

Report of Town Meeting Coordinating Committee survey on electronic voting

June, 2010

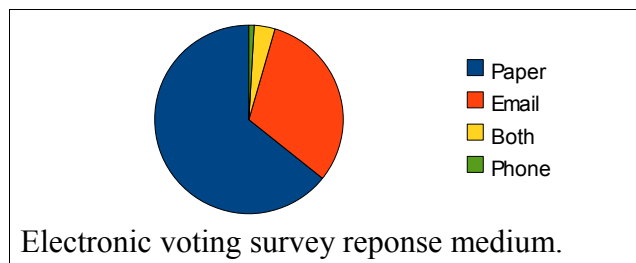
An interactive demonstration of an electronic voting system was conducted at the conclusion of Annual Town Meeting on May 17, 2010. Attendance at this session of Town Meeting was 177 and the demonstration began at approximately 10:30pm following dissolution of Town Meeting. Surveys were available on the back table at the beginning of the evening and were also disseminated via the Town Meeting listserv and on the Town Meeting webpage. Despite these efforts, not all Town Meeting members may have been aware of the opportunity to participate in the survey. As of May 17, 2010, there were 244 elected or *ex officio* members of Town Meeting. The response rate for the survey was 46 percent.

Feedback indicated that some members viewed the demonstration when it was rebroadcast by ACTV and that some have had prior experience with electronic voting systems. Neither participation in the demonstration nor experience with electronic voting was a prerequisite for responding to the survey.

This report presents the results of the survey, with analysis and recommendations provided by the Town Meeting Coordinating Committee. A complete account of all surveys received, including comments, is available in appendices 1 and 2 of this report and on the Town Meeting webpage.

Responses: 112 total

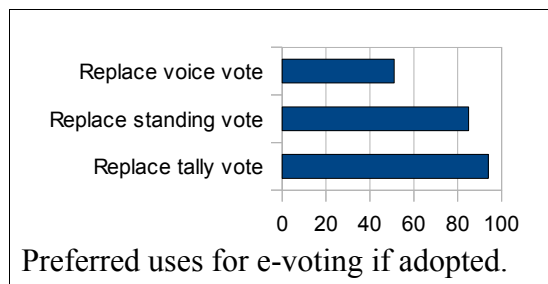
- Paper: 72
- Email: 35
- Both*: 4
- Phone: 1



* Survey questions and comments submitted separately but counted as single responses.

A) Under what situations should electronic voting be used? [multiple answers allowed]

- Replace voice voting: 5 (4%)
- Replace standing votes: 35 (31%)
- Replace the tally vote: 43 (38%)
- All of the above: 39 (35%)
- no answer/none: 25 (22%)



Analysis: There was general agreement among supporters of electronic voting for using it to replace tally votes and eliminating the distinction between tally votes and standing votes (around 90 percent), but only about half thought it necessary or desirable to replace the initial voice vote.

B) Please comment.

- See Appendix 2 for complete list of comments.

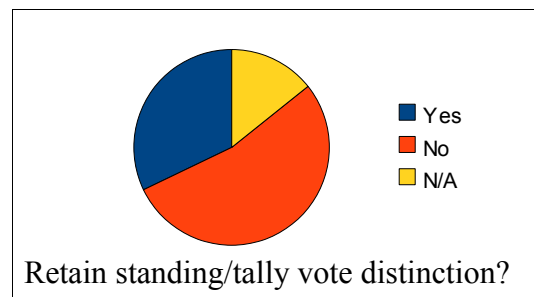
Summary: A significant number of respondents were interested in using electronic voting to increase the "transparency" or "accountability" of all votes, though there was also significant concern that this would be unnecessary or undesirable.

A significant number of respondents believe that using electronic voting for all votes would make Town Meeting more efficient, though there was also significant concern that time savings would be negligible or that time would be lost.

A third primary reason for supporting electronic voting is to improve the accuracy of the calling of the vote.

C) Should we retain the distinction between a standing vote (counts only) and a tally votes (vote total with names associated with votes)?

- Yes: 36 (32%)
- No: 60 (54%)
- no answer/no preference: 16 (14%)



Analysis: Almost all of the "no" votes came from supporters of electronic voting, and supporters voted "no" almost two-to-one. "Yes" votes were as likely to come from supporters as opposers.

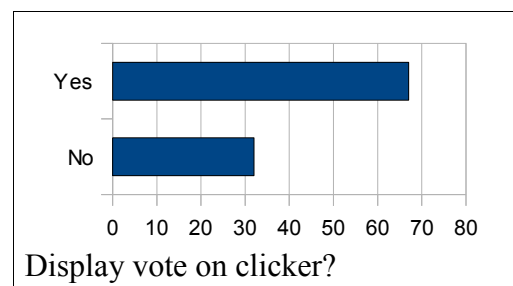
D) Why?

- See Appendix 2 for complete list of comments.

Summary: "No" voters overwhelming cited increased accountability as a reason for eliminating the distinction, with some also noting that electronic voting would obviate the need for the standing vote as a faster alternative to the tally vote. Some comments discussed the value of the current voting methods as opportunities for exercise, vocalization, fraternization, and cooling off after contentious debate.

E) Is it important to you that the machine displays your vote to you on your handheld unit as you vote?

