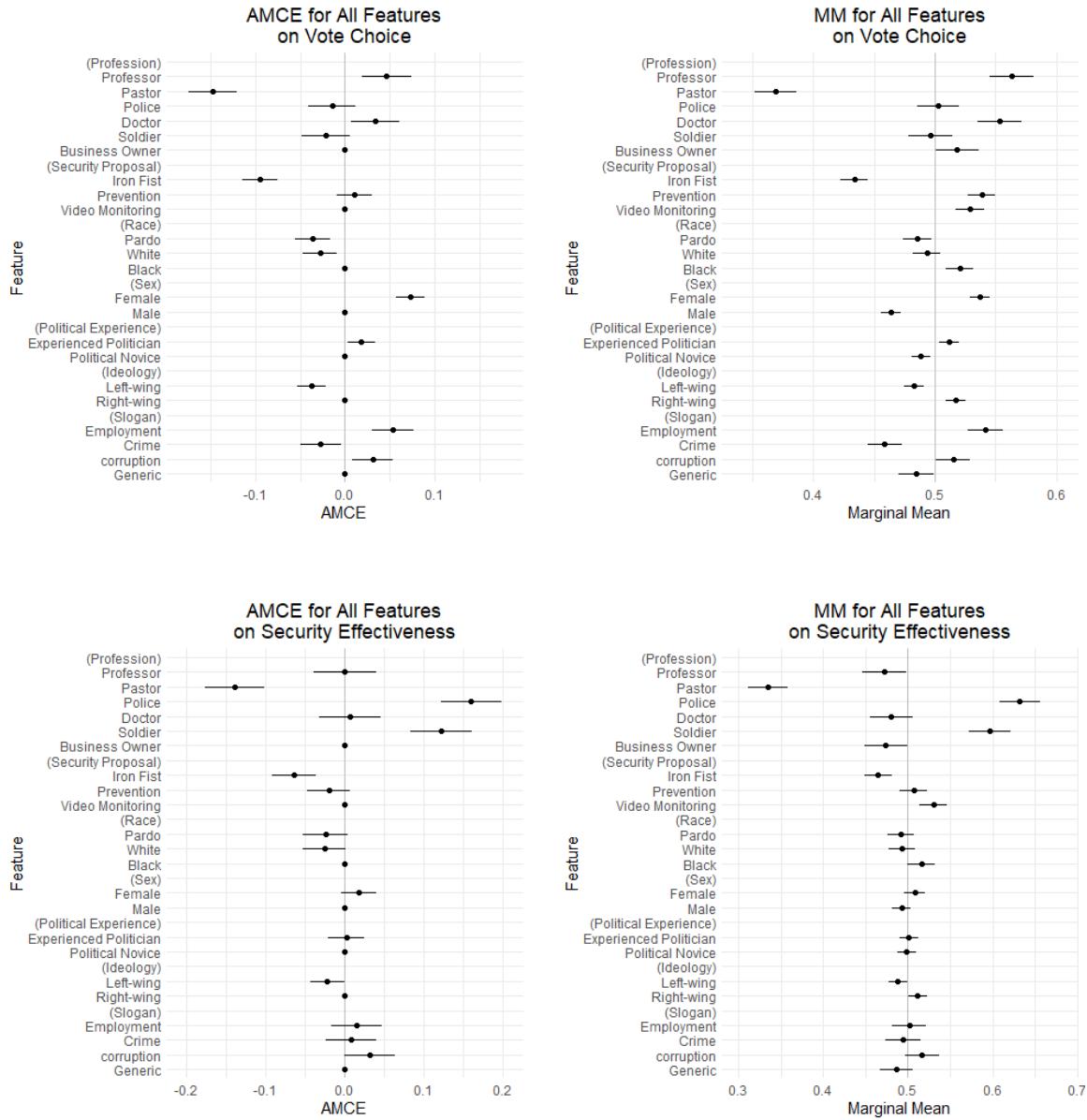


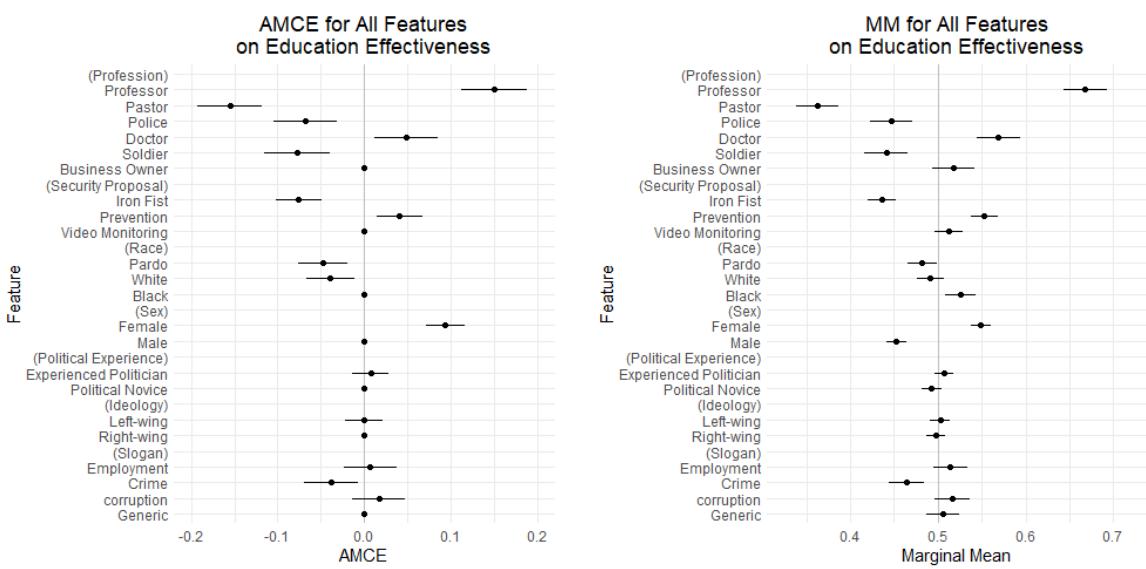
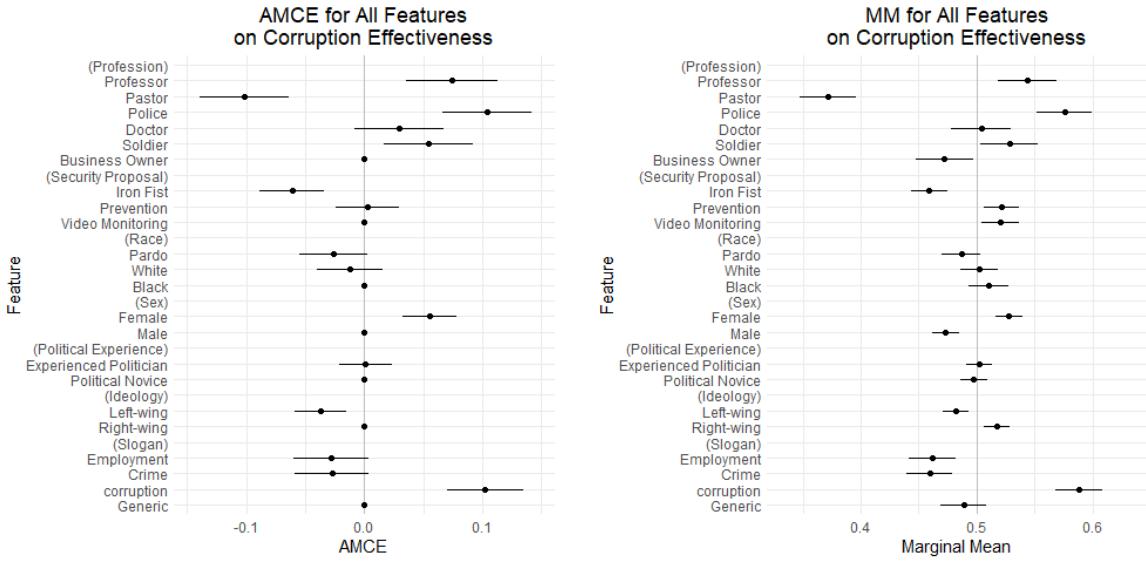
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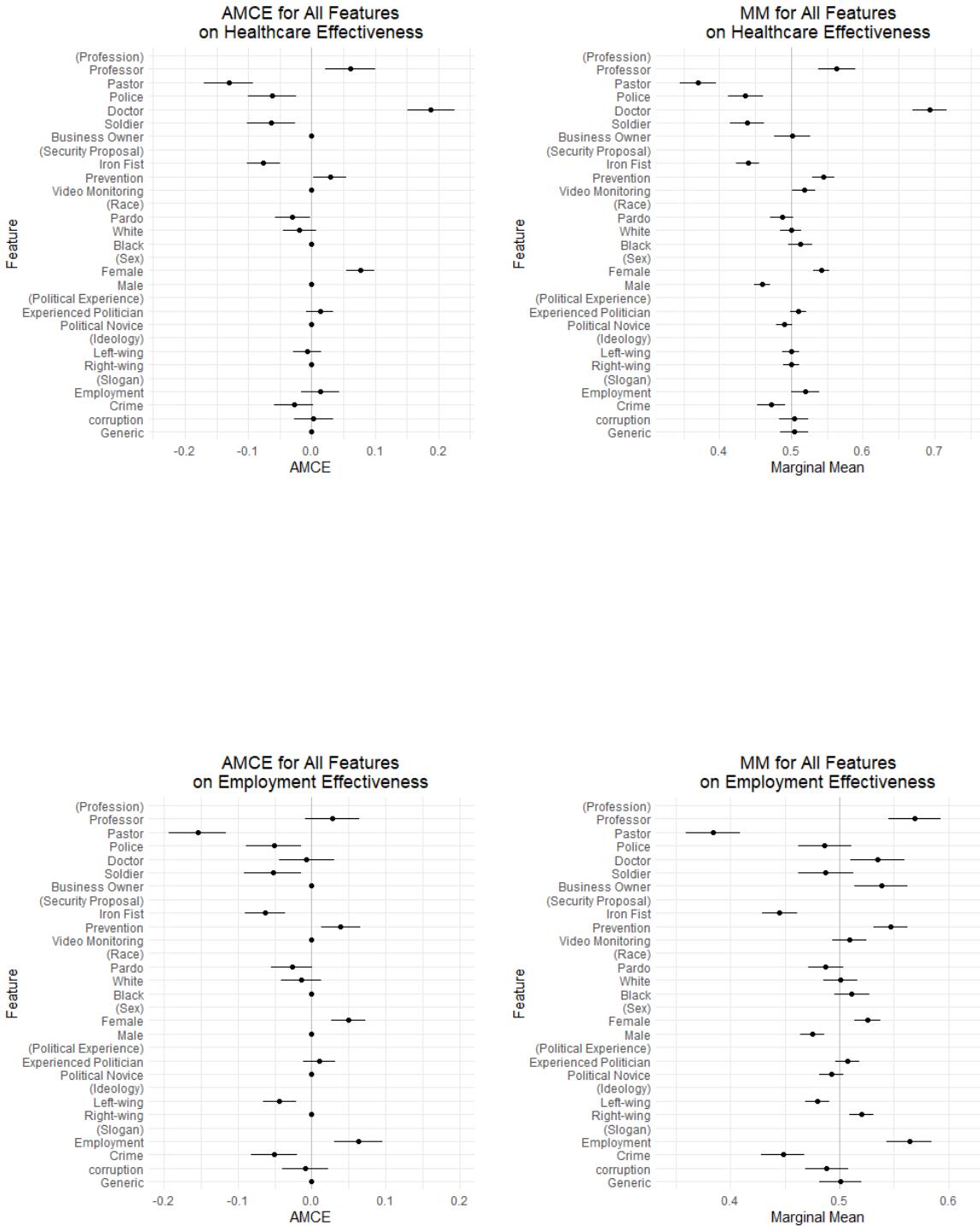
