# HOW JOB OPTIONS NARROW FOR OLDER WORKERS BY SOCIOECONOMIC STATUS

By Matthew S. Rutledge, Steven A. Sass and Jorge D. Ramos-Mercado\*

## Introduction

The ability of older job-changers to find "suitable" employment affects both their current income and their ability to work long enough to secure an adequate retirement income. One measure of suitable employment is the range of occupations available to them. This *brief*, based on a recent study, assesses the extent to which occupational options narrow for workers as they age from their early-fifties to their mid-sixties and whether the pattern varies by gender or socioeconomic status, as measured by education level.<sup>1</sup>

The discussion proceeds as follows. The first section reviews the previous literature. The second section discusses the data and methodology. The third section presents findings on the narrowing of job options and the associated change in wages. The fourth section reviews changes in older workers' access to occupations since the mid-1990s, including differences by gender and education. The final section concludes that job options decline with age, but the outlook is generally not as bad as it used to be, particularly for better-educated women. Further, once the analysis accounts for differences in job characteristics, "old-person" jobs pay no less than other jobs.

#### Previous Literature

Research on job-changing at older ages began in the 1980s with a series of studies showing that workers ages 55 and over found employment in relatively few occupations.<sup>2</sup> The studies provided evidence that this narrowing of job options was due to decisions made by employers, not workers. Specifically, many older workers were already employed in occupations where few older workers were hired, indicating that older workers were willing and able to do the work. These occupations were generally associated with long tenures, traditional pension plans, seniority rights, and hiring from within.

A later study confirmed that personnel policies created impediments to hiring job-seekers ages 50 and over in the 1990s.<sup>3</sup> The study also found occupations that require extensive training, computer use, numerical aptitude, and union membership were less open to older job-seekers. And it found that hiring was concentrated in "old person" occupations: low-paying, low-status jobs, such as night watchman, retail clerk, or crossing guard.

\* All of the authors are with the Center for Retirement Research at Boston College. Matthew S. Rutledge and Steven A. Sass are research economists. Jorge D. Ramos-Mercado is a research associate.

Today, though, opportunities for older job-seekers could be less bleak than in the past for several reasons. First, the shift away from defined benefit pensions has eliminated one barrier to hiring older workers, because employers no longer face the burden of backloaded benefit accruals. Second, traditional personnel policies seem less significant in a more fluid knowledge-based economy that emphasizes generic, as opposed to firm-specific, human capital.<sup>4</sup> Third, older workers are no longer less educated than younger workers, and could thus be more attractive to employers. And, finally, the aging of the large baby boom cohort could mean that job applicants are evaluated by older hiring managers, who tend to value older workers more than younger managers.<sup>5</sup>

## Data and Methodology

This study of job-changing uses data from the Current Population Survey (CPS) and its biennial Occupational Mobility and Job Tenure supplement during the 1996-2012 period. Following the approach used in prior research, the sample includes workers with five years of tenure or less, who were either prime-age workers (ages 30-49) or older workers (ages 50-64) when hired, with their current occupation assumed to be the occupation in which they were hired.<sup>6</sup> The sample is divided into four roughly equal gender and education sub-groups: men with/without college experience and women with/without college experience. To assess the change in occupational hiring as workers gradually age past their prime working years, the sample is divided into three age groups (ages 50-54, 55-59, and 60-64). To assess the change in occupational hiring over time, the sample is divided into three time periods (1996-2000, 2002-2006, and 2008-2012). Hiring is recorded using occupation codes from the CPS.

To assess the extent to which job options narrow as workers age, the project calculates occupational hiring ratios, which compare the share of older workers hired in a particular occupation to the share of prime-age workers hired in that same occupation.<sup>7</sup> An occupation with a ratio of 2, for example, indicates that its share of older hires is at least twice its share of prime-age hires. This analysis considers any occupation with a ratio of two or greater to be hiring a disproportionately large share of older job-changers – in other words, an "old-person" job. The analysis using the hiring ratios is comprised of two parts. First, the study assesses whether the concentration of hiring in select occupations adversely affects the wage prospects of older job-changers. It compares the weighted average of median hourly wage rates in occupations where older hires are heavily concentrated to the weighted average in occupations where older and prime-age workers are hired in equal shares.<sup>8</sup> Second, the study examines how hiring ratios, and thus opportunities for older workers, have changed over time, with breakdowns by age, gender and education.

