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Populism

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Abstract

In their pursuit of being elected, politicians might not provide their constituents with independent viewpoints, but just try to outguess popular opinion. Although rational voters see through such populism, candidates can not resist resorting to it when the spoils of office are too large. For an intermediate parameter range, both populism and its opposite, "candor", can be sustained as equilibria. This means that the public's trust or distrust in politicians may be self-fulfilling prophecies. Importantly, the *more* informed politicians are about public opinion, the more likely it is that populist behavior can be avoided.

Keywords: Popular opinion, electoral competition, candidate motivation, pandering, political trust.

JEL Classification: D72, D82.

Democracy thrives on popular support and withers in its absence.

– David Easton (1965)

Populism *A political strategy based on a calculated appeal to the interests or prejudices of ordinary people.*

– The Collins English Dictionary (2000)

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1 Introduction

Originally denoting members of The People's Party – an agrarian movement formed in the US in 1890 – the term populist now broadly refers to any politician or political party that, regardless of ideological bias, conforms to popular opinion in order to gain political advantage. By definition, populist policies appear favorable for significant factions of the electorate ("ordinary people"), but are inferior, since they are not chosen on basis of all available information.[1]

Although populist tendencies seem to be present in all democracies, in certain environments a political climate forms where politicians resort to demagoguery, and suppress any concerns about efficiency or sustainability.[2] One of the most long-lived instances of deficient political cultures is the "classic" (left-wing) populist doctrine, which prevailed in Latin America from the Great Depression until well in the 1990s. In country after country, protectionism, reckless deficit spending and macroeconomic expansion led to hyperinflation and economic crisis. Dornbush and Edwards (1991, p. 12) laconically conclude that "although the final outcome of these experiments was not always the total collapse and destruction of the economy (as in Chile, Peru, and Nicaragua, for example), in all cases there were disastrous effects for those groups who were supposed to be the beneficiaries of the policies."

The question is how to explain these and other self-destructive policy experiments in a world where voters are bestowed with rational expectations.[3] "Ordinary people" may certainly be poorly informed about the long-term consequences of different policies, but this does not imply that they will be biased towards politicians that adopt poor policies. Alternatively put, uninformed but rational voters will know better than to put

[1] An alternative term is "opportunism", but this usually refers to inefficient policy measures taken by incumbents, such as in models of political business cycles (see, e.g., Nordhaus 1975 and Rogoff 1990). A more recent term is "pandering" (see Canes-Wrone et al. 2003). For a synthesis of the various connotations of "populism", see Canovan (1981). Canovan's own terminology comprises seven categories, where the current definition corresponds best to what she denotes "politicians' populism".

[2] See Hillman and Swank (2000) for a discussion of the significance of political cultures.

[3] Although Dornbush and Edwards (1991, p. 8) assert that they have "no doubt...about the sincerity of the policymakers who embarked on these programs", Alberto Alesina expresses a different view (p. 42 in the same volume): "Why is it that certain countries keep repeating the same 'mistakes' and never learn? In fact, once the political and institutional incentives and constraints are taken into account, policies that appear to be mistakes are perfectly rational responses to distorted or imperfect political incentives."

much faith in their own (and thus any populist's) unreliable opinion. By consequence, a politician known just to submitting to popular belief will be punished in terms of election chances. The ultimate question is then why politicians would ever resort to populist behavior; why, to paraphrase Wittman (1989), do not political entrepreneurs emerge and provide the information to voters, win office, and reap both the direct and indirect returns of holding office?

In this paper I employ a stylized model of electoral competition to explore the populist phenomenon. A number of candidates are about to formulate their policy platforms. The efficiency of a given policy depends on the state of the world, which is unknown, but candidates and voters have some private information on what the best policy would be. In addition, the candidates have (imperfect) information on what voters think, for example through opinion polls. Upon observing the candidates' policy proposals, voters use their own information to assess their respective qualities and then elect the candidate with the best (expected) policy. While voters are solely concerned with policy quality, candidates are also motivated by office rewards, whose size are common knowledge.

To focus on informational aspects, I assume that voters have common interests and can be modelled by a representative voter. This does not necessarily mean that partisan conflict is absent, but that informational quality is pivotal for the electoral outcome. (For example, all candidates may have equally many partisans that vote for them irrespective of policy choice.)

My results are as follows. I classify political environments in terms of the importance of office spoils relative to policy concerns. I show that when the spoils of office are large, politicians will not adopt high-quality policies as they are too tempted to mimic their constituents' opinion. However, since voters anticipate this behavior, populist behavior constitutes a genuine commitment problem. Importantly, for a range of office spoils, both populism and its opposite, "candor", are self-fulfilling expectations. This means that, once a reputation for populism has been established, politicians and voters may be stuck in a Pareto-inferior equilibrium. Hence, in contrast to Easton's (1965) classic input-output model of political performance, voter satisfaction will be low because they

have *low* expectations on the system's output, not high ones.

The voter's proficiency has ambiguous effects on welfare. More competent constituents comprise a better source of information for politicians, but may make populism inevitable as the temptation to mimic public opinion becomes stronger. Interestingly, the *more* politicians know about public opinion, the more likely it is that populism can be avoided. This result challenges the view that opinion polls are an instrument that *feeds* populist behavior (see, e.g., Mansfield 1994). Briefly explained, voters will judge a discrepancy between their own opinion and the proposed policy more harshly the lower is the precision of the policy. Hence, as long as voter opinion has some informational value, less knowledge of public opinion, not more, may impel the candidates to increase their election chances by shifting to populist behavior.