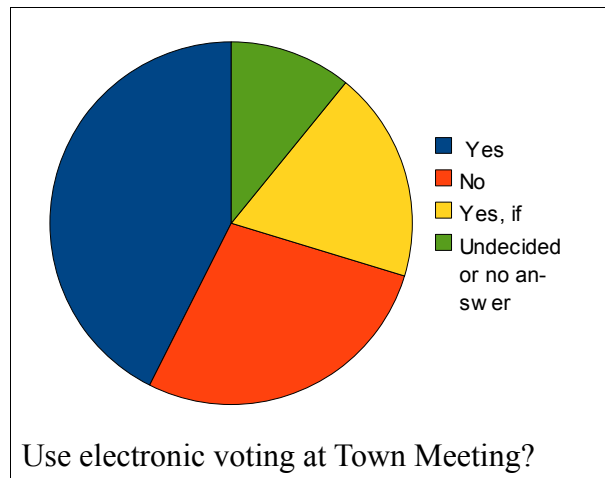
- Yes: 67 (60%)
- No: 32 (29%)
- no answer: 13 (12%)



Analysis: Among those expressing an opinion, there was a clear preference for a system that allows the user to verify his or her vote. Several respondents commented that they would not support using a system that did not have this feature, which would likely increase the purchase price of the system.

F) Do you think Town Meeting should use electronic voting?

- Yes: 48 (43%)
- No: 31 (28%)
- Yes, if: 21 (19%)
 - ...the cost is right: 16
 - ...it is easy to use: 4
 - ...the technology works: 4
 - ...it saves time: 3
 - ...accuracy can be assured: 3
 - ...votes are published: 2
 - ..."present" is an option: 1
 - ...it is not discriminatory: 1
- Undecided: 10 (9%)
- no answer: 2 (2%)



Analysis: Less than half of respondents were willing to offer unqualified support for the adoption of electronic voting, with about a quarter opposed in any case. Cost is the most important consideration for those on the fence.

G) Were you present for the electronic voting demonstration at Town Meeting?

- Yes: 47 (41%)
 - No: 50 (45%)
 - no answer: 15 (13%)
-

H) Do you have any other ideas or concerns about electronic voting to offer?

Summary:

- Town bylaw or Town Meeting procedures:
 - Use for all votes or retain voice vote?
 - Voting "present" or "abstain".
 - Evidence of quorum/lack of quorum. Could evidence of a lack of quorum invalidate a vote?
 - Time allocation for votes.
 - Provision for challenging the validity of electronic voting results.
 - Fallback method in case of technical failure.
- Expense:
 - Cost of current voting method, including supplies, staff time, and energy use.
 - Lifespan cost of electronic voting system, including maintenance, purchase of batteries, replacement of lost or damaged units, and software updates.
 - Record-keeping cost/benefit comparison.

- Verifiability and accuracy:
 - Desire to know whether and how one's vote was recorded.
 - Mistakes and technical glitches.
 - Security/hackability.
 - Voting on behalf of another member.
 - Paper trail.
 - Time efficiency:
 - Speed and efficiency of electronic voting versus current methods.
 - Increased accuracy of votes and (if used all the time) elimination of time spent on resolving doubted or controversial votes.
 - Technical breakdowns and glitches.
 - Practical considerations:
 - Town Meeting members with dexterity or vision problems.
 - Need for training.
 - Dead batteries and misplaced units.
 - Staff responsibility, including preparation time and presence at Town Meeting.
 - Projection of motion alongside voting screen.
 - Political considerations:
 - Will electronic voting be a bar to participation in Town Meeting?
 - Will electronic voting make participation in Town Meeting more appealing?
 - Should electronic voting be used to promote transparency and accountability?
 - Are Town Meeting members representatives or delegates?
 - How should energy consumption requirements be weighed in the consideration of voting methods?
-

Recommendations:

Determine the actual cost of the current method of voting, including staff time.

Explore possible cost reductions in the current method of voting.

Secure firm estimates for the lifetime cost of an electronic voting system, including staff time.

Conduct another demonstration and survey if/when a reasonable cost can be found and technical glitches and other considerations can be resolved.

Research the bylaw changes that would be necessary for the adoption of electronic voting.

Make a priority of improving the sound system in the auditorium.

The Town Meeting Coordinating Committee welcomes questions and comments about this report by email at <tmcc@amherstma.gov> or on paper at the Select Board office in Town Hall.

This report, including its appendices, is available on the TMCC page of the town website at <<http://www.amherstma.gov/tmcc>>.

Appendix 1 - Electronic Voting Survey Results Spring 2010

- A** Under what situations should electronic voting be used? (Circle as many as you like.)
- A1** Replace voice voting
- A2** Replace standing votes
- A3** Replace the tally vote
- A4** All of the above
- B** Please comment.
- C** Should we retain the distinction between a standing vote (counts only) & a tally votes (vote total with names associated with votes)? Yes No
- D** Why?
- E** Is it important to you that the machine displays your vote to you on your handheld unit as you vote?
- F** Do you think Town Meeting should use electronic voting? Yes No Undecided Yes, if _____
- G** Were you present for the electronic voting demonstration at Town Meeting? Yes No
- H** Do you have any other ideas or concerns about electronic voting to offer?

Totals	5	35	43	39	11	36	60	67	31	48	31	10	21	47	50
	A1	A2	A3	A4	A	C		E		F				G	
	Use E- voting for:					Distinction		Important to		Should TM use EV?				Were you	
	Voice	Stand	Tally	All	None	vs Tally		display vote		Yes	No	Unde-	Yes if	at demo?	
1			Yes			Yes		No		Yes				Yes	
2		Yes	Yes			Yes		Yes		Yes				Yes	
3							No	No			No				No
4	Yes	Yes				Yes		Yes			No			Yes	
5						Yes		No			No			Yes	
6				All				No		Yes					
7				All			No	No		Yes					No
8															
9						Yes		No			No				No
10				All			No	No		Yes				Yes	
11				All			No	Yes					Yes if	Yes	
12		Yes	Yes				No	Yes					Yes if	Yes	
13		Yes	Yes				No	Yes		Yes				Yes	
14	Yes	Yes	Yes			Yes		Yes		Yes				Yes	
15				All		don't know		Yes		Yes				Yes	
16		Yes	Yes				No	Yes			No			Yes	
17		Yes				Yes		Yes				Undecided			
18				All		Yes		Yes		Yes					
19			Yes				No	Yes			No			Yes	
20		Yes	Yes				No	Yes				Undecided			No
21		Yes	Yes				No	Yes				Undecided			No
22				All		Yes		Yes				Under	Yes if		
23				All			No	Yes		Yes					No
24						Yes			No				Yes if		No
25					None						No				No
26				All			No		no				Yes if	Yes	
27		Yes	Yes				No	Yes		Yes				Yes	
28		Yes	Yes	All			No	Yes		Yes				Yes	
29		Yes	Yes				No		No	Yes					No
30		Yes	Yes				No		No	Yes					