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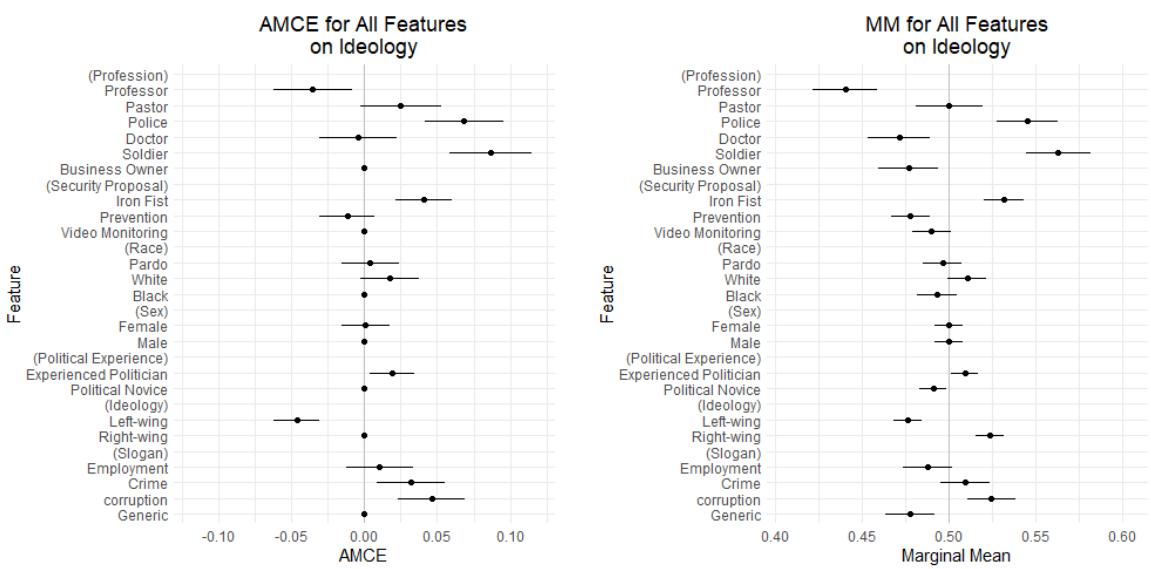
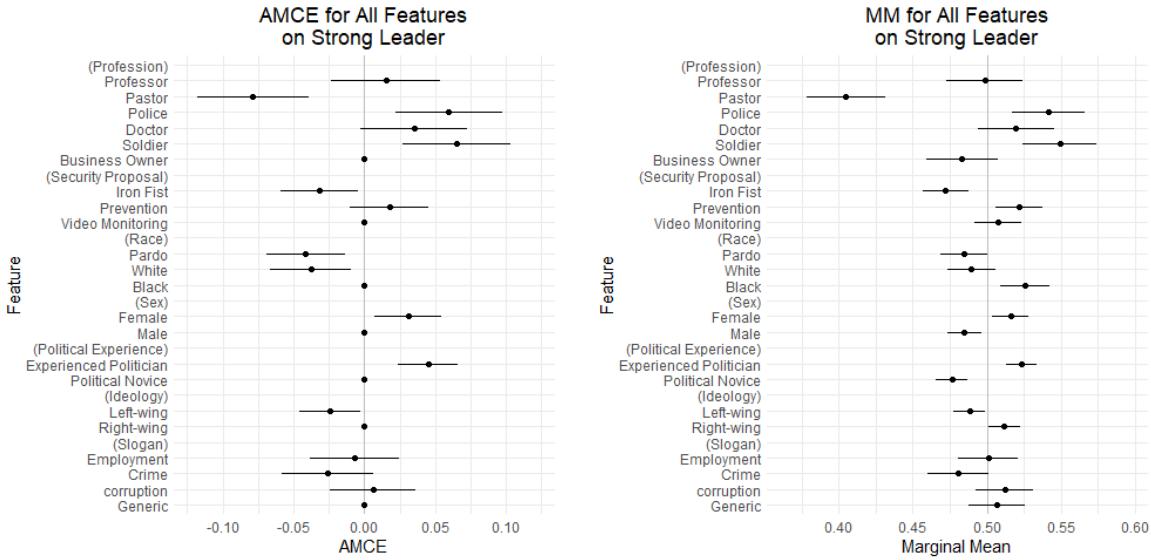
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Appendix A: Full Model Estimate











