PREPARING ECONOMIC AND SOCIAL PERSPECTIVES FOR FAMILIES AND UNRELATED INDIVIDUALS FROM THE CURRENT POPULATION SURVEY

Murray S. Weitzman
Social and Economic Statistics Administration, Bureau of the Census

I. Introduction

There is still to this day and I imagine there will be for a long time to come, a not insignificant amount of useful and meaningful income information locked up in the considerable pile of data amassed each year. This material can be released and used profitably in stimulating and furthering income research through examining different functional uses of the data, coupled with innovative formulations of strategies, quantitative applications, and table designs.

In this paper I want to describe and discuss two sets of analytic income tables. One set of tables is now published annually but has not been featured in any analytic presentation and may have gone unnoticed in the plethora of detailed tables that the Bureau of the Census publishes. The other set of tables is part of a larger goal that revolves around casting income and other economic statistics into modules or entities. Both sets of tables can be used directly and effectively in economic and social analyses and also can be integrated into a system of economic and social accounts. These two sets of tables represent efforts to complement and expand the information and analytic potential of the main series of income tables pertaining to families, unrelated individuals, and persons and which are presented in the Bureau's annual P-60 Current Population Report on Consumer Income. The income data in the P-60 report are presented primarily as income size distributions cross-classified by a wide-ranging variety of variables covering differing geographic, demographic, social, and economic elements. For the set of published analytic tables the initial objective was to bring together as many variables as practical that are scattered among different tables in the P-60 report in order to describe the characteristics of families at different income class intervals. Presenting data in this kind of format has been instrumental in germinating the idea of preparing an illustrative set of economic and social account type tables. The current goal is to organize economic and social data around important and sufficiently different groups of persons who display significantly different responses and performances within the context of economic and social conditions, emphasizing at the same time the additive features associated with the data.

II. Published Analytic Tables

The first six detailed tables in the Current Population Reports, "Income in 1969 of Families and Persons in the United States," Series P-60, No. 75, pages 19 to 22, some of which are reproduced here, are designated as published analytic tables. Income in 1969 is chosen to discuss their content because the data available for the experimental tables are for that year.

The first table in the series (table 1 and shown here as table A) sharply delineates the direct relationship on the average between increases in family income in terms of mean family income or per capita income and increases in the number of persons per family, earners per family, and median school years completed by the head.

The ratio of nonearners to earners statistic in table A is an inverse variant of earners per family and the ratio varies inversely with income. The median age of head by income class is a reversed jay-shape curve "$\cup$", with higher older ages, about 62 years of age, at the lower part of the income scale and lower older ages, 50 years of age, beginning at the $25,000 income level. Within a broad band of income, ranging from $7,000 to $14,999, the median age of head approximates 42 years.

The three following tables in the published set of analytic tables (tables 2, 3, and 4) are in the form of cumulative percent distributions of aggregate family income, number of families, and some of the variables used in table 1, plus the number of years of school that the head completed and the number of weeks that the head worked the previous year. Table 2 is reproduced here as table B. Some of the interesting observations that can be gleaned from the three tables are summarized in table C. Table C presents ratios based on the cumulative percent distributions between aggregate family income of specific universes and selected family characteristics within these universes at four income plateaus—$5,000, $10,000, $15,000, and $25,000. The information in the table suggests that where there is some indication within a selected universe of greater response and uniformity of effort of family heads and members of the family to the economic product of the country than the average, the aforementioned ratios are lower and also tend to increase at a slower rate at the different income plateaus (in all cases for the first three plateaus) than the ratios for all families. This observation applies to all earners in families, family head with 4 or more years of college, and family head who worked year round full time. The situation is reversed for families in which the head has no more than an elementary school education or did not work last year.

Estimates of Gini ratios, a summary measure of income concentration, by selected family characteristics tend to support the observation that the greater the homogeneity in family characteristics the more likely that the ratios of percents of aggregate family income to percents of family characteristics will be lower than for family characteristics which exhibit greater heterogenity. As shown in the Bureau of the Census Technical Paper No. 17, "Trends in the Income of Families and Persons in the United States: 1947-1964," table 32, the Gini ratio for families tends to be lowest (less income concentration) for families with heads who worked year round full time the previous year and highest (more income concentration) for families with heads who did not work the previous year. The Gini ratio for 1964 for all families was .352, for families with

Table A.—SUMMARY MEASURES OF FAMILY CHARACTERISTICS, BY TOTAL MONEY INCOME IN 1969

(Social and demographic estimates as of March 1970. They exclude inmates of institutions but include members of the Armed Forces in the United States living off post or with their families on post. Dollar estimates relate to income received in 1969)

Total money income	All families (thousands)	Mean family income (dollars)	Per capita family income (dollars)	Average number of--			Earners per family	Ratio of non-earners to earners 1/	Median age of head	Median school years completed by head 2/
				Persons per family	Related children					
					Per family	Per family with children				
Total	51,237	10,577	2,919	3.62	1.36	2.34	1.69	1.14	45.6	12.2
Under $1,000	804	51	17	3.02	1.30	2.27	0.71	3.27	47.6	9.8
$1,000 to $1,499	670	1,255	434	2.89	1.07	2.37	0.71	3.05	58.2	8.2
$1,500 to $1,999	930	1,750	632	2.77	0.87	2.28	0.66	3.17	62.3	8.3
$2,000 to $2,499	1,231	2,234	805	2.78	0.89	2.28	0.69	3.00	61.8	8.6
$2,500 to $2,999	1,140	2,736	946	2.89	0.92	2.39	0.79	2.66	61.9	8.5
$3,000 to $3,499	1,328	3,224	1,014	3.18	1.16	2.59	1.01	2.15	56.7	8.7
$3,500 to $3,999	1,377	3,739	1,176	3.18	1.15	2.72	1.02	2.11	54.2	8.9
$4,000 to $4,999	2,752	4,475	1,354	3.30	1.24	2.48	1.23	1.69	50.5	9.3
$5,000 to $5,999	3,033	5,457	1,586	3.44	1.33	2.44	1.43	1.41	44.9	10.4
$6,000 to $6,999	3,281	6,436	1,814	3.55	1.41	2.39	1.50	1.36	43.3	11.4
$7,000 to $7,999	3,726	7,453	2,077	3.59	1.42	2.33	1.55	1.32	42.5	12.0
$8,000 to $8,999	3,787	8,443	2,323	3.63	1.46	2.32	1.63	1.23	41.4	12.2
$9,000 to $9,999	3,602	9,447	2,559	3.69	1.45	2.28	1.76	1.10	41.9	12.2
$10,000 to $11,999	6,662	10,876	2,907	3.74	1.49	2.31	1.83	1.04	41.9	12.4
$12,000 to $14,999	7,020	13,280	3,434	3.87	1.49	2.32	2.05	0.89	43.7	12.5
$15,000 to $24,999	8,005	18,284	4,602	3.97	1.38	2.27	2.34	0.70	46.8	12.8
$25,000 to $49,999	1,665	35,786	8,819	4.06	1.25	2.30	2.37	0.71	50.4	15.6
$50,000 and over	224			4.00	1.47	2.39	1.77	1.26	50.0	16.5

1/ The number of all persons without earnings in families divided by the number of persons 14 years old and over with earnings in families.

2/ Restricted to families with head 25 years old and over.

Source: U.S. Bureau of the Census, Current Population Reports, Series P-60, No. 75, "Income in 1969 of Families and Persons in the United States," U.S. Government Printing Office, Washington, D.C., 1970, table 1, page 19.

