Minute Summary

The Pima County Election Integrity Commission met in regular session on February 17, 2012, at the Pima County Administration Building, Board of Supervisors Conference Room, 1st Floor, 130 W. Congress, Tucson, Arizona 85701.

Item 1: Roll Call

Present: Charles Geoffrion, Jim March, John Moffatt, Tom Ryan, Barbara Tellman, and Benny White

Absent: Mickey Duniho, Pat Pecoraro, Drew Spencer, and Arnie Urken

Also in attendance: Brad Nelson, Pima County Elections Department

Item 2: Pledge of Allegiance:

Those in attendance stood for the Pledge of Allegiance.

Item 3: Approval of the January 20, 2011 Minute Summary:

Clarification: Page 1, under 2012 Election Update, Benny White clarifies that he is “filing a criminal complaint against one (1) individual in Pima County who is not a Republican.” Catherine will redact the portion which states, “one not even eligible to vote.”

Barbara Tellman motions to approve the minute summary, as modified. Tom Ryan seconds the motion. Motion unanimously carries.

Item 4: Election of EIC Officers

Charles Geoffrion and Tom Ryan would like to continue as EIC Chair and Vice-Chair, respectively, if it’s the pleasure of the Commission.

Benny White makes a motion for Charles Geoffrion to continue as EIC Chairman and Tom Ryan to continue to serve as EIC Vice-Chairman. Barbara Tellman seconds the motion. Motion unanimously carries.

Item 5: Ballot Scanning Pilot Study/Clear Ballot Webinar – Tom Ryan & Larry Moore

Clear Ballot Webinar Presentation – Larry Moore (via teleconference)

Agenda

- Company/Product
- Voting Systems Supported
- Election Pilot Calendar
- EVS Key Features
- Pima County
Company

- Formed to provide election officials with a new class of tools designed to help them lower costs and build trust in the integrity of their elections

Product

- Election Verification System (EVS) is the first to implement a completely independent method to verify quickly and accurately an election cast on paper ballots

Voting Systems Supported (as of February 2012)

- Premier/Diebold – Complete
- ES&S (1) – Complete
- Sequoia – Estimated to be complete by June 2012
- ES&S (2) – Estimated to be complete by July 2012
- Dominion – Estimated to be complete by July 2012
- Hart – Estimated to be complete by August 2012

Clear Ballot Election Pilot Calendar

EVS Demo

EVS Key Features

- Ballot Style Verification
- Automated Reporting
- Election Visualization
- Analysis of Systemic Risk
- Election Performance Indexes

Question/Answer Session

Benny White asks if Clear Ballot considers low confidence ovals as votes or ambiguous. Larry Moore states that they are declaring them a vote, as ambiguity is left to a human judge. Benny explains that when logic and accuracy testing of the GEMS optical scanners is conducted, they are tested below the density of the lowest confidence oval.

Barbara Tellman asks how Clear Ballot sets the criteria for how ballots are remade. Larry Moore explains that Clear Ballot keeps a tab of ballots that have not been classified automatically, indicating that the ballots were skewed and could not be read. Clear Ballot is down to .13% of ballots to be remade and they believe with better preparation work, that number can decrease further.

Benny White asks if people are beginning to discuss how they are going to reflect the application of the system in their election statutes. Larry Moore says yes, and includes a video link to the New York Board of Elections, who discusses that issue: [http://at.pscdn.net/008/00198/nynclient/nysboe/2011/1215](http://at.pscdn.net/008/00198/nynclient/nysboe/2011/1215). New York Board of Election agreed that once the system is tested out (over the next four months), they will modify the statues to allow a 100% machine audit and not require the counties to conduct a hand count.
Benny White asks how Clear Ballot would be integrated statute with a challenge. Clear Ballot would scan the ballots and present the visualization tool to vote the challenged ballots and the challenger, who would have a set period of time to look across all images they want to look at and develop a challenge list of ballots to be adjudicated by a Canvassing Board. The Canvassing Board would combine those images and make the judgment call. Instead of showing the ballots one-at-a-time, this can be done quickly and even over the internet. Clear Ballot believes this can shorten the challenge period to 2-3 days.

Jim March asks where the ballot scanning takes place; Pima County or Clear Ballot offices. Larry Moore explains that the work is done by the election jurisdiction and the system is designed to be operated and recorded by the election jurisdiction.

Jim March comments that Larry Moore has shown web analysis tools to look at individual ballots, and inquires if voters would have access to the same web tools to analyze the ballots. Larry Moore explains that it’s not Clear Ballot’s model, as it’s dependent upon the laws of the jurisdiction and the desires of the election officials.

