

Department of Legislative Services
Maryland General Assembly
2018 Session

FISCAL AND POLICY NOTE
First Reader

House Bill 767 (Delegate Rosenberg)
Ways and Means

Election Law - Securing Elections From Foreign Interference

This bill makes various changes to State election law relating to (1) auditing of, and upgrading or replacing, voter registration infrastructure; (2) length of use of voting machines; (3) having paper copies of the election register available to election judges at polling places and early voting centers; and (4) a post-election manual audit. **The bill takes effect June 1, 2018.**

Fiscal Summary

State Effect: Potential significant increase in general fund expenditures in future years for voting system costs. Revenues are not affected.

Local Effect: Potential significant increase in local government expenditures beginning in FY 2020 to conduct post-election manual audits. In addition, local government expenditures increase beginning in FY 2018 for paper copies of election registers, with the potential increase (from the counties contacted) ranging from \$4,000 in Wicomico County to \$46,000 in Baltimore City. Local government expenditures may increase by a significant amount in future years for voting system costs. **This bill imposes a mandate on a unit of local government.**

Small Business Effect: None.

Analysis

Bill Summary:

Voter Registration Infrastructure

The bill requires the State Board of Elections (SBE) to (1) conduct an annual audit of the voter registration infrastructure (defined as the statewide voter registration list and related information technology systems); (2) mitigate any security vulnerabilities identified in the audit; and (3) upgrade or replace the voter registration infrastructure as necessary, but not less than once every 10 years.

Voting Machines

A voting machine (defined to include a direct recording electronic voting device, a ballot scanner, a ballot marking device, or any other machine or device that is used to cast, record, or tabulate ballots or votes) may not be used in an election if more than 10 years have elapsed since the date the voting machine was manufactured.

Paper Copies of the Election Register at Voting Locations

The bill requires that each polling place and early voting center have a paper copy of the election register available for the use of the election judges if computer devices containing a record of all registered voters in the county, that are required to be at each polling place, do not function properly during an election.

Post-election Manual Audit

The bill requires SBE to adopt regulations, by January 1, 2020, requiring verification of the electronically tabulated election results through a manual audit of a random sample of paper ballots. The regulations must provide for:

- the contests to be audited, which must include, at a minimum, all statewide contests and all contests for Representative in Congress;
- the number of ballots to be audited in each contest, which must be sufficient to provide a high level of statistical confidence that a software tabulation error that would change the outcome of a contest would be detected by the audit;
- correction of the electronically tabulated results through a full manual count of all ballots in a contest if any software tabulation error is detected;
- public observation of the audit process;

- the deadline for completion of the audit, which may be later than 10 days after an election; and
- all other procedures necessary for conducting the audit.

The audit is in addition to any other audit or procedure for verifying the vote count that SBE prescribes pursuant to an existing requirement that, within 10 days after any election, and before certifying the results of the election, each board of canvassers verify the vote count in accordance with regulations prescribed by SBE for the voting system used in the election.

Current Law/Background:

Security of Election Systems

Increased attention has been paid to security of election systems as a result of cybersecurity threats to election systems that occurred in 2016. Efforts are being made at various levels of government to increase existing security of election systems in order to guard against future threats. In Maryland, election officials continue to implement best practices for information systems and focus on securing and monitoring election systems. Scrutiny of the security of Maryland's election systems, by the Office of Legislative Audits (in an SBE audit [report](#) issued in April 2017) and others, has revealed certain deficiencies that can be (or already have been) addressed by administrative and/or legislative action. For additional information, see [Issue Papers, 2018 Legislative Session](#), Department of Legislative Services, pgs. 217-220 ("Cybersecurity of Election Systems") (November 2017).

Voting System

State election law requires SBE to select, certify, and acquire, for use in all counties, a voting system for voting in polling places and a voting system for absentee voting. Various requirements and criteria for certification and decertification are specified. SBE is authorized to decertify a voting system if it is determined to no longer merit certification and must decertify a voting system if it no longer meets one or more of specified certification standards (that the voting system will (1) protect the secrecy of the ballot; (2) protect the security of the voting process; and (3) count and record all votes accurately).

Registered Voter Information at Polling Places

"Election register" is defined under State election law as the list of voters eligible to vote (1) in a precinct on Election Day or (2) in a county early voting center during early voting. Election judges are required to use the election register in checking in, establishing the identity of, and verifying the address of voters at a polling place or early voting center.

State law also requires that each polling place be equipped with a computer device that contains a record of all registered voters in the county that is capable of being networked to other polling place computer devices.

Post-election Verification/Audit of Vote Count

2016 General Election Post-election Audit and Planned 2018 Audits

The 2016 budget bill (Chapter 143) restricted \$50,000 of SBE's general fund appropriation for general administration in fiscal 2017, until the completion of a post-election tabulation audit following the 2016 general election, using the paper ballots or electronic images of the paper ballots, and the submission of a report on the audit to the budget committees; the Senate Education, Health, and Environmental Affairs Committee; and the House Ways and Means Committee by December 31, 2016.

