

Libman, Alexander

**Working Paper**

## Words or deeds - what matters? Experience of recentralization in Russian security agencies

Frankfurt School - Working Paper Series, No. 148

**Provided in Cooperation with:**

Frankfurt School of Finance and Management

*Suggested Citation:* Libman, Alexander (2010) : Words or deeds - what matters? Experience of recentralization in Russian security agencies, Frankfurt School - Working Paper Series, No. 148, Frankfurt School of Finance & Management, Frankfurt a. M.

This Version is available at:

<https://hdl.handle.net/10419/39662>

**Standard-Nutzungsbedingungen:**

Die Dokumente auf EconStor dürfen zu eigenen wissenschaftlichen Zwecken und zum Privatgebrauch gespeichert und kopiert werden.

Sie dürfen die Dokumente nicht für öffentliche oder kommerzielle Zwecke vervielfältigen, öffentlich ausstellen, öffentlich zugänglich machen, vertreiben oder anderweitig nutzen.

Sofern die Verfasser die Dokumente unter Open-Content-Lizenzen (insbesondere CC-Lizenzen) zur Verfügung gestellt haben sollten, gelten abweichend von diesen Nutzungsbedingungen die in der dort genannten Lizenz gewährten Nutzungsrechte.

**Terms of use:**

*Documents in EconStor may be saved and copied for your personal and scholarly purposes.*

*You are not to copy documents for public or commercial purposes, to exhibit the documents publicly, to make them publicly available on the internet, or to distribute or otherwise use the documents in public.*

*If the documents have been made available under an Open Content Licence (especially Creative Commons Licences), you may exercise further usage rights as specified in the indicated licence.*

**Frankfurt School – Working Paper Series**

**No. 148**

**Words or Deeds – What Matters?  
Experience of Recentralization in  
Russian Security Agencies\***

by Alexander Libman



**Frankfurt School of  
Finance & Management**  
Bankakademie | HfB

Sonnemannstr. 9–11 60314 Frankfurt am Main, Germany  
Phone: +49 (0) 69 154 008 0 Fax: +49 (0) 69 154 008 728  
Internet: [www.frankfurt-school.de](http://www.frankfurt-school.de)

## Abstract

The paper discusses the relative importance of the “real” political actions versus the changes of symbolic nature in the bargaining over devolution, studying the case of personnel decentralization in security agencies in Russia in 2000-2007. While in the 1990s under Boris Yeltsin regional branches of federal ministries in Russia were mostly captured by regional governors, allowing them to pass acts directly contradicting federal law, in 2000s the administration of Vladimir Putin gradually replaced the heads of regional branches by new bureaucrats, supposedly without any connections to the region. The results differ for different security agencies; however, the paper finds, surprisingly, that in several cases the appointment decisions were robustly influenced rather by symbolic gestures made by regional governments in the earlier bargaining process than by the actual devolution policies of the regions.

Key words: devolution, bargaining, transition economies

JEL classification: D78, H77, P26

ISSN: 14369753

Contact:

Prof. Dr. Alexander Libman  
Assistant Professor International Political Economy  
East-West Centre for Business Studies  
and Cultural Science  
Frankfurt School of Finance and Management  
Sonnemannstraße 9-11  
60314 Frankfurt am Main, Germany

Email: a.libman@fs.de

\* I am grateful to Henrik Jordahl, Guido Friebel, Vladimir Gel'man, Vladimir Kozlov, Anastassia Obydenkova, Toke Aidt and Carsten Herrmann-Pillath for helpful suggestions. The paper was presented at the Goethe University Frankfurt and at the Institute of Economics of the Russian Academy of Sciences in December 2009, at the Frankfurt School of Finance, at the European University in St. Petersburg in February 2010 and at the European Public Choice Society conference in Izmir in April 2010. I would like to thank the seminar participants for important comments and criticisms. All mistakes remain my own.

## Content

1	Introduction.....	4
2	Informal decentralization in Russia .....	6
3	Data and econometric strategy.....	11
4	Main results.....	15
4.1	Ministry of Interior .....	15
4.2	Prosecutor’s Office .....	22
4.3	Federal Security Service.....	23
4.4	Preliminary conclusions .....	24
5	Extensions and robustness checks .....	24
5.1	Initial level of regional bias .....	24
5.2	Crime rates and appointment policies .....	29
5.3	Interaction between words and deeds.....	30
5.4	“Red Belt” and appointment decisions.....	35
5.5	Federal transfers .....	35
5.6	Stability of governors .....	36
5.7	Alternative measures for the resources.....	37
5.8	Power-sharing treaties and alternative measures of the “deeds” and “words” .....	38
5.9	Electoral considerations.....	39
6	Conclusion .....	41
	Literature .....	45

# 1 Introduction

The games of devolution and secession are rarely simply an issue of the distribution of economic resources and rents, as it is assumed in most economic models, starting from the seminal paper of Buchanan and Faith (1987). In fact, politicians seem to pay even a greater attention to “symbolic” gestures in negotiations – for example, public declarations of independence and sovereignty or re-naming local political institutions to resemble those of “mature” nations - than to real re-allocation of control. In many cases “hidden” redistribution of power is tolerated by the central government, but open opposition is suppressed with brute force – although there are no changes in terms of economic resources and authorities. Stated otherwise, ego-rents outweigh “measurable” economic resource in these conflicts. It may take extreme proportions: for example, mainland China invests significant effort to prevent the “formal” secession of Taiwan (i.e. declaration of its independence from the Republic of China) – although one can hardly expect this hypothetical event to make a significant difference in terms of Beijing’s ability to influence the decisions made in Taipei. The importance of symbols may be one of the reasons why political conflicts between the central government and the regional administrations are systematically associated with significant costs in terms of resources, but also often human lives. Abbink and Brandts (2007) show in an experimental paper that in an environment where an arrangement between the central and the regional governments exists, which should prevent violent and costly conflict, subjects still act in a way resulting in substantial amount of fighting.

However, while the importance of symbols and emotions in the secession and decentralization cases is hardly in dispute, their relative importance as compared with the “calculable” gains from resources and power is extremely difficult to study empirically. Young (2004) demonstrates that discussion of secessions often either over-value the “economic reasoning” underlying these conflicts, or “give up” by describing secessions as products of emotions and passion. The relative importance of “real world policies” and “symbolic gestures” as reasons for fighting the secession is in dispute even in the well-studied secession conflicts, like the American Civil War (see Liscow, 2007, for the literature review). This paper makes an attempt to empirically differentiate between the effects of these different motives in the decentralization bargaining, looking at the re-centralization in the Russian Federation under the president Vladimir Putin and using a unique dataset on personnel of regional branches of Russian security agencies from 2000 to 2007.

Since its very establishment in 1991, Russia developed as a dual federation: functions reserved to federal government, but requiring presence of the central officials in the regions, were implemented by the regional branches of the federal agencies rather than delegated to regional governments (similar to the US and different from the German “cooperative” model). Hence, most Russian ministries and governmental bodies exhibit also a large network of regional offices. Nevertheless, during the 1990s a common problem of these structures has been the “capture” of branches of federal agencies by regional governments: officials of the federation were poorly paid and weakly supported by the center, and at the same time remained in a particular region for decades, thus providing excellent opportunities for regional governors to establish informal relations by providing benefits and protection – as it has, in fact, been practices even in the Soviet Union of the post-Stalin era. Vladimir Putin after his election to the

presidency in 2000, considered his priority objective to “clean up” this patronage system, partly by replacing the officials from the regions by new appointees, usually with very limited connection to their new territories.

The paper looks at the outcomes of this policy, focusing on probably the most sensitive part of governmental functions in Russia – police and internal security service. These structures are especially important in order to maintain the territorial integrity of the federation – a problem which has been considered as non-trivial during the first decade after the collapse of the Soviet Union and an often claimed priority for the Putin’s administration. In particular it tests whether federal government (or, in the case, presumably, mostly Vladimir Putin himself) by their decisions focused rather on *public claims* the regions made about their desire to achieve higher autonomy or by the real *actions* of the regional governments. The results are mixed and depend upon the security agency in question; however, for at least one of three agencies studied I find strong evidence that the public claims had a significant impact on personnel decision making even after controlling for real actions, while the latter turn out to be insignificant. Paraphrasing the title of the paper, words matter more than deeds. The result seems to be robust to model specification and estimation method.

The paper is to our knowledge the first attempt to explicitly contrast the role of symbolic actions and real re-allocation of resources in a game of secession using econometrical evidence rather than case studies or experiments. In a way, the paper contributes to the growing literature on the determinants of decentralization in the economics of federalism (e.g. Pannizza, 1999; Arzaghi and Henderson, 2005; Feld et al., 2008); however, unlike almost all papers in the literature, its reasoning is driven by the attempt to explain rather the “supply” of autonomy by the federal center than the “demand” of the regional governments. It is well-known that decentralization in federations has a variety of aspects, which may or may not correlate to each other (Blume and Voigt, 2008). One almost always ignored aspect of decentralization relates to the ability of central government to control regional governors. However, treating this dimension seriously can often result in complete re-evaluation of the decentralization practices: for example, unitary states may turn out to be extremely decentralized (if the central government is weak or strategically prefers limited intervention in the regional affairs), or, on the contrary, strict control over appointment policy can effectively counteract formal decentralization. This is exactly what has been shown in the to our knowledge unique examination of informal appointment practices in the context of decentralization by Sheng (2007), who looks at the appointment of Chinese provincial governors – which, however, did not look at the possible differences between “words” and “deeds” as this paper does. Bai et al. (2008) also discuss this issue of a “bureaucratic integration” in China, but in a different framework, where the focus is the market integration and not the determinants of decentralization. In addition, one could relate our results to a larger problem of the impact of non-credible threats on political bargaining, as it will be discussed in what follows.

The paper is thus organized as follows. In the next section I discuss the institutional setup of this study and also specify the empirical design. The third section provides an overview of the data and econometric strategy of this paper. The fourth section reports the results. The fifth section looks at a number of extensions and robustness checks. The last section concludes.

## 2 Informal decentralization in Russia

The development of the Russian Federation in the 1990s can be summed up by two contradicting trends. On the one hand, the structure of Russian fiscal and regulatory federalism established in the early 1990s implied the creation of a highly centralized federation. Federal government had an almost unique authority over collection of taxes and decisions regarding tax rates and bases; in most areas of regulation regional administrations were restricted by detailed federal standards, which were to be implemented by regional branches of federal services. At the same time, the weakness of the central government allowed the regions to implement a variety of measures of *informal decentralization*, resulting in de-facto shift of fiscal revenue and regulatory power in favor of regional governments. Probably, the most notorious example of this policy was the so-called “war of laws”: regional parliaments and governors issued their own acts in a variety of areas of regulation, directly violating federal law (Polishchuk, 2001). In order to implement this regional legislation, control over courts and police was required; however, these agencies remained de-jure part of the federal administration. Hence, it was publicly perceived that regional governments attempted to “capture” federal agencies by establishing informal ties with their directors and providing additional benefits (e.g. housing assistance) (Enikolopov et al., 2000). Since most regional governments indeed managed to set up a large portion of acts contradicting federal law without any interventions from the federation, see *Figure 1*.

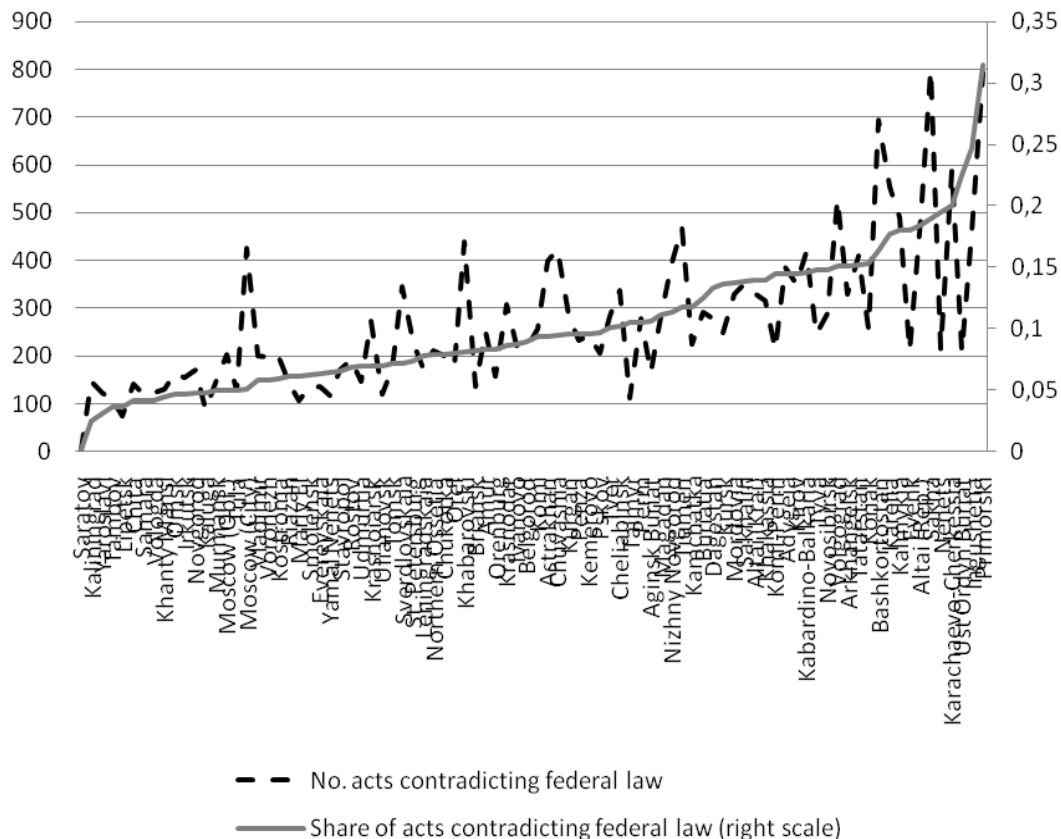


Figure 1: War of laws in the Russian Federation

Source: Ministry of Justice, 2006

The conformity of regional law to federal legislation, as well as capture of regional branches of federal agencies have been unequally distributed over the territory of the Russian Federation. While some regions experienced stronger de-facto devolution, others (as *Figure 1* clearly demonstrates) preferred less “aggressive” attitude towards the federal government. It seems plausible to expect these differences to be a function of bargaining power of individual regional governors vis-à-vis federal center. In fact, the 1990s have been a well-documented period of a “bargaining federalism” in Russia: most decisions on regional and federal level became subject to bilateral bargaining between individual federal agencies and regional administrations (Solnick, 2002). One can indeed show that the number and share of acts contradicting federal law are positively correlated with the factors representing bargaining power of regional governments (Libman, 2010).

This informal decentralization in the Russian Federation became one of the major concerns for the government of Vladimir Putin, which replaced the weak regime of Boris Yeltsin in 2000. In particular, two sets of measures (among other reforms, which seem to be less relevant in the context of this paper, but basically supported shift of the power towards the federal center from the regional governors) were implemented. First, Putin called for preparing an “inventory” of regional legislation in order to find out its conformity with the federal law. The task was originally assigned to a special committee, but was later transferred to the Ministry of Justice. During the first half of the 2000s the federal government was able to establish the so-called Federal Register (*federal’nyi registr*), or catalogue of regional acts (both of the legislatures and of executive bodies, but incorporating legal norms). The catalogue included both norms in power and invalid acts of regional administration, and categorized them as “conforming” and “non-conforming” with the federal law (according to the decision of the experts of the Ministry). Based on this information, Putin initiated a number of lawsuits aiming to remove at least the most obvious violations of federal law; in fact, a number of decisions of the Constitutional Court and other courts, as well as continuing pressure on regional governments indeed allowed his administration to close the gap between federal and regional law (Ross, 2003; Kahn et al., 2009).

The second part of the reform agenda included the systematic changes in the personnel policy for regional branches of federal agencies. In particular, Putin supported a much stronger monitoring of regional part of federal bureaucracy by central agencies, as well as gradually replaced the heads of the federal agencies in the regions. A probably most suitable example is the federal Ministry of Interior (which is in Russia responsible for police): in 2001 it changed the heads of its regional branches in 7 regions; in 2002 it were 13 regions, in 2003 25 regions and in 2004 22 regions. The appointments supposedly focused on replacing people with long-term connection to the region (often working there for decades or even coming from this region originally) by people without close ties to the territory – and therefore supposedly less likely to be captured by regional governments (Voronov, 2005). However, the appointment policies differed significantly in various regions: while in some cases presidential administration preferred a prompt and radical solution, other directors of regional agencies maintained their position.

It is possible to hypothesize that the appointment decisions could be driven by one of two contradicting approaches. On the one hand, it seems to be reasonable to appoint bureaucrats with limited local connections to potentially more “dangerous” regions with strong bar-



gaining power. In this case federal administration receives an opportunity to exercise stronger control over regional legislation in territories where regional governments are especially powerful and hence prone to implementing their own policies. However, on the other hand, there are reasons to be more cautious in appointment decisions influencing these influential regions with strong governors able to offer resistance to new officials on both regional and federal level – in particular, absence of cooperation of regional government could become a major problem for any federal agencies operating in the region; moreover, these strong governors usually also have significant influence on federal arena, which certainly increased during the Putin’s rule, but never became equal to zero. It should be noted that the power of governors has been often based on strong connection to major business groups in the region, as well as (at least in the most influential cases) indirect and even direct control over attractive assets. Hence, federal government could prefer “pacifying” these regions by either maintaining old personnel or replacing old bureaucrats with the new officials, which still had strong ties to the regions. On the other hand, in order to justify the publicly announced program of supporting the “unity of the legal space” of Russia, federal government could become much more aggressive by appointing officials in regions with lower bargaining power and weaker governors.<sup>1</sup>

Anyway, the appointment decisions of the Putin’s administration provide me with a unique opportunity to study the impact of symbolic gestures and real policies – i.e. “words” and “deeds” - on the political decision-making, as well as to generally analyze the logic of “appointment decentralization” in federations with strong hierarchical structures. In this paper I use a unique dataset of Petrov (2009) based on biographies of the heads of main Russian security agencies in the regions. The dataset contains observations for almost all Russian regions for two points of time: January 2000 (the first month of Putin’s presidency<sup>2</sup>) and July 2007, towards the end of the second term of Putin, when the personnel re-appointment wave was almost completed. The dataset includes three types of agencies in the most “sensitive” area of Russian politics, which is undoubtedly security:

- Ministry of Interior: as mentioned, in Russia this institution has the functions of a “ministry of police”;
- Office of the Prosecutor (*prokuratura*), which is entrusted not only with prosecution in courts on behalf of the state and supervision of the observance of law, but also had (until recently and throughout the period of the study) its own criminal investigation division, and
- Federal Security Service (*FSB*), which is the main domestic security agency responsible for counterintelligence, counter-terrorism, anti-corruption and organized crime affairs.

---

<sup>1</sup> These two logics of behavior: punishing vs. pacifying the influential regional governors – have already been extensively studied for the logic of fiscal transfers of the Yeltsin government, however, different papers provide support for different results (Treisman, 1996; 1998; Popov, 2004; Jarocinska, 2004).

<sup>2</sup> Putin as the prime minister became president of Russia after Yeltsin resigned on December 31, 1999, since according to the Russian constitution in case of resignation of the president prime minister accepts this office for a limited period of time before new elections. The elections were held in March 2000.

Each observation (which is the head of a particular service in one of the Russian regions either in 2000 or in 2007) is coded from 0 to 3, according to the relation to the region:

- 0: no connection to the region of any kind before the current appointment;
- 1: weak connections to the region;
- 2: born in the region, but mostly with working experience outside the region;
- 3: born in the region with long-term working experience in the region.<sup>3</sup>

Hence, it is possible to quantitatively assess the changes in the Putin's personnel policy for regional branches of federal bureaucracy throughout his presidency period. In what follows I will refer to this index as "**regional bias**" for the federal officials.

In order to measure the "symbolic" activity of the regional governors I use the *index of declarations of regional elites* developed by Dowley (1998). The index is based on the systematic account of public events where regional governors participated in; each event is coded from 1 to 5 depending upon the degree of autonomy claimed by the regional governor on this particular occasion (where, for example, 5 stands for pursuit of independence from the federation, and 1 for opposition to federal arrangement of any kind and call for unitarism). The index is calculated for the period of 1991-1995 for all Russian regions. Given the time lag between the calculation of the index and the Putin's appointment decisions, one can, on the one hand, avoid the reverse causality (and hence be sure that the endogeneity problem is irrelevant if all necessary controls are in place), and on the other hand, be sure that the federal government observed the information before the re-appointment decisions were made.

As a measure of *de-facto policies* I take the *share of acts contradicting federal law in total number of acts passed in the region*, as it is reported by the Ministry of Justice in the Federal Register and applied by Libman (2010). It seems to be straightforward that this variable represents the "real" policy implemented by the region in order to achieve higher autonomy from the federation. Moreover, one can be sure that in this case regional autonomy is not simply based on exercising its residual power, when federal government is not interested in regulating the particular area, but implies direct violations of the regulatory environment deliberately set by the federal administration. Once again, since the Ministry mostly catalogued acts of regions in the 1990s, and after 2000s the conformity of regional legislation with the federal law was ensured, the reverse causality problem seems not to be present (although in this case it is technically less straightforward, since the Register was created when Putin already became president during a couple of years, when old acts were included in the list alongside with the new ones). Moreover, by construction (based on the information from the Ministry of Justice) one can be sure that the *de-facto policies* were *observed* by the federal government alongside with the public claims of the early 1990s, and hence could be taken into consideration.<sup>4</sup>

---

<sup>3</sup> Since the typical mobility in the Russian bureaucratic hierarchy has been unidirectional and goes from the regional administration to Moscow, and not between regions or from Moscow to the region, it has been (before Putin's reforms) relatively unlikely for a person not born in the region to work there for a long time.

