Does Health Insurance Reduce Consumption Risk?

Letter of Interest for NBER RDRC March 2021, submitted by:
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Research Question and Background: Public health insurance has been shown to increase health care utilization, improve health, and increase financial security through reduced bankruptcy and greater credit scores.[1] Yet it remains an open question how well public health insurance insures *consumption* risk. We might expect that by reducing financial risk, public health insurance programs also guard against uncertain consumption. However, even uninsured Americans pay a small fraction of their health care costs, as their medical debts are often discharged in bankruptcy (Mahoney 2015). Consequently, much of the financial benefits of health insurance expansions accrue to health care providers rather than the uninsured (Finkelstein et al. 2019a, Finkelstein et al. 2019b, Garthwaite 2018). Thus it is possible that public health insurance, while guarding against bankruptcy, nonetheless provides only limited consumption smoothing benefits. Indeed, in a provocative paper, Lockwood (2021) argues that health insurance in fact exacerbates consumption risk. Our research question is therefore, how does Medicaid expansion affect household consumption risk?

Methodology: We will follow the previous literature and difference-in-differences (DID) models, comparing states that expanded Medicaid coverage following the passage of the Patient Protection and Affordable Care Act in 2014 to those that did not. Using aggregated data we can estimate the impact of Medicaid expansion on the standard deviation of residual consumption (residual net of household characteristics), as well as on mean consumption, to separate out the risk-reducing benefits from the transfer component of Medicaid. We will also estimate effects of Medicaid expansion on the entire distribution of consumption, using the change-in-changes model of Athey and Imbens (2006). We will also examine dimensions of racial inequality by assessing whether there are heterogeneous consumption risk responses to health insurance by the available race/ethnicity information.

Data: We will use the Nielsen Consumer Panel, a data set recording detailed expenditures on groceries. The data cover 2004-2018, contain 61,000 panelists annually since 2006, and are designed to be representative at the substate level. In addition to detailed, high frequency data on grocery purchases, the data provide rich information about the panelist's demographics, including home zip code, income, race, education, and the number of children under age 7, enabling meaningful heterogeneity analysis, and permitting us to analyze households especially likely to benefit from the Medicaid expansions. The Nielsen Consumer Panel dataset provides a useful measure of household consumption and is available to use through the AC Nielsen Center for Marketing Analytics and Insights at the Wisconsin School of Business; additionally, Daniel W. Sacks, a co-PI in this proposal, has used it in recent published papers, e.g., in Butters, Sacks, and Seo (2021). The other key data needed for this project will be the dates of Medicaid expansion at the state-level; these data are widely available publicly, e.g., through the Kaiser Family Foundation, and have been deeply studied in economics research.

Fit with SSA priorities: Central to our study is whether Medicaid expansion protects individuals from consumption risk; Medicaid itself is of interest to the SSA. We see our project as contributing to two focal areas in particular:

1. **Focal Area #1: Disparities by Race and Ethnicity:** Racial equity and support for underserved communities – uneven access to uncompensated care could be a structural barrier that may contribute to consumption risk for people who have been historically underserved or adversely affected by persistent poverty.
2. **Focal Area #4: Economic Security of SSA Beneficiaries:** Our work examines the effect of public health insurance on a particular aspect of economic security, consumption risk. This is relevant for SSA beneficiaries because SSDI beneficiaries are eligible for public health insurance through Medicare after a 24-month waiting period (and maybe on Medicaid during that time), and in most states, SSI beneficiaries are also eligible for Medicaid.

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[1] Finkelstein et al. (2018) provide a helpful review of these effects of health insurance. On mortality benefits, see Card et al. (2009), Goldin et al. (2020), and Miller et al. (2021a). On health behaviors, see Simon et al. (2016). On improved financial outcomes, see Gross and Notowidigdo (2011), Mazumder and Miller (2016), Hu at al. (2018), Gallagher et al. (2019), Brevoort et al. (2020) and Miller et al. (2021b).

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