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# THE INCREASING RISK OF POVERTY ACROSS THE AMERICAN LIFE COURSE\*

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*This article extends the emerging body of life course research on poverty by empirically identifying the incidence, chronicity, and age pattern of American poverty and how these dimensions have changed during the period 1968–2000. Using the Panel Study of Income Dynamics, we construct a series of life tables that estimate the risk of poverty for adults during their 20s, 30s, 40s, 50s, 60s, and 70s, and compare these estimates for Americans in the 1970s, 1980s, and 1990s. Our empirical results suggest that the risk of acute poverty increased substantially, particularly in the 1990s. This observed increase was especially pronounced for individuals in their 20s, 30s, and 40s; for all age groups with respect to extreme poverty; and for white males. On the other hand, the risk of chronic poverty declined during the 1990s (as measured by the percentage of the poor who experienced five or more years of poverty within a 10-year interval). The results in this article tell a very different story than the Census Bureau's yearly cross-sectional rates, which have shown little overall change in the U.S. poverty rate during this 30-year period. In contrast, a life course approach reveals a rising economic risk of acute poverty for individuals, one that is consistent with recent observations and research suggesting that a growing number of Americans will eventually find themselves in an economically precarious position.*

**G**rowing concern has been voiced in both public policy and academic circles regarding the increasing number of Americans that appear to be at economic risk. Analysts point to a number of indicators and patterns over the past three decades to support this claim: job security has weakened (Fligstein and Shin 2004; Uchitelle 2006), more Americans are without health care (DeNavas-Walt, Proctor, and Smith 2008; Quadagno 2005), income volatility and downward mobility has increased (Gosselin 2008; Hacker 2006), the social safety net has been seriously eroded (Hays 2003; Zuberi 2006), men's earnings have stagnated (Blank, Danziger, and Schoeni 2006; DeNavas et al. 2008), income and wealth inequality have widened (Smeeding 2005), and the level of consumer debt has reached record levels (Federal Reserve Board 2008; Warren and Tyagi 2003).

On the other hand, not all indicators or studies find that economic risk and vulnerability have been on the rise. For example, the 1990s saw a significant reduction in the welfare rolls that was partially attributed to economic growth during the mid- to late 1990s (Iceland 2006). Likewise, measuring poverty with respect to levels of consumption rather than levels of income has shown an overall reduction from the 1970s through the 1990s (Meyer and Sullivan 2004; Slesnick 1993). Additionally, analyses by Gottschalk and Moffitt (1999) using the Survey of Income and Program Participation (SIPP) indicated that, contrary to other findings, job instability and insecurity did not increase in the 1980s or 1990s. Finally, research by Gottschalk and Danziger (1998) and Hertz (2007) suggested that income mobility changed little during the 1980s and 1990s.

A key indicator of economic risk that is important to this debate is the likelihood of experiencing poverty. Between 1970 and 2007, the official U.S. poverty rate averaged

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between 11% and 15% (DeNavas et al. 2008). These cross-sectional rates have risen slightly during periods of economic recession (such as in the early 1980s, early 1990s, and early 2000s) and have fallen somewhat during periods of economic expansion (mid- to late 1980s, and mid- to late 1990s). Yet, what is most striking about the patterns of U.S. poverty has been the relative stability of these rates over the past 35 years (Hoynes, Page, and Stevens 2006). For example, the poverty rate of Americans aged 18–64 was 9.0% in 1970, 10.1% in 1980, up slightly to 10.7% by 1990, down to 9.6% in 2000, and 10.9% in 2007 (DeNavas et al. 2008).

If one takes the position that more Americans appear to be economically vulnerable, why then have we not seen more individuals experiencing poverty within the past 20 years or so? We address this question by employing an alternative approach to measuring adulthood poverty. We construct a series of life tables that estimate the likelihood of various age groups experiencing poverty, and in particular, we look at how this life course risk has shifted over the past three decades. The evidence in this article is intended to provide an important piece of information to further inform the debate about whether economic risk in America has been on the rise.

### A LIFE COURSE APPROACH TO UNDERSTANDING POVERTY

The concept of the life course has had a long and distinguished history in the social and applied sciences (Dewilde 2003; Elder 1994; Moen, Elder, and Luscher 1995; Riley 1999; Settersten and Mayer 1997). It has provided a very useful framework for thinking about how individual lives unfold and how particular events and transitions affect these trajectories (Elder 1995; Voyer 2004). The term *life course* itself generally refers to “social processes extending over the individual life span or over significant portions of it, especially [with regard to] the family cycle, educational and training histories, and employment and occupational careers” (Mayer and Tuma 1990:3). In addition, as Settersten and Mayer have argued, “While these dimensions describe the primary activities across life, a more complete picture of the life course must also include more marginal periods and events—such as brief periods of training, second or part-time jobs, periods of unemployment or sickness” (1997:252). The event of poverty should also be added to this list.

Interestingly, several of the earliest social scientific studies that examined these more marginal periods incorporated a life course perspective. Rowntree’s (1901) description of 11,560 working-class families in the English city of York was pioneering in developing this approach. Rowntree estimated the likelihood of falling into poverty at various stages of the life course (based on their household economic conditions in 1899). His research indicated that working-class families were more likely to experience poverty at particular stages during the life cycle when they were economically vulnerable (e.g., when starting a new family or during retirement). Likewise, Hunter (1904) in his book, *Poverty*, attempted to place impoverishment within the context of the life course. As Rowntree did, Hunter viewed poverty as a critical life event tending to occur for working-class families at several points during their life course.

From these early pioneering studies to the present, several key concepts have been instrumental in shaping the approach taken by life course researchers. They overlap to some extent with the classic demographic emphasis placed on the importance of age, period, and cohort effects. They include the dimensions of risk, historical context, and stages of the life course; and they emphasize the importance of particular characteristics, such as race and gender, that influence the trajectory of the life course.

### Heightened Risk

One of the key points to emerge from a life course approach to studying poverty is that the risk of experiencing poverty across the life course is much greater than typically found in cross-sectional studies or in longitudinal work of limited duration. For example, Rowntree’s

analysis suggested that a life course perspective could more fully reveal the widespread nature of poverty than a point-in-time approach. As he noted, "The proportion of the community who at one period or another of their lives suffer from poverty to the point of physical privation is therefore much greater, and the injurious effects of such a condition are much more widespread than would appear from a consideration of the number who can be shown to be below the poverty line at any given moment" (1901:172).

Indeed, contemporary research has found that the life course risk of poverty is substantial. For example, the work of Rank and Hirschl has demonstrated that the lifetime risk of experiencing poverty at some point during adulthood is exceedingly high. Between the ages of 20 and 75, 58% of Americans will experience at least one year below the official poverty line, while 75% will encounter a year below 150% of the poverty line (Rank and Hirschl 1999c). Furthermore, two-thirds of Americans will rely on a means-tested safety-net program between the ages of 20 and 65, and 40% of Americans will use such a program in five or more separate years (Rank and Hirschl 2002). Yet, most Americans who experience poverty or the welfare system do so for only one or two years at a time.

