

Curses or Blessings: How Low Asset Mobility Helps Foreign Firms Gain Government Support *

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Abstract

Low asset mobility is often seen as undermining the bargaining power of foreign investors. This article advances an alternative view that emphasizes the positive effects of low asset mobility. I argue that governments favor foreign firms with lower mobility because their commitment to stay is always more credible. I present a formal model to illustrate how (1) governments' preference for economic gains and (2) investment competition intensity determine the political effect of asset mobility. I empirically evaluated my theoretical predictions using two studies in China. First, leveraging a change in enterprise income tax law in 2008, I used a difference-in-differences design to examine the effect of ex post asset mobility on government treatment. Second, I fielded an original survey of foreign firms' employees in China to test the theoretical mechanisms. My findings suggest that, on average, governments favor immobile foreign firms over their mobile peers. This study showed that the role of asset mobility in government–investor bargaining is more nuanced in this era of globalization.

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1 Introduction

A large body of literature argues that asset mobility is a fundamental constraint on states' extractive behavior (Bates and Lien 1985). The same insight has been used to explore the interaction between foreign investors and their host countries. Most notably, the obsolescing bargain model (Vernon 1971) assumes that the *ex post* immobility of investments makes foreign investors susceptible to expropriation and exploitation.

Scholars have made significant progress in understanding how different factors affect the severity of the obsolescing bargain problem. For example, domestic political institutions (Henisz 2000; Jensen 2003; Li, Resnick, et al. 2003; Pinto 2013; Beazer and Blake 2018), international institutions (Büthe and Milner 2008; Allee and Peinhardt 2011; Perlman and Sykes 2017), supply chain networks (Kobrin 1987; Johns and Wellhausen 2015), and investors' nationality (Wellhausen 2014) play significant roles in empowering foreign investors to protect their assets.

Built on these insights, this paper argues that low asset mobility helps foreign firms obtain better government treatment precisely because they are less likely to move their assets. The canonical theory is predicated on two assumptions: (1) the government has predatory preferences (i.e., the government shares little interest with foreign investors and thus always exploits), and (2) the government is not concerned with investors leaving after they receive preferential policies. I show that these crucial assumptions are not necessarily realistic.

First, foreign firms face what I term "the inverse credible commitment problem," whereby a firm usually cannot credibly commit to staying in a locality after receiving any policy. The government does not offer preferential treatment to firms that are unlikely to stay after receiving it. Suppose that the government is predatory and only offers preferential policies to prevent investment outflows. If the government believes that mobile firms would leave even after receiving preferential policies, it would instead offer the policies to immobile firms. This concern is especially relevant when competition for investment is intense. Intense investment competition exacerbates the inverse credible commitment problem and undermines governments' ability to prevent investment out-

flows. In this situation, the government rewards foreign investors' low asset mobility and commitment.

Second, I further examine the "predatory government assumption." I argue that many host governments share considerable interests with foreign firms when the governments intend to maximize economic gains instead of the extracted profit share. Governments attract foreign investments for economic gains (e.g., growth, employment, or wages). For example, according to PwC, the Brazilian government states that "foreign investment ... is welcome provided it represents a long-term commitment to economic development ..."¹ The government's strong preference for economic gains originates from politicians' desire to ensure political survival, in both democracies and non-democracies (Przeworski et al. 2000; Anderson 2000). Thus, governments offer preferential treatment to firms that deliver higher expected economic returns. As less mobile firms always have a lower propensity to leave, governments are more likely to favor them because of the increased probability of economic gains.

Therefore, the relationship between asset mobility and government treatment is not monotonic. In many realistic settings, low asset mobility helps foreign firms obtain preferential treatment. This study proposes a new perspective on the politics of foreign direct investment (FDI) and adds to the body of knowledge on asset mobility.²

Empirically, I conducted two studies to evaluate the theory: difference-in-differences analyses of foreign firms' tax treatment in China and an original survey of foreign firms' employees in China. China is one of the largest recipients of FDI in the world. Nevertheless, the Chinese government is powerful and unconstrained. According to existing theories, the Chinese government is likely to act in a predatory manner against foreign firms with low asset mobility.³ Hence, China is a suitable context for testing my theory vis-à-vis existing ones. Although I conduct the empirical analyses in China, I believe the theory

1. [The link to the report](#)

2. In principle, my theory is applicable to domestic firms, but I focus on foreign firms because (1) the credible commitment problem and the inverse credible commitment problem are both more salient when governments negotiate with foreign firms, and (2) domestic firms have more means to protect their assets or seek political influence, which often downplays the effects of asset mobility (Kim 2017; Truex 2014; Xu 2020).

3. Additionally, the political cost of firm exits is relevant to Chinese local governments, as waves of campaigns on "keeping investments." (安商稳商) have been launched.

applies to many other developing countries. For example, recent work by Bauerle Danzman and Slaski (2021) demonstrates a similar mechanism shapes governments-foreign investors bargaining in Latin America. I discuss the scope condition in more detail in [Section 5](#).

First, I adopted a difference-in-differences design that utilized a sweeping change in China's enterprise income tax system. On January 1, 2008, China enacted a new enterprise income law. The law made the FDI incentives that were previously offered by local governments illegal and replaced them with another set of incentives. In the early transition period (i.e., 2008), many foreign firms in China needed to renegotiate with local governments to determine their tax status under the new system. This window enabled me to observe the negotiation outcome between local governments and foreign firms that have incurred sunk costs. I found that firms with lower mobility were more likely to receive favorable tax treatment after the negotiations. Moreover, the magnitude of this effect increased with local investment competition intensity. Furthermore, I used placebo tests to demonstrate that this effect was not driven solely by political connections.

Next, I conducted my original survey of foreign firms' employees to unpack the causal mechanisms. First, I showed that the vast majority of foreign firms' employees in China perceived local governments to be non-predatory, supporting the underlying assumption of my key argument. Second, I replicated the key observational finding from my difference-in-differences analyses in an embedded survey experiment. I then demonstrated that respondents who believed that (1) local governments were non-predatory and that (2) local investment competition was more intense were more likely to agree with my theoretical mechanisms. Thus, both empirical studies revealed clear support for the benefits brought about by low asset mobility.

This project makes contributions to several influential strands of literature on international political economy. First, my theory contributes to one of the fundamental debates in political economy. Hirschman (1970) argues that investors with low asset mobility are more likely to engage in political activities, as it is less costly for them to choose the "voice" option than the "exit" option. However, Bates and Lien (1985) criticize this argument, questioning why governments would offer policy concessions to investors with

low asset mobility that cannot exit. My theory resolves this debate, showing that a government may care more about the voice of investors with lower asset mobility if the government has overlapping interests with the investors. It is worth noting that this logic also applies to the bargaining scenarios between states, as it echoes with the classic literature on reassurance (Kydd 2000).

Second, it provides a new perspective on the politics of FDI. I demonstrate how non-democratic regimes can become central economic players in an international economic system governed by a liberal political order without undergoing significant political change. The existing framework emphasizes institutional “veto points” as critical features for attracting consistent and long-term foreign investments (Tsebelis 1995; Henisz 2000; Jensen 2008; Li, Resnick, et al. 2003). My theory extends this framework by explaining why many foreign investors make immobile and long-term investments in countries without adequate institutional asset protection. The findings of this paper imply that governments that are not constrained by “veto players” can still credibly signal their unwillingness to exploit by attaching political survival to economic performance, which adds a crucial mechanism to our current understanding of FDI politics. Moreover, uncovering this mechanism helps reveal the economic and political challenges faced by the liberal international order.

Third, I explore how the macro-level changes in the global capital market affect the micro-level interactions between host governments and individual foreign firms. As the mobility of global capital increases considerably in the past decades (Garrett 1995; Quinn 1997; Basinger and Hallerberg 2004; Freeman and Quinn 2012), I argue that this structural change also alters the effect of firms’ asset mobility at the micro-level. Due to the high mobility of foreign firms, the inverse credible commitment becomes salient in government-investors bargaining. As a result, the role of asset mobility in such negotiations also fundamentally changes in this era of globalization.

Lastly, the study joins a burgeoning pool of literature that re-examines the role of asset mobility. Pond and Zafeiridou (2020) shows that the level of financialization moderates the effect of asset mobility. Johns and Wellhausen (2020) emphasizes that firm replaceability can explain government treatment of foreign firms better than can firms’ ability

to move. Bauerle Danzman and Slaski (2021) empirically demonstrate that host governments in Latin America offer foreign investors with lower mobility better treatment using investment deal data. Chen and Hollenbach (2021) present similar findings, namely that firms with lower asset mobility are more likely to form close relationships with governments in countries with poor rule of law. Adding to these important findings, I formalize a theory showing how asset mobility shapes government-investor relationships when host governments are non-predatory and seek to maximize economic gains. This new insight departs from the literature and provides a nuanced understanding of the role of asset mobility in government-investor bargaining.

2 Theory

2.1 Overview

In this section, I explain when and why host governments assign better policies to less mobile foreign investors. Following existing studies on asset mobility, the theory focuses on the case of taxation. However, the theory's implications apply equally to other government policies that display distributive effects among firms.

Firms with lower asset mobility are less likely to leave, but the political effects of asset mobility depend on government preferences and the structural environment. The canonical prediction, which views asset immobility as a liability, builds on two assumptions: (1) the government has predatory preferences—that is, the government has little overlapped interest with foreign firms and thus always exploits them—and (2) the government is not concerned with firms leaving after receiving preferential policies. I argue that these assumptions may prove too strong in reality. The predatory government assumption rules out governments' motivations to "invest" in the economy. However, the second assumption often exaggerates the effectiveness of government policies on foreign firms' exit decisions, as business decisions are usually affected by factors unobservable to governments. I show that the political effects of asset mobility differ significantly under alternative but realistic assumptions.

Foreign firms suffer from what I term the “inverse credible commitment problem.” Uncertainty in global political and economic systems prevents foreign firms from committing to staying in a locality. While host governments understand that better policies lower firms’ propensity to leave, they foresee the risk that firms may leave nonetheless. Regardless of its preference, a government is unlikely to offer preferential treatment to foreign firms that still leave after receiving the preferential policies. I suggest that this concern is relevant to many government types, including both predatory and non-predatory governments.

First, consider how the inverse credible commitment problem influences the decision-making of a predatory government. The government maximally taxes foreign investors whenever possible. It offers preferential treatment to prevent investor outflows. In the absence of the inverse credible commitment problem, the government does not need to consider the effectiveness of government preferential policies, as all firms stay in equilibrium. However, effectiveness is relevant when the inverse credible commitment is considered. If government preferential treatment is more effective at preventing less mobile firms from leaving, then the government would prioritize keeping firms with low asset mobility. I argue that tax effectiveness depends on investment competition intensity. Intense investment competition exacerbates the inverse credible commitment problem and undermines governments’ ability to prevent investor outflows. Because of the reduced effectiveness of government preferential policies, the government finds the promise of highly mobile firms increasingly less credible than that of firms with low mobility, as mobile firms always find outside offers more attractive. Eventually, the government secures more benefits from offering preferential policies to immobile firms, as doing so to mobile firms would be a waste.

Second, I explored the possibility that the government can be non-predatory. Suppose the host government maximizes economic gains instead of extracted profit shares. Numerous studies have demonstrated the significant economic benefits of foreign investments (Kugler 2006; Setzler and Tintelnot 2021) and the importance of economic growth for political survival in both democracies and non-democracies (Przeworski et al. 2000; Anderson 2000; Mesquita et al. 2005; Jiang 2018; Cao, Kostka, and Xu 2019). However, the

economic benefits of foreign investments (e.g., growth, employment, income) can be realized only if foreign investors stay in the local economy. For that reason, the host government rewards less mobile firms with better treatment. In this scenario, the host government offers preferential treatment either to improve local economic conditions through firm performance and agglomeration or to signal their political competence (Jensen and Malesky 2018).⁴ Analogously, when the host government has strong incentives to expropriate, the harm of expropriation on the local economy is less significant when more mobile firms are targets, as they deliver lower expected economic benefits. Hence, immobile foreign firms always obtain better government treatment than their mobile counterparts.

I formalize the theoretical intuition in the next subsection. Additional theoretical factors, such as clawback provisions, phased investments, firm bargaining power, reputation cost, and renegotiation, are further discussed in [Appendix B](#).

2.2 The Basic Model

The model provides a parsimonious benchmark against which readers can assess the canonical prediction. I present a basic model first, then add investment competition as an extension.

The basic model features one host government h and N tax-paying foreign firms operating in country h . First, the host government h chooses a tax rate $t_i \in [0, 1]$ for each of the N foreign firms. Then, nature draws an outside option D_i for each firm i from the same probability distribution. The uncertainty captures shocks in global political and economic systems (Keen and Marchand 1997; Rodrik and Ypersele 2001). After observing the tax rate t_i and the outside option D_i , each firm decides to stay or leave. This game structure resembles the classic hold-up problem (Grossman and Hart 1986; Carnegie 2014).

For simplicity, I assume that firms have the same productivity and obtain the same profit π . If a firm chooses to stay, it earns post-tax profit $(1 - t_i)\pi$; if it chooses to leave, it earns the outside option minus its exit cost $D_i - c_i$. Consistent with the literature, asset mobility is defined as the exit cost c_i (Kobrin 1984; Boix 2003). A higher exit cost signifies

4. Note that governments may still gain in tax revenue, as economic growth expands the tax base and increases taxable income.

lower asset mobility.

The host government h derives direct and indirect benefits from imposing the corporate tax rate t_i . A higher tax rate directly increases government revenue. However, a lower tax rate indirectly benefits the host governments by improving firm performance and facilitating agglomeration. Better firm performance brings both political and economic benefits, as better-performing firms create more employment opportunities, expand the tax base, boost economic growth, and signal the competence of politicians.

If firm i stays, the government's utility is captured by $g(t_i)$, which is a weighted average of the direct and indirect benefit.

$$g(t_i) = \alpha \cdot t_i \pi + (1 - \alpha) \cdot (b \cdot t_i + w)$$

where $\alpha \in [0, 1]$ is the weight the government attaches to the direct benefit $t_i \pi$ and $(1 - \alpha)$ is the weight it attaches to the indirect benefit $b \cdot t_i + w$. The parameter α is assumed exogenous, as the government's policy emphasis is determined by domestic, international, and historical factors. I assume the indirect benefit $b \cdot t_i + w$ decreases with t_i (i.e., $b < 0$): it reaches the maximum value w at $t_i = 0$ and the minimum value $b + w > 0$ at $t_i = 1$.

A larger (smaller) α suggests that the government values the direct (indirect) benefit more. Hence, the government has more predatory preferences when α increases. Define the cutoff α^* as

$$\alpha^* \equiv \frac{b}{b - \pi}$$

Notice that $g(t_i)$ increases in t_i when $\alpha > \alpha^*$ (i.e., predatory) but decreases in t_i when $\alpha < \alpha^*$ (i.e., non-predatory).

As the government receives no benefit from a firm if it leaves, the government's objective function is the expected utility of imposing a tax rate vector $\mathbf{t} = (t_1, t_2, \dots, t_N)$:

$$G(\mathbf{t}) = \sum_{i=1}^N g(t_i) p(t_i, c_i)$$

where $p(t_i, c_i)$ denotes the probability of firm i staying. It follows from the firm calcula-

tions that the probability decreases with a higher tax rate t_i but increases with a higher exit cost c_i .

However, the host government has limited policy tools. I impose a budget constraint on the host government $h : \sum t_i \pi \geq R$. Note that this is a constraint in the available policy tools. There are two possible interpretations of the constraint.

First, readers can interpret it as a minimal expropriation level. Suppose the host government must increase tax rates on foreign firms *ex post* in response to political pressure. The tax increase level is lower bounded by R but can exceed R . This mirrors the reality in which governments expropriate foreign firms for political gains.

Second, it can be interpreted as host governments having an incentive program with a predetermined size. The tax reduction level of the program is upper bounded by $N\pi - R$ (i.e., the difference between imposing $t_i = 1$ on all firms and R). It captures the intuition that preferential policies are deemed limited resources. Previous research demonstrates the significant economic, political, and social costs of maintaining an incentive program (Zee, Stotsky, and Ley 2002; Christiansen, Oman, and Charlton 2003). Favoring certain firms, especially foreign ones, often leads to political backlash.

Notably, this is not a strong constraint, as bound R can be small. For a very small R , the constraint implies only that the government cannot offer $t_i = 0$ to all firms. The constraint simulates an environment in which the host government compares firms and chooses the most qualified ones.

To simplify the analyses, I make two additional assumptions.

1. I assume $\alpha \neq \alpha^*$ to avoid unrealistic corner solutions.
2. Shocks are drawn independently from $\text{Unif}[0, \bar{D}]$.

2.2.1 Predatory Governments: $\alpha > \alpha^*$

When $\alpha > \alpha^*$, I re-write $g(t_i)$ as $g(t_i) \equiv t_i \cdot \tilde{\pi} + (1 - \alpha) \cdot w$, where $\tilde{\pi} \equiv \alpha \cdot \pi + (1 - \alpha) \cdot b > 0$. This payoff structure captures the predatory government assumption, as the government always prefers higher tax rates.