Several recent papers have studied politicians' incentives to conform to popular opinion in order to increase their election prospects (Harrington 1993, Canes-Wrone et al. 2001, Chiu 2002, Heidhues and Lagerlöf 2003).[4] However, all of these assume binary policy spaces and are therefore unable to capture the crucial component in the current paper: how voters use their own information to evaluate policy proposals. In Harrington (1993) an incumbent chooses between two policies whose economic effects will affect his election chances. The incumbent has private information on which policy is the more efficient, which may or may not coincide with the (median) voter's prior belief. Harrington shows that the stronger is the voter's prior, and the more office-concerned is the incumbent, the more likely it is that the incumbent chooses policy according to the voter's prior despite this being the less efficient policy.

Other papers have demonstrated that politicians' opportunistic behavior (such as taking bribes or seeking rents) may be strategic complements, which, similar to the current model, may give rise to multiple equilibria, characterized by a "good" or "bad" political culture. (See Aidt 2003 for a recent survey.)

The model I employ owes much to Prendergast (1993). Prendergast shows that if superiors use subjective performance evaluation to reward workers, workers will tend to

[4]Somewhat less related is a series of papers that shows that imperfect knowledge of an agent's preferences may lead her to distort her messages in order to signal a certain bias – or lack thereof. See, e.g., Bernheim (1994), Cukierman and Tommasi (1998), and Morris (2001).

conform to their superior's opinion. In an electoral setting, "performance evaluation" is necessarily subjective since, arguably, constituents can hardly commit to vote for a candidate irrespective of how they perceive his or her policy platform.

Of course, in a partisan (Downsian) model where voters possess all policy-relevant information, basing policy on popular opinion would imply no inefficiency. Indeed, in such a world large office spoils are only desirable, as they pull politicians towards the (expected) median opinion among voters (Calvert 1985). Only in a world where politicians have a role as information sources is populist behavior detrimental to voters' welfare.

The remainder of the paper is organized as follows. Section 2 sets up the model and presents some fundamental results. Section 3 uses a log-linear specification and characterizes the set of perfect Bayesian equilibria in pure strategies. Section 4 performs comparative statics, and section 5 concludes. All proofs are in the Appendix.

2 The Model

There are a finite number n of political candidates, $i \in \{1, 2, ..., n\} = N$, that run for office. The candidates will independently present their policy platforms to the electorate, modeled by a single representative voter, v. A policy is a point on the real line, $p_i \in \Re$, and the candidate that wins the election is committed to implement her proposed policy.[5] After observing all policy proposals, the voter assesses their informational qualities and elects the candidate with the best (expected) policy. After the election the game ends.

To make the analysis tractable and put the focus on the role of voter expectations, I assume there are n independent policy dimensions and that the candidates (optimally) choose policies in different dimensions. For example, a policy may be thought of as a reform proposal on a certain issue (crime, pollution, tax policy, etc.), where each administration only manages one reform and where each candidate has a comparative advantage in pursuing one of the issues. The major benefit of making this assumption

[5] Without this assumption, electoral competition with forward-looking agents is difficult to model. Alesina (1988) relaxes it and studies to which extent (endogenous) reputational concerns serve as a commitment device.

is that the inference the voter makes about a certain candidate's policy will not be affected by other candidates' proposals. The policy dimensions are assumed equally important to the voter so that candidates are ex ante symmetric. The issues that are not subject to reform are assumed to continue with some status quo policy.

Utility The voter cares exclusively about policy quality, which depends on an unknown state of nature $\Pi = \{\pi_1, ..., \pi_i, ...\pi_n\}$. Specifically, let $\mathrm{b}(p_i) = \mathrm{E}[(p_i - \pi_i)^2]$ denote the expected squared bias (ESB) of policy p_i. The voter will simply elect the candidate whose policy he believes to have the smallest ESB.[6] Let I_v denote the voter's information set after observing all policy proposals. The ex ante probability that candidate i is elected is then

$$\Pr(\text{candidate } i \text{ wins}) = \Pr\left(\mathrm{b}(p_i \mid \mathrm{I}_v) < \min_{j \neq i \in N} \mathrm{b}(p_j \mid \mathrm{I}_v)\right). \tag{1}$$

Candidates care about policy quality – to some extent – but only on their own policy dimension. In other words, a candidate will only take policy quality into account conditional on the fact that she is elected.[7] In addition candidates are motivated by office spoils. I assume that candidates are symmetric w.r.t. to their motivations, and that the size of office spoils is common knowledge. Hence, this model is intended as a basis for comparisons across institutions rather than across individual candidates.[8]

Let $\lambda \in [0, 1)$ reflect the importance of office spoils, relative to that of providing high-quality policy. Candidate i's expected utility can then be modeled as

$$\mathrm{U}_i(p_i) = \Pr(\text{candidate } i \text{ wins})^{\lambda} * \mathrm{u}_i(\mathrm{b}(p_i))^{(1-\lambda)}, \tag{2}$$

where the policy utility function $\mathrm{u}(\cdot)$ is strictly decreasing in $\mathrm{b}(p_i)$.

Information structure The voter and candidate i both have private information

[6] In case of two or more policies having the smallest ESB, the voter randomizes and puts positive probability on each of these policies.

[7] This assumption simplifies the analysis considerably, and is fairly standard in the literature. See, e.g., Canes-Wrones et al. (2003).

[8] However, note that in a "citizen-candidate" world with unobservable motivation, those citizens that did choose to run for office would by definition be susceptible of having a lot to gain from winning it, and would suffer from a similar credibility problem to the one that arises in the current model.

on π_i. Specifically, candidate i gets a signal $\pi_i = \pi_i + \epsilon_i$, where ϵ_i is normally distributed with zero mean and variance σ_i^2, and the voter gets a signal $\pi_{iv} = \pi_i + \epsilon_{iv}$, where ϵ_{iv} is normally distributed with zero mean and variance σ_{iv}^2. In addition, candidate i gets a signal on the voter's information, $\pi_{iz} = \pi_{iv} + \epsilon_{iz}$, where ϵ_{iz} is normally distributed with zero mean and variance σ_{iz}^2. For example, this signal could represent surveys or opinion polls. I assume that all signals are conditionally independent, that their variances are positive and finite, and that their realizations are private information. All other aspects of the game are common knowledge. Candidates are ex ante symmetric so to spare on notation I will suppress the index i whenever possible and also, with some abuse of notation, refer to π as the state. I am ultimately interested in the perfect Bayesian equilibria (PBE) of this game in pure strategies, and in particular how the equilibrium set changes with λ.

