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# Sex differences in budgetary preferences among Flemish local politicians 

March, $16^{\text {th }} 2018$


#### Abstract

Policy preferences have been shown to differ by sex within the electorate and among public officials. We explore whether - in a context of budgetary restraints - sex differences in budgetary preferences prevail among council members in Flemish municipalities. We find convincing evidence of sex related differences. To fight a budget deficit, female politicians express a relative preference for increasing public revenues. Male politicians prefer to lower expenditures. Crucially, preferences also differ with respect to the nature of revenue increases and expenditure decreases. Once the option to increase revenues is chosen, women prefer the ability-to-pay principle, whereas men express a preference for the benefit principle. If, on the other hand, a decrease in expenditures is chosen, women prefer to narrow the scope of government intervention more than men, while men prefer a reduction in operating costs.


Keywords: Sex, Budget, Survey, Fiscal stress, Local government.

## Introduction

One of the stylized facts of political decision-making is that it has been - and remains dominated by men. While in modern democracies female leadership tends to be the exception rather than the rule, the past decades have witnessed a change: women's representation is growing. Though this process is slow, the trend towards more sex-balanced politics is observed in many democracies and at all levels of government. ${ }^{\text {. }}$

While the disappearance of the sex gap in politics may be valuable in itself, a fundamental question is whether and how female representation affects public policy. The answer to this question thus far remains elusive: some authors find limited or no impact of descriptive female representation, while others find evidence of an impact on specific political issues including child-care coverage (Besley and Case, 2003; Bratton and Ray, 2002), maternity leave and gender equality (Schwindt-Bayer and Mishler, 2005). Female legislators also initiate more legislative proposals on feminist issues and in policy areas such as education, welfare and environment (which are often explicitly regarded as women's interest areas; Saint-Germain, 1989, Vega and Firestone, 1995; Wängnerud, 2000). A highly interesting part of empirical work focuses on budgetary decision-making, which reflects a core function of contemporary democracies. It is often in budgetary decision-making that the fate of policies in women's interests is determined. Here too, however, the evidence is mixed: while some authors find that greater female representation affects the level (Besley and Case, 2003; Chattopadhyay and Duflo, 2004; Chen, 2010; Svaleryd, 2009) and nature (Schwindt-Bayer and Misher, 2003; Shea and Christian, 2016) of public expenditures, others find no such relationship (Ashworth, Geys and Heyndels, 2012; Thomas and Welch, 1991). The effect of female representation on the

[^0]revenue side of the budget is under-studied (see however Alvarez and McCaffery, 2003; Childs and Webb, 2012).

If women in office have systematically different preferences regarding budgetary choices than their male colleagues, this may result in different budgetary policies. It is important to acknowledge, however, that the mere existence of deviating preferences does not suffice: the impact of female representation is conditional on several contextual variables. For example, the sex distribution of power within political parties, as well as the institutional and sociological context play a role in the ability of women to affect policy (Mendelberg, Karpowitz and Goedert, 2014).

The identification of such sex gaps in the preferences of political representatives is the focus of the current paper. We investigate whether stated budgetary preferences among male and female council members in Flemish municipalities differ systematically. This paper is to our knowledge the first to address sex differences in budgetary preferences in a setting of budgetary restraint. Thereby, we complement the work of Alvarez and McCaffery (2003) who study preferences in a context of budget surplus. In contrast to most of the existing literature (which focusses on expenditures only) we also consider potential sex differences in preferences on public revenues.

Our empirical analysis is based on data from a large-scale survey among members of municipal councils in Flanders, the Dutch-speaking part of Belgium (N=1439). Respondents indicated whether they would respond to a budgetary crisis by increasing revenues, by decreasing expenditures or through a combination of both. They also indicated their preferred type of revenue / expenditure to be used. An analysis of these responses provides new evidence for the existence of sex-related budgetary preferences. We find that women are more likely than men to prefer an increase in public revenues (rather than cutting back expenditures) to balance
budgets. Furthermore, if a choice is made to increase revenues, women - more than men prefer revenue instruments that raise revenues according to ability (i.e. through taxes) rather than applying the so-called benefit-principle of taxation (i.e. through fees). If, on the other hand, the choice is made to cut back expenditures, women are more likely to prefer quantitative measures (i.e. narrowing the scope of government intervention) rather than qualitative measures (i.e. reducing operating costs) compared to men.

In section 1, we discuss the theoretical context and introduce three hypotheses on sex differences in budgetary preferences in a setting of budget restraints. Our empirical results are summarized in section 2. A conclusion and discussion are provided in section 3 .

## 1. Literature and hypotheses

Responding to the public's wants through the provision of public facilities and services while at the same time collecting sufficient revenues to pay for them is a challenge for all democratic governments. Normative criteria for government behavior (e.g. the so-called golden rule) dictate that budgets should be balanced. In the context of multi-level governance, 'common sense' arguments for not running too large deficits at the lower levels of government are often supplemented by guidelines or regulations imposed by higher-level governments. The European Union, for instance, meticulously monitors the budget of member states and takes action as soon as deficits grow too large. Within federal countries the budgetary orthodoxy at any level of government is typically monitored by higher-level authorities. This is also the case in Belgium where Flemish municipalities are obliged to balance their budgets (under direct supervision of the regional government).

All this means that striving for balanced budgets is a quasi-universal characteristic of modern democracies. As there tends to be an almost infinite number of ways to bring budgets into balance, the budgetary discussion is open to political debate. Looking at this debate from a sex perspective, it is crucial to know whether male and female representatives (would) make similar or even identical choices. There is strong academic evidence that the occurrence of sex related budgetary preferences is at least plausible (section 1.1). Reviewing this literature allows us to present a number of testable hypotheses (section 1.2), which will lie at the heart of our empirical analysis.

### 1.1 Literature

Politico-economic models of political decision-making tend to (implicitly) use the median voter model as a reference point. In its pure form, this model applies to direct democratic contexts only, i.e. to situations without formal representation. Still, the Hotelling-Downs model of representative democracy shows that similar mechanisms are at work in a two-party context where vote-maximizing politicians and parties tailor policies to the wishes of the median voter. It is crucial to note that in this widely used model politicians' preferences do not play a role. The composition of the assembly - also in terms of sex - does not have any influence on policy. Politicians and parties will always act to please the (median) voter in an attempt to maximize electoral support.

While analyzing representative democracy, the median-voter model is at best a point of reference. There is ample evidence that actual policy choices diverge from the predictions of this model both in two-party and multi-party systems (e.g., Frendreis, Gitelson, Jenkins and Roscoe, 2003; Romer and Rosenthal, 1979). In these cases, politicians’ preferences do play a role in policy making. This can be the case for one of two reasons. First, these preferences may introduce a bias as politicians (agents) take advantage of information-asymmetries and
follow their own rather than voters’ (principals') preferences. This agency view of nonbenevolent government is the standard approach in political economy. Second, public policy may no be a reflection of the electorate's preferences because politicians simply don't know voters' preferences - a different type of informational asymmetry to the one discussed above (Jottier, Ashworth and Heyndels, 2012). If this is the case, non-benevolence from the government is no longer required to explain the fact that public policy is no perfect mapping of voters' preferences. Consistent with the latter idea, Gerber and Lewis (2004) find that legislators in homogeneous districts - where politicians can be assumed to be better informed on voters' preferences - represent the median voter better than legislators in heterogeneous districts.

