

# On the Prevalence of Condorcet's Paradox

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## Abstract

The Condorcet paradox has been a significant focus of investigation since Kenneth Arrow rediscovered its importance for social choice theory. Previous research on this phenomenon has oscillated between simulation studies, probability calculations based on hypothetical voter preferences, and empirical analyses that often contended with unsatisfactory data. This paper presents the first comprehensive evaluation of 351 election polls conducted in 60 countries. Our findings reveal that Condorcet paradoxes occur in approximately one percent of cases, indicating that the issue of indeterminacy is less prevalent than previously thought. Additionally, we find that a Condorcet loser exists in approximately 99% of all cases considered.

**Keywords:** Elections; Condorcet Paradox; Condorcet Winner

**JEL-Code:** D71

# 1 Introduction

The Condorcet paradox (Condorcet, 1785, p. *lxj*(76)) is well-known to anyone involved in collective decision-making. It describes an intransitive amalgamation of preferences according to the Condorcet method. Although intensively discussed during the years of the French Revolution, the Condorcet paradox faded into obscurity for almost a century and a half (McLean, 2019, p. 99) until Kenneth Arrow (1950, p. 329) brought it back to prominence in social choice theory with his groundbreaking impossibility theorem.

To this day, the paradox remains a drawback of the Condorcet method, where the goal is to find the Condorcet winner. Due to the paradox, such a winner may not exist. The probability of its occurrence has been calculated in numerous studies, most of which assume that voters' preference orders are randomly composed. Garman and Kamien (1968) coined the term "Impartial Culture Approach" (IAC) for this assumption, also known as the "Culture of Indifference" (Regenwetter *et al.*, 2006).

Under this assumption, Condorcet paradoxes are more likely to occur with more alternatives available. With five alternatives, there is no Condorcet winner in one out of four cases; with 10 alternatives, the problem arises in nearly half of the elections (Gehrlein and Fishburn, 1976).

This body of literature has certainly contributed to the Condorcet method (aka simple-majority rule) being rarely considered a serious decision-making method for a long time. However, significant doubts emerged early on about the practical relevance of the IAC approach (Sen, 2017, Ch. 10.2). It was particularly noted that voters' preferences are rather ideologically shaped (Dasgupta and Maskin, 2004), making single-peaked preferences (or more generally, value-restricted preferences (Sen, 1966)) much more common than assumed by the IAC approach or most of its variations (Gehrlein, 2002).

Several empirical studies emerged as more data became available and data processing capabilities improved. Most of these studies have been comprehensively summarized by (Gehrlein, 2006, Ch. 2.3) and Van Deemen (2013),

so instead of another survey, we refer to these existing overviews. From the overall view of empirical works, three conclusions can be drawn:

1. Empirical research indicates that Condorcet paradoxes do occur (e.g., [Kurrild-Klitgaard, 2001](#)), but much less frequently than expected under the IAC assumption ([Regenwetter and Grofman, 1998](#)).
2. Most empirical studies involve relatively small datasets and often do not concern decisions about parties or candidates. This is due to a lack of suitable data ([Miller, 2019](#)). The data used has often been collected in experimental designs or derived from elections within committees of academic institutions and similar environments ([Chamberlin \*et al.\*, 1984](#); [Feld and Grofman, 1992](#)).
3. In larger datasets, a common problem is that voters did not rank a significant portion of the candidates, resulting in many desirable data not being of sound quality ([Tideman, 2009](#), Ch. 9). Because the number of those with complete orders was too small, studies opted to place unranked candidates at the last rank (e.g., [Feld and Grofman, 1992](#); [Tideman, 2009](#)). Besides this extensive handling of data, this procedure leads to a multitude of ties, which significantly reduce the probability of cyclic patterns ([Jones \*et al.\*, 1995](#); [Lepelley and Martin, 2001](#)).

Moreover, it is unclear how pronounced the problem of non-reporting is. Some authors sought empirical evidence for paradoxes in individual, mostly smaller datasets, and presented them. It is questionable whether studies without the occurrence of a Condorcet paradox were submitted and published.

Ever since [Arrow](#), we know that avoiding Condorcet paradoxes in Paretian and non-dictatorial amalgamation procedures can only be achieved at the cost of violating the Arrovian IIA. [Dasgupta and Maskin \(2008, 2020\)](#) demonstrated that if the plurality rule (or the Borda count) on a given domain violates neither IIA nor transitivity, then the Condorcet method on

the same domain also does not violate either axiom. However, the converse does not hold. There is a domain on which the Condorcet method complies with both axioms, but the plurality rule (or the Borda method) violates the IIA condition (such that the winner is short of majority). Based on this dominance theorem (robustness result), more researchers have advocated for the simple-majority rule in recent years (Maskin and Sen, 2016, 2017a,b). Nevertheless, the indeterminacy problem remains, and the question of how prevalent this problem is in real elections is still not fully clarified.

