gross estate, total assets, and net worth. Since net worth is the more usual concept of wealth, it is used as the major classifier.

Gross estate is the gross value of all assets including the full face value of life insurance reduced by policy loans and before the reduction by the amount of debts. This measure defines those included in the top wealthholder group.

Total assets, a lower wealth value, is still essentially a gross measure. This is obtained by using the cash value of the life insurance asset; that is, the value the insurance had immediately prior to death.

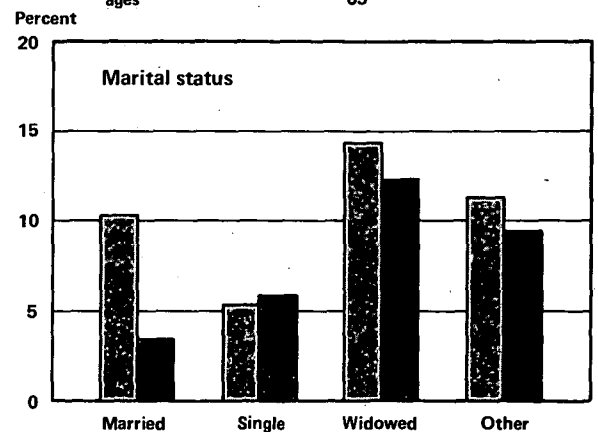
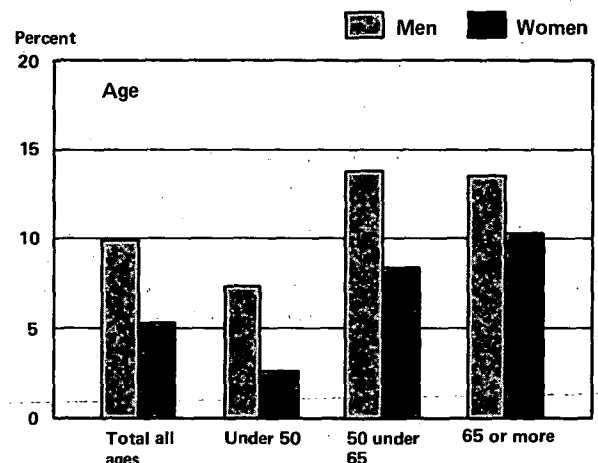
Net worth, of course, is the level after all debts have been removed, and includes the cash value of life insurance. Table B indicates the number of top wealthholders at four wealth levels, using the three definitions of wealth. Whereas nearly 148,000 individuals were millionaires in 1969 according to the value of their gross estate, only about 121,000 were in the millionaire category in terms of net worth.

The relationships between the three levels of wealth are shown in more detail in the basic tables. Table 19 provides a profile of the relationship between total assets and net worth; table 32 provides a profile of the relationship between gross estate and net worth.

Tables 30 and 31 provide a comparison of all top wealthholders to those with net worth of less than \$60,000. Of the 9.0 million top wealthholders, 2.4 million had a net worth of less than \$60,000. They accounted for only 8 percent of the total assets. Many of the individuals with net worth of less than \$60,000 are top wealthholders by virtue of the fact that they had large life insurance policies; others in the group, nearly one million of them, had total assets averaging more

than \$60,000, but debts brought net worth below the \$60,000 level. About 94 percent of those with net worth of less than \$60,000 had life insurance compared to 66 percent of the wealthholders with net worth of \$60,000 or more. Those in the under \$60,000 net worth category also had a significantly higher level of debts than other top wealthholders. The ratio of their debts to total assets was 44 percent compared to 10 percent for other top wealthholders.

Chart 2
Top wealthholders as a percent of adult population for men and women, by age and marital status, 1969



Note: "Other" marital status category includes legally separated, divorced, and marital status not stated.

Table B. —NUMBER OF TOP WEALTHHOLDERS UNDER THREE MEASURES OF WEALTH, BY SIZE OF WEALTH, 1969

[All figures are estimates based on estate tax return samples—numbers are in thousands]

Size class	Number as measured by--		
	Net worth	Total assets	Gross estate
	(1)	(2)	(3)
Total.....	9,013	9,013	9,013
Under \$100,000.....	5,312	4,620	3,341
\$100,000 under \$300,000.....	2,937	3,504	4,624
\$300,000 under \$1,000,000.....	643	749	900
\$1,000,000 or more.....	121	140	148

Top Wealthholders in the Total Population

The number of top wealthholders in the United States in 1969 was estimated to be 9,013,000, or 7.4 percent of the total adult population. More than 3,370,000 top wealthholders were women, accounting for about 5 percent of the adult female population, while the remainder were men accounting for 10 percent of the adult male population.

As expected, the proportion of the population in the top wealthholder group increased with age, from about 5 percent of those "under age 50"; 11 percent of those "age 50 under 65"; and nearly 12 percent of those age 65 or older.

Chart 2 provides the proportion of men and women that were top wealthholders by age and marital status.

Wealth Profile

The composition of wealth is related to age, sex, marital status, and the total amount of wealth held. For a number of reasons the present report can only provide partial answers to the question of the direction and magnitude in which these influences interact. One limitation is that the asset categories are quite broad and not always very homogeneous.

Individual movements within an asset category may be obscured or confounded by other, perhaps opposite, tendencies. Even within such a relatively homogeneous category as publicly traded stock, important but unobserved changes in portfolio composition may occur. Because of the graduated income taxes, there may be a shift toward growth stocks with lower yields as wealth increases.

Types of wealth held by men and women

More men were in the top wealthholder group, but, on the average women held more wealth and of different composition. Men averaged about \$163,000 in total assets, compared to about \$195,000 for women. Women held an average of \$102,000 in corporate stock and \$27,000 in cash, compared to \$72,000 and \$19,000 respectively for men. Men had noncorporate business assets averaging \$39,000 and life insurance equity averaging less than \$6,000 compared to \$27,000 and \$2,000 respectively for the same items for women.

As a percent of total assets, the debts and mortgages of men were twice those of women, 16 percent compared to 8 percent. The reason for the large difference in the debt relates to the fact that proportionally more men hold the assets which are typically mortgaged, such as real estate and business assets.

Table C indicates some of the differences between the holdings of men and women. Proportionally more men than women own real estate, noncorporate business assets and life insurance; more women owned corporate stock, bonds of all types, and notes and mortgages. The overall differences are large for only a few items. About 34 percent of the men had noncorporate business assets, and 89 percent had life insurance, compared to 15 percent and 46 percent respectively, for women who held these assets. On the other hand, 6 percent of the women held State and local bonds, and 10 percent held other Federal bonds, compared to 3 percent and 5 percent of the men respectively.

Age and marital status

Men between the ages of 40 and 50 years controlled about one-quarter of the total assets, while men between the ages of 40 and 60 controlled about one-half the total assets held by men. As indicated in chart 3 men under age 40 accounted for nearly 12 percent of the male-held assets, and the remaining 40 percent was distributed among men 60 years or older in decreasing proportions as age increased.

For women the pattern was different. About 18 percent of female-held assets were controlled by women between the ages of 40 and 50, while more than 40 percent were con-

Table C.—ASSETS, DEBTS, AND NET WORTH FOR MALE AND FEMALE TOP WEALTHHOLDERS, 1969

[All figures are estimates based on estate tax return samples—numbers are in thousands, money amounts are in billions of dollars]

Item	Total		Men		Women	
	Number of top wealthholders	Amount	Number of top wealthholders	Amount	Number of top wealthholders	Amount
	(1)	(2)	(3)	(4)	(5)	(6)
Total assets.....	9,013	1,580.6	5,643	921.9	3,370	658.7
Corporate stock.....	6,600	551.4	4,051	291.4	2,549	260.1
Bonds, total.....	(1)	85.4	(1)	42.0	(1)	43.2
Corporate and foreign	1,312	15.5	754	8.6	558	6.8
State and local.....	399	23.2	177	10.8	222	12.4
Federal savings.....	2,422	20.0	1,474	10.7	948	9.3
Other federal.....	647	26.6	308	11.9	338	14.7
Real estate.....	7,400	428.3	4,810	274.9	2,590	153.0
Cash.....	8,591	189.8	5,398	102.4	3,193	87.2
Noncorporate business assets.....	2,429	88.8	1,909	74.7	519	14.1
Notes and mortgages.....	2,597	59.4	1,588	36.6	1,009	22.8
Life insurance equity.....	6,559	31.0	5,006	28.1	1,552	2.8
Other assets.....	8,161	147.0	5,215	71.6	2,945	75.4
Debts.....	7,996	203.7	5,063	147.1	2,932	56.6
Net worth.....	9,013	1,377.0	5,643	774.8	3,370	602.2

¹Not available.

NOTE: Detail may not add totals because of rounding.

Chart 3
Percent distribution of assets by age group, 1969

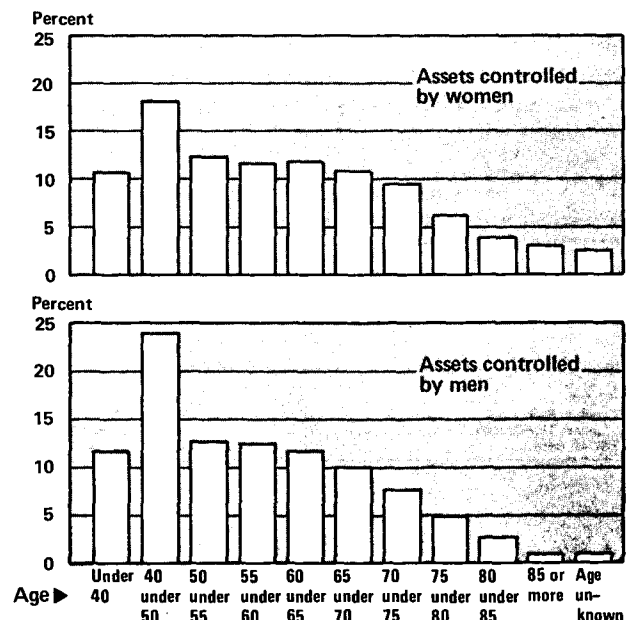
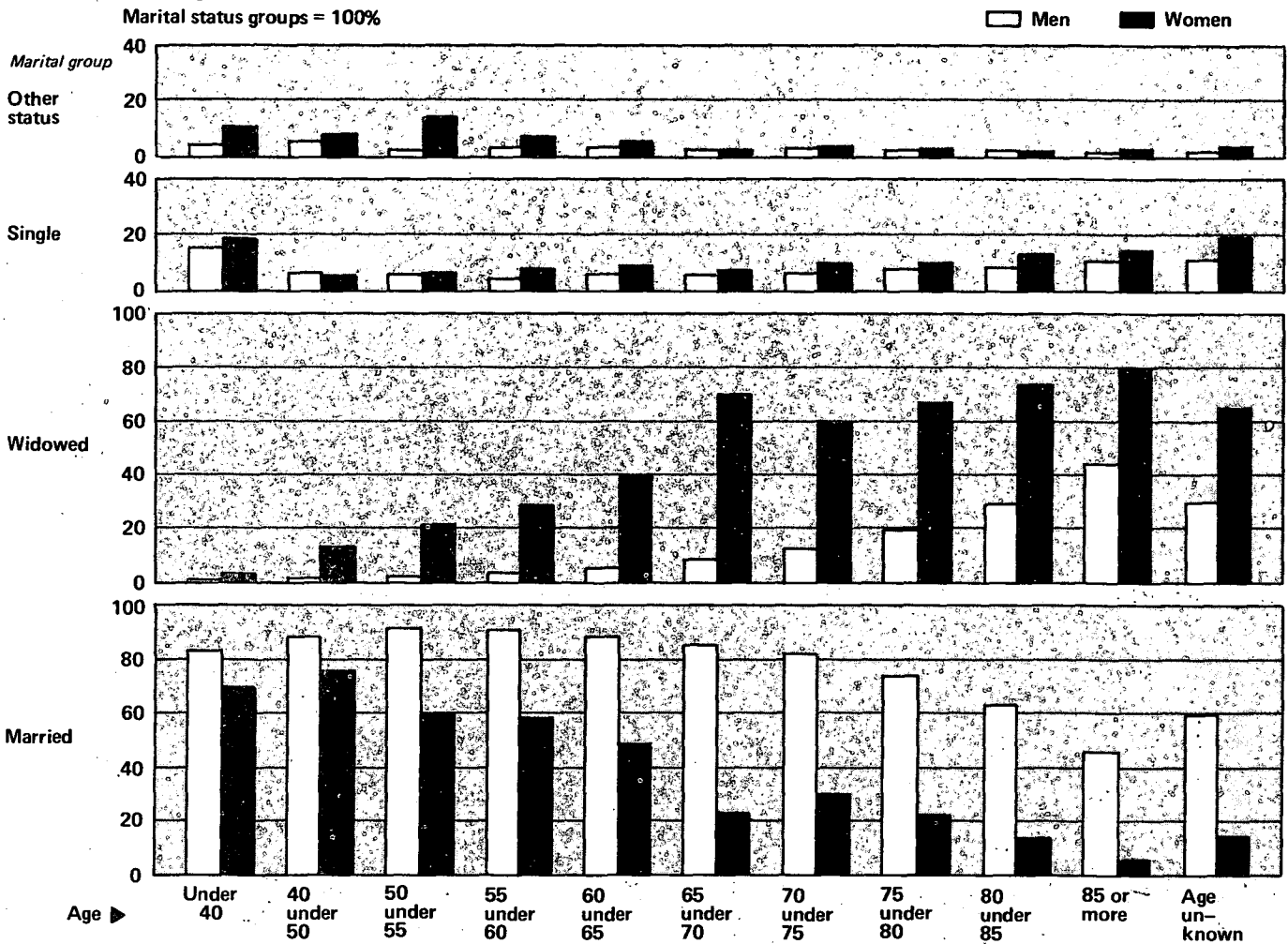


Chart 4
Percent of total assets controlled by each marital group of men and women,
by age group, 1969



trolled by those of ages 40 to 60 years. Chart 3 shows that about one-fifth of the assets were held by women between 65 and 75 years old.

The vast majority of the males were married, while less than one-half of the female top wealthholders were married. Only 5 percent of the men were widowers, while more than one-third of the women were widows. When the top wealthholders' age is taken into account the marital status pattern in wealthholding is that shown in chart 4, in terms of the proportion of total assets controlled by each age group for men and women.

For married top wealthholders corporate stock and real estate accounted for 34 percent and 30 percent of total assets, respectively. For those not married, corporate stock was a significantly greater proportion of total assets than real estate, as indicated in chart 5. Cash, which includes bank deposits and savings accounts, was the third most important asset item, and ranged from about 18 percent for "singles" to about 10 percent for "marrieds" and "others".

Although it is not shown in chart 5, a comparison with data for 1962 (see "Trends in Wealthholding" Section) indicates that cash in 1969 made up a significantly higher proportion of total assets for all groups of top wealthholders.

The charts on the following pages give some idea of the direction and importance of the interaction of age, sex, and marital status and size of wealth. Data for a more extensive analysis of asset composition will be found in tables 24-29.





Size of Wealth

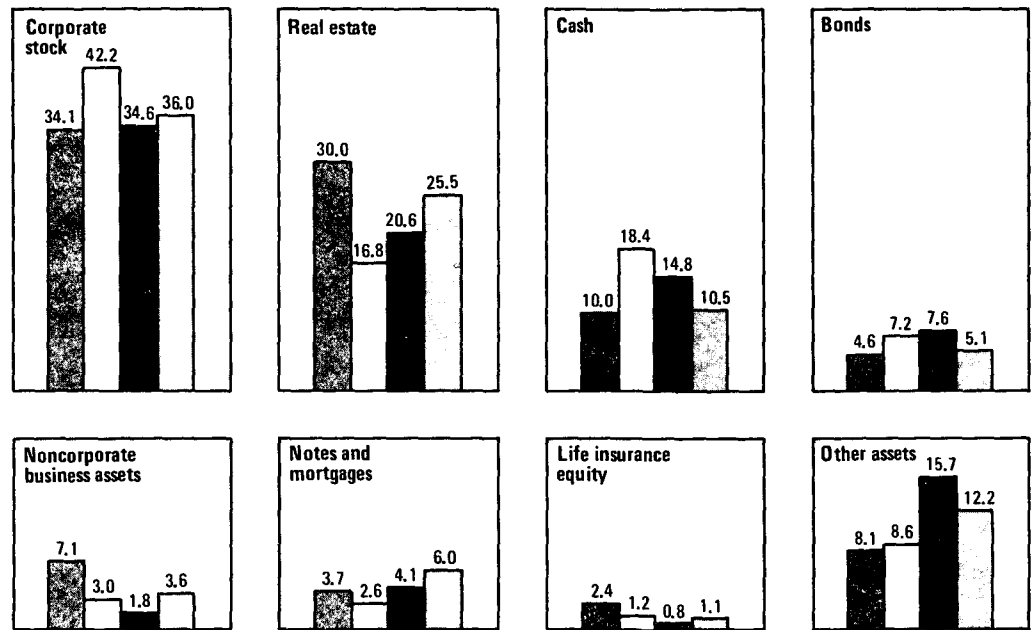
Chart 6 shows the variation in the composition of assets as related to amount of wealth. Those top wealthholders with a net worth of less than \$50,000 had an average of 55 percent of their assets in real estate, and every other asset item averaged 10 percent or less of the total. There were significant differences between men and women in the extent to which certain assets were held. The two dominant asset items, real estate and corporate stock, ranged from about 58 to 72 per-

Chart 5
Asset composition by marital status

Percent of each asset to total assets

Marital Class

-  Married
-  Single
-  Widowed
-  Other



cent of the assets of women. For men, these two asset items accounted for about 57 to 63 percent of total assets. For both men and women the relative importance of real estate steadily decreased as wealth increased, whereas the proportion of corporate stock held increased as wealth increased. Corporate stock, about one-tenth of total assets for both men and women with net worth of \$50,000 or less, accounted for over one-half of the assets of men who were millionaires, and three-fifths of the assets of women with net worth of \$1 million or more. Certain types of bonds were favored by the wealthy. Of the categories shown in chart 6, women with net worth of \$50,000 under \$100,000 had the highest holdings of Federal savings bonds at 2.7 percent, and no correlation to amount of wealth is apparent. The bonds favored by millionaires were State and local bonds and other Federal bonds, which included Treasury notes and bills as well as special issues that could be used to pay estate taxes at death. Holdings of both these types of bonds increased steadily as wealth increased, from a fractional percentage of total assets for the lowest wealth category to a total of 6.7 percent for millionaire women. For millionaires, while the proportion of total assets was small, on the average they held \$256,000 in these two types of bonds.

Three asset items, corporate stock, real estate, and cash accounted for 72 percent of the assets of all top wealthholders. As indicated in chart 7, the average holdings of these items vary with size of wealth. As would be expected, for those in the lower net worth categories, real estate holdings dominated total assets. Those top wealthholders with real estate and net worth between zero and \$30,000, had real estate that averaged between \$25,000 and \$30,000 in value, probably a personal residence in most cases. The average value of real estate increased gradually as net worth increased, and re-

mained the most important asset item to a level in wealth of about \$150,000, when corporate stock became more important. Chart 7 provides a clear indication of the relationship between these asset items. Although they are not included in the chart, over 71,000 top wealthholders had negative net worth and over one-half of them had corporate stock and real estate which averaged \$20,000 and \$60,000 respectively; cash was held by 86 percent of them, and averaged \$56,000. Obviously many of these top wealthholders had both high assets and high debts.

For the wealthiest group, corporate stock is the most important asset item, and is held to some extent by virtually all of them. Top wealthholders worth \$1 million or more have, on the average, \$1.5 million in corporate stock and those worth \$10 million or more hold, on the average, more than \$10 million in corporate stock.

In general, the size of a top wealthholder's net worth bears the most persistent and dominant relation to asset composition, particularly in the holding of insurance, stock, and real estate. Sex and age play less important roles but are useful classifiers of such assets as insurance which is considerably more common among men and the holding of bonds which is closely related to age and wealth. Single people also seem to differ in asset preference from the married and widowed. However, sometimes differences between groups are so small that it is impossible to determine whether the differences are due to anything more than sampling variability. A summary of these relationships and description of major shifts is presented with the charts which follow.

The charts on the following pages present three profiles of the holdings of assets and debts. The proportion of the asset type to total assets is shown for each wealth group by age, sex, and marital status. For example, single men under 50 years

Chart 6

Asset composition by size of net worth

Percent of each asset to total assets by sex

Size of Net Worth

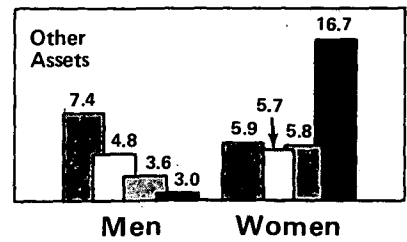
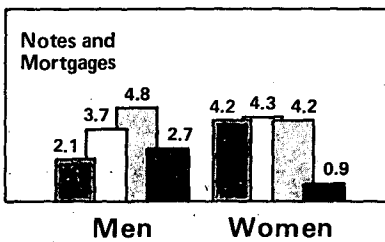
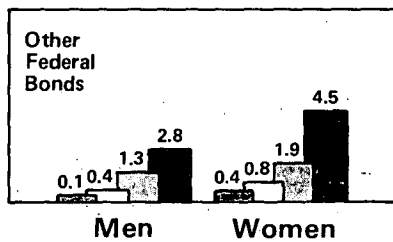
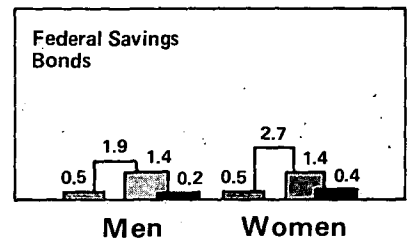
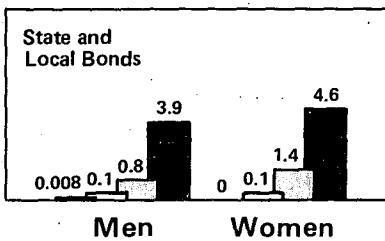
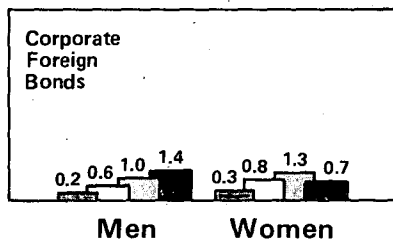
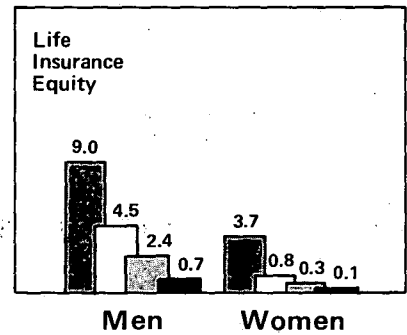
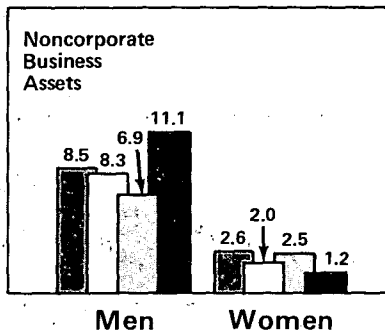
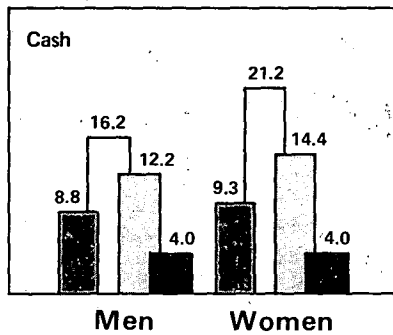
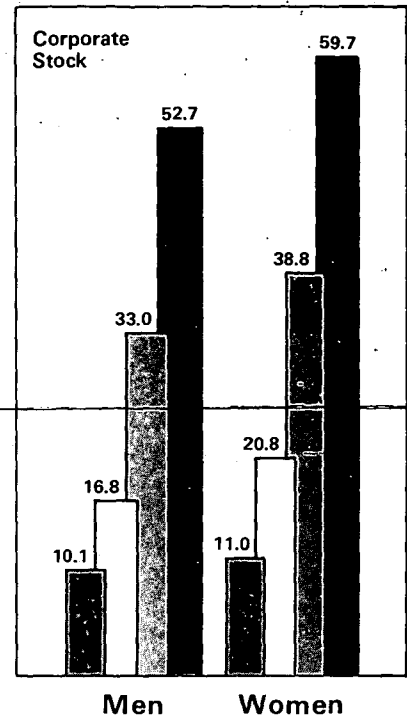
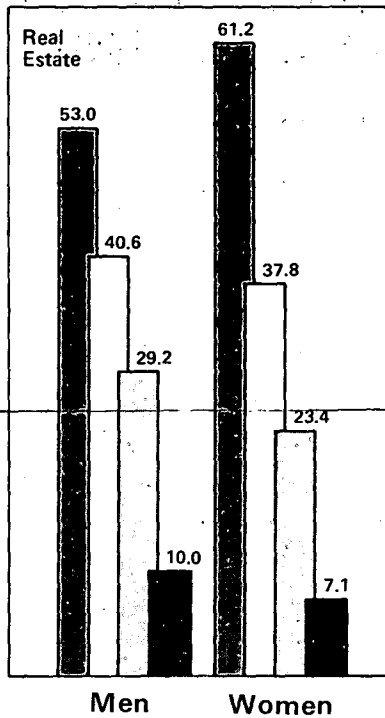
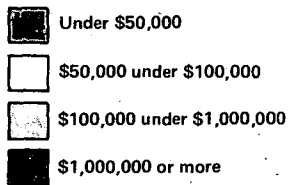


Chart 7

Average value of corporate stock, real estate, and cash, by size of net worth, 1969

Value of specific asset (Thousands of dollars)

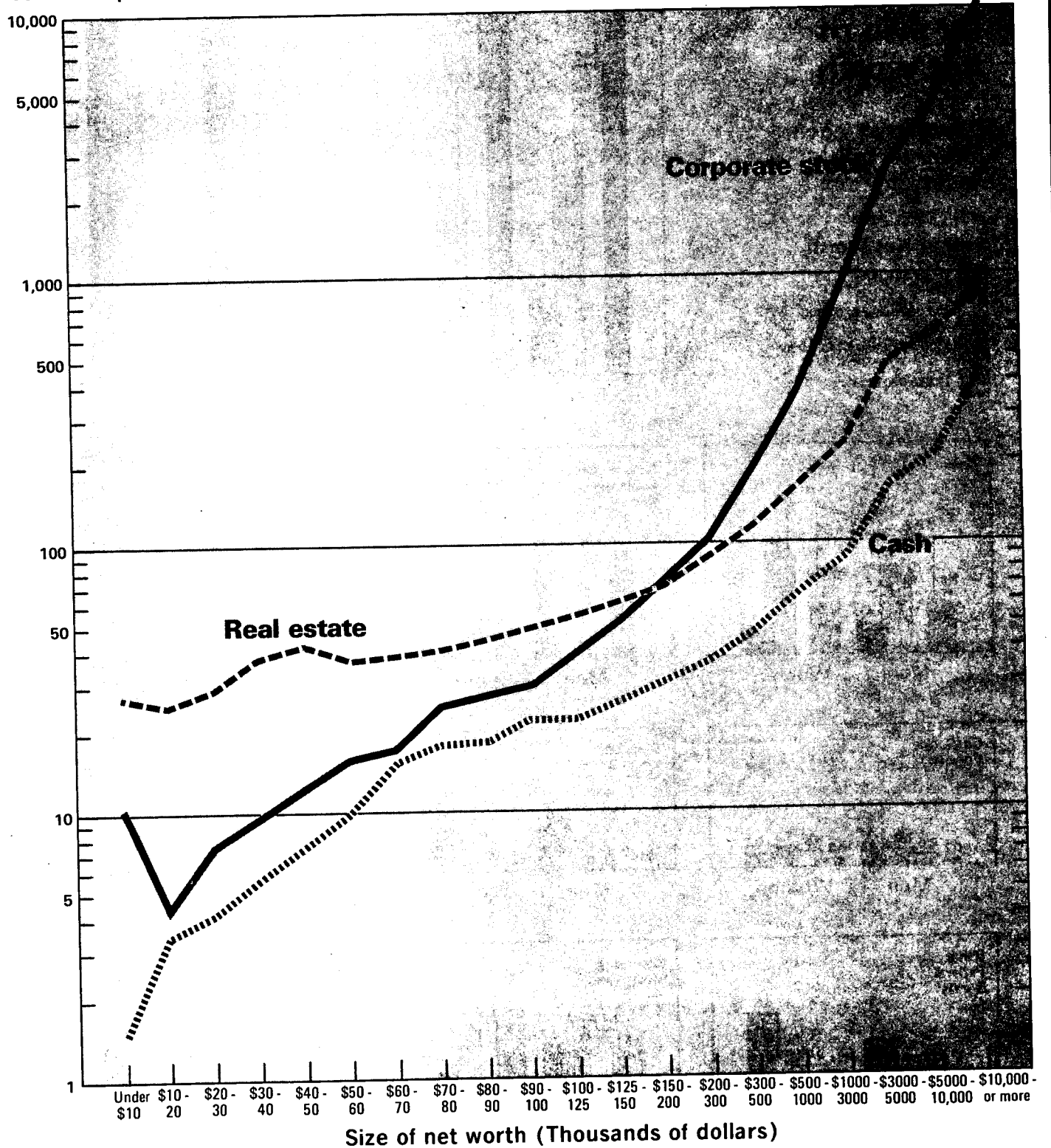
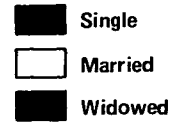


Chart 8

Marital status and age

Composition of Assets and Debts as a Percent of Total Assets for Men and Women, 1969



Total Assets = 100%

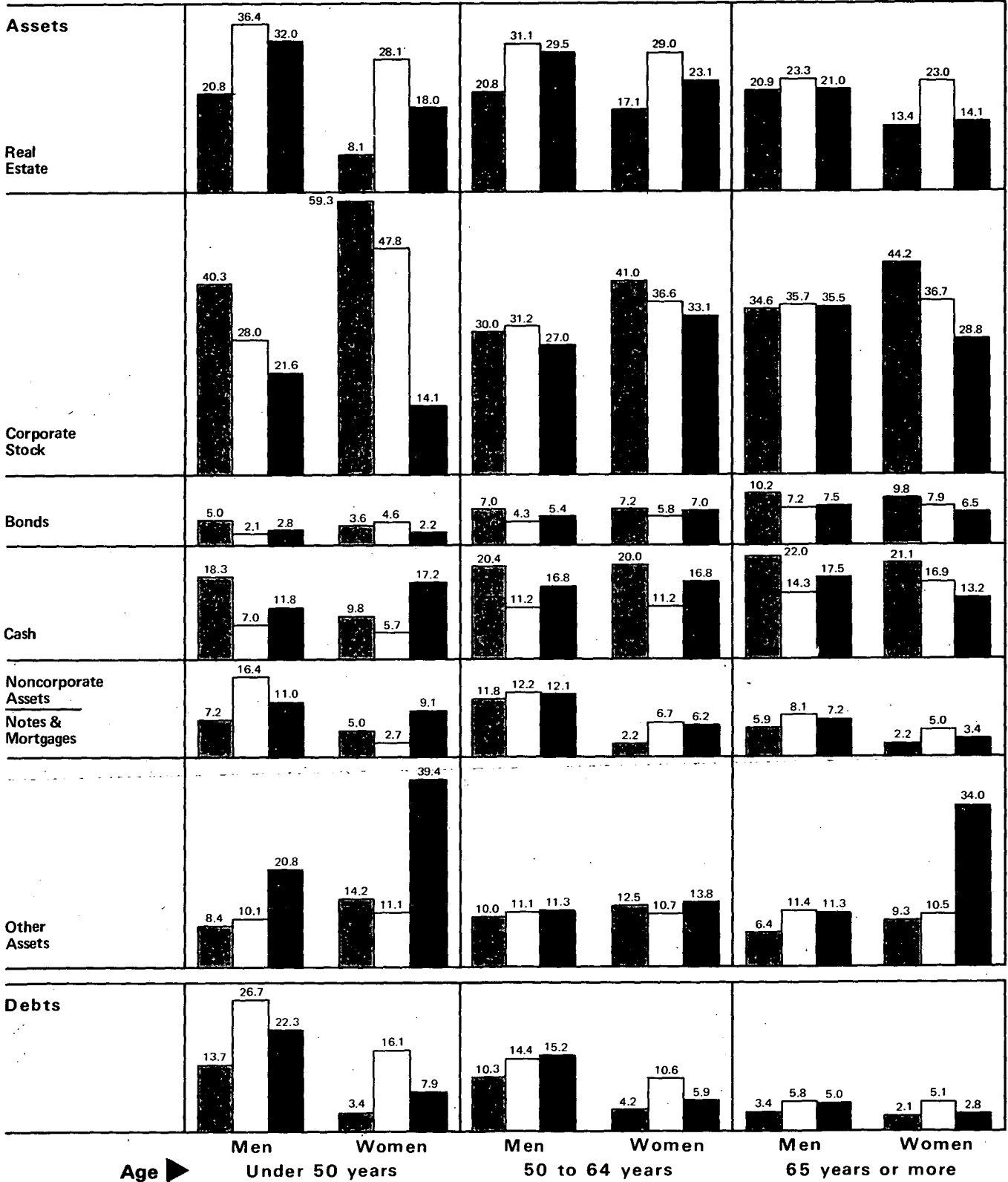


Chart 9

Net worth and marital status

Composition of Assets and Debts as a Percent of Total Assets for Men and Women, 1969

Total Assets = 100%

Net Worth Code

- Under \$60,000
- \$60,000 under \$100,000
- \$100,000 under \$500,000
- \$500,000 or more

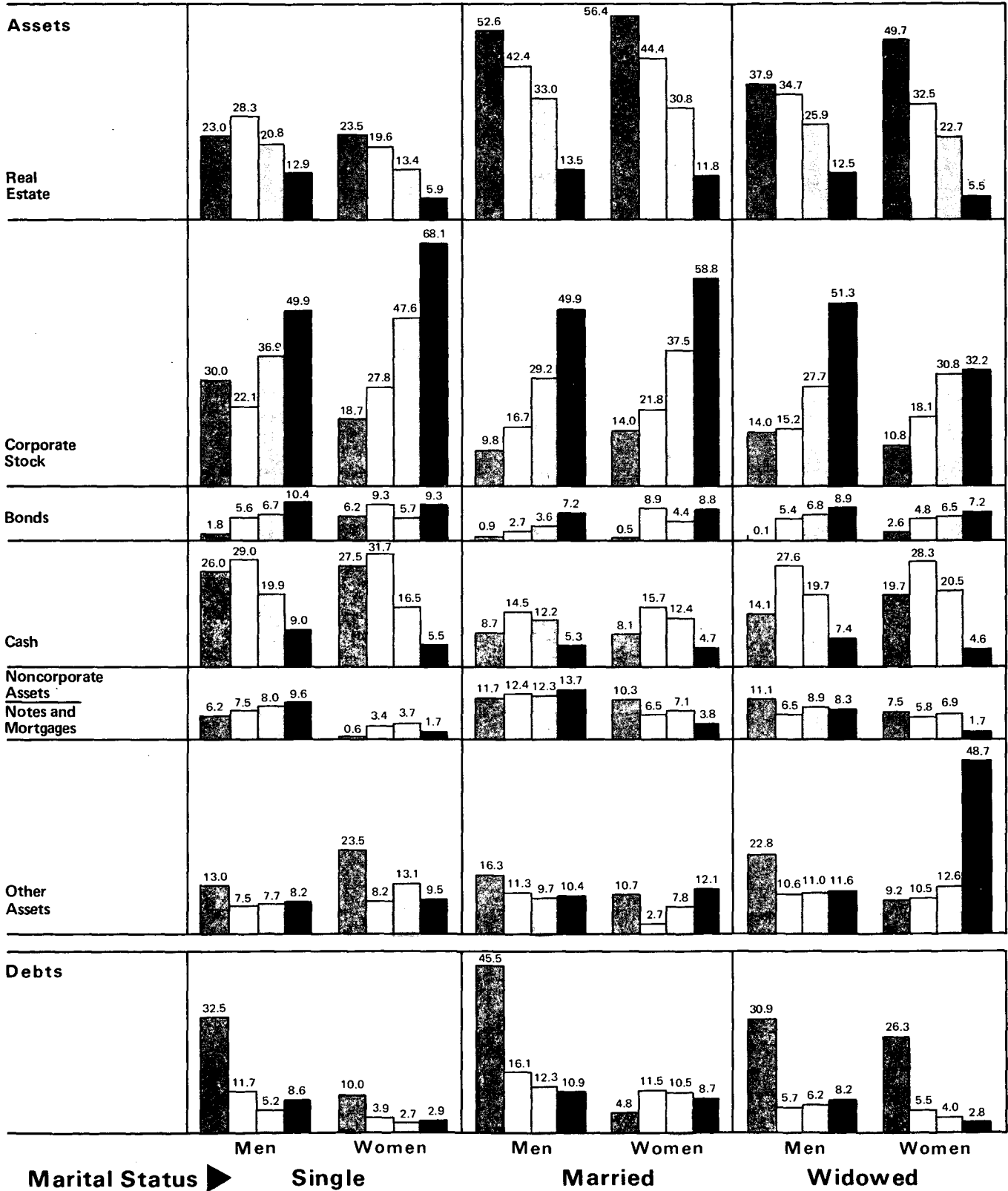


Chart 10

Net worth and age

Composition of Assets and Debts as a Percent of Total Assets for Men and Women, 1969

Total Assets = 100%

Size of Net Worth

- Under \$60,000
- \$60,000 under \$100,000
- \$100,000 under \$500,000
- \$500,000 or more

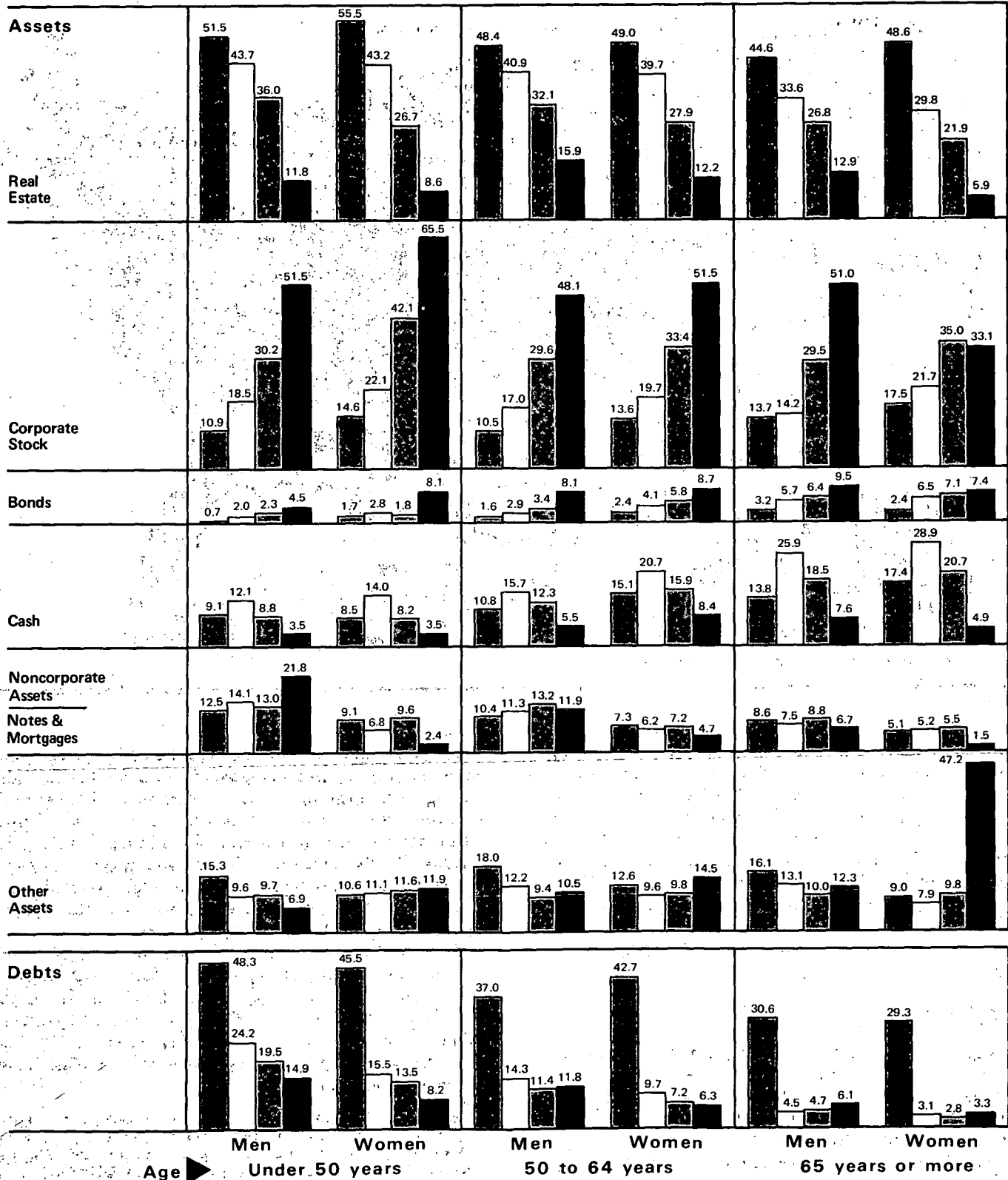
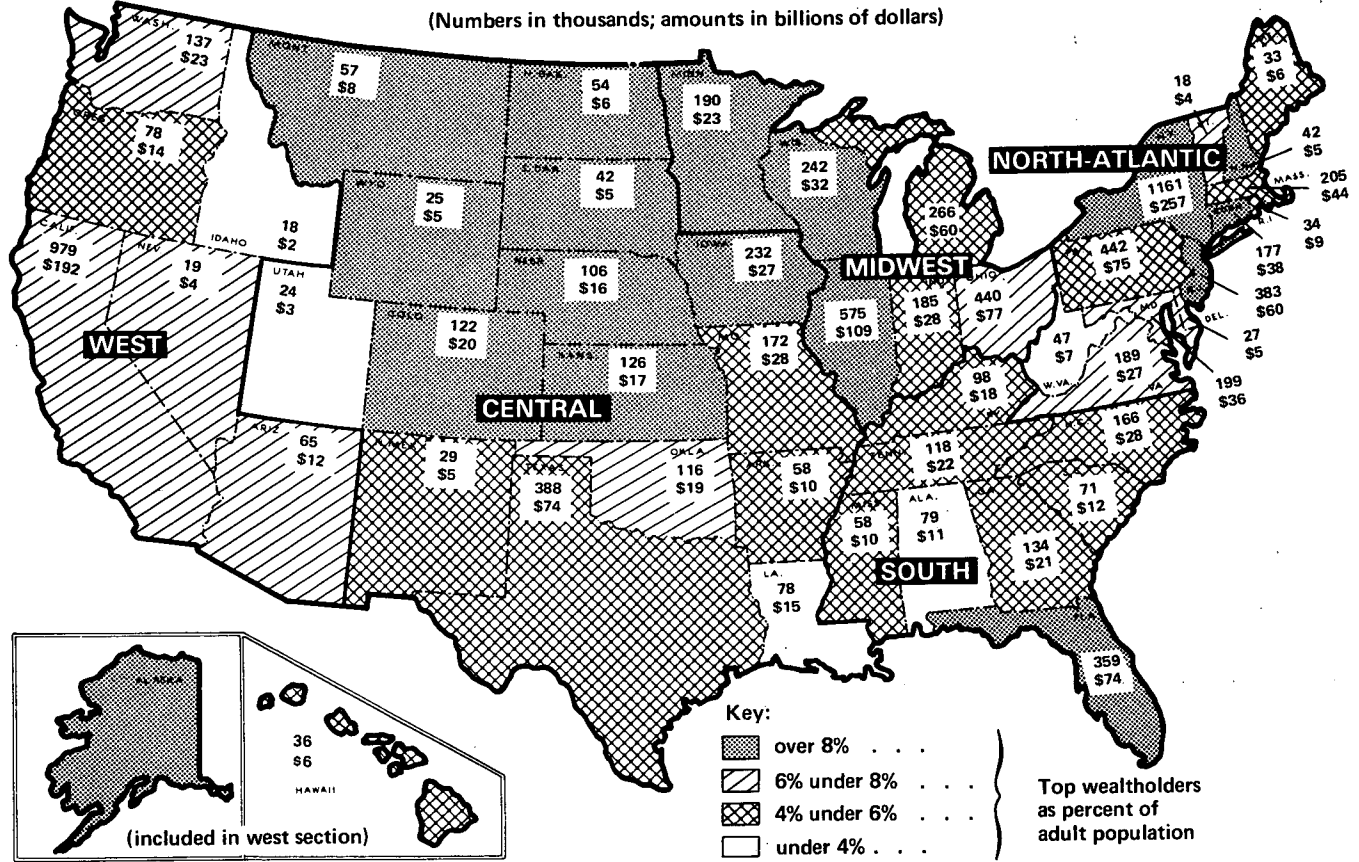


Chart 11

Number of top wealthholders, total assets, and proportion of adult population in top wealthholder group in each state, 1969



old have two-fifths of their assets in corporate stock, one-fifth in real estate, and debts of only 13 percent of total assets; single men with net worth under \$60,000 had 30 percent of their assets in corporate stock, 23 percent in real estate and their debts were nearly one-third of their assets. The charts can also be used to compare the variation in the holdings of a particular asset for groups of different characteristics. For example, the holdings of corporate stock as a percent of total assets show a very consistent pattern of growth as wealth increases for both men and women and regarding less of marital status.

Geographic Area

Though the distribution of top wealthholders generally reflected the population density in 1969, the proportion of top wealthholders for each State differed significantly by region of the country. Chart 11 indicates that the region with the highest relative concentration of top wealthholders was the block of States in the north-central part of the country, where predominantly large farms require high investments in

land and equipment. This is substantiated by the composition of assets in those States compared to others that had above-average concentrations of top wealthholders. Real estate and noncorporate business assets accounted for 40 to 60 percent of the total assets of top wealthholders in most of those States (Table 33). By contrast, in Florida and in the New England States that had over 8 percent of the adult population in the top wealthholder group, these two asset items accounted for between 20 and 30 percent of total assets.

The North-Atlantic section¹ of the country had one-third of the total number of top wealthholders, with New York having more than any other State, 1.2 million. The Midwest had 21 percent and the South had 12 percent (one-third of whom were in Florida). The Central States had 18 percent and the remaining 15 percent were in the West, most of whom were in California.

¹ Geographic areas are Office of Management and Budget Statistical Areas or combinations thereof. North-Atlantic section includes OMB Regions I, II, and III; South is Region IV; Midwest is Region V; Central is Regions VI, VII, and VIII; and West is Regions IX and X.

Basic Tables

Numbers of top wealthholders in the tables which follow are unrounded, primarily so frequencies could be presented in many data cells containing less than 1,000 top wealthholders. This convention has been followed to make it easier for the reader to use the tables and preserve the accuracy of any appropriate data combinations. In terms of any economic analysis based on these data, it is recommended that the

number of top wealthholders be rounded to the nearest thousand, because this is more consistent with the accuracy of the estimation technique.

Amounts have been provided in millions of dollars in keeping with the presumed accuracy of this technique. An asterisk (*) appears in every data cell where the amount is less than \$500,000.

Table 1.—ALL TOP WEALTHHOLDERS, BY SIZE OF NET WORTH

[All figures are estimates based on estate tax return samples—money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth	Types of assets			
			Number	Amount		Cash		Corporate stock	
						Number	Amount	Number	Amount
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	
Total.....	9,012,808	1,580,603	7,995,503	203,639	1,376,964	8,591,028	189,670	6,600,439	551,421
Negative net worth.....	71,414	5,843	71,414	9,682	-3,840	61,521	354	38,443	805
\$0 under \$50,000.....	1,743,741	88,678	1,574,454	40,247	48,431	1,611,756	8,016	982,901	8,875
\$50,000 under \$70,000.....	1,475,144	110,950	1,277,758	20,513	90,437	1,407,629	18,814	1,004,705	16,683
\$70,000 under \$100,000.....	2,022,102	190,804	1,714,828	22,214	168,589	1,923,323	36,560	1,454,814	39,031
\$100,000 under \$150,000.....	1,639,385	222,091	1,442,661	23,577	198,514	1,582,412	38,054	1,280,896	55,995
\$150,000 under \$300,000.....	1,297,638	293,871	1,181,406	28,911	264,960	1,249,373	41,244	1,129,679	97,846
\$300,000 under \$1,000,000.....	642,732	345,283	613,840	31,586	313,697	635,495	33,709	592,502	151,452
\$1,000,000 under \$5,000,000.....	111,322	211,984	109,818	19,347	192,637	110,189	10,385	107,328	119,801
\$5,000,000 under \$10,000,000.....	5,917	44,392	5,911	3,665	40,727	5,917	1,227	5,782	25,640
\$10,000,000 or more.....	3,413	66,706	3,413	3,896	62,810	3,413	1,306	3,389	33,293

Size of net worth	Types of assets—Continued									
	Corporate and foreign bonds		Government bonds						Life insurance equity	
	Number	Amount	State and local bonds		Federal savings bonds		Other Federal bonds		Number	Amount
Number			Amount	Number	Amount	Number	Amount			
(10)	(11)	(12)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	
Total.....	1,311,870	15,500	399,173	23,249	2,422,559	20,035	646,570	26,619	6,558,764	30,974
Negative net worth.....	2,965	10	-	-	5,009	1	113	(*)	67,193	476
\$0 under \$50,000.....	89,697	185	1,514	6	375,297	441	34,080	120	1,687,789	7,353
\$50,000 under \$70,000.....	116,489	532	10,900	81	419,034	2,064	56,957	468	1,101,469	4,130
\$70,000 under \$100,000.....	264,031	1,626	31,442	230	570,919	4,682	114,522	1,243	1,344,363	4,605
\$100,000 under \$150,000.....	266,646	2,175	49,751	514	484,665	4,403	114,278	1,522	1,071,201	4,596
\$150,000 under \$300,000.....	299,253	3,207	119,641	2,054	359,956	4,523	145,008	3,277	814,471	4,863
\$300,000 under \$1,000,000.....	220,467	4,283	128,062	6,637	180,221	2,907	140,358	8,320	404,705	3,633
\$1,000,000 under \$5,000,000.....	46,571	2,787	50,856	8,268	25,367	593	36,840	5,528	62,107	1,114
\$5,000,000 under \$10,000,000.....	3,112	363	4,470	3,053	510	10	2,659	2,561	3,147	121
\$10,000,000 or more.....	2,639	330	2,405	2,405	1,581	409	1,755	3,579	2,319	824

Size of net worth	Types of assets—Continued								Estate tax return statistics		
	Notes and mortgages		Real estate		Noncorporate business assets		Other assets		Number of returns	Gross estate	Net worth
	Number	Amount	Number	Amount	Number	Amount	Number	Amount			
(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)	(29)	(30)	
Total.....	2,597,026	59,440	7,400,060	427,955	2,428,804	88,776	8,160,566	146,965	133,941	29,666	26,911
Negative net worth.....	21,821	409	40,059	2,454	26,608	931	70,454	402	222	50	-15
\$0 under \$50,000.....	240,024	1,843	1,437,596	48,668	393,294	6,361	1,609,059	6,809	6,003	596	196
\$50,000 under \$70,000.....	341,844	3,953	1,245,964	47,364	408,771	7,850	1,316,479	9,010	19,721	1,510	1,244
\$70,000 under \$100,000.....	564,704	7,886	1,645,457	71,522	485,316	9,077	1,765,044	14,341	36,039	3,338	3,012
\$100,000 under \$150,000.....	526,935	9,711	1,355,321	76,638	475,421	13,143	1,466,196	15,340	30,531	4,053	3,706
\$150,000 under \$300,000.....	527,635	14,480	1,059,111	83,478	370,236	13,585	1,198,699	25,313	25,500	5,632	5,208
\$300,000 under \$1,000,000.....	308,515	15,109	520,735	69,925	219,903	16,713	615,447	32,595	13,366	7,001	6,562
\$1,000,000 under \$5,000,000.....	59,664	5,066	87,817	22,550	43,814	8,112	109,875	27,779	2,352	4,600	4,263
\$5,000,000 under \$10,000,000.....	3,114	534	4,698	2,834	3,174	1,369	5,902	6,680	145	1,063	985
\$10,000,000 or more.....	2,770	448	3,302	2,521	2,267	11,636	3,413	8,696	63	1,822	1,750

Table 2.—MALE TOP WEALTHHOLDERS, BY SIZE OF NET WORTH

[All figures are estimates based on estate tax return samples—money amounts are in millions of dollars]

Size of net worth	Number of top wealth-holders	Total assets	Debts and mortgages		Net worth	Types of assets			
			Number	Amount		Cash		Corporate stock	
						Number	Amount	Number	Amount
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	
Total.....	5,642,619	921,863	5,063,373	147,070	774,793	5,398,428	102,429	4,051,195	291,423
Negative net worth.....	63,647	4,626	63,647	7,445	-2,820	53,754	263	31,440	561
\$0 under \$50,000.....	1,558,092	77,255	1,411,311	34,758	42,497	1,437,028	6,933	873,005	7,726
\$50,000 under \$70,000.....	893,962	68,553	781,885	14,431	54,122	855,992	10,313	610,235	9,667
\$70,000 under \$100,000.....	1,069,198	104,313	911,296	15,178	89,135	1,032,549	17,721	782,818	19,291
\$100,000 under \$150,000.....	918,830	126,483	824,245	14,982	111,501	898,450	19,523	735,421	29,604
\$150,000 under \$300,000.....	708,130	165,789	654,705	20,549	145,239	694,634	21,823	615,188	49,729
\$300,000 under \$1,000,000.....	369,590	201,590	355,775	22,166	179,424	365,840	18,885	343,814	83,581
\$1,000,000 under \$5,000,000.....	56,721	110,428	56,067	56,067	97,974	55,732	5,829	54,884	58,982
\$5,000,000 under \$10,000,000.....	2,814	22,425	2,807	2,401	20,023	2,814	612	2,755	13,831
\$10,000,000 or more.....	1,635	40,401	1,635	2,705	37,696	1,635	526	1,635	18,451

Size of net worth	Types of assets—Continued									
	Corporate and foreign bonds		Government bonds						Life insurance equity	
	Number	Amount	State and local bonds		Federal savings bonds		Other Federal bonds		Number	Amount
			Number	Amount	Number	Amount	Number	Amount		
(10)	(11)	(12)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	
Total.....	753,773	8,650	177,282	10,813	1,474,450	10,726	308,179	11,930	5,006,529	28,141
Negative net worth.....	1,607	2	-	-	3,652	1	113	(*)	61,566	454
\$0 under \$50,000.....	77,103	153	1,514	6	341,739	377	30,118	66	1,543,857	6,908
\$50,000 under \$70,000.....	77,195	314	5,397	61	230,327	1,041	24,615	186	796,348	3,696
\$70,000 under \$100,000.....	130,493	790	9,839	68	319,857	2,273	45,883	474	892,744	4,040
\$100,000 under \$150,000.....	148,081	1,023	25,809	282	266,530	2,275	53,289	700	772,874	4,129
\$150,000 under \$300,000.....	168,594	1,705	48,811	704	197,196	2,574	65,199	1,462	577,681	4,404
\$300,000 under \$1,000,000.....	119,780	2,223	61,053	2,909	99,822	1,837	71,744	4,121	309,402	3,346
\$1,000,000 under \$5,000,000.....	27,967	1,987	21,926	3,958	14,463	336	15,735	2,432	48,466	995
\$5,000,000 under \$10,000,000.....	1,664	301	2,005	1,723	260	6	895	592	2,132	87
\$10,000,000 or more.....	1,289	151	928	1,100	604	5	588	1,897	1,479	81

Size of net worth	Types of assets—Continued								Estate tax return statistics		
	Notes and mortgages		Real estate		Noncorporate business assets		Other assets		Number of returns	Gross estate	Net worth
	Number	Amount	Number	Amount	Number	Amount	Number	Amount			
(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)	(29)	(30)	
Total.....	1,588,379	36,588	4,810,496	274,912	1,909,445	74,685	5,215,355	71,566	83,558	18,679	16,394
Negative net worth.....	17,955	243	32,822	1,899	22,212	838	62,688	363	200	46	-13
\$0 under \$50,000.....	193,346	1,475	1,302,440	41,491	361,536	6,121	1,442,276	5,999	5,492	552	178
\$50,000 under \$70,000.....	204,910	2,252	774,093	29,364	312,233	6,425	818,944	5,233	12,019	979	750
\$70,000 under \$100,000.....	316,888	4,099	922,663	40,839	374,457	7,903	968,850	6,814	21,062	2,040	1,767
\$100,000 under \$150,000.....	308,316	5,464	796,309	44,618	358,074	10,413	846,076	8,451	18,854	2,577	2,287
\$150,000 under \$300,000.....	313,292	8,414	616,560	53,374	282,623	10,411	658,786	11,190	15,828	3,594	3,235
\$300,000 under \$1,000,000.....	196,249	10,022	314,547	46,061	166,171	13,257	357,204	15,347	8,535	4,545	4,194
\$1,000,000 under \$5,000,000.....	33,924	3,928	47,237	14,006	28,899	6,746	56,097	11,229	1,443	2,879	2,620
\$5,000,000 under \$10,000,000.....	2,161	328	2,230	1,800	1,867	1,177	2,799	1,967	91	669	620
\$10,000,000 or more.....	1,338	364	1,595	1,460	1,373	11,394	1,635	4,972	36	796	756

Table 3.—FEMALE TOP WEALTHHOLDERS, BY SIZE OF NET WORTH

[All figures are estimates based on estate tax return samples—money amounts are in millions of dollars]

Size of net worth	Number of top wealth-holders	Total assets	Debts and mortgages		Net worth	Types of assets			
			Number	Amount		Cash		Corporate stock	
						Number	Amount	Number	Amount
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	
Total.....	3,370,189	658,740	2,932,129	56,569	602,171	3,192,599	87,240	2,549,242	259,998
Negative net worth.....	7,767	1,217	7,767	2,237	-1,020	7,767	91	7,003	243
\$0 under \$50,000.....	185,649	11,423	163,143	5,489	5,934	174,728	1,083	109,896	1,150
\$50,000 under \$70,000.....	581,182	42,397	493,873	6,082	36,315	551,637	8,502	394,469	7,016
\$70,000 under \$100,000.....	952,905	86,491	803,532	7,037	79,454	890,774	18,839	671,996	19,740
\$100,000 under \$150,000.....	720,555	99,608	618,416	8,596	87,013	683,962	18,530	545,475	26,391
\$150,000 under \$300,000.....	589,508	128,082	526,702	8,362	119,720	554,739	19,420	514,491	48,118
\$300,000 under \$1,000,000.....	273,142	143,693	258,065	9,419	134,274	269,655	14,824	248,688	67,871
\$1,000,000 under \$5,000,000.....	54,601	101,556	53,751	6,893	94,663	54,457	4,556	52,444	60,820
\$5,000,000 under \$10,000,000.....	3,103	21,968	3,103	1,263	20,704	3,103	615	3,027	11,809
\$10,000,000 or more.....	1,777	26,305	1,777	1,191	25,114	1,777	781	1,753	16,842

Size of net worth	Types of assets—Continued									
	Corporate and foreign bonds		Government bonds						Life insurance equity	
	Number	Amount	State and local bonds		Federal savings bonds		Other Federal bonds		Number	Amount
Number			Amount	Number	Amount	Number	Amount			
(10)	(11)	(12)	(13)	(14)	(15)	(16)	(17)	(18)	(19)	
Total.....	558,092	6,850	221,893	12,436	948,109	9,309	338,394	14,689	1,552,236	2,833
Negative net worth.....	1,357	8	-	-	1,357	(*)	-	-	5,646	22
\$0 under \$50,000.....	12,594	32	-	-	33,558	64	3,963	54	143,932	446
\$50,000 under \$70,000.....	39,294	218	5,503	20	188,706	1,023	32,342	283	305,121	433
\$70,000 under \$100,000.....	133,537	836	21,603	162	251,062	2,409	68,640	769	451,619	565
\$100,000 under \$150,000.....	118,565	1,152	23,942	231	218,135	2,128	60,988	822	298,327	467
\$150,000 under \$300,000.....	130,659	1,502	70,830	1,350	162,760	1,950	79,810	1,815	236,791	459
\$300,000 under \$1,000,000.....	100,687	2,060	67,010	3,727	80,400	1,070	68,614	4,199	95,303	287
\$1,000,000 under \$5,000,000.....	18,603	800	28,930	4,310	10,904	258	21,105	3,096	13,642	119
\$5,000,000 under \$10,000,000.....	1,447	62	2,465	1,330	250	4	1,764	1,969	1,015	34
\$10,000,000 or more.....	1,349	178	1,610	1,305	977	404	1,168	1,682	840	3

Size of net worth	Types of assets—Continued								Estate tax return statistics		
	Notes and mortgages		Real estate		Noncorporate business assets		Other assets		Number of returns	Gross estate	Net worth
	Number	Amount	Number	Amount	Number	Amount	Number	Amount			
(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)	(29)	(30)	
Total.....	1,008,647	22,852	2,589,565	153,043	519,358	14,092	2,945,212	75,399	50,383	10,988	10,518
Negative net worth.....	3,867	166	7,238	555	4,396	93	7,767	39	22	4	-3
\$0 under \$50,000.....	46,678	368	135,157	7,177	31,757	240	166,783	810	511	44	18
\$50,000 under \$70,000.....	136,934	1,701	471,871	18,000	96,538	1,425	497,535	3,777	7,702	532	494
\$70,000 under \$100,000.....	247,817	3,787	722,794	30,683	110,859	1,174	796,194	7,527	14,978	1,298	1,245
\$100,000 under \$150,000.....	218,618	4,247	559,012	32,021	117,347	2,730	620,120	6,889	11,678	1,476	1,420
\$150,000 under \$300,000.....	214,343	6,066	442,551	30,104	87,613	3,174	539,913	14,123	9,672	2,038	1,973
\$300,000 under \$1,000,000.....	112,266	5,087	206,188	23,864	53,732	3,456	298,242	17,248	4,831	2,455	2,369
\$1,000,000 under \$5,000,000.....	25,739	1,138	40,580	8,544	14,915	1,365	53,778	16,550	909	1,721	1,643
\$5,000,000 under \$10,000,000.....	953	206	2,467	1,034	1,307	192	3,103	4,713	54	394	365
\$10,000,000 or more.....	1,432	84	1,707	1,061	894	241	1,777	3,724	27	1,026	994

Personal Wealth Estimated From Estate Tax Returns, 1972

by Keith Gilmour and Charles Crossed

Introduction

This report provides estimates of the personal wealth of individuals with more than \$60,000 gross assets in 1972. The estimates are based on a sample of Federal estate tax returns filed during 1973 (such returns having been required for all individuals with more than \$60,000 gross estate at date of death).¹

The estate data which formed the basis for this report were published in *Statistics of Income—1972, Estate Tax Returns*, to which this volume is a supplement. This volume is the third personal wealth report to be published; the first two being for 1962 and 1969, respectively.

The underlying assumption in making these estimates is that death draws a random sample of the living population. The technique used to derive the estimates, called the "estate multiplier", relies on the fact that for the general population the mortality rate is known for each age and sex group. Therefore, if the number that died in each age/sex group is known, and the mortality rate for each group is known, then the population is simply the inverse of the mortality rate times the number of deaths in each group.

The estate multiplier technique is discussed further in Appendix A, but some problems associated with the technique are discussed here to provide an indication of some of the limitations inherent in the wealth estimates for the "top wealthholder" population provided in this report. The term "top wealthholder" is used throughout this report to refer to those in the living population with a gross estate of more than \$60,000 in 1972.

Perhaps the chief problem that confronts all applications of the estate multiplier technique is the lack of exact mortality rates appropriate to the top wealthholder population. This deficiency is very important, for there is much evidence to support the view that the mortality rates of those with economic well-being are more favorable than for the general population. On the basis of this evidence, which is discussed in detail in Appendix A, it is reasonable to assume that the mortality rates of top wealthholders are more favorable than the average mortality rates.

Other limitations associated with the estate multiplier technique that deserve early consideration relate to estate tax return reporting requirements and the wealth concepts for which measures are available.

Though the estate tax return is a rich source of economic information, generally prepared from records by highly skilled people and under exacting requirements of law, the

wealth reported on the return is not identical with what is ordinarily considered an individual's personal wealth. The financial value of life insurance to a living person, for example, is its cash surrender value; the estate of a deceased person includes the insurance at its full face value. In the estimates presented in this report, insurance proceeds were adjusted so both equity and face values of insurance could be included in different concepts of wealth.

Gifts and other transfers of wealth which were made by the decedent within 3 years of death are included as part of the wealth in this report. Such wealth must be reported on the estate tax return on the theory that the transfer was made in contemplation of death.

Some duplication in wealth is included in these estimates to the extent that the estate returns of both benefactors and beneficiaries were filed in 1973. This is also true with respect to jointly-held property which is included as wealth of one person.

Some types of wealth such as pensions, annuities, and trust interests, represented only by an income right of the decedent; and, certain community property interests; are excluded from the estimates.

The valuation of estate tax return assets may be understated for other reasons. The estimates are based on returns as filed before audit, and assets for which no ready market exists could be undervalued by the executor in the interest of minimizing the estate tax. In addition, the option to use an alternate valuation had the effect of reducing reported wealth. For returns used in this report, those filed in 1973, the alternate method permitted valuation 6 months after death, or on the date of disposal if within that period.

The estimates in this report should be relatively accurate with regard to showing the patterns of asset holdings among different age, sex, and marital status groups of top wealthholders. The estimates are less precise in terms of the absolute value of these asset holdings.

Summary of Findings

There were an estimated 12.8 million individuals in the living population in 1972 with gross estate of more than \$60,000. These 12.8 million top wealthholders represented about 6.1 percent of the total population in October (the point in time about which these estimates center). Slightly more than 7.8 million of this group were men, while 5.0 million were women, representing 7.7 percent and 4.7 percent of their respective population totals.

The top wealthholders had total assets valued at \$2.2 trillion and debts of \$0.3 trillion, resulting in net worth of \$1.9 trillion. As indicated in table A, over three-fifths of the

¹ The time period for these estimates would center around October 1972, since 66 percent of the estate tax returns were for individuals who died in 1972; 28 percent for 1973 decedents; and only 6 percent for individuals who died in 1971 or earlier years.

Table A.—NUMBER OF TOP WEALTHHOLDERS AND ASSET COMPOSITION BY SIZE OF NET WORTH, 1972

[All figures are estimates based on estate tax return samples—number of top wealthholders are in thousands, dollar amounts are in billions]

Item	Total	Size of net worth				
		Under \$50,000	\$50,000 under \$100,000	\$100,000 under \$500,000	\$500,000 under \$1,000,000	\$1,000,000 or more
	(1)	(2)	(3)	(4)	(5)	(6)
Number of top wealthholders	12,815	2,906	5,141	4,283	305	180
Total assets.....	2,152	151	444	881	226	449
Debts.....	300	99	67	85	19	31
Net worth.....	1,852	53	377	797	208	417
Types of assets:						
Cash.....	278	11	85	143	19	19
Corporate stock.....	629	12	65	239	98	215
Bonds.....	124	1	14	44	16	49
Real estate.....	645	83	190	273	44	55
All other.....	475	44	89	183	49	109

NOTE: Detail may not add to total because of rounding.

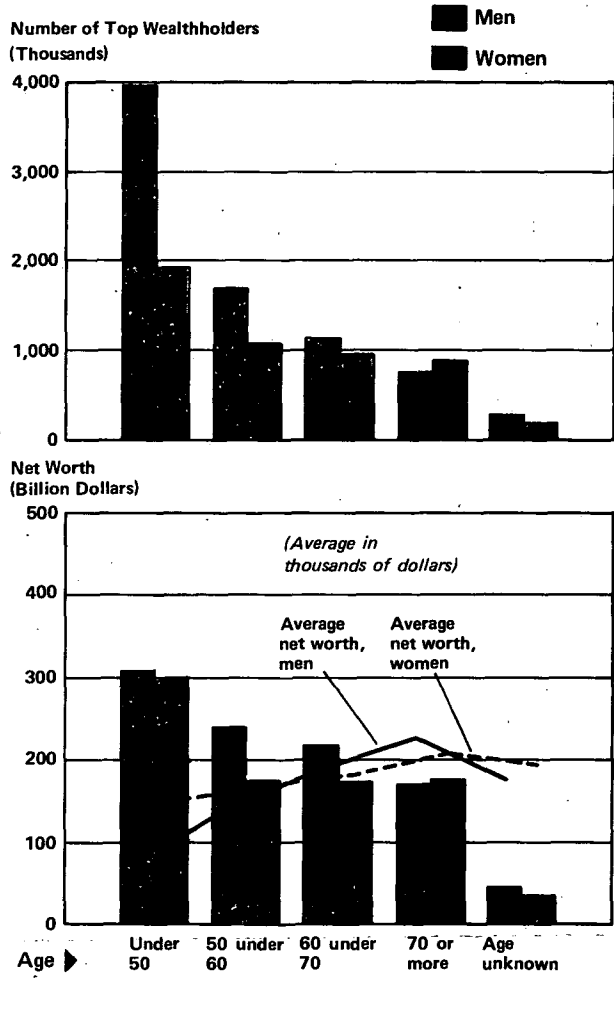
top wealthholders had a net worth of less than \$100,000. About 4 percent of the top wealthholders had a net worth of \$500,000 or more. Overall, real estate, at \$645 billion, was the largest single asset item in the top wealthholders' balance sheet. Corporate stock, the leading component in the 1962 and 1969 wealth estimates, amounted to \$629 billion in 1972. Over two-fifths of the total value of real estate was held by those with net worth of less than \$100,000, while, in contrast, almost one-half of the corporate stock was held by those with net worth of \$500,000 or more.

Chart 1 shows that the pattern of wealth among men was closely related with age. As age increased, the average net worth steadily increased, from \$78 thousand for those under age 50 to more than \$226 thousand for those age 70 or more. The pattern for women was not as closely related to age, probably due to the way much of their wealth was obtained (i.e., through inheritance).

In terms of age, women top wealthholders were generally older than men. Over half of the men and about two-fifths of the women were under age 50. In contrast, over one-quarter of the women were age 65 and over compared to about one-fifth of the men.

The vast majority of male top wealthholders were married, over 80 percent, while less than 7 percent were widowers. In comparison, 45 percent of the female top wealthholders were married and 36 percent were widows. Single individuals ac-

Chart 1
Number of top wealthholders, net worth, average net worth for men and women, 1972



counted for about 8 percent and 11 percent of the male and female top wealthholders, respectively.

Top Wealthholders in Perspective

Concepts of Wealth

As indicated in the Introduction, this report provides estimates of the number and wealth of individuals with a "gross estate" of more than \$60,000 in 1972. The gross estate criterion is a Federal estate tax concept of wealth that does not conform to more usual definitions of wealth mainly because life insurance at face value is included as wealth of the decedent. Therefore, three measures of wealth are used throughout this report; gross estate, total assets, and net worth. Since net worth is the more usual concept of wealth, it is used as the major classifier.

Gross estate is the gross value of all assets including the full face value of life insurance reduced by policy loans and before the reduction by the amount of debts. This measure defines those included in the top wealthholder group.

Total assets, a lower wealth value, is still essentially a gross measure. This is obtained by using the cash value of the life

insurance asset; that is, the value the insurance had immediately prior to death.

Net worth, of course, is the level after all debts have been removed, and includes the cash value of life insurance. Table B indicates the number of top wealthholders at four wealth levels, using the three definitions of wealth. Whereas an estimated 218 thousand individuals were millionaires according to the value of their gross estate, only 180 thousand were in the millionaire category in terms of net worth.

Wealth Profile

The composition of wealth is related to age, sex, marital status, and the total amount of wealth held. For a number of reasons the present report can only provide partial answers to the question of the direction and magnitude in which these influences interact. One limitation is that the asset categories are quite broad and not always very homogeneous.

Individual movements within an asset category may be obscured or confounded by other, perhaps opposite, tendencies. Even within such a relatively homogeneous category as publicly traded stock, important but unobserved changes in portfolio composition may occur. Because of the graduated income taxes, there may be a shift toward growth stocks with lower yields as wealth increases.

Types of wealth held by men and women

Although more men were in the top wealthholder group, on the average women held more wealth (\$188 thousand of total assets to \$155 thousand for men). Table C indicates the differences in the composition of asset holdings of men

Table B.—NUMBER OF TOP WEALTHHOLDERS BY MEASURES OF GROSS AND NET WEALTH, 1972
[All figures are estimates based on estate tax return samples—numbers are in thousands]

Size class for particular measure	Number as measured by—		
	Net worth	Total assets	Gross estate
	(1)	(2)	(3)
Total.....	12,815	12,815	12,815
Under \$100,000.....	8,047	7,021	4,938
\$100,000 under \$500,000.....	4,283	5,217	7,233
\$500,000 under \$1,000,000.....	305	375	425
\$1,000,000 or more.....	180	203	218

NOTE: Detail may not add to total because of rounding.

Table C.—COMPOSITION OF WEALTH FOR MALE AND FEMALE TOP WEALTHHOLDERS, 1972
[All figures are estimates based on estate tax return samples—numbers are in thousands, dollars amounts are in billions]

Item	Male top wealthholders				Female top wealthholders			
	Number	Percent of total males	Amount	Percent of total assets	Number	Percent of total females	Amount	Percent of total assets
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total assets.....	7,810	100.0	1,209	100.0	5,006	100.0	943	100.0
Debts.....	6,724	86.1	219	18.1	4,159	83.1	81	8.6
Net worth.....	7,810	100.0	990	81.9	5,006	100.0	862	91.4
Types of assets:								
Cash.....	7,423	95.0	142	11.7	4,730	94.5	137	14.5
Corporate stock.....	5,177	66.3	334	27.6	3,410	68.1	296	31.4
Bonds, total.....	2,798	35.8	59	4.9	2,038	40.7	65	6.9
Corporate and foreign.....	967	12.4	15	1.2	872	17.4	13	1.4
Government, total.....	2,247	28.8	44	3.7	1,570	31.4	52	5.5
Federal savings.....	1,896	24.3	12	1.0	1,175	23.5	11	1.2
Other Federal.....	297	3.8	14	1.1	359	7.2	25	2.7
State and local.....	243	3.1	19	1.6	246	4.9	17	1.8
Life insurance equity.....	6,815	87.3	37	3.1	2,532	50.6	5	0.5
Notes and mortgages.....	1,831	23.4	50	4.2	1,258	25.1	36	3.8
Real estate.....	6,693	85.7	393	32.5	3,988	79.7	252	26.7
Noncorporate business.....	2,106	27.0	75	6.2	556	11.1	18	1.9
Other assets.....	7,216	92.4	119	9.8	4,386	87.6	135	14.3

NOTE: Detail may not add to total because of rounding.

and women. Proportionally, more men than women owned real estate, notes and mortgages, and noncorporate business assets. In contrast, more women owned corporate stock and bonds. As a percent of total assets, the debts of men were twice those of women, 18 percent compared to 9 percent. The reason for the large difference in debts relates to the fact that proportionally more men owned the assets which are typically mortgaged or debt-financed, such as real estate and business assets.

Age and marital status

Chart 2 shows the distribution of assets for men and women in various age brackets. About 36 percent of the assets controlled by women, and 37 percent of the assets controlled by men, represented individuals under age 50. Men in age groups 50 under 65 had almost 35 percent of the total male-held assets, compared to a figure of 32 percent for women.

Chart 3 presents a comparison of the asset composition of top wealthholders within marital status classifications. Married top wealthholders held proportionately more real estate and life insurance; single wealthholders had relatively more corporate stock and cash; widows and widowers had relatively more bonds; and "other" marital groups (divorced and separated) had relatively more business assets and notes and mortgages.

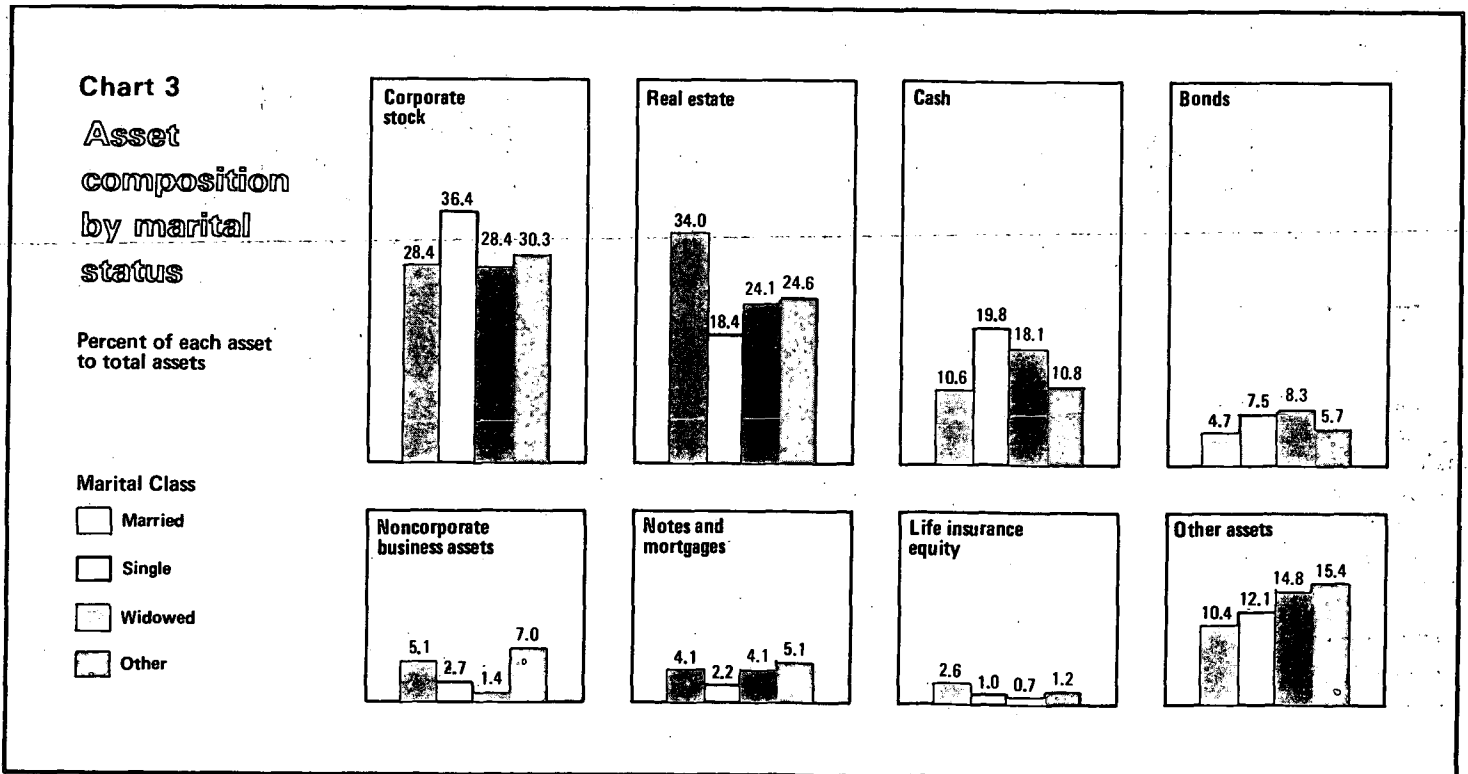
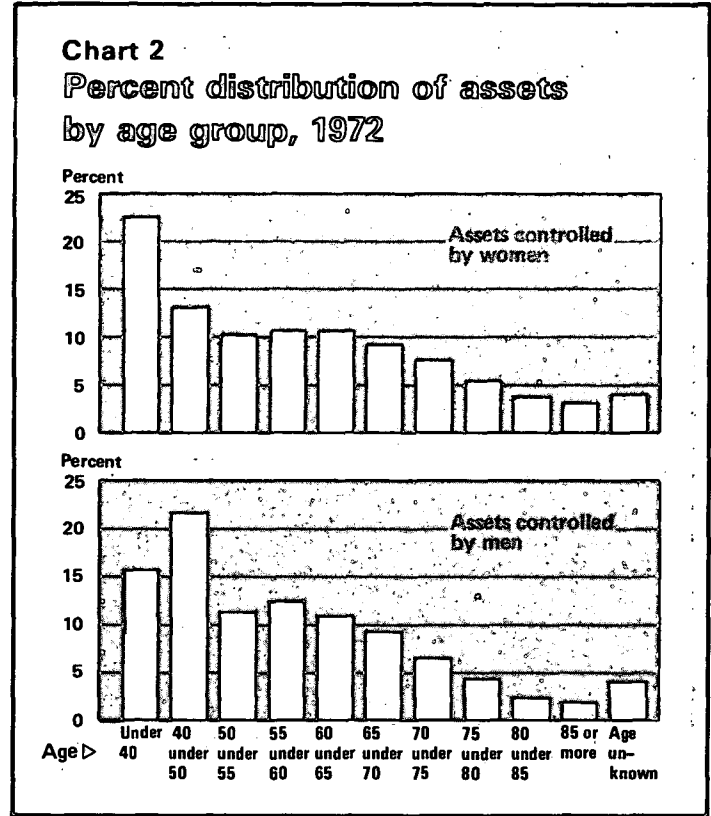


Chart 4
Percent of total assets controlled by each marital group of men and women, by age group, 1972

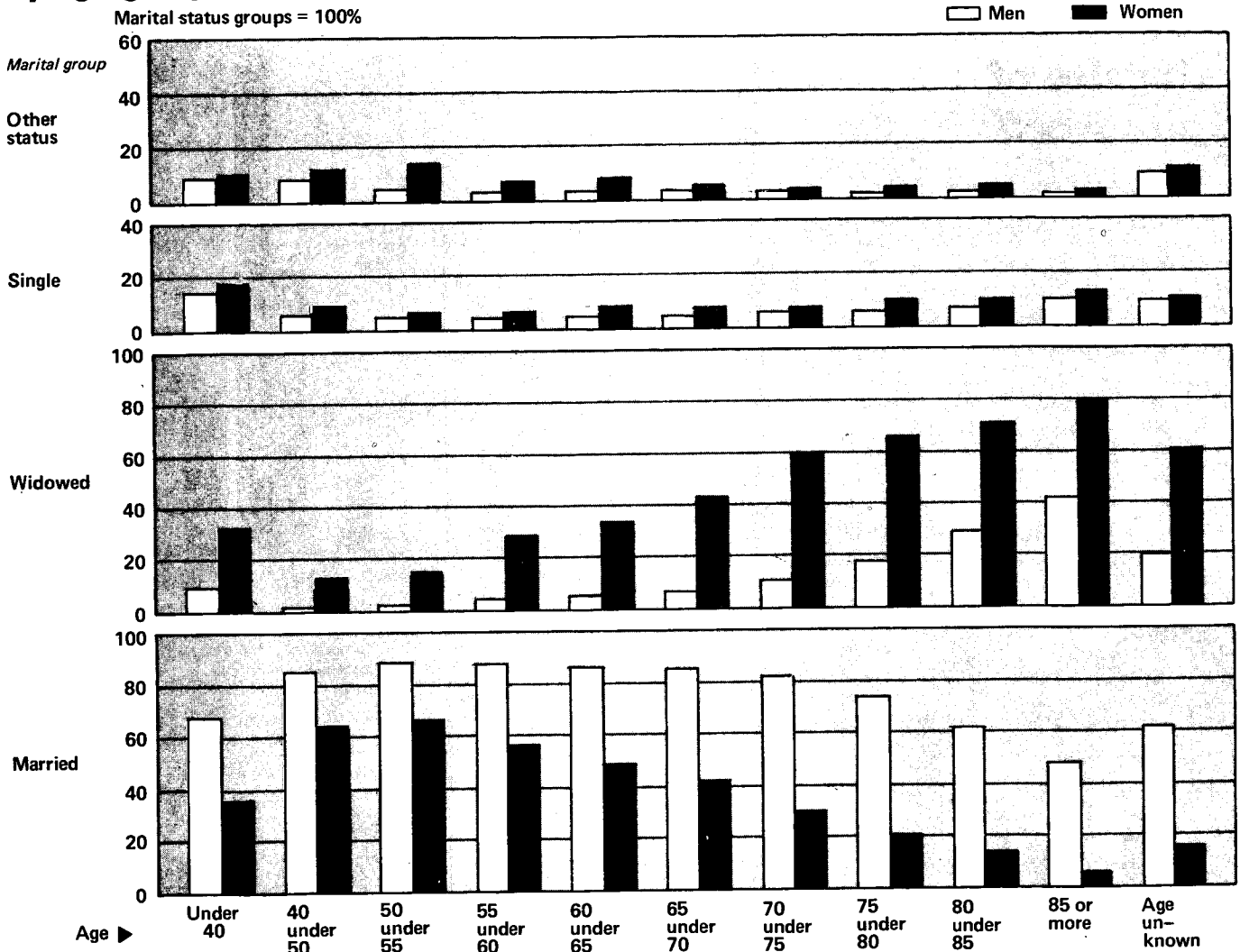


Chart 4 shows the pattern of wealth concentration for age/sex groups within marital status classifications. Married males controlled the vast majority of wealth in every age group for men; while for women, the married controlled the bulk of the wealth in age groups under 65, and, as expected, the widowed controlled the wealth for age groups 65 and over.

Size of wealth

Chart 5 shows the variation in the composition of assets related to the size of net worth. For both male and female

top wealthholders, the relative importance of real estate declined sharply as wealth increased. This was also true of life insurance, especially for men. Asset types which increased significantly as net worth rose were corporate stock and certain types of bonds.

In general, the asset composition of top wealthholders is predominantly related to size of wealth, particularly in the holding of corporate stock, real estate, and insurance. Age, sex, and marital status seem to play less important roles in the choice of holdings of various types of assets.

Chart 5.

Asset composition by size of net worth

Percent of each asset to total assets by sex

Size of Net Worth

- Under \$50,000
- \$50,000 under \$100,000
- \$100,000 under \$1,000,000
- \$1,000,000 or more

* Less than 0.05 percent

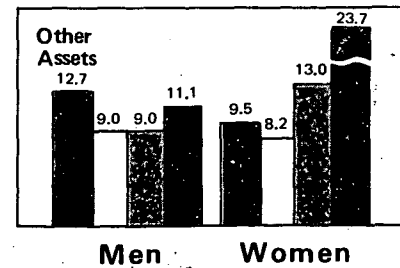
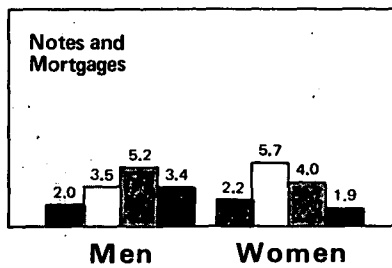
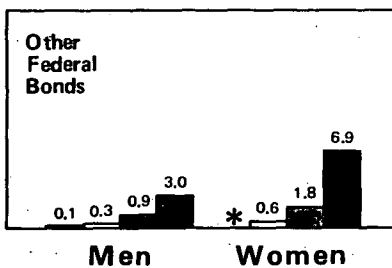
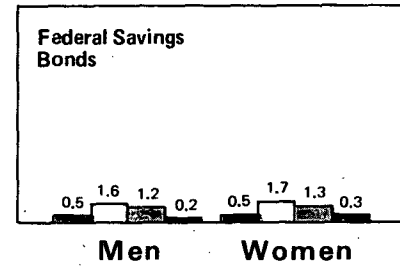
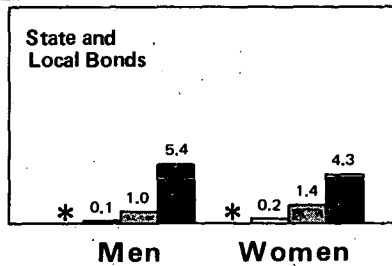
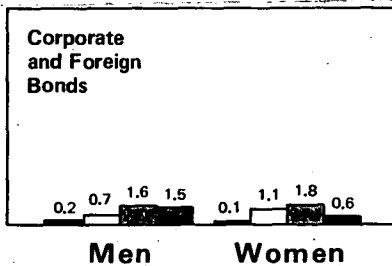
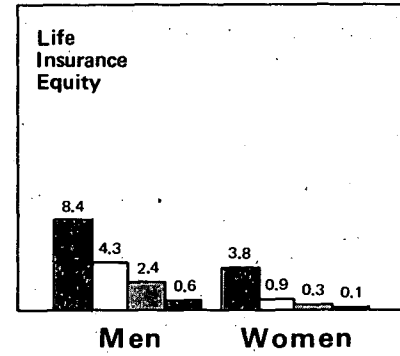
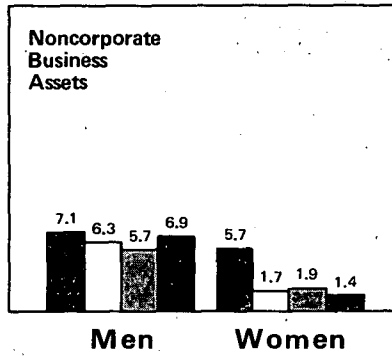
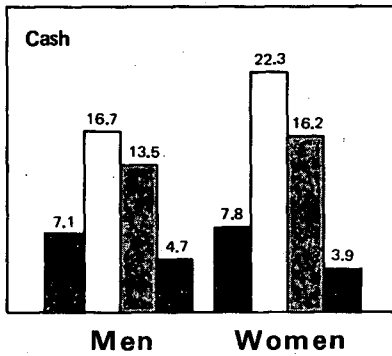
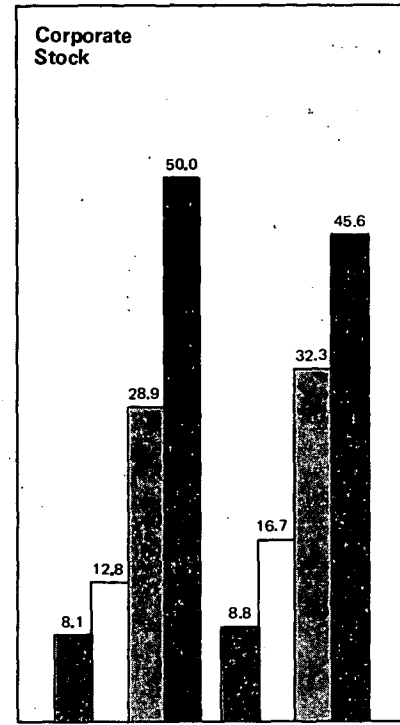
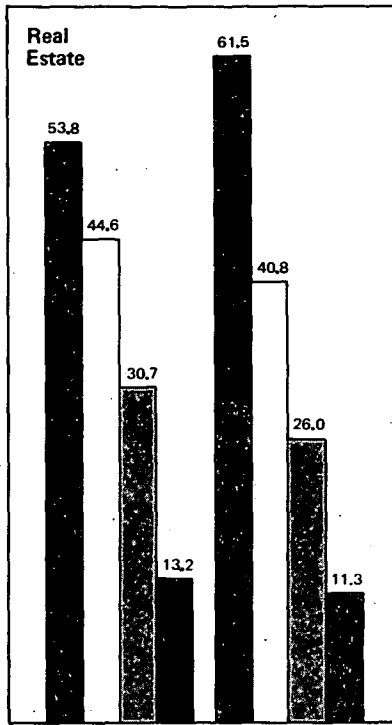


Table 1.—ALL TOP WEALTHHOLDERS, BY SIZE OF NET WORTH
 (All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands; all money amounts are in millions of dollars)

Size of net worth	Number of top wealthholders	Total assets	Debt and mortgages			Net worth	Types of assets			
			Number	Amount	Number		Cash		Corporate stock	
							Number	Amount	Number	Amount
Total.....	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	
Negative net worth.....	12,813.2	2,151,946	10,883.4	300,064	1,851,884	12,153.7	278,390	8,586.4	629,402	
\$0 under \$20,000.....	116.3	12,936	116.3	38,097	-25,160	89.0	471	61.9	2,066	
\$20,000 under \$50,000.....	913.3	29,946	813.0	116,429	10,217	831.6	1,637	397.2	1,778	
\$50,000 under \$80,000.....	1,876.8	108,502	1,703.6	41,464	17,468	1,726.2	8,882	1,111.5	8,616	
\$80,000 under \$100,000.....	681.2	63,282	637.5	14,614	48,671	1,829.1	8,442	322.1	4,746	
\$100,000 under \$150,000.....	1,479.6	113,666	1,150.7	17,098	96,570	1,370.7	21,681	875.0	16,885	
\$150,000 under \$200,000.....	1,111.5	98,533	873.4	15,446	83,087	1,052.1	20,839	685.9	13,838	
\$200,000 under \$250,000.....	1,668.5	166,690	1,291.0	19,398	149,293	1,599.9	34,437	1,100.0	26,562	
\$250,000 under \$300,000.....	2,071.3	279,939	1,732.1	29,851	250,088	2,006.3	52,885	1,544.0	59,318	
\$300,000 under \$350,000.....	1,364.4	285,351	1,176.2	28,932	258,419	1,318.0	47,944	1,081.6	71,227	
\$350,000 under \$400,000.....	847.5	316,048	787.5	28,028	288,020	834.2	42,483	730.6	108,218	
\$400,000 under \$1,000,000.....	304.8	226,332	287.9	18,660	207,672	297.9	19,417	281.0	98,343	
\$1,000,000 under \$5,000,000.....	168.7	329,492	164.2	22,852	306,640	167.9	15,951	154.5	155,621	
\$5,000,000 or more.....	11.3	119,427	11.2	8,628	110,799	11.2	3,827	10.7	59,429	
Types of assets—Continued										
Size of net worth	Number	Amount	Corporate and foreign	Total			Government			
				Number	Amount	Number	Amount	Number	Amount	
										Federal savings
Total.....	(10)	(11)	(12)	(13)	(14)	(15)	(16)	(17)		
Negative net worth.....	4,836.0	124,206	1,838.4	27,682	3,816.5	96,526	3,070.7	22,703		
\$0 under \$20,000.....	11.5	45	4.5	30	7.1	15	7.0	11		
\$20,000 under \$50,000.....	178.7	205	25.6	34	164.4	171	164.3	120		
\$50,000 under \$80,000.....	546.1	930	84.4	221	483.7	709	455.6	603		
\$80,000 under \$100,000.....	293.7	1,178	77.8	424	249.9	754	233.2	683		
\$100,000 under \$150,000.....	464.8	2,976	147.7	946	366.2	2,030	321.4	1,675		
\$150,000 under \$200,000.....	376.8	3,224	106.1	791	308.8	2,443	276.5	1,765		
\$200,000 under \$250,000.....	613.6	6,470	206.6	1,777	489.8	4,654	424.7	3,207		
\$250,000 under \$300,000.....	884.8	10,635	371.0	3,775	642.9	8,859	535.0	5,652		
\$300,000 under \$350,000.....	663.1	14,089	337.0	5,089	477.3	9,981	349.6	4,319		
\$350,000 under \$500,000.....	481.6	19,136	294.5	6,614	354.6	12,522	282.0	3,401		
\$500,000 under \$1,000,000.....	190.6	15,957	111.3	3,236	157.4	12,721	68.4	1,173		
\$1,000,000 under \$5,000,000.....	121.1	36,173	66.5	3,296	105.8	32,575	31.5	882		
\$5,000,000 or more.....	9.6	13,198	5.4	1,146	8.9	12,051	1.5	90		
Types of assets—Continued										
Size of net worth	Number	Amount	Bonds—Continued			Life insurance equity	Notes and mortgages			
			Government—Continued		Number		Amount	Number	Amount	
			Other Federal	State and local						
Total.....	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)		
Negative net worth.....	656.1	38,343	488.8	35,481	9,346.4	41,939	3,089.1	86,416		
\$0 under \$20,000.....	(*)	1	0.3	3	112.0	763	22.4	607		
\$20,000 under \$50,000.....	0.1	50	1.8	1	902.2	3,435	98.3	438		
\$50,000 under \$80,000.....	26.3	65	15.1	39	1,781.4	7,410	202.0	1,983		
\$80,000 under \$100,000.....	15.1	53	5.8	18	1,775.8	5,912	160.7	2,258		
\$100,000 under \$150,000.....	43.9	235	11.6	102	934.2	3,095	301.2	3,353		
\$150,000 under \$200,000.....	34.4	573	13.0	105	742.2	2,383	239.8	3,917		
\$200,000 under \$250,000.....	1,131	1,317	28.2	356	1,144.4	3,847	395.3	5,681.1		
\$250,000 under \$300,000.....	94.9	1,317	62.2	768	1,353.6	5,761	568.1	7,502		
\$300,000 under \$350,000.....	122.0	3,072	79.2	848.3	4,97.5	4,845	497.5	14,524		
\$350,000 under \$500,000.....	130.5	5,105	108.4	4,017	4,988.6	3,839	376.3	15,151		
\$500,000 under \$1,000,000.....	66.6	4,995	84.3	6,533	1,677.0	1,968	138.7	9,478		
\$1,000,000 under \$5,000,000.....	55.3	15,287	71.2	16,426	80.9	1,475	81.5	9,300		
\$5,000,000 or more.....	4.7	6,439	7.2	5,323	5.8	1,235	7.3	2,774		
Types of assets—Continued										
Size of net worth	Number	Amount	Real estate			Noncorporate business assets			Other assets	
			Number	Amount	Number	Amount	Number	Amount		
										Estate tax return statistics
Total.....	(26)	(27)	(28)	(29)	(30)	(31)	(32)	(33)	(34)	
Negative net worth.....	10,681.1	645,341	2,657.5	92,607	11,601.5	253,647	174,891	38,862	35,120	
\$0 under \$20,000.....	81.3	6,084	49.4	1,854	100.8	1,036	364	96	100	
\$20,000 under \$50,000.....	681.7	17,083	99.1	1,949	831.9	4,002	1,238	156	16	
\$50,000 under \$80,000.....	1,681.6	47,135	340.9	7,549	1,780.5	12,409	6,440	621	245	
\$80,000 under \$100,000.....	1,779.2	31,982	149.3	2,817	1,783.1	6,135	6,135	516	343	
\$100,000 under \$150,000.....	1,186.3	47,182	232.4	4,681	1,282.8	10,497	19,374	1,464	1,280	
\$150,000 under \$200,000.....	893.5	41,823	238.7	4,666	947.6	7,833	17,810	1,498	1,333	
\$200,000 under \$250,000.....	1,744.3	69,135	332.9	6,791	1,472.7	13,945	28,000	2,783	2,504	
\$250,000 under \$300,000.....	1,744.8	101,973	476.6	12,610	1,848.6	40,193	5,343	4,874	4,874	
\$300,000 under \$350,000.....	1,105.1	90,565	338.0	11,445	1,286.4	30,733	28,179	5,782	5,362	
\$350,000 under \$500,000.....	695.4	80,072	234.7	12,162	813.3	34,987	17,022	6,220	5,801	
\$500,000 under \$1,000,000.....	242.1	43,831	90.7	7,727	286.3	29,610	6,398	4,646	4,357	
\$1,000,000 under \$5,000,000.....	126.0	45,563	49.5	10,877	164.3	54,489	3,361	6,468	6,068	
\$5,000,000 or more.....	9.6	9,342	5.3	8,347	11.2	22,288	277	3,729	3,037	

Table 2.—ALL MEN: TOP WEALTHHOLDERS, BY SIZE OF NET WORTH

[All figures are estimates based on estate tax return samples--numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth	Types of assets			
			Number	Amount		Cash		Corporate stock	
						Number	Amount	Number	Amount
			(1)	(2)		(3)	(4)	(5)	(6)	(7)	(8)	(9)
Total.....	7,809.6	1,208,971	6,724.1	218,846	990,126	7,423.4	141,704	5,177.0	333,637
Negative net worth.....	115.2	12,477	115.2	36,852	-24,374	91.9	419	60.8	1,845
\$0 under \$20,000.....	838.2	27,939	750.8	18,353	9,586	761.4	1,478	366.2	1,736
\$20,000 under \$50,000.....	1,543.4	86,955	1,377.0	32,519	54,436	1,434.5	7,154	881.3	6,760
\$50,000 under \$60,000.....	599.7	43,243	510.4	10,295	32,948	581.9	5,460	395.1	4,764
\$60,000 under \$70,000.....	691.8	55,564	564.9	10,594	44,971	664.7	9,290	444.3	6,794
\$70,000 under \$80,000.....	620.7	55,695	496.0	9,360	46,334	599.1	9,854	384.2	7,011
\$80,000 under \$100,000.....	834.1	86,666	653.1	12,064	74,602	795.6	15,553	577.8	12,263
\$100,000 under \$150,000.....	1,134.5	156,930	958.7	20,053	136,877	1,085.8	26,442	841.6	30,663
\$150,000 under \$250,000.....	728.0	156,229	635.5	17,455	138,774	714.0	23,730	595.8	36,481
\$250,000 under \$500,000.....	464.4	178,929	430.7	20,342	158,587	457.4	21,594	404.4	58,506
\$500,000 under \$1,000,000.....	150.4	112,598	144.1	11,325	101,273	148.5	9,702	140.6	49,016
\$1,000,000 under \$5,000,000.....	82.5	159,359	81.1	14,294	145,065	82.0	8,223	78.3	77,237
\$5,000,000 or more.....	6.7	76,387	6.6	5,340	71,047	6.6	2,805	6.6	40,561

Size of net worth	Types of assets--Continued							
	Bonds							
	Total		Corporate and foreign		Government			
	Number	Amount	Number	Amount	Total		Federal savings	
(10)	(11)	(12)	(13)	(14)	(15)	(16)	(17)	
Total.....	2,798.1	59,399	966.9	14,939	2,246.8	44,460	1,895.9	12,085
Negative net worth.....	10.8	35	4.5	30	6.4	5	6.3	3
\$0 under \$20,000.....	162.6	199	25.6	34	148.3	165	148.2	114
\$20,000 under \$50,000.....	479.1	792	70.4	186	426.5	606	399.8	508
\$50,000 under \$60,000.....	207.7	701	63.8	196	175.2	505	160.6	440
\$60,000 under \$70,000.....	220.4	1,292	53.9	318	183.7	974	168.3	847
\$70,000 under \$80,000.....	218.6	1,806	58.9	361	180.1	1,445	158.8	926
\$80,000 under \$100,000.....	306.6	2,891	94.2	839	248.1	2,052	230.1	1,731
\$100,000 under \$150,000.....	450.2	5,219	179.1	1,741	334.6	3,478	279.1	2,466
\$150,000 under \$250,000.....	330.0	6,655	169.7	2,459	229.3	4,196	178.7	2,337
\$250,000 under \$500,000.....	255.8	9,099	152.8	3,461	190.5	5,638	113.2	1,722
\$500,000 under \$1,000,000.....	94.2	7,010	56.0	1,773	73.3	5,236	37.6	621
\$1,000,000 under \$5,000,000.....	56.5	16,603	34.6	2,626	45.6	13,978	14.5	325
\$5,000,000 or more.....	5.6	7,097	3.4	915	5.2	6,182	0.7	45

Size of net worth	Types of assets--Continued							
	Bonds--Continued				Life insurance equity		Notes and mortgages	
	Government--Continued				Number	Amount	Number	Amount
	Other Federal		State and local					
Number	Amount	Number	Amount	(22)	(23)	(24)	(25)	
Total.....	297.0	13,505	243.2	18,874	6,814.7	37,393	1,830.6	50,372
Negative net worth.....	(*)	1	0.2	1	111.0	742	21.7	562
\$0 under \$20,000.....	0.1	50	1.8	1	831.0	3,175	97.7	436
\$20,000 under \$50,000.....	25.9	65	14.1	34	1,517.7	6,763	159.9	1,506
\$50,000 under \$60,000.....	14.9	50	3.8	16	570.5	2,615	107.4	1,137
\$60,000 under \$70,000.....	15.4	94	5.3	34	557.6	2,517	128.1	1,797
\$70,000 under \$80,000.....	20.8	441	10.0	78	474.6	2,017	129.1	2,289
\$80,000 under \$100,000.....	16.8	223	12.1	98	689.3	3,334	202.4	3,252
\$100,000 under \$150,000.....	48.0	558	35.6	454	919.0	5,073	349.0	7,627
\$150,000 under \$250,000.....	46.9	1,147	32.8	712	587.4	4,384	286.5	8,491
\$250,000 under \$500,000.....	60.6	2,042	54.8	1,875	366.7	3,474	220.5	9,420
\$500,000 under \$1,000,000.....	25.1	1,807	36.9	2,808	119.7	1,769	77.3	5,752
\$1,000,000 under \$5,000,000.....	20.3	4,703	31.5	8,950	65.2	1,327	46.5	6,144
\$5,000,000 or more.....	2.2	2,324	4.3	3,813	5.0	203	4.5	1,959

Size of net worth	Types of assets--Continued						Estate tax return statistics		
	Real estate		Noncorporate business assets		Other assets		Number of returns	Gross estate	Net worth
	Number	Amount	Number	Amount	Number	Amount			
(26)	(27)	(28)	(29)	(30)	(31)	(32)	(33)	(34)	
Total.....	6,693.1	393,104	2,101.6	74,742	7,215.9	118,623	108,985	24,761	21,645
Negative net worth.....	80.6	6,048	48.8	1,828	99.7	998	343	90	-93
\$0 under \$20,000.....	622.1	15,910	97.8	1,285	789.2	3,721	1,296	149	36
\$20,000 under \$50,000.....	1,381.8	46,554	303.2	5,928	1,474.7	11,498	5,725	565	216
\$50,000 under \$60,000.....	541.3	21,853	128.8	2,453	552.2	4,260	4,700	413	261
\$60,000 under \$70,000.....	589.4	25,353	188.2	3,342	618.6	5,179	10,921	875	711
\$70,000 under \$80,000.....	513.7	24,129	181.9	3,663	548.3	4,925	10,450	916	782
\$80,000 under \$100,000.....	736.3	36,242	254.6	5,813	754.2	7,319	16,547	1,716	1,481
\$100,000 under \$150,000.....	983.3	57,591	379.5	10,484	1,028.4	13,832	25,016	3,426	3,034
\$150,000 under \$250,000.....	641.5	54,016	252.1	8,675	676.3	13,797	17,335	3,667	3,313
\$250,000 under \$500,000.....	397.9	49,978	166.9	9,695	440.8	17,164	10,393	3,904	3,550
\$500,000 under \$1,000,000.....	127.3	24,257	61.1	5,334	145.2	9,758	3,966	2,939	2,709
\$1,000,000 under \$5,000,000.....	71.7	24,674	35.3	8,300	81.7	16,851	2,121	4,115	3,807
\$5,000,000 or more.....	6.2	6,499	3.4	7,942	6.6	9,321	172	1,986	1,858

Table 3.—ALL WOMEN: TOP WEALTHHOLDERS, BY SIZE OF NET WORTH

[All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth	Types of assets			
			Number	Amount		Cash		Corporate stock	
						Number	Amount	Number	Amount
			(1)	(2)		(3)	(4)	(5)	(6)	(7)	(8)	(9)
Total.....	5,005.7	942,973	4,159.4	81,217	861,761	4,730.3	136,688	3,409.6	295,767
Negative net worth.....	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)
\$0 under \$20,000.....	75.1	2,006	62.8	1,075	931	70.1	159	31.0	43
\$20,000 under \$50,000.....	333.5	21,547	326.4	8,515	13,032	297.7	1,669	230.6	1,853
\$50,000 under \$60,000.....	281.5	20,039	267.6	4,316	15,723	257.2	2,956	157.0	2,739
\$60,000 under \$70,000.....	787.8	57,904	585.8	6,504	51,400	706.0	12,331	430.7	10,091
\$70,000 under \$80,000.....	490.8	42,838	377.4	6,085	36,753	453.0	10,985	301.7	6,827
\$80,000 under \$100,000.....	834.4	82,024	637.9	7,334	74,691	804.3	18,884	522.3	14,300
\$100,000 under \$150,000.....	936.8	123,009	773.4	9,798	113,211	920.6	26,443	702.5	28,656
\$150,000 under \$250,000.....	636.4	129,122	538.7	9,477	119,646	604.0	24,214	485.8	34,746
\$250,000 under \$500,000.....	383.1	137,119	356.9	7,687	129,433	376.8	20,889	326.2	49,712
\$500,000 under \$1,000,000.....	154.4	113,734	143.8	7,335	106,399	149.0	9,715	140.3	49,327
\$1,000,000 under \$5,000,000.....	86.2	170,132	83.1	8,558	161,575	85.9	7,368	76.2	78,384
\$5,000,000 or more.....	4.6	43,037	4.5	3,288	39,752	4.6	1,022	4.2	18,868

Size of net worth	Types of assets—Continued							
	Bonds							
	Total		Corporate and foreign		Government			
	Number	Amount	Number	Amount	Total		Federal savings	
Number					Amount	Number	Amount	
(10)	(11)	(12)	(13)	(14)	(15)	(16)	(17)	
Total.....	2,038.1	64,808	871.6	12,742	1,570.0	52,067	1,174.6	10,617
Negative net worth.....	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)
\$0 under \$20,000.....	16.1	6	-	-	16.1	6	16.1	6
\$20,000 under \$50,000.....	67.0	138	14.0	35	57.2	103	55.8	97
\$50,000 under \$60,000.....	86.0	477	14.0	228	74.7	249	72.6	243
\$60,000 under \$70,000.....	244.4	1,683	93.8	628	182.5	1,055	153.0	825
\$70,000 under \$80,000.....	158.3	1,427	47.2	429	128.4	998	117.6	839
\$80,000 under \$100,000.....	307.0	3,580	112.4	938	241.8	2,642	194.6	1,476
\$100,000 under \$150,000.....	434.7	5,416	192.0	2,034	308.3	3,382	255.9	2,309
\$150,000 under \$250,000.....	333.1	7,414	167.3	2,630	248.1	4,785	170.9	1,982
\$250,000 under \$500,000.....	225.8	10,038	141.7	3,153	164.1	6,885	88.8	1,679
\$500,000 under \$1,000,000.....	96.3	8,947	55.3	1,462	84.0	7,485	30.8	551
\$1,000,000 under \$5,000,000.....	64.6	19,570	31.9	973	60.2	18,597	17.0	557
\$5,000,000 or more.....	4.0	6,101	2.0	232	3.8	5,869	0.8	45

Size of net worth	Types of assets—Continued							
	Bonds—Continued				Life insurance equity		Notes and mortgages	
	Government—Continued				Number	Amount	Number	Amount
	Other Federal		State and local					
Number	Amount	Number	Amount	(22)	(23)	(24)	(25)	
(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	
Total.....	359.4	24,842	245.5	16,608	2,531.7	4,545	1,258.3	36,044
Negative net worth.....	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)
\$0 under \$20,000.....	-	-	-	-	71.2	240	0.6	2
\$20,000 under \$50,000.....	0.4	1	1.0	5	263.7	647	42.1	478
\$50,000 under \$60,000.....	0.2	3	2.0	2	205.3	297	53.2	1,121
\$60,000 under \$70,000.....	28.5	162	6.3	69	376.6	578	173.1	4,555
\$70,000 under \$80,000.....	13.7	132	3.0	27	267.6	366	110.7	1,628
\$80,000 under \$100,000.....	45.6	908	16.1	258	455.2	513	192.8	4,250
\$100,000 under \$150,000.....	46.9	759	26.6	313	434.6	688	219.1	4,504
\$150,000 under \$250,000.....	75.1	1,925	46.4	878	260.9	461	211.0	6,033
\$250,000 under \$500,000.....	70.0	3,063	53.6	2,142	131.9	364	155.8	5,731
\$500,000 under \$1,000,000.....	41.5	3,189	47.3	3,745	47.3	200	61.4	3,726
\$1,000,000 under \$5,000,000.....	35.0	10,585	40.2	7,456	15.7	148	34.8	3,156
\$5,000,000 or more.....	2.5	4,115	2.9	1,710	0.7	22	3.0	81.5

Size of net worth	Types of assets—Continued						Estate tax return statistics		
	Real estate		Noncorporate business assets		Other assets		Number of returns	Gross estate	Net worth
	Number	Amount	Number	Amount	Number	Amount			
							(26)	(27)	(28)	(29)	(30)	(31)	(32)	(33)	(34)
Total.....	3,988.0	252,238	555.6	17,864	4,385.6	135,020	65,905	14,100	13,479
Negative net worth.....	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)
\$0 under \$20,000.....	59.6	1,152	1.2	63	62.8	341	62	7	-7
\$20,000 under \$50,000.....	310.0	13,561	37.7	1,289	305.8	1,911	714	56	29
\$50,000 under \$60,000.....	237.9	10,129	20.4	448	230.9	1,872	1,435	103	82
\$60,000 under \$70,000.....	606.9	22,029	64.1	1,319	644.2	5,317	8,453	589	549
\$70,000 under \$80,000.....	379.8	17,695	56.8	1,003	399.3	2,908	7,360	582	551
\$80,000 under \$100,000.....	688.0	32,893	78.3	979	718.5	6,625	11,453	1,068	1,024
\$100,000 under \$150,000.....	761.6	44,382	97.1	2,126	820.2	10,793	15,177	1,917	1,841
\$150,000 under \$250,000.....	463.6	36,549	86.0	2,770	592.1	16,935	10,844	2,114	2,049
\$250,000 under \$500,000.....	297.5	30,094	67.8	2,467	372.4	17,823	6,629	2,325	2,252
\$500,000 under \$1,000,000.....	114.8	19,574	29.6	2,393	151.1	19,852	2,432	1,707	1,648
\$1,000,000 under \$5,000,000.....	64.3	21,291	14.2	2,577	82.6	37,638	1,220	2,373	2,261
\$5,000,000 or more.....	3.3	2,843	1.8	404	4.6	12,967	105	1,253	1,199

Trends in Personal Wealth, 1976-1981

by Marvin Schwartz

Preliminary estimates of the personal wealth of individuals in 1981 show that there were approximately 4.5 million people with gross assets of \$300,000 or more. These "wealthy individuals", who comprised only 2.0 percent of the nation's population, had net worth (total assets less liabilities) of nearly \$2.4 trillion. In contrast, during 1976, fewer than 2 million people had a similar level of gross assets. The net worth of these 1976 top wealthholders was in excess of \$1.0 trillion, which was nearly 23 percent of the net worth of all individuals in the country [1].

Wealthholders with Gross Assets of \$300,000 or More

Year	Wealthholders (thousands)	Total Assets (billions)	Net Worth (billions)
1976	1,938	1,238	1,043
1981	4,522	2,804	2,389

The number of top wealthholders with net worth of \$1 million or more showed a substantial increase from 1976 to 1981, in contrast to the lack of growth in the number of millionaires between 1972 and 1976. While there were approximately 180,000 individuals with net worth of \$1,000,000 or more in both 1972 and 1976, estimates show between 350,000 and 500,000 individuals with this same level of net worth in 1981. The leveling off of the number of millionaires between 1972 and 1976 is likely a result of the decline in the value of corporate stock over that period [2]. As shown below, corporate stock declined both in value and as a relative share of the total assets of individuals with net worth \$1,000,000 or more between 1972 and 1976.

Corporate Stock Held by Top Wealthholders With Net Worth \$1,000,000 or More, 1972 and 1976

	Corporate Stock (billions)	Total Assets (billions)	Corporate Stock As Percentage of Total Assets
1972	215.1	448.9	47.9
1976	181.5	432.1	42.0

The sharp increase in the number of millionaires between 1976 and 1981 may in part be attributed to inflation. Using the Personal Consumption Expenditures Implicit Price Deflator [3], \$1,000,000 in 1981 had the equivalent value of \$677,121 in 1976. Additionally, the rapid increase in the value of real estate may also, in part, be responsible for the growth in the number of millionaires.