Clearly, both approaches require a divergence between politicians' and the electorate's preferences to explain why policy does not mirror voters’ preferences. Such divergence has been documented in Ågren, Dahlberg and Mörk (2006), who find spending preferences to diverge among Swedish voters and local politicians with similar demographics. Once the median-voter ideal is left behind, the preferences of the ruling politicians become a relevant part of the democratic decision-making process. The immediate implication then is that the sex of decision-makers may matter and - if sex differences in policy preferences exist - that a distinction between 'male' and 'female' policy becomes a possibility. Of course, the mere existence of deviating preferences may not be sufficient to affect policy outcomes, but it can be considered as a necessary condition.

The above-mentioned literature sees the divergence between voters' and politicians' preferences as a potential source of public policies not being in line with the electorate's wishes. A different line of research posits that diverging preferences may in fact be instrumental to voters strategically electing politicians with different preferences than their own (Ågren, Dahlberg and Mörk, 2006; Besley and Coate, 2003).

Many authors have documented that men and women - for biological and/or cultural reasons differ in dimensions, which may be of direct relevance for policymaking. Phillips' work on the politics of presence documents how female politicians share experiences of women in general and thus predicts a link between descriptive and substantive representation (Phillips, 1995). Gendered experiences are most obvious with respect to, for instance, child-rearing, education, divisions of paid and unpaid labor, and exposure to violence and sexual harassment (Wängnerud, 2009). Sex-related differences in social behavior, self-image, attitudes towards uncertainty, have likewise been documented (Croson and Gneezy, 2009; Eagly and Wood, 1991; Feingold, 1994).

Sex differences in policy preferences have been identified in many contexts. In a legislative context, Thomas (1991) finds that women's preferences tend to differ from men's in policy areas such as education, medical issues, welfare, crime, budget and environment. Some researchers even explicitly identify these as women's interest areas (Thomas, 1991; SaintGermain, 1989; Vega and Firestone, 1995; Wängnerud, 2000; Svaleryd, 2009). ${ }^{\text {II }}$ Female legislators have also been found to attach more importance to equality across the sexes (Vega and Firestone, 1995; Swers, 1998), and are generally observed to be more left-leaning than males across political parties (Childs and Webb, 2012). The latter is also shown to be true among women in studies of the sex gap in voting (Campbell and Childs, 2014 ,2015; Celis, Roggemans and Spruyt, 2015; Manza and Brooks, 1998; Webb and Childs 2012). ${ }^{\text {II }}$

[^1]With respect to budgetary choices, female federal bureaucrats in the US have been shown to prefer a larger public sector than their male colleagues (Dolan, 2002), while female members of the British Conservative Party tend to be more positively inclined toward taxation than male members (Childs and Webb, 2012). Campbell and Childs $(2014,2015)$ report similar preferences among Conservative voters. Krogstrup and Wälti (2011) show that budget deficits in Swiss cantons were reduced by granting women the right to vote, suggesting that women may have a stronger preference for balanced budgets. Finally, Alvarez and McCaffery (2003) analyze sex differences in budgetary preferences in a context of budget surpluses, and find that men are more likely than women to prefer using such surpluses for implementing tax cuts or paying down the national debt.

### 1.2 Hypotheses

The question how to avoid a budget deficit is omnipresent in political debate. In principle, policy-makers have only three options to fight a deficit: they can increase revenues, decrease expenditures or combine both. 'Revenues' as well as 'expenditures' thereby refer to highly heterogeneous sets of policy instruments. On the revenue side of the budget, public authorities can use an almost infinite number of tax instruments or they can rely on debt financing (which effectively is just a way to postpone taxation). On the expenditure side, balancing budgets is possible through cutting expenditures in one or more specific spending categories. These diverse options, both on the revenue and the expenditure side of the budget, can be categorized according to underlying (normative) principles.

Often, attitudes towards government revenues and expenditures lie at the heart of the left-right ideological dimension of politics. Yet, even controlling for ideology, men and women in office could have different views on how to respond optimally to the threat of a budgetary imbalance. We may therefore expect sex-related (stated) preferences both with respect to the question
whether budgetary cut-backs should preferably be realized through increasing revenues rather than decreasing expenditures, and with respect to the question which revenues/expenditures should be increased/decreased. Based on the discussion in section 1.1, we expect that women, as a rule, will have a more positive attitude towards government intervention (Alvarez and McCaffery, 2003; Dolan, 2002; Funk and Gathmann, 2015; Lott and Kenny, 1999; Wängnerud, 2015). In a context of budgetary restraint, we therefore expect female politicians to support increases in revenues more (or to object less to them) than male politicians:

> H1: Female representatives (compared to their male colleagues) are more likely to support an increase in revenues to fight a potential budget deficit.

Given one's preference for increasing revenues to fight a budget deficit, the question arises as to the nature of this increase, i.e. what revenues to increase. Ever since Adam Smith's Wealth of Nations, it has been standard practice to evaluate tax systems by reference to the underlying principles (or 'canons'). Two main principles can thereby be contrasted: taxes could be levied according to either the ability-to-pay principle, or according to the benefit principle. The former dictates that taxpayers should contribute according to their (financial) ability. Many interpretations of this normative principle have been suggested in the literature, but the general underlying idea is that there should be a link between the income or wealth of a taxpayer and the amount of taxes owed. The benefit principle instead states that taxation should be a reflection of the benefits that a person derives from public services. As such, this principle introduces a market-based relation between the public and government, whereby taxes play a role similar to prices in the private market. The implementation of both the ability-to-pay and the benefit principle are not without difficulty (Musgrave and Musgrave, 1989). Still, they reflect the two polar principles that guide actual tax systems in modern democracies. Whereas the ability-to-pay principle reflects the introduction of solidarity and redistributive mechanisms into the tax system, the benefit-principle is based on a quid pro quo view of the relation between
the individual and public authorities. Based on findings in the literature that women tend to reveal a preference for more redistributive taxes (Alesina and La Ferrara, 2005; Alvarez and McCaffery, 2003; Edlund, 1999; Geys and Revelli, 2011) or, more generally, based on the finding that women tend to be more solidary (Torbjörnsson and Molin, 2014; Welch and Hibbling, 1992) we hypothesize:

H2: When fighting a budget deficit by increasing public revenues, female representatives will (relative to their male colleagues) be more likely to rely on the ability-to-pay principle rather than the benefit principle.

