



Subject: Validation of VoteRev's Memo on the State of the Evidence for EVVT and Underlying Meta-Analysis
To: Interested Parties
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Date: October 14, 2022

Analyst Institute reviewed Vote Rev's memo on the state of the evidence for Early Voter Vote Tripling (EVVT) as well as the code and output for Vote Rev's meta-analytic estimate. Analyst Institute believes the conclusions in the memo are supported by the available evidence.

State of the evidence: Early voter vote tripling

September 2022

Early voter vote tripling is a **promising tactic** for increasing the voter turnout of triplers' copartisan household members in medium salience elections.

Early voter vote tripling Impact Summary	
Tactic Rating	Promising
Estimated average past effect	0.48 percentage points increase in copartisan copartisan household member turnout ¹ , 90% CI = [-0.58 – +1.54pp]
Election types w/ potential impact	Medium salience² elections with ~50% baseline turnout
Number of evaluations	3

What is early voter vote tripling?

Early voter vote tripling (EVVT) is a vote tripling tactic in which voters who have already cast their ballots early (either by mail or in-person)³ are asked (typically via cold SMS campaigns) to remind their friends to vote. EVVT programs have advantages beyond traditional SMS reminder programs. First, EVVT programs target people who probably think that voting is important, as demonstrated by the fact that they voted (and voted early no less). Second, because many campaigns and civic engagement organizations remove people from their target universes after they vote, EVVT programs target people who probably are receiving less GOTV outreach, meaning the messages are less likely to get lost in the shuffle.

¹ Not statistically significant.

²Vote Rev uses “medium salience” to refer to elections with 35-50% eligible voter turnout such as midterm elections and “low-salience” for elections with less than 35% eligible voter turnout such as primary, special, and odd-year elections. Vote Rev uses “high salience” for elections with 50% or higher eligible voter turnout such as presidential elections.

³ As identified through early voting data released by state election officials during the early voting period.

EVVT categorization: promising

EVVT meets Vote Rev’s standards of a **promising** tactic (see categorization below) as two studies have shown positive, significant impact on turnout in medium salience elections. However, EVVT does not meet our standards for an **"effective"** tactic due to a null result in the high-salience 2020 General Election. We cannot say with confidence that EVVT delivers a positive impact on voter turnout in all elections because we have yet to observe a positive impact in a high salience context.

The categorization of tactics is as follows:

Rating	Explanation
Effective	We have strong evidence from multiple rigorous randomized control trials demonstrating the tactic’s impact on voter turnout in most types of elections including high-salience elections, such as general elections.
Promising	We have evidence from at least one rigorous randomized control trial demonstrating the tactic’s impact on voter turnout in an election, such as a low-salience primary election with lower expected turnout and attention. Further research is needed to increase our confidence in the tactic’s effectiveness.
Mixed	We don’t have sufficient evidence to confidently conclude the tactic has an impact on voter turnout in elections. This could be because some studies show an increase in turnout whereas others show a decrease or no effect on turnout.
Ineffective	We have evidence from multiple rigorous randomized control trials demonstrating the tactic has an overarching null, or even negative, impact on voter turnout in any type of election.
Lacks Evidence	We don’t have sufficient evidence from rigorous randomized control trials to indicate the directional impact of the program. We may have early findings from non-causal evaluations (such as process evaluations) or lower quality RCTs.

Summary of the evidence

EVVT has been tested in three randomized controlled trials (RCTs) – the “gold standard” for evaluating the effectiveness of interventions – as follows:

1. 2020 General Election study
2. 2020 Florida State Primary study
3. 2018 Texas Midterms study

All studies assessed the effectiveness of EVVT by measuring turnout among *copartisan household members* of the message recipient, as identified by voter file data and TargetSmart modeled partisanship scores. For brevity we will use the term “housemate” for these individuals, but note that they can include spouses, voting-aged children, and other people living at the same mailing address.

We considered two of these three studies “high-quality”, meaning the experiment was implemented with fidelity and a large sample size that mitigates the risk of false negatives. We considered one study “medium-quality” due to implementation errors that may have impacted the study’s results. The medium-quality study is treated as less influential in our narrative review of the evidence.