ESTIMATING PERSONAL WEALTH FROM ESTATE TAX RETURNS

While there is great interest in measuring the personal wealth of individuals in the United States, the opportunities for such are limited since this

information is not required to be reported regularly on any tax return or other public document. Though the ideal alternative for measuring wealth would be a comprehensive survey of a representative sample of the population, the reluctance of individuals to willingly reveal personal financial information diminishes the reliability of the estimates that could be generated. The "estate multiplier technique" [4] (see "Data Sources and Limitations" for a discussion of this technique), however, enables one to utilize administrative records, e.g., estate tax returns, for the purpose of estimating the personal wealth of that segment of the population which holds a substantial portion of the total wealth of all individuals. The estimates of the wealth for 1976 and 1981 of these individuals are derived from the application of this estimating technique to data extracted from samples of Federal estate tax returns filed during 1977 and 1982, respectively. The estimates of wealth included herein, therefore, are limited to those living individuals for whom an estate tax return would have been required had they died during a one year period extending from early 1976 to early 1977 or from early 1981 to early 1982. These individuals are hereafter referred to as "top wealthholders".

As the level of gross estate or gross assets required for the filing of an estate tax return has increased, the concept of top wealthholders has likewise changed. The levels of wealth to which the estimates are limited have risen from the \$60,000 which defined top wealthholders in 1972, to \$120,000 for returns filed in 1977, and subsequently to the \$300,000 level for returns filed in 1982. Additionally, as a result of a change in the reporting requirements for estates of decedents who died in 1982, asset detail for 1981 is presented only for those individuals with gross assets in excess of \$500,000.

The wealth included on the returns selected during each of the sample years is centered around mid-year of 1976 and 1981 and therefore reflects the wealth of the living population at that point in time. (A further discussion of the estimating technique is included under "Data Sources and Limitations".)

The gross estate criterion is a Federal estate tax concept of wealth that does not conform to the usual definitions of wealth primarily because the face value of life insurance is included in the wealth of the decedent. Therefore, three measures of wealth have been used in this article: gross estate (or gross assets), total assets, and net worth.

Gross estate or gross assets reflects the gross value of all assets, including the full face value of life insurance reduced by policy loans, but before any reduction for indebtedness. This measure defines those included in the top wealthholder group. Total assets, a lower wealth value, is still essentially a

*Foreign Special Projects Section. Prepared under the direction of Michael Coleman, Chief.

gross measure. This is obtained by using the cash value of the life insurance asset; that is, the value the insurance had immediately prior to death. Net worth is the level of wealth after all debts have been removed and includes the cash value of life insurance.

PERSONAL WEALTH IN 1976

If the typical top wealthholder was encountered in 1976, we would have found a married male under 50 years of age whose net worth was less than \$250,000. A significant share of his assets would have been in real estate, likely the family home. The typical female top wealthholder would also have been married, but would likely have been older and wealthier. Likewise, the primary asset in her portfolio, would have been real estate. However, it would not have constituted as significant a share of her assets as for her male counterpart.

Male wealthholders represented approximately 66.5 percent, or 5.8 million of the 8.7 million top wealthholders (defined as individuals with gross assets greater than \$120,000) in 1976. The average net worth of these men was \$192,000. Though far fewer in number, the 2.9 million female top wealthholders were generally wealthier with average net worth of \$261,000.

Over 83 percent of the male top wealthholders were married, while less than 5 percent were widowed. This compares with 47 percent of the females who were married and 33 percent who were widowed. These percentages are probably reflective of the age composition of the top wealthholders with nearly 33 percent of the female top wealthholders and only 17 percent of the male top wealthholders 65 years of age or older.

As shown in Figure A, real estate valued at \$771 billion was the largest single asset item held by the top wealthholders. However, corporate stock valued for all wealthholders at \$531 billion, still comprised the greatest share of the assets of those wealthholders with net worth of \$500,000 or more. These rankings reflect the relative importance of real property to that of stock in the asset portfolio of many individuals. In addition, they also reflect the effect of inflated housing values which were enough to cause many individuals to be classified as top wealthholders in 1976.

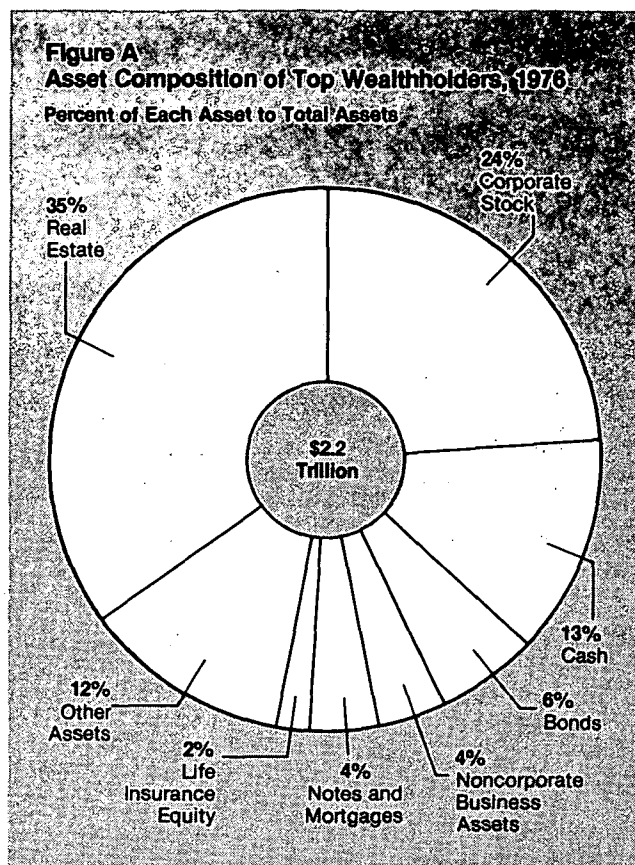
The concentration of wealth among the very top wealthholders was almost as skewed as that for the general population. As shown in Figure B, nearly 23 percent of the total assets of all top wealthholders was held by individuals with total assets of \$1 million or more. These 227,000 individuals represented less than 3 percent of the top wealthholders.

Wealth and Asset Composition

As wealth increased (see Figure C), the relative importance of real estate for both male and female top wealthholders declined sharply. Conversely, corporate stock and certain types of bonds became increasingly significant as the amount of wealth increased. In light of the special tax treatment afforded the income from State and local bonds, these assets were especially attractive to those "well off" individuals seeking to lessen their income tax burden.

Types of Wealth Held by Men and Women

The summary of the composition of wealth shown in Figure D indicates the differences between the holdings of men and women. Proportionally more men than women



owned real estate, noncorporate business assets, and life insurance; however, more women owned bonds and corporate stock. The overall differences in holdings were large for only a few items. In their traditional role as the head of the household, about 89 percent of the men had life insurance to protect their families, whereas only about 53 percent of the women held life insurance. Noncorporate business assets were held by 27 percent of the men, but only 14 percent of the women. This may be reflective of a female spouse's tendency to dispose of the family business upon the death of her husband, combined with the shorter life expectancy of males.

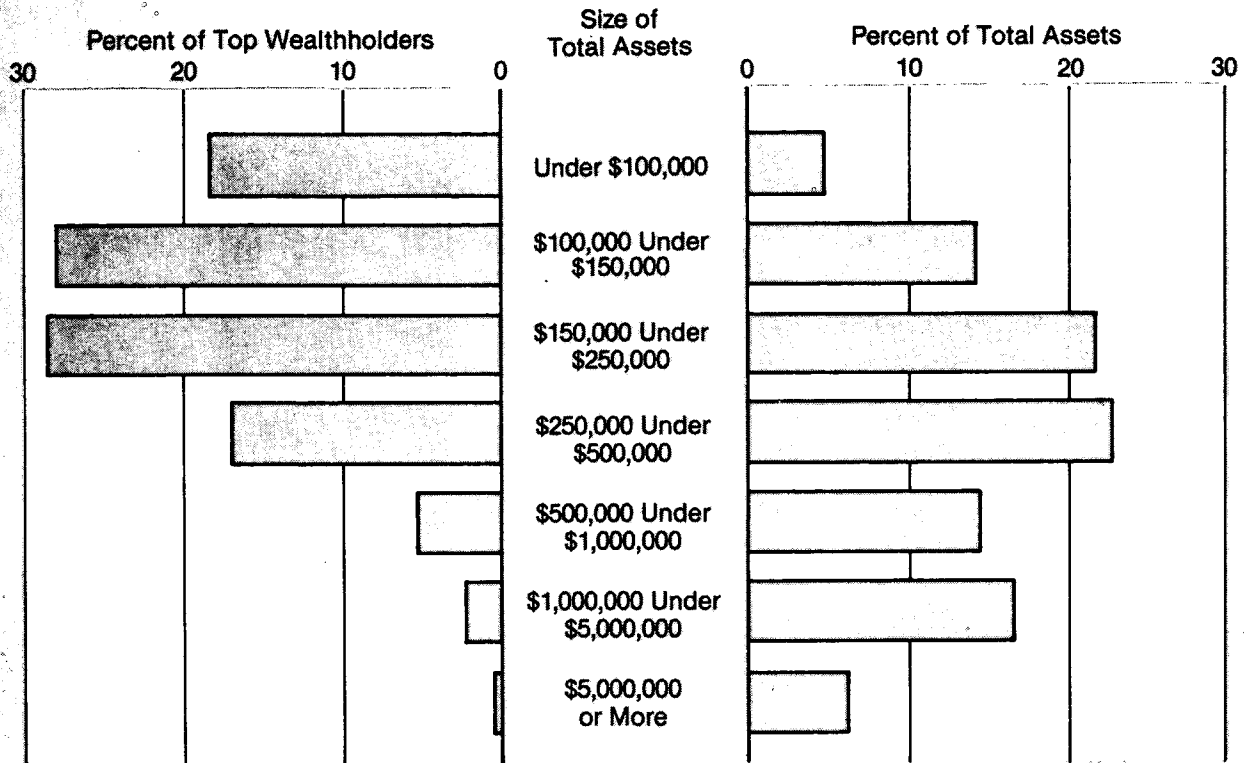
Men had a relatively heavier debt burden than women with 19 percent of their total assets owed as debts and mortgages compared with nearly 10 percent for women. The large difference in debts was related to the fact that proportionally more men owned assets which are typically mortgaged or debt-financed, such as real estate and business assets.

Age and Wealth

The average net worth of male top wealthholders appeared to be closely correlated with age. As age increased (see Figure E), the average net worth increased from \$119,000 for men under 50 years of age to \$395,000 for men 85 years or older. On the other hand, women under age 50 were 43 percent wealthier in terms of total assets than their male counterparts, but showed a less rapid increase than males in their average net worth until their early 60's.

Nearly 48 percent of the male top wealthholders were under 50 years of age, while only 29 percent of the female top wealthholders were in that age group. This

Figure B
Percent of Top Wealthholders and Total Assets of Top Wealthholders,
By Size of Total Assets, 1976



relatively low proportion of female top wealthholders under 50 years of age is an indication of the fact that many wealthy women may acquire their wealth upon the death of their spouse.

Predictably, younger top wealthholders had a debt burden considerably heavier than that of their elders, declining as age increased. The amount of indebtedness of males under 50 years of age was equal to 33 percent of their total assets. However, for females in this same age group, the debt burden was only 21 percent. As with the younger individuals, the debts of females of each age group was significantly lower than that of males in the same age group. This may be a reflection of the insurance protection provided more often by males that is used to pay off debts.

PERSONAL WEALTH IN 1981

Of the 4.5 million top wealthholders in 1981, redefined to include only those individuals with gross assets of \$300,000 or more, 65 percent were men. However, as in 1976, the average net worth of female top wealthholders was considerably higher than that of their male counterparts, \$637,000 compared to \$471,000.

Figure F shows that, again, a relatively high portion of the female top wealthholders, 28 percent, were widowed. This compared to the mere 4 percent of the males who were widowers. Likewise, 83 percent of the men and 52 percent of the women were married. As in 1976, this probably mainly reflected the age composition of the male and female top wealthholders

and the difference in their life expectancies. In 1981, 48 percent of all male wealthholders were under 50 years of age as opposed to just 29 percent of female top wealthholders.

With the continued increase in its value, real estate, as shown in Figure G, valued at \$593 billion, was the largest single asset item held by top wealthholders in 1981 with gross assets in excess of \$500,000 [5]. Corporate stock valued at \$484 billion was the next most commonly held asset. Together these two asset items accounted for 55 percent of the total assets held by those top wealthholders.

DATA SOURCES AND LIMITATIONS

The estimates of personal wealth contained herein are based on information reported on Federal estate tax returns filed during 1977 and 1982. The sampled returns primarily reflect deaths that occurred during a one year period extending from early 1976 to early 1977 or from early 1981 to early 1982. However, because an extension of time for filing the estate tax return can be obtained, the estimates of personal wealth for 1976 and 1981 are also based on a limited number of returns for decedents who died before 1976 or before 1981, respectively.

As indicated previously, the wealth included on the sampled returns is centered around mid-year of 1976 and 1981 and represents the wealth of the living population at that time. While the Federal estate tax return is an exceptional source of economic infor-

Figure C
Asset Composition by
Size of Net Worth, 1976
Percent of Each Asset to
Total Assets by Sex

Size of Net Worth

- Under \$100,000
- \$100,000 under \$250,000
- ▨ \$250,000 under \$1,000,000
- \$1,000,000 or more
- * Less than 0.05 percent

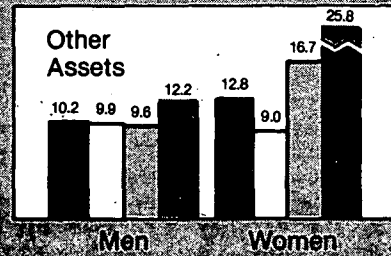
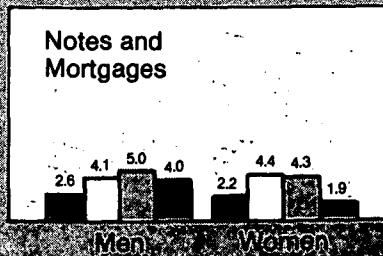
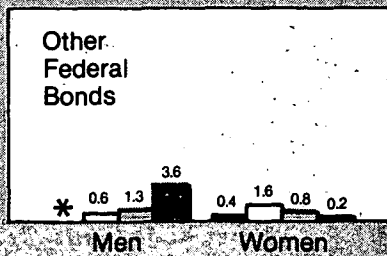
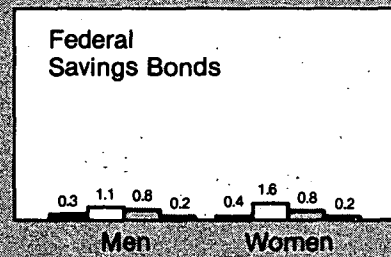
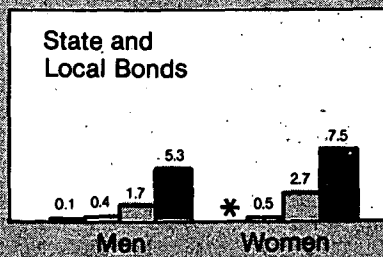
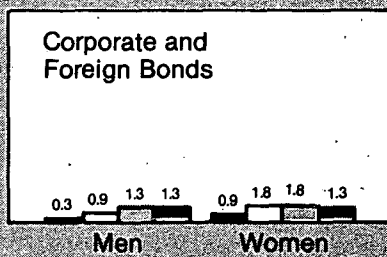
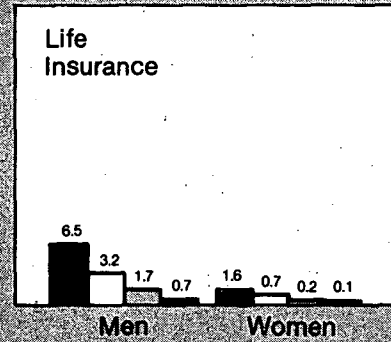
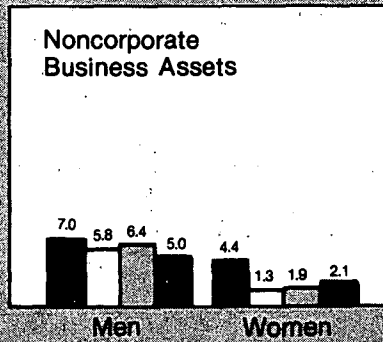
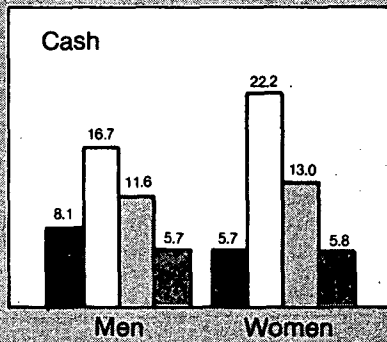
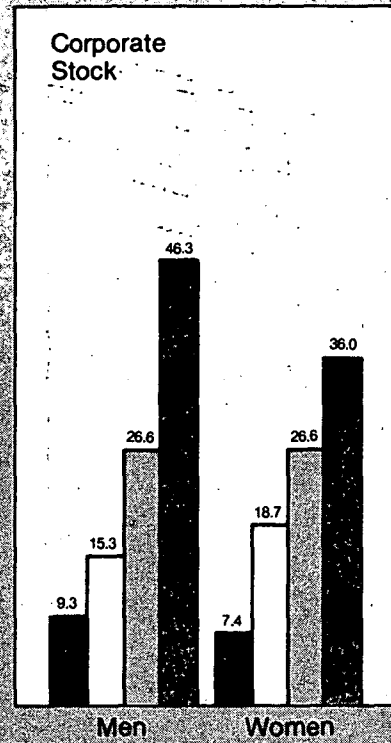
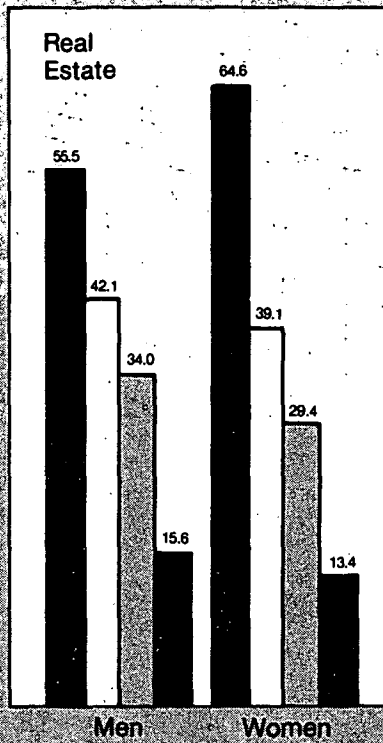


Figure D.--Composition of Wealth for Male and Female Top Wealthholders, 1976

[All figures are estimates based on estate tax return samples--numbers of top wealthholders are in thousands; all money amounts are in billions of dollars]

Item	Male top wealthholders				Female top wealthholders			
	Number	Percent of total males	Amount	Percent of total assets	Number	Percent of total females	Amount	Percent of total assets
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total assets.....	5,782	100.0	1,368	100.0	2,913	100.0	845	100.0
Debts.....	5,324	92.1	260	19.0	2,569	88.2	84	9.9
Net worth.....	5,782	100.0	1,108	81.0	2,913	100.0	761	90.1
Types of assets:								
Cash.....	5,537	95.8	159	11.6	2,746	94.3	122	14.4
Corporate stock.....	3,883	67.2	324	23.7	2,014	69.2	207	24.5
Bonds, total.....	2,012	34.8	64	4.7	1,314	45.1	66	7.8
Corporate and foreign.....	817	14.1	14	1.0	643	22.1	14	1.6
Federal savings.....	1,227	21.2	9	0.7	651	22.3	8	1.0
Other Federal.....	279	4.8	17	1.3	286	9.8	21	2.5
State and local.....	294	5.1	23	1.7	254	8.7	23	2.8
Life insurance equity.....	5,150	89.1	38	2.8	1,558	53.5	4	0.5
Notes and mortgages.....	1,511	26.1	56	4.1	894	30.7	31	3.7
Real estate.....	5,137	88.9	503	36.8	2,394	82.2	268	31.7
Noncorporate business.....	1,569	27.1	83	6.1	400	13.7	16	1.9
Other assets.....	5,539	95.8	141	10.3	2,676	91.9	131	15.5

NOTE: Detail may not add to total because of rounding.

mation, the accuracy of the estimates of personal wealth for a particular point in time is limited somewhat by the time span during which the sampled estates are valued. For assets such as corporate stock, the timing of the valuation can be quite significant. However, nearly 78 percent of the estate returns sampled during 1982 were for decedents who died in 1981 and 81 percent of the estate returns sampled during 1977 were for decedents who died during 1976.

The "estate multiplier technique," which has been used since the beginning of the twentieth century (financial records were used as early as 1864 to estimate total personal wealth by a related technique) [6,7,8] enables conclusions to be drawn about the wealth of the living population through the knowledge of the wealth of the deceased. The underlying assumption in making these estimates from estate tax returns is that death draws a random sample of the living population. However, in actuality, death is not a random event and therefore not necessarily representative of the living population under consideration.

The probability of "death's selection" of an individual depends on the particulars of one's life. Age and sex are usually taken as gross indicators of these conditions. By knowing the mortality rate and the number of deaths for each age and sex group, the population of wealthholders can be derived, by multiplying the inverse of the mortality rate by the number of deaths in each group.

However, vital to the estimates of personal wealth is the use of a mortality rate appropriate to the top wealthholder population. This is essential to the estimates in that there is much evidence that the mortality rate of the wealthy is more favorable than that of the population as a whole [9], that is, social class also is a determinant in the "selection of the sample". Therefore, an adjustment to the general mortality rate is necessary. The basic assumption made to prepare the estimates was that the probability

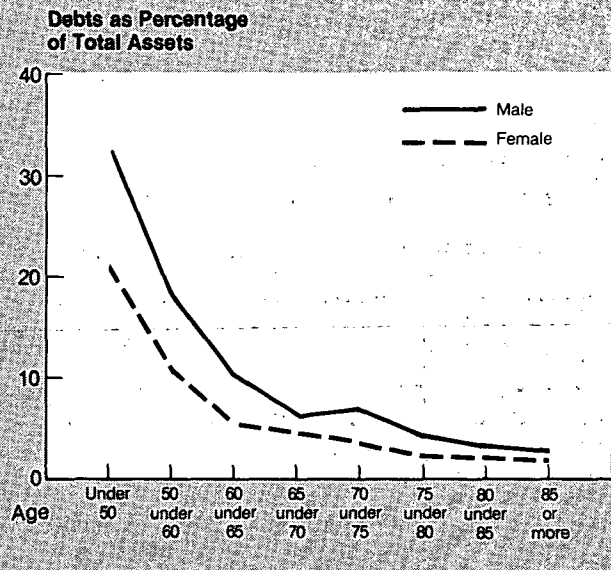
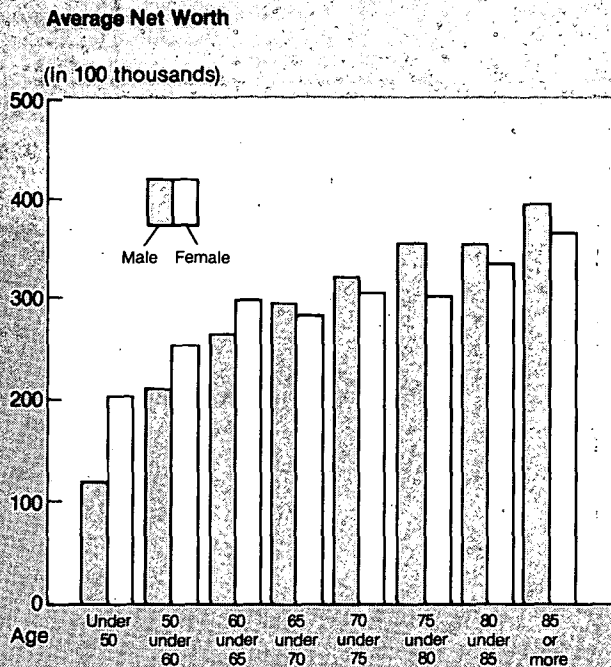
of death for those at or above the minimum level of gross assets or gross estate included in the estimates for 1976 and 1981 is approximately constant for each age and sex.

The mortality rates assumed to approximate that of the wealthy are generated utilizing data prepared by the Metropolitan Life Insurance Company [10]. Three sets of age-specific multipliers for male and female decedents for 1976 were produced utilizing the insurance experience between 1973 and 1976. The same multipliers were used to generate the estimates for 1981.

While the estimates of wealth for 1976 and 1981 are based on estate tax returns sampled during a specific filing year, the returns selected during 1982 were selected as the first part of a new sample design. Returns selected during 1977 primarily reflected deaths that occurred during 1976, but also deaths from 1977 and 1975 and several preceding years. Therefore, the estimates were arrived at utilizing values determined over an extended period of time. In order to more accurately reflect the wealth at a particular point in time, a "year of death" basis for the selection of the sample was utilized in 1982. Returns selected for the sample are based on decedents dying in 1982. These are augmented by a sample of all other returns, as well as the selection of all returns, regardless of the year of death of the decedent, for wealthy and young decedents. This sample will be selected for a three year period through December 1984 to estimate personal wealth in 1982. Since the estate tax return is not due until nine months after the death of the decedent, a limited number of returns for decedents dying in 1982 were filed. Therefore, the preliminary nature of the estimates which primarily reflect the wealth of decedents dying in 1981.

Because the data presented in this article are estimates based on a sample of Estate tax returns filed with the Internal Revenue Service, they are

Figure E
Average Net Worth and Debt Burden,
By Age and Sex, 1976



subject to sampling, as well as nonsampling, error. To properly use the statistical data provided, the magnitude of the potential sampling error must be known.

The table below presents rough preliminary estimates of the coefficients of variation (CV's) for frequency estimates. The approximate CV's shown here are intended only as a general indication of the reliability of the data. For a number other than those shown below, the corresponding CV's can be estimated by interpolation.

Number of Wealthholders	Approximated Coefficient of Variation	
	1976	1981
6,600,000	.01	N/A*
4,500,000	.012	.02
3,000,000	.015	.025
1,500,000	.02	.035
800,000	.03	.05
300,000	.05	.08
200,000	.06	.10
65,000	.10	.17
45,000	.12	.20
21,000	.18	.30
9,000	.27	.45

*N/A = Not Applicable

The reliability of estimates based on samples, and the use of coefficients of variation for evaluating the precision of sample estimates, are discussed in the Appendix.

Nonsampling error of the estate tax return data was controlled during statistical processing by a variety of methods. Among them was a systematic verification at the field processing locations of the manual data editing. As a further check on the quality of the editing small subsamples selected after field verification were reprocessed in the National Office. Key entry of the data at the processing locations was also subjected to 100 percent verification.

Prior to tabulation, numerous computer tests were applied to each return record to check for inconsistencies. Lastly, prior to publication, all statistics and tables were reviewed for accuracy and reasonableness.

NOTES AND REFERENCES

- [1] Ruggles, Richard and Nancy D., Bureau of Economic Analysis, U.S. Department of Commerce, Survey of Current Business, "Integrated Economic Accounts for the United States, 1947-80," May 1982, Volume 62, Number 5.
- [2] Ibid., p. 53
- [3] Bureau of Economic Analysis, U.S. Department of Commerce, Survey of Current Business, July 1982, Vol. 62, No. 7. For discussions of the deflator, see the Survey of Current Business, March 1978, Vol. 57, No. 3, and March 1979, Vol. 58, No. 11.
- [4] For a detailed explanation of the Estate Multiplier Technique, see Internal Revenue Service, Statistics of Income--1972 Personal Wealth, Washington, DC 1976.
- [5] As previously stated, asset detail for 1981 is unavailable for those individuals with gross assets of \$500,000 or less because of a change in the reporting requirements for the estates of decedents who died in 1982.
- [6] Atkinson, A.B., "The Distribution of Wealth in Britain in the 1960's--the Estate Duty Method Reexamined," Studies in Income and Wealth, National Bureau of Economic Research, no. 39, 1975, pp. 277-319.
- [7] Lampman, Robert J., The Share of Top Wealthholders in National Wealth, 1922-56, Princeton University Press, 1962.

Figure F.--All Top Wealthholders With Gross Assets \$300,000 or More, by Marital Status, Age, and Sex, 1981
 [All figures are estimates based on estate tax return samples--numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

Item	Number of top wealthholders	Total assets	Debts and mortgages		Net worth	Estate tax return statistics		
			Number	Amount		Number of returns	Gross estate	Net worth
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
All top wealthholders, total.....	4,521.7	2,803,800	4,058.9	415,022	2,388,778	60,342	45,894	41,889
Married.....	3,278.7	1,955,121	2,961.5	324,695	1,630,426	35,623	27,349	24,183
Single.....	408.1	245,481	323.2	25,276	220,205	4,180	3,127	2,965
Widowed.....	555.4	384,909	498.8	24,623	360,286	18,897	13,892	13,410
Other.....	279.5	218,288	275.3	40,427	177,861	1,643	1,527	1,331
Under 50.....	1,869.7	953,053	1,740.8	281,030	672,023	3,163	2,059	1,169
50 under 65.....	1,608.9	1,065,351	1,453.9	102,300	963,051	11,830	8,647	7,128
65 and over.....	955.9	740,575	796.9	31,027	709,549	44,273	34,623	33,045
Male.....	2,950.5	1,707,993	2,709.7	319,310	1,388,683	39,105	30,623	27,175
Married.....	2,462.4	1,375,840	2,246.8	255,923	1,119,917	30,050	23,515	20,580
Single.....	190.4	115,239	182.7	19,762	95,477	2,564	2,072	1,945
Widowed.....	121.5	73,053	106.4	10,616	62,437	5,418	3,931	3,724
Other.....	176.3	143,862	173.9	33,010	110,851	1,074	1,106	925
Under 50.....	1,417.8	679,001	1,386.9	224,415	454,585	2,773	1,836	997
50 under 65.....	968.2	604,199	856.8	74,382	529,817	9,023	6,596	5,212
65 and over.....	517.2	403,644	437.3	20,233	383,410	26,733	21,924	20,713
Female.....	1,571.2	1,095,806	1,349.2	95,711	1,000,095	21,237	15,271	14,714
Married.....	816.3	579,281	714.7	68,772	510,509	5,573	3,834	3,603
Single.....	217.7	130,243	140.5	5,515	124,728	1,616	1,055	1,019
Widowed.....	433.9	311,856	392.5	14,007	297,849	13,479	9,961	9,686
Other.....	103.3	74,426	101.5	7,417	67,010	569	421	406
Under 50.....	451.9	274,053	353.9	56,614	217,438	390	223	172
50 under 65.....	640.7	461,153	597.1	27,917	433,236	2,807	2,051	1,917
65 and over.....	438.7	336,932	359.7	10,792	326,139	17,540	12,700	12,333

NOTE: Detail may not add to total because of rounding. Age unknown are not shown separately above. However, they are included in the appropriate total.

Figure G.--All Top Wealthholders With Gross Assets Greater Than \$500,000, Assets by Sex, 1981
 [All figures are estimates based on estate tax return samples--numbers of top wealthholders are in thousands; all money amounts are in billions of dollars]

Item	Total		Men		Women	
	Number of top wealthholders	Amount	Number of top wealthholders	Amount	Number of top wealthholders	Amount
	(1)	(2)	(3)	(4)	(5)	(6)
Total assets.....	1,838.6	1,954.5	1,237.7	1,216.9	600.9	737.6
Debts.....	1,770.2	293.9	1,211.6	235.2	558.7	58.7
Net worth.....	1,838.6	1,660.6	1,237.7	981.7	600.9	678.9
Types of assets:						
Cash.....	1,776.6	167.4	1,217.4	89.7	559.2	77.7
Corporate stock.....	1,477.2	483.7	1,022.0	309.4	455.2	174.3
Bonds, total.....	736.5	117.7	444.3	60.1	292.3	57.6
Corporate and foreign.....	294.3	9.0	180.6	4.6	113.7	4.5
Federal savings.....	218.7	2.2	136.0	1.6	82.6	0.6
Other Federal.....	278.0	33.6	183.6	22.6	94.4	11.0
State and local.....	461.6	72.9	244.8	31.3	216.7	41.6
Life insurance equity.....	1,412.6	23.4	1,131.5	21.6	281.1	1.8
Notes and mortgages.....	876.9	74.5	638.7	55.1	238.2	19.4
Real estate.....	1,643.1	592.7	1,166.6	397.4	476.5	195.3
Noncorporate business.....	827.6	122.1	611.4	85.6	216.2	36.5
Other assets.....	1,780.7	372.9	1,205.7	198.0	575.0	174.9

NOTE: Detail may not add to total because of rounding.

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- [10] We are extremely grateful for the continued support we have received from the Metropolitan Life Insurance Company, beginning with the late Mortimer Spiegelman and continuing most recently with Mrs. Frances Baffa, who provided the mortality data used in the present computation of the estate multipliers.

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Table 1.—ALL TOP WEALTHHOLDERS, BY SIZE OF NET WORTH, 1976

[All figures are estimates based on estate tax return samples — numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages				Net worth	Types of assets		
			Number	Amount	Number	Amount		Number	Cash	
									Number	Amount
Negative net worth	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
\$0 under \$50,000	8,695.0	2,212,731	7,893.4	343,799	1,669,933	8,293.3	280,784	167.1	197.1	3,295
\$0 under \$50,000	118.8	22,415	118.8	31,065	-6,670	107.8	739	17.1	17.1	114
\$50,000 under \$100,000	1,051.5	87,057	1,032.5	55,520	31,537	638.8	4,740	15.6	15.6	508
\$100,000 under \$150,000	1,429.0	165,706	1,370.6	55,945	109,761	1,340.0	61,638	11.5	11.5	678
\$150,000 under \$250,000	2,237.8	321,822	1,891.1	41,759	280,063	2,115.8	61,439	10.2	10.2	1,000
\$250,000 under \$500,000	2,068.9	442,289	1,814.1	47,269	394,982	2,053.9	83,277	6.1	6.1	1,000
\$500,000 under \$1,000,000	1,205.2	453,712	1,064.9	47,657	406,054	1,170.7	83,277	6.1	6.1	1,000
\$1,000,000 under \$5,000,000	394.9	297,657	366.6	47,657	250,000	380.8	26,595	2.1	2.1	1,000
\$5,000,000 or more	169.3	350,824	165.2	32,104	281,046	380.8	26,595	2.1	2.1	1,000
Total	9.8	101,271	8.4	6,431	94,839	94,839	21,431	167.1	167.1	4,256
Size of net worth	Number	Amount	Corporate stock		Bonds		Types of assets — Continued			
			Number	Amount	Number	Amount	Number	Amount		
									Government — Continued	Life insurance equity	Notes and mortgages
(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)			
Negative net worth	5,997.6	530,974	3,326.1	129,650	1,480.8	27,625	1,877.7	17,418		
\$0 under \$50,000	39.9	2,834	26.8	297	1.1	209	25.7	33		
\$50,000 under \$100,000	408.6	6,094	207.3	556	49.8	371	173.6	129		
\$100,000 under \$150,000	877.7	15,548	393.9	1,541	110.3	615	275.1	731		
\$150,000 under \$250,000	1,521.2	48,001	843.8	10,200	435.1	3,392	548.3	4,152		
\$250,000 under \$500,000	1,560.6	81,594	894.9	17,796	405.2	6,074	482.8	5,625		
\$500,000 under \$1,000,000	984.6	105,521	600.8	22,654	310.9	6,248	282.3	4,170		
\$1,000,000 under \$5,000,000	345.4	91,766	239.8	23,171	137.7	4,984	76.4	1,817		
\$5,000,000 or more	149.9	130,211	120.9	40,520	70.8	4,436	32.3	823		
Total	9.2	51,315	7.9	12,712	4.8	1,305	1.2	38		
Size of net worth	Number	Amount	Bonds — Continued		Types of assets — Continued					
			Number	Amount	Number	Amount				
							Government — Continued	Life insurance equity		
(16)	(17)	(18)	(19)	(20)	(21)	(22)	(23)			
Negative net worth	564.7	38,315	547.7	48,293	6,708.2	42,297	2,404.4	87,727		
\$0 under \$50,000	**1.7	**25	**4.5	**87	117.2	958	39.1	1,782		
\$50,000 under \$100,000	22.4	117	18.1	78	1,018.5	5,775	133.6	1,778		
\$100,000 under \$150,000	82.6	1,694	62.4	1,002	1,345.2	6,695	301.0	4,003		
\$150,000 under \$250,000	150.6	3,892	122.4	2,405	1,700.3	8,320	558.7	4,056		
\$250,000 under \$500,000	161.6	7,032	142.4	5,405	1,418.0	8,021	645.9	20,390		
\$500,000 under \$1,000,000	79.5	6,292	112.1	10,298	781.3	5,811	479.8	21,475		
\$1,000,000 or more	52.2	14,737	80.3	20,425	241.2	2,619	163.7	13,318		
Total	4.0	4,788	5.7	6,802	5.1	1,870	86.3	10,597		
Size of net worth	Number	Amount	Types of assets — Continued		Estate tax return statistics					
			Number	Amount	Number of returns	Gross estate				
							Real estate	Noncorporate business assets	Other assets	Net worth
(24)	(25)	(26)	(27)	(28)	(29)	(30)	(31)	(32)		
Negative net worth	7,531.0	770,787	1,969.3	96,728	8,214.8	271,782	119,167	40,997	37,114	
\$0 under \$50,000	103.5	10,265	69.9	4,673	115.9	1,362	287	116	-111	
\$50,000 under \$100,000	890.7	54,689	118.4	4,518	1,024.3	8,604	205	393	508	
\$100,000 under \$150,000	1,311.6	82,012	341.3	8,770	1,389.6	19,496	6,399	1,046	4,220	
\$150,000 under \$250,000	1,949.7	142,300	386.5	10,594	2,048.2	30,921	40,765	4,788	7,765	
\$250,000 under \$500,000	1,774.1	169,710	506.9	19,694	1,948.1	41,814	24,717	8,973	6,400	
\$500,000 under \$1,000,000	1,023.0	77,661	325.6	14,059	1,142.3	37.5	3,298	8,975	5,624	
\$1,000,000 or more	145.4	53,910	63.4	12,977	163.6	59,408	3,742	7,056	6,618	
Total	7.4	9,489	5.1	3,505	9.6	17,998	27.4	4,256	4,014	

*Estimates should be used with caution because of the small number of sample estate tax returns on which it is based.
 **Data combined to avoid disclosure of information for specific estate tax returns.
 NOTE: Detail may not add to total because of rounding.

Table 2. — ALL MEN: TOP WEALTHHOLDERS, BY SIZE OF NET WORTH, 1976

(All figures are estimates based on estate tax return samples — numbers of top wealthholders are in thousands; all money amounts are in millions of dollars)

Size of net worth	Number of top wealthholders		Total assets		Debts and mortgages		Net worth		Types of assets	
	(1)	(2)	(3)	(4)	(5)	Types of assets		(6)	(7)	
						Number	Amount			Number	Amount
Total	5,782.0	1,367,539	5,323.9	259,986	1,107,552	5,372.2	158,779			
Negative net worth	82.0	19,865	82.2	27,606	-7,741	81.2	482			
\$0 under \$50,000	689.3	76,052	970.9	46,946	28,137	681.6	4,528			
\$50,000 under \$100,000	1,172.3	129,500	1,117.7	40,075	88,425	1,118.8	19,215			
\$100,000 under \$150,000	1,274.3	87,320	1,113.7	28,752	158,568	1,234.3	31,594			
\$150,000 under \$250,000	1,212.2	252,728	1,061.9	33,632	229,097	1,194.1	49,560			
\$250,000 under \$500,000	731.9	275,196	657.4	33,741	241,455	710.4	34,965			
\$500,000 under \$1,000,000	218.9	166,862	210.5	19,176	147,708	216.7	16,247			
\$1,000,000 under \$5,000,000	95.5	82,209	94.5	24,872	167,338	94.5	12,325			
\$5,000,000 or more	3.7	36,755	5.8	5,186	53,569	5.7	1,872			

Size of net worth	Corporate stock		Total		Bonds		Government	
	Number	Amount	Number	Amount	Types of assets — Continued		Federal savings	
					Number	Amount	Number	Amount
Total	3,883.3	323,628	2,012.4	63,656	817.5	13,884	1,298.7	9,394
Negative net worth	33.5	2,589	6.7	57	*1.0	*207	5.7	*18
\$0 under \$50,000	381.8	5,654	201.9	209	45.1	59	189.0	119
\$50,000 under \$100,000	757.8	12,599	347.0	1,184	91.8	489	249.4	568
\$100,000 under \$150,000	879.8	24,796	467.4	4,714	1,397	317.8	317.8	1,912
\$150,000 under \$250,000	909.7	44,134	456.3	8,296	2,523	259.4	2,855	2,457
\$250,000 under \$500,000	624.6	63,748	334.0	11,563	174.6	3,301	103.3	918
\$500,000 under \$1,000,000	201.0	53,839	127.8	11,129	72.9	2,640	42.6	506
\$1,000,000 under \$5,000,000	89.9	82,762	66.5	19,145	39.2	2,403	17.9	506
\$5,000,000 or more	5.5	33,507	4.8	7,136	3.1	966	0.7	32

Size of net worth	Government — Continued		State and local		Life insurance equity		Notes and mortgages	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
Total	278.9	17,394	293.6	22,694	5,150.2	36,408	1,510.6	56,437
Negative net worth	**1.5	**19	**3.6	**67	90.6	894	17.3	1,040
\$0 under \$50,000	19.5	49	18.1	76	6.586	6,110	132.5	1,602
\$50,000 under \$100,000	57.8	954	33.0	451	1,153.5	8,110	210.0	3,214
\$100,000 under \$150,000	67.0	1,659	68.5	2,259	1,083.3	7,217	321.5	7,035
\$150,000 under \$250,000	67.3	2,906	73.3	2,689	983.9	5,372	359.1	11,488
\$250,000 under \$500,000	25.2	6,365	39.7	4,718	179.8	2,357	103.3	13,601
\$500,000 under \$1,000,000	2.5	6,365	3.3	9,671	78.2	1,641	53.0	6,253
\$1,000,000 under \$5,000,000	2.5	2,586	3.3	3,552	4.6	207	4.1	2,566

Size of net worth	Real estate		Noncorporate business		Other assets		Estate tax return statistics		
	Number	Amount	Number	Amount	Number	Amount	Number of returns	Gross estate	Net worth
Total	5,137.5	503,189	1,569.0	82,922	5,539.1	140,511	76,953	27,014	23,702
Negative net worth	76.9	9,363	49.8	4,177	89.3	1,040	256	108	-110
\$0 under \$50,000	633.5	46,811	75.5	3,500	982.4	6,176	1,690	386	64
\$50,000 under \$100,000	1,093.6	69,334	309.5	8,077	1,141.1	13,785	5,719	836	451
\$100,000 under \$150,000	1,138.6	84,069	293.2	9,294	1,153.2	18,616	9,718	3,141	2,683
\$150,000 under \$250,000	1,070.2	102,225	405.7	17,021	1,152.3	25,954	25,026	5,263	4,770
\$250,000 under \$500,000	650.7	102,225	293.3	17,303	688.6	28,417	15,472	5,230	5,255
\$500,000 under \$1,000,000	194.7	46,072	94.0	10,989	212.7	15,966	3,627	3,539	3,539
\$1,000,000 under \$5,000,000	84.9	34,420	44.6	10,244	83.9	24,092	2,269	4,544	4,186
\$5,000,000 or more	4.4	4,650	3.5	2,316	5.7	6,482	173	3,080	2,881

*Estimate should be used with caution because of the small number of sample estate tax returns on which it is based.
 **Data combined to avoid disclosure of information in specific estate tax returns.
 NOTE: Detail may not add to total because of rounding.

Table 3. — ALL WOMEN: TOP WEALTHHOLDERS, BY SIZE OF NET WORTH, 1976

[All figures are estimates based on estate tax return samples — numbers of top wealthholders are in thousands; all money amounts are in millions of dollars.]

Size of net worth	Number of top wealthholders	Total assets	Debt and mortgages			Net worth	Types of assets			
			Number	Amount	Number		Amount	Number	Amount	Cash
Total	2,912.9	845,193	2,599.5	83,812	761,391	2,749.1	122,005			
Negative net worth	266.6	*2,550	286.6	3,478	-829	*28.6	*267			
\$0 under \$50,000	61.9	10,874	61.8	8,574	2,400	57.2	212			
\$50,000 under \$100,000	256.8	37,206	252.8	15,869	21,336	221.4	2,423			
\$100,000 under \$150,000	963.6	134,502	817.4	13,007	121,495	881.3	28,652			
\$150,000 under \$250,000	876.7	179,540	752.2	13,655	165,885	38,717	39,877			
\$250,000 under \$500,000	483.6	178,516	427.5	13,916	164,600	480.3	26,734			
\$500,000 under \$1,000,000	186.0	120,775	156.2	6,835	113,940	164.1	12,319			
\$1,000,000 under \$5,000,000	73.7	136,615	70.7	7,232	131,383	72.5	8,106			
\$5,000,000 or more	3.9	42,515	3.8	1,245	41,270	3.9	1,394			

Size of net worth	Corporate stock	Total	Bonds			Federal savings		
			Number	Amount	Number		Amount	
								Government — Continued	State and local	Life insurance equity	Notes and mortgages
Total	2,014.3	207,346	1,313.6	65,995	643.4	13,641	651.0	8,033
Negative net worth	8.4	345	**25.5	**398	**4.7	**315	**..	**..
\$0 under \$50,000	26.9	440	26.9	357	18.5	128	**50.3	**188
\$50,000 under \$100,000	120.1	2,950	120.1	5,466	100.6	1,869	230.4	2,250
\$100,000 under \$150,000	641.4	21,205	378.4	9,500	224.8	3,552	2,236	2,740
\$150,000 under \$250,000	691.1	37,450	428.6	11,292	138.3	2,947	2,352	2,170
\$250,000 under \$500,000	390.3	47,226	288.6	12,045	65.0	2,343	33.8	1,713
\$500,000 under \$1,000,000	144.4	31,925	112.0	21,375	22.2	2,053	58.0	699
\$1,000,000 or more	60.0	17,649	54.4	3,377	1.7	340	14.4	417
\$5,000,000 or more	3.9	17,808	3.1	5,377	0.5	340	0.5	5

Size of net worth	Other Federal	Bonds — Continued			Life insurance equity	Notes and mortgages		
		Number	Amount	Number			Amount	
								Government — Continued	State and local	Life insurance equity	Notes and mortgages
Total	285.8	20,922	254.1	23,398	1,556.1	3,878	893.8	31,290
Negative net worth	**..	**..	**..	**..	*28.6	*64	*21.8	*142
\$0 under \$50,000	**..	**..	**..	**..	191.7	177	*1.1	*176
\$50,000 under \$100,000	**783	**783	**30.0	**571	1,110	584	90.9	790
\$100,000 under \$150,000	83.6	2,032	53.9	1,146	612.0	1,110	207.2	5,021
\$150,000 under \$250,000	94.3	4,126	69.1	2,506	425.1	1,004	296.8	8,882
\$250,000 under \$500,000	41.4	3,427	58.1	5,573	178.9	439	177.1	7,874
\$500,000 under \$1,000,000	26.9	6,371	40.6	10,554	61.4	282	73.4	5,035
\$1,000,000 or more	1.5	2,182	2.4	3,049	0.5	229	33.3	3,019
\$5,000,000 or more	1.5	2,182	2.4	3,049	0.5	12	2.3	351

Size of net worth	Real estate	Types of assets — Continued			Estate tax return statistics				
		Number	Amount	Number		Amount			
							Noncorporate business assets	Other assets	Number of returns	Gross estate	Net worth
Total	2,393.5	267,598	400.4	15,806	2,675.7	131,271	42,214	13,983	13,402
Negative net worth	*26.6	*903	**..	**1,514	*26.6	*325	*31	*11	*4.02
\$0 under \$50,000	57.1	8,178	**63.0	61.9	426	5,731	95	28	3
\$50,000 under \$100,000	228.0	23,678	31.8	248.5	678	11,862	676	108	57
\$100,000 under \$150,000	811.2	64,232	72.3	1,281	855.0	12,305	1,647	1,647	1,557
\$150,000 under \$250,000	703.9	64,463	101.2	2,663	793.8	15,860	15,797	3,100	2,995
\$250,000 under \$500,000	372.3	58,555	78.6	2,757	453.7	28,292	9,245	3,242	3,145
\$500,000 under \$1,000,000	130.9	29,489	33.1	3,069	162.4	20,630	3,074	2,149	2,094
\$1,000,000 or more	60.5	19,490	18.8	2,632	69.7	35,315	1,374	2,521	2,430
\$5,000,000 or more	3.0	4,810	1.6	1,187	3.9	11,387	1,01	1,179	1,132

*Estimate should be used with caution because of the small number of sample estate tax returns on which it is based.
 **Estimate should be used with caution because of the small number of sample estate tax returns on which it is based.
 NOTE: Detail may not add to total because of rounding.

Table 4. — MARRIED MEN: TOP WEALTHHOLDERS, BY SIZE OF NET WORTH, 1976

[All figures are estimates based on estate tax return samples — numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders		Total assets		Debt and mortgages		Net worth		Types of assets	
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	Cash		
								Number	Amount	
Total	4,812.7	1,118,423	4,418.0	218,228	900,185	4,583.9	120,141			
Negative net worth	81.3	15,590	81.3	21,571	-5,981	70.4	120,141			
\$0 under \$50,000	644.7	88,262	828.3	40,727	25,535	738.6	3,445			
\$50,000 under \$100,000	1,061.1	112,721	969.3	53,967	78,754	1,005.6	11,447			
\$100,000 under \$150,000	1,066.4	195,790	917.2	24,814	131,118	1,018.1	23,353			
\$150,000 under \$250,000	942.0	204,868	815.9	27,127	177,829	827.9	31,853			
\$250,000 under \$500,000	574.8	220,868	521.2	28,394	182,484	564.4	25,973			
\$500,000 under \$1,000,000	137.821	160,076	172.6	17,013	120,009	177.3	12,280			
\$1,000,000 under \$5,000,000	78.5	44,300	4.6	2,777	139,028	77.5	9,974			
\$5,000,000 or more	4.6				41,523	4.6	1,560			

Size of net worth	Corporate stock		Bonds		Total		Corporate and foreign		Government	
	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	Federal savings	
									Number	Amount
Total	3,218.9	257,679	1,607.3	47,851	682.9	10,681	682.2	6,989		
Negative net worth	32.9	2,526	6.7	273	1.0	290	5.7	18		
\$0 under \$50,000	315.2	4,657	154.9	174	44.8	57	122.3	86		
\$50,000 under \$100,000	697.1	10,188	306.8	888	75.5	317	224.3	547		
\$100,000 under \$150,000	771.7	19,588	377.9	3,594	145.7	1,029	249.5	1,413		
\$150,000 under \$250,000	500.7	33,313	349.9	6,079	182.7	2,015	187.2	1,397		
\$250,000 under \$500,000	166.1	48,140	252.4	8,504	128.9	2,288	117.4	1,776		
\$500,000 under \$1,000,000	73.7	45,434	101.9	4,461	59.2	2,077	32.1	645		
\$1,000,000 under \$5,000,000	4.4	68,977	53.0	14,395	31.6	1,759	14.9	363		
\$5,000,000 or more		24,877	3.9	5,184	2.8	941	0.9	24		

Size of net worth	Bonds — Continued		Life insurance equity		Notes and mortgages			
	(16)	(17)	(18)	(19)	(20)	(21)	(22)	(23)
Total	223.7	12,145	235.2	17,993	4,417.5	34,280	1,214.6	45,702
Negative net worth	**1.5	**19	**9	**96	81.3	828	14.2	849
\$0 under \$50,000	18.7	48	19.6	166	635.5	4,810	87.4	1,208
\$50,000 under \$100,000	49.5	826	27.0	74	1,037.0	7,498	156.9	2,743
\$100,000 under \$150,000	53.1	1,291	49.3	327	928.4	6,525	287.6	5,819
\$150,000 under \$250,000	53.9	2,195	44.1	778	812.7	6,178	294.6	9,434
\$250,000 under \$500,000	27.3	1,924	44.1	2,249	496.7	4,766	252.7	10,683
\$500,000 under \$1,000,000	17.9	4,582	29.8	2,614	154.4	2,080	94.2	7,382
\$1,000,000 under \$5,000,000	1.9	1,281	2.8	872	67.8	1,442	44.1	6,386
\$5,000,000 or more				2,959	4.1	167	3.3	1,219

Size of net worth	Real estate		Noncorporate business assets		Other assets		Estate tax return statistics		
	(24)	(25)	(26)	(27)	(28)	(29)	(30)	(31)	(32)
Total	4,419.0	427,490	1,978.6	71,445	4,637.1	114,028	57,756	18,396	16,620
Negative net worth	69.6	6,043	41.0	78.4	908	208	81	81	100
\$0 under \$50,000	752.0	41,470	70.4	3,397	617.6	7,099	1,736	319	57
\$50,000 under \$100,000	978.6	60,516	283.7	7,213	1,025.0	12,150	5,156	843	406
\$100,000 under \$150,000	985.8	73,008	340.4	7,482	1,009.8	15,382	15,451	2,398	1,971
\$150,000 under \$250,000	880.7	84,468	340.0	14,400	898.6	19,230	18,218	3,904	3,478
\$250,000 under \$500,000	538.0	66,375	292.8	13,960	553.4	20,958	11,350	4,248	3,841
\$500,000 under \$1,000,000	183.0	40,327	81.6	9,925	174.4	12,033	3,779	2,806	2,563
\$1,000,000 under \$5,000,000	71.5	29,077	39.2	9,072	77.1	20,773	1,733	3,381	3,076
\$5,000,000 or more	3.8	4,208	2.9	1,563	4.9	5,520	122	1,420	1,335

*Estimates should be used with caution because of the small number of sample estate tax returns on which it is based.
 **Data combined to avoid disclosure of information for specific estate tax returns.
 NOTE: Detail may not add to total because of rounding.

Table 5. — MARRIED WOMEN: TOP WEALTHHOLDERS, BY SIZE OF NET WORTH, 1976

[All figures are estimates based on estate tax return samples — numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders (1)	Total assets (2)	Debts and mortgages (3)		Net worth (5)	Types of assets	
			Number (10)	Amount (11)		Number (6)	Amount (7)
			Number (14)	Amount (15)	Number (8)	Amount (9)	
Total	1,263.0	390,666	1,156.5	56,363	322,262	1,230.3	43,904
Negative net worth	**22.0	11,994	**22.0	**2,671	**977	22.0	**240
\$0 under \$50,000	22.7	10,656	22.0	2,366	1,366	22.0	198
\$50,000 under \$100,000	60.7	28,178	60.7	8,292	12,637	59.8	1,029
\$100,000 under \$150,000	168.0	78,559	162.1	12,537	18,946	130.6	12,425
\$150,000 under \$250,000	459.0	66,891	396.6	8,045	58,946	396.8	14,189
\$250,000 under \$500,000	1,132.0	78,559	302.1	8,368	70,191	361.9	7,598
\$500,000 under \$1,000,000	317.4	66,103	149.2	10,046	50,057	163.0	3,484
\$1,000,000 under \$5,000,000	52.4	50,940	61.8	4,076	46,866	66.9	4,127
\$5,000,000 or more	32.4	59,987	30.7	3,696	56,171	31.9	628
	1.3	17,377	1.3	452	16,825	1.3	428

Size of net worth	Number (8)	Amount (9)	Corporate stock		Total		Corporate and foreign		Government	
			Number (10)	Amount (11)	Number (12)	Amount (13)	Number (14)	Amount (15)	Number (16)	Amount (17)
			Number (18)	Amount (19)	Number (20)	Amount (21)	Number (22)	Amount (23)		
Total	919.4	96,539	542.9	25,472	241.3	5,257	272.8	2,179		
Negative net worth	**28.0	**551	**25.4	**966	**16.6	**414	**97	**..		
\$0 under \$50,000	78.3	2,322	32.6	160	57.6	**14	**43.0	**..		
\$50,000 under \$100,000	308.6	8,046	182.9	2,106	182.0	812	112.3	732		
\$100,000 under \$150,000	308.1	14,430	182.0	3,280	86.1	1,255	74.6	722		
\$150,000 under \$250,000	230.4	17,505	98.3	3,129	39.6	717	24.9	459		
\$250,000 under \$500,000	62.1	18,195	44.0	4,140	24.8	690	10.9	179		
\$500,000 under \$1,000,000	25.3	22,781	26.8	10,526	15.4	1,114	10.9	79		
\$1,000,000 under \$5,000,000	1.3	10,369	1.2	1,786	0.8	1,114	6.7	0.4		
\$5,000,000 or more						265		4		

Size of net worth	Number (16)	Amount (17)	Bonds — Continued		Types of assets — Continued		Life insurance equity		Notes and mortgages	
			Government — Continued		State and local		Number (24)	Amount (25)	Number (26)	Amount (27)
			Number (18)	Amount (19)	Number (20)	Amount (21)				
			Number (28)	Amount (29)	Number (30)	Amount (31)	Number (32)	Amount (33)		
Total	98.9	7,519	107.9	10,516	779.1	1,925	449.1	15,282		
Negative net worth	**..	**..	**..	**..	**21.9	**58	**14.8	**142		
\$0 under \$50,000	**..	**..	**..	**..	**9.4	**1.1	**1.1	**1.1		
\$50,000 under \$100,000	**17.6	**421	**11.1	**216	111.4	329	66.3	1,775		
\$100,000 under \$150,000	29.7	755	20.0	529	301.6	457	106.5	2,898		
\$150,000 under \$250,000	23.9	876	31.2	1,087	293.3	142	139.4	4,568		
\$250,000 under \$500,000	13.6	907	23.0	1,087	83.1	111	67.8	4,110		
\$500,000 under \$1,000,000	11.3	4,256	21.5	2,384	28.7	124	32.3	1,484		
\$1,000,000 under \$5,000,000	0.7	302	1.1	5,079	9.3	3	14.4	1,145		
\$5,000,000 or more				1,219	0.3	3	0.5	181		

Size of net worth	Number (24)	Amount (25)	Real estate		Noncorporate business assets		Other assets		Estate tax return statistics	
			Number (26)	Amount (27)	Number (28)	Amount (29)	Number (30)	Amount (31)	Number of returns (32)	Gross estate (33)
			Number (36)	Amount (37)	Number (38)	Amount (39)	Number (40)	Amount (41)		
Total	1,239.2	147,300	255.6	10,212	1,232.5	41,119	8,736	3,015	2,796	
Negative net worth	**22.0	**625	**..	**1,510	**22.0	**304	**18	**..	**..	
\$0 under \$50,000	56.0	7,969	**62.9	**5,150	60.7	320	74	23	2	
\$50,000 under \$100,000	165.9	19,151	24.2	441	159.6	2,139	395	62	32	
\$100,000 under \$150,000	455.1	33,904	45.4	889	392.3	5,194	3,524	480	421	
\$150,000 under \$250,000	337.7	33,419	59.8	2,122	343.6	6,132	3,524	706	672	
\$250,000 under \$500,000	146.4	27,197	35.0	1,971	136.9	6,245	1,892	571	537	
\$500,000 under \$1,000,000	58.7	14,637	19.3	1,919	66.7	6,816	578	415	383	
\$1,000,000 under \$5,000,000	26.3	7,698	8.2	1,330	28.1	12,047	273	514	488	
\$5,000,000 or more	1.1	2,371	0.8	132	1.3	1,826	18	254	250	

*Estimates should be used with caution because of the small number of sample estates tax returns on which it is based.
 **Data considered to be small disclosures of information for specific estates tax returns.
 NOTE: Detail may not add to total because of rounding.

Table 6. — SINGLE MEN: TOP WEALTHHOLDERS, BY SIZE OF NET WORTH, 1976
 [All figures are estimates based on estate tax return samples — numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders (1)	Total assets (2)	Debts and mortgages (3)		Net worth (5)	Types of assets (7)	
			Number (3)	Amount (4)		Number (6)	Amount (7)
						Cash	
Negative net worth							
\$0 under \$50,000	435.8	98,236	406.1	15,195	83,041	428.0	16,780
\$50,000 under \$100,000	**95.4	**6,973	**92.9	**5,487	**1,476	**95.4	**390
\$100,000 under \$150,000	37.2	5,007	35.7	2,059	2,949	32.2	416
\$150,000 under \$250,000	100.3	13,902	92.5	1,274	12,628	99.6	3,947
\$250,000 under \$500,000	125.5	27,024	113.4	3,136	23,888	123.8	5,669
\$500,000 under \$1,000,000	66.1	23,516	61.3	2,021	21,495	65.8	3,977
\$1,000,000 under \$5,000,000	15.2	10,959	14.3	620	10,338	15.1	1,650
\$5,000,000 or more	5.9	9,090	5.9	434	8,627	5.9	1,550
	0.2	1,798	0.2	156	1,643	0.2	728
Total	822.3	180,228	798.7	28,226	151,000	798.7	28,226
Corporate stock							
Size of net worth	Number (8)	Amount (9)	Total		Corporate and foreign (12)	Government	
			Number (10)	Amount (11)		Number (14)	Amount (15)
Negative net worth							
\$0 under \$50,000	310.3	26,490	205.5	5,448	73.5	1,205	1,328
\$50,000 under \$100,000	**97.1	**517	**94.5	**28	—	—	78
\$100,000 under \$150,000	23.9	1,039	14.2	10	—	—	49
\$150,000 under \$250,000	73.6	2,946	47.9	510	19.9	132	218
\$250,000 under \$500,000	100.2	5,901	51.8	1,146	23.7	132	218
\$500,000 under \$1,000,000	53.9	7,092	41.9	1,316	21.0	40.3	502
\$1,000,000 under \$5,000,000	13.7	3,323	10.1	1,135	6.1	28.6	396
\$5,000,000 or more	0.2	4,444	0.2	1,226	2.6	4.9	132
	0.1	1,019	0.1	76	0.2	1.8	281
Total	610.3	64,204	422.5	12,226	122.5	1,843	2,481
Bonds — Continued							
Size of net worth	Number (16)	Amount (17)	State and local		Life insurance equity (21)	Notes and mortgages	
			Number (18)	Amount (19)		Number (22)	Amount (23)
Negative net worth							
\$0 under \$50,000	20.6	1,003	24.6	1,912	307.7	1,136	109.7
\$50,000 under \$100,000	—	—	—	—	**95.4	**325	..
\$100,000 under \$150,000	2.3	50	4.8	110	37.1	52	..
\$150,000 under \$250,000	6.6	150	8.6	282	70.0	154	..
\$250,000 under \$500,000	4.5	189	3.0	283	29.5	70	..
\$500,000 under \$1,000,000	4.8	327	3.1	384	12.0	20	..
\$1,000,000 under \$5,000,000	2.4	256	4.0	943	2.0	2.6	..
\$5,000,000 or more	0.1	32	0.1	30	0.1	1.1	..
Total	41.7	2,052	40.5	3,602	449.4	1,526	148.1
Types of assets — Continued							
Size of net worth	Number (24)	Amount (25)	Real estate		Number of returns (30)	Estate tax return statistics	
			Number (26)	Amount (27)		Number (31)	Net worth (32)
Negative net worth							
\$0 under \$50,000	296.3	29,418	74.9	5,520	393.1	4,539	1,390
\$50,000 under \$100,000	**50.9	**2,981	..	..	**48	**103	..
\$100,000 under \$150,000	35.7	2,705	..	..	32.2	1120	..
\$150,000 under \$250,000	86.4	3,902	13.1	327	76.8	1,116	10
\$250,000 under \$500,000	90.1	8,538	25.8	896	3,102	1,689	144
\$500,000 under \$1,000,000	46.8	6,202	23.4	1,149	57.8	1,019	318
\$1,000,000 under \$5,000,000	11.9	2,672	3.8	340	14.5	367	353
\$5,000,000 or more	4.3	1,391	1.6	412	5.7	368	250
	0.2	55	0.1	59	409	139	222
Total	589.7	61,936	139.6	8,296	1,005	11,515	13,900

*Estimate should be used with caution because of the small number of sample estate tax returns on which it is based.
 †Data combined to avoid disclosure of information for specific estate tax returns.
 NOTE: Detail may not add to total because of rounding.

Table 7. — SINGLE WOMEN: TOP WEALTHHOLDERS, BY SIZE OF NET WORTH, 1976

(All figures are estimates based on estate tax return samples — numbers of top wealthholders are in thousands; all money amounts are in millions of dollars)

Size of net worth	Number of top wealthholders (1)	Total assets (2)	Debts and mortgages (3)			Net worth (5)	Types of assets		
			Number (3)	Amount (4)	Amount (5)		Cash (6)		
							Number (7)	Amount (7)	Amount (7)
Total	307.0	75,554	278.5	4,363	71,191	291.8	13,180	..	
Negative net worth .....	..	..	..	..	..	..	..	..
\$0 under \$50,000	**24.3	**3,078	**24.3	**1,538	**1,540	**24.3	3,876	**5	
\$50,000 under \$100,000	105.1	14,000	96.8	839	13,162	103.7	3,876	161	
\$100,000 under \$150,000	87.6	19,093	90.4	789	18,303	97.0	4,174	338	
\$150,000 under \$250,000	57.8	18,728	43.6	258	18,469	44.8	2,118	349	
\$250,000 under \$500,000	17.4	12,435	16.9	753	11,692	17.2	1,189	180	
\$500,000 under \$1,000,000	4.9	7,813	4.4	160	7,653	4.5	1,380	245	
\$1,000,000 under \$5,000,000 .....	..	407	..	25	381	..	7	..
\$5,000,000 or more .....	..	..	..	..	..	..	..	..

Size of net worth	Number (8)	Amount (9)	Total (10)			Corporate and foreign (12)			Government (13)		
			Number (10)	Amount (11)	Number (12)	Amount (12)	Number (13)	Amount (13)	Federal savings (14)		
									Number (15)	Amount (15)	
Total	222.3	22,453	189.3	5,023	96.1	1,138	96.1	1,474	..	..
Negative net worth .....	..	..	..	..	..	..	..	..	..	..
\$0 under \$50,000	**14.3	**438	..	..	..	..	..	..	..	..
\$50,000 under \$100,000	92.7	4,537	**75.6	**817	**44.4	**206	**34.5	833	..	..
\$100,000 under \$150,000	72.8	6,952	56.8	1,285	31.2	433	43.5	591	..	..
\$150,000 under \$250,000	25.8	3,802	21.0	839	12.0	258	12.6	238	..	..
\$250,000 under \$500,000	12.4	3,172	11.4	1,349	6.0	147	4.1	77	..	..
\$500,000 under \$1,000,000	4.2	**3,555	3.8	692	**2.5	**93	1.4	39	..	..
\$1,000,000 under \$5,000,000 .....	..	37	..	41	..	..	..	..	..	..
\$5,000,000 or more .....	..	..	..	..	..	..	..	..	..	..

Size of net worth	Number (16)	Amount (17)	Bonds — Continued (18)			Life insurance equity (20)			Notes and mortgages (22)		
			Number (18)	Amount (19)	Number (20)	Amount (20)	Number (22)	Amount (22)	Government — Continued (21)		
									Number (23)	Amount (23)	
Total	24.8	963	20.8	1,448	167.4	516	38.1	1,010	..	..
Negative net worth .....	..	..	..	..	..	..	..	..	..	..
\$0 under \$50,000 .....	..	..	..	..	..	..	..	..	..	..
\$50,000 under \$100,000	**2.4	**39	**3.1	**38	**23.6	**104	**7.2	**83	..	..
\$100,000 under \$150,000	10.8	196	10.8	65	67.8	146	16.5	361	..	..
\$150,000 under \$250,000	7.3	230	5.0	118	43.0	175	8.4	144	..	..
\$250,000 under \$500,000	3.1	222	6.8	852	24.1	37	4.1	339	..	..
\$500,000 under \$1,000,000	1.1	229	**2.1	**339	1.3	13	**1.9	**82	..	..
\$1,000,000 under \$5,000,000 .....	..	37	..	..	..	..	..	..	..	..
\$5,000,000 or more .....	..	..	..	..	..	..	..	..	..	..

Size of net worth	Number (24)	Amount (25)	Types of assets — Continued (26)			Estate tax return statistics (27)			
			Number (26)	Amount (27)	Number (28)	Amount (28)	Number of returns (30)	Gross estate (31)	
									Net worth (32)
Total	171.5	15,393	15.9	327	274.6	17,682	4,548	1,364	1,318
Negative net worth .....	..	..	..	..	..	..	..	..	..
\$0 under \$50,000	**15.0	**1,253	..	..	**24.3	**795	**81	**15	**5
\$50,000 under \$100,000	65.0	3,420	3.5	9	89.1	1,295	1,236	189	161
\$100,000 under \$150,000	54.2	4,324	4.7	38	74.0	1,265	1,096	345	338
\$150,000 under \$250,000	23.5	3,030	4.8	96	55.1	8,196	1,096	354	349
\$250,000 under \$500,000	10.2	2,377	1.8	75	17.2	3,985	295	194	180
\$500,000 under \$1,000,000	**3.7	**959	1.0	119	4.8	1,982	149	253	245
\$1,000,000 under \$5,000,000 .....	..	..	..	..	..	229	4	34	31
\$5,000,000 or more .....	..	..	..	..	..	..	..	..	..

Estimates should be used with caution because of the small number of sample estate tax returns on which it is based.
 *Less than 50 top wealthholders.
 NOTE: Detail may not add to total because of rounding.

Table 9. — WIDOWS: TOP WEALTHHOLDERS, BY SIZE OF NET WORTH, 1976

[All figures are estimates based on estate tax return samples — numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders		Total assets		Debits and mortgages		Net worth		Types of assets	
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	Cash		
								Number	Amount	
Total	850.1	312,755	856.6	13,278	299,478	833.8	56,600			
Negative net worth										
\$0 under \$50,000	0.5	79	0.5	58	21	0.5	56,600			
\$50,000 under \$100,000	15.1	2,068	15.1	841	1,227	15.0	519			
\$100,000 under \$150,000	290.0	39,614	296.7	1,999	37,815	282.9	11,630			
\$150,000 under \$250,000	328.2	64,667	289.2	2,518	62,148	321.5	17,757			
\$250,000 under \$500,000	214.9	75,769	197.3	2,847	72,922	213.2	15,237			
\$500,000 under \$1,000,000	87.9	47,671	64.9	1,547	46,123	67.3	6,963			
\$1,000,000 under \$5,000,000	31.5	61,919	30.9	2,813	59,106	31.2	4,065			
\$5,000,000 or more	2.0	20,969	1.9	655	20,314	2.0	582			

Size of net worth	Corporate stock		Total		Corporate and foreign		Government	
	(8)	(9)	(10)	(11)	(12)	(13)	Federal savings	
							Number	Amount
Total	668.2	70,796	509.7	30,880	248.1	6,263	253.0	4,085
Negative net worth								
\$0 under \$50,000								
\$50,000 under \$100,000	**4.2	**60	**3.7	**38	**	**	**	**
\$100,000 under \$150,000	192.4	5,302	130.0	2,488	**53.1	**860	2.9	17
\$150,000 under \$250,000	240.4	11,494	179.1	4,348	86.1	1,505	93.9	1,388
\$250,000 under \$500,000	163.9	15,975	126.0	5,800	65.4	1,697	56.4	911
\$500,000 under \$1,000,000	58.9	13,148	48.5	5,913	29.0	1,342	16.3	424
\$1,000,000 under \$5,000,000	26.9	18,582	21.0	8,695	12.0	777	5.2	262
\$5,000,000 or more	2.0	6,235	1.4	3,597	0.5	63	0.1	1

Size of net worth	Bonds — Continued		Life insurance equity		Notes and mortgages	
	Government — Continued		State and local		Amount	
	Number	Amount	Number	Amount	Number	Amount
Total	132.0	10,632	100.5	9,900	438.7	1,080
Negative net worth						
\$0 under \$50,000						
\$50,000 under \$100,000	**	**	**	**	**	**
\$100,000 under \$150,000	**17.7	**320	13.1	226	**0.7	**26
\$150,000 under \$250,000	36.7	894	21.9	462	**34	1,871
\$250,000 under \$500,000	41.9	2,260	26.4	923	328	81.6
\$500,000 under \$1,000,000	22.4	2,172	22.9	1,976	292	100.1
\$1,000,000 under \$5,000,000	12.5	3,067	15.4	4,590	250	3,374
\$5,000,000 or more	0.8	1,819	1.1	1,714	94	80.6

Size of net worth	Real estate		Noncorporate business assets		Other assets		Estate tax return statistics		
	(24)	(25)	(26)	(27)	(28)	(29)	(30)	Net worth	
								Gross estate	(32)
Total	747.4	78,263	83.1	4,027	883.1	56,284	26,273	9,022	8,738
Negative net worth									
\$0 under \$50,000	0.5	57			0.5				
\$50,000 under \$100,000	14.3	1,071	**1.0	**18	13.0	308	**14	**9	**11
\$100,000 under \$150,000	230.6	13,168	20.8	363	267.1	4,266	153	23	11
\$150,000 under \$250,000	252.4	20,340	21.4	467	289.6	6,568	7,003	862	824
\$250,000 under \$500,000	169.0	21,898	22.5	688	204.1	12,528	9,862	1,925	1,873
\$500,000 under \$1,000,000	52.2	10,562	9.6	943	61.9	7,797	2,084	2,171	2,114
\$1,000,000 under \$5,000,000	26.8	9,006	7.2	548	31.0	10,376	2,095	1,450	1,597
\$5,000,000 or more	1.6	2,160	0.6	1,000	2.0	7,221	837	837	789

*Estimate should be used with caution because of the small number of sample estate tax returns on which it is based.

**Data combined to avoid disclosure of information for specific estate tax returns.

NOTE: Detail may not add to total because of rounding.

Table 10. — TOP WEALTHHOLDERS UNDER 50 YEARS OF AGE, BY SIZE OF NET WORTH, 1976

[All figures are estimates based on estate tax return samples — numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders		Total assets		Debts and mortgages		Net worth		Types of assets	
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	Types of assets		
								Number	Amount	
Total	3,619.4	705,785	3,469.7	205,348	500,438	3,393.0	56,554			
Negative net worth	105.9	16,799	105.9	23,335	23,335	95.0	6,536			
\$0 under \$50,000	989.3	74,377	950.4	45,913	28,464	859.0	4,114			
\$50,000 under \$100,000	898.3	106,770	869.1	40,189	66,561	830.2	6,740			
\$100,000 under \$150,000	725.2	111,488	670.0	23,787	87,711	674.8	14,535			
\$150,000 under \$250,000	514.9	121,080	483.0	25,223	95,858	509.8	12,678			
\$250,000 under \$500,000	275.9	115,107	253.5	23,781	81,328	263.3	7,829			
\$500,000 under \$1,000,000	86.0	74,874	89.7	10,953	53,822	82.3	4,335			
\$1,000,000 under \$5,000,000	37.7	78,374	37.1	11,864	69,510	37.4	3,684			
\$5,000,000 or more	1.1	6,905	1.1	304	6,601	1.1	119			
Types of assets — Continued										
Size of net worth	Corporate stock		Total		Bonds		Federal savings		Government	
	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)	Government	
									Number	Amount
Total	2,160.2	144,695	931.1	22,204	345.8	4,418	609.5	1,355		
Negative net worth	33.6	2,469	35.7	242	..	..	..	..
\$0 under \$50,000	371.0	5,354	195.7	513	..	..	..	..
\$50,000 under \$100,000	529.5	10,899	208.2	604	..	..	..	..
\$100,000 under \$150,000	497.8	18,991	190.5	686	..	..	..	..
\$150,000 under \$250,000	392.9	25,591	134.7	1,473	..	..	..	..
\$250,000 under \$500,000	219.6	28,166	95.6	2,219	..	..	..	..
\$500,000 under \$1,000,000	85.0	25,063	55.0	4,674	..	..	..	..
\$1,000,000 under \$5,000,000	28.7	28,591	24.3	9,376	..	..	..	..
\$5,000,000 or more	1.1	3,771	1.1	1,616	..	..	..	..
Types of assets — Continued										
Size of net worth	Bonds — Continued		Government — Continued		Life insurance equity		Notes and mortgages			
	(16)	(17)	State and local		(20)	(21)	(22)	(23)		
			Number	Amount					Number	Amount
Total	86.7	7,766	110.5	8,684	3,114.8	13,724	822.6	22,663		
Negative net worth	..	..	..	..	..	..	..	..
\$0 under \$50,000	..	..	..	..	105.9	760	34.9	772	
\$50,000 under \$100,000	..	..	..	..	940.5	4,712	116.2	1,508	
\$100,000 under \$150,000	..	..	..	..	846.4	3,437	218.4	2,477	
\$150,000 under \$250,000	..	..	..	..	575.0	1,659	151.3	3,764	
\$250,000 under \$500,000	..	..	..	..	378.5	1,469	129.3	4,096	
\$500,000 under \$1,000,000	..	..	..	..	183.2	1,031	107.6	3,446	
\$1,000,000 under \$5,000,000	..	..	..	..	62.2	369	45.4	3,473	
\$5,000,000 or more	..	..	..	..	..	..	..	..
Types of assets — Continued										
Size of net worth	Real estate		Noncorporate business assets		Other assets		Estate tax return statistics			
	(24)	(25)	(26)	(27)	(28)	(29)	(30)	(31)	(32)	Net worth
Total	3,151.0	299,717	922.4	43,585	3,469.7	103,639	6,098	1,659	862	
Negative net worth	81.9	8,189	67.9	2,407	103.4	1,041	154	58	13	
\$0 under \$50,000	820.9	47,165	102.9	3,464	946.2	7,545	1,418	252	43	
\$50,000 under \$100,000	813.5	60,395	242.3	6,738	881.2	13,693	1,821	293	119	
\$100,000 under \$150,000	642.6	57,745	210.8	4,840	657.6	11,081	1,252	245	152	
\$150,000 under \$250,000	446.5	59,916	210.8	9,305	489.0	13,569	941	265	174	
\$250,000 under \$500,000	228.2	44,360	124.1	8,751	265.6	20,304	487.7	237	161	
\$500,000 under \$1,000,000	75.4	18,157	34.5	4,883	91.3	13,892	159	139	100	
\$1,000,000 under \$5,000,000	
\$5,000,000 or more	

*Estimates should be used with caution because of the small number of sample estate tax returns on which it is based.
 **Data combined to avoid disclosure of information for specific estate tax returns.
 NOTE: Detail may not add to total because of rounding.

Table 11. — TOP WEALTHHOLDERS 50 TO 64 YEARS OF AGE, BY SIZE OF NET WORTH, 1976

[All figures are estimates based on estate tax return samples — numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debt and mortgages		Net worth	Types of assets										
			Number	Amount		Number	Amount									
								Cash	Amount							
Total	2,878.5	791,866	2,594.0	105,231	696,735	2,769.1	97,834									
Negative net worth	11.8	5,035	11.8	6,901	-1,866	11.8	189									
\$0 under \$50,000	76.2	11,891	76.2	2,850	2,850	74.8	557									
\$50,000 under \$100,000	480.9	53,783	462.7	13,862	39,901	472.8	6,234									
\$100,000 under \$150,000	877.1	123,241	758.7	106,348	106,348	821.5	22,310									
\$150,000 under \$250,000	781.9	161,467	662.7	16,895	144,572	745.4	28,091									
\$250,000 under \$500,000	457.9	173,402	416.1	18,301	155,101	442.5	21,080									
\$500,000 under \$1,000,000	137.7	104,018	132.5	10,896	83,122	136.2	9,561									
\$1,000,000 under \$5,000,000	61.0	121,647	59.4	13,574	108,073	60.1	7,707									
\$5,000,000 or more	4.0	37,503	4.0	1,870	35,633	4.0	1,101									
Types of assets — Continued																
Size of net worth	Number	Amount	Total		Corporate and foreign		Government									
			Number	Amount	Number	Amount	Number	Amount								
									Federal savings							
Corporate stock																
Size of net worth	Number	Amount	Number	Amount	Number	Amount	Number	Amount								
									Bonds — Continued							
									Government — Continued							
Size of net worth	Number	Amount	Other Federal		State and local		Life insurance equity									
			Number	Amount	Number	Amount	Number	Amount								
									Types of assets — Continued							
Size of net worth	Number	Amount	Real estate		Noncorporate business assets		Other assets									
			Number	Amount	Number	Amount	Number	Amount								
									Estate tax return statistics							
Size of net worth	Number	Amount	Number	Amount	Number of returns	Gross estate	Net worth									
								Types of assets — Continued								
								Estate tax return statistics								

Estimates should be used with caution because of the small number of sample estate tax returns on which it is based.
 *Data contained to avoid disclosure of information for specific estate tax returns.
 NOTE: Data may not add to total because of rounding.

Table 12. — TOP WEALTHHOLDERS 65 YEARS OF AGE OR OLDER, BY SIZE OF NET WORTH, 1976

[All figures are estimates based on estate tax return samples — numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders		Total assets		Debts and mortgages		Net worth		Types of assets	
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
Total	1,940.4	645,395	1,626.5	29,677	615,718	1,903.0	112,843			
Negative net worth	1.1	581	1.1	849	-268	1.1	37			
\$0 under \$50,000	2.0	425	2.0	356	35	1.5	35			
\$50,000 under \$100,000	23.7	3,207	23.3	1,161	2,046	21.9	380			
\$100,000 under \$150,000	557.5	76,119	440.4	3,372	72,747	542.4	3,177			
\$150,000 under \$250,000	728.1	142,834	568.4	4,454	138,481	715.1	37,516			
\$250,000 under \$500,000	420.5	147,502	372.2	5,006	142,496	414.0	29,101			
\$500,000 under \$1,000,000	140.9	99,328	132.3	3,802	95,527	133.3	13,335			
\$1,000,000 under \$5,000,000	64.3	119,638	62.7	6,435	113,403	63.4	9,167			
\$5,000,000 or more	4.4	55,460	4.1	4,243	51,217	4.4	1,886			

Size of net worth	Corporate stock		Bonds		Federal savings		Government	
	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)
Total	1,455.7	180,721	1,053.6	62,140	544.6	11,837	520.6	9,571
Negative net worth	0.8	88	0.4	16	0.4	0.4	0.4	0.4
\$0 under \$50,000	1.3	31	1.2	12	0.9	0.9	0.9	0.9
\$50,000 under \$100,000	15.0	290	7.7	70	55.9	49	11.5	11.5
\$100,000 under \$150,000	386.5	11,278	253.5	4,677	1,536	1,536	1,536	1,536
\$150,000 under \$250,000	541.7	27,238	376.8	9,447	1,988	1,988	1,988	1,988
\$250,000 under \$500,000	343.7	36,618	264.7	12,404	1,042	1,042	1,042	1,042
\$500,000 under \$1,000,000	122.7	31,063	97.4	10,809	56.9	56.9	56.9	56.9
\$1,000,000 under \$5,000,000	56.0	46,569	49.0	17,207	27.5	27.5	27.5	27.5
\$5,000,000 or more	4.1	27,524	3.7	7,488	1.8	2.1	2.1	2.1

Size of net worth	Other Federal		State and local		Life insurance equity		Notes and mortgages	
	(16)	(17)	(18)	(19)	(20)	(21)	(22)	(23)
Total	264.4	18,997	217.8	21,635	1,125.3	8,961	624.0	28,171
Negative net worth	0.9	140	0.4	0.4	1.0	1.0	0.4	0.4
\$0 under \$50,000	1.2	229	0.4	0.4	1.2	1.2	0.3	0.3
\$50,000 under \$100,000	38.9	753	23.8	402	18.6	303	1.8	1.8
\$100,000 under \$150,000	81.0	2,084	50.9	9,067	351.3	1,838	6.5	6.5
\$150,000 under \$250,000	71.7	3,764	61.1	2,430	415.6	2,598	14.4	14.4
\$250,000 under \$500,000	39.8	2,413	45.7	4,328	228.1	2,059	161.2	161.2
\$500,000 under \$1,000,000	24.7	2,853	33.0	9,275	73.5	1,114	61.7	61.7
\$1,000,000 under \$5,000,000	2.0	3,122	2.9	4,128	33.8	882	30.8	30.8
\$5,000,000 or more	2.0	4,389	1.7	4,128	2.2	144	2.7	2.7

Size of net worth	Real estate		Noncorporate business		Other assets		Estate tax return statistics	
	(24)	(25)	(26)	(27)	(28)	(29)	(30)	(31)
Total	1,589.4	167,228	290.5	13,116	1,773.4	72,213	87,130	31,628
Negative net worth	0.9	140	0.2	0.2	0.9	163	42	20
\$0 under \$50,000	1.9	261	1.0	31	2.0	104	87	19
\$50,000 under \$100,000	22.1	1,708	5.4	89	20.6	295	806	127
\$100,000 under \$150,000	454.2	27,916	54.0	872	491.8	5,425	23,294	3,235
\$150,000 under \$250,000	539.3	45,365	94.1	1,867	657.6	11,881	32,501	6,445
\$250,000 under \$500,000	185.0	24,069	74.0	2,569	397.1	14,575	20,078	7,094
\$500,000 under \$1,000,000	115.2	24,201	32.3	2,206	136.1	12,147	6,916	4,885
\$1,000,000 under \$5,000,000	52.9	29,949	17.7	3,051	62.9	18,158	5,801	3,802
\$5,000,000 or more	3.8	4,389	1.7	2,371	4.4	9,428	237	3,691

*Estimates should be used with caution because of the small number of sample estate tax returns on which it is based.

**Data combined to avoid disclosure of information for specific estate tax returns.

NOTE: Detail may not add to total because of rounding.

Table 14. — TOP WEALTHHOLDERS, BY AGE AND MARITAL STATUS, 1976

[All figures are estimates based on estate tax return samples — numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

Age group and marital status	Number of top wealth-holders	Total assets	Debt and mortgages		Net worth	Cash			Corporate stock		Types of assets				
			Number	Amount		Number	Amount	Number	Amount	Total		Bonds		Government	
										(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)
Total	9,685.0	2,212,731	7,893.4	343,798	1,869,933	8,283.3	280,784	5,897.6	530,974	3,326.1	129,650	1,480.8	27,625	1,877.7	17,418
Married	6,175.7	1,499,068	5,574.5	276,812	1,222,477	5,814.2	163,945	4,138.3	353,218	2,150.2	73,123	884.0	15,937	1,224.8	9,068
Single	742.8	173,790	682.6	18,558	154,231	719.9	20,940	520.9	46,953	374.9	10,471	169.6	2,343	260.5	2,802
Widowed	1,218.8	391,732	1,100.5	370,795	20,936	1,201.4	71,827	878.8	88,773	636.9	37,397	308.1	7,513	325.3	5,089
Other	556.6	148,120	535.7	28,692	121,428	547.8	15,272	340.8	36,049	164.1	8,658	89.1	1,831	67.2	457
Under 50 years, total	3,619.4	705,785	3,499.7	205,348	500,436	3,363.0	56,554	2,160.2	144,695	831.1	22,204	345.8	4,418	699.5	1,355
Married	2,804.3	521,768	2,678.1	170,453	351,314	2,569.3	39,523	1,657.8	102,816	674.4	15,291	218.2	2,845	451.8	1,049
Single	406.2	78,248	386.0	12,822	65,428	387.3	8,801	282.5	23,343	159.4	2,336	78.6	781	118.3	217
Widowed	82.7	33,446	79.4	4,268	29,177	82.7	3,668	46.1	1,251	35.8	1,059	*15.0	*333	19.3	65
Other	326.2	72,323	326.2	17,805	54,519	323.7	4,584	173.6	17,285	61.5	3,517	*35.8	*478	*19.9	*25
50 under 60 years, total	2,059.2	543,403	1,981.2	83,596	459,806	1,980.4	63,882	1,488.8	121,945	835.9	24,471	340.8	4,178	457.2	3,094
Married	1,629.6	422,759	1,487.8	69,307	353,451	1,557.5	43,989	1,164.2	98,690	603.9	15,522	232.0	3,717	332.2	1,800
Single	115.9	51,724	104.2	4,711	47,013	115.6	5,777	89.2	7,539	73.8	2,280	32.6	691	45.3	575
Widowed	195.0	56,079	178.0	5,159	50,920	192.2	9,700	151.0	9,347	106.0	4,550	48.1	1,084	53.2	583
Other	118.8	32,841	111.2	4,418	28,424	115.2	4,421	84.4	8,368	52.2	2,119	28.1	696	26.6	125
60 under 65 years, total	819.3	248,563	722.8	21,635	226,928	788.7	33,952	617.7	67,443	388.4	15,557	180.3	4,186	222.5	2,333
Married	596.5	181,517	516.4	17,086	164,431	571.4	21,708	457.9	52,394	274.3	10,551	127.3	2,961	155.8	1,608
Single	39.6	6,669	36.0	596	6,073	39.6	2,643	27.0	1,877	22.2	731	8.1	98	16.2	230
Widowed	144.1	44,990	135.7	2,669	42,321	139.0	8,100	103.9	10,669	76.0	3,679	35.4	885	44.8	434
Other	39.2	12,387	34.7	1,295	11,093	38.7	1,503	28.8	2,502	15.9	607	6.5	166	5.9	62
65 under 70 years, total	680.5	212,829	575.4	12,282	200,546	676.5	36,310	524.0	36,310	354.6	16,918	182.2	3,690	176.2	2,341
Married	411.8	136,134	350.4	8,625	128,509	431.9	20,993	335.9	35,308	219.6	10,118	115.4	2,252	103.5	1,219
Single	53.8	14,762	49.3	483	14,279	53.8	3,327	43.7	3,878	36.8	1,125	15.0	208	26.4	463
Widowed	166.8	50,253	151.2	2,953	47,300	164.6	10,180	126.6	11,533	85.1	4,959	45.1	1,288	40.5	543
Other	28.1	9,678	24.4	610	9,068	28.1	1,811	17.8	2,888	13.0	715	6.6	145	5.8	117
70 under 75 years, total	489.5	166,058	418.4	9,241	156,816	489.7	28,112	370.4	44,634	284.9	15,849	154.1	3,323	137.7	2,487
Married	289.2	94,478	228.7	4,916	89,562	280.9	15,318	223.8	24,887	163.7	8,359	91.0	1,810	75.6	1,278
Single	33.0	10,242	29.5	1,188	10,044	33.0	2,735	23.9	3,306	23.2	1,198	9.5	182	16.8	488
Widowed	182.4	51,594	146.9	1,988	49,606	181.0	10,052	120.3	12,097	89.8	5,686	49.6	1,168	42.4	871
Other	14.8	9,746	13.3	2,139	7,906	14.8	1,008	11.3	4,344	8.1	606	4.1	152	2.8	51
75 under 80 years, total	346.0	117,116	289.4	3,951	113,167	341.1	22,042	260.1	34,803	183.4	12,803	100.5	2,314	97.8	2,214
Married	181.8	59,622	128.3	2,411	57,211	159.0	9,571	122.6	18,708	90.9	6,487	49.8	1,149	43.6	862
Single	28.6	8,791	25.6	1,195	8,596	28.2	2,325	21.5	2,415	20.6	943	8.9	136	13.0	330
Widowed	148.4	45,625	130.0	1,188	44,427	144.5	9,561	109.5	12,730	78.0	5,164	39.2	94	39.4	902
Other	8.3	3,080	7.6	147	2,933	8.3	565	6.4	948	3.9	289	2.5	86	1.7	20
80 under 85 years, total	231.3	82,121	194.7	2,372	79,749	228.7	14,483	187.1	25,482	123.8	8,569	61.3	1,359	62.7	1,444
Married	85.1	31,188	67.2	938	30,250	82.5	5,088	61.1	9,590	46.2	3,002	23.8	572	22.4	532
Single	21.7	6,798	19.1	259	6,539	21.4	1,514	16.3	2,172	13.0	593	6.2	67	8.3	195
Widowed	120.2	41,628	105.7	1,109	40,519	116.5	7,578	88.4	12,382	62.5	4,776	30.2	697	31.2	697
Other	4.3	2,507	3.6	67	2,440	4.3	303	3.3	1,937	2.1	197	1.2	23	0.8	21
85 years or more, total	173.1	67,269	148.6	1,930	65,439	169.1	10,895	125.1	22,174	97.1	7,922	48.7	1,052	48.4	1,065
Married	38.8	15,465	31.1	430	15,036	37.6	2,300	28.1	4,586	21.4	1,680	11.5	275	9.8	98
Single	18.1	6,760	15.5	186	6,574	17.6	1,324	14.2	2,441	12.4	785	6.3	139	7.0	177
Widowed	112.7	43,558	88.7	1,154	42,404	110.2	6,895	80.6	14,638	61.5	5,317	28.1	827	28.7	668
Other	3.5	1,485	3.2	47	1,438	3.5	255	2.2	506	1.8	150	0.9	15	0.8	19
Age unknown, total	256.7	69,585	213.1	3,542	66,043	248.2	13,552	165.3	16,171	117.1	5,268	49.1	883	67.7	1,085
Married	129.0	34,159	108.5	2,446	31,713	123.8	5,370	86.6	8,237	55.9	2,133	25.0	356	29.9	404
Single	22.9	6,795	18.5	104	6,691	22.2	1,484	14.3	1,961	13.4	471	5.3	68	8.0	129
Widowed	89.4	24,598	74.9	827	23,731	88.6	5,866	55.5	5,114	42.2	2,207	17.4	390	25.9	350
Other	15.4	4,073	11.3	165	3,907	13.4	823	8.8	858	5.6	457	1.5	77	2.8	517

Footnote at end of table.

Table 14.—TOP WEALTHHOLDERS, BY AGE AND MARITAL STATUS, 1976—Continued
 [All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

Age group and marital status	Types of assets—Continued										Estate tax return statistics											
	Bonds—Continued					Life insurance equity					Real estate			Noncorporate business assets			Other assets			Number of returns	Gross estate	Net worth
	Government—Continued					Notes and mortgages					Rental			Other			Number	Amount	Number				Amount
	Other Federal	State and local	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount				Number	Amount	Number		Amount
(16)	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)	(25)	(26)	(27)	(28)	(29)	(30)	(31)	(32)						
Total	564.7	36,315.5	547.7	46,293.3	6,706.2	42,287.7	2,404.4	87,727.7	7,531.0	770,787.7	1,989.3	98,726.7	8,214.8	271,782.7	119,167.7	40,987.7	37,104.7					
Married	320.7	19,664.4	343.1	28,454.4	5,196.7	36,205.4	1,653.8	60,995.4	5,658.2	574,790.4	1,632.4	81,657.4	5,667.7	155,147.4	67,482.4	22,381.4	19,416.4					
Single	45.4	1,969.4	45.4	3,360.4	1,478.4	1,652.4	147.8	3,490.4	487.8	44,778.4	90.8	5,846.4	667.7	28,878.4	9,096.4	2,878.4	2,708.4					
Widowed	158.7	12,753.4	118.5	12,042.4	632.8	2,627.4	389.2	15,698.4	974.0	102,292.4	140.7	5,821.4	1,135.6	66,493.4	38,913.4	13,447.4	12,932.4					
Other	40.0	3,933.4	40.8	2,437.4	403.6	1,803.4	203.6	7,543.4	48,826.4	48,826.4	105.5	5,403.4	541.7	21,464.4	3,686.4	2,291.4	2,049.4					
Under 50 years, total	86.7	7,766.4	110.5	8,684.4	3,114.8	13,724.4	822.6	22,663.4	3,151.0	298,717.4	822.4	43,595.4	3,489.7	103,639.4	6,098.4	1,658.4	882.4					
Married	54.3	4,717.4	74.9	6,678.4	2,525.9	12,024.4	695.3	17,531.4	2,594.8	240,697.4	789.4	37,120.4	2,707.2	86,763.4	5,057.4	1,358.4	682.4					
Single	6.8	1,174.4	13.2	1,184.4	768.4	1,345.4	229.1	1,345.4	229.1	21,606.4	38.1	1,758.4	357.9	18,270.4	489.4	116.4	78.4					
Widowed	9.3	2,068.4	19.9	4,566.4	1,568.4	5,777.4	284.4	2,091.4	733.6	7,517.4	21.7	1,375.4	82.7	17,328.4	146.4	62.4	49.4					
Other	22.2	2,668.4	13.6	346.4	255.2	773.4	115.9	2,697.4	23,818.4	23,818.4	75.2	3,332.4	322.0	11,278.4	407.4	121.4	72.4					
50 under 60 years, total	124.0	6,212.4	137.6	8,987.4	3,156.4	13,156.4	615.4	23,132.4	1,887.4	204,410.4	539.2	31,407.4	1,971.8	60,888.4	12,188.4	3,526.4	2,510.4					
Married	88.9	4,065.4	90.9	6,000.4	1,374.4	11,695.4	474.7	17,731.4	1,516.9	169,080.4	465.7	26,057.4	1,553.6	42,015.4	10,018.4	2,804.4	2,010.4					
Single	9.1	289.4	10.4	445.4	378.4	578.4	28.4	728.4	81.97	81.97	24.7	3,312.4	111.6	3,514.4	632.4	186.4	148.4					
Widowed	20.4	1,336.4	22.9	1,535.4	138.8	67.7	285.8	67.7	170.4	170.4	29.4	894.4	189.7	11,281.4	243.4	205.4	148.4					
Other	5.6	600.4	13.7	708.4	86.4	48.7	1,813.4	86.1	10,110.4	10,110.4	18.4	1,206.4	117.1	4,187.4	664.4	183.4	147.4					
60 under 65 years, total	62.6	3,612.4	67.8	5,424.4	640.5	5,624.4	278.7	728.4	728.4	728.4	152.9	9,151.4	772.4	28,224.4	10,575.4	3,286.4	2,762.4					
Married	43.6	2,475.4	47.9	3,507.4	481.8	4,865.4	200.1	8,481.4	5,436.6	57,882.4	162.9	7,962.4	560.6	17,875.4	8,361.4	2,833.4	2,181.4					
Single	3.4	134.4	3.5	281.4	25.7	120.4	10.1	288.4	33.1	2,928.4	6.6	192.4	38.5	887.4	478.4	120.4	108.4					
Widowed	12.9	862.4	11.6	1,388.4	93.3	447.4	50.6	2,068.4	120.9	12,334.4	15.6	522.4	137.6	7,168.4	1,327.4	386.4	356.4					
Other	2.8	141.4	4.8	238.4	29.7	191.4	18.0	536.4	30.9	4,081.4	4.4	476.4	37.6	2,491.4	408.4	137.4	118.4					
65 under 70 years, total	78.3	4,272.4	79.8	6,414.4	475.3	4,069.4	242.6	11,018.4	601.8	63,012.4	130.3	5,897.4	643.8	21,685.4	13,126.4	4,116.4	3,756.4					
Married	45.4	2,807.4	45.9	3,840.4	330.6	3,983.4	159.7	7,368.4	399.8	42,565.4	97.8	4,980.4	410.0	13,470.4	9,984.4	2,696.4	2,702.4					
Single	7.5	213.4	4.1	244.4	34.7	184.4	8.8	379.4	44.9	3,748.4	6.9	163.4	50.3	1,956.4	803.4	256.4	253.4					
Widowed	20.6	1,155.4	19.9	1,973.4	94.5	415.4	64.8	2,907.4	137.0	14,615.4	19.7	609.4	186.4	5,135.4	2,338.4	702.4	637.4					
Other	2.6	87.4	3.8	357.4	15.6	86.4	9.3	463.4	20.2	2,068.4	4.1	215.4	24.9	1,424.4	461.4	197.4	144.4					
70 under 75 years, total	69.1	4,416.4	69.7	5,624.4	299.4	2,210.4	166.0	8,491.4	414.8	43,872.4	69.1	4,095.4	467.0	17,805.4	15,926.4	5,352.4	4,970.4					
Married	36.9	2,091.4	38.6	3,182.4	318.2	1,757.4	99.8	4,368.4	253.1	27,054.4	49.8	2,585.4	268.5	10,148.4	10,466.4	3,445.4	3,214.4					
Single	4.1	243.4	4.1	276.4	15.4	81.4	9.4	295.4	22.7	1,888.4	3.7	76.4	31.3	664.4	309.4	301.4	301.4					
Widowed	26.0	2,093.4	14.8	1,844.4	77.3	320.4	53.3	2,348.4	126.7	13,748.4	14.1	1,228.4	154.8	6,015.4	4,043.4	1,272.4	1,212.4					
Other	2.1	76.4	2.3	324.4	6.4	52.4	5.4	1,480.4	9.3	1,182.4	1.5	96.4	14.3	877.4	408.4	326.4	241.4					
75 under 80 years, total	47.2	3,741.4	39.6	4,614.4	184.3	1,279.4	106.4	4,518.4	267.2	27,729.4	41.9	1,682.4	310.6	12,172.4	17,567.4	6,098.4	5,832.4					
Married	20.5	1,627.4	21.3	2,749.4	89.6	49.6	2,436.4	2,436.4	135.1	14,536.4	26.6	1,251.4	145.2	5,897.4	9,430.4	3,527.4	3,344.4					
Single	3.4	236.4	3.9	238.4	11.8	39.4	6.5	178.4	19.6	1,916.4	3.0	118.4	25.8	853.4	1,364.4	420.4	408.4					
Widowed	21.9	1,802.4	13.6	1,518.4	64.1	284.4	47.8	1,815.4	137.6	10,548.4	11.6	299.4	192.1	5,222.4	6,383.4	2,008.4	1,844.4					
Other	1.4	75.4	1.1	106.4	3.4	20.4	2.4	87.4	4.9	728.4	0.7	23.4	7.6	396.4	380.4	143.4	135.4					
80 under 85 years, total	35.0	3,032.4	25.1	2,734.4	107.0	913.4	63.7	2,585.4	169.4	18,183.4	23.7	948.4	205.9	10,950.4	18,363.4	7,308.4	7,084.4					
Married	13.3	832.4	10.1	1,087.4	52.7	605.4	25.3	1,216.4	69.1	7,302.4	11.9	488.4	75.2	3,898.4	7,709.4	2,838.4	2,734.4					
Single	3.2	164.4	2.5	146.4	8.4	35.4	4.4	102.4	12.8	1,214.4	1.9	76.4	18.4	1,092.4	1,638.4	524.4	500.4					
Widowed	18.0	1,696.4	12.0	1,444.4	43.4	258.4	32.8	1,236.4	84.5	9,220.4	9.4	385.4	109.4	5,802.4	8,695.4	2,870.4	2,894.4					
Other	0.5	78.4	0.5	75.4	1.5	31.4	0.5	18.4	3.0	446.4	0.5	18.4	3.9	158.4	332.4	87.4	86.4					
85 years or more, total	36.8	3,036.4	19.4	2,249.4	59.3	491.4	43.4	1,560.4	117.2	14,433.4	15.5	483.4	146.0	9,301.4	22,147.4	8,754.4	8,483.4					
Married	6.7	504.4	5.5	660.4	22.5	233.4	11.1	487.4	30.7	3,658.4	5.1	155.4	34.1	2,283.4	5,466.4	2,231.4	2,158.4					
Single	4.3	340.4	2.3	143.4	5.0	28.4	2.7	85.4	10.2	1,190.4	1.0	30.4	14.8	877.4	852.4	2,228.4	825.4					
Widowed	25.0	2,615.4	11.2	1,407.4	31.0	225.4	28.7	950.4	74.2	9,305.4	9.2	298.4	94.2	5,896.4	13,964.4	5,485.4	5,328.4					
Other	0.8	77.4	0.3	39.4	0.8	5.4	0.8	37.4	2.1	288.4	0.2	11.4	2.9	232.4	434.4	186.4	180.4					
Age unknown, total	26.7	1,729.4	14.0	1,582.4	142.4	822.4	63.6	2,395.4	214.8	23,206.4	48.6	1,468.4	227.4	6,708.4	3,166.4	900.4	815.4					
Married	11.1	605.4	8.0	789.4	33.7	706.4	38.1	1,376.4	116.1	12,017.4	33.2	1,131.4	117.4	3,168.4	1,579.4	484.4	568.4					
Single	3.6	171.4	1.5	101.4	4.4	88.4	2.0	4.4	6.8	2,080.4	5.2	116.4	20.9	564.4	263.4	85.4	83.4					
Widowed	10.3	834.4	3.9	467.4	34.7	54.4	17.0	523.4	69.9	7,960.4	9.9	194.4	77.7	2,640.4	308.4	295.4	285.4					
Other	1.8	118.4	0.6	245.4	4.2	399.4	4.0	399.4	10.7	1,149.4	0.3	28.4	11.4	318.4	180.4	53.4	45.4					

*Estimate should be used with caution because of the small number of sample estate tax returns on which it is based.
 NOTE: Detail may not add to total because of rounding.

Table 15.— ALL TOP WEALTHHOLDERS, BY STATE OF RESIDENCE, 1976

[All figures are estimates based on estate tax return samples— numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

State of residence	Number of top wealthholders (1)	Total assets (2)	Debts and mortgages		Net worth (5)	Men		Women		Types of assets	
			Number (3)	Amount (4)		Number (6)	Net worth (7)	Number (8)	Net worth (9)	Number (10)	Amount (11)
Total	8,695.0	2,212,730	7,893.4	343,801	1,888,831	5,782.0	1,107,553	2,912.8	751,383	8,283.3	280,785
Alabama	78.6	24,737	75.0	4,044	20,683	61.8	13,113	18.2	7,560	17.7	3,233
Alaska	17.6	5,731	16.8	1,168	4,563	13.7	3,005	3.8	1,556	11.6	655
Arizona	89.8	20,986	78.5	4,250	16,346	41.4	6,097	48.4	6,278	87.1	2,280
Arkansas	63.5	13,816	54.1	3,855	9,861	54.0	7,262	8.5	2,698	52.7	1,788
California	807.8	239,003	769.0	40,534	192,469	420.2	87,181	387.4	105,289	788.9	28,872
Colorado	128.6	28,728	119.7	5,763	22,967	98.2	16,212	30.3	6,755	128.2	3,183
Connecticut	176.6	53,745	172.1	5,082	46,653	113.6	28,956	62.8	18,697	167.3	5,503
Delaware	37.7	6,838	35.3	607	6,331	25.3	4,943	12.4	3,386	37.7	1,073
Florida	438.9	134,878	392.4	20,575	114,303	262.0	65,661	146.8	48,642	414.4	16,350
Georgia	159.8	41,110	156.1	12,817	28,282	122.0	18,678	37.8	9,613	152.0	5,825
Hawaii	39.0	7,436	33.7	1,546	5,890	32.0	4,288	7.1	1,803	38.2	488
Idaho	38.4	6,726	36.0	1,804	6,822	29.8	4,558	6.6	2,363	34.8	845
Illinois	564.4	142,284	501.6	16,184	126,110	389.7	77,495	194.7	48,615	545.6	18,574
Indiana	174.8	47,781	153.9	6,739	41,042	122.2	28,108	52.4	12,833	172.3	5,887
Iowa	212.8	52,339	187.9	7,027	45,312	132.7	29,454	80.1	18,858	197.7	5,303
Kansas	143.8	36,519	112.8	4,596	31,824	94.8	18,816	48.2	13,106	139.6	4,032
Kentucky	107.8	19,245	105.0	5,025	18,220	71.9	12,473	35.9	6,746	107.5	2,804
Louisiana	91.5	24,092	88.3	5,233	18,855	57.7	10,377	33.8	8,482	88.6	2,832
Maine	28.9	7,031	25.0	415	7,615	22.7	4,018	6.2	3,598	28.9	948
Maryland (includes D.C.)	221.2	49,183	193.8	5,565	43,598	144.2	23,741	77.0	18,857	190.7	6,482
Massachusetts	202.1	50,575	184.5	6,383	44,182	133.7	27,351	68.4	18,841	187.9	7,033
Michigan	301.9	74,868	254.3	10,097	64,771	233.2	47,337	66.7	17,438	287.7	8,238
Minnesota	175.4	40,310	158.1	5,124	35,186	131.8	24,612	43.5	10,574	173.6	4,738
Mississippi	73.1	19,711	70.0	3,628	16,083	52.7	10,006	20.5	6,078	70.4	2,311
Missouri	183.3	50,385	162.2	6,077	42,288	128.2	28,073	55.1	13,215	181.1	5,773
Montana	48.8	11,185	48.1	2,020	9,145	40.9	7,202	8.1	1,943	45.2	1,013
Nebraska	119.6	30,783	109.1	6,014	24,748	98.5	18,825	21.1	5,825	114.3	2,720
Nevada	27.3	12,951	25.7	3,836	9,115	9.4	5,639	17.9	3,476	26.7	660
New Hampshire	28.8	7,221	20.6	618	6,603	20.2	4,376	6.7	2,226	28.7	2,206
New Jersey	321.0	75,580	277.0	10,195	65,385	195.6	37,637	125.2	27,749	305.0	10,899
New Mexico	28.4	8,301	17.3	1,464	6,837	13.6	3,107	1.8	3,730	28.4	1,150
New York	899.5	226,509	804.1	30,690	195,818	603.9	106,507	295.6	86,312	891.6	32,754
North Carolina	178.7	45,204	145.4	7,385	37,816	121.7	23,789	54.9	14,018	154.0	5,017
North Dakota	48.7	10,347	40.6	1,884	8,483	38.9	6,738	9.8	1,726	42.1	1,183
Ohio	376.8	87,982	342.8	8,198	78,794	238.2	44,670	138.6	34,124	354.9	13,728
Oklahoma	137.7	40,781	125.0	11,173	28,608	77.5	16,358	60.2	13,251	125.3	4,885
Oregon	91.9	21,251	83.4	1,781	18,461	58.7	12,907	32.2	6,554	91.4	1,130
Pennsylvania	368.5	90,202	334.2	9,280	80,942	273.4	51,513	95.1	28,428	381.1	14,002
Rhode Island	32.2	5,534	28.7	913	4,621	24.6	2,108	7.7	2,513	23.3	756
South Carolina	87.8	19,090	84.5	3,712	15,348	72.7	10,946	15.0	4,402	84.8	1,183
South Dakota	51.7	12,242	44.9	1,417	10,825	24.0	5,594	27.7	5,231	48.1	1,130
Tennessee	135.2	31,572	132.7	6,190	25,182	104.1	17,381	31.1	7,800	132.4	3,642
Texas	409.7	113,724	390.1	23,210	90,515	218.0	38,359	190.9	52,156	398.9	16,185
Utah	38.6	7,164	34.4	609	6,555	10.6	2,635	28.9	3,920	38.6	1,183
Vermont	14.5	3,950	13.7	347	3,603	10.4	2,316	4.1	1,288	14.5	581
Virginia	210.0	43,277	193.4	7,102	38,175	176.4	25,902	33.6	10,273	206.8	5,375
Washington	123.5	29,092	119.1	4,834	24,156	82.4	11,606	61.1	12,552	123.2	3,687
West Virginia	39.8	8,488	36.5	1,357	7,141	32.0	5,150	7.8	1,992	39.8	1,199
Wisconsin	233.3	46,748	222.8	9,281	37,465	182.6	27,381	50.6	10,103	216.9	4,827
Wyoming	35.2	7,589	30.9	1,774	5,885	28.3	4,689	6.9	1,216	28.9	749
Other areas	57.4	14,407	52.0	1,289	13,108	41.8	6,338	15.6	6,770	52.8	1,534

Footnotes at end of table.

Table 15. — ALL TOP WEALTHHOLDERS, BY STATE OF RESIDENCE, 1976 — Continued

[All figures are estimates based on estate tax return samples — numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

State of residence	Types of assets — Continued									
	Corporate stock		Bonds		Life insurance equity		Notes and mortgages		Real estate	
	Number (12)	Amount (13)	Number (14)	Amount (15)	Number (16)	Amount (17)	Number (18)	Amount (19)	Number (20)	Amount (21)
Total	5,897.6	630,975	3,326.1	129,048	6,706.2	42,286	2,404.4	87,724	7,531.0	770,788
Alabama	63.6	6,264	33.3	1,221	63.2	646	21.3	1,261	74.4	9,772
Alaska	13.1	1,663	4.1	390	13.3	60	6.0	314	17.6	2,202
Arizona	75.0	6,399	29.3	1,231	50.2	205	43.1	1,294	64.5	7,461
Arkansas	26.6	1,681	15.0	688	53.3	219	19.1	1,075	6,040	6,040
California	659.6	62,062	291.1	12,047	625.4	2,319	319.3	11,500	698.5	76,180
Colorado	77.1	5,866	50.1	1,102	98.3	632	34.7	965	112.5	11,114
Connecticut	143.4	17,852	91.0	3,521	133.4	1,083	39.0	1,444	147.2	15,873
Delaware	28.2	2,631	12.6	300	24.8	206	17.9	915	30.7	2,637
Florida	309.1	30,647	177.5	13,136	306.1	2,005	171.9	7,239	398.1	39,664
Georgia	93.9	8,788	47.6	1,664	139.9	1,233	39.0	1,949	138.7	17,267
Hawaii	24.7	834	14.4	92	36.1	206	3.1	166	37.7	4,191
Idaho	25.6	2,383	5.4	274	31.5	116	17.5	304	37.7	4,191
Illinois	371.6	27,731	212.5	7,921	446.1	2,708	110.5	3,901	500.4	57,767
Indiana	112.8	9,080	67.2	1,966	138.2	683	45.0	1,694	162.1	16,122
Iowa	124.9	4,516	87.0	1,660	157.9	715	65.5	2,316	200.9	29,544
Kansas	63.9	5,366	53.3	1,447	99.8	524	44.7	1,234	133.7	16,669
Kentucky	73.9	7,633	24.2	911	66.0	446	17.1	771	99.4	9,575
Louisiana	65.9	6,228	37.3	1,454	64.8	347	36.1	1,468	64.9	8,776
Maine	21.0	3,410	13.1	745	21.7	166	7.7	219	22.3	1,901
Maryland (includes D.C.)	149.4	9,891	111.0	3,333	176.4	1,176	42.9	1,989	193.2	16,664
Massachusetts	154.2	15,954	70.4	2,842	156.0	1,080	33.4	1,314	160.3	12,929
Michigan	200.7	16,099	95.7	4,556	235.2	1,712	91.7	3,072	282.4	22,572
Minnesota	120.4	6,422	76.2	1,552	140.6	783	47.6	1,264	154.9	16,772
Mississippi	49.4	2,576	11.0	423	64.5	493	16.6	523	55.1	6,774
Missouri	116.9	13,995	75.3	2,695	125.9	959	69.4	2,602	157.0	16,723
Montana	35.7	2,064	13.1	303	40.2	176	14.9	566	40.9	4,510
Nebraska	78.4	4,632	45.0	1,316	97.2	526	32.6	1,565	102.7	13,601
Nevada	15.7	4,690	10.0	1,950	20.6	44	18.7	2,230	24.0	2,313
New Hampshire	24.2	1,893	9.2	303	21.5	147	7.4	192	22.3	1,639
New Jersey	230.8	21,434	178.6	6,055	274.1	2,006	74.8	2,597	276.1	25,917
New Mexico	15.8	1,707	10.2	443	15.6	71	11.1	334	23.1	2,408
New York	648.9	69,997	432.4	19,716	716.4	5,077	202.6	6,099	720.3	60,593
North Carolina	98.3	11,597	42.9	1,925	137.9	951	59.5	2,362	160.5	19,354
North Dakota	33.1	1,410	12.3	201	38.4	159	7.2	257	39.2	5,299
Ohio	294.8	24,492	151.4	4,026	297.9	1,994	74.9	1,810	316.2	28,972
Oklahoma	77.0	10,425	25.1	980	109.7	691	35.9	1,295	134.9	15,666
Oregon	61.4	4,656	29.9	1,186	60.9	347	43.3	1,675	81.5	9,151
Pennsylvania	274.0	27,376	199.0	7,095	300.7	2,473	65.7	1,822	317.3	25,553
Rhode Island	15.3	1,432	14.1	377	27.2	235	3.4	94	30.4	1,754
South Carolina	62.6	5,370	15.6	565	81.0	679	17.9	791	85.4	7,656
South Dakota	41.9	3,794	10.9	230	21.5	76	9.2	290	31.2	4,902
Tennessee	73.2	8,200	32.1	1,724	112.1	649	23.1	823	119.3	10,727
Texas	262.2	23,248	123.2	6,902	308.6	1,314	166.0	6,791	363.2	42,330
Utah	31.2	2,928	3.6	149	11.9	63	6.3	415	15.2	1,324
Vermont	12.9	870	6.4	205	10.2	94	4.5	137	13.6	1,469
Virginia	119.5	8,736	76.7	2,186	180.7	1,312	35.9	1,141	190.5	18,673
Washington	60.9	6,366	43.1	1,907	79.5	312	57.9	1,604	117.7	11,096
West Virginia	24.9	2,612	18.0	520	31.6	225	9.0	221	36.1	2,703
Wisconsin	162.4	11,983	84.9	2,049	210.1	1,102	69.1	1,497	213.5	18,524
Wyoming	28.0	1,989	4.7	100	32.5	122	3.9	244	29.7	3,374
Other areas ¹	49.9	3,599	29.9	505	36.1	395	19.9	234	36.2	4,654

Footnote at end of table.

