To: Cindy Cohn

From: Clifford Chen, Ken Farrall, Dina Mashayekhi, Chris Hoofnagle

Re: Election Verification Project – New Jersey

This memo examines certain legal, procedural and technical issues relating to elections in the state of New Jersey.   Specifically, the three topics covered are: recount laws and procedures, the certification process for e-voting machines, and access to voting machines and vote counting software source code.

Election recounts are regulated under §19:28-1 of the New Jersey Code. That provision allows candidates and groups of voters to challenge a vote count or declaration. A separate provision of the code, §19-29-1, may be invoked to challenge the results of an election under a number of grounds applicable to DRE concerns, including when votes are illegally rejected, mechanical malfunctions, and for "any other cause."

§19:48-2 of the New Jersey Code governs certification of voting machines by the state's election officer. The statutory language is geared towards mechanical (e.g., lever-based) voting machines, with internal operations typically visible to inspectors and designs typically protected by patent. There are no provisions for DRE electronic voting machines. As New Jersey's HAVA plan notes, "current law has been outpaced by the growing technological advances and must be revised." We have not been able to determine whether the state has complied with the code concerning certification. EPIC has filed a series of state freedom of information requests to determine whether the state has complied.

source code typically treated as trade secrets, there may be sufficient precedent for allowing inspection of source code. Protective orders may also be issued to prevent broad public disclosure of source code.

I. Recount laws and procedure in New Jersey elections

a. Background Information[1]

1. Political Structure

New Jersey has 21 counties, 40 legislative districts, and 13 congressional districts. The county government is responsible for most electoral operations, including selection and procurement of voting machines. Counties are subdivided into election districts, each district containing a polling place for all voters in its territory to cast ballots for any election. A particular election district is assigned to one of the 40 state legislative districts and one of the 13 congressional districts.

2. Election Officials

Attorney General: Through the Division of Elections, the Attorney General is the chief election official of New Jersey, responsible for ensuring compliance with federal acts, including the National Voter Registration Act (NVRA) and the Help America Vote Act (HAVA). The Attorney General is also responsible for certifying voting machines for use in elections, for regulatory rules on election issues, and for chairing the State Board of Canvassers which certifies

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[1] *See* New Jersey Chronological Elections Guide 2004, available at http://www.state.nj.us/lps/elections/chron.html.

machines.

County Board of Election: All 21 counties have a four-person County Board of Elections, including two members of each political party[2] appointed by the Governor[3] with nominations from members of each county committee and local party officials[4]. The County Board recruits, appoints, trains, and supervises district election board workers, certifies polling places, and canvasses and counts absentee and provisional ballots.

3. New Jersey State Court Structure

The New Jersey Supreme Court is the court of last resort for the State of New Jersey. The Appellate Division of the Superior Court is the state's intermediate appellate court. The other divisions of Superior Court comprise various trial courts for the state. The Civil Division of Superior Court hears cases involving monetary damages while the General Equity Division provides equitable relief. Other divisions such as Criminal or Family hear cases focused on particular subjects.

b. Recount laws and procedure in New Jersey elections

Title 19, Chapter 28 of the New Jersey Code governs recounts and sets out the necessary procedures to be followed from the application stage to the issuance of a new certificate of election. Title 19, Chapter 29 provides a course of action known as an election contest where the nomination of a candidate or the results of an election may be challenged. On occasion, an

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[2] N.J. Stat. Ann. §19:6-17.
[3] N.J. Stat. Ann. §19:6-20.
[4] N.J. Stat. Ann. §19:6-18.

1. *Making the application* (§19:28-1)

There are two circumstances in which an application for recount may be brought. The first arises when a candidate at an election believes that an error has been made in counting or declaring the vote.[7] The candidate then has until the second Saturday following the election or declaration to apply to a judge of the Superior Court that has jurisdiction over the district for a recount of the votes. When a public question is at issue, if ten voters believe that an error has occurred in counting or declaring the vote, they may follow the above procedure in applying for a recount.

The statute does not specify a prima facie standard that has to be met in establishing that an error worthy of a recount has occurred, nor does the case law provide any further guidance on this matter.

2. *Expenses* (§19:28-2)

The party initiating the recount must pay a deposit that is determined in accordance with the number of votes to be recounted. If the results of the recount alter the results by either 10 votes or 10% (whichever is greater), the expenses will be paid by the State, county, or municipality. If not, the expenses will be paid from the deposit made as security by the party.

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[5] *E. Melvin Goddard v. County Board of Elections of Monmouth et. al*, 98 A.2d 688 (N.J. Super. Ct. App. Div. 1953).

