

Weimar versus FPTP: The Role of Majoritarian Electoral Systems in Enabling Autocratizers

Brief overview: No-threshold list PR is often blamed for allowing Hitler to take over Germany; yet since 1945, majoritarian systems have been worse at preserving democracy than PR systems. We investigate how the electoral and party system impacts de-democratizing.

Abstract: *Causes of democratic backsliding are typically studied from either the autocratizers' side (supply side) or the electorate's side (demand side). Institutions most often enter the picture as part of the supply-side explanations. Autocratizers are constrained by the institutions in place, built to enforce some checks and balances, and the accountability of the leadership. The demand-side explanations mostly focus on the social and psychological determinants of voting for illiberal or anti-pluralist politicians and policies. Yet there may be some political institutions that influence both the supply and demand side. The paper sets out to analyze the impact of electoral and party system on democratic backsliding, by focusing on their demand-side influence. The empirical work, mostly based on the V-Dem dataset, supports the claim that majoritarian democracies, with their two-party (or two-block) systems, allow for more anti-pluralism to take hold than the proportional representation systems. The impact is two-fold. On the one hand, in majoritarian/two-party systems the erosion of checks and balances is facilitated by co-partisans taking over key veto points. On the other hand, the two-party system contributes to political polarization, which makes voters "act as partisans first and democrats only second" (Graham & Svobik 2020). Yet there are other factors influencing polarization, like economic inequality, and the paper proceeds by building models to address these complexities.*

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INTRODUCTION AND LITERATURE REVIEW

The causes of the last decades' wave of autocratization, most often referred to as democratic backsliding, are still heavily disputed. Yet there is widespread agreement about the phenomenology of the process. As Bermeo 2016 summed it up, the “new” kind of de-democratization is incremental, rather than one-shot. The mid-20th century forms of “coups d'état, executive coups, and blatant election-day vote fraud” gave way to “promissory coups, executive aggrandizement, and strategic electoral manipulation and harassment”. These latter terms have become seminal in the literature on democratic backsliding, and possibly one more term matches their heuristic importance, the “cartel party” (e.g. Katz & Mair 2009¹). There is also widespread agreement about would-be autocratizers using populist rhetoric to get into and remain in power.

From the point of view of causal explanations, these new ways of de-democratization bring the electorate into the equation. Coups d'état, executive coups, and election-day vote fraud could be carried out without any popular support, with pure force, of the military or of the state apparatus. Promissory coups, executive aggrandizement, and electoral manipulation need the support of a sizeable part of the electorate, though some accounts emphasize that autocratizers systematically go beyond the limits of the electoral authorization they receive in free and fair elections (until they exist). This obvious fact has led some researchers to state that democratic backsliding occurs in countries where popular support for democracy has already weakened (Jacob 2024, Wunsch, Jacob, & Derksen 2025). Others have been looking for the social-political features of the groups that may be the most tolerant towards the erosion of democratic institutions, and Svulik et al. 2023, for instance, reached the conclusion that “in Europe, democracy erodes from the right”. They found that people on the extreme right are most likely to support their politicians' transgression against democracy, while a group of “disengaged” do not pay attention at all. Actually, both groups defined by Svulik et al. 2023 can be seen as endpoints of a continuum. It is not only the disengaged who don't notice the erosion of democracy; Dahlum et al. 2025 argue that large segments of the electorate may misinterpret some de-democratizing moves and not classify them as anti-democratic. They found that the most obviously anti-democratic statements are likely to be punished by the electorate, but a large number of anti-democratic manifestations are not perceived as such. Hern 2025 introduces the term “visibility of autocratizing” and shows that visible trials for autocratizing have been punished in African elections. As for the illiberal radical right's tolerance for the anti-democratic manifestations of some nationalist politicians, an extended literature on polarization converges on the idea that in ideologically and/or affectively (politically and/or socially) polarized societies, partisan loyalty trumps support for democratic institutions (Svulik 2019, Arbatli & Rosenberg 2020, Graham & Svulik 2020, Gidengil et al. 2022, Orhan 2022, Şaşmaz et al. 2022, Hajnal 2025, Gidron et al 2025, Patkós & Plesz 2025). *Polarization* in these accounts is citizen polarization, or polarization of the society, where the opposing camps define themselves in terms of party affiliation and/or ideologies². Before taking for granted that polarization is a cause of

¹ “The cartel party thesis holds that political parties increasingly function like cartels, employing the resources of the state to limit political competition and ensure their own electoral success.”

² We follow the definition of McCoy et al. 2018: “Polarization is a process whereby the normal multiplicity of differences in a society increasingly align along a single dimension and people increasingly perceive and describe politics and society in terms of “Us” versus “Them””, with the addition that the integrative force that brings group coherence into the opposing camps is political partisanship, and the caveat that polarization has also been used in other senses in the political science literature, possibly in the most extended sense by Esteban & Schneider 2008. (They try to capture all of the

democratic backsliding, we have to refer to the work of skeptics who cannot see much impact of polarization on de-democratizing (Druckman et al. 2024). and also to some researchers pointing out the positive impact of polarization on political participation and voter turnout (Broockman et al. 2023, Janssen & Turkenburg 2024, Lubej et al. 2025). Yet again, Phillips 2024 claims that polarization just exacerbates existing inequality of participation, rather than effectively increasing participation, and Muis et al. 2025 propose that partisan polarization is associated with better democratic quality, while societal polarization relates to lower quality and less institutional trust.

At the end of the day, there is substantial agreement around the idea that polarization helps autocratizers to get away with their attacks on democratic institutions. Yet there is less agreement about which kind of polarization and what degree of polarization becomes most dangerous to democracy. One group of authors blames affective (or social) polarization (Mason 2014, Iyengar et al 2019, West & Iyengar 2022), while another gives primacy to ideological (policy-based, or issue-based) polarization driving the social schism (Orr et al 2023). It is also important to note that in the context of permissiveness towards democratic transgressions, popular polarization, that is, of the electorate, is considered. A more traditional literature, with roots in Dawns (1957) and Sartori (1976) focuses on the polarization of parties and/or elites, and a seminal work on elite ideological polarization, McCarthy et al. 2006, traces direct links between the increasing gaps between the two US parties' legislative options and the decay of democracy. Democratic backsliding as erosion of the democratic institutions is probably the most dangerous threat to democratic regimes, but dysfunctional political systems, which prevent the articulation of legitimate social interests, and/or which are fully captured by a minority interest, are the most dangerous threat to society as a whole. Paradigmatically, in the US, the descent into plutocracy started long before Trump's executive aggrandizing, with busting trade unions and passing Citizens United. The steps that led to the situation in which measures supported by a majority of the population, such as commonsense gun laws and progressive tax laws, could not pass through the legislature, are not termed "democratic backsliding" by the mainstream literature. However, we may assume that they have had a lasting impact on the political culture of the population, including a disappointment with democracy and an increasing intolerance toward outgroups, either political or social.

By voicing this assumption, we contribute to a very large gamut of hypotheses about the causes of popular polarization. Yet first of all, it's the case to refer to work that tried to establish whether affective polarization is an overarching pattern in today's democracies. Boxell et al. 2024 studied twelve OECD countries over the past four decades. They found that the US experienced the largest increase in polarization, while five countries experienced a smaller increase, and in six countries, polarization mitigated, which gives us hope that polarization, even if it looks like an affective, psychological, or cultural phenomenon, is primarily a social fact that is controlled by and controllable with other social facts. This is the idea underlying the work of McCoy et al. (2018), which "posits a set of causal mechanisms linking polarization to harm to democracy", but also situates polarization in the causal substratum of social cleavages, aptly exploited by manipulative elites to "cut out" a cohesive base for themselves. They typically construct the cleavage system in ways to suppress intra-group differences and to collapse the multiplicity of differences in a society along a single dimension, making possible an "Us" against "Them" simplified comprehension of the world. (One paradigmatic case of this is populism, with its "people" versus "elite" schism, and the gross inadequacy of the constructs is evidenced by Meijers et al 2025, who show that populist parties are in substantial disagreement about who is the "people" and who are the "elites".) McCoy et al. think that polarization leads to gridlock, underinvestment in public goods and development,

economic, communal, and social class polarizations under the term, besides the citizen polarization types, and argue for its conflict-prone-ness based on the analogy with the predictions of the interstate power distribution theories.

and may trigger violent conflicts, besides the likely outcome that one camp will try to consolidate its dominance over the other through autocratic means. This may happen with either side of the traditional left-right schism, such as leftist de-democratization in Venezuela (Chavez and Maduro), and right-wing de-democratization in Hungary (Orban), but sometimes the polarization happens along other old or new schisms, such as religion vs secularism in Erdogan's Turkey. We quote one statement of the authors that brings our institutional concern into the discourse:

In the case of Hungary, Turkey, and Venezuela, the new groups in power enacted constitutional change to consolidate their power. They increased their electoral advantage through increasingly majoritarian electoral systems and disproportionate representation, and they eroded constraints on executive power by promoting loyalists in the courts, electoral authorities, and security forces.

That is, majoritarian electoral systems are believed to serve autocratizers better than proportional representation systems, and the democratic checks and balances may easily be overridden by party loyalty, at least in conditions of heightened political polarization. These are the ideas we want to test in this paper, but we believe there are at least three causal pathways to explore:

- electoral systems' impact on de-democratization;
- polarization's impact on de-democratization; and
- electoral system's impact on polarization.

Otherwise, we think that the electoral system affects autocratization in both (more) direct and (more) indirect ways. Yet our test models have to address the competing explanations of both the democratic backsliding and citizen polarization; thus, we will refer to the scholarly literature in these domains.

As of early 2026, there is a long list of predictors of polarization that have received support in at least some of the tests reported in the literature. They seem to cluster around three topics: (i) partisanship as a social identity; (ii) economic issues; and (iii) institutional designs.

