

Web Appendix

Economic and Social Outsiders but Political Insiders: Sweden's Radical Right

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W1. Economically Vulnerable Populations in Swedish Survey Data

Swedish social scientists have relied on survey data to reject the idea that economic insecurity or long-term economic and social decline can explain Sweden-Democrat voting (most notably Sannerstedt 2014, 2015, and Jylhä et al. 2018). These authors present two main pieces of evidence to arrive at this conclusion: (1) *A majority* of the party's voters do not self-report to be among the unemployed, enrolled in an unemployment program, on long-term sick leave or on disability pension. (2) The income distribution of self-reported Sweden Democrat voters is highly similar to the income distribution of the population.

We take issue with the definitions and the data quality underlying this analysis. On the definition point, using the categories of unemployed, and sickness- or disability-pension recipients may be a reasonable proxy for people outside of economic activity. But it leaves out some social-support systems as well as low-income seniors. More importantly, other economically insecure voters are not captured by the proxy. The sociological construct of the SELMA model, which we use in this paper, highlights the differences between a core labor force (which we call labor-market insiders) and other groups with an unstable status in the labor market (which we call labor-market outsiders). These people, who make up 11 percent of the voting population in our data, go back and forth between employment and non-employment, but do not qualify for other support systems as their main source of income. Another point we highlight in this paper is that economic insecurity can be very real also among people with more stable employment, because of sectoral or occupational variation in the risk of losing one's job, from e.g., automation, digitization, or globalization. Taken together, the segments of workers who face significant economic insecurity are a great deal larger than the people outside of economic activity.

When it comes to data quality, survey data is not stratified on income or other labor-market variables. Neither is it stratified on region of birth. Even though survey respondents may be representative of the population income distribution, these multiple sources of prospective measurement error may make it highly unrepresentative in terms of labor-market categories. In the low-income category, students are more likely to respond, at the same time as foreign-born and social-support recipients are less likely to respond. The low response rate for foreign-born people is likely to overstate the Sweden-Democrat vote share, while the low response rates for social-support recipients is likely to understate it.

Calculating response rates for subgroups of the population in surveys is difficult, because sub-group characteristics are typically self-reported, or unavailable for the full population. An exception to this rule is the 2010 Swedish National Election Survey (NES), which partly builds on register-based measures. This survey also has a very high response rate, 69 percent, meaning that differential response rates is probably a smaller problem than in other surveys (e.g., the SOM survey that we use in the text has a response rate of 50 percent). In the NES, the share of Sweden Democrats voters was 3.8 percent in 2010, which under-represented the party's actual vote share in the 2010 election by more than a third

(the party won 5.7 percent of the vote). NES includes two register-data variables that we can compare to the full population: taxable income, which is available in the survey as the respondent's population percentile, and level of education, which we can compare to the population distribution in our register data.

The results are shown in Table W1. It shows that voters with low income and education are clearly underrepresented, while those with high income or education are over-represented in the NES. For example, the coverage of voters in the lowest 15 percentiles is 77 percent, while those with primary education have an average representation of less than 80 percent. If we would look at the intersection of these groups, the relative response rate would in all likelihood be even lower. Although this issue may not be too important when looking for the probability that certain groups vote Sweden Democrat, it creates a large problem if we look to describe the "typical" Sweden-Democrat voter, as the missing voters are more likely to have low income and education.

