

2016 Redistricting Database – Data Processing Notes

Elections Data

- All election returns included in the 2016 redistricting database were derived from Voting Tabulation District (VTD)-level data files, provided by the North Carolina State Board of Elections. VTDs are equivalent to the voter precincts as they existed on January 1st, 2008. Local boards of election are required by [G.S. 163-132.5G](#) to tabulate election returns, including out-of-precinct votes, by VTD within 60 days following each election.
- Any county-wide votes found in the VTD-level data files, typically falling under categories such as ‘absentee’, ‘transfer’, or ‘provisional’, were excluded due to the homogenizing effect on the VTD-level data. Note that statewide candidate vote totals are marginally less than those reported in the official contest results for this reason.
- Election results were matched directly to the 2010 census VTD geography.

Disaggregation Process:

- Redistricting databases are ultimately census block-level databases. Due to requirements for ballot secrecy, election results are not available below the VTD level. To integrate the elections data with the block-level redistricting database, the information has to be disaggregated.
- 2008 – 2012 contest results were disaggregated using a commercially-available utility. VTD-level counts were broken out based on the ratio of block-level census voting age population to VTD-level voting age population. Since results are fractional, they were truncated down to the nearest whole vote. The remainders for all blocks within a VTD were then added to the highest population block within that VTD.
- 2014 contest results were disaggregated using a weighting factor based on the ratio of the number of ballots cast by voters in each census block to the ballots cast in the corresponding VTD as a whole. Since results are fractional, they were truncated down to the nearest whole vote. The overall vote remainder for each VTD was then distributed amongst the blocks sequentially, according to the size of the truncated fractional vote. Ballot counts by block were derived by using a combination of voting history and geocode results for voter addresses of record.