## 2 Condorcet Paradoxes in Election Polling Data

This paper addresses how often the problem of indeterminacy occurs empirically. Instead of small datasets or elections within organizations, we use polling data conducted prior to 221 elections in 60 different countries at various times. We generated voter preference orderings from the CSES (CSES, 2020), a frequently used dataset designed for comparative studies. It was recently used by Lachat and Laslier (2024) to analyze how often different election methods lead to different results. Like Lachat and Laslier (2024), we use thermometer-style data, where voters rate parties or candidates on a Likert scale. These ratings are converted into preference orderings. For example: If a voter  $i$  rates Party  $A$  with +2, Party  $B$  with +4, and Party  $C$  with +1, this information is transformed into the binary preference relations  $B \succ_i A$ ,  $A \succ_i C$ . Based on a comprehensive dataset for Germany, where respondents provided both their ranking and their thermometer rating, Barbaro and Specht (2022) showed that the orders generated by the thermometer variables have a very high correlation (measured in Kendall’s  $\tau$ ) with the directly reported orderings.

Another advantage of the CSES dataset is that the number of respondents is very high, while the proportion of those who did not provide analyzable

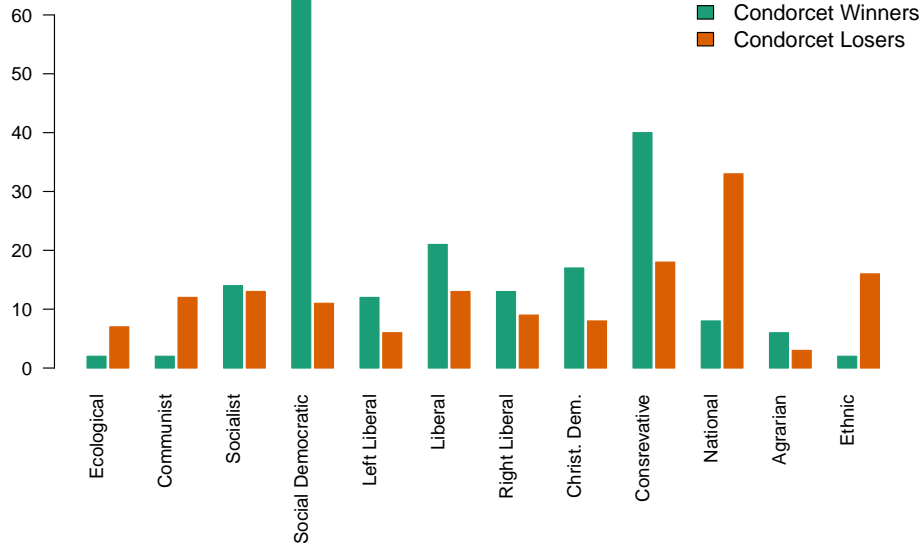
ratings is rather low (below 5%). Therefore, our study does not face the problem that previous studies (e.g. [Feld and Grofman, 1992](#); [Tideman, 2009](#)) had to contend with.

Our dataset includes 221 pre- or post-election studies in which (more than two) parties or candidates were on the ballot (e.g., parliamentary elections in PR systems and presidential elections). In most surveys, voters were asked to rate both parties and their leading candidates on a like-dislike running from 0 to 10. In our dataset, voters, in most cases, had between 4 and 8 alternatives to choose from.

We treat the election survey as a representative sample of voter preferences within a single national district to determine whether a Condorcet paradox existed in a specific national election. This simplification of the national electoral system is valid for our purposes because our primary interest is not in analyzing how paradoxes occur while processing preferences into electoral outcomes. Instead, we focus on whether the pattern of voter preferences would lead to a Condorcet paradox if amalgamated most simply and directly, irrespective of geographic boundaries and electoral stages.

For each election, we separately identify the Condorcet winner and loser party based on party ratings, and, when possible, also the Condorcet winner and loser candidate inferred from candidate ratings. While party ratings are available for all 221 elections, the CSES provides information on candidate evaluations for only 179 of these elections. We first construct party and candidate preference profiles from the rating data. Then, we apply the Condorcet method to the 400 preference profiles using the `condorcet`-function in the `vote` package for the R environment ([Raftery \*et al.\*, 2021](#)). The replication data and additional material are provided in the supplementary appendix to this article.

