Discussion Paper Series
B No.36

The Internal Control System of Russian Corporations

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January 2007

INSTITUTE OF ECONOMIC RESEARCH HITOTSUBASHI UNIVERSITY

IER Discussion Paper Series (B)

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January 2007

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Naka 2-1, Kunitachi City, Tokyo, 186-8603, JAPAN
http://www.ier.hit-u.ac.jp

Printed in Tokyo, Japan

Acknowledgments

This research was financially supported by the Japan Securities Scholarship Foundation (JSSF) and the Ministry of Education and Science of Japan (Grant No. 16530149 and No. 17203019). It was also financed by a research grant provided from the Moscow Public Science Foundation for the "Project for the Future" Institution to carry out the project "Business Integration in the Corporate Sector: Incentives, Patterns, and Economic Effects," which was carried out in June 2005 – May 2006 with a research grant from the Moscow Public Scientific Foundation, sponsored by the United States Agency for International Development (USAID), and by a grant-in-aid from the State University – Higher School of Economics (No. 06-01-0050). The authors also thank Ms. Tomoko Habu, secretary of the publication division of the Institute of Economic Research, Hitotsubashi University, for her assistance with the publication of this book.

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Chapter 1

Corporate Form and Organizational Behavior
- Open versus Closed Joint-Stock Companies in Russia -

Ichiro Iwasaki

The vast majority of Russian corporations, including many manufacturing and communications firms, are still compelled to become closed joint-stock companies that lack a modern democratic mechanism in order to attract capital from a wide range of private investors. This is due to factors such as significant insider ownership, a strong orientation among managers toward closed organizations, slumping needs for corporate finance, and underdeveloped local financial institutions. The impact of ownership structure on corporate-form choice by Russian firms exists, even if we assume that the two elements are determined endogenously. Under these circumstances, however, a significant number of closed companies attempt to develop more open internal organizational structures that are virtually the same as those in open companies. Nonetheless, such an institutional coupling of a closed corporate form and an open internal organizational structure is far from effective in resolving the imminent governance problems facing Russian corporations, such as the prevention of infighting among executives and outside shareholders and the implementation of discipline among top management.

JEL classification numbers: D23, G34, K22, L22, P31

Keywords: Russia, corporate form, organizational behavior, institutional complementarity

Chapter 2

Realities of Russian Companies
- Corporate Control under Concentrated Stock Property -

Tatiana G. Dolgopyatova

This chapter describes structures of stock property in Russian companies with particular attention to capital concentration and its effect on intra-corporate relations including board of

directors' composition and role. The study is based on the data of a survey of 822 top managers of large and medium-sizes joint stock companies in industry and communications conducted in 2005 at 64 regions of Russia within the joint research project implementing by scholars from Hitotsubashi University and State University - Higher School of Economics. High level of concentration of equity capital is already established in Russian joint-stock companies. The prevailing type of corporate control in Russian companies is a control of dominating shareholders based on their direct participation in executive management or tight supervision of hired managers. The latter option creates preconditions for gradual separation of ownership and management. Although inseparability of ownership and control still prevails, the ongoing business integration works in favour of gradual separation. Hiring of top managers transforms the practice of formation and activities of a board of directors. It evolves into an operative body working in the interests of large shareholders, and it is able to monitor the executive management. Separation of management does not affect capital investment, dividend policy, intensity of corporate conflicts and relations with stakeholders. Shifts in corporate governance in the companies where management is separated don't go beyond internal mechanisms, but even this has introduced certain good standards.

JEL classification numbers: D23, G32, G34, P26, P31

Keywords: stock ownership, corporate governance, separation of ownership and management

Chapter 3

Impacts of Corporate Governance and Performance on Managerial Turnover in Russian Firms

Naohito Abe and Ichiro Iwasaki

In this chapter, we deliberate the possible impacts of corporate governance and performance on managerial turnover using a unique dataset of Russian corporations. This study is different from most previous works in that we deal with not only CEO dismissals, but also with managerial turnover in a company as a whole. We find that nonpayment of dividends is correlated significantly with managerial turnover. We also find that the presence of dominant shareholders and foreign investors is another important factor in causing managerial dismissal in Russian corporations, but these two kinds of company owners reveal different effects in terms of turnover magnitude.

JEL classification numbers: D21, G34, G35, P31, P34.

Keywords: ownership structure, corporate performance, managerial turnover, Russia.

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Chapter 1

Corporate Form and Organizational Behavior: Open versus Closed Joint-Stock Companies in Russia *

Ichiro Iwasaki

1.1. Introduction

One of the most distinguishing features of the Russian corporate sector is the preponderance of "closed joint-stock companies" over "open joint-stock companies," both of which are statutory legal corporate forms defined in the Federal Law on Joint-Stock Companies (hereinafter, the Law on JSCs). According to the Supreme Arbitration Court, as of July 1, 2001, compared with as many as 370,000 closed JSCs, there were only 60,000 open JSCs in Russia (Shapkina, 2002, p. 5). Regarding large-scale companies that require raising funds from outside sources, the number of open JSCs exceeds that of closed JSCs, the latter number still being fairly significant. In fact, a survey conducted in 2003 by the Federal State Statistics Service found that, of the 32,266 JSCs surveyed, excluding micro and small enterprises, 19,407 were open companies, and the remaining 12,859 were closed companies (Rosstat, 2004). In

* This chapter was produced as a result of a Japan-Russia joint research project entitled "Corporate Governance and Integration Processes in the Russian Economy" launched by the Institute of Economic Research, Hitotsubashi University (Tokyo) and the Institute for Industrial and Market Studies, State University – Higher School of Economics (Moscow). The research was financially supported by the Japan Securities Scholarship Foundation (JSSF) and grants-in-aid for scientific research from the Ministry of Education and Science of Japan (No. 16530149; No. 17203019) in FY2005 and FY 2006. I also thank Naohito Abe, Tatiana G. Dolgopyatova and Andrei Yakovlev for their valuable comments and Jim Treadway for his assistance with English translation. Needless to say, all remaining errors are mine.

other words, four in every ten medium-sized and large Russian corporations were operating under a governance mechanism that put rigorous restrictions on the liquidity of their own shares.

In many developed countries, JSCs are allowed to achieve "virtual" organizational closedness by, for instance, making a special resolution in their general shareholders' meeting so as to ban, in principle, the transfer of their shares to third party or adding a provision to this effect in their corporation charter.[1] In contrast, in Russia, closed JSCs exist as a legal form of incorporation for business organizations. Furthermore, Russia has an extremely unique legal framework that clearly differentiates between closed and open JSCs in terms of the mode of securities issuance, the required levels of minimum capital, the restrictions on the number of shareholders, and disclosure obligations.

Inspired by the economic theory on internal organization that has been developed from classical suggestions made by Coase (1937), a large number of empirical studies have been conducted with regard to the determinants of organizational choice and the relationship between organizational form and behavior, including corporate performance. The subjects of these studies are broad, such as the choice between outlets owned by franchisees and those owned by franchisers (Brickley and Dark, 1987), the relationship between contract types for international joint venture projects and political risks (Phillips-Patrick, 1991), the impacts of the spin-off and reorganization of limited companies on corporate value (Denning and Shastri, 1993), the organizational advantages of the multidivisional form (M-form) organization over

[1] For example, in Japan, stock companies intending to make it mandatory for their shareholders to seek their approval for the transfer of their shares must provide a provision to that effect in their corporate charter in accordance with Article 107 of the Company Law, and companies with such a provision are generally called "closed companies." There is no formal closed JSC as a legal corporate form in continental law countries, either. On the other hand, in the UK, business firms are formally classified according to the Company Law into public companies and private companies, depending on how they raise funds, and private companies have similar statutory characteristics to those of closed JSCs in Russia.

the unitary form (U-form) (Weir, 1996), the relationship between corporate form and a growth/survival rate (Harhhoff, Stahl, and Woywode, 1998), the organizational choice of insurance distribution systems (Regan and Tzeng, 1999) and that in case of gasoline retailing (Blass and Carlton, 2001), the impact of liability systems on the choice of oil transportation system (Brooks, 2002), the organizational choice between closed-end and open-end investment funds (Deli and Varma, 2002), the choice of the contract type for driver employment in the European trucking industry (Arruñada, González-Díaz, and Fernández, 2004), and the correlation between international disparities in the business environment and differences in the business incorporation rate among countries (Demirguc-Kunt, Love, and Maksimovic, 2004). Surprisingly, though, except for a valuable case study by Karpoff and Rice (1989), there has been little empirical work investigating organizational choices by JSCs as well as their possible impacts on corporate behavior and performance. Thus, the corporate forms of Russian JSCs are a very important research subject to be explored from the viewpoint of organizational and financial economics.

Furthermore, this topic has great significance for understanding the Russian economic system, which is now experiencing a large-scale institutional transformation towards a capitalist market economy. As long as the primary nature of a stock company can be defined as a modern democratic mechanism for raising funds from the general public, an open company, which guarantees free share transferability, is the basic form of joint-stock company. In this sense, a closed JSC is one that distances itself from the fundamental purpose of a modern corporation. As previously described, still in Russia, the reality is that not only small corporations but also large enterprises are formed as closed JSCs across the country. It is quite possible that the high degree of orientation towards organizational closedness in the Russian business sector is inseparably linked to its poor corporate governance practices and its investment behavior, which remains inactive regardless of a significant economic recovery in recent years. Therefore, particular attention should also be given to research on the corporate forms of Russian firms in the context of the economics of transition and the Russian economic studies. Nevertheless, there have been only a

handful of economic studies touching on this topic, including that by Dolgopyatova (1995), and virtually no detailed research has been conducted on this aspect.

An attempt is made in this chapter to deal with this significant but yet-to-be explored problem on the basis of a large-scale questionnaire enterprise survey conducted from February to June 2005 in the framework of a Japan-Russia joint research project launched by Hitotsubashi University and State University – Higher School of Economics. In this survey, the top management personnel of 822 manufacturing and communications companies located in the 64 federal regions were interviewed in person.[2] The companies covered by our survey are all stock companies, and the average number of employees per company is 1,884 (Standard deviation: 5,570; Median: 465). As for their corporate form, open and closed JSCs account for 67.3% (553 firms) and 32.7% (269 firms) of the 822 surveyed firms, respectively, and this composition corresponds closely to the results of the aforementioned corporate survey by the Russian statistical office.[3] Furthermore, looking at our surveyed firms by region and by industrial sector, it is confirmed that they provide an ideal sample group representing Russian medium-sized and large JSCs.[4]

Relying upon the results of our joint survey, we first examine a variety of factors as to why Russian stock companies select to become closed JSCs. In the latter part of this chapter, we deal with the relationship between the corporate forms and internal organizational structures, as well as with the impact of these institutional couplings on

[2] 94.8% of those interviewed in our survey were presidents and vice-presidents. The remaining respondents were board chairmen (1.6%) and middle-class managers responsible for corporate governance matters (3.6%).

[3] The closed JSCs covered by our survey include four workers' joint-stock companies (people's enterprises), which are a special form of closed company. Although a workers' JSC is a very interesting legal form to study, it is not investigated in this chapter. For details of its institutional setting, see Iwasaki (2003, pp. 525-527).

[4] For more details of the joint enterprise survey and the main characteristics of the surveyed firms, see Dolgopyatova and Iwasaki (2006).

organizational behavior, including corporate performance. Through these research steps, we intend to provide new perspectives on the causality between corporate forms and organizational behavior.

The remainder of this chapter is organized as follows. The next section looks at the legal framework regulating the corporate forms of the Russian JSCs as well as its significance in the context of organizational strategy. Section 1.3 examines the determinants of organizational choices between open and closed JSCs. Section 1.4 focuses on the institutional complementarity of corporate forms and internal organizational structures. Section 1.5 analyzes the relationship between institutional equilibrium of a corporate organization and organizational behavior. Section 1.6 concludes the chapter.

1.2. Corporate Forms of Joint-Stock Companies in Russia: Institutional Framework and its Significance for Organizational Strategy

First, in this section, the institutional diversity of open and closed JSCs is discussed, and the significance of each of these two corporate forms is then clarified in terms of organizational strategies and how the managers interviewed in this survey perceive the main factors determining the reasons that their firms chose their current legal form of incorporation.

An investor who intends to establish a stock company in Russia must choose to make it either an open JSC or a closed JSC, as required by the provisions of the Russian corporate law,[5] which provides for statutory distinctions between these two types of corporate forms in the following six areas: (a) share transferability; (b) method for issuing securities; (c) required minimum capitalization; (d) number of shareholders; (e) government funding; and (f) disclosure obligations (see **Table 1.1**). First, a

[5] These provisions refer to the Civil Code, Part I, Chapter 4, Articles 96 to 104, and to the Law on JSCs. This section was written taking into account the laws and regulations that were effective in Russia during the period of the enterprise survey used as the base material for this empirical study.

shareholder of an open JSC may freely transfer its shares to any third party other than another shareholder of the company or the company itself, while, on the other hand, a shareholder of a closed JSC must sell its shares first to another shareholder of the company or the company itself due to the right of preferential purchase given to them. Specifically, a shareholder of a closed JSC who intends to transfer its shares to a third party must, at its own cost, notify all other shareholders of the company and its executives in writing concerning the selling price of the shares by the selling shareholder, as well as other terms and conditions included in an agreement between the selling shareholder and the purchasing third party, in order to confirm whether any of the other shareholders of the company or the company itself wishes to execute its right of preferential purchase. This obligation enables a closed JSC and its shareholders to detect in advance every action by any shareholder to transfer its shares to a third party and to effectively prevent the stock drain to outside parties by bearing necessary costs to purchase these shares.[6]

Secondly, unlike open JSCs, whose shares issued at the time of formation may be allocated to their promoters and to the general public (i.e., establishment with outside offering), closed JSCs are required to issue their shares only to their promoters and the other investors specified in advance. Even after incorporation, closed JSCs are not allowed to offer new shares to the general public, although they may issue corporate bonds other than convertible bonds on the securities market as a means of raising funds from outside sources.

Thirdly, the minimum capitalization (share capital) for open JSCs needs to be at least 1,000 times the statutory minimum wage at the time of their registration, while,

[6] Article 7 of the Regulations for Joint-Stock Companies approved by the Resolution of the RSFSR Cabinet of Ministers No. 601 of December 25, 1990, which was later replaced by the current Law on JSCs, provided that the shareholders of a closed JSC were prohibited from transferring their shares without the approval of a majority of all the shareholders of that closed JSC. It may be said that the share transfer restriction provided in the Law on JSCs now in effect is rather less severe than that in the Regulations for Joint-Stock Companies that was in force until the end of 1995.

on the other hand, closed JSCs are required to secure only 100 times the statutory minimum wage. For example, the effective statutory minimum wage for the period from January to August 2005 was 720 rubles (about USD25) monthly.[7] Therefore, there is a difference of 648,000 rubles (about USD23,000) between these two legal forms of JSCs established during this period with respect to their minimum share capital required by the Law on JSCs, which is not a trivial difference for small and venture businesses seeking to be incorporated.

Fourthly, closed JSCs may not have more than 50 shareholders, and, if the number of their shareholders exceeds this limit, they must, within a period of one year, reduce it to 50 or less, turn it into an open JSC, or be dissolved. However, this regulation does not apply to closed companies established by the end of 1995 before the enforcement of the current law on JSCs. In addition, the August 1996 presidential decree, in which closed JSCs with more than 25% of their shares owned by the government were ordered to become open JSCs, was not a very strong legally binding instrument since no effective penalties or sanctions were imposed on those violating the decree (Iwasaki, 2003, pp. 510-511).[8] As a result, there are still a large number of closed JSCs with 50 or more shareholders, and many of them are former state-owned enterprises and ex-municipal companies that were privatized in the process of the mass-privatization policy launched in the early 1990s as well as the affiliates of private firms and brand new companies that came into being in those days.

Fifthly, no state authorities, including local governments, can be the founder of a JSC in principle. In addition, even when a stock company is exceptionally established by a government or state organization using a company separation package in which the newly established joint-company inherits the assets of the government or state organization, that newly established company must be an open JSC. However, this regulation does not apply to cases in which a stock company is established by a

[7] Refer to Article 1 of the amended Federal Law on Minimum Wages of December 29, 2004.

[8] Refers to the Presidential Decree on Measures to Protect the Rights of Shareholders and to Ensure the Interests of the State as an Owner and Shareholder of August 18, 1996. This decree lost its effect in February 2005 with the amendment of the Bankruptcy Law.

government or state agency as a result of its separation from a privatized firm. This is one of the reasons that there are still many closed JSCs with their shares held by the state.

Lastly, open JSCs are obliged to disclose information, such as annual business reports, financial statements, asset securities reports, and other materials required by statute or requested by the Federal Financial Markets Service (FFMS) and other government authorities, while, on the other hand, closed JSCs are not subject to such disclosure requirements, except in cases where they issue bonds and other securities using the schemes and prices specified by the financial authorities.

Meanwhile, as pointed out by Emery, Lewellen, and Mauer (1988) and Gordon and Mackie-Mason (1994), tax distortion can have a significant impact on the decision-making process for investors and enterprises concerning organizational choices. In Russia, however, there are no differences in the applicable tax provisions between open and closed JSCs, and both of these corporate forms are regulated by the principle of equal taxation with respect to corporate ownership, investors, and capital sources.[9] There are no provisions set out in the Federal Law on Bankruptcy, the Corporate Governance Code, or any other legislation that could seriously affect the choice of the corporate form by a JSC.

The results of the joint enterprise survey, in which corporate executives were asked how they perceived the significance of the aforesaid legal framework in the context of their organizational strategies, as well as the most important reason for them to keep their company in the current corporate form, revealed that many of the respondents recognized that the choice between an open and a closed JSC had a considerable impact on its corporate strategies. Of 793 firms that provided valid responses to the survey, 602 (75.9%) replied that their corporate-form choice would or might affect their business growth, far more than the 191 (24.1%) that answered that

[9] Refer to Article 3 of Part I of the Tax Code. Although it is not reported in Article 3, it is widely recognized that the principle of equal taxation is construed to be applied to both open and closed JSCs (Abrosimov et al., 2005, p. 10). In fact, in Russia, joint-stock companies are treated equally to limited companies and other types in terms of taxation.

there was no connection between these two factors. The difference between the group of open JSCs and the group of closed JSCs covered in the survey regarding the proportion of firms that confirmed a connection between their organizational choice and their business development is statistically significant at the 10% level (χ^2=3.209, p=0.073) but quite small (77.8% vs. 72.0%). In addition, of the above 602 firms that said that their performance was influenced by their corporate form, 518 (86.0%) perceived such an influence to be positive for their business growth, much greater than the 84 firms (14.0%) that regarded it as negative. The difference between the group of open JSCs and the group of closed JSCs regarding the proportion of firms that positively perceived such an influence on their performance was very small (85.7% vs. 86.7%) and not statistically significant (χ^2=0.098, p=0.754). Hence, a great number of corporate executives see an inseparable relationship between their organizational choice and business activities regardless of the difference in the corporate form of their companies.

Table 1.2 shows the results of answers from corporate managers as to a question about the comparative advantages of each of the two corporate form options. Of the enterprises that admitted the organizational superiority of open JSCs to closed JSCs, 395 firms (68.3%) answered that open JSCs were better than closed JSCs in building a reliable relationship with investors and partners or in raising funds from outside financial sources, reflecting their current focus of attention, and this number is greater than the number of firms that replied that the organizational benefits of open JSCs lay in the flexibility of share transfers. A substantial and statistically significant difference can be observed between the open and closed JSCs in the breakdown of their answers to this question. Compared with the respondents of open JSCs, those of the closed JSCs pay more attention to the aspect that open JSCs enjoy good fundraising capabilities. At the same time, however, there are many managers of closed JSCs who do not see any advantage in the corporate form of open JSCs. As for closed JSCs, most executives, regardless of whether they are working for closed or open JSCs, agree that closed companies can more effectively defend their organizations from outsiders, including the state, than open companies. There is no remarkable

difference between the two company groups in the breakdown of their answers to the above question.

Table 1.3 indicates the answers of our respondents to the question of what was the most important reason for their companies having the current corporate form. Compared with 11.8%, who identified it as related to legal restrictions concerning the number of shareholders and the minimum required capital, 75.5% replied that it was because of the mass-privatization policy in the early 1990s or because of a management decision made on their own or by their shareholders. The result that 54.4% of the open JSCs answered they had become open JSCs due to the mass-privatization policy is quite understandable in the historical context that the Federal Government had strongly urged soon-to-be-privatized enterprises to select becoming open JSCs by facilitating a swap between privatization vouchers distributed to the general public free of charge and the shares of state-owned and municipal enterprises. On the other hand, in consideration of the fact that managers and worker collectives are still the dominant shareholders in many Russian firms and in light of the introverted mentality of these insider shareholders, it also makes sense that they favor a closed company as a result of their decision-making on their organizational strategy under the given uncertain social environment typical of a transition period.

1.3. The Choice of Corporate Form by Russian Firms

In Russia, the growing trend toward a market economy and its integration into the global economy are forcing domestic firms to tackle the issue of optimal adaptation to ever-changing business environments. Hence, it is not uncommon for Russian corporations to make a major change in their company profile, including their form of incorporation.[10] For instance, companies much more frequently change from limited

[10] In fact, experts at the Levada Center Social Research Institution (the former USSR All-Soviet Public Opinion Poll Center) who assisted with our enterprise survey, basing their opinion on their own experience, predicted that only about 200 of 500 firms would retain their company profile almost unchanged for a period of 5 years after being surveyed.

to joint-stock stature and vice versa than they do in Western countries. Needless to say, changes from an open JSC to a closed JSC and the reverse, which can only take place by amending a company charter through a special resolution at a general shareholders' meeting and then officially registering such an amendment, take place all the time (Tikhomirov, 2001, p. 91).

Although the law on JSCs stipulates that the amendment of a company charter must be made through a special resolution, which is passed by a majority of at least three-fourths of the votes cast by the shareholders with voting shares in attendance, this provision is not a serious obstacle to such amendments because, in many Russian companies, a small number of shareholders own a significant share of the total; that is, for the top management and major shareholders of Russian stock companies, the issue of whether their firms should be open or closed JSCs is just an "operational" variable even after their establishment.

The discussion in the previous section highlights the difference between open and closed JSCs as a corporate form option available in Russia and the significance of these two corporate forms from the viewpoint of organizational strategies as well as the impact of the mass-privatization policy on the decision-making process of stock companies about whether they should be open or closed JSCs. Based on these facts uncovered by our enterprise survey, this section is a theoretical and empirical analysis of the organizational choice mechanism of Russian corporations.

1.3.1. Theoretical Considerations

According to the economic theory of the organization and the firm advocated and developed by Alchian and Demsetz (1972), Jensen and Meckling (1976), Mayers and Smith (1981), Fama and Jensen (1983a, b), Williamson (1985; 1996), Milgrom and Roberts (1992), Jensen (2000), Furubotn and Richter (2005), and others, the differences in the institutional setting between an open and closed JSC would affect the incentives and decision-making process of corporate managers and shareholders through the following three mechanisms, which have a significant influence on their choices of corporate form.

The first mechanism is the asset effect of restrictions on share transfer; that is, any restrictions imposed on a closed company on the transfer of its shares will undermine the liquidity and value of such shares as financial commodities. Furthermore, as explained in Section 1.2, a shareholder of a closed JSC intending to transfer its shares to a third party must bear all the costs needed to confirm if any of the other shareholders in the closed JSC or the company itself wishes to execute its right of preferential purchase. Therefore, those who invest money purely to gain a return on their investment (i.e., portfolio investors) will buy the shares of open JSCs, rather than those of closed JSCs, *ceteris paribus*. Based on the same logic, corporate executives would prefer to have the corporate form of an open company from the viewpoint of issuing securities to raise funds from outside sources, since a closed company must pay for all the marginal capital costs equal to the transaction costs for the transfer of its own shares to a third party and the cost of a low liquidity premium on its own shares and closed JSCs are placed at a disadvantage over open JSCs due to the ban on issuing any convertible bonds. In addition, as indicated in **Table 1.2**, a firm's choice of adopting the open company as its corporate form will increase the transparency of its management, making it easier for the firm to receive loans from banks and other financial institutions. Considering the above, the higher a firm's fundraising demand, the more likely it is to be an open JSC.

The second mechanism is the governance effect of share transfer restrictions. Strict restrictions imposed on a closed JSC on the transfer of its shares significantly decrease the possibility of a change in its internal control or ownership that may be made due to an "exit" from the company of its shares sold, tender offer, proxy fight, and bankruptcy, posing a serious impediment to the reshuffling of a management body that has failed to come up with effective corporate discipline and to achieve the expected performance. Therefore, from the standpoint of which corporate form has a relatively better corporate governance mechanism, outside shareholders are more inclined to invest in open JSCs, while, on the other hand, corporate managers who wish to retain their managerial discretion to behave in an opportunistic way or wish to avoid the risk of outsiders attempting a hostile takeover bid choose to establish and

keep their firms as closed stock companies.

The third mechanism suggested in organizational economics is the information effect of state disclosure regulation. The disclosure obligation imposed only on open JSCs by the state produces the effect of alleviating the information asymmetry between executives and investors in favor of the latter, causing more outside shareholders to invest in open JSCs, which have a better governance system than closed JSCs, and more managers to operate their firms as closed companies.

In addition to the above three mechanisms, focus also needs to be given to the widespread existence of business groups (i.e., financial-industrial groups or holding companies) as a factor having a significant impact on the organizational choices between open and closed JSCs in Russia.[11] In fact, our survey revealed that 35.7% of the manufacturing companies (268 of 751 firms) and 77.5% of the communications companies (55 of 71 firms) were controlled by certain business groups through shareholding. Hence, the following hypothesis may be proposed: as the fourth mechanism, a company's participation in a business group is effective in protecting it from outside threats, such as state intervention or hostile takeover bits, due to the political influence exerted by the business group the company belongs to and the cross-shareholding relationship within member firms.[12] As a result, the organizational advantages of a closed JSC as an "institutional defense barrier" become trivial for group companies. Furthermore, it is not desirable for business groups to place restrictions that are too strict on the transfer of their shares from the viewpoint of

[11] See Johnson (1997), Perotti and Gelfer (2001), Hoffman (2002), Klepach and Yakovlev (2004), and Guriev and Rachinsky (2005) for details on the financial-industrial groups and oligarchs in Russia.