[6] *Supra* note 1.

[7] Under § 19:28-1, a candidate who applies for a recount may question an error in counting or declaring the vote, but may not question the *procedures* used to review and question the qualifications of absentee voters. *In re Gen. Election, Bethlehem Tp.,* 181 A.2d 523 (N.J. Super. Ct.1962). In this case, after a request for a recount, the county court invalidated civilian absentee ballots for technical reasons. On appeal, however, it was determined that the procedural violations were an insufficient basis to declare the ballots invalid. Absentee ballots, in general, have been the source of a significant amount of recount applications. See e.g., *In re Holmes,* 788 A.2d 291 (N.J. Super. Ct. App. Div. 2001); *In re Application of Gould,*196 A.2d 278 (N.J. Super. Ct. 1963).

Members of the district board will be issued subpoenas to be present as the ballot boxes are opened and to give testimony if needed.

4. Election Certificates – Issuance or Revocation (§19:28-4--7)

If the recount demonstrates that a different candidate has received the plurality of the votes, the judge will issue an order revoking the original certificate of election and subsequently order a new one to be issued. If the election was one that took place in multiple districts, the judge may order a recount in additional districts before issuing a certificate of election. In situations where the recount of a public question yields a different result, the judge will make an order that the results are to be corrected.

The issuance or revocation of a certificate by a judge is to be filed with the Secretary of State or with the clerk of the county or municipality, depending on the particular election. Then, the Secretary of State or clerk is to make an official, sealed copy of the certificate and immediately deliver it to the person declared elected. If, however, the recount dealt with the election of a senator, member of the assembly or a county officer, the county clerk has five days to deliver to the secretary of state at Trenton, another copy of the certificate that has been signed and officially sealed.

d. Contests under §19:29

1. Grounds for petition (§19:29-1)

This section allows the nomination or election of any person to a public office or party position or the results of a referendum to be contested based on one or more listed grounds. Although it does not specifically function as a recount provision, it can still be used to challenge the number

f. For any error by any board of canvassers in counting the votes or declaring the result of the election, if such error would change the result;

g. For any other cause which shows that another was the person legally elected;

While §19:28 authorizes a candidate in an election to contest the results for any error by any board of canvassers in counting the votes or declaring the result, §19:29 extends this power to voters. In *Magura v. Smith*, a trial court held that "legal votes rejected at the polls" in §19:29-1(e) must be "properly read to include any situation in which qualified voters are denied access to the polls including a denial because of shutdown of a voting machine."[8] In that case, the plaintiff was a candidate who lost a mayoral election by 18 votes. He contested the election results on the basis that voters were unable to cast votes for a period of over two hours due to a malfunction of the only voting machine at the polling place. No alternative means of casting ballots were available as election officials did not provide paper ballots. The judge noted that despite being discretionary, paper ballots "would appear to offer an economical and efficient manner of coping with unexpected mechanical troubles[.]"[9] In order to prevent a similar situation from occurring, the judge suggested that "[a] desirable solution may be for the Legislature to make mandatory the availability of unofficial ballots wherever voting machines are used."[10] Although the voting machine was repaired, some voters were unable to return and the plaintiff argued that the inability of these voters to cast these votes cost him the election. For §19:29-1(e), the plaintiff must show that the error was "sufficient to change the result" of the

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[8] *Magura v. Smith*, 330 A.2d 52, 55 (N.J. Super. Ct. 1974). The New Jersey Supreme Court reversed the interpretation of 19:29-1a in this case, which concerns the standard for "malconduct." *In re Application of Mallon*, 232 N.J. Super. 249 (1989).
[9] *Id.*
[10] *Id.* at 55-56.

prevented votes for a candidate from being recorded after the first vote was cast. The court had to determine whether this rejection of legal votes was sufficient to change the results of the election. They agreed that the "[i]nability to cast such vote because of a partially malfunctioning voting machine is unquestionably as much a rejection of a legal vote as in the case of a complete breakdown of the machine."[12] In meeting the burden of proof, the court reasoned that " the burden of showing specifically for whom votes were cast, while pertinent in cases of illegality, has no place where the issue is the rejection of legal votes."[13] For such cases, the burden could be met by the plaintiff demonstrating that had the votes been cast for him, they would have changed the results. The results of the election were set aside.