2020 General Election study

Overall Summary - 2020 General Election Study	
Election Type	General
Election Saliency	High
Eligible voter turnout rate ⁴	66.8%
Study Quality	High
Sample Size	1.4 million voters
Directionality	Very slightly negative
Effect Size	Null (p-value=0.39)

The 2020 General Election study found a nonsignificant and near-zero impact of EVVT messages on housemate turnout (treatment effect of -0.1pp, from 58.6 (control) to 58.5 (treatment), p=0.39). Because of its large sample size and fidelity of implementation, this study is the most influential in our narrative assessment of the evidence. Note that we do

⁴ We use the voter turnout rate among all eligible voters to indicate the saliency of the election. Retrieved from: <https://www.electproject.org/election-data/voter-turnout-data>

not know whether triplers’ housemates actually received a relational reminder (ie, this was an intention-to-treat analysis; see more on this in the [next section](#)). This large-scale study was run in 21 states and included a sample size of 1.4 million voters. Given the [atypically high turnout](#) in the 2020 General Election, we might find different results in medium salience elections with lower turnout such as midterms, primaries, or even typical Presidential elections.

2020 Florida State Primary study

Overall Summary - Florida Primary Study	
Election Type	Primary Election
Election Salience	Low
Eligible voter turnout rate	19.5%
Study Quality	High
Sample Size	200,000 voters
Directionality	Positive
Effect Size	0.8-0.95pp (p-value=0.01)

During Florida’s State Primary in 2020, an RCT found EVVT messages had a .8-.95 percentage point, statistically significant ($p=.01$), positive effect on housemate turnout. This test was conducted with relatively few implementation errors and included a well-powered sample size of 200,000, though notably (6x) smaller than the 2020 General Election results. As a result, the findings are encouraging but have less influence on our narrative review than the findings from the 2020 General Election experiment.

2018 Texas Midterms study

Overall Summary - Texas Midterms Study	
Election Type	Gubernatorial
Election Salience	Medium
Eligible voter turnout rate	45.6%
Study Quality	Medium
Sample Size	7,000 voters
Directionality	Positive

Effect Size	1pp (p-value=0.105)
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In the 2018 Texas Midterm elections, a small scale RCT run in partnership with the Texas Democrats found a 1 percentage point, positive impact of EVVT messaging on housemate turnout that reached near statistical significance ($p=.105$). Due to the sample size of only 7,000 participants and issues with the experiment's implementation, these results are less influential in our narrative review of the evidence but are still useful in helping to estimate EVVT's impact in midterm elections.

What is EVVT's estimated impact?

Meta-analysis

We ran a meta-analysis of the three studies outlined above (for details see [the Appendix](#)). The analysis estimated a **0.48pp lift in turnout** (90% confidence interval $[-0.58 - +1.54pp]^5$) across the 3 studies. The results were not statistically significant, meaning that **we can't strongly rule out the possibility that EVVT had no effect on average**, but the mean estimated effect of EVVT across the studies is large enough to be practically important (for more on how we interpret significance, see [the Appendix](#)).

This meta-analysis includes only 3 studies, which limits our ability to generalize to types of election not represented and increases the risk of misleading inferences due to chance results in any one study (in either direction). The aggregated effect size offers an improved estimate of effectiveness above and beyond each study in isolation, but we acknowledge that the effect may differ by election type. This may include a positive effect in low- or medium salience elections with lower baseline turnout, given the statistically significant positive impact found in the 2020 Florida Primary and near significant positive impact in the 2018 Texas Midterms. Future large scale RCTs should further test the impact of EVVT during medium and high salience elections, such as midterms and presidential elections, to explore this.

Caveats

There are a few caveats to the finding of overall null (i.e., statistically non-significant) impact of EVVT:

First, these results are driven by findings from a study run during the 2020 General Election which was an unusual election in terms of salience, excitement, and turnout. As a result, the impact of EVVT may have been overshadowed as voters who may typically need a nudge to vote were motivated by the excitement around the election.

⁵ We report a 90% CI because we believe political partner groups are less risk-averse than scientific audiences; the 95% CI is $[-1.09 - 2.05]$.

Second, the metric of measuring the voter turnout of copartisan household members may underestimate the impact of the intervention. We do not collect sufficient personal information on the reminded friends to look up their voting behavior in the voter file. As a result, copartisan household members' voter turnout is used as an imperfect proxy measure that most likely underestimates EVVT's impact. Previous tests show that only [12% of the names shared by triplers match the first names of known housemates](#), meaning that our analyses include housemates whom the tripler may or may not have reminded, while excluding the non-household members whom the tripler may have reminded.

