Disentangling the Personal and Partisan Incumbency Advantages: Evidence from Close Elections and Term Limits^{*}

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ABSTRACT

Although the scholarly literature on incumbency advantages focuses on *personal* advantages, the *partisan incumbency advantage* — the electoral benefit accruing to non-incumbent candidates by virtue of being from the incumbent party — is also an important electoral factor. Understanding this phenomenon is important for evaluating the role of parties vs. individuals in U.S. elections and the incentives of incumbents and their parties in the legislature, among other things. In this paper, we define the partisan incumbency advantage, explain its possible role in elections, and show how it confounds previous estimates of the personal incumbency advantage. We then exploit close elections in conjunction with term limits in U.S. state legislatures to separately estimate the personal and partisan incumbency advantages. The personal advantage is perhaps larger than previously thought, and the partisan advantage is indistinguishable from zero and possibly negative.

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Scholars have long studied the electoral returns to incumbency (e.g., Alford and Brady, 1989; Ansolabehere and Snyder, 2002, 2004; Ansolabehere *et al.*, 2000; Cox and Morgenstern, 1993, 1995; Erikson, 1971; Erikson and Titiunik, 2014; Gelman and Huang, 2008; Gelman and King, 1990; Hirano and Snyder, 2009; Lee, 2008; Levitt and Wolfram, 1997). Most previous studies focus on the *personal* incumbency advantage, the extent to which an individual candidate benefits simply by virtue of being the incumbent. A similarly important yet neglected quantity is the *partisan* incumbency advantage, i.e., the electoral benefit a candidate receives purely because her party is the incumbent party, regardless of whether she herself previously served.

While the importance of the personal incumbency advantage is well established in the literature, we believe the partisan incumbency advantage is an important quantity for two main reasons. First, and more substantively, it tells us about the nature of politics by shedding light on how our elections operate. A partisan incumbency advantage might signal that voters attribute the actions of representatives to their parties or that retiring representatives systematically help new candidates from their party. It would also mean that parties can credibly threaten to withdraw electoral support from renegade members, since a new candidate will still benefit from this advantage. A negative partisan incumbency advantage might signal that voters prefer partisan balance over time. Because there are theoretical reasons to expect a positive or negative partisan incumbency advantage, and because the sign and magnitude of this quantity has important implications for electoral politics (even if it turns out to be close to zero), we believe that such a quantity warrants investigation on purely substantive grounds.

Second, on a methodological level, we show that one cannot estimate the personal incumbency advantage without also considering the partisan advantage, too. Because personal and partisan incumbencies are often assigned together and in a non-random fashion, their independent effects are difficult to separate. This paper offers a new empirical strategy that aims to disentangle the two quantities by simultaneously exploiting close elections and term limits in U.S. state legislatures.

de Mesquita, Josh Clinton, Bob Erikson, Bernard Fraga, Andrew Gelman, Michael Gill, Guido Imbens, Keith Krehbiel, Elena Llaudet, Michele Margolis, Nolan McCarty, Pablo Montagnes, Max Palmer, Jas Sekhon, Maya Sen, Ken Shepsle, Rocío Titiunik, and seminar participants at Harvard.

We build upon previous research by employing a regression discontinuity design to study the returns to incumbency (Lee, 2008). With weak assumptions, the regression discontinuity design offers exogenous variation in incumbency by exploiting the quasi-random results of very close elections, in contrast to observational approaches which require strong assumptions about unobserved variables in order to identify incumbency effects. Unfortunately, the traditional RD design, as implemented by Lee (2008), does not by itself identify *either* the personal or partian incumbency advantages. Instead, it estimates a weighted combination of both, as we explain. To surmount this obstacle, we leverage an additional source of exogenous variation: state legislative term limits. By forcing incumbents out of office, term limits exogenously change the personal incumbency status but not the partisan incumbency status. Using a simple system of equations, we link the two sources of variation to estimate both the personal and partian incumbency advantages. More details on this approach, along with the necessary identifying assumptions and empirical support for these assumptions, are provided in the subsequent sections.

Implementing this new design, we find that the personal incumbency advantage is substantively large, perhaps even larger than previously thought, while the partisan incumbency advantage is negligible. According to our point estimates, incumbent candidates in term-limited U.S. state legislatures receive an extra 9 percentage points of vote share because of their personal incumbency, but non-incumbent candidates receive no electoral benefit (and may suffer a small loss) as a result of their party having held the seat in the preceding term. Despite the significance of parties in electoral and legislative politics and despite theoretical reasons to expect a large partisan incumbency advantage, we find that incumbency is a personal affair.

1 Partisan Incumbency Advantage: An Overlooked Quantity of Interest

We define the partisan incumbency advantage as

Partian Incumbency Advantage =
$$\frac{W_j(1) - W_j(0)}{2}$$

where $W_j(1)$ is the two-party vote share received by the Democratic Party's candidate in an open-seat election in district j at time t where the previous incumbent was from the Democratic Party, and $W_j(0)$ is the two-party vote

share received by the Democratic Party's candidate in the same district j at time t in the counterfactual scenario where the previous incumbent was from the Republican Party.

Holding district-specific and time-specific factors such as the ideology and partisanship of the electorate constant, how much better will a major party fare in an open-seat race as the incumbent party compared to the counter-factual scenario where the other party has held the seat?¹ We can also define the partisan incumbency advantage in terms of the candidate's probability of victory as opposed to her vote share, and we will discuss and present estimates for both outcome variables simultaneously.

We could hypothetically estimate the partisan incumbency advantage with a heroic randomized experiment. We would randomly assign some electoral offices to be occupied by Democratic candidates and others to be represented by Republican candidates by perturbing election results at time t. Then, we would force those incumbents to retire, and observe the two-party vote share in the next election at time t + 1. The average difference between the Democratic Party's two-party vote share in these two conditions divided by two represents the partisan incumbency advantage.² As before, this experiment is unfeasible, so we must find phenomena in the real world that closely mimic such an experiment.

To our knowledge, scholars have not attempted to estimate the partisan incumbency advantage despite its potential substantive value.³ Estimating this quantity informs us about the behavior of voters, the nature of political representation, and the performance of political institutions. Whether

¹ Our definition of the partisan incumbency advantage should not be confused with previous uses of the term. For example, Alford and Brady (1988) discuss a partisan advantage in the sense that incumbents are likely to be elected in districts that naturally favor their party. Their use of the term relates to the normal vote (Campbell *et al.*, 1960) within a district, but this has nothing to do with the effect of partisan incumbency. For the purposes of this study, the normal vote is a confounding variable, and the partisan incumbency advantage refers specifically to the effect of party incumbency on election results. In our definition, the district and time are held constant, but other factors that may be influenced by party incumbency such as the quality and resources of the candidates are part of the partisan incumbency advantage.