Appendix B: Experimental Levels

Slogan, Position, and Name Text

Level	Text
<i>Anti-crime Slogan</i>	Pela segurança dos nossos filhos! OR Por um Brasil seguro e sem crime! OR Vamos acabar com a insegurança! OR Trabalho para todos! OR
<i>Unemployment Slogan</i>	Vamos combater o desemprego! OR Pela criação de mais empregos! OR
<i>Corruption Slogan</i>	Vamos acabar com a corrupção! OR Chega de corrupção! OR Não aceito corrupção! OR
<i>Generic Slogan</i>	Por um novo Brasil! OR Vamos mudar o Brasil! OR Por um Brasil melhor! A gente voltará a sorrir!
<i>Left-Wing Economic Policy</i>	Vamos atuar no combate à pobreza e às desigualdades OR
<i>Right-Wing Economic Policy</i>	Menos imposto e mais eficiência é o nosso lema
<i>Iron Fist Security Policy</i>	Expansão da guarda municipal, fornecendo-lhe armamento de maior calibre OR
<i>Preventative Security Policy</i>	Expansão de programas de prevenção à violência, como, por exemplo, campanhas educativas OR
<i>Urbanist Security Policy</i>	Aumento de monitoramento por câmeras em espaços públicos e da iluminação pública
<i>Male Names</i>	Bernardo Teixeira OR Hector Amaral OR Joaquim Silveira OR
<i>Female Names</i>	Nicolas Duarte OR Rômulo Sampaio OR Danilo Gonzaga Cecilia Machado OR Isabella Nunes OR Jussara Barbosa OR Marcia Andrade OR Olivia Mendes OR Pietra Borges

Base Models

	Black		
Male			
Female			

	White		
Male			
Female			

	Pardo		
Male			
Female			

Costume Examples

<i>Executive</i>		<i>Professor</i>	
			
<i>Police</i>		<i>Soldier</i>	
			
<i>Pastor</i>		<i>Doctor</i>	
			

Appendix C: Description of Sample

Gender		
	Original Survey	IBGE
Male	50.8%	48.8%
Female	49.2%	51.1%

Source: IBGE Pesquisa Nacional por Amostra de Domicílios Contínua (PNAD)

Region		
	Original Survey	IBGE
North	10.6%	8.9%
Northeast	26.5%	26.7%
Southeast	40.7%	42.0%
Center-West	9.6%	7.9%
South	12.7%	14.8%

Source: IBGE Pesquisa Nacional por Amostra de Domicílios Contínua (PNAD)

Education		
	Original Survey	IBGE
None	1.0%	6.4%
Ensino Fundamental	10.8%	40.2%
Ensino Medio	46.8%	31.9%
Ensino Superior	30.5%	21.4%
Curso Técnico	10.7%	NA

Source: IBGE Pesquisa Nacional por Amostra de Domicílios Contínua (PNAD)

Age		
	Original Survey	IBGE
Mean	40.0	34.7
Median	37.0	36.5

Source: IBGE Pesquisa Nacional por Amostra de Domicílios Contínua (PNAD)

Race		
	Original Survey	IBGE
White	45.17%	47.5%
Black	12.39%	7.5%
Asian	1.17%	1.1%
Pardo	40.0%	43.4%
Indigenous	2.0%	0.4%

Source: IBGE Census 2010

Note: The survey allowed respondents to self-select into multiple categories. To simplify presentation, proportions represent all respondents who included each category in their response. This approach means that the “Original Survey” column does not sum to 100% and comparison with the IBGE values is not one to one. However, these proportions give a general sense of how racially representative the sample was, demonstrating that there were no extreme over or under-representations.

