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HOW TO FIX THE
VOTING SYSTEM

Wendy Weiser, Jonathan Brater, Diana Kasdan, Lawrence Norden

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ABOUT THE AUTHORS

Wendy Weiser is Director of the Brennan Center's Democracy Program, where she directs research, litigation, advocacy, and public education efforts to enhance political participation, improve our voting system, reduce the undue influence of money in politics, address government dysfunction, promote fair redistricting, and secure fair and impartial courts. She founded and directed the center's Voting Rights and Elections Project, which has helped protect hundreds of thousands of voters in 2006, 2008, 2010, and 2012.

She has authored a number of nationally-recognized publications and articles on voting rights and election reform; litigated ground-breaking lawsuits; testified before both houses of Congress and state legislatures; and provided policy and legislative drafting assistance to federal and state legislators and administrators across the country. She has appeared on CNN, Fox News, MSNBC, PBS, ABC News, and NPR; her commentary has been published in *The New York Times*, *USA Today*, *U.S. News & World Report*, *Roll Call*, *The Hill*, and elsewhere; and she is frequently quoted by *The New York Times*, the *Washington Post*, the *National Journal*, *Politico*, and other news outlets across the country. She received her J.D. from Yale Law School and her B.A. from Yale College.

Jonathan Brater serves as counsel for the Brennan Center's Democracy Program. His work focuses on voting rights and elections. In this capacity, Mr. Brater has worked on litigation to block enforcement of restrictive state voting laws, prevent unlawful purges, and ensure fair districts. Mr. Brater graduated *cum laude* from Michigan Law School in 2011.

Lawrence Norden is Deputy Director of the Brennan Center's Democracy Program. He has authored several nationally recognized reports and articles related to voting rights and voting technology, including *How to Fix Long Lines* (February 2013), *Better Design, Better Elections* (July 2012), and *Voting Law Changes in 2012* (October 2011). His work has been featured in media outlets across the country, including *The New York Times*, *The Wall Street Journal*, Fox News, CNN, MSNBC, and NPR. He has testified before Congress and several state legislatures on numerous occasions. He received his J.D. from New York University School of Law.

Diana Kasdan is the author of *Early Voting: What Works and State Restrictions on Voter Registration Drives*, and a co-author of *Voting Law Changes: Election Update* and *Curbing Filibuster Abuse*. As senior counsel for the Brennan Center's Democracy Program, Ms. Kasdan's work focused on litigation and advocacy to enhance political participation, prevent voter disenfranchisement, and ensure election integrity. She received her J.D. from New York University School of Law.

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INTRODUCTION

In the 2012 election, too many voters across the country waited in hours-long lines to cast a ballot. The problem was so acute that as he gave his victory speech, President Barack Obama took time to address the scores of voters *still* waiting in line to vote: “We have to fix that.”

The problems were not limited to a single state or region. Newspapers ran photos of “incredibly long lines” in Maryland, Minnesota, and the Carolinas. Long lines were also reported in Colorado, Indiana, Rhode Island, Wisconsin, and Texas. In Florida and Virginia, voters were still casting ballots at midnight, well after the presidential race had been called. Election observers gave disturbing accounts of would-be voters walking away because of long lines in Ohio and Pennsylvania. In storm-ravaged New Jersey and New York, voters stood in lines that did not move for several hours.

The long lines of 2012 were visible evidence of longstanding flaws in our current system of election administration. Although the delays we saw 2012 were nothing new — there were similar lines in other recent presidential elections — they rightly served as a wakeup call to policymakers. The time has come to take a hard look at the business of running elections.

In March, President Obama responded by forming the Presidential Commission on Election Administration. The Commission’s charge is to “promote the efficient administration of elections and ensure that all eligible voters have the opportunity to cast their ballots without undue delay,” “improve the experience of voters,” and remove “obstacles in casting their ballots.”

The Brennan Center submitted comprehensive testimony to the Commission outlining best practices to improve election administration and the voting experience — and to ensure, once and for all, that American elections are no longer marred by long lines. The following paper, which has been adapted from that testimony, outlines policies that should be adopted by all jurisdictions. Although initially presented to the Commission, these recommendations will assist all election officials and citizens seeking to improve their election systems. Everyone agrees that the long lines of 2012 were a disgrace. This is a plan for how we can “fix that.”

What follows are practical, evidence- and research-based best practices regarding four areas of reform — each of which will improve election administration and the voting experience:

1. Modernizing voter registration;
2. Expanding early voting;
3. Improving management of polling place resources; and
4. Improving the simplicity and usability of ballots and voting machines, and publishing data on machine performance.

I. MODERNIZING VOTER REGISTRATION

Harnessing technology to improve voter registration will make the voter rolls more efficient and accurate. All states should use electronic systems to modernize, simplify, and enhance the security of voter registration and voter rolls. By managing voter rolls with updated technologies and tools, states will also better ensure that all eligible voters have the opportunity to cast their ballots without undue delay and eliminate many of the obstacles voters face when attempting to cast ballots.

The need for reform is great. Voter registration is the single biggest election administration problem in the United States. A 2012 Pew study found that 24 million registrations nationwide are invalid or have serious errors, such as an incorrect address.¹ A system in which 1 in 8 records has serious errors raises the prospect of fraud and manipulation. Further, more than 50 million Americans, or 1 in 4 eligible citizens, are not registered to vote.² This leads to problems on Election Day. Political scientist Stephen Ansolabehere examined election data and determined that in 2008, up to 3 million eligible citizens could not vote because of problems related to registration.³ Recent data suggest this problem has not abated. In the 2012 election, 2.8 percent of in-person voters experienced registration problems, up from 2 percent in 2008.⁴

Voter registration is the single biggest election administration problem in the United States.

The paper-based voter registration system used in many jurisdictions is the principal source of the problem. It relies on forms with illegible and incomplete information, which election officials must then transcribe. This leads to further errors stemming from misreading forms or making typos. Registrations are difficult to update, meaning voter registration addresses do not match actual addresses. This outdated system is wasteful and inefficient, and relies on 19th-century technology that is out of step with the kind of electronic transactions citizens have increasingly come to expect in all other aspects of modern government, business, and life. This creates needless barriers to voting, opportunities for fraud, and delay and confusion at polling places — which in turn leads to long lines on Election Day.⁵

Registration errors contribute to long lines in two significant ways. First, poll workers waste time searching poll books for names that have been improperly left off the rolls or misspelled, or when they attempt to determine whether a voter is registered elsewhere. Second, voters with registration problems often must cast provisional ballots, which take extra time and force poll workers to divert their efforts from assisting other voters.

The Brennan Center has studied voter roll management and documented efforts to improve voter registration for a decade. Our reports have examined voter list maintenance,⁶ domestic and international models for voter roll management,⁷ registration in a mobile society,⁸ participation of military and overseas voters,⁹ and state-specific studies.¹⁰ In 2010, the Brennan Center conducted the first comprehensive study of modernized registration, entitled *Voter Registration in a Digital Age*. The report examined state innovations in registration based on an extensive national study with detailed interviews of at least 29 state and local election officials in 15 states.¹¹ Currently, we are expanding and updating our report based on interviews conducted with officials in almost 30 states, and will be publishing our findings in the coming months.

Based on our research, we recommend states upgrade their registration systems in four specific ways:¹²

- **Use Electronic Registration:** When eligible citizens interact with state agencies, they should have the opportunity to register seamlessly, and the agencies should electronically transfer the information collected from consenting applicants to election officials — without relying on paper forms.
- **Make Registration Portable:** Once an eligible citizen is on a state’s voter rolls, she should remain registered and her registration should automatically move with her as long as she continues to reside in that state.
- **Provide Online Registration:** Allow eligible citizens to register to vote, and view, correct, and update registration information online.
- **Ensure a Safety Net:** Eligible citizens should be able to update and correct their registrations up to and on Election Day.

Each of these elements for modernizing registration has proven benefits. States that use modernized registration systems have more accurate, reliable, and better managed rolls. This means less potential for fraud and fewer problems on Election Day.¹³ Electronic transfer and updates of voter data at government agencies also increase registration through those agencies, assisting compliance with federal law and helping get more voters on the rolls. Finally, modernizing registration typically substantially reduces registration costs, freeing up resources for other election needs.

Each of these reforms improves voter roll management in unique ways and would help on its own, but implementing all four together will maximize the accuracy, reliability, and manageability of voter rolls. For example, electronic and online registration, along with portability, help keep the voter rolls current at the front end, while Election Day safety nets correct for any records not updated through one of the other three mechanisms.

Not surprisingly, these reforms are popular and enjoy bipartisan support. The majority of states — at least 43 — have already implemented at least one element in recent years. The momentum continued in the 2012-2013 legislative session. At least 25 states introduced bills to modernize registration in whole or in part.¹⁴ Several bills passed, including a wide ranging modernization bill in Colorado, a bill in Maryland to expand same-day registration during early voting, electronic registration in New Mexico, and online registration in Illinois, Virginia, and West Virginia.

Legislators, governors, and election administrators of both parties have led the way in designing and implementing these systems. Bills were signed by both Democratic (Colorado, Maryland, Illinois, West Virginia) and Republican (New Mexico, Virginia) governors, and earlier bipartisan efforts led reforms in Arizona, California, Colorado, Connecticut, Florida, Georgia, Indiana, Kansas, Louisiana, Maryland, Michigan, New Mexico, New Hampshire, New York, Ohio, South Dakota, Texas, Utah, and Virginia.

States that use modernized registration systems have more accurate, reliable, and better managed rolls. This means less potential for fraud and fewer problems on Election Day.

A. States Should Implement Electronic Voter Registration at Government Agencies

States should electronically collect and transfer voter registration information from citizens applying for services at state agencies to election officials. Since the passage of the National Voter Registration Act (NVRA), states have provided voter registration opportunities at departments of motor vehicles, public service and disability agencies, and other designated agencies. In many cases, agencies continue to rely on ink-and-paper voter registration forms, limiting both the effectiveness of, and compliance with, federal law. But there is no reason for the registration process to generate new paperwork when an individual has already provided information to obtain, for example, a driver's license or veteran's benefits. Instead, upon consent, the agency can electronically transfer the already-collected information — much of which is the same as that needed to complete a voter registration application, along with the information specific to the registration process — to election officials.

States with electronic registration consistently find it creates more secure and accurate rolls. Electronic systems reduce problems stemming from paper forms, such as incomplete and illegible information and data entry errors.¹⁵ In 2009, Maricopa County, Arizona, examined registration forms containing incomplete, inaccurate, or illegible information and found that although only 15.5 percent of registrations were done on paper, these accounted for more than half the flawed forms. This means electronic records were five times less likely to contain errors.¹⁶

Maricopa County found it costs only 33 cents to collect and process an electronic registration, as opposed to 83 cents per paper form.

Electronic registration also increases registration rates at the agencies implementing it and improves NVRA compliance. Virtually every state that has adopted electronic registration at DMVs experienced a sharp jump in voter registrations (including updates) at those agencies. For example, in South Dakota, electronic registration led to a seven-fold increase in DMV registrations between 2003 and 2008. When Kansas and Washington began electronically transferring voter information in 2008, DMV registrations nearly doubled.¹⁷

Finally, electronic registration is more efficient, saving money and freeing up resources for other election administration needs. Maricopa County found it costs only 33 cents to collect and process an electronic registration, as opposed to 83 cents per paper form.¹⁸ And other states have reported low one-time startup costs that are quickly offset by the savings — Delaware saved \$200,000 with electronic registration, and Washington's Secretary of State's office saved \$126,000 in the first year alone, with additional savings to counties.¹⁹

For all these reasons, electronic registration at voter registration agencies is increasingly popular. At least 23 states have some form of electronic transmission of voter information²⁰ at DMVs, and in some states at other voter registration agencies as well. Full implementation of electronic registration at every appropriate state agency can build upon this progress.

There are various methods for implementing electronic registration. Below, we recommend best practices and highlight successful approaches that some states are already using.

1. Incorporate Electronic Registration at as Many Appropriate Agencies as Possible

States should build upon the progress made at DMVs by expanding electronic registration to as many state agencies as possible. This will maximize the effectiveness of agency-assisted registration by expanding it beyond the DMV population. There is movement toward expanding electronic registration at other agencies, including in Kentucky, where social service agencies use a partially electronic system, our research found.²¹ And both California and Oregon recently considered legislation to implement electronic registration at all NVRA agencies.²²

Appropriate agencies for electronic registration include all agencies legally required to provide voter registration services, those that serve the largest number of eligible citizens, those that serve populations not captured on other agencies' lists, those with computerized records, and those that already capture most of the information required for voter registration.

2. Minimize the Use of Ink-and-Paper Forms

States should design their electronic registration systems to minimize the use of ink-and-paper or mail forms during the course of electronic registration. The optimal approach is a fully electronic transfer model. This would involve agency employees transferring an applicant's information in an electronic format that election officials can review and directly upload into the voter registration database.²³ Less optimal is a "partially" electronic system, in which information is sent electronically, but the agency must still print and mail the registration form or other information to election officials. Electronic transfer is better because it requires less paper and eliminates another level of data entry — two outcomes that reduce costs and errors.²⁴

At least 17 of the 23 states with some level of electronic registration at DMVs have a fully electronic transfer process.²⁵ These states demonstrate the myriad options agencies can use to electronically transfer voter information to election officials. Arizona includes a voter registration questionnaire on its paper DMV form. If an applicant is eligible and consents to register, the DMV transfers the information in electronic format to a secure site. The statewide voter registration system then retrieves the information and distributes it to county election officials for verification. Maricopa County reports this has led to cost savings and increased reliability,²⁶ and other states have successfully emulated Arizona's model. Pennsylvania integrates the registration application with an electronic DMV application form.²⁷ DMV users enter information at self-service computer terminals, using an electronic application that includes questions about voter registration. Pennsylvania's model also helps reduce data entry errors and protects individuals from having to share potentially sensitive information, such as party affiliation, with agency employees.²⁸

Electronic transfer does not require a unified statewide voter registration system. Washington, which does not have a single unified system, uses a "bottom-up" mechanism that links independent county databases, allowing the state to directly transfer voter registration information to county officials for review.²⁹

3. Use Mechanisms for Signature Collection

States should use efficient mechanisms to collect a registrant's signature during or after the course of the electronic registration process. There are multiple methods and points in time for capturing an applicant's signature before her vote is cast. Thus, the inability to capture a hard signature at the time of electronic registration should not render the process incomplete. Whether election officials capture a signature from pre-existing records, at the time of electronic registration, or at some other point before voting, that step should not interfere with a registrant's ability to cast a ballot that counts. States have had success with a variety of approaches.

