

HOUSE BILL REPORT

ESSB 6420

As Reported by House Committee On:
Technology, Telecommunications & Energy

Title: An act relating to voting systems, including establishing paper record requirements for electronic voting devices.

Brief Description: Enhancing integrity of voting systems.

Sponsors: Senate Committee on Government Operations & Elections (originally sponsored by Senators Roach, Kastama, Kohl-Welles, Rasmussen, Oke and Winsley; by request of Secretary of State).

Brief History:

Committee Activity:

Technology, Telecommunications & Energy: 2/24/04, 2/27/04 [DPA].

Brief Summary of Engrossed Substitute Bill
(As Amended by House Committee)

- Prohibits the use of punchcard voting machines after January 1, 2006.
- Requires the Secretary of State (Secretary) to convene a task force known as the Washington Voting Systems Board made up of elections administrators, technology experts, and legislators.
- Requires Direct Recording Electronic (DRE) voting machines to produce a paper record that a voter may review before finalizing his or her vote.
- Allows alternate voter-verification methods to be certified after they have been approved by the Washington Voting Systems Board and after one regular legislative session has passed.
- Requires county auditors to audit 8 percent of the DREs after an election by comparing the electronic result to the paper result for six randomly selected races or issues.

HOUSE COMMITTEE ON TECHNOLOGY, TELECOMMUNICATIONS & ENERGY

Majority Report: Do pass as amended. Signed by 14 members: Representatives

Morris, Chair; Ruderman, Vice Chair; Sullivan, Vice Chair; Crouse, Ranking Minority Member; Nixon, Assistant Ranking Minority Member; Anderson, Blake, Bush, Delvin, Hudgins, Kirby, Tom, Wallace and Wood.

Minority Report: Do not pass. Signed by 2 members: Representatives McMahan and Romero.

Staff: Katie Blinn (786-7114).

Background:

Certification:

Voting equipment and vote tallying equipment must be approved by the Secretary in order to be used by county auditors to conduct elections. The Secretary must inspect, evaluate, and publicly test all voting equipment, make a report following each examination, and provide a copy of the report to each county auditor. Any change that does not impair the equipment's accuracy, efficiency or capacity, or extend its function, may be made without another examination or approval.

Voting machines must:

- Maintain secrecy;
- Permit the voter to vote for any person, office, and measure for which he or she has the right to vote;
- Correctly register votes cast;
- Prevent a vote for more than one candidate by a single operation of the device, except for president and vice-president of the United States; and
- Be tested, certified, and used in at least one other state or election jurisdiction, except for functions that are unique to Washington.

Vote tallying equipment must:

- Correctly count the votes on properly marked ballots;
- Ignore improperly marked portions of a ballot while counting the properly marked portions of the ballot;
- Count the number of ballots tallied for each precinct, the number of votes for each candidate, and the number of votes for and against each issue;
- Accommodate name rotation;
- Produce precinct and cumulative totals in printed form; and
- Be tested, certified, and used in at least one other state or election jurisdiction, except for functions that are unique to Washington.

County auditors are responsible for the preparation, maintenance, and operation of equipment used in their counties. An agreement to purchase or lease a voting system is subject to the Secretary's approval that the equipment is actually the same as that certified, and that the equipment is still operating correctly after it is delivered to the

county.

Regular Testing and Procedures:

Before an election, the format of each ballot in each machine and the precinct for which the machine has been prepared must be recorded. At least three days prior to each primary and general election, the Secretary must conduct a logic and accuracy test on each vote tallying system. If an error is detected, the cause of the error must be determined and corrected before the election. Voting machines must correctly record the votes on a ballot, and the ballot must be available for audit purposes after the election. At the polling place, voting machines containing ballots for one congressional, legislative or county council district must be grouped together and physically separated from machines containing ballots for other districts.

DRE Voting Machines:

The federal Help America Vote Act of 2002 (HAVA) requires states to place an electronic voting device in each polling place that is accessible to persons with disabilities, allowing them to vote in privacy. The devices currently on the market that meet these requirements are Direct Recording Electronic devices, known as DREs.