When governments choose to fight budget deficits by cutting public spending, the impact on public sector output may be quantitative or qualitative in nature. In the former case, governments can choose to lower expenditures by no longer (or to a lesser extent) offering specific public services. The scope of government activities is thereby narrowed and public interventions can be either stopped or transferred to the private sector (Geys and Sørensen, 2016). Alternatively, spending can be lowered by qualitatively changing government output and lowering operating costs. This may imply a correction of existing inefficiencies or a reduction in the quality of public services. While correcting inefficiencies wherever possible may be considered as a natural thing to do independent of budgetary pressure, it may be the case that such corrections are (politically) more feasible if there is an explicit budgetary need (Geys and Sørensen, 2016). Lowering operating costs may, for instance, involve a reduction in administrative services' opening hours, an increased workload for the civil servants, and so on. The choice between quantitative and qualitative measures can be seen as mirroring a trade-off of two principles. Quantitative measures - cutting back public services - correspond to a choice for smaller government in the sense that the government no longer fulfills specific tasks. Qualitative measures - lowering operating costs - are either aimed at increasing efficiency or
at organizing a government that fulfills the same tasks, but at a lower level. According to hypothesis 1, women will have a more negative attitude to both quantitative and qualitative changes. Our expectations with respect to sex-related preferences concerning the nature of the lowering of expenditures will thus depend on the dominant focus of both men and women. If the idea that women have a more positive attitude towards government intervention should be understood as women preferring a broadly-defined domain of government intervention, then:

H3-a: When fighting a budget deficit by decreasing public expenditures, female representatives will (relative to their male colleagues) be more likely to prefer a qualitative rather than quantitative reduction.

If, on the other hand, women's support for government intervention should be understood as a plea for high-quality (substantive rather than symbolic) interventions, then they may prefer to narrow the scope of government intervention while maintaining high quality:

H3-b: When fighting a budget deficit by decreasing public expenditures, female representatives will (relative to their male colleagues) be more likely to prefer a quantitative rather than qualitative reduction.

A possible reason for the latter proposition may be found in the fact that women tend to be overrepresented among civil servants (Campbell and Childs, 2014). As such, an expected increase in workload (which falls on civil servants) may induce a negative attitude towards lowering operating costs. As the literature does not allow us to formulate an unambiguous hypothesis, sex differences in preferences for quantitative versus qualitative changes in expenditures to meet budget cuts are to be considered an empirical issue.

## 2. Sex differences in preferences on budgetary interventions at the municipal level

Belgium has a multi-tier governmental structure in which municipalities represent the lowest level. All levels of government are confronted with the challenge to balance budgets. At the local level, this challenge is formalized more explicitly since Belgian municipalities are by law obliged to balance their budgets. As this requirement makes the budgetary balance highly salient, the municipal level is an ideal context to analyze budgetary preferences in the context of budgetary restraint. Focusing on municipalities also allows analyzing larger numbers of observations. The Flemish region consists of 308 municipalities with a parliamentary system where the legislative and executive powers lie with the council and the local government, respectively.

To test the hypotheses presented earlier, we use data from a survey among municipal council members in Flanders. In section 2.2, we discuss our data and the empirical method used. Results are presented in section 2.3. Before moving to the data and results, we give a brief overview of the budgetary context in which Flemish municipalities operate (section 2.1).

### 2.1 Budgetary context of Flemish municipalities

Flemish municipalities make their budgetary decisions via majority vote among councilors and have a broad range of competences (including nursery and elementary education, local police and fire brigade, social welfare provision, local infrastructure services, and so on). Local governments' revenue consists of two main sources: grants from higher-level governments and taxation. The former consists mainly of an unconditional grant that municipalities receive from the regional government. This grant covers about $40 \%$ of municipal expenditures. The remaining revenues are raised by the municipalities themselves. Local tax revenues - over which local governments have a high degree of autonomy - cover also about $40 \%$ of expenditures. While there is a wide variety in tax instruments (the average municipality raises
about 20 different taxes), the revenues tend to be highly concentrated. Two taxes - the local income tax and the local property tax - account for about $80 \%$ of all tax revenues. Both taxes are surcharges. The local income tax is a surcharge on the federal income tax and the local property tax is a surcharge on the regional property tax. The remaining $20 \%$ of municipal revenues stem from a set of (mostly minor) revenue sources, including dividends and returns on financial investment and fees charged for specific administrative or other services (e.g., delivering certificates to the public, visiting the local swimming pool, and so on).

### 2.2 Data and Method

For our empirical analysis, we use data from a large-scale survey on local politicians' budgetary preferences. This survey was sent in 2013 by e-mail to all members of the municipal councils in Flemish municipalities for whom contact information could be found ( $\mathrm{N}=7458$ ). Apart from questions on the preferred response to a potential threat of a budget deficit (which are the focus of the present paper), the survey collected data on the evaluation of actual public spending in the municipalities. For our purposes, and after excluding incomplete responses, we obtain data on policy preferences of 1439 local politicians (response rate of $21 \%$ ). Respondents are broadly representative of the general population of local politicians in terms of sex ( $30 \%$ women), age, political parties and municipality (301 of the 308 municipalities are represented). For a detailed description of the sample and the underlying population of local politicians, see table A in the appendix. To identify individuals' budgetary preferences, we asked how our respondents would react to (external) budgetary pressure using the following question:
"The financial position of municipalities is threatened as a consequence of recent events and evolutions (federal tax reforms, ageing population, increasing pension expenses, ...). How do you feel municipalities should respond in order to keep budgets balanced?"

While deliberately referring to a general and therefore hypothetical situation, the actual threats mentioned are realistic for all municipalities. Of course, the degree to which municipalities are affected depends on local circumstances. This means, as we will discuss further, that such circumstances should be controlled for in the analysis.

Respondents were presented eight options/instruments. Five of these involve an increase in municipal revenues (i.e. raising local income tax, local property tax, local corporate taxes, "other" local taxes and fees for municipal services). The other three imply a reduction in expenditures (i.e. reduction of services provided by the municipality, reduction in operating costs and outsourcing municipal services to the private sector). For each of these budgetary instruments, respondents were asked to what extent they would use it by picking one of four answers (completely disagree, tend to disagree, tend to agree, completely agree). To empirically analyze the responses relating to our three hypotheses, we created a set of three (trichotomous) variables. ${ }^{\text {IV }}$

Hypothesis 1 refers to representatives' preferences for fighting budget deficits by increasing revenues rather than decreasing public spending. We define a variable $h 1_{i}$ that indicates to what extent - in the event of a budgetary deficit - respondent $i$ chooses to increase revenues. The variable $h 1_{i}=1$ if the respondent states to prefer fighting the budgetary deficit by cutting expenditures (i.e. 'tend to agree' or 'completely agree' with at least one of the three options to lower expenditures) while excluding the use of revenue instruments. $h 1_{i}=2$ for those respondents who indicate a preference for combining expenditure and revenue measures. Finally, $h 1_{i}=3$ in case respondents express an unambiguous choice for fighting the budget

[^2]deficit by using one of the five revenue instruments while excluding a cut-back in expenditures. Figure B1 in appendix gives the distribution of reported preferences.

To test hypothesis 2 - the choice between ability-to-pay or benefit principle on the revenue side of the budget - we restrict the sample to those respondents who preferred an increase in at least one of the revenue sources (either in combination with decreases in expenditure or not). The five revenue sources can be classified according to their (dominant) principle. A clear distinction exists between taxes and fees. Municipal fees are explicitly based on the benefitprinciple, while taxes in our setting are based on the ability-to-pay principle. Most often, the link is highly explicit. For example, the local income tax - being a surcharge on a progressive federal income tax - mirrors the federal progression and falls disproportionately on the higher income groups. The local property tax - being proportional to the (assessed) rental value of properties - falls more heavily on wealthy taxpayers. The ability-to-pay principle may be less outspoken for a small number of local taxes that are lump-sum payments. Still, the principle does tend to remain present as in these cases it is common practice to allow tax reductions or exemptions for underprivileged and lower-income taxpayers. ${ }^{\mathrm{V}}$

As for hypothesis 1 , we create a variable that can take three values. This variable - $h 2_{i}$ - indicates the relative support for the ability-to-pay principle over the benefit principle. For those respondents who prefer to increase revenues by increasing municipal fees only, $h 2_{i}=1$. If the respondent prefers a combination of the ability-to-pay principle (municipal taxes) and benefit principle (municipal fees) $h 2_{i}=2$. Finally, $h 2_{i}=3$ for those expressing an unambiguous preference for the ability-to-pay principle by choosing increases in taxes while excluding any increase in municipal fees.

