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What Explains Unequal Responsiveness? Investigating the Role of Institutional Agenda Setting, Costly Policies, and Status-Quo Bias

Mikael Persson (University of Gothenburg)
mikael.persson@pol.gu.se



ABSTRACT:

Previous studies on the opinion-policy link have shown that political representatives appear to be more responsive to the affluent than to the middle- and working class. The main explanation in the U.S. based literature is that economic transactions from the economic elites to the political elites lead political representatives to take decisions that satisfy the preferences of the wealthy. This paper provides an analysis of the opinion-policy link in Swedish politics, a context where campaign donations are relatively small. Despite this, the results confirm that high-income citizens receive most policy responsiveness. Three alternative potential explanations are discussed. Do the high-income citizens receive more responsiveness because a) they are better at putting issues on the political agenda, b) because they are easier to satisfy and prefer “cheaper” symbolic policy reforms while the low-income citizens prefer more costly policies, or c) because the status quo bias is working to the advantage of the high-income citizens?

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Several studies have shown that political representatives appear to be more responsive towards affluent citizens than to middle- and low-income citizens (Bartels 2009; Gilens 2005, 2012; Gilens and Page 2014), i.e. policies supported by the rich are more common than policies supported by the poor. Yet, however, we know little about the mechanisms driving this relationship. Gilens (2005, 2012) speculates that the unequal responsiveness in the US might have roots in economic inequality. High-income citizens make large campaign donations while low-income citizens have less connections with political representatives. According to this argument, large economic transactions between wealthy citizens and the political elite might create a bond that leads politicians to take decisions that satisfies the opinions of the wealthy.

This paper studies the opinion-policy link in Swedish politics. While Sweden and the US are similar in that they are both postindustrial Western democracies, they are poles apart within this group of countries (Granberg and Holmberg 1988). While inequality has been on the rise in many western countries during the last decades (Piketty and Saez 2014), Sweden has far lower levels of inequality than the U.S. (Solt 2009), and donations to political parties are very small in comparison. If unequal political responsiveness is a consequence of economic inequality, then we should see more equal responsiveness in this context.

The first part of the paper establishes that responsiveness is biased in accordance with the preferences of high-income citizens also in Sweden. Although we cannot strictly compare the levels of inequality in responsiveness between countries since we lack a strictly comparable indicator, we can however say that the more egalitarian Swedish system is not absent of unequal responsiveness either. Thus the study adds to recent comparative studies that finds income biased responsiveness regarding government spending (Peters and Ensink 2015) and ideological congruence (Rosset, Giger and Bernauer 2013; Bernauer, Giger and Rosset 2015). In addition, single country studies from Denmark (Elkjær 2019), the Netherlands (Schakel Forthcoming; Schakel and Hakhverdian 2018) and Germany (Elsässer, Hense and Schäfer 2018) show that responsiveness is biased towards the preferences of the high-income citizens

also in Europe. Since biased responsiveness is found even in contexts with lower levels of inequality, we need to search for the explanation to biased responsiveness elsewhere.

The second part of the paper focuses on three potential explanations to why we find unequal responsiveness in the Swedish case. First, I study how responsiveness is related to the saliency of issues; do the high-income citizens get what they want to a higher degree because they are better at bringing their favored policies up on the political agenda? Second, I study whether the low-income citizens prefer more costly policies than the high-income citizens; is the reason to biased responsiveness that the high-income citizens prefer policies that are easier to implement? And third, do the high-income citizens receive more responsiveness because the status quo bias is working to their advantage.

The state of the research field

The classic approach to study responsiveness examines the relationship between citizens' opinions and their elected representatives' opinions or their legislative behavior (Achen 1977; Miller and Stokes 1963; Holmberg 1997). The collective message from these studies is that, at least in the US, there is a relatively strong relationship between the general public opinion and representatives' opinions and behavior. An alternative approach is to track changes in public opinion and changes in public policies (Page and Shapiro 1983; Soroka and Wlezien 2010; Erikson, MacKuen and Stimson 2002; Monroe 1979, 1998; Page and Shapiro 1983; Stimson, MacKuen and Erikson 1995). These studies have shown that while there is a relatively strong status quo bias, policy outcomes and majority preferences are often consistent. Comparative studies from Europe largely confirm that government is, at least, fairly responsive to the public (Hakhverdian 2010; Binzer Hobolt and Klemmensen 2005; Binzer Hobolt and Klemmensen 2008; Rasmussen, Reher and Toshkov 2019). Other studies have shown that opinions both *affect* policies and that public opinion *reacts* to policy changes (Wlezien 1995; Wlezien and Soroka 2007; Soroka and Wlezien 2005, 2010). A parallel literature on welfare states have argued that support in public opinion plays a pivotal role in explaining

the persistence of welfare states (Brooks and Manza 2006, 2008).

The aforementioned studies focus on the responsiveness given to the entire citizenry.¹ However, what is more interesting is whether policies are biased towards the opinions of citizens with certain socio economic status. Comparing citizens' opinions and data on U.S. senators' votes, Bartels (2009) shows that political representatives are more responsive to high-income citizens.² And in several recent studies Gilens (2005, 2012) and Gilens and Page (2014) show that while the general relationship between public opinion and policies is “moderately strong”, policies have a particularly close relationship with the preferences of high-income citizens when there is disagreement between high- and low-income citizens on policy proposals.

However, Gilens findings are contested. Soroka and Wlezien (2008) study government spending and argue that the policy preferences of high- and low-income citizens seldom differ, and hence there cannot reasonably be any strong bias in government responsiveness to different groups. Others have argued that the advantage for the high-income citizens, at least relative to the middle, is small, in some cases near-zero (Ura and Ellis 2008). In addition, Gilens methods and analyses have been criticized by several authors arguing that his results are exaggerated (Bashir 2015; Branham, Soroka and Wlezien 2017; Enns 2015).³

A recent quantitative comparison of the literature shows that biases in responsiveness related to income groups dominate over results showing no such bias (Elkjær Forthcoming). Elkjær (Forthcoming, p. 25) show that “about four out of five empirical models find that the high-income citizens are better represented compared to the poor”.

¹There are also studies looking at geographic variation in responsiveness. For example, Lax and Phillips (2012) study responsiveness in democratic states and show that there is a “democratic deficit” at the state level.

²Moreover, in a study that looks closer at biased responsiveness at the U.S. state level, Flavin (2012) finds a stronger influence of high- than low-income citizens' opinions on some key issues. In a case study on U.S. foreign policy, (Jacobs and Page 2005) find that high-status citizens have a strong impact on policy while labor citizens have a weaker impact. Moreover, (Griffin and Newman 2007) find that policy outcomes are also biased in relation to ethnicity. Looking at opinion congruence, they find that political representatives are more responsive to the preferences of whites than Latinos.

³But see also the replies from Gilens (2015, 2016). Hence, to what extent responsiveness actually is biased towards the rich in the U.S. is a matter of debate in the literature.

