

Collusion, Political Connection, and Tax Evasion*

Pi-Han Tsai
Zhejiang University

Yongzheng Liu
Renmin University of China

Xin Liu
Renmin University of China

Current version: May 2019

Abstract

Upon studying listed firms in China, this paper provides evidence of government-firm collusion. We argue that political turnover of local leaders serves as exogenous shocks to existing collusion, so the detected reduction of firm tax evasion in response to political turnover could be interpreted as evidence of pre-existing collusion. By exploiting variation of costs and opportunities of collusion amongst firms, we further disentangle the effect of collusion from political uncertainty. Lastly, we show that firms' political connections, capturing by social networks and political ties, stabilize the existing collusion, which helps firms maintain their advantage while facing external political shocks.

Keywords: Collusion; Turnover; Tax Evasion; Political Shock; Political Connection

JEL Classifications: D73, H26, P48

* We would like to thank Jan K. Brueckner, Yongmin Chen, Bruno Dallago, Ziyang Fan, Ying Ge, and Ruqu Wang for helpful comments. Also, we thank Jiankun Lu and Liumei Yang for data collection, and Jicheng Huang for providing some data used in this paper. This paper is supported by the National Natural Science Foundation of China (No.71773128, No.71533006) and the Fok Ying Tung Education Foundation (No. 151085). Please address all correspondence to: Yongzheng Liu, School of Finance, Renmin University of China, Beijing, 100872 China (E-mail: yongzheng.liu@ruc.edu.cn; phone +86 10-82500501; fax +1 10-82509260).

1. Introduction

Collusion is essentially a form of cooperation in which two or more players sign a side-contract whereby all of them benefit from the collaboration.¹ In recent years, government-firm collusion in China has received significant attention in both academic and policy circles (Su and Tao, 2012; Jia and Nie, 2017; Nie, 2017).² In the context of government-firm collusion, specifically, local governments have a tendency to form strategic alliances with local enterprises in the form of various coping strategies to respond to policies, directives, and inspections from the higher authorities, leading to deviations from intended policy goals.³ Under such a system, local governments

¹ If collaborative parties seek to capture the extra profits arising from market regulations, collusion can also be seen as a means of rent seeking. Even though “collusion” and “rent-seeking” are usually intertwined and both are important social phenomena, they belong to different realms of practices (Nie, 2017). Collusion, as discussed previously, is a secret agreement between two or more parties to limit open competition whereby all parties benefit from the collaboration. On the other hand, rent-seeking refers to the situation in which economic agents attempt to either gain a coercive monopoly or increase one’s share of existing wealth without creating new wealth (Tullock, 1967; Aidt, 2016). There are many ways of rent seeking, such as lobbying, cartel formation, and corruption (Ngo, 2009), and collusion is also one of it. The cases of collusion among economic agents may involve the creation, reallocation, and pursuit of economic rents, but the rent-seeking example may not always involve collusion. In our study, we focus on the collaborative behaviors on tax evasion between local governments and enterprises in China, thus, particularly, throughout the paper we use the term “collusion”, rather than “rent-seeking”.

² The media usually uses the idea of collusion to explain state-business relationships in China, while researchers generally apply concepts such as “commercialized communism”, “crony communism”, and “clientelist local state” to describe the relationship between businesses and local governments (Zhang, 2018). Before the onset of the recent anti-corruption campaign in China, the general party secretary and the Chinese president, Xi Jinping, stated that “the government official should keep their distance from the businesses and treat the later according to rules, do not collude with them (*goujian dabei*) to lose the boundary between public and private”, which reflects the central authority’s concern of local collusion.

³ The institutional logic of collusion between local governments and firms are similar to that of collusion among local governments in China, resulting from incomparability and contradictions among the institutional and political environment in the Chinese bureaucracy. From the perspective of organization analysis, Zhou (2010) attributes to three organizational paradoxes: uniformity in policy making but flexibility in implementation, the incentive intensity and goal displacement, and the coexistence of bureaucratic impersonality and the personalization of administrative ties. Collusion involving local governments has become a highly institutionalized practice in China, and the very behaviors of local officials are on the basis of government organizations. It is also for the same reason that most literatures studying collusion in China mix the identity of “local officials” and “local governments” and use these two terms interchangeably (Ngo, 2009; Zhou, 2010). The detailed discussion can be seen in Zhou (2010).

manipulate rent allocation to maneuver the development of local economy whereas enterprises rely on rents granted by local authorities to increase domestic competitiveness. Most of the literature shows that local governments have the incentive to help enterprises evade taxes by offering them with further investment opportunities amongst cutthroat interregional competition (Cai and Liu, 2009; Nie, 2017);⁴ meanwhile, the deinstitutionalization of taxation as a rule-by-law system in China leads to vulnerable entrepreneurs who prefer to build collusive relationship with local governments (Zhang, 2018). However, there is very little clear, empirical evidence of collusion. The lack of empirical evidence is possibly because collusion, by its very nature, is illicit and furtive (Banerjee et al., 2012). This makes it quite difficult to accurately measure. Our paper aims to fill this academic void by providing evidence of government-firm collusion. Specifically, we explore the changes in firms' tax evasion activities during leadership transition. We argue that political turnover serves as an exogenous shock to existing government-firm collusion, so the detected reduction of firm tax evasion in response to political turnover could be interpreted as evidence of pre-existing collusion. Additionally, our paper examines how political connections affect the stability of collusion, thus resulting in various different effects on tax evasion.

Even though it is not surprising that government-firm collusion may lead to tax evasion, the degree of evasion that comes from collusion is difficult to identify. Collusion is an issue in which both information and action are concealed; direct evidence is not easily observed, so we can only make inferences from indirect evidence (Nie, 2017). China's unique political setting may provide a natural testing ground to study this issue. Unlike their democratic counterparts where political turnover is determined by periodic elections, China's political turnover is determined by the upper-level party authorities of the Chinese Communist Party (CCP). Even though the term of office of local officials is five years, in practice they face high uncertainty regarding

⁴ For example, Greentown China Holding Ltd. (Zhejiang) colluded with Zhang Jiameng, the Party Secretary of Zhoushan City in 2002. Zhang offered a preferential tax policy to Greentown, leading to tax evasion of Greentown worth of 5 million yuan, and in return Greentown planned to build a five-star hotel ranging an area of 10 hectares and with high-end luxury facilities (Nie, 2017).

their tenure.⁵ Therefore, political turnover of prefectural leaders can serve as an exogenous shock to existing collusion by upending the status quo and creating significant insecurity for firms. Firms thus have the incentives to reduce tax evasion while facing potential instability in collusion. The change in firms' behavior regarding tax evasion during leadership transition provides evidence of the pre-existence of government-firm collusion. Moreover, we examine the heterogeneous effect of firms, such as firms belonging to distinct tax authorities, ownership of firms, and firm sizes, as a source of variation to identify the driving mechanism behind decreasing tax evasion. The differentiation among firms reflects the variation in the costs or the opportunities of collusion. Provided that the decreasing tax evasion is only observed among firms with lower costs or higher opportunities of collusion, we can make inferences that the instability of collusion is the driving mechanism, ruling out the possibility that it is driven by political uncertainty brought by political turnover.

The second part of the paper focuses on identifying the effect of political connections on the stability of collusion. We apply two commonly used, objective measurements to estimate the degree of political connections of firms. The two measurements applied are the social networks of newly appointed prefectural leaders, which are used to capture the political connection between government leaders and firms, and political ties between firms and governments, which capture the political connection between firm leaders and governments. Social networks are widely considered to play an important role in facilitating collusion, thus lowering the transaction cost of collusion (Jia and Nie, 2017). To capture the different degrees of social connections of prefectural leaders, we focus on the career trajectories of these leaders. Compared to the "nonlocal" prefectural leader, who made his/her significant career advancement in other cities, the "local" prefectural leader, who rose from a low to high position in the city he/she governs, has a better social network of connections. Thus, he/she can possess a general affinity towards, and familiarity with, the city. Hence,

⁵ At the provincial level, from 1980 to 2006 more than half of provincial leaders leave their office before their fifth year (Tsai, 2016). The purpose of frequent reshuffling of political leaders is to avoid the formation of factionalism and the rise of localism (Li, 2004).

the firms may have connections with newly appointed local prefectural leaders even before they are in office, which lessens the external shock effect of political turnover on existing collusion. In other words, if a newly appointed political prefectural leader comes from outside cities, which demonstrates lesser political connections between the local government and firms, the existing government-firm collusion becomes unstable while facing an exogenous political shock. A reduction in tax evasion is thus more likely to be observed. Coming to the other measurement, which is political ties, we follow the previous literature studying state-business political ties in China. In a particular firm, we then use the chief executive officer (CEO) and the chairman of the corporate board's political background, (defined as serving as a former or current government bureaucrat) as a proxy for political connections between firm leaders and governments (Fan et al., 2007; Chen et al., 2011; Dang and He, 2016; Zhang et al., 2016). We conjecture that hiring a bureaucrat as the successor CEO or the chairman of the corporate board enhances the firm's political connections to the government, which helps them keep their benefits while facing potential instability in collusion.

To test our hypotheses, our paper uses political turnover data of prefectural leaders and Chinese listed firm data from 2007 to 2014. By applying political turnover as an exogenous shock, we first examine the evidence of pre-existing government-firm collusion. The empirical results show that political turnover leads firms to reduce tax evasion, but such effects are only significant for firms which are more likely to collude with local governments, such as firms who pay taxes to local governments rather than the central government, domestic firms and state-owned enterprises (SOEs), and firms with greater assets. These findings lend support to our argument that the identification comes from the instability of collusion, instead of political uncertainties. While considering different effects of political connections on political turnover, we divide the sample on the basis of firms' political connections –calculated from the two previously discussed measurements – and find that the (inverse) effect of political turnover on tax evasion diminishes with a greater degree of political connections. This means that if the newly appointed political leader is local or if the firm leader has stronger political ties, the firm is less likely to be affected by external political shocks.