Larry Moore agrees that if the election officials and law supported the idea of giving voters access to those web tools, they would follow those rules.

Jim March states that at the time scanning is conducted, Clear Ballot has extra tools to analyze the contents of those ballots. He asks if he can obtain an archive of those saved images on one media source before any analysis tool is able to touch it. This implies the removal of analytical tools from the imaging process.

Larry Moore gives an explanation on how the system works:

As the ballots are scanned, it’s instantly digitally hashed, and Clear Ballot does not know what’s on the ballot. Jim March asks if Larry Moore can prove that assumption by removing the analysis software completely from the computer that’s doing the scans and hashes. Larry Moore explains that as they scan the ballot, they are producing real time statistics on the quality of the image, and he believes it is more important to gain high-quality images. If you take out the ability to in-line test, images may be warped and your results will be garbage. This fact argues against removing the analysis software, although it is easy for Clear Ballot to do so.

Jim March asks is Clear Ballot is open source. Clear Ballot is not open source, it is considered disclosed source. If a jurisdiction wants to review the system, they can. If a political party wants to review the system, they can, but Clear Ballot would give all political parties the same consideration. Clear Ballot produces a very clear block diagram of how they transform the inputs to the outputs. In the same methodology that Clear Ballot does to compare their results to the voting system, anyone can show up and take images and a tabulator to check their system. Clear Ballot doesn’t have a philosophical issue with open source, although they might have a business case issue with it.

Brad Nelson wants Larry Moore to clarify what he meant by “tightening up ballot control in some other jurisdictions.” Larry explains that he meant record keeping and the physical transfer of ballots. Clear Ballot will have real time results at the end of the last ballot scanned, so Clear Ballot will know if there are missing ballots.

Larry Moore explains that Clear Ballots gets asked if their system can be used within certification. Clear Ballot’s design point is to be used as diagnostic tool, not a report card at the end of an election. This tool can be run within certification, while the absentee and early ballots are being recorded, to assist with a perfect audit.
Barbara Tellman inquires about Clear Ballot’s business model. Larry Moore explains that the County would operate the system. Clear Ballot believes there is some value to them (Clear Ballot) producing the ballot definition files independently because Clear Ballot can conduct quality control checks on ballot layout. Clear Ballot would like to see sample ballots 25-30 days before an election. County would email an encrypted ballot in PDF and within an hour, Clear Ballot would perform the tests and disclose any errors in the PDFs submitted.

Larry Moore agrees that there are opportunities for cost off-sets, but he has to be clear on what the statutes are and what they could become.

Clear Ballot believes that in time, there will be no need to remake ballots. A set of artifacts will be created from the election and completely allows you to lock down the audit process. Images will be designated as ones that will be used separately, once adjudicated.

John Moffatt explains that the duplication process normally occurs when they open a ballot that comes in the mail and/or one that can’t be read by the scanner, so it has not been tabulated in the GEMS System. If you fix the ballot post-tabulation, John inquires how that vote would get back into the main system. Larry Moore has not thought through how his theory would be done in practice, as everyone does them differently. Larry urges everyone to brainstorm the process.

Charles Geoffrion asks if other states have issues as it relates to live ballots and statute. Larry Moore states yes; but, within the certification period, the supervisor has tremendous latitude about the tools he/she can bring to produce a good result. This has generated discussion on the use of the Clear Ballot tools during the certification period as an inline diagnostic tool.

Clear Ballot is having a conference in Florida for Secretaries of State to view their model. Brad Nelson is interested in attending. Clear Ballot will send out invites to attend, as well.

Larry Moore would like to show the Commission the Clear Ballot product.

Tom Ryan believes the webinar provided a good update and would like the Secretary of State to move this pilot study along. Tom received an email from the Secretary of State’s office, indicating that they would not have time this year to conduct the pilot study due to all of the elections. Tom does not believe that the Secretary of State’s Office needs to be very involved, other than provide their approval to conduct the study. John Moffatt explains that, per statute, the Secretary of State’s Office would eventually be involved in the RFP process, so their involvement would be necessary. John Moffatt will inquire with the Secretary of State’s Office again. Tom Ryan asks the Commission to send another letter to the Secretary of State’s Office and encourage this pilot study.

Jim March states that Clear Ballot is too complex, secretive, and has a lack of transparency. Tom Ryan thinks that there’s an issue with separation. All of the software and analysis tools that are needed to make a good set of images are separate from the set of software tools that are used to analyze those images. Tom Ryan will follow up with Larry Moore to confirm. Jim March explains that if the software doesn’t know that a particular mark is for a particular candidate, then automated image clean up can’t be used to cheat.