As mentioned in the introduction, recent studies from Denmark (Elkjær 2019), the Netherlands (Schakel Forthcoming; Schakel and Hakhverdian 2018) and Germany (Elsässer, Hense and Schäfer 2018) shows that there is biased responsiveness towards the preferences of the high-income citizens also in Europe. As a matter of fact, inequalities in responsiveness appear to be even larger in Europe than in the U.S. (Elkjær Forthcoming). In addition, a recent paper by Bartels (2017) provides evidence from comparative data on 30 countries showing that welfare spending was skewed in favor of wealthy citizens who prefer less spending.

In Sweden, previous studies have looked primarily on opinion congruence (but not inequality to different income groups or policy implementation as outcomes). Holmberg (1997) and Esaiasson and Holmberg (1996) conclude that voters' and citizens' opinions co-vary over time and that trends in opinion changes are very similar among voters and representatives. However, changes appear to be driven by changes among the elites rather than among the citizens.

On the outset, one could expect that responsiveness should be relatively high and unbiased in the Swedish context. First, voter turnout is relatively high — previous research has shown that politicians are more responsive to voters than to non-voters (Griffin and Newman 2005). Second, the Swedish system is highly proportional and research has shown that proportional systems better represent the public as a whole (Powell 2000).⁴ And third, the level of economic equality is relatively high. Campaign contributions are much smaller in Sweden than in the US. The ties between the wealthy and the politicians are likely not as strong in Sweden and the working class movement constitutes an alternative pathway to political influence that has no counterpart in the U.S. context.

⁴But see Rogowski and Kayser (2002) for a counter-argument.

Study design: Data on public opinion connected to policy outcomes

The paper evaluates the opinion policy link in Swedish politics. The opinion data comes from the Swedish National Election Studies (SNES) and the Society, Opinion and Media (SOM) institute. Both are non-commercial and publicly funded data collections. I examined all the old data-files searching for questions on policy proposals at the national level. The criteria for a question to be part of the dataset is that it should ask about a specific possible policy change in Swedish politics such as whether to close all nuclear power plants, whether to enter the EMU, raise the retirement age or increase income taxes. Too vague and too broad questions were excluded, since for those it was not possible to provide clear answers as to whether they were implemented. After excluding such questions, 260 survey questions remained that are measuring opinions on specific policy proposals. Some of these questions were only asked once while others were asked numerous times. In total this brings us 957 unique measures of public opinion on policy proposals in different years.

For each of these variables the amount of support among the public as a whole and in different subgroups were calculated (i.e. the proportion who said that they supported the proposal). When responses were coded on scales the share on the positive side of the scale was calculated.

For each of these policy proposals it was evaluated to what extent policies were actually changed in the direction of the proposal the same year as the question was asked or whether it was implemented at each succeeding year until 2014. For example, this means that the implementation variable takes the value 0 for EMU policy proposal for years when Sweden was not part of the EMU and the value 1 after it entered, for the raising the retirement age variable it takes the value 0 if the retirement age was not raised and 1 if it was, for the proposal to increase taxes it takes the value 0 if taxes were not raised and 1 if they were during the respective time frame windows. Since these evaluations are done for each specific year after the question was asked it gives us the opportunity to look at responsiveness in both a short and a long term perspective. Further information on the data can be found in

the Appendix, section [A](#).

How responsive is the system?

In general 54 percent of the proposals were favored by a majority of the respondents who expressed a preference. Overall the level of policy changes is quite low; 13 percent of the proposed changes were implemented during the respective term. But most importantly, there is no clear pattern showing that higher levels of general public support leads to higher levels of policy change. The top row in Table [1](#) illustrates the coefficients from a series of regressions where implementation was regressed on policy support among the general public (with clustered standard errors at the policy proposal-level) for different time frame windows (1 to 10 years). For most windows the confidence bounds cover zero. This indicates that there is no strong and significant relationship between general public opinion and implementation no matter if we look at it in a short- or long-term perspective. More detailed descriptive analyses can be found in the Appendix section [C](#).

Using the survey data I predict the support for policies at different income levels.⁵ The second to third row of results in Table [1](#) show regression coefficients from a series of regressions where the level of support among the 10th, 50th and 90th percentile was included separately as independent variables (with standard errors clustered at the policy proposal level). As time goes by the influence of the 90th percentile becomes more positive and significant while the estimate for the 10th percentile is close to zero for all years. As for the influence of the 50th percentile it only reaches the 95 percent significance level for four to eight years after a question was asked and the size of the coefficients are much smaller than for the 90 percentile.⁶

⁵See Appendix section [B](#) for a methodological discussion of this issue.

⁶The correlation between support in the 90th and 10th percentile is .82, and between the 90th and 50th percentile it is .95. When looking at the support in the raw income categories instead of the imputed I find that the correlation is .74 between the support in the highest and the lowest income category. Table [A2](#) in the Appendix show results from multivariate models. Due to high collinearity estimates do not reach statistical significance; coefficients for 10th percentile are generally negative or close to zero while the coefficients for the 90th percentile are larger and positive.

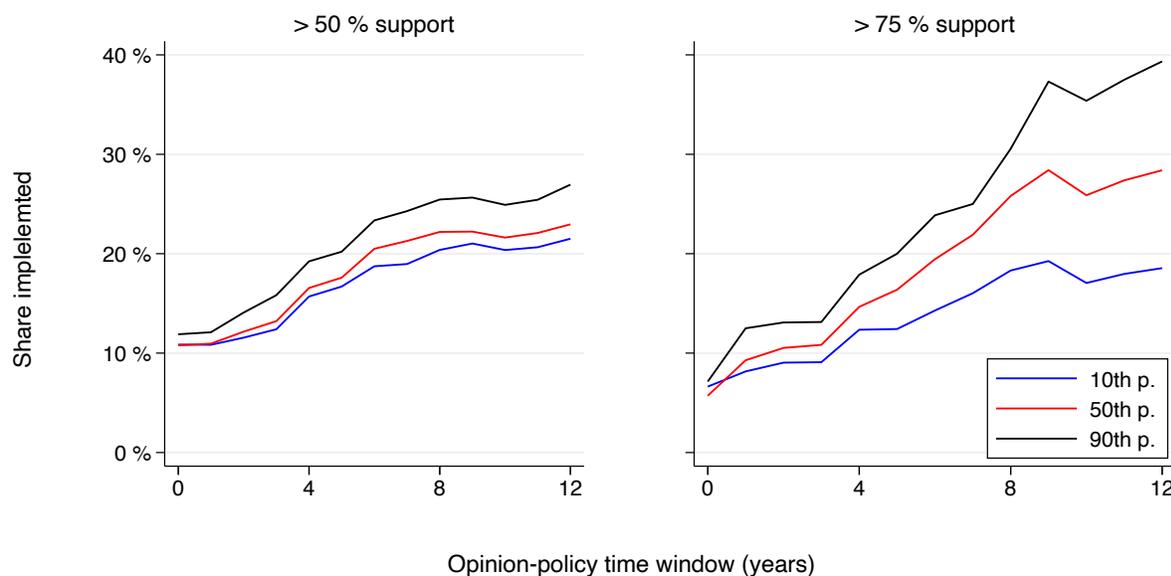
The support variable is scaled from zero to ten, which means that a ten percent increase in support among the 90th percentile is associated with an increased probability of policy change in the magnitude of about one to three percentage points depending of the time frame used.

