Incentives dominate selection – Chamber-changing legislators are driven by electoral rules and voter preferences

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ABSTRACT

The role of electoral incentives vs. selection is ideally analyzed in a setting where individual legislators are selected to decide on policies under different electoral rules and where voter preferences on policies can be precisely measured. This is the first paper to look at such a situation. The institutional setting of Switzerland allows us to observe the behavior of legislators who change from a proportionally-elected chamber to a majority-elected chamber of parliament with their electorate being the same in both chambers. Voter preferences are revealed in referenda. We identify behavioral changes of legislators who are chamber-changers in comparison to other legislators due to the respective electoral rules along three dimensions, all measured at the level of individual legislators: representation of revealed voter preferences for policies, party loyalty, and interest group affiliations. The evidence suggests that electoral incentives explain the behavioral response of chamber-changers towards voter preferences to such an extent that there remains no relevant role for selection. After having changed from a proportionally-elected chamber to a majority-elected chamber, chamber-changers cater more intensely for the preferences of the voter majority (including the median voter), become less loyal towards their party and adapt their lobby group affiliations towards more district-oriented interests.

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1. Introduction

One of the great questions of democratic governance is how to gear legislators to cater for voters’ preferences. In economics, the debate focuses on the role of incentives for legislators vs. selection of legislators (e.g. Persson and Tabellini 2000; Besley 2005; Hillman 2009). In political science, a closely related debate revolves around whether legislators are responsive and connected to voters’ preferences or whether they are ideologically stubborn, i.e., whether the “electoral connection

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theory” is right (e.g. Stratmann 2000; Crespin 2010) or wrong (e.g. Poole and Daniels 1985; Grofman et al., 1995; Hix et al., 2007).  

The “incentives view” broadly suggests that legislators are rather indifferent with respect to the content of their policies but they are incentivized by reelection constraints (e.g. Downs 1957; Persson and Tabellini 2000; Mueller 2003). The “selection view” tends to posit that legislators aim at policy outcomes in accordance with their ideology and voters select politicians whose ideology or political preferences fit their own (e.g. Alesina 1988; Osborne and Slivinski 1995; Besley and Coate 1997; Braendle and Stutzer, 2016).  

In order to understand politicians’ behavior and design better institutions, it is indispensable to empirically assess the relevance of the incentives vs. selection view. For doing so, an ideal research environment should exhibit the following three characteristics: (1) There should be reliable and independent indicators for the individual behavior of legislators and the preferences of their voters with respect to identical policy issues, i.e., the difference between the indicators should reveal whether what legislators do is what voters want. (2) The behavior of the same individual legislators should be observed in different but clearly identifiable situations with different incentives. (3) These situations should not differ with respect to other aspects than incentives.  

The literature has seen diverse attempts to investigate the effect of incentives or selection on the behavior of legislators and to explain subsequent policy decisions. Well known are studies that look at the effect of the last term in office (e.g. Besley and Larcinese 2011; Geys and Mause 2016), electoral margins and competition (e.g. Lee et al., 2004; Henderson and Brooks 2016; Butler et al., 2017), changes in voters’ ideology, e.g., due to redistricting (e.g. Glazer and Robbins 1985; Stratmann 2000; Crespin 2010; Jennes and Persyn 2015) or differences regarding electoral rules and institutions (e.g. Funk and Gathmann 2013; Frank and Stadelmann 2021). Our study leverages differences in electoral rules while also following a promising strand of literature that seeks to discern incentives and selection by investigating the behavior of legislators who changed from one set of incentives to another set by changing from one chamber of parliament to another with a different electoral rule (e.g. Poole and Daniels 1985; Grofman et al., 1995; Miler 2016). However, changing the parliamentary chamber usually goes along with changes in the geographical constituency. Thus, chamber-changers are confronted with a change in the electorate. Moreover, all the respective contributions so far lack a direct measure for the preferences of the citizens to analyze the congruence of legislators and citizens, thereby raising questions related to substantive vs. descriptive representation (e.g. Hessami and Lopes da Fonseca 2020 for a recent review of female political representation). On the other hand, the distinct literature on congruence (e.g., Ansolabehere et al., 2001; Blais and Bodet 2006; Golder and Stramski 2010; Golder and Ferland 2018; Stadelmann et al., 2019) does not explicitly separate incentive effects from selection. Our paper complements both literatures.  

In particular, we contribute to the debate on the role of incentives vs. selection (or the validity of electoral connection theory) by looking at chamber-changers. We investigate the behavior of members of the Swiss lower house of Parliament who move to the upper house. Lower house members are elected in a system of proportional representation while upper house members face majority elections. The mandate of proportionally-elected lower house members is to cater for the preferences of a specific subsample of their electorate, while majority-elected upper house members have incentives to cater for the median voter (see the seminal works by Duverger 1954; Lipphart, 1994; Cox 1990; Powell 2000).  

Our empirical setting allows us to identify legislators' behavioral changes relative to their voters’ revealed preferences due to changes in electoral incentives.  

(1) To measure voters’ preferences, we draw on a distinctive feature of the Swiss political system, namely direct-democratic decisions. We compute political congruence between legislators’ decisions and voters’ preferences on the subset of parliamentary final passage votes for which there are identically worded referendum decisions.  

(2) We observe the same legislators under two different incentives implied by the electoral systems. We assure that the observed changes in congruence between legislators and constituency reflect legislator-specific responsiveness by employing legislator-fixed-effects. That is, we compare legislator-voter congruence of chamber-changers to legislator-voter congruence of legislators who do not change chambers.  

