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Authors: Alicia Haydock Munnell, Geoffrey Sanzenbacher,
Alice Zulkarnain

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WHY HAS POVERTY DECLINED FOR WIDOWS?

BY ALICIA H. MUNNELL, GEOFFREY T. SANZENBACHER, AND ALICE ZULKARNAIN*

Introduction

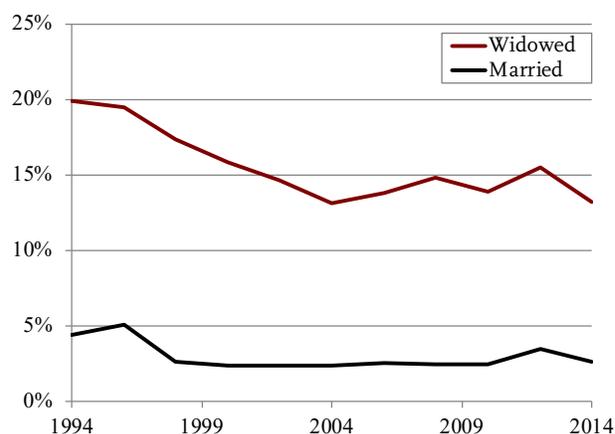
In the mid-1990s, the poverty rate for widows ages 65-85 was 20 percent. Since then, it has dropped sharply. Why did this decline occur and will it continue? This *brief*, based on a recent paper, addresses these questions by exploring three factors that could have contributed to the decline.¹ The first is the rise in women's educational attainment. The second is the rise in women's work experience. The third is shifting marriage patterns, with women of higher socioeconomic status (SES) now more likely to be married than their lower-SES counterparts.

The discussion proceeds as follows. The first section describes the three factors that could have reduced widows' poverty and how they have changed over recent decades. The second section quantifies how much of the decline in widows' poverty can be explained by each factor. The third section projects what might happen to widows' poverty in the next decade. The final section concludes that increases in education and work experience have driven the decline in widows' poverty to date, but marriage selection will likely play a significant role in a continuing decline in the future. Still, even after these effects play out, widows' poverty will remain well above that of married women.

Potential Drivers of the Decline in Widows' Poverty

Historically, widows have had much higher poverty rates than married women, but the gap between them shrank from 1994 to 2014 as poverty for widows fell more substantially (see Figure 1).² The poverty rates

FIGURE 1. POVERTY RATES FOR WOMEN AGES 65-85 BY MARITAL STATUS, 1994-2014



Source: Authors' calculations from the University of Michigan, *Health and Retirement Study* (HRS) (1994-2014).

* Alicia H. Munnell is director of the Center for Retirement Research at Boston College (CRR) and the Peter F. Drucker Professor of Management Sciences at Boston College's Carroll School of Management. Geoffrey T. Sanzenbacher is associate director of research at the CRR. Alice Zulkarnain is a research economist at the CRR.

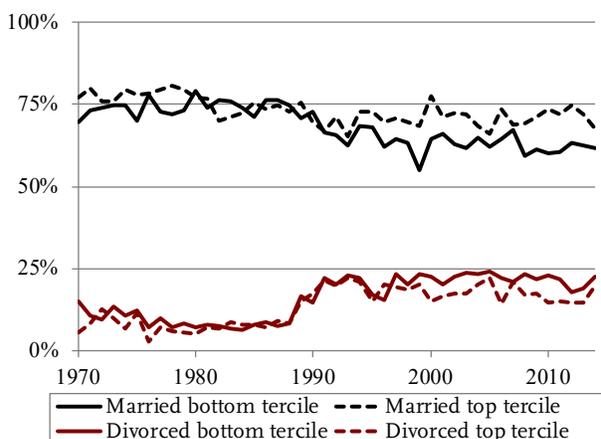
experienced by past generations of widows may reflect their greater economic dependence on men. Women who were ages 65-85 in 1994 hit their prime working years in the late 1940s, '50s, and '60s, when women tended to be homemakers and their husbands the breadwinners. Upon a husband's death, widows saw their household Social Security benefits decline and the husband's employer pension benefits reduced or eliminated completely. This loss of income put them at risk of falling into poverty.³

Over time, women have become more independent as both their educational attainment and work experience have increased. By 2014, widows ages 65-85 had an extra year and a half of education and more than 10 years of additional work experience, on average, compared to their counterparts in 1994 (see Figure 2).⁴ And better-educated women also have more access to jobs that offer retirement plans.⁵