Appendix D: Pre-Analysis Plan

No Country for Criminals: Understanding Security Sector Candidates in Brazil Pre-Analysis Plan

Introduction and Overview

In 2018, Brazil elected Jair Bolsonaro, a relatively unknown politician who ran on a platform of anti-corruption, evangelism, and aggressive anti-crime rhetoric including a notorious phrase that came to define his campaign, *bandito bom é bandito morto* (the only good criminal is a dead criminal). While many right-wing candidates ran that year, and many attempted to capitalize on the anti-PT sentiment through anti-corruption messages, Bolsonaro was able to differentiate himself from the pack with this iron fist message that highlighted crime and criminality as one of the most salient problems facing Brazil and suggested violent and extra-legal solutions to the problem.

One important feature of Bolsonaro's candidacy and his subsequent government has been his connection with the security forces and other “specialists in violence” ([Funari, 2021](#); [Volkov, 2000](#)). Not only is Bolsonaro himself a former captain in the Brazilian army, but his vice president Hamilton Mourão is a general, pro-Bolsonaro factions in congress are populated with former military and police officers, and many cabinet officials have come from the security sector. The Bolsonaro family also has well-documented connections to several *milicias* of Rio de Janeiro who themselves are frequently police officers or have close connections to police officers ([Magaloni, Franco-Vivanco and Melo, 2020](#); [Funari, 2021](#)).

This blurring of lines between elected officials, state security agents, and armed non-state actors is a familiar phenomenon in the Americas from the “hybrid state” of Jamaica ([Jaffe, 2013](#)) to the “gray zone of criminality” identified between drug cartels and the security sector in Mexico ([Trejo and Ley, 2018](#)). Frequently, the police in Brazil are responsible for much violent crime ([Willis, 2015](#); [Bueno, 2014](#)) and are often perceived as highly corrupt and inefficient. However, despite low levels of trust in the security sector, political candidates with professional histories in the police and military, as well as punitive “iron fist” candidates have enjoyed electoral success in Brazil and across the Americas. Recent elections in the United

States have also demonstrated the cross-partisan appeal of security sector connections with military veterans enjoying electoral advantages in the Republican and Democratic parties ([Teigen, 2007](#)) and former police officer Eric Adams winning the 2021 Democratic nomination for mayor of New York City at the height of the Black Lives Matter and Defund the Police movements ([Fitzsimmons, 2020](#)).

This pre-analysis plan describes an online conjoint experiment to precisely identify the ways in which security sector connections affect voter perceptions of electoral candidates and how these perceptions interact with preferences influenced by the voter's local lived context. First, I derive a set of testable hypotheses based on the logic of voting heuristics ([McDer-mott, 2005](#)) and the literature on penal populism ([Fenwick, 2013; Campbell, 2008](#)). Next, I describe the image-based conjoint experiment to test these hypotheses and outline the estimation procedure for calculating the average marginal component effect (AMCE) and the marginal means. Finally, I describe additional considerations about questionnaire design and sampling.

Hypotheses

Understanding why voters choose to support candidates with security sector connections involves unraveling two interrelated processes. The first is that of preference formation. I suggest that voters develop preferences for criminal justice policy, style of governance, and certain dimensions of ideology based on the environments in which they live. Daily interactions with agents of the state such as police officers and public health workers and subjective evaluations of their performance influence individual attitudes toward the status quo and those who maintain it. While much of the information used to create these evaluations also comes from the media ([Bonner, 2018; Krause, 2014](#)), certain municipal or even neighborhood-level contextual features will have a strong impact on individual attitudes. As these variables cannot be manipulated experimentally, their influence will be explored primarily through companion observational investigations.

The second is how voters develop perceptions of electoral candidates. The literature on heuristics suggests that much of this process is a function of associations that voters make between certain sometimes superficial candidate characteristics and policy positions, atti-

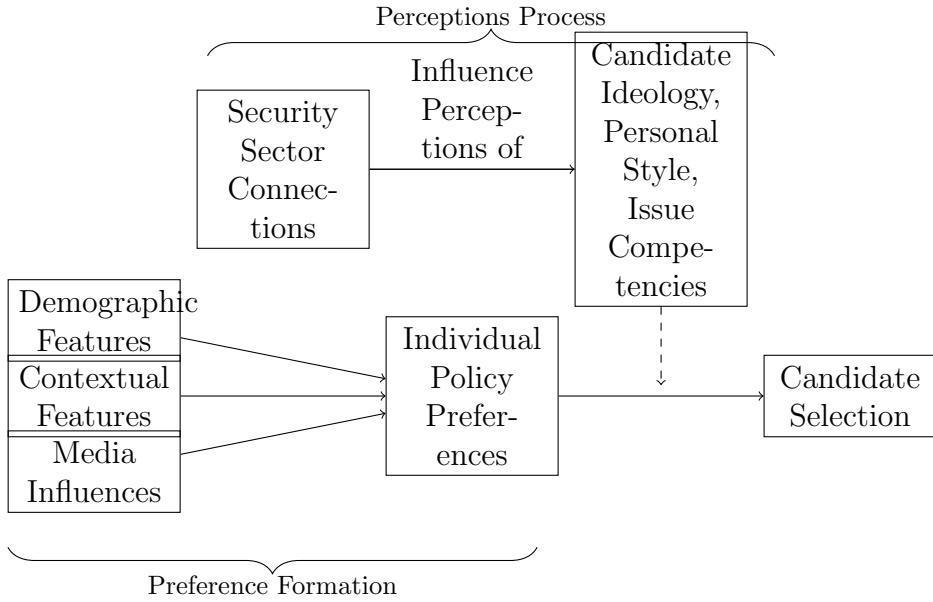


Figure 1: Basic theoretical framework

tudes, or style of governance. This is especially true in low information environments such as local elections with fragmented, inchoate party systems. I suggest that a candidate's occupation is likely to influence voter perceptions on aggregate about ideology, personal style, and issue competencies. This "perceptions process" is ideal for experimental study, as expectations surround an individual's reaction to an external stimulus, that of a candidate's occupation. This second process, measuring how voter evaluation of candidates along several different dimensions changes as a function of their occupation, is therefore the link where the current experiment will focus.

The hypothesized relationship between the two processes is summarized in Figure 1. This setup makes classic assumptions about voters such as that they are rational, policy-interested actors. That is, voters will select the candidate that most closely approximates their policy preferences. However, as much of these positions are unknown or unobserved, voters make significant inferences about candidate ideology, personal style, and issue competencies from candidate heuristics including a candidate's occupation. Therefore, while voters select candidates based on their policy preferences, their perception of which candidate best approximates their preferences is determined partly by occupational heuristics, including professional connections to the security sector.

