

The Financing of Infrastructure Projects in the UK

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Project Aims:

A large body of literature highlights the significance of economic and social infrastructure in determining the economic growth and development of a country (see, for example, Gramlich, 1994; Röller and Waverman, 2001; Czernich et al, 2004). According to the recent Global Competitiveness Report by the World Economic Forum, the UK is ranked 27th on the “Quality of Overall Infrastructure”. The deteriorating infrastructure in the UK may explain the lack of significant productivity improvement in the British economy (see Holtz-Eakin and Schwartz, 1995).

An important challenge facing the UK economy, especially after the planned exit from the European Union in 2019, is to upgrade its weak social and economic infrastructure (see Trebilcock and Rosenstock, 2015). Consequently, the recent National Infrastructure Delivery Plan 2016-2021 by the Infrastructure Projects Authority (IPA) proposes over £100 billions of investment in infrastructure projects by the end of 2021. A key hurdle, however, is to develop appropriate financing structure for infrastructure projects (Sclar, 2015; Delmon, 2017). Within this context, the aims of this project are to (1) evaluate risks associated with different types of social and economic infrastructure projects in the UK, and (2) determine how these risks determine the financing structures for the projects.

Theoretical Perspectives/Field:

The project will build on the plethora of finance and management literature on the investors' perception and assessment of risks associated with different types of projects (e.g. Fama, 1977). The project will lay emphasis on the significance of asymmetric information and agency problems between investors, firms and the public sector in determining the financing structure for infrastructure projects (see, e.g. Hart, 2001; Bennett and Iossa, 2003; Iossa and Martimort, 2015).

Proposed Methodology:

The project will develop simple game theoretic model to generate predictions regarding the investors' perception and assessment of risks, and regarding the significance of information and agency problem for financing of infrastructure project. These predictions will be tested using historical data on infrastructure projects in the UK. Econometrics techniques such as regression analysis (with and/or without matching methods) will be used to analyze data. It is also expected that the parts of research that will deal with investors assessment/perception of risk will utilize survey or experimental data.

Relevance and Impact:

The project will be relevant to both academics and policy makers. The finding will also indirectly benefit the users of the social and economic infrastructure in the UK.

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