**Figure 1:** *Frequency of Condorcet winner and loser parties by party family*



### 3 Results

Only 3 of the 221 preference profiles on party ratings and 1 of the 179 preference profiles on candidate ratings encounter a Condorcet paradox. Specifically, the three polling elections without a Condorcet winner party are Belgium 1999, Hong Kong 2012, and Slovenia 1996. The only case in which there is no Condorcet winner candidate is Peru 2011.

A similar number recurs when focusing on the existence of Condorcet losers. We detect two elections with no Condorcet loser party (Finland 2015, South Korea 2012), and two elections with no Condorcet loser candidate (Australia 2007 and Slovakia 2020).

Figure 1 plots the frequency of Condorcet winners and losers by party family. It shows that Condorcet winners are most often Social Democratic or Conservative parties. In contrast, Condorcet losers are more frequently

found at the ideological extremes. National parties are the most common among the Condorcet losers, followed by Conservative and Ethnic parties and Ecological, Communist, and Socialist parties. A full list of Condorcet winner and loser parties is presented in the (Online-)Appendix (for the review process, the appendix is attached to this file). Table 1 provides an extract from the full list, covering the G7 countries only (the complete list spans five pages).

We found some noteworthy results. For example, although Condorcet winner parties are often centrally located within the party system, they are not necessarily large parties. In the Netherlands, for instance, the liberal party 'Democrats 66' (D66) was the Condorcet winner party in 2010, 2017, and 2021, despite its low vote share of only 7%, 12%, and 15%, respectively. In the 2010 election, it was only the sixth-largest party in terms of votes and parliamentary seats. In 2017, it ranked fourth, and in 2021, it ranked second. In an earlier study for the election year 1994—which our dataset does not extend back to—[Van Deemen and Vergunst \(1998\)](#) had already found that D66 emerged as the Condorcet winner party. Even then, the vote share of 15.5% did not reflect the broad support for the D66 party among the electorate.

On the other hand, there are instances where Condorcet loser parties gain a significant number of votes and seats. For example, based on our data, the Sweden Democrats were the Condorcet loser party in 2006, 2014, and 2018. Yet, they increased their vote share to 12.9% in the 2018 election, becoming the third-largest party out of eight in the 2014 and 2018 parliaments. An even more extreme case is the Swiss 2011 election, where the Swiss People's Party gained the largest vote share while emerging as the Condorcet loser, according to the data.

However, the respective electoral systems employed work well in selecting the Condorcet winner most of the time. Our results show that in around 85% (185 out of 218) of the elections where a Condorcet winner party exists,

Country	Year	Condorcet Winner Party	Condorcet Loser Party
Canada	1997	Liberal Party (LIB)	Bloc Quebecois (BQ)
Canada	2004	Liberal Party (LIB)	Green Party (GP)
Canada	2008	Conservative Party (CP)	Bloc Quebecois (BQ)
Canada	2011	Conservative Party (CP)	Bloc Quebecois (BQ)
Canada	2015	Liberal Party (LIB)	Bloc Quebecois (BQ)
France	2002	Socialist Party (PS)	National Front (FN)
France	2007	Union for a Popular Movement (UMP)	National Front (FN)
France	2012	Socialist Party (PS)	National Front (FN)
France	2017	La Republique En Marche! (LaREM)	National Front (FN)
Germany	1998	Social Democratic Party (SPD)	Left Party (DIE LINKE)
Germany	2002	Social Democratic Party (SPD)	The Republicans (REP)
Germany	2005	Social Democratic Party (SPD)	National Democratic Party (NPD)
Germany	2009	Christian Democratic Party (CDU)	Left Party (DIE LINKE)
Germany	2013	Christian Democratic Party (CDU)	Alternative for Germany (AfD)
Germany	2017	Unionsparteien (CDU/CSU)	Alternative for Germany (AfD)
Germany	2021	Social Democratic Party (SPD)	Alternative for Germany (AfD)
Great Britain	1997	Labour (Lab)	Conservatives (Con)
Great Britain	2005	Labour (Lab)	Conservatives (Con)
Great Britain	2015	Conservatives (Con)	UK Independence Party (UKIP)
Great Britain	2017	Labour (Lab)	Plaid Cymru (PC)
Great Britain	2019	Conservatives (Con)	Plaid Cymru (PC)
Italy	2006	National Alliance (AN)	Communist Refoundation Party (PRC)
Italy	2018	Five Star Movement (M5S)	Free and Equal (LeU)
Japan	1996	Liberal Democratic Party (LDP)	New Party Harbinger (NPH)
Japan	2004	Democratic Party of Japan (DPJ)	Japanese Communist Party (JCP)
Japan	2007	Democratic Party of Japan (DPJ)	Japanese Communist Party (JCP)
Japan	2013	Liberal Democratic Party (LDP)	Green Wind
Japan	2017	Liberal Democratic Party (LDP)	Japanese Communist Party (JSP)
USA	1996	Democratic Party (DEM)	Reform Party (REF)
USA	2004	Democratic Party (DEM)	Reform Party (REF)

**Table 1:** *List of Condorcet winner and loser parties in G7 countries*



that party ends up in government.