[^3]Finally, to test hypothesis 3 - on the preference for quantitative versus qualitative changes in government expenditures - we restrict the sample to those who want to tackle the budget deficit through the expenditure side (possibly in combination with revenue increases). The variable $h 3_{i}$ $=1$ for those respondents who choose a qualitative reduction through a cutback in operating costs (leaving the scope of the public sector unaffected). If the respondent prefers a combination of qualitative and quantitative reductions, $h 3_{i}=2$. Finally, $h 3_{i}=3$ for those who wish a quantitative reduction (affecting the scope of the public sector).

Since all our dependent variables are trichotomous and ordered, we proceed by using an ordered logistic regression technique. The underlying idea is that 'actual' preferences $h$ *. (preference for increasing revenue $-h^{*}$, for applying the ability to pay principle $-h^{*}$, and for quantitative changes in expenditure $-h_{3}$ ) are a linear function of a vector $(X)$ including a variable capturing the respondent's sex and a set of control variables. Hence, we can write (leaving out the respondent-specific indices for convenience):

$$
h^{*} .=\beta^{\prime} \cdot X+\varepsilon
$$

Where $\beta^{\prime}$ is a vector of coefficients and $\varepsilon$ is the error term. It should be noted that the analysis has in effect an unobserved dependent variable: the 'actual' preferences of our respondents ( $h^{*}$.) are unknown. What we do have are their stated preferences, which are translated on the offered scales. Three possible answers were presented, and so the actual response $h$. (with . $=1,2,3$ ) is derived as follows:

$$
\begin{array}{lll}
h .=1 & \text { if } & h^{*} . \leq \mu_{1} \\
h .=2 & \text { if } & \mu_{1}<h^{*} . \leq \mu_{2} \\
h .=3 & \text { if } & \mu_{2}<h^{*} .
\end{array}
$$

where the $\mu$ 's are unknown parameters that delineate the boundaries for the responses and that are estimated with the parameters of the basic model. All this leads to our estimation equations, which relate preferences to the respondent's sex as well as to a set of control variables:

$$
\begin{aligned}
& \text { h. }=\beta_{0 \mathrm{j}}+\beta_{1} \text { Woman }+\beta_{2} \text { Age }+\beta_{3} \text { Education }+\beta_{4} \text { Marital }+\beta_{5} \text { Children } \\
& +\beta_{6} \text { Ideology }+\beta_{7} \text { Majority } \\
& \text { for h. }=\text { h1, h2, h3 }
\end{aligned}
$$

Our central variable of interest is Woman (1 for female respondents, 0 otherwise). The other explanatory variables reflect that preferences may be related to variables at the level of the individual respondent, his/her party, or the municipality where (s)he is councilor.

At the individual level, we control for the respondent's age, education level, marital status, and whether (s)he has children. Age (in years) is introduced as preferences may depend on (both life and political) experience, as well as to allow for the possibility that preferences shift over generations (Campbell and Childs, 2014). ${ }^{\text {VI }}$ The respondent's education level is measured by a dichotomous variable indicating whether the respondent has obtained at least a Bachelor degree $($ Education $=1)$ or not $($ Education $=0)$. The education level has been shown to influence policy attitudes towards the welfare state (Brooks and Svallfors, 2010; Svallfors, 2011). A third individual-level control variable is the respondent's marital status, which distinguishes between respondents living - either married or not - together with a partner (Marital $=1$ ) or not (Marital $=0$ ). There is ample evidence that being single - if only because this may imply a higher risk of being in a more vulnerable economic situation - affects budgetary preferences (Campbell and Childs, 2014; Chaney, Alvarez and Nagler, 1988; Finseraas, Jakobsson and Kotsadam, 2012). Finally, we include a variable Children, which indicates whether the respondent has children (Children $=1$ ) or not (Children $=0$ ). Having children may affect one’s preferences

[^4](Campbell and Childs, 2014) and induce a higher degree of altruism (Schlozman, Burns and Verba, 1995).

Clearly, politicians' budgetary preferences may reflect or be shaped by their partisan affiliation. Both the ideological position of a party (and its members), as well as its current position in terms of executive power can be expected to affect respondents' preferences. Given the ideological dimension of most budgetary decisions, we control for the ideological position of the respondent's party on a left-right axis ranging from 0 (extreme left) to 10 (extreme right) through the variable Ideology. ${ }^{\text {VII }}$ This variable is also important to control for the potential confounding effect of sex-specific patterns of party affiliation (Stadelmann, Portmann and Eichenberger, 2014) We capture the respondent's party's current political status through a variable Majority, which equals 1 when the party is part of the ruling majority or coalition ( 0 otherwise). Ashworth and Heyndels $(1997,2000)$ show that being part of the majority systematically influences politicians' preferences by changing their (electorally driven) perspective.

Finally, budgetary preferences - even though defined in a general context - might depend on the specific (budgetary, economic, sociological or political) municipal context in which the respondent finds her- or himself. This is controlled for by introducing municipality-specific fixed effects in our regressions.

[^5]
### 2.3 Results

Regression results for each of the hypotheses are summarized in tables 1-3. ${ }^{\text {VIII }}$ In each case, we present two sets of results. In a first specification, we include all individual- and party-level variables, and thereby present results without and with the municipality-specific dummies (in columns 1 and 3, respectively). In a second and more parsimonious specification, we include only those variables for which coefficients were significant at a $10 \%$ level (using a step-wise procedure whereby significant variables were included one by one into the model). Again, results are presented excluding (column 2) and including (column 4) municipality-specific dummies.

Table 1 summarizes the estimation results with respect to representatives' preferences for fighting budget deficits by increasing revenues rather than by decreasing public spending. In general, the model explains politicians' preferences quite well, and we find significant effects from both the individual-, party- and municipality-level variables. As witnessed by the increase in the pseudo- $\mathrm{R}^{2}$ in columns 2 and 4 , the municipal context is an important driver of stated preferences. Still, and crucial for our analysis, there appears to be no substantial effect of the inclusion of municipality-specific dummies on the coefficients and levels of significance of the main explanatory variables in our model.

Insert table 1 here

[^6]Focusing on our central variable, we find strong evidence of sex related preferences. When fighting a budget deficit, women are significantly more likely than men to prefer an increase in public revenues. This result provides strong support for our first hypothesis. To measure the substantive importance of these sex differences in preferences, we calculate the marginal effects (see lower section of table 1). These indicate that sex has a considerable effect on preferences: compared to men - and controlling for all other determinants - women are four percentage points more likely to choose a revenue increase to remedy a threatening budget deficit. Such a difference is considerable given the baseline probabilities observed in the raw data (which indicate that $12 \%$ of women prefer the 'revenue only' option as opposed to only $8 \%$ of men).