Table B.—CUMULATIVE PERCENT DISTRIBUTIONS OF SELECTED FAMILY CHARACTERISTICS, BY TOTAL MONEY INCOME IN 1969

(Numbers in thousands)

Total money income	All families	Aggregate family income	Total persons in families 1/	Total related children in families 1/	All earners in families 1/
Total	51,237	$541,934,000	185,396	69,786	86,711
CUMULATIVE PERCENT DISTRIBUTION					
Under $1,000	1.6	(Z)	1.3	1.5	0.7
Under $1,500	2.9	0.2	2.3	2.5	1.2
Under $2,000	4.7	0.5	3.7	3.7	1.9
Under $2,500	7.1	1.0	5.5	5.3	2.9
Under $3,000	9.3	1.5	7.3	6.8	3.9
Under $3,500	11.9	2.3	9.6	9.0	5.5
Under $4,000	14.6	3.3	12.0	11.3	7.1
Under $5,000	20.0	5.6	16.9	16.2	11.0
Under $6,000	25.9	8.6	22.5	22.0	16.0
Under $7,000	32.3	12.5	28.8	28.6	21.7
Under $8,000	39.6	17.7	36.0	36.2	28.3
Under $9,000	47.0	23.6	43.4	44.1	35.4
Under $10,000	54.0	29.9	50.6	51.6	42.7
Under $12,000	67.0	43.2	64.0	65.8	56.8
Under $15,000	80.7	60.5	78.6	80.8	73.4
Under $25,000	96.3	87.5	95.8	96.6	95.0

Z Less than 0.05 percent. 1/ Distributed by income levels of their families.

Source: U.S. Bureau of the Census, Current Population Reports, Series P-60, No. 75, "Income in 1969 of families and Persons in the United States," U.S. Government Printing Office, Washington, D.C., 1970, table 2, page 19.

Table C.—RATIOS AND INDEXES OF THE PERCENTS OF AGGREGATE FAMILY INCOME TO SPECIFIED CHARACTERISTICS ABOVE $5,000, $10,000, $15,000, AND $25,000 INCOME LEVELS

Characteristics of families and sources of data	Percent of characteristics in brackets at $5,000 income level	Ratios of the percents of aggregate family income to specified characteristics above $5,000 income level	Percent of characteristics in brackets at $10,000 income level	Ratios of the percents of aggregate family income to specified characteristics above $10,000 income level	Percent of characteristics in brackets at $15,000 income level	Ratios of the percents of aggregate family income to specified characteristics above $15,000 income level	Percent of characteristics in brackets at $25,000 income level	Ratios of the percents of aggregate family income to specified characteristics above $25,000 income level	Index of ratios (Ratios in table 2 of aggregate family income to all incomes=100)			
									Above $5,000 income level	Above $10,000 income level	Above $15,000 income level	Above $25,000 income level
Table 2—ALL FAMILIES												
Aggregate family income	100.0—(5.6) 1/	(X)	100.0—(29.9)	(X)	100.0—(60.5)	(X)	100.0—(87.5)	(X)	(X)	(X)	(X)	(X)
All families	100.0—(20.0) 1/	1.18:1 1/	100.0—(54.0)	1.52:1	100.0—(80.7)	2.05:1	100.0—(93.3)	3.38:1	100.0	100.0	100.0	100.0
Total persons in families	100.0—(16.9)	1.14:1	100.0—(50.6)	1.42:1	100.0—(78.6)	1.85:1	100.0—(95.8)	2.98:1	96.6	93.4	90.2	88.2
Total related children in families	100.0—(16.2)	1.13:1	100.0—(51.6)	1.45:1	100.0—(80.8)	2.06:1	100.0—(96.6)	3.68:1	95.8	95.4	100.5	108.9
All earners in families	100.0—(11.0)	1.06:1	100.0—(42.7)	1.22:1	100.0—(73.4)	1.48:1	100.0—(95.0)	2.50:1	89.8	80.3	72.2	74.0
Table 3—HEADS 25 YEARS OLD AND OVER												
Aggregate family income	100.0— (5.2)	(X)	100.0—(28.2)	(X)	100.0—(58.9)	(X)	100.0—(86.9)	(X)	(X)	(X)	(X)	(X)
All families	100.0—(19.2)	1.17:1	100.0—(52.1)	1.50:1	100.0—(79.5)	2.00:1	100.0—(96.1)	3.36:1	99.2	98.7	97.6	99.4
Elementary school, 8 years or less												
Aggregate family income	100.0—(15.1)	(X)	100.0—(51.2)	(X)	100.0—(79.3)	(X)	100.0—(95.9)	(X)	(X)	(X)	(X)	(X)
All families	100.0—(38.7)	1.38:1	100.0—(75.3)	1.98:1	100.0—(92.6)	2.80:1	100.0—(99.3)	5.85:1	116.9	130.3	136.6	173.1
High school, 4 years												
Aggregate family income	100.0— (3.0)	(X)	100.0—(27.5)	(X)	100.0—(63.3)	(X)	100.0—(91.5)	(X)	(X)	(X)	(X)	(X)
All families	100.0—(11.2)	1.09:1	100.0—(46.8)	1.36:1	100.0—(80.1)	1.84:1	100.0—(97.4)	3.27:1	92.4	89.5	89.8	96.7
College, 4 or more years												
Aggregate family income	100.0— (0.9)	(X)	100.0— (9.2)	(X)	100.0—(31.3)	(X)	100.0—(68.5)	(X)	(X)	(X)	(X)	(X)
All families	100.0— (5.0)	1.04:1	100.0—(22.1)	1.17:1	100.0—(51.9)	1.43:1	100.0—(85.4)	2.16:1	88.1	77.0	69.8	63.9
Table 4—FAMILIES WITH CIVILIAN HEADS												
Head worked year round full time												
Aggregate family income	100.0— (2.0)	(X)	100.0—(22.8)	(X)	100.0—(55.3)	(X)	100.0—(85.8)	(X)	(X)	(X)	(X)	(X)
All families	100.0— (7.3)	1.06:1	100.0—(40.9)	1.31:1	100.0—(74.3)	1.74:1	100.0—(95.2)	2.96.1	89.8	86.2	84.9	87.6
Head did not work in 1969												
Aggregate family income	100.0—(31.3)	(X)	100.0—(65.6)	(X)	100.0—(82.8)	(X)	100.0—(94.7)	(X)	(X)	(X)	(X)	(X)
All families	100.0—(62.3)	1.82:1	100.0—(88.3)	2.94:1	100.0—(95.9)	4.20:1	100.0—(99.4)	8.83:1	154.2	193.4	204.9	261.2

1/ Computation of ratio: 100.0—(5.6) = 94.4 and 100.0—(20.0) = 80.0; $\frac{94.4}{80.0}$ = 1.18.

X Not applicable.

Source: Table B in text and published analytic tables 3 and 4 included in Appendix A.

heads who worked year round full time—.301, and .452 for families with heads who did not work in 1964.

The fifth table in the published set combines the cumulative distribution of aggregate family income and the component sources of such income. Aggregate family income is presented as a cumulative percent distribution and the sources of income as a percent distribution by income class intervals. Although there are many interesting relationships that can be drawn from this table as it now stands, the task of interpretation can benefit from some calculations to obtain the absolute dollar estimates on which the table is based. These estimates are shown here in table D to assist people who may find table 5 in the published report of some interest. This table points up the very substantial role of the Government in contributing to money income for families with incomes under $5,000 in 1969 and its rapidly diminishing role in the higher income intervals as the earnings component of income becomes increasingly more important.

The last of the six tables in the published series supplements the previous tables by showing specified characteristics of families as a percent of all families, by total money income.

III. Economic and Social Perspective Tables

The income and related 1969 data from the March 1970 Current Population Survey have been rearranged to produce a set of tables that in my view have the attributes required for the establishment of a network of annual economic and social accounts linking the activities and contributions of significant and identifiable groups of persons to the economy and to the economic position of the family. The tables try to systematically describe the commitment and efforts put forth by heads of different groups of families, unrelated individuals, and persons in producing the economy's output in terms of current labor force status and for such earnings and income-generating factors as weeks worked last year, worked full time or part time last year, education, and age. This information for heads, for example, is linked to the numbers of persons in the specific family group and aggregate family income. From these relationships, comparisons are derived indicating the economic contributions of the family head, average family size, per capita income, and other measures.