This theoretical setup therefore operates at two levels: the level of preferences and the level of perceptions. The logic of heuristics and uncovering how voters use security sector connections to make inferences about electoral candidates is firmly contained in the perceptions process while the influence of contextual features is contained in the preferences process. First, I will identify some theoretical expectations of how voters perceive candidates with security sector connections, and how it might be a useful and relevant heuristic. Next, I will derive theoretical expectations for how context might influence preferences surrounding ideology, commitment to democracy, criminal justice policies, and issue salience.

Perceptions Process: Security Sector Heuristics

Given the frequency that police and military officers run for office in Brazil and the prominent positioning of their security sector connections in campaign materials (see Figure ?? for some examples), I expect that voters will use professional history in the military or police as a heuristic and that this heuristic will have a strong impact on how voters perceive a candidate's ideology and issue competencies.

First, in line with the literature on occupational heuristics, I expect for voters to trust candidates with professional histories with the security sector more on issue areas directly related to their professional experiences. Therefore:

H1a: Respondents will rate candidates with security sector connections as more competent on security-related issues

H1b: Respondents will rate candidates with security sector connections as equally competent on non security-related issues

H1c: Respondents will rate candidates with security sector connections as stronger leaders

While voters are expected to use security sector connections as a heuristic specific to security and crime related issue competencies, I expect for much broader effects when voters use security sector heuristics for ideological cues. The reputation for military and police officers as right-wing should apply to ideological issues beyond criminal justice policies, and a history of military rule and police abuses should impact how voters perceive a candidate's commitment to democratic principles.

There are therefore two principal ways in which a security sector connection might be perceived as a meaningful heuristic for ideology. The first is the traditional left-right ideological scale. Several studies of the adoption of punitive criminal justice policies have emphasized electoral strategic concerns, advancing the idea that policing policies can serve as a useful valence issue to strategically move right without sacrificing ground on other economic or social policies. [Holland \(2013\)](#), for instance, suggests that left-wing parties can adopt a *mano dura* approach to criminal justice in order to tack to the center, seeking votes under a Downsian logic ([Downs, 1957](#)). [Block \(2019\)](#) similarly suggests that governors in Brazil allocate resources to the police at different levels depending on the electoral threat that they face. Right-wing governors might want to increase security spending to close off any challenge from the right while leftist governors might need to attract centrist voters in the face of a left-wing challenger.

In the absence of much detail about a candidate's spending priorities, a voter could reasonably infer security policy from a candidate's security sector connections. On average, voters might think that it is a safe assumption that candidates with security sector connections will prioritize spending on security and pursue punitive criminal justice policies. I also expect for voters to perceive "iron fist" messaging and policy positions as more credible when coming from a candidate with security sector connections. That is that perceptions of punitivism will increase when "iron fist" policies are proposed, but the increase in punitivism will be even greater when that candidate also has security sector connections. Criminal justice policy positions and security sector connections are therefore hypothesized to have an interactive relationship.

However, positioning on the crime-fighting dimension might have an impact on voter evaluations of other, not directly related policy issues. in this way, a left-wing police officer will be perceived as more moderate on all policy dimensions than an otherwise identical candidate without security sector connections.

I therefore expect for candidates with security sector connections to be perceived as more conservative on all issue areas than other candidates with identical stated policy preferences. This includes a more punitive approach to criminal justice, favoring increased funding for the police and expanding access to military-grade weapons, a more business friendly economic

policy, and traditional views on social issues such as abortion and gender roles (the so-called *ideologia de gênero*). Therefore:

H2a: Respondents will rate candidates with security sector connections as to the ideological right

H2b: Respondents will rate candidates adopting “iron fist” policies as more competent on security-related issues

Relatedly, I expect for candidates with security sector connections to be more credible with their public security appeals. This follows recent work that suggests that military and police officer members of congress are agenda setters on security policy. Voters and politicians alike seem to frequently defer to security sector professionals on these questions. The observable implication for this design is that security sector status interacts with iron fist criminal justice policies, strengthening the effect of adopting such policies.

H2c: The effect of adopting “iron fist” policies will be stronger for candidates with security sector connections

I also expect for interactive effects between security sector connections and both gender and race. The literature on female police officers suggests that they behave distinctly from their male colleagues, initiating fewer arbitrary traffic stops while confiscating just as much contraband ([Shoub, Stauffer and Song, 2021](#)), and are perceived differently by the citizens they interact with ([Córdova and Kras, 2020](#)). Since I expect for the police officer to represent a sort of “mirror” to the dominant society ([Bradford, Murphy and Jackson, 2014](#)), security competencies should be moderated by the race and gender of the officer. Therefore:

H2d: The higher ratings for candidates with security sector connections on security-related competencies will be lower for female candidates

H2e: The higher ratings for candidates with security sector connections on security-related competencies will be lower for non-white candidates

Next, given Brazil’s troubled history with military government and state repression, intimately intertwined with the police forces ([Willis, 2015](#); [Costa and Thompson, 2011](#); [Ahnem](#),

2007), I expect for security sector connections to strongly impact perceptions of the candidate's commitment to democratic norms and ideals.

H3: Respondents will rate candidates with security sector connections as less committed to democratic principles

The combination of voters perceiving security sector candidates as more capable on questions of safety and crime but less respectful of democratic values and norms suggests that there exists a trade-off in the minds of voters between these two values. That is that symbols and indicators of safety and effective crime fighting simultaneously suggest weaker democratic values. Qualitative work has suggested that such a trade-off mentality exists in Brazil (González, 2020; Caldeira, 2000; Caldeira and Holston, 1999) and the Philippines (Garrido, 2020), and survey evidence has demonstrated a similar concept in the United States where whether to limit civil liberties to combat terrorism is a salient question, and a sacrifice many are willing to make (Davis and Silver, 2004).

Of course, the trade-off between security and democracy does not necessarily exist, and basic liberal rights of the accused such as the right to due process and protections from arbitrary search are fundamental to maintaining the rule of law and guaranteeing security from state abuses. However, the important question for this analysis is not whether the trade-off exists in actuality, but whether voters commonly *perceive* it to exist.

