



## Growth and Variability in Health Plan Premiums in the Individual Insurance Market Before the Affordable Care Act

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**Abstract** Before we can evaluate the impact of the Affordable Care Act on health insurance premiums in the individual market, it is critical to understand the pricing trends of these premiums before the implementation of the law. Using rates of increase in the individual insurance market collected from state regulators, this issue brief documents trends in premium growth in the pre-ACA period. From 2008 to 2010, premiums grew by 10 percent or more per year. This growth was also highly variable across states, and even more variable across insurance plans within states. The study suggests that evaluating trends in premiums requires looking across a broad array of states and plans, and that policymakers must examine how present and future changes in premium rates compare with the more than 10 percent per year premium increases in the years preceding health reform.

### OVERVIEW

The Affordable Care Act (ACA) represents the most fundamental change to the structure of U.S. insurance markets in decades. The law introduces, among other things: modified community rating, which restricts insurers from charging consumers different rates based on factors like health status (although with the exception of some, like age and tobacco use); new state marketplaces to promote competition among insurers; substantial tax credits to offset the cost of insurance in the marketplaces for lower-income Americans; and regulation to ensure that plans sold both within and outside the marketplaces meet a minimum level of benefits. These reforms will influence the pricing of plans sold in the individual health insurance market.

However, the individual insurance markets in the United States before the implementation of the ACA had a host of problems that motivated health care reform, including rapidly rising and highly variable health insurance premiums. It is unclear how these reforms will influence the overall rate of increase in premiums in this market and their variability across and within states. The purpose of this issue brief is to describe premium increases and variability before the ACA was implemented.

This brief uses data collected by Jon Gabel and colleagues at the National Opinion Research Center (NORC).<sup>1</sup> The researchers collected premium rate change filings for the individual market in 30 states for the 2008–2010 period before ACA

regulations were imposed. The data are not fully comprehensive, but provide the best available overview of rate growth in the individual insurance market. Data from this period can be used to provide information on premium rate growth before the ACA.

These data show that from 2008 to 2010 there was high and variable premium growth in the individual insurance market. Overall, premium growth averaged 10 percent or more per year during this period before the implementation of the ACA. Growth rates were highly variable across states, with premiums rising by as little as 3 percent or by as much as 21 percent. Across individual insurer filings there was even more variability; for example, in 2008, the top 1 percent of insurers raised rates by more than 28 percent.

These results provide important guidance for interpreting the rate increases we will see over 2014 to 2015 in state marketplaces. They suggest that strong conclusions about rate effects of the ACA cannot be gleaned from individual insurance filings or even from single states. These findings also illustrate that any interpretation of the rate increases from 2014 to 2015 should be compared with the increases of 10 percent or more that occurred in the period before the law took effect.

## BACKGROUND

### How Might the Affordable Care Act Affect Insurance Pricing?

The Affordable Care Act includes a wide range of provisions that might affect the pricing of insurance in the individual market ([Appendix 1](#)). Because of the multifaceted effects of these provisions on premiums, it is hard to predict exactly how the ACA will change premiums.

There is little systematic research showing how the ACA affected prices in the individual insurance market since 2010, which partially reflects the difficulty of obtaining solid baseline data on pricing, particularly in the individual market. A number of studies projected how the ACA would affect pricing in the individual market for comparable insurance products, with results varying from decreases to sizeable increases.<sup>2</sup>

The 2014 rates that were issued in the state marketplaces were lower than many of these estimates. In particular, the typical silver plan premium (i.e., one that pays 70 percent of health care expenses) was about 16 percent below the level projected by the Congressional Budget Office (CBO).<sup>3</sup> In its most recent report, CBO now projects modest growth in premiums in the coming years, with premiums rising by less than 3 percent from 2014 to 2015, and by 6 percent per year on average from 2015 through 2024.