(3) While the electoral incentives differ between houses, the geographical boundaries of the constituencies in which members of the two houses are elected, are identical, i.e., there is no uncertainty regarding electoral incentives due to a changing composition of the electorate.  

Our results indicate that the chamber-changers behavioral responses to voters’ preferences are in line with their changing electoral incentives. Before they move to the upper house, chamber-changers vote as if they were ideologically spread over the political spectrum, as suggested by the theory on proportional representation. They are not distinguishable from

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1 Evidently, incentives and selection may both matter and the selection may also imply that voters elect politicians who have certain characteristics that make it credible that they will pursue specific policies. More generally, this debate is broadly related to the delegate vs. trustee behavioral dichotomy which is a classical theme in political representation (e.g. Pitkin 1967).  

2 Up to today, the Downsian view of electoral competition and variants thereof have remained the backbone for numerous models of politician behavior (e.g. Besley and Case, 2005; Congleton, 2003; Lee et al. 2004; Grofman, 2004; Padovano, 2013; Portmann and Stadelmann, 2017).  

3 Analyzing effects of electoral rules on legislators’ incentives and policy outcomes has gained interest in the economic literature in recent years (e.g. Maaser and Stratmann 2018 show that German politicians self-select into different types of legislative committees where some have a more regional focus depending on incentives induced by electoral rules).
other members of the lower house with respect to congruence with the electorate. They differ clearly from the members of the upper house as their congruence levels are substantially lower. However, once they are elected to the upper house (and only then), their legislative decisions correspond more closely to constituency median preferences, such that they are not anymore statistically different to other members of the upper house. The quantitative effect of the changes in electoral incentives is precisely estimated, sizable and corresponds to a between 6.9 to 7.4 percentage points change in congruence levels. Empirically, we do not find support for any relevant role of political selection for congruence of legislators with the preferences of the electorate. This is consistent with Hessami (2018), who provides evidence that incentives dominate selection regarding specific policy choices and behavior of German mayors. We further complement the literature with the finding that chamber-changers become more independent from their parties and adapt their lobby group affiliations towards more district-oriented interests (which is consistent with Gagliarducci et al., 2011 or Funk and Gathmann 2013 among others).

The remainder of the paper is structured as follows: The institutional setting is presented in Section II. Section III introduces our data and explains the identification strategy. Empirical results on legislators’ responsiveness to voters’ preferences when moving from the lower house to the upper house are presented in Section IV. Section V offers a discussion and concludes.

2. Institutional setting

2.1. Federal assembly

Switzerland’s federal constitution from 1848 established a bicameral parliament comprising a lower house, the National Council or “Nationalrat” in German, and an upper house, the Council of States or “Ständerat” in German. The two chambers build on the same 26 geographical constituencies (electoral districts, Cantons), i.e., members of both chambers are elected to represent the same geographical constituencies. Members of both chambers serve for four-year terms and are usually elected on the same dates. The 200 members of the lower house are elected under a proportional electoral system with district magnitude being proportional to the districts’ population. Small cantons are guaranteed at least one representative. The 46 members of the upper house are elected under a two-round majority-plurality system. There are either one or two seats per electoral district for the upper house and voters have either one or two votes, accordingly. Apart from the electoral system, formal election requirements and prerogatives in the two chambers are identical. The candidates for both chambers are typically nominated at meetings of the cantonal party sections.

Both chambers have equal competencies and the same legislative power. All parliamentary affairs are treated by both chambers and all enactments must pass both chambers with majority vote. The Parliamentary Services assign the start of the deliberation process in each chamber based on the current workload of the two chambers, thus in effect randomly. With respect to lower house votes, the period of analysis of our study starts in 1996 when electronic recording of votes started, and it ends with the election in 2015. In the upper house, there has been no electronic voting system until 2014, but since winter 2006 a camera records its sessions (see Stadelmann et al., 2014; Benesch et al., 2018). The camera footage allows the identification of individual voting behavior for the members of the Upper House.

2.2. Referendum decisions

Switzerland exhibits a system of direct democracy with three instruments:

1. The citizen may challenge parliamentary decisions on laws and international contracts in a referendum. After both chambers have decided, citizens can demand a facultative referendum by collecting at least 50’000 signatures (out of approximately 4.9 million registered voters) within 100 days. Any new law or amendment proposed by parliament is rejected, if a majority of voters decides against it.
2. All constitutional amendments by the parliament are automatically subject to a mandatory referendum.
3. By collecting 100,000 signatures citizens may launch a popular initiative on a constitutional amendment drafted by themselves. Legislators cannot change the wording of a popular initiative. Once the necessary signatures are collected, the legislators are required to vote on the proposal prior to the referendum as their vote serves as a parliamentary recommendation to voters (see Stadelmann and Torgler 2013).

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4 Exceptions are the Canton of Jura and since September 26, 2011 the Canton of Neuchâtel where the two members of the Upper House are elected under a proportional system. Omitting these cantons does not affect our results or interpretations.

5 For historical reasons, there are 20 full-cantons and 6 half-cantons (“Vollkantone” and “Halbkantone” in German). The only relevant difference between a full-canton and half-canton is that the former (latter) has two (one) seats in the upper house and counts with a weight of 1 (0.5) for referenda for which a double majority (“Doppeltes Mehr” in German) is required.