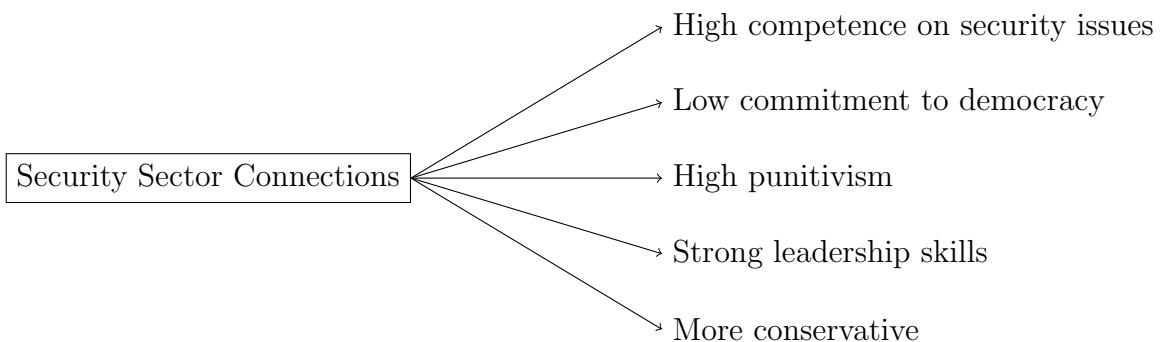


Figure 2: Aggregate changes in perceptions for a candidate with security sector connections

Preference Formation

While the experiment most directly simulates the “perceptions process” outlined in Figure 1, it can shed at least some initial light on the validity of the theorized process of preference formation too. In the context of security sector candidates, these preferences are likely influenced by preexisting attitudes about the organs of the state, drawn from day-to-day interactions with the police and other “street level bureaucrats”, local crime rates, public goods provision, and media reporting about police abuses.

Many voter preferences are at least partly determined by the context in which they live. A resident of a neighborhood occupied by a *Unidade de Polícia Pacificadora* (UPP) in Rio de Janeiro, for instance, might understand the appropriate role, capacities, and desirability of a police officer quite differently from other neighborhoods dominated by the *Comando Vermelho* (CV) or especially a neighborhood without much meaningful influence from armed groups ([Souza, 2019](#)).

Beyond concerns about physical security, [González \(2017\)](#) demonstrates that in certain low-resource and rural municipalities, the police are often the only visible or minimally functional organ of the local government, blurring the lines between what is and is not police work. In these zones, the police frequently distribute far more types of public goods than just public security. The police are sometimes involved in activities as diverse as conflict mediation, childcare and healthcare provision. This ever expanding role of the security sector into non-security activities was exacerbated during the Covid-19 pandemic where the military and police frequently enforced curfews, organized vaccination drives, and often administered the vaccines themselves.¹

These two contextual features likely shape the ways in which individuals process security sector connections, responding more favorably to candidates with security sector connections and their associated characteristics. I therefore expect to find heterogeneous effects on vote choice conditional on a respondent’s specific lived context. Specifically:

¹Recent events in Brazil complicate this proposed relationship, as military officers appointed to positions of power within the Bolsonaro administration have suffered a series of scandals for their poor performance in office, for example the Minister of Health Eduardo Pazuello who was forced to resign in March 2021 ([Cancian, 2021](#)). However, these high profile scandals involving military officers might not dislodge deeply held attitudes and beliefs surrounding the appropriate role of the security sector in politics.

H4: Respondents with high exposure to crime will be more likely to support security sector candidates

H5: Respondents with positive experiences with government employees will be more likely to support security sector candidates

H6: Respondents in municipalities with relatively higher police budgets will respond more favorably to security sector candidates

Experimental Design

While observational methods can shed light onto where security sector candidates run, how well they perform in these elections, and what contextual features correlate with emergence and performance, there remain several unanswered questions that cannot be satisfactorily answered through observational methods. These questions probe at the psychology of voting and the internal decision processes of voters. Since candidates with security sector connections are not randomly distributed across elections, observational data can only provide some initial suggestions about such micro-level questions. Experimental methods that randomly assign various stimuli to respondents are better suited to capture the individual-level effect that security sector connections have on a voter's decision making process.

To tell a more complete story with precise claims about why voters choose to support candidates with security sector connections, I will field a candidate choice experiment. The high "internal validity" of the experiment merged with the observational analysis presented in the above sections will maximize leverage on this question, demonstrating how security sector connections function in the minds of voters while also exploring how the phenomenon has unfolded in real life over time and space.

The Experiment

The experiment will follow the design of the conjoint experiment, popularly introduced to the field of political science in [Hainmueller, Hopkins and Yamamoto \(2014\)](#), though the conjoint's history in marketing and sociology research extends quite a bit further back ([Green and Rao, 1971](#); [Green, Krieger and Wind, 2001](#)). The basic setup of the conjoint experiment

Table 1

Feature	Levels
<i>Demographic Features</i>	
Race	Black, White
Gender	Male, Female
<i>Professional Features</i>	
Political Novice	Yes, No
Occupation	Police Officer, Military Officer, Doctor, Professor, Ambiguous
<i>Policy Features</i>	
Economic Policy	Lower Taxes, Expand Welfare
Death Penalty	For, Against
<i>Other</i>	
Slogan	Iron Fist, Unemployment, Social Justice, Generic

is to present experimental subjects with two profiles of products, or candidates, and ask them to select between the two. The products have several features, usually seven or fewer, which randomly vary between levels. In this way, the researcher can precisely and accurately estimate the independent effect that each feature has on a product's desirability, and also how features interact with one another. The experimental design is also flexible enough to probe heterogeneous effects (Leeper, Hobolt and Tilley, 2020).

This experiment will present respondents with two different candidates varying along several different features. See Table 1 for a description of the levels between which each feature will vary. To see the exact operationalization of each level, see the Appendix. The feature of most theoretical interest is *Occupation*, which will be used as a signal for security sector connections. Candidates with a previous job in the police or military will signal these connections through an occupational cue.

The name of the candidate will randomly vary between several common Portuguese names. The name should not have any effect on the outcomes of interest, but estimates including variables representing the different names will be estimated as robustness checks. Likewise, political party does not enter the theory, nor is it explicitly included in the list of features. However, mayoral candidates in Brazil are represented by a two-digit number that corre-

sponds with the party they registered with for that election. These numbers are nearly always included in campaign material. I include in the *santinhos* a randomly selected two-digit number selected from a list of numbers not currently registered to any political party. This will ensure that the *santinhos* are realistic, but also do not trigger any undesired party effects. Like the names, affiliation with these non-existent parties should have no effect on the outcomes of interest, but I will include them in additional models for robustness.

In order to break some of the correlation between security sector connections and certain policy dimensions, I include as separate levels both *death penalty*, a hot-button criminal justice issue in Brazil, and *economic policies*. Including these as separate dimensions allows for the existence of left-wing, and/or soft on crime police candidates which will enable the analysis to make specific claims about the influence of security sector connections independent of policy positions. While observational data does suggest that police candidates are more right-wing on average, the left-wing cop is not a mirage. In fact, just under 10% of police officer mayoral candidates ran with the leftist PSOL, PC do B, or PDT parties in the 2020 municipal elections and Martha Rocha, a high-profile and left-wing former sheriff, ran with the PDT and was competitive in Rio de Janeiro’s mayoral election ([O Globo, 2020](#)).