## 4 Conclusion

This paper provides a reliable figure to quantify the occurrence of Condorcet paradoxes, which stands at about one percent. This supports a hypothesis by Dasgupta and Maskin (2004), suggesting that the problem of indeterminacy ('the bugaboo of the simple-majority rule') is more of an exceptional occurrence than a serious regularity. Several research contributions have calculated the probability of its occurrence using the IAC approach. In this paper, we leverage the availability of large and comparable data sets that allow us to conduct numerous pairwise match-ups. We not only confirm an expectation from previous empirical work (each on a weaker data basis) that the frequency of indeterminacy is less pronounced than suggested under the IAC approach but also assert that, given the breadth of our data and their widely accepted quality, our key measure of around one percent is reliable when dealing with the Condorcet method in the future. The Condorcet paradox appears in practically every public economics course. We believe that now, based on a broad basis, the relevance of this phenomenon can be quantified and put into perspective.

In addition to finding that Condorcet winners almost always exist, our analyses provide several new insights into who the Condorcet winners are. They are mostly parties with a high vote share, although notable exceptions exist. Secondly, Condorcet winners are most often found in the conservative or moderately left spectrum. Conversely, Condorcet loser parties often benefit from the actual voting methods applied, gaining more parliamentary representation than parties more preferred by a majority in head-to-head comparisons.

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## Appendices

Note: The appendix is proposed to be published online. We add the appendices to the main text in line with the submission guidelines.

## A Countries and Election Years Included in Analysis

	'96	'97	'98	'99	'00	'01	'02	'03	'04	'05	'06	'07	'08	'09	'10	'11	'12	'13	'14	'15	'16	'17	'18	'19	'20	'21
Albania										x												x				
Argentina																				x						
Australia	x								x			x						x						x		
Austria													x					x				x				
Belarus						x							x													
Belgium				x				x																x		
Brazil							x				x				x				x				x			
Bulgaria						x													x							
Canada		x							x				x			x				x				x		
Chile				x						x				x								x				
Costa Rica																							x			
Croatia												x														
Czech Republic	x						x				x				x			x								
Czechia																						x				x
Denmark			x			x						x												x		
El Salvador																								x		
Estonia																x										
Finland								x				x				x				x				x		
France							x					x					x					x				
Germany			x				x			x				x				x				x				x
Great Britain		x								x										x		x		x		
Greece														x			x			2				x		
Hong Kong			x		x				x				x				x				x					
Hungary			x				x																x			
Iceland				x				x				x		x				x			x	x				



	'96	'97	'98	'99	'00	'01	'02	'03	'04	'05	'06	'07	'08	'09	'10	'11	'12	'13	'14	'15	'16	'17	'18	'19	'20	'21
Taiwan	x					x			x				x				x				x				x	
Thailand						x						x				x								x		
Tunisia																								x		
Turkey																x				x			x			
Ukraine			x																							
USA	x								x				x				x				x				x	
Uruguay														x										x		



