The Levy Economics Institute of Bard College

Public Policy Brief

ASSET POVERTY IN THE UNITED STATES
Its Persistence in an Expansionary Economy

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We study the level and severity of asset poverty, the characteristics of asset-poor households, the trends and persistence of asset poverty, and the role of major lifetime events affecting transitions in and out of asset poverty. We find that, contrary to a sharp decline in the official measure of poverty, which is based on income, the asset poverty rate barely changed over the 1984–99 period and the severity of poverty increased, despite economic growth and a booming stock market.

Introduction

The U.S. poverty measure is an important indicator that influences public awareness of well-being, as well as public policies and programs. Income has been the main focus of poverty measurement, and income maintenance has been the primary goal of public policies designed to alleviate poverty. However, using income as the basis to measure and alleviate poverty ignores the importance of wealth.

Wealth is central to a household's economic security. Assets provide liquidity in times of economic hardship and can be used to pay for further education, to buy a house, or to maintain a

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decent standard of living after retirement. Owner-occupied housing, moreover, is an important part of household wealth, as it provides services and frees up resources that would otherwise be spent on rent.

In this brief we study the characteristics of households that lack enough savings to sustain them during a period of economic hardship.[1] The extent and severity of asset poverty in the United States is estimated using data from the Panel Study of Income Dynamics (PSID). Our approach is novel, since it is the first thorough analysis of the level and determinants of and trends in asset poverty.

The Definition of Asset Poverty

We adopt the definition of asset poverty in Haveman and Wolff (2001): A household or person is "asset-poor" if their access to "wealth-type resources" is insufficient for them to meet their "basic needs" for a limited "period of time." We use three alternative wealth measures to specify basic needs: (1) net worth (NW), which includes the current value of all marketable assets less the current value of all debts; (2) net worth minus home equity (NW-HE), which includes all items in NW, except for home equity; and (3) liquid wealth (LIQ), which measures the value of cash and other kinds of easily monetized assets.

Period of time is set somewhat arbitrarily, but reasonably, at three months.[2] This is the time period that we require for households to survive on their own by spending down their wealth. We use poverty thresholds that were recently proposed by a National Academy of Sciences panel. These thresholds were set for a reference family of two adults and two children using data from the Consumer Expenditure Survey and corrected for family size and structure using a three-parameter equivalence scale. The reference family threshold is $15,998 (in 1997 dollars).

Asset poverty was estimated using a headcount index and poverty gap ratio that were introduced by Foster, Greer, and Thorbecke (1984). The headcount index gives an estimate of the share of households that would be unable to live at the poverty level for three months if forced to liquidate all wealth and consume the proceeds. The poverty gap ratio measures the per capita wealth that would have to be transferred to asset-poor households (as a percentage of the poverty line) in order to bring the asset-poor households to the asset poverty line.

The Evolution of Wealth

Tables 1A and 1B describe the mean and selected percentiles of the NW, NW-HE, and LIQ measures during the 1984–99 period (in 1999 dollars). The mean value of household wealth increased steadily, although at different growth rates for the various measures. The median net worth (50th percentile) increased from $43,000 to $56,500, or 31.5 percent. The 25th percentile increased by 25 percent, but the 95th percentile increased from $483,100 to $779,000, or 61.2 percent. In other words, there was a skewed progression in favor of the upper percentiles. In contrast, the poorest 10 percent of the American population was in debt in 1984, and their NW debt increased between 1984 and 1999.

Table 1A Wealth Measures, 1984–99

	Mean (Thousands of 1999 dollars)				% Change		
	1984	1989	1994	1999	1984–89	1989–94	1994–99
NW	127.9	162.6	168.7	217.1	27.1	3.8	28.7
NW-HE	81.9	107.5	116.0	158.7	31.3	7.9	36.8
LIQ	36.3	49.3	68.8	72.5	35.7	39.5	5.5

Note: Data based on four weighted, cross-sectional snapshots of households in each year.
Source: Authors' calculations from PSID surveys.