² Our decision to define the partisan incumbency as the effect of Democratic vs. Republican Party incumbency divided by two will become clear later in the paper. We could also define this quantity as the effect of one party's control vs. no partisan incumbency. However, in a two-party system such as the United States, situations where neither party is the incumbent party (e.g., a third-party incumbent or a new electoral district) are rare.

³ As we explain later, the regression discontinuity design conflates personal and partian incumbency, even though the variables are defined in partian terms.

the partisan advantage is positive, negative, or negligible, it has important implications for the political process.

Do voters transfer their favor for an incumbent to her co-partisans after she retires? Similarly, do voters think more about the individual representing their district or the party? A positive partisan incumbency advantage would suggest that the answer to these questions is "yes." Alternatively, a negligible partisan advantage would suggest that voters regard the actions and attributes of their incumbent as separate from her party. While voters may be partisan in their behavior, and while parties may have brands that benefit them electorally, a negligible partisan incumbency advantage suggests that the specific actions an incumbent takes do not redound to the party's benefit when she retires.

Do elected officials behave in ways that benefit their party after they step down? Retiring incumbents could campaign for their replacements, for example, or could take actions in the legislature thought to be conducive to the electoral fortunes of their replacements. A positive partisan incumbency advantage would suggest that incumbents might aid their party in this manner. That we find a negligible or even negative advantage suggests that they either do not undertake such efforts or, if they do, that they are ineffective because voters simply do not transfer credit from an incumbent to a co-partisan replacement.

Can parties credibly threaten to withdraw support from renegade members in the hope that another candidate from the party will perform equally well in the next election? Can parties expect an incumbent party benefit when deciding how to allocate limited campaign resources across different races? A positive partisan incumbency advantage would imply that the answer to both of these questions is also "yes." The campaign strategy of parties will be quite different in a world in which co-partisan replacements receive the same electoral benefit as incumbents vs. the world in which incumbents' advantage dissipates when they depart. The negligible effect we find suggests that parties cannot credibly threaten to withdraw support from renegade members, because a replacement candidate will start her campaign with a sizeable disadvantage relative to the previous incumbent.

Finally, and perhaps most directly, estimating the partisan advantage in our design tells us about the possible effects of term limits. A positive partisan incumbency advantage would mean that co-partisan replacements maintain the insulation of their termed-out predecessors, suggesting that term limits would not increase competition. A negligible partisan incumbency advantage, on the other hand, is a mechanism that explains published evidence for a positive effect of term limits on electoral competition (Daniel and Lott, 1997; Masket and Lewis, 2007). Removing incumbents via term limits increases competition in part because their electoral advantage dissipates, rather than accruing to future candidates from their party.

Because parties shape policy (Aldrich and Rohde, 2001; Cox and McCubbins, 1993, 2006), they enjoy enormous loyalty from voters (Campbell et al., 1960; Green et al., 2002), and strategically mold political institutions to suit their needs (Aldrich, 1995), we might expect that parties generate their own incumbency advantage, much in the way strategic politicians are said to generate theirs (Mayhew, 1974; McKelvey and Riezman, 1992). At the same time, competing forces might produce a negative partisan incumbency advantage. For example, voters prefer partisan balance (Campbell and Miller, 1957; Mebane, 2000; Lewis-Beck and Nadeau, 2004; Folke and Snyder, 2012) and tend to dislike their political institutions relative to their incumbent officials (Fenno, 1975; Parker and Davidson, 1979). Behavioral scientists have identified a grass-is-greener or reverse endowment effect where individuals sometimes overestimate the value of outside options, particularly when the options are bad (Brenner et al., 2007; Bordalo et al., 2012; Bhatia and Turan, 2013) or when the decision maker is disgusted or sad (Lerner et al., 2004). These phenomena may lead voters to throw out the incumbent party after an incumbent individual retires and support the incumbent party at lower rates specifically because it is the incumbent party.

Aside from substantive reasons to care about the personal incumbency advantage directly, it contaminates estimates of the personal incumbency advantage, a quantity responsible for an enormous literature in American politics. Every time an individual candidate is an incumbent, her party is also the incumbent party. As a result, the researcher cannot easily attribute her electoral success to one factor or the other. For example, the sophomore surge and regression estimates may significantly over-estimate (or underestimate) the personal incumbency advantage because changes in personal incumbency status also correspond to changes in the parties' incumbency statuses. Therefore, in addition to the substantive relevance of the partisan advantage, this quantity holds important implications for estimating the personal advantage and for other empirical studies that examine the effects of election results, incumbency, and different types of representatives. In the next section, we define the personal incumbency advantage and discuss its estimation so that we can link the two quantities together.

2 Personal Incumbency Advantage and the Bias of Previous Estimates

Political scientists have long scrutinized hypothesized about the personal returns to incumbency. An individual candidate may benefit from her incumbency status because of increased name recognition, media exposure, campaign resources, previous constituency service, experience from having held office, institutional privileges, improved ability to fend off high-quality challengers, and many other factors. The personal incumbency advantage encompasses all of the reasons that an individual may be better off as an incumbent than as a candidate for an open seat. Therefore, for a particular candidate i, we define the personal incumbency advantage as

Personal Incumbency Advantage = $V_i(1) - V_i(0)$,

where $V_i(0)$ is the two-party vote share⁴ received by candidate *i* in an openseat election where the previous incumbent was from the same party, and $V_i(1)$ is the two-party vote share of candidate *i* at the same time in the same district, except that the candidate herself has served the previous term and enjoys all the benefits of being an incumbent, including increased experience, more resources, and the ability to fend off high-quality challengers.⁵

When previous scholars talk about the incumbency advantage, they often refer, implicitly or explicitly, to this personal advantage. Holding all factors fixed, including the underlying quality and talent of the candidate and the incumbency status of the party, how much better will she perform in an election as an incumbent compared to the counterfactual scenario where she is a non-incumbent? This advantage includes any electoral benefits of

⁴ As with the partisan advantage, we can also define the personal incumbency advantage in terms of the candidate's probability of victory instead of her vote share. Even if personal incumbency increases a candidate's vote share, it may hold little policy consequence if it simply shifts the vote share of those who would have won anyway. In fact, changes in vote share may not translate to changes in election results (Jacobson, 1987), and for the purposes of studying political representation we may care more about the latter. For this reason, we estimate the personal and partisan incumbency advantages in terms of both vote share and probability of victory, discussing and presenting estimates for both outcomes simultaneously.