The host government h solves the following optimization problem:

$$\begin{aligned} \max_{t_1, t_2, \dots, t_N} \quad & G(\mathbf{t}) = \sum_{i=1}^N (t_i \cdot \tilde{\pi} + (1 - \alpha) \cdot w) \cdot p(t_i, c_i) \\ \text{s.t.} \quad & \sum_{i=1}^N t_i \cdot \pi \geq R \end{aligned}$$

Whether the constraint binds or not, firms with higher asset mobility receive lower tax rates in equilibrium, a result consistent with the canonical literature.

Lemma 2.1. *When the host government h is predatory ($\alpha > \alpha^*$), it imposes lower tax rates on firms with higher asset mobility.*

Proof. See [Appendix A.1](#) □

If the constraint does not bind, the calculation is the same as it is in the canonical setup. If the constraint binds, decreasing one firm's tax rate must imply increasing the tax rates of other firms. The government needs to decide which firms return the maximum benefit after receiving reduced tax rates.

Notice that the cross-partial derivative is positive:

$$\frac{\partial^2 G(\mathbf{t})}{\partial t_i \partial c_i} = \frac{\tilde{\pi}}{D} > 0$$

This implies that it is less harmful to increase the tax rates of less mobile firms than of more mobile firms. Thus, when constrained, the government always increases the tax rates of immobile firms first.

Therefore, the canonical prediction holds under this setup.

2.2.2 Supportive Governments: $\alpha < \alpha^*$

When $\alpha < \alpha^*$, the host government sufficiently values the indirect benefit. I rewrite $g(t_i)$ as $g(t_i) \equiv \tilde{b} \cdot t_i + (1 - \alpha) \cdot w$, where $\tilde{b} \equiv \alpha \cdot \pi + (1 - \alpha) \cdot b < 0$. Such a government is non-predatory (or supportive), as it prefers lower tax rates.

A supportive government solves the following optimization problem:

$$\begin{aligned} \max_{t_1, t_2, \dots, t_N} \quad & G(\mathbf{t}) = \sum_{i=1}^N (\tilde{b} \cdot t_i + (1 - \alpha) \cdot w) \cdot p(t_i, c_i) \\ \text{s.t.} \quad & \sum_{i=1}^N t_i \cdot \pi \geq R \end{aligned}$$

As the government offers the lowest possible tax rates, it implies that the constraint must bind.

Proposition 2.2. *A supportive government ($\alpha < \alpha^*$) offers firms with lower asset mobility lower tax rates.*

Proof. See [Appendix A.2](#). □

Note that the cross-partial derivative is negative in this case:

$$\frac{\partial^2 G(\mathbf{t})}{\partial t_i \partial c_i} = \frac{\tilde{b}}{D} < 0$$

This implies that it is less harmful to increase the tax rates of *more* mobile firms than of less mobile firms. Therefore, the government increases the tax rates of mobile firms first when constrained. In equilibrium, less mobile firms receive lower tax rates.

It is easy to see that the sign of the cross-partial derivative determines the equilibrium tax allocation under the binding constraint. In this case, the sign depends on $\tilde{b} = \tilde{\pi} \equiv \alpha \cdot \pi + (1 - \alpha) \cdot b$, whose sign depends on the weight α . Whenever the government sufficiently values the indirect benefit (i.e., $\alpha < \alpha^*$), it favors immobile firms.

2.3 Extension: Competition for Investments

This subsection explores how investment competition introduces differential effects on mobile and immobile firms.

Consider M countries competing for N firms operating in host country h . First, the host government h chooses a tax rate t_i for each of the N foreign firms. Then, in each of the M investment-seeking countries, nature draws N product-specific shocks. I assume

that each firm i produces one differentiated product. The M countries subsequently make an offer to each of the N firms. Lastly, observing the outside offer and the tax rate, each firm decides to stay or leave.

In this setting, the uncertainty originates from both the shocks and the competing countries' strategies. Denote D_{jk} as the shock to product k in country j , where $k \in \{1, 2, \dots, N\}$ and $j \in \{1, 2, \dots, M\}$. The shock D_{jk} exogenously changes country j 's private valuation of firm k . This setup captures how economic, political, or technological shocks change governments' preferences for foreign investments. The size of the shocks is private information. For simplicity, I again assume shocks are drawn independently from $\text{Unif}[0, \bar{D}]$.

The M countries engage in a first-price auction. Each firm compares the highest offer with its post-tax profit plus exit cost and decides whether to take the offer. The auction theory literature establishes that all bidders employing a strictly increasing and continuous bidding strategy constitute a symmetric equilibrium (Milgrom 2004). I denote this symmetric equilibrium bidding strategy as $e(\cdot)$.

Firm i takes the outside offer if and only if it is at least $(1 - t_i) \cdot \pi + c_i$. Define the cutoff shock size as

$$K_i^* = e^{-1}[(1 - t_i) \cdot \pi + c_i]$$

As the bidding strategy $e(\cdot)$ is strictly increasing, a country that receives a shock larger than K_i^* bids higher than $(1 - t_i) \cdot \pi + c_i$. Thus, firm i stays if and only if none of the M shocks exceeds K_i^* . Denote the probability that a shock is *less* than K_i^* by $p(t_i, c_i)$. Hence, the probability of firm i staying is $p(t_i, c_i)^M$ (i.e., none of the M shocks exceeds K_i^*).

2.3.1 Predatory Governments: $\alpha > \alpha^*$

The government h maximizes the expected utility:

$$\begin{aligned} \max_{t_1, t_2, \dots, t_N} \quad & G(\mathbf{t}) = \sum_{i=1}^N (t_i \cdot \tilde{\pi} + (1 - \alpha) \cdot w) \cdot p(t_i, c_i)^M \\ \text{s.t.} \quad & \sum_{i=1}^N t_i \cdot \pi \geq R \end{aligned}$$

The government becomes more reluctant to increase tax rates under more intense competition. There is a cutoff competition level M_i for each firm, above which the government prefers to offer $t_i = 0$ to firm i . Therefore, the average tax rate decreases when the competition intensifies, which is consistent with the “race to the bottom” hypothesis. The constraint must bind under sufficiently large M .

Note again that the cross-partial derivative $\partial^2 G(\mathbf{t}) / \partial t_i \partial c_i$ becomes negative for sufficiently large M , because the effect of lowering tax rates on preventing firms’ exit shrinks faster for more mobile firms. When competition intensifies, the government h views lowering mobile firms’ tax rates as futile, as its ability to prevent investment outflows is significantly weakened. Therefore, as long as the host government cannot offer all firms $t_i = 0$, it strictly prefer immobile firms.

The following proposition summarizes this result.

Proposition 2.3. *There exists M^* such that for all $M > M^*$, the host government offers firms with lower asset mobility lower tax rates, even when the government is predatory ($\alpha > \alpha^*$).*

Proof. See [Appendix A.3](#). □

2.3.2 Supportive Governments: $\alpha < \alpha^*$

It is readily observed that increasing M does not change a supportive government’s calculations, as 1) the constraint always binds for all $M \geq 1$ and 2) the government objective function has a negative cross-partial derivative for all $M \geq 1$.

Corollary 2.4. *A supportive host government always offers less mobile firms lower tax rates than it offers more mobile firms regardless of competition levels.*

Proof. See [Appendix A.4](#)

□

2.4 Empirical Implications

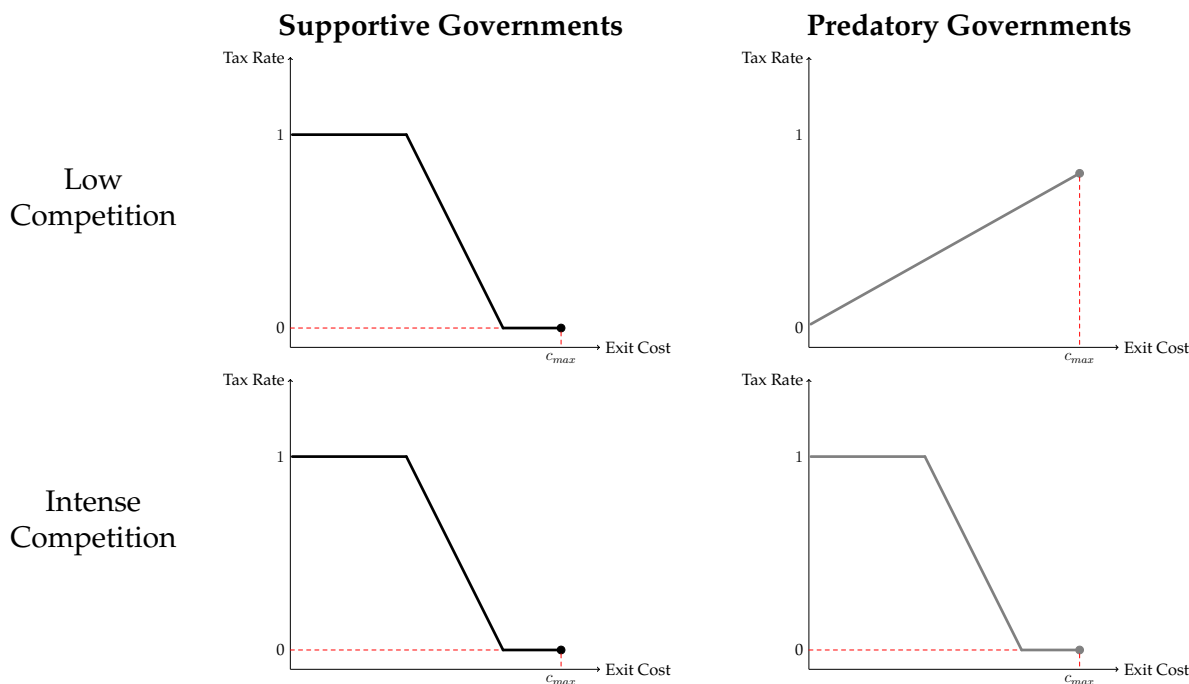


Figure 1: Empirical Predictions

The model's predictions are summarized in [Figure 1](#). The horizontal axis measures the exit cost—a larger exit cost represents lower asset mobility. The vertical axis is the equilibrium tax rate.

The left column summarizes the behavior of a supportive government under different competition levels. Regardless of the competition intensity, the host government favors firms with a larger exit cost ([Proposition 2.2](#) and [Corollary 2.4](#)).

The right column demonstrates a predatory government's behavior. When the competition level is low, the government exploits firms with low asset mobility ([Lemma 2.1](#)); when the competition is intense, the government behaves as if it is a supportive government ([Proposition 2.3](#)). It is evident that high asset mobility is beneficial only when the government is predatory and the competition level is low. In any other scenario, at least some firms with low asset mobility receive equally good or better policies than their mobile counterparts.

To systemically evaluate the theory, I propose three hypotheses. The first test is for the overall effect of asset mobility on government treatment. In contrast to the canonical arguments, my theory predicts that asset immobility has a positive effect. Whether the positive effect can be observed in reality depends on the proportion of supportive governments and the average competition levels. A test of the overall effect evaluates whether less mobile firms are treated better on average than more mobile firms. A positive result would suggest the existence of my proposed mechanism. Note that my inability to identify different theoretical scenarios makes it more difficult to find a monotonic effect of asset mobility, as different combinations of government types and competition levels may introduce non-monotonic relationships.

Hypothesis 1 (Overall). *On average, foreign firms with lower asset mobility receive better government treatment.*

It needs to be acknowledged that several recent research also shows that lower asset mobility is associated with better government treatment (e.g., Pond and Zafeiridou (2020) and Chen and Hollenbach (2021)). While agreeing with their theoretical and empirical findings, I emphasize that a key distinction between my theory and theirs is that I depart from the canonical assumption that low asset mobility renders firms vulnerable because governments seek to exploit them. I argue that governments do not always have a predatory preference which implies that low asset mobility is not a liability in many realistic settings. Empirically, I address this issue more carefully in [Section 3.7](#). Moreover, I present survey evidence in [Section 4](#) to demonstrate that the non-predatory government preference is common.

Next, I specifically test the relationship between asset mobility and government treatment under a non-predatory government. As formalizing the non-predatory government type is a major contribution of my theory, and as I predict that non-predatory governments always treat foreign firms with lower asset mobility better regardless of investment competition intensity, the proposed effect should be most pronounced in this scenario.

Hypothesis 2 (Government Type). *When the host government has a non-predatory preference, foreign firms with lower asset mobility will receive better government treatment.*

Lastly, recall that competition for investments exacerbates the inverse credible commitment problem and forces governments to reward investors with low asset mobility. Governments of different types behave distinctly differently under low investment competition intensity. However, their behaviors are more homogeneous when the intensity of investment competition increases.

Hypothesis 3 (Competition). *When intergovernmental competition for investments is more intense, foreign firms with lower asset mobility will receive better government treatment.*

I used two empirical studies to test the theory's predictions and its mechanisms. First, I used a difference-in-differences design to examine the negotiation outcome between Chinese local governments and foreign firms that have sunk investments in China. In [Section 3](#), I show that foreign firms with lower asset mobility are granted better tax treatment after the negotiation, which strongly supports [Hypothesis 1](#). Next, I find support for [Hypothesis 3](#) by demonstrating that the treatment of low mobility firms over high mobility firms is better in regions with more intense investment competitions.

Second, I fielded an original survey of foreign firms' employees in China to collect evidence on the mechanisms. I replicated my observational findings in a pre-registered experiment embedded in the survey: When learning about a hypothetical foreign firm, respondents reported that the firm with lower asset mobility was more likely to obtain the favor of the government ([Hypothesis 1](#)). Moreover, I use survey questions to show (1) that the vast majority of respondents perceive local governments as non-predatory, and (2) that their belief in the treatment of low asset mobility firms depend on the perceived government type and the investment competition intensity, which lend supports for [Hypothesis 2](#) and [Hypothesis 3](#).

3 Study 1: Difference-in-Differences Analysis of Government Treatment of Foreign Firms in China

Utilizing a sweeping change in the Chinese corporate income tax system in 2008, I employed a difference-in-differences design to verify whether local governments in China

grant better treatment to foreign firms with lower asset mobility. I showed that foreign firms with lower *ex post* mobility pay significantly less income tax after local governments and foreign firms negotiate tax treatment under the new tax law. Moreover, my results demonstrate that the effects become stronger in areas where local governments face more intense investment competition.

3.1 China's 2008 Enterprise Income Tax Law

On March 16, 2007, the National People's Congress of China passed the "Enterprise Income Tax Law," which became effective on January 1, 2008. The new corporate income tax law entailed two significant changes in the tax system: (1) the statutory tax rate was set at 25% for all firms, domestic or foreign (compared with the previous 33%); and (2) the new law replaced FDI-exclusive incentives with a new set of incentives available to both domestic and foreign firms.

Although the new law proposed a lower statutory tax rate, these sweeping changes and the early ambiguity of the law enabled local governments to renegotiate tax treatment with foreign firms that have made significant sunk investments. On the one hand, the ambiguity of the new law allowed disputes to arise when foreign firms disagreed with local governments regarding whether their previously negotiated tax contracts were still legal. On the other hand, incumbent foreign firms needed to negotiate with local governments concerning their eligibility for the new incentives.

First, although the central government urged local governments to respect any existing agreements signed with foreign firms, numerous disputes between local governments and foreign firms still arose, mostly due to ambiguities in the new law.⁵ For example, the rules regarding how to deduct expenses for employee pension and medical insurance were not published until March 2009 (Figure C.15). However, the central government required all local governments to adopt this standard from January 2008. Similar delays

5. In addition, the central government allowed existing foreign firms that enjoyed FDI incentives to have a five-year grace period before paying the 25% tax rate. However, there were three major problems in the implementation process: (1) some rules on how to calculate tax bases were significantly delayed, (2) there were conflicts between new and existing policies, and (3) the eligibility criteria for new incentives were unclear. I present additional evidence later in this section to show that there are even disputes on whether the five-year grace period applies to a firm

can also be found in other areas of the law, all of which caused significant implementation discrepancies. As I confirmed in interviews with local Chinese officials, there were also cases in which local governments in 2008 claimed that previously negotiated preferential tax agreements with foreign firms were illegal and refused to honor the agreements.⁶

Second, an expanded set of incentives, which replaced the FDI-exclusive incentives, were made available to domestic and foreign firms. The new incentives entailed detailed requirements on the eligibility of firms and thus careful government review. For example, the Chinese government publishes categories of equipment whose cost can be deducted from the tax base of firms.⁷ Another famous tax incentive program is the high and new tech enterprises program. To be eligible for the program, a firm needs to undergo a government review process in which local governments carefully examine the firm's portfolio. However, due to the rather ambiguous criteria in the early implementation stage, many foreign firms have publicly voiced their concerns over the uncertainty and unfairness of local government implementation of the program.⁸

The early ambiguity of the law and its rather chaotic implementation process have been well documented by Chinese scholars (e.g., Wang (2009)). Moreover, I verify their findings by quantifying the laws and official documents issued by local governments regarding the new corporate income tax. In [Figure 2](#), I show the number of laws and documents issued by local governments in China concerning corporate income tax between 2005 and 2011.⁹ It is evident that the number of laws and documents increases rapidly after 2006 and decrease sharply after 2009, peaking in 2008.

