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Feature Articles

Research Summaries

Regular Items

Income and Consumer Expenditures of Households Headed by Hispanic and Black Elderly Women

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Among the elderly, females are more likely than males to be poor. Minority females are more likely than White females to be poor. Using 1989-91 Consumer Expenditure Survey data, this study reports incomes and expenditures of Hispanic, Black, and White consumer units with a female reference person or spouse 65 years or older. The average income of Black households was $11,872; Hispanics, $16,570; and Whites, $18,932. Expenditures of Black and Hispanic households were also substantially lower than those of White households. On average, Black households spent 62 percent and Hispanic households spent 87 percent as much as White households ($17,154). On an average per capita basis, Blacks spent 53 percent and Hispanics spent 72 percent as much as Whites ($10,211). Since Black and Hispanic elderly women have a substantially lower level of income and expenditures than White women, they may merit special attention from policymakers and educators who are interested in the well-being of elders.

Although the poverty rate among the elderly has declined from 29 percent in 1966 to 12 percent in 1991 (*5*), the poverty rates of elderly persons who are women and from minority races and origins are much higher. Elderly **women** are more likely than elderly men to be poor. Sixteen percent of women 65 years or older are poor, compared with 8 percent of men. Elderly **minority** women are more likely than elderly White women to be poor. Thirty-nine percent of elderly Black women and 25 percent of elderly Hispanic women are poor (*9*). Census data show that the median income of Black women ($5,059) 65 years or older was only 65 percent that of White women ($7,816); Hispanic women's income ($4,992) was 64 percent that of elderly White women (*1*).

Current demographic trends indicate that an increasing number and proportion of elderly women are members of minority groups. Hispanics are an increasing proportion of the elderly and trends point toward a feminization of the Hispanic elderly population. This results from increases in life expectancy of minorities that tend to favor females (*4*) and immigration rates that more closely match those of Hispanic men (*2*). Table 1 shows that the percentages of elderly who are Hispanic increased from 2.8 to 3.7 percent during the period 1980 to 1990; the percentage of elderly women who are Hispanic increased from 2.7 to 3.7 percent. Origins of the Hispanic population who are 65 years or older are 54 percent Mexican, 14 percent Cuban, 10 percent Puerto Rican, 8 percent from South or Central America, and 14 percent from other areas (*10*).

The percentage of elders who are Black declined during the last decade because the proportion of elderly men who are Black decreased. Black **women** remained at 8.1 percent of the population of elderly women.

Because elderly minority women are more likely to be economically vulnerable than other elderly people and because they are an increasing proportion of the population, their economic status is of interest and concern. Therefore, this study will compare the economic status of Black and Hispanic female elders with that of White female elders using consumer expenditures as a measure of economic status.

Table 1. Distribution of population age 65 or older, by race and sex, 1980 and 1990

Race, origin	1980			1990		
	All	Men	Women	All	Men	Women
65 years and older (number in thousands)	25,707	10,364	15,343	31,224	12,557	18,668
	Percent					
Hispanic	2.81	3.00	2.69	3.73	3.85	3.65
Black	8.08	8.11	8.06	7.86	7.51	8.09
White	87.99	87.58	88.25	86.65	86.69	86.62
American Indian, Eskimo, and Aleut	.28	.31	.27	.35	.37	.34
Asian and Pacific Islander	.84	1.00	.73	1.41	1.58	1.30

Source: Hollmann, F.W., 1993, U.S. Population Estimates, by Age, Sex, Race, and Hispanic Origin: 1980 to 1991, U.S. Department of Commerce, Bureau of the Census.

Source of Data

Data for this study are from the interview component of the 1989, 1990, and 1991 Consumer Expenditure Surveys (CE) conducted by the Bureau of the Census for the Bureau of Labor Statistics. The CE is an ongoing survey that collects data on household expenditures, income, and major socioeconomic and demographic characteristics. A national sample of consumer units[1] is interviewed once each quarter for five consecutive quarters; the first interview is used only for bounding purposes. Using a rotating sample design, about one-fifth of the sample is replaced each quarter. Each year of CE data contains information from about 20,000 quarterly interviews. Income data are annual, and quarterly expenditure data are multiplied by four to provide estimates of annual expenditures. The data are weighted to represent the U.S. noninstitutionalized population.

For this study, 3 years of data were used to provide an adequate sample size of Hispanic women.[2] Since the CE survey was of the civilian noninstitutionalized U.S. population, women in nursing homes[3] or similar institutions were not interviewed. Only consumer units with a female reference person[4] or female spouse were selected; thus, women 65 years or older living in the homes of their children or others[5] were not included. Also, units with a male reference person without a spouse were excluded since the focus was on elderly women.There were 10,007 consumer units with a woman 65 years or older who was the reference person or was married to the reference person. Of these, 281 were Hispanic, 856 were Black, and 8,668 were White women. For the subgroup of elderly women who live alone, 97 were Hispanic, 393 were Black, and 3,853 were White.

[1]A consumer unit consists of either: (1) all members of a particular housing unit who are related by blood, marriage, adoption, or other legal arrangements: (2) two or more people living together who pool their incomes to make joint expenditure decisions; or (3) a person living alone or sharing a household with others or living as a roomer in a private home or lodging house or in permanent living quarters in a hotel or motel, but who is financially independent. To be considered financially independent, at least two of the three major expense categories (housing, food, and other living expenses) have to be provided by the respondent. In this paper, the term household refers to consumer unit.

[2]Even with 3 years of data, the numbers of Asian or Pacific Islander and American Indian, Aleut, or Eskimo consumer units were too small for analysis.

[3]Six percent of women 65 years or older live in nursing homes (*7*).

[4]Reference person is the first member mentioned when the respondent was asked to "start with the name of the person or one of the persons who owns or rents the home."

[5]In 13 percent of consumer units with a woman 65 years or older, the woman is living with her children, siblings, or nonrelatives as a consumer unit (*7*).

Characteristics of Households Headed by Elderly Women

Family Type

Hispanic and White women over age 65 were more likely than Black women to be married (table 2). Almost half had a husband, whereas less than one-third of Black women were married. Being married often confers economic benefits including Social Security and the retirement benefits of the husband (*6*). Black women were most likely to live alone; 47 percent lived alone. They were also more likely than the other women to have others, such as children or siblings, live with them. Hispanic women were least likely to live alone and White women were as likely to live with a husband as alone.

Region

Half of the Black women and nearly half of the Hispanic women lived in the urban South. Few Hispanic or Black women were in rural areas. White women were distributed somewhat equally in the four regions and rural areas. The concentration of Hispanic and Black women in the southern region permits targeted efforts for education and family service programs for these women.

Age of Woman

Hispanic women were more likely to be in the 65-74 age category. Sixty-nine percent of elderly Hispanic women were in this age range, compared with 59 percent of Black and White women.

Table 2. Characteristics of households headed by elderly Hispanic, Black, and White women, 1989-91

Characteristic	Hispanic	Black	White
		Percent	
Family type			
Husband and wife[1]	46	30	46
Single woman living alone	37	47	44
Other	17	23	10
Region			
Urban			
Northeast	18	15	21
Midwest	2	18	21
South	47	50	24
West	32	6	17
Rural	1	11	17
Age of woman			
65 - 74 years	69	59	59
75 years or older	31	41	41
Education of woman			
8th grade or less	66	50	23
Some high school	12	23	17
High school graduate or more	22	27	60
Household income			
Less than $10,000	48	51	30
$10,000 - $19,999	25	25	31
$20,000 - $29,999	8	5	14
$30,000 - $39,999	8	4	6
$40,000 or more	6	2	7
Incomplete reporters	5	13	12
Earners			
No one	60	60	72
Woman or spouse	27	23	21
Others	13	17	7
Tenure			
Homeowner, with mortgage	27	17	13
Homeowner, no mortgage	33	48	66
Renter	40	35	21
Number of vehicles			
None	47	46	22
One	32	34	44
Two or more	21	20	34

[1]Children or others may live with husband and wife.

Education of Woman

Hispanic women were less educated than Black or White women. Two-thirds had an eighth-grade education or less, compared with half of Black and about one-fourth of White women. Thus, all educational programs and enrollment forms for participation in public assistance programs (such as food stamps) should be presented in a manner appropriate for an education level well below eighth grade. Hispanic women may have added difficulty if their primary language is Spanish.

Income

About half of Hispanic and Black women had household incomes less than $10,000, compared with 30 percent of White women. On the other end of the scale, 14 percent of Hispanic women and 13 percent of White women reported income of $30,000 or more. Some elderly women may have lived in households where someone was employed. Forty percent of Hispanic and Black families had an earner, compared with 28 percent of White families.

Housing Tenure

Home ownership is a major asset among elderly families. A smaller percentage of Hispanic families owned a home: 60 percent of Hispanic, 65 percent of Black, and 79 percent of White families were owners. Also, about half of the Hispanic owners were still paying on their mortgage.

Vehicles

Ownership of vehicles is not only an asset, it also allows easier access to community resources, markets, and services. Almost half of the Hispanic and Black families did not own a vehicle, compared with 22 percent of White families.

Table 3. Income sources of households[1] headed by elderly Hispanic, Black, and White women, 1989-91

Income source	Hispanic	Black	White
Total income before taxes	$16,570	$11,872	$18,932
Social Security, Railroad Retirement	6,370	6,017	8,986
Pensions, annuities	1,697	839	3,299
Interest, dividends	947	71	2,630
Earnings	6,045	4,185	3,656
Public assistance	1,432	718	268
SSI	784	371	82
Welfare	158	112	15
Food stamps	127	142	17
Other public	363	93	154
Regular contributions	80	42	93
Percent receiving income			
Social Security, Railroad Retirement	86	93	96
Pensions, annuities	17	15	42
Interest, dividends	19	7	44
Earnings	36	33	25
Public assistance	39	36	11
SSI	27	23	5
Welfare	4	5	1
Food stamps	21	22	4
Other public	3	3	5
Regular contributions	3	4	2

[1]Only the 88 percent of households who reported their income.

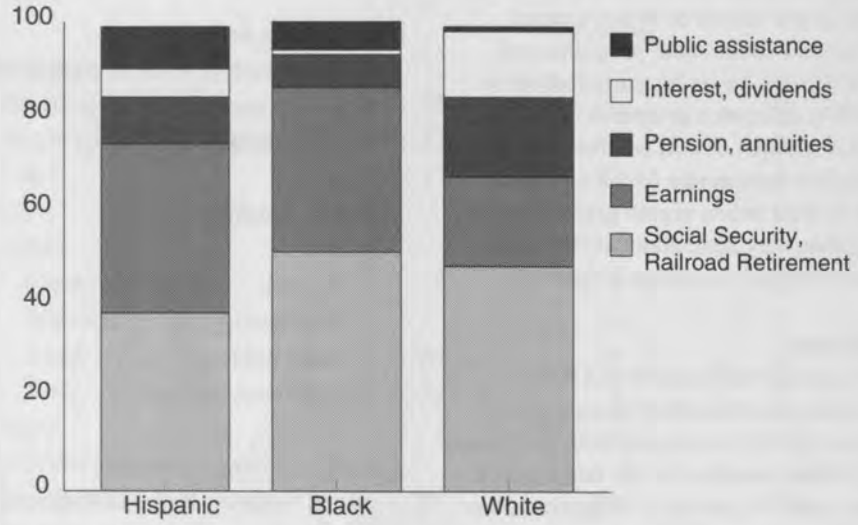
Income[6] Sources

Households headed by Black women had an average income of $11,872, which was the lowest of the three groups. The income was $16,570 for Hispanics and $18,932 for White households (table 3).

The relative importance of various sources of income was quite different for each group. Hispanic families were less likely than Black or White families to receive Social Security. Only 86 percent received Social Security, compared with 93 percent of Black families and 96 percent of White families. Hispanic women or their spouses may have worked in jobs that were not covered by Social Security or they may still be working so they have not yet applied for Social Security benefits. Thirty-nine percent of Hispanic households reported income from public sources (SSI, welfare, food stamps, and other). Thirty-six percent had earnings or had someone in the household who reported earnings.

[6]Twelve percent of the consumer units did not give complete reporting of their income so are not included in this analysis of income sources.

Percent of income from major sources: Households[1] headed by elderly Hispanic, Black, and White women, 1989-91



[1]Only the 88 percent of households who reported their income.

... Black elderly households spent 62 percent and Hispanic households spent 87 percent as much as White households.

The figure shows the proportion of income from major sources. Households of elderly Hispanic women received 38 percent of their income from Social Security, 36 percent from earnings, 10 percent from pensions and annuities, 6 percent from interest and dividends, and 9 percent from public monies. Of the three groups, Hispanics received the smallest proportion from Social Security and the largest proportions from earnings and public funds.

Black households received 51 percent of their income from Social Security, 35 percent from earnings, 7 percent from pensions and annuities, 1 percent from interest and dividends, and 6 percent from public funds. Of the three groups, Black elders had the largest proportion of their income from Social Security, even though they received less, on average—$6,017—than the other groups. Total income of Black households was enough lower than that of Hispanic or White households that Social Security assumed greater importance.

Households of White elderly women received 48 percent of their income from Social Security, 19 percent from earnings, 17 percent from pensions and annuities, 14 percent from interest and dividends, and 1 percent from public funds. Of the three groups, White elders had the largest proportion of income from pensions and annuities as well as from interest and dividends. These income sources may reflect a husband's employment in jobs with retirement benefits and accumulated wealth.

Allocation of Expenditures of Elderly Women

Households headed by Black women spent the least. Their annual total expenditures averaged $10,606, compared with $14,961 for Hispanic households and $17,154 for White households (table 4). The average family size was 1.97 in Black households, 2.03 in Hispanic, and 1.68 in White households. When per capita expenditures are compared,

Table 4. Expenditures and expenditure shares of households headed by elderly Hispanic, Black, and White women, 1989-91

Expenditures	Hispanic	Black	White	Hispanic	Black	White
					Percent	
Total expenditures	$14,961	$10,606	$17,154	100	100	100
Per capita expenditures	7,370	5,384	10,211			
Housing	6,007	3,863	5,808	40	36	34
Food	3,407	2,433	3,158	23	23	18
Transportation	1,785	1,297	2,801	12	12	16
Health	1,355	1,057	2,224	9	10	13
Apparel	574	407	647	4	4	4
Other	1,833	1,549	2,516	12	15	15

households of Black women still spent the least. Per capita expenditures were $5,384 for Black, $7,370 for Hispanic, and $10,211 for White households. Using a third measure (expenditures/need ratio), Black women again fared worse than Hispanic or White women. The expenditures[7] of each consumer unit were divided by the poverty threshold[8] for their household size and the appropriate year. This provided an expenditure-to-need measure for each household. The average ratio for elderly Black female households was 1.30, compared with 1.75 for Hispanic, and 2.27 for White.

In comparing total expenditures among the three groups, Black elderly households spent 62 percent and Hispanic households spent 87 percent as much as White households. The substantial differences among the three groups reflect differences in income, family type, woman's age and education, region, and home ownership.

There were two exceptions to the overall pattern of Blacks spending the least and Whites spending the most: housing and food expenditures. Average housing expenditures were highest for Hispanic women. Most Hispanics were either paying rent or paying a mortgage; only 33 percent had a home with no mortgage, compared with 48 percent of Black and 66 percent of White females. Also, Hispanic households were a little larger than other households so may have required a larger dwelling, more utilities, and more furnishings. Hispanics spent more for food than Black or White households. Again, the larger family may have required more food. Also, food expenditures may reflect higher food prices where they shopped; many Hispanics and Blacks had no vehicle and had to choose where to shop based on convenience rather than price.