This definition differs from that of Gelman and King (1990), which focuses on the difference in incumbent party vote share between scenarios where the incumbent legislator runs or retires, conditional on the major, opposing party fielding a candidate. Also, in defining $V_i(0)$, we stipulate that the incumbent was from the same party in order to hold the incumbent party constant, allowing the partisan incumbency advantage (whatever electoral advantage goes to the incumbent party regardless of whether the incumbent runs) to wash out between the two conditions.

incumbency including any scare-off effect that influences the quality of candidate i's opponent under the treatment and control conditions.

Ideally, we could estimate this quantity through another heroic randomized experiment. Following a legislative election at time t that occurred naturally with no researcher intervention, a researcher could identify new candidates in each district from the same party as the recent winner. Then, the researcher would randomly assign the districts into one of the two conditions. In the first condition, the elected officials would be forced out of office and the new candidates would be appointed in their place as incumbents who then seek reelection at time t+1. In the second condition, the elected officials would serve their terms and then be forced to retire, and the new candidates would step in and run for election at time t + 1. The difference between the average vote shares of the new candidates under these two experimental conditions at time t + 1 would provide an unbiased estimate of the personal incumbency advantage. The two sets of candidates and electoral districts would be identical to one another, in expectation, except for the fact that the candidates in the first condition enjoy the benefits of personal incumbency which potentially include more resources, more experience, and the potential ability to fend off high-quality challengers. Because this randomized experiment is unfeasible, researchers must employ observational data to assess the personal incumbency advantage. Below, we discuss some of these approaches. All of these previous estimates, while innovative, fail to credibly identify the personal incumbency advantage as we have defined it.

One intuitive estimator for the personal incumbency advantage is the sophomore surge. A newly elected official will typically garner more votes in her first election as an incumbent than in the previous election when she was a non-incumbent (Erikson, 1971; Alford and Brady, 1989), and this holds even when the incumbent faces the same opponent as before (Levitt and Wolfram, 1997; Hirano and Snyder, 2009). Another intuitive estimator is the retirement slump. The incumbent party typically loses votes when an incumbent official retires (Alford and Brady, 1989), and this effect remains even when legislators are forced out of office by term limits (Ansolabehere and Snyder, 2004). Regression-based analyses show that incumbents typically outperform non-incumbents even when controlling for key covariates (Gelman and King, 1990; Cox and Morgenstern, 1993, 1995; Ansolabehere and Snyder, 2002; Gelman and Huang, 2008; Hirano and Snyder, 2009). Unique features of the electoral system provide further opportunities to assess

incumbency advantages. For example, when new voters are redestricted into an incumbent's district, they are less likely to support the incumbent compared to the district's old voters (Ansolabehere *et al.*, 2000; Desposato and Petrocik, 2003), suggesting that incumbents benefit from a personal vote.

As a result of various methodological problems, none of these previous studies identify the personal incumbency advantage as defined above. Regression to the mean, strategic retirement, and selection bias plague the interpretation of the sophomore surge, retirement slump, and regressionbased estimates. Redistricting offers a rare source of exogenous variation in incumbency, but new voters may not be entirely comparable to old voters (Sekhon and Titiunik, 2012), and the personal vote does not capture all components of the personal incumbency advantage. In short, current observational estimates fail to estimate the personal incumbency advantage because incumbency is endogenous to the outcome of interest and because personal incumbency is conflated by partian incumbency. In our subsequent analysis, we simultaneously exploit two sources of exogenous variation in incumbency status to estimate the personal incumbency advantage. The next section discusses our use of the regression discontinuity design to isolate exogenous variation in incumbency status. As we show, this approach by itself is insufficient to identify either the personal or the partian incumbency advantages.

3 The RD Estimator: A Combination of the Personal and Partisan Advantages

The regression discontinuity (RD) design (Thistlethwaite and Campbell, 1960; Imbens and Lemieux, 2008), provides causal leverage on incumbency status and overcomes some of the limitations of previous approaches discussed above. The logic proceeds as follows. Election results are not randomly assigned in general, but for very close elections, we can think of the winner as if randomly assigned. Therefore, if we compare barely-winners to barely-losers, they will be, on average, identical to one another in terms of their pre-election characteristics.⁶ However, one will become the incumbent

⁵ In practice, using RD to assess the incumbency advantage is not as simple as calculating the difference between barely winners and barely losers. This will produce biased estimates because the winners garnered more votes than the losers. Instead, the researcher must estimate the limit of the dependent variable as the running variable approaches the treatment threshold from

and the other will not. Applying this logic to the study of the incumbency advantage, Lee (2008) finds that the Democratic Party performs significantly better in U.S. House elections when a Democrat barely won the previous election compared to situations where a Democrat barely lost.⁷ The same logic has since been employed to estimate the effect of incumbency in other settings and on other outcomes of interest (e.g., Boas and Hidalgo, 2011; Broockman, 2009; Butler, 2009; Dal Bo *et al.*, 2009; Eggers and Hainmueller, 2009; Folke and Snyder, 2012; Hainmueller and Kern, 2008; Lee *et al.*, 2004; Migueis, 2013; Querubin and Snyder, 2013; Titiunik, 2012; Uppal, 2009, 2010).

The RD design depends on an important assumption concerning potential outcomes. Let Y(1) be the two-party vote share of the Democratic Party in the next election if the Democratic Party wins the present election, and Y(0) be the two-party vote share of the Democratic Party in the next election if the Republican Party wins the present election.

Each election holds its own unique values of Y(1) and Y(0), although only one is ever observed. The Lee (2008) RD approach estimates

$$E[Y(1) - Y(0)|X = 0.5],$$

where X is the vote share of the Democratic Party in the present election, so long as Assumption 1, holds.

Assumption 1:

$$\lim_{X \to 0.5-} Y(1) = \lim_{X \to 0.5+} Y(1), \text{ and}$$
$$\lim_{X \to 0.5-} Y(0) = \lim_{X \to 0.5+} Y(0).$$

In words, Lee's RD approach estimates the local average treatment effect of an election result on the next election result for the type of district that equally supports the Democratic and Republican Parties in the present election. The identifying assumption is that the potential outcomes are continuous at the electoral threshold, meaning that a case where a Democratic candidate barely won (by epsilon votes) is on average no different

both sides. See Imbens and Lemieux (2008) for a more detailed description of the regressiondiscontinuity design.