This paper is organized as follows. In the following section, we review the relevant literature. In Section 3, we present our data sources and discuss our empirical methodology. In Section 4, we report and discuss our empirical results. Lastly, Section 5 concludes the paper.

2. Literature Review

Our study relates to several strands of economic literature. First, our paper relates to the literature of government-firm collusion in the sense that both local governments and firms benefit from the tax evasion activities. In order to attract investment, which is a typical assessment of political performance of local officials, local governments provide government-sponsored monopoly rents to enterprises. Nie (2017) discusses a variety of social problems, such as environmental pollution, illegal use of land, smuggling, food safety, and jerry-built projects, in the framework of government-firm collusion in China. Su and Tao (2012) attribute the rising house prices in China to the collusion between local governments and real estate enterprises. The financial ties between local governments, real estate developers, and banks, have forged a strong growth coalition, sharing a common goal in growing the real estate sector and expanding cities, thus leading to an increase in housing prices. Jia and Nie (2017) study how government-firm collusion affects workplace safety by taking the case of China's coal mine deaths. They find that decentralization in China facilitates collusion and that the effect is strengthened with the decrease in transaction costs of collusion. In Cai and Treisman's theoretical model (2004), they argue that if the central government's enforcement capacity is considered endogenous, interjurisdictional competition may undermine the central government's monitoring capacity, and further encourage collusion between local governments and firms in order to evade taxes or regulations.⁶ However, because collusion is usually covert, there is little clear evidence (Jia and Nie,

⁶ Cai and Treisman (2004) provide examples of countries ranging from Argentina and Russia to China, demonstrating that increased interregional competition for capital in recent decades has coincided with a decrease in central government revenues, an increase in tax evasion and an increase in political conflict on resource allocation.

2017). Our paper contributes to the existing literature related to government-firm collusion in China by providing direct evidence of the existence of government-firm collusion, specifically we examine the changes in corporate behavior on tax evasion in response to leadership transition.

Secondly, we supplement previous studies on the determinants of firm tax evasion (Slemrod, 2004; Desai and Dharmapala, 2006). Specifically, our paper is more in line with analyzing the link between corruption and tax evasion.⁷ However, most of the existing theoretical works focus on this issue in the context of collusion between taxpayers and tax inspectors, incorporating the principal-agent problem of the government to enforce tax obligations through a potentially corruptible tax inspector (Besley and McLaren, 1993; McLaren, 1996; Sanyal et al., 2000). The empirical work within the same framework provides evidence of positive correlation between corruption and tax evasion (Uslaner, 2010; Alm et al., 2016). Corruption facilitates tax evasion by making it easier for taxpayers to hide their income, leading to a decrease in government tax revenue. However, in China, there is no independent tax inspector, and local governments have the ultimate power within their jurisdiction. Thus, we explore the changes in corporate behavior on tax evasion in the presence of collusion between local governments and taxpayers (i.e., firms) during leadership transition. Results similar to those found in democratic countries can also be found in a transitional economy like China.

Third, our findings extend the current literature on the impact of leadership transition. There is a lot of literature studying political uncertainties brought by political turnovers. Julio and York (2012) examine the effects of political uncertainty on

⁷ To avoid confusion, it is important to note that there is another branch of literature that focuses on the peculiarities of collusive tax evasion, in contrast to independent tax evasion. In this literature, tax evasion is deemed collusive if two or more individuals (e.g., buyers and sellers, employers and employees) explicitly or implicitly coordinate to evade taxes (Yaniv, 1992; Chang and Lai, 2004; Abraham et al., 2017); otherwise, it is deemed independent. A detailed comparison between these two concepts can be found in Abraham et al. (2017). However, our paper is different from theirs in the sense that collusion in our paper refers to the coordination between local governments and firms, instead of taxpayers, as discussed in their works.

corporate investment behavior, in the context of periodic national elections. Political turnover also leads to a change in corporate investment in a transitional economy. An et al. (2016) apply data from China to exemplify this theory. Li et al. (2017) study 103 national elections in 30 countries and find that changes in corporate tax evasion coincide with national electoral cycles, peaking in election years that have greater electoral uncertainty. Our paper provides another possible explanation for the effect of political turnover. We argue that political turnover leads to instability of existing collusion between governments and firms. In order to identify the mechanism of collusion and rule out the possibility that the results are driven by political uncertainties, we consider the heterogeneous effects of firms as a source of variation in the degree of collusion.

Finally, our paper contributes to the strand of literature on political connections. We first examine the effect of the social networks of prefectural leaders on corporate behavior. Identification comes from variations in political leaders' career trajectories; an example would be to explore whether a particular leader has had their most important career advancement in the jurisdiction they govern. Because social networks grow over time, a local political leader tends to develop political ties to local elites and favor local firms. Applying the distinction between local and nonlocal political leaders to capture the degree of social networks is a widely used approach in current literature. Persson and Zhuravskaya (2016) find that, compared to a nonlocal provincial leader, a local provincial leader spends more on education and healthcare and less on capital construction projects, resulting in a higher provision level of public goods. Tsai (2007) shows that the provision of public goods in China is higher at the village level if village leaders have stronger connections to "encompassing solidarity groups" i.e., those groups which offer opportunities for social interaction between local officials and the public. Similarly, Xu and Yao (2015) find that the presence of village leaders belonging to large family clans substantially increases local public goods spending. The closest work to ours is that of Jia and Nie (2017), who study collusion between coal mine firms and safety regulators in China, and document that having a local safety regulator decreases the transaction cost of collusion and increases the number of coal mine deaths.

Additionally, firms can use their political capital to shield themselves from unwanted political intervention and various forms of government rent expropriation (Mellahi et al., 2016). It is widely believed that political ties increase corporate value, due to preferential policy by the governments, less stringent taxation, regulatory benefits, and so on (Faccio, 2006).⁸ There exists a sizable volume of literature on the effect of political ties on corporate behavior and performance. Most studies focus on developing countries that are prone to “relationship-based” rather than “market-based” capitalism (Adhikari et al., 2006), and where the legal system and corporate governance is weak (Fisman, 2001). Adhikari et al. (2006) study a group of Malaysian firms, and find that firms with political connections face lower effective tax rates than other firms. Connected firms in Tunisia are also found to be more likely to evade taxes (Rijkers et al., 2016). There is also some literature focusing on China. They use either the chief executive officer (CEO) or the chairman of corporate board’s political background (particularly if they are former or current government bureaucrats) to capture firms’ political ties. Zhang et al. (2016) find that firms with politically connected CEOs are able to use their connections as a buffer from governmental donation pressure.⁹ Chen et al. (2011) examine the institutional setting in China and find that political connections protect firms from government rent-seeking behavior. Our paper then

⁸ However, there is also another strand of literature focusing on the negative effect of political ties on corporate performance, in which connected bureaucrats align their interests to government requirements and policies, instead of the interests of shareholders (Marquis and Qian, 2014; Piotroski and Zhang, 2014). Moreover, firms appointing a politically connected CEO – who tends to have fewer managerial skills – may experience deterioration in operating performance and weakening corporate governance (Dang and He, 2016). Fan et al. (2007) find that the post-IPO financial performance of a firm run by a politically connected CEO is significantly worse than that of a firm run by a CEO without any political affiliation. Fan et al. (2008) study the roles of public governance in firm financing patterns. By investigating 23 corruption scandals, they find that the financial leverage and debt maturity ratios of politically connected firms were significantly less than those of the unconnected firms i.e., the same firms after the connections were broken, when the corrupted bureaucrats were arrested.

⁹ In China, the most well-known NGOs in the field of charity are all controlled by the government. Due to their political background and governmental backing, these NGOs are able to solicit donations from enterprises (Zhang et al., 2016).

explores corporate behavior related to tax evasion and incorporates the heterogeneous effect of political turnover, contingent on the political ties of firm leaders.

3. Empirical Strategy

3.1 Econometric Specification

Our main identification strategy is to take political turnover of prefecture-level city leaders as an exogenous shock to the potential existence of government-firm collusion, and thus any behavioral changes in firms' tax compliance activities in response to political turnover could, in turn, be interpreted as evidence of pre-existing collusion. We thus explore the following specification:

$$tax\ evasion_{ijnt} = \alpha + \beta turnover_{jt} + X_{it}\gamma + Z_{jt}\theta + L_{jt}\vartheta + \delta_i + \tau_j + \mu_{nt} + \varepsilon_{i,t} \quad (1)$$

where i represents a firm located in city j in industry n ; t refers to the year. The dependent variable, $tax\ evasion_{ijnt}$, estimates the extent of tax evasion on corporate income taxation. The primary independent variable we are interested in is $turnover_{jt}$, which is a dummy variable indicating whether political turnover occurs in city j at time t . Three sets of time-varying control variables, X_{it} , Z_{jt} , and L_{jt} , are included, controlling at firm, city, and prefectural leader levels, respectively. We also consider firm-based fixed effects, δ_i , city-based fixed effects, τ_j , and industry-year fixed effects, μ_t . By adding firm fixed effects, we control for the mean differences in tax evasion across firms. The city dummies control for unobserved heterogeneity that are constant over time across cities. The industry-year dummies capture the potential heterogeneous time patterns of tax treatment at the industry level.¹⁰ Moreover, the standard errors in all regressions are clustered by firm and robust standard errors are applied. On the grounds of pre-existence of collusion, we expect to find a negative sign for coefficient β , suggesting that political turnover tends to result in potential instability

¹⁰ This may be particularly relevant because, occasionally, the Chinese authorities offer special tax treatments to certain industries in order to support their development.

of existing collusion between governments and firms, thus inducing behavioral changes amongst the firms.