There is an extensive variety of possible combinations of family, unrelated individual, and persons groups for which individual tables can be prepared and summed to larger aggregates since the base file for this experimental work has been tabulated by two race breaks (Negro, and white and other), three income breaks, and the aforementioned variables. The package of experimental tables, which is available by writing to the author, is intended to illustrate the potential of this type of presentation for economic and social accounts. Included in the package are all families, families headed by females, and two sets of tables for male heads, one emphasizing weeks worked and the other worked full time last year, education, and age by three family income breaks—less than the low economy standard budget, more than the low economy standard budget but less than $10,000, and more than $10,000.

Table D.-- AGGREGATE MONEY INCOME OF FAMILIES BY TYPE OF INCOME, BY TOTAL MONEY INCOME IN 1969
(In millions of dollars)

Total money income	Total aggregate income	Aggregate family money income									
		Earnings				Income other than earnings					
		Total	Wage or salary income	Nonfarm self employment income	Farm self-employment income	Total	Social Security and Government Railroad Retirement	Dividends, interest, net rental income, income from estates or trusts	Public Assistance and Welfare payments	Unemployment and workmen's compensation, Government employee pensions, and Veterans' payments	Private pensions, annuities, alimony, royalties, etc.
Total 1/..	542,174	483,296	434,295	40,916	8,085	58,879	16,333	20,688	3,765	9,100	8,993
CUMULATIVE DISTRIBUTION											
Under $1,000..	370	176	176	--	--	194	92	21	49	5	27
Under $1,500..	1,210	469	402	33	34	741	382	53	208	30	68
Under $2,000..	2,836	931	799	52	80	1,905	1,058	103	517	88	139
Under $2,500..	5,582	1,864	1,556	128	180	3,718	2,056	192	939	235	296
Under $3,000..	8,700	2,994	2,514	186	294	5,706	3,130	351	1,378	416	431
Under $3,500..	12,983	5,172	4,306	424	442	7,811	4,200	524	1,798	619	670
Under $4,000..	18,134	7,943	6,776	577	590	10,191	5,365	749	2,140	903	1,034
Under $5,000..	30,448	16,026	13,837	1,134	1,055	14,422	7,310	1,260	2,629	1,507	1,716
Under $6,000..	47,004	28,934	25,303	2,087	1,544	18,070	8,908	1,817	2,863	2,182	2,300
Under $7,000..	68,119	46,810	41,591	3,216	2,003	21,309	10,064	2,457	3,109	2,703	2,976
Under $8,000..	95,891	71,343	64,299	4,581	2,463	24,548	11,107	3,257	3,264	3,388	3,532
Under $9,000..	127,863	100,426	91,394	5,993	3,039	27,437	11,894	4,013	3,380	4,017	4,133
Under $10,000.	161,892	131,756	121,023	7,267	3,466	30,136	12,663	4,768	3,475	4,584	4,646
Under $12,000.	234,339	199,828	184,490	10,872	4,466	34,511	13,667	6,164	3,547	5,704	5,429
Under $15,000.	327,561	287,416	266,502	15,340	5,594	40,145	14,793	8,503	3,643	6,938	6,268
Under $25,000.	473,916	424,275	392,151	25,041	7,083	49,641	16,005	13,656	3,745	8,587	7,648

-- Represents zero.

1/ Excludes net losses, therefore the data shown here are not strictly comparable with the aggregate income shown in table 2 which includes net losses. Moreover aggregate negative amounts in nonfarm and farm self-employment income were changed to zero values in all computations.

Source: U.S. Bureau of the Census, Current Population Reports, Series P-60, No. 75, "Income in 1969 of Families and Persons in the United States," U.S. Government Printing Office, Washington, D.C., 1970, based on table 5, page 21.

Family income below the low economy standard budget is based on the 1969 family income cutoffs established for use in connection with the Bureau of the Census statistics on the characteristics of the low income population. Family income below the low economy standard budget is a variable measure depending primarily upon size of family, presence and number of family members under 18 years of age, sex of head, and farm and nonfarm residence and a nutritionally adequate food plan that could be implemented under temporary or emergency conditions when funds are low. References to the work in this area of the Department of Agriculture, of Mollie Orshansky of the Social Security Administration, and a summary of the 1969 income cutoffs are presented in the Current Population Report on Consumer Income, P-60, No. 76, pages 17 to 20.

The estimates of average income and earnings of persons 14 years old and over in the economic and social perspective tables relate to all persons in a given group irrespective of whether they have income or earnings from a particular income source. This procedure differs from the one used for the persons tables that appear in the P-60 Consumer Income Reports. In these reports income distributions, and median and mean income estimates are restricted to persons with income or particular types of earnings. Both procedures are acceptable considering the respective objectives of the two kinds of tables. In presenting income size distributions by type of income, it is inappropriate, for example, to include persons who are proprietors and receive zero wages and salaries with persons who do receive wages and salaries. In contrast the all persons concept is used in the economic and social perspective tables because of the reliance on a modular or entity approach in which the different attributes and performances of diverse population groups are summed to totals.

Tables E and E' illustrate the presentation of the economic and social perspective for all families with male heads utilizing the stub that emphasizes worked full time, education, and age.

At this methodological stage of the project in which the emphasis is on the skeletal structure of the system, the table presentation has been kept relatively unencumbered. The modular approach to the tables, however, permits a great deal of flexibility in adding or subtracting modules. For example, the column on number of persons in families can be decomposed into different family relationships and sex and age characteristics. Similarly, the income data detail can be expanded by different sources of income. The occupational variable has not been tabulated in the present file used in this work in an effort to keep the volume of printouts from ballooning to unmanageable proportions. Also the limited size of the CPS sample, 50,000 households, would result in a still smaller number of observations in a cell than the file now contains. Of course, it is possible to collapse the detail for other than occupation variables, to obtain more observations per cell. The 1970 Census of Population and Housing, through its associated package of basic tapes and the various sample tapes makes available many if not all of the variables used in the CPS and thus represents an important data source for the preparation of tables for national and less than national universes.

Table E.—ECONOMIC AND SOCIAL PERSPECTIVE OF FAMILIES WITH MALE HEADS WITH SPECIAL EMPHASIS ON MALE HEADS WHO WORKED FULL TIME LAST YEAR: MARCH 1970

NUMBER OF PERSONS IN FAMILIES, AGGREGATE FAMILY INCOME, AND EARNINGS OF HEADS BY SELECTED LABOR FORCE CHARACTERISTICS, AGE, AND EDUCATION

(Social and demographic estimates as of March 1970. They exclude inmates of institutions but include members of the Armed Forces in the United States living off post or with their families on post. Dollar estimates relate to income received in 1969. Numbers may not add to totals because of rounding)