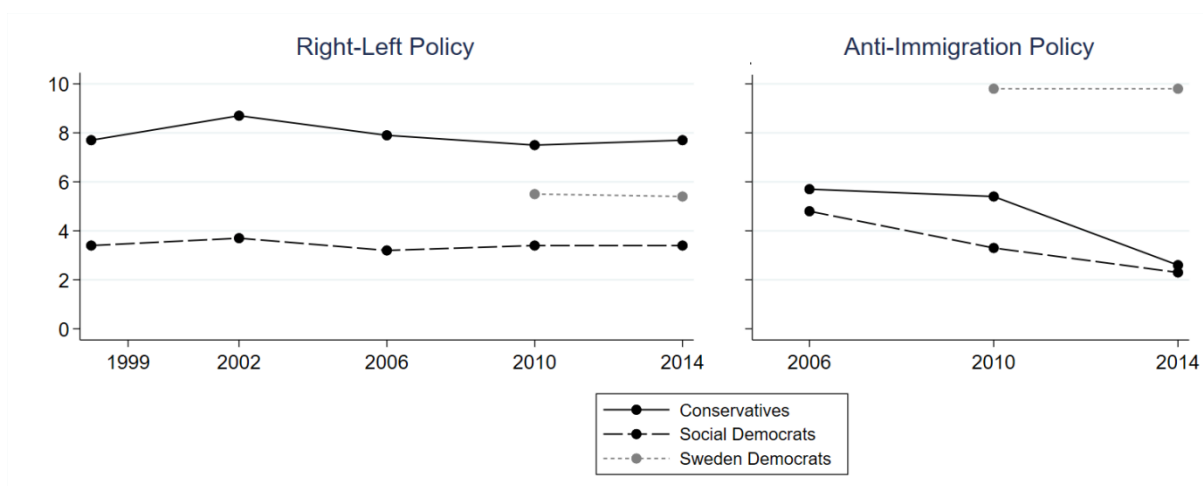


Figure W1. Political Platforms of Conservatives, Social Democrats, and Sweden Democrats.

Notes: Data from the CHESDATA expert survey on party platforms. The left-hand side graph shows the Right-Left policy positions and the right-hand side shows Immigration policy.

Table W1. Response Rates for Income and Education Categories in the 2010 National Election Survey.

	(1) Share of Respondents	(2) Share of Population in 2010	Over/under- representation (1)/(2)
Taxable Income			
1-15 percentile	12%	15%	77%
15-35 percentile	17%	20%	87%
36-65 percentile	31%	30%	104%
66-85 percentile	22%	20%	111%
86-100 percentile	18%	15%	118%
Education Level			
Primary, less than 9 years	7%	12%	65%
Primary at least 9 years	10%	11%	84%
Secondary education	46%	55%	83%
Tertiary education	36%	31%	116%
Doctoral degree	1%	1%	130%

Notes: Oskarsson and Holmberg (2011, Table 32) report numbers of respondents in the 2010 Swedish National Election Survey (N=2,387), across percentiles of taxable income and levels of education. We use these numbers to calculate the percentages shown in Column (1). For the distribution of levels of education in the Swedish adult population, we use a 2010 cross-section of the administrative data described in Section 2 (N=7,345,349).

Figure W2. Comparison of Economic and Social Outsider Groups, and Immigrant Exposure, across All Parties and the Swedish Population.

Notes: The figure replicates Figure 5 for each political party with at least one seat in the Swedish parliament during the sample period. The Sweden Democrats are shown as black bars, and other parties are divided by political bloc, left or center-right. Population N=19,317,388; Sweden Democrats N=1,402; Left Party N=2,611; Social Democrats N=15,343; Green Party N=1,679; Center Party N=5,151; Liberal Party N=2,812; Christian Democrats N=2,350; Conservative Party N=7,457. Additional information in the notes to Figure 5.

Table W2. Pairwise Correlation Matrix.

	L-M Outs.	Vul. Insider	Received Welfare	Single or Div	Father L-M Outs. in 1985	Father Welfare in 1985	Parents Div. by 18	Share of Immigrants in			
								Ind.	Occ.	Neighb.	Welfare recip. in Neighb.
Labor Market Outsider	1										
Vul. Insider		1									
Received Welfare	0.25	0.02	1								
Single or Div	0.15	0.08	0.08	1							
Father L-M Outs. in 1985	0.10	0.05	0.07	0.06	1						
Father Welfare in 1985	0.09	0.03	0.13	0.05	0.23	1					
Parents Div. by 18	0.12	0.04	0.12	0.12	0.17	0.20	1				
Share of Immigrants in											
Industry	0.06	-0.03	0.04	0.03	0.02	0.04	0.04	1			
Occupation	0.09	-0.03	0.06	0.06	0.05	0.06	0.06	0.34	1		
Neighborhood	0.06	-0.05	0.08	0.11	-0.03	0.03	0.05	0.06	0.02	1	
Welfare recip. in Neighb.	0.07	-0.02	0.09	0.11	-0.02	0.03	0.04	0.05	0.04	0.59	1

Notes: Pairwise correlations between the 11 indicators for economic and social outsider groups, and immigrant exposure (see Figure 3). Data is four pooled cross sections: 2002, 2006, 2010, 2012. N=19,461,404

Table W3. Regression Estimates Corresponding to Figure 6.