To get a better sense of the trends in the raw data, figure [1](#) illustrates the share of proposals implemented from 0 to 12 years after questions were asked for issues that were supported by more than 50 and 75 percent of the persons in the different income groups. As for the high-income citizens, the amount of implemented policy changes increases as support for the proposals rises. For the most popular proposals (those supported by more than 75 percent in the 90th income percentile) about 16 percent of the proposed changes got implemented after four years, this increases to almost 40 percent a decade after a question was asked. This stands in contrast to the fact that only about 12 percent of the most popular proposals among the low-income citizens got implemented after four years. For the low-income citizens policy changes occurred to a similar degree for moderately popular proposals (supported by more than 50 percent) and for the most popular proposals (favored by more than 75 percent).

The fact that I do measure responsiveness continuously every year after the question was asked uncovers the important finding that responsiveness increases substantially over time. Other work in this field has mostly relied on fixed time-frames (such as four year windows) and might thus have missed an increasing influence of the affluent over time. However, it is of course not possible to say if this is a more general pattern or a peculiarity of the Swedish political system.

A related issue is whether the distance between the support in the different income groups are related to the level of policy implementation. The bottom row in Table [1](#) shows results from regressions where the independent variable is the support in the 10th percentile minus the support in the 90th percentile. When policy proposals are more popular among the low-income citizens than the high-income citizens, there is a lower probability that the proposals

Figure 1: The raw data relationship between support in different income groups and policy change by different time frames



become implemented and this relationship becomes more pronounced as time goes by. A ten percent increase in the relative support of the 10th percentile relative to the 90th is associated with about a five percent decrease in the probability of implementation four years later and about a nine percent decrease two years later.

Additional analyses can be found in the Appendix where I show that the same kinds of biases can be found for other groups; policy responsiveness appear to be biased in favor of men rather than women, old rather than young and well educated rather than low educated. No matter which indicator of socio-economic position one uses, groups with more resources appear get what they want to a higher degree (see Appendix section [C](#)).⁷

⁷See [Guntermann and Persson \(2020\)](#) for a study on issue voting and responsiveness in Sweden.

Table 1: The relationship between opinions and policies

Window (years)	1	2	3	4	5	6	7	8	9	10
General public	0.008 (0.00)	0.004 (0.00)	0.004 (0.00)	0.011* (0.01)	0.011 (0.01)	0.015* (0.01)	0.015* (0.01)	0.016* (0.01)	0.013 (0.01)	0.009 (0.01)
10th percentile	0.002 (0.00)	-0.004 (0.00)	-0.005 (0.00)	0.002 (0.00)	-0.000 (0.01)	0.003 (0.01)	0.002 (0.01)	0.001 (0.01)	-0.002 (0.01)	-0.006 (0.01)
50th percentile	0.008 (0.00)	0.004 (0.00)	0.004 (0.00)	0.011* (0.01)	0.011* (0.01)	0.015* (0.01)	0.015* (0.01)	0.016* (0.01)	0.013 (0.01)	0.009 (0.01)
90th percentile	0.013* (0.00)	0.011* (0.00)	0.013* (0.00)	0.020* (0.01)	0.021* (0.01)	0.027* (0.01)	0.027* (0.01)	0.029* (0.01)	0.028* (0.01)	0.025* (0.01)
10-90 difference	-0.031* (0.01)	-0.041* (0.01)	-0.048* (0.01)	-0.047* (0.01)	-0.058* (0.01)	-0.064* (0.01)	-0.070* (0.01)	-0.076* (0.01)	-0.080* (0.01)	-0.086* (0.01)

Notes: * denote statistical significance at the 5% level. Heteroscedastic-consistent standard errors clustered at the policy proposal level in parentheses. Entries are from separate bivariate regressions.

Table 2: The relationship between opinions and discussion in parliament

Window (years)	1	2	3	4	5	6	7	8	9	10
10th percentile	0.012 (0.01)	0.005 (0.01)	0.000 (0.01)	-0.002 (0.01)	0.007 (0.01)	0.010 (0.01)	0.006 (0.01)	-0.004 (0.02)	-0.011 (0.02)	-0.006 (0.02)
50th percentile	0.013 (0.01)	0.007 (0.01)	0.002 (0.01)	0.000 (0.01)	0.008 (0.01)	0.013 (0.01)	0.007 (0.02)	-0.001 (0.02)	-0.010 (0.02)	-0.005 (0.02)
90th percentile	0.012 (0.01)	0.007 (0.01)	0.003 (0.01)	0.002 (0.01)	0.009 (0.01)	0.014 (0.01)	0.006 (0.01)	0.002 (0.01)	-0.007 (0.02)	-0.003 (0.02)

Notes: * denote statistical significance at the 5% level. Heteroscedastic-consistent standard errors clustered at the policy proposal level in parentheses. Entries are from separate bivariate regressions.

Are high-income citizens better at putting their preferred issues on the political agenda?

What can explain this bias? Perhaps the political representatives want to be responsive to all citizens but what the low-income citizens want might not even be discussed in the political debate. Could it be the case that the policy proposals that the low-income citizens favor do not even enter the institutional agenda? It is well established in political science research that the step that determines what comes up on the agenda might be as important as the actual political decisions (Kingdon 1984; Baumgartner and Jones 2010; Baumgartner, Green-Pedersen and Jones 2006). But yet, few studies have looked at agenda setting in relation to unequal responsiveness. An exception is Flavin and Franko (2017) who use US bill introduction data from state legislatures showing “that state legislators are less likely to act on an issue when it is prioritized by low-income citizens as compared to affluent citizens” (p. 659). They therefore suggest that “political inequality is infused earlier in the policymaking process at the agenda-setting stage” (p. 659). Another important contribution is Rigby and Wright (2013) who show that party positions are biased in accordance with the preferences of the high-income citizens while the preferences of the low-income citizens are widely overlooked.

A problem with the kind of data used in the present study is that it includes both salient issues that were central in the Swedish political debate and other issues that might have been more peripheral. As a measurement of whether an issue was on the institutional agenda, I use whether or not an issue was discussed in any parliamentary debate the respective year the question was asked. The protocols from the Swedish Riksdag are available on-line, but the period under study covers more than 7,000 protocols which makes reading them manually a very time consuming task.

