Gubernatorial coattails in Mexican congressional elections^{*}

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Abstract

Mexican congressional elections between 1979 and 2009 are examined to determine if successful candidates for governor have coattails helping candidates on the same ticket get elected to higher office and, if so, to what extent. Presidential coattails are also examined for reference. Regression estimates reveal that state parties transferred, on average, 42% of their electoral success in the gubernatorial quest to those competing for Congress in a concurrent election. Depending on which of the major parties we look at, gubernatorial coattails in Mexico are about one-tenth (for the PRI) and twofifths (for the left) longer than presidential ones; the PAN's are nearly identical. Local forces appear to move Mexican congressional campaigns and elections as much as national forces since at least 1979, raising questions about the relevance of federalism in developing nations.

Voting scholars have paid considerable attention to presidential coattail effects on congressional elections. The term refers to the notion that the winner of the presidential race pulls fellow partisans to victory, as if they grabbed on to his overcoat. Although the mechanism at work is still a matter of debate, there is evidence that the president's party tends to win systematically fewer votes in midterm elections in the United States (Jacobson 1997), Brazil, Chile, and El Salvador (Jones 1995); that early-term elections produce a milder slump in

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the share of assembly seats held by the president's party than late-term elections in ten countries, including Colombia, France, and the Philippines (Shugart 1995); and that party performance in congressional races in Mexico tends to reflect the electoral fortunes of their presidential candidates in concurrent elections (Segovia 1979).

It is conceivable that a good gubernatorial candidate, upon winning the election, exerts a similar effect on co-partisans running for the state's federal deputy seats in a concurrent election. If so, an effect would be felt between two institutions that are formally not juxtaposed—neither hierarchically nor transactually—in systems that are both presidential and federal. Jones (1997) and Samuels (2000) have, in fact, detected such effects in Argentina and Brazil. Is it also discernible in Mexico? This paper shows that the answer is affirmative. There is a coattail effect from gubernatorial to federal deputy candidates in Mexico of a size similar to presidential coattails.

Inspecting election returns since 1979 makes the finding surprising. Figure 1 shows the vote share won by the formerly hegemonic Institutional Revolutionary Party (PRI), the right-of-center National Action Party (PAN), and the left-of-center Democratic Revolution Party (PRD) in federal deputy, presidential, and gubernatorial elections. Close correspondence between presidential and deputy vote shares herald strong presidential coattails in congressional elections throughout the period. Gubernatorial yearly aggregate vote shares, however, do not follow the lines as neatly. Larger gaps strike the eye in both off years and, of direct relevance, federal election years. There are differences in time and across parties but, in general, lesser correspondence with deputy returns suggests weaker, or even non-existent, gubernatorial coattails in congressional races. The paper shows that relying on more disaggregated evidence exposes a very different story.

The argument proceeds as follows. Section 1 briefly discusses the voting model underlying coattail effects in congressional elections. Section 2 then explains how to measure party support for the Mexican case. Section 3 builds a regression model of presidential and gubernatorial coattail effects, estimating it with federal deputy election data between 1979 and

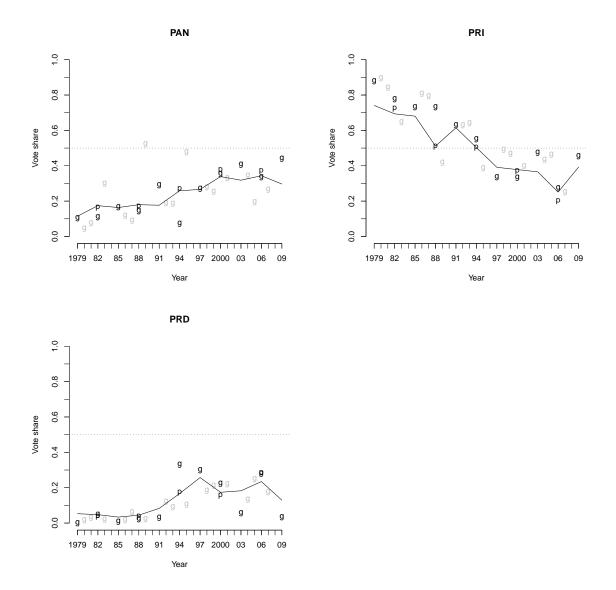


Figure 1: Major parties' annual vote aggregates 1979–2009. Lines connect parties' national vote shares in triennial federal deputy election. Letters p and g indicate, respectively, the vote shares won nationwide in presidential and gubernatorial elections during each year, dark for federal election years. Prepared with data described in footnote 3.

2009 for the three major parties. Section 4 elucidates regression estimates by simulation, employing two standards to gauge coattail effects and expose similarities, but also sharp differences between the major parties. Section 5 offers a discussion of the relevance of the findings for the comparative study of electoral systems, party system nationalization, and federalism. Section 6 concludes.

1 Long- and short-term effects in elections

The coattail perspective assumes that the outcome of any election is the product of longand short-term forces (Converse 1966). Long-term forces are encapsulated in each voter's party identification. Decades of National Election Studies panel surveys in the U.S. confirm that party ID is a remarkably stable individual trait, analogous to religion, and that it is also the best predictor of how the citizen will vote in a given election. It follows that it is the distribution of party IDs in a state or district that determines parties' long-term strength when votes are pooled. This is the notion of a district's "normal vote".

Short-term forces, on the other hand, are phenomena such as a candidate of exceptionally good (or bad) quality or the excellent (or dismal) performance of the incumbent party. Shortterm forces can affect a party's vote in a given year positively or negatively, but ultimately vanish, reverting the locality back to its normal vote. Presidential coattails belong in the category of short-term forces: a relatively good candidate for national executive office incites many voters to also support co-partisans in congressional races on the same ticket. Shortterm forces are mediated to a large extent by party organization. All else constant, stronger machines have an advantage in getting out the constituency vote. But pulling this muscle requires a vast amount of energy and resources, which political agents will expend only when reasonable returns are expected (Rosenstone and Hansen 1993)—and this is not always the case, thus subjecting party organization to short-term forces that may or may not be present. When conditions are met, local organizations affect relative mobilization efforts, which have an effect on turnout. The primary question this paper wishes to answer is whether or not the appeal of a good candidate for executive office at the *state* level, who activates local party organizations, should be included among short-term electoral forces.

Seen from a historical perspective, presidential coattails in the U.S. seem to have progressively weakened (Campbell 1991, Ferejohn and Calvert 1984). By the mid-1980s, the district congressional vote premium was estimated at around one-third of the presidential vote. In other words, three extra percentage points in the vote for a presidential candidate in a district translated into one additional point for his party's House candidate in that district. But 50 years before, coattail estimates reached about half the presidential vote; and they were in the neighborhood of nine-tenths of the presidential vote at the end of the 19th century. The drop has certainly been a substantial one, and it has spurred interest in its likely causes.

With respect to a possible gubernatorial coattail effect on lower house elections, no record of attempts to estimate it directly in the U.S. could be found,¹ although Boyd (1986), Cox and Munger (1989), and Rosenstone and Hansen (1993) did investigate effects on mobilization. The studies find that toss-up gubernatorial races increase turnout in concurrent congressional races—chasing crucial voters for these governor races spills over to other campaigns. And Ames (1994) uncovers similar "reverse" coattail effects of Brazilian mayors in the 1989 presidential race. Presidential candidates received a systematic and significant vote premium in municipalities their party or a party endorsing them controls. Local party organization became the vehicle of vote mobilization aimed at "supralocal contests" (95).

But Jones (1997) and Samuels (2000) have done a direct estimation for Argentina and Brazil, respectively, although they measure it in a different unit—the effective number of competitors in those elections instead of a vote premium. Both studies find that gubernatorial elections that concur with (in the Argentine case) or are closer to (in the Brazilian case²)

 $^{^{1}}$ In a study of five U.S. states, Burns (1999) found no significant gubernatorial coattail effects on senate elections. It will be seen below that failure to include states with non-concurrent congressional elections, however, complicates the detection of coattails.