Third, SMS was a highly used voter engagement channel in 2020. An estimated [13 billion](#) political texts were sent during the 2020 election, heavily concentrated in swing states. It's possible that overwhelmed voters may have simply ignored all political messaging, minimizing the impact of this intervention. If texting continues to be used heavily, this may be a valid indication that EVVT will not be effective in the future. However, new regulations (10DLC) that reduce the volume and increase the quality of text messages may lead EVVT to rise in effectiveness.

How does EVVT compare to traditional campaign tactics?

This evaluation – that EVVT may increase voter turnout during medium salience but not high-salience elections – aligns with a [meta-analysis of GOTV programs from the Analyst Institute](#). As mentioned above, the noisiness of the 2020 election may have reduced the impact of SMS programs in the election, also consistent with a [subsequent report](#) from the Analyst Institute.

Taken together, this evidence suggests EVVT is likely as impactful as other GOTV SMS interventions.

Appendix

Meta-analysis

Approach

We have performed 3 RCTs on EVVT. These studies were combined in a meta-analysis to determine an overall effect estimate. Papers, data, and code used for the meta-analysis are available on request (contact research@voterev.org).

Some experiments contained multiple variants on the main treatment, including different scripts, different numbers of follow-up messages, or different senders. The headline analyses for each study combined all of these into one comparison between any-treatment and no-treatment, and this is the result our analyses use. In all cases the outcome of interest is copartisan housemate turnout in the relevant election.

Papers contained 2 versions of each analysis, with and without control variables. These variables typically included tripler and triplee demographics, turnout scores, and household sizes. The meta-analysis always uses the version with control variables present.

Two papers contained additional splits or subgroups, including analyses looking at spillovers regardless of partisanship or at only pledgers or only non-pledgers. We do not use any of those distinctions in this meta-analysis, nor do we attempt to account for variations in the definition of a control group. The meta-analysis simply uses the controlled main effect estimate across all treatment variations, compared to whatever the headline study analysis defined as the control.

The original analyses used linear regression, which produces parameter estimates that are equivalent to the percentage point lift in turnout attributable to the treatment. We considered reanalyzing the data using a logistic regression approach that may be more technically correct for binary outcome data. However, inferences based on logistic regression may imply that higher baseline turnout will lead to a larger absolute increase in turnout. Empirical evidence, as reviewed above, suggests that absolute treatment effects are *smaller* in higher-salience elections, so the linear regression approach is more realistic⁶.

⁶ As a robustness check we did carry out the logistic regression analysis, and obtained a somewhat higher prediction in the context of midterm elections (0.72pp at a baseline turnout rate of ~50%).

Generalizability remains a challenge. The meta-analysis uses a random-effects model that represents heterogeneity among studies, but the sample is too small to test hypotheses about what predicts these differences.

Results

We used an inverse-variance weighted model with random effects (Knapp-Hartung method). Random effects were chosen due to our pre-existing belief that the different electoral contexts of these studies would entail critical differences; this was borne out by statistical measures of heterogeneity ($I^2=75.19\%$, $Q=9.53$, $p=.01$). The estimated difference between groups in voter turnout was 0.48pp ($p=.32$). The 90% Confidence Interval (CI), representing the likely range of impact based on the data we have, is $[-0.58 - +1.54pp]^7$.

Because the results are not statistically significant, we can't say with high certainty that the intervention has a nonzero effect. However, our goal is to make the best estimate we can about the world, even given imperfect evidence. Thus, we estimate that across our past studies EVVT has shown a voter turnout lift of 0.48pp, and will advise our partners of the imprecision in this estimate when discussing the use of this tactic.

We also reiterate that the meta-analytic combination of multiple studies may not be the most relevant prediction for any one election. There is a distinct possibility that we found differing results between elections because EVVT actually does have a large impact in low salience elections and a smaller impact in extremely high-salience elections. **In order to find out if EVVT works in midterms or presidential elections, it must be further tested in those types of elections.**

⁷ We report a 90% CI because we believe political partner groups are less risk-averse than scientific audiences; the 95% CI is $[-1.09 - 2.05]$.