Patterns of Regional Authority

GARY MARKS*, LIESBET HOOGHE* & ARJAN H. SCHAKEL**

*University of North Carolina, Chapel Hill, USA and Free University, Amsterdam, The Netherlands, **Free University, Amsterdam, The Netherlands

ABSTRACT This paper introduces a new dataset on regional authority in 42 democracies for 1950–2006 and formulates five hypotheses. First, an S-curve effect describing a logistic association between the population of a country and its regional authority. Secondly, a heteroskedasticity effect, in which the variance in regional authority among larger countries is greater than that among smaller countries. Thirdly, an identity effect, in which the allocation of authority to a jurisdiction is influenced by the relative strength of a population’s identity to the community encompassed by the jurisdiction. Fourthly, a democracy effect, which leads democracies to have higher levels of regional authority than dictatorships. Fifthly, an integration effect, which removes a potential economic cost on regionalization by providing a transnational frame for economic exchange.

KEY WORDS: Regions, multilevel governance, decentralization, identity, regionalization

Introduction

This paper summarizes some fundamental patterns of regional authority since 1950, in 42 democracies and semi-democracies. We use data from an index of regional authority for all levels of government below the national level with an average population greater than 150,000.

Regional authority varies a lot, both cross-sectionally and over time. Some countries have no regional level, others have authoritative regional governments that play a decisive role not only in their respective regions, but also in the country as a whole. Of the 42 countries in the dataset, eight have no regional tier, 17 have a single tier, 16 have two regional tiers and one (Germany) has three. The variation we observe in the index of regional authority shows no signs of declining over time. The standard deviation in country scores is as great in 2006 as it was in 1950. However, there has been a marked increase in the level of regional authority over the past half-century. Not every country has become regionalized, but where we see reform over time, it is in the direction of greater, not less, regional authority by a ratio of eight to one.
These two characteristics, wide variation across countries and time, and near-uniformity in the direction of change, are puzzling. Do they result from distinct causal processes or can they be explained by a single theory? Our attempt to measure regional authority yields a mosaic of scores across countries and time (see Appendix B to this special issue), but we believe that it reflects some basic organizational principles.

Our strategy is to begin by evaluating the functional pressures on regional government. Countries with larger populations experience greater (and nonlinear) functional pressure for regional governance. But the theory presented here is not a functionalist theory. The generalizations we set out suggest both the power and the limits of optimality in structuring government. To understand the structure of subnational government, one needs to engage distributional conflict and identity politics.

Variation Over Time

Of the 42 countries in the dataset, 29 saw an increase in the index of regional authority over the period of evaluation, eleven saw no change, and two show a decline.

No country has become much less regionalized, though we estimate a decline in two countries. Sweden’s Regional Authority Index (RAI) decreases from 13.5 to 10.0 as a result of the abolition of the upper chamber of the Riksdag in 1971, which was composed of regional (län) representatives. This put a stop to shared rule for the län, which was offset only partially by increased regional self-rule. Serbia and Montenegro drops 1.5 points, from 25.9 to 24.4, mainly on account of Serbia’s loss of Kosovo to the United Nations.

Eight of the 11 countries that saw no change begin and finish the time series with an index of zero. The reason points to a functional constraint on regionalization: country size. All eight have a population of 2.5 million or less and their median population is 1.09 million. A country with a small population has little space in which to squeeze an intermediate level of government between local authorities and the national government. Why pay for a regional level of government if local authorities serve populations of up to 150 000 and the total population of the country is in the low millions? The jurisdictional challenge for these countries lies in creating public goods above the national state, not below it (Hooghe et al., 2006).

A second functional constraint is that countries with high levels of regionalization face a ceiling effect. The measurement instrument does not impose a mathematical upper limit on regionalization because it is always logically possible to create and empower an additional level of regional governance. But this is a logical, rather than a practical, possibility. Two of the 11 countries that saw no change—Switzerland and Bosnia and Herzegovina—had little scope for further regionalization. In general, countries that were relatively decentralized in 1950—Australia, Canada, Germany, Switzerland and the USA—saw, at most, a small increase in regional authority over the next 56 years.