As for control variables at the individual firm level, X_{it} , we consider several factors that are closely related to a firm's choice of tax behavior, such as firm size, leverage ratio, return on assets (ROA), credit constraint, and management fees of the firm. Firm size is measured by the logarithm of total assets of the firm. Compared to small ones, bigger corporations may have more economic and political resources to conduct tax evasion (Lanis and Richardson, 2011).¹¹ We also control for leverage ratio and ROA because these two factors represent capital structure and firm performance respectively, and both are proved to be closely associated with the enterprise's aversion to taxes (Gupta and Newberry, 1997). Additionally, credit constraint is considered as a control variable because tax compliance is an important indicator for Chinese state-owned banks to allocate credit. Firms relying more heavily on loans tend to be less involved in tax evasion (Cai and Liu, 2009). Note that the credit constraint of the firm is measured both by the ratio of financial charges to total assets and the ratio of net cash flows to total assets. Lastly, management fees provide a buffer in manager earnings that may incentivize them to conduct tax evasion activities (Desai and Dharmapala, 2006); we proxy it with the ratio of management fees to total assets of the firm.

At the aggregated city level (Z_{jt}), the control variables we consider are real GDP per capita, the shares of the secondary and tertiary sectors in total GDP, government size, and population density. Real GDP per capita (deflated by provincial price indexes) and the secondary and tertiary sector shares of overall GDP capture the level of economic development and the economic structure of a city, which in turn reflects a city's capacity to collect tax revenues (Besley and Person, 2009). Population density is employed to capture the potential scale effects in revenue collection for a prefectural government. Government size, measured by the ratio of fiscally supported population (including civil servants and employees in public sectors) to total population, aims to

¹¹ However, Gupta and Newberry (1997) argue that due to more attention imposed by society, the cost of evasion is higher for larger firms, leading to lower tax evasion.

account for the revenue needs of prefectural governments. This may contain strong implications for a government's taxing behavior (Zhang, 2006).

Finally, the characteristics of prefectural leaders (L_{jt}) determine their likelihood of promotion or termination, which may simultaneously affect the occurrence of political turnover and the governments' capability of tax enforcement. We thus control for prefectural leaders' personal attributes, including age and education, to avoid a potential omitted variable bias. Education captures a prefectural leader's human capital.¹² Age is an important factor in determining local officers' political advancement, especially after the age-based retirement rule was implemented in 1982 (Li and Zhou, 2005).

3.2 Measures of Key Variables

3.2.1 Tax Evasion

Tax evasion, by its very nature, is difficult to measure, largely due to the lack of reliable information on taxpayers' compliance. After all, tax evasion is illegal, and firms have strong incentives to conceal their cheating behavior, given the financial and political penalties imposed by governments (Alm and McClellan, 2012). In this paper, we measure firm tax evasion on corporate income tax (CIT) by the gap between the statutory tax rate (STR)¹³ and the effective tax rate (ETR) faced by the firm. That is:

$$tax\ evasion_{ijt} = STR_{ijt} - ETR_{ijt}. \quad (2)$$

Note that ETR is calculated as the ratio of the current CIT expense (the total CIT expense minus the deferred CIT expense) to earnings before interest and taxes.

In the relevant literature, the *ETR* is usually employed as an indicator of the tax burden of firms (Porcano, 1986; Liu and Cao, 2007; Wu et al., 2012), and to some extent, this indicator also reflects the tax compliance of firms (Fariz and Klamm, 2012). Nevertheless, with the current tax legislation in China, the statutory tax rate on CIT varies significantly across firms under different industries and ownerships (even the

¹² Education is an ordinal variable from 0 to 4. We set 0 for high school and below, 1 for college, 2 for undergraduate (Bachelors), 3 for postgraduate (Masters), and 4 for Ph.D.

¹³ In the cases where there are multiple statutory corporate income tax rates faced by the firm, we use the top statutory corporate income tax rate applicable to the firm.

same firm may have faced different statutory tax rates across the years).¹⁴ Thus, the variation in ETR cannot be fully attributed to the tax evasion activities of firms. We therefore exploit the difference between the statutory CIT rate and the effective CIT rate as the measure of tax evasion of firms. A greater difference between these two rates indicates a larger gap between what the firm has to pay and what it actually pays, and so the firm is more involved in tax evasion activities.

Finally, it is worth mentioning that much of the empirical literature does not disentangle tax activities of the firms into tax avoidance and tax evasion, of which the former is legal while the latter is illegal.¹⁵ In our context, we believe what we measure is tax evasion, rather than tax avoidance. Because tax avoidance is legal, there tends to be less reason for the firms to change their legal behavior in the presence of a political shock, the timing of the leadership transition in the city. Before running regression analysis, Figures 1 and 2 may shed some light on the variation in tax evasion during the political turnover. Figure 1 illustrates the variation in tax evasion of the listed firms in cities with and without political turnover from 2007 to 2014. It seems the mean tax evasion in general is lower in cities with political turnover (with the exception of 2010, and 2012). Figure 2 demonstrates the variation in tax evasion surrounding the years with political turnover. Since the political turnover of prefectural leader is five years institutionally, we use the window of five with the 0 reflecting the year of political turnover, considering two years before and after the year of political turnover. Figure 2 shows that tax evasion of the listed firms in our sample drops dramatically when the political turnover occurs but appears to increase again after two periods. This result may be consistent with our conjecture that the political shock leads to the instability of the existing government-firm collusion, resulting in a reduction of tax evasion activities of firms. So, tax evasion is found to

¹⁴ The standard CIT statutory tax rate in China is 25%. However, high-tech firms, some foreign firms, and agribusinesses pay a reduced rate at 15%, 20%, and 0%, respectively.

¹⁵ Some scholars define it as a more “neutral” concept, such as tax noncompliance, tax sheltering, or tax aggressiveness (Manzon and Plesko, 2002; Chen et al., 2010; Lanis and Richardson, 2011). Some do not put attention into distinguishing between these two concepts, even if they use one of the concepts literally (Desai and Dhammika, 2006; Cai and Liu, 2009; Fariz and Klamm, 2012).

decline substantially during the year of political turnover. After political shock, firms are able to rebuild their relationship with new local governments, so the increase in tax evasion is observed afterwards.

[Insert Figure 1 Here]

[Insert Figure 2 Here]

3.2.2 Political Turnover of the City

The political turnover of local officials is under the control by the higher-level party authority, that is the political turnover of prefectural leader is determining by the Provincial Party Committee (Fan et al., 2018). The Provincial Party Committee meets in the Provincial Party Congress every five year, discussing the future party policy and important personnel reshuffle within the province. Thus, the Provincial Party Congress is considered as the most important political occasion in the province. Additionally, according to the regulations issued by the Central Committee of the Chinese Communist Party in August 2006, the term of office for Chinese local officials is five years and they can only serve in the same position for two consecutive terms at most.¹⁶ Thus, we should expect to see that the timing of political turnover of prefectural leader synchronizes with the timing of Provincial Party Congress and occurs every five year. However, as a matter of fact, most of prefectural leaders cannot actually complete their scheduled terms (Landry et al., 2014) and political turnover does not coincide with the timing of the Provincial Party Committee. Table 1 reports the frequency distribution of prefectural secretaries' political turnover regarding their times in office from 2007 to 2014. That the average term for prefectural secretaries in our sample was about 2.95 years. Additionally, approximately 60% of political turnovers occurred in the first four years of their tenure and less than 20% of political leaders stayed more than five years in the same position, clearly demonstrating the high uncertainty faced by local officials regarding their tenure.

¹⁶ The Organization Department of the Central Committee of the Chinese Communist Party issued the "Provisional Regulations on Terms of Cadres of the Party and Government" in August 2006, regulating the tenure of local officials at the county level and above (Fan et al., 2018).

[Insert Table 1 Here]

The frequent political turnover of local governments is to avoid the formation of factionalism and the rise of regional localism, making sure the effectiveness of the central personnel control (Li, 2004). Unlike the pre-scheduled electoral political turnovers in many other countries, the top-down appointment-based political system in China creates unexpected political turnover of local officials.¹⁷ Thus, political turnover of prefectural leaders can serve as an exogenous shock to the existing collusion.

Under the current political institution of China, there are two political leaders in a prefectural city; one is the prefectural secretary and the other one is the mayor. The prefectural secretary of the CCP is deemed as the head of city government, while the mayor takes the second political ranking and serves as the deputy prefectural secretary of the CCP. Therefore, the political turnover of the prefectural secretary usually reshapes the political environment within the city. We follow the previous literature by focusing on the effect of political turnover of the prefectural secretary (Liu et al., 2015; An et al., 2016).¹⁸ In particular, we set the political turnover variable as 1 if the

¹⁷ The question then arises why and how the political turnover happens, if the political turnover of local cadres does not follow a specific time pattern. There are many literatures studying the determinants of political turnover of local cadres. The characteristics of local cadres, such as age and education, become important criterion for high-level party authority to assess local cadres since 1980s (Li and Zhou, 2005). The other possible determinant discussed the most is local economic condition, reflecting the economic performance of local cadres. Even though under the cadre management system local cadres may have incentives to manipulate economic policy during their tenures, the effect of local cadres' economic performance on political turnover is mixed. Li and Zhou (2005) find the evidence of positive association between provincial leaders' economic performance and their likelihood of being promoted. Shi et al. (2018) apply prefectural level data and demonstrate that local economic growth significantly and positively correlated with prefectural leader's chances of promotion. However, Shih et al. (2012) find no evidence of such association when applying the data of 12th through 16th Party Congresses from 1982 to 2007. Chen et al. (2017) also show that the probability of political turnover of provincial leaders is unrelated to local economic conditions. By applying a unique city-leader linked dataset from 1994 to 2010, Yao and Zhang (2015) suggest that if the competence of local cadres were considered, the effect of performance-promotion linkage would be less significant. The above discussion implies that local officials face high uncertainty regarding their tenures.