Table 1B Wealth Measures by Percentile, 1984–99

	Percentile	(Thousands of 1999 dollars)				% Change 1984–99
		1984	1989	1994	1999	
NW	10	-0.4	-1.1	-1.7	-1.8	-
	25	1.6	1.3	2.0	2.0	25.0
	50	43.0	41.7	50.7	56.5	31.5
	75	132.3	152.5	167.7	195.0	47.4
	95	483.1	585.0	664.2	779.0	61.2
NW-HE	10	-1.6	-3.2	-5.1	-5.0	-
	25	0.0	0.0	0.0	0.0	0.0
	50	7.2	8.5	11.3	12.0	66.2
	75	57.7	67.2	84.4	100.0	73.3
	95	352.8	399.0	495.3	621.0	76.0
LIQ	10	0.0	0.0	0.0	0.0	0.0
	25	0.5	0.5	0.6	0.5	4.2
	50	5.6	6.7	9.0	6.0	7.0
	75	28.9	39.0	56.3	40.5	40.3
	95	163.6	201.5	298.3	289.0	76.7

Note: Based on four weighted, cross-sectional snapshots of households in each year.
Source: Authors' calculations from PSID surveys.

The rise in liquid assets was also highly skewed in favor of the upper tail of the wealth distribution. The median increased from $5,600 in 1984 to $9,000 in 1994, before declining to $6,000 in 1999 (a 7.0 percent increase over the period). In contrast, the 95th percentile increased 76.7 percent.

Changes in Asset Poverty

Table 2A shows our estimates of the headcount index of asset poverty for U.S. households. According to the NW measure, almost 26 percent of households were asset poor in 1999, while 40 percent and 42 percent were asset poor according to the NW-HE and LIQ measures, respectively. According to our calculations, more than 46 percent of households had less than $5,000 worth of liquid assets to cushion adverse shocks. We note that there seems to be almost no change in the overall asset poverty rates during the 1984–99 period.

Table 2A Overall Household Asset Poverty Rates
(Headcount Index)

	1984	1989	1994	1999
NW	26.4	27.1	26.1	25.9
NW-HE	41.7	41.3	40.5	40.1
LIQ	41.8	38.9	37.8	41.7

Source: Authors' calculations from PSID surveys.

The NW measure yields the lowest estimate of asset poverty, as it is the most inclusive measure of wealth. The poverty rate increases by almost 15 percentage points when home equity is excluded. NW-HE and LIQ poverty rates are very close, so we focus on the NW and NW-HE poverty measures in subsequent sections of this brief.

The stability of the headcount index gives the false impression that the recession of the early 1990s had no adverse effect on asset-poor households. The large increase in the poverty gap ratio between 1989 and 1994, as shown in Table 2B, suggests, however, that the recession was harsh on almost a quarter of the population, since the average asset-poor household seems to have lost assets. Moreover, contrary to popular belief, asset poverty rates did not go down during the economic expansion of the late 1990s. In contrast to the asset poverty rates, the NW and NW-HE poverty gap ratios fell, although the NW-HE gap

Table 2B Overall Household Poverty Gap Ratios
(P1 indices)

	1984	1989	1994	1999
NW	61.5	75.7	89.4	82.3
NW-HE	85.0	93.7	112.8	108.7
LIQ	33.3	30.7	30.8	32.3

Source: Authors' calculations from PSID surveys.

ratio stayed above 100 percent in 1999. In terms of volatility, the LIQ poverty gap ratio was quite stable during the 1984–99 period (ranging from 31 to 33 percent), while the NW and NW-HE ratios were quite volatile (ranging from 62 to 113 percent).

Our estimates of asset ownership rates and asset holdings of poor households imply that there was a noticeable increase in indebtedness from the 1980s to the 1990s. Mortgage and non-mortgage debt jumped substantially and exceeded asset holdings.

The Structure of Asset Poverty, by Group

We find striking differences in the asset poverty rate by racial group, regardless of the wealth measure. Nonwhites are more than twice as likely as whites to be asset poor, and their poverty gap ratio is much higher.

With the exception of the oldest group, the poverty gap rose continuously during the 1984–99 period for all age groups, rising at the steepest rate for the under-25 group and remaining above 100 percent for the 34-and-under age groups. The asset poverty indices generally decrease with age and with higher education levels.

The most striking observation in terms of housing tenure is the huge and persistent gap in NW-HE asset poverty rates between renters and homeowners (66 percent versus 26 percent). Furthermore, the severity of asset poverty among renters is much worse than homeowners, as asset-poor renters have negative wealth, on average.