Transportation, health, and apparel expenditures followed the overall pattern of highest total expenditures for White households and lowest for Black households.

The budget shares allocated to each category of expenditures are also shown in table 4. Hispanics spent a larger share (40 percent) of their expenditures for housing than Blacks (36 percent) or Whites (34 percent). Food accounted for 23 percent of the expenses of Hispanic and Black households, compared with 18 percent in White households.

Elderly women who live alone are considered more economically vulnerable than those who live with spouses or others who may contribute resources to the household. For that reason, the expenditures of elderly females who lived alone are shown in table 5, p. 8. The same general pattern existed; Black women had the lowest expenditures and White women had the highest expenditures. Of elderly women living alone, Black women spent 59 percent, and Hispanic women 67 percent, as much as White women.

[7]Expenditures were used rather than income because 12 percent of the sample did not report income.

[8]For example, the 1990 poverty threshold for persons 65 years or older was $6,268 for one-person households and $7,906 for two-person households. Thresholds for larger household sizes and for 1989 or 1991 were also used (*8*).

Table 5. Expenditures and expenditure shares of elderly Hispanic, Black, and White women who live alone, 1989-91

Expenditures	Hispanic	Black	White	Hispanic	Black	White
					Percent	
Total expenditures	$7,858	$6,855	$11,692	100	100	100
Housing	3,940	3,253	4,908	50	47	42
Food	1,945	1,691	2,016	25	25	17
Transportation	415	414	1,173	5	6	10
Health	773	654	1,592	10	10	14
Apparel	230	169	471	3	2	4
Other	555	674	1,532	7	10	13

Summary

In summary, Hispanic and Black elderly women are not as well-off economically as White elderly women. Their expenditures are lower and their resources are fewer.

Nearly half of Hispanic elderly women have annual household incomes less than $10,000. Two-thirds have an eighth-grade education or less. Only one-third own their home without a mortgage, and nearly half do not own a vehicle. Forty percent of their expenses are for housing and nearly one-quarter are for food.

Over half of Black elderly women have incomes less than $10,000. Half have an eighth-grade education or less. Nearly half own their home without a mortgage and nearly half do not own a vehicle. Over one-third of their expenditures are for housing and nearly one-quarter are for food. Nearly half of these women live alone.

The data suggest that minority elderly women are economically vulnerable. Some of the causes, such as lack of education, may be rooted in environments, experiences, and decisions from long ago. In any case, their current economic status requires consideration of their special needs from program planners, policymakers, and educators.

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The Food Situation of Families Maintained by Single Mothers: Expenditures, Shopping Behavior, and Diet Quality

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This study examined (1) self-reported food adequacy and expenditures, (2) food shopping behavior, and (3) diet quality of families maintained by single mothers and married couples. Data are from the 1989-90 Continuing Survey of Food Intake by Individuals for 379 families maintained by single mothers and 1,049 families maintained by married couples. These data are weighted to provide population estimates. Although single mothers viewed the food adequacy of their household less positively than did married couples, their food expenditures were not appreciably different, especially when noncash benefits were taken into account. Most single mothers shopped infrequently. Overall, the diets of single and married mothers and their children, as measured by food variety, fat/cholesterol intake, and nutrient intake, were found to be lacking. Results suggest that nutrition education programs that consider the income constraints and food shopping behavior of single-parent families are needed.

Families maintained by single mothers are a growing proportion of all families with children. In 1970, single mothers headed 12 percent of all family groups with children under age 18. By 1992, this percentage had increased to 26 percent (*14*). These families are also one of the more economically distressed groups in the United States. In 1991, 47 percent of families with children under 18 maintained by females with no husband present fell below the poverty thresholds (for their household size), compared with 8 percent of families with children under 18 maintained by married couples (*22*). Given the large number of female-headed families with children and their relatively poor economic status, research on the food situation of these families was undertaken.

Specifically, this study examines their: (1) reported food adequacy and expenditures, (2) food shopping behavior, and (3) diet quality (of mothers and children). For comparison, the food situation of married-couple families and, for individual level analysis, married mothers is also assessed. Previous research has seldom focused exclusively on the food situation of families maintained by single mothers and has never addressed the above three aspects of their food situation simultaneously (*1,3,4,6,25*).

Data and Sample

Data for this study are from the 1989-90 Continuing Survey of Food Intake by Individuals (CSFII), conducted by the Human Nutrition Information Service (HNIS) of the U.S. Department of Agriculture (USDA). The survey is administered to a nationally representative sample of households in the 48 conterminous United States and consists of an all-income and low-income sample. In the all-income sample, all households, including low-income households, were eligible to be interviewed. For the low-income sample, participation was limited to households with a gross income for the previous month at or below 130 percent of Federal poverty thresholds (*16*). Sixty-seven percent of households in the 1989-90 CSFII were from the all-income sample; 33 percent were from the low-income sample. The household response rate was 68 percent in 1989 and 66 percent in 1990 (the response rate was slightly higher for the low-income sample than the all-income sample).

Data for 4,406 households with a total of 11,551 individuals in these households were collected in the 1989-90 CSFII. Families maintained by single mothers or married couples with at least one child under age 18 in the home were selected for this study. Because the CSFII did not ask respondent's marital status, these two household groups had to be constructed by assumption. Households headed by women where all other household members were children of these women (that is, no spouse, cohabiting partner, or other adult was present in the home) were defined as families maintained by single mothers. In 1986, such single-mother families composed 72 percent of all single-mother situations (*24*). Households headed by males or females where all other household members were a spouse and children of the head or spouse were defined as married-couple families.

Information was collected from each household member on socioeconomic characteristics, food consumption, and perceived healthfulness of diet; for children under age 12, information was provided by a parent. Household level information (reported food adequacy, expenditures, and program participation) was collected from the primary respondent who was typically the main meal planner/preparer for the family. Food shopping behavior was also provided by the primary respondent. In families maintained by single mothers, the primary respondent was always the mother; in married-couple families, the primary respondent was the mother in 91 percent of cases.

The sample consisted of 379 families maintained by single mothers and 1,049 families maintained by married couples drawn from combined all-income and low-income households. Data were weighted to reflect the population so results are population estimates.[1]

[1]For overall household and household representative data, CSFII household weights were used; for data from the Diet and Health Knowledge Survey section of the CSFII, weights developed for this section were used; for data on dietary intake, CSFII day 1 dietary intake weights were used.

Table 1. Characteristics of single and married mothers, 1989-90

Characteristics	Single mothers	Married mothers
Average age	35	35
Average before-tax family income[1]	$15,120	$43,759
	Percent	
Mother's		
Education[1]		
No high school diploma	28	11
High school diploma	42	40
Some college or more	30	49
Race[1]		
White	65	87
Non-white	35	13
Employment status[1]		
Employed	52	66
Not employed	48	34
Number of children[1]		
One	48	30
Two	29	44
Three or more	23	26
Home ownership[1]		
Own	27	74
Rent	73	26
Residence[2]		
Central city	36	29
Noncentral city	64	71

[1]Difference between groups statistically significant at 0.05 level.
[2]Difference between groups statistically significant at 0.10 level.

Weighting also ensured that the low-income sample of the CSFII was not overrepresented. Statistical tests of significance (t-tests and Chi-square tests) were calculated at the 0.05 and 0.10 level of probability; all statistically significant results discussed are significant at the 0.05 level, unless noted that they are significant at the 0.10 level only. These tests were computed using the statistical package SUDAAN (*15*). This package allows for statistical tests of significance on weighted data from complex survey designs and its use is recommended for the CSFII (*20*). Means and tests of significance for continuous variables were calculated using PROC DESCRIPT of SUDAAN; frequencies and Chi-square tests of significance for categorical variables were calculated using PROC CROSSTABS of SUDAAN.

It should be noted that findings of statistically significant differences between single-parent and married-couple families do not necessarily imply that these differences are practically meaningful. Conversely, the failure to find a particular difference statistically significant does not mean that no real difference exists between the two groups in the population. Tests of significance depend on sample size. Levels of difference found to be insignificant in this study might be significant with a larger sample size. In addition, all statistics based on sample cells with fewer than 45 respondents are flagged since the statistical tests used in the paper can fail with such small samples.

Characteristics of Single and Married Mothers

Average age of both single and married mothers was 35 (table 1). Average before-tax household income was significantly lower for families maintained by single mothers than for those maintained by married couples ($15,120 versus $43,759). Average household size of single-parent families was 2.9 and that of married-couple families, 4.1. Therefore, average per capita income of families maintained by single mothers was also lower than that of their married-couple counterparts ($5,210 versus $10,670).

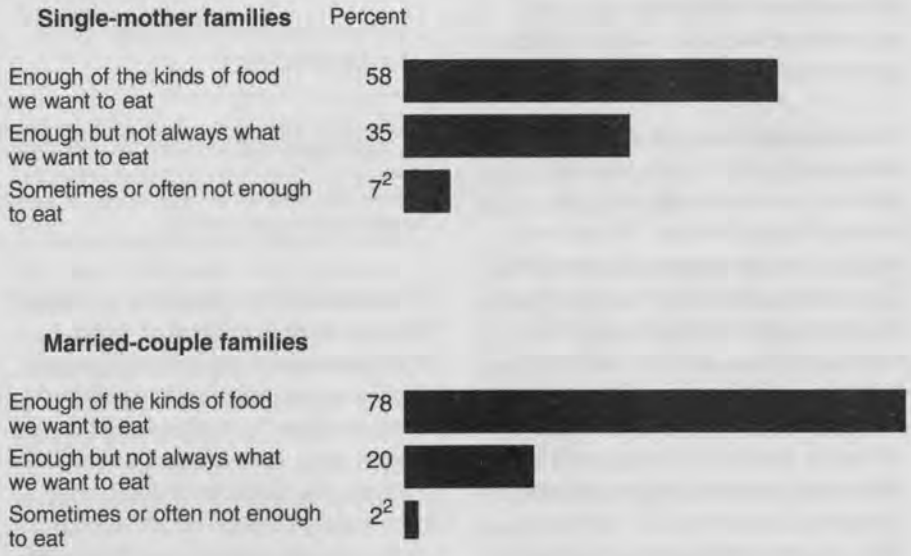
Single mothers had significantly less formal education than married mothers. Twenty-eight percent of single mothers did not have a high school diploma, compared with 11 percent of married mothers. More single than married mothers were non-white (35 versus 13 percent) and not employed (48 versus 34 percent); both differences were statistically significant. A significantly smaller proportion of single-mother families resided in an owned home (27 versus 74 percent). Thirty-six percent of single-parent families and 29 percent of married-couple families resided in a central city; this difference was significant at the 0.10 level. A central city is defined as a city with a population of 50,000 or more that is the main city within an MSA (Metropolitan Statistical Area).

Food Adequacy and Expenditures

For an overview of how families perceived their food adequacy, primary respondents were asked to describe the food eaten in their household. One of four response options could be given: (1) "enough of the kinds of food we want to eat," (2) "enough but not always what we want to eat," (3) "sometimes not enough to eat," and (4) "often not enough to eat" (for this analysis the last two response options were combined because of the small number of cases in each). Although this question can be interpreted differently by various respondents, it does give a general indication of how they viewed their food adequacy.

A significantly lower percentage of families maintained by single mothers, compared with married couples, stated they had enough of the kinds of food they wanted to eat (58 versus 78 percent) (fig. 1). Seven percent of single-parent families stated they sometimes

Figure 1. Reported food adequacy of families with children maintained by single mothers and married couples, 1989-90[1]



[1]Difference between groups statistically significant at 0.05 level.
[2]Number of cases less than 45.

or often did not have enough to eat, compared with 2 percent of married-couple families.

Although families maintained by single mothers perceived their food adequacy as lower than families maintained by married couples, food expenses were not that different between the two groups (table 2). In the CSFII, respondents were asked their usual food expenses over the past 3 months. For this study, these expenses were calculated on a weekly basis. This was done for overall food expenses, per capita expenses, and expenses per adult male equivalent for food energy or calories (AME).

The AME measure adjusts household size for the ages and sex of household members. Each household member is given a score based on his or her Recommended Energy Intake (REI) for food energy in relation to the REI for a male age 23 to 50 years (*13*). For example, a male age 30 would have a score of 1.00, a female age 30 would have a score of 0.76, and a 2-year-old would have a score of 0.45. The scores for all household members are then summed to yield household size in AME's. This measure is thought to be useful for examining food expenditure differences between households where age and sex composition varies, such as single-parent versus married-couple families.

Average weekly food expenses amounted to $65 for single-parent families, compared with $107 for married-couple families. When these weekly food expenses are annualized, 22 percent of the before-tax income of single-parent families goes to food, compared with 13 percent of that of married-couple families. There was a smaller, but significant, difference in per capita weekly food expenses between single-parent and married-couple families ($24 versus $27). However, there was no significant difference in total food expenses per adult male equivalent between the two groups.

Table 2. Food expenditures and food program participation of families with children maintained by single mothers and married couples, 1989-90

Expense and program participation	Single-mother families	Married-couple families
Average weekly food expense in past 3 months		
	Dollars	
Total[1]	65	107
Per capita[1,2]	24	27
Per adult male equivalent[3]	33	35
Food at home[1]	55	84
Per capita	20	21
Per adult male equivalent	28	27
Food away from home[1]	10	23
Per capita[1]	4	6
Per adult male equivalent[1]	5	8
	Percent	
Receive		
Food stamps[1]	38	3
WIC benefits[1]	11	3
Surplus food[1]	6[4]	2[4]
Free or reduced-price school breakfast for child/children[1]	15	4
Free or reduced-price school lunch for child/children[1]	35	11

[1]Difference between groups statistically significant at 0.05 level.
[2]Per capita figures were derived by summing individual family per capita expenditures and calculating the mean.
[3]Adjusts family size for the ages and sex of household members.
[4]Number of cases less than 45.

Per capita and per adult male equivalent weekly expenses for **food at home** (food purchased at specialty and grocery stores) were not found to be significantly different in the two types of families. A lower proportion of weekly food expenses was allocated to **food away from home** in single-parent families compared with married-couple families.

Food away from home accounted for 15 percent of the total food dollars in single-parent families, compared with 21 percent in married-couple families. Per capita weekly expenses for food away from home were lower for single-parent than married-couple families ($4 versus $6), as were per adult male equivalent expenses for food away from home ($5 versus $8). Both differences were statistically significant.

Families maintained by single mothers were significantly more likely to participate in government food programs than their married-couple counterparts. Among single-parent families, 38 percent were receiving food stamps; 11 percent, WIC benefits (Special Supplemental Food Program for Women, Infants, and Children); and 6 percent had received surplus food in the 3 months before the interview. In addition, 15 percent had at least one child receiving a free or reduced-price school breakfast, and 35 percent had at least one child receiving a free or reduced-price school lunch. Among married-couple families, 3 percent were receiving food stamps; 3 percent, WIC benefits; 2 percent had received surplus food in the 3 months before the interview; 4 percent had at least one child receiving a free or reduced-price school breakfast; and 11 percent had at least one child receiving a free or reduced-price school lunch.