Table 15. — ALL TOP WEALTHHOLDERS, BY STATE OF RESIDENCE, 1976 — Continued

[All figures are estimates based on estate tax return samples — numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

State of residence	Types of assets — Combined						Wealthholders as defined by:						Estate tax return statistics		
	Noncorporate business assets		Other assets		Total assets		Net worth		Number of returns		Gross estate	Net worth			
	Number (22)	Amount (23)	Number (24)	Amount (25)	Number (26)	Amount (27)	Number (28)	Amount (29)	Number (30)	(31)	(32)				
Total	1,969.3	98,725	8,214.8	271,779	227.1	504,277	179.8	393,561	119,184	40,997	37,106				
Alabama	210.3	8,725	76.2	2,137	2.7	6,066	2.2	6,446	1,134	396	346				
Alaska	3.4	184	16.7	384	*1.1	*2,075	*1.1	*1,825	155	41	33				
Arizona	17.7	15	87.9	2,521	1.6	2,940	1.5	2,510	1,056	336	310				
Arkansas	24.9	1,635	61.6	789	1.2	2,525	0.7	1,265	840	256	230				
California	206.4	10,595	773.4	39,437	25.2	61,905	20.2	50,095	11,544	4,834	4,412				
Colorado	32.5	1,490	127.1	4,287	2.3	4,373	1.5	3,260	1,313	421	366				
Connecticut	29.8	748	189.5	7,610	5.6	15,141	4.5	12,565	2,238	843	797				
Delaware	*1.0	*28	30.8	1,249	0.3	411	0.3	397	361	105	83				
Florida	412.3	6,263	412.3	19,674	19.2	39,660	16.8	31,895	7,816	2,744	2,506				
Georgia	30.9	1,483	154.8	2,591	4.3	10,834	2.4	5,400	1,848	648	544				
Hawaii	6.3	155	38.4	1,293	0.5	1,046	0.4	816	377	120	101				
Idaho	20.4	661	35.2	697	*0.9	*1,235	*0.5	*984	381	105	94				
Illinois	112.7	6,036	518.7	17,854	14.1	28,286	12.2	24,489	8,475	2,939	2,725				
Indiana	48.2	3,117	168.6	6,050	4.6	10,282	4.3	6,682	3,303	1,203	1,118				
Iowa	86.7	4,736	202.5	3,527	3.1	4,256	1.8	2,672	3,655	983	820				
Kansas	48.3	2,958	132.3	4,270	2.6	4,445	2.2	3,730	2,456	742	688				
Kentucky	30.1	1,123	101.1	2,102	2.5	5,286	1.7	3,215	1,404	430	383				
Louisiana	17.1	607	91.1	1,264	3.3	6,263	2.7	4,308	1,088	386	327				
Maine	7.7	181	27.1	482	2.7	3,209	0.4	800	825	172	161				
Maryland (includes D.C.)	39.1	1,618	212.2	8,012	4.7	7,594	3.8	6,221	2,682	892	802				
Massachusetts	19.7	1,563	182.0	6,059	6.4	11,841	4.5	8,061	3,111	879	897				
Michigan	69.5	3,905	282.5	14,906	7.1	18,182	6.4	16,992	3,702	1,312	1,168				
Minnesota	69.7	3,508	166.8	5,239	3.5	5,456	2.7	4,171	2,513	689	608				
Mississippi	23.3	2,205	72.8	4,402	2.0	2,912	0.8	1,841	750	234	196				
Missouri	30.0	1,927	166.2	6,216	7.3	14,522	4.9	8,856	2,723	850	878				
Montana	15.0	775	44.5	1,757	0.9	1,346	*0.2	*408	509	155	139				
Nebraska	59.4	3,725	112.6	2,675	2.0	5,302	1.7	3,650	1,965	565	513				
Nevada	4.9	738	26.8	557	0.6	6,926	0.6	3,816	297	285	180				
New Hampshire	1.9	58	28.1	694	0.6	1,490	0.6	1,391	524	182	147				
New Jersey	30.7	1,485	297.2	5,196	8.1	14,806	6.4	11,229	4,410	1,390	1,239				
New Mexico	13.2	428	26.1	1,790	1.7	2,603	1.0	1,817	372	115	108				
New York	89.4	6,807	823.8	26,503	22.3	63,197	17.3	50,574	11,092	4,197	3,744				
North Carolina	63.7	1,987	150.8	3,110	3.4	9,298	2.6	7,553	2,118	691	612				
North Dakota	19.8	821	43.4	1,019	*0.7	*1,054	*0.2	*418	672	187	153				
Ohio	64.2	2,833	382.9	12,144	6.1	16,794	6.7	15,692	5,692	1,831	1,690				
Oklahoma	29.7	1,677	129.4	5,423	5.9	15,599	5.5	9,708	1,696	567	501				
Oregon	17.9	445	80.9	2,726	1.2	2,189	1.2	2,017	1,338	371	341				
Pennsylvania	81.6	2,841	350.0	9,099	8.8	21,731	8.4	18,763	5,795	1,922	1,752				
Rhode Island	*0.8	*30	27.9	856	0.9	1,459	0.8	1,372	473	192	148				
South Carolina	17.0	615	87.5	1,466	2.7	5,694	1.6	4,264	950	317	278				
South Dakota	19.9	1,186	28.5	794	**	**	**	**	663	194	151				
Tennessee	28.5	1,583	133.0	2,814	1.7	6,111	1.6	5,837	1,547	716	646				
Texas	176.8	6,952	402.1	10,432	13.2	27,090	10.8	21,439	4,776	1,791	1,596				
Utah	4.5	339	35.7	782	0.3	437	0.3	281	388	104	95				
Vermont	4.8	227	13.7	367	0.2	322	0.2	281	302	90	81				
Virginia	31.8	1,320	206.2	4,533	5.2	9,927	3.9	7,562	2,616	828	732				
Washington	56.6	1,190	123.1	2,931	3.0	5,328	2.4	4,210	1,496	495	443				
West Virginia	6.5	462	38.4	555	1.1	1,496	0.8	1,185	611	187	169				
Wisconsin	2,143	445	220.8	4,819	2.9	6,945	2.3	5,316	2,727	779	694				
Wyoming	7.3	445	33.3	737	*0.3	*974	*0.3	*939	296	98	86				
Other area ¹	14.8	150	50.6	3,346	0.6	1,971	0.6	1,697	402	167	142				

¹Estimate should be used with caution because of the small number of sample estate tax returns on which it is based.
²Data combined to avoid disclosure of information for specific estate tax returns.
 U.S. citizens domiciled abroad. Persons who acquired U.S. citizenship solely by virtue of being a citizen of Puerto Rico or the Virgin Islands are not included.
 NOTE: Detail may not add to total because of rounding.

Estimates of Personal Wealth, 1982: A Second Look

by Marvin Schwartz

According to updated estimates of the personal wealth of individuals in 1982, approximately 4.5 million people had gross assets of \$325,000 or more that year. These individuals, the Nation's "top wealthholders," represented only 2.8 percent of the Nation's adult population [1]. Their net worth, estimated from estate tax returns using the "estate multiplier technique," exceeded \$2.7 trillion and accounted for approximately 29.6 percent of the personal wealth in the United States in 1982 [2].

In contrast, during 1976, fewer than 2 million people had gross assets of \$300,000 or more, the amount closest to the level at which data are available for 1982. The net worth of these top wealthholders in 1976 was approximately \$1.0 trillion.

Just as the total number of top wealthholders increased during this period, so did the millionaires among them. Approximately 475,000 individuals had a net worth of \$1 million or more in 1982, well over twice the number in 1976 (180,000). The sharp increase in the number of millionaires between 1976 and 1982, however, was largely due to inflation. On the basis of constant 1976 dollars, only 232,000 individuals—52,000 more than in 1976—had a net worth of \$1 million or more in 1982 [3].

ESTIMATING PERSONAL WEALTH FROM ESTATE TAX RETURNS

The measurement of personal wealth in the United States has attracted considerable attention in recent years. This interest has been stimulated by a number of factors, not the least of which is the public's fascination with the topic. Accurate and comprehensive estimates of wealth, however, are difficult to obtain, because individuals are not required to report information on wealth regularly on any tax return or other public document. Several alternative approaches, each with its own merits, have been developed. The estimates presented here are based on the "estate multiplier technique." This approach utilizes administrative records, in particular, estate tax returns filed for the deceased to estimate the wealth of the living population.

This procedure can be used to estimate wealth for all individuals whose assets exceed the estate filing requirement in effect that year. Estimates of wealth thus can be provided for the top 2 to 3 percent of the wealthholders—

those individuals or "top wealthholders" who control a large portion of the personal wealth in the United States. (The mechanics of the estimating technique are discussed later.)

The updated estimates of personal wealth in 1982 represent the first phase of an effort by the Internal Revenue Service to improve the accuracy of the data [4,5]. In the past, wealth estimates, such as the preliminary estimates for 1982 published earlier, were made from the Statistics of Income sample of estate tax returns filed in a given year for deaths that had occurred over several years [6]. Thus, the wealth estimates generated from a sample selected on a filing year basis actually reflected the value of wealth held during several years, unadjusted for the rates of inflation applicable to those years.

The final personal wealth estimates for 1982 presented here are based on estate tax returns filed from 1982 through 1984 for individuals who died in 1982 [7]. By sampling returns filed over this 3-year period, the returns filed for nearly all individuals who died in 1982 can be captured. The advantage of a "year-of-death" sample is it represents the wealth of a given year, rather than a series of years, and thus more accurately reflects wealth at a particular time.

As the level of gross estate (or gross assets) required for filing an estate tax return has increased, the definition of top wealthholders also has changed. The level of wealth to which the estimates apply rose from \$60,000 or more in 1972 to \$120,000 or more for 1976 and subsequently to \$325,000 or more for 1982. While summary estimates of wealth are provided for wealthholders with gross assets of \$325,000 or more, asset detail is presented only for individuals with gross assets exceeding \$500,000 because such detail was not required for the estates of decedents with smaller assets.

The gross estate criterion is a Federal estate tax concept of wealth that does not conform to the usual definitions of wealth, primarily because it includes the face value of life insurance in the wealth of the decedent. Therefore, three measures of wealth are used in this article: gross assets (or gross estate), total assets, and net worth.

Gross assets reflect the gross value of all assets, including the full face value of life insurance reduced by policy loans but excluding any reduction for other indebtedness. This measure defines the individuals included in the top

*Foreign Special Projects Section. Prepared under the direction of Mike Alexander, Chief.

wealthholder group. The amount of total assets, a lower wealth value, is still essentially a gross measure. Total assets are obtained by using the cash value of life insurance, i.e., the value the insurance had immediately before the policyholder's death [8]. Net worth, the level of wealth after all debts have been removed, includes the cash value of life insurance.

PERSONAL WEALTH IN 1982

Female wealthholders accounted for 38.3 percent of the 4.5 million top wealthholders in 1982 (see Figure A) compared with 32.8 percent in 1976. But because women held 43.4 percent of the net worth of top wealthholders in 1982, they had an average net worth nearly 24 percent higher than that of their male counterparts.

Figure A.—Top Wealthholders With Gross Assets of \$325,000 or More, by Sex, 1982

[Number of wealthholders in thousands; amounts in billions, except as indicated]

Item	Total	Male	Female
Number of top wealthholders	4,479	2,763	1,715
Total assets.....	\$3,218	\$1,916	\$1,302
Net worth	2,714	1,536	1,178
Average net worth (dollars)	605,900	555,700	686,700

Composition of Assets

In 1982, real estate constituted the largest share of the assets held by all individuals with gross assets exceeding \$500,000 (see Figure B), continuing the trend first observed the previous year [9]. In contrast, estate multiplier estimates of wealth for 1976 and earlier years showed corporate stock to be the most commonly-held asset [10]. Real estate and corporate stock together accounted for more than 62 percent of the assets of these top wealthholders in 1982.

Figure B.—All Top Wealthholders With Gross Assets Exceeding \$500,000, by Type of Asset and Sex, 1982

Type of asset	Total	Males	Females
Total assets	100.0%	100.0%	100.0%
Real estate	32.5	32.7	32.2
Corporate stock	29.9	29.7	30.3
Cash	8.4	7.4	9.8
Noncorporate business assets	7.8	9.2	5.5
Bonds	7.0	5.5	9.4
Notes and mortgages	4.7	5.1	4.2
Life insurance	1.2	1.8	0.3
Other assets.....	8.5	8.6	8.3

Corporate stock, long the most prominent asset in the portfolio of top wealthholders, declined from more than 35 percent of the assets in 1976 to roughly 30 percent in 1982, probably because of the decline in the stock market, as well as the increase in the value of real estate during that period [11]. Between 1976 and 1982 the Dow-Jones Industrial Average fell 9.3 percent while the Consumer Price Index for

home purchases rose 67.2 percent [12, 13]. These measures of the market condition are reflected in the shift in the composition of the assets of the wealthy for these 2 years.

Bonds and noncorporate business assets also switched positions of importance [14]. The share of assets held as bonds declined from more than 9 percent in 1976 to 7 percent in 1982, and noncorporate business assets increased from 5 percent of the assets in 1976 to nearly 8 percent in 1982.

A look at the composition of assets by sex shows that the share of the wealth held in the form of real estate and corporate stock was similar for men and women. On the other hand, the difference in the proportion of the wealth held as bonds or as noncorporate business assets is noteworthy. Noncorporate business assets made up 9 percent of the assets of men in 1982, compared with 5.5 percent for women. Conversely, wealth held by women was typified by a greater concentration in bonds, over 9 percent, compared with only 5.5 percent for men. An examination of all other assets shows that notes and mortgages and life insurance constituted a more significant portion of the assets of men, while cash represented a greater share of the assets of women.

Although real estate constituted the greatest share of the assets in the portfolio of all top wealthholders, the proportions of wealth held as real estate and corporate stock were quite different for millionaires and submillionaires (see Figure C). Real estate made up just 25 percent of the assets of millionaires; they held more than 38 percent of their assets as corporate stock. In contrast, real estate accounted for almost 42 percent of the assets of submillionaires; 20 percent of their assets were in corporate stock.

Figure C.—All Top Wealthholders With Gross Assets Exceeding \$500,000, by Size of Net Worth and by Type of Asset, 1982

Type of asset	Size of net worth	
	Under \$1,000,000	\$1,000,000 or more
Total assets	100.0%	100.0%
Real estate	41.6	24.6
Corporate stock	20.1	38.5
Cash	10.5	6.5
Noncorporate business assets	7.1	8.3
Notes and mortgages	5.3	4.2
Bonds	4.8	9.0
Life insurance	2.0	0.6
Other assets.....	8.5	8.4

Cash and bonds together represented just over 15 percent of the assets of both groups of top wealthholders but were held in quite different proportions. Whereas bonds represented just under 5 percent of the assets of the less wealthy group, they were, at 9 percent of the assets, the third most common asset held by millionaires. Proportionately, millionaires held more corporate stock, bonds, and

noncorporate business assets and less real estate, cash, notes and mortgages, and life insurance than the sub-millionaires.

Geographic Distribution of Wealth

In 1982, nearly 700,000 of the top wealthholders in the United States lived in California. This was more than twice the number of top wealthholders in the "second wealthiest" State, Texas. New York, which had the most wealthy individuals in 1976, had dropped to third place by 1982. As a result of the effect of the recent decline in oil prices on the economy of Texas, coupled with Florida's rapid growth and attractive tax policy (no State income tax), Florida may become the "second wealthiest" State by the end of this decade.

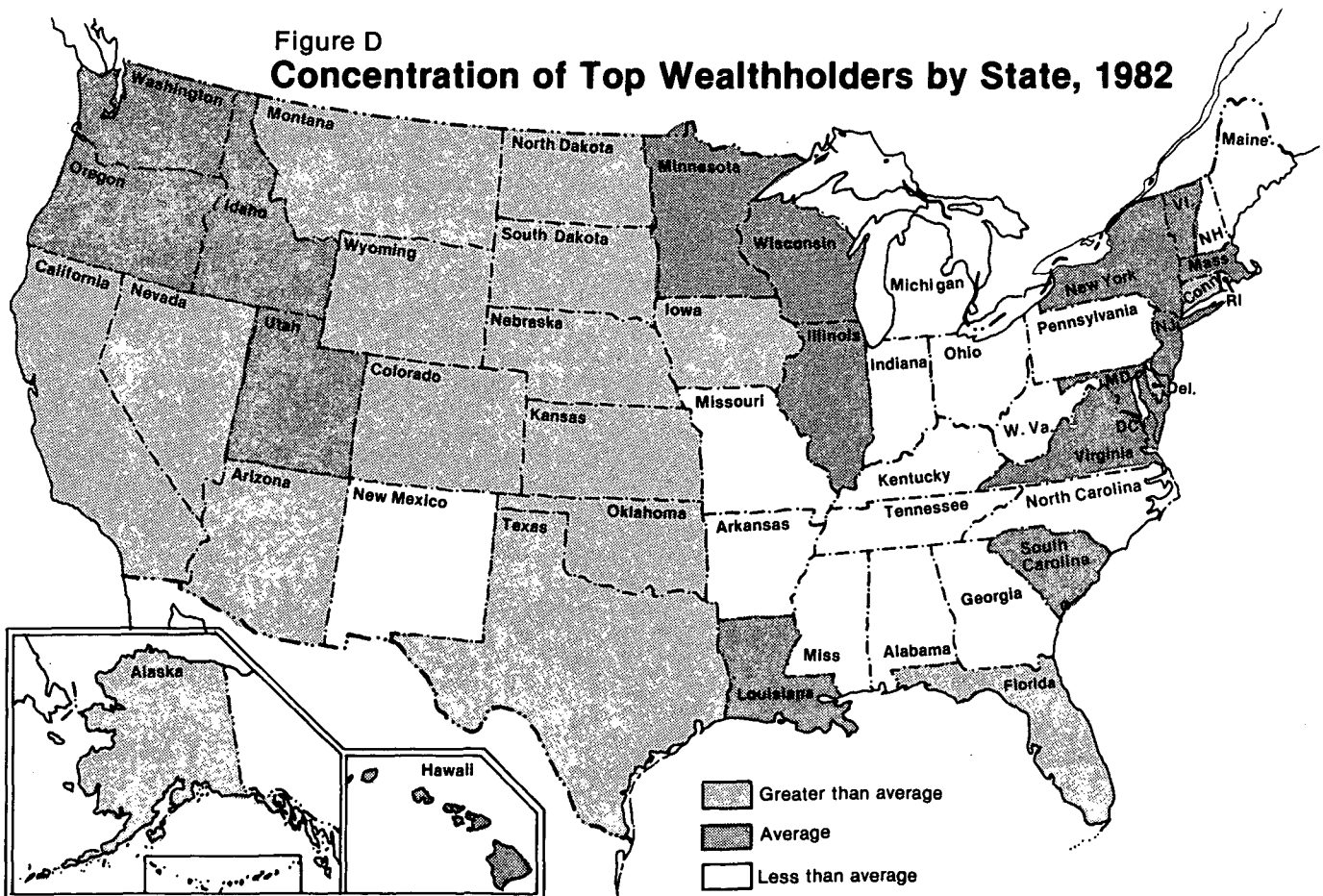
The ratio of wealthy individuals to the adult population illustrates the distribution of wealth, undistorted by the large populations of certain States. California, the most populous State, had an above-average concentration of wealth, with 15 percent of the top wealthholders but only 11 percent of the Nation's adult population. Although there were a large number of wealthholders in New York and Illinois, the proportion of top wealthholders in these States was only

average. As shown in Figure D, wealth appears to be more heavily concentrated in the more rural States west of the Mississippi River. Conversely, the southern States—with one of the principal exceptions being Florida—and the more heavily industrialized States of the Midwest had a lower-than-average proportion of wealthy individuals.

ESTATE MULTIPLIER TECHNIQUE

Researchers have been using the estate multiplier technique since the beginning of the 20th century (financial records were used as early as 1864 to estimate total personal wealth by a related technique) to draw conclusions about the wealth of the living population through knowledge of the wealth of the deceased [15, 16]. The technique assumes that estate tax returns taken as a whole represent a random sample, designated by death, of the living population. In fact, however, death is not a random event and therefore is not a simple representative sample of the living population under consideration.

The probability of "death's selection" of an individual, i.e., that a person will die in a given year, depends on the particulars of one's life. Age and sex are usually taken as "gross" indicators of these conditions. If one knows the



Note: The average concentration of top wealthholders by State was 2.2 to 3.0 percent of the State's adult (age 20 and above) population.

mortality rate and the number of deaths for each age and sex group, one can derive the population of wealthholders by multiplying the inverse of the mortality rate by the number of deaths in each group [8].

Vital to the estimates of personal wealth is the use of a mortality rate appropriate to the top wealthholder population. This is essential to the estimates because there is much evidence that the wealthy have mortality rates lower than those of the population as a whole. In other words, social class also is a determinant in the "selection of the sample" [17]. Therefore, an adjustment to the general mortality rates is necessary.

The mortality rates assumed to approximate those of the wealthy are based on the mortality experience of the Metropolitan Life Insurance Company's preferred-risk policyholders [18]. Multipliers are then derived from the adjusted mortality rates for each decedent according to age and sex. These multipliers, applied to sampled estate tax return data, produce wealth estimates for the living population.

The multipliers used to develop the preliminary estimates for 1982 were based on Metropolitan Life mortality experience for a 4-year period. As part of the effort to improve the accuracy of these estimates, the Internal Revenue Service has developed new mortality differentials and multipliers based on data for a series of years between 1969 and 1982. Thus, the effect of the sampling variance of death has been reduced.

As mentioned earlier, the updated estimates of personal wealth in 1982 are based on a sample of estate tax returns filed between 1982 and 1984 for individuals dying in 1982. This approach, which is a departure from the year-of-filing approach used for the preliminary 1982 estimates and for the estimates for earlier studies, is designed primarily to reduce the effects of inflation. The preliminary estimates of personal wealth for 1982 were based on estate tax returns filed during 1983. Although the returns filed that year were primarily for decedents who died in the preceding year, they also reflected deaths that occurred in 1983 as well as deaths that occurred in 1981 and several earlier years. Therefore, the estimates for the 1 year were achieved by using values based on several.

In addition to reducing the effect of inflation, the use of a year-of-death file has improved the estimates by reducing the sampling error.

The strength of the estate multiplier technique, in part, lies in the large sample size. The sample of 19,000 returns selected in 1983, on which the preliminary estimates of wealth for 1982 were based, was considerably larger than the samples selected for other studies for comparable

levels of wealth [19, 20]. Yet, despite the large overall sample size, the limited number of returns filed each year for young (under 45 years of age) and very wealthy (gross assets of \$5 million or more) decedents can make results for these categories subject to considerable sampling error.

The achieved selection probabilities of "death's sample" of these relatively young and very wealthy decedents in a given year can distort estimates of the wealth of the living. Death samples at high and low rates which tend to average out over a period of years, but which can result in large short-term fluctuations, i.e., for a given year. When death "selects" a smaller sample, i.e., fewer deaths for a limited population during a sample year, wealth estimates will be lower than the true population values. Similarly, too large a sample produces estimates that overstate the wealth of the population.

The updated estimates of wealth for 1982 have incorporated two modifications from recent-year estimates designed to reduce the variability of death's annual sample selection. First, the sample of estate tax returns was redesigned so that it was stratified by age as well as by size of gross estate. Whereas all returns of the very wealthy (those with gross estates of \$5 million or more) were selected for past studies, before the 1982 study the returns of the relatively young were selected at rates dictated by the size of gross estate. Thus, the high sampling variance already present because of the limited number of returns for relatively young decedents was further increased by sampling those returns for less wealthy decedents at rates less than 100 percent. Starting with 1982, all estate tax returns, regardless of the size of gross estate, were selected for decedents under 45 years of age.

The sampling variability of the final estimates for wealthy and relatively young individuals is reduced further by basing the estimates on returns filed for the specific year of death (1982) during a 3-year period. Thus, this technique produces more accurate estimates of the type and amount of wealth of the young and very wealthy.

SUMMARY

For 1982, approximately 4.5 million people—2.8 percent of the adult population of the United States—held gross assets of \$325,000 or more. The net worth of these individuals exceeded \$2.7 trillion and accounted for almost 30 percent of the personal wealth in this country.

The top wealthholder in 1982 was typically a man under 50 years of age from California. Just over 60 percent of his wealth was held as real estate and corporate stock, with corporate stock becoming more prominent as wealth increased.

Wealthy women, although still the minority of top wealthholders, nevertheless increased their representation from less than 33 percent in 1976 to just over 38 percent in 1982. Of the total, approximately 38 percent were under 50 years of age, and over 36 percent were between 50 and 64 years of age.

DATA SOURCES AND LIMITATIONS

Although estimates of wealth are provided for all individuals with gross assets of \$325,000 or more, the composition of assets was examined only for wealthholders with gross assets exceeding \$500,000. This limitation is the result of a change in the reporting requirements for the estate tax returns on which the estimates are based. Detailed asset information is not required to be filed on the returns of persons who died after December 31, 1981 with a gross estate (gross assets) of \$500,000 or less. Nevertheless, 72 percent of the assets of the wealthholders derived from this group were reported on the returns. Because the decision to provide asset detail on the return may be a reflection of the asset composition of the estate, the inclusion of estimates of wealth based on this incomplete detail would have distorted the estimates and introduced a bias into the estimates.

The treatment of the assets included on the estate tax return as "lifetime transfers" was modified to provide more accurate data on the composition of the assets of top wealthholders. In the past, all assets reported as lifetime transfers were included in the statistics as "other assets". The redefinition of lifetime transfers under the Economic Recovery Tax Act (ERTA) of 1981 made it more appropriate to allocate lifetime transfers to the specific type of asset [21]. Figure E shows the effect of this change on the data for 1982.

Figure E.—Treatment of Lifetime Transfers Made by All Top Wealthholders With Gross Assets Exceeding \$500,000, by Type of Asset, 1982

Type of asset	Lifetime transfers	
	Allocated to specific asset type	Included in "Other assets"
Total	100.0%	100.0%
Real estate	32.5	30.7
Corporate stock	29.9	26.4
Cash	8.4	7.8
Noncorporate business assets	7.8	7.4
Bonds	7.0	5.9
Notes and mortgages	4.7	4.4
Life insurance	1.2	1.2
Other assets	8.5	16.2

Sample Selection Criteria

The 1982 estimates of personal wealth are based on data from a sample of estate tax returns, Form 706, processed by the Internal Revenue Service between 1982 and 1984. The sample was stratified according to the year of death

and age of the decedent, along with the size of the gross estate. The returns were selected during the 3-year period at annual rates that ranged from 10 percent—for decedents age 70 and older with gross estate under \$1 million—to 100 percent—for decedents under age 45 or with gross estate of \$1 million and above—with weights appropriate to each year maintained.

Of the returns filed during the 1982–1984 period, only those filed for individuals dying in 1982 were selected, with two exceptions. All returns for the very wealthy (those with gross estates of \$5 million or more) and individuals under 45 years of age were selected, regardless of the year of death. The estate multipliers for those returns were adjusted accordingly. Other returns filed during this period for individuals who died in years other than 1982 were not used for these estimates.

Limitations

Because the data in this article are estimated on the basis of a sample of estate tax returns filed with the Internal Revenue Service, they are subject to sampling as well as nonsampling error. For proper use of the statistical data, the magnitude of the potential sampling error must be known.

Figure F presents preliminary estimates of the coefficients of variation (CV's) for frequency estimates. The approximate CV's shown here are intended only as a general indication of the reliability of the data. For a number other than that shown, the corresponding CV's can be estimated by interpolation. The reliability of estimates based on samples and the use of coefficients of variation for evaluating the precision of sample estimates are discussed in the Appendix.

Figure F.—Approximate Coefficients of Variation for Frequency Estimates, 1982

Number of wealthholders	Approximate coefficient of variation
.02	2,600,000
.03	540,000
.05	124,000
.10	18,500
.15	3,900
.20	1,900

NOTES AND REFERENCES

- [1] The adult population is defined as individuals 20 years of age and older.
- [2] Marley, Marcia, and Wolff, Edward N., "Long-term Trends in U.S. Wealth Inequality: Methodological Issues and Results," *1987 Proceedings of the Conference on Research on Income and Wealth*, National Bureau of Economic Research (in preparation as of June 1988).

- [3] Using the Personal Consumption Expenditures Implicit Price Deflator calculated by the U.S. Department of Commerce, Bureau of Economic Analysis, \$1 million in 1976 had the equivalent value of \$1,597,400 in 1982. For a discussion of the deflator, see U.S. Department of Commerce, *Survey of Current Business*, April 1987, Volume 66, Number 4.
- [4] McCubbin, Janet, "Improving Wealth Estimates Derived from Estate Tax Data," *Statistics of Income and Related Administrative Record Research: 1986-1987*, U.S. Department of the Treasury, Internal Revenue Service, 1987.
- [5] Scheuren, Fritz, and McCubbin, Janet, "Piecing Together Personal Wealth Distributions," *Statistics of Income and Related Administrative Record Research: 1986-1987*, U.S. Department of the Treasury, Internal Revenue Service, 1987.
- [6] Schwartz, Marvin, "Preliminary Estimates of Personal Wealth, 1982: Composition of Assets," *Statistics of Income Bulletin, Winter 1984-1985*, Volume 4, Number 3.
- [7] For estimates of the number of individuals with net worth of \$5 million or more based on estate tax returns filed in each of the 3 years, as well as those filed in 1985, see Skelly, Daniel F., and Kozielec, John A., "Statistics of Income Domestic Special Studies," *Statistics of Income Bulletin, Fall 1987*, Volume 7, Number 2. These estimates reflecting wealth in 1981 through 1984 were developed prior to the methodological improvements reflected in the estimates for 1982 included herein.
- [8] For a detailed explanation of the estate multiplier technique and the computation of the equity value of life insurance, see *Statistics of Income—1972, Personal Wealth Estimated from Estate Tax Returns*, U.S. Department of the Treasury, Internal Revenue Service, 1976.
- [9] Schwartz, Marvin, "Trends in Personal Wealth," *Statistics of Income Bulletin, Summer 1983*, Volume 3, Number 1.
- [10] The revised treatment for the 1982 estimates of the assets included on the estate tax return as "lifetime transfers" should be noted. This is described in the section on "Data Sources and Limitations." Although the revised treatment yields somewhat higher asset shares, the basic relationship described later remains largely unaffected.
- [11] Ruggles, Richard, and Ruggles, Nancy, D., "Integrated Economic Accounts for the United States, 1947-1980," *Survey of Current Business*, Volume 62, Number 5, U.S. Department of Commerce, Bureau of Economic Analysis, May 1982.
- [12] U.S. Department of Commerce, Bureau of Economic Analysis, *Survey of Current Business*, various issues.
- [13] For information about the Consumer Price Index, see U.S. Department of Labor, Bureau of Labor Statistics, *Monthly Labor Review*, various issues.
- [14] Noncorporate business assets include the net value of sole proprietorships, farms, and interests in partnerships, except for the value of the real estate associated with the business or farm.
- [15] Lampman, Robert J., *The Share of Top Wealthholders in National Wealth, 1922-56*, Princeton University Press, 1962.
- [16] Smith, James, and Calvert, Staunton, "Estimating the Wealth of Top Wealthholders from Estate Tax Returns," *1965 American Statistical Association Proceedings, Section on Business and Economics Statistics*.
- [17] Kitagawa, Evelyn M., and Hauser, Philip M., *Differential Mortality in the United States: A Study in Socioeconomic Epidemiology*, Harvard University Press, 1973.
- [18] The author is extremely grateful for the continued support received from the Metropolitan Life Insurance Company, beginning with the late Mortimer Spiegelman and continuing most recently with Frances Baffa, who provided the mortality data used in the computation of the estate multipliers.
- [19] Data on wealth are also available from the 1983 Survey of Consumer Finances. This study, jointly sponsored by the Board of Governors of the Federal Reserve System and six other Federal agencies, presents information on assets as well as other financial information based on a survey of approximately 3,800 families. The inclusion of data from interviews with an additional 438 high-income families allowed greater comparability with the estate multiplier estimates of the wealth of top wealthholders. For further information, see Avery, Robert B., Elliehausen, Gregory E., Canner, Glenn B., and Gustafson, Thomas A., "Survey of Consumer Finances, 1983," *Federal Reserve Bulletin*, September 1984; Avery, Robert B., Elliehausen, Gregory E., Canner, Glenn B., and Gustafson, Thomas A., "Survey of Consumer Finances, 1983: A Second Report," *Federal Reserve Bulletin*, December 1984;

and Avery, Robert B., and Elliehausen, Gregory E., "Financial Characteristics of High-Income Families," *Federal Reserve Bulletin*, March 1986.

- [20] Lamas, Enrique J., and McNeil, John M., "Year-Apart Estimates of Household Net Worth from the Survey of Income and Program Participation," *1987 Proceedings of the Conference on Research on Income and*

Wealth, National Bureau of Economic Research (in preparation as of June 1988).

- [21] Prior to 1982, all gifts within the 3 years preceding death were required to be included in the estate. Under ERTA, only certain transfers—primarily gifts in which the decedent had a reversionary interest and revocable trusts—were included in the estate.

Table 1A.—All Top Wealthholders With Gross Assets of \$325,000 or More, by Size of Net Worth

[All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth
			Number	Amount	
			(1)	(2)		(3)	(4)	(5)
Total	4,478.8	3,218,225	3,976.5	504,714	2,713,510
Under \$100,000 ¹	341.7	93,796	332.2	107,990	-14,193
\$100,000 under \$250,000	649.0	200,942	620.4	84,079	116,863
\$250,000 under \$500,000	2,032.3	868,468	1,744.4	118,996	749,472
\$500,000 under \$1,000,000	980.3	734,872	843.7	73,659	661,212
\$1,000,000 under \$5,000,000	437.3	874,391	399.1	87,402	786,989
\$5,000,000 or more	38.2	445,755	36.6	32,588	413,167

¹ Includes top wealthholders with negative net worth.

NOTE: Detail may not add to totals because of rounding.

Table 1B.—All Top Wealthholders With Gross Assets Greater Than \$500,000, by Size of Net Worth

[All figures are estimates based on estate tax return samples—number of top wealthholders are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth
			Number	Amount	
			(1)	(2)		(3)	(4)	(5)
Total	2,233.1	2,464,225	2,033.2	399,206	2,065,019
Under \$250,000 ¹	282.6	130,729	278.0	121,511	9,219
\$250,000 under \$500,000	494.7	278,478	475.8	84,045	194,433
\$500,000 under \$1,000,000	980.3	734,872	843.7	73,659	661,212
\$1,000,000 under \$5,000,000	437.3	874,391	399.1	87,402	786,989
\$5,000,000 or more	38.2	445,755	36.6	32,588	413,167

Size of net worth	Types of assets							
	Cash		Corporate stock		Bonds			
	Number	Amount	Number	Amount	Total		Corporate and foreign	
					Number	Amount	Number	Amount
	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
Total	2,178.0	205,960	1,842.9	737,964	980.7	173,635	407.7	17,264
Under \$250,000 ¹	269.5	6,655	196.7	13,155	50.6	1,252	16.2	487
\$250,000 under \$500,000	478.0	21,392	387.4	44,114	143.7	5,688	56.1	1,262
\$500,000 under \$1,000,000	960.9	92,597	820.0	173,044	499.8	48,444	221.1	6,626
\$1,000,000 under \$5,000,000	431.7	64,936	401.5	298,522	259.4	75,739	102.2	5,746
\$5,000,000 or more	37.9	20,380	37.3	209,129	27.1	42,512	12.0	3,143

Size of net worth	Types of assets—Continued							
	Bonds—Continued						Life insurance equity	
	Government		State and local				Number	Amount
	Federal savings		Other Federal		State and local			
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)	
Total	244.4	6,609	324.5	55,871	559.9	93,891	1,622.4	30,610
Under \$250,000 ¹	21.0	31	8.2	157	14.8	576	269.9	6,467
\$250,000 under \$500,000	44.6	360	36.2	1,546	61.8	2,520	422.2	8,019
\$500,000 under \$1,000,000	125.4	3,377	175.8	16,834	278.6	21,606	624.2	8,247
\$1,000,000 under \$5,000,000	50.9	2,177	92.5	24,532	183.8	43,284	282.0	6,777
\$5,000,000 or more	2.6	664	11.8	12,801	20.9	25,904	24.0	1,100

Size of net worth	Types of assets—Continued							
	Notes and mortgages		Real estate		Noncorporate business assets		Other assets	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	Total	975.9	116,005	2,074.3	800,391	971.8	191,128	2,139.0	208,533
Under \$250,000 ¹	82.0	6,357	264.7	67,621	127.8	17,449	270.8	11,774
\$250,000 under \$500,000	197.9	14,475	476.0	137,430	221.8	22,792	476.5	24,569
\$500,000 under \$1,000,000	432.4	39,662	893.4	270,544	373.2	41,371	932.0	60,964
\$1,000,000 under \$5,000,000	238.0	39,411	403.9	252,025	221.3	67,958	421.8	69,023
\$5,000,000 or more	25.7	16,101	36.4	72,772	27.7	41,559	37.8	42,203

¹ Includes top wealthholders with negative net worth.

NOTE: Detail may not add to totals because of rounding.

Table 2A.—All Men: Top Wealthholders With Gross Assets of \$325,000 or More, by Size of Net Worth

[All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth
			Number	Amount	
	(1)	(2)	(3)	(4)	(5)
Total	2,763.4	1,915,893	2,478.6	380,392	1,535,501
Under \$100,000 ¹	304.7	84,376	296.1	95,421	- 11,046
\$100,000 under \$250,000	527.9	158,789	500.2	64,461	94,329
\$250,000 under \$500,000	1,136.1	494,675	974.7	79,694	414,981
\$500,000 under \$1,000,000	529.8	412,968	462.8	53,546	359,422
\$1,000,000 under \$5,000,000	243.5	503,067	224.5	62,056	441,010
\$5,000,000 or more	21.4	262,019	20.3	25,214	236,804

¹ Includes top wealthholders with negative net worth.
NOTE: Detail may not add to totals because of rounding.

Table 2B.—All Men: Top Wealthholders With Gross Assets Greater Than \$500,000, by Size of Net Worth

[All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth
			Number	Amount	
	(1)	(2)	(3)	(4)	(5)
Total	1,408.7	1,495,612	1,299.0	307,794	1,187,818
Under \$250,000 ¹	248.5	114,829	243.8	105,463	9,366
\$250,000 under \$500,000	365.5	202,730	347.5	61,515	141,215
\$500,000 under \$1,000,000	529.8	412,968	462.8	53,546	359,422
\$1,000,000 under \$5,000,000	243.5	503,067	224.5	62,056	441,010
\$5,000,000 or more	21.4	262,019	20.3	25,214	236,804

Size of net worth	Types of assets							
	Cash		Corporate stock		Bonds			
	Number	Amount	Number	Amount	Total		Corporate and foreign	
					Number	Amount	Number	Amount
(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	
Total	1,371.4	110,648	1,167.1	444,251	543.8	82,332	215.7	7,654
Under \$250,000 ¹	238.1	5,322	172.7	11,665	45.0	957	**	**
\$250,000 under \$500,000	352.6	15,070	298.2	36,111	104.9	3,723	**51.6	**1,207
\$500,000 under \$1,000,000	518.3	45,777	447.4	99,502	244.3	20,977	105.6	2,698
\$1,000,000 under \$5,000,000	241.3	34,149	227.7	179,011	135.5	33,871	52.7	2,638
\$5,000,000 or more	21.1	10,330	21.0	117,962	14.0	22,804	5.7	1,111

Size of net worth	Types of assets—Continued							
	Bonds—Continued						Life insurance equity	
	Federal savings		Other Federal		State and local			
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)	
Total	148.1	3,266	145.4	22,842	298.4	48,570	1,236.5	27,426
Under \$250,000 ¹	**	**	**	**	**	**	241.6	6,078
\$250,000 under \$500,000	**53.0	**283	**29.3	**1,047	**58.6	**2,142	343.2	7,201
\$500,000 under \$1,000,000	66.1	1,465	71.3	6,720	133.2	10,094	432.4	7,324
\$1,000,000 under \$5,000,000	27.4	965	38.8	7,793	95.6	22,475	201.3	5,850
\$5,000,000 or more	1.7	553	5.9	7,282	11.0	13,858	18.0	974

Size of net worth	Types of assets—Continued							
	Notes and mortgages		Real estate		Noncorporate business assets		Other assets	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
Total	636.1	75,687	1,325.2	488,642	697.2	138,021	1,353.8	128,605
Under \$250,000 ¹	73.3	5,578	234.3	58,923	114.1	15,949	238.9	10,356
\$250,000 under \$500,000	146.1	9,997	352.5	91,990	182.3	19,540	355.1	19,098
\$500,000 under \$1,000,000	260.4	24,175	491.5	149,722	243.6	30,060	504.1	35,432
\$1,000,000 under \$5,000,000	141.5	24,765	226.4	142,153	141.1	44,030	234.6	39,239
\$5,000,000 or more	14.8	11,173	20.5	45,854	16.3	28,441	21.1	24,481

** Data combined to avoid disclosure of information for specific estate tax returns.
¹ Includes top wealthholders with negative net worth.
NOTE: Detail may not add to totals because of rounding.

Table 3A.—All Women: Top Wealthholders With Gross Assets of \$325,000 or More, by Size of Net Worth

[All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth
			Number	Amount	
	(1)	(2)	(3)	(4)	(5)
Total.....	1,715.3	1,302,332	1,497.9	124,322	1,178,010
Under \$100,000 ¹	37.0	9,421	36.2	12,568	-3,147
\$100,000 under \$250,000.....	121.0	42,153	120.2	19,619	22,535
\$250,000 under \$500,000.....	896.2	373,793	769.8	39,302	334,491
\$500,000 under \$1,000,000.....	450.5	321,904	380.9	20,114	301,790
\$1,000,000 under \$5,000,000.....	193.8	371,325	174.6	25,346	345,979
\$5,000,000 or more.....	16.8	183,736	16.3	7,374	176,362

¹ Includes top wealthholders with negative net worth.

NOTE: Detail may not add to totals because of rounding.

Table 3B.—All Women: Top Wealthholders With Gross Assets Greater Than \$500,000, by Size of Net Worth

[All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth
			Number	Amount	
	(1)	(2)	(3)	(4)	(5)
Total.....	824.5	968,614	734.2	91,413	877,201
Under \$250,000 ¹	34.2	15,901	34.2	16,048	-148
\$250,000 under \$500,000.....	129.2	75,748	128.3	22,531	53,217
\$500,000 under \$1,000,000.....	450.5	321,904	380.9	20,114	301,790
\$1,000,000 under \$5,000,000.....	193.8	371,325	174.6	25,346	345,979
\$5,000,000 or more.....	16.8	183,736	16.3	7,374	176,362

Size of net worth	Types of assets							
	Cash		Corporate stock		Bonds			
	Number	Amount	Number	Amount	Total		Corporate and foreign	
					Number	Amount	Number	Amount
(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	
Total.....	806.6	95,312	675.8	293,713	436.9	91,303	192.0	9,610
Under \$250,000 ¹	31.4	1,333	24.0	1,490	*5.6	*295	**	**
\$250,000 under \$500,000.....	125.5	6,322	89.2	8,004	38.8	1,965	**20.7	**542
\$500,000 under \$1,000,000.....	442.6	46,820	372.6	73,542	255.5	27,467	115.5	3,928
\$1,000,000 under \$5,000,000.....	190.4	30,787	173.8	119,510	123.9	41,868	49.6	3,108
\$5,000,000 or more.....	16.8	10,050	16.2	91,166	13.1	19,708	6.3	2,032

Size of net worth	Types of assets—Continued							
	Bonds—Continued						Life insurance equity	
	Government						Number	Amount
	Federal savings		Other Federal		State and local			
Number	Amount	Number	Amount	Number	Amount	(20)	(21)	
(14)	(15)	(16)	(17)	(18)	(19)			
Total.....	96.2	3,343	179.1	33,029	261.5	45,321	385.8	3,184
Under \$250,000 ¹	**	**	**	**	**	**	28.3	388
\$250,000 under \$500,000.....	**12.5	**107	**15.1	**657	**18.1	**954	79.0	818
\$500,000 under \$1,000,000.....	59.4	1,912	104.5	10,114	145.4	11,512	191.8	924
\$1,000,000 under \$5,000,000.....	23.5	1,212	53.7	16,739	88.1	20,809	80.8	927
\$5,000,000 or more.....	0.9	111	5.9	5,519	9.9	12,046	6.0	126

Size of net worth	Types of assets—Continued							
	Notes and mortgages		Real estate		Noncorporate business assets		Other assets	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
Total.....	339.8	40,317	749.2	311,750	274.5	53,107	785.2	79,928
Under \$250,000 ¹	8.7	777	30.4	8,698	13.7	1,500	32.0	1,418
\$250,000 under \$500,000.....	51.8	4,478	123.5	45,440	39.6	3,251	121.4	5,470
\$500,000 under \$1,000,000.....	171.9	15,487	401.9	120,822	129.6	11,311	428.0	25,532
\$1,000,000 under \$5,000,000.....	96.5	14,646	177.4	109,873	80.2	23,928	187.1	29,785
\$5,000,000 or more.....	10.9	4,928	15.9	26,917	11.4	13,117	16.8	17,722

* Estimate should be used with caution because of the small number of sample estate tax returns on which it is based.

** Data combined to avoid disclosure of information for specific estate tax returns.

¹ Includes top wealthholders with negative net worth.

NOTE: Detail may not add to totals because of rounding.

Table 4A.—Top Wealthholders Under 50 Years of Age With Gross Assets of \$325,000 or More, by Size of Net Worth

[All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth
			Number	Amount	
	(1)	(2)	(3)	(4)	(5)
Total	1,702.4	1,040,871	1,590.4	290,518	750,353
Under \$100,000 ¹	313.7	78,846	304.6	85,970	-7,125
\$100,000 under \$250,000	438.4	133,968	423.1	58,043	75,925
\$250,000 under \$500,000	599.7	275,637	546.0	63,445	212,192
\$500,000 under \$1,000,000	232.5	189,086	205.1	32,880	156,206
\$1,000,000 under \$5,000,000	105.8	234,179	99.5	39,387	194,792
\$5,000,000 or more	12.3	129,155	12.1	10,792	118,362

¹ Includes top wealthholders with negative net worth.
NOTE: Detail may not add to totals because of rounding.

Table 4B.—Top Wealthholders Under 50 Years of Age With Gross Assets Greater Than \$500,000, by Size of Net Worth

[All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth
			Number	Amount	
	(1)	(2)	(3)	(4)	(5)
Total	833.7	798,190	790.0	225,555	572,635
Under \$250,000 ¹	232.2	101,248	228.4	92,147	9,102
\$250,000 under \$500,000	250.7	144,521	244.9	50,349	94,172
\$500,000 under \$1,000,000	232.5	189,086	205.1	32,880	156,206
\$1,000,000 under \$5,000,000	105.8	234,179	99.5	39,387	194,792
\$5,000,000 or more	12.3	129,155	12.1	10,792	118,362

Size of net worth	Types of assets							
	Cash		Corporate stock		Bonds			
	Number	Amount	Number	Amount	Total		Corporate and foreign	
					Number	Amount	Number	Amount
(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	
Total	806.1	48,492	639.2	223,877	231.8	36,970	87.6	3,871
Under \$250,000 ¹	222.0	5,414	158.4	10,562	40.5	673	12.8	391
\$250,000 under \$500,000	241.2	8,862	192.4	23,616	51.6	1,833	20.8	523
\$500,000 under \$1,000,000	226.8	17,434	181.5	43,641	85.4	8,603	37.1	1,335
\$1,000,000 under \$5,000,000	103.9	11,477	95.0	82,451	46.2	17,392	13.2	604
\$5,000,000 or more	12.1	5,306	12.0	63,607	8.1	8,469	3.8	1,019

Size of net worth	Types of assets—Continued							
	Bonds—Continued						Life insurance equity	
	Government				State and local			
	Federal savings		Other Federal		Number	Amount	Number	Amount
	Number	Amount	Number	Amount				
(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)	
Total	62.2	1,249	67.0	15,843	101.0	16,007	683.1	10,568
Under \$250,000 ¹	17.1	13	6.7	93	10.9	177	223.4	4,637
\$250,000 under \$500,000	16.3	59	12.4	239	18.4	1,012	216.2	2,873
\$500,000 under \$1,000,000	19.6	516	30.5	3,925	36.7	2,827	160.9	1,472
\$1,000,000 under \$5,000,000	8.9	226	13.9	8,739	29.0	7,822	74.6	1,358
\$5,000,000 or more	0.3	434	3.5	2,846	5.9	4,169	8.1	228

Size of net worth	Types of assets—Continued							
	Notes and mortgages		Real estate		Noncorporate business assets		Other assets	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
Total	333.1	34,097	771.3	290,063	402.2	77,923	800.8	76,200
Under \$250,000 ¹	62.8	4,788	216.7	53,105	101.3	12,109	224.0	9,960
\$250,000 under \$500,000	95.1	6,913	242.6	75,592	116.2	12,253	242.2	12,580
\$500,000 under \$1,000,000	107.5	8,832	203.0	73,786	111.5	15,610	222.1	19,708
\$1,000,000 under \$5,000,000	59.2	9,227	97.2	66,805	63.3	25,105	100.4	20,365
\$5,000,000 or more	8.4	4,338	11.9	20,775	10.0	12,845	12.1	13,586

¹ Includes top wealthholders with negative net worth.
NOTE: Detail may not add to totals because of rounding.

Table 5A.—Top Wealthholders 50 to 64 Years of Age With Gross Assets of \$325,000 or More, by Size of Net Worth

[All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth
			Number	Amount	
	(1)	(2)	(3)	(4)	(5)
Total	1,631.3	1,217,460	1,431.4	166,300	1,051,160
Under \$100,000 ¹	27.3	14,291	26.8	21,008	-6,718
\$100,000 under \$250,000	200.5	62,253	187.2	23,337	38,916
\$250,000 under \$500,000	826.1	347,291	711.3	44,964	302,326
\$500,000 under \$1,000,000	384.9	292,162	331.3	31,172	260,990
\$1,000,000 under \$5,000,000	179.3	353,658	162.3	33,975	319,682
\$5,000,000 or more	13.3	147,807	12.6	11,844	135,963

¹ Includes top wealthholders with negative net worth.

NOTE: Detail may not add to totals because of rounding.

Table 5B.—Top Wealthholders 50 to 64 Years of Age With Gross Assets Greater Than \$500,000, by Size of Net Worth

[All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth
			Number	Amount	
	(1)	(2)	(3)	(4)	(5)
Total	828.8	932,461	745.3	133,696	798,765
Under \$250,000 ¹	47.9	27,351	47.1	27,264	87
\$250,000 under \$500,000	203.4	111,483	192.0	29,440	82,043
\$500,000 under \$1,000,000	384.9	292,162	331.3	31,172	260,990
\$1,000,000 under \$5,000,000	179.3	353,658	162.3	33,975	319,682
\$5,000,000 or more	13.3	147,807	12.6	11,844	135,963

Size of net worth	Types of assets							
	Cash		Corporate stock		Bonds			
	Number	Amount	Number	Amount	Total		Corporate and foreign	
					Number	Amount	Number	Amount
(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	
Total	808.0	70,537	704.3	269,650	370.1	45,973	147.0	5,578
Under \$250,000 ¹	45.4	1,107	36.7	2,435	10.0	564	3.4	89
\$250,000 under \$500,000	196.8	8,994	161.0	16,754	73.3	2,646	27.6	528
\$500,000 under \$1,000,000	375.6	30,685	329.1	65,595	180.5	13,021	74.9	2,064
\$1,000,000 under \$5,000,000	176.9	23,724	164.5	116,079	97.8	19,206	37.4	2,033
\$5,000,000 or more	13.2	6,027	13.1	68,786	8.5	10,535	3.7	864

Size of net worth	Types of assets—Continued							
	Bonds—Continued						Life insurance equity	
	Federal savings		Other Federal		State and local			
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)	
Total	87.4	1,549	102.3	11,697	219.3	27,149	639.2	14,283
Under \$250,000 ¹	3.7	15	1.4	62	4.0	399	44.7	1,775
\$250,000 under \$500,000	22.7	160	17.9	916	34.5	1,042	179.1	4,533
\$500,000 under \$1,000,000	43.3	722	50.6	3,216	105.1	7,020	277.0	4,185
\$1,000,000 under \$5,000,000	16.8	570	29.2	4,568	69.5	12,035	129.3	3,315
\$5,000,000 or more	1.0	82	3.1	2,936	6.2	6,653	9.1	474

Size of net worth	Types of assets—Continued							
	Notes and mortgages		Real estate		Noncorporate business assets		Other assets	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(22)	(23)	(24)	(25)	(26)	(27)	(28)	(29)
Total	385.4	46,310	798.0	323,751	396.5	79,609	797.4	82,349
Under \$250,000 ¹	17.8	1,440	45.6	13,163	24.9	5,158	44.8	1,708
\$250,000 under \$500,000	83.8	6,021	196.6	52,313	93.5	9,441	196.1	10,781
\$500,000 under \$1,000,000	175.3	17,183	371.3	116,630	166.0	19,150	369.3	25,712
\$1,000,000 under \$5,000,000	99.3	16,252	171.5	114,258	101.6	29,633	174.1	31,190
\$5,000,000 or more	9.2	5,414	12.9	27,387	10.5	16,227	13.2	12,957

* Estimate should be used with caution because of the small number of sample estate tax returns on which it is based.

¹ Includes top wealthholders with negative net worth.

NOTE: Detail may not add to totals because of rounding.

Table 6A.—All Top Wealthholders 65 Years of Age or Older With Gross Assets Greater Than \$325,000, by Size of Net Worth
 [All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth
			Number	Amount	
			(1)	(2)		(3)	(4)	(5)
Total	1,103.8	935,392	921.3	46,509	888,883
Under \$100,000 ¹	0.8	660	0.8	1,011	-351
\$100,000 under \$250,000	9.0	4,231	9.0	2,407	1,824
\$250,000 under \$500,000	578.1	233,913	464.0	9,941	223,972
\$500,000 under \$1,000,000	354.2	247,844	301.1	9,490	238,354
\$1,000,000 under \$5,000,000	149.3	281,381	134.7	13,715	267,666
\$5,000,000 or more	12.6	167,363	11.8	9,945	157,418

* Estimates should be used with caution because of the small number of sample estate tax returns on which it is based.
¹ Includes top wealthholders with negative net worth.
 NOTE: Detail may not add to totals because of rounding.

Table 6B.—All Top Wealthholders 65 Years of Age or Older With Gross Assets Greater Than \$500,000, by Size of Net Worth
 [All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth
			Number	Amount	
			(1)	(2)		(3)	(4)	(5)
Total	557.8	720,654	488.1	39,487	681,167
Under \$250,000 ¹	2.4	2,130	2.4	2,100	30
\$250,000 under \$500,000	39.4	21,936	38.1	4,236	17,700
\$500,000 under \$1,000,000	354.2	247,844	301.1	9,490	238,354
\$1,000,000 under \$5,000,000	149.3	281,381	134.7	13,715	267,666
\$5,000,000 or more	12.6	167,363	11.8	9,945	157,418

Size of net worth	Types of assets							
	Cash		Corporate stock		Bonds			
	Number	Amount	Number	Amount	Total		Corporate and foreign	
					Number	Amount	Number	Amount
(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	
Total	551.2	84,834	489.8	241,173	372.9	89,073	170.9	7,739
Under \$250,000 ¹	2.1	135	1.7	158	*0.1	*13	**	**
\$250,000 under \$500,000	38.8	3,401	32.9	3,597	18.8	1,198	**7.8	**219
\$500,000 under \$1,000,000	349.7	43,262	303.6	62,687	229.9	26,388	107.4	3,208
\$1,000,000 under \$5,000,000	148.1	29,002	139.5	98,765	113.6	38,256	51.1	3,062
\$5,000,000 or more	12.5	9,033	12.1	75,966	10.4	23,217	4.5	1,250

Size of net worth	Types of assets—Continued							
	Bonds—Continued						Life insurance equity	
	Government			State and local				
	Federal savings		Other Federal		State and local		Number	Amount
	Number	Amount	Number	Amount	Number	Amount		
(14)	(15)	(16)	(17)	(18)	(19)	(20)	(21)	
Total	92.7	3,682	152.9	27,927	235.7	49,725	294.1	5,705
Under \$250,000 ¹	**	**	**	**	**	**	1.8	54
\$250,000 under \$500,000	**5.7	**143	**6.0	**390	**8.9	**460	25.9	594
\$500,000 under \$1,000,000	61.4	2,122	93.1	9,542	134.5	11,516	182.5	2,569
\$1,000,000 under \$5,000,000	24.2	1,269	48.6	10,975	83.7	22,950	77.1	2,090
\$5,000,000 or more	1.3	147	5.2	7,020	8.7	14,800	6.8	397

Size of net worth	Types of assets—Continued							
	Notes and mortgages		Real estate		Noncorporate business assets		Other assets	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
Total	252.3	35,024	492.9	182,455	169.1	33,291	529.2	49,099
Under \$250,000 ¹	1.4	129	2.4	1,353	1.6	181	2.1	106
\$250,000 under \$500,000	18.6	1,518	35.5	9,354	12.1	1,098	37.1	1,176
\$500,000 under \$1,000,000	146.3	13,347	311.1	77,902	93.1	6,501	333.0	15,187
\$1,000,000 under \$5,000,000	78.0	13,682	132.4	69,286	55.1	13,024	144.6	17,276
\$5,000,000 or more	8.0	6,348	11.5	24,560	7.2	12,487	12.4	15,353

* Estimate should be used with caution because of the small number of estate tax returns on which it is based.
 ** Data combined to avoid disclosure of information for specific estate tax returns.
¹ Includes top wealthholders with negative net worth.
 NOTE: Detail may not add to totals because of rounding.

Table 7A.—All Top Wealthholders With Gross Assets of \$325,000 or More, by State of Residence

(All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands, money amounts are in millions of dollars)

State of residence	Number of top wealthholders	Total assets	Debts and mortgages		Net worth	Men		Women		Millionaires as defined by:	
			Number	Amount		Number	Net worth	Number	Net worth	Net worth	
										Number	Amount
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	
United States, total.....	4,478.8	3,218,225	3,976.5	504,714	2,713,510	2,763.4	1,535,501	1,715.3	1,178,010	475.5	1,200,157
Alabama.....	44.8	31,813	41.4	4,000	27,813	32.0	18,338	12.7	9,475	7.2	14,402
Alaska.....	18.0	11,121	17.3	2,571	8,550	13.7	6,266	4.3	2,284	1.8	3,448
Arizona.....	67.3	53,998	59.9	6,022	47,976	37.8	19,637	29.5	28,338	7.0	24,058
Arkansas.....	31.8	24,715	27.6	4,752	19,963	21.6	10,835	10.2	9,128	4.7	9,301
California.....	689.4	598,487	607.7	98,479	500,009	341.6	221,115	347.8	278,893	95.2	257,506
Colorado.....	83.3	70,049	73.4	16,015	54,033	49.7	34,215	33.6	19,819	8.2	26,382
Connecticut.....	75.1	54,720	68.0	4,535	50,185	44.1	23,955	31.0	26,231	9.7	24,362
Delaware.....	13.7	8,222	11.8	1,347	6,875	7.6	4,145	6.1	2,729	0.8	2,234
Florida.....	288.1	229,310	246.9	35,141	194,170	169.8	114,157	118.3	80,013	41.8	97,606
Georgia.....	86.3	57,153	75.6	9,421	47,731	62.4	31,697	23.9	16,034	7.9	20,432
Hawaii.....	20.3	14,767	18.4	3,523	11,244	13.1	7,309	7.2	3,935	1.4	4,813
Idaho.....	18.5	11,380	16.1	3,443	7,937	9.6	3,354	8.9	4,584	1.0	2,074
Illinois.....	230.7	154,487	209.4	27,745	126,743	150.5	81,571	80.2	45,172	20.8	47,403
Indiana.....	80.3	48,387	64.8	8,009	40,378	49.5	25,780	30.8	14,598	7.6	14,702
Iowa.....	105.6	58,303	92.3	12,658	45,645	73.9	30,125	31.7	15,520	4.7	10,528
Kansas.....	69.5	44,070	58.7	6,121	37,949	46.9	26,256	22.6	11,693	4.2	12,700
Kentucky.....	49.6	31,524	45.2	5,275	26,249	34.7	16,577	14.9	9,673	5.0	11,200
Louisiana.....	70.6	50,846	66.1	9,538	41,308	38.9	21,302	31.7	20,006	7.6	18,201
Maine.....	14.7	10,550	13.2	2,458	8,092	9.7	4,929	5.0	3,163	1.2	2,999
Maryland (includes District of Columbia).....	88.9	65,458	76.1	7,735	57,723	62.3	36,741	26.6	20,982	9.8	28,489
Massachusetts.....	102.3	61,078	99.0	6,334	54,744	61.2	30,527	41.1	24,217	8.8	20,739
Michigan.....	111.8	68,734	98.9	8,913	59,822	76.5	38,342	35.4	21,479	9.8	22,199
Minnesota.....	90.6	56,643	78.5	12,055	44,588	74.7	34,156	15.9	10,433	6.4	15,418
Mississippi.....	33.9	18,320	30.3	3,793	14,526	25.0	10,326	8.9	4,200	1.6	3,107
Missouri.....	77.0	55,610	62.3	7,206	48,404	55.2	31,313	21.8	17,091	8.1	19,855
Montana.....	25.5	16,539	22.2	4,600	11,939	16.7	7,714	8.8	4,226	1.9	4,385
Nebraska.....	57.0	36,002	48.3	7,550	28,452	39.6	17,864	17.4	10,588	4.1	8,016
Nevada.....	27.7	26,249	25.9	4,198	22,051	10.4	6,835	17.3	15,215	4.4	13,483
New Hampshire.....	13.6	9,387	13.0	1,677	7,710	9.9	5,610	3.7	2,100	1.3	3,547
New Jersey.....	141.7	89,787	128.0	11,902	77,885	97.3	49,331	44.4	28,554	11.6	29,223
New Mexico.....	14.6	11,530	13.0	3,168	8,362	9.2	4,736	5.4	3,626	1.6	3,602
New York.....	326.5	245,727	280.1	24,810	220,917	200.2	124,809	126.3	96,108	38.1	109,525
North Carolina.....	71.2	43,059	67.7	8,799	34,260	52.7	22,604	18.5	11,656	5.0	10,680
North Dakota.....	29.5	18,942	24.3	5,457	13,485	24.5	10,448	5.0	3,037	2.2	3,555
Ohio.....	141.5	86,605	130.0	12,498	74,106	88.0	43,199	53.5	30,907	13.0	27,143
Oklahoma.....	72.8	54,997	59.5	9,121	45,876	48.6	29,341	24.2	16,535	7.5	21,454
Oregon.....	51.5	28,866	41.3	3,922	24,943	32.2	14,056	19.3	10,887	2.6	5,259
Pennsylvania.....	144.6	95,247	133.0	13,051	82,196	92.7	45,620	51.9	36,576	13.8	33,475
Rhode Island.....	10.9	8,043	9.8	1,184	6,859	8.0	5,214	2.9	1,646	1.5	2,966
South Carolina.....	50.0	29,130	48.3	4,335	24,795	32.9	16,381	17.1	8,414	3.4	9,080
South Dakota.....	19.4	10,407	17.7	3,207	7,200	15.6	5,379	3.8	1,821	1.0	1,645
Tennessee.....	61.5	38,146	58.8	5,839	32,306	41.9	20,777	19.6	11,530	7.2	13,677
Texas.....	343.5	266,266	323.0	39,344	226,921	167.1	102,056	176.4	124,866	41.4	110,861
Utah.....	24.0	16,431	21.0	2,782	13,649	13.4	8,723	10.6	4,927	3.4	6,688
Vermont.....	10.3	8,844	7.8	710	8,134	6.6	5,858	3.6	2,276	1.4	4,242
Virginia.....	89.9	60,632	79.9	7,464	53,168	61.8	34,707	28.1	18,462	8.0	25,067
Washington.....	75.5	56,157	65.7	8,842	47,315	41.8	29,089	33.8	18,226	7.7	17,931
West Virginia.....	10.6	7,449	10.0	1,949	5,499	8.1	4,041	2.5	1,458	0.8	1,320
Wisconsin.....	77.6	45,672	69.2	8,954	36,718	63.7	27,781	13.9	8,937	5.5	11,381
Wyoming.....	14.1	10,716	12.1	1,811	8,904	11.1	6,264	3.0	2,641	2.5	4,590
Other Areas ¹	11.3	7,647	8.1	448	7,199	6.8	4,098	4.5	3,101	1.9	3,204

¹ U.S. citizens domiciled abroad. Persons who acquired U.S. citizenship solely by virtue of being a citizen of Puerto Rico or the Virgin Islands are not included.

NOTE: Detail may not add to totals because of rounding.

Table 7B.—All Top Wealthholders With Gross Assets Greater Than \$500,000, by State of Residence

[All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands, money amounts are in millions of dollars]

State of residence	Number of top wealthholders	Total assets	Debts and mortgages		Net worth	Men		Women	
			Number	Amount		Number	Net worth	Number	Net worth
United States, total	2,233.1	2,464,225	2,033.2	399,206	2,065,019	1,408.7	1,187,818	824.5	877,201
Alabama	23.6	25,467	22.1	3,021	22,445	16.4	14,266	7.1	8,180
Alaska	8.8	8,118	8.7	1,788	6,330	6.5	4,707	*2.3	*1,623
Arizona	34.2	42,511	30.8	4,471	38,040	19.5	14,618	14.7	23,422
Arkansas	20.8	21,232	17.9	3,828	17,404	14.0	9,322	6.8	8,082
California	380.7	487,466	337.6	79,958	407,508	183.6	178,613	197.1	228,895
Colorado	44.5	56,727	38.6	13,663	43,064	26.9	28,989	17.6	14,075
Connecticut.....	40.6	43,536	38.9	3,844	39,693	22.6	18,177	18.1	21,516
Delaware.....	4.4	5,181	4.1	1,151	4,030	3.7	3,371	0.6	659
Florida.....	154.0	182,854	137.1	29,875	152,979	98.0	93,870	56.0	59,109
Georgia.....	42.0	43,633	37.3	7,309	36,324	31.2	24,746	10.8	11,578
Hawaii.....	8.7	10,864	8.0	2,919	7,946	6.0	5,655	2.7	2,290
Idaho.....	10.6	8,448	10.2	2,393	6,054	5.2	2,794	5.4	3,260
Illinois.....	116.8	116,416	107.2	22,642	93,775	83.3	64,286	33.5	29,488
Indiana.....	36.2	33,484	30.4	7,088	26,395	22.4	18,322	13.8	8,073
Iowa.....	41.7	36,373	38.6	9,404	26,969	32.0	18,360	9.7	8,609
Kansas.....	30.2	30,476	26.1	4,024	26,452	19.7	18,651	10.5	7,801
Kentucky.....	22.2	22,945	21.9	3,647	19,299	15.6	12,533	6.6	6,766
Louisiana.....	37.5	39,405	36.5	7,566	31,839	21.4	17,589	16.2	14,250
Maine.....	7.8	8,525	7.0	2,068	6,457	4.6	3,785	3.2	2,672
Maryland (includes District of Columbia).....	45.5	51,609	41.5	6,400	45,209	32.7	29,278	12.8	15,931
Massachusetts.....	44.4	42,630	42.7	4,489	38,141	26.7	22,255	17.7	15,886
Michigan.....	50.7	48,945	46.4	5,409	43,535	36.9	29,192	13.8	14,343
Minnesota.....	41.1	40,631	38.5	9,134	31,497	34.4	24,303	6.7	7,194
Mississippi.....	14.5	11,705	13.2	2,437	9,268	12.1	7,243	2.4	2,025
Missouri.....	41.6	43,135	36.0	6,127	37,008	32.3	24,611	9.3	12,397
Montana.....	14.3	13,092	12.2	4,139	8,954	8.5	5,540	5.8	3,414
Nebraska.....	30.1	25,718	27.2	6,315	19,403	23.0	12,372	7.1	7,031
Nevada.....	12.6	20,459	12.0	2,849	17,610	6.3	6,088	6.2	11,522
New Hampshire.....	7.3	7,810	6.9	1,352	6,459	4.6	4,713	2.8	1,745
New Jersey.....	64.4	64,707	58.1	9,492	55,215	46.4	36,296	18.0	18,919
New Mexico.....	7.8	9,106	7.0	2,690	6,416	5.4	3,702	2.5	2,714
New York.....	151.3	187,963	136.6	18,802	169,161	98.5	97,467	52.8	71,693
North Carolina.....	37.0	31,777	35.5	7,067	24,710	28.0	16,640	9.0	8,070
North Dakota.....	16.9	14,284	14.8	4,862	9,421	15.2	7,397	*1.7	*2,024
Ohio.....	63.5	61,322	59.8	9,376	51,946	43.5	32,382	20.0	19,564
Oklahoma.....	36.8	43,270	30.0	7,727	35,543	25.4	23,870	11.4	11,673
Oregon.....	24.3	19,488	21.7	2,933	16,555	13.0	8,482	11.3	8,074
Pennsylvania.....	73.6	72,848	70.7	10,513	62,335	43.8	33,767	29.8	28,568
Rhode Island.....	5.5	6,287	5.4	1,014	5,273	4.3	4,307	1.2	966
South Carolina.....	20.0	20,329	19.5	3,105	17,224	13.3	12,258	6.7	4,965
South Dakota.....	8.7	6,711	8.2	2,430	4,281	6.7	3,126	1.9	1,155
Tennessee.....	27.4	27,277	25.8	4,524	22,753	17.9	14,730	9.5	8,022
Texas.....	175.9	209,965	168.0	30,965	179,000	91.5	82,461	84.4	96,539
Utah.....	11.0	12,033	9.4	1,853	10,180	7.1	7,266	3.9	2,914
Vermont.....	5.1	6,972	4.9	575	6,397	3.5	4,986	1.6	1,412
Virginia.....	41.5	45,503	37.7	5,039	40,464	30.2	27,321	11.3	13,143
Washington.....	37.7	41,904	32.4	6,738	35,166	21.9	23,082	15.8	12,084
West Virginia.....	7.2	6,312	6.7	1,600	4,713	5.4	3,475	1.8	1,238
Wisconsin.....	35.9	32,131	33.9	6,975	25,156	28.1	18,313	7.8	6,843
Wyoming.....	7.0	8,409	6.4	1,337	7,073	5.2	4,861	1.8	2,211
Other Areas ¹	7.3	6,232	5.2	281	5,951	4.2	3,376	3.1	2,575

Footnotes at end of table.

Table 7B—All Top Wealthholders With Gross Assets Greater Than \$500,000, by State of Residence—Continued

[All figures are estimates based on estate tax return samples—numbers of top wealthholders are in thousands; all money amounts are in millions of dollars]

State of residence	Selected assets									
	Cash		Corporate stock		Bonds		Real estate		Noncorporate business assets	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(10)	(11)	(12)	(13)	(14)	(15)	(16)	(17)	(18)	(19)
United States, total	2,178.0	205,960	1,842.9	737,964	980.7	173,635	2,074.3	800,391	971.8	191,128
Alabama.....	23.1	1,687	19.9	6,767	11.2	1,381	23.0	8,302	10.8	1,845
Alaska.....	8.8	577	5.2	1,765	1.4	98	8.5	3,733	5.9	1,021
Arizona.....	32.9	2,470	28.1	18,172	13.6	1,954	32.4	11,999	16.7	2,735
Arkansas.....	20.3	2,452	16.4	4,193	8.5	3,375	19.3	6,504	9.8	1,247
California.....	370.3	33,905	301.2	123,506	146.6	23,706	363.4	202,568	174.6	45,124
Colorado.....	44.3	4,092	36.0	14,768	17.5	2,676	41.2	20,600	21.7	7,597
Connecticut.....	38.9	4,007	35.1	17,536	22.4	4,116	34.8	11,014	9.8	1,011
Delaware.....	4.2	570	3.9	1,712	1.9	387	4.2	1,352	1.8	545
Florida.....	149.8	15,824	125.5	52,078	77.1	21,148	143.4	57,377	49.7	10,049
Georgia.....	40.8	3,100	35.6	14,390	15.8	1,730	39.1	13,880	15.7	2,770
Hawaii.....	8.4	501	7.2	2,376	3.0	899	8.5	5,840	3.5	467
Idaho.....	9.6	662	6.6	1,081	2.7	328	10.0	3,819	7.8	1,048
Illinois.....	114.6	11,856	100.2	34,443	55.6	9,115	107.4	34,590	47.0	8,182
Indiana.....	35.5	2,834	27.4	10,818	14.3	2,430	35.0	11,722	13.9	1,776
Iowa.....	40.8	2,178	36.5	8,309	16.0	1,435	39.0	15,328	28.1	4,497
Kansas.....	29.4	2,933	24.9	9,045	13.9	2,282	28.5	9,832	18.8	2,790
Kentucky.....	21.8	2,120	19.9	9,293	13.2	1,790	21.1	6,611	10.2	800
Louisiana.....	36.6	3,197	33.9	11,425	18.8	2,414	35.9	14,440	15.2	2,202
Maine.....	7.8	719	7.5	3,723	3.4	449	7.2	1,564	2.1	657
Maryland (includes District of Columbia).....	44.8	4,136	40.2	14,125	24.0	3,635	41.3	15,067	15.9	4,164
Massachusetts.....	44.1	4,253	36.9	16,696	24.8	4,764	39.8	9,443	10.3	1,368
Michigan.....	48.9	5,188	41.2	17,481	23.1	3,891	45.6	10,792	21.6	3,861
Minnesota.....	39.9	2,342	33.1	10,738	15.6	1,833	39.8	16,801	23.9	4,357
Mississippi.....	14.1	1,147	11.5	2,436	6.2	587	13.6	4,024	5.7	1,165
Missouri.....	40.0	2,993	33.7	16,766	17.9	3,769	36.8	10,761	20.0	2,495
Montana.....	14.2	1,064	9.4	2,312	5.1	357	13.7	5,695	7.6	1,232
Nebraska.....	28.9	1,830	22.3	4,701	10.8	1,207	29.6	11,514	22.4	3,569
Nevada.....	12.4	2,270	10.1	5,569	4.9	1,866	11.9	7,478	7.3	876
New Hampshire.....	7.3	943	5.7	3,104	3.4	703	6.0	1,793	1.3	100
New Jersey.....	62.6	6,280	55.8	24,661	36.8	7,282	60.3	15,794	19.6	3,157
New Mexico.....	7.7	656	5.5	2,066	2.9	273	7.8	2,820	3.9	346
New York.....	145.6	19,107	132.8	69,276	87.7	23,036	119.2	35,114	45.7	13,119
North Carolina.....	36.1	2,850	32.4	10,063	15.9	1,703	36.0	11,257	14.2	1,664
North Dakota.....	15.7	768	11.9	1,373	5.0	140	16.6	6,957	12.2	2,569
Ohio.....	62.1	5,875	56.2	23,705	26.6	3,542	57.2	15,528	22.8	3,060
Oklahoma.....	35.2	4,498	27.2	13,870	10.7	1,655	34.4	12,859	16.4	3,516
Oregon.....	24.1	1,875	17.5	4,271	7.8	1,104	23.2	6,800	11.9	1,828
Pennsylvania.....	73.3	6,753	66.5	28,220	41.3	7,224	67.1	16,861	21.6	3,818
Rhode Island.....	5.4	566	4.9	2,581	4.2	714	5.0	1,656	1.2	88
South Carolina.....	19.7	1,866	17.1	7,483	9.4	931	18.2	5,595	7.5	1,147
South Dakota.....	7.7	468	5.6	1,196	2.6	139	8.6	2,687	6.7	1,591
Tennessee.....	26.5	2,883	23.6	8,376	12.2	1,484	27.3	7,771	12.1	1,597
Texas.....	174.3	18,229	147.1	52,981	60.8	9,887	171.1	73,518	101.0	19,877
Utah.....	10.9	705	7.6	3,780	3.6	551	9.6	4,127	5.6	871
Vermont.....	5.1	398	4.9	3,721	3.2	783	4.9	1,226	3.0	134
Virginia.....	40.9	3,143	35.2	14,323	19.2	2,664	38.4	12,776	16.0	4,326
Washington.....	37.6	2,922	30.4	9,719	16.1	3,051	36.1	16,626	21.6	4,166
West Virginia.....	7.0	664	6.5	2,612	2.9	256	7.1	1,616	2.6	331
Wisconsin.....	34.2	2,023	28.4	10,339	14.0	1,705	34.7	10,170	20.6	3,208
Wyoming.....	7.0	1,019	5.1	1,731	1.9	399	6.7	3,168	3.8	572
Other Areas ¹	7.1	565	5.6	2,291	3.2	786	5.1	1,024	2.6	593

¹ Estimate should be used with caution because of the small number of sample estate tax returns on which it is based.

² U.S. citizens domiciled abroad. Persons who acquired U.S. citizenship solely by virtue of being a citizen of Puerto Rico or the Virgin Islands are not included.

NOTE: Detail may not add to totals because of rounding.

Estimates of Personal Wealth, 1986

by Marvin Schwartz and Barry W. Johnson

Approximately 3.3 million people had gross assets of \$500,000 or more in 1986 according to estimates of personal wealth derived from estate tax returns using the "estate multiplier technique." These individuals, the Nation's "top wealthholders," represented only 1.9 percent of the Nation's adult population [1]. Their net worth was nearly \$3.8 trillion and accounted for approximately 28.5 percent of the personal wealth in the United States in 1986 [2]. In contrast, 2.2 million people had gross assets of \$500,000 or more in 1982 [3]. The net worth of these top wealthholders was approximately \$2.1 trillion.

Just as the total number of top wealthholders increased between 1982 and 1986, so too did the number of millionaires among them. Approximately 941,000 individuals had a net worth of \$1 million or more in 1986, nearly twice the 475,000 in 1982. This followed a sharp increase from the 180,000 millionaires estimated for 1976.

ESTIMATING PERSONAL WEALTH FROM ESTATE TAX RETURNS

The measurement of personal wealth in the United States has attracted considerable attention in recent years. This interest has been stimulated by a number of factors. The effects of changes in the tax law, and other public policies, on the economy and on the concentration of wealth has focused attention on this subject. Accurate and comprehensive estimates of wealth, however, are difficult to obtain because individuals are not required to regularly report wealth information on any tax return or other public document. Several alternative approaches, each with its own merits, have been developed [4]. The estimates presented here are based on the "estate multiplier technique." This approach utilizes administrative records, in particular, estate tax returns filed for the deceased, to estimate the wealth of the living population.

The estate multiplier technique can be used to estimate wealth for all individuals whose assets exceed the estate filing requirement in effect for a particular year. While the increase in the filing requirement from \$60,000 for decedents who died in 1976 to \$500,000 for those who died in 1986 has served to limit the scope of the estimates, the estate tax return still serves as a valuable source of information on the wealthy. From these returns, estimates of wealth can be provided for the top 1 to 2 percent of the Nation's wealthholders; that is, those individuals or "top wealthholders" who control the largest portion of the personal wealth in the United States. (The estimation technique is discussed in greater detail later.)

The estimates of personal wealth in 1986 are the result of continuing efforts by the Internal Revenue Service to improve the accuracy of the data [5]. In the past, wealth estimates, such as the preliminary estimates for 1982, were derived from the Statistics of Income sample of estate tax returns filed in a particular year [6]. Because a decedent's estate has up to 9 months to file an estate tax return and an extension of 6 months is not uncommon, returns filed in a given year can include deaths that occurred over several years. Thus, wealth estimates generated from a sample selected on a filing year basis actually reflected the value of wealth held during several years, and are therefore subject to different economic conditions based on the year of death.

The personal wealth estimates for 1986 presented here are based on estate tax returns filed from 1986 through 1988 for individuals who died in 1986 [7]. By sampling returns filed over this 3-year period, the returns filed for nearly all individuals who died in 1986 can be captured. By looking at the wealth of a single year, rather than a series of years, the estimates more accurately reflect wealth at a particular time.

As the level of gross estate (or gross assets) required for filing an estate tax return has increased, the definition of top wealthholders also has changed. The level of wealth to which these estimates apply is \$500,000 or more of gross assets. The gross estate criterion is a Federal estate tax concept of wealth that does not conform to the usual definitions of wealth, primarily because it includes the face value of life insurance in the wealth of the decedent. Therefore, three measures of wealth are used in this article: gross assets (or gross estate), total assets, and net worth.

Gross assets reflect the gross value of all assets, including the full face value of life insurance reduced by policy loans but excluding any reduction for other indebtedness [8]. This measure defines the individuals included in the top wealthholder group. The amount of total assets, a lower wealth value, is still essentially a gross measure. Total assets differs from gross assets in that the cash value of life insurance, i.e., the value of insurance immediately before the policyholder's death, replaces the "at death" value of life insurance included in gross assets [9]. Net worth, the level of wealth after all debts have been removed, also includes the cash value of life insurance.

PERSONAL WEALTH IN 1986

Female wealthholders accounted for 41.2 percent of the 3.3 million top wealthholders in 1986 (see Figure A) compared with 36.9 percent at a corresponding level in 1982. While this increase continued a recent trend, it was also due, in part, to a change in the estate tax law in 1982. This change permitted bequests to the surviving spouse of a decedent to go untaxed.

Figure A.—Top Wealthholders With Gross Assets of \$500,000 or More, by Sex, 1986

[Number of wealthholders in thousands; amounts in billions]

Item	Total	Male	Female
	(1)	(2)	(3)
Number of top wealthholders.....	3,329	1,957	1,372
Total assets.....	\$4,321	\$2,557	\$1,764
Debts and mortgages.....	554	395	160
Net worth.....	3,767	2,163	1,604
Average net worth.....	1,131	1,105	1,169

Note: Detail does not add to totals because of rounding.

Women, holding 42.6 percent of the net worth of top wealthholders, were on average wealthier and had fewer debts than their male counterparts. Their

average net worth was 6 percent higher than that of male top wealthholders. The debt burden, i.e., amounts owed as debts and mortgages, of women was only 9 percent of their total assets compared to 15.4 percent for men. In part because they had fewer debts, just 15 percent of the female top wealthholders had net worth below \$500,000, while nearly one third of the male top wealthholders had net worth below that level.

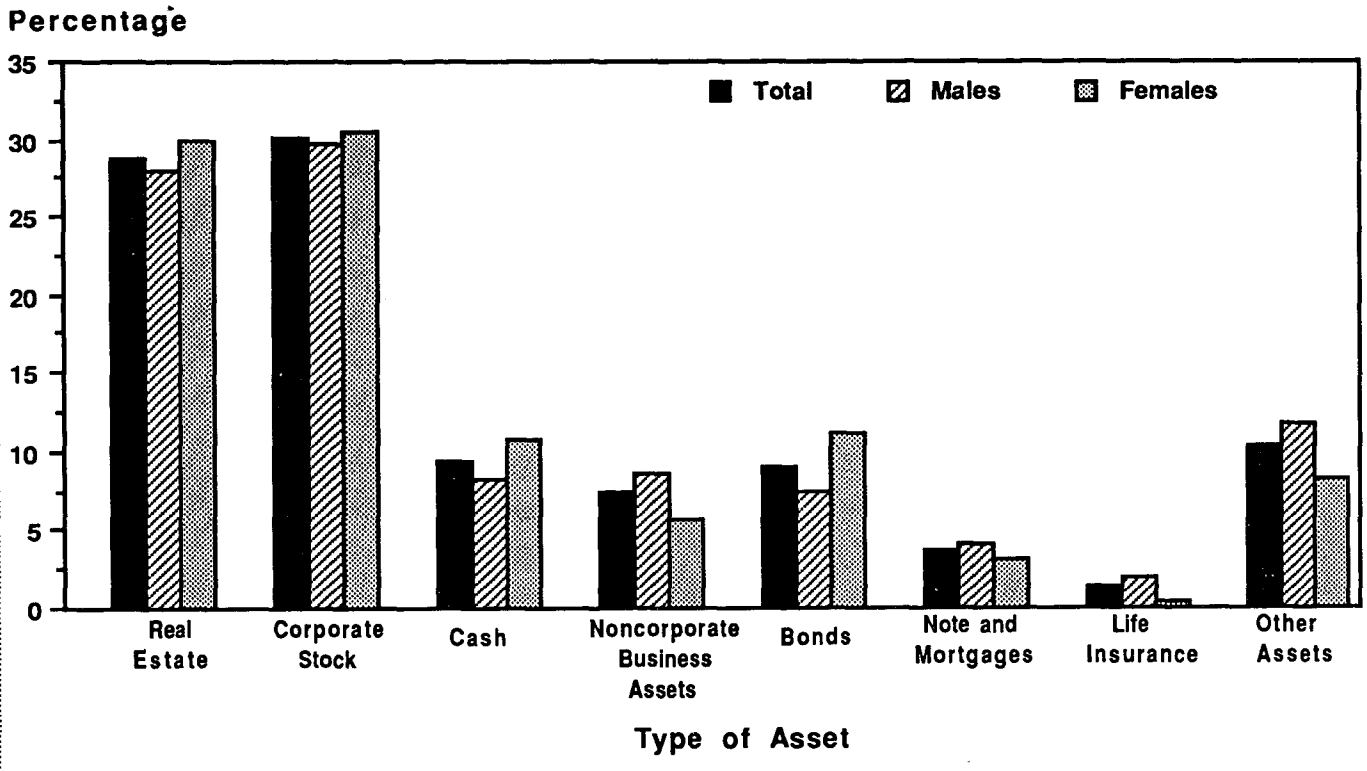
Composition of Assets

In 1986, corporate stock constituted the largest share of the assets held by top wealthholders (see Figure B). This is a departure from the portfolio mix observed in 1981 and 1982 when real estate was the predominant asset. Previous to that, corporate stock comprised the largest share of the portfolio of the wealthy. Considering the relative performance of the real estate and stock markets between 1982 and 1986, this reversal was not unexpected. The Dow Jones Industrial Average more than doubled during this period, rising 103 percent, while the Price Index of New One-Family Houses Sold rose a comparatively modest 14 percent [10, 11].

Once again, cash at 9.3 percent of the assets was the third most commonly held asset. Bonds and noncorporate business assets, however, switched positions of importance [12]. The share of assets held as bonds increased from 7 percent in 1982 to 9 percent in 1986, while noncorporate business assets remained constant at 7.5 percent. With 70 percent of the bonds held by top wealthholders consisting of State and local Government bonds, the 56 percent increase in the Standard and Poor's Municipal Bond Price index during this period provides some insight into the increase [10].

A look at the composition of assets by sex shows that the share of wealth held in the form of corporate stock was similar for men and women. Real estate, the other major asset in the portfolio of the wealthy, represented a slightly larger share of the wealth of females, 30 percent compared to 28 percent for males. Noteworthy differences in the proportion of assets held by men and women were observed for several other types of assets. Bonds made up 11.2 percent of women's assets in 1986, compared with 7.5 percent for men. Conversely, wealth held by men was characterized by a greater concentration in noncorporate business assets, nearly 9 percent, compared with only 5.7 percent for women. An examination of all other asset types shows that notes

Figure B
Top Wealthholders, by Type of Asset and Sex, 1986



and mortgages and life insurance constituted a more significant portion of the assets of men, while cash represented a greater share of the assets of women. Another noteworthy difference in the portfolios of men and women was in the share of assets held as "other assets." ("Other assets" includes intangible and depletable assets, annuities, pensions, and personal property.) Nearly 12 percent of the assets of men were classified as "other assets" compared with just 8.3 percent for women.

Although corporate stock constituted the greatest share of assets in the portfolio of top wealthholders, the proportions of wealth held as corporate stock and real estate were quite different for millionaires and "sub-millionaires," that is, those top wealthholders whose net worth was less than \$1 million (see Figure C). Corporate stock made up more than 36 percent of the assets of millionaires while just 23.6 percent of their assets were held as real estate. In contrast, real estate accounted for over 37 percent of the assets of sub-millionaires while 19.5 percent

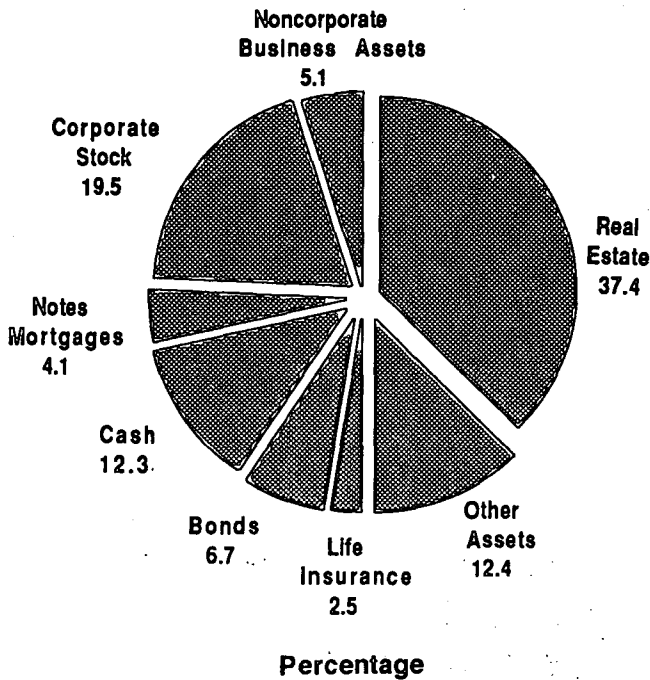
of their assets were in corporate stock. In 1982, nearly 42 percent of the assets of sub-millionaires were held as real estate.

Cash and bonds were held in quite different proportions by the two groups. Whereas cash represented more than 12 percent of the assets of the less wealthy group, they were, at 7.5 percent, a less significant asset in the portfolio of millionaires. Proportionately, millionaires held more corporate stock, bonds, and noncorporate business assets, and less real estate, cash, notes and mortgages, life insurance and "other assets," than the sub-millionaires.

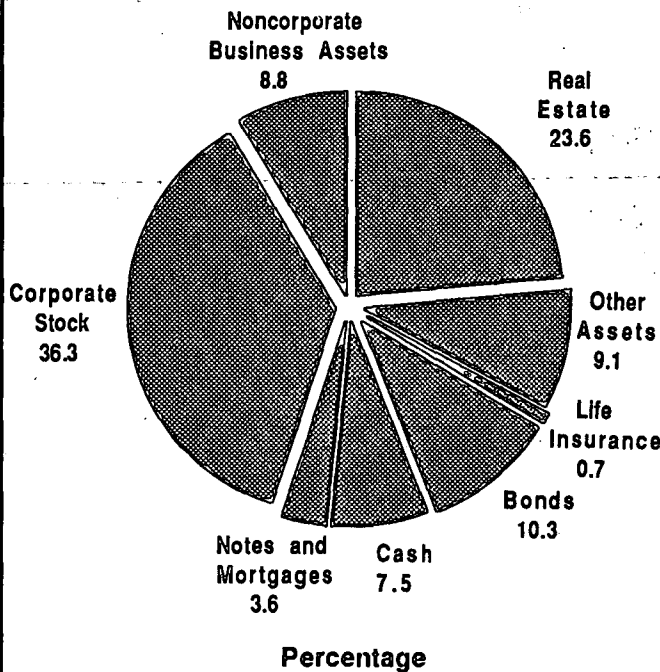
Geographic Distribution of Wealth

Estimates of personal wealth using the estate multiplier technique for a limited population, for instance, by state, are subject to high variance making it difficult to reliably estimate wealth for the extremely wealthy. Thus, the estimates by state presented

Figure C
Top Wealthholders With Net Worth Under \$1,000,000, 1986



Top Wealthholders With Net Worth \$1,000,000 or More, 1986



NOTE: Detail may not add to totals because of rounding.

here are limited to those individuals whose net worth is not in excess of \$10 million. (Only 25,000 top wealthholders were excluded from these estimates.)

In 1986, nearly 560,000 of these 3.3 million top wealthholders in the United States lived in California. New York, with 340,000, had the second highest number of top wealthholders, displacing Texas, which dropped to third. Florida with its rapid growth and attractive tax policy (no State income tax) was a close fourth behind Texas whose economy showed the effects of the decline in oil prices.

Looking at wealth on a per capita basis presents a somewhat different picture of wealth in this country by eliminating the distortions caused by the large populations of some states. For instance, Connecticut, the 25th most populous state (adults), had the highest concentration of top wealthholders, 327 per 10,000 adults [13]. This compared with the 198 top wealthholders per 10,000 adults for the Nation. California with 17 percent of the Nation's top wealthholders and 11 percent of the adult population, still had the third highest concentration of top wealthholders with 299 per 10,000. On the other hand, Pennsylvania, ranked seventh in the number of top wealthholders, had a relatively low concentration of wealthy individuals, just 134 per 10,000 adults. As shown in Figure D, wealth appears to be more heavily concentrated in the Southwest—with the exception of New Mexico—and in the Northeast.

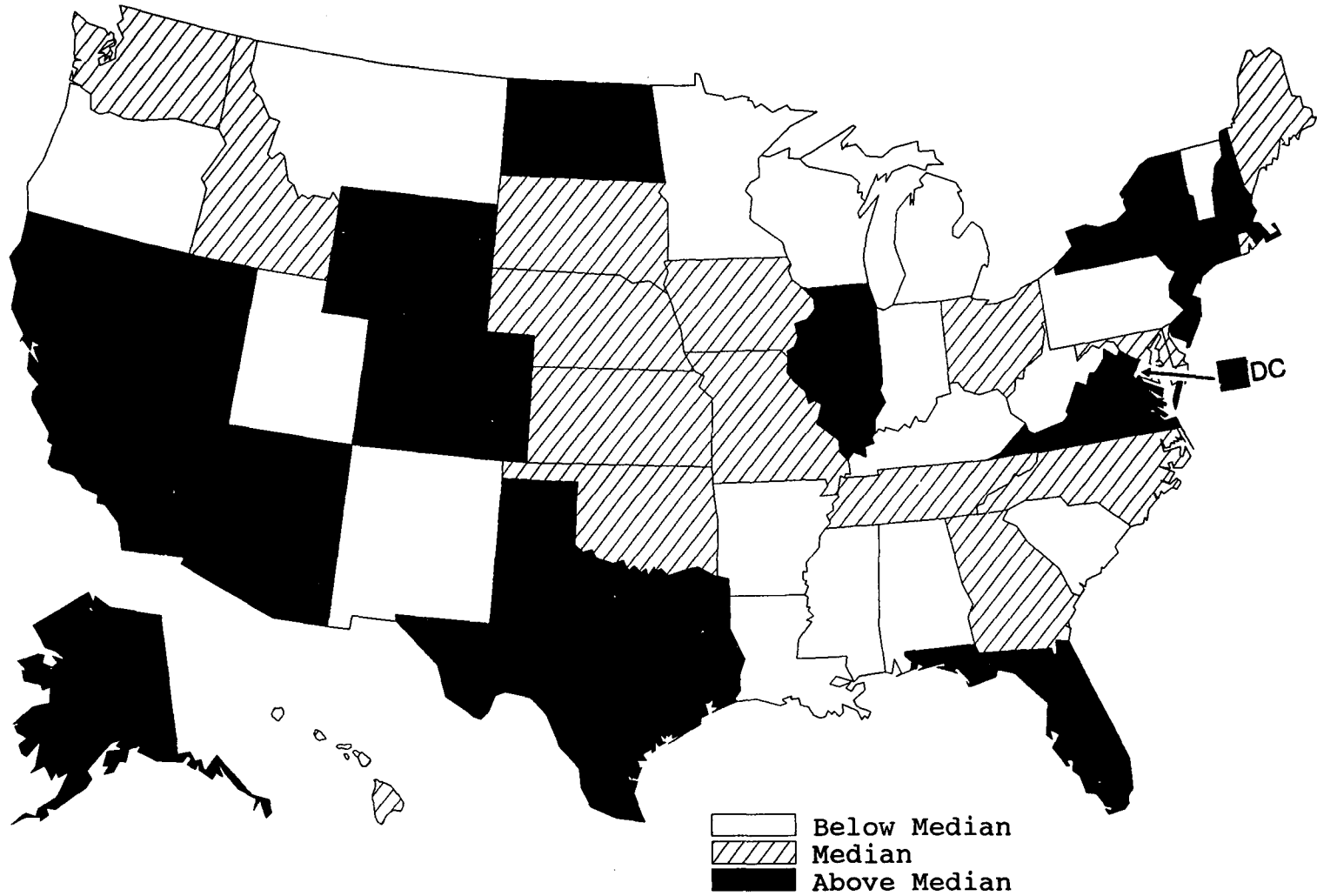
ESTATE MULTIPLIER TECHNIQUE

Researchers have been using the estate multiplier technique since the beginning of the 20th century to draw conclusions about the wealth of the living population through knowledge of the wealth of the deceased [14]. (Financial records were used as early as 1864 to estimate total personal wealth by a related technique.) The technique assumes that estate tax returns taken as a whole represent a random sample, designated by death, of the living population. Death, however, is not a truly random event and therefore is not a simple representative sample of the living population under consideration. It does, however, provide a means of producing reasonable estimates of personal wealth utilizing existing data.

The probability that a person will die in a given year depends on the particulars of one's life. Age and sex are usually taken as indicators of these conditions.

Figure D

Concentration of Top Wealthholders With Net Worth Less Than \$10,000,000, by State, 1986



NOTE: The median concentration of top wealthholders by State was 143 to 183 per 10,000 adults.

If one knows the mortality rate and the number of deaths for each age and sex group, one can approximate the population of living wealthholders [15].

Vital to the estimation of personal wealth is the use of a mortality rate appropriate to the top wealthholder population. This is essential to the estimates because there is much evidence that the wealthy have mortality rates that are lower than those of the population as a whole. In other words, social class also is a determinant in the "selection of the sample" [16]. Therefore, an adjustment to the general mortality rates is necessary.

The mortality rates assumed to approximate those of the wealthy are based on the mortality experience of the Metropolitan Life Insurance Company's preferred-risk policyholders [17]. As part of the effort to improve the accuracy of these estimates, the Internal Revenue Service developed new mortality differentials based on Metropolitan Life data for a series of years. Thus, the effect of the sampling variance of death has been reduced. Multipliers are then derived using the inverse of the adjusted mortality rates for each decedent according to age and sex. These multipliers, applied to sampled estate tax return data, produce wealth estimates for the living population.

The estimates of personal wealth for 1986 are based on a stratified sample of estate tax returns filed between 1986 and 1988 for individuals dying in 1986. This approach, first used for the updated 1982 estimates, is a departure from the filing year approach used for the preliminary 1982 estimates and for the estimates for earlier studies [3,6].

The strength of the estate multiplier technique is due, in part, to the large sample size. The 13,694 returns sampled during the 3-year period for 1986 decedents was considerably larger than the samples selected for other studies for comparable levels of wealth. Yet, despite the large overall sample size, the limited number of returns filed each year for decedents who were young (under 40 years of age) or very wealthy (gross assets of \$5 million or more) can make results for these categories subject to considerable variance.

Death's achieved sample of these relatively young and very wealthy decedents in a given year can

distort estimates of the wealth of the living. Death samples at varying rates which tend to average out over a period of years. This can result in large short-term fluctuations for a given year. When death "selects" a smaller sample, i.e., fewer deaths for a segment of the population during a sample year, wealth estimates of that segment will be lower than the true population values. Similarly, too large a sample produces estimates that overstate the wealth of the population.

In order to reduce the variability of the estimates, the sample of estate tax returns is designed so that it is stratified by age as well as by size of gross estate. All returns filed for both the very wealthy (those with gross estates of \$5 million or more) and the young (those under 40 years of age) were selected for the study. Thus, the sampling variance introduced by the IRS sample for returns of relatively young or wealthy decedents was eliminated.

The variability of the final estimates for very wealthy and relatively young individuals was further reduced by including in the sample all returns filed for non-1986 decedents during the 3-year period. These segments of the sample were then post-stratified and reweighted to represent the true 1986 decedent population. This technique reduces the affect of outliers on the estimates of the type and amount of wealth for the young and very wealthy.

Further adjustments to the estimation technique have been incorporated in a continuing effort to improve the accuracy of the estimates. The use of returns for a particular year of death filed during a 3-year period is dependent upon all or nearly all the returns being filed timely for that year, or, alternatively, an awareness of the number of missing or yet-to-be filed returns. Data for prior years have enabled us to estimate the number of unfiled returns for 1986 decedents. This adjustment proved to be age dependent since the likelihood of the return being filed timely increases with the decedent's age.

Basing the estimates on returns for a single year of death eliminated much of the distortion of inflation on the estimates. However, the problem was not entirely eliminated due to the use of all returns for the young and wealthy decedents regardless of the year of death. Money amounts for these individuals were converted to 1986 dollars to further reduce the effects of inflation on the estimates.

SUMMARY

For 1986, approximately 3.3 million people--1.6 percent of the adult population of the United States--held gross assets of \$500,000 or more. The net worth of these individuals was nearly \$3.8 trillion and accounted for almost 28.5 percent of the personal wealth in this country.

Wealthy women, although still the minority of top wealthholders, nevertheless increased their representation from just under 37 percent in 1982 to 41.2 percent in 1986. Their average net worth, \$1,169,000 was 6 percent higher than that of male top wealthholders.

Corporate stock constituted the largest share of the assets held by top wealthholders. Real estate, the predominant asset in the portfolio of the wealthy in 1982, comprised the next largest share of the assets. Together they represented nearly 59 percent of the assets of top wealthholders.

DATA SOURCES AND LIMITATIONS

Sample Selection Criteria

The 1986 estimates of personal wealth are based on data from a sample of estate tax returns, Form 706, processed by the Internal Revenue Service between 1986 and 1988. The sample was stratified according to the year of death and age of the decedent, along with the size of the gross estate. The returns were selected during the 3-year period at annual rates that ranged from 7 percent to 100 percent with weights appropriate to each year maintained.

Of the returns filed during the 1986-1988 period, only those filed for individuals dying in 1986 were selected, with two exceptions. All returns for the very wealthy (those with gross estates of \$5 million or more) and individuals under 40 years of age were selected, regardless of the year of death. The estate sample weights for those returns were adjusted accordingly. Other returns filed during this period for individuals who died in years other than 1986 were not used for these estimates.

Limitations

Because the data in this article are estimated on the basis of a sample of estate tax returns filed with the Internal Revenue Service, they are subject to

sampling as well as nonsampling error. For proper use of the statistical data, the magnitude of the potential sampling error should be considered. Estimates of the coefficients of variation (CV's) for frequency estimates can be obtained by writing the authors at the Internal Revenue Service, Statistics of Income Division R:S:F, P.O. Box 2608, Washington, DC 20013-2608.

Estimates of personal wealth using the estate multiplier technique are subject to further limitations. Since the data are obtained prior to audit, the possibility exists of some understatement of the value of certain assets. This and other issues concerning the accuracy of these estimates are discussed by Scheuren and McCubbin in an earlier publication [5].

NOTES AND REFERENCES

- [1] U.S. Bureau of the Census, *Current Population Reports*, Series P-25, Number 1045, United States Population Estimates, by Age, Sex, Race, and Hispanic Origin: 1980 to 1988. While the onset of adulthood is more commonly considered to be 18 or 21 years of age, it is defined here as 20 years of age because of the available mortality data used to develop these estimates.
- [2] Information on the wealth of the U. S. population is derived from the 1986 Survey of Consumer Finances sponsored by the Federal Reserve Board. See Avery, Robert B. and Kennickell, Arthur B., "Household Saving in the U. S.," *Review of Income and Wealth* (forthcoming).
- [3] Schwartz, Marvin, "Estimates of Personal Wealth, 1982: A Second Look," *Statistics of Income Bulletin*, Spring 1988, Volume 7, Number 4, 1988.
- [4] Scheuren, Fritz, and McCubbin, Janet, "Piecing Together Personal Wealth Distributions," *Statistics of Income and Related Administrative Record Research: 1986-1987*, U.S. Department of the Treasury, Internal Revenue Service, 1987.
- [5] McCubbin, Janet, "Improving Wealth Estimates Derived from Estate Tax Data," *Statistics of Income and Related Administrative Record Research: 1986-1987*, U.S. Department of the Treasury, Internal Revenue Service, 1987.

ment of the Treasury, Internal Revenue Service, 1987.

- [6] Schwartz, Marvin, "Preliminary Estimates of Personal Wealth, 1982: Composition of Assets," *Statistics of Income Bulletin*, Winter 1984-1985, Volume 4, Number 3, 1985.
- [7] Johnson, Barry W., "1986-1988 Estate Tax Returns," *Statistics of Income Bulletin*, Spring 1990, Volume 9, Number 4.
- [8] Post-mortem dividends and interest are included in the value of the life insurance reported on estate tax returns.
- [9] For a detailed explanation of the estate multiplier technique and the computation of the equity value of life insurance, see *Statistics of Income--1972, Personal Wealth Estimated from Estate Tax Returns*, U.S. Department of the Treasury, Internal Revenue Service, 1976.
- [10] U.S. Department of Commerce, Bureau of Economic Analysis, *Survey of Current Business*, various issues.
- [11] U.S. Bureau of the Census, Construction Reports, Series C-27, Price Index of New One-Family Houses Sold, First Quarter 1990.
- [12] Noncorporate business assets include the net value of sole proprietorships, farms, and interests in partnerships, except for the value of the real estate associated with the business or farm.
- [13] Population estimates by state for 1986 were obtained from the U.S. Bureau of the Census, *Current Population Reports*, Series P-25, Number 1058, State Population and Household Estimates: July 1, 1989. Adults are defined for purposes of this discussion as individuals 21 years of age or over because of the availability of the data.
- [14] Lampman, Robert J., *The Share of Top Wealthholders in National Wealth, 1922-56*, Princeton University Press, 1962.
- [15] Smith, James, and Calvert, Staunton, "Estimating the Wealth of Top Wealthholders from Estate Tax Returns," 1965 *American Statistical Association Proceedings, Section on Business and Economics Statistics*.
- [16] Kitagawa, Evelyn M., and Hauser, Philip M., *Differential Mortality in the United States: A Study in Socioeconomic Epidemiology*, Harvard University Press, 1973.
- [17] The authors are extremely grateful for the continued support received from the Metropolitan Life Insurance Company, beginning with the late Mortimer Spiegelman and continuing most recently with Frances Baffa, who provided the mortality data used in the computation of the estate multipliers.

Table 1.—All Top Wealthholders with Gross Assets of \$500,000 or More, by Size of Net Worth

[All figures are estimates based on estate tax return samples—numbers are in thousands; money amounts are in millions of dollars]

Size of net worth	Total assets		Debts and mortgages		Net worth		Total assets by type	
	Number	Amount	Number	Amount	Number	Amount	Real estate	
							Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total	3,329.4	4,321,202	2,943.7	554,496	3,329.4	3,766,706	3,041.6	1,241,884
Under \$250,000 ¹	291.2	118,635	282.3	112,174	291.2	6,460	265.9	58,597
\$250,000 under \$500,000	548.9	306,901	510.6	87,731	548.9	219,171	519.0	141,585
\$500,000 under \$1,000,000	1,548.3	1,182,818	1,304.7	116,277	1,548.3	1,066,541	1,390.4	401,352
\$1,000,000 under \$2,500,000	710.0	1,148,848	633.0	98,132	710.0	1,050,716	651.4	335,571
\$2,500,000 under \$5,000,000	150.3	574,279	138.0	61,063	150.3	513,217	138.1	137,255
\$5,000,000 under \$10,000,000	55.5	412,160	51.2	38,314	55.5	373,847	52.6	89,086
\$10,000,000 or more	25.0	577,561	23.9	40,805	25.0	536,756	24.1	78,438

Size of net worth	Total assets by type (continued)							
	Corporate stock		Cash		Noncorporate business assets		Bonds	
	Total		Total		Total		Total	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
Total	2,692.4	1,299,492	3,248.5	401,968	1,299.5	322,595	1,657.9	387,803
Under \$250,000 ¹	165.1	11,242	269.2	6,823	101.5	11,648	44.7	1,306
\$250,000 under \$500,000	415.4	43,431	532.8	28,956	218.2	16,230	173.3	7,308
\$500,000 under \$1,000,000	1,268.1	258,942	1,523.3	162,632	510.6	54,944	848.5	99,258
\$1,000,000 under \$2,500,000	627.0	319,063	695.6	110,357	329.1	87,610	440.0	117,789
\$2,500,000 under \$5,000,000	140.0	210,520	147.7	40,454	87.2	49,164	94.0	58,542
\$5,000,000 under \$10,000,000	52.4	170,314	55.1	23,376	34.8	39,543	37.6	48,638
\$10,000,000 or more	24.5	285,979	24.9	29,370	18.0	63,457	19.8	54,962

Size of net worth	Total assets by type (continued)							
	Bonds (continued)							
	State and local Government bonds		Corporate and foreign bonds		Federal savings bonds		Other Federal bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
Total	1,173.3	269,919	554.2	31,009	360.6	8,532	508.8	78,344
Under \$250,000 ¹	20.1	1,137	9.8	84	18.7	31	*3.6	*54
\$250,000 under \$500,000	95.1	4,812	40.8	872	60.3	426	35.1	1,198
\$500,000 under \$1,000,000	577.5	59,864	301.7	10,815	194.0	5,028	288.2	23,551
\$1,000,000 under \$2,500,000	347.6	83,557	152.1	9,522	72.2	2,238	136.0	22,473
\$2,500,000 under \$5,000,000	83.2	46,629	29.3	3,218	10.0	607	27.2	8,088
\$5,000,000 under \$10,000,000	32.6	36,825	12.2	3,384	4.0	105	12.2	8,324
\$10,000,000 or more	17.3	37,095	8.3	3,114	1.5	98	6.5	14,656

Size of net worth	Total assets by type (continued)					
	Mortgages and notes		Life insurance equity		Other assets	
	Number	Amount	Number	Amount	Number	Amount
	(25)	(26)	(27)	(28)	(29)	(30)
Total	1,151.6	163,124	2,360.8	59,550	3,222.8	444,786
Under \$250,000 ¹	66.2	4,655	278.8	10,161	281.7	14,203
\$250,000 under \$500,000	154.6	14,515	479.1	11,320	539.9	43,556
\$500,000 under \$1,000,000	524.0	46,252	997.1	18,272	1,485.7	141,165
\$1,000,000 under \$2,500,000	288.5	44,624	449.1	11,864	690.0	121,970
\$2,500,000 under \$5,000,000	74.5	19,804	103.5	4,705	146.4	53,836
\$5,000,000 under \$10,000,000	26.5	10,407	36.5	1,800	54.3	28,997
\$10,000,000 or more	17.3	22,866	16.7	1,428	24.8	41,059

¹ Includes top wealthholders with negative net worth.

* Estimate should be used with caution because of the small number of sampled estate tax returns on which it is based.

Note: Detail may not add to totals because of rounding.

Table 2.—All Male: Top Wealthholders with Gross Assets of \$500,000 or More, by Size of Net Worth.

[All figures are estimates based on estate tax return samples—number are in thousands; money amounts are in millions of dollars]

Size of net worth	Total assets		Debts and mortgages		Net worth		Total assets by type	
	Number	Amount	Number	Amount	Number	Amount	Real estate	
							Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total	1,957.4	2,557,384	1,743.2	394,671	1,957.4	2,162,692	1,803.1	714,752
Under \$250,000 ¹	248.6	103,475	242.3	102,698	248.6	777	227.7	49,697
\$250,000 under \$500,000	389.1	211,403	362.0	58,855	389.1	152,548	367.1	90,268
\$500,000 under \$1,000,000	789.0	618,115	663.1	74,139	789.0	543,976	714.8	199,938
\$1,000,000 under \$2,500,000	389.2	642,995	345.4	63,433	389.2	579,562	361.1	183,205
\$2,500,000 under \$5,000,000	93.0	356,532	84.7	38,191	93.0	318,340	86.2	81,026
\$5,000,000 under \$10,000,000	32.2	242,260	30.0	25,334	32.2	216,925	30.6	51,404
\$10,000,000 or more	16.4	382,584	15.7	32,021	16.4	350,564	15.6	59,214

Size of net worth	Total assets by type (continued)							
	Corporate stock		Cash		Noncorporate business assets		Bonds	
	Number	Amount	Number	Amount	Number	Amount	Total bonds	
Number							Amount	
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
Total	1,579.4	759,511	1,904.6	212,108	869.7	222,672	878.1	190,530
Under \$250,000 ¹	143.8	10,385	228.8	5,652	91.0	10,969	42.1	1,233
\$250,000 under \$500,000	298.9	30,853	379.4	19,534	159.7	12,945	129.9	5,367
\$500,000 under \$1,000,000	656.9	140,596	775.9	71,882	323.3	34,945	392.2	41,886
\$1,000,000 under \$2,500,000	346.0	182,374	380.3	55,302	200.2	49,265	222.0	54,627
\$2,500,000 under \$5,000,000	87.3	124,944	92.0	25,760	60.2	37,898	57.1	30,063
\$5,000,000 under \$10,000,000	30.3	96,316	31.9	14,308	22.5	28,882	21.9	24,387
\$10,000,000 or more	16.1	174,044	16.2	19,670	12.8	47,766	13.0	32,967

Size of net worth	Total assets by type (continued)							
	Bonds (continued)							
	State and local bonds		Corporate and foreign bonds		Federal savings bonds		Other Federal bonds	
Number	Amount	Number	Amount	Number	Amount	Number	Amount	
								(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
Total	604.8	134,004	279.5	16,232	214.9	3,716	232.4	36,578
Under \$250,000 ¹	**	**	**	**	**	**	**	**
\$250,000 under \$500,000	**86.6	**4,575	**39.2	**781	**64.5	**289	**28.3	**955
\$500,000 under \$1,000,000	267.2	27,197	134.6	4,223	99.2	1,793	116.6	8,673
\$1,000,000 under \$2,500,000	173.1	39,300	73.9	5,152	38.9	1,239	61.0	8,937
\$2,500,000 under \$5,000,000	48.1	23,565	18.8	1,919	8.0	255	15.6	4,324
\$5,000,000 under \$10,000,000	19.0	17,631	7.8	2,547	3.0	60	6.6	4,149
\$10,000,000 or more	10.8	21,737	5.2	1,610	1.2	80	4.4	9,540

Size of net worth	Total assets by type (continued)					
	Mortgages and notes		Life insurance equity		Other assets	
	Number	Amount	Number	Amount	Number	Amount
(25)							(26)	(27)	(28)	(29)	(30)
Total	691.4	106,403	1,670.0	52,277	1,900.2	299,111
Under \$250,000 ¹	58.7	4,066	239.5	9,283	239.0	12,190
\$250,000 under \$500,000	107.6	8,862	357.2	10,067	383.4	33,507
\$500,000 under \$1,000,000	280.8	25,951	636.6	15,387	762.0	87,531
\$1,000,000 under \$2,500,000	164.9	27,815	317.9	10,443	377.5	79,964
\$2,500,000 under \$5,000,000	50.1	15,334	79.0	4,222	90.8	37,284
\$5,000,000 under \$10,000,000	17.6	7,445	26.2	1,540	31.2	17,978
\$10,000,000 or more	11.7	16,931	13.5	1,335	16.3	30,658

¹ Includes top wealthholders with negative net worth.

