



Internal Audit
Department

301 W Jefferson St
Suite 660
Phoenix, AZ 85003

[maricopa.gov/
internalaudit](http://maricopa.gov/internalaudit)
602.506.1585

Mike McGee
County Auditor

Recorder's Office

*Audit of activities of the November
2017 jurisdictional elections and the
February 2018 special election in the
8th Congressional District.*

September 2018

*Internal Audit Report Authorized by the
Maricopa County Board of Supervisors*

Report Highlights

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The Recorder's Office will strengthen oversight of the Ballot-On-Demand system.

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The Recorder's Office will strengthen early voting controls.

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The Recorder's Office prepares jurisdictional ballots in accordance with service agreements.

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The Recorder's Office will strengthen controls over cash handling and election fees.

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<p>Audit Introduction</p>	<p>This audit was authorized in fiscal year (FY) 2017 for the FY 2018 audit plan and was limited to the objectives and scope described below. In light of the recent events surrounding the primary election on August 28, 2018, we will be conducting additional work related to the planning and execution of election day activities. A separate report will be issued upon completion.</p> <p>The Recorder’s Office provides document recording and voter registration services. Pursuant to a charter with the Board of Supervisors (BOS), the Recorder’s Office also provides elections services. We will refer to the Recorder’s Office throughout this report when discussing both recording and election services.</p> <p>The audit results contained in this report are based on conditions in effect at the time of our test work. The Recorder’s Office asserts that corrective actions are underway or have been completed, as noted in their responses to the issues in this report. As part of our normal audit process, we will conduct follow-up procedures after the release of this report to verify that corrective action has been implemented.</p>
<p>Audit Objectives</p>	<p>To ensure that adequate controls are in place to:</p> <ul style="list-style-type: none"> • Properly manage and secure the electronic voter check-in (i.e., Ballot-on-Demand) system. • Mail early ballots to eligible voters in a timely manner and process undeliverable ballots in accordance with statutes. • Print ballots accurately and in accordance with statutes. • Calculate election fees accurately, invoice and collect fees timely, and record and safeguard cash receipts properly.
<p>Scope</p>	<p>Our work encompassed activities for the November 2017 jurisdictional elections and the February 2018 special election in the 8th Congressional District (CD8).</p>
<p>Standards</p>	<p>This audit was conducted in conformance with International Standards for the Professional Practice of Internal Auditing.</p>

Audit Results

Issue #1: Ballot-On-Demand System

Background:

The Recorder's Office first implemented the Ballot-On-Demand System (BOD) in the November 2017 jurisdictional election. The BOD system includes three primary components: (1) SiteBooks to enable voter check-in, (2) Ballot-On-Demand printers to print the required ballot for each voter, and (3) equipment to provide redundant cellular networks to transmit voter data.

The Recorder's Office implemented the BOD system in order to (1) decrease the time required to vote in-person, reducing lines at polling places, (2) provide locations where registered voters from any precinct may vote, and (3) reduce the number of uncounted provisional ballots due to ballots cast from the wrong location.

The BOD system was used by 8,494 voters during the special election for the 8th Congressional District (CD8) in February 2018, and 19,262 voters during the general election in April 2018. The Recorder's Office estimates that approximately 243,000 voters will cast in-person ballots for the general election in November 2018.

Observations:

Roles and Responsibilities

We reviewed the roles and responsibilities over the BOD system and found that responsibilities for system development and management have not been documented. In addition, responsibilities over ongoing system maintenance requirements (e.g., change management, stress testing) were not identified and/or documented.

Contingency Planning

We reviewed the disaster recovery plan for elections services and found that it was last updated in 2014, and does not adequately address data restoration and business continuity in the event of a disaster involving the BOD system.

Stress Testing

We inquired about stress testing performed to evaluate the maximum level of activity that the BOD system can handle at once. Management asserted that they used automated tools to simulate rapid voter check-ins on numerous SiteBooks. However, we noted that the testing described to us was not planned to identify critical levels of activity that could cause a system failure. In addition, the testing procedures and test results were not documented. We noted that the BOD system was utilized during the CD8 special election in February 2018 and the general election in April 2018, and no significant issues were reported.

Change Management

Change management refers to the controlled identification and implementation of required computer system changes. We reviewed changes to the SiteBook application from September 2017 through March 2018, and found that most changes were not documented in the change management system.

In addition, we observed the imaging process, where SiteBooks are configured and software is updated before each election. We found several configuration errors (e.g., wrong computer names, potentially preventing the SiteBook from correctly connecting to the network). Additionally, key process steps were missing from the imaging checklists, requiring employees to remember critical changes.