[12] In fact, according to our survey results, one in five managers of the group firms regards effective protection from hostile acquisition as the greatest advantage of being members of holding companies or other business groups, and this factor accounts for 13.3% in the all multiple answers (two items at a maximum) following "stronger position in the domestic market" (32.2%) and "better access to invested funds and easier introduction of new technologies" (31.0%).

ensuring effective inter-group asset management. Therefore, the growing trend for Russian companies to take part in a financial-industrial group or a holding company is expected to increase the possibility of member firms being operated as open JSCs. However, with the hierarchy within such business groups expanding, enterprises in the lower echelons are more likely to be established by their upper companies as the wholly owned subsidiaries or dummy firms for account-rigging or tax evasion purposes, and these enterprises are usually closed companies bound by less strict disclosure obligations. Consequently, the organizational scale of a business group is thought to be positively correlated with the proportion of closed JSCs in the member firms of that group.

Lastly, as explained above, considering the background of Russia's privatization policy and its legal restrictions on state investment, privatized companies and companies separated from state-owned or municipal companies are more likely to choose to operate as open JSCs compared to enterprises newly established by private capital after the fall of the communist regime; that is, the impact of past policies on company start-ups may have a historical path-dependent effect on organizational choices. In summary, Russian stock companies branch away either to open JSCs or to closed JSCs through the interaction of the aforementioned five mechanisms.

1.3.2. Empirical Assessment

In this subsection, we empirically test the theoretical mechanism of making a corporate-form choice as well as its impact and statistical significance of choosing each alternative. We estimate our organizational choice models by probit methods using a discrete variable, in which closed JSCs take a value of 1 (versus 0), as the dependent variable (*CLOCOM*) as well as adapting the following independent variables: (a) ownership variables representing the influence of outside shareholders and managers over organizational strategies, (b) variables concerning the constraints affecting capital demand and supply of the company; (c) variables regarding the linkage between a company with a business group and the organizational scale of that group; (d) variables concerning the impact of past policies on company start-ups; and

(e) other control variables. The probit model taking *CLOCOM* as a dependent variable assumes that:

$$\Pr[CLOCOM = 1] = \Phi(x\beta) = \int_{-\infty}^{x\beta} \frac{1}{\sqrt{2\pi}} e^{-t^2/2} dt,$$

where x is a vector of independent variables including a constant term, β is a parameter vector, and Φ (.) indicate the standard normal distribution function. The log of the likelihood function for the model is given by:

$$\log L = \sum CLOCOM_i * \log[\Phi(x_i\beta)] + \sum (1 - CLOCOM_i) * \log[1 - \Phi(x_i\beta)].$$

We estimate β using maximum likelihood.

The variables of outside ownership utilized in our estimation are: the 6-point-scale ownership share of outside shareholders excluding domestic individuals (*OWNOUT*) and that of the state (*OWNSTA*) and private shareholders (*OWNPRI*), each of which is further classified into the federal government (*OWNFED*), regional and local governments (*OWNREG*), commercial banks (*OWNBAN*), investment funds and other financial institutions (*OWNFIN*), non-financial corporate shareholders (*OWNCOR*), and foreign investors (*OWNFOR*). As for managers, a large management shareholder dummy (*MANSHA*) is adapted, in which, if a manager or group of managers is a major shareholder of his or her own company, that company takes a value of 1.[13]

[13] In other words, domestic individual shareholders, including employee shareholders, are treated as a reference category. The experience of our joint research team and that of other researchers indicates that many Russian top managers do not have sufficient data on ownership by employees of his/her company or ownership by other managers or families, relatives, or acquaintances of employees, all of whom are categorized as outside individual shareholders, and, therefore, their answers to our questions about their insider ownership may contain substantive measurement errors. In addition, the reason that we used a large management shareholder dummy variable that represents the position of managers as corporate owners is that it is quite difficult to ask managers to submit accurate data on their own shareholding rate. In addition, making such a request of managers is very likely to result in their refusal to participate in the survey.

The variables used as proxies of company's capital demand are a securities-issuing planning dummy (*SECPLA*) in which, if the company has a plan to issue securities in Russia in the near future, it takes a value of 1, if the company has a plan to issue shares and bonds in foreign financial markets, where more stringent rules than in Russia are enforced with respect to organizational management and disclosure, it takes a value of 2, and, if neither of these two conditions applies, it takes a value of 0, and a relationship-banking dummy (*RELBAN*) for companies with a long-term credit relationship with a certain commercial bank. On the other hand, as a proxy for representing the constraints affecting the capital procurement of a company, the number of financial institutions per 1,000 non-financial corporations in a federal district where the company is located (*NUMFIN*) is introduced. *NUMFIN* is used because, except in a few big cities, local commercial banks and investment firms play a critical role in the field of investment financing and financial consulting services for the corporate sector, and the development of these local financial institutions is an overriding factor affecting the fundraising abilities of local companies.

The variables for the relationship between a company and a business group the company belongs to are a group firm dummy (*GROFIR*) that takes a value of 1 if the company is a member of a certain holding company or other business group by owning stocks, as well as a core corporation dummy (*GROCOR*) and an affiliate firm dummy (*GROAFF*), both of which reflect the characteristics of the company's group membership. The organizational size of the business group is represented by the natural logarithm of the total number of its member firms (*GROSIZ*).

The impact of past policies on company start-ups is assessed using two dummy variables from the standpoint of the importance of the mass-privatization policy and the statutory regulations on investments by state agencies. Namely, *PRICOM* takes a value of 1, if the company is a privatized firm of a former state-owned or ex-municipal enterprise. *SPIOFF* captures firms that span off from state-owned enterprises or

privatized companies.[14] The control variables include the natural logarithm of the total number of employees representing the company size (*COMSIZ*) and a series of industrial dummy variables to control industrial effects.

In accordance with our theoretical considerations in Subsection 1.3.1, we expect that the ownership by outside shareholders represented in *OWNOUT* and other variables restrains companies from being closed JSCs; in other words, outsider ownership is negatively correlated with the choice of a closed JSC. The sign of *MANSHA* cannot be specified at this stage, as it varies depending on which element is more powerful, the marginal assessment value of own shares by a manager or a group of managers, or the additional benefits the manager obtains by operating a closed company. All of the three variables concerning capital demand and supply are expected to be negative. The three dummy variables representing a company's participation in a business group would be negatively correlated with the company's choice of the corporate form of a closed JSC, whereas *GROSIZ* would have a positive sign. *PRICOM* and *SPIOFF*, both of which reflect the impact of past policies on company start-ups, would be negative. *COMSIZ* are also expected to be negative; this is because the larger the size of a company is, the more shareholders and the more capital the company has, and the requirements to choose the corporate form of an open JSC are gradually fulfilled.

Table 1.4 compares open and closed JSCs using the above independent variables. Open JSCs, regardless of their type, have a higher average outside ownership than closed JSCs, and the difference between the two forms of incorporation in this regard is significant at the 1% level, except for foreign ownership. In contrast, the percentage of companies with large management shareholders in all samples of closed JSCs is 15% higher than that of open JSCs, and the difference between them is statistically significant at the 1% level. Furthermore, the differences between open and closed JSCs in the proportion of companies having a long-term credit relationship

[14] Hence, newly established private firms after the collapse of the Soviet Union are treated as the reference in our estimation.

with a certain commercial bank, the proportion of privatized firms, and the average number of employees are also statistically significant and consistent with our theoretical hypotheses. The remaining variables need to be reexamined using a regression analysis technique, since their statistical significance was not detected by simply comparing the descriptive statistics.

The basic sample for our estimation consists of 557 observations, excluding all stock companies that have already issued securities in the past (Sample I). In order to validate the robustness of the estimation results, a supplementary estimation is performed using the following three cases: Sample II, which is made up of the firms included in Sample I excluding all communications firms; Sample III, which excludes firms whose number of employees exceeds the mean of the number of employees of the closed JSCs plus/minus 1 standard deviation from the basic sample set; and Sample IV, which consists of firms with a stable ownership structure that did not see any changes in major shareholders from 2001 to 2004. An estimation using the former two cases focuses on the estimation bias arising from the characteristics of newly emerged telecommunication businesses and those of mega corporations. On the other hand, the estimation using sample IV deals with the possible endogeneity relating to corporate forms and ownership structures. Furthermore, as an alternative way to cope with the endogeneity problem, we also conduct a two-stage estimation [15] by introducing the following four variables as instruments: a dummy variable of shareholding by an incumbent CEO (or president) (*CEOSHA*), a dummy variable which takes a value of 1 if there is a shareholder or a shareholder group who substantially controls corporate management (*DOMSHA*), the age level of the CEO or company president (*CEOAGE*), and a three-point-scale assessment on the intensity of

[15] The two-stage procedure would be to estimate the reduced forms for ownership variables by probit or ordered probit maximum likelihood and estimate the corporate-form choice model by probit after substituting predicted values for ownership variables. For more details of the two-stage estimation methods, see Maddala (1983), Newey (1987), and Rivers and Vuong (1988).

competition with domestic firms in a product market (*COMDOM*).[16] The White estimator of heteroskedasticity-consistent standard errors is used for various statistical tests.

The following is the basic equation for our regression, and the marks in parentheses stand for the expected signs:

Pr[*CLOCOM*=1] = *F*(*constant*, *OUTOWN*(-), *MANSHA*(?), *SECPLA*(-), *RELBAN*(-), *NUMFIN*(-), *GROFIR*(-), *GROSIZ*(+), *PRICOM*(-), *SPIOFF*(-), *COMSIZ*(-), *industrial dummies*)

Table 1.5 shows the estimation results.[17] The coefficients of the independent variables represent their marginal effects. The marginal effect in the probit model is computed as:

$$\frac{\partial E[CLOCOM_i]}{\partial x} = \Phi(x_i\beta)\beta \,.$$[18]

Except for the variables representing ownership by financial institutions including commercial banks and foreign ownership, all of the explanatory variables for Model (A) through Model (D) estimated using the basic sample have the predicted signs with

[16] The correlation coefficients for *CLOCOM* and each of the newly introduced 4 variables range between -0.032 and 0.019, and are statistically insignificant.

[17] The correlation coefficients for the independent variables used in each model are well below a threshold of 0.70 for possible multicollinearity in all combinations (Lind et al., 2004).

[18] The marginal effect for a binary independent variable (say *D*) would be Pr[*CLOCOM*=1| $\bar{x}_{(D)}$, *D*=1] - Pr[*CLOCOM*=1| $\bar{x}_{(D)}$, *D*=0], where $\bar{x}_{(D)}$ denotes the means of all the other variables in the model (Greene, 2003, pp. 667-668).

high statistical significance.[19] The presence of outside shareholders diminishes the probability that an investment-target firm will become a closed JSC. Another interesting aspect is that the marginal effect of state involvement is much stronger than the influence of private owners. The impact of capital demand and the development of local financial institutions also reduce the probability of the emergence of closed JSCs. Companies linked with a business group through ownership tend to choose to become open JSCs. However, the larger a business group becomes, the higher the number of closed companies that are included among its member firms. Privatized firms, as well as JSCs span off from state-owned or municipal enterprises or from privatized companies, are more likely to be open companies. In addition, as the size of a company grows, the likelihood of the company operating as a closed JSC significantly decreases.

On the other hand, the result that a large management shareholder dummy (*MANSHA*) is significant and positive gives a special characteristic to the Russian economy. This implies that Russian managers place far more importance on maintaining effective control of their company than on obtaining capital gains by having stock in their companies. In other words, they have a strong desire to prevent outsiders from participating in their management activities even at the cost of a somewhat reduced value and lowered transferability of their own shares.[20] Furthermore, this result clearly demonstrates that the most attractive reason for Russian managers to operate their firms as closed JSCs is the variety of fringe benefits

[19] The non-significance of ownership by financial institutions and foreign ownership is consistent with the statements pointed out by many researchers pertaining to the passive attitude of commercial banks and investment funds as institutional investors, the weak presence of foreign shareholders, and the widespread share purchases by managers and their affiliates through offshore companies (Iwasaki, 2006).

[20] This is closely associated with the fact that the sample firms for the empirical analysis in this section as well as the massive majority of Russian companies are unlisted with stock prices that are not particularly sensitive to management performance, which leads to an extremely low incentive effect of stock ownership by managers.

they obtain by doing so. Although 14 years have passed since the systemic transformation to a market economy, it is highly probable that many corporate executives still hold on to such perceptions under the conditions of the developed capital and managerial markets in the Russian economy.

It is logical that *SECPLA* for Model (E) and that for Model (F) are a little less significant than those for the other models, since the sample set does not include any communications companies,[21] which represent the emerging industry in Russia, and largest corporations that have substantial financial needs and are highly motivated to raise equity capital. It is not surprising that the *GROFIR* and *GROSIZ* for Model (G) are insignificant, considering that an impressive 46.4% of the surveyed firms (110 of 237) that experience a substantial change in their ownership structure from 2001 to 2004 concentrate on group firms. What is more important, from the viewpoint of the statistical robustness of the estimation results, is that the explanatory power and significance of the ownership variables in Model (G) are almost the same level as those of the estimates for Model (A).[22] In addition, the result of two-stage probit estimation of Model (H) also strongly suggests that there is an empirical relation between the corporate form and the ownership structure even if we assume that both of them are determined endogenously.

Thus, our estimation results strongly support the theoretical hypothesis stated in Subsection 1.3.1; that is, the five organizational choice-mechanisms, including the asset effect and governance effect arising from share transfer restrictions, are effectively functioning in the real world. In other words, there are four primary influential factors: (a) a concentrated insider ownership structure, (b) persistent

[21] In fact, the Russian communication sector, which has been developing in recent years at a breathtaking speed, driven by cellular phone and Internet service businesses, saw an average annual real growth rate of 22.4% between 2001 and 2004, much higher than the 4.2% for the eight manufacturing sectors covered by our enterprise survey; that is why the telecommunication sector is regarded as the new economy in Russia.

[22] On the other hand, all models were re-estimated by logit and the results were found to be almost the same as those indicated in Table 1.5.

orientation towards organizational closedness among corporate officers, (c) sluggish capital demand in the corporate sector, and (d) an underdeveloped regional financial sector, all of which cause many JSCs to choose the corporate form of a closed company in Russia. The impact of ownership structure on corporate-form choice by Russian firms exists, even if we assume that the two elements are determined endogenously.

1.4. Institutional Complementarity between the Corporate Form and the Internal Organizational Structure

Choosing which corporate form to take has an important strategic meaning for a JSC with regard to defining its organizational openness and balancing the power between its managers and shareholders; however, this is not the only step required. Its objective is fulfilled when the company has finalized its internal organizational structure by, for example, drawing up a corporate charter and electing the corporate bodies required by law. This section further examines corporate form issues by focusing on the institutional complementarity between the corporate form and the internal organizational structure.

1.4.1. A New Approach to Institutional Complementarity: Function-Enhancing Complementarity versus Function-Neutralizing Complementarity

A general perception by economists of the concept of institutional complementarity is represented in the following statements by Aoki (2000, pp. 57-58):

> 'If the institutional structure of a particular economy reflects equilibrium strategies in its underlying evolutionary game, complementarity is likely to exist between the elements of that structure. That is, *the operations of one institution will be reinforced by the existence of other institutions*. This is referred to as "institutional complementarity,"…' (Emphasis added).

The concept of institutional complementarity not only refers to the institutional compatibility in a particular economic system but also implies a positive assessment of

the synergistic effects of different institutions functionally enhancing each other. The most commonly used phenomenon in explaining this notion in the context of the Japanese economy is the Japanese corporate governance system, which is characterized by an insider-centered career system, cross-shareholding practices between a company and its clients or financial institutions, and the main bank system,[23] and the Japan-style employment system featuring long-term (lifetime) employment, a seniority-based pay scale, and an in-house union (Miyamoto, 2004). The concept of institutional complementarity is believed to have paved the way to accounting for the fact that the Japanese economic system is more reasonable in Japan than its counterparts in the US and European countries, which has significantly contributed to overcoming the stereotype of Japan as a country with a unique but eccentric economic system.

Nevertheless, we insist that such complementarity may exist in a way that causes one institution to functionally undermine the other. This means that, even if the functional level of an institution were excessive for a particular economic entity, it would be impossible to fine-tune that institution, and another institution would work to inhibit the function of others in order to optimize the entire system. If an institutional complementarity that causes institution Ψ^+ to reinforce the function of institution Ω^+ or causes both of these institutions to functionally enhance each other can be called a "function-enhancing complementarity" and an institutional arrangement that is established based on such institutional complementarity and represented in a matrix form as (Ω^+, Ψ^+) may be referred to as a "function-enhancing complementary equilibrium," an institutional complementarity that causes institution A^- to work to offset or mitigate the function of institution Ω^+ or causes these two institutions to functionally neutralize each other may be called a "function-neutralizing complementarity," and an institutional arrangement based on this (Ω^+, Ψ^+) may be

[23] This refers to the contingent governance system formulated by Aoki (2000), in which a systematic transfer of management control over a company from insiders (top managers promoted from within employee groups) to outsiders (main banks) takes place, depending on the management performance and financial situations.

referred to as a "function-neutralizing complementary equilibrium."

A function-neutralizing complementary equilibrium tends to be achieved when institution Ω^{+} is exogenous to a given economic entity or when it is still under development in its evolutional process. If institution Ω^{+} transforms into Ω^{++} with the desired functional level by becoming endogenous to a given economic entity or gaining perfection over time, it is presumed that there is also a change in institution Ψ^{-}, leading to the emergence of a new, non-function-neutralizing complementary equilibrium expressed as (Ω^{++}, Ψ^{++}). In this sense, an institutional arrangement with function-neutralizing complementary characteristics generates only a short-term equilibrium. As seen in the relationship between law and business, however, the wider the social hierarchy is between a particular economic entity (enterprise) and an institutional builder (legislative body) for institution Ω^{+}, the more difficult it is for the former to achieve a long-term equilibrium. Therefore, a function-neutralizing complementary equilibrium exists for a substantial period of time in the real incomplete world, even though it is theoretically transient. With this in mind, the impact of a function-neutralizing complementary equilibrium on the economic performance under assessment cannot be disregarded.

As is probably quite evident, this chapter provides a good opportunity for an empirical study of the two examples of institutional complementarity, making it possible to observe both the function-enhancing and function-neutralizing aspects of institutional complementarity by looking at various combinations of corporate forms and internal organizational structures. The dichotomous options of statutory corporate form enforced by the Russian corporate law, i.e., the choice between an open and a closed company, are probably not satisfactory to the JSCs whose ownership structures and business environments are diverse. This is because the ideal degree of organizational openness and desirable power balance between managers and shareholders differ from company to company. In addition, after an enterprise determines its corporate form in accordance with the organizational choice mechanism verified in the previous section, the enterprise has to address the issue of reconciling the interests of stakeholders.

For example, some of those who invested in a closed JSC may have the persistent complaint that the restrictions on share transferability imposed by the law on JSCs unreasonably increase the company's organizational closedness, whereas some open JSC managers may continue to feel cautious about the statutory rights of shareholders to freely transfer shares, as well as about the disclosure requirements, due to a possible risk of the company being excessively exposed to the outside environment. Of course, there also may be shareholders and managers who regard the institutional effect of the corporate form they have chosen as insufficient. These people try to affect the functional strength of their companies' corporate forms and to further achieve more adequate organizational openness and power balance by amending their corporate charters to include their original provisions on share transfers and by exercising their influence over the decision-making process to determine the number of members and the composition and rules of internal corporate organs.

In the case described above, open (closed) JSCs are regarded to have attained a function-enhancing complementary arrangement by coordinating the organizational openness (closedness) of their internal structures. Conversely, enterprises that chose an open (closed) JSC as their corporate form and adjusted their internal structures to have closed (open) characteristics are judged to have selected a function-neutralizing complementary equilibrium as their institutional arrangement. By applying the above criteria to our firm-level data, the next subsection describes the actual behavior of Russian corporations in this respect.

1.4.2. Institutional Arrangement of the Corporate Form and Internal Structure in Russian Firms

The internal structure of a stock company is quite complex. Hence, the following analysis of our survey results was carried out in order to measure the organizational openness of the internal structure as a whole of each surveyed firm: Hayashi's quantification method III[24] was used for 24 qualitative variables (categorical data)

[24] The quantification method III uses structural description models, as do the principal component analysis method and the factor analysis method. However, it analyzes not the

collected from 553 firms, which represent the characteristics of a statutory corporate structure in terms of the content of a corporate charter regarding shareholders' ownership and their voting rights, general shareholders' meetings, board of directors, collective executive organs,[25] audit committees (auditors), and external auditors, in order to obtain sample scores of the second eigenvalues that best represent the organizational openness of a company's internal structure.

Table 1.6 lists the variables used in the analysis. These variables contain information about the existence of corporate charter provisions that limit the number of shares owned per shareholder or restrict shareholder voting rights as well as the composition of its membership, frequency of meetings, and authority of corporate organizations over management decisions. In this table, the response rate of these variables for each corporate form is also shown. The χ^2 test of differences of proportions revealed that the difference between open and closed JSCs was statistically significant for 16 of the 24 categories. As expected, these figures clearly suggest that closed JSCs generally have a more closed internal structure than open stock companies.

The sample scores calculated on the basis of the categorical quantity of the second eigenvalue listed at the far right of **Table 1.6** are hereinafter referred to as openness scores (*OPESCO*), which are used as indices to quantify the openness of the internal organizational structure. *OPESCO* ranges from -2.910 to 2.020, and its mean

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continuous (quantitative) variable, but the categorical data expressed as {0, 1}.

[25] A collective executive organ headed by the company president (the general director), which is an internal executive organization voluntarily set up by a company, "takes leadership in daily corporate management except for exclusive competence of the general shareholder meeting and the board of directors" (Article 69(2) of the law on JSCs). In addition, Article 66(2) of that law prohibits members of a collective executive organ from making up more than one-quarter of the board of directors. With these provisions in view, it is assumed that the presence of a collective executive organ functions to clarify management responsibilities and to enhance the independence of the board of directors from management (Iwasaki, 2003, pp. 511-514).

(median) is -0.093 (-0.052). The mean (median) *OPESCO* for open JSCs is 0.045 (0.023), and that for closed JSCs is -0.472 (-0.510), and the difference of the means between these two company groups is significant at the 1% level (t=5.178, p=0.000). Hence, there is a substantial, statistically significant difference between open and closed companies in terms of the openness of their internal structures.

The determinants of the openness of an internal structure of a company may overlap with the factors affecting its choice of corporate form discussed in Subsection 1.3.2. In particular, the authority exerted by outside shareholders and executives over corporate management, as well as the company's membership in a business group, are expected to have a significant impact, since the mode of the internal organizational structure is directly related to how the company divides its managerial control. In addition, as we mentioned in Section 1.2, it is presumed that the formation of an open internal structure enables the company to demonstrate a more transparent management style for business partners and potential investors and to be more actively involved in raising capital than those with a closed internal structure. In order to verify this presumption, we conduct an OLS estimation to regress *OPESCO* on the variables representing ownership by outside shareholders and managers, the proxy variables of capital demand and supply constraints, and a group company dummy, while controlling the impact of past policies on company start-ups and the size and sector of the company.[26] **Table 1.7** shows the results.[27] It indicates: (a) that ownership by outside shareholders and corporate managers adversely affects the formation of a company's internal structure; (b) that the membership in a business group accelerates the openness of the internal structure in its member firms against the theoretical background that a firm can reduce the risk of being exposed to external threats by becoming a group company, and that the holding company and core group companies try to establish

[26] The basic sample for the OLS estimation consists of 417 observations. Sample constraints are provided in accordance with the corporate-form choice models.

[27] As in the case of Note 17, all correlation coefficients between the independent variables used in these models are smaller than a threshold of 0.7, and the variance inflation factor for each of the independent variables is well under a threshold of 10.0 (mean = 2.347).

effective governance mechanisms in affiliated companies for a corrective purpose; and (c) that the significantly estimated *RELBAN* has a positive sign corresponding to the theoretical assumption of constraints on capital supply and demand. These results imply that there are many common factors that have the same direction of impact both on the choice of corporate form and the formation of the internal structure. These elements appear as driving forces to promote the coevolution and function-enhancing institutional arrangements of a company's legal form of incorporation and its internal organizational structure.

Meanwhile, the following interesting fact was found by looking at *OPESCO* from a different angle. As referred to in Section 1.2, the respondents were asked whether or not they believed the corporate form of their company was beneficial to the growth of the business. When comparing the *OPESCO* values for companies that answered "beneficial" with those of the companies that answered "detrimental," the sample group of open JSCs had an average ratio of 0.03 (265 firms) to -0.09 (43 firms), whereas that for the sample group of closed JSCs was -0.61 (97 firms) to -0.09 (14 firms), suggesting that JSCs, the managers of which have a negative view of their own corporate form, are inclined to develop an internal structure with function-neutralizing characteristics. In particular, the difference between closed JSCs with a positive view and closed JSCs with a negative view is statistically quite significant (t=2.216, p=0.029).[28] That is, closed companies that are not satisfied with their closed disposition in term of the corporate form are much more likely to achieve function-neutralizing complementary institutional arrangements than open companies. This implies the possibility that dissatisfaction with the corporate form of a closed JSC comes from its organizational closed nature represented by severe restrictions on share transferability imposed by the Russian corporate law.

As is clear from the above examination, the distribution of *OPESCO* for open and closed JSCs is diverse, and there is a general tendency for open companies to try to make their internal structures more open to the outside world and for closed companies

[28] The result of the same test for open companies is as follows: t=0.751, p=0.453.

to act in the reverse. Hence, looking at the overall picture of the current state of Russian JSCs, their dynamic and systematic efforts to attain a function-enhancing complementary equilibrium for their internal structures are noticeable. However, as indicated by the frequency distribution charts in **Figure 1.1**, there are many open JSCs that have internal structures with openness levels that are the same or lower than the average of internal structures in closed JSCs. At the same time, there is a significant number of closed JSCs with open internal structures. In fact, when categorizing our surveyed firms into a company with an open internal structure and a company with a closed internal structure on the basis of whether or not their *OPESCO* values are larger than the median of all samples, 43.3% of the responding open JSCs (176 firms out of 406) have closed internal structures, whereas 32.0% of the responding closed JSCs (47 firms out of 147) have open structures; that is, according to the discussions in Section 1.3, four of ten of the firms surveyed have already achieved or are in the process of achieving a function-neutralizing complementary equilibrium as the institutional arrangement for the internal governance system.