* Data combined with those for next size class to avoid disclosure of information for specific estate tax returns.

Note: Detail may not add to totals because of rounding.

Table 3.—All Female: Top Wealthholders with Gross Assets of \$500,000 or More, by Size of Net Worth

[All figures are estimates based on estate tax return samples—number are in thousands; money amounts are in millions of dollars]

Size of net worth	Total assets		Debts and mortgages		Net worth		Total assets by type	
	Number	Amount	Number	Amount	Number	Amount	Real estate	
							Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total	1,372.0	1,763,838	1,200.5	159,824	1,372.0	1,604,014	1,238.4	527,132
Under \$250,000 ¹	42.7	15,159	40.0	9,476	42.7	5,683	38.3	8,900
\$250,000 under \$500,000	159.8	95,499	148.7	28,875	159.8	66,623	151.8	51,317
\$500,000 under \$1,000,000	759.3	564,703	641.6	42,138	759.3	522,565	675.6	201,414
\$1,000,000 under \$2,500,000	320.9	505,853	287.6	34,700	320.9	471,153	290.3	152,366
\$2,500,000 under \$5,000,000	57.3	217,748	53.3	22,872	57.3	194,876	51.9	56,228
\$5,000,000 under \$10,000,000	23.3	169,900	21.1	12,979	23.3	156,921	22.0	37,682
\$10,000,000 or more	8.7	194,976	8.2	8,784	8.7	186,192	8.5	19,224

Size of net worth	Total assets by type (continued)							
	Corporate stock		Cash		Noncorporate business assets		Bonds	
	Number	Amount	Number	Amount	Number	Amount	Total bonds	
Number							Amount	
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
Total	1,113.0	539,981	1,343.8	189,860	429.8	99,923	779.8	197,273
Under \$250,000 ¹	21.3	857	40.3	1,172	10.5	678	*2.6	*73
\$250,000 under \$500,000	116.4	12,578	153.3	9,421	58.6	3,285	43.4	1,941
\$500,000 under \$1,000,000	611.2	118,347	747.3	90,751	187.3	19,998	456.3	57,372
\$1,000,000 under \$2,500,000	280.9	136,689	315.3	55,055	128.9	38,345	218.1	63,163
\$2,500,000 under \$5,000,000	52.7	85,577	55.7	14,693	27.0	11,266	36.9	28,479
\$5,000,000 under \$10,000,000	22.1	73,998	23.2	9,068	12.3	10,660	15.7	24,251
\$10,000,000 or more	8.4	111,936	8.6	9,700	5.3	15,691	6.8	21,995

Size of net worth	Total assets by type (continued)							
	Bonds (continued)							
	State and local bonds		Corporate and foreign bonds		Federal savings bonds		Other Federal bonds	
Number	Amount	Number	Amount	Number	Amount	Number	Amount	
								Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
Total	568.5	135,915	274.7	14,777	145.8	4,816	276.4	41,768
Under \$250,000 ¹	**	**	**	**	**	**	**	**
\$250,000 under \$500,000	**28.6	**1,374	**11.4	**176	**14.5	**168	**10.3	**296
\$500,000 under \$1,000,000	310.3	32,667	167.1	6,592	94.8	3,234	171.7	14,879
\$1,000,000 under \$2,500,000	174.5	44,258	78.2	4,370	33.3	999	75.0	13,536
\$2,500,000 under \$5,000,000	35.1	23,064	10.5	1,298	2.0	351	11.7	3,765
\$5,000,000 under \$10,000,000	13.6	19,194	4.4	838	1.0	45	5.6	4,174
\$10,000,000 or more	6.5	15,358	3.1	1,503	0.3	17	2.1	5,117

Size of net worth	Total assets by type (continued)					
	Mortgages and notes		Life insurance equity		Other assets	
	Number	Amount	Number	Amount	Number	Amount
Number							Amount
	(25)	(26)	(27)	(28)	(29)	(30)
Total	460.2	56,721	690.9	7,273	1,322.6	145,874
Under \$250,000 ¹	7.5	589	39.3	877	42.7	2,013
\$250,000 under \$500,000	47.1	5,653	121.9	1,254	156.5	10,049
\$500,000 under \$1,000,000	243.2	20,301	360.5	2,886	723.7	53,634
\$1,000,000 under \$2,500,000	123.5	16,809	131.2	1,421	312.5	42,005
\$2,500,000 under \$5,000,000	24.4	4,471	24.5	483	55.7	16,552
\$5,000,000 under \$10,000,000	8.9	2,962	10.3	260	23.1	11,019
\$10,000,000 or more	5.6	5,936	3.2	94	8.6	10,402

¹ Includes top wealthholders with negative net worth.

* Estimate should be used with caution because of the small number of sampled estate tax returns on which it is based.

** Data combined with those for next size class to avoid disclosure of information for specific estate tax returns.

Note: Detail may not add to totals because of rounding.

Table 4.—Top Wealthholders Under 50 Years of Age With Gross Assets of \$500,000 or More, by Size of Net Worth

[All figures are estimates based on estate tax return samples—number are in thousands; money amounts are in millions of dollars]

Size of net worth	Total assets		Debts and mortgages		Net worth		Total assets by type	
	Number	Amount	Number	Amount	Number	Amount	Real estate	
							Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total	1,174.7	1,376,584	1,104.4	293,889	1,174.7	1,082,696	1,073.4	425,013
Under \$250,000 ¹	239.5	83,185	232.3	76,746	239.5	6,439	215.9	42,356
\$250,000 under \$500,000	297.8	170,521	280.0	56,203	297.8	114,318	282.1	83,012
\$500,000 under \$1,000,000	373.9	309,408	340.9	53,907	373.9	255,502	333.5	112,466
\$1,000,000 under \$2,500,000	197.8	339,845	189.0	45,289	197.8	294,556	179.8	98,511
\$2,500,000 under \$5,000,000	38.4	162,126	36.4	29,845	38.4	132,281	35.2	37,355
\$5,000,000 under \$10,000,000	18.6	141,461	17.3	16,537	18.6	124,924	18.2	28,768
\$10,000,000 or more	8.6	170,038	8.4	15,361	8.6	154,676	8.6	22,545

Size of net worth	Total assets by type (continued)							
	Corporate stock		Cash		Noncorporate business assets		Bonds	
	Total bonds							
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
Total	898.4	424,892	1,130.1	105,764	515.4	135,843	412.7	68,597
Under \$250,000 ¹	131.8	7,806	219.5	5,098	75.3	7,343	34.8	612
\$250,000 under \$500,000	227.6	24,309	286.0	15,023	126.6	10,152	83.2	3,204
\$500,000 under \$1,000,000	303.3	72,278	370.2	30,241	160.3	21,116	157.0	15,191
\$1,000,000 under \$2,500,000	174.7	92,380	190.0	27,718	112.5	42,474	105.1	24,605
\$2,500,000 under \$5,000,000	34.9	69,131	37.1	9,412	22.0	19,877	15.4	6,445
\$5,000,000 under \$10,000,000	17.3	65,389	18.6	6,179	12.1	14,692	10.3	13,185
\$10,000,000 or more	8.6	93,599	8.6	12,094	6.7	20,188	6.9	5,355

Size of net worth	Total assets by type (continued)							
	Bonds (continued)							
	State and local bonds		Corporate and foreign bonds		Federal savings bonds		Other Federal bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
Total	262.5	47,478	121.7	7,275	100.0	713	100.8	13,130
Under \$250,000 ¹	**	**	**	**	**	**	**	**
\$250,000 under \$500,000	**56.8	**2,476	**28.2	**595	**43.3	**163	**17.7	**581
\$500,000 under \$1,000,000	106.6	9,356	54.2	2,546	36.3	271	47.7	3,018
\$1,000,000 under \$2,500,000	71.5	15,922	31.4	3,542	17.1	175	28.8	4,966
\$2,500,000 under \$5,000,000	12.4	4,965	13.0	158	1.6	98	2.8	1,224
\$5,000,000 under \$10,000,000	**15.2	**14,759	**4.8	**434	**1.7	**5	**3.9	**3,341
\$10,000,000 or more	**	**	**	**	**	**	**	**

Size of net worth	Total assets by type (continued)					
	Mortgages and notes		Life insurance equity		Other assets	
	Number	Amount	Number	Amount	Number	Amount
	(25)	(26)	(27)	(28)	(29)	(30)
Total	363.9	48,587	941.7	19,330	1,145.9	148,559
Under \$250,000 ¹	47.1	2,320	232.3	7,267	233.0	10,383
\$250,000 under \$500,000	80.2	7,116	257.9	4,539	294.5	23,166
\$500,000 under \$1,000,000	122.8	10,599	269.5	3,688	362.7	43,830
\$1,000,000 under \$2,500,000	79.5	12,770	133.8	2,149	191.7	39,237
\$2,500,000 under \$5,000,000	19.3	4,785	29.1	983	37.2	14,139
\$5,000,000 under \$10,000,000	8.2	2,635	13.0	409	18.2	10,204
\$10,000,000 or more	6.7	8,363	6.1	294	8.6	7,600

¹ Includes top wealthholders with negative net worth.
 * Estimate should be used with caution because of the small number of sampled estate tax returns on which it is based.
 ** Data combined with those for next size class to avoid disclosure of information for specific estate tax returns.
 Note: Detail may not add to totals because of rounding.

Table 5.—Top Wealthholders 50 under 65 Years of Age With Gross Assets of \$500,000 or More, by Size of Net Worth

[All figures are estimates based on estate tax return samples—number are in thousands; money amounts are in millions of dollars]

Size of net worth	Total assets		Debts and mortgages		Net worth		Total assets by type	
	Number	Amount	Number	Amount	Number	Amount	Real estate	
							Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total	1,195.8	1,580,264	1,040.2	202,956	1,195.8	1,377,307	1,135.8	498,997
Under \$250,000 ¹	50.0	33,012	48.3	32,449	50.0	563	48.4	15,461
\$250,000 under \$500,000	207.0	111,897	189.5	27,743	207.0	84,154	198.1	49,440
\$500,000 under \$1,000,000	588.2	454,650	490.3	48,874	588.2	405,776	556.4	171,869
\$1,000,000 under \$2,500,000	265.4	433,632	233.3	39,471	265.4	394,161	251.8	136,654
\$2,500,000 under \$5,000,000	58.1	220,596	53.3	22,177	58.1	198,419	55.4	60,237
\$5,000,000 under \$10,000,000	19.3	147,370	17.9	16,543	19.3	130,827	18.2	36,450
\$10,000,000 or more	7.9	179,106	7.6	15,699	7.9	163,407	7.5	28,886

Size of net worth	Total assets by type (continued)							
	Corporate stock		Cash		Noncorporate business assets		Bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
Total	984.1	422,070	1,171.5	128,032	513.1	120,824	571.2	112,196
Under \$250,000 ¹	32.0	3,163	47.9	1,610	24.7	3,945	8.8	544
\$250,000 under \$500,000	154.3	14,657	204.3	10,441	76.8	5,139	64.7	2,474
\$500,000 under \$1,000,000	485.0	86,528	573.7	49,217	218.2	22,755	298.5	27,941
\$1,000,000 under \$2,500,000	233.0	117,179	261.6	36,071	135.7	31,959	146.0	32,561
\$2,500,000 under \$5,000,000	53.8	69,380	57.1	14,799	38.5	18,404	35.3	19,310
\$5,000,000 under \$10,000,000	18.4	55,509	19.0	8,853	13.2	16,627	12.4	13,645
\$10,000,000 or more	7.7	75,653	7.8	7,041	6.1	21,995	5.5	15,721

Size of net worth	Bonds (continued)							
	State and local bonds		Corporate and foreign bonds		Federal savings bonds		Other Federal bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
Total	416.6	75,801	177.0	11,161	117.3	1,600	156.1	23,634
Under \$250,000 ¹ .....	..	..	..	..	..	..	..	..
\$250,000 under \$500,000	**43.7	**2,164	**14.4	**274	**28.3	**200	**12.7	**380
\$500,000 under \$1,000,000	207.5	18,046	99.2	2,881	64.0	951	90.7	6,063
\$1,000,000 under \$2,500,000	119.6	24,407	45.8	2,485	20.5	372	36.1	5,297
\$2,500,000 under \$5,000,000	31.2	15,027	10.7	1,845	3.2	50	10.0	2,389
\$5,000,000 under \$10,000,000	**14.5	**16,157	**7.0	**3,676	**1.3	**28	**6.6	**9,505
\$10,000,000 or more .....	..	..	..	..	..	..	..	..

Size of net worth	Total assets by type (continued)					
	Mortgages and notes		Life insurance equity		Other assets	
	Number	Amount	Number	Amount	Number	Amount
	(25)	(26)	(27)	(28)	(29)	(30)
Total	429.6	64,349	902.0	27,573	1,166.5	206,223
Under \$250,000 ¹	18.0	1,961	45.1	2,832	47.0	3,497
\$250,000 under \$500,000	56.2	5,681	189.7	5,874	203.0	18,189
\$500,000 under \$1,000,000	198.1	19,510	416.8	9,217	571.8	67,613
\$1,000,000 under \$2,500,000	112.3	16,658	188.0	6,012	260.6	56,538
\$2,500,000 under \$5,000,000	29.2	8,581	42.4	2,227	57.3	27,658
\$5,000,000 under \$10,000,000	10.4	4,215	14.3	749	19.0	11,323
\$10,000,000 or more	5.4	7,743	5.8	663	7.9	21,404

¹ Includes top wealthholders with negative net worth.
 **Data combined with those for next size class to avoid disclosure of information for specific estate tax returns.
 Note: Detail may not add to totals because of rounding.

Table 6.—Top Wealthholders 65 Years of Age or Older With Gross Assets of \$500,000 or More, by Size of Net Worth

[All figures are estimates based on estate tax return samples—number are in thousands; money amounts are in millions of dollars]

Size of net worth	Total assets		Debts and mortgages		Net worth		Total assets by type	
	Number	Amount	Number	Amount	Number	Amount	Real estate	
							Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total	958.8	1,364,354	799.1	57,651	958.8	1,306,703	832.4	317,874
Under \$250,000 ¹	1.7	2,437	1.7	2,979	1.7	-542	1.7	780
\$250,000 under \$500,000	44.2	24,483	41.2	3,785	44.2	20,698	38.8	9,133
\$500,000 under \$1,000,000	586.2	418,759	473.4	13,496	586.2	405,263	500.5	117,016
\$1,000,000 under \$2,500,000	246.8	375,371	210.7	13,372	246.8	361,999	219.8	100,407
\$2,500,000 under \$5,000,000	53.8	191,557	48.3	9,041	53.8	182,516	47.6	39,662
\$5,000,000 under \$10,000,000	17.6	123,329	15.9	5,233	17.6	118,096	16.1	23,868
\$10,000,000 or more	8.5	228,417	7.8	9,744	8.5	218,673	7.9	27,008

Size of net worth	Total assets by type (continued)							
	Corporate stock		Cash		Noncorporate business assets		Bonds	
	Number	Amount	Number	Amount	Number	Amount	Total bonds	
Number							Amount	
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
Total	809.9	452,530	946.9	168,172	270.9	65,928	674.0	207,010
Under \$250,000 ¹	1.3	273	1.7	116	1.5	360	*1.1	*151
\$250,000 under \$500,000	33.4	4,465	42.5	3,492	14.8	939	25.4	1,630
\$500,000 under \$1,000,000	479.8	100,136	579.4	83,175	132.1	11,072	392.9	56,126
\$1,000,000 under \$2,500,000	219.2	109,504	244.0	46,568	80.9	13,177	189.0	60,623
\$2,500,000 under \$5,000,000	51.2	72,009	53.5	16,243	26.8	10,883	43.2	32,787
\$5,000,000 under \$10,000,000	16.7	49,416	17.4	8,343	9.5	8,224	15.0	21,808
\$10,000,000 or more	8.2	116,727	8.4	10,235	5.3	21,273	7.4	33,887

Size of net worth	Total assets by type (continued)							
	Bonds (continued)							
	State and local bonds		Corporate and foreign bonds		Federal savings bonds		Other Federal bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
Total	494.2	146,639	255.5	12,573	143.3	6,219	251.9	41,579
Under \$250,000 ¹	**	**	**	**	**	**	**	**
\$250,000 under \$500,000	**14.7	**1,309	**8.1	**87	**7.5	**94	**8.2	**290
\$500,000 under \$1,000,000	263.4	32,462	148.2	5,388	93.6	3,806	149.8	14,470
\$1,000,000 under \$2,500,000	156.4	43,228	74.9	3,495	34.6	1,691	71.1	12,209
\$2,500,000 under \$5,000,000	39.6	26,637	15.6	1,214	5.1	459	14.5	4,476
\$5,000,000 under \$10,000,000	**20.1	**43,004	**8.7	**2,388	**2.5	**169	**8.2	**10,134
\$10,000,000 or more	**	**	**	**	**	**	**	**

Size of net worth	Total assets by type (continued)					
	Mortgages and notes		Life insurance equity		Other assets	
	Number	Amount	Number	Amount	Number	Amount
	(25)	(26)	(27)	(28)	(29)	(30)
Total	358.1	50,188	517.1	12,647	910.4	90,004
Under \$250,000 ¹	1.2	375	1.4	61	1.7	322
\$250,000 under \$500,000	18.2	1,717	31.5	907	42.4	2,201
\$500,000 under \$1,000,000	203.1	16,144	310.8	5,368	551.2	29,723
\$1,000,000 under \$2,500,000	96.7	15,195	127.3	3,703	237.7	26,194
\$2,500,000 under \$5,000,000	25.9	6,439	32.1	1,495	51.9	12,039
\$5,000,000 under \$10,000,000	7.9	3,558	9.2	642	17.1	7,470
\$10,000,000 or more	5.1	6,761	4.8	471	8.3	12,055

¹ Includes top wealthholders with negative net worth.

* Estimate should be used with caution because of the small number of sampled estate tax returns on which it is based.

** Data combined with those for next size class to avoid disclosure of information for specific estate tax returns.

Note: Detail may not add to totals because of rounding.

Table 7.—Top Wealthholders With Net Worth Under \$10,000,000 and Gross Assets of \$500,000 or More: Total and Selected Assets, Debts and Mortgages, and Net Worth, by State of Residence

[All figures are estimates based on estate tax return samples—number are in thousands; money amounts are in millions of dollars]

State of residence	Total assets		Debts and mortgages		Net worth	
	Number	Amount	Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)
Total	3,304.3	3,743,641	2,919.8	513,691	3,304.3	3,229,951
Alabama.....	39.0	40,469	34.5	3,585	39.0	36,884
Alaska.....	8.8	10,409	8.4	2,300	8.8	8,110
Arizona.....	52.9	60,649	47.6	9,662	52.9	50,988
Arkansas.....	16.7	18,753	15.5	3,596	16.7	15,157
California.....	558.3	701,235	506.4	107,717	558.3	593,518
Colorado.....	52.6	48,355	46.6	7,166	52.6	41,189
Connecticut.....	74.7	90,336	70.5	9,775	74.7	80,562
Delaware.....	7.1	6,332	6.9	369	7.1	5,964
District of Columbia.....	14.0	17,990	13.2	1,350	14.0	16,641
Florida.....	238.8	294,922	202.7	39,408	238.8	255,514
Georgia.....	62.6	72,469	58.9	9,540	62.6	62,929
Hawaii.....	11.0	11,330	10.1	1,475	11.0	9,855
Idaho.....	11.3	10,088	9.3	1,846	11.3	8,242
Illinois.....	148.5	175,151	129.8	27,114	148.5	148,037
Indiana.....	39.7	39,746	31.2	5,717	39.7	34,030
Iowa.....	34.5	28,936	30.8	4,072	34.5	24,863
Kansas.....	25.9	29,258	20.6	3,453	25.9	25,805
Kentucky.....	34.9	38,942	30.2	6,019	34.9	32,924
Louisiana.....	38.3	42,047	35.2	8,472	38.3	33,576
Maine.....	14.9	11,792	13.9	1,477	14.9	10,314
Maryland.....	49.7	53,351	40.1	5,429	49.7	47,923
Massachusetts.....	113.2	117,160	106.9	12,922	113.2	104,238
Michigan.....	72.4	71,707	62.5	5,465	72.4	66,242
Minnesota.....	35.2	36,411	30.6	5,405	35.2	31,006
Mississippi.....	23.5	23,388	22.6	6,167	23.5	17,221
Missouri.....	53.9	61,335	48.5	6,990	53.9	54,345
Montana.....	7.2	6,384	5.9	1,051	7.2	5,333
Nebraska.....	19.8	18,352	14.9	3,699	19.8	14,654
Nevada.....	13.3	17,953	12.0	1,249	13.3	16,704
New Hampshire.....	20.2	24,892	16.9	4,681	20.2	20,211
New Jersey.....	139.2	150,128	115.2	16,549	139.2	133,579
New Mexico.....	12.3	15,797	9.9	1,646	12.3	14,151
New York.....	339.6	381,476	288.9	35,843	339.6	345,633
North Carolina.....	66.3	80,352	61.1	8,936	66.3	71,416
North Dakota.....	9.4	7,548	7.9	3,096	9.4	4,451
Ohio.....	106.4	103,880	95.7	13,218	106.4	90,662
Oklahoma.....	37.6	48,605	34.9	7,331	37.6	41,273
Oregon.....	25.4	37,008	22.9	5,221	25.4	31,788
Pennsylvania.....	113.8	120,914	100.8	13,171	113.8	107,743
Rhode Island.....	12.1	15,902	10.5	1,886	12.1	14,015
South Carolina.....	29.4	31,084	27.8	3,529	29.4	27,555
South Dakota.....	7.0	4,784	5.9	1,220	7.0	3,564
Tennessee.....	51.4	55,303	42.2	5,736	51.4	49,567
Texas.....	250.6	295,471	229.9	60,646	250.6	234,825
Utah.....	7.3	8,787	6.2	1,276	7.3	7,510
Vermont.....	4.8	5,483	4.8	445	4.8	5,038
Virginia.....	76.5	75,017	69.7	9,140	76.5	65,878
Washington.....	55.6	56,618	45.0	9,034	55.6	47,584
West Virginia.....	11.2	9,996	9.2	620	11.2	9,375
Wisconsin.....	44.8	48,107	39.9	5,393	44.8	42,715
Wyoming.....	6.4	6,670	5.1	2,255	6.4	4,415
Other areas ¹	4.5	4,566	3.3	329	4.5	4,238

See footnotes at end of table.

Table 7.—Top Wealthholders With Net Worth Under \$10,000,000 and Gross Assets of \$500,000 or More: Total and Selected Assets, Debts and Mortgages, and Net Worth, by State of Residence—(continued)

[All figures are estimates based on estate tax return samples—number are in thousands; money amounts are in millions of dollars]

State of residence	Total assets by type							
	Real estate		Corporate stock		Cash		Total bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
Total	3,017.4	1,163,446	2,667.9	1,013,512	3,223.6	372,598	1,638.0	332,841
Alabama	35.4	10,444	30.3	11,042	37.8	5,269	18.9	3,835
Alaska	8.3	4,115	6.3	834	8.8	554	4.7	1,180
Arizona	48.8	20,583	46.1	14,263	51.3	4,502	27.5	5,308
Arkansas	15.9	4,249	15.5	6,454	15.9	2,081	8.0	2,011
California	526.4	301,244	423.0	148,121	541.1	59,770	236.2	50,816
Colorado	47.3	13,547	41.0	12,071	52.1	5,725	30.2	4,964
Connecticut	68.3	30,840	66.8	24,815	73.9	6,706	45.3	8,197
Delaware	6.4	1,524	5.8	1,832	6.5	661	4.3	491
District of Columbia	10.9	5,062	11.6	5,762	14.0	1,852	9.1	2,061
Florida	216.5	83,015	178.9	82,742	229.4	25,897	116.4	35,720
Georgia	57.9	21,956	49.8	20,962	59.6	8,402	22.6	3,843
Hawaii	10.8	5,447	8.9	2,439	10.7	1,041	5.8	806
Idaho	11.2	4,026	7.0	2,636	11.3	558	5.1	652
Illinois	138.3	41,310	121.5	53,830	145.0	18,318	80.7	16,749
Indiana	37.7	9,179	33.6	12,698	39.4	4,709	23.5	4,413
Iowa	31.1	6,502	28.9	7,053	33.0	2,732	18.2	3,781
Kansas	23.8	7,265	20.1	9,820	25.7	3,075	13.5	2,339
Kentucky	28.9	8,598	30.1	14,385	34.1	4,578	19.8	4,778
Louisiana	37.4	15,064	33.7	8,599	36.6	5,295	18.4	4,080
Maine	13.4	4,207	10.5	3,642	14.9	1,081	6.3	665
Maryland	45.3	15,570	40.4	16,171	49.4	6,007	28.5	4,164
Massachusetts	101.2	40,548	87.3	31,872	110.7	10,873	46.5	7,924
Michigan	65.4	13,268	61.3	23,244	70.6	7,816	42.2	9,265
Minnesota	32.9	10,790	30.2	10,366	34.1	3,031	18.3	2,904
Mississippi	21.7	6,596	19.9	7,405	23.4	1,975	11.8	1,369
Missouri	49.3	11,772	44.4	25,207	52.3	7,749	27.5	6,793
Montana	6.5	2,374	5.0	1,767	7.2	653	1.5	160
Nebraska	17.8	5,104	15.2	4,230	19.5	1,924	10.5	2,475
Nevada	10.8	5,318	10.9	4,547	13.3	1,875	5.4	1,889
New Hampshire	19.3	11,256	15.6	6,526	19.9	1,420	8.0	1,803
New Jersey	127.8	47,782	118.1	42,598	134.7	16,161	81.9	13,942
New Mexico	12.1	4,384	7.9	3,356	11.9	1,831	4.0	1,125
New York	277.1	108,135	278.1	110,295	332.5	39,611	189.2	35,842
North Carolina	61.6	23,143	53.4	29,431	65.1	6,623	31.9	5,854
North Dakota	9.2	2,984	7.1	1,277	8.8	618	4.8	434
Ohio	92.8	19,979	95.0	34,715	103.4	12,195	58.4	9,523
Oklahoma	34.8	9,417	29.1	11,973	36.8	5,775	12.6	7,173
Oregon	24.5	9,241	21.3	10,242	25.0	2,439	14.8	3,001
Pennsylvania	101.7	25,199	93.1	36,390	108.5	14,309	65.8	14,195
Rhode Island	10.8	5,613	10.1	5,017	12.1	1,640	6.2	1,288
South Carolina	27.4	9,905	25.4	10,265	28.8	2,615	11.4	1,972
South Dakota	5.8	1,467	5.3	694	7.0	545	3.9	550
Tennessee	49.0	14,621	38.7	18,728	50.3	5,230	24.9	5,374
Texas	241.4	100,863	210.4	60,418	249.1	38,479	107.4	20,164
Utah	6.9	1,452	5.6	2,159	7.3	757	2.8	896
Vermont	4.8	1,576	4.8	1,299	4.5	224	2.2	345
Virginia	71.1	21,861	63.3	19,432	75.8	7,437	38.5	5,528
Washington	53.1	20,630	45.1	14,207	54.1	4,330	26.9	3,966
West Virginia	10.9	2,438	10.3	3,252	11.2	1,102	7.2	967
Wisconsin	40.6	9,581	38.1	18,752	44.2	3,091	21.8	3,999
Wyoming	5.8	1,381	4.1	2,024	6.3	868	3.4	773
Other areas ¹	3.3	1,021	4.0	1,654	4.4	591	3.0	498

¹ U.S. citizens domiciled abroad. Persons who acquired U.S. citizenship solely by virtue of being a citizen of Puerto Rico or the Virgin Islands are not included.

Note: Detail may not add to totals because of rounding.

Estimates of Personal Wealth, 1989

by Barry W. Johnson and Marvin Schwartz

There were approximately 3.4 million people with gross assets of \$600,000 or more in 1989 according to estimates of personal wealth derived from Federal estate tax returns using the "estate multiplier technique." These individuals, the Nation's "top wealth-holders," represented less than 2 percent of the adult population [1]. Their net worth was over \$4.8 trillion and accounted for between 25 and 30 percent of the personal wealth in the United States [2]. Almost 1.3 million of these individuals had a net worth of at least \$1 million.

Background

The distribution and composition of personal wealth in the United States is a topic of great interest among researchers and policy planners. Much of the economic debate preceding the 1992 Presidential election focused on how the policies of the previous 12 years had affected various sectors of society: how had the wealthiest individuals in society fared compared to middle class and needy Americans?

This is a difficult question to answer because, while there are several sources of data available to study income trends, little is known about wealth. The few surveys which attempt to measure wealth tend to under-represent the very wealthy because of the relatively small size of this important group [3]. An alternate approach is the use of administrative records, i.e., the Federal estate tax return, to approximate the wealth of the living.

The personal wealth estimates for 1989 are based on estate tax returns filed for individuals who died in 1989. The estate multiplier technique is used to estimate the wealth of living individuals using tax returns filed for the deceased. Because a decedent's estate has up to 9 months to file an estate tax return, and a 6 month extension is not uncommon, it is necessary to sample returns filed over a 3-year period in order to capture data for nearly all estate tax decedents dying in a single year. One of the strengths of this estimation technique is the large sample upon which the estimates are based. The sample contains over 17,500 returns for 1989 decedents, which is about 35 percent of the total population of 1989 estate tax filers, considerably larger than the samples selected for other studies at comparable levels of wealth (see the appendix to this article for a more complete discussion of the estate multiplier technique).

The estate multiplier technique has been used by Statistics of Income to estimate the wealth of living individuals since the 1960's (most recently for 1982 and 1986). As

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the level of gross estate (or gross assets) required for filing a tax return has increased, the definition of a top wealthholder has also changed. The level of wealth to which these estimates apply is \$600,000 or more in gross estate, the filing threshold in effect for 1989. The gross estate criterion is a Federal estate tax concept of wealth which does not conform to usual definitions of wealth, primarily because it includes the face value of life insurance in the wealth of the decedent. Therefore, three measures of wealth are used in this article: gross assets (or gross estate), total assets and net worth.

Gross assets reflect the gross value of all assets, including the full face value of life insurance reduced by policy loans, but excluding any reduction for other indebtedness [4]. This measure defines the individuals included in the top wealthholder group. Total assets, while a narrower definition of wealth, is still essentially a gross measure. It differs from gross assets in that the cash, or equity, value of life insurance, i.e., the value of insurance immediately before the policyholder's death, replaces the "at death" value of life insurance included in gross assets [5]. Net worth, the level of wealth after all debts have been removed, also includes the cash value of life insurance.

Personal Wealth in 1989

Although 52.1 percent of the adult population in 1989 was female, just 41.8 percent of the 3.4 million top wealth-holders that year were women (see Figure A). Nevertheless, this represented a modest increase from the 40.3 percent who were female at a corresponding level in 1986. On the other hand, women were on the average wealthier and had fewer debts than their male counterparts, holding 43.1 percent of the net worth of top wealthholders. Their average net worth was 5.6 percent higher than that of male top wealthholders. The debt burden, i.e., amounts owed as debts and mortgages, of

Figure A

Top Wealthholders: Selected Items, by Sex, 1989

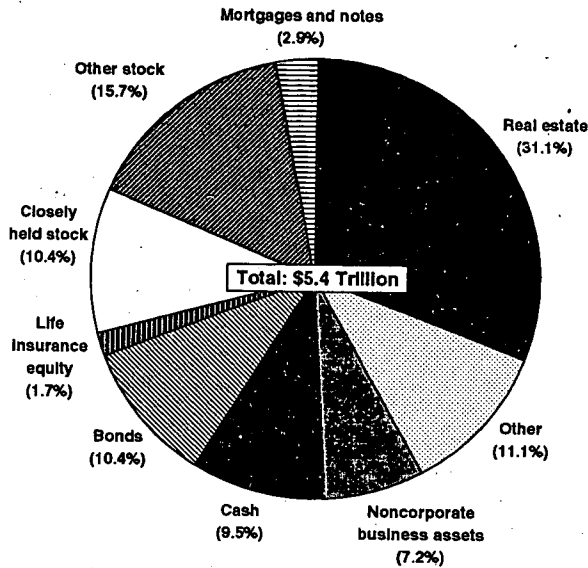
[Number of wealthholders is in thousands]

Item	Total	Males	Females
	(1)	(2)	(3)
Number of top wealthholders.....	3,417	1,989	1,427
Total assets (billions).....	5,390	3,150	2,241
Debts and mortgages (billions).....	586	416	170
Net worth (billions).....	4,804	2,733	2,071
Mean net worth (millions).....	1.41	1.37	1.45
Median net worth (millions).....	0.81	0.77	0.85

NOTE: Detail may not add to totals because of rounding.

Figure B

Top Wealthholders: Composition of Assets, 1989



women was only 7.6 percent of their total assets, compared to 13.2 percent for men.

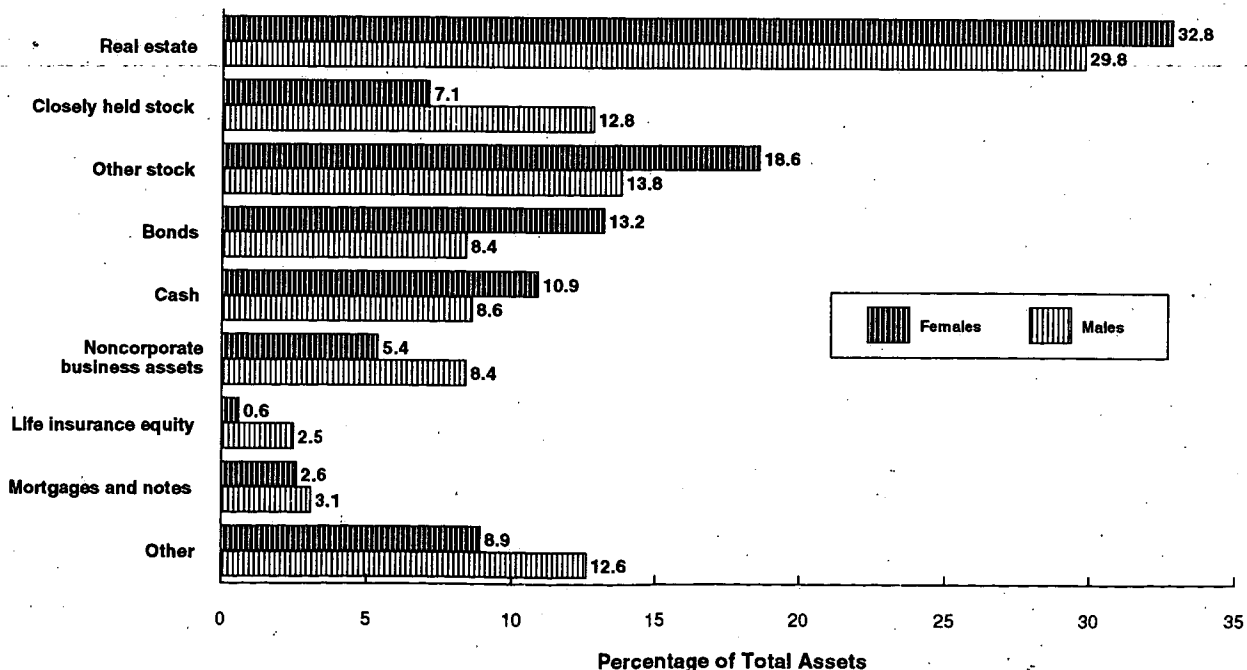
Composition of Assets

Real estate comprised the largest share of the assets held by top wealthholders in 1989 (see Figure B). Over 31 percent of their portfolios consisted of real estate holdings, while corporate stock comprised just 26 percent. This is in contrast to 1986 estimates where corporate stock, at 30 percent, was the most commonly held asset. Both the Dow Jones Industrial Average and Standard and Poor's common index increased about 40 percent between 1986 and 1989, while the Index of New One-Family Houses Sold increased a more modest 14 percent over the same period [6]. This indicates that the change in the relative importance of stock and real estate was mainly attributable to a redistribution of investments, rather than an actual decline in the performance of the stock market [7].

Some of the assets held in 1986 as corporate stock were subsequently redirected to bonds, which made up 10.4 percent of 1989 wealthholders' holdings and was the third largest asset type. This was an increase from the 9.0 percent of the assets held as bonds in 1986 by top wealthholders. Nearly two-thirds of the bonds held by the wealthy in 1989 were State and local Government bonds. These bonds are particularly attractive to top wealth-

Figure C

Top Wealthholders: Types of Assets as a Percentage of Total Assets, by Sex, 1989



NOTE: Detail may not add to totals because of rounding.

holders because interest payments on them are generally tax-exempt. The modest 1.5 percent increase in Standard and Poor's Municipal Bond Price Index between 1986 and 1989 shows that the rise in their relative share was due to the increased use of bonds as a means of diversifying and balancing a portfolio, rather than to an increase in their investment value. Cash, at 9.5 percent, and noncorporate business assets, at 7.2 percent, represented the next largest assets.

There were significant differences in the asset portfolios of men and women (see Figure C). While the portfolios of both men and women included roughly the same share of investments in corporate stock, the make-up of the stock holdings was quite different. At least 48 percent of the corporate stock held by men was untraded or in closely held corporations, compared to 28 percent for women [8]. This indicates that men are still more active in the creation and management of small companies than women, despite the increasingly important role of female entrepreneurs. It may also say something about different attitudes toward risk taking, as investments in this kind of stock are usually much riskier and less liquid than investments in the stock of larger, publicly traded firms.

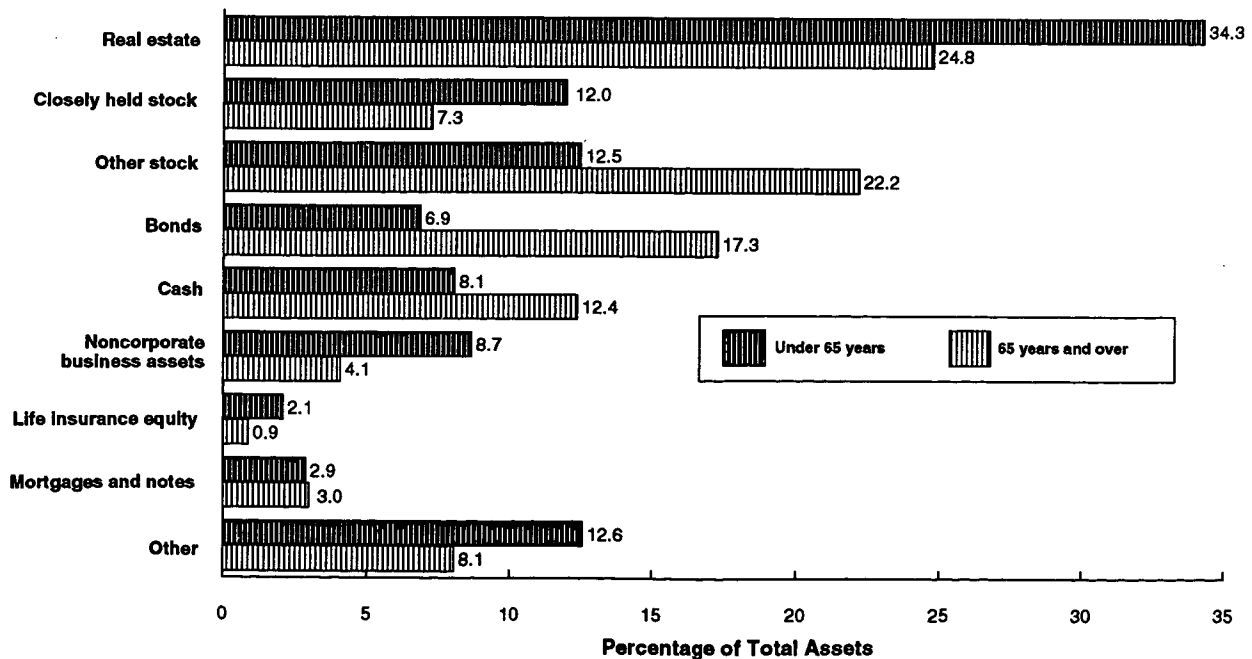
There were other noteworthy differences between the

portfolios of males and females as well. Bonds made up 13.2 percent of women's assets in 1989 compared to just 8.4 percent of the assets of men. Conversely, wealth held by men was characterized by a higher concentration in noncorporate business assets, 8.4 percent, compared to just 5.4 percent for women. Though a small portion of the assets of the wealthy, the share held as equity in life insurance by men and women was also quite different. While 2.5 percent of the assets of men was life insurance, only 0.6 percent of the assets of women was in the form of life insurance. Another noteworthy difference in the portfolios of men and women was in the share of assets comprising "other assets." (These assets include intangible and depletable assets, annuities, interests in pension plans and personal property.) Just 8.9 percent of the assets of women were classified as "other assets" compared to 12.6 percent for men.

More distinct differences in the composition of the assets of the top wealthholders exist when looking at the way the portfolio changes as the wealthy age (see Figure D). More than one-third of the assets of top wealthholders under 65 years of age was held as real estate, with corporate stock comprising just 24 percent of their portfolios. At least 49 percent of the corporate stock held by these top wealth-

Figure D

Top Wealthholders: Types of Assets as a Percentage of Total Assets, by Age, 1989



NOTE: Detail may not add to totals because of rounding.

holders was that of closely held corporations. In fact, when looking only at the wealth of those under 50 years of age at least 54 percent of their corporate stock holdings was in the form of closely held stock (see Table 4).

As the wealthy aged, their portfolios changed, with corporate stock, at just under 30 percent, becoming the most prominent asset of those 65 years of age and older, while less than 25 percent of the total was made up of real estate. The composition of the corporate stock holdings of the wealthy also changed, with closely held stock becoming less significant. Only about one quarter of the stock held by those top wealthholders at least 65 years of age was identified as that of closely held corporations.

The share of the assets held as noncorporate business assets, cash and bonds also changed significantly as the wealthy aged and redirected their investments. Noncorporate business assets, like closely held stock, were more prominent in the portfolios of those under 65 years of age. While 8.7 percent of the assets of younger

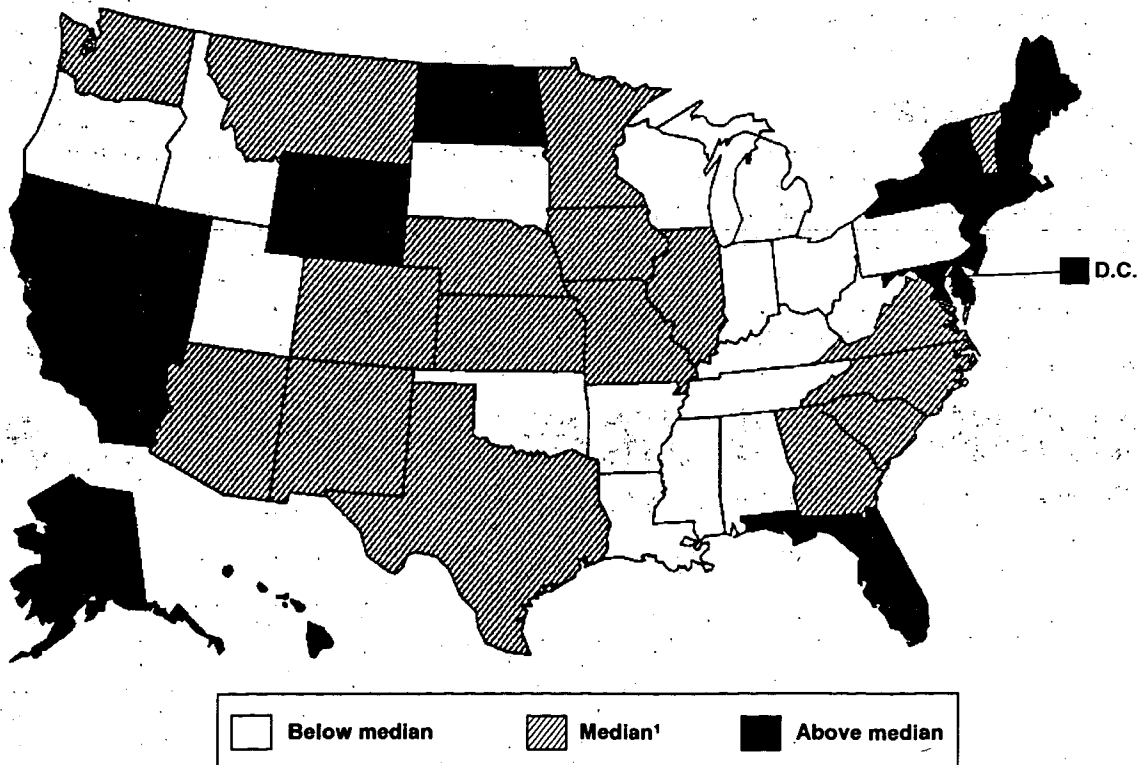
wealthholders was held as noncorporate business assets, these assets accounted for only 4.1 percent of the assets of those 65 years and older. In contrast, bonds, which constituted only 6.9 percent of the portfolio of wealthholders under 65 years of age, became an important source of income for those 65 years and older, with 17.3 percent of their assets invested in them. Cash, a significant share of the assets of all age groups, increased rather modestly in comparison, from 8.1 percent to 12.4 percent of the assets, as the wealthy aged.

Geographic Distribution of Wealth

Estimates of personal wealth using the estate multiplier technique for a limited population, for instance, the very wealthiest individuals by State, are subject to high sampling variance. Thus, wealth estimates by State for those individuals whose net worth is \$10 million or more can be misleading. For that reason, the estimates of wealth by State presented here do not include the 36,000 top

Figure E

Concentration of Top Wealthholders With Net Worth Less Than \$10,000,000, by State, 1989



¹ The median group includes States with 146.3 to 184.0 top wealthholders per 10,000 adults.

wealthholders, with net worth \$10 million or more. (These wealthholders represented only 1 percent of the 3.4 million people with gross assets of \$600,000 or more.)

In 1989, nearly 662,000, or almost 20 percent of the top wealthholders with net worth under \$10 million, lived in California. New York, with 325,000, accounted for the second largest number. Florida, with its rapid growth and attractive tax policy (no State income tax), showed the third largest number of top wealthholders, 241,000, displacing Texas, which had been third in 1986.

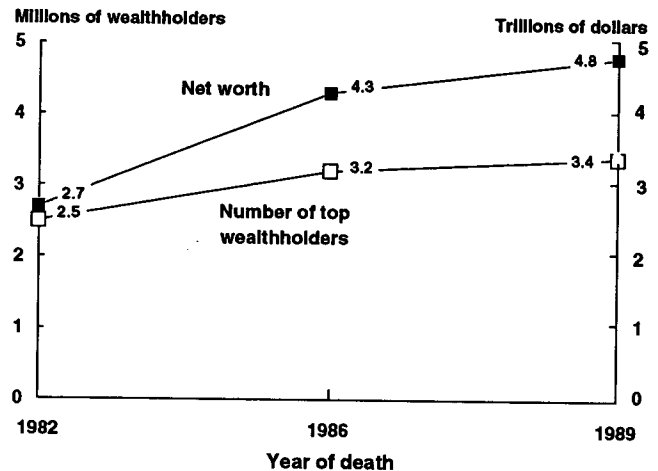
Looking at wealth on a per capita basis presents a somewhat different picture of wealth in this country by eliminating the distortions caused by the large population of some States. For instance, Connecticut, the 26th most populous State, had the highest concentration of top wealthholders—422 per 10,000 adults [9]. This compared with the 196 top wealthholders per 10,000 adults nationwide. Using this measure, California, with 11 percent of the adult population, had the second highest concentration of top wealthholders, with 330 per 10,000. On the other hand, Pennsylvania, the fifth most populous State, had a relatively low concentration of wealthy individuals, just 146 per 10,000, ranking it 35th among the 50 States and the District of Columbia. As shown in Figure E, wealth appears to be more heavily concentrated in the more populous coastal States of the Northeast and some Western States.

Personal Wealth, 1982-1989

The U.S. economy continued to grow during 1989, making the period from 1982 to 1989 the longest consecutive peacetime expansion in U.S. history. Between 1982 and 1989, over 20 million jobs were created, so that by 1989, the unemployment rate, at 5.3 percent, was at its lowest since 1973. Gross domestic product (GDP) experienced real growth of almost 29 percent, while inflation grew at an average annual rate of about 3 to 4

Figure F

Top Wealthholders: Number and Net Worth, 1982-1989



NOTE: Top wealthholders with gross assets of \$600,000 or more, using constant 1989 dollars.

percent, or just over 29 percent, between 1982 and 1989. The Dow Jones Industrial Average increased 184 percent. Interest rates fell between 1982 and 1989, lowering the yield on most bonds, but making mortgages more affordable. Exports reached an all time high by 1989, making the United States the world's leading exporter that year [10].

Between 1982 and 1989, the number of top wealthholders with gross assets of at least \$600,000 (in constant 1989 dollars) increased 38.5 percent (see Figure F) [11]. Figure F shows that the value of net worth increased at a much higher rate, growing 77.6 percent. This rate is more than double the increase in the GDP. The greatest change occurred between 1982 and 1986.

Figures G and H show that the number of top wealthholders with a net worth of at least \$5 million experienced the largest growth between 1982 and 1989, more than

Figure G

Top Wealthholders: Number and Net Worth, by Size of Net Worth, 1982-1989

(Number of wealthholders is in thousands--money amounts are in billions of dollars)

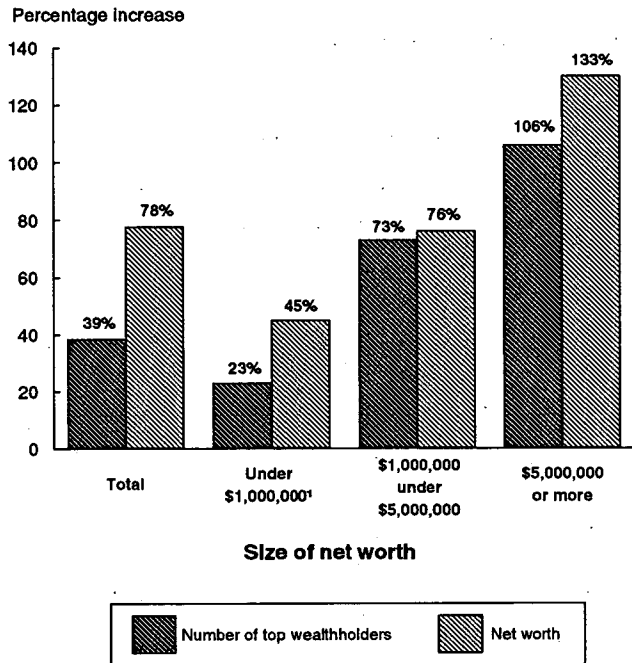
Size of net worth	1982		1986		1989	
	Number	Net worth	Number	Net worth	Number	Net worth
	(1)	(2)	(3)	(4)	(5)	(6)
Total.....	2,467	2,705	3,206	4,347	3,417	4,804
Under \$1,000,000 ¹	1,748	914	2,070	1,164	2,156	1,323
\$1,000,000 under \$5,000,000.....	666	1,196	1,035	1,888	1,151	2,100
\$5,000,000 or more.....	53	594	102	1,295	109	1,382

¹ Includes top wealthholders with negative net worth.

NOTES: Top wealthholders with gross assets of \$600,000 or more, using constant 1989 dollars. Detail may not add to totals because of rounding.

Figure H

Top Wealthholders: Percentage Increase in Number and Net Worth, by Size of Net Worth, 1982-1989



¹Includes top wealthholders with negative net worth.

NOTE: Top wealthholders with gross assets of \$600,000 or more, using constant 1989 dollars.

doubling to 109,000. The value of their combined net worth increased by 133 percent, meaning that each individual in this group was, on average, wealthier than his or her 1982 counterpart. As a group, they accounted for almost \$1.4 trillion of the personal wealth in the United States.

Individuals with a net worth of at least \$1 million but less than \$5 million increased by 73 percent between 1982 and 1989. Similarly, the value of assets owned by this group increased by about 76 percent. Individuals with gross assets of \$600,000 or more, but with a net worth less than \$1 million, increased by only 23 percent, while their net worth grew by 45 percent.

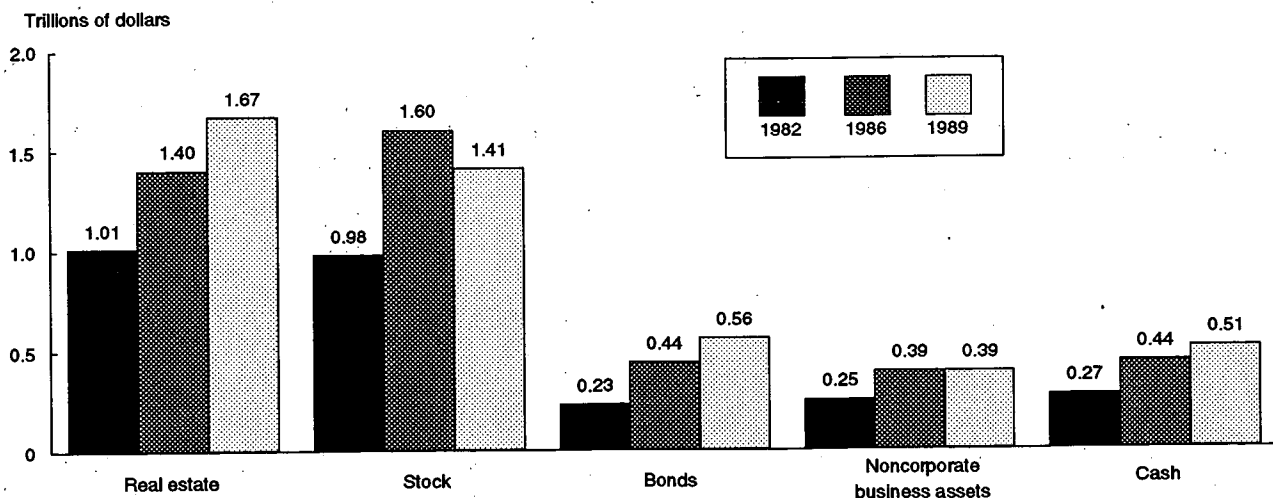
As mentioned earlier, real estate comprised the largest single component of the portfolios of top wealthholders in 1989. Figure I shows that the value of the real estate held by top wealthholders increased by an inflation-adjusted \$660 billion between 1982 and 1989. The graph also shows the decline between 1986 and 1989 in the real value of corporate stock included in the portfolios of the wealthy. The value of bonds in the portfolios of top wealthholders increased the most on a percentage basis, more than doubling. The amount of cash nearly doubled over the period, due, in part, to the increased popularity of money market mutual funds.

Summary

In 1989, approximately 3.4 million people—less than 2 percent of the Nation's adult population—held gross

Figure I

Top Wealthholders: Selected Assets, 1982-1989



NOTE: Top wealthholders with gross assets of \$600,000 or more, using constant 1989 dollars.

assets of \$600,000 or more. The net worth of these individuals was \$4.8 trillion and accounted for between 25 and 30 percent of the personal wealth in this country.

Although 52.1 percent of the adult population in 1989 was female, they accounted for only 41.8 percent of the top wealthholders. This represented a modest increase from 1986 when 40.3 percent of those individuals at the corresponding level of wealth were female. Their average net worth, however, was 5.6 percent higher in 1989 than that of male top wealthholders.

Real estate constituted the largest share of the assets held by top wealthholders. Corporate stock, the predominant asset in the portfolio of the wealthy in 1986, comprised the next largest share of the assets. Together they represented over 57 percent of the assets of top wealthholders.

Notes and References

- [1] U.S. Bureau of the Census, Current Population Reports, Series P-25, Number 1057, *United States Population Estimates, by Age, Sex, Race, and Hispanic Origin: 1989*. While the onset of adulthood is more commonly considered to be 18 or 21 years of age, it is defined here as 20 years of age because of the available mortality data used to develop these estimates.
- [2] Board of Governors of the Federal Reserve, *Balance Sheets of the U.S. Economy, 1960-1991*, Publication C-9, September 1992, estimates the total net worth of the private sector to be \$18.9 trillion. The 1989 Survey of Consumer Finances, also sponsored by the Board of Governors of the Federal Reserve, estimates a more conservative \$15.9 trillion.
- [3] The 1989 Survey of Consumer Finances, sponsored by the Board of Governors of the Federal Reserve, is a noteworthy exception to this problem. The survey design uses a dual frame which over-samples the very wealthy in order to ensure that they are adequately represented in the resulting data base. The Survey collects data on assets, debts, income and attitudes about finances.
- [4] Post-mortem dividends and interest included in the value of life insurance are included in gross assets for estate tax purposes.
- [5] Estimates of the equity value of life insurance included in total assets were approximated based on the face value reported on Federal estate tax returns and on the decedent's age. A ratio of the cash value to the face value was developed using two independent sources of data. The first was a study conducted by the Institute for Life Insurance which looked at the life insurance policies reported in the estates of 1971 Federal estate tax filers. The second was the Federal Reserve Board's 1982 and 1989 Surveys of Consumer Finances. The results from each of these sources were encouragingly similar. A simple regression in which age was the independent variable was used to predict the values used in the Statistics of Income estimates. The same set of ratios was used for both males and females due to lack of sex-specific data.
- [6] U.S. Bureau of the Census, Construction Reports, Series C-27, *Price Index of New One-Family Houses Sold*, First Quarter 1990.
- [7] The Federal Reserve Board's Flow of Funds estimates of household financial assets and liabilities showed that the value of corporate equity (including mutual funds) held by households increased by 20.2 percent between 1986 and 1989, again, less than the increase in the market indices during the same period. Both the Tax Reform Act of 1986 and the stock market decline in 1987 may have influenced the amount of stock held by individual investors.
- [8] Untraded, or closely held, stock is identified from the descriptions of assets provided by executors on the Federal estate tax return. When such descriptions are too vague (or are absent) to make a reasonable determination, amounts are included in the more general "other corporate stock" category. Therefore, the estimate of "closely held stock" presented in this article should be considered extremely conservative.
- [9] U.S. Bureau of the Census, Current Population Reports, Series P-25, Number 1058, *State Population and Household Estimates, July 1, 1989*. Adults are defined for purposes of this discussion as individuals 21 years of age or over, because of the availability of the data.
- [10] U.S. Office of Management and Budget, *Economic Report of the President*, Washington, DC, 1990.
- [11] Some of the change in the number of top wealthholders may be due to the influence of a revision of the estate tax law which became effective in 1982. This revision permitted an unlimited deduction from gross estate for bequests to the decedent's surviving spouse. (Prior to this, the deduction was limited to the greater of one-half of the adjusted gross estate, or \$250,000.) This meant

that by bequeathing most of the assets to the surviving spouse, the estate would be exempt from Federal estate taxes. The new law may have caused changes in bequest patterns, whereby more of the decedent's estate was left to the surviving spouse, postponing bequests to children and grandchildren until the death of the surviving spouse. Such a shift in bequest patterns could influence the number and make-up of the top wealthholder population and should be considered when comparing estimates between 1982 and 1989.

Appendix: The Estate Multiplier Technique

Researchers have been using the estate multiplier technique since the beginning of the 20th century to draw conclusions about the wealth of the living population through knowledge of the wealth of the deceased. (Financial records were used as early as 1864 to estimate total personal wealth by a related technique.) The technique assumes that estate tax returns taken as a whole represent a random sample, designated by death, of the living population. Death, however, is not a truly random event and therefore is not a simple representative sample of the living population under consideration. It does, however, provide a means of producing reasonable estimates of personal wealth utilizing existing data.

The probability that a person will die in a given year depends on the particulars of one's life. Age and sex are usually taken as indicators of these conditions. If one knows the mortality rate and the number of deaths for each age and sex group, one can approximate the population of living wealthholders.

Vital to the estimation of personal wealth is the use of a mortality rate appropriate to the top wealthholder population. This is essential to the estimates because there is much evidence that the wealthy have mortality rates that are lower than those of the population as a whole. In other words, social class is also a determinant in the "selection of the sample." Therefore, an adjustment to the general mortality rates is necessary.

The mortality rates assumed to approximate those of the wealthy are based on the mortality experience of the Metropolitan Life Insurance Company's preferred-risk policyholders. Mortality differentials were derived based on Metropolitan Life data for a series of years. Thus, the effect of the sampling variance of death has been reduced. Multipliers are then derived using the inverse of the adjusted mortality rates for each decedent according to age and sex. These multipliers, applied to sampled estate tax return data, produce wealth estimates for the living population.

The estimates of wealth are based on a sample of estate tax returns filed for 1989 decedents during 1989-1991. Sampling rates varied from 7 to 100 percent, with weights appropriate to each year maintained. Although this yielded a large overall sample size, the limited number of returns filed each year for decedents who were relatively young (under 40 years of age) or very wealthy (gross assets of \$5 million or more) can make results for these categories subject to considerable variance.

Death's achieved sample of these relatively young and very wealthy decedents in a given year can distort estimates of the wealth of the living. Death samples at varying rates which tend to average out over a period of years. This can result in large short-term fluctuations for a given year. When death "selects" a smaller sample, i.e., fewer deaths for a segment of the population during a sample year, wealth estimates of that segment will be lower than the true population values. Similarly, too large a sample produces estimates that overstate the wealth of the population.

In order to reduce the variability of the estimates, the sample of estate tax returns is designed so that it is stratified by age, as well as by size of gross estate. All returns filed for both the very wealthy (those with gross assets of \$5 million or more) and the relatively young (those under 40 years of age) were selected for the study. Thus, the sampling variance introduced by the Statistics of Income sample for returns of relatively young or wealthy decedents was eliminated.

The variability of the final estimates for very wealthy and relatively young individuals was further reduced by including in the sample all returns filed for non-1989 decedents during the 3-year period. These segments of the sample were then post-stratified and reweighted to represent the true 1989 decedent population. This technique reduces the effect of outliers on the estimates of the type and amount of wealth for the relatively young and very wealthy.

Further adjustments to the estimation technique have been incorporated in a continuing effort to improve the accuracy of the estimates. The use of returns for a particular year of death filed during a 3-year period is dependent upon the timely filing of all or nearly all the returns for that year, or, alternatively, an awareness of the number of missing or yet-to-be-filed returns. Data for prior years have allowed estimates to be made of the number of unfiled returns for 1989 decedents. This adjustment proved to be age dependent; the likelihood of a timely return being filed increases with the decedent's age, possibly because the elderly have been able to make more complete estate plans.

Basing the estimates on returns for a single year of death eliminated much of the distortion due to inflation. However, the problem was not entirely eliminated due to the use of all returns for the relatively young and very wealthy decedents regardless of the year of death. Money amounts for these individuals were converted to 1989 dollars to further reduce the effects of inflation on the estimates.

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Table 1.--All Top Wealthholders with Gross Assets of \$600,000 or More: Total and Type of Assets, Debts and Mortgages, and Net Worth, by Size of Net Worth

[All figures are estimates based on samples - numbers are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth		Real estate	
			Number	Amount	Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total.....	3,416.8	5,390,431	2,969.1	585,964	3,416.8	4,804,467	3,150.7	1,674,667
Under \$600,000 ¹	811.9	483,063	763.1	184,206	811.9	298,858	759.5	241,987
\$600,000 under \$1,000,000.....	1,344.4	1,117,669	1,113.3	93,956	1,344.4	1,023,713	1,216.6	401,760
\$1,000,000 under \$2,500,000.....	945.4	1,539,118	812.7	135,316	945.4	1,403,801	879.8	513,803
\$2,500,000 under \$5,000,000.....	205.5	770,162	179.1	73,933	205.5	696,230	190.6	227,773
\$5,000,000 under \$10,000,000.....	73.1	529,737	66.5	37,497	73.1	492,240	69.2	124,634
\$10,000,000 or more.....	36.4	950,682	34.5	61,056	36.4	889,626	35.2	164,710

Size of net worth	Closely held stock		Other stock		Cash		Total bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
Total.....	762.2	561,372	2,399.3	848,968	3,336.9	513,422	1,876.1	561,452
Under \$600,000 ¹	157.9	25,708	448.3	24,846	778.7	38,963	259.7	12,472
\$600,000 under \$1,000,000.....	221.8	51,148	957.6	147,681	1,319.9	161,072	799.9	109,943
\$1,000,000 under \$2,500,000.....	250.1	122,687	739.2	237,915	927.5	161,335	594.3	164,293
\$2,500,000 under \$5,000,000.....	80.7	90,946	164.0	139,992	201.9	60,923	138.3	84,379
\$5,000,000 under \$10,000,000.....	32.3	72,977	64.7	102,217	72.6	40,098	55.6	69,692
\$10,000,000 or more.....	19.5	197,905	31.5	196,317	36.3	51,031	28.4	120,673

Size of net worth	State and local Government bonds		Corporate and foreign bonds		Federal savings bonds		Other Federal Government bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
Total.....	1,330.9	370,917	735.7	42,514	393.4	11,139	732.6	136,882
Under \$600,000 ¹	130.6	7,370	76.2	1,253	78.2	902	67.4	2,948
\$600,000 under \$1,000,000.....	549.0	65,381	317.7	10,631	175.6	5,465	324.2	28,466
\$1,000,000 under \$2,500,000.....	464.9	111,431	247.6	11,044	111.1	3,322	248.0	38,496
\$2,500,000 under \$5,000,000.....	115.0	61,051	56.6	4,865	19.4	983	59.3	17,480
\$5,000,000 under \$10,000,000.....	46.6	50,655	24.5	4,995	6.5	290	21.0	13,752
\$10,000,000 or more.....	24.8	75,031	13.2	9,726	2.5	177	12.9	35,739

Size of net worth	Noncorporate business assets		Mortgages and notes		Life insurance equity		Other assets	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(25)	(26)	(27)	(28)	(29)	(30)	(31)	(32)
Total.....	1,404.2	385,764	1,072.0	158,140	2,359.4	92,718	3,289.8	595,929
Under \$600,000 ¹	289.0	28,546	180.8	11,493	733.3	32,490	784.9	66,560
\$600,000 under \$1,000,000.....	475.6	50,630	405.5	39,667	831.5	21,224	1,279.5	134,543
\$1,000,000 under \$2,500,000.....	443.8	86,569	335.1	44,606	593.2	23,990	915.8	184,521
\$2,500,000 under \$5,000,000.....	117.9	65,309	87.2	21,314	131.2	8,129	201.1	71,397
\$5,000,000 under \$10,000,000.....	50.5	51,214	40.0	17,113	47.0	5,033	72.3	46,758
\$10,000,000 or more.....	27.4	103,497	23.3	21,948	23.1	2,452	36.3	92,149

¹ Includes top wealthholders with negative net worth.
 NOTE: Detail may not add to totals because of rounding.

Table 2.—Male Top Wealthholders with Gross Assets of \$600,000 or More: Total and Type of Assets, Debts and Mortgages, and Net Worth, by Size of Net Worth

[All figures are estimates based on samples — numbers are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth		Real estate	
			Number	Amount	Number	Amount	Number	Amount
			(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total.....	1,989.3	3,149,720	1,740.5	416,308	1,989.3	2,733,412	1,845.3	940,002
Under \$600,000 ¹	610.1	355,648	567.4	143,501	610.1	212,147	569.6	168,692
\$600,000 under \$1,000,000.....	672.8	575,397	556.8	61,242	672.8	514,155	616.4	201,492
\$1,000,000 under \$2,500,000.....	523.0	869,203	450.3	91,293	523.0	777,910	489.1	277,520
\$2,500,000 under \$5,000,000.....	119.2	455,967	105.6	52,515	119.2	403,452	109.4	126,970
\$5,000,000 under \$10,000,000.....	42.5	311,404	39.6	24,544	42.5	286,860	39.9	65,787
\$10,000,000 or more.....	21.7	582,103	20.8	43,215	21.7	538,888	20.9	99,541

Size of net worth	Closely held stock		Other stock		Cash		Total bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
Total.....	541.0	402,971	1,353.1	433,099	1,940.3	270,116	973.1	264,753
Under \$600,000 ¹	125.5	20,740	344.5	19,173	585.8	26,300	187.0	7,523
\$600,000 under \$1,000,000.....	151.3	36,094	465.1	63,171	658.0	71,654	359.4	44,071
\$1,000,000 under \$2,500,000.....	174.0	90,265	392.5	109,972	514.2	84,619	303.5	74,168
\$2,500,000 under \$5,000,000.....	56.4	66,596	95.9	76,767	118.4	36,390	75.8	41,800
\$5,000,000 under \$10,000,000.....	20.9	51,426	36.9	55,583	42.4	22,402	31.4	38,306
\$10,000,000 or more.....	12.8	137,851	18.4	108,434	21.6	28,750	16.0	58,884

Size of net worth	State and local Government bonds		Corporate and foreign bonds		Federal savings bonds		Other Federal Government bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
Total.....	667.8	176,084	362.7	21,928	234.7	5,242	341.8	61,498
Under \$600,000 ¹	88.9	4,131	51.7	903	66.1	572	46.1	1,917
\$600,000 under \$1,000,000.....	243.9	26,261	133.5	4,758	88.4	2,117	135.2	10,935
\$1,000,000 under \$2,500,000.....	235.6	51,754	124.2	5,360	61.4	1,704	111.8	15,349
\$2,500,000 under \$5,000,000.....	60.2	30,503	32.4	2,727	12.9	586	30.6	7,984
\$5,000,000 under \$10,000,000.....	25.6	26,907	13.6	3,054	4.3	166	11.4	8,179
\$10,000,000 or more.....	13.7	36,528	7.3	5,125	1.6	97	6.7	17,134

Size of net worth	Noncorporate business assets		Mortgages and notes		Life insurance equity		Other assets	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(25)	(26)	(27)	(28)	(29)	(30)	(31)	(32)
Total.....	915.6	265,818	653.3	97,325	1,668.5	79,019	1,928.6	396,618
Under \$600,000 ¹	223.1	23,943	131.5	7,991	576.3	28,266	592.7	53,020
\$600,000 under \$1,000,000.....	287.1	33,139	212.8	21,189	529.1	17,645	649.1	86,942
\$1,000,000 under \$2,500,000.....	279.2	57,859	213.1	29,933	413.6	20,446	506.7	124,422
\$2,500,000 under \$5,000,000.....	78.2	38,966	56.6	14,546	97.5	7,241	116.6	46,690
\$5,000,000 under \$10,000,000.....	31.0	35,462	25.0	11,683	34.8	3,137	42.0	27,618
\$10,000,000 or more.....	16.9	76,450	14.3	11,983	17.2	2,284	21.5	57,927

¹ Includes top wealthholders with negative net worth.
 NOTE: Detail may not add to totals because of rounding.

Table 3.—Female Top Wealthholders with Gross Assets of \$600,000 or More: Total and Type of Assets, Debts and Mortgages, and Net Worth, by Size of Net Worth

[All figures are estimates based on samples — numbers are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth		Real estate	
			Number	Amount	Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total	1,427.5	2,240,710	1,228.6	169,655	1,427.5	2,071,055	1,305.5	734,666
Under \$600,000 ¹	201.8	127,416	195.7	40,705	201.8	86,711	189.9	73,295
\$600,000 under \$1,000,000.....	671.6	542,272	556.4	32,715	671.6	509,558	600.1	200,268
\$1,000,000 under \$2,500,000.....	422.4	669,915	362.3	44,024	422.4	625,891	390.6	236,283
\$2,500,000 under \$5,000,000.....	86.3	314,196	73.5	21,418	86.3	292,778	81.2	100,804
\$5,000,000 under \$10,000,000.....	30.7	218,333	26.9	12,953	30.7	205,380	29.3	58,847
\$10,000,000 or more.....	14.8	368,579	13.8	17,841	14.8	350,738	14.3	65,170

Size of net worth	Closely held stock		Other stock		Cash		Total bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
Total	221.3	158,400	1,046.2	415,869	1,396.5	243,306	903.0	296,699
Under \$600,000 ¹	32.4	4,967	103.8	5,674	192.8	12,662	72.7	4,949
\$600,000 under \$1,000,000.....	70.5	15,054	492.5	84,510	661.8	89,418	440.4	65,872
\$1,000,000 under \$2,500,000.....	76.2	32,423	340.8	127,943	413.3	76,716	290.8	90,125
\$2,500,000 under \$5,000,000.....	24.3	24,350	68.2	63,225	83.6	24,534	62.5	42,578
\$5,000,000 under \$10,000,000.....	11.4	21,552	27.8	46,634	30.3	17,696	24.2	31,396
\$10,000,000 or more.....	6.6	60,054	13.2	87,883	14.7	22,280	12.4	61,789

Size of net worth	State and local Government bonds		Corporate and foreign bonds		Federal savings bonds		Other Federal Government bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
Total	663.1	194,833	373.0	20,586	158.7	5,897	390.8	75,383
Under \$600,000 ¹	41.7	3,239	24.5	350	12.1	330	21.3	1,031
\$600,000 under \$1,000,000.....	305.1	39,120	184.2	5,873	87.3	3,348	189.0	17,531
\$1,000,000 under \$2,500,000.....	229.3	59,676	123.4	5,684	49.7	1,618	136.2	23,147
\$2,500,000 under \$5,000,000.....	54.8	30,548	24.2	2,138	6.5	397	28.6	9,496
\$5,000,000 under \$10,000,000.....	21.0	23,748	10.9	1,941	2.2	124	9.6	5,573
\$10,000,000 or more.....	11.1	38,503	5.9	4,601	0.9	80	6.2	18,605

Size of net worth	Noncorporate business assets		Mortgages and notes		Life insurance equity		Other assets	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(25)	(26)	(27)	(28)	(29)	(30)	(31)	(32)
Total	488.5	119,946	418.7	58,816	690.9	13,698	1,361.2	199,310
Under \$600,000 ¹	65.9	4,603	49.3	3,502	157.0	4,223	192.2	13,540
\$600,000 under \$1,000,000.....	188.4	17,491	192.8	18,478	302.5	3,579	630.3	47,602
\$1,000,000 under \$2,500,000.....	164.6	28,710	122.0	14,673	179.6	2,943	409.1	60,099
\$2,500,000 under \$5,000,000.....	39.7	26,342	30.6	6,767	33.7	888	84.5	24,707
\$5,000,000 under \$10,000,000.....	19.5	15,753	15.0	5,430	12.2	1,897	30.3	19,140
\$10,000,000 or more.....	10.5	27,047	9.0	9,966	5.9	168	14.7	34,223

¹ Includes top wealthholders with negative net worth.

NOTE: Detail may not add to totals because of rounding.

Table 4.—Top Wealthholders Under 50 Years of Age with Gross Assets of \$600,000 or More: Total and Type of Assets, Debts and Mortgages, and Net Worth, by Size of Net Worth

[All figures are estimates based on samples -- numbers are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth		Real estate	
			Number	Amount	Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total	1,196.6	1,693,990	1,108.0	310,110	1,196.6	1,383,880	1,103.9	591,362
Under \$600,000 ¹	538.2	302,485	510.7	127,083	538.2	175,402	504.5	159,306
\$600,000 under \$1,000,000.....	321.2	291,090	289.1	46,259	321.2	244,831	283.8	115,278
\$1,000,000 under \$2,500,000.....	247.2	440,871	226.1	66,902	247.2	373,969	233.0	162,548
\$2,500,000 under \$5,000,000.....	58.5	240,264	52.2	38,864	58.5	201,400	52.5	81,905
\$5,000,000 under \$10,000,000.....	21.0	154,325	19.5	14,262	21.0	140,064	19.8	41,936
\$10,000,000 or more.....	10.4	264,954	10.4	16,740	10.4	248,214	10.3	30,389

Size of net worth	Closely held stock		Other stock		Cash		Total bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
Total	321.1	225,675	716.4	194,219	1,150.5	130,803	452.9	94,365
Under \$600,000 ¹	107.5	17,385	279.0	13,138	514.5	22,310	147.4	5,121
\$600,000 under \$1,000,000.....	84.8	20,934	200.3	26,867	310.0	31,493	144.2	14,409
\$1,000,000 under \$2,500,000.....	87.5	50,580	172.2	57,932	237.8	37,700	110.6	25,444
\$2,500,000 under \$5,000,000.....	24.5	30,915	39.7	36,816	57.0	16,751	29.5	14,758
\$5,000,000 under \$10,000,000.....	9.8	22,507	17.4	20,782	20.7	12,734	14.0	13,142
\$10,000,000 or more.....	7.1	83,353	7.8	38,684	10.4	9,815	7.2	21,492

Size of net worth	State and local Government bonds		Corporate and foreign bonds		Federal savings bonds		Other Federal Government bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
Total	265.9	51,179	147.8	9,403	103.3	972	158.8	32,811
Under \$600,000 ¹	67.7	3,090	39.4	440	49.1	372	37.0	1,218
\$600,000 under \$1,000,000.....	88.7	8,010	48.0	1,424	24.0	147	52.4	4,828
\$1,000,000 under \$2,500,000.....	71.1	13,840	39.1	1,569	23.7	436	50.3	9,599
\$2,500,000 under \$5,000,000.....	21.6	8,096	11.6	1,543	4.2	2	13.2	5,116
\$5,000,000 under \$10,000,000.....	10.5	8,898	6.1	1,816	*1.8	*14	3.5	2,415
\$10,000,000 or more.....	6.4	9,245	3.6	2,611	--	--	*2.4	*9,636

Size of net worth	Noncorporate business assets		Mortgages and notes		Life insurance equity		Other assets	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(25)	(26)	(27)	(28)	(29)	(30)	(31)	(32)
Total	528.6	165,752	318.9	39,218	935.1	34,406	1,153.4	218,189
Under \$600,000 ¹	191.7	19,613	103.8	5,841	494.4	18,768	517.7	41,004
\$600,000 under \$1,000,000.....	149.4	24,379	96.6	10,906	217.7	5,175	307.1	41,650
\$1,000,000 under \$2,500,000.....	128.1	33,172	75.3	10,089	160.7	5,559	240.2	57,846
\$2,500,000 under \$5,000,000.....	34.9	27,761	22.7	5,717	41.2	2,322	56.9	23,317
\$5,000,000 under \$10,000,000.....	15.9	21,860	13.0	3,485	14.0	2,258	21.0	15,621
\$10,000,000 or more.....	8.6	38,967	7.5	3,179	7.2	325	10.4	38,750

* Estimate should be used with caution because of the small number of sampled estate tax returns on which it is based.

¹ Includes top wealthholders with negative net worth.

NOTE: Detail may not add to totals because of rounding.

Table 5.—Top Wealthholders Age 50 Under 65 Years with Gross Assets of \$600,000 or More: Total and Type of Assets, Debts and Mortgages, and Net Worth, by Size of Net Worth

[All figures are estimates based on samples — numbers are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth		Real estate	
			Number	Amount	Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total.....	1,157.4	1,887,231	994.0	204,985	1,157.4	1,882,268	1,099.0	635,510
Under \$600,000 ¹	222.5	145,425	203.8	48,600	222.5	96,825	208.1	66,290
\$600,000 under \$1,000,000.....	476.2	397,780	396.5	34,974	476.2	362,806	452.2	157,495
\$1,000,000 under \$2,500,000.....	345.0	561,093	294.5	52,414	345.0	508,679	329.1	204,181
\$2,500,000 under \$5,000,000.....	76.1	282,246	65.0	26,514	76.1	255,732	73.4	88,941
\$5,000,000 under \$10,000,000.....	25.1	185,069	22.7	15,608	25.1	169,461	24.1	43,328
\$10,000,000 or more.....	12.6	315,618	11.5	26,855	12.6	288,763	12.2	75,274

Size of net worth	Closely held stock		Other stock		Cash		Total bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
Total.....	294.8	204,516	839.2	252,405	1,134.9	158,258	621.1	154,159
Under \$600,000 ¹	40.7	6,749	139.4	8,866	214.8	12,622	85.4	5,033
\$600,000 under \$1,000,000.....	92.0	20,748	337.5	44,593	468.4	45,318	256.6	28,160
\$1,000,000 under \$2,500,000.....	105.0	47,698	265.0	68,250	339.7	49,304	203.0	45,326
\$2,500,000 under \$5,000,000.....	36.5	39,325	63.6	41,308	74.5	20,594	48.7	23,249
\$5,000,000 under \$10,000,000.....	13.5	29,880	22.5	32,761	25.1	11,696	18.1	20,745
\$10,000,000 or more.....	7.1	60,116	11.3	56,626	12.4	18,722	9.3	31,647

Size of net worth	State and local Government bonds		Corporate and foreign bonds		Federal savings bonds		Other Federal Government bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
Total.....	451.0	104,486	226.8	11,999	124.6	2,437	227.5	35,236
Under \$600,000 ¹	46.2	3,099	26.9	483	24.0	360	23.0	1,091
\$600,000 under \$1,000,000.....	182.0	16,716	87.0	2,391	56.1	1,222	98.0	7,830
\$1,000,000 under \$2,500,000.....	160.6	30,606	81.3	4,097	35.3	622	76.7	10,000
\$2,500,000 under \$5,000,000.....	39.6	17,483	19.5	1,344	6.4	125	18.9	4,297
\$5,000,000 under \$10,000,000.....	15.2	14,786	8.1	1,627	1.8	88	6.8	4,244
\$10,000,000 or more.....	7.6	21,796	4.1	2,057	1.1	20	4.1	7,775

Size of net worth	Noncorporate business assets		Mortgages and notes		Life insurance equity		Other assets	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(25)	(26)	(27)	(28)	(29)	(30)	(31)	(32)
Total.....	530.3	145,372	394.5	63,000	854.0	42,245	1,132.4	231,768
Under \$600,000 ¹	79.5	7,549	56.2	3,330	199.8	12,316	219.0	22,668
\$600,000 under \$1,000,000.....	184.8	16,533	144.4	13,792	333.9	10,821	463.6	60,320
\$1,000,000 under \$2,500,000.....	187.4	34,772	135.9	18,773	242.5	12,029	337.8	80,759
\$2,500,000 under \$5,000,000.....	49.3	26,126	36.3	8,056	51.2	3,867	74.7	30,779
\$5,000,000 under \$10,000,000.....	18.9	18,971	13.6	8,302	18.2	1,807	24.9	17,578
\$10,000,000 or more.....	10.4	41,420	8.2	10,746	8.4	1,404	12.5	19,662

¹ Includes top wealthholders with negative net worth.

NOTE: Detail may not add to totals because of rounding.

Table 6.--Top Wealthholders Age 65 Years or Older with Gross Assets of \$600,000 or More: Total and Type of Assets, Debts and Mortgages, and Net Worth, by Size of Net Worth

[All figures are estimates based on samples -- numbers are in thousands, money amounts are in millions of dollars]

Size of net worth	Number of top wealthholders	Total assets	Debts and mortgages		Net worth		Real estate	
			Number	Amount	Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total.....	1,062.8	1,809,211	867.1	70,889	1,062.8	1,738,322	947.9	447,795
Under \$600,000 ¹	51.3	35,153	48.6	8,523	51.3	26,630	46.9	16,390
\$600,000 under \$1,000,000.....	547.0	428,799	427.6	12,724	547.0	416,076	480.6	128,987
\$1,000,000 under \$2,500,000.....	353.2	537,154	292.1	16,001	353.2	521,153	317.6	147,074
\$2,500,000 under \$5,000,000.....	70.9	247,652	61.8	8,554	70.9	239,098	64.8	56,927
\$5,000,000 under \$10,000,000.....	27.0	190,343	24.3	7,627	27.0	182,716	25.3	39,370
\$10,000,000 or more.....	13.4	370,109	12.6	17,461	13.4	352,648	12.7	59,047

Size of net worth	Closely held stock		Other stock		Cash		Total bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
Total.....	146.4	131,180	843.7	402,344	1,051.5	224,361	802.1	312,928
Under \$600,000 ¹	9.7	1,573	29.9	2,842	49.3	4,031	26.9	2,319
\$600,000 under \$1,000,000.....	45.0	9,466	419.8	76,222	541.4	84,261	399.0	67,375
\$1,000,000 under \$2,500,000.....	57.7	24,410	296.1	111,733	350.1	74,331	280.7	93,523
\$2,500,000 under \$5,000,000.....	19.8	20,706	60.7	61,867	70.4	23,578	60.0	46,372
\$5,000,000 under \$10,000,000.....	9.0	20,590	24.9	48,674	26.9	15,667	23.5	35,805
\$10,000,000 or more.....	5.3	54,436	12.4	101,007	13.4	22,494	12.0	67,535

Size of net worth	State and local Government bonds		Corporate and foreign bonds		Federal savings bonds		Other Federal Government bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(17)	(18)	(19)	(20)	(21)	(22)	(23)	(24)
Total.....	614.0	215,252	361.1	21,113	165.6	7,730	346.4	68,834
Under \$600,000 ¹	16.7	1,180	9.9	330	5.1	169	7.4	639
\$600,000 under \$1,000,000.....	278.3	40,654	182.7	6,816	95.6	4,096	173.8	15,808
\$1,000,000 under \$2,500,000.....	233.3	66,984	127.2	5,379	52.1	2,264	120.9	18,897
\$2,500,000 under \$5,000,000.....	53.8	35,472	25.6	1,978	8.9	855	27.2	8,067
\$5,000,000 under \$10,000,000.....	21.0	26,971	10.3	1,552	2.9	188	10.7	7,094
\$10,000,000 or more.....	10.9	43,990	5.5	5,058	1.0	157	6.4	18,329

Size of net worth	Noncorporate business assets		Mortgages and notes		Life insurance equity		Other assets	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(25)	(26)	(27)	(28)	(29)	(30)	(31)	(32)
Total.....	345.3	74,640	358.6	53,923	570.2	16,066	1,004.0	145,972
Under \$600,000 ¹	17.8	1,384	20.8	2,322	39.2	1,405	48.2	2,887
\$600,000 under \$1,000,000.....	141.4	9,718	164.5	14,969	279.9	5,228	508.8	32,573
\$1,000,000 under \$2,500,000.....	128.3	18,625	123.9	15,743	190.0	5,801	337.8	45,915
\$2,500,000 under \$5,000,000.....	33.8	11,421	28.3	7,540	38.9	1,940	69.5	17,301
\$5,000,000 under \$10,000,000.....	15.7	10,383	13.4	5,326	14.8	968	26.4	13,559
\$10,000,000 or more.....	8.4	23,109	7.6	8,023	7.5	723	13.3	33,737

¹ Includes top wealthholders with negative net worth.

NOTE: Detail may not add to totals because of rounding.

Table 7.—Top Wealthholders with Gross Assets of \$600,000 or More and Net Worth Under \$10,000,000: Total and Selected Assets, Debts and Mortgages, and Net Worth, by State of Residence

[All figures are estimates based on samples — numbers are in thousands, money amounts are in millions of dollars]

State of residence	Number of top wealthholders	Total assets	Debts and mortgages		Net worth	
			Number	Amount	Number	Amount
	(1)	(2)	(3)	(4)	(5)	(6)
Total.....	3,380.3	4,439,561	2,934.5	525,097	3,380.3	3,914,463
Alabama.....	30.1	45,408	25.2	5,646	30.1	39,763
Alaska.....	6.7	7,514	5.9	1,239	6.7	6,275
Arizona.....	42.3	67,165	37.9	8,665	42.3	58,500
Arkansas.....	17.1	22,173	14.5	2,629	17.1	19,544
California.....	661.9	943,548	573.5	133,200	661.9	810,349
Colorado.....	42.3	50,976	35.4	5,566	42.3	45,410
Connecticut.....	98.7	123,644	91.4	14,039	98.7	109,605
Delaware.....	13.1	16,041	10.7	1,771	13.1	14,270
District of Columbia.....	13.1	16,492	12.5	1,566	13.1	14,926
Florida.....	240.8	348,654	204.1	41,060	240.8	307,594
Georgia.....	68.7	81,211	62.7	12,425	68.7	68,786
Hawaii.....	22.3	28,393	18.3	2,447	22.3	25,947
Idaho.....	7.7	9,015	6.7	1,275	7.7	7,740
Illinois.....	148.0	201,884	126.2	20,184	148.0	181,701
Indiana.....	37.0	45,772	31.3	3,188	37.0	42,584
Iowa.....	33.1	37,080	24.5	4,145	33.1	32,936
Kansas.....	28.3	29,255	22.9	2,607	28.3	26,648
Kentucky.....	30.9	38,339	26.2	5,563	30.9	32,776
Louisiana.....	30.6	37,922	28.7	5,598	30.6	32,324
Maine.....	16.2	24,673	13.9	2,781	16.2	21,892
Maryland.....	65.2	97,857	56.4	9,673	65.2	88,184
Massachusetts.....	108.8	121,856	105.2	15,426	108.8	106,430
Michigan.....	85.3	103,254	71.2	11,039	85.3	92,215
Minnesota.....	44.3	51,211	36.1	4,936	44.3	46,274
Mississippi.....	16.8	17,398	15.5	2,598	16.8	14,800
Missouri.....	55.1	63,568	43.9	3,751	55.1	59,817
Montana.....	9.9	9,692	8.3	1,343	9.9	8,348
Nebraska.....	20.4	24,187	15.9	2,855	20.4	21,332
Nevada.....	21.0	35,383	17.7	5,536	21.0	29,848
New Hampshire.....	15.0	18,328	13.0	1,843	15.0	16,485
New Jersey.....	162.0	211,677	134.6	20,600	162.0	191,077
New Mexico.....	14.7	14,680	13.4	1,846	14.7	12,834
New York.....	324.9	427,117	279.4	43,568	324.9	383,549
North Carolina.....	70.9	95,843	60.4	8,213	70.9	87,630
North Dakota.....	9.6	8,244	8.1	801	9.6	7,443
Ohio.....	99.1	122,323	87.2	12,981	99.1	109,343
Oklahoma.....	29.8	36,128	25.5	2,993	29.8	33,135
Oregon.....	24.4	28,357	18.4	2,300	24.4	26,058
Pennsylvania.....	126.6	147,743	114.2	14,344	126.6	133,399
Rhode Island.....	16.6	17,554	15.9	1,112	16.6	16,441
South Carolina.....	41.6	41,497	36.1	4,377	41.6	37,119
South Dakota.....	7.0	6,345	5.8	916	7.0	5,429
Tennessee.....	45.3	56,253	41.1	7,547	45.3	48,706
Texas.....	174.4	229,198	159.1	39,520	174.4	189,677
Utah.....	7.6	12,033	6.8	1,832	7.6	10,201
Vermont.....	7.0	8,163	6.5	1,183	7.0	6,980
Virginia.....	69.2	102,491	62.9	8,246	69.2	94,245
Washington.....	60.1	80,357	52.9	9,411	60.1	70,946
West Virginia.....	9.1	8,653	7.6	656	9.1	7,997
Wisconsin.....	36.3	50,588	31.2	4,118	36.3	46,470
Wyoming.....	6.3	7,676	5.4	1,315	6.3	6,361
Other areas ¹	7.2	8,747	6.5	2,627	7.2	6,120

Footnotes at end of table.

Table 7.--Top Wealthholders with Gross Assets of \$600,000 or More and Net Worth Under \$10,000,000: Total and Selected Assets, Debts and Mortgages, and Net Worth, by State of Residence--Continued

[All figures are estimates based on samples -- numbers are in thousands, money amounts are in millions of dollars]

State of residence	Real estate		Corporate stock		Cash		Bonds	
	Number	Amount	Number	Amount	Number	Amount	Number	Amount
	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
Total.....	3,115.5	1,509,923	2,640.7	1,016,468	3,300.5	462,143	1,847.5	439,955
Alabama.....	27.8	17,159	26.5	11,904	29.0	3,623	15.4	4,483
Alaska.....	6.5	2,153	4.6	1,593	6.7	672	3.9	374
Arizona.....	39.2	18,707	36.5	14,447	42.3	4,520	27.7	9,417
Arkansas.....	16.5	7,023	14.1	6,909	17.0	2,045	7.4	2,015
California.....	630.9	481,634	474.7	143,790	647.6	81,208	305.0	60,373
Colorado.....	38.8	11,193	34.6	12,893	41.1	4,607	23.3	6,045
Connecticut.....	92.5	50,186	78.9	27,939	96.5	12,315	56.8	10,154
Delaware.....	12.1	5,089	11.5	4,523	13.1	2,207	8.3	1,727
District of Columbia.....	12.3	6,955	11.1	2,877	13.1	1,876	9.0	1,927
Florida.....	220.0	99,975	193.8	77,571	236.5	40,946	148.5	56,163
Georgia.....	63.7	26,372	52.9	18,545	68.5	8,258	31.1	7,034
Hawaii.....	19.1	11,713	14.8	8,707	22.2	2,194	7.9	1,542
Idaho.....	7.6	2,772	6.2	1,946	7.7	1,052	3.7	745
Illinois.....	136.0	57,470	119.7	50,781	144.7	24,090	82.7	23,004
Indiana.....	32.7	8,581	28.9	13,613	37.0	5,652	19.0	4,427
Iowa.....	27.9	8,899	26.3	11,074	32.5	5,211	21.3	3,227
Kansas.....	26.3	5,516	21.9	9,230	26.8	3,676	16.1	3,696
Kentucky.....	28.5	8,765	23.4	10,847	30.3	5,825	15.2	4,835
Louisiana.....	28.6	8,879	28.6	10,173	30.2	4,470	19.9	5,810
Maine.....	14.8	7,595	14.9	6,875	16.1	1,626	10.7	3,417
Maryland.....	61.2	29,526	54.7	25,835	61.1	9,046	36.6	9,932
Massachusetts.....	102.7	45,217	81.3	27,447	106.2	12,233	51.5	11,172
Michigan.....	77.7	21,908	70.8	31,221	84.2	11,601	48.2	10,214
Minnesota.....	40.1	10,336	36.0	16,372	42.5	4,825	27.0	6,014
Mississippi.....	16.2	5,628	15.1	4,094	16.1	1,909	7.5	1,619
Missouri.....	47.5	11,445	46.2	21,592	53.5	7,784	30.1	9,594
Montana.....	8.6	2,884	8.5	1,927	9.9	930	7.8	1,094
Nebraska.....	17.6	5,560	13.5	8,778	20.1	2,337	13.0	2,356
Nevada.....	20.4	16,291	15.3	5,455	19.4	2,782	9.2	3,009
New Hampshire.....	13.3	6,189	12.8	5,156	14.6	2,415	8.8	1,697
New Jersey.....	148.2	67,294	130.3	46,550	154.7	23,679	93.3	17,577
New Mexico.....	13.4	4,744	10.5	2,367	14.7	1,702	8.3	1,504
New York.....	281.9	132,342	240.1	96,066	317.4	45,713	186.4	43,936
North Carolina.....	67.3	29,109	61.2	26,572	69.6	9,463	40.4	11,174
North Dakota.....	8.9	2,570	6.2	1,163	9.6	1,305	6.7	708
Ohio.....	82.6	24,421	83.3	43,581	94.9	13,995	59.4	12,745
Oklahoma.....	25.5	5,522	23.6	7,455	28.9	6,548	14.5	4,799
Oregon.....	21.7	5,971	20.1	8,531	23.6	3,036	15.1	4,359
Pennsylvania.....	115.3	36,382	100.5	38,296	124.0	17,870	79.9	18,828
Rhode Island.....	16.0	4,933	13.0	4,064	16.6	3,195	11.4	2,445
South Carolina.....	38.5	14,391	30.1	10,212	40.2	3,628	21.8	2,848
South Dakota.....	7.0	2,269	5.0	1,344	6.6	584	2.1	475
Tennessee.....	43.3	17,771	33.5	12,200	43.8	5,838	22.4	6,595
Texas.....	168.8	70,885	140.5	49,179	172.8	26,969	95.8	21,813
Utah.....	7.2	3,624	5.9	2,996	7.6	899	3.7	1,078
Vermont.....	6.0	1,912	6.5	3,256	6.7	1,006	4.2	786
Virginia.....	67.1	34,041	55.2	26,328	66.7	9,762	38.6	7,804
Washington.....	56.4	28,394	47.4	19,846	59.1	7,992	35.5	6,225
West Virginia.....	8.6	1,551	7.3	3,218	9.1	884	4.9	1,197
Wisconsin.....	33.9	13,526	31.5	15,860	35.2	4,151	24.1	5,265
Wyoming.....	5.5	2,761	5.5	1,642	5.5	716	4.2	652
Other areas ¹	5.6	3,892	5.8	1,628	7.1	1,275	2.7	625

¹ U.S. citizens domiciled abroad. Persons who acquired U.S. citizenship solely by the virtue of being a citizen of Puerto Rico or the Virgin Islands are not included.

NOTE: Detail may not add to totals because of rounding.

The Relationship Between Realized Income and Wealth

A Report From A Selected Sample of Estates Containing Farms or Businesses

by C. Eugene Steuerle, Ph.D

Income from wealth can be realized or unrealized for both tax and accounting purposes. Generally, realized income is in the form of direct cash flow from the underlying assets, while unrealized income is in the form of appreciation in the value of the assets. This division is not pure. The selling of an asset, for instance, causes a cash flow from previously unrealized income.

The Federal income tax is primarily a tax on realized income. The base for calculating the tax is essentially the cash receipts of the taxpayer less certain outlays for business costs. Imputations of changing asset value are normally not used, except in the case of depreciation of qualified assets.

In filing their income tax returns, taxpayers provide direct information on the amount of their income realization. These data are used for a wide variety of studies, ranging from national income accounting to analyses of behavioral reactions to tax disincentives. Whatever their limitations, income tax returns are widely believed to be one of the best sources of microdata on realized property income, partly because they do not suffer from the amount of underreporting present in survey data.

Unfortunately, previous comparisons of households on the basis of realized income suffered from the drawback that there was no information on the wealth which was the source of property income. One draws very different conclusions about a household which realizes \$10,000 in property income if the associated value of its property is \$100,000 than if it is \$1,000,000. Because unrealized income is not reported or even calculated by most households, knowledge of the wealth of households, when combined with other information on economic rates of return on assets, would also give a means of determining whether much economic income goes unrealized for tax purposes.

On a separate track, however, work has proceeded on the use of estate tax returns as a source of wealth data [1]. These data are highly valued because of the requirement of complete assessment of property value at death and because there have been serious problems of nonresponse and underreporting when other attempts have been made to gather data on the wealth of households.

The availability of a small national sample of estate tax returns matched with the previous year's income tax returns made possible a unique opportunity to examine the relationship between realized income from capital and the underlying value of the assets

that produced that income. This data set is especially rich in information on reported rates of return on closely held assets, as the sample consists of farmers and businessmen with substantial amounts of such assets at time of death. For purposes of this article, the ratio of realized income to value of wealth shall be referred to as the realized rate of return or simply the rate of return. The realized rate of return differs from the actual economic rate of return by the amount of unrealized income or other income on capital not reported on the tax return.

For this sample the size of the realized rate of return on all wealth is found to be around 2 percent, much less than would be recognized if that wealth were invested in the lowest paying savings account. Even when wage income is added to capital income (because of the difficulty of separating the two components), the amount of realized income is still less than 4 percent of the total value of assets.

Because economic theory holds that each investor equalizes after-tax rates of return on assets of equal risk, it is difficult to believe that these low realized rates of return actually reflect equally low economic rates of return. Indeed, if account is made for the illiquidity and riskiness [2] of many of the assets held by members of the sample, one would expect that the average economic return of these individuals would be in excess of the rate of return received by individuals holding less risky assets such as savings accounts and, therefore, considerably in excess of the rates of return realized for tax purposes. In a related paper [3], it was reported that the net income from capital reported on individual tax returns is less than one-third of the net income from capital (excluding inflationary returns) in the economy. The evidence presented here is consistent with the earlier finding that much income from capital is not reported or required to be reported on individual income tax returns.

This study also finds that the realized rate of return varies according to certain economic circumstances of the taxpayer. The realized rate of return on all assets generally declines as the value of assets increases. Even after accounting for portfolio differences, regression analysis reveals that there is still a significant rate of decline. In terms of portfolio differences themselves, the greater the percentage of assets which are closely held, the lower the realized rate of return on all assets. Additionally, farmers and owners of real estate businesses tend to realize lower rates of return on their total portfolio than other businessmen.

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This low ratio of realized income to economic income has a number of implications for both policy and research. For expenditure and tax policy, these results imply that realized income is not a very reliable measure of well-being, at least for persons with substantial ownership of capital. If need is based on economic income, then an expenditure program may be inadequately targeted if grants vary only with realized income. A similar limitation applies to the individual income tax system, where realized income is used as the measure of ability-to-pay.

Moreover, the efficiency of investment in the economy may be seriously distorted when the tax rate (or the potential for not realizing income) varies by asset type. Tax considerations lead individuals to invest more in assets for which smaller portions of total economic income are realized as income subject to tax. Resulting portfolio adjustments lead to a sectoral misallocation of investment.

The low ratio of realized income to asset value has implications for a number of related areas of research. Realized income is often used to measure the degree of inequality in society and counts of those in poverty [4]. This study provides further evidence of the extent to which such data, if not adjusted to account for unrealized income or wealth, must be interpreted with a good deal of caution.

Finally, realized income is sometimes used by researchers as a means to estimate wealth of households. Under the investment-income approach to wealth estimation, the wealth of an individual in a particular asset is estimated by dividing the realized income (data sources generally contain information only on realized income) from that asset by the expected rate of return on that asset.[5]. This article presents one of the few independent estimates of such rates of return, and perhaps the only independent estimate for those who wish to apply wealth/income multipliers to income tax return data.

SOURCE OF DATA

This study uses a sample of 117 estate tax returns matched with the income tax returns of decedents for the calendar year before the year of death. The estate tax returns were filed during 1973 (for deaths generally in 1972 or 1973), while the income tax returns usually covered calendar 1971 or calendar 1972 income. Each estate in the sample had a gross estate of \$60,000 or more, contained a large percentage of assets in the form of closely held business or farm, and its executor applied for deferred payment of estate tax. To be more precise, this study uses a random sample of returns which applied under IRS Code Section 6166 for an extension of time for payment of estate tax. Under this provision, the value of the interest in the closely held business must exceed 65 percent of the adjusted gross estate.

Although this study presents heretofore ungathered information on the important relationship between income and wealth for owners of closely held assets, ideally the sample would have included all estate tax returns, not just those with closely held assets. Nonetheless, it is hoped that this study will prove to be an important first step in estate-income analysis and a useful catalyst for comments on alternative approaches to using such data. Although the hypothesis cannot be tested here, we might also expect that much of the portfolio behavior of this sample is similar to that of wealthholders with similar amounts of wealth, especially with regard to behavioral responses to tax incentives.

The match of the estate tax with the previous year's income tax allowed a direct comparison of the income from capital with the value of the capital that produced that income. Since the year of death differed by one or two years from the year in which the income was recorded, the comparison was not exact. The value of an asset may have differed slightly from year to year, and the taxpayer may have engaged in purchases and sales of assets after the receipt of the income, but before death. In order to file for an extension of payment of estate tax, however, most of the assets for members of this sample had to be held in closely held businesses at time of death, and sales of portions of closely held businesses are often difficult. Moreover, to the extent that consumption was likely to be financed out of sales of assets, any bias in the estimates of realized rates of return would be upward. However, if wealthholders tend not to consume out of their wealth [6], then the bias due to inexact match of year of income and year of valuation of assets is slightly downward, and the wealth measure should be discounted about one year.

Any bias due to the inexact match of year of death and year of income is still likely to be small. However, there are two tax accounting reasons why there is almost certain to be a net upward bias in the realized rate of return measures. First, valuations of farms and businesses for estate tax purposes are typically low. While estimates of value must be reasonable, there clearly is a tax incentive for executors and heirs to provide the lowest among reasonable estimates. Second, the measure of asset value includes only the assets of the deceased, while the income measure may include both the deceased's former income and that of a spouse.

Practically all of the data items were taken directly from the estate and income tax returns. Further information on items of data is contained at the end of this article.

REALIZED RATES OF RETURNS

Average rates of return for various asset types and various gross estate classes are presented in Table 1. (Estate classes are split so as to provide equal sample sizes in each class.) For closely held business assets of all members of this sample, income was only 1.15 percent of the value of the assets (3.56 percent is the average of the individual rates of return, if no weighting of individuals by amount of assets is made). Even this estimate may be high, as data limitations required attribution to the closely held business of all business and farm income reported on related tax schedules [7].

The rate of return for corporate stock is the dividend rate. To the extent that capital gains are earned and realized on such stock, the estimate of the realized rate of return from ownership of corporate stock does not reflect the total return. It is not possible in this study to separate out capital gains on corporate stock from other capital gains nor to know the year in which those capital gains were accrued. Dividends on nonclosely held stock equaled 2.32 percent of assets. This figure can be contrasted to a Standard and Poors dividend rate on 500 stocks of 2.84 percent for 1972 and 3.14 percent for 1971.

While all asset types exhibit realized rates of return which are low, the rate of return for stock of closely held corporations is the lowest of all. Closer examination of the data indicates that, of 49 persons owning stock in closely held corporations at

time of death, only 16 reported any dividends at all. Of these 16 persons, 5 had dividend rates of less than 1 percent, and 12 had rates of less than 3 percent. In effect, closely held corporations, at least in this sample, are not prone to pay out dividends. This result should not surprise us, for corporations (other than subchapter S corporations) are subject to corporate tax. Wages and dividends are both taxable to the individual recipient, but only wages are deductible against corporate tax.

When all nonwage income [8] is treated as capital income, the income for all members of the sample is only 1.88 percent of their assets. Capital income includes income from all nonwage sources, including savings accounts and capital gains, while the asset measure includes value of homes and durables. In practice, it is impossible to separate capital income from wage income for owners of business and farms. These owners may receive capital income in the form of wages or labor income in the form of profits. By adding income designated as "wages" to capital income, then, we can derive an upper bound for the income earned on all assets. Total income is still only 3.66 percent of the value of assets.

No matter what the measure of realized rate of return or the gross estate class, the rate is quite low--less than the lowest paying savings account. Moreover, as noted in the previous section, this method of estimation probably results in an overstatement of the rate actually declared. When wages are added to income from capital, the resulting measure of the realized rate of return from capital is biased upward even more.

REGRESSION RESULTS

From Table 1, it appears that the realized rate of return decreases as gross estate size increases and that the rate of return is lower for closely held businesses than for other assets. For tax reasons, of course, we should not find such results surprising. Larger gross estate sizes are generally indicative of higher marginal tax rates. Taxpayers with higher marginal tax rates shift toward assets for which exclusions of income from tax are possible. Moreover, assets cannot be costlessly exchanged once they have appreciated in value (that is, investors become "locked into" their assets because of the capital gains taxes); therefore, past as well as current marginal tax rates may have induced the particular portfolios observed at any one point in time. Indeed, current wealth may be more representative than current income of the marginal rates which influenced the existing portfolio.

While tax effects clearly induce the distribution of assets among different income and wealth groups, the data are insufficient to determine whether these low realized rates of return imply low economic rates of return as well [9]. Economic theory does hold that after-tax rates of return on assets of equal risk are equilibrated across assets and that differentials in tax rates will become reflected in different before-tax rates of return on the assets. [10] However, this study finds that lower realized rates of return are generally associated with assets considered to have higher risk. Thus, the tax effects may indeed have lowered the economic rate of return on risky, but tax-preferred, assets relative to other assets; however, the economic rate is still likely to be higher for these risky assets than for many less risky investments such as interest-bearing financial instruments. Empirical evidence generally has borne out the finding of higher economic rates of return to

assets with higher risk [11, 12]. There is no reason to suspect that such findings are not also applicable to this sample.

There are two related reasons to believe that lower realized rates of return do not imply lower economic rates of return for persons with large amounts of wealth. First, the very presence of large amounts of wealth means that top wealthholders are likely to have been persons who were successful, rather than unsuccessful, in their investment. Second, top wealthholders are also likely to be persons who accumulated rather than consumed much of their income. In this case, a lower realized rate of return may simply indicate that persons with higher rates of savings do not need to realize as much income to finance their consumption.

One means of testing this last hypothesis is to see if increases in wealth significantly affect realized rates of return even after accounting for differences in portfolio allocation. Such a finding would lend support to the notion that larger wealthholders are more likely to take advantage of the option not to realize income even when they receive equal before-tax rates of return on particular types of assets.

In this section we use regression analysis to find out whether the relationship between realized rate of return and wealth is statistically significant and, further, whether realized rates of return vary by type of asset held, e.g., by type of closely held business: farm, real estate, or other business. Accordingly, regressions were run using rates of return from closely held business or farm (noncorporate), corporate stock, and all assets as dependent variables. In the case of all assets, wage income is both excluded and included in the measure of income and, hence, rate of return from those assets. Recall that for owners of closely held business, it is often difficult to separate wage from capital income.

Table 2 presents the results of these regressions. For each dependent variable, one equation was run using only one independent variable--the value of the assets from which the related income is derived. For instance, if the rate of return from corporate stock is the dependent variable, the independent variable is the value of all corporate stock in the estate. In remaining equations, other possible explanatory variables are added: the value of all other assets, income other than the income from the particular assets being examined, dummy variables for closely held business comprised entirely of farm assets or of real estate assets, and variables which reflect the percentage of assets in closely held or corporate form.

The first equation of each series is meant primarily to be descriptive of the data. We check to see whether rates of return for closely held assets and all assets decline as the amount of ownership of those assets increase. As suggested by the summary data reported in the previous section, these do indeed decline and the relationship tends to be significant for all except corporate stock, although for closely held business (noncorporate), the relationship is significant only at the .10 level. Although not reported in Table 2, similar regressions using value of all assets (rather than assets from which the income was derived) as the only independent variable show similar results--a decline in realized rate of return for all except corporate stock as the value of assets increases.

The rate of return for closely held businesses or farms is found to be sensitive primarily to the value of other assets (see equation 1b). For a \$1 million increase in value of assets other than closely held businesses, the rate of return on closely held business goes up by 11.0 percentage points. For a \$1 million increase in closely held business assets, the realized rate of return on those assets goes down by 1.8 percentage points, but the relationship is no longer significant. A possible explanation of this result is as follows: as noted before, owners of closely held business have a great deal of discretion as to when to realize income, and, like other wealthholders, they tend to realize lower rates of return as their wealth increases. However, persons who show greater amounts of other assets include both those who are diversifying in order to obtain better or less risky returns elsewhere and those who find it necessary to realize more income in order to obtain more liquidity, perhaps to cover consumption needs. In summary, for owners of closely held business, the presence of larger amounts of other assets indicates a greater current tendency to realize income from the closely held assets themselves.

Other variables add little to the explanation of the realized rate of return on closely held business. Other income [13]--in part a proxy for marginal tax rates applying when the first dollar of income is received from the business--is insignificant, as are dummy variables for farm and real estate. As noted above, however, past marginal tax rates may be more appropriate than current marginal tax rates when examining those parts of portfolios which are especially locked in due to past investment decisions.

Turning to corporate stock, we find that only the "percentage of stock held closely" tends to explain much of the difference among individuals in rates of return (equation 2b). Given the tax incentive for owners of closely held corporations to pay wages in lieu of dividends, we expected the dividend rate on closely held stock to be lower than the dividend rate on other corporate stock. This is indeed what we found.

A number of theories assert that taxpayers with higher-than-average marginal tax rates will tend to hold corporate stock with lower-than-average dividend rates [14]. However, we found no significant negative correlation between the dividend/price ratio and income (or wealth) in this sample.

In equation (3b), we test whether the rate of return on all assets, capital income only, is related to several variables: value of assets, amount of other income, type of closely held business--farm, real estate, or other business, and percentage of assets in 1) noncorporate, closely held form, 2) stock of closely held corporations, and 3) stock of nonclosely held corporations. Only "other income" and "percentage of assets in noncorporate, closely held form" are significant at the .10 level [15].

The percentage of assets in noncorporate, closely held form is significant not only in equation (3b), but in all equations in which it is introduced as a variable. However, equation (2b) is the only equation in Table 2 in which "other income" is significant, although only at the .10 level. Economic theory suggests that as other income goes up and marginal tax rates rise, taxpayers would tend to control their portfolios so as to minimize the extent to which the economic return from assets is realized for tax purposes. The insignificance of "other income" in equation (1b), as contrasted to (3b), would indicate

that total portfolio rates of return are likely to be controlled through adjustments in asset holdings other than holdings of closely held business. A simpler explanation is that the measure of capital income, or the distinction between wage and capital income, is especially poor for closely held business assets.

Equation (4d) is similar to equation (3b), except that wage income is included in the income from the assets and there is no "other income" since all income is included in the rate of return variable. In equation (4d), a decline in realized rate of return is indicated as asset value increases. Since this equation allows for various portfolio adjustments, the significance of the asset value variable lends support to the hypothesis that top wealthholders lower their realized rates of return not only through portfolio adjustments, but also by simply realizing less of their income for tax purposes.

In terms of portfolio variables, equation (4d) also indicates a significant decline in rate of return as the proportion of the estate in noncorporate, closely held business increases. Even after adjusting for the proportion of assets held closely, owners of real estate have a much lower rate of return relative to owners of other business. Contrasting this equation to equation (3b)--in which the ownership of real estate is not significantly related to the rate of return on capital--would indicate that owners of real estate businesses pay themselves a lower wage rate (relative to value of capital) than owners of other businesses, while realizing about the same rate of capital income. Again, this does not imply a lower economic rate of return to owners of real estate, since owners of land and buildings may have substantial unrecognized income through appreciation in the value of assets.

Equations (4b) and (4c) are presented primarily to show the effect of variables reflecting farm or real estate (as opposed to other business) ownership separately from the effect of portfolio allocations into noncorporate, closely held assets and corporate assets (both closely and nonclosely held). Note that farm owners tend to realize less than owners of other business in equation (4b), but that this difference seems to be explained in equation (4d) by the allocation of the portfolio among closely held and nonclosely held assets, i.e., farmers realize lower rates of return on their total portfolio by holding a greater percentage of their assets in the closely held form.

SUMMARY

The realized rate of return on all assets for owners of closely held businesses and farms is quite low. The rate tends to decline both as wealth increases and as the percentage of wealth in noncorporate, closely held form increases. Dividend rates for closely held corporate stock are lower than rates for other corporate stock and often are zero. Counting both wages and other income, the realized rates of return for owners of real estate business are lower than those of other businesses. Farmers also tend to realize lower rates on their total assets than other business owners, but the difference tends to be reflected in a greater percentage of assets held in closely held form.

Although this source of data provides new and important information on the relationship between income and wealth, it does not allow determination of whether the decline in realized rates of return as wealth increases implies a similar decline in economic

rates of return. Three factors, however, argue against such a result. First, the assets held by top wealthholders tend to be more risky; other sources of data have tended to confirm higher rates of return for riskier assets. Second, persons who accumulate wealth are likely to have achieved such accumulation through successful investment in assets with relatively high rates of return. Finally, even after adjusting for portfolio changes, rates of realization were still found to decline significantly as wealth increased. My conclusion is that tax effects do cause portfolio shifts and do lower the economic rate of return on risky, but tax-preferred, assets relative to other assets. However, this economic rate of return is still likely to be higher for the risky assets held by top wealthholders than for other assets. Moreover, there remains a realization effect: that is, for many tax pre-preferred assets, the rate of realization of income is somewhat discretionary in nature, and it declines as wealth increases.

