Statement By Lance Gough, Executive Director
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When I first became involved in the election business more than 30 years ago, I initially thought it was a fairly elementary and simple process. You established a polling place; put in some voting equipment; allowed voters to cast their ballots; counted the votes after the polls closed; and that was it! Sounds simple. But, as we all know, this is a fallacy. Elections are a complicated, convoluted, and challenging profession. And, it gets more difficult each election cycle.

Of course, those of us in the election business knew this all along. It was only as a result of the historic November 7, 2000 Presidential Election that the public awoke to the complexities of the election process. Emanating from the State of Florida and spreading throughout the entire country, the American voting public demanded a change in the administration of elections. They wanted assurances that their votes were being counted fully, fairly, and accurately.

The primary result of this public outcry was the passage of the Help America Vote Act (HAVA), and the creation of this commission. We are here today to discuss the proposed Voluntary Voting System Guidelines, and I particularly want to address section 2.2.7, The Human Factors Involved in the Design and use of Voting Systems.

Voting is not a complicated process. At least, it shouldn't be. But there are many human factors that impact the administration of elections, from inexperienced voters who have difficulty in understanding the mechanics of casting a ballot to judges of election who are indifferent or poorly trained in administering the election process.

The single most challenging aspect now facing election authorities is to ensure that they comply with the HAVA requirements regarding people with disabilities and their right to vote privately and independently. I'll talk more about that later.

The voting process becomes even more challenging and difficult when changes are made in how elections are conducted. After all, most people only vote once or twice every few years, and it is often a retraining process each time they show up at the polls. I would like to relate how the human factor impacts elections in Chicago; the challenges we are facing, and our plan of attack.

Less then two weeks ago, the Chicago Board of Election Commissioners signed a contract to implement a $26,000,000 dual voting system.

After nearly a quarter of a century of usage, punchcard voting is now being eliminated in Chicago, along with the inherent problems of hanging or pregnant chads and voter confusion over ballot layout. Although we have eliminated these problems, I am equally as confident that we are facing many new ones. Foremost, is the fact that we must now retrain 1.5 million voters on how to vote on not just one voting system, but two.

Chicago has decided to convert to a name-on-ballot optical scan voting system, along with a DRE touch screen voting unit in every precinct. Obviously, the touch screen is to meet the HAVA requirements to allow people with disabilities to vote privately and independently. But, it will also be used for multi-language ballot requirements, and when not in use will be made available for any voter who wishes to venture into electronic land voting.

Why a dual system? It's a long story, one that began after the year 2000 Election, when it became apparent that the punchcard system had many drawbacks, although I personally believe that it was not quite the devil that some portrayed.

Fortunately, Chicago's punchcard voting system, utilizing the PBC 2100, did alert voters to possible errors, such as voting for too many candidates for the same office or failing to cast a ballot for any candidate. In addition, our machines were programmed to reject any ballot that was not initialed by a judge of election, as required by state law. I might add that we were only able to utilize these safeguards resulting from a lawsuit following the year 2000 Election, even though the software was in place prior to that Presidential Election. Unfortunately, we had been unable to convince the state legislature to give us this legal authority to turn on our screening software.

That aside, it was obvious following the year 2000 that punchcard voting was doomed in the United States, and we began thinking and planning for a more sophisticated state-of-the-art voting system.

With the passage of HAVA, and the promise of federal monies, our attention, like most election authorities, turned to DRE or touch screen-voting. Almost two years ago, the Chicago Election Board sponsored a public exhibition and demonstration of all voting technology, drawing more than two dozen vendors and manufacturers of voting equipment throughout the country. Although the exhibit involved every type of election system, all eyes were on the electronic or touchscreen devices.

Many election jurisdictions rushed to purchase these electronic marvels, confident that they would solve all the election ills that had beset us in 2000. Reality then set in. There were horror stories of electronic glitches that eliminated

entire pages of candidate names; poll workers who were unable to "boot up" their computers to get them operating; and university studies that showed some of the systems could easily be "hacked" to change election results. The Utopia had turned into a nightmare.

Fortunately, for the City of Chicago, the city that hesitated, all was not lost. In fact, we were feeling quite smug that we had the foresight not to hastily commit to an electronic voting system.

We looked at every voting system on the market, held numerous demonstrations of these products, and carefully watched and studied what other election jurisdictions throughout the country were purchasing. In the end, we decided not to go with all DREs for two reasons:

a. We simply did not have the available funds to commit to a full DRE purchase.

b. Secondly, and more importantly, we simply did not feel confident that a full conversion to DRE was right for Chicago voters. This was reinforced when other jurisdictions, such as Miami-Dade, announced it was considering reverting to an optical scan system because of the problems with their DRE equipment.

With less than seven months until our next election, the March 21, 2006 Primary Election, we are now undertaking a massive public education and judge of election training program to prepare for the introduction of the city's first dual voting system. This education effort will include multiple mailings of brochures and pamphlets to all registered voters; a video in every precinct polling place to introduce the dual system; public service announcements; a multi-language voter instruction booklet; a revamped web site; public and media demonstrations; and a complete retraining of our cadre of 14,000 judges of election. It will be no easy task. And, even with all these efforts, I can confidently predict thousands of voters will show up at the next election asking where are the punchcard ballots.