One could search for wordings of the policy proposals but this is not without problems. While some proposals have straightforward key words that could be used like ‘joining the EU’, many other proposals are hard to search for. For example, searching for ‘aid’ would provide

results from debates about both foreign aid to developing countries as well as financial aid in the form of welfare benefits.

To get as good estimates as possible without reading all 7,459 documents, supervised machine learning with multi labeling classification was used. A training dataset was prepared with about 10 percent of the material (771 protocols) where it was classified whether the issues were discussed or not. The algorithm worked through the remaining 6,688 protocols. One way of evaluating the labeling of the protocols is to look at the Hamming loss which indicates how many times a protocol is incorrectly labeled on average (it ranges from 0 to 1, and the closer to 0 the better). The labeling resulted in a Hamming loss of 0.011. Based on this I constructed a binary variable indicating whether each specific issue was discussed at least ones in a parliamentary debate during the year the question was asked in the survey. 51 percent of the issues were classified as having been discussed in parliament during the same year as the question was asked.

So, are high-income citizens better at putting their preferred issues on the political agenda? The results shows no clear evidence that the proposals favored by the high-income citizens where discussed more in parliament than the proposals favored by the low-income citizens. The low-income citizens show more support for policy change both when it comes to issues discussed in parliament as well as issues not discussed in parliament. Among the proposals not discussed in parliament the mean support for change among the low-income citizens is .54 versus .47 among the high-income citizens. The respective numbers for the issues discussed in parliament are .55 and .49. A series of regressions where estimated where the binary variable indicating that an issue was discussed in parliament was regressed on the support in the high-, middle- and low-income groups for different time frames. The coefficients from these regressions are presented in Table [2](#). No matter if the time span between the measures of public opinion and discussion in parliament is shorter (one year) or longer (ten years), the impact of support in the three income groups on discussion in parliament is indistinguishable from zero. Hence, high income groups do not appear to be better at

putting their preferred proposals on the parliamentary agenda.

Appendix section [D](#) provides further analyses related to discussion in parliament where I shows that a) the pattern is the same when looking at the full variation in the discussion variable, b) the effect of support in the different income groups on policy change is not interacted with the level of discussion in parliament, and c) politicians are of course much more responsive to the issues that where on the political agenda compared to those who were not.

Do the low-income citizens prefer more costly policy proposals?

A second potential explanation is that the low-income citizens demand more costly changes while the high-income citizens are more supportive of symbolic issues that are not associated with any large economic costs. In other words, it might be “cheaper” to satisfy the high-income citizens than the low-income citizens. Research has suggested that voters might care more about symbolic policy reforms than concrete reforms that balance costs and benefits (cf. [Mendelberg 2018](#); [Achen and Bartels 2017](#)). While we know that low-income citizens support more government spending and redistribution ([Erikson 2015](#)), there is no strong evidence from previous research that some income groups should prefer symbolic reforms to a larger extent than others.

To evaluate the influence of symbolic versus costly policies, all policy issues were hand coded as either cost neutral, as costly for the state (such as more vacation days or increased welfare benefits) or as economic benefits for the state (such as reducing foreign aid). When the choice is unclear the decision is based on what the immediate consequence would be for the state budget. It turns out that the low-income citizens are more supportive of policy change than high-income citizens for both costly and neutral issues but also issues that would benefit the state budget. The difference is largest when it comes to costly proposals (58 percent support among the low-income citizens compared to 51 percent support among the high-income citizens) and neutral proposals (55 percent versus 47) and somewhat smaller

when it comes to benefits (55 percent versus 50).

Table 3 shows that the bias in responsiveness cannot be explained with reference to implementation of cost neutral policies favored by the high-income citizens. The table shows the relationship between support in the three different income percentiles and policy change for proposals that were either classified as costly, neutral or beneficial. To save space I only show these coefficients for four and eight year windows. The responsiveness to the income groups are quite small when it comes to cost neutral issues and costly proposals. Only the influence of the 90th percentile on neutral proposals in an eight year perspective reaches conventional levels of statistical significance. In particular the politicians seem to implement a large share of issues that would benefit the state budget and that are at the same time largely supported by the high-income citizens. All groups appear to have a significant influence on policy changes for economically beneficial proposals, but the influence of the high-income citizens is larger than that of the low-income citizens. It should also be mentioned that the level of policy change for the costly proposals are about 18 percent in a four year perspective, while it is 8 percent for the neutral and 37 percent for the economically beneficial.

Table 3: Responsiveness for costly, neutral or beneficial for the state budget

Window (years)	Costly Proposals		Neutral Proposals		Beneficial Proposals	
	4	8	4	8	4	8
10th percentile	-0.012 (0.02)	-0.038 (0.03)	-0.003 (0.01)	0.006 (0.01)	0.070* (0.02)	0.063 (0.03)
50th percentile	-0.003 (0.02)	-0.020 (0.03)	0.002 (0.01)	0.015 (0.01)	0.083* (0.02)	0.076* (0.03)
90th percentile	0.009 (0.02)	0.005 (0.03)	0.008 (0.01)	0.023* (0.01)	0.083* (0.02)	0.080* (0.03)

Notes: * Denote statistical significance at the 5% level. Heteroscedastic-consistent standard errors clustered at the policy proposal level in parentheses .

Does the status quo bias work to the advantage of the high-income citizens?

So what can explain that the preferences of the low-income citizens are not as well reflected in implemented policies as the preferences of the high-income citizens? I have already mentioned two tendencies in the data that should now be examined further; a) the fact that there is a strong status quo bias and b) the fact that the low-income citizens want to see higher levels of policy change. Status quo bias is a re-occurring pattern in previous studies on policy responsiveness in the U.S. (Gilens 2012; Enns et al. 2014). Policy changes are obviously hard to enact in a parliamentary system as the Swedish as well. The proportional voting system facilitates the representation of many parties in parliament and thus majority governments are rare. Coalition building are almost always necessary and few parties have the ability to make reality of their party programs without compromises to other parties. This means that in general, the most likely outcome for a policy proposal is that it will not lead to policy change. When combining this insight with the fact that high-income citizens are more satisfied with the current state of affairs, while low-income citizens want to see more policy change, we see why responsiveness is biased towards the preferences of the advantaged. Let us now look at this in more detail.

Support for policy changes is higher among the low-income citizens than among the high-income citizens. At the 10th income percentile the mean level of support for policy change is 54 percent, while it is 48 percent at the 90th percentile. Looking at the sample as a whole, the average support is 51 percent.

Figure 2: Policy support among income groups for proposals that where implemented or not implemented.