	A1	A2	A3	A4	A	C		E		F				G	
	Use E- voting for:					Distinction		Important to		Should TM use EV?				Were you	
	Voice	Stand	Tally	All	None	vs Tally		display vote		Yes	No	Unde-	Yes if	at demo?	
31				All		Yes		No		Yes				Yes	
32		Yes	Yes				No	No			No			Yes	
33		Yes	Yes				No	Yes			No			Yes	
34		Yes	Yes				No*	Yes					Yes if		
35				All			No	Yes					Yes if		No
36		Yes	Yes				No	No					Yes if		No
37		Yes	Yes				No	Yes		Yes					No
38				All		Yes		Yes				Undecided			No
39					None	Yes					No				No
40			Yes				No	No			No				No
41	No		Yes				No	No			No				No
42				All			No	Yes					Yes if		No
43				All			No	No				Undecided		Yes	
44					Undec	Undecided		Yes				Undecided		Yes	
45				All			No	Yes		Yes					
46		Yes	Yes			Yes		Yes		Yes					No
47				All			No			Yes					No
48		Yes	Yes				No	Yes		Yes					No
49				All			No	Yes		Yes					
50	No	Yes	Yes				No	Yes		Yes					No
51				All			No	Yes		Yes				Yes	
52				All			No	Yes		Yes				Yes	
53				All		Yes		Yes		Yes				Yes	
54											No				
55	No	?				Yes		No				Undecided			No
56					None	Yes but		Yes			No			Yes	
57				All		Yes		Yes					Yes if	Yes	
58				All			No	Yes		Yes				Yes	
59				All			No	Yes					Yes if		No
60		Yes	Yes				No	No		Yes					
61		Yes	Yes				No	No					Yes if	Yes	
62			Yes			Yes		Yes			No			Yes	
63				All			No	Yes		Yes				Yes	
64					None	Yes		No			No				
65				All			No	No		Yes					No
66				All		Yes		Yes		Yes				Yes	
67				All			No	Yes		Yes				Yes	
68	No	Yes	Yes			Yes		No		Yes					No
69			Yes			Yes		Yes			No				No
70		Yes	Yes			Yes		No		Yes				Yes	

	A1	A2	A3	A4	A	C		E		F				G	
	Use E- voting for:					Distinction		Important to		Should TM	use EV?			Were you	
	Voice	Stand	Tally	All	None	vs Tally		display vote		Yes	No	Unde-	Yes if	at demo?	
71													Yes if		
72				All		No		Yes		Yes				No	
73		Yes	Yes			No		No			No			No	
74				All		No		No		Yes				No	
75					None	Yes					No			Yes	
76				All		No		Yes		Yes				No	
77		Yes	Yes			No		Yes		Yes				Yes	
78														Yes	
79		Yes	Yes			No		No		Yes					
80				All		Not sure		Yes					Yes if	Yes	
81						Yes		Yes		Yes				No	
82		Yes	Yes			No				Yes				No	
83					No	Undecided					No			Yes	
84			No			Undecided		Yes			No			Yes	
85	No	No	Perhaps			Yes		Yes			No			No	
86				All		No		Yes		Yes				No	
87		Yes	Yes			No		Yes				Undecided		Yes	
88			Yes			Yes		No			No			No	
89				All		Yes		Yes		Yes				No	
90					None						No			No	
91			Yes			N/A		Yes					Yes if	Yes	
92				All		No		Yes		Yes				No	
93	Yes					Yes		Yes		Yes				No	
94				All		No		Yes					Yes if	No	
95	No!	*	Yes			Yes		Yes			No			Yes	
96		Yes	Yes			No		Yes		Yes				Yes	
97		Yes	Yes			No		Yes		Yes				Yes	
98					None	Yes					No			No	
99			Yes			Yes		Yes				Under	Yes if	No	
100		Yes	Yes			No preference		Yes					Yes if	No	
101				All		No		Yes		Yes					
102					Never	Yes		Yes			No!!			Yes	
103	Yes	Yes	Yes			No		Yes					Yes if	Yes	
104		Yes	Yes			No		Yes				Undecided		Yes	
105				All		No		No		Yes				No	
106						No					No			No	
107				All				Yes		Yes				Yes	
108					None	Yes		No			No			No	
109					No	No		No			No			No	
110								Yes				Undecided		No	
111	Yes		Yes			Yes		Yes				Under	Yes if	No	
112						No		No			No			No	

Appendix 2 - Comments from Electronic Voting Surveys Spring 2010

A Under what situations should electronic voting be used? (Type X before as many as you like.)

A1 Replace voice voting

A2 Replace standing votes

A3 Replace the tally vote

A4 All of the above

B Please comment.

C Should we retain the distinction between a standing vote (counts only) and a tally votes (vote total with names associated with votes)? Yes No

D Why?

E Is it important to you that the machine displays your vote to you on your handheld unit as you vote? Yes No

F Do you think Town Meeting should use electronic voting? Yes No Undecided Yes, if _____

G Were you present for the electronic voting demonstration at Town Meeting? Yes No

H Do you have any other ideas or concerns about electronic voting to offer?

Each survey is numbered. Names have been removed before dissemination.

8 - Can't deal with this.

9 - I'm against!

10-D. Not necessarily

11-F. Yes, if affordable, simple, non-discriminatory

12-F. Yes, if it works better than this evening

13-D. Why bother? It would take longer.