6 We include all decisions since the installation of the camera in our dataset. In a small number of cases individual votes cannot be observed due to a too slow movement of the camera during the voting phase (see discussion in the appendix of Stadelmann et al., 2019). Using camera recordings to identify voting behavior of members of the Upper House has aroused media interest (e.g., Eichenberger et al. 2011a, 2011b) and ultimately contributed to the introduction of an electronic voting system in 2014.
Similar to recommendations by parliament, party conventions issue recommendations to voters. All amendments to the constitution, i.e., those initiated by parliament as well as those by citizens, are only accepted if there is a double majority (“Doppeltes Mehr” in German), i.e., if both, a majority of the voters nationwide (“Volksmehr” in German) as well as a majority of the voters of more than half of the cantons agrees (“Ständemehr” in German). There are no quorum requirements such that there are no strategic incentives to abstain (e.g. Hizen 2021). Referenda cover a wide range of issues including economic, health, social, migration, and defense proposals, among others and they have relevant ramifications. All referendum results are available for each canton.

2.3. Interest group affiliations

Swiss legislators must disclose all their affiliations with interest groups such as executive board seats in companies and foundations, committee memberships in public institutions, counselling activities and other activities for lobby groups according to federal law (Art. 11, Parlamentsgesetz). The Swiss Parliamentary Services are required to collect this information and to provide it in an easily and publicly available register online (see Gava et al., 2017; Péclat and Puddu 2017). The register frequently attracts media attention.

To investigate how a change of a legislator from the lower house to the upper house affects her affiliations with interest groups, we count each legislator’s number of interest group affiliations on an annual basis. Following the literature, we group them into sectional (#Sectional) and cause groups (#Cause) (see Stewart 1958; Giger and Klüver 2016; Stadelmann et al., 2016; Barceló 2019). Sectional groups tend to focus on specific segments of society and on special interests (e.g. the energy industry). Cause groups, on the other hand, tend to focus on general beliefs or principles such as public health or human rights (e.g. human rights groups). In addition, we classify interest groups according to whether they promote regional goals (#Regional). In addition to counting the number of interest group affiliations, we look at the composition of legislator’s affiliations, i.e., at the share of different types of interest affiliations (variables denoted with a # prefix, e.g., #Sectional).

3. Data and empirical strategy

3.1. Datasets employed in the analysis

We employ three datasets for our study.

(1) The dataset “lower house members” consists of the universe of legislators and all 156 legislative and constitutional final passage votes in parliament with subsequent popular referendum for the years 1996 to 2015. This corresponds to the 45th to the 49th legislature of the Swiss Federal Assembly comprising 28,308 individual votes of the 547 distinct members of the lower house. 8 32 members of the lower house were elected to the upper house during this period. The dataset includes the 1532 decisions these chamber-changers made while they still served in the lower house.

(2) The dataset “upper house members” comprises 2086 individual final passage votes with subsequent popular referendum. 769 of these votes were cast by former lower house members. Voting data for the upper house is available from Winter 2006 onwards since the introduction of a camera recording the sessions. The distinct datasets “lower house members” and “upper house members” are suitable to study whether chamber-changers are statistically different to other members of the chamber in which they currently serve.

(3) For our central dataset “lower house + former members”, we add the 769 decisions by former lower house members to the dataset “lower house members” that took place after they moved to the upper house. With this dataset, we test whether individual legislators change their behavior when changing from the lower house to the upper house, i.e. whether their congruence levels change after having moved to the other house.

Detailed descriptions and references for all variables employed are presented in Table A1 in the Appendix (Supplementary Material, SM). Descriptive statistics for all datasets and variables are reported in Table A2.

3.2. Measuring congruence between legislators and constituency

Final passage votes take place at the end of a parliamentary session and are proximate to the adoption of actual policies (see Krehbiel 1993). However, parliamentary decisions in Switzerland do not directly materialize in amendments to the law and constitution but they may be subject to binding popular votes. Citizens vote in referendum on proposals which are word-for-word identical to the final passage votes on which legislators voted before. By voting in referendum, citizens reveal their preferences (e.g. Brunner et al., 2011; Hessami 2016).

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7 E.g., Swiss voters and parliament accepted a debt brake in 2001 which served as a template for other European countries (Salvi et al. 2020). Information on other referenda are provided by the Swiss Parliamentary Services on https://www.parlament.ch/de/services/volksabstimmungen.

8 Whereas the theoretical maximum of votes amounts to 31200 (=156 final passages times votes times 200 members), the president of the chambers abstains from voting unless there is a tie vote and legislators may be absent or abstain from voting due to sickness, voyage or other responsibilities, as well as early resignation or death.
We define a binary measure of congruence between legislator $i$ and her constituency in referendum $r$, $Constituency\text{Congruence}_{ir}$. The measure of congruence takes the value 1 if either both the legislator and the median voter (i.e., the voter majority) of the constituency accept or reject the referendum, otherwise congruence is 0. Accordingly, the unit of observation in our study is legislator-referendum specific, i.e., each legislator’s decision is compared to the referendum outcome in her constituency.

Using legislators’ and constituents’ votes on identical proposals has attractive properties especially when compared to other approaches which, for instance, regress ADA or Nominate scores on constituency characteristics as proxies for voter preferences (e.g. Achen 1977; Gerber and Lewis 2004; Powell 2009; Matsusaka 2010, 2018 who discuss issues afflicting such more indirect measures).