Summary of Amended Bill:

Certification:

A voting device or vote tallying system, or the component software, must be tested and approved by an independent testing authority (ITA) approved by the Federal Election Assistance Commission in order to be certified for use in Washington, but must no longer be used in another state prior to certification in Washington. The Secretary must publicly demonstrate all voting systems submitted for review, and post the certification reports to the internet. A voting system vendor submitting a system to the Secretary for certification must provide the Secretary copies of the source code and the compiler code sufficient to recompile the program. The Secretary may withdraw certification for cause, following a public hearing. After January 1, 2006, punchcard voting machines are prohibited. Existing equipment certifications remain in effect until January 1, 2006, but equipment purchased after July 1, 2004 must be subject to the new requirements.

Once a voting system has been certified, no changes may be made by a county auditor without notifying the Secretary. The change must be approved by an ITA prior to submission to the Secretary. If the vendor believes that a modification is necessary during the 10 days prior to an election, an emergency examination that is valid only for the upcoming election may be performed by the Secretary. Anytime a source code is modified, a vendor must provide updated copies to the Secretary. All source code and compiler code material submitted to the Secretary is exempt from public disclosure. The Secretary must work with the Department of Information Services and the Information Services Board on the procurement of new voting systems through master

contracts. If using federal HAVA funds to procure new voting systems, county auditors must consider the use of these master contracts.

Regular Testing and Procedures:

County auditors must provide written, signed verification during a logic and accuracy test that the voting system and its component software, in the version used, are certified. The test following a purchase or lease of a voting system to determine if the system is the same as that certified by the Secretary must be conducted by the county auditor as the purchaser or lessee. During the logic and accuracy test conducted prior to an election, the county auditor must again provide proof that the voting system in use is certified, and that all ballot styles have been programmed correctly. Each voting device must be physically sealed, kept in a secure location, and protected against unauthorized access until election day.

Polling places are no longer required to physically separate voting devices with ballots for one district from voting devices with ballots for another district. Rather, the individual ballot displayed to the voter must only contain the candidates for one district. Ballot counting systems must produce periodic reports in between counting sessions.

Wireless communications may not be used in a voting system. All elements of a ballot counting system must be observable and secured, and may not be connected to, or operated on, any electronic network, including internal office networks, the internet, or the World Wide Web. Transfer of information from the ballot counting system to another system must be made via disk, tape, or other physical means rather than a direct electronic connection. However, vote tallies from poll site-based counting devices may be transmitted electronically if the electronic method is not directly connected to the voting system.

Task Force:

The Secretary must convene a task force of elections and computer security experts known as the Washington Voting Systems Board (Board) to study the potential for election fraud. The Board shall include:

- At least five county auditors;
- At least two information technology professionals;
- The Director of the Department of Information Services;
- A representative of the Washington disability access group;
- The Director of Elections;
- The Secretary;
- A member of each of the four caucuses of the Legislature;
- A statistician; and
- A cryptographer.

The Board may also consult other experts as necessary, such as forensic accounting

specialists, computer forensic experts, and law enforcement agencies. The Secretary shall report to the Legislature during the 2005 and 2006 legislative sessions on the status of a variety of election issues.

DRE Voting Machines:

DRE voting machines must have *either* a voter-verified paper record of the votes cast, *or* an alternative method for the voter to verify votes in a technology that is distinct from the DRE.

If the DRE produces a paper record, the paper must be machine-readable for purposes of counting the votes cast in a technology distinct from the DRE. The DRE must allow the voter to review the paper record prior to finalizing his or her vote, and spoil the record and repeat the voting process if necessary. If the DRE is programmed to display ballots in multiple languages, each paper record must be printed in the language used by the applicable voter. The electronic record is the official record of each vote, but the paper record becomes the official record for specified circumstances, such as manual recounts, and must be treated with the same procedure and security as traditional ballots.