14-B. faster

D. The precinct that elects us should know how we vote

15-B. speed, accuracy, transparency

D. I don't know

H. less organic - more technology

16-A1. Quicker for relatively uncontested issues;

F. Not now - because of cost

17-D. On important issues voters should be identified with their positions.

18-B. Will improve accuracy, make it quicker with no doubts

19-F. No!!!!!!!

H. The cost is unjustifiable given the cuts we are making.

20-F. Undecided - Wonder if benefit outweighs cost

21-F. Undecided ☐ Cost is concern

22-F. Undecided/Yes if someone grants \$ to pay for it

H. Cost!! There are better uses for tax dollars - 1) initial cost, 2) maintenance costs

23-B. no more "volume" competitions in yea or nay votes

D. No *Why?* Accountability

24-B. if it costs less than cards

F. Yes, if the cost is less than cards

25-B. – If its not broken... – We can't even get good* sound at meetings (more a priority) *and other electronic equipment

26-B. Use for all votes – would reduce number of tally votes because there would be no call to doubt and impulse to enforce accountability would be dampened

H. yes, if not too expensive

27-B. want accountability for votes that matter

D. No if electronic voting - accountability

E. for confirmation / ability to change if mistaken button press

28-B. If it slows down the voice voting, it might not be worth it for the majority of voice votes. To have it replace standing and tally -- with standing as the back up for system failure -- makes good sense. I'm fine with it replacing all voted however.

D. No, accountability is key to good government. Standing should only be a back up to an electronic system.

H. I think it's brilliant and about time!!

29-B. Need to speed up voting when there is a lot of procedural maneuvering.

H. The microphones and the sound system at Spring 2010 Town Meeting were dismal. Improving sound should be a much higher priority than electronic voting.

30-B. Possibly replace voice voting if it can be done in essentially the same time

D. No *Why?* People should know how a TM member votes. The only reason for ??? standing vote to my mind is to save time.

31-B. We should use electronic voting for all votes, but have an option for having people's names on their votes (e.g. maintain the 15 person rule but apply it to having names on votes).

D. Tally votes are important to have names on votes, but standing votes are important as well since it's important to have the precise number on a vote with even just one person saying "doubt it" The beauty of electronic voting however would be that no one would ever have to say "doubt it" again since the electronic vote would be accurate and precise immediately.

E. No -- maybe -- If names appear on the big screen, then it's not necessary to have hand held a hell; if not, would be good to have vote shown on hand held.

32-B. This will allow tallies when the Moderator is in doubt or the requisite number asks. Otherwise it is unnecessary and will distract from the tallies that are important.

D. No *Why?* The only diff is how we get there.

F. No, after demo - will be too difficult for some members (originally had Undecided / Yes if, The cost is reasonable as we consider all capital needs through the JCPC process)

33-H. Getting the technology to work might pose problems and delays. Even the sound system Town Meeting is used to has glitches. Teaching Town Meeting members to use it may not be easy.

I'd rather spend \$12,000-\$22,000 on something else. Also, how often would the system and/or its components need replacing?

Might it be possible to cheat? For instance, someone steps out and gives lick to another person, who votes for him/her (uses two clickers).

This could make voting quicker, but debate is what takes up most of our time.

34-B 2 & 3 only if individual votes are recorded and if handset confirms our votes

***D.** I lean against this -- I tend to think that if it is close enough to count we should also be accountable. In addition, limiting us to 2 voting methods seems simpler.

E. Yes Absolutely - otherwise don't do it.

F. Yes, if system can be shown to be reliable and if savings on card printing will eventually pay for them or come close.

35-B. I sometimes choose not to vote. I would hope the record would record this as an abstention rather than an absence.

E. Yes, Given how clumsy I am, I would prefer the machine display my vote -- especially if I can correct it.

F. Yes, if electronic voting saves time.

36-B. 2 & 3 This would only be a good option if the \$12,000-\$22,000 would be cheaper than printing everyone's individual voting cards for each meeting. If it isn't cheaper then it shouldn't happen.

D. No Why? Standing votes allow people to see what you voted for.

F. Yes, if the costs of electronic voting are cheaper than printing the tally vote cards.

37-D. No Why? If we have electronic voting machines, then I see no reason for distinction. If we do not have electronic voting, then I would retain distinction.

F. Yes / Yes, if there is a way to ensure accurate counting, if a machine does not work.

H. I support electronic voting, but want assurances that a system of verification is in place. There should be a way to make sure votes are accurate if the machines break.

38-B. The number should show on the screen, or for the Moderator, names/numbers?

D. Yes Why? Tally votes have been used for political retribution without recourse.

E. Yes -- maybe

G. Sorry I missed it.

H. Security

39- B. None of the above

D. Yes Why? The only thing tally votes do is Town Hall has a record of how you vote, no time saved in the voting process.

G. To reduce time for Town Meeting it should start at 7:30 as posted not 7:45-8 p.m., members should make effort to be on time, also less explanations of Moderator on process.

40-B. Voice voting would be slowed down by electronic voting and is not needed. Standing votes, OK. Tally votes would result in a quicker public record.

D. No Why? Not important. Both votes are public.

G. No, but I have watched it on ACTV;

H. I am opposed to electronic voting for various reasons, enough so that I might leave Town Meeting voluntarily if it were to be adopted. Circling is tough here. The symbol "->" before options is my circle.

41 - I did not fill out the survey on 5/17 about electronic voting as I thought it premature to do so before seeing the demonstration. I also did not stay for the demo as my foot was bothering me too much. The demo aired on ACTV this afternoon, where I managed to see it. Your introduction suggests that you are in favor of electronic voting. After seeing the demo, I am opposed, and here are some of my thoughts.

