Economic Modelling 37 (2014) 202–215

Contents lists available at ScienceDirect

Economic Modelling

journal homepage: www.elsevier.com/locate/ecmod

Corruption and growth: The role of governance, public spending, and economic development ☆

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ARTICLE INFO

Article history:
Accepted 1 November 2013

JEL classification:
H3
O11
O41

Keywords:
Corruption
Development
Governance
Economic growth

ABSTRACT

This paper analyses how the quality of governance, the size of public spending, and economic development affect the relationship between bureaucratic corruption and economic growth. The analysis shows that the interaction between corruption and governance shapes the efficiency of public spending, which in turn, determines the growth effects of corruption. Specifically, corruption improves economic efficiency only when the actual government size is above the optimal level. It implies that a growth-maximising level of corruption is possible. This paper also finds that the incidence of corruption declines with economic development. This is because with economic development the wage rate rises and makes private rent seeking costs higher, thereby, discouraging corruption. The main policy implication is that targeting tax evaders instead of bureaucrats is more effective in terms of both reducing corruption and improving the growth potential of an economy.

1. Introduction

When the public and private sectors interact, bureaucrats may abuse their public position for private gains by accepting bribes or even actively extorting them. This behaviour is defined as an act of bureaucratic corruption. Examining the effects of bureaucratic corruption on economic growth and more importantly, how this relationship is influenced by the quality of governance, the size of public spending, and economic development is the primary focus of this paper.

Notably, the extant literature finds that corruption either may facilitate growth by helping firms circumvent the burden of the public sector or may retard it by increasing this burden and reducing the efficiency of public spending that contributes to productivity.[1] The literature highlights that whether the positive or negative effect dominates depends on the quality of governance, the size of the public sector, and the level of economic development; as these factors play a significant role in corruption outcomes. However, there are some inconsistencies and gaps in the literature in explaining the dependence of the corruption-growth nexus on these factors, which merit a further investigation.

First, the literature is not clear about how the quality and structure of underlying institutions influence the relationship between corruption and economic performance. One line of reasoning in this literature is based on the idea that corruption is driven by the institutional setting.[2] According to this rationale, the institutional structure determines the degree of organisation of corruption, which then impacts on the income uncertainty faced by the private agents and thus on the economic performance (Blackburn and Forgues-Puccio, 2009; Shleifer and Vishny, 1993). On the contrary, the other line of reasoning assumes that corruption alters the effects of institutions on the economy, such as the burden imposed or the productivity input provided by the public sector, thereby, impacts on economic growth (for example, see (Acemoglu and Verdier, 2000; Aidt, 2009; de Vaal and Ebben, 2011; Keefer and Knack, 1997; Knack and Keefer, 1995; Rajkumar and Swaroop, 2008).

☆ I thank Arye Hillman, Yew-Kwang Ng, Keith Blackburn, Been-Lon Chen, and participants of workshops at ANU and Monash University for the useful comments. I also would like to thank two anonymous referees for their insightful comments.

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[1] For example, see *inter alia* Leff (1964), Huntington (1968), Liu (1985, 1996), Fisman and Svensson (2007), Pellegrini and Gerlagh (2004), Ali and Isse (2003), Tanzi and Davoodi (2000), Tanzi and Davoodi (1998), Bardhan (1997), Mauro (1995), Aidt (2003), Abed and Gupta (2002).

[2] Aidt (2003), Andvig and Moene (1990), Bardhan (1997), Blackburn et al. (2006), Ryvkin and Serra (2012), Celentani and Ganuza (2002) argue that the governance structure indeed drives the incidence of corruption, either by impacting the uncertainty of corruption outcomes or by altering the incentives for corruption.

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http://dx.doi.org/10.1016/j.econmod.2013.11.007

Although offering useful insights, the analysis in the aforementioned literature provides us with a limited understanding of the issue, as it focuses on narrowly defined transmission mechanisms of the effects of corruption. The lack of a systematic explanation of the role of governance in the corruption-growth nexus is evident also from the existing inconclusive empirical findings. For example, Méon and Weill (2010) and, Aidt et al. (2008) find that corruption is less detrimental to efficiency and growth in countries where institutions are weak. Méon and Sekkat (2005) contradict the above-mentioned authors, and report that corruption is most harmful to growth where governance is weak. In the same vein, Méndez and Sepúlveda (2006), and Aidt (2009) demonstrate empirically that in countries with high political freedom and low level of corruption, the beneficial effects of corruption outweigh the detrimental effects, and vice versa.[3]

Second, there is another inconsistency in the literature with respect to the relationship between government size and corruption. In particular, if government size is related to the degree of government intervention and the inefficiencies induced by it, then, an increase in government size creates more room for rent-seeking and corruption (for example, see Alesina and Angeletos, 2005; Goel and Nelson, 1998; Rose-Ackerman, 1999). However, if the government size reflects its control of corruption and accountability, an increase in government size should curb corruption. La Porta et al. (1999) and Billger and Goel (2009) find evidence supporting the latter hypothesis for Scandinavian countries. Intuitively, the inconsistency in this case stems from ignoring the interaction of the quality of governance with both corruption and government size.