For 2015 and beyond, we will not have to rely on comparing current rates to projected rates, but will be able to compare to the rates that were available in 2014. It will be useful to compare the rate of growth of premiums on the marketplaces with the rate of growth in these markets before the ACA. The purpose of this brief is to provide a baseline for such a comparison

### Collecting Data on Insurance Premium Growth

There is no systematic reliable national data on premium levels in the individual market before the ACA.<sup>4</sup> In a number of states, data on rate growth are available through state insurance regulators. NORC collected data in two waves: for 2008–2011 and then again for 2011–2012, albeit with a somewhat different set of states. This analysis focuses on premium increases filed from 2008–2010 because premium rate increases from 2011 and after are strongly influenced by three provisions of the ACA, outlined below.

First, in 2010, the law initiated a number of important benefit mandates, such as limitations on the ability of insurers to impose annual or lifetime caps on benefits. These reforms may have raised premiums, making it difficult to use post-2010 information as a baseline.

Second, the ACA authorized states or the federal government (in cases where the state's review process was not deemed effective) to review the reasonableness of rate increases. In particular, justification was required for any rate increase of 10 percent or more. This review began in September 2011, and the effect on rate submissions was immediate.<sup>5</sup> The share of rate filings of 10 percent or more fell by more than half after September 2011. Overall, the share of filings of 10 percent or more fell from three-quarters in 2010 to one-third by 2012.

Finally, the ACA introduced target medical loss ratios (MLRs) in the individual and small-group markets. These regulations required insurers to spend at least 80 percent of premiums on medical benefits and quality improvement activities. Any insurers not meeting these targets were required to rebate the excess to consumers. These rebates began in summer 2012, based on MLRs calculated in 2011.

Because of these provisions, it is difficult to separate baseline trends in insurance premium increases after 2011 from the impacts of the ACA itself. This brief therefore focuses on the pre-ACA period, 2008–2010, for measuring premium trends.

The NORC study, which was presented in a November 2012 report, collected data from 30 states, relying on states for which data were available on insurance rate filings, mostly through publicly available websites.<sup>6</sup> Data were collected for the individual insurance and conversion markets (i.e., markets for people who lost group insurance and converted to individual policies). [Appendix 2](#) reviews the data collection process and associated limitations. For these states, the NORC data collection represented about half of insurance coverage in 2008, and more than 70 percent of the coverage in 2009 and 2010. While the data are not comprehensive, the findings are consistent under sensitivity testing. This

demonstrates that the findings are robust—that is, there is no systematic bias in the data.

It is important to note one benefit of the ACA: a move away from the lack of transparency in the individual insurance market. Beginning in 2014, rates for insurance will be readily available in a clear and transparent way to consumers and state regulators will be required to collect comprehensive data on rate changes that can make future analysis of this sort much more rigorous.

## FINDINGS

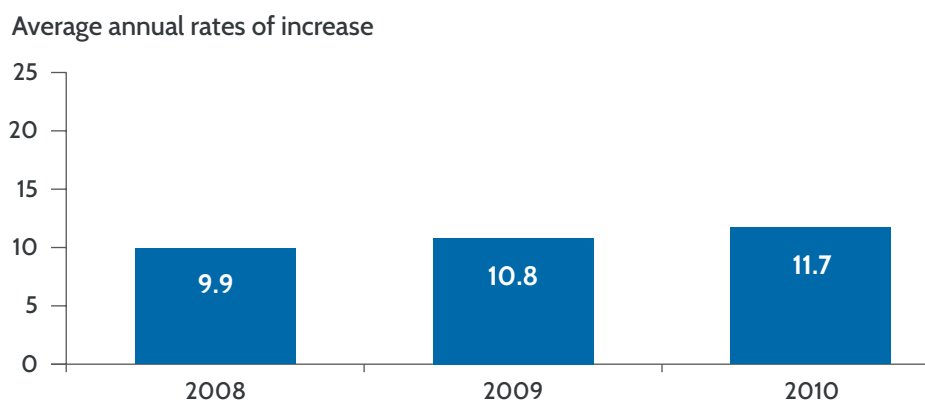
### Premium Growth in the Period Before the Affordable Care Act

#### National Trends

Nationally, premiums in the full NORC sample rose by 9.9 percent in 2008, 10.8 percent in 2009, and 11.7 percent in 2010 (Exhibit 1).