<sup>4</sup> It is possible to question whether the most appropriate measure is the share of contradicting acts, and not their number. However, as Libman (2010) shows, both variables are driven by virtually the same factors, except for

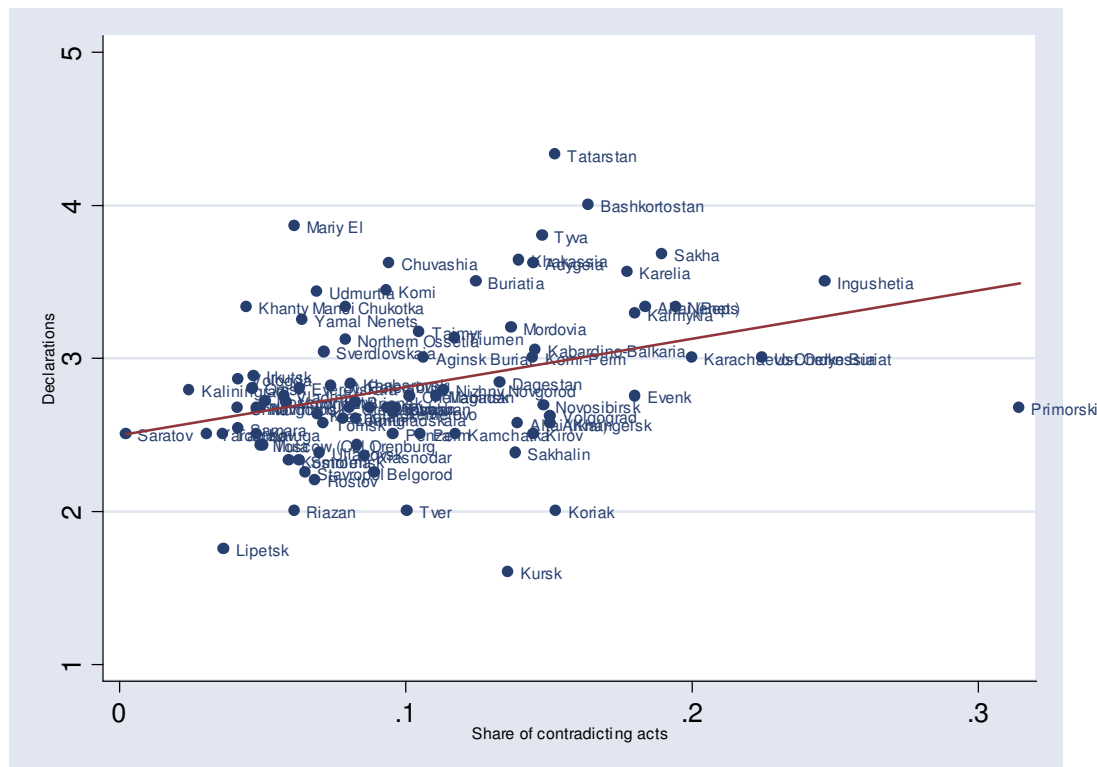


Figure 2: Declarations of elites and de-facto policies

The relation between symbolic gestures and de-facto policies is in fact non-trivial. On the one hand, under Yeltsin the weak federal government aimed to form coalitions with regional governors, thus probably exchanging possibilities of the de-facto devolution for loyalist rhetoric (see Treisman, 1999). From this point of view, one could expect that the regions which are not so active in terms of making public claims in fact are “allowed” to pass a higher fraction of acts contradicting the federal legislation – or, on the other hand, that the public support of the president could be rewarded by providing benefits to governors, also in terms of “free hands” in the legislation (but also, maybe, federal grants and subsidies or higher quotas in state-owned resource enterprises and access to privatized assets). Then one could expect a negative correlation between these two variables. On the other hand, it is also possible that the share of legislation contradicting federal law represents the divergence in the preferences between the region and the federation in total, as well as the public activity – then a positive correlation becomes possible. A simple graphical representation suggests that the de-facto policies and symbolic gestures are weakly positively correlated with each other (see Figure 2) – as one probably could expect; however, this effect vanishes if additional controls are taken

the correlation between number of contradicting acts and population – which, in fact, is simply an outcome of the overall strong positive correlation between law-making activity and size of the population of Russian regions.

into account (Libman, 2010).<sup>5</sup> What is particularly important for me is that the correlation between these two variables is not high enough, and hence, they can be treated as separate determinants of Putin's re-appointment policies, which are at the core of this paper.<sup>6</sup>

### 3 Data and econometric strategy

The basic regression implemented in the paper is very simple: I regress the change of the index of "regional bias" for directors of regional branches of three federal agencies between 2000 and 2007 on the measure of public statements, measure of de-facto policies and a set of controls potentially relevant for the federal decisions on personnel appointment. Given the nature of data, I calculate a cross-section for more than 80 Russian regions.<sup>7</sup> The dependent variable is calculated as regional bias index of 2007 minus regional bias index in 2000; hence, it is smaller if a bureaucrat with strong ties to the region was replaced by a bureaucrats without any connection to the region (more "centralized" control over regional bureaucracy) and vice versa. A positive sign of covariates in the regression indicates that increase of this particular determinant leads to establishment of weaker federal control over region and vice versa. The dependent variable can be both negative (for example, if a bureaucrat with strong ties to the region – value of index 3 – was replaced by an external official – value of index 0) and positive. However, on average the variable is -1.3 for police, -0.4 for federal security and -0.7 for prosecutors (see *Appendix A* for descriptive statistics), suggesting that the federal government rather increased its control over regional branches.

---

<sup>5</sup> It should be noted that both measures are not without caveats. As for the "deeds" variable, I cannot distinguish between different areas of legislation, although some of them may be more important for the bargaining agents than the other. As for the "words" variable, I do not know exactly the media used to communicate their resolve by the regional governors, as well as cannot control for the "amount of communication", i.e. not just "what was said" but also "how often and how much", although it could also matter. However, even under these restrictions, the indicators seem to be of use for the purpose of this paper.

<sup>6</sup> A particular advantage of the case used in this paper is that the action and the reaction in the political bargaining process are separated by a relatively long time period of several years. Usually it is difficult to clearly identify the actions of political actors, since they happen roughly at the same time and the bargaining process is intransparent – so that only the results, and not the moves of the players are observed. It is particularly true for non-democratic regimes.

<sup>7</sup> Russian Federation included 89 regions in 2000 and 83 regions in 2007, since some of the territories were merged with others. Hence, in some cases regions ceased to exist in 2007 and no difference of the index of regional bias can be calculated. One should note that mergers usually were rather "acquisitions" of a smaller region by its larger counterpart – hence, for the larger region index is available in 2000 and 2007. Moreover, I exclude Chechen Republic (a standard procedure for Russian data); in few cases I am forced to exclude regions due to the availability of data.

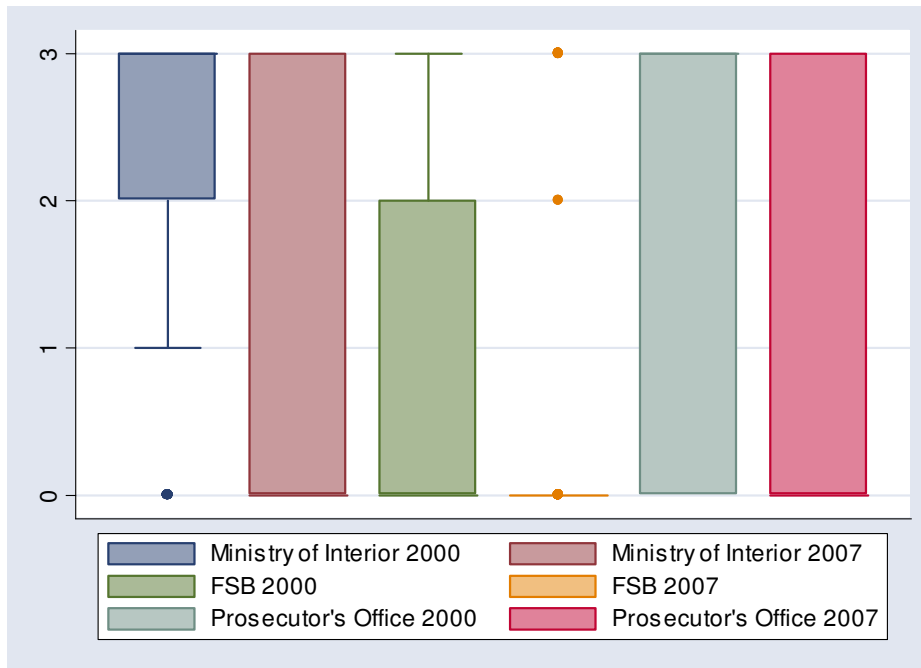


Figure 3: Box plot for regional bias index

Nevertheless, the changes seem to be different for different security agencies. *Figure 3* provides a box plot for the regional bias values before and after Putin's personnel policy. One can clearly see that for the Ministry of Interior originally most federal officials had at least some connection to their region before Putin's reforms, after reforms the median bureaucrat does not have any connection to the region, but the share of those with connections to the regions is still substantial. For the Federal Security Service FSB the regional bias was substantially smaller in 2000; in 2007 no smooth distribution could be derived. Finally, for the Prosecutor's Office the variation was significant both before and after Putin's reforms. Interestingly enough, change in regional bias for three agencies is uncorrelated at 5% significance level, and therefore reappointments seem to be relatively independent of each other (thus, one can exclude the option of "hostage exchange", when, say a FSB head loyal to the federal government is accepted in exchange for local prosecutor). The absolute level of regional bias in 2007 is uncorrelated as well, in 2000 I find significant and positive correlation only for the Prosecutor's Office and Ministry of Interior (thus, while these two agencies may have developed in a similar way, FSB seems to have a different pattern even before Putin's reforms).

Given the nature of the dependent variable, I estimate ordered logit regressions and check for proportional-odds assumption using an LR test; as an additional robustness check OLS regressions are estimated. For OLS I also check for normal distribution of residuals using Jarque-Bera test; if it is significant I exclude the outliers until the normality hypotheses cannot be rejected, and analyze effects which remain robust after this procedure. For ordered logit, if the proportional odds assumption is violated, I estimate generalized ordered logit, and use for the interpretation the marginal effects at the mean of the sample and, once again, in-

interpret only results which remain robust after this procedure. The estimations are done for each individual agency.

The right-hand side variables include, as noticed: (a) the index of declarations of regional governors; (b) the share of acts contradicting federal law in regional legislation and (c) a variety of other controls. These control variables include:

- Measures of secessionist potential of the region – whether the territory could be considered a candidate for seceding for the federation. In order to account for this factor, I use three variables: (a) distance between the regional capital and the City of Moscow; (b) dummy for the border regions and (c) share of ethnic Russians in the total population of the region;
- Economic potential of the region, which could influence its bargaining power potential (which can be implemented in negotiations with federal government and therefore influences its decisions): I use, once again, three indicators: (a) size of the regional territory; (b) size of its population and (c) share of oil and gas extraction in the region in the total extraction in the Russian Federation.
- Legal status of the region: Russian Federation “inherited” from its Soviet past regions with slightly different status. In particular, some of the constituents of the Russian Federation (with a significant portion of ethnic non-Russian population traditionally residing there) have the status of “republics”; although the current constitution proclaims equal rights of all regions, republics de-facto often claim a higher degree of autonomy and influence in federal affairs. Hence, I include a dummy for republics to check for this effect.
- Political regime of the region: it is possible that the appointment policy reacted rather to the desire to restrict the development of “isles of democracy” (or, on the contrary, suppress regional authoritarianism) than to bargaining power. Hence, I include an index of democracy developed by Moscow Carnegie Center and based on expert opinion.
- An additional variable is a dummy for the Northern Caucasus region. The reason for this special treatment is the “Chechnya factor”: Northern Caucasus has been treated (at least, informally) as a territory of special concern from the military point of view, what has to manifest itself in the appointments in security agencies (which also partly have been involved in open warfare in Chechnya in the 1990s, like the Ministry of the Interior, and still often engaged different military opponents in the 2000s). Thus, appointments in this small group of regions can be guided by a different factor than in the rest of the Russian Federation.

For all time-varying repressors I take the average between 2000 and 2006; this is mostly unproblematic because of limited changes in the values over time. One can clearly see that almost all variables included in the regressions are not subject to reverse causality (either by construction, or – as in case of population – due to relatively high stability of values). It is slightly more difficult with the index of democracy, but even this variable usually exhibits

relative stability over time and therefore the endogeneity problem is unlikely.<sup>8</sup> In the extensions I will also add a number of variables to the regression, which may be more susceptible to the problem of the endogeneity.

Moreover, I estimate a specification where I also add an index of power of regional governor in 1995-2000 (Jarocinska, 2004), which may in fact have influence the federal decision – once again, one can assume exogeneity by construction of the index. The index, on the one hand, may be considered the most “straightforward” form to measure bargaining power of the regions (as opposed to indirect characteristics described above). On the other hand, however, power index can also be treated as a measure of *de-facto policies* (similarly to share of contradicting acts), i.e. policy outcome rather than endowment (bargaining potential). Hence, any significant impact of this variable allows for multiple interpretations.<sup>9</sup>

Finally, I look at an additional specification of the regression. The decision of the federal government may as well be influenced not only by the characteristics of the region, but simply by the “degree of involvement” of federal bureaucrats in this region with the regional administration. Stated otherwise, “initial level” of regional bias may be significantly influencing the decisions of government. So, I estimate regressions where I add initial level of index in the year 2000 to the covariates. These regressions are reported in the *Appendix B*.

To conclude, there are three main research issues I have to look at while doing the inference. First, the main question of this paper is whether the “words” or (or, possibly, and) the “deeds” matter for the re-centralization. Hence, I look at the significance of both respective variables, in particular if they both are included in the regressions. Second, the *sign* of significant control variables is able to show, whether the federal government was rather interested in restricting the activities of the strong regions, or in fact concentrated on the weak regions, thus creating a public impression of a re-centralization campaign, but not really involving itself in conflicts with strong governors. If the sign is positive, the federal government was more cau-

---

<sup>8</sup> Nevertheless, in order to check for the impact of potentially endogenous controls, I re-estimated all regressions of the Tables 1-3 (as well as all regressions of Appendix B) excluding democracy. There are virtually no changes for the Ministry of Interior. For the Federal Security Service *Table 3* does not change; in *Table B3* population loses significance in several specifications. For the Prosecutor’s Office in *Table 2* population loses significance; in *Table B2* distance becomes more robustly significant (i.e. present in many specifications with a significant coefficient). To conclude, inclusion of democracy seems to be relevant for the effect of population on appointment decisions and does not influence the effects of the main exploratory variables.

<sup>9</sup> It is possible to hypothesize that the federal government focuses on other policy variables reflecting decentralization rather than share of contradicting acts – for example, fiscal aspects of devolution may be more important. Hence, I also estimated regression where average retention rate (share of total de-facto tax collection from region’s territory attributed to its consolidated budget) for 2000-2006 was added as a variable (regression estimated excluding autonomous districts, i.e. regions with lower political rights in Russia). However, all significant results of Tables 1-3 did not change; the average retention rate was almost never been significant; so, omission of this variable seems to be unproblematic. One should notice that using retention rates is not consistent with the type of agencies I am interested in: if one looks at the retention rates in Russia, actually not the security agencies, but the Federal Tax Service it the key player (cf. Libman and Feld, 2009). The choice of security agencies as the empirical playground for the paper is motivated by the importance of these structures for any country – and for Russia in particular – so, one is looking at the case for which politicians should make a great effort to make a “correct” decision – and it makes the results I report in what follows even more surprising.

tious in relations with strong regions; if it is negative, the opposite is true.<sup>10</sup> Third, the additional specification of the *Appendix B* may show whether the federal government was rather interested in re-establishing control in regions with strong regional bias, or the initial regional bias did not really matter for the federal authorities, which looked at the “content” of center-region relations and the power of the regional governors.

## 4 Main results

### 4.1 Ministry of Interior

The results of the baseline specification for the Ministry of Interior are reported in *Table 1*, and immediately provide some surprising evidence. The de-facto policies of federal government do not seem to be highly significant; however, *declarations of regional governors matter for federal policy, even if one controls for de-facto policies* (regressions (3) and (8)) and *relative power of governors* (regressions (5) and (10)).<sup>11</sup> Hence, the federal government seems to pay more attention to what regional governors said, than to what they actually did. It should be noted that although the words and deeds variables are somewhat correlated, including both of them in the regression does have almost no effect on the size of the coefficient as opposed to the case when only one of them is present: so, my results are not driven by multicollinearity.

Moreover, as already mentioned, the results of the regressions could be used in order to assess the general logic of the (de)centralization by appointment in Russia. I find mixed evidence with respect to the objectives of federal government by deciding on new bureaucrats for its regional offices. Indeed, for Ministry of Interior federal government seems to follow the “aggressive” strategy for regions, which have the status of a republic (although results are not entirely robust), border regions and regions with large oil and gas reserves. However, for the share of Russians and declarations of regional elites the effect is the opposite: the federal government seems to be more cautious dealing with regions with high non-Russian population and with the publicly active governors in the 1990s. Hence, the federal government seems to perceive different dimensions of bargaining power differently and therefore implement different policies. The positive sign of declarations is also worth noticing: the public claims seem to drive federal government to more cautious policies towards the regions, even if it is not related to the de-facto devolution.<sup>12</sup>

---

<sup>10</sup> Most covariates increase in bargaining power of the region. The exception is share of Russians: larger variable indicates lower share of non-Russian population and hence lower bargaining power.

<sup>11</sup> If one estimates the regressions from Tables 1-3 just with “words” (without “deeds” and power index) all results for declarations are confirmed in OLS and ordered logit.

<sup>12</sup> A further interesting finding, which will also persist for several other security agencies is the positive sign of the dummy Northern Caucasus. It is possible to hypothesize that this outcome reflects federal center’s desire to use local elites as their “power support” in the region instead of ruling through direct federal appointees – an experience well represented by the case of the Chechen Republic in the early 1990s.



The statistical properties of the regressions are fine: Jarque-Bera test does not reject the normality of residuals in OLS, and LR test supports the proportional-odds assumption (and hence generalized ordered logit is not necessary). An additional robustness check, as noticed, implies the inclusion of initial regional bias in the regression. Indeed, the initial regional bias is always significant and negative in all specifications, for all estimation techniques and all three agencies (*Appendix B*), showing the general re-appointment trend from more regional bias to less regional bias. The results for Ministry of Interior (*Appendix B, Table B1*) for public claims and observable real policies do not change. The exclusion of outliers in the OLS virtually never changes the results. Moreover, LR test for ordered logit in the key regressions (B8) and (B10) is not significant, so the application of generalized ordered logit is not necessary.

The central result of this section - the importance of “words” for re-appointment decisions, which seem to ignore the real actions of the governors - requires additional discussion. Generally speaking, several interpretations are possible, but the first three seem to be less likely for the Russian case – although with the tools of this paper clear discrimination among the hypotheses is impossible, and hence, one can only consider some of them as more or less probable).

First, it is possible to assume that federal government still “expects” the threats made by the regions in the early 1990s to become policies in the future, and hence, is still unsure that the threats were “empty”. This is a possible, but relatively unlikely explanation: Russian politics is rather characterized by myopic than by too far-sighted behavior, as well as the social behavior in general (Rozmarinsky, 2004), and the changes of regional policies after 1995 (the last year which is covered by the declarations index) have been substantial (however, in what follows I will show that the “memory” of the Russian politicians is not so short as one often assumes – and therefore the myopic behavior is also not straightforward).

Second, the government may react on public opinion expecting re-elections, which in the world of insufficiently informed and emotional voters may as well be influenced by “words” rather than “deeds”. For the Russian case, however, low degree of democracy also makes this explanation questionable.<sup>13</sup>

Third, one can be dealing with a purely “emotional” short-term response, and hence assume that politicians are completely irrational. However, irrational response is likely as a short-term reaction in a small group of regions: what I find is a reaction with a significant time lag, which also occurs systematically in more than 80 regions.

---

<sup>13</sup> Certainly, even in a non-democracy “reputation” is important, and the public opinion could not be disregarded. However, the public point of view is at least usually not so important, as in a democracy, and can often be easily manipulated through the media control. On the other hand, a very relevant issue is the reputation of the leader in the relations with the elites: but in this case elites are often well-informed not only about words, but also about deeds. In addition, appointments are prepared by the bureaucrats of the presidential administration: here an additional level of information asymmetry is possible, and in this case recommendations could specifically be motivated by “words” due to the carrier concerns of bureaucrats attempting to create a decision the president will “like”: this speculation is, however, not testable in any rigorous sense.

Fourth, the government could be concerned because “words” are better observable by other regional administrations: so, preventing the regions from being more aggressive in terms of their public claims could be used to avoid the snowball effect of spreading aspiration for autonomy and to provide a signal for other regions. In addition, “words” are crucial if one is looking for the external support for the possible secession (since they can reach the external actors, relevant for the international recognition). This interpretation is not entirely consistent with the positive sign of the declarations variable. In addition, Gel’man (2006) shows that the group of Russian regions interested in higher autonomy has always been limited (even during the ultimate weakness of the federal government in the 1990s), while the rest of the regions were more interested in federal transfers than in increasing autonomy. Since the situation persisted for almost a decade, there seems to be no reason for the Putin government to be very concerned with it. Nevertheless, this argument should be dismissed so easily.

Finally, the last explanation means that federal government simply pays more attention to the claims of regional governments than to the de-facto policies; it may have preferences over content of communication (basically, it may (dis)like certain things governors say, regardless of what they do, since the communication influences its ego-rents), which make “empty threats” relevant even if no political change is going on. In this case the federal government considered the dissolution of the “open rebellion” a more important issue than the fight against the “true” re-allocation of authorities. This result is in fact not surprising *per se*: since politicians are “just” human beings, there is no reason to believe that they act differently than people in other areas – where ego-rents and preferences over communication are obviously an issue. What is probably more amazing is the relative importance of the ego-rents for a key political decision-making area, where one would expect to see more dedicated calculation. However, once again, people seem to value status, honor and respect in the decisions of the “live and death” importance. One analogy could be that of criminal gangs: while there is a literature looking at gangs from the perspective of rational rent-maximization (Levitt and Venkatesh, 2000), other papers confirm the relevance of the “content of communication” and status for their development (Horowitz and Schwartz, 1974). My results suggest simply that politicians are not different than the rest.

The insignificant result for “deeds” should also be discussed. On the one hand, it is possible that it reflects the measurement problem: in this case regional acts simply did not matter for the economy, and hence unsurprisingly were ignored by the appointment policies. This claim, however, is not confirmed by numerous observations of the “war of laws” in Russia, which often refer to significant impact of regional legislation. Second, it is possible that other aspects of “real” devolution were more important – I have already checked for the retention rate and will explore this option in what follows as well. Finally, the result can be driven simply by the fact that facing a sophisticated and often costly (in terms of relations with regional governor) re-appointment decision, federal government has to prioritize, and the “words” may have higher weight in the utility function. Nevertheless, to err on the side of caution, one should probably say that the obtained results do show a robust significant impact of “words”, while for “deeds” my findings can be driven by the absence of the “relevant” proxy.

