share
State Health Access Reform Evaluation

Robert Wood Johnson Foundation

shadac
State Health Access Data Assistance Center

August 2010

The Importance of Young Adult Provisions in Massachusetts' Health Reform

– *Sharon K. Long, Ph.D.^, Alshadye Yemane, M.P.P+, Karen Stockley**

*^University of Minnesota, +U.S. Department of Health and Human Services, *The Urban Institute*

INTRODUCTION

Massachusetts enacted a comprehensive health care reform bill in 2006 that has moved the state to near-universal health insurance coverage. The Massachusetts law expanded eligibility for public coverage; established subsidized insurance coverage; created an insurance purchase exchange; instituted market reforms; expanded coverage options for young adults; established requirements for employers; and mandated that all adults who have access to affordable coverage obtain health insurance (John E. McDonough et al. 2008). Although estimates to date have focused on the overall effect of the Massachusetts health reform package (e.g., Sharon K. Long, Karen Stockley and Alshadye Yemane 2009), there is substantial policy interest in determining the effects of the different components of the reform effort. In this paper, we focus on disentangling the effects of the special provisions implemented in Massachusetts to expand coverage to young adults.

Compared to older adults, young adults are much less likely to be insured, reflecting their access to fewer coverage options and, when coverage options are available, lower probability of taking up coverage (Jennifer L. Nicholson et al. 2009). Massachusetts' 2006 reform legislation included two special provisions that were targeted at young adults in an effort to make insurance more affordable for this age group. First, eligibility for dependent coverage for private insurance was extended from age 19 up to age 26, allowing young adults to be covered under a parent's health plan for a longer time period. Second, new "Young Adult Plan" (YAP) options were created for adults ages 19 to 26 who do not have access to employer-sponsored coverage. The YAPs are offered through Commonwealth Choice, the new health insurance exchange for individuals with family income above 300 percent of the federal poverty level that is operated by the Commonwealth Health Insurance Connector Authority—a quasi-governmental agency created as part of the state's reform effort. The YAPs offer a narrower benefit package and higher cost-sharing than the other Commonwealth Choice plans and thus are less expensive.

DATA & METHODS

Data

The present analysis focused on data for 2005 to 2008 from the 2006 to 2009 Current Population Survey (CPS). The CPS, a nationally representative household survey of the U.S. civilian, non-institutionalized population, collects monthly information on labor market characteristics. CPS respondents are asked in March to report on their health insurance over the prior calendar year and are classified as uninsured only if they report having been without coverage during the entire year. For the 2006-2008 study period, CPS data was available for 827 young adults ages 19-26 in Massachusetts.

For this study, individuals from households that did not respond to questions pertaining to insurance coverage in the CPS were excluded, despite the availability of insurance status information for some via the Census Bureau. Nonrespondents were excluded because the process of imputing this Census data tends to overstate the number of uninsured residents in states with a low uninsurance rate relative to the national average (Michael Davern et al. 2007). The remaining CPS sample with those exclusions was reweighted to be representative of the population in each state in each year.

Methods

To compare health insurance coverage for young adults before and after Massachusetts implemented its health reform initiative, the authors employed difference-in-differences (DD) and difference-in-difference-in-differences (DDD) methods. This methodology is more rigorous than simple pre-post comparisons, allowing the authors to disentangle the effects of young adult provisions and to account for other trends in coverage not related to the reform initiatives. The DD and DDD approach facilitates this disentanglement by exploiting variation over time (comparing pre-and post-reform time periods), across population groups (comparing young adults to older adults who are not affected by the special provisions for young adults), and across states (comparing Massachusetts to a comparison state that did not implement health reform).

Variation over Time

Since the CPS asks about health insurance coverage over the prior calendar year, the possibility of aligning the pre- and post-reform periods with the exact timing of reform implementation was limited. Pre- and post-reform periods were thus defined based on the year, rather than the month, that Massachusetts implemented reform. Although some of the initial reform efforts went into effect in October 2006, our post-reform period using the CPS begins in 2007. Analysis of health insurance coverage in the post-reform period of 2007-2008 was therefore compared to coverage in the 2005-2006 pre-reform period.

Variation across Population Groups

Three comparison groups of older adults in Massachusetts were used in this analysis: slightly older adults ages 27-33 (N=817); non-white, non-Hispanic adults ages 27-50 (N=821); and childless adults ages 27-45 (N=917). The slightly older adults are likely to be similar to young adults in their attitudes and preferences, while the older minority adults and childless adults had higher-than-average levels of uninsurance prior to health reform and thus were more similar to young adults in their pre-reform insurance status.