For families that used food stamps to purchase food, the value of the stamps used is included in their food expenses. However, the value of the other food programs used, such as WIC and free or reduced-price lunches, is not included in food expenses—nor can the value be determined from the data. Nonetheless, these other food programs raise the effective food expenditures of households that participate in them. The effective food expenditures of families maintained by single mothers per AME may therefore be higher than that of married-couple families.

Table 3. Food shopping behavior of families with children maintained by single mothers and married couples, 1989-90

Behavior	Single-mother families	Married-couple families
	Percent	
Main food shopper[1]		
Mother	98	74
Father	–	5
Both mother and father	–	19
Other[2]	2[3]	2[3]
Frequency of major food shopping[1]		
Once a week or more often	39	69
Once every 2 weeks	28	25
Once a month or less	33	6
Type of store major food shopping done		
Supermarket	99	97
Other[4]	1[3]	3[3]
Distance from home to store where major food shopping done[1]		
Less than 1 mile	25	17
1-3 miles	52	51
More than 3 miles	23	32

[1]Difference between groups statistically significant at 0.05 level.
[2]Includes children and people outside the household.
[3]Number of cases less than 45.
[4]Includes small stores.

Food Shopping Behavior

The food shopping behavior of families can provide further insight on their food expenses and diet quality. Who shops, where they shop, and how often they shop determines, in part, the types of foods purchased and consumed. In families maintained by single mothers the main shopper was almost always the mother (table 3). In married-couple families, 74 percent of respondents cited the mother as the main shopper.

Families maintained by single mothers did their major food shopping significantly less frequently than did those maintained by married couples. Thirty-nine percent of single-parent families did their major food shopping once a week or more often, compared with 69 percent of married-couple families; 33 percent of single-parent families did their major food shopping once a month or less often, whereas only 6 percent of married-couple families did. The infrequent food shopping of single-parent families probably affects the types of foods they purchase, especially fresh fruits and vegetables.

The less frequent major food shopping of single-parent families may be related to how food program benefits, which many of these families receive, are dispensed. Food stamps are typically distributed on a monthly basis. Single-parent families may plan their major food shopping around receipt of these benefits. Also, single parents are more likely to face time and child-care constraints when food shopping. Child-care arrangements must be made, or children

Single mothers were significantly more likely than married mothers to believe the healthfulness of their diet was only fair or poor.

are taken along to the food store. In addition, transportation may be a problem for single parents. A sizable percentage of single-parent families do not own a vehicle; 18 percent of white and 56 percent of non-white single-parent families did not own an automobile in 1984-85 (*9*).

Most families (97 to 99 percent) did their major food shopping at supermarkets. There was no significant difference between single-parent and married-couple families in this regard. The distance from home to the store where major food shopping was done was significantly less for single-parent than for married-couple families. For 25 percent of single-parent families, but only 17 percent of married-couple families, this distance was less than 1 mile. If transportation is a problem for single-parent families, they may have little choice as to where to shop—they shop at the nearest supermarket or food store.

The single mother and a parent in married-couple families were also asked to rank, on a 1 to 6 scale, the importance of certain factors when food shopping; 1 meaning not important at all and 6 signifying very important.[2] Factors ranked as very important were identified (fig. 2).

Taste was ranked as very important when food shopping by more single mothers and married persons (79 and 73 percent) than any other factor. Product safety was ranked as very important by the second highest percentage of single mothers and married people. There were no significant differences between the two groups with regard to these two factors. Sixty-nine percent of single mothers ranked how well food keeps and 67 percent ranked price as very important. A significantly lower percentage of married persons ranked these two factors as very important. The greater importance attributed to price by single parents was expected given their lower incomes. The importance assigned to how well food keeps is likely related to their infrequent food shopping.

Nutrition was cited by 62 percent of both groups as very important when food shopping. Ease of food preparation was cited by 42 percent of single mothers and 31 percent of married people as very important, a significant difference. The higher proportion of single mothers citing ease of food preparation as being very important may reflect greater time demands.

Diet Quality

In the CSFII, people were asked to rate the healthfulness of their diet. One of five response options could be given: (1) poor, (2) fair, (3) good, (4) very good, and (5) excellent. In this analysis, poor and fair were combined as were very good and excellent because of the small number of cases in the poor and excellent categories. Single mothers were significantly more likely than married mothers to believe the healthfulness of their diet was only fair or poor (31 versus 17 percent) (fig. 3). Thirty-two percent of single mothers rated the healthfulness of their diet as excellent or very good, whereas 40 percent of married mothers did.

The diets of the mother and a focal child in a family were assessed using more objective measures. In each household, a focal child was randomly selected from children between the ages of 2 and 18. Children under age 2 were excluded because some of the measures of diet quality only apply to individuals 2 years of age and over.

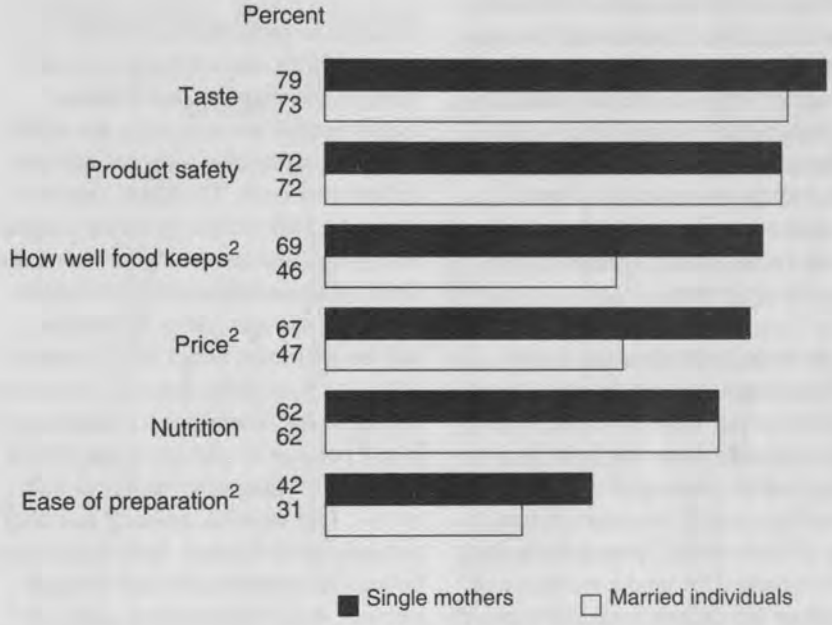
[2]Only respondents included in the follow-up section of the CSFII, the Diet and Health Knowledge Survey, were asked these questions. The sample consisted of CSFII respondents who reported themselves to be the main meal planner/preparer; 86 percent of CSFII respondents participated.

For this study, three measures of diet quality were used: (1) food variety, (2) fat/cholesterol intake, and (3) nutrient intake. These measures were applied to the 1-day-food-intake data from the CSFII for mothers and focal children. Trained interviewers collected these data using the 24-hour recall method.[3] Energy (calories), fat, cholesterol, and nutrient intakes were calculated using USDA's Nutrient Data Base for Food Consumption Surveys. Release 5 was used with 1989 CSFII data (*18*), and release 6 was used with 1990 CSFII data (*17*).

Food variety was assessed by whether persons consumed on a given day any food item from the following five major food groups of the USDA's Food Guide (*23*) recently presented as a pyramid graphic (*19*): (1) meat, poultry, fish, eggs, dried beans, or nuts, (2) milk or milk products, (3) vegetables, (4) fruits or fruit juices, and (5) bread, cereal, or other grain products. Consumption of a varied diet promotes adequate intake of essential nutrients, as well as important non-nutrient components of a diet, such as dietary fiber. Other researchers have used a similar measure for food variety (*8*). A food-variety score was computed for each individual by assigning one point for each of the five major food groups from which he or she consumed at least one food item on a given day. This score had a range of 0 to 5. An overall average food-variety score for mothers and children was then calculated.

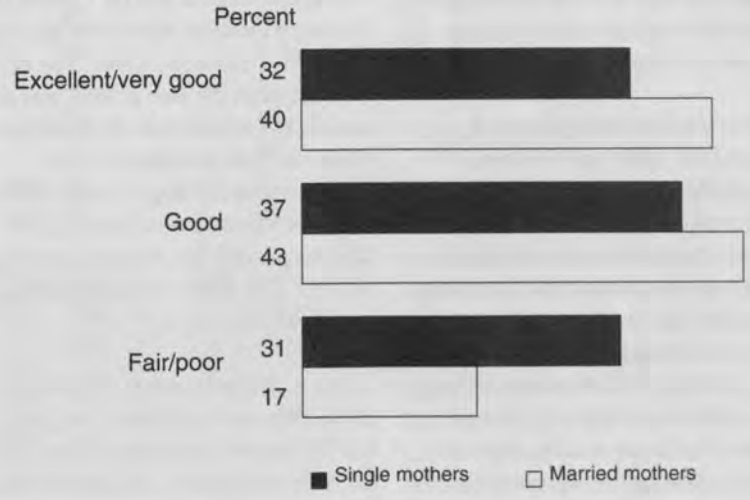
[3]Although the CSFII collects data on 3 days of food intake, only 1-day-food-intake data were used in this study. Whereas 1-day data were collected by trained interviewers, data for the second and third days were collected through diaries kept by respondents. There was a high dropout rate by the third day of data collection: 25 percent for single mothers, 23 percent for married mothers, 26 percent for children in families maintained by single mothers, and 19 percent for children in families maintained by married couples. Because of the relatively large sample size used in the study, 1-day-food-intake data were thought to be acceptable to examine group differences.

Figure 2. Factors ranked as very important when food shopping[1] by single mothers and married individuals with children, 1989-90



[1]Factors ranked very important were rated 6 on a 1-to-6 scale.
[2]Difference between groups statistically significant at 0.05 level.

Figure 3. Self-reported healthfulness of diet by single and married mothers,[1] 1989-90



[1]Difference between groups statistically significant at 0.05 level.

It should be noted that USDA's standard method of grouping food reported in the CSFII may lead to underestimates of variety in people's diets. Foods are grouped by primary ingredient. For example, a hamburger with tomato slices is placed in the meat category because meat is its primary ingredient. Variety was therefore measured on the basis of the primary ingredient in a food. Secondary ingredients, which may increase variety, are not considered in this grouping system.

Moderation in fat/cholesterol intake was determined by whether individuals consumed on a given day: (1) no more than 30 percent of calories from fat, (2) less than 10 percent of calories from saturated fat, and (3) less than 300 milligrams of cholesterol. These criteria for fat and saturated fat intake are based on the Dietary Guidelines for Americans (*21*), and the criterion for cholesterol intake is based on guidelines issued by the National Cholesterol Education Program (*12*). A fat/cholesterol moderation score was computed for each individual by assigning one point for each fat/cholesterol moderation measure met by him or her on a given day. This score had a range of 0 to 3. An overall average fat/cholesterol moderation score for mothers and children was then calculated.

For nutrient intakes of single and married mothers and their children, a measure similar to one used by Murphy et al. (*11*) was employed. For this measure, the proportion of individuals in each group who consumed 67 percent or more of the Recommended Dietary Allowances (RDA's) established by the National Academy of Sciences (*13*) for protein, vitamin A, vitamin E, vitamin C, thiamin, riboflavin, niacin, vitamin B-6, folacin, vitamin B-12, calcium, phosphorus, magnesium, iron, and zinc was determined. A nutrient score was computed for each individual by assigning one point for each nutrient for which his or her intake was at or above 67 percent of its RDA on a given day. This score had a range of 0 to 15. An overall average nutrient score for mothers and children was then calculated.

It should be noted that individual nutrient intake requirements vary and nutrient consumption that is below recommended amounts does not necessarily mean that physiological nutrient deficiencies exist. The RDA's are recommended allowance levels for population groups and are set high to cover the needs of almost all healthy individuals in a given sex-age group. In addition, nutrient estimates based on self-reports of food consumption data may be underreported (*10*). Therefore, a conservative cutoff point of 67 percent of each RDA was used to categorize intakes as high or low. This cutoff is arbitrary and does not indicate deficiency. Nor, since distributions of requirements vary for each nutrient, does it indicate the same risk of dietary inadequacy for each nutrient. However, measures of diet quality that assess intake in relation to a standard, such as a proportion of the RDA, are useful for comparisons of two groups (*7*).

Mothers

Average calorie intake on a given day for single mothers was 1,584 and that for married mothers, 1,640. The difference between the two groups was not statistically significant. Both of these values are low compared to the Recommended Energy Intake (REI) for adult women, which was 2,200 calories per day for women age 19 to 50 (*13*). This difference may reflect some underreporting.

In terms of food variety, 73 percent of single mothers consumed a vegetable and 34 percent consumed a fruit or fruit juice on a given day, compared with 83 and 51 percent of married mothers, a statistically significant difference (table 4). Seventy-one percent of single mothers and 79 percent of married mothers consumed milk or a milk product on a given day, a difference significant at the 0.10 level. The lower percentage of single mothers consuming items from these three food groups may reflect their food shopping behavior. Single parents did their major food shopping less frequently so they were less likely to have a regular supply of perishable foods such as fresh vegetables, fruits, and milk.

Most single and married mothers (91 and 94 percent) consumed meat, poultry, fish, eggs, dried beans, or nuts on a given day, as well as bread, cereal, or other grain product (95 and 96 percent). Statistically significant differences were not found between the two groups in the use of these food items. Looking at overall food variety, a significantly lower percentage of single than of married mothers consumed at least one food item from all five major food groups (18 versus 34 percent). The overall mean food variety score was also significantly lower for single than for married mothers (3.7 versus 4.0).

A minority of single and married mothers (34 and 31 percent) consumed no more than 30 percent of their total calories from fat on a given day. In addition, a minority of single and married mothers (29 and 31 percent) consumed less than 10 percent of their total calories from saturated fat. Most single and married mothers (72 and 74 percent) consumed less than 300 milligrams of cholesterol. For these three measures of fat/cholesterol moderation, no significant differences between single and married mothers were observed. Also, there was no significant difference between single and married mothers in the percentage who met all three fat/cholesterol moderation measures (21 and 19 percent) and in the overall mean fat/cholesterol moderation score (1.3 versus 1.4).

As for nutrient intake, a significantly lower percentage of single than married mothers reported consuming at least 67 percent of the RDA on a given day for vitamin C, thiamin, riboflavin (which

Table 4. Food variety, moderation, and nutrient intake of single and married mothers, based on 1-day food intake, 1989-90

Measure	Single mothers	Married mothers
Total calories	1,584	1,640
	Percent	
Food variety		
Consume any		
Meat, poultry, fish, eggs, dried beans, or nuts	91	94
Milk or milk product[1]	71	79
Vegetable[2]	73	83
Fruit or fruit juice[2]	34	51
Bread, cereal, or other grain product	95	96
Fat/cholesterol moderation		
Consume		
No more than 30% calories from fat	34	31
Less than 10% calories from saturated fat	29	31
Less than 300 mg cholesterol	72	74
Nutrient intake		
Consume 67% or more of Recommended Dietary Allowance for		
Protein	83	87
Vitamin A	47	56
Vitamin E	49	48
Vitamin C[2]	52	64
Thiamin[2]	69	79
Riboflavin[1]	71	78
Niacin	78	83
Vitamin B-6[2]	48	58
Folacin	64	68
Vitamin B-12	79	81
Calcium	50	51
Phosphorus	82	85
Magnesium[2]	47	60
Iron	44	51
Zinc	53	48
Meet all 5 food variety measures[2]	18%	34%
Meet all 3 fat/cholesterol moderation measures	21%	19%
Meet all 15 RDA measures	15%	15%
Mean food variety score[2,3]	3.7	4.0
Mean fat/cholesterol moderation score[4]	1.3	1.4
Mean RDA score[1,5]	9.2	10.0

[1]Difference between groups statistically significant at 0.10 level.
[2]Difference between groups statistically significant at 0.05 level.
[3]Computed by assigning 1 point for each of the five food groups from which person consumed at least one item.
[4]Computed by assigning 1 point for each of the three fat/cholesterol moderation measures met.
[5]Computed by assigning 1 point for each of the fifteen nutrients for which intake was at or above 67 percent of the RDA.

was significant at the 0.10 level only), vitamin B-6, and magnesium. The lower intake of vitamin C for single as opposed to married mothers is likely related to their lower consumption of fruits and vegetables, which are the major sources of this nutrient in the American food supply (*5*). No significant differences were observed between single and married mothers in terms of the other nutrients. However, a sizable proportion of single and married mothers did not meet the cutoff level of 67 percent or more of the RDA for each of these other nutrients. For both groups of mothers, 15 percent consumed 67 percent or more of the RDA for all 15 nutrients. The overall mean nutrient score was significantly lower for single than for married mothers (9.2 versus 10.0) at the 0.10 level.