Characteristics of male family heads	Number of families (in thousands)	Number of persons in families (in thousands)	Aggregate family income (in millions of dollars)	Aggregate income of male family heads (in millions of dollars)	Aggregate earnings of male family heads (in millions of dollars)	Percent distribution				
						Number of families	Number of persons in families	Aggregate family income	Aggregate income of male family heads	Aggregate earnings of male family heads
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
Total population	45,658.5	167,100	508,910	398,700	360,600	100.0	100.0	100.0	100.0	100.0
Civilian population	44,647.5	163,369	500,469	391,710	353,741	97.8	97.8	98.3	98.2	98.1
Civilian labor force	38,516.4	147,200	462,775	367,600	348,300	84.4	88.1	90.9	92.2	96.6
Employed	37,511.8	143,400	453,743	360,900	342,300	82.2	85.8	89.1	90.5	94.9
Worked full time last year	35,814.1	138,600	441,480	352,900	337,400	78.4	82.9	86.7	88.5	93.6
Under 25 years	2,256.0	6,625	17,996	13,820	13,620	4.9	4.0	3.5	3.4	3.8
Elementary—less than 8 years	70.0	252	430	340	338	0.2	0.2	0.1	0.1	0.1
Elementary—8 years	104.8	347	658	539	533	0.2	0.2	0.1	0.1	0.1
High school—1 to 3 years	454.8	1,415	3,195	2,601	2,570	1.0	0.8	0.6	0.7	0.7
High school—4 years	1,121.3	3,286	9,235	7,148	7,080	2.5	2.0	1.8	1.8	2.0
College—1 to 3 years	361.0	981	3,095	2,231	2,161	0.8	0.6	0.6	0.6	0.6
College—4 or more years	144.2	343	1,383	956	941	0.3	0.2	0.3	0.2	0.3
College—4 years	119.4	280	1,185	810	799	0.3	0.2	0.2	0.2	0.2
College—5 or more years	24.8	63	199	146	142	0.1	(Z)	(Z)	(Z)	(Z)
25 to 44 years	17,762.1	78,453	211,405	177,300	172,600	38.9	46.9	41.5	44.5	47.9
Elementary—less than 8 years	1,106.5	5,737	8,889	6,881	6,744	2.4	3.4	1.7	1.7	1.9
Elementary—8 years	1,205.9	5,695	11,269	8,952	8,768	2.6	3.4	2.2	2.2	2.4
High school—1 to 3 years	2,853.7	13,190	28,751	23,080	22,540	6.3	7.9	5.6	5.8	6.3
High school—4 years	6,875.1	29,908	77,317	64,470	63,180	15.1	17.9	15.2	16.2	17.5
College—1 to 3 years	2,462.4	10,269	31,691	26,600	25,940	5.4	6.1	6.2	6.7	7.2
College—4 or more years	3,258.4	13,653	53,483	47,300	45,370	7.1	8.2	10.5	11.9	12.6
College—4 years	1,799.6	7,546	27,991	24,640	23,630	3.9	4.5	5.5	6.2	6.6
College—5 or more years	1,458.9	6,107	25,494	22,660	21,740	3.2	3.7	5.0	5.7	6.0
45 to 64 years	14,804.8	51,108	201,271	153,300	144,600	32.4	30.6	39.5	38.4	40.1
Elementary—less than 8 years	1,786.8	6,667	16,062	11,000	10,600	3.9	4.0	3.2	2.8	2.9
Elementary—8 years	2,179.3	7,175	22,748	16,770	16,060	4.8	4.3	4.5	4.2	4.5
High school—1 to 3 years	2,656.4	8,821	31,917	23,180	22,090	5.8	5.3	6.3	5.8	6.1
High school—4 years	4,678.5	15,826	63,487	47,640	45,020	10.2	9.5	12.5	11.9	12.5
College—1 to 3 years	1,599.2	5,486	26,176	20,620	19,090	3.5	3.3	5.1	5.2	5.3
College—4 or more years	1,904.5	7,133	40,874	34,130	31,710	4.2	4.3	8.0	8.6	8.8
College—4 years	1,046.8	3,946	21,026	17,560	16,280	2.3	2.4	4.1	4.4	4.5
College—5 or more years	857.7	3,187	19,848	16,570	15,430	1.9	1.9	3.9	4.2	4.3
65 years old and over	991.2	2,375	10,802	8,429	6,594	2.2	1.4	2.1	2.1	1.8
Elementary—less than 8 years	215.4	559	1,511	1,066	873	0.5	0.3	0.3	0.3	0.2
Elementary—8 years	228.3	537	1,970	1,510	1,210	0.5	0.3	0.4	0.4	0.3
High school—1 to 3 years	150.6	353	1,394	1,076	868	0.3	0.2	0.3	0.3	0.2
High school—4 years	164.9	403	1,819	1,379	1,088	0.4	0.2	0.4	0.3	0.3
College—1 to 3 years	72.6	156	995	844	677	0.2	0.1	0.2	0.2	0.2
College—4 or more years	159.4	367	3,114	2,553	1,878	0.3	0.2	0.6	0.6	0.5
College—4 years	80.5	193	1,307	953	697	0.2	0.1	0.3	0.2	0.2
College—5 or more years	78.9	174	1,808	1,601	1,181	0.2	0.1	0.4	0.4	0.3
Worked part time last year	1,465.2	4,173	11,070	7,357	4,634	3.2	2.5	2.2	1.8	1.3
Did not work last year	232.5	679	1,201	690	254	0.5	0.4	0.2	0.2	0.1
Unemployed	1,004.6	3,760	9,029	6,649	5,997	2.2	2.3	1.8	1.7	1.7
Seeking full-time employment	936.5	3,564	8,612	6,394	5,832	2.1	2.1	1.7	1.6	1.6
Worked full-time last year	873.8	3,361	8,145	6,160	5,688	1.9	2.0	1.6	1.5	1.6
Worked part time last year	26.9	94	144	63	35	0.1	0.1	(Z)	(Z)	(Z)
Did not work last year	35.8	109	323	171	109	0.1	0.1	0.1	(Z)	(Z)
Seeking part-time employment	68.1	197	417	255	164	0.1	0.1	0.1	0.1	(Z)
Not in civilian labor force	6,131.1	16,169	37,694	24,110	5,441	13.4	9.7	7.4	6.0	1.5
Worked full time last year	1,012.0	2,933	9,032	6,422	4,691	2.2	1.8	1.8	1.6	1.3
Under 25 years	82.4	220	393	228	190	0.2	0.1	0.1	0.1	0.1
25 to 44 years	175.2	730	1,501	1,020	721	0.4	0.4	0.3	0.3	0.2
45 to 64 years	407.1	1,180	4,039	2,836	2,278	0.9	0.7	0.8	0.7	0.6
65 years old and over	347.2	803	3,098	2,338	1,503	0.8	0.5	0.6	0.6	0.4
Worked part time last year	555.1	1,535	3,109	1,992	665	1.2	0.9	0.6	0.5	0.2
Under 25 years	29.2	73	132	59	38	0.1	(Z)	(Z)	(Z)	(Z)
25 to 44 years	35.6	178	200	117	84	0.1	0.1	(Z)	(Z)	(Z)
45 to 64 years	113.6	395	706	358	130	0.2	0.2	0.1	0.1	(Z)
65 years old and over	376.7	888	2,071	1,458	413	0.8	0.5	0.4	0.4	0.1
Did not work last year	4,564.1	11,702	25,554	15,690	85	10.0	7.0	5.0	3.9	(Z)
Under 25 years	44.2	103	211	76	20	0.1	0.1	(Z)	(Z)	(Z)
25 to 44 years	141.3	670	787	402	8	0.3	0.4	0.2	0.1	(Z)
45 to 64 years	930.6	2,863	5,955	3,231	47	2.0	1.7	1.2	0.8	(Z)
65 years old and over	3,448.1	8,066	18,602	11,990	9	7.6	4.8	3.7	3.0	(Z)
In Armed Forces	1,011.0	3,731	8,441	6,990	6,859	2.2	2.2	1.7	1.8	1.9

Z Less than 0.05.

Note: Summary measure statistics from the Current Population Survey are usually not shown for a population base of less than 75,000 because of low reliability of the estimates. Such statistics are shown here primarily as components contributing to the aggregate estimates and generally should not be employed for between-cell comparisons. This note applies to all tables in the Economic and Social Perspective series.

Estimates for the Armed Forces were obtained by subtracting estimates for the civilian population from the total population. The relatively small size of the Armed Forces in comparison with the total population, the rounding procedures used to conserve space in the tabulation printout (estimates in the hundreds of billions of dollars were rounded to the nearest hundred million) and the residual procedure used to estimate the parameters for the Armed Forces may result in some substantial errors for some of the Armed Forces estimates involving income and earnings.