The voter's updating The set I_v consists of two pieces of information, p and π_v, which the voter can use to form his ex post expectation of the state. Without loss of generality, assume that p is a convex combination of π_c and π_z, so that the policy is an unbiased estimate of the state. This must be optimal since candidates have some inherent interest in providing good policy alternatives.[9] It follows that the voter's ex post estimate of π is unbiased if and only if it is a convex combination of p and π_v. Let μ, $(1-\mu) \in [0,1]$ denote the weights of π_c and π_z in p, respectively, according to the voter's belief. Of course, in a PBE we require that this belief is correct.

LEMMA 1. The voter's expectation of the state is

$$\widehat{\pi} = \delta^- p + (1-\delta^-)\pi_v, \tag{3}$$

where δ^- is the minimum of 1 and

$$\delta^* = \frac{\mu\sigma_v^2}{\mu^2(\sigma_c^2+\sigma_v^2)+\sigma_z^2(1-\mu)^2}. \tag{4}$$

[9] Such a strategy is also weakly dominant in terms of election chances.

In the Appendix I show that $\widehat{\pi}$ has the least variance among all (unbiased) estimators. The slightly complex mapping in (4) is due to the interdependence between π_z and π_v. For example, if $\mu = 0$ the policy (supposedly) equals π_z. Since π_z is a garbled signal of π_v the voter should put no weight on p in his estimate, so that $\widehat{\pi} = \pi_v$. If $\mu = 1$ the policy exclusively reflects the candidate's independent information and we get the familiar result $\widehat{\pi} = \frac{\sigma_v^2 \pi_c + \sigma_c^2 \pi_v}{(\sigma_v^2 + \sigma_c^2)}$. For future reference, the following definition will be useful.

DEFINITION 1:

$$\mu_0 = \frac{\sigma_v^2 + \sigma_z^2}{\sigma_c^2 + \sigma_v^2 + \sigma_z^2}$$

$$\mu_1 = \frac{\sigma_z^2}{\sigma_c^2 + \sigma_v^2 + \sigma_z^2}$$

LEMMA 2: In any pure-strategy PBE, $\delta^- = \delta^* \in (0, 1)$.

Lemma 2 implies that in a pure-strategy equilibrium, when such exists, the voter always attaches some weight to his own opinion when forming his ex post expectation of the state. In turn this means that, since signals are normally distributed and variances are positive, the support for $\mathrm{b}(p \mid \mathrm{I}_v)$ is unbounded. That is, no matter how the candidate selects her policy, if she is unlucky the distance between p and π_v may be infinitely large. In addition, for policies that are convex combinations of π_c and π_z, $\mathrm{E}[\mathrm{b}(p \mid \mathrm{I}_v)]$ is positive and finite. Because this holds in equilibrium for all candidates $j \neq i$, candidate i's election probability, (1), is positive and continuously decreasing in $\mathrm{E}[\mathrm{b}(p_i \mid \mathrm{I}_v)]$.

The election function f_i: $\mathrm{E}[\mathrm{b}(p_i \mid \mathrm{I}_v)] \longrightarrow (0, 1)$ has no explicit functional form and must be solved numerically. In Figure 1 a candidate's election probability is plotted as a function of her policy's (perceived) quality, facing one, two, or three rival candidates. The more candidates that are present, the steeper is the curvature of the election function.

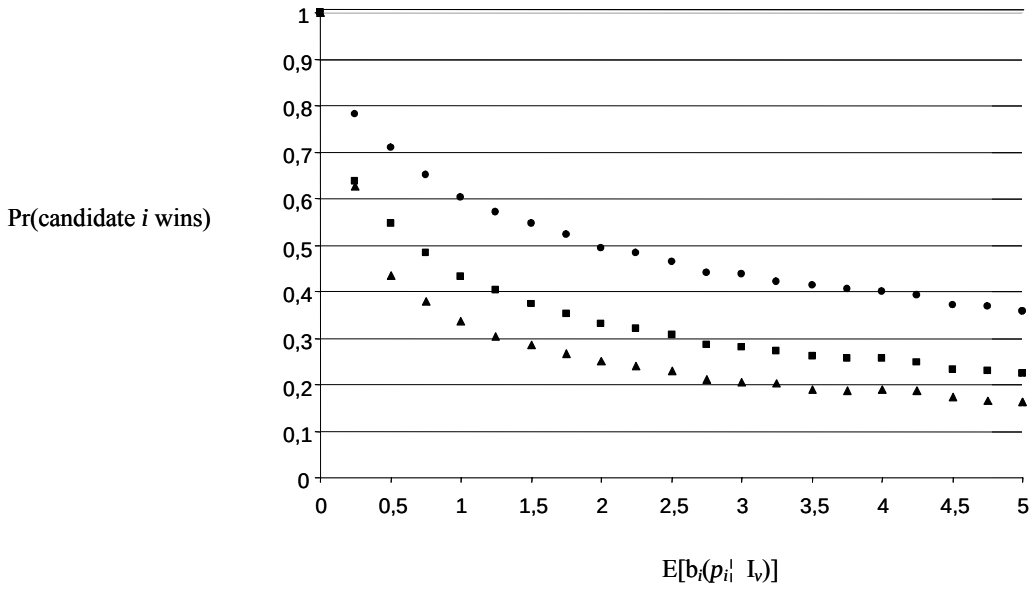

Figure 1. A candidate's election probability as a function of her policy's ESB – as assessed by the voter – facing one (•), two (■), or three (▲) other candidates, whose policies all have ESB = 2. Probability estimates are based on 10000 random draws.