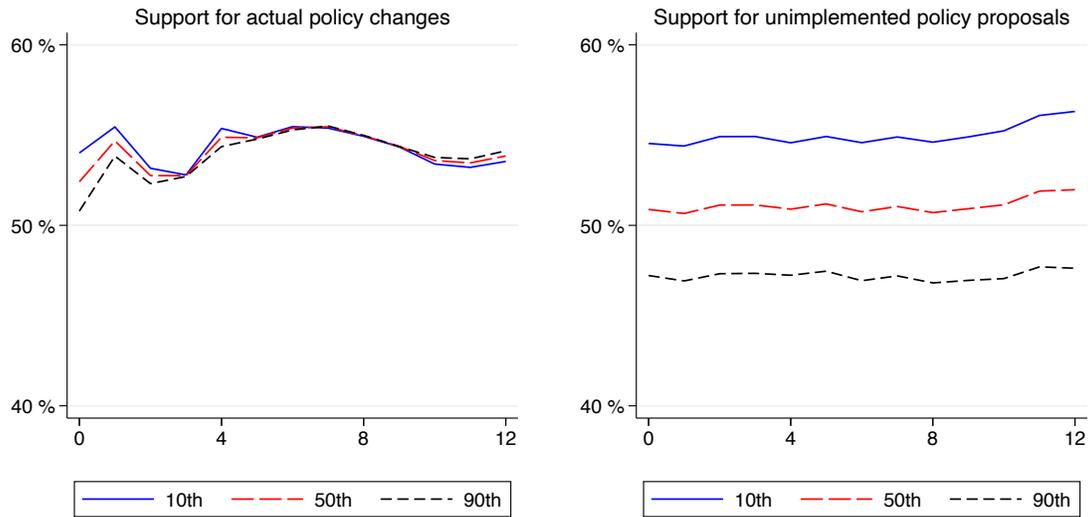
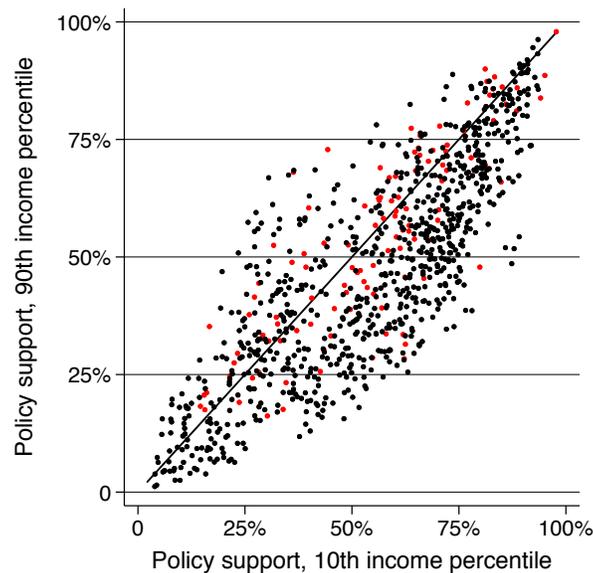


Figure 3: Policy support among income groups for proposals that where implemented or not implemented.



The illustrations in Figure 2 shows that the level of support for policy changes among different income groups divided on policies that were implemented (left) as opposed to not implemented (right). As it turns out, there is not much difference in the popularity of the implemented policies between different income groups. The few policies that are immediately implemented, or implemented the next year after the question was asked, were even more

popular among the low-income citizens, The big difference lies in the fact that there are many more policy proposals that the low-income citizens would like to see implemented that never were realized. There is an 8 percentage point difference in support for the not implemented proposals when comparing the low- and high-income citizens. Hence, the biases that is found in responsiveness can to a large extent be explained with reference to the fact that the low-income citizens preferences are not turned into policies rather than that the policies that are implemented are being biased towards the advantaged. Hence, the status quo bias in the system works to the disadvantage of the low income citizens who want to see more change.

While status quo bias might seem as a technical and rather unpolitical tendency, it can also be interpreted in a more political way; the high-income citizens might have more ‘negative power’ that makes it possible for them to stop policy proposals that they do not want to see implemented. Distinguishing between ‘negative power’ and general status quo bias is of course hard and beyond the scope of this paper. However, we can get a more nuanced picture of the situation by looking closer at the proposals where there was more than a ten percent difference in support between the low- and high income citizens. For the proposals where the relative support was more than 10 percent points higher among low-income citizens as opposed to the high-income citizens, they were implemented in only eight percent of the cases four years later. When it comes to the proposals where the high-income citizens support was more than 10 percentage points the implementation rate was 20 percent. Hence, the rich appear better at ‘stopping’ what the poor wants than vice versa.

Figure 3 shows the relationship between policy support among the 10th and the 90th percentile. In this graph, red dots represent policies that were implemented during the respective government term (from one election to the next) the question was asked and black dots represent policies that were not implemented. Above the diagonal line we find policies that were more popular among the high-income citizens than among the low-income citizens, whereas below the diagonal line there are policies that were more popular among

low-income citizens than among high-income citizens. The larger amount of red dots above the diagonal line indicate that policy proposals were more likely to be implemented when policies were more popular among the high-income citizens than among the low-income citizens. Among proposals that were more popular among the high-income citizens than the low-income citizens, 20 percent was implemented, whereas the corresponding amount was 9 percent for policies that were more popular among the low-income citizens than among the high-income citizens.

Conclusions

Previous studies have shown that in the US, the implemented policies are biased in accordance with the preferences of the high-income citizens. This paper provides further evidence that the similar kind of bias can appear in more egalitarian welfare states as well. Since similar patterns of biased responsiveness is found in countries such as the US, Germany, the Netherlands and Sweden, it does not seem reasonable to explain it only with reference to the level of economic inequality or the strong ties that can be found between the politicians and the wealthy.

However, research has focused much less on trying to *explain* biased responsiveness. This paper contributes to the discussion by evaluating three potential explanations; (a) that the low-income citizens do not manage to put their preferred policies on the institutional agenda, (b) that they demand costly policy changes as opposed to the high-income citizens who might favor more symbolic policy reforms and (c) that the status quo bias is working to the advantage of the high-income citizens. The paper does not show any support for the first two explanations. However, it does confirm that the status quo bias is working to the advantage of the high-income citizens. Among the proposals that did not get implemented, there was a larger share of proposals favored by the low-income citizens.

Further research should dig deeper into why this is the case, despite that the policies the low-income citizens favor are on the political agenda or that the characteristics of the

policies they prefer are not markedly different. Still, what the low-income citizens want does not get implemented to the same extent as what the other income groups want.

A key factor worth digging into is the role of descriptive representation (Carnes 2013). The class bias among the political representatives might imply that they carry preferences that are more in line with the high-income citizens preferences already to begin with. Elsewhere I have shown that high educated representatives in the Swedish parliament are better at representing high educated citizens than low educated representatives are at representing low educated citizens (Persson 2020). This tendency might further drive biases in responsiveness. Furthermore, it could be that case that even though the low income citizens preferences are not less well articulated, their preferences might still be misperceived by the political representatives (Pereira 2019). Having said that, it is troublesome for the legitimacy of democracies that what is now a considerably number of studies find that responsiveness is biased towards the preferences of the high-income citizens while low-income citizens preferences are not reflected in policies to the same extent. At present we know very little about the direct consequences of biases in responsiveness. There is a need to study whether this, for example, plays a role in driving political distrust and the success of anti-establishment parties.