(i) Iyengar et al. 2019 construct affective polarization as a consequence of partisanship becoming an overarching ("master") social identity, re-orienting or suppressing cross-cutting identities. This obviously has a social-facts rooted component, namely, that some other social identities, like the urban-rural divide and religion, have become quite aligned with party affiliation. We cannot help believing that the alignment of multiple existentially rooted social identities with party affiliation is more likely in conditions of bipartism than in multi-party settings. However, some novel features of communication in the last decades, the possibility to live in the echo-chambers of selected media channels and social media networks, have also contributed, while Lupu 2015 also highlighted a vicious circle of polarization: citizens become more partisan as they perceive polarization increasing. If affective polarization is driven by partisanship, we may also assume that it is deeper where there are more ideological extremists, a relationship supported by Bischof & Wagner 2019, Guedes-Neto 2023, and Hartevelde et al. 2022³. Finally, the impact of elites on popular polarization has also been studied from the perspective of whether elites can manipulate affective polarization or not. A new survey-experiment in Sweden (Bäck et al. 2023) showed that this is highly feasible, even in Europe (– previous literature focused on ideological polarization, and on the US). Sadly, bot farms and artificial intelligence make it much easier to spread fake news that looks deceptively credible, and manipulate public opinion.

³ Bischof & Wagner 2019, Hartevelde et al, 2022, as well as Cely 2025, focus on the strengthening of the radical right to explain increases of the affective polarization. The first two works highlight that the radical right brings heightened emotional charge in the political arena (namely, hatred), and the third claims that since the left is ideologically more coherent and stable, any increase of polarization can be attributed to position shifts on the right of the aisle (namely, their drifting toward more extremism).

(ii) The country's economic conditions may influence both ideological and affective polarization, that is, both the policy options and the sentiments of the citizens. It seems that there is solid empirical support for this, but not an overarching theory explaining the mechanism. The insight is that people fearing economic decline or stagnation grow disenchanted with their political system (in democracies, with democracy), start scapegoating (such as immigrants, globalist elites, traitor bureaucrats), become increasingly intolerant towards everyone who do not share their particulars and worldviews, and may end up "messianizing" a political entrepreneur who promises to turn the tables on a world currently victimizing them. Historical records show that in times of economic downturn, both left-wing and right-wing extremism increase. Yet while the left-wing recipe to cope with the situation has stayed quite stable over centuries (tax or expropriate the rich, increase redistribution), the right has gone with a larger gamut of solutions promoted by their leaders, such as robbing minorities and neighbors (Hitler), deregulating and dismantling the redistributive state (Pinochet), Britain's Brexit, Trump's tariffs and expulsion of immigrants. Among the explanations of affective polarization, we would refer to four recent papers that tested the impact of unemployment (Gidron et al 2018), of economic threats (García-Sánchez et al 2024), of inequality (Gidron et al. 2018, Merten & Niedringhaus 2024), and of vertical social mobility (Merten & Niedringhaus 2024). Gidron et al. 2018 found a significant impact of both unemployment and inequality, while Merten & Niedringhaus 2024 found that inequality triggers affective polarization only when coupled with the perception of vanishing vertical social mobility. Garcia-Sanchez et al. 2024 found that while collective economic threats made people prone to affective polarization, personal economic threats did not show a significant impact on polarization.

(iii) The country's institutions in place obviously determine its resilience to de-democratizing attempts, but it is less obvious whether they contribute to popular polarization or not. The Lijphartian description of consensus democracies as "kinder, gentler" ways of governing than the contentious majoritarian systems may serve as a rule of thumb. Affective polarization involves impatience and intolerance towards those with opposing views. People socialized in consensus-seeking political cultures may avoid expressions of intolerance because it is not a useful method to solve social problems. Majoritarian systems foster the belief of zero-sumness, when a group either wins power to impose their will on everybody else, or they become dominated by others. Evidence is accumulating that indeed, majoritarian systems lead to more affective polarization than multi-party consensus systems; here, we single out two important works in this sense. Bernaerts et al. (2023) believe that the list of polarization predictors include "the effect of media and other forms of political communication; economic inequality; the increase of online and offline homogeneous networks; the absence of social norms which suppress polarization between individuals; variations in social cohesion and institutional trust; the role of globalization in driving a wedge between its winners and losers". Yet they focused on an institutional explanation and successfully supported that majoritarian electoral systems are more prone to polarization. They studied 36 countries over 20 years (2000-2019), and built regression models with institutional features such as electoral proportionality and federalism, which both turned up as significant predictors of polarization. Importantly, they ran models on both the affective (which they call identity-based) and the ideological (which they call idea-based) polarization. The models reach R²s of 0.85 with only the institutional predictors, thus a strong criticism because of their omitting the rival hypotheses from the models is not really justified. Yet we have to note that there have been other IVs in the models that boosted their R²-s: a lag of the affective polarization in the ideological model, and a lag of the ideological polarization in the affective polarization model, plus some year dummies. These two types of "popular" polarization are highly correlated; however, they seem to be only weakly correlated with elite polarization. Gidron et al 2018 tested three predictors of affective polarization: elite polarization, economic woes (unemployment and inequality), and majoritarian

institutions. They found a significant impact of the economic and institutional variables, but not of elite polarization.

As for the causes of de-democratization, the economy and institutions are unavoidable explanatory variables, though economy tends to enter the demand-side accounts, while institutions tend to enter supply-side theories. Over the last decades, since the right-wing populist offensive has become ubiquitous in 1st world democracies, scholars have tried to anchor receptivity to this brand of politics in the socioeconomic status of its followers, and some support for their being less educated, and more vulnerable to economic deterioration has been found. Yet there is no clear rational explanation linking fear of pauperization and support for policies that paralyze the state's ability to redistribute wealth and foster social mobility. At times, unbearable poverty led to revolts, rebellions, and revolutions that implemented redistribution of wealth, such as land reforms and nationalizations. The masses expropriated the wealthy elites on behalf of the needy. Today's right-wing populism is bent on taking away the little that their scapegoated groups (minorities, immigrants, civil servants, intellectuals) possess and helping the wealthy elites get wealthier. Social psychology needs to find more complex explanations for this behavior than egoism, conceived as following someone's well-understood interests. A handful of people may make the calculation that they can be better rewarded by autocratizer elites than by society-wide redistribution and anti-poverty measures, but this lackey mentality is not something that many people admit to having. On the contrary, the extreme right has a consciousness of standing on a higher moral ground than anybody else, and successful populist autocratizers don't ever fail to portray their targets as deeply immoral. We believe that economic hardships on their own, with or without an economically polarizing society, should normally strengthen the left, possibly the extreme left. As de-democratization is driven by strong extreme-right mass movements, we need to add some non-economic factors to the purely economic explanatory variables, such as ideological and affective polarization, increased potential of disinformation⁴, and elite manipulation. Yet despite all the animosity the polarized societies' camps have against each other, they share a fundamental trait. Disenchantment with the political institutions and democratic processes seems to precede the ascendance into power of the would-be autocratizers (Ross 2024, Jacob 2024, Wunsch et al. 2025). Though the disenchantment may be mostly economically driven, institutional factors contribute substantially to the occurrence, force, and progress of de-democratization impulses.

First of all, political institutions have a role in shaping economic development and social mobility, as well as the country's resilience to some adverse globalization trends, which all affect the population's subjective well-being and their assessment of the existing form of democracy.

Second, political institutions shape the ways in which political competition can be carried out in a country. Citizens socialized to certain institutions are socialized to a corresponding political culture. In different institutional set-ups, different methods are efficient, different actions are reasonable and meaningful, and the political actors take up different roles, which results in different affective orientations toward each other.

Third, the political institutions in place have varying resilience to executive aggrandizement, and they shape the outcomes of autocratizing attempts. Since the single largest institutional difference is between the majoritarian and consensus democracies, this paper operationalizes the impact of institutions with these two types.

⁴ Nord et al. 2025 produce telling charts showing that autocratization processes go hand-in-hand with increased disinformation and polarization.

HYPOTHESES AND DATA

This paper focuses on the relationship between political institutions and de-democratization, and intends to highlight that the impact of institutions plays out through multiple pathways. It will also attempt to compare the strength of the different impacts. The political institutions are compared along a main feature centered on the electoral system, that is, whether they are majoritarian or consensus democracies. Our hypotheses are that

- H1: majoritarian systems are more likely to experience de-democratization;
- H2: polarized societies are more likely to experience de-democratization; and
- H3: majoritarian systems are more prone to ideological and affective polarization.

That is, we believe that majoritarian political institutions are less resilient in the face of autocratizing tendencies, and the deterioration of democracy is partly realized through polarization, but not all of it. This assumption is unorthodox as compared to mid-20th century political science standpoints, which tended to rank the Anglo-Saxon type of bipartism as the most reliable and stable form of democracy (e.g., Midlarski 1984), and they attributed Hitler's success to the fragmented Weimar political system. The major turning point in the comparison of electoral and party systems came in the 1970s with Lijphart, who praised the kinder, gentler consociational systems relying on proportional representation and multi-partism. Since then, the comparative evaluation of majoritarian and proportional representation systems has varied; they were shown to have different advantages, such as proportional representation being less likely to lead to violent conflicts but being more prone to instability, minority governance, and snap elections. Yet the last decades highlighted an unexpected weakness of the majoritarian systems to allow would-be autocratizers to bankrupt democratic institutions, and we intend to study the venues through which this impact is actualized.

The main dataset we use for our analyses is the Varieties of Democracy, which has a wealth of institutional variables, scores of measures of the quality of democracy, and descriptors of social relations such as inequality and communication flows. It also has two measures of polarization, one of political polarization, which covers both the 20th and 21st centuries, and one of social polarization, which covers the 21st century only. Given the centrality of the polarization issue to our project, we wanted to compare the V-Dem dataset's polarization measurements with other similar measurements introduced in the literature, and added Mehlhaff 2025's PolarCAP data, which was made publicly available by the author, and our own version of an opinion survey-based polarization measure. Versions of this latter have been used by Kang et al 2025, for instance. The World Value Surveys and the European Value Surveys have been asking, since 1981, a question about the respondents' self-placement on a 10-point Left-Right political scale. The survey data files include the standard deviation of the answers, which is an excellent polarization measure, and additional ones can be constructed from the detailed answer frequencies, such as adding the extremes (1, 2, 9, and 10 on the scale), and adding the middle values (5 and 6 on the scale). The V-Dem dataset also contains two measures of the electoral system, assessing the method of elections for the lower chamber, once on a 13-category scale and once on a 4-category scale (majoritarian, proportional, mixed, other). Yet these values are entered for election years only. Thus, we imported variables describing the electoral system from the Quality of Government dataset, which treats this institutional variable as a constant between elections, that is, it occurs for all country-years where it makes good sense. This effort has been rewarded with the possibility to compare the relationship between electoral systems and the quality of democracy pre- and post-WWII.