Because Lee focuses on close elections between a Democrat and a Republican and because the United States is essentially a two-party system, the choice of the party is arbitrary. The result would be exactly the same if he used Republican vote share as the variable of interest.

in Y(0) or Y(1) than a case where a Republican candidate barely won (by epsilon votes). This assumption is crucial because $E[\lim_{X\to 0.5-} Y(1)]$ and $E[\lim_{X\to 0.5+} Y(0)]$ are unobservable, but $E[\lim_{X\to 0.5+} Y(1)]$ and $E[\lim_{X\to 0.5-} Y(0)]$ can be estimated without bias. We follow Lee in estimating these limits with a high-order polynomial regression but later show that our results are robust to many other approaches as well. Under the continuity assumption above,

$$E[\lim_{X \to 0.5+} Y(1)] - E[\lim_{X \to 0.5-} Y(0)] = E[Y(1) - Y(0)|X = 0.5],$$

yielding the local average treatment effect described above.

Several recent papers have cast doubt on the identifying assumption of RD designs in electoral settings by pointing out that bare winners are different than bare losers in recent U.S. House of Representatives elections (Caughey and Sekhon, 2011; Grimmer et al., 2012; Snyder, 2005). Specifically, incumbents appear to be better than challengers at winning very close elections. We are sensitive to this possibility and after thorough investigation, we are confident that these challenges do not pose a problem for our results. First, Eggers et al. (2014) find no evidence of strategic sorting or of an incumbent party advantage in close U.S. state legislative elections, the electoral setting of relevance in this study. Second, Eggers et al. (2014) provide further evidence that the peculiar phenomenon of incumbents winning very close elections in the U.S. House may be a statistical fluke that does not pose a general threat to all RD designs in electoral settings. Third, we present several statistical results in the Appendix that further demonstrate the lack of sorting in our sample and the robustness of our results to potential sorting. Placebo tests find no effect of current election results on lagged incumbency or previous election results and all of our subsequent results are robust to the inclusion of pre-treatment covariates such as lagged incumbency and lagged vote share. Finally, all subsequent results are robust to a donut RD design (Almond and Doyle, 2011; Barreca et al., 2011a; Barreca et al., 2011b) in which we remove the very close elections where we might be worried about strategic sorting.

We can replicate Lee's (2008) RD design using equations of the form

 $DemVoteShare_{t+1} = \alpha + \beta DemVictory_t + \gamma f(DemVoteShare_t) + \varepsilon, \quad (1)$

where $f(\text{DemVoteShare}_t)$ represents a polynomial function of the Democratic Party's vote share at time t. β represents the effect of a Democratic victory relative to a Republican victory on the performance of the Democratic Party in the next election. Because the winning candidate typically seeks re-election, close elections quasi-randomly assign incumbency status to both individual candidates and parties. While this design does identify the effect of election results on voting in subsequent elections — an interesting quantity in and of itself, it does not identify either the personal or partisan incumbency advantages. Just as these two quantities are confounded in other estimates, the RD estimate represents a weighted combination of both the personal and partian incumbency advantages. The reason is clear: when a close election randomly assigns a Democratic candidate as an incumbent, it also assigns the Democratic Party as the incumbent party. The current RD design provides no way of separating these two quantities or of determining whether a positive RD estimate is driven primarily by a personal or partisan advantage. This problem in interpreting the RD estimate has been described previously by Gelman (2011), Caughey and Sekhon (2011), and Erikson and Titiunik (2014).

As discussed by Erikson and Titiunik (2014), the quantity estimated by Lee's RD design (2008) represents the following combination of the personal and partian incumbency advantages, as we have defined them:

$$\beta = 2 * \text{Partisan Advantage} + 2 * \Pr(\text{Winner Runs Again}) \\ * \text{Personal Advantage.}$$
(2)

The partisan incumbency advantage is doubled because the winning party has both the benefit of being the incumbent party and the benefit of the other party not having this advantage.⁸ Similarly, if we knew that the winner of the first election would always run for re-election, then the RD estimate would also include two times the personal incumbency advantage. However, the incumbent does not always seek re-election, so we must multiply this term by the probability that the winner of a close election seeks re-election. Without any additional information, we have no way of separating the personal and partisan incumbency advantages from the RD estimate; we have two unknowns and only one equation.

In the next section, we describe our empirical strategy which allows us to separate the personal and partian incumbency advantages by utilizing

⁸ This is analogous to the fact that the result of a \$1 bet between two individuals has a \$2 effect on each person's wealth. The winner gains \$1, but if she had lost, she would have lost \$1. To our knowledge, Erikson and Titiunik (2014) were the first to point out this double counting issue with respect to RD designs and incumbency effects.

a second source of exogenous variation. In addition to the quasi-experiment provided by close elections, we also exploit term limits in U.S. state legislatures which create exogenous variation in the probability that the winner of a close election runs again. This additional source of variation provides the necessary leverage to back out both quantities of interest — the personal and partian incumbency advantages.

4 Identification Strategy: Exploiting Close Elections and Term Limits

We motivate our strategy with a thought experiment, similar to one proposed by Gelman (2011). Imagine a set of elections where no candidate is allowed to run for reelection. In this scenario, the partian incumbency advantage is simply the RD estimate divided by 2, because no personal incumbency advantage is present. Call this quantity A. Next, imagine another electoral setting, otherwise similar to the first, where incumbent candidates always run for reelection. In every case, the candidate running for reelection is both herself the incumbent and a member of the incumbent party. Because personal and partisan incumbencies are assigned simultaneously in this situation, the RD estimate is two times the sum of the personal and partian advantage. Call this quantity A + B, where A is the partian incumbency advantage and B is the personal advantage. Given these two scenarios, we could obtain unbiased estimates of both quantities; the partisan incumbency advantage comes straight from dividing first RD estimate by 2, and the personal incumbency advantage comes from dividing both by two and subtracting (A + B - A = B).

While we cannot conduct this exact experiment, a similar experiment occurs regularly in state legislative elections where term limits are present. By isolating cases where term limits prevent one candidate from seeking reelection if she wins and comparing these to cases in the same state and chamber where both candidates could seek reelection, we can separate the personal and partisan incumbency advantages in a similar fashion. We refer to these two types of elections as expiring and non-expiring, respectively. When an election is non-expiring, meaning that both candidates could seek reelection if they won, the winner of a close election seeks reelection 7 times out of 10. Alternatively, when an election is expiring, meaning that one candidate could not seek reelection if she won, the winner runs for reelection only 4 times out of 10. This gap provides the leverage necessary to tease out the quantities of interest.