Source: Current Population Survey, special tabulation.

Table E'.--ECONOMIC AND SOCIAL PERSPECTIVE OF FAMILIES WITH MALE HEADS WITH SPECIAL EMPHASIS ON MALE HEADS WHO WORKED FULL TIME LAST YEAR: MARCH 1970

DERIVED AVERAGE ECONOMIC AND DEMOGRAPHIC MEASURES AND RELATIONSHIPS FROM AGGREGATE DATA

(Social and demographic estimates as of March 1970. They exclude inmates of institutions but include members of the Armed Forces in the United States living off post or with their families on post. Dollar estimates relate to income received in 1969. Numbers may not add to totals because of rounding.

Characteristics of male family heads	Average family income (in dollars)	Average income of male family heads (in dollars)	Average earnings of male family heads (in dollars)				Income of male family head as a percent of family income	Average family size	Per capita family income (in dollars)	Per capita family income excluding average earnings of male family heads	
			Total	Wages and salaries	Nonfarm self-employment	Farm self-employment				Dollars	Percent of per capita family income
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)
Total population	11,146	8,732	7,898	6,936	803	159	78.3	3.66	3,045	887	29.1
Civilian population	11,209	8,773	7,923	6,939	821	163	78.3	3.66	3,063	898	29.3
Civilian labor force	12,015	9,543	9,043	7,924	939	180	79.4	3.82	3,145	778	24.7
Employed	12,096	9,621	9,125	7,983	958	184	79.5	3.82	3,166	778	24.6
Worked full time last year	12,327	9,853	9,421	8,276	959	186	79.9	3.87	3,185	751	23.6
Under 25 years	7,977	6,124	6,039	5,884	106	49	76.8	2.94	2,713	659	24.3
Elementary--less than 8 years	6,139	4,854	4,833	4,725	84	24	79.1	3.61	1,701	356	20.9
Elementary--8 years	6,282	5,149	5,088	5,103	—	-15	82.0	3.31	1,898	361	19.0
High school--1 to 3 years	7,024	5,721	5,651	5,569	72	10	81.4	3.11	2,299	441	19.5
High school--4 years	8,236	6,375	6,314	6,101	149	64	77.4	2.93	2,811	656	23.3
College--1 to 3 years	8,573	6,180	5,987	5,885	74	28	72.1	2.72	3,152	951	30.2
College--4 or more years	9,594	6,632	6,528	6,318	49	161	69.1	2.38	4,031	1,288	32.0
College--4 years	9,921	6,783	6,692	6,438	59	195	68.4	2.35	4,222	1,374	32.5
College--5 or more years	8,016	5,903	5,736	5,736	—	—	73.6	2.53	3,168	901	28.4
25 to 44 years	11,902	9,981	9,720	8,700	883	136	83.9	4.42	2,693	494	18.3
Elementary--less than 8 years	8,033	6,218	6,095	5,621	377	97	77.4	5.18	1,551	374	24.1
Elementary--8 years	9,345	7,424	7,271	6,280	657	334	79.4	4.72	1,980	439	22.2
High school--1 to 3 years	10,075	8,087	7,933	7,315	500	117	80.3	4.62	2,181	464	21.3
High school--4 years	11,246	9,377	9,189	8,397	606	186	83.4	4.35	2,585	473	18.3
College--1 to 3 years	12,870	10,802	10,536	9,714	746	75	83.9	4.17	3,086	496	16.1
College--4 or more years	16,414	14,516	13,924	11,727	2,163	34	88.4	4.19	3,917	594	15.2
College--4 years	15,554	13,691	13,132	12,342	731	59	88.0	4.19	3,712	578	15.6
College--5 or more years	17,475	15,534	14,900	10,968	3,930	2	88.9	4.19	4,171	615	14.7
45 to 64 years	13,595	10,357	9,765	8,353	1,156	256	76.2	3.45	3,941	1,110	28.2
Elementary--less than 8 years	8,989	6,155	5,932	5,262	438	232	68.5	3.73	2,410	820	34.0
Elementary--8 years	10,438	7,693	7,368	6,336	515	516	73.7	3.29	3,173	933	29.4
High school--1 to 3 years	12,015	8,726	8,316	7,390	694	232	72.6	3.32	3,619	1,114	30.8
High school--4 years	13,570	10,183	9,622	8,450	920	252	75.0	3.38	4,015	1,168	29.1
College--1 to 3 years	16,368	12,896	11,937	10,285	1,427	225	78.8	3.43	4,772	1,292	27.1
College--4 or more years	21,462	17,921	16,650	13,041	3,561	48	83.5	3.75	5,723	1,283	22.4
College--4 years	20,086	16,777	15,550	13,390	2,080	81	83.5	3.77	5,328	1,203	22.6
College--5 or more years	23,141	19,318	17,991	12,616	5,368	7	83.5	3.72	6,221	1,384	22.2
65 years old and over	10,898	8,504	6,653	4,984	1,324	345	78.0	2.40	4,541	1,769	39.0
Elementary--less than 8 years	7,016	4,952	4,056	2,915	882	258	70.6	2.60	2,698	1,138	42.2
Elementary--8 years	8,627	6,613	5,300	4,174	576	550	76.7	2.35	3,671	1,416	38.6
High school--1 to 3 years	9,254	7,146	5,761	4,794	622	345	77.2	2.35	3,938	1,486	37.7
High school--4 years	11,029	8,364	6,600	5,289	981	330	75.8	2.44	4,520	1,815	40.2
College--1 to 3 years	13,706	11,624	9,326	6,731	2,354	241	84.8	2.14	6,405	2,047	32.0
College--4 or more years	19,537	16,021	11,781	8,009	3,539	233	82.0	2.30	8,494	3,372	39.7
College--4 years	16,234	11,831	8,655	6,648	1,743	264	72.9	2.40	6,764	3,158	46.7
College--5 or more years	22,910	20,299	14,974	9,399	5,374	201	88.6	2.21	10,367	3,591	34.6
Worked part time last year	7,555	5,021	3,163	1,906	1,080	176	66.5	2.85	2,651	1,541	58.1
Did not work last year	5,165	2,967	1,092	1,077	2	13	57.4	2.92	1,769	1,395	78.9
Unemployed	8,988	6,619	5,969	5,739	216	14	73.6	3.74	2,403	807	33.6
Seeking full-time employment	9,196	6,828	6,228	5,984	230	14	74.2	3.81	2,414	779	32.3
Worked full time last year	9,321	7,049	6,509	6,256	238	15	75.6	3.85	2,421	730	30.2
Worked part time last year	5,355	2,345	1,292	1,033	259	—	43.8	3.51	1,526	1,158	75.9
Did not work last year	9,024	4,788	3,054	3,054	—	—	53.1	3.04	2,968	1,964	66.2
Seeking part-time employment	6,129	3,741	2,413	2,375	33	5	61.0	2.89	2,121	1,286	60.6
Not in civilian labor force	6,148	3,932	887	755	79	53	64.0	2.64	2,329	1,993	85.6
Worked full time last year	8,925	6,346	4,636	4,045	369	222	71.1	2.90	3,078	1,479	48.1
Under 25 years	4,774	2,761	2,300	2,251	49	—	57.8	2.67	1,788	927	51.8
25 to 44 years	8,568	5,821	4,112	3,866	206	40	67.9	4.16	2,060	1,071	52.0
45 to 64 years	9,921	6,966	5,595	4,788	535	272	70.2	2.90	3,421	1,492	43.6
65 years old and over	8,922	6,734	4,329	3,690	331	308	75.5	2.31	3,862	1,988	51.5
Worked part time last year	5,600	3,589	1,198	835	203	160	64.1	2.76	2,029	1,595	78.6
Under 25 years	4,525	2,027	1,295	1,270	25	—	44.8	2.50	1,810	1,292	71.4
25 to 44 years	5,613	3,285	2,372	1,984	369	19	58.5	5.00	1,123	648	57.7
45 to 64 years	6,212	3,153	1,148	833	301	14	50.8	3.48	1,785	1,455	81.5
65 years and over	5,498	3,870	1,095	694	172	229	70.4	2.36	2,330	1,866	80.1
Did not work last year	5,599	3,439	19	16	—	2	61.4	2.56	2,187	2,180	99.7
Under 25 years	4,765	1,730	457	457	—	—	36.3	2.33	2,045	1,849	90.4
25 to 44 years	5,571	2,844	59	57	1	—	51.1	4.74	1,175	1,163	99.0
45 to 64 years	6,399	3,472	50	48	—	2	54.3	3.08	2,078	2,061	99.2
65 years and over	5,395	3,476	3	—	—	2	64.4	2.34	2,306	2,304	99.9
In Armed Forces	8,349	6,914	6,784	6,795	3	5	82.8	3.69	2,262	424	18.7

