

## The differential demand for indirect rule: evidence from the North Caucasus

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Indirect rule is one of the means that central authorities have long employed in hopes of defusing communal conflict and civil war in multicultural societies. Yet very little is known about the appeal of indirect rule among the ruled themselves. Why do people in some places demand more indirect rule and local autonomy, whereas others seem content to be governed directly by rulers of an alien culture? This is a crucial question with important implications for determining the form of governance that is most likely to provide social order in culturally heterogeneous societies. Although much attention has been given to consider the relative costs and benefits of direct versus indirect rule for the central authorities, the other side of the coin – namely, the variable demand for indirect rule among the members of distinctive cultural groups – has hardly been examined with systematic empirical data. This paper presents a theory of the differential demand for indirect rule and offers an initial test of its principal empirical implications using original micro-level data from the North Caucasus region of Russia. The theory's core claim is that the middle class should express the greatest demand for indirect rule, while both the upper and lower classes should prefer more direct rule. The theory therefore predicts that there will be an inverse parabolic relationship between the demand for indirect rule and economic class. The findings are largely consistent with these theoretical expectations.

**Keywords:** indirect rule; ethnic conflict; nationalism; decentralization; the middle class

### Introduction

Although nationalist conflict is common in multicultural societies, it is also far from universal (Brubaker and Laitin 1998). One of the reasons proposed for its containment is the institution of *indirect rule* (Hechter 2000). Under this form of administration, distinctive and spatially concentrated ethnic groups are largely governed by co-ethnic indirect rulers. In turn, these indirect rulers funnel tribute (in the form of taxes, primary products, or manpower during wartime) to central rulers, who remain the ultimate political authorities in the state. Indirect rule is the converse of direct rule, in which central authorities assume control over the entire expanse of the polity.

Until the advent of modern communications technology, central rulers in large empires, as well as smaller states, faced enormous obstacles in their attempts to

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control their lands. Indirect rule sets up an agency relationship between central rulers and the local authorities who stood in for them across diverse peripheral territories. There is no doubt that by adopting indirect rule, the center suffered losses on account of this agency problem and failed to capture all of the resources that it sought as a result. Yet this loss was compensated by an increase in social order in peripheral territories. By designating local authorities having the same ethnicity and culture as that of the peripheral population, the center minimized the prospect that the periphery would resist the imposition of alien rulers. Indirect rule was a mainstay of premodern polities, but it is also widely used in modern culturally heterogeneous polities – and for much the same reason.<sup>1</sup> Included among its many familiar forms are federation, especially ethno-federalism and consociationalism.

If this cost-benefit story largely focuses on the supply of indirect rule, it is surely incomplete if it is silent on what explains the demand for indirect rule in the modern world. Why do people in some places demand more indirect rule and local autonomy, whereas others appear to be at least reasonably content to be ruled directly by aliens? This is a crucial question in political science with important implications for when, why, and what forms of governance may be most suitable for guaranteeing stability in culturally heterogeneous societies. Although a number of theories have been advanced to explain the relative costs and benefits of direct versus indirect rule for central authorities' ability to contain or even eradicate nationalism (Tilly 1990; Hechter 2000; Boone 2003; Hechter and Kabiri 2009; Lawrence 2010), and to account for why central rulers grant more indirect rule to some peripheral units than to others (Gerring et al. 2011), and there are now numerous theories of secession (Sambanis and Milanovic 2011) cast at different levels of analysis (Siroky 2011), the endogenous demand for indirect rule remains understudied and has hardly been examined with systematic micro-level data.

In this paper, we develop the outline of a theory to account for the differential demand for indirect rule and offer an initial test of the theory's main empirical implications using original micro-level data from the North Caucasus region of Russia. Our theory's core claim is that the middle class should express the greatest demand for indirect rule, for it stands to benefit the most from a switch to this form of governance, whereas the upper and lower classes should desire less indirect rule – and hence more direct rule. More formally, we predict an inverse parabolic relationship (a concave function) between the demand for indirect rule and economic class.<sup>2</sup> We develop this theory in the next section, and then test it using unique survey data from the North Caucasus, a region that has been subject to various forms of rule since it was conquered in the early nineteenth century, and that exhibits considerable local variation in the demand for indirect rule.

The article is organized into four sections. In the first, we introduce and develop our main theoretical proposition about the differential demand for indirect rule and derive specific hypotheses to be tested. In the second, we provide some brief background on the North Caucasus and justify our case selection, then describe our data and our statistical model. In the third section, we discuss our main results, and then conclude with some qualifications and potential implications for future research.