Functional constraints arising from small population or the ceiling effect cannot account for the remaining country that does not shift, Bulgaria, nor do they explain the UK, where the net increase in regional authority is less than one point. Both countries remain considerably less regionalized than other countries of their population size. Bulgaria, with a population of 7.8 million, is the only country over 2.5 million
which has so far resisted regionalization, while the UK, with a population of 60 million, is only slightly more regionalized than Poland or Turkey, which are the least regionalized larger countries in the dataset. One must draw on additional factors, including the strength of national versus subnational identities, to explain these cases.

What one can say is that it is easier to identify the characteristics of countries that have not regionalized than to identify the characteristics of countries that have. This is a revealing statement, for it suggests that the causes of regionalization are diverse. The countries that have changed most are non-federal countries with populations larger than three million, but here end the commonalities. Regionalization has taken place in small countries and large countries (measured by population and territorial size), ethnically diverse societies and ethnically homogeneous societies, countries that were centralized in 1950 and countries that were regionalized in 1950, established democracies and new democracies. The next section will have more to say about each of these, but it is worth noting immediately that regionalization has taken place, to some degree, in all but a few countries not shielded by their tiny population size or by the fact that they were already highly regionalized.

This is consistent with a post-functionalist account of multi-level governance which assumes that the provision of governance is subject to functional pressures, but that the extent to which these pressures lead to reform depends on distributional and identity effects (Hooghe and Marks, 2008). Functional pressures arise because some collective problems (such as town planning or fire protection) are best handled at a population scale of tens of thousands, some (such as secondary education or hospitals) are best dealt with at a scale of hundreds of thousands, others (such as tourism promotion or transport infrastructure) at a scale of millions, while yet other problems require jurisdictions that are vastly larger.4

Optimality is consistent with jurisdictional change, not stasis, if the policy portfolio changes over time. When conventional war-making dominates policy, as it did for much of the first half of the twentieth century, it may be optimal to bundle authority at the national level. War-making and extracting resources necessary for war were instrumental in the development of national education, national taxation, conscription, and national ownership or control of mineral extraction, transport and munitions (Tilly, 1990; Marks, 1989, 1997). In the years immediately following World War II, central states were called upon to distribute scarcity and to mobilize resources, human and financial, to rebuild battered economies.

The period since 1950 has seen unparalleled diversification in the policy portfolio of national states to welfare, environmental, educational, infrastructural and microeconomic policies.5 Unlike conventional war-making, these policies do not press authority toward the central state. Functional pressures for regionalization require simply that the policy portfolio of national states comes to include policies that are most efficiently delivered at diverse jurisdictional scales, including a regional level between the local and national.

On this logic, countries that do not experience regionalization are those where regional governments are already authoritative or where the small size of the country limits the benefit of regional government. Predicting the positive side of the equation is more difficult because much intervenes between functional pressures and jurisdictional reform. This is not only because institutions are sticky and, correspondingly, institutional reform is difficult to point-predict. More importantly, political
choice mediates the effect of functional pressures for institutional outcomes. The level of authoritative decision making has consequences for the distribution of power, for the distribution of income and for self-governance. As we look further into the data, the causal force of these intervening political factors will become apparent.

Figure 1 indicates the annual number of reforms across 42 countries between 1950 and 2006, distinguishing reforms that increase regional authority and those that decrease regional authority. The unit is a reform that shifts regional authority across one or more categories in any direction on the scale. There are 384 such reforms, of which 342, or 89%, increase regional authority. So we are observing a process that has been one-sided over quite an extended period of time.

Did the cultural shift of the late 1960s kick-start the process? Figure 1 suggests an almost frozen institutional landscape following World War II, which was transformed, from the 1970s, into a torrent of reform. The 1970s saw 85 reforms, more than twice as many as the 1950s and 1960s combined. The first moves in the early 1970s relaxed centralization in formerly centralized states—creating communities and regions in Belgium (1970); new regional governments in France (1964, 1972); regional councils in New Zealand (1974), comunidades autónomas in Spain (1978 onwards), and regional elections in Denmark (1970), Italy (1972) and Norway (1975).