A further aspect to be taken into considerations is the institutional reforms implemented in the Russian administrative system in the 2000s. While in the year 2000 the regional

minister of interior (as well as prosecutor) was directly subordinated to the federal minister, in 2007 there was an additional layer established: prosecutors and agencies of the Ministry of Interior on the level of the new “federal districts”: groups of regions directed by an appointed presidential representative. This layer is sometimes claimed to draw a significant portion of authorities from the actual regional level. Hence, it is possible that what I observe in the data also comes from the fact that the regional officials became less important: therefore the federal government could be willing to be more “open” to regional governors while appointing heads of regional security agencies, and at the same time maintain control through federal appointees in the federal districts (in this case the analysis of this paper is irrelevant: all districts were established just in 2000 and were directed by officials without links to the regions – often from the military or the FSB). It could imply that the federal government does care for “words”, but only if consequences in terms of “deeds” are not dramatic (some results for the interaction terms reported in what follows could confirm this conclusion).

**Table 1: Personnel appointment for the Ministry of Interior, dep.var.: difference in regional bias index between 2000 and 2007**

	(1) OLS	(2) OLS	(3) OLS	(4) OLS	(5) OLS	(6) Ordered logit	(7) Ordered logit	(8) Ordered logit	(9) Ordered logit	(10) Ordered logit
<b>Dummy republic</b>	<b>-1.059**</b> (0.509)	<b>-1.177**</b> (0.498)	<b>-2.298***</b> (0.647)	<b>-1.056**</b> (0.508)	<b>-2.294***</b> (0.650)	-1.110 (0.782)	<b>-1.287*</b> (0.761)	<b>-3.368***</b> (1.131)	-1.121 (0.760)	<b>-3.361***</b> (1.122)
<b>Dummy border region</b>	<b>-1.031***</b> (0.329)	<b>-1.044***</b> (0.328)	<b>-0.884**</b> (0.345)	<b>-1.021***</b> (0.328)	<b>-0.878**</b> (0.345)	<b>-1.369***</b> (0.493)	<b>-1.387***</b> (0.493)	<b>-1.233**</b> (0.524)	<b>-1.360***</b> (0.491)	<b>-1.224**</b> (0.518)
<b>Distance from Moscow</b>	-0.017 (0.072)	-0.036 (0.079)	-0.077 (0.082)	-0.021 (0.072)	-0.080 (0.082)	-0.029 (0.114)	-0.056 (0.123)	-0.108 (0.135)	-0.043 (0.110)	-0.117 (0.132)
<b>Share of Russians</b>	<b>-2.223**</b> (0.992)	<b>-2.145**</b> (1.017)	-1.020 (1.060)	<b>-2.160**</b> (1.028)	-0.982 (1.090)	<b>-2.716*</b> (1.604)	-2.596 (1.635)	-1.052 (1.482)	-2.524 (1.606)	-0.952 (1.476)
<b>Territory</b>	0.285 (0.783)	0.306 (0.804)	0.360 (0.790)	0.267 (0.792)	0.348 (0.800)	0.310 (1.889)	0.351 (2.028)	0.319 (1.774)	0.237 (1.705)	0.282 (1.682)
<b>Population (2000-2006)</b>	0.015 (0.089)	0.017 (0.089)	0.003 (0.079)	0.009 (0.090)	-0.001 (0.082)	-0.030 (0.111)	-0.022 (0.112)	-0.042 (0.101)	-0.052 (0.116)	-0.055 (0.108)
<b>Oil and gas (2000-2006)</b>	<b>-2.860*</b> (1.576)	<b>-2.877*</b> (1.582)	<b>-4.032**</b> (1.641)	<b>-2.933*</b> (1.593)	<b>-4.075**</b> (1.664)	-5.130 (3.741)	-4.946 (3.854)	<b>-8.022**</b> (3.766)	-5.522 (3.636)	<b>-8.250**</b> (3.809)
<b>Democracy (2000-2006)</b>	0.044 (0.040)	0.045 (0.039)	0.030 (0.039)	0.043 (0.041)	0.029 (0.039)	0.064 (0.056)	0.065 (0.055)	0.056 (0.062)	0.058 (0.057)	0.052 (0.063)
<b>Dummy Northern Caucasus</b>	<b>1.522**</b> (0.596)	<b>1.507**</b> (0.595)	<b>2.199***</b> (0.588)	<b>1.528**</b> (0.605)	<b>2.201***</b> (0.594)	<b>2.076**</b> (0.928)	<b>2.082**</b> (0.926)	<b>3.451***</b> (0.971)	<b>2.126**</b> (0.943)	<b>3.456***</b> (0.966)
<b>Contradicting acts</b>		2.654 (3.324)	2.66 (3.158)		2.706 (3.143)		3.891 (4.401)	3.506 (4.282)		3.610 (4.183)
<b>Declarations</b>			<b>1.440***</b> (0.522)		<b>1.435***</b> (0.527)			<b>2.512***</b> (0.921)		<b>2.487***</b> (0.924)
<b>Power of governors</b>				0.064 (0.292)	0.041 (0.291)				0.222 (0.398)	0.137 (0.413)
<b>Constant</b>	-0.369 (1.150)	-0.632 (1.252)	-4.837** (2.120)	-0.794 (2.273)	-5.100* (2.835)					
<b>Observations</b>	79	79	79	79	79	79	79	79	79	79
<b>R<sup>2</sup></b>	0.221	0.227	0.284	0.222	0.284					
<b>Pseudo R<sup>2</sup></b>						0.098	0.101	0.143	0.100	0.143
<b>LR proportional odds test</b>						44.76*	46.49	45.96	45.33	47.95
<b>J.-B. test</b>	1.373	1.645	1.036	1.370	1.055					

Notes: numbers in parenthesis are standard errors. \* significant at 10% level, \*\* significant at 5% level, \*\*\* significant at 1% level. Robust standard errors applied.

**Table 2: Personnel appointment for Prosecutor’s Office, dep.var.: difference in regional bias index between 2000 and 2007**

	(11) OLS	(12) OLS	(13) OLS	(14) OLS	(15) OLS	(16) Ordered logit	(17) Ordered logit	(18) Ordered logit	(19) Ordered logit	(20) Ordered logit
<b>Dummy republic</b>	0.513 (0.711)	0.696 (0.730)	1.479 (0.945)	0.513 (0.719)	1.481 (0.951)	0.498 (0.797)	0.757 (0.847)	1.683 (1.123)	0.497 (0.801)	1.684 (1.124)
<b>Dummy border region</b>	-0.312 (0.407)	-0.275 (0.406)	-0.372 (0.415)	-0.311 (0.409)	-0.378 (0.413)	-0.456 (0.503)	-0.385 (0.513)	-0.523 (0.541)	-0.453 (0.497)	-0.526 (0.534)
<b>Distance from Moscow</b>	0.089 (0.085)	0.116 (0.089)	0.146 (0.092)	0.089 (0.092)	0.149 (0.099)	0.083 (0.101)	0.124 (0.102)	0.160 (0.107)	0.082 (0.108)	0.162 (0.112)
<b>Share of Russians</b>	0.889 (1.365)	0.716 (1.318)	-0.055 (1.569)	0.894 (1.386)	-0.088 (1.590)	0.597 (1.545)	0.511 (1.539)	-0.446 (1.989)	0.612 (1.557)	-0.462 (2.008)
<b>Territory</b>	-0.520 (0.456)	-0.541 (0.479)	-0.583 (0.469)	-0.522 (0.473)	-0.574 (0.480)	-0.573 (0.542)	-0.612 (0.566)	-0.667 (0.553)	-0.577 (0.562)	-0.662 (0.572)
<b>Population (2000-2006)</b>	<b>0.267*</b> <b>(0.152)</b>	<b>0.266*</b> <b>(0.148)</b>	<b>0.276*</b> <b>(0.145)</b>	<b>0.267*</b> <b>(0.155)</b>	<b>0.279*</b> <b>(0.150)</b>	<b>0.329*</b> <b>(0.191)</b>	<b>0.335*</b> <b>(0.186)</b>	<b>0.346*</b> <b>(0.184)</b>	<b>0.328*</b> <b>(0.192)</b>	<b>0.348*</b> <b>(0.187)</b>
<b>Oil and gas (2000-2006)</b>	0.659 (1.394)	0.649 (1.293)	1.476 (1.538)	0.653 (1.497)	1.517 (1.632)	0.793 (1.294)	0.831 (1.239)	1.747 (1.492)	0.773 (1.400)	1.767 (1.566)
<b>Democracy (2000-2006)</b>	-0.057 (0.040)	-0.057 (0.040)	-0.049 (0.041)	-0.057 (0.044)	-0.048 (0.044)	-0.073 (0.049)	-0.075 (0.050)	-0.063 (0.051)	-0.073 (0.053)	-0.063 (0.056)
<b>Dummy Northern Caucasus</b>	-0.915 (0.848)	-0.893 (0.894)	-1.386 (0.959)	-0.915 (0.852)	-1.388 (0.970)	-1.260 (1.054)	-1.193 (1.134)	-1.738 (1.240)	-1.259 (1.051)	-1.737 (1.243)
<b>Contradicting acts</b>		-4.675 (3.896)	-4.656 (4.036)		-4.720 (4.003)		-5.675 (4.196)	-5.888 (4.518)		-5.914 (4.462)
<b>Declarations</b>			-1.028 (0.702)		-1.025 (0.706)			-1.232 (0.898)		-1.231 (0.898)
<b>Power of governors</b>				0.005 (0.403)	-0.035 (0.394)				0.017 (0.486)	-0.019 (0.487)
<b>Constant</b>	-0.263 (1.554)	0.236 (1.464)	3.26 (2.509)	-0.294 (2.784)	3.484 (3.363)					
<b>Observations</b>	84	84	84	84	84	84	84	84	84	84
<b>R<sup>2</sup></b>	0.096	0.111	0.135	0.096	0.135					
<b>Pseudo R<sup>2</sup></b>						0.043	0.052	0.062	0.043	0.062
<b>LR proportional odds test</b>						31.96	68.45***	75.95***	32.57	76.76***
<b>J.-B. test</b>	1.113	2.157	2.295	1.113	2.316					

Notes: see Table 1

**Table 3: Personnel appointment for Federal Security Service, dep.var.: difference in regional bias index between 2000 and 2007**

	(21) OLS	(22) OLS	(23) OLS	(24) OLS	(25) OLS	(26) Ordered logit	(27) Ordered logit	(28) Ordered logit	(29) Ordered logit	(30) Ordered logit
<b>Dummy republic</b>	-0.206 (0.411)	-0.202 (0.443)	-0.124 (0.528)	-0.206 (0.419)	-0.129 (0.527)	-0.539 (0.803)	-0.361 (0.857)	-0.221 (1.083)	-0.593 (0.844)	-0.270 (1.092)
<b>Dummy border region</b>	0.338 (0.233)	0.339 (0.236)	0.330 (0.247)	0.393 (0.239)	0.379 (0.251)	0.677 (0.608)	0.737 (0.619)	0.719 (0.656)	0.886 (0.588)	0.917 (0.629)
<b>Distance from Moscow</b>	0.046 (0.041)	0.047 (0.038)	0.050 (0.041)	0.027 (0.040)	0.028 (0.042)	-0.006 (0.120)	0.015 (0.103)	0.021 (0.112)	-0.058 (0.116)	-0.031 (0.110)
<b>Share of Russians</b>	1.045 (0.874)	1.044 (0.882)	0.972 (0.941)	1.303 (0.877)	1.226 (0.938)	1.618 (1.916)	1.579 (1.959)	1.432 (2.098)	2.48 (1.905)	2.242 (2.016)
<b>Territory</b>	<b>-0.734***</b> <b>(0.210)</b>	<b>-0.734***</b> <b>(0.211)</b>	<b>-0.738***</b> <b>(0.214)</b>	<b>-0.796***</b> <b>(0.227)</b>	<b>-0.802***</b> <b>(0.230)</b>	<b>-1.324**</b> <b>(0.559)</b>	<b>-1.379**</b> <b>(0.546)</b>	<b>-1.378**</b> <b>(0.545)</b>	<b>-1.797***</b> <b>(0.669)</b>	<b>-1.847***</b> <b>(0.646)</b>
<b>Population (2000-2006)</b>	-0.018 (0.073)	-0.018 (0.073)	-0.017 (0.072)	-0.040 (0.072)	-0.039 (0.071)	-0.084 (0.151)	-0.085 (0.150)	-0.082 (0.146)	-0.160 (0.160)	-0.154 (0.153)
<b>Oil and gas (2000-2006)</b>	<b>1.987***</b> <b>(0.578)</b>	<b>1.987***</b> <b>(0.581)</b>	<b>2.068***</b> <b>(0.671)</b>	<b>1.671***</b> <b>(0.613)</b>	<b>1.761**</b> <b>(0.706)</b>	<b>4.028***</b> <b>(1.500)</b>	<b>4.125***</b> <b>(1.466)</b>	<b>4.264**</b> <b>(1.736)</b>	<b>3.458**</b> <b>(1.473)</b>	<b>3.758**</b> <b>(1.699)</b>
<b>Democracy (2000-2006)</b>	-0.008 (0.024)	-0.008 (0.024)	-0.007 (0.024)	-0.016 (0.024)	-0.015 (0.025)	-0.018 (0.050)	-0.018 (0.051)	-0.017 (0.051)	-0.044 (0.055)	-0.042 (0.055)
<b>Dummy Northern Caucasus</b>	<b>0.825*</b> <b>(0.439)</b>	<b>0.826*</b> <b>(0.439)</b>	<b>0.779*</b> <b>(0.448)</b>	<b>0.857*</b> <b>(0.445)</b>	<b>0.796*</b> <b>(0.442)</b>	<b>1.665*</b> <b>(0.907)</b>	<b>1.708*</b> <b>(0.927)</b>	<b>1.617*</b> <b>(0.916)</b>	<b>1.817*</b> <b>(0.992)</b>	<b>1.729*</b> <b>(0.938)</b>
<b>Contradicting acts</b>		-0.081 (2.521)	-0.090 (2.560)		0.351 (2.622)		-3.853 (5.380)	-3.853 (5.395)		-3.037 (5.205)
<b>Declarations</b>			-0.100 (0.374)		-0.122 (0.384)			-0.186 (0.854)		-0.254 (0.909)
<b>Power of governors</b>				0.259 (0.189)	0.265 (0.201)				0.836 (0.536)	0.824 (0.554)
<b>Constant</b>	-1.113 (0.966)	-1.106 (1.016)	-0.816 (1.536)	-2.816* (1.599)	-2.528 (2.093)					
<b>Observations</b>	83	83	83	83	83	83	83	83	83	83
<b>R<sup>2</sup></b>	0.200	0.200	0.200	0.216	0.217					
<b>Pseudo R<sup>2</sup></b>						0.088	0.091	0.092	0.106	0.109
<b>LR proportional odds test</b>						74.18***	76.47***	77.87***	77.25***	80.25***
<b>J.-B. test</b>	19.99***	20.02***	19.67***	16.97***	16.35***					

Notes: see Table 1. According to the Jarque-Bera test, there are following outliers in all regressions: Evreiskaia, Aginsk Buriat, Chukotka, Khanty Mansi, Nenets, Moscow (City), St. Petersburg, Altai Krai, Krasnoiarsk, Primorski, Stavropol, Amur, Arkhangelsk, Briansk, Cheliabinsk, Ivanovo, Kaluga, Kamchatka, Kemerovo, Kirov, Kostroma, Leningradskaja, Lipetsk, Magadan, Moscow Region, Murmansk, Nizhniy Novgorod, Novgorod, Orel,

Penza, Perm, Riazan, Samara, Sverdlovskaja, Tambov, Tomsk, Tula, Tver, Ulianovsk, Vladimir, Vologda, Voronezh, Yaroslavl, Alrai Rep., Bashkortostan, Buriatia, Chuvashia, Kalmykia, Karelia, Khakassia, Komi, Mariy El, Mordovia, Tatarstan, Tyva, Udmurtia. There are following exceptions: in regression (23) Kemerovo is not an outlier, in regression (24) Krasnodar, Novosibirsk, Pskov, Sakhalin, Volgograd, Dagestan, Kabardino-Balkaria, Sakha are outliers and Stavropol and Orel not, in regression (25) Krasnodar, Novosibirsk, Pskov, Volgograd, Dagestan are outliers and Stavropol, Tomsk and Orel not. After exclusion of outliers, dummy Northern Caucasus in regression (21), (22), (23), (25) becomes insignificant, but still has a positive coefficient.

## 4.2 Prosecutor's Office

*Table 2* reports the baseline estimations for the Prosecutor's Office. One does not find any significant impact of the public claims or the real policies variables on the appointment decisions. Regarding the bargaining power variables, for the Prosecutor's Office I find only evidence of cautious policies with respect to regions with large population. There seems to be no need to re-estimate OLS regressions, since the normal distribution of residuals cannot be rejected. However, for the logit regressions proportional odds assumption cannot be sustained. Re-estimations through ordered logit (where I use marginal effects at the mean for inference) do not support the finding: population is mostly insignificant, but positive, and other variables do not show any robust effects on the appointments.<sup>14</sup>

Including initial regional bias in the regressions (*Appendix B, Table B2*) does generate a number of interesting changes. First, now I find a negative and significant impact of the number of contradicting acts on the re-appointment policies; declarations remain insignificant. Hence, inclusion of initial regional bias as a covariate suggests, that in case of the Ministry of Interior the “words” were more important than “deeds” (and supported more cautious attitude of the federal government towards strong regions), while for the Prosecutor's Office “deeds” and not “words” mattered (and supported more aggressive behavior towards strong regions). To start with, the federal government seems to treat the “words” and “deeds” differently not only by changing its appointment policies for different agencies, but also changing the direction of the re-appointments. The relation between aggressive and cautious behavior and importance of public claims and policies is not completely clear: one could probably expect the federal government to consider it more difficult and risky to intervene in the area of public politics, than to strongly restrict the informal devolution often not perceived by the population – but, on the other hand, regional governments could consider the real benefits as more valuable, as the opportunity to make public statements (especially in the Russian political culture, which still exhibits strong traits of the Soviet “closed bargaining style”) – and then would fight for the former rather than for the latter. However, the result may indicate that both preferences regarding the public claims and real policies may matter; the federal government may simply manipulate its policies for different agencies, probably treating them as partial substitutes (indeed, Prosecutors have a strong influence on the activity of police and vice versa).

Moreover, I find that democracy is significant and negative – and hence, the federal government was active in appointing prosecutors with lower “embeddedness” in local context in the regions where democracy level was high. It makes sense since Prosecutors are directly involved in monitoring of “politically sensitive issues” (for example, related to election

<sup>14</sup> Generalized ordered logit regressions in this paper are not reported in this paper, but can be provided on request.

fraud), and therefore may be relevant in this context. Once again, the result is not robust in generalized ordered logit estimations. *Table B2* yields a number of further interesting observations, consistent with mixed cautious and aggressive behavior towards strong regions: distance from Moscow and oil and gas become partly positive and significant (cautious policy towards strong regions) and territory is partly negative and significant (aggressive policy towards strong regions). One should be aware though that the results of the *Table B2* do not survive the generalized ordered logit estimations, where neither “words” nor “deeds” are significant, and other results are not robust. Since in this particular regression proportional-odds assumption could not be sustained, the results for the Prosecutor’s Offices should be treated with extreme caution.

### 4.3 Federal Security Service

The estimations for the Federal Security Service seem to be less interesting for our discussion, as it could have been expected (since the capture problem and subsequent reform were probably not so important for this agency). Basically, I cannot find any significant effect of “words” or “deeds” on appointment decisions in any specification or with any estimation technique. The results for the baseline estimation are reported in *Table 3*. It once again confirms that the overall “centralizing” trend in the appointment policy of the Russian government in the 2000s becomes at least ambiguous: it looks like federal administration (at least, partly) focused on relatively weak regions, while strong regions were even able to get more control over “their” local security agencies. For the FSB appointments federal government was “aggressive” vis-à-vis regions with large territory and “cautious” against oil and gas regions.<sup>15</sup> It is worth noticing that the sign for oil and gas is reverse for the Ministry of Interior and for the FSB, probably still suggesting the opportunity of “hostage exchange” for these agencies: “local” FSB head as price for the “federal” Minister of Interior.

The LR test for ordered logit regressions also rejects the proportional-odds assumption; therefore the application of generalized ordered logit becomes necessary; the results obtained, however, do not survive if one considers marginal effects at the mean in this estimation approach. Including the regional bias in 2000 changes the results slightly: in the new specification dummy republic is negative and significant in ordered logit, population is positive and significant in OLS (but not robust to exclusion of outliers) and oil and gas loses its significance in OLS (*Appendix B, Table B3*). New results seem to be not robust to estimation technique, and, moreover, once again provide mixed evidence about the behavior of the central government – both aggressive (dummy republic) and cautious (population) towards stronger regions. However, no results of ordered logit could be confirmed in generalized ordered logit (with the exception of the negative effect of regional bias in 2000).

---

<sup>15</sup> Moreover, dummy Northern Caucasus is once again almost always significant. This result is however not robust to outliers and do not survive the inclusion of the initial regional bias – so, evidence of “ruling through local elites” is much weaker than in case of the Ministry of Interior. It is surprising though that one finds any evidence at all, since in Russia traditionally the Federal Security Service, as well as its infamous predecessor have always been strongly controlled by the central government.