Similar findings have been observed cross-culturally as well. For example, Leisering and Leibfried wrote with regard to their life course analysis of poverty in Germany,

Poverty is no longer (if ever it was) a fixed condition or a personal or group characteristic, but rather it is an experience or stage in the life course. It is not necessarily associated with a marginal position in society but reaches well into the middle class. Poverty is specifically located in time and individual biographies, and, by implication, has come to transcend traditional social boundaries of class (1999:239).

These life course results compliment and are consistent with longitudinal spell analyses of poverty, which suggest that most spells of poverty are fairly short, often recurring, and can affect a wide segment of the population (Bane and Ellwood 1986; Blank 1997; Cellini, McKernan, and Ratcliffe 2008; Duncan 1984; Stevens 1999; Walker 1994). This body of work has also shown that events leading households into poverty include the loss of jobs or cutbacks in earnings, family dissolution, and/or medical problems (Duncan et al. 1995; Iceland 2006; McKernan and Ratcliffe 2005). Over extended periods of time across the life course, these events have a much greater probability of occurring, and hence the likelihood of experiencing a spell of poverty is much greater.

This notion of risk is potentially important in understanding why cross-sectional rates of poverty may have changed very little over several decades while the life course risk of poverty may have increased substantially. A very small change in the yearly risk of poverty from one decade to another could potentially result in a much greater change in the likelihood of encountering poverty across the life course. For example, a small upward change in the risk of poverty from the 1980s to the 1990s could result in a much greater change in the life course risk of poverty if this small increased risk is multiplied over a series of years.<sup>1</sup>

Alternatively, the cross-sectional rate of poverty could remain the same but the life course risk could potentially increase if a wider range of individuals in the population experienced poverty. For example, if the poverty rate in the 1980s and 1990s was 12% each year but the turnover from year to year in terms of who was experiencing poverty was much greater during the 1990s, then the life course risk would be substantially higher in the 1990s than in the 1980s.

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1. In fact, there was a small increase in the overall rate of the poverty across the three periods we study. For those aged 18–64, the average rate of poverty between 1968 and 1978 was 8.8%; between 1979 and 1989, it was 10.9%; and between 1990 and 2000, it was 11.1% (DeNavas-Walt et al. 2008).

## Historical Context

A second important factor in applying a life course framework to an analysis of poverty is the importance of historical context in influencing the occurrence of events and the trajectory of lives. One of the ongoing concerns of life course researchers has been to analyze how the historical context, and changes in that context, can alter and shape the manner in which individuals' lives unfold (Hutchison 2005). The classic example of this type of research is Elder's (1974) examination of the impact of the Great Depression in the 1930s on the lives of children as they have aged.

One of our primary concerns in this article is to examine whether the life course risk of poverty increased across the period 1968–2000. If it has, this would represent a critical and neglected component to the overall argument and debate that there has been a rise in the level of economic vulnerability during this time for American households.

As noted at the beginning of the article, a number of analysts have argued that individual Americans are more economically vulnerable than in the past. For example, Hacker's research documented the increasing prevalence of income volatility, particularly downward mobility. Using the Panel Study of Income Dynamics (PSID), Hacker (2006) demonstrated that income instability in the mid-1990s was nearly five times higher than in the early 1970s. He noted that such patterns of rising income instability and insecurity mirror an overall trend in the United States: "As both employment-based social benefits and government programs have eroded, social risks have shifted from collective intermediaries—government, employers, large insurance pools—onto individuals and families" (Hacker 2004:252). Hacker argued that although this shift and its accompanying economic insecurity began in the 1970s and continued through the 1980s, the 1990s saw a sharp increase in economic risk as measured by several different indicators. Additional research has also suggested that economic insecurity and income volatility increased significantly in the 1990s (Bania and Leete 2007; Comin, Groshen, and Tracy 2006; Dynan, Elmendorf, and Sichel 2008; Gosselin 2008).

Conversely, as mentioned earlier, other research has called into question whether economic insecurity has in fact risen during this period. For example, in contrast to the findings reported by Hacker with respect to income volatility, an analysis by the Congressional Budget Office (2007) reported that earnings volatility has remained basically constant from the mid-1980s onward. Although it is difficult to precisely determine the extent to which these contradictory studies are the result of differences in methodology, data, or analytical techniques employed, the reported differences may be partly the result of different approaches to measuring income variance (for a discussion of this issue and an overall review of the body of research on rising income instability, see Hacker and Jacobs 2008). In addition, contradictory studies may simply reflect different components of economic risk, some of which have risen over time while others have not.

In the present analysis, we look at a particularly important measure of economic risk that has been neglected in this debate: the life course risk of poverty. Our concern is understanding the extent to which this risk has changed over the later decades of the twentieth century. Consequently, incorporating historical time into our analysis would appear to be critical in understanding the changing life course dynamics of American poverty.

## Stages of the Life Course

A third key attribute to understanding poverty from a life course framework is the notion that there are certain points and stages during the life course when individuals are more vulnerable to poverty. This, again, was one of the central points of Rowntree's pioneering research into poverty at the turn of the century in Great Britain. In particular, those in the early and later stages of life have historically been at greater risk of experiencing poverty and near poverty. For example, the 2007 rates of falling below 150% of the poverty line

with respect to age were as follows: under 18, 29.3%; 18–24, 27.7%; 25–34, 21.4%; 35–44, 16.6%; 45–54, 14.5%; 55–59, 13.7%; 60–64, 16.4%; 65 and older, 23.1%; and 75 and older, 27.1% (U.S. Census Bureau 2008).<sup>2</sup>

Research has shown that during the early and later periods of adulthood, earnings tend to be at their lowest point, while resources and assets to buffer the detrimental events discussed earlier may be in short supply (Modigliani and Brumberg 1954). In contrast, individuals in their 40s and 50s are often at the height of their earning capacity, while their portfolio of assets and resources has grown as well (Gourinchas and Parker 2002; Keister 2000; Kennickell and Starr-McCluer 1997; Mirowsky and Ross 1999; Rigg and Sefton 2004). As a result, poverty tends to be at its lowest point during these periods of the life course.

### Characteristics That Can Shape the Life Course

A final element to consider in a life course analysis of poverty is the importance of key characteristics that have been demonstrated in prior research to have a profound influence on a variety of life course events—specifically the importance of race and gender. In both cross-sectional and longitudinal analyses, race has been shown to exert a powerful influence on affecting the likelihood of poverty. African Americans and Latinos are much more likely than whites to experience poverty at any point in time and are more likely to encounter lengthier spells in poverty (Blank 1997; Cellini et al. 2008; DeNavas et al. 2008; Iceland 2006). In addition, the likelihood of poverty across the life course has been shown to be much greater for nonwhites than for whites (Rank 2009). Rank and Hirschl demonstrated that whether one examines the years of childhood (1999a; forthcoming), the working age years (2001a), or the later years of life (1999b), the risk of poverty is substantially greater for blacks than for whites. For example, they found that although 1 out of 2 whites aged 20–75 would experience a year below the poverty line, the corresponding figure for blacks was 9 out of 10 (1999c).