### Outlines of a theory of the demand for indirect rule

Our starting point is the long-standing debate over ethno-federalism (Nordlinger 1972; Bunce 1999; Bermeo 2001; Roeder and Chapman 2007; Cuffe and Siroky 2013) and particularly the demand for it as implied by the theory of direct rule (Hechter 2000; Hechter, Kuyucu, and Sacks 2006), which holds that nationalism in culturally heterogeneous societies increases as central authorities transition from indirect to direct rule. As central authorities successfully replace their local counterparts as the primary providers of public goods – such as security, education, welfare, and dispute resolution – class cleavages within the locality fade and cultural ones become more salient in the wider society (Blau and Schwartz 1984; Hechter 2004). In culturally heterogeneous societies, direct rule subjects distinctive ethno-religious populations to governance by aliens (Hechter 2013). This fact alone usually raises the salience of cultural identification, and often leads to nationalism (Siroky and Aprasidze 2011). At the same time that direct rule stimulates cultural identities in some contexts, it also affords the center with a greater capacity to suppress collective action on the basis of these same identities. Indirect rule does the reverse – it supplies more autonomy to peripheral groups, endowing them with a greater capacity to challenge the state, but by the same token it also removes much of their incentive to seek greater autonomy.

According to the theory, the greater the provision of public goods by central authorities in culturally heterogeneous societies, the more likely that cultural differences will become politically salient. This is because peripheral groups are likely to prefer culturally distinct public goods – such as education and dispute resolution in their own language – that central authorities are loath to provide. For reasons of this sort, members of peripheral groups may be motivated to undertake nationalist collective action.

If we translate this argument to the individual level, grievance-based theories (Davies 1962; Gurr 1970; Horowitz 1985; Cederman, Weidmann, and Gleditsch 2010) predict that those individuals in the periphery whose cultural identities are most disadvantaged by the imposition of central authority into their localities should also be in favor of indirect rule. At the same time, however, we might expect that the most affluent individuals in the periphery would tend to support indirect rule because they are likely to be the principal beneficiaries of it. These different expectations can be reconciled, we suggest here, by introducing a non-linear threshold argument.

The least privileged individuals have the greatest grievances, but they will have relatively little demand for indirect rule because their most immediate goal – survival – trumps other social aspirations, including greater autonomy and indirect rule (Maslow 1954). The wealthiest social stratum is also unlikely to demand a significantly greater amount of indirect rule, since it is precisely this social class that benefits most from the existing order. However, the middle class has sufficient resources that it need not worry about basic needs, and yet it does not benefit in the same way as the upper class from the existing order (Hroch 1985). It follows that this class stands to gain the most from a shift to indirect rule, and

should therefore express the greatest demand for it. This leads to our primary hypothesis:

**Hypothesis 1:** The relationship between material well-being and the demand for indirect rule is curvilinear. Individuals in the middle-income category are the most likely to demand indirect rule, while the least and the most affluent respondents will indicate significantly less demand for indirect rule

In addition to this central proposition about the relationship between economic position and the demand for indirect rule, we outline several additional claims that have been proposed in the scholarly literature and offer an empirical assessment of their explanatory power. Related to our argument about economic position are theories that focus on educational attainment. It is often assumed that education increases tolerance and inter-ethnic harmony. Recently, however, Lange (2012) has shown that educational expansion in multiethnic societies often contributes to ethnic conflict, rather than diminishing it, by increasing inter-group competition, placing people in groups, frustrating those who do not succeed after graduation due to inter-ethnic inequality, and by providing greater capacity to mobilize ethnic-based movements. Although our explanandum of interest is not ethnic conflict per se – but rather than demand for indirect rule – we build on Lange's argument and suggest that the most educated class should favor indirect rule because they frequently assume leadership roles in nationalist movements (Smith 2000). Yet the least educated class should also favor indirect rule because they often blame their frustrations and anxieties about their own worth on ethnic others (Horowitz 1985). The least educated also often tend to be primarily dependent on the local economy, and therefore they should see fewer benefits from the economies of scale to be realized from belonging to a larger economic market.

In sum, we expect two education strata to be most in favor of indirect rule – the most and the least educated. Whereas we argue that the relationship between the demand for indirect rule and economic class follows an inverted-U relationship (a concave function), we suggest that educational attainment follows a simple-U shaped relationship with the demand for indirect rule (a convex function).

**Hypothesis 2:** The relationship between educational attainment and the demand for indirect rule is curvilinear with low and high education levels most in favor of more indirect rule

In addition to achieved characteristics, such as wealth and education, we also expect certain individually ascriptive characteristics to be associated with a differential demand for indirect rule, especially ethnicity and, by extension, inter-ethnic relations and networks. Although Russia conquered the North Caucasus more than 150 years ago and populated the region with ethnic Russians, the republics of the North Caucasus have become increasingly indigenous since the 1970s, and the emigration of ethnic Russians out of the region has increased in particular over the past two decades (Dzadziyev 2012). As a result, the native peoples of the North Caucasus should expect to benefit more from a shift toward

indirect rule, which would increase the relevance of family and clan networks in determining an individual's life chances.<sup>3</sup> Conversely, the non-native population (i. e., Russians) should be less in favor of indirect rule because its members would likely fare worse in the absence of a strong central government to reinforce their status in local hierarchies.