	(1) Municipality- Election Year F.E.	(2) + Controls for Education, Age, and Sex	(3) + Controls for the Other Indicators
DV: Labor-Market Outsider			
Sweden Democrat = 1	0.27*** (0.01)	0.27*** (0.01)	0.15*** (0.02)
Observations	40,313	40,287	12,561
DV: Vulnerable Insider			
Sweden Democrat = 1	0.28*** (0.02)	0.15*** (0.02)	0.17*** (0.02)
Observations	30,383	30,374	9,422
DV: Received Social Welfare			
Sweden Democrat = 1	0.05*** (0.00)	0.04*** (0.00)	0.04*** (0.00)
Observations	40,313	40,287	12,561
DV: Single or Divorced			
Sweden Democrat = 1	0.24*** (0.01)	0.21*** (0.01)	0.16*** (0.02)
Observations	40,313	40,287	10,999
DV: Father Outsider in 1985			
Sweden Democrat = 1	0.09*** (0.01)	0.09*** (0.01)	0.06*** (0.02)
Observations	22,015	22,015	10,999
DV: Father Welfare in 1985			
Sweden Democrat = 1	0.06*** (0.01)	0.06*** (0.01)	0.03*** (0.01)
Observations	22,172	22,172	10,999
DV: Parents Divorced by Age 18			
Sweden Democrat = 1	0.18*** (0.02)	0.14*** (0.02)	0.12*** (0.02)
Observations	14,172	14,169	10,999
Immigrant Share in Industry > Median			
Sweden Democrat = 1	0.04*** (0.01)	0.06*** (0.01)	0.01 (0.02)
Observations	38,668	38,650	10,999
Immigrant Share in Occupation > Median			
Sweden Democrat = 1	0.16*** (0.02)	0.16*** (0.02)	0.14*** (0.02)
Observations	33,064	33,056	10,999
DV: Immigrant Share in Neighborhood > Median			
Sweden Democrat = 1	0.01 (0.01)	0.01 (0.01)	0.01 (0.02)
Observations	40,313	40,287	10,999
DV: Immigrant Share among Welfare Recipients in Neighborhood > Median			
Sweden Democrat = 1	-0.01 (0.01)	-0.02 (0.01)	-0.02 (0.02)
Observations	38,931	38,906	10,999

Notes: Standard errors in parentheses, *** p<0.01, ** p<0.05, * p<0.1 Controls for education level (7 dummies), age bracket (6 dummies), sex at birth (1 dummy). Other indicators for the analysis of politicians are described in Figure 3 and Section 3.2.