¹⁸ We have also examined the effects of political turnover of the prefectural mayors; the results show that the effect of political turnover on firm tax evasion is still negative but statistically insignificant, which is consistent with the Chinese political institution that it is indeed the prefectural secretary of the CCP who is dominantly responsible for shaping the political landscape of the city.

prefectural secretary is replaced in year t , and 0 otherwise. If the political turnover occurs in the first (second) half of year t , we treat it as occurring in year t (year $t+1$).

3.2.3 Political Connection of the Firms

The second part of the paper explores the role played by political connection (of the firms) in facilitating and stabilizing government-firm collusion. To capture the degree of political connection of firms, we focus on the political background of both prefectural leaders and the firms' chief leaders, specifically the CEO and the chairman of the board. The first measurement factor in the social networks of newly appointed prefectural leaders (i.e., prefectural secretary of the CCP). Following Persson and Zhuravskaya (2016), we determine a prefectural leader's localness based on his/her career trajectory, in order to capture the degree of his/her social networks. Specifically, a local prefectural leader rises from a low to high position in the city he/she governs, while a nonlocal prefectural leader makes significant career advancements in other cities. It is generally believed that compared to a nonlocal prefectural leader, a local prefectural leader tends to have better connections with the firms in the city. The second measurement incorporates political ties, referring to the political backgrounds of firm leaders, which is widely applied in the previous literature (Chen et al., 2011; Zhang et al., 2016). We create a dummy variable indicating the existence of political connections of a firm, if either the CEO or the chairman of the board's¹⁹ curriculum vitae mentions any of the following backgrounds: (i) current or former government official; (ii) current or former member of the People's Congress; (iii) current or former member of the People's Political Consultative Conference.²⁰

3.3 Data

The dataset we used is both at the firm level and at the aggregated city level. Due to the availability of firm level information in only some respects, such as the statutory CIT

¹⁹ We believe that both the CEO and the chairman of the board play a crucial role in the firms' daily operations and decision-making processes. This method has been applied by Wu et al. (2012) and Hou et al. (2017).

²⁰ In China, the People's Congress (which is the lawmaker) and the People's Political Consultative Conference (whose members serve as official advisors) are both quasi-government organizations that play important roles in Chinese politics.

rate of firms and the political connections of corporate leaders, we focus on all non-financial, listed firms in the Chinese stock market from 2007 to 2014.²¹ Detailed financial data of the listed firms is drawn from the China Stock Market and Research (CSMAR) database. In addition, data on the political connections of the corporate leaders is obtained from a sub-database of the CSMAR for the years after 2008. The information before 2008 (i.e., 2007) is collected manually by authors, using resumes of corporate leaders.²²

As for aggregated city-level data, we exclude four province-level municipalities, which are Beijing, Tianjin, Shanghai, and Chongqing. This is because the political and administrative status of these municipalities is dramatically different from the prefectural cities. Information on political turnover in the cities and the personal attributes of prefectural leaders is mainly collected from the database of Chinese leading cadres,²³ and the official personnel appointment and termination announcements released by the Xinhua Net.²⁴ All other aggregated variables at the city level are gathered from the various issues of the *China City Statistical Yearbook* and the *China Statistical Yearbook for Regional Economy*.

Having combined the firm-level dataset with the city-level dataset, our final sample consists of 9,181 observations for 1,682 corporations, located in 219 prefecture cities. To ensure that the results are not driven by the extreme outliers, we winsorize our data at the 1st percentile and 99th percentile. Table A1 in the Appendix provides detailed definitions of all the variables, and their corresponding summary statistics are reported in Table 2.

[Insert Table 2 Here]

²¹ The financial industry is excluded from the sample because of its substantial difference from other industries. For example, there are large amounts of “off balance sheet” activities in financial corporations, especially banks, which make them less comparable to the other ordinary corporations.

²² The resumes of the corporate leaders, covering the CEO and the chairman of the board, can be found in the firms’ annual reports.

²³ The database is managed by the People’s Net. <http://cpc.people.com.cn/gbzl/index.html>

²⁴ <http://www.xinhuanet.com/politics/rs.htm>

4. Empirical Results

4.1 Political Turnover and Evidence of Collusion

Table 3 presents the results of our baseline specification (1). Each column of Table 3 represents the estimate from a separate regression, where only the coefficient of political turnover (and its clustered standard error) is reported. We start off the estimation by only controlling for firm-specific fixed effects and year-specific fixed effects in Column (1). It turns out that political turnover is negatively associated with firm tax evasion, and the relation is statistically significant. The empirical results support our main argument that the external shock from political turnover tends to lead to the instability of the existing government-firm collusion, resulting in a reduction of tax evasion activities of firms. Columns (2)-(4) add controls for city, prefectural leader, and firm, gradually. As shown, the coefficients of political turnover are persistently negative and statistically significant. Upon adding more control variables, the (inverse) effect of political turnover becomes larger in magnitude. Quantitatively, Column (4) indicates that on average, political turnover reduces the gap between the statutory CIT rate and the effective CIT rate by 0.883 points. At the mean, this approximately translates into a 86% decrease in the gap.²⁵

[Insert Table 3 Here]

4.2 Collusion or Political Uncertainty?

It might be argued that the detected reduction of firm tax evasion in the presence of political turnover is *not* pure evidence of the pre-existence of government-firm collusion. The so-called “political uncertainty” hypothesis in the relevant literature (Julio and York, 2012; An et al., 2016) may, instead, offer a competing explanation for what we just found. In particular, given the strong influence of prefectural leaders on

²⁵ Since new collusion might be re-established after some time once the new city leadership takes position, we also explore the lagged effects of political turnover on firm tax evasion. As reported in Table A2 of the Appendix, we find that the one-period lagged effect of political turnover on firm tax evasion remains negative but statistically insignificant, while the two-to-three period lagged effects of political turnover become positive and statistically insignificant, which provides evidence of possible re-establishment of collusion. Such results are consistent with the findings in Figure 2 that firm tax evasion reaches the peak after three years of political turnover.

the local economy, political turnover may bring changes to existing economic or fiscal policies that could create significant uncertainty for firms.²⁶ In response to this, the firms may strategically take more prudent actions such as withholding investment until any uncertainty is resolved (Dixit and Pindyck, 1994; An et al., 2016) or reducing tax evasion activities (Liu et al., 2015). In this case, there will be no collusion.

While it appears that our aforementioned results may be rationalized by both hypotheses (the collusion hypothesis and the political uncertainty hypothesis), there exists an important difference between the two. Provided that the reduction of firm tax evasion after political turnover is mainly caused by the political uncertainty faced by firms, we should more or less expect a systematic effect of political turnover across all types of firms. By contrast, given the fact that collusion is a joint action between the government and the firm, the chances and/or costs of collusion would, at least partially, depend on the resources available to firms, both economic and political. In other words, we can expect to find out more heterogeneous effects of political turnover on firm tax evasion if collusion is indeed the driving mechanism. To exploit this point and subsequently disentangle the collusion hypothesis from the political uncertainty hypothesis, we examine our data along three different dimensions; each dimension is supposed to generate some differentiation amongst firms in terms of costs or opportunities of collusion.

To begin with, we split the sample on the basis of the firms' corresponding taxing authorities. Due to income tax reforms in China in 2002 and 2008, the collection of CIT is assigned to either the State Administration of Taxation (SAT) or the Local Administration of Taxation (LAT), depending on the startup year of the firm. The SAT and the LAT were both created in 1994, as a result of the critical fiscal reform (the so-called "tax-sharing system" reform) in China. The 1994 reform assigned foreign firms and central firms to the SAT for CIT, and other firms to the LAT. However, firms established in and after 2002 have been assigned to the SAT for CIT collection. For

²⁶ For instance, firms may worry that the new leader will perform stronger enforcement on tax collection than the previous leader.

firms established in and after 2009, if their primary business is supposed to pay value-added tax, they are assigned to the SAT for CIT collection. If, however, their primary business is in the scope of business tax, then they are charged CIT by the LAT.²⁷ The key difference between the two institutes is that the SAT represents the central government and is under the direct control of the central authority, while the LAT belongs to, and is under direct supervision by the local governments.²⁸ This unique institutional setup provides us with an opportunity to differentiate between the collusion and the political uncertainty hypotheses. In particular, if the latter hypothesis dominates the interpretation of the tax-related behavioral responses of the firms, the uncertainty should be uniform across firms affiliated with either the SAT or the LAT, and so a similar behavioral response is expected to be observed among all firms. On the other hand, if it is mainly due to the pre-existence of government-firm collusion, the tax-related behavioral responses of the two groups of firms (firms affiliated with the SAT and LAT) might be different. More specifically, since political turnover is defined at the local level (i.e., change of the city head), it is presumed to destabilize any local government-firm collusion (potentially captured by the behavior of firms affiliated with the LAT). However, it may not destabilize central government-firm collusion (potentially captured by the behavior of firms affiliated with the SAT).²⁹ Taking advantage of the information on the firms' taxing authorities, indicated in the annual reports of the listed firms, we divide our sample into the aforementioned two groups (SAT-affiliated firms and LAT-affiliated firms). The empirical results are reported in Table 4. As seen in the table, while the estimated coefficient of political turnover is

²⁷ The new rules imposed by these reforms only apply to the firms established during and after the reforms. For firms established before the reforms, the old rules apply.