Ballot Integrity

The Recorder's Office prepares over 7,000 ballot types to account for differing combinations of candidates and issues, depending on the voting precincts and voting districts. We reviewed the controls in place to ensure that all ballot types are properly transferred into the computers operating the BOD printers. We found there was no verification that the vendor responsible for performing this task transferred the correct ballot types into the BOD printers. This verification is needed to ensure that the appropriate ballot types are available and will print correctly at the polling place.

Security Assessments and Related Security Controls

We reviewed the processes over IT risk and security vulnerability assessments, along with related security controls, to determine that BOD system risks were effectively assessed and appropriately mitigated. We found instances where security over the BOD system could be strengthened. Detailed technical findings and recommendations were communicated directly to the Recorder's Office. For security purposes, further details are restricted.

Conclusion #1A: The Recorder's Office did not document the roles and responsibilities for the development and management of the Ballot-On-Demand system.	
Recommendation	Office Action Plan
1A-1 The Recorder's Office should document roles and responsibilities for maintaining and monitoring the Ballot-On-Demand system, and ensure that this information is properly communicated throughout the organization.	Concur – in progress One area that we agree in general needs to be addressed is the formal writing of all policies and procedures throughout the office. We have tasked our State and Federal Compliance Officer to eventually go through every part of our office and document policies, procedures and process, as well as develop a system for their periodic review. The first priority for her work is documenting the

Recommendation	Office Action Plan
<p>1A-1 (continued)</p>	<p>processes and procedures highlighted in this report, starting first with the roles and responsibilities of the SiteBook system.</p> <p>Target Date for completion: Oct. 15, 2018</p>
<p>Conclusion #1B: Written disaster recovery procedures and business continuity plans for the Ballot-On-Demand system were incomplete.</p>	
Recommendation	Office Action Plan
<p>1B-1 The Recorder’s Office should update the disaster recovery plan, and develop and implement a written contingency plan to ensure that all Ballot-On-Demand components are addressed. Both plans should include provisions for periodic review, update, and testing, as appropriate.</p>	<p>Concur – Completed - The technical aspects of the SiteBook and BOD system disaster recovery and business continuity plan have been included in the IT Section of the Disaster Recovery Plan, which is a confidential and internal document, and due to its sensitivity, available only for select review.</p> <p>In Progress - The general disaster recovery plan for the elections services, including items that impact personnel, equipment and other logistical issues, is currently under review and in the process of being updated as part of a department-wide update to policies and procedures. There are existing strategies in place for these issues under the 2014 plan that are utilized in current elections and the added redundancy of the vote center availability now allows for more voting options in emergency and unanticipated situations.</p> <p>Target Date for completion: June 30, 2019</p>
<p>Conclusion #1C: The Ballot-On-Demand system stress testing, as described by the Recorder’s Office, was not planned to identify critical activity levels and test results were not documented.</p>	
Recommendation	Office Action Plan
<p>1C-1 The Recorder’s Office should develop and implement written stress testing procedures for the Ballot-On-Demand system. Test results and related corrective actions should be documented.</p>	<p>Concur with the recommendation and the ongoing procedure documentation is in progress, but with respect to the “conclusion,” want to clarify:</p> <p>Our office conducted several formal stress tests on the SiteBook and BOD systems prior to implementation. The stress testing consisted of</p>

	<p>automated system testing using tools we developed and live testing during a mock election.</p> <p>All formal testing was setup to identify potential failure points using automated tools to track performance, and in the case of the mock election, using actual voters to measure system capacity and performance. A video of the mock election is available.</p> <p>Additionally, the SiteBook system was used during the Congressional District 8 special election. The anticipated voters at any polling location in the Primary and General elections does not exceed the numbers experienced at many of those locations.</p> <p>All that said, we concur that written procedures for stress testing, results, and related corrective actions should be documented.</p> <p>Target date for completion: June 30, 2019.</p>
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Conclusion #1D: Most changes to the Ballot-On-Demand system were not recorded in the change management system. In addition, the SiteBook imaging process was not complete, accurate, or properly documented.