To begin with, the time savings are dubious at best. The demo didn't work right in that the program would not come up for the operator, and the first attempt at a trial vote also brought a delay for technical reasons. There is no reason to believe that this system will work any better than our sound system, whose workings ought to be an embarrassment to the town. Any time saved rests on the assumption that the system would be working right, that everyone would have their clickers in their hands in operating order, etc., and all of that is extremely likely not to be the case on some evenings.

Most of our votes are voice votes called by the moderator, and the electronic system can hardly speed these up. The voice vote is nearly instantaneous, but the electronic vote will require an announcement, and then a time period for people to find their clickers and enter their votes. My opinion therefore is that electronic voting will SLOW DOWN the TM votes that would otherwise be settled by voice voting.

In the case of standing votes and tally votes, the system would probably be faster provided as I noted above that it was operational and people were ready with their clickers. I predict claims that batteries are not working, etc., which might well slow down these votes as well.

Finally, I am opposed to the notion that TM members should be held accountable for their votes by publishing all of them. The reason is that decisions on many votes are very close. I often have trouble deciding between a "yes" and a "no" and an abstention. In standing votes, I often see people whom I respect voting differently, and I assume that they have good reasons for their choice, not that they have voted wrong if they vote differently. Example: In a standing vote at the last TM, _____ and I voted differently but I assume that he had a good reason to vote the way that he did. I would not feel good about a future in which TM recruitment was based on past voting records. This is exactly what the Amherst Center crowd has done, even publishing a guide (by name) for sympathetic readers in the Bulletin. I regard this as a deep corruption of a local system of democracy, although I know many people feel differently.

At this point in time, the modest track record of electronic voting in public meetings and its cost (I noticed you seem to prefer the pricier system that allows you to verify your vote ..) are by themselves good reasons not to go ahead with electronic voting at this time.

42-F. Yes, if it is programmed to publish how individual TM members voted on every vote in the interest of accountability and transparency. The Town residents (voters) will be able to see how they were represented.

43-D. No *Why?* We should be accountable for our votes.

H. I'm not sure the benefits justify the costs, and the infrequent use is likely to mean a plague of technical issues and time wasted constantly training and retraining TM members.

_____ has sent you a link to a blog:

Some further thoughts on electronic voting (I also turned in a survey on Monday night)

Thursday, May 20, 2010

Electronic voting Luddite

After Town Meeting ended Monday night I stayed for a demonstration of an electronic voting system. The idea is that maybe investing some money in high-tech gadgets will make Amherst Town Meeting faster and will save the Town Clerk the work of recording the paper ballots we use for Tally votes.

That's a good idea, and I'm glad electronic voting is being considered. But like a lot of good ideas, I think it might be destroyed on the rocks of reality.

First, it took something like 20 minutes to get the electronic voting software up and running. Not a good start!

Once running, I thought the system was pretty darn spiffy, and easy to use. But a few people had trouble, and managed to be confused even after what I thought was a clear explanation of how the voting works (press the button to vote: your name on the screen changes color. Press an invalid button: your name turns yellow, otherwise it cycles through a rainbow of colors every time you push.)

Once people understood it, it is extremely fast; we completed a test vote in 30 seconds.

If the system was going to be used for dozens of votes per year, then the costs might justify the benefits. The first one or two TM sessions would likely be chaotic as people are trained or re-trained on how to use the clickers, but after using them a few times I think people would figure them out.

If it's used to just to replace Tally/Standing votes, then I think it's a bad idea. We're more likely to spend more time fussing with the technology ("Point of Order: my battery is dead") and training new Town Meeting members how to use the clickers than the time saved. If I recall correctly, we had just one Tally vote and three (or was it two?) standing votes at the past Town Meeting.

And the up-front cost isn't trivial (I think it was \$10-\$16,000).

I was going to write about possible security concerns, but assuming all vote results would become public (just as tally votes are made public), I don't think that would be a problem. What WOULD be a problem is people accidentally pressing the wrong buttons on their clickers, and then suspecting that the system got hacked (or that there's a bug) when they see the vote results and their vote is the opposite of what they intended. With no paper trail, it will be impossible to know what happened, and it will take just a couple of incidents for people to lose confidence in the system.

So I guess I'm an electronic voting Luddite. Keep the paper ballots, and instead of spending more time on electronic voting spend some time figuring out how to make the sound system at Town Meeting better.

Real-time captioning would be wonderful, too-- that'd give us a transcript of the meeting, accessibility for the hearing impaired, and closed captioning for the ACTV broadcast...

44-B. I am undecided about electronic voting to begin with and thus cannot constructively comment.

D. Undecided – but if we get rid of one, I'd vote to keep the tally vote – it makes you more responsible.

E. Yes If it's one or the other, there's too much opportunity for confusion. As we saw at the start of this meeting, and as we see in our daily lives, electronic gadgets save time when they work, but eat it up when they don't;

H. 1. How much does it cost?

2. yes/no, stand up or not – This is very simple. Electronics tend to be less simple. I'm concerned that things will get more rather than less complicated.

3. Will people want to know/publicize the results of every single vote? What impact will this have on the time of other staff associated with TM?

4. Tonight it's taking time to get this all set up. In every mediated classroom I've been in or class where people use electronics, more times than not something goes wrong. How often will this happen (realistic answer, please)? When things go wrong, even people who seem to know what's going on have trouble figuring things out. My concern is that this time-saving measure may eat up lot of time.

5. 1 for yes, 2 for no – too confusing. 1 and 2 are meaningless in terms of affirmative or

negative. It needs to be plain and simple, otherwise there will be errors.

45-B. Electronic voting will give a full range of votes by which to judge members. Accountability is vital to a healthy democracy.

D. No Why? Electronic voting should be quick -- but it can become our new norm, just as AYE or NO is now.

47-B. However, I can see the argument for not replacing voice votes. However, we have had lots of votes which seemed close and even some that seemed clear by voice vote that the standing vote cleared up. My perception is that people say "NO" louder than they say yes. Using the clickers would eliminate all doubt.