The content of such laws and documents ranges from local implementation rules of the new corporate tax law to the government's official responses regarding whether an individual firm is qualified for a tax incentive. For example, on June 2, 2008, the government of Guangdong province offered an official response to Dongfeng-Honda, a Japan-China joint venture, about whether it was qualified for the preferential tax rate during the five-

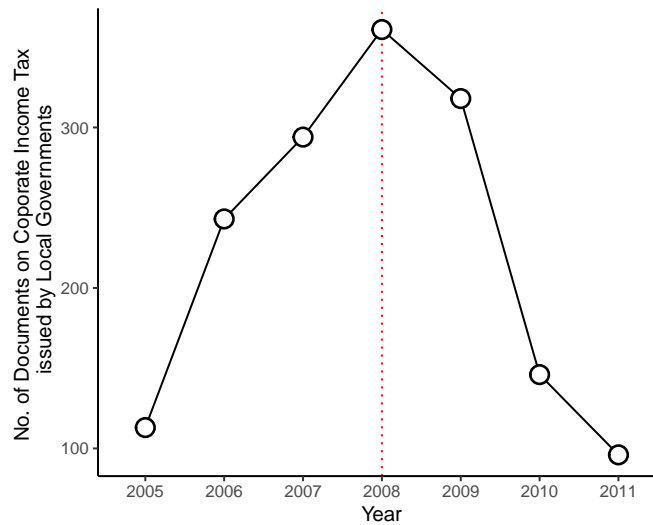
6. I received this information from interviews with five local officials from two cities in eastern China where foreign firms are concentrated.

7. See [the official government document](#)

8. See [a news report from a Chinese media](#)

9. I search the keyword "corporate income tax" in the PKU Law database, which is a comprehensive database that includes documents and laws issued by local governments in China.

Figure 2: Number of Local Government Documents on Corporate Income Tax, 2005-2011



year transition period. In the official response, the government denied Honda the preferential tax rate.¹⁰ Therefore, these temporal patterns of local government documents are consistent with my argument that the new law is unclear on the detailed implementation rules in the early implementation stage, as many local governments find it necessary to make their local rules public and, at the same time, solve disputes with incumbent firms.

As a result, these changes in the corporate tax system provide a unique window to test my theory vis-à-vis existing theories. The law change allowed me to observe how host governments negotiated with foreign firms that incurred significant sunk costs in a period when the old rules were outdated but the new rules were ambiguous. Thus, I argue that the negotiation outcome during this time window should at least partially reflect local governments' preferences. If the governments favor foreign investors with low *ex post* mobility, we should observe that less mobile firms are more likely to receive better tax treatment under the new law. Otherwise, we should observe the opposite.

This identification strategy is suitable from two major aspects. First, it matches the setup of the theory. Incumbent foreign firms need to negotiate with Chinese governments after making sunk costs. Second, the empirical design addresses the problem of reverse causality related to *ex ante* bargaining. If foreign firms condition their investments on the tax treatment they receive, then the direction of causality is unclear. As I analyze firms

10. Additionally, I present a shortlist of similar cases in [Figure C.16](#)

that made their investments at least two years before the law change, it is unlikely that the tax treatment they received in 2008 would have significantly influenced their entry decisions.

It should be acknowledged that this strategy fails to account for heterogeneity between firms with high and low asset mobility. However, I seek to address this issue by using a rich set of covariates and a difference-in-differences design. Moreover, I present evidence from a survey experiment in [Section 4](#) that further addresses endogeneity issues.

3.2 Statistical Models

Suppose the amount of tax a firm i needs to pay in year t is

$$\begin{aligned} \text{Tax}_{i,t} = & c_i + \alpha_t + \delta \cdot \text{Asset Mobility}_i + \eta \cdot \mathbb{1}\{t = 2008\} \cdot \text{Asset Mobility}_i + \beta \cdot X_{i,t} \\ & + \gamma \cdot Z_{i,t-1} + \epsilon_{i,t} \end{aligned} \quad (1)$$

This model assumes that the amount of tax that a firm pays is a function of asset mobility and other factors. Before 2008 (i.e., $t \neq 2008$), the effect of asset mobility on the amount of tax that a firm pays is δ . However, after the new tax law became effective in 2008, there is an additional effect of asset mobility η caused by the (re)negotiation between incumbent foreign firms and local governments. For example, due to the (re)negotiations, firms may need to pay more or less tax even though asset mobility does not change. Local governments may favor firms with higher (or lower) asset mobility, and therefore, we would expect firms with different levels of asset mobility to experience different levels of changes (captured by the value of η). If my theory is correct, η should be positive (i.e., higher asset mobility is associated with higher additional taxation). Otherwise, η should be negative.¹¹

The parameters c_i and α_t capture time-invariant confounders and a common time

11. I assume that the amount of tax a firm pays measures government treatment. This measurement strategy, while having flaws, is consistent with political science studies (Jensen 2013; Pond and Zafeiridou 2020; Johns and Wellhausen 2020) and business studies (Huang and Tang 2018). Notably, Huang and Tang (2018) argues that the tax amount captures the government's favorable treatment in China, as state-owned enterprises always pay less in taxes than other firms do.

trend. Asset mobility is assumed to remain constant in short time windows (e.g., from 2007 to 2008). Hence, asset mobility varies only at the firm level but not across years. I include contemporaneous and lagged covariates $X_{i,t}$ and $Z_{i,t-1}$ to account for firm heterogeneity.

To identify η , I use a first difference strategy:

$$\Delta_t \text{Tax}_i = \eta \cdot \mathbb{1}\{t = 2008\} \cdot \text{Asset Mobility}_i + \beta \cdot \Delta_t X_i + \gamma \cdot \Delta_{t-1} Z_i + \Delta_t \alpha + \epsilon_i \quad (2)$$

The model cannot identify δ , which is the effect of asset mobility on tax amount before the tax change, because it is canceled out by taking the first difference. In addition, the error term is the same as the independent and identically distributed error in a cross-sectional setting, even if we assume a Markov process between $\epsilon_{i,t}$ and $\epsilon_{i,t+1}$ that allows for temporal correlations.

3.3 Data

I rely on the Chinese Industrial Enterprises Database for firm-level financial information. The database covers all manufacturing firms with sales above 5 million RMB (700,000 USD) from 1998 to 2013. It is estimated that the database covers about 85–90% value added in most manufacturing industries in China and serves as a foundation for the central government’s GDP calculation (Brandt, Van Biesebroeck, and Zhang 2012). The database includes both firm registration and financial performance information.¹²

The sample is restricted to wholly foreign-owned enterprises. I exclude joint ventures and investors from Hong Kong, Macau, and Taiwan to address the potential confounding effect of political connections. To build a panel dataset, I include only firms that stayed in the database from 2006 to 2008 ($N = 9,940$).

The main analysis is complemented with analyses of heterogeneous treatment effects and additional robustness tests using data from other sources. I present detailed explanations of the additional data sources when needed.

12. Economists have raised concerns about the data quality after 2008 (Hsieh and Klenow 2009; Liu and Lu 2015; Gao and Van Biesebroeck 2014; Brandt, Van Biesebroeck, and Zhang 2012, 2014). For that reason, I exclude data from 2009 to 2013.

3.4 Measurement and Covariates

To measure asset mobility, I use the fixed asset ratio:

$$\text{Asset Mobility}_{i,t} = 1 - \frac{\text{Fixed Asset}_{i,t}}{\text{Total Asset}_{i,t}}$$

A *higher* fixed asset ratio signifies *lower* asset mobility. This measurement strategy is similar to recent work by Pond and Zafeiridou (2020) and Chen and Hollenbach (2021).

I categorize asset mobility into high, medium, and low. The analyses compare only firms with high and low asset mobility. Hence, the results are the average difference in tax treatment between foreign firms with high and low mobility. I choose this approach to address the non-linear relationship explained in [Subsection 2.4](#). Since we cannot observe government types and cutoff competition levels using this data, it is not feasible to precisely test the relationship under different scenarios. The inability to measure these important model parameters hinders my ability to find a linear effect. The proposed procedure partially circumvents this hurdle by focusing on the average tax treatment of mobile and immobile firms.¹³ Notably, the test would return strong negative effects if the canonical theory prevails.

When choosing cutoffs to categorize firms, I use the 30th quantile and 60th quantile in the main analysis; that is, firms whose asset mobility is below the 30th quantile are coded as low; firms between the 30th and 60th quantile are coded as medium; and firms above the 60th quantile are coded as high. Readers may be concerned with this arbitrary choice of cutoffs. I show in [Appendix D.3](#) that the results remain unchanged even if I randomly sample 100 cutoffs.

The dependent variable is the amount of taxes that firm i owes in year t . It is a function of firm profits, government incentives, and other financial factors. The effect of the statutory tax rate is absorbed into the profit coefficient. In addition, I include a rich set of firm-level covariates to simulate the data-generating process. The included variables are profit, debt, number of employees, revenue, main production cost, inventory, export

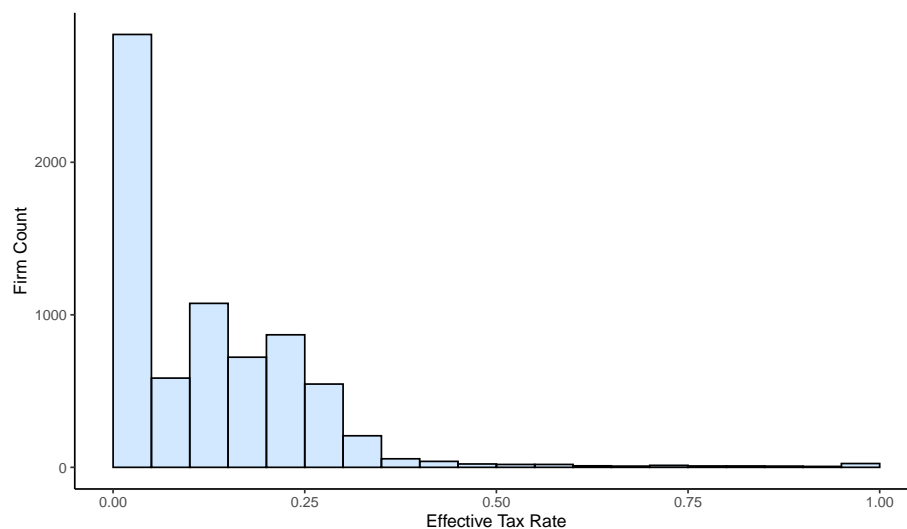
13. Results using alternative measurements are presented in [Appendix D.1](#).

amount, and lagged debt.¹⁴

3.5 Main Results

Figure 3 visualizes the distribution of foreign firm effective tax rates in 2008. Effective tax rates are calculated by dividing tax by profit. Many foreign firms in the sample do not pay any income tax.¹⁵ Hence, the figure demonstrates that there is substantial variation in tax treatment enjoyed by foreign firms.

Figure 3: Distribution of Foreign Firms' Effective Tax Rates in 2008



Note: this figure presents the empirical distribution of foreign firms' effective tax rates. Tax rates are calculated by dividing tax by profit. Most foreign firms do not pay any income tax. Around 4% (394) of firms have effective tax rates that are negative or higher than 1. I exclude these firms from the graph for illustration purposes but keep them in the main analyses. In [Appendix D.5](#), I show that the results are robust to exclusion of these observations.

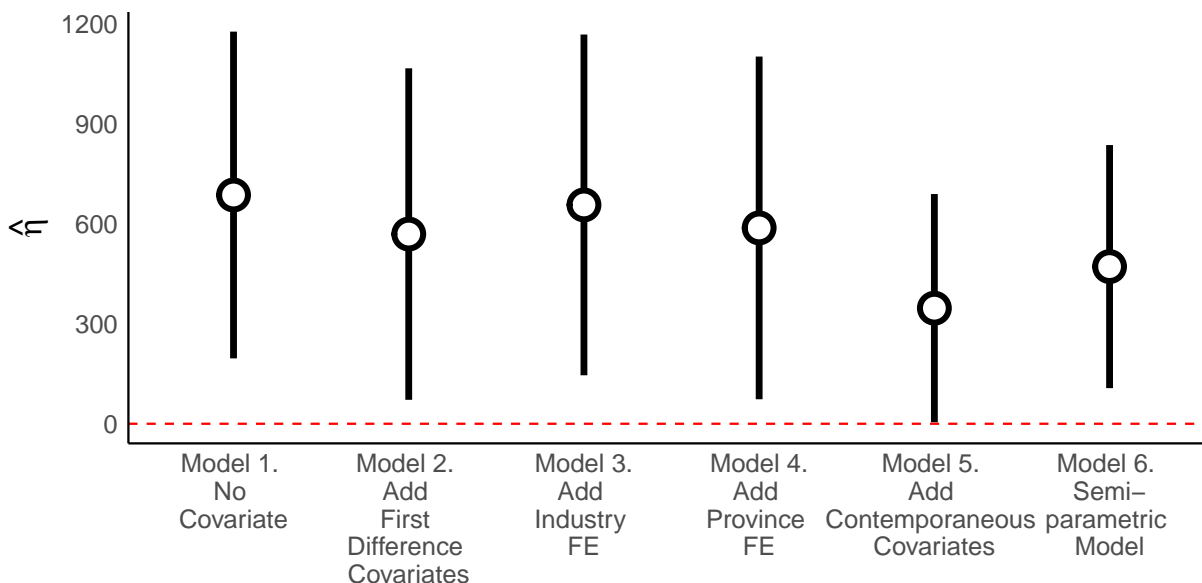
The main results are included in **Figure 4**. All the models use robust standard errors clustered at the prefecture level. The dots in the figure are point estimates of the asset mobility coefficients (i.e., $\hat{\eta}$) using 2007–2008 data. The error bars are the 95% confidence intervals. Model 1 includes only asset mobility as the covariate. Then, I add other covari-

14. The literature has demonstrated that using the tax amount is valid (Jensen 2013; Pond and Zafeiridou 2020). I use the amount of taxes instead of the effective tax rate because effective tax rates have poor fit with linear models as it is constrained between 0 and 1.

15. A small number of firms pay a tax rate above 50%. From an accounting standpoint, these are cases in which 1) certain costs are deducted from profits but are still taxable or 2) firms pay deferred tax.

ates in the first-difference form in model 2. In model 3, industry fixed effect is included. Province fixed effect is introduced in model 4.

Figure 4: Main Results (2008)

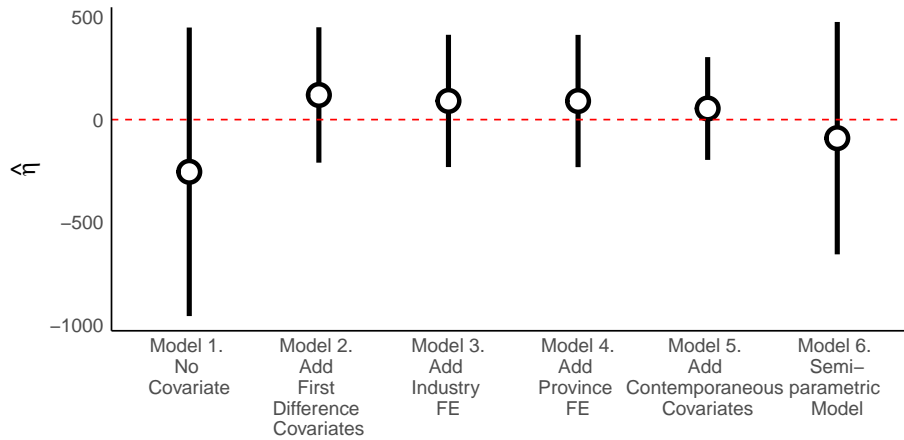


Note: this figure presents the results of seven regression models. The dots are point estimates and the bars are 95% confidence intervals. The full regression table is in [Table E.6](#).

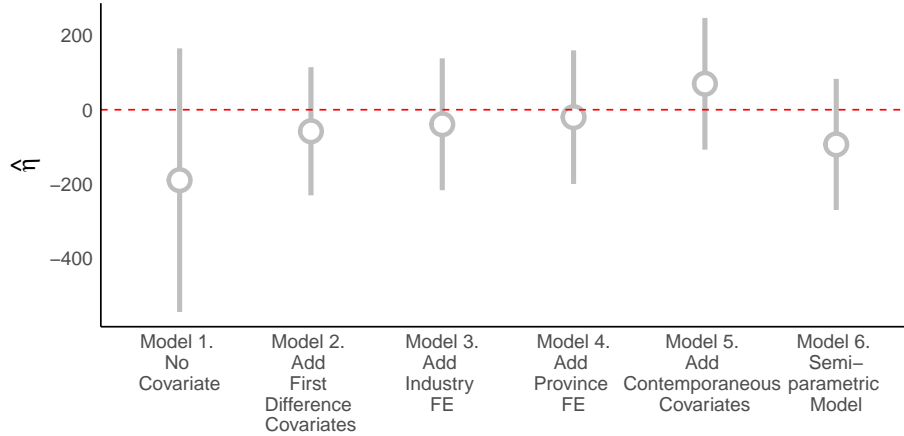
Model 5 includes additional contemporaneous covariates (i.e., firm data in 2008), allowing the effects of these variables to change across years. This is a reasonable choice if these variables' coefficients change between 2007 and 2008. For instance, since the statutory tax rate changes after 2008, the effect of profit on the paid tax amount should also change. Hence, I allow financial variables directly related to income tax, such as profit, debt, and exports, to have time-varying coefficients in model 5.