A historical quirk

Twenty-first century readers of the mid-20th century literature on comparing electoral systems may be incredulous about the merits attributed to majoritarian systems. Yet the historical data amassed by V-Dem and QOG do some justice to those who believed that proportional systems may be inherently unstable and more prone to the erosion of democracy. If we compare the differences between majoritarian and proportional country-years before and after 1945, the differences show divergent patterns. Table 1 shows that

- Majoritarian countries tend to be more populous and poorer than the proportional ones. The difference in population size was mitigated, but the difference in wealth increased after 1945.
- All democracy indices from V-Dem, plus a democracy measure imported from Polity, are higher in proportional systems, but the difference in favor of the proportional systems is much higher after 1945.
- A selection of measures pertinent to detailed features of the political system also shows the proportional systems more democratic, and the difference between the two system types growing after 1945.
- Societies opting for proportional electoral systems are more inclusive and more egalitarian – yet these differences, with the sole exception of gender equality, have not grown since WWII. To some extent, both types improved their records over time.
- The last entries at the bottom of the table show some interesting reversals. Before 1946, political polarization was higher in proportional systems than in majoritarian systems. After 1945, it is inversely, PR systems are less polarized. Mass mobilization for democracy is rare in both systems, but before 1946, it was rarer in PR, and after 1945, it has been rarer in majoritarian systems. Mass mobilization for autocracy became rarer in PR and more frequent in majoritarian systems after 1945 (the difference changed from plus 0.429 to minus 0.787).

Table 1: Group Means Differences between Pre-WWII and Post-WWII Eras

Before 1946					V-Dem measures and some imported ones	After 1945				
Proportional case#	Majoritarian case#	Proportional Mean	Majoritarian Mean	Difference Prop-Maj		Proportional Mean	Majoritarian Mean	Difference Prop-Maj	Proportional case#	Majoritarian case#
693	1111	862	2863	-2000	Population*	1747	3610	-1863	3529	4877
720	1193	50.9	43.5	7.5	Life expectancy*	69.6	61.0	8.7	3867	5179
693	1111	10.8	9.0	1.8	GDP per capita*	30.9	15.6	15.3	3529	4877
717	1167	0.427	0.318	0.108	Electoral democracy index	0.597	0.327	0.270	3894	5273
716	1167	0.351	0.264	0.087	Liberal democracy index	0.487	0.237	0.250	3894	5270
717	1167	0.271	0.189	0.082	Participatory democracy index	0.395	0.185	0.210	3894	5273
716	1167	0.310	0.223	0.087	Deliberative democracy index	0.479	0.232	0.247	3894	5273
716	1167	0.312	0.187	0.125	Egalitarian democracy index	5.094	0.242	4.852	3903	5273
650	913	3.635	2.575	1.060	Polity revised combined score*	5.311	-1.247	6.558	3236	4310
					Voice and accountability --- estimate*	0.334	-0.503	0.837	1664	1395
720	1193	0.677	0.584	0.094	Local government index	0.761	0.464	0.297	3872	5222
713	1193	0.443	0.366	0.077	Regional government index	0.409	0.244	0.165	3885	5274
669	1179	0.632	0.507	0.125	Legislative constraints on executive index	0.657	0.418	0.239	3801	5114
713	1193	0.676	0.573	0.103	Accountability index	0.754	0.484	0.269	3925	5273
713	1193	0.582	0.423	0.159	Vertical accountability index	0.875	0.183	0.692	3925	5273
713	1193	0.459	0.150	0.309	Diagonal accountability index	0.853	-0.067	0.920	3925	5273
713	1193	0.526	0.259	0.268	Horizontal accountability index	0.633	-0.085	0.718	3925	5273
720	1193	0.565	0.419	0.145	Civil society participation index	0.689	0.439	0.250	3903	5274
719	1177	0.455	0.660	-0.205	Exclusion by Socio-Economic Group	0.369	0.523	-0.154	3837	5170
719	1177	0.423	0.625	-0.202	Exclusion by Social Group index	0.345	0.527	-0.182	3837	5155
719	1177	0.609	0.751	-0.141	Exclusion by Gender index	0.355	0.531	-0.176	3837	5170
719	1177	0.366	0.567	-0.201	Exclusion by Urban-Rural Location index	0.347	0.532	-0.186	3837	5155
719	1193	0.554	0.343	0.210	Egalitarian component index	0.654	0.497	0.157	3903	5274
719	1193	0.517	0.306	0.211	Equal distribution of resources index	0.635	0.480	0.156	3903	5274
719	1193	0.321	-0.995	1.316	Educational equality	0.819	0.056	0.763	3925	5274
719	1193	0.099	-0.937	1.036	Health equality	0.881	-0.013	0.894	3925	5274
719	1183	2.802	2.218	0.584	Power distributed by urban-rural location	2.473	1.939	0.533	3837	5151
719	1177	0.269	-0.291	0.559	Political polarization	-0.318	-0.068	-0.250	3888	5252
719	1177	-0.209	-0.116	-0.093	Political violence	-0.629	-0.209	-0.420	3908	5252
641	1143	-0.929	-0.709	-0.220	Mass mobilization for democracy	-0.469	-0.521	0.051	3861	5252
682	1160	-0.441	-0.871	0.429	Mass mobilization for autocracy	-0.876	-0.089	-0.787	3878	5252

That is, before 1946, majoritarian systems, despite suffering from some obvious design disadvantages, still showed more political cohesion and stability than their PR counterparts. Yet these advantages have dissipated, and even reversed, in the post-WWII world.

Because of data availability, this paper will only focus on the post-1945 systems, and some analyses will deal with even shorter timeframes. Yet this historical preamble may highlight the complexity of the relationships among political institutions, social environment, and mass action.

Data details

We added foreign measures to the original V-Dem dataset with two goals in mind: (i) to test the external validity of the V-Dem measures and (ii) to extend the number of observations, that is, the number of country-years that have the variables of interest for this project. We checked on these with a correlation matrix of the imported measures and the pertinent V-Dem measures. Most

convincingly, the correlation between the V-Dem's majoritarian and proportional assignments and those of QOG's is very high; 1 for the majoritarian systems and 0.998 for the proportional systems⁵. These correlations are the same for both time intervals we tested, the longer 1900-2024 interval and the shorter 1946-2024 interval alike. Most polarization indicators, with the single exception of V-Dem's political polarization, exist for periods even shorter than 1946-2024; thus, Table 2 highlights the correlations for after 1945. (Only the statistically significant Pearson coefficients are left in the table.)

Table 2: Correlations of V-Dem and Imported Measures, after 1945

Measure Correlations After 1945	Origin	Political polarization	Polarization of society	L.Chamber Majoritarian	L.Chamber Proportional	PolarCAP ideology	PolarCAP affect	L_R.Std.Deviation	L_R.Extremes	L_R.Middle	District.Magnitude	El.System.Majoritarian
Polarization of society	V-Dem	-.662***										
L.Chamber Majoritarian	V-Dem	.058**										
L.Chamber Proportional	V-Dem	-.042*		-.728***								
PolarCAP ideology	PolarCAP	.105***	-.085***	.111**	-.151***							
PolarCAP affect	PolarCAP											
L_R.Std.Deviation	WVS/EVS	.289***	-.298***			.107***						
L_R.Extremes	WVS/EVS	.269***	-.241***	.150***	-.124**	.113***		.656***				
L_R.Middle	WVS/EVS					-.063**		-.532***	-.339***			
District.Magnitude	QOG	.052***		-.275***	.341***		.067*		-.088***			
El.System.Majoritarian	QOG	.080***	.036*	1.000***	-.728***	.109***		.200***	-.095***	-.270***		
El.System.Proportional	QOG	-.075***		-.726***	.998***	-.121***		-.156***		.329***	-.744***	

PolarCAP's ideology indicator shows a significant, though weak correlation with V-Dem's political polarization measure, and the same can be said about its relationship with V-Dem's polarization of society indicator. The theoretical expectation that Polarization of society is related to PolarCAP.affect did not materialize. Two of the ideological polarization measures created from the WVS/EVS data are also significantly related to the V-Dem polarization measures, and again, not only with the V-Dem political polarization, but also with their Polarization of society measure. These correlations do justice to the hypothesis that social/affective polarization is driven by ideological and policy disagreements (Orr et al. 2023). And of course, the correlation coefficient of -0.662 between V-Dem's own two polarization measures also supports this⁶.

For regression modelling, we created two smaller datasets out of the V-Dem data. One is narrower and longer, covering the years from 1946 through 2024. It has become "narrow" by dropping a large number of variables from the dataset, mostly those with high missingness. The reason was that we intended to run our models with the R software's lavaan package, but this only accepts complete and standardized variables; thus, we subjected this dataset to a multiple imputation and a standardization procedure. The other dataset is shorter and wider, and covers 1990 through 2024. This had large missingness on the main variables of interest, and we did not impute it.

⁵ Our Majoritarian and Proportional measures have been created as dummies from the original datasets' nominal scales ("Lower Chamber Electoral System" in V-Dem and "Electoral System" in QOG), which included more values than Majoritarian and Proportional, making room for Mixed and Other options. Our Majoritarian dummy takes value 1 if and only if the nominal scale value is "Majoritarian", and is 0 otherwise; the Proportional dummy takes value 1 if and only if the nominal scale value is "Proportional", and is 0 otherwise.

⁶ It is a negative correlation because Political polarization was coded towards increasing polarization, while Polarization of society runs from most polarization towards the least polarized status.