## B Full List of Condorcet Winner and Condorcet Loser Parties

Country	Year	CW party	CL party
Albania	2005	Democratic Party	Agrarian Party (PAA)
Argentina	2015	Front for the Victory (FPV)	Progressives (Pro)
Australia	1996	Liberal Party (LP)	Australian Greens (AG)
Australia	2004	Liberal Party (LP)	One Nation Party (ONP)
Australia	2007	Australian Labor Party (ALP)	National Party of Australia (NPA)
Australia	2013	Liberal Party (LP)	Australian Greens (AG)
Australia	2019	Liberal Party (LP)	Pauline Hanson's One Nation (PHON)
Austria	2008	Social Democratic Party (SPÖ)	Dinkhauser List
Austria	2013	Social Democratic Party (SPÖ)	Alliance for the Future of Austr. (BZÖ)
Austria	2017	Liste Sebastian Kurz - Die neue Volkspartei (ÖVP)	Liste Peter Pilz (PILZ)
Belarus	2001	Communist Party of Belarus	United Civil Party
Belarus	2008	The BNF Party	United Civil Party
Belgium	1999	–	People's Union (VU)
Belgium	2003	Socialist Party Differently (SP.A)	Confederated Ecologists (ECOLO)
Belgium	2019	Christen-Democratisch en Vlaams (CD&V)	Open Vlaamse Liberalen en Democraten (Open-VLD)
Brazil	2002	Workers Party (PT)	Brazilian Labor Party (PTB)
Brazil	2006	Workers Party (PT)	Brazilian Labor Party (PTB)
Brazil	2010	Workers Party (PT)	Democrats (DEM)
Brazil	2014	Workers Party (PT)	Republic Party (PR)
Brazil	2018	Workers Party (PT)	Republic Party (PR)
Bulgaria	2001	National Movement for Stability and Progress (NDS)	Euroleft (BE)
Bulgaria	2014	Citizens for European Development of Bulgaria (GERB)	Movement for Rights and Freedoms (DPS)
Canada	1997	Liberal Party (LIB)	Bloc Quebecois (BQ)
Canada	2004	Liberal Party (LIB)	Green Party (GP)
Canada	2008	Conservative Party (CP)	Bloc Quebecois (BQ)
Canada	2011	Conservative Party (CP)	Bloc Quebecois (BQ)
Canada	2015	Liberal Party (LIB)	Bloc Quebecois (BQ)
Canada	2019	Liberal Party (Lib)	Bloc Quebecois (BQ)
Chile	1999	Party for Democracy (PPD)	Communist Party of Chile (PCCh)
Chile	2005	Party for Democracy (PPD)	Independent Democratic Union (UDI)
Chile	2009	Christian Democratic Party (PDC)	Communist Party of Chile (PCCh)
Chile	2017	National Renewal (RN)	Political Evolution (Evopoli)
Costa Rica	2018	Citizens' Action Party (PAC)	Social Christian Republican Party (PRSC)
Croatia	2007	Croatian Democratic Union (HDZ)	Croatian Democratic Alliance of Slavonia and Baranja (HDSSB)
Czech Republic	1996	Civic Democratic Party (ODS)	Communist Party of Bohemia and Moravia (KSCM)
Czech Republic	2002	Czech Social Democratic Party (CSSD)	Communist Party of Bohemia and Moravia (KSCM)
Czech Republic	2006	Green Party (SZ)	Communist Party of Bohemia and Moravia (KSCM)
Czech Republic	2010	Public Affairs (VV)	Communist Party of Bohemia and Moravia (KSCM)

Country	Year	Condorcet winner party	Condorcet loser party
Czech Republic	2013	Action of Dissatisfied Citizens (ANO 2011)	Civic Democratic Party (ODS)
Czechia	2017	Action of Dissatisfied Citizens (ANO 2011)	TOP 09
Czechia	2021	Action of Dissatisfied Citizens (ANO 2011)	Czech Pirate Party (Pi)
Denmark	1998	Social Democrats (Sd)	Danish People's Party (DF)
Denmark	2001	Liberal Party (V)	United List - Red-Greens (En - O)
Denmark	2007	Social Democrats (Sd)	United List - Red-Greens (En - O)
Denmark	2019	Social Democrats (Sd)	The New Right (NB)
El Salvador	2019	New Ideas (NI)	Vamos
Estonia	2011	Social Democratic Party (SDE)	Estonian People's Union (ER a)
Finland	2003	Social Democratic Party (SDP)	Swedish People's Party (RKP - SFP)
Finland	2007	Center Party (KESK)	Left Alliance (VAS)
Finland	2011	Social Democratic Party (SDP)	Christian Democrats (KD)
Finland	2015	Center Party (KESK)	–
Finland	2019	Social Democratic Party (SDP)	Blue Reform (SIN)
France	2002	Socialist Party (PS)	National Front (FN)
France	2007	Union for a Popular Movement (UMP)	National Front (FN)
France	2012	Socialist Party (PS)	National Front (FN)
France	2017	La Republique En Marche! (LaREM)	National Front (FN)
Germany	1998	Social Democratic Party (SPD)	Left Party (DIE LINKE)
Germany	2002	Social Democratic Party (SPD)	The Republicans (REP)
Germany	2005	Social Democratic Party (SPD)	National Democratic Party (NPD)
Germany	2009	Christian Democratic Party (CDU)	Left Party (DIE LINKE)
Germany	2013	Christian Democratic Party (CDU)	Alternative for Germany (AfD)
Germany	2017	Unionsparteien (CDU/CSU)	Alternative for Germany (AfD)
Germany	2021	Social Democratic Party (SPD)	Alternative for Germany (AfD)
Great Britain	1997	Labour (Lab)	Conservatives (Con)
Great Britain	2005	Labour (Lab)	Conservatives (Con)
Great Britain	2015	Conservatives (Con)	United Kingdom Independence (UKIP)
Great Britain	2017	Labour Party (Lab)	Plaid Cymru (PC)
Great Britain	2019	Conservatives (Con)	Plaid Cymru (PC)
Greece	2009	Pan-Hellenic Socialist Movem. (PASOK)	Popular Orthodox Rally (La.O.S)
Greece	2012	Democratic Left (DIMAR)	Golden Dawn (LS - XA)
Greece	2015a	Coalition of the Radical Left (SYRIZA)	Golden Dawn (LS - XA)
Greece	2015b	New Democracy (ND)	Golden Dawn (XA)
Greece	2019	New Democracy (ND)	Greek Solution
Hong Kong	1998	Democratic Party (DP)	Citizen's Party
Hong Kong	2000	Democratic Party (DP)	Citizen's Party
Hong Kong	2004	Democratic Party (DP)	Democratic Alliance for Betterment of Hong Kong (DAB)
Hong Kong	2008	Civic Party (CPP)	League of Social Democrats (LSD)
Hong Kong	2012	–	People Power (PP)
Hong Kong	2016	Democratic Party (DP)	ALLinHKG
Hungary	1998	Fidesz-Hungarian Civic Party Alliance Party (Fidesz - MPP)	Hungarian Justice and Life Party (MIEP)
Hungary	2002	Hungarian Socialist Party (MSZP)	Hung. Justice and Life Party (MIEP)
Hungary	2018	Fidesz - KNDP	Democratic Coalition (DK)
Iceland	1999	Independence Party (Sj)	Liberal Party (FF)
Iceland	2003	Independence Party (Sj)	Liberal Party (FF)
Iceland	2007	Independence Party (Sj)	Icelandic Movement (IL)
Iceland	2009	Social Democratic Alliance (Sam)	Liberal Party (FF)
Iceland	2013	Progressive Party (F)	Pirata (Pi)
Iceland	2016	Left-Green Movement (VG)	Pirata (Pi)