Variation across States

In order to assess the effects of Massachusetts' reform on the young adult population, this study utilized a comparison state to provide an estimate of what would have happened in Massachusetts in the absence of health reform. Identifying an appropriate comparison state was difficult given the wide variation in state policies, programs and populations, and the frequency with which other states were also implementing program and policy changes that affected health insurance coverage over the study period. New York was chosen for this analysis because it is, like Massachusetts, a large northeastern state with a strong system of public programs. New York expanded public coverage and implemented a program to reduce the cost of private coverage in the early 2000s, but it made few changes in its coverage initiatives over the 2005-2008 study period.

Other Trends in Coverage

Multivariate regression models were used to control for other factors beyond health reform that could have affected insurance status. The regression models included race/ethnicity; sex; citizenship; educational attainment; marital status; family size; health and disability status; employment; family income; and residence in a metropolitan area. The authors estimated linear probability models, obtaining variance estimates using the replicate weights recently released by the Census Bureau. In testing for the marginal effects of the young adult provisions, one-tailed tests of a gain in insurance coverage were used. All other tests were two-tailed tests.

In analyses relying on DD and DDD methods it is always possible that there are unmeasured differences between the treatment and comparison groups that affect the outcome of interest, thereby biasing the impact estimates. In this case, that would include unmeasured differences between young adults ages 19-26 and older adults, and between adults in Massachusetts and New York. The authors estimated the impacts of health reform using alternate comparison groups as a test of the sensitivity of their findings.

FINDINGS

More than 1 in 5 young adults ages 19-26 were uninsured prior to health reform in Massachusetts (Table 1). Between the pre-reform (2005-2006) and post-reform (2007-2008) periods, the uninsurance rate for young adults in Massachusetts fell from 21.1 percent to 8.2 percent—a drop of more than 60 percent.

Table 1: Change in Uninsurance among Young Adults Ages 19-26 and Older Adults in Massachusetts and New York, 2005 to 2008 *(Unadjusted Estimates)*

	Young Adults (Ages 19-26)	**Older Adults** (ages 27-33)	**Older Minority Adults** (Ages 27-50)	**Older Childless Adults** (Ages 27-45)
Massachusetts	N=827	N=817	N=827	N=917
Pre-reform (2005-2006)	21.1%	14.9%	18.6%	19.3%
Post-reform (2007-2008)	8.2%	8.2%	9.5%	11.9%
Post-pre difference	-12.9 ***	-6.7 ***	-9.1 ***	-7.4 ***
Change from pre-reform level	-61%	-45%	-49%	-38%
New York	N=2,689	N=2,523	N=3,311	N=2,733
Pre-reform (2005-2006)	27.4%	22.6%	24.4%	25.4%
Post-reform (2007-2008)	27.9%	20.9%	25.5%	24.2%
Post-pre difference	0.5	-1.7	1.2	-1.2

Source: 2006 to 2009 Current Population Survey.
Note: Post-pre differences may vary from reported point estimates due to rounding.
* Significantly different from zero at p<.10; ** Significantly different from zero at p<.05;*** Significantly different from zero at p<.01

Table 2 reports estimates of the overall impact of health reform on uninsurance for young adults ages 19-26 in Massachusetts, along with estimates of the marginal effect of the special provisions for young adults using the alternate comparison groups. These estimates are based on regression models, which, as noted above, control for demographic and socioeconomic characteristics and residence in a metropolitan area. As shown, we estimate that uninsurance was reduced by about 12 percentage points for young adults as a result of the full package of changes under health reform in Massachusetts—12.6 percentage points based on pre-post estimates and 12.2 percentage points based on DD estimates.

Table 2: Alternate Estimates of the Impact of Health Reform on Young Adults Ages 19-26 in Massachusetts, 2005 to 2008 *(Regression-Adjusted Estimates of Percentage Point Changes)*

	Estimate
Overall Impact of Health Reform	
Pre-post estimate for young adults in Massachusetts	-12.6 ***
DD estimate comparing young adults in Massachusetts to young adults in New York	-12.2 ***
Marginal Impact of Young Adult Provisions under Health Reform	
DD estimates	
Model 1: Comparing young adults to older adults in Massachusetts	-6.3 ***
Model 2: Comparing young adults to older minority adults in Massachusetts	-5.0 ***
Model 3: Comparing young adults to older childless adults in Massachusetts	-6.5 **
DDD estimates	
Model 1: Comparing young adults to older adults in Massachusetts and New York	-7.5 ***
Model 2: Comparing young adults to older minority adults in Massachusetts and New York	-5.4 **
Model 3: Comparing young adults to older childless adults in Massachusetts and New York	-6.4 ***