Yet before preparing the smaller datasets, from which we purged the “foreign” democracy measures, which had a larger proportion of missingness than V-Dem itself, we ran a correlation matrix of democracy indicators. Four V-Dem democracy indexes (electoral, liberal, deliberative, and participatory) show above 0.9 Pearson coefficients with the Unified Democracy Scores (mean and median) and with World Bank Governance Indicators’ Voice and Accountability component. They also display above-0.8 and sometimes above 0.9 correlations with the Freedom House and Polity measures. Strangely, the “foreign” measures correlation with the V-Dem egalitarian democracy index is much lower, though the egalitarian index itself is highly, above-0.9 correlated with the other four V-Dem indexes. After these checks, V-Dem's Electoral Democracy Index was chosen as the main dependent variable of the regressions.

Since our main explanatory variable in this paper is the electoral system, we studied some features that could distinguish the two basic types. An ANOVA analysis revealed a significant difference between the sizes of the regime support and opposition groups. On average, regimes with PR have larger regime support and smaller opposition than regimes with majoritarian systems. Further, there are some differences concerning the main support and main opposition groups. Regimes with majoritarian systems are more likely to receive the support of the military and of foreign countries than regimes with PRs, while regimes with proportional systems are more likely to rely on party elites and urban middle classes. Possibly most relevant for the relationship between electoral system and chances of autocratization is the difference between ways to legitimate the regimes in place. In Table 3, the blue highlight shows the system that relies more, and the reddish highlight shows the system that relies less on a form of legitimation and a form of ideology.

Table 3: Comparing regime legitimation in different electoral systems

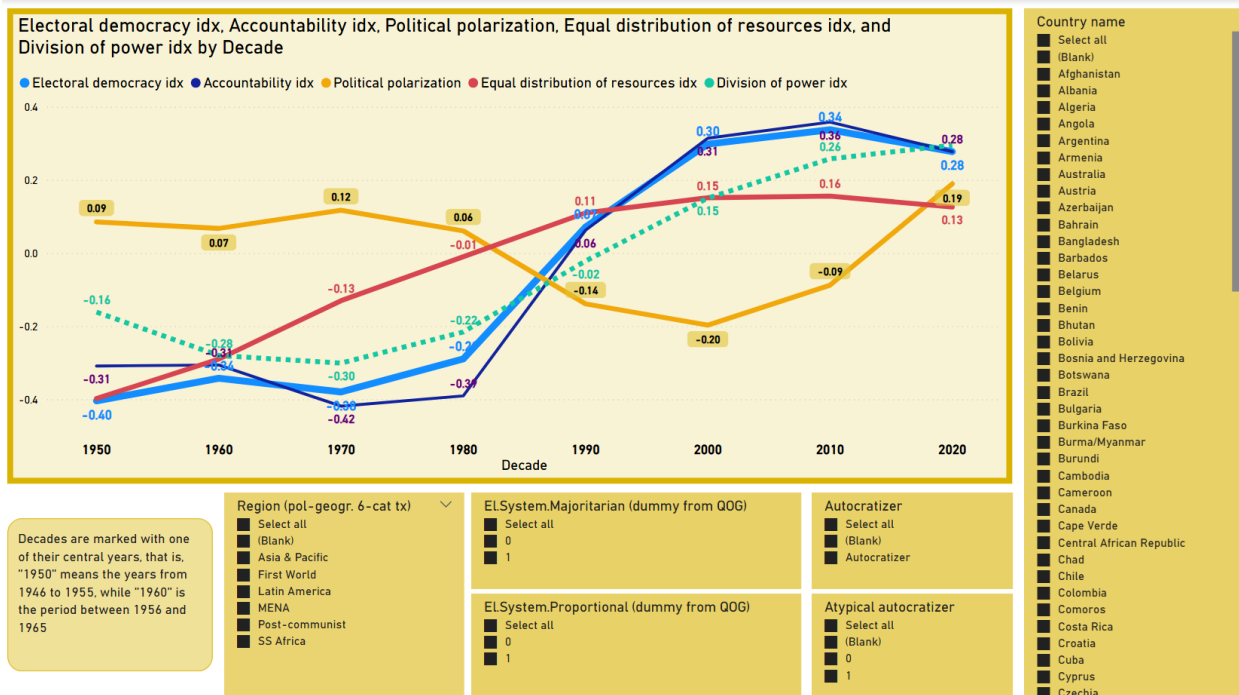
Electoral System Majoritarian		Legitimation: Ideology	Legitimation: Person of the Leader	Legitimation: Performance legitimation	Legitimation: Rational-legal legitimation	Ideology character Nationalist	Ideology character Socialist or Communist	Ideology character Restorative or Conservative	Ideology character Separatist or Autonomist	Ideology character Religious
Not majoritarian	Mean	-0.6391	-0.5728	0.6094	0.7125	0.5281	0.2274	0.4054	0.0530	0.0971
	N	5343	5344	5344	5344	5348	5348	5348	5348	5348
Majoritarian	Mean	0.4022	0.5781	0.2853	0.2194	0.5543	0.2792	0.3183	0.0633	0.1307
	N	5155	5168	5155	5155	5195	5195	5195	5195	5195
Total	Mean	-0.1278	-0.0070	0.4503	0.4704	0.5410	0.2529	0.3625	0.0581	0.1136
	N	10498	10512	10499	10499	10543	10543	10543	10543	10543
Electoral System Proportional		Legitimation: Ideology	Legitimation: Person of the Leader	Legitimation: Performance legitimation	Legitimation: Rational-legal legitimation	Ideology character Nationalist	Ideology character Socialist or Communist	Ideology character Restorative or Conservative	Ideology character Separatist or Autonomist	Ideology character Religious
Not proportional	Mean	0.2109	0.4260	0.3510	0.3084	0.5697	0.2471	0.3319	0.0573	0.1204
	N	6661	6675	6662	6662	6706	6706	6706	6706	6706
Proportional	Mean	-0.7157	-0.7602	0.6227	0.7517	0.4909	0.2631	0.4160	0.0595	0.1018
	N	3837	3837	3837	3837	3837	3837	3837	3837	3837
Total	Mean	-0.1278	-0.0070	0.4503	0.4704	0.5410	0.2529	0.3625	0.0581	0.1136
	N	10498	10512	10499	10499	10543	10543	10543	10543	10543

Majoritarian systems rely more on ideological and personalistic legitimation, while PRs are more likely to use performance legitimation and rational-legal arguments. Of the ideology types considered, nationalism is the most commonly used for regime legitimation, at a serious distance from runner-up restorative/conservative and socialist/communist ideologies. It is only in the case of restorative/conservative ideologies that regimes in PR systems use it more often than regimes in majoritarian systems. Nationalist, socialist-communist, and religious ideologies are more often used for regime legitimation in majoritarian systems.

To simplify the explanatory models, we focused on three important controls. A country development level measure is unavoidable in any cross-national explanations, and in the V-Dem dataset, the “Life expectancy” measure had the least missingness of the pertinent variables. Socioeconomic inequality, which demoralizes and destabilizes societies, has had a built-in good measure in the V-Dem dataset, the “Equal distribution of resources”. And we felt the need to involve a second institutional variable, which measures the vertical distribution of power in countries, that is, whether sub-national entities (regions, federal states, local communities) have self-governing rights. V-Dem calls this variable “Distribution of power.” We expected this to interact with the electoral system variable, for instance, to see large-scale regional autonomies moderate the negative impact of majoritarianism on democratic quality.

Temporal trends

With the 1946-2024 data, we have built a dashboard to visualize the trends that make the study of de-democratization so badly needed [LINK TO BE INSERTED]. At the global scale, after decades of democratizing success, there is an ostensible decay of the electoral democracy index and the accountability index over the last decade. The trendlines also show the socioeconomic inequality flattening in the 21st century before definitely decaying after the 2010s, while political polarization’s negative turn preceded the negative turn of democracy measures by a decade. The filters on the page allow for comparing the democracy values of countries with majoritarian and proportional electoral systems, and this comparison confirms the findings from the group means analyses above.



The dashboard incorporates data from a smaller dataset that we do not use in the causal analysis. We compiled a list of autocratizers in various countries since 1990. The last page of the dashboard

shows the list itself; on the other pages, the list can be used as a filter (“slicer” in the Power BI reports’ terminology).

REGRESSION ANALYSES

In this section, we report the tests we conducted on the two smaller datasets, one ranging from 1946 through 2024 and the other ranging from 1990 through 2024.

Analysis of the 1946-2024 imputed and standardized data

Our hypotheses assume that the institutional system impacts de-democratization both directly and through polarization. Of the techniques available to simultaneously test direct and mediated impacts, we mainly counted on Lavaan’s multivariate regression feature, but also experimented with OLS regressions, which provide the most information about the predictors’ comparative strength.

In a first step, we ran OLS models with only one interaction term, that is, with the electoral system * polarization interaction, besides the direct determinants of change. The main predictors were the electoral system⁷ and political polarization, to which we added three controls, called Life expectancy, Equal distribution of resources index, and Division of power. However, we had to switch to 8-predictor, three-interaction term models after running the Lavaan regressions. Lavaan reported very bad fit statistics before we added two more predictors to the explanation of polarization. The eight-predictor OLS models came with above 60% explanatory power, and all predictors emerged as significant in the right direction, but both models suffered from autocorrelation. We re-ran the models with two different corrections for autocorrelation: (i) by including the first-order lag of the outcome variable, and (ii) with cluster-robust errors⁸. In the shade of the powerful lag, all explanatory variables faded a lot, but most preserved their statistical significance. Of the direct impacts, only life expectancy sank into insignificance, and two of the interaction terms also did partly, but specifically, the electoral system*polarization preserved its significance. When the models were run with cluster-robust errors, all direct effects kept their significance, and all interaction terms lost it (though the division of power*polarization remained weakly significant at the 90% threshold). The directionality of the direct impacts continued to conform to expectations (Table 4).

⁷ We ran parallel models with the two electoral system dummies, El.System.Majoritarian and El.System.Proportional. We considered combining them in one variable, but we believe that having two of them also functions as a robustness check.

⁸ SPSS does not have an innate package for cluster-robust errors, thus we used an imported file, thanks to Huang & Li’s (2022) sharing their macro that can be imported into SPSS.