## 4.4 Preliminary conclusions

Summarizing the findings for “words” and “deeds”, the situation looks as follows. First, the importance of public claims for appointments in the Ministry of Interior is confirmed almost regardless of specification and estimation technique, and one can indeed claim that for police the federal government paid more attention to what the regional governors said than to their de-facto policies. Second, the results for Prosecutor’s Office are much less robust: the “deeds” variable is significant in some specifications, does this result is strongly influenced by the set of covariates and does not appear in the generalized ordered logit, which is required in this case because of the proportional-odds assumption. Finally, for the Federal Security Service no significant results for “words” and “deeds” were established. For all variables I find combined cautious and aggressive approaches towards regions with stronger bargaining power by appointing new governors; however, results for individual variables are often not robust to the specification and estimation technique (with Ministry of Interior, once again, providing relatively more robust evidence). Finally, federal government always focused its attention on regions with larger regional bias – which, however, are not necessarily those with strong bargaining power.<sup>16</sup>

## 5 Extensions and robustness checks

### 5.1 Initial level of regional bias

As I have shown so far, federal government is clearly attempting to reduce the regional bias in the regions with initially strong connections between federal and regional bureaucrats, but is ambiguous about regions with strong bargaining position. However, intuitively it seems like these two sets of regions may be overlapping. It is also interesting to understand how different bargaining factors, as well as “public claims” and “real policies” influenced not just the *change* of regional bias, but also the *level* of regional bias. Therefore I have estimated regressions where the dependent variable is the level of regional bias in 2000 (*Table 4*) and 2007 (*Table 5*).<sup>17</sup> One can clearly see that in both cases regional bias for different agencies is driven by different factors; hence, as in the previous section, I will look at each organization. It should moreover be noted that for this type of estimations by the selection of

---

<sup>16</sup> It is clear that so far one questionable assumption I made was that the appointments in all three agencies are basically independent. In order to check it I estimated a system of equations (3), (13) and (23) using three-stage least squares. In this case all effects, which have been significant in the stand-alone regressions, remain significant and hold their sign, with the exception of dummy Northern Caucasus for the FSB, which becomes insignificant. In addition, for the Prosecutor’s Office I find significant and positive impact of dummy Northern Caucasus and of the declarations – so, for the 3SLS estimations the relevance of “words” over “deeds” seems to be even more pronounced. Results are not reported, but available on request.

<sup>17</sup> One could of course pool these two time periods to a panel – but, as the results of both cross-sectional regressions show, there is likely to be a structural break between these two observations.

the data the endogeneity problem is more acute than in the previous part of the paper – and therefore the results should be treated with caution.<sup>18</sup>

For the Ministry of Interior the only robust finding for the pre-Putin era is that border regions seem to have higher regional bias. This fact can be explained by several considerations: probably, border regions were more successful at protecting their “capture” of the federal agencies, but probably their remote position made it more difficult for the federal government to find replacements for the positions of bureaucrats (which have been quite unpopular before Putin’s accession to power) – although distance from Moscow is insignificant. Anyway, strong regions seem to have higher regional bias.<sup>19</sup> Under Putin, however, the situation changed completely: dummy republic (as well as distance from Moscow and oil and gas in OLS) has been negatively associated with the regional bias – therefore strong regions had worse possibilities to establish control over agencies of the federal government.

---

<sup>18</sup> In what follows I will refer to the regressions where the dependent variable is the change of the regional bias as “re-appointment regressions”, and to the regressions where the dependent variable is the regional bias of a particular year as “regional bias 2000 / 2007” regressions.

<sup>19</sup> It should be further noted that for all agencies the Northern Caucasus dummy is always significant (although partly not robust to outliers) in the Yeltsin period – however, the sign is positive for the Prosecutor’s Office and negative for both other agencies. For the Putin period no robust results were established. From this point of view the observed significant impact of the Northern Caucasus dummy for re-appointments in the Ministry of Interior and the FSB seems to be even more convincing and simply represents the shift from focusing on “federal representatives” in the region of major concern to using local elites in a kind of “indirect rule” structure.

**Table 4: Determinants of personnel appointments in 2000, dep.var.: regional bias for three federal agencies in 2000**

	(31) OLS	(32) OLS	(33) OLS	(34) Or- dered logit	(35) Or- dered logit	(36) Or- dered logit
Dependent variable: regional bias in	Ministry of Inte- rior	FSB	Prosecutor's Office	Ministry of Inte- rior	FSB	Prosecutor's Office
Dummy republic	0.298 (0.576)	-0.410 (0.547)	-0.650 (0.712)	0.956 (1.210)	-0.932 (1.085)	-0.967 (1.026)
Dummy border region	<b>0.747***</b> ( <b>0.232</b> )	-0.380 (0.272)	0.164 (0.331)	<b>1.248***</b> ( <b>0.480</b> )	-0.630 (0.600)	0.207 (0.512)
Distance from Moscow	-0.012 (0.049)	-0.005 (0.054)	0.016 (0.071)	0.025 (0.083)	0.011 (0.123)	0.036 (0.111)
Share of Russians	-0.391 (0.746)	-1.047 (1.079)	1.711 (1.113)	-0.744 (1.190)	-1.350 (2.665)	<b>3.465*</b> ( <b>1.941</b> )
Territory	-0.361 (0.418)	0.325 (0.319)	-0.006 (0.428)	-0.708 (0.642)	0.535 (0.558)	-0.011 (0.584)
Population (1995-1999)	<b>0.112**</b> ( <b>0.056</b> )	<b>0.302***</b> ( <b>0.094</b> )	0.009 (0.131)	0.277 (0.203)	<b>0.571**</b> ( <b>0.231</b> )	0.016 (0.188)
Oil and gas (1995-1999)	0.395 (1.118)	<b>-1.778*</b> ( <b>0.957</b> )	1.496 (0.936)	1.271 (2.436)	-3.439 (2.375)	16.016 (24.312)
Democracy (1995-1999)	-0.032 (0.023)	-0.003 (0.025)	-0.010 (0.033)	<b>-0.082*</b> ( <b>0.049</b> )	-0.025 (0.051)	-0.023 (0.046)
Dummy Northern Caucasus	<b>-1.218**</b> ( <b>0.525</b> )	<b>-0.792*</b> ( <b>0.462</b> )	<b>1.801***</b> ( <b>0.559</b> )	<b>-2.287**</b> ( <b>1.079</b> )	<b>-36.363***</b> ( <b>1.113</b> )	<b>3.638**</b> ( <b>1.628</b> )
Contradicting acts	-2.417 (2.645)	-0.400 (3.705)	-2.270 (3.456)	-7.229 (5.430)	-1.567 (7.784)	-3.123 (4.691)
Declarations	0.137 (0.377)	0.409 (0.373)	<b>1.320***</b> ( <b>0.444</b> )	0.338 (0.745)	0.984 (0.997)	<b>2.186***</b> ( <b>0.823</b> )
Constant	2.928** (1.345)	0.317 (1.581)	-2.902* (1.637)			
Observations	88	86	88	88	86	88
R <sup>2</sup>	0.186	0.228	0.134			
Pseudo R <sup>2</sup>				0.095	0.147	0.101
LR proportional odds test				18.23	18.68	13.14
J.-B. test	11.57***	11.92***	9.97***			

Note: see Table 1. List of outliers includes: (31): Evenkia, Khanty Mansi, Nenets, Taimyr, Ust Ordyn Buriat, St Petersburg, Krasnoyarsk, Arkhangelsk, Irkutsk, Ivanovo, Kaluga, Kamchatka, Kirov, Lipetsk, Magadan, Nizhniy Novgorod, Novgorod, Orenburg, Riazan, Perm, Sverdlovskaya, Tambov, Tomsk, Tula, Tver, Volgograd, Vologda, Yaroslavl, Karachaevo-Cherkessia, Mariy El, Mordovia, Sakha; (32): Aginsk Buriat, Khanty Mansi, Krasnodar, Primoskiy, Briansk, Kaluga, Kemerovo, Leningradskaya, Nizhniy Novgorod, Penza, Samara, Smolensk, Tambov, Ulianovsk, Voronezh, Bashkortostan, Chuvashia, Tyva, Udmurtia; (33): Evreiskaya, Nenets, Taimyr, Moscow (City), Chita, Kaliningrad, Murmansk, Orel, Voronezh, Saratov, Ulianovsk, Karachevo-Cherkessia, Buriatia, Mariy El. There are no changes after exclusion of outliers in all regression, with the exception of Northern Caucasus dummy in regression (32), which becomes insignificant (although maintains its sign).

Table 5: Determinants of personnel appointments in 2007, dep.var.: regional bias for three federal agencies in 2007

	(37) OLS	(38) OLS	(39) OLS	(40) Or- dered logit	(41) Orde- red logit	(42) Ordered logit
Dependent vari- able: regional bias in	Ministry of Interi- or	FSB	Prosecutor's Office	Ministry of Interi- or	FSB	Prosecutor's Office
Dummy republic	<b>-2.649***</b> (0.491)	<b>-1.024**</b> (0.485)	0.433 (0.689)	<b>-5.837***</b> (1.826)	<b>-43.581***</b> (3.409)	0.691 (1.193)
Dummy border region	-0.223 (0.314)	-0.134 (0.254)	-0.259 (0.326)	-0.451 (0.612)	-0.318 (0.845)	-0.489 (0.548)
Distance from Moscow	-0.083 (0.055)	0.030 (0.042)	<b>0.154**</b> (0.071)	-0.184 (0.154)	0.188 (0.183)	<b>0.270**</b> (0.12)
Share of Russians	<b>-2.011*</b> (1.088)	-0.710 (0.877)	1.075 (1.212)	<b>-4.740**</b> (1.903)	-0.822 (2.848)	1.556 (1.801)
Territory	0.196 (0.434)	-0.328 (0.198)	<b>-0.511**</b> (0.209)	0.281 (0.666)	<b>-6.632***</b> (2.495)	-1.203 (0.921)
Population (2000-2006)	0.082 (0.087)	<b>0.227***</b> (0.080)	<b>0.255***</b> (0.087)	0.089 (0.145)	<b>0.837**</b> (0.362)	<b>0.452**</b> (0.202)
Oil and gas (2000-2006)	<b>-4.302***</b> (1.306)	-0.235 (0.939)	<b>2.520*</b> (1.437)	-37.302 (41.322)	6.260 (4.310)	<b>4.402**</b> (2.196)
Democracy (2000-2006)	-0.007 (0.030)	-0.009 (0.021)	<b>-0.061**</b> (0.030)	0.001 (0.055)	-0.102 (0.073)	<b>-0.106*</b> (0.059)
Dummy Northern Caucasus	0.918 (0.694)	-0.145 (0.300)	0.335 (0.793)	1.548 (1.065)	<b>-34.554***</b> (1.419)	0.542 (1.241)
Contradicting acts	2.124 (2.714)	0.594 (2.152)	<b>-6.939**</b> (3.041)	4.352 (5.309)	-0.895 (5.544)	<b>-11.839*</b> (6.113)
Declarations	<b>1.598***</b> (0.507)	0.384 (0.310)	0.384 (0.521)	<b>3.562***</b> (1.352)	<b>3.838*</b> (2.111)	0.580 (0.866)
Constant	-1.222 (1.899)	-0.018 (1.306)	0.836 (2.039)			
Observations	79	83	84	79	83	84
R <sup>2</sup>	0.264	0.213	0.192			
Pseudo R <sup>2</sup>				0.196	0.315	0.124
LR proportional odds test				15.95	8.46	20.78
J.-B. test	6.623**	57.870***	7.167**			

Note: see Table 1. In OLS regressions the outliers are the following: (37): Khabarovsk, Briansk, Leningradskaya, Novgorod, Novosibirsk, Riazan, Sverdlovskaya, Tomsk, (38): Aginsk Buriat, Chukotka, Khanty-Mansi, Nenets, St. Petersburg, Altai (Krai), Krasnodar, Primorski, Cheliabinsk, Kemerovo, Moscow Region, Murmansk, Nizhniy Novgorod, Penza, Perm, Rostov, Samara, Smolensk, Sverdlovskaya, Voronezh, Tatarstan, Bashkortostan; (39): Arkhangelsk, Leningradskaya, Novosibirsk, Bashkortostan. After the exclusion of outliers in regression (38) dummy republic becomes insignificant, although has (respectively) the same sign.

From this point of view Putin's intention to break the ties between regional administrations and federal officials seemed to succeed – however, regions with higher share of Russian population (i.e. with weaker bargaining position) at the same time had lower regional bias. This is an interesting result, especially if one takes into account that large share of ethnic Russians was also associated with larger retention rates (Libman and Feld, 2009); it seems like federal government granted higher autonomy to potentially weaker regions without large non-Russian minorities. Finally, declarations are significant and positive, explaining the effect observed in the previous part of the paper.

For the FSB the results have been ambiguous under Yeltsin (year 2000): population is significant with a positive sign, while oil and gas has a significant negative impact (but only in OLS, which may be misspecified in this case). The significant and positive impact of population on the regional bias remained also under Putin. So, it looks like large regions in terms of their population are more likely to receive “locals” as heads of the Federal Security Service branches. It can however simply represent the fact that in a large population it is easier to recruit high-qualified bureaucrats without moving them from other regions. Under Putin population remains significant and positive, but there is also a negative impact of dummy republic, which is not robust to outliers in OLS. There is also significant and positive impact of declarations, but only in ordered logit (and only at 10% significance level).<sup>20</sup>

For the Prosecutor's Office the only significant and robust (in OLS and ordered logit) effect for the Yeltsin period (with the exception of the dummy Northern Caucasus) is the positive sign of the declarations, suggesting that the regions with strong public claims specifically focused on establishing control over the Prosecutor's Office. Under Putin, however, one can establish several interesting observations. First, once again, the impact of bargaining power variables is mixed: while distance from Moscow and population are significant and positive, territory is significant and negative (only in OLS). What is more interesting is that democracy is significant and negative: therefore, once again, there is evidence that “external” prosecutors were appointed in the “more democratic” regions in Russia and that the office of the regional prosecutor may have been an important factor for the spread of the authoritarianism under Putin in the 2000s. Moreover, I find a significant and negative impact of the share of contradicting acts passed under Yeltsin – probably explaining the mixed evidence from the *Tables 2* and *B2*. This outcome shows that for the appointment of regional prosecutors the federal government indeed took the desire to reduce the de-facto autonomy achieved by the regions into account.<sup>21</sup>

---

<sup>20</sup> One should note however that in both 2000 and 2007 the ordered logit specifications for the FSB face the problem of perfect prediction caused by the inclusion of the dummies republic and Northern Caucasus – for example, in 2007 all republics had a 0 score for the regional bias for the FSB. Hence, interpretation of the ordered logit results is questionable: simply excluding offending variables in this case is very likely to result in a omitted variable bias, since all mentioned variables are from the point of view of what we know of Russian specifics highly relevant, and makes almost all results unstable (with the exception of population, which remains significant both for 2000 and 2007).

<sup>21</sup> For 2007 perfect prediction problem also occurs for ordered logit: removing offending variables (dummy border region, republic and Northern Caucasus) makes all remaining regressors insignificant.

To conclude, the regressions basically confirm the outcomes of the previous sections: first, bargaining power variables can have both negative and positive effects on the regional bias, and second, I find impact of public claims on the regional bias for the Ministry of Interior (in 2007) and the Prosecutor's Office (in 2000) and of the contradicting acts for the Prosecutor's Office (in 2007) – so, in this case both “words” and “deeds” seem to matter for the re-appointment policies, but for different agencies.<sup>22</sup> It should be noted though that as I will show in what follows, the results for both regressions on the regional bias level are much less robust as for the regressions on the change of the regional bias, if one varies the set of outliers, and hence a more cautious interpretation is required. The discussion in what follows will confirm this claim. Caution is often called for because of the perfect prediction problem, which did not occur in the re-appointment regressions (both with and without initial regional bias), but, as discussed, did happen in the regional bias specifications. So, in purely statistical sense the reliability of these results is not unequivocal.

## 5.2 Crime rates and appointment policies

The regressions so far ignored at least one variable, which may become quite important in the context of appointment policies of the federal government for security agencies – the crime rates. It is possible to expect the federal government to intervene not only because of the power contest with regional elites, but simply to provide the public good of security and order. What is less straightforward is why these interventions should result in reduction or increase of “regional bias”, but it is at least theoretically possible that, for example, the federal government links the regional connections of heads of its agencies to their ability to fight crime in the particular region, while making the appointment decisions (and that this link could actually exist). The most obvious approach were to include some indicator of crime rates in the regressions – however, this variable is, first, highly endogenous, and second, likely to be manipulated in the context of appointments (reporting lower – or reducing – crime rates could support the carrier of the heads of regional police or prosecutors). However, in order to check for the robustness of my results, I re-estimated all regressions reported so far including crime rates (average number of crimes committed in 2000-2006 per 100,000 inhabitants of the region).<sup>23</sup>

---

<sup>22</sup> For these specifications, once again, I estimated systems of equations: first two separate systems of (31), (32) and (33) and (37), (38) and (39), and then a system of all six equations (which would imply that the re-appointments made in 2007 are somehow related to what happened before 2000) using 3SLS. First look at two systems of equations. In 2007 for the Ministry of Interior no results change; for the FSB all results of stand-alone regressions are confirmed, but also dummy republic is significant and negative; for the Prosecutor's Office territory and oil and gas lose significance, but there are no further changes. In 2000 for the Ministry of Interior population, for the FSB dummy Northern Caucasus and oil and gas loses significance, and there are no further changes, as there are no changes for the Prosecutor's Office. For the system of six equations we basically find the same as for two systems, with the exception of dummy republic for the FSB in 2000, which is once again insignificant, and for the FSB dummy border region in 2000 becomes significant and positive. To conclude, all results for words and deeds survive, as well as the “mixed” evidence for the combination of cautious and aggressive strategies.

<sup>23</sup> The regressions are not reported in this paper, but are available on request.

To start with, regardless of the specification (and also regardless of including the initial level of regional bias or not) in the regressions for the change of the level of the regional bias, crime rates are insignificant for the FSB re-appointments. It is to be expected, because the function of this agency is not to combat the ordinary crime, but rather to care for issues like espionage. What is more interesting is that crime rates have no influence on the re-appointments in the Ministry of Interior, which primarily focus is exactly to combat criminal activity. For the prosecutor's office crime rates are almost always significant and negative for the re-appointment decisions. This result suggests that the federal government used the appointments of administrators without regional connections also to reduce crime. Including the initial level of the regional bias does not change the results, and I also do not find any impact of controlling for the crime rates on the "words" and the "deeds" – so, the main message of this paper does not seem to be influenced by the problem described.

For the regressions for the actual level of the regional bias in 2000 crime rates are not significant and almost never influence the sign and significance of other variables, including the declarations for the Prosecutor's Office. Looking at the regional bias in 2007 one finds the negative association between the crime rates and the regional bias for the prosecutors – so, locally embedded prosecutors seem to be less efficient in combating crime (the reasons for that may vary from bureaucratic inertia to corruption), - but no other significant results. However, it is important to notice that the results for crime rates simply suggest the (partial) correlation, and not the causality of the link, and may be biased because of the endogeneity problem. The share of contradicting acts for the Prosecutor's Office is still significant and negative, but the declarations are now always significant and positive for all agencies and specifications (in ordered logit – in the OLS it is still only the Ministry of the Interior).

### 5.3 Interaction between words and deeds

So far I have assumed that the effects of actions and of policy choices (i.e., declarations made by regional elites and contradicting acts) do not interact with each other. However, it is highly plausible to assume that the reaction of the federal government on claims is somehow dependent on actions implemented by the regions and vice versa. Hence, to solve this problem I have included the interaction term between words and deeds (i.e. product of both variables) in the regressions of the *Table 1-3*.<sup>24</sup> Generally speaking, the result is straightforward: neither sign nor significance of words and deeds as such change in any manner, while the interaction term is insignificant. It may indicate that the federal government simply treats two aspects of the problem as clearly separated from each other, and therefore does not condition its responses (since the size of the coefficient of the contradicting acts in regressions (2) and (3) (and (7) and (8) respectively) is almost the same, this conclusion seems to be reasonable).

However, the really interesting point while introducing interaction is to look at how the sign and the significance of the effect changes over the sample. *Figure 4* summarizes the

---

<sup>24</sup> The regressions are not reported in this paper, but are available on request

marginal effect of declarations on re-appointment for the Ministry of Interior.<sup>25</sup> One can see that the effect is in fact significant and positive for small share of contradicting acts, while it is insignificant for large shares. In fact, one can claim that my results so far were mostly determined by the fact that the federal government through re-appointments increased the region bias for jurisdictions where the share of contradicting acts was anyway low. So, it looks like if “deeds” were friendly enough, Putin did not discourage the verbal aggression of the regional leaders by the re-appointments. But when the degree of actual devolution became strong enough, no effect of either words or deeds could be established.

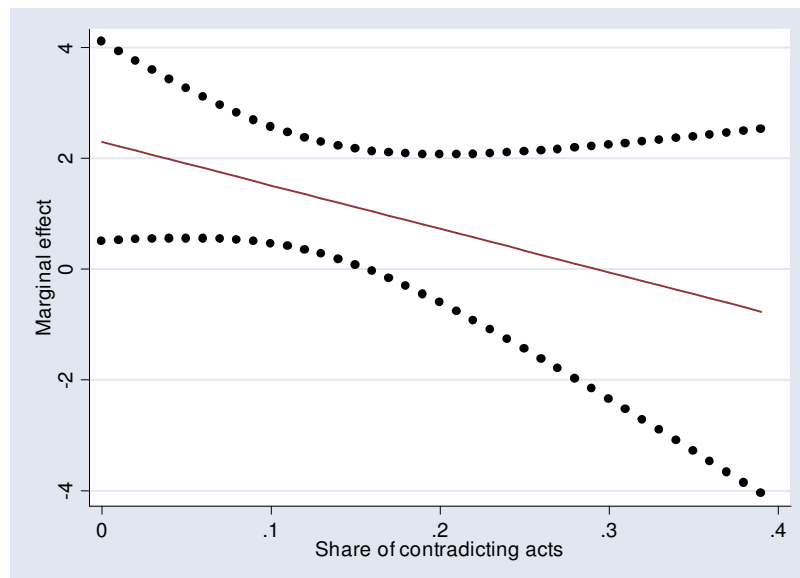


Figure 4: Marginal effect of the declarations conditional on the share of contradicting acts on the re-appointment decision for the Ministry of Interior

In the next stage I also added the interaction terms to the regressions for the actual level of regional bias in 2000 and 2007 and looked at how their presence influences the determinants of the initial regional bias. Here I indeed observe several changes in the results. First, for the regression of regional bias in the year 2000 declarations are now not significant for Prosecutor’s Office. However, for the Ministry of Interior I find significant and negative effect of the contradicting acts on the bias level, and the interaction term is positive and significant (in both OLS and ordered logit). Looking at the shifts of the significance bounds across the sample, one actually is forced to conclude that the effect is almost always not significant (*Figure 5*).