For a valid measure of congruence not only the text of the proposals but the decision-making situation must be comparable for legislators and constituents. Swiss legislators and constituents rank the status quo against a new proposal when they decide on final votes in parliament and referenda. Referenda are preceded by a phase of public debate enabling voters to make a comparatively informed decision.\footnote{In contrast, this is often not the case when people are asked in surveys about their opinions on policy topics. Important in distinguishing parliamentary votes and subsequent referenda from surveys is the fact, that in the first case individuals vote only after an intensive public discourse and they know that they do not simply express an opinion but that their informed decision is implemented.} Parliamentary and referendum decisions entail real consequences for policy. Thus, the Swiss setting comes close to an ideal setting for a measure of congruence (see, among others, Frey 1994; Hug and Martin 2012; Giger and Klüver 2016; Salvi et al., 2020). For these reasons the number of scholarly papers relying on final passage votes and referenda has been increasing (see, e.g., Portmann et al., 2012; Brunner et al., 2013; Portmann 2014; Potrafke 2013; Giger and Klüver 2016; Matsusaka 2017; Barceló 2019; Stadelmann et al., 2019).

Fig. 1 shows average congruence levels for legislators from the lower and upper house. Consistent with the theory on electoral systems (e.g. Downs 1957; Cox 1990; Persson and Tabellini 2000; Gagliarducci et al., 2011) we observe that proportionally-elected legislators from the lower house exhibit on average a congruence with median constituency preferences of 64.8% which is 6.1 percentage points lower than the corresponding figure for majority-elected legislators from the upper house (70.9%). The difference in average congruence levels for legislators of the respective houses is statistically significant at the 1% level.

3.3. Empirical strategy

3.3.1. Testing for responsiveness when incentives change

While proportionally-elected legislators have on average lower congruence levels than majority-elected legislators (Fig. 1), we are interested in legislators’ responsiveness to electoral incentives. Thus, we analyze whether individual legislators who are elected from the lower to the upper house change their congruence levels after their election. The dataset

![Fig. 1. Average legislator congruence with constituency in lower and upper house](image-url)
“lower house + former members” contains the voting behavior of all lower house members and the voting behavior of chamber-changers before and after changing from the lower to the upper house.

Employing the dataset “lower house + former members” we estimate the following equation:

\[
(\text{ConstituencyCongruence})_i = \alpha + \beta_1(\text{ChangedChamber})_i + \xi_1 i + \Gamma_i X_i + \epsilon_1 i
\]  

(1)

ChangedChamber takes the value 1 for votes by legislators from the lower house after they have taken seat in the upper house, and 0 otherwise. While chamber-changers move at different points in time to their new mandate in the upper house, we always observe the voting behavior of lower house members and chamber-changers on the same votes prior and after their change.

Most legislators consider the upper house to be the more prestigious chamber in Switzerland and may serve there at a later stage of their career. We control for time-variant legislator characteristics such as time in office, among others in the matrix \(X_i\). Congruence between legislators and constituents is higher for constitutional amendments and lower for facultative referenda. Therefore, we also include referendum type fixed-effects captured in the matrix \(X_i\) in Eq. (1). \(\epsilon\) stands for the error term.

Since we investigate behavioral changes of individuals who we observe in two chambers, we include legislator fixed-effects denoted \(\xi_i\) to hold legislator specific time-invariant characteristics constant. Thus, our empirical strategy relies on legislators changing to the upper house and a control group of legislators who remain in the lower house. While the change is due to an election, only a certain selection of legislators changes to the upper house. We account for this by observing the respective sample of people in two different chambers through our fixed-effects setting. Legislator fixed-effects ensure that the coefficient of interest \(\beta_1\) captures the legislators’ change in congruence due to a change from the lower to the upper house. As a potential interpretation, Eq. (1) corresponds to a type of staggered difference-in-difference estimator where constituency congruence of lower house members serves as a control group. Hence, \(\beta_1\) identifies the effect of a change of chamber on legislator-constituency-congruence if one assumes that future chamber-changers are similar over time in terms of their congruence levels to other members of the lower house prior to their change.

To defend this assumption, it is important to realize that legislators change their mandates at different points in time. We compare legislators who change from the lower house to the upper house to their former peers in the lower house for the same legislative proposals holding all time-invariant characteristics constant with the fixed-effects. Figure A1 in the Appendix (SM) shows that chamber-changers have similar congruence levels over time as other lower house members prior to their change, i.e. we do not observe that chamber-changers are a special selection in terms of prior congruence with voters. There is also no sign of any potential anticipation effects, i.e. chamber-chamber do not have higher levels of congruence in the years prior to election to the upper house. If there were anticipation effects, Eq. (1) would underestimate the effect of incentives as future chamber-changers would then increase their congruence levels prior to election to the upper house, i.e. \(\beta_1\) would be downward biased. Thus, if anything, we should observe smaller or no effects in our setting if chamber-changers were to adapt their congruence levels prior to being elected to the upper house. Because we can, by logic, observe house changers in the upper house only after they have served in the lower house, and because our period of observation for the upper house begins in 2007, we control for time trends with year fixed effects.

As legislator congruence with constituency is a binary variable, Eq. (1) is formulated in terms of a linear probability model. We opt to present results from a linear probability model for ease of interpretation. Estimating logistic models (see Table A9 in the Appendix, SM) yields qualitatively identical and quantitatively similar results.

Our setting does not only identify behavioral changes of legislators but the above specification distinguishes the “selection view” from the “incentive view”: We expect \(\beta_1 = 0\), if voters select legislators to the upper chamber who have already been median-oriented during their terms in the lower house. If, on the other hand, legislators who change to the upper house react to electoral incentives, we expect \(\beta_1 > 0\).