D. No Why? I don't see any need to. There is no reason that I can think of for our votes to not be recorded.

E. This could help for techno challenged individuals (or people that just don't use technology much in their lives). Although I don't need it, it might make some of those people more comfortable.

F. Yes/ Yes, if we can work out ways to make sure that there aren't persistent problems in people using them correctly. Technology is easy for many of us, but lots of TM members still have problems understanding how the microphone works. I think we have to be very sure that there is training, that everybody can use the system comfortably, and that we have assistants on hand to make sure people are using it correctly.

G. No, but I am very familiar with the clickers. I think they are terrific. In a very short period of time, we can get the vote and have a record of how each member voted.

H. Besides those stated above, I do worry about quorum calls. There will be no need for quorum calls anymore, because any vote without a quorum could be invalidated, since the numbers will be accurate for each vote. This could invalidate a lot of late votes. Is this a good thing or a bad thing? We know that we sometimes don't have a quorum. It's not important except on contentious issues. Just something to think about. A related issue is whether we record abstentions. If we do not record abstentions, as is currently the case, then we would not have an accurate count for all voters on each issue. This could be a positive thing, since the clicker response could not be used for a quorum count, unless specifically called by a member. That is, if a quorum is 125, and we have a 60 – 59 vote, if we don't record abstentions, we could assume that there were a half dozen abstentions. If we record abstentions, without six, the vote would be invalidated for lack of quorum.

48-B. This should not replace voice votes unless it's unclear that the voice vote is indeed a majority, either Yes or No.

F. Yes, if there is adequate support for Town Meeting members who are unfamiliar with the technology, and may need some assistance or troubleshooting.

H. If Town Meeting does decide to go with electronic voting, it should streamline the voting process. Also, an efficient method of distributing and collecting the units before and after TM is critical.

49-B. All – Then a standing or tally vote would not be necessary. Would speed up Town Meeting

F. Faster & more accurate

50-D. No **Why?** I don't see any meaningful distinction.

E. Might be helpful, but not essential.

G. NO (unfortunately)

51-B. Use it for everything so stay in practice, not just for some things; every vote should be counted & everyone should be willing to have their votes known, every time

E. Yes **Why?** I changed my mind after I saw it - but it would probably make some people much more comfortable -- consider just how much more e.g. 12K vs 15K: 15 K would be worth it

H. • Simply no reason not to do it

- like they have our names on unit so no complex recordkeeping
- wonder about the few members who may have dexterity issues due to arthritis, etc. We have hearing devices but what about an alternative to these?
- So, quorum will be based on how many units picked up, just like ✓ off on cards?
- Assume this can be online each night @ 7:30 – tonight was not typical, right :-)
- Computer download is great rather than keying in

52-B. I strongly think that individual votes should be recorded for all motions. How else will voters be able to see how TM members voted on an issue important to them?

D. No **Why?** Count all individual votes

H. A strong Yes for e-Voting! The main reason I supported the Charter vote was because TM member votes are not individually recorded for all motions. It's important that voters be able to know how all individual TM members voted. Otherwise TM is not a responsible democratic process. Transparency = recording all individual votes! And transparency is critical to the democratic process & an effective & responsible government. Thank you for e-voting!

53-H. It would save time and every vote we take with the exception of preliminary votes should be electronic voting. Even if calling the question is a close call that should be electronic voting too.

54 - At town meeting I filled out a form and indicated I was for the electronic voting. However, after thinking about it and weighing the cost as well as possible problems/hitches etc., I have decided that I am absolutely opposed to the idea of electronic voting.

56-B. Much to my surprise, I have come to the conclusion that I am not in favor of the electronic voting system, so I would circle a fifth option 5) None of the above;

D. (Yes, but) **Why?** If, unfortunately, we do adopt an electronic voting system, even for a trial period, I would favor keeping the distinction between standing votes and tally votes.

There is "information" in the fact of a tally vote, that Town Meeting felt it was an issue that appropriately recorded the votes each individual made (or abstained from making). Standing votes are often merely necessary because "the moderator is in doubt". [although frankly, I think he abuses that privilege, to try to embarrass people who vote against the result he favors. I changed my yes vote to a no, once, when it was SO clear that he was trying to humiliate the people who were voting against the school budget.]

In addition, I regret that there is a group that is tallying who votes which way against the litmus test of THEIR positions. If every little issue is tallied, it will just be more data -- obscuring the fact that some votes are made to take charge of the process, not on the issue [for example, extending debate when we sense that debate has been curtailed to try to ram something through. I could give some potent and wonderful examples of that from past years. Town Meeting then reminds me of the children's book Swimmy, when one different little fish is endangered and all the other fish gather round, with Swimmy as the black "eye", to form an outline of a big fish to ward off the danger. But I digress.....]

E. Yes, but I still would not entirely trust how it was RECEIVED by the system, not after the debacle of the demonstration!;

G. YES, I was present for the entire electronic voting demonstration. It not only convinced me that there were significant technical problems, but also that it was not a time saver. I realized also that it could be an encumbrance that will compromise the voting of some Town Meeting members. And there

would need to be new parliamentary aspects for challenges to how the system had operated -- or whether the time-limit was too short or too long. And what do we do when a person checks the record of their vote and sees that it was recorded differently than they had voted, so they thought. Et cetera, etc.

As I mentioned above, I also suspect that it will allow new abuses by groups who are inclined to 'grade' the participation of Town Meeting members based on their votes. I think accountability is reasonable so that elections can be informed by the positions taken by persons running for town meeting, but I have problems with this "black-listing" activity. For me, the posting of votes on the town website is for our constituents to see how we voted. And I have indeed had a postcard from an irate voter who checked and said he would never vote for me again!