Overall, less than 2 percent of both single and married mothers had optimal scores for food variety (5 on the 0 to 5 scale), fat/cholesterol moderation (3 on the 0 to 3 scale), and nutrient intake (15 on the 0 to 15 scale). This is consistent with the results of other researchers (*11*) who found that fewer than 2 percent of adults had diets that met two-thirds or more of the RDA for all 15 nutrients and contained less than 30 percent of calories from fat.

Focal Children

Diets of 311 focal children of single mothers and 789 focal children of married mothers were assessed.[4] Average age of focal children of single mothers was 10 years and for focal children of married mothers, 9 years, a difference significant at the 0.10 level. Fifty-one percent of focal children in single-parent families were female, compared with 55 percent in married-couple families, a nonsignificant difference.

[4]There are fewer children than mothers because some children were below the age of 2 years and complete food intake data did not exist for all children.

... a significantly lower percentage of focal children of single as opposed to married mothers consumed fruit or fruit juice on a given day.

As with mothers, there was no significant difference in the calorie intake on a given day between focal children of single and married mothers. Children of single mothers had an average intake of 1,930 calories and children of married mothers, 1,831 calories; the REI for children age 7 to 10 is 2,000 calories per day (*13*). The average intake of children was higher than that of their mothers, possibly because of the range of ages and sex of the focal children—for example, the group included males age 15 to 17 who have an REI that is 800 calories higher than that of their mothers. The difference may also be partly attributable to less underreporting.

In terms of food variety, a significantly lower percentage of focal children of single as opposed to married mothers consumed fruit or fruit juice on a given day (47 versus 63 percent) (table 5). No significant differences were observed for the other food groups. Most focal children of single and married mothers consumed meat, poultry, fish, eggs, dried beans, or nuts (93 and 92 percent); milk or a milk product (84 and 92 percent); a vegetable (76 and 80 percent); and bread, cereal, or other grain product (98 percent each). Thirty-five percent of focal children of single mothers and 44 percent of children of married mothers consumed at least one food item from all five major food groups. This difference was not significant. The overall mean food variety score for children of single mothers was 4.0 and for children of married mothers, 4.2. This difference was significant at the 0.10 level.

No significant differences in the measures of fat/cholesterol moderation were observed between the two groups of focal children. Less than a third of children of single and married mothers consumed no more than 30 percent of calories from fat (23 and 29 percent) and less than 10 percent of calories from saturated fat (18 and 20 percent) on a given day. Most children of single and married mothers (73 and 78 percent) consumed less than 300 milligrams of cholesterol on a given day. Thirteen percent of children of single mothers and 16 percent of children of married mothers met all three fat/cholesterol moderation measures, a nonsignificant difference. The overall mean fat/cholesterol moderation score for children of single mothers was 1.1 and for children of married mothers, 1.3, a nonsignificant difference.

A majority of focal children of both single and married mothers consumed 67 percent or more of the RDA for all nutrients measured on a given day. A significantly lower percentage, at the 0.10 level, of focal children of single mothers consumed 67 percent or more of the RDA for vitamin C, phosphorus, and magnesium. There were no significant differences between the two groups with regards to the other nutrients. Looking at overall nutrient intake, 24 percent of children of single mothers and 27 percent of children of married mothers consumed 67 percent or more of the RDA for all 15 nutrients. This difference was not statistically significant. The overall mean nutrient score for children of single mothers was 11.6 and for children of married mothers, 12.3; this difference was also not significant.

As with mothers, a very small percentage of focal children had diets that were optimal in terms of all three measures of diet quality. One percent of all children had optimal scores for the food variety measure, fat/cholesterol moderation measure, and nutrient measure.

Table 5. Food variety, moderation, and nutrient intake of focal children of single and married mothers, based on 1-day food intake, 1989-90

Measure	Focal children of Single mothers	Focal children of Married mothers
Total calories	1,930	1,831
	Percent	
Food variety		
Consume any		
Meat, poultry, fish, eggs, dried beans, or nuts	93	92
Milk or milk product	84	92
Vegetable	76	80
Fruit or fruit juice[1]	47	63
Bread, cereal, or other grain product	98	98
Fat/cholesterol moderation		
Consume		
No more than 30% calories from fat	23	29
Less than 10% calories from saturated fat	18	20
Less than 300 mg cholesterol	73	78
Nutrient intake		
Consume 67% or more of Recommended Dietary Allowance for		
Protein	94	97
Vitamin A	66	71
Vitamin E	56	56
Vitamin C[2]	68	80
Thiamin	88	92
Riboflavin	87	93
Niacin	87	89
Vitamin B-6	74	79
Folacin	88	94
Vitamin B-12	93	95
Calcium	64	71
Phosphorus[2]	81	90
Magnesium[2]	74	85
Iron	74	76
Zinc	64	65
Meet all 5 food variety measures	35%	44%
Meet all 3 fat/cholesterol moderation measures	13%[3]	16%
Meet all 15 RDA measures	24%	27%
Mean food variety score[2,4]	4.0	4.2
Mean fat/cholesterol moderation score[5]	1.1	1.3
Mean RDA score[6]	11.6	12.3

[1]Difference between groups statistically significant at 0.05 level.
[2]Difference between groups statistically significant at 0.10 level.
[3]Number of cases less than 45.
[4]Computed by assigning 1 point for each of the five food groups from which person consumed at least one item.
[5]Computed by assigning 1 point for each of the three fat/cholesterol moderation measures met.
[6]Computed by assigning 1 point for each of the fifteen nutrients for which intake was at or above 67 percent of the RDA.

Conclusion

This study provides an overview of the food situation of families with children maintained by single mothers and married couples. Results show that single mothers viewed the food adequacy of their household less positively than married couples. Although the average caloric intake was similar for the two groups, the quality of single mothers' diets supported this view. Single mothers were significantly less likely to consume fruits, vegetables, and milk products, and their children were less likely to consume fruits on a given day.

Although single mothers viewed their food adequacy as lower than married-couple families and their diets were indeed poorer, the usual weekly food expenditures, in per adult male equivalent terms, of single-parent families were not appreciably different from their married-couple counterparts. Single-parent families had a smaller average household size than married-couple families so they may not be able to achieve the same economies of scale and resulting food savings. Also, because transportation may be a problem for single mothers, they may have to shop at the nearest supermarket—not necessarily where food prices are lowest.

In addition, there may be subjective reasons for the more negative perception of food adequacy of single mothers. Many single mothers participate in government food programs with which they may associate some stigma. Some of these programs, such as WIC benefits, also limit food choices. Lastly, single mothers' dissatisfaction may be a reflection of the stress of managing within the financial constraints that most of them face.

Single mothers likely face time and transportation problems in food shopping. Although most single mothers lived 3 miles or less from the store

where their major food shopping was done, they shopped infrequently. Infrequent shopping may not be necessarily undesirable; it may in fact be a good time-management strategy. However, the infrequent food shopping of single mothers may be linked to their lower consumption of fruits, vegetables, and milk products since many of these items are highly perishable. This conclusion is supported by the high level of importance single mothers attached to how well food keeps when food shopping. Nutrition educational efforts directed toward these low-income families therefore may want to emphasize a mix of fresh, frozen, and canned fruits and vegetables and powdered milk that would enable these families to have these food items regularly.

Diets of focal children in families maintained by single mothers were generally of higher quality than those of their mothers and similar to those of children in families maintained by married couples. Children in single-parent families could benefit from participation in free or reduced-price school breakfast and lunch programs, which provide meals with a variety of foods. Also, single mothers may sacrifice their own diets to better the quality of their children's diets. Using a smaller sample, Campbell and Desjardins (2) found that low-income mothers' diets tended to be worse than their children's diets.

Overall, the diets of single and married mothers and their children were found to be lacking in terms of food variety, fat/cholesterol moderation, and nutrient intake. Only a small percentage of mothers and children had optimal scores on any of these measures. Although current dietary guidance materials emphasize food choices and preparation techniques for reducing fat and cholesterol while maintaining nutrient adequacy, this appears to be difficult for most Americans. Continuing educational efforts in this area are therefore needed, especially for single-parent families.

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Alcohol Consumption in America: An Overview

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Almost half (48 percent) of Americans 12 years old and older consumed alcohol in the past month, according to the 1992 National Household Survey on Drug Abuse. Annual per capita consumption of ethanol in the United States peaked at 2.76 gallons in 1980-81. As measured in the Consumer Expenditure Surveys, mean annual household expenditure for alcoholic beverages, in constant 1991 dollars, decreased by 35 percent between 1980 ($459) and 1991 ($297). Indications of a trend towards less widespread drinking may reflect changing demographics—a smaller percentage of the population are in the peak drinking years. A large percentage of Americans have first-hand knowledge of alcohol abuse. About 4 in 10 have had a problem drinker in their family and 1 in 10 are, themselves, problem drinkers. Alcohol abuse is one of the Nation's most serious health problems, and alcoholics use a disproportionate share of our health resources. Findings from recent Federal surveys are used to describe the current situation and trends in alcohol consumption and expenditures; related demographic characteristics are presented.

Alcohol is not a major expenditure for most American households. Many households spend no money at all on alcohol. Yet, for some families, alcohol consumption has substantial economic, health, and social consequences.

This article presents findings from national surveys that describe trends in alcohol consumption, characteristics of people who drink, and expenditures and prices. Related medical and social concerns with economic implications are also presented.

Consumption of Alcoholic Beverages

The amount of alcohol consumed in the United States is estimated from sales in the 50 States—tax receipts, sales in State-controlled stores, and/or reports from beverage industry sources (*18*). "Apparent" per capita consumption is determined by dividing total quantity of alcohol sold by the total population 14 years or older. Consumption is sometimes expressed in gallons of pure alcohol (ethanol). Quantities of beer, wine, and distilled spirits are converted by using factors that represent the amount of ethanol content in each type of drink (0.045 for beer, 0.129 for wine, and 0.414 for liquor) (*23*).

Apparent U.S. per capita consumption of ethanol peaked in 1980-81 at 2.76 gallons. Thereafter, consumption decreased until 1990 (fig. 1). In late 1990, there was a surge in sales for all alcoholic beverages as wholesalers, retailers, and consumers sought to stock up before the increase in the Federal Excise Tax took effect January 1, 1991 (*23*).

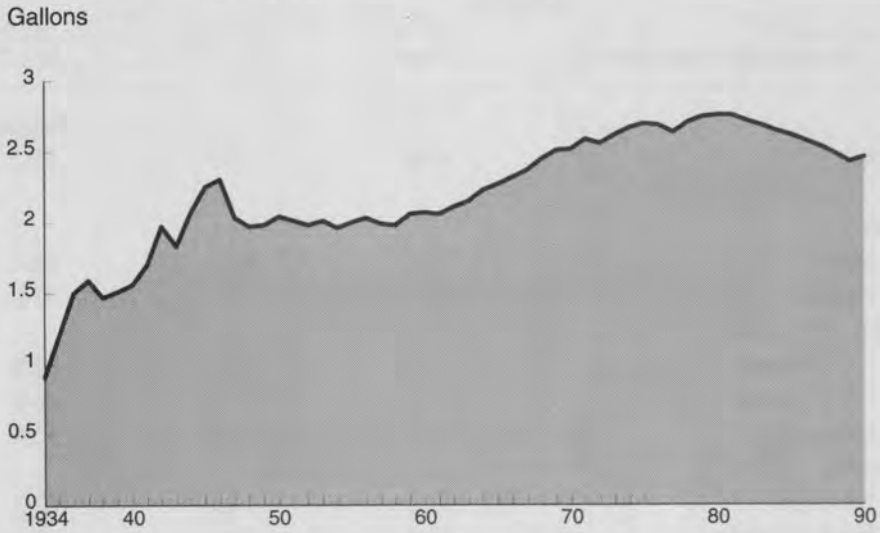
There are several reasons (*18*) why ethanol consumption is expected to decline further in the future:

- The proportion of the population over age 60 is increasing—this segment consumes less alcohol.
- The increasing concern with health, fitness, nutrition, and exercise is inconsistent with alcohol consumption.
- Tastes have switched from distilled spirits to beer and wine, with lower ethanol content.

In 1990, beer accounted for over half (54.7 percent) of the total ethanol consumed in alcoholic beverages. Almost one-third (31.8 percent) of ethanol consumed was in distilled spirits, and 13.5 percent was via wine intake (*23*).

The Economic Research Service, U.S. Department of Agriculture reports quantities of alcoholic beverages consumed (*13*). For the U.S. population 21 years old and older, per capita consumption of alcoholic beverages increased from 32.1 gallons in 1966 to 37.8 gallons in 1991 (fig. 2). Beer (from 27.8 to 33.2 gallons) and wine (from 1.6 to 2.6 gallons) consumption each increased during the 25-year period. Consumption of distilled spirits, however, declined from 2.7 to 2.0 gallons. Beer consumption peaked at 36.8 gallons per adult in 1980 and 1981. Wine consumption was highest in 1985 and 1986, at 3.5 gallons. Consumption of distilled spirits peaked earlier, between 1972 and 1978, at 3.1 gallons per adult.

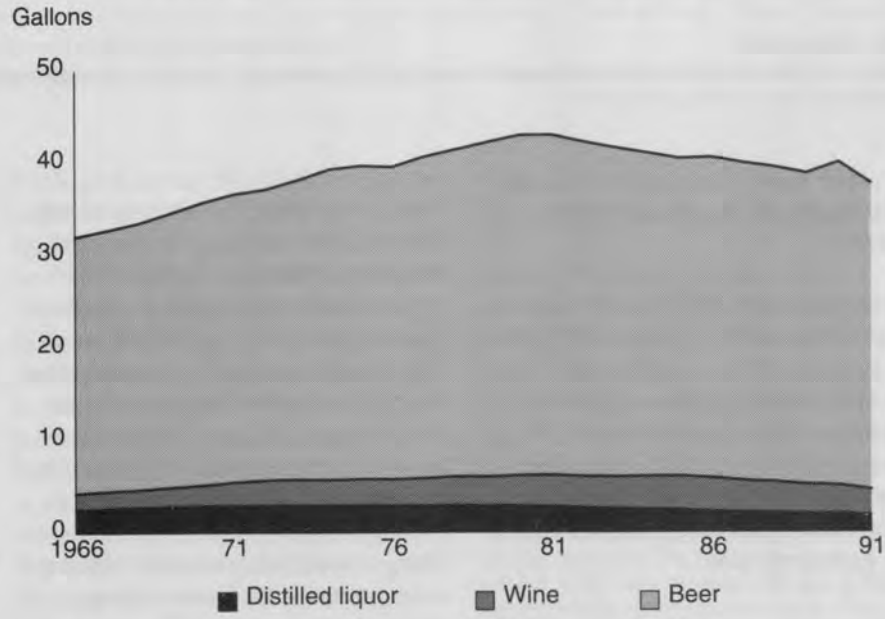
Figure 1. Apparent[1] per capita[2] annual ethanol consumption, United States: 1934-90



[1]Based on sales and shipments.
[2]For the population age 15 and over until 1970; thereafter, for those age 14 and over.