The NORC data collection varies in the intensity with which different states are represented, due to incomplete insurance filings across the states and to the sampling strategy of focusing on the largest insurance companies. To address this concern, Exhibit 2 shows the year-by-year results under various restrictions to the sample:

**Exhibit 1. National Average Rates of Premium Increase in Individual Market**



Note: Includes individuals who are able to convert existing insurance policies into the individual market, under HIPAA.  
Sources: NORC, "Trends in Premiums in the Small Group and Individual Insurance Markets, 2008–2011," Nov. 6, 2012; author's analysis.

## Exhibit 2. National Average Rates of Premium Increase in Individual Market

Year	Overall	>60% Market Share	>80% Market Share	Consistent High Share
Total	10.9%	11.5%	12.2%	10.7%
2008	9.9%	10.4%	10.4%	9.97%
2009	10.8%	11.0%	11.5%	10.1%
2010	11.7%	12.2%	13.1%	12.1%

Note: Includes individuals who are able to convert existing insurance policies into the individual market, under HIPAA.

Sources: NORC, "Trends in Premiums in the Small Group and Individual Insurance Markets, 2008–2011," Nov. 6, 2012; author's analysis.

- the first column shows the full sample results represented in Exhibit 1;
- the second column shows results when we restrict only to states and years where more than 60 percent of the enrollment in the individual market is represented in the NORC data;
- the third column shows results when we restrict only to states and years where more than 80 percent of the enrollment in the individual market is represented in the NORC data; and
- the fourth column shows results when we included only states in all years where more than 60 percent of the market is represented in each year of the sample for that state.

The consistency of the results across these samples is striking. Premium increase in each year and in each case are in the 10 percent and 12 percent range. The large premium increases appear consistent, despite any limitations in the data.

### State Variability

There is sizeable variability across states in the premium rate increases in the individual insurance market. Exhibit 3 shows the mean premium increases by state and year. Values are shown only for states where the data include at least 50 percent of the market.

As the exhibit illustrates, there is enormous variation in rate increases across states. In 2008, state average rate increases ranged from 2.8 percent in Iowa to 14.7 percent in Wisconsin; in 2009, from 4.1 percent in New Jersey to 20.1 percent in Connecticut; in 2010, from 3.0

percent in Idaho to 21.8 percent in Nebraska. There is no clear geographic pattern to these rate increases.

### Carrier Variability

There is additional variability by carrier within state. To illustrate this phenomenon, Exhibits 4 and 5 show the distribution of premium increases by year. In Exhibit 5, each row shows results from different percentiles of the distribution of premium change. For example, the 10th percentile row of the premium change distribution shows that 10 percent of premium changes in that year are below this value and 90 percent are higher. Likewise, the 90th percentile row is the point at which 90 percent of premium changes are below this value and 10 percent are above it. The 50th percentile row is the median value, the midpoint in the distribution of premium changes.

For example, for 2008, the median premium increase is 10.8 percent. But the 10th percentile value is zero, meaning that 10 percent of enrollment is in plans with no rate increase. At the other extreme, the 90th percentile value is at 17.8 percent, meaning that 10 percent of premium increases are 17.8 percent and above. One percent of premium filings in that year reduce rates by 9.5 percent or more (1st percentile), while another 1 percent raise rates by 28.0 percent or more (99th percentile).

The variation is somewhat lower, but still quite large, in 2009 and 2010. In 2009, for example, 5 percent of the sample has premium increases of 1.5 percent or lower, and 5 percent of the sample has premium increases of 20.5 percent or higher. In 2010, 5 percent of the sample has premium increases of 1 percent or lower, while 5 percent of the sample has premium increases of 21.8 percent or higher.

These results also highlight the importance of weighting the data to reflect the market shares of different insurers when interpreting the distribution of premium changes. That is, plans that had very small numbers of people enrolled were given less weight in the overall estimates than plans with large numbers of enrollees. Exhibit 5 also shows the results without weighting the data using the enrollment weights from NORC. In 2009 and 2010, the mean change in premiums is fairly similar to when the data are weighted; in 2008, the unweighted mean is much higher. More important, the variation across filings is much larger when not weighted. This is important to note as many reports of rate changes

will simply refer to individual insurer rate filings without considering their importance to the overall market.