Gender has also been found to be an important attribute associated with poverty. Women in general, and female-headed families in particular, have been shown to be at a much greater risk of poverty than their male counterparts (DeNavas et al. 2008; McLanahan and Sandefur 1994). However, when looking across the entire life course, Rank and Hirschl (2001b) showed that the effect of gender is partially mitigated by the fact that women spend a significant amount of time married, which results in poverty rates identical to those of their husbands during those years.

To summarize, four concepts critical to understanding poverty from the perspective of the life course are increased risk, historical change, stages of the life course, and the factors of race and gender. First, the risk of poverty is far more likely when it is examined across the life course than when it is examined in cross-sectional analyses or for limited longitudinal periods of time. Second, the risk of poverty during the life course can be substantially altered as a result of differences across historical periods, with such changes often more readily apparent in a life course framework than in a cross-sectional analysis. Third, the risk of poverty can vary dramatically depending on one's stage of the life course. Finally, the occurrence of poverty across the life course can also be strongly influenced by race and gender.

We bring each of these four key elements to bear in our analysis. Our intention is to examine the risk of poverty for individuals as they age across their 20s, 30s, 40s, 50s, 60s,

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2. However, it is also true that the official poverty rate for the elderly has been cut dramatically over the past 50 years in the United States, primarily as a result of an increase in the generosity of Social Security (Hoynes et al. 2006). For example, the poverty rate for those 65 and older in 1970 was 24.6%, but it had fallen to 9.9% by 2000 (DeNavas et al. 2008). Nevertheless, many of the elderly are only a short distance above the official poverty line. As evidenced by the percentages of individuals falling below 150% of the poverty line by age categories, the likelihood of impoverishment increases substantially from the 50s onward.

and 70s, and to determine how that risk changed during the 1970s, 1980s, and 1990s. In addition, we will explore the impact of race and gender on the life course risk of poverty.

This study adds to the earlier work of Rank and Hirschl, who pooled together the PSID study waves from 1968 to the mid-1990s in order to examine the overall life course risk of poverty. Here we estimate the extent to which the life course risk of poverty has changed across the recent decades and how that change varies by stages of the life course and by race and gender. Furthermore, this work expands upon the current body of poverty research by introducing an alternative way of conceptualizing and measuring the extent of poverty and by demonstrating that this approach can reveal patterns not readily apparent in a cross-sectional or longitudinal spell analyses.

## METHODS

### Data Set

In order to assess the changing life course dynamics of poverty over time, we utilize the Panel Study of Income Dynamics (PSID). The PSID began in 1968 as an annual panel survey (biennial after 1997) and is nationally representative of the nonimmigrant U.S. population. The longest running panel data set in the United States, the PSID oversamples low-income households and contains in-depth information on family demographic and economic behavior, making it uniquely suited for this study. The PSID initially interviewed approximately 4,800 U.S. households in 1968, collecting detailed information on roughly 18,000 individuals within those households. The PSID has since tracked these individuals, including children and adults who eventually broke off from their original households to form new households (e.g., children leaving home, separations, divorce). Thus, the PSID is designed so that in any given year the sample is representative of the entire nonimmigrant U.S. population (for detailed information regarding the PSID sample and its representativeness, see Duncan, Hofferth, and Stafford 2004; Fitzgerald, Gottschalk, and Moffitt 1998; Kim and Stafford 2000; and PSID 2007).

Throughout the analysis, we employ the individual sampling weights to ensure that the PSID sample accurately reflects the U.S. population. Specifically, we utilize the weights assigned to individuals for each given wave to take advantage of the PSID practice of periodically adjusting the weights to account for nonresponse bias (Hill 1992). Over time, the PSID has experienced greater attrition among those of lower socioeconomic status. However, as Fitzgerald et al. (1998) pointed out, there is no evidence that this attrition has distorted the representativeness of the PSID; rather the authors reported that there is "considerable evidence that its cross-sectional representativeness has remained roughly intact" (1998:251).

We utilize both the household and individual levels of information from the initial wave of 1968 through 2000. Consequently, we draw upon 33 years of longitudinal information, which translates into several hundred thousand individual years of information embedded in the analysis. Our analysis does not include data from the supplemental Latino sample that was gathered from 1990 to 1995, but it does include the immigrant refresher sample introduced in 1997.<sup>3</sup>

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3. Use of the supplemental Latino sample would make the data from the 1990s less comparable with those of the 1970s and 1980s. We tested for any effects that the immigrant refresher sample might have had on our overall results by computing our poverty life tables for the 1990–2000 final sample (including the immigrant refresher sample) versus a subsample that excluded the immigrant refresher sample. There were no statistically significant differences between these two life table estimations.

Although the PSID began interviewing households biannually after 1997, income data have been gathered every year. Consequently, each calendar year in our analysis continues to have its own unique poverty and demographic information for PSID households.<sup>4</sup>

A second change occurring in 1997 was that the PSID sample size was reduced for cost management reasons (Duncan et al. 2004). The original core sample was reduced from approximately 8,500 in 1996 to 6,168 in 1997 (Duncan et al. 2004). As noted above, the sample weights are used throughout to ensure that the sample continues to represent the overall population and that the reduction in sample size does not bias our estimates (Gouskova et al. 2008).

### Measuring Poverty

The measure of poverty used in this analysis is identical to that employed by the U.S. Census Bureau in estimating the overall U.S. poverty rate (DeNavas et al. 2008). Total family income is used to determine whether individuals fall below the poverty line. This encompasses the full range of components that the Census Bureau relies on, including earnings generated by the head, the spouse, and other family members; property income; government cash transfers, such as Social Security or welfare; pensions and annuities; child support; and dividends and royalties. Family income is based on annual income, calculated from pretax dollars, and does not include in-kind program benefits, such as Medicaid or food stamps.<sup>5</sup>

Families below specific income levels are considered poor. These levels represent what is considered the least amount of income needed for a family to purchase a minimally adequate basket of goods (e.g., food, clothing, and shelter) throughout the year. The poverty thresholds are adjusted each year in accord with changes to the consumer price index.

The level itself varies depending on family size. For example, in 2007, a family of one was considered poor if its income fell below \$10,590; a family of two was counted as poor if its income was less than \$13,540; for a family of three, the level was \$16,530; and a family of four was considered poor if its income fell below \$21,203 (DeNavas et al. 2008).

