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Research Spotlight: Darren Lubotsky

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Passing health care costs to employees

New data on the trade-off between wages and employer-provided health insurance

Over the last 50 years, health care spending grew at an average annual rate of nearly 5 percent in real terms, far surpassing the growth in income. High and rising health insurance costs are an important driver of federal and state budgets, private sector compensation costs, and also a top concern of families. Reigning in health costs was a prime motivation behind the Affordable Care Act and is also an important factor behind many state policy proposals, including those to reform Medicaid, Workers Compensation, and collective bargaining rules for state employees.

At the same time as health insurance premiums have rapidly increased, average monetary pay for employees has remained flat. Economists have long recognized that these two trends may be related. Firms typically require that employees pay some fraction of the cost of their health insurance directly through payroll deduction. But employees may effectively pay for more of their insurance than this because year-to-year salary adjustments may depend on the growth in health insurance costs. As health insurance costs go up, firms may offer, and employees may be willing to accept, slower wage growth if it means employees can keep their health insurance benefits at a constant level. A prominent view among economists, in fact, is that all employer-provided health insurance costs are passed on to employees in one form or the other.

Understanding the relationship between health insurance costs and take-home salaries is important for interpreting the long-term trajectory of salaries. It is also important for understanding the true consequences of policies that seek to reduce the cost of health insurance. For example, if all health insurance costs are ultimately paid by employees through some combination of payroll deductions and salary adjustments, then policies to reduce the cost of health insurance ultimately have no effect on employment costs and only affect the mix of monetary pay and health insurance in total compensation.

IGPA Expert Darren Lubotsky, an economist at the University of Illinois at Chicago, and co-author Craig A. Olson, a professor in the School of Labor and Employment Relations at the University of Illinois at Urbana Champaign, used unique data to measure the trade-off between salary and health insurance costs among public school teachers in Illinois over two decades. Studying the trade-off in the context of public school teachers is especially interesting because of the ongoing debate here over public sector employment costs. Are increasing health care costs really being passed on to employees? If so, could taxpayers save money by reducing the cost of health insurance for public employees?

Study Approach

The researchers used data from the Illinois State Board of Education's census of school districts. The census collects data annually on a range of topics, including salaries paid to teachers with different levels of education and experience, the costs of individual and family health insurance policies offered by each district, and how much teachers pay directly (though payroll deductions) for their health insurance. Lubotsky and Olson examined data from the 1991-92 school year to the 2008-09 school year on over 800 districts in Illinois. This particular data source is especially useful for this study because it is among the only available data that has information on both the total cost of insurance and the amount that employees pay directly through payroll deductions. Another advantage of the data and study context is that public school teacher pay in Illinois is generally based only on a teachers' education and years of teaching experience. So Lubotsky and Olson can study salaries across districts over time for a particular configuration of teacher credentials (such as one with a masters degree and 10 years of teaching experience). By studying the pay that any teacher with a particular set of credentials would receive, they are able to abstract from other, unobservable factors that might lead someone to have both a high wage and a generous health insurance plan.

Results

As is the case nationally, Lubotsky and Olson found that Illinois public school teachers experienced little growth in inflation-adjusted salaries for Illinois public school teachers. The average salary for a new teacher who has a college degree was $29,429 in 1991 and was $30,906 in 2008 (these figures are expressed in 2009 dollars). This represents a 0.3 percent average growth rate per year.

The cost of health insurance and teachers' direct contributions toward it increased significantly during this time. Inflation-adjusted premiums for individual insurance policies rose by 89 percent from $2,969 in 1991 to $5,622 in 2008, or 3.8 percent per year. Premiums for family plans rose at a 4.6 percent annual rate, from $5,101 to $10,972. These growth rates for insurance premiums were similar to national averages.

A growing share of districts used payroll deductions to cover some of the costs of health insurance. The fraction of districts that had any payroll deduction for individual insurance rose from 39.5 percent in 1991 to 57.6 percent in 2008. Nearly all districts have required a contribution for family insurance.

Payroll deductions for health insurance costs are the direct channel through which take-home pay adjusts to changes in health insurance costs. Lubotsky's and Olson's analysis indicates that for every $100 increase in the premium for individual insurance, teachers pay an additional $17 in payroll deductions. For every $100 increase in the premium for family insurance, teachers pay an additional $46 in payroll deductions. These effects are larger in districts with more experienced teachers, presumably because older teachers place a higher value on insurance and are willing to pay more for it.

Although it is widely thought that salaries also respond to changes in health insurance costs, Lubotsky and Olson found that this is not the case in their study context. Changes in health insurance costs in a school district are virtually unrelated to changes in salaries.

Because some portion of health insurance costs are paid by school districts, Lubotsky and Olson assess whether they respond to rising health insurance costs by hiring fewer teachers or hiring less experienced (and thus less costly) teachers. They find no evidence of either type of response.

Policy Implications

This study argues that changes in health insurance premiums do not translate into dollar-for-dollar increases in the cost of public education in Illinois. This is important to know as policymakers think about ways to reduce the cost of public services and the burden of taxation necessary to pay for them. Because of premium contributions, a large share of any cost savings from, for example, raising deductibles will go to teachers themselves.

The results of this study have implications for understanding other policy options. For example, the Affordable Care Act included a so-called Cadillac tax on high-cost health insurance plans that will go into effect in 2018. This tax effectively undoes some of the favorable treatment for employer-provided insurance, and the intention of the tax was to push firms to offer less expensive health insurance. To the extent there is trade-off between wages and health insurance premiums, the Cadillac tax could have the effect of increasing workers' wages.

Lubotsky and Olson's study was published in the *Journal of Health Economics* in August 2015. The study is available at Darren Lubotsky's university website (PDF). IGPA improves the public policy discussion through non-partisan, evidence-based research and public engagement in Illinois. **To learn more, visit igpa.uillinois.edu and follow @IllinoisIGPA**