Moreover, it is important to highlight that these are changes in base rates of premium growth. Before the Affordable Care Act, rates were also highly variable based on factors such as health. This is no longer permitted in today's market. While we cannot show the rate increases facing individual enrollees, they were certainly much more variable than those illustrated in Exhibit 5. The ACA will play a crucial role in limiting this enormous variation because of changes in individual enrollee's health status and other factors.

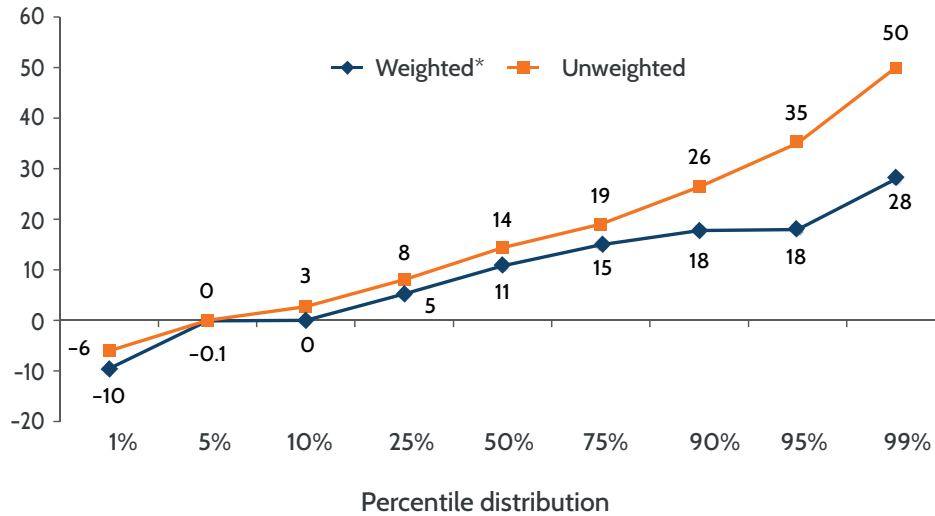
**Exhibit 3. State Average Rates of Premium Increase in Individual Market**

State	2008	2009	2010
Mean U.S.	9.9%	10.8%	11.7%
Alabama		17.5%	10.8%
California			15.7%
Colorado			16.4%
Connecticut		20.1%	
Florida	8.2%	8.9%	13.6%
Idaho		6.9%	3.0%
Illinois	14.4%	10.4%	9.6%
Indiana	13.5%	15.1%	8.2%
Iowa	2.8%	7.3%	18.4%
Kentucky	8.1%	7.1%	5.5%
Maine		11.0%	11.1%
Minnesota		10.7%	7.4%
Nebraska			21.8%
New Jersey		4.1%	10.8%
North Carolina			11.6%
Oklahoma		8.2%	13.0%
Oregon	12.2%	15.2%	14.9%
Pennsylvania			9.0%
South Dakota		14.1%	16.2%
Virginia		13.8%	8.9%
Washington			12.8%
Wisconsin	14.7%	11.1%	14.0%

Note: Includes individuals who are able to convert existing insurance policies into the individual market, under HIPAA.  
Sources: NORC, "Trends in Premiums in the Small Group and Individual Insurance Markets, 2008-2011," Nov. 6, 2012; author's analysis.

### Exhibit 4. Distribution of Premium Changes in Individual Market, 2008

Average premium changes



Note: Includes individuals who are able to convert existing insurance policies into the individual market, under HIPAA.  
 \* Weighted by the estimated number of people enrolled in the plan. Plans that had very small numbers of people enrolled are given less weight in the overall estimates than are plans with large numbers of enrollees.  
 Sources: NORC, "Trends in Premiums in the Small Group and Individual Insurance Markets, 2008–2011," Nov. 6, 2012; author's analysis.