Given that we have a Town Moderator who blatantly tries to control debate (IMHO), I am grateful for the visual information of standing votes when I am have been a bit unsure. This can come about particularly when there is new information that starts to emerge during debate and the Moderator calls on one of the trusty call-the-previous-question folks. When he does that, alarm bells often go off in my head, even if there hadn't been uncertainty before!

H. I think the technical side of the demonstration was very disturbing. As someone joked, if we can't manage a microphone, how can we manage electronic voting?

But the compelling problems were mainly in the system itself, not the users (most of whom were just trying it for the first time). The two technicians, one from Amherst College I gathered and the main I.T. guy from Town Hall, seemed quite confounded in sorting out the difficulties. Why was the boot-up time so extraordinarily long? Is there interference or 'acoustical' types of problems for wireless communication in that space? How will individuals know if their hand-held device is malfunctioning or not connected? I think of the Jeopardy contestants fervently shaking their push-button devices, when they know the answer but never seem to be recognized first. To confirm that I was connected (during the demonstration), I signaled again to see if my "name" would change color -- but wondered if the time-for-voting might suddenly elapse, in a real vote, and I would have voted differently than I intended.

I gather one 'advantage' would be the time saved entering data of the tally votes. Has anyone looked at how this is actually done? I can imagine a very cumbersome approach, as well as a number of ways to streamline it if it is done that way. There may be free or inexpensive software for entering voting data.

Who is going to 'manage' the equipment, sorting out who has which device, and which ones were absent-mindedly taken away? THAT will certainly take time.

What is to prevent people leaving the meeting and passing the hand-held device to a friend and asking them to vote in a particular way? Or is that not a problem? Would a quorum count be standing, or would it be electronically counted?

In sum, I think it is an expense that is not justified. If we purchased the electronic voting system, I suspect that we should not go the cheapest, bare-bones approach. And if we go ahead with it and the system has these problems and many others not yet anticipated, it will just be one more criticism of Town Meeting making a bad decision -- and in this case, perhaps seemingly self-indulgent. I'm surprised by my conclusion, because mostly, I am delighted by technological advances and enjoy using technology.

57-F. Yes, if the cost is reasonable

59-B. All - I think it would be faster than either standing or tally votes, and I think it would be good to have all votes recorded so townspeople can see how their representatives voted on any TM issues of interest.

D. No *Why?* For the reason cited above - voters should be able to know how we vote on all votes.

If that's the case, then there's no distinction between standing and tally votes - everything becomes a tally vote.

F. Yes, if we can see our votes as we vote, to confirm they registered correctly.

60-D. No **Why?** Not if we have e-voting

61-D. No **Why?** If it doesn't add time to the process, we might as well have the accountability.

F. Yes, if more sophisticated systems become available for less money

62-D. Yes **Why?** Town Meeting is representative OF NOT representative FOR. [Town Meeting is a representative body not a delegate body]

H. Use technology appropriately. Simple is better than complex.

Beware of unforeseen consequences. [Since tally vote is the true time consuming process, only that vote requires a "speed-up". Also the human element of Town Meeting is enhanced by voice vote and the standing vote. People should stand, be seen, and be counted. There is something "sneaky" about all inclusive electronic voting. We should not abridge the dynamic of human congregation.

63-B. The citizens of Amherst should be able to see how their representatives voted

D. No **Why?** See comment above

64-A. None of the above

D. Yes **Why?** But you should allow the Moderator to trust his eyes if his ears are in doubt by having "yes" and "no" votes stand. Then count if still in doubt.

65-D. No **Why?** Ideally, this could be used for all votes, thus eliminating the need for any different types of voting. We can all cast our vote and Harrison would know definitively whether or not a motion had passed.

G. No, unfortunately!

67-H. people voting for others

68-B. There would be no efficiency gain in replacing voice voting. Rather, an efficiency loss.

D. Yes **Why?** No reason not retain the distinction.

69-F. No-----financially, too much we ask for other people to sacrifice...also maintaining machines would cost money

H. JUST ONCE AGAIN AGAINST IT.

70-B. Voice is faster. Still leaves room for doubting.

D. Yes **Why?** Just more data, that is not needed.

Blind?

71 - I could not fill out the survey on my computer,(it wouldn't let me) so I will just do it by narrative:

I was not there at the end, when the electronic voting was tried

I do not feel strongly about it. That being said, other than the money the town would have to spend for the hand-held devices - which is a lot at this time - it seems like a good idea.

72-B. I think electronic voting should replace all voting so that there is a record for every vote.

D. No **Why?** Once we have the means to record votes instantly, I think that distinction is no longer

necessary. We are elected officials and the people in our precincts deserve to see our entire voting records.

E. This is a tough one to answer. It is important to me that I know for sure that my vote was counted. If the only way to do that is to have it show up on the hand held unit, then I guess my answer is yes. It is critical that all votes be recorded (and based on how hard it seems to be to get something simple like the microphones to work, I foresee issues in this as well).

73-D. No **Why?** Because I view the standing vote as a time saver only to the tally vote. Both decide close voice votes which are the quickest.

H. Do whatever we can to speed up voting and the town meeting process. Regardless of the moderator's opinion, I believe that tm takes too much time. In my case, I work 2 jobs, do volunteer coaching in town, have other kid commitments and obviously represent the residents yet I still feel that tm has become a chore due to the time commitment.

I appreciate the chance to let the committee hear my comments.

74-B. See caveats over

D. No **Why?** If this is quick it will speed up TM

F. Yes, if "present" is an option

H. My only concern is in a circumstance -- usually late at night -- when an electronic vote shows definitely that a quorum is not present. Currently, unless the presence of a quorum is challenged, TM can still do its business. What would happen if an electronic vote shows that a quorum is not present?

75-A. I'm circling none of them.

B. I like that there is a brief lull during tall votes. It allows people to talk with their neighbors.

D. Yes **Why?** Too many lulls can be a problem. So in votes that are less controversial, it is helpful to have the quicker standing option.