1.5. Institutional Equilibrium and Organizational Behavior

As noted in the previous section, an asymmetrical institutional arrangement between a corporate form and its internal structure is a noticeable phenomenon that divides medium-sized and large JSCs, which are a core component of the Russian business sector, into two types. Therefore, as long as the qualitative differences in an institutional equilibrium affect organizational behavior to a certain degree, that fact may be of great significance not only to their corporate performance but also to the Russian economy as a whole. In this section, this issue will be closely examined.

1.5.1. Working Hypotheses

The theoretical study of institutional diversity and imperfect institutions has made remarkable progress in recent years (Young, 1998; Aoki, 2001; Eggertsson, 2005; Ostrom, 2005). Although such research lacks precision in assessing how an institutional equilibrium affects the behavioral pattern of an economic entity, including

a corporation, it provides highly suggestive clues to elucidating this mechanism. The organizational economics also gives helpful hints on this topic. Based on recent developments of institutional and organizational studies in economics, we propose three working hypotheses with regard to the causality between institutional arrangements of corporate forms and the internal structures in Russian stock companies and organizational behavior, including corporate performance.

First, the institutional arrangement of corporate form and internal organizational structure in a stock company may be closely linked with the probability of the occurrence of infighting between management and shareholders. An institutional equilibrium in a corporate organization, which is reached as the result of a bargaining game between managers and owners over corporate control, brings a degree of stability to the company management but does not prevent all kinds of conflicts of interest between the two parties stemming from changes in the outer environment and opportunistic behavior of the corporate executives. The probability of such a disagreement between the managers and the shareholders developing into serious infighting largely depends on the degree of freedom of the shareholder voice in management and exit from ownership. In other words, the more institutionally open a company is, the more effective it will be at reducing the risk of internal conflict.

Secondly, function-neutralizing complementarity between corporate forms and internal structures is inferior to function-enhancing complementarity as institutional coordination, in the sense that the additional openness of the internal organizational structure in closed JSCs may be less effective to deter internal conflicts between corporate managers and shareholders than that in open companies *ceteris paribus*. The reasons for the relatively low degree of the marginal functional strength of a function-neutralizing complementary equilibrium are that no synergetic effects between functionally compatible institutions can be expected and systemic distortion (coordination loss) may occur by coupling function-incompatible institutions.

Finally, the institutional equilibrium of corporate form and internal structure in a stock company have only an indirect impact on its productivity as well as on its investment and restructuring activities since, although it is true that the above two

elements play a significant role in disciplining corporate officers and ensuring organizational stabilization through the definition of power balance between managers and shareholders, it is equally true that a corporate performance in Russia is also largely affected by the business environment, the quality of its managers, labor-management relationships, financial constraints, and the interrelationships with business partners and the state. In particular, in transitional Russia, corporate management is seriously crippled by hardening budget constraints, given the uncertain political and economic situation, as well as its underdeveloped capital market and banking system. Therefore, it appears to be difficult to find an empirical relationship between institutional arrangement in a Russian stock company and its corporate performance.

1.5.2. Institutional Equilibrium and its Impact on Internal Conflicts

In order to substantiate the first and second hypothesis presented above, we perform a probit estimation of qualitative choice models using the following two kinds of dependent variables. One is an internal-conflict dummy variable (*INTCON*), which takes a value of 1 if the company has experienced harsh infighting between managers and shareholders at least once from 2001 to 2004, and the other is a CEO-displacement dummy (*CEOTUR*), in which the value of 1 is assigned to companies that saw CEO turnover at the request of shareholders at least once during the same period. According to our survey results, 206 (26.8%) of the 768 firms had more than one internal conflict, and 170 (20.7%) of the 821 firms changed their top management as a result of pressure from their shareholders. Karpoff and Rice (1989) regard managerial turnover as a proxy variable to measure the magnitude of a control contest or shareholder disagreement. Our *CEOTUR* variable may have the same function. However, managerial turnovers in Russia are generally regarded as an arbitration process applied to reduce conflict between manager and shareholders and reach settlements outside of courts. In fact, of the 767 surveyed firms that answered both the question of whether or not they had an internal conflict from 2001 to 2004 and whether or not they had a CEO displacement during the same period, only 53 (33.5%)

of the 158 companies answered "yes" to both questions. This suggests that the probability of a shareholder-initiated managerial turnover is closely but negatively associated with the probability of corporate infighting. Therefore, it is presumed that a corporate organization open to outside shareholders deters internal conflicts and increases the likelihood of shareholder-initiated CEO turnovers.

In order to examine the impact of corporate form and internal structure in a stock company as well as the impact of the institutional arrangement on the probability of such organizational behavior, we estimate probit models aimed at verifying the individual effects of the corporate form and internal structure as well as the synergistic effects generated by the institutional coordination of these two elements. The individual effects of the corporate form and internal structure are estimated using the following equation, which takes an open JSC dummy (*OPECOM*) and *OPESCO* as the explanatory variables together with the variables controlling ownership structure (*OWNOUT*, *MANSHA*), the relationship with business groups (*GROFIR*), the gross sales change from 2001 to 2004 (*SALGRO*) representing the management condition in that period, and the size and sector of the given surveyed firm (*COMSIZ* and industrial dummy variables):

Pr[*INTCON*=1 or *CEOTUR*=1] = *F*(*constant*, *OPECOM*, *OPESCO*, *OWNOUT*, *MANSHA*, *GROFIR*, *SALGRO*, *COMSIZ*, *industrial dummies*)

On the other hand, the synergistic effect of the institutional coordination of a corporate form and internal structure is estimated on the basis of two sub-samples representing open and closed JSCs using the above formula but without *OPECOM* variable. Meanwhile, as **panel (a)** in **Table 1.8** shows, according to the χ^2-test of difference of the proportion in all available samples of firms that saw an internal conflict and/or had a shareholder-initiated CEO turnover at least once in 2001-04, there was no statistically significant difference between open and closed JSCs, whereas the difference between two company groups divided on the basis of the median value of *OPESCO* is significant at the 5% level in terms of the probability of an internal conflict as well as at the 1% level with regard to the probability of CEO turnover.

In consideration of the possible reverse-causality in which an internal conflict or CEO turnover occurred in the past may affect directly or indirectly the current state of the governance system, the sample for the probit estimation is limited to 321 firms that did not experience changes in major shareholders from 2001 to 2004, that is, companies whose ownership structure remained almost constant during that period. This sample constraint is considered to be quite effective in ruling out the possibility of the aforementioned reverse-causality, since it is a well-known fact that almost all large-scale internal structural changes in Russian firms are triggered by a shift in dominant shareholders resulting from a hostile takeover or merger.

The regression results are shown in **Table 1.9**.[29] These models highlight the analytical importance of institutional coordination of corporate organization and the outstanding effect of the function-enhancing institutional complementary in a clearer fashion than we expected. The corporate form alone does not have any significant impact on the probability of an internal conflict and a CEO turnover. In addition, the internal structure alone does not effectively deter internal conflicts. On the contrary, an increase in the openness of an open company's internal structure positively affects the prevention of corporate infighting and expansion of the shareholders' influence over the managerial selection process, and its magnitude and statistical significance are larger than that for an internal structure's individual effects.[30] In contrast, a closed company's attempts to design a more open internal structure end up with no statistically significant result. Here, it is strongly suggested that the

[29] Again, all of the correlation coefficients among the independent variables used in these models were below a threshold of 0.70. In addition, all models were re-estimated by logit and yielded the same as those shown in Table 1.9.

[30] To check the robustness of these estimation results, we also conducted the estimation based on more constrained observations by excluding all the communications firms from the basic sample and by excluding the largest companies, as we did for the estimation of the corporate-form choice model in Subsection 1.3.2, and we found that there is no remarkable change in the coefficients and statistical significances of *OPESCO* in these re-estimated models.

function-enhancing complementary between corporate form and internal organizational structure in a stock company can produce considerable synergistic effects, and, on the contrary, that the function-neutralizing institutional complementary may be accompanied by a serious coordination loss to corporate management.

On the other hand, in the light of empirical evidence on the corporate governance of Russian firms, it is quite suggestive that *OWNOUT* has a positive sign with statistical significance in many cases and *MANSHA* is negative and significant in Model (D) and Model (E) using *CEOTUR* as the dependent variable.[31] Furthermore, the result that *SALGRO* is not significant as the explanatory variable for the probability of an internal conflict and CEO turnover except for Model (C) is consistent with preceding studies, in which it was repeatedly maintained that the managerial turnover in Russian firms was not sensitive to their performance, although there is room for improvement in the analysis method on this problem (Iwasaki, 2006).[32] Hence, it may be said that, in Russia, corporate infighting and CEO turnover need to be seen in the context of power struggles between managers and outside investors rather than in the context of shareholders' complaints blaming managers for poor performance or company scandals.

1.5.3. Institutional Equilibrium and its Impact on Corporate Performance

The third hypothesis regarding the causality between the institutional equilibrium and corporate performance is supported by the survey results. **Panel (b)** in **Table 1.8** shows comparisons of two sample groups classified by corporate form and by the degree of openness of their internal structure on the basis of a total of thirteen criteria.

[31] We re-estimated all models in Table 1.9, excluding ownership variables from the independent variables, and confirmed that this treatment did not have any influence on *OPECOM* and *OPESCO*.

[32] Instead of *SALGRO*, the proit estimation was also performed using variables for labor productivity of a company, its financial and economic condition assessed by managers, and dividend distribution frequency as a proxy of management performance, and none of them produced significant results.

Six of them, including labor productivity and changes in gross sales, are related to business performance for the past several years, and the remaining seven, including the intensiveness of investment activities and changes in R&D expenditure, reflect restructuring activities.

In each of these two types of comparisons, no significant difference was observed in more than half of the criteria. In addition, none of the regression analyses conducted with these performance indices as the dependent variables produced systematically significant results with respect to the corporate-form dummy variable, *OPESCO*, and the interaction term of these variables.[33] The above empirical results allow us to surmise that an institutional equilibrium between corporate form and internal organizational structure in a Russian JSC is less likely to have a direct impact on its corporate performance.

1.6. Concluding Remarks

In Russia, an overwhelming number of JSCs choose to become closed companies despite the fact that this corporate form strays far from the primary nature of stock companies, that is, raising funds from a wide variety of sources in a modern and democratic manner. This trend is equally obvious for medium-sized and large enterprises in the manufacturing and communications sectors. In this study, we attempted to conduct theoretical and empirical examinations on this quite interesting organizational behavior using the results of a large-scale enterprise survey we conducted in the 64 federal regions in the first half of 2005.

In the first part of the chapter, we illuminated the mechanism of the organizational choice between two alternative corporate forms, i.e., open versus closed JSCs, and identified the following four factors encouraging many of Russian firms to be closed

[33] In almost all of these regression results, the explanatory variables representing the relationship with a business group, the company size, and the financial constraints on corporate management were estimated with high statistical significance, which also supports the third hypothesis.

companies: (a) a widespread insider-dominating corporate ownership structure emerging as a result of the mass-privatization policy; (b) a strong orientation among managers toward closed corporate organization due to the underdeveloped capital and managerial markets; (c) slumping needs for corporate finance; and (d) insufficient financial support from local financial institutions. The empirical relation between ownership structure and corporate form dose exist, even if we assume the endogeneity of the two elements. The fact that the above four factors still have a significant impact on the behavioral patterns of Russian corporations even after well over a decade since the collapse of the Soviet Union reminds us of the difficult and time-consuming transition process from a centrally planned to a market-based economic system.

In the latter half of this chapter, we examined the institutional coordination between corporate forms and internal organizational structures in Russian stock companies and its impact on organizational behavior. The provisions of the law on JSCs force Russian firms to choose between an open or a closed JSC as their legal form of incorporation, resulting in the emergence of the two contrasting types of institutional equilibria. The reason that some Russian enterprises try to add a reverse-functional aspect to their internal structures needs to be understood in the context of their economically rational organizational behavior in an attempt to attain an ideal degree of organizational openness (or closedness) and to optimize the power balance between managers and shareholders by adjusting the excessive functional strengths of their corporate form, which are exogenous to them. Such an organizational reaction of Russian firms to the corporate law probably plays an important role in enabling them to perform stable business operations on a “peacetime” basis. According to the empirical evidence derived in the previous section, however, compared with a function-enhancing complementary equilibrium coupling functionally compatible institutions, the function-neutralizing complementary equilibrium works quite ineffective in preventing internal conflicts as well as in allowing shareholders to dismiss managers, both of which are critical challenges facing corporate governance in Russia today.

Now, Russia is required to build a legal framework that can eliminate the need for enterprises to maintain the inefficient institutional equilibrium of corporate organization. Nevertheless, it would be difficult to achieve this objective in a way that obliges all stock companies to become open JSCs, as has been proposed by the lower house of the Federal Assembly (*The State Duma*) and is currently being discussed within the federal government (Osipenko, 2005).[34] The most essential policy solution is to facilitate an environment that motivates Russian firms to voluntarily unlock their organizations. Without this condition, the convergence policy of the corporate forms into open JSCs may drive more companies towards a function-neutralizing complementary equilibrium. After all, the sound development of the Russian business sector can be achieved only by promoting the transition to a market economy in parallel with an effort to move forward with appropriate and comprehensive structural reforms. There is no shortcut to this process.

[34] I would like to thank Andrei A. Yakovlev for providing information on this matter.

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Table 1.1: Differences in the legal framework between open and closed joint-stock companies

	Open JSC	Closed JSC
Share transferability	No restrictions are imposed on share transfers. No preferred purchase rights may be arranged for any shareholders, including the company, in terms of the transfer of shares to third parties (Art. 7(2)).	The company shareholders have the right to purchase the shares of other shareholders in preference to third parties. The company may exercise such a preferred purchase right only when no shareholder exercises the same right (Art. 7(3)).
Share subscription	Open JSCs are incorporated by having all of their shares subscribed by their promoters or by having some of their shares subscribed by their promoters and the remaining shares subscribed by other investors (Art. 7(2)). After incorporation, they can make a public share placement without any restriction (Art. 39(1) & Art. 39(2)).	Closed JSCs are incorporated only by having all of their shares subscribed by their promoters. All of their shares issued after their incorporation must be offered only to their promoters or persons specified in advance (Art. 7(3) & Art. 39(2)).
Issuance of company bonds	Open JSCs may issue any kinds of bonds, including convertible bonds, to the public in accordance with the procedures set by law (Art. 39(2)).	Closed JSCs are prohibited from issuing convertible bonds to the public (Art. 39(2)).
Statutory minimum capitalization	1000 times the minimum statutory wage on the date of registration (Art. 26).	100 times the minimum statutory wage on the date of registration (Art. 26).
Number of shareholders	No upper limit is placed on the number of shareholders (Art. 7(2)).	The upper limit on the number of shareholders is 50 (Art. 7(3)). However, this limit does not apply to closed JSCs established by the end of 1995 (Art. 94(4)).
State involvement in investment	The state may not become the promoter of a joint-stock company, in principle (Art. 10(1)). However, state agencies may become the promoters of open JSCs in certain cases as provided for by law (Art. 7(4)).	Only former state-owned enterprises and other former municipal enterprises may become the promoters of closed JSCs (Art. 7(4)).
Disclosure requirements	Open JSCs are required to disclose certain information as requested by the law on JSCs and other statutes and by government agencies (Art. 92(1)).	Closed JSCs that issue bonds or securities at the same price and in the same manner as instructed by the Federal Financial Markets Service (FFMS) are required to disclose certain information in accordance with the rules adopted by the FFMS (Art. 92(2)).

Source: The Federal Law on Joint-Stock Companies of the Russian Federation.

Table 1.2: Comparative advantages of open and closed JSCs over an alternative corporate form

	All companies		Open JSCs		Closed JSCs [a]	
	No. of affirmative respondents	Share (%)	No. of affirmative respondents	Share (%)	No. of affirmative respondents	Share (%)
(a) Advantages of open JSCs over closed JSCs [b]						
Company transparency can be emphasized to business partners and investors.	235	31.2	202	38.3	33	14.6
Corporate governance can be improved.	85	11.3	60	11.4	25	11.1
Better access to financial markets and increased ability to attract potential investors	160	21.2	97	18.4	63	27.9
Shareholders may sell stocks freely.	96	12.7	67	12.7	29	12.8
Others	2	0.3	2	0.4	0	0.0
There is no comparative advantage.	175	23.2	99	18.8	76	33.6
Total	753	100.0	527	100.0	226	100.0
(b) Advantages of closed JSCs over open JSCs [c]						
Managers can effectively control companies.	60	8.4	30	6.5	30	12.0
Very strict regulations imposed by the state on open joint-stock companies can be avoided.	131	18.3	92	19.8	39	15.6
The transfer of stock to outsiders can be prevented, and companies are protected from hostile takeover.	350	49.0	218	47.0	132	52.8
Even a small-scale enterprise could be set up as joint-stock company.	43	6.0	29	6.3	14	5.6
Others	0	0.0	0	0.0	0	0.0
There is no comparative advantage.	130	18.2	95	20.5	35	14.0
Total	714	100.0	464	100.0	250	100.0

Notes: [a] Including workers' joint-stock companies (people's enterprises).
[b] Test for the equality of the composition of the responding firms by corporate form that gave a positive answer to each item: χ^2=51.079 (p=0.000).
[c] Test for the equality of the composition of the responding firms by corporate form that gave a positive answer to each item: χ^2=12.480 (p=0.014).
Source: The joint enterprise survey.

Table 1.3: Most important reason for being in the current corporate form

	All companies		Open JSCs		Closed JSCs [a b]	
	No. of affirmative respondents	Share (%)	No. of affirmative respondents	Share (%)	No. of affirmative respondents	Share (%)
Legal restrictions on the number of shareholders, minimum required capitalization (minimum share capital)	93	11.8	58	10.8	35	13.7
Mass-privatization policy for state-owned enterprises	349	44.1	291	54.4	58	22.7
Judgment by the managers and shareholders	248	31.4	133	24.9	115	44.9
Lack of consensus among managers and shareholders	7	0.9	3	0.6	4	1.6
Time and cost of changing the corporate form	21	2.7	10	1.9	11	4.3
Others	73	9.2	40	7.5	33	12.9
Total	791	100.0	535	100.0	256	100.0

Notes: [a] Including workers' joint-stock companies (people's enterprises).

[b] Test for the equality of the composition of the responding firms by corporate form that gave a positive answer to each item: $\chi^2 = 74.240$ ($p = 0.000$).

Source: The joint enterprise survey.

Table 1.4: Comparison between open and closed joint-stock companies regarding the ownership structure, capital demand, relationship with business groups, and impact of past policies on company start-ups

	Open JSCs	Closed JSCs [a]
Outsider ownership share [b c]	2.20	1.17 ***
State ownership share	0.66	0.12 ***
Federal government agencies	0.49	0.09 ***
Regional and local government agencies	0.23	0.05 ***
Private ownership share [c]	1.71	1.04 ***
Commercial banks	0.19	0.07 ***
Investment funds and other financial institutions	0.31	0.09 ***
Non-financial corporations	1.06	0.69 ***
Foreign investors	0.37	0.31
Proportion of firms with a large managerial shareholder (shareholder group)	0.43	0.58 †††
Proportion of firms planning to issue securities in the near future	0.12	0.08
Proportion of firms with a long-term credit relationship with a certain commercial bank	0.85	0.76 †††
Proportion of member companies of a business group	0.41	0.36
Proportion of core corporations of a business group	0.05	0.06
Proportion of affiliated companies of a business group	0.35	0.31
Total number of member companies of a business group that a company belongs to	25.71	22.26
Proportion of former state-owned or ex-municipal privatized firms	0.78	0.51 †††
Proportion of firms that separated from a state or privatized company	0.09	0.11
Average number of employees	2414.77	794.19 ***

Notes: [a] ***: The difference of the means in comparison with open JSCs is significant at the 1% level according to the *t*-test (the Welch test was performed instead of the *t*-test when the null-hypothesis that the two samples have the same population variance was rejected by *F*-test for homoscedasticity); †††: The difference of the proportions in comparison with open JSCs is significant at the 1% level according to the χ^2 test.

[b] "Ownership share" as used herein means an ownership share rated on the following 6-point scale: 0: 0%; 1: 10.0% or less; 2: 10.1 to 25.0%; 3: 25.1 to 50.0%; 4: 50.1 to 75.0%; 5: 75.1 to 100.0%.

[c] Excluding ownership by domestic individual shareholders.

Source: Author's estimation based on the results of the joint enterprise survey.

Table 1.5: Probit regression analysis of the corporate-form choice model

Dependent variable	*CLOCOM*							
Sample constraints[a]	I	I	I	I	II	III	IV	I
Model	(A)	(B)	(C)	(D)	(E)	(F)	(G)	(H)[b]
OWNOUT	-0.055 ***			-0.056 ***	-0.058 ***	-0.058 ***	-0.050 ***	-0.169 **
	(0.01)			(0.01)	(0.01)	(0.01)	(0.01)	(0.07)
OWNSTA		-0.120 ***						
		(0.03)						
OWNFED			-0.106 ***					
			(0.03)					
OWNREG			-0.143 ***					
			(0.04)					
OWNPRI		-0.041 ***						
		(0.01)						
OWNBAN			-0.023					
			(0.05)					
OWNFIN			-0.071					
			(0.04)					
OWNCOR			-0.057 ***					
			(0.01)					
OWNFOR			0.019					
			(0.03)					
MANSHA	0.100 **	0.093 **	0.099 **	0.102 **	0.104 **	0.105 **	0.110 **	0.210 *
	(0.05)	(0.05)	(0.05)	(0.05)	(0.04)	(0.05)	(0.05)	(0.11)
SECPLA	-0.131 *	-0.124 *	-0.129 *	-0.133 **	-0.113	-0.116	-0.175 *	-0.124 **
	(0.07)	(0.07)	(0.07)	(0.07)	(0.08)	(0.08)	(0.10)	(0.06)
RELBAN	-0.148 **	-0.153 **	-0.146 **	-0.149 **	-0.138 **	-0.158 **	-0.134 *	-0.143 **
	(0.06)	(0.06)	(0.06)	(0.06)	(0.06)	(0.06)	(0.07)	(0.07)
NUMFIN	-0.188 ***	-0.191 ***	-0.194 ***	-0.192 ***	-0.164 **	-0.185 ***	-0.142 *	-0.146 **
	(0.06)	(0.07)	(0.07)	(0.06)	(0.07)	(0.07)	(0.08)	(0.07)
GROFIR	-0.217 **	-0.216 **	-0.209 **		-0.179 *	-0.253 ***	-0.169	-0.225 **
	(0.10)	(0.09)	(0.09)		(0.10)	(0.09)	(0.14)	(0.09)
GROCOR				-0.232 ***				
				(0.08)				
GROAFF				-0.196 **				
				(0.10)				
GROSIZ	0.098 **	0.088 *	0.085 *	0.094 **	0.084 *	0.115 **	0.067	0.122 **
	(0.05)	(0.05)	(0.04)	(0.05)	(0.05)	(0.05)	(0.07)	(0.05)
PRICOM	-0.390 ***	-0.383 ***	-0.403 ***	-0.394 ***	-0.376 ***	-0.388 ***	-0.423 ***	-0.392 ***
	(0.06)	(0.06)	(0.06)	(0.06)	(0.06)	(0.06)	(0.07)	(0.06)
SPIOFF	-0.173 ***	-0.162 **	-0.166 ***	-0.178 ***	-0.160 ***	-0.168 **	-0.200 ***	-0.180 ***
	(0.06)	(0.06)	(0.06)	(0.06)	(0.06)	(0.07)	(0.07)	(0.06)
COMSIZ	-0.062 **	-0.058 **	-0.060 **	-0.064 **	-0.049 *	-0.070 **	-0.068 **	-0.037
	(0.03)	(0.03)	(0.03)	(0.03)	(0.03)	(0.03)	(0.03)	(0.03)
Industrial dummies	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
N	557	555	555	557	525	534	389	527
Pseudo R^2	0.19	0.20	0.21	0.19	0.16	0.19	0.17	0.17
Log likelihood	-295.70	-290.69	-286.06	-295.44	-283.83	-284.18	-211.91	-282.43

Notes: [a] I: basic sample (available observations without firms that already issued securities in the past); II: excluding communications firms from the basic sample; III: excluding those with the total number of employees exceeding the mean of number of employees of closed JSCs (794.19 person) plus/minus 1 standard deviation (3,149.14) from the basic sample; IV: excluding those that experienced a change in the major shareholders from 2001 to 2004 from the basic sample.

[b] The two-stage probit estimation assuming the endogeneity between corporate form and ownership structure.

[c] The coefficients represent marginal effects. White's heteroskedasticity-consistent standard errors are shown in parentheses. ***: significant at the 1% level; **: at the 5% level; *: at the 10% level.

Source: Author's estimation. See Appendix for the definition, descriptive statistics, and data source of variables used in models.