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On-line Appendix—Not Intended for Publication

A Extended descriptive information about the data

The opinion data comes from the Swedish National Election Studies (SNES) and the Society, Opinion and Media (SOM) institute. The SNES started out in 1956 and has since then been carried out at every parliamentary election, mainly as face-to-face surveys (see [Oscarsson and Holmberg \(2013\)](#) for more information on the SNES). I use the 17 surveys covering the parliamentary elections from 1956 to 2010.

The SOM survey is an annual postal survey that started in 1986 and I use all surveys up until 2013 (28 surveys in total). The SNES is carried out by the official Swedish statistics bureau “Statistics Sweden” in collaboration with the University of Gothenburg while the SOM survey is carried out by the SOM institute at the University of Gothenburg.

For more information about the surveys see their respective websites: valforskning.pol.gu.se and som.gu.se.

The fact that the SOM survey is added in the 1980s and that the surveys ask more and more questions about policy proposals over time results in a non-normal distribution of data over the covered years, see Figure [A1](#). This implies that the later years have higher weight in our analyses. When it comes to the main results one should keep in mind that they have a bias towards the later period.

I examined all the old data-files searching for questions on policy proposals at the national level. Too vague and too broad questions were excluded, since for those it was not possible to provide clear answers as to whether they were implemented. After excluding such questions, 260 survey questions remained that are measuring opinions on specific policy proposals. Some of these questions were only asked once while others were asked numerous times. In total this brings us 957 unique measures of public opinion on policy proposals in different years. For each of these variables I calculated the amount of support among the public as a whole and in different subgroups (i.e. the proportion who said that they supported the proposal).

An important issue is whether this collection of policy proposals represent a random

sample of the total population of issues. This is hard to say since there is no clear definition of the true population of issues (Burstein 2006). For example, should it cover proposals that are “on the agenda” in the public, in the media or among political actors? And how should these agendas be defined? These are important questions but they are out of scope for this paper. For the present study I rely on the principal investigators judgment of which policy proposals that were relevant to ask about at different times.

When a similar question was asked in both the SOM and the SNES during the same year I used the item which had the question wording and response options most similar to those used in other years when the question was asked.

The questions cover a large array of issue areas where the largest are “Economy/Labor market/Business issues”, “Energy/Environment” and “Foreign policy/Defense policy”. Summary statistics of the policy issue areas are presented in table A1.

For each of these policy proposals it was evaluated to what extent they were implemented the same year as the question was asked or whether it was implemented at each succeeding year until 2014.

An issue when coding implementation is whether one should focus on decisions or actual implementation. I have followed this guideline: If the question explicitly is about whether a decision should be made, I have focused on the decision when making the coding. If the question explicitly asks about implementation, I have focused on the implementation when making the coding. For most cases, focusing on one or the other does not make any difference, but in some cases it does. One example is the question about whether to close down nuclear power plants. A decision to do that was taken but it is not yet implemented. In such cases I have let the nature of the survey question decide whether I should focus on decision or implementation.

About 31 percent of the questions ask about relative changes such as changes of taxes, etc, but the majority of questions concern dichotomous outcomes of, for example, implementation of specific laws. I use both types of questions. Since I aim to measure attitudes towards

policy *change* I have switched the values of variables for questions concerning support for status quo policies. Hence, all opinion variables indicate support for policy change and the implementation variables indicate if policies actually were changed.

One research assistant was responsible for working with the opinion data and another was responsible for the implementation data. They provided raw data to us that I carefully evaluated. In order to test inter-coder reliability I asked a second research assistant to code a random subset of 25 percent of the questions. For 78 percent of the questions the answers to the binary answers were identical. For half of the questions with divergent answers, most were only partially different and for the other half the answers were completely different. Discrepancies mostly occurred because concepts were defined in different ways or that the assistants had turned to different sources. For those questions I chose the most reasonable definition and the most credible source for the final data file. Figure [A2](#) illustrate the percentages of implemented policies by the level of policy support.

Figure A1: The number of policy proposals asked about in the surveys by year

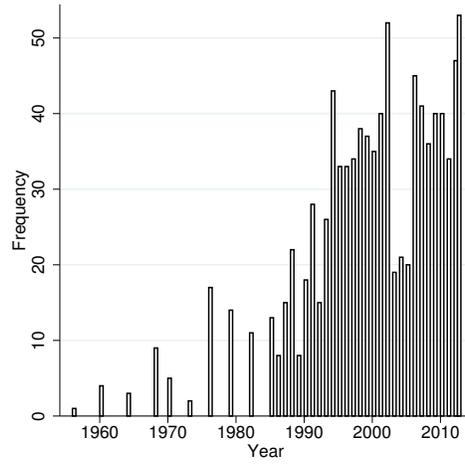


Figure A2: Percent implemented and non-implemented policy proposals by public support

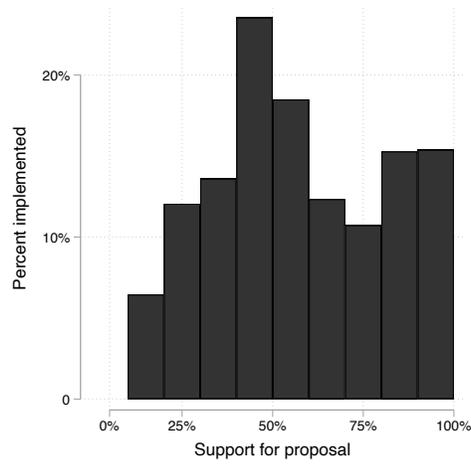


Table A1: Descriptive statistics

Area	Frequency	Percent
Economy/Labor market/Business issues	117	12
Taxes	77	8
Public sector	68	7
Social policy/Family policy	54	6
Education	10	1
Energy/Environment	134	14
Law and enforcement	28	3
Democracy/Bureaucracy	89	9
Religion/Integration/Discrimination	62	6
Media/Internet	68	7
Foreign policy/Defense policy	133	14
EU	63	7
Ethical issues	54	6
Total	957	100

B A brief note on predicting policy support in income groups

Since income is measured with inconsistent categories in the different surveys I follow the methodology employed by Gilens (2005, 2012). The original income variables were re-scored and replaced with the percentile midpoint of their income category. These scores were used as independent variables in logit models with policy preferences as dependent variables. Post-estimation commands were used to calculate the predicted levels of support at the 10th, 50th and 90th percentile. These predicted levels serve as the levels of imputed policy support among the different income groups.

This approach departs somewhat from Gilens approach since I do not include a quadratic term as Gilens does to allow for non-linearity. The reason to this is that levels of support in the different income groups is essentially linear in the majority of the cases. As a robustness check I ran the models with raw levels of support in the income categories that happened to cover the top 10 income percent, the bottom 10 percent and the midpoint. These analyses are presented in table A3 and show results very similar to those presented in the main paper drawing on the predicted levels.