The most significant result related to asset poverty rates by family type is that nonelderly female-headed families with children have the highest rate of asset poverty, which is expected, considering the high unemployment rate among single mothers, their consequent dependency on government assistance, and the high living expenses associated with families with children. For this group, asset poverty rates declined over time, but poverty gap ratios increased. The lowest asset poverty rate by family type

is associated with elderly married couples. Between 1984 and 1999, asset poverty rates decreased among the married elderly and increased among the unmarried elderly. A similar picture emerges with regard to the poverty gap ratios.

The Effects of Changes in Population Composition on Asset Poverty Rates

The U.S. population experienced some striking compositional changes during the 1984–99 period due to such factors as immigration and aging, but asset poverty rates remained the same. Using a shift-share analysis, we find that changes in race/ethnicity and family type had a negligible effect on the overall poverty rate, while changes in age, education, and housing tenure had some effect.

The aging U.S. population, combined with decreasing poverty rates among older groups, would have pulled the NW poverty rate down to 20.3 percent in 1999, but increasing poverty in the younger groups kept the overall poverty rate at 25.9 percent. Similarly, the increase in homeownership would have reduced the overall poverty rate, but it was counterbalanced by an increase in poverty rates for renters and homeowners alike. The effect of higher education was relatively small.

A Comparison of Official and Asset Poverty Rates

Table 3 compares our asset poverty rates derived from PSID surveys with the official poverty rates based on income. Since our definition of household is not equivalent to the official definition of family, we base our comparison on the individual.[3]

We follow the Census Bureau's convention when grouping individuals by race/ethnicity, age, and gender. The individual asset poverty rate is defined as the ratio of the number of individuals in asset-poor households to the total population. The race of household members is determined by the race of the household head.

Our asset-based poverty rates are, on average, two to four times higher than the official poverty rates for almost all groups. We observe the same ranking among racial groups (whites have lower rates than nonwhites). Among age groups, however, the official poverty rate is slightly higher than the NW poverty rate for the elderly in the first two survey years. We also note that asset and income poverty rates for females are greater than those for males, and that the disparity in the official poverty rates appears to be greater than that for the asset poverty rates.

Table 3 Comparison of Official and Asset Poverty Rates by Age, Race, and Gender

			1984	1989	1994	1999
All Individuals	Official		14.4	12.8	14.5	11.8
	Asset-based	NW	24.4	25.4	24.8	27.9
		NW-HE	43.8	42.9	41.3	42.5
White (Non-Hispanic)	Official		10.0	8.3	9.4	7.7
	Asset-based	NW	19.3	20.2	20.2	19.7
		NW-HE	37.3	36.5	35.9	32.4
Black	Official		33.8	30.7	30.6	23.6
	Asset-based	NW	52.2	51.1	51.4	57.6
		NW-HE	78.4	75.2	74.0	75.6
Hispanic	Official		28.4	26.2	30.7	22.8
	Asset-based	NW	37.7	35.4	30.5	52.3
		NW-HE	62.4	53.7	44.3	77.2
Ages < 18	Official		21.5	19.6	21.8	16.9
	Asset-based	NW	31.4	33.6	30.8	36.1
		NW-HE	56.2	54.6	49.5	52.9
Ages 18-64	Official		11.7	10.2	11.9	10.0
	Asset-based	NW	23.8	24.8	24.3	28.1
		NW-HE	41.8	41.7	40.2	42.2
Ages 65 +	Official		12.4	11.4	11.7	9.7
	Asset-based	NW	10.2	10.0	12.2	9.7
		NW-HE	23.2	22.5	26.2	21.4
Male	Official		12.8	11.2	12.8	10.3
	Asset-based	NW	23.6	24.6	24.5	27.8
		NW-HE	42.9	42.1	41.1	42.3
Female	Official		15.9	14.4	16.3	13.2
	Asset-based	NW	25.2	26.2	25.2	28.1
		NW-HE	44.7	43.7	41.6	42.6

Sources: Official poverty rates: U.S. Bureau of the Census, Current Population Survey, Historical Poverty Tables by People. Asset poverty rates: Authors' calculations from PSID surveys and the experimental poverty thresholds.

As expected, the official poverty rate follows the U.S. business cycle—decreasing during economic booms, as incomes go up, and increasing during recession. However, asset poverty rates seem to move countercyclically—rising in the expansionary periods (1984–89 and 1994–99) and declining during recession (the beginning of the 1990s). This suggests, perhaps, that saving rates decline during economic booms and the decline is large enough to offset the appreciation of assets.

