

**DRAFT 1**

Mail-in Ballot Counting Was Manipulated In Pima County, Arizona – Part 2

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In our previous paper of the same title, Part 1, dated December 12, 2021, we demonstrated that the sequence in which mail-in ballots were reported to have been counted prior to Election Day, November 3, 2020, was statistically impossible. Randomly-arriving mail-in ballots should produce an essentially flat (slope of zero) cumulative Biden/Trump ratio as counting progresses, after the initial fluctuations due to a small number of votes counted so far.

However, not only is the actual cumulative Biden/Trump ratio not essentially flat (as expected for randomly-arriving ballots), there is a huge and systematic decline in the cumulative Biden/Trump ratio as counting progresses, from over 300% down to 157% on Election Day, a factor of about 2, when the slope should be zero. In other words, the early mail-in votes, which should be random, are reported with the first chunk of ballots being 75% for Biden, the next chunk of ballots being 74% for Biden, the next chunk of ballots being 73% for Biden, and so on, systematically declining all the way to election day.

***This is not mathematically possible for randomly-arriving mail-in ballots, and is clear evidence that mail-in ballot counting was manipulated.***

Having shown in Part 1 that the counting was manipulated, this paper now addresses the “accuracy” of the negative linear slope to quantify whether or not the reported vote count was controlled.

As noted above, when the number of votes counted so far is small, the next vote can have a large effect on the cumulative Biden/Trump ratio. For example, if 3 of the first 4 votes are for Biden, then the ratio is 3 to 1, or 300%. If the fifth vote is for Biden, the ratio becomes 4 to 1, or 400%, while if the fifth vote is for Trump, the ratio becomes 3 to 2, or 150%.

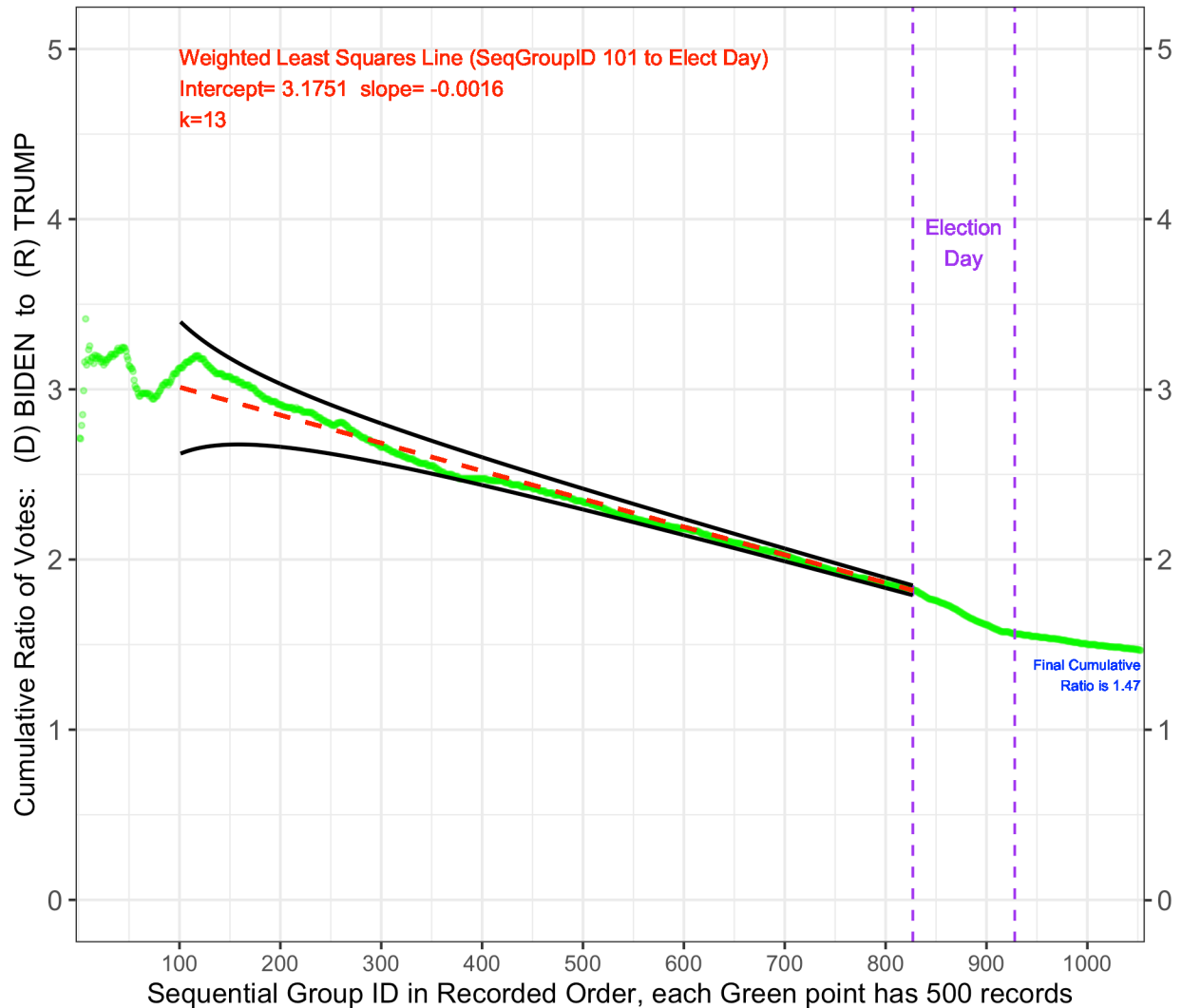
However, after 50,000 votes, one more vote has a very small effect on the cumulative Biden/Trump ratio. For example, if 37,500 of the first 50,000 votes are for Biden, then the ratio is 37,500 to 12,500, or 300%. If the 50,001<sup>st</sup> vote is for Biden, the ratio becomes 37,501 to 12,500, or 300.008%, a tiny change, while if the 50,001<sup>st</sup> vote is for Trump, the ratio becomes 37,500 to 12,501, or 299.976%, again a tiny change.