An alternative would be to compare the policy support among the lowest and highest income category, irrespective of the categorization made in the specific survey. When using that approach, the result are nearly identical. The correlation between the level of support in the top and bottom categories in the raw income variables and the imputed variables for the 10th and 90th percentile is above .9.

C Further analyses

The top panel of Figure [A3](#) illustrates the frequency of policy changes during the same term as questions were asked in relation to the amount of public support. 54 percent of the proposals were favored by a majority of the respondents who expressed a preference. Overall the level of policy changes is quite low; 13 percent of the proposed changes were implemented during the respective term.¹

But it is not only the level of policy change that is low. Most importantly, there is no clear pattern showing that higher levels of public support leads to higher levels of policy change. However, the bottom panel of figure [A3](#) shows that as time goes by a larger share of policy changes are enacted. While the most unpopular policies (supported by 0 to 25 percent) have a lower probability of getting adopted, at least 20 percent of the more popular policy proposals are adopted after eight years.

¹This is considerably lower than in Gilens' data from the U.S. which showed a policy change level of 32 percent. But judging from these figures, it is not possible to say whether this is due to different kinds of questions being asked in the surveys in the two countries — Swedish survey researchers might have included more questions about proposals that are unlikely to be implemented — or if it truly reflects a weaker link between opinion and policy in Sweden than in the US. To better understand this I compared the dataset of the Swedish questions to Gilens dataset from the US. I marked all questions in the Swedish dataset for which a similar corresponding question was asked in the US. I found 29 such issues, many of these asked in several years resulting in 231 issue-year observations. After having removed the issues that appear to be concerned with the Swedish political debate that has no counterpart among the issues asked in America, I found that 30 percent of these were implemented. A share that is close to what Gilens reports from the US.

Figure A3: Frequency of implemented and non-implemented policy proposals by public support (top), the relationship between general public support and policy change by different time frames (bottom)

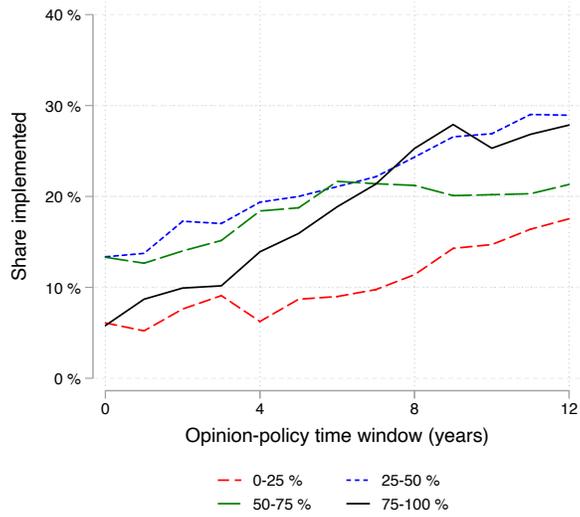
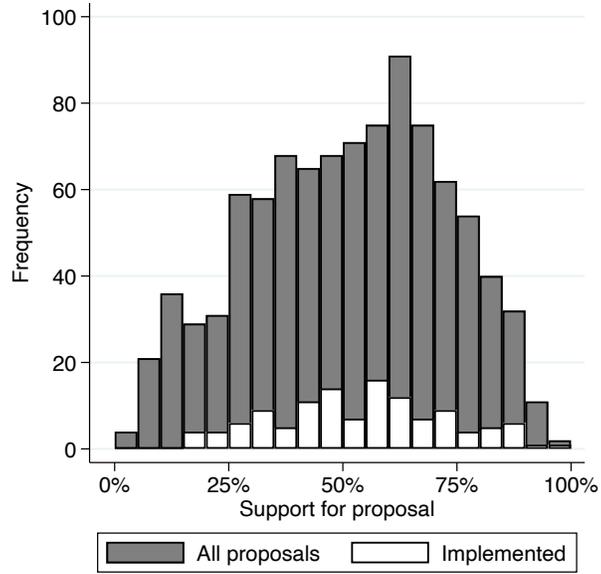


Table A2: The relationship between opinions and policies, multivariate analyses

Window (years)	1	2	3	4	5	6	7	8	9	10
10th percentile	-0.019 (0.07)	-0.072 (0.08)	-0.071 (0.09)	0.015 (0.12)	-0.038 (0.12)	0.041 (0.13)	0.037 (0.16)	0.090 (0.17)	-0.067 (0.18)	-0.092 (0.19)
50th percentile	-0.016 (0.14)	0.066 (0.15)	0.050 (0.18)	-0.111 (0.23)	-0.028 (0.24)	-0.191 (0.26)	-0.196 (0.30)	-0.312 (0.33)	-0.013 (0.36)	0.021 (0.37)
90th percentile	0.045 (0.07)	0.011 (0.08)	0.027 (0.09)	0.111 (0.12)	0.080 (0.12)	0.171 (0.13)	0.180 (0.16)	0.246 (0.17)	0.097 (0.18)	0.083 (0.19)

Notes: * denote statistical significance at the 5% level. Heteroscedastic-consistent standard errors clustered at the policy proposal level in parentheses. Entries are from multivariate regressions.

Table A3: The relationship between opinions and policies, raw income categories

Window (years)	1	2	3	4	5	6	7	8	9	10
10th percentile	0.003 (0.00)	-0.001 (0.00)	-0.002 (0.00)	0.005 (0.01)	0.002 (0.01)	0.006 (0.01)	0.006 (0.01)	0.007 (0.01)	0.004 (0.01)	-0.001 (0.01)
50th percentile	0.007 (0.00)	0.003 (0.00)	0.003 (0.00)	0.010 (0.01)	0.010 (0.01)	0.013* (0.01)	0.012* (0.01)	0.013 (0.01)	0.010 (0.01)	0.007 (0.01)
90th percentile	0.015* (0.00)	0.015* (0.00)	0.016* (0.00)	0.022* (0.01)	0.024* (0.01)	0.032* (0.01)	0.034* (0.01)	0.037* (0.01)	0.037* (0.01)	0.033* (0.01)

Notes: * denote statistical significance at the 5% level. Heteroscedastic-consistent standard errors clustered at the policy proposal level in parentheses. Entries are from bivariate regressions.

While previous studies have focused on biased responsiveness towards different income groups, our data also contains information on support for policies among other relevant groups. Figure [A4](#) to [A6](#) show the share of implemented policies by different education groups, age groups and gender. First, figure [A4](#) shows that high educated have got their wishes fulfilled more than the low educated when comparing policies that received large support (more than 75 percent). However, when looking at policies with moderate support (over 50 percent), the difference in responsiveness to education groups is small. Second, a similar pattern can be seen when comparing age groups. Differences are small when comparing policies supported by at least a majority. But when looking at the most popular policies within age group it is evident that older persons received more responsiveness than the middle aged and the young. Third, looking at gender there is a sizeable gap in the responsiveness given to men compared to women. This is the case when looking at the proposals supported by a majority, but even more so when considering the proposals that have the strongest support. After 8 years there is about a 10 percent change; men got what they wanted to a higher degree than women.