Recommendation	Office Action Plan
<p>1D-1 The Recorder’s Office should ensure that changes to the Ballot-On-Demand system are recorded in the change management system, and SiteBook imaging should be complete, accurate, and properly documented.</p>	<p>Concur – Completed</p> <p>During the development phase of the SiteBook system, we used email to document the system changes. Now that the system is fully in the implementation/production phase, policies requiring further changes to be recorded in the change management system are being enforced. The change management system documents what changes are made and who requests and works on those changes. Further, the change management system includes a testing and verification process to ensure changes are completed as required.</p> <p>Further, the process for imaging the SiteBooks has been changed. Currently, a contractor provides automated imaging services of the SiteBooks using the procedures we developed. These procedures include requiring the contractor to document their activities on each unit, to ensure accuracy. The contractor imaged 1650 SiteBooks with no errors. Documentation is provided to our office by the</p>

	contractor, which shows that the imaging was done correctly.
Conclusion #1E: A reliable system was not in place to ensure that the vendor accurately and completely transferred all ballot types into the Ballot-On-Demand printers, and that all ballots print correctly.	
Recommendation	Office Action Plan
1E-1 The Recorder’s Office should develop and enforce written procedures to verify that the vendor transferred all ballot types accurately and completely into the Ballot-On-Demand system, and that all ballots print accurately and completely.	<p>Concur – Completed</p> <p>Every ballot type has a unique identifier and that ballot ID is created in the Recorder’s Office “VRAS system” as part of the ballot order program. The unique ballot ID is created for every eligible address and district combination that is qualified for the election. This ballot order is then confirmed by MCED staff and sent to a vendor for the processing and printing of ballots. The vendor also produces a printed version of the report that shows the number of ballot files and types in the ballot repository. These numbers must all match. This version control report will be printed at the time of uploading and a test alignment sheet will be printed for every BOD printer.</p> <p>In Progress – Written policies and procedures will be developed to articulate this process</p> <p>Target date for completion: June 30, 2019.</p>

Issue #2: Early Voting

Background:

The Recorder’s Office contracts with two vendors to print and mail (1) early voting ballots, and (2) follow-up notices to voters whose ballots are returned undeliverable. Both vendors receive electronic files from the Recorder’s Office for processing.

Observations:

We examined 328,553 early voting records for the February 2018 CD8 special election and determined that early voting ballots were sent to all eligible voters within the required timeframes.

We reviewed early voting processes and found no significant deficiencies. However, there were no formal procedures in place to help ensure that approved processes are followed in future elections.

We reviewed post-election processes and noted that there were no procedures to ensure that post-election data validation is conducted. For example, no procedures were in place to reconcile early ballots sent to ballots received and cast.

We also reviewed processes for sending follow-up notices to voters whose ballots were returned undeliverable, and tested a sample of early voting ballots returned as undeliverable in the February 2018 CD8 special election. We found that the Recorder’s Office did not ensure that the vendor responsible for printing and sending the follow-up notices provided proof of mailing these notices. In addition, all records of eligible voters were not retained, including undeliverable notices for public inspection, as required by federal regulation.

Conclusion #2A: The Recorder’s Office sent early ballots to all eligible voters in a timely manner for the February 2018 special election in the 8 th Congressional District.	
Recommendation	Office Action Plan
None	N/A
Conclusion #2B: No written policies and procedures were in place to ensure the successful implementation in future elections. In addition, post-election data validation procedures were inadequate.	
Recommendation	Office Action Plan
2B-1 The Recorder’s Office should prepare comprehensive written policies and procedures for the early ballot mailing process, to include: (1) the election set-up process, (2) early voting ballot delivery, and (3) post-election data validations.	Concur – In Progress As responded in item 1A-1, developing written policies and procedures in this area will be part of the project to document policies and procedures office-wide. Target date for completion: October 15, 2018.
Conclusion #2C: The Recorder’s Office did not maintain (1) proof of mailing from the vendor contracted to send follow-up notices, or (2) an adequate listing of all eligible voters, including undeliverable notices, as required by federal regulation.	

Recommendations	Office Action Plan
<p>2C-1 The Recorder’s Office should develop a comprehensive written policy to ensure that all supporting documentation for mailing undeliverable notices is obtained from vendors and retained.</p>	<p>Concur – Complete</p> <p>Internal reports have been designed and are now being used to track the work of the vendor sending-out notices. These reports are available to the public via our public records request process.</p> <p>In Progress</p> <p>Additionally, as responded in item 1A-1, developing written policies and procedures in this area will be part of the project to document policies and procedures office-wide.</p> <p>Target date for completion of written policies: June 30, 2019.</p>
<p>2C-2 The Recorder’s Office should develop comprehensive written policies and procedures to ensure that all mandated records related to eligible voter lists are retained and made publicly available.</p>	<p>Concur – In Progress</p> <p>As responded in item 1A-1, developing written policies and procedures in this area will be part of the project to document policies and procedures office wide.</p> <p>Target date for completion: June 30, 2019.</p>

Issue #3: Ballot Preparation

Background:

The Recorder’s Office prepares and prints jurisdictional ballots in accordance with jurisdiction service agreements, which delineate ballot requirements (e.g., ballot layout, authorization responsibilities, verification of boundaries) for each election. The Recorder’s Office prepared 131 ballot types for the November 2017 jurisdictional election.