Thus to assess the “accuracy” of the negative linear slope exhibited by the reported cumulative Biden/Trump ratio, the deviation from a negative linear slope must be weighted in inverse proportion to the number of votes counted so far; to avoid the initial fluctuations due to a small number of votes counted so far, the following analysis begins after 50,000 votes.

As in Part 1, ballots are grouped in batches of 500 (batch 1 contains ballots 1-500, batch 2 contains ballots 501-1000, etc.), so the last batch before Election Day is approximately batch 826. (See Part 1 for how it was determined that there were approximately 413,239 mail-in votes counted prior to Election Day.)

The following graph shows the reported cumulative Biden/Trump ratio in green.

Cumulative Ratio of Votes: (D) BIDEN -to- (R) TRUMP  
 Contest: PRESIDENTIAL ELECTORS  
 for ALL Cast Vote Records (CVRs) in Sequential Groups of Size 500  
 PIMA County 2020 -- Final Ratio is 1.47



The red dashed line is the fitted least-squares line

$$y = -0.0016x + 3.1751$$

where  $x$  is the batch number, and the narrowing black boundary lines show a fixed percentage of deviation above and below a linear slope, weighted by the number of votes counted so far. The equations are

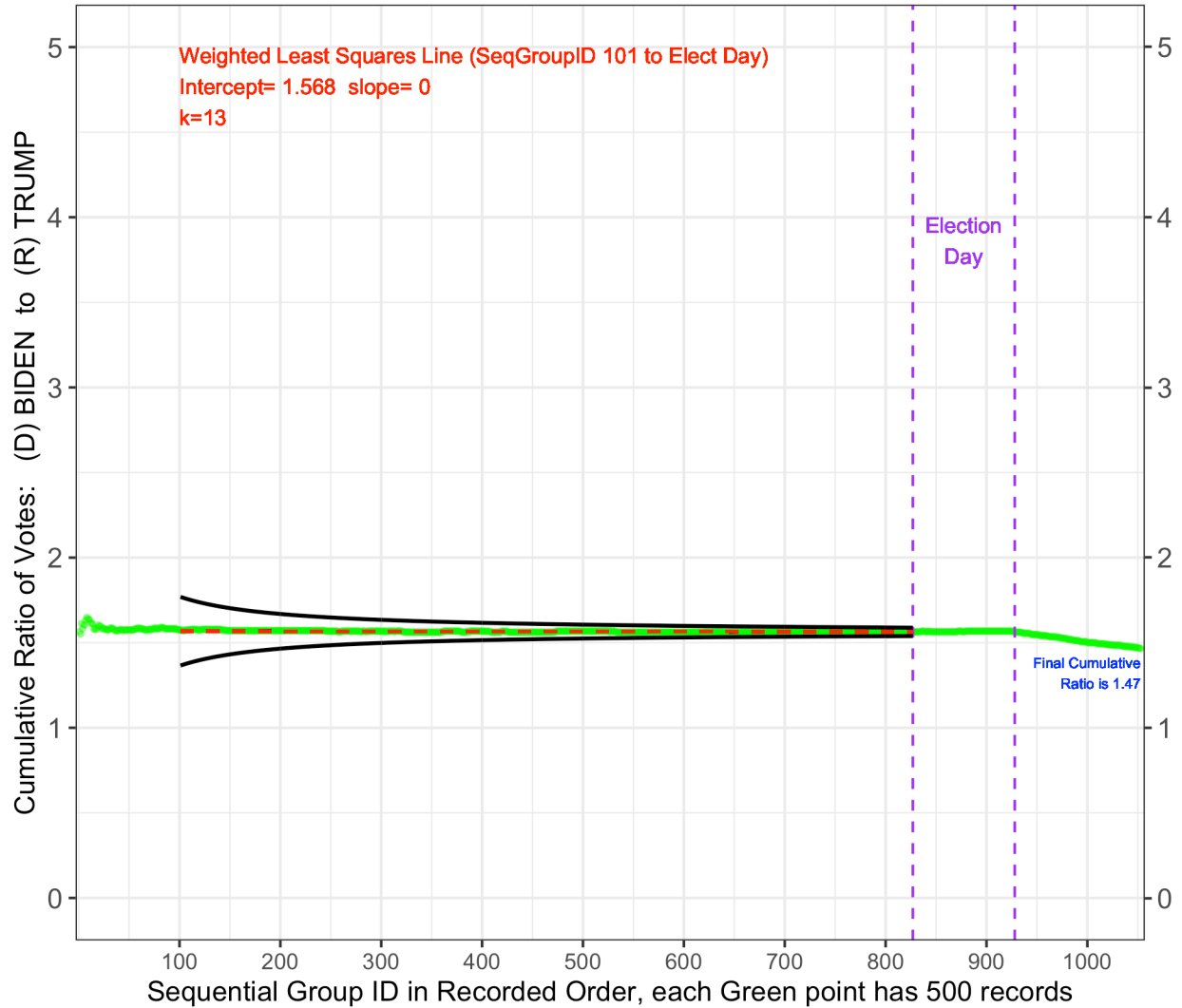
$$y = (-0.0016 x + 3.1751) \left(1 \pm \frac{k}{x}\right)$$

making  $\frac{100 k}{x}$  the percentage of deviation above and below a linear slope weighted by the number of votes counted so far. Setting  $k = 13$  includes *all* the green data points within the black boundaries, so the maximum percentage deviation at Election Day is  $\frac{100 \cdot 13}{826} = 1.57\%$ .

This means that after 50,000 votes have been counted, the cumulative Biden/Trump ratio, instead of being essentially flat as in a fair election, follows a sloping line so closely that it must have been controlled.