3.3.2. Testing for differences to other members of the chamber

Of course, even if \(\beta_1 > 0\), selection may still play some role, but electoral incentives matter in that situation. To investigate the role of selection as an explanation for changes in individual responsiveness to voter preferences, we define the binary variable \(\text{IsChamberChanger}\) which takes the value 1 if a legislator will at some point in time move from the lower to the upper house, and 0 otherwise.

We run the following regression for observations from the lower house only (dataset

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10 There is only one legislator over the whole time period from 1996 to 2015 who voluntarily did not present himself for re-election to the upper house but opted to run for the lower house, only. Another legislator successfully ran for the lower house after missing re-election to the Upper House. We removed both legislators from the sample after their term in the upper house. Including them would not change our results.

11 Appendix (SM) Table A7 estimates equation (1) by adding an additional dummy variable that takes the value of 1 for chamber-changers four years prior their election to the upper house. This dummy is statistically insignificant and close to zero suggesting that there are no anticipation effects and chamber-changers are similar in terms of congruence to their peers in the lower house as long as they serve there.

12 We estimate robust standard errors clustered at the legislator level in recognition of the likelihood that observations from the same legislators may not be independent (see Cameron and Miller, 2015). As we observe the universe of politicians and decisions, neither the sampling process of individual legislators is clustered nor is there any cluster assignment mechanism (see Abadie et al. 2017).

13 Similarly, if legislators are ideologically stubborn, i.e., non-responsive, we expect \(\beta_1 = 0\). If, on the other hand, the electoral connection hypothesis is true, we expect \(\beta_1 > 0\), i.e., chamber-changers are responsive and move towards the median voter.

14 \(\text{IsChamberChanger}\) differs from \(\text{ChangedChamber}\) since the latter only takes the value 1 after the move to the upper house took place.
“lower house members”):

\[(ConstituencyCongruence)_{ir} = \alpha_2 + \beta_2(\text{IsChamberChanger})_{ir} + \Gamma_2X_{ir} + \epsilon_{2ir}\]  

(2)

Since IsChamberChanger is a time-invariant characteristic of the legislator, we cannot include legislator fixed-effects. If legislators who move to the upper house constitute a selection of politicians who are more similar to the members of the upper house than average members of the lower house, we should find \(\beta_2 > 0\). In contrast, if chamber-changers serving in the lower house are similar in terms of congruence to other legislators in the lower house, it results that \(\beta_2 = 0\). This would imply that voters did not select them into the upper house due to them having higher congruence levels than their peers in the lower house, and it would represent evidence against the “selection view”. It would imply that there were no relevant anticipation effects.

Analogously to the above, we can compare chamber-changers once they are elected to the upper house to other upper house members. We run the following regression for observations from the upper house only (dataset “upper house members”):

\[(ConstituencyCongruence)_{ir} = \alpha_3 + \beta_3(\text{IsChamberChanger})_{ir} + \Gamma_3X_{ir} + \epsilon_{3ir}\]  

(3)

If chamber-changers do not fully adapt their congruence levels when in the upper house, we should find \(\beta_3 < 0\). If, on the other hand, chamber-changers fully adapt their behavior to the new incentives they face in the upper house and if they behave similar to other upper house members, we expect \(\beta_3 = 0\) which would be consistent with pure “incentive view”. Eq. (3) serves as a test for whether chamber-changers become common members of the upper house once elected, i.e., whether they behave according to the incentives set in the upper house.

To summarize, if we find \(\beta_1 > 0, \beta_2 = 0, \beta_3 = 0\), incentives drive individual legislators’ congruence with their voters’ preferences (“incentive view”). On the other hand, if we find \(\beta_1 = 0, \beta_2 > 0, \beta_3 = 0\), selection would be the driving force for congruence (“selection view”). Then, no individual behavioral changes would be observed (legislators would be “ideologically stubborn”) and elected legislators would behave similarly to upper house members while still in the lower house. Finally, if we find \(\beta_1 > 0, \beta_2 > 0, \beta_3 < 0\), both selection and incentives would matter. Table 1 highlights our hypotheses to help distinguish the “incentives view” from the “selection view”.

### 3.3.3. Party loyalty and interest group affiliations

Our setting allows us to analyze further dimensions regarding the behavior of legislators. As parties issue voting recommendations, we use this information as a measure for party loyalty and define the binary measure of congruence between legislator \(i\) and her party’s voting recommendation in referendum \(r\), \(\text{PartyLoyalty}_{ir}\). This measure takes the value of 1 if both, the legislator and the majority of the party convention simultaneously accept or reject the referendum, and 0 otherwise. Moreover, we employ variables for the number of lobby groups as a dependent variable to analyze if chamber-changers change their number and share of different lobby affiliations.

To analyze whether party loyalty and lobby affiliations of legislators change when they change the chamber, we estimate:

\[(PartyLoyalty)_{ir} = \alpha_4 + \beta_4(\text{ChangedChamber})_{ir} + \xi_4i + \Gamma_4X_{ir} + \epsilon_{4ir}\]  

(4)

\[(Interestgroupmeasure)_{ir} = \alpha_5 + \beta_5(\text{ChangedChamber})_{ir} + \xi_5i + \Gamma_5X_{ir} + \epsilon_{5ir}\]  

(5)

These estimations are in analogy to regression (1) but employ our measures of party loyalty and interest group affiliations as dependent variables.

### 4. Results

#### 4.1. Incentives matter for legislator congruence

**Table 2** presents our main results regarding the effect of a change from the lower to the upper house on congruence of legislators with median constituency preferences (Eq. (1)).