These low realized rates of return call into serious question the use of realized income from capital as part of any measure of well-being or ability-to-pay. For owners of capital, economic income may have little relationship to realized income, and rates of realization may vary according to the assets they hold. Tax and expenditure programs based upon realized income can produce inequitable results and may lead individuals to allocate their investments inefficiently.

SUPPLEMENTAL INFORMATION ON SOURCES OF DATA

Each income tax return contained items of income such as wages, interest, dividends, farm income, rental income, partnership income, and business income. Each estate tax return identified value of gross estate, real estate, corporate stock, farm and non-corporate business assets, and value of closely held business. This last item was required of taxpayers to determine eligibility to file for the extension of time to pay the estate tax. By turning to worksheets and schedules attached to the returns, it was possible to differentiate wages from closely held business, dividends from closely held stock, and value of corporate stock in closely held business. In addition, the value of own home was separated from value of all other real estate. In most cases, the value of own home could be found in the documents attached to the estate tax return. However, in some cases--particularly where there was a farm--the presence of a home was indicated but the value of the house was not separated from the reported value of the farm or real estate. To impute a value of own home in these cases, two regression analyses were run. In the first regression, the sample consisted of all farms or ranches where value of own home was known. In the second regression, the sample consisted of all nonfarm estates where the value of own home was regressed against size of gross estate. These regressions were then used to impute the value of own home to those estates where a home was likely to be present, but where a value was not reported. The value of real estate in closely held business and the total value of closely held business assets were then adjusted by the value of own home.

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- [7] Income from closely held business is calculated as the sum of business income, partnership income, rental and farm income. To the extent that there may have been some partnership income which came from sources which did not qualify as closely held business, for instance, the rate of return from closely held business may be overstated.
- [8] Income equals adjusted gross income as reported on tax returns. Except for a few items of exclusion, generally small in nature, adjusted gross income equals gross income.
- [9] The economic rate of return discussed here is before individual taxes, but after corporate taxes. The before-corporate tax economic rate of return on noncorporate assets is generally believed to be lower than the rate obtainable on corporate investment.
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Table 1. — Realized Rates of Return¹
(percent)

Type of asset	Gross estate class			
	\$60,000-\$362,000	\$362,000-\$840,000	\$840,000 or more	All classes
Closely held.....	2.22	1.78	0.47	1.15
Business (non-corporate).....	(2.45)	(3.78)	(4.69)	(3.56)
Corporate stock - total.....	0.81	2.18	1.24	1.30
a. Closely held.....	(2.03)	(4.09)	(1.94)	(2.66)
0.21	0.21	2.26	0.93	0.96
(0.22)	(0.22)	(3.00)	(0.85)	(1.08)
b. Non-closely held.....	4.14	2.10	2.27	2.32
(5.22)	(5.22)	(3.87)	(2.95)	(3.79)
All assets--capital income only.....	3.24	3.33	1.29	1.88
(3.38)	(3.38)	(3.39)	(1.82)	(2.86)
All assets--capital + wage income.....	6.57	4.67	2.99	3.66
(6.33)	(6.33)	(4.73)	(3.89)	(4.98)

^{1/} Top numbers: Weighted average rates of return (or $\frac{\sum \text{income}}{\sum \text{value of assets}}$).

Bottom numbers, in parentheses: Unweighted average rates of return (or $\frac{\sum (\text{income/assets})}{n}$).

Size of sample (by row, respectively): 1. (28,35,21,84)

2. (19,25,33,77)

2a. (13,9,27,49)

2b. (13,23,24,60)

4. (39,39,39,117)

Table 2. — Regressions for Realized Rates of Return¹

Regression number	(1a)	(1b)	(2a)	(2b)	(3a)	(3b)	(4a)	(4b)	(4c)	(4d)
Dependent variables	Rate of return on closely held business (non-corporate)		Rate of return on corporate stock		Rate of return on all assets--capital income		Rate of return on all assets--capital + wage income			
Independent variables										
Constant.....	5.40** (1.52)	2.47 (2.79)	3.27** (.94)	5.19** (1.67)	3.67** (.56)	5.93** (1.72)	6.06** (.75)	7.25** (.72)	12.71** (2.76)	9.89** (1.95)
Value of underlying assets (in millions of dollars).....	-3.95* (2.15)	-1.80 (2.63)	-1.01 (.86)	-.23 (1.11)	-.88** (.41)	.02 (.35)	-1.18** (.55)	-.63* (.38)	-2.05** (.52)	-.76** (.38)
Value of other assets (in millions of dollars)...		11.03** (3.01)		-.40 (1.63)						
Other income (in millions of dollars)...		-38.72 (64.00)		5.51 (21.32)		-33.79* (17.07)				
Farm.....		.29 (2.95)				.78 (.97)		(2.86** (.87)		-1.06 (1.10)
Real estate.....		-4.01 (3.43)				-1.06 (1.00)		-3.57** (1.02)		-2.68** (1.10)
Percentage of corporate stock held closely.....				-4.61** (2.18)						
Percentage of assets in non-corporate, closely held form.....						-3.73* (2.01)			-9.79** (3.21)	-5.39** (2.32)
Percentage of assets in stock of closely held corporations.....						-3.45 (2.36)			-2.93 (3.86)	-3.34 (2.71)
Percentage of assets in stock of non-closely held corporations.....						-3.15 (3.23)			-3.43 (5.30)	.84 (3.73)
Size of sample.....	84	71	77	77	117	100	117	100	117	100
R ²	.040	.398	.018	.081	.039	.137	.039	.159	.253	.238

^{1/} Standard errors are shown in parentheses.

* Significant at the .01 level.

** Significant at the .05 level.

WEALTH, REALIZED INCOME, AND THE MEASURE OF WELL-BEING

by C. Eugene Steuerle, Ph.D

4.1 Introduction

All modern societies attempt to measure well-being of their people for both policy and research purposes. Government must explicitly define well-being for purposes of designing tax and welfare policies, while researchers must explicitly choose classifications by which to compare data and perform statistical analyses.

Measures of well-being involve a contrast of means with needs. This chapter falls within that set of studies that deal with the measurement of means (Steuerle and McClung 1977; Smeeding 1982; David and Smeeding 1985). Changing the measure of means does not necessarily imply that households are better or worse off, nor that the government should collect less or spend more for any particular type of program. Given any standard of needs, however, it will be possible to assert that the distribution of means, and therefore of well-being, changes significantly as the measurement of means is changed.

Attention will be directed toward the measure of well-being used most widely today—realized income—and its relationship to wealth and economic income. Using a unique national sample of income tax returns matched with estate tax returns, this chapter will compare the realized property income of individuals with the associated amount of wealth that generates that income.

The purpose of this study is twofold. First, with respect to wealth holders, realized income (with emphasis on the word realized) is demonstrated to be an extremely poor measure of well-being. As a consequence, substantial inequity is introduced into tax and welfare programs. If the goal of these programs is to measure real economic

income, that purpose may be better served by first obtaining measures of property or wealth than realized income. Second, in reporting the initial findings of the first national estate-income collation, this chapter shows the promise of this approach to research on the relationship between wealth and income. Whatever the problems, and they are not few, this estate-income collation may provide the best national data ever assembled for studying the wealth-income relationship for persons with significant amounts of wealth.

4.1.1 Source of Data

This study uses a collation of estate tax returns, income tax returns of decedents in years before death, and income tax returns of heirs in years both prior to and following the death of the persons granting the bequests. The estate tax returns were filed in 1977 (for deaths generally in 1976 or 1977), while income tax returns were collected for years 1974 through 1980. Each estate in the sample had a gross estate of

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\$60,000 or more (\$120,000 or more for decedents dying in 1977). The collation sample was a one-in-ten sub-sample of the sample of over 41,000 estate tax returns used for purposes of the Statistics of Income-Estate Tax Returns (U.S. Department of the Treasury, Internal Revenue Service 1979) and for related wealth studies (Schwartz 1983).

While the collation sample began with 4,143 estate tax returns, in many cases there was an absence of accurate reporting of bequests made, and many income tax returns could not be found or were not filed for both decedents and heirs. For purposes of this study, therefore, two subsamples were used: decedents with income tax returns in the year prior to death (sample size, 2,924); and nonspousal heirs for whom a bequest of \$50,000 or more could be determined, while income tax returns were filed in a year prior to and a year following receipt of inheritance (sample size, 1,451).

The match of a decedent's estate tax return with the previous year's income tax return allowed a direct comparison of the realized or reported income from capital with the value of capital that produced that income. Similarly, the match of a bequest amount with income tax returns of an heir in years both prior to and after receiving the inheritance allowed comparison of the change in realized or reported income with a change in wealth.

Both types of comparisons suffer from the inexact match of income with wealth. Under ideal conditions, one would want to compare income on an instantaneous flow basis with the stock of wealth at a given point in time. The estate-income collation falls short of that ideal in two respects. First, only annual flows of income are reported. Second, accounting for wealth takes place in a period different from that in which income is measured. Because partial-year returns are often filed on behalf of decedents in year of death, obtaining an annual measure of income requires the use of an income tax return in a year prior to death. In measuring change in income for heirs, on the other hand, it was necessary to allow a sufficient time

to elapse so that income from inheritances would be reflected in the income tax returns rather than returns of estates. For both decedents and heirs, therefore, the comparison of income with wealth is inexact to the extent that any wealth transfer (not reported on estate tax returns), consumption out of wealth, or wealth accumulation out of income took place between the points in time at which measurements were made. Those problems are believed to be minor for the vast majority of returns, although important in a small number of cases.

For tax accounting reasons, a net upward bias exists in the measure of realized rates of return. Valuations for estate tax purposes are typically low for reported assets, especially businesses, farms, houses, and other illiquid or infrequently traded assets. Estimates must be reasonable, but there is a strong incentive to provide the lowest among available estimates. In addition, much wealth from life insurance and pensions does not pass through estates, so estimates of value of estates and inheritances are understated. Observations are also excluded from each subsample when income tax returns of decedents or heirs could not be found; in some of these cases, the decedent or heir did not file a return because of low amounts of realized income.¹

Finally, the collation file has not yet been merged to obtain estate tax weights; therefore, the reported data are unweighted. Fortunately, estate tax filers were sampled according to size of gross estate. Weighted results in each wealth or similar class therefore would differ little from unweighted results, and most issues of within- or between-class differences can be addressed either way.

While these problems mean that the data must be interpreted with caution, the estate-income match still offers the possibility of vast improvements in our understanding of the wealth-income relationship for persons with significant wealth holdings. An analogy might be provided by the improvement in our understanding of the wealth distribution first obtained through the efforts of Lampman (1962) and Smith and Franklin (1974). Both then and

now, the advantage of using administrative data stems in part from the considerable underreporting of wealth and income from property in survey data, even surveys dedicated to the measurement of such items. The evidence is fairly conclusive: even though there is some bias to underreport for tax purposes, population estimates of income from property or of wealth are much higher when using tax return data than survey data. As will be seen, the variation in realized rates of return is so great across taxpayers that our qualitative conclusions with respect to horizontal equity would hold even in the presence of significant bias and limitations of data.

4.2 Why Realized Income is Used as a Measure of Well-Being

The most common measure of well-being used for both statistical and policy purposes is realized income. Realized income is used to define income tax burdens, eligibility for various tax expenditures such as deductions for cost of health care and property tax relief, amount of assistance in various welfare programs, and distributions of income by class in many, if not most, census and survey analyses. The reason for this dominance is partly the result of historical circumstances. Originally, both in England and America, ability to pay was measured by property ownership (Musgrave 1959). In modern times, however, income has come to dominate other measures such as property as the prime measure of ability to pay and eligibility to receive. A major explanation for this shift is the increasing importance of wage income to most households' well-being. When labor income for most households was thought to equal only subsistence income, was derived in the form of self-employment income, or was paid in the form of in-kind benefits such as crop sharing, it was largely treated as both nontaxable and nonmeasurable.

With the development of the modern firm and the rise of the middle class, the problems of nontaxability and nonmeasurability dwindled enormously. Wage income now was large, varied markedly from one individual to the next, and could no

longer be treated merely as subsistence income. In addition, there was a significant improvement in the availability and accuracy of measures of income because wage payments were entered in two different sets of accounts: those of employers and employees. Increasingly, therefore, the measure of ability to pay or eligibility to receive has come to be defined as wage-plus-property income. This measure of means is often compared to a measure of needs such as a subsistence level of income, with income taxes being imposed principally above that level, and income-conditioned grants or subsidies targeted mainly below that level.

Property is still used today to measure well-being for certain purposes, and debates do take place over such issues as assets tests in welfare programs and methods of valuation for wealth subject to property tax and estate tax. Income has become the dominant measure of well-being for most tax and welfare purposes, nonetheless, and property-related issues have declined in relative importance. Moreover, since wage income is a major source of total income, the accuracy of the measure of wage income has tended to make income itself appear to be accurately reported or measured, at least in aggregate terms.

In recent years, there also has been increasing emphasis on providing incentives for investment and savings, perhaps even replacing an income tax with a consumption tax. This new emphasis has had an impact upon attempts to reflect more accurately property income or other current measures of wealth in on an income or consumption basis, is viewed by some as an insignificant issue. Although theoretically one can argue that improvement in the measure of property or property income need have no impact on marginal tax rates paid on returns to capital, it is sometimes feared that improvements in the measure of property income will not result simply in a more uniform treatment of such income, but also in an increase in the taxes paid on returns to capital. As one example, the accelerated cost recovery system (ACRS) was designed with little concern over the actual rates of depreciation of assets. The word

depreciation was deliberately omitted in 1981 tax changes in favor of the term *cost recovery* to make clear that the accurate measure of income was no longer a policy goal. We will return in section 4.5 to the question of whether it is possible to move closer to the goal of horizontal equity regardless of the choice between consumption and income taxes.

4.2.1 The Realization Base

In one sense the switch to income as a measure of well-being was as much a result of, as a cause of, prevalent accounting practices. Accounting practices were also extremely influential in determining that the measure of income to be used for most policy, as well as statistical purposes, would be based primarily upon realizations. Accounting for income, with a number of exceptions, has been associated with the realized payment and receipt of cash. The exceptions apply primarily at the business level, where accrual accounting is applied to such items as inventories and accounts receivable, and investment in plant, equipment, and buildings is treated differently from other expenses.² At the household level, however, measures of income for tax, welfare, and other purposes have tended to be recognized only when they show up in the form of cash. (This cash flow logic by the way, also helps explain the reluctance to count payments of in-kind benefits in the measure of income.)

It is well-known that measuring income only when it shows up as household cash flow falls short in several respects of a Haig-Simons definition of economic income. The measure ignores implicit flows of services from housing and durables, accruals (less realizations) of gains and losses on assets, and often accruals of rights and services provided through insurance and pension plans. In addition, in an inflationary environment, a cash-flow-based measure tends to reflect nominal returns from assets, not real returns. Real payments and receipts of interest, for instance, are overstated by the inflationary component of the interest rate. Traditional measures of income of households are distorted, therefore, by nonrealiza-

tions of service flows, gains on assets, and accruals of benefits in certain institutional accounts, as well as by the failure to make proper adjustments for inflation.

In 1979 the income from over 80 percent of assets was found to benefit from one tax preference or another. Most of these preferences were a direct result of the tendency to recognize property income only when it showed up in the form of cash flow. As a result, only about 30 percent of the net real returns from capital were found to be reported on individual tax returns (Steuerle 1983c). These findings help support the view that at the individual level, the recognition of income from capital is in many ways a voluntary event for both tax and other purposes.

The voluntariness of the tax is actually a function of consumption needs (relative to income), risk, and knowledge. Put another way, the individual tax (and loss of benefits or implicit tax in welfare systems) on capital income is in part a tax on liquidity, risk reduction and diversification, simplicity, and ignorance. More than half of all interest and dividend receipts reported on individual tax returns are reported by taxpayers aged sixty-five and over. The elderly realize a greater percentage of their income than other wealth holders, although as a group they do not appear to draw down their wealth (Menchik and David 1983). Persons recognizing income from property are often in need of current receipts or liquid assets to cover consumption needs in the near future. For the person anticipating that savings may be needed soon, risk can also be reduced substantially by increasing the percentage of interest-bearing assets and by reducing the percentage of other assets in the portfolio. Those who realize capital gains or interest income also have greater opportunity for diversification relative to those who hold onto unrealized gains.

For many taxpayers, however, the tax is hardly paid after elaborate calculations of some optimally designed portfolio that achieves the maximum-expected after-tax rate of return. For these taxpayers, and to some extent for all taxpayers, the

tax is merely a tax on simplicity and ignorance.

It is not hard to find examples. Many persons fail to achieve tax savings obtainable by switching to assets of equal yield and equal risk, but with greater tax preference. Employer contributions to pensions can substitute for employee contributions; annuities with withdrawal rights can replace savings accounts; direct shareownership can replace ownership of mutual funds that recognize capital gains frequently, and so forth. Ownership can also be transferred among family members, a practice used less frequently than possible both by taxpayers and certain welfare (principally elderly Medicaid) recipients. The persons paying the additional direct or implicit taxes may find their time too valuable to search out alternative mechanisms for achieving tax savings and government benefits; they may find it distasteful to play socially unproductive games; or they may simply be ignorant of the laws.³

The voluntary nature of capital income realization does not imply that the total tax paid on returns from capital is too high or too low, nor that total welfare payments should be larger or smaller. Such issues are not addressed here and, to be treated properly, would require consideration of measures of needs, as well as the ways in which the various tax and welfare systems combine or stack on top of each other. What the voluntary nature of capital income recognition will imply, however, is that the taxes paid and benefits received will vary tremendously among persons in fairly identical circumstances, and that income classifiers in statistical analyses will be inaccurate for many purposes.

4.3 A Comparison of realized Income and Wealth

Aggregate data on income recognition lends support to the notion that substantial horizontal inequity is created when tax and welfare systems base the measure of well-being in part on recognized property income. To reinforce this view, we now turn to microdata on households.

Our first comparison of wealth and income is

between wealth in estates of decedents and their reported income in the year prior to death. Table 4.1 summarizes the sources of income and wealth for this sample. As is immediately apparent, by far the most important sources of recognized capital income are dividends and interest. Realized rates of return on farms and business assets are especially low, especially when it is noted that reported farm and business income represents returns to labor as well as capital.⁴

Table 4.2 narrows our focus to a comparison of gross capital income subject to tax (GCIST) and wealth. The realized rate of return declines significantly as wealth increases, reaching a low of 2.2 percent for decedents with assets of 2.5 million or more. What is equally interesting is the large variation in realized rates of return in every wealth class. At least 5 percent of each wealth class reported zero or negative returns from capital, while at least 23 percent of each class report rates of return between 0 and 3 percent.

Rates of return of 10 percent or more are reported by 30 percent of the lowest-wealth class, with the proportion dropping to 4 percent of those with assets of \$2.5 million or more. A separate analysis (not shown in the tables) was made on persons reporting unusually high rates of return. Capital gains were only a minor factor in explaining these rates; dividend and interest income, on the other hand, were implausibly high relative to total assets. Problems of accounting period differences or estate tax valuation are probably most significant for this group. That is, either many of these persons underreport wealth, or they transfer or consume wealth between accounting periods.

In table 4.3 we turn to a sample of beneficiaries other than surviving spouses, and compare the change in reported capital income between 1975 and 1978 to the amount of inheritance received in 1976 or 1977. Table 4.3 does not show any strong relationship between amount of inheritance and realized rate of return, but it does show striking differences within inheritance classes. In each class (except one class with a sample size of three), between 17 percent and 32 percent of all

Table 4.1 All Decedents: Average Income and Wealth by Source

Income by Source	Average Amount of Item	Item as a Percentage of	
		Net Income Subject to Tax	Net Worth
Salaries and wages	\$8,496	25.51	1.63
Dividends	10,425	31.30	2.00
Interest	6,951	20.87	1.33
Business (nonfarm)	1,460	4.38	0.28
Farm	-122	-0.37	-0.02
Partnership	644	1.93	0.12
Small business corporations	44	0.13	0.01
Capital gain distributions	11	0.03	-
Net capital gain	2,725	8.18	0.52
Supplemental gain	22	0.07	-
Pensions and annuities	1,220	3.66	0.23
Rents	1,751	5.26	0.34
Royalties	771	2.32	0.15
Estate and trusts	879	2.64	0.17
Alimony	34	0.10	0.01
Other	-744	-2.23	-0.14
Gross income subject to tax	34,339	103.10	6.59
Less: Interest deductions	1032	3.10	0.20
Net income subject to tax	33,308	100.00	6.39
Plus: State income tax returns	51	0.15	0.01
Less: Exemptions	2,196	6.59	0.42
Other deductions	9,224	27.69	1.77
Adjustments	227	0.68	0.04
Taxable income	22,970	68.96	4.41

Wealth by Source	Average Amount of Item	Item as a Percentage of Total Wealth
Corporate stock	\$228,813	40.7
Real estate	125,337	22.3
Cash, bonds, notes and mortgages	153,925	27.4
Noncorporate business assets	15,371	2.7
Other assets	39,185	7.0
Total wealth (total estate)	562,632	100.0
Less: Debts	41,208	7.3
Net worth (economic estate)	521,424	92.7

NOTE: Measures of income are from decedent's individual income tax return filed for year prior to death. Measures of wealth are from decedent's estate tax return.

Table 4.2 All Decedents: Gross Capital Income Subject to Tax as a Percentage of Wealth (amounts in thousands of dollars)

Size of Wealth	Total Number	Average Wealth	Average Gross Capital Income	Gross Capital Income as a Percentage of Wealth	Gross Capital Income Subject to Tax as a Percentage of Wealth		
					Zero or Negative		Gross Capital Income
					Number	Wealth	
Under \$100,000	519	72	9	12.4	41	3,269	-43
\$100,000 under \$250,000	980	164	10	6.1	66	10,460	-140
\$250,000 under \$500,000	445	344	20	5.9	22	7,597	-139
\$500,000 under \$1,000,000	668	675	34	5.1	39	25,608	-775
\$1,000,000 under \$2,500,000	255	1,458	70	4.8	18	25,638	-144
\$2,500,000 or more	57	8,272	183	2.2	9	48,197	-578
All decedents	2,924	563	26	4.5	195	120,770	-2,116

Size of Wealth	Under 3 Percent			3 Percent under 5 Percent		
	Number	Wealth	Gross Capital Income	Number	Wealth	Gross Capital Income
Under \$100,000	120	9,620	140	99	7,930	315
\$100,000 under \$250,000	263	42,429	547	235	39,291	1,541
\$250,000 under \$500,000	102	35,261	532	109	37,055	1,487
\$500,000 under \$1,000,000	168	114,206	1,273	204	139,757	5,692
\$1,000,000 under \$2,500,000	75	110,868	1,656	93	134,038	5,337
\$2,500,000 or more	23	314,916	1,211	14	71,788	2,591
All decedents	751	627,302	5,361	754	429,860	16,964

Size of Wealth	5 Percent under 7 Percent			7 Percent under 10 Percent		
	Number	Wealth	Gross Capital Income	Number	Wealth	Gross Capital Income
Under \$100,000	57	4,340	260	48	3,850	331
\$100,000 under \$250,000	161	27,583	1,623	98	15,943	1,360
\$250,000 under \$500,000	92	31,282	1,808	54	18,931	1,576
\$500,000 under \$1,000,000	119	78,818	4,628	70	47,243	3,852
\$1,000,000 under \$2,500,000	29	41,848	2,436	22	32,441	2,618
\$2,500,000 or more	7	24,838	1,462	2	6,128	507
All decedents	465	208,707	12,216	294	124,534	10,244

Size of Wealth	10 Percent under 15 Percent			15 Percent or More		
	Number	Wealth	Gross Capital Income	Number	Wealth	Gross Capital Income
Under \$100,000	42	2,968	358	112	5,192	3,237
\$100,000 under \$250,000	81	13,338	1,579	76	11,969	3,232
\$250,000 under \$500,000	40	14,490	1,716	26	8,398	1,916
\$500,000 under \$1,000,000	39	25,314	3,059	29	19,720	4,627
\$1,000,000 under \$2,500,000	11	17,137	1,925	7	9,790	3,999
\$2,500,000 or more	-	-	-	2	5,645	1,751
All decedents	213	73,247	8,636	252	60,716	18,761

Table 4.3 Change in Gross Capital Income Subject to Tax as a Percentage of Inheritance Received (Amounts in dollars)

Size of Inheritance	Number of Beneficiaries	Gross Capital Income Subject to Tax		Change in Income 1975-78	Inheritance Received	Income Change as a percentage of Inheritance
		1975	1978			
Under \$100,000	751	7,427,011	10,161,407	2,734,396	52,935,141	5.17
\$100,000 under \$250,000	521	7,693,609	11,823,199	4,129,590	80,309,871	5.14
\$250,000 under \$500,000	134	1,615,962	5,603,513	3,987,551	45,671,922	8.73
\$500,000 under \$1,000,000	42	1,506,610	2,874,181	1,367,571	28,563,514	4.79
\$1,000,000 under \$2,500,000	3	318,062	823,375	505,313	3,603,179	14.02
\$2,500,000 or more	-	-	-	-	-	-
Total	1451	18,561,254	31,285,675	12,724,421	211,083,627	6.03

Size of Inheritance	Zero or Negative			Under 5 Percent		
	Number of Beneficiaries	Change in Income	Inheritance Received	Number of Beneficiaries	Change in Income	Inheritance Received
Under \$100,000	242	(2,854,798)	16,997,682	148	294,188	10,248,779
\$100,000 under \$250,000	157	(2,079,446)	23,213,559	122	573,490	19,487,771
\$250,000 under \$500,000	31	(371,890)	10,784,633	44	434,550	14,924,315
\$500,000 under \$1,000,000	7	(43,158)	5,002,242	21	363,306	14,293,016
\$1,000,000 under \$2,500,000	-	-	-	-	-	-
\$2,500,000 or more	-	-	-	-	-	-
Total	437	(5,349,292)	55,998,116	335	1,665,534	58,953,881

Size of Inheritance	5 Percent under 10 Percent			10 Percent under 15 Percent		
	Number of Beneficiaries	Change in Income	Inheritance Received	Number of Beneficiaries	Change in Income	Inheritance Received
Under \$100,000	139	759,489	10,184,132	75	659,587	5,436,714
\$100,000 under \$250,000	110	1,314,997	17,805,773	56	1,050,233	8,529,982
\$250,000 under \$500,000	34	801,092	11,374,375	10	378,947	3,435,351
\$500,000 under \$1,000,000	8	364,623	5,392,852	3	211,936	1,879,189
\$1,000,000 under \$2,500,000	2	152,494	2,465,985	-	-	-
\$2,500,000 or more	-	-	-	-	-	-
Total	293	3,392,695	47,223,117	144	2,300,703	19,281,236

Size of Inheritance	15 Percent under 20 Percent			20 Percent under 30 Percent		
	Number of Beneficiaries	Change in Income	Inheritance Received	Number of Beneficiaries	Change in Income	Inheritance Received
Under \$100,000	34	405,801	2,355,276	43	755,138	3,085,816
\$100,000 under \$250,000	34	908,818	5,262,143	18	630,784	2,618,485
\$250,000 under \$500,000	6	317,876	1,821,144	3	223,257	1,022,271
\$500,000 under \$1,000,000	-	-	-	3	314,545	1,468,956
\$1,000,000 under \$2,500,000	-	-	-	-	-	-
\$2,500,000 or more	-	-	-	-	-	-
Total	74	1,632,495	9,438,563	67	1,923,724	8,195,528

Table 4.3 (continued)

Change in Gross Capital Income Subject to Tax as a Percentage of Inheritance (continued)			
30 Percent or More			
Size of Inheritance	Number of Beneficiaries	Change in Income	Inheritance Received
Under \$100,000	70	2,714,991	4,626,742
\$100,000 under \$250,000	24	1,730,714	3,392,158
\$250,000 under \$500,000	6	2,203,719	2,309,833
\$500,000 under \$1,000,000 } \$1,000,000 under \$2,500,000 }	2	509,138	1,654,453
\$2,500,000 or more	—	—	—
Total	102	7,158,562	11,983,186

NOTE: Table includes beneficiaries other than surviving spouses.

Table 4.4 Average Net Capital Income Subject to Tax, 1975 and 1978

Item	All Individual Income Tax Returns		Beneficiaries Other Than Surviving Spouses	
	1975	1978	1975	1978
Dividends	266	336	3,807	7,344
Interest	528	682	2,427	4,810
Business	679	829	2,627	3,767
Capital and other gains	185	273	1,748	2,493
Rents and royalties	63	64	1,566	1,587
Estates and trusts	31	34	617	1,560
Gross capital income subject to tax	1,752	2,218	12,792	21,561
Less: Interest deductions	473	676	1,675	2,357
Net capital income subject to tax	1,279	1,542	11,117	19,205

SOURCES: For all returns, Statistics of Income, Individual Income Tax Returns for 1975 and 1978. For beneficiaries, all identifiable beneficiaries (included in the subject study) who received benefits of \$50,000 or more and who filed income tax returns for both 1975 and 1978.

Table 4.5 Change in Gross Capital Income Subject to Tax as a Percentage of Inheritance Received by Size of Gross Capital Income Subject to Tax (amounts in dollars)

Size of Gross Capital Income Subject to Tax in 1975	Number of Beneficiaries	Change in Income 1975-78	Inheritance Received	Income Change as a Percentage of Inheritance	Change in Gross Capital Income Subject to Tax as a Percentage of Inheritance		
					Zero or Negative		
					Number of Beneficiaries	Change in Income	Inheritance
Zero or negative	200	3,564,235	25,426,276	14.02	79	-316980	8,468,557
\$1 under \$2,500	473	2,716,533	56,089,179	4.84	132	-271430	15,089,443
\$2,500 under \$5,000	157	1,393,149	21,812,321	6.39	32	-138315	4,426,021
\$5,000 under \$7,500	99	1,470,276	16,256,501	9.04	17	-13640	1,883,314
\$7,500 under \$10,000	72	593,570	9,403,363	6.31	17	-74386	1,776,119
\$10,000 under \$15,000	100	955,851	14,614,693	6.54	26	-279450	3,622,226
\$15,000 under \$20,000	71	687,683	12,707,604	5.41	18	-246667	3,157,892
\$20,000 under \$30,000	88	606,954	16,417,317	3.70	33	-610026	5,549,910
\$30,000 under \$50,000	78	74,003	12,597,643	0.59	35	-752210	4,469,510
\$50,000 under \$100,000	76	740,300	14,293,421	5.18	30	-1086604	3,856,196
\$100,000 or more	37	-78,133	11,465,309	-0.68	18	-1559584	3,968,928
Total	1,451	12,724,421	211,083,627	6.03	437	-5,349,292	56,268,116

Change in Gross Capital Income Subject to Tax as a Percentage of Inheritance (continued)

Size of Gross Capital Income Subject to Tax in 1975	Number of Beneficiaries	Under 5 Percent		5 Percent under 10 Percent		
		Change in Income	Inheritance	Number of Beneficiaries	Change in Income	Inheritance
Zero or negative	33	208,051	6,138,233	24	226,315	3,204,985
\$1 under \$2,500	150	537,712	19,387,097	113	939,439	13,784,498
\$2,500 under \$5,000	48	217,505	7,286,223	41	395,684	5,383,093
\$5,000 under \$7,500	27	150,513	5,308,098	30	432,486	6,122,792
\$7,500 under \$10,000	17	81,559	2,987,902	13	140,136	1,181,693
\$10,000 under \$15,000	19	116,850	4,030,581	21	215,045	2,975,436
\$15,000 under \$20,000	13	119,522	3,880,828	15	247,900	3,342,123
\$20,000 under \$30,000	13	127,667	4,995,503	11	139,487	1,676,855
\$30,000 under \$50,000	9	40,151	2,309,102	13	267,703	3,577,919
\$50,000 under \$100,000	3	24,356	826,337	12	388,500	5,273,723
\$100,000 or more	3	41,637	1,803,977	-	-	-
Total	335	1,665,523	58,953,881	293	3,392,695	46,523,117

Change in Gross Capital Income Subject to Tax as a Percentage of Inheritance (continued)

Size of Gross Capital Income Subject to Tax in 1975	Number of Beneficiaries	10 Percent under 15 Percent		15 Percent under 20 Percent		
		Change in Income	Inheritance	Number of Beneficiaries	Change in Income	Inheritance
Zero or negative	19	204,710	1,687,495	17	379,479	5,173,664
\$1 under \$2,500	37	481,917	3,993,123	14	264,787	1,537,155
\$2,500 under \$5,000	18	351,585	3,107,855	4	96,429	581,104
\$5,000 under \$7,500	11	143,625	1,196,516	6	101,321	569,838
\$7,500 under \$10,000	11	226,457	1,757,583	8	100,420	579,802
\$10,000 under \$15,000	12	157,298	1,378,723	5	113,922	641,633
\$15,000 under \$20,000	7	82,745	726,400	5	107,443	571,237
\$20,000 under \$30,000	12	247,563	2,036,655	5	147,587	899,864
\$30,000 under \$50,000	5	82,683	689,505	5	122,043	736,769
\$50,000 under \$100,000	7	184,108	1,541,160	5	199,064	1,147,497
\$100,000 or more	5	138,012	1,166,221	-	-	-
Total	144	2,300,703	19,281,236	74	1,632,495	12,438,563

Table 4.5 (continued)

Size of Gross Capital Income Subject to Tax in 1975	Change in Gross Capital Income Subject to Tax as a Percentage of Inheritance (continued)					
	20 Percent under 30 Percent			20 Percent or More		
	Number of Beneficiaries	Change in Income	Inheritance	Number of Beneficiaries	Change in Income	Inheritance
Zero or negative	10	218,827	933,155	18	2,643,833	2,820,187
\$1 under \$2,500	14	295,789	1,250,384	13	468,319	1,047,479
\$2,500 under \$5,000	5	122,746	478,890	9	347,515	729,135
\$5,000 under \$7,500	2	45,482	186,458	6	610,489	989,485
\$7,500 under \$10,000	4	76,600	308,113	2	42,784	112,151
\$10,000 under \$15,000	8	277,136	1,235,791	9	355,050	730,303
\$15,000 under \$20,000	4	83,809	304,938	9	292,920	724,186
\$20,000 under \$30,000	7	195,190	836,729	7	359,486	511,801
\$30,000 under \$50,000	3	80,009	293,482	8	233,624	521,356
\$50,000 under \$100,000	7	213,591	898,632	14	907,080	1,654,220
\$100,000 or more	2	314,545	1,478,956	7	897,462	2,142,873
Total	66	1,923,724	8,205,528	102	7,158,562	11,983,176

NOTE: Table includes beneficiaries other than surviving spouses.

inheritors actually show a negative or zero change in gross capital income subject to tax. On the other hand, about 12 percent of those with inheritances under \$250,000 and 7 percent of those with inheritances over \$250,000 show a change in capital income that was equal to 20 percent or more of the recorded change in wealth.

Since reported capital income would normally increase over time regardless of inheritances, the number of inheritors reporting low or negative amounts of change becomes even more striking. Between 1975 and 1978, the average individual income tax return showed an increase of about 27 percent (from \$1,752 to \$2,218) in reported capital income, as contrasted with a 69 percent increase (from \$12,792 to \$21,562) for our sample (see table 4.4). If the change in interest rates, dividends rates, and growth in wealth in the economy were to have approximately equal effect on realized returns for both groups, capital income of inheritors also would have grown by 27 percent in absence of the inheritances. Thirty-nine percent (27 percent/69 percent) of the increase in reported capital income would then be attributable to factors other than the inheritances themselves.

Although table 4.3 shows little difference in realized rates of return across inheritors by size of

inheritance, table 4.5 provides some explanation. The ratio of the change in income to change in wealth is shown to decline significantly with an increase in the amount of capital income reported prior to the receipt of the inheritance. That is, beneficiaries with substantial amounts of realized income from wealth prior to the receipt of their inheritances were much quicker to convert their inheritances into assets for which the rate of income recognition would be low. Three consistent explanations can be offered for such behavior: (1) those with more capital income in 1975 faced higher marginal tax rates and therefore had more of an incentive to convert or hold their inheritances in the form of preferred assets; (2) those with greater amounts of capital income were more likely to be savers and accumulators and, in any case, would be less likely to need the income from their inheritances for near-term consumption purposes; (3) many of those owning substantial amounts of capital would already be engaged in tax-induced portfolio shifting and have access to investment advice, whereas inheritors without previous wealth accumulation more likely would react only with a significant time lag to the tax incentives to hold preferred assets.

Since the realized rate of return declines with an increase in 1975 capital income, it should not

surprise us that the percentage of returns showing a negative or zero change in capital income would actually rise with an increase in 1975 capital income. In fact, if one calculates returns reporting negative or zero changes in income as a percentage of total returns with similar amounts of 1975 capital income, a type of U-shaped curve emerges. At the bottom, 40 percent of those reporting zero or negative 1975 capital income show even more negative capital income by 1978 after receiving inheritances of \$50,000 or more.

In the middle, those with \$5,000 to \$7,500 in 1975 capital income have the smallest percentage of returns, 17 percent, showing a negative change after receiving their inheritance. At the top, 49 percent of those with \$100,000 or more of 1975 capital income show less (or the same) capital income in 1978. This finding is consistent with the observation that there are many wealthy taxpayers who report low or negative amounts of capital income because of substantial investment in tax-preferred assets or tax shelters of various sorts. They probably invest their inheritances in a similar manner. Those with significant amounts of reported capital income, on the other hand, include the wealthiest of taxpayers; they are also quite capable of limiting their increase in taxable income through sophisticated portfolio shifting. Those in the middle, however, often fall into neither category and include many whose experience of owning financial assets is confined principally to holding deposits in financial institutions. While this last group of individuals may also be likely to invest in owner-occupied housing -one of the best shelters of all- housing purchases are likely to take place only in discrete intervals and occur infrequently within a year or two after receiving an inheritance.

In summary, at least for persons receiving significant inheritances (\$50,000 or more) and for persons who eventually leave sizeable estates (\$60,000 or more), the measure of realized income from capital is likely to have only a small relationship to their economic rate of return from assets or any other accepted measure of well-being based on property income or property. Differences among households in realized rates of

return are quite large in all wealth classes.

4.4 Horizontal Equity: Some Theoretical Considerations

We have argued that the recognition of income from capital is partly a voluntary event and, therefore, that the realized return from capital will vary across persons of equal circumstance, whether measured by equal economic income, equal wealth, or similar classifier of well-being. Our data showed such large variations in realized rates of return across taxpayers that using realized property income as a basis for measuring equals in statistical analyses, as well as tax and welfare programs, must be called into serious question. One cannot address this topic, however, without turning to some of the theoretical arguments against the existence of horizontal inequity. "With multiple abilities or different tastes," as Feldstein notes, "any feasible tax on income or consumption will violate horizontal equity" (1976b, p. 129). Abstracting from the general case, however, it is then argued that if persons differ only in their endowment of a single type of ability, but have the same tastes, there will be no horizontal inequity. In the extreme case, of course, this argument would be hard to refute if it were assumed that equals were so alike in every respect -abilities, tastes, and outcomes- that there was no difference among them, including taxes paid and transfers received.

The first qualification to the argument must therefore come when persons with equal abilities and equal tastes are at least allowed to have different outcomes because of luck, uncertainty, and risk. Persons with equal abilities and tastes, for instance, might still purchase different assets with equal expected returns and equal risk. Once we introduce some degree of randomness to the returns from engaging in various forms of (investment) behavior, ex post results will start to deviate from ex ante expectations.

If tax and welfare systems, as well as statistical analyses, were to be designed on the basis of ex ante conditions, there would be much less need

for many of them. In simplest terms, if all persons start out with equal opportunities in life, and several flips of the coin determine eventual well-being, a horizontally equitable tax or welfare system designed on an ex ante basis would tax everyone equally and grant everyone an equal amount of transfers. In that sense, except for required governmental goods and services such as defence, much of the tax-transfer system would be redundant and unnecessary. If, however, taxes, transfers, and statistical analyses are directed at ex post results, then they cannot ignore the issues of luck, risk, and uncertainty, nor can they treat those who have gambled and won the same as those who have gambled and lost.

Part of the argument against horizontal inequity also relies on what will be labeled here the market compensation effect. Even if persons purchase assets with different degrees of preference in tax or welfare systems, under certain assumptions (sometimes implicit), they will receive the same after tax rewards from those purchases. The market compensates purchasers of nonpreferred assets by equilibrating after-tax rates of return across assets, while differentials in tax rates are then reflected in different before-tax rates of return on assets.⁵

A second qualification must therefore be made if the assumptions of the model do not hold in practice. Suppose that taxpayers are taxed under a progressive tax system or one in which there are substantial numbers of investors (such as tax-exempt institutions or foreign investors). Then it is not at all clear that after-tax rates of returns will equilibrate across assets with different degrees of tax preference. Any movement up in the price of an asset A or asset B to equalize after-tax rates of return for a given group of taxpayers will give an incentive for arbitrage between A and B by tax-exempt investors (or investors in other tax brackets). For instance, foreign investors may turn to future markets, short sales, and other financial mechanisms to arbitrage between the assets whenever before-tax rates of return begin to diverge. Theory alone cannot determine whether this financial arbitrage dominates the tax-induced

tendency for before-tax rates of return to differ according to the preferences given various assets, and one must resort in part to studies of institutions and empirical data to try to find an answer.⁶

What the data show rather conclusively is that preferred assets generally have higher economic rates of return than nonpreferred assets (e.g., for corporate stock, see Ibbotson and Sinquefeld 1982; for farms see U.S. Department of Agriculture 1981).⁷ In contradiction to the simple market compensation argument, interest-bearing assets usually have offered the lowest economic rate of return, yet at the same time are accompanied (for each investor) by the highest tax rate because of the inclusion of the entire inflationary component of the interest rate in income subject to tax. Even if the reasons for this result are partly institutional -statutory limitations of interest rates or the habitual tendency of many lenders and borrowers to require a higher before-tax rate of return on business investment than on loans financing that investment- the designer of a tax or welfare program or the statistical observer cannot assume away such differences.

Our own data also support the notion that those with lower realized rates of return have generally achieved higher economic rates of return. The very presence of large amounts of wealth means that the top wealth holders are likely to have been persons who were successful, rather than unsuccessful, in their investment. Yet at the same time, these are the same individuals holding the assets with the greatest amount of tax preference at the household level.

A further complication is added, however, once it is recognized that the assets with the greatest amount of tax preference are often the most risky, at least over a short period of time. One might argue that the compensation to holders of nonpreferred assets is hidden by this risk adjustment. Indeed, once account is made for risk, it is hard to deny that some compensation may have taken place through the lowering of economic rates of return on risky, but tax-preferred, assets relative to the rates paid on other assets; however, there

is no evidence, either theoretical or empirical, that this compensation is complete. Partly because of financial arbitrage and partly because of institutional factors, for instance, it would be quite difficult to provide full compensation to holders of interest-bearing assets if interest rates had to rise above the rate of return on other financial assets such as stock.

In deciding whether compensation for taxes paid takes place through equalization of after-tax rates of return, the obvious voluntary nature of the tax system also must be taken into account. It is simply not possible to argue that two persons owning the same stock receive a different economic rate of return or face a different risk because one recognizes capital gains and the other does not, nor that a person who finds a way to deposit and withdraw money from an annuity account faces a different risk or return than a person who engages in the same behavior at a bank. The greater the voluntariness of the tax, the less there can be any compensation through market adjustments to those who pay a higher rate of tax on the same income.

In summary, horizontal inequity is unimportant in a world in which tastes are so similar among equals that they purchase exactly the same assets and one is concerned with *ex ante* rather than *ex post* distributions of welfare. By the same token, all tax and welfare systems can be shown to have some degree of horizontal inequity under real-world assumptions of several abilities or different tastes. Between these two worlds lies the world of the designer of a tax or welfare system and the statistical analyst, both of whom must classify individuals in categories of equals primarily on the basis of means relative to needs, but not tastes. This designer or analyst must take into account luck, risk and uncertainty, *ex post* results, the inability of financial markets to fully compensate holders of non-tax-preferred assets, and differences in taxes or benefits among individuals holding essentially the same assets, but having different patterns of recognition of income from those assets.

4.5 Implications for Research and Policy

There are several research and policy implications to the poor relationship between the realized rate of return and the economic income, wealth, or similar measure of well-being of the household. The first of the research implications is in many ways the most obvious, but in other ways the most difficult to handle. A statistical analysis of household characteristics, government payments, or taxes can be very misleading when it uses realized income as a variable or classifier. The researcher may be aware of the misleading nature of the data, but in few cases will his readers have a similar level of understanding. The problem is difficult because the correlation often can be made only by imputation of other information. Because imputation is statistically imprecise, it often reduces bias only by adding errors of measurement to a file.

Studies such as the estate-income match help us to make the imputations that are necessary. Because we can obtain fairly good information on the relationship between realized income and wealth, we can enhance our ability to take files with only reported income from property and make imputations of wealth onto those files through the investment income approach to wealth estimation (Atkinson and Harrison 1978, p. 171). Imputations of economic income will be more difficult, but, once wealth is estimated, independent studies of returns to ownership of stock, land, housing, and other assets can also be used.

Information on the ratio of realized income to asset value can also help to correct measures of the degree of inequality in society or the count of those in poverty (e.g., U.S. Bureau of the Census 1981). From the type of data reported here, one can get an idea of the number of persons with substantial wealth who report low amounts of realized income from capital. This data must be supplemented at the bottom end of the distribution. Here survey data have a better chance of filling the void, both because wage income will tend to dominate property income no matter what the error and because there are usually fewer

types of assets held and, except for homes and pensions, lesser amounts of unrealized income for which to account.

Proper measurement of property and property income is crucial for policy purposes as well. Welfare programs using realized income as a measure of means would probably be better off abandoning altogether the measure of realized income (except as a compliance check of actual property ownership) and turning instead to a measure of ability based upon wage income and property. For instance, an estimate of expected economic income from net worth, a fraction of net worth, or the annuity value of net worth could be added to wage income. Any of these measures would appear to be a more accurate, and less horizontally inequitable, measure of means than wage income plus realized income from property. Such a shift would redistribute welfare benefits more toward the longer-term poor and those with lesser amounts of wealth (Steuerle and McClung 1977). This approach also would have the advantage of no longer separating homes from other assets, and it could eliminate the need for separate asset tests with arbitrary cutoff or notch points. In addition, it would solve the problem of treating interest income as real income no matter what the rate of inflation, thus requiring welfare recipients to spend down their wealth at different rates in different years. These corrections need not add nor subtract to total welfare payments, but can be done in a way to make more equal the distribution of such payments across households of equal means relative to needs.

As for the tax system, better measurement of property or property income is certainly necessary if the base of the tax is meant to be economic income. Better measurement would require some substantial changes in tax laws, including accurate measurement of economic depreciation, indexing or approximate indexing of different types of returns from capital, and movement toward an accrual rather than a realization base. By the same token, corporate, individual, and property taxes would need to be better integrated. One tax could be meant as a substitute for another tax, but

an integrated design would need to eliminate conditions whereby some persons paid double taxes, while others with equal incomes paid no tax at all. Some of these steps would tend to raise taxes and some would lower them, but that should not be allowed to detract from the fact that it is possible to move toward greater horizontal equity in the income tax without necessarily raising or lowering the taxes on income from capital.

If our capability of taxing uniformly income from wealth continues to prove so poor, it raises the distinct possibility that a solution to the problem may come from the measurement of property value rather than of realized income. Such a solution is readily feasible when considering corporate wealth in publicly traded stock. Even the normal property tax on real estate, despite the variation in effective rates because of poor administration, may prove to provide less horizontal inequity with respect to property owners than does the income tax.⁸ Its potential to provide more horizontal equity than a realized property income base is even greater. Better integration of property taxes with realized income taxes again may provide a back-door way of moving toward more uniform treatment of income from all assets.

If horizontal equity is the goal, better measurement of property and property income is required regardless of whether society moves further in the direction of a consumption tax or maintains an income tax. Horizontal equity requires at a minimum that, if two persons have equal incomes and equal savings, they should pay the same amount of taxes regardless of whether the ideal tax base is income or consumption.

The current policy approach of using realized income, adjusted by various piecemeal savings and investment incentives, unequivocally fails the standard of horizontal equity. Although the focus of this chapter has been on equity issues, the efficiency costs of existing failures to provide uniform treatment of different sources of capital income may be quite substantial and are caused by the same measurement problems that create

horizontal inequity (Steuerle 1983b; Galper and Steuerle 1983).

Obviously, if no societal consensus exists on whether to move toward an income or a consumption standard, the steps that can be agreed upon will be less. All of the following, however, at least move in the direction of meeting the common standard of imposing the same tax on those who have both equal incomes and equal savings: uniform measurement and taxation of real economic income from property, regardless of source;⁹ unification of savings and investment incentives to measure total savings and investment; and uniform reciprocal treatment of interest paid and received, or borrowing (dissavings) and savings.

In summary, both for research and policy purposes, reliance upon realized income from capital as part of a measure of well-being has led to misleading analyses and poorly designed programs. The standard of horizontal equity in tax and welfare programs is violated whether the measure of equals is on the basis of economic income or consumption. Accounting for economic income may be difficult, but there are approximate methods that would allow greater accuracy in statistical analyses and a fairer distribution of benefits and taxes in government programs.

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Comment James D. Smith

All societies have both political and functional imparities to define well-being. It is inevitably a topic of political debate, but beyond the realm of campaign rhetoric. The political process is the mechanism by which measures of well-being are translated into policies for sharing the burden of

public goods, one of which is the distribution of well-being itself. The term well-being has a ring to it that endears it to those charged with ennobling entrances to public edifices, drafting political tracts, or engaging in pure theory - all endeavors where the felicity of language transcends understanding. For public policy a more analytically tractable concept is necessary. The most widely applied proxy for well-being is realized income. Steuerle suggests that the use of realized income derives from historic accident, convenience, and ideology. Whatever the reasons for the use, it is not Steuerle's chosen burden to explicate them, but rather to disabuse the reader of any notion that it is a wise use. He does this in a minor way by the didactics of public finance texts, but in a more compelling way by putting on display a new data base, indeed, a data base that is not yet quite finished. In its present state it is like the product of the consummate designer of women's fashion: in good taste, but revealing just enough to maximize speculation and interest on the part of the viewer. Steuerle speculates a great deal about what is behind his data, and I will turn to his speculations and some of my own in a moment, but first let me describe its nature.

For routine statistical processing in its Statistics of Income (SOI) program, the Internal Revenue Service drew a sample of about 41,000 Federal estate tax returns filed in 1977. These returns were for decedents who died in 1977 or before (the majority of them being for decedents in 1976 and 1977). A one-in-ten subsample, or about 4,100 estate tax returns, was selected for Steuerle from the initial IRS sample with the intent that for each of these, the income tax return of the decedent in the year preceding his death would be located as well as the income tax return of the decedent's nonspousal legatees in the year prior to and the year following inheritance. For reasons that are not obvious, but troubling, tax returns from the year preceding death were not found for over one-quarter of the decedents for whom an estate tax return had been selected. The about 2,900 decedents for whom an income tax return

could be found were used for part of the analysis presented in Steuerle's paper.

Estate tax returns require filers to list legatees along with their Social Security number and amount bequeathed them. Steuerle formed a second analysis file consisting of all nonspousal legatees who received \$50,000 or more and for whom an income tax return could be found for 1975 and 1978. Thus, he has a set of legatees for whom he knows taxable income shortly before and shortly after the receipt of a bequest of \$50,000 or more. The size of this sample is 1,451 legatees.

Thus, he has two sets of data, one relating decedent's wealth to income in the year preceding death and another relating the income in years preceding and following an inheritance to that inheritance.

I applaud the kind of administrative record matching Steuerle is doing; we need a lot more of it. In its present state the data are not representative of any meaningful population, however, and our uses of them should keep this in mind. Steuerle notes that the SOI file was stratified according to size of gross estate. He argues that because his analysis deals primarily with issues of within- and between-wealth classes that the unweighted form of his file will not be biased.

Although I agree with this proposition so far as he wishes to make statements about rich decedents and draw some inferences about income/wealth relationships, it does not follow, that one can safely make inferences about the importance of income/wealth relationships for the living population, which is the relevant one. The estate tax returns are a sample of wealthy, living persons stratified by age, sex, race, and marital status. The stratification occurs because the sample is drawn by death, and factors that influence mortality rates make it unrepresentative of the living population. For instance, his sample overrepresents older persons who have a higher probability of dying than do younger ones.

The sample can be unbiased by weighting the observations by the reciprocals of mortality rates applicable to decedent characteristics. In table C4.1, I compare the asset composition in Steuerle's sample of decedents to the asset composition of the SOI file after it was weighted to represent the living population sufficiently wealthy to file estate tax returns were they to die. The weighting reverses the relative importance of real estate and corporate stock - the two largest asset types, and ones that have quite different income realization potentials because real estate is dominated by owner-occupied structures.

Table C4.1 Comparison of Asset Composition from Weighted SOI File and Unweighted Collation File

Asset	Percentage of Total Wealth	
	Weighted SOI	Unweighted Collation
Corporate stock	23.9	40.7
Real estate	34.8	22.3
Cash, bonds, notes, and mortgages	22.5	27.4
Noncorporate business	4.5	2.7
Other assets	14.2	7.0
Total Assets	100.0	100.0
Debts	15.5	7.3
Net worth	84.5	92.7

SOURCE: Schwartz 1983.

To the extent that behavior related to age, sex, and other mortality-related variables bear upon realization rates or portfolio composition, properly weighted data would give different results. Steuerle's main point, that the variance of realization rates is so high as to render realized income an inappropriate measure of well-being is so obvious in the data that it will likely hold when the sample is weighted, but the observed dispersion of the realization rates will be compressed some. His findings also pose considerable challenge to researchers who would link income and wealth either by capitalizing income flows or by converting asset value to yield. I will return to these

research issues later. First, let me comment further on Steuerle's findings.

In table 4.1 Steuerle provides an overall view of the composition of the income of these relatively affluent individuals and of the proportion that each income type represents of total net worth. On first glance the percentages that incomes represent of total net worth seem too small. But when one remembers that these income flows are essentially for 1975, when the average yield of stocks traded on the New York Stock Exchange was 4.1 percent and treasury bills were yielding about 6 percent, the aggregate taxable income of this group which represented about 4.4 percent of its net worth certainly does not seem implausible. Keep in mind that not only is this group rich, but it is made up of considerably more women and older persons than would be found in a random selection of equally rich individuals. This accounts for the relatively small share, 25.5 percent, of total income represented by wages and salaries. The interpretation of the percentage that a particular income flow, such as dividends, represents of total net worth is not obvious. But Steuerle is pushed to such comparisons because in the period between the income tax return and death one can convert assets - stock into cash for instance. For treasury bills the opportunity for conversion to cash would be automatic with the maturity of the bill.

Steuerle goes on, making the point quite strongly in table 4.2 that considerable variability exists in realized income from capital. He compares the gross capital income reported on income tax returns in the year before decedents' deaths with the value of assets reported on their estate tax returns. He notes that the average rate of realization declines with size of wealth. Decedents with under \$100,000 in gross assets had a realization rate of 12.4 percent, while those with \$2.5 million or more of wealth had a realization rate of 2.2 percent. He points out that an examination was undertaken of cases with unusually high rates of realization; it was found that dividend and interest income were implausibly high relative to total assets. He speculates that the time interval

between the reporting of income and the recording of assets may have permitted people to transfer or consume wealth. Thus the high rates of realization observed for some decedents may, in fact, be a problem of intertemporal misalignment of accounting points and periods. I agree with the general speculation, but let me pursue it a bit.

First, it is known from estate tax data that costs of last illness can be substantial. The population with which he is dealing is quite old: the mean age is seventy-two. One can easily imagine prolonged illnesses. If the cost of these illnesses is less variable across individuals than is the value of their assets, the relatively higher medical cost for the less affluent of these rich folks diminishes their assets relatively more than it does the assets of the more affluent, and the ratio of their taxable income in the year before death to the wealth reported in their estate tax return is consequently higher. Steuerle can pursue this issue by examining the cost-of-last-illness value reported on the estate tax returns. He can also, with greater effort, locate decedents' death certificates, which provide information on cause of death and duration of last illness. Both of these might serve as proxies for the consumption of medical services.

In addition to consuming medical services, it is reasonable to expect that some of this decedent population was drawing down its assets for general consumption expenditures prior to death. If this drawing down involved the liquidation of bills, notes, and bonds as they matured, interest income will show up in the income tax returns, but some portion of the face value of the instruments will have been used for consumption and will not show up in the estate tax returns. If one hypothesizes, as I do, that consumption expenditures will not be proportional to wealth for this population, then the liquidation of assets will be relatively more important for the less affluent than for the more affluent. Thus the proportion of wealth represented by capital income would appear to be larger than for the more affluent in the Steuerle file.

There is also the problem that bearer bonds may

generate an interest flow but can be "informally" distributed among the heirs, hence escaping taxation and not appearing in the estate tax return. Finally, there is the problem of the tax-paying unit represented on the estate tax return versus the tax-paying unit represented on the income tax return. It is not clear from Steuerle's discussion how income reported on a joint income tax return is related to the assets on an estate tax return, which is always filed for a sole decedent. There is not an easy solution to the problem of ascribing ownership of income on joint returns to the person owning assets on the estate tax return. Although the income tax return in 1976 requested that dividend income be designated as joint or as belonging to the husband or wife, taxpayer compliance with this request is believed to have been very poor. Furthermore, large amounts of dividend income were frequently reported as from street accounts without differentiation among different street accounts or the ownership thereof. For other types of property income no designation of ownership was required on the return. Some insight into the joint return problem could be provided by analyzing separately joint returns and all other returns. It is suspected that if Steuerle were able to make corrections for the temporal misalignment of the income-reporting period and the asset evaluation point as well as for assets that are informally distributed, the variation of rates of return across wealth-size classes would be considerably compressed. There still would remain substantial within-class variation of rates of realization, however. Steuerle notes with respect to table 4.2 that at least 5 percent of each wealth class has zero or negative realization rates. Because the denominator for the realization rate is gross assets, negative rates must come about because of negative income. This suggests that significant numbers of farm and business losses are present on the income tax returns. Since farms and business assets are more likely to be held by men than women, when the file is weighted the proportion of negative and zero rates of return can be expected to increase.

Thirty percent of the decedent population had realization rates of 10 percent or more as calculat-

ed by Steuerle. However, 20 percent of the decedent population with assets of \$100,000 or less reported realization rates of 15 percent or more. I suggest that the factors offered in explanation for the overall high average realization rate (12.4 percent) for the group are at work to generate these unusually high rates of realization.

There is another factor that can generate artificially high realization rates. Professional practices and some small business assets are frequently identified with the owner. The value of the business for estate tax purposes may come down to an evaluation of accounts receivable and physical property, but the business income reported on tax returns reflects the owner's marketability. In purely economic terms, there would be a large factor payment to labor, but on the tax return it would all appear as business income. Thus we have a confounded problem of misconceptualization of income and asset devaluation induced by death.

Next Steuerle looks at the change in capital income from 1975 to 1978 for legatees other than spouses who inherited \$50,000 or more. In the upper-right-hand portion of table 4.3 Steuerle calculates the change in gross capital income amounted to approximately 6 percent. Because these inheritors were nonspouses, it is reasonable to speculate that assets such as residential housing, consumer durables, works of art, and other non-yield-producing forms were less important in these inheritances than they would have been in the inheritances of spouses. Given this and the fact that one might reasonably expect some increment in legatees' asset holdings to have occurred quite independent of any inheritance, a change in gross capital income that amounted to 6 percent of the inheritance does not seem unreasonable at all. Steuerle notes there is relatively little difference in the realization rate by size of inheritance. This is also plausible for the same reasons. When one looks at the percentage that change in gross capital income represents of the value of inheritance within inheritance-size classes, however, one finds a substantial variability. For instance, nearly one-third of those inheriting

between \$50,000 and \$100,000 have negative changes in gross capital income between 1975 and 1978. It is difficult, however, to tease much understanding out of the table because so many unobservable things are going on. For instance, we know little about the age of the inheritors and to what extent they might be selling off assets. We do not know the value of the assets they held prior to inheritance. For inheritors with substantial preinheritance wealth, small fluctuations in the rate of return of their prior wealth could swamp percentage changes in income due to inherited wealth. For inheritors who are farm and business proprietors, normal year-to-year variability in income could be substantially greater than any variability induced by the newly inherited assets. If the inheritance was itself a farm or business asset, then the variability in the asset yield on the inheritance itself could be quite large. In this particular instance the data has revealed too little to us to excite much speculation.

Finally, in table 4.5 Steuerle looks at changes in gross capital income over the period 1975 to 1978 by size of 1975 gross capital income. This is somewhat of a proxy for preinheritance wealth, but the whole thrust of Steuerle's argument on realization rates qualifies this use of it. Yet when he does this he finds that individuals with zero or negative capital income in 1975 were much more likely to have zero or negative changes in their capital income from 1975 to 1978 as were individuals with relatively high 1975 capital income. He speculates that persons with zero or negative capital income in 1975 and those with high capital income in 1975 are, in fact, similar individuals, the implication being that those with zero or negative capital income really were holding substantial amounts of assets but were effectively using tax shelters, as were very wealthy persons in 1975. It was, he argues, the petty rich, those with capital incomes between \$2,500 and \$20,000, who had high realization rates and consequently were taxed on their lack of tax sophistication. He speculates that legatees with large 1975 capital incomes were sensitive to high marginal tax rates and had strong incentives to convert their inheritances into preferred asset forms since they were

likely to be savers and had already accumulated large amounts of wealth. Their propensity to consume out of their inheritances would be low. He also speculates that the owners of substantial capital would have a higher probability of having already engaged in tax-induced portfolio shifting and have access to investment advice. Legatees without previous wealth accumulations would have a tendency to engage in tax minimization efforts only after a time lapse. Again, Steuerle's speculations are plausible and the evidence is suggestive, but the reader is left with a terrible sense of urgency to examine the files in detail to understand what is really going on behind the tabulated results.

Conclusions and Research Implications

Steuerle, without a doubt, demonstrates that realized income is an inappropriate measure of well-being. To the extent that it is used as a basis for allocating tax burdens and transfers, it introduces substantial horizontal and vertical inequities. Although the collation file will provide substantial insight into the equity issues posed by the use of realized income, even after it is weighted and much more is understood about the file, we will have done only the necessary preliminary work to exploit the rich body of data he has assembled. Although I encourage Steuerle to continue examining the relationship between income tax returns and assets on estate tax returns, I suggest that once he has completed this task that he consider a slightly different strategy.

Given the information he has available from the collation file plus some additional information he could obtain or may already have, I would argue for reconstructing a balance sheet for each individual decedent as it existed at some point within the year of the income tax return in the collation file. This would not necessarily be an easy task. It will require using information income tax returns filed by the decedent prior to his death and by executors of the estate for periods during which the decedent was alive but did not file. It might also require searching for gift tax returns. The central issue is that of entering into the balance sheet the

value of assets that disappeared because they were consumed or transferred between the income tax observation and the estate tax observation in the collation file. Schedule C will be of some value in their endeavor as will information on medical costs that appear in the estate tax return as well as in the income tax return. Once one has such a file, not only can one make judgements about equity distortion introduced by the utilization of realized income but one can move a consider-

able distance the derivation of economic income for relatively affluent individuals. Such a file could be the basis for simulating a variety of tax policies.

References

Schwartz, Marvin. 1983. Trends in personal wealth, 1976-81. Statistics of Income Bulletin 3: 1-26.

Endnotes

1. It was not possible to distinguish between cases in which an income tax return was not filed and cases in which the return could not be found because of an invalid Social Security number.
2. Even at the business level, major items of income such as accrued capital gains and nominal interest payments and receipts are measured essentially by a cash flow criterion.
3. One can model ignorance as a cost of acquiring information. If we assume that the cost of acquiring information rises with one's ignorance of the tax and welfare laws, however, then the tax and welfare systems still impose taxes that rise with ignorance. These taxes can be paid directly to the government or indirectly to advisors.
4. For a separate analysis of the returns to owners of farms and closely held businesses, see Steuerle 1983a.
5. For an excellent model of the extent to which such market compensation might take place in a progressive tax system, as well as the implicit taxes paid and transfers received under certain conditions, see Galper and Toder 1984. For other portfolio effects, see Bailey 1974 and Blume, Crockett, and Friend 1974.
6. A related issue is the effect of taxes on interest rates, especially in a period of inflation. Because inflation raises the effective tax rate on real income from interest-bearing assets, and because income from these assets is more vulnerable than other assets to this inflation-induced tax, one might initially expect the interest rate to rise by a multiple of the increase in the inflation rate. In almost all attempts to explain the effect of inflation and taxes on observed interest rates (e.g., Darby 1975; Tanzi 1980; Peek 1982), however, it is assumed incorrectly that the tax system is proportional or, through use of average marginal tax rates, effectively proportional for all investors, both domestic and foreign. This assumption prevents the type of financial arbitrage discussed above from working to reduce the increase in the interest rate. In addition, the failure to take into account the extent to which interest is deducted at a higher tax rate than it is included in income, as well as the extent to which receipts are never counted at all (Steuerle 1984), leads to a misestimation of average marginal rate.
7. An exception, of course, is provided by tax-exempt bonds, but even wealthy individuals generally hold only a small percentage of their assets in tax-exempt bonds. See Schwartz 1983.
8. See Aaron 1975 for an argument that the property tax may also be progressive.
9. Strictly speaking, if one were to move all the way to a consumption tax, economic income would not have to be measured. However, a consumption tax would require wealth accounting, or, to be more precise, at least a measure of withdrawals and deposits in qualified (wealth) accounts. In addition, during a transition period, wealth accounting of existing assets would be required to insure that trillions of dollars worth of consumption were not allowed to go tax free for current holders of wealth.

CHAPTER 4

Methodological Issues

Introduced by R. Louise Woodburn

There is much interest in the estimation of personal wealth in the United States. The most common methods of computing these estimates are: collecting wealth data directly via a survey, capitalizing income flows reported on individual tax returns, and using wealth data reported on Federal estate tax returns. As discussed in the Scheuren and McCubbin paper, perhaps none of these methods alone is adequate. Certainly, a joint effort combining the strengths of each method would be better. In order to accomplish this task, it is necessary to understand the relative strengths and weaknesses of each method. The collection of papers in this chapter provides an understanding of these underlying issues for the Estate Multiplier technique. The Smith paper details the history of the estate multiplier technique. The technique has improved over the years, although some of the concerns raised in the Smith paper still haunt researchers today. The Scheuren paper also provides a historical perspective, with an Afterwords discussing the changes since 1975.

The beauty of wealth estimates computed using the estate multiplier technique is the rich administrative estate data from which the estimates derive and the clever use of these data to estimate the wealth of the living population. The administrative data on an estate tax return are quite detailed and relatively error free, when compared to comparable survey data. Underlying the beauty of this technique, however, are several important methodological issues, which can be separated into two categories: data and estimation. The estimation issues are more easily quantified than the data issues. Indeed, since administrative data are used, the data issues will, most likely, continue to plague researchers.

There are three main types of data issues. First, the estate data are affected by the actions of the individual in preparation for death. This is especially a concern with elderly and terminally ill individuals, who may choose to pass on wealth before death or who need to pay extensive medical expenses. The remaining two data issues are of particular concern when researchers compare results from the estate data to estimates computed using household surveys (e.g., the Survey of Consumer Finances sponsored by the Federal Reserve Board). One main concern is the definition and nature of the data that are required to be included on the estate return. For instance, the full value of the life insurance is reported, rather than the cash surrender value as would be appropriate for survey-measured wealth. Also, data reported on the estate return are influenced by the tax consequences and are subject to change during an audit. The McCubbin paper discusses a study of post-audit data changes. The Scheuren and McCubbin paper discusses the asset definitions in detail. The final data concern is the population that is included in the estate universe; it is based on individuals and is limited to those with total gross estate above the filing threshold. The Johnson and Woodburn paper attempts to deal with these coverage and definitional differences by constructing a household wealth file with the estate data for more direct comparison with the Survey of Consumer Finances household results.

Typical estimation issues in a survey begin with the design of an appropriate sample and continue through the computation of appropriate sampling weights, desired estimates and their corresponding variances. These issues are also important in the case of the estate multiplier estimates. The difficulty in the latter case is that the researcher has no control over the decedent population (that is, the sample of the living population selected by death). This leads to a very inefficient sample design for the estimation of wealth for the living population. Additionally, when computing the estate multiplier estimates, the researcher must estimate the probabilities of selection. Typically, the base mortality rates by age and sex are used, with adjustments estimated for a differential mortality for the wealthy population. There has been much work on the estimation of an appropriate differential, as described in

the Smith and Scheuren papers. In order to reflect the uncertainty inherent in the multipliers, Johnson and Woodburn estimate the differentials using a regression model and incorporate the model uncertainty. They then develop bootstrap samples that reflect all the sources of uncertainty, in order to compute the variance of the resulting estimates.

Finally, a researcher well-versed in the issues described in these papers is ready to compute wealth estimates and compare them to outside estimates. This has been done here via thorough comparisons of estate multiplier estimates to those from the Survey of Consumer Finances found in the Scheuren and McCubbin and Johnson and Woodburn papers.

In conclusion, the papers in this chapter not only detail the history of the estate multiplier technique and provide an understanding of the methodological issues, but they also provide exciting suggestions for future research.

Estimating the Wealth of Top Wealth-Holders From Estate Tax Returns

by James D. Smith, Ph.D

Introduction

The estate multiplier technique, as currently used, rests on the assumption that death draws a random sample, stratified by age and sex, of the living population. If one has available age-sex-specific mortality rates, an estimate of the wealth of the living in a given period of time can be made by stepping-up the wealth of decedents in each age-sex class by the inverse of the mortality rate associated with that age-sex class, and summing the results across all age-sex classes:

$$W_t = \sum_{i=1}^m \sum_{j=1}^2 \frac{V_{ij}}{M_{ij}} w_{ij}$$

Where V_{ij} is the number of living persons, M_{ij} is the number of decedents, and w_{ij} is the wealth of decedents, all associated with the ij th age-sex class. The term V_{ij}/M_{ij} is the estate multiplier for the ij th age-sex class. The technique can also be used to derive distributions for the living by any identifiable characteristic of the decedents or their wealth.

Using the Federal estate tax returns, the Internal Revenue Service is preparing estate multiplier estimates of the wealthiest strata of the United States population in 1962. This is gratifying to economists looking toward comprehensive estimates of U.S. wealth and national balance sheets by the end of the decade of the '60's.

This paper presents (1) a short discussion of the problems and limitations of estate multiplier estimates, (2) a brief review of previous estate multiplier estimates, (3) some results from a 1958 estimate, and (5) some ideas for future estate multiplier estimates (by no means a plan for their realization, in view of the demand for other statistics). A technical appendix demonstrates

mathematically the derivation of estimates by use of the estate multiplier technique.

Problems and Limitations

Administrative records used for the collection of death taxes have been employed in England, Wales, Scotland, Australia, New Zealand and the United States as inputs to the estate multiplier.

As is almost always the case, however, administrative records reflect the immediate needs of administrators; only indirectly the needs of scholars -- and often policy makers. Death tax returns, for instance, are required only for decedents with estates above a rather high level of wealth. In the United States the present filing requirement is very high, \$60,000. (We hereafter refer to persons with gross assets of over \$60,000 as top wealth-holders.)

Because of the high filing requirement, the estate multiplier method is not suited to estimating total private wealth in the United States or its distribution along a complete Lorenz curve. At the upper levels, however, it enjoys a comparative advantage over field surveys. In 1963, for instance, 78,393 estate tax returns were filed for persons with assets of over \$60,000. The Federal Reserve Board, on the other hand, used a total sample of only 3,600 families to estimate the distribution of wealth for the entire population.¹

But even with the very large sample of top wealth-holders provided by estate tax returns, considerable sampling variability attaches to estimates of ownership of assets such as municipal and corporate bonds, the distributions of which are highly skewed even among the rich. Further, the sampling variability attaching to estimates of wealth held by persons of younger ages is greater than corresponding estimates for older persons because death draws a much thinner sample of the

young.

But beyond the general problems associated with any sample, three areas of difficulty are inherent in the application of the estate multiplier to U.S. estate tax returns. First, there is the problem of selecting the appropriate set of mortality rates; second, that of informational gaps in the returns; and third, the necessity to infer year of death.

If mortality rates and wealth are correlated, then a biased estimate will be produced using mortality rates unadjusted for wealth level. Indirect evidence supports the view that an inverse correlation exists -- the rich do live longer.² Under this circumstance the estate multipliers will be too low, and under-state the wealth of top wealth-holders.

The major information gaps in the U.S. estate tax returns are missing ages and the absence of life insurance cash surrender value and of post audit asset valuations.

Each year a number of returns are filed without age information (1,383 out of 55,685 in 1958). It is necessary, therefore, either to exclude the returns for decedents of unspecified age or to impute ages.

Life insurance in the estates of the decedents, unlike other assets, is not isomorphic with that in the hands of the living. The economic value of a life insurance contract to a living person is its cash surrender value, but death brings the face value of the contract into the estate. In order to estimate the wealth of top wealth-holders, it is necessary to adjust downward the life insurance component reported on estate tax returns.

Although evidence suggests that auditing may increase asset values reported on estate tax returns by as much as 10 percent, only tabulations of unaudited returns have been available for estate multiplier estimates.³ Under-estimation here, however, is probably less than in field surveys.

For administrative purposes it makes sense to tabulate returns by calendar year of filing. Conse-

quently, one does not have the sample death has drawn of the living population in a calendar year; rather returns filed in a calendar year, which include returns for deaths of several years. The executor has 15 months after decedent's date of death in which to file a return, and extensions may be granted beyond that. During 1965 returns filed within the 15 month filing period may be for decedents whose date of death was as early as October 1963. On the other hand, returns for some 1964 decedents will not be filed until 1966. A few returns filed in 1965 with extensions of time may be for decedents whose date of death was over 10 years ago.

Although the first study of the temporal distribution of dates of death will be done with the 1966 filings, it is believed, on the basis of limited evidence, that the great majority of returns filed in a given calendar year represent deaths in the preceding year. In all estate multiplier estimates it has been inferred that a return filed in a given year represented death in the preceding year. Because the number of returns and asset prices have moved secularly upward, the inference of the year of death probably introduces a downward bias in the wealth estimate.

Previous Uses of the Estate Multiplier Technique

Although financial information about decedents was used to estimate total wealth of the living by the "interval devolution" method in the 19th century, the estate multiplier technique was first suggested by Coughlin in 1906.⁴

The first estate multiplier estimate was made by Bernard Mallet⁵ in 1908 when he applied inverse mortality rates to English estate duty tabulations for 1905 and 1906 and the second was apparently made by Laughton for Victoria, Australia for 1911-12.⁶

In 1918 G. H. Knibbs published estimates for Australia for the years between 1878 and 1911.⁷ He used age-sex specific mortality rates, but his data did not provide a break-down by asset type. He was well aware of the possibility that mortality rates might be inversely correlated with wealth, but after an examination of life insurance records,

decided the evidence for Australia did not support reducing the age-sex-specific mortality rates.

Estate multiplier estimates for England and Wales for the years 1911 to 1913, 1924 to 1930 and 1936, were produced by Daniels and Campion.⁸ They contended the £100 filing exclusion filtered lower social classes out of the sample. Comparing occupations of decedents for whom estate duty returns had been filed with the occupational distribution in the Decennial Supplement on Occupational Mortality of the 1921 British Census of Population, they found the majority of decedents with more than £100 were in the top social classes used in the census. They then pointed to the significantly lower mortality rates for each of the upper classes in each of the four age brackets spanning the age interval 25 to 65. On the basis of this evidence, they lowered the mortality rates (thus raising the multipliers used for their estimate).

Kathleen Langly has published estimates for England, Scotland and Wales for 1936-38, 1946-47, and 1950-51.⁹ In each case, she used general age-sex-specific mortality rates unadjusted for social class. An estimate for England for 1947-49 by A. M. Carter, however, did employ age-sex-specific mortality rates so adjusted.¹⁰

Lydall and Tipping, using age-sex-specific mortality rates for the top two social classes defined in Great Britain's 1951 Census of Population, have made estimates for each of the years 1951 through 1958 for England, Scotland and Wales (England and Wales together for each year except 1957 and 1958).¹¹ As with prior estate multiplier estimates for Great Britain, they were not able to directly estimate the asset composition of wealth because Her Majesty's Commissioners did not publish tabulations of asset type by age and sex of decedent. Lydall and Tipping imputed an asset composition on the basis of the size distribution of estates within each age-sex cell.

To dampen the effect of sampling errors, they averaged the estimates of wealth above £2000 for the years 1951 through 1956, taking the result as their best estimate for beginning of year 1954 for persons with wealth of £2000 and over.

The first British estate multiplier estimate to get directly at the composition of wealth was done by J.R.S. Revell for 1957-58. His findings show that Lydall and Tipping's imputation of asset composition based entirely on size distributions was far from correct.¹² An official estimate for Great Britain for 1960, also produced a direct estimate of the composition of the wealth of the wealthy.¹³

Two estate multiplier studies previous to the 1958 results presented below have been made for the United States. In the first, Mendershausen made an estimate for each of the years 1922, 1924, 1941, 1944 and 1946.¹⁴ For the year 1944 a special tabulation of gross estate by type of asset and age of decedent was prepared for him by Internal Revenue Service. Unfortunately, the tabulations did not provide sex of decedents. Using both white age-specific mortality rates and a set of rates adjusted for social class, Mendershausen estimated the wealth of top wealth-holders by type of asset. The set of social class adjusted rates were based on the experience of the Metropolitan Life Insurance Company with a group of risks called the "\$5,000 whole life classification," composed predominantly of well-to-do individuals.¹⁵

With a tabulation by asset type, Mendershausen was able to isolate life insurance and adjust for the difference between the value of proceeds reported in the estate of a decedent and cash surrender value the instant before death. To do this, he obtained from "one fairly large" insurance company the ratios of reserves to face values by age groups of policyholders. It was basically this set of ratios which he used to reduce the proceeds reported on estate tax returns to estimate the life insurance equity of top wealth-holders in 1944. Mendershausen excluded those returns on which age of decedent was not reported.

Lampman estimated the wealth of top wealthholders in 1953.¹⁶ As did Mendershausen, he worked with a special Internal Revenue Service tabulation. Decedents were classified by State and marital status, as well as age and sex. Assets were classified by 10 types (including debt). He used

social class mortality rates based primarily on a study of differential mortality by Moriyama and Guralnick and the mortality experience of a large insurance company with a group of risks buying relatively large policies.¹⁷

Life insurance proceeds reported in the estates of decedents were reduced by a set of ratios of reserves to face values by age of policyholder. The ratios were obtained by reducing Mendershausen's ratios on the ground that the overall ratio of reserves to face value had decreased since 1944.

Lampman imputed to decedents of unknown age the average age of all decedents, and for the first time related U.S. estimates to national balance sheets.

The 1958 Estimates

The estimates for 1958 which follow are from a study by Smith of the income and wealth of top wealth-holders in 1958.¹⁸ The mortality rates used were obtained by reducing the 1958 white age-sex-specific mortality rates, based on post 1960 Census population estimates, by the same proportion Lampman had reduced the comparable rates for 1953. Insurance was reduced by the same ratios used by Lampman. Decedents of unknown age were imputed the average age of all decedents of the same sex in the same size of gross estate class. Table 1 shows the composition by type of property and size of gross estate of the wealth of top wealth-holders in 1958.

Because one of the important uses of estate multiplier estimates is to gauge the concentration of wealth, a mid-year 1958 national balance sheet for individuals has been constructed. The balance sheet was constructed by modifying Goldsmith's balance sheet for nonfarm households to include noncorporate farms and to exclude nonprofit institutions. Goldsmith's balance sheet values are for the end-of-year.¹⁹ His estimates were converted to mid-1958 by taking the arithmetic mean of his end-of-year 1957 and 1958 values. This was done to achieve correspondence with the wealth estimates which are based on a sample of decedents assumed to have been drawn rather evenly

over the year 1958.

The method of constructing the balance sheet for individuals differed slightly from that used by Lampman.²⁰ Because of this, and also because Lampman worked with preliminary data, a new balance sheet for individuals was constructed for mid-1953 to permit a direct comparison of the share of top wealth-holders in personal wealth based on his finding for 1953 and Smith's for 1958. The revision of the 1953 balance sheet had slight effect on the share of top wealth-holders as reported by Lampman.

Table 2 shows the 1953 and 1958 balance sheets. In accordance with the concepts adopted by Lampman, an individual sector was constructed to show both prime wealth and total wealth. Total wealth includes all personal wealth from which one receives "direct" benefits. Thus, it includes pension and trust funds though their corpus may not be subject to invasion. Prime wealth is total wealth less the value of assets in trust funds and pension reserves.

Because of one extremely unusual case which appeared in the Internal Revenue printouts, some adjustment to the composition of assets of top wealth-holders is called for. One female under 40 years of age was tabulated as having an estate of \$14,526,000. Examination of the detailed IRS tabulations shows that \$13,609,000 of this estate was in annuities. Blowing-up this value by the high multiplier associated with females under 40, yields an estimate of annuities of \$19.8 billion, a very dubious value.²¹

Assuming the gross estate of this one decedent was distributed among assets in the same proportions as assets in the aggregate gross estate of all other top wealth-holders in the same estate size class, then the distribution of assets and their respective shares appears as shown in table 3. Adjusting the total composition shown in table 1 for this one case results in the estimated concentration of State and local bonds, other bonds and corporate stock being considerably increased; and that of "miscellaneous assets" decreased.

In order to place the share of wealth owned

Table 1. COMPOSITION OF GROSS ESTATE BY SIZE OF GROSS ESTATE FOR TOP WEALTH-HOLDERS IN 1958

Size of Gross Estate *	Number of top wealth-holders (Thousands)	Type of Property						
		Real estate	Federal bonds	State and local bonds	Other bonds	Corporate stock	Cash	Notes and mortgages
		(Billion dollars)						
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Total	2,595	114.4	16.2	10.6	3.5	182.0	39.3	17.6
\$60,000 under \$70,000	274	6.2	0.8	0.1	0.1	3.6	2.5	0.6
\$70,000 under \$80,000	303	7.7	0.9	0.1	0.1	4.6	2.7	0.8
\$80,000 under \$90,000	241	7.0	0.8	a	0.1	4.0	2.2	0.7
\$90,000 under \$100,000	211	6.5	0.8	a	0.1	4.4	2.0	0.6
\$100,000 under \$120,000	357	12.8	1.4	0.1	0.2	8.7	4.1	1.4
\$120,000 under \$150,000	350	13.6	1.6	0.1	0.2	11.8	4.5	1.7
\$150,000 under \$200,000	310	14.2	1.9	0.2	0.3	14.7	4.6	2.4
\$200,000 under \$300,000	269	15.4	2.2	0.6	0.5	21.8	5.2	2.6
\$300,000 under \$500,000	151	11.8	1.8	1.0	0.6	24.0	3.9	2.1
\$500,000 under \$1,000,000	88	9.8	1.8	2.1	0.6	29.9	3.7	2.1
\$1,000,000 under \$2,000,000	28	4.2	1.2	2.3	0.3	21.2	1.7	1.5
\$2,000,000 under \$3,000,000	6	1.4	0.3	1.1	0.1	9.1	0.5	0.4
\$3,000,000 under \$5,000,000	2	1.2	0.2	1.5	0.2	5.3	0.5	0.2
\$5,000,000 under \$10,000,000	2	0.7	0.3	0.9	0.1	6.1	0.7	0.2
\$10,000,000 under \$20,000,000	2	1.5	a	0.4	a	9.9	0.3	0.2
\$20,000,000 or more	b	0.2	0.1	0.4	a	2.9	0.1	0.2

Detail may not add to total because of rounding.
Notes at end of table

Table 1. COMPOSITION OF GROSS ESTATE BY SIZE OF GROSS ESTATE FOR TOP WEALTH-HOLDERS IN 1958 -- Continued

Size of Gross Estate *	Type of Property -- Continued				Gross Estate		Debts and mortgages	Economic estate **
	Life insurance		Annuities	Miscellaneous assets	Using face value of life insurance	Using equity value of life insurance		
	Face value	Equity value						
	(9)	(10)	(11)	(12)	(13)	(14)	(15)	(16)
Total	52.4	13.3	19.8	55.2	511.1	472.0	42.9	429.0
\$60,000 under \$70,000	1.9	0.5	0.1	2.0	17.8	16.4	1.2	15.2
\$70,000 under \$80,000	3.1	0.7	0.1	2.6	22.7	20.3	1.7	18.6
\$80,000 under \$90,000	3.2	0.7	0.1	2.3	20.5	18.0	1.5	16.4
\$90,000 under \$100,000	3.2	0.8	0.1	2.2	20.1	17.6	1.6	16.0
\$100,000 under \$120,000	5.9	1.4	0.2	4.3	39.0	34.5	3.3	31.2
\$120,000 under \$150,000	7.6	1.8	0.1	5.4	46.9	41.0	4.5	36.5
\$150,000 under \$200,000	8.6	2.0	0.2	6.3	53.4	46.8	5.0	41.8
\$200,000 under \$300,000	8.0	2.1	0.3	8.1	64.6	58.7	6.1	52.7
\$300,000 under \$500,000	5.3	1.5	0.1	6.8	57.4	53.6	5.0	48.6
\$500,000 under \$1,000,000	3.7	1.2	0.2	5.7	59.6	57.2	5.2	51.9
\$1,000,000 under \$2,000,000	1.4	0.5	a	4.7	38.4	37.5	3.4	34.0
\$2,000,000 under \$3,000,000	0.3	0.1	a	2.0	15.3	15.1	1.2	13.9
\$3,000,000 under \$5,000,000	0.1	a	a	0.6	9.7	9.7	0.6	9.1
\$5,000,000 under \$10,000,000	0.1	a	a	1.7	10.6	10.6	0.8	9.7
\$10,000,000 under \$20,000,000	a	a	++ 18.4	0.6	31.3	31.3	1.8	29.5
\$20,000,000 or more	a	a	a	a	3.7	3.7	a	3.6

Detail may not add to total because of rounding.

a. Rounds to less than \$100,000,000

b. Rounds to less than 1,000

* Gross estate size distribution obtained by using the face value of life insurance.

** Gross estate (using equity value of life insurance) less Debts and mortgages, column 14 less column 15.

++ See footnote 21.

Table 2. DERIVATION OF NATIONAL BALANCE SHEET FOR INDIVIDUALS BY TYPE OF PROPERTY FOR MID-YEAR 1958 AND 1953

PART I -- MID-YEAR 1958

Type of Property	Nonfarm house hold	Farm house hold	Nonfarm noncor- porate businesses	Trust funds	Nonprofit institu- tions	Individuals	
						Total wealth	Prime wealth
						(Billion dollars)	
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
Real estate, total	452.8	113.5	63.4	-	30.4	599.3	599.3
Residential structures	338.6	18.1	16.1	-	-	-	-
Nonresidential structures	25.3	15.8	24.8	-	25.3	-	-
Land	88.9	79.6	22.5	-	5.1	-	-
Federal bonds, total	59.7	4.9	-	2.7	1.7	62.9	60.2
Short-term	3.9	-	-	-	-	-	-
Savings bonds	43.5	4.9	-	-	-	-	-
Other Federal bonds	12.3	-	-	-	-	-	-
State and local bonds	24.1	-	-	7.8	0.6	23.5	15.7
Other bonds	11.0	-	-	2.9	3.2	7.8	4.9
Corporate stock, total	299.6	-	-	33.3	9.0	290.6	257.3
Preferred	10.4	-	-	1.5	0.8	-	-
Common	289.2	-	-	31.8	8.2	-	-
Cash, total	193.6	8.6	12.9	0.4	5.3	209.8	209.4
Currency and demand deposits	59.9	5.8	12.9	0.4	5.3	-	-
Other deposits	133.7	2.8	-	-	-	-	-
Notes and mortgages, total	28.9	-	16.1	0.7	0.4	44.6	43.9
Nonfarm mortgages:							
Residential	12.4	-	-	-	-	-	-
Nonresidential	9.4	-	-	-	-	-	-
Farm mortgages	4.4	-	-	-	-	-	-
Consumer credit	-	-	4.8	-	-	-	-
Trade credit	-	-	11.3	-	-	-	-
Other loans	2.7	-	-	-	-	-	-
Life insurance reserves	96.8	6.2	-	-	-	103.0	103.0
Pension and retirement funds:							
Private	25.0	-	-	-	-	25.0	-
Government	65.0	0.4	-	-	-	65.5	-
Miscellaneous assets, total	172.5	56.4	43.5	1.9	1.9	270.5	268.6
Equity in mutual financial institutions	7.7	-	-	-	-	-	-
Producer durables	2.0	17.4	26.7	-	1.9	-	-
Consumer durables	162.2	13.3	-	-	-	-	-
Inventories	-	22.2	16.8	-	-	-	-
Other intangible assets	0.6	3.5	-	0.6	-	-	-
Other tangible assets	-	-	-	1.3	-	-	-
Gross assets	1,429.1	190.0	135.9	49.7	52.5	1,702.5	1,562.3
Debt	170.2	19.0	39.1	-	5.5	222.8	222.8
Economic estate	1,258.9	171.0	96.8	49.7	47.0	1,479.7	1,339.5

Table 2. DERIVATION OF NATIONAL BALANCE SHEET FOR INDIVIDUALS BY TYPE OF PROPERTY FOR MID-YEAR 1958 AND 1953--Continued

PART II -- MID-YEAR 1953

Type of Property	Nonfarm house hold	Farm house hold	Nonfarm noncor- porate businesses	Trust funds	Nonprofit institu- tions	Individuals	
						Total wealth	Prime wealth
(Billion dollars)							
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
Real estate, total	330.1	91.5	49.0	—	20.3	450.3	450.3
Residential structures	254.8	16.0	14.8	—	—	—	—
Nonresidential structures	17.0	13.2	16.9	—	17.0	—	—
Land	58.3	62.3	17.3	—	3.3	—	—
Federal bonds, total	60.3	4.5	—	5.5	1.7	63.1	57.6
Short-term	1.8	—	—	—	—	—	—
Savings bonds	46.4	4.5	—	—	—	—	—
Other Federal bonds	12.1	—	—	—	—	—	—
State and local bonds	16.4	—	—	5.3	0.4	16.0	10.7
Other bonds	6.3	—	—	1.9	1.8	4.5	2.6
Corporate stock, total	162.9	—	—	19.6	5.1	157.8	138.2
Preferred	9.4	—	—	1.6	0.7	—	—
Common	153.5	—	—	18.0	4.4	—	—
Cash, total	141.8	8.3	10.4	0.6	3.9	156.6	156.0
Currency and demand deposits	56.7	6.0	10.4	0.6	—	—	—
Other deposits	85.1	2.3	—	—	—	—	—
Notes and mortgages, total	20.4	—	12.8	0.8	0.3	32.9	32.1
Nonfarm mortgages:							
Residential	9.4	—	—	—	—	—	—
Nonresidential	6.2	—	—	—	—	—	—
Farm mortgages	3.1	—	—	—	—	—	—
Consumer credit	—	—	4.1	—	—	—	—
Trade credit	—	—	8.7	—	—	—	—
Other loans	1.7	—	—	—	—	—	—
Life insurance reserves	70.4	4.9	—	—	—	75.3	75.3
Pension and retirement funds:							
Private	10.5	—	—	—	—	10.5	—
Government	50.3	0.5	—	—	—	50.8	—
Miscellaneous assets, total	123.7	51.6	33.2	1.9	1.0	207.5	205.6
Equity in mutual financial institutions	4.8	—	—	—	—	—	—
Producer durables	1.0	15.7	18.2	—	1.0	—	—
Consumer durables	117.3	13.2	—	—	—	—	—
Inventories	—	20.0	15.0	—	—	—	—
Other intangible assets	0.6	2.7	—	0.6	—	—	—
Other tangible assets	—	—	—	1.3	—	—	—
Gross assets	993.1	161.3	105.4	35.6	34.5	1,225.3	1,128.4
Debt	98.3	14.1	24.6	—	3.2	133.8	133.8
Economic estate	894.8	147.2	80.8	35.6	31.3	1,091.5	994.6

Notes for Table 2

Column 1, Nonfarm households, is the average of end-of-year asset values: for 1953, end-of-year, 1952 and 1953; for 1958, end-of-year 1957 and 1958 from Goldsmith, Studies in the National Balance Sheet, Vol. II, pp. 118f. Nonfarm noncorporate business assets of individuals are not included in column 1, but shown as a separate sector, Nonfarm Noncorporate Businesses, in column 3.

Column 2, Farm households, was derived by averaging Goldsmith's year-end values for his agriculture sector, Studies in the National Balance Sheet, Vol. II, pp. 132f: for 1953, end-of-year 1952 and 1953; for 1958, end-of-year 1957 and 1958. The values obtained were then reduced by 5 percent to eliminate corporate farms. The basis for this adjustment is Mary M. B. Harmon, A Statistical Summary of Farm Tenure, Agriculture Research Service, U.S.D.A., 1958, p. 2, which shows five percent of farm acreage was owned by corporations in 1954. Discussions with personnel of the Department of Agriculture and the Bureau of the Census who deal with agricultural data cast doubt upon the assumption that only five percent of the value of farm assets is owned by corporations. It is suspected that the five percent of farm acreage owned by corporations is above average in value and that corporate farms are more capital intensive than the average. However, for lack of hard data to support a further reduction in Goldsmith's agriculture sector, assets were reduced by only five percent.

Column 3, Nonfarm noncorporate businesses, is an average of Goldsmith's end-of-year asset values for such businesses from Studies in the National Balance Sheet, Vol. II, pp. 126f.

Column 4: The assets and liabilities of trust funds, all of which are included in the nonfarm household sector, are listed separately here as the trust sector. Trust funds, for 1958 is an average of common trust funds for 1957 and 1958 from Goldsmith, Studies in the National Balance Sheet, Vol. II, pp. 122f, plus the values for personal trust funds from the "Report of National Survey of Personal Trust Accounts," (ABA mimeo., 1959) p. 4. For 1953, trust funds is the average of Goldsmith's year-end values for 1952 and 1953 for personal and common trust funds combined, Studies in the National Balance Sheet, Vol. II, pp. 122f

Column 5, Nonprofit institutions, was derived by applying to the mid-year asset values of nonfarm households (column 1) the percent that each asset held by nonprofit institutions in 1949 was of that asset held by households in 1949. See Goldsmith, A Study of Savings in the United States, Vol. III, p. 72 This ratio estimating procedure was made necessary because 1949 is the last year for which Goldsmith estimated a nonprofit sector. Goldsmith points out in the preface page to the 1949 nonprofit sector balance sheet, the estimates are rough approximations: "Whoever reads the notes to the tables -- or has worked in the field -- will be aware of how precarious the estimates are..." (*Ibid.* p. 449.). In spite of the roughness of the 1949 estimate, it is appropriate to use the estimate of the outstanding authority in the field as a basis to adjust downward the assets of the nonfarm household sector, which are known to be too high.

Column 6: To arrive at the total wealth concept for the individual sector, the assets and liabilities of farm households and unincorporated businesses were added to, and those of nonprofit institutions were subtracted from, the nonfarm household sector. (The assets and liabilities of trust funds are already included in the nonfarm household sector.) Thus Individuals total wealth is the sum of columns 1, 2, and 3, minus column 5.

Column 7: To obtain a prime wealth individual sector, assets of trust funds and pension reserves were subtracted from total wealth. Thus Individuals prime wealth is the sum of columns 1, 2, and 3, minus columns 4 and 5 and minus private and government pension and retirement funds.

Table 3. TOP WEALTH—HOLDERS SHARE IN NATIONAL BALANCE SHEET ACCOUNTS BY TYPE OF PROPERTY FOR 1958 AND 1953

Type of Property	1958			1953		
	Top wealth—holders *	Individuals national balance sheet prime wealth **	Share of top wealth—holders	Top wealth—holders *	Individuals national balance sheet prime wealth **	Share of top wealth—holders
	(Billion dollars)	(Billion dollars)	(Percent)	(Billion dollars)	(Billion dollars)	(Percent)
	(1)	(2)	(3)	(4)	(5)	(6)
Real estate	115.7	599.3	19.3	70.1	450.3	15.6
Federal bonds	16.3	60.2	27.1	17.4	57.6	30.2
State and local bonds	12.2	15.7	77.7	10.8	10.7	100.9
Other bonds	3.7	4.9	75.5	2.8	2.6	107.7
Corporate Stock	195.4	257.3	75.9	105.7	138.2	76.5
Cash	39.5	209.4	18.9	44.6	156.0	28.6
Notes and mortgages	17.9	43.9	40.8	10.5	32.1	32.7
Life insurance equity	13.3	103.0	12.9	++ 7.1	75.3	9.4
Miscellaneous assets +	57.9	268.6	21.6	39.6	205.6	19.3
Gross assets	472.0	1,562.3	30.2	309.2	1,128.4	27.4
Debt	42.9	222.8	19.3	27.7	133.8	20.7
Economic estate	429.0	1,339.5	32.0	281.5	994.6	28.3

Detail may not add to total because of rounding.

* For 1958, the value of all top wealth—holders wealth based upon decedents of known and unknown age with \$60,000 or more gross estate. For 1953, basic variant, a concept used by Lampman to include the value of all top wealth—holders wealth based upon decedents of known and unknown age for whom estate tax returns were filed. Conceptually these valuations were made in the same way except that Lampman included the value resulting from the blow-up of the wealth of 23 decedents with gross estates of less than \$60,000. The insignificance of this difference will be realized by noting that the total wealth of the living attributable to the 23 decedents with less than \$60,000 gross estate in Lampman's estimate is \$79,000,000 or .02 percent of his \$309,203,000,000 basic variant. Amounts shown in column 4 are from Lampman, *op. cit.*, pp. 191f.

** Prime wealth estimates are from table 2. For the derivation of these estimates see the notes to that table.

+ Top wealth—holders "Miscellaneous assets" includes annuities and the national balance sheet estimates excludes Pension and retirement funds to achieve comparability with Lampman. The annuity figure for 1958, \$19.8 billion, (shown in table 1) was adjusted to \$2.7 billion before being included in miscellaneous assets. See footnote 21.

++ The value of life insurance equity shown by Lampman in table 90 (*Lampman, op. cit.* pp. 192f) appears to be incorrect. The correct value is believed to be at least \$8.7 billion. He shows \$8.7 billion in table 23, *ibid.*, p. 51, before an addition for the estate of decedents with age unspecified. Because a negative value for insurance equity for the age unspecified group is not possible, we assume this figure to understate by at least 1.6 billion the basic variant value of life insurance equity of top wealth—holders. Based on a value of \$8.7 billion, the share of top wealth—holders in life insurance equity in 1953 would be 11.6 percent.

Table 4. SHARE OF TOP ONE PERCENT OF WEALTH-HOLDERS IN NATIONAL BALANCE SHEET ACCOUNTS MID-YEAR 1958 AND 1953

Type of Property	Top One Percent of Wealth-holders	
	1958 *	1953
(Percent)		
Real estate	15.7	15.3
Federal bonds	22.8	30.2
State and local bonds	76.4	100.9
Other bonds	69.4	107.7
Corporate Stock	71.0	76.0
Cash	15.2	28.1
Notes and mortgages	35.1	31.5
Life insurance equity	11.0	9.3
Miscellaneous assets 3*	18.8	18.5
Gross assets	26.7	26.1
Debt	17.2	20.5
Economic estate	28.1	27.8
Economic estate		

* Based on asset holdings after adjustment for special case. See notes to table 3.

Table 5. SHARE OF TOP ONE PERCENT OF ADULTS IN NATIONAL BALANCE SHEET ACCOUNTS. SELECTED YEARS 1922 TO 1958

Year	Share of Top One Percent of Adult Wealth-holders
	(Percent)
1922	31.6
1929	36.3
1933	28.3
1939	30.6
1945	23.3
1949	20.8
1953	24.3
1954	24.0
1956	26.0
1958	23.8

NOTE: All figures except that for 1958 are from Lampman, op. cit. p. 204. The percent of basic variant wealth owned by the top one percent of adult wealth-holders for the years 1922 through 1956 was computed by Lampman on the basis of his balance sheets. The 1958 share is based on the balance sheet presented in this study. No adjustment has been made for Lampman's 1953 estimates which overstated the gross estate of the age unknown group and understated life insurance equities. See notes to table 3.

by top wealth-holders in perspective, their total number can be compared to the total population. On July 1, 1958, according to the Bureau of the Census, the population of the United States was 174.9 million. Top wealth-holders according to our estimate numbered 2.6 million. Therefore, in 1958 1.5 percent of the population held 32 percent of net prime wealth owned by all individuals in the United States.

For a comparison of the shares of top wealth-holders in 1953 and 1958, table 3 also shows Lampman's 1953 estimates as a percent of the mid-1953 balance sheet.²² The shares of real estate, notes and mortgages, and life insurance equity held by top wealth-holders appear to have increased since 1953. Federal bonds, corporate stock, and miscellaneous assets appear to represent about the same proportion of their respective totals in 1958 as they did in 1953. State and local bonds, other bonds, and cash represent lesser shares in 1958 than in 1953. The fact that large sampling variability may attach to individuals assets, particularly those with small aggregates such as municipal and "other" bonds which tend to be held by a very small number of persons, demands caution in interpreting differences between 1953 and 1958. It is unlikely that a large swing in the share of a particular asset owned by top wealth-holders occurred in a period as short as five years.

The most reliable estimates are those for gross and economic estate. Table 3 shows that top wealth-holders owned 27.4 percent of gross and 28.3 percent of net prime wealth in 1953, but increased their share to 30.2 and 32.0 percent respectively by 1958. These data support Lampman's conclusion that the share of top wealth-holders has been increasing since 1949.²³

The increased share of top wealth-holders in prime wealth between 1953 and 1958 is probably understated. Because of what appears to be an arithmetic error, Lampman included \$16.4 billion in gross estate as the blow-up of assets of decedents of unknown age.²⁴ The correct amount according to the procedure described by Lampman should be \$7.6 billion.²⁵ If \$7.6 billion is taken as the correct estimate of gross estate for the age

unknown group, then his estimate for all wealth-holders would be reduced to \$300.4 billion. On this basis, the share of top wealth-holders in national balance sheet gross prime wealth in 1953 would have been 26.6 percent compared to 30.2 percent in 1958.

But in order to get at the concentration of wealth, a constant percentage of the population should be considered. The proportion of the total population represented by top wealth-holders has been increasing. In 1953 the group consisted of approximately 1.66 million persons, or about 1.04 percent of the total U.S. population. In 1958 the number of persons had risen to 2.60 million or 1.48 percent of the total population.

Table 4 shows the percent of each asset in total prime wealth owned by the top 1 percent of all wealth-holders. In the aggregate, the wealthiest strata have at least maintained their share position of 1953. With respect to specific assets, the top 1 percent of wealth-holders held about the same share of real estate, corporate stock, notes and mortgages, life insurance equity, and miscellaneous assets in 1958 as in 1953. The share of all types of bonds in the hands of the top 1 percent of wealth-holders declined as did cash holdings.

A longer perspective of the concentration of wealth is available if one uses Lampman's data for the top 1 percent of adults. Table 5 shows the proportion of wealth held by the top 1 percent of persons over 20 years of age from 1922 to 1958. The estimate of 23.8 percent for 1958 is slightly lower than Lampman's estimates for 1953, 1954, and 1956. When it is remembered that there are differences in the balance sheet used for 1958 and for other years, that sampling errors exist in all the estimates, and that the wealth of the age unknown is overstated in 1953, one is forced to look at the whole series of estimates to assess changes in the concentration of wealth. Doing this, it appears that over the period of these estimates [wealth] was most highly concentrated in the 1920's, decreased in concentration during the depression and war years, and has been increasing since 1949. Lampman has already pointed out this movement in concentration, we merely add the most recent data in support of his observation.²⁶

The 1962 Internal Revenue Service Estimates

The first IRS estate multiplier study will be published in 1966.²⁷ Besides updating past estimates it will incorporate technical improvements in mortality rates and insurance valuation. Decedent of unknown age will be imputed the average age of all decedents of the same sex in the same size of gross estate class.

Data from the study "Social and Economic Differentials in Mortality Rates" being done by Hauser at the University of Chicago will be used to evaluate and probably adjust age-sex-specific mortality rates.

The adjustment for life insurance proceeds will be made on the basis of a special study being done for the IRS by the Institute of Life Insurance. A return filed for an estate which includes life insurance proceeds must provide a statement of the face value, policy loans, accumulated dividends and proceeds (among other things) for each life insurance contract on the life of the decedent. The information is supplied by attaching to the return a Form 712 completed by the carrier. Unfortunately, cash surrender value has not been one of the items of information requested. The Institute of Life Insurance, however, collected from a group of companies cash surrender value and age of decedent as well as all the information requested in Form 712 each time the form was completed during a recent two-month period. The Institute plans to tabulate ratios of cash surrender value to proceeds by age group. This set of ratios will be used to reduce the life insurance proceeds of decedents in each age group for the 1962 estimate. The decedents for whom the information is being tabulated are not, of course, those for whom estate tax returns were filed in 1963. Our assumption is that the ratios do not vary much from year to year.

The IRS study will cross-classify top wealth-holders' gross and net wealth by size, age, sex, marital status, State, and type of asset. Of particular interest to social scientists will be the distributions by net wealth after adjustment of life insurance to equity value. These distributions will permit better estimates of the concentration of wealth than has been possible with the "size of

gross estate" classification used in earlier estimates.

Future Application of the Estate Multiplier in the U.S.

In presenting the following ideas we wish to emphasize they represent the thinking of the authors and of scholars who have worked in the field, not the official position or plans of the IRS and Treasury.

The estate tax returns are an underdeveloped source of economic information. True, successive applications of the estate multiplier have expanded the number of questions asked of the returns, but their full potential is far from exploited.

What is the propensity of top wealth-holders for financial risk? Does increased wealth shift portfolio composition toward growth stocks? How significant is the closely held corporation? Since estate tax returns provide security information on an issue-by-issue basis, indices could be devised to provide answers to these questions.²⁸

What are the occupational characteristics of top wealth-holders? Occupation and social security number of the decedent are contained in the return. A cross-sectional occupation pattern may be obtainable directly from the returns; the life cycle pattern might be obtained by a social security number match with SSA work history records. Further, wealth-holding by occupational groups could be estimated.²⁹

What is the income of top wealth-holders? What is the income of the heirs? Using social security numbers, estate tax returns can be matched with previous income tax returns, thus putting together the income flow and wealth stock. A slight modification of the estate tax returns would make possible a study of the intergenerational flows by wealth and income of decedents, and income of heirs.

What is the relation between inter vivos giving and transmission of assets at death? What are the effects of the creation of inter vivos and testamentary trusts? The addition of grantors' and

donors' social security numbers on fiduciary and gift tax returns would permit a computer match of these returns with estate tax returns.

For further applications of the estate multiplier to U.S. data certain methodological improvements constitute the immediate needs. The tabulation of returns for four or five consecutive years, sorted by year of death, would minimize the error caused by the assumption of inferred year of death. It would also permit a reduction of sampling variability by combining returns for two or more years.

Reporting by life insurance companies of cash surrender value for each contract in the estates of decedents for which an estate tax return is filed would vastly improve estimates of life insurance equity.

Further research to improve mortality rates assigned to decedents filing estate tax returns should be undertaken. One path is that of relating death to income size. Another would be an exploration of the information on the cause of death (supplied by a physician) and occupation contained in the return.

FOOTNOTES

1. See Dorothy S. Projector, "Survey of Financial Characteristics of Consumers," Federal Reserve Bulletin, March 1964, p. 289.
2. See Constantine A. Yeracaris, "Differential Mortality, General and Cause Specific in Buffalo, 1934-41," Journal of the American Statistical Association, December 1955; Louis I. Dublin, Alfred J. Lotka, and Mortimer Spiegelman, Length of Life: A Study of the Life Table, New York: The Ronald Press, 1949; I.M. Moriyama and L. Guralnick "Occupational and Social Class Differences in Mortality" in Trends and Differentials in Mortality, proceedings of the 1955 Annual Conference, Milbank Memorial Fund. Unpublished statistics provided by the Department of Health, City of New York, show mortality rates for high income health districts to be significantly lower than those for low income districts.
3. C. Lowell Harris, "Wealth Estimates as Affected by Audit of Estate Tax Returns," National Tax Journal, December 1949, p. 333.
4. The interval devolution method estimates total wealth by multiplying the wealth of decedents by the average interval, in years, between generations. A discussion of attempt to use the interval devolution method will be found in G.H. Knibbs, The Private Wealth of Australia and its Growth, Melbourne: McCarron, Bird and Co., 1918, pp. 168-81.

T. A. Coughlin's suggestion is found in the discussion of a paper W. J. Harris and K. A. Lake, "Estimates of the Realizable Wealth of the United Kingdom Based Mostly on Estate Duty Returns," Journal of the Royal Statistical Society, December 1906, pp. 709-32.
5. Bernard Mallet, "A Method of Estimating Capital Wealth from Estate Duty Statistics," Journal of the Royal Statistical Society, March 1908, pp. 65-84.
6. Victorian Yearbook, 1911-12, p. 216.
7. Knibbs, op. cit.
8. G.W. Daniels and H. Campion, The Distribution of National Capital, Manchester: Manchester University Press, 1936; and H. Campion, Public and Private Property, Oxford: Oxford University Press, 1939.
9. Kathleen Langly, "The Distribution of Capital in Private Hands in 1936-1938 and 1946-1947," Bulletin of the Oxford University Institute of Statistics, December 1950, p. 339 and February 1951, p. 33; and Kathleen Langly, "The Distribution of Private Capital, 1950-51," Bulletin of the Oxford University Institute of Statistics, January 1954, p. 1.
10. A.M. Cartter, "A New Method of Relating British Capital Ownership and Estate Duty Liability to Income Groups," Economica,

- August 1953, p. 247.
11. H.F. Lydall and D.G. Tipping, "The Distribution of Personal Wealth in Britain," Bulletin of the Oxford University Institute of Statistics, January 1961, p. 96.
 12. J.R.S. Revell "Assets and Age," Bulletin of the Oxford University Institute of Statistics, March 1962, p. 363. Revell further analyzes the 1957 and 1958 British data in his forthcoming monograph on national balance sheets, now in manuscript.
 13. Report of the Commissioners of Her Majesty's Inland Revenue for the Year Ended 31st March 1961, London: Her Majesty's Stationary Office, 1962, pp. 154-160.
 14. Horst Mendershausen, "The Pattern of Estate Tax Wealth," in Raymond W. Goldsmith, Dorothy S. Brady, and Horst Mendershausen, A Study of Savings in the United States, Vol. III Princeton: Princeton University Press, 1956.
 15. Ibid., p. 299.
 16. Robert J. Lampman, The Share of Top Wealth-holders in National Wealth 1922-56, Princeton: Princeton University Press, 1962.
 17. Moriyama and Guralnick, op. cit.
 18. James D. Smith, unpublished research submitted to the University of Oklahoma in connection with a doctoral dissertation. The original estate multiplier estimate by Smith was based upon tabulations in Statistics of Income--1958, Fiduciary, Gift, and Estate Tax Returns, and the composition of wealth by asset type was estimated by a different technique. However, Jeannette Fitzwilliams and Raymond W. Goldsmith generously made available a special Internal Revenue Service tabulation (upon which considerable work toward an estate multiplier estimate had been made by Fitzwilliams) which permitted the direct estate multiplier estimate of asset composition in table 1.
 19. Raymond W. Goldsmith, Robert E. Lipsey and Morris Mendelson, Studies in the National Balance Sheet.
 20. Lampman, op. cit., pp. 191-5.
 21. The occurrence of such a high value may merely reflect the excessive sampling variability attaching to a rare event, or it may have been the result of faulty transcription in processing the returns by the Internal Revenue Service. An attempt to check the Internal Revenue transcription was frustrated by the fact that the edit sheets and punch cards used in the tabulation of the 1958 returns had been destroyed.
 22. The major differences in the 1953 Lampman balance sheet and that constructed for this study are: 1. Lampman used end-of-year values. 2. Lampman apparently allocated assets to trust funds on the basis of the findings reported in Goldsmith and Shapiro's "Estimates of Bank-Administered Trust Funds," Journal of Finance, March 1959, pp. 11-17; the mid-1953 balance sheet uses Goldsmith's later estimates in Studies in the National Balance Sheet and the "Report of Survey of Trust Accounts." 3. Lampman's estimate of 16.1 billion "equities in mutual financial institutions" held by the household sector appears far too large in comparison with Goldsmith's National Balance Sheet entry of \$4.8 billion.
 23. Lampman, op. cit., p. 24.
 24. Lampman, op. cit., p. 62.
 25. See Lampman, op. cit., p. 55. In discussion with Lampman he has stated to Smith that he was unable to reconcile the \$16.4 billion shown in his table 29 with the procedure described on page 55 of The Share of Top Wealth-Holders, but that the procedure should yield the correct estimate for the age unknown group.
 26. Lampman, op. cit., p. 24.

27. Yeoman labor in preparing the specifications for the IRS estimate was done by Jeannette Fitzwilliams. She also, with Robert Lampman and Raymond Goldsmith, contributed to the initial planning of the project, at the request of the late Ernest Engquist, Director of the Statistics Division. Helen Demond with assistance from Jeannette Fitzwilliams drafted specifications for the project.
28. See, for instance, I. R. Atkinson, The Pattern of Financial Asset Ownership: Wisconsin Individuals, 1949, Princeton: Princeton University Press, 1956.
29. See Leonard Hamilton, "The Distribution of Capital Among the Medical Profession in England and Wales, 1940-41," Bulletin of the Oxford University Institute of Statistics, January 1950, p.1.

Technical Appendix*

The estate multiplier technique rests on the assumption that death draws a random sample, stratified by age and sex, of the living population.

If one has available age-sex-specific mortality rates, an estimate of total wealth can be derived as:

$$W = \sum_{i=1}^m \sum_{j=1}^2 \frac{V_{ij}}{M_{ij}} w_{ij}$$

where w_{ij} is the wealth of decedents, V_{ij} is the number of living persons, and M_{ij} is the number of deaths, all associated with the i th age and j th sex. Decedents' wealth can be dimensioned to any degree, subject only to the tolerable sampling error for the purposes to which the estimates are to be put. For instance, w_{ijk} may be used to represent the wealth of decedents of the i th age, j th sex, of asset type k in the g th gross wealth size class. Using such a four-way classification, there is a partitioned matrix W , such that the distribution of wealth by any combination of the classification categories can be obtained as a result of pre-and/or post-multiplication of W by suitable vectors and/or matrices. The matrix W is defined by $W = (t_{ij} w_{ijk})$ where $t_{ij} = V_{ij} / M_{ij}$ and where $i = 1, 2, \dots, m$; $j = 1, 2$; $k = 1, 2, \dots, n$; $g = 1, 2, \dots, s$.

If we let $W_{kg} = \begin{pmatrix} t_{11} w_{11kg} & t_{12} w_{12kg} \\ \cdot & \cdot \\ \cdot & \cdot \\ t_{m1} w_{m1kg} & t_{m2} w_{m2kg} \end{pmatrix}$ Then we can write: $W = \begin{pmatrix} W_{11} & W_{12} & \dots & W_{1s} \\ W_{21} & W_{22} & \dots & W_{2s} \\ \cdot & \cdot & \dots & \cdot \\ \cdot & \cdot & \dots & \cdot \\ W_{n1} & W_{n2} & \dots & W_{ns} \end{pmatrix}$

The following example illustrates how a particular cross-category distribution of wealth may be obtained from W .