Characteristics of the Asset-Poor

We trace the independent effect of each factor on NW and NW-HE asset poverty measures by estimating a probit model for each survey year. To prevent multicollinearity, we exclude the dummy variables for whites, the 50–61 age group, the lowest

education group, and the unmarried nonelderly group. We find that, relative to the excluded 50–61 age group, households whose heads are older than 61 are less likely to belong to the asset-poor group than households whose heads are younger than 50. Our estimates also confirm that the chances of being asset poor go down as the level of schooling goes up.

Race is another important factor in determining asset poverty. Keeping other factors constant, households whose heads are white are 8–10 percent less likely to be NW poor than nonwhites. The effects of education and race are even greater in terms of the NW-HE poverty measure: being white lowers the probability by 19–26 percent, while a college degree lowers the probability by 11–20 percent.

Comparing different family types, we observe that nonelderly couples with children and female-headed households with children are more likely to be asset poor relative to the excluded group (unmarried nonelderly). Childless couples and the married elderly are less likely to be asset poor, while the results are mixed for the unmarried elderly.

Housing tenure is a very important factor, since homeowners are 42 percent and 20 percent less likely than renters to be NW poor and NW-HE poor, respectively.

Trends in Asset Poverty

Surprisingly, we find that the contribution to asset poverty of being white, relative to nonwhite, went up over the 1984–99 period, although the level of asset poverty among whites remained low. All age groups, with the exception of the 35–49 and 62–69 age groups, experienced a downward trend in asset poverty.

We observe some unexpected trends for some family types. Being married with children became less important as a determinant of asset poverty, while being a childless married couple became more important. Another surprise is that the contribution to asset poverty from nonelderly female household heads with children went down. Married elderly households exhibited a downward trend in NW poverty, but unmarried elderly households exhibited an upward trend.

In the period from 1984 to 1999, households with one or more of the following characteristics became worse off in terms of asset poverty: employed, 35–49 years old, married without children, white, low education, single, or unmarried elderly. The contribution of a college degree to reducing asset poverty increased over time. The importance of being nonwhite, married

with children, or a female household head with children diminished over time as a determinant of asset poverty.

The Persistence of Poverty

Table 4 shows the probability of being asset poor, which is conditional on being asset poor in the previous survey year. Our previous estimate showed that approximately 26 percent of households are NW poor in any given year, while Table 4 shows that about 60 percent of those households remain poor five years later. The persistence of poverty is higher according to the NW-HE measure (about 70 percent), because of the importance of home equity.

The persistence of asset poverty among nonwhites increased between 1984 and 1999. The picture for the various age groups is different from our earlier analysis (that poverty

Table 4 Persistence in Asset and Income Poverty

	1984–89 NW	1984–89 NW-HE	1989–94 NW	1989–94 NW-HE	1994–99 NW	1994–99 NW-HE	1984–89 Income
Total	62.0	68.7	62.6	68.6	59.7	72.1	41.6
Race/Ethnicity							
White	54.9	63.4	59.6	64.9	52.0	67.1	32.6
Nonwhite	75.6	81.9	68.6	77.7	77.3	86.0	54.8
Age Groups							
Ages <25	61.8	70.8	64.5	78.9	70.6	79.4	34.9
Ages 25-34	60.9	66.6	57.4	65.6	56.6	73.0	37.0
Ages 35-49	56.9	67.1	62.1	63.9	61.7	73.4	38.9
Ages 50-61	66.0	69.6	62.3	68.2	48.6	64.6	42.7
Ages 62-69	75.4	68.8	87.6	82.7	62.1	62.1	44.5
Ages 70 +	71.1	79.0	82.2	77.5	61.6	71.3	53.6
Education							
<High School	73.4	79.4	74.9	82.8	75.0	84.8	54.2
High School	67.0	72.2	64.0	68.4	55.4	69.6	27.7
Some College	50.5	57.0	47.8	57.6	58.3	68.5	16.3
College Graduate	31.7	41.8	51.4	50.7	47.5	62.0	7.9
Housing Tenure							
Homeowner	26.3	60.8	30.7	58.5	24.0	63.4	35.9
Renter	63.7	73.6	65.4	74.9	65.9	78.7	44.3
Family Type							
<65 yrs, Married, Children	53.0	65.1	54.1	63.6	53.6	72.6	29.2
<65 yrs, Married, No Children	43.1	54.4	46.3	56.8	42.8	61.8	25.2
<65 yrs, Female Head, Children	84.8	90.7	82.2	86.9	80.5	86.8	60.5
65+ yrs, Married	64.3	73.1	98.5	82.4	47.2	55.7	30.4
65+ yrs, Female Head	77.5	80.4	84.9	75.5	64.3	76.1	57.6
65+ yrs, Male Head	73.4	91.4	93.2	100.0	70.6	67.9	37.9