_Materials provided: Clear Ballot PowerPoint Presentation for Webinar, dated February 17, 2012_
Item 6: County Anonymous Questionnaire Tool Example – Kelly Butwinski

Kelly Butwinski was tasked with presenting a prototype of a web-based email submission form that would not capture the sender's email address. Kelly presented handouts, webpage, and previewed images to the Commission showing what the web pages would look like. The webpage gives access to a content form, as well. The sender's name could be “optional” and any field can be “required.” Custom fields can also be made. The Comments section is required to have content prior to its submission.

The Poll Worker Survey form was recently updated and gives the poll worker the opportunity to provide feedback to the Elections Department regarding their experiences. The webpage offers another tool to provide feedback, if the Commission desires. If the webpage were to be utilized for poll workers, Kelly would make it an unadvertised link that is distributed to the poll workers for follow up, and keep on the website for a period of time following the election.

Commission members offer recommendations for the webpage. Some members would like the webpage to be more specific. Jim March would like the User to have the ability to use additional fields.

Kelly Butwinski would like the Commission to agree upon what needs to be asked, what's required or not required to be asked, and provide an order in which the questions are asked. Everything can be captured within the form easily.

Pima County IT has worked diligently on updating the Pima County website and has since implemented a tool for the Commission.

This webpage can also be used for the general public to provide their experiences at the polls. Kelly Butwinski recommends Survey Monkey, which can offer services for both the general public and poll workers. Survey Monkey information can be exported (to Excel, for instance), as well, and maintain records over time. Pima County ITD operations has one license for that, and through a service ticket, could put together a survey if that’s the recommendation of the Commission. Today’s prototype may be the better choice for the general public.

Conditional-type choices (questions the user can answer) are not built into the prototype seen today. The Survey Monkey tool gives you conditional choices where an answer can trigger a different question set.

Once the user fills out the information on the webpage, he/she is given a “Thank You” for submitting their feedback. From this form, the user would receive an email from a “group” or “person” with a “No Reply” email address. Replies could go to the Commission members for review, if they choose.

Pima County ITD will be implementing the new website around April 1, 2012. It's a more robust, integrated website that has additional tools for citizen response built in. Once it's up and running, ITD will review some modules to give additional capability for citizen response.

The Commission needs to decide who this webpage will target and on which website they would like to see the link. John Moffatt suggests the webpage feedback go through one point of contact and it get distributed from there.

Tom Ryan and Barbara Tellman recommend the webpage target two (2) audiences: poll workers and the general public. Catherine Hanna will send Kelly the Poll Worker Survey Form to review.
Commission members were referred to the UConn Center for Voting Technology Research handout, provided by Tom Ryan, and highlights the problems with AccuVote memory cards.

Tom Ryan believes Pima County has similar problems and seeks ways to keep these problems from occurring. Brad Nelson explains that according to the handout, once the AccuVote has been sealed and ready for the election, it's delivered to the polling place and left unattended. They presume that the black ballot box, which the scanner sits on, can be opened with a paperclip and attacked. Pima County does not distribute scanners in that manner. Pima County places the scanners in a steel cage and locked with a pad lock with a combination that changes every election. Additionally, each precinct’s scanner boxes have different combination. Over the combination locks, there is a tamper-evidence seal that is numbered and recorded, as well. Jurisdictions who leave their boxes unattended should read this report, but Pima County does not have this environment.

However, within the Elections Procedures Manual, it says to “treat election media (memory cards) the same way you’d protect ballots.”

Tom Ryan states that he is less concerned with the memory card attack issue, but was taken aback by the failure rates of the memory cards. Ten per cent (10%) of the cards that were looked at had a failure issue. Brad Nelson explains that the handout attributed some (not all) failure to entities not changing the batteries that maintain the memory inside the card. Pima County changes the card batteries before every Presidential Election cycle.

Tom Ryan was struck by the number of ways the memory card could fail, i.e. card not programmed properly, which deemed it unusable. Brad Nelson understood that the private vendor, LHS, programmed the memory card, sent them out to the districts, and sent four (4) memory cards with each scanner. The districts were instructed to do their pre-election testing on those four (4) cards, and send one (1) of those cards to the University of Connecticut for testing. Those cards did not all come in at the same status; some cards hadn’t been tested, and some cards had the election closed out inside of them, etc. Brad Nelson is unsure to classify this as a “memory card failure,” as opposed to a “procedural” problem, which was alluded to in the report and needs to be tightened up by the Secretary of State.