 $^{^{2}}$ Since 1994, all Brazilian first round gubernatorial elections concur with national congressional elections.

		Congressional race concur- rent with presidential					
		no	yes	total			
Congressional race concur-	no	153 (80%)	150 (94%)	303~(86%)			
rent with gubernatorial	yes	39~(20%)	10~(6%)	49~(14%)			
	total	192 (100%)	160 (100%)	352~(100%)			

Table 1: Concurrence of congressional, presidential, and gubernatorial elections in Mexican states, 1979–2009. Entries report the number of states with congressional races in each category. Eleven congressional elections in thirty two states took place in the period, for a grand total of 352 observations.

congressional elections have a reductive effect on the number of parties in the legislative race. This suggests that parties get vote shares in the congressional election that tend to mirror vote shares in the gubernatorial race, despite sizeable differences in district magnitude.

For Mexico, Magar (2004) and Magar (2006) are precursors of this paper using 1979–2003 data; while Valdés (2009) is a result-confirming replication with data more disaggregated for the 1997, 2003, and 2009 midterm elections in selected states. Other evidence of gubernatorial coattails comes from survey research, not aggregate data, and is not conclusive about individual determinants of vote for Congress and for governor. Becerra (2002) found that respondents' incumbent governor thermometer scales in the state of Morelos correlated significantly with their party vote intentions for president in 2000. And Estrada (n.d.) found that ticket-splitters, voters whose behavior did not help produce coattails, in six states where a governor race concurred with the federal midterm of 2003 tended to be significantly younger, more educated, urban, and with higher income. This profile dovetails well the expectation that it should be the somewhat less "sophisticated" portion of the electorate that behaves in coattail fashion (cf. Campbell 1991). All this is suggestive that coattails from lower to higher office in concurrent elections may be present in Mexico as well.

Mexico is also an excellent laboratory to detect coattail effects. First, midterm federal elections permit an observation of party performance without the potential effect of a con-

Samuels (2000:97) pools together electoral data for the 1945–64 and 1989–98 periods, therefore allowing to control for proximity à la Shugart (see p. 14). See Brambor, Clark and Golder (2006:79) for a critique.

current presidential race. Second, election calendars also vary considerably from one state to another. Some states elect their governors when the country votes for a president every six years; others do it at the midterm; and the majority does neither, electing governors in perfect disconnection with the federal calendar. Table 1 summarizes the observed timing of federal deputy elections with respect to presidential and gubernatorial elections between 1979 and 2009. Although few governor elections concur with a presidential (only 10 observations in the period, most since 2000), a governor elected concurrently with federal deputies but not with a president is a more common combination. This should provide empirical leverage to perform an estimation of gubernatorial coattails, while holding the presidential effect constant. Section 4 shows that pooling four concurrence regimes data offers advantages over the analysis of some or all regimes separately. And third, Mexico's ban on immediate reelection makes it likelier that coattail effects flow from federal/state executive votes to congressional votes, not the other way round. Establishing causality from a correlation—ie. whether the phenomena we observe are top-down or bottom-up coattails—has always been thorny in the literature. Yet, much evidence collected recently by scholars points to a bottom-up relation in Mexico. As argued by Estrada (n.d.:2), single-term limits bring about relatively less recognizable candidates systematically and press parties to focus resources on the more prominent campaigns for executive office nationally and in each state, thereby inducing congressional candidates to mimic slogans and messages from the better-funded campaigns. And gubernatorial campaigns are indeed better funded. In fiscal year 2003, when the federal midterm was held, national parties channeled about one-third of their very generous public subsidies to state party chapters, money flowing systematically to more competitive states and, especially, to those with a concurrent gubernatorial race (Poiré n.d.). In a system where three-fifths of all deputies returned to their states for a political position after their tenure in Congress expired (Langston and Aparicio n.d.), sub-national influence in nationally-decided policy after the election is also well documented. State party's federal deputy cohort behavior conforms to governor's preferences over fiscal matters (Langston 2010) and in roll calls more generally (Desposato and Cantú 2009, Rosas and Langston 2009). Throughout the 1990s, when the PRI had to rely increasingly on opposition votes in Congress, non-PRI governors secured systematically larger increases in federal transfers in the annual budget than the rest (Díaz Cayeros 2006, Flamand 2006).

To close this section, two limitations of the present work are discussed. One is the use of states as unit of analysis instead of districts, as in U.S. studies. While a district-level analysis certainly gives finer-grained estimations of coattail effects, gubernatorial returns are not originally reported at federal district level by states' election authorities, and would therefore need to be reconstructed—at considerable cost. Matching municipal-level reports of both races does the trick but only partially, because large-city municipalities break into several federal districts, which cannot be disaggregated. These would require matching sectionlevel (a unit above the precinct but below the district) returns, a route not pursued here because a fair number of gubernatorial races reported at that level are still unavailable. The municipality as the unit of analysis was also discarded because federal data is reported at that level only since 1997, and I wished to inspect voting patterns since the PRI's hegemony began thawing in 1979. In defense of the choice of pursuing a state-level analysis, Morgenstern (n.d.) has evidence that, despite significant district-to-district variance in vote swings, there is still a greater deal of similarity in districts belonging in the same state (as reported in his DHS) statistics). This is probably why Valdés' (2009) findings with municipalities (albeit in a sample of states and years covered here) are much in line with those reported below with state-level analysis. Coattail effects estimates are sizeable with both methods.

Another is that the upper chamber is ignored, despite connections between governors and senators. "Congressional" here refers to federal deputies only, mirroring a bias in the U.S. literature. Yet about half the PRI's candidates for governor since 1989 have been former or sitting senators, and a bit shy of a quarter for other major parties (Langston 2008). Gubernatorial coattails are, presumably, determinants of senate votes as well. But there is a complication for the study of this relationship in that five out of seven senate races in the period coincided with a presidential one, offering much less empirical grip to separate the effect that an election for governor exerts, from that of an election for president, on a state's senate vote. Moreover, the remaining midterm elections of 1991 and 1997 are hardly comparable, since the latter also elected a list of 32 national PR-senators (a Mexican institutional oddity introduced by the 1996 electoral reform). The paper therefore follows the literature and pays attention to the lower chamber only.

2 Congressional elections in Mexico

The dependent variable in this paper is the share of votes that each of the three major parties won in each of Mexico's 31 states, plus the Federal District, in congressional elections between 1979 and 2009.³ The range of observations is such that will let us judge if significant coattail effects have been present since times when the PRI's hegemony was still robust. Figure 2 describes thirty-two federal deputy elections at the state level spanning eleven triennia. Except for 1997, 2003, and 2009 the PAN's median congressional election return rose throughout the period. The PAN's interquartile ranges (the heavier lines), however, have remained fairly constant, a sign that the party has managed to grow nationwide. The PAN has won a majority of a state's congressional vote twice, in 2000 and 2006. These cases mark the T-edged top of the whisker in those years.

Like the PAN, the PRD also had an increasing median return, but only up to 1997. That year's midterm election saw the best performance by the left so far in congressional races; it also captured Mexico City's mayorship in the concurrent election. The PRD's median return then dropped, both in 2000 and in 2003, increasing only in 2006, when it was

³To obtain vote shares, I subtracted votes for candidates not appearing on the ballot (*no registrados*) as well as invalid votes (*votos nulos*) from the denominator. I also simplified party labels for the left, calling "PRD" (a party label not appearing until 1989) the communist party (PCM in 1979) and two versions of the socialists (PSUM in 1982 and 1985 and PMS in 1988). Since all parties in the previous sentence have, in fact, held the same official registration with the federal election authority (changing labels only), this simplification is not too unjust. Federal election returns are from Varela (2004) before 1991, and from IFE (2009) afterwards; state elections are from reports downloaded directly from state election authorities' web pages by the author, completing missing data from Gómez (1991) and Valdés (2001). Data analysis performed with R (R Development Core Team 2009).