Source: Williams, G.D., et al., 1992, Apparent per capita alcohol consumption: National, State, and regional trends, 1977-1990, U.S. Department of Health and Human Services, National Institute on Alcohol Abuse and Alcoholism, Surveillance Report #23.

Figure 2. Adult per capita[1] annual consumption of alcoholic beverages, 1966-91



[1]For the population age 21 and over.

Table 1. Consumption of alcoholic beverages in the past month, by age group and demographic characteristics, 1992

Demographic characteristic	Total	Age group			
		12 - 17	18 - 25	26 - 34	35 and older
			Percent		
Total	47.8	15.7	59.2	61.2	46.5
Sex					
Male	55.9	16.9	65.6	70.0	56.1
Female	40.4	14.5	53.0	52.8	38.0
Race and ethnicity					
Non-Hispanic White	49.7	16.7	62.9	63.7	47.8
Non-Hispanic Black	39.8	13.2	50.9	55.6	37.2
Hispanic	45.0	16.2	52.8	56.1	44.9
Region					
Northeast	52.9	14.3	67.2	66.8	51.1
North Central	49.2	18.1	60.3	61.7	48.5
South	41.7	14.5	55.4	56.2	38.4
West	52.2	16.2	57.8	64.1	53.4
Population density					
Large metro	51.3	15.1	61.2	64.7	50.2
Small metro	48.3	16.3	58.8	61.0	47.8
Nonmetro	41.0	15.9	56.1	53.9	38.4
Education					
Less than high school	36.1	NA	47.9	53.8	30.3
High school graduate	49.9	NA	57.4	60.7	44.3
Some college	56.0	NA	63.6	58.5	52.2
College graduate	66.1	NA	75.0	69.1	63.9

NA = Not applicable.

Source: U.S.Department of Health and Human Services, Public Health Service, Substance Abuse and Mental Health Services Administration, National Household Survey on Drug Abuse (16).

Characteristics of Alcohol Users

According to the 1992 National Household Survey on Drug Abuse (NHSDA), 48 percent of the population age 12 and over or about 98 million people consumed alcohol in the past month. This was a decline from 1988 when 53 percent of the population or 106 million people had drunk alcoholic beverages in the past month (*16*).

Young adults, ages 18 to 34, report highest rates of drinking: in 1992, about 60 percent used alcohol in the past month (table 1) (*16*). Although the National Minimum Drinking Age Act of 1984 required all States to set their minimum-purchase and public-possession age at 21 (*14*), underage drinking is widespread. Among high school seniors surveyed in 1990, nearly 90 percent have tried alcohol and have continued to use it in their senior year (*5*).

There is some indication that drinking among minors may be decreasing. Annual surveys since 1975 sponsored by the National Institute on Drug Abuse (NIDA) collect data on alcohol use among high school seniors, college students, and young adults. The percentage of seniors who consumed alcohol in the past month decreased from 72 percent in 1980 to 51 percent in 1992 (*5,15*). Prevalence of daily consumption of alcohol among seniors peaked at 6.9 percent in 1979; it had decreased to 3.7 percent by 1990 (*5*).

In 1992, men were more likely to have consumed alcoholic beverages in the past month than were women—56 percent compared with 40 percent (*16*)

Table 2. Heavy alcohol use[1] in the past month, by age group and demographic characteristics, 1992

Demographic characteristic	Total	Age group 12 - 17	18 - 25	26 - 34	35 and older
			Percent		
Total	5.0	1.3	11.3	7.4	3.4
Sex					
Male	8.1	2.1	16.2	11.7	6.0
Female	2.1	0.5	6.5	3.1	1.1
Race and ethnicity					
Non-Hispanic White	5.1	1.4	13.3	7.7	3.3
Non-Hispanic Black	4.5	0.5	6.1	6.6	4.3
Hispanic	5.6	1.5	7.5	7.4	5.1
Region					
Northeast	4.9	0.6	14.5	6.6	2.9
North Central	4.8	1.8	12.1	7.2	3.1
South	5.0	1.3	10.6	7.8	3.2
West	5.3	1.5	8.8	7.5	4.4
Population density					
Large metro	5.1	1.5	11.3	7.6	3.4
Small metro	4.5	1.3	9.1	6.3	3.4
Nonmetro	5.3	1.1	14.0	8.3	3.3
Education					
Less than high school	5.8	NA	9.3	12.2	3.8
High school graduate	5.6	NA	10.3	9.0	3.2
Some college	6.0	NA	14.2	4.7	3.4
College graduate	4.0	NA	9.9	4.5	3.2

NA = Not applicable.
[1]Defined as drinking five or more drinks per day on each of 5 or more days in the past 30 days.
Source: U.S. Department of Health and Human Services, Public Health Service, Substance Abuse and Mental Health Services Administration, National Household Survey on Drug Abuse (16).

(table 1). Men consume about twice as much alcohol as do women in the United States. A supplement to the 1988 National Health Interview Survey (NHIS) found that among 22,000 current drinkers (defined as those who drank at least 12 drinks in the last year), men reported a higher number of days on which they drank and a higher number of drinks per day than did women. However, mean ethanol content per drink was slightly higher for women because a higher percentage of women's drinks were wine and liquor (*2*).

Findings from the 1992 National Household Survey on Drug Abuse show that the higher the educational level, the more likely alcohol was currently used (*16*). Residents of the South were less likely to report drinking alcohol in the past month than people in other regions. A lower percentage of people living in nonmetro areas (41 percent) than those living in large metro areas (51 percent) or small metro areas (48 percent) were current drinkers. Finally, non-Hispanic Whites had a higher rate of alcohol use (50 percent) than non-Hispanic Blacks (40 percent) or Hispanics (45 percent).

Characteristics of Those Who Are Heavy Users of Alcohol

Heavy drinking is defined by the Substance Abuse and Mental Health Services Administration (SAMHSA) as drinking five or more drinks per day on each of 5 or more days in the past 30 days.[1] SAMHSA's National Household Survey on Drug Abuse for 1992 found

[1]Other Government agencies define heavier drinking differently. The National Institute on Alcohol Abuse and Alcoholism (NIAAA) defines heavier drinking as drinking two or more drinks per day or an average daily intake of one or more ounces of ethanol (*9*). NIDA defined heavy drinking as five or more drinks in a row, at least once in the previous 2 weeks (*5*).

Men consume about twice as much alcohol as do women in the United States.

5 percent of the U.S. population age 12 and over to be heavy drinkers. Those most likely to be drinking heavily in the past month were ages 18 to 25, reported by 11 percent (table 2) (*16*). NIDA's survey of high school seniors shows that heavy drinking was less prevalent in 1992 when 28 percent of seniors reported drinking heavily, compared with 41 percent in 1983 (*5,15*).

Men were much more likely than women to be heavy drinkers. In 1992, 8 percent of men, compared with 2 percent of women were so classified by SAMHSA (*16*). Also, the NHIS reported men were more likely to be heavier drinkers (*2*). When data from the NHIS for 1983 and 1988 were compared, heavier drinking (NIAAA's definition) was found to have decreased for both men and women (*22*).

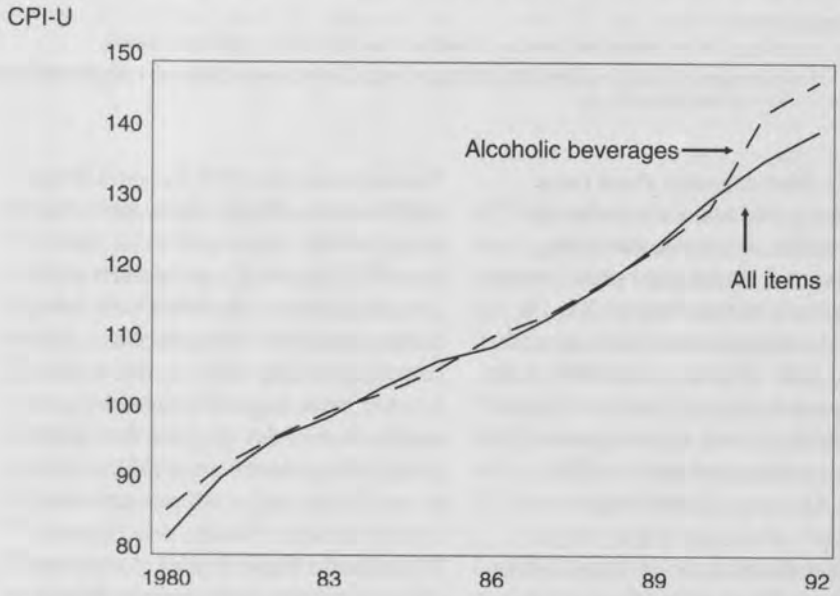
Data from the 1992 National Household Survey on Drug Abuse show that heavy drinking among college graduates was reported at a lower rate than among people in other educational categories (*16*). A recent study published in the *American Journal of Public Health* found that, compared with college graduates, people who had dropped out of high school were more than six times as likely to be dependent on alcohol. Among those who had entered college, but not graduated, the risk factor was three. These results support psychological theories that "link failure to meet social role expectations with subsequent behavior disorders" (p. 830) (*1*).

Prices and Expenditures of Alcoholic Beverages

In 1991, the Federal tax on alcohol in beer and wine increased for the first time since the early 1950's (*21*). Until then, prices for alcoholic beverages had increased at about the same rate as prices for all items measured in the Consumer Price Index (fig. 3) (*20*).

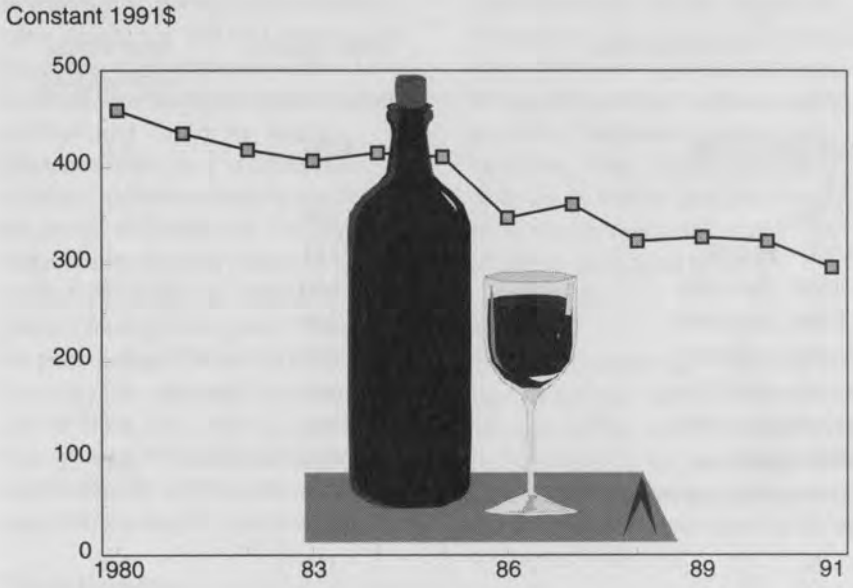
Since 1980, when the average expenditure for alcoholic beverages was $459 (1991 dollars), spending on alcohol by

Figure 3. Changes in consumer prices for alcoholic beverages



Source: U.S. Department of Labor, Bureau of Labor Statistics, CPI Detailed Report.

Figure 4. Average annual household expenditure for alcoholic beverages, 1980-91



Source: U.S. Department of Labor, Bureau of Labor Statistics, Consumer Expenditure Survey.

Since 1980 ... spending on alcohol by families has declined by 35 percent.

families has declined by 35 percent (fig. 4). Data from the 1991 Consumer Expenditure Survey (*19*) show that the mean annual expenditure for alcoholic beverages by U.S. households was $297 (table 3).

Alcoholic beverages accounted for 1 percent of total expenditures for all consumer units. Consumer units with higher incomes spent more on alcoholic beverages than did those with lower incomes, but the percentage of total expenditures spent on alcohol fluctuated little. Consumer units who reported highest expenditures for alcohol were headed by someone 25-54 years old, were husband-and-wife households without children or others, and had household income in excess of $30,000. In contrast, consumer units who spent the greatest share of their expenditures on alcohol were one-person families, those with a head under 25 years old, and renters.

Costs Related to Alcohol Abuse

Thus far, this paper has reported data on U.S. alcohol consumption and expenditures. Now the discussion shifts to the economic, health, and social consequences of alcohol abuse and alcoholism (see box, p. 28) for the abusers, their families, and society.

Alcohol Abusers

In 1988, an estimated 15.3 million Americans (8.6 percent of those 18 years old and older) were alcoholics or alcohol abusers (*3*). Alcoholics use a disproportionate share of our health resources (*11*). General health care costs are greater for untreated alcoholics and their families than for nonalcoholics and their families (*4*). In addition, alcohol abusers are more likely to incur specific medical treatment for trauma and disease.

The Consumer of Alcohol

Three different types of drinkers have been identified by the National Institute on Alcohol Abuse and Alcoholism (*18*): those who drink with few, if any, problems; problem drinkers who are not dependent on alcohol but who misuse or abuse alcohol; and those who are dependent on alcohol and who suffer from the disease called alcoholism.

Alcoholism has four main clinical features: tolerance—increasing amounts of alcohol are needed to produce the desired effect; physical dependence—withdrawal symptoms occur when not drinking that may be relieved by more alcohol; impaired control over regulating alcoholic intake at any drinking occasion once begun; and craving—an abnormal appetite for alcohol that is not present in individuals who are not alcohol dependent. Alcoholism is a chronic, progressive, and potentially fatal disease typically characterized by pathologic organ changes.

Accidents, particularly falls and those involving motor vehicles, are frequently caused by the impaired judgment, diminished coordination, and slowed reactions associated with alcohol consumption. Studies have shown that 20 to 37 percent of patients treated for trauma in emergency rooms have been drinking (*18*). Chronic alcohol abuse in trauma victims increases the risk of pneumonia, infection, and other complications (*6*).

Chronic alcohol consumption is associated with diseases of the liver, stomach, pancreas, esophagus, and almost every other organ in the body. At least 20 percent—and as many as 40 percent—of hospital beds are occupied by people whose health conditions are complications of alcohol abuse (*18*).