The post-election audit of the 2016 general election was conducted using a software product that performed an independent, automated audit using ballot images imported from the voting system. SBE indicated in its December 2016 report to the legislative committees that the goal of the audit, to verify and confirm the accuracy of the voting system's reported results, was achieved.

Similar audits are planned for the 2018 elections, at a cost of \$352,000 per (primary or general) election, with the cost shared by SBE and the local boards of elections.

Current Law and Regulations on Post-election Verification of Vote Count

Under existing statute, within 10 days after any election and before certifying the results of the election, each board of canvassers (the local board of elections in a county when it has organized itself for the purpose of canvassing the vote after an election) must verify the vote count in accordance with regulations prescribed by SBE for the voting system used in the election. Upon completion of the verification process, the members of the board of canvassers must certify, in writing, that the election results are accurate and that the vote has been verified.

If a board of canvassers determines that there appears to be an error in the documents or records produced at a polling place following an election, it immediately must investigate the matter to ascertain whether the records or documents are correct.

SBE regulations establish a post-election verification and audit process conducted prior to certification of the election results which has the purpose of (1) demonstrating and confirming the accuracy of the voting system's tabulation logic; (2) confirming that the number of ballots cast equals the number of voters who checked in to vote at a polling

place; and (3) ensuring that each accepted absentee and provisional ballot met the application and acceptance criteria and that rejected ballots did not meet the criteria. The verification of the voting system's tabulation logic involves comparing printed out vote totals from the individual voting units from a precinct with the aggregated results for the precinct in the election management system. After 8 p.m. on Election Day, each local board of elections must randomly select, at an open session of the board, the greater of three precincts (with at least 300 registered voters) or 5% of all precincts used in the election, for post-election verification and auditing. The State Administrator of Elections may also require a local board of elections to conduct the audit and verification procedures on additional precincts.

State Fiscal Effect: General fund expenditures may increase by an indeterminate, potentially significant amount in future years to meet the bill's requirement that a voting machine not be used in an election if more than 10 years have elapsed since the date the voting machine was manufactured.

Maryland's current voting system is leased and was procured under a contract with an initial contract term of January 2015 through March 2017 (covering the 2016 elections), and two, two-year options to continue the contract, one covering the 2018 elections and one covering the 2020 elections. The current annual cost of the voting system, including the cost of hardware (voting machines) and certain services such as equipment repair and maintenance, is approximately \$4.7 million per fiscal year.

SBE indicates that the State will have the option, at the end of the second lease contract option (after the 2020 elections) to purchase the current system, but the voting machines will be relatively close to being 10 years old at that point.

Pursuant to the bill, general fund expenditures may increase if (1) in the absence of the bill, the State decides to purchase the current system and continue to use it past 10 years after the voting machines were manufactured and (2) the annual cost of purchasing and maintaining the current voting system is less than the annual cost of leasing or purchasing a new voting system.

The bill's requirements related to voter registration infrastructure are not expected to affect State finances since SBE's current practices meet those requirements.

Local Fiscal Effect:

Voting System Costs

Local government expenditures may increase by an indeterminate, potentially significant amount in future years to meet the bill's requirement that a voting machine not be used in

an election if more than 10 years have elapsed since the date the voting machine was manufactured. Voting system costs are shared by the State and counties pursuant to Chapter 564 of 2001.

Post-Election Manual Audit

Local government expenditures increase by a potentially significant amount beginning in fiscal 2020, to conduct the manual audit procedure. For the purposes of this fiscal and policy note, it is assumed that the first audit occurs after the 2020 primary election, the first election after the deadline for SBE to adopt the regulations (January 1, 2020).

For illustrative purposes, the approximate average of per ballot personnel costs identified in SBE's [*Post-Election Tabulation Audit Pilot Program Report*](#) (October 2016) associated with the actual review of ballots during pilot manual audits (not including any costs associated with time spent on set-up and organization, or statistician services) was \$1 per ballot. This represents the average of four pilot manual audits – testing two audit methods in each of two counties, Carroll and Montgomery – in which per ballot costs ranged from approximately \$0.50 to \$1.50. (The pilot audits reviewed ballot images produced by the voting system, rather than the actual ballots.) In the 2016 general election, 2.8 million ballots were cast. Using the approximate average cost per ballot from the 2016 pilot program, if 1% of ballots are audited, the collective cost for the counties is \$28,000, and if 10% of ballots are audited, the collective cost is \$280,000. If a software tabulation error is detected and a full manual recount of all ballots in a contest (and potentially a statewide contest) must be conducted, as required under the bill, the cost could be considerably more than those examples.

Paper Copies of the Election Register

Local government expenditures increase annually, beginning in fiscal 2018, for local boards of elections to provide a paper copy of the election register to early voting centers. For example, Baltimore City expenditures increase by approximately \$46,000 for each election, to print and bind an election register (containing over 300,000 registered voters) for each of seven early voting centers. Wicomico County, which has fewer registered voters and one early voting center, expects costs of approximately \$4,000 for each election to print an election register for its early voting center.

Additional Information

Prior Introductions: None.

Cross File: None.

Information Source(s): State Board of Elections; Baltimore City; Charles, Frederick, Montgomery, and Wicomico counties; Department of Legislative Services

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