The other advantage to including criminal justice policies as features completely independent of occupation is that the design will be able to fully identify interactive effects between them. If “iron fist” messaging is only credible from a candidate with security sector connections, for instance, then the coefficient for the effect of interaction between the criminal justice policies and being a police officer on punitivism should be positive. If only certain kinds of candidates can credibly make certain appeals, or if being a police officer can compensate for “soft on crime” policies, then it is important to be able to estimate these interactive effects. The information in this experiment will be presented primarily with images. While most candidate choice experiments have conveyed information to respondents in table or vignette form, (e.g. [Hainmueller and Hiscox, 2006](#); [Teele, Kalla and Rosenbluth, 2018](#); [Horiuchi, Smith and Yamamoto, 2020](#); [Kirkland and Coppock, 2018](#); [Mummolo, Peterson and Westwood, 2019](#); [Carnes and Lupu, 2016](#)), tables and vignettes are highly artificial ways of communicating information about political candidates. Political campaigns rarely publish such tables summarizing their positions relative to their opponents. This experiment will therefore

present the relevant information in a manner that approximates the ways in which voters actually absorb political information as closely as possible. Examples of conjoint experiments attempting to mimic political advertising include Poertner (2020), who presents respondents with handbills, Krupnikov, Piston and Bauer (2016), who creates fictional campaign websites, and Teigen (2013) who uses television ads from a real candidate modified to emphasize or omit their veteran status.

This experiment will present voters with information in the form of the *santinho*, handbills commonly distributed during elections in Brazil. This form of political advertising will be familiar and understandable to respondents, as they might be offered dozens over the course of a single day during the height of election season. The other advantage to displaying the information in a *santinho* is that its visual nature allows for a very high density of information. Nearly all biographic information about the candidate (race, gender, occupation) will be absorbed nearly instantly and simultaneously by the respondent simply by looking at the candidate photo and without reading a single word. See Figure 3 for a possible pair of *santinhos* that a respondent might see during the experiment. To further aid the transmission of information, short vignettes repeating certain vital information will be displayed underneath the images.

To match the theoretical framework, the experiment will measure several outcomes to analyze the perception process and how perceptions of candidates interact with preferences to predict vote choice. Therefore, while respondents will be asked to select between pairs of candidates to support in a hypothetical election, they will be asked separately to select between pairs of candidates along other theoretically interesting dimensions including respect for democracy, left-right ideology, leadership, and issue competencies.

The flow of the survey will be as follows: first, all respondents will be asked about vote choice, i.e. *which of these candidates would you be most likely to vote for in a mayoral election?*. This will measure preference and provide estimates for how much security sector professions influence vote choice relative to otherwise identical candidates on average across the entire sample.

Next, respondents will answer a couple of questions to prime them to think about policy issues. They will then be asked to evaluate the same six candidates on their perceived



(a)

(b)

Figure 3: Two examples of *santinhos*, showing a military officer and a professor. These *santinhos* differ along race, profession, and political experience but share gender, slogan, and economic policy.

competency on three dimensions: public security, healthcare, and municipal finances. The six candidates will be shuffled so that they are comparing three distinct pairs.

Next will follow questions to prime them to think about left-right ideology. They will then rate the same six candidates on the left-right ideological scale, i.e. *which of these candidates would you consider to be more on the “right”?*

Finally, respondents will answer questions to prime them to think about democracy.

Estimation Procedure

This experiment will measure four separate outcomes: left-right ideology, vote choice, issue competency, and democratic ideology. Modeling procedures for each outcome will be equivalent. The main quantity of interest estimated from the experimental data will be the average marginal component effect (AMCE) which represents the marginal effect of any given attribute averaged over the joint distribution of the remaining attributes (Hainmueller, Hopkins and Yamamoto, 2014). That is to say, the expected change in the outcome variable

for a change from a pre-defined reference level of a certain feature to another level.

Since profiles are generated under full randomization, the AMCE can be estimated using a non-parametric difference in means estimator as outlined in [Hainmueller, Hopkins and Yamamoto \(2014\)](#). That estimator, for attribute l from N respondents rating J profiles in K selection tasks is:

$$\hat{\pi}_l(t_1, t_0, p(\mathbf{t})) = \frac{\sum_{i=1}^N \sum_{j=1}^J \sum_{k=1}^K Y_{ijk} \mathbf{1}\{T_{ijkl} = t_1\}}{n_1} - \frac{\sum_{i=1}^N \sum_{j=1}^J \sum_{k=1}^K Y_{ijk} \mathbf{1}\{T_{ijkl} = t_0\}}{n_0}$$

Where n_d is the number of profiles where $T_{ijkl} = t_d$, Y_{ijk} is the outcome for the ijk^{th} profile, and $\mathbf{1}\{\cdot\}$ is the indicator function.

For the aggregate effects outlined in $H1$ through $H3$, this estimator will provide a sufficient test. See Table 2 for a summary of expectations and estimators for each of these hypotheses.

Hypothesis	Attribute	Outcome Variable	Expected Direction
$H1a$	Police/Military	Security Competence	(+)
$H1b$	Police/Military	Other Competencies	(No Effect)
$H1c$	Police/Military	Leadership	(+)
$H2a$	Police/Military	Ideology	(Right)
$H2b$	Iron Fist Message	Security Competency	(+)
$H2c$	Iron Fist Message \times Iron Fist Message	Security Competency	(+)
$H2d$	Police/Military \times Female	Security Competency	(-)
$H2e$	Police/Military \times Race (non-white)	Security Competency	(-)
$H3$	Police/Military	Democratic Ideology	(-)

Table 2

The heterogeneous effects outlined in $H4$ through $H6$ require a slightly different estimation strategy, as they represent hypotheses about subgroup preferences. Since the AMCE is an estimate of the marginal effect of a profile containing a certain level of a feature, differences in AMCE represent differences in that marginal effect. For example, the difference in AMCE for a candidate being a police officer between respondents living in high-crime municipalities and low-crime municipalities would represent the difference in the *marginal effect*, but not base favorability, which $H4$ proposes should be higher in high-crime zones. The solution

is to estimate the *marginal means* for each attribute within each subgroup of interest and compare the magnitude of these estimates (Leeper, Hobolt and Tilley, 2020).

See Table 3 for a summary of the expected results for these hypotheses.

Hypothesis	Subgroup Definition	Outcome Variable	Expected Relationship
H_4	Municipal Crime Rates	Vote Choice	Positive
H_5	Police Legitimacy	Vote Choice	Positive
H_6	Police Budgets	Vote Choice	Positive
H_8	Urban	Vote Choice	Negative
H_7	Respondent Race (non-white)	Vote Choice	Negative

Table 3

If the difference in marginal means between the subgroups is statistically significant and in the expected direction, then I will consider this confirmatory evidence. As outlined above, this subgroup analysis is not fully experimental, as the subgroup assignments are not random and not controlled by the researcher, but the analysis does provide some fine-grained observational evidence that will link with macro-level observational studies of aggregate voting behavior at the voting district and municipal level.

