

Elections and the Cost of Accuracy

by Andrew Brod

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Nearly two months ago I wrote in this space, “nobody really knows who our next president will be.” I was referring to the uncertainty generated by conflicting opinion polls right before the November 7 election. But to everyone’s surprise, that statement continued to apply to the many weeks of uncertainty *after* the election.

The election mess reminds me of a joke. Three statisticians go deer hunting. Upon spying a big buck the first statistician fires his gun, missing by a couple of feet to the left. The second statistician fires almost at the same time and misses by a couple of feet to the right. The third statistician shouts, “We got him!”

If the statisticians had been lobbing hand grenades, their definition of accuracy might have been okay. But of course it’s silly when applied to rifle hunting.

You might think this is all just common sense, but there’s some economics here. Accuracy is an economic good. Like more tangible commodities, accuracy costs money to acquire and therefore isn’t “purchased” unless the benefits outweigh the costs. If accuracy were free, everything, including hand grenades, would be perfectly accurate.

The economics of accuracy also comes into play with elections and vote counting. We’ve just witnessed the closest election in U.S. history. George W. Bush won the election because he won Florida, the deciding state in the Electoral College, by the razor-thin margin of about three one-thousandths of one percent.

The amazing closeness of this election taught us two important lessons.

First, we learned that the way we count votes isn’t perfectly accurate. There is a margin of error in an election, just as there is in an opinion poll. Whereas an opinion poll’s margin of error results from random sampling, an election’s margin of error results from counting the votes.

The other lesson we learned is that in spite of the above, elections are pretty darned accurate. The margin of victory in Florida that everyone’s so worried about was far smaller than acceptable failure rates in vaccination programs and industrial processes, far smaller than the amount of fragrance sullyng the “99 and 44/100 percent” purity of Ivory soap.

In every election, there are irregularities, disputes, and mistakes. The reason we rarely hear about them is that the margin of error introduced by those irregularities is almost never larger than the margin of victory. Even in Wisconsin and Iowa, which Gore won narrowly this year, the Bush campaign withdrew election challenges because it concluded the number of votes in question was less than the Gore victory margin.

There was no such luck in Florida. We all know that Bush won the election, but because the margin of error was greater than the margin of victory, nobody really knows whether Bush won the *vote* in Florida.

What should we do about this less-than-perfect accuracy? Jacob Weisberg of the on-line magazine Slate makes a more partisan claim: “The legal outcome can't change the reasoned judgment that absent Florida's primitive electoral technology, Gore, not Bush, would be our next president.”

But is Florida's electoral technology really primitive? Or more to the point, is upgrading it really the best solution? Sure, it's easy for us in Guilford County, with our fancy computer touch-screen voting booths, to answer yes. But nearly a third of all voters nationwide used punch-card ballots like the ones made famous in Florida. If Florida's system is primitive, it's not alone.

Comments like Weisberg's ignore an important point about the economics of accuracy. Improved accuracy isn't free, and therefore the election margin of error can never be eliminated completely. The question becomes: how much accuracy is enough?

In some respects, the situation in Florida reminds me of a big snow in Greensboro. When we get that rare big snow, the process of snow removal is slow, primarily because the city has so few plows. But why should Greensboro have a large fleet of plows when big snowfalls are so rare?

When that big snowfall hits, we just take a few days off from work and school and let the stuff melt. It always does. Of course, we'd sing a different tune if we knew our weather was about to change for the worse and force upon us a few large snowstorms every year.

We should think about election accuracy in the same terms. It's become fashionable to say that the technology of voting will undergo great changes between now and 2004. Maybe it will. But does anyone have reason to believe that what happened in Florida will become the norm? Or even an occasional outcome?

In election terms, we had the snowfall of the century in Florida this year. If it's extremely unlikely to happen again, why invest in more accurate voting technology? After all, if we accept that accuracy is an economic good, we also have to accept that sometimes its costs exceed its benefits.

But let's not give up so quickly. Maybe technology isn't the only route to improved accuracy. You've probably read that the reason Guilford County has a touch-screen system is that we've already had *our* Florida debacle. In 1986, voting in the county was by punch cards. After Howard Coble defeated Robin Britt for Congress by fewer than 100 votes, Guilford County hasn't used punch cards.

But North Carolina law at the time did not mandate recounts in close elections, and there was no recount of the Coble-Britt vote. Would we have felt we needed computer voting if a hand recount had been conducted?

So there is a way, in principle, to increase electoral accuracy without the up-front expense of fancy high-tech voting systems. Instead, state governments could formalize legal and procedural guarantees for conducting recounts, maybe even (gasp!) hand-recounts. Many do so now; Florida has not.

Last month, Canada hand-counted all 13 million ballots cast in its federal elections *and* got the results back in less than a day. It helped that Canada didn't funnel hundreds of thousands of ballots through small three-person canvassing boards, as appeared to be the case in Florida. But assuming the legal and Constitutional issues had been addressed, does anyone doubt that Florida could have hand-recounted every one of its six million ballots?

It often seems that the American way is to throw money at a problem, and whenever possible to invest in new gizmos. But given the extreme rarity of elections like the one we just witnessed, maybe the way to go about improving electoral accuracy is to choose a lower-cost option: make it possible for quick and reliable hand-recounts to be conducted.

Or we could just wait for the snow to melt.

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