Optimal Policy and Limited Attention

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Abstract

Recent evidence, as illustrated by Chetty et al. (2014), has established that individuals differ in terms of the degree to which they pay attention to retirement saving. In particular as argued, since some savers are passive, i.e., not attentive to government's retirement subsidies, policies that directly target saving quantities such as default enrollment can be beneficial. Inspired by this evidence, I study optimal government policy in a model in which individuals are rationally inattentive to government policies and their (future) preferences.

To do so, I consider an individual who solves an information design problem by acquiring information about their preferences and government policies before making their choices: as in Sims (2003), Matějka and McKay (2015) and Caplin and Dean (2015). To acquire information, individuals pay a utility cost which depends on an appropriate notion of the distance between their prior and posterior. This information acquisition creates a feedback effect whereby government policies depend on individuals' choices and information while individuals' information choice depends on their expectation of government's policies. I show that the nature of the individuals cost of information acquisition critically impacts the policy chosen by the government. In particular, when the cost of information acquisition is such that individuals cannot distinguish between small changes in government policy and their prior, then optimal policies depart from standard behavioral models of limited attention such as Farhi and Gabaix (2015).

Furthermore, I study an extension of the model that allows for heterogeneity in attention cost across individual. Optimal policies then prescribe how to target passive versus active decision makers, i.e., those with high and low attention costs. I provide formulas that characterize the optimal mix of tax/subsidies as well as defaults and quantity targets. Finally, I apply this framework to optimal design of public pensions and retirement incentives.

References

CAPLIN, A. AND M. DEAN (2015): "Revealed preference, rational inattention, and costly information acquisition," *American Economic Review*, 105, 2183–2203.

CHETTY, R., J. N. FRIEDMAN, S. LETH-PETERSEN, T. H. NIELSEN, AND T. OLSEN (2014): "Active vs. passive decisions and crowd-out in retirement savings accounts: Evidence from Denmark," *The Quarterly Journal of Economics*, 129, 1141–1219.

FARHI, E. AND X. GABAIX (2015): "Optimal taxation with behavioral agents," *NBER Working Paper*.

MATĚJKA, F. AND A. MCKAY (2015): "Rational inattention to discrete choices: A new foundation for the multinomial logit model," *American Economic Review*, 105, 272–98.

SIMS, C. A. (2003): "Implications of rational inattention," *Journal of monetary Economics*, 50, 665–690.