Model 6 further relaxes the linearity assumption. The double machine learning estimator proposed by Chernozhukov et al. (2018) allows estimation of causal quantities while avoiding the assumptions of model specifications. The model not only accounts for linear relationships between covariates and the outcome, but it also controls for any non-linear relationship between them. Therefore, I can control for unobserved non-linear relationships between the tax amount and the covariates (e.g., non-linear relationships between tax and profit).

Figure 5: Placebo Results (2006 and 2007)



(a) Placebo: 2007 Results



(b) Placebo: 2006 Results

Note: this figure presents the results of two placebo tests. The dots are point estimates and the error bars are 95% confidence intervals. The full regression tables are in [Table E.7](#) and [Table E.8](#).

Figure 4 shows that the effect of asset mobility is consistently positive and statistically significant. The findings provide empirical support for **Hypothesis 1** that firms with lower asset mobility pay less income tax on average, *ceteris paribus*. In 2008, foreign firms with low asset mobility paid on average around 42,000 USD less additional tax than did those with high asset mobility, while controlling for observable firm characteristics and unobservable time-invariant confounders.

The validity of the results relies on the parallel trend assumption; that is, firms with high and low asset mobility would experience similar changes in tax if there were no

change in the tax law. I propose two placebo tests to evaluate this assumption. I run the same models using 2006–2007 and 2005–2006 data. Because the new corporate tax law did not become effective until 2008, there should be no effects using pre-2008 data.

Figure 5 presents the placebo results. None of the models return significant point estimates. Some of the coefficients are in the opposite direction. This increases our confidence in the validity of the main results. Moreover, one may be concerned with the difference in baseline tax treatment between high and low asset mobility firms, as my models only identify the *change* in tax caused by asset mobility. If foreign firms with higher asset mobility pay less income tax prior to the law change, my results can be driven by purely mechanical reasons. I address this issue in detail in **Appendix D.6**. Lastly, I also use the covariate balancing propensity score (Imai and Ratkovic 2014) to achieve covariate balance between firms with high and low asset mobility, and the results remain unchanged (see **Appendix D.4**). In **Appendix D.2**, I show that the results are robust when I perform the main and placebo analyses using the same set of firms.

3.6 Heterogeneous Effects: Competition

Hypothesis 3 postulates that governments are more likely to treat immobile firms better under more intense intergovernmental competition. I use within-China political competition to approximate local government competition for investments. Numerous studies have shown that local economic performance has a significant impact on the career prospects of local Chinese leaders (Lü and Landry 2014; Jiang 2018). Therefore, more intense political competition among local leaders implies more intense competition for investments. Meanwhile, local competition for foreign investments is highly correlated with the global climate of foreign investments. Investment competition among different countries exerts significant pressure on local governments. For these reasons, I use local political competition in China to approximate competition for investments.

I follow the approach of Lü and Landry (2014) to measure intergovernmental competition. The authors show that the number of prefectural governments in the same province is positively correlated with inter-governmental competition. Local leaders in China are

considered for promotion by upper-level officials. For example, government officials at the prefecture level are considered for provincial-level leadership positions by the provincial or national governments. Since the number of available positions decreases as the rank rises, many candidates are usually considered for the same position. As a result, political competition becomes increasingly fierce as more candidates are considered.

I refine this measurement by including information about individual local leaders. Specifically, I include the age of prefecture leaders to measure whether they are still eligible for promotion. In the Chinese political system, government officials are no longer eligible for higher positions above a certain age. The age caps vary across different ranks, with higher ranks having higher age caps. Jensen and Malesky (2018) also leverage similar political mechanisms to show that the probability of local governments offering incentives drops dramatically when the local leaders are older than the promotion eligibility age. Hence, I count the number of prefectural leaders aged below the age cap within the same province and use the count as an indicator of political competition intensity. At the prefecture level, party secretaries are the commanders in chief, while mayors are regarded as the heads of local economic management. As both leaders may influence firm treatment, I present one result for each leader.

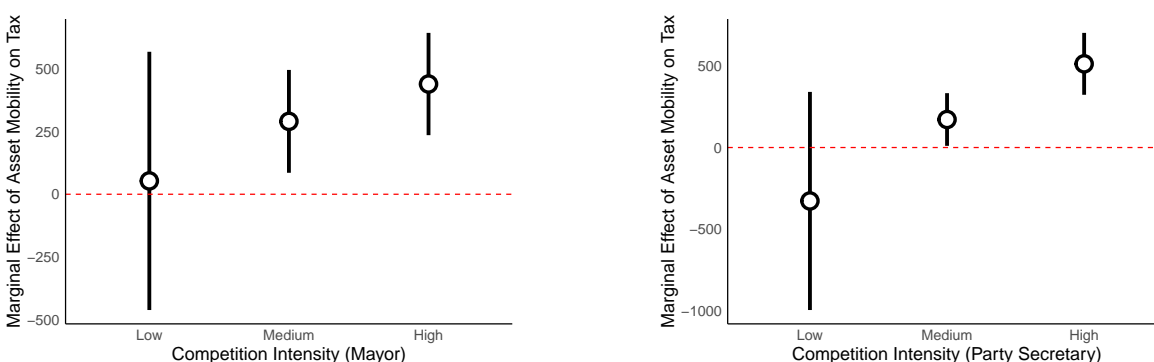
I draw the age information of party secretaries and mayors from the database compiled by Jiang (2018). The database includes extensive demographic and career information of prefectural, provincial, and national leaders in China. The available periods range from 2000 to 2015. I use the age cap information documented by Kou and Tsai (2014) to decide promotion eligibility.

I use both linear interaction models and the binning estimator to estimate the marginal effect of competition. The binning estimator is proposed by Hainmueller, Mummolo, and Xu (2019) to guard against misinterpretation caused by excessive extrapolation in linear interaction models. It splits the sample into three equally sized groups based on the moderator (i.e., first, second, and third tercile) and estimate the marginal effect in each group. The binning estimator offers significant advantage when the marginal effect is not linear.

The results of the binning estimator are presented in [Figure 6](#) and those of the linear

interaction models in [Table E.9](#) and [Table E.10](#).

Figure 6: Competition Effects



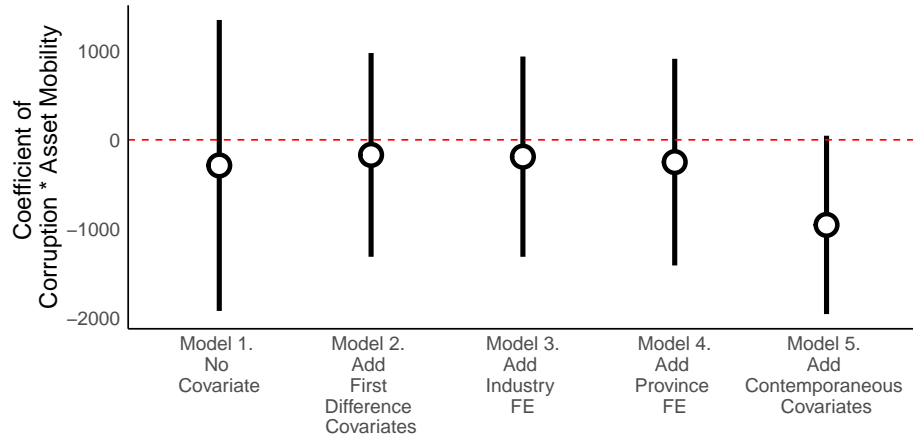
Note: this figure presents results of the binning estimator. The error bars are 95% confidence intervals. I use the specification of model 5 as the baseline model. Prefecture-level GDP and population are included as additional controls.

[Figure 6](#) shows that overall competition increases the positive effect of asset immobility, especially when the competition level is medium or high. The effect becomes undetermined when the competition level is low. My theory suggests that supportive and predatory governments behave distinctly differently under low competition intensity but behave more similarly at higher intensities. The findings confirm that there is significant variation in governments' behaviors under low competition intensity. Under medium and high competition intensity, governments indeed treat immobile firms better when competition further intensifies. These results lend empirical support for [Hypothesis 3](#).

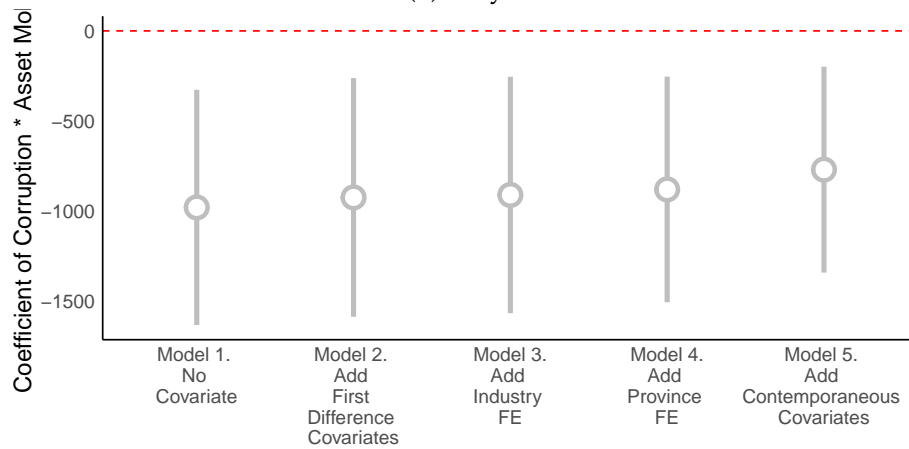
3.7 Confounder: Political Connections and Bribery

One major concern is the confounding effect of political connections and bribery. First, prior studies show that political connections are associated with both preferential government treatment and better property protection (Fisman [2001](#); Truex [2014](#)). Thus, foreign firms with political connections are more likely to invest in fixed assets and receive tax incentives than are those without political connections. Second, scholars argue that firms in fixed asset-intensive industries are more likely to engage in political activities, such as lobbying and bribery (Hiscox [2001](#); Zhu and Deng [2020](#); Chen and Hollenbach [2021](#)). Ideally, I would measure political connections or bribery at the firm level, but to the best

Figure 7: Corruption Placebo



(a) Mayor



(b) Party Secretary

Note: this figure presents coefficients of a linear interaction model. The error bars are 95% confidence intervals. The full linear regression tables are in [Table E.11](#) and [Table E.12](#)

of my knowledge, such a comprehensive measure does not exist. For this reason, I use a proxy for political connections to assess whether the observed empirical patterns can be explained by political connections.

As political connections and bribery are highly correlated in many developing countries, including China, I propose measuring political connections using corruption cases. If the observed effect is driven solely by corruption, we should observe stronger effects in localities where local leaders are corrupt. I use information from the Chinese Political Elite Database (Jiang 2018) to identify corrupt local leaders. I code anyone arrested for

corruption after 2008 as 1 and others as 0. Then, I classify whether a foreign firm was operating under a corrupt local leader in 2008. If political connections drive the empirical findings, we should observe a stronger positive effect of asset immobility when foreign firms operate under a corrupt leader. I again conduct the exercise for party secretaries and for mayors.

The results presented in [Figure 7](#) do not support immobile firms being favored more under corrupt leaders. The positive effect of asset immobility seems to shrink in localities governed by corrupt leaders. While this test cannot completely eliminate political connections as a competing explanation, it suggests that the empirical findings are not likely to be driven by political connections alone. Both political connections and the “commitment” channels may be at work in reality.

4 Study 2: Original Survey of Foreign Firms’ Employees

Having shown that foreign firms with lower asset mobility obtain better tax treatment after *ex post* negotiations using firm-level data, I now present evidence from an original survey of foreign firms’ managers and employees in China. First, I replicate the observational findings that foreign firms with lower asset mobility are more likely to obtain preferential government treatment. Second, I show that most respondents in my survey perceive local governments to be non-predatory, substantiating the underlying assumption of the theory and empirics. Lastly, I show that respondents’ perception of whether low asset mobility benefits foreign firms is correlated with their perception of government types and local investment competition intensity.

4.1 Design

The survey experiment was conducted among an online sample of 2,000 foreign firm employees in China. The pre-registration information can be found at the Open Science Foundation ([link](#)). Leveraging their knowledge of business practices, I can collect rigorous evidence on the main hypothesis and mechanisms. Existing studies in political

Figure 8: Treatment Vignettes and Outcome Questions

There is a foreign-invested firm operating in the same province as your company, seeking government support.

This firm has very **low (high)** asset mobility. It is very **costly (convenient)** for them to move their asset out of the locality in which it currently operates. For example, this firm could own a **large (minimal)** amount of fixed assets that are difficult to sell or move in the short run (e.g., office buildings, factories, or equipment).

Besides, this firm has a **high (average)** profit level. The products of this firm **use (do not use)** cutting edge technology.

Questions:

1. According to your observations and opinions, to what extent do you think the government would support this firm? (1 = no support, 4 = highest priority, full support)
2. According to your observations and opinions, how likely would it be for this firm to have policy influence? (1 = unlikely, 4 = very likely)

science, economics, and business have extensively employed a similar research approach to study firms' actions and attitudes (Malesky and Mosley 2018; Malesky and Taussig 2019; Bandiera et al. 2020).

The survey first ask for the employer information of the respondents. Respondents who report that their employer is a foreign-invested firm are admitted to the survey. This screening process ensure that all respondents who take the survey are employees of foreign-invested enterprises in China. Of all respondents in the sample, 1,312 (66%) report being at the management level.

After offering background information, the respondents are randomly assigned to groups. In each group, the respondents read a profile of a hypothetical firm whose characteristics vary across groups. Then, the respondents answer two questions that quantify government treatment. **Figure 8** shows the wording of the experiment vignettes and the two outcome questions. In the vignettes, I manipulate three characteristics of the hypothetical firm: asset mobility, profit, and technology level. The asset mobility treatment al-

allows me to experimentally evaluate the effect of asset mobility on government treatment, while I add the other two treatments to enhance the experiment’s external validity. Profit and technology level are deemed to be two crucial factors in views of local governments in China. It would undermine the experiment’s connection to reality if the hypothetical firm’s profile only included information on asset mobility.

I used two questions to measure government treatment. The first question asks for respondents’ opinions on the level of support that the government may offer the hypothetical firm. The second question asks for respondents’ opinions on the level of policy influence that the hypothetical firm may obtain. These two outcomes capture two major aspects of government treatment.

Therefore, the experiment has 8 groups:

Table 1: Experiment Groups

	G1	G2	G3	G4	G5	G6	G7	G8
Asset Mobility	Low	Low	Low	Low	High	High	High	High
Profit	High	Average	High	Average	High	Average	High	Average
Technology	Use	Use	¬Use	¬Use	Use	Use	¬Use	¬Use

To estimate the average marginal effect of asset mobility, I compare the difference in outcomes between groups G1, G2, G3, and G4 and G5, G6, G7, and G8. For the rest of the paper, I will term G1, G2, G3, and G4 as the treatment group and G5, G6, G7, and G8 as the control group.

Next, I use the question in [Figure 9](#) to measure government type. My theory proposes that a key distinction between a predatory and a non-predatory government is that a predatory government does not have incentives to “invest” in firms. I define this government preference more rigorously in the taxation setting of the formal model: a predatory government never voluntarily offers low tax rates because the loss in revenue outweighs gains in the economy (i.e., $\partial g(t_i)/\partial t_i > 0$); however, a non-predatory government voluntarily offers low tax rates because it sufficiently values economic gains (i.e., $\partial g(t_i)/\partial t_i < 0$). My definition of a predatory government is weaker than the conventional definition because my definition only entails that the government does not “invest” in

firms. However, a government that confiscates investors' assets, the canonical example of a predatory government, also fits my definition.

Therefore, following my theoretical definition, I use option A in [Figure 9](#) to describe the preference of a non-predatory government and option B to describe the preference of a predatory government. This question allows me to observe how business practitioners view local governments in China and to test the effect of asset mobility under a non-predatory government ([Hypothesis 2](#)).