Table 4: Explaining changes in democratic quality – OLS and Matrix regressions with 3 interaction terms

IMPUTED DATA Adj. R2 = 0.973, Obs.nr = 10,578, Durbin-Watson 1,699	Unstand.Coefficients		St.Coeff.	t	Sig.
	B	Std. Error	Beta		
(Constant)	0.024	0.002		9.876	0.000
Life expectancy	0.001	0.002	0.001	0.228	0.820
Equal distribution of resources index	0.012	0.002	0.012	5.574	0.000
Division of power index	0.014	0.002	0.014	6.856	0.000
El.System.Majoritarian (QOG)	-0.023	0.004	-0.012	-6.435	0.000
Majoritarian * Polarization	-0.010	0.002	-0.010	-5.909	0.000
Equality * Polarization	0.002	0.002	0.002	1.121	0.262
DivisionOfPower*Polarization	-0.003	0.002	-0.003	-1.892	0.058
Lag_Electoraldemocracy.idx	0.962	0.003	0.963	370.162	0.000

a. Dependent Variable: Electoral democracy

IMPUTED DATA Adj. R2 = 0.973, Obs.nr = 10,578, Durbin-Watson 1.697	Unstand.Coefficients		St.Coeff.	t	Sig.
	B	Std. Error	Beta		
(Constant)	0.007	0.002		3.293	0.001
Life expectancy	0.002	0.002	0.002	0.765	0.444
Equal distribution of resources index	0.011	0.002	0.011	5.107	0.000
Division of power index	0.015	0.002	0.015	7.284	0.000
El.System.Proportional (QOG)	0.021	0.004	0.010	5.749	0.000
Proportional * Polarization	-0.012	0.002	-0.012	-6.893	0.000
Equality * Polarization	0.004	0.002	0.004	2.495	0.013
DivisionOfPower*Polarization	0.003	0.002	0.003	1.753	0.080
Lag_Electoraldemocracy.idx	0.961	0.003	0.962	366.166	0.000

a. Dependent Variable: Electoral democracy index

Cluster-Robust Regression Coefficient Tests	Estimate	CR_S.E.	Columns		
			t_value	d.f.	Sig.
Constant	0.1350	0.0476	2.8337	95.8030	0.0056
Lifeexpectancy	0.1786	0.0383	4.6673	79.8742	0.0000
Equaldistributionofresourcesindex	0.1868	0.0544	3.4330	45.4302	0.0013
Divisionofpowerindex	0.3931	0.0444	8.8531	82.7126	0.0000
Politicalpolarization	-0.2691	0.0408	-6.5934	70.1828	0.0000
El.System.MajoritarianQOG	-0.3256	0.0780	-4.1759	114.5958	0.0001
InteractionMajoritarianPolarization	0.0364	0.0448	0.8125	72.2505	0.4192
Equality.Polarization	-0.0606	0.0352	-1.7224	48.2452	0.0914
DivisionOfPower.Polarization	-0.0294	0.0343	-0.8584	52.1547	0.3946

Cluster-Robust Regression Coefficient Tests	Columns				
	Estimate	CR_S.E.	t_value	d.f.	Sig.
Constant	-0.1464	0.0486	-3.0098	104.6966	0.0033
Lifeexpectancy	0.1991	0.0376	5.2909	80.1312	0.0000
Equaldistributionofresourcesindex	0.1816	0.0533	3.4101	45.6076	0.0014
Divisionofpowerindex	0.3913	0.0425	9.1997	82.3386	0.0000
Politicalpolarization	-0.2181	0.0422	-5.1677	70.5673	0.0000
El.System.ProportionalQOG	0.3371	0.0736	4.5812	106.7276	0.0000
InteractionProportionalPolarization	-0.0407	0.0400	-1.0159	66.2267	0.3134
Equality.Polarization	-0.0611	0.0334	-1.8323	49.5848	0.0729
DivisionOfPower.Polarization	-0.0222	0.0336	-0.6610	52.0969	0.5115

Table 5 reports on two models we ran in the R ecosystem's lavaan package. The whole output is in the Appendix; here, we sum up the coefficients only.

Table 5: Lavaan ML SEM models

Regressions with El.System.Majoritarian (R2 = 0.606):

	Estimate	Std.Err	z-value	P(> z)	Std.lv	Std.all
Political.polarization ~						
El.Systm.Mjrtrr	-0.036	0.019	-1.872	0.061	-0.036	-0.018
Divsn.f.pwr.dx	-0.001	0.000	-11.841	0.000	-0.001	-0.116
Eql.dstrb.f.r.	-0.274	0.010	-27.900	0.000	-0.274	-0.274
Electoral.dem.idx ~						
El.Systm.Mjrtrr	-0.409	0.013	-30.860	0.000	-0.409	-0.204
Politcl.plrztn	-0.257	0.006	-40.117	0.000	-0.257	-0.257
Eql.dstrb.f.r.	0.169	0.008	20.775	0.000	0.169	0.168
Life.expectncy	0.240	0.008	28.319	0.000	0.240	0.240
Divsn.f.pwr.dx	0.002	0.000	44.610	0.000	0.002	0.300

Variances:

	Estimate	Std.Err	z-value	P(> z)	Std.lv	Std.all
.Politcl.plrztn	0.893	0.012	73.328	0.000	0.893	0.893
.Electorl.dm.dx	0.395	0.005	73.328	0.000	0.395	0.394

Regressions with El.System.Proportional (R2 = 0.610):

	Estimate	Std.Err	z-value	P(> z)	Std.lv	Std.all
Political.polarization ~						
El.Systm.Prprt	0.015	0.020	0.761	0.447	0.015	0.007
Divsn.f.pwr.dx	-0.001	0.000	-11.671	0.000	-0.001	-0.114
Eql.dstrb.f.r.	-0.272	0.010	-27.806	0.000	-0.272	0.206
Electoral.dem.idx ~						
El.Systm.Prprt	0.428	0.013	32.430	0.000	0.428	-0.255
Politcl.plrztn	-0.256	0.006	-40.065	0.000	-0.256	0.160
Eql.dstrb.f.r.	0.160	0.008	19.812	0.000	0.160	-0.272
Life.expectncy	0.265	0.008	32.181	0.000	0.265	0.265
Divsn.f.pwr.dx	0.002	0.000	44.710	0.000	0.002	0.299

Variances:

	Estimate	Std.Err	z-value	P(> z)	Std.lv	Std.all
.Politcl.plrztn	0.893	0.012	73.328	0.000	0.893	0.893
.Electorl.dm.dx	0.392	0.005	73.328	0.000	0.392	0.390

When looking at the residual variance of the endogenous (dependent) variable Electoral Democracy Index, the explanatory power of these models comes close to what the original OLS models showed (above 60% of the variance, R2-s of 0.606 and 0.610). The explanation of Political Polarization, on the other hand, is low; it only reaches 10.7% in both models. Economic inequality is a strong predictor of polarization, yet the electoral system dummies fail to turn up as its significant predictors. It is the other institutional variable, Division of power, which is a consistently reliable polarization predictor, in the sense that more local/regional/federal empowerment reduces polarization. The issue is that the division of power is significantly correlated with the electoral system; not at the level of serious collinearity danger, but strong enough to dominate the electoral system variables in a regression model. Majoritarian systems are negatively associated, while proportional systems are positively associated with the division of power (Table 6).

Table 6: Relationships among three institutional variables, plus polarization

		El.System.Majoritarian (dummy from QOG)	El.System.Proportional (dummy from QOG)	Division of power index
El.System.Proportional (dummy from QOG)	Pearson Correlation	-.744***		
	Sig. (2-tailed)	0.000		
	N	10754		
Division of power index	Pearson Correlation	-.317***	.283***	
	Sig. (2-tailed)	0.000	0.000	
	N	10754	10754	
Political polarization	Pearson Correlation	.079***	-.076***	-.201***
	Sig. (2-tailed)	0.000	0.000	0.000
	N	10754	10754	10754
***. Correlation at 0.001(2-tailed)				

In summary of this section, the regression models on the 1946-2024 data show strong support for H1 and H2, but do not support H3. However, they don't definitely refute the possibility of an electoral system → polarization causal link either. The OLS regressions allow for the possibility of a mediated impact of the electoral system, and all models demonstrate the strong impact of an institutional feature (Division of powers) that is systematically related to the electoral systems.

Analysis of the 1990-2024 data

We inquired as to whether the relationships evidenced by the regressions featuring V-Dem's political polarization measure hold up for other polarization measures, as well. Yet all alternative measures are available for much shorter periods than V-Dem's political polarization, feature more missing values, and these short, lacunar timeseries are more prone to autoregression. We considered that the missingness was too large to justifiably impute the dataset, and only ran regression models with the original data. We tested five polarization measures:

- V-Dem's Political Polarization (as a control, N=5610⁹);
- V-Dem's Polarization of society (available for 2000-2024, N=4119);
- PolarCAP's Ideology (N=2640);
- PolarCAP's Affect (N=1519);
- L_R.Std.Deviation (derived from the WVS, N=2412).

⁹ The numbers refer to the case number of the regression models that may be built with the Polyarchy dependent variable and the predictors used in the models built with the 1946-2024 data, as well.

We used the same six predictors as for the models with the long series initially, and applied the same modelling process, starting with a plain OLS model, which suffered from autocorrelation in all cases, then running the models with cluster-robust standard errors. In four cases, when the polarization predictor was Political Polarization, Polarization of Society, PolarCAP.ideology, and L_R.Std.Deviation, the autocorrelation-stricken OLS models closely mimicked the 1946-2024 models. Most adjusted R2-s were above 0.6, with the exception of the PolarCAP.ideology model, which remained in the upper 0.5-s. And all predictors, including the interaction terms, showed up as significant. PolarCAP.affect was the exception. In the two models built with it, only the inequality measure and Division of power turned up as significant.

