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Can corruption really function as "protection money" and "grease money"? Evidence from Chinese firms

Gang Xu[a,*], Dongyang Zhang[b,*], Go Yano[a]

[a] Graduate School of Economics, Kyoto University, Yoshida-honmachi, Sakyo-ku, Kyoto, 606-8501, Japan
[b] School of Economics, Capital University of Economics and Business, Zhangjialukou-121, Fengtai District, Beijing, 10070, China

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ABSTRACT

This paper directly investigates the "grease money" and "protection money" effects of corruption based on Chinese firm survey data. First, we identify a significantly positive effect of bribes on firm profitability only for non-state-owned enterprises (non-SOEs). Further empirical analysis shows that this positive effect mainly exists in less contract-intensive industries and simple goods industries. Then we find that corruption functions as "protection money" for non-SOEs by showing that bribes can lower effective tax rates. We further show that bribes can help non-state firms circumvent red tape and increase their probability of obtaining government procurement contracts, thus validating the "grease money" hypothesis. Our results suggest that both effects of corruption exist for non-SOEs in China, thereby identifying a new profit-enhancing factor in the non-state sector in recent years.

1. Introduction

China has long been plagued by corruption, which has become one of the country's central social and political issues, having increased to an epidemic level since the advent of the "reform and opening" policy in 1978.[1] Despite having achieved spectacular progress in economic development, China, as the current second largest economy, has always found itself stuck in an awkward position regarding its corruption ranking, taking only 100th place among the 175 countries in the 2014 "Corruption Perception Index".[2] In fact, especially in business circles, the networks of personal ties with government officials are viewed as a very important resource for obtaining government-related benefits such as access to political power, preferential treatment in the allocation of scarce resources and protection of property rights. That many firms invest time and money in creating and maintaining these networks is a common phenomenon in contemporary China.

However, it seems that not all countries suffering from widespread corruption experience poor economic development. This phenomenon, termed the "East Asia paradox" by Wedeman (2002), points to the fact that some East Asian countries like China, Indonesia and South Korea have displayed significant economic growth despite widespread corruption. Allen et al. (2005) argue that even without sound legal and financial institutions, China's non-state sector still grows much faster than the state sector and serves as the engine of the rapid economic growth. They attribute the astounding development of the non-state sector to the system of an alternative mechanism based on relationships. Blackburn and Wang (2009) ascribe this paradox to a more organized corruption

* Corresponding authors.
E-mail addresses: xgdl2005@hotmail.com (G. Xu), zhangdongyang@cueb.edu.cn (D. Zhang), rswtj922@yahoo.co.jp (G. Yano).

[1] According to Blackburn and Wang (2009), corruption includes three categories in China − shouhui (the extortion and acceptance of bribes), tanwu (the misappropriation of public property) and tequan (seeking privileges and favors). As we focus mainly on corruption between firms and government officials through bribes here, corruption basically refers to the first category.

[2] Please see http://www.transparency.org/cpi2014/results for details.

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network in China, where the collective bureaucracy internalizes the negative externalities of increasing individual bribe amounts on the bribe-taking capacity of others with reduced uncertainty. Fan and Grossman (2001) argue that the central government of China actually uses corruption as a decentralized compensation scheme. Those local officials who have made larger contributions in the reform are likely to extract larger bribes and have more valuable public property to appropriate with smaller chances of being punished. In this sense it is rational to reconsider corruption as a growth-enhancing factor in order to shed new light on the business growth model in China.