One limitation of the analysis is that it focuses entirely on workers who actually find jobs, because job-seekers who are not hired cannot be assigned to any particular occupation. As a result, the sample is skewed toward better job candidates in each education and gender group. When the labor market is weak, such as during the Great Recession, this sample selection bias may make some occupations look more accessible to older workers than they really are – not because employers actually hired a greater share of older workers than usual, but because they hired fewer workers of all ages.

## Job Options Narrow with Age

Figure 1 shows how job options narrow with age over the period under review. Among job-changers in their early 50s, only 4 percent find work in occupa-



Figure 1. Percentage of Older Job-Seekers Hired in "Old-Person" Jobs by Age, 1996-2012

Note: "Old-person jobs" are defined as occupations with a hiring ratio equal to or greater than 2. *Source*: Rutledge, Sass, and Ramos-Mercado (2016).

tions with hiring ratios of 2 or greater. But hiring becomes increasingly concentrated as workers age, with the share hired in such "old-person" jobs jumping to 22 percent by ages 60-64.

The study then assesses the effect of the concentration of hiring on workers' wages in "old-person" jobs relative to occupations in which older and prime-age job seekers were hired in equal shares, i.e. a hiring ratio of 1 to 1. The average older job-changer found work in an occupation with a median wage of \$15.65 an hour, in 2015 dollars. For those hired into old-person jobs, wages appear lower, with some variation by age (see red bars in Figure 2).

Figure 2. Difference in Median Hourly Wages for "Old-Person" Jobs Relative to Jobs with Equal Shares of Older and Prime-Age Hires by Age



Note: Solid bars are statistically significant. The metric is the reduction in the median hourly wage relative to the median wage in jobs with equal shares of older and prime-age hires, weighted by the share of workers hired. *Source*: Rutledge, Sass, and Ramos-Mercado (2016).

- For job-seekers in their early fifties, those hired into "old-person" jobs had median wages about
  2 percent higher, on average, than the occupations that hired equal shares of older and prime-aged workers, but this result is not statistically significant.
- For those in their late fifties, old-person jobs paid about 7 percent less, on average.
- For those in their early sixties, the wage reduction was actually a little smaller – about 6 percent – than for those in their late fifties.<sup>9</sup> But, as noted above, a much larger share of older job-seekers in this age range ended up in "old-person" jobs, so more people were affected by this reduction.

But these correlations ignore that "old-person" jobs differ from other jobs; for example, they are less likely to require physical skills or numerical ability. Once the analysis adjusts for these differences, the "old-person" jobs pay no less than jobs hiring equal shares of older and prime-age workers (see gray bars in Figure 2).

### Job Options over Time

Next, the analysis uses the hiring ratios to examine how the pattern of job options by age changed over the past two decades. The results appear encouraging in that they indicate a general broadening of options for older job-changers, as the percentage hired in "old-person" jobs declined noticeably at ages 50-54 and 60-64, and increased only slightly - over the full period – at ages 55-59 (see Figure 3).<sup>10</sup> This overall pattern could have been affected by the weak labor market in 2008-2012 compared to 1996-2000; in that case, older workers may look better off only because prime-age workers' job options were fading. But the share of workers in "old-person" jobs also fell for two of the three age groups during the 2002-2006 period, so the apparent gain for older workers is not just due to the recession.

## Figure 3. Percentage of Older Job-Seekers Hired in "Old-Person" Jobs by Age and Time Period



Source: Rutledge, Sass, and Ramos-Mercado (2016).

To assess any differences among demographic groups, the analysis also includes breakdowns by socioeconomic status, as defined by education, and gender. Consistent with the overall picture presented above, each education-gender group's job options have improved since the late 1990s. The share of all older workers (ages 50-64) in "old-person" occupations in 2008-2012 was about 2 percentage points lower for men in both education groups and for women with no college experience (see Figure 4). Women with at least some college show an even greater decline – 4.6 percentage points – which reflects their expanding educational attainment in more recent cohorts and hence a narrowing gap in job qualifications between older and prime-age educated women.

Figure 4. Percentage of Older Job-Seekers Hired in "Old-Person" Jobs, by Gender/Education Group and Time Period



### Conclusion

The study confirms previous findings that occupational opportunities decline for workers changing jobs after age 50. Employment opportunities for job-changers in their early 50s, however, are reasonably similar to opportunities for prime-age workers. The study also finds a broadening of occupational opportunities since the late 1990s, in particular for better-educated women. In addition, "old-person" jobs pay no less than other jobs. These results should be interpreted with a degree of caution, though, as the sample includes only job-seekers that found employment - not those who failed. As such, it may provide a rosier picture of the labor market prospects for older workers - particularly those with less education, who are far more likely to drop out of the labor force in their 50s.