Country	Year	Condorcet winner party	Condorcet loser party
Iceland	2017	Left-Green Movement (VG)	Centre Party (M)
India	2019	Indian People's Party (BJP)	All India Trinamool Congress (AITC)
Ireland	2002	Fianna Fail (FF)	Sinn Fein (SF)
Ireland	2007	Fianna Fail (FF)	Sinn Fein (SF)
Ireland	2011	Fine Gael (FG)	United Left Alliance (ULA)
Ireland	2016	Fine Gael (FG)	Sinn Fein (SF)
Israel	1996	Israeli Labor Party (MHH)	Sfarad's Keepers of the Torah (Shas)
Israel	2003	Likud - The Consolidation (L)	Sfarad's Keepers of the Torah (Shas)
Israel	2006	Forward (Kadima)	Sfarad's Keepers of the Torah (Shas)
Israel	2013	There is a Future (YA)	Sfarad's Keepers of the Torah (Shas)
Israel	2020	Likud (L)	Joint List
Italy	2006	National Alliance (AN)	Communist Refoundation Party (PRC)
Italy	2018	Five Star Movement (M5S)	Free and Equal (LeU)
Japan	1996	Liberal Democratic Party (LDP)	New Party Harbinger (NPH)
Japan	2004	Democratic Party of Japan (DPJ)	Japanese Communist Party (JCP)
Japan	2007	Democratic Party of Japan (DPJ)	Japanese Communist Party (JCP)
Japan	2013	Liberal Democratic Party (LDP)	Green Wind
Japan	2017	Liberal Democratic Party (LDP)	Japanese Communist Party (JSP)
Kenya	2013	The National Alliance (TNA)	United Democratic Front (Forum) (UDFP)
Kyrgyzstan	2005	Ar Namys	New Kyrgyzstan
Latvia	2010	Union of Greens and Farmers (ZZS)	For Human Rights in United Latvia (PCTVL)
Latvia	2011	Unity (V)	Latvia's First Party/Latvian Way (LPP/LC)
Latvia	2014	Union of Greens and Farmers (ZZS)	Latvian Association of the Regions (LRa)
Latvia	2018	Union of Greens and Farmers (ZZS)	Latvian Russian Union (LRU)
Lithuania	1997	Center Union (LCS)	Nationalist Party - "Young Lithuania" (JL)
Lithuania	2016	Lithuania Union of Farmers and Greens (LVZS)	Lithuanian Poles Electoral Action - Christian Families Alliance (LLRA-KSS)
Lithuania	2020	Homeland Union - Lithuanian Christian Democrats (TS-LKD)	Lithuanian Poles Electoral Action - Christian Families Alliance (LLRA-KSS)
Mexico	1997	Democratic Revolution Party (PRD)	Cardenista Party (PFCRN)
Mexico	2000	Alliance for Change	Authentic Party of the Mexican Revolution (PARM)
Mexico	2003	National Action Party (PAN)	Citizen's Movement (MC)
Mexico	2006	National Action Party (PAN)	Social Democratic Party (PSD)
Mexico	2009	Institutional Revolutionary Party (PRI)	Social Democratic Party (PSD)
Mexico	2012	Institutional Revolutionary Party (PRI)	New Alliance Party (PANAL or: PNA)
Mexico	2015	Institutional Revolutionary Party (PRI)	Citizen's Movement (MC)
Mexico	2018	National Regeneration Mov. (MORENA)	Institutional Revolutionary Party (PRI)
Montenegro	2012	Coalition "For a European Montenegro"	Croatian Civic Initiative (HGI)
Montenegro	2016	Democratic Party of Socialists of Montenegro (DPS)	Bosniak Party (BS)
Netherlands	1998	Labor Party (PvdA)	Reformed Political Alliance (GPV)
Netherlands	2002	Christian Democratic Appeal (CDA)	Reformed Political Party (SGP)
Netherlands	2006	Christian Democratic Appeal (CDA)	Party for Freedom (PVV)
Netherlands	2010	Democrats 66 (D66)	Party for Freedom (PVV)
Netherlands	2017	Democrats 66 (D66)	Party for Freedom (PVV)
Netherlands	2021	Democrats 66 (D66)	Forum for Democracy (FvD)
New Zealand	1996	Labor Party (Lab)	Christian Coalition
New Zealand	2002	Labor Party (Lab)	Jim Anderton's Progressive Party (PP)
New Zealand	2008	National Party (NP)	Jim Anderton's Progressive Party (PP)