The role of δ^*A policy's ESB conditional on the voter's information can be decomposed into two parts: the variance of $\hat{\pi}$ plus the policy's squared bias to $\hat{\pi}$. Using (3), the expected conditional ESB of a candidate's policy can be written as,

$$\mathrm{E}[\mathrm{b}(p \mid \mathrm{I}_v)] = \mathrm{Var}(\widehat{\pi}) + \mathrm{E}[(p - \widehat{\pi})^2] = \mathrm{Var}(\widehat{\pi}) + (1 - \delta^*)^2 \mathrm{E}[(p - \pi_v)^2]. \tag{5}$$

Two things are important to note. First, taking the voter's belief μ as given, $\mathrm{E}[\mathrm{b}(p \mid \mathrm{I}_v)]$, hence the candidate's election chances, only depends on the distance $|p - \pi_v|$. Everything else equal, the more a policy deviates from the voter's opinion, the more it deviates from $\widehat{\pi}$, and the lower is its assessed quality. For future reference, denote the expected squared deviation (ESD) between a policy and the voter's signal by $\mathrm{d}(p) = \mathrm{E}[(p - \pi_v)^2]$. Second, δ^* is a crucial variable, for it determines how sensitive election chances are to $\mathrm{d}(p)$; the lower is δ^*, the costlier it becomes to deviate from public opinion. Indeed, the way in which δ^* changes with parameters is key to the main results of the paper.

LEMMA 3: δ^* is

(i) decreasing in σ_c^2,

(ii) increasing in σ_v^2,

(iii) decreasing in σ_z^2,

(iv) increasing in μ in an open neighborhood around μ_1.

Recall that δ^* denotes the weight the voter attaches to the policy when forming his ex post expectation of the state. Intuitively, a less informed candidate (higher σ_c^2) or a more informed voter (lower σ_v^2) implies that this weight decreases. A less precise opinion poll (higher σ_z^2) means that, since the voter's signal itself is informative, the politician becomes less informed, why δ^* decreases. Part (iv) of Lemma 3 says that – as long as μ is not too large – δ^* is increasing in the voter's belief of how much weight the candidate put on her own signal when she formed p. Intuitively, the more information on π_c a policy contains, the more it adds to the voter's knowledge of π, why the weight of p in $\widehat{\pi}$ increases with μ.[10]

3 Equilibrium Analysis: A Log-Linear Specification

To reiterate, each candidate maximizes (2) given the voter's belief μ, given the parameters λ, σ_c^2, σ_v^2, and σ_z^2, and taking all other candidates' behavior as given. That is, each candidate maximizes

$$\mathrm{U}(p) = \mathrm{f}(\mathrm{E}[\mathrm{b}(p \mid \mathrm{I}_v)])^{\lambda} * \mathrm{u}(\mathrm{b}(p))^{(1-\lambda)}. \tag{6}$$

To get a closed-form solution to (6) and guarantee the existence of pure-strategy PBE for the entire range $\lambda \in [0, 1)$, I assume that both $\mathrm{f}(\cdot)$ and $\mathrm{u}(\cdot)$ are exponentially decreasing. In fact, as suggested by Figure 1, the election function can be approximated quite well by an exponential function, $\mathrm{f}(p) = \exp\left(-\alpha \mathrm{E}[\mathrm{b}(p \mid \mathrm{I}_v)]\right)$, $\alpha > 0$.[11] The larger is α, i.e.,

[10] However, when μ is sufficiently large a further increase makes the information in π_v relatively more useful, why δ^* decreases.

[11] For the three examples in Figure 1, exponential functions explained approximately 95%, 93%, and 92% of total variation for the case of one, two and three rival candidates, respectively (calculated over the range [0, 5] with grid 0.25). The intuition why the log-linear approximation works well is that

the steeper is the curvature of the election function, the more sensitive are election chances to a policy's (perceived) quality. Intuitively, α should be increasing in the number of competing candidates. By assuming that $\mathrm{u}(\cdot)$ also is an exponential function, $\mathrm{u}(p) = \exp\left(-\beta \mathrm{b}(p)\right)$, $\beta > 0$, (6) becomes a simple log-linear expression. Using (5) and normalizing α to 1, a candidate's expected log-utility becomes

$$\ln\ \mathrm{U}(p) = -\lambda \mathrm{Var}(\widehat{\pi}) - \lambda(1-\delta^*)^2 \mathrm{d}(p) - (1-\lambda)\gamma \mathrm{b}(p), \tag{7}$$

where $\gamma = \frac{\beta}{\alpha} > 0$.

Policy-concerned politicians If $\lambda = 0$ candidates are solely interested in presenting policy platforms of as high quality as possible, i.e., to minimize $\mathrm{b}(p)$, which also maximizes the voter's utility. The optimal policy is then

$$p_0 = \mu_0 \pi_c + (1-\mu_0)\pi_z,$$

which has ESB

$$b_0 = \frac{\sigma_c^2\left(\sigma_v^2 + \sigma_z^2\right)}{\sigma_c^2 + \sigma_v^2 + \sigma_z^2}.$$

In p_0 the signals π_c and π_z enter in inverse proportions to their respective variances. It is easily verified that p_0 has the smallest possible ESB.

Office-motivated politicians As λ approaches one, candidates become indifferent as to which policy is implemented, so long as they get elected. They will therefore minimize the policy's *perceive*d bias, i.e., the policy's ESD. The optimal policy is

$$p_1 = \mu_1 \pi_c + (1-\mu_1)\pi_z,$$

which has ESB

$$b_1 = \frac{\sigma_c^2\left(\sigma_v^2 + \sigma_z^2\right) + \sigma_v^4}{\sigma_c^2 + \sigma_v^2 + \sigma_z^2}.$$

the variance of $\mathrm{b}(p\ |\mathrm{I}_v)$ is strictly increasing in $\mathrm{E}[\mathrm{b}(p\ |\mathrm{I}_v)$, so the election probability decreases with $\mathrm{E}[\mathrm{b}(p\ |\mathrm{I}_v)$ at a slower and slower rate.