The system of equations below decomposes each RD quantity. RD_1 and RD_0 represent the RD estimates in the expiring and non-expiring cases, respectively. P_1 and P_0 represent the probability that the winner runs for reelection in the expiring and non-expiring cases, respectively. In the expiring and non-expiring cases, the RD quantity is composed of the personal and partian incumbency advantages specific to each context. As written, we therefore have two equations with four unknowns. We treat the probabilities P_1 and P_0 as fixed and known; in practice they can be estimated from the data.

$$RD_1 = 2 * P_1 * Personal_1 + 2 * Partisan_1,$$
(3)

$$RD_0 = 2 * P_0 * Personal_0 + 2 * Partisan_0.$$
(4)

We can identify the average personal and partial incumbency advantages from this system of equations when Assumption 2, below, holds.

Assumption 2:

 $Personal_1 = Personal_0$, and $Partisan_1 = Partisan_0$.

Assumption 2 states that the average incumbency advantages within a particular state and chamber, both partisan and personal, do not vary depending on whether an election is expiring or not. To be clear, we do not assume that states or electoral settings with term limits are comparable to those without term limits. We only apply Assumption 2 in the context of elections within each term-limited state while term limits are in place. While couched in different terms, this assumption is similar to those employed by Ansolabehere and Snyder (2004) who use term limits as an instrument for incumbency.⁹ Specifically, we assume that conditional on being in the set

If the analogy is useful, readers can think of our identification strategy as analogous to instrumental variables analysis, where both close election results and term limits are used as instruments for personal and partisan incumbency. Partisan incumbency is fully determined by the result of the close election while personal incumbency is strongly influenced (but not perfectly determined) by the binding nature of term limits across elections within the same states and chambers. With this analogy, readers may better understand the assumptions of exogeneity (term limits are exogenous to expected changes in partisanship) and exclusion (term limits only influence subsequent election results by forcing incumbents to retire). Of course, this analogy can be taken too far. We prefer to think of our strategy as estimating the RD quantity in two different settings where the probability of winners running again differ for exogenous reasons in order to separate the personal and partisan advantages.

of closely contested elections, expiring and non-expiring races within the same chamber have the same average values of their personal and partian incumbency advantages.

Assumption 2 is far different from saying that expiring and non-expiring elections are similar in every way. Obviously, expiring races will have a more senior incumbent seeking reelection, and the popularity of incumbents and quality of challengers may differ. However, this is not a violation of our assumptions. We only assume that the value of incumbency *per se* is equal across the two cases. Moreover, we only make this assumption for the case of close elections, because the RD design focuses on elections that were close at time t, and we make no assumptions about uncompetitive electoral settings.

In the Appendix, we assess the plausibility of Assumption 2 in several ways. First, we conduct a placebo test, examining state legislative elections in states without term limits, pretending that each state had the same term limit laws as California. We compare the RD estimates in placebo expiring and non-expiring cases and show that these quantities are nearly identical. We find no substantive or statistically significant differences between the RD estimates in these two cases. This result suggests that career effects do not bias our estimates and expiring and non-expiring cases are comparable to one another in the absence of term limits.¹⁰ Next, we assess the comparability of expiring and non-expiring cases by testing for balance in pretreatment covariates between these two types of cases. In the Appendix, we directly compare expiring and non-expiring elections within the same state and chamber in terms of previous partisanship, the party of the incumbent, the previous margin of victory, and the previous probability of uncontested races. Across these four pre-treatment characteristics, we find no substantively meaningful or statistically significant differences between expiring and non-expiring cases, providing further support for the validity of our assumptions and empirical strategy. More details on these placebo tests and balance tests are provided in the Appendix.

¹⁰ Of course, there are many important differences between state legislative elections with and without term limits. For example, Rogers (2014) finds that high-quality challengers in settings with term limits strategically wait for incumbents to be termed out, explaining some of the differences that we find between expiring and non-expiring cases. However, this strategic behavior is not a source of bias for our estimates, because scare-off is included in our definitions of the personal and partisan incumbency advantages. Rather, this type of strategic behavior is a source of the personal incumbency advantage and it could be an argument for why term limits increase the personal incumbency advantage.

Under Assumption 2, we can solve for the system of two equations which now has only two unknowns.

$$RD_1 = 2 * P_1 * Personal + 2 * Partisan,$$
(5)

$$RD_0 = 2 * P_0 * Personal + 2 * Partisan.$$
(6)

Algebraically solving for the personal and partial advantages, we obtain the following results:

$$Personal = \frac{RD_0 - RD_1}{2(P_0 - P_1)},$$
(7)

Partisan =
$$\frac{\text{RD}_1 P_0 - \text{RD}_0 P_1}{2(P_0 - P_1)}$$
. (8)

Even without following the algebra, the logic is intuitive. Suppose the RD estimates are positive and identical in both the expiring and non-expiring cases even though the probabilities of winners seeking reelection are starkly different. Then, we would conclude that the personal incumbency advantage is zero and that both RD estimates are driven by a partial effect. Alternatively, if the RD estimates in the expiring and non-expiring cases are proportional to the probability that the winner runs again in each case, we would conclude that the RD estimates are driven by a personal effect and that the partial incumbency advantage is zero.¹¹

A final assumption, common to the incumbency advantage literature, is necessary.

Assumption 3:

When an incumbent retires after narrowly winning a close election, the new candidate running from the same party is, on average, of comparable quality.

Here, quality is defined as the sum of all characteristics of candidates that influence their performance in elections. This assumption is necessary because differential candidate quality could influence the estimates.

¹¹ We cannot simply subtract the RD estimates to assess the personal and partial advantages. Instead, we must solve Equations (5) and (6). As this example illustrates, a significant difference between RD_1 and RD_0 constitutes evidence that the personal advantage is non-zero, but the raw difference alone tells us nothing about the substantive size of either quantity of interest.

For example, if term-limited incumbents who barely won their last election are typically replaced by lower-quality candidates, we could overestimate the personal incumbency advantage. This assumption is not unique to our approach; most estimates of the incumbency advantage (e.g., Alford and Brady, 1989; Ansolabehere and Snyder, 2002, 2004; Gelman and King, 1990) would also be biased if replacement candidates differed in quality from retiring incumbents. This concern is possibly the greatest threat to validity, because our empirical design does not guarantee the comparability of these two sets of candidates. However, the problem is less severe than it may appear initially because unlike previous studies, we focus on cases where the incumbent barely won the previous election. In these elections, incumbency tells us little about candidate quality. Our study also focuses on a particular electoral settings — state legislatures with term limits — where candidate quality may be less important than in other settings. If quality does not vary significantly across candidates or if voters do not know enough about the candidates to select on quality, then these concerns are largely irrelevant.