#### Endnotes

- 1 Rutledge, Sass, and Ramos-Mercado (2016).
- 2 Hutchens (1986, 1988, 1991, 1993).
- 3 Hirsch, Macpherson, and Hardy (2000).
- 4 See Karoly and Panis (2004); and Osterman (2011).
- 5 Munnell, Sass, and Soto (2006).

6 Hutchens (1988, 1991) and Hirsch, Macpherson, and Hardy (2000).

7 This approach follows Hutchens (1988, 1991).

8 The reported results are estimates from a regression of an occupation's median wage on the hiring ratio and other controls: state unemployment rate, firm size, the share of the occupation with pension coverage and in unions, and period dummies. The shares of workers hired in each occupation are used as weights. For more information on the data and methodology used, see Rutledge, Sass, and Ramos-Mercado (2016).

9 The smaller correlation between wages and hiring ratios at ages 60-64 compared to 55-59 is common across the four gender-education groups. This result could be due to a selection effect – only the more successful job applicants remain in the sample.

10 The increase in the share of job-seekers at ages 55-59 hired in "old-person" jobs appears to be due to less-educated men; see Rutledge, Sass, and Ramos-Mercado (2016).

## References

- Hirsch, Barry T., David A. Macpherson, and Melissa A. Hardy. 2000. "Occupational Age Structure and Access for Older Workers." *Industrial and Labor Relations Review* 53(3): 401-418.
- Hutchens, Robert M. 1993. "Restricted Job Opportunities and the Older Worker." In As the Workforce Ages: Costs, Benefits and Policy Challenges, edited by Olivia S. Mitchell, 81-102. Ithaca, NY: ILR Press.
- Hutchens, Robert M. 1991. "Segregation Curves, Lorenz Curves, and Inequality in the Distribution of People across Occupations." *Mathematical Social Sciences* 21(1): 31-51.
- Hutchens, Robert M. 1988. "Do Job Opportunities Decline with Age?" *Industrial and Labor Relations Review* 42(1): 89-99.
- Hutchens, Robert M. 1986. "Delayed Payment Contracts and a Firm's Propensity to Hire Older Workers." *Journal of Labor Economics* 4(4): 439-457.
- Karoly, Lynn A. and Constantijn W. A. Panis. 2004. The 21st Century at Work: Forces Shaping the Future Workforce and Workplace in the United States. Santa Monica, CA: RAND Corporation.
- Munnell, Alicia H., Steven A. Sass, and Mauricio Soto. 2006. "Employer Attitudes Towards Older Workers: Survey Results." *Work Opportunities for Older Americans Issue in Brief* 3. Chestnut Hill, MA: Center for Retirement Research at Boston College.
- Osterman, Paul. 2011. "Institutional Labor Economics, the New Personnel Economics, and Internal Labor Markets: A Reconsideration." *Industrial & Labor Relations Review* 64(4): 637-653.
- Rutledge, Matthew S., Steven A. Sass, and Jorge D. Ramos-Mercado. 2016. "How Does Occupational Access for Older Workers Differ by Education?" Working Paper 2015-20. Chestnut Hill, MA: Center for Retirement Research at Boston College.

#### CENTER for RETIREMENT RESEARCH at boston college

#### About the Center

The mission of the Center for Retirement Research at Boston College is to produce first-class research and educational tools and forge a strong link between the academic community and decision-makers in the public and private sectors around an issue of critical importance to the nation's future. To achieve this mission, the Center sponsors a wide variety of research projects, transmits new findings to a broad audience, trains new scholars, and broadens access to valuable data sources. Since its inception in 1998, the Center has established a reputation as an authoritative source of information on all major aspects of the retirement income debate.

#### Affiliated Institutions

The Brookings Institution Massachusetts Institute of Technology Syracuse University Urban Institute

#### **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

© 2016, by Trustees of Boston College, Center for Retirement Research. All rights reserved. Short sections of text, not to exceed two paragraphs, may be quoted without explicit permission provided that the authors are identified and full credit, including copyright notice, is given to Trustees of Boston College, Center for Retirement Research.

The CRR gratefully acknowledges the Alfred P. Sloan Foundation for its support of this research. The findings and conclusions expressed are solely those of the authors and do not represent the opinions or policy of the Alfred P. Sloan Foundation or Boston College.