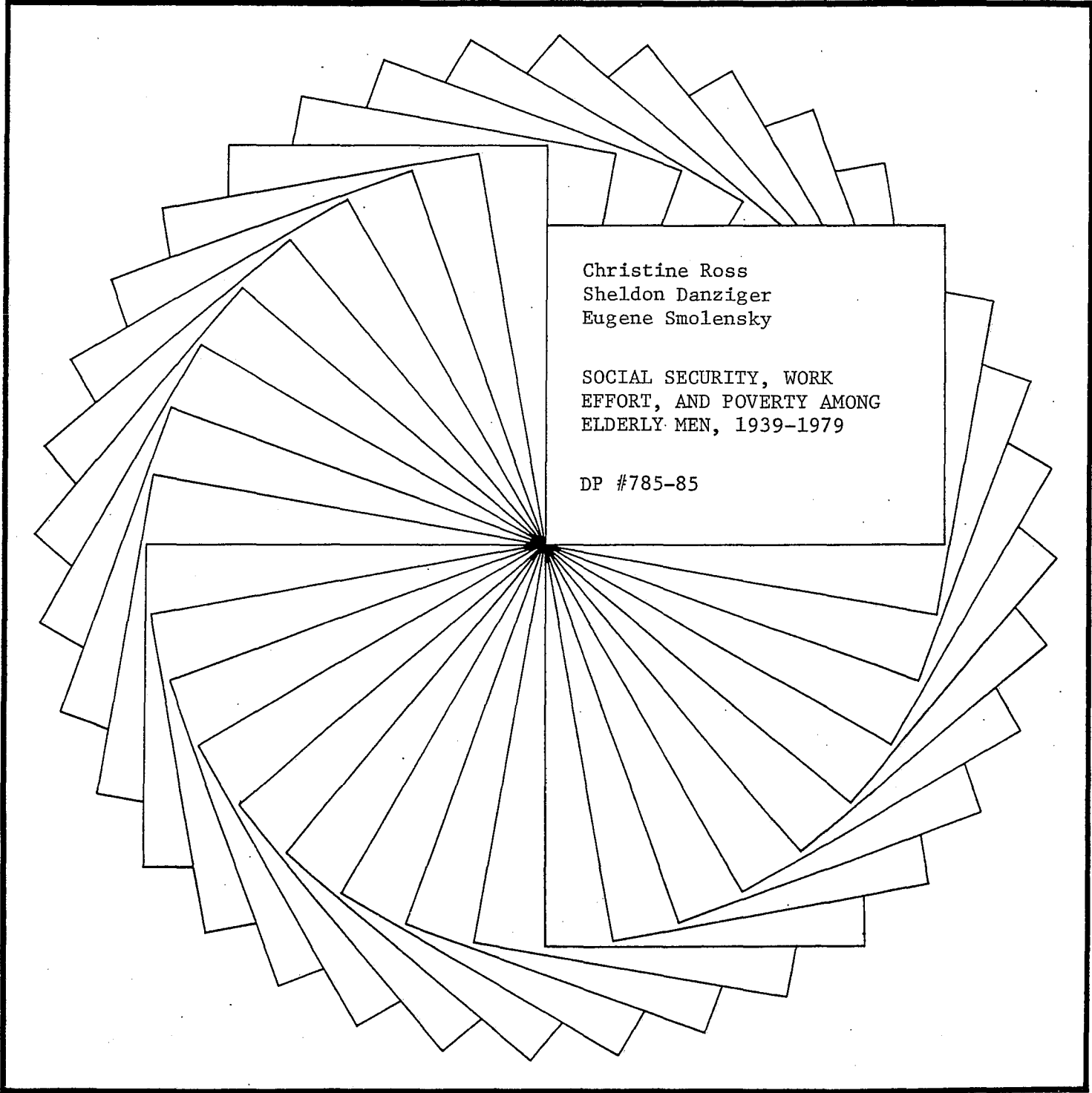

IRP Discussion Papers



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SOCIAL SECURITY, WORK
EFFORT, AND POVERTY AMONG
ELDERLY MEN, 1939-1979

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Social Security, Work Effort, and
Poverty among Elderly Men, 1939-1979

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Abstract

Employing data from the 1-in-100 sample files of the decennial censuses of 1940 through 1980, this paper addresses five issues:

1. How do earnings levels and poverty rates for different household types and cohorts compare over the period 1940-1980?
2. How generous were social security benefits to retired workers over the period? How do the benefit levels compare to the official poverty level for the retired worker's household? How do they compare to average earnings?
3. Is the decline in labor force participation among elderly men a recent (post-social security) phenomenon, or was there a decline in participation prior to 1940?
4. Among the elderly who continue working, has there been a decline in hours or weeks worked?
5. What do workers who retired between 1940 and 1980 give as reasons for their retirement? How important are economic factors relative to health and to compulsory retirement?

Our findings can be summarized as follows. In 1939, the labor force participation rate for elderly men was relatively high, at 51 percent, as was their poverty rate based on wage and salary income, at 77 percent. By 1979, labor force participation of this group had declined to 27 percent, yet their poverty rate based on wage and salary income was still high, at 71 percent. Their poverty rate based on total cash income, however, had fallen to 10 percent.

Median earnings for all male wage and salary workers more than doubled in real terms from 1940 to 1980, but the average social security benefit for a retired worker and his wife nearly tripled in the same period. This average benefit was 50 percent of the poverty line for an elderly couple in 1940, and 134 percent of that poverty line in 1980.

Male cohorts retiring in later years had higher real lifetime earnings before retirement than those in previous cohorts. If we assume the marginal propensity to consume is constant across individuals and time periods, the later cohorts would also be expected to have saved higher real amounts for their retirement than would earlier cohorts.

Labor force participation among men aged 65 to 71 declined from 60 percent in 1940 to 36 percent in 1980. Average hours worked per week among those still working fell from 44 to 33, a 25 percent decline. Average weeks worked fell from 46 to 38, an 18 percent decline. Participation, hours, and weeks worked also fell for the group aged 62 to 64, but by smaller percentage amounts.