**Hypothesis 3:** Natives in each republic should be more in favor of indirect rule than the non-native population

The relative costs and benefits of indirect rule should also be related to an individual's perception of interethnic relations. Individuals who think that their territory has tense ethnic relations, and feel vulnerable in the face of potential interethnic conflict, should be more in favor of direct rule. Although this effect might seem to be the same as the effect of being non-native to the land (e.g., Russians), there are several other possible scenarios. One likely possibility is that such respondents are native to the land, but members of an ethnic minority (e.g., Cherkess, Abaza, and Nogais in Karachay-Cherkessia, Balkars in Kabardino-Balkaria, Ingush in North Ossetia, Chechens and Ingush respectively in Ingushetia and Chechnya, etc.), who look for help to the central state as an arbiter in containing the power of the regional ethnic majority. Naturally, such respondents will tend to regard the central government as a more impartial arbiter between competing ethnic groups than the local government – often dominated by the republic's ethnic majority – since local rulers are more likely to be ethnically allied with the perpetrator and the judge of the conflict. For reasons of this kind, we hypothesize that:

**Hypothesis 4:** Respondents who perceive greater ethnic tension in their republic are more likely to prefer direct rule

Conversely, we expect individuals with fewer interethnic networks to be supportive of indirect rule. Since individuals with mono-ethnic networks primarily rely on ethnic kin to satisfy their basic needs, they will view indirect rule (by their own kin) as more advantageous than will those individuals that possess broader social networks:

**Hypothesis 5:** Respondents with fewer interethnic networks will display a greater demand for indirect rule

Before investigating the empirical validity of these five hypotheses using unique survey data from the North Caucasus, we first provide a brief overview of the North Caucasus, justify our case selection, and discuss the data.

### Case selection: the North Caucasus

The North Caucasus is an especially apt area to study the demand for indirect rule. Even though the peoples of the North Caucasus have nominal autonomy, the government in Moscow has increased its control over the region through a variety of means, thus potentially stimulating greater demand for indirect rule. Most

notably, the direct elections of local governors were removed in 2004<sup>4</sup> and replaced with a system of direct presidential appointment (Slider 2008). Effectively, in 2004, Russia shifted from a system of governance with a greater degree of indirect rule to one with more elements of direct rule. Although this undoubtedly increased the overall level of nationalism and conflict in several republics, as the theory suggests, it remains unclear of what kinds of individuals were most galvanized to demand more indirect rule, and why.

Home to dozens of small ethnic groups, the North Caucasus is administratively organized into seven autonomous republics within Russia. From east to west, these are Dagestan, Chechnya, Ingushetia, North Ossetia, Kabardino-Balkaria, Karachay-Cherkessia and Adygea. Russia conquered this region in the second half of the nineteenth-century in a long, bloody war during which several indigenous groups were deported *en masse*. Although the situation in this restive region was relatively quiet during the last several decades of the Soviet Union's existence, conflicts started to unravel soon after the USSR collapsed in 1991 (Roeder 1991; Beissinger 2002). The most well-known of these conflicts is the first Russian–Chechen war (1994–1996) and its sequel (1999–present). Whereas large-scale military operations ended in Chechnya in 2009, it is debatable whether the war has actually ended (Lyal 2010). Chechnya has become an international synonym for intractable conflict between central governments and insurgent peripheries (Dunlop 1998).

Yet conflict in the North Caucasus has not been confined to Chechnya. In recent years, it has spread to Dagestan, Ingushetia, and Kabardino-Balkaria (Kolossoff and Toal 2007; Vendina, Belozorov, and Gustafson 2007). As a result, hundreds of Russian law enforcement agents, military, rebels, and civilians die in the North Caucasus each year. Moreover, hostilities are not limited to the North Caucasus. In March 2010, rebels launched a double suicide bomb attack in the Moscow metro. And in January 2011, rebels carried out a suicide bombing at a Moscow international airport, Domodedovo. For the Russian government, this is a fight with Islamic “bandits” and “terrorists” (Russell 2007). For the rebels, it is a struggle with the Russian “infidel” for self-determination. Human rights activists accuse the Russian government of massive human rights violations (e.g., extralegal killings, torture, and kidnapping) across the North Caucasus on a nearly daily basis (Politkovskaya 2003; HRC 2008; HRW 2008).