Furthermore, while all women have increased their educational attainment and work experience, the composition of married women has shifted. Recent decades have seen a decline in marriage rates – ob-

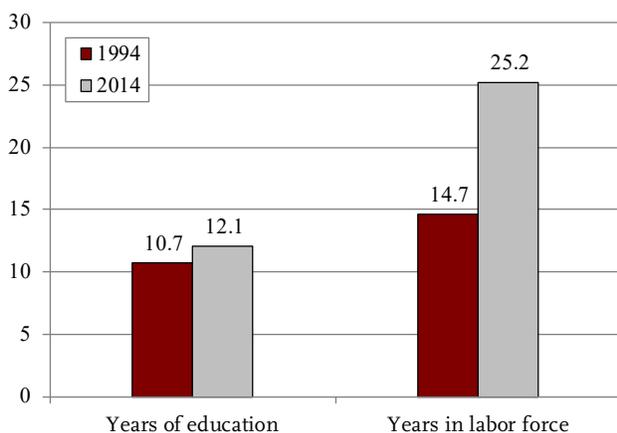
what larger for less-educated women.⁷ Thus, the pool of women who can become widows in old age is becoming better-educated than the general population.

FIGURE 3. PERCENTAGE OF WOMEN MARRIED AND DIVORCED AT AGE 50, BY EDUCATION, 1970-2014



Note: Education terciles are calculated separately for three birth cohorts: 1912-1929, 1930-1949, and 1950 to the present. Source: Authors' calculations from the U.S. Census Bureau, *Current Population Survey* (1970-2014).

FIGURE 2. AVERAGE YEARS OF EDUCATION AND WORK EXPERIENCE FOR WIDOWS AGES 65-85, 1994 AND 2014



Source: Authors' calculations from the HRS (1994, 2014).

served at age 50 – among women with less education, while rates have held relatively steady for those with more education (see Figure 3).⁶ And although divorce rates rose across the board, the increase was some-

All three factors – more education, more work experience, and the changing composition of the widow population – could have decreased widows' poverty, although the increase in marriage selection at age 50 appears to have emerged too recently to have had much impact on today's widows. Understanding the extent to which each factor explains the decline in widows' poverty is not just important for determining why it has declined to date, but also for projecting the pattern going forward.

Why Has Widows' Poverty Declined to Date?

To understand the decline in widows' poverty from 1994 to 2014, the analysis uses data from the *Health and Retirement Study*, a biennial longitudinal survey of households ages 51 and older, to determine women's education, years spent in the labor force, marital status, income, and demographics.⁸

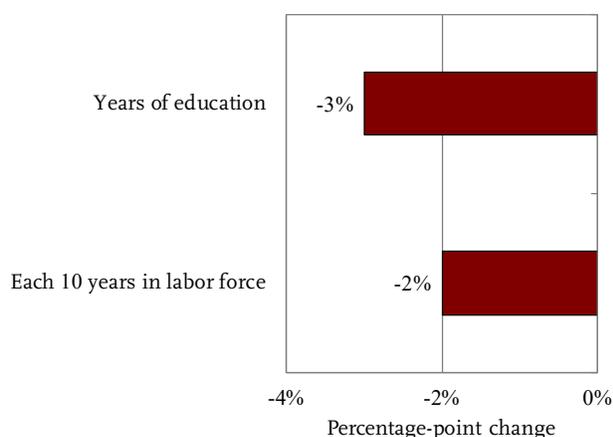
The analysis consists of three steps. First, a simple linear regression establishes the relationship between poverty and widows' education and years in the labor force, controlling for other characteristics:

$$\text{Widow poverty rate} = f(\text{years of education, years in labor force, other characteristics})$$

The other characteristics that may be associated with poverty are a widow's age, the age difference between her and her late spouse, the spouse's Social Security claiming age, race/ethnicity, whether the spouse was alive at age 65, and a linear control for time. The impact of marriage selection needs to be assessed separately because *all* widows were once married by definition.

The key regression results are presented in Figure 4. Years of education is associated with a 3-percentage-point decline in the poverty rate, while an additional 10 years of work experience is associated with a 2-percentage-point decline; both coefficients are statistically significant. The control variables for other characteristics also have the expected signs (see Appendix Table A1).