Retirees surveyed in 1941-1942 reported as significant reasons for retirement that they had lost their jobs (56 percent) or quit due to poor health (34 percent). In 1982, only 17 to 20 percent of retirees reported that they had lost their jobs, and only 17 to 30 percent retired owing to poor health. The greatest proportion of retirees in that year--37 percent of men aged 62-64 and 47 percent of men 65 and over--retired to enjoy leisure ("wanted to retire; tired of working") which, as the other findings of this paper indicate, they were increasingly able to afford. In sum, able-bodied men aged 62 could, by the 1970s, retire on their social security benefits alone and could, on average, avoid poverty as they did so.

The increased likelihood that an elderly person will retire in the year since social security benefits began to be paid continues a trend that dates back to at least 1900. Perhaps the most important contribution of social security to this trend is that to an increasing extent social security could be chosen solely on economic grounds.

Social Security, Labor Force Participation, and
Poverty among Elderly Men, 1939-1979

Rising real lifetime incomes and government cash transfer programs that have grown in both size and scope have combined over the past forty years to improve the economic status of the elderly along two dimensions: the level of current income and the amount of leisure time chosen after age 62. This paper uses data from the public use microdata files of the U.S. decennial censuses of 1940 through 1980 to analyze changes in the relative economic status of the elderly. The first section discusses the measurement of economic status, the second describes the data, and the third reviews trends in poverty and labor force participation for the elderly and nonelderly. Since poverty among the elderly declined even though labor force participation declined, the next section examines increases in social security benefits and other income sources over this 40-year period; the fifth section discusses trends in leisure. In those last two sections, we focus on the paradoxical decline in labor force participation and increase in current incomes of men, since it is among men that these particular changes occur. We leave it to future work to discuss the different dynamics affecting the incomes of elderly women.

THE MEASUREMENT OF ECONOMIC STATUS

Because of the obvious importance of voluntary leisure to the elderly, the best measure of their economic status for comparing economic well-being across time and across groups is utility rather than income.

A general formulation of individual utility would include consumption and leisure as goods, purchased with available time and income. An alternative measure assumes that utility-maximizing consumers are always on their budget constraints. If we quantify "full income," the choices made by individuals with respect to consumption and leisure yield a measure of the resources that an individual commands. This individual resource constraint may form the basis for comparisons of economic welfare. A measure of individual resources would ideally include current income, the annuitized value of wealth, in-kind transfers, the income foregone by choosing leisure time, and the value of home production. To compare this measure of resources across time and across households, it should be standardized by needs, which may depend on family size, disability, age of household members, location of residence, and price levels among other things.

THE CENSUS DATA

The data we have--the 1-in-100 sample files of the decennial censuses of 1940 through 1980--do not permit such a comprehensive measure. The extent of information on current income in the censuses varies over the forty-year period. In 1940, information was obtained on the amount of wages and salaries received by each person in 1939, and whether or not that person received more than \$50.00 in income from other sources, indicated by a variable equal to zero or one. The other sources of income could include interest, dividends and rent, self-employment income, and government transfers, but are lumped together without specification. Thus, the 1940 census yields useful information about the

returns to labor market activity, but only sketchy information about other receipts.

How much can data on wage and salary income alone tell us about the current income position of the household? Table 1 shows aggregate personal income and its components from the National Income Accounts for the five census years. Wages and salaries have been a stable share of personal income over the entire period, at approximately 65 percent. Transfer payments, which are largely from government sources, rose from 4 to 12 percent of personal income, with half of that growth occurring between 1969 and 1979. While census data on wages and salaries provide information on about 65 percent of current income in each of the five census years, we do not know either the distribution of total income in the population or the share of wage income in total income of any particular household.

The 1950 and 1960 data again provide information on wages and salaries, but add data for, separately, self-employment income and nonearned income. Nonearned income includes government cash transfers, interest and dividends, and income from other regular sources. In 1970, information on nonearned income is separated into the categories social security income, public assistance income, and all other income. In 1980, property income is separated from other nonearned income so that the following sources of income are reported separately: wages and salaries; self-employment; interest, dividends and net rental; social security; public assistance and "other," including alimony or child support, private or public pensions, unemployment insurance, workers' compensation, veterans' benefits, and periodic income other than earnings.

Table 1

Personal Income and Its Components, 1939-1979
(in billions of current dollars)

	1939	1949	1959	1969	1979
<u>Personal Income</u>	\$72.4	\$205.6	\$382.1	\$754.7	\$1,951.2
Wages and salaries	46.0	134.8	258.9	515.7	1,237.6
Proprietors' and other labor income	12.3	39.1	57.9	95.6	247.0
Rents, dividends, interest	11.7	21.5	46.3	103.1	297.4
Transfer payments, including government	3.0	12.5	27.0	66.7	250.3
Government transfers	2.5	11.7	25.2	62.7	239.9
Less contribution to Social Insurance	0.6	2.2	7.9	26.2	81.1
<u>Percentage of Personal Income^a</u>					
Wages and salaries	63.5%	65.6%	67.8%	68.3%	63.4%
Proprietors' and other labor income	17.0	19.0	15.2	12.7	12.7
Rents, dividends, interest	16.2	10.5	12.1	13.7	15.2
Transfers payments, including government	4.1	6.1	7.1	8.8	12.8
Government transfers	3.5	5.7	6.6	8.3	12.3

Source: For 1939, 1949, 1959, and 1969 figures, U.S. Department of Commerce, Bureau of Economic Analysis, The National Income and Product Accounts of the United States, 1929-74 (1977), pp. 334, 66-67, 327, and 22-23. For 1979, U.S. Department of Commerce, Bureau of Economic Analysis, Business Statistics, 1982, (November 1983), p. 1, and Survey of Current Business, vol. 61, no. 1 (January 1981), p. 14.

^aThe percentages do not sum to 100 because government transfers are a part of all transfer payments (and because of rounding error).

While the 1980 data provide the most complete information about sources of income and labor market choices, many broad comparisons across census years are possible. Between 1950 and 1980, we can compare total income, and wages and salaries may be compared across the entire period. Each census also contains information on hours and weeks worked, employment status, and a number of demographic characteristics. While the data can support research on a wide range of questions, we concentrate on the decline in poverty that accompanied the decline in the labor force participation of the elderly.