²⁸ During the Tax-Sharing reform, all taxes in China were classified into three categories: central taxes, local taxes, and taxes shared between the central and local governments. The SAT was put in charge of collecting central taxes and the majority of the shared taxes, while the LAT was made responsible for the collection of all local taxes and the remaining small portion of the shared taxes. For a more detailed description of the Chinese tax system, see Jia et al. (2017).

²⁹ As pointed out by Sun (2004), in China, collusion of local officials or even an entire local government is often present, and tax fraud is organized and pervasive as a local phenomenon and enjoys a local "support system". These reflect the top-down model of regional corruption.

negative in both groups of firms, it is only statistically significant for firms whose CIT revenues are collected by the LAT. The empirical results are consistent with the collusion hypothesis, rather than the political uncertainty hypothesis.

[Insert Table 4 Here]

Due to historical reasons, foreign firms in China have long been granted with preferential tax treatment and various other benefits (i.e. tax exemption, tax break, and preferential tax rate). Given that foreign investors generally pay more attention to local laws and policies in order to prevent political risk, it is reasonable to assume that foreign firms are less likely to be involved in collusion activities than domestic firms. Along the same lines, the state-owned enterprises (SOEs), by their very nature, are inextricably interwoven with the government and thus have a much higher chance to be collusive than the non-SOEs. Using this insight, we continuously explore the second dimension by separating our sample into two groups based on different ownership criteria, namely foreign firms versus domestic firms (and non-SOEs versus SOEs). We expect that foreign firms (non-SOEs) should be less sensitive in responding to political turnover than the domestic firms (SOEs). The empirical results are reported in Table 5. This table confirms our conjecture that the negative estimated coefficient of political turnover is only statistically significant for domestic firms and SOEs, but not foreign firms and non-SOEs. Table 5 provides another piece of evidence inclined towards the collusion hypothesis rather than political uncertainty hypothesis, as the latter would imply a more consistent effect of political turnover across all types of firms. Particularly, since SOEs are faced with less uncertainty than non-SOEs due to their connection with governments, the more salient response of SOEs, in turn, would suggest a deny of the political uncertainty hypothesis as a key explanation of our detected results.

[Insert Table 5 Here]

In the third dimension, we divide the sample into deciles based on the mean value of the firms' assets, and compare the bottom three to the top three deciles. Our conjecture is that large firms, in relation to small firms, are generally enriched with more economical and political resources that build the foundation for government-firm

collusion.³⁰ Thus, provided the collusion hypothesis holds, political turnover may impose a stronger shock to the tax activities of the large firms, rather than the small firms. The empirical results are reported in Table 6. This table indicates that large firms are significantly more responsive to political turnover. Quantitatively, large firms yield an estimate of -1.251 (Column (4) of Table 6), compared to -0.883 in the benchmark estimation (Column (4) of Table 3). Even though the small firms also have a negative coefficient, they are statistically insignificant. The results are therefore against the political uncertainty hypothesis, in which a similar effect of political turnover across firms with different sizes is expected to be found.

[Insert Table 6 Here]

4.3 The Role of Political Connection

Having established evidence in favor of government-firm collusion, we ask the question: to what extent is the existing collusion more likely to be stable? To answer this question, we explore the role of political connection in firms, the concept of which is defined and illustrated in subsection 3.2.3. Intuitively, we hypothesize that the existing collusion should be more stable and less likely to be broken by the political turnover shock if the firm is politically connected.

To validate this point, we firstly look at our measure of political connection from the perspective of the prefectural leaders. That is, we divide our sample into two groups, depending on whether the prefectural leader is “local” or “nonlocal”.³¹ The empirical results are reported in Table 7. As indicated in the table, the estimated coefficient of political turnover remains negative and statistically significant in the subsample with city leaders promoted outside the cities (Columns (3) and (4) of Table 7), while the same coefficient appears to be statistically insignificant and much smaller in magnitude when the prefectural leader is promoted locally (Columns (1) and (2) of Table 7). This finding is somewhat consistent with our hypothesis that, compared to prefectural

³⁰ As argued by Zhang (2018), while small firms have hard time dealing with tax officers, large firms usually enjoy privileged connections with local political leaders, as well as tax officers.

³¹ As defined in subsection 3.2.3, “local” means that the prefectural secretary was promoted within the city, while “nonlocal” means that the prefectural secretary was promoted from outside cities.

leaders appointed from outside cities, firms may already have connections with locally promoted prefectural leaders before they are in office. This lessens the external shock effect of political turnover on existing collusion.³²

[Insert Table 7 Here]

In the next step, we turn to the second measure of political connection of firms, which is political ties. This captures the detailed political background of firms' chief leaders, and so is an arguably more accurate index. In particular, we split our sample into two groups, depending on whether the chief leaders of the firms – specifically the CEO and the chairman of the board – are former or current government bureaucrats. Table 8 documents the new estimation results. Largely in line with the previous finding, political turnover is only found to be statistically significant in reducing firm tax evasion when firms' chief leaders have no political ties (Columns (3) and (4) of Table 8), and the corresponding results for firms with chief leaders being former or current government officers are not statistically significant. Finally, it is also worth mentioning that with this second measure of political connection, the quantitative effect of political turnover becomes even more striking, with an estimated coefficient of -1.409 in Column (4) of Table 8, compared to an estimated coefficient of -0.914 in Column (4) of Table 7. This seems to support our claim that the second measure of political connection is a more accurate one.

[Insert Table 8 Here]

³² Apart from the career trajectory of prefectural leaders, Lu and Tsai (2017) also consider the birthplace of prefectural leaders to capture the degree of local officials' social networks. Compared to local officials who were born in the city they govern, local officials who were not born in the city they govern have fewer connections with local elites. Thus, political turnover should have a less salient effect on firm tax evasion for locally born prefectural leaders. However, our data shows that from 2007 to 2014, less than 6% of prefectural leaders were born in the cities they govern. When applying the definition of birthplace, the empirical results may be biased due to low variation in the sample. For this reason, we primarily focus on the effect of the prefectural leaders' previous work experience. Note that the empirical results are consistent with our conjecture if we apply birthplace as a metric instead, confirming the robustness of our results. The corresponding regression results are reported in Table A3.

Taken together, the results in Tables 7 and 8 provide consistent evidence for the role of political connection of firms in stabilizing the existing government-firm collusion.

5. Concluding Remarks

Government-firm collusion in China has been widely discussed in recent years. However, there is little clear empirical evidence in the existing academic research. Our paper combines a prefectural-level panel dataset with a Chinese listed firm dataset from 2007 to 2014, and innovatively applies political turnover of local officials as an exogenous political shock to firms, examining the corresponding behavioral changes in firm tax evasion during the leadership transition, in order to find evidence of pre-existing government-firm collusion. By considering the heterogeneous effect of firms, our empirical finding that only firms with low costs and high chances of collusion respond to the external political shock supports the collusion hypothesis, ruling out the possibility that the changes are driven by political uncertainty.

Additionally, we argue that political connections stabilize the existing government-firm collusion during the leadership transition. The empirical results of this paper demonstrate that the effect of political turnover on tax evasion is lessened if the firms are politically connected, specifically when the newly appointed prefectural leader is local or when the firms' chief leaders have stronger political ties. It implies that political connections in China increase corporate value in the sense that they help firms become less vulnerable to external political shocks, and more likely to sustain their advantages during rent-seeking activities. Even though our study focuses on the change in corporate tax evasion driven by government-firm collusion, a similar political logic may also apply to other types of corporate rent-seeking behavior.

References

- Abraham, Martin, Kerstin Lorek, Friedemann Richter, and Matthias Wrede. 2017. "Collusive Tax Evasion and Social Norms." *International Tax and Public Finance* 24: 179-197.
- Adhikari, Ajay, Chek Derashid, and Hao Zhang. 2006. "Public Policy, Political Connections, and Effective Tax Rates: Longitudinal Evidence from Malaysia." *Journal of Accounting and Public Policy* 25: 574-595.
- Aidt, Toke. 2016. "Rent Seeking and the Economics of Corruption." *Constitutional Political Economy* 27(2): 142-157.
- Alm, James, and Chandler McClellan. 2012. "Tax Morale and Tax Compliance from the Firm's Perspective." *Kyklos* 65(1): 1-17.
- Alm, James, Jorge Martinez-Vazquez, and Chandler McClellan. 2016. "Corruption and Firm Tax Evasion." *Journal of Economic Behavior and Organization* 124: 146-163.
- An, Heng, Yanyan Chen, Danglun Luo, and Ting Zhang. 2016. "Political Uncertainty and Corporate Investment: Evidence from China." *Journal of Corporate Finance* 36: 174-189.
- Banerjee, Abhijit, Rema Hanna, and Sendhil Mullainathan. 2012. "Corruption." MIT Department of Economics Working Paper No. 12-08.
- Besley, Timothy, and John McLaren. 1993. "Taxes and Bribery: The Role of Wage Incentives." *Economic Journal* 103: 119-41.
- Besley, Timothy, and Persson Torsten. 2009. "The Origins of State Capacity : Property Rights, Taxation and Politics." *American Economic Review* 99(4): 1218-1244.
- Cai, Hongbin, and Daniel Treisman. 2004. "State Corroding Federalism." *Journal of Public Economics*, 88: 819-843.
- Cai, Hongbin, and Qiao Liu. 2009. "Competition and Corporate Tax Avoidance: Evidence form Chinese Industrial Firms." *Economic Journal* 119: 764-795.
- Chang, Juin-jen and Ching-chong Lai. 2004. "Collaborative Tax Evasion and Social Norms: Why Deterrence Does Not Work." *Oxford Economic Papers* 56: 344-368.
- Chen, Charles, Zengquan Li, Xijia Su and Zheng Sun. 2011. "Rent-seeking Incentives, Corporate Political Connections, and the Control Structure of Private Firms: Chinese Evidence." *Journal of Corporate Finance* 17: 229-243.
- Chen, Shuping, Xia Chen, Qiang Cheng, and Terry Shevlin. 2010. "Are Family Firms More Tax Aggressive than Non-Family Firms ?" *Journal of Financial Economics* 95 (1): 41-61.
- Chen, Sophia, Lev Ratnovski, and Pi-Han Tsai. 2017. "Credit and Fiscal Multipliers in China." IMF working paper WP/17/273.
- Dang, Tri Vi, and Qing He. 2016. "Bureaucrats as Successors CEOs." BOFIT Discussion Paper 13.
- Desai, Mihir, and Dhammika Dharmapala. 2006. "Corporate Tax Avoidance and High Powered Incentives." *Journal of Financial Economics* 79(1): 145-179.
- Dixit, Avinash, and Robert Pindyck. 1994. *Investment under Uncertainty*. New Jersey: Princeton University Press.
- Faccio, Mara. 2006. "Politically Connected Firms." *American Economic Review* 96(1): 369-386.