This paper uses firm-level data from the 2005 Investment Climate Survey by the World Bank to explore the effect of corruption on firm development in China. Among the empirical literature that examines the effect of corruption by using firm-level survey data, some papers find that corruption is detrimental to firm performance (e.g., Fisman and Svensson, 2007; Cai et al., 2011; Nguyen and Van Dijk, 2012), while others identify a positive effect (e.g., Hellman et al., 2003; Vial and Hanoteau, 2010; Wang and You, 2012).[3] Especially in the context of excessive overregulation, rigid administration and lack of market-supporting mechanisms, corruption is argued to help overcome distortions caused by these and enhance efficiency in a second-best sense. In the literature, corruption promotes economic efficiency mainly through the channels of "grease money" and "protection money". Regarding "grease money", on one hand, bribery can function to help reduce red tape imposed on firms, such as circumventing cumbersome regulations, reducing long waiting times and speeding up the allocation of licenses and permits (Leff, 1964; Leys, 1965; Huntington, 1968; Lui, 1985). Lui (1985) established a queuing model where the opportunity costs of different agents are embodied in their size of bribery, with more efficient agents more able or willing to buy lower effective red tape, thus leading to Pareto efficiency. Dreher and Gassebner (2013), employing a dataset covering a maximum of 43 countries over 2003 to 2005, show that the existence of a larger number of procedures required to start businesses and larger minimum capital requirements prove to be detrimental to entrepreneurship, but corruption can reduce the negative impact and facilitate firm entry in those highly regulated economies. On the other hand, the "grease money" effect also refers to a mechanism where firms enjoy preferential treatment in the allocation of scarce resources through bribery, which eventually results in an efficient outcome as achieved by a competitive auction. In a bribery game characterized by competitive bidding for a crucial resource, such as government procurement contracts, the corrupt official awards the contract to the bidder willing to pay the highest bribe, leading to allocation efficiency (Bardhan, 1997).[4] The other channel, "protection money", can serve to lessen the risks of government predation, for example by protecting property rights and reducing tax burdens for firms. Hellman et al. (2003) show that captor firms experience more improvement in individualized protection for their own property rights in a high-capture economy. Cai et al. (2011) demonstrate that for firms with a higher lagged tax rate, the negative effect of corruption on productivity is smaller, thus indirectly verifying the "protection money" hypothesis.

We use entertainment and travel costs (ETC) to measure firm-level corruption, following Cai et al. (2011). We believe this proxy has some advantages. First of all, this expenditure item is publicly recorded and reported in the financial statements of Chinese firms, and therefore this data is very easy to access. Second, this data is more objective and accurate, without the biases involved in the subjective perception index. In fact, this item is unlikely to have measurement errors because each reimbursement requires a receipt. Last but not least, it can well reflect the nature and amount of corruption or, more specifically, bribes in each firm. In addition to the legitimate expenses of entertainment (e.g., meals, gifts, karaoke) and travel, managers of Chinese firms always use this item to cover considerable expenses spent in bribing government officials with fake or inflated receipts. Therefore, this expenditure item should be an appropriate indicator of corruption for firm-level studies.

This paper intends to directly investigate the "grease money" and "protection money" effects of corruption based on firm-level survey data. First, by using instrument variables to account for the possible endogeneity of ETC, we find that corruption has a significantly positive effect on firm profitability for the full sample and for non-state firms, while this effect is insignificant for SOEs. Further empirical analysis shows that this positive effect mainly exists in less contract-intensive industries and simple goods industries. Then, we proceed to directly test the "protection money" and "grease money" effects. By using the effective tax rates (ETR) to proxy state predation, our paper finds that ETC can significantly reduce ETR for non-state firms, whereas ETC significantly increases ETR for SOEs. Regarding the "grease money" effect, on the one hand, we use the time the CEO spends on government assignments and communications to proxy red tape, with the empirical result showing a significantly negative relationship between ETC and the wasted managerial time for non-SOEs. On the other hand, we also test whether corruption can help firms get favorable treatment in obtaining key resources. In this part we mainly focus on two resources: government procurement contracts and bank credit. Our empirical results demonstrate that the more ETC a firm spends, the higher the probability of having its products purchased by the government for non-state firms, albeit not for SOEs. However, corruption does not seem to have any effect in helping firms alleviate financial constraints or obtain bank loans, regardless of ownership type. To sum up, our conclusions suggest that corruption can enhance firm profitability for non-state firms by easing the tax burden, reducing red tape and obtaining government contracts, thus verifying most of the "protection money" and "grease money" hypotheses.

Our study extends the literature on corruption by demonstrating that the effects of corruption on firm performance and the related mechanisms are conditioned by the ownership structure. On the one hand, given the unique institutional characteristics in China, non-SOEs and SOEs face significantly different external environments. On the other hand, internal factors, such as firm objectives and CEO incentives, also differ greatly among them. These differences determine that the effects of corruption and the specific channels

[3] Most of the literature regarding this topic uses cross-country macro data to investigate the detrimental effect of corruption on economic growth, investment, FDI, innovation and entrepreneurial activities (e.g., Mauro, 1995; Wei, 1997; Mo, 2001; Keefer and Knack, 1997; Knack and Keefer, 1995; Anokhin and Schulze, 2009).

[4] Beck and Maher (1986) show that in an auction model with incomplete information about the cost levels of other bidders, the firm with the lowest cost can always win the contract by offering the highest bribe. Thus bribery can reproduce the efficiency consequences of a competitive bidding system even under imperfect information.