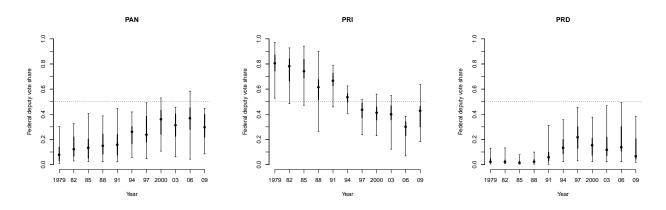


Figure 2: The evolution of congressional voting in 32 states (the dependent variable). Each year reports, by party, the median state share of federal deputy votes (circles), the interquartile range (heavy lines), and the minimum to maximum range (light, T-ended lines).

defeated narrowly in the presidential race. But what really makes the PRD different from the PAN is how it has had increasingly mixed results in congressional elections, as can be noted in the growing spread of its heavy lines and lighter whiskers. In fact, at the end of the larger whisker lies a group of seven states where the PRD has its best showings more or less regularly (it has governed five of them). The Mexican left has encountered more formidable obstacles to homogeneous growth across the federation than the right.

Because elections are zero-sum games, the big loser in recent decades has been the former ruling party. The 1979 midterm was, in fact, the last congressional election in which the PRI won an outright majority in each and every state, something it achieved routinely before. The median PRI return went from more than 75 percent of the vote that year, to around 40 percent in 1997—the first time the median fell below majority—where it has tended to remain. The PRI has felt the push of the erstwhile "opposition parties" even in southern strongholds where it used to command nearly 100 percent of the congressional vote until the mid-1980s. It now stands slightly above 50 percent in those states. The challenge to the PRI began in a handful of states only, when bottom whiskers grew in length, but as of 1991 became a national phenomenon. In 2006, when its presidential candidate came third, it managed to not win a majority of federal deputy votes in any single state. It is important to discuss how this paper deals with the (recent) problem of coalitions, one source of measurement error. Electoral alliances between two or more parties in elections have gained popularity in Mexico since they were legalized at the end of the 1990s. They are now widespread across presidential, congressional, and gubernatorial races. All three major parties have entered such coalitions in races at all levels, and they seem to be doing so with increasing frequency—sometimes, though still rarely, even among themselves. Of four presidential races nationwide since 1988, PAN coalesced in one, PRI in one, and PRD in three. Of 160 federal deputy races at the state level since 1997, PAN coalesced in 32 (1 in 5), PRI in 55 (1 in 3), and PRD in 64 (2 in 5). In the case of gubernatorial races, only the 52 concurrent with federal deputies are of concern, as will be clear in the model specification below: PAN coalesced in 5 of those (1 in 10); PRI in 13 (1 in 4); and PRD in 12 (1 in 4).

Depending on election laws, which have varied over time and across states, there are two general ways parties engage in such arrangements. (1) Each party may retain its original slot on the ballot, and a candidate's name appears as many times as there are parties crossendorsing. Or (2) parties supporting a common candidate share a common slot on the ballot, so that the candidate's name appears only once. The difference is subtle, but important for our purpose: while it is possible to know the exact share of the joint vote that each party contributed to the whole in the case of cross-endorsements, this remains an unknown for the other coalitions, since parties' votes are reported jointly at all levels of aggregation. For type 2 coalitions—and the bulk of coalitions observed are type 2—we are therefore forced to approximate each party's vote.

This can be done by assuming that parties coalescing in a given year preserve the relative weight they had in the previous legislative election when they last competed separately. In this fashion, two parties that coalesced in 2000—the PAN and the Greens (PVEM)—running separately received 442,255 and 44,884 votes, respectively, in the 1997 federal deputies election in the state of Veracruz. Had they coalesced that year, PAN would have contributed nearly 91% of the combined vote. This percentage was used to impute that, of 892,279 federal deputy votes won by the coalition in the state in 2000, PAN's contribution was 810,006. This technique to break votes was used for most coalitions in congressional, presidential, and gubernatorial elections in the analysis.⁴ The method required an exceptional treatment for the PRI, who has coalesced nearly systematically with the Greens in elections at all levels since 2001: applying the method would have required the use relative weights with a six-, a nine-, and even a twelve-year lag. The Greens after 2000 are therefore treated, in most cases, as a faction of the PRI, using the joint vote with no attempt to impute breakdowns. The on-line appendix to this article gives further details. To control for measurement errors associated with this imperfect, but necessary procedure, a control was included for elections where the party coalesced and an imputation of this nature was performed.

3 A model of coattails in Mexico

"If the presidential and congressional vote do not vary together, then meaningful coattail effects, however interpreted, do not exist"—Jacobson⁵

Estimating short-term coattail effects requires controlling for long-term effects first. In U.S. studies, the standard way of separating the effect of a party's normal vote in a constituency is by including the running average of its vote share in a given number of previous elections (Campbell 1991 uses one previous election; Ferejohn and Calvert 1984 use three) among explanatory variables. Everything returns to normality once the effect of short-term forces vanishes, and normality is captured by this average vote.

The models in this section estimate the extent to which a party's fate in congressional elections is associated to that of its presidential and gubernatorial candidates in concurrent elections.⁶ This is done with linear regression on state-level observations. In the left side of

⁴I am grateful to Federico Estévez for this method of breaking coalitional votes apart.

⁵Jacobson (1997:129).

⁶One issue of substance is Mexico's multiparty system, which may render the definition of coattails different from the standard U.S. version. In the two-party system, coattails are defined as how much the margin of the winning candidate for executive office translates into additional votes and seats for his/her party in Congress. Coattails here are measures of the impact of the winner and the two losing candidates

the equation is *Dvote*, the vote share for federal deputies; separate equations are fitted for each major party. In the right side are measures of short- and long-term vote determinants, plus a constant and error term. The appendix has descriptive statistics of the variables.

First appears *RecentDvote*, the average vote received by the party in the previous three elections in the state. As discussed, this indicator controls for long-term forces in the state vote. To the extent that parties build territorial machines and remain strong where they were strong, it should get a positive and large coefficient estimate.

Next come indicators to capture the possible effect of voters' preferences for presidential and gubernatorial candidates on the aggregate vote in congressional races, the substantive interest of this paper. Among these are three dichotomous variables, GovOnlyConcurs, *PresOnlyConcurs*, and *Gov&PresConcur* taking value 1 when the deputy race concurred only with a gubernatorial, only with a presidential, or with both races, respectively, and 0 otherwise. These mutually-exclusive dummies estimate different base levels for the dependent variable (y-intercepts) for different concurrence regimes, matching the cells in Table 1the omitted regime, non-concurrency, is the baseline. It is then assumed, as Ferejohn and Calvert (1984) do, that a party's coattail effects are proportional to its strength in the concurrent executive election. Therefore, the gubernatorial and presidential vote shares won by the party in the state enter the right side of the equation in years when those races concurred with the congressional. Following Chubb (1988:135), the gubernatorial vote share enters the equation in two alternative conditions. One, Gvote GovOnlyConcurs, is for gubernatorial races concurrent with the congressional but not a presidential; the other, Gvote Gov& PresConcur, is for gubernatorial races concurrent with both. In years when the congressional election took place in isolation from a gubernatorial race, they both adopt a value of 0, indicating the absence of a gubernatorial effect. Each also adopts a 0 when the

for executive office on their parties' in congressional races. In two-party systems what someone wins is the other's loss; in a three-party system, what someone wins it may take from one, the other, or both of the remainder parties. Estimating the model for each party separately, regardless of whether it won or lost, as Ferejohn and Calvert do for the U.S., still works. Winning more votes for president (or governor) should translate into more deputy votes. Losing votes for president (or governor) should translate into fewer deputy votes. And no change in president (or governor) vote should have no effect on deputy vote.

concurrence regime it controls is unmet.⁷ The purpose of this duality is to obtain a separate estimate of gubernatorial effects when the presidential vote is not an intervening factor. There is a difficulty in separating one from the other when both short-term forces operate simultaneously on congressional votes. Fortunately, Mexico's complex electoral calendar provides instances when the gubernatorial effect occurs without the presidential. Variables Pvote|PresOnlyConcurs and Pvote|Gov&PresConcur measure presidential effects likewise. To avoid confusing the absence of coattails that arises when executive offices are not at stake with the weakness of coattails that occur when mediocre executive candidates head the ticket, the dummy variables described at the top of this paragraph are included. If coattails are present, conditional variables should all have positive coefficients, their size (net of the coefficient of the appropriate dummy) indicating the magnitude of this effect.