Although Russia's portrayal of these conflicts frequently relies on a broad brush to paint the entire North Caucasus as Chechnya *writ large*, there is considerable variation in the extent and the nature of violence across and within the region (O'Loughlin, Kolossoff, and Jean Radvanyi 2007; O'Loughlin and Wittmer 2010). Similarly, there is significant variation in the extent to which individuals view Moscow as an alien ruler – a colonial power – that must be replaced with indigenous rule for the people of the North Caucasus to achieve their potential (O'Loughlin and Ó Tuathail 2009). While Chechens fought two bloody wars with Russia over the past 20 years, other peoples of the region have not gone so far. Chechnya is no longer the most violent place in the North Caucasus; Dagestan is now the primary locus of violence.<sup>5</sup> Why are some individuals in the



North Caucasus more vigorously in favor of indirect rule and steadfastly against Moscow's rule than others? What explains micro-level variation in the demand for indirect rule in the North Caucasus?

This is a question that has received little systematic attention. Partly as a result of the violence and partly due to the information vacuum about events in the North Caucasus (Siroky and Dzutsev 2012), there are relatively few surveys of the civilian population that would allow researchers to address this sensitive issue (Trier and Deniev 2000; Mendelson and Gerber 2006). Russian government agencies consistently regard researchers with suspicion, making it difficult to conduct surveys using proper protocols that adhere to international standards.<sup>6</sup>

In this article, we analyze the results of a unique survey conducted by local research agencies in accord with international standards and across all seven republics of the North Caucasus. Most important, the survey allows us to test theories that might shed light on the differential demand for direct rule. The survey included over 1700 respondents who were asked about their political attitudes and also covered their socioeconomic and demographic characteristics (see the appendix for further information about the survey instrument and variables included in our analysis).

The survey was conducted by the Institute of Socio-Political Research, a subsidiary of the Russian Academy of Sciences, in June 2006. It was managed by a team of sociologists based in Vladikavkaz under supervision of Dr Khasan Dzutsev (2006). The researchers used a multistage stratified probability sampling strategy with two types of strata. The first stratum was territorial and focused on the type of settlements; the second stratum was quotidian and relied on gender, age, education, and ethnicity. Items and scales from the questionnaire were replicated whenever possible from major Russian polling agencies such as the All-Russian Center for the Study of Public Opinion (VTsIOM), the Levada-Center, and The Public Opinion Foundation (FOM). The questions covered several areas of social life in the North Caucasus, including social adaptation, attitudes toward Russia and federal authorities, perceptions of the region's problems, and attitudes toward the regional authorities, as well as political ideology and personal views, including religious beliefs (ibid.). The survey was administered face-to-face in the Russian language during June 2006 in Adygea, Chechnya, Dagestan, Ingushetia, Kabardino-Balkaria, Karachay-Cherkessia, and North Ossetia. Only respondents aged 18 years and older were interviewed.

## Data description

### *Dependent variable*

Our dependent variable for the analysis is a binary indicator of the demand for indirect rule. We utilized a survey question about how power should be shared between the federal republic and the central government in Moscow to operationalize the concept of indirect rule. Respondents were given the following choices:

1. More power should be given to the federal government.
2. More power should be given to the republican government.
3. The republic should have more leeway to manage its economy.
4. The division of power should stay the same as it is now.
5. Do not know, refuse to answer.

We then recoded the variable as follows:

1. More power should be given to the federal government.
2. The division of power should stay the same as it is now.
3. The republic should have more leeway to manage its economy.
4. More power should be given to the republican government.

We then collapsed the first two categories as reflecting a demand for direct rule and the last two categories as reflecting a demand for indirect rule.<sup>7</sup>

### *Explanatory variables*

It is well-known that direct questions about income lead to convergence toward the mean, and thus poor estimates of the full distribution, inasmuch as poor individuals overestimate their wealth and rich individuals underestimate it. As a result, to capture income and operationalize “the middle class,” we utilized a question on what one can afford to buy, which ranges from “not enough even for food” up to “can buy everything plus some extra,” and is measured on an ordinal scale from 1 to 6. Respondents in the middle category are considered as belonging to “the middle class” for the analysis.

Our indicator of educational attainment is measured on an 8-point scale from 1 to 8. We measured indigenous ethnic groups with a binary indicator equal to 0 for non-native ethnicities (namely Russians and Armenians but also Chechens in Ingushetia, Ossetians in Karachay-Cherkessia, etc.) and 1 for members of ethnic groups that are indigenous to the given republic, even if they are not titular.<sup>8</sup> Ethnic tension perception was measured on an ordinal scale with three values: 1 – no perceived ethnic tension, 2 – slight ethnic tension, 3 – high perceived ethnic tension. Finally, the inter-ethnic network was measured using a binary indicator that takes the value of 1 if a respondent has at least a few friends outside of her or his own ethnic group, and assumes a value of 0 otherwise.