One major reason for using the official poverty level as our dependent variable is that it represents the measure most used in policy and academic discussions of this topic. Although periodically debated and criticized (Blank 2008; Brady 2003; Iceland 2005; Meyer and Sullivan 2003; National Research Council 1995; Ruggles 1990), it remains the benchmark in America for judging impoverishment. Furthermore, to facilitate a comparison of our results with the prior trends in poverty, it is essential to use the official measure of poverty. In addition, Danziger (2006) argued that, in fact, it represents a reasonable compromise between those who argue that the poverty line is set too low (as a result of, for example, rising housing and child-care costs) and those who argue it is set too high (as a result of not accounting for in-kind benefits, such as food stamps or for tax credits such as the Earned Income Tax Credit [EITC]).<sup>6</sup>

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4. In order to check for any biases introduced by using the off-year information, we computed life tables for the periods 1980–1986 and 1990–1996, and found identical life course patterns when compared to our final results for 1979–1989 and 1990–2000. Consequently, we detected no evidence of bias introduced into our analysis by the post-1997 changes in PSID data collection (however, for further information regarding PSID off-year income data, see Andreski, Stafford, and Yeung 2008).

5. In constructing this variable, we did not use the PSID poverty variable, but rather computed census poverty by simulating the PSID “annual need standard—Census variable” that is provided by the PSID for 1990 and subsequent years. Our simulations accounted for part-year changes in family money income (i.e., PSID variable V18875) and were adjusted for changes in family composition. When our simulation effectively reproduced the 1990 PSID census variable, we applied this method to compute census poverty, backdating to 1968. Consequently, we used this measure across the various waves of the PSID, from 1968 to 2000.

6. One might argue that in an analysis examining whether poverty has risen during a 30-year period, our measure of poverty should include in-kind programs (e.g., the Food Stamp Program) or tax credits (the EITC), which are not included in the official measurement of poverty. However, there are several reasons why we do not

Rates of poverty derived from the PSID tend to be slightly lower than those from the Current Population Survey (CPS), which may reflect a more complete accounting of income that takes place within the PSID than in the CPS (Duncan 1984). This is not surprising because the CPS was primarily designed for measuring unemployment, whereas the PSID was designed to measure income and household well-being. For example, Gouskova and Schoeni (2007) compared estimates of family income for the PSID and CPS between 1968 and 2005 and found a close and consistent pattern throughout these years between the two, with the PSID reporting slightly higher income estimates across the years than the CPS (in addition, see Duncan and Rodgers 1991).

Our analysis employs two additional measures of poverty: extreme poverty and near poverty. Extreme poverty consists of households that fall below 50% of the official poverty line, whereas near poverty includes households that fall below 150% of the poverty line. Extreme poverty is therefore a measure of severe income deprivation, while near poverty includes both the poverty stricken and those on the outer edges of poverty. In an analysis that combines case studies of working poor individuals with national survey data, Schwarz (1997) found that 150% of the poverty line is approximately the income level required to attain a frugal, minimal life style.

### Life Table Approach

In describing the life course patterns of poverty dynamics over time, we rely on the life table as our major analytical technique. Life tables provide a concise method for describing how the odds of experiencing a specific event change as individuals age. The life table is most closely associated with biological and demographic studies of mortality, but it can be easily applied to estimate the occurrence of other events as well (Allison 1995; Namboodiri and Suchindran 1987).

In this analysis, the life table provides a clear advantage over the more common spell analyses of poverty, such as those of Bane and Ellwood (1986) and Stevens (1999). Rather than focusing on spells and duration, our interest lies in understanding the extent to which Americans fall into poverty across various stages of the life course and the degree to which that risk has changed over time. The life table is ideally suited to this task.

We construct a series of life tables for various age categories across the life course: we look at the risk of poverty for individuals in their 20s, 30s, 40s, 50s, 60s, and 70s. Within each of these age categories, we estimate a series of age-specific probabilities that poverty (or a particular number of years in poverty) will occur for those who have yet to experience impoverishment. From these age-specific probabilities, we are then able to calculate a set of cumulative probabilities that form the core of our analysis. These cumulative probabilities allow us to report the overall percentage of Americans who will experience poverty as they age across their 20s, 30s, 40s, and so on.

Because we are interested in changes in poverty dynamics over time, we split the sample into three equal time periods: 1968 to 1978, 1979 to 1989, and 1990 to 2000. These periods roughly coincide with peak-to-peak variations in the business cycle. We examine the experience of each age cohort over time by selecting all persons who are at the beginning of the age category and following them for as many years as they are at risk within the

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incorporate such measures into our analysis in this article. First, the PSID does not have continuous, consistent coverage for some of these programs (e.g., food stamp and Medicaid coverage), as it does for income, which would hinder our construction of consistent life tables across the three decades. Second, it is unclear how several of these programs should be converted into a poverty measure. For example, there are significant problems in attempting to economically factor a program such as Medicaid within a poverty measure (National Research Council 1995). Finally, and perhaps most importantly, our concern in this study is whether poverty, as measured by the Census Bureau definition, could have risen in a life course context in spite of the yearly cross-sectional flattening out of the poverty rate. Using a definition different from the Census Bureau's would, to some extent, defeat the purpose of the analysis.

10-year period.<sup>7</sup> Cohorts are followed for a period of 10 years. For example, in constructing the life tables for the period 1968 to 1978 for those aged 20–29, we select all individuals who turn age 20 during any year between 1968 and 1978. If a person turns age 20 in 1968 or in 1969, he or she could potentially contribute as many as 10 person-years to the life table. In other words, a person who was aged 20 in 1968 and did not experience poverty through age 29 would contribute 10 person-years to the life table. On the other hand, an individual who turned 20 in 1975 and experienced a year of poverty in 1977 would contribute three person-years to the construction of the life table (at ages 20, 21, and 22). Each person remains in the data set during the period as long as she or he has not experienced poverty or until surpassing the age range of the particular analysis. Using this method of selection ensures that there is no left censoring in the data, yet allows us to use the maximum amount of respondent information from the PSID.

We examine the chronicity of poverty by estimating life tables for three or more years in poverty and for five or more years in poverty within our 10-year age horizons. For example, in our life tables that estimate the likelihood of experiencing three or more years of poverty, after an individual has experienced a third year of poverty (either consecutively or spread out across the interval), the event has occurred, it is recorded, and the individual is then removed from further analysis in such a life table. These estimates allow us to measure the varying degrees of what we call chronic poverty.

Finally, we examine demographic differences in poverty by gender and by race (white versus nonwhite). As discussed earlier, countless studies have shown these variables to be important attributes that influence the risk of poverty. In the PSID, the vast majority of nonwhites are African American.

For all of our estimates, we follow the standard Census Bureau practice of providing 90% confidence intervals around each of our poverty estimates. These confidence intervals were derived from the standard errors calculated using weighted data, but were then normalized to nonweighted metrics. Life table standard errors are a function of the mean and the number of cases (Klein and Moeschberger 2003: equation 5.4.4). It is necessary to use PSID weights to compute unbiased estimates of the mean; however, the weights bias the standard errors downward. This bias was corrected by normalizing to the unweighted metrics. A limitation of this approach is that it does not account for potential PSID design effects that are an artifact of the original clustered sampling procedures (Burkhauser, Weathers, and Schroeder 2006). Although these effects exert only a minimal influence on sample variances in PSID waves that are distant from the original 1968 clustered sampling design (because the sample over time has spread out across the country from the original sampling clusters), they may be more influential in the very early waves of the study (F.P. Stafford, personal communication, November 21, 2008). Hence, testing for design effects is important in the present analysis given that we compare period differences calculated from early versus later waves.