Figure 9: Predatory versus Non-predatory Government

Questions:

According to your observations and opinions, how do local governments usually view tax incentives:

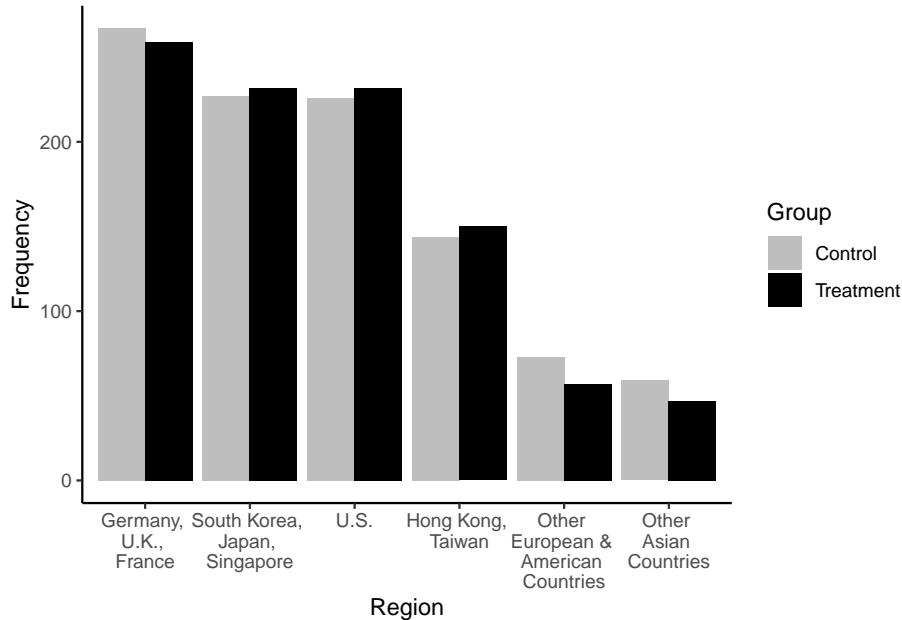
- A. Governments actively offer tax incentive policies to help local companies and to increase local economic growth.
- B. Governments are reluctant to offer tax incentives because tax incentives reduce government revenue.
- C. Do not know

4.2 Respondent Characteristics

In this section, I present descriptive statistics of the sample. I focus on two features of the respondents: home countries of the foreign investors and their industries. Additionally, I demonstrate in [Appendix F.1](#) that the respondents in the treatment and control groups are comparable, as I do not detect significant differences between the two groups across 13 pre-treatment covariates.

The empirical distribution of the home countries/regions of the foreign firms is presented in [Figure 10](#). I design the choice categories based on the "Statistical Bulletin of FDI in China" published by the Ministry of Commerce of China in 2019. According to the report, the countries/regions listed as options account for more than 94% of total FDI in China. In my sample, the top four home countries/regions are Western Europe (Germany, the UK, France), East Asia (South Korea, Japan, Singapore), the US, and Hong

Figure 10: Foreign Investor Distribution



Kong and Taiwan. Compared with the actual FDI pattern in China, investors from Hong Kong and Taiwan are considerably under-represented, while those from Western Europe are over-represented. As existing studies have shown that investors from Hong Kong and Taiwan are different from investors elsewhere (Huang 2003), down weighting investors from Hong Kong and Taiwan strengthens the generalizability of the findings.

Next, I present firms' industry composition in the sample in Figure 11. The categories are also based on the "Statistical Bulletin of FDI in China." The top three industries in the sample are Software and Information Technology, Wholesales and Retailing, and Finance. Compared with the actual FDI in China, finance firms are slightly over-represented in the sample, but the overall distribution of industries is consistent with the actual FDI patterns.

4.3 Main Results

Before turning to the results, I first present the sample distribution of the perceived government type (i.e., answers to the question in Figure 9). Figure 12 displays that around 85% of respondents in my sample believe that local governments have a non-

Figure 11: Industry Distribution

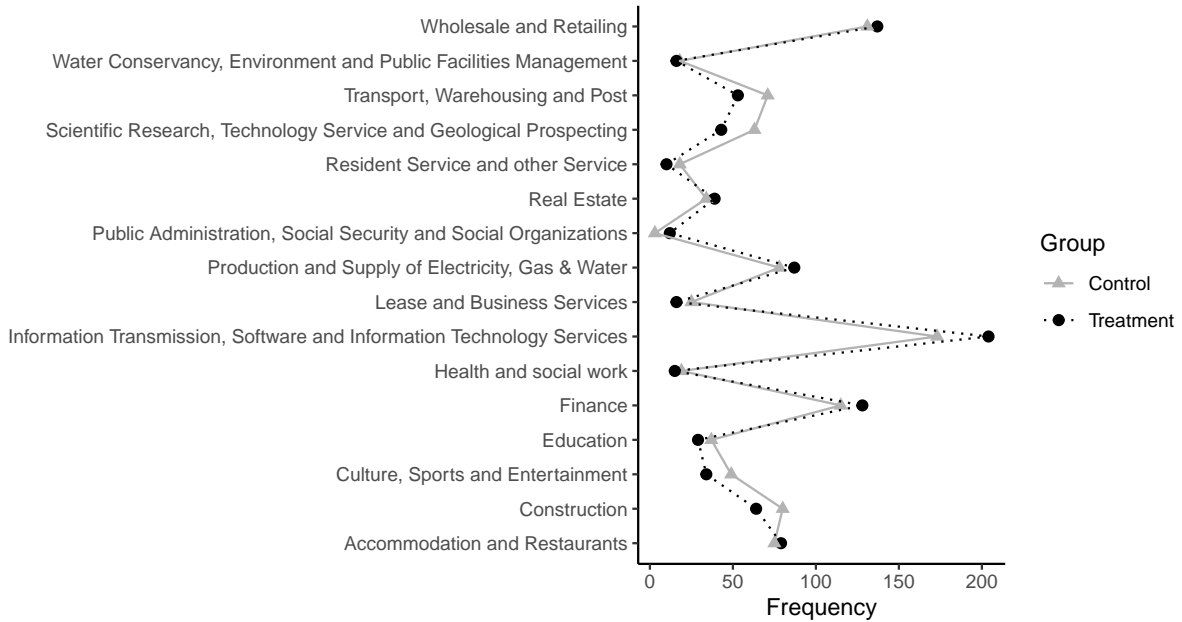
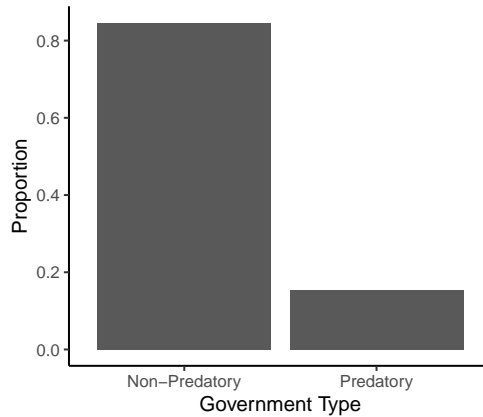


Figure 12: Government Type Distribution



predatory preference. In contrast, only 277 respondents in the sample perceive the local governments to be predatory. This finding strongly corroborates my assumption that many investment-seeking governments have a non-predatory preference, which also explains why we can observe a positive effect of low asset mobility on average. Moreover, the finding demonstrates that my proposed mechanism may be more prevalent than the mechanism outlined in canonical theories.

Next, I report the main results of the experiment in [Table 2](#). In Models 1, 2, and 3, I regress the government support outcome on the treatment variable, whereas I use policy

Table 2: Effect of Low Asset Mobility on Perceived Government Treatment

(a) Full Sample

	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
	<i>Government Support</i>			<i>Policy Influence</i>		
Low Asset Mobility	0.04 (0.03)	0.04 (0.03)	0.06 (0.03)	0.07* (0.03)	0.07* (0.03)	0.08* (0.03)
Covariates			✓			✓
Industry FE		✓	✓		✓	✓
Home Region FE		✓	✓		✓	✓
Province FE		✓	✓		✓	✓
R ²	0.00	0.04	0.16	0.00	0.04	0.19
Adj. R ²	0.00	0.01	0.13	0.00	0.02	0.16
N	1929	1914	1496	1929	1914	1494

*** $p < 0.001$; ** $p < 0.01$; * $p < 0.05$

(b) Non-Predatory Sample

	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
	<i>Government Support</i>			<i>Policy Influence</i>		
Low Asset Mobility	0.03 (0.03)	0.03 (0.04)	0.07 (0.04)	0.09* (0.04)	0.09* (0.04)	0.10** (0.04)
Covariates			✓			✓
Industry FE		✓	✓		✓	✓
Home Region FE		✓	✓		✓	✓
Province FE		✓	✓		✓	✓
R ²	0.00	0.04	0.19	0.00	0.04	0.19
Adj. R ²	-0.00	0.00	0.15	0.00	0.01	0.15
N	1528	1519	1233	1528	1519	1232

*** $p < 0.001$; ** $p < 0.01$; * $p < 0.05$

influence as the outcome variable in Models 4, 5, and 6.¹⁶ Recall that the respondents in the treatment group are assigned a profile of a low asset mobility firm, while those in the control group receive a profile of a firm with high asset mobility. Thus, the treatment effect is the perceived difference in government treatment between foreign firms with low and high asset mobility.

Table 2a presents the sample average treatment effect. It can be readily observed that the estimated treatment effect is positive across 6 models, which implies that survey respondents believe that foreign firms with lower asset mobility are more likely to obtain better government treatment. Although the treatment effect is positive, the effect on government support do not achieve statistical significance at the conventional level. However, the effect on policy influence is statistically significant and remain robust to the inclusion of province, home region, industry fixed effects, and other pre-treatment covariates. On average, respondents in the treatment group rate the firm as being 3.3% more likely to obtain policy influence when compared with respondents in the control group. Overall, this finding is consistent with the main hypothesis (Hypothesis 1) that foreign firms with lower asset mobility are more likely to obtain preferential treatment from host governments on average.

The failure to find a significant effect on government support may have been caused by the vagueness of the word “government support.” However, there may also be two other reasons for the null finding. First, offering government support, such as subsidies, has become more rule-based in China than it was 10 years ago. Thus, government support may not capture government preference as directly as policy influence. Second, the inverse credible commitment may be more salient in the area of policymaking than in government support. It is much more costly to change local policies, such as regulations and economic policies, than to revoke government support (e.g., subsidies). Therefore, local governments place greater weight on foreign firms’ commitment when granting policy influence than when offering government support.

I next examine the treatment effect when I only include respondents who perceive

16. 71 respondents chose “Do Not Know” on either of the two outcome questions. I exclude these observations from the analyses. Moreover, there is no significant correlation between being treated and choosing “Do Not Know” ($p = 0.31$).

local governments as non-predatory. The results in [Table 2b](#) show that the effect on government support remain insignificant, but the effect on policy influence becomes slightly larger in magnitude, which provides empirical support for [Hypothesis 2](#). Given that only a small number of respondents perceive local governments as predatory, it is not surprising that the effect in the non-predatory sample does not differ significantly from the effect in the full sample.

4.4 Mechanism

Figure 13: The Mechanism Question

Question:

Do you agree or disagree that governments are more likely to support foreign firms with lower asset mobility because these firms are more likely to stay?

- Disagree (= 1)
- Somewhat Disagree (= 2)
- Somewhat Agree (= 3)
- Agree (= 4)

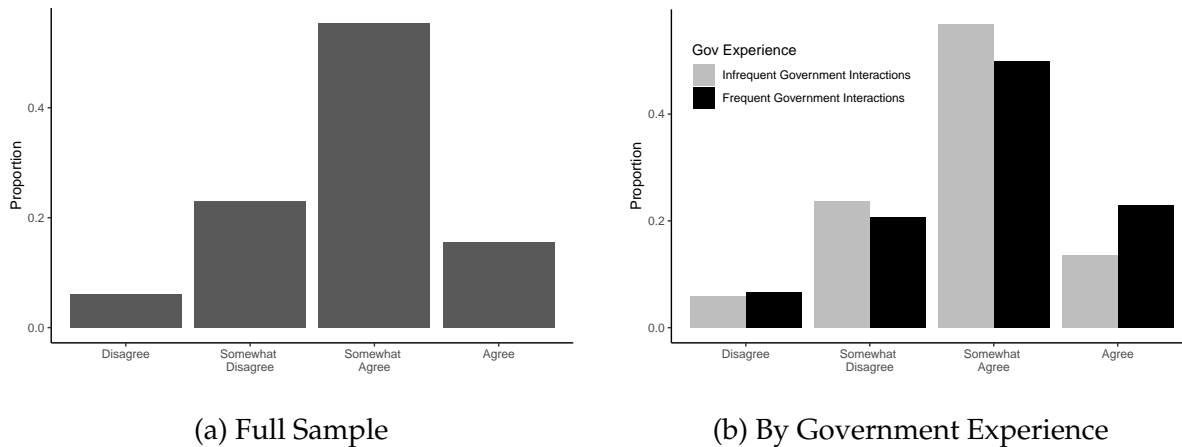
I use a question at the end of the survey to directly evaluate the proposed mechanism. After the experiment section, I ask all respondents to answer a question on how host governments view foreign firms' asset mobility. The precise wording of the question is presented in [Figure 13](#). The question asks respondents whether they would agree or disagree with my theory, which provides the most direct evidence on the causal mechanism.

The distribution of respondents' answers is shown in [Figure 14](#). The left panel ([Figure 14a](#)) presents the distribution of answers of all respondents, showing that the vast majority of respondents chose "Agree" (15%) or "Somewhat Agree" (55%), while only 6% of respondents chose "Disagree."

Next, I display the distribution of answers by the respondents' work experience in [Figure 14b](#). At the beginning of the survey, I ask each respondent whether their job requires

interacting with local governments regularly. Of the respondents, 399 (20%) confirm that they work with local governments on a routine basis. I code respondents whose job requires regular interactions with local governments as “frequent government interactions” whereas the rest are coded as “infrequent government interactions.” Reassuringly, the results in [Figure 14b](#) show that respondents with more frequent government interactions are in fact much more likely to choose “Agree.”

Figure 14: Distribution of Respondents’ Opinions on the Proposed Mechanism



Lastly, as my theory predicts that the prevalence of this mechanism would vary by government type and competition intensity, I use regression analyses to test whether government type and competition intensity predict respondents’ answers. I present the results in [Table 3](#).

First, I regress respondents’ answers to the mechanism question on whether they work with local governments regularly in Model 1 to rigorously test the effect of government experience. Consistent with my expectation, the point estimate is positive and statistically significant, which provides additional support that respondents with more experience working with local governments are more likely to agree with the theoretical mechanism.

Second, I include the self-reported investment competition intensity in Model 2 to test the effect of investment competition.¹⁷ Again, the model returns a positive and statistically significant coefficient, which implies that respondents in regions with more intense

17. I used the following question to measure competition intensity: “According to your observations and opinions, how intense is the competition between local governments for investments in the area where your firm is located? (1 = no competition at all; 4 = local governments intensely compete for investments.)”

Table 3: Effect of Government Type and Competition Level on Respondents' Opinion

	Model 1	Model 2	Model 3	Model 4
Gov Experience	0.10*	0.10**	0.11**	0.12**
	(0.04)	(0.04)	(0.04)	(0.04)
Competition Level		0.05***	0.06***	0.03
		(0.02)	(0.02)	(0.02)
Predatory			-0.02	-0.29*
			(0.06)	(0.14)
Predatory \times Competition Level				0.13*
				(0.06)
Covariates				✓
Industry FE	✓	✓	✓	✓
Home Region FE	✓	✓	✓	✓
Province FE	✓	✓	✓	✓
R ²	0.03	0.04	0.04	0.07
Adj. R ²	0.00	0.01	0.01	0.02
N	1930	1768	1686	1284

*** $p < 0.001$; ** $p < 0.01$; * $p < 0.05$

investment competition are more likely to agree with my mechanism. Therefore, this evidence provides strong support for **Hypothesis 3**.

Next, I include government type in the regression in Model 3, but the coefficient fails to achieve statistical significance. Then, I examine the interaction effect between government type and competition level in Model 4 while controlling for other firm- and individual-level covariates. The estimated interaction effect between government type and the competition level is positive and statistically significant, while the coefficient of the predatory government type remains negative. The result implies that respondents who perceive local governments to be predatory are *less likely* to agree with my theory; however, this negative correlation is attenuated when local investment competition intensity increases. This empirical finding corroborates the theoretical prediction presented in **Figure 1** and offers empirical support to **Hypothesis 2** and **Hypothesis 3**.

It should be acknowledged that the results in **Table 3** may be driven by unobserved confounders. Nonetheless, the regression analysis still serves as a direct test of the mechanisms. Overall, the survey findings confirm my observational results from the firm-level

data that foreign firms with lower asset mobility receive better government treatment. Together, the empirical findings offer consistent support for my theory.

5 Conclusions and Limitations

This study shows that the effect of asset mobility on government treatment deserves closer scrutiny in the new era of globalization. In this study, I identify three crucial factors that contribute to the positive effect of asset immobility: (1) the inverse credible commitment problem, (2) governments' political concerns associated with firm performance, and (3) competition for investment. These factors are prevalent in most countries that actively participate in the global economy. Hence, my theory proposes a new pathway to study the politics of FDI.

Empirically, I assess the validity of the theory in the context of China. A recent study by Bauerle Danzman and Slaski (2021) presents empirical findings consistent with my theory using data from Latin America, which suggests the applicability of my theory beyond China. However, because I argue that host governments' preference for economic growth is the key theoretical mechanism, my theory is more relevant to developing countries which have a stronger preference for growth. Since many developing countries do not have a judicial system as sophisticated as developed ones, my argument has broad implications for understanding government-business interactions in the developing world. Moreover, with many developing countries are fast-growth markets for foreign investments, my theory also helps shed light on the government-investor dynamic in the future.

The study introduces the second dimension of firms' political influence: firms' commitment to stay. Existing studies suggest that firms derive their political power from their dominance (Grossman and Helpman 1994; Gulotty 2020) or replaceability (Johns and Wellhausen 2020). This study introduces firms' commitment to stay as an additional factor. Governments evaluate both firms' economic dominance and firms' commitment to stay when assigning preferential policies. Governments may prefer less productive firms with higher commitment to stay over more productive firms with lower commitment to stay.