For any integer p , let J_p be the p -dimensional column vector of ones. Then, multiplication of W on the left by J'_{mn} gives a $1 \times 2s$ matrix whose elements are column sums of W :

$$J'_{mn}W = [(J'_{m1}W_{11} + J'_{m1}W_{21} + \dots + J'_{m1}W_{n1}), (J'_{m1}W_{12} + J'_{m1}W_{22} + \dots + J'_{m1}W_{n2}), \dots, (J'_{m1}W_{1s} + J'_{m1}W_{2s} + \dots + J'_{m1}W_{ns})]$$

$$= ([\sum_{k=1}^n J_m W_{k1}], [\sum_{k=1}^n J_m W_{k2}], \dots, [\sum_{k=1}^n J_m W_{ks}])$$

* The assistance of Michael G. Billings, Mathematical Statistician, Statistics Division, Internal Revenue Service, is gratefully acknowledged.

$$\text{Now, } J'_m W_{kg} = (1, 1, 1, \dots, 1) \begin{pmatrix} t_{11} W_{11kg} & t_{12} W_{12kg} \\ t_{21} W_{21kg} & t_{22} W_{22kg} \\ \vdots & \vdots \\ t_{m1} W_{m1kg} & t_{m2} W_{m2kg} \end{pmatrix} = \left(\sum_{i=1}^m t_{i1} W_{i1kg}, \sum_{i=1}^m t_{i2} W_{i2kg} \right)$$

Therefore $J'_m W =$

$$\left(\left[\sum_{k=1}^n \sum_{i=1}^m t_{i1} W_{i1k1}, \sum_{k=1}^n \sum_{i=1}^m t_{i2} W_{i2k1} \right], \left[\sum_{k=1}^n \sum_{i=1}^m t_{i1} W_{i1k2}, \sum_{k=1}^n \sum_{i=1}^m t_{i2} W_{i2k2} \right], \dots, \left[\sum_{k=1}^n \sum_{i=1}^m t_{i1} W_{i1ks}, \sum_{k=1}^n \sum_{i=1}^m t_{i2} W_{i2ks} \right] \right)$$

Each of the $s \ 1 \times 2$ vectors in $J'_m W$ has as one of its elements the total wealth of females and the other of males in a given wealth class. Thus, the product matrix $J'_m W$ can be thought of as the distribution of total wealth by size of wealth-holding and sex of holder.

Similarly, the distribution of wealth by size of holding, sex and age of holder can be obtained as follows: Let $I_{pq} = (I_p, I_p, I_p, \dots, I_p)$ be the p -rowed matrix consisting of $q \ p \times p$ identity matrices.

Then, $I_{mn} W = \left(\sum_{k=1}^n W_{k1}, \sum_{k=1}^n W_{k2}, \dots, \sum_{k=1}^n W_{ks} \right)$. The submatrix $\sum_{k=1}^n W_{kg}$ of $I_{mn} W$ has as its ij th component the sum of the wealth size class g held by persons in age group i , sex group j .

The composition of wealth by asset type, age and sex of holder is given by $WI'_{2s} = \left(\sum_{g=1}^s W_{1g}, \sum_{g=1}^s W_{2g}, \dots, \sum_{g=1}^s W_{ng} \right)'$. The submatrix

$\sum_{g=1}^s W_{kg}$ of WI'_{2s} has as its ij th component the value of asset type k held by persons of age group i , sex group j .

Once the matrix W has been set-up, any desired distribution of wealth using the selected variables can be extracted by choosing the appropriate vector and/or matrix multipliers. The following definitions and table summarize the multipliers which would be used to obtain the various breakdowns in our four-way classification.

Definitions of the multipliers:

1. For any integer p , J_p is the column vector of p ones.
2. For any integers p and q , I_{pq} is the p -rowed matrix which can be partitioned into q $p \times p$ identity matrices:

$$I_{pq} = (I_p, I_p, I_p, \dots, I_p)$$

3. For any integers m, n, p , $p \leq n$, J_{nm}^p is the $n \times m$ matrix whose p th row is J'_m , where J'_m is defined in (1).
4. For any integers m, n , K_{nm} is the $n \times nm$ matrix which can be partitioned as follows:

$$K_{nm} = (J_{nm}^1, J_{nm}^2, J_{nm}^3, \dots, J_{nm}^n), \text{ where } J_{nm}^p \text{ is defined in (3).}$$

With the matrices, vectors, and their transposes, defined above, any desire cross-classified wealth distribution can be obtained from W . If we think of W as an hierarchy of classification, we can write $W = \text{asset (age-sex) size}$. Then,

1. Multiplication of W on the left by I_{nm} eliminates an asset.
2. Multiplication of W on the right by I'_{2s} eliminates size.
3. Multiplication of W on the left by K_{nm} eliminates age.
4. Multiplication of W on the right by K'_{s2} eliminates sex.
5. Multiplication of W on the left by J'_{nm} eliminates asset and age.
6. Multiplication of W on the right by J_{2s} eliminates size and sex.
7. Sequential eliminations are obtained by performing operations in sequence (see table below).

MATRIX MULTIPLIERS, OPERATIONS AND PRODUCTS

Left	Multipliers	Right	Eliminates	Product	Product gives wealth-holding by
J'_{nm}	-	-	Asset, age	$J'_{nm}W$	Sex, size
-	J_{2s}	-	Sex, size	WJ_{2s}	Asset, age
I_{nm}	-	-	Asset	$I_{nm}W$	Age, sex, size
-	I'_{2s}	-	Size	WI'_{2s}	Asset, age, sex
K_{nm}	-	-	Age	$K_{nm}W$	Asset, sex, size
-	K'_{s2}	-	Sex	WK'_{s2}	Asset, age, size
I_{nm}	-	K'_{s2}	Asset, sex	$I_{nm}WK'_{s2}$	Age, size
K_{nm}	-	I'_{2s}	Age, size	$K_{nm}WI'_{2s}$	Asset, sex
I_{nm}	-	I'_{2s}	Asset, size	$I_{nm}WI'_{2s}$	Age, sex
I_{nm}	-	J_{2s}	Asset, size,sex	$I_{nm}WJ_{2s}$	Age
J'_{nm}	-	I'_{2s}	Asset, age,size	$J'_{nm}WI'_{2s}$	Sex
J'_{nm}	-	K'_{s2}	Asset, age, sex	$J'_{nm}WK'_{s2}$	Size
K_{nm}	-	J_{2s}	Age, sex, size	$K_{nm}WJ_{2s}$	Asset
K_{nm}	-	K'_{s2}	Age, sex	$K_{nm}WK'_{s2}$	Asset, size

W =

$$\begin{pmatrix}
 \begin{pmatrix} t_{11}W_{1111} & t_{12}W_{1211} \\ t_{21}W_{2111} & t_{22}W_{2211} \\ \vdots & \vdots \\ t_{m1}W_{m111} & t_{m2}W_{m211} \end{pmatrix} & \begin{pmatrix} t_{11}W_{1112} & t_{12}W_{1212} \\ t_{21}W_{2112} & t_{22}W_{2212} \\ \vdots & \vdots \\ t_{m1}W_{m112} & t_{m2}W_{m212} \end{pmatrix} & * & * & * & \begin{pmatrix} t_{11}W_{111s} & t_{12}W_{121s} \\ t_{21}W_{211s} & t_{22}W_{221s} \\ \vdots & \vdots \\ t_{m1}W_{m11s} & t_{m2}W_{m21s} \end{pmatrix} \\
 \\
 \begin{pmatrix} t_{11}W_{1121} & t_{12}W_{1221} \\ t_{21}W_{2121} & t_{22}W_{2221} \\ \vdots & \vdots \\ t_{m1}W_{m121} & t_{m2}W_{m221} \end{pmatrix} & \begin{pmatrix} t_{11}W_{1122} & t_{12}W_{1222} \\ t_{21}W_{2122} & t_{22}W_{2222} \\ \vdots & \vdots \\ t_{m1}W_{m122} & t_{m2}W_{m222} \end{pmatrix} & * & * & * & \begin{pmatrix} t_{11}W_{112s} & t_{12}W_{122s} \\ t_{21}W_{212s} & t_{22}W_{222s} \\ \vdots & \vdots \\ t_{m1}W_{m12s} & t_{m2}W_{m22s} \end{pmatrix} \\
 \\
 * & * & & * & * \\
 * & * & & * & * \\
 \\
 \begin{pmatrix} t_{11}W_{11n1} & t_{12}W_{12n1} \\ t_{21}W_{21n1} & t_{22}W_{22n1} \\ \vdots & \vdots \\ t_{m1}W_{m1n1} & t_{m2}W_{m2n1} \end{pmatrix} & \begin{pmatrix} t_{11}W_{11n2} & t_{12}W_{12n2} \\ t_{21}W_{21n2} & t_{22}W_{22n2} \\ \vdots & \vdots \\ t_{m1}W_{m1n2} & t_{m2}W_{m2n2} \end{pmatrix} & * & * & * & \begin{pmatrix} t_{11}W_{11ns} & t_{12}W_{12ns} \\ t_{21}W_{21ns} & t_{22}W_{22ns} \\ \vdots & \vdots \\ t_{m1}W_{m1ns} & t_{m2}W_{m2ns} \end{pmatrix}
 \end{pmatrix}$$

Historical Perspectives on IRS Wealth Estimates With a View to Improvements

by Fritz Scheuren, Ph.D

My role, in these few minutes Jim Smith has given me, is to provide a short history of IRS estimates of wealth and their limitations. Let me begin with a little background on how IRS started making estate multiplier wealth estimates in 1962. Then we'll look briefly at the handout which you have. This contains the details of exactly what was done and why. Finally, I'd like to reflect with you on the experience.

Contributors to IRS Wealth Estimates

So think back with me to the early 60's. Under the late Ernie Engquist, the IRS Statistics Division, at the suggestion of Raymond Goldsmith, agreed to try to repeat for 1962 the wealth estimation procedures that Robert Lampman had used in his work for 1953. A number of people played important roles in the early planning, including Helen Demond, Jeanette Fitzwilliams, and Dave Cassidy. Jim Smith joined the Statistics Division for a while in 1965-66 and contributed his experience on the 1958 estate tax wealth estimates he had made. He continued to contribute as a technical consultant thereafter. While at IRS, Jim helped set up a cooperative effort to determine the equity values of the life insurance reported on Federal estate tax returns. This study was carried out at the Institute of Life Insurance under the direction of Virginia Holran and Robert Chiapetta.

The late Mortimer Spiegelman at Metropolitan Life also acted as a technical consultant, since Metropolitan Life's policyholder experience played an integral part in the construction of the estate multipliers used. The actual estimates and the 1962 report which resulted were prepared by me under the direction of Staunton Calvert and, later, Keith Gilmour.

Since 1962, estate multiplier wealth estimates

have been done routinely at IRS. The work at IRS after 1962 has proceeded under Keith Gilmour and Charlie Crossed, with the very active participation of the Statistics Division's current Director, Vito Natrella.

Description of 1962 Estimates

So much for the credits. Now let me show you a little of the movie. If you will turn to the handout please [see SOI Personal Wealth, 1962].

The paper you have presents a general summary description of the assets and demographic characteristics of living individuals with gross holdings of \$60,000 or more in 1962. The focus is on the age, race, sex, and marital status of those "top wealthholders," as well as the size and composition of their wealth.

The estimates of the wealth of the living in the paper are based on Federal estate tax returns filed during 1963 for decedents with a gross estate of \$60,000 or more. Each decedent's estate was weighted by the inverse of the mortality rate appropriate to his age and sex. Adjustments were made for social class mortality differentials using Metropolitan's \$5,000 or more Whole Life experience for men and assuming the mortality differentials between white men and women in the general population held for top wealthholders as well.

Reflection on 1962 Estimation Procedure

Let me now turn to some reflections on the 1962 wealth estimates. There are many lessons to be learned from the 1962 experience which can be helpful in planning future work.

A great deal of thinking, for example, needs to be done about the valuation problems that exist when using estate tax returns to estimate wealth.

Prepared remarks delivered on May 2, 1975, at the Workshop on Estate Multiplier Estimates of Wealth sponsored by the National Bureau of Economic Research. The help of Wendy Alvey, Laverne Rauman, Lois Gale, H. Lock Oh, and Catherine Murphy is gratefully acknowledged.

The wealth concept itself has some unattractive features, in that wealth represented only by an income right is not included. Historical comparisons, particularly concentration estimates, are subject to considerable interpretation problems due to this.

The importance of pension rights, for instance, has grown tremendously in recent years and will become even more important. There is also the effect of transfers in trust which confer an income right on one generation with the remainder interest going to the next. In such cases, the wealth is includable on the Federal estate tax returns only every other generation.

I don't know what can be done about these problems in future estimates, beyond combining the estate multiplier technique with other measuring devices; notably, household surveys which include matching to administrative information (something we are doing a great deal of at Social Security right now).

"Sampling" problems are the area in which I personally have the greatest interest. These principally include deriving a better sense of the selection "probabilities" appropriate for the mortality of the wealthy. Standard concerns such as sampling variability (especially for the young and the very rich) and sample control are also very important and have not been given enough attention. I am particularly concerned with the use of a year's filings to represent a year's deaths. Since there is such a long period in which executors can file, a good deal of uncertainty is introduced by not controlling the sample more. (Also, the very largest estates may never even get into the statistics at all because auditors are reluctant to give them up.)

I've always had the suspicion that Lampman got too many returns filed in 1954 for his 1953 estimates because of the law changes which occurred at that time. When one looks at the estate tax filing historically (1945-1973), there do seem to be little extra increases in filings during the period just before major changes in the law go into effect. However, let me add that I have not really looked closely enough at this phenomenon to say whether or not there is anything to the

causal structure I am implying.

The fundamental sampling problem is, of course, what probabilities of selection should we use. I have three things to say about this.

Use of Death Certificates

First, we need to study the mortality of the well-to-do by using the estate tax returns themselves. Unlike any other tax return, the Form 706 has a great deal of demographic information. This, of course, is what makes it attractive as an alternative to household surveys for information on the wealthy. In the past basically only age, sex, and marital status have been edited off the return. Other available data which could be picked up include occupation (even though perhaps only of moderate usefulness except for those under 65), nativity (foreign or native born), cause of death, length of last illness, date and length of widowhood.

The results of a 1965 pilot study on the reporting of these demographic characteristics indicated that, except for cause of death, the response was reasonably good. The proposal I made some time ago, and make again now, which bears on this "cause of death" problem is that the Form 706 be changed to require the executor to submit the death certificate or at least the death certificate number. Since the National Center for Health Statistics (NCHS) codes all U.S. deaths by cause, a computer match with their records would make it possible to obtain this important data item. Except for race, the estate tax return already requires essentially the same information provided on most death certificates, so little if any additional burden is being placed on the executor.

The problems of disclosure in such an arrangement exist and may preclude such a match. As far as I know, NCHS has no problem of this sort.¹ IRS, by providing to NCHS only the date of death and death certificate number, would be disclosing no more than that a particular decedent had an estate tax return filed for him. It may even be possible to buy (or borrow) the NCHS data files and do the matching at IRS.

For literally decades we have been trying to study mortality patterns by socio-economic class.

All sorts of proxies have been used: housing, occupation, income, education, size of insurance. However, it is the estate tax return, itself, which is the best place to look, if not for differential rates, at least for differences in patterns of mortality, in the causes and seasonality of death.

Valuation Study Proposal Sketched

My second point is the following: Certain direct tests should be applied to the mortality differentials that are thought to be appropriate for the estate multiplier. (For example, Jim Smith, in the 1969 work, used 12 different sets of differentials. The choice among these had to be largely subjective.)

The project I have in mind would be carried out jointly by Social Security and Internal Revenue Service, and it could be part of the estate tax program IRS has planned for returns filed in 1977. SSA would provide IRS with a file of 1976 male decedents from its 10 percent Continuous Work History Sample. (For males 35 or older, the reporting of deaths to SSA is about 95% complete. One of the reasons that it is so complete is that, in most cases, the heirs are entitled to a lump sum death benefit of \$255.) IRS would then merge this file with their estate tax file of 1976 decedents. SSA will validate and, if necessary, supply the social security numbers for records on the estate tax file so this matching can be carried out. The resulting file, appropriately weighted, will be matched with the 1974 Individual Income Tax Master File. Marital status (type of return), 1974 AGI, wages and salaries, and other income information from the Master Tax File will be added to the decedent file.² The weights on this file will be adjusted by mortality multipliers based on age-race-and marital status to produce estimates of all income tax filers for 1974. After this adjustment, IRS would prepare tabulations from this tape of the population by AGI class, etc. These results will be compared to actual totals from Statistics of Income for 1974. Any discrepancies found (aside from those attributable to sampling variability), can be interpreted, with qualifications, as measuring the net impact of the differential mortality which exists within age-sex-race-marital status groups in 1976.

When the discrepancies between the income comparisons of the decedent sample and the basic income tax files have been resolved (using a "raking" procedure developed at SSA), the decedent file may give useful estimates of the distribution of both income and wealth, at least in so far as this is available from the administrative records being used.

The project which I just described briefly is still in the discussion phase. A number of problems must be resolved. Preserving the confidentiality of SSA and IRS data is, of course, an essential legal requirement. Furthermore, it is not clear at this stage whether or not the recently passed Privacy Act will permit the kind of matching we have in mind.³

This project has another major deficiency in that it only allows us to test the mortality differentials for men. Deaths for females are not reported very well to Social Security. (For example, only about 2/3rds of the deaths among women in 1972 were reported.) We need to provide some other means of testing mortality differentials for women. One that occurred to me is to use the community property information on the estate tax return to test these female differentials, since conceptually the number of married male top wealthholders with community property (above a certain size) must equal the number of married females with community property. A small and incomplete test of this idea was carried out with the 1969 filings, and I think it has promise for the future work at IRS. (The results of this 1969 work are shown in Table 1 below.)

Overemphasis on Wealth Concentration Estimates

The third thing I'd like to say has to do specifically with the use of the estate multiplier technique for work on wealth concentration. I think that undue emphasis has been given to this aspect in previous research, given the uncertainty that now surrounds the mortality rates that one should use. On the other hand, for looking at patterns of asset holdings among different age, sex, net worth, marital status groups and so forth, the estate multiplier technique seems to be fairly reliable. For example, Jim Smith, in his 1969 work, examined 12 different mortality assumptions. The variance between the total top wealth-

holder figures was enormous. However, the overall percentage distributions by size of wealth were practically identical for all 12. (See Table 2 below.) This suggests that the analysis of patterns of wealthholding may be robust over a very wide range of reasonable alternative assumptions about what the multipliers are. The overall aggregate estimates are obviously very sensitive to one's assumptions and must be considered (in Kendall's words) to be quite frail.

In saying this, I do not wish to sound as if I favor abandoning the attempt to make wealth concentration estimates using the estate multiplier technique. Rather, I am suggesting that there are a number of other interesting areas which can be productively studied that may not be as sensitive to the uncertainty surrounding what the mortality rates are for "top wealthholders."

ENDNOTES

1. It turns out that NCHS does, as I should have assumed, have such problems, but, if suitable safeguards are instituted, these need not be insurmountable.
2. Our later work indicates that there might be enough of a downturn in income near death to require an earlier master file be used. With the help of Census Bureau staff, therefore, a match will also be made to the 1969 IRS master file as well. Under this revised procedure "weights" would be determined from the 1969 file. The 1974 matched data could then be examined (as weighted) to see what income differences exist between persons who will die two years later and those who will not.
3. It does not cover deceased individuals.

1993 AFTERWORDS

In rereading this long-ago talk, I thought some afterwords might be worth adding about what has happened since 1975.

- First, it is particularly gratifying, thanks to Barry Johnson, Marvin Schwartz, and Louise Woodburn (among others), that so many recommendations made here were actually implemented. Notable among these was the shift to a year-of-death rather than a year-of-filing sample and the establishment of a partnership with the Federal Reserve Board so that their Survey of Consumer Finances can be used jointly with the estate wealth estimates.
- Second, even though nearly 20 years have passed and many heroic efforts have been made, the talk also illustrates all too well a truth of human affairs, "When all is said and done, more is said than is done." For example, while some work was attempted with the National Death Index on directly studying mortality patterns of the wealth from estate returns, this project proved harder and less immediately rewarding than I envisioned. The work of linking together SSA and IRS income and estate files was actually completed and well documented by Keith Gilmour (and the combined file is available at the National Archives); however, to my knowledge, the study called for has not been done, even though the file is available.
- Third, one of the benefits of revisiting something done so long ago is to see how much or how little one's understanding stood the test of time. In some ways my views have stood up fairly well. The dimensions of the problem as I understood them then were roughly right. What I didn't understand were all the new dimensions of wealth estimation that others would bring. Here I'm thinking not only of IRS staff but particularly of Gene Steuerle and, more recently, David Joulfaian and Arthur Kennickell. Whole perspectives (vistas) have been added to my thinking and a deeper appreciation of this subject has been gained from them. I look forward to this kind of change continuing and for still more dimensions to be added by researchers whose names are not yet known.

Table 1 -- Number of Married Wealthholders in 1969 in Community Property States by Size of Total Assets

(Numbers in thousands; ratios based on unrounded counts.
Detail may not add top totals because of rounding.)

Total Assets Modified (in dollars)	Community Property States			
	Total	California	Texas	All other (except New Mexico)
Part I: Married Female Top Wealthholders				
Total	376	226	102	49
60,000 under 100,000	155	97	35	24
100,000 under 150,000	96	60	26	10
150,000 under 300,000	77	41	26	9
300,000 under 1,000,000	40	22	12	5
1,000,000 or more	8	6	2	1
Part II: Married Male Top Wealthholders				
Total	407	205	101	101
60,000 under 100,000	177	87	47	43
100,000 under 150,000	89	47	22	20
150,000 under 300,000	87	44	20	23
300,000 under 1,000,000	47	23	11	13
1,000,000 or more	6	3	1	2
Part III: Ratio of Female to Male Top Wealthholders (in percent)				
Total	92.7	110.3	101.6	48.1
60,000 under 100,000	87.7	110.9	75.2	54.4
100,000 under 150,000	108.4	127.4	121.5	49.3
150,000 under 300,000	88.0	93.0	131.8	40.2
300,000 under 1,000,000	85.1	96.3	114.2	41.1
1,000,000 or more	134.9	176.5	149.3	34.0

Note: Total assets was modified for this table by subtracting twice the marital deduction so as to more nearly approximate the community property holdings of married persons. Community property states in addition to California and Texas are Arizona, Idaho, Louisiana, Nevada, New Mexico, and Washington. New Mexico was not included because of the special treatment given community property at death (see STATISTICS OF INCOME 1962 -- PERSONAL WEALTH, p. 74). The mortality rates underlying the estimates in the table are described in detail in STATISTICS OF INCOME, 1969 -- PERSONAL WEALTH, p. 75. See also pp. 57-58 of that same report, where data on Top Wealthholders are presented by State

Generally (except for insurance), whatever property is acquired by the efforts of either the husband or wife during marriage belongs to the marital community, and not to the husband or wife separately. Property acquired either before marriage, or after marriage by gift or inheritance, usually is considered the separate property of the spouse who acquired it and is taxed as such. For estate tax purposes, only half the community property at date of death is included in the gross estate of the decedent. Community property was not shown separately in the estate tax statistics for 1969; therefore, the crude approximation, total assets less twice the marital deduction, was created.

Table 2 -- Percentage Distribution of 1969 Top Wealthholders by Size of Economic Estate

Size of Economic Estate (in dollars)	Estimates of Top Wealthholders for 1969 Under Differing Mortality Assumptions											
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
Number of Top Wealthholders (in thousands)	4,964	7,355	8,124	6,139	6,904	5,342	5,187	7,703	8,506	6,424	7,171	5,587
Percent	100.00	100.00	100.00	100.00	100.00	100.00	100.00	100.00	100.00	100.00	100.00	100.00
60,000 under 80,000	23.90	23.94	23.88	24.00	24.15	24.05	23.29	23.31	23.27	23.36	23.52	23.40
80,000 under 100,000	18.88	19.03	18.98	19.02	18.69	19.01	18.95	19.08	19.02	19.10	18.77	19.11
100,000 under 150,000	26.95	26.97	26.96	26.96	26.46	26.96	27.28	27.34	27.32	27.33	26.83	27.32
150,000 under 200,000	11.44	11.40	11.36	11.43	11.32	11.45	11.61	11.57	11.52	11.61	11.50	11.64
200,000 under 300,000	8.92	8.91	9.00	8.84	9.26	8.78	8.97	8.96	9.04	8.88	9.32	8.82
300,000 under 500,000	5.67	5.59	5.63	5.59	5.73	5.59	5.65	5.57	5.62	5.56	5.69	5.56
500,000 under 1,000,000	2.88	2.83	2.86	2.82	3.03	2.81	2.89	2.84	2.88	2.83	3.00	2.81
1,000,000 under 2,000,000	0.93	0.90	0.91	0.92	0.94	0.92	0.95	0.92	0.92	0.93	0.95	0.95
2,000,000 under 3,000,000	0.21	0.20	0.20	0.21	0.21	0.21	0.19	0.18	0.19	0.19	0.19	0.19
3,000,000 under 5,000,000	0.12	0.12	0.12	0.11	0.11	0.11	0.12	0.12	0.12	0.11	0.12	0.11
5,000,000 under 10,000,000	0.07	0.07	0.07	0.07	0.07	0.07	0.07	0.07	0.07	0.06	0.06	0.06
10,000,000 or more	0.03	0.04	0.04	0.03	0.03	0.03	0.03	0.04	0.04	0.03	0.03	0.03

Note: Economic estate is gross estate less lifetime transfers, debts and mortgages, and policy loans on insurance. The full face value of the insurance is included, not just the equity amount. The multipliers used in making the estimates were constructed by Smith in his work for 1969. Column-by-column notes are provided on the next page.

MULTIPLIERS FOR EACH COLUMN OF TABLE 2

Column

- (1) - Reciprocals of 1969 white age-sex-specific mortality rates.
- (2) - Reciprocals of age-sex-specific mortality rates based on the experience of the Metropolitan Life Insurance Company with preferred risk whole life policies. The policy is issued in minimum amounts of \$5,000 (later \$10,000). The experience over the period 1964 to 1969 was used, but only policies issued before 1960 and which had been in force a minimum of six years were considered. Because the insured were predominantly male, rates for females were calculated by assuming that the same ratio of male to female mortality existed as in the white population in 1969.
- (3) - Reciprocals of age-sex-specific mortality rates based on the Metropolitan Life Insurance Company's experience with the broader Preferred Risk category issued since 1960. The policy is issued in a minimum amount of \$25,000. Because insured rates were for males, female rates were estimated in the same manner as in (2).
- (4) - Reciprocals of age-sex-specific mortality rates calculated by splitting the difference between the rates of (2) and a set of modified occupational class mortality rates based on the work of Moriyama and Guralnick for ages 20-65. For age 65 and on, the rates were calculated by splitting the difference between the rates of (1) and (2).
- (5) - Reciprocals of age-sex-specific mortality rates calculated in the same manner as (4), by with the rates of (3) substituted for those of (2).
- (6) - Reciprocals of age-sex-specific mortality rates based on the occupational mix of wealth (\$600,000 or more) Washington, D.C. decedents in 1967. Due to insufficient observations for ages less than 35 the average of Moriyama and Guralnick's top two occupational classes updated to 1969 were used. For ages 65 and over, (1) rates were used because social class differentials were believed to have disappeared.
- (7) - Reciprocal of the rates from (1) adjusted for marital status differentials based on the work of Klebba ("Mortality from Selected Causes by Marital Status," Vital and Health Statistics, Series 20, Nos. 8a and 8b, 1970).
- (8) - Reciprocals of the rates from (2) adjusted for marital status differentials.
- (9) - Reciprocals of the rates from (3) adjusted for marital status differentials.
- (10) - Reciprocals of the rates from (4) adjusted for marital status differentials.
- (11) - Reciprocals of the rates from (5) adjusted for marital status differentials.
- (12) - Reciprocals of the rates from (6) adjusted for marital status differentials.

Improving Wealth Estimates Derived From Estate Tax Data

by Janet McCubbin

The estate tax multiplier method may currently be the best available estimator of the personal wealth of the U.S. population of individuals with total assets greater than the estate tax filing requirement. In this method, values from the estate tax return are multiplied by the inverse of an appropriate age and sex specific mortality rate to provide an estimate of wealth for the living population. This method has certain advantages over survey methods, but it may tend to underestimate the number and net worth of the wealthiest individuals. Much of the ongoing research at the Statistics of Income Division of the IRS is focused on enhancing the quality and usefulness of data extracted from estate tax returns, and on improving the accuracy of the multipliers used. A variety of approaches aimed at developing better wealth estimates is being explored; three of these are described in this paper.

While the estate tax code has been fairly consistent over time relative to some other tax law areas, several notable changes have been legislated during the past decade. Data collectors and data users should be aware of these alterations as they can cause subtle or sometimes dramatic changes in the nature of the data. Because a basic understanding of the estate tax code and changes to it is necessary for intertemporal analysis of the data, a review of some aspects is presented here.

Estate multiplier estimates may be too low if assets as reported on the returns are undervalued or if they are omitted from the returns. In the interest of timeliness, data are extracted from returns before they are audited. However, developing an adjustment factor that reflects observed changes in net worth figures as a result of the audit process should reduce the downward bias in estate multiplier estimates. A pilot study of post-audit information is being conducted and preliminary results are discussed in the second section of this paper.

Finally, supplementary sources of data may be used to evaluate and correct for the under-enumeration of wealthholders and possibly the undervaluation of assets. One available source is the listing of 400 of the wealthiest Americans published annually in *Forbes*. Analysis of this data set, including exact-matching with the estate tax returns of decedents from this group, is ongoing. Results to date are discussed in the third section of the paper.

ESTATE TAX LAW CHANGES

In order to compare wealth estimates produced by different organizations, it is necessary to understand differences in the ways in which assets are defined and valued. Similarly, when considering wealth estimates produced over time by the Internal Revenue Service, it is necessary to note how tax law changes have affected the types of assets reported and the valuation of those assets.

New tax provisions sometimes affect the estimates directly by redefining what assets are to be reported on the estate tax return. For example, the 1976 Tax Act required that all transfers made within 3 years of death be included in the total gross estate. This increases the net worth figure directly. In addition, a new provision may affect wealth estimates indirectly, by influencing the behavior of taxpayers. If, as a result of the requirement discussed above, taxpayers alter their patterns of gift-giving, other asset categories would be affected indirectly.

Finally, new legislation might redefine the population of taxpayers. For 35 years, the estate tax law required that a return be filed for any decedent with a gross estate of \$60,000 or more. That filing requirement has increased annually since 1977. For those dying in 1987, it will be \$600,000. This has, of course, drastically reduced the size of our population. Statistics of Income estimates are now limited to a much smaller portion of the wealth distribution curve. [1]

The Tax Reform Act of 1976 became effective on January 1, 1977. Since it pertains to individuals dying after December 31, 1976, its changes will be most evident on returns received after September 1977. (Returns are due to be filed within nine months of death unless an extension is granted.) The Economic Recovery Tax Act of 1981 (ERTA) is effective for individuals dying after December 31, 1981, except for some retroactive changes. Effects resulting from ERTA will be most evident on returns filed after September 1982. Changes in the estate tax law mandated by the Tax Reform Act of 1976 and the Economic Recovery Tax Act of 1981, which have the potential for significantly impacting estate tax multiplier estimates, are discussed below.

The Tax Reform Act of 1976

The Tax Reform Act of 1976 was the first major revision of the estate tax law since its inception. Several components of the revision which had important implications for estate tax data are reviewed below. [2-4]

The Unified Rate Schedule, Unified Credit and Filing Requirement.--One of the most sweeping changes mandated by the 1976 Act involved the revamping of the basic structure of the estate and gift taxes. For those dying prior to January 1, 1977, gift tax rates were lower than estate tax rates, and the rate at which an estate was taxed was independent of the amount of gift taxes previously paid by the decedent. Estate planners could cushion the impact of progressive estate tax rates and take advantage of lower gift tax rates by transferring property before death rather than at death. The very wealthy benefitted most from this strategy, as they could afford to transfer large amounts of property prior to death.

The 1976 Tax Act unified the estate and gift tax schedules. Transfers made after December 31, 1976, that are not included in the total gross estate, are added to the taxable estate, in order to determine the rate of taxation. (Gift taxes paid on such transfers are then subtracted from the gross estate tax.)

A unified credit was developed to replace the exemption which was previously used to calculate the estate tax due. The exemption, which was applied to the gross estate before the tax computation, was especially favorable to wealthier individuals because it provided a tax savings from the higher tax brackets. The unified credit, which is subtracted from the gross estate tax after the computation of the tax, constitutes a savings from the lower tax brackets. At the same time, the filing requirement was increased from \$60,000 to \$175,000 over a period of five years. The unified credit was increased in a similar manner.

Year of Death	Filing Requirement	Credit
1976	\$60,000	N/A
1977	\$120,000	\$30,000
1978	\$134,000	\$34,000
1979	\$147,000	\$38,000
1980	\$161,000	\$42,500
1981	\$175,000	\$47,500

These changes, designed to bring tax relief and fairness to small and medium estates, affect wealth estimates by removing smaller estates from the population. However, our estimates derived from estates above the filing requirement should not be affected, except to the extent that gift-giving is influenced by the unification of the estate and gift tax schedules.

Transfers within Three Years of Death.--Prior to 1977, transfers of property made within 3 years of death were assumed to have been made in contemplation of death and were includable in the gross estate. The executor of the estate could contest the presumption that a gift was made in contemplation of death and sometimes have the value of the transfer removed from the estate. This rebuttable presumption led to a significant amount of litigation. The Tax Reform Act of 1976 amended section 2035 to include in the gross estate all transfers made within 3 years of death, other than bona fide sales, regardless of the decedent's motivation.

In addition, any gift tax paid after December 31, 1976, and within 3 years of death, was also includable in the gross estate. Prior to 1977, gift taxes reduced the total gross estate by the amount paid, regardless of the timing of the transfer. The abolishment of the rebuttable contemplation of death presumption and the inclusion of the gift tax "gross-up" rule served to simplify the valuation of estates and to remove the incentive to make death-bed transfers for the purpose of tax avoidance.

The effect of the changes in the treatment of transfers on wealth estimates is undoubtedly complex. Under the 1976 Act provisions, more transfers are includable in the gross estate and

the gift taxes on these transfers are also includable. Thus, we might expect the amount of transferred wealth reported on the estate tax return to increase. Yet, since the tax advantages of making death-bed transfers are eliminated, the amount of transfers might decrease. This would result in a decrease in the wealth reported as transfers and some increase in the wealth reported as other types of assets. The overall effect, regardless of whether or not there is a decrease in gift-giving, should be some increase in the total gross estate. (The extent of the effect is at least partially dependent upon the extent to which individuals make transfers to minimize taxes.)

Joint Property Held by Spouses.--Prior to 1977, the total gross estate included the entire value of property held by the decedent as a joint tenant or tenant by the entirety with a spouse, except for the portion of the property attributable to consideration furnished by the survivor. The 1976 Act replaces the "consideration furnished" rule with a "fractional interest" rule for qualified joint interests. Under the "fractional interest" rule, only one-half of property held entirely by the decedent with a spouse is includable in the gross estate, provided that: the tenancy was created after December 31, 1976, by the decedent, the spouse or both and the creation of the interest constituted a completed gift for gift tax purposes. (Spouses are permitted to dissolve joint interests and recreate them after December 31, 1976, in order to take advantage of the new law.) The donor must have elected to treat the joint tenancy of real property as a taxable event, even if no gift tax is paid due to the annual exclusion, marital deduction or application of the unified credit.

While the entire value of joint property assets is often referred to on Schedule E of the estate tax return, only one-half of the value of a qualified joint interest must be included in the total gross estate. Therefore, our net worth estimates will be reduced to the extent that such interests are created. This reduction may be partially offset by the inclusion of one-half of the property as transferred wealth, when a qualified joint tenancy is created by a decedent within 3 years of death. The net worth of surviving spouses is not affected by the provision, as the entire property will be includable in the surviving spouse's gross estate, if it was not disposed of prior to death.

Special Use Valuation.--Prior to 1977, all assets in the gross estate were included at their fair market or "highest and best use" value. This created severe liquidity problems for some farmers and owners of closely held businesses, forcing them to sell their inherited property in order to pay the estate taxes on it. The 1976 Act allowed executors to refer to the capitalization of earnings or similar methods, as well as to the fair market value, when valuing assets and thereby reduce the value of the property by up to \$500,000.

To qualify for special use valuation, the decedent and the heirs must meet stringent requirements regarding citizenship, the size of the property relative to the total estate and

the use of the property prior to and subsequent to the time of death. Because of the specific requirements allowing for special use valuation and the limitation of the reduction to \$500,000, the effect of this provision on wealth estimates may be slight and is more significant for smaller estates.

The generation-skipping transfer tax also first appeared in the 1976 Act; however, because of subsequent, ongoing revisions and problems with compliance, the eventual effects of this tax are not yet apparent.

The Economic Recovery Act of 1981

The Economic Recovery Tax Act (ERTA) mandated the next significant estate tax code revisions. Those which are likely to have affected IRS data are discussed here. [5,6]

The Filing Requirement, Unified Credit and Tax Rate.--The 1976 Tax Act increased the estate tax filing requirement from \$60,000 to \$175,000 over a period of 5 years. ERTA provided for further increases in the filing requirement and corresponding unified credit.

Year of Death	Filing Requirement	Credit
1982	\$225,000	\$ 62,800
1983	\$275,000	\$ 79,300
1984	\$325,000	\$ 96,300
1985	\$400,000	\$121,800
1986	\$500,000	\$155,800
1987 and after	\$600,000	\$192,800

In addition, ERTA decreased the maximum estate and gift tax rate from 70 percent to 50 percent over 4 years beginning in 1982 and enlarged the highest tax bracket to include taxable transfers of \$2.5 million or more, rather than \$5 million or more. (The Tax Reform Act of 1984 delayed the effective year of the final reduction by 3 years.)

The increase in the filing requirement will further limit estate tax multiplier estimates to the very wealthiest Americans. Taxpayer response to lower estate tax rates is another subject worthy of consideration. Given lower tax rates, taxpayers may decide to avoid the inconvenience of sheltering assets and, thus, more wealth would be reported on the estate tax return.

The 1981 Act also increased the annual gift tax exclusion from \$3,000 to \$10,000. This increase should induce individuals to make more lifetime transfers, thus resulting in some decrease in estate multiplier estimates, as assets are removed from the estate.

Interspousal Transfers and Joint Property.--The 1981 Act drastically liberalized the treatment of interspousal transfers, eliminating limits on estate and gift tax marital deductions. After December 31, 1981, individuals can transfer unlimited amounts to their spouses tax-free. (The Act includes a transitional rule to address marital deduction clauses in wills executed or trusts created before 30 days after the enactment of ERTA.) Provisions which prohibit estate

and gift tax deductions for transfers of community property between spouses were removed. Furthermore, only one-half of the value of joint property owned by spouses with rights of survivorship must be included in the total gross estate, regardless of which spouse furnished consideration for the property or the purpose for which the property is used.

Certain lifetime income interests granted to spouses may also pass tax-free. To qualify for this Qualified Terminable Interest Property (QTIP) deduction, the decedent's executor must make an election. No person may have the power to appoint any part of the property before the second spouse's death. The property is taxed when the second spouse disposes of it or dies.

Since the marital deduction is taken after the computation of the total gross estate, the deduction will not directly affect the wealth observed after the death of the first spouse. However, it is possible that the total gross estate figure will increase somewhat if taxpayers, able to pass an entire estate to a spouse tax-free, shelter fewer assets. In addition, since wives are more often the surviving spouse, wealth estimates for women may increase, as husbands minimize estate taxes by bequeathing more assets to their wives and fewer to children or other beneficiaries. Under ERTA, the gross estate figure will be lower for some owners of joint property (those who furnished consideration), and higher for others, than it would have been under previous law.

Transfers within Three Years of Death.--Under the 1976 Tax Act, all gifts made within 3 years of the donor's death were to be included in the gross estate at their value as of the date of death or as of the alternate valuation date. Under ERTA, only certain gifts made within 3 years of death are included. These are gifts of life insurance, gifts in which life estates are retained, gifts in which the decedent had a reversionary interest, revocable transfers and gifts of general powers of appointment.

This change will lead to some decrease in our net worth estimates. Gifts within 3 years of death will still be taxed when the gift is made, and the gift tax paid will still be included in the total gross estate, but the value of the transferred property will not be included in the total gross estate. Patterns of gift-giving will probably not be significantly affected. (Under ERTA, estates will only be saved the tax on the appreciation of property which occurred between the date of the gift and the date of death.)

Special Use Valuation.--ERTA liberalizes the special use valuation provisions enacted in 1976. The changes are generally retroactive to January 1, 1977. The amount by which the value of farms and closely held businesses may be reduced is increased from \$500,000 to \$750,000 over 3 years. The liberalization of these provisions will reduce our net worth estimates to the extent that more estates will qualify for special valuation and that some estates will be allowed larger reductions in property values.

Summary

The discussion here of indirect effects on our

estimates is not supported by theory or empirical evidence; yet, it is important to consider such possibilities, especially when using estate tax (or other IRS) data for intertemporal analysis. It is also necessary to consider legislative changes when evaluating the ability of the estate multiplier method to estimate the distribution of wealth in the United States.

POST-AUDIT DATA

As previously noted, estate tax multiplier estimates of wealth produced by the Internal Revenue Service are based on data edited from estate tax returns before the returns are audited. All estate tax returns are examined by the Service, but in the interest of timeliness, returns are edited for statistical purposes prior to the audit process. While it has long been recognized that asset valuations might change significantly during the audit, no review of these changes has been conducted in recent years. [7] A pilot study of post-audit returns is currently being conducted by the Internal Revenue Service. Returns are being examined to evaluate the nature and magnitude of changes in the valuation of assets made by auditors using these data. We may be able to develop adjustment factors to apply to estate data to compensate for inaccuracies in reporting by taxpayers.

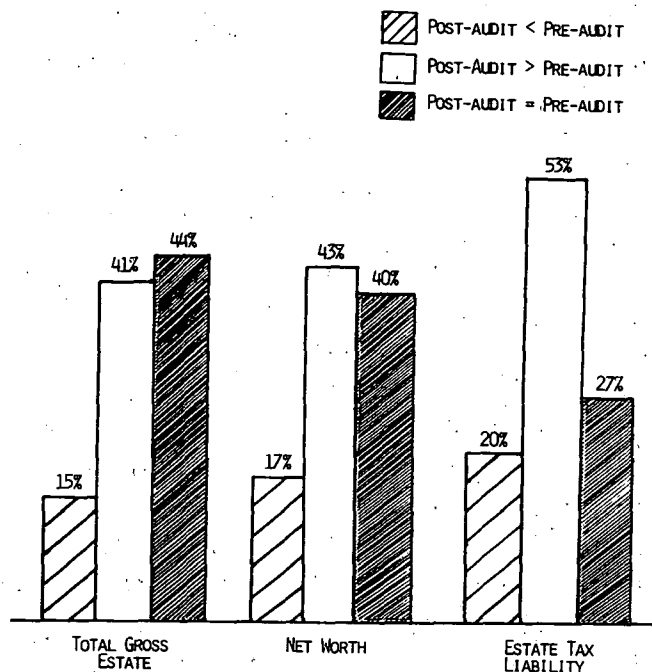
Currently, returns filed in 1983 at two IRS service centers are being examined. It was determined that returns filed in 1983 would be old enough to have completed the audit process, yet recent enough to provide insight applicable to future wealth estimates. In addition, there are also personal wealth estimates available which are focused on this filing year. [8] These returns represent primarily individuals dying in 1982. The estate tax filing requirement in that year was \$225,000.

One hundred thirty-seven returns have been sampled thus far. Eighty-three percent of the returns are for estates with at least \$5 million in assets. All of the returns with at least \$5 million in assets, from the two IRS service centers involved, are included in the sample; the sample does not include any returns with less than \$500,000 in the gross estate. Seventy-two percent of these returns have been received and examined; we expect to receive the remaining returns shortly.

Preliminary Results

Figure 1 shows the frequency and direction of changes in the total gross estate, net worth and estate tax liability. Thus far, the post-audit differences we have observed have been smaller than expected. Aggregate net worth, defined as the total gross estate less debts and mortgages, increased by about 2 percent. If we consider only the cases for which net worth increased, the increase was over 4 percent. A fair amount of the 2 percent increase in aggregate net worth is due to a 1.7 percent decrease in debts and mortgages allowed as deductions. Of the assets, the largest increases were to real estate (1.8 percent), corporate stock (1.9 percent) and miscellaneous assets (4 percent). In addition

Figure 1.--Direction and Frequency of Change: Pre-audit Versus Post-audit Amounts



to personal effects and automobiles, this miscellaneous category includes some types of property which are difficult to value, such as artwork, mineral rights and royalties.

As you might expect, some assets, including bonds, cash, insurance and annuities, are relatively easy to value and are only rarely subject to significant changes. Harriss estimated "that probably one-third to two-fifths of gross taxable estates consist of property presenting no significant valuation problems." [9] In the newer data, real estate, corporate stock and miscellaneous assets make up over 75 percent of the aggregate total gross estate. The value of each of these assets changed in about 26 percent of the returns examined. While these assets are more likely to be revalued than others, auditing apparently does not significantly change the portfolio distribution of assets.

In addition, auditing does not significantly change the size distribution of aggregate wealth. While larger estates may be scrutinized more vigorously by IRS examiners, they do not seem to be revalued more frequently nor are the changes in the gross estate proportionately larger than those made to smaller estates. This may be because larger estates had, on average, proportionately larger marital and charitable deductions. Estates with less than \$5 million in assets claimed, on average, marital deductions of 22 percent, while estates of \$5 - 7.5 million and estates of greater than \$7.5 million claimed marital deductions which averaged over 23 and 37 percent, respectively.

Again, the valuation changes are somewhat smaller overall than expected. Perhaps the differences in asset values before and after audits are not significant. It would, though, be premature to conclude this after examining only 98 returns. Most of the returns not yet

examined are for estates with at least \$5 million in assets. Some of the most complicated returns must still be retrieved from district offices. Most of these remaining returns will probably have been subject to some change during auditing.

But still, perhaps the returns reviewed thus far are a representative sample of our population of returns. Why, then, are the percentage changes so low? One reason is that because of the complexity of the estate tax laws, many estate tax decedents have designated professional executors and tax form preparers. As Harriss noted, "The widespread participation of corporate and professional legal fiduciaries in executing estates, therefore, probably insures a high minimum level of integrity in estate tax compliance." [10] Secondly, inaccuracies in reporting which result from ignorance or computational errors should not be biased toward over- or underestimation. The current study of returns seems to support this assumption.

Of course, the accuracy of post-audit valuations must also be considered. Indeed, the audit process is designed to increase tax revenues, rather than to provide a more accurate valuation of every estate. While every return is examined, field audits are not always conducted. (This review is, however, more thorough than the review of individual income tax returns, only a fraction of which are examined for anything other than mathematical accuracy and consistency.) Efforts to increase the value of smaller estates may not be pursued, when such efforts are obviously not cost effective. Even very large estates may escape increases in the gross estate when such changes would not lead to increases in tax, due to corresponding increases in marital or charitable deductions. Of the cases in which the value of the estate was changed, the aggregate gross value of estates claiming marital deductions of 50 percent of the gross estate or less changed by nearly 4 percent; the value of estates in which the marital deduction exceeded 50 percent of the gross estate changed by less than 2 percent. Even when a change in the value of an estate does occur, it may be the result of a compromise between the auditor and the executor, rather than an increase which the auditor believes to be absolutely correct. (In fact, only one of the cases reviewed was litigated and in nearly every case, an agreement was secured with the executor.)

Despite these factors and the small magnitude of change observed thus far, we are convinced that a bias towards the underestimation of estates exists. A review of audited returns provides at least some indication of the size and nature of this bias. That information can then be used to adjust our data and yield more accurate wealth estimates.

Future Plans

At this time, we do have plans to expand the post-audit study. The first step will be to retrieve and examine the remaining returns already sampled. At that point, our sample will consist of about 140 returns, most of which were filed for decedents with at least \$5 million in the gross estate. Next, we will probably expand

the study in two ways, by including additional service centers and by sampling more returns with less than \$5 million in the gross estate. After the data are analyzed, we should be able to develop the adjustment factors to at least partially correct for the undervaluation of estates. Finally, we would, of course, need to update these adjustment factors periodically.

USING OUTSIDE SOURCES TO ENRICH ESTATE TAX DATA

Other efforts to improve wealth estimates involve using sources outside of the Internal Revenue Service for additional financial and demographic information. One such source is *Forbes* magazine and its annual listing of the 400 wealthiest Americans. [11] The demographic information provided allows us to evaluate the changing nature of the population of very wealthy individuals. In addition, while the reliability of their net worth estimates is limited, direct comparisons of the information published in *Forbes* with the figures reported on estate tax returns may provide clues about the types of assets and amounts of wealth not fully captured by our current estimation techniques. In addition, data from *Forbes* are a particularly useful supplement, as they focus on very wealthy individuals. Current IRS estimates associated with these economically powerful individuals suffer from large variances, due to the small sample sizes.

Forbes has published a report on wealthy Americans each year since 1982. This information, gathered by a small group of *Forbes* staff members, is obtained from public documents, published information and interviews with financial experts. They also try to contact the 400 members themselves, although many, of course, do not respond. Tabulations of the data published in *Forbes* have been completed. These are classified according to demographic characteristics including age and sex.

The estate tax returns of members of this population are examined as they become available. There are currently less than 50 known decedents from the population. Most of these individuals were still listed among the 400 wealthiest Americans at the time of their death. Approximately 30 returns have been examined; less complete information is available for several additional individuals. The summary statistics presented here are based on all of these decedents, except where otherwise indicated.

Preliminary Results

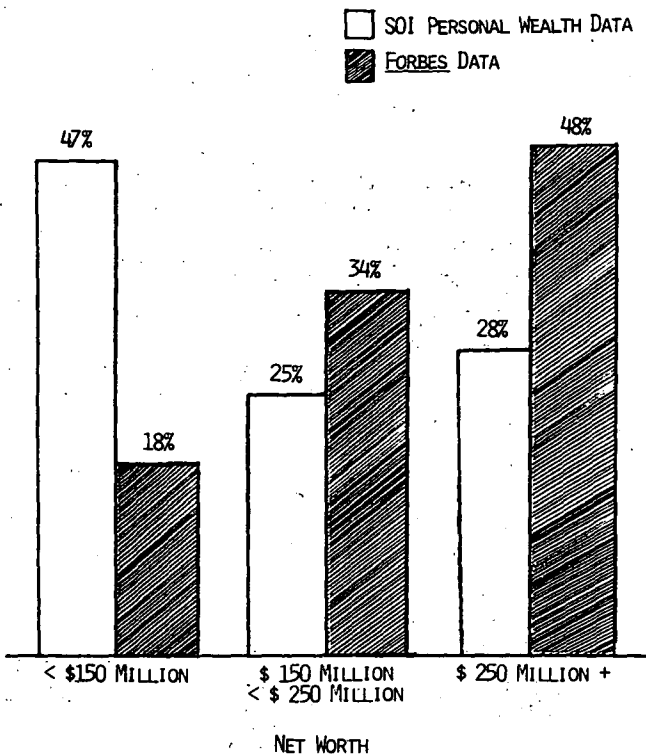
The estate tax mean and median figures are lower than the *Forbes* figures. The examination

Net Worth	Estate Tax Data	Forbes Data
Mean	\$ 114,134,312	\$ 199,000,000
Median	\$ 94,694,396	\$ 170,000,000

of returns revealed that Statistics of Income estimates were, on average, 35 percent lower than estimates published in *Forbes*. (The figures on several returns were not comparable due to major financial changes, such as the sale

of family-owned businesses, occurring during the time elapsed between the two estimations.) The net worth figure reported on the estate tax return was less than the estimate appearing in Forbes in 79 percent of the cases. Figure 2 shows the distribution of IRS net worth figures versus the distribution of Forbes net worth estimates for the decedents studied. Nearly

Figure 2.--Percentage Distribution of Net Worth by Net Worth Size Class: Forbes Versus IRS



half of the wealth reported on the estate tax returns (47 percent) is held by decedents with less than \$150 million. As the bar graph shows, the distribution of wealth as reported by Forbes peaks much later.

Certainly many factors contribute to these differences in valuation. Forbes' researchers assume that "the separate elements of ownership (control of principal, receipt of income, power to name heirs, etc.) are deliberately spread among different people to defend against the inheritance tax laws." [12] Thus, they generally attribute the wealth of spouses and other family members to a principal family member. Similarly, assets in trust are generally assigned "to the person who created the wealth, where still alive and in control, or to the principal controlling family member where he is not." [13] (Irrevocable charitable trusts are not considered to be personal wealth by Forbes' researchers, even where they are used to retain control of family companies.)

On the other hand, the estate tax law is quite specific in determining what constitutes legal ownership. In addition, some types of assets are not required to be reported on the estate

tax return or are not required to be reported at their full value. For example, only one-half of most jointly owned property is included in the estate. Not surprisingly, when net subtractions for jointly owned property (reported on Schedule E of the estate tax return) are added back to the values of the estates, the net worth figures are, on average, only 28 percent lower than those published in Forbes. (This adjustment is applicable to approximately one-third of the estates.)

In addition to ownership and valuation issues, the timing of the two sets of estimates must be considered. Forbes' estimates are usually published in October. The cutoff date for 1986 was September 12. [14] The estate tax valuation date for the individuals studied ranged from 33 months to less than 1 month after the valuation for the Forbes estimate. The average length of time between the two estimates is approximately 10 months. (Eighty-nine percent of the estates were valued as of the date of death; the alternate valuation date, defined as 9 months after the date of death, was elected for the others.)

We would expect the wealth of these individuals to increase over time, and the lower cutoff value of the living Forbes population has indeed increased in every year except 1985. However, the average age of these decedents at the time of death is about 81 years. A number of them have undoubtedly distributed a significant portion of their assets to family members or other beneficiaries prior to their deaths. (As noted before, some of these distributions are so complete that the two estimates are not comparable.) Thus, we might expect the estate tax figures to be lower.

Finally, we have also taken note of all of the estate tax returns filed for very wealthy individuals dying after the first Forbes report was published. Sixty-one percent of those individuals with estates of \$60 million or more and 47 percent of those with \$100 million or more never appeared in Forbes. These individuals may have held assets which Forbes was unable to uncover. The timing issue discussed earlier may also have contributed to these differences in the two populations. At any rate, we will have to consider these factors when using Forbes data to model the wealth distribution curve.

Future Plans

Despite the differences in the units and items measured and in the timing of the estimates, we feel that supplementary sources of data such as that published in Forbes can enhance our understanding of the population of very wealthy Americans. Future plans for this effort include reviewing Forbes' work as it is published. We are also continuing to track the decedents from this group. In addition, we are using other outside sources to supplement our data. Recent work by Scheuren and McCubbin describes some of these developments. [15]

CONCLUSION

The recent ongoing work at IRS has reinforced our opinion that the estate tax multiplier

method may currently be the best available estimator of the personal wealth in the U.S. population, for individuals above the estate tax filing requirement. Nevertheless, we realize that this method probably tends to underestimate the number and net worth of the very wealthiest individuals. The variety of approaches discussed here is aimed at developing better wealth estimates. The post-audit and Forbes projects are both just beginning and the data presented here are preliminary. Yet it appears that information available from these sources will be useful. The post-audit study and the use of data collected by Forbes and others will continue to be part of our research program, as will the evaluation of any changes to the estate tax code. The results of these efforts and the cooperation we are receiving from researchers outside the IRS should ensure that the quality of our data will continue to improve.

ACKNOWLEDGMENTS

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Piecing Together Personal Wealth Distributions

by Fritz Scheuren, Ph.D and Janet McCubbin

The American economy is undergoing enormous stress, brought about by forces that are of a size unprecedented in history. Large trade and budget deficits come readily to mind. Concerns about the Society's long-run international competitiveness exist, as well. Savings rates in the United States have historically been low and appear to be getting lower [1]. What to do about all this is unclear, especially since various industrial sectors seem to be affected to a greater or lesser degree [2].

Various nostrums have been proposed and, in some cases, may even be having a beneficial effect. For instance, the new emphasis on quality in the manufacturing sector is one response that may have started to work, although American goods have a long way to go in many areas [e.g.,3]. There is a widespread belief that the massive tax law changes of the 1980's will also help, particularly the 1986 Tax Reform Act [e.g., 4]. Cuts in marginal rates, for example, should confer at least a short-run advantage on most American businesses.

With all this change in the American economy, how well are we "keeping score?" On a "macro" level, of course, we have the National Income and Product Accounts prepared by the Bureau of Economic Analysis and the "Flow-of-Funds" accounting done by the Federal Reserve Board (FRB). These measures, while subject to weaknesses, have served to monitor economic trends in income and wealth reasonably well. It may be time, however, to heed calls for an integrated approach [5], combining both macro- and microdata [e.g., 6].

A great many of the elements are in place. The Census Bureau's new Survey of Income and Program Participation (SIPP) clearly is a major step [7]. Advances in the measurement of income in the Current Population Survey also are an important factor [8]. Renewed emphasis on improvements in the National Income and Product Accounts is encouraging [9]. In addition, the Federal Reserve Board is undertaking a thorough re-examination of the methodology underlying its "Flow-of-Funds" accounting [10].

Of most interest at this session is the renewal of the Federal Reserve Board's interest in using survey techniques to measure the distribution of wealth [e.g., 11]. The 1962 wealth study by the Board, which was conducted by Dorothy Projector and Gertrude Weiss [12], was a milestone in this area. The 1983 FRB study, as we have heard at this session, offers great promise as a new beginning of what is hoped will be a more regular measurement of wealth by the Board. In both of these FRB efforts the Internal Revenue Service (IRS) offered support. While this cooperation was considerable, in many ways it has been incomplete. (The estate multiplier wealth estimation periodically done at IRS has,

until very recently, been carried out as a separate, stand-alone activity.)

This paper addresses a number of the issues that need to be faced if IRS information is to play a larger role in measuring wealth. Our goal, however, is not to set out a detailed agenda for research, but to suggest areas where more work might lead to improvements. While the main focus of the remarks made is on the upper tail of the wealth distribution, there is also some discussion of the problems of measurement at lower ranges of the Lorenz curve, as well.

Organizationally, the paper is divided into five sections. The first section provides a framework within which the overall wealth distribution measurement problem might be set. Section 2 focuses on a general description of the history and limitations of the estate multiplier method. The paper by Medve [13], also given at these meetings, will be one of the sources drawn on here. Sections 3 and 4 further develop the concerns about estate multiplier limitations, specifically in terms of how the 1982 multiplier results relate to the 1983 Federal Reserve Board survey figures. Particular attention is given in these sections to the results found in the companion papers at these meetings by Schwartz [14] and McCubbin [15]. We conclude the paper in Section 5, with some observations intended to set the stage for considering what priorities should be given to the future work ahead.

1. WEALTH MEASUREMENT TYPOLOGY

The measurement of the U.S. personal wealth distribution can be looked at as consisting of three pieces:

- First, there is the bulk of the population, the nonwealthy. (Here we will define this group as persons with total gross assets of less than \$500,000.)
- Next, comes those who have moderate but not great wealth. (In this paper we will define that group as individuals with gross assets of \$500,000 but net worth of less than \$10,000,000.)
- Finally, there is the very small group of exceedingly wealthy people, who are the hardest of all to measure. (Here we define these individuals as having net worth of \$10,000,000 or more.)

A good survey vehicle is essential for the study of each of these groups but could profit from supplementation of various sorts [e.g., 16]. This would be true even if a multiple frame survey approach were taken, as in the 1962 and 1983 FRB studies. (For a description of the

1983 supplementary high-income sample, see [11] and [17].)

Nonresponse problems would undoubtedly remain, despite whatever improvements in field techniques might be made. Also, for the very wealthy, sheer sample size is an issue. In the 1983 FRB Study for instance, there were only 36 individuals in the sample aged 26 years or older who could be said to be very wealthy. (See Figure A.) Even in the absence of concerns about nonresponse biases and response errors, such a sample seems simply too small to be used alone; certainly this would be the case if the aim is to produce aggregate wealth estimates and concentration ratios.

FIGURE A.--Distribution of 1983 Federal Reserve Board Sample By Wealth Group

Wealth Group	1983 FRB Sample Adults	
	Number	Percent
Total.....	6442	100.0
Nonwealthy.....	5569	86.4
Moderately wealthy.	837	13.0
Very wealthy.....	36	0.6

Source: Special unpublished tabulations prepared by the Federal Reserve Board.

Concerns about the measurement errors among those of moderate wealth exist as well, even though the sample size there might be judged by some as adequate; however, when looked at in terms of households, the 1983 FRB sample size of 837 adults falls sharply (to 478 households). In addition to potentially major nonresponse and

response errors among this group, there is an inherent inefficiency in the sampling frame that needs to be addressed, since the income measures used were not always adequate proxies for wealth [18]. Improvements in the sample design of the high income cases will help here but are likely to fall short and the survey might profitably be supplemented through the use of other measurement devices. Indeed, as will be seen later in this section, we strongly recommend augmenting the sample of nonwealthy individuals in various ways, as well.

Nonwealthy Individuals

The nonwealthy are such a large and diverse category that separating them into subgroups might be helpful. Four such divisions are made in Figure B and discussed below.

Least Affluent Group.--According to the 1983 FRB Survey, about one-fifth of the nonwealthy aged 26 years or older [19] had little, if any, assets and what they had consisted essentially of consumer durables and personal effects. The policy questions pertaining to this group may relate, not to an actual estimate of their wealth, but to their relative frequency in the population by age, sex, race, education and so on.

Included in this first group are individuals who also have small savings accounts and certain claims for income from private pensions, which indeed they may already be receiving. Again, the main questions concerning this group may relate not so much to their aggregate wealth as individuals, but to their relative frequency in various subpopulations. Welfare claims against society by members of these groups, whether real

FIGURE B.--Some Potential Information Sources on Income and Wealth of Individuals with Total Assets Less Than \$500,000

Wealthholding Group	Some Potential Information Sources on Income and Wealth
Individuals with less than \$2,000 in financial assets and <u>no</u> home ownership.	Surveys, like SIPP and the FRB study, might be sufficient, supplemented possibly by Social Security Administration earnings and benefit information.
Individuals with less than \$2,000 in financial assets <u>plus</u> some home ownership.	Survey information would again be the dominant source, but local tax assessment records could be helpful and the taxes paid and mortgage interest deductions on the Federal income tax return would be of value for itemizers.
Individuals with \$2,000 to \$10,000 in financial assets.	Survey information could be greatly augmented by Federal income tax records, possibly supplemented by social security benefit data.
Individuals with \$10,000 or more in financial assets	Direct use, through income capitalization or "gross-up" methods, would be possible, plus indirect help through post-stratification.

Source: Statistics on the size of these various groups shown in the text all came from unpublished tabulations made available by the Federal Reserve Board from its 1983 Survey.

or contingent, may need to be considered, as well as social security claims, actual or potential.

Survey vehicles would seem to be the best method of looking at this first group. The Census Bureau's Survey of Income and Program Participation (SIPP), in particular, may be suitable, especially since plans are to obtain Social Security Administration earnings and benefit data, so a social security wealth variable can be calculated [20]. The Federal Reserve Board survey would be an excellent source as well, although it is a lot smaller than SIPP and, hence, its results would be more limited [21]. On the other hand, the FRB survey has developed a method for estimating private pension wealth, something that SIPP does not now do. (By the way, adding social security variables to the FRB is possible and was proposed at one time for the 1983 study.)

Homeowners with Few Other Assets.--It may be useful to continue our "typology" of various wealth groups by looking next at homeowners with less than \$2,000 in financial assets. In 1983, nearly 30 percent of all persons 26 years or older fell in this group.

With few exceptions, once individuals move from a position of having limited personal and consumer items, small savings accounts and cash-on-hand, plus some pension wealth, the next asset they often own is a personal residence of some sort. Important exceptions might be the very old or sole proprietors (who may have plowed all their resources into their businesses).

In the case of social security wealth, we have already seen the value of record linkages to administrative records; FRB pension data also made use of record linkage techniques [22]. With the home ownership variables, the use of record checks may be important to confirm the information being supplied. The use of tax assessment records and bank or other mortgage holder records would be a valuable device to build in routinely to the SIPP or FRB surveys. Tying in to tax assessment records provides a direct link between the survey data and similar estimates in the "Flow-of-Funds" accounting [23]. A concern that needs examination, particularly for real estate, is the question of who really owns the asset. The survey-supplied answer and the strict legal answer may differ. Tax assessment and bank records may help in this connection but could need supplementation; for example, powers of appointment might not be recorded and the information about transfers into trusts might also be incomplete. Determining an individual's share of jointly owned property (here and elsewhere) may be particularly tricky in some cases.

Wealthholders with Significant Income-Bearing Assets.--We are now ready to talk briefly about the remaining two nonwealthy population groups shown in Figure B. Both of these have significant amounts of income-bearing assets.

Incidentally, based on the 1983 FRB Survey, these groups are of about equal size and collectively account for around half of the nonwealthy, aged 26 years or older.

The major new source of information we will consider is using the Federal income tax return. One approach might be simply to augment the survey data by a wholly separate sample, like the IRS Individual Tax Model [24]. The incomes shown on the returns could be capitalized or "grossed-up" to produce the corresponding asset values, as described in [25]. Direct record linkages of the survey data with tax returns might also be contemplated [26], if concerns about confidentiality and access can be overcome. In our judgment a combination of both of these approaches is needed.

The "gross-up" method is not just confined to incomes, but has been applied to real estate taxes as well; hence, we could improve our wealth estimates for less wealthy homeowners too, by linking to their Federal income tax returns. Certainly, the deductions for real estate taxes and mortgage interest may be of some value as a check of the reasonableness of the corresponding asset and liability amounts supplied on the survey.

Recent changes arising from the landmark 1986 Tax Reform Act make the "gross-up" approach even more attractive, in that interest from state and local bonds is now required to be reported. Valuing business assets may also be possible from the return, at least in the case of sole proprietorship holdings. The technique would be to employ detailed information on income and expenses from Schedule C and to use the net income flows, possibly for several years, as a way of valuing the asset. Linkage of tax and survey records here would be the key to such an approach, since we would need to calibrate the survey and tax sources to see that each was reasonable. (Incidentally, partnership income reported on Schedule E may also be a good starting point to calculating the value of that source of wealth, as well, provided we were willing to go back to the partnership returns for more information.)

It should be pointed out that "grossing-up" incomes like interest, dividends and so on has merit, but cannot be done separately, without regard to the individual's overall income position; this is because, as real incomes rise, investors tend to shift portfolios to assets that have smaller realized (i.e., taxable) flows, possibly deferring the remainder to be taxed as a capital gain or to be transferred (perhaps untaxed) to their heirs at death [27].

It is recommended, therefore, that the use of "grossed-up" data from income tax samples (like the IRS' Individual Tax Model files) should be adjusted, by using the survey data to obtain information about how the income-to-asset ratio changes as income or assets increase. Alternatively, the SIPP or FRB survey data, once linked to income tax records, could be post-

stratified to overall administrative aggregates developed using one (or more) "gross-up" techniques. Either method, plus hybrids, may have significant advantages in reducing sampling and nonsampling errors for wealth distribution data.

Difficulties in achieving high quality record linkages may be a problem, especially for the FRB survey; SIPP, though, has had outstanding success in obtaining good social security numbers [28]. The units problem--tax returns versus individuals versus households--also needs to be met head on. For SIPP and FRB, the family or household is the primary wealthholding unit. Based on our experiences in the 1973 IRS-CPS-SSA Exact Match Study of some years ago, we believe that, in most cases, the tax returns can be brought into alignment, but not always, since some members of tax units may be living separately. (Incidentally, it is conjectured that, when property ownership is joint with individuals not living together, the survey data on wealth, whether from FRB or SIPP, may suffer greater nonsampling errors because of confusion about who owns what.)

Moderately Wealthy Individuals

Individuals of moderate wealth are a fairly small group, consisting of less than 2 percent of the population of adults. Even so, with a multiple frame survey approach, like that employed in the FRB studies, reasonably large sample sizes can be achieved. Nonetheless, the use of additional sources of data appears particularly attractive because of the potentially large measurement errors that can arise.

Above the estate tax return filing threshold, the "grossed-up" income tax records can be augmented by direct wealth measurement for sources covered by the estate tax [29]. Estate data are invaluable, but their limitations should be kept in mind. Assets not covered by the estate tax return are items for which the individual had only a life interest: pension and annuity wealth, for example; incomes from trusts or other estates; and insurance claims on the life of the decedent from policies for which the decedent did not possess any incidents of ownership. Additional concerns exist in using the estate tax wealth measures, particularly with regard to the valuation of assets, like unincorporated business interests, that change their character as a result of the owner's death. The asset in life could be of potentially much greater value. Life insurance assets, includable in the estate, also have this problem but in the opposite direction, since the face value comes into the estate rather than the cash-surrender value. Finally, like the survey approach, the estate multiplier estimates have many sampling and nonsampling error issues of their own that need discussion, including which estate multipliers to use, how to deal with potential undervaluations by executors on the unaudited returns employed, and so on. These issues will be discussed further in the next two sections.

Very Wealthy Individuals

The very wealthy are an extremely small group of only a few thousand. Certainly survey estimates, despite supplementation by cases from a high-income frame, are entirely too sparse to be relied upon. In fact, while estate tax methods are still useful to a limited extent, even they break down for this wealthy group. We could look instead to approaches like that taken by Forbes [30], as well as to various extrapolation fitting procedures employing variants of the Pareto distribution. Taken together, especially if averaged over several years, these techniques may yield reasonable results. Somewhat more will be said about this in Section 5.

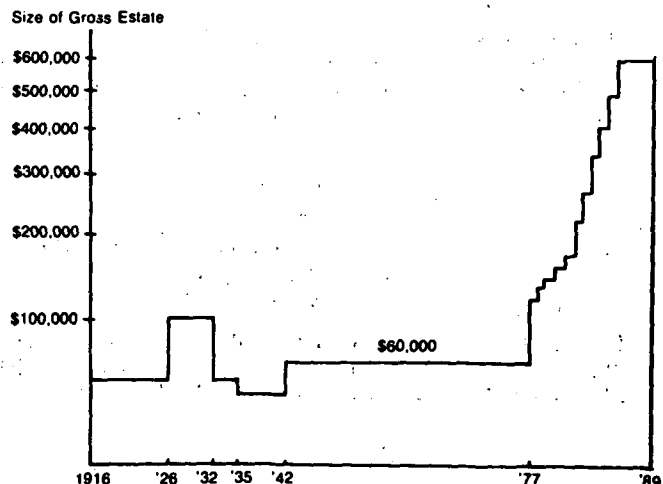
2. ESTATE MULTIPLIER ESTIMATION

Estimates of U.S. personal wealth from IRS estate tax returns have been made for decades using the so-called "estate multiplier technique." Actually, the technique appears to have originated in England, with the work of Baxter in the nineteenth century. Baxter used the inverse of the overall mortality rate to estimate total personal wealth from probate records [31]. In 1908, Mallet [32] modified the method by using age-related multipliers. His work has guided most subsequent researchers in Great Britain and elsewhere since then.

Wealth studies for the United States have focused on data from U.S. Federal estate tax returns. Many studies of less than National scope have also been conducted, using state and local inheritance tax and probate records. See, for example, [33].

The United States estate tax was instituted by the Revenue Act of 1916 for the dual purpose of producing revenue and redistributing wealth. As illustrated in Figure C, this legislation required estate tax returns to be filed for the estates of individuals who, at death, held gross

Figure C.--Estate Tax Return Filing Requirements: 1916-1989



assets exceeding an annual legal filing threshold. From the inception of the tax in 1916 until the 1970's, the minimum filing requirement ranged between \$40,000 and \$100,000; in fact, for most of this period it was set at \$60,000. Since 1976, the minimum filing limit has been rising fairly steadily. By 1982 it stood at \$225,000 and it reached \$600,000 in 1987. (The limit is scheduled to be \$600,000 in 1989 also, which is the next year that the FRB plans to conduct a major wealth survey.)

Using IRS tabulations, the first estate multiplier estimates made for the United States were by Mendershausen for 1922, 1924, 1941, 1944 and 1946 [34]. Mortality rates were adjusted based on data provided by the Metropolitan Life Insurance Company. In a later study, Lampman [35] produced a set of estimates for 1953. Lampman also conducted an extensive study of the wealth of estate taxpayers from 1922 through 1956. Smith produced estimates for 1958 [36], following the approach taken by Lampman. Scheuren [37] produced the first Internal Revenue Service personal wealth estimates (for 1962). Later, IRS wealth estimates were made by Crossed for 1969 [38] and Gilmour for 1972 [39]. In 1974, Smith and Franklin [40] revised the estate multiplier technique to produce new estimates of wealth for 1922 to 1969. Recently, estimates of estate tax wealth have been made for 1976, 1981 and 1982, largely by Schwartz and his colleagues [41]. Smith has also produced figures for some of those years [42]. In the remainder of this section we will go on to describe the estate multiplier method and point out some of its major limitations, especially those involving the calculation of the multipliers themselves.

Basic Approach

To start things off, we might begin by noting that the estate multiplier method assumes that "death draws a random sample of the living population." This assumption allows one to apply statistical sampling theory to the result obtained by weighting estate tax return data by the inverse of the mortality rate characteristic of the demographic group from which the decedent was "selected."

Let x_i be some measure of wealth, say corporate stock, taken from a sample of $i = 1, 2, \dots, n$ decedents, where the probability of "death's selection" is denoted by π_i . The estate multiplier estimator of the total

$$\hat{\chi} = \sum_{i=1}^n \left(\frac{1}{\pi_i} \right) x_i \quad (2.1)$$

is then seen to be simply a conventional Horvitz-Thompson estimator [e.g., 43], where $\pi_i > 0$ for all n members of the population. (Incidentally, if the decedents are themselves a sample from all the returns available, then obviously our estimator should be of the form

$$\hat{\chi} = \sum_{i=1}^n \left(\frac{1}{\pi_i P_i} \right) x_i \quad (2.2)$$

where the $P_i > 0$ are known return selection probabilities.)

Now the probabilities of dying, π_i depend on the particulars of an individual's life state--age and sex are variables that come readily to mind. However, many other characteristics have also been shown to be factors, including marital status, geographic location, social class and, obviously, a whole host of health indicators.

The IRS estate multipliers typically have been adjusted to take account of only three variables: age, sex and social class. In terms of the typology of Section 2, the assumption has been made that, for a given age and sex group, the social class differential in mortality is the same for the moderately wealthy and the very wealthy. Technically, the effect of this is to treat the other factors in the selection as ignorable [44] or, more informally, to assume simply that they average out, so that $\hat{\pi}_i$ is unbiased.

Another way to look at this is to consider estate tax return sample averages by age and sex (weighted by the inverse of the design probabilities, p_i , if necessary). By assumption, these sample averages are unbiased estimators of the "true" averages in the corresponding living population of wealthy individuals of the same age and sex, no matter what multipliers are chosen.

This is an important observation because to date there is no completely satisfactory method of estimating the multipliers. IRS practice has been to follow the 40-year old precedent of Mendershausen and to employ Metropolitan's whole life series (initially, for those with \$5,000 or more in coverage and, more recently, for persons with \$25,000 or more). Controversy exists on this issue and, indeed, the work of Smith [e.g., 45] employs selection probabilities that are less favorable to the wealthy than those used by IRS. Empirical studies of plausible alternative selection probabilities show that, while overall wealth estimates are affected greatly by our lack of knowledge of these probabilities, wealth composition is not particularly sensitive to the probabilities chosen. Intuitively, the main reason for this appears to be the relative robustness of the sample averages by age and sex, combined with the fact that alternative multipliers tend to raise or lower selection probabilities in such a way that the possible weights behave like a family of curves, when plotted by age and sex, each of which is roughly parallel to those being used by IRS [46].

Scheuren [37, 47] and Schwartz [14] go into the details of the calculation of estimates for the $\hat{\pi}_i$. It seems unnecessary to rehash that

material beyond noting that, for intertemporal comparisons, reasonable alternative multipliers will yield roughly the same trends, provided that the calculations at each point in time can be carried out in a consistent manner.

The issue of what multipliers to use may never be settled, but recent results from longitudinal studies of the population will allow us to recast the concerns which exist. For example, the National Death Index [48] could be linked to surveys like the National Longitudinal Survey [49] and the Retirement History Survey [50]. Both of these vehicles obtained asset information; if linked to the National Death Index, mortality differentials by wealth status (and a host of other factors) could be calculated [51]. A similar effort involving SIPP, or even the 1983 FRB Study, would also be desirable, if that could be initiated.

Variances and Other Limitations

If we assume that death's selections are, for the most part, independent from one individual to another, then there are a number of variance estimators available. For example, to estimate the variance of \hat{x} as given by expression (2.1), we could employ [52]

$$\frac{1}{n(n-1)} \sum_{i \neq j} \left(\frac{1}{\pi_i p_i} x_i - \frac{1}{\pi_j p_j} x_j \right)^2 \quad (2.3)$$

where the summation is over all different pairs of selections drawn in the sample. Another possibility that has been tried is balanced repeated replication [53], with months of death being paired based on overall similarities in mortality experience [54].

One problem with the Horvitz-Thompson variance estimator is that if we simply substitute $\hat{\pi}_i$ for π_i , we are effectively treating the multipliers as being without error. The balanced repeated replication approach, if the $\hat{\pi}_i$ are recalculated for each pair of months, is an improvement over expression (2.3), because it captures some of the variability of the $\hat{\pi}_i$; however, it severely restricts the degrees of freedom available.

Another variance estimator that might be more satisfactory, albeit much more work than either of the above, could be developed as follows:

- First, information about the variability of the $\hat{\pi}_i$ can be obtained from the data smoothing process that went into their estimation. A prior distribution also could be postulated for the π_i explicitly bringing in our uncertainty about their true values.
- Second, we could then draw samples from the posterior distribution of the $\hat{\pi}_i$ and simultaneously make stratified bootstrap selections from the overall estate tax decedent file [55].

This approach has more the flavor of sensitivity analysis than the others; however, that seems entirely appropriate under the circumstances and may be well worth trying.

Before going on to the next section one other aspect of "death's selection," while obvious,

may need to be underscored. It is simply that, by and large, death is not a random point in an individual's life. No amount of adjustment may fully compensate for this. For example, the effects of terminal illness may result in a smaller estate or a larger debt burden.

In a 1976 study [54] done at the Social Security Administration, it was determined that earnings for decedents became unrepresentative up to six years before death, with very sharp effects in the last two years or so. For a stock measure, like wealth, rather than a flow measure, like earnings, we speculated at the time that the effects would be much smaller. We are no longer so sure of this, especially given the recent advances in the prolongation of life. Certainly, for many noncorporate businesses, changes in the asset value of the business might parallel possible declines in income.

3. CONCEPTUAL COMPARISONS BETWEEN FRB AND IRS WEALTH ESTIMATES

Extensive comparisons have been made by a number of researchers between the 1962 estate tax wealth estimates and the corresponding figures produced by Projector and Weiss from the 1962 FRB work [e.g., 56]. The results of the two approaches seem remarkably close, especially given the initial differences which existed between the 1982 IRS estimates of wealth and those taken from the 1983 FRB effort. The differences between the 1982 IRS and 1983 FRB estimates are still striking and are too large to be entirely attributable to sampling error. The comparability of the 1962 estimates, on the other hand, would be remarkable even if sampling error was the only source of differences. That closeness is probably partially coincidental.

When the original survey figures came out for 1983, they were quite surprising to us, in that they showed an upward movement in the concentration of wealth, which was not reflected in the estate tax data [14, 42]. Frankly, we felt that there had to be an error in the survey results. This, of course, turned out to be the case. Even after correction, however, large discrepancies still remained; clearly, more work was called for.

We had already started, with help from the Census Bureau, to carry out an in-depth analysis of the possible nonresponse bias in the IRS high income sample. (Research in this area will be reported elsewhere in detail [57]). We then began working with the Federal Reserve Board and the Institute for Social Research's Survey Research Center to see if there were other ways to help. A collaborative effort was undertaken, which still continues. Among other things, that effort has addressed the development of alternative FRB survey weights--a topic touched on elsewhere at this session and, hence, one that will not be covered here.

An intensive examination of the estate tax wealth estimator also seemed in order. Particu-

larly troublesome was the sharp drop in wealth concentration which occurred for 1976 and which was coincidental with major changes in the estate tax law at about that time. We didn't have a good explanation for this and we needed one, especially since the preliminary 1981 and 1982 data showed that only a minor upward shift had been made since then. The paper by McCubbin [15], mentioned earlier, was written in part to address these concerns. This discrepancy has yet to be resolved, but we are continuing to study the issue.

At the suggestion of Bob Avery at the FRB, we looked closely at a number of the many valuation issues that plague the estate multiplier. For example, what is the net effect of using unaudited, rather than audited, tax returns? What about trust assets, transfers in anticipation of death, the tax treatment of jointly owned property and so on? There hasn't been enough time to come to a definite conclusion on each of these issues. (Indeed, there may never be enough time for some of them.) Small samples were studied in a few cases, though, and we consulted with experts on the law and administration of the estate tax to see what, if anything, might have changed in recent years.

Asset-by-Asset Comparisons

The review undertaken by McCubbin [15], and related work for the present paper, allow us to discuss Avery's conjectures (and others). This is done below on an asset-by-asset basis.

Financial Assets.--Financial assets (cash, corporate stock, bonds and notes and mortgages) appear to be extremely well reported on the estate tax return and in a manner, for the most part, that is conceptually consistent with that in the FRB study. Some net undervaluation of corporate stock may exist, because of the fact that the returns used are unaudited; but, in the sample studied by McCubbin, this impact was quite small--only about 2 percent. Undervaluation of the other financial assets appears to be even less of an issue.

The estate tax law was changed in 1976 to provide special use valuation provisions for farmers and owners of closely-held businesses. This could have led to some further undervaluation of corporate stock; however, because of the stringent nature of the requirements allowing for this provision and the limitation of the reduction to \$500,000, the effects on wealth estimates may be slight and, in any case, would be more significant for smaller estates. (The reduction limit was raised to \$600,000 for those dying in 1981, \$700,000 in 1982 and \$750,000 for decedents in 1983 and thereafter.) Another valuation technique available for corporate stock, the "blockage adjustment," has been available since 1958. If the decedent owned a sizable percentage of a corporation's traded stock, a downward adjustment of the stock's selling price was allowed, if the executor could prove that the disposal of the stock would cause its market price to be depressed.

Nonfinancial Assets.--The various valuation issues are considerably more important for nonfinancial assets (real estate, noncorporate business equity, and other, mainly tangible, assets). Miscellaneous assets, for example, in the McCubbin sample had an adjusted value after audit that was 4 percent greater than its pre-audit amount. Real estate increased by 2 percent during audit. The special use valuation provisions mentioned above also apply to real estate, although again our belief is that these would have only a limited effect. Changes in the treatment of jointly owned property also need to be considered. After 1976, only one-half of the value of certain joint property owned by spouses must be included in the estate. After 1981, only one-half of any joint property owned by spouses must be included, regardless of which spouse furnished consideration for the property [58]. This could have a sizable effect particularly on time series comparisons of wealth concentration. According to Schwartz [14], for 1982 about \$213 billion was held by wealthy married individuals as their share of jointly owned property.

We have already commented on valuation issues with regard to noncorporate business equity. Unquestionably, the valuation of these assets may be affected by the death of the owner (or part-owner). In addition, the special use valuation provisions described for closely-held corporate stock apply to unincorporated businesses, as well.

In the case of other (nonfinancial) assets, it was conjectured that there might be some problems in locating all of this miscellaneous property for estate tax purposes. In addition to automobiles, furnishings and personal property, the category of other assets includes such things as works of art, copyrights, royalty interests, and gift taxes paid within three years of death. The McCubbin sample found, however, only a few cases where previously unincorporated property was added as a result of audit. Virtually all of the 4% increase in the value of other assets was due to revaluations of property.

Insurance and Life Interests.--Insurance, annuities and trust assets in which the decedent possessed only a life interest are particularly troublesome to value properly using estate tax data. The face value of includable life insurance comes into the estate. In the past, an adjustment has been made to lower the face amount to its cash surrender value, but this is a rough adjustment at best. Annuities and life income interests in trust, plus pension and social security wealth, are seriously undervalued or omitted altogether. One solution to this problem is simply to change the scope of the wealth estimates to exclude these assets. This is possible; however, it may result in misleading conclusions about wealthholding patterns in the United States, since pension wealth, for example, has grown enormously in importance in recent years. As noted earlier [in 29], linkages between the estate and income tax returns for decedents and beneficiaries are

being carried out; these might be a source for a partial correction of such problems (especially if carried back far enough for decedents and forward enough for beneficiaries).

Some Other Considerations

Three other overall estate tax valuation issues might be mentioned briefly, even though their effects for 1982 appear likely to be small.

- First, there is some flexibility available in the point at which an asset can be valued for estate tax purposes. While usually the date of death value is used, this need not be the case. As a result of this option, on balance there was a slight decrease in the total assets estimated for 1982 for the wealthy; however, this was far less than 1 percent overall.
- Second, originally all gifts (and related gift taxes) made within three years of death, in contemplation of death, had to be reported on the estate tax return. The 1976 Act required that all transfers made and gift taxes paid within three years of death, regardless of motivation, be included in total gross estate. After 1981, this changed again so that only certain transfers made within three years of death, but all gift taxes paid, had to be included. We are not sure, but it is likely that the estate tax wealth series may have been affected because of these changes, relative to what it was historically. Certainly there is an overstatement relative to what a survey would measure. Such gifts have two chances of being "sampled" (since both donor and donee would have them in their estates if they died); hence, their inclusion in estate tax wealth leads to double counting. Including gift taxes paid is entirely inappropriate since the wealth is no longer in the household sector at all. The extent of this problem does not appear great; however, no current estimates are available.
- Third, in general the wealth of an individual declines during the last few years prior to death, as assets are transferred to heirs or as savings are depleted by expenditures during retirement, including those for the expenses of last illnesses. Thus, the value of many estates might be less at death than at some other (random) time. In addition, some assets in particular are especially likely to decrease in value at death. The undervaluation of annuities was mentioned earlier. The gross estate includes the value of an annuity or pension payment that a beneficiary is due to receive because he or she survives the decedent. The value of payments which terminate at death are not included. Similarly, income interests in trust assets which terminate at death are not included in the estate. In this case, the decedent did not legally own the assets from which

the income was derived and so these assets are not included in the estate. (The income stream is not included, as it terminates at death.) Yet even though the decedent did not own the assets for estate tax purposes, he or she benefitted from them and the exclusion of them results in an understatement of economic well-being.

The value of business interests may also decline at death, especially if the decedent was a sole proprietor or important partner in the business. The value of professional (medical, legal) practices certainly could fall around the time of death, since human capital is lost. Survey methods may be more useful in capturing this type of wealth. There are also ways to correct for the decline in wealth which occurs near death. Income tax or other data can be collected and later matched with estate tax records, to provide a picture of economic well-being for more than one point in time [59].

Summary

While our analysis of valuation concerns in this section is incomplete and preliminary, we conjecture that most of the valuation issues on the estate tax are relatively small, correctible or both. In particular, we believe that, within the conceptual limitations of the estate tax law, the assets shown on estate tax returns are extremely well reported. They draw notable strength from having been taken from administrative records, by highly skilled people and under exacting legal sanctions.

Unlike survey data, such as that collected in SIPP (or in the FRB study), it is thought that estate tax returns do not suffer greatly from response variation. One exception may be for particularly hard-to-value assets, such as an interest in a partnership or closely-held corporation or real estate assets for which there are no ready markets; in such cases, the valuation may be subject to some difference of opinion. Usually there is a financial stimulus for the executor to use the lowest value he thinks can be sustained. It is not uncommon, therefore, that valuations are changed when returns are subjected to audit. In the McCubbin study, such increases occurred nearly half the time. Even so, the percentage changes were fairly small overall and not always in the same direction.

It should be noted, by the way, that sometimes there are good financial reasons for the executor to select the higher rather than lower value of an asset. Because the estate valuation establishes the basis for future taxation of the asset in the hands of the heirs, a higher basis may minimize income taxes, so that while a higher estate tax is paid the net effect is a tax saving. For example, a higher basis for business property subject to depreciation will increase the allowable deductions for depreciation; a higher basis for property which the heirs intend to sell will minimize the income

taxes paid on the difference between the estate tax return valuation and the selling price.

While on balance estate assets may be undervalued, the McCubbin data indicates that this bias is small. Even if the outdated study by Harriss is used as a guide, the bias in valuations would still be fairly modest. [60] A larger sample of more recent returns would be needed to conclude this definitively, but it seems unlikely that undervaluation can be a major factor in explaining FRB/IRS differences.

On the other hand, we feel less comfortable about whether or not ownership issues are a factor in the FRB/IRS differences. De facto and de jure differences may exist and there could be some confusion on the survey leading to double counting. Large swings are possible in the estate multiplier estimates depending on how jointly owned property is treated.

Undoubtedly the timing of the estate tax valuations is of some importance. As previously discussed, some assets decrease in value when the owner dies. The value of at least one asset, life insurance, increases at death. (We can correct for this, however.) In addition, the savings of many nonwealthy and moderately wealthy individuals may be depleted after retirement, especially during the last illness. The FRB estimates, on the other hand, are based on a survey of individuals at various life stages.

Individual assets, as we have seen, may be systematically undervalued on the estate tax return due to particular provisions of the law allowing for special valuations in certain cases for family businesses and farms. While we speculate that this cannot be a major factor, we have no data yet to back that up. It certainly will have some effect on time series comparisons with earlier estate multiplier estimates, as will the change in the treatment of jointly owned property and lifetime transfers. On the survey side, we conjecture that there may be some confusion about where to report certain assets. For example, notes and mortgages could be too low in the FRB study and real estate too high, as a consequence.

The way the "other assets" questions were asked in the survey suggests that a great deal of wealth may simply have been missed altogether. On the estate tax returns, based on a small sample study, we found all kinds of property that were not showing up at all in the survey or, if reported, were being mentioned far less frequently [61]. As noted above, these assets include jewelry, art work, home furnishings, copyright interests and other items.

4. NUMERICAL COMPARISONS BETWEEN FRB AND IRS WEALTH ESTIMATES

This section continues the discussion of differences between the 1982 Estate Tax Wealth

estimates and those made by the Federal Reserve Board for 1983. To make the numerical comparison shown here, we obtained the help of the Federal Reserve Board in producing special tabulations of individual than wealth from their data on household wealth. Asset by asset price adjustments were made to shift the 1983 FRB figures to 1982 price levels [62]. Attention was confined for each asset type just to individuals or estates with \$500,000 or more of that asset since estate tax returns with gross estate of less than \$500,000 did not have to report asset by asset detail for 1982 decedents. To the extent possible, we have omitted assets that clearly would not be comparable, notably insurance, annuities and pensions interests. Comparisons are made in two ways. First there is an overall discussion of differences in average amounts; this is followed by more detailed distributional comparisons.

Comparisons Between FRB and IRS Asset Averages

Comparisons between FRB and IRS asset averages are made in Figure D. Substantial differences exist. For example, all but one of the individual asset amounts show the IRS average to be higher than those from the FRB survey (and four of these differ by about 20 percent or more). The one exception--real estate--may arise, in part, due to the difference between the two sources in the treatment of jointly owned property. We estimate that 80 percent of the joint property owned by married individuals is real estate. Adding 80 percent of the un-included joint property held by married IRS top wealthholders to the real estate total yields an average real estate figure of \$1,402,395, or \$24,804 less than the FRB average. This adjusted figure may be conceptually closer to the FRB estimate.

The two totals for financial assets and gross assets show FRB average amounts greater than the corresponding IRS figures. This seems a paradox given the fact that nearly all of the individual components that make up these amounts differ in the opposite direction. The reason for this apparent contradiction lies in the large differences in the relative frequencies of the FRB and IRS amounts. In particular, for corporate stock, real estate and noncorporate business assets, the FRB survey reports many, many more individuals holding that asset type than does IRS. (See Figure E.)

As an aside, it might be noted that we are not uncomfortable about the differences at the mean for each asset type. These accord with our expectations about the relative strengths of the estate and survey approaches to wealth estimation. What troubles us greatly are the large differences in the relative frequencies for each asset type. At this point we are unable to account for these. Weaknesses in the estate multiplier being used could be one contributing cause, but it is hard to attribute all of the differences to this one factor. Some uncertainty in how the FRB weighting might be done is another possibility which we are still exploring.

FIGURE D.--Comparison of Federal Reserve Board and Estate Multiplier Wealth Estimates

(Average amounts in thousands of dollars; data confined to observations greater than or equal to \$500,000 in each category.)

Asset Type	Average Amounts		Difference	
	Federal Reserve Board (1)	Internal Revenue Service (2)	Amount (3)	Percent (4)
Total assets.....	1,504	1,269	235	15.6
Financial assets.....	1,463	1,430	33	2.3
Cash.....	828	878	-50	-6.0
Stock.....	1,350	1,601	-251	-18.6
Bonds.....	1,052	1,305	-253	-24.0
Notes and mortgages..	858	1,105	-247	-28.8
Real Estate.....	1,426	1,020	406	28.5
Noncorporate business..	1,407	1,437	-30	-2.1
Other.....	724	1,316	-592	-81.7

Source: The FRB data are the basic "corrected" data that have been made publicly available, deflated from 1983 to 1982 [62]. The IRS data are the final 1982 estimates made by Schwartz [14]. See the text for a discussion of the differences found.

FIGURE E.--Comparison of Federal Reserve Board and Estate Multiplier Frequency Estimates

(Frequency of wealthholders in thousands; data confined to observations greater than or equal to \$500,000 in each category.)

Asset Type	Frequency		Difference	
	Federal Reserve Board (1)	Internal Revenue Service (2)	Frequency (3)	Percent (4)
Total assets.....	2,581	1,832	749	29.0
Financial assets.....	927	660	267	28.8
Cash.....	53	56	-3	-5.7
Stock.....	661	335	326	49.3
Bonds.....	93	72	21	22.6
Notes and mortgages.	20	32	-12	-0.6
Real Estate.....	718	446	272	37.9
Noncorporate business.	370	71	299	80.8
Other.....	19	71	-52	-273.7

Source: The FRB data are the basic "corrected" data that have been made publicly available, deflated from 1983 to 1982 [62]. The IRS data are the final 1982 estimates made by Schwartz [14].

Comparisons Between FRB and IRS Asset Distributions

When FRB and IRS asset distributions were compared in our presentation of this paper at the ASA meetings, they were shown graphically, in terms of the cumulative percentage of individuals in each asset size class. (See, for example, Figure F.) The discussant, Edward Budd, noted that the graphs were difficult to interpret, because of the closeness of some of the curves. In response to his comments, we have re-presented the information here, employing quantile-quantile (Q-Q) plots, as described by Wilk and Gnanadesikan in 1968 and reviewed by Hoaglin et al.[63]. By this method, a plot of the inverses of the two cumulative

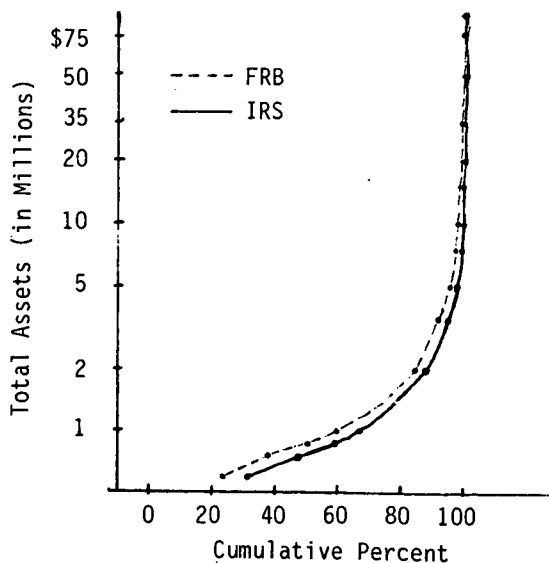
distribution functions, $F_{IRS}^{-1}(p_i)$ and $F_{FRB}^{-1}(p_i)$,

can be used to compare the shapes of the distributions as well as look at differences in their means and variances. In particular, the Q-Q chart corresponding to Figure F is shown alongside it as Figure G. Notice first that both plot the data on the "Y" or vertical axis in the same way, i.e., by size of total assets beginning at \$500,000.

For Figure F, the X or horizontal axis is the cumulative percentage of estates or individuals with total assets less than or equal to the amount shown on the Y axis. Thus, we see that for the estate top wealthholder data there are 68 percent with assets of \$500,000 to \$1,000,000; the corresponding percentage for the FRB survey is 60 percent.

For Figure G the Y axis is the same as the X axis, i.e., it plots total assets by size. The difference between the X and Y axes is that on the X axis we plot the FRB data at a fixed set of percentiles, while on the Y axis, we plot the IRS data at the same set of percentiles. Three lines are shown in Figure G:

Figure F.--Cumulative Percent of Individuals/Households with \$500,000 or More of Gross Assets



- a dashed line, which corresponds to the actual plot of the pair of points

$$F_{IRS}^{-1}(p_i) \text{ and } F_{FRB}^{-1}(p_i) \text{ for } p_i$$

at each decile .40, .50, .60, ..., .90 plus at .95, .98, .99, and .995;

- a straight-line smoothing of the basic $F_{IRS}^{-1}(p_i)$, $F_{FRB}^{-1}(p_i)$ data we obtained by employing ordinary least squares using the equation (4.1) below; and
- a bold-faced 45 degree line that passes through the origin. This last line is included for reference.

We derived Figure G from Figure F by taking the two original simple cumulative distributions for the FRB and IRS data and then interpolating at the P_i values mentioned above. To do the interpolation, we used new procedures described in a companion paper being given at these meetings [64].

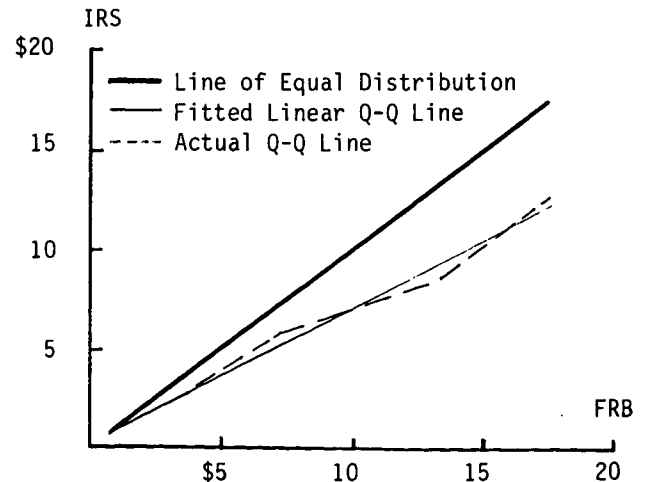
Now, if the distributions are exactly the same, the plot of $F_{IRS}^{-1}(p_i)$ versus $F_{FRB}^{-1}(p_i)$ will form a straight line which passes through the origin and has a slope of 1. If the distributions do not have the same shape, the plot will be nonlinear. In general, if $F_{IRS}^{-1}(p_i)$ and $F_{FRB}^{-1}(p_i)$ have the same shape, then the Q-Q plot is of the form

$$F_{IRS}^{-1}(p_i) = \mu + \sigma F_{FRB}^{-1}(p_i) \quad (4.1)$$

where the mean μ is a scaled difference between the mean of the IRS data μ_{IRS} and the FRB data, μ_{FRB} , i.e.,

$$\mu = \mu_{IRS} - \left(\frac{\sigma_{IRS}}{\sigma_{FRB}} \right) \mu_{FRB} \quad (4.2)$$

Figure G.--Quantile-Quantile (Q-Q) Plot for Total Assets, FRB and IRS Distributions Compared (\$ in Millions)



The quantiles σ_{IRS} and σ_{FRB} are the population standard deviations of the IRS and FRB distributions, respectively. (Estimates of μ_{IRS} and μ_{FRB} have, of course, already been provided in Figure D.)

The slope of the linear relationship between F_{IRS}^{-1} and F_{FRB}^{-1} in expression (4.1) is of the form

$$\sigma = \frac{\sigma_{IRS}}{\sigma_{FRB}} \quad (4.3).$$

Hence, if $\sigma = 1$, the variances of the IRS and FRB are equal and if, further, $\mu = 0$ and the shapes are same, then expression (4.1) will be a straight line through the origin.

Quantile-Quantile Chart Comparisons

Given the machinery we have just described, what can we conclude from Figure G about the differences between the IRS and FRB measurement of total assets for persons with \$500,000 or more in gross wealth?

- First, as to shape, the dashed line definitely is not straight; it is not badly bowed, however; hence, we might be willing to conclude that the two distributions are not that dissimilar.
- Second, the slope of the Q-Q plot of total assets is less than 1, indicating that the IRS distribution rises faster than that from the FRB survey (in fact, $\hat{\sigma} = .69$).
- Third, as we have already seen in figure D, μ_{IRS} and μ_{FRB} differ at the mean for total assets and this, along with dispersion differences, i.e., $\hat{\sigma} \neq 1$ yield the value $\hat{\mu} = \$231,240$.

All in all, the Q-Q chart for total assets nicely extends the insights of Figure D and indicates that despite large differences at the mean, there are still important similarities, at least as to shape.

Figure H provides a complete set of Q-Q charts for each asset type, beginning with financial assets as a total, then graphing each of its components: cash, corporate stock, bonds, and notes and mortgages. Three nonfinancial assets also are shown: real estate, noncorporate business assets, and other assets. In what follows, we will comment on each of these briefly:

Cash.--The FRB distribution rises very fast and looks to be quite different in shape from the corresponding IRS data as well. We speculate that reporting of cash in the survey was less complete than on the estate returns, with the consequences that the IRS mean is greater and the IRS distribution is more spread out (with $\hat{\sigma} = 2.27$ and $\hat{\mu} = -\$1,001,560$).

Corporate Stock.--The shapes of the IRS and FRB stock distributions are fairly similar over at least a portion of their range. The IRS distribution does rise faster than the FRB around

the 60th through 90th percentiles, possibly due to some rounding by the survey respondents in their answers. The IRS mean is higher than that for the FRB and, on the whole, the IRS data are somewhat more spread out (with $\hat{\sigma} = 1.23$ and $\hat{\mu} = -\$59,500$).

Bonds.--The shapes of the IRS and FRB distributions for bonds seem very similar, although there are sizable differences in relative dispersion and in overall means. The IRS data have a much heavier tail than the FRB survey information (with $\hat{\sigma} = 1.77$ and $\hat{\mu} = -\$557,040$).

Notes and Mortgages.--Notes and mortgages are very infrequently reported in amounts of \$500,000 or more in the FRB data. The Q-Q plot, perhaps for sampling reasons, shows almost no relationship between the two possible distributions. Nonsampling errors due to misclassification of notes and mortgages as real estate are conjectured to be a factor in the survey as well. (In any event, $\hat{\sigma} = 4.23$ and $\hat{\mu} = -\$2,524,340$.)

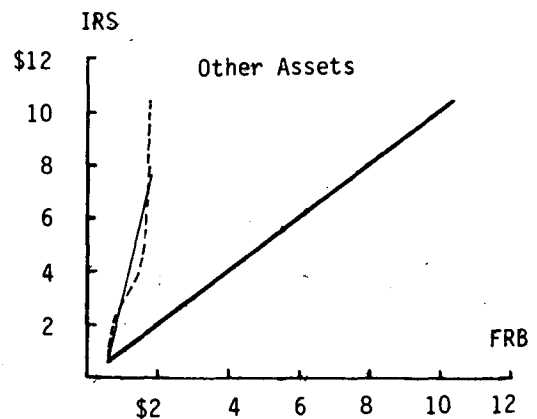
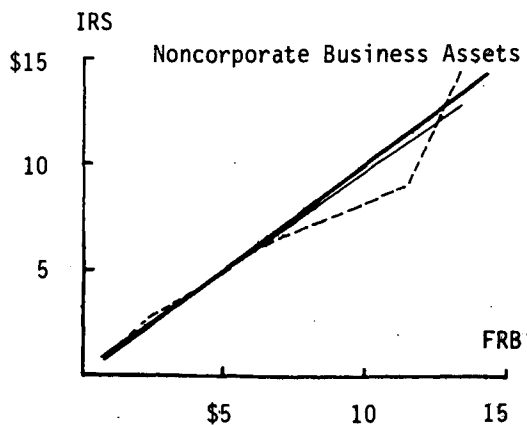
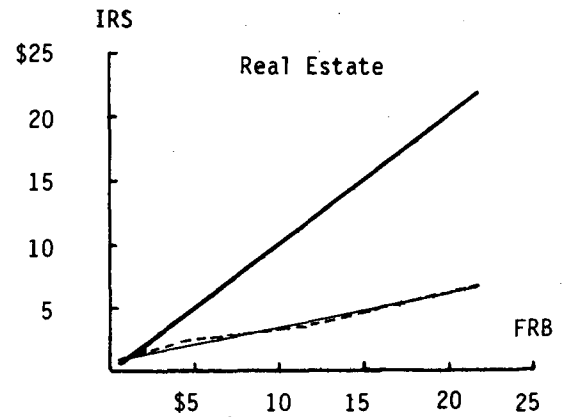
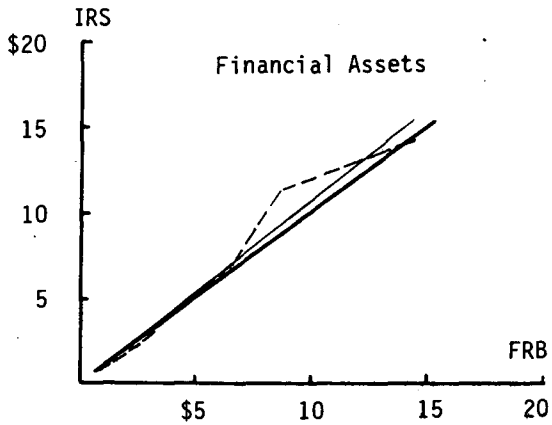
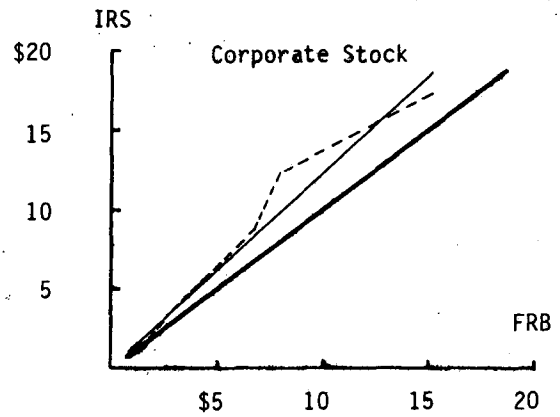
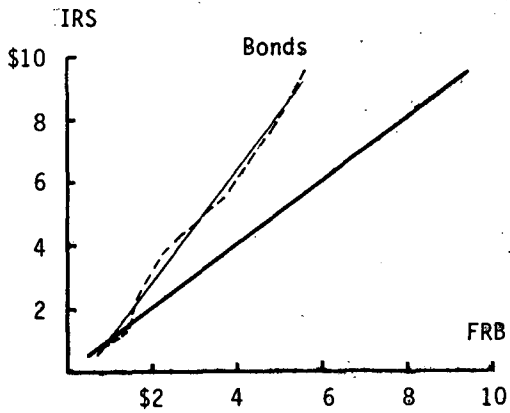
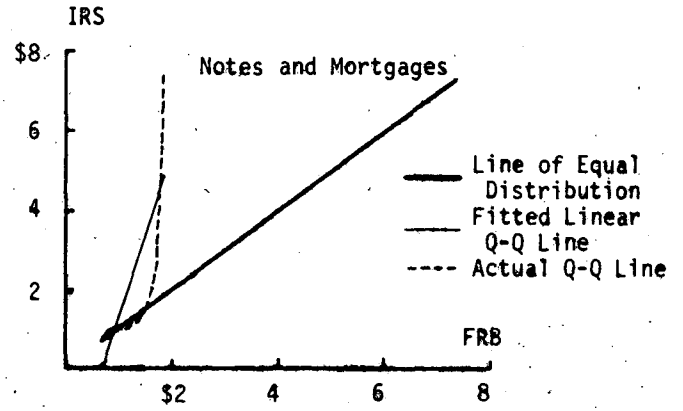
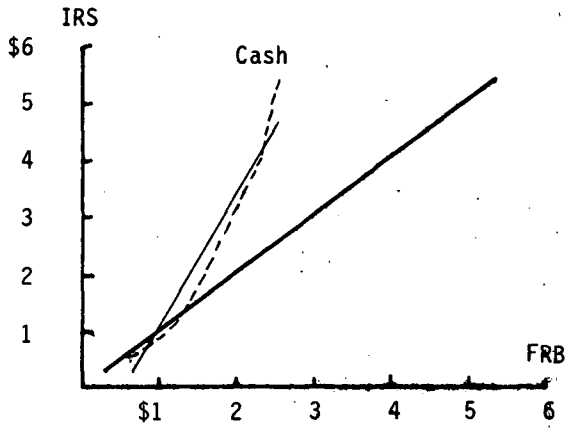
Financial Assets.--Financial assets appear quite similar in distribution between the FRB and IRS data sets. There is still a slight bow in the shape (caused by the dominance of corporate stock). Differences in the other components (bonds, cash, and notes and mortgages) tend to cancel out somewhat. The IRS and FRB distributions have nearly the same variances (with $\hat{\sigma} = 1.01$) and differ in their means only slightly as well ($\hat{\mu} = -\$47,630$).

Real Estate.--For all intents and purposes, the IRS and FRB distributions for real estate are identical in shape. On the other hand, they differ greatly in their means and variances (with $\hat{\sigma} = .26$ and $\hat{\mu} = \$649,240$). The IRS data source is picking up considerably less real estate overall, perhaps partly due to the possible difference in the way jointly owned property is being treated. As we noted earlier in Figure D, if 80 percent of jointly owned property is added to the IRS real estate amount, than the difference between the FRB and IRS mean shrinks from \$406,000 to about \$25,000. We have not replotted the real estate Q-Q chart to see what this change would do to the distribution as a whole, but that effort is underway.

Noncorporate Business Assets.--We were quite surprised, given the valuation issues surrounding this asset, at how close the FRB and IRS distributions came. As with corporate stock, there is a bow in the Q-Q chart (which, again, could be due to rounding in the survey). In any event, the IRS distribution rises more quickly between the 60th and 80th percentiles (and less quickly between the 90th and the 98th percentiles). The means and variances of the two distributions are quite close (with $\hat{\sigma} = .95$ and $\hat{\mu} = \$100,350$).

Other Assets.--As with notes and mortgages, we see little similarity between the FRB and IRS distributions for this component. Ample evidence, as already noted, seems to indicate

Figure H.--Quantile-Quantile (Q-Q) Plots for Each Asset Type, Federal Reserve Board and IRS Distributions Compared (\$ in Millions)



that the survey may have omitted large amounts of other assets. On the other hand, the IRS data may overstate this component, due to the inclusion of gift taxes paid within three years of death. (In any event, $\hat{\sigma} = 5.75$ and $\hat{\mu} = -\$2,847,000$.)

Other Considerations

In this section and the last, we have only touched the surface in our comparisons between FRB and IRS data. Most of what has been done can be taken as illustrative of the issues which exist and of how hard it will be to pin down any specific difference to a particular cause or set of causes.

The approach taken has been descriptive and exploratory. Detailed calculations of sampling errors from the FRB and IRS data sets remain to be carried out within the context of the comparisons made here. We originally planned to have some information on these, but time ran out on us. We now expect to report on these later.

5. FUTURE PLANS

The new initiatives by the Federal Reserve Board in measuring wealth deserve complementary, cooperative developments elsewhere in the Federal statistical system. Bob Avery's work and that of his colleagues at FRB, notably Art Kennickell and Greg Elliehausen, have enormously stimulated the IRS' personal wealth estimation program based on estate tax returns. As we have seen in this paper, there are a whole host of issues that need to be studied if these two sources (and others) are to be pieced together. Various levels of integration are possible, depending on the degree to which asset definitions can be made comparable and on our knowledge (or assumptions) about the error properties of each source. We may want to mix the two data sets (and others) in different ways, depending on our analytic objectives. Factors to consider in the blending of data sources include relative response (and nonresponse) biases, response variation and, of course, differences in sample size. The research has simply not been done yet that will allow for a clear choice of approaches. There are some areas (like household and family statistics) that must be based heavily on a survey vehicle. On the other hand, heavy reliance on sources other than a survey may be essential for, say, detailed information on the aggregate wealth of individuals with net worth of \$10,000,000 or more. In between these two extremes there is a great deal of flexibility about how the multiple sources available could be used.

For example, for asset items known to be comparable between the survey and estate data and for which the survey response variance was not too great, a post-stratification approach using a variant of raking ratio estimation [65] might be possible. For asset items known to be better reported on the estate tax returns, some form of multiple imputation or multiple statistical matching might be tried [66], where the estate tax information is "matched" into the survey.

The item "other assets" might be improved on the survey by such an approach. Greenwood's work, cited earlier, bears on this point as well [25]. Finally, estate tax return data could be employed to model the upper tail distributions of each asset type as part of an error detection and outlier protection procedure; this would certainly help to avoid the problems that arose last summer [42]. Record check studies of survey reported asset information, like those conducted in the earlier FRB work [12] seem to be needed. When anomalies are detected, correcting response error or down-weighting the cases might be viable options [67].

All of these strategies rely on the notion that what we should do with our outside information is to use it to produce adjusted microdata survey records. This may not always be desirable; for example, in the case of the very wealthy, there are likely to be just a handful of survey schedules available. Less elaborate methods could be adequate or even superior, including just tabulating the survey and estate data. For the extreme upper tail of the wealth distribution, whether of families or individuals, an explicit modelling approach seems unavoidable. Relying on just survey records, however adjusted, won't be enough; even with major improvements here, the sample of the very wealthy will still need supplementation. The important work being done by Forbes [30] in this area might be of great assistance as pointed out by McCubbin [15]. Pareto smoothing of the upper tail also shows promise and needs to be given continued attention [64].

It is possible, given the retrospective nature of the comparisons that we will never be able to completely explain the differences between the 1983 FRB and 1982 IRS wealth estimates. Nevertheless, this exercise has already been a source of several valuable conjectures that have spurred special studies of IRS wealth measurement issues. Many more of these studies are needed and we hope to undertake some of them over the next several years. (See Figure I.)

More independent work on IRS' (or FRB's) part will not be enough however. For a major advance in our understanding to occur, a tightly coordinated joint IRS-FRB effort seems essential. The proposed 1989 FRB survey of wealth offers one such opportunity, since an estate tax multiplier estimation program is also planned for that year. Within the limitations of these two measurement mediums, there are a fair number of steps that could be taken to improve our ability to align the two data sets. Reducing definitional differences in asset types would be one example. Deeper exploration of types of ownership in both sources would be another, especially for jointly owned and community property but also for partnership holdings. A better method of using an IRS frame for high income individuals seems to be another area where improved cooperation would help greatly, provided legal restrictions on access can be properly addressed. We look forward to working cooperatively to produce better wealth estimates for 1989 and beyond.