### *Control variables*

To control for a respondent’s latent potential to reject direct or indirect rule, and avoid possible bias from omitted variables, we included several control variables. First, we included an ordinal measure of the respondent’s assessment of Russian president Vladimir Putin’s performance while in office. The measure ranges from 1 (total approval) to 4 (total disapproval), which should be positively associated with the demand for indirect rule. We also included another ordinal measure on the same scale for the approval of the individual republic’s governor, which should be negatively



associated with the demand for indirect rule. Since those respondents who tend to treat strangers with distrust are also more likely to support indirect rule, we included a four-point ordinal measure of trust toward strangers. In addition, we used an ordinal measure of how difficult one perceives life to be in their republic relative to life in other republics, where 1 stands for “my republic is relatively better off than others” and 4 indicates a belief that “my republic is relatively worse off than others.” Finally, we also controlled for a respondent’s duration of residence using an ordinal measure, where 1 means that “I have lived all my life in my current town” and 5 indicates that “I have lived in my current town less than a year.” Because a significant portion of the data needed to estimate the full model would be removed using a procedure such as list-wise deletion, we relied on multiple imputation for the missing covariate values and used Random Recursive Partitioning.<sup>9</sup>

Data analysis

We estimated the demand for indirect rule using logistic regression in *R* (Table 1). Our first model includes only control variables (*M1*). Then we proceeded to model only our explanatory variables (*M2*), and finally we combined the two into a full model (*M3*). We first present the results numerically in Table 1 and then graphically using a coefficient plot in Figure 1.

In Figure 1, the dots represent the coefficients and the lines indicate their standard errors. Statistically significant predictors do not overlap at all with the vertical zero-line. If the dot and line are to the left of the zero-line, then there is a negative effect on the demand for indirect rule. If the dot and line are to the right of the zero line, the predictor displays a positive relationship with the demand for indirect rule.

Discussion of results

The statistical results appear to support our principal hypothesis that the demand for indirect rule is curvilinearly (concavely) related to an individual’s economic

Table 1. Logistic regression results for three models.

Predictor	Controls (Mod. 1)	Explanatory (Mod. 2)	Full (Mod. 3)
President disapproval	0.25** (0.08)		0.25** (0.08)
Governor disapproval	− 0.15* (0.06)		− 0.13* (0.06)
Hard life	− 0.29*** (0.06)		− 0.22*** (0.06)
Trust	− 0.20** (0.07)		− 0.15* (0.07)
Migrate	0.11 + (0.07)		0.11 (0.07)
Income		0.94** (0.30)	0.92** (0.30)
Income Sq.		− 0.13** (0.05)	− 0.14** (0.05)
Education		0.35 + (0.19)	0.33 + (0.19)
Education Sq.		− 0.04 + (0.02)	− 0.04 + (0.02)
Native		0.76*** (0.12)	0.75*** (0.12)
Tension		− 0.17 (0.08)	− 0.17 + (0.09)
Network		− 0.42* (0.17)	− 0.36* (0.17)

Note: Significance codes (standard error): \*\*\*0; \*\*0.001; \*0.01; +0.05.

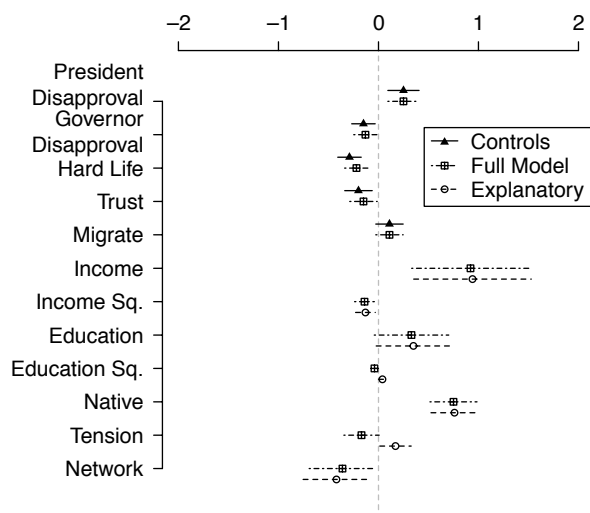


Figure 1. Coefficient plots of the three main models.

position. The lower order coefficient on income is positive and significant, while the second-order polynomial coefficient is negative and significant. This indicates an “inverted U” or concave relationship with income and suggests that the demand for indirect rule is greatest among the middle-income category and lower among the lowest and highest income strata. This is consistent with our claim that the middle-income strata of respondents should be most predisposed toward indirect rule.