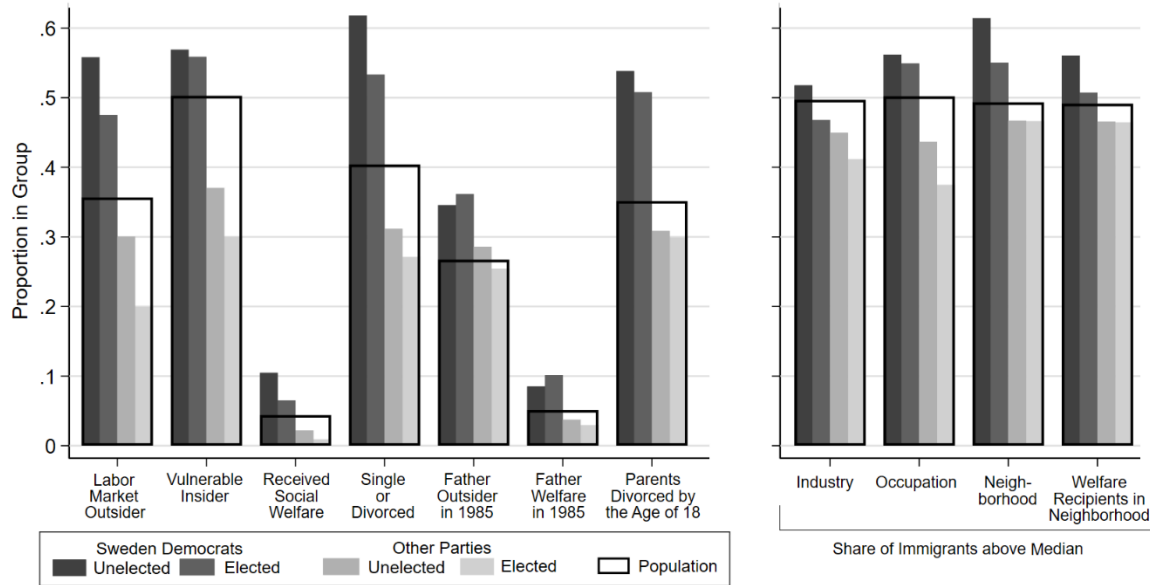


Figure W3. Comparison of Economic and Social Outsider Groups, and Immigrant Exposure, between Unelected and Elected Municipal Councillors.

Notes: The figure replicates Figure 5 for nominated municipal politicians who were not elected to the municipal council, as well as municipal councillors. Additional information in the notes to Figure 5. Elected Sweden Democrats N=1,402; Nominated Sweden Democrats N= 2,087; Elected Other Parties N=38,911; Nominated Other Parties N=149,911; Population N=19,317,388.

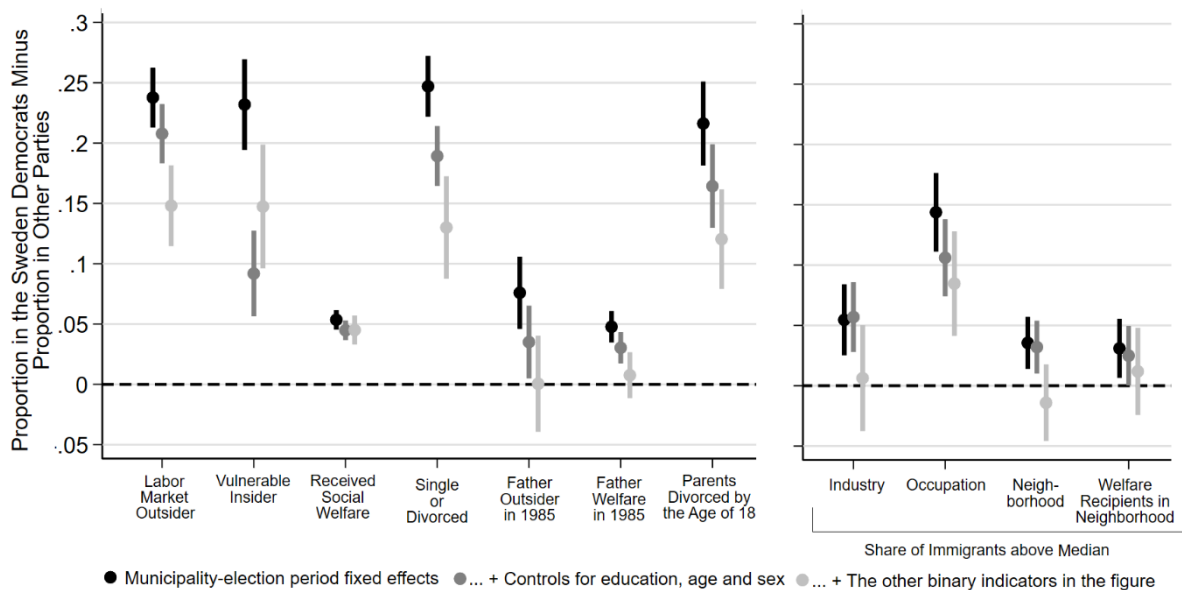


Figure W4. Replication of Figure 6 for Nominated, Unelected Politicians.

