

Chancellor Model Predicts a Change of the Guards

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When the votes for the Bundestag have been tallied on September 24, 2017, Germany will most likely get a new chancellor. This is the forecast of the Chancellor Model (Norpoth and Gschwend 2013), as of March 2017, to be updated throughout the election year. *Machtwechsel*, a change of the guards, in the Federal Republic is in the air. Martin Schulz, the Social Democratic candidate for chancellor, is poised to take over from Christian Democrat Angela Merkel, ending her 12-year tenure as German chancellor, spanning three full terms with a varied cast of coalition partners.

Schulz will have an embarrassment of riches to choose from in assembling the coalition pieces of the new government (figure 1). The chances of a red-red-green coalition (Social Democrats, Linke, and Greens) commanding a majority of seats in the next Bundestag are 83 out of 100, according to our model. If that is not the government option Schulz wants to pursue, or if this cannot be worked out among the prospective partners, he can entertain a “Traffic Light” coalition (Social Democrats, Free Democrats, and Greens). This one also has 83 out of 100 chances, according to our model, of securing a majority of seats. And if that option proves elusive, Schulz can fall back on staying with the CDU/CSU, the SPD’s partner in the Grand Coalition, though with him as the chancellor now. The reason: the chances of the SPD beating the CDU/CSU in the 2017 election are 66 out of 100, according to our model.

One way or the other, it looks very promising right now for Schulz to be elected federal chancellor this September. The best chance for Merkel to retain the chancellorship is through a coalition of the CDU/CSU with the Free Democrats (FDP) and the Greens. We rate the chances of that combination to command a majority of seats as 69 out of 100. We are very doubtful, however, that the Greens would prefer a coalition with the CDU/CSU to one with the SPD, especially if the latter comes out ahead in the election.

The main reason our model rates the prospect of a Chancellor Schulz so high is that the German electorate heavily favors him in a one-on-one chancellor duel over Merkel. Schulz leads Merkel 49–38 in the February poll of the Forschungsgruppe Wahlen; other polls have shown similar leads. Granted, Germany is not a presidential system, where voters elect the chief executive. They vote for members of the legislative branch who then elect a chancellor. But, as the Chancellor Model has convincingly shown, the marks on the ballots in Bundestag elections bear the stamp of chancellor preferences.

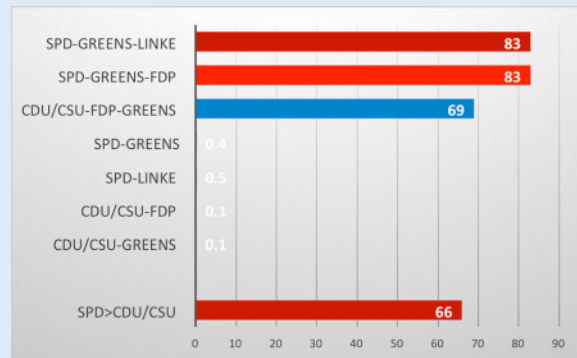
The other reason to be bullish on a challenger like Schulz is that after three terms in office, the German electorate is in a mood for change. This is not unusual. Donald Trump greatly benefitted from that sentiment in the recent US presidential election after two terms of Democratic control of the White House. Demand for change along with Trump’s doing better in presidential primaries than did Hillary Clinton predicted his victory early on in 2016 (Norpoth 2016; <http://primarymodel.com/>). Incumbent fatigue and an appealing challenger augur well for a changing of the guard this year in Germany, too.

THE FORECAST RECORD

This is not the first time we are making a forecast of a Bundestag election. We introduced the Chancellor Model, as we called it, in time for the 2002 Bundestag election, and have used it for every Bundestag election since. For the record, the model forecasts have proved uncannily accurate and/or correctly picked the chancellor of the next government. In 2002, with polls and pundits writing off Chancellor Schroeder’s red-green coalition, we predicted its reelection. Our vote forecast, issued three months before Election Day, got the combined vote of SPD and Greens right to the decimal—47.1%—a feat unmatched by any poll or election-night projection (Norpoth and Gschwend 2003). In the election of 2005, called one year ahead of schedule, our model correctly predicted that the red-green coalition would fail to get reelected but prove strong enough to prevent the formation of a black-yellow coalition (CDU/CSU and FDP). Our vote forecast came within three-tenths of a single percentage point for the governing parties, closer than other poll or projection (Gschwend and Norpoth 2005). In 2009, with a Grand Coalition (CDU/CSU and SPD) in office under Chancellor Merkel, we predicted that a new coalition (CDU/CSU and FDP) would win enough votes to secure a majority of seats in the Bundestag (ZEIT Blog 2009). This came to pass and Chancellor Merkel formed a new government with the FDP as her coalition partner. In 2013, our model predicted that Merkel’s coalition would capture enough votes to stay in office (Norpoth and Gschwend 2013). Two-tenths of a percentage point separated this forecast from its target. That was the gap by which the FDP, notching 4.8% of the vote, missed the 5% threshold of the vote required for getting seats in the Bundestag. Nonetheless, as predicted, Merkel remained in office as chancellor, though with another junior partner to replace the FDP.