Table 1.6: Comparison between open and closed JSCs regarding their internal organizational structure

Upper categories	Lower categories	Response rate		Categorical quantity of the second eigenvalue [b]
		Open JSCs	Closed JSCs [a]	
Corporate charter restricting ownership and voting rights	Ownership limits are set by the corporate charter.	0.12	0.19 ††	-2.234
	Voting rights limits are set by the corporate charter.	0.16	0.19	-1.847
General shareholders meeting	General shareholders meeting has a high degree of influence over management decisions.[c]	0.79	0.87 †††	-0.345
Board of directors	Managerial directors constitute the majority (51% or more) of the board of directors.	0.34	0.55 †††	-1.995
	Employee directors constitute the majority of the board of directors.	0.01	0.05 †††	-3.641
	Outsider directors, including those representing the state, constitute the majority of the board of directors.	0.58	0.33 †††	1.581
	Private outside directors constitute the majority of the board of directors.	0.51	0.33 †††	1.705
	The chairman of the board of directors is an outsider.	0.33	0.26 ††	0.342
	The board of director includes a director(s) who represents non-employee minor shareholders.	0.19	0.12 ††	0.919
	The board of director includes an independent director(s).	0.21	0.14 ††	1.307
	A board of directors' meeting is convened at least once a month.	0.46	0.34 †††	-0.336
	The board of directors has a high degree of influence on management decisions.[c]	0.93	0.93	-0.048
	The chairman of the board of directors has a high degree of influence on management decisions.[c]	0.84	0.83	0.076
Collective executive organ	A collective executive organ is in place.	0.39	0.24 †††	0.257
	A meeting of the collective executive organ is convened at least once a month.[d]	0.83	0.72 †	0.329
	The collective executive organ has a high degree of influence on management decisions.[c]	0.33	0.23 †††	0.530
Audit committee (Auditors)	Auditors representing employees and their union constitute the majority of the audit committee.	0.46	0.51	-1.553
	Outside auditors constitute the majority of the audit committee.	0.51	0.46	1.383
	The audit committee members include a professional expert(s).	0.27	0.26	1.172
	A meeting of the audit committee is convened at least once a quarter.	0.44	0.37	-0.749
	The audit committee has a high degree of influence on management decisions.[c]	0.49	0.46	-0.373
External auditors	The external auditor is a foreign incorporated audit firm.	0.10	0.05 †	1.762
	A meeting between management and the external auditor is held at least once a quarter.	0.72	0.63 ††	-0.225
	The external auditors has a high degree of influence on management decisions.[c]	0.49	0.42 †	0.182

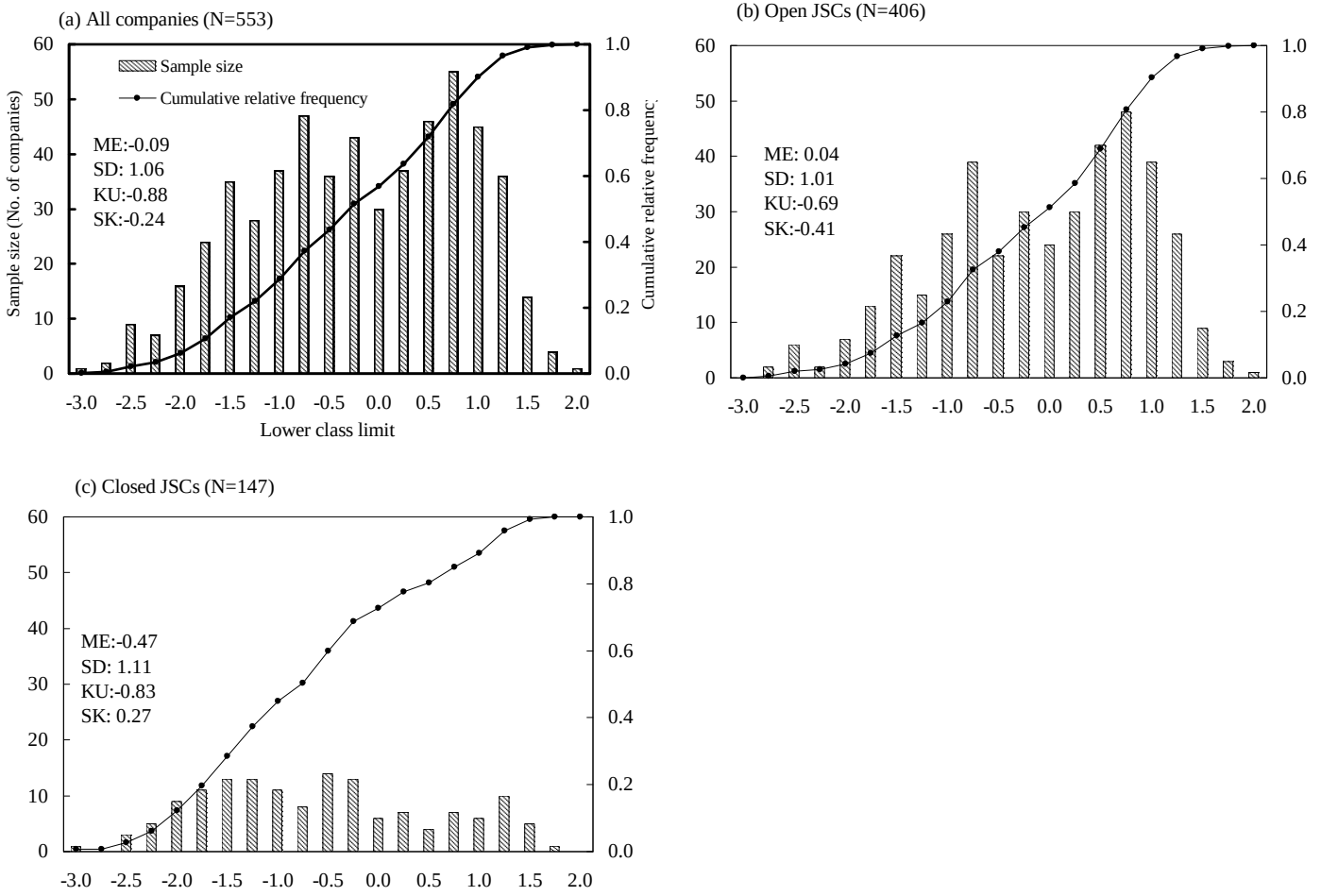
Notes: [a] †††: The difference of proportions in comparison with open JSCs is significant at the 1% level according to the $\chi 2$ test; ††: at the 5% level; †: at the 10% level.

[b] The second eigenvalue, its contribution rate, and correlation coefficient are 0.221, 15.3% and 0.470, respectively.

[c] Indicates firms that replied, "there is a certain degree of influence" or "there is a high degree of influence."

[d] Covering only firms with a collective executive organ.

Source: Author's estimation based on the results of the joint enterprise survey.



Note : ME - mean value; SD - standard deviation; KU – kurtosis; SK – skewness
Source : Author's estimation based on the results of the joint enterprise survey.

Figure 1.1: Distribution of the openness score (*OPESCO*) of the internal organizational structure

Table 1.7: OLS regression analysis of the openness of the internal organizational structure

Dependent variable	*OPESCO*			
Sample constraints [a]	I	II	III	VI
Model	(A)	(B)	(C)	(D)
Const.	0.233	0.112	0.526	0.621
	(0.38)	(0.39)	(0.44)	(0.58)
OWNOUT	0.072 ***	0.071 ***	0.071 ***	0.071 **
	(0.03)	(0.03)	(0.02)	(0.03)
MANSHA	-0.748 ***	-0.750 ***	-0.749 ***	-0.641 ***
	(0.10)	(0.10)	(0.10)	(0.12)
SECPLA	-0.044	0.062	-0.122	-0.063
	(0.11)	(0.13)	(0.13)	(0.15)
RELBAN	0.244 *	0.265 *	0.266 *	0.316 **
	(0.13)	(0.14)	(0.14)	(0.16)
NUMFIN	-0.053	-0.074	-0.036	-0.128
	(0.15)	(0.16)	(0.15)	(0.17)
GROFIR	0.353 ***	0.347 ***	0.346 ***	0.505 ***
	(0.11)	(0.11)	(0.11)	(0.13)
PRICOM	-0.018	-0.009	-0.036	-0.218
	(0.13)	(0.13)	(0.14)	(0.16)
SPIOFF	0.001	0.004	-0.023	-0.179
	(0.19)	(0.19)	(0.20)	(0.23)
COMSIZ	-0.002	-0.022	-0.049	-0.030
	(0.05)	(0.05)	(0.06)	(0.06)
Industrial dummies	Yes	Yes	Yes	Yes
N	417	396	401	284
Adjusted R^2	0.24	0.21	0.23	0.25
Breusch-Pagan test (χ^2)	29.27 **	27.61 **	27.67 *	21.83

Notes: [a] I: basic sample; II: excluding communications firms from the basic sample; III: excluding those with the total number of employees exceeding the mean of number of employees of closed JSCs (794.19 person) plus/minus 1 standard deviation (3,149.14) from the basic sample; IV: excluding those that experienced a change in the major shareholders from 2001 to 2004 from the basic sample.

[b] Standard errors are shown in parentheses (White's heteroskedasticity-consistent standard errors are given when the null-hypothesis of homoscedasticity is rejected at the 5% level or more by the Breusch-Pagan test). ***: significant at the 1% level; **: at the 5% level; *: at the 10% level.

Source: Author's estimation. See Appendix for the definition, descriptive statistics, and data source of variables used in models.

Table 1.8: Comparison between open and closed JSCs and between the two groups of companies divided by the openness of the internal organizational structure in terms of the probability of an internal conflict and CEO turnover as well as corporate performance

(a) Internal conflict and CEO turnover

	Corporate form		*OPESCO*	
	Open JSCs	Closed JSCs [a]	> -.052	< -.052 [a]
Internal conflict in 2001-04 [b]	0.26	0.28	0.24	0.33 ††
Shareholder-initiated CEO turnover in 2001-04 [b]	0.22	0.18	0.27	0.14 †††

(b) Corporate performance

	Corporate form		*OPESCO*	
	Open JSCs	Closed JSCs [a]	> -.052	< -.052 [a]
Gross sales per employee in 2004 (1,000 rubles) [c]	762.89	823.63	889.84	767.54
Changes in gross sales in 2000–04 [e]	1.62	1.62	1.79	1.35 ***
Changes in the total number of employees in 2001–05 [f]	-0.15	0.32 ***	-0.15	0.04 *
Changes in average wages in 2000–04 [e]	1.98	1.86 *	2.16	1.76 ***
Financial/economic situation (at the time of the survey) [f]	0.39	0.43	0.45	0.24 **
Frequency of dividend payments in 2001–03 [g]	1.03	0.74 ***	0.95	0.97
Intensiveness of investment in 2001–04 [h]	1.20	1.05 ***	1.27	1.11 **
Changes in R&D expenditure in 2001–04 [i]	1.50	1.37	1.46	1.60
Changes in marketing and advertising expenditure in 2001–04 [i]	2.32	2.26	2.24	2.47 ***
Introduction of new production facilities in 2001–04	0.65	0.70	0.64	0.70
Employment of new technology in 2001–04	0.53	0.52	0.50	0.57
Development of new products or services in 2001–04	0.59	0.59	0.56	0.60
ISO certification obtained for own products in 2001–04	0.47	0.35 †††	0.45	0.42

Notes: [a] ***: The difference of the means in comparison with its counter category is significant at the 1% level according to the *t*-test (the Welch test was performed instead of the *t*-test when the null-hypothesis that the two samples have the same population variance was rejected by *F*-test for homoscedasticity); **: at the 5% level; *: at the 10% level; †††: The difference of the proportions in comparison with open JSCs is significant at the 1% level according to the χ^2 test; ††: at the 5% level.

[b] Indicates firms that replied that such an incident occurred at least once during this CEO's term.

[c] Excluding discordant value.

[d] The changes are rated on the following 5-point scale: -1: decreased; 0: no change; 1: increased by less than 1.5 times; 2: increased by 1.5 or more but less than 2.0 times; 3: increased by 2.0 or more times.

[e] The changes are rated on the following 5-point scale: -2: decreased by 20% or more; -1: decreased by less than 20%; 0: no change; 1: increased by less than 20%; 2: increased by 20% or more.

[f] This item is rated on the following 5-point scale: -2: bad; -1: poor; 0: average; 1: good; 2: fairly good.

[g] Excluding all firms established after 2001.

[h] This item is rated on the following 3-point scale: 0: no investment made; 1: small-scale investment made; 2: large-scale investment made.

[i] This item is rated on the following 4-point scale: 0: no spending; 1: expenditure decreased; 2: expenditure remained unchanged; 3: expenditure increased.

Source: Author's estimation based on the results of the joint enterprise survey.

Table 1.9: Probit regression analysis of the impacts of the institutional coordination of corporate form and internal organizational structure in a joint-stock company on the probability of internal conflicts and CEO turnover

Dependent variables	*INTCON*			*CEOTUR*		
Sample constraints	All companies	Open JSCs	Closed JSCs	All companies	Open JSCs	Closed JSCs
Model	(A)	(B)	(C)	(D)	(E)	(F)
OPECOM	-0.023			0.010		
	(0.06)			(0.05)		
OPESCO	-0.024	-0.056 *	0.050	0.046 **	0.054 **	0.028
	(0.03)	(0.03)	(0.06)	(0.02)	(0.03)	(0.02)
OWNOUT	0.045 ***	0.040 ***	0.076 **	0.017 *	0.019	0.011
	(0.01)	(0.01)	(0.03)	(0.01)	(0.01)	(0.01)
MANSHA	0.045	0.051	0.005	-0.173 ***	-0.149 ***	-0.169
	(0.05)	(0.06)	(0.12)	(0.05)	(0.05)	(0.11)
GROFIR	-0.047	-0.069	-0.132	0.066	0.150 **	-0.034
	(0.06)	(0.07)	(0.12)	(0.05)	(0.06)	(0.03)
SALGRO	-0.021	-0.010	-0.090 **	0.011	-0.003	0.014
	(0.02)	(0.02)	(0.04)	(0.02)	(0.02)	(0.01)
COMSIZ	0.006	0.024	-0.073	-0.015	-0.025	0.008
	(0.02)	(0.03)	(0.05)	(0.02)	(0.02)	(0.01)
Industrial dummies	Yes	Yes	Yes	Yes	Yes	Yes
N	317	238	74	321	237	73
Pseudo R^2	0.07	0.08	0.14	0.17	0.17	0.43
Log Likelihood	-157.42	-115.93	-35.13	-121.27	-96.15	-15.53

Note: The coefficients represent marginal effects. White's heteroskedasticity-consistent standard errors are shown in parentheses. ***: significant at the 1% level; **: at the 5% level; *: at the 10% level.

Source: Author's estimation. See Appendix for the definition, descriptive statistics, and data source of variables used in models.

Appendix. Definition, descriptive statistics, and data source of variables used for empirical Analysis

Variable name	Definition	Descriptive statistics			
		Mean	S.D.	Min.	Max.
CLOCOM	Closed JSC dummy	0.33	0.47	0	1
OPECOM	Open JSC dummy	0.67	0.47	0	1
OWNOUT	Outsider ownership share [a]	1.87	2.14	0	5
OWNSTA	State ownership share	0.37	1.02	0	5
OWNFED	Ownership share by federal government agencies	0.23	0.82	0	5
OWNREG	Ownership share by regional and local government agencies	0.17	0.70	0	5
OWNPRI	Private ownership share	1.26	1.90	0	5
OWNBAN	Ownership share by commercial banks	0.11	0.50	0	5
OWNFIN	Ownership share by investment funds and other financial institutions	0.16	0.68	0	5
OWNCOR	Ownership share by non-financial corporate shareholders	0.88	1.65	0	5
OWNFOR	Ownership share by foreign investors	0.22	0.88	0	5
MANSHA	Large managerial shareholder dummy	0.51	0.50	0	1
SECPLA	Securities issuance planning dummy	0.06	0.29	0	2
RELBAN	Relationship-banking dummy	0.82	0.39	0	1
NUMFIN	Number of financial institutions per 1000 firms in the location	1.19	0.31	0.54	2.18
GROFIR	Business group participation dummy	0.33	0.47	0	1
GROCOR	Core business group member dummy	0.05	0.22	0	1
GROAFF	Business group affiliation dummy	0.28	0.45	0	1
GROSIZ	Natural logarithm of the total number of member firms of a business group	0.68	1.13	0	6.40
PRICOM	Dummy for former state-owned or ex-municipal privatized companies	0.69	0.46	0	1
SPIOFF	Dummy for firms separated from state-owned or privatized companies	0.10	0.30	0	1
COMSIZ	Natural logarithm of the total number of employees	6.16	0.93	4.66	9.42
CEOSHA	Dummy of shareholding by incumbent CEO (or company president)	0.63	0.48	0	1
DOMSHA	Dummy of a shareholder/shareholder group dominating corporate management	0.87	0.33	0	1
CEOAGE	Age level of incumbent CEO (or company president) [b]	2.43	0.91	0	5
COMDOM	Intensity of competition with domestic firms in product market [c]	1.50	0.69	0	2
OPESCO	Indicator of the openness of the internal organizational structure	-0.09	1.06	-2.91	2.02
INTCON	Internal conflict dummy	0.27	0.44	0	1
CEOTUR	Shareholder-initiated CEO turnover dummy	0.21	0.41	0	1
SALGRO	Changes in gross sales [d]	1.62	1.27	-1	3

Notes: [a] "Ownership share," as used herein, means an ownership share rated on the following 6-point scale: 0: 0%; 1: 10.0% or less; 2: 10.1 to 25.0%; 3: 25.1 to 50.0%; 4: 50.1 to 75.0%; 5: 75.1 to 100.0%.

[b] Age level is rated on the following 6-point scale: 0: 30 years old or less; 1: 31-40 years old; 2: 41-50 years old; 3: 51-60 years old; 4: 61-70 years old; 5: 71 years old or more.

[c] The intensity of competition is rated on the following 3-point scale: 0: no competition; 1: not very competitive; 2: very competitive.

[d] The changes are rated on the following 5-point scale: -2: decreased by 20% or more; -1: decreased by less than 20%; 0: no change; 1: increased by less than 20%; 2: increased by 20% or more.

Data source: NUMFIN was calculated by the author based on Rosstat (2005) and the Central Bank of the Russian Federation (2005). Other variables are based on the results of the Japan-Russia joint enterprise survey conducted in 2005.

Chapter 2

Realities of Russian Companies: Corporate Control under Concentrated Stock Property [*]

Tatiana G. Dolgopyatova

2.1. Evolution of Ownership and Corporate Control in Russian Companies

In the late 1980s, control over state-owned enterprises was actually exercised by coalitions of working teams (labour collectives) and administrations. Voucher privatisation legalized the control pattern as it emerged in the primary structure of equity capital. By the moment when mass privatisation was completed, stock ownership of Russian enterprises was justly regarded as dispersed and insider-dominated by practically all scholars (Blasi et al., 1997). Post-privatisation redistribution of companies' equity capital consisted in transfers of shares from rank

[*] The chapter uses results of the project 'Business Integration in the Corporate Sector: Incentives, Patterns and Economic Effects', which was carried out in June 2005 – May 2006 with a research grant from the Moscow Public Scientific Foundation, sponsored by the United States Agency for International Development (USAID). The final version of the paper was prepared with support of the personal research grant presented by SU-HSE Scientific Foundation 'Forms of Corporate Control in Russian Companies under Concentrated Stock Ownership' (No. 06-01-0050). The point of view presented in the paper may not agree with points of view of the above named organizations. The author also would like to thanks participants of International Conference of SU-HSE "Economic Modernization and the State" (Moscow, April 2006) and 9th Bi-Annual Conference of EACES (Brighton, September 2006) for their participation in discussion. Special thanks should be addressed to Professor X. Richet and Dr. Yu. Simachev for their extremely useful comments at these conferences.

and file workers to managers, from working teams as a whole to outside owners, against a background of concentration of stock ownership. Under a deep transformation slump and high inflation, limitations in the ways of exercising property rights (non-liquidity of shares, absence of dividend payments, and withdrawal of assets from enterprises for the sake of managers and certain owners) gave the shareholders incentives for concentration of corporate ownership in order to gain legitimate control over joint stock companies (JSCs).

Russian corporate sector, in the atmosphere of imperfect legal institutions, took the predictable way of creation of a type of large shareholder, an owner of stakes that could give him the right to control executives (Stiglitz, 1999). Privatised enterprises evolved in this direction, while newly established companies, as a rule, belonged to large shareholders from the outset. Let us notice that well-known international comparisons demonstrate a great variety of ownership structures and types of corporate control, dispersed ownership being rather an exception to the rule (La Porta et al., 1999). High level of ownership concentration is natural to many transitional economies in spite of differences in initial ways of privatisation and in the quality of institutions (Berglof and Pajuste, 2003; Andreff, 2005; Kapelyushnikov, 2005).

As shown by surveys conducted in recent years by the Bureau of Economic Analysis, the SU-HSE, the Russian Economic Barometer (REB), the Institute for the Economy in Transition and other think tanks, high level of capital concentration is typical of Russian companies, and this level is rising year by year. According to the data of a number of studies (Radygin and Entov, 2001; Dolgopyatova (ed), 2003; Guriev et al., 2003; Yasin (ed), 2004; Kapelyushnikov and Dyomina, 2005), in the early 2000s the stake of the largest shareholder in equity stock of an industrial enterprise was about 30-50%. The share of JSCs where an owner of a blocking stake was present, reached 40-65% of the total number of surveyed firms, and the share of JSCs with an owner of a controlling block of shares was 30-40%. The respondents indicated (Golikova et al., 2003) that even among open JSCs, almost two thirds had a shareholder, which kept them under control. On the other hand, in-depth surveys (interviews, case studies), as a rule, gave evidence of a substantially higher actual level

of concentration (TTPP, 2004; Yasin (ed), 2004).

Dynamic processes of property redistribution created large owners. Corporate governance is ruled by interests of dominant shareholders who are restrained by nothing but a requirement to comply with the existing legal regulations, which is usually done by means of imitation of compliance. In the prevailing model of corporate governance these shareholders directly participate in governing the companies as their top managers. Inseparability of ownership and control has become a formal institution in the Russian corporate practice, constraining demand for hired managers. This type of institution became widespread not only as an outcome of privatisation (a 'red director' – an enterprise owner), but also as an instrument deliberately chosen by an owner – entrepreneur. The latter, given the situation when markets for managerial labour and institutions for protection of property rights were underdeveloped, preferred to rely on this instrument rather than to bear high costs of prevention of opportunistic behaviour, which was practiced by hired managers in such extreme ways as withdrawal of assets and seizure of businesses.

Opportunities for gaining control are supported with other formal institutions (for instance, such as holding company groups based on contractual or property relations), and with certain informal practices. These practices include direct interference of large proprietors in corporate activities and their excessive command over operational decisions made by managers, in particular, over their financial operations. Such practices actually bring managerial decision making beyond the bounds of the area of corporate governance procedures.

Making conjectures about evolution of the Russian system of corporate governance may follow, it is interesting to find an answer to a question, which model of governance a dominant shareholder will choose and whether he will or will not consent to formal separation of executive management from ownership. A shift to reliance on hired management will make the owner try to look for different methods of control over the business entity, and he may possibly resort to the use of internal corporate mechanisms. Inseparability of management and ownership is an instrument for control and for protection of shareholders. But it can be either substituted with

other methods or complement these methods (super-high concentration of capital, legal form of a closed join-stock company, participation in a business group based on property and other relations).

In recent years, when corporate integration of Russian enterprises gained substantial strength, composition of dominant shareholders changed a great deal, as well as the ways they exercise corporate control in their companies. Expanding the boundaries of a firm, integration transforms the relations between participants of corporate governance. Having defined that a formal indicator of separation of management from ownership is presence of a hired general director (CEO) in the absence of large stakes of shares in the hands of other managers, we disclosed in (Dolgopyatova, 2004), using the data of a limited number of interviews, that separation is typical of ordinary member firms of holding company groups (or business groups). However, if an enterprise presented a whole business (being an independent entity or a parent enterprise in a group of companies), it's dominating owners preferred to have a formally fixed inseparability of functions. Separation of ownership from management came with a higher degree of capital concentration and was followed by dynamic change of top managers and by emergence of modern managerial teams. Representatives of shareholders prevailed in boards of directors, while inseparability of ownership and management usually charges managers with responsibilities of the boards. In the latter case, shareholders, executive and non-executive directors make a unified group that represents itself across all corporate bodies of management and places intra-corporate procedures under its control.

The goals of this chapter are either to confirm or to disprove these conclusions with the data of a large sample, and to examine other outcomes of separation of management activities in the companies. The issue of informal control mechanisms that are used by dominating owners is set aside. We suppose that at the present time, separation of management from ownership is an integral feature of a substantial part of Russian joint stock companies, mostly to member firms of business groups, and it is typical of the firms that have to deal with sophisticated managerial problems requiring particular professional knowledge and skills (firms of larger scale, belonging to certain

industries). We also suppose that separation of management from ownership affects corporate governance and corporate finance policy in the firms that have chosen this organizational pattern of control. On the one hand, intensity of corporate conflicts can be expected to rise due to the emerging agency problem, and on the other hand, boards of directors and other corporate bodies can be expected to take stronger hand in supervising activities of executives.

2.2. Ownership Structure in Joint-Stock Companies: New Empirical Data

2.2.1. Capital Concentration

Our survey confirmed once again that the degree of ownership concentration is extremely high. The indicators we have used show the presence of a shareholder or a consolidated group of shareholders who possess large blocks of shares and have control over their companies. If we exclude those that had 'difficulty in answering', 4 out of 5 JSCs had an owner of a blocking package of shares at the survey moment, and about 70% had an owner of more than a half of the stock. In the latter category, only 30% of the respondents mentioned that they had another large shareholder owning a blocking stake. This level of capital concentration was regarded by almost 70% of the respondents as optimal for development of their businesses; about 18% wished it to make it higher, and 13%, to make it lower. Great majority of the respondents – more than 87% declared that their companies already has an owner (or a stable coalition of owners) who exercised control over their enterprises.

All JSCs can be divided into 3 groups: in the first, level of concentration is high (the largest owner has more than 50% of the stock); in the second, it is medium (this share is from 25% to 50% inclusive), and in the third, it is low (the largest owner has less than 25% of the stock). Meanwhile, the group of companies with high level of concentration has 2 sub-groups, which differ by presence or absence of another large shareholder. Absence of such a shareholder may imply in particular that the owner of a controlling block has a still heavier stake. Actually, this sample is dominated by the companies with an owner of a controlling block of shares, and at almost a half of

entities this owner isn't limited by the power of another large shareholder – a counterweight to his influence (**Figure 2.1**).

A higher capital concentration could be expected to be typical of closed JSCs and of newly established businesses, in contrast to privatised enterprises, which contain a still non-vanished class of petty shareholders. Besides, the companies whose securities are listed on the stock exchanges could also have lower levels of capital concentration. Our survey gave different results.[1] Distribution of enterprises by degree of capital concentration was almost the same irregardless of industry sectors and sizes (tests for equality of means and medians were given extra verification), organizational forms, historical backgrounds of JSCs, and listing of their securities on Russian or foreign bourses. The only established difference was that another large shareholder was present in 35% of joint stock companies that had been founded after January 1, 1992, and only in 19% of those that had been privatised or reorganized upon a merger or a spin-off.

Although high concentration of ownership became a universal feature of Russian companies, there was a significant link between its level and corporate integration (**Figure 2.2**). Typically, the enterprises that are ordinary members of company groups have much higher concentration than independent JSCs and parent companies. Let us notice that presence of another large shareholder was more often a feature of parent companies: they were present at every third entity this category, against every fifth in the rest. Absence of such a 'counterweight' to the dominant shareholder was observed at almost 60% of ordinary members of business groups, against a third of parent companies and 44% of independent JSCs.

The higher was capital concentration, the more often it was preceded with vigorous redistribution of ownership. In 2001-2004, change of major owners was typical of 30% of enterprises in the whole sample, but it happened twice more frequent under high than under low capital concentration. It was most frequent in the sub-group

[1] Here and further (in the absence of other direct stipulations) results of statistical tests for verification of correlations between variables and for comparison of means and medians are considered valid if the threshold of significance is less than 0.05.

with a second centre of control, where it took place at more than 39% of companies. Apparently, change of ownership followed by consolidation of capital gave a stimulus to modernize all bodies of corporate management (see details in Subsection 2.4.4).