In our empirical work, we define a household as an income-sharing unit, and include only those members of the household related to the head by birth, marriage, or adoption. Unrelated individuals age 15 and over and secondary families are counted as separate households. Subfamilies are considered as part of the primary family. This definition of a household is consistent with the Census Bureau's definitions of "family" and "unrelated individual," and we use it to describe units of both types.

We classify households by the age of the household head. As a result, not all of the elderly are included. To do so requires an analysis of elderly persons and a decision rule for assigning income to those elderly who live in households headed by the nonelderly. For example, should one assume that an elderly parent shares equally in the family income of his or her adult child who is the household head? Because of the difficulty in choosing among a variety of decision rules, we consider only elderly household heads. In 1940, 21 percent of the elderly lived with nonaged household heads; by 1980 this percentage had fallen to 9. The remaining proportion of the elderly were either heads of households

or living with other elderly heads of households. The percentage of all of the elderly who were heads of households in each year increased only slightly over the 40-year period, from 62 percent in 1940 to 69 percent in 1980.

In 1950, a more restrictive sample than the 1-in-100 is available. In that census, only a 5 percent sample of persons (rather than of households, as in the other censuses) was asked to report income. Household income information was obtained only from household heads; all other family members reported only individual income. Therefore, we only have household income information for household heads and unrelated individuals.*

EARNINGS AND POVERTY, 1940-1980

We begin with an overview of poverty rates, average labor earnings, and labor force participation of the elderly and nonelderly in the five census years. By 1939, the Social Security Act had been in place for four years, but no benefits had yet been paid (benefits were first paid in 1940). We therefore assume that all behavioral responses to the social security program which affect well-being--both labor supply and savings decisions--occurred after that year. In terms of macroeconomic activity, unemployment in 1939 was high, at 17.2 percent, but the year

*This restriction does not require us to weight observations, even though persons composed the sample frame. A person from a particular household is drawn into the sample with probability NH/NP , where NH is the number of persons in the household, and NP is the total number of persons. The probability that this person is the household head is $1/NH$. Therefore, the probability that the household head of any particular household is drawn into the sample is $1/NP$. This means that each household head has the same probability of being drawn into the sample, so it is random with respect to heads, and no weights are required.

was characterized by recovery from the decline of 1937-38. The wartime boom in production and income had not yet begun. Thus, in 1939, we measure real incomes at a point prior to the wartime and postwar growth of income and social security benefits.

In Table 2, labor force participation rates, mean wages and salaries, and poverty rates are shown for the elderly and nonelderly, grouped according to the age and sex of the household head. A household head is classified as being in the labor force here (and in Table 7) if she or he worked a positive number of weeks in the income year (the year prior to the census). Our definition is not strictly comparable to the usual Bureau of Labor Statistics (BLS) definition, since we do not include unemployed persons who are actively seeking employment at some point in that year as in the labor force. We do this because weeks worked (and not weeks looking for work) is the only measure of annual labor force participation in the census. The census does have other information on labor force behavior for the week preceding the April census survey. However, because we want information on labor force participation and household income to cover the same time period, we use weeks worked to define participation.*

In 1939, about 95 percent of nonelderly men and half of elderly men worked some positive number of weeks. About 60 percent of nonaged female household heads worked in 1939, while only about 10 percent of elderly

*The differences between the conventional labor force participation rate based on data for the week preceding the survey and the rate based on weeks worked last year were never more than 5 percentage points for the nonelderly and 11 percentage points for the elderly. The differences were both positive and negative, and usually were about 3 percentage points.

Table 2
 Labor Force Participation, Earnings, and Poverty among
 Households Classified by Age and Sex of the Head, 1939-1979

Household Head	Labor Force Participation Rate of Household Heads ^a (1)	Households with Wage and Salary Income		Poverty Rates, All Persons	
		Percentage of all Households ^b (2)	Mean Wages and Salaries Relative to Poverty Line ^c (3)	Wage and Salary (4)	All Cash Income Sources ^d (5)
<u>1939</u>					
Men					
15-64	93.0	78.9	1.20	66.1	n.a.
65+	51.3	45.8	1.15	77.3	n.a.
Women					
15-64	61.0	67.4	0.98	75.3	n.a.
65+	13.2	36.0	1.10	76.3	n.a.
<u>1949</u>					
Men					
15-64	93.0	81.0	1.59	48.3	35.3
65+	49.9	44.1	1.41	72.2	55.7
Women					
15-64	64.0	65.7	1.26	68.0	61.1
65+	16.1	26.5	1.10	82.6	71.4
<u>1959</u>					
Men					
15-64	96.2	88.3	2.30	28.8	17.3
65+	44.8	45.1	1.97	66.8	31.2
Women					
15-64	72.1	72.9	1.69	59.9	49.9
65+	20.8	31.1	1.61	73.6	51.7
<u>1969</u>					
Men					
15-64	95.1	92.3	3.15	17.0	8.9
65+	37.9	42.7	2.51	67.1	20.9
Women					
15-64	75.0	77.4	2.07	52.3	40.5
65+	19.3	26.3	1.99	77.1	42.6

table continues

Table 2, continued

Household Head	Labor Force Participation Rate of Household Heads ^a (1)	Households with Wage and Salary Income		Poverty Rates, All Persons	
		Percentage of all Households ^b (2)	Mean Wages and Salaries Relative to Poverty Line ^c (3)	Wage and Salary (4)	All Cash Income Sources ^d (5)
<u>1979</u>					
Men					
15-64	91.8	91.1	3.48	17.3	8.3
65+	27.3	37.3	2.35	71.3	10.1
Women					
15-64	77.1	79.4	2.18	48.1	35.9
65+	13.4	20.9	1.89	80.5	25.0

Source: Computations by authors from Public Use Samples of the Censuses of 1940, 1950, 1960, 1970 and 1980.

^aDefined as proportion of household heads working a positive number of weeks in the income year.

^bThe percentage in column 2 can exceed that in column 1 because there are households in which the head is not in the labor force, but in which some other household member is receiving wage and salary income.