Figure 1

Chances of Each Coalition Winning a Majority of Seats, and Chances of SPD beating CDU/CSU



THE PREDICTORS

By now, election forecasting is a worldwide phenomenon, encompassing an ever expanding variety of approaches and formulae (Stegmaier and Norpoth 2017). Building on core determinants of the voting decision familiar from classics like *The American Voter* (Campbell et al. 1960, updated by Lewis-Beck et al. 2008), the Chancellor Model puts a premium on the popularity of the top candidates for the job of chief executive. It is a more inclusive indicator than economic performance, a widely used predictor in forecast models. Our operational measure of chancellor popularity, for most elections, takes the preferences for the two chancellor candidates recorded in polls one to two months before Election Day. This measure correlates quite strongly (0.70) with the incumbent vote in the 17 Bundestag elections since 1953. Still, this leaves room for other predictors to make their weight felt.

Needless to say, in German elections as elsewhere partisan attachments, whatever one may call them, hold a strong grip on voters (Campbell et al. 1960, Lewis-Beck et al. 2008). Partisanship affects how voters feel about the candidates for the highest office but the effect is not so powerful that one is simply the other side of the same coin. For a model of the aggregate vote, as used here, we constructed a measure of long-term partisanship by averaging a party's vote share in the last three Bundestag elections, except for the first two. This measure correlates fairly strongly (0.59), though less so than chancellor popularity, with the incumbent vote in the 17 Bundestag elections since 1953.

And finally, incumbent governments face longer and longer odds for reelection, the more terms they accumulate in office. In American presidential elections time is up for the White House party after two terms. During the last 70 years, the spell was broken only once—in 1988, when George H.W. Bush extended the Republican hold on the White House for a third term. While German politics during the nearly 70 years of the Federal Republic's existence has not been afflicted with an aversion to third terms,

the governing parties nonetheless lose electoral support as their tenure lengthens ($r = -0.38$).

As is clear by now, any vote forecast of interest in German elections will not be about a single party or candidate. With no party strong enough to command a majority, one must forecast the combined vote of the coalition parties forming the government. This is what our model typically does except for the unusual situation of a Grand Coalition. In that case, each of the partners will be seeking an alternative after the next election, as happened after the 1969 and 2009 elections, and most likely after the 2017 election as well.

We have estimated the size of the three predictors with data from all but one of the 17 Bundestag elections from 1953 to 2013; there was no poll about chancellor popularity in 1949, the initial election. As can be seen in table 1, each of the predictors proves highly significant and robust.

The parameter estimates for 1953–2013 are very consistent with those obtained for forecasts of previous elections, beginning in 2002. We used the same operational definitions measures for chancellor support and long-term partisanship as before. For the term-effect, however, we took the unlogged number of terms this time so we would be able to predict the vote for parties (or party) in a future government headed by a brand new chancellor (Martin Schulz). A Merkel-led government gets a term-value of '3' while a Schulz-led government gets a term-value of '0'. The in-sample predictions of this model deviate by no more than 1.5 percentage points from the actual vote and the overall fit stays above 0.9. Past performance, of course, as the saying goes, is no guarantee of future success, but it cannot help build confidence.

THE 2017 FORECAST

There is no suspense that the two parties in the federal government right now, the CDU/CSU and the SPD, will win a majority in the 2017 election. The chances of that happening are practically 100 out of 100. The only suspense about a Grand Coalition is which of the two partners will come out on top in the election and thus make the stronger bid for the

Table 1

Statistical Estimates of Vote Predictors

Vote Predictors	Parameter (SE)
Chancellor Support	.39*** (.05)
Long-term Partisanship	.79*** (.08)
Term	-1.18** (.32)
Constant	-8.95 (4.8)
\bar{R}^2	.93
Root Mean Squared Error	1.49
(N)	(17)
Ljung-Box Q (5 lags)	2.08

Note: Model estimation based on elections 1953-2013.