2.2.2. Structure of Stock Ownership

Analysing the structure of stock ownership, we gave up the division of the circle of shareholders into workers and outside owners, which had been traditionally made in preceding studies and had been rooted in the usual dichotomy of the 1990s between 'insiders' and 'outsiders'. In a different context, taking into account that the term 'insider' refers to all large owners including persons that don't work in a company (Dolgopyatova (ed), 2003), we have turned our attention to comparison of participation of large and minority shareholders. In the total sample (**Table 2.1**), large individual shareholders prevail in the ownership of ordinary shares; dispersed minority individual shareholders also remain a sizeable owner as a combined group, and Russian non-financial enterprises have occupied the third place in the list. Ownership of banks, other financial investors, as well as of regional administrations is scanty, and the share of foreign investors is modest.

As in the case of concentration of equity, corporate integration has affected its structure. Much higher percentage of minority shareholders is a feature of independent companies. Ordinary members of holding company groups have higher percentage of ownership of federal authorities and Russian legal entities, and parent companies have bigger stakes in the hands of large shareholders and foreign investors. In general, the entities that present a whole business usually have a higher percentage of minority shareholders along with significantly lower weight of other types of shareholders except regional and local administrations and large individual shareholders.

Turning to a comparison of structures of equity capital at different levels of concentration (**Table 2.2**), we find that highly concentrated companies have a lower weight of minority shareholders and the highest percentage of Russian non-financial organizations. On the other hand, JSCs with medium level of concentration have the highest percentage of federal shareholding. Besides, when we singled out the companies

with presence/absence of counterweights, we found that their capital structures were practically identical.

Consequently, the structure of ownership of ordinary shares gives us confirmation of high capital concentration along with preservation of dispersed ownership, prevalence of large shareholders and non-financial organizations. Non-financial organizations are used as affiliated entities in order to ensure participation of large shareholders – owners of controlling blocks of shares.

2.3. Emergence of Types of Corporate Control under Concentrated Ownership

2.3.1 What Kind of Companies Typically Have Management Separated from Ownership

In our survey, we have used two variables – partial indicators of inseparability/separation of ownership and management. The first indicator is based on the question whether large shareholders work as company managers; the second is based on the question whether the company's CEO holds any company's shares. In 2005, setting aside those who felt 'difficulty in answering', large shareholders were managers in 48% of the surveyed companies, and the CEOs were their shareholders in 63% of all cases. As could be expected, these indicators are significantly correlated. In 83% of the companies where large shareholders were managers, CEOs were shareholders. In the companies where large shareholders didn't become managers, CEOs also owned shares in 44% of these cases.

We have defined the group of JSCs where the respondents gave negative answers to both questions as a group where ownership is separated from management. The rest form another group where these functions are non-separated, although patterns of non-separation are different (**Figure 2.3**). This group includes JSCs where large shareholders are managers, and at the same time, CEO is a shareholder (let us name it M&D_S). We defined this sub-group as 'complete inseparability'. The sub-group where large shareholders are company's managers, but CEO isn't a shareholder (M_S)

is relatively small. It may include enterprises where CEO's ownership is concealed or where he is a hired manager, while managerial team has large shareholders in its ranks. Such a situation looks infrequent; it is usually a temporary one or related to such matters as geographical remoteness of an enterprise from its main owners. We came across such cases in a number of in-depth interviews (Yasin (ed), 2004), and we define this situation as inseparability: company's business is in the hands of managers.

A substantial sub-group in which only the CEO is a shareholder (D_S) consists of companies where the top manager has a small or medium stake in capital. The CEO's stake is either the result of privatization (among other reasons, because new owners tend to appoint CEOs from the ranks of former managers, which are minority shareholders), or because the owners endowed him with some shares. Even a modest stake in the hands of a top manager gives him additional control levers, especially in the situations where working teams have atomised shares or where public administration, which has a stake in the capital, not always exercise their rights of control. This sub-group occupies an intermediate position, although many of such JSCs can be considered among the entities with inseparability of functions.

A comparison between two basic groups of JSCs by essential characteristics of their businesses has revealed that they differ only by histories of their creation (for more details see (Dolgopyatova (ed), 2006). Separation of ownership from management is typical of new and re-organized joint stock companies, and inseparability, of the privatised ones. We have found that the group of companies with non-separated ownership and management is heterogeneous because it includes a specific type of joint stock company with a CEO who is not a large shareholder. Such companies are much more frequently met in communications, among open joint stock companies, as well as among the privatised and the largest corporations. This is exactly the group where every fourth joint stock company has already listed its securities on Russian or foreign stock exchanges.

We have found that patterns of combination of ownership and control are different in the joint stock companies that present a whole business or a part of a business (**Figure 2.4**). In accordance with our expectations, separation of ownership

from management is typical of the enterprises that are ordinary members of holding company groups, but independent firms and parent companies are mostly operated on the base of inseparability of these functions. Among independent firms, JSCs with 'complete inseparability' are prevailing. In this case it is likely to compensate, as instrument for control, for a lower degree of ownership concentration. The stakes owned by a CEO are practically the same in all types of surveyed companies, but the few cases when large shareholders take part in management not being CEOs are generally typical of parent companies.

In the entities that became parts of a business, separation of ownership from management goes together with higher concentration of capital, which displays itself in different ways in open and closed companies. In the JSCs presenting whole businesses, about a quarter of open companies and less than 18% of closed ones have separation. Members of holding company groups are in a reverse situation: separation is typical of 40% of open against 52% of closed companies. The form of a close company and inseparability of management and ownership are two instruments of corporate control, which substitute each other. We believe that this notion has certain ground to be true (significance of the disclosed differences was 0.09).

In compliance with our supposition, separation of management is typical of large-scale business groups with complicated management: massive groups with large numbers of employees in all its units, or holding company groups that are more widely dispersed geographically and diversified by industry. Going beyond the boundaries of a single region gives the companies with separated ownership and management almost 20 percentage points of additional weight. Separation of functions is observed in 55% of conglomerates; at 10 percentage points fewer vertically integrated groups; but 65% of members of horizontally integrated holding company groups prefer to combine these functions.

2.3.2. Ownership Structure and Organization of Corporate Control

Choice of a configuration of ownership and management is predetermined by decisions made by dominating owners. We have found that separation of management was much

more often preceded with a change of main owners in 2001-2004, when almost 36% of all JSCs had this event in their history. The greatest stability was typical of the companies whose CEO was one of the shareholders, large as well as minority: in these two sub-groups, a quarter of companies changed their owners. The least stable was a small sub-group of JSCs where large shareholders were managers (but not CEOs): about 48% of them were affected by redistribution of ownership rights.

In the companies that differ by patterns of organization of control (**Table 2.3**), presence of a shareholder owning a blocking package of shares is the only fact that correlates with division of the sample: when ownership is separated from management, a shareholder owning a blocking package is found more often.

Inseparability of the functions gives additional control tools, because even when capital concentration is lower, it helps to substantially increase the weight of JSCs with a dominating shareholder (by 20 points in comparison with holders of a controlling block of shares). In the companies where the stake of a CEO is not so large, degrees of ownership concentration and consolidation of control are much lower. Both 'complete inseparability' and the presence of a block of shares in the hands of a CEO help to make control stronger. Interestingly, the presence of another large shareholder has no effect on the organizational choice of combination of ownership and management.

Turning to the structure of ownership of ordinary shares, we have found that when management is separated, shareholding of Russian non-financial companies is much higher, and when it is not, minority shareholders and banks have larger stakes. In the cases where small and medium stakes of CEOs are presented, federal authorities have larger stake. In the cases of 'complete inseparability' combined stakes in the hands of both large and minority shareholders are higher. In the presence of large shareholders who are managers, stakes of foreign investors are higher.

2.4. Corporate Relations under Different Organizational Types of Control

2.4.1. Intra-Corporate Conflicts

Earlier surveys have obtained evidence from limited numbers of companies that

consolidation of ownership and control, which is followed with crowding out or voluntary departure of minority shareholders brings stability to intra-corporate relations: actual number of corporate conflicts is not so great, and is very much different from the impression that one can get from mass media. On the other hand, the level of conflicts is higher in the firms that have influential minority shareholders (foreign or institutional investors) and in public companies whose securities are listed on stock exchanges (TTPP, 2004). Taking in trust what our respondents are saying, in the period of 2001-2004 approximately 1 joint stock company out of 4 (6% a year on average) had disputes between shareholders or between them and managers. We found that the frequency of conflicts is independent from the industry the company belongs to or from its size, its financial condition and the degree of integration (the frequency was the same in whole businesses and in parts of businesses as well). Other assumptions were not confirmed either.

Although we anticipated that the agency problem would display itself, disputes arose in a quarter of companies under separation of ownership from management, against less than 29% of the rest of joint stock companies, and such differences are unimportant (sub-groups were homogeneous too).

Along with relations between shareholders and managers, we also examined the practice of coordination of key decisions about future course of business devlopment with other participants in corporate governance (stakeholders). As we have found, the weight of companies that mentioned the existence of this practice is actually the same under the 2 basic models of control – 38 - 39%. And companies whose CEO is a shareholder are exceptional – a half of them practiced such coordination. This sub-group shows a much stronger inclination to consider the interests of federal, regional and local administration, labour collectives, and the banks that serve the enterprises. It cannot be ruled out that this is the way the CEO who is not a large shareholder tries to maintain and reinforce his influence, and it may happen that outside owners let him hold this post because of these specific abilities.

2.4.2. Role of Corporate Bodies in Decision-making

Turning to the roles of basic management bodies in corporate decision-making we can see that boards of directors have stronger influence than shareholder meetings by respondents' estimates (**Table 2.4**). In JSCs that are members of business groups in any particular status, roles of shareholder meetings and boards of directors is generally higher than in independent companies. When an enterprise presents a whole business, influence of its shareholder meeting is relatively higher than in ordinary members of holding company groups, but there is no significant difference in the role of the board of directors.

Although direct assessments of the influence of shareholder meetings are identical under different organizational types of control, the role of a board of directors is found to be higher under separation of functions (**Figure 2.5**). Interestingly, three quarter of the respondents pointed at high influence of boards of directors in the sub-group of companies where the CEO is a shareholder.

2.4.3. Composition of Boards of Directors

Previous surveys showed that membership of the boards of directors were 7 persons on the average and tended to get smaller (Yasin (ed), 2004; Dolgopyatova, 2001). For instance, in 2005 an average board had 6.7 members. In a typical board, company managers prevailed (they were likely to be shareholders as well), and representatives of large outside shareholders took the second place. Managers and large outside shareholders secured 78% of all votes in boards of directors (**Table 2.5**), while independent directors together with minority shareholders got less than one ninth.

Major actors of corporate governance retain extremely high level of representation irrespective of whether their companies are parts of a business (a holding company group) or a business entity. Structures of boards are similar in independent JSCs and parent companies, if only we forget about independent directors. However, the first place in member companies of holding groups is taken by representatives of outside shareholders while in independent JSCs their managers prevail, taking together with rank and file workers more than 60% of total votes. In

member companies of holding groups, regardless of their status, the boards of directors are usually larger, and representatives of independent directors are more numerous.

Table 2.6 demonstrates substantial differentiation in representation of managers, large outside shareholders and, to a lesser extent, rank and file workers under different models of control. When management and ownership are non-separated, all company workers have 60% of votes, but when they are separated, large outside shareholders alone have more than a half of the votes (together with independent directors, almost 60%), securing themselves the opportunity to monitor the activities of executive managers. Under 'complete inseparability', company managers alone have captured two thirds of the votes. At the same time, on the companies whose CEO is a shareholder weight of managers and large shareholders, as well as of independent directors is found to be the closest to the structure of the boards of JSCs whose ownership and management are separated. In this sub-group, the share of votes belonging to all levels of public administration is also relatively higher.

2.4.4. Renewal of Executive and Non-executive Directors

Previous surveys seldom turned to analysing activities of boards of directors, which was partly due to difficult choice of appropriate indicators. Records of in-depth interviews show (Dolgopyatova, 2004) that activities of boards are often a tribute paid to formal legal regulations and that their phoney nature tends to correlate both with fusion of the board with executive management and with stability of its membership. Indeed, less than a third of all JSCs in our sample have completely or to a large extent renewed the membership of their boards in 4 years. Intensity of renewal was much higher at ordinary member firms of holding company groups (**Figure 2.6**): a half of these member firms have substantially renewed their boards, against a quarter in the other joint stock companies. The most intensive renewal is observed under separation of ownership from management: it has been renewed completely or to a large extent at a half of all JSCs. The most conservative policies regarding boards of directors were kept under 'complete inseparability': in this group, total or substantial renewal was made at less than 18% of the companies.

Intensity of change of a CEO in a company serves as an illustration of the fact that separation helps better supervision of the management, because this changes happened under this model of control more frequently, and often many times (**Table 2.7**). Obviously, a CEO could successfully 'entrench' himself in the cases when he was a large and a minority shareholder. Besides, in 2001-2004 change of a CEO was initiated by a company shareholders in 71% of companies with separation of ownership from management, and in a half as few other enterprises again.

On the one hand, separation may have been an outcome of change of a CEO, which usually follows change of an owner. On the other hand, separation lowers the ability of a CEO to entrench himself, which is proved by a great number of cases of repeated changes within several years, and it also expands the field for hunting for new managers. In 36% of companies in the group with separation of ownership from management, a new CEO was working at the same firm, but this was the situation at 72% of the cases when the functions were not separated.

2.4.5. Investment and Dividend Policies

About three quarters of surveyed JSCs made capital investment in 2001-2004, and this proportion was the same under different relations between ownership and management. It can be suggested that, according to the 'insiders' dilemma', separation of ownership from management will facilitate diversification of sources of funds for investment and decrease reliance on internal funds. However, specific Russian spirit of informal relationships can, on the contrary, make the creditors prefer to give funds to firms that have a real 'master' in person.

We have established no difference either in access to different sources of funds for investment or in the scale of their use. Only a small sub-group of companies whose managers were large shareholders was distinguished by relatively more frequent applications to following external sources. The funds in question came from a holding company to its member companies (used by 90% against 60-65% in other JSCs); or they were foreign funds (used by 14% against 3-6% in other enterprises). Let us remind that this sub-group contains many parent companies and also has a relatively

high participation of foreign shareholders in equity capital.

Logically, dividend policy should correlate with attraction of investors, although it can have other grounds such as need to maintain good relations with minority shareholders in order to avoid conflicts or to prevent them from selling their shares to other investors. In general, 37% of companies in the sample did pay dividends at least once, and a quarter did pay then regularly – thrice **(Table 2.8).** Indeed, listing on stock exchanges had its influence: more than two thirds of listed companies paid dividends at least once, and every second did it 3 times. However, presence of hired managers didn't help paying dividends, and the most active dividend policy was found in the companies whose CEO was a shareholder (along with other managers as well). On the one hand, large presence of minority shareholders was certainly typical of such companies, but on the other, inseparability can, indeed, give manager-shareholders an incentive for getting their compensation in this way, as an alternative to salaries in particular. Separation brings incentives for spending profits by other ways.

Having excluded the listed companies, we saw no difference in the patterns of relations. Let us notice that joint stock companies whose CEO is not a large shareholder show a stronger intention to have their securities listed on stock exchanges in the near future (1 out of 8, against 1 out of 12 in other companies), which can influence their dividend policies in advance.

2.5. Conclusion

High level of concentration of equity capital is already established in Russian JSCs. Their great majority is under control of a single or a consolidated group of proprietors. High capital concentration is a universal feature of Russian business. The highest level of concentration is seen in ordinary member firms of holding company groups, where it is an instrument for keeping them inside the groups. The lowest concentration is typical of independent firms.

The outcome of redistribution of stock ownership is appearance of a large shareholder who, in the majority of cases, directly participates in management using

formal labour contract. Although non-separation of ownership and management still prevails, the ongoing corporate integration works in favour of gradual separation. We found no confirmation for influence of enterprise size or specifics of its industry in the cases of formal separation of ownership from management.

Inseparability of ownership and management works as an instrument for control in addition to the established level of capital concentration. However, in case of integration, intra-group stock ownership permits to turn this instrument down, to be replaced with either extremely high level of ownership concentration or with legal form of closed company as a member of a holding company group. When enterprises get involved in corporate integration, this implies that corporate bodies gain importance and that in member firms of holding company groups, executive and non-executive managers get separated, in contrast to joint stock companies that represent a whole business.

Hiring of top managers contributes to changes in the practice of formation and activities of the board of directors. Its role becomes stronger; it evolves into an operative agency working in the interests of large shareholders, and it is able to monitor the executive management. Companies where CEOs are small or medium shareholders give us reason to expect that large shareholders will gradually gain stronger control over such companies as well, and that the pattern of work of their boards of directors will also change. This may be partly due to a growing percentage of companies in this sub-group that have their securities listed on stock exchanges or are going to have them listed in future.

At the same time, separation did not affect capital investment, and dividend policies, on the contrary, turned to be less active than under non-separation. Hiring of top managers did not affect the intensity of corporate conflicts and the style of relations with stakeholders. It has just lowered the barrier of defence for a CEO under a threat of dismissal. As we believe, such results tell that the insiders' pattern of corporate control from the part of dominant owners remains unchanged and that the business is still 'closed'. Shifts in corporate governance in the companies where management is separated don't go beyond internal mechanisms, but even this has introduced certain

good standards. All other factors being equal, these companies look more attractive to investors if dominant owners decide to share control with them in exchange for investment. Transformation of executive management into a separate function and hiring of professional skilled managers, not necessarily from the inside but from open market, will also make the management better. However, these issues are beyond the boundaries of corporate governance, they belong to corporate management.

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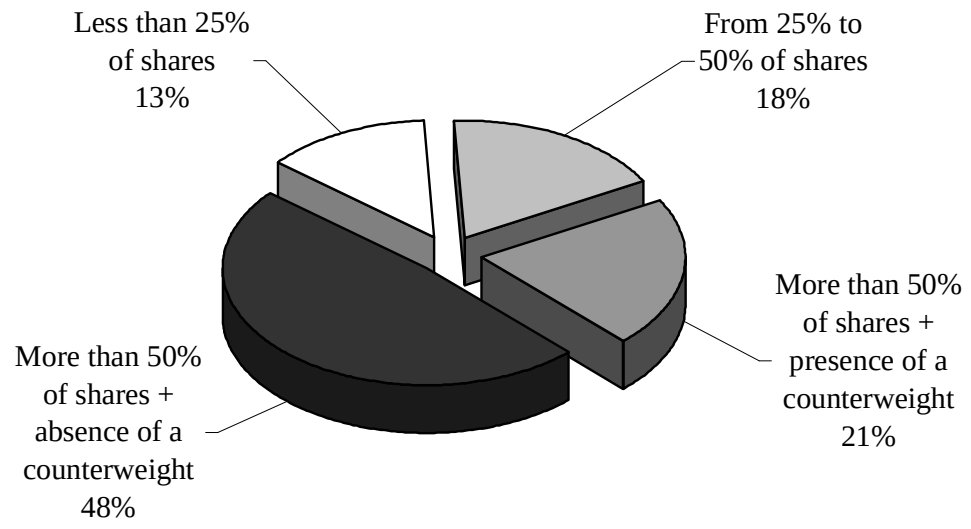

Figure 2.1: Classification of joint stock companies by level of stock concentration

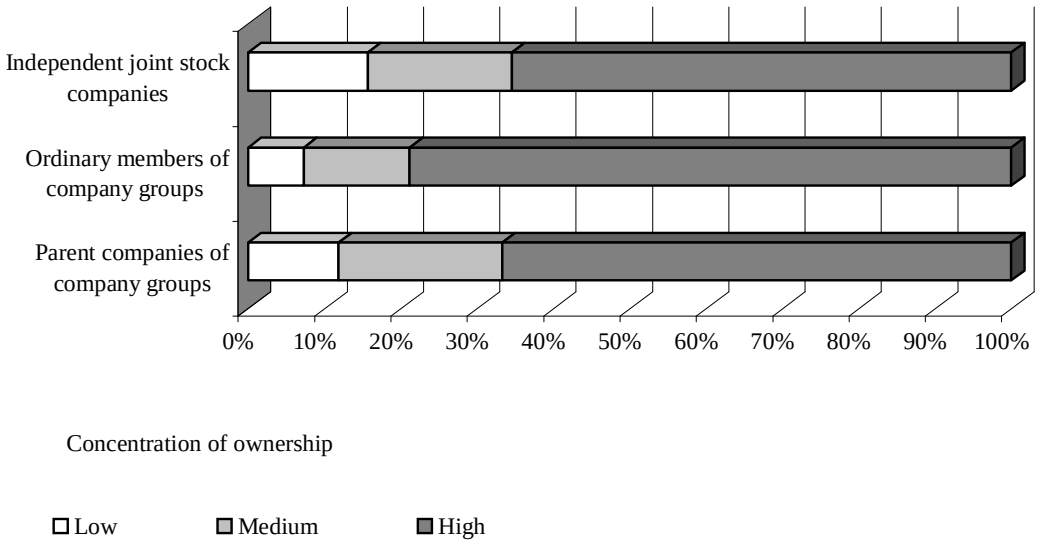

Figure 2.2: Concentration of ownership in independent and integrated companies

Table 2.1: Average percent of ordinary shares owned by type of shareholder, % of charter capital[a]

Type of shareholder	Total sample[b]	Independent companies	Members of company groups	Parent companies	Significance of differences [c]
Federal administration	4.7	3.2	7.4	4.6	0.002/0.002
Regional and local administration	1.9	2.1	1.4	3.0	0.516/0.476
All small individual shareholders	24.9	31.9	13.8	13.7	0.000/0.000
Banks	1.5	0.9	2.8	0.4	0.034/0.037
Investment funds and companies	2.7	2.1	4.0	1.3	0.000/0.000
Russian non-financial enterprises	13.7	9.4	21.8	13.1	0.000/0.000
All large individual shareholders	34.8	35.6	32.1	42.1	0.353/0.109
Foreign investors	4.6	2.6	7.1	10.6	0.000/0.000

Notes: [a] Here and further in the Tables, the sample means all surveyed joint stock companies minus the companies that had difficulty in answering or had no answer. For this reason, the number of JSCs in the sample is usually larger than sums by group.

[b] The number of respondents fluctuates between 698 and 720.

[c] The numerator is Kruscal Wallis test; the denominator is a test for comparison of medians.

Source: Author's estimates based on the survey data.

Table 2.2: Average percent of ordinary shares owned by type of shareholder at different levels of capital concentration, % of charter capital

Type of shareholder	Low	Medium	High	Significance of differences [a]
Federal administration	1.8	5.5	4.2	0.034/0.028
Regional and local administration	1.0	1.7	2.3	0.136/0.138
All small individual shareholders	30.5	31.1	20.5	0.000/0.000
Banks	1.1	0.6	1.8	0.681/0.619
Investment funds and companies	0.0	1.5	3.2	0.547/0.560
Russian non-financial enterprises	6.1	9.4	16.0	0.002/0.002
All large individual shareholders	39.5	35.4	35.8	0.107/0.064
Foreign investors	1.9	3.0	5.3	0.207/0.193

Note: [a] The numerator is Kruscal Wallis test; the denominator is a test for comparison of medians.

Source: Author's estimates based on the survey data.

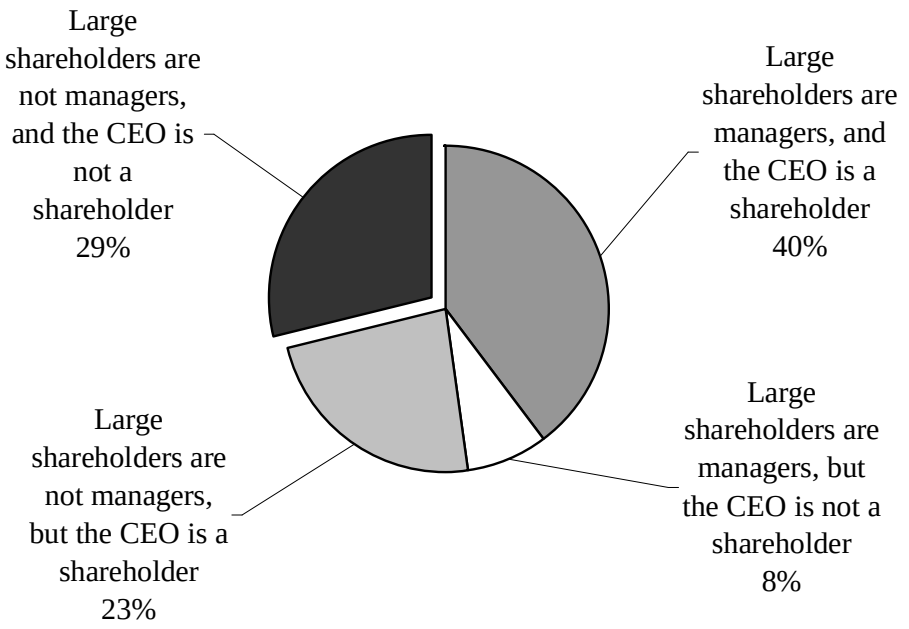

Figure 2.3: Classification of companies by participation of shareholders in their management

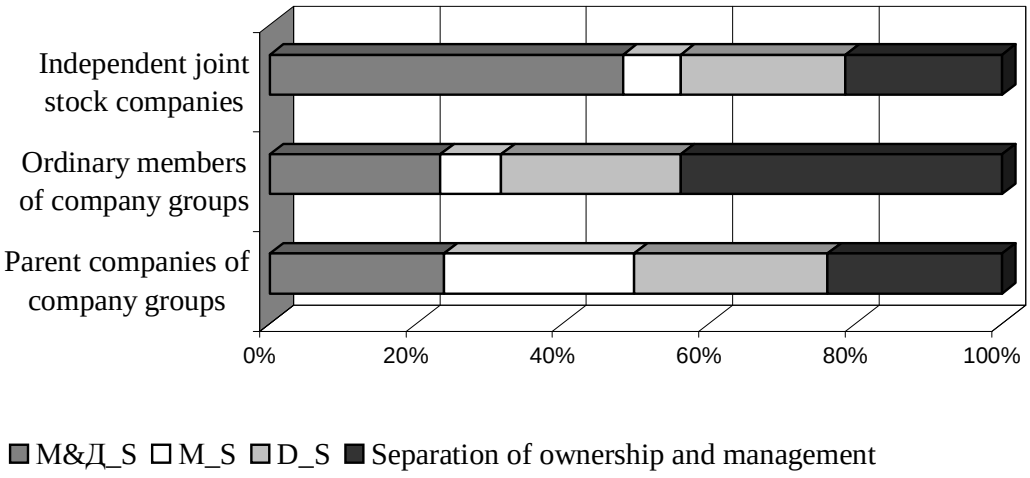

Figure 2.4: Correlation between ownership and management in integrated and independent companies

Table 2.3: Concentration of ownership and control in JSCs under different types of control, % of the number of respondents in each group

Indicators of concentration of ownership and control		Groups of joint stock companies:				
		Inseparability	M&D_S	M_S	D_S	Separation
An owner of 25%+1 share is present	Yes	81.6	86.2	84.7	72.8	80.9
	No	18.4	13.8	15.5	27.2	19.1
	Total	100	100	100	100	100
	Statistical significance of differences: 2 groups – 0.816, 4 sub-groups – 0.004[a]					
An owner of 50%+1 share is present	Yes	68.6	68.4	81.7	64.1	78.4
	No	31.4	31.6	18.3	35.9	21.6
	Total	100	100	100	100	100
	Statistical significance of differences: 2 groups – 0.008, 4 sub-groups – 0.003[a]					
An owner of 50%+1 shares is present along with an owner of 25%+1 shares ('counterweight')	Yes	31.9	32.4	31.9	30.8	27.4
	No	68.1	67.6	68.1	69.2	72.6
	Total	100	100	100	100	100
	Statistical significance of differences: 2 groups – 0.314, 4 sub-groups – 0.777[a]					
A dominating (controlling) owner is present, by the respondent's view	Yes	88.1	90.7	93.0	82.0	84.6
	No	11.9	9.3	7.0	18.0	15.4
	Total	100	100	100	100	100
	Statistical significance of differences: 2 groups – 0.208, 4 sub-groups – 0.016[a]					

Note: [a] χ^2 test was performed.