It can be seen directly that $b_1 > b_0$, i.e., the expected quality of an office-motivated candidate's policy is lower than that of a policy-concerned one's. In analogy with previous studies, a politician's desire to increase her election chances leads her to compromise the efficiency of her policy. However, since all parameters are common knowledge, the voter realizes whether a candidate is biasing her platform in this manner, and adjust his beliefs accordingly. Although p_1 (on average) better accords with π_v than does p_0, this is more than compensated for by the higher variance the voter (rationally) ascribes to $\hat{\pi}$, so that $\mathrm{E}[\mathrm{b}(p \mid \mathrm{I}_v)$ increases, and election chances decrease.[12] Hence, with rational voters, the incentive to conform to popular opinion must be self-defeating. However, when all politicians are driven by a similar desire, the consequence of populist behavior is poor policy quality.

The general case Due to the log-linear utility function, in a pure equilibrium the policy is always either p_0 or p_1. What is important however, is that the two equilibria coexist for a range of λ. The reason is that voter expectations are, to a certain extent, self-fulfilling (see part (iv) of Lemma 3). For example, if μ is small the voter should put a low weight on p in $\hat{\pi}$, which implies a small δ^*. The intuition is that a low weight on π_c implies that p contains little independent (i.e., useful) information, why the voter should rely more on his own signal. From the candidate's perspective, the probability that a given policy differs from $\hat{\pi}$ will now be higher, i.e., $\mathrm{E}[\mathrm{b}(p \mid \mathrm{I}_v)]$ increases. This can be seen in (7) as $\mathrm{d}(p)$ is multiplied by the factor $(1-\delta^*)^2$. By consequence, the candidate's incentive to decrease $\mathrm{d}(p)$, i.e., to increase the weight of π_z in p, becomes stronger as μ decreases – which indeed fulfills the voter's belief.

When lambda is close to zero, p_0 is the unique equilibrium, and when λ is close to one, p_1 is the unique equilibrium. For intermediate values of λ both equilibria (and one mixed) are possible, and the equilibrium policy must be jointly determined with the voter's beliefs. Loosely put, a "skeptic" voter attitude tends to generate desperate politicians, while a trusting attitude tends to generate confident ones. These findings are summarized in Proposition 1 and illustrated in Figure 2.

[12] Of course, in a PBE, $\mathrm{E}[\mathrm{b}(p_0 \mid \mathrm{I}_v)] = b_0$ and $\mathrm{E}[\mathrm{b}(p_1 \mid \mathrm{I}_v)] = b_1$.

DEFINITION 2: Denote d(p_0) and d(p_1) by, respectively,

$$d_0 = \frac{\sigma_v^4 + \sigma_z^2(\sigma_c^2 + \sigma_v^2)}{\sigma_c^2 + \sigma_v^2 + \sigma_z^2},$$

and

$$d_1 = \frac{\sigma_z^2\,(\sigma_c^2 + \sigma_v^2)}{\sigma_c^2 + \sigma_v^2 + \sigma_z^2}.$$

DEFINITION 3:

$$\lambda_0 = \frac{\gamma}{\gamma + (1 - \delta^*(\mu_1))^2}$$
$$\lambda_1 = \frac{\gamma}{\gamma + (1 - \delta^*(\mu_0))^2}$$

PROPOSITION 1: $0 < \lambda_0 < \lambda_1 < 1$. For $\lambda < \lambda_0$, p_0 is the unique equilibrium, for $\lambda > \lambda_1$, p_1 is the unique equilibrium, and for $\lambda_0 \leq \lambda \leq \lambda_1$ both equilibria are possible.

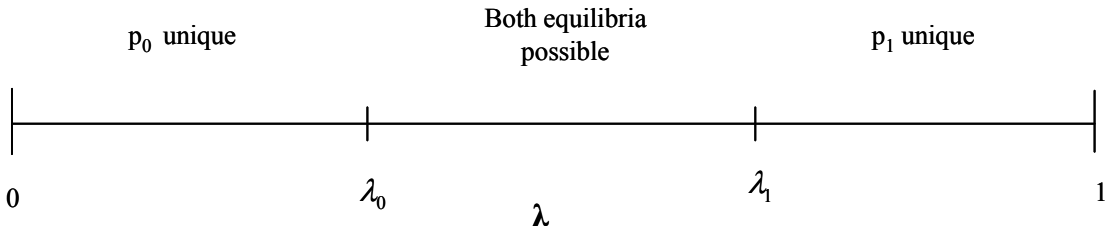

Figure 2. Equilibrium policy as a function of λ.

4 Comparative Statics

A shift from p_0 to p_1 implies a behavioral change: instead of estimating the unknown state the candidate estimates the voter's perception of the state, which, depending on parameters, may lead to a sizeable deterioration in policy quality. Intuitively, the higher

is the candidate's informational precision and the lower is the voter's, the larger is the difference. Also, better knowledge of voter opinion increases the weight the candidate (inefficiently) attaches to π_z, which further reduces the quality of p_1 relative to p_0. Note that this holds even if the voter is better informed than the candidate; lower σ_z^2 always leads to a "too large" increase in the weight of π_z in p_1. This is summarized below.

PROPOSITION 2: The difference in policy quality, $b_1 - b_0$, is larger the
(i) lower is σ_c^2,
(ii) the higher is σ_v^2,
(iii) the lower is σ_z^2.

