



June 22, 2020

TO: The United States Election Assistance Commission (EAC)

Thank you for the opportunity to comment on the proposed Voluntary Voting Systems Guidelines (VVSG) 2.0. Verified Voting's mission is to strengthen democracy for all voters by promoting the responsible use of technology in elections.

Verified Voting applauds the diligent work that has occurred over the past several years to get to the final stages of VVSG 2.0 and agrees with Chairman Hovland that this is an important step toward improving election security.

Verified Voting has contributed to the development of prior versions of the VVSG since its inception in 2004. We appreciate the EAC's invitation for public comments and that the EAC has incorporated a number of our suggestions throughout the years. Several of Verified Voting's Board and Advisory Board members have participated in the development of earlier versions of the VVSG 2.0 as well as on several NIST-EAC Working Groups that helped develop the Requirements for the latest proposed VVSG 2.0.

The EAC should adopt the VVSG 2.0 as soon as possible and enforce the expiration of VVSG 1.0 and 1.1 in order to ensure that systems fulfill the most recent standards, rather than grandfathering election systems that continue to evolve.

Since its founding, Verified Voting has advocated for the responsible use of technology in elections. Technology is a crucial component of election infrastructure – the choice of technology and its deployment directly impacts how votes are cast and counted. The responsible use of election technology can bolster public confidence in election outcomes and help voters cast their votes safely and securely. The irresponsible use of election technology not only destroys confidence in elections but also disenfranchises voters. **As the EAC considers final public comments, we must note that *all* voters deserve election security and that election security does not have to be compromised for accessibility.**

Verified Voting submits the following additional comments for the EAC's consideration before the publication of a final version.

We applaud and ask that you remain firm in the following:

- **Requirement 14.2-D (p. 254) Prohibition of Wireless Technology** unambiguously states that "Voting systems must not be capable of establishing wireless connections." Even brief wireless connectivity can facilitate malicious hacking, manipulated or deleted votes and tracing a voter's selections back to the individual voter. We urge the EAC to remain firm on this prohibition.
- **Principle 4 Interoperability (p. 125 - 131)** includes a number of specific requirements for election system components to be able to import and export data and metadata in standard common data formats developed by NIST that we hope will lead to consistent component certification testing.

We ask that you reexamine the following:

- **Requirement 10.2.1-B, p. 212** There must be a crystal clear and verifiable separation of voter identity from each cast vote. Storing "indirect" information that allows *anyone* but the voter to associate an individual voter with their votes, such as with a recallable ballot, must be prohibited even on paperless systems.
- **Requirement 7.1-I – Text size (paper)** Although the current version of the VVSG contains a number of requirements that pertain to usability and accessibility of ballot marking device (BMD) visual interfaces, Requirement 7.1-I seems to be the only one that specifies attributes of paper ballots that are produced by those BMDs. It is these paper ballots that need to be verified by voters to produce solid evidence for tabulation audits and the correctness of election outcomes. We urge the EAC to specify concrete requirements for the paper produced by BMDs. These paper ballots should include all contests, should be comparable in size and shape to other ballots cast, and be readable so that the voter can verify their contest selections.
- **Requirement 9.4-B - Efficient Risk Limiting Audit (p. 208)** deserves enhancement to ensure the export of election records in an open format for *software independent* tabulation audits of election outcomes as well as measurements of device performance. An evidence-based election requires convenient access to systematically anonymous ballot sheets, ballot sheet images and cast vote records for efficient and trustworthy public tabulation audits. Vendors should demonstrate how an election system provides all the information necessary for an independent Risk-Limiting Audit (RLA), and voting systems should be tested for their support of efficient audits.

- **Early Voting and Central Count Systems Requirements.** Much of the proposed VVSG 2.0 seems aimed primarily at voter-facing electronic vote-capture systems. Additional requirements are needed to address central counting of mail ballots in the proposed draft VVSG 2.0, especially given the recent increase in voting by mail. For instance, the prohibition of extracting or reporting any vote tally data prior to the end of election day (1.1.10-I) should explicitly include early voting and central count systems.
- **Glossary; “voter-facing” or “voter-fed” scanner (p.328).** We applaud the decision to update the terminology for “precinct-count” and “central-count” scanners. Clearly, scanner characteristics do not depend on where the scanners are used. The proposed term “batch-fed” (for “central-count”) clearly identifies a class of high-capacity scanners. The proposed term “voter-fed,” however, has a similar weakness as “precinct-count”: More than half the nation’s jurisdictions use these scanners to tabulate ballots centrally. We recommend the term “hand-fed” to describe these scanners, whether fed by voters or by election officials.
- **Consistent and Well-defined Terminology.** VVSG 2.0 Requirements depend on uniform and precise understanding of the words used and a consistent application of terminology. We support careful use of modifiers for greater clarity, especially when discussing a “ballot” (including provisional ballot, accepted ballot, read ballot, cast ballot, ballot sheet, ballot packet).¹ There are also terms that are defined clearly in the proposed Glossary that should be used consistently² and there are some terms³ that are not currently defined in the Glossary.

Verified Voting recommends close attention to the State Audit Working Group's (SAWG) detailed examination of the VVSG Glossary and Requirements. SAWG members are election integrity experts and advocates from across the country who share a common desire to uphold the security, accuracy, integrity, and particularly the verifiability of elections. Their work was a valuable resource for our review.

Verified Voting commends the improvements in VVSG 2.0 that enable greater confidence in the integrity of voting systems.

¹ The term “ballot” is used over 980 times, but in some instances (such as in the introduction to Principle 9 p. 191) adding the modifier “accepted” to ballot creates greater clarity as it is possible for a ballot to be cast and not accepted or counted.

² e.g. the Glossary defines “contest selections” but Principle 9 repeatedly uses “ballot selections,” which is not defined in the Glossary (p. 191); “bulk-fed scanner” should be “batch-fed scanner” (p. 106)

³ One example of a term that is used in the Requirements but that is not defined is ‘compliance audit’.

Thank you in advance for consideration of our comments on the proposed VVSG 2.0.

We look forward to reading and using the final version.

Respectfully submitted,

A handwritten signature in blue ink that reads "Marian K. Schneider". The signature is written in a cursive style with a large initial 'M'.

Marian K. Schneider, Verified Voting Foundation President

Cris Landa, Verified Voting Foundation Program Director

John McCarthy, Verified Voting Foundation Advisory Board Member and retired computer scientist, Lawrence Berkeley National Laboratory