For the year 2007 neither the interaction terms, nor “deeds” are significant; declarations are significant and positive, as it has been the case without the interaction terms. From that point of view, the results of the *Tables 4* and *5* discussed above do not seem to be robust enough; but the major findings for the re-appointments, i.e. the change of the regional bias, did not experience any changes (although could be interpreted in a slightly different way).

<sup>25</sup> Note that the marginal effects are calculated for the OLS



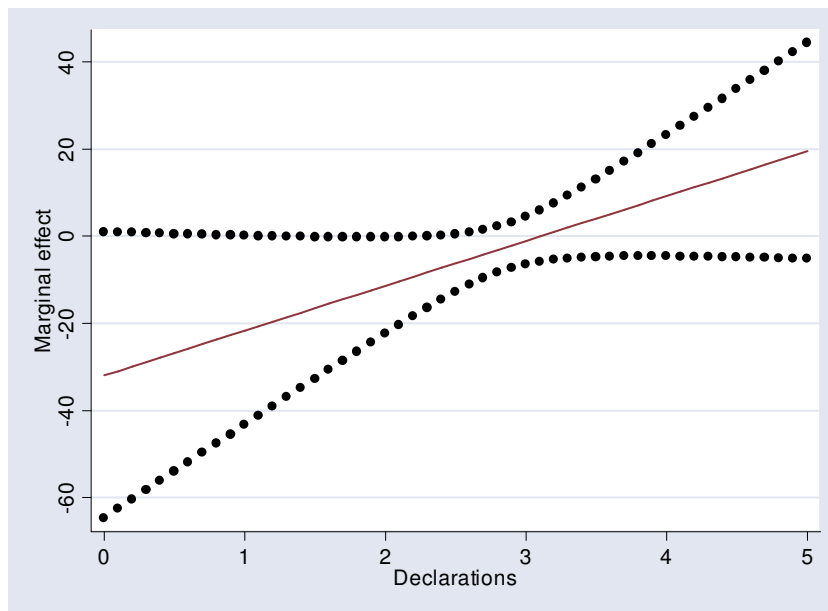


Figure 5: Marginal effect of share of contradicting acts conditional on the level of declarations on the level of the regional bias in the Ministry of Interior, 2000

Another possible form of interactions it might be interesting to explore is that between power and declarations. It is well imaginable that the federal government pays more attention to claims made by powerful regions, than just to claims in general. Unfortunately, as it has been shown above, we do not have a clear measure of “power”: hence, I have estimated re-appointment regressions from *Tables 1-3* interacting declarations each time with a different power variable: dummy republic, dummy border region, distance from Moscow, share of Russians, territory, population and oil and gas (hence, regressions were re-estimated seven times). I have re-estimated specifications with just “words” and “words and deeds” simultaneously. In addition, I have introduced an interaction term between power of the governor index and words and re-estimated a regression including these two variables (as well as “words” and “words and deeds” as well).<sup>26</sup>

For the police declarations remain significant and positive in almost all specifications (regardless of the estimation technique – OLS or ordered logit). Interaction terms are mostly not significant, but with the exception of the interaction between declarations and distance and declarations and territory, which are significant and *negative* (while declarations and distance / territory are often significant and positive). This is an interesting result: it implies that while federal government is “cautious” with respect to both “strong” and “publicly active” regions, if these two qualities are combined it becomes much more aggressive in the re-appointments. So, the federal government *does care* for whether the “strong” or the “weak” region is publicly threatening the central control – if it is weak, it may be “cheaper” to find a

<sup>26</sup> The results are not reported here but can be provided on request.

compromise (by appointing people from this region), while if it is strong, suppression (through appointments of outsiders) becomes more desirable.

For the FSB declarations are never significant, but the interaction terms are partly marginally significant and indicate the same effect: they are negative for the interaction with dummy republic and positive for the interaction with share of Russians (which, as indicated, while increasing shows a loss of bargaining power). For the Prosecutor's Office, on the contrary, I find a significant and positive effect of the interaction with territory and distance (and sometimes a negative and significant effect of the interaction with population). Declarations as such are significant and *negative* only in specifications, where interaction terms with distance are included. In this case one could claim to have observed the "opposite" effect: being generally speaking more "aggressive" towards regions with strong popular activity, the federal government "weakens" its attitude if the region is strong enough (specifically, far away from Moscow and hence more difficult to pressure and to control). Since the results are not robust, however, a conservative position would be not to "over-interpret" them.

The results of the interaction analysis for the re-appointment regressions for the change of the regional bias become somewhat more interesting if one re-estimates the model using a binary instead of an ordinal dependent variable: i.e. creating a dummy assigning 1 to all cases when the home bias increased and vice versa. In this case one still obtains a significant and positive effect of the declarations (at 1% level), but also a 5% level significant and positive effect of the share of contradicting acts and a negative and significant effect of the interaction term (I had to drop the dummy Northern Caucasus to avoid perfect prediction problem). This result is straightforward: declarations do matter, but their importance goes down if the share of violations of the federal law is increasing.

However, one should be of course aware of the fact that the interaction terms in the non-linear models are in many cases not so easy to interpret: simply looking at sign and significance of the interaction term does not suffice (see Ai and Norton 2003). I will use the approach suggested by Norton, Wang and Ai (2004) to correct for the possible misinterpretation and look at the significance and the sign of the interaction term for different prediction probabilities. One can see, however, that the marginal effect for low prediction probabilities is highly non-robust; for high prediction probabilities it is mostly negative, but, if one looks at the z-statistics, only marginally significant (*Figures 6 and 7*). To conclude, the results for the interaction terms should be interpreted with extreme caution (though the results could be driven by the small sample size and the predominance of regions with a reduction of the political bias).

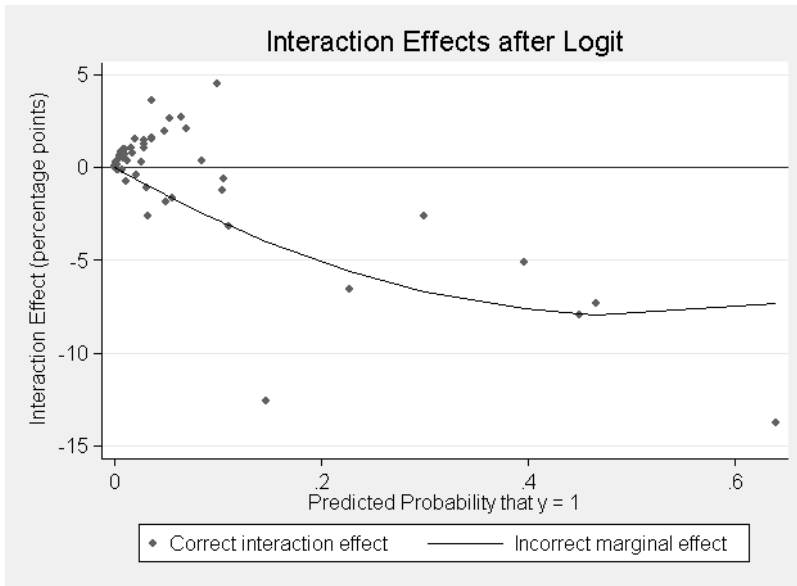


Figure 6: Marginal effect of the declarations conditional on the share of contradicting acts on the re-appointment decision for the Ministry of Interior, logit

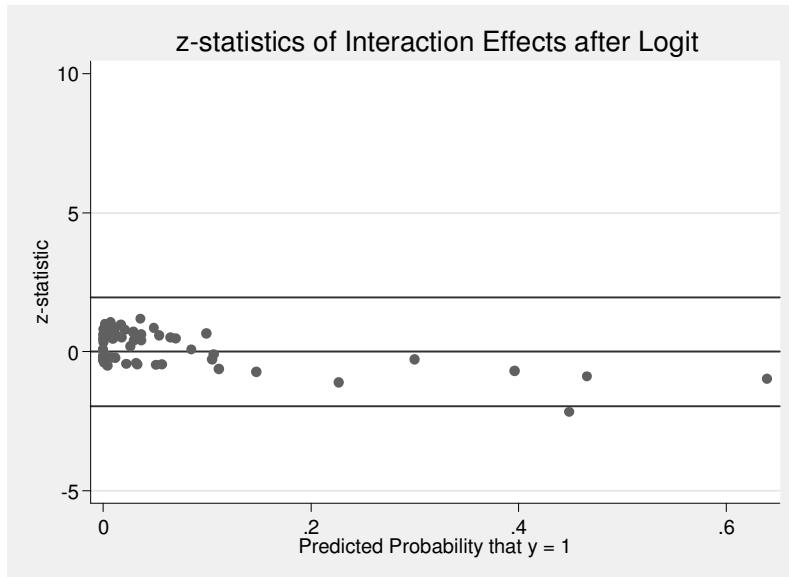


Figure 7: z-statistics for the Figure 6

## 5.4 “Red Belt” and appointment decisions

An additional concern regarding the results of this paper so far is that it ignores the differences in the relations between the Yeltsin government and the regional administrations. It is possible that in some regions governors were “aligned” to Yeltsin, and hence were able to achieve higher de-facto devolution even without any public declarations, while in other regions there were direct hostilities between the regional governors and the presidential office of Russia present. To check for this effect I include in the regressions the so-called “red belt” dummy, which accounts for the regions where towards the end of 1990s the governors were members of the Communist Party (and hence openly hostile to Yeltsin)<sup>27</sup> and re-estimate all regression from *Tables 1-3* and *4-5*.<sup>28</sup> I do not find any changes for other variables through including “red belt” in the re-appointment regression of the first three tables, where the dependent variable is the change of the level of the regional bias: “red belt” as such is almost never insignificant for all agencies. The results hence show that the re-appointments do not take the “old hostilities” between Yeltsin and governors into account. This is particularly interesting, because “red belt” is not correlated with share of contradicting acts and *negatively correlated* with declarations (Communist governors usually liked to represent themselves as “protectors of the national unity”, also because of party’s supposed chances to win federal elections and gain rents from that). Nevertheless, even including “red belt” and declarations in one regression does not ruin the results with respect to declarations.

However, in the regressions for the level of regional bias in 2000 and 2007 I also find no changes in terms of “words” and “deeds”. The red belt dummy is never significant under Yeltsin, but is significant and negative for the FSB appointments under Vladimir Putin. This is a surprising result: it looks like the presence of a Communist governor (even in the past – towards the second term of Vladimir Putin almost all former Communists turned into members of the presidential party *Edinaya Rossiya*) is reason enough for the federal government to impose stricter control on the local branches of the Federal Security Service. As I will show in what follows, this is not the only piece of evidence suggesting that the “shadows” of the past decisions seem to have impact on the politics in the Russian Federations.

## 5.5 Federal transfers

Re-appointment decisions are certainly an important tool of the federal government to influence regional political decisions, but of course not the only one: as already mentioned, federal government can provide (or withdraw) other benefits, particularly control over attractive assets and transfers, which can be used in exchange for restricting public declarations or

---

<sup>27</sup> The list is based on CIPKR (2003) and includes Krasnodar, Stavropol, Bryansk, Vladimir, Volgograd, Ivanovo, Kamchatka, Kursk, Orenburg, Riazan and Tula. It should be noted that there exists an alternative definition of the “red belt”, which includes regions with overproportional vote for the Communist Party at federal and regional elections. However, I opt to define the “red belt” by party affiliation of the governor, because it is more consistent with the idea that the re-appointments have to combat the de-facto decentralization, and not the electoral politics.

<sup>28</sup> The regressions are not reported in this paper, but are available on request

more cautious relation to passing acts contradicting the federal law. Therefore it seems to be reasonable to control for a variable measuring these benefits: a straightforward solution could be to include a measure of federal transfers to the regional budget in the regressions. Unfortunately, this variable is also highly endogenous: it is difficult to find out the causal link between transfers, “words” and “deeds” and reappointment decisions. Nevertheless, I have re-estimated the regressions of this paper, adding share of federal transfers in the total fiscal expenditures of the region.<sup>29</sup> For the regressions for the change in the regional bias between 2000 and 2007 and for the actual regional bias in 2007 I used the average share of transfers in 2000-2006; for the regressions for the regional bias in 2000 the average share for 1995-1999 was applied (given the availability of data); however, shares of transfers for both periods are highly (90.24%) correlated, and therefore this differentiation is unlikely to strongly influence the results.

However, fiscal transfers do not change the results for “words” and “deeds” in any regressions of the *Tables 1-5*;<sup>30</sup> they are, however, negative and significant just in the reappointments for the Federal Security Service. Here, once again, I find evidence of a rather “cautious” approach of the federal government, which was more eager to send its emissaries in “weak” regions, dependent on the federal center anyway. An alternative interpretation may be that the federal government was interested in stricter control over financial flows in these particular regions – but in this case it is more plausible to expect the federal government to focus on the Prosecutor’s Office than on the FSB, which is (usually) not directly involved in the fiscal control process. On the contrary, the finding could also indicate the desire of the influential representatives of the FSB (which had an important role in the Putin’s government) to place “their” people in regions with large federal fiscal flows to support their rent-seeking activities.

## 5.6 Stability of governors

Finally, the paper so far ignored an extremely important dimension, which in fact is crucial for the interpretation of the results: I have assumed that the federal government, while making re-appointment decisions in the 2000s, deals with the same regional leaders, which ruled in the 1990s, and hence, produced both public declarations and de-facto devolution. This is certainly not the case, because in many regions governors were replaced during the 1990s: therefore the differences between “words” and “deeds” can simply represent the distinction between the past and the current governor, and not some specific preferences of the federal government. To check for the impact of this factor, I excluded all regions where governor was re-appointed between 1993 (the year after the new constitution granting full power to the president after the dissolution of the former Supreme Soviet was passed) and 2000. Unfortunately, this measure is imperfect: it is possible, for example, that although the governor

---

<sup>29</sup> The regressions are not reported in this paper, but are available on request

<sup>30</sup> One of the reasons can be that the re-appointments are rather driven by the concerns for the regulatory, and not fiscal federalism, as discussed above. On the other hand, it is possible that the share of official transfers simply does not measure the “true” benefits provided to the regions, which may be more informal (e.g. privileges by privatization) – however, there is no data to corroborate these suggestions.

was replaced, his successor was strongly related to him and thus continues his policies, or (even more likely) the political regime in the region remains the same, and constant rules force different politicians to replicate similar policies. However, for the purpose of a quantitative test looking at regions without governor change (this group includes 33 regions in my sample) becomes a viable alternative. In addition, I also looked at the group with governor change (i.e. remaining regions) and compared the estimation results in both cases.<sup>31</sup>

Generally speaking, replicating regressions from the *Tables 1-3* for the group, without changes, I still confirm a significant and positive impact of declarations for the Ministry of Interior in almost all regression, but there is also a significant and negative impact of the “deeds” in all regressions now. When the initial level of the regional bias is included, the first result becomes more robust (and is now present in all regressions), while the second survives only in ordered logit. For the prosecutors’ re-appointments I now find negative and significant impact of the “deeds” even without the initial level. So, at the first glance the results seem to be supporting my previous predictions: if one looks just at the “relevant” group of regions ruled by the same governors, there is a relatively robust impact of declarations on the re-appointments in the Ministry of Interior. Impact of “deeds” for this agency is also observed, but is not robust to specification.

The results become more interesting if one looks at the group where the governor has been replaced for the same regressions (*Tables 1-3, B1-B2*). Here – contrary to any expectations – I also find a positive and significant impact of declarations, which is highly robust, for the Ministry of Interior. There is also some less robust evidence of the negative impact of “deeds” even for this agency. For the Prosecutor’s Office neither “words” nor “deeds” are now significant. From this point of view the results of this paper seem to be even more surprising: the federal government takes the declarations of the regional elites in the account, although the people who made them no longer rule the respective regions. Even more, as the *Table 5* above shows, declarations were particularly significant for the regional bias in 2007, long after the old governors were replaced. From that point of view it looks like politicians not just care about public declarations in the devolution process, but include them in their decision-making long time after they were made: “words” not just simply matter, but matter for a long period of time!

## 5.7 Alternative measures for the resources

A particular disadvantage of the specification I have used so far is that it virtually ignored the impact of other resources than oil and gas on the appointments. However, bargaining power is not necessarily associated with these resources: for example, non-ferrous metals in Krasnoyarsk (more specifically, Taimyr) or diamonds in Sakha are also an important factor. The problem is that measuring several different types of natural resources at once is a difficult task. One can take the share of mining in the regional GRP as a proxy, but in this case one may be mismeasuring the really interesting aspect of the bargaining power: for example, if in

---

<sup>31</sup> The regressions are not reported in this paper, but are available on request

a small region the share of mining is large, but also region's GRP is very small, no strong bargaining power is to be expected. Nevertheless, I have re-estimated the main regressions replacing oil and gas by one of the two variables suggested by Vainberg and Rybnikova (2006) to capture the resource potential of the region. The first one ranks all regions according to their coal, oil, gas and gold deposits. The second estimates the total value of the mineral deposits in the region.<sup>32</sup>

However, I do find virtually no significant impact of these two variables of re-appointment or on the appointments in the years 2000 and 2007 (with the exception of few specifications). In the re-appointment regressions, there is also almost no change for the significance of “words” and “deeds” for the police.<sup>33</sup> For the Prosecutor's Office, however, “deeds” become insignificant in the re-appointment decisions, even if controlling for the initial level of the regional bias (moreover, in the specification without initial regional bias declarations become significant and negative). There are also some minor changes in the regional bias regression for the year 2007.<sup>34</sup> Thus, the main message of the paper survives this adjustment.

## 5.8 Power-sharing treaties and alternative measures of the “deeds” and “words”

I have already mentioned that a particular problem of the empirical exercise as it has been implemented in this paper is to precisely capture the “words” and the “deeds”, i.e. symbolic actions and real redistribution of rents. It is possible that other symbolic actions were in fact more important for the behavior of the politicians than the public statements; or that the real redistribution of rents was not the implementation of acts contradicting federal law but other factors. Certainly, the range of these potential variables is very large to be sure that all of them have been captured in any specification; however, in this subsection I intend to experiment with yet another variable of interest – dummy for regions signing a power-sharing treaty with the federal government in the 1990s. It is well known that during the Yeltsin period regional governments often claimed additional rights not just through unilateral actions, but also through bilateral agreements with the federal administration, which have been signed by about a half of all jurisdictions. Under Putin most of these acts were abolished by 2002. So, it is interesting to know whether power-sharing treaties had any impact on the appointment policies.

Unfortunately, using this variable is not entirely straightforward. To start with, only a tiny fraction of all agreements has been reported; many have been signed by individual agencies in the federal and regional governments and are very difficult to trace. Moreover, the content of agreements differs substantially: while earlier acts (for example, those signed by Tatar-

---

<sup>32</sup> The regressions are not reported in this paper, but are available on request.

<sup>33</sup> Declarations become insignificant in specification (5), and remain significant in specifications (3), (B3) and (B5), but the significance level goes down

<sup>34</sup> In the regression for 2007 and both groups of natural resources “deeds”, as well as “words” – only in ordered logit for the FSB - become insignificant.

stan and Bashkortostan) implied relatively high decision-making autonomy, further acts of the second half of the 1990s were all very similar to each other, did not grant the regions substantial autonomy and in many cases simply declared federal government’s “recognition” of the importance of the region (cf. Obydenkova, 2008). No clear distinction between these two groups is possible: so, basically, the existence of a power-sharing treaty may be referred under both categories of “words” (recognized claim of the regional government of its relevance) and “deeds” (re-distribution of authorities). In this paper I simply added to the set of covariates a dummy for all regions, which had a power-sharing agreement with the federal government in the early 2000s.<sup>35</sup>

First, simply adding this dummy does not change any results for the declarations and the share of contradicting acts in the re-appointment regressions (with and without regional bias), but also has virtually no impact on the appointment regressions in 2000 and 2007 (just in specification (41) declarations become insignificant). So, the story used so far seems to survive inclusion of this factor. Second, the dummy power sharing as such is significant and negative for the Ministry of Interior in the re-appointment regressions of *Table 1*; this effect disappears if one controls for the initial level of the regional bias. For the Federal Security Service and the Prosecutor’s Office no influence was established. For the regional bias of the year 2000 I was not able to find any significant relation between the power-sharing agreements and the regional bias; in 2007 it has been negative and significant for the Federal Security Service in OLS and for the Prosecutor’s Office in OLS and ordered logit. To conclude, the results seem to be not robust, and therefore difficult to interpret. Once again, it seems like inclusion of this control supports the main claims made in this paper so far.

## 5.9 Electoral considerations

Although Russia is very far from any established democratic standards, yet another aspect of “deeds” possibly considered by the federal government could be related to elections. Specifically, I am referring to the electoral campaign of 1999. During the last years of the Yeltsin’s presidency (i.e. 1998-1999) a group of powerful regional governors formed a coalition aiming to influence the succession procedure and the federal decision-making; this coalition became the basis of the Otechestvo-Vsia Rossiya (OVR, Fatherland – All Russia) block headed by the former Prime Yevnegiy Primakov, which demonstrated realistic ambitions to become the new president after Yeltsin. On the other hand, yet another group of Russian elites (supposedly closer to Boris Yeltsin himself) formed an alternative coalition, which also received support of several regional governors (although mostly from weaker regions more dependent from federal transfers), and formed the basis of the MEDVED block (which supported the alternative successor candidate, Vladimir Putin). Both coalitions competed in the parliamentary elections of 1999, which eventually resulted into the MEDVED’s relative success, therefore providing power basis for the following Putin’s accession to the presidency. The results of the elections in individual regions seem to have been strongly influenced by the affiliation of regional governors either for OVR or MEDVED: the most prominent examples

<sup>35</sup> The regressions are not reported in this paper, but are available on request



are Ingushetia (a North Caucasian republic affiliated with OVR), where OVR received the majority of more than 80% of the votes (with MEDVED accounting for about 1%) and Tyva (in the Southern Siberia), where OVR obtained about 3% of the votes with more than 70% share of MEDVED.

Following Putin's accession to power, MEDVED and OVR merged, providing the basis for the current ruling party Edinaya Rossiya. However, OVR seems to have represented a very realistic threat to Putin from a group of governors, and hence could have influenced the re-appointment considerations. Hence, I have re-estimated the regressions of *Tables 1-3* including three additional controls: share of the OVR votes in 1999, share of the MEDVED votes in 1999, as well as share of the votes for the Communist Party (the traditional opponent of the Russian government) in 1999.<sup>36</sup> To start with, the results for the "words" and the Ministry of Interior are confirmed: the variable is still significant and positive (regardless of whether I include in addition the initial regional bias or not). For the FSB still no significant effect was found; for the Prosecutor's Office "deeds" are marginally significant and negative in ordered logit even without initial regional bias. So, the results reported survive the additional controls.

