Social networks and power in legislative bargaining: A socially embedded legislative bargaining game

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Abstract

This paper derives a political power index within the framework of a socially embedded legislative bargaining game. Legislative bargaining is modelled applying a modified legislative bargaining model of a Baron-Ferejohn type, where legislators’ policy preferences are endogenously determined in a political communication process. Political communication is organized in policy networks, where network structures determine social influence of individual legislators on other legislators’ preferences. Social influence results from legislators’ fundamental uncertainty regarding the impact of various policies on the state of the world, i.e. the true political technology. Based on the overall equilibrium of the legislative bargaining model a generalized political power index can be computed for each individual legislator. Overall, the political power index includes three distinct components of power: constitutional rules as formal and policy networks as informal political institutions as well as legislators’ fundamental preferences regarding the state of the world. Formally, the derived power index can be interpreted as a generalization of both the classical cooperative voting power indices focusing only on constitutional rules and the noncooperative legislative bargaining model of Baron and Ferejohn focusing on constitutional rules and policy preferences, but neglecting social interaction structures among legislators. Pars pro toto the generalized political power index is applied to the Common Agricultural Policy of the European Union.

Keywords: Measurement of political power, policy networks, legislative bargaining, political belief formation