The majority of states with electronic registration transfer a digital copy of each individual's wet signature from the individual's DMV record.³⁰ This is an efficient approach for registrants already in the DMV system. Other registration agencies, such as social services and veterans' agencies, could implement a similar system by collecting electronic signatures during transactions. Some states, such as Delaware and New York,³¹ use a pad and stylus to capture an electronic signature. Jurisdictions can also consider other methods of electronic signature capture, such as touch-screens at government offices, tablets, and smart phones.

If an electronic signature cannot be collected, states should still allow the registrant to vote a regular ballot if the registrant provides an ink-and-paper signature at some point after registration but prior to voting. Other options include sending the registrant a postage-paid return form to collect the signature, or having voters sign at the polls before being permitted to vote. For any of these options to be effective, the state should add the voter to the rolls whether she provides a signature during registration or at the polls.

4. Design Systems that Ensure Agencies Offer the Opportunity to Register

States should design their electronic registration systems in a manner that ensures all appropriate agencies offer applicants the option to register. An ideal system of electronic registration requires the applicant to provide a "yes" or "no" answer to the registration option before the transaction is complete.³² Investigations show that local offices sometimes do not offer registration services at all transactions, that staff are unaware of the obligation to offer the opportunity to register, or that agencies have no mechanism to ensure staff offer voter registration.³³ Proper safeguards at the transaction level will guarantee agencies comply with the NVRA, give all eligible individuals the opportunity to register, and increase agency registration rates.

One model of accomplishing this is by using a "hard stop" — the DMV transaction cannot proceed until the employee (or form) asks the customer whether she wishes to register, and the customer answers yes or no. Rhode Island, Arkansas, Florida, Washington, and several other states use this approach.³⁴ A hard stop ensures the agency asks the question and the customer makes the choice of whether to register before the transaction is completed.

B. States Should Make Registration Portable

The second key improvement to voter roll management is making registration portable. This means that as long as an already-registered voter resides within the state, she remains registered and her registration moves with her — there is no need to fill out a new registration form at a new address. To accomplish portable registration, states should capture address changes before and up through Election Day. The methods for accomplishing this include automatic address and name changes through electronic registration at government agencies, online address and name updates, and mechanisms to enable voters to update their addresses and names and vote on Election Day.³⁵

Making registration portable will substantially reduce one of the major sources of inaccuracy in the rolls: incorrect addresses. According to Pew’s 2012 study, of the 24 million registrations that are significantly inaccurate, half contain an incorrect address.³⁶ Better mechanisms for keeping registration addresses up to date are critical in our mobile society, in which 11 to 17 percent of Americans move in a year.³⁷ Better managing changes in registration addresses would alleviate a potential threat to election integrity.

Studies also suggest that making registration portable would address one of the major reasons eligible citizens are unable to participate in elections. In 2002, Professor Thomas Patterson found that 1 in 3 unregistered eligible individuals is a formerly registered voter who has moved.³⁸ Professor Michael McDonald published a 2008 study looking at the potential effect of portable registration on movers and found it could increase turnout by up to 2 million.³⁹

Below, we highlight best practices and successful methods states use to achieve or move toward portable registration.

1. Achieve Full Portability Through an Election Day Mechanism

Given our highly mobile society in which citizens frequently move for jobs, school, family obligations, and changed economic circumstances, states can only fully achieve portable registration if they allow voters to update their addresses through Election Day. The ideal Election Day address update mechanism would allow registered voters to cast a regular ballot if they moved within the state, even if they moved to a different county. This would keep rolls current and reduce the possibility of an eligible vote not being counted. Delaware and Oregon offer great models.⁴⁰ In Delaware,⁴¹ voters may update their address on Election Day and vote a regular ballot. In Oregon, where elections are conducted by mail, voters can request ballots at their new address any time through Election Day, including by picking up a ballot at an election office on Election Day.⁴² Other states offer an Election Day address update mechanism at the polls and have movers vote by provisional ballot.

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2. Move Toward Portability with Streamlined Address Updates Prior to Election Day

States should also use electronic and online registration systems to facilitate more frequent address updates. Making address updates easier will decrease the number of voters whose registration addresses do not match their current addresses when they show up to vote.

Every state is currently required by the federal Motor Voter law to automatically update the address of any registered voter who updates her address with a motor vehicle agency and does not indicate that the change of address is not also for voter registration purposes.⁴³ While most states do have a process for motor vehicle address changes also to serve as voter registration address changes, the paper-based processes fail to capture many voters who move. The address update process works especially well in states that use electronic registration at DMVs and seamlessly integrate voter registration into their DMV services.

In addition to ensuring that the process for sharing address updates from the DMV is automatic and electronic, states should expand this practice to all agencies that offer voter registration services. There is no reason why a registered voter should have to update her address with multiple government agencies when it can be accomplished in one transaction, so long as the individual is given the opportunity to indicate that an address change should not apply for voter registration purposes.

C. States Should Provide Online Voter Registration

All states should offer online voter registration. Online voter registration consists of a secure,⁴⁴ web-based portal that eligible citizens may use to register to vote. This provides many of the same benefits as electronic registration at agency offices. There is less risk of inaccurate or incomplete information, because voters enter registration information directly into the online system and digital records are more secure and accurate than paper records.⁴⁵ In addition, online voter registration can further increase access and expand the electorate, particularly among young voters.⁴⁶ Online voter registration is relatively inexpensive to implement. States that have introduced online registration have recouped costs in as little as one election. Oregon spent \$200,000, the same amount it previously spent on printing paper registration forms in a single election cycle.⁴⁷

Online voter registration can further increase access and expand the electorate, particularly among young voters.

For all these reasons, online registration is already highly popular and expanding rapidly. When the Brennan Center released *Voter Registration in a Digital Age* in 2010, only six states had online registration, and five more were developing systems. Today, 19 states have or will soon have online registration.⁴⁸

Below, we discuss best practices related to online registration.

1. Make Online Registration Available to All Eligible Citizens

States should make online voter registration available to as broad a population as possible to increase the number of people who use the system and maximize its benefits to the state. Most states with online voter registration have linked the system to DMV information, which limits its availability to the DMV population.⁴⁹ As with electronic registration, making online voter registration available to all eligible citizens, even if they lack driver's licenses or state IDs, would improve the voter experience and allow jurisdictions to realize greater benefits.⁵⁰

California, Louisiana, Utah, and Virginia have partially addressed this issue by creating a hybrid online-paper registration process for citizens who do not have a DMV ID number.⁵¹ These residents may complete a voter registration application online, using a Social Security number or other identifying information, and then print, sign, and mail the completed form to their local registrar. Similarly, Delaware allows individuals to register online using either a DMV ID or Social Security number and then mail in the signed paper form as the final step. The voter's information is added to the registration database even before the signature is received. Delaware provides an additional voter-friendly feature: Voters who do not complete the mail portion of the registration application or whose mailed-in signatures are lost can still cast a regular ballot on Election Day by going to the polling place, showing identification, and providing a signature at the polls.

While these hybrid systems have the advantage of allowing individuals without DMV records to at least partially register online, it would be best if eligible individuals could complete their registrations entirely online.⁵² One way of achieving this is to design online registration systems that can interact with other agency websites aside from DMVs. Voters for whom electronic signatures could not be transferred could provide signatures on Election Day, or states can consider accepting electronic affirmations without signatures.

2. Do Not Require Exact Matches to Permit Registration

States should not require an exact match between the information a registrant provides and existing information in motor vehicle or other databases in order to allow an individual to register to vote online. Our research has shown that almost 20 percent of records in voter registration databases do not match records in motor vehicle databases because of typos by government officials.⁵³ Therefore, requiring an exact match with DMV information will prevent large numbers of eligible citizens from getting on the voter rolls.

States that do require a match with DMV records should ensure their systems rely on more successful data matching procedures. Nearly every state's online voter registration system currently in use matches to the DMV record in real-time,⁵⁴ and some states have helped registrants by providing clear instructions after a failed initial match. Providing an immediate warning and, when possible, explanation of the basis for a failed match, allows the registrant to attempt to complete the electronic process with corrected or additional information. For example, in Utah, where the online registrant's home address is a matching field, the system reminds the applicant that she must enter the address as it appears on her driver's

license or state ID. In Washington State, where voters must list their name on their voter registration exactly the same as it is listed on their driver's license, the system "auto-corrects" a nearly matching name (e.g., from "Bill Smith" to "William Smith") as long as other fields (DMV ID number, date of birth, and the issue date of the DMV ID) match.⁵⁵ These features increase the likelihood that a correct match will be found.

States should also explore systems with the flexibility to accept, search, and match nicknames and last names with hyphens, spaces, or symbol-characters. This will prevent matching problems from prefixes, suffixes, nicknames, and incorrect or alternate spellings. According to recent interviews, many states are moving away from using the applicant's name as a matching field to avoid this problem, instead using other fields such as DMV ID number, date of birth, the issue date of the DMV ID, or all or part of the applicant's Social Security number to locate the matching DMV record.

3. Allow Viewing and Updating Registration Records Online

Online systems should allow voters to review, update, and correct voter registration information using the same secure site with which they can submit an application.⁵⁶ This is one more way — beyond the initial online registration — that states can make voter rolls as accurate and up to date as possible.

Indeed, all states with online registration currently provide an online method for their residents to submit certain updates to their voter registration. Ideally, voters should have the option to use the system to update *all* of the basic information in their registration record. This includes their political party affiliation (if collected), their address, and a name change, if applicable. With the exception of California, currently all states that have online voter registration and request party affiliation allow this to be updated online.⁵⁷

Online systems should allow voters to review, update, and correct voter registration information using the same secure site with which they can submit an application.

D. States Should Ensure a Safety Net

Finally, states should provide a fail-safe correction process that allows voters to correct errors in their registration or their omission from the rolls, up to and including on Election Day. If states modernize their registration systems in the other ways recommended here, the number of voters utilizing the safety net should be minimal. Nevertheless, it is an important safeguard to prevent problems on Election Day. With a sensible fail-safe in place, eligible individuals with errors in their registration will be able to vote without undue delay and without resorting to problematic, time-wasting provisional ballots.

An ideal safety net allows voters the maximum number of opportunities to correct errors in their registration or their omission from the rolls. The most common method allows voters to correct their omission from the rolls or update their registration information on the same day they vote, whether it is prior to or on Election Day. This gives voters and election officials the best chance of keeping the rolls accurate.

Eleven states allow this on Election Day: California, Colorado, Connecticut, Idaho, Iowa, Maine, Minnesota, Montana, New Hampshire, Wisconsin, and Wyoming, along with the District of

Columbia.⁵⁸ Other states employ a limited form of fail-safe correction through same-day registration prior to Election Day.⁵⁹ In Maryland and Ohio, voters may register or make updates to registration and vote during the early voting period, but not on Election Day.

Other Modernizing Tools: Electronic Poll Books

Electronic poll books, which states have used to streamline check-in at the polling location and the updating of voter history, also have important benefits for maintaining up-to-date registration rolls. Jurisdictions in at least 27 states use some form of electronic poll books (E-poll books). Many states deploy them on a wide scale, including for making corrections and updates to voter registration records at the polls.

Maryland and Georgia deploy E-poll books statewide,⁶⁰ and Colorado will use them statewide by 2014.⁶¹ The majority of jurisdictions in Florida, Michigan, South Carolina, and Utah also use E-poll books.⁶² In Kansas and North Carolina, 25 to 40 percent of jurisdictions have used them in previous elections.⁶³

In order to maximize functionality and security, we recommend that E-poll books have the following features. First, they should have the capacity to interact with the statewide voter registration database in real time. E-poll books in Colorado have this function. Although not a necessary feature, this provides list maintenance and election security benefits. Voters can update their registration information with the state in real time or as soon as the poll books and database can be linked up. Although it is not necessary for Election Day registration, states allowing voters to register or make updates at the time of voting may also be able to use E-poll books to determine whether a voter is registered at another address or to verify that the individual has not already voted. Second, each polling place should have a digital copy of the database available to poll workers on a hard drive — polling places should not be reliant solely on an online connection for access. Finally, polling places using E-poll books should also have paper backup copies of the qualified voter file on hand in the event of a loss of power or other problems.

With a sensible fail-safe in place, eligible individuals with errors in their registration will be able to vote without undue delay and without resorting to problematic, time-wasting provisional ballots.

II. EXPANDING EARLY IN PERSON VOTING

Well-designed early in person voting (EIPV) systems improve election administration overall and reduce problems and stress on Election Day. Every jurisdiction should provide EIPV using the best practices described below.

A system of EIPV with certain characteristics can improve election administration performance nationwide. Thirty-two states plus the District of Columbia already use some form of EIPV.⁶⁴ But these systems vary dramatically from state to state — ranging from just a few days or only a single early voting location per county in some states, to multiple weeks of early voting and numerous voting sites per county in other states. These different practices lead to vastly different results. Some states see more than half their electorate turning out early, while others see less than one-quarter. As more states consider adopting or expanding EIPV — this past session at least 20 states saw such proposals⁶⁵ — the time is ripe for recommending minimum standards that can help all states implement successful EIPV programs.

Toward that end, the Brennan Center has conducted a first-of-its kind assessment of EIPV by researching all state early voting laws, reviewing scholarly research and turnout data on early in person voting, and conducting interviews with more than 20 state and local election officials experienced in administering early voting. We focused on those states whose early voting practices most resemble those on Election Day. This included states with early voting systems in which any eligible voter can arrive at a designated voting location, cast a regular ballot, and have her vote counted in the same fashion as an Election Day ballot.⁶⁶

In conducting our research we focused most closely on the EIPV policies and practices in nine states with the highest rates of EIPV in 2008 and 2012: Arkansas, Florida, Georgia, Nevada, New Mexico, North Carolina, Tennessee, Texas, and Utah.⁶⁷ We found that EIPV dramatically improves election administration and arrived at seven policy recommendations for successfully implementing EIPV in every jurisdiction. These findings and recommendations are based on a combination of the following factors: similar legal requirements and practices in states with the highest rates of EIPV, points of consensus among election officials interviewed on what contributes to successful EIPV,⁶⁸ and related evidence drawn from existing early voting research and data.

We released the results of this research in an October 2013 report, *Early Voting: What Works*. Here we provide an overview of our key findings and policy recommendations for how EIPV can improve election administration and enhance the voting experience.