Electoral concurrency is construed here as a series of dichotomous categorizations—the congressional race concurs or not with a presidential, with a gubernatorial, or with both. But Shugart (1995:329) has argued that the non-concurrence category has, in fact, an element of continuous variation left aside by this approach: how much time has lapsed between elections for different offices. A non-concurrent, but nonetheless relatively recent race for executive office might exert a diluted influence on a congressional race. The logic of delayed coattails is not fully clear: it is just as possible that, a few months into her term, a new governor is so unpopular that her endorsement diminishes the fortunes of her party's congressional candidates. So the question remains an empirical one. Controlling this delayed effect is unnecessary for the case of Mexican presidential coattails, since the time lapsed is either 3 years for all states in midterms or 0 years for all states in presidential election years—so the dichotomy suffices. But adding a continuous timing measure for gubernatorial coattails, since governor races take place all along a six-year presidential cycle, would be of interest. This refinement was not undertaken due to data availability (missing returns for some non-

⁷This portion of the right side identical to equation 7 in Brambor, Clark and Golder (2006). Including the constitutive term Gvote, as is standard in conditional interactions, in unfeasible because perfect multi-collinearity ensues (69). Gvote|NoConcurrence, on the other hand, is unobserved.

concurrent governor elections). In defense of the dichotomous version, it can be argued that, if the delayed effect in fact exists, then the absence of the timing control plays against detecting gubernatorial coattails, not in its favor.⁸

Two more dummies measure whether or not the party controls the state's governorship (*IncumbentGovernor*) or presidency (*IncumbentPresident*). These are intended to capture a likely advantage that parties with an incumbent executive may have against challengers—echoing reports (Langston n.d., Poiré n.d.) on governors as key players in the state's congressional campaigns, funneling money and campaign resources from state government offices.

Also included in the right side is one indicator of another short-term force, the recent performance of the economy. Although the question of who gets the credit or blame for economic performance is still a matter of debate, the pocket-book vote has been an attractive factor of retrospective judgement of incumbent parties in the majority of voting models since Downs (1957).⁹ I follow the literature and include *Economy* in the right side of the equation. This regressor is the rate of growth in a state's economy in recent years, multiplied by +1 in case the party in question controls the governorship (state economic growth should play in favor of the governor's party) and by -1 in case the party does not control the governorship (when growth should not favor it). The rate of economic growth was calculated with the average annual growth of the Gross State Product for the 3 years anteceding the corresponding congressional election.¹⁰ To the extent that the retrospective voting model holds, this specification of *Economy* should obtain a positive coefficient for all parties.

One more variable completes the main model (or model 1) estimated for each major

⁸To see why, imagine a gubernatorial landslide only 9 months before the federal midterm. Following Shugart, this would positively affect the party's performance in the midterm. My specification assumes that this effect is nil, leading me to overlook the delayed portion in my estimate of gubernatorial coattails.

 $^{^{9}}$ On whom should retrospective judgements about the state of the economy fall: the president, the governor, both or neither? Buendía (2000) has survey evidence that Mexican voters tend to credit themselves or the society for improvements, but blame the government for economic downfalls.

¹⁰Other specifications—rate of growth in the previous year; in the previous 3 years (instead of the average), and interactions with the incumbency dummies—produced little change in the estimates. *Economy* contains a good deal of measurement error because two different series had to be used: Alvarez (1981) and INEGI (using the latter's methodology; I thank Federico Estévez for sharing this series) provide figures for 1976–1993; INEGI (2005) for 1993–2002. The figure for 1993 is different in each, but its presence in both made it possible to consolidate the series into a single one of first-differences (growth) for the full period.

party. *PartyCoalesced* adopts a value of 1 for congressional elections where the party being analyzed ran in alliance with another party in the state, imputing votes with the method discussed above; it is 0 otherwise. This is intended to capture some of the measurement error resulting from the imperfect technique used to disaggregate a coalition's vote into its partisan components. If other coefficient estimates are unaffected by adding this control, we can be more confident that results are not an artifact of the imputation technique.

Alternative model specifications. Model 2 drops all controls for gubernatorial effects in order to estimate presidential coattails alone, an extension of models in the spirit of Ferejohn and Calvert (1984). Since no measure of presidential coattails in Mexican congressional elections seems to have been attempted in the literature, it offers a baseline to evaluate the estimation in tandem with gubernatorial coattails.¹¹

For a party system as changing as Mexico's, a sceptic will no doubt question the appropriateness of the return-to-the-mean approach, which presupposes a good deal of party system stability. The high degree of change experienced by the party system over the last decades is striking in Figure 2. The PRI's vote share falls below previous levels with two exceptions only, while the PAN tends to always fall above it and the PRD's is more volatile. Although the effect of a continuous drop in the PRI, and of a steady surge for the other parties ought to be captured by the constant term of the equation, two more model specifications are estimated to check the robustness of results.

Model 3 offers an alternative method of controlling the normal vote, with explicit focus on *change*, similar to Magar (2004). Instead of relying on the recent vote averages, the recent trend of change is obtained by regressing the party's vote share in the five previous congressional races on a linear time variable, then using it to forecast the present vote share. So to obtain a party's forecast for year y, the equation $VoteShare_y = \gamma_0 + \gamma YearDummies_t$

¹¹Software to simulate federal deputy returns by Márquez and Aparicio (2010)—not explicitly designed to estimate presidential coattails, however—offers a crude approximation. A counterfactual of the 2006 congressional contest where each party, in turn, is awarded a 10 percent raise in the presidential vote it received (with losses applied proportionally to all other parties) would have given the PAN a 7 percent bonus in its federal deputy vote, 11 percent to the PRI, and 16 percent to the PRD. I am grateful to Javier Aparicio for computing these estimates.

is fitted, with $t \in [y - 3, y - 6, y - 9, y - 12, y - 15]$ —the last five triennial congressional elections—and where $YearDummies_t$ indicate four of those election years. The dependent variable in model 3 is the residual for year y, the difference between the observed share in y and the 5-year trend forecast. A positive residual indicates a party that over-performed based on recent expectations; negative residuals indicate under-performance. Residuals for presidential and gubernatorial races are computed likewise, using the three sexennial elections instead of five. If coattail effects are present, over-performing in an executive race in some state will be associated with over-performance in that state's concurrent congressional race as well. This measure is less intuitive than vote shares, but might be more adequate for a party system as mutable as Mexico's over three decades.