Table 3. Average annual expenditures for alcoholic beverages, by demographic characteristics, 1991

Characteristic	Mean dollars	Percent of total annual expenditures
All consumer units	**$297**	**1.0**
Income		
<$5,000	169	1.2
$5,000 - $9,999	111	.8
$10,000 - $14,999	140	.8
$15,000 - $19,999	249	1.2
$20,000 - $29,999	271	1.1
$30,000 - $39,999	390	1.2
$40,000 - $49,999	404	1.1
$50,000 and over	564	1.0
Age of reference person (years)		
<25	252	1.5
25 - 34	370	1.3
35 - 44	354	1.0
45 - 54	360	.9
55 - 64	260	.8
65 - 74	217	1.0
75 and over	81	.5
Size of consumer unit		
One person	262	1.5
Two people	349	1.1
Three	273	.8
Four	302	.8
Five or more	264	.7
Composition of consumer unit		
Husband and wife only	350	1.1
Husband, wife with children	283	.7
Single parent (at least one child under age 18)	134	.6
Housing tenure		
Homeowner	297	.9
Renter	296	1.4
Race of reference person		
White and other	314	1.0
Black	159	.8
Type of area		
Urban	315	1.0
Rural	185	.7

Source: U.S. Department of Labor, Bureau of Labor Statistics, 1992, Consumer Expenditures in 1991, Report 835.

About 5 percent of all deaths in the United States can be attributed to alcohol (*12*). There is some evidence, however, that age-adjusted mortality rates (deaths per 100,000 population) for deaths attributable to alcohol have declined. Mortality data published by the National Center for Health Statistics were used to determine trends in alcohol-related deaths for the period 1979-88 (*12*). Findings indicate that mortality rates for deaths attributable to alcohol decreased by 17 percent during these years. Throughout the period, non-Whites had a higher mortality rate attributable to alcohol than Whites, and men had a higher rate than women. Also, mortality rates for deaths directly attributable to alcohol rose with increasing age until age 65.

Their Families

People with an alcohol problem affect those around them. Children of alcoholics[2] are at high risk for alcohol and other drug problems. If they live with an alcoholic parent, they may have difficulty learning coping skills, handling their feelings, and getting along with others. Also, they may do poorly in school. As a result, these children may have low self-esteem and exhibit deviant behavior. They may not live up to their potential, earning and achieving at a lower level throughout their lifetime. In 1991, there were 28.6 million children of alcoholics living in the United States—nearly 7 million were under age 18. About half of these children marry alcoholics and the cycle repeats itself (*17*).

Among U.S. adults, 43 percent have been exposed to alcoholism in the family (*11*). They may have grown up with (18 percent) or married (9 percent), or had a blood relative who was an alcoholic or problem drinker (38 percent).

According to data from the 1988 National Health Interview Survey, marital status was strongly related with exposure to alcoholism: 56 percent of separated or divorced individuals, compared with 44 percent of married, 38 percent of never married, and 36 percent of widowed reported such exposure. Also, 38 percent of separated or divorced women had been married to an alcoholic, compared with 12 percent of currently married women.

Society

Controlling health care costs is vitally important to the Nation's economy. Total economic costs of alcohol abuse in the United States, including health care, lost employment, and reduced productivity were estimated at $85.8 billion for 1988 (*10*).

The cost of motor vehicle crashes caused by alcohol abuse is a major burden to society. Drivers who drink are more likely than other drivers to cause accidents that raise insurance rates (motor vehicle, disability, health, life) and court costs (*7*). Of even more concern is that 40 to 44 percent of all deaths resulting from motor vehicle accidents from 1979 to 1990 were alcohol related (*24*).[3] Similarly, the percentage of drivers involved in fatal traffic accidents who had been drinking has remained steady at 28 to 31 percent over the 12-year period. Male drivers (31 to 35 percent) were far more likely than female drivers (17 to 20 percent) to have been drinking when involved in a fatal traffic accident. However, **based on vehicle-miles traveled**, alcohol-related traffic fatalities decreased 36 percent between 1979 and 1990.

[2]One-third of Alcoholics Anonymous members are female. Of these, 45 percent reported addiction to another drug, compared with 35 percent of male members (*8*).

[3]The National Highway Traffic Safety Administration defines an incident as alcohol related when a participant (driver, pedestrian, or bicyclist) has a blood alcohol concentration (BAC) of 0.01 percent or greater, although the legal limit (usually) for intoxication is a BAC of 0.10 percent (*24*).

Impact of Educational Efforts

Supplements to the National Health Interview Survey for 1985 and 1990 collected information on health promotion and disease prevention. These supplements measured knowledge and practices regarding various national health objectives (*9*). Concerning alcohol, topics included prevalence of heavy drinking, prevalence of driving after drinking, and knowledge of specific health risks associated with alcohol—throat cancer and fetal alcohol syndrome. If, over the period between surveys, prevalence of heavy drinking and driving after drinking showed a decline and knowledge of health risks rose, that may indicate that educational efforts are succeeding and the public is more conscious of the consequences of drinking.

When findings for 1985 and 1990 were compared, the percentage of people age 18 and older who consumed an average of 1 ounce or more of ethanol a day had declined from 8 percent to 6 percent. Those who had driven a car at least once in the past year after having had too much to drink declined from 17 percent in 1985 to 12 percent in 1990. Those of childbearing age (18-44 years old) who knew about fetal alcohol syndrome increased from 56 percent in 1985 to 64 percent in 1990. These are encouraging trends.

Characteristics of people who were most likely to stop drinking and driving during the period were those with more than 12 years of education, earning $50,000 or more, and of Hispanic origin. Those most likely to stop drinking heavily were female, earning $35,000 or more, and with more than 12 years of education.

Summary and Implications

There were several major trends identified in this article. These include recent declines in: Ethanol consumption, alcoholic beverage consumption, the percentage of the population that drinks, household expenditures for alcohol, mortality rates for deaths attributable to alcohol, and alcohol-related traffic fatalities based on vehicle miles traveled.

Demographic characteristics that seem to affect alcohol consumption are age (young adults 18-34 years old have the highest drinking rates), education (college graduates are more likely to use alcohol, but less likely to be dependent on it), sex (males drink more than females), and race (non-Hispanic Whites are more likely to be current drinkers and, for those 18-25 years old, to drink heavily).

Although the trends appear to be encouraging, the extent to which alcohol has permeated American society is not to be underestimated. When 43 percent of all U.S. adults have had a family member who abused alcohol, when 40 percent of all deaths from motor vehicle accidents are alcohol related, when 20 to 40 percent of hospital beds are occupied by people who abuse alcohol and almost as large a percentage of trauma victims have been drinking, much remains to be done. Research efforts should continue to investigate who is drinking and how much is being ingested. Educational efforts by government, media, and the medical community can then be focused on the population most likely to be affected.

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Consumer Debt and Home Equity Borrowing

Debt-to-income ratios are often used to evaluate consumer indebtedness and consumer liquidity. The ratio of consumer installment credit to disposable personal income, the most commonly used measure of consumer indebtedness, has been declining since early 1990. This study reports two important changes in consumer borrowing behavior.

Recently, consumers have been taking advantage of less costly sources of credit. Since the Tax Reform Act of 1986 phased out personal interest and expense on nonmortgage loans, such as credit cards, auto loans, and personal loans, consumers have been substituting home equity borrowing for other types of credit. Consumers have also been replacing traditional auto loans with less costly auto leasing agreements. These two substitutions have resulted in a decline in consumer installment credit outstanding. Consequently, the ratio of installment credit to disposable personal income overstates the real change in consumer indebtedness.

The two major components of household debt are consumer credit and home mortgage debt. In the third quarter of 1992, consumer credit made up 19.3 percent of total household debt, and home mortgage debt accounted for 70.4 percent. Home mortgage debt includes home equity loans and home equity lines of credit. Home equity loans are traditional closed-end loans that require scheduled monthly repayments of principal and interest for a predetermined period. Traditional closed-end loans are used mainly for debt consolidation and home improvements (see table). Home equity lines of credit are revolving accounts (open-end lines) that allow borrowers to make withdrawals against an approved dollar amount. Home equity lines as substitutes for more expensive types of consumer credit offer many tax and nontax advantages compared with other forms of credit.

Uses of home equity debt

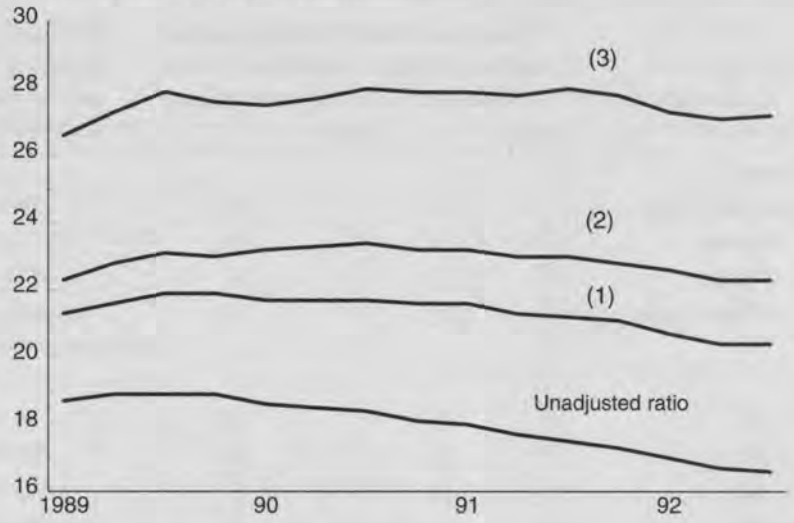
Use	1987		1991	
	Open end	Closed end	Open end	Closed end
	Percent			
Debt consolidation	53	35	36	43
Home improvements	25	45	28	29
Autos	4	5	11	10
Education	3	1	9	7
Investments	3	4	4	2
Other	12	10	12	9

Note: "Other" includes medical expenses, vacations, tax payments, major purchases, and business expenses.

Source: Eugeni, F., 1993, Consumer debt and home equity borrowing, Federal Reserve Bank of Chicago, Economic Perspectives XVII(2):2-13.

Adjusted consumer debt ratio

Percent of disposable personal income



Unadjusted ratio = consumer installment credit.
(1) = consumer installment credit + home equity lines of credit.
(2) = consumer installment credit + home equity lines of credit + the portion of home equity loans that is used for expenditures on goods and services.
(3) = consumer installment credit + total debt outstanding under loans and lines of credit.

Source: Eugeni, F., 1993, Consumer debt and home equity borrowing, Federal Reserve Bank of Chicago, Economic Perspectives XVII(2):2-13.

Replacing other types of consumer loans with home equity borrowing causes consumer installment credit outstanding to decline. If only consumer installment credit is used to calculate debt ratios, the true magnitude of consumer indebtedness is not measured. Three debt ratios that take into account this substitution effect, each with disposable personal income as the denominator and a different measure of consumer debt as the numerator, are proposed (see figure). These adjusted debt-to-income ratios indicate that, although the rate of accumulation of total household debt has slowed down since 1990, the real magnitude of consumer indebtedness has not been consistently declining during the last 2 years, as the traditional measure of consumer debt suggests.

The substitution of auto leases for traditional auto loans also causes an understatement in the real measure of consumer credit. Auto leasing allows consumers to lower their monthly payments on a new vehicle through favorable lease terms and rates. The person who leases a vehicle finances only a portion of the total value of the vehicle. At the end of the lease, the lessee can either purchase the vehicle or return it to the lessor. The proportion of total passenger cars delivered that were leased grew from 12 percent in 1986 to 24 percent in 1992 and is projected to reach 28 percent in 1997.

The increase in auto leasing over the past 6 years corresponds with a slowdown in the growth of auto credit. The use of home equity borrowing to purchase new autos and pay off more costly auto loans outstanding also contributed to the recent slowdown.

Source: Eugeni, F., 1993, Consumer debt and home equity borrowing, Federal Reserve Bank of Chicago, *Economic Perspectives* XVII(2):2-13.

Displaced Workers

During the 1980's, about 20 million American workers were displaced. People who "lost or left a job because of a plant closing, an employer going out of business, a layoff from which [they were] not recalled or other similar reason" were identified as displaced workers. To study the experiences of these displaced workers, the Census Bureau collected data for the Bureau of Labor Statistics in surveys conducted every other year from 1984 to 1992. The study looks at the numbers and characteristics of displaced workers and reports on their situation after displacement. Workers were surveyed between 13 and 36 months after losing their jobs.

The state of the economy influenced the number of displaced workers for any given year during the 1980's. The numbers peaked at 2.7 million displaced workers during the weak labor market of 1982 and were lowest during the relatively strong labor market of 1988 when 1.5 million workers were displaced.

During the past decade, the risk of being displaced varied among industries and occupations. Workers in goods-producing industries and blue-collar workers were much more likely to be displaced than workers in service industries and white-collar workers. In 1990, about 1 in 25 workers in goods-producing industries were displaced—about 3 times the rate experienced by workers in services-producing industries. Blue-collar workers accounted for the majority of displaced workers, although their share fell from 65 percent in 1982 to 55 percent in 1990.

Workers who were not high school graduates were twice as likely to be displaced as workers with a college degree. Similarly, older workers with

more seniority were less likely to be displaced than younger workers.

Nearly three-quarters of workers displaced over the past decade eventually returned to work. However, the great majority of displaced workers experienced a period of joblessness following displacement. The average duration of joblessness for all workers displaced during the 1980's was 29 weeks (table 1).

Of displaced workers who were reemployed, 55 percent had earnings that were 95 percent or more of their previous earnings. About one-third of those reemployed had earnings at least 20 percent below their previous earnings. Workers who incurred the largest pay cuts also tended to be those who had been jobless for the longest period. Older, longer tenured, and less educated workers fared much worse than others after being displaced (table 2). In general, workers who lost jobs in industries that were contracting (or growing more slowly than average) and those who lived in States with relatively high unemployment fared worse.

Following displacement, women were about 13 percentage points less likely than men to be reemployed, and nonwhites were about 11 percentage points less likely than whites to be reemployed, holding other factors constant. Women and non-whites took longer to find new jobs than did men and whites—women were jobless 3 weeks longer and nonwhites were jobless 4 weeks longer. Workers age 55 to 59 with 10 or more years of job tenure who were reemployed took about 7 weeks longer to find new jobs than the typical displaced worker, and those age 60 and older took nearly 10 weeks longer.

Age, education, and job tenure affected the likelihood that a displaced worker incurred an earnings loss on reemployment. Those age 55 to 59 were 7 percentage points more likely than workers age 18 to 34 to have new earnings less than 80 percent of their old earnings. Compared with high school graduates, dropouts were 4 percentage points more likely to have low earnings after reemployment, and college graduates were about 5 percentage points less likely. Workers with more education may be more knowledgeable about how to find work or may have skills that are more easily transferred. Workers with 5 to 9 years' job tenure were about 8 percentage points more likely to incur a substantial loss in earnings than those with less than 3 years job tenure, and those with 10 or more years' tenure were 17 percentage points more likely. About half of reemployed older workers with long tenure had their earnings drop by 20 percent or more; these older workers also needed the longest amount of time to find a new job.

Table 1. Joblessness and reemployment among all displaced workers, by selected characteristics, 1981-90

Characteristic	Percentage of all displaced workers in category	Average number of weeks jobless (up to survey date)	Percentage employed at survey date
Job tenure			
Less than 3 years	50	25	74
3 - 4 years	16	28	77
5 - 9 years	17	31	77
10 or more years	16	37	65
Age			
18 - 34	55	25	76
35 - 44	23	26	79
45 - 54	13	35	70
55 - 59	5	40	61
60 and older	4	53	32
Schooling completed			
Less than 12 years	19	39	58
12 years	44	29	73
13 - 15 years	22	23	79
16 or more years	15	22	87
Sex			
Male	63	27	77
Female	37	32	68
Total	100	29	73

Source: Congressional Budget Office estimates based on data from the January 1984, 1986, 1988, 1990, and 1992 Current Population Surveys.