This first round of institutional creation coincides with a cultural shock that swept across the globe in the late 1960s and which, in the West, took the form of youth rebellion and new forms of self-expression that questioned or, more usually, confronted, conventional norms. Norms that were taken for granted—materialism, cultural progress and short hair—were explicitly challenged, as were political norms, including deference to political leaders and centralized decision making. In 1973, E. F. Schumacher wrote a book entitled Small is Beautiful, which fiercely questioned the virtue of a materialist

Figure 1. Reform of regional authority (1950–2006).

Note: The unit of reform is a shift of one or more categories on one dimension of regional authority. Dark bars refer to reforms increasing authority. Light bars refer to reforms decreasing authority. n = 384
culture based on ever larger organizations that appeared to be out of touch with human need. The 1970s saw also the mobilization of minority nationalisms, for example, in Belgium, Britain, Canada, France, Italy, Spain and Switzerland.

The Composition of Regionalization

A region can exert authority over the lives of its inhabitants (a) by running its own affairs with some degree of independence (self-rule) and (b) by having some share of authority in the country as a whole (shared rule).

A Pearson correlation for self-rule and shared rule across 42 countries in 2006 yields a linear estimate of 0.70 ($p < 0.001$), but this is misleading. Twenty-nine countries have little or no shared rule but vary considerably on self-rule, from zero (Iceland, Estonia, among others) to 16 (France). Thirteen countries have high levels of both self-rule and shared rule. These are the federal countries in the dataset plus Italy, Spain and the Netherlands.

One of the strengths of the Regional Authority Index is that it does not estimate subnational authority as a function of federalism. Federalism, conceived as a constitutionalized system of authority which neither the centre nor constituent units can unilaterally change, is empirically associated with regional authority, but the two are not the same.

- The association between self-rule and federalism has weakened since 1950. The chief reason for this is that most countries have experienced pressures for regional self-rule whether or not they are federal. In 1950, non-federal countries had an average score of 4.1 for self-rule; in 2006 this increased to 8.7. The federal/non-federal distinction tells one almost nothing about the chief source of change in government structure in advanced industrial societies over the past half-century or more.

- The causality between regional authority and federalism runs in both directions. In 1950, all highly decentralized countries were so because they had adopted federal constitutions (Australia, Canada, Germany, Switzerland, USA). Since 1950 Belgium, Spain and Italy have seen large increases in regional authority prior to constitutional change embodying federalism. Belgium adopted a federal constitution in 1993, after two decades of regionalization; Spain and Italy have yet to do so.

- The chief effect of federalism is to lock shared rule in supermajoritarian institutions. One consequence is that federal countries have seen less change in regional authority than similarly sized non-federal countries. Another is that the association between federalism and shared rule has increased since 1950, as that between federalism and self-rule has weakened. The reason for this is that few non-federal countries that have gained self-rule have also gained shared rule.

A general relationship appears to underlie these developments. Self-rule is easier to reform than shared rule. An increase in regional self-rule involves a shift of competencies (e.g. over taxes or welfare policy) to regional governments or some increase in their independence (e.g. by creating directly elected regional assemblies or regionally selected executives). Such reforms change the locus of authority in a society, but they appear to be more decomposable from the overall structure than reforms that enhance
shared rule. To increase shared rule, reformers must establish the regional principle of representation (against one person, one vote), empower the second chamber, allow regions to co-decide national policy, or change the rules for amending the constitution.

If shared rule faces a higher reform hurdle than self-rule one might expect it to be more stable over time and accessible only to stronger regions. The index distinguishes four components of self-rule and four components of shared rule. Figure 2 charts the number of reforms in each category and reveals that self-rule has been reformed much more frequently than shared rule. Of 384 reforms in Figure 2, 289 are reform of self-rule, 95 of shared rule. Over the period 1950–2006 as a whole, one detects change in self-rule in 29 of the 42 countries in the dataset, and change in shared rule in 12 countries.

Shared rule is limited to regions that have strong self-rule. In 2006, all twelve countries that score one or more on shared rule also score eight or more on self-rule, and nine of these score 12 or more on self-rule. One sees a similar phenomenon over time. Shared rule increased by a point or more in six countries, with an average score of 17.9 on self-rule, and was abolished for Swedish län in 1971 (self-rule = 10), Belgian provincies in 1995 (self-rule = 9) and Croatian županije in 2001 (self-rule = 9).