Country	Year	Condorcet winner party	Condorcet loser party
New Zealand	2011	National Party (NP)	MANA Movement (MANA)
New Zealand	2014	National Party (NP)	Internet MANA (IP - MANA)
New Zealand	2017	National Party (NP)	MANA Movement (MANA)
New Zealand	2020	Labor Party (Lab)	New Conservative (NC)
Norway	1997	Labor Party (Ap)	Progress Party (FrP)
Norway	2001	Conservative Party (H)	Progress Party (FrP)
Norway	2005	Labor Party (Ap)	Red Electoral Alliance (RV)
Norway	2009	Labor Party (Ap)	Red Party (R)
Norway	2013	Conservative Party (H)	Red Party (R)
Norway	2017	Conservative Party (H)	Red Party (R)
Peru	2000	Possible Peru	Peruvian Aprista Party (PAP)
Peru	2001	Possible Peru	Andean Renaissance
Peru	2006	Peruvian Aprista Party (PAP)	National Restoration (RN)
Peru	2011	Peru Wins (UPP)	Peruvian Aprista Party (PAP)
Peru	2016	Popular Force (FP)	Direct Democracy
Peru	2021	Popular Action (AP)	Popular Renewal (RP)
Philippines	2004	Lakas - Christian-Muslim Democrats (LAKAS-CMD)	Democratic Action (AD)
Philippines	2010	Liberal Party (LP)	New Nation- Volunteers for a New Philippines (VNP)
Philippines	2016	Philippine Democratic Party (PDP-LABAN)	People's Reform Party (PRP)
Poland	1997	Solidarity Electoral Action (AWS)	Movement for Reconstruction of Poland (ROP)
Poland	2001	Coalition of the Alliance of the Democr. Left (SLD-UP)	Solidarity Electoral Action (AWS)
Poland	2005	Law and Justice (PiS)	Democratic Party (PD)
Poland	2007	Civic Platform (PO)	Left and Democrats (LiD)
Poland	2011	Civic Platform (PO)	Palikots Movement
Poland	2019	United Right (ZP)	Konfederacja
Portugal	2002	Socialist Party (PS)	Portuguese Communist Worker's Party (PCTP/MRPP)
Portugal	2005	Socialist Party (PS)	Democratic and Social Centre - People's Party (CDS-PP)
Portugal	2009	Socialist Party (PS)	Unitarian Democratic Coalition (CDU)
Portugal	2015	Socialist Party (PS)	Democratic Republican Party (PDR)
Portugal	2019	Socialist Party (PS)	Democratic and Social Centre - People's Party (CDS-PP)
Republic of Korea	2000	Millennium Democratic Party (MDP)	New Korean Party of the Hope (NKPH)
Republic of Korea	2004	Our Party	National Integration 21
Republic of Korea	2008	New Frontier Party (NFP)	New Progressive Party (NPP)
Republic of Korea	2012	Democratic United Party (DUP)	-
Republic of Korea	2016	Democratic Party of Korea (DP)	Justice Party (JP)
Romania	1996	Romanian Democratic Convention (CDR)	Democratic Union of Hungarians in Romania (UDMR)
Romania	2004	Democratic Party (PD)	Democratic Union of Hungarians in Romania (UDMR)
Romania	2009	National Liberal Party (PNL)	New Generation Party - Christian Democratic (PNGCD)
Romania	2012	Social Liberal Union (USL)	Democratic Union of Hungarians in Romania (UDMR)
Romania	2014	Christian-Liberal Alliance (ACL)	Democratic Union of Hungarians in Romania (UDMR)
Russian Federation	1999	Unity Inter-Regional movement	Zhirinovsky Bloc
Russian Federation	2000	Communist Party of the Russian	Zhirinovsky Bloc