Respondents' characteristics other than their sex are also related to their preferences. Support for revenue increases is stronger among older politicians and weaker among those who live together with a partner. The latter may be seen as supporting the notion that single respondents tend to find themselves in a more vulnerable economic situation, which propels a more positive attitude towards government intervention. It should be noted, however, that the effect of marital status is only statistically significant in one out of four specifications. Hence, the evidence of a marital-state effect is present, but not overwhelming.

Stated preferences clearly reflect respondents’ ideological background: the preference for revenue increases is negatively correlated with the ideological position of the party to which the respondent belongs. This is as expected, and reflects a more pro-revenue attitude (and thus towards higher government intervention) on the left-hand side of the political spectrum. ${ }^{\text {IX }}$

[^7]Finally, we find that politicians belonging to a ruling party tend to be more positively inclined towards revenue increases. Given the baseline probabilities observed in the raw data, members of opposition parties are twice as likely to prefer the 'expenditure only' option compared to members of incumbent parties ( $20 \%$ vs. $10 \%$ ). It is of note that this preference for a cut-back in expenditures over an increase in revenues is not reflected in the choice for the option 'revenue only': members of opposition parties outnumber (albeit slightly) the members of incumbent parties (11 \% vs. $8 \%$ ). This reflects a pattern where politicians of incumbent parties tend to prefer more balanced options where both revenues and expenditures are used to fight a potential deficit. This can be taken to reflect that the actual budgetary situation (for which incumbents are responsible) corresponds with their preferences.

Table 2 summarizes - following the same format as table 1 - the preferences for applying the ability-to-pay rather than the benefit principle of taxation. The results provide strong support for hypothesis 2: female politicians are more likely than men to choose the ability-to-pay principle and are less likely to rely on fees or tariffs. The marginal effects show that these effects are substantively meaningful. That is, women are 9 percentage points more likely to choose the ability-to-pay principle, and 3 percentage points less likely to prefer the benefit principle than men to remedy the budget deficit. These effect sizes can best be evaluated looking at the raw data, where we see that $45 \%$ of respondents who would consider raising revenues prefer to rely only on the ability-to-pay principle. Only 8\% opt for the fee-only option.

Insert table 2 here

For the individual-level variables, we find that respondents living together with a partner and more highly educated respondents prefer to rely on the benefit principle. This result may be taken to reflect that respondents living without a partner or having a lower level of education and thus tending to be in a more vulnerable economic position - attribute more weight to the solidarity mechanism, which underlies the ability-to-pay principle. Finally, respondents’ age and whether they have children does not affect their preference for the method of raising additional revenues to curb a threatening budget deficit.

The coefficients for the party-ideology variables show that politicians of more right-wing parties have considerably less sympathy for the ability-to-pay principle, as could be expected. The same also applies to politicians of majority parties. This could be explained by the fact that these respondents' preferences are more driven by the expected electoral costs of the respective decisions (Ashworth and Heyndels, 1997; Geys and Vermeir, 2008a,b). In day-to-day municipal budgetary politics, applying the ability-to-pay principle boils down to increasing either the local income tax or the local property tax (as these taxes have a tax base large enough to raise sufficient revenues). Yet, both these taxes are highly visible to voters, and thus tend to be politically very costly. ${ }^{\mathrm{x}}$

Table 3 summarizes the results for respondents’ preferences for quantitative versus qualitative reductions in expenditures. The results provide support for hypothesis 3-b (and thus reject hypothesis 3-a): when the decision to fight a budget deficit by cutting back expenditures has been taken, female politicians are more likely to choose a quantitative rather than qualitative reduction of public spending. Women thus appear more likely than men to prefer public

[^8]intervention of (sufficiently) high quality to a broad scope of governmental activities. Note that - as previously - this is a relative statement comparing male and female respondents. In absolute terms, we observe a general preference for using qualitative measures. Looking at the raw data (shown in table B3 in the appendix), the vast majority of both female and male respondents indeed prefer to combine qualitative and quantitative measures.

Insert table 3 here

For the individual-level variables, we find a negative effect from marital status. Respondents who live together with a partner prefer a quantitative reduction. Highly educated and older respondents tend to be less supportive of a quantitative reduction in public expenditures (the effect of age is only significant in the models including the municipal context).

Once again, a respondent's party ideology has a (highly) significant impact on stated preferences. Politicians belonging to incumbent parties are more in support of quantitative adjustments, and right-wing politicians tend to be more inclined towards a reduction of government activities in comparison to left-wing politicians. An interesting difference between the results in table 3 and the previous tables is that women do not display what one may call 'leftist preferences' here. Indeed, when asked whether to increase revenues or decrease expenditures (table 1) or when asked whether to apply the ability-to-pay rather than benefit principle (table 2), women's preferences tended to correlate with more leftist views. The coefficients of our sex and ideology variables had opposite signs. This is not true for table 3. Women's preference for quantitative rather than qualitative changes mirrors the view dominating among right-wing politicians. This may be taken to reflect the less outspoken
ideological character of the question or, put differently, its multi-dimensional nature. More importantly, this pattern of findings implies that Woman in our analysis is not simply picking up an effect attributable to individual-level left-right ideology.

## 3. Conclusion

Avoiding or remedying budget deficits is a highly salient issue for most democratic governments. The response to a threatening deficit may reflect the political decision-makers' preferences. This is the first study, to the best of our knowledge, that analyses sex differences in budgetary preferences in a context of budgetary restraint - and thereby complements the work of Alvarez and McCaffery (2003) who study sex differences in budgetary preferences in a context of budget surpluses.

We first of all identify sex differences in preferences with respect to the question whether deficits should be addressed by increasing revenues and/or decreasing expenditures. Women tend to prefer increases in public revenues, whereas men prefer a decrease in public spending. With this result, we confirm the general finding in the literature that women tend to have a more positive attitude towards government intervention, while men seem to prefer a 'smaller government' (Alvarez and McCaffery, 2003; Dolan, 2002; Funk and Gathmann, 2015; Lott and Kenny, 1999; Wängnerud, 2015).

Importantly, our results show that sex related preferences are also present at a lower level of aggregation. Once the option to increase revenue is chosen, the question arises as to what type of revenue to increase. We find that female council members have a (relative) preference to raise revenues according to the ability-to-pay principle, whereas men are more likely than women to apply the benefit principle. Once the option is chosen to fight a budget deficit by decreasing expenditures, we find that women - more than men - prefer to narrow the scope of
government by limiting the tasks it fulfills. Men would rather prefer a reduction in operating costs, possibly at the cost of lowering the quality of public intervention. This would mean that the classical observation that women have a more positive attitude towards government intervention should not be understood as women wanting the government to take up as many tasks as possible. Rather, our results indicate that their pro-government attitude reflects a concern for government to dispose of sufficient (financial) means to allow 'proper' functioning.

Overall, our results highlight that male and female politicians have systematically different preferences at the subnational level in Belgium. These findings are broadly in line with work on Sweden (Svaleryd, 2009) and the UK (Childs and Webb, 2012). Even so, whether or not the results can be generalized to other regions and countries may depend on the institutional and cultural context. Our respondents are (active) politicians that operate in a setting of representative democracy. This setting typically allows for politicians’ discretion in policy making, which stands in stark contrast to situations of direct democracy (where the (median) voter has a more prominent/dominant position). In the latter setting, we would therefore expect politicians' preferences to be in line with that (unique) median voter, such that male and female politicians' preferences would not differ. Stadelmann, Portman and Eichenberger (2012)'s analysis documents this very well.