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15 Evidently, by using regressions (2) and (3) with party loyalty and the different interest groups measures as dependent variables, we can also test whether chamber-changers differ from the other members of their current chamber. We perform these tests for party loyalty in Table 6 and for interest groups in Table A11 and A12 in the Appendix (SM).
We introduce our primary variable of interest, ChangedChamber, together with individual fixed-effects and time fixed-effects in specification (1). The results provide support for $\beta_1 > 0$ and suggest that by changing from the lower to the upper house individual legislator congruence increases by approximately 7.3 percentage points. This increase closely corresponds to the difference between the average congruence levels of lower and upper house (as illustrated in Fig. 1). The change in congruence suggests that incentives matter when chamber-changers move from the proportionally-elected to the majority-elected house, which is consistent with the “incentive view” and the electoral connection hypothesis. Given the size of the effect, there is virtually no room for selection as chamber-changers fully converge to the average congruence level in the upper house.

Specifications (2) and (3) provide further support for our interpretation by adding referendum type fixed-effects (2) as well as time-variant MP controls (3) such as TimeInParliament (and the squared term of it), FirstTermInOffice, and FirstTermInOffice. With these specifications we intend to rule out, firstly, a change in the mix of referendum types, and, secondly, any effects of career paths in office (which result, e.g., from experience, incumbency advantages, seniority) as confounders. The effect of the change of the house on legislator congruence remains a statistically robust increase of between 6.9 to 7.4 percentage points. Legislators in the lower house decide at some point in office whether they want to run for a seat in the upper house. To rule out potential subsequent behavioral changes during the legislative period, we run a setting in Table A6 in the Appendix (SM) where we exclude the observations for future chamber-changers for the whole legislative period prior to their change to the upper house. The results are qualitatively and quantitatively similar to Table 2.

4.1.2. Party loyalty and interest group affiliations

In specifications (1) to (3) of Table 3 we turn to party loyalty and analyze the effect of a change in chamber on party loyalty. Whereas official party positions are determined by the national party elite, upper house members may face stronger incentives to cater for district median preferences unless they are “ideologically stubborn”.

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16 The relevance of career paths has been highlighted by Ramos Pastrana (2021) or Pickard (2021).
17 Even when including interest group affiliations (which are a potentially endogenous variable to the change in chamber), the quantitative effects of a change in house remain almost identical.
The results show that legislators who move to the upper house reduce their loyalty to their party by approximately 3.1 percentage points, independently of which control variables we include. This result shows that incentives matter for party loyalty, too, which is in line with the incentive view. A change from the lower to the upper house brings about more independence from the party line.

Table 4 presents results for the effects of a change from the lower to the upper house on the number of interest group affiliations and the composition of interest groups. In general, taking a mandate view of responsiveness, chamber-changers should neither increase nor decrease their lobby affiliations. An exception to that could be regional interest group affiliations of chamber-changers. These groups may have interests that are well-aligned with constituency preferences, which may matter more for majority elected politicians (e.g. Galliarducci et al., 2011; Frank and Stadelmann 2021).

Panel (a) exhibits the effects on the absolute number of affiliations. Specifications (1) to (3) indicate that a change from the lower to the upper house is neither associated with a change in the number of interest group affiliations, nor with affiliations disaggregated for cause groups, sectional groups, and regional interest groups at conventional statistical significance levels for chamber-changers. This evidence can be interpreted as consistent with the “incentive view” of legislator responsiveness, i.e., legislators do not gain more interest group affiliations once they have changed chamber.

With respect to the relative importance of types of interest group affiliations, panel (b) shows that the share of sectional interest group affiliations (%Sectional) and the share of cause interest groups (%Cause) are not affected by a change of legislators from the lower to the upper house at conventional significance levels. In contrast, the change from lower to upper house is accompanied by a statistically significant increase in the share of regional interest group affiliations (%Regional) of 4.6 percentage points. As regional interest groups can be expected to represent regional interests, this is consistent with the evidence presented in Table 2 that chamber-changers are responsive to incentives and more closely correspond to their constituency’s majority preferences after having changed to the upper chamber.

4.2. Comparison within chambers to distinguish selection from incentives

4.2.1. Congruence with constituency

In Table 5 we analyze how legislators who are chamber-changers behave regarding constituency congruence and party loyalty before and after they changed the house compared to other members of the respective house in which they currently serve. In specifications (1) to (3) we restrict the sample to the lower house and in (4) to (6) to the upper house.

Results show that congruence of legislators who move to the upper house is not statistically different to other members of the lower house before they change chamber (specifications 1 and 2), i.e., $\beta_2 = 0$ cannot be rejected at conventional levels of statistical significance. Even when including party fixed-effects (specification 3) chamber-changers are neither statistically
more nor less congruent with their constituents than other legislators of the lower house while having been active in the lower house. This evidence suggests no anticipation effect according to which legislators cater to the median voter in the lower house in order to increase their electoral chances. Moreover, it shows that chamber-changers are not different to other members of the lower house in terms of congruence prior to changing to the upper house (see also Figure A1 in the Appendix, SM).

Specifications (4 and 5) show that (without party control) congruence of chamber-changers tends to be by about 3.7 to 3.8 percentage points lower compared to other members of the upper house. While these differences are statistically only weakly significant in the base estimate without controls (specification 4), they lose statistical significance as soon as controls for time variant variables and referendum types are included (specification 5) and fully evaporate once party affiliation is accounted for in specification (6). There is virtually no difference between chamber-changers and other upper house legislators, i.e. legislators connect to voters and adapt to the new incentives in the upper house. Thus, chamber-changers seem to fully converge to the higher levels of congruence observed in the upper house providing further support for the “incentive view”.