Yet when we ran the eight viable models with cluster-robust standard errors, in all but one, some predictors sank into insignificance (Table 7). The predictors that kept their significance in all models were the inequality measure and the two institutional measures, the electoral system and the vertical division of power. The interaction terms showed up as significant in four models (blue highlight), and came close to significance (between p 0.5 and 0.1, yellow highlight) in three cases out of the eight total. Yet the polarization measures themselves were also elusive, and remained insignificant in four models out of eight (brown highlight).

Table 7: Significance of Predictors in Models with Cluster-robust Standard Errors

Predictors (MJ)	Significance	Model type	Predictors (PR)	Significance
Life expectancy	0.1946	Cluster-Robust SE-s, N=5610	Life expectancy	0.1332
Equal distribution of resources index	0.0000		Equal distribution of resources index	0.0000
Division of power index	0.0000		Division of power index	0.0000
El.System.Majoritarian	0.0000		El.System.Proportional	0.0000
Political polarization	0.0006		Political polarization	0.0089
Majoritarian*PolPolarization	0.1248		Proportional.PolPolarization	0.0830

Predictors (MJ)	Significance	Model type	Predictors (PR)	Significance
Life expectancy	0.1901	Cluster-Robust SE-s, N=4119	Life expectancy	0.2028
Equal distribution of resources index	0.0000		Equal distribution of resources index	0.0000
Division of power index	0.0000		Division of power index	0.0000
El.System.Majoritarian	0.0041		El.System.Proportional	0.0001
Polarization of society 2000-2024	0.0204		Polarization of society 2000-2024	0.6141
Majoritarian*SocPolarization	0.0451		Proportional*SocPolarization	0.0608

Predictors (MJ)	Significance	Model type	Predictors (PR)	Significance
Life expectancy	0.0030	Cluster- Robust SE-s, N=2640	Life expectancy	0.0072
Equal distribution of resources index	0.0000		Equal distribution of resources index	0.0000
Division of power index	0.0000		Division of power index	0.0000
El.System.Majoritarian	0.0028		El.System.Proportional	0.0252
PolarCAP.ideology	0.0001		PolarCAP.ideology	0.1776
Majoritarian.PolarCAP.ideology	0.0030		Majoritarian.PolarCAP.ideology	0.0749

Predictors (MJ)	Significance	Model type	Predictors (PR)	Significance
Life expectancy	0.0258	Cluster- Robust SE-s, N=2412	Life expectancy	0.0355
Equal distribution of resources index	0.0000		Equal distribution of resources index	0.0000
Division of power index	0.0000		Division of power index	0.0000
El.System.Majoritarian	0.0218		El.System.Proportional	0.0036
L_R.Std.Deviation (WVS)	0.1171		L_R.Std.Deviation (WVS)	0.2456
Majoritarian.L.R.Std.Dev	0.0234		Proportional.L.R.Std.Dev	0.0160

We conclude that the alternate polarization measures also have the potential to support H2, that is, a polarization → democracy causal link, but in these models, the electoral system predictor is stronger than polarization, and lends enough strength to the interaction term to dominate above polarization. (In the long-series models, polarization tended to be stronger than the electoral system.)

CONCLUSIONS AND DISCUSSION

Summary of findings

Although the paper was streamlined toward causal analysis with regression modelling, we leaned seriously into the descriptive analysis of the data, because they suggested some unexpected, interesting contextual information.

1. First, theorizing about the role of electoral systems and party systems has long been controversial because defenders of majoritarian systems have had their legitimate arguments against “weimarism”. Our analyses evidenced that (i) majoritarian structures occur more often in more populous and less developed countries, which puts these institutions at a serious disadvantage when comparing their democracy outcomes with those of the PR countries. (ii) The relationship of the majoritarian institutions with political polarization, as well as with mass mobilization for democracy, has changed over time. Around the time of WWII there was a turn from less polarized and more democracy-oriented mass movements in majoritarian countries towards PR countries becoming less polarized and more supportive of democracy. (iii) The focus of the literature defending majoritarian structures tended to be political stability, while here we focused on (changes in) democratic quality, thus our arguments don’t collide head-on.
2. Previous literature has done well in probing various aspects of the institutional set-up for resilience against autocratizing, such as constraints on the executive, and the maturity of

checks and balances. This paper is more engaged with the demand-side processes, and we were pleased to learn that the communication between leadership and masses is realized in significantly different ways in majoritarian and proportional systems. The role of nationalism in supporting autocratizing tendencies is just the tip of the iceberg; the whole ideological landscape is different in the two systems. Majoritarianism tends to rely on ideologies and personal charisma, while proportional systems rely on performance legitimation and legal-rational arguments. The empirical substratum also does justice to the theoretical concept of “proportionalism”: PR regimes have more widespread popular support than majoritarian regimes.

3. The Power BI dashboard was set up to visualize temporal trends of the phenomena studied in this paper, particularly the decline of quality-of-democracy measures. In addition, some of the monitored variables supported the choice of predictors in the regression models. Worldwide, the negative turn of political polarization precedes de-democratization, and socio-economic equality also started its stagnation and decay before the decay of the democracy. Even the dynamically evolving division of power slows down in the 21st century. These temporal trends support the causal direction among the studied phenomena, though strong feedback loops, such as from autocratizing to increasing economic inequality, are also plausible.
4. H1, that majoritarian systems are more likely to experience de-democratization, while proportional systems are less likely, was strongly supported by all models we ran.
5. H2, that polarization contributes to de-democratization, was also strongly supported for political polarization as measured by the corresponding V-Dem index. Two alternate polarization measures, V-Dem’s Polarization of society and PolarCAP. ideology, which cover fewer countries for shorter time periods, received partial support; they were significant in models with the majoritarian dummy, and insignificant in models with the proportional dummy. The World Value surveys derived ideological polarization measure failed to turn up as significant itself, but its interaction terms with electoral systems did.
6. The socio-economic equality measure had a very strong showing in all models, always in the expected direction, that is, more inequality makes de-democratization more likely. This was not really a surprise, as we argued for inequality’s impact on the upsurge of right-wing populism in a previous paper, as well. Yet these models, particularly the lavaan models, also evidenced that inequality is a predictor of polarization.
7. It was the other control, Division of power, of which strength in models (in ALL models), came as a surprise to us. And its success in the models mitigates the sting from the fact that our H3 received only partial support in those regressions. Division of power is also an important institutional variable, and actually, it articulates the same basic idea about power relations that distinguishes between majoritarian and proportional systems. More dispersion of the power in societies, and more need for negotiating our way with others, instead of imposing the will of a group that most of the time is not a real majority, but a sub-50% of the population that captures more than 50% of the power positions, is good for the democratic quality. The observation about the ideological differences between “proclamation” types of legitimation in majoritarian systems as opposed to “dialoguing” types of legitimation in proportional systems lends to the centralized versus decentralized institutional structures, as well. Federalism and viable sub-national self-governance need a great deal of “dialoguing”. Beyond being a strong predictor of the Electoral democracy index, Division of power may also mitigate polarization, as shown by the lavaan models.
8. H3, the hypothesis that the electoral system affects polarization, failed to receive convincing support in our models, but it was not convincingly refuted, either. As for the

1946-2024 data, it was most categorically rejected by the cluster-robust standard error models, but showed up as significant in the models with temporal lags, and in one of the lavaan models, it came close to significance with a p-value of 0.061. In the eight shorter-term models, it was significant 50% of the time. The hypothesis definitely deserves more tests with improved datasets and possibly with alternative methods, as well.

Suggestions for further research

This paper was meant to test the assumption that some institutions may have multiple channels to influence the outcomes of de-democratizing attempts. Actually, we started out from the insight that institutions as such, on their own, may not tell the whole story about the resilience of a society faced with powerful authoritarianizing attempts. The specific case at the center of our concerns was the US, with its carefully crafted checks-and-balances system, which still fails to keep tabs on an autocratizer when the same party captures all branches of power. This outcome is much less likely in a multiparty system; thus, proportional electoral systems have a serious advantage in this regard. But not even in the US have all trifectas led to executive aggrandizement; normally, the legislature and the judiciary do fight to keep their autonomy, even against a co-partisan executive. The party loyalty overriding institutional competition seems to be the exception, rather than the rule. Polarization is a good explanation for heightened party loyalty, mainly when the polarization is so strong in the population that officeholders are threatened to be voted out of office for “il-loyalty” (or “lèse-majesty”, in the conditions of serious executive aggrandizement). From another aspect, the type of polarization that increases party loyalty is also more likely in conditions of bipartism than in conditions of multi-partism. We have not had good historical data on the number of parties in countries, but it certainly would make a good alternative explanatory variable.

In general, we think that further research should extend its focus to more institutions.

First of all, given the strong impact of the vertical division of power on both the democratic quality and polarization, it should be recognized as a part of the explanation, not only as a control. While there has been a serious amount of interest in studying the relationship between decentralization and democracy, to our best knowledge, there is no theory about the relationship between division of power and polarization. The functional analogy between proportional election outcomes and decentralized power structures suggests that a network of dispersed power centers constrained to negotiate their ways is more likely to resist autocratizing tendencies than centralized structures that may be captured by one cohesive group promoting a “we against them” political logic.

Second, for practical purposes, we may prefer to study more granular measures of democratic decay, such as the evolution of accountability or of the legislative constraints on the executive. Do we have a “canary-in-the-mine” feature, an institution that is first to show signs of degradation, once an autocratizer comes into power? Which institutions are most vulnerable to executive aggrandizement? Or does it count for the outcome, how an autocratizer starts their work of demolishing democratic institutions?

However, we believe that the reason for being of autocratizers is to implement socio-economic changes that disproportionately benefit them and their supporters. We would be delighted to see studies that systematically map the autocratizers’ pre-election promises (the so-called populist discourse) against their actual acts in power. Most notably, there is a clear track record of all right-wing autocratizers to increase socioeconomic inequalities.

Polarization has amply been studied over the last decades, yet we don't have comprehensive, wide coverage measures of social/affective polarization. We have been happy with the V-Dem dataset's political polarization measure, yet the social one exists for a much shorter period. The same is true for a number of potential explanatory variables, such as communication patterns (echochambers, fake news, and manipulation), and the surge of extremist parties. V-Dem started incorporating data on communication and party system democratic-ness (Angiolillo et al. 2025), and about 2-3 decades have been coded thus far. Data availability has a profound impact on what may be meaningfully tested. Shorter-term timeseries or panel data are too much prone to autoregressions, and there are no really good solutions to address severe autocorrelation while fairly measuring the impact of the predictors in the model. To maximize the observation numbers and simplify the models, we refrained from including communication and extremism variables in our regressions.