And model 4 replicates model 1 with data in the 1997–2009 period instead of 1979–2009. This will contrast systematic effects over the longer run to those when Mexico's party system has more or less stabilized, the counting of the votes has become more transparent, and the playing field more level. Alternative specifications of the model were attempted, adding controls for other factors putatively affecting the congressional vote. None produced significant changes in the results I report below.¹²

Results of OLS estimation with panel-corrected standard errors (Beck and Katz 1995) appear in Table 2. Each estimation for the full period includes 352 observations (32 states multiplied by 11 congressional elections); the estimation for the democratic years has 160 observations (5 elections) only. All models explain a high portion of the variance in the dependent variable, as evidenced by determination coefficients: PAN's and PRI's are above 80% determination for share models; PRD's above 70%. Not too surprisingly, a fair portion of this high value is attributable to *RecentDvote* by itself, but nothing exaggerated: fitting

¹²Among other specifications I attempted was a fixed-state-effects version adding a dummy for each state in Mexico. This specification is rather blood-thirsty for coattails, adopting a skeptic's perspective that there is nothing really systematic about congressional elections, and all the action is attributable to state idiosyncrasies. It left coattail estimates fundamentally unaffected in size and significance. Ferejohn and Calvert's (1984) direct estimation of coattails, an alternative and interesting technique, offers a meagre panorama since it requires one to analyze only those congressional elections concurring with both a presidential and a gubernatorial election, a combination that has the least observations in Table 1.

		1997 - 2009							
	(1) shares		1979–2009 (2) shares		(3) residuals		(4) shares		
Variable	$\hat{\beta}$	p	$\hat{\beta}$	p	$\hat{\beta}$	p	$\hat{\beta}$	p	
Part A. PAN		_		_		_			
Constant	.084	.000	.074	.000	022	.004	.135	.000	
RecentDvote	.671	.000	.787	.000			.586	.000	
GovOnlyConcurs	057	.002			.017	.021	151	.005	
PresOnlyConcurs	058	.011	047	.051	.042	.000	097	.054	
Gov & PresConcur	063	.033			.038	.012	106	.102	
Gvote GovOnlyConcurs	.405	.000			.760	.000	.584	.000	
Gvote Gov & PresConcur	.500	.002			.163	.325	.444	.043	
Pvote PresOnlyConcurs	.421	.000	.341	.000	.875	.000	.446	.002	
Pvote Gov & PresConcur	096	.638			.930	.000	.018	.956	
IncumbentGovernor	.020	.155	.008	.583	.017	.123	.045	.021	
Incumbent President	025	.120	027	.128	.001	.926	047	.004	
Economy	.204	.141	.206	.176	.110	.233	145	.465	
PartyCoalesced	001	.990	.007	.802	014	.382	.016	.416	
Ν	352		352		352		160		
R^2	.84		.81	.81		.58		.82	
Part B. PRI									
Constant	.092	.050	.062	.213	.017	.507	.187	.000	
RecentDvote	.746	.000	.808	.000			.418	.000	
GovOnlyConcurs	190	.000			019	.092	288	.001	
PresOnlyConcurs	224	.000	199	.000	059	.005	249	.000	
Gov&PresConcur	232	.001			045	.081	235	.052	
Gvote GovOnlyConcurs	.291	.000			.737	.000	.620	.002	
Gvote Gov & PresConcur	.378	.270			.332	.185	.231	.478	
Pvote PresOnlyConcurs	.315	.000	.270	.005	.839	.000	.640	.000	
Pvote Gov & PresConcur	050	.876			.661	.013	.362	.329	
Incumbent Governor	.027	.168	.016	.449	.031	.062	.086	.000	
Incumbent President	033	.350	038	.298	014	.596	063	.006	
Economy	.402	.090	.438	.087	.048	.815	438	.005	
PartyCoalesced	.006	.801	.005	.834	003 .901		018	.132	
N	352		352		352		160		
R^2	.88		.87		.56		.74		
Part C. PRD									
Constant	.058	.005	.050	.022	010	.564	.098	.005	
RecentDvote	.608	.000	.665	.000			.475	.019	
GovOnlyConcurs	070	.000			.005	.670	125	.000	
PresOnlyConcurs	045	.123	034	.304	.014	.555	111	.039	
Gov&PresConcur	031	.424			.010	.718	104	.043	
Gvote GovOnlyConcurs	.785	.000			.927	.000	.878	.000	
Gvote Gov & PresConcur	.233	.474			.400	.371	051	.901	
Pvote PresOnlyConcurs	.577	.001	.530	.000	.815	.001	.488	.006	
Pvote Gov&PresConcur	.242	.443			.472	.227	.408	.298	
IncumbentGovernor	.084	.009	.077	.021	.024	.352	.102	.009	
Economy	059	.829	039	.904	040	.867	202	.608	
PartyCoalesced	058	.092	061 .147		001 .995		100		
N P ²	352		352		352		160		
R^2	.73		.67		.40		.67		

Table 2: Four models of coattail effects on congressional elections. Dependent variable in models 1, 2, and 4 is party's federal deputy vote share; in model 3 it is the residual of regressing recent previous elections on time to forecast present federal deputy vote share. Method of estimation is OLS, p-values computed with panel-corrected standard errors (Beck and Katz 1995), two-tailed tests.

model 1 dropping this variable reduces R^2 coefficients to .72 for the PAN and PRI, .61 for the PRD. Other variables contribute importantly to the explanation. The estimated effect of this independent variable, the standard measure of parties' normal vote, performs much as expected, despite marked changes in Mexico's party system. All estimated coefficients of *RecentDvote* are large—in general, much larger than coefficient estimates obtained for the other independent variables. The PRI's, at .746, is largest: throughout the 1979–2009 period, it tended to do well where it had done well, and do worse where it had done worse (a coefficient value of 1 would indicate identical state vote shares in subsequent elections). The .671 estimate for the PAN, and .608 for the PRD, are also good signs that the standard way of controlling for the normal vote is appropriate.

More important for this paper is the evidence of coattails. Statistical evidence supports the claim that coattails, for both presidents and governors, are sizeable. The estimate for *Pvote PresOnlyConcurs*, in the case of the PAN, is positive, as expected, reaching a value of .421. This confirms the presence of presidential coattails in Mexican congressional elections by one conventional standard (Ferejohn and Calvert 1984, Kramer 1971): holding other factors affecting PAN's performance in congressional races constant, a 2.4 percent increase in its vote for president translates into one extra percentage point in the concurrent federal deputies race in the state. With a coefficient estimate of .315, presidential coattails for the PRI are smaller than the PAN's. Achieving the same bonus in the concurrent congressional election requires a 3 percent increase in its vote for president. On the contrary, the PRD's presidential coattails are highest among major parties: a 1.7 percent increase in the vote received by the left's presidential candidate suffices to get the extra percentage point in the congressional vote for the state. These effects are not significant in size only, but statistically as well. Estimates much larger than their standard errors make the probability that the null of a zero value coefficient is true .001 or smaller for all parties—it is virtually nil. The positive coattail coefficient is therefore not a product of chance alone. The estimate for *Pvote* Gov& *PresConcur* fares less well. It is positive for the PRD, but negative for the PAN and the PRI; none, however, achieves statistical significance, so they are really indistinguishable from zero. A systematic presidential effect cannot be found when the congressional race also concurs with a gubernatorial one.