To test for design effects, we conducted a series of analyses that incorporated the design effects and then reestimated the significance of the period differences found in our results using survey data estimation procedures in the statistical package program STATA (the “Svy” command; StataCorp 2009). These procedures accommodate survey sample weights as well as PSID design effects that can be estimated using the balanced repeated replication (BRR) method of calculating standard errors (Burkhauser et al. 2006; Solon, Page, and Duncan 2000). The STATA survey data commands for testing BRR design effects cannot be used in life table procedures but are available in survival regression procedures, specifically Cox regression. As an example of this approach, for each row in the top panel

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7. Consequently, individuals who enter into the sample during the middle of an age category would not be included in the analysis for that particular age category. Including such individuals introduces left-censoring bias into the analysis.

of Table 1, a Cox model was estimated in which time to first poverty spell was regressed on period dummy variables (one for 1968–1978 and one for 1979–1989, versus the omitted category 1990–2000). This model was estimated both with and without the BRR design effects. These results confirmed the statistical significance of each of the period effects found in the upper panel of Table 1. Accounting for design effects inflated the variances only slightly, and not nearly enough to suppress statistical significance when alpha was set to .10. Similar analyses were conducted for additional results reported in the article. We found the period effects reported in the results section to be robust and not negated by the presence of any potential design effects.<sup>8</sup>

## RESULTS

### Cumulative Risk of Poverty

Table 1 displays the cumulative risk of encountering poverty for individuals in their 20s, 30s, 40s, 50s, 60s, and 70s during the 1970s, 1980s, and 1990s (for the exact cumulative percentages for each age within these 10-year age intervals, along with the confidence intervals surrounding these percentages, see the supplemental materials in the online appendix tables: <http://www.soc.duke.edu/resources/demography>). Table 1 is divided into three panels. The top panel examines the likelihood of encountering at least one year below the official poverty line (1.00 level poverty); the middle panel looks at the likelihood of experiencing at least one year of extreme poverty (falling below 50% of the poverty line, or 0.50 level poverty); and the bottom panel addresses the risk of falling into poverty or near poverty (below 150% of the poverty line, or 1.50 level poverty).

Several patterns are readily apparent from this table. Perhaps most striking is that the life course risk of poverty increased across all age groups and different levels of poverty for the 1990–2000 period compared with the 1979–1989 and the 1968–1978 periods (the one exception is that poverty at the 1.50 level for those in their 70s was higher in 1968–1978 than it was in 1990–2000). The increase in the life course risk of poverty during the 1990s was particularly strong and significant for those in their 20s, 30s, and 40s, and for all age categories with respect to extreme poverty. For example, as shown in the top panel of Table 1, our estimates indicate that during the 1970s, 12.8% of the population experienced at least one year below the official poverty line between the ages of 40 and 49. During the 1980s, the percentage increased slightly to 14.9%; and during the 1990s, it rose to 22.0%.<sup>9</sup>

A second pattern found in Table 1 is that Americans in the 1990s (and to a somewhat lesser extent in the 1970s and 1980s) faced a significant risk of poverty across all ages of the life course. The estimated percentage of Americans experiencing at least one year below the official poverty line in the 1990s was 37.4% for those in their 20s, 27.1% for those in their 30s, 22.0% for those in their 40s, 19.8% for those in their 50s, 27.9% for those in their 60s, and 38.3% for those in their 70s. These percentages indicate that the risk of poverty is a very real threat across the entire life course. Looking at the percentages of Americans who will experience poverty at the 1.50 level indicates an even higher life course risk.

A third pattern found in Table 1 is the familiar U-shape across the stages of the life course with respect to the risk of poverty. In each of the three-decade analyses, the likelihood of experiencing poverty is highest in the 20s, declines through the 40s and in some cases the 50s, and then increases during the 60s and 70s. For example, from 1990 to 2000, the cumulative likelihood of experiencing poverty or near poverty was 55.3% for those in their 20s; 37.9% for those in their 30s; 33.1% for those in their 40s; 29.2% for those in

8. These estimations are available from the authors on request.

9. However, two of the increases in Table 1 should be viewed with caution. The increase in poverty at the 0.50 level for 70- to 79-year-olds from 6.5% to 25.4% is particularly large. Likewise, the increase in poverty at the 1.00 level for 60- to 69-year-olds from 15.8% to 27.9% is also large. It is quite likely that these increases may be at least partly due to measurement and/or sampling error within the PSID.

**Table 1.** Cumulative Percentage of the U.S. Population Experiencing Poverty Across Age Intervals and Time Periods

Poverty Level and Age Intervals	1968–1978			1979–1989			1990–2000		
	%	90% Confidence Interval	<i>N</i>	%	90% Confidence Interval	<i>N</i>	%	90% Confidence Interval	<i>N</i>
<b>1.00 Level Poverty</b>									
20–29	24.33	±1.58	12,615	30.79 <sup>a</sup>	±1.88	11,339	37.44 <sup>a,b</sup>	±2.25	6,734
30–39	18.20	±2.45	6,022	21.92	±1.96	10,014	27.10 <sup>a,b</sup>	±2.01	6,852
40–49	12.79	±1.79	6,896	14.88	±2.55	4,963	21.96 <sup>a,b</sup>	±1.58	6,369
50–59	18.43	±2.62	5,070	17.54	±2.22	5,147	19.77	±3.19	3,759
60–69	24.86	±3.06	3,856	15.76	±2.19	3,985	27.89 <sup>b</sup>	±3.37	3,165
70–79	35.08	±5.51	1,710	33.26	±5.66	2,651	38.27	±4.51	2,357
<b>0.50 Level Poverty</b>									
20–29	7.90	±0.99	14,138	16.47 <sup>a</sup>	±1.46	12,380	19.02 <sup>a</sup>	±2.52	7,491
30–39	4.76	±1.22	6,393	11.27 <sup>a</sup>	±1.61	10,619	15.57 <sup>a,b</sup>	±2.34	7,233
40–49	3.16	±0.94	7,234	8.18 <sup>a</sup>	±2.20	5,173	14.74 <sup>a,b</sup>	±2.17	6,757
50–59	8.30	±2.01	5,392	8.82	±1.58	5,375	14.62 <sup>a,b</sup>	±3.54	3,906
60–69	6.14	±1.66	4,197	6.28	±1.76	4,279	12.71 <sup>a,b</sup>	±3.36	3,340
70–79	6.39	±2.39	1,942	6.48	±2.22	2,942	25.44 <sup>a,b</sup>	±4.19	2,617
<b>1.50 Level Poverty</b>									
20–29	44.40	±2.01	11,352	46.28	±1.96	9,916	55.31 <sup>a,b</sup>	±2.60	5,896
30–39	26.71	±2.48	5,522	32.72 <sup>a</sup>	±2.11	9,231	37.85 <sup>a,b</sup>	±2.68	6,318
40–49	23.01	±2.11	6,417	22.72	±2.81	4,687	33.09 <sup>a,b</sup>	±2.65	6,044
50–59	27.51	±3.03	4,792	25.21	±2.52	4,869	29.22	±3.59	3,608
60–69	41.95	±3.55	3,444	37.42	±4.19	3,641	43.78	±4.11	2,950
70–79	59.49	±5.54	1,421	46.87	±4.74	2,257	57.02	±5.63	2,070

*Notes:* Percentages represent the cumulative percentage of the population experiencing poverty across each 10-year age interval at three different periods: 1968–1978, 1979–1989, and 1990–2000. Three levels of poverty are displayed: falling below the official poverty line (1.00 level poverty), falling below 50% of the poverty line (0.50 level poverty), and falling below 150% of the poverty line (1.50 level poverty). Sample sizes (*N*) represent the total number of unweighted person-years used to construct the life table analysis for each age interval.