Notes: See notes for Figure 6. The data is pooled cross-sections for all nominated politicians in municipal elections in 2002, 2006, 2010, and 2014, who did not win a council seat. The number of observations varies slightly between outcome variables from the full sample of N=1,402 Sweden Democrats and N=38,911 politicians in other parties.

Table W4. Regression Estimates Corresponding to Figure 9.

	(1)	(2)	(3)	(4)	(5)
Labor-Market Outsider	0.029*** (0.001)				0.023*** (0.003)
Vulnerable Insider		0.086*** (0.001)			0.080*** (0.002)
Single or Divorced			0.014*** (0.001)		-0.013*** (0.001)
Parents Divorced by Age 18				0.093*** (0.003)	0.056*** (0.004)
Received Social Welfare					-0.013*** (0.004)
Father Outsider in 1985					0.009*** (0.002)
Father Welfare in 1985					-0.001 (0.005)
Immigrant Share in Industry > Median					-0.005* (0.003)
Immigrant Share in Occupation > Median					0.033*** (0.003)
Immigrant Share in Neighborhood > Median					-0.049*** (0.002)
Immigrant Share among Welfare Recipients in Neighborhood > Median					0.001 (0.001)
Observations	17,427	17,427	17,427	17,427	17,267

Notes: Standard errors in parentheses, *** p<0.01, ** p<0.05, * p<0.1

Table W5. Regression Results for Municipal Sweden-Democrat Vote Share in Parliamentary Elections, Inequalities Measured with National Gaps in Income and Unemployment

	(1)	(2)	(3)	(4)	(5)	(6)
Panel A: National Gaps in Income						
Income Inequality	1.10*** (0.30)		1.02*** (0.28)	2.80*** (1.04)		2.24*** (0.82)
Unemployment Inequality		2.55*** (0.42)	2.41*** (0.42)		4.75*** (0.40)	4.56*** (0.41)
Observations	1,160	1,159	1,159	1,160	1,160	1,160
Panel B: Municipal Gaps in Income						
Income Inequality	0.99*** (0.24)		0.97*** (0.23)	1.15*** (0.31)		1.14*** (0.30)
Unemployment Inequality		0.35*** (0.10)	0.32*** (0.10)		0.36*** (0.11)	0.35*** (0.10)
Observations	1,160	1,159	1,159	1,160	1,160	1,160
2006 Population Shares				x	x	X

Notes: Robust standard errors clustered at the municipality level in parentheses, *** p<0.01, ** p<0.05, * p<0.1. All regressions are estimated with OLS and include municipality and election-period fixed effects. Columns using “2006 Population Shares” show estimates from regressions where the inequality measurements are calculated based on the 2006 population shares rather than the current shares (details in Section 5.2).

Figure W5. Descriptive Representation of Top-four predictive Outsider-Status Groups
in New Political Parties

Notes: The figure shows the shares of people in four groups of interest among municipal councilors for four new political parties compared to the Swedish working-age population. The observations correspond to the first year of entry to parliament of each party: 2010 for the Sweden Democrats and 1991 for the other three (the Green Party first entered in 1988 but due to data-quality issues we also use 1991 observations for this party). Green Party N=367; Christian Democrats N=772; New Democracy N=235; Sweden Democrats N=374; Population in 1991 N=4,667,038; Population in 2010 N=4,880,945.

Figure W6. Vote Shares of New Political Parties by the Population Shares
of Economic and Social Outsider Groups.

Notes: The figure shows binned averages of vote shares of three new political parties in the 1991 election. The level of observation is a cross-section of Sweden's 290 municipalities, and the *x*-axis shows the share of economic and social outsider categories in the municipal population. Each bin contains 5 observations.

Table W6. Regression Estimates Corresponding to Figure 11.

