

Question 1: How have voting patterns changed over time?

Question 2: What are some communal or demographic factors that influence voting patterns? Which factors appear to be the most impactful?

## Major events in Brazil (1998 - 2018)

(<https://www.bbc.com/news/world-latin-america-19359111>)

**1998** October - President Cardoso re-elected

**2002** October - Luiz Inácio Lula da Silva, popularly known as Lula, wins presidential elections to head the first left-wing government for more than 40 years.

**2005** June-August - Corruption allegations rock the governing Workers' Party. A wave of resignations ensues.

**2006** October - President Lula is re-elected.

**2010** October - Dilma Rousseff, of President Lula's Workers' Party, wins second round run-off to become Brazil's first female president.

**2011** June - Government launches Brasil Sem Miséria (Brazil Without Poverty) welfare scheme, aimed at lifting millions out of extreme poverty.

**2013** June - A wave of protests sweeps the country. People take to the streets in dozens of cities to demonstrate over poor public services, rising public transport costs and expense of staging the 2014 World Cup. The protests continue into the autumn.

**2014** October - Dilma Rousseff wins another term as president.

**2016** February - World Health Organisation declares a global public health emergency following an outbreak of the Zika virus centred on Brazil.

**2016** August - Olympic Games are held in Rio de Janeiro.

Senators vote to remove President Dilma Rousseff from office for illegally using money from state banks to bankroll public spending. Michel Temer is sworn in to serve the rest of her term to 1 January 2019.

**2018** April - Former president Lula da Silva is imprisoned for corruption, which makes him ineligible to run for president in October.

**2018** October - Far-right candidate Jair Bolsonaro wins presidential election over Workers' Party candidate, takes office in January 2019.

Question 1 Response:

As seen in our modeling, the shift in voting patterns over time for each political party is generally trending upwards, with the exception of a few. Although, not all political parties have voting data across the years 1998, 2002, 2006, 2010, 2014 and 2018. For those who have voting data across 2 or more years, we were able to model a least squares polynomial fit to gauge a general upwards or downwards trend. \*In the final report, we will list the voting models separated by upwards and downwards trends as long as voting data for a political party spans across 2 or more years.

Question 2 Response:

As seen in our modeling, the general upward trend of voting means Brazilians have become more politically active overseas. This activism can be traced back to Brazil where people were also active in politics. Corruption allegations, protests, the 2014 World Cup, and outbreak of the Zika virus were important events captured throughout our time frame. These events would impact voter turnout because Brazilians away from home want to help direct their country through these challenges.

2018 was a popular year for voting across all parties. This was caused by the major political events impacting that voting year. President Dilma Rousseff and former President Lula da Silva were in trouble from corruption, making an opportunity for other parties to get their candidate elected. This opportunity led to a huge voter turn out from overseas in order to promote their party's candidate.