The incidence of reform has been greatest in representation, mainly in the direction of deepening democracy at the regional level. Elected institutions at the regional level have always been a facet of federal polities, but the idea has spread. Sixteen of

---

**Figure 2.** Reform of self-rule and shared rule (1950–2006).

_Note:_ The unit of reform is a shift of one or more categories on one dimension of regional authority. Dark bars refer to reforms increasing authority. Light bars refer to reforms decreasing authority. The first four dimensions measure self-rule; the second four dimensions measure shared rule. \( n = 384 \)
42 countries had directly elected regional assemblies in 1950 or when they became democratic. By 2006, an additional 12 countries had adopted the principle, and three of the original 16 had extended the principle to a newly created regional tier. It is not easy, and perhaps not possible, to explain this as a response to functional pressure. More plausibly, directly elected regional assemblies have gone hand in hand with regionalization on account of the liberal democratic norm that those who exercise significant authority in general-purpose jurisdictions should compete for election (Hooghe and Marks, 2003).

Reform of fiscal authority has been less pronounced. The functional benefits of giving regions greater authority over taxation are contested between those who claim that tax autonomy sharpens allocative efficiency and those who warn that regional tax autonomy may lead to a race to the bottom (Musgrave, 1997; de Vries, 2000; Treisman, 2007). By our account, regional governments in thirteen countries gained fiscal autonomy, while one (German Länder) lost such authority.

Five Generalizations

We propose five hypotheses to explain cross-national and temporal patterns of regional authority.

- First, an *S-curve effect* describing a logistic association between the population of a country and its regional authority.

  Very small countries reap no functional benefit in regional authority. At some point (population > 2.5 million) the benefits of regional authority emerge and increase rapidly until the population reaches around twenty million, at which point the benefits of regionalization in relation to population begin to level off.

  Figure 3 illustrates this. No country in the dataset with a population of less than 2.5 million has regional government (defined as an intermediate jurisdictional level encompassing a mean population of 150 000 or more). Presumably, the gap between local government and national government in such societies is too small to justify an additional layer of government. That is to say, the costs of creating and maintaining a regional level of government outweigh the benefits of scale diversity.

  The greatest increase in regional authority appears in countries with a population of three to twenty million. All democratic countries with a population of more than twenty million have quite serious levels of regional authority. Even in Turkey, which has the weakest regions among all countries larger than Bulgaria, one finds provincial administrations, with responsibility for transport infrastructure, hospitals and schools, having directly elected councils to which provincial executives are accountable.

- Second, a *heteroskedasticity effect*, in which the variance in regional authority among larger countries is greater than that among smaller countries.

  Functional pressures may lead to reform, or then again they may not. Where they exist, functional pressures are mediated by the distributional and identity effects of reform. These vary widely across countries and give rise to sharply contrasting outcomes.
homogeneous, rates of change. This is what is found when regional authority is examined over time, as in Figure 4 which plots 21 countries in 1950. Iceland, Luxembourg, Canada, Germany, Switzerland and the USA were not subject to functional pressure in 1950, either because they have small populations or because their level of regional authority puts them well above the S-curve. Over the following 56 years, these countries experienced, on average, a slight increase in regional authority, with little variation. The remaining countries in Figure 4 witnessed a considerable average increase in regional authority, but with a standard deviation that is about as large as the increase.

Before generalizing about the sources of such variation, a paradox should be noted. The more closely one examines the particular circumstances of an individual reform, the less it may appear to be determined by optimality. The logic of optimality excludes certain possibilities, but rarely specifies a unique optimum. So, for example, a local good such as refuse disposal may be optimally provided at the regional—or, arguably, the local—level, but not at the national, continental or global level.\textsuperscript{18} Optimality is usually evidenced by the fact that certain alternatives are off the table, which does not imply that there is consensus about those that remain. Optimality is therefore most evident in aggregation.