Our findings add evidence to the ongoing debate on the link between the descriptive and substantive representation of women, and strengthens the micro-foundations for a theory on the politics of presence. Yet, our results also raise a number of questions, both positive and normative. A first question is to what extent female politicians are - as regards their preferences - representative for the female electorate. A second, more fundamental, positive question is to what extent politicians' preferences matter for policy outcomes. If these preferences drive policy, it is to be expected that the distribution of power between men and women will significantly affect actual policy outcomes. Under the assumptions that politicians' preferences
mirror preferences of the population as a whole and that their preferences are translated into policy, there is a strong normative case for sex-balanced power distribution to assure sex-neutral policy outcomes. Both positive questions have received widespread attention in the literature. Still, especially with respect to the question on the translation of female politicians' preferences into public policy, the evidence is mixed. A systematic analysis of mediating factors should be high on the research agenda to obtain insight into the process through which women's descriptive representation translates into their substantive representation. One important avenue of research thereby concerns the potential role of party discipline, which is required to achieve a better understanding of the possibilities of women to vote against their own (often still maledominated) party in real life situations.

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Table 1. Estimation of support for increase in revenue over decrease in expenditures: ordered logit

|  | Model 1 | Model 2 | Model 3 | Model 4 |
| :---: | :---: | :---: | :---: | :---: |
| Woman | $\begin{gathered} 0.556 * * * \\ (0.141) \end{gathered}$ | $\begin{gathered} 0.546 * * * \\ (0.141) \end{gathered}$ | $\begin{gathered} 0.580^{* * *} \\ (0.171) \end{gathered}$ | $\begin{gathered} 0.596 * * * \\ (0.150) \end{gathered}$ |
| Age | $\begin{gathered} 0.016 * * * \\ (0.006) \end{gathered}$ | $\begin{gathered} 0.016 * * * \\ (0.006) \end{gathered}$ | $\begin{gathered} 0.024^{* *} * \\ (0.007) \end{gathered}$ | $\begin{gathered} 0.018^{* * *} \\ (0.006) \end{gathered}$ |
| Education | $\begin{aligned} & -0.167 \\ & (0.143) \end{aligned}$ |  | $\begin{aligned} & -0.175 \\ & (0.180) \end{aligned}$ |  |
| Marital | $\begin{aligned} & -0.239 \\ & (0.229) \end{aligned}$ | $\begin{aligned} & -0.320^{*} \\ & (0.193) \end{aligned}$ | $\begin{aligned} & -0.214 \\ & (0.288) \end{aligned}$ |  |
| Children | $\begin{gathered} -0.113 \\ (0.195) \end{gathered}$ |  | $\begin{gathered} -0.360 \\ (0.251) \end{gathered}$ | $\begin{gathered} -0.321^{*} \\ (0.117) \end{gathered}$ |
| Ideology | $\begin{gathered} -0.482^{* * *} \\ (0.043) \end{gathered}$ | $\begin{gathered} -0.481^{* * *} \\ (0.043) \end{gathered}$ | $\begin{gathered} -0.596 * * * \\ (0.055) \end{gathered}$ | $\begin{gathered} -0.526 * * * \\ (0.047) \end{gathered}$ |
| Majority | $\begin{gathered} 0.269 * * \\ (0.127) \end{gathered}$ | $\begin{gathered} 0.270^{* *} \\ (0.127) \end{gathered}$ | $\begin{gathered} 0.340^{* *} \\ (0.161) \end{gathered}$ | $\begin{gathered} 0.316^{* *} \\ (0.135) \end{gathered}$ |
| Municipality specific dummies | NO <br> -3.829*** | NO <br> $-3.805^{* * *}$ | YES | YES <br> 3.710*** |
| $\mu_{1}$ | (0.454) | (0.366) | (1.339) | (0.432) |
| $\mu_{2}$ | $\begin{aligned} & 0.740^{*} \\ & (0.433) \end{aligned}$ | $\begin{gathered} 0.758^{* *} \\ (0.340) \end{gathered}$ | $\begin{gathered} 1.288 \\ (1.328) \end{gathered}$ | $\begin{gathered} 1.381 * * * \\ (0.411) \end{gathered}$ |
| Pseudo R ${ }^{2}$ | 0.08 | 0.08 | 0.27 | 0.17 |
| Observations | 1439 | 1439 | 1439 | 1439 |
| Likelihood ratio test (chi square) | 161.95*** | 160.25*** | $542.42^{* * *}$ | $341.36 * * *$ |
| Marginal effects of the support of women for an increase in revenue |  |  |  |  |
| h1=1 | -0.063*** | -0.062*** | -0.052*** | -0.062*** |
|  | (0.016) | (0.016) | (0.015) | (0.020) |
| h1 $=2$ | 0,020*** | 0.020*** | 0.015*** | 0.020*** |
|  |  | (0.007) | (0.006) | (0.007) |
| h1=3 | 0.043*** | 0.042*** | 0.037*** | 0.041*** |
|  | (0.011) | (0.011) | (0.011) | (0.011) |

Table 2. Estimation of support for ability to pay principle over benefit principle: ordered logit