A. The Benefits of EIPV for Election Administration and Voters

Most research on EIPV focuses on the question of whether it will increase overall turnout, but little offers insight on other potential benefits of EIPV. We focused our research on that latter question and found EIPV can improve election administration in five key ways: 1) reducing stress on the voting system

on Election Day; 2) alleviating long lines on Election Day; 3) improving poll worker performance; 4) allowing early identification and correction of registration errors and voting system glitches; and 5) providing greater access to voting and increased voter satisfaction.

First, EIPV alleviates many of the challenges and burdens a single Election Day poses for both full-time election administrators and part-time election workers. According to election officials we interviewed, whether they were able to serve one-quarter or more than one-half of their anticipated total voter turnout during the EIPV period, that distribution of substantial numbers of voters over multiple days reduced overall Election Day stress.

EIPV also helps shorten lines and reduce evening (post-commute) rushes come Election Day. Overwhelmingly, the election officials we interviewed identified this as one of EIPV's top benefits. This was true even in counties that reported longer lines during early voting than on Election Day.⁶⁹ Not only are shorter lines and more evenly distributed voter traffic easier for administrators and staff to manage, they are also less frustrating for voters.⁷⁰ When voters can choose to vote on a day and time that does not conflict with work, family care, or other obligations, waiting in line is an option not an obstacle.

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Improving poll worker and staff performance is another distinct advantage of EIPV. An extended voting period allows election workers to gain valuable experience, which in turn makes them more efficient at handling the higher volume on Election Day. For example, some jurisdictions found that early voting created the opportunity to develop an "A team" of highly experienced election staff to manage early voting sites. Many others confirmed that even part-time election volunteers become increasingly confident and capable over the course of EIPV.

Additionally, EIPV helps administrators and staff discover and correct problems before Election Day. This provides tremendous benefits in terms of correcting registration errors that might otherwise lead to provisional ballots and catching glitches in electronic systems or voting machines before the increased pressure of Election Day.

Finally, providing greater accessibility and flexibility for voters is itself a key benefit. Election officials agreed that EIPV enhanced election performance by better serving voters who would otherwise face obstacles on Election Day because of work schedules, commutes, unexpected military deployment, or bad weather. Increased convenience and voter satisfaction in turn leads to smoother interactions at voting sites. Indeed, EIPV's convenience is unquestionably popular with voters. Turnout data confirms that citizens are increasingly choosing EIPV instead of voting on Election Day. Between the 2004 and 2008 presidential elections, EIPV grew by one-third, to 13 percent of all votes cast nationally.⁷¹ In some regions, the growth of EIPV has been even more dramatic. In Nevada, North Carolina, Tennessee, and Texas, a majority of voters used EIPV in 2008 and 2012.⁷²

Notably, among the growing population using early voting, the face of the electorate is becoming more diverse. Until relatively recently, studies identified the typical early voter as older white

conservatives.⁷³ But more recent scholarship shows that in some parts of the country communities of color disproportionately prefer early voting. For example, by 2012, 41 percent of blacks in the South, compared to nearly 35 percent of whites, voted early.⁷⁴ Indeed, black voters are among the fastest growing users of EIPV.⁷⁵ Between 2004 and 2008, in the South where EIPV rates are typically higher than the rest of the nation, the rate of blacks voting early tripled.⁷⁶

One area that deserves further study is the potential resource efficiencies and cost-savings that EIPV might ultimately achieve. In our research, election officials were split on the question of whether providing EIPV increased or reduced overall election costs. Potential ways in which EIPV can create efficiencies, according to some officials, is by reducing the number of voting machines or polling places used on Election Day, and increasing the ratio of voters served per staff at each voting location. Notably, even officials that did not identify cost-savings expressed strong support and encouragement for EIPV given its non-monetary benefits.

B. Policy Recommendations for Early In Person Voting

1. States Should Begin EIPV a Full Two Weeks Before Election Day

Based on the nearly uniform policies of states with the highest EIPV turnout in 2008 and 2012, and the experience of election officials in those states, we recommend two full weeks of EIPV. In 2012, the states with the highest rates of EIPV, with the exception of Florida, all began their early voting period between two and three weeks in advance of Election Day for all general elections.⁷⁷ And, as of 2013, this is the most common period among all states offering EIPV.⁷⁸ By contrast, states offering significantly more or less time to cast a ballot during the EIPV period have not seen significantly greater use of early in person voting.⁷⁹

In addition, election officials interviewed consistently confirmed that a period of at least two weeks was the minimum effective duration for generating the benefits described above. On the other hand, they did not think more voters would use EIPV if it was offered for longer, and did not anticipate that administrative benefits would increase.

2. States Should Provide EIPV on Weekends, Including the Last Weekend Before Election Day

Weekend voting can help maintain a more manageable and even distribution of voters over each day of EIPV. It also has the potential to increase overall usage of EIPV by drawing voters who are less likely to vote during weekdays due to work schedules, or might otherwise wait until Election Day but for the convenience of weekend voting. Indeed, in some jurisdictions, weekends are peak voting days, and the last weekend before Election Day often sees the biggest day of EIPV turnout. For example, in Mecklenburg, North Carolina, in 2012, the first weekend of early voting saw nearly 17,000 voters, about 11,000 of them on Saturday. For the final Saturday of early voting, the daily turnout was almost 21,000 voters — the single highest day of turnout in 17 days of early voting.⁸⁰ A similar pattern occurred in 2008.⁸¹ And in Florida in 2012, the last Saturday before Election Day was the highest EIPV turnout day across 9 of the state's 10 most populous counties.⁸²

Not surprisingly, in states with the highest EIPV turnout, weekends are consistently part of the EIPV period. Eight of the nine have statutory mandates for at least one weekend day,⁸³ and in three of those states the final Saturday before Election Day is the last mandated day of EIPV.⁸⁴ Notably, in practice, election officials chose to offer weekend voting hours in all of the jurisdictions we interviewed, even when not mandated by state law.

Weekend voting can help maintain a more manageable and even distribution of voters over each day of early voting.

3. States Should Set a Consistent Number of Minimum Daily Hours for Each Day of EIPV and Provide for Extended, Non-Business Hours

Election officials can reduce lines during EIPV, enhance access for many voters, and even increase EIPV turnout by maximizing daily hours and including a regular set of non-business hours. Eight of the nine states with the highest EIPV turnout set minimum daily early voting hours by law, and explicitly authorize local jurisdictions to offer additional hours beyond those minimums.⁸⁵ According to election officials, offering more beyond those minimums is often necessary to adequately manage voter flow during EIPV. For this reason, in Montgomery County, Tennessee — population 172,000 — for example, early voting typically occurs from 8:00 a.m. to 6:00 p.m., well beyond the daily three-hour minimum set by law.⁸⁶ This schedule also provides an hour on either end of the typical 9-to-5 workday. Indeed, across the board, election officials we interviewed chose to offer some range of evening hours to make EIPV accessible to those more likely to vote outside work hours or on their commute home. Recent research likewise confirms that offering extended hours during EIPV has the potential to enhance early voting turnout.⁸⁷

4. Counties Should Be Able to Use Both Public and Private Facilities for EIPV Locations

Because early voting locations generally operate as “vote centers” — serving all registered voters in a county — and must remain open several days, election officials need the flexibility to choose facilities that can meet unique logistical, security, and capacity needs. Election officials can best address these needs when able to use a mix of public and private facilities.

In nearly all the states with the highest use of EIPV, the laws are flexible enough that election officials can use a broad range of private and public facilities.⁸⁸ By contrast, Florida was a notable exception and it suffered as a consequence. Florida law imposed fairly strict limits in both 2008 and 2012.⁸⁹ Only a clerk’s office, a pre-existing permanent branch of the clerk’s office, a city hall, or a permanent public library were acceptable early voting sites.⁹⁰ After 2008, county election officials protested that this roster was too restrictive to meet demand.⁹¹ In 2011, rather than expanding the types of permissible locations, the legislature compounded the problem by reducing early voting days. Within six months of Florida’s widely criticized 2012 election performance, the legislature adopted a package of reforms, including an expansion of suitable EIPV locations, allowing early voting in fairgrounds, civic centers, stadium and convention centers, and other locations.⁹²

Additionally, according to election officials, and academic research,⁹³ many voters are more likely to turn out at privately-owned locations they already visit as part of their regular schedule, such as malls

and shopping centers. And these private locations may also offer better space to accommodate large numbers of voters and voting machines than local public facilities. Indeed, even when states mandate a preference for government buildings — as in North Carolina and Utah — we found election officials commonly supplemented them with private locations.

5. Counties Should Distribute Early Voting Sites Fairly and Equitably

No less than for Election Day, fair and equitable siting policies are critical to the successful administration of EIPV. An extensive body of academic literature addresses the ways in which siting policies can impact, even increase, turnout.⁹⁴ Yet very few states with EIPV set standards for the distribution of early voting facilities.⁹⁵ Not surprisingly, those states with high rates of EIPV are much more likely to have either set rules about the number of early voting locations, how they are to be distributed within each county, or both. Georgia, New Mexico, and Texas all mandate a minimum number of early voting locations based on county population.⁹⁶ New Mexico additionally requires equitable distribution of voting sites based on population density and travel time.⁹⁷ While Florida and North Carolina impose no population-based minimum number of EIPV locations, they do have provisions requiring equitable distribution of discretionary satellite locations. And Utah applies a similar standard to the distribution of early voting locations in its most populous county, Salt Lake, which represents nearly 40 percent of Utah's entire population.⁹⁸

Moreover, we found that election officials implement self-initiated policies to achieve equitable distribution of early voting locations and to enhance access among different communities. These shared many similar criteria — including projected turnout based on past elections, equitable geographic coverage across the county, proximity to parking and public transport, and targeting high-turnout areas for extra voting locations or hours. These same criteria were used in selection of EIPV sites.

6. Counties Should Update Poll Books Daily

Providing a choice of multiple days and locations for voting before Election Day poses challenges for maintaining up-to-date and accurate poll books — both during the EIPV period and for Election Day. Electronic poll books can address two primary concerns related to implementation of early voting. First, if a countywide poll book is updated daily by each early voting site, administrators will not face the crunch of manually updating and preparing accurate precinct-specific poll books just days, or less, before Election Day. Second, officials will have a real-time mechanism to verify that a voter has not already cast an early ballot at another early voting location, or absentee.

Although most state laws establishing EIPV do not address this issue at all, or in any detail, election officials we interviewed uniformly do so in practice. Using electronic poll books or computers at each voting site networked to the countywide or state registration database, election staff access and update voter rolls at least daily if not more. Election officials overwhelmingly agreed that in addition to easing the management of poll books, particularly in preparation for Election Day, electronic systems also enhanced the integrity of the election system.

7. States and Counties Should Educate Voters About EIPV

States should ensure counties provide sufficient advance notice and widespread public education about EIPV opportunities. This will achieve two goals. First, it gives voters the specific information they need to determine when and where they can most readily vote in light of their work and family schedules and travel options. Second, according to election officials we interviewed, and academic research, counties can increase usage of EIPV by widely publicizing its availability through a range of public communications.

States with the highest rates of EIPV require localities to publicly announce their EIPV schedules in advance of the early voting period.⁹⁹ However, for the most part, public education efforts depend on the initiative of local election administrators. For example, Bernalillo County, New Mexico, truly adapted to the needs of its constituents by offering a mobile app that allowed early voters to find the nearest polling place, learn approximate wait times, and get directions.¹⁰⁰ Likewise, in Travis County, Texas, election officials widely promoted EIPV through public media in order to encourage early turnout. Research confirms these initiatives can succeed in encouraging EIPV use in other jurisdictions as well. A study of EIPV in Georgia in 2008 found the greater the variety of forms of public education, the greater the effect on early voting turnout. A combination of newspaper, radio and television announcements, public billboards and signs, notices in utility bills, and presentations to neighborhood groups all contributed to turnout in the counties studied.¹⁰¹

Ensuring equal and fair access to early voting opportunities nationwide will help eliminate many of the obstacles that impede access to voting and improve the voting experience of millions.

III. IMPROVED MANAGEMENT OF POLLING PLACE RESOURCES

States should also look at the management of polling places themselves as a method of improving the voter experience on Election Day. Research suggests that long lines reduce voter turnout and satisfaction.¹⁰² A recent analysis by Professor Theodore Allen estimated that in Florida alone, more than 200,000 voters may have been discouraged from participating because of long lines.¹⁰³ To date, insufficient attention has been paid to the effect of resource allocation, especially machine and poll worker distribution, on long lines.

Although long lines were found across the country in 2012 (as in prior elections), data shows that some precincts are more likely than others to experience long lines, and that disparities persist from year to year. Charles Stewart and Stephen Ansolabehere examined the results of a survey of more than 10,000 voters in 2012 and found that four states — Florida, Maryland, South Carolina, and Virginia (in addition to D.C.) — had particularly long wait times.¹⁰⁴ The data also showed that states with longer lines in 2008 were also more likely to have longer lines in 2012, suggesting that some of the long lines of 2012 could have been predicted.¹⁰⁵ Moreover, the data showed that voters in urban areas experienced longer lines.¹⁰⁶

More than 200,000 voters may have been discouraged from participating because of long lines.

Professor Stewart also found that significant racial disparities in wait times: African-American voters waited an average of 24 minutes, Hispanics waited 19 minutes, and whites waited only 12.¹⁰⁷ There were also racial disparities on an aggregate basis. All residents of zip codes with a higher percentage of non-white voters waited longer on average than residents of zip codes with a lower non-white population.¹⁰⁸

The Brennan Center is currently completing its own analysis of precinct-level data in three states with long lines in 2012 — Florida, Maryland, and South Carolina. Our analysis has identified positive correlations between the ratio of voters to polling place resources (specifically machines and poll workers) and the length of voting lines. We have also found that polling locations serving larger percentages of minority voters are more likely to have longer lines.

Based on these findings, we recommend that states take a number of steps to improve the management of polling place resources. First, states should ensure election officials provide adequate resources at polling locations, and have the information and resources needed to make good decisions about resource allocation. This should include examination of the number of machines and pollworkers, relative to the number of voters, that will be needed to avoid long lines at each polling place, as well as consideration of demographic factors. Second, as a baseline protection to voters, states should identify a maximum acceptable wait time — no more than one hour — and allocate resources to ensure that this is not exceeded. Third, states should adopt and enforce standards for resource allocation to make sure minimum standards are actually adhered to.