*Source:* Authors' calculations of the Panel Study of Income Dynamics, 1968–2000.

<sup>a</sup>Significant increase at the .10 level from 1968–1978.

<sup>b</sup>Significant increase at the .10 level from 1979–1989.

their 50s; 43.8% for those in their 60s; and 57.0% for those in their 70s. What is also apparent in Table 1 is that this U-shape has effectively been pushed up across the 30 years under examination, while the overall life course shape of the age distribution with respect to poverty has remained the same.

Thus, Table 1 provides strong evidence that the life course risk of poverty increased substantially in the 1990s when compared with the risk in the 1970s and 1980s. However, one important limitation of Table 1 is that it potentially confounds period effects with cohort effects because the three different time periods are composed of three different cohorts. For example, the 20- to 29-year-olds that we examine between 1968 and 1978 obviously compose a different cohort than the 20- to 29-year-olds that we examine from

1979 to 1989 or from 1990 to 2000. Consequently, it is possible that the rise we observe in the risk of poverty in the 1990s is not the result of a period effect, but rather the result of a cohort effect (although the fact that the rise occurs across almost all age groups makes this less likely).

In order to disentangle period effects from cohort effects, we provide in Table 2 the cumulative poverty incidence for four separate cohorts that are followed across all three time periods (found in the diagonal patterns in Table 1). If there is a strong period effect in the third period (1990 to 2000), then poverty either should increase during this period for each of the cohorts or should not decline for those entering ages at which poverty is expected to fall (i.e., the 40s and 50s). As in Table 1, the top panel of Table 2 examines the risk of poverty, the middle panel looks at extreme poverty, and the bottom panel focuses on poverty and near poverty.

The top two rows within each of the three panels provide a strong test for the presence of a period effect because, as we have seen, poverty is normally expected to decline markedly across this stage of the life course—that is, from the 20s to the 40s or 50s. Across all three panels, and for each of the four cohorts within those panels, the risk of poverty either increased or remained the same during the 1990s. For example, as shown in the top panel, the 1938–1948 birth cohort experienced a cumulative poverty incidence of 18.2% when they were in their 30s during the years 1968–1978. As they reached their 40s (between 1979 and 1989), their risk of poverty fell to 14.9%. One might expect that given the age dynamics of poverty, their risk would again fall or would remain roughly the same when this cohort reached their 50s (as it did in Table 1 for those in the 1990s). On the contrary, their risk of poverty increased to 19.8%. Each of the other three cohorts also display the same pattern of a rise in the risk of poverty during the 1990s, or a leveling off of the risk of poverty when we should expect a decline. These patterns are repeated in the middle and bottom panels of Table 2 as well. Taken together, they provide strong evidence that the rise in the life course risk of poverty in the 1990s is the result of a period effect rather than a cohort effect.

### Number of Years in Poverty

Table 3 displays the cumulative risk of experiencing differing amounts of time below the official poverty line in order to determine whether the increase in poverty we have observed in Table 1 is the result of an acute versus a chronic rise in poverty. Included in Table 3 are individuals who have experienced one or more years of poverty (which is identical to the cumulative estimates in the top panel of Table 1), three or more years, and five or more years.

Table 3 clearly shows that the earlier observed increase in poverty in the 1990s is primarily confined to individuals who experienced a year or two of poverty, rather than several years of impoverishment. For each of the various age categories, between 1979–1989 and 1990–2000 there were no statistically significant increases in persons experiencing three or more or experiencing five or more years in poverty (the exception being three or more years for those in their 40s). In fact, in a number of age categories, there was a decline in the 1990s of experiencing three or more and five or more years of poverty.

This is further apparent in Table 4. Here we select individuals who have experienced at least one year of poverty and then calculate the percentage of these individuals who will experience three or more years of poverty and five or more years of poverty. The percentage of the poverty population encountering long-term poverty actually dropped from 1979–1989 to 1990–2000. For example, of those in their 20s experiencing poverty in the 1980s, 27.5% experienced five or more years of poverty, compared with only 17.9% for those experiencing poverty in the 1990s. The corresponding percentage drop for the other ages are 28.1% to 20.3% for those in their 30s; 42.1% to 26.9% for those in their 40s; 28.7% to 26.3% for those in their 50s; and 58.9% to 17.2% for those in their 60s. Only for

**Table 2.** Cumulative Percentage of the U.S. Population Experiencing Poverty Across Age Intervals and Time Periods, by Birth Cohorts

Poverty Level and Birth Cohorts	Time Period		
	1968–1978	1979–1989	1990–2000
<b>1.00 Level Poverty</b>			
1948–1958	Age 20–29	Age 30–39	Age 40–49
Percentage	24.33 (±1.58)	21.92 (±1.96)	21.96 (±1.58)
1938–1948	Age 30–39	Age 40–49	Age 50–59
Percentage	18.20 (±2.45)	14.88 (±2.55)	19.77 (±3.19)
1928–1938	Age 40–49	Age 50–59	Age 60–69
Percentage	12.79 (±1.79)	17.54 (±2.22)	27.89 (±3.37)
1918–1928	Age 50–59	Age 60–69	Age 70–79
Percentage	18.43 (±2.62)	15.76 (±2.19)	38.27 (±4.51)
<b>0.50 Level Poverty</b>			
1948–1958	Age 20–29	Age 30–39	Age 40–49
Percentage	7.90 (±0.99)	11.27 (±1.61)	14.74 (±2.17)
1938–1948	Age 30–39	Age 40–49	Age 50–59
Percentage	4.76 (±1.22)	8.18 (±2.20)	14.62 (±3.54)
1928–1938	Age 40–49	Age 50–59	Age 60–69
Percentage	3.16 (±0.94)	8.82 (±1.58)	12.71 (±3.36)
1918–1928	Age 50–59	Age 60–69	Age 70–79
Percentage	8.30 (±2.01)	6.28 (±1.76)	25.44 (±4.19)
<b>1.50 Level Poverty</b>			
1948–1958	Age 20–29	Age 30–39	Age 40–49
Percentage	44.40 (±2.01)	32.72 (±2.11)	33.09 (±2.65)
1938–1948	Age 30–39	Age 40–49	Age 50–59
Percentage	26.71 (±2.48)	22.72 (±2.81)	29.22 (±3.59)
1928–1938	Age 40–49	Age 50–59	Age 60–69
Percentage	23.01 (±2.11)	25.21 (±2.52)	43.78 (±4.11)
1918–1928	Age 50–59	Age 60–69	Age 70–79
Percentage	27.51 (±3.03)	37.42 (±4.19)	57.02 (±5.63)

*Notes:* Percentages represent the cumulative percentage of each birth cohort experiencing poverty across 10-year age intervals at three different periods: 1968–1978, 1979–1989, and 1990–2000. Three levels of poverty are displayed: falling below the official poverty line (1.00 level poverty), falling below 50% of the poverty line (0.50 level poverty), and falling below 150% of the poverty line (1.50 level poverty). Numbers in parentheses are 90% confidence intervals.