^cAverages of wages and salaries relative to needs are computed only for households with positive values; if the mean ratio is less than 1.0, the typical household in the demographic group is in poverty.

^dPoverty rates are based on household income for all persons. Thus a household with a self-employed head and no wage or salary workers would be counted as poor in column 4, regardless of how high its self-employment income.

women worked. In spite of this relatively high rate of labor force participation among the nonelderly, 1939 wage and salary poverty rates were almost as high for them (66.1 percent) as for the elderly (77.3 percent). A household is considered poor if its income (in this case, wage and salary income only) falls below the official poverty line for that year. The official poverty cutoffs vary by the size of the household and the age and sex of the head, and they have been brought forward each year since the mid-1960s according to changes in the Consumer Price Index (CPI). We have extrapolated these official lines back to 1939 with the CPI. (See Appendix for further discussion of the poverty cutoffs used in this paper.)

Poverty rates based only on wages and salaries overstate the amount of poverty because many sources of income are excluded: self-employment income, property income, and government transfer income. But the true poverty rates in 1939 were certainly relatively high because unemployment was high and because wage and salary income was well below the poverty line for many persons with earnings.

The third column of Table 2 shows average household wages and salaries relative to the poverty line. Because the poverty line is adjusted for prices each year, income relative to the poverty line is a measure of real income which can be compared across years. Since the poverty lines also vary by household size, this income-to-needs measure allows comparisons across households, as well. A ratio of less than one indicates a mean below the poverty line. For all four groups in 1939, the average is just at or above the poverty line.

We look at wages and salaries in column 3 because we want to describe the trend over the 40-year period in household income, and only wages and

salaries are available over the entire period.* The proportion of households included in the calculation of mean wage and salary income is given in column 2. The percentage in column 2 does not equal the percentage in column 1 because either the head is working but not at a wage and salary job, or because the head is not working but someone else in the household earns wage and salary income.

By 1959, average wage and salary income (for those with nonzero wages and salaries) relative to needs for each group had increased considerably. All groups then earned one and one-half to twice their needs from that source. As a result of this increase, the wage and salary poverty rate for all persons in 1959 is lower than in 1939 for all groups, particularly for the nonelderly. Since most elderly household heads did not earn wage and salary income, their poverty rates remained in the 70 percent range.

The addition of other sources of cash income, available in the censuses since 1949, reduces poverty considerably (compare columns 4 and 5). Yet in 1959 one-third of all households headed by elderly men and half of those headed by elderly women were poor. The income poverty rates for nonelderly men and women were about 17 and 50 percent, respectively.

*Zeros are omitted from the calculation of the mean income-to-needs ratio in column 3 because households with substantial self-employment income may have zero wage and salary income. Because these zeros do not accurately describe the household's level of resources, we do not want them to artificially reduce the mean. And since in 1940 it is impossible to distinguish "true" zero income households from households with income other than wages and salaries, we omit all zero wage and salary households from the calculation of the mean.

Both real incomes and the size of government social insurance transfers to the elderly increased between 1959 and 1979, and their effects are reflected in the poverty rates as early as 1969. A larger proportion of households headed by nonelderly men earned wage and salary income in 1969 (92 percent in column 2) than in any previous year, and the average amount earned by these households was 3.15 times the poverty line. Wage and salary poverty for nonelderly men in that year was 17 percent; based on all income it was 8.9 percent. Other groups earned about twice the poverty line if they had wage and salary income. But since fewer of the elderly household heads worked (though in some cases, someone in the household did work), their wage and salary poverty was higher in 1969 than in 1959. The figures for 1979 are similar to those of 1969, but with slightly lower average earned income among the elderly, higher average earned income for the nonelderly, and almost the same rate of wage and salary poverty.

When transfers and other sources of income are added to earned income, the poverty rates in 1969 fall to 20.9 percent for elderly men and 42.6 percent for elderly women. By 1979, posttransfer poverty among the elderly was even lower--10.1 percent for elderly men and 25.0 percent for elderly women. This is a substantial improvement over the 1959 rates, and it reflects both the increased benefit levels of social security as well as increased property income resulting from higher real earnings over the person's lifetime.

Thus, in 1939 the aged and nonaged were equally likely to be poor and the rate was very high. By 1959, poverty of nonelderly men had fallen substantially because of increased real earnings. Even though they retired in greater numbers (column 1), poverty among the elderly also

fell because of increased transfers and property income (column 5). However, the rate for elderly men was twice that of their nonelderly counterparts. In 1979, the incidence of poverty for elderly men had fallen by two-thirds since 1959 and was only slightly above that of nonelderly men. While the poverty rate for elderly women was much higher than for men, it was nonetheless lower than for nonelderly women. The data seem to imply that rising wages were responsible for the dramatic reduction in poverty for nonelderly men, while rising nonearned income (including government transfers, pensions, and property income) was responsible for the substantial gains of elderly men and women.

THE GROWTH OF SOCIAL SECURITY AND OTHER NONEARNED INCOME, 1940-80

We now turn to an examination of the growth in social security benefits over the 1940-80 period. Because we do not have detailed microdata on nonearned income, we also examine the growth in labor earnings since the nonearned income of the retired will be related to their prior earned income. Table 3 compares social welfare expenditures and social security expenditures in each of the census years to the Gross National Product. Social security expenditures include benefits paid to disabled and retired workers and their survivors and dependents under all of its component programs: disability and hospital insurance as well as retired worker benefits. Social security has grown not only relative to GNP, but also as a percentage of all social welfare expenditures. Very little of that growth occurred between 1940 and 1950. Social security expenditures relative to GNP increased from 0.27 to 2.18 percent between 1950 and 1960, and to 5.78 percent by 1980. As a share of all social spending,

Table 3

The Gross National Product, Social Welfare Expenditures,
and Social Security Expenditures, 1940-1980
(current dollars)

Year	Gross National Product (in billions) ^a	Social Welfare Expenditures under Public Programs (in billions) ^b	Social Security (OASDHI) Expenditures (in millions) ^c	Social Security as % of GNP	Social Security as % of All Social Welfare
1940	100.0	8.8	40.4	0.04	0.5
1950	286.5	23.5	784.1	0.27	3.3
1960	506.5	52.3	11,032.3	2.18	21.1
1970	992.7	145.9	36,835.4	3.71	25.2
1980	2,631.7	492.5	152,110.4	5.78	30.9

^aU.S. Department of Health and Human Services, Social Security Administration, Social Security Bulletin, Annual Statistical Supplement, 1983, Table 1, p. 59; and U.S. Department of Commerce, Bureau of the Census, Statistical Abstract of the United States, 1982-83 (December 1982), Table 689, p. 418.