IV. IMPROVING THE SIMPLICITY AND USABILITY OF ELECTION FORMS AND PUBLISHING DATA ON MACHINE PERFORMANCE

There is probably nothing more basic to voter confidence than the assurance that votes will be counted as they were intended to be cast. Unfortunately, in every federal election, poorly worded instructions, confusing design, and machine failures cause hundreds of thousands of lost and miscounted votes.¹⁰⁹ The move to vote by mail across the country in recent years is, in many cases, making the situation even worse.¹¹⁰ Based on the recommendations of experts in the field and our own research — spanning nearly a decade — the Brennan Center recommends three key strategies¹¹¹ for minimizing these kinds of errors.

In every federal election, poorly worded instructions, confusing design, and machine failures cause hundreds of thousands of lost and miscounted votes.

First, all election officials should adopt well-established ballot design guidelines and usability testing prior to elections. Ballot and election form design is an area where small improvements that often cost close to nothing can make a big difference in election administration.

Second, all election districts should conduct post-election audits and publish regular reports of Election Day data. This will allow state and local election officials to quickly identify and share — across all districts — issues that arise with certain voting machines. A centralized resource collecting this information will enable election officials to correct known problems that may occur well in advance of Election Day.

Third, state and local election officials need to address problems reported. If, for example, certain election districts report high overvote rates, state and local boards of elections should have the authority to address any problems.

But even if all election officials were to faithfully follow the above steps, many would still be stymied by legal barriers to using the best technology and design. Century old laws — that no longer make sense given modern election practices — are still on the books and continue to get in the way of better solutions. States should eliminate or update these laws wherever necessary.

Below we describe in greater detail how state and local election officials can best implement these strategies to improve ballot design, prevent machine failures, and improve the integrity of our elections.

A. Improving Ballot and Election Form Designs and Instructions

Poor ballot and election form (i.e., absentee ballot and provisional ballot envelopes) design increases the risk of lost or misrecorded votes among all voters, but the risk is even greater for particular groups, including low-income citizens and the elderly. As Brennan Center research documents, several hundred thousand votes were not counted in the 2008 and 2010 elections because of voter mistakes undoubtedly related to poor design, in some cases affecting the outcome of critical contests.¹¹²

The rise of absentee and provisional voting since 2000 has only increased the risk of lost votes. Absentee ballots were 12.1 percent of ballots cast in 2004, 14.6 percent of ballots cast in 2006, 17.7 percent of ballots cast in 2008, and 19.1 percent of ballots cast in 2010.¹¹³ Charles Stewart estimates that the absentee ballot rate rose to 21 percent in 2012.¹¹⁴ By the Brennan Center's estimates, between 150,000 and 200,000 absentee ballots were not counted in the 2008 presidential election. In the 2010 midterm election, when fewer voters participated, between 100,000 and 150,000 absentee ballots were not counted. These votes were lost due to technical errors, such as the voter's failure to sign her name in the correct place or seal the envelope before mailing it to election officials.¹¹⁵ Likewise, we estimated that more than 50,000 provisional ballots were not counted between the 2008 and 2010 elections because of technical errors on the provisional ballot envelope.¹¹⁶

The good news is that when election officials review lost vote data from previous elections, conduct usability tests, and work with experts to find design problems and solutions, the improvements are dramatic. For example, in Minnesota's 2008 election, 3,906 absentee ballots were not counted because the voter did not sign the envelope. This was the same year the Senate election between Al Franken and Norm Coleman was decided by a mere 312 votes. After the contest was settled, the Minnesota Secretary of State's office worked with usability experts to redesign the absentee ballot envelope. The new envelope had a large "X" identifying the signature block, and the number of absentee ballots that went uncounted because the voter failed to sign the envelope dropped from 1.2 percent in 2008 to 0.6 percent in 2010.¹¹⁷ The Minnesota Secretary of State's office continued to test and improve the envelope after the 2010 election. Draft Election Assistance Commission (EAC) data suggests this has further reduced the percentage of absentee ballots rejected for technical reasons.¹¹⁸ This is a prime example of a minimal and low-cost change that led to far fewer votes being tossed out.¹¹⁹

Other jurisdictions can easily replicate Minnesota's success. Below we describe how, and why, every state and locality should adopt field-tested guidelines for ballot design and voter instructions, regularly implement usability testing, and start to revise outdated laws that impede good ballot design.

1. State and Local Election Officials Should Follow Expert Guidelines for Ballot Design

Across-the-board, better ballot design will reduce the potential for lost votes (and delay at the polling place) due to cluttered and confusing ballots. Our report *Better Design, Better Elections* collects these in an easy-to-reference checklist of expert-recommended designs to allow for greater simplicity and usability for voters. Specifically: 1) ballot instructions should be brief, simple, and clear; 2) ballots should not split contests across pages or columns; 3) ballot design should be consistent, including all design elements such as font, text size, headings, and location of response option; and 4) ballots should be easy to understand visually and designed to avoid visual clutter.¹²⁰

Additionally, ballots should give voters maximum flexibility. Electronic ballots should allow voters to select or change language at any point during the voting process. Voters should also be able to change the text size and contrast levels for better visualization, or get audio support at any time during the voting process. And counties should use voting machines that work with usability-tested ballots. As counties and states purchase new voting machines, they should demand machines that will use ballots that satisfy the EAC-recommended standards for effective ballot design.¹²¹

2. Election Administrators Should Conduct Usability Testing and Voter Information Campaigns in Advance of Elections

Even when following the best design recommendations and practices, there is no substitute for usability testing. This uncovers potential problems — often unique to a particular ballot or election — and allows election officials time to either redesign and rewrite the ballot or address them in poll worker training or voter education.

For example, voters in Sarasota, Florida, were going to use paper ballots for the first time in September 2008. Election officials in Duval and Sarasota counties invited usability experts, including the Brennan Center, to conduct a day of testing. The majority of participants had just voted in the primary, but several did not turn their ballot over to vote for contests on the other side until given a prompt to do so. They never noticed the instruction “VOTE BOTH SIDES OF BALLOT” in a grey bar at the bottom of the ballot. With this finding in hand, election officials made one simple adjustment — changing the instruction language to “TURN BALLOT OVER” and placing it directly beneath the last contest on the page. This modest improvement had a substantial impact. In the 2008 presidential election, the residual vote rate for the first question on the second page of the ballot was 10.2 percent in Duval and Sarasota counties, compared to 14.7 percent in the 15 other counties where contests also continued onto a second page. This meant 28,000 fewer lost votes on ballot initiatives in Duval and Sarasota counties.¹²²

Usability testing also leads to solutions through voter education. When Port Chester, New York, first adopted cumulative voting, Usability in Civic Life conducted usability testing for both the ballot and voter education brochures prior to the election. UCL found that while voters understood the general concept of cumulative voting, they had a hard time remembering they could cast more than one vote for a candidate. To address this, election officials sent voters an education flyer called “How to Vote with Cumulative Voting,” which included illustrations of what different choices would look like. An exit poll from the election showed that many voters had seen the materials before the election, and more than 95 percent of voters reported using all of the available votes. Election returns also showed a lower residual vote rate in Port Chester than in other communities that used cumulative voting.¹²³

As seen in both Florida and Port Chester, usability testing can lead to simple redesign and better education of voters to help them complete their ballots correctly. Another form of voter education that can help in any election is making sure voters do not encounter a new ballot style for the first time on Election Day. Providing voters with sample ballots in advance of Election Day allows voters to familiarize themselves, at their leisure, with the ballot choices and the correct method of completing the ballot. This may also help reduce the residual vote rate.¹²⁴

3. States Should Revise Laws that Impede Good Ballot Design

States should revise, as necessary, laws and regulations that discourage good ballot design. In many cases lawyers and others lacking familiarity with usability principles draft laws mandating designs that make it unnecessarily difficult for voters to cast ballots for candidates of their choice. For example, New York’s

law and regulations require a full-face paper ballot that lists every candidate and contest on a single screen or piece of paper. It further requires *both* that all candidates of a single party be placed in a single row or column (labeled with the party name), *and* that each candidate's name be surrounded by a party name and party emblem. These rules lead to ballots that present too much information to voters at the same time and cause voter confusion.¹²⁵ New York's law also mandates design elements that violate basic usability principles, such as printing candidate names with all capital letters and inclusion of legal and election jargon in ballot instructions.¹²⁶ As a result, under current law, it is impossible for election officials in New York to implement the very design principles that experts recommend to improve ballot usability. States should remove these and similar barriers to effective ballot design.

B. Resolving Recurring Problems with Machine Failures

In 2008, the Brennan Center co-authored with Common Cause and Verified Voting a report entitled *Is America Ready to Vote?* We found that election officials in many jurisdictions fail to systematically prepare for voting machine problems on Election Day — despite widespread documentation of problems in past elections.¹²⁷ In our 2010 report, *Voting Machine Failures: A Database Solution*, we recommended concrete practical solutions — drawing in part from oversight models used in other industries.¹²⁸ As highlighted below, and detailed more extensively in those reports, this is another area where simple, low-cost solutions can alleviate recurring election problems.

In our research we consistently found that officials typically depend on vendors for information about voting machine failures, but vendors do not always provide good information — even when they are aware of problems. Additionally, turnover in election administrators leads to the loss of institutional knowledge about past problems. For example, when election officials in Ohio began reconciling vote totals from the state primary in 2008, one Ohio county noticed that several votes had been dropped from the machine's memory cards. State officials then conducted an investigation that determined at least 1,000 votes were not counted in 9 of Ohio's 44 counties that used “Premier” touch screen or optical scan voting systems. Despite the machine vendor's awareness of this same problem occurring four years earlier in DuPage County, Illinois, neither the company nor other election officials appeared to understand the cause of the problem when it was first publicized. In fact, the vendor originally argued that antivirus software and human error were probably the cause. After several tests confirmed the problem was actually a software glitch that caused lost votes when administrators simultaneously uploaded multiple cards from individual machines, the vendor notified more than 30 states of the problem, telling them “to be on the lookout for missing votes.”¹²⁹

Humboldt County, California, provides another example of known problems persisting across multiple election cycles. A programming error in Premier Elections Solutions' Global Election Management System (GEMS) software resulted in the first batch (or “deck zero”) of optical scanned ballots being deleted when they were scanned into GEMS. This meant all the votes in this batch could be lost. According to a report by the California Secretary of State, Premier (formerly Diebold) was aware of this problem no later than October 2004.¹³⁰ However, the vendor did not notify the EAC, the National Association of State Election Directors, or the California Secretary of State. Instead, the company sent an email to election officials in the 11 California counties using the software. This email, which the California secretary of state described as “vague,” advised a workaround procedure in which officials

would create and immediately delete an empty “deck zero” before scanning any real ballots. However, the email did not explain why this procedure was necessary or that failing to do so could result in lost votes.¹³¹ Four years later, the exact same problem occurred in Humboldt County. The registrar of voters for 2008, Carolyn Crirnich, apparently never received the 2004 email or any other documentation of the problem. The former county elections officer who had received the email left the office in 2007 and had not passed on the information. Only after the county implemented a post-election “Transparency Project” using an independent scanner did it determine that the “deck zero” problem caused approximately 200 lost votes in 2008.¹³²

Without a more systematic approach to information gathering and sharing, these types of problems will continue. Jurisdictions should implement the following four strategies to catch voting machine defects early, notify officials in affected jurisdictions immediately, and take action to correct all such systems wherever they are used in the United States.

1. All Jurisdictions Should Review Lost Vote Data After Each Election

Election officials should look at the residual vote rate in order to diagnose problems. To effectively do this on a wide scale, each election district in each state should report undervotes and overvotes. Florida provides a good model for this. The state adopted practices that require all counties to report election totals, including undervotes and overvotes, by precinct. Further, after every federal election the state issues a report that assesses voting system performance and administrative procedures. This type of reporting system allows election officials to quickly identify and correct the kinds of issues that lead to overvotes for future elections.¹³³

2. The EAC Should Systematize Voting Machine Information Sharing

Election officials could easily identify problems before they occur with the aid of a publicly available, searchable online database of reported voting system flaws. A national clearinghouse of election information and guidance — such as the EAC — is ideally situated for providing this resource to all states and local jurisdictions.¹³⁴ Such a database could include official information from election officials and vendors as well as unofficial information from voters about system failures and vulnerabilities. This sort of national clearinghouse will dramatically improve the security and reliability of voting machines by enabling election officials to make informed choices and anticipate any problems far enough in advance of an election to correct for them.

3. Election Officials Should Improve Individual Vendor Contracts

Certain provisions in voting machine contracts make it more difficult for election officials to get information about system problems in other parts of the country. Further, it is difficult to hold vendors responsible for problems if something goes wrong. Counties and states should include key contract terms that will increase voting system reliability and hold vendors more accountable in order to minimize risk.

4. States Should Require Disclosure From Vendors Who Contract Within the State

States can also choose to enact stronger regulation of contracts with vendors, requiring them to disclose information about any machine problems to election officials. For example, California passed legislation requiring vendors selling voting systems within the state to notify the secretary of state and all local election officials using those systems of any “defect, fault, or failure,” within 30 days of discovering it.¹³⁵ Every state should pursue options to more directly regulate government contracts with vendors.