• Third, an \textit{identity effect}, in which the allocation of authority to a jurisdiction is influenced by the relative strength of a population’s identity to the community encompassed by the jurisdiction.\textsuperscript{19}
The identity effect arises because individuals prefer rulers who share their ethno-cultural norms. This is a powerful impetus for regional self-government in countries that contain distinct ethno-territorial groups, and a powerful impetus towards centralization where a strong national identity confronts weak regional identities (Smith, 1995; Brubaker, 1996; Marx, 2003). Hence, where regional identity is strong, one should find more regional authority than one would expect on optimality grounds; where national identity is strong, one should find less regional authority.20

This appears to be the case in Figure 3. Solid circles represent countries where the probability that two randomly selected individuals belong to a different ethnic group is 0.4 or greater. The measure is crude for our purpose because it does not reveal whether an ethnic group is, or is not, territorially concentrated, but it does, nevertheless, distinguish countries that lie above the S-curve.

We have no measure of the intensity of national identity in relation to regional identity, but we perceive its effect in some countries that lie furthest below the S-curve—Turkey, Poland, Bulgaria, Portugal, the UK and Japan.

Ethnic diversity is sensitive to the level of aggregation. The units of a heterogeneous confederation may themselves be relatively homogeneous, as in Czechoslovakia. When Czechoslovakia split in 1993, the Czech and Slovak regimes were each much more homogeneous (and less regionalised) than the former regime.21

Fourth, a democracy effect, which leads democracies to have higher levels of regional authority than dictatorships. We know more about how regional authority
affects the quality of democracy than is known about how democracy affects regional authority. Our intuition is that regional authority depends on whether a regime is a democracy or dictatorship, but that the effect is nonlinear. Dictatorship stifles decentralization, but democracy produces only the possibility of dispersion of authority, not the thing itself.

Dictators strive to centralize authority in their own hands. They rule because they decide who rules; their tenure depends on frustrating or eliminating alternative claimants. Dispersing authority is a dangerous luxury for a dictator if it provides opponents with an alternative power base. The tenure of a democratic ruler does not depend on his or her ability to monopolize authority, but on elections. Whether more regional government helps or hurts a ruler’s electoral chances depends on the optimality of the current institutional set up in relation to the policy portfolio, the distributional consequences of reform and the extent to which it jars existing identities. These are situational. There is no reason why politicians competing in elections should always propose to decentralize authority, but then again there is no reason to believe that they will always resist doing so (Hooghe and Marks, 2001). Hence, dictatorship is expected to inhibit regionalism, while democracy lets the chips fall where they may.

One cannot evaluate the validity of this hypothesis in a dataset where case selection is biased to democratic polities, but the evidence about change is broadly in line with it. An implication of the democracy effect is that a country which shifts from autocracy to democracy will be subject to pressures that may lead to regionalization. Figure 5 plots average increases per decade in regional authority in longstanding democracies and in countries under democratic transition, and shows that the rate of regionalization is, on average, higher in the latter.

Fifth, an integration effect, which lowers the economic costs of regionalization by providing an overarching framework of rules for economic exchange.

When economic rule-making is transnational rather than national, existing patterns of trade are insulated from reform in the allocation of authority within countries. Shifting authority to a region does not then impose economic autarky, and is therefore less costly for the region (Marks and Hooghe, 2000; Jolly, 2006).

Assessing this effect is complicated because European integration may increase regionalization for other reasons (Börzel, 2002). Several member states have created regional levels in order to conform with EU rules on cohesion funding (Hooghe, 1996; Brusis, 2002; Hughes et al., 2005; Bache, 2007). And regions in several European countries have sought to bolster their powers in education, research, transport and trade—including forming international partnerships—so as to compete more effectively in the single market. Within an individual country, a weak region does not suffer a competitive disadvantage because it is just one among similarly weak regions. Except in asymmetrical regionalization, jurisdictional reform does not affect the competitive situation of a region relative to others in the same country. The EU, however, integrates previously insulated subnational systems and, hence, brings regional governments into competition. The perception is that weak regions are at a disadvantage (Jeffery, 2000).

A comparison of EU and non-EU countries is weakly consistent with the expectation that EU membership increases regionalization. The mean increase in regional authority for each year a country was a member of the EU is 0.11; the mean increase
for each year a country was not a member of the EU is 0.07. On this estimate, it would take 29 years of EU membership to increase regionalization by an additional category on this measurement instrument.23

Conclusion

Regional government in 42 advanced industrial societies over the past half-century can be summarized under two headlines. The first is that change is overwhelmingly in one direction. We detect 42 reforms that weaken regional authority and 342 reforms that strengthen regional authority—a ratio of about 1:8. Twenty-nine countries surveyed have regionalized, two have become less regionalized, and eleven are unchanged.