An alternative method to verify votes cast on a DRE may be certified by the Secretary if it has been approved by the Washington Voting Systems Board and if at least one regular legislative session has passed since the Board's approval. The alternative method must maintain privacy, while allowing a voter to verify that the votes were cast and recorded as intended. The alternative method must allow the voter an opportunity to repeat the voting process if the verification does not reflect his or her votes.

The day after an election, the county auditor must conduct an audit of votes cast on DRE machines. The auditor must randomly select 8 percent of the DRE machines used and, for six randomly selected races or issues, compare the electronic results to the results recorded on paper or the alternative method. Unauthorized removal from a polling place of a DRE paper record or the alternative technology is a class C felony.

Amended Bill Compared to Engrossed Substitute Bill:

The amended bill requires a vendor to provide copies of the source code and the compiler code to the Secretary when submitting the equipment for certification and each time the equipment is modified. The amended bill allows alternative voter-verification methods to be certified for use in Washington at some point in the future once they have been approved by the Washington Voting Systems Board and after at least one regular legislative session has passed. The amended bill clarifies that each voting device must be physically sealed until election day. The amended bill clarifies that the paper record becomes the official ballot under specified circumstances. The post-election audit is expanded from three randomly selected races on 4 percent of the DRE machines to six randomly selected races on 8 percent of the DRE machines.

The amended bill changes the make-up of the Washington Voting Systems Board from six county auditors to five, from two computer experts experienced in maintaining enterprise level computing systems to two information technology professionals, and adds a cryptographer. The Washington Voting Systems Board may consult with other experts as necessary, such as forensic accounting specialists. The Secretary must work with DIS and the ISB on the procurement of voting systems through master contracts, and county auditors that use HAVA funds to purchase new voting systems must consider the use of master contracts. The requirement that voting equipment and vote tallying equipment be certified for use in another state before it may be certified for use in Washington is eliminated. The reference to the SERVE voting pilot project is eliminated because the pilot project was recently canceled by the Department of Defense.

Appropriation: None.

Fiscal Note: Available on original Senate bill.

Effective Date of Amended Bill: The bill takes effect July 1, 2004, except for sections 18 through 21, 25, and 26, relating to DRE voting machines, which take effect January 1, 2006.

Testimony For: None.

Testimony Against: Do not wait until 2006 to implement the audit requirement. The 4 percent audit is not extensive enough to be meaningful. All DRE ballots should be audited, not just 4 percent. There should be a voter-verified paper audit for every voting system used, not just DREs. Some states are imposing this requirement for all types of equipment. The state needs to audit all systems, including optical scan.

The provision requiring equipment to be certified in another state prior to certification here should be repealed. It should be more difficult to introduce new equipment or voting systems into our state. New technologies should have to be approved by the Legislature before they can be certified. The current certification system has failed repeatedly. Technology is leaping ahead, and so are the hackers. The Secretary should not be able to certify last minute modifications because this will undercut all prior quality control procedures. There should be a requirement that equipment be re-certified after every change. An additional step should be added to the logic and accuracy test to check if the computer program has been changed. While the provision prohibiting wireless connections is good, there is no way to verify compliance and no way to enforce it. The HAVA is being misinterpreted. It is an unfunded mandate, and the Elections Assistance Commission is just now getting started. It is still unknown how the counties are going to afford the replacement of their punchcard equipment.

While an independent method of verification is definitely a good thing, paper is not the

only method and the Legislature should not freeze that technology in law. The University of Washington School of Information will be conducting a study of various methods for voters to verify the votes cast. The Legislature should wait until that study is completed, estimated to be in Spring 2005, before imposing a requirement in law that voting equipment produce paper. Vendors are in the process of developing other technologies for voter verification. This bill forecloses the other options that those vendors are developing, which can also jeopardize their funding.

Persons Testifying: Marian Beddill and Linda Franz, Whatcom Fair Voting/Citizens for Voting Integrity; Brian Finney, Advanced Voting/University of Washington; and Scott Hazelgrove, Vote Here.

Persons Signed In To Testify But Not Testifying: None.