Improper or deficient instructions to voters can form a basis for challenge under §19:29. In *In re Gray-Sadler*, Appellants were write-in candidates for the offices of mayor and borough council.[14] Since they were write-in candidates, their names did not appear on the voting machine ballot and voters were required to take extra steps with the machines in order to vote for one of these candidates. There were no instructions available about voting for a write-in candidate prior to entering the voting machine area and once inside, many voters found the instructions to be confusing. After a recount, the petitioners challenged the election on the ground that the write-in instructions were confusing. The Board of Elections also disclosed that it had rejected votes, contrary to what the recount report stated, but that this occurred because they were placed on the wrong line. The court, however, found the errors to be caused by a failure to properly instruct voters on the proper use of voting machines. Furthermore, not only were the instructions confusing, they also omitted critical information. The court found that the petitioners also

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[11] 361 A.2d 74 (N.J. Super. Ct. App. Div. 1976).
[12] *Application of Moffat*, 361 A.2d 74, 77 (N.J. Super. Ct. App. Div. 1976).
[13] *Id.*
[14] 753 A.2d 1101 (N.J. Sup. Ct. 2000).

write-in vote, along with a sample ballot sent to them in the mail. These instructions should be clear and provide detailed yet simple directions that explain how to operate the voting machine and the importance of casting write-in votes on the correct line. User-friendly instructions and posters must also be available at the polling places, *before* the voter enters voting machine. The voter should also have the opportunity to read the instructions so that they may have an opportunity to pose any questions beforehand. As a recommendation, the court suggests that a voting machine be available to instruct voters, but this is not a requirement.

2. Filing the petition (§19:29-2)

The voters who file for the votes to be verified must file a petition with the superior court with jurisdiction over the affected area. In the case of an election which involved the entire State or more than one county, the Chief Justice of the Supreme court will assign a Superior Court judge to hear the contest. The petition must contain at least 25 voters' signatures or be signed by a defeated candidate. In all other elections, the contest will be heard by a Superior Court judge with jurisdiction over the county. The petition must contain at least 15 voters' signatures or the signature of a defeated candidate. Depending on the type of election, there is a maximum of 10 or 30 days to file the petition.

3. Timeline (§19:29-3,4)

After the petition is filed, the judge will set a date to hear the petition which will be between 15-30 days from the date the petition is filed. The party contesting the election must serve the Secretary of State, the municipal or county clerk, or the incumbent at least 10 days before the trial.

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[15] *In re Gray-Sadler* 753 A.2d 1101, 1110 (N.J. Sup. Ct. 2000).

the court proceedings while evidence related to the election such as ballot boxes, books, and ballots may also be requested. The judge may also require a witness who voted in an election to testify, and if it is determined that the person was not a qualified voter, they may be compelled to disclose for whom they voted. It will then be up to the judge to pronounce whether the incumbent or the contestant was rightfully elected, or to announce the correct answer to public question. The person rightfully elected will then be entitled the certificate of election. The judgment will annul an election certificate in the possession of an incumbent if a decision is rendered against them. If, however, the judge finds that no person was properly elected, the election will be set aside.

5. Order for successful party (§19:29-10)

In order to put the successful party in office after a judgment, the judge issues an order under seal of the court to the sheriff of the county to put the successful party in possession of the office without delay.

6. Right of appeal (§19:29-11)

The party who has lost the case may have it reviewed by the Appellate Division of the Superior Court.

II. Voting Machine Certification Process and Current Compliance

Certification of voting machines is governed primarily by Title 19, Chapter 48 of the New Jersey Code, which details, among other things, the requirements for voting machines,[16] the examination of voting machines by the Secretary of State (in practice, the Attorney General is

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[16] N.J. Stat. Ann. §19:48-1.

HAVA plan notes, "current law has been outpaced by the growing technological advances and must be revised."[19]

Examination and certification of voting machines is carried out by Attorney General, and such examination is mandatory as "[a]ny form of voting machine not so approved cannot be used at any election."[20] The statute requires that the Secretary appoint three examiners to determine whether the machine can be "safely used by the voters at elections under the conditions prescribed," and specifies that one examiner be an expert in patent law with the other two "mechanical experts."[21] The NJ HAVA report suggests that certifications are, in practice, handled by the Division of Elections and include a patent attorney, a voting machine expert, and an information technology expert.[22] Although not required by statute or published regulation, approval by a recognized Independent Testing Authority (ITA), testing for compliance with FEC voluntary standards, appears to be an additional requirement.[23] Once a machine has been approved, re-examination or reapproval is not required as long as it is a change that "does not impair its accuracy, efficiency, or capacity." Certification by the Secretary is considered "conclusive evidence" of compliance with statutory requirements, but certification may be reviewed by the Superior Court.[24] It is unclear what showing must be made to compel review of the Secretary's certification.