Source: Author's estimates based on the survey data.

Table 2.4: Influence of corporate bodies on decision-making, % of the number of respondents[a]

Ranks of influence	Total sample	Independent companies	Members of company groups	Parent companies
Strong influence	66.3/49.7	63.1/45.8	70.3/57.2	77.5/45.0
Moderate influence	26.8/32.0	27.5/33.3	23.5/29.0	17.5/37.5
Practically no influence	6.9/18.3	7.4/20.9	6.2/13.8	5.0/17.5
Number of joint stock companies	772/788	471/478	260/269	40/40
Statistical significance of differences: board of directors 0.169; shareholder meeting 0.027 [b]				

Notes: [a] In the numerator, assessments of the role of boards of directors; in the denominator, of the role of shareholder meetings.

[b] χ^2 test was performed.

Source: Author's estimates based on the survey data.

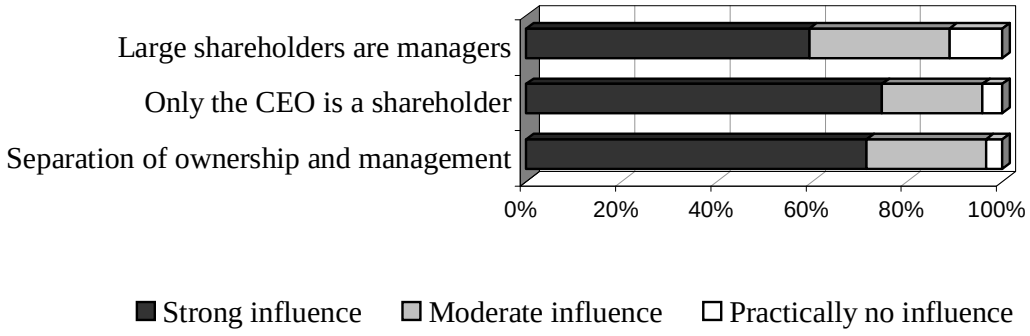

Figure 2.5: Influence of board of directors on corporate decision-making under different types of control

Table 2.5: Structure of board of directors, % of total membership

Representatives in the board	Total sample	Independent companies	Members of company groups	Parent companies	Significance of differences [a]
Company managers	46.4	54.5	30.5	45.3	0.000/0.000
Ordinary workers, trade union	5.0	6.3	2.7	4.0	0.001/0.001
Public administration of all levels	5.0	5.1	4.2	8.7	0.259/0.175
Large outside shareholders	32.0	24.0	48.4	28.9	0.000/0.000
Minority outside shareholders	4.7	5.1	3.8	5.5	0.853/0.896
Independent directors	6.2	4.1	10.0	7.7	0.000/0.000
Other	0.7	1.0	0.4	0.0	0.672/0.675
Total membership, persons	6.7	6.3	7.2	7.1	0.000/0.000
Number of JSCs	736	460	237	38	-

Note: [a] The numerator is Kruscal Wallis test; the denominator is a test for comparison of medians.

Source: Author's estimates based on the survey data.

Table 2.6: Structure of board of directors under different type of control, % of total membership

Representatives in the board	Inseparability	M&D_S	M_S	D_S	Separation	Significance of differences [a]
Company managers	54.4	67.0	53.6	33.6	26.3	0.000/0.000
Ordinary workers, trade union	5.5	5.3	8.6	4.8	3.5	0.020/0.007
Federal administration	2.2	1.3	1.8	3.9	2.4	0.013/0.877
Regional and/or local administration	2.8	1.8	3.2	4.3	3.4	0.041/0.655
Large outside shareholders	25.2	16.7	22.7	40.3	50.7	0.000/0.000
Minority outside shareholders	4.5	3.4	4.9	6.3	3.8	0.067/0.663
Independent directors	4.9	4.2	2.7	6.7	8.8	0.011/0.055
Other	0.5	0.3	2.4	0.2	1.1	0.344/0.269
Total membership, persons	6.6	6.2	6.7	7.3	6.7	0.000/0.119
Number of JSCs	498	278	55	165	190	-

Note: [a] Kruskal Wallis test: the numerator presents significance of differences between 4 sub-groups; the denominator presents significance of differences between 2 basic groups of JSCs.

Source: Author's estimates based on the survey data.

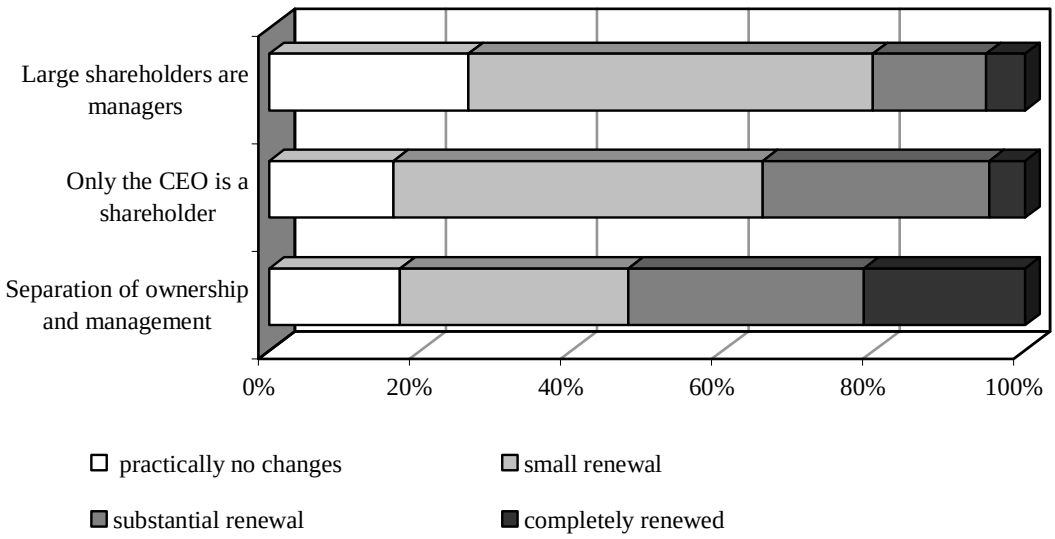

Figure 2.6: Renewal of board of directors in 2001-2004

Table 2.7: Intensity of change of a CEO in 2001-2004, % of the number of respondents

Indicators of a CEO's turnover	Inseparability	M&D_S	M_S	D_S	Separation
CEO was never changed	71.3	75.5	50.0	71.4	35.3
CEO was changed once	23.6	21.1	33.3	24.6	35.8
CEO was changed several times	5.1	3.4	16.7	4.0	28.9
Total of the sample	100	100	100	100	100
Number of joint stock companies	533	298	60	175	218
Statistical significance of differences: 2 groups – 0.000, 4 sub-groups – 0.000[a]					

Note: [a] χ^2 test was performed.

Source: Author's estimates based on the survey data.

Table 2.8: Regularity of common share dividend payments for 2001-2003 under different configuration of ownership and management, % of the number of respondents

Indicators of dividend policy	Inseparability	M&D_S	M_S	D_S	Separation	Total sample
Never paid for these years	58.0	57.0	76.3	53.5	75.0	63.4
Paid once for 1 or 2 years	12.7	12.7	10.2	13.3	7.6	10.7
Paid for all 3 years	29.3	30.2	13.6	33.1	17.5	25.9
Total of the sample	100	100	100	100	100	100
Number of JSCs	529	298	59	172	212	806
Statistical significance of differences: 2 groups 0.000, 4 sub-groups 0.000 [a]						

Note: [a] χ^2 test was performed.

Source: Author's estimates based on the survey data.

Chapter 3

Impacts of Corporate Governance and Performance on Managerial Turnover in Russian Firms*

Naohito Abe and
Ichiro Iwasaki

3.1. Introduction

Establishing an effective governance system to discipline top management to produce maximized shareholder wealth is very important, because the diffuse ownership structure in public companies means that shareholders must delegate the daily management of a business to professional managers, and they do not always bend over backward to satisfy their principals.

To control the potential agency conflicts between shareholders and managers, several mechanisms of internal control reside in modern corporations. In this regard, the corporate governance literature pays close attention to insider ownership, boards of directors, and dual leadership system (i.e., a separation of chief executive officer (CEO) and board chairman positions), and also to shareholders' right to remove ineffective managers. In many countries, including Russia and other post-Communist countries, corporate law provides that the contract relationship between a company and

* This paper is an outcome from the Japan–Russia joint research project entitled "Corporate governance and integration processes in the Russian economy" launched by the Institute of Economic Research, Hitotsubashi University (Tokyo) and the Institute for Industrial and Market Studies, State University – Higher School of Economics (Moscow). Our research work was financially supported by the Japan Securities Scholarship Foundation (JSSF) and grants-in-aid for scientific research from the Ministry of Education and Science of Japan (No. 16530149; No. 17203019) in FY2005-2006.

its management officers may create a trust that enshrines the right of arbitrary dismissal of executives. This right may be given to the general shareholders' meeting and the board of directors, if such an authority is delegated to the latter by the former. This legislative ordination is intended to be a formal tool for governing corporations to allow necessary managerial renewals in favor of shareholders' interests.

From this point of view, an empirical test to examine the likelihood of managerial dismissal initiated by a shareholder(s) or through an entrusted board member(s) and the positive link between poor corporate performance and managerial turnover is of considerable significance to measure the viability of the aforesaid shareholders' right, that is, the enforcement of the corporate law in a concerned state. In the context of transition economies, this kind of empirical work is important also to assess the development of the private corporate sector in a country under "the great transformation" (Kornai, 2006) and the degree of adaptation by its citizens to the new principles of life in a market economy.

Although empirical results are mixed, many financial economists confirm the statistically significant impacts of the governance mechanism and corporate performance on managerial turnover in developed countries.[1] As we will discuss later, empirical evidence does exist concerning the close relationship between ownership structure and managerial turnover in Russia. With regard to the impact of corporate performance on dismissal of poor performing managers, however, there are only a handful of papers supporting the empirical relation between the two elements (Muravyev, 2001, 2003a, 2003b; Kapelyushnikov and Demina, 2005). As many researchers of Russian economy point out, the nonsignificant or neutral association between bad performance and managerial turnover in Russian firms is due to the obstinate managerial entrenchment in the background of substantial insider ownership as a result of the mass-privatization policy, weakly functioning internal corporate organs and serious informational asymmetry between management and outside

[1] See Coughlan and Schmidt (1985), Weisbach (1988), Martin and McConnell (1991), Kang and Shivdasani (1995), Denis et al. (1997), Goyal and Park (2002), Abe and Oguro (2004), Huson et al. (2004), and others.

shareholders (Iwasaki, 2007). Although their arguments are convincing, taking the degree of economic transformation and the current social circumstances in Russia into consideration, we feel there is room for more detailed research on this topic.

In this study, we deliberate the possible impacts of governance systems and corporate performance on managerial turnover using a unique dataset of Russian corporations. The survey underlying this article is a Japan-Russia large-scale questionnaire survey of joint-stock companies conducted in the summer of 2005. It covers 822 manufacturing and communication enterprises located in 64 of the 89 regions of the Russian Federation. This chapter is based on the results of our joint survey[2].

From a methodological perspective, this study is different from most previous work in that we deal with not only CEO dismissals, but managerial turnover in a company as a whole, assuming that different types of shareholders may have distinct impacts on removal of poorly performing managers.[3] We find that nonpayment of dividends is significantly correlated with managerial turnover in our samples. We also find that the presence of dominant shareholders and foreign investors is another important factor causing managerial dismissals in Russian corporations, but these two kinds of company owners reveal different effects in terms of turnover magnitude.

The remainder of this chapter is organized as follows: Section 3.2 reviews preceding studies of managerial turnover in Russian firms. Section 3.3 discusses testable hypotheses and empirical methodology. Section 3.4 describes the data. Section 3.5 presents our empirical results on the determinants of managerial turnover. Section 3.6 concludes the chapter.

[2] For more details, see Dolgopyatova and Iwasaki (2006).

[3] In this chapter, CEOs denote not only chief executive officers in the western terms, but also company presidents and general directors.

3.2. Managerial Turnover in Transition Russia: Literature Review

Many studies have been devoted to the CEO turnover observed in developed countries because this phenomenon offers a unique dimension to corporate governance theory. Likewise, this theme is also a center of attention for those involved in the study of Russian corporate governance. In fact, many researchers and research teams have conducted studies on CEO turnover from the viewpoint of the appointment date of the current president and the reason for the resignation of the predecessor in order to use the data in empirical studies.

Although abundant information on managerial turnover in Russia is available from these survey papers, most of them simply show the percentage of enterprises that experienced a CEO replacement during a given survey period but not changes in the turnover rate over time. Therefore, we estimated the annual CEO turnover for each year from 1993 to 2003 by examining the relevant data available in 14 papers. **Figure 3.1** plots simple means as well as weighted means by sample size in individual surveys. Dolgopyatova (2003) suggested that CEO turnover increased after the 1998 financial crisis. However, **Figure 3.1** suggests that it is highly possible that such an upward trend started earlier than that event. In fact, the differences between the average turnover for 1996 and that for 1997 are statistically significant at the 1% level by the one-tail test ($t = 3.55$, $p = 0.004$), whereas the differences between 1997 and 1998 are not significant ($t = 0.474$, $p = 0.323$). Furthermore, a regression analysis of CEO turnover that was adapted from the reform years (setting 1993 to 1 as the starting point) and using a level-shift dummy (set at 1 for 1997 onwards) as explanatory variable, led to the conclusion that there was a statistically significant average divergence of 5.8% in CEO turnover between the two subperiods of 1993 to 1996 and 1997 to 2003.[4]

[4] The OLS estimation result is as follows:

$$\underset{}{Turnover} = \underset{(8.00)}{7.64^{*}} \underset{(1.18)}{-0.27}Reformyear + \underset{(4.69)}{5.79^{*}}After1997,$$

N=56, R^2=0.480, *Adj.* R^2=0.461, F=24.484*.

The *t*-values are in parentheses. * denotes that the coefficient is significant at the 1% level.

As indicated in **Figure 3.2**, after the mass privatization of state-owned enterprises conducted in early 1990s, the year of 1997 became the first year when the average share of insider ownership fell below 50%.[5] In the same year, the average age of top managers was nearly as high as their retirement age, with the proportion of CEOs older than 60 topping 28%. In addition, the average CEO tenure (7 to 8 years) and turnover frequency (10 to 11%) for Russian corporations over the past few years have been almost the same as those for American and Japanese companies. In terms of the frequency of outside CEO succession (40 to 50%), Russian firms have kept their level 10 to 20% higher than the average for corporations in developed countries (Weisbach, 1988; Martin and McConnell, 1991; Kang and Shivdasani, 1995; Muravyev, 2001; Rachinsky, 2002; Muravyev, 2003a; Abe and Oguro, 2004; Yasin, 2004). Therefore, the increasing upward trend of CEO turnover frequency shown in **Figure 3.1** can be attributed to the accelerated development of flexibility of CEO appointment against the background of declining insider control and the aging of Soviet-generation managers (so-called "red executives").

Table 3.1 lists empirical studies scrutinizing the linkage between CEO turnover and corporate restructuring in Russia. All studies, except the one by Linz (1996), highlight the critical effects of ownership structure on managerial renewal. They share the following four common perceptions. First, outside ownership is positively and highly statistically correlated with CEO turnover frequency. Second, in contrast, insider shareholding significantly hampers CEO changes as 40 to 50% of enterprises with dominant ownership by managers and worker collectives have a holdover CEO from the Soviet days, a much higher proportion compared with that in other types of

[5] During mass-privatization period from August 1992 to June 1994, 67% of all state-owned enterprises eligible for privatization adopted an option plan in which management and employees were allowed to acquire a maximum of 51% of a firm's total stock at 70% of face value. As a result, the vast majority of the privatized firms had been heavily controlled by insiders. However, in the second half of 1990s the shareholding by insiders was remarkably decreased mainly due to massive selling own shares by rank and file workers (Iwasaki, 2007).

corporations (15 to 20%). Third, substantial changes in ownership structure resulting from the replacement of the largest or dominant shareholders are highly likely to cause CEO turnover. Fourth, the higher the investment share of a top shareholder and the ownership concentration rate are, the more frequently CEO turnover occurs.[6] Moreover, there are two other noteworthy points, first that the government does not necessarily speak for the current management, considering that state ownership increases CEO turnover as well (Kapelyushnikov, 2001; Muravyev, 2001, 2003a). Second, the frequency of insider CEO succession is positively correlated with shareholding by insiders and the federal government, while the presence of outside investors and local governments enhances the possibility of outsider succession (Muravyev, 2003b; Kapelyushnikov and Demina, 2005).

Table 3.2 shows the results from vote-counting analysis of the impact of different types of owners and changes in ownership structure on CEO turnover based on the 12 estimation results available in the papers listed in **Table 3.1**.[7] Here, multiple estimation results were taken from one study only when regression modeling, analysis period and other conditions were substantially different from others in that study. In cases in which more than one estimation result was available from one study regarding the same subject, the most appropriate was selected by judging the coefficient of determination (R^2) and selection of control variables and by considering the simultaneous equation bias, among other factors.

This table confirms the reversed relationship between insiders and outsiders regarding the direction of their impact on CEO turnover. Except for the state ownership, all types of outside owners had a positive impact on managerial turnover, if they are estimated statistically significant at the 5% level or less. Domestic individual shareholders and financial institutions enjoy a relatively high probability to

[6] For instance, a survey covering 334 industrial firms revealed that, as of the end of 2001, the largest shareholders in enterprises whose CEOs were appointed in or after 1998 had an average ownership of 45.1%, whereas those in enterprises whose CEOs had been in office for 10 years had an average ownership of 24.2% (Dolgopyatova, 2003).

[7] For details of vote-counting method, see Hunter and Schmidt (2004).

affect the renewal of company top officers in comparison with domestic nonfinancial corporate shareholders and foreign investors. Changes in ownership structure also exert positive effects on CEO turnover.

Regarding the interrelation between managerial turnover and corporate performance, eight studies shown in **Table 3.1** examine the effects of the renewal of top-notch managers on ex post corporate performance and restructuring activities. Four of them evaluate the refreshment of management as positive (Barberis et al., 1996; Klepach, Kuznetsov and Kryuchkova, 1996; Filatotchev, Wright, Buck and Dyomina, 1999; Krueger, 2004), and the other four have a neutral or negative view of its influence (Rachinsky, 2001; Peng, Buck and Filatotchev, 2003; Dolgopyatova and Kuznetsov, 2004; Yasin, 2004), leaving room for further discussion.

A more debatable aspect in this regard is the reverse angle of the relationship between these two elements, that is, to the role of corporate performance as a trigger of CEO turnover. The majority of researchers do not provide clear evidence that corporate performance affects the frequency of managerial turnover. Many papers have suggested an extremely limited correlation between these two factors (Kapelyushnikov, 2001; Dolgopyatova and Kuznetsov, 2004) or denied a significant correspondence (Goltsman, 2000; Yasin, 2004). An exhaustive event study by Rachinsky (2002) covering 110 listed corporations also supports these mainstream views. According to his study, only 19.5% of all 113 CEOs who left their post from 1997 to 2001 resigned to take responsibility for the worsening of their business results.[8] This percentage is much lower than that of CEOs who stepped down for nonmanagerial reasons, such as career changes, age-limit retirements, internal reassignments resulting from organizational changes and nonmanagerial problems (51.3% in total), and even lower than that of those who resigned for other reasons, such as managerial intervention by local governments, social conflicts including labor disputes, legal procedures concerning corporate rehabilitation, takeover and others

[8] CEO turnover occurred in 69 of the 110 companies surveyed. Twenty companies experienced the phenomenon twice, and 9 companies experienced it three or more times during the survey period (op. cit.).

(24.8% in total). Judging from the above findings, Rachinsky (2002) states that it is difficult, even in listed companies, to drive out top management on the grounds of poor performance, and consequently, CEO changes are not sensitive to corporate performance in Russia.

In contrast, the remaining two studies, Muravyev (2003a) and Kapelyushnikov and Demina (2005) demonstrate that poor corporate performance is positively related to managerial turnover. Using data obtained in the survey of 437 Russian enterprises, Muravyev (2003a) regressed CEO turnover in the period from January 1999 to May 2000 on industry-adjusted labor productivity and other control variables including ownership structure, board composition and company size, etc., and found a statistically robust relationship between past performance and turnover frequency. He concludes "the fact that bad managers (either incompetent or opportunistic) are punished implies that the widely held assumption about virtual nonexistence of corporate governance in Russia is not valid" (p.168).

Kapelyushnikov and Demina (2005) is the most recent study on managerial turnover in Russia. Using the results of a longitudinal questionnaire survey of industrial firms[9] carried out in 1997–2003, they performed PROBIT estimation of the CEO-turnover model, and confirmed that on average the possibility of CEO replacement in loss-making firms is 8.5% higher than that in profitable corporations. Moreover, Kapelyushnikov and Demina (2005) also examined the impact of corporate performance on new CEO appointment and substantiated that appointment of incumbent workers to top management is less probable in underperformed enterprises than in profitable ones. Indeed, according to their regression results, the possibility of succession by insiders to company presidents in loss-making firms is 68.8% lower on average than in well-performing firms. Because their dataset consists of many unlisted firms and ex-state-owned privatized firms, their empirical evidence may

[9] It is called the "Russian Economic Barometer" survey project – one of representative longitudinal enterprise surveys in Russia. More information is available at: http://www.imemo.ru/barom/.

suggest that the positive link between poor performance and CEO renewal becomes usual governance practice in daily management life in contemporary Russia.

Although their empirical analyses clearly indicates that bad corporate performance enhances CEO turnover in Russian firms, Muravyev (2003a) and Kapelyushnikov and Demina (2005) are still in the minority. In the following sections, we will show additional evidence supporting the empirical relationship between corporate performance and managerial turnover, relying on a complete new dataset of Russian corporations.

3.3. Hypothesis and Empirical Methodology

As we discussed in the previous section, most prior studies on Russian companies do not find a significant impact of company performance on CEO turnover. We can think of various reasons for the absence of correlation between these two factors in Russia. It is possible that previous literature simply did not have a sufficient number of observations of turnover events. Another possibility is that the CEO in Russia does not play the same role in other countries such as the United States. In the US, the CEO is the bridge between the board of directors and management team, and is solely responsible for management outcomes. That is, the CEO is very powerful. In other developed countries like in Japan, CEOs or company presidents are not as powerful as American top managers are. Rather, they are regarded only as one of the key members of management team. In such a case, when company performance is poor, it does not have to be the CEO who should take the whole responsibility, but other management members are to be blamed. Furthermore, in these countries it is highly likely that the management team in a company should take collective responsibility and resign as a group when the company produces extremely bad performance or there is a great scandal about its corporate affairs.

Because of the 70-year-long history of the risk-averse way of life in the Soviet period and the Continental European nature of corporate law, the management system in Russian corporations, especially in the former socialist enterprises, inclines toward

the team leadership and the collective decision-making practice on everyday management. Indeed, Russian company presidents generally do not stand aloof from other executives, or they do not have sole responsibility for all company matters including poor performance. In other words, Russian managers often share the fruits of collective achievements in corporate management, and at the same time, they jointly sustain damage from any failure as a team member. Consequently, it is conceivable that not only the CEO, but also other high-ranking officers leave their company in response to bad corporate performance caused mainly by their mistakes. It is also possible that the entire management team in a Russian company may resign together due to an irrecoverable loss in its shareholder wealth or company reputation.

Furthermore, it may be optimal for outside shareholders, who have a certain insight into management style in a company they own, to call for resignation not of its president but of another senior manager(s) depending on the seriousness of company problems. It can be justified, when outside shareholders expect that the CEO dismissal may not bring positive effects on ex post management of that company enough to offset the loss of CEO's firm-specific knowledge and experiences. It is particularly true for dominant shareholders who can easily access inside information of management activities in their companies.

If the above discussions would be very much nearer the mark concerning company management life in current Russia, we had better examine the impact of corporate performance not on CEO turnover alone, but also on managerial turnover in a whole company. Relying on this presumption, we attempt to investigate turnover of not only CEOs, but also other high-ranking managers who are in charge of finance, accounting, planning, marketing, or sales management. There are four possible events to examine. They are turnover of both CEO and senior managers (Type I), turnover of only CEO (Type II), turnover of only senior managers (Type III) and no turnover (Type IV). It means that we now have four mutually exclusive outcomes.