The theoretical and empirical findings of this work have broad implications for international politics and international political economy. I show that globalization and economic interdependence under the liberal world order do not necessarily lead to democratization. Regimes with non-liberal ideologies can still become central players in a liberal international system. Thus, it is possible that increased economic interdependence leads to peace (Gartzke 2007); however, it is also possible that deep economic cooperation breeds conflict due to long-lasting differences in ideologies.

The theory also provides a micro-foundation for the well-known “liability of foreignness” (Hymer 1976). Foreign firms usually need to pay more business operation costs than do their domestic peers because foreign firms’ commitment to stay is much weaker than that of domestic firms. As many host governments care about the political outcomes of firm performance, domestic firms have a natural advantage of gaining the support of host governments.

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Appendix A Proofs of Theoretical Results

Subsection A.1 Proof of Lemma 2.1

First, consider the constraint to be non-binding. The objective function is:

$$G(\mathbf{t}) = \sum_{i=1}^N (t_i \cdot \tilde{\pi} + (1 - \alpha) \cdot w) \cdot \frac{(1 - t_i)\pi + c_i}{D}$$

It is easily seen that $G(\mathbf{t})$ is concave in t_i . We obtain the optimal tax rate t_i^* by solving the first order condition:

$$t_i^* = \min \left\{ 1, \frac{(c_i + \pi)\tilde{\pi} - w \cdot \pi(1 - \alpha)}{2\pi\tilde{\pi}} \right\}$$

It is readily observed that t_i^* increases in c_i .

Now consider the constraint to be binding. Under the binding constraint, lowering one's tax rate must imply increasing tax rates of other firms.

Consider any tax vector \mathbf{t}' that satisfies the binding constraint. I now show a necessary condition for \mathbf{t}' to be an equilibrium is that for any firms i, j with $c_i > c_j$, their received tax rates must satisfy $t_i \geq t_j$.

I will prove the statement by contradiction. Consider two firms with $c_i > c_j$ receive $t_i < t_j$ in equilibrium. I will show that swapping t_i and t_j strictly benefits the government, implying that the proposed tax allocation cannot be an equilibrium.

The net benefit of changing firm k 's tax rate from t_k to t'_k is:

$$\begin{aligned} C_k(t_k, t'_k) &= G(t_k = t'_k, \mathbf{t}_{-k} = \mathbf{t}_{-k}) - G(t_k = t_k, \mathbf{t}_{-k} = \mathbf{t}_{-k}) \\ &= \int_{t_k}^{t'_k} \frac{\partial G(\mathbf{t})}{\partial t_k} dt_k \end{aligned}$$

Thus, the net benefit of swapping t_i and t_j is:

$$\begin{aligned}
 U &= C_i(t_i, t_j) + C_j(t_j, t_i) \\
 &= \int_{t_i}^{t_j} \frac{\partial G(\mathbf{t})}{\partial t_i} dt_i + \int_{t_j}^{t_i} \frac{\partial G(\mathbf{t})}{\partial t_j} dt_j \\
 &= \int_{t_i}^{t_j} \frac{\partial G(\mathbf{t})}{\partial t_i} dt_i - \int_{t_i}^{t_j} \frac{\partial G(\mathbf{t})}{\partial t_j} dt_j \\
 &= u(c_i) - u(c_j)
 \end{aligned}$$

because the firm i and j only differ in their exit cost c_i and c_j . It is readily observed that $U = 0$ if $c_i = c_j$.

Differentiating $u(c_k)$ with respect to its argument returns:

$$\begin{aligned}
 \frac{du(c_k)}{dc_k} &= \frac{d}{dc_k} \int_{t_i}^{t_j} \frac{\partial G(\mathbf{t})}{\partial t_k} dt_k \\
 &= \int_{t_i}^{t_j} \frac{\partial^2 G(\mathbf{t})}{\partial t_k \partial c_k} dt_k
 \end{aligned}$$

Note the positive cross partial derivative of the government expected utility:

$$\frac{\partial^2 G(\mathbf{t})}{\partial t_k \partial c_k} = \frac{\tilde{\pi}}{D} > 0$$

which implies: $du(c_k)/dc_k > 0$

Therefore, $u(c_k)$ increases in c_k . It follows that $u(c_i) > u(c_j)$ because $c_i > c_j$. Hence, we know $U = u(c_i) - u(c_j) > 0$, which implies that swapping t_i and t_j leads to utility increase. As a result, the equilibrium tax vector cannot assign lower tax rates to less mobile firms.

Subsection A.2 Proof of Proposition 2.2

The government needs to assign some strictly positive tax rates t_i to satisfy the constraint. The objective function is:

$$\begin{aligned} G(\mathbf{t}) &= \sum_{i=1}^N g(t_i) \cdot \frac{(1-t_i)\pi + c_i}{D} \\ &= \sum_{i=1}^N (t_i \cdot \tilde{b} + (1-\alpha) \cdot w) \cdot \frac{(1-t_i)\pi + c_i}{D} \end{aligned}$$

Readers can verify that it is convex and decreasing in t_i .

As the constraint always binds, I will show that a necessary condition for any equilibrium of this game is that the host government offers less mobile firms lower tax rates.

Now, consider two firms with $c_i > c_j$ but receive $t_i > t_j$ in equilibrium. I will again show that swapping t_i and t_j leads to an increase in the government utility.

Again, define the net benefit of swapping t_i and t_j as:

$$\begin{aligned} U &= C_i(t_i, t_j) + C_j(t_j, t_i) \\ &= \int_{t_i}^{t_j} \frac{\partial G(\mathbf{t})}{\partial t_i} dt_i + \int_{t_j}^{t_i} \frac{\partial G(\mathbf{t})}{\partial t_j} dt_j \\ &= u(c_i) - u(c_j) \end{aligned}$$

Note that $u(c_k)$ is also increasing in c_k in this case:

$$\begin{aligned} \frac{du(c_k)}{dc_k} &= \int_{t_i}^{t_j} \frac{\partial^2 G(\mathbf{t})}{\partial t_k \partial c_k} dt_k \\ &= - \int_{t_j}^{t_i} \frac{\partial^2 G(\mathbf{t})}{\partial t_k \partial c_k} dt_k \\ &> 0 \end{aligned}$$

because $t_j < t_i$ and the cross partial derivative is negative:

$$\frac{\partial^2 G(\mathbf{t})}{\partial t_k \partial c_k} = \frac{\tilde{b}}{D} < 0$$

It is readily observed that $U = u(c_i) - u(c_j) > 0$. Thus, swapping t_i and t_j is beneficial and the government never allocates lower tax rates to more mobile firms in equilibrium.

Subsection A.3 Proof of **Proposition 2.3**

I will show that the objective function 1) decreases in t_i when M is sufficiently large so that the constraint must bind and 2) has a negative cross partial derivative when M is sufficiently large. Then the proof is the same as the proof of **Proposition 2.2**.

Differentiating the objective function with respect to t_i :

$$\frac{\partial G(\mathbf{t})}{\partial t_i} = \left(-\frac{g(t_i)\pi}{(1-t_i)\pi + c_i} \cdot M + \tilde{\pi} \right) \cdot \left(\frac{(1-t_i)\pi + c_i}{\bar{D}} \right)^M$$

The only negative term in this expression is the coefficient of M , which suggests that the term becomes negative with a sufficiently large M .

We can solve for this cutoff M and define it as $M_0(c_i, t_i)$

$$M_0(c_i, t_i) \equiv \tilde{\pi} \cdot \frac{c_i + (1-t_i)\pi}{g(t_i)\pi}$$

Then, I define M_0^* as the competition level above which $\partial G(\mathbf{t})/\partial t_i < 0$ holds for all asset mobility levels c_i and feasible tax rates t_i .

Next, note the cross partial derivative of the objective function:

$$\frac{\partial G(\mathbf{t})}{\partial t_i \partial c_i} = \left(-\frac{g(t_i)\pi}{((1-t)\pi + c_i)^2} \cdot M + \frac{\alpha(\pi^2 + \pi c_i) + (1-\alpha)(\pi w + \pi b + bc_i)}{((1-t)\pi + c_i)^2} \right) \cdot \left(\frac{(1-t_i)\pi + c_i}{\bar{D}} \right)^M \cdot M$$

It is again readily observed that the coefficient of M in the first term is negative. Hence, the cross partial derivative becomes negative for a sufficiently large M .

We can also solve for this cutoff M and define it as $M_1(c_i, t_i)$

$$M_1(c_i, t_i) \equiv \frac{b(c_i + \pi)(1-\alpha) + \pi((c_i + \pi)\alpha + (1-\alpha)w)}{\pi g(t_i)}$$

Again, I define M_1^* as the competition level above which $\partial^2 G(\mathbf{t})/\partial t_i \partial c_i < 0$ holds for all asset mobility levels c_i and feasible tax rates t_i .

Finally, define:

$$M^* = \max\{M_0^*, M_1^*\}$$

As long as $M > M^*$, we get the desired results.¹⁸

Subsection A.4 Proof of Corollary 2.4

It is evident that $\partial G(\mathbf{t})/\partial t_i < 0$, which implies that the constraint always binds.

Note again that:

$$M > M_1(c_i, t_i) \equiv \frac{b(c_i + \pi)(1 - \alpha) + \pi((c_i + \pi)\alpha + (1 - \alpha)w)}{\pi g(t_i)} \implies \frac{\partial^2 G(\mathbf{t})}{\partial t_i \partial c_i} < 0$$

As $\alpha < b/(b - \pi)$, the cutoff value $M_1(c_i, t_i)$ is less than one for all c_i and t_i . Hence, the cross partial derivative is always negative.

18. It can also be shown using simple algebra that $M_0(c_i, t_i) - M_1(c_i, t_i) < 0$ for all c_i and t_i . The proof is omitted.

Appendix B Additional Theoretical Discussions

Subsection B.1 Renegotiation and Replacement

It is worth emphasizing that my results still hold if we allow repeated bargaining between the host government and foreign firms. The current setup is equivalent to a model with counteroffers where the government must pay a prohibitively large cost to adjust the current policy allocation. This is empirically relevant, for instance, when the policy is sticky and costly to change, as is the case for regulations or industrial policies. However, the results also hold if we allow for lower adjustment costs. Firms with high asset mobility will always ask for more counteroffers from host governments than low asset mobility firms because they enjoy more attractive outside options. If each time the host government needs to pay a small adjustment cost by reallocating policies, it is still preferable to offer firms with low asset mobility a better policy due to smaller total adjustment costs. Similar logic holds when firm replacements are allowed. As long as each time replacing an incumbent firm with a new entrant entails replacement costs, my main arguments hold.

Subsection B.2 Reputation Cost

Host governments suffer reputation costs when expropriating foreign investors *ex post*. I argue this additional factor does not undermine my theory's validity, though incorporating it in future works is beneficial.

My theory outlines the fundamental relationship between asset mobility and government treatment, which shares the same theoretical focus as the classic literature (e.g., the obsolescing bargain problem). However, I aim to advance an alternative framework where the effect of asset mobility is fundamentally different. For that reason, I abstract away from other important factors and only look at the relationship between asset mobility and government treatment. Adding other important factors such as political institutions and reputation cost complicates the observable implication of the theory; however, it does not alter the fundamental relationship between asset mobility and government

treatment.

Many extant theories on the political effects of institutions or reputation costs are built under the canonical obsolescing bargain framework. Hence, it will be essential for future works to explore whether these factors can serve additional purposes under the alternative framework proposed by this study.

Empirically, I carefully address the possible selection biases associated with reputation cost by utilizing a sharp policy change as the empirical design and including a rich set of firm covariates. While this is not flawless, it helps address several salient concerns associated with possible confounders.

Subsection B.3 Phasing Investments

Many business studies show how multinational companies adjust their investment strategies after entering a foreign market (Johanson and Vahlne 1977; Santangelo and Meyer 2011). Foreign firms expand or scale down their operations (e.g. increase/decrease investments, employ more/less local labor) after learning information *post entry*. Therefore, the current model setup fails to capture: 1) moderate strategies other than exit are available to foreign firms to make threats, and 2) foreign firms can increase/decrease commitment *ex post*.

First, I do not argue that there is a cutoff asset immobility level to solve the inverse credible commitment problem. On the contrary, the inverse credible commitment problem is embedded in the structural environment and cannot be completely eliminated. However, I argue that asset immobility makes it harder for foreign firms to retreat, both in terms of exercising the exit option and scaling down their investments or economic activities. Hence, governments favor firms that display more commitment than those present less commitment, as none of the firms can “solve” the inverse credible commitment problem.

Second, political scientists and business scholars agree that exit is an important option (Benito 2005). Despite the existence of more moderate options, the threat of exit still looms large in government-business negotiations because exit decisions often engender

the highest political costs. Therefore, the salience and relevance of the exit option is not downplayed by the existence of other strategies.

Lastly, whether foreign firms can increase investments *ex post* does not change my results. The promises of foreign firms to increase investments in the future are not credible due to unforeseeable shocks in the environment, which is a credible commitment problem similar to the one suffered by the host government. In an interview with a U.S. - China joint venture chairman, he explicitly points out that local governments are cautious with the credibility of foreign firms' future expansion plans.¹⁹ Hence, firms may increase commitment in the future, but the government focuses on the current commitment level instead of possible future commitments.

Subsection B.4 Clawbacks

Many countries incorporate clawback provisions into incentives programs whereby governments force foreign investors to increase commitment. The prevalence of such provisions showcases the severity of the inverse credible commitment problem. However, the effectiveness of clawbacks is unclear. Jensen (2017), for example, quantitatively demonstrates that incentives with or without clawbacks do not differ in their effectiveness. It is plausible that clawback provisions mitigate the inverse credible commitment problem, however, it is unlikely that they can *solve* the problem.

Subsection B.5 Bargaining Power

The model fails to incorporate firm heterogeneity. Notably, firms differ in their bargaining power over host governments. My framework views the bargaining outcomes of host governments and foreign investors as a function of two variables: bargaining power and commitment. When holding the bargaining power constant, the bargaining outcome should be close to my theory's prediction. I deliberately assume away bargaining power heterogeneity to highlight the theory's core logic, though future works are needed to incorporate firm bargaining power systematically.

¹⁹ I conducted my interviews in July and August of 2019. The sample includes 15 local government officials and managers of foreign firms in China.

One purpose of this study is to introduce the tradeoff between firm bargaining power and commitment. The government prefers firms with bargaining power and commitment, if we view firms' bargaining power as their contributions to the economy. Firms that contribute significantly to the economy but show little commitment may still not receive preferential treatment because their expected contribution to the economy is lower due to their high propensity to leave. Notice that this prediction is different from the canonical one, as extant studies often hypothesize that firms with economic contributions *and* the highest mobility often receive the best government treatment.

Therefore, adding bargaining power to my theory will complicate the prediction, but the fundamental logic of my theory still differs from existing studies.

Appendix C Examples of Policies

2009年09月24日 来源：财政部 国家税务总局

【字体：大 中 小】 打印本页

各省、自治区、直辖市、计划单列市财政厅（局）、国家税务局、地方税务局，新疆生产建设兵团财务局：

根据《中华人民共和国企业所得税法》及其实施条例的有关规定，现就补充养老保险费、补充医疗保险费有关企业所得税政策问题通知如下：

自2008年1月1日起，企业根据国家有关政策规定，为在本企业任职或者受雇的全体员工支付的补充养老保险费、补充医疗保险费，分别在不超过职工工资总额5%标准内的部分，在计算应纳税所得额时准予扣除；超过的部分，不予扣除。

财政部 国家税务总局

二〇〇九年六月二日

To Provincial Level Governments, State Taxation Administration, Local Taxation Administrations:

According to the related articles in the *Enterprise Income Tax Law of the People's Republic of China*, we hereby announce additional tax deduction rules regarding the pension insurance and medical insurance:

Starting from January 1, 2008, the amount of payment made for pension insurance and medical insurance, if within 5% of the total salary, can be deducted from enterprise income taxes.