Contrary to our expectations, however, we find that educational attainment also exhibits an “inverted U” relationship with the demand for indirect rule, similar to the relationship between indirect rule and income, although the relationship is weaker. This indicates that middle class groups, both in terms of human capital (education) and in terms of financial capital (income), express a greater demand for indirect rule than the lower and upper strata on these two dimensions. It stands to reason that a shift from direct rule toward indirect rule would benefit both of these groups, although the correlation between human and financial capital is far from perfect.<sup>10</sup>

Finally, members of indigenous ethnic groups were significantly more likely to demand indirect rule than members of other ethnic groups. Respondents who perceived more ethnic tensions in their republic were somewhat less likely to demand indirect rule. We argued that this is due a belief that the federal authorities were more likely to be impartial arbiters of inter-ethnic tensions. Similarly, those respondents with more inter-ethnic networks were less likely to demand indirect rule.

We also briefly report on the results from our control variables. Respondents who perceived conditions in their republic to be worse than in other republics were less likely to demand indirect rule. Respondents who had lived less time in their current residence were slightly more likely to demand indirect rule. This

contradicts our expectations. One possible reason might be that those who migrate are the same people who were forced to leave their old residence and resettle among their own ethnic group, and these individuals may harbor greater animosity toward other ethnic groups and higher levels of nationalistic sentiments.

### Robustness

To examine the robustness of our results, we reestimated the three main models using a hierarchical logistic regression model with a random effect for the republic (Gelman and Hill 2007). The generalized linear mixed model estimation displayed an increase in the significance of the already significant variables at the expense of the least significant variables. Thus, in the full model, the indicators of Income, Income Squared, and Native ethnic group were highly significant ( $p < 0.0001$ ). The same pattern was seen in the model that included only the explanatory variables. Apart from the variable measuring the length of an individual's residence in the same place – “Migrate” – all of the control variables were significant in Models 1 and 3. The Intraclass Correlation Coefficient was 8% in the null model, which indicates that 8% of the variation in demand for indirect rule is attributable to the differences *between* the seven republics covered in the survey.

Similarly, to examine whether our model choice changed our results, we estimated a multinomial and an ordered logistic regression. We also examined whether altering the coding of our dependent variable using a trichotomous measure of the demand for indirect rule influenced our main findings. The tests showed consistent support for the significance of Income and Income Squared across all models in multinomial and ordered logistic regression models. The multinomial logistic regression model lowered the significance of Education and Education Squared, and all other indicators were statistically significant, including Income and Income Squared. Also significant was whether a respondent belonged to an indigenous North Caucasian ethnic group (“Native”), a respondent's perception of ethnic Tension in her or his republic, and the density of his or her inter-ethnic Networks.<sup>11</sup>

The ordered logistic regression models displayed almost exactly the same results. In the full model, all of the explanatory variables were significant, including Income, Income Squared, Native, and ethnic Tension perception. Education and Education Squared were also statistically significant, but only by the 10% level ( $p < 0.1$ ).<sup>12</sup> Because the core results remain largely the same as in the simpler binary logistic regression analysis, we report the results from the simpler models.

### Conclusion

The objective of this article has been to examine the differential demand for indirect rule. We developed the outlines of a micro-level theory of indirect rule based on individual's economic position. The main prediction of the theory is that, because individuals belonging to the middle class stand to gain the most from a

shift to indirect rule, the middle class should therefore express the greatest demand for it. Those in the lower class possess the greatest grievances but will have relatively little demand for indirect rule because their most immediate goal of survival trumps other social aspirations, including greater autonomy and indirect rule. The wealthiest social stratum is also unlikely to demand a significantly greater amount of indirect rule, because it is precisely this social group that extracts the greatest rents and benefits most from the existing order.

We tested this expectation using unique survey data from the North Caucasus and estimated a logistic regression model of the demand for indirect rule. Material conditions and perceptions appear to play a significant role in explaining variation in the demand for indirect rule. Similar to the nineteenth century nationalisms in Central and Western Europe, we find that the middle class displays the highest levels of nationalism as embodied in the demand for indirect rule (Hroch 1985). This is also largely consistent with Hechter's theory about growing cultural differences in societies where central governments have succeeded in providing basic services and public goods. An important manifestation of cultural differences in the North Caucasus is the demand for indirect rule, which is a function both of economic and ethnic factors.

Although our results are supportive of the theory and provide important micro-level evidence for the role of economic position in accounting for the differential demand for indirect rule, our study also has notable limitations. Foremost among these is that our data, although highly valuable, only cover one point in time. As a result, we are unable to examine how changes in the provision of public goods over time influence the demand for indirect rule in peripheral regions. The analysis does suggest, however, that economic position and ethnicity may have some implications for understanding why some individuals and groups appear to demand more indirect rule, whereas others appear reasonably content to be ruled directly by others.