Let the value to the *i*th company of choosing turnover type j (j = 1,..,4), be y_{ij}^{*}, and assume y_{ij}^{*} depends on company performance (*Performance*), corporate governance related variables such as ownership structure (*CG*) and other variables

including firm size, legal form of incorporation, industrial dummies (X) and an error term ε_{ij} :

$$y_{ij}^{*} = a^{j} + \beta_1^{j} Performance_i + \beta_2^{j} CG_i + \beta_3^{j} X_i + \varepsilon_{ij} . \quad (1)$$

Using Type IV (No turnover) as the base case, we adopt the multinomial PROBIT (MNP) model to estimate the relationship between company performance and the type of turnover.[10]

The probability of observing Type j turnover, $y_{ij}=1$ is:

$$P_{ij} = \Pr[y_{ij}=1] = \Pr[y_{ij}^{*} > y_{ik}^{*}, \forall k \neq j \mid Performance_i, CG_i, X_i] .^{11} \quad (2)$$

If there are only two outcomes such as No turnover and CEO turnover, (2) can be written as a standard PROBIT or LOGIT model.

3.4. Data Description

To perform regression analysis based on the abovementioned methodology, we employ detailed micro data of Russian nonfinancial joint-stock companies with more than 100 employees. The data derives from the joint enterprise survey conducted in 2005 by Hitotsubashi University and State University Higher School of Economics.[12] Our survey is unique in several aspects. First, it contains more than 100 questions on detailed company management, capital and ownership structures, board composition, as well as the relationship between managers and shareholders and other stakeholders.

[10] In this paper, we do not use the multinomial LOGIT (MNL) model for our empirical analysis because IIA assumption for MNL is rejected. Since MNP with a general covariance matrix takes a prohibitively long time to converge, we assume that all the covariances between type i residuals and type j residuals except for diagonal elements are identical.

[11] See Stern (1997) for detail of the procedure to work with MNP model.

[12] Dolgopyatova and Iwasaki (2006) give a comprehensive explanation of the survey including the sampling procedures, questionnaires, sample statistics, and comparisons with other surveys.

Second, the questionnaires were filled in after interviews with company executives. Third, 822 companies located in 64 regions of the 89 constituent entities of the Russian Federation replied with valid answers to the survey. The proportional distribution of these companies by federal region is very close to that of the actual regional distribution of business organizations according to the official statistics (see **Table 3.3**). Finally, the sectoral composition of the surveyed firms is also well representing the actual distribution of medium and large-scale joint-stock companies by industry.[13]

Out of 822 observations, we dropped workers' joint-stock companies (people's enterprises) due to the specific nature of their internal control system stipulated by the special law on these legal entities.[14] We also dropped companies that refused to answer to at least one of the questions regarding managerial turnover, relationship between shareholders and managers and company performances, which gives us 602 observations.

Our survey contains many items on turnover of not only CEO or board members, but of senior managers. One of the drawbacks of the survey is its weakness in accounting information. Most surveyed companies are not listed. Although we asked questions on company performance such as profit, dividend and sales growth, such variables most likely contain many measurement errors[15]. In the following empirical analyses, it is important to take it into account the characteristics of the data.

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[13] The detailed sectoral breakdown of the 822 companies is as follows: (1) fuel and energy (66 firms or 8.0%), (2) metallurgy (36 firms or 4.4 cent), (3) machine-building and metal working (255 firms or 31.0%), (4) chemical and petroleum (33 firms or 4.0%), (5) wood, paper, and paper products (63 firms or 7.7%), (6) light industry (51 firms or 6.2%), (7) food industry (169 firms or 20.6%), (8) construction materials (78 firms or 9.5%), and (9) communications (71 firms or 8.6%).

[14] For more details on workers' joint-stock company, see Iwasaki (2003).

[15] Another thing to be noticed is its response rate. Because our survey was interview based, the response rate was not expected to be high. The ratio is approximately one third. That is, one of three company executives refused to participate in the survey (Dolgopyatova and Iwasaki, 2006, p. 8).

The variables we use in our empirical model (2) are as follows:

y: The CEO turnover dummy takes unity if the CEO left the company between 2001 and 2004 on the initiative of shareholders, otherwise, the dummy takes zero. Turnover dummy of senior managers takes a value of 1 if the company reports that many managers who are in charge of finance, accounting planning, marketing and sales left the company between 2001 and 2004. The turnover index is created from these two dummy variables, which gives us four mutually exclusive outcomes.

Performance: As independent variables representing corporate performance, we utilize two different indices: That is, first, a dividend payment dummy (*DIVPAY*) that takes unity when dividends on common stock were paid between 2001 and 2004, otherwise zero, and second, a sales growth index (*SALGRO*) that captures the relative sales growth to the industrial average from 2000 to 2004. The original variable is an index (1 for doubled or more sales growth during the period, 2 for 1.5 times less than doubled, 3 for less than 1.5 times, 4 for not changed and 5 for declined). We take the industrial averages of the variable and subtract the mean from the company level variable.

CG: As independent variables of governance mechanism, we adapt two ownership variables taking into account the findings of the prior studies on managerial turnover in Russia, as mentioned in Section 3.2. They consist of first an index for ownership share by foreign investors (*OWNFOR*) that takes 0 for zero, 1 for 10% or less, 2 for 10.1–25%, 3 for 25.1–50%, 4 for 50.1–75 and 5 for more than 75% and second, a dummy for existence of dominant shareholders (*DOMSHA*). The dominant shareholder is defined as the shareholder who owns more than 50% of common stock and has controlling interest.[16]

[16] Although, the survey covers current board composition, it did not ask the composition before the turnover event. Although we could include the board composition in our explanatory variables, we did not so because (1) turnover or top executives likely precede changes in board composition so that the endogeneity issue is serious, (2) in many cases, when we include information of the outside board member ratio, our likelihood functions fail to converge, and (3) for some cases in which we could obtain the maximum, the outside

X: Furthermore, we introduce the next three variables to control other firm specificity. Namely, (a) Natural logarithms of the number of employment as a proxy of company size (*COMSIZ*), (b) Open joint-stock company dummy (*OPECOM*),[17] and (c) Industrial dummies for nine classifications.

Table 3.4 shows the descriptive statistics for all the 602 observations and those for each turnover type. Among 602 companies, 68 firms (11.3%) report that they experienced turnover of both CEO and managers (Type I). Combining Type I and II, about 27% of companies went through turnover of CEO initiated by shareholders. *SALGRO* is positive for no turnover case (Type IV), but positive for all other cases, which suggests companies that experienced any type of turnovers grew slower than other companies. The mean of *DIVPAY* is 0.45 for Type IV and 0.28 for CEO sole turnover (Type II), which suggests companies whose CEO resigned recently did not pay dividends. There tend to be more open joint-stock companies that experienced Type I turnover. Companies with more foreign shareholders went through more Type I and Type II turnover than other types of turnover. The most noticeable point of **Table 3.4** is probably the role of dominant shareholders in turnover. More then 90% of companies whose CEO and mangers resigned had a dominant shareholder, while less than 70% of the companies that did not experience any managerial turnover had a dominant shareholder. On the whole, **Table 3.4** suggests that a company that has a dominant shareholder, low sales growth and more ownership share by foreigners experienced Type I turnover. A company without dividend payments went through Type II turnover. Overall, these findings seem to be consistent with the hypothesis we discussed in the previous section.

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board member ratio is not statistically significant.

[17] There are two types of stock corporations in Russia – open and closed companies. Stock of a closed company cannot be traded without permission of all other stockholders. To be a closed company, several criteria such as the number of shareholders and the amount of capital should be met. For more details on this matter, see Iwasaki (2003).

3.5. Empirical Results

In this section, to evaluate the impacts of corporate performance and governance mechanism on managerial turnover, we conduct regression analysis in multivariate setting. Our analysis begins with an examination of the determinants of CEO turnover by the LOGIT model, taking the CEO turnover dummy as a dependent variable. Next, we perform the multinomial PROBIT estimation of managerial turnover using the four mutually exclusive turnover indices capturing the magnitude of managerial removal in the scale of whole company.

Table 3.5 contains the standard LOGIT estimates. Model [L1] in **panel A** of **Table 3.5** uses the full sample consisting of total 602 companies. In addition, in order to validate the robustness of the estimation results, a supplementary estimation is performed using the following three cases. That is, we estimate the model [L2] using the full sample excluding all firms with no dividend payment. Model [L3] uses the sample with negative relative sales growth index and Model [L4] is estimated based on the sample with no dividend payments and negative relative sales growth. Models [L5] to [L8] in **panel B** of **Table 3.5** utilize the same sample criteria as Model [L1] to [L4], respectively. The only difference is Models [L5] to [L8] do not include industrial dummies in the control variables. The marginal effects of each independent variable are reported in the next column to the coefficients.[18]

Results of Model [L1] and [L5] show that company performance represented by *DIVPAY* and *SALGRO* do not have significant effects on CEO turnover. We can observe several positive significant effects of foreign ownership (*OWNFOR*) and presence of a dominant shareholder (*DOMSHA*) on dismissal of CEO initiated by shareholders. Results in Model [L2], [L3], [L6] and [L7] suggest that a company

[18] The marginal effects in the LOGIT model are calculated as $\partial Y/\partial x_i = \Lambda(x_i\beta)[1-\Lambda(x_i\beta)]\beta$, where Y is a dichotomous dependent variable, x is a vector of independent variables including constant term, β is a parameter vector, and Λ (.) indicates the logistic cumulative distribution function. In the multinomial PROBIT models, Λ (.) is substituted the standard normal distribution function.

with poor performance tends to experience CEO removal more if their ownership share by foreign investors is high or if there exists a dominant shareholder. A serious problem in this specification is statistically weak effects of performance on CEO turnover in Model [L1] and [L5] full sample estimation. Largely, our LOGIT estimates in **Table 3.5** confirm the main findings of preceding studies, which suggest the weak correlation between corporate performance on CEO turnover, and the significant impact of ownership structure on top management removal.

Next, we look into the joint turnover of company presidents and senior managers in our samples. **Table 3.6** reports the regression results by the multinomial PROBIT maximum likelihood. The base category for our MNP estimation is the firms with no turnover events (Type IV). Models [M1] to [M8] use the same sample criteria and control variables as Model [L1] to [L8], respectively. This time, we can confirm negative significant impacts of performance on CEO turnover (Type II). That is to say, *DIVPAY* has negative significant effects on CEO dismissal under all the specifications. Although *SALGRO* does not have statistically significant impacts on CEO removal, the sign is negative under all the specifications, which suggests that poor company performance in terms of sale growth induces turnover of top managers. The MNP estimation results contrast with previous literature and our LOGIT regression analysis reported in **Table 3.5**.

We think that the difference occurs for two reasons. The first is the fact the multinomial PROBIT model is statistically more powerful than the standard LOGIT model. Notice that although the *DIVPAY* dummy variable in **Table 3.5** is insignificant, the sign is negative. Utilizing information of various turnovers simultaneously, we can increase the statistical powers to reject the null hypothesis. The second reason is the importance of distinction between CEOs' and other high-ranking managers' turnover. As we discussed in Section 3.3, when company performance is poor, it does not have to be always the CEO who is responsible for it. It is likely that other senior manager(s) may resign instead of the company president especially if companies are running under a collective management system. Although it is almost impossible to identify who should take the responsibility from the data, by

controlling for ownership structure and other company characteristics, we think we can get information on how companies react differently to realization of bad company performances.

Another noteworthy result in **Table 3.6** is that the shareholding by foreign investors (*OWNFOR*) has positive and significant effects on CEO sole turnover (Type II), although the effects on other turnovers are not significant. The effects of dominant shareholder dummy (*DOMSHA*) is significant in Type I turnover, that is, turnover of both CEO and senior managers, but not significant in CEO only turnover. As for Type III turnover – turnover of senior managers only, *DOMSHA* is positive and significant when the sample is limited to firms with no dividend payment and lower sales growth than industrial average (Models [M4] and [M8]). We interpret this result as follows. It is very difficult for foreign owners to monitor activities of the CEO and other company managers in Russian firms due to several reasons including weak disclosure requirements and managers' hostile attitude to foreigners. Therefore, when the outcome from company management is poor, foreign investors are unable to identify what is the main cause of this bad performance. In such a case, the foreign shareholders may simply call for the CEO to take the responsibility following the western practices.

On the other hand, if the dominant shareholder, who is in many cases either a rich Russian private investor or a nonfinancial corporate shareholder including holding companies and other business groups, exists in a company, such a shareholder has a strong incentive to monitor the activities of its company managers. With intensive monitoring, it might be possible for him or her to identify who is really responsible for the poor outcome. Hence, the dominant shareholders with deep insight into management activities in companies they fund may exert pressure on an individual manager to resign for his/her bad performance possibly through their unofficial contact with the management. It is also possible for them to call on the whole management team to leave their companies, when, for instance, bad corporate performance has it roots in the ineffective coordination of collective decision making on strategic management matters or in terrible opportunistic behavior as a team. Comparing the

marginal effects of Model [M3] with that of [M1], the former coefficient of *DOMSHA* is greater than the latter. Recall that Model [M3] uses the observations with lower sales growth. That is, the dominant shareholders increase the turnover of both CEO and senior managers when the company performance measured by sales growth is poor. This is consistent with the view that the dominant shareholder is playing a disciplinary role for Russian companies.

Turnover of a CEO or senior managers could take place when internal conflict occurs between outside shareholders and management. In Russia, company infighting is not an extraordinary case, rather an everyday incident. In fact, 206 or 25.1% of 822 surveyed firms responded that they experienced a harsh internal conflict(s) at least once from 2001 to 2004.[19]

Apparently, the internal conflict is not a random event. Poor company performance, or ownership structure and other company characteristics could trigger the conflict. There is a possibility that the statistical relationship between turnover and other variables is spurious and the conflict could explain the turnover. To check this possibility, we perform additional multinomial PROBIT regressions by including an internal conflict dummy (*INTCON*), in which the value of 1 is assigned to companies that experienced infighting between managers and shareholders in 2001–04, in independent variables.

Table 3.7 shows the results.[20] First of all, we can observe that the log likelihood of Model [M9] is -620.49 in **panel A** of **Table 3.7**, which is much larger than that of Model [M1] (-640.85) in **panel A** of **Table 3.6**. This implies that internal conflict itself has a large explanatory power for our turnover model. Second, although it is not significant at the 5% level in Type I of Model [M9], generally, *INTCON* has positive significant effects on various turnovers. Third, there are not remarkable differences in estimated coefficients of other variables such as *DIVPAY*, *OWNFOR* and *DOMSHA* between the MNP estimations with and without the internal conflict dummy

[19] See page 52 in Dolgopyatova and Iwasaki (2006).

[20] Sample size becomes smaller in Table 3.7 because some companies refused to answer to the question about the occurrence of the internal conflict.

variable. Since it is possible that the estimated coefficients of *INTCON* are biased due to the correlation between this variable and error terms, we should be careful to interpret the results. However, it is safe to say that the relationships between turnover and company characteristics such as corporate performance and ownership structures observed in **Table 3.4** are not spurious due to the effects of the intracompany infighting.

3.6. Concluding Remarks

Although the corporate governance literature provides much empirical evidence of the significant association between corporate performance and CEO turnover in developed countries, the majority of research on Russian firms is quite negative in this respect. The little correlation between two factors may be due to not having a sufficient number of observations of turnover events. It is also possible that the reason of the nonsignificant relation between bad performance and CEO turnover in the prior studies is that the authors implicitly assume that the Russian manner of managerial dismissal is very similar to that in the United States, disregarding the collective nature of the management system in Russian firms, especially in the ex-socialist enterprises.

Using a unique firm-level dataset obtained from our large-scale enterprise survey conducted in 2005, we attempted to deal with the above two problems. The estimation results of the multinomial PROBIT model reported in the previous section strongly suggest that nonpayment of dividends as a proxy of bad corporate performance is significantly correlated with managerial turnover in stark contrast to the standard LOGIT estimation of CEO turnover as the preceding studies do. It is possible that utilizing information of various turnovers simultaneously, we can increase the statistical powers to reject the null hypothesis.

We also find that the presence of a dominant shareholder or foreign investor is another important factor in causing managerial dismissal in Russian corporations. This finding is mostly consistent with the preceding work. However, it is more important to point out from the analytical viewpoint that these two kinds of

shareholders may have different effects on managerial turnover in terms of its magnitude. That might be because there is a perceptible difference in behavioral patterns between Russia and foreign investors. The large shareholding may also play a significant role to inspire dominant shareholders to conduct intensive monitoring over management activities in companies they own. Not simply removing company presidents in response to poor management outcomes, dominant shareholders may utilize human capital in their companies more effectively than minority shareholders including foreign investors do.

At any rate, the presence of the empirical relationship between dividend payment and managerial turnover indicates the growing respect to shareholder wealth in Russia among domestic investors. As the transition to a market economy will go further, we may see more visible change in empirical results of this country even in the near future.

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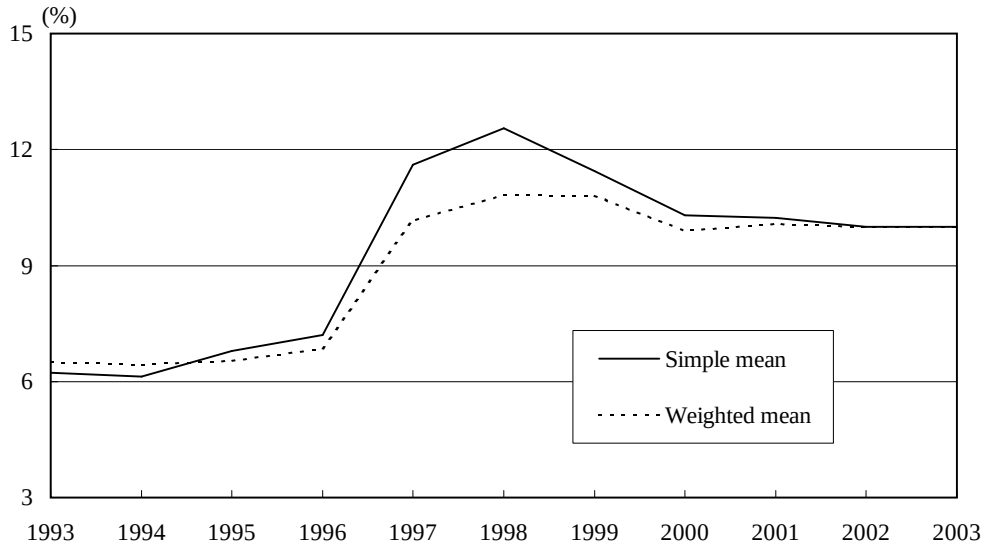
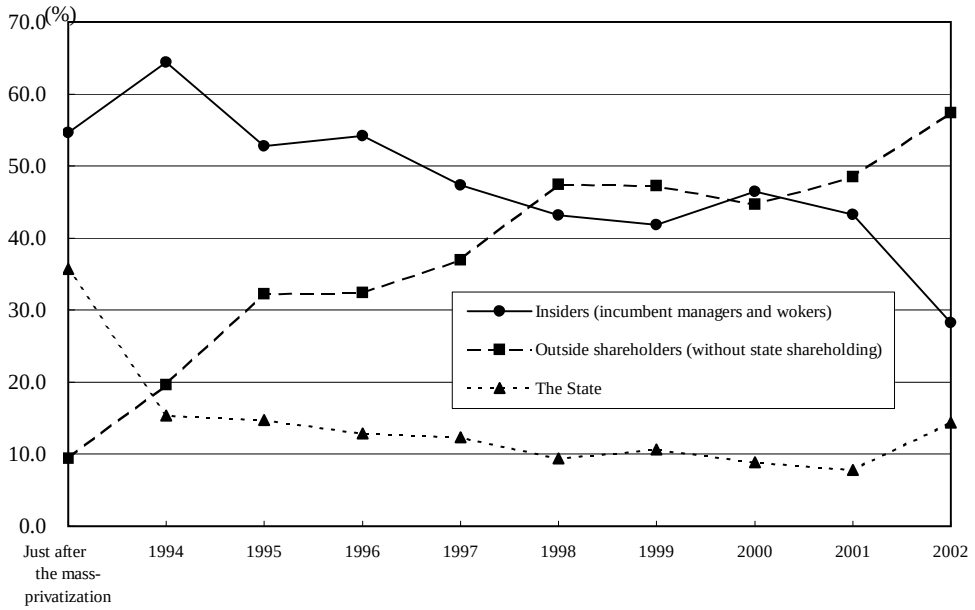


Source: Authors' illustration based on Klepach, Kuznetsov, and Kryuchkova (1996) (covering 66 firms); Linz (1996) (1,714 firms); Filatotchev, Wright, and Bleaney (1999) (314 firms); Filatotchev, Wright, Buck, and Dyomina (1999) (98 firms); Radygin and Arkhipov (2000) (872 firms); Goltsman (2000) (217 firms); Kapelyushnikov (2001) (135 to 156 firms); Rachinsky (2001, 2002) (110 firms); Gurkov (2002) (530 firms); Muravyev (2003a) (413 firms); Dolgopyatova (2003) (523 firms); Dolgopyatova (2004) (20 firms); and Dolgopyatova and Kuznetsov (2004) (328 firms).

Figure 3.1: Changes in CEO turnover frequency, 1993-2003



Source: Authors' illustration. The ownership share of each category of shareholders was calculated basing on the survey results reported in 25 different papers investigated into the ownership structure of industrial firms for various periods. For more details, see Iwasaki (2007).

Figure 3.2: Changes in average ownership share by insiders, outside shareholders and the state in industrial firms, 1994-2002

Table 3.1: Studies of managerial turnover in Russian firms

Paper	Analysis period	Tested interrelations [a]	Empirical method [b]
Barberis et al. (1996)	1992-1993	II	RA (OLS, 2SLS)*
Frydman, Pistor, and Rapaczynski (1996)	1994	I	RA (LOG)
Klepach, Kuznetsov, and Kryuchkova (1996)	1995	II	DS
Linz (1996)	1992-1995	I	RA (PRO)
Filatotchev, Wright, and Bleaney (1999)	1992-1996	I	DS
Filatotchev, Wright, Buck, and Dyomina (1999)	1995-1998	III	DS, RA (LOG)
Basargin and Perevalov (2000)	1994-1999	I	RA (PRO)
Goltsman (2000)	1999	I	RA (PRO, TOB)
Bevan et al. (2001)	2000	I	DS
Kapelyushnikov (2001)	2001	I	DS
Muravyev (2001, 2003a)	1999-2000	I	DS, RA (PRO)
Rachinsky (2001)	1997-2000	II	RA (OLS)
Rachinsky (2002)	1997-2001	I	DS, CS
Dolgopyatova (2003a)	2001	I	DS
Peng, Buck, and Filatotchev (2003)	1995	II	RA (PRO)
Wright et al. (2003)	1997	I	DS
Dolgopyatova (2004c)	2003	I	DS
Dolgopyatova and Kuznetsov (2004)	2001	III	DS
Krueger (2004)	1994-1997, 1999	II	RA (OLS)
Yasin (2004)	2003	III	DS, PS
Kapelyushnikov and Demina (2005)	1995-2003	I	DS, RA (PRO)

Source: Compiled by the authors.

Notes: [a] Each code represents the following: I: Ownership structure and/or corporate performance have an impact on managerial turnover; II: Managerial turnover has an impact on corporate performance and/or restructuring; III: I+II.

[b] Each code represents the following: CS: Case study; DS: Descriptive statistical analysis (t-test of differences in means, ANOVA, etc.); RA: Regression analysis (OLS: Ordinary least squares; 2SLS: Two-stage least squares; PRO: Probit; LOG: Logit; TOB: Tobit; *: Analysis dealing with selection bias for privatized enterprises); PS: Point systems for individual survey items.

Table 3.2: Results from vote-counting analysis of impact of different types of owners and changes in ownership structure on CEO turnover

Type of owner	Number of samples				Composition (%)			
	Significantly negative	Not significant	Significantly positive	Total	Significantly negative	Not significant	Significantly positive	Total
Insiders	2	1	0	3	66.7	33.3	0.0	100.0
Workers	3	1	0	4	75.0	25.0	0.0	100.0
Outsiders	0	2	2	4	0.0	50.0	50.0	100.0
Domestic individuals	0	1	2	3	0.0	33.3	66.7	100.0
Domestic corporations	0	5	2	7	0.0	71.4	28.6	100.0
Financial institutions	0	2	3	5	0.0	40.0	60.0	100.0
Foreign investors	0	2	1	3	0.0	66.7	33.3	100.0
State	2	2	2	6	33.3	33.3	33.3	100.0
Changes in ownership structure	0	0	2	2	0.0	0.0	100.0	100.0

Source : Compiled by the authors based on the preceding studies listed in Table 3.1.

Note : The significance level for the verification was set to the 5% level.

Table 3.3: Regional distribution of surveyed firms and comparison with official statistics on that of business organizations

	Enterprise survey		Official statistics (as of January 1, 2004)	
	Number	Share (%)	Number	Share (%)
Russian Federation	822	100.0	468,841	100.0
Central Federal District	265	32.2	165,453	35.3
North West Federal District	97	11.8	66,452	14.2
South Federal District	71	8.6	51,841	11.1
Privolzhsky (Volga) Federal District	197	24.0	69,767	14.9
Ural Federal District	83	10.1	36,413	7.8
Siberian Federal District	85	10.3	54,741	11.7
Far East Federal District	24	2.9	24,174	5.2

Source: Dolgopyatova and Iwasaki (2006, p.15). Official statistics are quoted to the released data by the Russian Statistical Service.

Table 3.4: Descriptive statistics of independent variables by company group in terms of turnover type

	Observations	*DIVPAY*	*SALGRO*	*OWNFOR*	*DOMSHA*	*COMSIZ*	*OPECOM*
	number (%)	mean (S.D)	mean (S.D)	mean (S.D)	mean (S.D)	mean (S.D)	mean (S.D)
All firms	602 (100.0)	0.392 (0.489)	-0.029 (1.249)	0.364 (1.054)	0.728 (0.446)	6.464 (1.251)	0.688 (0.464)
Firms with turnover of CEO and senior managers (Type I)	68 (11.3)	0.426 (0.498)	-0.132 (1.234)	0.618 (1.350)	0.912 (0.286)	6.802 (1.506)	0.794 (0.407)
Firms with CEO turnover only (Type II)	75 (12.5)	0.280 (0.452)	-0.051 (1.406)	0.693 (1.559)	0.760 (0.430)	6.614 (1.308)	0.667 (0.475)
Firms with turnover of senior managers only (Type III)	107 (17.8)	0.318 (0.468)	-0.149 (1.220)	0.336 (0.941)	0.738 (0.442)	6.393 (1.203)	0.729 (0.447)
Firm with no turnover (Type IV)	352 (58.5)	0.432 (0.496)	0.032 (1.226)	0.253 (0.852)	0.682 (0.466)	6.389 (1.190)	0.659 (0.475)

Source : Authors' calculation.