Third, there is strong evidence indicating that the incidence of corruption is related to the level of economic development. For example, studies by Mauro (1995), Knack and Keefer (1995), Keefer and Knack (1997), Fisman and Gatti (2002), Rauch and Evans (2000), Blackburn and Forgues-Puccio (2007) find that there is a significant negative relationship between the level of corruption and the level of economic development of countries. Blackburn et al. (2006, 2010) and Haque and Kneller (2009) explain this link between development and corruption by suggesting that the expected losses of corrupt bureaucrats increase with income levels. Intuitively, one can also relate the cost of corrupt rent seeking to the cost stemming from concealment of illicit income gained from corruption. In fact, analysing tax evasion Cowell (1990), Chen (2003), and Hillman (2009) explain that rent seeking costs arise because tax evaders have to hire experts and lawyers to conceal their illegally obtained income. The relevance of this rationale to corrupt activities has also been emphasised by Barreto (2000) and Blackburn et al. (2006), who link the cost of corrupt behaviour to the incidence of corruption.[4] Despite being highlighted as an important channel, the possible implications of the link between rent seeking costs and the wage rate driven by the level of economic development on corruption outcomes, have not been thoroughly examined in the literature.

To summarise, the existing literature lacks a more general approach for interpreting the role of governance, the size of government, and the level of development in the relationship between corruption and growth. This paper attempts to address this issue. A formal analysis of how these factors affect the relationship between corruption and growth in a more general framework is important for a number of reasons. First, by gaining insights into this issue one will be better capable in interpreting the above controversial empirical results. Second, this is important because by ascertaining how these factors alter the corruption-growth nexus will help one to assess the growth effects of corruption more accurately. Moreover, a good understanding of how corruption impacts economic performance is essential for formulating and implementing effective development policies.

This paper attempts to shed a new light on the issues raised above by considering the link between governance, the size of the public sector, and corruption from a broader perspective. Specifically, the analytical framework employed in this study integrates the aforementioned approaches, thereby making it more general.[5] First, following Andvig and Moene (1990), Ryvkin and Serra (2012), Haque and Kneller (2009), and Blackburn et al. (2006), the framework incorporates the idea that the ability of the government to contain corruption is driven by the quality of governance. The statistical evidence by Butkiewicz and Yanikkaya (2006) supports this tenet by demonstrating that the correlation between corruption and different measures of the quality of governance is consistently negative. In the model, this aspect of governance is captured by the parameters that affect compliance and bribery. Second, the quality of institutions also drives the efficiency of the public sector, and hence it determines the optimal size of public spending.[6] Another key element in the workings of the corruption-growth nexus is that corruption distorts both the burden of the public sector driven by the quality of institutions and the productive inputs generated by the government.[7] This implies that corruption affects economic performance also through the (in)efficiency of public spending, driving a disparity between actual and optimal government sizes. Thus, the relationship between corruption and growth depends directly on governance as this drives the level of corruption; and indirectly through the interactions between the efficiency of government spending and the distortions caused by corruption in the cost–benefit balance of the public sector.

Another distinctive feature of the analysis in this paper is that it emphasizes that the cost of rent seeking is an important factor driving the incidence of corruption. Explaining this link helps to establish a new channel through which the level of development affects the incidence of corruption. In this respect, by adopting a different view to the current literature, this paper postulates that the negative relationship between the incidence of corruption and the level of development is driven by rent-seeking costs which rise with the wage rate. This is because this cost depends on the effort to conceal the illegally obtained income; and hence, this effort should be costlier as the wage rate increases, which in turn increases with the level of economic development. Thus, by accounting for the rent seeking costs, this paper addresses another aspect of corruption that has not been thoroughly examined in the corruption literature.

It is worthwhile to note that the analysis conducted in this paper differs from the closely related papers in several aspects. In particular, Blackburn and Forgues-Puccio (2009) and Shleifer and Vishny (1993) focus on how the structure of governance drives corruption, but do not consider how corruption affects public productive inputs and tax evasion. Keefer and Knack (1997); Rajkumar and Swaroop (2008); Knack and Keefer (1995), and Aidt (2009) only empirically examine the effect of governance on the relationship between corruption and the efficiency of public spending. Unlike the paper of de Vaal and Ebben (2011),

[3] Nevertheless, Aidt (2009) argues that these results may not be robust because they depend on the choice of the dummy variables; and also intuitively it is hard to accept that in countries with strong institutions, at low levels, corruption may be beneficial.

[4] There are some papers that focus on the relationship between relative public–private wages and corruption, rather than the average wage rate of the economy. For example, Van Rijckeghem and Weder (2008) and Panizza (2001) find evidence of a statistically and economically significant relationship between relative civil-service pay and corruption in regressions based on cross-country averages. However, Sosa (2004), based on the empirical studies done on the wage-corruption trade-off, finds no conclusive support for the effectiveness of increasing wages as an anti-corruption measure.

[5] However, it should be admitted that, due to this generalisation in the model, some trivial but clear relations mentioned in the literature and theory may not be captured by the model.

[6] To account fully for the economic effect of the public sector it is essential to consider the benefits provided by the public sector along with the burden imposed by it (Barro, 1990; Cowell and Gordon, 1988). Barro (1990) has explained that the optimal size of the government is determined by the trade-off between the marginal cost and benefit of public goods.

[7] For example, Mauro (1998), Delavallade (2006), Kagundu (2006), Devarajan et al. (1996), Keefer and Knack (2002), Gupta et al. (2001), Rajkumar and Swaroop (2008), and de la Croix and Delavallade (2009) have shown that corruption distorts the effectiveness of public spending. Whereas, Blackburn et al. (2006), Dreher et al. (in press), Dreher and Gassebner (2007), Guriev (2004), Svensson (2003), and Kaufmann and Wei (1999) corruption imposes a significant burden on private agents.