FIGURE 4. EFFECT OF EDUCATION AND WORK EXPERIENCE ON POVERTY RATES FOR WIDOWS AGES 65-85, 1994-2014



Note: Results are statistically significant at the 1-percent level. Source: Authors' calculations from the HRS (1994-2014).

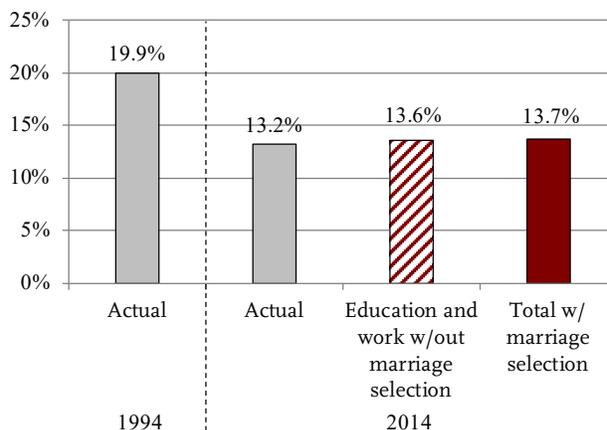
In the second step, the regression coefficients are used to estimate the decline in the widows' poverty rate due to education and work experience between 1994 and 2014. For this calculation, widows' average years of education and average years in the labor

force in 1994 are replaced with the averages in 2014 to predict the alternative poverty rate, holding all other variables constant at 1994 levels. This method isolates the impact of these two variables from all the other variables.

The third step is to account for the influence of marriage selection on widows' poverty trends. This effect is already implicitly included in the regression because the higher education and work experience of widows in 2014 reflects the increasing selection into marriage. What is not clear is the proportion of the effect that comes from *population-wide* increases in education and work as opposed to marriage selection alone. For this calculation, widows' years of education and work are replaced with recalculated values assuming that marriage rates by education were unchanged since 1994. This method isolates the impact of these trends from marriage selection.⁹

The results from this process show how the three factors have contributed to the decline in poverty over the last two decades (see Figure 5). Widows' poverty declined from 19.9 percent in 1994 to 13.2 percent in 2014. According to the estimates from the second step, the poverty rate in 2014 would have been 13.7 percent (the solid red bar), which reflects the impact of education, work experience, and marriage selection. Showing the effects of education and work experience only, the predicted rate is virtually the same (the striped red bar), which means marriage selection had essentially no impact on poverty. As noted above, marriage selection emerged too recently to have much effect on the widow population in 2014.

FIGURE 5. ACTUAL AND PREDICTED POVERTY RATES FOR WIDOWS AGES 65-85 IN 1994 AND 2014

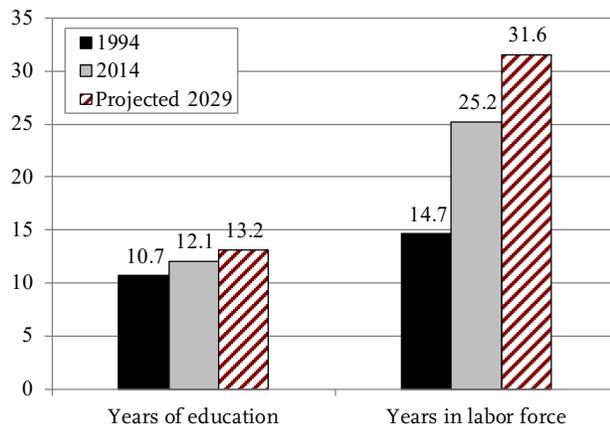


Source: Authors' calculations from the HRS (1994-2014).

Widows' Poverty in 2029

To assess what trends in education, work experience, and marriage selection can tell us about widows' poverty in the future, the analysis first estimates a simple linear regression – similar to the one performed above – to predict which married women ages 50-70 in 2014 are likely to be widowed in 2029. Figure 6 reports the predicted education and work experience for these future widows.