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## Notes

1. Although the Ottoman Empire's use of the *millet* system concerned religious rather than ethnic communities, it is a familiar case in point (Barkey 2005).
2. This implies that for any  $x$  and  $y$  in the interval and for any  $t$  in  $[0,1]$ :  $f(tx + (1 - t)y) \geq tf(x) + (1 - t)f(y)$ .
3. Of course, to the degree that Moscow's affirmative action policies contributed to the occupational mobility of Caucasians, this should have had a countervailing effect on the demand for indirect rule (cf. Giuliano 2011).
4. Russian Federal Law #159-FZ, passed on December 11, 2004.

5. In 2011, over 400 people died and about the same number were killed in attacks in Dagestan, more than all other republics of the North Caucasus combined (see Caucasian 2012).
6. According to the U.S. State Department's website, "Travel to the North Caucasus region of Russia is dangerous; the Department of State recommends U.S. citizens not travel to Chechnya and the rest of the North Caucasus region" ([http://www.travel.state.gov/travel/cis\\_pa\\_tw/cis/cis\\_1006.html](http://www.travel.state.gov/travel/cis_pa_tw/cis/cis_1006.html)).
7. To test for robustness, we also considered a multinomial logit and an ordered logit with three categories, using "keep things as they are" as the middle category. Since the results were largely the same, we opted for the simpler binary logistic regression analysis.
8. For example, Nogays and Abaza in Karachay-Cherkessia would still count as "natives," even though they are not titular ethnic groups.
9. We used the `rrp` package in R for our multiple imputation (S.M. Iacus; [stefano.iacus@unimi.it](mailto:stefano.iacus@unimi.it); [http://www.unt.edu/rss/class/Jon/R\\_SC/Module4/M4\\_SomeMissingValueImputation.R](http://www.unt.edu/rss/class/Jon/R_SC/Module4/M4_SomeMissingValueImputation.R)). The standard assumption about missingness at random was made. Politically charged and sensitive questions, such as one's attitude toward president Vladimir Putin ("noputin") or one's attitude toward the local governor ("norep"), exhibit the most missing data. On endorsement and list experiments to elicit more truthful answers to sensitive questions, see Bullock, Imai, and Shapiro (2011) and Blair, Imai, and Lyall (2012).
10. The correlation coefficient between income and education in the data sample is 0.17.
11. The explanatory variables only multinomial model featured slightly higher significance of all variables. The control model showed significance for all variables except the variable measuring the length of a person's stay in the area, Migrate.
12. In the model with explanatory variables only, these predictors displayed slightly higher significance than in the full model: Education and Education Squared were significant at the 5% level. The control variables were all significant, except Migrate. Trust toward strangers was weakly significant.

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## Appendix A. Robustness tables

### Multinomial models

Predictor	Controls (Mod.1)	Explanatory (Mod.2)	Full (Mod. 3)
2: President disapproval	0.05 (0.16)		0.076 (0.16)
3: President disapproval	0.27** (0.09)		0.27** (0.09)
2: Governor disapproval	− 0.36** (0.12)		− 0.36** (0.12)
3: Governor disapproval	− 0.22*** (0.07)		− 0.21** (0.07)
2: Hard life	− 0.46*** (0.11)		− 0.39*** (0.11)
3: Hard life	− 0.34*** (0.06)		− 0.31*** (0.07)
2: Trust	0.17 (0.12)		0.15 (0.13)
3: Trust	− 0.16 (0.07)		− 0.11 (0.07)
2: Migrate	0.06 (0.13)		0.041 (0.13)
3: Migrate	0.12+ (0.07)		0.13+ (0.07)
2: Income		0.84 (0.62)	0.87 (0.63)
3: Income		1.04** (0.31)	1.02** (0.32)
2: Income Sq.		− 0.09 (0.10)	− 0.11 (0.10)
3: Income Sq.		− 0.14** (0.05)	− 0.14** (0.05)
2: Education		0.30 (0.38)	0.36 (0.39)
3: Education		0.40* (0.20)	0.39+ (0.21)
2: Education Sq.		− 0.03 (0.04)	− 0.03 (0.22)
3: Education Sq.		− 0.05* (0.02)	− 0.04+ (0.02)
2: Native		− 0.08 (0.22)	− 0.03 (0.22)
3: Native		0.75*** (0.13)	0.75*** (0.13)
2: Tension		− 0.78*** (0.18)	− 0.71*** (0.18)
3: Tension		− 0.33*** (0.09)	− 0.31*** (0.09)
2: Network		− 0.17 (0.33)	− 0.17 (0.34)
3: Network		− 0.45* (0.19)	− 0.39* (0.19)

Note: Significance codes (standard error): \*\*\*0; \*\*0.001; \*0.01; +0.05.