*Source:* Authors' calculations of the Panel Study of Income Dynamics, 1968–2000.

individuals in their 70s was there an increase in long-term poverty from the 1980s to the 1990s, from 37.7% to 41.7%.

Tables 3 and 4 demonstrate that the earlier observed rise in the life course risk of poverty from the 1980s to the 1990s is predominately the result of a rise in the risk of encountering an acute spell of poverty lasting only a year or two. Consequently, the increased

**Table 3. Cumulative Percentage of the U.S. Population Experiencing Various Numbers of Years in Poverty Across Age Intervals and Time Periods**

Years in Poverty and Age Intervals	1968–1978		1979–1989		1990–2000	
	%	90% Confidence Interval	%	90% Confidence Interval	%	90% Confidence Interval
<b>One or More Years</b>						
20–29	24.33	±1.58	30.79 <sup>a</sup>	±1.88	37.44 <sup>a,b</sup>	±2.25
30–39	18.20	±2.45	21.92	±1.96	27.10 <sup>a,b</sup>	±2.01
40–49	12.79	±1.79	14.88	±2.55	21.96 <sup>a,b</sup>	±1.58
50–59	18.43	±2.62	17.54	±2.22	19.77	±3.19
60–69	24.86	±3.06	15.76	±2.19	27.89 <sup>b</sup>	±3.37
70–79	35.08	±5.51	33.26	±5.66	38.27	±4.51
<b>Three or More Years</b>						
20–29	8.40	±1.17	14.53 <sup>a</sup>	±1.54	13.99 <sup>a</sup>	±2.38
30–39	6.33	±1.48	9.62 <sup>a</sup>	±1.46	10.83 <sup>a</sup>	±2.27
40–49	4.77	±1.20	6.46	±1.80	11.23 <sup>a,b</sup>	±2.12
50–59	8.94	±2.04	10.28	±2.48	7.15	±3.05
60–69	11.38	±2.22	10.50	±2.37	6.95	±3.03
70–79	20.22	±6.14	18.01	±5.14	22.01	±5.43
<b>Five or More Years</b>						
20–29	5.99	±1.28	8.46	±1.32	6.70	±2.32
30–39	3.91	±1.32	6.15	±1.27	5.51	±2.19
40–49	3.47	±1.17	6.26	±2.35	5.91	±2.32
50–59	7.42	±2.27	5.04	±2.02	5.21	±2.88
60–69	8.03	±2.26	9.29	±3.19	4.80	±2.95
70–79	12.60	±3.65	12.55	±3.06	15.96	±5.79

*Notes:* Percentages represent the cumulative percentage of the population experiencing one or more, three or more, and five or more years below the official poverty line across each 10-year age interval at three different periods: 1968–1978, 1979–1989, and 1990–2000.

*Source:* Authors' calculations of the Panel Study of Income Dynamics, 1968–2000.

<sup>a</sup>Significant increase at the .10 level from 1968–1978.

<sup>b</sup>Significant increase at the .10 level from 1979–1989.

risk of poverty in the 1990s seen in Table 1 is distributed across the general population, rather than being concentrated within what has been labeled the “underclass” or “the truly disadvantaged.”

These findings are entirely consistent with the pattern mentioned earlier in the theoretical section that the cross-sectional rates of poverty could remain fairly stable over time (which has been the case over the past 30 years) while the life course risk of poverty increases if there was a rise in the amount of turnover from year to year in terms of who is experiencing poverty. Our results in Tables 3 and 4 showing that the increase in poverty is primarily confined to individuals experiencing only a year or two of poverty and that there has actually been a drop in longer term poverty are quite consistent with this scenario.

**Table 4.** Cumulative Percentage of the U.S. Population Experiencing Additional Years in Poverty Contingent on Having Experienced One Year in Poverty

Years in Poverty and Age Intervals	Time Period		
	1968–1978	1979–1989	1990–2000
Three or More Years			
20–29	34.5	47.2	37.4
30–39	34.8	43.9	40.0
40–49	37.3	43.4	51.1
50–59	48.5	58.6	36.1
60–69	45.7	66.6	24.9
70–79	57.6	54.1	57.5
Five or More Years			
20–29	24.6	27.5	17.9
30–39	21.5	28.1	20.3
40–49	27.1	42.1	26.9
50–59	40.3	28.7	26.3
60–69	32.2	58.9	17.2
70–79	35.9	37.7	41.7

*Notes:* Percentages represent the cumulative percentage of the population experiencing three or more and five or more years below the official poverty line across each 10-year age interval for those who have experienced at least one year in poverty. Percentages are shown for three different periods: 1968–1978, 1979–1989, and 1990–2000.

*Source:* Authors' calculations of the Panel Study of Income Dynamics, 1968–2000.

## Race and Gender Differences

Table 5 shows the cumulative life course estimates of poverty by age, race, and gender, and suggests that the increase in poverty in our earlier figures occurred across demographic groups but was particularly noticeable for white males. Due to sample size limitations, we were only able to construct two time periods: 1968–1984 and 1985–2000. Although poverty increased for all race-gender groups (except for nonwhite males in their 60s and nonwhite females in their 20s, 50s, and 60s), the largest increases occurred for white males as a whole and for nonwhite males in their 30s, 40s and 50s.<sup>10</sup> This is consistent with results from Comin, Groshen, and Tracy (2006) showing a significant increase in earnings volatility among white male heads of households from 1984 to 1993 compared with the period of 1970 to 1979, largely as a result of increasing turbulence among U.S. firms.

A second finding consistent with virtually all research on poverty is that nonwhites are at a much greater risk of experiencing poverty across all age groups and time periods than their white counterparts. Women are also more likely to experience poverty across the life course than their male counterparts, although these differences are not nearly as wide as the racial differences. As discussed earlier, the reason gender differences are not more

10. In addition to these findings, if all ages categories are pooled for each of the four groups in Table 5, overall life course poverty increased from 1968–1984 to 1985–2000 for both white and nonwhite males and for white females.