— Represents zero.
Column 7: Column 2 divided by column 1 times 100.
Column 9: Column 1 divided by column 8.
Column 10: Column 1 less column 3 divided by column 8.
Column 11: Column 10 divided by column 9 times 100.

Note: Summary measure statistics from the Current Population Survey are usually not shown for a population base of less than 75,000 because of low reliability of the estimates. Such statistics are shown here primarily as components contributing to the aggregate estimates and generally should not be employed for between-cell comparisons. This note applies to all tables in the Economic and Social Perspective series.

Estimates of the Armed Forces were obtained by subtracting estimates for the civilian population from the total population. The relatively small size of the Armed Forces in comparison with the total population, the rounding procedures used to conserve space in the tabulation printout (estimates in the hundreds of billions of dollars were rounded to the nearest hundred million) and the residual procedure used to estimate the parameters for the Armed Forces may result in some substantial errors for some of the Armed Forces estimates involving income and earnings.

Source: Current Population Survey, special tabulation.

There are innumerable patterns and relationships that emerge readily from the economic and social perspective tables. The discussion here will concentrate primarily on some of the differences in group performance that show up among the three income categories for male family heads. Some of the highlights are summarized in tables F and G.

Table F.--SELECTED STATISTICS FOR FAMILIES WITH MALE HEADS BY THREE FAMILY INCOME GROUPS: MARCH 1970

(Social and demographic estimates as of March 1970. They exclude inmates of institutions. Dollar estimates relate to income received in 1969. Percents may not add to totals because of rounding)

Characteristics of family and head	Family income Below Low Economy Standard Budget			Family income more than Low Economy Standard Budget but less than $10,000			Income more than $10,000		
	Heads (in percent)	Average income of head (in dollars)	Income of male head as a percent of family income or average family size	Heads (in percent)	Average income of head (in dollars)	Income of male head as a percent of family income or average family size	Heads (in percent)	Average income of head (in dollars)	Income of male head as a percent of family income or average family size
All heads in civilian population (in thousands)	3,084.9	(X)	(X)	19,135.3	(X)	(X)	22,427.3	(X)	(X)
CIVILIAN POPULATION	100.0	1,740	(X)	100.0	5,553	(X)	100.0	12,486	(X)
Income of male heads as a percent of family income	(X)	(X)	78.7	(X)	(X)	82.0	(X)	(X)	76.9
Average family size	X)	(X)	3.94	(X)	(X)	3.32	(X)	(X)	3.90
CIVILIAN LABOR FORCE	56.9	1,969	(X)	79.7	6,085	(X)	95.9	12,613	(X)
Income of M/H as a % of family income	(X)	(X)	80.7	(X)	(X)	84.8	(X)	(X)	77.7
Average family size	(X)	(X)	4.70	(X)	(X)	3.56	(X)	(X)	3.94
EMPLOYED--WORKED FULL TIME LAST YEAR	42.1	2,086	(X)	71.5	6,305	(X)	92.9	12,665	(X)
Income of M/H as a % of family income	(X)	(X)	82.2	(X)	(X)	86.2	(X)	(X)	78.0
Average family size	(X)	(X)	4.92	(X)	(X)	3.65	(X)	(X)	3.95
Under 25 years	4.0	1,867	(X)	8.2	5,564	(X)	2.5	8,599	(X)
Income of M/H as a % of family income	(X)	(X)	91.1	(X)	(X)	81.8	(X)	(X)	68.8
Average family size	(X)	(X)	3.40	(X)	(X)	2.96	(X)	(X)	2.77
25 to 44 years	21.4	2,597	(X)	35.1	6,755	(X)	46.3	12,535	(X)
Income of M/H as a % of family income	(X)	(X)	85.5	(X)	(X)	89.0	(X)	(X)	82.2
Average family size	(X)	(X)	5.73	(X)	(X)	4.31	(X)	(X)	4.40
Elementary--less than 8 years	6.7	2,838	(X)	3.1	5,727	(X)	1.4	9,478	(X)
Income of M/H as a % of family income	(X)	(X)	86.6	(X)	(X)	83.3	(X)	(X)	70.0
Average family size	(X)	(X)	6.30	(X)	(X)	4.84	(X)	(X)	5.11
Elementary--8 years	3.2	2,639	(X)	3.4	6,370	(X)	2.0	9,974	(X)
Income of M/H as a % of family income	(X)	(X)	84.6	(X)	(X)	87.3	(X)	(X)	73.1
Average family size	(X)	(X)	5.81	(X)	(X)	4.56	(X)	(X)	4.71
High school--1 to 3 years	3.9	2,584	(X)	7.5	6,463	(X)	5.8	10,376	(X)
Income of M/H as a % of family income	(X)	(X)	85.6	(X)	(X)	87.4	(X)	(X)	76.0
Average family size	(X)	(X)	5.71	(X)	(X)	4.47	(X)	(X)	4.68
High school--4 years	5.3	2,532	(X)	14.5	7,010	(X)	17.6	11,322	(X)
Income of M/H as a % of family income	(X)	(X)	87.6	(X)	(X)	90.2	(X)	(X)	80.7
Average family size	(X)	(X)	5.45	(X)	(X)	4.24	(X)	(X)	4.38
College--1 to 3 years	1.4	2,211	(X)	3.8	7,134	(X)	7.6	12,578	(X)
Income of M/H as a % of family income	(X)	(X)	73.9	(X)	(X)	91.4	(X)	(X)	82.4
Average family size	(X)	(X)	5.32	(X)	(X)	3.93	(X)	(X)	4.24
College--4 or more years	0.9	1,712	(X)	2.8	7,301	(X)	12.0	16,117	(X)
Income of M/H as a % of family income	(X)	(X)	87.6	(X)	(X)	90.9	(X)	(X)	88.2
Average family size	(X)	(X)	3.77	(X)	(X)	3.90	(X)	(X)	4.25
College--4 years	0.6	1,416	(X)	1.6	7,329	(X)	6.6	15,195	(X)
Income of M/H as a % of family income	(X)	(X)	86.9	(X)	(X)	92.1	(X)	(X)	87.6
Average family size	(X)	(X)	3.45	(X)	(X)	3.94	(X)	(X)	4.26
College--5 or more years	0.3	2,224	(X)	1.2	7,263	(X)	5.4	17,232	(X)
Income of M/H as a % of family income	(X)	(X)	88.3	(X)	(X)	89.2	(X)	(X)	88.9
Average family size	(X)	(X)	4.31	(X)	(X)	3.83	(X)	(X)	4.25
45 to 64 years	14.7	1,594	(X)	25.6	6,065	(X)	42.2	13,001	(X)
Income of M/H as a % of family income	(X)	(X)	73.6	(X)	(X)	83.9	(X)	(X)	74.6
Average family size	(X)	(X)	4.49	(X)	(X)	3.10	(X)	(X)	3.59
65 years old and over	1.9	626	(X)	2.6	4,963	(X)	1.9	13,777	(X)
Income of M/H as a % of family income	(X)	(X)	73.4	(X)	(X)	83.2	(X)	(X)	76.1
Average family size	(X)	(X)	2.21	(X)	(X)	2.29	(X)	(X)	2.54
EMPLOYED--WORKED PART TIME LAST YEAR	8.6	1,430	(X)	4.8	3,764	(X)	1.3	12,250	(X)
Income of M/H as a % of family income	(X)	(X)	74.2	(X)	(X)	66.1	(X)	(X)	66.1
Average family size	(X)	(X)	3.80	(X)	(X)	2.51	(X)	(X)	3.05
EMPLOYED--DID NOT WORK LAST YEAR	2.1	1,070	(X)	0.8	3,289	(X)	0.1	6,441	(X)
Income of M/H as a % of family income	(X)	(X)	64.0	(X)	(X)	58.4	(X)	(X)	52.2
Average family size	(X)	(X)	3.33	(X)	(X)	2.66	(X)	(X)	3.37
UNEMPLOYED	4.1	2,349	(X)	2.7	5,126	(X)	1.6	10,295	(X)
Income of M/H as a % of family income	(X)	(X)	80.5	(X)	(X)	77.6	(X)	(X)	70.5
Average family size	(X)	(X)	5.05	(X)	(X)	3.28	(X)	(X)	3.96
NOT IN CIVILIAN LABOR FORCE	43.1	1,466	(X)	20.3	3,466	(X)	4.1	9,511	(X)
Income of M/H as a % of family income	(X)	(X)	75.7	(X)	(X)	66.8	(X)	(X)	58.2
Average family size	(X)	(X)	2.94	(X)	(X)	2.41	(X)	(X)	3.15
WORKED FULL TIME LAST YEAR	3.9	1,582	(X)	3.0	4,443	(X)	1.4	11,712	(X)
Income of M/H as a % of family income	(X)	(X)	75.1	(X)	(X)	72.3	(X)	(X)	70.1
Average family size	(X)	(X)	3.91	(X)	(X)	2.70	(X)	(X)	2.87
WORKED PART TIME LAST YEAR	4.3	1,470	(X)	1.9	3,518	(X)	0.2	9,570	(X)
Income of M/H as a % of family income	(X)	(X)	74.8	(X)	(X)	66.7	(X)	(X)	55.3
Average family size	(X)	(X)	3.19	(X)	(X)	2.48	(X)	(X)	3.73
DID NOT WORK LAST YEAR	34.8	1,427	(X)	15.4	3,268	(X)	2.5	8,259	(X)
Income of M/H as a % of family income	(X)	(X)	75.9	(X)	(X)	65.4	(X)	(X)	51.5
Average family size	(X)	(X)	2.80	(X)	(X)	2.35	(X)	(X)	3.26
45 to 64 years old	8.4	1,425	(X)	2.7	3,179	(X)	0.7	7,737	(X)
Income of M/H as a % of family income	(X)	(X)	71.0	(X)	(X)	55.6	(X)	(X)	49.2
Average family size	(X)	(X)	3.28	(X)	(X)	2.79	(X)	(X)	3.67
65 years old and over	23.7	1,350	(X)	12.2	3,317	(X)	1.7	8,599	(X)
Income of M/H as a % of family income	(X)	(X)	78.4	(X)	(X)	69.4	(X)	(X)	52.5
Average family size	(X)	(X)	2.36	(X)	(X)	2.22	(X)	(X)	3.02