Questionnaire Design and Sampling

Questionnaire

In order to keep the mental burden on the respondent to a minimum, the questionnaire will be kept as short as possible, measuring only the concepts that are most important to the theory as well as certain demographic features that will be important controls in the model. The survey instrument will measure several concepts important to the theory. First, it will measure ideology, understood along several different dimensions. The questionnaire features a battery of questions to measure economic ideology, understood as the proper role of the state in economic activity, democratic ideology, understood as the desirability of democratic government, and punitive ideology, understood as valuing the rights of the accused. I expect to find heterogeneous effects for issue competencies and vote choice dependent on the ideology of respondents.

The next concept that the questionnaire will measure is a respondent's contact with the police

and other agents of the state. The theory expects for this personal experience to mediate a voter’s response to the security sector heuristic for the support and trustworthiness outcomes where respondents with positive evaluations of the police and other state agencies being more likely to see an increase in support for a candidate due to a security sector connection.

Finally, the questionnaire will place the respondent in their lived physical context. I will follow two complementary strategies to do this, an “objective” approach that will measure the respondent’s exact location as precisely as possible and a “subjective” approach that will measure a respondent’s perceptions of the environment in which they live. These two measures will allow for me to test the contextual features of the theory, examining simultaneously how context influence the process of preference formation and whether the security sector connections heuristic has a stronger effect in certain contexts.

The “objective” strategy will infer contextual characteristics from the physical location of respondents. This information will be captured from two sources. First, in the battery of demographic questions asked at the end of the survey instrument, respondents will be asked to name the state, municipality, and postal code (*Código de Endereçamento Postal* [CEP]) where they live. This level of information will pair the respondent with certain geographic features such as past electoral results, crime rates, and local government budgets at a very fine level without compromising anonymity.

Second, the Qualtrics platform provides approximate geographic coordinates for each survey respondent based on either GPS data for a GPS enabled device or an estimate based on a database of IP addresses. According to Qualtrics documentation, the coordinates are not precise enough to identify specific individuals, sacrificing little to no anonymity. However, these coordinates will provide an idea of where an individual respondent is that is generally more specific than asking for their city and state. The coordinates provided by Qualtrics will serve as validation for the question-based location measures as well as an alternative measurement strategy.

However, two related critiques can be leveled at this “objective” strategy. The first is that people generally gather information about their communities from the media, especially when it comes to politics and “law and order” issues (Krause, 2014; Bonner, 2009). Citizens may not be as influenced by what is actually happening in their neighborhoods as they are

by what they see in the news media, which has an incentive to over-emphasize those stories which are sensational and newsworthy ([Jewkes, 2011](#)).

Partly for this reason, studies have shown that average citizens have a pretty bad sense of how the way things are in their communities. For example, residents have been shown to be quite bad at estimating crime rates in the country as a whole and in their neighborhoods. What is unarguably most important for predicting attitudes and behaviors is how citizens *perceive* the world around them, not necessarily how it looks in reality. The “objective” conditions must first be perceived and interpreted by individuals. It is therefore worthwhile to try and measure these mental states directly rather than only relying on the objective indicators to describe an individual’s lived context.

Both strategies together will help validate one another, and any difference in inferences between the two strategies will provide additional information about how citizens perceive the world around them and the link between objective conditions on the ground and subjective perceptions of that reality.

Sampling

Sampling will be conducted by the online survey firm Netquest. Netquest maintains a panel of around 300,000 respondents across all municipalities in Brazil and is able to construct nationally representative samples from this panel. In order to guarantee variation along the contextual variables of greatest theoretical interest, I will work with Netquest to build a sample stratified by rurality and crime rates with the municipality being the primary sampling unit.

Simultaneously, I will build a separate sample through a Facebook ad-buying campaign ([Samuels and Zucco, 2013](#); [Zhang et al., 2020](#); [Brickman Bhutta, 2012](#)). The campaign will follow the same sampling structure as the Netquest sample, targeting the same municipalities, allowing for comparisons between the sampling techniques.

Conclusion

The experiment outlined in this plan will provide experimental evidence to understand how voters perceive electoral candidates with security sector connections. Military veterans are a persistent feature of many electoral systems ([Teigen, 2018](#)), and observational evidence suggests that the number of military and police officers contesting local elections in Brazil has increased dramatically since 2012. To understand why these candidates run, why they are successful, and what the implications are for democracy and governance, it is important to first understand how voters conceptualize their choice when presented with a candidate from the security sector.

This plan outlines a preliminary theory about how security sector connections affect perceptions of electoral candidates along several dimensions including issue competencies, ideology, and respect for democracy. It then describes an experimental design to capture these effects, improving on previous text-based experiments with an image-based conjoint setup. Finally, it clearly defines its empirical expectations and how potential results fit into a larger line of inquiry into the presence of security sector candidates in Brazilian elections.

PAP Appendix: Conjoint Levels

Feature	Level	Visual Stimulus	Text Stimulus
<i>Biographic</i>			
Race	Black Pardo White	Race of actor Race of actor Race of actor	None None None
Gender	Male Female	Gender of actor Gender of actor	Implicit (pronouns, gendered language etc.) Implicit (pronouns, gendered language etc.)
Occupation	Police Officer Military Officer Doctor Professor Ambiguous	Title, Costume Title, Costume Title, Costume Title, Costume Absent title, Costume	“[CANDIDATE] is a police officer...” “[CANDIDATE] is a captain in the army...” “[CANDIDATE] is a doctor...” “[CANDIDATE] is a professor...” “[CANDIDATE] is a candidate...”
Political Novice	Yes No	“Novas ideias na prefeitura” “Seix anos de experiência na Assembleia Legislativa”	“...has no previous political experience” “...has six years of experience in the state legislature”
<i>Criminal Justice Policies</i>			
Death Penalty	For, Against	Iron fist slogan	“...favors capital punishment”

Feature	Level	Visual Stimulus	Text Stimulus
<i>Other Policies</i>			
Economic Policy	Reduce State Involvement Expand Welfare	“Menos imposto e mais eficiência é o nosso lema” “Vamos investir em programas de assistência social para acabar com a pobreza”	“...favors lower taxes and privatizing public companies” “...favors expanding welfare and direct cash transfers”
<i>Other</i>	Slogan	Iron Fist	“Bandido bom é bandido morto! Vamos acabar com a inseguurança” “Por um Brasil melhor! A gente voltará a sorrir!” Social Justice
			[Iron fist criminal justice Policies] None [Non-iron fist criminal justice policies]

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