Figure I.--Selected IRS Estate Tax Multiplier Issues That Might Need to be Addressed in Piecing Together Personal Wealth Distributions

Issue	Implications	Research Needed
<p>The undervaluation of assets including closely held corporate assets, non-corporate business assets and real estate is of some concern, as are laws allowing for special use valuation and the valuation of jointly owned property.</p>	<p>Wealth estimates will tend to be biased downward and the portfolio distribution of assets may be skewed away from the assets for which obtaining an accurate valuation is difficult.</p>	<p>More study of changes to asset valuations made during auditing, as described in Harriss [60] and McCubbin [15] could result in the development of a method to adjust asset valuations. The fair market value of property included at the special use value could be captured from the return. Types of jointly owned property could be captured in detail.</p>
<p>Some assets, in particular, terminable interests including some trust interests and some pensions, are not required to be included on the estate tax return.</p>	<p>Wealth estimates will be biased downward. This effect may be stronger for very wealthy individuals with more complex types of assets.</p>	<p>Additional review of the estate tax law in this area might enable researchers to understand better what types of adjustments are needed in the estate multiplier wealth estimates to correct for this omission. New sources of data can be looked at too. For example, the re-structured generation skipping transfer tax requires that lifetime trust interests be reported each time an interest terminates. A study of the new tax might improve our understanding of this area.</p>
<p>Some assets, including large blocks of stock in closely held corporations and business interests which derived value from the skill and experience of the decedent (eg., professional practices, small, owner-run businesses) decline in value around the date of death. In addition, debts usually increase at this time, due to the expenses of the last illness.</p>	<p>Wealth estimates will be biased downward and they will not reflect the wealth of the living population. The full importance of these assets will not be reflected in estimated portfolio distribution of assets.</p>	<p>Income tax data, if linked in, could provide a picture of economic well-being for more than one point in time. These data might also be grossed-up to provide estimates of the worth of income producing assets. Information on the length of the last illness will also be useful in determining when an individuals net worth might begin to decline. To the extent that they are identifiable on the estate tax return, debts due to the expenses of the last illness could be excluded from debt measures derived from the estate return.</p>
<p>Life insurance is one asset which increases in value at death.</p>	<p>Wealth estimates are biased upward and the estimated portfolio distribution of assets is incorrect.</p>	<p>The use of average cash surrender values, rather than the full value of life insurance has been the traditional adjustment here. A new study of the relationship between face and cash surrender values might be valuable.</p>

Figure I.--Selected IRS Estate Tax Multiplier Issues That Might Need to be Addressed in Piecing Together Personal Wealth Distributions--Continued

Issue	Implications	Research Needed
The alternate valuation date provision complicates the timing issue by allowing executors to elect to value estates six months after the date of death, rather than at the date of death value.	Wealth estimates may be biased. (Prior to July 1984, executors could use the alternate valuation election to increase the value of estates, in order to avoid future income taxes. This is no longer allowed, so the bias for years to be studied in the future will be downward.)	The date of death value, which is available on the estate tax return, should be used for wealth estimation.
Changes in the estate tax code affect the scope and meaning of estate tax data, making time-series analyses difficult.	Fluctuations in the level and distribution of wealth and in the portfolio distribution of assets due to tax law changes may be erroneously attributed to exogenous economic factors.	An ongoing study of the nature and magnitude of such effects, along with the promotion of an awareness of the effects, may make this complication more manageable (e.g., [15]). Selecting additional samples of returns for recent years (especially 1976) might also help us to assess reporting effects. When possible, wealth estimates for different points in time will be corrected for tax law differences which are measurable.
Incomplete demographic information on decedents and the unknown nature of differential mortality rates with respect to wealth complicate the weighting of the "sample."	Wealth may be over- or underestimated by the estate multiplier technique.	Longitudinal income tax data or wealth survey data linked with estate and probate records could be used to calculate mortality differentials by wealth status.

AFTERWORD AND ACKNOWLEDGMENTS

All-in-all there are clearly enough challenges in the area of personal wealth estimation to fill the professional lives of the authors of this paper and their colleagues at IRS many times over. We are greatly indebted to all those who helped us in the preparation of what turned out to be an interim report on the implication of FRB-IRS comparisons for future research.

Special thanks are due to Marvin Schwartz at IRS who has labored mightily in this field for many years. The importance of the fresh insights of Bob Avery, Arthur Kennickell and their colleagues at the Federal Reserve Board has already been noted several times. Their help in preparing special tabulations of the 1983 Survey was enormous. The early mentoring of Jim Smith and Dorothy Projector deserves a special note of gratitude. They have set the standard for leadership and excellence in this area and our hope is only to follow in their footsteps. The good sense and support of Beth Kilss and Wendy Alvey must also be mentioned,

along with Dan Skelly's persistence in egging us on at certain points. H. Lock Oh, as always, gave invaluable assistance. Typing support was provided by Nancy Dutton, Sheila Gray and Bettye Jamerson.

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The Estate Multiplier Technique, Recent Improvements for 1989

By Barry W. Johnson and Louise Woodburn

The distribution and composition of personal wealth in the United States has attracted considerable attention in recent years. The effects of changes in tax laws, and other public policies, on the economy and on the concentration of wealth have been widely debated. Accurate and comprehensive estimates of wealth, however, are difficult to obtain because individuals are not generally required to report wealth information on any tax return or other public document. The most common methods of estimating personal wealth are collecting wealth data directly via a survey, such as the Federal Reserve Board's Survey of Consumer Finances [Kennickell and Shack-Marquez, 1992, Avery and Kennickell, 1992], capitalizing income flows reported on individual tax returns [Greenwood, 1981], or using wealth data reported on Federal estate tax returns. This paper focuses on the third alternative, using the 'estate multiplier technique' to estimate the wealth of the living population from estate tax return data collected by the Internal Revenue Service's Statistics of Income Division (SOI).

This paper is divided into four sections. The first will review the estate multiplier technique, the underlying data base, and some of the conceptual challenges associated with the methodology. Next, we will look in detail at the application of the methodology and at the uncertainty associated with the estimation technique by quantifying the effects of our assumptions on the variance of the resulting estimates. We will then evaluate our estimates by comparing them to those developed using the Federal Reserve Board's 1989 Survey of Consumer Finances. Finally, some areas for future research will be discussed.

I. The Technique, Data, and Conceptual Challenges

Researchers have been using the estate multiplier technique since the beginning of the 20th century to draw conclusions about the wealth of the living population by studying the wealth of the deceased. The multiplier technique assumes that estate tax returns, taken as a whole, represent a random sample of the living wealthy population, and thus provide a means of producing reasonable estimates of personal wealth utilizing existing data. These estimates are limited by the estate tax filing threshold, which is currently \$600,000 in total gross estate. While this threshold is somewhat restrictive, the resulting estimates account for the top 1 to 2 percent of the population. In 1989, these top wealthholders controlled between 25 and 30 percent of personal wealth in the U.S. [Johnson and Schwartz, 1993].

The multiplier is equivalent to a sampling weight where the probabilities of selection include the probability of

being a decedent and that of being included in the SOI sample of estate tax returns. The difficult computation is the probability of being a decedent. Death is not a truly random event and therefore the decedent sample is not a simple representative sample of the living population under consideration. The probability that a person will die in a given year depends on many factors. Age and sex have often been taken as the most important factors relating to mortality. However, there is much evidence that the wealthy have mortality rates significantly lower than those of the population as a whole, perhaps due to better access to health care, better nutrition, less hazardous occupations, or better housing [see Menchik, 1991, Kitagawa and Hauser, 1973]. Thus, the probability of being a decedent in our sample has two components, a mortality rate, based on age and sex, and an adjustment, called a differential, which adjusts the mortality rates of the general population for the added longevity of the top wealthholder population. The mathematical expression of the estate multiplier is given in equation (1).

(1) $MULT = 1 / (p * r * d)$ where:

p = probability of selection to the estate tax sample,
r = mortality rate,
d = rate differential.

There have been several studies as to the best way to compute the differentials. The first researchers to try to make such an adjustment to mortality rates were Daniels and Campion in preparing wealth estimates for England and Wales in the 1920's [Daniels and Campion, 1936]. Horst Mendershausen was the first U.S. researcher to adjust mortality rates, applying them to IRS data from the 20's and 40's [Mendershausen, 1956]. He used data on the mortality experience of the Metropolitan Life Insurance Company for policies in the \$5,000 whole life classification to adjust white, age-specific mortality rates. He was also the first to attempt to isolate insurance values and make an estimate of the cash surrender value, an issue which is discussed in the next section.

Robert Lampman made similar estimates for 1953 based on IRS data [Lampman, 1962]. His estimates carried Mendershausen's work a step further, creating a composite mortality differential adjustment based on three factors: the mortality experience of professional, technical, administrative, and managerial workers for 1950; the 1953 white-male mortality rates; and an average of the 1953 Metropolitan Life data with the data of male Ordinary Life Insurance policy holders. The IRS has been using data from Metropolitan Life comparable to that used by Mendershausen and Lampman to produce estimates since 1962.

Data Sources

There are three main components of the estate multiplier personal wealth estimates: the estate tax sample, the mortality rates, and the rate differentials.

Estate Tax Data

The 1989 SOI Personal Wealth data file is based on Federal estate tax return data compiled by the Statistics of Income Division (SOI) of the IRS. For the 1989 wealth estimates, the SOI estate tax data were derived from a stratified sample of estate tax returns filed from 1989 through 1991 for individuals who died in 1989. The sample is stratified by year of death, age at death, and by size of total gross estate (TGE). Only estates with a gross estate value of \$600,000 or more, the estate tax filing threshold, are included in the sample. All returns filed for both the very wealthy (those with gross estates of \$5 million or more) and the young (those under 40 years of age) were selected with certainty.

In the past, wealth estimates, such as the preliminary estimates for 1982, were derived from the SOI sample of estate tax returns filed in a particular year. Because a decedent's estate has up to nine months to file an estate tax return and an extension of six months is not uncommon, returns filed in a given year can include decedents who died in several different years. By sampling returns filed over a 3-year period, nearly all the returns filed for the cohort of 1989 decedents can be represented. We estimate that only 1 percent of 1989 decedents were not included in the study file. These decedents tend to have larger, more complicated estates. We use data for prior years to compute an adjustment to account for these decedents.

The strength of the estate multiplier technique is due, in part, to the nearly complete coverage of the wealthiest portion of the decedent population. Approximately 21,500 estate tax returns for individuals with total assets of \$600,000 or more are included in the 1989 SOI Personal Wealth file. Despite the sample size advantages, the limited number of returns filed each year for decedents who were young or very wealthy can make estimates for those sub-groups subject to considerable variance [Smith, 1965].

The number of very young or wealthy decedents tends to vary from year to year and is relatively small in comparison to their representation in the living population. This can result in significant short-term fluctuations in our estimates attributable solely to the 'sample variance' associated with these two groups. To dampen the effect of these variations, we 'smooth' the sample by including all returns for these individuals filed between 1989-91, without regard to the year of death. The data are then reweighted to represent the true 1989 decedent population.

Three measures of wealth are used in this article: gross estate (or gross assets), total assets, and net worth. The gross estate criterion is a Federal estate tax concept of wealth that does not conform to the usual definitions of wealth. Gross estate reflects the gross value of all assets, including the full face value of life insurance reduced by policy loans but excluding any reduction for other indebtedness. This is the measure used in assessing the estate tax and thus defines the individuals included in the top wealthholder group. The amount of total assets, a lower wealth value, is still essentially a gross measure. Total assets differ from gross assets in that the cash value of life insurance, i.e., the value of insurance immediately before the policyholder's death, replaces the 'at death' value of life insurance included in gross assets [1]. Net worth is the level of wealth after all debts have been removed from total assets.

Mortality Rates

The mortality rates used here are derived from data compiled by the National Center for Health Statistics and are the death rates for white males and females in the United States, by 5-year age groups, for 1989. The rates range from .481 per 100,000 for females, age 20-24 years, to 179.78 per 100,000 for males older than 85. These rates are sample estimates and thus subject to sampling error; however, the sampling error is very small. Thus, we disregard the variance associated with these estimates in our analysis.

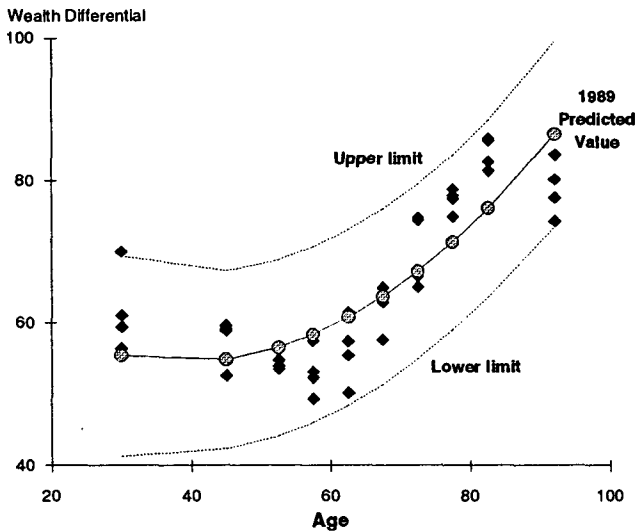
Rate Differentials

The rate differentials are derived from information supplied by the Metropolitan Life Insurance Company and are based on the expected vs. realized deaths of their large policy holders. We do not compute sex specific differentials, rather we account only for age at death differences. [2] Our 1989 differential estimates are predicting using differentials in 6 age categories for the years 1969, 1971, 1975 and 1978 from Metropolitan Life. We investigated different models for these data using age and year as the independent variables in an ordinary least squares regression. Year of death was not a significant predictor in any of the models. Our final model is given by equation (2):

$$(2) \text{ diff} = 71.808 - 0.89(\text{age}^2) + 0.011(\text{age}) + E \sim (N(0, 5.95))$$

The predicted values range from about 58% of the general mortality rate for those under thirty, to 85% for those age 90 and over. The plot in Figure A shows the data, the fitted regression line and the 5% and 95% confidence limits for the individual predictions. We incorporate the inherent model uncertainty in the variance computation as detailed in the next section.

Figure A.—1989 Mortality Differential Underlying Data and 95% Confidence



II. Estimation Methodology

There are two main estimation concerns inherent in sampling applications: the computation of sampling weights and a methodology for computing variance estimates. We first describe the sampling weight computation which is itself composed of two steps: the computation of the selection probability and adjustments to this probability. As shown in equation (1) and discussed earlier, the selection probability consists of the mortality rate, rate differential, and probability of selection to the SOI sample. We refer to the inverse of this probability as the multiplier. Once all the components are known, we considered adjustments such as post-stratification and weight trimming.

The extremely skewed distribution of net worth is of particular interest to researchers. Because the underlying sample of estate tax returns was stratified by gross assets, which is not highly correlated with net worth, it would be appropriate to post-stratify. However, the necessary control totals are not readily available. Thus, our strategy was to constrain the tails of the net worth distribution to resemble a Pareto distribution, which is often used in wealth and income models.

For our purposes, the upper tail of the net worth distribution was defined as those individuals with net worth of \$250 million or more. In order to determine the parameters of the Pareto, we examined the empirical distribution of net worth implied by the individuals in the *Forbes* 400 for the years 1982-1989. We found that the data approximated a Pareto with parameters varying from 1/2 to 1/3. The SOI data were then divided into the following net worth categories: \$250 to \$450 million, \$450 to \$700 million and greater than \$700 million.

First, we decided to trim the multipliers in the bounded net worth categories at the 3rd quantile. The remaining unbounded category contained an estimated 45 individuals. The multiplier values in this category were fit to a Pareto of parameter 1/3, preserving the final estimate of 45. When these adjustments had been made, the distribution of individuals with net worth of \$250 million or more approximated a Pareto, so no further changes were made [3].

Similar adjustments were made for returns with extreme negative net worth (less than -\$1 million). These cases were grouped into three categories: -\$1 to -\$5 million, -\$5 to -\$15 million, and less than -\$15 million. Again, a distribution of the multipliers was computed and the multipliers trimmed at the 3rd quantile in each of the categories.

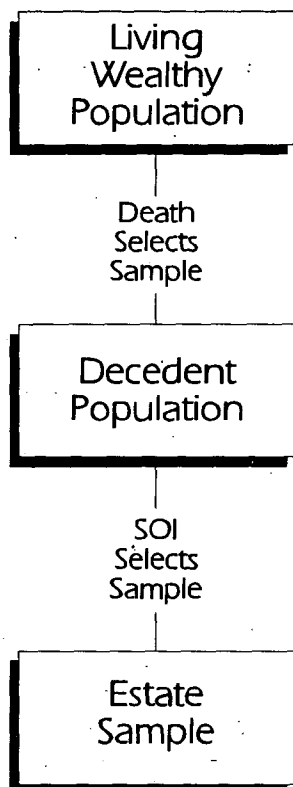
Variance Estimation

In this section we detail the methodology used in the computation of variance estimates. We quantify the uncertainty inherent in the estate tax data and in the differential used in the computation of the estate multipliers by developing distributional models for these components. These individual measures of uncertainty are used as input to a total error, as described later in this section. Such treatment of the multipliers as an unknown quantity with an error distribution was suggested by Scheuren and McCubbin [1987]. Our overall strategy is to select bootstrap samples that reflect the sampling process from the living population through the selection of the estate sample, incorporating the different estimation steps along the way.

The three components of the estate multiplier are the probability of selection to the estate tax sample, the mortality rate, and the rate differential. These approximate a two-stage sampling scheme, where the first stage is death, with the probability of selection equal to the mortality rate times the differential. The second stage is the SOI sample selection (see Figure B). Note that for both stages, the sampling unit is an individual. We have nearly complete knowledge of the probability of selection to the estate tax sample. The sample is a stratified random sample with sample rates varying from 7 to 100 percent. We also have some limited information for the entire population of estate tax filers. It is worth pointing out that the sample is post-stratified to the population of filers. This allows us to adjust for returns that were misclassified due to keying errors prior to sample selection. Still, there is sampling error associated with the SOI sample.

Less is known about the probability that an individual will die in a particular year. While we have mortality rates, a degree of uncertainty must be attributed to this process as well. (We have already detailed our efforts to 'smooth' the

Figure B.--SOI Estate Tax Sample Schematic



variance of the sample selection of the young and wealthy in section I.) Also, because the differentials are modeled using a time series of data, they add to the uncertainty of the multiplier [4]. In order to measure the contribution of each of these components of uncertainty (sampling and modeling) we choose the bootstrap method of variance estimation.

The bootstrap method of variance estimation is a resampling technique where many random samples are drawn, with replacement, from the original sample. The bootstrap samples are selected using the same sampling scheme as was used for the original sample. These bootstrap samples are used to produce estimates which are then combined to produce

estimates of bias and variance for desired statistics. The advantage of a resampling method is that it is possible to estimate the variance of both linear and nonlinear statistics, and to incorporate uncertainty due to the estimation process. Additionally, inferential analysis, such as the computation of confidence intervals, is not limited to the assumption of an underlying normal distribution; the actual distribution of the bootstrap sample estimates can be studied.

In order to select bootstrap samples, we must recall that the estate tax sample is derived from a two-stage selection process. This sample is not a traditional cluster sample because the sampling unit is the same for both stages and the samples are selected independently of each other. However, the estate sample is a subsample of death's decedent sample. We assume death's sample is stratified by age at death and sex. In order to capture the sampling variance due to death's selection, we recreated death's decedent sample. Based on the SOI sample weights, records were duplicated creating a decedent sample of 53,000 (the total number of estate tax filers who died in 1989). We then resampled, with replacement, in the age/

sex categories we used in assigning mortality rates--our assumed stratification of death's sample.

At this point, we have a 'bootstrap decedent sample' reflecting death's selection. From here, we reselect an SOI estate tax sample, according to the original SOI sample design. We now have a bootstrap estate sample incorporating both the sampling error attributed to death, and that attributed to the SOI sample. Next, we choose a differential from the estimated distribution, incorporating the model error. We constrain the differential choice to be within the computed 95% confidence interval, seen previously, to keep the resulting values in a feasible range. Finally, using the known probability of selection to the estate sample, the assumed mortality rate, and the estimated differential, we compute the multipliers. We bound the multipliers for decedents with net worth over \$250 million or net worth less than -\$1 million, as discussed earlier. These adjustments are data driven, the third quantile bound was computed for each bootstrap sample.

Figure C shows a box plot of 11 bootstrap estimates for total assets. The median of the bootstrap estimates is \$5.37 trillion, with a high of \$5.50 trillion and a low of \$5.25 trillion. As expected, the distribution of the estimates is slightly skewed. Because there are no control totals to use in computing the multipliers, the estimate of the number of individuals is also of interest. Figure D is a box plot of 11 bootstrap estimates of the number of individuals with total assets over \$600,000. The median of the estimates is 3.06 million, with a high of 3.08 million and a low of 3.04 million. The distribution is much tighter than that of the sum of total assets.

In computing the estimates, it was possible to measure the variance associated with each of the multiplier components. The post-stratification adjustments, which included the weight trimming, decreased the variance of the sum of total assets by 54%. The resulting estimate was about 1.4 percent less than the original, unpost-stratified estimate. The variance of the frequency estimate decreased 16% as a result of post-stratification; the effect on the value of the estimate was negligible.

Allowing the mortality rate differentials to vary within the 95 percent confidence interval suggested by the model increased the variance of the total asset estimate by about 29 percent; the variance of the frequency estimate increased by less than 2 percent. In both cases the resulting estimates were almost 4 percent higher than the estimates based on a fixed differential. Further investigation revealed that calculating the differentials based on the age of each decedent using equation (2), rather than assigning them in broader age categories as was done previously, further increases the estimate of both the number of top wealthholders and the total value of their assets.

Figure C.--Box Plot of Aggregate Total Assets Using 11 Bootstrap Estimates

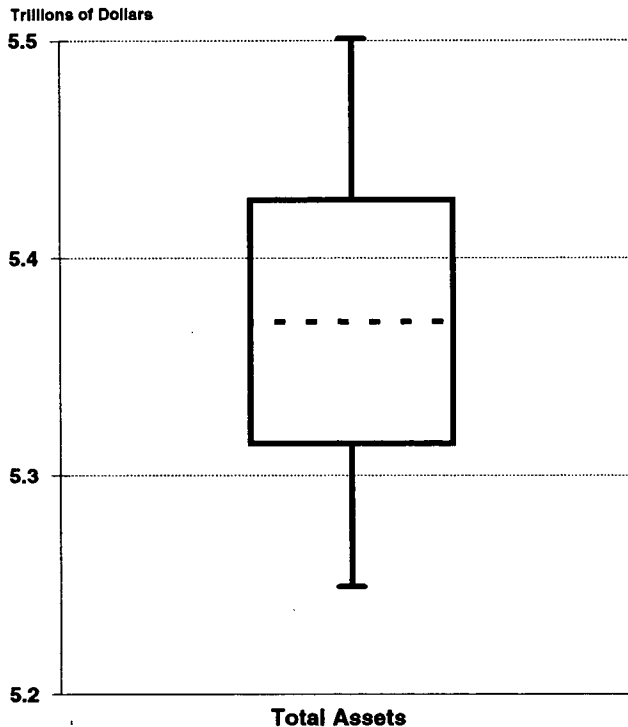
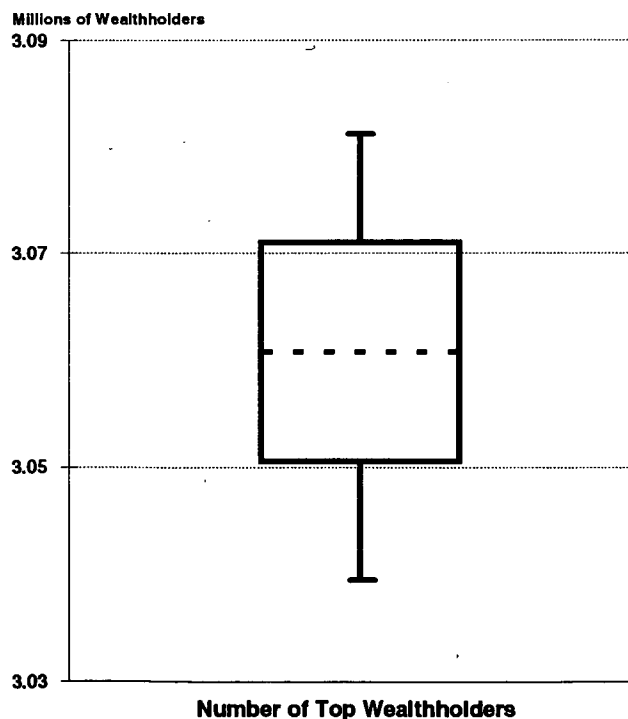


Figure D.--Box Plot of Number of Top Wealthholders using 11 Bootstrap Estimates



III. Comparison to Other Data

Having created estimates of individual or personal wealth, the next step is to validate them, using an independent data source. As mentioned, there is very little information on the wealth of individuals in the U.S., particularly for those in the upper end of the wealth distribution. One excellent source of wealth data, however, is the Survey of Consumer Finances, sponsored triennially by the Board of Governors of the Federal Reserve System.

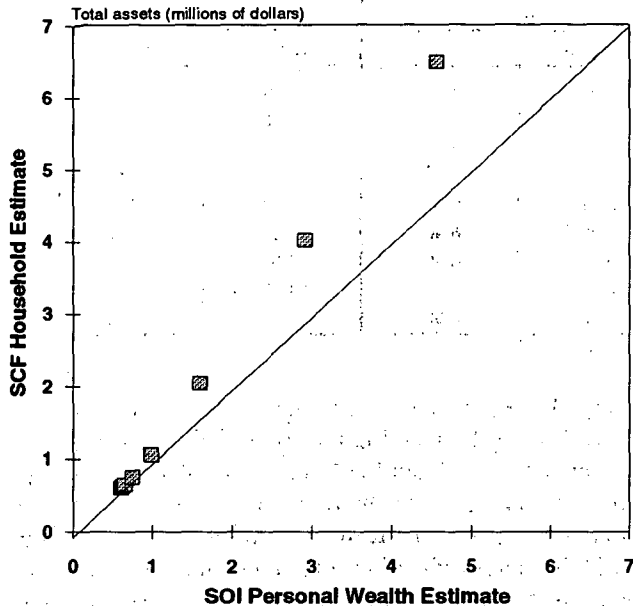
The Survey of Consumer Finances (SCF) is a household survey from which estimates of wealth, income, savings, etc. for the entire nation can be derived. One main objective of the SCF is to provide a good representation of the entire wealth distribution. In order to do this, the SCF incorporates a dual frame sample. One sample is a multi-stage area probability sample; the other is a list sample stratified by a measure of wealth and sampled disproportionately [see Kennickell and Woodburn, 1992]. It is particularly appropriate to use estimates derived from the SCF to validate the SOI estimates because of the supplemental coverage of wealthy individuals provided by the list sample [5].

Because the SCF produces household estimates of wealth, while the estate multiplier technique produces estimates of individual wealth, it is not possible to compare aggregate totals directly [see Scheuren and McCubbin, 1987]. However, there should be some relationship between the distributions of the estimated populations. This comparison can be shown graphically using quantile-quantile (QQ) charts, which compare the cumulative percentage of individuals over a fixed set of percentiles [see Wilk and Gnanadesikan, 1968 for an explanation of this technique]. If the distributions of these functions are exactly alike, the plot will be a straight line, passing through the origin, with slope=1. If the variances are the same, the y-intercept represents the difference in the means. The slope represents the ratio of the variances. If the distributional forms are dissimilar, the plot will be nonlinear.

Figure E is a QQ comparison for estimates of total assets for individuals (SOI) vs households (SCF) with at least \$600,000 in total assets. The linear arrangement of the points indicates that the two distributions are of similar functional form. The slope is greater than one, which shows that the values of the SCF estimates rise more quickly than those derived from the estate data.

The linear relationship between the two sets of estimates observed in the QQ plot suggests that the underlying distributions are similar, albeit, derived in different ways. It is possible to carry the comparison further by using additional SOI data to create a household data base from the individual wealth file for households with total assets of at least \$600,000. We start with the assumption that single individuals, whether they are widowed, separated,

Figure E.—QQ Comparison, SCF vs. SOI Estimates for Households/Individuals with Total Assets of \$600,000 or More



divorced or never married, each represent a household. We are left with devising a way to create 'families' from the data for married individuals.

The household wealth of a married couple can be separated into three parts: assets belonging solely to one of the two spouses (WFEM or WMALE) and assets held jointly (WJOINT). The data in the SOI estimates represent individuals for which $WFEM + 1/2 WJOINT$ (for females) or $WMALE + 1/2 WJOINT$ (for males) was at least \$600,000. The value of the second spouses' assets (WMALE for females or WFEM for males) is missing and must therefore be imputed.

We first took up the task of imputing WFEM for the males in our file, simply because there were more records for married males in the database than married females. In order to impute a value for WFEM, we made the following assumptions:

1. Some, but not all, of the married individuals in the SOI estimates are married to each other.
2. The separate assets of the married females in our file were representative of those belonging to the spouses (WFEM) of the males in the file.

In general, imputation of missing values is most effective when based on a model derived from a distribution of known values [Little, 1986]. Since WFEM is missing for all cases, we have no information on how WFEM relates to WMALE, or for that matter, to any other data for a given male. Therefore, an explicit model was not feasible. We

instead chose the hotdeck procedure within adjustment cells [Hinkins and Scheuren, 1986]. Records for married males for which a value of WFEM were to be imputed were matched to records for females (donor records) in the same adjustment cell. The missing value was estimated using the known value from the donor records.

In order to implement this procedure, the donor records must first be divided into cells. The original SOI sample TGE categories were used, creating 3 strata: TGE under \$1 million, \$1 million under \$5 million and \$5 million or more. Each of these strata was further divided into four quantiles based on the distribution of joint assets within that strata, creating a total of 12 cells. Records for the males were divided into the same cell categories. A value of WFEM was then chosen randomly, with replacement, from a donor record, for each married male in a corresponding cell. Repeated applications of the procedure showed that the variance attributable to the imputation process had a relatively minor effect on the distribution of the value of Total Assets in the resulting data set. This variance is incorporated later.

The results of the hotdeck procedure produced a data set containing estimates of households where $WMALE + 1/2 WJOINT$ was at least \$600,000. While we assume that some of the males and females in our file are members of the same household, there remain a number of households for which the female spouse's assets ($WFEM + 1/2 WJOINT$) totaled at least \$600,000, but the husband's did not. We assumed that households in which females owned separate assets of at least \$600,000 ($WFEM > \$600,000$) best represented these missing families. The males on our file which best represented their spouses were those for whom $WMALE < \$600,000$. A weighting adjustment was made to account for these additional 'families'.

This final adjustment gave us a file of households for which at least 1 individual owned \$600,000 or more in gross assets. We were not able to represent married households for which each individual owned less than \$600,000 but where the couples' combined assets totaled \$600,000 or more. These households are, however, included in the SCF estimates and thus, direct comparisons of the SOI and SCF households at the \$600,000 threshold are not meaningful.

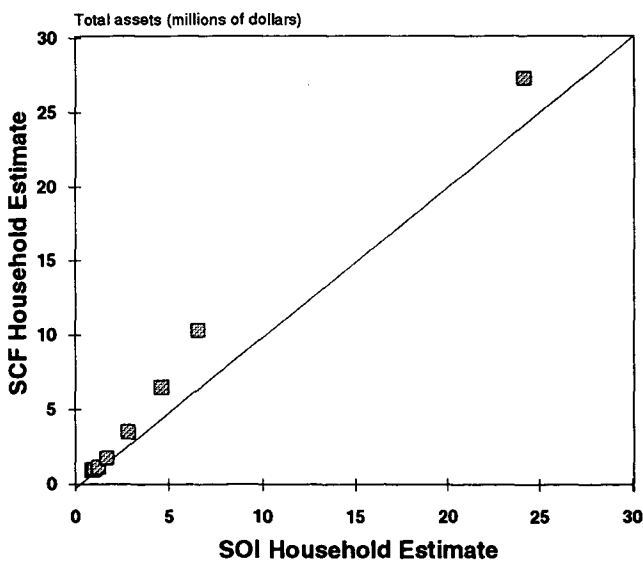
The effect of these 'missing' families on the frequency and dollar estimates should diminish at higher total asset thresholds; the SCF and SOI estimates should eventually converge. Figure F gives frequency and dollar estimates of total assets for different thresholds between \$600,000 and \$1 million. The frequencies converge between \$850,000 and \$900,000. At this level their aggregate estimates of total assets differ by about \$890 billion, with the SOI estimate about 12 percent less than that of the SCF. A QQ

Figure F.—SCF vs SOI Household Estimates of Aggregate Total Assets for Increasing Total Asset Thresholds

Total asset threshold	SCF estimate		SOI estimate		Percent difference between SCF and SOI	
	Number	Amount	Number	Amount	Number	Amount
\$600,000	3.93	8.89	2.94	7.26	25.19 %	18.34 %
\$650,000	3.51	8.62	2.80	7.20	20.23	16.47
\$700,000	3.10	8.36	2.67	7.11	13.87	14.95
\$750,000	2.93	8.24	2.58	7.04	11.95	14.56
\$800,000	2.61	7.99	2.48	6.97	4.98	12.77
\$850,000	2.42	7.83	2.39	6.90	1.24	11.88
\$900,000	2.30	7.71	2.32	6.83	-0.87	11.41
\$950,000	2.16	7.59	2.25	6.76	-4.17	10.94
\$1,000,000	2.03	7.46	2.17	6.69	-6.90	10.32

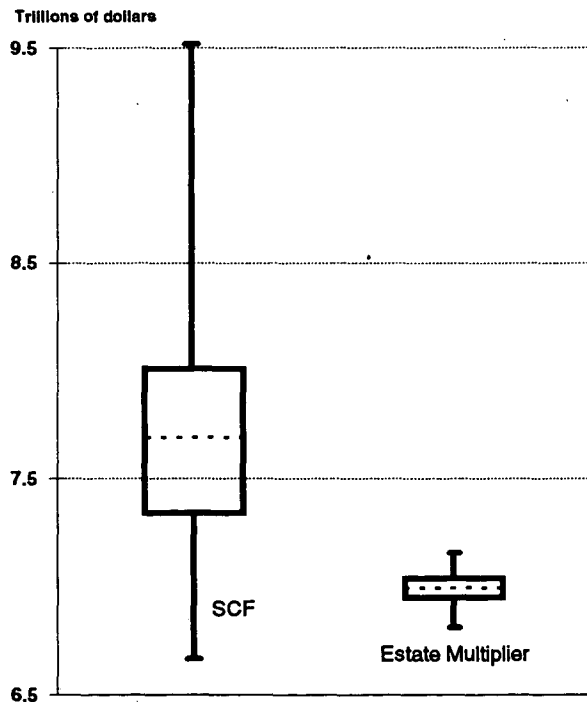
plot of total assets for households with at least \$900,000 in assets is given in Figure G. The distributions are more similar than before, but the distribution of the SCF estimates still increases more rapidly than that of the more conservative SOI estimates. Interestingly, some researchers have estimated that the pre-audit values of some estates increase by as much as 10 percent after an audit has been completed [Harris, 1949], while a more recent study found that the increase was between 2 and 4 percent, overall [McCubbin, 1987]. It is also reasonable to expect that values which are acceptable for administrative purposes may be more conservative than those given during a survey interview.

Figure G.—QQ Comparison, SCF vs. SOI Estimates for Households with Total Assets of \$900,000 or More



Finally, by applying the variance methodology previously described, including the additional variance due to the imputation of "families," we can see that much of the difference in the two estimates is attributable to the uncertainty associated with the two estimation techniques. Figure H shows a box plot of 11 bootstrap estimates of the value of assets for households at or above the \$900,000 threshold. The overall variance of the SCF estimate is much greater than that of the SOI estimate, largely because of the much

Figure H.—Comparison of Bootstrap Estimates: Aggregate Total Assets for Households with Total Assets of \$900,000 or more



smaller sample size on which the SCF estimates are based. (Remember that at this threshold, the frequency estimates are nearly the same.) This graph shows that the more conservative SOI estimate of the value of total assets is within the survey's margin of error.

IV. Summary and Future Research

In his 1965 paper presented to the American Statistical Association, James Smith suggested several areas for future studies relating to the Estate Multiplier Technique and wealth estimation. Likewise, Scheuren and McCubbin gave a similar set of suggestions in their 1987 paper. In closing, it seems appropriate to visit their "wish lists" and give a progress report on those things we have not already specifically addressed.

1. The major information gaps in the Federal estate tax return data had been missing ages and the absence of a cash surrender value of life insurance. The first problem, that of missing ages has been virtually eliminated through the use of death certificate data, now required of each filer, to supplement data reported on the return itself. For our present sample, there were a mere 22 decedents for whom ages were imputed.

Estimating the cash value of life insurance remains a problem which will only get worse in light of the many new products being marketed by the industry. Some of these products are sophisticated investment instruments, the return on which is determined by an individual's attitude toward risk as well as by market performance. We are continuing to investigate ways to capture more information from the supplemental data filed with each tax return in order to improve in this area.

2. Data captured from estate tax returns is prior to an audit. C. Lowell Harriss estimated that the value of some estates may increase by as much as 10% after audit. A more recent preliminary study by Scheuren and McCubbin suggest that the difference may be much less significant. SOI is planning a more extensive study, to begin in 1994, which will look at this important issue.
3. What is the income of top wealthholders and their heirs? What is the relationship between inter vivos giving and the transmission of assets at death? These issues are very important to the estimation of wealth and are being addressed through a series of estate collation studies, beginning with a sample of 1976 decedents. These studies link income, gift and fiduciary tax returns filed for decedents and their heirs, for

several years prior to a decedent's death, and, in the case of heirs, several years hence. We are currently beginning to process data for 1989 decedents and are planning a larger scale study for 1992 decedents. The advent of the SOI individual income tax panel sample (see Czajka and Walker, 1990) will also offer important opportunities to follow income patterns of individuals over long periods of time and then relate that data to their estate tax returns at their death.

4. Finally, of course more research is needed into the appropriate mortality rates. We have shown that allowing the mortality rate differentials to vary within age categories can have a significant influence on the final estimate and its variance. Further, the practice of assigning the differentials within broad age categories seems to bias the resulting estimates downward. We are looking at several sources for more detailed information on the influence of wealth on mortality, the most promising being the National Longitudinal Mortality Study sponsored by the National Institutes of Health.

Notes

- [1] The cash value of life insurance included in total assets and net worth was approximated based on the face value of life insurance reported on the estate tax return and on the decedent's age. This was done by applying an equity valuation ratio in the form:

$$\frac{\text{Cash Value of Life Insurance}}{\text{Face Value of Life Insurance}}$$

This ratio was developed based on two independent sources of data. The first was a study conducted by the Institute for Life Insurance which looked at the life insurance policies which had been reported in the estates of Federal estate tax filers in mid 1971. The second was the Federal Reserve Board's 1989 Survey of Consumer Finances. This survey asked respondents to approximate the total cash and surrender values of their life insurance values. Only households with total assets of at least \$600,000 were considered.

The results generated from each of these sources were encouragingly similar. A simple regression in which age was the independent variable was used to predict the values used in our estimates. No attempt was made to adjust for the presence of term insurance in our data. The same set of ratios was used for both males and females due to lack of sex-specific data.

Life Insurance Equity Values

AGE	Equity Ratio
Under 40	3.9%
40 under 45	8.9
45 under 50	14.0
50 under 55	18.4
55 under 60	24.2
60 under 65	31.1
65 under 70	38.6
70 under 75	47.0
75 under 8	56.1
80 and over	82.5

- [2] We have derived a single set of mortality rate differentials, based on the decedent's age, which were used for both males and females. Based on the knowledge that these groups have very different mortality rates, this may be inappropriate. A simple test of this is to compare the estimates of community property for married males and females living in states where such property is common [Scheuren, 1975]. It seems reasonable to expect that the frequency and dollar estimates of community property would be roughly equal between men and women if the differentials have been assigned appropriately.

The table below shows estimates for all community property states combined and for California, the state for which we had the largest sample. In both cases, the aggregate dollar estimate is higher for women than for men; the frequency estimates are reasonably close. Based on these results, no further adjustments were made, although more research is needed in determining the characteristics of the mortality differential between the wealthy and the general population.

Community Property Estimates

(Amounts are in billions)

	Males		Females	
	Number	Amount	Number	Amount
All	270,000	\$741	266,000	\$949
Calif	157,000	\$472	158,000	\$584

- [3] It is interesting to note that the adjusted data base estimated that there were nearly 400 individuals with net worth greater than \$250 million, the *Forbes* 400 cut-off in 1989.
- [4] Additionally, there is a degree of uncertainty in the estimation of the various components of wealth (real estate, stock, bonds, etc.) due to errors introduced during data capture. These errors are, however, beyond the scope of this paper.

- [5] The Survey of Consumer Finances does not include any individuals with net worth greater than \$250 million. We therefore constrain the SOI estimates in the following comparison to the same upper bound.

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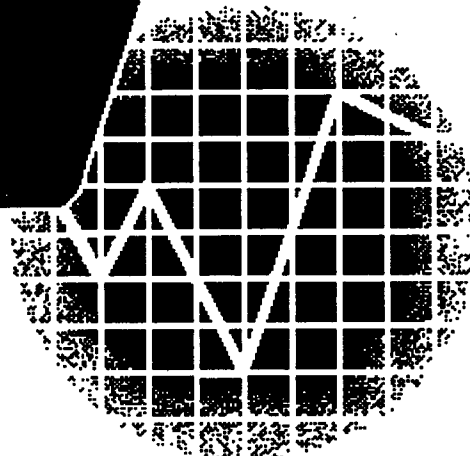
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Appendix



United States Estate (and Generation-Skipping Transfer) Tax Return

OMB No. 1545-0015
Expires 6-30-93

Department of the Treasury
Internal Revenue Service

Estate of a citizen or resident of the United States (see separate instructions). To be filed for decedents dying after October 9, 1990, and before January 1, 1993. For Paperwork Reduction Act Notice, see page 1 of the instructions.

1a Decedent's first name and middle initial (and maiden name, if any)	1b Decedent's last name	2 Decedent's social security no.	
3a Domicile at time of death (county and state, or foreign country)	3b Year domicile established	4 Date of birth	5 Date of death
6a Name of executor (see instructions)	6b Executor's address (number and street including apartment or suite no. or rural route; city, town, or post office; state; and ZIP code)		
6c Executor's social security number (see instructions)		7a Name and location of court where will was probated or estate administered	
		7b Case number	
8 If decedent died testate, check here <input type="checkbox"/> and attach a certified copy of the will. 9 If Form 4768 is attached, check here <input type="checkbox"/>			
10 If Schedule R-1 is attached, check here <input type="checkbox"/>			
1 Total gross estate (from Part 5, Recapitulation, page 3, item 10)	1		
2 Total allowable deductions (from Part 5, Recapitulation, page 3, item 20)	2		
3 Taxable estate (subtract line 2 from line 1)	3		
4 Adjusted taxable gifts (total taxable gifts (within the meaning of section 2503) made by the decedent after December 31, 1976, other than gifts that are includible in decedent's gross estate (section 2001(b)))	4		
5 Add lines 3 and 4	5		
6 Tentative tax on the amount on line 5 from Table A in the instructions	6		
7a If line 5 exceeds \$10,000,000, enter the lesser of line 5 or \$21,040,000. If line 5 is \$10,000,000 or less, skip lines 7a and 7b and enter -0- on line 7c.	7a		
b Subtract \$10,000,000 from line 7a	7b		
c Enter 5% (.05) of line 7b	7c		
8 Total tentative tax (add lines 6 and 7c)	8		
9 Total gift tax payable with respect to gifts made by the decedent after December 31, 1976. Include gift taxes by the decedent's spouse for such spouse's share of split gifts (section 2513) only if the decedent was the donor of these gifts and they are includible in the decedent's gross estate (see instructions)	9		
10 Gross estate tax (subtract line 9 from line 8)	10		
11 Maximum unified credit against estate tax	11	192,800	00
12 Adjustment to unified credit. (This adjustment may not exceed \$6,000. See instructions.)	12		
13 Allowable unified credit (subtract line 12 from line 11)	13		
14 Subtract line 13 from line 10 (but do not enter less than zero)	14		
15 Credit for state death taxes. Do not enter more than line 14. Compute the credit by using the amount on line 3 less \$60,000. See Table B in the instructions and attach credit evidence (see instructions)	15		
16 Subtract line 15 from line 14	16		
17 Credit for Federal gift taxes on pre-1977 gifts (section 2012) (attach computation)	17		
18 Credit for foreign death taxes (from Schedule(s) P). (Attach Form(s) 706CE)	18		
19 Credit for tax on prior transfers (from Schedule Q)	19		
20 Total (add lines 17, 18, and 19)	20		
21 Net estate tax (subtract line 20 from line 16)	21		
22 Generation-skipping transfer taxes (from Schedule R, Part 2, line 10)	22		
23 Section 4980A increased estate tax (from Schedule S, Part I, line 17) (see instructions)	23		
24 Total transfer taxes (add lines 21, 22, and 23)	24		
25 Prior payments. Explain in an attached statement	25		
26 United States Treasury bonds redeemed in payment of estate tax	26		
27 Total (add lines 25 and 26)	27		
28 Balance due (or overpayment) (subtract line 27 from line 24)	28		

Under penalties of perjury, I declare that I have examined this return, including accompanying schedules and statements, and to the best of my knowledge and belief, it is true, correct, and complete. Declaration of preparer other than the executor is based on all information of which preparer has any knowledge.

Signature(s) of executor(s) _____ Date _____

Signature of preparer other than executor _____ Address (and ZIP code) _____ Date _____
Cat. No. 20548R

Estate of:

Part 3.—Elections by the Executor

Please check the "Yes" or "No" box for each question.

	Yes	No
1 Do you elect alternate valuation?	<input type="checkbox"/>	<input type="checkbox"/>
2 Do you elect special use valuation? If "Yes," you must complete and attach Schedule A-1	<input checked="" type="checkbox"/>	<input type="checkbox"/>
3 Do you elect to pay the taxes in installments as described in section 6166? If "Yes," you must attach the additional information described in the instructions.	<input checked="" type="checkbox"/>	<input type="checkbox"/>
4 Do you elect to postpone the part of the taxes attributable to a reversionary or remainder interest as described in section 6163?	<input type="checkbox"/>	<input type="checkbox"/>

Part 4.—General Information (Note: Please attach the necessary supplemental documents. You must attach the death certificate.)

Authorization to receive confidential tax information under Regulations section 601.502(c)(3)(ii), to act as the estate's representative before the Internal Revenue Service, and to make written or oral presentations on behalf of the estate if return prepared by an attorney, accountant, or enrolled agent for the executor:

Name of representative (print or type) _____ State _____ Address (number, street, and room or suite no., city, state, and ZIP code) _____

I declare that I am the attorney/ accountant/ enrolled agent (you must check the applicable box) for the executor and prepared this return for the executor. I am not under suspension or disbarment from practice before the Internal Revenue Service and am qualified to practice in the state shown below.

Signature _____ CAF number _____ Date _____ Telephone number _____

1 Death certificate number and issuing authority (attach a copy of the death certificate to this return).

2 Decedent's business or occupation. If retired, check here and state decedent's former business or occupation.

3 Marital status of the decedent at time of death:

Married
 Widow or widower—Name, SSN, and date of death of deceased spouse ▶ _____

Single
 Legally separated
 Divorced—Date divorce decree became final ▶ _____

4a Surviving spouse's name _____ **4b** Social security number _____ **4c** Amount received (see instructions)

5 Individuals (other than the surviving spouse), trusts, or other estates who receive benefits from the estate (do not include charitable beneficiaries shown in Schedule O) (see instructions). For Privacy Act Notice (applicable to individual beneficiaries only), see the Instructions for Form 1040.

Name of individual, trust, or estate receiving \$5,000 or more	Identifying number	Relationship to decedent	Amount (see instructions)

All unascertainable beneficiaries and those who receive less than \$5,000 ▶ _____

Total _____

(Continued on next page)

Part 4.—General Information (continued)

Form with questions 6-16 regarding general information, including insurance, property ownership, and transfers. Includes 'Yes' and 'No' columns.

Part 5.—Recapitulation

Table for Recapitulation with columns for Item number, Gross estate, Alternate value, and Value at date of death. Includes sub-sections for Deductions and Total allowable deductions.

Estate of:

SCHEDULE A—Real Estate

(For jointly owned property that must be disclosed on Schedule E, see the instructions for Schedule E.) (Real estate that is part of a sole proprietorship should be shown on Schedule F. Real estate that is included in the gross estate under section 2035, 2036, 2037, or 2038 should be shown on Schedule G. Real estate that is included in the gross estate under section 2041 should be shown on Schedule H.) (If you elect section 2032A valuation, you must complete Schedule A and Schedule A-1.)

Table for Schedule A—Real Estate with columns for Item number, Description, Alternate valuation date, Alternate value, and Value at date of death. Includes a total line at the bottom.

(If more space is needed, attach the continuation schedule from the end of this package or additional sheets of the same size.) (See the instructions on the reverse side.)

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Instructions for Schedule A.— Real Estate

If the total gross estate contains any real estate, you must complete Schedule A and file it with the return. On Schedule A list real estate the decedent owned or had contracted to purchase. Number each parcel in the left-hand column.

Describe the real estate in enough detail so that the IRS can easily locate it for inspection and valuation. For each parcel of real estate, report the area and, if the parcel is improved, describe the improvements. For city or town property, report the street and number, ward, subdivision, block and lot, etc. For rural property, report the township, range, landmarks, etc.

If any item of real estate is subject to a mortgage for which the decedent's estate is liable, that is, if the indebtedness may be charged against other property of the estate that is not subject to that mortgage, or if the decedent was personally liable for that mortgage, you must report the full value of the property in the value column.

Enter the amount of the mortgage under "Description" on this schedule. The unpaid amount of the mortgage may be deducted on Schedule K. If the decedent's estate is NOT liable for the amount of the mortgage, report only the value of the equity of redemption (or value of the property less the indebtedness) in the value column as part of the gross estate. Do not enter any amount less than zero. Do not deduct the amount of indebtedness on Schedule K.

Also list on Schedule A real property the decedent contracted to purchase. Report the full value of the property and not the equity in the value column. Deduct the unpaid part of the purchase price on Schedule K.

Report the value of real estate without reducing it for homestead or other exemption, or the value of dower, curtesy, or a statutory estate created instead of dower or curtesy.

Explain how the reported values were determined and attach copies of any appraisals.

Schedule A Examples

In this example the alternate valuation is not adopted; the date of death is January 1, 1991.

Item number	Description	Alternate valuation date	Alternate value	Value at date of death
1	House and lot, 1921 William Street NW, Washington, DC (lot 6, square 481). Rent of \$2,700 due at end of each quarter, February 1, May 1, August 1, and November 1. Value based on appraisal, copy of which is attached.			108,000
	Rent due on item 1 for quarter ending November 1, 1990, but not collected at date of death.			2,700
	Rent accrued on item 1 for November and December 1990.			1,800
2	House and lot, 304 Jefferson Street, Alexandria, VA (lot 18, square 40). Rent of \$600 payable monthly. Value based on appraisal, copy of which is attached.			96,000
	Rent due on item 2 for December 1990, but not collected at date of death.			600

In this example alternate valuation is adopted; the date of death is January 1, 1991.

Item number	Description	Alternate valuation date	Alternate value	Value at date of death
1	House and lot, 1921 William Street NW, Washington, DC (lot 6, square 481). Rent of \$2,700 due at end of each quarter, February 1, May 1, August 1, and November 1. Value based on appraisal, copy of which is attached. Not disposed of within 6 months following death.	7/1/91	90,000	108,000
	Rent due on item 1 for quarter ending November 1, 1990, but not collected until February 1, 1991.	2/1/91	2,700	2,700
	Rent accrued on item 1 for November and December 1990, collected on February 1, 1991.	2/1/91	1,800	1,800
2	House and lot, 304 Jefferson Street, Alexandria, VA (lot 18, square 40). Rent of \$600 payable monthly. Value based on appraisal, copy of which is attached. Property exchanged for farm on May 1, 1991.	5/1/91	90,000	96,000
	Rent due on item 2 for December 1990, but not collected until February 1, 1991.	2/1/91	600	600

Checklist for Section 2032A Election—If you are going to make the special use valuation election on Schedule A-1, please use this checklist to ensure that you are providing everything necessary to make a valid election.

To have a valid special use valuation election under section 2032A, you must file, in addition to the Federal estate tax return, (a) a notice of election (Schedule A-1, Part 2), and (b) a fully executed agreement (Schedule A-1, Part 3). You must include certain information in the notice of election. To ensure that the notice of election includes all of the information required for a valid election, use the following checklist. The checklist is for your use only. Do not file it with the return.

1. Does the notice of election include the decedent's name and social security number as they appear on the estate tax return?

2. Does the notice of election include the relevant qualified use of the property to be specially valued?

3. Does the notice of election describe the items of real property shown on the estate tax return that are to be specially valued and identify the property by the Form 706 schedule and item number?

4. Does the notice of election include the fair market value of the real property to be specially valued and also include its value based on the qualified use (determined without the adjustments provided in section 2032A(b)(3)(B))?

5. Does the notice of election include the adjusted value (as defined in section 2032A(b)(3)(B)) of (a) all real property that both passes from the decedent and is used in a qualified use, without regard to whether it is to be specially valued, and (b) all real property to be specially valued?

6. Does the notice of election include (a) the items of personal property shown on the estate tax return that pass from the decedent to a qualified heir and that are used in qualified use and (b) the total value of such personal property adjusted under section 2032A(b)(3)(B)?

7. Does the notice of election include the adjusted value of the gross estate? (See section 2032A(b)(3)(A).)

8. Does the notice of election include the method used to determine the special use value?

9. Does the notice of election include copies of written appraisals of the fair market value of the real property?

10. Does the notice of election include a statement that the decedent and/or a member of his or her family has owned all of the specially valued property for at

least 5 years of the 8 years immediately preceding the date of the decedent's death?

11. Does the notice of election include a statement as to whether there were any periods during the 8-year period preceding the decedent's date of death during which the decedent or a member of his or her family (a) did not own the property to be specially valued, (b) use it in a qualified use, or (c) materially participate in the operation of the farm or other business? (See section 2032A(e)(6).)

12. Does the notice of election include, for each item of specially valued property, the name of every person taking an interest in that item of specially valued property and the following information about each such person: (a) the person's address, (b) the person's taxpayer identification number, (c) the person's relationship to the decedent, and (d) the value of the property interest passing to that person based on both fair market value and qualified use?

13. Does the notice of election include affidavits describing the activities constituting material participation and the identity of the material participants?

14. Does the notice of election include a legal description of each item of specially valued property?

(In the case of an election made for qualified woodlands, the information included in the notice of election must include the reason for entitlement to the woodlands election.)

Any election made under section 2032A will not be valid unless a property executed agreement (Schedule A-1, Part 3) is filed with the estate tax return. To ensure that the agreement satisfies the requirements for a valid election, use the following checklist.

1. Has the agreement been signed by each and every qualified heir having an interest in the property being specially valued?

2. Has every qualified heir expressed consent to personal liability under section 2032A(c) in the event of an early disposition or early cessation of qualified use?

3. Is the agreement that is actually signed by the qualified heirs in a form that is binding on all of the qualified heirs having an interest in the specially valued property?

4. Does the agreement designate an agent to act for the parties to the agreement in all dealings with the IRS on matters arising under section 2032A?

5. Has the agreement been signed by the designated agent and does it give the address of the agent?

Decedent's Social Security Number

Estate of:

SCHEDULE A-1—Section 2032A Valuation

Part 1.—Type of Election:

- Protective election (Regulations section 20.2032A-8(b)).—Complete Part 2, line 1, and column A of lines 3 and 4. (See instructions.)
Regular election.—Complete all of Part 2 (including line 11, if applicable) and Part 3. (See instructions.)

Part 2.—Notice of Election (Regulations section 20.2032A-8(a)(3))

Note: All real property entered on lines 2 and 3 must also be entered on Schedules A, E, F, G, or H, as applicable.

- 1 Qualified use—check one: Farm used for farming, or Trade or business other than farming
2 Real property used in a qualified use, passing to qualified heirs, and to be specially valued on this Form 706.

Table with 4 columns: A (Schedule and item number from Form 706), B (Full value without section 2032A(b)(3)(B) adjustment), C (Adjusted value with section 2032A(b)(3)(B) adjustment), D (Value based on qualified use without section 2032A(b)(3)(B) adjustment)

Totals
Attach a legal description of all property listed on line 2.
Attach copies of appraisals showing the column B values for all property listed on line 2.

3 Real property used in a qualified use, passing to qualified heirs, but not specially valued on this Form 706.

Table with 4 columns: A (Schedule and item number from Form 706), B (Full value without section 2032A(b)(3)(B) adjustment), C (Adjusted value with section 2032A(b)(3)(B) adjustment), D (Value based on qualified use without section 2032A(b)(3)(B) adjustment)

Totals
If you checked "Regular election," you must attach copies of appraisals showing the column B values for all property listed on line 3.

(Continued on next page)

4 Personal property used in a qualified use and passing to qualified heirs.

Table with 4 columns: A (Schedule and item number from Form 706), B (Adjusted value with section 2032A(b)(3)(B) adjustment), A (continued) (Schedule and item number from Form 706), B (continued) (Adjusted value with section 2032A(b)(3)(B) adjustment)

Subtotal Total adjusted value

5 Enter the value of the total gross estate as adjusted under section 2032A(b)(3)(A).

6 Attach a description of the method used to determine the special value based on qualified use.

7 Did the decedent and/or a member of his or her family own all property listed on line 2 for at least 5 of the 8 years immediately preceding the date of the decedent's death? Yes No

8 Were there any periods during the 8-year period preceding the date of the decedent's death during which the decedent or a member of his or her family:

- a Did not own the property listed on line 2 above?
b Did not use the property listed on line 2 above in a qualified use?
c Did not materially participate in the operation of the farm or other business within the meaning of section 2032A(e)(6)?

If "Yes" to any of the above, you must attach a statement listing the periods. If applicable, describe whether the exceptions of sections 2032A(b)(4) or (5) are met.

9 Attach affidavits describing the activities constituting material participation and the identity and relationship to the decedent of the material participants.

10 Persons holding interests. Enter the requested information for each party who received any interest in the specially valued property.

Table with columns: Name, Address, Identifying number, Relationship to decedent, Fair market value, Special use value

You must attach a computation of the GST tax savings attributable to direct skips for each person listed above who is a skip person. (See instructions.)

11 Woodlands election.—Check here if you wish to make a woodlands election as described in section 2032A(e)(13). Enter the Schedule and item numbers from Form 706 of the property for which you are making this election. You must attach a statement explaining why you are entitled to make this election. The IRS may issue regulations that require more information to substantiate this election. You will be notified by the IRS if you must supply further information.

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Part 3.—Agreement to Special Valuation Under Section 2032A.

Estate of: _____ Date of Death: _____ Decedent's Social Security Number: _____

We (list all qualified heirs and other persons having an interest in the property required to sign this agreement)

_____ being all the qualified heirs and _____

_____ being all other parties having interests in the property which is qualified real property and which is valued under section 2032A of the Internal Revenue Code, do hereby approve of the election made by _____

Executor/Administrator of the estate of _____ pursuant to section 2032A to value said property on the basis of the qualified use to which the property is devoted and do hereby enter into this agreement pursuant to section 2032A(d).

The undersigned agree and consent to the application of subsection (c) of section 2032A of the Code with respect to all the property described on line 2 of Part 2 of Schedule A-1 of Form 706, attached to this agreement. More specifically, the undersigned heirs expressly agree and consent to personal liability under subsection (c) of 2032A for the additional estate and GST taxes imposed by that subsection with respect to their respective interests in the above-described property in the event of certain early dispositions of the property or early cessation of the qualified use of the property. It is understood that if a qualified heir disposes of any interest in qualified real property to any member of his or her family, such member may thereafter be treated as the qualified heir with respect to such interest upon filing a Form 706-A and a new agreement.

The undersigned interested parties who are not qualified heirs consent to the collection of any additional estate and GST taxes imposed under section 2032A(c) of the Code from the specially valued property.

If there is a disposition of any interest which passes or has passed to him or her or if there is a cessation of the qualified use of any specially valued property which passes or passed to him or her, each of the undersigned heirs agrees to file a Form 706-A, United States Additional Estate Tax Return, and pay any additional estate and GST taxes due within 6 months of the disposition or cessation.

It is understood by all interested parties that this agreement is a condition precedent to the election of special use valuation under section 2032A of the Code and must be executed by every interested party even though that person may not have received the estate (or GST) tax benefits or be in possession of such property.

Each of the undersigned understands that by making this election, a lien will be created and recorded pursuant to section 6324B of the Code on the property referred to in this agreement for the adjusted tax differences with respect to the estate as defined in section 2032A(c)(2)(C).

As the interested parties, the undersigned designate the following individual as their agent for all dealings with the Internal Revenue Service concerning the continued qualification of the specially valued property under section 2032A of the Code and on all issues regarding the special lien under section 6324B. The agent is authorized to act for the parties with respect to all dealings with the Service on matters affecting the qualified real property described earlier. This authority includes the following:

- To receive confidential information on all matters relating to continued qualification under section 2032A of the specially valued real property and on all matters relating to the special lien arising under section 6324B.
- To furnish the Service with any requested information concerning the property.
- To notify the Service of any disposition or cessation of qualified use of any part of the property.
- To receive, but not to endorse and collect, checks in payment of any refund of Internal Revenue taxes, penalties, or interest.
- To execute waivers (including offers of waivers) of restrictions on assessment or collection of deficiencies in tax and waivers of notice of disallowance of a claim for credit or refund.
- To execute closing agreements under section 7121.
- Other acts (specify) ▶ _____

By signing this agreement, the agent agrees to provide the Service with any requested information concerning this property and to notify the Service of any disposition or cessation of the qualified use of any part of this property.

Name of Agent

Signature

Address

The property to which this agreement relates is listed in Form 706, United States Estate (and Generation-Skipping Transfer) Tax Return, and in the Notice of Election, along with its fair market value according to section 2031 of the Code and its special use value according to section 2032A. The name, address, social security number, and interest (including the value) of each of the undersigned in this property are as set forth in the attached Notice of Election.

IN WITNESS WHEREOF, the undersigned have hereunto set their hands at _____

this _____ day of _____

Qualified Heirs

Other Interested Parties

Instructions for Schedule A-1.—Section 2032A Valuation

The election to value certain farm and closely held business property at its special use value is made by checking "Yes" to line 2 of Part 3, Elections by the Executor, Form 706. Schedule A-1 is used to report the additional information that must be submitted to support this election. In order to make a valid election, you must complete Schedule A-1 and attach all of the required statements and appraisals.

For definitions and additional information concerning special use valuation, see section 2032A and the related regulations.

Part 1.—Type of Election

Estate and GST Tax Elections.—If you elect special use valuation for the estate tax, you must also elect special use valuation for the GST tax and vice versa.

You must value each specific property interest at the same value for GST tax purposes that you value it at for estate tax purposes.

Protective Election.—To make the protective election described in the separate instructions for line 2 of Part 3, Elections by the Executor, you must check this box, enter the decedent's name and social security number in the spaces provided at the top of Schedule A-1, and complete line 1 and column A of lines 3 and 4 of Part 2. For purposes of the protective election, list on line 3 all of the real property that passes to the qualified heirs even though some of the property will be shown on line 2 when the additional notice of election is subsequently filed. You need not complete columns B-D of lines 3 and 4. You need not complete any other line entries on Schedule A-1. Completing Schedule A-1 as described above constitutes a Notice of Protective Election as described in Regulations section 20.2032A-8(b).

Part 2.—Notice of Election

Line 10.—Because the special use valuation election creates a potential tax liability for the recapture tax of section 2032A(c), you must list each person who receives an interest in the specially valued property on Schedule A-1. If there are more than eight persons who receive interests, use an additional sheet that follows the format of line 10. In the columns "Fair market value" and "Special use value," you should enter the total respective values of all the specially valued property interests received by each person.

GST Tax Savings.—To compute the additional GST tax due upon disposition (or cessation of qualified use) of the property, each "skip person" (as defined in the instructions to Schedule R) who receives an interest in the specially valued property must know the total GST tax savings on all of the interests in specially valued property received. This GST tax savings is the difference between the total GST tax that was imposed on all of the interests in specially valued property received by the skip person valued at their special use value and the total GST tax that would have been imposed on the same interests received by the skip person had they been valued at their fair market value.

Because the GST tax depends on the executor's allocation of the GST exemption and the grandchild exclusion, the skip person who receives the interests is unable to compute this GST tax savings. Therefore, for each skip person who receives an interest in specially valued property, you must attach worksheets showing the total GST tax savings attributable to all of that person's interests in specially valued property.

How To Compute the GST Tax Savings.—Before computing each skip person's GST tax savings, you must complete Schedules R and R-1 for the entire estate (using the special use values).

For each skip person, you must complete two Schedules R (Parts 2 and 3 only) as worksheets, one showing the interests in specially valued property received by the skip person at their special use value and one showing the same interests at their fair market value.

If the skip person received interests in specially valued property that were shown on Schedule R-1, show these interests on the Schedule R, Parts 2 and 3 worksheets, as appropriate. Do not use Schedule R-1 as a worksheet.

Completing the Special Use Value Worksheets.—On lines 2-4 and 6, enter -0-.

Completing the Fair Market Value Worksheets.—Lines 2 and 3, fixed taxes and other charges.—If valuing the interests at their fair market value (instead of special use value) causes any of these taxes and charges to increase, enter the increased amount (only) on these lines and attach an explanation of the increase. Otherwise, enter -0-.

Line 6—GST exemption.—If you completed line 10 of Schedule R, Part 1, enter on line 6 the amount shown for the skip person on the line 10 special use allocation schedule you attached to Schedule R. If you did not complete line 10 of Schedule R, Part 1, enter -0- on line 6.

Total GST Tax Savings.—For each skip person, subtract the tax amount on line 10, Part 2 of the special use value worksheet from the tax amount on line 10, Part 2 of the fair market value worksheet. This difference is the skip person's total GST tax savings.

Part 3.—Agreement to Special Valuation Under Section 2032A

The agreement to special valuation by persons with an interest in property is required under section 2032A(a)(1)(B) and (d)(2) and must be signed by all parties who have any interest in the property being valued based on its qualified use as of the date of the decedent's death.

An interest in property is an interest that, as of the date of the decedent's death, can be asserted under applicable local law so as to affect the disposition of the specially valued property by the estate. Any person who at the decedent's death has any such interest in the property, whether present or future, or vested or contingent, must enter into the agreement. Included are owners of remainder and executory interests; the holders of general or special powers of appointment; beneficiaries of a gift over in default of exercise of any such power; joint tenants and holders of similar undivided interests when the decedent held only a joint or undivided interest in the property or when only an undivided interest is specially valued; and trustees of trusts and representatives of other entities holding title to, or holding any interests in the property. An heir who has the power under local law to caveat (challenge) a will and thereby affect disposition of the property is not, however, considered to be a person with an interest in property under section 2032A solely by reason of that right. Likewise, creditors of an estate are not such persons solely by reason of their status as creditors.

If any person required to enter into the agreement either desires that an agent act for him or her or cannot legally bind himself or herself due to infancy or other incompetency, or due to death before the election under section 2032A is timely exercised, a representative authorized by local law to bind the person in an agreement of this nature may sign the agreement on his or her behalf.

The Internal Revenue Service will contact the agent designated in the agreement on all matters relating to continued qualification under section 2032A of the specially valued real property and on all matters relating to the special lien arising under section 6324B. It is the duty of the agent as attorney-in-fact for the parties with interests in the specially valued property to furnish the IRS with any requested information and to notify the IRS of any disposition or cessation of qualified use of any part of the property.

Estate of:

SCHEDULE B—Stocks and Bonds

(For jointly owned property that must be disclosed on Schedule E, see the instructions for Schedule E.)

Item number	Description including face amount of bonds or number of shares and par value where needed for identification. Give CUSIP number if available.	Unit value	Alternate valuation date	Alternate value	Value at date of death
1					
Total from continuation schedule(s) (or additional sheet(s)) attached to this schedule.					
TOTAL. (Also enter on Part 5, Recapitulation, page 3, at item 2.)					

(If more space is needed, attach the continuation schedule from the end of this package or additional sheets of the same size.)
(The instructions to Schedule B are in the separate instructions.)

Estate of:

SCHEDULE C—Mortgages, Notes, and Cash

(For jointly owned property that must be disclosed on Schedule E, see the instructions for Schedule E.)

Item number	Description	Alternate valuation date	Alternate value	Value at date of death
1				
Total from continuation schedule(s) (or additional sheet(s)) attached to this schedule.				
TOTAL. (Also enter on Part 5, Recapitulation, page 3, at item 3.)				

(If more space is needed, attach the continuation schedule from the end of this package or additional sheets of the same size.)
(See the instructions on the reverse side.)

**Instructions for Schedule C—
Mortgages, Notes, and Cash**

If the total gross estate contains any mortgages, notes, or cash, you must complete Schedule C and file it with the return.

On Schedule C list mortgages and notes payable to the decedent at the time of death. (Mortgages and notes payable by the decedent should be listed (if deductible) on Schedule K. Also list on Schedule C cash the decedent had at the date of death.

Group the items in the following categories and list the categories in the following order:

1. Mortgages.—List: (a) the face value and unpaid balance; (b) date of mortgage; (c) date of maturity; (d) name of maker; (e) property mortgaged; and (f) interest dates and rate of interest. For example: bond and mortgage of \$50,000, unpaid balance \$24,000; dated January 1, 1980; John Doe to Richard Roe; premises 22 Clinton Street, Newark, N.J.; due January 1, 1992, interest payable at 10% a year January 1 and July 1.

2. Promissory notes.—Describe in the same way as mortgages.

3. Contract by the decedent to sell land.—List: (a) the name of the purchaser; (b) date of contract; (c) description of property; (d) sale price; (e) initial payment; (f) amounts of installment payment; (g) unpaid balance of principal; and (h) interest rate.

4. Cash in possession.—List separately from bank deposits.

5. Cash in banks, savings and loan associations, and other types of financial organizations.—List: (a) the name and address of each financial organization; (b) amount in each account; (c) serial number; and (d) nature of account, indicating whether checking, savings, time deposit, etc. If you obtain statements from the financial organizations, keep them for IRS inspection.

Estate of:

SCHEDULE D—Insurance on the Decedent's Life

You must attach a Form 712 for each policy.

Item number	Description	Alternate valuation date	Alternate value	Value at date of death
1				
Total from continuation schedule(s) (or additional sheet(s)) attached to this schedule				

TOTAL. (Also enter on Part 5, Recapitulation, page 3, at item 4.)
(If more space is needed, attach the continuation schedule from the end of this package or additional sheets of the same size.)
(See the instructions on the reverse side.)

Instructions for Schedule D.—Insurance on the Decedent's Life

If there was any insurance on the decedent's life, whether or not included in the gross estate, you must complete Schedule D and file it with the return.

Insurance you must include on Schedule D.—Under section 2042 you must include in the gross estate:

- Insurance on the decedent's life receivable by or for the benefit of the estate; and
- Insurance on the decedent's life receivable by beneficiaries other than the estate, as described below.

The term "insurance" refers to life insurance of every description, including death benefits paid by fraternal beneficiary societies operating under the lodge system, and death benefits paid under no-fault automobile insurance policies if the no-fault insurer was unconditionally bound to pay the benefit in the event of the insured's death.

Insurance in favor of the estate.—Include on Schedule D the full amount of the proceeds of insurance on the life of the decedent receivable by the executor or otherwise payable to or for the benefit of the estate. Insurance in favor of the estate includes insurance used to pay the estate tax, and any other taxes, debts, or charges that are enforceable against the estate. The manner in which the policy is drawn is immaterial as long as there is an obligation, legally binding on the beneficiary, to use the proceeds to pay taxes, debts, or charges. You must include the full amount even though the premiums or other consideration may have been paid by a person other than the decedent.

Insurance receivable by beneficiaries other than the estate.—Include on Schedule D the proceeds of all insurance on the life of the decedent not receivable by or for the benefit of the decedent's estate if the decedent possessed at death any of the incidents of ownership, exercisable either alone or in conjunction with any person.

Incidents of ownership in a policy include:

- The right of the insured or estate to its economic benefits;
- The power to change the beneficiary;

- The power to surrender or cancel the policy;
- The power to assign the policy or to revoke an assignment;
- The power to pledge the policy for a loan;
- The power to obtain from the insurer a loan against the surrender value of the policy;
- A reversionary interest if the value of the reversionary interest was more than 5% of the value of the policy immediately before the decedent died. (An interest in an insurance policy is considered a reversionary interest if, for example, the proceeds become payable to the insured's estate or payable as the insured directs if the beneficiary dies before the insured.)

Life insurance not includible in the gross estate under section 2042 may be includible under some other section of the Code. For example, a life insurance policy could be transferred by the decedent in such a way that it would be includible in the gross estate under section 2036, 2037, or 2038. (See the instructions to Schedule G for a description of these sections.)

Completing the Schedule

You must list every policy of insurance on the life of the decedent, whether or not it is included in the gross estate.

Under "Description" list:

- Name of the insurance company and
- Number of the policy.

For every policy of life insurance listed on the schedule, you must request a statement on Form 712, Life Insurance Statement, from the company that issued the policy. Attach the Form 712 to the back of Schedule D.

If the policy proceeds are paid in one sum, enter the net proceeds received (from Form 712, line 24) in the value (and alternate value) columns of Schedule D. If the policy proceeds are not paid in one sum, enter the value of the proceeds as of the date of the decedent's death (from Form 712, line 25).

If part or all of the policy proceeds are not included in the gross estate, you must explain why they were not included.

Estate of:

SCHEDULE E—Jointly Owned Property

(If you elect section 2032A valuation, you must complete Schedule E and Schedule A-1.)

PART 1.—Qualified Joint Interests—Interests Held by the Decedent and His or Her Spouse as the Only Joint Tenants (Section 2040(b)(2))

Item number	Description For securities, give CUSIP number, if available.	Alternate valuation date	Alternate value	Value at date of death
Total from continuation schedule(s) (or additional sheet(s)) attached to this schedule.				
1a Totals				
1b Amounts included in gross estate (one-half of line 1a)				

PART 2.—All Other Joint Interests

2a State the name and address of each surviving co-tenant. If there are more than three surviving co-tenants, list the additional co-tenants on an attached sheet.

Name	Address (number and street, city, state, and ZIP code)
A.	
B.	
C.	

Item number	Enter letter for co-tenant	Description (Including alternate valuation date if any) For securities, give CUSIP number, if available.	Percentage includible	Includible alternate value	Includible value at date of death
Total from continuation schedule(s) (or additional sheet(s)) attached to this schedule.					
2b Total other joint interests					

3 Total includible joint interests (add lines 1b and 2b). Also enter on Part 5, Recapitulation, page 3, at item 5.

(If more space is needed, attach the continuation schedule from the end of this package or additional sheets of the same size.) (See the instructions on the reverse side.)

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Instructions for Schedule E.—Jointly Owned Property

You must complete Schedule E and file it with the return if the decedent owned any joint property at the time of death, whether or not the decedent's interest is includible in the gross estate.

Enter on this schedule all property of whatever kind or character, whether real estate, personal property, or bank accounts, in which the decedent held at the time of death an interest either as a joint tenant with right to survivorship or as a tenant by the entirety.

Do not list on this schedule property that the decedent held as a tenant in common, but report the value of the interest on Schedule A if real estate, or on the appropriate schedule if personal property. Similarly, community property held by the decedent and spouse should be reported on the appropriate Schedules A through I. The decedent's interest in a partnership should not be entered on this schedule unless the partnership interest itself is jointly owned. Solely owned partnership interests should be reported on Schedule F, "Other Miscellaneous Property."

Part 1.—Qualified joint interests held by decedent and spouse.—Under section 2040(b)(2), a joint interest is a qualified joint interest if the decedent and the surviving spouse held the interest as:

- Tenants by the entirety, or
- Joint tenants with right of survivorship if the decedent and the decedent's spouse are the only joint tenants.

Interests that meet either of the two requirements above should be entered in Part 1. Joint interests that do not meet either of the two requirements above should be entered in Part 2.

Under "Description," describe the property as required in the instructions for Schedules A, B, C, and F for the type of property involved. For example, jointly held stocks and bonds should be described using the rules given in the instructions to Schedule B.

Under "Alternate value" and "Value at date of death," enter the full value of the property.

Note: You cannot claim the special treatment under section 2040(b) for property held jointly by a decedent and a surviving spouse who is not a U.S. citizen. You must report these joint interests on Part 2 of Schedule E, not Part 1.

Part 2.—Other joint interests.—All joint interests that were not entered in Part 1 must be entered in Part 2.

For each item of property, enter the appropriate letter A, B, C, etc., from line 2a to indicate the name and address of the surviving co-tenant.

Under "Description," describe the property as required in the instructions for Schedules A, B, C, and F for the type of property involved.

In the "Percentage includible" column, enter the percentage of the total value of the property that you intend to include in the gross estate.

Generally, you must include the full value of the jointly owned property in the gross estate. However, the full value should not be included if you can show that a part of the property originally belonged to the other tenant or tenants and was never received or acquired by the other tenant or tenants from the decedent for less than adequate and full consideration in money or money's worth, or unless you can show that any part of the property was acquired with consideration originally belonging to the surviving joint tenant or tenants. In this case, you may exclude from the value of the property an amount proportionate to the consideration furnished by the other tenant or tenants. Relinquishing or promising to relinquish dower, curtesy, or statutory estate created instead of dower or curtesy, or other marital rights in the decedent's property or estate is not consideration in money or money's worth. See the Schedule A instructions for the value to show for real property that is subject to a mortgage.

If the property was acquired by the decedent and another person or persons by gift, bequest, devise, or inheritance as joint tenants, and their interests are not otherwise specified by law, include only that part of the value of the property that is figured by dividing the full value of the property by the number of joint tenants.

If you believe that less than the full value of the entire property is includible in the gross estate for tax purposes, you must establish the right to include the smaller value by attaching proof of the extent, origin, and nature of the decedent's interest and the interest(s) of the decedent's co-tenant or co-tenants.

In the "Includible alternate value" and "Includible value at date of death" columns, you should enter only the values that you believe are includible in the gross estate.

Estate of:

SCHEDULE F—Other Miscellaneous Property Not Reportable Under Any Other Schedule

(For jointly owned property that must be disclosed on Schedule E, see the instructions for Schedule E.)
(If you elect section 2032A valuation, you must complete Schedule F and Schedule A-1.)

- | | Yes | No |
|---|-----|----|
| 1 Did the decedent at the time of death own any articles of artistic or collectible value in excess of \$3,000 or any collections whose artistic or collectible value combined at date of death exceeded \$10,000?
If "Yes," submit full details on this schedule. | | |
| 2 Has the decedent's estate, spouse, or any other person, received (or will receive) any bonus or award as a result of the decedent's employment or death?
If "Yes," submit full details on this schedule. | | |
| 3 Did the decedent at the time of death have, or have access to, a safe deposit box?
If "Yes," state location, and if held in joint names of decedent and another, state name and relationship of joint depositor. | | |

If any of the contents of the safe deposit box are omitted from the schedules in this return, explain fully why omitted.

Item number	Description For securities, give CUSIP number, if available.	Alternate valuation date	Alternate value	Value at date of death
1				
Total from continuation schedule(s) (or additional sheet(s)) attached to this schedule.				
TOTAL. (Also enter on Part 5; Recapitulation, page 3, at item 6.)				

(If more space is needed, attach the continuation schedule from the end of this package or additional sheets of the same size.)
(See the instructions on the reverse side.)

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Instructions for Schedule F.—Other Miscellaneous Property

You must complete Schedule F and file it with the return.

On Schedule F list all items that must be included in the gross estate that are not reported on any other schedule, including:

- Debts due the decedent (other than notes and mortgages included on Schedule C)
- Interests in business
- Insurance on the life of another (obtain and attach Form 712, Life Insurance Statement, for each policy)

Note for single premium or paid-up policies: In certain situations, for example where the surrender value of the policy exceeds its replacement cost, the true economic value of the policy will be greater than the amount shown on line 56 of Form 712. In these situations, you should report the full economic value of the policy on Schedule F. See Rev. Rul. 78-137, 1978-1 C.B. 280 for details.

- Section 2044 property
- Claims (including the value of the decedent's interest in a claim for refund of income taxes or the amount of the refund actually received)
- Rights
- Royalties
- Leaseholds
- Judgments
- Reversionary or remainder interests
- Shares in trust funds (attach a copy of the trust instrument)

- Household goods and personal effects, including wearing apparel
- Farm products and growing crops
- Livestock
- Farm machinery
- Automobiles

If the decedent owned any interest in a partnership or unincorporated business, attach a statement of assets and liabilities for the valuation date and for the 5 years before the valuation date. Also attach statements of the net earnings for the same 5 years. You must account for goodwill in the valuation. In general, furnish the same information and follow the methods used to value close corporations. See the instructions for Schedule B.

All partnership interests should be reported on Schedule F unless the partnership interest, itself, is jointly owned. Jointly owned partnership interests should be reported on Schedule E.

If real estate is owned by the sole proprietorship, it should be reported on Schedule F and not on Schedule A. Describe the real estate with the same detail required for Schedule A.

Line 1.—If the decedent owned at the date of death articles with artistic or intrinsic value (e.g., jewelry, furs, silverware, books, statuary, vases, oriental rugs, coin or stamp collections), check the "Yes" box on line 1 and provide full details. If any one article is valued at more than \$3,000, or any collection of similar articles is valued at more than \$10,000, attach an appraisal by an expert under oath and the required statement regarding the appraiser's qualifications (see Regulations section 20.2031-6(b)).

Estate of:

SCHEDULE G—Transfers During Decedent's Life

(If you elect section 2032A valuation, you must complete Schedule G and Schedule A-1.)

Item number	Description For securities, give CUSIP number, if available.	Alternate valuation date	Alternate value	Value at date of death
A.	Gift tax paid by the decedent or the estate for all gifts made by the decedent or his or her spouse within 3 years before the decedent's death (section 2035(c))	X X X X X		
B.	Transfers includible under section 2035(a), 2036, 2037, or 2038:			
1				
Total from continuation schedule(s) (or additional sheet(s)) attached to this schedule				
TOTAL. (Also enter on Part 5, Recapitulation, page 3, at item 7.)				

SCHEDULE H—Powers of Appointment

(If you elect section 2032A valuation, you must complete Schedule H and Schedule A-1.)

Item number	Description	Alternate valuation date	Alternate value	Value at date of death
1				
Total from continuation schedule(s) (or additional sheet(s)) attached to this schedule				
TOTAL. (Also enter on Part 5, Recapitulation, page 3, at item 8.)				

(If more space is needed, attach the continuation schedule from the end of this package or additional sheets of the same size.)
(The instructions to Schedules G and H are in the separate instructions.)

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Estate of:

SCHEDULE I—Annuities

Note: Generally, no exclusion is allowed for the estates of decedents dying after December 31, 1984 (see instructions).

A Are you excluding from the decedent's gross estate the value of a lump-sum distribution described in section 2039(f)(2)? Yes No
 If "Yes," you must attach the information required by the instructions.

Item number	Description Show the entire value of the annuity before any exclusions.	Alternate valuation date	Includible alternate value	Includible value at date of death
1				
Total from continuation schedule(s) (or additional sheet(s)) attached to this schedule				

TOTAL. (Also enter on Part 5, Recapitulation, page 3, at item 9.)
 (If more space is needed, attach the continuation schedule from the end of this package or additional sheets of the same size.)
 (The instructions to Schedule I are in the separate instructions.)

Estate of:

SCHEDULE J—Funeral Expenses and Expenses Incurred in Administering Property Subject to Claims

Note: Do not list on this schedule expenses of administering property not subject to claims. For those expenses, see the instructions for Schedule L.

If executors' commissions, attorney fees, etc., are claimed and allowed as a deduction for estate tax purposes, they are not allowable as a deduction in computing the taxable income of the estate for Federal income tax purposes. They are allowable as an income tax deduction on Form 1041 if a waiver is filed to waive the deduction on Form 706 (see the Form 1041 instructions).

Item number	Description	Expense amount	Total Amount
A. Funeral expenses:			
1			
Total funeral expenses			
B. Administration expenses:			
1	Executors' commissions—amount estimated/agreed upon/paid. (Strike out the words that do not apply.)		
2	Attorney fees—amount estimated/agreed upon/paid. (Strike out the words that do not apply.)		
3	Accountant fees—amount estimated/agreed upon/paid. (Strike out the words that do not apply.)		
4	Miscellaneous expenses:	Expense amount	
Total miscellaneous expenses from continuation schedule(s) (or additional sheet(s)) attached to this schedule			
Total miscellaneous expenses			

TOTAL. (Also enter on Part 5, Recapitulation, page 3, at item 11.)
 (If more space is needed, attach the continuation schedule from the end of this package or additional sheets of the same size.)
 (See the instructions on the reverse side.)

**Instructions for Schedule J.—
Funeral Expenses and Expenses Incurred
in Administering Property Subject to
Claims**

General.—You must complete and file Schedule J if you claim a deduction on item 11 of Part 5, Recapitulation.

On Schedule J itemize funeral expenses and expenses incurred in administering property subject to claims. List the names and addresses of persons to whom the expenses are payable and describe the nature of the expense. **Do not list expenses incurred in administering property not subject to claims on this schedule. List them on Schedule L instead.**

Funeral Expenses.—Itemize funeral expenses on line A. Deduct from the expenses any amounts that were reimbursed, such as death benefits payable by the Social Security Administration and the Veterans Administration.

Executors' Commissions.—When you file the return, you may deduct commissions that have actually been paid to you or that you expect will be paid. You may not deduct commissions if none will be collected. If the amount of the commissions has not been fixed by decree of the proper court, the deduction will be allowed on the final examination of the return, provided that:

- The District Director is reasonably satisfied that the commissions claimed will be paid;
- The amount entered as a deduction is within the amount allowable by the laws of the jurisdiction where the estate is being administered;
- It is in accordance with the usually accepted practice in that jurisdiction for estates of similar size and character.

If you have not been paid the commissions claimed at the time of the final examination of the return, you must support the amount you deducted with an

affidavit or statement signed under the penalties of perjury that the amount has been agreed upon and will be paid.

You may not deduct a bequest or devise made to you instead of commissions. If, however, the decedent fixed by will the compensation payable to you for services to be rendered in the administration of the estate, you may deduct this amount to the extent it is not more than the compensation allowable by the local law or practice.

Do not deduct on this schedule amounts paid as trustees' commissions whether received by you acting in the capacity of a trustee or by a separate trustee. If such amounts were paid in administering property not subject to claims, deduct them on Schedule L.

Note: *Executors' commissions are taxable income to the executors. Therefore, be sure to include them as income on your individual income tax return.*

Attorney Fees.—Enter the amount of attorney fees that have actually been paid or that you reasonably expect to be paid. If on the final examination of the return the fees claimed have not been awarded by the proper court and paid, the deduction will be allowed provided the District Director is reasonably satisfied that the amount claimed will be paid and that it does not exceed a reasonable payment for the services performed, taking into account the size and character of the estate and the local law and practice. If the fees claimed have not been paid at the time of final examination of the return, the amount deducted must be supported by an affidavit, or statement signed under the penalties of perjury, by the executor or the attorney stating that the amount has been agreed upon and will be paid.

Do not deduct attorney fees incidental to litigation incurred by the beneficiaries. These expenses are charged against the beneficiaries personally and are not administration expenses authorized by the Code.

Estate of:

SCHEDULE K—Debts of the Decedent, and Mortgages and Liens

Item number	Debts of the Decedent—Creditor and nature of claim, and allowable death taxes	Amount unpaid to date	Amount in contest	Amount claimed as a deduction
1				

Total from continuation schedule(s) (or additional sheet(s)) attached to this schedule

TOTAL. (Also enter on Part 5, Recapitulation, page 3, at item 12.)

Item number	Mortgages and Liens—Description	Amount
1		

Total from continuation schedule(s) (or additional sheet(s)) attached to this schedule

TOTAL. (Also enter on Part 5, Recapitulation, page 3, at item 13.)

(If more space is needed, attach the continuation schedule from the end of this package or additional sheets of the same size.)
(The instructions to Schedule K are in the separate instructions.)

Estate of:

SCHEDULE L—Net Losses During Administration and Expenses Incurred in Administering Property Not Subject to Claims

Item number	Net losses during administration (Note: Do not deduct losses claimed on a Federal income tax return.)	Amount
1		
Total from continuation schedule(s) (or additional sheet(s)) attached to this schedule		
TOTAL. (Also enter on Part 5, Recapitulation, page 3, at item 16.)		
Item number	Expenses incurred in administering property not subject to claims (Indicate whether estimated, agreed upon, or paid.)	Amount
1		
Total from continuation schedule(s) (or additional sheet(s)) attached to this schedule		
TOTAL. (Also enter on Part 5, Recapitulation, page 3, at item 17.)		

(If more space is needed, attach the continuation schedule from the end of this package or additional sheets of the same size.)
(The instructions to Schedule L are in the separate instructions.)

Estate of:

SCHEDULE M—Bequests, etc., to Surviving Spouse

Election To Deduct Qualified Terminable Interest Property Under Section 2056(b)(7).—If a trust (or other property) meets the requirements of qualified terminable interest property under section 2056(b)(7), and

- a. the trust or other property is listed on Schedule M, and
- b. the value of the trust (or other property) is entered in whole or in part as a deduction on Schedule M,

then (unless the executor specifically identifies property to be excluded from the election) the executor shall be deemed to have made an election to have such trust (or other property) treated as qualified terminable interest property under section 2056(b)(7).

If less than the entire value of the trust (or other property) that the executor has included in the gross estate is entered as a deduction on Schedule M, the executor shall be considered to have made an election only as to a fraction of the trust (or other property). The numerator of this fraction is equal to the amount of the trust (or other property) deducted on Schedule M. The denominator is equal to the total value of the trust (or other property).

	Yes	No
c. Did any property pass to the surviving spouse as a result of a qualified disclaimer? If "Yes," attach a copy of the written disclaimer required by section 2518(b).		
2a. In what country was the surviving spouse born? _____		
b. What is the surviving spouse's date of birth? _____		
c. Is the surviving spouse a U.S. citizen?		
d. If the surviving spouse is a naturalized citizen, when did the surviving spouse acquire citizenship? _____		
e. If the surviving spouse is not a U.S. citizen, of what country is the surviving spouse a citizen? _____		
3. Qualified Domestic Trust.—Do you elect under section 2056A(d) to treat any trusts reported on Schedule M as qualified domestic trusts? (Identify in the description column on Schedule M below the trusts to which the QDT election applies) (see instructions).		
4. Election out of QTIP Treatment of Annuities.—Do you elect under section 2056(b)(7)(C)(ii) not to treat as qualified terminable interest property any joint and survivor annuities that are included in the gross estate and would otherwise be treated as qualified terminable interest property under section 2056(b)(7)(C)? (see instructions)		

Item number	Description of property interests passing to surviving spouse	Amount
1		
Total from continuation schedule(s) (or additional sheet(s)) attached to this schedule		
5	Total amount of property interests listed on Schedule M	5
6a	Federal estate taxes (including section 4980A taxes) payable out of property interests listed on Schedule M	
6b	Other death taxes payable out of property interests listed on Schedule M	
6c	Federal and state GST taxes payable out of property interests listed on Schedule M	
6d	Add items a, b, and c	6d
7	Net amount of property interests listed on Schedule M (subtract 6d from 5). Also enter on Part 5, Recapitulation, page 3, at item 18	7

(If more space is needed, attach the continuation schedule from the end of this package or additional sheets of the same size.)

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Examples of Listing of Property Interests on Schedule M

Item number	Description of property interests passing to surviving spouse	Amount
1	One-half the value of a house and lot, 256 South West Street, held by decedent and surviving spouse as joint tenants with right of survivorship under deed dated July 15, 1937 (Schedule E, Part I, item 1)	\$ 32,500
2	Proceeds of Gibraltar Life Insurance Company policy No. 104729, payable in one sum to surviving spouse (Schedule D, item 3)	20,000
3	Cash bequest under Paragraph Six of will	100,000

Instructions for Schedule M.—Bequests, etc., to Surviving Spouse (Marital Deduction)

General.—You must complete Schedule M and file it with the return; if you claim a deduction on item 18 of Part 5, Recapitulation.

The marital deduction is authorized by section 2056 for certain property interests that pass from the decedent to the surviving spouse. You may claim the deduction only for property interests that are included in the decedent's gross estate (Schedules A through I).

Note: The marital deduction is generally not allowed if the surviving spouse is not a U.S. citizen. The marital deduction is allowed for property passing to such a surviving spouse in a "qualified domestic trust" or if such property is transferred or irrevocably assigned to such a trust before the estate tax return is filed. The executor must elect qualified domestic trust status on this return. See the instructions for line 3 on the following page for details on the election.

Line 1.—If property passes to the surviving spouse as the result of a qualified disclaimer, check "Yes" and attach a copy of the written disclaimer required by section 2518(b).

Property interests that you may list on Schedule M.—Generally, you may list on Schedule M all property interests that pass from the decedent to the surviving spouse and are included in the gross estate. However, you should not list any "Nondeductible terminable interests" (described below) on Schedule M unless you are making a QTIP election. The property for which you make this election must be included on Schedule M. See "Qualified Terminable Interest Property" on the following page.

For the rules on common disaster and survival for a limited period, see section 2056(b)(3).

You may list on Schedule M only those interests that the surviving spouse takes:

- As the decedent's legatee, devisee, heir, or donee;
- As the decedent's surviving tenant by the entirety or joint tenant;
- As an appointee under the decedent's exercise of a power or as a taker in default at the decedent's nonexercise of a power;

4. As a beneficiary of insurance on the decedent's life;

5. As the surviving spouse taking under dower or curtesy (or similar statutory interest); and

6. As a transferee of a transfer made by the decedent at any time.

Property interests that you may not list on Schedule M.—You should not list on Schedule M:

1. The value of any property that does not pass from the decedent to the surviving spouse.

2. Property interests that are not included in the decedent's gross estate.

3. The full value of a property interest for which a deduction was claimed on Schedules J through L. The value of the property interest should be reduced by the deductions claimed with respect to it.

4. The full value of a property interest that passes to the surviving spouse subject to a mortgage or other encumbrance or an obligation of the surviving spouse. Include on Schedule M only the net value of the interest after reducing it by the amount of the mortgage or other debt.

5. Nondeductible terminable interests (described below).

6. Any property interest disclaimed by the surviving spouse.

Terminable interests.—Certain interests in property passing from a decedent to a surviving spouse are referred to as *terminable interests*. These are interests that will terminate or fail after the passage of time, or on the occurrence or nonoccurrence of some contingency. Examples are: life estates, annuities, estates for terms of years, and patents.

The ownership of a bond, note, or other contractual obligation, which when discharged would not have the effect of an annuity for life or for a term, is not considered a terminable interest.

Nondeductible terminable interests.—A terminable interest is *nondeductible*, and should not be entered on Schedule M (unless you are making a QTIP election) if:

1. Another interest in the same property passed from the decedent to some other person for less than adequate and full consideration in money or money's worth; and

2. By reason of its passing, the other person or that person's heirs may enjoy

part of the property after the termination of the surviving spouse's interest.

This rule applies even though the interest that passes from the decedent to a person other than the surviving spouse is not included in the gross estate, and regardless of when the interest passes. The rule also applies regardless of whether the surviving spouse's interest and the other person's interest pass from the decedent at the same time. Property interests that are considered to pass to a person other than the surviving spouse are any property interest that: (a) passes under a decedent's will or intestacy; (b) was transferred by a decedent during life; or (c) is held by or passed on to any person as a decedent's joint tenant, as appointee under a decedent's exercise of a power, as taker in default at a decedent's release or nonexercise of a power, or as a beneficiary of insurance in the decedent's life.

For example, a decedent devised real property to his wife for life, with remainder to his children. The life interest that passed to the wife does not qualify for the marital deduction because it will terminate at her death and the children will thereafter possess or enjoy the property.

However, if the decedent purchased a joint and survivor annuity for himself and his wife who survived him, the value of the survivor's annuity, to the extent that it is included in the gross estate, qualifies for the marital deduction because even though the interest will terminate on the wife's death, no one else will possess or enjoy any part of the property.

The marital deduction is not allowed for an interest that the decedent directed the executor or a trustee to convert, after death, into a terminable interest for the surviving spouse. The marital deduction is not allowed for such an interest even if there was no interest in the property passing to another person and even if the terminable interest would otherwise have been deductible under the exceptions described on the following page for life estate and life insurance and annuity payments with powers of appointment. For more information, see Regulations sections 20.2056(b)-1(f) and 20.2056(b)-1(g), Example (7).

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If any property interest passing from the decedent to the surviving spouse may be paid or otherwise satisfied out of any of a group of assets, the entry on the property interest is, for the entry on Schedule M, reduced by the value of any asset or assets that, if passing from the decedent to the surviving spouse, would be nondeductible terminable interests. Examples of property interests that may be paid or otherwise satisfied out of any of a group of assets are a bequest of the residue of the decedent's estate, or of a share of the residue, and a cash legacy payable out of the general estate.

Example: A decedent bequeathed \$100,000 to the surviving spouse. The general estate includes a term for years (valued at \$10,000 in determining the value of the gross estate) in an office building, which interest was retained by the decedent under a deed of the building by gift to a son. Accordingly, the value of the specific bequest entered on Schedule M is \$90,000.

Life Estate With Power of Appointment in the Surviving Spouse.—A property interest, whether or not in trust, will be treated as passing to the surviving spouse, and will not be treated as a nondeductible terminable interest if: (a) the surviving spouse is entitled for life to all of the income from the entire interest; (b) the income is payable annually or at more frequent intervals; (c) the surviving spouse has the power, exercisable in favor of the surviving spouse or the estate of the surviving spouse, to appoint the entire interest; (d) the power is exercisable by the surviving spouse alone and (whether exercisable by will or during life) is exercisable by the surviving spouse in all events; and (e) no part of the entire interest is subject to a power in any other person to appoint any part to any person other than the surviving spouse (or the surviving spouse's legal representative or relative if the surviving spouse is disabled. See Rev. Rul. 85-35 1985-1 C.B. 328). If these five conditions are satisfied only for a specific portion of the entire interest, see the section 2056(b) regulations to determine the amount of the marital deduction.

Life Insurance, Endowment, or Annuity Payments, With Power of Appointment in Surviving Spouse.—A property interest consisting of the entire proceeds under a life insurance, endowment, or annuity contract is treated as passing from the decedent to the surviving spouse, and will not be treated as a nondeductible terminable interest if: (a) the surviving spouse is entitled to receive the proceeds in installments, or is entitled to interest on them, with all amounts payable during the life of the spouse, payable only to the surviving spouse; (b) the installment or interest

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payments are payable annually, or more frequently, beginning not later than 13 months after the decedent's death; (c) the surviving spouse has the power, exercisable in favor of the surviving spouse or of the estate of the surviving spouse, to appoint all amounts payable under the contract; (d) the power is exercisable by the surviving spouse alone and (whether exercisable by will or during life) is exercisable by the surviving spouse in all events; and (e) no part of the amount payable under the contract is subject to a power in any other person to appoint any part to any person other than the surviving spouse. If these five conditions are satisfied only for a specific portion of the proceeds, see the section 2056(b) regulations to determine the amount of the marital deduction.

Charitable Remainder Trusts.—An interest in a charitable remainder trust will not be treated as a nondeductible terminable interest if:

1. The interest in the trust passes from the decedent to the surviving spouse; and

2. The surviving spouse is the only beneficiary of the trust other than charitable organizations described in section 170(c).

A "charitable remainder trust" is either a charitable remainder annuity trust or a charitable remainder unitrust. (See section 664 for descriptions of these trusts.)

Election To Deduct Qualified Terminable Interests (QTIP).—You may elect to claim a marital deduction for qualified terminable interest property or property interests. You make the QTIP election simply by listing the qualified terminable interest property on Schedule M and deducting its value. You are presumed to have made the QTIP election if you list the property and deduct its value on Schedule M. If you make this election, the surviving spouse's gross estate will include the value of the "qualified terminable interest property." See the instructions for line 6 of General Information for more details. **The election is irrevocable.**

If you file a Form 706 in which you do not make this election, you may not file an amended return to make the election unless you file the amended return on or before the due date for filing the original Form 706.

The effect of the election is that the property (interest) will be treated as passing to the surviving spouse and will not be treated as a nondeductible terminable interest. All of the other marital deduction requirements must still be satisfied before you may make this election. For example, you may not make this election for property or property interests that are not included in the decedent's gross estate.

Qualified Terminable Interest Property is property (a) that passes from the decedent, and (b) in which the surviving spouse has a qualifying income interest for life.

The surviving spouse has a *qualifying income interest for life* if the surviving spouse is entitled to all of the income from the property payable annually or at more frequent intervals, or has a usufruct interest for life in the property, and during the surviving spouse's lifetime no person has a power to appoint any part of the property to any person other than the surviving spouse. An annuity is treated as an income interest regardless of whether the property from which the annuity is payable can be separately identified.

The QTIP election may be made for all or any part of a qualified terminable interest property. A partial election must relate to a fractional or percentile share of the property so that the elective part will reflect its proportionate share of the increase or decline in the whole of the property when applying sections 2044 or 2519. Thus, if the interest of the surviving spouse in a trust (or other property in which the spouse has a qualified life estate) is qualified terminable interest property, you may make an election for a part of the trust (or other property) only if the election relates to a defined fraction or percentage of the entire trust (or other property). The fraction or percentage may be defined by means of a formula.

Line 3.—Qualified Domestic Trust Election.—The marital deduction is allowed for transfers to a surviving spouse who is not a U.S. citizen only if the property passes to the surviving spouse in a "qualified domestic trust" (QDT) or if such property is transferred or irrevocably assigned to a QDT before the decedent's estate tax return is filed.

A QDT is any trust:

- That requires at least one trustee to be either an individual who is a citizen of the U.S. or a domestic corporation;
- That requires that no distribution of corpus from the trust can be made unless such a trustee has the right to withhold from the distribution the tax imposed on the QDT;
- That meets the requirements of any applicable regulations; and
- For which the executor has made an election on the estate tax return of the decedent.

To make the election, you must answer "Yes" to the question on line 3. **Once made, the election is irrevocable.**

When listing property on Schedule M, identify that property for which the QDT election has been made. Include the employer identification number for each trust and the names and addresses of all trustees.

The determination of whether a trust qualifies as a QDT will be made as of the date the decedent's Form 706 is filed. If, however, judicial proceedings are brought before the Form 706's due date (including extensions) to have the trust revised to meet the QDT requirements, then the determination will not be made until the court ordered changes to the trust are made.

Line 4.—Section 2056(b)(7) creates an automatic QTIP election for certain joint and survivor annuities that are includible in the estate under section 2039. To qualify, only the surviving spouse can have the right to receive payments before the death of the surviving spouse.

The executor can elect out of QTIP treatment, however, by checking the "Yes" box on line 4. Once made, the election is irrevocable. If there is more than one such joint and survivor annuity, you are not required to make the election for all of them.

If you make the election out of QTIP treatment by checking "Yes" on line 4, you cannot deduct the amount of the annuity on Schedule M. If you do not make the election out, you must list the joint and survivor annuities on Schedule M.

How To Complete Schedule M.—List each property interest included in the gross estate that passes from the decedent to the surviving spouse and for which a marital deduction is claimed. This includes otherwise nondeductible terminable interest property for which

you are making a QTIP election. Number each item in sequence and describe each item in detail. Describe the instrument (including any clause or paragraph number) or provision of law under which each item passed to the surviving spouse. If possible, show where each item appears (number and schedule) on Schedules A through I.

Enter the value of each interest before taking into account the Federal estate tax or any other death tax. The valuation dates used in determining the value of the gross estate apply also on Schedule M.

If Schedule M includes a bequest of the residue or a part of the residue of the decedent's estate, attach a copy of the computation showing how the value of the residue was determined. Include a statement showing:

- The value of all property that is included in the decedent's gross estate (Schedules A through I) but is not a part of the decedent's probate estate, such as lifetime transfers, jointly owned property that passed to the survivor on decedent's death, and the insurance payable to specific beneficiaries.

- The values of all specific and general legacies or devises, with reference to the applicable clause or paragraph of the decedent's will or codicil. (If legacies are made to each member of a class, for example, \$1,000 to each of decedent's employees, only the number in each

class and the total value of property received by them need be furnished.)

- The date of birth of all persons, the length of whose lives may affect the value of the residuary interest passing to the surviving spouse.

- Any other important information such as that relating to any claim to any part of the estate not arising under the will.

Lines 6a, b, and c.—The total of the values listed on Schedule M must be reduced by the amount of the Federal estate tax, the Federal GST tax, and the amount of state or other death and GST taxes paid out of the property interest involved. If you enter an amount for state or other death or GST taxes on lines 6b or 6c, identify the taxes and attach your computation of them. For additional information, see Pub. 904, *Interrelated Computations for Estate and Gift Taxes*.

Attachments.—If you list property interests passing by the decedent's will on Schedule M, attach a certified copy of the order admitting the will to probate. If, when you file the return, the court of probate jurisdiction has entered any decree interpreting the will or any of its provisions affecting any of the interests listed on Schedule M, or has entered any order of distribution, attach a copy of the decree or order. In addition, the District Director may request other evidence to support the marital deduction claimed.

Estate of:

SCHEDULE O—Charitable, Public, and Similar Gifts and Bequests

	Yes	No
1a If the transfer was made by will, has any action been instituted to have interpreted or to contest the will or any of its provisions affecting the charitable deductions claimed in this schedule? If "Yes," full details must be submitted with this schedule.		
b According to the information and belief of the person or persons filing this return, is any such action planned? If "Yes," full details must be submitted with this schedule.		
2 Did any property pass to charity as the result of a qualified disclaimer? If "Yes," attach a copy of the written disclaimer required by section 2518(b).		

Item number	Name and address of beneficiary	Character of institution	Amount
1			

Total from continuation schedule(s) (or additional sheet(s)) attached to this schedule			
3 Total			3
4a Federal estate tax (including section 4980A taxes) payable out of property interests listed above			
4b Other death taxes payable out of property interests listed above			
4c Federal and state GST taxes payable out of property interests listed above			
4d Add items a, b, and c.			4d
5 Net value of property interests listed above (subtract 4d from 3). Also enter on Part 5, Recapitulation, page 3, at item 19			5

(If more space is needed, attach the continuation schedule from the end of this package or additional sheets of the same size.) (The instructions to Schedule O are in the separate instructions.)

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Estate of: _____

SCHEDULE S—Increased Estate Tax on Excess Retirement Accumulations

(Under section 4980A(d) of the Internal Revenue Code)

Part I Tax Computation

- Check this box if a section 4980A(d)(5) spousal election is being made. You must attach the statement described in the instructions.
- Enter the name and employer identification number (EIN) of each qualified employer plan and individual retirement account in which the decedent had an interest at the time of death:

	Name	EIN
Plan #1		
Plan #2		
Plan #3		
IRA #1		
IRA #2		
IRA #3		

	A Plan #1	B Plan #2	C Plan #3	D All IRAs
3 Value of decedent's interest				
4 Amounts rolled over after death				
5 Total value (add lines 3 and 4)				
6 Amounts payable to certain alternate payees (see instructions)				
7 Decedent's investment in the contract under section 72(f)				
8 Excess life insurance amount				
9 Decedent's interest as a beneficiary				
10 Total reductions in value (add lines 6, 7, 8, and 9)				
11 Net value of decedent's interest (subtract line 10 from line 5)				
12 Decedent's aggregate interest in all plans and IRAs (add columns A-D of line 11)				12
13 Present value of hypothetical life annuity (from Part III, line 4)	13			
14 Remaining unused grandfather amount (from Part II, line 4)	14			
15 Enter the greater of line 13 or line 14				15
16 Excess retirement accumulation (subtract line 15 from line 12)				16
17 Increased estate tax (multiply line 16 by 15%). Enter here and on line 23 of the Tax Computation on page 1				17

(The instructions to Schedule S are in the separate instructions.)

Part II Grandfather Election

- Was a grandfather election made on a previously filed Form 5329? Yes No
If "Yes," complete lines 2-4 below. You may not make or revoke the grandfather election after the due date (with extensions) for filing the decedent's 1988 income tax return. If "No," enter -0- on line 4 and skip to Part III.

2 Initial grandfather amount	2
3 Total amount previously recovered	3
4 Remaining unused grandfather amount (subtract line 3 from line 2). Enter here and on Part I, line 14, on page 37	4

Part III Computation of Hypothetical Life Annuity

1 Decedent's attained age at date of death (in whole years, rounded down)	1
2 Applicable annual annuity amount (see instructions)	2
3 Present value multiplier (see instructions)	3
4 Present value of hypothetical life annuity (multiply line 2 by line 3). Enter here and on Part I, line 13, on page 37	4

Supplemental Documents

You must attach the death certificate to the return.

If the decedent was a citizen or resident and died testate, attach a certified copy of the will to the return. Other supplemental documents may be required as explained below. Examples include Forms 712, 709, 709-A, and 709CE, trust and power of appointment instruments, death certificate, and state certification of payment of death taxes. If you do not file these documents with the return, the processing of the return will be delayed.

If the decedent was a U.S. citizen but not a resident of the United States, you must attach the following documents to the return: (1) a copy of the inventory of property and the schedule of liabilities, claims against the estate, and expenses of administration filed with the foreign court of probate jurisdiction, certified by a proper official of the court; (2) a copy of the return filed under the foreign inheritance, estate, legacy, succession tax, or other death tax act, certified by a proper official of the foreign tax department; and (3) if the decedent died testate, a certified copy of the will.

Rounding Off to Whole Dollars

You may show the money items on the return and accompanying schedules as whole-dollar amounts. To do so, drop any amount less than 50 cents and increase any amount from 50 cents through 99 cents to the next higher dollar.

Penalties

Section 6651 provides for penalties for both late filing and for late payment unless there is reasonable cause for the delay. The law also provides for penalties for willful attempts to evade payment of tax. The late filing penalty will not be imposed if the taxpayer can show that the failure to file a timely return is due to reasonable cause. Executors filing late (after the due date, including extensions) should attach an explanation to the return to show reasonable cause.

Section 6682 provides a penalty for the underpayment of estate tax of \$5,000 or more when the underpayment is attributable to valuation understatements. A valuation understatement occurs when the value of property reported on Form 706 is 50 percent or less of the actual value of the property.

These penalties also apply to late filing, late payment, and underpayment of GST taxes.

Publication 448

Additional information may be found in Pub. 448, Federal Estate and Gift Taxes.

Specific Instructions

You must file the first three pages of Form 706 and all required schedules. Schedules A through I must be filed, as appropriate, to support the entries in items 1 through 9 of the Recapitulation.

If you enter zero on any item of the Recapitulation, you need not file the schedule (except for Schedule F) referred to on that item.

If you claim any deductions on items 11 through 19 of the Recapitulation, you must complete and attach the appropriate Schedule(s) to support the claimed deductions.

If you claim the credits for foreign death taxes or tax on prior transfers, you must complete and attach Schedule P or Q.

Form 706 has 41 numbered pages. The pages are perforated so that you can remove them for copying and filing. When you complete the return, staple all the required pages together in the proper order.

Number the items you list on each schedule, beginning with 1 each time. Total the items listed on the schedule and its attachments, Continuation Schedules, etc. Enter the total of all attachments, Continuation Schedules, etc., at the bottom of the printed schedule, but do not carry the totals forward from one schedule to the next. Enter the total or totals for each schedule on the Recapitulation, page 3, Form 706.

Do not complete the "Alternate valuation date" or "Alternate value" columns of any schedule unless you elected alternate valuation on line 1 of Part 3, Elections by the Executor.

If there is not enough space on a schedule to list all the items, attach a Continuation Schedule (or additional sheets of the same size) to the back of the schedule. The Continuation Schedule is located at the end of the Form 706 package. You should photocopy the blank schedule before completing it if you will need more than one copy.

Instructions for Part 3.—Elections by the Executor

Line 1—Alternate Valuation.

Unless you elect at the time you file the return to adopt alternate valuation as authorized by section 2032, you must value all property included in the gross estate on the date of the decedent's death. Alternate valuation cannot be applied to only a part of the property. You may elect special use valuation (line 2) in addition to alternate valuation.

You may not elect alternate valuation unless the election will decrease both the value of the gross estate and the total net estate and GST taxes due after application of all allowable credits.

Alternate valuation is elected by checking "Yes" on line 1 and filing Form 706. Once made, the election may not be revoked. The election may be made on a

late filed Form 706 provided it is not filed later than 1 year after the due date (including extensions).

If you elect alternate valuation, value the property that is included in the gross estate as of the applicable dates as follows:

1. Any property distributed, sold, exchanged, or otherwise disposed of or separated or passed from the gross estate by any method within 6 months after the decedent's death is valued on the date of distribution, sale, exchange, or other disposition, whichever occurs first. Value this property on the date it ceases to form a part of the gross estate, that is, on the date the title passes as the result of its sale, exchange, or other disposition.

2. Any property not distributed, sold, exchanged, or otherwise disposed of within the 6-month period is valued on the date 6 months after the date of the decedent's death.

3. Any property, interest, or estate that is "affected by mere lapse of time" is valued as of the date of decedent's death or on the date of its distribution, sale, exchange, or other disposition, whichever occurs first. However, you may change the date of death value to account for any change in value that is not due to a "mere lapse of time" on the date of its distribution, sale, exchange, or other disposition.

The property included in the alternate valuation and valued as of 6 months after the date of the decedent's death, or as of some intermediate date (as described above) is the property included in the gross estate on the date of the decedent's death. Therefore, you must first determine what property constituted the gross estate at the decedent's death.

Interest accrued to the date of the decedent's death on bonds, notes, and other interest-bearing obligations is property of the gross estate on the date of death and is included in the alternate valuation. Rent accrued to the date of the decedent's death on leased real or personal property is property of the gross estate on the date of death and is included in the alternate valuation.

Outstanding dividends that were declared to stockholders of record on or before the date of the decedent's death are considered property of the gross estate on the date of death, and are included in the alternate valuation. Ordinary dividends declared to stockholders of record after the date of the decedent's death are not property of the gross estate on the date of death and are not included in the alternate valuation. However, if dividends are declared to stockholders of record after the date of the decedent's death so that the shares of stock at the later valuation date do not reasonably represent the same property at the date of the decedent's death, include those dividends (except dividends paid from earnings of the corporation after the date of the decedent's death) in the alternate valuation.

As part of each Schedule A through I, you must show: (1) what property is

included in the gross estate on the date of the decedent's death; (2) what property was distributed, sold, exchanged, or otherwise disposed of within the 6-month period after the decedent's death, and the dates of these distributions, etc. These two items should be entered in the

"Description" column of each schedule. Briefly explain the status or disposition governing the alternate valuation date, such as: "Not disposed of within 6 months following death," "Distributed," "Sold," "Bond paid on maturity," etc. In this same column, describe each item of principal and includible income; (3) the date of death value, entered in the appropriate value column with items of principal and includible income shown separately; and (4) the alternate value, entered in the appropriate value column with items of principal and includible income shown separately. In the case of any interest or estate, the value of which is affected by lapse of time, such as patents, leaseholds, estates for the life of another, or remainder interests, the value shown under the heading "Alternate value" must be the adjusted value (i.e., the value as of the date of death with an adjustment reflecting any difference in its value as of the later date not due to lapse of time).

Distributions, sales, exchanges, and other dispositions of the property within the 6-month period after the decedent's death must be supported by evidence. If the court issued an order of distribution during that period, you must submit a certified copy of the order as part of the evidence. The District Director may require you to submit additional evidence if necessary.

Line 2—Special Use Valuation of Section 2032A

Under section 2032A, you may elect to value certain farm and closely held business real property at its farm or business use value rather than its fair market value. You may elect both special use valuation and alternate valuation. To elect this valuation you must check "Yes" to line 2 and complete and attach Schedule A-1 and its required additional statements. You must file Schedule A-1 and its required attachments with Form 706 for this election to be valid. You may make the election on a late filed return so long as it is the first return filed.