As for the significance of these controls as such, the elections do not matter for the Ministry of Interior and Prosecutor's Office reappointment, but have a strong effect on the FSB decisions (which is, however, just marginally significant). Surprisingly, all three variables have a negative and significant sign. Hence, once again, federal government seems to "mix" the strategies: re-appointments influence both "loyal" MEDVED regions, as well as regions with large Communist' and OVR share. Thus, this additional finding of combining "search for scapegoats" and "restrictions for powerful players" is confirmed for these electoral aspects as well.

---

<sup>36</sup> The regressions are not reported in this paper, but are available on request. Russian elections during this period used a mixed system with half of the parliament elected through party lists, and half consisting of representatives of individual geographical districts, so I provide the data just for the half of the parliament elected through a proportional system (since in this case partisan preferences are more obvious). In addition, please note that through the timing of events reverse causality is impossible: the elections took place in 1999, and the re-appointments started in 2000 (and hence could take the results of the elections into consideration).

## 6 Conclusion

The aim of this paper was to look at the appointment policies in the territorial divisions of Russian security agencies between 2000 and 2007 in order to understand the relative importance of real re-allocation of resources and of “symbolic gestures” of regional governments. Surprisingly (for the economics point of view), a robust result of the paper is that “symbols” play a more important role than “rents” – even in a non-democracy like Russia, where electoral concerns play a limited role. In fact, the Russian federal government seems to have a particularly “long memory” regarding the declarations of regional elites: they seem to matter even after the governors, who made them, are long gone. The last result should be treated with caution: it is possible that what I capture are simply declarations after 1995, which are correlated with the past declarations (and could theoretically be made even by different governors – but it would require a lot of continuity between regional administrations). The paper finds that declarations of regional elites have a significant and robust impact on re-appointments in the Ministry of Interior. For the Prosecutor’s Office (oversight of other security agencies and criminal investigation) I find a more expected evidence of specific focus on “deeds” instead of “words”; however, the result is less robust from the point of view of specification; moreover, although the variable is always significant, it also changes sign, what makes interpretation problematic. Finally, for the Federal Security Service neither “words” nor “deeds” seem to matter; however, this agencies seems to be least “captured” in the 1990s and hence relatively unaffected by the Putin’s reforms.

This result is interesting from several points of view. First, it provides some evidence that in the devolution and secession conflicts parties pay even greater attention to the symbolic gestures of their opponents than to the real distribution of rents. It may driven by the preferences and ego-rents, or by the feat of the “contagion” of the secession and decentralization and its influence on the perception of third parties. Hence, concentration on redistributive consequences of devolution is insufficient to explain the patterns of decentralization and their divergence in different countries: it may be even more important to look at how the devolution process is framed in a particular situation. Moreover, since it is often more difficult to find a compromise for “symbols” than for the rents, the importance of the declarations is relevant to understand the difficulty of the devolution conflicts. In this case introducing transfers between regions (what is probably the standard attempt in economics to make a mechanism incentive-compatible) does not solve the problem of the conflicts over decentralization: the key issue may be to find common ground for the symbolic gestures.

In addition, as mentioned the results may have a more general meaning outside the analysis of devolution, and contribute to the understanding of the role of non-credible threats in bargaining. A claim which probably most political economists will share is that in negotiations arguments of parties matter only if they are credible. If a threat of a participant in negotiations is certainly non-credible (for example, because information on her endowment or other actions is available), one would hardly expect her opponents to react on that (Houba and Bolt, 2002).<sup>37</sup> It is however quite difficult to relate this findings to the real world behavior,

<sup>37</sup> However, in the laboratory settings it has been shown that cheap talk can effectively influence the behavior of the parties even if the verbal threat cannot be verified and that lies about private information *can* influence economic behavior of parties (Crosson et al., 2003; Tingley and Walter, 2008), although other experiments

simply because in the non-experimental situations the knowledge of the “rules of the game” played in a particular situation is highly imperfect. Stated otherwise, any supposedly “non-credible” threat influencing political behavior in bargaining situations could simply represent extreme loss aversion of the bargaining partners, which intend to avoid even the smallest possible risk. In order to properly test the relevance of non-credible threats in a non-experimental setting it would probably be nice to have a case when both threats *and* realizations of behavior of the bargaining party are observed to the other party: this is exactly the case in the setting of this paper, if declarations of elites are interpreted as *threats* and the share of contradicting acts as *realization of these threats*. In 2000 the presidential administration could immediately assess the credibility of these threats made in the first half of the 1990s simply observing the subsequent behavior of regional governors.<sup>38</sup>

In this case one could say that the paper shows not just the importance of claims made by political agents in negotiations, but that even if they are non-credible (i.e. declarations of the elites are not followed by real devolution decisions) they still matter for the parties – because, as discussed, they may have preferences over the *content* of communication, and not just over *actions* of players. Since time-inconsistency belongs to the main explanations of suboptimality of economic decision-making in the current literature (Dixit and Romer, 2006), this modification becomes particularly important: if agents “like” and “dislike” what politicians “promise to them” per se (regardless of what is actually done), making a time-inconsistent claim may be still relevant for politics. However, this interpretation of the results of this paper probably assumes “too much”, especially because, as I mentioned, the findings are present not just in the subsample of regions ruled by the same governors (as it would be expected), but also when the governors who made the declarations in the first half of the 1990s were often replaced during the subsequent years. Moreover, it is difficult to clearly justify the link between declarations and policies: the former could have resulted in other actions than simply re-arrangements of the regional legislation (for example, by providing access to federal subsidies and grants), and then there is no clear reason to believe that the share of contradicting acts indeed captures all the realizations of a threat. Nevertheless, the importance of “words” over “deeds” still remains an interesting finding.<sup>39</sup>

---

suggest absent effect of cheap talk (Forsyth et al., 1991). In other social sciences social constructivists argue that the actions of participants in negotiations may in fact be driven by the conformity to the permanently changing social norms, which could make even non-credible threats relevant for negotiations (Risse, 2000).

<sup>38</sup> Which, as already mentioned, has also been known to the federal administration by the definition of the respective variable – based on the reports of the Ministry of Justice.

<sup>39</sup> It should be noted that so far interpreting the results of my paper I avoided using the term “reputation” to describe either “words” or “deeds”. Reputation is a central concept for the discussion of non-credible claims, and of course the decisions discussed are related to reputation formation (which can also explain this long-lasting “institutional memory”). However, reputation obviously relates to both claims and actions of the agents: the advantage of this paper is not just that we look at the political reactions on the decisions of the opponents in the past (and therefore show whether the politicians “remember” what happened then), but we also disentangle “reputations” based on just public claims and on just observable actions – what is, in my opinion, an interesting exercise.

From this perspective the paper is also related to the empirical literature on the credibility of political commitments, for example, in the electoral competition (see Elinder et al., 2008, p. 12, for a survey). However, unlike these studies, I am not interested in whether promises are fulfilled: but rather intend to understand the reaction of one of the bargaining parties on promises made by the other party. In this respect the paper relates to the study of Elinder et al (2008), who show that in Swedish elections voters respond to the campaign promises, but not to the later implementation of the reforms. However, the results of this paper are much more extreme. First, I study the bargaining between politicians and bureaucrats, and not the public voting. Second, for Sweden (as well as for several other developed countries) there is arguably a large share of promises which are fulfilled; so, the voters act prospectively (and to some extent capitalize the future gains already during the voting stage). In the setting of this paper the federal government is *already aware of* the fact that promises were not fulfilled and still reacts on them – and it calls for a different explanation, like “preference regarding the content of communication” discussed above. In fact, although both papers conclude that “words” matter, their theoretical interpretation is very different: Elinder et al. (2008) find out that voters, often expected to base their reaction on rational ignorance, emotions and uncertainty, are in fact very much able to “capitalize” the future gains in the present decisions, while I show that bureaucrats and politicians, arguably very careful when making decisions for crucial appointments, pay more attention to what people say than to what they do.

One should notice though that some robustness checks call for slight adjustments in the interpretation of the results. First, for the Ministry of Interior it looks like federal government takes “words” into account just for regions with weak “actual” devolution (measured by deeds); this subsample actually drives the results. Second, federal government had different attitude towards “powerful” regions with active public position and “weak” regions with high “words” indicators: while in the former case it preferred appointing “outsiders”, in the latter case it appointed “local” representatives. Hence, what one actually has to deal with is a more complex interactions between “words”, “deeds” and power of the region, and therefore the effect could be more subtle. However, it does not change the main message of the relevance of “just” verbal communication not supported by actual devolutionary activity in bargaining.

In addition, the paper showed that, although the generally declared aim of the re-appointment policy of the federal government in Russia was to strengthen federal control over regional bureaucracies, the influence of factors determining bargaining power of regions on appointments partly provides mixed evidence: the central government seems to be more aggressive in appointing bureaucrats in “weak regions” and more cautious in “strong regions”, which theoretically should become the center of re-appointment policies. As mentioned above, central control over appointment policies may result in re-evaluation of the degree of decentralization achieved in a particular country. The claim that Russia became more centralized in the 2000s – partly because of increasing control of the federal center over regional bureaucracy – is currently accepted by most students of federalism. However, this paper shows that even in this environment the federal appointment policy should not be overestimated – and that even in spite of general centralization trend strong regions could maintain their bargaining position in the federation. Hence, even highly centralized federations with announced centralization intentions of leading political actors, may in fact provide substantial autonomy for influential regions, simply increasing centralization in the rest of the country -

and therefore the task of measuring decentralization and devolution for empirical research becomes even more challenging.

## Literature

- Ai, Chunrong, and Edward C. Norton (2003): Interaction Terms in Logit and Probit Models. *Economics Letters* 80:123-129
- Abbink, Klaus, and Jordi Brandts (2007): Political Autonomy and Independence: Theory and Experimental Evidence. Mimeo
- Arzaghi, Mohammad, and J. Vernon Henderson (2005): Why Countries Are Fiscally Decentralizing. *Journal of Public Economics* 89:1157-1189
- Bai, Chong-En, Tao, Zhigang, and Yueting Sarah Tong (2008): Bureaucratic Integration and Regional Specialization in China. *China Economic Review* 19:308-319
- Blume, Lorenz, and Stefan Voigt (2008): Federalism and Decentralization – A Critical Survey of Frequently Used Indicators. MAGKS Working Paper No. 21
- Buchanan, James M., and Roger L. Faith (1987): Secession and the Limits of Taxation: Towards a Theory of Internal Exit, *American Economic Review* 77:1023-1031
- CIPKR (2003): Vybory-2003: Regional'nyi Aspekt. Mimeo
- Crosson, Rachel, Boles, Terry, and J. Keith Murnighan (2003): Cheap Talk in Bargaining Experiments: Lying and Threats in Ultimatum Games. *Journal of Economic Behavior and Organization* 51:143-159
- Dixit, Avinash, and Thomas Romer (2006): Political Explanations of Inefficient Economic Policies – An Overview of Some Theoretical and Empirical Literature. Mimeo
- Dowley, Kathleen M. (1998): Striking the Federal Bargain in Russia: Comparative Regional Government Strategies. *Communist and Post-Communist Studies* 31:359-380
- Elinder, Mikael, Jordahl, Henrik, and Panu Poutvaara (2008): Selfish and Prospective: Theory and Evidence of Pocketbook Voting. IZA Discussion Paper No. 3763
- Enikolopov, Ruben, Zhuravskaya, Ekaterina, and Sergei Guriev (2002): Rossiiskiy Federalism: Scenarii Razvitiya. Mimeo
- Feld, Lars P., Schaltegger, Christoph, and Jan Schnellenbach (2008): On Government Centralization and Fiscal Referendums. *European Economic Review* 52(4):611-645
- Gel'man, Vladimir (2006): Vozvrasheniye Levafana? Politika Recentralizatsii v Sovremennoi Rossii. *POLIS* (2):90-109
- Forsythe, Robert, Kennan, John, and Barry Sopher (1991): An Experimental Analysis of Strikes in Bargaining Games with One-Sided Private Information. *American Economic Review* 81(1):253-278
- Horowitz, Ruth, and Gary Schwartz (1974): Honor, Normative Ambiguity and Gang Violence. *American Sociological Review* 39(2):238-251
- Houba, Harold, and Wilko Bolt (2002): Credible Threats in Negotiations: A Game-Theoretic Approach. Springer
- Jarocinska, Elena (2004): Determinants of Intergovernmental Transfers in Russia: Political Factors versus Objective Criteria. Mimeo

- Kahn, Jeffrey, Trochev, Alexei, and Nikolai Balayan (2009): The Unification of Law in the Russian Federation. *Post-Soviet Affairs* 25(4):310-346
- Levitt, Stephen, and Sudhir Alladi Venkatesh (2000): An Economic Analysis of a Drug-Selling Gang's Finances. *Quarterly Journal of Economics* 115(3):755-789
- Libman, Alexander (2010): Constitutions, Regulations, and Taxes: Contradictions of Different Aspects of Decentralization. *Journal of Comparative Economics*, forthcoming
- Libman, Alexander, and Lars P. Feld (2009): Strategic Tax Collection and Fiscal Decentralization: The Case of Russian Regions. Mimeo
- Liscow, Zachary D. (2007): Why Didn't the North Let the South Secede? Evidence of Economic Motivations from Presidential Elections Data. Mimeo
- Norton, Edward C., Wang, Hua, and Chunrong Ai (2004): Computing Interaction Effects and Standard Errors in Logit and Probit Models. *Stata Journal* 4(2):154-167
- Obydenkova, Anastassia (2008): *Democratization, Regionalization and Europeanization in Russia: Interplay of National and Transnational Factors*. Saarbrücken: VDM Verlag
- Panizza, Ugo (1999): On the Determinants of Fiscal Centralization: Theory or Evidence. *Journal of Public Economics* 74:93-139
- Petrov, Nikolai (2009): Nasledie Imperii I Regionalism. In: Miller, A. (ed.): *Nasledie Imperiy I Budushee Rossii*. Moscow: NLO
- Polishchuk, Leonid (2001): Legal Initiatives of Russian Regions: Determinants and Effects, in: Murrell, P. (ed.): *The Value of Law in Transition Economies*, University of Michigan Press, Ann Arbor: 330-368
- Popov, Vladimir (2004): Fiscal Federalism in Russia: Rules versus Electoral Politics. *Comparative Economic Studies* 46:515-541
- Risse, Thomas (2000): Let's Argue! Persuasion and Deliberation in International Relations. *International Organization* 54(1):1-39
- Ross, Cameron (2003): Putin's Federal Reforms and the Consolidation of Federalism in Russia: One Step Forward, Two Steps Back! *Communist and Post-Communist Studies* 36: 29-47
- Rozmarinsky, I. (2004): Postkeinsinaskaya Model' Cheloveka I Khosyastvennoe Povedenie Rossiyan v 1990-e Gody. *Ekonomicheskii Vestnik RSU* 3(1):62-73
- Sheng, Yumin (2007): Global Market Integration and Central Political Control: Foreign Trade and Intergovernmental Relations in China. *Comparative Political Studies* 40(4): 405-434
- Solnick, Steven L. (2002): Federalism and State-Building: Post-Communist and Post-Colonial Perspectives. In: Reynolds, A. (ed.): *The Architecture of Democracy: Constitutional Design, Conflict Management, and Democracy*. Oxford University Press
- Tingley, Dustin, and Barbara Walter (2008): Can Cheap Talk Help Build Reputations? An Experimental Analysis. Mimeo
- Treisman, Daniel S. (1996): The Politics of Intergovernmental Transfers in Post-Soviet Russia. *British Journal of Political Science* 26:299-335

- Treisman, Daniel S. (1998): Fiscal Redistribution in a Fragile Federation: Moscow and the Regions in 1994. *British Journal of Political Science* 28: 185-222
- Treisman, Daniel S. (1999): *After the Deluge: Regional Crises and Political Consolidation in Russia*. Ann Arbor: University of Michigan Press
- Vainberg, Anna, and Tatyana Rybnikova (2006): Institucional'nye i Geograficheskie Faktory Razvitiya Regionov Rossii. Mimeo
- Voronov, Vladimir (2005): Mentologiya Dvadtsat' Pervogo Veka. *Novoe Vremya*, August 7
- Young, Robert (2004): Secession as Revolution. *Homo Oeconomicus* 21(2): 373-395



## Appendix A: Data

**Table A1: Summary statistics**

Variable	Obs	Mean	Std. Dev.	Min	Max
Change in regional bias (FSB)	83	-0.42	1.11	-3.00	2.00
Change in regional bias (Ministry of Interior)	79	-1.34	1.62	-3.00	3.00
Change in regional bias (prosecutor's office)	84	-0.74	1.73	-3.00	3.00
Contradicting acts	88	0.10	0.05	0.00	0.31
Crime rates	87	2123.10	611.15	365.00	3537.57
Declarations	88	2.82	0.50	1.60	4.33
Democracy (1995-1999)	88	27.57	6.24	14.00	45.00
Democracy (2000-2006)	84	28.80	6.31	17.00	45.00
Distance from Moscow	88	2.64	2.93	0.00	12.87
Dummy border region	88	0.42	0.50	0.00	1.00
Dummy Northern Caucasus	88	0.08	0.27	0.00	1.00
Dummy power sharing treaty	88	0.52	0.50	0.00	1.00
Dummy Red Belt	88	0.13	0.33	0.00	1.00
Dummy republic	88	0.23	0.42	0.00	1.00
Fiscal transfers (1995-1999)	88	0.23	0.18	0.01	0.75
Fiscal transfers (2000-2006) <sup>40</sup>	88	0.29	0.20	-0.04	0.83
Regional bias (FSB, 2000)	86	0.79	1.27	0.00	3.00
Regional bias (FSB, 2007)	83	0.40	0.99	0.00	3.00
Regional bias (Ministry of Interior, 2000)	88	2.26	1.18	0.00	3.00
Regional bias (Ministry of Interior, 2007)	79	1.03	1.40	0.00	3.00
Regional bias (Prosecutor's Office, 2000)	88	1.75	1.46	0.00	3.00
Regional bias (Prosecutor's Office, 2007)	84	1.07	1.40	0.00	3.00
Natural resources I	78	33.08	12.67	3.00	42.00
Natural resources II	78	5.40	1.06	2.00	6.00
Oil and gas (1995-1999)	88	0.02	0.10	0.00	0.79
Oil and gas (2000-2006)	84	0.02	0.11	0.00	0.79
Population (1995-1999)	88	1.68	1.51	0.02	8.55
Population (2000-2006)	84	1.73	1.57	0.04	9.88
Power of governors	88	7.00	0.69	5.70	8.50
OVR share	88	10.74	11.93	2.24	87.98
MEDVED share	88	26.76	8.94	1.04	70.8
Communist Party share	88	24.27	8.43	1.82	42.13
Share of Russians	88	0.75	0.24	0.01	0.97
Territory	88	0.23	0.46	0.00	3.10

<sup>40</sup> Negative transfers were reported in several years by the Khanty-Mansy district, which is the main source of the Russian oil exports and at the same time as unit subordinate to yet another constituent of the federation (Krasnoyarsk) subject to a specific budgeting procedure.