Figure A4: Policy support by gender and policy change by different time frames

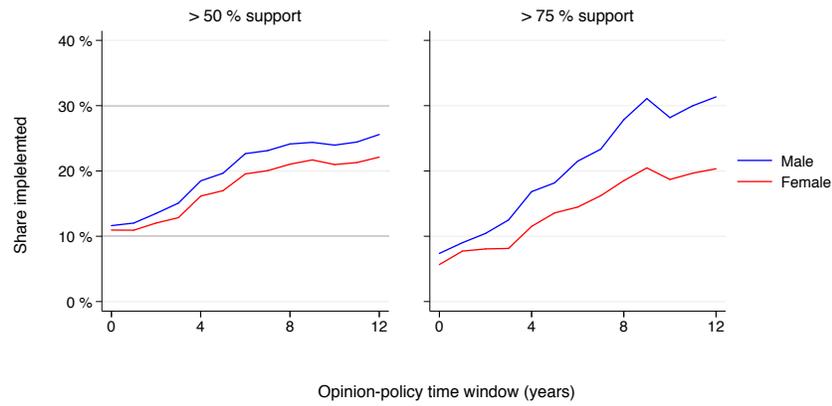


Figure A5: Policy support by age groups and policy change by different time frames.

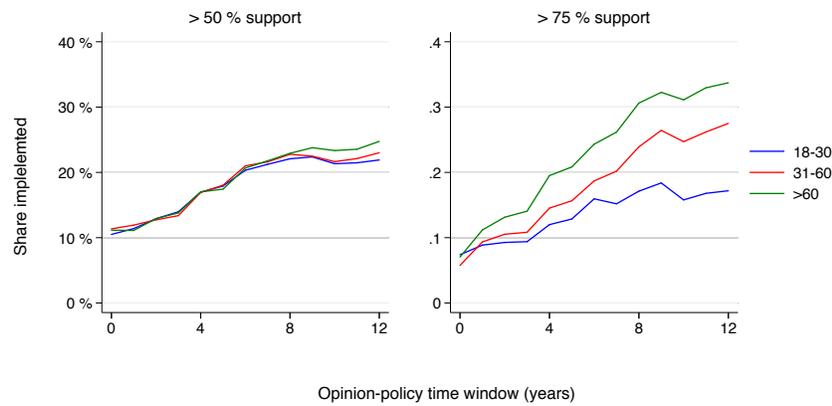
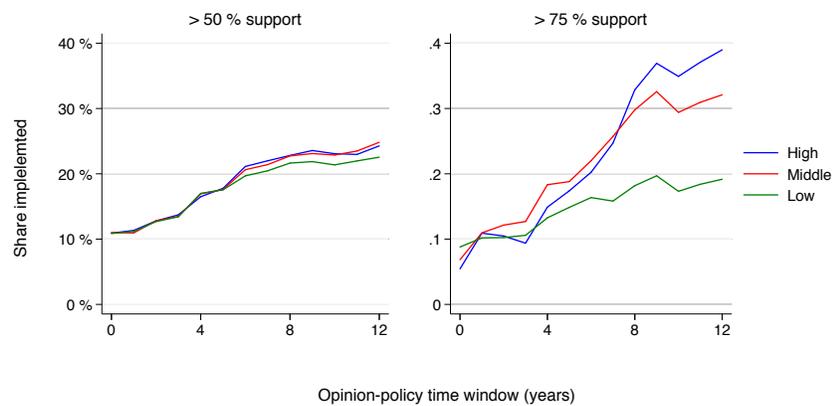


Figure A6: Policy support among different education groups during different governments.



D Further analyses on discussion in parliament

The analyses in the main paper showed that there is not strong difference between how much proposals favored by different income groups are discussed in parliament. The pattern is the same when looking at the full variation in the discussion variable. I test if the effect of support in the different income groups on policy change is interacted with the level of discussion in parliament. A series of regressions were estimated where both the dichotomous and the binary discussion variable was interacted with support in the 90th and the 10th income percentile respectively. Again, regressions were estimated for different implementation windows ranging from 0 to 12 years. Only 2 of these these 52 interaction coefficients reached conventional levels of statistical significance ($p < .05$). In figure [A7](#) the share of implemented proposals from the raw data is illustrated.

As shown in Figure [A8](#), the politicians are of course much more responsive to the issues that were on the political agenda compared to those that were not. Looking specifically on the proposals for which support was particularly strong (>75 support), the differences in responsiveness to the different income groups are larger for the issues that were discussed in parliament. These differences grow over time. After eight years a substantial amount of the policies strongly favored by the low-income citizens that were on the agenda have been implemented (about 30 percent). For the richest tenth percentile the corresponding share is even larger; about 45 percent. So while the issues that were popular among the low-income citizens were discussed in parliament to a large extent as well, politicians appear to be more responsive to issues where there is a large support among the wealthy.²

²A regression approach shows consistent results. When using a binary variable indicating that support is stronger than 75 percent among the income groups, the differences between the effects of the 10th and the 90th percentiles on implementation are statically significant when the time frame window is larger than six years, but otherwise not.

Figure A7: Policy support by income and policy change by discussion in parliament

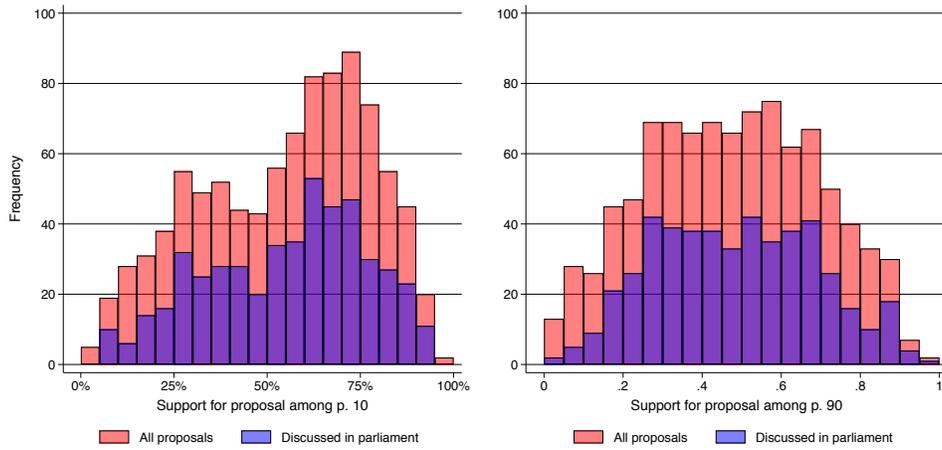


Figure A8: Policy support by income and policy change by discussion in parliament