X Not applicable.

Source: Based on tables for the Economic and Social Perspective of Families With Male Heads: March 1970.

Table G.—NUMBER, AGGREGATE INCOME, AND AGGREGATE EARNINGS OF CIVILIAN POPULATION 14 YEARS OLD AND OVER AND MALE FAMILY HEADS BY FAMILY INCOME CATEGORIES: MARCH 1970

(Dollar estimates relate to income received in 1969. Numbers may not add to totals because of rounding)

Civilian population of male family heads	Civilian population 14 years old and over			Worked full time in 1969 and employed in March 1970			Worked full time in 1969 and employed in March 1970 divided by civilian population 14 years old and over x 100		
	Number (in thousands)	Aggregate income of persons (in millions of dollars)	Aggregate earnings of persons (in millions of dollars)	Number (in thousands)	Aggregate income of persons (in millions of dollars)	Aggregate earnings of persons (in millions of dollars)	Number (in thousands)	Aggregate income of persons (in millions of dollars)	Aggregate earnings of persons (in millions of dollars)
	NUMBER						PERCENT		
Total	144,143.4	600,430	523,630	64,137.2	493,600	472,400	44.5	82.2	90.2
All male family heads	44,647.5	391,710	353,741	35,814.1	352,900	337,400	80.2	90.1	95.4
FAMILY INCOME CATEGORIES									
Less than Low Economy Standard Budget	3,084.9	5,378	3,217	1,299.7	2,712	2,521	42.1	50.4	78.4
More than "LTLESB" and less than $10,000	19,135.3	106,260	90,344	13,674.1	86,220	83,550	71.5	81.1	92.5
More than $10,000	22,427.3	280,019	260,214	20,840.3	263,900	251,300	92.9	94.2	96.6
	PERCENT DISTRIBUTION								
Total	100.0	100.0	100.0	100.0	100.0	100.0			
All male family heads	31.0	65.2	67.6	55.8	71.5	71.4			
FAMILY INCOME CATEGORIES									
Less than Low Economy Standard Budget	2.1	0.9	0.6	2.0	0.5	0.5			
More than "LTLESB" and less than $10,000	13.3	17.7	17.3	21.3	17.5	17.7			
More than $10,000	15.6	46.6	49.7	32.5	53.5	53.2			

Source: Based on tables for the Economic and Social Perspective of Families With Male Heads: March 1970.

There is an appreciable difference in economic effort exhibited by each group of male heads. The progression of effort beginning with male heads in families with family income below the low economy standard and extending to male heads in families with income above $10,000 may be illustrated by referring to the percent of civilian male heads in an income category who were employed full time in 1969 and were employed in March 1970, the survey month. This statistic climbs rapidly from 42 percent for male heads in families below the low economy standard budget to 72 percent for the intermediate group, and 93 percent for males in families with income above $10,000. It should also be noted that for the same group of heads, those in the highest family income classification are associated with family members who contribute proportionately more to the family than do family members in the other two income categories. Family members other than the head contributed 22 percent to family income for the above-$10,000 category, 14 percent for the intermediate category, and 18 percent for the lowest income category.

With each higher income category, the proportion of male heads with less than 8 years of education and who were employed full time in 1969 and were employed in March 1970 declines from 23 percent for the lowest income category to 19 percent for the intermediate one, and 11 percent for the highest one; the latter percent represents some 2.5 million families. The modal educational level of male heads for the two highest income categories is 4 years of high school, 25 percent for males in families with income more than the low economy standard budget but less than $10,000, and 34 percent for those in families with income above $10,000.

For the 25- to 44-year age group and for the various income categories shown in table F, the income of male heads as a percent of family income tends to increase while average family size tends to decrease as education of head increases. At each educational level, the 25 to 44 age group in the $10,000 and over income category has a larger family size than does the intermediate income category. In the less than college level, the average size of family at each educational level is largest for families with income less than the low economy standard budget.