There are cards that fail where you simply don’t know why they fail. On the LCD screen at the polling place, there is some type of notification that the card has failed. Once or twice every election, poll workers come in on an election day, unlock the steel cage, prepare the scanner, plug it in and turn it on and everything looks fine. They run ballots through the scanner and eventually, power indicators detect that the AccuVote battery is low. The poll workers didn’t realize that the wall outlet switch was not used, and the battery was drained. If the scanner fails, it can be replaced with the same memory card inserted into the new AccuVote with proper seal application and logging. If the memory card fails, everything is lost, but there are paper ballots to count as a back-up.

John Moffatt questions how the memory cards are analyzed. If a more in-depth analysis is needed, we would need to develop a process whereby we would take any memory card that failed, or questionable, download it and make a forensic profile. Jim March has a problem with bringing back an allegedly dead crop scanner.

*Material provided:* VoTeR Center UConn Center for Voting Technology Research, dated October 19, 2011.
**Item 8:** Secretary of State Election Procedures Manual Process – Brad Nelson

The manual has been cleared by the DOJ. The link to the Secretary of State’s page where Commission members can download the PDF file is [http://www.azsos.gov/election/Electronic_Voting_System/](http://www.azsos.gov/election/Electronic_Voting_System/).

**Item 9:** 2012 Election Update – Brad Nelson

February 28, 2012 will be the Presidential Preference Election (PPE) throughout Arizona, for the Republican and Green party candidates only, and additional information on the election can be found on the Election website at [www.pima.gov/elections](http://www.pima.gov/elections).

A Congressional Vacancy Primary and a Congressional Vacancy General Election for Congressional District 8 is on the horizon. There are five (5) political parties involved: Democrat, Republican, Green, Libertarian, and American’s Elect.

Per the Governor’s proclamation, the Special Primary Election will be April 17, 2012, and the Special General Election will be June 12, 2012. Candidates have until February 27th to file with the Secretary of State’s Office.

Some Commission members have heard that legislation will soon be proposed requiring elections to occur only in the Fall. Brad Nelson states that he’d like to see Primaries in August and Elections in November every calendar year, as the public identifies those months as election months. He cautions that due to the large number of Presidential electoral candidates and many referendums and other issues, the Elections Department may have to create a two-page ballot at some point, which gets confusing.

The Special Elections will be paid for by Pima County, approximately $2M, and will come from the County’s General Fund. The County will be reimbursed for printing and mailing sample ballots.

**Item 10:** Redistricting Progress Report

Redistricting is on hold due to the upcoming CD-8 Election, where the old boundaries will be utilized. Once that election is complete, the new boundaries will take effect.

Arizona Representative Andy Tobin has recently proposed that during the usual May election day, there be a ballot question, state-wide, to disband the Redistricting Commission and have his maps used for the State. If the Legislature had presented that to the Governor for signature, she would have had to sign it by February 14, 2012. Representative Tobin has created another bill to have it on the June CD-8 General Election, since an election is being conducted anyway. To Brad’s understanding, this bill is getting no traction from fellow members of the Legislature.

The jurisdictions that will get the new CD-8 will not send out their new voter registration cards until the upcoming CD-8 Elections are over.

**Reprecincting**

The Board of Supervisors will make the final adjustments to the election precinct lines and Board of Supervisor district lines by February 21st. Those adjustments will adhere to the final IRC lines. Brad Nelson will forward precinct maps to their respective parties and make them available to Catherine Hanna.
**Item 11: Libertarian Party Goal’s Document – Jim March**

Jim March explains that he is not the individual in charge of pending litigation on behalf of the Libertarian Party. There is a limit to what party representatives can say, in public, about the party’s goals, separate from the pending litigation. No further discussion on this topic is needed and it can be taken off the agenda.

**Item 12: Call to the Audience**

No audience members have comments for the Commission.

**Item 13: Next Meeting Date and Time**

The Commission will meet again on Friday, March 23, 2012, at 9:00 am, Pima County Administration Building, Board of Supervisors Conference Room, 1st Floor, 130 W. Congress, Tucson, Arizona 85701.

**Item 14: Agenda Items-New Business**

Arnie Urken (not present) requested a vendor to attend the March EIC meeting to discuss systems standards, and Brad Nelson has one lined-up. He will be in contact with Arnie.

Commission members are concerned with the lack of attendance from the Green Party. Catherine Hanna will forward an email to the party Chair to inquire, as the Commission members are eager to see this resolved.

**Item 15: Adjournment**

Barbara Tellman motions to adjourn the meeting; Tom Ryan seconds the motion. Meeting adjourned at 11:26 a.m.