- Fan, Joseph, T.J. Wong, and Tianyu Zhang. 2007. "Politically Connected CEOs, Corporate Governance, and Post-IPO Performance of China's Newly Partially Privatized Firms." *Journal of Financial Economics* 84: 330-357.
- Fan, Joseph, Oliver Meng Rui, and Mengxin Zhao. 2008. "Public Governance and Corporate Finance: Evidence from Corruption Cases." *Journal of Comparative Economics* 36: 343-364.
- Fang, Hanming, Zhe Li, Nianhang Xu, and Hongjun Yan. 2018. "In the Shadows of Government: Political Turnovers and Firm Perk Expenses." Working Paper.
- Fariz, Huseynov, and Bonnie Klamm. 2012. "Tax Avoidance, Tax Management and Corporate Social Responsibility." *Journal of Corporate Finance*, 18(4), PP 804-827
- Fisman, Raymond. 2001. "Estimating the Value of Political Connections." *American Economic Review* 91(4): 1095-1102.
- Gupta, Sanjay, and Kaye Newberry. 1997. "Determinants of the Variability in Corporate Effective Tax Rate: Evidence from Longitudinal Data." *Journal of Accounting and Public Policy* 16:1-39.
- Hou, Qingsong, May Hu, and Yuan Yuan. 2017. "Corporate Innovation and Political Connections in Chinese Listed Firms." *Pacific-Basin Finance Journal* 46(September): 158-76.
- Jia, Ruixue, and Huihua Nie. 2017. "Decentralization, Collusion, and Coal Mine Deaths." *Review of Economics and Statistics*, 99(1): 105-118.
- Jia, Junxue, Yongzheng Liu and Kewei Zhang. 2017. "Vertical Fiscal Imbalance and Local Fiscal Discipline: Empirical Evidence from China" *International Center for Public Policy Working Paper*:1-41.
- Julio, Brandon, and Youngsuk York. 2012. "Political Uncertainty and Corporate Investment Cycles." *Journal of Finance* Vol. LXVII, No. 1: 45-83.
- Landry, Pierre F., Xiaobo Lü, and Haiyan Duan, 2014. "Does Performance Matter? Evaluating the Institution of Political Selection along the Chinese Administrative Ladder." *APSA 2014 Annual Meeting Paper*.
- Lanis, Roman, and Grant Richardson. 2011. "The Effect of Board of Director Composition on Corporate Tax Aggressiveness." *Journal of Accounting and Public Policy* 30 (1): 50-70.
- Li, Cheng. 2004. "Political Localism versus Institutional Restraints: Elite Recruitment in the Jiang Era." In B. J. Naughton & D. L. Yang (Eds). *Holding China Together*. Cambridge: Cambridge University Press.
- Li, Qingyuan, Edward Maydew, Richard Willis, and Li Xu. 2017. "Corporate Tax Behavior and Political Uncertainty: Evidence from National Elections around the World." *Vanderbilt Owen Graduate School of Management Research Paper No. 2498198*.
- Li, Hongbin, and Zhou Li-an. 2005. "Political Turnover and Economic Performance : The Incentive Role of Personnel Control in China." *Journal of Public Economics* 89: 1743-62.
- Liu, Qiao, Wei Luo, and Pingui Rao. 2015. "The Political Economy of Corporate Tax Avoidance." Working Paper.

- Liu, Xing, and Shujun Cao. 2007. "Determinants of Corporate Effective Tax Rates : Evidence from Listed Companies in China." *The Chinese Economy*, 40:6, 49-67.
- Lu, Jiankun, and Pi-Han Tsai. 2017. "Signal and Political Accountability: Environmental Petitions in China." *Economics of Governance* 18: 391-418.
- Manzon, Gil B. , and George A. Plesko. 2001. "The Relation between Financial and Tax Reporting Measures of Income." Working paper 4332-01.
- Marquis, Christopher, and Cuili Qian. "Corporate Social Responsibility Reporting in China: Symbol or Substance?" *Organization Science* 25(1): 127-148.
- McLaren, John. 1996. "Black Markets, and the Fiscal Problem in LDCS: Some Recent Findings." *Eastern Economic Journal* 22(4): 491-502.
- Mellahi, Kamel, Jędrzej George Frynas, Pei Sun, and Donald Siegel. 2016. "A Review of the Nonmarket Strategy Literature: Toward a Multi-Theoretical Integration." *Journal of Management* 42(1): 143-173.
- Ngo, Tak-Wing. 2009. "Rent Seeking under the Licensing State: The Institutional Sources of Economic Corruption in China." In Ting Gong and Stephen K. Ma (Eds). *Preventing Corruption in Asia: Institutional Design and Policy Capacity*. London; New York: Routledge.
- Nie, Huihua. 2017. *Collusion, Local Governments and Development in China*. Palgrave Macmillan
- Persson, Petra, and Ekaterina Zhuravskaya. 2016. "The Limits of Career Concerns in Federalism: Evidence from China." *Journal of the European Economic Association* 14(2): 338-374.
- Piotroski, Joseph, and Tianyu Zhang. 2014. "Politicians and the IPO Decision: the Impact of Impending Political Promotions on IPO Activity in China." *Journal of Financial Economics* 111(1): 111-136.
- Porcano, Thomas M. 1986. "Corporate Tax Rates: Progressive, Proportional, or Regressive." *Journal of the American Taxation Association* 7(2):17-32
- Rijkers, Bob, Hassen Arouri, and Leila Baghdadi. 2016. "Are Political Connected Firms More Likely to Evade Taxes? Evidence from Tunisia." *World Bank Economic Review* 30: S166-S175.
- Sanyal, Amal, Ira N. Gang, and Omkar Goswami. 2000. "Corruption, Tax Evasion and the Laffer Curve." *Public Choice* 105: 61-78.
- Shih, Victor, Christopher Adolph, and Mingxing Liu. 2012. "Getting ahead in the Communist Party: Explaining the Advancement of Central Committee Members in China." *American Political Science Review* 106(1): 166-187.
- Slemrod, Joel. 2004. "The Economics of Corporate Tax Selfishness." *National Tax Journal* 57(4): 877-899.
- Su, Fubing, and Ran Tao. 2012. "Visible Hand or Crippled Hand: Stimulation and Stabilization in China's Real Estate Markets, 2008-2010." In D. L. Yang (Ed), *Global Recession and China's Political Economy*, Palgrave Macmillan
- Sun, Yan. 2004. *Corruption and market in contemporary China*, Ithaca, N.Y.: Cornell University Press.
- Tsai, Lily. 2007. "Solidary Groups, Informal Accountability, and Local Public Goods Provision in Rural China." *American Political Science Review*, 101(2), 355-372.

- Tsai, Pi-Han. 2016. "Fiscal Incentives and Political Budget Cycles in China." *International Tax and Public Finance* 23: 1030-1073.
- Tullock, Gordon. 1967. "The Welfare Costs of Tariffs, Monopolies, and Theft." *Western Economic Journal* 5: 224-232.
- Uslaner, Eric. 2010. "Tax Evasion, Corruption, and the Social Contract in Transition." In: Alm, James, Martinez-Vazquez, Jorge, Torgler, Benno (Eds.), *Developing Alternative Frameworks for Explaining Tax Compliance*. Routledge International Studies in Money and Banking, New York, NY: 174-190.
- Wu, Wenfeng, Chongfeng Wu, Chunyang Zhou, and Jun Wu. 2012. "Political Connections, Tax Benefits and Firm Performance: Evidence from China." *Journal of Accounting and Public Policy* 31(3): 277-300.
- Xu, Yiqing, and Yang Yao. 2015. "Informal Institutions, Collective Action, and Public Investment in Rural China." *American Political Science Review*, 109(2), 371-391.
- Yanis, Gideon. 1992. "Collaborated Employee-employer Tax Evasion." *Public Finance* 47: 312-321.
- Yao, Yang, and Muyang Zhang. 2015. "Subnational Leaders and Economic Growth: Evidence from Chinese Cities." *Journal of Economic Growth* 20(4): 405-436.
- Zhang, Changdong. 2018. "Trapped into Collusion: The Under-Institutionalized Taxation System and Local Business-State Relations in China." In X. Zhang & T. Zhu (Eds). *Business, Government and Economic Institutions in China*. Germany: Springer International Publishing.
- Zhang, Jianjun, Christopher Marquis, and Kunyuan Qiao. 2016. "Do Political Connections Buffer Firms from or Bind Firms to the Government? A Study of Corporate Charitable Donations of Chinese Firms." *Organization Science* 27(5): 1307-1324.
- Zhang, Xiaobo. 2006. "Fiscal Decentralization and Political Centralization in China: Implications for Growth and Inequality." *Journal of Comparative Economics*, 34(4): 13-726.
- Zhou, Xueguang. 2010. "The Institutional Logic of Collusion among Local Governments in China." *Modern China*, 36(1): 47-78.