* $p < .05$ ** $p < .01$ *** $p < .001$

chancellorship. At the same time, it is no secret that each partner will be tempted to leave the marriage for a liaison with a younger one. This is where election forecasting this year turns into an intriguing exercise. So we have tweaked our model to come up with vote forecasts for quite a few scenarios along with their chances of success.

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Right now, we predict that a red-red-green coalition (SPD, Linke, Greens) will get 49.3% of the vote in the 2017 election. Is that enough to win a majority of seats in the Bundestag and thus be able to form a government? Assuming that the votes for all the other parties failing to get seats in the Bundestag add up to at least 5%, one can safely stipulate half of 95% of the vote as the threshold for a majority of seats. By that standard, we estimate that the chances of Red-Red-Green winning a majority are 83 of 100, as shown in figure 1. In order to assess the chances of winning we employ a parametric bootstrap approach (King et al. 2001). When we say a coalition has a 83% chance of winning a majority we simulate 10,000 predictions for the 2017 election and in about 8,300 of those the combined vote share of this coalition is predicted to be greater than 47.5% (= 95/2).¹

Our model makes the same forecast with the same probability of success for a “Traffic Light” coalition (SPD, FDP, Greens). It’s up to the Social Democratic chancellor candidate Martin Schulz to choose which one, if any, he prefers and what he can work out with those parties. He is also in a privileged position vis-à-vis the CDU/CSU. Our model predicts, as of early March, that his party will edge the CDU/CSU 34.5 to 33.6% of the vote—enough to rate the chances of the SPD coming out ahead as 66 of 100. Short of topping the SPD and continuing the Grand Coalition, Merkel’s best hope is for a coalition with the FDP and the Greens. It would get 48.3% of the vote and its chances of winning a majority of seats would be 69 of 100. German politics after this election is headed for suspense and intrigue. Our forecasts right now, of course, are based on the values

of the predictors, one of which is subject to change—the popularity of the chancellor candidates. Martin Schulz is a new face in German politics. His lead over Merkel in the chancellor duel may be fragile. Any shrinkage of that lead would diminish his prospect of becoming Germany’s next chancellor. ■

NOTE

1. Why do we get so many different predictions for the same election? Our simulations of the predicted election outcomes differ ever so slightly because they reflect two types of uncertainty inherent in every prediction. First, there is estimation uncertainty of our model parameters that accounts for the historical uncertainty since 1953 (see table 1) we face when predicting a typical election. Every concrete election prediction such as the 2017 election depends additionally on the influence of innumerable chance events that arise during election campaigns. These chance events potentially influence the outcome in September but are not systematically part of our model. Even if we knew the exact regression parameters (i.e., without error) the second type of uncertainty, fundamental uncertainty, would prevent us from predicting the outcome perfectly. Thus, the variability of our simulated election predictions reflects both types of uncertainty.

REFERENCES

- Campbell, Angus, Philip E. Converse, Warren E. Miller, and Donald E. Stokes. 1960. *The American Voter*. New York: Wiley.
- Gschwend, Thomas and Helmut Norpoth. 2005. “Prognosemodell auf dem Prüfstand: Die Bundestagswahl 2005.” *Politische Vierteljahresschrift* 46 (4): 682–88.
- King, Gary, Michael Tomz, and Jason Wittenberg. 2000. “Making the Most of Statistical Analyses: Improving Interpretation and Presentation.” *American Journal of Political Science* 44 (2): 347–61.
- Lewis-Beck, Michael S., William G. Jacoby, Helmut Norpoth, and Herbert F. Weisberg. 2008. *The American Voter Revisited*. Ann Arbor: University of Michigan Press.
- Norpoth, Helmut. 2016. “Primary Model Predicts Trump Victory.” *PS: Political Science & Politics* 49 (4): 655–58.
- Norpoth, Helmut and Thomas Gschwend. 2003. “Against All Odds? The Red-Green Victory.” *German Politics and Society* 21 (1): 15–34.
- . 2013. “Chancellor Model Picks Merkel in 2013 German Election.” *PS: Political Science & Politics* 46 (3): 481–82.
- Stegmaier, Mary and Helmut Norpoth. 2017. “Election Forecasting.” In *Oxford Bibliographies in Political Science*. New York: Oxford University Press.
- ZEIT Blog. 2009. <http://blog.zeit.de/zweitstimme/2009/10/14/das-kanzlermodell-bei-der-wahl-2009-diesmal-kein-volltreffer/>