^bStatistical Abstract of the United States, 1982-83, Table 512, p. 313, and Social Security Bulletin, Annual Statistical Supplement, 1983, Table 1, p. 59.

^cSocial Security Bulletin, Annual Statistical Supplement, 1983, Table 2, p. 60.

they increased from 3.3 to 21.1 percent between 1950 and 1960 and to 30.9 percent by 1980.

Table 4 shows, in the first three columns, real median wages and salaries for all men, the percentage of elderly men who have retired, and real average annual social security benefits for a worker and his wife. The last two columns show the ratio of social security to median male earnings and to the poverty line for an elderly couple. Social security benefits and the percentage of elderly men retired changed very little between 1940 and 1950. However, real median earnings increased by over 50 percent. As a result, benefits increased from 50 to 57 percent of the poverty line for two elderly adults, but declined from 45 to 33 percent of median male earnings.* Between 1950 and 1960, real social security benefits increased by about 40 percent and real earnings by about 25 percent; social security benefits increased to about 80 percent of the poverty line, which is constant in real terms for the entire period. Between 1960 and 1970, benefits and earnings each increased by about 20 percent. There was another period of rapid growth of benefits between 1970 and 1980--benefits grew by about 35 percent while real earnings declined by 7 percent. As a result, the average benefit for a worker and wife was 1.3 times the poverty line and 55 percent of median earnings.* It may be this large rise relative to both the poverty line and to real earnings that has generated much political dissatisfaction with social security.

Given the assumption that the poverty line specifies a minimum annual retirement income for the elderly, the mean social security benefits can

*Median earnings are for all male wage and salary workers, including those of all ages working part time and part year.

Table 4

Earnings, Labor Force Participation, and Social
Security Benefits, 1940-1980
(constant 1980 dollars)

Year	Median Wage and Salary of Earnings of Male Workers ^a (1)	Percentage of Men 65+ Retired ^b (2)	Mean Annual Social Security Benefit, Worker and Wife ^c (3)	Ratio of Mean Social Security Benefit to	
				Male Median Earnings ^d (4)	Poverty Line (5) ^e
1940	\$5,494	58.2%	\$2,492	.45	.50
1950	8,667	58.6	2,845	.33	.57
1960	10,782	69.5	4,026	.37	.81
1970	13,100	75.2	4,882	.37	.99
1980	12,128	80.1	6,632	.55	1.34

^aU.S. Department of Health and Human Services, Social Security Administration, Social Security Bulletin, Annual Statistical Supplement, 1983, Table 22, p. 80. Computed for wage and salary workers only. Includes workers of all ages, and those working part-time or part-year.

^bU.S. Department of Commerce, Bureau of the Census, Historical Statistics, Colonial Times to the Present (1976), Series D, pp. 29-41.

^cSocial Security Bulletin, Annual Statistical Supplement, 1983, Table 78, p. 153. Mean computed for social security recipients only.

^dComputed as column 3 / column 1.

^eThe poverty line for an elderly couple is about \$4950 in 1980 dollars for each year.

be viewed as having changed from a retirement supplement paying half of the minimum in 1940 to a minimum guaranteed income by 1970 and well beyond the minimum by 1980. If one were to value the benefits the elderly have received from Medicare since 1965, their gains relative to both the poverty line and median male earnings would be even greater. Similarly, their relative well-being would increase if we valued the increased leisure associated with increased retirement.

The social security system is on a pay-as-you-go basis, so the trend in real earnings in column 1 of Table 4 is overstated because we have not subtracted the growing payroll tax.* And, because tax rates were so much lower in the earlier than the later years, the unprecedented rise in social security benefits relative to earnings between 1970 and 1980 represents a direct transfer from workers to the retired.

Table 5 shows that male cohorts retiring in later years also had higher real lifetime earnings prior to retirement than those in previous cohorts. Since we have divided earnings by the poverty line, the ratios shown represent real values. These averages are computed for those with positive values only, so they describe only households with wage and salary workers. Because we do not have detailed data on the non-government-transfer, nonearned income of the elderly, we use their previous earnings as an indicator of differences in amounts of savings by different cohorts. For example, those born between 1886 and 1895 who were 64-73 years in 1959 had earnings in 1959 that were 2.05 times the poverty line. Twenty years earlier, the men in this cohort averaged only 27

*The employee and the employer each pay half of the payroll tax. The employee shares were 1.0, 1.5, 3.0, 4.8, and 6.13 percent of annual earned income in 1940, 1950, 1960, 1970 and 1980, respectively.

Table 5

Average Male Household Wages and Salaries Relative
to the Poverty Line, 1939-1979

Household Head	1939	1949	1959	1969	1979
Male, born before 1855	0.97				
1856-1865	1.06	1.08			
1866-1875	1.17	1.16	1.68		
1876-1885	1.27	1.46	1.59	2.35	
1886-1895	1.27	1.75	2.05	2.08	2.09
1896-1905	1.24	1.77	2.71	2.59	1.98
1906-1915	1.16	1.58	2.61	3.73	2.43
1916-1925	0.82	1.51	2.29	3.70	4.05
1926-1935		1.15	2.11	3.08	4.16
1936-1945			1.46	3.01	3.60
1946-1955				1.91	3.30
1956-1965					2.09

Source: Computations by authors from Public Use Samples of the Censuses of 1940, 1950, 1960, 1970 and 1980.