In the Appendix, we present a more detailed discussion of this issue and conduct several theoretical and empirical analyses which assess the plausibility of Assumption 3. First, we formally derive the bias that would arise if there were an average quality differential between new candidates and retiring incumbents who narrowly won their last election, and we demonstrate the sensitivity of our estimates to such a violation of our assumptions. We also show conditions under which we would expect no average quality differential or subsequent bias. For example, we present a model of elections whereby Assumption 3 is met so long as the average district is evenly split between support for Democratic and Republican candidates (which appears to be the case in our data) or the variance in quality for Democratic and Republican candidates is the same.

In the Appendix, we also discuss the possibility that, because of a personal incumbency advantage, incumbents in close elections might be particularly low-quality candidates. Of course, cutting in the other direction is the fact that these incumbents won a previous election as a non-incumbent candidate, suggesting they are of above average quality. Depending on the level of noise in the electoral process and other factors, these two signals could cancel out or one could dominate the other. While we cannot directly test whether incumbents who have close elections are lower or higher than average in quality relative to other candidates from the same party and place, we conduct one additional robustness test designed to address this concern. If replacement candidates are, on average, worse than term-limited incumbents (because of the selection that took place in previous elections), we would expect the quality differential to be especially pronounced for incumbents who had served many previous terms. For example, when long-term incumbents are removed in the first year that term limits are implemented in a particular state and chamber, we might expect this quality differential to be particularly acute. Accordingly, in the Appendix, we replicate our subsequent analyses after excluding the first election for each chamber after term limits came into place. This modification has virtually no impact on our estimates, suggesting that differential candidate quality does not play a significant role in our estimates.

To be clear, our methodological strategy does not identify the average effects of personal and partisan incumbency across all electoral settings. Instead, we estimate the local average effects for elections where the previous election was close to the 50% threshold. No method can credibly identify these effects for all districts, and we prefer unbiased local estimates to more general estimates that may be severely biased. Moreover, for the purposes of studying political representation and electoral outcomes, competitive electoral environments are precisely the settings for which we would like to estimate these quantities. We discuss this issue in more detail in the Appendix, discussing theoretical expectations about heterogeneity, showing that the districts with close elections are more representative than one might expect, and showing that our estimates of the personal and partisan incumbency advantages are not detectably different in districts that are typically less electorally competitive.

4.1 Data

Our sample includes all state legislative elections through 2008 where a candidate could theoretically be *expiring* as a result of term limits.¹² Table 1 provides a list of state legislatures with term limits along with their term lengths, maximum number of terms allowed, and the first year when limits were implemented. Election results come from an extended version of the

¹² The year here refers to the election at time t. 2008 is the most recent year that we can use, because we need to use election results from the subsequent election as our outcome variable. This explains why there are no relevant cases for Nevada. 2010 was the first year of impact, so we do not yet have data on the outcome variables for these cases. Also, the term limit years begin when term limits first take effect, not the years that these laws were passed.

State	Chamber	Year of impact	Term length	Max terms	Relevant cases
Arizona	Upper	2000	2	4	28
Arkansas	Lower	1998	2	3	171
	Upper	2000	4	2	10
California	Lower	1996	2	3	589
	Upper	1998	4	2	124
Colorado	Lower	1998	2	4	339
	Upper	1998	4	2	40
Florida	Lower	2000	2	4	278
	Upper	2000	4	2	50
Maine	Lower	1996	2	4	868
	Upper	1996	2	4	225
Michigan	Lower	1998	2	3	747
	Upper	2002	4	2	112
Missouri	Lower	2002	2	4	482
	Upper	2002	4	2	65
Montana	Lower	2000	2	4	443
	Upper	2000	4	2	102
Nevada	Lower	2010	2	6	0
	Upper	2010	4	3	0
Ohio	Lower	2000	2	4	493
	Upper	2000	4	2	88
Oklahoma	Lower	2004	2	6	157
	Upper	2004	4	3	39
South Dakota	Upper	2000	2	4	126

 Table 1. Sample: state legislative elections with term limits.

The table indicates the legislatures and years included in our analysis. The lower houses in Arizona and South Dakota are excluded due to multi-member districts. The year of impact indicates the first year in which a candidate could have been banned from running for reelection. We include an election in our analysis if a candidate could potentially be banned from seeking reelection in the next election. For example, the year of impact in Arizona was 2000 and the terms last 2 years, so all election in Arizona's upper house from 1998 to 2008 would be included in our analysis. The "Relevant cases" column indicates the number of elections from each chamber that are incorporated into our analysis. These include all contested races between a Democrat and a Republican. Information on term limit laws comes from the National Conference of State Legislatures: http://www.ncsl.org/legislatures-elections/legisdata/chart-of-term-limits-states.aspx. dataset collected and analyzed by Ansolabehere and Snyder (2002). Most of the results were collected directly from Secretary of State's offices. Because the partisan incumbency advantage cannot be analogously defined in multimember districts, we drop the lower chambers of Arizona and South Dakota. Because the empirical method requires party identities for the candidates, we exclude Nebraska as well. Finally, because of its unique electoral system and the quality of available data, we also exclude Louisiana from the analysis.

In order to estimate the personal and partisan incumbency advantages, we must compute four different quantities: Lee's (2008) RD estimate using the sample of non-expiring elections where no candidate is prevented from running for reelection, Lee's (2008) RD estimate on the sample of expiring elections where one candidate is prevented from running for reelection due to term limits, and the probability that the winner of a close election seeks reelection in each of these two cases. After estimating these four quantities, we can solve the system of equations discussed in the previous section to separate the personal and partisan incumbency advantages. Recall that this is not as simple as just subtracting the RD coefficients across the two samples; some victorious incumbents choose not to run again even when they are eligible, and in expiring cases the non-incumbent wins half the time and can choose to run. This is why we must estimate the probabilities of reelection attempts.

5 Results: Large Personal Advantage and No Partisan Advantage

Implementing our empirical strategy, we find that the personal incumbency advantage is substantively large, confirming the results of previous studies, and we find that the partisan incumbency advantage is negligible. Results are shown in Table 2. In the Appendix, we provide more details on the estimation and show that these estimates are robust to numerous specifications. All estimates focus on variation *within* legislative chambers where term limits are in place. As a result, differences across legislative settings or differences between term-limited and non-term-limited states do not pose a threat to the internal validity of our findings.