Source: 2006 to 2009 Current Population Survey
* Significantly different from zero at p<.10, ** Significantly different from zero at p<.05,*** Significantly different from zero at p<.01

DISCUSSION

The authors found evidence that the special provisions targeting young adults played an important role in the expansion in coverage for that group. While small sample sizes affected the precision of the estimates, it appears that a substantial share of the gain in coverage for young adults under health reform in Massachusetts was due to the addition of those special provisions. These results suggest that supplementing reform efforts with targeted initiatives that reduce the costs of coverage for young adults is an effective strategy for expanding insurance coverage among a difficult-to-cover population.

Not addressed in this brief are the implications of the narrower benefit package and higher cost-sharing of the YAP options on access to and affordability of care for young adults. In assessing the overall success of the special provisions for young adults, it will be important to determine whether the gains in coverage for these individuals translated into better access to health care and financial protection from high health care costs. Unfortunately, small sample sizes for states in most national surveys limit such analyses to, at best, the largest states. With the increased need of tracking national reform, it is now very critical to expand sample sizes in national surveys to allow for enhanced tracking of the implications of health reform over time and across key population groups. Given the importance of states in national health reform efforts, it would also be worthwhile to add a few questions about access to and affordability of care to the American Community Survey to take advantage of the large sample sizes available in that survey.

The content of this brief draws from the authors' work published in the American Economic Review. For the full paper, see Long, Sharon K., Alshadye Yemane, and Karen Stockley. 2010. "Disentangling the Effects of Health Reform in Massachusetts: How Important Are the Special Provisions for Young Adults?" American Economic Review, 100(2): 297–302. Available at http://pubs.aeaweb.org/doi/pdfplus/10.1257/aer.100.2.297.

REFERENCES

Davern, Michael, Holly Rodin, Kathleen T. Call, and Lynn A. Blewett. 2007. “Are the CPS Uninsurance Estimates Too High? An Examination of Imputation.” *Health Services Research*, 42(5): 2038-45.

Long, Sharon K., Karen Stockley, and Alshadye Yemane. 2009. “Another Look at the Impacts of Health Reform in Massachusetts: Evidence Using New Data and a Stronger Model,” *American Economic Review: Papers & Proceedings*, 99(2): 508-511.

McDonough, John E., Brian Rosman, Mehreen Butt, Lindsey Tucker, and Lisa Kaplan Howe. 2008. “Massachusetts Health Reform Implementation: Major Progress and Future Challenges” *Health Affairs*, 27(4): w285-w297.

Nicholson, Jennifer L., Sara R. Collins, Bisundev Mahato, Elise Gould, Cathy Schoen, and Sheila D. Rustgi. 2009. “Rite of Passage? Why Young Adults Become Uninsured and How New Policies Can Help, 2009 Update.” Washington, DC: The Commonwealth Fund. Available at www.commonwealthfund.org.

ABOUT THE SHARE INITIATIVE

SHARE is a national program of the Robert Wood Johnson Foundation and is located at the University of Minnesota's State Health Access Data Assistance Center (SHADAC).

The SHARE project has the following key goals:

1. Coordinate evaluations of state reform efforts in a way that establishes a body of evidence to inform state and national policy makers on the mechanisms required for successful health reform.
2. Identify and address gaps in research on state health reform activities from a state and national policy perspective.
3. Disseminate findings in a manner that is meaningful and user-friendly for state and national policy makers, state agencies, and researchers alike.

To accomplish these goals, SHARE has funded 16 projects covering 29 states.

CONTACTING SHARE

The State Health Access Reform Evaluation (SHARE) is a Robert Wood Johnson Foundation (RWJF) program that aims to provide evidence to state policy makers on specific mechanisms that contribute to successful state health reform efforts. The program operates out of the State Health Access Data Assistance Center (SHADAC), an RWJF-funded research center in the Division of Health Policy and Management, School of Public Health, University of Minnesota. Information is available at www.statereformevaluation.org.

State Health Access Data Assistance Center
2221 University Avenue, Suite 345
Minneapolis, MN 55414
Phone (612) 624-4802