### Exhibit 5. Distribution of Premium Changes in Individual Market

Weighted*			
Percentile distribution	2008	2009	2010
1%	-9.5%	-3.2%	-5.0%
5%	-0.1%	1.5%	1.0%
10%	0.0%	4.0%	3.0%
25%	5.3%	7.6%	8.9%
50% (median)	10.8%	9.5%	11.2%
75%	15.0%	14.4%	15.0%
90%	17.8%	19.4%	18.8%
95%	18.0%	20.5%	21.8%
99%	28.0%	26.5%	25.0%
Unweighted			
Percentile distribution	2008	2009	2010
1%	-6.0%	-3.2%	-9.0%
5%	0.0%	0.0%	0.0%
10%	2.7%	3.2%	1.4%
25%	8.1%	8.0%	6.6%
50% (median)	14.4%	12.0%	12.0%
75%	19.0%	20.0%	16.0%
90%	26.4%	25.0%	22.0%
95%	35.0%	30.0%	25.0%
99%	50.0%	40.0%	38.2%

Note: Includes individuals who are able to convert existing insurance policies into the individual market, under HIPAA. Each row shows results from different percentiles of the distribution of premium change. For example, the 10th percentile row of the premium change distribution shows that 10 percent of premium changes in that year are below this value and 90 percent are higher.

\* Weighted by the estimated number of people enrolled in the plan. Plans that had very small numbers of people enrolled are given less weight in the overall estimates than are plans with large numbers of enrollees.  
 Sources: NORC, "Trends in Premiums in the Small Group and Individual Insurance Markets, 2008–2011," Nov. 6, 2012; author's analysis.

## CONCLUSION

These data help set the stage for interpreting the rate changes from 2014 to 2015 that will soon become available from the state marketplaces. Before the implementation of the ACA, the insurance market experienced double-digit rate increases, as well as tremendous volatility across states and across plans within states. Premium growth nationally and at the state level from 2014 to 2015 should be compared to this benchmark. Conclusions should not be drawn from a small set of reported filings but rather from a comprehensive picture of the national trends in premium growth. While the Affordable Care Act should help address the rapid and volatile growth in premiums in the individual insurance market, it does not eliminate the nature of the market, which is inherently volatile and where insurers face more uncertainty than in their large-group offerings.

## NOTES

- <sup>1</sup> NORC, “Trends in Premiums in the Small Group and Individual Insurance Markets, 2008–2011,” Nov. 6, 2012, final report to the U.S. Department of Health and Human Services, <http://aspe.hhs.gov/health/reports/2014/Premiums/20121119%20PremTrendsRptFnl.pdf>; and NORC, “Effects of Implementing State Insurance Market Reform, 2011–2012,” June 7, 2013, final report to the U.S. Department of Health and Human Services, <http://aspe.hhs.gov/health/reports/2014/Premiums/20130607InsMktReformReportFnl.pdf>.
- <sup>2</sup> The Congressional Budget Office (CBO) projected in 2009 a rise in premiums of 10 percent to 13 percent, driven entirely by increases in the generosity of purchased insurance. Controlling for plan generosity, CBO projected a decline in premiums of 14 percent to 20 percent. A series of state studies, some of which I authored, projected increases in premiums relative to baseline because of the ACA. These studies generally predicted premium increases in the range of 20 percent to 30 percent in the individual market, with about half of the rise coming from more generous insurance and about half coming from a worsening risk pool. Of course, these analyses were all carried out before the inclusion of offsetting tax credits. When tax credits are included, people’s average premiums fell.
- <sup>3</sup> T. Spiro and J. Gruber, *The Affordable Care Act’s Lower-Than-Expected Premiums Will Save \$190 Billion* (Washington, D.C.: Center for American Progress, 2013).
- <sup>4</sup> Studies, such as one conducted by America’s Health Insurance Plans in 2009, provide rates for a selected sample of policies, while data from consumer surveys such as the MEPS provide very noisy and incomplete data on premiums paid. Moreover, these surveys provide data on average premiums paid for policies in force, which incorporate the changes in benefits in those policies. The past decade has seen enormous reductions in insurance generosity in aggregate as firms and individuals have reacted to higher premiums by raising employee cost-sharing and making other plan limitations. For this reason, evidence from those sources will lead to a substantial underestimate of the underlying trend premium for a fixed set of individual insurance policies.
- <sup>5</sup> The Henry J. Kaiser Family Foundation, *Focus on Health Reform: Quantifying the Effects of Health Insurance Rate Review* (Menlo Park, Calif.: Kaiser Family Foundation, Oct. 2012); R. Chu and R. Kronick, *Health Insurance Premiums in the Individual Market Since the Passage of the Affordable Care Act* (Washington, D.C.: HHS, Office of the Assistant Secretary for Planning and Evaluation, Feb. 2013). Both studies rely on rate collections from a sample of states
- <sup>6</sup> NORC, “Trends in Premiums,” 2012; NORC, “Effects of Implementing,” 2013. Data were collected for 21 states in 2008, 29 states in 2009, and 28 states in 2010, with 30 individual states represented across the three years.