Proposition 2 seems to imply that populism poses a more severe threat in environments where voters are poorly informed vis-à-vis politicians, and where candidates have easy access to voter opinion. The latter result would corroborate the view that opinion polls have a detrimental effect on politicians' behavior. However, these conclusions are unwarranted. *Given* that populism is the equilibrium behavior, the welfare loss from implementing p_1 rather than p_0 does increase with σ_v^2 and decrease with σ_z^2, but this may no longer be true as these parameters change. In particular, a parameter change that causes λ_1 to decrease may make populism inevitable.

PROPOSITION 3: The set of λ for which populism is the unique equilibrium, $(1 - \lambda_1)$, is
(i) increasing in σ_c^2,
(ii) decreasing in σ_v^2,
(iii) increasing in σ_z^2.
(iv) decreasing in γ.

Part (iii) of Proposition 3 implies that if the society originally is in the candid equilibrium, less knowledge of voter opinion may decrease welfare for two reasons. First, policy quality decreases directly as σ_z^2 increases, but this does not affect the relative gain from shifting from p_0 to p_1. More interestingly, λ_1 decreases, which means that p_0

may become unsustainable. This result may seem paradoxical. How can less knowledge of voter opinion increase the risk that politicians try to mimic it? Again, the intuition stems from Lemma 3, how voters (rationally) evaluate deviations between a policy and their own opinion. When σ_z^2 increases the precision of p_0 decreases, which leads δ^* to decrease. From the candidate's perspective, this implies that deviations from public opinion become costlier in terms of election chances. Hence, the incentive to decrease $\mathrm{d}(p)$, by shifting to p_1, increases as σ_z^2 increases, which implies that λ_1 decreases. Conversely, when candidates have almost perfect knowledge of voter opinion, populism is always avoidable (see Figure 3).

The same argument applies to a change in σ_c^2 but not σ_v^2. An increase in σ_v^2 certainly decreases policy quality, but it decreases voter precision more. Hence, a decrease in voter proficiency makes $\hat{\pi}$ more dependent on the proposed policy, which attenuates the temptation to mimic voter opinion. Roughly expressed, although the increase in σ_v^2 results in policies deviating more from voter opinion, the yardstick by which the voter evaluates such deviations softens even more, so that candor becomes easier to sustain.

Finally, an increase in γ, either due to an increase in β (the slope of the utility function) or a decrease in α, for example due to a reduction in the number of competing candidates, reduces the sensitivity of election chances to policy quality, and thus increases the scope for candid behavior. Alternatively put, the fiercer is the competition for votes, and the less concerned are politicians about policy quality, the smaller office spoils are required to make populism the unique equilibrium.

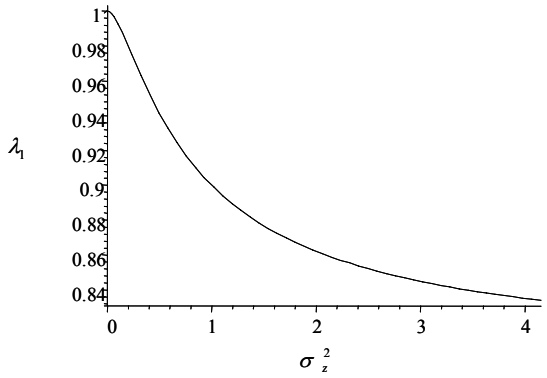

Figure 3. λ_1 as a function of σ_z^2 ($\sigma_c^2 = \sigma_v^2 = \gamma = 1$).

5 Concluding Remarks

Though difficult to measure, there should be significant welfare costs associated with politicians' conforming to popular opinion. Due to electoral competition, candidates will abstain from taking stands that seem controversial but possibly are very informative for voters. The populist's strategy of alienating as few voters as possible (to "serve all"), also means that, once in power, she is prevented from making necessary trade-offs.

For an economist, the populist phenomenon comprises somewhat of a puzzle: even if voters are poorly informed, so long as they are rational they should on aggregate disfavor poor policies. But if sincere behavior implied better election chances, why would a politician ever resort to populism?

In this paper I show that populist behavior may constitute a genuine commitment problem on the behalf of politicians. Although voters can anticipate whether candidates are distorting their messages, if office spoils are too large they can not resist doing it. For a range of parameters, populism and its opposite, "candor", can both be sustained as equilibrium behaviors. The reason is that voter expectations and the politicians' incentives are mutually reinforcing. For example, if voters expect politicians to adopt high-quality policies, then any evidence pointing against the proposed policies will bear lightly in the voters' assessment of them. This gives politicians more "leeway" in choosing informed policies, and attenuates their incentive to mimic voter opinion. This result begs the intriguing question if the virtually world-wide decline in political trust since the 1950s (see, e.g., Norris 1999) may in part be a self-fulfilling prophecy.

The fundamental mechanism at work, that is, the self-fulfillment of evaluators' expectations, should apply to numerous contexts. The crucial feature is that the "sender", at least on the margin, is willing to compromise the quality of her message in order to attain approval. To take just one other example, consider a scientist writing an article for a journal whose editorial board has a certain view on what research fields are interesting and not. The incentive for a junior scientist to follow the current research trend, regardless of whether she finds it appealing or not, should be larger than that of senior scientist's with an established reputation; not only because their desire to get published may differ, but because a deviation from the trend is more likely to be viewed

as a "mistake" if it origins with the junior scientist.

To focus on informational efficiency the paper ignores partisanship, and models the electorate by a representative voter. Adding partisan conflict to the current model may be complicated, but suggests an interesting trade-off: In the Downsian analysis, large office spoils are an effective means to make candidates ignore their own biases and adjust to voter opinion, whereas here it impairs information transmission from politicians to voters. Which effect will dominate in a hybrid model should depend on parameter choices.