|  | Model 1 | Model 2 | Model 3 | Model 4 |
| :---: | :---: | :---: | :---: | :---: |
| Woman | $\begin{gathered} 0.422^{* * *} \\ (0.126) \end{gathered}$ | $\begin{gathered} 0.434^{* * *} \\ (0.125) \end{gathered}$ | $\begin{gathered} 0.313^{* *} \\ (0.156) \end{gathered}$ | $\begin{gathered} 0.456 * * * \\ (0.150) \end{gathered}$ |
| Age | $\begin{aligned} & -0.007 \\ & (0.005) \end{aligned}$ |  | $\begin{aligned} & -0.007 \\ & (0.007) \end{aligned}$ |  |
| Education | $\begin{gathered} -0.753^{* * *} \\ (0.133) \end{gathered}$ | $\begin{gathered} -0.738^{* * *} \\ (0.132) \end{gathered}$ | $\begin{gathered} -0.821^{* * *} \\ (0.167) \end{gathered}$ | $\begin{gathered} -0.750^{* * *} \\ (0.135) \end{gathered}$ |
| Marital | $\begin{gathered} -0.463^{* *} \\ (0.219) \end{gathered}$ | $\begin{gathered} -0.396^{* *} \\ (0.166) \end{gathered}$ | $\begin{aligned} & -0.416 \\ & (0.275) \end{aligned}$ | $\begin{gathered} -0.460^{* *} \\ (0.171) \end{gathered}$ |
| Children | $\begin{gathered} 0.211 \\ (0.185) \end{gathered}$ |  | $\begin{gathered} 0.298 \\ (0.232) \end{gathered}$ |  |
| Ideology | $\begin{gathered} -0.261 * * * \\ (0.039) \end{gathered}$ | $\begin{gathered} -0.264^{* * *} \\ (0.039) \end{gathered}$ | $\begin{gathered} -0.309^{* * *} \\ (0.049) \end{gathered}$ | $\begin{gathered} -0.269^{* * *} \\ (0.040) \end{gathered}$ |
| Majority | $\begin{gathered} -0.934^{* * *} \\ (0.122) \end{gathered}$ | $\begin{gathered} -0.933^{* * *} \\ (0.122) \end{gathered}$ | $\begin{gathered} -1.241^{* * *} \\ (0.162) \end{gathered}$ | $\begin{gathered} -1.021^{* * *} \\ (0.127) \end{gathered}$ |
| Municipality specific dummies |  |  |  |  |
| $\mu_{1}$ | $\begin{gathered} -5.761^{* * *} \\ (0.442) \end{gathered}$ | $\begin{gathered} -5.334^{* * *} \\ (0.324) \end{gathered}$ | $\begin{gathered} -7.051^{* * *} \\ (1.025) \end{gathered}$ | $\begin{gathered} -5.864^{* * *} \\ (0.346) \end{gathered}$ |
| $\mu_{2}$ | $\begin{gathered} -2.941^{* * *} \\ (0.416) \end{gathered}$ | $\begin{gathered} -2.517^{* * *} \\ (0.292) \end{gathered}$ | $\begin{gathered} -3.604^{* * *} \\ (1.006) \end{gathered}$ | $\begin{gathered} -2.821^{* * *} \\ (0.308) \end{gathered}$ |
| Pseudo R ${ }^{2}$ | 0.07 | 0.07 | 0.22 | 0.20 |
| Observations | 1219 | 1219 | 1219 | 1219 |
| Likelihood ratio test (chi square) | 154.88*** | 152.79*** | 494.46*** | 484.85*** |
| Marginal effects of the support of women for the ability to pay principle |  |  |  |  |
| h2 $=1$ | -0.031*** | -0.031*** | -0.019** | -0.031*** |
|  | (0.009) | (0.009) | (0.010) | (0.009) |
| h2 $=2$ | -0.062*** | -0.064*** | -0.035** | -0.064*** |
|  | $(0.018)$ | (0.018) | (0.018) | (0.018) |
| h2 $=3$ | 0.093*** | 0.096*** | 0.054** | 0.095*** |
|  |  |  | (0.027) | (0.027) |
| Standard errors in parentheses: ${ }^{* * *} \mathrm{p}<0.01,{ }^{* *} \mathrm{p}<0.05,{ }^{*} \mathrm{p}<0.1$ |  |  |  |  |

Table 3. Estimation of support for quantitative over qualitative reduction of services: ordered logit

|  | Model 1 | Model 2 | Model 3 | Model 4 |
| :---: | :---: | :---: | :---: | :---: |
| Woman | $\begin{gathered} 0.317^{* *} \\ (0.134) \end{gathered}$ | $\begin{gathered} 0.322 * * \\ (0.134) \end{gathered}$ | $\begin{gathered} 0.467 * * * \\ (0.166) \end{gathered}$ | $\begin{gathered} 0.293^{* *} \\ (0.140) \end{gathered}$ |
| Age | $\begin{aligned} & -0.005 \\ & (0.006) \end{aligned}$ |  | $\begin{gathered} -0.014^{* *} \\ (0.007) \end{gathered}$ | $\begin{gathered} -0.010^{*} \\ (0.006) \end{gathered}$ |
| Education | $\begin{gathered} -0.406 * * * \\ (0.139) \end{gathered}$ | $\begin{gathered} -0.393^{* * *} \\ (0.138) \end{gathered}$ | $\begin{gathered} -0.419^{* *} \\ (0.175) \end{gathered}$ | $\begin{gathered} -0.444^{* * *} \\ (0.146) \end{gathered}$ |
| Marital | $\begin{gathered} 0.277 \\ (0.214) \end{gathered}$ |  | $\begin{gathered} 0.358 \\ (0.274) \end{gathered}$ | $\begin{gathered} 0.494 * * * \\ (0.189) \end{gathered}$ |
| Children | $\begin{gathered} 0.080 \\ (0.183) \end{gathered}$ |  | $\begin{gathered} 0.243 \\ (0.236) \end{gathered}$ |  |
| Ideology | $\begin{gathered} 0.364^{* * *} \\ (0.041) \end{gathered}$ | $\begin{gathered} 0.361^{* * *} \\ (0.040) \end{gathered}$ | $\begin{gathered} 0.399^{* * *} \\ (0.052) \end{gathered}$ | $\begin{gathered} 0.388^{* *} * \\ (0.042) \end{gathered}$ |
| Majority | $\begin{gathered} 0.349 * * * \\ (0.121) \end{gathered}$ | $\begin{gathered} 0.357 * * * \\ (0.121) \end{gathered}$ | $\begin{gathered} 0.433 * * * \\ (0.158) \end{gathered}$ | $\begin{gathered} 0.382 * * * \\ (0.127) \end{gathered}$ |
| Municipality specific dummies | NO | NO | YES | YES |
| $\mu_{1}$ | 0.818* | 0.872*** | 0.449 | 0.936*** |
|  | (0.421) | (0.266) | (1.154) | (0.376) |
| $\mu_{2}$ | $\begin{gathered} 4.505^{* * *} \\ (0.441) \end{gathered}$ | $\begin{gathered} 4.551^{* *} \\ (0.298) \end{gathered}$ | $\begin{gathered} 5.151^{* * *} \\ (1.166) \end{gathered}$ | $\begin{gathered} 5.055^{* * *} \\ (0.407) \end{gathered}$ |
| Pseudo R ${ }^{2}$ | 0.05 | 0.05 | 0.24 | 0.13 |
| Observations | 1294 | 1294 | 1294 | 1294 |
| Likelihood ratio test (chi square) | 103.37*** | 99.90*** | 513.64*** | 277.42*** |
| Marginal effects of the support of women for the quantitative reduction of services |  |  |  |  |
| h3=1 | -0.055** | -0.056** | -0.062*** | -0.047** |
|  | (0.023) | (0.023) | (0.021) | (0.022) |
| h3=2 | 0.031** | 0.032** | 0.033*** | 0.027** |
|  | (0.013) | (0.013) | (0.012) | (0.013) |
| h3=3 | 0.024** | 0.024** | 0.029*** | 0.019** |
|  | (0.010) | (0.010) | (0.010) | (0.009) |
| Standard errors in parentheses: ${ }^{* * *} \mathrm{p}<0.01,{ }^{* *} \mathrm{p}<0.05,{ }^{*} \mathrm{p}<0.1$ |  |  |  |  |