**Table 5. Cumulative Percentage of the U.S. Population Experiencing Poverty Across Age Intervals and Time Periods, by Race and Gender**

Gender and Age Intervals	White				Nonwhite			
	1968–1984		1985–2000		1968–1984		1985–2000	
	%	90% Confidence Interval	%	90% Confidence Interval	%	90% Confidence Interval	%	90% Confidence Interval
<b>Male</b>								
20–29	18.07	±0.48	26.09 <sup>a</sup>	±2.90	48.41	±2.58	50.47	±3.98
30–39	13.72	±0.41	18.09 <sup>a</sup>	±2.53	21.53	±0.97	40.80 <sup>a</sup>	±4.16
40–49	8.06	±0.17	15.36 <sup>a</sup>	±2.48	25.95	±1.71	45.12 <sup>a</sup>	±6.22
50–59	11.09	±0.33	13.34	±3.17	25.95	±1.75	37.92 <sup>a</sup>	±8.26
60–69	14.02	±0.55	19.29 <sup>a</sup>	±3.47	39.06	±3.99	21.96	±8.57
70–79	16.95	±0.92	28.89 <sup>a</sup>	±6.48	59.31	±17.44	68.56	±8.84
<b>Female</b>								
20–29	23.35	±0.72	30.67 <sup>a</sup>	±3.14	54.32	±3.24	49.80	±3.62
30–39	19.17	±0.60	19.50	±2.64	41.87	±2.73	51.32 <sup>a</sup>	±3.42
40–49	12.07	±0.31	16.74 <sup>a</sup>	±2.55	37.72	±2.28	41.40	±4.44
50–59	17.45	±0.62	19.78	±3.42	50.58	±5.16	48.06	±5.87
60–69	21.10	±0.89	23.57	±3.58	66.09	±10.38	43.46	±5.79
70–79	33.48	±2.83	37.36	±5.05	67.98	±18.85	69.02	±6.32

*Notes:* Percentages represent the cumulative percentage of white males, nonwhite males, white females, and nonwhite females experiencing at least one year below the official poverty line during 10-year age intervals at two different periods: 1968–1984 and 1985–2000.

*Source:* Authors' calculations of the Panel Study of Income Dynamics data, 1968–2000.

<sup>a</sup>Significant increase at the .10 level from 1968–1984.

pronounced is that women and men spend much of their adulthood in marriage, which results in identical rates of poverty during these years.

## DISCUSSION

In this article, we set out to measure the extent and patterns of poverty across the various stages of the life course and to determine whether that risk has increased during the period 1968–2000. As noted at the beginning of the article, there has been an ongoing debate regarding the extent to which economic risk has been rising. On the one hand, a substantial body of empirical research has documented a number of long-term trends and patterns indicating that Americans have been facing a rising peril of economic vulnerability. On the other hand, several studies have found scant evidence for a rise in economic insecurity.

One key measure of economic risk is that of poverty. Those who argue that economic risk has been increasing over time must reconcile this with the fact that the poverty rate as reported by the Census Bureau has remained fairly stable from the early 1970s onward. We addressed this conundrum by providing an alternative analysis of poverty through the perspective of the life course and the methodology of the life table.

Our findings indicate that the life course risk of poverty increased from the 1970s and 1980s to the 1990s and that the risk itself is substantial. Adult Americans as a whole faced a greater likelihood of experiencing poverty in the 1990s than they did in the

1970s or 1980s. This was particularly the case for those in their 20s, 30s, and 40s, and for all age groups with respect to extreme poverty. The overall increase in the 1990s was predominately the result of a rise in acute rather than chronic poverty. The rise in the likelihood of encountering poverty also occurred across racial and gender lines, but it was particularly noticeable for white males as a whole and for nonwhite males in their 30s, 40s, and 50s.

This research provides an important counterpoint to findings from cross-sectional studies, such as those of the U.S. Census Bureau, showing that overall rates of poverty changed little and actually declined somewhat during the 1990s. By using a different conception of time to measure poverty, our analysis has revealed a pattern that has not been apparent from this earlier work. As Ralf Dahrendorf (1999:ix) wrote, "Arguably the most exciting dimension of social analysis is time. Yet it has long been neglected by mainstream sociology. Much of the study of social stratification, even of mobility, is static, based on snapshots which ignore the place of such moments in people's life histories."

Our findings also provide an interesting counterpoint to the perception that chronic poverty has increased from the 1970s onward. We have shown that the number of individuals experiencing chronic poverty, sometimes termed the "truly disadvantaged," has in fact somewhat declined in the 1990s (as measured by the percentage of the poor who experience five or more years of poverty within a 10-year interval). This finding is consistent with research showing that the percentage of the poverty population living in census tracts of extremely high levels of concentrated poverty (40% or more) declined significantly between 1990 to 2000 (Jargowsky 2003).

Taken together, the findings presented in this article would appear to highlight a double-edged sword regarding changes in poverty over time. Although the reach of poverty in the 1990s widened, at the same time, the grasp of poverty became somewhat weaker. More Americans were at risk of poverty in the 1990s than in the 1970s and 1980s, but fewer Americans experienced long bouts of chronic poverty.

The question then arises, to what extent are these countervailing patterns problematic? Although the decline in chronic poverty in the 1990s is certainly a positive development, the substantial increase in the risk of acute poverty is nevertheless troubling. Research has indicated that even short-term spells of poverty can be highly disruptive for individuals and families (Kaler and Rennert 2008). The fact that this risk has become more prevalent across the life course is a cause for concern.

The rise of acute poverty is consistent with the argument that the long-term economic and social policy patterns over the past 15 to 20 years have increased the likelihood of economic vulnerability, potentially leading to poverty. That is, as jobs have become more unstable and less well paying, as the social safety net has become weaker, as quality health insurance has been more scarce, and/or as levels of personal debt have skyrocketed, more Americans are at risk of falling into poverty. Although these periods of impoverishment are generally short lived, they are undoubtedly disruptive and damaging to the individuals and families experiencing such spells of economic turmoil.

We would argue that this increase in poverty strongly suggests that American society is becoming a place where economic hardship is increasingly commonplace, affecting nearly the majority, if not the majority, of Americans at several points throughout the various stages of adulthood. For example, although the risk of poverty is lowest for individuals during the prime earning years of the 40s and 50s, the risk was far from trivial even during these stages of the life course in the 1990s: approximately one-fifth of Americans were likely to experience a year of poverty during both their 40s and 50s, and one-third experienced poverty or near poverty during each of these periods.

The American life course is thus increasingly characterized by periodic spells of economic turmoil. Whether these patterns will continue throughout the first decade of the 2000s and beyond is difficult to say without further longitudinal data, but there is little

reason to think that this trend will reverse itself any time soon. If anything, it may have intensified given the continuing patterns of job insecurity, erosion of social protection programs, levels of financial debt, and wage stagnation during the 2000s.

In conclusion, by using a life course approach to measuring poverty over time, we have been able to demonstrate for the first time that the risk of American poverty increased substantially during the 1990s in comparison with the 1970s and 1980s. As we have shown, that risk has become exceedingly high. In fact, it would appear that for most Americans, the question is no longer if, but rather when they will experience poverty. In short, poverty has become a routine and unfortunate part of the American life course.

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