We suspect that near homogeneity in the direction of change is not unique to the post-World War II period. A prior era of state building, which lasted for considerably more than a century, was characterized by similar consistency in the direction of change, but with the opposite sign. So an era of centralization has been followed by an era of decentralization.

Secondly, there is wide variation across countries in the level of regional authority. Eight countries have no regional level of government, even after more than half a century of regionalization, and a further four score less than 5 on the Regional Authority Index. Thirteen countries have regions that exert considerable authority, scoring more than 15 on the index. So the variation is wide. The standard deviation

Figure 5. Democracy and regional authority.

Note: The y-axis indicates annual change per decade in the Regional Authority Index. \( n = 38 \). Established democracies are countries that are scored ‘free’ for 1972–2006 by Freedom House. A country that changes from ‘not free’ to ‘partly free’, is scored to be in democratic transition for a period of ten years. We exclude from this category countries that return to ‘not free’. Source: http://www.freedomhouse.org/ (historical data: comparative scores)
for 42 countries in 2006 is 9.1, which is almost as large as the average score, 10.8. This variation appears historically robust. Although many polities became more centralized in the first half of the twentieth century, relatively decentralized federal polities continued to co-exist with highly centralized polities.24

Imre Lakatos argued forcefully that scientists should put the necks of their theories on the block by making falsifiable predictions. Our chief goal has been to provide carefully constructed data on a basic political phenomenon. But we wish also to take Lakatos’ advice, knowing that our own necks are likely to be safe irrespective of the fate of the theory.

Casting aside timidity: countries above the S-curve will, in the next few decades, experience much less regionalization on average and much more homogeneity with respect to change than those below the S-curve. One would then expect little or no regionalization in Bosnia and Herzegovina or in Belgium (barring their possible break up into entities with low or middling levels of regional authority), or in Denmark, Sweden, Switzerland, Austria, Germany and the USA. Conversely, Bulgaria, Turkey, Poland, Romania, the UK and Japan are subject to functional pressures that will lead to a large average shift towards regional authority, but with a large standard deviation.

Countries that become democracies will experience a shift in the causality of regionalization that will, on average, lead to higher levels of regional authority, whereas countries that become non-democracies will, on average, face absolute declines. So, for example, if Turkey further democratizes it will likely regionalize; if Russia continues on a non-democratic path it will probably become more centralized.

The logic of this theory is that regional governance could be reversed because the policy portfolio changes (reallocating competencies to a single authoritative level, e.g. in response to war); for distributional reasons (for example, when dictators compress authority in their own hands); or on account of the mobilization of an exclusive identity (e.g. nationalism). However, we predict that even if none of these things happen in the advanced democracies, the mean pace of regionalization will slow. Figures 1 and 5 suggest that this may already be happening. As regional authority increases, so the functional pressure for further growth diminishes. Moreover, one of the chief facilitators of regionalization—democracy—has been in place for several decades in most of the countries we examine. The era of regionalization in the advanced democracies may come to a close within a generation, but, if history is any guide, stasis thereafter would be the last thing one would expect.

Notes

1Currently, the five largest Länder in Germany have two additional regional levels (Regierungsbezirke and Kreise) while smaller Länder have at most just one additional regional level.

2For the 21 countries for which we have data since 1950, the standard deviation in 1950 is 8.9, and in 2006 it is 8.5. The mean score in 1950 is 9.3 and in 2006 it is 13.5.

3In a four-country study of local elite preferences on decentralization, De Vries (2000) finds that country size is the strongest predictor of a general positive attitude towards decentralization.

4This list is derived from an expert survey of optimal jurisdictional scale undertaken by the authors. See also Amin and Thrift (1995), Keating (1995), Crouch et al. (2001).
Patterns of Regional Authority


7 Calculated for the 21 countries for which we have data since 1950. If one includes Belgium among non-federal countries, the average in 2006 is 9.6.

8 The association with shared rule increased from 0.65 to 0.85, and the association with self-rule decreased from 0.85 to 0.66 (21 countries).