ENDNOTES

- ¹ PEW CENTER ON THE STATES, *INACCURATE, COSTLY AND INEFFICIENT: EVIDENCE THAT AMERICA'S VOTER REGISTRATION SYSTEM NEEDS AN UPGRADE 2* (2012), *available at* http://www.pewtrusts.org/uploadedFiles/wwwpewtrustsorg/Reports/Election_reform/Pew_Upgrading_Voter_Registration.pdf.
- ² *Id.*
- ³ Stephen Ansolabehere, Testimony Before the U.S. Senate Rules Committee (Mar. 11, 2009), *available at* http://vote.caltech.edu/sites/default/files/03112009Ansolabehere_Testimony.pdf; *see also* R. MICHAEL ALVAREZ, STEPHEN ANSOLABEHERE, ADAM BERINSKY, GABRIEL LENZ, CHARLES STEWART III, AND THAD HALL, 2008 SURVEY OF THE PERFORMANCE OF AMERICAN ELECTIONS, EXECUTIVE SUMMARY 5 (2009), *available at* <http://www.vote.caltech.edu/sites/default/files/2008%20Survey%20of%20the%20Performance%20of%20American%20Elections%20Executive%20Summary.pdf>.
- ⁴ CHARLES STEWART III, 2012 SURVEY OF THE PERFORMANCE OF AMERICAN ELECTIONS, FINAL REPORT 70 (2013), *available at* <http://dvn.iq.harvard.edu/dvn/dv/measuringelections>.
- ⁵ LAWRENCE NORDEN, BRENNAN CENTER FOR JUSTICE, *HOW TO FIX LONG LINES 2* (2013), *available at* http://www.brennancenter.org/sites/default/files/publications/How_to_Fix_Long_Lines.pdf.
- ⁶ JUSTIN LEVITT, WENDY R. WEISER, & ANA MUNOZ, BRENNAN CENTER FOR JUSTICE, *MAKING THE LIST: DATABASE MATCHING AND VERIFICATION PROCESSES FOR VOTER REGISTRATION* (2006), *available at* <http://www.brennancenter.org/publication/making-list-database-matching-and-verification-processes-voter-registration>; MYRNA PÉREZ, BRENNAN CENTER FOR JUSTICE, *VOTER PURGES* (2008), *available at* <http://www.brennancenter.org/publication/voter-purges>.
- ⁷ MARGARET CHEN & JENNIFER S. ROSENBERG, BRENNAN CENTER FOR JUSTICE, *EXPANDING DEMOCRACY: VOTER REGISTRATION AROUND THE WORLD* (2009), *available at* <http://www.brennancenter.org/publication/expanding-democracy-voter-registration-around-world>; LAURA SEAGO, BRENNAN CENTER FOR JUSTICE, *GOVERNMENT LISTS: HOW READY ARE THEY FOR AUTOMATIC REGISTRATION?* (2009), *available at* <http://www.brennancenter.org/publication/government-lists-how-ready-are-they-automatic-registration>; LAURA SEAGO, BRENNAN CENTER FOR JUSTICE, *AUTOMATIC REGISTRATION IN THE UNITED STATES: THE SELECTIVE SERVICE EXAMPLE* (2009), *available at* <http://www.brennancenter.org/publication/automatic-registration-united-states-selective-service-example>.
- ⁸ MYRNA PÉREZ, BRENNAN CENTER FOR JUSTICE, *WHEN VOTERS MOVE* (2009), *available at* <http://www.brennancenter.org/publication/when-voters-move>; ADAM SKAGGS & JONATHAN BLITZER, BRENNAN CENTER FOR JUSTICE, *PERMANENT VOTER REGISTRATION* (2009), *available at* <http://www.brennancenter.org/publication/permanent-voter-registration>.
- ⁹ ADAM SKAGGS, BRENNAN CENTER FOR JUSTICE, *REGISTERING MILITARY AND OVERSEAS CITIZENS TO VOTE* (2009), *available at* <http://www.brennancenter.org/publication/registering-military-and-overseas-citizens-vote>.
- ¹⁰ WENDY R. WEISER, ADAM SKAGGS & CHRISTOPHER PONOROFF, BRENNAN CENTER FOR JUSTICE, *MODERNIZING OHIO'S SYSTEM FOR REGISTERING VOTERS: AUTOMATIC & ONLINE REGISTRATION* (2009), *available at* <http://www.brennancenter.org/publication/modernizing-ohio%E2%80%99s-system-registering-voters-automatic-online-registration>; WENDY R. WEISER & NHU-Y NGO, BRENNAN CENTER FOR JUSTICE, *MODERNIZING VOTER REGISTRATION: MOMENTUM IN THE STATES* (2010), *available at* <http://www.brennancenter.org/publication/modernizing-voter-registration-momentum-states>.
- ¹¹ CHRISTOPHER PONOROFF, BRENNAN CENTER FOR JUSTICE, *VOTER REGISTRATION IN A DIGITAL AGE 15* (Wendy Weiser ed., 2010), *available at* http://www.brennancenter.org/sites/default/files/legacy/Democracy/Paperless_Registration_FINAL.pdf. Additional appendices with detailed state profiles are available at <http://www.brennancenter.org/publication/voter-registration-digital-age>.
- ¹² *Voter Registration Modernization in the States*, BRENNAN CENTER FOR JUSTICE, <http://www.brennancenter.org/analysis/voter-registration-modernization-states> (last updated May 10, 2013).

- ¹³ For example, North Dakota Secretary of State Craig Nelson has concluded that electronic registration helped reduce the number of provisional ballots cast in his state. PONOROFF, *supra* note 11, at 13.
- ¹⁴ See *Voting Laws Roundup 2013*, BRENNAN CENTER FOR JUSTICE, <http://www.brennancenter.org/analysis/election-2013-voting-laws-roundup> (last updated Aug. 15, 2013) (detailing pending and passed voting reform bills from 2013 state legislative sessions).
- ¹⁵ PONOROFF, *supra* note 11, at 13. In interviews this year, officials in Arkansas, Delaware, Iowa, Rhode Island, Maryland, Mississippi, Kentucky, and South Dakota stated that electronic registration improved accuracy. Telephone Interview with Rob Hammons, Dir. of Elections, Ark. Sec’y of State (May 21, 2013); Telephone Interview with Elaine Manlove, Comm’r of Elections, Del. Office of the State Election Comm’r. (Feb. 20, 2013); Telephone Interview with Sarah Reissetter, Dir. of Elections, Iowa Sec’y of State (May 9, 2013); Telephone Interview with Mike Narducci, Deputy Dir., John Fleming, Chief of Staff & Rob Rock, Elections Div., R.I. Sec’y. of State (Apr. 4, 2013); Telephone Interview with Mary Cramer Wagner, Dir. of Voter Registration Div., Md. State Bd. of Elections & Ross Goldstein, Deputy State Adm’r, Md. Bd. of Elections (Mar. 5, 2013); Telephone Interview with Madalan Lennep, Elections Consultant, Miss. Sec’y of State (Apr. 12, 2013); Telephone Interview with Maryellen Allen, Exec. Dir., Ky. Bd. of Elections (Apr. 12, 2013); Telephone Interview with Brandon Johnson, Senior Elections Coordinator, S.D. Sec’y of State (Apr. 5, 2013).
- ¹⁶ PONOROFF, *supra* note 11, at 13.
- ¹⁷ *Id.* at 15.
- ¹⁸ *Id.* at 12. Electronic registration records also allow for the use of automated processes to assist in verifying the accuracy of voter registration information, which can reduce the cost of processing to as little as 3 cents per registration. These are currently used in Arizona, Florida, Pennsylvania, Rhode Island, and Washington. *Id.* at 5, 12.
- ¹⁹ *Id.* at 12.
- ²⁰ Arizona, Arkansas, California, Delaware, Florida, Georgia, Iowa, Kansas, Kentucky, Maryland, Massachusetts, Michigan, Mississippi, New Jersey, New Mexico, New York, North Carolina, Pennsylvania, Rhode Island, South Carolina, South Dakota, Texas, and Washington. *VRM in the States: Electronic Registration*, BRENNAN CENTER FOR JUSTICE, <http://www.brennancenter.org/analysis/vrm-states-automatic-registration> (last updated Apr. 4, 2013).
- ²¹ Telephone Interview with Maryellen Allen, *supra* note 15.
- ²² California S.B. 361, 2013-2014 Leg., Reg. Sess. (Cal. 2013), *available at* <http://leginfo.legislature.ca.gov/faces/billStatusClient.xhtml>; Oregon H.B. 3521, 2013 Leg., Reg. Sess. (Or. 2013), *available at* <https://olis.leg.state.or.us/liz/2013R1/Measures/Overview/HB3521>.
- ²³ To safeguard privacy, agencies should transfer only the information needed for voter registration, and the process should be limited to a one-way transfer of data from the source agency to election officials. States should avoid two-way linking of multiple state databases within a single superstructure, but rather should utilize a secure, one-way transfer. Ideally, agencies should transfer information in real time or overnight as is done in Arizona, Kansas, Pennsylvania and Washington. PONOROFF, *supra* note 11, at 5.
- ²⁴ *Id.* at 12-14.
- ²⁵ The initiation of the process for obtaining consent to use information for registration purposes varies. Often, the agency employee, at the prompting of a computer program, asks the customer if she would like to register. This is done in at least 5 states: Delaware, Florida, Kansas, Rhode Island, and Washington. *Id.* at 3. In contrast, in Arizona, the agency application contains the voter registration question. *Id.* at 4.
- ²⁶ *Id.* at 4, 12-14.
- ²⁷ *Id.* at 4.

- ²⁸ In Florida, Kansas, and Washington, the customer answers questions orally. *Id.* at 4. In Delaware and Rhode Island, an individual uses a stylus and electronic pad to answer eligibility questions. *Id.*
- ²⁹ *Id.* at 15.
- ³⁰ *Id.* at 4.
- ³¹ *VRM in the States: Delaware*, BRENNAN CENTER FOR JUSTICE, <http://www.brennancenter.org/analysis/vrm-states-delaware> (last updated June 14, 2012).
- ³² In order to register electronically, an individual must meet registration requirements, including age, citizenship, and residency, just as with traditional registration. All states require an individual to affirm that she is eligible and wants to register prior to electronic registration. If a voter declines to register or is ineligible, the DMV transaction proceeds. However, an ideal system of electronic registration will ensure that neither the agency official nor the potential voter will bypass the voter registration portion of the transaction.
- ³³ Lisa J. Danetz, Senior Counsel, Demos, Testimony to the U.S. Comm'n on Civil Rights 5 (Apr. 19, 2013), *available at* <http://www.demos.org/sites/default/files/publications/Final%20USCCR%20Testimony.pdf>.
- ³⁴ PONOROFF, *supra* note 11, at 3; Telephone Interview with Rob Hammons, *supra* note 15; Telephone Interview with Maria Matthews, Dir. of Elections, Fla. Sec'y of State & Maureen Johnson, Dir., Fla. Dep't of Highway Safety and Motor Vehicles (May 20, 2013); Telephone Interview with Lori Augino, Dir. of Elections, Shane Hamlin, Deputy Dir. of Elections, Patty Murphy, IT Specialist, & Nick Pharris, Program Specialist, Wash. Sec'y of State (Mar. 20, 2013). In other states, the transaction continues whether or not the question is asked or answered.
- ³⁵ Currently, twelve states offer portability through Election Day registration: California, Colorado, Connecticut, Idaho, Iowa, Maine, Maryland, Minnesota, Montana, New Hampshire, Wisconsin, and Wyoming. Seven other states offer portability through an Election Day address update procedure: Delaware, Florida, Hawaii, Maryland, Ohio, Oregon, and Utah. The states that offer electronic registration at state agencies discussed in the previous section make address updates more seamless for voters.
- ³⁶ PEW CENTER ON THE STATES, INACCURATE, COSTLY AND INEFFICIENT, *supra* note 1, at 3.
- ³⁷ *Mobility of the Population*, U.S. CENSUS BUREAU, http://www.census.gov/newsroom/releases/archives/mobility_of_the_population/ (last updated Aug. 27, 2013); *see also* Wendy R. Weiser & Vishal Agraharkar, *Book of the States 2013: Modernizing Elections*, BRENNAN CENTER FOR JUSTICE, (July 1, 2013), <http://www.brennancenter.org/analysis/book-states-2013-modernizing-elections#5>.
- ³⁸ THOMAS PATTERSON, *THE VANISHING VOTER: PUBLIC INVOLVEMENT IN AN AGE OF UNCERTAINTY* 178 (2002).
- ³⁹ Michael P. McDonald, *Portable Voter Registration*, 20 *POLITICAL BEHAVIOR* 499 (2008).
- ⁴⁰ In Florida, voters who move within the state vote a provisional ballot, which is counted unless there is evidence of fraud. In Ohio and Utah, voters who update their address must also vote a provisional ballot. This is better than nothing, but provisional ballots may not be counted and create additional unnecessary administrative burdens.
- ⁴¹ *VRM in the States: Delaware*, BRENNAN CENTER FOR JUSTICE, <http://www.brennancenter.org/analysis/vrm-states-delaware> (last updated June 14, 2012).
- ⁴² *VRM in the States: Oregon*, BRENNAN CENTER FOR JUSTICE, <http://www.brennancenter.org/analysis/vrm-states-oregon> (last updated June 11, 2012).
- ⁴³ 42 U.S.C. § 1973gg-3(d).
- ⁴⁴ States employ a variety of security measures to safeguard online voter registration systems and voter information. These tools include websites that will “time out” automatically after a certain period of inactivity, CAPTCHA tests to prevent

hacking or automated attacks on the system, and monitoring suspicious activity, including the volume of failed driver's license numbers. Additional security measures may be needed in certain states. For example, in 2013, both Maryland and Washington added the *issue date* of the applicant's DMV ID in order to enhance security because their driver's license numbers can be predicted with a publicly known algorithm based on the individual's name. See Letter from J. Alex Halderman, Professor, The Univ. of Mich., Dr. David R. Jefferson, Lawrence Livermore Nat'l Lab., and Dr. Barbara Simons, IBM Research (retired) and Former President, Ass'n for Computing Machinery, to Robert L. Walker, Chairman, Md. State Bd. of Elections, et al. (Sept. 25, 2012), available at <http://s3.documentcloud.org/documents/469818/maryland-online-voting-concerns.pdf>.

⁴⁵ PONOROFF, *supra* note 11, at 13.

⁴⁶ When Arizona began online registration the 18-24 year old registration rate jumped from 29 percent in 2002 to 48 percent in 2004 and 53 percent in 2008. *Id.* at 18.

⁴⁷ *Id.* at 11.

⁴⁸ Arizona, California, Colorado, Connecticut, Delaware, Hawaii, Illinois, Indiana, Kansas, Louisiana, Maryland, Nevada, New York, Oregon, South Carolina, Utah, Virginia, Washington, and West Virginia. *VRM in the States: Online Registration*, BRENNAN CENTER FOR JUSTICE, <http://www.brennancenter.org/analysis/vrm-states-online-registration> (last updated July 27, 2013).

⁴⁹ Fourteen states currently offer paperless online voter registration to residents with a DMV ID number. New York is included among these 14 states, as the system will be paperless once the second stage of its implementation process is completed. Telephone Interview with Robert Brehm, Co-Executive Dir. of N.Y. Bd. of Elections & Anna Svizzero, Dir. of Election Operations, N.Y. (Mar. 15, 2013). Some states, such as Arizona and Maryland, do not require UOCAVA voters to have a DMV ID number in order to submit a voter registration application online. Telephone Interview with Mary Fontes, HAVA Business Analyst, Ariz. Sec'y of State (July 23, 2013); E-mail from Ross Goldstein, Deputy Adm'r, Md. State Bd. of Elections, to Holly Maluk, Voting Rights Researcher, Brennan Center for Justice (May 29, 2013 15:42 EST) (on file with author). In Maryland, for example, UOCAVA applicants are permitted to use their Social Security number in lieu of a Maryland driver's license number to register to vote online in a paperless process. E-mail from Ross Goldstein, Deputy Adm'r, Md. State Bd. of Elections, to Holly Maluk, Voting Rights Researcher, Brennan Center for Justice (May 29, 2013 15:42 EST) (on file with author).