Finally, as noted in the introduction, there are other definitions of the term populism than the one provided here. In particular, according to Harvey Mansfield (1994), what many refer to as populist movements today are exactly what James Madison used to denote "majority factions". A populist regime would then correspond to his "tyranny of the majority", where minorities become the victims of the "passions" of the majority; a prospect that prompted Madison to insist that decisions should be delegated to a body of wise men who could "refine and enlarge" the public view (Madison, Hamilton, and Jay 1987, p. 126). Providing a theoretical rationale for why the majority should choose to instigate such institutions could be a useful venue for future research.

Appendix

PROOF OF LEMMA 1: Let $\tilde{\pi} = \delta p + (1-\delta)\pi_v$, $\delta \in [0,1]$, be an arbitrary estimator of π. If the candidate assigns weight $\mu \in [0,1]$ to π_c and weight $(1-\mu)$ to π_z, the ESB of p reads

$$\mathrm{b}(p) = \mu^2\sigma_c^2 + (1-\mu)^2(\sigma_v^2 + \sigma_z^2). \tag{A1}$$

In turn, the variance of $\tilde{\pi}$ reads

$$\mathrm{Var}(\tilde{\pi}) = \delta^2\mathrm{b}(p) + (1-\delta)^2\sigma_v^2 + 2\delta(1-\delta)(1-\mu)\sigma_v^2. \tag{A2}$$

The last term follows from the fact that the covariance between π_z and π_v is σ_v^2. Using (A1) in (A2) and differentiating w.r.t. δ gives that δ^* solves the first-order condition.

The second derivative reads

$$\frac{d\pi}{d^2\delta} = 2\mu^2(\sigma_c^2 + \sigma_v^2) + 2\sigma_z^2(1-\mu)^2 > 0,$$

so that δ^* solves for a unique interior minimum. Finally, it can be seen directly that δ^* is never negative, however, it may be larger than unity.

PROOF OF LEMMA 2: If $\lambda = 0$, each candidate minimizes

$$\mathrm{b}(p) = \mu^2\sigma_c^2 + (1-\mu)^2(\sigma_v^2 + \sigma_z^2),$$

with the unique solution $\mu = \mu_0$. Substituting for μ_0 in (4) gives

$$\delta^*(\mu_0) = \frac{\sigma_v^4 + \sigma_v^2\sigma_z^2}{\sigma_v^4 + \sigma_v^2\sigma_v^2 + \sigma_c^2\sigma_z^2} < 1.$$

Suppose that, contrary to the Lemma, there was a PBE in pure strategies such that $\delta^- = 1$, i.e., $\tilde{\pi} = p$. Since $\lambda < 1$, the candidate would then deviate and set $\mu = \mu_0$: this does not affect her election chances and the ESB of her policy is minimized. But then δ^- must equal $\delta^*(\mu_0) < 1$, a contradiction.

PROOF OF LEMMA 3: For notational convenience, let

$$\phi = \frac{1}{\left(\mu^2\sigma_v^2 + \mu^2\sigma_z^2 - 2\mu\sigma_z^2 + \sigma_c^2\mu^2 + \sigma_z^2\right)^2} > 0.$$

(i) $\frac{d\delta^*}{d\sigma_c^2} = -\phi\mu^3\sigma_v^2 < 0.$
(ii) $\frac{d\delta^*}{d\sigma_v^2} = \phi\left(\mu\sigma_z^2(1-\mu)^2 + \sigma_c^2\mu^2\right) > 0.$
(iii) $\frac{d\delta^*}{d\sigma_z^2} = -\phi\mu(1-\mu)^2\sigma_v^2 < 0.$
(iv) $\frac{d\delta^*}{d\mu} = \phi\left(\sigma_z^2 - \mu^2\sigma_v^2 - \mu^2\sigma_z^2 - \sigma_c^2\mu^2\right)$. Evaluating the derivative at $\mu = \mu_1$ gives

$$\frac{\sigma_v^2(\sigma_c^2 + \sigma_v^2 + \sigma_z^2)}{\sigma_z^2(\sigma_c^2 + \sigma_v^2)} > 0.$$

By continuity, the derivative is positive in a neighborhood around μ_1.

PROOF OF PROPOSITION 1: Without loss of generality, suppose that a candi-

date's policy is a convex combination of p_0 and p_1. Denote the weights she puts on p_1 and p_0, w and $(1-w)$, respectively. Given the voter's beliefs, μ, the candidate maximizes

$$-\lambda \text{Var}(\hat{\pi}(\mu)) - \lambda \left(1-\delta^*(\mu)\right)^2 \left((1-w)d_0 + w d_1\right) - (1-\lambda)\gamma(1-w)b_0 - (1-\lambda)\gamma w b_1. \quad \text{(A3)}$$

The expression is clearly linear in w. Hence, except for knife-edge cases, $w=1$ or $w=0$ is the unique solution to the candidate's problem. Suppose first that the voter believes that $w=1$, so that $\mu = \mu_1$. If the candidate indeed sets $w=1$, (A3) becomes

$$-\lambda \text{Var}(\hat{\pi}(\mu_1)) - \lambda \left(1-\delta^*(\mu_1)\right)^2 d_1 - \gamma(1-\lambda)b_1. \quad \text{(A4)}$$

If the candidate instead sets $w=0$, (A3) becomes

$$-\lambda \text{Var}(\hat{\pi}(\mu_1)) - \lambda \left(1-\delta^*(\mu_1)\right)^2 d_0 - \gamma(1-\lambda)b_0. \quad \text{(A5)}$$

Clearly, p_1 is an equilibrium if and only if (A4) $\geq$ (A5). This holds so long as

$$\lambda \geq \frac{\gamma\left(b_1 - b_0\right)}{\gamma\left(b_1 - b_0\right) + \left(1-\delta^*(\mu_1)\right)^2 \left(d_0 - d_1\right)},$$

which, using the fact that $(b_1 - b_0) = (d_0 - d_1)$, reduces to λ_0.