9 Shared rule is almost always exercised by the highest level of government under the national. This is what one would expect when independent entities make a pact to create a federal polity in which they share rule. The exceptions are in non-federal polities (Spain, where provincias, which pre-date comunidades, predominate in the second chamber, and Belgium, where provinces predominated in the second chamber prior to the empowerment of the communities) and in a de-federalizing polity (Russia, where subwekty federacji became the second-highest level of subnational government after president Putin created a super-level of government in an effort to outflank them).

10 As detailed in Appendix B, the only countries to move down a bit on representation are the UK (−0.8), with the abolition of elected county councils in Scotland, Wales and parts of England; Germany (−0.1), with the abolition of Regierungsbezirke in various Länder; and Serbia and Montenegro (−0.7), when Kosovo came under UN mandate.

11 Australia, Austria, Belgium, Bosnia and Herzegovina (two tiers), Canada, France, Germany (two tiers), Italy, Japan, the Netherlands, Romania, Russia, Serbia and Montenegro, Switzerland, the UK and the USA.

12 Croatia, Czech Republic, Denmark, Greece, Hungary, New Zealand, Norway, Poland, Slovakia, Spain, Sweden and Turkey. New directly elected regional tiers were created in Belgium, France and Italy.

13 North (1990), however, argues that democratic institutions lower transaction costs of economic exchange.

14 The same argument has been applied to the empowerment of the European Parliament.

15 In several cases the gains fell to asymmetrical or special autonomous regions: territories in Australia and Canada, Azores and Madeira in Portugal, Scotland and the Greater London Authority in the UK. Judete in Romania obtained fiscal autonomy, and lost it ten years later.

16 Multivariate analysis is required to evaluate the validity of these hypotheses—or “guesses” in Richard Feynman’s words (1967).

17 This is a hypothesis for a particular set of governments with a given set of policy portfolios at a particular time, namely, the second half of the twentieth century. Here we must put aside the question of how the structural implications of optimality change over time.

18 While policy experts often disagree about the precise scale at which a policy will be optimally provided, they usually agree in excluding several possible scales.

19 The causality may run in both directions. That is to say, the existence of a government may strengthen the identity of the population it encompasses.

20 The policy hypothesis is that individuals with different ethno-cultural traditions desire heterogeneous mixes of public goods, such as education, welfare and economic policy (Alesina and Spolaore, 2003). The self-government hypothesis is that individuals sharing ethno-cultural norms desire self-rule on intrinsic grounds (e.g. Keating, 1998; Loughlin, 2001). While the validity of these hypotheses varies across space and time, we suspect that the self-government hypothesis is more powerful in the presence of ethno-cultural groups.

21 Aggregation is highly asymmetrical in three countries that lie furthest above the S-curve: Serbia and Montenegro, Bosnia and Herzegovina and Belgium. The regional authority score for Serbia and Montenegro in 2006 is 24.4; after partition, in 2007, it is zero in Montenegro and 3.3 in Serbia.

22 In an unpublished paper analysing cross-sectional data for 166 countries, Treisman (2002) finds that democracy is correlated with several indicators of decentralization, but notes that economic development, not democracy, may explain the association. Our data, which are longitudinal, allow us to examine post-democratic reform when economic development does not change much, and the results are consistent with the notion that democracy has an independent effect.
The topic is ripe for multivariate analysis (e.g. controlling for identity and regime type) that accounts also for the effect of prospective EU membership on regionalization (as in Eastern Europe) (Schakel, 2007).

Riker (1996: 9) notes that it is worthwhile recalling that only in the nineteenth and twentieth centuries have federations been a widely used constitutional form. . . . And this is surprising because this era has also been an era of nationalism when the nation-state, the sovereign political organization of the people, is approved of.

References

Hooghe, Liesbet and Marks, Gary (2007), The vices and virtues of scale flexibility. Unpublished manuscript.
Hughes, James, Sase, Gwendolyn and Gordon, Clair (2005), *Europeanization and regionalization in the EU’s enlargement to Central and Eastern Europe: the myth of conditionality*. Basingstoke: Palgrave Macmillan.


Schakel, Arjan (2007), Toward a theory of regional authority: a multivariate analysis, Unpublished manuscript.