To place the importance of the statistics on male heads who were employed full time in 1969 and were employed in March 1970 in sharper perspective with respect to their contributions to the economic activity of the economy and within their income categories, several percentages that appear in table G are cited. All male family heads comprised 31 percent of all persons in the civilian population, 14 years old and over, and accounted for 65 percent of all income of persons and 68 percent of their earnings. Male family heads who were employed full time in 1969 and were employed in March 1970 represented 25 percent of all persons

in the civilian population and generated 59 percent of the aggregate income of persons and 65 percent of total earnings of $524 billion by the civilian population. For male heads in families with income of $10,000 or more the comparable estimates were 14.5 percent of the civilian population and 48 percent of aggregate earnings of persons. Within the highest income group, $10,000 or more of family income, the 93 percent of male heads who worked full time had 94 percent of the aggregate income and 97 percent of the earnings. This very uniform performance and reward record in the economy for a group which produces 44 percent of all income and 48 percent of all earnings is considerably different than for the other two income categories. As shown in table G, male heads who worked full time last year made up 42 percent of all male heads in families with income less than the low economy standard budget and received 50 percent of all income for the group. For male heads in the intermediate family group the comparable figures were 71.5 percent and 81 percent.

IV. Improving and Expanding the Data Source and Scope of the Economic and Social Perspective Tables

The Current Population Survey generates each month a wealth of data across a broad spectrum of subjects. As a beneficiary of this largess, I have never quite ceased being amazed by the rational statistical network of social and economic relationships that the survey unfailingly produces. This does not mean however that the data are without limitations or that the money income concept is not losing some of its dominance as the principal indicator of welfare. The inaccuracy in reporting, particularly underreporting, interest and dividends, social security benefits and public assistance, and the difficulties in collecting reliable self-employment farm and nonfarm income is well recognized and has appeared in the income literature. The problem becomes more critical as more and more Government programs in the social sphere rely on these income statistics for planning and evaluation purposes.

Improvements in CPS income estimates by correcting for dificient income responses can be accomplished by various adjustment procedures. These may range from arbitrary allocations of income to respondents to make the survey income estimates equal independent control totals to discretionary assignments based on special surveys and associated information. For some sources of income, for example public assistance, a particularly effective method of appraising the quality of individual responses and improving coverage is to conduct surveys sampled from an established list of income recipients. This procedure permits analyses of respondents who incorrectly report no income or who correctly report the income source but incorrectly report by either overstating or understating the amount of income. The list sample approach cannot of course detect respondents who incorrectly report receiving income from a given source. Reducing this type of error can only proceed from the CPS vehicle and is expensive to conduct and the results are subject to a large element of uncertainty because of the difficulty of locating respondents on a given list.

Two hundred years ago in this country nonmoney income was an important and pervasive characteristic of an economy in which a large proportion of the population was engaged in semisubsistence-type agriculture. The currently expanding nonmoney income phenomenon seems to be considerably less anchored in the technological characteristics of the economy than 200 years ago and more in man's social perception of the needs and requirements of men and women in securing stipulated social objectives. Employers increase their financial participation in private pensions and health plans and contributions to the Social Security Trust Fund with respect to their wage bill and Government assumes, develops, and finances more supportive social and health services. The growing list and value of nonmoney income sources and personal benefits derived from labor/employer contracts and practices and Government programs portend increased interest in collecting information on the subject in household surveys that are compatible with the Current Population Survey that can serve as a basic core vehicle. The precise vehicles and methods to estimate and distribute defined nonmoney income sources and personal benefits will have to be determined. The options that come to mind are possible supplements to CPS, collateral surveys, some of which could be of the list sample variety, administrative statistics, and at a minimum the heroic efforts of intelligent, imaginative, and experienced analysts in developing estimations and adjustment procedures to modify money income estimates in order to take account of nonmoney income and personal benefits derived from Government programs.

In an informative paper delivered before this Association in 1971 at Fort Collins, Colorado, "Changes in the Distribution of Taxes Among Income Groups: 1962 to 1968," Roger A. Herriot and Herman P. Miller broadly followed the methodological roads travelled earlier by other analysts to merge money and nonmoney income sources. Neither endorsing the estimates presented in table 9 of that paper nor the conclusions drawn at its finish, I am presenting them here as table H to indicate in broad terms what we can ultimately attain in bringing together more elements than money income in an overall presentation of the assignment of this Nation's output of goods and services to its population.

The flexibility of the modular format used to present the economic and social perspective tables as indicated in Section III of this paper with respect to adding additional variables or level of detail from the CPS or 1970 Census of Population and Housing can be extended to embrace the tax and Government expenditure activities discussed in the Herriot and Miller paper. In addition the modular format can accommodate consumption and wealth elements associated with identifiable groups in the population.

Table H.--PERCENT DISTRIBUTIONS OF FAMILIES AND UNRELATED INDIVIDUALS AND OF TOTAL INCOME BEFORE AND AFTER TAXES, TRANSFERS, AND GOVERNMENT EXPENDITURES, FOR 1968

Adjusted money income intervals	Families and unrelated individuals	Total income before taxes, transfers, and Government expenditures	Total income after taxes, transfers, and Government expenditures		
			A 1/	B 2/	C 3/
Total.....	100.0	100.0	100.0	100.0	100.0
Under $2,000.....	9.9	0.8	2.1	2.6	3.6
$2,000 to $4,000.....	12.4	2.9	5.1	5.4	6.6
$4,000 to $6,000.....	12.8	5.9	7.5	7.3	8.6
$6,000 to $8,000.....	13.9	9.7	10.5	10.1	11.1
$8,000 to $10,000.....	13.0	11.6	11.9	11.1	12.1
$10,000 to $15,000.....	22.2	27.3	26.4	25.1	25.6
$15,000 to $25,000.....	12.3	23.6	21.9	21.0	20.1
$25,000 to $50,000.....	3.0	11.3	9.8	10.4	8.4
$50,000 plus.....	0.5	6.9	4.8	7.0	3.9

1/ A = Unallocable expenditures distributed by total income.
2/ B = Unallocable expenditures distributed by total wealth.
3/ C = Unallocable expenditures distributed by number of families and individuals.

Source: American Statistical Association, "Changes in the Distribution of Taxes Among Income Groups: 1962 to 1968," 1971 Proceedings of the Business and Economics Statistics Section, by Roger A. Herriot and Herman P. Miller, table 9, page 113.

V. Concluding Comments

The work reported in this paper is geared to synthesizing a large amount of economic and social statistics produced from the CPS and molding it into a format suitable for presenting information and establishing a structure for economic and social accounts. A major theme that emerges from the data is the connecting link in the United States economy between economic effort and reward in terms of money income before taxes but including Government transfer payments. This finding is compatible with at least two hard facts of life that persistently reappear in history with boring regularity. First an economic system must in essence, if it is to achieve a modicum of success other than perpetuating itself by healthy doses of repression, be able to distribute rewards to productive forces in the economy in proportions that are approximately commensurate with their economic performances and also have their acquiescence with respect to Government finance and expenditure programs. As a corollary, words, phrases, and exhortations cannot paper over the first observation for any extended period of time.

Looking at the different cumulative income size distributions in Section II, table C, prompts me to point out that the ratios of percents of aggregate family income to all families is a very gross relationship measure that can stand a great deal of refinement in terms of standardized universes in order to make it a more acceptable statistic for use in economic and social analysis. This comment applies equally as well to other generalized measures such as Gini ratios to describe the income inequality of all families or persons. One can pick up the 1971 Statistical Abstract of the United States, turn to table 72, page 55, and find that for 1967 the death rates per 1,000 population were identical for white and Negro and other at 9.4 per 1,000. I do not think we would leap from this statistic to the conclusion that this indicated that the health experiences of both population groups, which are different in age and sex composition, were the same. Examination of age-specific survival rates by sex shows that the populations on the average are not equally at risk with respect to death. Similarly the data as summarized in table C and other tables in this report most certainly reflect measurable differential dollar and time investment commitments and current family operating costs, again in terms of dollars and time expenditure, in securing given income levels, exclusive of any differences in innate qualities, functioning abilities, and cultural aspirations of family heads and members.