Table 2. Joblessness and earnings losses among reemployed displaced workers, by selected characteristics, 1981-90

Characteristic	Percentage of reemployed workers in category	Average number of weeks jobless	Percentage with new earnings less than 80 percent of old earnings
Job tenure			
Less than 3 years	50	16	28
3 - 4 years	17	20	29
5 - 9 years	17	22	38
10 or more years	14	23	46
Age			
18 - 34	57	17	29
35 - 44	24	19	34
45 - 54	12	22	37
55 - 59	4	23	43
60 and older	2	26	52
Schooling completed			
Less than 12 years	15	23	39
12 years	44	19	33
13 - 15 years	23	16	32
16 or more years	18	17	24
Sex			
Male	66	18	31
Female	34	20	34
Total	100	19	32

Source: Congressional Budget Office estimates based on data from the January 1984, 1986, 1988, 1990, and 1992 Current Population Surveys.

During the next few years, the number of workers who will be displaced may be somewhat larger than the number displaced in the late 1980's because the economy is likely to be weaker and because defense-related employment is expected to decrease further. The defense sector is projected to lose more than 1 million jobs during the next 5 years.

The Federal Government, together with State governments, offers a range of programs to assist displaced workers who need income assistance or help in preparing for and finding a new job. The Federal/State Unemployment Insurance (UI) system is the largest such program. The UI program provides weekly cash benefits to experienced workers who lose their jobs, whether or not the job loss is permanent. Work histories determine the specific duration and weekly amount of benefits. The average weekly benefit in 1992 was $170. Benefits are generally available for no more than 26 weeks in most States. Displaced workers are much more likely than other UI beneficiaries to exhaust their benefits without having found new employment.

The Economic Dislocation and Worker Adjustment Assistance Act of 1988 provides Federal funds to States to help displaced workers gain employment through training and related services. Affected individuals can receive job search assistance, retraining, and (in some cases) cash payments. In 1993, $517 million was appropriated for the program, which enabled an estimated 200,000 displaced workers to participate in training and other activities.

Another program, Trade Adjustment Assistance (TAA), offers income replacement benefits, training, and related services to workers unemployed because of import competition. Annual outlays (mostly income replacement benefits) for this program have ranged from $150 million to $250 million in recent years. About 20,000 displaced workers received reemployment assistance amounting to $65 million through TAA in 1991.

Source: The Congress of the United States, Congressional Budget Office, 1993, *Displaced Workers: Trends in the 1980s and Implications for the Future.*

Limited Opportunity Farm Households

The 1988 Farm Costs and Returns Survey (FCRS) identified 200,329 farm operator households that had gross sales below $100,000, farm assets of less than $150,000, and household income from all sources below the official poverty level. Households that met all three of these criteria were considered to have limited economic opportunities. In 1988, about 12 percent of all farm operator households were designated limited opportunity farm households.

Limited opportunity farm households have neither the human capital to earn a successful living outside farming nor the means to earn adequate incomes from farming. This low human capital is associated with age and education. More than half of limited opportunity farm operators in 1988 were over age 55, and nearly one-third were over age 65. Limited opportunity farm operators were just as likely to be under age 35 as were other farm operators but less likely to be age 35 to 54.

Many farm operators are able to increase household income through off-farm employment. Formal education is an important factor in obtaining such employment. However, about half of limited opportunity farm operators had less than a high school education, compared with less than one-fourth of other operators, and fewer had attended college. In general, farm spouses were the same age and had the same amount of education as farm operators.

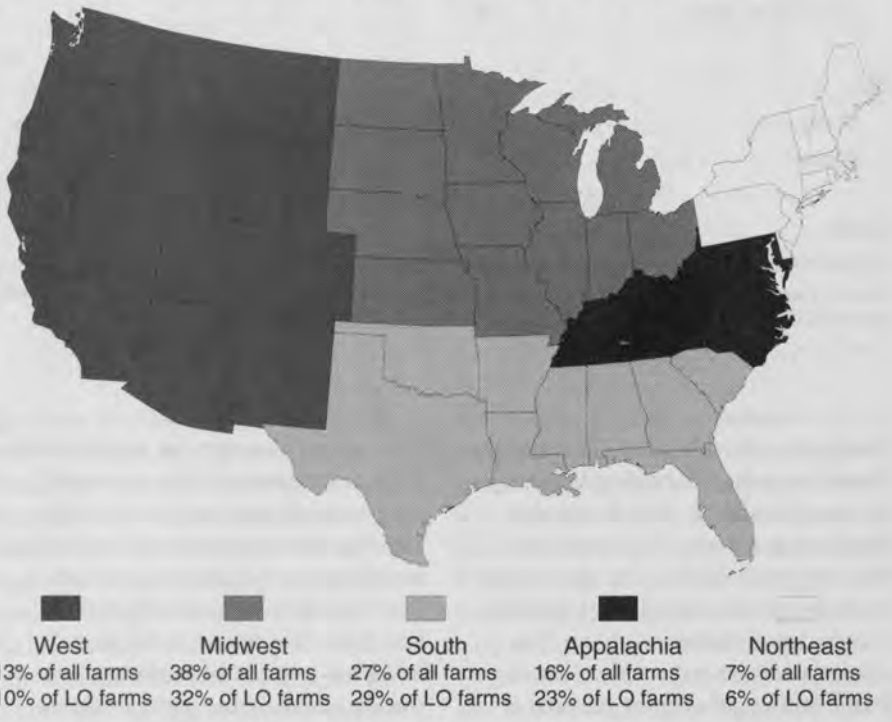
The average household income of limited opportunity farm households in 1988 was $1,772, compared with $37,644 for other farm operators. Nearly 40 percent of limited opportunity farm operators had some income from off-farm sources or nonfarm businesses. Their average off-farm income was $5,914 (compared with $31,793 for other farm households), over one-third of which was from unearned sources, such as interest, dividends, pensions, retirement, Social Security, and other transfer payments. Off-farm sources of income helped compensate for farm losses experienced by limited opportunity farm operators.

Compared with the average U.S. farm, farm businesses operated by limited opportunity farm households performed poorly in 1988—nearly 70 percent sustained a farm business loss. While almost one-third of these households received off-farm income that was above the poverty threshold, farm business losses brought the total incomes of these households below the poverty threshold.

Of limited opportunity farm operators, those whose major occupation was farming were more apt to lose money than were other operators. Compared with other limited opportunity farm operators, those operators who spent most of their work time farming:

- Were slightly older and had less formal education
- Worked more hours on the farm
- Farmed twice as many acres
- Had more farm assets
- Had greater participation in direct Government commodity programs and, on average, received higher payments.

Distribution of U.S. limited opportunity (LO) farms, 1988



Source: 1988 Farm Costs and Returns Survey.

Characteristics of limited opportunity farm operators, by region, 1988

Characteristic	Unit	All households	Regions				
			South	West	Midwest	Appalachia	Northeast
All farm households	Percent	100	27	13	38	16	7
Limited opportunity farm households	Percent	100	29	10	32	23	6
Major occupation is farming	Percent	60	50	62	63	66	60
Farm operator's average age	Years	54	58	53	50	57	54
Age 65 or older	Percent	31	38	30	18	38	[1]
Farm operator's education							
Less than high school	Percent	49	54	24	32	73	47
High school graduate	Percent	31	28	36	44	15	[2]53
At least some college	Percent	20	19	40	23	12	[2]
Farm income to household	Dollars	–4,142	–4,856	–5,707	–5,327	–827	–5,336
Off-farm income	Dollars	5,914	5,697	6,546	7,448	4,227	4,475
Household income	Dollars	1,772	840	890	2,196	3,419	–832

[1]Insufficient data.
[2]Categories are combined.
Source: 1988 Farm Costs and Returns Survey.

However, with fewer dollars earned from off-farm sources, total household income for limited opportunity farm operators whose major occupation was farming was less than one-third that of limited opportunity farm operators whose major occupation was not farming.

Compared with other farms, limited opportunity farm businesses were less likely to have debt. Their average debt-to-asset ratio was comparable with that of other farm businesses, mainly due to their low debt. Older operators had less debt than did younger operators—who tend to be better educated, with more assets, but also with greater debt.

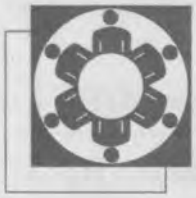
Limited opportunity farm operators were less likely than other U.S. farmers to participate in direct Government commodity programs. In 1988, 22 percent of limited opportunity farm operators received direct commodity program payments averaging $4,513, compared with an average payment of $14,218 for the 36 percent of all farm operators who participated in these programs.

The Midwest region contains 38 percent of the country's farms and 32 percent of all limited opportunity farms (see figure). The Appalachian region has a relatively larger proportion of limited opportunity farms (23 percent), compared with its proportion of all farms (16 percent). Limited opportunity farms are distributed in the South, Northeast, and West in nearly the same proportion as all farms. The West and Midwest were more likely to have farm operators who were younger, more educated, and who considered farming to be their major occupation (see table).

When surveyed about their plans for the future, about half of limited opportunity farm operators planned to farm or ranch only, about one-third planned to farm with an off-farm job, and about one-fifth planned to leave farming within 5 years. Only 20 percent had plans to expand their operation. Almost half were undecided as to what to do about the farm business after they were no longer farming, whereas 36 percent intended for a family member to take over.

Traditional farm policies that focus on agricultural production, such as commodity programs, are of little help to limited opportunity farm households. Off-farm employment may offer the best opportunity for many of these households, particularly those with younger operators. Because some limited opportunity farm operators have less education than do other workers, vocational education and retraining targeted to this group would increase their ability to compete in the work force.

Source: Perry, J.E. and Ahearn, M.C., 1993, *Limited Opportunity Farm Households in 1988*, U.S. Department of Agriculture, Economic Research Service, Agriculture Information Bulletin No. 662.



Recent Legislation Affecting Families

Public Law 103-33 (enacted May 25, 1993)—authorizes the Department of Education to conduct and develop the National Assessment of Educational Progress (NAEP) for fiscal year 1994. The NAEP will conduct a trial mathematics assessment for the 4th and 8th grades and a trial reading assessment for the 4th grade in 1994 in States wanting to participate, to determine whether such assessments yield valid and reliable State representative data. The NAEP will also develop a trial mathematics assessment for the 12th grade and a trial reading assessment for the 8th and 12th grades in 1994 in States wanting to participate. Students in both public and private schools will be included in each sample to ensure comparability with the national sample.

Public Law 103-44 (enacted June 28, 1993)—amends the Federal Deposit Insurance Act to improve the procedures for treating unclaimed insured deposits. Eighteen months after an insured bank or a savings association fails, insured deposits will be forfeited to the Federal Deposit Insurance Corporation (FDIC) or the Resolution Trust Corporation (RTC), if the FDIC or the RTC provided the depositor with two notices of the impending forfeiture. Thereafter, the FDIC or the RTC will offer the deposit to the State of the depositor's last known address to be held as abandoned property for 10 years, during which time the State will attempt to locate the depositor and return the deposit.

Public Law 103-50 (enacted July 2, 1993)—makes supplemental appropriations of $1,003,413,538 for the fiscal year that ended September 30, 1993. President Clinton had requested appropriations totalling $2,512,679,000. Some of the major allocations in the law include: $220 million to the Department of Labor for employment and training services, $326 million to the Department of Defense for the military, $341 million to the Department of Education for student financial assistance, and $475 million to the Veterans Administration for compensation and pensions.

Public Law 103-66 (enacted August 10, 1993)—the Budget-Reconciliation Act seeks to achieve $496 billion in deficit reduction over 5 years. Of that total, an estimated $240 billion will come from revenue increases, including a 4.3-cents-per-gallon increase in the tax on transportation fuels. Spending cuts include a $55.8 billion cut in Medicare. The bill also sets limits on discretionary spending for fiscal 1997 and 1998.

Data Sources

National Health Interview Survey on Child Health

Sponsoring agency: U.S. Department of Health and Human Services

Population covered: Children age 17 years and younger

Sample size: 17,100

Geographic distribution: Nationwide

Years data collected: 1988

Method of data collection: Personal interview

Future surveys planned: None

Major variables: Child-care arrangements; marital history of the child's mother; accidents, injuries, and medical conditions; birth weight and prenatal care; exposure to cigarette smoke; bedtime and sleeping arrangements; school attendance; developmental, learning, emotional, and behavioral problems; health insurance; and sources of medical care.

Publications: The 1988 edition of the annual report "Current Estimates From the National Health Interview Survey."

Sources for further information and data: Data tapes are available from:

National Technical Information Service
5285 Port Royal Road
Springfield, VA 22161
(703) 487-4650

For other information contact:

U.S. Department of Health and Human Services
Public Health Service
Centers for Disease Control
National Center for Health Statistics
6525 Belcrest Road
Hyattsville, MD 20782
(301) 436-8500

New Beneficiary Followup Survey

Sponsoring agency: U.S. Department of Health and Human Services

Population covered: Noninstitutionalized Social Security beneficiaries—retired workers, disabled workers, and aged wives and widows

Sample size: 18,600 in the 1982 New Beneficiary Survey. Same set or their survivors in 1991.

Geographic distribution: Nationwide

Years data collected: 1982 New Beneficiary Survey; 1991 New Beneficiary Followup Survey

Method of data collection: Personal interview

Future surveys planned: 2002

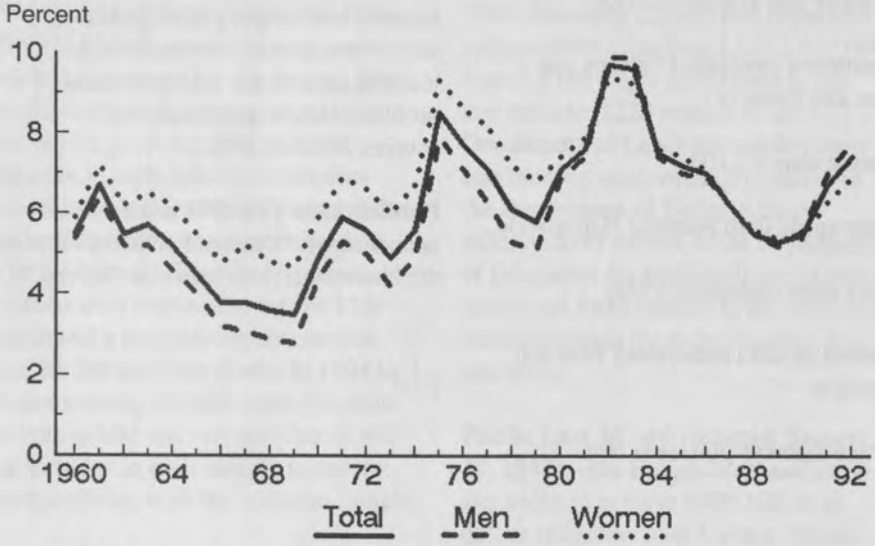
Major variables: Sociodemographic variables such as income sources, assets, health, employment history, marital history, household composition, and childbearing; history and financial impact of critical events since 1982, including widowhood, divorce, retirement, migration, and sale of home; and activities of daily living, private health insurance provisions, and longest nursing home experience. Disabled workers returning to work were asked about the job search, employer accommodation of disability, and the use of vocational-rehabilitation services.