Jointly, $\beta_1 > 0$ (chamber-changers increase congruence after a change), $\beta_2 = 0$ (chamber-changers are not different to lower house members as long as they are in the lower house) and $\beta_3 = 0$ (chamber-changers are not different to upper house members once they are in the upper house) suggest that incentives strongly matter to explain legislator congruence with voters’ preferences. In contrast, the evidence does not point to any relevant selection effect. The evidence for the “incentive view” leaves no room for the “selection view”. Moreover, there is no relevant role for any anticipation effects regarding congruence of chamber-changers while they are still in the lower house.

Fig. 2 reveals that the results of Table 5 even hold when looking at the whole distribution of legislator congruence with their constituency. The left panel shows the distribution of constituency congruence of members of the lower house, the right panel these same for the upper house. Chamber-changers are in light blue while in the respective house, non-chamber changers are in light red.

We observe in Fig. 2 substantial overlaps of the distributions of chamber-changers and other members of the lower house while both are active in the lower house (left panel). It is noteworthy that some legislators who will be elected to the upper house (i.e., chamber-changers) have lower congruence levels with their constituency’s preferences than other lower house members who are not elected to the upper house. Obviously, chamber-changers do not represent a selection of politicians with high congruence, i.e., there is no support for the view that voters specifically elect legislators from the lower to the upper house because of higher congruence prior to being elected. Similarly, the distributions of chamber-changers and other members of the upper house overlap for the period both groups are in the upper house. Thus, chamber-changers adapt to the incentives faced in the upper house.

### 4.2.2. Party loyalty and interest group affiliations

In Table 6 we investigate differences regarding party loyalty between those who move from the lower to the upper house and the remaining members of their current chambers.

The coefficients of IsChamberChanger are statistically significant and range from 1.3 percentage points if party fixed-effects are included (specification 3) to 2.5 percentage points in the other specifications for the lower house. Thus, prospective chamber-changers are more loyal to the party than other members of the lower house. This finding suggests that candidates running for upper house mandates are usually endorsed by their parties.

Results for the effect of the mandate change on party loyalty tend to show that once chamber-changers are in the upper house, they are not statistically different from other members of the upper house regarding party loyalty. Only in specification (5) when excluding party fixed-effects, a marginally statistically significant positive effect of party loyalty shows up. Once controlling for party fixed-effects in specification (6), chamber-changers turn out to be virtually identical to other members of the upper house in terms of party loyalty. All these results are consistent with the view that incentives matter for legislator congruence.

### Table 5

<table>
<thead>
<tr>
<th>Dependent variable</th>
<th>ConstituencyCongruence</th>
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<td>(0.0301)</td>
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<tr>
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<tr>
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</tr>
<tr>
<td>Dataset</td>
<td>lower house members</td>
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</tbody>
</table>

Notes: ***, **, and * indicate a mean significance level of <1%, 1–5%, and 5–10%, respectively. Robust clustered standard error estimates are reported. Linear probability models are estimated. Time-variant controls include the controls indicated in Appendix (SM) Table A2.
Table 6
Party loyalty of chamber-changers while in the lower house and once in the upper house in comparison to other members of the respective houses.

<table>
<thead>
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<td>0.0248***</td>
<td>0.0130**</td>
<td>0.0279</td>
<td>0.0494*</td>
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<td>(0.0059)</td>
<td>(0.0059)</td>
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<td>yes</td>
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<td>yes</td>
<td>yes</td>
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<tr>
<td>Referendum type FEs</td>
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<td>no</td>
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<tr>
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<td>yes</td>
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Notes: ***, **, and * indicate a mean significance level of <1%, 1–5%, and 5–10%, respectively. Robust clustered standard error estimates are reported. Linear probability models are estimated. Time-variant controls include the controls indicated in Appendix (SM) Table A2.

When analyzing lobby affiliations for chamber-changers while they are still in the lower house, we essentially find no systematic differences between them and other members of the lower house. Similarly, chamber-changers are not statistically different to other members of the upper house once they serve there. For the sake of brevity, we present these results in the Appendix (SM) in Table A11 and A12.

4.3. Robustness checks

We performed a large battery of robustness checks and we briefly discuss a selection of them.

In Table A3, A4, and A5 in the Appendix (SM), we investigate whether restricting the sample to legislators for whom a minimum of 10 or 20 votes are available per chamber, affects the size of the mandate change effect on constituency congruence. We also present results based on a restricted sample from the year 2000 onwards because for a few chamber-changers there is a time gap of several years between the last vote in the lower house and the first observed vote in the upper house. All our main results are robust and our quantitative and qualitative interpretations need not be qualified.
Table A6 and A7 suggest that there are no relevant anticipation effects of chamber changers in terms of their congruence. Table A8 explores a subsample of legislators who have been in parliament for at least one full legislative period. Focusing on these more experienced legislators and analyzing chamber-changers in that sample, we again observe an increase in congruence once politicians change from the lower to the upper house.

In Table A9 in the Appendix (SM), we show that all results hold when estimating logit models. A stepwise inclusion or omission of control variables does not affect our interpretations.

All estimates above account for robust standard errors clustered for legislators. In Table A10, we present results based on a wild cluster bootstrap where we treat all votes by a legislator as one block. Results show that statistical significance of our earlier findings is not driven by particular legislators nor is it an artifact of assumptions underlying the clustering.