Notes: Means are computed on positive values only. The first number in each column is the mean for household heads 84 years and over in the particular income year; the last number in each column is the mean for household heads aged 14 to 23.

percent more than the poverty line. Thus, we expect them to have accumulated relatively little during their working years. However, those born between 1906 and 1915 who were 64-73 in 1979 had earnings twenty years earlier which were already 2.61 times the poverty line, leaving them much more room to save for retirement. For example, if we assume that the marginal propensity to consume out of permanent income is a constant and that the income-to-needs ratios of Table 5 measure permanent income, then real savings for the 1906-15 cohort would be about twice that of the 1886-95 cohort.

THE RELATIVE LEISURE OF THE ELDERLY, 1940-1980

The amount of leisure available to the elderly has increased substantially because life expectancy has increased, retirement after age 65 has increased, and early retirement has increased. Table 6 shows that the expected length of life for men age 65 increased less than 1 percent, from 76.4 to 76.9 years, between 1900 and 1940. Between 1940 and 1980, expected years increased by 18 percent, from 76.9 to 79 years.

Labor force participation of men over 65 declined before 1940 as well as afterward. The rate fell from 63.1 in 1900 to 41.8 in 1940. Between 1940 and 1980 it fell another 20 percentage points, to 19.0. Clearly, the decline over the 1940 to 1980 period was not entirely due to social security, but to some degree was a continuation of the earlier trend. Factors involved in the retirement decision include the availability of income from sources other than own earnings, the individual's health, and the difficulty of finding employment in the event of layoff or compulsory retirement. Since 1940, sources of income other than

Table 6

The Leisure of the Elderly: Life Expectancy and Retirement

	Expectation of Life at Age 65 for Men ^a	Civilian Labor Force Participation Rates: Men Aged 65 and Over ^b
1900	76.4	63.1
1920	76.8	55.6
1930	76.8	54.0
1940	76.9	41.8
1945	77.6	48.7
1950	77.8	41.4
1955	78.1	39.6
1960	77.9	30.5
1965	77.9	27.9
1970	78.1	24.8
1975	78.7	21.6
1980	79.0	19.0

^aU.S. Department of Health and Human Services, Social Security Administration, Actuarial Study No. 89, "Life Tables for the United States: 1900-2050," December 1983, Table 5, pp. 69-71.

^bU.S. Department of Commerce, Bureau of the Census, Historical Statistics, Colonial Times to 1970 (1976), Series D, pp. 29-41, and Statistical Abstract of the United States, 1982-83 (December 1982), Table 626, p. 377.

social security continue to be important to retirement decisions, but are more difficult to sort out empirically. The pre-1940 decline in labor force participation is much clearer evidence supporting the proposition that increases in real income available from a variety of possible sources caused a decline in labor force participation, independent of the effect of increases in social security.

Table 7 documents changes by age cohort in labor force participation rates, average hours worked per week and average weeks worked per year for those working. Labor force participation, measured as having worked one or more weeks in the year prior to the census, declined very little between 1940 and 1980 for the nonelderly, but by large percentage amounts for household heads over age 62. Similarly, average weekly hours of work among those working declined for all cohorts, but more for the elderly than for the nonelderly. Average weeks worked declined for the elderly, but not for the nonelderly. The declines among early retirees (62-64 years) in the dimensions of labor force participation measured here were concentrated in the 1960-1980 period, primarily because the early retirement option was first added to social security in 1961.

We now turn to the self-reported reasons given by the elderly for this increased retirement. Table 8 presents the findings of five surveys of retirees, conducted between 1941 and 1982 by the Social Security Administration. These surveys support the proposition that economic factors have become increasingly important in explaining the increased

Table 7

Labor Force Participation and Hours and Weeks Worked
among Male Heads of Households, 1940-1980

Age Cohort	1940	1950	1960	1970	1980	Percentage Change, 1940-80
Labor Force Participation^a						
15-34	95.7	93.4	97.5	96.4	95.4	-0.3
35-44	95.5	96.1	98.4	98.0	95.8	-0.3
45-54	92.2	93.6	96.8	96.0	92.0	-0.2
55-61	86.6	88.1	91.5	90.6	82.7	-4.5
62-64	78.7	82.1	83.6	79.6	64.7	-17.8
65-71	60.3	63.0	56.9	51.6	36.4	-39.6
72+	31.7	32.5	29.8	23.4	17.4	-45.1
Average Hours Worked Per Week^b						
15-34	46.4	45.7	43.9	42.4	43.3	-6.7
35-44	46.6	46.6	45.5	45.0	45.0	-3.4
45-54	46.9	46.2	44.9	44.2	44.4	-5.3
55-61	44.3	45.3	43.6	43.0	43.0	-2.9
62-64	43.9	44.6	42.4	40.9	40.7	-7.3
65-71	44.2	43.6	38.4	35.3	33.3	-24.7
72+	44.5	40.3	35.1	32.5	30.4	-31.7
Average Weeks Worked Last Year^b						
15-34	44.4	45.2	45.2	44.7	45.1	1.6
35-44	45.7	47.3	47.9	48.9	48.8	6.8
45-54	45.2	46.6	47.0	48.4	48.8	8.0
55-61	47.0	45.5	45.8	47.4	47.9	1.9
62-64	46.9	44.8	44.6	44.8	44.2	-5.8
65-71	46.4	42.3	38.5	37.4	38.1	-17.9
72+	45.1	40.5	36.8	35.5	37.1	-17.7

Source: Computations by authors from Public Use Samples of the Censuses of 1940, 1950, 1960, 1970 and 1980.

^aDefined as the proportion of household heads working a positive number of weeks in the year prior to the census.

^bAverages are based on those with positive values only. Hours are reported for the week preceding the census survey. Weeks are actual weeks worked the year prior to the census.