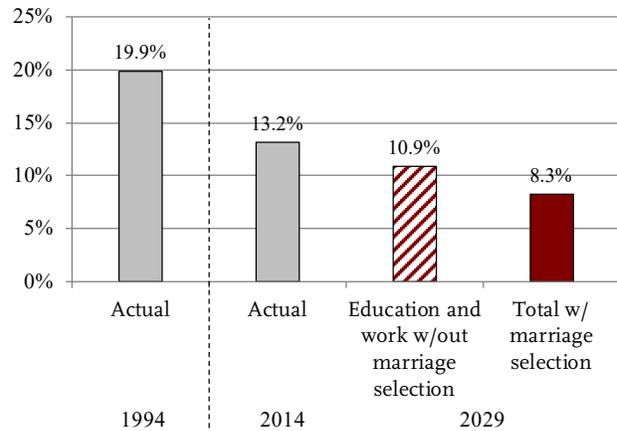
FIGURE 6. AVERAGE YEARS OF EDUCATION AND WORK EXPERIENCE FOR WIDOWS AGES 65-85, 1994, 2014, AND 2029



Note: For the 2029 projection with respect to years in the labor force, women are assumed to retire at age 65.
Source: Authors' calculations from the HRS (1994, 2014).

Using the predicted values for 2029 and the coefficients from the initial regression, the projection shows a continuing decline in widows' poverty to 8.3 percent (see Figure 7). However, this decline includes the influence of marriage selection. It is possible to separate out this effect by holding the marriage rates by education for the 2029 widows at the 2014 rates. This exercise shows that, without marriage selection, the poverty rate would only decline to 10.9 percent. Thus, about half of the total projected decline is due to marriage selection.

FIGURE 7. ACTUAL AND PREDICTED POVERTY RATES FOR WIDOWS AGES 65-85 IN 1994, 2014, AND 2029



Source: Authors' calculations from the HRS (1994-2014).

Conclusion

Over the last two decades, widows' poverty has fallen, narrowing the poverty gap between widows and married women. This decline can be explained by the general rise in women's education and work experience, with little role played by marriage selection. However, projections suggest that about half of the future decline in widows' poverty between 2014 and 2029 will be driven by the changing marital composition of widows. Although a continued decline in the poverty rate for widows is good news, widows' poverty will remain much higher than that of married couples.

Endnotes

1 Munnell, Sanzenbacher, and Zulkarnain (2018).

2 This *brief* uses data from the RAND HRS Longitudinal File which is a cleaned, easy-to-use, and streamlined version of the *Health and Retirement Study* (HRS) core interviews. These data are available for 1992-2014. The *brief* uses data starting in 1994 when the older AHEAD cohort was first added.

3 For recent studies on the transition of married women to widowhood and the likelihood of poverty, see Diebold, Moulton, and Scott (2017) or Gillen and Kim (2009).

4 For more on the education trend, see Goldin, Katz, and Kuziemko (2006) and Goldin and Katz (2018). For more on the workforce trend, see Goldin and Mitchell (2017).

5 See Munnell et al. (2016); Tamborini and Kim (2017); and Goldin and Katz (2018).

6 See Reeves, Sawhill, and Krause (2016).

7 See Stevenson and Wolfers (2007) or Aughinbaugh, Robles, and Sun (2013).

8 The public-use HRS is linked to the Social Security Administration's administrative earnings and benefit records to provide accurate information on women's earnings histories and their late spouses' age at death.

9 For full details on the methodology, see Munnell, Sanzenbacher, and Zulkarnain (2018).

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APPENDIX

TABLE A1. EFFECTS OF VARIOUS FACTORS ON POVERTY RATES FOR WIDOWS AGES 65-85, 1994-2014

Variable	Probability of being in poverty
Years of education	-0.027*** (0.002)
Years in labor force	-0.002*** (0.000)
Spouse claimed after age 65	-0.043*** (0.012)
Spouse alive at age 65	-0.037*** (0.011)
Age gap [positive if husband older]	0.002* (0.001)
Age	0.001 (0.001)
Black	0.167*** (0.019)
Hispanic	0.153*** (0.036)
Other race	0.089** (0.042)
Year	0.000 (0.001)
Constant	-0.530 (1.474)
R-squared	0.148
N	12,960

Notes: Poverty rates are based on the prior year's income and poverty thresholds. Regressions are weighted. Robust standard errors are in parentheses; standard errors are clustered at the person level. *** p<0.01, ** p<0.05, * p<0.1.

Source: Authors' calculations from the HRS (1994-2014).

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Contact Information

Center for Retirement Research
Boston College
Hovey House
140 Commonwealth Avenue
Chestnut Hill, MA 02467-3808
Phone: (617) 552-1762
Fax: (617) 552-0191
E-mail: crr@bc.edu
Website: <http://crr.bc.edu>

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