For many months, the Chicago Election Board has been busy planning the implementation of the HAVA requirements for people with disabilities. Fortunately, we have had the benefit and assistance of an Advisory Committee for People With Disabilities, comprised of many advocacy groups within the Chicago area. These experts have provided suggestions and guidance in opening and improving the electoral system in Chicago for this segment of our community. This committee is currently working with us and our vendor to further improve our

DREs to better accommodate our voters. Because of their expertise, some of the suggested improvements for people with disabilities will be inaugurated for March Election, others are being planned for November, and even more for future elections.

Although we have made considerable progress in meeting some of the requests of the disability community, there are other suggestions or proposals that the equipment simply cannot handle.

The proposed voting system guidelines contain many highly desirable goals. For this, the EAC should be commended as you have given great thought and consideration for the human factors in our voting systems. However, it is unfortunate that we have been left with so little time prior to the implementation of HAVA to achieve these goals. We will continue to work with our manufacturer to implement as many of these voluntary goals as possible, but some simply cannot be accommodated by the current equipment.

Please allow me to take a few minutes to review some of the human factors guidelines, our ability to comply with them, and my personal opinion on the feasibility of some of these points.

It is my opinion, and that of my staff, that there is no single voting system on the market today that will meet the needs and requirements for every type of disability. Despite our best efforts, we are aware that we are not going to satisfy every disability advocate.

In Chicago, we are equipping each of our 2,709 precinct polling places with one DRE unit designed to meet the needs of the disabled. Our DRE units incorporate headsets with audio instructions to navigate the blind voter through the ballot, and we recently redesigned the navigation box to make it more user-friendly for these voters. This was accomplished after several meetings with our disability group and our manufacturer.

I agree with the recommendation that usability studies with specific performance bench marks should be conducted on the accessible voting stations. We will continue working with our own advisory group to further refine our equipment whenever possible. For example, it was suggested by our committee that the voters should have the option of having the touch screen on or off, while utilizing the audio ballot and navigation controls. For voters with no sight abilities, a blank screen is advantageous since it ensures privacy. But, there are other voters who have partial sight and prefer to have the visual voting screen guidance during the voting process. Our equipment was originally manufactured so that the screen would go blank during an audio ballot, but as a result of our meetings it will be changed to provide the voter choice for the November, 2006 Election.

The guidelines suggests that the electronic image display be capable of providing all information, and in at least two type font sizes. Unfortunately, our equipment cannot be adapted to provide this option, although it has not be an issue with our advisory disability groups.

The advisory guidelines also suggest that there should be provisions for persons using paper ballots who have poor reading vision. For these voters, we will be providing a magnifying device in every precinct polling place, a service which we have provided for many years under the punchcard system.

As recommended in the guidelines, the buttons and controls on our accessible voting station will be distinguishable by both shape and color, a helpful aid to those with partial vision. Also, this voting unit will provide synchronized audio output that conveys the same information as that displayed on the screen.

We also are following the recommendation that the accessible voting station provide an audio tactile interface to support the full functionality of a normal ballot interface. This includes instructions and feed back for navigation of the ballot, instructions and feed back on confirming and changing selections, feed back on final submission of the ballot, and of course instructions and feed back to the voter on how to operate the voting unit.

Other features of our DRE unit include the ability to have any information provided by the system repeated to the voter; allow the voter to pause and resume the audio; allow the voter to skip to the next contest or return to the previous contest; allow the voter to skip over the reading of a referendum and to vote on it immediately; and allow voters to use their own audio assistance devices. We also are providing a sanitized paper cover for each voter using the headphones. We are in the process of researching a method whereby the voter can control the rate of speech on the audio system.

The smartcard utilized to activate our DRE will have a corner cut so that voters who are blind can easily perform this activation. We also are researching new techniques to determine if we can provide blind voters with the ability to verify the paper record that is produced by the DRE outlining their ballot choices. For voters who lack fine motor control, our navigation box is being equipped with velcro so that this can be attached to the arm of a wheel chair, or on a table top to provide stability.

Another benefit of utilizing a DRE unit in every precinct is the ability to comply with Section 203 of the Federal Voting Rights Act. In Chicago, we must print all ballots and voting instructions in Spanish and Chinese, in addition to English. These languages will be included in our DRE unit, and we are studying the possibility of incorporating other languages that are predominant within the City of Chicago. All voter instruction, titles of office, and other information can be

displayed in the required foreign languages. It has been our practice that the names of the actual candidates be in English, since this is how they are promoted and advertised. We do not think the actual names of candidates should be translated.

With Chicago's dual voting system, all voters will be given the opportunity to review their ballots before a final submission to verify they are complete and correct. The DRE system will not allow voters to overvote an office, while the optical scan system will screen the ballots for this error and return it to the voter if such a mistake is made.

When we utilized the punchcard voting system, we were one of the few jurisdictions that screened ballots for undervotes or incomplete candidate selections. We do not believe that such a step is necessary with the name-on-ballot optical scan system, since it is simple for the voter to determine whether they voted for all candidates and offices. By eliminating screening for undervotes, we also eliminate the privacy concerns for voter selections.

We believe that with the introduction of our dual voting system next March, all voters will be brought into the electoral mainstream. We believe that the number of errors that cause voters to forfeit their vote will be greatly reduced, and that every vote will be counted fairly, and accurately.