Table 8

Findings of Surveys of Retirees, Conducted by Social Security Administration, 1941-1982
(percentage of respondents)

Reasons for Termination of Employment	Survey	Survey	Survey 1963, Male Wage and Salary Workers ^c			Survey 1968, Newly Entitled Beneficiaries ^d		Survey 1982, Newly Entitled Beneficiaries ^e	
	1941-42, Men Aged 65+ ^a	1951-52, Men Aged 65+ ^b	SS Beneficiaries 62-64	65+	Nonbenef. 65+	Men Aged 62-64	Men Aged 65+	Men Aged 62-64	Men Aged 65+
<u>Quit Job</u>	44.4	54.3	58	63	65	84	57	83.3	80.4
Health	33.9	40.8	42	35	36	54	23	29.0	17.3
Other personal reasons:	10.5	13.5	16	27	29	30	34	54.3	63.1
Leisure	4.7	3.8	11	19	22	20	29	36.5	46.9
Dislike job or employer	3.1	—	1	1	—	4	2	1.5	0.9
Strike	0.1	—	—	—	—	—	—	—	—
Needed at home	0.6	—	n.a.	1	—	3	1	2.8	2.5
Other ^f	2.0	9.7	4	6	7	1	1	9.2	7.0
Pension eligibility	—	—	—	—	—	2	1	4.3	5.8
<u>Lost Job</u>	55.7	44.0	40	38	35	16	42	16.7	19.6
Retired by company retirement age	10.2	10.7	3	20	17	3	36	5.2	12.9
Other company reasons:	45.5	33.3	37	17	18	13	6	11.5	6.7
Job discontinued	n.a.	20.5	18	8	8	13	6	11.5	6.7
Considered unable to work by employer	n.a.	6.6	11	5	6	—	—	—	—
Other	n.a.	6.2	8	4	4	—	—	—	—

notes on continued page

Table 8, continued

Note: Dash indicates question not asked; "n.a." indicates numbers responding was too small to record.

^aE. C. Wentworth, "Why Beneficiaries Retire," Social Security Bulletin (January 1945), pp. 18-20.

^bM. L. Stecker, "Do Beneficiaries Retire? Who Among Them Return to Work?" Social Security Bulletin (May 1955), pp. 3-12.

^cE. Palmore, "Retirement Patterns among Aged Men: Findings of the 1963 Survey of the Aged," Social Security Bulletin (August 1964), pp. 3-10.

^dV. Reno, "Why Men Stop Working At or Before Age 65: Findings from the Survey of New Beneficiaries," Social Security Bulletin (June 1971), pp. 3-17.

^eS.R. Sherman, "Reported Reasons Retired Workers Left Their Last Job: Findings From the New Beneficiary Survey," Social Security Bulletin (March 1985), pp. 22-30.

^fIn the first three surveys, the category "Other" included voluntary reasons (such as "Strike," "Tending Sick Spouse," and "Disliking Job") that were not allocated to the preceding categories.

leisure of the elderly.* The dates of the surveys correspond roughly to the five census years.

The reasons given by survey respondents for termination of employment correspond roughly to the voluntary and involuntary reasons, "I quit my job," and "I lost my job." In the earliest years, 1941-42 and 1951-52, the responses to the surveys are very similar. Very few (4 to 5 percent) cited increased leisure time as a significant reason for retirement. Health was a very important factor in voluntary retirement (more so in 1950 than in 1940). If we recall from Table 4 the low levels of social security benefits available in those years, we can understand that the social security program in 1940 and 1950 offered little inducement to retire. So it is not surprising that factors like health and involuntary loss of job were more significant for the retirement decision. Among involuntary reasons for retirement, reaching the company retirement age was a stable 10 to 11 percent in both years.

The 1963 survey included men aged 62 to 64 who were recently permitted to retire early at reduced benefit levels. Among this group, health was relatively more important and leisure less important than for

*The five surveys are not strictly comparable, since the populations that were sampled are not the same (newly entitled beneficiaries, retired beneficiaries, beneficiaries in particular cities, etc.), and the questions and survey formats were not identical across surveys. However, as surveys of men at or above retirement age on the reasons for retirement, they are more or less representative of prevailing attitudes toward retirement, and it is in this spirit that we compare them.

the group 65 years and over in the same year. As might be expected, reaching company retirement age was of very small importance to this younger group. However, "job discontinued," and "considered unable to work by employer," were more significant than they were for the older group. Thus, in the early years of age-62 retirement, most of the men taking advantage of the relaxed provisions had self-reported health or employment problems (or thought these were the socially acceptable answers).

In the 1963 survey of men over 65, the interesting comparison in considering social security effects is between beneficiaries and non-beneficiaries. The two groups retired for voluntary and involuntary reasons in approximately the same proportions. In fact, there is very little difference in motivation between them. For both groups, leisure is quite a bit more important than it was in the earlier years, and health is about as important as before. Reaching company retirement age is twice as important in 1963 as in 1950 or 1940. The world is clearly different in 1963 as compared to 1940 and 1950 for noncovered as well as covered retirees. One would expect that the retiring nonbeneficiaries had private pension income upon which to draw.

By 1968, the differences between early retirees and over-65 retirees are sharp. Early retirement is overwhelmingly for voluntary reasons (84 percent), mostly on grounds of health, and in considerable part for leisure. The rise in the proportion citing health as a reason probably means that it was still not socially acceptable to retire early simply to enjoy more leisure. This presumption is reinforced by the decline in the percentage of those over 65 who cited poor health and the increase in those who cited leisure as reasons. Recalling Table 4, the average

social security benefits in 1960 and 1970 were, respectively, 81 and 99 percent of the poverty lines, making retirement economically more feasible than previously.

The New Beneficiary Survey of 1982 reinforces these observations. In this survey, slightly more of the younger group retired for voluntary reasons (83 percent versus 80 percent). But while the response, "wanted to retire; tired of working" (leisure) was more common for both groups, the younger group was more likely than the older group to cite health rather than leisure as a reason for retirement. In 1980, the mean social security benefit was one and one-third the poverty line for a 2-person family, making retirement economically more attractive in that year than in any previous one.

How feasible was retirement on social security benefits alone in any year for someone earning the maximum or minimum benefit? Table 9 shows minimum, maximum, and average social security benefits for the elderly in the five census years. In 1940 and 1949, even the maximum benefits were below the poverty line. For example, the maximum benefit for a single retired worker, \$538, was less than half the poverty line of \$1155. By 1960, both average and maximum benefits were close to, though still below, the poverty line; by 1970, the maximum benefit for a retired worker, \$1926, was above the poverty line of \$1757. And in 1980 the average as well as the maximum benefits were higher than the poverty line. Recent econometric studies of retirees in the years surrounding 1980 find that economic incentives are very important to the retirement decision--understandably so.