Tables A11 and A12 investigate the number and the composition of interest group affiliations of chamber-changers in comparison to other legislators while they serve in the lower and upper house. As mentioned above, there are no statistically significant differences between chamber-changers and other members of the respective houses and the estimated coefficients are quantitatively small.

5. Discussion and conclusion

5.1. Summary of findings

Our empirical evidence provides five new insights.

(1) Legislators respond to constituency preferences when changing from the lower house to the upper house. The change from proportional representation in the lower house to majoritarian elections in the upper house is reflected in legislators’ move towards constituency median preferences after being elected, i.e., chamber-changers are responsive in terms of congruence and strongly react to incentives.

(2) Regarding congruence with constituency preferences, we find no differences between lower house members who will move to the upper house and lower house members who stay in the lower house. Thus, chamber-changers are not a special selection of members of the lower house in terms of congruence as long as they are serving in the lower house.

(3) Once chamber-changers are in the upper house, they become like other members of this chamber in terms of congruence. Thus, chamber-changers adapt to the incentives they face in the upper house.

(4) Chamber-changers become less loyal towards their party once they are in the upper house. They change from a higher degree of party loyalty in the lower house to a lower degree of party loyalty once facing the incentives of the upper house. This change in loyalty makes them similarly loyal to parties as other members of the upper house.

(5) While chamber-changing legislators show similar patterns of interest group affiliations as other members of their chambers, they adapt their affiliations towards more regionally oriented interest groups once they move from the lower to the upper house.

5.2. Discussion

No other study aiming at distinguishing between incentives and selection regarding political representation so far has used such a direct measure of congruence between legislators and their electorate. Our findings provide evidence that politicians are not ideologically stubborn but respond to constituency preferences. All the observed behavioral changes with respect to congruence are consistent with the changes in electoral incentives and thus supportive of the “incentive view”. While proportionally elected legislators have incentives to pander to specific ideological segments of their constituency, majority elected legislators have incentives to pander to a majority interest of their constituency.

Our results confront the “incentive view” with the “selection view” in political representation. At first glance, our results may be seen as evidence in favor of an “only electoral incentives matter” as opposed to an “only selection matters”. While this result is astonishing, we would, of course have liked to further bolster it by testing even more refined hypotheses. For instance, it could be hypothesized that electoral incentives of chamber-changers from small districts (i.e., cantons) with only one or two seats in the lower house change less severely than the one of chamber-changers from large districts with up to 35 seats in the lower house. However, only two legislators from districts with less than five representatives in the lower house were elected to the upper house. Thus, we cannot investigate this aspect.

Another potentially interesting differential hypothesis could be derived from the argument that next to congruence which we test for and explore, other potential electoral incentives may matter. For example, citizens may honor how a candidate fulfills her current mandate (i.e., as a proportionally elected member of the lower house) rather than how her behavior already fits the mandate of the potential future position (i.e., as a majority elected member of the upper house). If this is the case, there should be no pre-election incentive effects in terms of congruence or other potentially electorally relevant factors. Alternatively, pre-selection effects may only occur a few months prior to election. With the current data base it is not possible to discern such very short run effects more precisely as the number of referendum votes usually decreases in the months before elections making statistical tests less powerful.

While our setting allows us to distinguish the “incentive view” from the “selection view”, the nature and the type of incentive brought about by a new office may go beyond any reelection constraint. A new office may bring about an entirely
new set of incentives. To some extent, legislators may also be driven by an incentive to fulfill public expectations of the office that they hold. Our results would be consistent with this interpretation and such an incentive effect linked to the office. Such an incentive mechanism can be called a Thomas-à-Becket incentive in reference to the historical figure of Thomas-à-Becket.\(^{18}\)

If we accept our results as a fair picture of the Swiss situation, we must ask whether and to what extent it can be generalized to other countries. A standard argument against generalizing Swiss results is that they could be specific to Swiss institutions with their extensive direct democracy. This argument does not apply to our results. While we have only been able to investigate the incentive vs. selection views due to Swiss institutions which generate the necessary data, the respective mechanisms are not specific to Switzerland. As we pursue a strictly comparative analysis of electoral incentives in the two chambers which are not differentially affected by the institutions specific to Switzerland, we see no reason why our results should not generalize. However, we would like to note the following two limitations:

First, our results do not imply that selection does not play any role at all. Of course, it is possible (and, from our perspective, probably true) that both, the members of the lower and the upper chamber, originate from a specifically selected group of citizens, namely representatives at the federal level. However, the systematic differences in their behavior regarding congruence under different electoral rules are not driven by further selection but by differences in incentives. Second, our results have a marked focus on congruence with voter preferences. Taken at face value they imply that chamber-changers are no specific selection of legislators with respect to their voting behavior and preference representation. Given our setting, we cannot exclude that chamber-changers are a specific selection with respect to characteristics complementary to their congruence behavior; for instance, how they speak about policy issues or draw personal utility from fulfilling public expectations related to an office rather than from following their own ideology. Given these caveats, we conclude that legislators behave at least as if they were driven only by incentives.

**Declaration of Competing Interest**

All authors declare to have no conflict of interest.

**Supplementary materials**


**References**


\(^{18}\) In 1162 Thomas-à-Becket, a close friend and the Lord Chancellor of the English King Henry II, became the Archbishop of Canterbury. But instead of supporting the King in his disagreement with the pope, Thomas-à-Becket dutifully served as an Archbishop and fulfilled the expectations of the new office he held. This change in the behavior of Thomas-à-Becket resulted in a confrontational stance with the King ultimately leading Thomas-à-Becket to being slain in 1170.