First, we estimate the probability that the winner runs for reelection using a fourth-order polynomial regression. After coding a dummy variable indicating whether the winner of the previous election sought reelection, we

 tages.
 Non-expiring
 Expiring
 Difference

 RD estimate (vote share)
 .078
 .024
 .054

 [.056, .098]
 [-.019, .071]
 [.005, .100]

Table 2. Estimating the personal and partian incumbency advan-

	[.056, .098]	[019, .071]	[.005, .100]
RD estimate (victory)	.480	.152	.328
	[.427, .524]	[.014, .288]	[.188, .466]
Pr(winner runs again)	.678	.370	.308
	[.629, .726]	[.259, .492]	[.180, .433]
Observations	4590	986	
Personal advantage		.088	
(vote share)		[.009, .185]	
Partisan advantage		020	
(vote share)		[083, .031]	
Personal advantage		.533	
(victory)		[.306, .961]	
Partisan advantage		121	
(victory)		[402, .033]	

Bootstrapped 95% confidence intervals in brackets.

Row 1 shows the RD vote share estimates in non-expiring and expiring cases, in addition to the difference between the two. Row 2 shows the same estimates using victory as the dependent variable. Row 3 shows the probability that a barely-winner runs again in each setting. For each of these three rows, all three quantities are estimated in the same regression model. State-chamber fixed effects are included so that only within-chamber variation contributes to the estimates. More details are provided in the Appendix. The final four rows of the table present our estimates of the personal and partian advantages with respect to both vote share and probability of victory. These quantities are computed from the quantities in Rows 1–3 according to the system of equations described in the text. All standard errors are calculated using a non-parametric bootstrap which accounts for both heteroskedasticity and uncertainty over all components of the estimation procedure.

regress that variable on a fourth-order polynomial of the winner's margin of victory. This is similar to the specification that we use for RD estimation later on. Figure 1 shows these predicted probabilities across different margins of victory. For our purposes, we care specifically about the probability that a bare winner seeks reelection, so we estimate the limit of this probability as the margin of victory approaches zero. As expected, this estimate is sig-



Figure 1. Effect of impending term limits on the probability of seeking reelection.

Dotted lines indicate robust standard errors. The figure employs fourth-order polynomial regressions to predict the probability that the winner of the previous election seeks reelection. For the purposes of our estimates, we care about these predicted probabilities at 0.5, P0 and P1, representing the probabilities that a barely-winner seeks reelection in non-expiring and expiring cases, respectively. As expected, this probability is significantly smaller (0.37 compared to 0.68) when impending term limits would prevent one of the candidates from seeking reelection. The difference between these two probabilities allows us to separate the personal and partian incumbency advantages in our subsequent analysis. For the sake of transparency, we also plot binned data: the average probability that the winner runs again for each one percentage point interval of the winner's vote share for both expiring and non-expiring cases.

nificantly smaller for the placebo expiring cases. When term limits prevent one candidate from seeking reelection, the winner runs again 37% of the time, compared to 68% for the non-expiring cases where neither candidate is bound by term limits. These point estimates are presented in the third row of Table 2. This probability is not 0 for the expiring cases, because one candidate is still eligible to seek reelection if she wins. Moreover, because the election is essentially a coin flip at the threshold, the eligible candidate will win half the time. The difference in these probabilities, 0.68 and

0.37, provides the necessary leverage to separate the personal and partisan incumbency advantages from the RD estimates. 13

Next, we apply the RD estimator to the expiring and non-expiring cases,¹⁴ employing a fourth-order polynomial as before. For purposes of statistical efficiency, we include all contested elections in this analysis, but as before, only those close to the threshold meaningfully contribute to the estimates, and the assumption of as-if random assignment is only necessary at the threshold.¹⁵ For the non-expiring cases, the RD vote share estimate is similar to the estimate of Lee (2008) for the U.S. House of Representatives. As the Democratic Party's vote share crosses the 50% threshold, its expected vote share in the next election increases by 7.8 percentage points. However, this RD estimate is significantly smaller with the expiring cases — only 2.4 percentage points. The point estimates are shown in the first row of Table 2. Recall that these numbers do not represent the personal or partisan incumbency advantages, but are stepping-stones on the way to solving for the quantities of interest. Figure 2 shows these estimates graphically, plotting the expected Democratic vote share at time t + 1 across Democratic vote shares at time t for both the expiring and non-expiring cases. If the personal incumbency advantage were small, then these estimates would be similar. The fact that the RD estimate is significantly larger in non-expiring cases suggests that the personal advantage is large and the partisan advantage is small.

¹³ Technically, we estimate these probabilities for expiring and non-expiring cases with a single regression. This allows us to include state-chamber fixed effects in our analysis, so we only exploit differences between expiring and non-expiring cases *within* a particular chamber. This allows for the possibility that the probability of seeking re-election along with the probability of an expiring case can vary across chambers, and we only allow the within-chamber variation to contribute to our analysis. We always implement these fixed effects using the *areg* command in Stata which subtracts the mean for each state-chamber for each variable and then adds back the population mean. This is important, because demeaning (rather than including dummy variables) allows us to identify the constant term which is relevant for estimating the probabilities that winners run again. More details are provided in the Appendix.

¹⁴ Again, we compute RD estimates for the expiring and non-expiring cases with a single regression which includes state-chamber fixed effects. Again, this analysis allows us to focus exclusively on within-chamber variation in the returns to incumbency between the expiring and non-expiring elections. More details are provided in the Appendix.

¹⁵ We estimate the discontinuities at the threshold by estimating limits of the outcome variables as they approach the electoral threshold from either side and calculating the difference in these limits. In the Appendix, we show that our estimates are robust across many different specifications with different bandwidths, different polynomial orders, and different approaches for estimating these limits.

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Figure 2. RD estimates in non-expiring and expiring cases — vote share. The figure plots the expected vote share of the Democratic Party in one election across its vote share in the previous election. For non-expiring elections, those where both candidates are eligible to seek reelection, there is a large discontinuity (about 8 percentage points) around the threshold where the Democratic candidate won or lost the previous election. This discontinuity is significantly smaller (about 2 percentage points) for expiring elections, where one candidate is not allowed to seek reelection due to term limits. Dotted lines indicate standard errors. We also plot binned data: the average Democratic vote share in the next election for each one percentage point interval of Democratic vote share in the current election for both expiring and non-expiring cases. Because the expiring discontinuity is so much smaller than the non-expiring discontinuity, we estimate a positive personal incumbency advantage and a negative partian incumbency advantage. See the text for more details.