Table 3.5: LOGIT regression analysis of the impacts of corporate governance and performance on CEO turnover

A. Estimation with industrial effects

Model [a]	[L1]		[L2]		[L3]		[L4]	
	Coef.	dF/dx	Coef.	dF/dx	Coef.	dF/dx	Coef.	dF/dx
COMSIZ	0.1635	0.0283	0.1364	0.0252	0.2266*	0.0404*	0.2600	0.0517
	(1.86)	(1.87)	(1.12)	(1.12)	(2.07)	(2.08)	(1.67)	(1.68)
OWNFOR	0.2594**	0.0449**	0.2621*	0.0484*	0.1926	0.0344	0.2017	0.0401
	(2.95)	(2.95)	(2.42)	(2.43)	(1.79)	(1.79)	(1.56)	(1.56)
DOMSHA	0.7696**	0.1205***	0.3338	0.059	0.8494*	0.1352**	0.3369	0.0642
	(3.05)	(3.45)	(1.11)	(1.16)	(2.45)	(2.83)	(0.82)	(0.86)
OPECOM	0.1221	0.0209	-0.0222	-0.0041	-0.4026	-0.0747	-0.6106	-0.1269
	(0.52)	(0.53)	(-0.08)	(-0.08)	(-1.32)	(-1.28)	(-1.70)	(-1.65)
SALGRO	-0.0033	-0.0006	-0.029	-0.0054				
	(-0.04)	(-0.04)	(-0.30)	(-0.30)				
DIVPAY	-0.3933	-0.0665			-0.6143*	-0.1054*		
	(-1.79)	(-1.84)			(-2.07)	(-2.17)		
Constant	-2.7456***		-2.3804*		-2.5268**		-2.0095	
	(-3.79)		(-2.35)		(-2.75)		(-1.62)	
Industrial dummies	Yes		Yes		Yes		Yes	
N	602		366		337		208	
Log likelihood	-312.4620		-199.5589		-176.4265		-117.0546	

B. Estimation without industrial effects

Model [a]	[L5]		[L6]		[L7]		[L8]	
	Coef.	dF/dx	Coef.	dF/dx	Coef.	dF/dx	Coef.	dF/dx
COMSIZ	0.1714*	0.0299*	0.1417	0.0265	0.2525*	0.0459*	0.2982*	0.0600*
	(2.06)	(2.07)	(1.24)	(1.25)	(2.42)	(2.44)	(2.09)	(2.10)
OWNFOR	0.2443**	0.0427**	0.1970*	0.0369*	0.1888	0.0343	0.1554	0.0313
	(2.92)	(2.92)	(2.00)	(2.00)	(1.86)	(1.86)	(1.33)	(1.33)
DOMSHA	0.7597**	0.1202***	0.3656	0.0653	0.8342*	0.1356**	0.3637	0.0699
	(3.04)	(3.45)	(1.24)	(1.31)	(2.47)	(2.84)	(0.93)	(0.98)
OPECOM	0.1247	0.0215	0.0134	0.0025	-0.3753	-0.0706	-0.5477	-0.1145
	(0.55)	(0.56)	(0.05)	(0.05)	(-1.28)	(-1.24)	(-1.58)	(-1.54)
SALGRO	-0.0072	-0.0013	-0.0388	-0.0073				
	(-0.09)	(-0.09)	(-0.40)	(-0.40)				
DIVPAY	-0.3458	-0.0591			-0.5599	-0.0981*		
	(-1.63)	(-1.67)			(-1.96)	(-2.05)		
Constant	-2.9341***		-2.3375**		-3.0387***		-2.8181**	
	(-5.22)		(-3.16)		(-4.34)		(-3.07)	
Industrial dummies	No		No		No		No	
N	602		366		337		208	
Log likelihood	-315.0965		-203.0402		-179.5852		-119.7881	

Source : Authors' estimation.

Notes : [a] Model [L1] and [L5] are estimated using full sample; Model [L2] and [L6] - firms without dividend payment; Model [L3] and [L7] - firms with lower sales growth than industrial average; Model [L4] and [L8] - firms without dividend payment and with lower sales growth than industrial average.

[b] dF/dx denotes marginal effects of independent variables.

[c] t-values are in parentheses. *, **, and *** denote 5%, 1%, and 0.1% significance, respectively.

Table 3.6: Multinomial PROBIT regression analysis of the impacts of corporate governance and performance on managerial turnover taking its magnitude into consideration

A. Estimation with industrial effects

Model [a]		[M1]		[M2]		[M3]		[M4]	
		Coef.	dF/dx	Coef.	dF/dx	Coef.	dF/dx	Coef.	dF/dx
Firms with turnover of CEO and senior managers (Type I)	*CONSIZ*	0.1338	0.0145	0.1577	0.0043	0.2600*	0.0460*	0.3121*	0.0239*
		(1.57)	(1.35)	(1.29)	(1.08)	(2.42)	(2.43)	(1.98)	(1.97)
	OWNFOR	0.2021*	0.0195	0.1399	0.0025	0.1132	0.0162	0.0523	0.0015
		(2.26)	(1.78)	(1.12)	(0.59)	(0.97)	(0.78)	(0.32)	(0.12)
	DOMSHA	1.0467***	0.1038***	0.5959	0.0133	1.0405**	0.1529***	0.6577	0.0401
		(3.85)	(4.71)	(1.87)	(1.66)	(2.89)	(3.60)	(1.56)	(1.72)
	OPECOM	0.3457	0.0381	0.2900	0.0073	-0.0628	-0.0082	-0.1481	-0.0085
		(1.47)	(1.42)	(0.99)	(0.82)	(-0.20)	(-0.14)	(-0.39)	(-0.27)
	SALGRO	-0.0501	-0.0039	-0.0796	-0.002				
		(-0.64)	(-0.39)	(-0.82)	(-0.60)				
	DIVPAY	-0.1524	0.0061			-0.4162	-0.0611		
		(-0.73)	(0.23)			(-1.49)	(-1.30)		
	Constant	-3.0772***		-3.4906**		-3.6890***		-3.4274**	
		(-4.23)		(-3.20)		(-3.87)		(-2.58)	
Firms with CEO turnover only (Type II)	*CONSIZ*	0.125	0.0157	0.0878	0.0111	0.1127	0.0016	0.1245	0.0053
		(1.50)	(1.29)	(0.75)	(0.55)	(1.02)	(0.40)	(0.80)	(0.55)
	OWNFOR	0.2135*	0.0255*	0.2472*	0.0419*	0.2298*	0.0073	0.2778*	0.0170*
		(2.56)	(2.18)	(2.51)	(2.49)	(2.22)	(1.92)	(2.23)	(2.13)
	DOMSHA	0.3058	0.0169	0.2128	0.0107	0.4554	0.0069	0.3387	0.0142
		(1.44)	(0.58)	(0.80)	(0.23)	(1.53)	(0.75)	(0.90)	(0.72)
	OPECOM	-0.0121	-0.019	-0.0403	-0.0293	-0.4216	-0.0185	-0.4575	-0.0317
		(-0.06)	(-0.59)	(-0.16)	(-0.64)	(-1.47)	(-1.32)	(-1.33)	(-1.20)
	SALGRO	-0.0052	0.0038	-0.0174	0.002				
		(-0.07)	(0.35)	(-0.20)	(0.13)				
	DIVPAY	-0.6183**	-0.0758**			-0.7483**	-0.0217*		
		(-2.95)	(-2.73)			(-2.61)	(-2.25)		
	Constant	-1.8564**		-1.8015		-1.2989		-1.3034	
		(-2.79)		(-1.96)		(-1.50)		(-1.09)	
Firms with turnover of senior managers only (Type III)	*CONSIZ*	0.0217	-0.0049	0.0731	0.0098	0.0649	-0.0005	0.0575	0.000
		(0.27)	(-0.32)	(0.66)	(0.43)	(0.62)	(-0.08)	(0.39)	(-0.00)
	OWNFOR	0.0873	0.0028	0.0678	-0.0005	0.1494	0.0071	0.1633	0.0019
		(0.98)	(0.17)	(0.63)	(-0.02)	(1.39)	(1.09)	(1.21)	(0.97)
	DOMSHA	0.2471	0.010	0.4635	0.0819	0.3400	0.0054	0.8916*	0.0084*
		(1.28)	(0.28)	(1.79)	(1.70)	(1.28)	(0.36)	(2.29)	(2.18)
	OPECOM	0.2267	0.0351	0.3388	0.0734	0.0743	0.0074	0.3108	0.0053
		(1.15)	(0.99)	(1.39)	(1.54)	(0.28)	(0.48)	(0.92)	(1.33)
	SALGRO	-0.0864	-0.0158	-0.080	-0.0162				
		(-1.27)	(-1.23)	(-0.97)	(-0.94)				
	DIVPAY	-0.3824*	-0.0488			-0.4404	-0.0186		
		(-2.05)	(-1.45)			(-1.76)	(-1.29)		
	Constant	-0.9618		-2.3899*		-1.6255		-2.3675	
		(-1.52)		(-2.56)		(-1.84)		(-1.85)	
Industrial dummies		Yes		Yes		Yes		Yes	
N		602		366		337		208	
Log likelihood		-640.8457		-403.6555		-356.3318		-226.3168	

(continuing)

Table 3.6 (continued)

B. Estimation without industrial effects

	Model [a]	[M5]		[M6]		[M7]		[M8]	
		Coef.	dF/dx	Coef.	dF/dx	Coef.	dF/dx	Coef.	dF/dx
Firms with turnover of CEO and senior managers (Type I)	*CONSIZ*	0.1367	0.0157	0.1817	0.0226	0.2653**	0.0353**	0.3724**	0.0534**
		(1.71)	(1.55)	(1.61)	(1.58)	(2.67)	(2.61)	(2.58)	(2.60)
	OWNFOR	0.1769*	0.0164	0.0573	-0.0007	0.0977	0.0029	-0.0161	-0.0191
		(2.08)	(1.56)	(0.51)	(-0.05)	(0.90)	(0.20)	(-0.11)	(-0.89)
	DOMSHA	1.0349***	0.1050***	0.6400*	0.0601	1.0354**	0.1086***	0.7273	0.0611
		(3.88)	(4.80)	(2.07)	(1.90)	(2.97)	(3.48)	(1.78)	(1.26)
	OPECOM	0.3617	0.0389	0.3474	0.0358	-0.026	0.0041		
		(1.60)	(1.49)	(1.26)	(1.08)	(-0.09)	(0.10)		
	SALGRO	-0.0548	-0.0045	-0.0793	-0.0075				
		(-0.71)	(-0.45)	(-0.84)	(-0.61)				
	DIVPAY	-0.1855	0.0009			-0.4471	-0.0302	-0.0601	-0.0072
		(-0.93)	(0.04)			(-1.69)	(-0.87)	(-0.17)	(-0.13)
	Constant	-3.2185***		-3.1155***		-3.5787***		-3.9315***	
		(-5.69)		(-4.08)		(-5.08)		(-4.05)	
Firms with CEO turnover only (Type II)	*CONSIZ*	0.1249	0.0165	0.0625	0.0043	0.126	0.0118	0.127	0.0075
		(1.57)	(1.41)	(0.57)	(0.24)	(1.21)	(0.76)	(0.88)	(0.31)
	OWNFOR	0.2165**	0.0273*	0.2268*	0.0368*	0.2439*	0.0316*	0.2755*	0.0448*
		(2.71)	(2.39)	(2.47)	(2.50)	(2.51)	(2.27)	(2.44)	(2.42)
	DOMSHA	0.2959	0.0169	0.2482	0.0073	0.4315	0.0318	0.3974	0.009
		(1.42)	(0.58)	(0.97)	(0.17)	(1.50)	(0.81)	(1.12)	(0.15)
	OPECOM	0.0038	-0.0191	-0.0270	-0.0323	-0.4069	-0.076	-0.4433	-0.1065
		(0.02)	(-0.60)	(-0.11)	(-0.77)	(-1.51)	(-1.63)	(-1.37)	(-1.69)
	SALGRO	-0.0106	0.0031	-0.0262	0.0015				
		(-0.15)	(0.29)	(-0.30)	(0.10)				
	DIVPAY	-0.5575**	-0.0667*			-0.6544*	-0.0705		
		(-2.78)	(-2.44)			(-2.43)	(-1.93)		
	Constant	-2.0897***		-1.6522*		-1.8712**		-1.8507*	
		(-4.07)		(-2.39)		(-2.84)		(-2.07)	
Firms with turnover of senior managers only (Type III)	*CONSIZ*	0.0042	-0.0088	0.0369	-0.0016	0.0335	-0.0084	0.0691	-0.0073
		(0.06)	(-0.61)	(0.36)	(-0.08)	(0.35)	(-0.44)	(0.52)	(-0.27)
	OWNFOR	0.0794	0.0017	0.0604	0.000	0.1321	0.0144	0.1546	0.0216
		(0.92)	(0.11)	(0.59)	(0.00)	(1.30)	(0.74)	(1.29)	(0.90)
	DOMSHA	0.2102	0.0028	0.4522	0.0633	0.3048	0.0147	0.9392*	0.1439*
		(1.11)	(0.08)	(1.81)	(1.39)	(1.19)	(0.30)	(2.55)	(2.53)
	OPECOM	0.2717	0.0433	0.3561	0.0656	0.1132	0.0431	0.3465	0.1013
		(1.42)	(1.26)	(1.53)	(1.50)	(0.44)	(0.90)	(1.07)	(1.71)
	SALGRO	-0.0836	-0.0151	-0.0799	-0.0135				
		(-1.23)	(-1.17)	(-0.97)	(-0.81)				
	DIVPAY	-0.3925*	-0.0522			-0.4978*	-0.0622		
		(-2.20)	(-1.60)			(-2.08)	(-1.39)		
	Constant	-1.1865*		-1.6296*		-1.2460*		-2.1666*	
		(-2.45)		(-2.46)		(-2.03)		(-2.49)	
Industrial dummies		No		No		No		No	
N		602		366		337		208	
Log likelihood		-651.9376		-417.5589		-372.1353		-241.4160	

Source : Authors' estimation. The base category for estimation is the firms with no turnover (Type IV).

Notes : [a] Model [M1] and [M5] are estimated using full sample; Model [M2] and [M6] - firms without dividend payment; Model [M3] and [M7] - firms with lower sales growth than industrial average; Model [M4] and [M8] - firms without dividend payment and with lower sales growth than industrial average.

[b] dF/dx denotes marginal effects of independent variables.

[c] t-values are in parentheses. *, **, and *** denote 5%, 1%, and 0.1% significance, respectively.

Table 3.7: Multinomial PROBIT regression analysis of the impacts of corporate governance, corporate performance, and internal conflict on managerial turnover taking its magnitude into consideration

A. Estimation with industrial effects

Model [a]		[M9]		[M10]		[M11]		[M12]	
		Coef.	dF/dx	Coef.	dF/dx	Coef.	dF/dx	Coef.	dF/dx
Firms with turnover of CEO and senior managers (Type I)	*CONSIZ*	0.1215	0.0143	0.1344	0.0037	0.2553*	0.0450*	0.2821	0.015
		(1.41)	(1.31)	(1.10)	(0.99)	(2.31)	(2.33)	(1.77)	(1.75)
	OWNFOR	0.1938*	0.019	0.1252	0.0021	0.0865	0.0119	0.006	-0.0007
		(2.15)	(1.70)	(0.99)	(0.55)	(0.73)	(0.57)	(0.04)	(-0.08)
	DOMSHA	1.0020***	0.1020***	0.5356	0.0116	1.0525**	0.1536***	0.6181	0.0267
		(3.65)	(4.48)	(1.66)	(1.53)	(2.88)	(3.59)	(1.44)	(1.62)
	OPECOM	0.3205	0.0367	0.2890	0.0065	-0.083	-0.0116	-0.1296	-0.0054
		(1.34)	(1.32)	(0.96)	(0.78)	(-0.25)	(-0.20)	(-0.32)	(-0.24)
	SALGRO	-0.0608	-0.0046	-0.1005	-0.0023				
		(-0.77)	(-0.45)	(-1.02)	(-0.73)				
	DIVPAY	-0.2193	-0.0006			-0.5205	-0.0772		
		(-1.03)	(-0.02)			(-1.80)	(-1.63)		
	INTCON	0.4005	0.0430	0.5371	0.0134	0.8579**	0.1616*	1.0816**	0.0849
		-1.8800	-1.3900	-1.8600	-1.0900	-2.9400	-2.5100	-2.7600	-1.8700
	Constant	-2.9361***		-3.3167**		-3.7354***		-3.3210*	
		(-3.98)		(-3.02)		(-3.83)		(-2.48)	
Firms with CEO turnover only (Type II)	*CONSIZ*	0.0899	0.0105	0.0647	0.0087	0.1021	0.0012	0.1127	0.0032
		(1.04)	(0.87)	(0.55)	(0.43)	(0.90)	(0.31)	(0.72)	(0.54)
	OWNFOR	0.1987*	0.0223	0.2091*	0.0351*	0.1956	0.0057	0.2273	0.0088
		(2.31)	(1.91)	(2.05)	(2.02)	(1.82)	(1.60)	(1.72)	(1.69)
	DOMSHA	0.2489	0.0094	0.1226	-0.0025	0.4117	0.0049	0.2784	0.0076
		(1.14)	(0.32)	(0.45)	(-0.05)	(1.35)	(0.55)	(0.72)	(0.61)
	OPECOM	-0.008	-0.0151	0.0139	-0.0169	-0.3953	-0.0152	-0.4304	-0.0185
		(-0.04)	(-0.47)	(0.05)	(-0.36)	(-1.31)	(-1.15)	(-1.18)	(-1.03)
	SALGRO	-0.0229	0.0016	-0.0325	0.0004				
		(-0.31)	(0.16)	(-0.37)	(0.02)				
	DIVPAY	-0.7447***	-0.0881**			-0.8779**	-0.0228*		
		(-3.38)	(-3.23)			(-2.93)	(-2.46)		
	INTCON	0.4425*	0.0572	0.4370	0.0597	0.5904	0.0118	0.4476	0.0121
		-2.0900	-1.6800	-1.5800	-1.1000	-1.9600	-0.9300	-1.0700	-0.6000
	Constant	-1.5394*		-1.6151		-1.2402		-1.2142	
		(-2.24)		(-1.71)		(-1.40)		(-1.00)	
Firms with turnover of senior managers only (Type III)	*CONSIZ*	0.0091	-0.0057	0.0426	0.0047	0.0583	-0.0007	-0.0094	0.000
		(0.11)	(-0.37)	(0.38)	(0.20)	(0.55)	(-0.12)	(-0.06)	(-0.41)
	OWNFOR	0.0889	0.0043	0.0596	0.0001	0.1375	0.0068	0.128	0.0004
		(0.99)	(0.25)	(0.55)	(0.01)	(1.26)	(1.06)	(0.92)	(0.79)
	DOMSHA	0.2223	0.008	0.4007	0.0754	0.3498	0.006	0.8595*	0.002
		(1.14)	(0.23)	(1.53)	(1.51)	(1.30)	(0.40)	(2.14)	(1.92)
	OPECOM	0.1707	0.0249	0.3066	0.0643	0.0184	0.0039	0.3163	0.0012
		(0.86)	(0.67)	(1.23)	(1.30)	(0.07)	(0.24)	(0.88)	(1.21)
	SALGRO	-0.0966	-0.0171	-0.098	-0.0195				
		(-1.41)	(-1.30)	(-1.17)	(-1.11)				
	DIVPAY	-0.3858*	-0.0445			-0.4870	-0.0192		
		(-2.03)	(-1.28)			(-1.91)	(-1.35)		
	INTCON	0.1119	-0.0094	0.3562	0.0493	0.5614*	0.0199	1.0681**	0.0061
		-0.5600	(-0.25)	-1.3600	-0.8400	-2.0600	-1.0100	-2.8500	-1.3100
	Constant	-0.7967		-2.1102*		-1.605		-1.9969	
		(-1.23)		(-2.22)		(-1.79)		(-1.54)	
Industrial dummies		Yes		Yes		Yes		Yes	
N		586		358		327		201	
Log likelihood		-620.4855		-394.0279		-339.7735		-213.5993	

(continuing)

Table 3.7 (continued)

B. Estimation without industrial effects

Model [a]		[M13]		[M14]		[M15]		[M16]	
		Coef.	dF/dx	Coef.	dF/dx	Coef.	dF/dx	Coef.	dF/dx
Firms with turnover of CEO and senior managers (Type I)	*CONSIZ*	0.1274	0.0157	0.1600	0.0212	0.2626**	0.0349**	0.3479*	0.0524*
		(1.58)	(1.52)	(1.41)	(1.47)	(2.58)	(2.58)	(2.37)	(2.51)
	OWNFOR	0.1697*	0.016	0.0428	-0.0014	0.0737	0.0008	-0.0619	-0.0233
		(1.98)	(1.50)	(0.38)	(-0.10)	(0.67)	(0.05)	(-0.42)	(-1.08)
	DOMSHA	0.9932***	0.1033***	0.5766	0.056	1.0531**	0.1089***	0.6843	0.0581
		(3.69)	(4.58)	(1.85)	(1.71)	(2.98)	(3.49)	(1.64)	(1.15)
	OPECOM	0.3375	0.0372	0.3627	0.0371	-0.0433	0.0016	-0.0157	-0.0036
		(1.46)	(1.38)	(1.28)	(1.10)	(-0.14)	(0.04)	(-0.04)	(-0.06)
	SALGRO	-0.0622	-0.0048	-0.0957	-0.0091				
		(-0.80)	(-0.48)	(-1.00)	(-0.73)				
	DIVPAY	-0.2435	-0.0049			-0.5526*	-0.0403		
		(-1.20)	(-0.19)			(-2.03)	(-1.18)		
	INTCON	0.3685	0.0409	0.5686*	0.0626	0.8416**	0.0952*	1.0340**	0.1174
		-1.7600	-1.3500	-2.0400	-1.4300	-2.9500	-1.9700	-2.7600	-1.7000
	Constant	-3.1842***		-3.0640***		-3.7258***		-3.9664***	
		(-5.52)		(-3.99)		(-5.11)		(-4.02)	
Firms with CEO turnover only (Type II)	*CONSIZ*	0.0972	0.0122	0.0433	0.0028	0.1182	0.011	0.1137	0.0085
		(1.18)	(1.05)	(0.39)	(0.15)	(1.11)	(0.71)	(0.78)	(0.34)
	OWNFOR	0.2066*	0.0248*	0.1958*	0.0319*	0.2144*	0.0274*	0.2294	0.0401*
		(2.51)	(2.19)	(2.06)	(2.11)	(2.14)	(1.96)	(1.96)	(2.09)
	DOMSHA	0.2453	0.0101	0.1773	-0.0021	0.3973	0.0256	0.3483	0.002
		(1.15)	(0.34)	(0.68)	(-0.05)	(1.36)	(0.65)	(0.97)	(0.03)
	OPECOM	0.0078	-0.0156	0.0229	-0.0221	-0.3844	-0.0683	-0.3857	-0.0988
		(0.04)	(-0.50)	(0.09)	(-0.52)	(-1.36)	(-1.44)	(-1.15)	(-1.50)
	SALGRO	-0.0267	0.001	-0.0355	0.001				
		(-0.36)	(0.09)	(-0.41)	(0.07)				
	DIVPAY	-0.6696**	-0.0781**			-0.7612**	-0.0800*		
		(-3.20)	(-2.93)			(-2.73)	(-2.20)		
	INTCON	0.3955	0.0519	0.3937	0.0379	0.6023*	0.0468	0.4851	-0.0088
		-1.9000	-1.5500	-1.4600	-0.7900	-2.0800	-1.0000	-1.2500	(-0.14)
	Constant	-1.9780***		-1.5935*		-1.9202**		-1.8350*	
		(-3.72)		(-2.29)		(-2.84)		(-2.02)	
Firms with turnover of senior managers only (Type III)	*CONSIZ*	-0.0072	-0.0098	0.0094	-0.006	0.0226	-0.0102	0.0181	-0.018
		(-0.09)	(-0.66)	(0.09)	(-0.29)	(0.23)	(-0.52)	(0.13)	(-0.63)
	OWNFOR	0.0786	0.0025	0.050	-0.0001	0.1154	0.0134	0.1116	0.0162
		(0.91)	(0.15)	(0.49)	(-0.01)	(1.12)	(0.67)	(0.91)	(0.66)
	DOMSHA	0.1881	0.001	0.4046	0.0591	0.3159	0.0189	0.9066*	0.1421*
		(0.99)	(0.04)	(1.60)	(1.26)	(1.22)	(0.38)	(2.41)	(2.41)
	OPECOM	0.2268	0.0353	0.3321	0.0581	0.0797	0.0359	0.3833	0.1043
		(1.17)	(0.99)	(1.40)	(1.29)	(0.30)	(0.71)	(1.13)	(1.70)
	SALGRO	-0.0917	-0.0161	-0.094	-0.0156				
		(-1.34)	(-1.22)	(-1.13)	(-0.93)				
	DIVPAY	-0.3939*	-0.0481			-0.5402*	-0.065		
		(-2.17)	(-1.43)			(-2.23)	(-1.42)		
	INTCON	0.0812	-0.0131	0.3315	0.0305	0.5905*	0.0673	0.9755**	0.1546
		-0.4200	(-0.35)	-1.3000	-0.5700	-2.2300	-1.1900	-2.7700	-1.9000
	Constant	-1.0762*		-1.4677*		-1.2624*		-2.0271*	
		(-2.19)		(-2.20)		(-2.02)		(-2.28)	
Industrial dummies		No		No		No		No	
N		586		358		327		201	
Log likelihood		-631.8927		-408.1288		-355.3182		-229.6789	

Source : Authors' estimation. The base category for estimation is the firms with no turnover (Tyoe IV).

Notes : [a] Model [M9] and [M13] are estimated using full sample; Model [M10] and [M14] - firms without dividend payment; Model [M11] and [M15] - firms with lower sales growth than industrial average; Model [M12] and [M16] - firms without dividend payment and with lower sales growth than industrial average.

[b] dF/dx denotes the marginal effects of the independent variables.

[c] t-values are in parentheses. *, **, and *** denote 5%, 1%, and 0.1% significance, respectively.