Appendix

Table A. Description of the used sample and the underlying population of local politicians

|  | Description of the sample |  |  | Description of the population |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Total | Percentage of men | Percentage of women | Total | Percentage of men | Percentage of women |
| Total count | 1439 | 70\% | 30\% | 7458 | 64\% | 36\% |
| $\begin{array}{\|rl} \hline \text { Age } & \\ - & 18-25 \\ - & 26-35 \\ - & 36-45 \\ - & 46-55 \\ - & 56-65 \\ - & >66 \end{array}$ | $\begin{gathered} 3 \% \\ 13 \% \\ 21 \% \\ 30 \% \\ 25 \% \\ 10 \% \end{gathered}$ | $\begin{array}{\|l} 58 \% \\ 68 \% \\ 68 \% \\ 68 \% \\ 73 \% \\ 79 \% \end{array}$ | $\begin{gathered} 42 \% \\ 32 \% \\ 32 \% \\ 32 \% \\ 27 \% \\ 21 \% \end{gathered}$ | $4 \%^{b}$ $13 \%$ $24 \%$ $31 \%$ $22 \%$ $7 \%$ | $\begin{array}{\|l} 48 \% \\ 55 \% \\ 60 \% \\ 63 \% \\ 73 \% \\ 82 \% \end{array}$ | $\begin{aligned} & 52 \% \\ & 45 \% \\ & 40 \% \\ & 37 \% \\ & 27 \% \\ & 18 \% \end{aligned}$ |
| Party <br> - Groen <br> - sp.a <br> - CD\&V <br> - N-VA <br> - Open Vld <br> - Vlaams Belang <br> - Local parties | $\begin{aligned} & 5 \% \\ & 11 \% \\ & 30 \% \\ & 27 \% \\ & 13 \% \\ & 2 \% \\ & 12 \% \end{aligned}$ | $\begin{aligned} & 73 \% \\ & 72 \% \\ & 61 \% \\ & 71 \% \\ & 74 \% \\ & 83 \% \\ & 81 \% \end{aligned}$ | $\begin{aligned} & 27 \% \\ & 28 \% \\ & 39 \% \\ & 29 \% \\ & 26 \% \\ & 17 \% \\ & 19 \% \end{aligned}$ | $\begin{array}{\|l} 2 \% \\ 6 \% \\ 26 \% \\ 21 \% \\ 10 \% \\ 3 \% \\ 32 \% \end{array}$ | $\begin{aligned} & 59 \% \\ & 68 \% \\ & 63 \% \\ & 61 \% \\ & 67 \% \\ & 66 \% \\ & 65 \% \end{aligned}$ | $\begin{aligned} & 41 \% \\ & 32 \% \\ & 37 \% \\ & 39 \% \\ & 33 \% \\ & 34 \% \\ & 35 \% \end{aligned}$ |
| $\begin{array}{cc} \text { Majority } \\ - & \text { Yes } \\ - & \text { No } \end{array}$ | $\begin{aligned} & 57 \% \\ & 43 \% \end{aligned}$ | $\begin{aligned} & 67 \% \\ & 74 \% \end{aligned}$ | $\begin{aligned} & 33 \% \\ & 26 \% \end{aligned}$ | $\begin{aligned} & 60 \% \\ & 40 \% \end{aligned}$ | $\begin{aligned} & 63 \% \\ & 64 \% \end{aligned}$ | $\begin{aligned} & 37 \% \\ & 36 \% \end{aligned}$ |
| Marital Status <br> - Single <br> - Living with a partner <br> - Married | $\begin{aligned} & 15 \% \\ & 15 \% \\ & 70 \% \end{aligned}$ | $\begin{aligned} & 67 \% \\ & 66 \% \\ & 71 \% \end{aligned}$ | $\begin{aligned} & 33 \% \\ & 34 \% \\ & 28 \% \end{aligned}$ | 1 | 1 | / |
| $$ | $\begin{aligned} & 76 \% \\ & 24 \% \end{aligned}$ | $\begin{aligned} & 71 \% \\ & 68 \% \end{aligned}$ | $\begin{aligned} & 29 \% \\ & 32 \% \end{aligned}$ | 1 | 1 | 1 |
| Education <br> - Secondary <br> - Bachelor <br> - Master <br> - PhD | $\begin{aligned} & 27 \% \\ & 36 \% \\ & 34 \% \\ & 3 \% \end{aligned}$ | $\begin{aligned} & 75 \% \\ & 64 \% \\ & 72 \% \\ & 83 \% \end{aligned}$ | $\begin{aligned} & 25 \% \\ & 36 \% \\ & 28 \% \\ & 17 \% \end{aligned}$ | 1 | 1 | 1 |

Figure B.1: Description of variable h1 by sex


Figure B.2: Description of variable h2 by sex


Figure B.3: Description of variable h3 by sex



[^0]:    ${ }^{\text {I }}$ Throughout this paper we use the word 'sex' to refer to the biological differences between males and females (in contrast to 'gender', which reflects socially constructed roles and expectations that cultures attribute to the male and female sex). We study the preferences of men and women based on their sex and not their gender identity; consequently, the term 'sex gap' rather than 'gender gap' is used to refer to differences between males and females.

[^1]:    ${ }^{\text {II }}$ The concept of 'interests' has been ubiquitous in debates on representation ever since the classical contribution of Pitkin (1967). Differentiating interests across social groups is thereby effectively perceived as a means to concretize what various groups hope to gain through political inclusion. For a more detailed discussion, see Pitkin (1967).
    ${ }^{\text {III }}$ This tendency of women to be more left-leaning has often been linked to developments causing a change in the position of women in society (Manza and Brooks, 1998; Campbell and Childs, 2014). The increase in divorce rates, the disproportional amount of time women spend caring for children or elderly, and the increase of women in the workforce indeed tend to shift the dependency of women increasingly from men to state (Andersen, 1991; Manza and Brooks, 1998).

[^2]:    ${ }^{\text {IV }}$ We experimented with dichotomous operationalization of our dependent variables (and employed logit rather than ordered logistic regression techniques). The results were highly similar to those reported.

[^3]:    ${ }^{\mathrm{v}}$ Restricting the analysis to only local income and local property taxes did not substantially change our results.

[^4]:    ${ }^{\mathrm{VI}}$ Extending the model with a quadratic term of Age - in order to capture possible non-linearities in its effect did not substantially change the results reported below.

[^5]:    ${ }^{\text {VII }}$ To be more precise, Ideology - taken from Deschouwer, Verthé and Rihoux (2013) - gives for each party the average self-reported placement by members of the local factions of that party. For the (six) parties that are organized nationally (regionally), these values are: Groen: 2,2; sp.a: 2,6; CD\&V: 5,5; Open Vld: 6,6; N-VA 6,7 and Vlaams Belang 9,3. Local parties were given a score 5. As an alternative for Ideology, we replicated the analyses using separate dummies for the major parties. This approach yielded qualitatively similar results (results available upon request).

[^6]:    ${ }^{\text {VIII }}$ All results reported below use unweighted data. As women are slightly under-represented in our sample, we also replicated the analysis by weighting observations according to the gender shares in local politics (to make the sample more representative). All results are robust to this alternative specification (details available upon request).

[^7]:    ${ }^{\text {IX }}$ Following the suggestion of an anonymous referee, we experimented with adding interactions between our sex variable and respondents' education, ideology and membership of the ruling coalition. The results suggest that the sex effect may be somewhat weaker among women with higher levels of education and those part of the ruling coalition. Still, as these findings lack robustness across model specifications, they should be treated with caution. The same lack of robustness arises also when looking at similar interaction effects for hypotheses 2 and 3 below, and will therefore not be discussed in detail (full results available upon request).

[^8]:    ${ }^{x}$ Different taxes give a different meaning to the ability-to-pay principle. The degree of implicit redistribution differs. Apart from this, Mahieu, Geys and Heyndels (2017) show that the Flemish local property tax incorporates an additional inequity due to a lack of systematic re-assessment of its tax base. An interesting question for further research is whether or not a sex dimension exists in attitudes towards such inequity. We thank an anonymous referee for this insight.