Note: Groupings are based on the characteristics of the household head.
Source: Authors' calculations from PSID surveys. Income poverty data from 1985 and 1990 surveys.

decreases with age): the conditional poverty rates are lowest for households whose heads are between 35 and 61 years, and there is a smaller degree of wealth mobility for the youngest and oldest groups.

Education seems to be an important determinant of the probability of staying in poverty, since college graduates have the lowest conditional probabilities. Homeowners are half as likely as renters to stay in poverty. Families headed by the elderly or by females with children have the highest chance of staying in asset poverty (an approximately 85 percent probability for households headed by a female with children).

We investigated the correlation between movements in and out of asset poverty with major lifetime events, since changes in family composition, the job market, or health may impact a family's wealth.[4] We are unaware of any previous research about the impact of lifetime events on asset poverty transitions.

We find that marriage has been a way out of NW poverty and that its effect increased over the 1984–99 period. Terminating a marriage, on the other hand, increases the chances of becoming asset poor. Inheritances significantly affect the probability of transition, since they usually involve considerable amounts of money. Persons starting a business are more likely to escape asset poverty and less likely to fall into asset poverty. Job market experiences of the household head appear to affect a household's wealth, but some of our results were unexpected. Finding a job had a strong positive effect for the poor in the 1984–89 sample, but a weak negative effect thereafter. Homeowners who become renters have a higher chance of transition into asset poverty. Although purchasing a home appears to help a household escape asset poverty, its effect diminishes over time.

Conclusion

This brief emphasizes that household wealth is an important factor in understanding the distribution of well-being. Wealth provides economic protection during hard times and enables people to invest in their future. During the last two decades, wealth inequality has increased. While mean net worth increased substantially, the share of the population that is vulnerable to economic shocks due to a lack of sufficient assets remained the same. It is clear that economic and financial developments in the United States benefited only a small part of the population in the 1984–99 period. Asset poverty rates did not

go down, even in the long expansionary period in the late 1990s. Given the high persistence of asset poverty, there is good reason to suspect that a high number of asset-poor households stayed in asset poverty throughout the 15-year period.

Poverty reduction policy in the United States has focused exclusively on income maintenance. While such government programs have benefited many families, they are not adept at making the poor self-sufficient. The programs' short-term focus and, especially, their asset limits, make some families dependent on government assistance. These programs, therefore, should be supplemented with new ones that provide incentives for the poor to accumulate assets.

Notes

1. By economic hardship we mean hardship caused mainly by income loss, although for some population groups, such as the elderly, income loss may not be a concern, since their incomes are mostly secure. Other causes of economic hardship may be the loss of health, which most often affects the elderly, or the breakdown of the family.

2. The choice of three months as the time period is reasonable. A key source of economic hardship is job loss, and the expected duration of unemployment ranged from 10 to 19 weeks (or 2.2 to 4.2 months) during the 1967–2002 period (Federal Reserve Bank of San Francisco 2002). To check the sensitivity of our poverty rates to the choice of time period, we estimated rates for two and four months, which varied from the reported rates by 1 to 2 percentage points.

3. The U.S. Census Bureau defines a family as a group of two people or more (one of whom is the householder) who are related by birth, marriage, or adoption, and reside together. The PSID definition of a family unit is a group of people living together who are usually related by blood, marriage, or adoption. Unrelated persons can be part of a

family unit, if they are permanently living together and share incomes and expenses. Obviously, the two definitions are not equivalent. The Census Bureau definition excludes one-person units and the PSID definition includes all persons living together (if they share incomes and expenses), although they may not be related.

4. The analysis of changes in family composition is somewhat limited here, since the longitudinal samples are restricted to households where the head remains the same. The only change allowed is the movement of family members, such as the marriage of the head or the birth of a child.

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