Observations:

We reviewed a sample of ballot types to verify compliance with jurisdictional service agreements. The ballot types were generally complete and prepared in accordance with authorized proofs and other applicable requirements outlined in the service agreements.

Conclusion #3A: The ballots reviewed were generally prepared in conformance with proofs authorized by the jurisdictions.	
Recommendation	Office Action Plan
None	N/A

Issue #4: Cash Handling and Election Fees

Background:

In FY 2017, the Recorder’s Office recorded cash receipts of nearly \$9.2 million for the Elections Department, predominantly in the form of checks (99%). Of this amount, \$2.2 million was for the November 2017 jurisdictional elections.

Observations:

Cash Handling

We reviewed the controls in place to ensure that cash receipts (cash currency and checks) are accurately recorded and properly safeguarded. We also performed cash counts at three locations.

We found that there is no reliable system in place to ensure that cash receipts are accurately accounted for and properly safeguarded from fraud, waste, and abuse. Weaknesses were identified in most areas of the cash receipting cycle, including recording, safeguarding, depositing, and reconciling revenues. In addition, internal policies and procedures lacked key controls.

Election Service Fees

We reviewed billing and collection processes to verify that election service fees were properly calculated, invoiced, collected, and recorded for the 26 jurisdictions participating in the November 2017 elections. No exceptions were noted. However, fee schedules have not been updated since calendar year (CY) 2010, and a reliable system is not in place to determine the full cost of providing elections services. Additionally, many jurisdictional service agreements contained outdated fee schedules that conflicted with the fee schedule approved by the BOS in (CY) 2010.

Conclusion #4A: Adequate controls and written procedures were not in place to ensure that monies received were properly accounted for and safeguarded.	
Recommendation	Office Action Plan
4A-1 The Recorder's Office should strengthen controls for handling cash and checks received. This should include reconciling monies recorded in receipt books to the related transactions recorded in the financial system, and reconciling the transactions in the financial statement to the bank statement. Formal training and written policies and procedures should be enhanced accordingly.	Concur – In Progress The Recorder's Office is currently in the process of completing cash handling written procedures to ensure all aspects of cash and check handling is secure, accountable and documented. The department currently follows the cash handling controls as illustrated on the County website under the Department of Finance, and standard cash handling processes practiced in the industry. Additionally, we complete a reconciliation of deposits on a monthly basis. Once the written procedures are complete, formal training with all front counter staff and others that handle monies will be conducted. Target date for completion: June 30, 2019.
Conclusion #4B: Elections service fees were calculated in accordance with the approved fee schedule and were invoiced and collected appropriately.	
Recommendation	Office Action Plan
None	N/A
Conclusion #4C: Elections service fees have not been reviewed since CY 2010, and there is no process in place to determine the cost of providing elections services.	
Recommendation	Office Action Plan
4C-1 The Recorder's Office should conduct a fee study to determine the full cost of providing elections services, and update the fee schedule as appropriate.	Concur – In Progress The Recorder's Office and Elections Department is in the progress of designing a cost study to determine the actual cost of election services and develop a process to review and update the election services fees schedule. Target date for completion of the study: June 30, 2019. However, it must be stated that implementation of any fees revisions must be approved by the Board

<p>4C-1 (continued)</p>	<p>of Supervisors and would have significant impacts on the budgets of other jurisdictions within the County. Many of the jurisdictions to whom we provide election services, including school districts, do not have the budget margins to fully absorb the full increase right away. Communications and planning with the Board and impacted jurisdictions will be necessary to account for the full cost of providing these services.</p>
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Auditors Carla Harris, Audit Manager, CPA, CIA, CFE
 Patra Carroll, IT Audit Supervisor, MSIM, CISA
 Jenny Chan, Senior Auditor CIA, CGAP
 Stacy Aberilla, Senior Auditor, MPA, CGAP
 Timothy Lockinger, Senior Auditor
 Hilary Munger, MPA, Internal Auditor
 KPMG, LLP

This report is intended primarily for the information and use of the County Board of Supervisors, County leadership, and other County stakeholders. However, this report is a public record and its distribution is not limited.

We have reviewed this information with Recorder's Office management. The action plan was approved by Adrian Fontes, County Recorder, on September 6, 2018.

If you have any questions about this report, please contact Mike McGee, County Auditor, at 602-506-1585.