⁵⁰ In addition to making online registration available to the non-DMV population, states should to make sure websites may be used with screen readers or are otherwise accessible to the disabled. Websites should also be accessible for pre-population by third-party tools such as Rock the Vote's registration website.

⁵¹ Telephone Interview with Jennie Bretschneider, Ass't Chief Deputy, Cal. Sec'y of State (Mar. 22, 2013); Telephone Interview with Chrissie Weatherford, Info. Tech. Dir., La. Sec'y of State (May 2, 2013); Telephone Interview with Mark Thomas, Dir. of Elections, Utah Office of the Lieutenant Governor (May 3, 2013); Telephone Interview with Donald Palmer, Sec'y, Va. Bd. of Elections & Matt Davis, Info. Servs. Manager, Va. Bd. of Elections (July 31, 2013).

⁵² Maryland allows military and overseas voters to register online with a social security number. E-mail from Ross Goldstein, *supra* note 49.

⁵³ LEVITT, WEISER, & MUNOZ, *supra* note 6, at 4.

⁵⁴ Delaware's online registration system does not involve a real-time match because the system is not linked to DMV records. As of March 2013, Kansas's online registration system also did not include a real-time match with DMV records, although State Election Director Brad Bryant noted that the Secretary of State's office intends to incorporate a real-time match as soon as possible. According to Mr. Bryant, the lack of a real-time match has created an administrative problem for the DMV. Telephone Interview with Brad Bryant, State Election Dir., Kan. Sec'y of State (Mar. 14, 2013).

⁵⁵ Telephone Interview with Lori Augino, et al., *supra* note 34.

⁵⁶ Many states operate public websites with which voters may verify that they are registered and view the polling place

associated with their residential address. All but two states have some form of polling place lookup tool available online, and all but nine have a registration status lookup tool. *Online Lookup Tools for Voters 2012*, PEW CENTER ON THE STATES, <http://www.pewstates.org/research/data-visualizations/online-lookup-tools-for-voters-2012-85899471399> (last updated Apr. 30, 2013). Many states also allow voters to check the status of their absentee ballot online. *Id.* These are useful tools but not a substitute for allowing registration updates online.

- ⁵⁷ A voter can update his political party affiliation using the online registration system in Arizona, Colorado, Kansas, Louisiana, Maryland, Nevada, New York, Oregon, and Utah. Other online registration states (South Carolina, Virginia, and Washington) do not ask voter-applicants to identify a political party affiliation. Another model of failsafe correction is found in Vermont. Voters in that state who are not listed on the poll book are permitted to vote if they swear they are registered in that precinct on a written affidavit. *VRM in the States: Vermont*, BRENNAN CENTER FOR JUSTICE, <http://www.brennancenter.org/analysis/vrm-states-vermont> (last updated June 11, 2012).
- ⁵⁸ All of the states with Election Day Registration, aside from Colorado, Connecticut and New Hampshire, also allow voters to register and vote prior to Election Day.
- ⁵⁹ In Illinois, citizens can register to vote during the “grace period” from the normal close of registration up through the third day before the election. Once registered, these voters may cast a ballot during the grace period, but not on Election Day.
- ⁶⁰ Electronic poll-books have been used statewide in Georgia since 2005 and in Maryland since 2006. Email from Linda Ford, Dir. of Elections, Ga., to Holly Maluk, Voting Rights Researcher, Brennan Center for Justice (May 24, 2013); Telephone Interview with Mary Cramer Wagner et al., *supra* note 15.
- ⁶¹ Telephone Interview with Judd Choate, Dir. of Elections, Colo. Sec’y of State (July 31, 2013).
- ⁶² Telephone Interview with Maria Matthews et al., *supra* note 34; Telephone Interview with Kristi Dougan, Elections Specialist, Mich. Sec’y of State (Apr. 9, 2013); Telephone Interview with Howard Snider, Dir. of Voter Servs., S.C. Election Comm’n. (Apr. 10, 2013); Telephone Interview with Mark Thomas, *supra* note 51.
- ⁶³ Telephone Interview with Brad Bryant, *supra* note 54; Telephone Interview with Veronica DeGraffenreid, Voter Registration Dir. & Marc Burris, Chief Info. Officer, N.C. Bd. of Elections (May 3, 2013).
- ⁶⁴ Alaska, Arizona, Arkansas, California, Colorado, D.C., Florida, Georgia, Hawaii, Idaho, Illinois, Indiana, Iowa, Kansas, Louisiana, Maine, Maryland, Montana, Nebraska, Nevada, New Mexico, North Carolina, North Dakota, Ohio, Oklahoma, South Dakota, Tennessee, Texas, Utah, Vermont, West Virginia, Wisconsin, Wyoming. The two exclusively vote by mail states, Oregon and Washington, are not counted among the states with early in person voting since virtually no voting — including Election Day — takes place in person in those states. See U.S. ELECTION ASSISTANCE COMM’N, 2012 STATUTORY OVERVIEW 29-30 (Feb. 2013), available at http://www.eac.gov/assets/1/Documents/EAC_StatutoryOverviewReport_FINAL-rev.pdf.
- ⁶⁵ *Voting Laws Roundup*, *supra* note 14.
- ⁶⁶ Accordingly, we did not research or analyze how no excuse absentee or vote by mail systems impact election administration or voter experience, and we offer no findings or recommendations on those forms of early voting.
- ⁶⁷ In nine states, over one-quarter of all voters who cast a ballot in the 2008, did so early and in person. U.S. ELECTION ASSISTANCE COMM’N, 2008 ELECTION ADMINISTRATION AND VOTING SURVEY 1, 22-25 (Nov. 2009), available at <http://www.eac.gov/assets/1/Documents/2008%20Election%20Administration%20and%20Voting%20Survey%20EAVS%20Report.pdf> (reporting EIPV percentages as follows: AR (29.6%), FL (31.3%), GA (44.9%), NV (57.9%); NM (40.1%), NC (55.8%), TN (57.9%), TX (60.6%), UT (28.7%)). EIPV usage of 25% or more significantly exceeded the national average in 2008, which was about thirteen percent. *Id.* at 22-23. In 2012, the Election Assistance Commission reported that across 29 states reporting early voting data, the proportion of early and in person voting was 9%. See U.S. ELECTION ASSISTANCE COMM’N, 2012 ELECTION ADMINISTRATION AND VOTING SURVEY, Table 28 Ballots Cast by Means of Voting 23-26 (2013), available at http://www.eac.gov/assets/1/Page/990-050%20EAC%20VoterSurvey_508Compliant.pdf and U.S. ELECTION ASSISTANCE COMM’N, 2012 ELECTION ADMINISTRATION AND VOTING SURVEY, Corrected Table 28 Ballots Cast by Means of Voting (2013), (on file with author). However, the 2012 EIPV rate does not include EIPV reporting

from Georgia and Texas (which it did in 2008) and thus substantially understates the use of EIPV nationwide. Georgia and Texas were among the states with the highest use of EIPV nationally in 2012. In Georgia, as a percentage of all ballots cast for president (3,897,839), 43.8% were cast “advance in person” (1,706,236). *See* BRIAN P. KEMP, GA. SEC’Y OF STATE, 2012 OFFICIAL ELECTION RESULTS, PRESIDENT OF THE UNITED STATES SUMMARY BY VOTE TYPE, <http://results.enr.clarityelections.com/GA/42277/113204/en/vts.html?cid=5000> (last visited Oct. 7, 2013), (reporting official top of ticket statewide results by vote type). In Texas, the Secretary of State does not publish the total of all early in person ballots cast statewide, but does publish the number cast for the 15 counties with the highest number of registered voters. As a percentage of all ballots cast (5,106,453) in those same 15 counties, 62.4% were cast early in person (3,188,396). *See* JOHN STEEN, TEX. SEC’Y OF STATE, 2012 GENERAL ELECTION, PRESIDENT/ VICE-PRESIDENT TOP OF TICKET 2012 CANVASS REPORT, VOTES FOR PRESIDENT, <http://elections.sos.state.tx.us/elchist.exe> (last visited Oct. 7, 2013) (query “2012 General Election” and query “2012 General Election” and “County by County Canvass Report”, then select “President/Vice-President” for “race” to find total top of ticket ballots cast for each county in Texas, including Harris, Dallas, Tarrant, Bexar, Travis, Collin, El Paso, Denton, Fort Bend, Hidalgo, Montgomery, Williamson, Nueces, Galveston, Cameron) *and* JOHN STEEN, TEX. SEC’Y OF STATE, NOVEMBER 6, 2012 EARLY VOTING CUMULATIVE TOTALS, <http://www.sos.state.tx.us/elections/earlyvoting/2012/nov2.shtml> (last visited Oct. 7, 2013) (reporting 3,188,396 “Cumulative In-Person Voters for Harris, Dallas, Tarrant, Bexar, Travis, Collin, El Paso, Denton, Fort Bend, Hidalgo, Montgomery, Williamson, Nueces, Galveston, Cameron). When more complete national data sets are used, it indicates the early in person voting rate remained fairly steady between 2008 and 2012. Charles Stewart and Daron Shaw note that “in contrast [to the 2012 EAC data], based on responses from the Voting Registration Supplement of the Current Population Survey, the distribution of voters [was reported as] 14% early. The discrepancies [between the two surveys]. . . appear primarily due to a handful of states with in-person early voting (notably Texas and Georgia) combining early voting statistics with absentee statistics.” CHARLES STEWART III AND DARON SHAW, LESSONS FROM THE 2012 ELECTION ADMINISTRATION AND VOTING SURVEY 9 (2013), *available at* <https://www.supportthevoter.gov/files/2013/08/Charles-Stewart-EAVS-White-Paper-Stewart-and-Shaw.pdf> (citing data from the 2012 Census Current Population Survey Voting Registration Supplement). Additionally, comprehensive studies drawing on a direct survey of voters nationwide report an even higher steady usage of EIPV — 18% — in 2008 and again in 2012. *See Early Voting in the 2012 General Election*, PEW CHARITABLE TRUSTS (Aug. 6, 2013), www.pewstates.org/research/analysis/early-voting-in-the-2012-general-election-85899495516 (citing 2012 Survey of the Performance of American Elections Data); *see also* R. Michael Alvarez, Ines Levin & J. Andrew Sinclair, *Making Voting Easier: Convenience Voting in the 2008 Election*, 65 POL. RES. Q. 248, 251 (2012) (citing 2008 Survey of the Performance of American Elections Data).

⁶⁸ We interviewed a total of 21 election officials. These officials represented county and state election offices in seven of the nine states with the highest rates of EIPV: Georgia, Nevada, New Mexico, North Carolina, Tennessee, Texas, and Utah. We also interviewed election officials from Colorado and Illinois.

⁶⁹ Nationwide the average wait time is longer during early voting days than on Election Day. *See* Charles Stewart III, *Waiting to Vote in 2012*, at 21 (MIT Political Science Dep’t Research Paper No. 2013-6, Apr. 1 2013), *available at* http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2243630. However, the academic research on what election practices might cause or reduce long voting lines is still “primitive” and inconclusive. *Id.* at 10 (explaining “there is no published analysis of how the allocation of election resources has affected long lines at the polls....[and] the empirical study of waiting in line to vote is still in its infancy.”).

⁷⁰ But careful planning and resource management can and should be used to avoid overly long lines during EIPV, just as on Election Day. Bernalillo County, NM achieved average EIPV wait times of less than 4 minutes in 2012. RAE ATKESON, ALEX ADAMS & LISA BRYANT, ASSESSING ELECTORAL PERFORMANCE IN NEW MEXICO USING AN ECOSYSTEM APPROACH 104-105 (Caltech/MIT Voting Technology Project, 2012), *available at* www.polisci.unm.edu/common/documents/c-sved/papers/BernCoFinalReport.pdf. And other counties reported 15-20 minutes was the longest wait time during early voting. *Id.*

⁷¹ *Compare* U.S. ELECTION ASSISTANCE COMM’N, 2008 ELECTION ADMINISTRATION AND VOTING SURVEY, *supra* note 67, at 22-25 *with* U.S. ELECTION ASSISTANCE COMM’N, A SUMMARY OF 2004 ELECTION DAY SURVEY 6 (Sept. 2005), *available at* <http://www.eac.gov/assets/1/AssetManager/2004%20EAVS%20Executive%20Summary.pdf> (reporting that 8.4% of ballots were cast by early voting in the 2004 election). EIPV turnout is consistently lower in non-presidential election years. *See, e.g.*, U.S. ELECTION ASSISTANCE COMM’N, 2010 ELECTION ADMINISTRATION AND VOTING SURVEY I (Dec. 2011), *available at* http://www.eac.gov/assets/1/Documents/990-281_EAC_EAVS_508_revised.pdf (reporting 8.2% of ballots were cast by early voting in the 2010 midterm election).

