Dynamic Income Responses to Tax Reform: New Approach

Md Sabbirul Haque

The current literature on the Elasticity of Taxable Income (ETI) consists mostly of static models, and despite the growing importance of ETI for both research and policy, the literature has not fully considered the intertemporal impacts of taxation. I expand the literature by estimating short-run and long-run impacts of tax rate changes using a dynamic model relying on the most recent estimation method. One of the challenges in estimating ETI is that the observed tax rate is endogenous at the taxpayer level. Conventional studies have addressed this endogeneity by using synthetic tax rates defined for some base-year income as instruments. However, empirically-verified serial correlation raises legitimate concerns about the validity of these results. I resolve the endogeneity issue by relying on the most recent literature and using appropriate lagged values of income when constructing the predicted net-of-tax rate instruments. I also use a constant-law definition of taxable income such that the tax base is held constant across tax reform regimes. My estimation is based on a testable assumption regarding the existence of endogeneity. The preliminary results suggest that the long-run ETI is larger than the short-run ETI.