## APPENDIX 1. HOW THE ACA AFFECTS THE INDIVIDUAL INSURANCE MARKET

The ACA includes a broad set of provisions that might affect the pricing of insurance in the individual market:

- Regulations requiring “guaranteed issue” (i.e., insurance must be sold to all, regardless of health), “guaranteed renewability” (i.e., insurance plans must be renewable for all, regardless of health), and banning preexisting conditions exclusions;
- Regulations banning premium rating on factors other than family size, age (limited to a 3:1 rate band), location, and smoking status (limited to a 1.5:1 rate band);
- Regulations that limit variation in benefits, in particular the requirement that plans be sold at four different metallic tiers (bronze, silver, gold, and platinum) at specified levels of actuarial value; or the average share of medical costs covered;
- A set of minimum essential benefits that must be offered by insurance plans;
- The introduction of state-based insurance marketplaces;
- Tax credits for low-income individuals purchasing insurance through the individual marketplaces;
- A requirement that individuals purchase insurance or be subject to a tax penalty, unless insurance is sufficiently expensive as to trigger an affordability exemption, among other exemptions; and
- The introduction of a sophisticated set of three risk-sharing mechanisms to redistribute risk across insurers in an effort to shield any given insurer from a particularly adverse population selection.

These varied provisions have both positive and negative expected effects on premiums in the individual insurance market. Community rating regulations and banning of preexisting conditions provisions are likely to raise premiums as less-healthy individuals enter the market and are priced as part of the same pool, but the individual mandate and tax credits should offset that to some extent by bringing healthier individuals into the market. Regulations that limit benefit variation and impose benefit minimums make it harder to find the most inexpensive plans, particularly in the individual market where such plans were more prevalent. However, competition through the marketplaces will lower premiums by allowing more effective shopping.

## APPENDIX 2. DETAILS ON THE NORC DATA COLLECTION

NORC's data collection effort is by far the most comprehensive overview of rate changes in the individual insurance market in the pre-ACA period. That said, it does have a number of limitations. First, the data do not cover the entire nation, but only include states for which data were available to the public. In an additional three states, NORC acquired data through connections between study researchers and senior executives at the state insurance departments. Consequently, the study does not include all states in the pre-ACA period. Second, even within the study states, the data were not collected for every insurance carrier, but rather for the five largest carriers in the state and a sampling of smaller carriers. Weights were developed based on National Association of Insurance Commissioners data on carrier enrollment size. The weights were estimated to represent each rate filing's relative size for a carrier when enrollment data were missing in the rate filing. Lastly, many filings were missing information about enrollment, or the final decision on the allowed rate increase following state regulatory review.

The potential issue that arises from such limitations is that the data do not represent an accurate portrayal of national patterns of rate increase. To address the second limitation, in this brief the author uses sensitivity analyses that are restricted to only states where there is a large share of the individual market represented in the collected data. We show that the results are not sensitive to these tests. But it is not possible to address the fact that data were not available in some states. Nevertheless, [Exhibit 3](#) shows that there is no clear pattern across areas of the country in the states that are represented, suggesting that the results are broadly applicable.

## ABOUT THE AUTHOR

[Jonathan Gruber, Ph.D.](#), is a professor of economics at the Massachusetts Institute of Technology and the director of the Health Care Program at the National Bureau of Economic Research. Dr. Gruber's research focuses on the areas of public finance and health economics. He has authored more than 150 published research articles and serves as associate editor of the *Journal of Public Economics* and the *Journal of Health Economics*. Dr. Gruber received his Ph.D. in economics from Harvard University. He was elected to the Institute of Medicine in 2005.

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