Improving Payment Accuracy In Health Insurance Marketplaces

Why This Study Is Important

Health insurance marketplaces that enable consumers to choose between competing health plans – such as the ACA insurance exchanges in the United States and similar national systems in The Netherlands and Germany – rely on risk adjustment to improve the accuracy of the premiums plans receive for individual enrollees. If risk adjustment is inadequate, premiums for some enrollees may fall well short of the spending plans incur for them, leaving insurers with high losses and incentives to avoid these enrollees; conversely, other enrollees may be overcompensated, with opposite effects. This study focuses on the “residual” spending differences between actual spending and risk-adjusted premiums, examines the subsets of enrollees for whom insurers are either very dramatically under- or overpaid, and demonstrates how an innovative reinsurance program could significantly improve payment accuracy.

What These Findings Mean

Despite real differences in how the three study countries administer risk adjustments, study findings are strikingly similar across the countries. In all cases, even the sophisticated risk adjustment methods they currently use fail to accurately compensate health plans for the risks represented by specific enrollees. Large losses and large profits on certain enrollees, combined with persistence over time in which individuals are highly under- and overpaid, create incentives that work against an efficient insurance market that has robust participation by insurers and neither favors nor disadvantages individual enrollees. This study demonstrated the important payment improvements that can be achieved across the board by reinsuring against losses for the small portion of enrollees whose care is grossly undercompensated and suggests this reinsurance will not weaken plan incentives to effectively manage care for these very high cost patients.

What This Study Found

- In all three countries studied, risk adjustment leaves some enrollees highly underpaid and others highly overpaid. In the U.S. exchanges, for example, one in a thousand enrollees were underpaid by more than $190,000, and one in a thousand were overpaid by at least $95,000 in 2017.
- In all three countries, there is high year-to-year persistence in the individual enrollees who are either highly under- or overpaid. Such predictability can contribute to selection problems that inhibit market efficiency.
- In all three countries, a large portion of the variance in spending that is unexplained after risk adjustment is due to the most dramatically underpaid enrollees, pointing to the chance to improve payment accuracy by focusing on this group.
- Reinsurance that limits insurers’ current-year losses for the 1 percent of enrollees who were most underpaid in the prior year substantially improves overall risk-adjusted payment accuracy by redistributing payments from the most overpaid to the most underpaid enrollees.
- Because these reinsurance payments affect only a very small portion of total spending and enrollees, this improvement in payment accuracy is achieved without weakening insurers’ incentives to control health care costs for their enrollees.

More About This Study

This study used extensive national claims data from the three study countries to replicate the relevant risk adjustment methodology and compute residual spending amounts for individual enrollees. Health care spending and presence of diseases were examined for enrollees in the top and bottom 0.1 and 1.0 percent segments of the residual spending distribution. Year-to-year persistence of residual spending was tracked by examining the probability of remaining in the same high/low tranche from year to year and the correlation of residual spending across years. Enrollees with high residual spending in the previous year were placed in a high-risk pool that was eligible for reinsurance based on current year residual spending. The impact of such reinsurance was evaluated by considering the improvement in individual-level payment fit, the funds required for reinsurance and the share of enrollees affected.


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