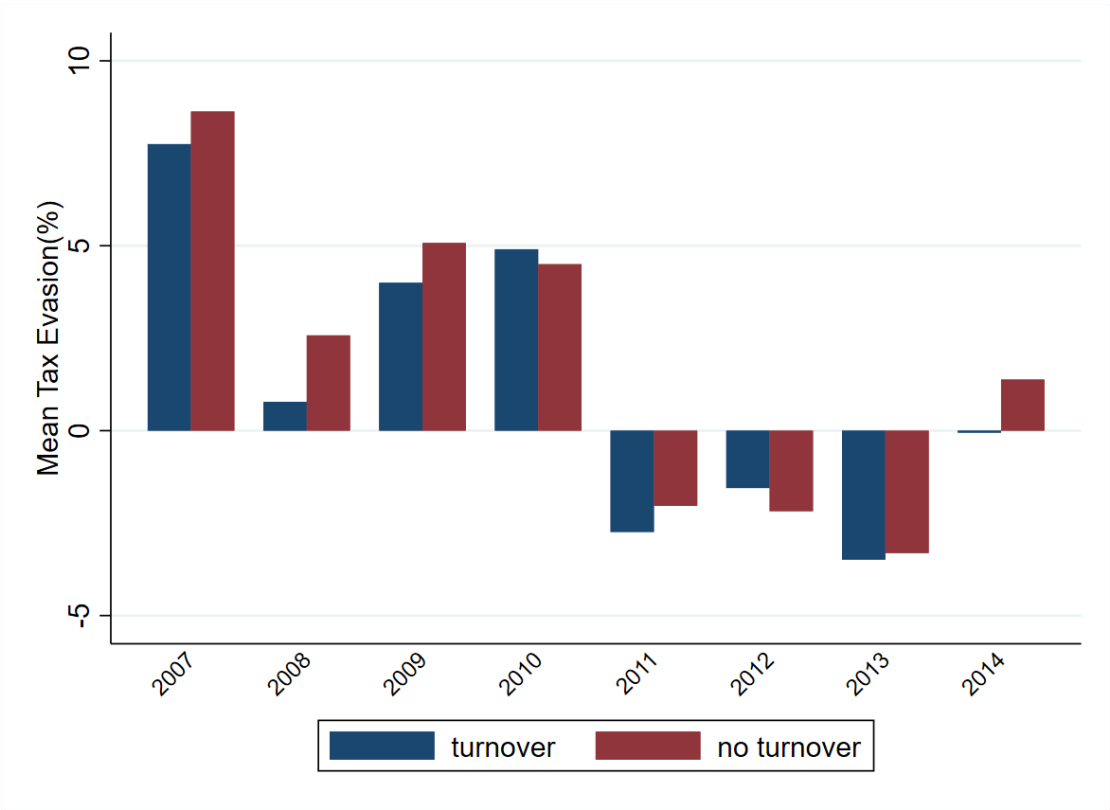


Figure 1: Variation of Tax Evasion between Turnover VS. Non-turnover

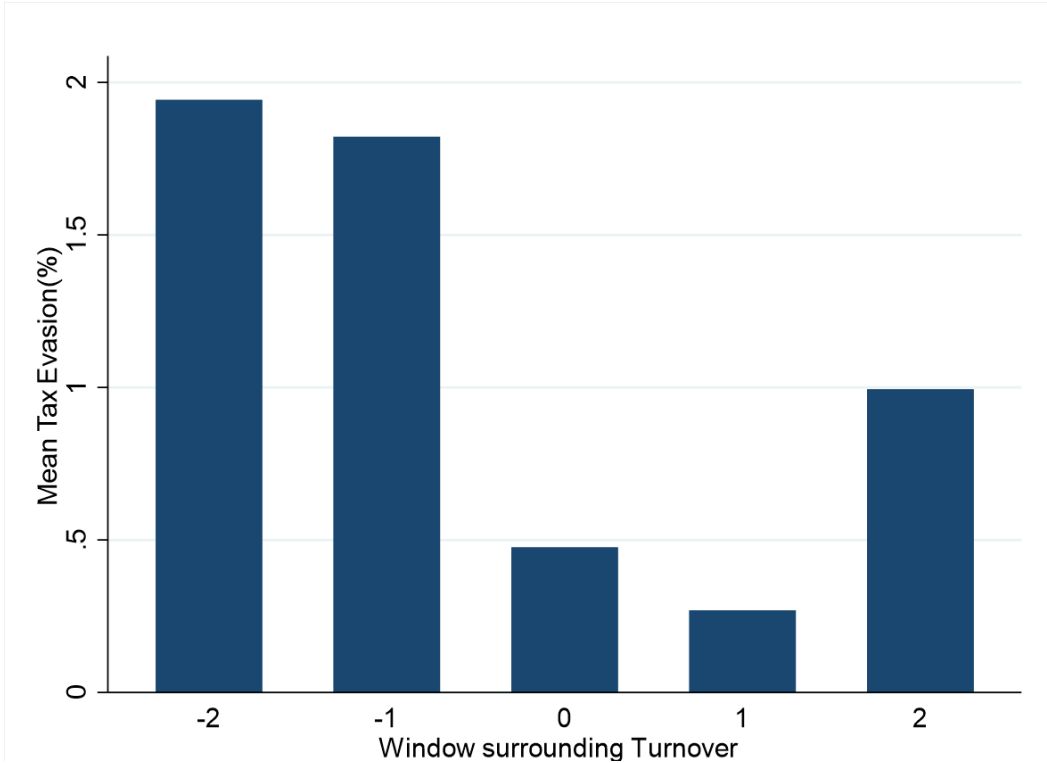


Figure 2: Tax Evasion surrounding Political Turnover in Window (t-2, t+2)

Table 1: The Distribution of Prefectural Leaders' Turnover regarding Their Tenures

Secretaries' Tenure	Frequency	Percentage
1	28	6.95%
2	64	15.88%
3	71	17.62%
4	84	20.84%
5	75	18.61%
6	40	9.93%
7	21	5.21%
8	11	2.73%
9	7	1.74%
10	1	0.25%
11	1	0.25%
Total	403	100%

Source: Authors' Calculation.

Table 2. Summary Statistics

Variable	Obs.	Mean	Std. Dev.	Min	Max
ETR	9181	21.382	14.814	0	80.815
STR	9181	22.438	5.824	0	45
Tax evasion	9181	1.021	15.084	-57.667	28.080
Political turnover	9181	0.246	0.431	0	1
Firm size (log)	9181	21.467	1.195	18.597	24.827
Leverage (%)	9181	46.046	23.427	4.700	136.940
Financial charges (%)	9181	0.897	1.365	-1.855	6.565
ROA (%)	9181	5.974	5.662	-13.105	28.964
Management fees (%)	9181	4.852	3.088	0.429	17.446
Cash flows (%)	9181	4.558	7.838	-20.607	26.277
Real GDP per capita(log)	9181	10.852	0.912	8.995	12.791
Share of secondary sector in total GDP (%)	9181	49.067	7.843	24.806	68.080
Share of tertiary sector in total GDP (%)	9181	44.610	9.523	24.324	67.869
Government size (%)	9181	1.649	1.118	0.283	4.700
Population density(log)	9181	6.373	0.742	3.626	8.361
Age	9181	53.389	3.610	44	60
Education	9181	3.053	0.765	1	4

Source: Authors' Calculation.

Table 3. Impact of Political Turnover on Firm Tax Evasion: Baseline Results

	(1)	(2)	(3)	(4)
Political turnover	-0.657** (0.321)	-0.676** (0.322)	-0.829** (0.328)	-0.883*** (0.323)
City controls	No	Yes	Yes	Yes
Leader controls	No	No	Yes	Yes
Firm controls	No	No	No	Yes
Firm fixed	Yes	Yes	Yes	Yes
City fixed	Yes	Yes	Yes	Yes
Industry-year fixed	Yes	Yes	Yes	Yes
Observations	9,181	9,181	9,181	9,181
R-squared	0.137	0.138	0.139	0.158
Number of firms	1,682	1,682	1,682	1,682

Notes: City controls include real GDP per capita, the share of secondary sector in total GDP, the share of tertiary sector in total GDP, government size, and population density; leader controls include age and education level of the prefectural secretary; firm controls include firm size, leverage, financial charges, ROA, management fees, and cash flows. Standard errors are clustered at firm level for all regressions and robust standard errors are applied. *** p < 0.01, ** p < 0.05, * p < 0.1.

Table 4. Impact of Political Turnover on Firm Tax Evasion: SAT versus LAT

	SAT		LAT	
	(1)	(2)	(3)	(4)
Political turnover	-0.658 (0.692)	-0.671 (0.686)	-0.782** (0.368)	-0.861** (0.360)
City controls	Yes	Yes	Yes	Yes
Leader controls	Yes	Yes	Yes	Yes
Firm controls	No	Yes	No	Yes
Firm fixed	Yes	Yes	Yes	Yes
City fixed	Yes	Yes	Yes	Yes
Industry-year fixed	Yes	Yes	Yes	Yes
Observations	1,953	1,953	7,228	7,228
R-squared	0.214	0.232	0.138	0.159
Number of firms	447	447	1,342	1,342

Notes: SAT represents those firms whose CIT revenues are collected by State Administration of Taxation; and LAT represents those firms whose CIT revenues are collected by Local Administration of Taxation. City controls include real GDP per capita, the share of secondary sector in total GDP, the share of tertiary sector in total GDP, government size, and population density; leader controls include age and education level of the prefectural secretary; firm controls include firm size, leverage, financial charges, ROA, management fees, and cash flows. Standard errors are clustered at firm level for all regressions and robust standard errors are applied. *** p < 0.01, ** p < 0.05, * p < 0.1.