- ⁷² See U.S. ELECTION ASSISTANCE COMM'N, 2008 ELECTION ADMINISTRATION AND VOTING SURVEY, *supra* note 67; See also R. Michael Alvarez, Ines Levin & J. Andrew Sinclair, *Making Voting Easier: Convenience Voting in the 2008 Election*, 65 POL. RES. Q. 248, 251 (2012) (noting states where 50% of voters reported voting early in the 2008 election). According to EAC data, and state data, in the 2012 election these states again surpassed 50% for EIPV usage. See U.S. ELECTION ASSISTANCE COMM'N, 2012 ELECTION ADMINISTRATION AND VOTING SURVEY DRAFT DATA, *supra* note 67.
- ⁷³ See, e.g., Paul Gronke, Eva Galanes-Rosenbaum, Peter A. Miller, & Daniel Toffey, *Convenience Voting*, 11 ANN. REV. POL. SCI. 437, 443 (2009), available at http://people.reed.edu/~gronkep/docs/Gronke2008-Convenience_Voting.pdf (“Early research on the demographic profile of individual voters who took advantage of convenience voting painted a portrait of a voter who is ‘conservative, middle-to-upper-class, generally interested in politics, and Republican.’(internal citations omitted)).
- ⁷⁴ Paul Gronke & Charles Stewart, *Early Voting in Florida* 6-7 (MIT Pol. Sci. Dep't, Research Paper No. 2013-12), http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2247144 (citing 2012 Cooperative Congressional Election Study data); see also Alvarez, *supra* note 72, at 251 (noting that while 2008 is commonly described as a “game-changer” in terms of African-American use of EIPV, strong evidence demonstrates this trend developed in prior to 2008).
- ⁷⁵ See Alvarez, *supra* note 72.
- ⁷⁶ Gronke & Stewart, *supra* note 74, at 7 (“African American usage of early in-person voting in the South nearly tripled in the 2008 presidential election when compared to the 2004 presidential election Data from the 2012 CCES show that African Americans continuing [sic] to use early in-person voting in the South at high rates, comparable to the outcomes of the 2008 presidential election.”). This increase is also reflected when comparing midterm elections. For example, in Florida from 2006 to 2010, there was an increase of nearly 75% in African Americans using early in person voting. *Florida v. United States*, 885 F. Supp. 2d 299, 365 (D.D.C. 2012) (quoting Rebuttal Decl. of Prof. Gronke).
- ⁷⁷ ARK. CODE ANN. § 7-5-418(a)(1) (requiring 15 days); (GA. CODE ANN. § 21-2-385(d)(1) (early voting period from the fourth Monday prior to election day to the Friday before election day); NEV. REV. STAT. ANN. § 293.3568(1) (early voting from third Saturday before an election to the final Friday before the election); N.M. STAT. ANN. § 1-6-5.7(A) (early voting from third Saturday before an election to the final Saturday before the election); N.C. GEN. STAT. § 163-227.2(b) (early voting from third Thursday before an election to last Saturday before election); TENN. CODE ANN. § 2-6-102(a)(1) (early voting from 20 days before an election to 5 days before an election); TEX. ELEC. CODE ANN. § 85.001 (early voting from 17th day prior to election to 4th day before an election); UTAH CODE ANN. § 20A-3-601(2) (early voting begins 14 days prior to election and ends Friday before election). Compare FLA. STAT. ANN. § 101.657(1)(d) (2011) with 2013 Fla. Sess. Law Serv. Ch. 2013-57, sec. 13, § 101.657(1)(a). Meanwhile, the recent reduction of early voting in North Carolina means North Carolina will no longer offer a full two weeks of early voting, although it did in both 2008 and 2012. H.B. 589, 2013 Leg. Sess. (N.C. 2013).
- ⁷⁸ As of 2013, seventeen states required that early voting locations open between two and three weeks in advance of Election Day for all general elections, making this the most common period among all states offering some form of EIPV: Alaska, Arkansas, Colorado, Georgia, Hawaii, Idaho, Illinois, Nevada, New Mexico, North Dakota, Tennessee, Texas, Utah, West Virginia, and Wisconsin. These periods apply to general elections, and may be different for other elections, such as primaries or municipal elections.
- ⁷⁹ According to EAC data for each of these states, it appears that most ballots cast early were cast and counted as absentee. For the eleven states with over three weeks of early voting, the 2012 percentage of votes cast early in person and those cast absentee (not counting UOCAVA voters) were reported as follows: Arizona (EIPV 0%, absentee 50.6%), California (EIPV 0.4%, absentee 39.8%), Indiana (EIPV 0%, absentee 19%), Iowa (EIPV 0%, absentee 43.1%), Maine (EIPV 0%, absentee 25.5%), Montana (EIPV 0%, absentee 57.5%), Nebraska (EIPV 0%, absentee 25.4%), Ohio (EIPV 10.7%, absentee 22.4%), South Dakota (EIPV 4.1%, absentee 8.9%), Vermont (EIPV 3.6%, absentee 20.4%), and Wyoming (EIPV 0%, absentee 26.2%). See U.S. ELECTION ASSISTANCE COMM'N, 2012 ELECTION ADMINISTRATION AND VOTING SURVEY, *supra* note 67. In 2008, the percentage of votes cast early in person and those cast absentee were reported as follows: Arizona (EIPV 1.9%, absentee 50.6%), California (EIPV 1.0%, absentee 41.7%), Indiana (EIPV 0%, absentee 23.6%), Iowa (EIPV 0%, absentee 37.8%), Maine (EIPV 0%, absentee 31.0%), Montana (EIPV 0%, absentee 42.2%), Nebraska (EIPV 0%, absentee 21.5%), Ohio (EIPV 6.8%, absentee 22.7%), South Dakota (EIPV 6.5%, absentee 13.2%), Vermont (EIPV 0%, absentee 27.5%), and Wyoming (EIPV 0%, absentee 25.0%). See U.S. ELECTION ASSISTANCE COMM'N, 2008 ELECTION ADMINISTRATION AND VOTING SURVEY, *supra* note 67.

- ⁸⁰ *2012 General Election No Excuse Voting Totals*, CITY OF CHARLOTTE & MECKLENBURG CNTY, <http://charmec.org/mecklenburg/county/BOE/data/Documents/earlyvoting/2012GeneralNoExcuseVoting.pdf> (last visited August 26, 2013).
- ⁸¹ *See 2008 General Election No Excuse Voting*, CITY OF CHARLOTTE & MECKLENBURG CNTY., <http://charmec.org/mecklenburg/county/BOE/data/Documents/earlyvoting/2008GeneralEV.pdf> (last visited July 10, 2013). While North Carolina counties formerly had the discretion to continue early voting until 5:00 p.m. on the final Saturday, as of 2014 all early voting must end at 1:00 p.m. on the Saturday prior to Election Day. H.B. 589, 2013 Leg. Sess. (N.C. 2013).
- ⁸² The ten counties are Miami-Dade, Broward, Palm Beach, Hillsborough, Orange, Pinellas, Duval, Lee, Polk, and Brevard. In Brevard County, the last Saturday was the second highest day for turnout, after the last Friday. Notably, however, unlike the other nine counties, Brevard did not offer the full twelve hours for voting on Saturday. *See Statewide Early Voting Summary Files*, FLA. SEC'Y OF STATE, <http://countyballotreports.elections.myflorida.com/AbsenteeEarlyVotingReports/PublicReports> (last visited Oct. 15, 2013) (reporting daily early voting turnout for each county in Florida); *Early Voting Sites by County, Fla. November 6, 2012*, FLA. SEC'Y OF STATE, http://election.dos.state.fl.us/pdf/Early_Voting_Sites_General_2012.pdf (last visited Oct. 15, 2013) (listing early voting site hours by county for 2012). Additionally, scholarly analysis of daily turnout data in Florida, before and after legislative changes were made to the available weekend voting days, confirms that the last weekend before Election Day is likely to see very heavy, or highest, usage. *See Gronke & Stewart, Early Voting in Florida, supra* note 74, at 22.
- ⁸³ *See* ARK. CODE ANN. § 7-5-418(a)(1)(A) (requiring Saturday hours); FLA. STAT. ANN. § 101.657(1)(d) (requiring Saturday and Sunday voting); GA. CODE ANN. § 21-2-385(d)(1) (requiring weekend hours); NEV. REV. STAT. ANN. § 293.3568 (requiring Saturdays, giving discretion to provide Sunday hours); N.M. STAT. ANN. § 1-6-5.7(A) (requiring Saturday hours); N.C. GEN. STAT. § 163-227.2(b) (requiring Saturday hours); TENN. CODE ANN. § 2-6-103(a)(1) (requiring Saturday hours); TEX. ELEC. CODE ANN. § 85.006(a),(e) (requiring weekend hours for counties with more than 100,000 people, and giving discretion to smaller counties); UTAH CODE ANN. § 20A-3-602(2)(c)(ii)(B) (giving discretion to offer weekend hours). Among all EIPV states in 2008, at least 18 statutorily required weekend voting or explicitly provided discretion to election officials to offer it: Arkansas, D.C., Florida, Georgia, Hawaii, Illinois, Indiana, Kansas, Louisiana, Maryland, Nevada, New Mexico, North Carolina, Oklahoma, Tennessee, Texas, Utah, and West Virginia.
- ⁸⁴ FLA. STAT. ANN. § 101.657(1)(d) (requiring final Saturday, Sunday optional); N.M. STAT. ANN. § 1-6-5.7(A) (ending on final Saturday before Election Day); N.C. GEN. STAT. § 163-227.2(b) (ending on final Saturday before Election Day). Additionally, in Arkansas the final Saturday is required, but early voting resumes on the Monday before Election Day. ARK. CODE ANN. § 7-5-418(a)(1)(A).
- ⁸⁵ *See* ARK. CODE ANN. § 7-5-418(a) (requiring 8:00 AM to 6:00 PM hours on weekdays at “the county clerk’s designated early voting location”); FLA. STAT. ANN. § 101.657(1)(d) (requiring a minimum of 8 hours per day and allowing up to 12 hours per day); GA. CODE ANN. § 21-2-385(d)(1) (“[C]ounties and municipalities may extend the hours for voting beyond regular business hours”); NEV. REV. STAT. ANN. § 293.3568(2),(3) (requiring permanent locations to be open from 8 AM to 6 PM on weekdays and allowing locations be open until 8 PM during the second week of early voting); N.M. STAT. ANN. § 1-6-5.7(C) (providing that early voting locations “shall open no earlier than 7:00 a.m. and shall close no later than 9:00 p.m.” and must be open for at least eight consecutive hours); N.C. GEN. STAT. § 163-227.2(f) (specifying that in addition to operating during regular business hours, officials “may conduct one-stop absentee voting during evenings”); TENN. CODE ANN. § 2-6-103 (requiring a “minimum” of three hours between 8:00 AM and 6:00 PM and requiring certain larger counties to be open from 4:30 PM to 7:00 PM for “at least” three days during the early voting period); TEX. ELEC. CODE ANN. § 85.005(c) (requiring counties with more than 100,000 people to have 12 hours of early voting each weekday during last week of a general election). *See also* UTAH CODE ANN. § 20A-3-602 (giving discretion to election officer to determine the hours for early voting). At least another five states also fall in this category: Colorado, D.C., Louisiana, Maryland, and Oklahoma.
- ⁸⁶ *See State & County Quick Facts*, U.S. Census Bureau (last visited August 29, 2013), <http://quickfacts.census.gov/> (estimating Montgomery County 2012 population of 172,000); *see also Clarksville-Montgomery County voters taking advantage of early voting*, CLARKSVILLE ONLINE (Tenn.) (Oct. 25, 2012), <http://www.clarksvilleonline.com/2012/10/25/clarksville-montgomery-county-voters-taking-advantage-of-early-voting/> (publicizing 8:00 AM to 6:00 PM early voting hours).
- ⁸⁷ At least one recent study of EIPV in Georgia supports the view that providing extended non-business and weekend hours will enhance convenience and increase EIPV turnout. In that study of 117 of Georgia’s 159 counties, it was found that

“[i]ncreasing the hours of operation for early voting sites . . . appears to be the most cost-effective measure for boosting turnout.” M.V. Hood III & Charles S. Bullock III, *An Examination of Efforts to Encourage the Incidence of Early In-Person Voting in Georgia, 2008*, 10 ELECTION L. J. 103, 110 (2011).

⁸⁸ See ARK. CODE ANN. § 7-5-418(b)(1)(A) (“The county board of election commissioners may decide to hold early voting at additional polling sites outside the offices of the county clerk”); FLA. STAT. ANN. § 101.657(1)(a) (allowing discretion to establish certain types of early voting sites in addition to the main branch office of the supervisor of elections); GA. CODE ANN. §§ 21-2-385(d)(1), 21-2-382(a) (giving elections officials discretion to establish locations provided the location is “county courthouse, a courthouse annex, a government service center providing general government services, or another government building generally accessible to the public”); office as satellite advance voting sites.”); NEV. REV. STAT. ANN. §§ 293.3561, 293.3564, 293.3572 (allowing the county clerk to establish permanent and temporary early voting locations); N.M. STAT. ANN. § 1-6-5.7(B) (allowing discretion for counties to establish “alternate voting locations” aside from the clerk’s office and requiring counties with certain populations to have a minimum number of locations); N.C. GEN. STAT. § 163-227.2 (allowing county boards of elections to establish one or more early voting locations); TENN. CODE ANN. § 2-6-103(a)(1) (“The county election commission office or another polling place appropriately designated by the county election commission shall be open [for early voting]”); TEX. ELEC. CODE ANN. § 85.062 (allowing for the establishment of temporary branch locations and requiring certain counties with large populations to establish branch locations); UTAH CODE ANN. § 20A-3-603 (giving discretion to election officer to establish “one or more” early voting polling places). In contrast, just a handful of states, such as Maine, Nebraska, Ohio, South Dakota and Wisconsin, limit early in person voting to only the county clerk’s office (sometimes via absentee ballot), or only permit early voting in a single alternate location in place of the clerk’s office.

⁸⁹ FLA. STAT. ANN. § 101.657(1)(a).

⁹⁰ “The supervisor of elections shall allow a voter to vote early in the main or branch office of the Supervisor.” FLA. STAT. ANN. § 101.657(1)(a). In order for a branch office of the supervisor of elections to be used for early voting, it must be a “permanent facility of the supervisor and should have been designated and used as such for at least one year prior to the election.” FLA. STAT. ANN. § 101.657(1)(a). The supervisor of elections was also permitted to designate any “city hall or permanent public library facility as early voting sites,” and they must “be geographically located so as to provide all voters in the county an equal opportunity to cast a ballot.” *Id.*

⁹¹ See Tony Marrero, *Early Voting Hours to Drop*, TAMPA BAY TIMES (Sept. 8, 2011), <http://www.tampabay.com/news/localgovernment/early-voting-hours-to-drop/1190501> (noting that Florida’s voting changes in 2011 did not include flexibility for supervisors of elections to establish early voting locations, which was the only request supervisors had made for new legislation).

⁹² Pursuant to newly enacted legislation, elections officials can now designate a “fairground, civic center, courthouse, county commission building, stadium, convention center, government-owned senior center, or government-owned community center” as early voting sites in addition to city halls and libraries. The amended statute further allows for the supervisor of election to designate an additional site if an area of the county does not have one of the eligible early voting locations. 2013 Fla. Sess. Law Serv. Ch. 2013-57, sec. 13, § 101.657(1)(a).