Ministry of Finance, State Taxation Administration
June 2, 2009

Figure C.15: A Delayed Policy

1. 江苏省国家税务局关于香港德信集团有限公司取得的特许权使用费免征企业所得税的批复 苏国税函[2008]361号 / 现行有效 / 2008.09.19发布 / 2008.09.19实施	<p>2. Official Reply by Government of Jiangsu Province regarding the appropriate income tax rate applies to Wujiang Water Company (2008.09.19)</p> <p>3. Official Reply by Government of Jiangsu Province regarding the appropriate income tax rate applies to Zhongji Company (2008.08.25)</p> <p>8. Official Reply by Government of Guangdong Province regarding deducting royalties from income taxes of Areva S.A. (France) (2008.06.25)</p>
2. 江苏省国家税务局关于吴江华纺水业有限公司适用企业所得税税率的批复 苏国税函[2008]344号 / 现行有效 / 2008.08.25发布 / 2008.08.25实施	
3. 江苏省国家税务局关于江苏中基复合材料有限公司适用企业所得税税率的批复 苏国税函[2008]343号 / 现行有效 / 2008.08.25发布 / 2008.08.25实施	
4. 安徽省国家税务局关于来安新奥燃气工程有限公司适用企业所得税税率的批复 皖国税函[2008]193号 / 现行有效 / 2008.07.22发布 / 2008.07.22实施	
5. 安徽省国家税务局关于奥地利李斯特内燃机及测试设备公司取得特许权使用费免征企业所得税的批复 皖国税函[2008]191号 / 现行有效 / 2008.07.21发布 / 2008.07.21实施	
6. 广州市国家税务局关于广东海丰鞋业有限公司2007年度购买国产设备投资抵免企业所得税的批复 粤国税函[2008]174号 / 现行有效 / 2008.08.30发布 / 2008.08.30实施	
7. 广州市国家税务局关于广东海丰鞋业有限公司2006年度购买国产设备投资抵免企业所得税的批复 粤国税函[2008]173号 / 现行有效 / 2008.08.30发布 / 2008.08.30实施	
8. 广东省国家税务局关于法国阿海陆核电公司取得特许权使用费免征企业所得税的批复 粤国税函[2008]341号 / 现行有效 / 2008.06.25发布 / 2008.06.25实施	
9. 江苏省国家税务局关于江苏苏能风力发电有限公司适用企业所得税税率的批复 苏国税函[2008]277号 / 现行有效 / 2008.06.15发布 / 2008.06.15实施	
10. 江苏省国家税务局关于光大环保能源(常州)有限公司适用企业所得税税率的批复 苏国税函[2008]276号 / 现行有效 / 2008.06.15发布 / 2008.06.15实施	
11. 江苏省国家税务局关于江苏龙源风力发电有限公司适用企业所得税税率的批复 苏国税函[2008]271号 / 现行有效 / 2008.06.15发布 / 2008.06.15实施	
12. 江苏省国家税务局关于太仓协鑫垃圾焚烧发电有限公司适用企业所得税税率的批复 苏国税函[2008]269号 / 现行有效 / 2008.06.15发布 / 2008.06.15实施	
13. 江苏省国家税务局关于南通宏达热电有限公司适用企业所得税税率的批复 苏国税函[2008]279号 / 现行有效 / 2008.06.15发布 / 2008.06.15实施	

Figure C.16: Dispute Cases

Appendix D Robustness Tests

Subsection D.1 Robustness Test: Alternative Measurements

The results using the continuous measurement of fixed asset ratio is presented in [Table D.4](#). Alternatively, I use the inverted fixed asset amount (i.e., $-1 \times$ fixed asset amount) as the variable of interest while control for total asset. The results are presented in [Table D.5](#).

The point estimates remain consistently positive, but they fail to achieve statistical significance in some cases. The failure to find a linear effect may be driven by my inability to identify government types and competition cutoffs. Moreover, as I explained in [Section 2.4](#), my empirical strategy can only examine how immobile firms are treated on average. The results suggest that asset immobility indeed benefits firms; yet it does not support that this effect change monotonically with asset mobility.

Lastly, I again fail to find supportive evidence for the canonical theory using these alternative measurements.

Table D.4: Main Results: Asset Mobility Continuous

	Model 1	Model 2	Model 3	Model 4	Model 5
Asset Mobility (Continuous)	1405.76** (540.92)	643.25 (777.33)	875.83 (794.38)	853.00 (764.19)	585.85 (646.03)
Δ Profit		0.05 (0.03)	0.05 (0.04)	0.05 (0.04)	0.03 (0.03)
Δ Employee		0.29 (2.42)	0.26 (2.43)	0.26 (2.43)	-0.01 (2.57)
Δ Revenue		0.04 (0.03)	0.04 (0.03)	0.04 (0.03)	0.02 (0.02)
Δ Export		-0.00 (0.00)	-0.00 (0.00)	-0.00 (0.00)	0.00 (0.01)
Δ Cost		-0.04 (0.04)	-0.04 (0.04)	-0.04 (0.04)	-0.03 (0.03)
Δ Inventory		0.01 (0.04)	0.01 (0.04)	0.01 (0.04)	0.01 (0.03)
Δ Lag Debt		0.02*** (0.00)	0.02*** (0.00)	0.02*** (0.00)	0.01 (0.01)
Profit					0.05* (0.03)
Export					-0.00 (0.00)
Debt					0.00* (0.00)
Industry FE		✓	✓	✓	✓
Province FE				✓	✓
R ²	0.00	0.30	0.30	0.31	0.42
Adj. R ²	0.00	0.30	0.30	0.30	0.42
Num. obs.	9921	9908	9908	9908	9906

*** $p < 0.001$; ** $p < 0.01$; * $p < 0.05$

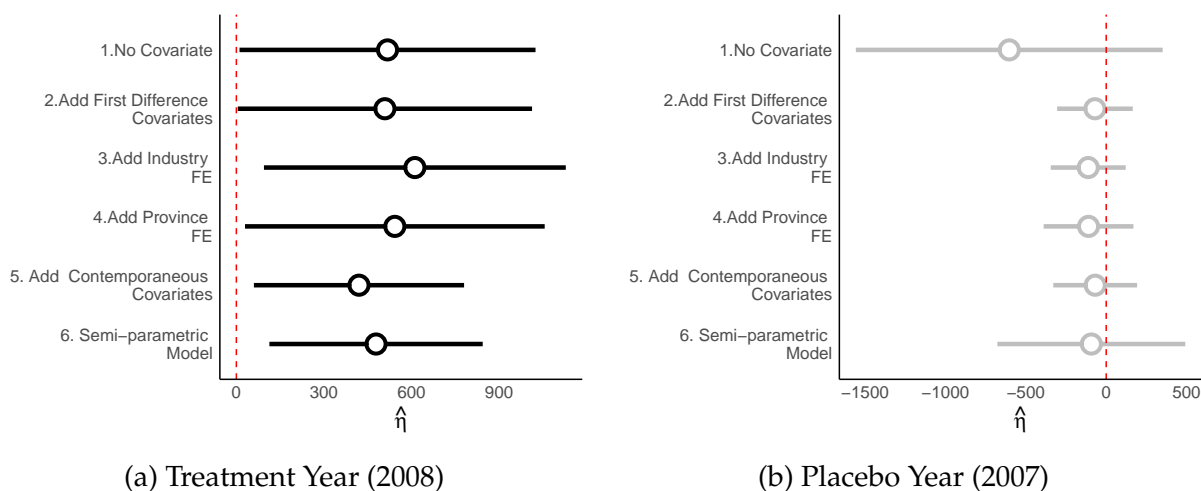
Table D.5: Main Results: Fixed Asset Amount

	Model 1	Model 2	Model 3	Model 4	Model 5
Fixed Asset Invert	0.01 (0.01)	0.01 (0.01)	0.01 (0.01)	0.01 (0.01)	0.02*** (0.00)
Total Asset	0.01** (0.00)	0.01* (0.00)	0.01* (0.00)	0.01* (0.00)	0.02** (0.01)
Δ Profit		0.06 (0.03)	0.06 (0.03)	0.06 (0.03)	0.03 (0.03)
Δ Employee		-0.79 (2.01)	-0.79 (2.01)	-0.79 (2.02)	-0.30 (2.19)
Δ Revenue		0.03 (0.03)	0.03 (0.03)	0.03 (0.03)	0.02 (0.02)
Δ Export		0.00 (0.00)	0.00 (0.00)	0.00 (0.00)	0.00 (0.00)
Δ Cost		-0.04 (0.03)	-0.04 (0.03)	-0.04 (0.03)	-0.03 (0.02)
Δ Inventory		0.00 (0.03)	0.00 (0.03)	0.01 (0.03)	0.00 (0.02)
Δ Lag Debt		0.01 (0.00)	0.01 (0.00)	0.01 (0.00)	0.01 (0.01)
Profit					0.03 (0.02)
Export					-0.00 (0.00)
Debt					-0.02** (0.01)
Industry FE		✓	✓	✓	✓
Province FE				✓	✓
R ²	0.24	0.41	0.41	0.41	0.50
Adj. R ²	0.24	0.40	0.41	0.41	0.49
Num. obs.	9940	9927	9927	9927	9925

*** $p < 0.001$; ** $p < 0.01$; * $p < 0.05$

Subsection D.2 Robustness Test: Same Firms from 2005 - 2008

Figure D.1: Robustness Test: 2005 - 2008 Panel



The treatment and placebo results presented in [Figure 4](#) and [Figure 5](#) use two different set of firms. The main results use foreign firms which stay in the sample from 2006 - 2008 but the placebo results use foreign firms which stay from 2005 - 2007. One may be concerned with validity of the placebo test when I use two different groups of observations. Furthermore, [Brandt, Van Biesebroeck, and Zhang \(2014\)](#) suggests that the 2008 sample is less comprehensive as previous years, which causes concerns on validity of the main results. To address these concerns, I replicate the main and placebo results on the same set of foreign firms which stay in the sample from the entire 2005 to 2008 period. This exercise allows me to test the parallel trend assumption on the same set of firms. It also addresses the data coverage issue by studying firms that are consistently in the sample.

[Figure D.1](#) presents both the main and placebo results. This panel dataset loses around 25% of observations compared with the datasets used in the main analyses. The estimated effects of the law change remain unchanged.

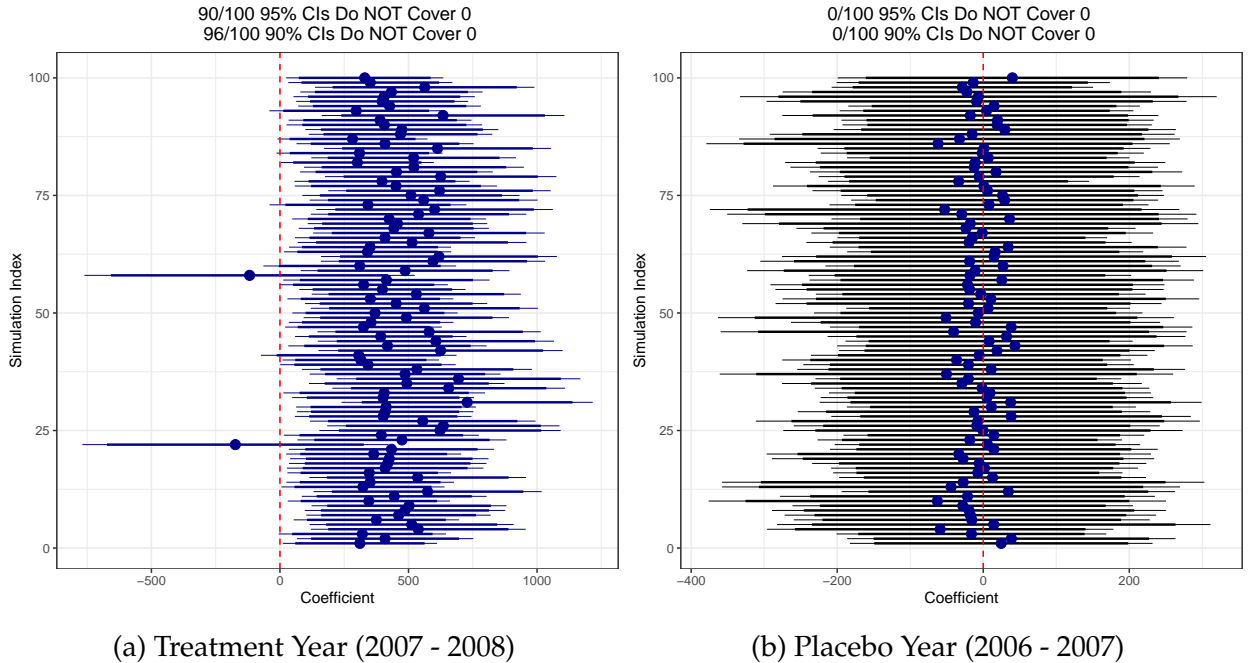
Subsection D.3 Robustness Test: Random Cutoffs

Recall that the choice of 30th/60th quantile is arbitrary. The observed patterns can be driven by this cutoff choice. To test the robustness of the findings, I randomly sample 100 pairs of cutoffs and use them to run the preferred model (model 5).

Each pair of cutoffs consists of one below the median and one above the median. Firms' asset mobility then is trichotomized using these 100 pairs of cutoffs. Besides, I replicate this exercise using the placebo data (i.e., 2006-2007 data). If the results are not sensitive to cutoff choices, they should stay unchanged in most of the cases.

Figure D.2 reports the results. Figure D.2a reports the 100 point estimates along with the 95% and 90% confidence intervals, using data from 2007 and 2008. Among the 100 trials, 90 of them stay positive and statistically significant at the 95% level, and 96 of them remain significant at the 90% level. Besides, none of the regressions returns a significant result at either level using the placebo data (Figure D.2b).

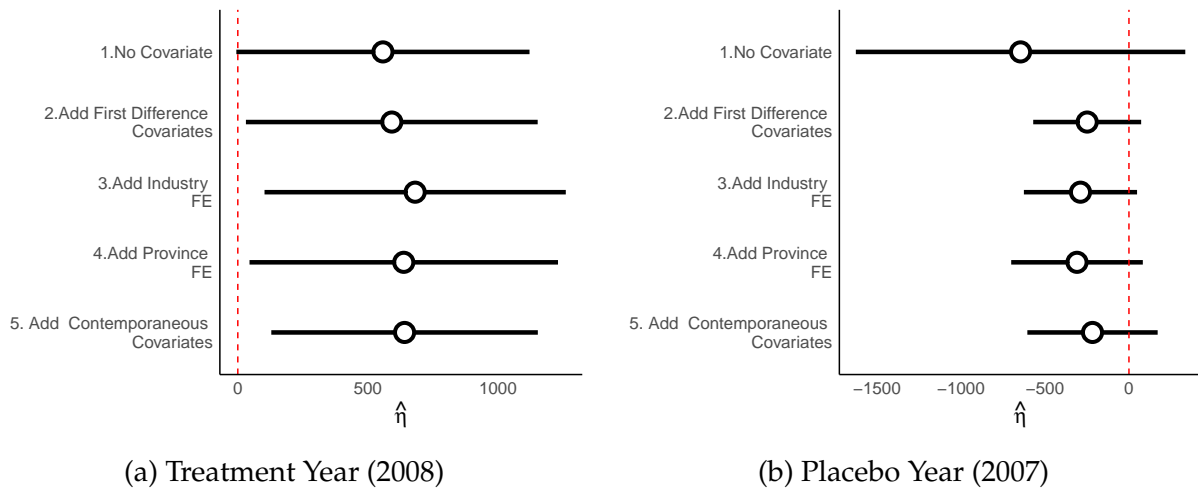
Figure D.2: Robustness Test: Randomly Cutoffs



Subsection D.4 Robustness Test: CBPS Weighting

The difference-in-differences design solves time-invariant confounders. Still, we need to consider time-variant confounders as well. I use the Covariate Balancing Propensity Score (Imai and Ratkovic 2014) to re-weight my sample to achieve covariate balance between the treatment and control group. Then, I replicate the main and placebo analyses using the weighted sample.

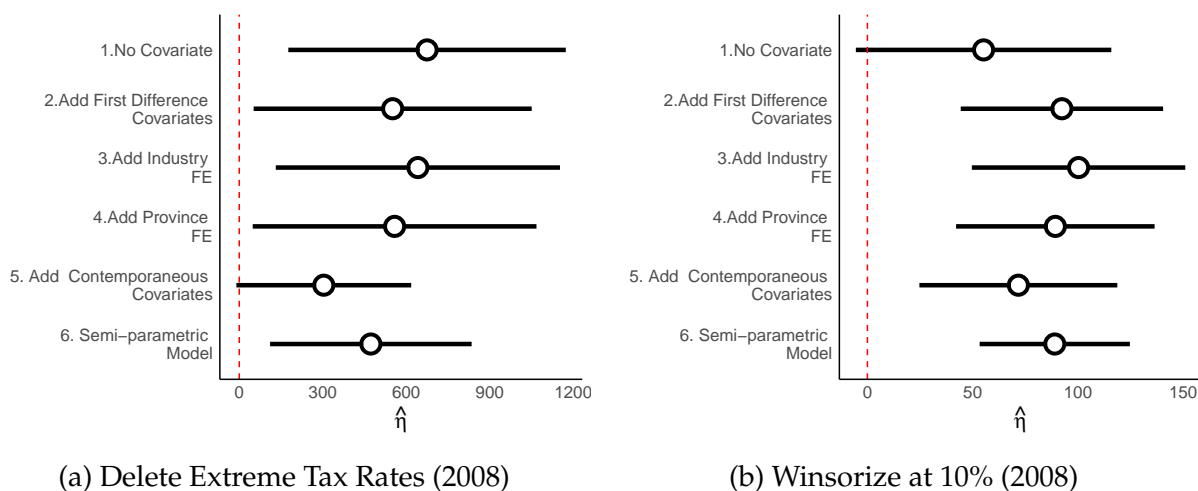
Figure D.3: Robustness Test: CBPS Weighting



Results presented in [Figure D.3](#) stay almost unchanged, which suggests that my results are not driven by significant differences in covariates neither.