And there is abundant statistical evidence in the regressions to claim confidently that Mexican governors' coattails exist and are sizeable as well—that, by the conventional standard, they are not any shorter than presidential ones. A gubernatorial candidate's effect on the concurrent federal deputies race is positive for the PRI and the PRD when the races also concur with a presidential election: coefficient estimates for Gvote Gov&PresConcur are .378, and .233, respectively, none achieving statistical significance. The same effect is larger for the PAN, achieving a statistically significant estimate of .500, larger in fact than its presidential effect. But gubernatorial effects acquire statistical significance for all major parties when concurrence is with midterm congressional elections. The isolation from the effect of a presidential race in such circumstances renders this the appropriate measure for gubernatorial coattails. The PAN's estimate of .405 for Gvote GovOnlyConcurs is only 4 percent smaller in size than its presidential coattail. The PRI's estimate of .291 is 8 percent smaller than the presidential equivalent. But at .785, the PRD gets a gubernatorial coattail estimate that is 36 percent larger than the presidential kind. Holding other factors in the model constant, 5 extra percentage points in the gubernatorial race gave the PAN, the PRI, and the PRD a bonus of about 2, 1.5, and 4 percent more votes in the concurrent federal midterm. Considering the (major) party system as a whole, the average gubernatorial coattail (.5) is nearly 14 percent larger than the average presidential effect (.44). And from a statistical standpoint, the hypothesis that coefficients for *Pvote*|*PresOnlyConcurs* and Gvote Gov& GovOnlyConcurs are equal cannot be rejected with confidence for neither party.¹³ By the conventional standard, party-by-party gubernatorial and presidential coattails are about the same size; and parties are somewhat unlike one another-but have become more homogeneous in recent years, as will be seen below.

 $^{^{13}\}mathrm{The}$ levels of the tests are .40 for the PAN, .39 for the PRI, and .23 for the PRD.

By another coattails standard, parties are quite more distinct. The coattail coefficients in the regression estimate the marginal influence of votes for executive candidates on congressional votes only. Because the model allows intercept shifts for different concurrence regimes, thresholds of executive votes must be exceeded by the candidate before coattails actually add a congressional vote bonus against the level expected in the absence of concurrence. Take PAN's gubernatorial effect in midterms as illustration: one additional point for the gubernatorial candidate adds .405 extra points for the party in the state's congressional race, but the concurrence regime *GovOnlyConcurs* also brings the baseline congressional vote share down by -.057 compared to the non-concurrent baseline. So unless the PAN wins a gubernatorial vote share of at least .14 (the minimum *Gvote* needed to offset the drop in the regression line), the net effect of the coattail on congressional races will, in fact, be *negative*. A reminder that coattails are double-edged swords: just like good candidates for executive office help co-partisans concurrently running for Congress, bad ones hurt them. The PRD's threshold for presidential coattails, at .09, is not too different from the PAN's—both parties earn easy gains from concurrence. But the PRI's .65 implies that the party has mostly suffered rather than gained from concurrence since losing hegemonic status. Since 1988, the party exceeded that threshold in one out of every four gubernatorial contests; since 1994, in one of ten only. Presidential coattail thresholds by party match the gubernatorial quite well: .14, .71, and .08 for PAN, PRI, and PRD respectively. The next section illustrates thresholds more plainly.

Incumbency status had mixed results. Since the PRD never held the presidency in the period, variable IncumbentPresident was dropped from the equation. For the PAN and the PRI, however, tenant status at Los Pinos exerted a statistically insignificant drop of about -2.5 and -3.3 percentage points, respectively, on congressional votes compared to their opposition years, other factors constant. Having an IncumbentGovernor, however, exerted positive pulls for the PAN and the PRI, but neither effect can be confidently separated from chance alone. The PRD, however, did receive more than 8 extra percentage points when it controlled the governor's office, a statistically significant effect.

Estimates for retrospective judgements, despite the poor measurement of the *Economy* variable, produce acceptable results mostly in concordance with the expected positive coefficient. The PRI is by far the most sensitive to the state of the economy, obtaining a coefficient estimate of .402, significant at the .09 level only. In states it governs, and other factors held constant, a 5 percent three-year average increase in the GSP brings a 2 percent bonus in the PRI's congressional vote statewide; by variable construction, in states governed by another party, a 5 percent decrease in a state's economy brought the same bonus for the PRI. The economy's effect on the PAN's electoral fortunes is more modest (.204), significant at the .14 level only. The PAN would need a 10 percent average growth in GSP where it governs to earn the same 2 percent bonus in the congressional race. And the effect of the economy on the PRD is contrary to expectation, although indistinguishable from zero in statistical terms.

Finally, the variable *PartyCoalesced* enters the model to absorb some of the measurement error in voting figures due to electoral coalitions. It would seem that the vote imputation technique is about on target for the PAN and the PRI (the coefficient is not different from zero) but systematically underestimates the PRD's by about 6 percentage points. But more important is that with this variable included in the right side the equation still detects sizeable and significant coattail effects for both president and governor. Estimating the model without *PartyCoalesced* leaves other estimates largely unaffected: the most notable change involves to the PRD's presidential coattail estimate, which falls to .494 (from .577), but remains significant at the .001 level or better.

Coefficients suffer losses of 19, 14, and 9 percent in value for PAN, PRI, and PRD, respectively, when the three regressors capturing gubernatorial effects are dropped in model 2. Thresholds change only slightly. This argues that controlling gubernatorial coattails simultaneously offers an improved—and accentuated—estimate of presidential coattail effects. Including the concurrent race for governor variables, especially the *Gov&PresConcur* conditional, brings forth an increase in presidential coattails estimates, not the contrary. Gubernatorial and presidential coattails can not only be separated in a regression; joint control appear to be required to estimate each one without bias.

Results open an interesting perspective of how relatively vulnerable parties are to shortand long-term forces. The PRD's congressional vote is clearly more dependent on short-term factors than the PAN—lower coattail thresholds and steeper slopes—which in turn depends more on them than the PRI. The former hegemonic ruler of Mexico has had, and retains, very strong local bases of support tying a much larger extent of its fortunes to the normal vote than the other two parties. The PRD stands at the opposite end in this respect. This set of results is in line with Morgenstern's (n.d.) measures of parties' relative localism in congressional elections, although coattails show them more different from each other.

Coattail results are robust to two more model specifications. Model 4 employs a shorter time horizon, but is otherwise identical to model 1. In general, coattails in the democratic have become much bigger than in the longer span. The PRI experienced the most substantive increase, at least doubling its sensitivity to gubernatorial gubernatorial (+113 percent) and presidential (+103 percent) effects. The PAN's gubernatorial coattail in recent years experienced a more modest, yet important growth (+44 percent), with virtually no change in the presidential. This is proof that its erstwhile unilateral advantage in party organization across the board has been strongly challenged in years of PAN-controlled federal executive. The PRD's presidential coattails have shortened (-15 percent) but its gubernatorial lengthened (+12 percent). And coattail thresholds changed importantly for all parties. The gubernatorial thresholds shifted up to .26 (+85 percent) and .14 (+60 percent) for PAN and PRD, but dropped to .46 (-30 percent) for the PRI. Presidential thresholds migrated to .22 (+60 percent) and .23 (+190 percent) for PAN and PRD, down to .39 (-45 percent) for the PRI. Democratization has made the PRI much more susceptible to executive coattails in congressional elections, with more potential to experience the sweet side of contagion.

And model 3 estimates coattails for the full period in a different metric. Using the residuals approach to control the normal vote reveals that the rate of transfer of over- or

under-performance in the concurrent presidential election to the state's congressional races ranged from a low of 82 percent (for the PRD) and a high of 88 percent (for the PAN). The PRI's middle location, on par with the others, suggests that the residual approach internalizes its relatively more rapid change better than the other normal vote control. The estimated rate of transfer from a concurrent gubernatorial race is one-seventh smaller for the PAN and the PRI and one-seventh larger for the PRD. Thresholds for this models are all small, in the -.05 to .05 range. On average this other empirical approach to measure short-term effects confirms that gubernatorial coattails no smaller than presidential ones have characterized Mexican congressional elections in the last three decades.

All this is unexpected from, and indeed quite challenging for, the perspective of textbook Mexico, with its emphasis on a hierarchical juxtaposition of central (dominant) and state (subservient) governments (Cornelius and Craig 1988, Cossío Villegas 1981, Domínguez 1999, González Casanova 1965, Mecham 1940, Rodríguez 1997). Even if important changes in how localism is expressed have taken place—from local *caudillos* in the past to variably competitive elections now—federalism has had important, yet unacknowledged effects since the days of the PRI's hegemony. A re-estimation of the model with data ranging from 1979 to 1985 only, before the conditions supporting hegemony began to crumble, in fact produces coattail estimates not much different from those reported in Table 2.¹⁴ Federalism has been much less about window-dressing, and more about lively local political influences in Mexico than has been recognized, echoing work on fiscal politics by Díaz Cayeros (2006).