⁹³ See, e.g., Roberta M. Stein & Patricia A. García-Monet, *Voting Early but Not Often*, 78 SOC. SCI. Q. 657, 665 (1997), available at <http://earlyvoting.net/files/2013/06/Stein-Voting-Early-But-Not-Often.pdf> (“The number of early voting sites located at familiar and frequented locations (e.g., supermarkets, convenience stores, shopping malls, and mobile unites) is significantly related to a higher percentage of votes cast early, but the effect is marginal”).

⁹⁴ See, e.g., M.V. Hood III & Charles S. Bullock III, *An Examination of Efforts to Encourage the Incidence of Early In-Person Voting in Georgia, 2008*, 10 ELECTION L. J. 103, 109-10 (2011) (finding that as ratio of square miles per voting site was reduced there was an increase in early voting); James G. Gimpel, Joshua J. Dyck, & Daron R. Shaw, *Location, Knowledge and Time Pressures in the Spatial Structure of Convenience Voting*, 25 ELECTORAL STUD. 35, 52 (2006) (finding “physical location of [early voting] sites appears to have had a significant impact on the use of convenience voting among those who live most proximate to those sites” but that the impact is significantly less for low-turnout locations where “the electorate is heavily burdened by obstacles to voting other than inconvenience”); see also J.G Gimpel & J.E. Schuknecht, *Political participation and the accessibility of the ballot box*, 22 POL. GEOGRAPHY 471, 2003 (finding, in context of Election Day, that accessibility — a function of distance and impediments to travel — has significant influence on turnout).

- ⁹⁵ Eight states require, or provide guidance on, equitable distribution specifically for early voting locations; COLO. REV. STAT. ANN. § 1-5-102.9(1)(a)(I)(A) (2013) (listing multiple specific factors for consideration by each county in determining locations and sites for early voting centers); D.C. MUN. REGS. tit. 3 § 703.3 (“Early voting centers shall be equitably distributed geographically throughout the District”); FLA. STAT. ANN. § 101.657(1)(a) (“[S]ites must be geographically located so as to provide all voters in the county an equal opportunity to cast a ballot, insofar as is practicable”); LA. REV. STAT. ANN. § 18:1309.2(B) (instructing the Secretary of State to select additional locations for early voting based on feasibility, accessibility, and the number of registered voters”); MD. CODE REGS. 33.17.02.02 (providing that local boards of elections must submit a form including whether proposed voting locations is within a specified distance of a certain percentage of voters depending upon the size of the county); N.M. STAT. ANN. § 1-6-5.7(A)(1) (“The county clerk shall... ensure that voters have adequate access to alternate voting locations for early voting in the county, taking into consideration population density and travel time to the location of voting”); UTAH CODE ANN. § 20A-3-603(3) (requiring “counties of the first class” to “ensure that the early voting polling places are approximately proportionately distributed based on population within the county”); W. VA. CODE R. § 153-13-3.3 (requiring county clerks to submit proposals for satellite early voting that considers that considers “neutrality” of the location based on distance from the main voting location, population centers, turnout rates, and the party affiliation ratios in the precincts).
- ⁹⁶ GA. CODE ANN. § 21-2-382(b); N.M. STAT. ANN. § 1-6-5.7(B); TEX. ELEC. CODE ANN. § 85.062(d).
- ⁹⁷ In New Mexico, each county shall “ensure that voters have adequate access to alternative voting locations for early voting in the county, taking into consideration population density and the travel time to the location of voting.” N.M. STAT. ANN. § 1-6-5.6(A) (2012).
- ⁹⁸ In Florida, any satellite voting locations beyond election offices “must be geographically located so as to provide all voters in the county an equal opportunity to cast a ballot, insofar as is practicable.” FLA. STAT. ANN. § 101.657(1)(a). North Carolina also has a provision that provides a regulatory check on the selection and distribution of EIPV locations. If a county proposes to provide one-stop voting in “a building that the county board of elections is not entitled to . . . demand and use” as a polling locations, such as a private facility, the State Board of Elections must find that “other equally suitable sites were not available and that the use of the sites chosen will not unfairly advantage or disadvantage geographic, demographic, or partisan interests of that county.” N.C. GEN. STAT. § 163-227.2(g1). And Utah—requires “counties of the first class,” which are defined as those with a population over 700,000, to ensure that the early voting polling places are “approximately proportionately distributed based on population within the county.” UTAH CODE ANN. § 20A-3-603(3); *see also* UTAH CODE ANN. § 17-50-501 (defining county classes by population). While currently only Salt Lake County meets this threshold, it is home to nearly 40 percent of the entire state population. *See State & County Quick Facts*, U.S. Census Bureau (last visited August 8, 2013), <http://quickfacts.census.gov/> (estimating Salt Lake County 2012 population of 1,063,842 and State population of 2,855,287). Additionally, in any county, if during the early voting period it is determined the number of established early polling places is insufficient to serve the number of registered voters turning out, the local election office may designate additional polling places. UTAH CODE ANN. § 20A-3-603(2)(a).
- ⁹⁹ Just 13 states with EIPV have statutes of this sort (Alaska, California, Colorado, Georgia, Illinois, Iowa, Maryland, Nevada, New Mexico, North Dakota, Tennessee, Texas, and Utah). Six of those are among the nine states with the highest EIPV rates. *See* GA. CODE ANN. § 21-2-385(d)(2) (NEV. REV. STAT. ANN. § 293.3576(2) (requiring public posting five days before Election Day); N.M. STAT. ANN. § 1-6-5(C), (J) (requiring schedule to be fixed 90 days before Election Day, but publicizing of schedule only to begin ten days before early voting); TENN. CODE ANN. § 2-6-103(c) (requiring public notice 25 days before Election Day); TEX. ELEC. CODE ANN. § 85.007 (requiring public notice 72 hours before EIPV starts); UTAH CODE ANN. § 20A-3-604 (requiring notice five days before early voting). Other states, such as Louisiana, Vermont, West Virginia, and Wisconsin, have statutes that only require public notice of early voting hours and locations if a county uses locations other than the clerk’s office.
- ¹⁰⁰ Interview with Maggie Toulouse Oliver, Cnty. Clerk, Bernalillo Cnty., N.M. (Mar. 22, 2013); *see also*, *My Vote Centers*, BERNALILLO CNTY., N.M., <https://www.bernco.gov/vcc> (last visited July 8, 2013) (displaying map of voting locations and providing hours, directions, and current wait times).
- ¹⁰¹ Based on county level survey results and a multivariate model, Hood and Bullock predicted that by utilizing all fifteen types of measured outreach efforts counties could achieve an EIPV rate six percentage points higher than counties who did not utilize any of the measured outreach efforts. M.V. Hood III & Charles S. Bullock III, *An Examination of Efforts to Encourage the Incidence of Early In-Person Voting in Georgia, 2008*, 10 ELECTION L. J. 103, 108-09 (2011).

- ¹⁰² Professor Theodore Allen found that long lines in Florida caused an estimated 49,000 people in central Florida not to vote. He previously found that long lines in Franklin County, Ohio discouraged approximately 20,000 people from voting. Voters who have experience longer lines have less positive evaluations of their voting experience Scott Powers and David Damron, *Researcher: Long Lines at Polls Caused 49,000 not to vote*, Dec. 29, 2012, available at http://articles.orlandosentinel.com/2012-12-29/news/os-discouraged-voters-20121229_1_long-lines-higher-turnout-election-day (citing analysis of Theodore Allen).
- ¹⁰³ Scott Powers and David Damron, *Analysis: 201,000 in Florida Didn't Vote Because of Long Lines*, ORLANDO SENTINEL, Jan. 23, 2013, available at http://articles.orlandosentinel.com/2013-01-29/business/os-voter-lines-statewide-20130118_1_long-lines-sentinel-analysis-state-ken-detzner.
- ¹⁰⁴ CHARLES STEWART III AND STEPHEN ANSOLABEHRE, WAITING IN LINE TO VOTE 7 (July 28, 2013) (Submitted to the Presidential Commission on Election Administration).
- ¹⁰⁵ *Id.* at 10.
- ¹⁰⁶ *Id.* at 11.
- ¹⁰⁷ *Id.*
- ¹⁰⁸ *Id.* at 12.
- ¹⁰⁹ See LAWRENCE NORDEN ET AL., BRENNAN CENTER FOR JUSTICE, BETTER DESIGN, BETTER ELECTIONS 3 (2012), available at http://www.brennancenter.org/sites/default/files/legacy/Democracy/VRE/Better_Design_Better_Elections.pdf. LAWRENCE NORDEN & SUNDEEP IYER, BRENNAN CENTER FOR JUSTICE, DESIGN DEFICIENCIES AND LOST VOTES (2011), available at http://www.brennancenter.org/sites/default/files/legacy/Democracy/Design_Deficiencies_Lost_Votes.pdf. LAWRENCE NORDEN ET AL., BRENNAN CENTER FOR JUSTICE, BETTER DESIGN, BETTER ELECTIONS (2012); LAWRENCE NORDEN, BRENNAN CENTER FOR JUSTICE, VOTING SYSTEM FAILURES; A DATABASE SOLUTION (2010), available at http://www.brennancenter.org/sites/default/files/legacy/Democracy/Voting_Machine_Failures_Online.pdf.
- ¹¹⁰ The reason for this is simple. When voters cast ballots by mail, there is no warning if the voter fills out the ballot wrong or fails to properly prepare the return envelope. As discussed in more detail below — and in our report — a high number of ballots get thrown out for these types of technical mistakes, See LAWRENCE NORDEN ET AL., BETTER DESIGN, BETTER ELECTIONS, *supra* note 109, at 3.
- ¹¹¹ We address these recommendations in greater depth in our report, DESIGN DEFICIENCIES AND LOST VOTES. See *supra* note 109.
- ¹¹² See NORDEN ET AL., BETTER BALLOTS, *supra* note 109, at 13. See also NORDEN & IYER, DESIGN DEFICIENCIES AND LOST VOTES, *supra* note 109, at 2-3.
- ¹¹³ *Id.* at 30.
- ¹¹⁴ STEWART III, 2012 SURVEY OF THE PERFORMANCE OF AMERICAN ELECTIONS, FINAL REPORT, *supra* note 4, at i.
- ¹¹⁵ See NORDEN ET AL., BETTER DESIGN, BETTER ELECTIONS, *supra* note 109, at 30.
- ¹¹⁶ *Id.*
- ¹¹⁷ *Id.* at 31-32.
- ¹¹⁸ Election Administration and Voting Survey data shows the percentage dropping from 2.01% in 2010 to 1.51% in 2012. See 2012 ELECTION ADMINISTRATION AND VOTING SURVEY DRAFT DATA, *supra* note 67. Technical reasons for rejection relevant to Minnesota are missed deadlines (Question C5a on the EAVS), no voter signature (C5b), no witness signature (C5c), and no resident address on envelope (C5i).

- ¹¹⁹ Another example of clearer instructions saving votes can be seen by comparing the different ballot instructions and different overvote rates in three Florida counties. In 2010, Miami-Dade gave voters detailed instructions to voters about how to cast in-person and absentee ballots, but, those instructions were not sufficiently clear and did not include information on how to correct a mistake. As a result, the Miami-Dade overvote rate was five times higher in 2010 than the state average. In comparison, during the same election, Volusia and Citrus Counties gave clear instructions that specifically addressed the issue of how to make corrections without voiding the ballot. As a result, those counties had close to zero overvotes for the U.S. Senate contest at the top of the ticket, compared to Miami-Dade's overvote rate of nearly 1 percent. NORDEN ET AL., BETTER DESIGN, BETTER ELECTIONS, *supra* note 109 at 22-23.
- ¹²⁰ See NORDEN ET AL. BETTER DESIGN, BETTER ELECTIONS, *supra* note 109 at 11 for the specifics for each of these guidelines. See also Dana Chisnell, ed., *Field Guides to Ensuring Voter Intent*, AIGA DESIGN FOR DEMOCRACY (2012), <http://civicdesigning.org/fieldguides/>; *Top 10 Election Design Guidelines*, AIGA DESIGN FOR DEMOCRACY (last visited Nov. 13, 2013), <http://www.aiga.org/election-design-top-ten/>; Plain Language Checklist, CENTER FOR PLAIN LANGUAGE (last visited Nov. 13, 2013), <http://centerforplainlanguage.org/about-plain-language/checklist/>.
- ¹²¹ U.S. Election Assistance Commission, EFFECTIVE DESIGNS FOR THE ADMINISTRATION OF FEDERAL ELECTIONS (2007), available at http://www.eac.gov/assets/1/Page/EAC_Effective_Election_Design.pdf.
- ¹²² That is, had the rate in Duval and Sarasota Counties been 14.7% instead of 10.2%, 28,000 more votes would have been lost in those counties. *Id.* at 37-38.
- ¹²³ *Id.* at 41.
- ¹²⁴ *Id.* at 14.
- ¹²⁵ NORDEN ET AL., BETTER BALLOTS, *supra* note 109, at 13.
- ¹²⁶ *Id.* at 64-67.
- ¹²⁷ Is America Ready to Vote? State Preparations for Voting Machine Problems in 2008 at 1, <http://www.brennancenter.org/sites/default/files/legacy/publications/is.america.ready.to.vote.pdf>.
- ¹²⁸ See NORDEN, VOTING SYSTEM FAILURES, *supra* note 109.
- ¹²⁹ *Id.* at 10-11.
- ¹³⁰ DEBRA BOWEN, CALIFORNIA SEC'Y OF STATE, REPORT TO THE ELECTION ASSISTANCE COMMISSION CONCERNING ERRORS AND DEFICIENCIES IN DIEBOLD/PREMIER GEMS VERSION 1.18.19 2-4 (2009), <http://www.eac.gov/assets/1/AssetManager/Report%20CA%20SOS%20Debra%20Bowen%20to%20EAC%20on%20Diebold%20Premier%20March%202009-Revised.pdf>.
- ¹³¹ *Id.*
- ¹³² See NORDEN, VOTING SYSTEM FAILURES, *supra* note 109 at 12.
- ¹³³ See NORDEN, DESIGN DEFICIENCIES AND LOST VOTES, *supra* note 109, at 5.
- ¹³⁴ While the EAC does currently operate a database of this nature, it is only for EAC-certified machines, which make up a fraction of those currently in use. See *Election Assistance Commission*, VOTING SYSTEM REPORTS COLLECTION, http://eac.gov/testing_and_certification/voting_system_reports.aspx (last visited Aug. 27, 2013).
- ¹³⁵ See NORDEN, VOTING SYSTEM FAILURES, *supra* note 109, at 4.

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at New York University School of Law

161 Avenue of the Americas
12th Floor
New York, NY 10013
646-292-8310
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