Subsection D.5 Robustness Test: Extreme Values

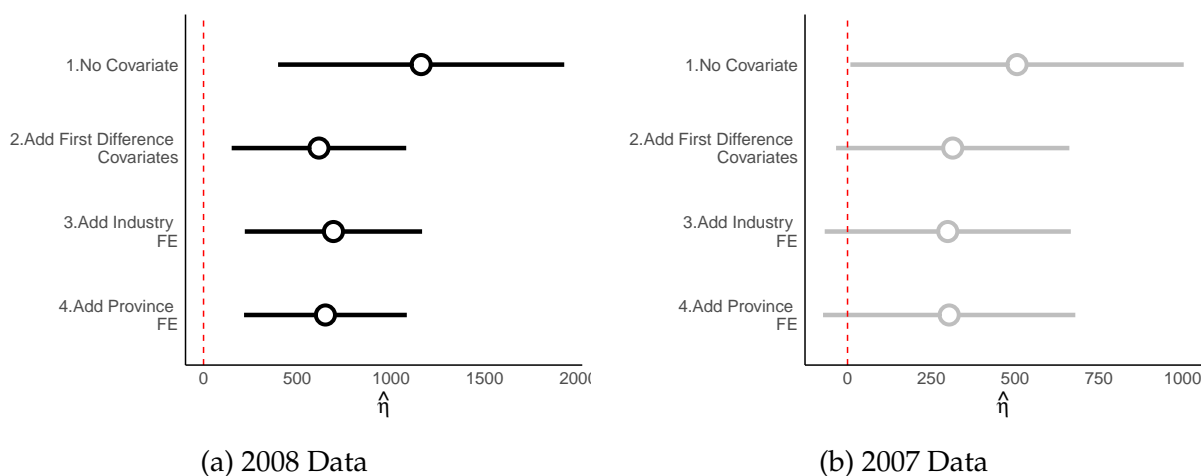
Figure D.4: Robustness Test: Extreme Values



From an accounting standpoint, firms with a negative tax amount or tax amount exceeding the profit are sensible cases. Negative tax represents that the government will return the firm previously paid income tax. It is also possible that the paid tax amount exceeds the profit in the same year because 1) the government uses different rules to calculate taxable profit; 2) the firm may need to pay deferred tax. Therefore, I include all of these observations in the main analyses. To test the finding robustness, I re-run all the models with these observations excluded. These cases account for around 4% of the total observations. [Figure D.4a](#) shows that five out of the six models remain robust. Alternatively, I winsorize all of the included variables at the 10% level and re-run the analyses. The results presented in [Figure D.4b](#) suggest the findings remain robust.

Subsection D.6 Robustness Test: Simple Regressions

Figure D.5: Robustness Test: Simple Regressions



The difference-in-differences design fails to identify the baseline effect of asset mobility before the 2008 law change. It raises two concerns: 1) even if foreign firms with higher asset mobility pay more taxes after the law change, they can still pay less in total when we consider the baseline effect of asset mobility; 2) the observed effects of higher asset mobility firms paying more tax can be purely mechanical if governments only offer higher asset mobility firms preferential tax rates before the law change. Thus, local governments can only abolish the preferential tax rates for high asset mobility firms as the low asset mobility ones never enjoy any preferential treatment.

Essentially, these concerns suggest that the overall effect of low asset mobility is still negative, even if the identified effect is positive. I propose a simple test to address these concerns: I will separately regress the paid tax amount on asset mobility using 2007 and 2008 data. If the results consistently show that low asset mobility firms pay less taxes, it alleviates these concerns.

Figure D.5 presents the two sets of regression results. Results in Figure D.5a shows that low asset mobility firms still pay less in taxes after the law change in 2008. Results in Figure D.5b also confirm that firms with low asset mobility pay less in taxes in 2007, though the effects are not statistically significant. These results suggest that firms with low asset mobility enjoy a small advantage before the law change but gain increased

advantages after the law change. This finding supports neither of the above concerns but is consistent with my theory and empirical design.

Appendix E Main Regression Tables

Table E.6: Main Results (2008)

	Model 1	Model 2	Model 3	Model 4	Model 5	Semi-Parametric
Asset Mobility	686.63** (250.18)	569.38* (253.81)	656.89* (260.90)	587.88* (262.39)	346.93* (174.81)	481.87* (189.22)
Δ Profit		0.04 (0.04)	0.04 (0.04)	0.04 (0.04)	0.02 (0.03)	✓
Δ Employee		-0.45 (1.68)	-0.52 (1.68)	-0.51 (1.69)	-2.69* (1.11)	✓
Δ Revenue		-0.02 (0.02)	-0.02 (0.02)	-0.02 (0.02)	-0.01 (0.02)	✓
Δ Export		0.00 (0.00)	0.00 (0.00)	0.00 (0.00)	0.00 (0.01)	✓
Δ Cost		0.01 (0.02)	0.01 (0.02)	0.01 (0.02)	0.00 (0.02)	✓
Δ Inventory		0.05 (0.03)	0.05 (0.03)	0.05 (0.03)	0.04* (0.02)	✓
Δ Lag Debt		0.01*** (0.00)	0.01*** (0.00)	0.01*** (0.00)	-0.00 (0.01)	✓
Profit					0.03 (0.02)	✓
Export					0.00* (0.00)	✓
Debt					0.00* (0.00)	✓
Industry FE			✓	✓	✓	✓
Province FE				✓	✓	✓
R ²	0.00	0.24	0.24	0.25	0.43	
Adj. R ²	0.00	0.24	0.24	0.24	0.42	
Num. obs.	6946	6938	6938	6938	6936	6936

*** $p < 0.001$; ** $p < 0.01$; * $p < 0.05$

Table E.7: Placebo Results (2007)

	Model 1	Model 2	Model 3	Model 4	Model 5	Semi-Parametric
Asset Mobility	-253.55 (357.60)	119.70 (167.79)	90.79 (163.91)	90.36 (163.93)	53.96 (127.38)	-89.02 (295.7298)
Δ Profit		0.08*** (0.01)	0.08*** (0.01)	0.08*** (0.01)	0.08*** (0.01)	✓
Δ Employee		-1.40 (0.86)	-1.43 (0.84)	-1.43 (0.85)	-0.64 (0.68)	✓
Δ Revenue		0.02* (0.01)	0.02* (0.01)	0.02* (0.01)	0.02** (0.01)	✓
Δ Export		-0.01*** (0.00)	-0.01*** (0.00)	-0.01*** (0.00)	-0.01*** (0.00)	✓
Δ Cost		-0.02* (0.01)	-0.02* (0.01)	-0.02* (0.01)	-0.02* (0.01)	✓
Δ Inventory		0.00 (0.00)	0.00 (0.00)	0.00 (0.00)	0.00 (0.00)	✓
Δ Lag Debt		-0.00 (0.00)	-0.00 (0.00)	-0.00 (0.00)	-0.00 (0.00)	✓
Profit					-0.00 (0.01)	✓
Export					0.00 (0.00)	✓
Debt					-0.00** (0.00)	✓
Industry FE			✓	✓	✓	✓
Province FE				✓	✓	✓
R ²	0.00	0.74	0.74	0.74	0.74	
Adj. R ²	-0.00	0.73	0.73	0.73	0.74	
Num. obs.	7389	7379	7379	7379	7378	7378

*** $p < 0.001$; ** $p < 0.01$; * $p < 0.05$

Table E.8: Placebo Results (2006)

	Model 1	Model 2	Model 3	Model 4	Model 5	Semi-Parametric
Asset Mobility	-189.95 (181.26)	-58.12 (88.17)	-39.22 (90.67)	-20.02 (91.84)	69.98 (90.58)	-213.53 (46.73)
Δ Profit		0.12*** (0.01)	0.11*** (0.01)	0.12*** (0.01)	0.10*** (0.01)	✓
Δ Employee		-1.60 (1.08)	-1.55 (1.09)	-1.54 (1.10)	-1.28 (1.14)	✓
Δ Revenue		-0.01 (0.02)	-0.01 (0.02)	-0.01 (0.01)	-0.00 (0.01)	✓
Δ Export		0.00 (0.00)	0.00 (0.00)	0.00 (0.00)	0.00 (0.00)	✓
Δ Cost		0.01 (0.02)	0.01 (0.02)	0.01 (0.02)	0.01 (0.01)	✓
Δ Inventory		0.00 (0.01)	0.00 (0.01)	0.00 (0.01)	0.01 (0.01)	✓
Profit					-0.01* (0.00)	✓
Export					-0.00 (0.00)	✓
Debt					0.00 (0.00)	✓
Industry FE			✓	✓	✓	✓
Province FE				✓	✓	✓
R ²	0.00	0.74	0.75	0.75	0.77	
Adj. R ²	0.00	0.74	0.75	0.75	0.76	
Num. obs.	6935	6935	6935	6935	6931	6931

*** $p < 0.001$; ** $p < 0.01$; * $p < 0.05$

Table E.9: Competition Heterogeneity: Mayors

	Model 1	Model 2	Model 3	Model 4
Asset Mobility	255.32 (608.38)	364.16 (450.10)	510.19 (514.93)	174.11 (496.08)
Competition	3.31 (28.46)	11.72 (17.67)	10.16 (23.69)	28.98 (25.75)
GDP	1.62** (0.58)	0.77 (0.40)	0.60 (0.34)	-0.25 (0.52)
Population	-0.19*** (0.05)	-0.12** (0.04)	-0.11** (0.04)	-0.06 (0.03)
Asset Mobility × Competition	28.54 (51.42)	-3.30 (30.62)	-8.51 (35.19)	0.56 (37.95)
Δ Profit		0.00 (0.03)	0.00 (0.03)	-0.01 (0.02)
Δ Employee		-1.61 (1.74)	-1.67 (1.75)	-2.94* (1.26)
Δ Revenue		0.00 (0.02)	0.00 (0.02)	0.00 (0.02)
Δ Export		0.01* (0.00)	0.01* (0.00)	0.01 (0.01)
Δ Cost		-0.01 (0.02)	-0.01 (0.02)	-0.01 (0.02)
Δ Inventory		0.01 (0.01)	0.01 (0.01)	0.01* (0.01)
Δ Lag Debt		0.02*** (0.00)	0.02*** (0.00)	0.00 (0.01)
Profit				0.03 (0.02)
Export				0.00 (0.00)
Debt				0.00* (0.00)
Industry FE			✓	✓
R ²	0.00	0.43	0.44	0.55
Adj. R ²	0.00	0.43	0.44	0.54
Num. obs.	4598	4590	4590	4589

*** $p < 0.001$; ** $p < 0.01$; * $p < 0.05$

Table E.10: Competition Heterogeneity: Party Secretaries

	Model 1	Model 2	Model 3	Model 4
Asset Mobility	33.89 (1224.51)	217.21 (979.93)	385.16 (992.99)	45.50 (892.80)
Competition	24.47 (54.44)	29.06 (45.55)	28.55 (46.81)	65.45 (56.36)
GDP	1.60** (0.49)	0.74 (0.44)	0.56 (0.43)	-0.26 (0.44)
Population	-0.18* (0.07)	-0.12* (0.05)	-0.10* (0.05)	-0.06 (0.04)
Asset Mobility × Competition	49.99 (108.45)	9.44 (81.59)	1.90 (81.36)	11.88 (77.56)
Δ Profit		0.00 (0.03)	0.00 (0.03)	-0.01 (0.02)
Δ Employee		-1.61 (1.25)	-1.67 (1.25)	-2.93** (0.97)
Δ Revenue		0.00 (0.02)	0.00 (0.02)	0.00 (0.01)
Δ Export		0.01 (0.00)	0.01 (0.00)	0.01 (0.01)
Δ Cost		-0.01 (0.02)	-0.01 (0.02)	-0.01 (0.02)
Δ Inventory		0.01 (0.01)	0.01 (0.01)	0.01 (0.01)
Δ Lag Debt		0.02*** (0.00)	0.02*** (0.00)	0.00 (0.00)
Profit				0.03 (0.02)
Export				0.00 (0.00)
Debt				0.00 (0.00)
Industry FE			✓	✓
R ²	0.00	0.35	0.35	0.47
Adj. R ²	0.00	0.34	0.35	0.46
Num. obs.	5338	5330	5330	5329

*** $p < 0.001$; ** $p < 0.01$; * $p < 0.05$

Table E.11: Corruption: Mayors

	Model 1	Model 2	Model 3	Model 4	Model 5
Asset Mobility	624.04** (226.30)	335.28 (216.08)	419.68 (219.23)	356.31 (213.34)	205.04 (156.05)
Corrupt	-37.28 (232.28)	-225.53 (277.52)	-153.60 (244.17)	-104.07 (256.79)	-28.35 (283.90)
GDP	1.70** (0.58)	0.77 (0.46)	0.58 (0.50)	0.67 (0.51)	-0.23 (0.52)
Population	-0.20** (0.08)	-0.13** (0.05)	-0.11* (0.05)	-0.07 (0.06)	-0.05 (0.05)
Asset Mobility \times Corrupt	-287.63 (833.11)	-169.41 (583.42)	-189.09 (573.46)	-250.31 (591.75)	-954.99 (510.70)
Δ Profit		0.00 (0.03)	0.00 (0.03)	0.00 (0.03)	-0.01 (0.02)
Δ Employee		-1.61 (1.25)	-1.66 (1.26)	-1.64 (1.26)	-2.89** (0.97)
Δ Revenue		0.00 (0.02)	0.00 (0.02)	0.00 (0.02)	0.00 (0.01)
Δ Export		0.01 (0.00)	0.01 (0.00)	0.01 (0.00)	0.01 (0.01)
Δ Cost		-0.01 (0.02)	-0.01 (0.02)	-0.01 (0.02)	-0.01 (0.02)
Δ Inventory		0.01 (0.01)	0.01 (0.01)	0.01 (0.01)	0.01 (0.01)
Δ Lag Debt		0.02*** (0.00)	0.02*** (0.00)	0.02*** (0.00)	0.00 (0.00)
Profit					0.03 (0.02)
Export					0.00 (0.00)
Debt					0.00* (0.00)
Industry FE		✓	✓	✓	✓
Province FE				✓	✓
R ²	0.00	0.43	0.44	0.46	0.56
Adj. R ²	0.00	0.43	0.44	0.45	0.55
Num. obs.	4598	4590	4590	4590	4589

*** $p < 0.001$; ** $p < 0.01$; * $p < 0.05$

Table E.12: Corruption: Party Secretaries

	Model 1	Model 2	Model 3	Model 4	Model 5
Asset Mobility	727.81** (241.63)	439.14* (215.11)	518.93* (219.41)	447.17* (211.36)	231.25 (164.73)
Corruption	220.53 (295.51)	312.78 (252.57)	359.70 (232.79)	20.95 (174.98)	357.68* (159.27)
GDP	1.69** (0.57)	0.79 (0.46)	0.60 (0.48)	0.65 (0.49)	-0.08 (0.49)
Population	-0.20** (0.07)	-0.13** (0.05)	-0.11* (0.04)	-0.06 (0.06)	-0.04 (0.05)
Asset Mobility \times Corrupt	-981.00** (333.48)	-925.57** (338.39)	-911.85** (335.14)	-881.11** (319.97)	-771.18** (291.89)
Δ Profit		0.00 (0.03)	0.00 (0.03)	0.00 (0.03)	-0.01 (0.02)
Δ Employee		-1.62 (1.25)	-1.67 (1.25)	-1.64 (1.26)	-2.90** (0.97)
Δ Revenue		0.00 (0.02)	0.00 (0.02)	0.00 (0.02)	0.00 (0.01)
Δ Export		0.01 (0.00)	0.01 (0.00)	0.01 (0.00)	0.01 (0.01)
Δ Cost		-0.01 (0.02)	-0.01 (0.02)	-0.01 (0.02)	-0.01 (0.02)
Δ Inventory		0.01 (0.01)	0.01 (0.01)	0.01 (0.01)	0.01 (0.01)
Δ Lag Debt		0.02*** (0.00)	0.02*** (0.00)	0.02*** (0.00)	0.00 (0.00)
Profit					0.03 (0.02)
Export					0.00 (0.00)
Debt					0.00* (0.00)
Industry FE		✓	✓	✓	✓
Province FE				✓	✓
R ²	0.00	0.35	0.35	0.36	0.47
Adj. R ²	0.00	0.34	0.35	0.35	0.47
Num. obs.	5338	5330	5330	5330	5329

*** $p < 0.001$; ** $p < 0.01$; * $p < 0.05$

Appendix F Survey

Subsection F.1 Balance Table

Table F.13: Balance Table

Variables	Treatment Mean	Control Mean	<i>p</i> value
Profit	4.239	4.208	0.674
Foreign Shareholder	1.369	1.338	0.162
Government Experience	1.8	1.799	0.946
Firm Age	2.65	2.565	0.103
Export	1.253	1.239	0.481
Tax Incentive	1.166	1.181	0.395
Regulation Drafting	1.836	1.822	0.468
Exit Cost	2.641	2.644	0.924
Average Government Support	2.514	2.536	0.445
Average Policy Influence	2.514	2.515	0.969
Predatory Government	1.145	1.164	0.273
Investment Competition	2.294	2.301	0.885
Managers	1.331	1.348	0.414