Table 5. Impact of Political Turnover on Firm Tax Evasion: Firm Ownership

Panel A	Foreign		Domestic	
	(1)	(2)	(3)	(4)
Political turnover	-1.140 (1.919)	-0.568 (1.935)	-0.784** (0.333)	-0.839** (0.328)
Observations	303	303	8,878	8,878
R-squared	0.349	0.383	0.140	0.159
Number of firms	80	80	1,642	1,642
Panel B	Non-SOEs		SOEs	
	(1)	(2)	(3)	(4)
	-0.486 (0.413)	-0.633 (0.406)	-1.379*** (0.532)	-1.290** (0.526)
Observations	5,001	5,001	4,180	4,180
R-squared	0.165	0.186	0.151	0.167
Number of firms	1,083	1,083	698	698
City controls	Yes	Yes	Yes	Yes
Leader controls	Yes	Yes	Yes	Yes
Firm controls	No	Yes	No	Yes
Firm fixed	Yes	Yes	Yes	Yes
City fixed	Yes	Yes	Yes	Yes
Industry-year fixed	Yes	Yes	Yes	Yes

Notes: Foreign, domestic, SOEs, and non-SOEs represent foreign firms, domestic firms, state-owned enterprises, and non-state-owned enterprises respectively. City controls include real GDP per capita, the share of secondary sector in total GDP, the share of tertiary sector in total GDP, government size, and population density; leader controls include age and education level of the prefectural secretary; firm controls include firm size, leverage, financial charges, ROA, management fees, and cash flows. Standard errors are clustered at firm level for all regressions and robust standard errors are applied. *** $p < 0.01$, ** $p < 0.05$, * $p < 0.1$.

Table 6. Impact of Political Turnover on Firm Tax Evasion: Small versus Large Firms

	Small firms		Large firms	
	(1)	(2)	(3)	(4)
Political turnover	-0.151 (0.579)	-0.083 (0.578)	-1.082* (0.610)	-1.251** (0.603)
City controls	Yes	Yes	Yes	Yes
Leader controls	Yes	Yes	Yes	Yes
Firm controls	No	Yes	No	Yes
Firm fixed	Yes	Yes	Yes	Yes
City fixed	Yes	Yes	Yes	Yes
Industry-year fixed	Yes	Yes	Yes	Yes
Observations	2,755	2,755	2,754	2,754
R-squared	0.180	0.195	0.205	0.227
Number of firms	589	589	434	434

Notes: City controls include real GDP per capita, the share of secondary sector in total GDP, the share of tertiary sector in total GDP, government size, and population density; leader controls include age and education level of the prefectural secretary; firm controls include firm size, leverage, financial charges, ROA, management fees, and cash flows. Standard errors are clustered at firm level for all regressions and robust standard errors are applied. *** p < 0.01, ** p < 0.05, * p < 0.1.

Table 7. Impact of Political Turnover on Firm Tax Evasion: Local versus Non-local

	Local		Non-local	
	(1)	(2)	(3)	(4)
Political turnover	-0.720 (0.531)	-0.745 (0.523)	-0.844* (0.487)	-0.914* (0.484)
City controls	Yes	Yes	Yes	Yes
Leader controls	Yes	Yes	Yes	Yes
Firm controls	No	Yes	No	Yes
Firm fixed	Yes	Yes	Yes	Yes
City fixed	Yes	Yes	Yes	Yes
Industry-year fixed	Yes	Yes	Yes	Yes
Observations	4,179	4,179	5,002	5,002
R-squared	0.159	0.186	0.162	0.171
Number of firms	1,100	1,100	1,252	1,252

Notes: “Local” represents those firms located in the city with a prefectural leader who was promoted within the city; “Non-local” represents those firms located in the city with a prefectural leader who was promoted outside the city. City controls include real GDP per capita, the share of secondary sector in total GDP, the share of tertiary sector in total GDP, government size, and population density; leader controls include age and education level of the prefectural secretary; firm controls include firm size, leverage, financial charges, ROA, management fees, and cash flows. Standard errors are clustered at firm level for all regressions and robust standard errors are applied. *** p < 0.01, ** p < 0.05, * p < 0.1.

Table 8. Impact of Political Turnover on Firm Tax Evasion: Firm Leaders' Political Ties

	Firm Leaders' Political Ties=1		Firm Leaders' Political Ties=0	
	(1)	(2)	(3)	(4)
Political turnover	-0.620 (0.466)	-0.585 (0.456)	-1.340*** (0.461)	-1.409*** (0.458)
City controls	Yes	Yes	Yes	Yes
Leader controls	Yes	Yes	Yes	Yes
Firm controls	No	Yes	No	Yes
Firm fixed	Yes	Yes	Yes	Yes
City fixed	Yes	Yes	Yes	Yes
Industry-year fixed	Yes	Yes	Yes	Yes
Observations	4,014	4,014	5,167	5,167
R-squared	0.165	0.189	0.150	0.166
Number of firms	976	976	1,154	1,154

Notes: "Firm Leaders' Political Ties=1" represents those firms whose chief leaders are former or current government bureaucrats; and "Firm Leaders' Political Ties=0" represents those firms whose chief leaders have never been government bureaucrats; City controls include real GDP per capita, the share of secondary sector in total GDP, the share of tertiary sector in total GDP, government size, and population density; leader controls include age and education level of the prefectural secretary; firm controls include firm size, leverage, financial charges, ROA, management fees, and cash flows. Standard errors are clustered at firm level for all regressions and robust standard errors are applied. *** p < 0.01, ** p < 0.05, * p < 0.1.

Appendix

Table A1. Description of Variables and Sources

Variable	Definition	Source
ETR	Effective tax rate on CIT, %	China Stock Market and Research (CSMAR) Database
STR	Statutory tax rate on CIT, %	CSMAR
Tax evasion	The difference between STR and ETR, %	Authors' calculation
Political turnover	=1 if turnover of the city secretary of the CCP secretary occurs; 0 otherwise	Database of Chinese leading cadres; Xinhua Net
Firm size	Total asset, log	CSMAR
Leverage	Ratio of debt to total asset, %	CSMAR
Financial charges	Ratio of financial charges to total asset, %	CSMAR
ROA	Ratio of total profit to total asset, %	CSMAR
Management fees	Ratio of management fees to total asset, %	CSMAR
Cash flows	Ratio of net cash flows to total asset, %	CSMAR
Real GDP per capita	Real GDP per capita, log	China Statistical Yearbook for Regional Economy
Share of the secondary sector in total GDP	Share of the secondary sector in GDP, %	China Statistical Yearbook for Regional Economy
Share of the tertiary sector in total GDP	Share of the tertiary sector in GDP, %	China Statistical Yearbook for Regional Economy
Government size	Ratio of population of civil servants and employees in public sectors to total population, %	China City Statistical Yearbook
Population density	Population density, per kilometer square, log	China Statistical Yearbook for Regional Economy
Age	The age of city secretary of the CCP	Database of Chinese leading cadres; Xinhua Net
Education	The education level of city secretary of the CCP	Database of Chinese leading cadres; Xinhua Net

Table A2. The Lagged Effects of Political Turnover on Firm Tax Evasion

	(1)	(2)	(3)	(4)	(5)	(6)
Political turnover, t-1	0.082 (0.301)	0.083 (0.297)				
Political turnover, t-2			0.071 (0.335)	0.083 (0.335)		
Political turnover, t-3					0.541 (0.418)	0.601 (0.415)
City controls	Yes	Yes	Yes	Yes	Yes	Yes
Leader controls	Yes	Yes	Yes	Yes	Yes	Yes
Firm controls	No	Yes	No	Yes	No	Yes
Firm fixed	Yes	Yes	Yes	Yes	Yes	Yes
City fixed	Yes	Yes	Yes	Yes	Yes	Yes
Industry-year fixed	Yes	Yes	Yes	Yes	Yes	Yes
Observations	9,181	9,181	9,181	9,181	9,181	9,181
R-squared	0.138	0.157	0.138	0.157	0.139	0.157
Number of firms	1,682	1,682	1,682	1,682	1,682	1,682

Notes: City controls include real GDP per capita, the share of secondary sector in total GDP, the share of tertiary sector in total GDP, government size, and population density; leader controls include age and education level of the prefectural secretary; firm controls include firm size, leverage, financial charges, ROA, management fees, and cash flows. Standard errors are clustered at firm level for all regressions and robust standard errors are applied. *** p < 0.01, ** p < 0.05, * p < 0.1.

Table A3. Impact of Political Turnover on Firm Tax Evasion: City Birth

	City Birth=1		City Birth=0	
	(1)	(2)	(3)	(4)
Political turnover	1.825 (3.870)	1.677 (3.556)	-0.736** (0.337)	-0.805** (0.332)
City controls	Yes	Yes	Yes	Yes
Leader controls	Yes	Yes	Yes	Yes
Firm controls	No	Yes	No	Yes
Firm fixed	Yes	Yes	Yes	Yes
City fixed	Yes	Yes	Yes	Yes
Industry-year fixed	Yes	Yes	Yes	Yes
Observations	469	469	8,707	8,707
R-squared	0.260	0.309	0.141	0.158
Number of firms	191	191	1,664	1,664

Notes: “City Birth=1” represents those firms located in the city with a prefectural leader who was born within the city; “City Birth=0” represents those firms located in the city with a prefectural leader who was born outside the city. City controls include real GDP per capita, the share of secondary sector in total GDP, the share of tertiary sector in total GDP, government size, and population density; leader controls include age and education level of the prefectural secretary; firm controls include firm size, leverage, financial charges, ROA, management fees, and cash flows. Standard errors are clustered at firm level for all regressions and robust standard errors are applied. *** p < 0.01, ** p < 0.05, * p < 0.1.