**Table A2: Description of variables**

Name	Description	Period	Source
Change in regional bias (FSB)	Regional bias (FSB) in 2007 minus regional bias (FSB) in 2000	2000-2007	Petrov, 2009
Change in regional bias (Ministry of Interior)	Regional bias (Ministry of Interior) in 2007 minus regional bias (Ministry of Interior) in 2000	2000-2007	Petrov, 2009
Change in regional bias (Prosecutor's Office)	Regional bias (Prosecutor's Office) in 2007 minus regional bias (Prosecutor's Office) in 2000	2000-2007	Petrov, 2009
Communist Party share	Share of votes for the Communist Party in State Duma elections 1999	1999	Central Electoral Committee, IRENA database
Contradicting acts	Number of acts assessed as contradicting the federal legislation over total number of acts assessed as either contradicting or conforming the federal legislation	2006	Ministry of Justice
Crime rate	Number of crimes per 100,000 inhabitants of the region	2000-2006	Goskomstat <sup>41</sup>
Declaration	Index of declaration of regional elites in 1991-1995 based on count of events, e.g. statements of sovereignty of the region, requests to reallocate powers in the federation etc. The higher value of index represents a greater support of decentralisation	1995	Dowley, 1998
Democracy	Index of democratisation of the region, estimated by the experts of the Carnegie Centre in Moscow. The higher value of index represents a higher degree of democratisation; annual data averaged over two time periods. For 2005-2006 value for 2004 is used	1991-2004	Carnegie Centre and Independent Institute for Social Policy
Distance from Moscow	Distance between the capital of the region and Moscow, thousands of km, 0 for Moscow and Moscow oblast, identical for St. Petersburg and St. Petersburg oblast	n.a.	Goskomstat
Dummy border region	1 if the region has a border to any state outside the Russian Federation, 0 otherwise	n.a.	Own estimation

<sup>41</sup> Goskomstat refers to the Russian federal statistical agency

Name	Description	Period	Source
Dummy Northern Caucasus	1 for Stavropol, Adygeia, Dagestan, Ingushetia, Kabardino-Balkaria, Karachaevo-Cherkessia and Northern Ossetia, 0 otherwise	n.a.	Own estimation
Dummy power-sharing agreement	1 if there was a power-sharing agreement in force by 2000, 0 otherwise		Garant, own estimation
Dummy Red Belt	1 if the region had a Communist governor in 1999, 0 otherwise	1999	CIPKR, 2003
Dummy republic	1 if the region has the status of a republic, 0 otherwise	n.a.	Own estimation
Fiscal transfers (1995-1999)	Average share of fiscal transfers from other budgets to the total budget expenditures of the region in 1995-1999	1995-1999	Ministry of Finance; State Treasury
Fiscal transfers (2000-2006)	Average share of fiscal transfers from other budgets to the total budget expenditures of the region in 2000-2006	2000-2006	Ministry of Finance; State Treasury
MEDVED share	Share of votes for MEDVED in State Duma elections 1999	1999	Central Electoral Committee, IRENA database
Natural resources I	Ranking of regions from 1 (highest resources) to 42 (lowest resources) based on the deposits of oil, gas, coal and gold	1998	Vainberg and Rybnikova, 2006
Natural resources II	Ranks regions from 1 (highest resources) to 6 (lowest resources) depending upon the value of their explored natural resource deposits (USD)	1996	Vainberg and Rybnikova, 2006
Oil & gas share	Average share of oil extraction in the region in the total oil extraction in Russia plus share of the gas extraction in the region to the total gas extraction in Russia over two; annual data averaged over two time periods	1995-1999; 2000-2006	Goskomstat
OVR share	Share of votes for OVR in State Duma elections 1999	1999	Central Electoral Committee, IRENA database
Population	Average population of the region, mln. people; annual data averaged over two time periods	1995-1999; 2000-2006	Goskomstat
Power of governors	Index of power of regional governors, based on data like years in office, share on regional elections, control of parliament etc. The higher value of index represents a higher influence of regional governor.	1995-2000	Jarocinska, 2004

<b>Name</b>	<b>Description</b>	<b>Period</b>	<b>Source</b>
Regional bias (FSB)	Index of connections between director of regional FSB office and the region, from 0 to 3, 0 = no connections, 3 = strong connections	2000; 2007	Petrov, 2009
Regional bias (Ministry of Interior)	Index of connections between director of regional Ministry of Interior office and the region, from 0 to 3, 0 = no connections, 3 = strong connections	2000; 2007	Petrov, 2009
Regional bias (Prosecutor's Office)	Index of connections between director of regional Prosecutor's Office office and the region, from 0 to 3, 0 = no connections, 3 = strong connections	2000; 2007	Petrov, 2009
Share of Russians	Share of ethnic Russians in the region's population	2002	Russia's Census, 2002
Territory	Territory of the region, mln. sq.km, 0 for Moscow and St. Petersburg	n.a.	Goskomstat

**Appendix B: Convergence of regional bias**

**Table B1: Personnel appointment for the Ministry of Interior, dep.var.: difference in regional bias index between 2000 and 2007, initial regional bias included**

	(B1) OLS	(B2) OLS	(B3) OLS	(B4) OLS	(B5) OLS	(B6) Ordered logit	(B7) Ordered logit	(B8) Ordered logit	(B9) Ordered logit	(B10) Ordered logit
<b>Regional bias 2000</b>	<b>-0.694***</b> (0.125)	<b>-0.691***</b> (0.124)	<b>-0.708***</b> (0.124)	<b>-0.694***</b> (0.126)	<b>-0.709***</b> (0.125)	<b>-1.172***</b> (0.216)	<b>-1.177***</b> (0.216)	<b>-1.403***</b> (0.272)	<b>-1.169***</b> (0.214)	<b>-1.401***</b> (0.270)
<b>Dummy republic</b>	<b>-1.234***</b> (0.401)	<b>-1.334***</b> (0.390)	<b>-2.546***</b> (0.489)	<b>-1.233***</b> (0.404)	<b>-2.549***</b> (0.490)	<b>-1.589*</b> (0.842)	<b>-1.828**</b> (0.835)	<b>-5.094***</b> (1.446)	<b>-1.591*</b> (0.827)	<b>-5.091***</b> (1.444)
<b>Dummy border region</b>	<b>-0.586*</b> (0.327)	<b>-0.600*</b> (0.325)	-0.416 (0.327)	<b>-0.586*</b> (0.326)	-0.419 (0.328)	<b>-0.946*</b> (0.555)	<b>-0.956*</b> (0.556)	-0.657 (0.593)	<b>-0.939*</b> (0.552)	-0.648 (0.590)
<b>Distance from Moscow</b>	-0.020 (0.058)	-0.036 (0.064)	-0.081 (0.056)	-0.021 (0.058)	-0.080 (0.055)	-0.026 (0.102)	-0.062 (0.112)	-0.158 (0.122)	-0.037 (0.099)	-0.164 (0.120)
<b>Share of Russians</b>	<b>-2.985***</b> (0.952)	<b>-2.916***</b> (0.959)	<b>-1.722*</b> (1.018)	<b>-2.980***</b> (1.013)	-1.746 (1.078)	<b>-4.411**</b> (1.963)	<b>-4.290**</b> (1.988)	-2.582 (1.682)	<b>-4.242**</b> (2.032)	-2.522 (1.749)
<b>Territory</b>	0.170 (0.545)	0.188 (0.562)	0.244 (0.534)	0.169 (0.560)	0.251 (0.550)	0.182 (0.994)	0.234 (1.057)	0.320 (0.974)	0.135 (0.949)	0.301 (0.959)
<b>Population (2000-2006)</b>	0.071 (0.097)	0.072 (0.097)	0.059 (0.085)	0.070 (0.100)	0.061 (0.090)	0.060 (0.148)	0.070 (0.148)	0.050 (0.133)	0.042 (0.153)	0.042 (0.143)
<b>Oil and gas (2000-2006)</b>	<b>-2.962**</b> (1.194)	<b>-2.976**</b> (1.170)	<b>-4.223***</b> (1.324)	<b>-2.969**</b> (1.225)	<b>-4.197***</b> (1.369)	<b>-8.318***</b> (2.601)	<b>-7.900***</b> (2.653)	<b>-15.260***</b> (4.475)	<b>-8.680***</b> (2.647)	<b>-15.415***</b> (4.618)
<b>Democracy (2000-2006)</b>	0.020 (0.032)	0.020 (0.032)	0.004 (0.032)	0.020 (0.034)	0.004 (0.033)	0.044 (0.050)	0.045 (0.049)	0.028 (0.057)	0.039 (0.053)	0.025 (0.059)
<b>Dummy Northern Caucasus</b>	0.578 (0.653)	0.569 (0.657)	<b>1.292**</b> (0.636)	0.579 (0.661)	<b>1.290**</b> (0.643)	1.077 (1.248)	1.098 (1.249)	<b>2.952**</b> (1.197)	1.123 (1.265)	<b>2.954**</b> (1.193)
<b>Contradicting acts</b>		2.283 (2.851)	2.280 (2.635)		2.251 (2.606)		4.848 (4.527)	4.696 (4.425)		4.805 (4.326)
<b>Declarations</b>			<b>1.552***</b> (0.483)		<b>1.555***</b> (0.480)			<b>3.765***</b> (1.305)		<b>3.749***</b> (1.292)
<b>Power of governors</b>				0.006 (0.280)	-0.026 (0.271)				0.18 -0.468	0.083 -0.49
<b>Constant</b>	2.422** (1.073)	2.186* (1.106)	-2.277 (1.849)	2.384 (2.165)	-2.111 (2.707)					
<b>Observations</b>	79	79	79	79	79	79	79	79	79	79
<b>R<sup>2</sup></b>	0.415	0.419	0.485	0.415	0.485					
<b>Pseudo R<sup>2</sup></b>						0.210	0.214	0.282	0.210	0.282
<b>LR proportional odds test</b>						58.35**	59.21**	55.00	57.61**	56.72
<b>J.-B. test</b>	5.988*	6.022**	4.559	5.979*	4.581					

Note: See Table 1. Outliers are: (B1): Khabarovsk, Briansk, Nizhniy Novgorod, Novosibirsk, Omsk, Leningradskaya; (B2): Khabarovsk, Krasniarsk, Briansk, Leningradskaya, Nizhniy Novgorod, Novosibirsk, Omsk, Vologda, Sakha; (B3): Khabarovsk, Krasnoyarsk, Novosibirsk, Riazan, Sverdlovsk; (B4): Khabarovsk, Briansk, Nizhniy Novgorod, Novosibirsk, Leningradskaya, Omsk; (B5): Khabarovsk, Krasnoyarsk, Novosibirsk, Riazan, Sverdlovskaya. Exclusion of outliers does not lead to any change in any regression, with the exception of oil and gas in regression (B2), which becomes insignificant, but holds its sign.

**Table B2: Personnel appointment for Prosecutor’s Office, dep.var.: difference in regional bias index between 2000 and 2007, initial regional bias included**

	(B11) OLS	(B12) OLS	(B13) OLS	(B14) OLS	(B15) OLS	(B16) Ordered logit	(B17) Ordered logit	(B18) Ordered logit	(B19) Ordered logit	(B20) Ordered logit
<b>Regional bias 2000</b>	<b>-0.752***</b> (0.098)	<b>-0.767***</b> (0.096)	<b>-0.770***</b> (0.099)	<b>-0.754***</b> (0.100)	<b>-0.770***</b> (0.100)	<b>-1.581***</b> (0.314)	<b>-1.888***</b> (0.335)	<b>-1.890***</b> (0.334)	<b>-1.584***</b> (0.311)	<b>-1.889***</b> (0.334)
<b>Dummy republic</b>	0.469 (0.593)	0.719 (0.574)	0.674 (0.661)	0.465 (0.605)	0.672 (0.670)	0.660 (0.999)	1.279 (1.069)	1.247 (1.254)	0.628 (1.029)	1.242 (1.279)
<b>Dummy border region</b>	-0.341 (0.318)	-0.291 (0.310)	-0.285 (0.318)	-0.322 (0.324)	-0.282 (0.323)	-0.627 (0.557)	-0.507 (0.578)	-0.503 (0.590)	-0.582 (0.563)	-0.498 (0.586)
<b>Distance from Moscow</b>	0.117 (0.070)	<b>0.154**</b> (0.067)	<b>0.152**</b> (0.068)	0.109 (0.075)	<b>0.151**</b> (0.075)	0.161 (0.146)	<b>0.248*</b> (0.128)	<b>0.247*</b> (0.130)	0.146 (0.156)	<b>0.245*</b> (0.147)
<b>Share of Russians</b>	1.006 (1.158)	0.770 (1.127)	0.815 (1.237)	1.095 (1.181)	0.832 (1.268)	1.409 (1.859)	0.787 (1.938)	0.810 (2.058)	1.554 (1.837)	0.829 (2.057)
<b>Territory</b>	<b>-0.502**</b> (0.215)	<b>-0.530**</b> (0.206)	<b>-0.528**</b> (0.209)	<b>-0.526**</b> (0.214)	<b>-0.532**</b> (0.205)	-0.863 (0.595)	<b>-1.047*</b> (0.628)	<b>-1.047*</b> (0.629)	<b>-0.926*</b> (0.563)	<b>-1.055*</b> (0.591)
<b>Population (2000-2006)</b>	<b>0.262***</b> (0.095)	<b>0.260***</b> (0.089)	<b>0.260***</b> (0.089)	<b>0.253**</b> (0.097)	<b>0.258***</b> (0.092)	<b>0.419**</b> (0.191)	<b>0.439**</b> (0.192)	<b>0.439**</b> (0.191)	<b>0.405**</b> (0.195)	<b>0.437**</b> (0.199)
<b>Oil and gas (2000-2006)</b>	2.302 (1.582)	<b>2.321*</b> (1.391)	2.280 (1.430)	2.185 (1.624)	2.258 (1.501)	<b>3.431*</b> (1.970)	<b>3.926**</b> (1.811)	<b>3.900**</b> (1.925)	3.231 (2.054)	<b>3.876*</b> (2.096)
<b>Democracy (2000-2006)</b>	<b>-0.056*</b> (0.029)	<b>-0.057**</b> (0.029)	<b>-0.058*</b> (0.030)	<b>-0.059*</b> (0.032)	<b>-0.058*</b> (0.032)	<b>-0.094*</b> (0.052)	<b>-0.104*</b> (0.062)	<b>-0.104*</b> (0.062)	<b>-0.100*</b> (0.057)	-0.105 (0.064)
<b>Dummy Northern Caucasus</b>	-0.138 (0.729)	-0.093 (0.773)	-0.061 (0.827)	-0.126 (0.721)	-0.060 (0.830)	-0.242 (1.157)	-0.146 (1.385)	-0.126 (1.466)	-0.222 (1.131)	-0.124 (1.459)
<b>Contradicting acts</b>		<b>-6.406**</b> (3.006)	<b>-6.414**</b> (3.022)		<b>-6.380**</b> (3.083)		<b>-16.474**</b> (7.313)	<b>-16.466**</b> (7.316)		<b>-16.408**</b> (7.575)
<b>Declarations</b>			0.059 (0.540)		0.058 (0.542)			0.039 (0.979)		0.038 (0.978)
<b>Power of governors</b>				0.097 (0.283)	0.019 (0.281)				0.191 (0.486)	0.024 (0.485)
<b>Constant</b>	0.857 (1.255)	1.563 (1.233)	1.394 (2.048)	0.232 (2.035)	1.272 (2.731)					
<b>Observations</b>	84	84	84	84	84	84	84	84	84	84
<b>R<sup>2</sup></b>	0.472	0.500	0.500	0.473	0.500					
<b>Pseudo R<sup>2</sup></b>						0.281	0.320	0.320	0.282	0.321
<b>LR proportional odds test</b>						70.45***	90.44***	90.58***	71.99***	90.73***
<b>J.-B. test</b>	5.803*	5.300*	5.228*	5.739*	5.202*					

Note: see Table 1. Outliers are in (B11) Lipetsk, Bashkortostan, Buriatia, Novosibirsk, Saratov and Leningradskaya; (B12): Khabarovsk, Amur, Leningradskaya, Lipetsk, Novosibirsk, Bashkortostan, Buriatia; (B13) Leningradskaya, Lipetsk, Novosibirsk, Bashkortostan and Buriatia, (B14): the same regions as in (B13) and Saratov and (B15) Khabarovsk, Buriatia Lipetsk, Leningradskaya, Novosibirsk and Bashkortostan. There are no changes after exclusion of outliers.

**Table B3: Personnel appointment for Federal Security Service, dep.var.: difference in regional bias index between 2000 and 2007, initial regional bias included**

	(B21) OLS	(B22) OLS	(B23) OLS	(B24) OLS	(B25) OLS	(B26) Ordered logit	(B27) Ordered logit	(B28) Ordered logit	(B29) Ordered logit	(B30) Ordered logit
<b>Regional bias 2000</b>	<b>-0.581***</b> (0.114)	<b>-0.581***</b> (0.115)	<b>-0.586***</b> (0.116)	<b>-0.586***</b> (0.117)	<b>-0.592***</b> (0.119)	<b>-1.703***</b> (0.418)	<b>-1.697***</b> (0.421)	<b>-1.724***</b> (0.424)	<b>-1.681***</b> (0.414)	<b>-1.703***</b> (0.419)
<b>Dummy republic</b>	-0.490 (0.326)	-0.505 (0.330)	<b>-0.652*</b> (0.373)	-0.493 (0.328)	<b>-0.656*</b> (0.377)	<b>-2.249**</b> (0.990)	<b>-2.151**</b> (1.039)	<b>-2.710**</b> (1.330)	<b>-2.274**</b> (1.021)	<b>-2.709**</b> (1.344)
<b>Dummy border region</b>	0.048 (0.199)	0.044 (0.204)	0.058 (0.210)	0.037 (0.194)	0.047 (0.203)	0.206 (0.756)	0.244 (0.798)	0.295 (0.846)	0.301 (0.676)	0.377 (0.751)
<b>Distance from Moscow</b>	0.045 (0.031)	0.043 (0.030)	0.038 (0.031)	0.048 (0.031)	0.041 (0.032)	0.090 (0.141)	0.111 (0.150)	0.097 (0.156)	0.076 (0.137)	0.084 (0.152)
<b>Share of Russians</b>	-0.141 (0.733)	-0.137 (0.737)	-0.013 (0.750)	-0.190 (0.765)	-0.065 (0.779)	-2.119 (2.300)	-2.056 (2.332)	-1.655 (2.398)	-1.685 (2.462)	-1.278 (2.442)
<b>Territory</b>	<b>-0.507***</b> (0.169)	<b>-0.506***</b> (0.169)	<b>-0.498***</b> (0.168)	<b>-0.496***</b> (0.173)	<b>-0.485***</b> (0.173)	<b>-3.389*</b> (1.776)	<b>-3.534**</b> (1.764)	<b>-3.694**</b> (1.846)	<b>-3.694*</b> (1.954)	<b>-3.958**</b> (1.959)
<b>Population (2000-2006)</b>	<b>0.127*</b> (0.072)	<b>0.127*</b> (0.073)	<b>0.126*</b> (0.073)	<b>0.131*</b> (0.074)	<b>0.131*</b> (0.075)	0.323 (0.199)	<b>0.327*</b> (0.196)	0.321 (0.201)	0.283 (0.221)	0.284 (0.223)
<b>Oil and gas (2000-2006)</b>	0.879 (0.749)	0.877 (0.761)	0.719 (0.742)	0.918 (0.748)	0.757 (0.740)	<b>5.753*</b> (3.288)	<b>5.987*</b> (3.286)	<b>5.612*</b> (3.314)	<b>5.755*</b> (3.274)	<b>5.613*</b> (3.324)
<b>Democracy (2000-2006)</b>	-0.007 (0.019)	-0.007 (0.019)	-0.008 (0.018)	-0.005 (0.019)	-0.007 (0.019)	-0.001 (0.067)	-0.000 (0.067)	-0.005 (0.066)	-0.012 (0.070)	-0.015 (0.068)
<b>Dummy Northern Caucasus</b>	0.160 (0.275)	0.156 (0.276)	0.237 (0.291)	0.149 (0.283)	0.229 (0.297)	0.061 (0.708)	0.098 (0.718)	0.347 (0.734)	0.159 (0.801)	0.430 (0.772)
<b>Contradicting acts</b>		0.290 (1.311)	0.311 (1.324)		0.241 (1.397)		-1.503 (4.522)	-1.487 (4.453)		-1.396 (4.311)
<b>Declarations</b>			0.184 (0.271)		0.190 (0.273)			0.664 (1.067)		0.623 (1.115)
<b>Power of governors</b>				-0.040 (0.136)	-0.044 (0.143)				0.332 (0.695)	0.308 (0.721)
<b>Constant</b>	0.199 (0.760)	0.177 (0.775)	-0.348 (1.172)	0.472 (1.284)	-0.058 (1.550)					
<b>Observations</b>	83	83	83	83	83	83	83	83	83	83
<b>R<sup>2</sup></b>	0.543	0.544	0.546	0.544	0.546					
<b>Pseudo R<sup>2</sup></b>						0.331	0.331	0.333	0.332	0.334
<b>LR proportional odds test</b>						71.85***	72.22***	72.30***	77.64***	80.47***
<b>J.-B. test</b>	7.881**	8.193**	7.489**	7.666**	7.178**					

Note: See Table 1. Analysis of robustness of regression through exclusion of outliers in regression (B21), (B22) and (B24) is impossible, since in order to achieve non-significant Jarque-Bera most regressions should be excluded. Outliers in (B23) are Khanty Mansi, Aginsk Buriat, Moscow City, St. Petersburg, Altai Krai, Amur, Briansk, Cheliabinsk, Kaluga, Kemerovo, Leningradskaya, Moscow Oblast, Murmansk, Nizhiny Novgorod, Penza, Rostov, Smolensk, Sverdlovskaya, Tambov, Ulianovsk, Voronezh, Chuvashia, Komi, Tatarstan, Tyva, Udmurtia. In (B25) Krasnodar is also an outlier and Rostov is not, and other outliers coincide. After exclusion of outliers in (23) and (25) population and dummy republic become insignificant, but maintain their sign.