### Ordinal models

Predictor	Controls	Explanatory	Full
President disapproval	0.26*** (0.08)		0.25** (0.08)
Governor disapproval	− 0.18** (0.06)		− 0.17** (0.06)
Hard life	− 0.28*** (0.06)		− 0.26*** (0.06)
Trust	− 0.18** (0.06)		− 0.12+ (0.07)
Migrate	0.11 (0.07)		0.10 (0.07)
Income		0.97*** (0.29)	0.95** (0.29)
Income Sq.		− 0.13** (0.05)	− 0.14** (0.05)
Education		0.37* (0.19)	0.35+ (0.19)
Education Sq.		− 0.04* (0.02)	− 0.04+ (0.02)
Native		0.72*** (0.12)	0.72*** (0.12)
Tension		− 0.25** (0.08)	− 0.23** (0.08)
Network		− 0.44** (0.17)	− 0.37* (0.17)

Note: Significance codes (standard error): \*\*\*0; \*\*0.001; \*0.01; +0.05.

Generalized linear mixed model

Predictor	Controls	Explanatory	Full
President disapproval	0.31*** (0.08)		0.31** (0.09)
Governor disapproval	− 0.17* (0.07)		− 0.16* (0.07)
Hard life	− 0.28*** (0.06)		− 0.25*** (0.07)
Trust	− 0.20** (0.07)		− 0.16* (0.07)
Migrate	0.09 (0.07)		0.10 (0.07)
Income		1.19*** (0.31)	1.17*** (0.31)
Income Sq.		− 0.18*** (0.05)	− 0.19*** (0.05)
Education		0.15* (0.20)	0.14+ (0.21)
Education Sq.		− 0.02 (0.02)	− 0.02 (0.02)
Native		0.75*** (0.14)	0.70*** (0.14)
Tension		− 0.07 (0.09)	− 0.04 (0.09)
Network		− 0.22 (0.18)	− 0.16 (0.18)

Note: Significance codes (standard error): \*\*\*0; \*\*0.001; \*0.01; +0.05.

Appendix B. List of survey questions used in the analysis with answers

*Dependent variable: Rule*

Which of these statements reflects your opinion most closely?	
Federal government should have more powers than currently	1
Republican government should have more powers than currently	2
Republic should have more powers to manage the economy	3
Everything should stay the same	4
Hard to say	5

*President disapproval*

In general did Vladimir Putin as President of the Russian Federation have more achievements or failures?	
Achievements	1
Somewhat achievements	2
Somewhat failures	3
Failures	4
Hard to say	5

*Governor disapproval*

In general are there more achievements or failures in the activities of the head of your republic?	
More achievements	1
Somewhat more achievements	2
Somewhat more failures	3
More failures	4
Hard to say	5

***Hard life***

Do you think life in your republic in general is easier, harder, or about the same as elsewhere in the Russian Federation?

Easier	1
Somewhat easier	2
About the same	3
Somewhat harder	4
Harder	5
Hard to say	6

***Trust***

When you deal with strangers do you tend to trust or distrust them?

Trust	1
Somewhat trust	2
Somewhat distrust	3
Distrust	4
Hard to say	5

***Migrate***

For how long have you lived in your town/village?

All my life	1
Most of my life	2
The last 5–10 years	3
The last 1–4 years	4
Less than a year	5
Other	6
Hard to say	7

***Income***

To what group of population would you refer your family?

Not enough money for food	1
Enough money for food, but not for clothing	2
Enough money for food and clothing	3
Sometimes we can buy expensive items	4
We can afford everything	5
Hard to say	6

### ***Education***

Your education level:

1. 7 grades and below
2. Unfinished secondary school
3. Finished secondary school, including professional training
4. Secondary education, including technical school
5. Unfinished college (fewer than 3 years)
6. BA
7. Graduate school
8. Doctorate and up

### ***Native***

- 0 – non-Native to the republic  
 1 – Native to the republic

### ***Tension***

What is your assessment of interethnic relations in the republic?

- |  |   |
|--|---|
| Stable                                 | 1 |
| Little tension                         | 2 |
| Heavy tension, some degree of conflict | 3 |
| Hard to say                            | 4 |

### ***Inter-ethnic networks***

Do you have friends from among other ethnicities?

- |             |   |
|-------------|---|
| Yes         | 1 |
| No          | 2 |
| Hard to say | 3 |

### ***Region:***

- 1 – North Ossetia
- 2 – Karachay-Cherkessia
- 3 – Dagestan
- 4 – Adygea
- 5 – Ingushetia
- 6 – Kabardino-Balkaria
- 7 – Chechnya