For comparison with the graphs in Part 1, here is the graph of the same votes randomly shuffled (in green). The red dashed line is the fitted least-squares line, which indeed has a slope of zero (as expected for randomly-arriving ballots), and the narrowing black boundary lines are the same fixed percentage of deviation above and below a linear slope of zero, weighted by the number of votes counted so far. This same  $k = 13$  includes *all* the green data points within the black boundaries, so the maximum percentage deviation at Election Day is again  $\frac{100 \cdot 13}{826} = 1.57\%$ .

RANDOMLY SHUFFLED Prior to Election Day  
 Cumulative Ratio of Votes: (D) BIDEN -to- (R) TRUMP  
 for ALL Cast Vote Records (CVRs) in Sequential Groups of Size 500  
 PIMA County 2020 -- Final Ratio is 1.47



Returning to the first graph above, it is clear that after the first 50,000 votes were counted, the cumulative Biden/Trump ratio followed a sloping straight line to the target setpoint on Election Day so closely (within a weighted 1.57%) that it must have been controlled.

A similar pattern was also observed in almost all of the other races in Pima County; see the 51 pages of graphs attached to Part 1. For example, in the race for County Recorder, the cumulative Democrat/Republican ratio up to Election Day, which should have been essentially flat, showed almost exactly the same huge and systematic decline as counting progresses, from over 300% down to less than 150%.

In conclusion, mail-in ballot counting was manipulated in Pima County, Arizona, by reporting ballots in a mathematically impossible order to create a progressively declining

Democrat/Republican ratio for almost all races, and that mathematically impossible order is within a weighted 1.57% of a non-horizontal straight line, clear evidence that it was controlled.