The total value of the property valued under section 2032A may not be decreased from fair market value by more than \$750,000.

Real property may qualify for the section 2032A election if:

1. The decedent was a U.S. citizen or resident at the time of death;
2. The real property is located in the United States;
3. At the decedent's death the real property was used by the decedent or a family member for farming or in a trade or business or is rented for such use by the surviving spouse to a family member on a net cash basis;

4. The real property was acquired from or passed from the decedent to a qualified heir of the decedent;

5. The real property was owned and used in a qualified manner by the decedent or a member of the decedent's family during 5 of the 8 years before the decedent's death;

6. There was material participation by the decedent or a member of the decedent's family during 5 of the 8 years before the decedent's death; and

7. The qualified property is the percentage of the decedent's gross estate specified in section 2032A.

For definitions and additional information, see section 2032A and the related regulations.

Include the words "section 2032A valuation" in the "Description" column of any Form 706 schedule if section 2032A property is included in the decedent's gross estate.

An election under section 2032A need not include all the property in an estate that is eligible for special use valuation, but sufficient property to satisfy the threshold requirements of section 2032A(b)(1)(B) must be specially valued under the election.

If joint or undivided interests (e.g., interests as joint tenants or tenants in common) in the same property are received from a decedent by qualified heirs, an election with respect to one heir's joint or undivided interest need not include any other heir's interest in the same property if the electing heir's interest plus other property to be specially valued satisfies the requirements of section 2032A(b)(1)(B).

If successive interests (e.g., life estates and remainder interests) are created by a decedent in otherwise qualified property, an election under section 2032A is available only with respect to that property (or part) in which qualified heirs of the decedent receive all of the successive interests, and such an election must include the interests of all of those heirs.

For example, if a surviving spouse receives a life estate in otherwise qualified property and the spouse's brother receives a remainder interest in fee, no part of the property may be valued pursuant to an election under section 2032A.

Where successive interests in specially valued property are created, remainder interests are treated as being received by qualified heirs only if the remainder interests are not contingent on surviving a nonfamily member or are not subject to divestment in favor of a nonfamily member.

Protective Election.—You may make a protective election to specially value qualified real property. Under this election, whether or not you may ultimately use special use valuation depends upon values as finally determined (or agreed to following examination of the return) meeting the requirements of section 2032A.

To make a protective election, check "Yes" to line 2 and complete Schedule A-1 according to its instructions for "Protective Election."

If you make a protective election, you should complete this Form 706 by valuing all property at its fair market value. Do not use special use valuation. Usually, this will result in higher estate and GST tax liabilities than will be ultimately determined if special use valuation is allowed. **The protective election does not extend the time to pay the taxes shown on the return.** If you wish to extend the time to pay the taxes, you should file Form 4768 in adequate time before the return due date.

If it is found that the estate qualifies for special use valuation based on the values as finally determined (or agreed to following examination of the return), you must file an amended Form 706 (with a complete section 2032A election) within 60 days after the date of this determination. Complete the amended return using special use values under the rules of section 2032A, and complete Schedule A-1 and attach all of the required statements.

Line 3—Installment Payments

If you check this line to make a protective election, you should attach a notice of protective election as described in Regulations section 20.6166-1(d). If you check this line to make a final election, you should attach the notice of election described in Regulations section 20.6166-1(b).

In computing the adjusted gross estate under section 6166(b)(9) to determine whether an election may be made under section 6166, the net amount of any real estate in a closely held business must be used.

You may also elect to pay GST taxes in installments. See section 6166(i).

Line 4—Reversary or Remainder Interests

For the details of this election, see section 6163 and the related regulations.

Instructions for Part 4.—General Information (pages 2 and 3)

Power of Attorney

Completing the authorization on page 2 of Form 706 will authorize one attorney, accountant, or enrolled agent to represent the estate and receive confidential tax information, but will not authorize the representative to enter into closing agreements for the estate. **If you wish to represent the estate, you must complete and sign the authorization.**

If you wish to authorize persons other than attorneys, accountants, and enrolled agents, or if you wish to authorize more than one person, to receive confidential information or represent the estate, you must complete and attach Form 2848,

Power of Attorney and Declaration of Representative.

You must also complete and attach Form 2848 if you wish to authorize someone to enter into closing agreements for the estate.

If you wish only to authorize someone to inspect and/or receive confidential tax information (but not to represent you before the IRS), you must complete and file Form 8821, Tax Information Authorization.

Line 4

Complete line 4 whether or not there is a surviving spouse and whether or not the surviving spouse received any benefits from the estate. If there was no surviving spouse on the date of decedent's death, enter "None" in line 4a and leave lines 4b and 4c blank. The value entered in line 4c need not be exact. See the instructions for "Amount," under line 5, below.

Line 5

Name.—Enter the name of each individual, trust, or estate who received (or will receive) benefits of \$5,000 or more from the estate directly as an heir, next-of-kin, devisee, or legatee; or indirectly (for example, as beneficiary of an annuity or insurance policy, shareholder of a corporation, or partner of a partnership that is an heir, etc.).

Identifying Number.—Enter the social security number of each individual beneficiary listed. If the number is unknown, or the individual has no number, please indicate "unknown" or "none." For trusts and other estates, enter the employer identification number.

Relationship.—For each individual beneficiary enter the relationship (if known) to the decedent by reason of blood, marriage, or adoption. For trust or estate beneficiaries, indicate TRUST or ESTATE.

Amount.—Enter the amount actually distributed (or to be distributed) to each beneficiary including transfers during the decedent's life from Schedule G required to be included in the gross estate. The value to be entered need not be exact. A reasonable estimate is sufficient. For example, where precise values cannot readily be determined, as with certain future interests, a reasonable approximation should be entered. The total of these distributions should approximate the amount of gross estate reduced by funeral and administrative expenses, debts and mortgages, bequests to surviving spouse, charitable bequests, and any Federal and state estate and GST taxes paid (or payable) relating to the benefits received by the beneficiaries listed on lines 4 and 5.

All distributions of less than \$5,000 to specific beneficiaries may be included with distributions to unascertainable beneficiaries on the line provided.

Line 6—Section 2044 Property

If you answered "Yes," these assets must be shown on Schedule F.

Section 2044 property is property for which a previous section 2056(b)(7) election (QTIP election) has been made, or for which a similar gift tax election (section 2523) has been made. For more details see Pub. 448.

Line 8—Insurance Not Included in the Gross Estate

If you checked "Yes" for either 8a or 8b, you must complete and attach Schedule D and attach a Form 712, Life Insurance Statement, for each policy and an explanation of why the policy or its proceeds are not includible in the gross estate.

Line 10—Partnership Interests and Stock in Close Corporations

If you answered "Yes" to line 10, you must include full details for partnerships and unincorporated businesses on Schedule F (Schedule E if the partnership interest is jointly owned). You must include full details for the stock of inactive or close corporations on Schedule B.

Value these interests using the rules of Regulations section 20.2031-2 (stocks) or 20.2031-3 (other business interests).

A "close corporation" is a corporation whose shares are owned by a limited number of shareholders. Often, one family holds the entire stock issue. As a result, little, if any, trading of the stock takes place. There is, therefore, no established market for the stock, and those sales that do occur are at irregular intervals and seldom reflect all the elements of a representative transaction as defined by the term "fair market value."

Line 12—Trusts

If you answered "Yes" to either 12a or 12b, you must attach a copy of the trust instrument for each trust.

You must complete Schedule G if you answered "Yes" to 12a and Schedule F if you answered "Yes" to 12b.

Line 14—Transitional Marital Deduction Computation

You must check "Yes" if property passes to the surviving spouse under a maximum marital deduction formula provision that meets the requirements of section 403(e)(3) of the Economic Recovery Tax Act of 1981 (P. L. 97-34; 95 Stat. 305).

If you check "Yes" to line 14, you must compute the marital deduction under the rules that were in effect before the Economic Recovery Tax Act of 1981.

For a format for this computation, you should obtain the November 1981 revision of Form 706 and its instructions. The computation is items 19 through 26 of the Recapitulation. You should also apply the rules of Rev. Rul. 80-148, 1980-1 C.B. 207, if there is property that passes to the surviving spouse outside of the maximum marital deduction formula provision.

Line 16—Excess Retirement Accumulation

If the decedent did not have any interest in a qualified employer plan or individual retirement plan (defined in section 7701(a)(37)), check "No" to this question.

Note: The tax on excess retirement accumulations will not apply to most decedents because the present value of the hypothetical annuity is usually so large that very few decedents will have a larger total interest in qualified plans and individual retirement plans. The rules below are a general description of the section 4980A(d) excess retirement accumulation. If it appears, after reading these rules, that there is the possibility of such an excess, see the instructions for Schedule S on page 20 for more information.

A "qualified plan" means any:

1. Qualified pension, profit-sharing, or stock bonus plan described in section 401(a) that includes a trust exempt from tax under section 501(a);
2. Annuity plan described in section 403(a);
3. Annuity contract, custodial account, or retirement income account described in section 403(b)(1), 403(b)(7), or 403(b)(9);
4. Qualified bond purchase plan described in section 405(a) prior to that section's repeal by section 491(a) of the Tax Reform Act of 1984.

To determine if the decedent had an excess retirement accumulation, you must first total all of the decedent's interests (as of the date of death) in qualified plans and individual retirement plans. Then determine the present (date of death or alternate valuation date) value of a hypothetical life annuity for the decedent. This hypothetical life annuity must pay the decedent the greater of \$150,000 (unindexed) or \$112,500 (indexed) per year, times the multiplier described in the instructions for line 3, Part III, of Schedule S. Those instructions are on page 21.

If the decedent's total interest in the plans is greater than the value of this hypothetical annuity, then there is an excess retirement accumulation, and you should check "Yes" to question 16 and attach Schedule S to your return.

Instructions for Part 5.—Recapitulation (Page 3 of Form 706)

Gross Estate

Items 1 through 9.—You must make an entry in each of items 1 through 9. If the gross estate does not contain any assets of the type specified by a given item, enter zero for that item. Entering zero for any of items 1 through 9 is a statement by the executor, made under penalties of perjury, that the gross estate does not contain any includible assets covered by that item. Do not enter any amounts in the "Alternate value" column unless you elected alternate valuation on line 1 of Elections by the Executor on page 2.

Which Schedules To Attach for Items 1 Through 9.—You must attach Schedule F to the return and answer its questions even if you report no assets on it.

You must attach Schedules A, B, and C if the gross estate includes any Real Estate, Stocks and Bonds; or Mortgages, Notes, and Cash, respectively. You must attach Schedule D if the gross estate includes any Life Insurance or if you answered "Yes" to question 8a. You must attach Schedule E if the gross estate contains any Jointly Owned Property or if you answered "Yes" to question 9. You must attach Schedule G if the decedent made any of the lifetime transfers to be listed on that schedule or if you answered "Yes" to question 11 or 12a. You must attach Schedule H if you answered "Yes" to question 13. You must attach Schedule I if you answered "Yes" to question 15.

Deductions

Items 11 Through 19.—You must attach the appropriate schedules for the deductions you claim.

Item 15.—If item 14 is less than or equal to the value (at the time of the decedent's death) of the property subject to claims, enter the amount from item 14 on item 15.

If the amount on item 14 is more than the value of the property subject to claims, enter the greater of (a) the value of the property subject to claims, or (b) the amount actually paid at the time the return is filed.

In no event should you enter more on item 15 than the amount on item 14. See section 2053 and the related regulations for more information.

Instructions for Part 2.—Tax Computation (Page 1 of Form 706)

In general, the estate tax is figured by applying the unified rates shown in Table A to the total of transfers both during life and at death, and then subtracting the gift taxes. You must complete the Tax Computation.

Line 1

If you elected alternate valuation on line 1, Part 3, Elections by the Executor, enter the amount you entered in the "Alternate value" column of item 10 of Part 5,

Recapitulation. Otherwise, enter the amount from the "Value at date of death" column.

Lines 4 and 9

Three worksheets are provided to help you compute the entries for these lines. You need not file these worksheets with your return but should keep them for your records. Worksheet TG allows you to reconcile the decedent's lifetime taxable gifts to compute totals that will be used for the line 4 and line 9 worksheets. You must get all of the decedent's gift tax returns (Form 709, United States Gift (and Generation-Skipping Transfer) Tax Return) before you complete Worksheet TG. The amounts you will enter on Worksheet TG can usually be derived from these returns as filed. However, if any of the returns were audited by the IRS, you should use the amounts that were finally determined as a result of the audits.

Special Treatment of Split Gifts.—These special rules apply only if:

1. The decedent's spouse predeceased the decedent;
2. The decedent's spouse made gifts that were "split" with the decedent under the rules of section 2513;
3. The decedent was the "consenting spouse" for those split gifts, as that term is used on Form 709; and
4. The split gifts were included in the decedent's spouse's gross estate under section 2035.

If all four conditions above are met, do not include these gifts on line 4 of the Tax Computation and do not include the gift taxes payable on these gifts on line 9 of the Tax Computation. These adjustments are incorporated into the worksheets.

Line 7

Lines 7a-c are used to calculate the phaseout of the unified credit and graduated rates. The phaseout applies only to estates in which the amount the tentative tax is computed on exceeds \$10 million.

Line 12

If the decedent made gifts (including gifts made by the decedent's spouse and treated as made by the decedent by reason of gift splitting) after September 8, 1976, and before January 1, 1977, for

which the decedent claimed a specific exemption, the unified credit on this estate tax return must be reduced. The reduction is figured by entering 20% of the specific exemption claimed for these gifts. (Note: The specific exemption was allowed by section 2521 for gifts made before January 1, 1977.)

If the decedent did not make any gifts between September 8, 1976, and January 1, 1977, or if the decedent made gifts during that period but did not claim the specific exemption, enter zero.

Line 15

You may take a credit on line 15 for estate, inheritance, legacy, or succession taxes paid as the result of the decedent's death to any state or the District of Columbia. However, see section 2053(f) and the related regulations for exceptions and limits if you elected to deduct the taxes from the value of the gross estate.

If you make a section 6166 election to pay the Federal estate tax in installments and make a similar election to pay the state death tax in installments, see Rev. Rul. 86-38, 1986-1 C.B. 296, for the method of computing the credit allowed with this Form 706.

The credit may not be more than the amount figured by using Table B on page 9, based on the value of the adjusted taxable estate. The adjusted taxable estate is the amount of the Federal taxable estate (line 3 of the Tax Computation) reduced by \$60,000. You may claim an anticipated amount of credit and figure the Federal estate tax on the return before the state death taxes have been paid. However, the credit cannot be finally allowed unless you pay the state death taxes and claim the credit within 4 years after the return is filed (or later as provided by the Code if a petition is filed with the Tax Court of the United States, or if you have an extension of time to pay) and submit evidence that the tax has been paid. If you claim the credit for any state death tax that is later recovered, see Regulations section 20.2016-1 for the notice you are required to give the IRS within 30 days.

If you transfer property other than cash to the state in payment of state inheritance taxes, the amount you may claim as credit is the lesser of the state inheritance tax liability discharged or the fair market value of the property on the date of the transfer.

Worksheet TG Taxable Gifts Reconciliation
To be used for lines 4 and 9 of the Tax Computation

Gifts made after June 6, 1952, and before 1977	a.	b.	Note: For the definition of a taxable gift see section 2503. Ignore the old specific exemption. Follow Form 709. That is, include only the decedent's one-half of split gifts, whether the gifts were made by the decedent or the decedent's spouse.			
	Calendar year or calendar quarter	Total taxable gifts reported on Form 709 for period (see Note)	c.	d.	e.	f.
			Taxable amount included in col. b for gifts included in the gross estate	Taxable amount included in col. b for gifts that qualify for "special treatment of split gifts" described above	Gift tax paid by decedent on gifts in col. d	Gift tax paid by decedent's spouse on gifts in col. c
1. Total taxable gifts made before 1977						
Gifts made after 1976						
2. Totals for gifts made after 1976						

Line 4 Worksheet Adjusted Taxable Gifts Made After 1976

1. Taxable gifts made after 1976. Enter the amount from line 2, column b, Worksheet TG	
2. Taxable gifts made after 1976 reportable on Schedule G. Enter the amount from line 2, column c, Worksheet TG	
3. Taxable gifts made after 1976 that qualify for "special treatment." Enter the amount from line 2, column d, Worksheet TG	
4. Add lines 2 and 3.	
5. Adjusted taxable gifts. Subtract line 4 from line 1. Enter here and on line 4 of the Tax Computation of Form 706	

Line 9 Worksheet Gift Tax on Gifts Made After 1976

a.	b.	c.	d.	e.	f.
Calendar year or calendar quarter	Total taxable gifts for prior periods (from Form 709, Tax Computation, line 2)	Taxable gifts for this period (from Form 709, Tax Computation, line 1)	Tax payable using Table A (on page 9)	Unused unified credit for this period (see below)	Tax payable for this period (subtract col. e from col. d)
Total pre-1977 taxable gifts. Enter the amount from line 1, Worksheet TG					

- Total gift taxes payable on gifts made after 1976 (combine the amounts in column f)
- Gift taxes paid by the decedent on gifts that qualify for "special treatment." Enter the amount from line 2, column e, Worksheet TG on page 7
- Subtract line 2 from line 1
- Gift tax paid by decedent's spouse on split gifts included on Schedule G. Enter the amount from line 2, column f, Worksheet TG on page 7
- Add lines 3 and 4. Enter here and on line 9 of the Tax Computation of Form 706

Column d: To figure the "tax payable" for this column, you must use Table A in these instructions, as it applies to the year of the decedent's death rather than to the year the gifts were actually made. To compute the entry for col. d, you should figure the "tax payable" on the amount in col. b and subtract it from the "tax payable" on the amounts in cols. b and c added together. Enter the difference in col. d.

If the amount in columns b and c combined exceeds \$10 million for any given calendar year, then you must calculate the tax in column d for that year using the Form 709 revision in effect for the year of the decedent's death.

To calculate the tax, enter the amount for the appropriate year from column c of the worksheet on line 1 of the Tax Computation of the Form 709. Enter the amount from column b on line 2 of the Tax Computation. Complete the Tax Computation through the tax due before any reduction for the unified credit and enter that amount in column d, above.

Column e: To figure the unused unified credit, use the unified credit in effect for the year the gift was made. This amount should be on line 12 of the Tax Computation of the Form 709 filed for the gift.

For more details, see Rev. Rul. 86-117, 1986-2 C.B. 157.

You should send the following evidence to the IRS:

- Certificate of the proper officer of the taxing state, or the District of Columbia, showing: (a) the total amount of tax imposed (before adding interest and penalties and before allowing discount); (b) the amount of discount allowed; (c) the amount of penalties and interest imposed or charged; (d) the total amount actually paid in cash; and (e) the date of payment.
- Any additional proof the IRS specifically requests.

You should file the evidence requested above with the return if possible. Otherwise, send it as soon after you file the return as possible.

Line 17

You may take a credit for Federal gift taxes imposed by Chapter 12 of the Code, and the corresponding provisions of prior laws, on certain transfers the decedent made before January 1, 1977, that are included in the gross estate. The credit cannot be more than the amount figured by the following formula:

$$\frac{\text{Gross estate tax minus the sum of the state death taxes and unified credit}}{\text{Value of gross estate minus the sum of the deductions for charitable, public, and similar gifts and bequests and marital deduction}} \times \text{Value of included gift}$$

For more information, see the regulations under section 2012. This computation may be made using Form 4808, Computation of Credit for Gift Tax. Attach a copy of a completed Form 4808 or the computation of the credit. Also attach all available copies of Forms 709 filed by the decedent to help verify the amounts entered on lines 4, 9, and 17.

Line 23

If you answered "Yes" to question 16 of General Information, you must complete Schedule S. Enter the tax due from line 17 of Schedule S on line 23. This increased estate tax may not be offset by any of the estate tax credits on lines 11-19.

Line 26

You may not use these bonds to pay the GST tax. You may use these bonds to pay the increased estate tax shown on line 23.

Instructions for Schedule A.—Real Estate

See the reverse side of Schedule A on Form 706.

Instructions for Schedule B.—Stocks and Bonds General

If the total gross estate contains any stocks or bonds, you must complete Schedule B and file it with the return.

On Schedule B list the stocks and bonds included in the decedent's gross estate. Number each item in the left-hand column. **Bonds that are exempt from Federal income taxes are not exempt from estate taxes unless specifically exempted by an estate tax provision of the Code.** Therefore, you should list these bonds on Schedule B.

Public housing bonds includible in the gross estate must be included at their full value.

If you paid any estate, inheritance, legacy, or succession tax to a foreign country on any stocks or bonds included

(continued on page 10)

Table A—Unified Rate Schedule

Column A Taxable amount over	Column B Taxable amount not over	Column C Tax on amount in column A	Column D Rate of tax on amount in column A (Percent)
0	0	0	10
\$10,000	\$1,800	\$1,800	22
20,000	3,800	3,800	24
40,000	8,200	8,200	26
60,000	13,000	13,000	28
80,000	18,200	18,200	30
100,000	23,800	23,800	32
150,000	38,800	38,800	34
200,000	50,000	50,000	37
500,000	152,800	152,800	38
1,000,000	243,200	243,200	41
1,500,000	345,800	345,800	43
2,000,000	455,800	455,800	45
2,500,000	570,000	570,000	49
2,500,000	1,025,800	1,025,800	50

Table B Worksheet

Federal Adjusted Taxable Estate	
1	Federal taxable estate from Tax Computation, Form 706, line 3
2	Adjustment
3	Federal adjusted taxable estate. Subtract line 2 from line 1. This is the amount to compute maximum credit for state death taxes in Table B.
	\$ 60,000

Table B

Computation of Maximum Credit for State Death Taxes
(Based on Federal adjusted taxable estate computed using the worksheet above.)

(1) Adjusted taxable estate equal to or more than—	(2) Adjusted taxable estate less than—	(3) Credit on amount in column (1)	(4) Rate of credit on excess over amount in column (1) (Percent)	(5) Adjusted taxable estate equal to or more than—	(6) Credit on amount in column (1)	(7) Rate of credit on excess over amount in column (1) (Percent)	(8) Rate credit on excess over amount in column (1) (Percent)
0	\$40,000	0	None	2,540,000	106,800	8.0	8.0
\$40,000	90,000	0	0.8	3,040,000	146,800	9.6	9.6
90,000	190,000	\$400	1.6	4,040,000	206,800	10.4	10.4
190,000	290,000	1,200	2.4	5,040,000	266,800	11.2	11.2
290,000	390,000	3,600	3.2	6,040,000	326,800	12.0	12.0
390,000	490,000	10,000	4.0	7,040,000	386,800	13.6	13.6
490,000	590,000	27,600	5.6	8,040,000	446,800	14.4	14.4
590,000	690,000	38,800	6.4	9,040,000	506,800	15.2	15.2
690,000	790,000	70,800	7.2	10,040,000	566,800	16.0	16.0
1,540,000	2,040,000	70,800	7.2	10,040,000	1,022,800	16.0	16.0

Examples showing use of Schedule B

Example where the alternate valuation is not adopted; date of death, January 1, 1993

Item number	Description including face amount of bonds or number of shares and par value where needed for identification. Give CUSIP number if available.	Unit value	Alternate valuation date	Value at date of death
1	\$50,000-Arkansas Railroad Co. first mortgage 4%, 20-year bonds, due 1995, interest payable quarterly on Feb. 1, May 1, Aug. 1 and Nov. 1; N.Y. Exchange, CUSIP No. XXXXXXXXX	100		60,000
2	Interest coupons attached to bonds, item 1, due and payable on Nov. 1, 1992, but not cashed at date of death. Interest accrued on item 1, from Nov. 1, 1992, to Jan. 1, 1993. 500 shares Public Service Corp., common; N.Y. Exchange, CUSIP No. XXXXXXXXX	110		55,000
	Dividend on item 2 of \$2 per share declared Dec. 10, 1992, payable on Jan. 10, 1993, to holders of record on Dec. 30, 1992.			1,000

Example where the alternate valuation is adopted; date of death, January 1, 1993

Item number	Description including face amount of bonds or number of shares and par value where needed for identification. Give CUSIP number if available.	Unit value	Alternate valuation date	Value at date of death
1	\$50,000-Arkansas Railroad Co. first mortgage 4%, 20-year bonds, due 1995, interest payable quarterly on Feb. 1, May 1, Aug. 1 and Nov. 1; N.Y. Exchange, CUSIP No. XXXXXXXXX	100	4/1/93	60,000
	\$30,000 of item 1 distributed to legatees on Apr. 1, 1993	98	5/2/93	29,700
	\$30,000 of item 1 sold by executor on May 2, 1993	98		29,400
	Interest coupons attached to bonds, item 1, due and payable on Nov. 1, 1992, but not cashed at date of death. Cashied by executor on Feb. 1, 1993		2/1/93	600
	Interest accrued on item 1, from Nov. 1, 1992, to Jan. 1, 1993. Cashied by executor on Feb. 1, 1993		2/1/93	400
2	500 shares of Public Service Corp., common; N.Y. Exchange, CUSIP No. XXXXXXXXX	110		55,000
	Not disposed of within 6 months following death	90	7/1/93	45,000
	Dividend on item 2 of \$2 per share declared Dec. 10, 1992, and paid on Jan. 10, 1993, to holders of record on Dec. 30, 1992.		1/10/93	1,000

(Continued from page 8)

In this schedule, group those stocks and bonds together and label them "Subjected to Foreign Death Taxes."

List interest and dividends on each stock or bond separately. Indicate as a separate item dividends that have not been collected at death, but which are payable to the decedent or the estate because the decedent was a stockholder if the stock is the date of death. However, if the stock is being traded on an exchange and is selling at a dividend on the date of the decedent's death, do not include the amount of the dividend as a separate item. Instead, add it to the unadjusted quotation in determining the fair market value of the stock on the date of the decedent's death. Dividends declared on shares of stock before the death of the decedent but payable to stockholders of record on a date after the decedent's death are not includable in the gross estate for Federal estate tax purposes.

prices or bid and asked prices as the fair market value.

For example, assume that sales of stock nearest the valuation date (June 15) occurred 2 trading days after (June 13) and 3 trading days after (June 16). On those days the mean sale prices per share were \$10 and \$15, respectively. The fair market value of a share of stock on the valuation date, if the prices per share were \$15 and \$10, respectively, the fair market value of a share of stock on the valuation date is \$13.

If only closing prices for bonds are available, see Regulations section 20.2031-2(b).

Apply the rules in the section 2031 regulations to determine the value of inactive stock and stock options held by corporations. Send the schedule complete financial and other data used to determine the net including balance sheets (particulars) and statements of the net earnings for each of the 5 years immediately before the valuation date.

Securities reported as of no value, nominal value, or obsolete should be listed last in the schedule and the address of the company and the state and date of the incorporation. Attach copies of correspondence or statements used to determine the "no value."

If the security was listed on more than one stock exchange, use either the records of the exchange where the security is principally traded or the composite listing of combined exchanges, if available, in a publication of general circulation. In valuing listed stocks and bonds, you should carefully check accurate records to obtain values for the applicable valuation date.

If you get quotations from brokers, or evidence of the sale of securities from the officers of the issuing companies, attach to the schedule copies of the letters

Description

- Number of shares
 - Whether common or preferred
 - Issue
 - Par value where needed for identification
 - Price per share
 - Exact name of corporation
 - Principal exchange upon which sold, if listed on an exchange
 - CUSIP number, if available
- For bonds indicate:
- Quantity and denomination
 - Name of obligor
 - Date of maturity
 - Interest rate
 - Interest due date
 - Principal exchange, if listed on an exchange
 - CUSIP number, if available

furnishing these quotations or evidence of sale.

See Rev. Rul. 69-489, 1969-2 C.B. 172, for the special valuation rules for certain marketable U.S. Treasury Bonds (issued before March 4, 1971). These bonds, commonly called "flower bonds," may be redeemed at par plus accrued interest in payment of the tax at any Federal Reserve bank, the office of the Treasurer of the United States, or the Bureau of the Public Debt, as explained in Rev. Proc. 69-18, 1969-2 C.B. 300.

Instructions for Schedule D.—Insurance on the Decedent's Life

See the reverse side of Schedule D on Form 706.

Instructions for Schedule E.—Jointly Owned Property

See the reverse side of Schedule E on Form 706.

Instructions for Schedule F.—Other Miscellaneous Property

See the reverse side of Schedule F on Form 706.

Instructions for Schedule G.—Transfers During Decedent's Life

You must complete Schedule G and file it with the return if the decedent made any of the transfers described below in 1 through 5 or if you answered "Yes" on line 11 or 12a of Part 4, General Information.

Five types of transfers should be reported on this schedule:

1. **Certain gift taxes.**—Section 2035(c). Enter at item A of the Schedule the total value of the gift taxes that were paid by the decedent or the estate on gifts made by the decedent or the decedent's spouse within 3 years before death.

The date of the gift, not the date of payment of the gift tax, determines whether a gift tax paid is included in the gross estate under this rule. Therefore, you should carefully examine the Forms 709 filed by the decedent and the decedent's spouse to determine what part of the total gift taxes reported on them was attributable to gifts made within 3 years before death. For example, if the decedent died on July 10, 1993, you should examine gift tax returns for 1993, 1992, 1991, and 1990. However, the gift taxes on the 1990 returns that are attributable to gifts made before July 10, 1990, are not included in the gross estate.

Attach an explanation of how you computed the includible gift taxes if you do not include in the gross estate the entire gift taxes shown on any Form 709 filed within 3 years of death. Also attach copies

of any pertinent gift tax returns filed by the decedent's spouse within 3 years of death.

2. **Other transfers within 3 years before death.**—Section 2035(a). These transfers include only the following:

- Any transfer by the decedent with respect to a life insurance policy within 3 years before death.
- Any transfer within 3 years before death of a retained section 2036 life estate, section 2037 reversionary interest, or section 2038 power to revoke, etc., if the property subject to the life estate, interest, or power would have been included in the gross estate had the decedent continued to possess the life estate, interest, or power until death.

These transfers are reported on Schedule G regardless of whether a gift tax return was required to be filed for them when they were made. However, the amount includible and the information required to be shown for the transfers are determined:

- For insurance on the life of the decedent using the instructions to Schedule D. (Attach Form(s) 712.)
- For insurance on the life of another using the instructions to Schedule F. (Attach Form(s) 712.)
- For sections 2036, 2037, and 2038 transfers, using paragraphs 3, 4, and 5 of these instructions.

3. **Transfers with retained life estate (section 2036).**—These are transfers in which the decedent retained the income from the transferred property or the right to designate the person or persons who will possess or enjoy the transferred property, or the income from the transferred property if the transfer was made:

(a) Between March 4, 1931, and June 6, 1932, inclusive, and the decedent alone retained the right to so designate for life, or for any period that did not in fact end before the decedent's death; or

(b) After June 6, 1932, and the decedent retained the right to so designate, either alone or with any person, for life, for any period that must be ascertained by reference to the decedent's death, or for any period that did not in fact end before the decedent's death.

Retained Voting Rights. Transfers with a retained life estate also include transfers of stock in a "controlled corporation" after June 22, 1976, if the decedent retained or acquired voting rights in the stock. If the decedent retained direct or indirect voting rights in a controlled corporation, the decedent is considered to have retained enjoyment of the transferred property. A corporation is a "controlled corporation" if the decedent owned (actually or constructively) or had the right (either alone or with any other person) to vote at least 20% of the total combined voting power of all classes of stock. See section 2036(b). If these voting rights ceased or were relinquished within 3 years before the decedent's death, the corporate interests are included in the gross estate as if the decedent had actually retained the voting rights until death.

4. **Transfers taking effect at death (section 2037).**—These are transfers made on or after September 8, 1916, that took effect at the decedent's death. A transfer that takes effect at the decedent's death is one under which possession or enjoyment can be obtained only by surviving the decedent. A transfer is not treated as one that takes effect at the decedent's death unless the decedent retained a reversionary interest in the property that immediately before the decedent's death had a value of more than 5% of the value of the transferred property. If the transfer was made before October 8, 1949, the reversionary interest must have arisen by the express terms of the instrument of transfer.

5. **Revocable transfers (section 2038).**—These are transfers in which the enjoyment of the transferred property was subject at decedent's death to any change through the exercise of a power to alter, amend, revoke, or terminate, as follows:

- If the transfer was made before 4:01 p.m., eastern standard time, June 2, 1924, and the power was reserved at the time of the transfer and was exercisable by the decedent alone or with a person who had no substantial adverse interest in the transferred property.
- If the transfer was made on or after 4:01 p.m., eastern standard time, June 2, 1924, and before June 23, 1936, and the power was reserved at the time of the transfer and was exercisable by the decedent alone or with any person (regardless of whether that person had a substantial adverse interest in the transferred property), or
- If the transfer was made after June 22, 1936, regardless of whether the power was reserved at the time of the transfer or later created or conferred, regardless of the source from which the power was acquired, regardless of whether the power was exercisable by the decedent alone or with any person, and regardless of whether that person had a substantial adverse interest in the transferred property.
- If the decedent relinquished within 3 years before death any of the includible powers described above, you should determine the gross estate as if the decedent had actually retained the powers until death.

For more detailed information on which transfers are includible in the gross estate, see the Estate Tax Regulations.

Special Valuation Rules for Certain Lifetime Transfers

Note: Code sections 2701-2704 were enacted by the Omnibus Budget Reconciliation Act of 1990. These sections provide rules for valuing certain transfers to family members and are generally effective for transfers occurring after October 8, 1990.

Section 2701 deals with the transfer of an interest in a corporation or partnership while retaining certain distribution rights, or a liquidation, put, call, or conversion right.

Section 2702 deals with the transfer of an interest in a trust while retaining any interest other than a qualified interest. In general, a qualified interest is a right to receive certain distributions from the trust at least annually, or a noncontingent remainder interest if all of the other interests in the trust are distribution rights specified in section 2702.

Section 2703 provides rules for the valuation of property transferred to a family member but subject to an option, agreement, or other right to acquire or use the property at less than fair market value. It also applies to transfers subject to restrictions on the right to sell or use the property.

Finally, section 2704 provides that in certain cases the lapse of a voting or liquidation right in a family-owned corporation or partnership will result in a deemed transfer.

These rules have potential consequences for the valuation of property in an estate. If the decedent (or any member of his or her family) was involved in any such transactions, see Code sections 2701-2704 for additional details.

How To Complete Schedule G

All transfers (other than outright transfers not in trust and bona fide sales) made by the decedent at any time during life must be reported on the Schedule regardless of whether you believe the transfers are subject to tax. If the decedent made any transfers not described in the instructions on page 11, the transfers should not be shown on Schedule G. Instead, attach a statement describing these transfers: list the date of the transfer, the amount or value, and the type of transfer.

Complete the schedule for each transfer that is included in the gross estate under sections 2035(a), 2036, 2037, and 2038 as described on page 11.

In the "item number" column, number each transfer consecutively beginning with 1. In the "Description" column, list the name of the transferee, the date of the transfer, and give a complete description of the property. Transfers included in the gross estate should be valued on the date of the decedent's death or, if the alternate valuation is adopted, according to section 2032.

If only part of the property transferred meets the terms of section 2035(a), 2036, 2037, or 2038, then only a corresponding part of the value of the property should be included in the value of the gross estate. If the transferee makes additions or improvements to the property, the increased value of the property at the valuation date should not be included on Schedule G. However, if only a part of the value of the property is included, enter the value of the whole under the column headed "Description" and explain what part was included.

Attachments.—If a transfer, by trust or otherwise, was made by a written instrument, attach a copy of the instrument

to the Schedule. If of public record, the copy should be certified; if not of record, the copy should be verified.

Instructions for Schedule H.—Powers of Appointment

You must complete Schedule H and file it with the return if you answered "Yes" to line 13 of Part 4, General Information.

On Schedule H include in the gross estate:

1. The value of property for which the decedent possessed a general power of appointment on the date of his or her death; and

2. The value of property for which the decedent possessed a general power of appointment which he or she exercised or released before death by disposing of it in such a way that if it were a transfer of property owned by the decedent, the property would be includible in the decedent's gross estate. (See section 2041 and Pub. 448 for more details.)

Powers of Appointment

A power of appointment includes all powers which are in substance and effect powers of appointment regardless of how they are identified and regardless of local property laws. For example, if a settlor transfers property in trust for the life of his wife, with a power in the wife to appropriate or consume the principal of the trust, the wife has a power of appointment.

General Power of Appointment.—A general power of appointment is a power that is exercisable in favor of the decedent, the decedent's estate, the decedent's creditors, or the creditors of the decedent's estate, except:

1. A power to consume, invade, or appropriate property for the benefit of the decedent that is limited by an ascertainable standard relating to health, education, support, or maintenance of the decedent.

2. A power created on or before October 21, 1942, that is exercisable by the decedent only in conjunction with another person.

3. A power created after October 21, 1942, exercisable by the decedent only in conjunction with (a) the creator of the power, or (b) a person who has a substantial interest in the property subject to the power, which is adverse to the exercise of the power in favor of the decedent.

A part of a power created after October 21, 1942, is considered a general power of appointment if the power:

1. May only be exercised by the decedent in conjunction with another person; and

2. Is also exercisable in favor of the other person (in addition to being exercisable in favor of the decedent, the decedent's creditors, the decedent's estate, or the creditors of the decedent's estate).

The part to include in the gross estate as a general power of appointment is figured by dividing the value of the property by the number of persons (including the decedent) in favor of whom the power is exercisable.

Date Power Was Created.—Generally, a power of appointment created by will is considered created on the date of the testator's death. However, a power of appointment created by a will executed on or before October 21, 1942, is considered a power created on or before that date if the person executing the will died before July 1, 1949, without having republished the will, by codicil or otherwise, after October 21, 1942.

A power of appointment created by an inter vivos instrument is considered created on the date the instrument takes effect. If the holder of a power exercises it by creating a second power, the second power is considered as created at the time of the exercise of the first.

Attachments

If the decedent ever possessed a power of appointment, attach a certified or verified copy of the instrument granting the power and a certified or verified copy of any instrument by which the power was exercised or released. You must file these copies even if you contend that the power was not a general power of appointment, and that the property is not otherwise includible in the gross estate.

Instructions for Schedule I.—Annuities

You must complete Schedule I and file it with the return if you answered "Yes" to question 15 of Part 4, General Information. Enter on Schedule I every annuity that meets all of conditions 1-4 under General, below, and every annuity described in paragraphs a-h of **Annuities Under Approved Plans**, even if the annuities are wholly or partially excluded from the gross estate.

See the instructions for line 3 of Schedule M for a discussion regarding the QTIP treatment of certain joint and survivor annuities.

General

Except as otherwise provided under **Annuities Under Approved Plans** on page 13, include in the gross estate on this schedule all or part of the value of an annuity receivable by any beneficiary following the death of the decedent under a contract or agreement that satisfies all four conditions below:

1. The contract or agreement is not a policy of insurance on the life of the decedent;

2. The contract or agreement was entered into after March 3, 1931;

3. The annuity is receivable by the beneficiary because he or she survived the decedent; and

4. Under the contract or agreement, an annuity was payable to the decedent (or

the decedent possessed the right to receive the annuity either alone or in conjunction with another, for the decedent's life or for any period not ascertainable without reference to the decedent's death or for any period that did not in fact end before the decedent's death.

Part Includible.—If the decedent contributed only part of the purchase price of the contract or agreement, include in the gross estate only that part of the value of the annuity receivable by the surviving beneficiary that the decedent's contribution to the purchase price of the annuity or agreement bears to the total purchase price. For example, if the value of the survivor's annuity was \$20,000 and the decedent had contributed three-fourths of the purchase price of the contract, the amount includible is \$15,000 ($\frac{3}{4} \times \$20,000$). Except as provided under **Annuities Under Approved Plans**, contributions made by the decedent's employer to the purchase price of the contract or agreement are considered made by the decedent if they were made by the employer because of the decedent's employment. For more information, see section 2039.

"Annuity" Defined.—The term "annuity" includes one or more payments extending over any period of time. The payments may be equal or unequal, conditional or unconditional, periodic or sporadic. The following are examples of contracts (but not necessarily the only forms of contracts) for annuities that must be included in the gross estate:

1. A contract under which the decedent immediately before death was receiving or was entitled to receive, for the duration of life, an annuity with payments to continue after death to a designated beneficiary, if surviving the decedent;

2. A contract under which the decedent immediately before death was receiving or was entitled to receive, together with another person, an annuity payable to the decedent and the other person for their joint lives, with payments to continue to the survivor following the death of either;

3. A contract or agreement entered into by the decedent and employer under which the decedent immediately before death and following retirement was receiving, or was entitled to receive, an annuity payable to the decedent for life and after the decedent's death to a designated beneficiary, if surviving the decedent, whether the payments after the decedent's death are fixed by the contract or subject to an option or election exercised or exercisable by the decedent. However, see **Annuities Under Approved Plans**, below;

4. A contract or agreement entered into by the decedent and employer under which at the decedent's death, before retirement or before the expiration of a stated period of time, an annuity was payable to a designated beneficiary, if surviving the decedent. However, see **Annuities Under Approved Plans**, below;

5. A contract or agreement under which the decedent immediately before death was receiving, or was entitled to receive, an annuity for a stated period of time, with the annuity to continue to a designated beneficiary, surviving the decedent, upon the decedent's death before the expiration of that period of time;

6. An annuity contract or other arrangement providing for a series of substantially equal periodic payments to be made to a beneficiary for life or over a period of at least 36 months after the date of the decedent's death under an individual retirement account, annuity, or bond as described in section 2039(e) (before its repeal by P.L. 98-369).

Annuities Under Approved Plans.—The statute allowing an exclusion for annuities under approved plans has been repealed. However, under the special rules provided for the annuities described in a-h below, it may be possible to exclude part or all of the value of these annuities from the gross estate.

No exclusion is allowed for annuities under approved plans unless either condition 1 or 2 below is met:

1. On December 31, 1984, the decedent was both a participant in the plan and in pay status (i.e., had received at least one benefit payment on or before December 31, 1984), and the decedent irrevocably elected the form of the benefit before July 18, 1984; or

2. The decedent separated from service before January 1, 1985, and did not change the form of benefit before death.

If either of the above conditions is met, an exclusion is allowed. The exclusion may not exceed \$100,000 unless either of the two additional conditions below is met:

1. On December 31, 1982, the decedent was both a participant in the plan and in pay status (i.e., had received at least one benefit payment on or before December 31, 1982), and the decedent irrevocably elected the form of the benefit before January 1, 1983; or

2. The decedent separated from service before January 1, 1983, and did not change the form of benefit before death.

If either of the above conditions is met, the exclusion is not subject to the \$100,000 limitation.

Approved Plans:

a. An employees' trust (or under a contract purchased by an employees' trust) forming part of a pension, stock bonus, or profit-sharing plan that met all the requirements of section 401(a), either at the time of the decedent's separation from employment (whether by death or otherwise) or at the time of the termination of the plan (if earlier);

b. A retirement annuity contract purchased by the employer (but not by an employees' trust) under a plan that, at the time of the decedent's separation from employment (by death or otherwise), or at the time of the termination of the plan (if earlier), was a plan described in section 403(a);

c. A retirement annuity contract purchased for an employee by an employer that is an organization referred to in section 170(b)(1)(A)(ii) or (vi), or that is a religious organization (other than a trust), and that is exempt from tax under section 501(a);

d. Chapter 73 of Title 10 of the United States Code;

e. A bond purchase plan described in section 405 (before its repeal by P.L. 98-369, effective for obligations issued after December 31, 1983).

If an annuity under an "approved plan" described in a-e above is receivable by a beneficiary other than the executor and the decedent made no contributions under the plan toward the cost, no part of the value of the annuity, subject to the \$100,000 limitation (if applicable), is includible in the gross estate. If the decedent made a contribution under a plan described in a-e above toward the cost, include in the gross estate on this schedule that proportion of the value of the annuity which the amount of the decedent's contribution under the plan bears to the total amount of all contributions under the plan. The remaining value of the annuity is excludable from the gross estate subject to the \$100,000 limitation (if applicable). For the rules to determine whether the decedent made contributions to the plan, see Pub. 448.

Note: The accounts, annuities, and bonds described in f-h, below, are "approved plans" only if they provide for a series of substantially equal periodic payments to be made to a beneficiary for life, or over a period of at least 36 months after the date of the decedent's death.

f. An individual retirement account described in section 408(a);

g. An individual retirement annuity described in section 408(b);

h. A retirement bond described in section 409(a) (before its repeal by P.L. 98-369).

Subject to the \$100,000 limitation, if applicable, if an annuity under a "plan" described in f-h above is receivable by a beneficiary other than the executor, the entire value of the annuity is excludable from the gross estate even if the decedent made a contribution under the plan. However, if any payment to or for an account or annuity described in paragraph f, g, or h above was not allowable as an income tax deduction under section 219 (and was not a rollover contribution as described in section 2039(e) before its repeal by P.L. 98-369), include in the gross estate on this schedule that proportion of the value of the annuity which the amount not allowable as a deduction under section 219 and not a rollover contribution bears to the total amount paid to or for such account or annuity. For more information, see Regulations section 20.2039-5.

If any part of an annuity under a "plan" described in a-h above is receivable by the executor, it is generally includible in the gross estate on this schedule to the extent that it is receivable by the executor in that

capacity. In general, the annuity is receivable by the executor if it is to be paid to the executor or if there is an agreement (expressed or implied) that it will be applied by the beneficiary for the benefit of the estate (such as in discharge of the estate's liability for death taxes or debts of the decedent, etc.) or that its distribution will be governed to any extent by the terms of the decedent's will or the laws of descent and distribution.

If data available to you does not indicate whether the plan satisfies the requirements of section 401(a), 403(a), 408(a), 408(b), or 409(a), you may obtain that information from the District Director of Internal Revenue for the district where the employer's principal place of business is located.

Line A—Lump Sum Distribution Election

The election pertaining to the lump sum distribution from qualified plans (approved plans) excludes from the gross estate all or part of the lump sum distribution that would otherwise be includible. When the recipient makes the election to take a lump sum distribution and include it in his or her income tax, the amount excluded from the gross estate is the portion attributable to the employer contributions. The portion, if any, attributable to the employee-decedent's contributions is always includible. The actual election is made by the recipient of the distribution by taking the lump sum distribution and by treating it as taxable on his or her income tax return as described in Regulations section 20.2039-4(d). The election is irrevocable. However, you may not compute the gross estate in accordance with this election unless you check "Yes" to line A and attach the name, address, and identifying number of the recipients of the lump sum distributions. See Regulations section 20.2039-4.

How To Complete the Schedule

In describing an annuity, give the name and address of the grantor of the annuity. Specify if the annuity is under an approved plan. If it is under an approved plan, you must state the ratio of the decedent's contribution to the total purchase price of the annuity. If the decedent was employed at the time of death and an annuity as described in paragraph 4 of **Annuity Defined**, on page 13, became payable to any beneficiary because the beneficiary survived the decedent, you must state the ratio of the decedent's contribution to the total purchase price of the annuity. If an annuity under an individual retirement account or annuity became payable to any beneficiary because that beneficiary survived the decedent and is payable to the beneficiary for life or for at least 36 months following the decedent's death, you must state the ratio of the amount paid for the individual retirement account or annuity that was not allowable as an income tax deduction under section 219 (other than a rollover contribution) to the total amount paid for the account or annuity. If the annuity is payable out of a

trust or other fund, the description should be sufficiently complete to fully identify it. If the annuity is payable for a term of years, include the duration of the term and the date on which it began, and if payable for the life of a person other than the decedent, include the date of birth of that person. If the annuity is wholly or partially excluded from the gross estate, enter the amount excluded under "Description" and explain how you computed the exclusion.

Instructions for Schedule J.—Funeral Expenses and Expenses Incurred in Administering Property Subject to Claims

See the reverse side of Schedule J on Form 706.

Instructions for Schedule K.—Debts of the Decedent and Mortgages and Liens

You must complete and attach Schedule K if you claimed deductions on either item 12 or item 13 of Part 5, Recapitulation.

Debts of the Decedent

List under "Debts of the Decedent" only valid debts the decedent owed at the time of death. List any indebtedness secured by a mortgage or other lien on property of the gross estate under the heading "Mortgages and Liens." If the amount of the debt is disputed or the subject of litigation, deduct only the amount the estate concedes to be a valid claim. Enter the amount in contest in the column provided.

Generally, if the claim against the estate is based on a promise or agreement, the deduction is limited to the extent that the liability was contracted bona fide and for an adequate and full consideration in money or money's worth. However, any enforceable claim based on a promise or agreement of the decedent to make a contribution or gift (such as a pledge or a subscription) to or for the use of a charitable, public, religious, etc., organization is deductible to the extent that the deduction would be allowed as a bequest under the statute that applies.

Certain claims of a former spouse against the estate based on the relinquishment of marital rights are deductible on Schedule K. For these claims to be deductible, all of the following conditions must be met:

- The decedent and the decedent's spouse must have entered into a written agreement relative to their marital and property rights.
- The decedent and the spouse must have been divorced before the decedent's death and the divorce must have occurred within the 3-year period beginning on the date 1 year before the agreement was entered into. It is not required that the agreement be approved by the divorce decree.
- The property or interest transferred under the agreement must be transferred

to the decedent's spouse in settlement of the spouse's marital rights.

You may not deduct a claim made against the estate by a remainderman relating to section 2044 property. Section 2044 property is described in the instructions to line 6 of Part 4, General Information.

Include in this schedule notes unsecured by mortgage or other lien and give full details, including name of payee, face and unpaid balance, date and term of note, interest rate, and date to which interest was paid before death. Include the exact nature of the claim as well as the name of the creditor. If the claim is for services performed over a period of time, state the period covered by the claim. Example: Edison Electric Illuminating Co., for electric service during December 1992, \$150.

If the amount of the claim is the unpaid balance due on a contract for the purchase of any property included in the gross estate, indicate the schedule and item number where you reported the property. If the claim represents a joint and separate liability, give full facts and explain the financial responsibility of the co-obligor.

Property and Income Taxes.—The deduction for property taxes is limited to the taxes accrued before the date of the decedent's death. Federal taxes on income received during the decedent's lifetime are deductible, but taxes on income received after death are not deductible.

Keep all vouchers or original records for inspection by the Internal Revenue Service.

Allowable Death Taxes.—If you elect to take a deduction under section 2053(d) rather than a credit under section 2011 or section 2014, the deduction is subject to the limitations described in section 2053(d) and its regulations. If you have difficulty figuring the deduction, you may request a computation of it. Send your request within a reasonable amount of time before the due date of the return to the Commissioner of Internal Revenue, Washington, DC 20224. Attach to your request a copy of the will and relevant documents, a statement showing the distribution of the estate under the decedent's will, and a computation of the state or foreign death tax showing the amount payable by charity.

Mortgages and Liens

List under "Mortgages and Liens" only obligations secured by mortgages or other liens on property that you included in the gross estate at its full value or at a value that was undiminished by the amount of the mortgage or lien. If the debt is enforceable against other property of the estate not subject to the mortgage or lien, or if the decedent was personally liable for the debt, you must include the full value of the property subject to the mortgage or lien in the gross estate under the appropriate schedule and may deduct the mortgage or lien on the property on this schedule. However, if the decedent's estate is not liable, include in the gross estate only the value of the equity of

redemption (or the value of the property less the amount of the debt), and do not deduct any portion of the indebtedness on this schedule.

Notes and other obligations secured by the deposit of collateral, such as stocks, bonds, etc., also should be listed under "Mortgages and Liens."

Description

Include under the "Description" column the particular schedule and item number where the property subject to the mortgage or lien is reported in the gross estate.

Include the name and address of the mortgagee, payee, or obligee, and the date and term of the mortgage, note, or other agreement by which the debt was established. Also include the face amount, the unpaid balance, the rate of interest, and date to which the interest was paid before the decedent's death.

Instructions for Schedule L—Net Losses During Administration and Expenses Incurred in Administering Property Not Subject to Claims

You must complete Schedule L and file it with the return if you claim deductions on either item 16 or item 17 of Part 5, Recapitulation.

Net Losses During Administration

You may deduct only those losses from thefts, fires, storms, shipwrecks, or other casualties that occurred during the settlement of the estate. You may deduct only the amount not reimbursed by insurance or otherwise.

Describe in detail the loss sustained and the cause. If you received insurance or other compensation for the loss, state the amount collected. Identify the property for which you are claiming the loss by indicating the particular schedule and item number where the property is included in the gross estate.

If you elect alternate valuation, do not deduct the amount by which you reduced the value of an item to include it in the gross estate.

Do not deduct losses claimed as a deduction on a Federal income tax return or depreciation in the value of securities or other property.

Expenses Incurred in Administering Property Not Subject to Claims

You may deduct expenses incurred in administering property that is included in the gross estate but that is not subject to claims. You may only deduct these expenses if they were paid before the section 6501 period of limitations for assessment expired.

The expenses deductible on the schedule are usually expenses incurred in the administration of a trust established by

the decedent before death. They may also be incurred in the collection of other assets or the transfer or clearance of title to other property included in the decedent's gross estate for estate tax purposes, but not included in the decedent's probate estate. The expenses deductible on this schedule are limited to those that are the result of settling the decedent's interest in the property or of vesting good title to the property in the beneficiaries. Expenses incurred on behalf of the transferees (except those described above) are not deductible. Examples of deductible and nondeductible expenses are provided in Regulations section 20.2053-8.

List the names and addresses of the persons to whom each expense was payable and the nature of the expense. Identify the property for which the expense was incurred by indicating the schedule and item number where the property is included in the gross estate. If you do not know the exact amount of the expense, you may deduct an estimate, provided that the amount may be verified with reasonable certainty and will be paid before the period of limitations for assessment (referred to above) expires. Keep all vouchers and receipts for inspection by the Internal Revenue Service.

Instructions for Schedule M.—Bequests, etc. to Surviving Spouse (Marital Deduction)

See pages 28 through 30 of Form 706 for these instructions.

Instructions for Schedule O.—Charitable, Public, and Similar Gifts and Bequests

General

You must complete Schedule O and file it with the return if you claim a deduction on item 19 of the Recapitulation.

You can claim the charitable deduction allowed under section 2055 for the value of property in the decedent's estate that was transferred by the decedent during life or by will to a charitable institution as explained in Pub. 448.

The deduction is limited to the amount actually available for charitable uses. Therefore, if under the terms of a will or the provisions of local law, or for any other reason, the Federal estate tax, the Federal GST tax, or any other estate, GST, succession, legacy, or inheritance tax is payable in whole or in part out of any bequest, legacy, or devise that would otherwise be allowed as a charitable deduction, the amount you may deduct is the amount of the bequest, legacy, or devise reduced by the total amount of the taxes.

For split-interest trusts (or pooled income funds) enter in the "Amount" column the amount treated as passing to

the charity. Do not enter the entire amount that passes to the trust (fund).

If you are deducting the value of the residue or a part of the residue passing to charity under the decedent's will, attach a copy of the computation showing how you determined the value, including any reduction for the taxes described above.

Also include:

1. A statement that shows the values of all specific and general legacies or devises for both charitable and noncharitable uses. For each legacy or devise, indicate the paragraph or section of the decedent's will or codicil that applies. (If legacies are made to each member of a class (e.g., \$1,000 to each of the decedent's employees), show only the number of each class and the total value of property they received.)

2. The date of birth of all life tenants or annuitants, the length of whose lives may affect the value of the interest passing to charity under the decedent's will.

3. A statement showing the value of all property that is included in the decedent's gross estate but does not pass under the will, such as transfers, jointly owned property that passed to the survivor on decedent's death, and insurance payable to specific beneficiaries.

4. Any other important information such as that relating to any claim, not arising under the will, to any part of the estate (e.g., a spouse claiming dower or curtesy, or similar rights).

Line 2

The charitable deduction is allowed for amounts that are transferred to charitable organizations as a result of a qualified disclaimer. To be a qualified disclaimer, a refusal to accept an interest in property must meet the conditions of section 2518. These are explained in Pub. 448 and Regulations sections 25.2518-1 through 25.2518-3. If property passes to a charitable beneficiary as the result of a qualified disclaimer, check the "Yes" box on line 2 and attach a copy of the written disclaimer required by section 2518(b).

Attachments

If the charitable transfer was made by will, attach a certified copy of the order admitting the will to probate, in addition to the copy of the will. If the charitable transfer was made by any other written instrument, attach a copy. If the instrument is of record, the copy should be certified; if not, the copy should be verified.

Value

The valuation dates used in determining the value of the gross estate apply also on Schedule O.

Instructions for Schedule P.—Credit for Foreign Death Taxes

General

If you claim a credit on line 18 of Part 2, Tax Computation, you must complete Schedule P and file it with the return. You must attach Form(s) 706CE, Certificate of Payment of Foreign Death Tax, to support any credit you claim.

The credit for foreign death taxes is allowable only if the decedent was a citizen or resident of the United States. However, see section 2053(d) and the related regulations for exceptions and limitations if the executor has elected, in certain cases, to deduct these taxes from the value of the gross estate. For a resident, not a citizen, who was a citizen or subject of a foreign country for which the President has issued a proclamation under section 2014(h), the credit is allowable only if the country of which the decedent was a national allows a similar credit to decedents who were U.S. citizens residing in that country.

The credit is authorized either by statute or by treaty. If a credit is authorized by a treaty, whichever of the following is the most beneficial to the estate is allowed: (a) the credit computed under the treaty; (b) the credit computed under the statute; or (c) the credit computed under the treaty, plus the credit computed under the statute for death taxes paid to each political subdivision or possession of the treaty country that are not directly or indirectly creditable under the treaty. Under the statute, the credit is authorized for all death taxes (national and local) imposed in the foreign country. Whether local taxes are the basis for a credit under a treaty depends upon the provisions of the particular treaty.

If a credit for death taxes paid in more than one foreign country is allowable, a separate computation of the credit must be made for each foreign country. The copies of Schedule P on which the additional computations are made should be attached to the copy of Schedule P provided in the return.

The total credit allowable in respect to any property, whether subjected to tax by one or more than one foreign country, is limited to the amount of the Federal estate tax attributable to the property. The anticipated amount of the credit may be computed on the return, but the credit cannot finally be allowed until the foreign tax has been paid and a Form 706CE evidencing payment is filed. Section 2014(g) provides that for credits for foreign death taxes, each U.S. possession is deemed a foreign country.

If a credit is claimed for any foreign death tax that is later recovered, see Regulations section 20.2016-1 for the notice required within 30 days.

Credit Under the Statute

For the credit allowed by the statute, the question of whether particular property is

situated in the foreign country imposing the tax is determined by the same principles that would apply in determining whether similar property of a nonresident not a U.S. citizen is situated within the United States for purposes of the Federal estate tax. See the instructions for Form 706NA.

Computation of Credit Under the Statute

Item 1.—Enter the amount of the estate, inheritance, legacy, and succession taxes paid to the foreign country and its possessions or political subdivisions, attributable to property that is (a) situated in that country, (b) subjected to these taxes, and (c) included in the gross estate. The amount entered at item 1 should not include any tax paid to the foreign country with respect to property not situated in that country and should not include any tax paid to the foreign country with respect to property not included in the gross estate. If only a part of the property subjected to foreign taxes is both situated in the foreign country and included in the gross estate, it will be necessary to determine the portion of the taxes attributable to that part of the property. Also attach the computation of the amount entered at item 1.

Item 2.—Enter the value of the gross estate less the total of the deductions on items 18 and 19 of Part 5, Recapitulation.

Item 3.—Enter the value of the property situated in the foreign country that is subjected to the foreign taxes and included in the gross estate, less those portions of the deductions taken on Schedules M and O that are attributable to the property.

Item 4.—Subtract line 17, Part 2, Form 706 from line 16, Part 2, Form 706, and enter the balance at item 4 of Schedule P.

Credit Under Treaties

If you are reporting any items on this return based on the provisions of a death tax treaty, you may have to attach a statement to this return disclosing the return position that is treaty based. See Regulations section 301.6114-1 for details.

In General.—If the provisions of a treaty apply to the estate of a U.S. citizen or resident, a credit is authorized for payment of the foreign death tax or taxes specified in the treaty. Death tax conventions are in effect with the following countries: Australia, Austria, Denmark, Germany, Finland, France, Greece, Ireland, Italy, Japan, Netherlands, Norway, Republic of South Africa, Sweden, Switzerland, and the United Kingdom.

A credit claimed under a treaty is in general computed on Schedule P in the same manner as the credit is computed under the statute with the following principal exceptions: (a) the situs rules contained in the treaty apply in determining whether property was situated in the foreign country; (b) the credit may be allowed only for payment of the death tax or taxes specified in the treaty (but see the instructions above for credit under the

statute for death taxes paid to each political subdivision or possession of the treaty country that are not directly or indirectly creditable under the treaty); (c) if specifically provided, the credit is proportionately shared for the tax applicable to property situated outside both countries, or that was deemed in some instances situated within both countries; and (d) the amount entered at item 4 of Schedule P is the amount shown on line 16 of Part 2, Tax Computation, less the total of the amounts on lines 17 and 19 of the Tax Computation. (If a credit is claimed for tax on prior transfers, it will be necessary to complete Schedule Q before completing Schedule P.) For examples of computation of credits under the treaties, see the applicable regulations.

Computation of Credit in Cases Where Property is Situated Outside Both Countries or Deemed Situated Within Both Countries.—See the appropriate treaty for details.

Instructions for Schedule Q.—Credit for Tax on Prior Transfers

General

You must complete Schedule Q and file it with the return if you claim a credit on line 19 of Part 2, Tax Computation.

The term "transferee" means the decedent for whose estate this return is filed. If the transferee received property from a transferor who died within 10 years before, or 2 years after, the transferee, a credit is allowable on this return for all or part of the Federal estate tax paid by the transferor's estate with respect to the transfer. There is no requirement that the property be identified in the estate of the transferee or that it exist on the date of the transferee's death. It is sufficient for the allowance of the credit that the transfer of the property was subjected to Federal estate tax in the estate of the transferor and that the specified period of time has not elapsed. A credit may be allowed with respect to property received as the result of the exercise or nonexercise of a power of appointment when the property is included in the gross estate of the donee of the power.

If the transferee was the transferor's surviving spouse, no credit is allowed for property received from the transferor to the extent that a marital deduction was allowed to the transferor's estate for the property. There is no credit for tax on prior transfers for Federal gift taxes paid in connection with the transfer of the property to the transferee.

If you are claiming a credit for tax on prior transfers on Form 706NA, you should first complete and attach the Recapitulation from Form 706 before computing the credit on Schedule Q from Form 706.

Section 2056(d)(3) contains specific rules for allowing a credit for certain transfers to a spouse who was not a U.S. citizen where

the property passed outright to the spouse, or to a "qualified domestic trust."

Property

The term "property" includes any interest (legal or equitable) of which the transferee received the beneficial ownership. The transferee is considered the beneficial owner of property over which the transferee received a general power of appointment. Property does not include interests to which the transferee received only a bare legal title, such as that of a trustee. Neither does it include an interest in property over which the transferee received a power of appointment that is not a general power of appointment. In addition to interests in which the transferee received the complete ownership, the credit may be allowed for annuities, life estates, terms for years, remainder interests (whether contingent or vested), and any other interest that is less than the complete ownership of the property, to the extent that the transferee became the beneficial owner of the interest.

Maximum Amount of the Credit

The maximum amount of the credit is the smaller of:

1. The amount of the estate tax of the transferor's estate attributable to the transferred property, or
2. The amount by which (a) an estate tax on the transferee's estate determined without the credit for tax on prior transfers, exceeds (b) an estate tax on the transferee's estate determined by excluding from the gross estate the net value of the transfer. If credit for a particular foreign death tax may be taken under either the statute or a death duty convention, and on this return the credit actually is taken under the convention, then no credit for that foreign death tax may be taken into consideration in computing estate tax (a) or estate tax (b).

Percent Allowable

Where Transferee Predeceased the Transferor.—If not more than 2 years elapsed between the dates of death, the credit allowed is 100% of the maximum amount. If more than 2 years elapsed between the dates of death, no credit is allowed.

Where Transferor Predeceased the Transferee.—The percent of the maximum amount that is allowed as a credit depends on the number of years that elapsed between dates of death. It is determined using the following table:

Period of Time Exceeding	Not Exceeding	Percent Allowable
-----	2 years	100
2 years	4 years	80
4 years	6 years	60
6 years	8 years	40
8 years	10 years	20
10 years	-----	none

How To Compute the Credit

A worksheet is provided on the last page of these instructions to allow you to compute the limits before completing Schedule Q. Transfer the appropriate amounts from the worksheet to Schedule Q as indicated on the schedule. You do not need to file the worksheet with your Form 706, but should keep it for your records.

Cases Involving Transfers From Two or More Transferors.—Part I of the worksheet and Schedule Q enable you to compute the credit for as many as three transferors. The number of transferors is irrelevant to Part II of the worksheet. If you are computing the credit for more than three transferors, use more than one worksheet and Schedule Q, Part I, and combine the totals for the appropriate lines.

Section 2032A Additional Tax.—If the transferor's estate elected special use valuation and the additional estate tax of section 2032A(c) was imposed at any time up to 2 years after the death of the decedent for whom you are filing this return, check the box on Schedule Q, On lines 1 and 9 of the worksheet, include the property subject to the additional estate tax at its fair market value rather than its special use value. On line 10 of the worksheet, include the additional estate tax paid as a Federal estate tax paid.

How To Complete the Worksheet

Most of the information to complete Part I of the worksheet should be obtained from the transferor's Form 706.

Line 5.—Enter on line 5 the applicable marital deduction claimed for the transferor's estate (from the transferor's Form 706).

Lines 10-18.—Enter on these lines the appropriate taxes paid by the transferor's estate.

If the transferor's estate elected to pay the Federal estate tax in installments, enter on line 10 only the total of the installments that have actually been paid at the time you file this Form 706. See Rev. Rul. 83-15, 1983-1 C.B. 224, for more details. Do not include as estate tax any tax attributable to section 4980A.

Line 21.—Add lines 13, 15, 17, and 18 of Part 2, Tax Computation, of this Form 706 and subtract this total from line 10 of the Tax Computation. Enter the result on line 21 of the worksheet.

Line 26.—If you computed the marital deduction on this Form 706 using the rules that were in effect before the Economic Recovery Tax Act of 1981 (as described in the instructions to line 14 of Part 4 of General Information), enter on line 26 the lesser of: the marital deduction you claimed on line 18 of Part 5 of the Recapitulation; or 50% of the "reduced adjusted gross estate." If you computed the marital deduction using the unlimited marital deduction in effect for decedents dying after 1981, for purposes of determining the marital deduction for the reduced gross estate, see Rev. Rul. 90-2,

1990-1 C.B. 170. To determine the "reduced adjusted gross estate," subtract the amount on line 25 of the Schedule Q worksheet from the amount on line 24 of the worksheet. If community property is included in the amount on line 24 of the worksheet, compute the reduced adjusted gross estate using the rules of Regulations section 20.2056(c)-2 and Rev. Rul. 76-311, 1976-2 C.B. 261.

Instructions for Schedules R and R-1.— Generation-Skipping Transfer Tax

Introduction and Overview

Schedule R is used to compute the generation-skipping transfer (GST) tax that is payable by the estate. Schedule R-1 (Form 706) is used to compute the GST tax that is payable by certain trusts that are includible in the gross estate.

The GST tax that is to be reported on Form 706 is imposed only on "direct skips occurring at death." Unlike the estate tax, which is imposed on the value of the entire taxable estate regardless of whom it is distributed to, the GST tax is imposed only on the value of interests in property, wherever located, that actually pass to certain transferees, who are referred to as "skip persons."

For purposes of Form 706, the property interests transferred must be includible in the gross estate before they are subject to the GST tax. Therefore, the first step in computing the GST tax liability is to determine the property interests includible in the gross estate by completing Schedules A-1 of Form 706.

The second step is to determine who the "skip persons" are. To do this, assign each transferee to a generation and determine whether each transferee is a "natural person" or a "trust" for GST purposes.

The third step is to determine which skip persons are transferees of "interests in property." If the skip person is a "natural person," anything transferred is an "interest in property." If the skip person is a "trust," make this determination using the rules under **Interest in Property**, on page 18. These first three steps are described in detail under the heading **Determining Which Transfers Are Direct Skips**.

The fourth step is to determine whether to enter the transfer on Schedule R or on Schedule R-1. See the rules under the heading **Dividing Direct Skips Between Schedules R and R-1**.

The fifth step is to complete Schedules R and R-1 using the **How To Complete** instructions on page 19, for each schedule.

Determining Which Transfers Are Direct Skips

Effective Dates.—The rules below apply only for the purpose of determining if a transfer is a direct skip that should be reported on Schedule R or R-1 of Form 706.

In General.—The GST tax is effective for the estates of decedents dying after October 22, 1986.

Wills and revocable trusts.—For the estates of decedents dying before January 1, 1987, the GST tax will not apply to transfers under wills and revocable trusts executed before October 22, 1986.

Irrevocable trusts.—The GST tax will not apply to any transfer under a trust that was irrevocable on September 25, 1985, but only to the extent that the transfer was not made out of corpus added to the trust after September 25, 1985. An addition to the corpus after that date will cause a proportionate part of future income and appreciation to be subject to the GST tax. For more information, see Temporary Regulations section 26.2601-1(b)(1)(ii).

Mental disability.—If the decedent was, on October 22, 1986, under a mental disability to change the disposition of his or her property and did not regain the competence to dispose of property before death, the GST tax will not apply to any property included in the gross estate (other than property transferred on behalf of the decedent during life and after October 21, 1986). The GST tax will also not apply to any transfer under a trust to the extent that the trust consists of property included in the gross estate (other than property transferred on behalf of the decedent during life and after October 21, 1986).

The term "mental disability" means the decedent's mental incompetence to execute an instrument governing the disposition of his or her property, whether or not there has been an adjudication of incompetence and whether or not there has been an appointment of any other person charged with the care of the person or property of the transferor.

If the decedent had been adjudged mentally incompetent, a copy of the judgment or decree must be filed with this return.

If the decedent had not been adjudged mentally incompetent, the executor must file with the return a certification from a qualified physician stating that in his opinion the decedent had been mentally incompetent at all times on and after October 22, 1986, and that the decedent had not regained the competence to modify or revoke the terms of the trust or will prior to his death or a statement as to why no such certification may be obtained from a physician.

Direct Skip.—The GST tax reported on Form 706 and Schedule R-1 (Form 706) is imposed only on direct skips. For purposes of Form 706, a direct skip is a transfer that is: (1) subject to the estate tax, (2) of an interest in property, and (3) to a skip person. All three requirements must be met before the transfer is subject to the GST tax. A transfer is "subject to the estate tax" if you are required to list it on any of Schedules A-1 of Form 706. To determine if a transfer is of an "interest in property" and to a "skip person," you must first determine if the transferee is a "natural person" or a "trust" as defined below.

Trust.—For purposes of the GST tax, a "trust" includes not only an explicit trust (as defined in **Special Rule for Trusts Other than Explicit Trusts** on page 19), but also any other arrangement (other than an estate) which, although not explicitly a trust, has substantially the same effect as a trust. For example, "trust" includes life estates with remainders, terms for years, and insurance and annuity contracts.

Substantially separate and independent shares of different beneficiaries in a trust are treated as separate trusts.

Interest in Property.—If a transfer is made to a "natural person," it is always considered a transfer of an interest in property for purposes of the GST tax.

If a transfer is made to a "trust," a person will have an interest in the property transferred to the trust if that person either has a present right to receive income or corpus from the trust (such as an income interest for life) or is a permissible current recipient of income or corpus from the trust (e.g., may receive income or corpus at the discretion of the trustee).

Skip Person.—A transferee who is a "natural person" is a "skip person" if that transferee is assigned to a generation that is two or more generations below the generation assignment of the decedent. **See Determining the Generation of a Transferee**, below.

A transferee who is a "trust" is a "skip person" if all the "interests in the property" (as defined above) transferred to the trust are held by skip persons. Thus, whenever a non-skip person has an interest in a trust, the trust will not be a skip person even though a skip person also has an interest in the trust.

A trust will also be a "skip person" if there are no "interests in the property" transferred to the trust held by any person, and future distributions or terminations from the trust can be made only to skip persons.

Non-Skip Person.—A non-skip person is any transferee who is not a skip person.

Determining the Generation of a Transferee.—Generally, a generation is determined along family lines as follows:

1. Where the beneficiary is a lineal descendant of a grandparent of the decedent (for example, the decedent's cousin, niece, nephew, etc.), the number of generations between the decedent and the beneficiary is determined by subtracting the number of generations between the grandparent and the decedent from the number of generations between the grandparent and the beneficiary.

2. Where the beneficiary is a lineal descendant of a grandparent of a spouse (or former spouse) of the decedent, the number of generations between the decedent and the beneficiary is determined by subtracting the number of generations between the grandparent and the spouse (or former spouse) from the number of generations between the grandparent and the beneficiary.

3. A person who at any time was married to a person described in 1 or 2

above is assigned to the generation of that person. A person who at any time was married to the decedent is assigned to the decedent's generation.

4. A relationship by adoption or half-blood is treated as a relationship by whole-blood.

5. A person who is not assigned to a generation according to 1, 2, 3, or 4 above is assigned to a generation based on his or her birth date, as follows:

a. A person who was born not more than 12½ years after the decedent is in the decedent's generation.

b. A person born more than 12½ years, but not more than 37½ years, after the decedent is in the first generation younger than the decedent.

c. A similar rule applies for a new generation every 25 years.

If more than one of the rules for assigning generations applies to a transferee, that transferee is generally assigned to the youngest of the generations that would apply.

If an estate, trust, partnership, corporation, or other entity (other than certain charitable organizations and trusts described in sections 511(a)(2) and 511(b)(2)) is a transferee, then each person who indirectly receives the property interests through the entity is treated as a transferee and is assigned to a generation as explained in the above rules. However, this look-thru rule does not apply for the purpose of determining whether a transfer to a trust is a direct skip.

Generation Assignment Where Intervening Parent Is Dead.—If property is transferred to the decedent's grandchild, and at the date of death, the grandchild's parent (who is the decedent's or the decedent's spouse's or the decedent's former spouse's child) is dead, then for purposes of generation assignment the grandchild will be considered to be the decedent's child rather than the decedent's grandchild. Thus, the transfer of the property will not be a direct skip. The grandchild's children will be treated as the decedent's grandchildren rather than the decedent's great-grandchildren.

This rule is also applied to the decedent's lineal descendants below the level of grandchild. For example, if the decedent's grandchild is dead, the decedent's great-grandchildren who are lineal descendants of the dead grandchild are considered the decedent's grandchildren for purposes of the GST tax. If any transfer of property to a trust would have been a direct skip except for this generation assignment rule, then the rule also applies to transfers from the trust attributable to such property.

Charitable Organizations.—Charitable organizations and trusts described in sections 511(a)(2) and 511(b)(2) are assigned to the decedent's generation. Transfers to such organizations are therefore not subject to the GST tax.

Charitable Remainder Trusts.—Transfers to or in the form of charitable remainder

annuity trusts, charitable remainder unitrusts, and pooled income funds are not considered made to skip persons and, therefore, are not direct skips even if all of the life beneficiaries are skip persons.

Estate Tax Value.—Estate tax value is the value shown on Schedules A-1 of this Form 706.

Examples.—The rules above can be illustrated by the following examples:

Example 1.—Under the will, the decedent's house is transferred to the decedent's daughter for her life with the remainder passing to her children. This transfer is made to a "trust" even though there is no explicit trust instrument. The interest in the property transferred (the present right to use the house) is transferred to a nonskip person (the decedent's daughter). Therefore, the trust is not a skip person because there is an interest in the transferred property that is held by a nonskip person. The transfer is not a direct skip.

Example 2.—The will bequeaths \$100,000 to the decedent's grandchild. This transfer is a direct skip that is not made in trust and should be shown on Schedule R.

Example 3.—The will establishes a trust that is required to accumulate income for 10 years and then pay its income to the decedent's grandchildren for the rest of their lives and, upon their deaths, distribute the corpus to the decedent's great-grandchildren. Because the trust has no current beneficiaries, there are no present interests in the property transferred to the trust. All of the persons to whom the trust can make future distributions (including distributions upon the termination of interests in property held in trust) are skip persons (i.e., the decedent's grandchildren and great-grandchildren). Therefore, the trust itself is a skip person and you should show the transfer on Schedule R.

Example 4.—The will establishes a trust that is to pay all of its income to the decedent's grandchildren for 10 years. At the end of 10 years, the corpus is to be distributed to the decedent's children. All of the interests in this trust are held by skip persons. Therefore, the trust is a skip person and you should show this transfer on Schedule R. You should show the estate tax value of all the property transferred to the trust even though the trust has some ultimate beneficiaries who are nonskip persons.

Dividing Direct Skips Between Schedules R and R-1

Report all generation-skipping transfers on Schedule R unless the rules below specifically provide that they are to be reported on Schedule R-1.

Under section 2603(a)(2), the GST tax on direct skips from a trust (as defined for GST tax purposes on page 18) is to be paid by the trustee and not by the estate. Schedule R-1 serves as a notification from the executor to the trustee that a GST tax is due.

For a direct skip to be reportable on Schedule R-1, the trust must be includable in the decedent's gross estate.

If the decedent was the surviving spouse life beneficiary of a marital deduction power of appointment (or QTIP) trust created by the decedent's spouse, then transfers caused by reason of the decedent's death from that trust to skip persons are direct skips required to be reported on Schedule R-1.

If a direct skip is made "from a trust" under these rules, it is reportable on Schedule R-1 even if it is also made "to a trust" rather than to an individual.

Similarly, if property in a trust (as defined for GST tax purposes on page 18) is included in the decedent's gross estate under section 2035, 2036, 2037, 2038, 2039, 2041, or 2042 and such property is, by reason of the decedent's death, transferred to skip persons, the transfers are direct skips required to be reported on Schedule R-1.

Special Rule For Trusts Other Than Explicit Trusts.—An explicit trust is a trust as defined in Regulations section 301.7701-4(a) as "an arrangement created by a will or by an inter vivos declaration whereby trustees take title to property for the purpose of protecting or conserving it for the beneficiaries under the ordinary rules applied in chancery or probate courts." Direct skips from explicit trusts are required to be reported on Schedule R-1 regardless of their size unless the executor is also a trustee (see below).

Direct skips from trusts that are trusts for GST tax purposes but are not explicit trusts are to be shown on Schedule R-1 only if the total of all tentative maximum direct skips from the entity is more than \$100,000. If this total is \$100,000 or less, the skips should be shown on Schedule R. For purposes of the \$100,000 limit, "tentative maximum direct skips" is the amount you would enter on line 5 of Schedule R-1 if you were to file that schedule.

A liquidating trust (such as a bankruptcy trust) under Regulations section 301.7701-4(d) is not treated as an explicit trust for the purposes of this special rule.

If the proceeds of a life insurance policy are includable in the gross estate and are payable to a beneficiary who is a skip person, the transfer is a direct skip from a trust that is not an explicit trust. It should be reported on Schedule R-1 if the total of all the tentative maximum direct skips from the company is more than \$100,000. Otherwise, it should be reported on Schedule R.

Similarly, if an annuity is includable on Schedule I and its survivor benefits are payable to a beneficiary who is a skip person, then the estate tax value of the annuity should be reported as a direct skip on Schedule R-1 if the total tentative maximum direct skips from the entity paying the annuity is more than \$100,000.

Executor as Trustee.—If any of the executors of the decedent's estate are trustees of the trust, then all direct skips

with respect to that trust must be shown on Schedule R and not on Schedule R-1 even if they would otherwise have been required to be shown on Schedule R-1. This rule applies even if the trust has other trustees who are not executors of the decedent's estate.

How To Complete Schedules R and R-1

Valuation.—Enter on Schedules R and R-1 the estate tax value of the property interests subject to the direct skips. If you elected alternate valuation (section 2032) and/or special use valuation (section 2032A), you must use the alternate and/or special values on Schedules R and R-1.

How To Complete Schedule R

Part 1—GST Exemption Reconciliation.—Part 1, line 6 of both Parts 2 and 3, and line 4 of Schedule R-1 are used to allocate the decedent's \$1 million GST exemption. This allocation is made by filing Form 706. Once made, the allocation is irrevocable. You are not required to allocate all of the decedent's GST exemption. However, the portion of the exemption that you do not allocate will be allocated by IRS under the deemed allocation at death rules of section 2632(c).

Special QTIP election.—In the case of property for which a marital deduction is allowed to the decedent's estate under section 2056(b)(7) (QTIP election), section 2652(a)(3) allows you to treat such property for purposes of the GST tax as if the election to be treated as qualified terminable interest property had not been made.

The 2652(a)(3) election must include the value of all property in the trust for which a QTIP election was allowed under section 2056(b)(7).

If a section 2652(a)(3) election is made, then the decedent will for GST tax purposes be treated as the transferor of all the property in the trust for which a marital deduction was allowed to the decedent's estate under section 2056(b)(7). In this case, the executor of the decedent's estate may allocate part or all of the decedent's GST exemption to the property.

Line 2.—These allocations will have been made either on Forms 709 filed by the decedent or on Notices of Allocation made by the decedent for inter vivos transfers that were not direct skips but to which the decedent allocated the GST exemption. These allocations by the decedent are irrevocable.

Line 3.—Make an entry on this line if you are filing Form(s) 709 for the decedent and wish to allocate any exemption.

Lines 4, 5, and 6.—These lines represent your allocation of the GST exemption to direct skips made by reason of the decedent's death. Complete Parts 2 and 3 and Schedule R-1 before completing these lines.

Line 9.—Line 9 is used to allocate the remaining unused GST exemption (from line 8) and to help you compute the trust's inclusion ratio. Line 9 is a Notice of

Allocation for allocating the GST exemption to trusts as to which the decedent is the transferor and from which a generation-skipping transfer could occur after the decedent's death. If line 9 is not completed, the deemed allocation at death rules will apply to allocate the decedent's remaining unused GST exemption, first to property that is the subject of a direct skip occurring at the decedent's death, and then to trusts as to which the decedent is the transferor. If you wish to avoid the application of the deemed allocation rules, you should enter on line 9 every trust (except certain trusts entered on Schedule R-1, as described below) to which you wish to allocate any part of the decedent's GST exemption. Unless you enter a trust on line 9, the unused GST exemption will be allocated to it under the deemed allocation rules.

If a trust is entered on Schedule R-1, the amount you entered on line 4 of Schedule R-1 serves as a Notice of Allocation and you need not enter the trust on line 9 unless you wish to allocate more than the Schedule R-1, line 4 amount to the trust. However, you must enter the trust on line 9 if you wish to allocate any of the unused GST exemption amount to it. Such an additional allocation would not ordinarily be appropriate in the case of a trust entered on Schedule R-1 when the trust property passes outright (rather than to another trust) at the decedent's death. However, where section 2032A property is involved it may be appropriate to allocate additional exemption amounts to the property. See the instructions for line 10.

Note: To avoid application of the deemed allocation rules, Form 706 and Schedule R should be filed to allocate the exemption to trusts that may later have taxable terminations or distributions under section 2612 even if the form is not required to be filed to report estate or GST tax.

Line 9, Column C.—Enter the GST exemption included on lines 2-6, above, that was allocated to the trust.

Line 9, Column D.—The line 8 amount is to be allocated in column D of line 9. GST tax amount may be allocated to transfers into trusts that are not otherwise reported on Form 706. For example, the line 8 amount may be allocated to an inter vivos trust established by the decedent during his or her lifetime and not included in the gross estate. This allocation is made by identifying the trust on line 9 and making an allocation to it using column D. If the trust is not included in the gross estate, value the trust as of the date of death. You should inform the trustee of each trust listed on line 9 of the total GST exemption you allocated to the trust. The trustee will need this information to compute the GST tax on future distributions and terminations.

Line 9, Column E.—Trust's Inclusion Ratio.—The trustee must know the trust's inclusion ratio to figure the trust's GST tax for future distributions and terminations. You are not required to inform the trustee of the inclusion ratio and may not have enough information to compute it. Therefore, you are not required to make an

entry in column E. However, column E and the worksheet below are provided to assist you in computing the inclusion ratio for the trustee if you wish to do so.

You should inform the trustee of the amount of the GST exemption you allocated to the trust. Line 9, columns C and D may be used to compute this amount for each trust.

This worksheet will compute an accurate inclusion ratio only if the decedent was the only settlor of the trust. You should use a separate worksheet for each trust (or separate share of a trust that is treated as a separate trust).

1	Total estate and gift tax value of all of the property interests that passed to the trust	
2	Estate taxes, state death taxes, and other charges actually recovered from the trust	
3	GST taxes imposed on direct skips to skip persons other than this trust and borne by the property transferred to this trust	
4	GST taxes actually recovered from this trust (from Schedule R, Part 2, line 8 or Schedule R-1, line 6)	
5	Add lines 2-4	
6	Subtract line 5 from line 1	
7	Add columns C and D of line 9	
8	Divide line 7 by line 6	
9	Trust's inclusion ratio. Subtract line 8 from 1.000	

Line 10.—Special Use Allocation.—For skip persons who receive an interest in section 2032A special use property, you may allocate more GST exemption than the direct skip amount to reduce the additional GST tax that would be due when the interest is later disposed of or qualified use ceases. See Schedule A-1 of this Form 706 for more details about this additional GST tax.

Enter on line 10 the total additional GST exemption you are allocating to all skip persons who received any interest in section 2032A property. Attach a special use allocation schedule listing each such skip person and the amount of the GST exemption allocated to that person.

If you do not allocate the GST exemption, it will be automatically allocated under the deemed allocation at death rules. To the extent any amount is not so allocated it will be automatically allocated (under regulations to be published) to the earliest disposition or cessation that is subject to the GST tax. Under certain circumstances, post-death events may cause the decedent to be treated as a transferor for purposes of Chapter 13.

Line 10 may be used to set aside an exemption amount for such an event. You must attach a schedule listing each such event and the amount of exemption allocated to that event.

Parts 2 and 3.—Part 2 is used to compute the GST tax on transfers in which the property interests transferred are to bear the GST tax on the transfers. Part 3 is to be used to report the GST tax on transfers

in which the property interests transferred do not bear the GST tax on the transfers.

Section 2603(b) requires that unless the governing instrument provides otherwise, the GST tax is to be charged to the property constituting the transfer. Therefore, you will usually enter all of the direct skips on Part 2.

You may enter a transfer on Part 3 only if the will or trust instrument directs, by specific reference, that the GST tax is not to be paid from the transferred property interests.

Part 2—Line 3.—Enter -0- on this line unless the will or trust instrument specifies that the GST taxes will be paid by property other than that constituting the transfer (as described above). Enter on line 3 the total of the GST taxes shown on Part 3 and Schedule(s) R-1 that are payable out of the property interests shown on Part 2, line 1.

Part 2—Line 6.—Do not enter more than the amount on line 5. Additional allocations may be made using Part 1.

Part 3—Line 3.—See the instructions to Part 2, line 3, above. Enter only the total of the GST taxes shown on Schedule(s) R-1 that are payable out of the property interests shown on Part 3, line 1.

Part 3—Line 6.—See the instructions to Part 2, line 6, above.

How To Complete Schedule R-1

Filing Due Date.—Enter the due date of Schedule R, Form 706. You must send the copies of Schedule R-1 to the fiduciary by this date.

Line 4.—Do not enter more than the amount on line 3. If you wish to allocate an additional GST exemption, you must use Schedule R, Part 1. Making an entry in line 4 constitutes a Notice of Allocation of the decedent's GST exemption to the trust.

Line 6.—If the property interests entered on line 1 will not bear the GST tax, multiply line 6 by 50% (.50).

Signature.—The executor(s) must sign Schedule R-1 in the same manner as Form 706. See **Signature and Verification** on page 2.

Filing Schedule R-1.—Attach one copy of each Schedule R-1 that you prepare to Form 706. Send two copies of each Schedule R-1 to the fiduciary.

Instructions for Schedule S.—Increased Estate Tax on Excess Retirement Accumulations

The executor uses Schedule S to figure the increased estate tax imposed by section 4980A(d) on excess accumulations in qualified employer plans (plans) and individual retirement plans (IRAs). Schedule S may be filed only as an attachment to Form 706.

Which Estates Must File

All estates must file Schedule S if the estate has any excess accumulation (as calculated on line 16 of the Tax

Computation of Schedule S). Schedule S must be filed regardless of the size of the gross estate and regardless of whether the estate is otherwise required to file Form 706.

The section 4980A(d) tax also applies to the estates of nonresident alien decedents whether or not they are otherwise required to file Form 706NA. In these instructions, references to Form 706 should be construed as references to Form 706NA if the decedent was a nonresident alien.

When To File

Schedule S is considered an integral part of Form 706 and you must file it with the estate's Form 706. Therefore, the due date is determined by the due date, with extensions, of the estate's Form 706.

Where To File

Schedule S must be attached to and filed with the Form 706.

Paying the Tax

The increased estate tax shown on Schedule S is due at the same time as the estate tax (if any) shown on the Form 706.

You may not make a section 6166 or 6163 election to defer the payment of the increased estate tax.

Part I.—Tax Computation

Line 1.—Spousal Election.—Section 4980A(d)(5) provides that if a surviving spouse is the beneficiary of all of the decedent's retirement accumulations (subject to a de minimis exception), then the spouse may elect not to have the excess accumulation rules apply to the decedent but to have section 4980A apply to such interests and any distributions attributable to such interests as if they were the surviving spouse's.

To make the election, the spouse must attach a statement to the decedent's Form 706. The statement must be signed by the spouse and must indicate clearly that the spouse is making the election provided for in section 4980A(d)(5).

If the spouse makes the election, check the box on line 1 and complete lines 2-12 of Part I, Schedule S.

Line 2.—List each plan and IRA in which the decedent had any interest at the time of death. If you need more space, list the additional plans and IRAs on an attached sheet. Also list any plans in which the decedent was an alternate payee if payments to the decedent would have been includible in the decedent's gross income under a qualified domestic relations order within the meaning of section 414(p).

If an IRA does not have an EIN, enter "None" in the EIN column.

Rollover IRAs.—If the decedent was a surviving spouse who rolled over a distribution from a plan or IRA of the predeceased spouse into an IRA established in the surviving spouse's own

name, do not list the IRA on line 2 unless contributions or transfers other than the rollover amount were made to the IRA. If such other contributions or transfers were made, then you must list the IRA on line 2 and include the entire value of the decedent's interest in the IRA on line 3.

If the decedent was a surviving spouse who elected to treat an inherited IRA (described in section 408(d)(3)(C)(ii)) as his or her own IRA and made no further contributions to it, do not list the IRA on line 2.

If the decedent (whether or not a surviving spouse) elected to treat an IRA as subject to the distribution requirements of section 408(a)(6) (before its amendment by section 521(b) of the Tax Reform Act of 1984), under Regulations section 1.408-2(b)(7)(ii), do not list the IRA on line 2 if it meets those distribution requirements.

Lines 3-10.—Consolidate all of the decedent's IRAs in column D. If there are more than three plans, compute their value on an attached sheet following the same format as lines 3-10.

Line 3.—Value of Decedent's Interest.—Value the decedent's interest in the plan or IRA using the estate tax valuation rules, including the alternate valuation election under section 2032. See page 3 for details on making this election. Do not reduce this value by any of the credits, deductions, exclusions, etc., that otherwise apply for estate tax purposes. Do not apply community property rules to reduce the value of the decedent's interest.

You should include in the value all amounts payable to beneficiaries of the decedent under the plan or IRA (including amounts payable to a surviving spouse under a qualified joint and survivor annuity or qualified preretirement survivor annuity), whether or not these amounts are otherwise included in valuing the decedent's gross estate.

Exclude from the value the excess (if any) of interests payable immediately after death over the value of the same interests immediately before death.

Line 4.—Post-Death Rollovers.—Enter on this line any amounts that: (1) were distributed from the plan or account within 60 days before the decedent's death, and (2) were rolled over into an IRA after the date of death and within 60 days after the distribution. Value the rolled over amounts as of the date they were received by the IRA.

Line 5.—Alternate Payees.—Enter on this line the amount of any portion of the decedent's interest in the plan that is payable to an alternate payee and is included in the payee's gross income under a qualified domestic relations order (within the meaning of section 414(p)).

Line 6.—Excess Life Insurance Amounts.—If the plan held a life insurance policy on the decedent's life, enter here the amount excludable from the beneficiary's income under section 101(a). This is the amount by which the death

benefit payable under the policy exceeds the cash surrender value of the policy immediately before the decedent's death. Do not enter on this line amounts that are excludable from gross income under section 101(b) (employee death benefits).

Line 9.—Decedent's Interest as a Beneficiary.—Enter on this line the amount of the decedent's interest in a plan or IRA by reason of the death of another individual.

Do not enter on this line any plans or IRAs that are reported on line 2 of Part I as a result of the decedent having made a spousal election under section 4980A(d)(5).

Line 17.—Increased Estate Tax.—The tax shown on line 17 may not be reduced or offset by any of the estate tax credits. Enter the line 17 amount on line 23 of the Tax Computation on page 1 of Form 706. (If you are filing Schedule S with Form 706NA, enter the line 17 amount on line 16 of the Tax Computation of Form 706NA.)

Part II.—Grandfather Election

Line 1.—If you checked "Yes," attach the Form 5329, Return for Additional Taxes Attributable to Qualified Retirement Plans (Including IRAs), Annuities, and Modified Endowment Contracts, on which the election was made.

Line 2.—Initial Grandfather Amount.—If you checked "Yes" on line 1, enter the initial grandfather amount shown on the Form 5329 on which the grandfather election was made.

Line 3.—Previously Recovered Amounts.—Enter the total of the amounts treated as recoveries of the grandfather amount from previously filed Forms 5329.

Part III.—Computation of Hypothetical Life Annuity

Line 1.—Decedent's Attained Age.—Enter the decedent's attained age in whole years on the date of death. For example, if the decedent was 60 years and 11 months old on the date of death, enter "60" on line 1.

Line 2.—Annual Annuity Amount.—If you did not check "Yes" to line 1 of Part II, enter the greater of \$150,000 or \$112,500 indexed for inflation as described in Temp. Regs. section 54.4981A-1T(a-9).

If you checked "Yes" to line 1 of Part II, enter \$112,500 indexed for inflation as described in Temp. Regs. section 54.4981A-1T(a-9).

Line 3.—Present Value Multipliers.—Section 5031 of the Technical and Miscellaneous Revenue Act of 1988 required the IRS to issue new present value tables using revised mortality figures. Also, to determine the present value multiplier under the new procedure, you must use an interest rate that is revised monthly. The IRS will announce the applicable rate in a news release and will publish it in a revenue ruling in the Internal Revenue Bulletin.

The IRS has published new present value tables for some interest rates in Notice 89-60, 1989-1 C.B. 700. The complete tables have been printed in Pub. 1457, Actuarial Values—Alpha Volume,

which can be purchased from the Superintendent of Documents, U.S. Government Printing Office, Washington, DC 20402.

To calculate the present value of an annuity if the tables are not available, and for additional information on the new rules, see Notice 89-60 as noted above, and Notice 89-24, 1989-1 C.B. 660.

Worksheet for Schedule Q—Credit for Tax on Prior Transfers

Part I Transferee's tax on prior transfers

Item	Transferee (From Schedule Q)			Total for all transferees (line 8 only)
	A	B	C	
1. Gross value of prior transfer to this transferee				
2. Death taxes payable from prior transfer				
3. Encumbrances allocable to prior transfer				
4. Obligations allocable to prior transfer				
5. Marital deduction applicable to line 1 above, as shown on transferor's Form 706				
6. Total (Add lines 2, 3, 4, and 5)				
7. Net value of transferee (Subtract line 6 from line 1)				
8. Net value of transfers (Add columns A, B, and C of line 7)				
9. Transferor's taxable estate				
10. Federal estate tax paid				
11. State death taxes paid				
12. Foreign death taxes paid				
13. Other death taxes paid				
14. Total taxes paid (Add lines 10, 11, 12, and 13)				
15. Value of transferor's estate (Subtract line 14 from line 9)				
16. Net Federal estate tax paid on transferor's estate				
17. Credit for gift tax paid on transferor's estate				
18. Credit allowed transferor's estate for tax on prior transfers from prior transferor(s) who died within 10 years before death of decedent				
19. Tax on transferor's estate (Add lines 16, 17, and 18)				
20. Transferor's tax on prior transfers (Line 7 + line 19, x line 19 of respective estates)				

Part II Transferee's tax on prior transfers

Item	Amount
21. Transferee's actual tax, before allowance of credit for prior transfers (see instructions)	
22. Total gross estate of transferee from line 1 of the Tax Computation, page 1, Form 706	
23. Net value of all transfers from line 6 of this worksheet	
24. Transferee's reduced gross estate (subtract line 23 from line 22)	
25. Total debts and deductions (not including marital and charitable deductions) (lines 15, 16, and 17 of the Recapitulation, page 3, Form 706)	
26. Marital deduction from item 18, Recapitulation, page 3, Form 706 (see instructions)	
27. Charitable bequests from item 19, Recapitulation, page 3, Form 706 (see instructions)	
28. Charitable deduction proportion $(\frac{\text{line 23} + \text{line 22-line 25}}{\text{line 23}}) \times \text{line 27}$	
29. Reduced charitable deduction (subtract line 28 from line 27)	
30. Transferee's deduction as adjusted (add lines 25, 26, and 29)	
31. (a) Transferee's reduced taxable estate (subtract line 30 from line 24) (b) Adjusted taxable gifts (c) Total reduced taxable estate (add lines 31(a) and 31(b))	
32. Tentative tax on reduced taxable estate	
33. (a) Post-1976 gift taxes paid (b) Unified credit (c) Section 2011 state death tax credit (d) Section 2012 gift tax credit (e) Section 2014 foreign death tax credit (f) Total credits (add lines 33(a) through 33(e))	
34. Net tax on reduced taxable estate (subtract line 33(f) from line 32)	
35. Transferee's tax on prior transfers (subtract line 34 from line 21)	

SOI Projects and Contacts

General Statistical Information: (202) 874-0410 Fax: (202) 874-0922

Project	Primary Analysts	Frequency and Program Content
Americans Living Abroad: 1991 Program	Melissa Redmiles	This periodic study is conducted every 4 years (every 5 years, after 1991). It covers foreign income and taxes paid, and foreign tax credit shown on individual income tax returns. Data are by size of adjusted gross income and country.
Corporation Foreign Tax Credit: 1991 Program 1992 Program 1993 Program	Kimberly Veleto Bill States	This annual study provides data on foreign income and taxes paid and foreign tax credit reported on corporation income tax returns. Data are classified by industry (all years) and country (even numbered years).
Corporation Income Tax Returns: 1991 Program 1992 Program 1993 Program	Patrice Treubert Allison Clark Janice Washington Jonathan Shook Ellen Legel Victor Rehula	Basic data are produced annually and cover complete income statement, balance sheet, tax and tax credits, and detail from supporting schedules. Data are classified chiefly by industry group or asset size. (Beginning with the 1992 program, S Corporations are a separate study.)
Environmental Excise Taxes (Superfund) Study: 1992 Program 1993 Program	Sara Boroshok	The Superfund Amendments and Reauthorization Act of 1986 (SARA) replaced the Comprehensive Environmental Response, Compensation and Liability Act of 1980 (CERCLA), authorizing the collection of environmental taxes, a type of excise tax. This study, published annually, is the only source of data that provides detailed tabulations by type of chemical.
Estate Collation	Barry Johnson	This periodic study links estate tax return data for decedents and beneficiaries. Income information for beneficiaries is available both for years preceding and following the decedent's death. Information on gift tax returns is available for the last 2 years of the decedent's life. The most recent study is based on decedents who died in 1982. The next study will be for decedents who died in 1989.
Estate Tax Returns: 1992-1994 Program	Barry Johnson	This annual study includes information on gross estate and its composition, deductions and tax; and information on the age, sex and marital status of the decedents. Basic estate tax return data by year in which returns are filed are produced every year. Other statistics are available on a year-of-death basis (approximately every 3 years). The most recent study is based on decedents who died in 1989 with returns filed in 1989-91.
Exempt Organizations Business Income Tax Returns: 1990 Program 1991 Program	Peggy Riley Sara Boroshok	This annual study includes tabulations of "unrelated business" income and deductions for organizations classified as tax-exempt under the Internal Revenue Code. The data file will also be linked with the Forms 990 and 990-PF data files of tax-exempt organizations and private foundations.

SOI Projects and Contacts

General Statistical Information: (202) 874-0410 Fax: (202) 874-0922

Project	Primary Analysts	Frequency and Program Content
Foreign Controlled Corporations: 1990 Program 1991 Program 1992 Program	John Latzy	This annual study includes data on transactions between U.S. corporations and their foreign owners. Data are classified by country and industry.
Foreign Corporations: 1990 Program 1992 Program 1993 Program	Bill States Randy Miller Maggie Lewis	This periodic study, planned for every 2 years, provides data on activities of foreign corporations that are controlled by U.S. corporations. Data are classified by industry and country.
Foreign Recipients of U.S. Income: 1991 Program	Denise Bori	This annual study provides data by country on income paid to nonresident aliens and the amount of tax withheld for the U.S. Government.
Foreign Sales Corporations (FSC): 1992 Program	Dan Holik	These corporations replaced the Domestic International Sales Corporation, or DISC, as of January 1, 1985. Balance sheet, income statement and export-related data are tabulated annually through 1987, and then on a 4-year cycle after 1992.
Foreign Trusts: 1990 Program	Randy Miller	This periodic study, conducted every 4 years, provides data on foreign trusts that have U. S. persons as grantors, transferors or beneficiaries. Data include country where trust was created, value of transfer to the trust and the year the trust was created.
Individual Income Tax Return Public Use File	Mario Fernandez	Microdata magnetic tape files, produced annually, contain detailed information obtained from the individual statistics program, with identifiable taxpayer information omitted to make the file available for public dissemination, on a reimbursable basis. (In addition to microdata files, specific tabulations from them are produced, also on a reimbursable basis.)
Individual Income Tax Returns: 1990 Program 1991 Program 1992 Program	Michael Strudler Marty Shiley	Basic data are produced annually and cover income, deductions, tax and credits reported on individual income tax returns and associated schedules, chiefly by size of adjusted gross income.
Interest-Charge Domestic International Sales Corporations (IC-DISC): 1991 Program	Dan Holik	These corporations replaced the Domestic International Sales Corporation, or DISC, as of January 1, 1985. Balance sheet, income statement, and export-related data are tabulated annually through 1987, and then on a 4-year cycle.
Intergenerational Wealth	Barry Johnson Marvin Schwartz	This on-going study involves estate returns filed since the inception of the estate tax (1916), and focuses on changes in the concentration of wealth and the intergenerational transfer of wealth, as well as the history of the estate tax system. The asset composition, available demographic information, and an analysis of beneficiaries of estates will be emphasized.

SOI Projects and Contacts

General Statistical Information: (202) 874-0410 Fax: (202) 874-0922

Project	Primary Analysts	Frequency and Program Content
International Boycott Participation: 1991 Program 1992 Program	Melissa Redmiles	This study provides data on business operations of U.S. persons in boycotting countries, as well as the requests and agreements to participate in, or cooperate with, international boycotts not sanctioned by the U.S. Government.
Migration Flow and County Income Data	Sandy Byberg	Migration flow data (based on changes in individual income tax return addresses) and county or State income data are available annually on a reimbursable basis. The most recent data are for 1990-91.
Nonprofit Charitable and Other Organizations: 1990 Program 1991 Program	Cecelia Hilgert Paul Arnsberger	This annual study includes balance sheet and income statement data for organizations classified as tax-exempt under subsections 501(c)(3)-(9) of the Internal Revenue Code. Beginning with 1989, the study will include data from the new Form 990-EZ.
Nonresident Alien Estates: 1990 Program	Randy Miller	This periodic study, planned for every 4 years, provides data on estates of nonresident aliens who had more than \$60,000 of assets in the United States. The estates are subject to U.S. estate taxation on U.S. property.
Occupation Studies	Bobby Clark Dodie Riley	This periodic study, based on availability of outside funding, is designed to classify individual income tax returns by occupation and to develop a dictionary of occupation titles that can be used to enhance the economic data of many other individual income tax return studies.
Partnership Returns of Income: 1992 Program 1993 Program	Tim Wheeler Elaina Shekhter	Basic data, produced annually, cover income statement, balance sheet, and details from supporting schedules. Data are classified chiefly by industry group.
Partnership Withholding Study: 1991 Program	Kimberly Vetto	This annual study includes data on U.S. partnership payments to foreign partners. Data are classified by country and recipient type.
Personal Wealth Study: 1992 Program	Marvin Schwartz Barry Johnson	This periodic study provides data estimates of personal wealth of top wealth-holders that are generated from estate tax return data using the "estate multiplier" technique, in conjunction with both filing-year and year-of-death estate data bases. The most recent data (1989) are based on returns filed from 1989 to 1991. The 1992 program will be based on returns filed from 1992-1994.
Private Foundations: 1990 Program 1991 Program	Alicia Meckstroth	This annual study includes balance sheets and income statements. Beginning with 1989, the study will include data on non-exempt charitable trusts.

SOI Projects and Contacts

General Statistical Information: (202) 874-0410 Fax: (202) 874-0922

Project	Primary Analysts	Frequency and Program Content
S Corporations: 1992 Program 1993 Program	Amy Gill	Annual study data are collected for the income statement, balance sheet and from supporting schedules. Data are classified by industry group or by asset size.
Sales of Capital Assets: 1985 Program 1985-1992 Panel Study	Barbara Longton Janette Wilson	This periodic study provides detailed data on the sales of capital assets reported on Schedule D of the individual income tax return, sales of residences and personal or depreciable business property. A panel study provides the same data on capital asset transactions for a subsample of the returns in the Sales of Capital Assets basic study, over a period of years.
Sales of U.S. Real Property Interests by Foreign Persons: 1992 Program	Chris Carson	This annual study will provide data on transfers of U.S. real property interests, when these interests are acquired from foreign persons. Data include the amount realized on transfers, U.S. tax withheld and the country of foreign persons.
Sole Proprietorships: 1990 Program 1991 Program 1992 Program	Jeffrey A. Hartzok	Basic program data, produced annually, cover the business receipts, deductions and net income reported on Schedule C (for nonfarm proprietors), by industry group. Similar data from Schedule F (for farmers) are available on an occasional basis.
State Data: 1985 Program 1988 Program	Mario Fernandez	Special tabulations of selected individual income, deduction and tax data by State are produced on a reimbursable basis. (The data file for 1988 is the most recent.)
Statistical Subscription Services: Corporation Source Book	Sandy Byberg	Annual data by more detailed industry groups than are used for the regular corporation statistics are produced by asset size.
Tax-exempt Bond Issues: 1991 Program 1992 Program	Marvin Schwartz	This annual study provides information on private activity and governmental bond issues by type of property financed, size of face amount and State.
Taxpayer Usage Study: 1993 Program	Laura Prizzi	Basic data, produced annually, provide weekly frequencies of specific line entries made by taxpayers, the use of various return schedules and associated forms, and general characteristics of the individual taxpayer population for returns received during the primary filing season (January through April).
U.S. Possessions Corporations: 1989 Program	Randy Miller	This periodic study, planned for every 4 years, provides data on income statement, balance sheet, tax and "possessions tax credit" data for "qualifying" U. S. possessions corporations. (Most of these corporations are located in Puerto Rico.)

Publications & Tapes

Statistical Information Services

For questions about the availability of SOI data, other statistical services, or release dates for new publications, please contact the Statistical Information Services Office on (202) 874-0410 or FAX (202) 874-0922. As its name implies, this office is best able to answer questions about data. It is not the place to call to obtain tax forms or information about the status of an individual's tax refund or audit examination. Also, all requests from the media should be directed to the IRS Public Affairs Office on (202) 622-4000.

The following *Statistics of Income* reports and tapes can be purchased from Statistics of Income (unless otherwise indicated). Prepayment is required, with checks made payable to the IRS Accounting Section. Please write:

Acting Director
Statistics of Income (CP:S)
Internal Revenue Service
P. O. Box 2608
Washington, DC 20013-2608

Business Source Books

Corporation Source Book, 1990

Publication 1053 – Price \$175.00

This 479-page document presents detailed income statement, balance sheet, tax and selected other items, by major and minor industry groups and size of total assets. The report, which underlies the *Statistics of Income—Corporation Income Tax Returns* publication, is part of an annual series and can be purchased for \$175 (issues prior to 1982 are for sale at \$150 per year). Magnetic tape or diskette containing the tabular statistics for 1990 can be purchased for \$1,500.

Partnership Source Book, 1957-1983

Publication 1289 – Price \$30.00

This 291-page document shows key partnership data, for 1957 through 1983, by major and minor industry group. It includes a historical definition of terms section and a summary of legislative changes affecting the comparability of partnership data during that period. Tables show:

- number of partnerships;
- number of partners;
- business receipts;
- depreciation;
- taxes paid deductions;
- interest paid deductions;
- payroll deductions;
- payments to partners; and
- net income less deficit.

(A magnetic tape containing the tabular statistics for partnerships can be purchased for \$300 from the National Technical Information Service, U.S. Department of Commerce, Springfield, VA 22161.) More recent partnership data are published annually in the *SOI Bulletin*.

Sole Proprietorship Source Book, 1957-1984

Publication 1323 – Price \$95.00

This *Source Book* is a companion to that for partnerships, described above. It is a 251-page document showing key proprietorship data for 1957 through 1984; data for farm proprietorships are excluded after 1980. Each page presents statistics for a particular industry. Tables show:

- number of businesses;
- business receipts;
- depreciation;
- taxes paid deduction;
- interest paid deductions;
- payroll deductions; and
- net income less deficit.

A magnetic tape containing the tabular statistics can be purchased for \$245. As with partnerships, more recent (nonfarm) sole proprietorship data are published annually in the *SOI Bulletin*.

Compendiums

Studies of Tax-Exempt Organizations, 1974-1987

Publication 1416 – Price \$26.00

This publication presents 22 articles from *Statistics of Income* studies on tax-exempt organizations. The articles emphasize important issues within the nonprofit sector, and also include several other articles previously unpublished in the *SOI Bulletin*, as well as papers published in proceedings of the American Statistical Association and the Independent Sector Research Forum. Topics featured are:

- nonprofit charitable organizations (primarily charitable, educational and health organizations);
- private foundations and charitable trusts; and
- unrelated business income of exempt organizations.

Publications & Tapes

Studies of Tax-Exempt Organizations, 1986-1992

Publication 1416 – Price \$26.00

This is the second volume in a series of *Statistics of Income* (SOI) publications on tax-exempt, nonprofit organizations. The volume includes data covering 1986-1992 and contains 12 previously-published articles from SOI studies, including articles from the *SOI Bulletin*, as well as papers prepared for the *Journal of Nonprofit Management and Leadership*, *Trusts and Estates*, the Independent Sector Research Forum, the National Research Council's Committee on National Statistics, and the American Statistical Association.

Studies of International Income and Taxes, 1984-1988

Publication 1267 – Price \$26.00

This report presents information from 13 *Statistics of Income* studies in the international area (many of them previously published in the *SOI Bulletin*), including:

- foreign activity of U.S. corporations;
- activity of foreign corporations in the United States;
- foreign controlled U.S. corporations;
- statistics related to individuals, trusts and estates; and
- data presented by geographical area or industrial activity, as well as other classifiers.

Reimbursable Services

(Prices are dependent on the request.)

Public Use Magnetic Tape Microdata Files

This includes individual income tax returns for 1979-1990. A limited number of files for 1989 are also available on CD-ROM. (Individual income tax returns for 1966-1978 are available for sale by writing to the Center for Electronic Records (NNX) of the National Archives and Records Administration, Washington, DC 20408.) Files containing more limited data for each State are also available for 1985 and 1988. All of these files have been edited to protect the confidentiality of individual taxpayers. Files for private foundations for 1982-1983 and 1985-1989 and nonprofit charitable organizations for 1982-1983 and 1985-1989 are also available from Statis-

tics of Income. The individual, private foundation and charitable organization files are the only microdata files that can be released to the public.

Migration Data

Compilations are available showing migration patterns, from where to where, by State and county, based on year-to-year changes in the tax return address. Data are also available for selected time periods (according to the years in which returns were filed) between 1978 and 1991 and include counts of the number of individual income tax returns and personal exemptions. In addition, county income totals are available for Income Years 1982 and 1984 through 1990.

Other Unpublished Tabulations

Unpublished tabulations are also available, including detailed tables underlying those published in the *SOI Bulletin*. Special tabulations may also be produced, depending on the availability of resources.

Other Publications

The following *Statistics of Income* publications are available from the Superintendent of Documents, U.S. Government Printing Office. For copies, please use the order form following this section or write:

Superintendent of Documents
P. O. Box 371954
Pittsburgh, PA 15250-7954.

If you determine from the Government Printing Office that any of the next three items is out-of-print, please telephone the Statistical Information Services Office on (202) 874-0410, for assistance.

Statistics of Income (SOI) Bulletin

Quarterly Publication 1136, Stock No. 748-005-00000-5
Subscription price, \$25.00; Single copy price, \$13.00

Provides the earliest published financial statistics from individual and corporation income tax returns. The *Bulletin* also includes annual data on nonfarm sole proprietor-

Publications & Tapes

ships and on partnerships, as well as from periodic or special studies of particular interest to tax analysts and administrators and to economists. Historical tables include data from SOI, as well as on tax collections and refunds by type of tax.

Statistics of Income - 1990, Corporation Income Tax Returns

Publication 16, Stock No. 048-004-02322-9
Price \$19.00

This report presents more comprehensive and complete data on corporation income tax returns with accounting periods ended July 1990 through June 1991, than those published earlier in the *SOI Bulletin*.

Presents information on:

- receipts;
- deductions;
- net income;
- taxable income;
- income tax;
- tax credits;
- assets; and
- liabilities.

Data are classified by:

- industry;
- accounting period;
- size of total assets; and
- size of business receipts.

Statistics of Income - 1990, Individual Income Tax Returns

Publication 1304, Stock No. 048-004-02320-2
Price \$10.00

This report presents more comprehensive and complete data on individual income tax returns for 1990 than those published earlier in the *SOI Bulletin*.

Presents information on:

- sources of income;
- exemptions;
- itemized deductions; and
- tax computations.

Data are presented by:

- size of adjusted gross income; and
- marital status.

The following *Statistics of Income* publication is available from Statistics of Income. For copies, please write to the

Acting Director at the address shown at the beginning of this section.

Turning Administrative Systems Into Information Systems

Publication 1299 - Free of Charge

This report is the latest volume in a continuation of the IRS' methodology reports series which documents technological and methodological changes in *Statistics of Income* programs and other related statistical uses of administrative records. Previous volumes in the series were called *Statistics of Income and Related Administrative Record Research*. Topics featured are:

- information from tax return data;
- the 1989 Survey of Consumer Finances;
- estimation and methodological research in SOI business programs;
- sample design and weighting issues in the SOI individual program;
- some quality improvements applications;
- some technological innovations for SOI research; and
- a look to the future data needs for the Federal sector.

SOI Electronic Bulletin Board

Since June 1992, over 320 files have been added to the SOI electronic bulletin board system (BBS) and are available for access. They include data from recent *SOI Bulletin* publications for returns covering individuals, corporations, partnerships, sole proprietorships and estates. The BBS also contains files on personal wealth and international topics, such as foreign tax credits and Controlled Foreign Corporations, as well as tax collections and refunds from the IRS administrative system.

Electronic Bulletin Board Numbers:

(202) 874-9574 (Analog - Most Users)

Systems Administrator: Jim Willis (202) 874-0408

Systems Coordinator: Jim Hobbs (202) 874-0268.

Department of the Treasury
Internal Revenue Service
Pub. 1773 (4-94)
Cat. No. 20069P