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[17] N.J. Stat. Ann. §19:48-2.
[18] N.J. Stat. Ann. §19:48-6.
[19] New Jersey Help America Vote Act (HAVA) State Plan, at 24, available at: http://www.state.nj.us/lps/elections/hava_plan.html.
[20] N.J. Stat. Ann. §19:48-2.
[21] *Id*.
[22] New Jersey HAVA State Plan, *supra* at 24.
[23] Though not specified, it is likely that NJ utilizes ITAs accredited by the National Association of State Election Directors. Certification is granted separately for hardware and software testing.
[24] N.J. Stat. Ann. §19:48-2.

III. DRE Voting Machine Source Code Access

Statutory and regulatory language governing disclosure of voting machine source code is sparse or non-existent.

In addition to the mechanically-oriented certification requirements described above, elections officials are required to notify the county committee chairmen of at least two principal political parties before preparing a voting machine for any election.[25] Each party may provide a representative who "shall be afforded an opportunity to see that the machines . . . are in proper condition for use in the election." Once a machine has been examined, it is to be "locked against voting and sealed with a numbered seal," and keys delivered to the county election officials.

While ITA certification likely allows for source code disclosure to the testing agency, inspections of DRE voting machines mandated by §19:48-6 do not appear to include examination of source code.[26] Indeed, attempts by challengers in other states to compel disclosure of source code have been stymied by assertions of trade secrets and contractual limitations to disclosure.[27]

Chapter 52 of Title 19 addresses the manner of rechecking voting machines but provides no provision for reexamination of internal machine operations. Rather, the process as specified by

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[25] N.J. Stat. Ann. §19:48-6.

[26] See Voting Machine Inspection, at http://www.freedom-to-tinker.com/archives/000575.html, for an account of a public inspection of DRE voting machines.

[27] See Rebecca Mercuri, A Better Ballot Box?, available at http://www.spectrum.ieee.org/WEBONLY/publicfeature/oct02/evot.html (discussing Palm Beach County, Florida, election contested by two losing candidates). The judge in that case allowed only a 'walk-through inspection' of election equipment. The Palm Beach County supervisor of elections had testified that the county's purchase contract included trade-secret clauses prohibiting disclosure of details of the specifications or internal functioning of the machines. It is not clear under what terms New Jersey counties have purchased DRE voting machines.

There is no published case law directly addressing disclosure of DRE voting machine source code to interested parties such as candidates or elections officials, beyond the certification committee convened by the Division of Elections. There are a few cases, however, that address machine inspections in the context of recounts and malfunctioning machines once an election has already taken place. In *Application of Moffat*, the results of a close election for membership to a township committee were set aside when it became clear that legal votes were rejected by a malfunctioning machine and that the rejected votes were sufficient to change the result of the election.[28] The court notes the uncontradicted testimony of an expert witness who discovered that "a shaft connected to the counter wheel recording the votes for [the candidate] became dislodged, so that the wheel failed to move after the first vote was cast for him]." So, close examination of the internal operation of a voting machine by an expert chosen by one candidate was apparently permitted when its output was suspect (plaintiff received total votes comparable to his opponents but only 1 vote out of 148 cast in the district containing the malfunctioning machine). In an agency decision, *In the Matter of the Annual Newark School Board Election*, the plaintiff candidate sued to compel the superintendent of elections to allow her to inspect the voting machines to be utilized in the upcoming election, and an order directing this inspection was granted though it is unclear how detailed an inspection was allowed.[29]

In cases involving mechanical voting machines, the mechanical operations are mostly visible and generally protected by patent. The expert examination described in *Moffat*, however, suggests that a more in depth level of access was required to probe the operations of mechanical machine, as opposed to a purely operational inspection. Examination of source code may be deemed sufficiently similar to this kind of in depth mechanical analysis that has been permitted by courts in the past.

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[28] 361 A.2d 74 (N.J. Super. Ct. App. Div. 1976).
[29] 93 N.J.A.R.2d(EDU) 645 (1993).

[30] *See e.g.*, *Alk Assocs. v. Multimodal Applied Sys*., 647 A.2d 1359 (N.J. Super. Ct. App. Div. 1994) ("A court, and especially a court of equity, can enter a protective order for disclosure that may exclude dissemination to a party and its employees. Disclosure may be limited solely to the parties' attorneys and experts who must agree to make no further disclosure, including a disclosure to the clients, without further order of the court."); Joe Wilcox, *Judge orders Microsoft to reveal code*, at http://news.com.com/2100-1001-839356.html (discussing court order directing Microsoft to provide Windows source code to opposing parties, governed by protective order).