The relationship between economic inequality and de-democratization keeps fascinating us as something still mysterious. The leftist thinking tends to explain the last decades' anti-establishment ("populist") mobilization, which swept into power several would-be autocratizers, with increasing economic inequality and insecurity accompanied by people's perception that their influence on policies is vanishing. The mysterious element is the affected masses' choice between left-wing and right-wing solutions to their plight. The left solutions focus on restoring the welfare state by taxing the wealthy. The right solutions focus on taking away things from "undeserving" immigrants and minorities, while allowing the rich to get even richer. In the developed world, where a decent level of democracy has existed, and we may meaningfully speak of democratic backsliding, right-wing autocratizers are much more frequent than left-wing autocratizers, while they are also more frequent in countries with majoritarian structures. This suggests that institutions, economic outcomes, and mass policy preferences may intricately be linked, and those links should (further) be studied.

Finally, we did not set out to formally test this, but our data suggests that ideological polarization is a driving force behind other forms of polarization, that is, behind social and/or affective polarization, as suggested by a part of the pertinent literature (Orr et al. 2023).

REFERENCES

- Angiolillo, Fabio, Felix Wiebrecht, and Staffan I. Lindberg. 2025. Party Systems, Democratic Positions, and Regime Changes: Introducing the Party-System Democracy Index. *British Journal of Political Science*, 55, e42, 1–24. DOI:10.1017/S0007123424000887
- Arbatli, E., & D. Rosenberg. 2020. United we stand, divided we rule: how political polarization erodes democracy. *Democratization*, 28(2), 285–307. <https://doi.org/10.1080/13510347.2020.1818068>
- Bäck H., R. Carroll, E. Renström, & A. Ryan. 2023. Elite communication and affective polarization among voters. *Electoral Studies*, 84, 102639.
- Bermeo, Nancy. 2016. On Democratic Backsliding. *Journal of Democracy*, Vol. 27(1), pp. 5–19.
- Bernaerts, Kamil, Benjamin Blanckaert, & Didier Caluwaerts. 2023. Institutional design and polarization. Do consensus democracies fare better in fighting polarization than majoritarian democracies. *Democratization*, Vol. 30, No. 2, 153–172. <https://doi.org/10.1080/13510347.2022.2117300>
- Bischof, D. and M. Wagner. 2019. Do voters polarize when radical parties enter parliament? *American Journal of Political Science* 63(4), 888–904.

- Boxell, Levi, Matthew Gentzkow, & Jesse M. Shapiro. 2024. Cross-Country Trends in Affective Polarization. *The Review of Economics and Statistics*, 106 (2): 557–565. https://doi.org/10.1162/rest_a_01160
- Broockman D. E., J.L. Kalla, & S.J. Westwood. 2023. Does affective polarization undermine democratic norms or accountability? Maybe not. *American Journal of Political Science*, 67(3), 808-828
- Cely, Tadeas. 2025. One more constrained than the other: Asymmetrical ideological alignment and its implications for polarization. *European Journal of Political Research*. Vol. 64, (4):1945-1973. DOI: 10.1111/1475-6765.70016
- Dahlum, Sirianne, Peter Egge Langsæther, & Tore Wig. 2025. New evidence on citizens' reactions to democratic norm violations in an advanced democracy. *Electoral Studies: an international journal on voting and electoral systems and strategy*. Vol. 97. DOI: 10.1016/j.electstud.2025.102971.
- Druckman, James N., Donald P. Green, & Shanto Iyengar. 2024. Does Affective Polarization Contribute to Democratic Backsliding in America? *The ANNALS of the American Academy of Political and Social Science* 708:1, pp.137-163.
- Esteban, Joan, & Gerald Schneider. 2008. Polarization and Conflict: Theoretical and Empirical Issues. *Journal of Peace Research* 45(2): 131–141. DOI:10.1177/0022343307087168.
- García-Sánchez, Efraín, Felicity Turner-Zwinkels, Rebekka Kesberg, Medhi Marot, Rosa Rodríguez-Bailón, Guillermo B. Willis, & Toon Kuppens. 2024. Economic Threats, Political and National Identification Predict Affective Polarization: Longitudinal Evidence from Spain. *International Review of Social Psychology* 37:1, p.5, DOI: 10.5334/irsp.838
- Gidengil E., D. Stolle, O. Bergeron-Boutin. 2022. The partisan nature of support for democratic backsliding: A comparative perspective. *European Journal of Political Research*, 61(4), 901-929.
- Gidron, Noam, James Adams, & Will Horne. 2018. How Ideology, Economics and Institutions Shape Affective Polarization in Democratic Polities. <https://ces.fas.harvard.edu/uploads/files/events/GAH-Affective-Polarization-in-Democratic-Polities.pdf>
- Gidron, Noam, Yotam Margalit, Lior Sheffer, & Itamar Yakir. 2025. Why masses support democratic backsliding. *American Journal of Political Science*. <https://doi.org/10.1111/ajps.12958>
- Graham M.H., & M.W. Svobik. 2020. Democracy in America? Partisanship, polarization, and the robustness of support for democracy in the United States. *American Political Science Review* 114(2), 392–409.
- Guedes-Neto, J. V. 2023. The effects of political attitudes on affective polarization: Survey evidence from 165 elections. *Political Studies Review*, 21(2), 238-259.
- Hajnal, Áron. 2025. Two Tales of Polarization? How Affective and Ideological Polarization Influence Political Corruption—A Panel Analysis of 153 Countries Between 2000 and 2021. *Political Studies*, 75(1) pp. 438–452. <https://doi.org/10.1177/00323217251324306>
- Harteveld E., P. Mendoza, M. Rooduijn. 2022. Affective polarization and the populist radical right: Creating the hating? *Government and Opposition*, 57(4), 703-727.
- Hern, Erin. 2025. Visibility of autocratization and election outcomes. *European Political Science Review*, 17(4) pp. 691 – 710, DOI: <https://doi.org/10.1017/S1755773925100076>
- Huang, Francis L., & Xintong Li. 2022. Using cluster-robust standard errors when analyzing group-randomized trials with few clusters. *Behavior Research Methods* 54: 1181–1199. <https://doi.org/10.3758/s13428-021-01627-0>.

- Iyengar, Shanto, Yphtach Lelkes, Matthew Levendusky, Neil Malhotra, & Sean J. Westwood. 2019. The Origins and Consequences of Affective Polarization in the United States. *Annual Review of Political Science*, Vol. 22:129-146, <https://doi.org/10.1146/annurev-polisci-051117-073034>
- Jacob, Marc S. 2024. Citizen support for democracy, anti-pluralist parties in power and democratic backsliding. *European Journal of Political Research* 64(1), Pp. 348-373.
- Janssen, Lisa, & Emma Turkenburg. 2024. Breaking free from linear assumptions: Unravelling the relationship between affective polarization and democratic support. *European Journal of Political Research* 64(3), Pp. 1465-1479.
- Lupu, Noam. 2015. Party polarization and mass partisanship: A comparative perspective. *Political Behavior* 37, Pp. 331–356.
- Mason, Lilliana. 2014. "I Disrespectfully Agree": The Differential Effects of Partisan Sorting on Social and Issue Polarization. *American Journal of Political Science* 59 (1): 128–145. doi:10.1111/ajps.12089.
- McCarty N.M., K.T. Poole, H. Rosenthal. 2006. *Polarized America: The Dance of Ideology and Unequal Riches*. Cambridge, MA: MIT Press
- McCoy, Jennifer, Tahmina Rahman, & Murat Somer. 2018. Polarization and the Global Crisis of Democracy: Common Patterns, Dynamics, and Pernicious Consequences for Democratic Polities. *American Behavioral Scientist* 62(1): 16–42. doi:10.1177/0002764218759576
- Meijers, Maurits J., Robert A. Huber, & Andrej Zaslove. 2025. The anatomy of populist ideology: How political parties define 'the people' and 'the elite'. *European Journal of Political Research*, Vol. 64(4): 2161-2176. <https://doi.org/10.1111/1475-6765.70026>
- Merten, Lion, & Jana Niedringhaus. 2024. When perception shapes reality: Effects of perceived income inequality and social mobility on affective polarization. *The Journal of Economic Inequality* 23(2): 327-347.
- Midlarsky, Manus I. 1984. Political Stability of Two-Party and Multiparty Systems: Probabilistic Bases for Comparison. *American Political Science Review*, 78(4): 929–951.
- Muis, Q., F. Hendriks, & T. Reeskens. 2025. Opponents, not enemies: disentangling the relationship between polarization and democracy in Europe. *Democratization*, 1–24. <https://doi.org/10.1080/13510347.2025.2548904>
- Nord, Marina, Fabio Angiolillo, Ana Good God, & Staffan I. Lindberg. 2025. State of the world 2024: 25 years of autocratization – democracy trumped? *Democratization*, 32(4): 839-864, DOI: 10.1080/13510347.2025.2487825
- Orhan, Y. E. 2022. The relationship between affective polarization and democratic backsliding: comparative evidence. *Democratization*, 29(4): 714–735. <https://doi.org/10.1080/13510347.2021.2008912>
- Orr L. V., A. Fowler, & G.A. Huber. 2023. Is affective polarization driven by identity, loyalty, or substance? *American Journal of Political Science*, 67(4): 948-962.
- Patkós, V., & B. Plesz. 2025. Does political polarisation undermine democratic accountability? Evidence from 28 European democracies. *West European Politics*, 1–33. <https://doi.org/10.1080/01402382.2025.2543600>.
- Phillips, Joseph B. 2024. Affective polarization and habits of political participation. *Electoral Studies* 87: 102733. <https://doi.org/10.1016/j.electstud.2023.102733>
- Ross, Bertrall L. 2024. Polarization, Populism, and the Crisis of American Democracy. *Annual Review of Law and Social Science* 20(1): 293-30. <https://doi.org/10.1146/annurev-lawsocsci-041922-035113>