4 Interpreting the results

This section develops simulations to offer a more eloquent interpretation of gubernatorial coattail results. The proposed specification controls four alternative concurrence regimes,

¹⁴The only difference deserving a comment is a -.62, insignificant negative gubernatorial coattail for the PRD. It can be disregarded because it is the product of too few observations: between 1979 and 1985, the PRD's predecessors nominated six candidates for governor only in concurrent elections, receiving seven-tenths of one percentage point on average.

and does so with conditional variables and constitutive terms. Common regression coefficient tables don't allow to judge the effects of regime switching, but simulations do. The approach relies on Markov Chain Monte Carlo (MCMC) estimation, a convenient method to gauge the joint effect of several regression coefficients, to make predictions about coattails and their thresholds, and to reveal how precise inferences are (see Gelman and Hill 2007). The web appendix shows that MCMC estimates of model 4 are similar to OLS ones in Table 2.¹⁵

Model 4, covering the 1997–2009 period, was chosen for this exercise in simulation in order to illustrate a scenario more compatible with present-day Mexican elections. The scenario used to predict gubernatorial coattail effects has the following features. In order to remove the simultaneous effect of a presidential race on deputy votes, the focus of attention is a state with a gubernatorial race concurrent with the midterm congressional election. Each party is assumed to have received its 1997–2009 median vote return in the previous congressional race: .26 for the PAN, .47 for the PRI, and .13 for the PRD. Neither the state's governor nor current president belong to the party analyzed. And the state's economy grew by 3% on average in the last three years (the median value for the period). What effect does the model predict that varying shares in the concurrent gubernatorial vote have on the party's congressional performance in this hypothetical state holding the features above constant?

Figure 3 gives the answer, revealing three quite distinct major parties in Mexico. Each plot in the figure reports the marginal effect of a unit change in the gubernatorial vote share on the party's federal deputy vote share statewide—the slope of the *Gvote*|*GovOnlyConcurs* regression coefficient—holding the rest of the scenario constant. Solid lines report the median of the posterior distribution of simulated gubernatorial coattails, flanked by the 50% and 95% intervals to convey estimate precision. Three things are noteworthy.

As stated in section 3, parties are not too different since 1997 by the conventional standard. Considering point estimates of marginal effects only, a 45-degree line would indicate a

¹⁵Three chains were updated 5 thousand times each, preserving every tenth iteration from the second half. This generated a sample of $3 \times 250 = 750$ posterior simulations to derive the results discussed in this section. Gelman and Hill's (2007) $\hat{R} \approx 1$, suggesting that the chains had converged towards a steady state. BUGS (Lunn, Thomas, Best and Spiegelhalter 2000) used for MCMC estimation.

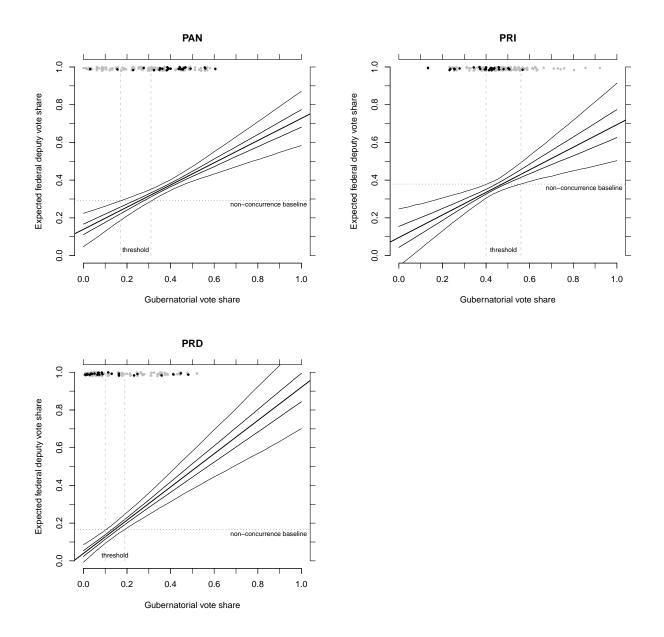


Figure 3: Gubernatorial coattails in congressional elections 1997–2009. Plots prepared with MCMC estimates of model 4 in Table 2. Panels report the median, 50%, and 95% intervals of the posterior distribution. The simulation scenario for each party has the following features: the last deputy vote share is set at the party's median value for the period; there is a concurrent governor but not presidential election; the party has no incumbent governor nor president; the state's economic performance set at the median value for the period; and no party coalesced in the congressional election. The non-concurrence baseline is the median of the posterior distribution when GovOnlyConcurs = 0 in the same scenario. Dots are the party's actual gubernatorial vote shares (y-jittered for visibility), heavier points for races concurrent with congressional elections.

one-to-one correspondence between votes in the two arenas—ie. a coattail of value 1. Not far below, the PRD dons the biggest gubernatorial coattails. The PAN and PRI's are shorter, but not by much. However when the 95% intervals are also taken into consideration, the task of discovering party differences becomes more challenging. The flattest line within the PRD's interval can easily fit in the intervals of both the PAN and the PRI. Using 1979–2009 data instead would make the PRI's congressional vote much less sensitive to gubernatorial effects, but it has lost its clear-cut distinctiveness since democratization.

By the other standard introduced in section 3 this is not quite so. Marginal effects do not consider the federal deputy vote share that parties would have received in the absence of a concurrent gubernatorial contest. A virtue of the research design pooling together observations from four concurrency regimes is that this counterfactual quantity can be estimated. Repeating the simulation for the purpose with variables GovOnlyConcurs and Gvote GovOnlyConcurs set to zero, but in an otherwise identical scenario as before, does the comparative statics. Dotted lines in plots are federal deputy vote shares expected in such circumstances (plots report the median of the posterior without credible intervals for clarity.) It is the party's average non-concurrence congressional vote, net of short-term forces, an estimate of its normal vote in a state like the hypothetical scenario. The PRI had a substantial mean normal vote of nearly .40. Despite a considerable drop in recent years—its normal vote would be above majority if model 1 were used instead of model 4-the PRI has had, and retains, relatively stronger ties to local electorates than the other parties. When considering evidence of a weakening PRI (Langston n.d., Morgenstern n.d.), it is important to keep in mind that levels also matter: the PRI began from very high voting share levels, and seems to remain above the other parties in terms of ties to the partian electorate in states. At the other end, the PRD had a non-concurrence y-intercept just above .15. The PAN is somewhere between, its mean normal vote at about .30.

And coattail thresholds further accentuate party differences. The level of the x-axis where regression line and non-concurrence baseline meet marks the level at which coattails start delivering net profits. This is the threshold that the gubernatorial vote must meet for the party to earn a congressional vote bonus compared to the absence of a gubernatorial contest. In the 1997–2009 period the PRD had the lowest gubernatorial coattails threshold at .15 $(\pm .05 \text{ if the } 95\% \text{ interval of the regression line is considered})$, PRI the highest at .48 $(\pm .08)$, and PAN at .24 $(\pm .07)$ was intermediate. When gubernatorial support fails to exceed the threshold concurrence turns into a bitter experience for congressional candidates running concurrently. Parties' actual gubernatorial vote shares in the period appear as darker points at the top of each graph (lighter points for non-concurrent gubernatorial races) to verify their standing with respect to this all-important line. The PRI was nearly on target but not quite, commonly just below the middle of the threshold range. To the contrary, it is plain that PAN exceeded its coattail threshold very systematically since 1997, gaining 5 to 20 percentage points for the state's congressional candidates vis-à-vis non-concurrence. And the PRD's situation is surprising to a high degree. The left routinely failed to exceed its threshold in spite of its remarkably low level (there were a handful of notable exceptions). Inability to produce good gubernatorial candidates combine with a very steep slope to seriously hurt the party's congressional slate. The left's average gubernatorial return in races concurrent with the midterm since 1997 is 7 percent. At that support level, the model's expected federal deputy return is 9 (± 4) percent, 8 points below the non-concurrence baseline. Had it nominated attractive candidates, as it in fact did in the 1997 Sonora state gubernatorial race, boosting support to 23 percent instead, the expected deputy vote would surge to 22 (± 4) percent, up five from the baseline. The PRD's actual deputy vote in Sonora was 27 percent.