Sources for further information and data: Data tapes from 1982 Survey are available from:

Inter-University Consortium for Political Science Research
P.O. Box 1248
Ann Arbor, MI 48106-1248
or
U.S. Department of Health and Human Services
Social Security Administration
Office of Policy/Office of Research and Statistics
4301 Connecticut Ave., NW
Washington, DC 20008

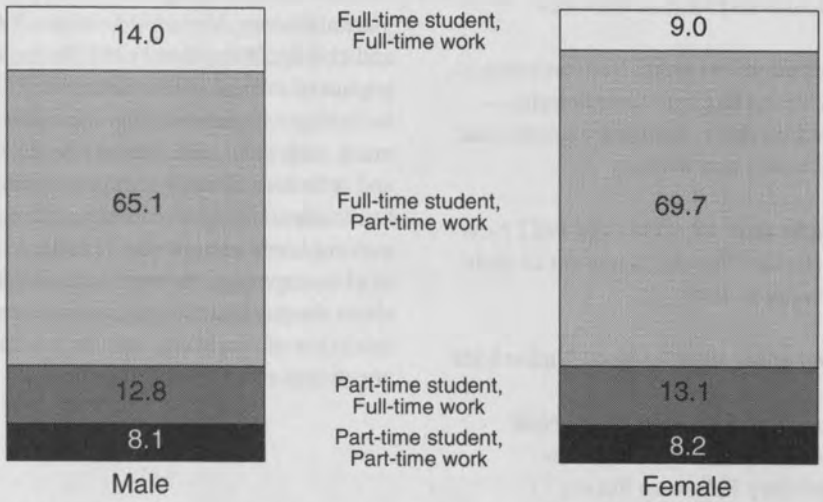
Charts From Federal Data Sources

Unemployment rates of the civilian noninstitutionalized population 16 years and over, 1960-92



Source: U.S. Department of Labor, Bureau of Labor Statistics, 1993, Employment and Earnings Vol. 40 No. 5.

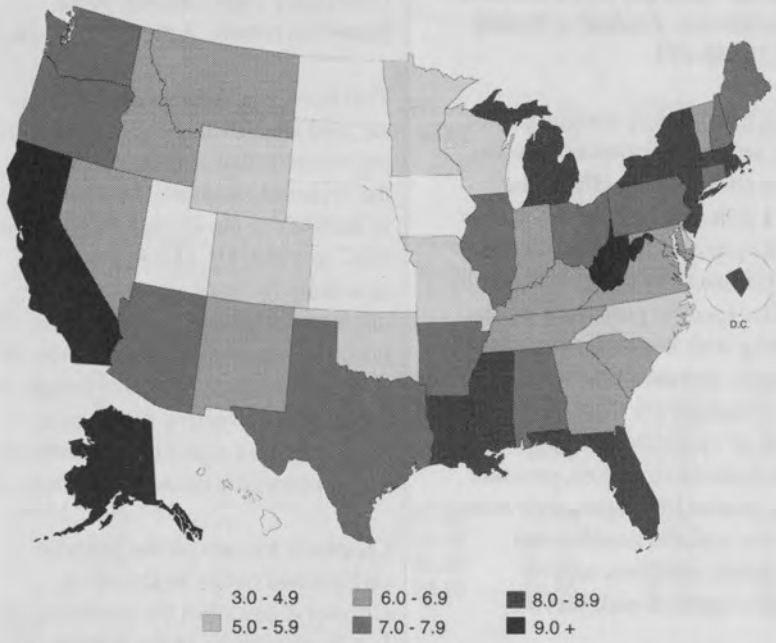
Employment among college students, ages 16-24, April 1993



Note: Full-time work = 35 or more hours per week; Full-time student = 12 hour load for undergraduates, 9 hour load for graduates.

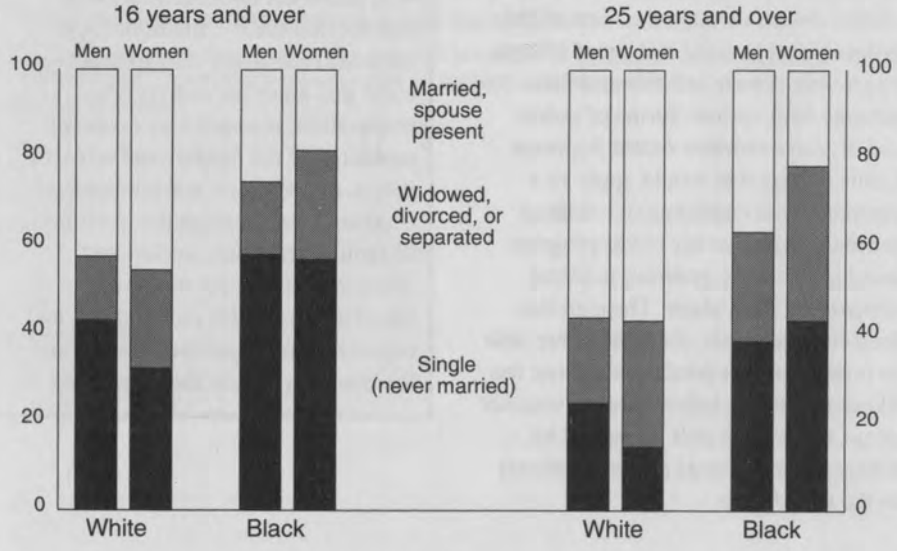
Source: U.S. Department of Labor, Bureau of Labor Statistics, 1993, Employment and Earnings Vol. 40 No. 5.

Unemployment by State, annual average for 1992



Source: U.S. Department of Labor, Bureau of Labor Statistics, 1993, Employment and Earnings Vol. 40 No. 5.

Marital status of the unemployed by sex, race, and age, April 1993



Source: U.S. Department of Labor, Bureau of Labor Statistics, 1993, Employment and Earnings.

Journal Abstracts and Book Summary

The following abstracts are reprinted verbatim as they appear in the cited source.

Hong, G-S. and White-Means, S.I. 1993. Do working mothers have healthy children? *Journal of Family and Economic Issues* 14(2):163-186.

This paper examines the effects of maternal employment on children's physical and mental health. The data used are from the Health Interview Survey 1981, Child Health Supplement. A health production model is developed on the basis of Becker's household production theory. The results reveal that a mother's employment is a significant factor affecting her child's physical health. Use of physician services, prices (i.e., CPI used as a proxy variable), sex of the child, receipt of Medicaid, the number of relocations, the mother's education, the mother's health status, breast-feeding practices, and the birth weight of the child are other important variables explaining the health status of children. The role of each of these factors varies according to the marital status of the mother.

Ward, R. A. 1993. Marital happiness and household equity in later life. *Journal of Marriage and the Family* 55(2):427-438.

Data from the National Survey of Families and Households are used to investigate associations among gender, employment, household task involvement, and marital happiness for 1,353 couples aged 50+. Employment by respondents and their spouses is not directly related to marital happiness. Wives report greater participation in household tasks and greater inequity in the division of household labor. The perceived fairness of household labor (though not reported hours of housework) is related to marital happiness, but only for wives.

Oropesa, R.S. 1993. Using the service economy to relieve the double burden: Female labor force participation and service purchases. *Journal of Family Issues* 14(3):438-473.

Using a national survey conducted in 1990, this article examines how wives' labor force participation affects the extent to which families use the market economy to provide goods and services that have traditionally been produced by women. The specific purchases examined are help with housecleaning, meals at restaurants, and meals delivered to the home. Findings are discussed within the context of hypotheses about the roles of household resources, personal resources, gender ideologies, role overload, and the specific benefits that different family members receive from the provision of each service.

Wells, A.S. and Biegel, S. 1993. Public funds for private schools: Political and First Amendment considerations. *American Journal of Education* 101(3):209-233.

This article analyzes the private school choice debate through a review of the political and judicial history of efforts to provide private schools and their patrons with various forms of public aid. It also examines recent Supreme Court rulings that would apply to a constitutional challenge of a federal tuition voucher or tax credit program and discusses the growing political support for such plans. Through this long-term analysis, the authors are able to make cautious predictions about the likelihood that a federal tuition voucher or tax credit plan will be passed by Congress or declared unconstitutional in the near future.

Liston, M.I. 1993. *History of Family Economics Research: 1862-1962.* University Publications, Iowa State University, Ames, IA 50011.

This book is a biographical, historical, and analytical reference describing research that was conducted on the economic and social problems of families in the United States from 1862 to 1962. Dr. Liston's purpose in writing the book was to increase our knowledge and understanding of families' economic circumstances in different settings. Also, she sought to promote the effective functioning of the family as a significant institution in our pluralistic economic society.

Chapter 1 focuses on the purpose and general nature of the study. Chapter 2 describes the evolution of family economics in the American Home Economics Association and in USDA's Bureau of Home Economics and provides selected historical literature. Chapter 3 discusses environmental influences on family economics research during six periods. Chapters 4, 5, and 6 list resources for basic and applied theory, methodology, statistical methods, data measurement and analysis, and report preparation; resources on economic problems of the family; and selected theses, dissertations, and publications. Chapter 7 summarizes the evolution of family economic studies and offers challenges for the future. A list of acronyms for publications and organizations mentioned throughout the book appears in the Appendix.

Cost of Food at Home

Cost of food at home estimated for food plans at four cost levels, November 1993, U.S. average[1]

Sex–age group	Cost for 1 week				Cost for 1 month			
	Thrifty plan	Low-cost plan	Moderate-cost plan	Liberal plan	Thrifty plan	Low-cost plan	Moderate-cost plan	Liberal plan
FAMILIES								
Family of 2:[2]								
20 - 50 years	$51.00	$64.50	$79.30	$98.70	$221.20	$279.30	$343.90	$427.60
51 years and over	48.30	61.90	76.20	91.10	209.40	268.30	330.20	394.80
Family of 4:								
Couple, 20 - 50 years and children—								
1 - 2 and 3 - 5 years	74.40	93.00	113.30	139.30	322.60	402.70	491.30	603.80
6 - 8 and 9 - 11 years	85.20	109.20	136.30	164.20	369.00	473.00	590.70	711.10
INDIVIDUALS[3]								
Child:								
1 - 2 years	13.50	16.50	19.20	23.20	58.60	71.30	83.20	100.70
3 - 5 years	14.50	17.90	22.00	26.40	62.90	77.50	95.50	114.40
6 - 8 years	17.70	23.70	29.60	34.50	76.60	102.50	128.30	149.30
9 - 11 years	21.10	26.90	34.60	40.00	91.30	116.60	149.80	173.10
Male:								
12 - 14 years	21.90	30.50	38.00	44.60	94.90	132.10	164.60	193.30
15 - 19 years	22.70	31.50	39.10	45.30	98.40	136.40	169.50	196.40
20 - 50 years	24.40	31.20	38.90	47.10	105.60	135.20	168.50	204.20
51 years and over	22.10	29.60	36.40	43.60	95.80	128.40	157.80	189.10
Female:								
12 - 19 years	22.10	26.40	32.00	38.70	95.80	114.30	138.60	167.50
20 - 50 years	22.00	27.40	33.20	42.60	95.50	118.70	144.10	184.50
51 years and over	21.80	26.70	32.90	39.20	94.60	115.50	142.40	169.80

[1]Assumes that food for all meals and snacks is purchased at the store and prepared at home. Estimates for the thrifty food plan were computed from quantities of foods published in *Family Economics Review* 1984(*1*). Estimates for the other plans were computed from quantities of foods published in *Family Economics Review* 1983(*2*). The costs of the food plans are estimated by updating prices paid by households surveyed in 1977–78 in USDA's Nationwide Food Consumption Survey. USDA updates these survey prices using information from the Bureau of Labor Statistics, *CPI Detailed Report*, table 4, to estimate the costs for the food plans.

[2]Ten percent added for family size adjustment. See footnote 3.

[3]The costs given are for individuals in 4-person families. For individuals in other size families, the following adjustments are suggested: 1-person—add 20 percent; 2-person—add 10 percent; 3-person—add 5 percent; 5- or 6-person—subtract 5 percent; 7- or more-person—subtract 10 percent.

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Consumer Prices

Consumer Price Index for all urban consumers [1982-84 = 100]

Group	Unadjusted indexes			
	November 1993	September 1993	October 1993	November 1992
All items	145.8	145.1	145.7	142.0
Food	141.9	141.1	141.6	138.3
Food at home	141.2	140.0	140.8	137.0
Food away from home	144.2	143.8	144.0	141.5
Housing	142.0	142.3	142.2	138.5
Shelter	156.7	156.6	156.8	152.4
Renters' costs[1]	164.4	165.3	165.4	160.6
Homeowners' costs[1]	162.0	161.4	161.6	157.2
Household insurance[1]	149.2	148.7	148.9	143.5
Maintenance and repairs	127.9	131.3	130.8	129.5
Maintenance and repair services	130.2	137.4	136.4	134.8
Maintenance and repair commodities	124.9	122.8	123.1	122.2
Fuel and other utilities	121.2	123.9	122.4	118.3
Fuel oil and other household fuel commodities	89.4	87.9	89.1	92.1
Gas (piped) and electricity	117.3	123.1	119.7	114.8
Household furnishings and operation	120.3	119.6	120.0	118.5
Housefurnishings	110.4	109.7	110.0	109.1
Housekeeping supplies	131.9	130.7	131.8	130.2
Housekeeping services	137.1	136.9	137.0	134.0
Apparel and upkeep	136.2	134.6	136.1	134.5
Apparel commodities	133.5	132.0	133.5	132.1
Men's and boys' apparel	130.8	127.8	129.4	128.8
Women's and girls' apparel	135.5	134.2	136.0	134.3
Infants' and toddlers' apparel	127.5	126.5	126.3	131.9
Footwear	127.4	126.2	127.3	126.0
Apparel services	153.6	152.4	152.9	149.7
Transportation	132.6	130.1	131.8	129.2
Private transportation	129.5	127.1	129.0	127.0
New vehicles	134.8	132.1	133.4	130.6
Used cars	140.7	138.7	139.8	129.9
Motor fuel	98.4	96.1	99.7	102.2
Automobile maintenance and repair	147.4	146.8	147.1	142.8
Other private transportation	159.1	156.1	157.8	155.3
Other private transportation commodities	102.7	103.0	102.8	104.7
Other private transportation services	172.1	168.3	170.5	166.8
Public transportation	173.0	168.4	168.2	157.4
Medical care	204.9	203.3	204.4	194.3
Medical care commodities	196.6	196.2	196.6	190.4
Medical care services	206.8	205.0	206.2	195.2
Professional medical services	187.1	186.3	186.8	179.1
Entertainment	147.7	146.6	147.3	143.7
Entertainment commodities	134.3	133.6	134.3	132.2
Entertainment services	163.7	162.1	162.9	157.8
Other goods and services	193.8	193.1	193.4	188.0
Personal care	142.9	142.4	142.4	139.0
Toilet goods and personal care appliances	140.2	139.7	139.7	136.9
Personal care services	145.7	145.3	145.3	141.1
Personal and educational expenses	217.2	215.8	216.9	203.9
School books and supplies	200.0	199.2	199.9	193.9
Personal and educational services	218.7	217.3	218.4	204.9

[1]Indexes on a December 1982 = 100 base.

Source: U.S. Department of Labor, Bureau of Labor Statistics.

Highlights

Hispanic and Black Elderly Women

Food Situation in Single-Mother Families

Alcohol Consumption