	(1) Municipality-Election Period FE	(2) + Controls for Education, Sex and Age	(3) + Controls for Groups in the Analysis of Politicians
DV: Public Sector Experience			
Sweden Democrat=1	-0.746*** (0.025)	-0.412*** (0.024)	-0.239*** (0.028)
Observations	51,100	51,036	38,906
DV: Political Experience			
Sweden Democrat=1	-1.126*** (0.031)	-1.046*** (0.029)	-0.824*** (0.034)
Observations	51,100	51,036	38,906
DV: Years of Education			
Sweden Democrat=1	-0.599*** (0.023)	-0.577*** (0.022)	-0.459*** (0.026)
Observations	51,036	51,036	38,906
DV: Earnings Score			
Sweden Democrat=1	-0.762*** (0.033)	-0.787*** (0.033)	-0.413*** (0.034)
Observations	38,146	38,144	29,628
DV: Public Service Motivation			
Sweden Democrat=1	-0.638*** (0.053)	-0.547*** (0.053)	-0.594*** (0.065)
Observations	6,014	6,012	4,241
DV: Honesty-Humility			
Sweden Democrat=1	-0.248*** (0.052)	-0.144*** (0.052)	-0.105 (0.064)
Observations	6,352	6,349	4,479

Notes: Standard errors in parentheses, *** p<0.01, ** p<0.05, * p<0.1. Controls for education level (7 dummies), age bracket (6 dummies), sex at birth (1 dummy) and other indicators for outsider status and immigration exposure (for empirical operationalizations, see Section 3.2).

Table W7: Comparison of Earnings Scores and Years of Education by Group.

	(1) Working-age Population	(2) Sweden Democrat Politicians	(3) Other Party Politicians	Diff (2)-(1)	Diff (3)-(1)
Sample: Labor-Market Outsider					
Earnings Score	-0.62	-0.7	-0.17	-0.08	0.45
Years of Education	12	12	13.2	0	1.2
Sample: Vulnerable Insider					
Earnings Score	0.24	0.13	0.47	-0.11	0.23
Years of Education	11.9	11.8	12.5	-0.1	0.6
Sample: Received Social Welfare					
Earnings Score	-0.99	-0.98	-0.02	0.01	0.97
Years of Education	11.1	11.9	13	0.8	1.9
Sample: Single or Divorced					
Earnings Score	-0.04	-0.28	0.48	-0.24	0.52
Years of Education	12	12.1	13.6	0.1	1.6
Sample: Father Outsider in 1985					
Earnings Score	-0.03	-0.26	0.36	-0.23	0.39
Years of Education	12.3	12.3	13.4	0	1.1
Sample: Father Welfare in 1985					
Earnings Score	-0.22	-0.18	0.3	0.04	0.52
Years of Education	11.8	11.9	12.3	0.1	0.5
Sample: Parents Divorced by Age 18					
Earnings Score	-0.04	0.19	0.38	0.23	0.42
Years of Education	12.5	12.1	13.7	-0.4	1.2
Sample: Immigrant Share in Industry > Median					
Earnings Score	0.13	-0.14	0.49	-0.27	0.36
Years of Education	12.8	11.9	13.5	-0.9	0.7
Sample: Immigrant Share in Occupation > Median					
Earnings Score	0.14	-0.08	0.43	-0.22	0.29
Years of Education	12.7	12.2	13.6	-0.5	0.9
Sample: Immigrant Share in Neighborhood > Median					
Earnings Score	0.01	-0.21	0.52	-0.22	0.51
Years of Education	12.4	12.2	13.8	-0.2	1.4
Sample: Immigrant Share among Welfare Recipients in Neighborhood > Median					
Earnings Score	0	-0.2	0.54	-0.2	0.54
Years of Education	12.3	12.3	13.7	0	1.4

Notes: The table shows means for two competence variables, the Earnings Score and Years of Education for the full working-age population (N=, Sweden Democrat municipal councilors, and municipal councilors from other parties. The number of observations varies somewhat between samples and variables, see Table W3 for approximate counts. The two leftmost columns show differences in the two categories of politicians compared to the population, where negative values correspond to negative selection, and vice-versa for positive values.

References

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