Country	Year	Condorcet winner party	Condorcet loser party
Russian Federation	2004	Federation (KPRF)	Union of Right Forces (SPS)
Serbia	2012	United Russia (ER)	Liberal Democratic Party (LDP)
Slovakia	2010	Serbian Progressive Party (SNS)	Party Of The Hungarian Coalition (SMK)
Slovakia	2016	Direction - Social Democracy (Smer)	Network (S)
Slovakia	2020	Slovak National Party (SNS)	D
Slovenia	1996	C	Christian Democrats (SKD)
Slovenia	2004	–	New Slovenia - Christian People's Party (NSi)
Slovenia	2008	Social Democratic Party (SDS)	New Slovenia - Christian People's Party (NSi)
Slovenia	2011	Social Democrats (SD)	Slovenian National Party (SNS)
South Africa	2009	African National Congress (ANC)	Freedom Front Plus (VF Plus)
South Africa	2014	African National Congress (ANC)	Freedom Front Plus (VF Plus)
Spain	1996	Spanish Socialist Workers' Party (PSOE)	Basque Nationalist Party (PNV)
Spain	2000	People's Party (PP)	Basque Nationalist Party (PNV)
Spain	2004	Spanish Socialist Workers' Party (PSOE)	People's Party (PP)
Spain	2008	Spanish Socialist Workers' Party (PSOE)	Republican Left of Catalonia (ERC)
Sweden	1998	Sweden's Social Democratic Worker's Party (SAP)	Liberal People's Party (FP)
Sweden	2002	Sweden's Social Democratic Worker's Party (SAP)	Moderate Party (M)
Sweden	2006	Sweden's Social Democratic Worker's Party (SAP)	Sweden Democrats (SD)
Sweden	2014	Sweden's Social Democratic Worker's Party (SAP)	Sweden Democrats (SD)
Sweden	2018	Sweden's Social Democratic Worker's Party (SAP)	Sweden Democrats (SD)
Switzerland	1999	Radical Democratic Party (FDP / PLR)	Green Party (GPS / PES)
Switzerland	2003	Social Democratic Party (SP / PS)	Swiss People's Party (SVP / UDC)
Switzerland	2007	Christian Democratic People's Party (CVP / PDC)	Evangelical People's Party (EVP / PEP)
Switzerland	2011	Christian Democratic People's Party (CVP / PDC)	Swiss People's Party (SVP / UDC)
Taiwan	1996	Kuomintang of China (KMT)	New Party (NP)
Taiwan	2001	Democratic Progressive Party (DPP)	New Party (NP)
Taiwan	2004	Democratic Progressive Party (DPP)	New Party (NP)
Taiwan	2012	Kuomintang of China (KMT)	People First Party (PFP)
Taiwan	2016	Democratic Progressive Party (DPP)	Taiwan Solidarity Union (TSU)
Taiwan	2020	Democratic Progressive Party (DPP)	People First Party (PFP)
Thailand	2001	Thai Rak Thai Party (TRT)	Justice and Freedom Party
Thailand	2007	People's Power Party (PPP)	Referendum Party
Thailand	2011	For Thais Party (PPT)	Power of Choburi Party
Thailand	2019	For Thais Party (PTP)	People's Nation Party
Turkey	2011	Justice and Development Party (AKP)	Peace and Democratic Party (BDP)
Turkey	2015	Justice and Development Party (AKP)	Patriotic Party (VP)
Turkey	2018	Justice and Development Party (AKP)	Peoples' Democratic Party (HDP)
Ukraine	1998	Communist Party of Ukraine	Social-Democratic Party
USA	1996	Democratic Party (DEM)	Reform Party (REF)
USA	2004	Democratic Party (DEM)	Reform Party (REF)

Country	Year	Condorcet winner party	Condorcet loser party
Uruguay	2009	Broad Front (FA)	Popular Assembly
Uruguay	2019	Broad Front (FA)	Intransigent Radical Ecology Party (PERI)