FRANKFURT SCHOOL / HFB – WORKING PAPER SERIES

No.	Author/Title	Year
147	Kostka, Genia / Zhou, Jianghua Chinese firms entering China's low-income market: Gaining competitive advantage by partnering governments	2010
146.	Herrmann-Pillath, Carsten Rethinking Evolution, Entropy and Economics: A triadic conceptual framework for the Maximum Entropy Principle as applied to the growth of knowledge	2010
145.	Heidorn, Thomas / Kahlert, Dennis Implied Correlations of iTraxx Tranches during the Financial Crisis	2010
144	Fritz-Morgenthal, Sebastian G. / Hach, Sebastian T. / Schalast, Christoph M&A im Bereich Erneuerbarer Energien	2010
143.	Birkmeyer, Jörg / Heidorn, Thomas / Rogalski, André Determinanten von Banken-Spreads während der Finanzmarktkrise	2010
142.	Bannier, Christina E. / Metz, Sabrina Are SMEs large firms en miniature? Evidence from a growth analysis	2010
141.	Heidorn, Thomas / Kaiser, Dieter G. / Voinea, André The Value-Added of Investable Hedge Fund Indices	2010
140.	Herrmann-Pillath, Carsten The Evolutionary Approach to Entropy: Reconciling Georgescu-Roegen's Natural Philosophy with the Maximum Entropy Framework	2010
139.	Heidorn, Thomas / Löw, Christian / Winker, Michael Funktionsweise und Replikationstil europäischer Exchange Traded Funds auf Aktienindices	2010
138.	Libman, Alexander Constitutions, Regulations, and Taxes: Contradictions of Different Aspects of Decentralization	2010
137.	Herrmann-Pillath, Carsten / Libman, Alexander / Yu, Xiaofan State and market integration in China: A spatial econometrics approach to 'local protectionism'	2010
136.	Lang, Michael / Cremers, Heinz / Hentze, Rainald Ratingmodell zur Quantifizierung des Ausfallrisikos von LBO-Finanzierungen	2010
135.	Bannier, Christina / Feess, Eberhard When high-powered incentive contracts reduce performance: Choking under pressure as a screening device	2010
134.	Herrmann-Pillath, Carsten Entropy, Function and Evolution: Naturalizing Peircian Semiosis	2010
133.	Bannier, Christina E. / Behr, Patrick / Güttler, Andre Rating opaque borrowers: why are unsolicited ratings lower?	2009
132.	Herrmann-Pillath, Carsten Social Capital, Chinese Style: Individualism, Relational Collectivism and the Cultural Embeddedness of the Institutions-Performance Link	2009
131.	Schäffler, Christian / Schmaltz, Christian Market Liquidity: An Introduction for Practitioners	2009
130.	Herrmann-Pillath, Carsten Dimensionen des Wissens: Ein kognitiv-evolutionärer Ansatz auf der Grundlage von F.A. von Hayeks Theorie der „Sensory Order“	2009
129.	Hankir, Yassin / Rauch, Christian / Umber, Marc It's the Market Power, Stupid! – Stock Return Patterns in International Bank M&A	2009
128.	Herrmann-Pillath, Carsten Outline of a Darwinian Theory of Money	2009
127.	Cremers, Heinz / Walzner, Jens Modellierung des Kreditrisikos im Portfoliofall	2009
126.	Cremers, Heinz / Walzner, Jens Modellierung des Kreditrisikos im Einwertpapierfall	2009
125.	Heidorn, Thomas / Schmaltz, Christian Interne Transferpreise für Liquidität	2009
124.	Bannier, Christina E. / Hirsch, Christian The economic function of credit rating agencies - What does the watchlist tell us?	2009



123.	Herrmann-Pillath, Carsten A Neurolinguistic Approach to Performativity in Economics	2009
122.	Winkler, Adalbert / Vogel, Ursula Finanzierungsstrukturen und makroökonomische Stabilität in den Ländern Südosteuropas, der Türkei und in den GUS-Staaten	2009
121.	Heidorn, Thomas / Rupprecht, Stephan Einführung in das Kapitalstrukturmanagement bei Banken	2009
120.	Roszbach, Peter Die Rolle des Internets als Informationsbeschaffungsmedium in Banken	2009
119.	Herrmann-Pillath, Carsten Diversity Management und diversitätsbasiertes Controlling: Von der „Diversity Scorecard“ zur „Open Balanced Scorecard“	2009
118.	Hölscher, Luise / Clasen, Sven Erfolgsfaktoren von Private Equity Fonds	2009
117.	Bannier, Christina E. Is there a hold-up benefit in heterogeneous multiple bank financing?	2009
116.	Roßbach, Peter / Gießamer, Dirk Ein eLearning-System zur Unterstützung der Wissensvermittlung von Web-Entwicklern in Sicherheitsthemen	2009
115.	Herrmann-Pillath, Carsten Kulturelle Hybridisierung und Wirtschaftstransformation in China	2009
114.	Schalast, Christoph: Staatsfonds – „neue“ Akteure an den Finanzmärkten?	2009
113.	Schalast, Christoph / Alram, Johannes Konstruktion einer Anleihe mit hypothekarischer Besicherung	2009
112.	Schalast, Christoph / Bolder, Markus / Radünz, Claus / Siepmann, Stephanie / Weber, Thorsten Transaktionen und Servicing in der Finanzkrise: Berichte und Referate des Frankfurt School NPL Forums 2008	2009
111.	Werner, Karl / Moormann, Jürgen Efficiency and Profitability of European Banks – How Important Is Operational Efficiency?	2009
110.	Herrmann-Pillath, Carsten Moralische Gefühle als Grundlage einer wohlstandschaffenden Wettbewerbsordnung: Ein neuer Ansatz zur erforschung von Sozialkapital und seine Anwendung auf China	2009
109.	Heidorn, Thomas / Kaiser, Dieter G. / Roder, Christoph Empirische Analyse der Drawdowns von Dach-Hedgefonds	2009
108.	Herrmann-Pillath, Carsten Neuroeconomics, Naturalism and Language	2008
107.	Schalast, Christoph / Benita, Barten Private Equity und Familienunternehmen – eine Untersuchung unter besonderer Berücksichtigung deutscher Maschinen- und Anlagenbauunternehmen	2008
106.	Bannier, Christina E. / Grote, Michael H. Equity Gap? – Which Equity Gap? On the Financing Structure of Germany’s Mittelstand	2008
105.	Herrmann-Pillath, Carsten The Naturalistic Turn in Economics: Implications for the Theory of Finance	2008
104.	Schalast, Christoph (Hrsg.) / Schanz, Kay-Michael / Scholl, Wolfgang Aktionärschutz in der AG falsch verstanden? Die Leica-Entscheidung des LG Frankfurt am Main	2008
103.	Bannier, Christina E./ Müsch, Stefan Die Auswirkungen der Subprime-Krise auf den deutschen LBO-Markt für Small- und MidCaps	2008
102.	Cremers, Heinz / Vetter, Michael Das IRB-Modell des Kreditrisikos im Vergleich zum Modell einer logarithmisch normalverteilten Verlustfunktion	2008
101.	Heidorn, Thomas / Pleißner, Mathias Determinanten Europäischer CMBS Spreads. Ein empirisches Modell zur Bestimmung der Risikoaufschläge von Commercial Mortgage-Backed Securities (CMBS)	2008
100.	Schalast, Christoph (Hrsg.) / Schanz, Kay-Michael Schaeffler KG/Continental AG im Lichte der CSX Corp.-Entscheidung des US District Court for the Southern District of New York	2008
99.	Hölscher, Luise / Haug, Michael / Schweinberger, Andreas Analyse von Steueramnestiedaten	2008
98.	Heimer, Thomas / Arend, Sebastian The Genesis of the Black-Scholes Option Pricing Formula	2008

97.	Heimer, Thomas / Hölscher, Luise / Werner, Matthias Ralf Access to Finance and Venture Capital for Industrial SMEs	2008
96.	Böttger, Marc / Guthoff, Anja / Heidorn, Thomas Loss Given Default Modelle zur Schätzung von Recovery Rates	2008
95.	Almer, Thomas / Heidorn, Thomas / Schmaltz, Christian The Dynamics of Short- and Long-Term CDS-spreads of Banks	2008
94.	Barthel, Erich / Wollersheim, Jutta Kulturunterschiede bei Mergers & Acquisitions: Entwicklung eines Konzeptes zur Durchführung einer Cultural Due Diligence	2008
93.	Heidorn, Thomas / Kunze, Wolfgang / Schmaltz, Christian Liquiditätsmodellierung von Kreditzusagen (Term Facilities and Revolver)	2008
92.	Burger, Andreas Produktivität und Effizienz in Banken – Terminologie, Methoden und Status quo	2008
91.	Löchel, Horst / Pecher, Florian The Strategic Value of Investments in Chinese Banks by Foreign Financial Institutions	2008
90.	Schalast, Christoph / Morgenschweis, Bernd / Sprengeter, Hans Otto / Ockens, Klaas / Stachuletz, Rainer / Safran, Robert Der deutsche NPL Markt 2007: Aktuelle Entwicklungen, Verkauf und Bewertung – Berichte und Referate des NPL Forums 2007	2008
89.	Schalast, Christoph / Stralkowski, Ingo 10 Jahre deutsche Buyouts	2008
88.	Bannier, Christina E./ Hirsch, Christian The Economics of Rating Watchlists: Evidence from Rating Changes	2007
87.	Demidova-Menzel, Nadeshda / Heidorn, Thomas Gold in the Investment Portfolio	2007
86.	Hölscher, Luise / Rosenthal, Johannes Leistungsmessung der Internen Revision	2007
85.	Bannier, Christina / Hänsel, Dennis Determinants of banks' engagement in loan securitization	2007
84.	Bannier, Christina "Smoothing" versus "Timeliness" - Wann sind stabile Ratings optimal und welche Anforderungen sind an optimale Berichtsregeln zu stellen?	2007
83.	Bannier, Christina E. Heterogeneous Multiple Bank Financing: Does it Reduce Inefficient Credit-Renegotiation Incidences?	2007
82.	Cremers, Heinz / Löhr, Andreas Deskription und Bewertung strukturierter Produkte unter besonderer Berücksichtigung verschiedener Marktszenarien	2007
81.	Demidova-Menzel, Nadeshda / Heidorn, Thomas Commodities in Asset Management	2007
80.	Cremers, Heinz / Walzner, Jens Risikosteuerung mit Kreditderivaten unter besonderer Berücksichtigung von Credit Default Swaps	2007
79.	Cremers, Heinz / Traugber, Patrick Handlungsalternativen einer Genossenschaftsbank im Investmentprozess unter Berücksichtigung der Risikotragfähigkeit	2007
78.	Gerdemeier, Dieter / Roffia, Barbara Monetary Analysis: A VAR Perspective	2007
77.	Heidorn, Thomas / Kaiser, Dieter G. / Muschiol, Andrea Portfoliooptimierung mit Hedgefonds unter Berücksichtigung höherer Momente der Verteilung	2007
76.	Jobe, Clemens J. / Ockens, Klaas / Safran, Robert / Schalast, Christoph Work-Out und Servicing von notleidenden Krediten – Berichte und Referate des HfB-NPL Servicing Forums 2006	2006
75.	Abrar, Kamyar / Schalast, Christoph Fusionskontrolle in dynamischen Netzsektoren am Beispiel des Breitbandkabelsektors	2006
74.	Schalast, Christoph / Schanz, Kay-Michael Wertpapierprospekte: Markteinführungspublizität nach EU-Prospektverordnung und Wertpapierprospektgesetz 2005	2006
73.	Dickler, Robert A. / Schalast, Christoph Distressed Debt in Germany: What's Next? Possible Innovative Exit Strategies	2006
72.	Belke, Ansgar / Polleit, Thorsten How the ECB and the US Fed set interest rates	2006

71.	Heidorn, Thomas / Hoppe, Christian / Kaiser, Dieter G. Heterogenität von Hedgefondsindizes	2006
70.	Baumann, Stefan / Löchel, Horst The Endogeneity Approach of the Theory of Optimum Currency Areas - What does it mean for ASEAN + 3?	2006
69.	Heidorn, Thomas / Trautmann, Alexandra Niederschlagsderivate	2005
68.	Heidorn, Thomas / Hoppe, Christian / Kaiser, Dieter G. Möglichkeiten der Strukturierung von Hedgefondsportfolios	2005
67.	Belke, Ansgar / Polleit, Thorsten (How) Do Stock Market Returns React to Monetary Policy ? An ARDL Cointegration Analysis for Germany	2005
66.	Daynes, Christian / Schalast, Christoph Aktuelle Rechtsfragen des Bank- und Kapitalmarktsrechts II: Distressed Debt - Investing in Deutschland	2005
65.	Gerdemeier, Dieter / Polleit, Thorsten Measures of excess liquidity	2005
64.	Becker, Gernot M. / Harding, Perham / Hölscher, Luise Financing the Embedded Value of Life Insurance Portfolios	2005
63.	Schalast, Christoph Modernisierung der Wasserwirtschaft im Spannungsfeld von Umweltschutz und Wettbewerb – Braucht Deutschland eine Rechtsgrundlage für die Vergabe von Wasserversorgungskonzessionen? –	2005
62.	Bayer, Marcus / Cremers, Heinz / Kluß, Norbert Wertsicherungsstrategien für das Asset Management	2005
61.	Löchel, Horst / Polleit, Thorsten A case for money in the ECB monetary policy strategy	2005
60.	Richard, Jörg / Schalast, Christoph / Schanz, Kay-Michael Unternehmen im Prime Standard - „Staying Public“ oder „Going Private“? - Nutzenanalyse der Börsennotiz -	2004
59.	Heun, Michael / Schlink, Torsten Early Warning Systems of Financial Crises - Implementation of a currency crisis model for Uganda	2004
58.	Heimer, Thomas / Köhler, Thomas Auswirkungen des Basel II Akkords auf österreichische KMU	2004
57.	Heidorn, Thomas / Meyer, Bernd / Pietrowiak, Alexander Performanceeffekte nach Directors Dealings in Deutschland, Italien und den Niederlanden	2004
56.	Gerdemeier, Dieter / Roffia, Barbara The Relevance of real-time data in estimating reaction functions for the euro area	2004
55.	Barthel, Erich / Gierig, Rauno / Kühn, Ilmhart-Wolfram Unterschiedliche Ansätze zur Messung des Humankapitals	2004
54.	Anders, Dietmar / Binder, Andreas / Hesdahl, Ralf / Schalast, Christoph / Thöne, Thomas Aktuelle Rechtsfragen des Bank- und Kapitalmarktrechts I : Non-Performing-Loans / Faule Kredite - Handel, Work-Out, Outsourcing und Securitisation	2004
53.	Polleit, Thorsten The Slowdown in German Bank Lending – Revisited	2004
52.	Heidorn, Thomas / Siragusano, Tindaro Die Anwendbarkeit der Behavioral Finance im Devisenmarkt	2004
51.	Schütze, Daniel / Schalast, Christoph (Hrsg.) Wider die Verschleuderung von Unternehmen durch Pfandversteigerung	2004
50.	Gerhold, Mirko / Heidorn, Thomas Investitionen und Emissionen von Convertible Bonds (Wandelanleihen)	2004
49.	Chevalier, Pierre / Heidorn, Thomas / Krieger, Christian Temperaturderivate zur strategischen Absicherung von Beschaffungs- und Absatzrisiken	2003
48.	Becker, Gernot M. / Seeger, Norbert Internationale Cash Flow-Rechnungen aus Eigner- und Gläubigersicht	2003
47.	Boenkost, Wolfram / Schmidt, Wolfgang M. Notes on convexity and quanto adjustments for interest rates and related options	2003
46.	Hess, Dieter Determinants of the relative price impact of unanticipated Information in U.S. macroeconomic releases	2003
45.	Cremers, Heinz / Kluß, Norbert / König, Markus Incentive Fees. Erfolgsabhängige Vergütungsmodelle deutscher Publikumsfonds	2003

44.	Heidorn, Thomas / König, Lars Investitionen in Collateralized Debt Obligations	2003
43.	Kahlert, Holger / Seeger, Norbert Bilanzierung von Unternehmenszusammenschlüssen nach US-GAAP	2003
42.	Beiträge von Studierenden des Studiengangs BBA 012 unter Begleitung von Prof. Dr. Norbert Seeger Rechnungslegung im Umbruch - HGB-Bilanzierung im Wettbewerb mit den internationalen Standards nach IAS und US-GAAP	2003
41.	Overbeck, Ludger / Schmidt, Wolfgang Modeling Default Dependence with Threshold Models	2003
40.	Balthasar, Daniel / Cremers, Heinz / Schmidt, Michael Portfoliooptimierung mit Hedge Fonds unter besonderer Berücksichtigung der Risikokomponente	2002
39.	Heidorn, Thomas / Kantwill, Jens Eine empirische Analyse der Spreadunterschiede von Festsatzanleihen zu Floatern im Euroraum und deren Zusammenhang zum Preis eines Credit Default Swaps	2002
38.	Böttcher, Henner / Seeger, Norbert Bilanzierung von Finanzderivaten nach HGB, EstG, IAS und US-GAAP	2003
37.	Moormann, Jürgen Terminologie und Glossar der Bankinformatik	2002
36.	Heidorn, Thomas Bewertung von Kreditprodukten und Credit Default Swaps	2001
35.	Heidorn, Thomas / Weier, Sven Einführung in die fundamentale Aktienanalyse	2001
34.	Seeger, Norbert International Accounting Standards (IAS)	2001
33.	Moormann, Jürgen / Stehling, Frank Strategic Positioning of E-Commerce Business Models in the Portfolio of Corporate Banking	2001
32.	Sokolovsky, Zbynek / Strohhecker, Jürgen Fit für den Euro, Simulationsbasierte Euro-Maßnahmenplanung für Dresdner-Bank-Geschäftsstellen	2001
31.	Roßbach, Peter Behavioral Finance - Eine Alternative zur vorherrschenden Kapitalmarkttheorie?	2001
30.	Heidorn, Thomas / Jaster, Oliver / Willeitner, Ulrich Event Risk Covenants	2001
29.	Biswas, Rita / Löchel, Horst Recent Trends in U.S. and German Banking: Convergence or Divergence?	2001
28.	Eberle, Günter Georg / Löchel, Horst Die Auswirkungen des Übergangs zum Kapitaldeckungsverfahren in der Rentenversicherung auf die Kapitalmärkte	2001
27.	Heidorn, Thomas / Klein, Hans-Dieter / Siebrecht, Frank Economic Value Added zur Prognose der Performance europäischer Aktien	2000
26.	Cremers, Heinz Konvergenz der binomialen Optionspreismodelle gegen das Modell von Black/Scholes/Merton	2000
25.	Löchel, Horst Die ökonomischen Dimensionen der ‚New Economy‘	2000
24.	Frank, Axel / Moormann, Jürgen Grenzen des Outsourcing: Eine Exploration am Beispiel von Direktbanken	2000
23.	Heidorn, Thomas / Schmidt, Peter / Seiler, Stefan Neue Möglichkeiten durch die Namensaktie	2000
22.	Böger, Andreas / Heidorn, Thomas / Graf Waldstein, Philipp Hybrides Kernkapital für Kreditinstitute	2000
21.	Heidorn, Thomas Entscheidungsorientierte Mindestmargenkalkulation	2000
20.	Wolf, Birgit Die Eigenmittelkonzeption des § 10 KWG	2000
19.	Cremers, Heinz / Robé, Sophie / Thiele, Dirk Beta als Risikomaß - Eine Untersuchung am europäischen Aktienmarkt	2000
18.	Cremers, Heinz Optionspreisbestimmung	1999

17.	Cremers, Heinz Value at Risk-Konzepte für Marktrisiken	1999
16.	Chevalier, Pierre / Heidorn, Thomas / Rütze, Merle Gründung einer deutschen Strombörse für Elektrizitätsderivate	1999
15.	Deister, Daniel / Ehrlicher, Sven / Heidorn, Thomas CatBonds	1999
14.	Jochum, Eduard Hoshin Kanri / Management by Policy (MbP)	1999
13.	Heidorn, Thomas Kreditderivate	1999
12.	Heidorn, Thomas Kreditrisiko (CreditMetrics)	1999
11.	Moormann, Jürgen Terminologie und Glossar der Bankinformatik	1999
10.	Löchel, Horst The EMU and the Theory of Optimum Currency Areas	1998
09.	Löchel, Horst Die Geldpolitik im Währungsraum des Euro	1998
08.	Heidorn, Thomas / Hund, Jürgen Die Umstellung auf die Stückaktie für deutsche Aktiengesellschaften	1998
07.	Moormann, Jürgen Stand und Perspektiven der Informationsverarbeitung in Banken	1998
06.	Heidorn, Thomas / Schmidt, Wolfgang LIBOR in Arrears	1998
05.	Jahresbericht 1997	1998
04.	Ecker, Thomas / Moormann, Jürgen Die Bank als Betreiberin einer elektronischen Shopping-Mall	1997
03.	Jahresbericht 1996	1997
02.	Cremers, Heinz / Schwarz, Willi Interpolation of Discount Factors	1996
01.	Moormann, Jürgen Lean Reporting und Führungsinformationssysteme bei deutschen Finanzdienstleistern	1995

**FRANKFURT SCHOOL / HFB – WORKING PAPER SERIES  
CENTRE FOR PRACTICAL QUANTITATIVE FINANCE**

No.	Author/Title	Year
23.	Esquivel, Manuel L. / Veiga, Carlos / Wystup, Uwe Unifying Exotic Option Closed Formulas	2010
22.	Packham, Natalie / Schlögl, Lutz / Schmidt, Wolfgang M. Credit gap risk in a first passage time model with jumps	2009
21.	Packham, Natalie / Schlögl, Lutz / Schmidt, Wolfgang M. Credit dynamics in a first passage time model with jumps	2009
20.	Reiswich, Dimitri / Wystup, Uwe FX Volatility Smile Construction	2009
19.	Reiswich, Dimitri / Tompkins, Robert Potential PCA Interpretation Problems for Volatility Smile Dynamics	2009
18.	Keller-Ressel, Martin / Kilin, Fiodar Forward-Start Options in the Barndorff-Nielsen-Shephard Model	2008
17.	Griebsch, Susanne / Wystup, Uwe On the Valuation of Fader and Discrete Barrier Options in Heston's Stochastic Volatility Model	2008
16.	Veiga, Carlos / Wystup, Uwe Closed Formula for Options with Discrete Dividends and its Derivatives	2008

15.	Packham, Natalie / Schmidt, Wolfgang Latin hypercube sampling with dependence and applications in finance	2008
14.	Hakala, Jürgen / Wystup, Uwe FX Basket Options	2008
13.	Weber, Andreas / Wystup, Uwe Vergleich von Anlagestrategien bei Riesterrenten ohne Berücksichtigung von Gebühren. Eine Simulationsstudie zur Verteilung der Renditen	2008
12.	Weber, Andreas / Wystup, Uwe Riesterrente im Vergleich. Eine Simulationsstudie zur Verteilung der Renditen	2008
11.	Wystup, Uwe Vanna-Volga Pricing	2008
10.	Wystup, Uwe Foreign Exchange Quanto Options	2008
09.	Wystup, Uwe Foreign Exchange Symmetries	2008
08.	Becker, Christoph / Wystup, Uwe Was kostet eine Garantie? Ein statistischer Vergleich der Rendite von langfristigen Anlagen	2008
07.	Schmidt, Wolfgang Default Swaps and Hedging Credit Baskets	2007
06.	Kilin, Fiodor Accelerating the Calibration of Stochastic Volatility Models	2007
05.	Griebisch, Susanne/ Kühn, Christoph / Wystup, Uwe Instalment Options: A Closed-Form Solution and the Limiting Case	2007
04.	Boenkost, Wolfram / Schmidt, Wolfgang M. Interest Rate Convexity and the Volatility Smile	2006
03.	Becker, Christoph/ Wystup, Uwe On the Cost of Delayed Currency Fixing	2005
02.	Boenkost, Wolfram / Schmidt, Wolfgang M. Cross currency swap valuation	2004
01.	Wallner, Christian / Wystup, Uwe Efficient Computation of Option Price Sensitivities for Options of American Style	2004

#### HFB – SONDERARBEITSBERICHTE DER HFB - BUSINESS SCHOOL OF FINANCE & MANAGEMENT

No.	Author/Title	Year
01.	Nicole Kahmer / Jürgen Moormann Studie zur Ausrichtung von Banken an Kundenprozessen am Beispiel des Internet (Preis: € 120,-)	2003

Printed edition: € 25.00 + € 2.50 shipping

Download:

Working Paper: [http://www.frankfurt-school.de/content/de/research/Publications/list\\_of\\_publication0.html](http://www.frankfurt-school.de/content/de/research/Publications/list_of_publication0.html)

CPQF: [http://www.frankfurt-school.de/content/de/research/quantitative\\_Finance/research\\_publications.html](http://www.frankfurt-school.de/content/de/research/quantitative_Finance/research_publications.html)

**Order address / contact**

Frankfurt School of Finance & Management

Sonnemannstr. 9–11 ■ D–60314 Frankfurt/M. ■ Germany

Phone: +49 (0) 69 154 008–734 ■ Fax: +49 (0) 69 154 008–728

eMail: [m.biemer@fs.de](mailto:m.biemer@fs.de)

Further information about Frankfurt School of Finance & Management

may be obtained at: <http://www.fs.de>