Suppose instead that the voter believes that the politician sets $w=0$. Doing so gives the candidate utility

$$-\lambda \text{Var}(\hat{\pi}(\mu_0)) - \lambda \left(1-\delta^*(\mu_0)\right)^2 d_0 - (1-\lambda)\gamma b_0, \quad \text{(A6)}$$

while deviating to $w=1$ gives

$$-\lambda \text{Var}(\hat{\pi}(\mu_0)) - \lambda \left(1-\delta^*(\mu_0)\right)^2 d_1 - (1-\lambda)\gamma b_1. \quad \text{(A7)}$$

Using the definitions gives that (A6) $\geq$ (A7) so long as $\lambda \leq \lambda_1$. It can be seen directly that $\lambda_0, \lambda_1 \in (0,1)$. Using Definition 1 and (4) gives

$$\delta^*(\mu_0) = \frac{\sigma_v^2\left(\sigma_v^2+\sigma_z^2\right)}{\sigma_c^2\sigma_z^2+\sigma_v^2\sigma_z^2+\sigma_v^4},$$

and

$$\delta^*(\mu_1) = \frac{\sigma_v^2}{\sigma_c^2+\sigma_v^2}.$$

The difference $\delta^*(\mu_0) - \delta^*(\mu_1)$ equals

$$\frac{\sigma_v^4\sigma_c^2}{\left(\sigma_c^2\sigma_z^2+\sigma_v^2\sigma_z^2+\sigma_v^4\right)\left(\sigma_c^2+\sigma_v^2\right)} > 0,$$

which implies that $\lambda_1 > \lambda_0$.

PROOF OF PROPOSITION 2: Using the definitions gives that $b_1 - b_0 = \frac{\sigma_v^4}{\sigma_v^2+\sigma_c^2+\sigma_z^2}$. Differentiating this term w.r.t. σ_c^2, σ_v^2, and σ_z^2, respectively, gives

(i) $\quad -\frac{\sigma_v^4}{(\sigma_c^2+\sigma_v^2+\sigma_z^2)^2} < 0.$

(ii) $\quad \frac{\sigma_v^2(\sigma_v^2+2\sigma_c^2+2\sigma_z^2)}{(\sigma_c^2+\sigma_v^2+\sigma_z^2)^2} > 0.$

(iii) $\quad -\frac{\sigma_v^4}{(\sigma_c^2+\sigma_v^2+\sigma_z^2)^2} < 0.$

PROOF OF PROPOSITION 3: Part (i), (ii), and (iii) follow immediately from Lemma 3. Since $\delta^* < 1$, the derivative of λ_1 w.r.t. γ is positive, which implies that the set $(1-\lambda_1)$ decreases with γ.

References

Aidt, T.S., "Economic Analyses of Corruption: A Survey." *Economic Journal*, Vol. 113 (2003), pp. 632-652.

Alesina, A., "Credibility and Policy Convergence in a Two-Party System with Rational Voters." *American Economic Review,* Vol. 78 (1998), pp. 796-805.

Bernheim, D., "A Theory of Conformity." *Journal of Political Economy*, Vol. 102 (1994), pp. 841-877.

Canes-Wrone, B., Herron, M.C. and Shotts, K.W., "Leadership and Pandering: A Theory of Executive Policy-Making". *American Journal of Political Science*, Vol. 45 (2001), pp. 532-550.

Canovan, M., *Populism*. Harcourt Brace Jovanovich, New York 1981.

Calvert, R., "Robustness of the Multidimensional Voting Model: Candidate Motivations, Uncertainty, and Convergence." *American Journal of Political Science*, Vol. 29 (1985), pp. 69-95.

Chiu, S.Y., "On the Feasibility of Unpopular Policies under Re-Election Concerns." *Southern Economic Journal*, Vol. 68 (2002), pp. 841-858.

Cukierman, A. and Tommasi, M., "When Does it Take a Nixon to Go to China?" *American Economic Review,* Vol. 88 (1998), pp. 180-197.

Dornbush, R. and Edwards, S. (eds.), *The Macroeconomics of Populism in Latin America*. The University of Chicago Press, Chicago 1991.

Easton, D., *A Systems Analysis of Political Life*. Wiley, New York 1965.

Harrington, J.E., "Economic Policy, Economic Performance, and Elections." *American Economic Review,* Vol. 83 (1993), pp. 27-42.

Heidhues, P. and Lagerlöf, J., "Hiding Information in Electoral Equilibrium." *Games and Economic Behavior*, Vol. 42 (2003), pp. 48-74.

Hillman, A.L. and Swank, O. "Why Political Culture Should be in the Lexicon of Economists." *European Journal of Political Economy*, Vol. 16 (2000), pp. 1-4.

Madison, J., Hamilton, A., and Jay, J., *The Federalist Papers,* edited by I. Kramnick, Penguin Books, London 1987. First published in 1788.

Mansfield, H., "Democracy and Populism," pp. 27-30 in Leiken, R. (ed.), *A New Moment in the Americas.* Transaction, New Brunswick (N.J.) and London 1994.

Morris, S., "Political Correctness." *Journal of Political Economy*, Vol. 109 (2001), pp. 231-265.

Nordhaus, W. D., "The Political Business Cycle." *Review of Economic Studies*, Vol. 42, (1975), pp. 169-190.

Norris, P. (ed.), *Critical Citizens: Global Support for Democratic Governance*. Oxford University Press, New York 1999.

Prendergast, C., "A Theory of Yes Men." *American Economic Review,* Vol. 83 (1993), pp. 757-70.

Rogoff, K. "Equilibrium Political Budget Cycles." *American Economic Review*, Vol. 80 (1990), pp. 21-36.

Wittman, D., "Why Democracies Produce Efficient Results". *Journal of Political Economy*, Vol. 97 (1989), pp. 1395-1424.

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