We also compute the RD estimates using Democratic victory as the dependent variable instead of vote share. In the non-expiring cases, a Democratic victory at time t increases the probability of a Democratic victory at time t+1 by 48 percentage points. In the expiring cases, this effect is significantly smaller — only 15 percentage points. These point estimates are presented in the second row of Table 2. Figure 3 shows these effects graphically. Changes in vote share may not translate to changes in election results (Jacobson, 1987), and for the purposes of studying political representation we may care



Figure 3. RD estimates in non-expiring and expiring cases — victory. The figure plots the Democratic Party's probability of victory in one election across its vote share in the previous election. For non-expiring elections, those where both candidates are eligible to seek reelection, there is a large discontinuity (48 percentage points) around the threshold where the Democratic candidate won or lost the previous election. This discontinuity is significantly smaller (15 percentage points) for expiring elections, where one candidate is not allowed to seek reelection due to term limits. Dotted lines indicate standard errors. We also plot binned data: the average probability of Democratic victory in the next election for each one percentage point interval of Democratic vote share in the current election for both expiring and non-expiring cases. Because the expiring discontinuity is so much smaller than the non-expiring discontinuity, we estimate a positive personal incumbency advantage and a negative partisan incumbency advantage. See the

more who wins than the margin of victory. For this reason, we estimate the personal and partian advantages in terms of both vote share and probability of electoral victory.

text for more details.

Substituting these estimates into the system of equations as described previously, we estimate a personal advantage on vote share of 8.8 percentage points and a partian advantage of -2.0 percentage points. In terms of the probability of victory, the personal advantage is 0.53 and the partian advantage is -0.12. These estimates are presented in the final four

rows of Table 2. To obtain reliable measures of uncertainty, we employ a non-parametric bootstrap. We randomly sample (with replacement) a new data set from our original data and re-estimate these quantities, including the probabilities of seeking reelection. Repeating this procedure 100,000 times, we obtain 95% confidence intervals for the estimates. This procedure allows for heteroskedasticity and considers uncertainty over all of the estimation steps. As shown in Table 2, our estimates of the personal incumbency advantage are statistically significant but the partisan incumbency advantage estimates are indistinguishable from zero. Personal incumbency increases a candidate's vote share by 8.8 percentage points and increases her probability of victory by 53 percentage points. Partisan incumbency, on the other hand, has no detectable effect and may actually be detrimental. Our confidence intervals allow us to reject any hypothesis that the partisan incumbency advantage is greater than 3 percentage points, suggesting that the partisan advantage is indeed substantively small.

In order to compare our results to previous estimates of the incumbency advantage, we benchmark our estimates against those of previous designs using the exact same data on state legislatures with term limits. The results are presented in the Appendix. Our 8.8 percentage point estimate of the personal incumbency advantage is larger than the estimates resulting from all other designs including the Erikson's (1971) sophomore surge: 6.7 percentage points, Alford and Brady's (1989) retirement slump: 3.2 percentage points, the panel regression approach of Ansolabehere and Snyder (2002): 5.9 percentage points, and Lee's (2008) RD design: 7.8 percentage points. These results suggest that the personal incumbency advantage may be larger than previously thought and previous designs which suffer from various sources of bias and conflate the personal and partisan advantages may underestimate the quantity of interest.

6 Discussion and Conclusion

In this paper, we have attempted to rigorously define and estimate the personal and partian incumbency advantages, utilizing a new empirical strategy which overcomes several limitations of previous studies. The extensively studied personal advantage appears to be even larger than previously thought, while the partian advantage, which has never been rigorously defined or estimated despite substantive and methodological importance, appears to be small and possibly negative. These new facts

reinforce the notion that American politics is personal politics (e.g., King, 1997; Mayhew, 1974) and add new flesh to the concept of incumbency as a personal phenomenon.

Of course, our finding of a large personal incumbency advantage and a small partisan incumbency advantage does not negate the importance of political parties in elections. For example, parties may direct significant resources to their incumbents seeking reelection, thereby increasing the *personal* incumbency advantage. Similarly, parties may exert significant effort in all elections in a particular setting, thereby increasing their normal vote share, which does not factor into either the personal or partisan incumbency advantages. And of course, party labels and voter partisanship play important roles in elections for reasons unrelated to the personal or partisan incumbency advantages. Despite the potentially significant roles of parties in the normal electoral process, they are unable to build upon the success of retiring incumbents and parlay their resources into a partisan incumbency advantage.

As we discussed early in the paper, a negligible partial incumbency advantage tells us much about the relationship between parties, incumbents, and voters. Voters in our sample do not appear to link the specific actions of their incumbent to their incumbent's party at the ballot box. Similarly, retiring incumbents are either unable or unwilling to help their co-partian replacements, who receive no residual benefit from their party having held the seat previously. As a result, parties cannot credibly threaten to support new candidates over renegade members unless they are willing to bear the cost of losing the entirety of the current member's incumbency advantage.

Our findings also speak to the electoral consequences of term limits and other reforms that generate open-seat elections. When a popular incumbent is forced out of office by term limits, her party receives no residual benefit because the partisan electoral advantage is small and possibly negative. For this reason, term limits may lead to more competitive elections (Daniel and Lott, 1997; Masket and Lewis, 2007) and prevent one party or another from developing a persistent monopoly in a particular electorate.¹⁶

In addition to its empirical results, we hope this paper proves useful to future researchers in several ways. Some elements of our empirical strategy may be applicable to other substantive questions where current esti-

¹⁶ Even if electoral competition is normatively desirable, this study should not be construed as an endorsement of term limits. We do not consider many other important consequences of term limits.

mators conflate two separate quantities of interest. A typical critique of quasi-experimental designs is that the quantities estimated are not necessarily those of primary interest, and this study offers an example of bridging the gap between the estimation of important quantities with strong assumptions and the estimation of unimportant quantities with weak assumptions. Furthermore, by working through some of the counterintuitive complexities associated with estimating incumbency advantages and electoral RD designs in general, we hope that this study along with the supplementary analyses in the Appendix benefits empirical researchers who will undoubtedly confront some of the same issues in future studies.

American voters reelect their incumbent officials at astounding rates. The reasons behind this phenomenon hold crucial implications for our understanding of both political representation and voter behavior. As a result, the incumbency advantage is one of the most-studied topics in political science. Despite this attention, previous work has not addressed whether this advantage, large though it may be, stems from voters rewarding individuals or parties. As it turns out, the reward is personal. Returns to incumbency in term-limited state legislatures flow only to the individual candidate and not to her party.

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