- Şaşmaz A., A.H. Yagci, & D. Ziblatt. 2022. How voters respond to presidential assaults on checks and balances: Evidence from a survey experiment in Turkey. *Comparative Political Studies*, 55(11): 1947–1980.
<https://journals.sagepub.com/doi/10.1177/00104140211066216>.
- Svolik, Milan W., E. Avramovska, J. Lutz, & F. Milaèiæ. 2023. In Europe, Democracy Erodes from the Right. *Journal of Democracy* 34(1): 5–20.
- Svolik, Milan W. 2019. Polarization versus Democracy. *Journal of Democracy* 30(3): 20-32.
- West, E. A., & S. Iyengar. 2022. Partisanship as a social identity: Implications for polarization. *Political Behavior*, 44(2): 807–838. <https://doi.org/10.1007/s11109-020-09637-y>
- Wunsch, Natasha, Marc S. Jacob & Laurenz Derksen. 2025. The Demand Side of Democratic Backsliding: How Divergent Understandings of Democracy Shape Political Choice. *British Journal of Political Science* 55, e39.
<https://doi.org/10.1017/S0007123424000711>

DATASET CITATIONS:

- Mehlhoff, Isaac D. 2025. Mass Polarization across Time and Space. Series: *Elements in Comparative Political Behavior*, DOI: <https://doi.org/10.1017/9781009350662>, Online ISBN: 9781009350662, Cambridge University Press.
- Teorell, Jan, Aksel Sundström, Sören Holmberg, Bo Rothstein, Natalia Alvarado Pachon, Cem Mert Dalli, Rafael Lopez Valverde, Victor Saidi Phiri & Lauren Gerber. 2025. *The Quality of Government Standard Dataset*, version Jan25. University of Gothenburg: The Quality of Government Institute, <https://www.gu.se/en/quality-government>
doi:10.18157/qogstdjan25
- Coppedge, Michael, John Gerring, Carl Henrik Knutsen, Staffan I. Lindberg, Jan Teorell, David Altman, Fabio Angiolillo, Michael Bernhard, Agnes Cornell, M. Steven Fish, Linnea Fox, Lisa Gastaldi, Haakon Gjerløw, Adam Glynn, Ana Good God, Sandra Grahn, Allen Hicken, Katrin Kinzelbach, Joshua Krusell, Kyle L. Marquardt, Kelly McMann, Valeriya Mechkova, Juraj Medzihorsky, Natalia Natsika, Anja Neundorf, Pamela Paxton, Daniel Pemstein, Johannes von Römer, Brigitte Seim, Rachel Sigman, Svend-Erik Skaaning, Jeffrey Staton, Aksel Sundström, Marcus Tannenberg, Eitan Tzelgov, Yi-ting Wang, Felix Wiebrecht, Tore Wig, Steven Wilson and Daniel Ziblatt. 2025. "V-Dem [Country-Year/Country-Date] Dataset v15" *Varieties of Democracy (V-Dem) Project*. <https://doi.org/10.23696/vdemds25>.
- Pemstein, Daniel, Kyle L. Marquardt, Eitan Tzelgov, Yi-ting Wang, Juraj Medzihorsky, Joshua Krusell, Farhad Miri, and Johannes von Römer. 2025. "The V-Dem Measurement Model: Latent Variable Analysis for Cross-National and Cross-Temporal Expert-Coded Data". *V-Dem Working Paper* No. 21. 10th edition. University of Gothenburg: Varieties of Democracy Institute.
- Inglehart, R., C. Haerpfer, A. Moreno, C. Welzel, K. Kizilova, J. Diez-Medrano, M. Lagos, P. Norris, E. Ponarin & B. Puranen (eds.). 2022. *World Values Survey: All Rounds - Country-Pooled Datafile*. Madrid, Spain & Vienna, Austria: JD Systems Institute & WWSA Secretariat. Dataset Version 3.0.0. doi:10.14281/18241.17

CLASSICS MENTIONED:

Dawns (1957), Sartori (1976), Katz and Mair (2009), Lijphart

Appendix

Lavaan models with the 1946-2024 data

1. Model with the Majoritarian dummy

```
mPOLY.inst11bis <- '  
Political.polarization ~ El.System.Majoritarian + Division.of.power.idx +  
Equal.distrib.of.resources.idx  
Electoral.dem.idx ~ El.System.Majoritarian + Political.polarization +  
Equal.distrib.of.resources.idx + Life.expectancy + Division.of.power.idx  
'  
fitPOLY.inst11bis<- sem(mPOLY.inst11bis, data=dat)  
summary(fitPOLY.inst11bis, standardized = TRUE, fit.measures=TRUE)
```

lavaan 0.6-19 ended normally after 1 iteration

Estimator	ML
Optimization method	NLMINB
Number of model parameters	10
Number of observations	10754

Model Test User Model:

Test statistic	11.646
Degrees of freedom	1
P-value (Chi-square)	0.001

Model Test Baseline Model:

Test statistic	11220.145
Degrees of freedom	9
P-value	0.000

User Model versus Baseline Model:

Comparative Fit Index (CFI)	0.999
Tucker-Lewis Index (TLI)	0.991

Loglikelihood and Information Criteria:

Loglikelihood user model (H0)	-24913.279
Loglikelihood unrestricted model (H1)	NA

Akaike (AIC)	49846.558
Bayesian (BIC)	49919.389
Sample-size adjusted Bayesian (SABIC)	49887.610

Root Mean Square Error of Approximation:

RMSEA	0.031
90 Percent confidence interval - lower	0.017
90 Percent confidence interval - upper	0.049
P-value H ₀ : RMSEA ≤ 0.050	0.962
P-value H ₀ : RMSEA ≥ 0.080	0.000

Standardized Root Mean Square Residual:

SRMR	0.005
------	-------

Parameter Estimates:

Standard errors	Standard
Information	Expected
Information saturated (h1) model	Structured

Regressions:

	Estimate	Std.Err	z-value	P(> z)	Std.lv	Std.all
Political.polarization ~						
El.Systm.Mjrtr	-0.036	0.019	-1.872	0.061	-0.036	-0.018
Divsn.f.pwr.dx	-0.001	0.000	-11.841	0.000	-0.001	-0.116
Eql.dstrb.f.r.	-0.274	0.010	-27.900	0.000	-0.274	-0.274
Electoral.dem.idx ~						
El.Systm.Mjrtr	-0.409	0.013	-30.860	0.000	-0.409	-0.204
Politcl.plrztn	-0.257	0.006	-40.117	0.000	-0.257	-0.257
Eql.dstrb.f.r.	0.169	0.008	20.775	0.000	0.169	0.168
Life.expectncy	0.240	0.008	28.319	0.000	0.240	0.240
Divsn.f.pwr.dx	0.002	0.000	44.610	0.000	0.002	0.300

Variances:

	Estimate	Std.Err	z-value	P(> z)	Std.lv	Std.all
.Politcl.plrztn	0.893	0.012	73.328	0.000	0.893	0.893
.Electoral.dm.dx	0.395	0.005	73.328	0.000	0.395	0.394

2. Model with the Proportional dummy

```

mPOLY.inst10 <- '
Political.polarization ~ El.System.Proportional + Division.of.power.idx +
Equal.distrib.of.resources.idx
Electoral.dem.idx ~ El.System.Proportional + Political.polarization +
Equal.distrib.of.resources.idx + Life.expectancy + Division.of.power.idx
'
fitPOLY.inst10<- sem(mPOLY.inst10, data=dat)
summary(fitPOLY.inst10, standardized = TRUE, fit.measures=TRUE)

```

lavaan 0.6-19 ended normally after 2 iterations

Estimator	ML
Optimization method	NLMINB
Number of model parameters	10
Number of observations	10754

Model Test User Model:

Test statistic	13.860
Degrees of freedom	1
P-value (Chi-square)	0.000

Model Test Baseline Model:

Test statistic	11310.173
Degrees of freedom	9
P-value	0.000

User Model versus Baseline Model:

Comparative Fit Index (CFI)	0.999
Tucker-Lewis Index (TLI)	0.990

Loglikelihood and Information Criteria:

Loglikelihood user model (H0)	-24869.372
Loglikelihood unrestricted model (H1)	NA

Akaike (AIC)	49758.745
Bayesian (BIC)	49831.575
Sample-size adjusted Bayesian (SABIC)	49799.796

Root Mean Square Error of Approximation:

RMSEA	0.035
90 Percent confidence interval - lower	0.020
90 Percent confidence interval - upper	0.052
P-value H ₀ : RMSEA ≤ 0.050	0.928
P-value H ₀ : RMSEA ≥ 0.080	0.000

Standardized Root Mean Square Residual:

SRMR	0.006
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Parameter Estimates:

Standard errors	Standard
Information	Expected
Information saturated (h1) model	Structured

Regressions:

	Estimate	Std.Err	z-value	P(> z)	Std.lv	Std.all
Political.polarization ~						
El.System.Prprt	0.015	0.020	0.761	0.447	0.015	0.007
Divsn.f.pwr.dx	-0.001	0.000	-11.671	0.000	-0.001	-0.114
Eq1.dstrb.f.r.	-0.272	0.010	-27.806	0.000	-0.272	0.206
Electoral.dem.idx ~						
El.System.Prprt	0.428	0.013	32.430	0.000	0.428	-0.255
Politcl.plrztn	-0.256	0.006	-40.065	0.000	-0.256	0.160
Eq1.dstrb.f.r.	0.160	0.008	19.812	0.000	0.160	-0.272
Life.expectncy	0.265	0.008	32.181	0.000	0.265	0.265
Divsn.f.pwr.dx	0.002	0.000	44.710	0.000	0.002	0.299

Variances:

	Estimate	Std.Err	z-value	P(> z)	Std.lv	Std.all
.Politcl.plrztn	0.893	0.012	73.328	0.000	0.893	0.893
.Electoral.dm.dx	0.392	0.005	73.328	0.000	0.392	0.390