The elderly are a heterogeneous group, however, and while poverty based on all cash income declined over the 1940-80 period, it was not

Table 9

Social Security Benefits and Poverty Rates, 1940-1979
(Current Dollars)

	1940	1949	1959	1969	1979
<u>Social Security Benefits</u>					
Average annual benefit ^a					
retired worker	\$278	\$323	\$961	\$1,332	\$3,922
worker and wife	424	488	1,420	1,954	5,707
widow and orphan	292	438	1,556	2,186	2,950
Minimum statutory benefit, retired worker	120	120	396	660	1,462
Maximum statutory benefit, retired worker	494	538	1,392	1,926	6,041
<u>Poverty Line, (male head, nonfarm)</u>					
Single person, 65+	673	1,155	1,412	1,757	3,469
2 adults, 65+	841	1,443	1,764	2,218	4,392

Source: Social security benefits: from U.S. Department of Health and Human Services, Social Security Administration, Social Security Bulletin, Annual Statistical Supplement, 1983; average benefits from Table 78, p. 153, minimum and maximum benefits from Table L.2, p. 32. Poverty lines: see Appendix. Poverty rates: Computations by author from the Public Use Samples of the censuses of 1940, 1960, and 1980.

^aAverages computed for social security beneficiaries only.

entirely eliminated. One reason for this can be inferred from comparison of the minimum benefit for a retired worker to the poverty line for a single person in each year. Even in the later years, the minimum benefit is well below the poverty line.* If we recall that workers still gave "health" and "company retirement age" as reasons for retirement, we find one reason for the persistence of poverty among the elderly. Some of those who retired involuntarily or for health reasons may have had low previous earnings, and so are eligible only for small benefits. A second reason is the relatively low social security benefits of many elderly women who are widowed, divorced, or separated (the average benefit for a single widow was below the poverty line until 1979, when it was only slightly above it).

CONCLUSION

The money income of the elderly has risen substantially in real terms and their incidence of poverty has fallen relative to that of the nonelderly over the past 40 years, particularly since 1960. Increases in money income alone understate the growth in the economic well-being of the elderly, because they have also substantially increased the amount of leisure time enjoyed after retirement.

*The introduction of a federally uniform minimum Supplemental Security Income benefit in 1974 is not reflected in Table 9.

The increased likelihood that an elderly person will retire in the years since social security benefits began to be paid continues a trend that dates back to at least 1900. Perhaps the most important contribution of social security to this trend is that to an increasing extent retirement can be chosen solely on economic grounds. Able-bodied men aged 62 could, by the 1970s, retire on their social security benefits alone and on average, they would avoid poverty. We leave it to future research to decompose the trend in retirement into factors related to the growth of social security benefits and factors that are not directly related to the program, including better health, rising real earnings, and the growth in private pensions.

Appendix

Poverty Thresholds

The official poverty thresholds depend on family size, the age and sex of the household head, the number of children under 18 years old and farm-nonfarm residence. In 1979, the poverty threshold for a family of four (two adults and two children) was \$7355. For an aged head of household and his spouse, the poverty line in that year was \$4392. These thresholds incorporate the notions that household needs differ by the characteristics of their members, and that there are economies of scale in family size. For this reason, they are superior to measures, such as per capita income, that depend on household size alone. The poverty lines are adjusted each year with the Consumer Price Index. They can therefore be used as a basis for comparing income across years as well as across households.

The poverty lines were developed by Mollie Orshansky of the Social Security Administration in 1963 to specify, in dollar terms, a minimum level of adequate income for families of different types that was in keeping with American consumption patterns. These poverty cutoffs are based on the cost of an economy food plan for the family, multiplied by three. The economy food plan was the least costly of four family food plans developed by the Department of Agriculture based on findings of the 1955 Household Food Consumption Survey. The cost of this plan was multiplied by three, reflecting the importance of food in the American budget.

The basis for these official poverty lines is worth noting, because poverty is essentially a relative concept. Thus, the notion of "needs"

defined in 1963 may be quite different from what would have been considered an adequate income in 1939. Similarly the notion of "needs" in 1979 might be quite different in 1979 than it was in 1963. However, the poverty cutoffs have been extended forward in time to define a basic level of income to the present day, and they have been officially extended backward as far as 1959.

For this analysis, we have adjusted the official poverty lines for 1959 back to 1939 by using the Consumer Price Index (CPI). Table A1 compares poverty lines for selected types of households in the five census years and shows the value of the CPI. In current dollars, poverty lines in 1939 were about one-half of those in 1959; those in 1979 were about two and one-half times those in 1959. Because the poverty line is fixed in real terms, but real mean incomes increase over time, the poverty lines fell dramatically relative to mean household earnings and posttransfer incomes (last two rows of Table A1).

In all the five census years, we used the full matrix of over 100 poverty lines. In each year, the age and sex of the household head and farm-nonfarm residence were available. However, the definition of a family (thus, family size) and the determination of the number of children varied slightly.

In all years except 1950, a family consists of all persons living in the household and related to the head, and all unrelated persons under the age of 15. Unrelated individuals 15 years or more become single-person households, as detailed information is available only on the relations of individuals to the head (not to each other).

In 1950, we analyzed only household heads from the 20 percent subsample of the 1-in-100 sample because family income information was available on these records only. Since detailed information about the rest of the household was unavailable on the head's record, we included in the family all persons living with the head, related or unrelated. It was not possible to determine the ages of other members of the household.

Table A-1

Absolute Poverty Cutoffs in Current Dollars for Selected
Family Types as Adjusted by the Consumer Price Index

	1939	1949	1959	1969	1979
Single nonaged person	\$749	\$1286	\$1572	\$1976	\$3912
Two adults, Aged head	841	1443	1764	2218	4392
Two adults, two children	1408	2417	2955	3714	7355
Consumer Price Index (1967 = 100)	41.6	71.4	87.3	109.8	217.4
Absolute poverty line for a family of four relative to mean household earnings	1.46	1.06	0.71	0.52	0.53
Absolute poverty line for a family of four relative to mean household posttransfer income	1.09 ^a	0.79	0.53	0.42	0.41

^aEstimate, as no data on household incomes are available.