All this informs well parties' interests in debates about reforming Mexico's profusion of dates in the electoral calendar. Until it can build more solid local bases, the PAN must argue in favor of having all elections concur as a way to win more votes in Congress. The PRD ought to be more cautious, at least until it can generate better candidates for subnational executive office. But the PRI should absolutely discourage concurrence to protect its relatively stronger local bases from increased competition in executive elections. When the administration recently circulated the idea of sending a bill to Congress proposing a single concurrent election date through federal legislation, the explicit rationale was to save money. The truth may well have been more partian.

The missing inference in all this discussion is how many seats these congressional vote bonuses can buy. Computing this is unfortunately not as straightforward as it may seem. Whether or not a vote premium translates into a seat premium will depend, on the one hand, on district margins: is the party a runner-up in many districts? and if so, is the vote premium enough to turn it into a winner? On the other hand, seats in Mexico can also be won by proportional representation in the parallel system, depending on the state population vis-à-vis other states in the multi-member PR district (Weldon 2001). Due to these complications, no attempt is made to compute this quantity of interest.

5 The bigger picture

The findings connect at least three prominent literatures in political science. One is the comparative study of electoral systems. In the search for cross-national patterns, scholars in that field have naturally paid attention to national-level phenomena. Witnessing gubernatorial coattails in Mexican congressional elections adds to growing evidence that local forces shape national election outcomes to important degrees in Argentina, Brazil, and the U.S. (Ames 1994, Cox and Munger 1989, Jones 1997, Samuels 2000). National election studies overlooking sub-national elections and institutions are incomplete at best, biased at worst.

Another is the debate on party systems nationalization (Caramani 2004, Cox 1997, Jones and Mainwaring 2003). The relative success of national or regional parties depends on which level of government voters credit for outcomes. Regional parties in Canada, India, Great Britain, and the U.S. have thrived when the center of economic and political authority has gravitated towards lower levels of government (Chhibber and Kollman 2004). Gubernatorial coattails in Mexico since 1979 serve as reminder that local voting influences may fall dramatically when authority is extremely centralized, but do not collapse to zero. Future research into local party organization and its ties to national campaigns may unveil this puzzle.

The other is the comparative study of federal institutions. If ambitious office-holders pay attention to others in proportion to how much they can determine their careers (Mayhew 1974), the discovery that Mexican federal legislators' electoral fortunes are decided, to an important degree, by *sub-national* voters, mediated by gubernatorial candidates in a concurrent race, implies that governors and their constituents have systematic influence in *national* policy. This resonates well with studies of reviving federal arrangements in the context of the Mexican (Flamand 2006, Rosas and Langston 2009) and Latin American (Gibson 2004) democratization. As more and more sub-national election data become available, the estimation of bottom-up coattails in national legislative races may in fact offer an indirect, yet relatively easy to obtain and compare measure of local v. national influence in policy.

Extensions of this work point to the study of turnout, candidate quality, and election calendars. It was noted above that the causal mechanism of coattails remains obscure. The approach has assumed that the crucial force behind is mobilization (Rosenstone and Hansen 1993). If so, turnout should follow predictable patterns and therefore becomes an obvious variable of interest for future research. Others are candidate quality and election calendars, two key treatments in the analysis. Both may be the subject of very interesting strategic considerations that my approach leaves aside (Engstrom and Kernell 2005, Jacobson and Kernell 1983). A handful of states in the period shifted local election timing, some to, others from concurrence with federal races. How much of the shifts is linked to coattails and other factors remains a mystery. Likewise, better candidates may have such considerations in mind when deciding whether or not to run for office. A more general approach to gubernatorial coattails will develop a theory where such features are endogenous, and resolve related estimation complexities.

6 Conclusion

This paper has shown that Mexican gubernatorial candidates from all three major parties don electoral coattails that congressional candidates in the same ticket ride systematically in their quest for office. A successful, concurrent campaign for state executive office confers a significant vote bonus to co-partisans running for federal deputy in the state. And gubernatorial coattails are not just present, they are large. For reference, consider that presidential coattails on congressional elections in Mexico, at a major-party average of .44 since 1979, and .53 since 1997, are between one-half and three-quarters larger than in the U.S. (Ferejohn and Calvert 1984). The average gubernatorial coattail is even longer than the presidential, at .49 since 1979 and .69 since 1997—between half and two-thirds of the success or failure of gubernatorial candidates has transferred to congressional candidates on the same ticket.

The evidence delivered also points to inter-party and temporal differences of importance. Least sensitive to short-term forces—both national and local—is the PRI, a party with solid presence in most congressional districts, whose machines toe the vote quite homogeneously from election to election, across the board. The party has nonetheless been losing this relative advantage in the last decade. Most sensitive is the PRD, still struggling to organize locally beyond a handful of states. The PAN, with a longer organizational history and tenure of federal executive office, stands between the other two. And it has been shown that gubernatorial coattails are no recent phenomenon, associated with democratization. Local forces have shaped the national electoral arena systematically and to an important extent since at least 1979.

This finding should interest students of federalism, but also electoral system and constitutional reformers. In arrangements where local office-holders are elected, attempts to modify the national party system must take into account the likely effect that sub-national races will have on national ones.

Appendix: Descriptive statistics of variables

Continuous variables, 19792009							Dichotomous
Variable		Obs	Mean	StdDev	Min	Max	Variab
Deputy share	PAN	352	.228	.133	.009	.583	PresOnlyCo
Deputy Share							
	PRI	352	.545				GovOnlyCon
	PRD	352	.112	.115	.002	.493	Gov\&PresCo
President share	PAN	160	.262	.145	.012	.610	Neither (d
	PRI	160	.499	.208	.050	.925	IncumbentGo
	PRD	160	.119	.120	.002	.556	
Governor share, all	PAN	173	.214	.171	0	.605	
	PRI	173	.614	.217	.133	1	IncumbentP
	PRD	173	.105	.133	0	.521	
Gov. sh., concurrent	PAN	49	.270	.178	0	.605	
	PRI	49	.579	.240	.134	1	PartyCoales
	PRD	49	.085	.126	0	.481	-
Economy	PAN	352	023	.036	260	.073	
-	PRI	352	.020	.038	073	.260	
	PRD	352	027	.033	260	.056	

Dichotomous variables, 19792009							
Variable		0	(%)	1	(%)		
PresOnlyConcurs		202	(57)	150	(43)		
GovOnlyConcurs	313	(89)	39	(11)			
Gov\&PresConcur	342	(97)	10	(3)			
Neither (droppe	199	(57)	153	(43)			
IncumbentGov	PAN	312	(89)	40	(11)		
	PRI	62	(18)	290	(82)		
	PRD	332	(94)	20	(6)		
IncumbentPres	PAN	256	(73)	96	(27)		
	PRI	96	(27)	256	(73)		
	PRD	352((100)	0	(0)		
PartyCoalesced	PAN	320	(91)	32	(9)		
	PRI	297	(84)	55	(16)		
	PRD	288	(82)	64	(18)		

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