76-B. All – as long as it is fast.

D. No. **Why?** Just tally votes – much faster.

E. For accuracy.

H. Keep it cheap

77-D. No **Why?** If there is no difference in time, votes should be recorded

78-D. If the vote, as a sense of the whole of Town Meeting, is not clear enough for the voice vote to carry then I am for “standing up” (e-voting) and being counted.

79-A1. Not needed in voice voting - takes time

80-B. All - If we are going to spend the money we may as well use the system for all voting

D. Not sure **Why?** It certainly makes the process more transparent to everyone. I just would not want it to become a burden to document all of the information

E. With a hand held device or on the projection screen if we buy a system it MUST give feedback to how you voted. If not I think it will fail and be a complete waste of money Many people will be confused without the positive feedback from the device. If this feature is not affordable then do not spend any money on it at all, just stick with the current voice, standing, tally vote system.

F. Yes, if _____ Again only if the system has positive feedback to allow the voter to know how their vote was tallied. Otherwise there will be a great level of discomfort for people and it will waste time.

83-B. Under no circumstance right now. I think this kind of spending in a time of severe budget cutting is irresponsible.

D. Undecided.

E. N/A

84-B. Tonight's tally vote went swimmingly.

D. Do not know enough about why the distinction exists

H. 1. Microphones prove technologically challenging. I fear how much harder TM will be for many people.

2. I believe technology is wonderful – I advise NFPs on tech use and use it extensively myself. I advise them to follow their mission and use that mission to determine what tools of tech will advance that mission. I'm not clear that the mission of TM is advanced by this technology tool.

3. I have not heard that there is a need to Δ [change] how things are now - tally vote went even more swiftly than the standing vote.

4. I would want, if we were to move to e-voting, the machine that showed me my vote -- and to know how I could change it if I made a mistake.

85-B. Most e-voting systems, such as those approved for elections, require a "paper trail" much like our current green and pink card system. So it is not clear we can effectively replace our current paper system with an electronic system anyway, and the added cost seems wasteful under any circumstances, let alone under the dire financial straights we find ourselves in now. Furthermore, I think there are positive reasons why we may benefit from the standing and stretching our legs once in a while, especially after a contentious debate or a close vote: the extra time we take help us cool down and temper our consideration of the business yet to come. All in all, I doubt the "efficiency" some people anticipate from using e-voting will amount to much, and it would abolish a tradition that we should - for the reasons noted above, and perhaps for tradition's own sake - honor and respect (otherwise, why don't we also replace the moderator's gavel with a taser?!)

D. Yes **Why?** For the same reason we distinguish voice votes, it's good to have different levels of scrutiny depending on the matter at hand: standing votes deal with counting, tally votes with "accountability" in some sense - I don't think we should overstate the value of this kind of "accountability" (even though a particular political faction in town meeting has made a fetish of that issue through their notorious ranking system and websites)

E. Yes (for "paper trail" reasons noted above)

F. No (at least for now, again, please see above);

G. No (not this year, but in the past, and I know how these response systems work in classrooms);

H. (I can't find the reverse side of an email message, but that's an interesting concept we can contemplate as we dream of electric sheep)

But seriously, I hope you understood my larger point: modern technology is not always an improvement, and may (upon some reflection) have drawbacks too....

87-H. I am not sure that Town Meeting members will get the "hang" of using these machines. We continued to have members who struggle with the microphone...

88-B. Voice voting is adequate for most articles/issues

D. Yes **Why?** Standing vote is visual-informative to members/viewers on more difficult issues

H. E-voting is presumably speedier than tally voting so might contribute to the useful goal of moving TM along more briskly. I rather like the oral and visual aspect of voice and standing vote - they feel right to me for TM. I don't take the "accountability" argument very seriously, but probably others

do, i.e., I don't see great value in being able to know how everyone voted on every motion. "Transparency" is one of the current buzzwords i.e. a bit mindless.

The recent TM moved along quite nicely. The key thing is that people learned to be concise and to be humble, but those are hard lessons. And gadgets are no substitutes for them. I don't think e-voting a critical advance for TM. Self-restraint by members and _____ by Moderator can be and have been keys to moving us along -- as if we were a body gathered not to celebrate our virtue but to do a bit of public business.

89-B. All of the above. Initially, electronic tally might take more time, but as it became customary voting would become simpler. On voice votes, one is counting on the accuracy of the moderator's and other ears. People would be less likely to vote on an issue according to how their friends voted.

D. Yes *Why?* a person is then responsible for how they voted on a tally vote, and perhaps that will cause them to think more carefully about the issue.

E. Yes I want to see that my vote was recorded accurately.

H. My concern is that the way people vote is used as propaganda as to why they should not be elected to Town Meeting. Sometimes a person would have voted differently with more consideration and that is held against them. A person should be elected to Town Meeting on their entirety on just on a couple of votes.

90-H. In a time of economic hardship it would be foolish to pursue this option.

91-B. It is important that we raise our voices. It is important that we stand and be counted physically.

D. N/A [see above]

F. Yes, if only for tally votes

H. I am an early adopter – love technology, and I think this is a bad idea, for reasons noted on the front page, and for these reasons as well:

The technology will fail. We can't even get the microphone working here; how will we deal with this more complex technology?

And: the cost of the system widely exceeds the alleged benefits.

92-D. No *Why?* I Believe that all votes should have a recorded vote for the voters to reference when choosing who to elect to represent them. (Assuming that contests for seats becomes the norm)

E. Instant feedback is important to make sure that each person's vote is recorded and recorded accurately. I went through earlier versions of electronic polling through UMass lecture courses and sometimes the system did not record the result or recorded incorrectly but there was no way to tell until well after the fact.

F. Yes Wholeheartedly

94-B. If we get it, we should use it for everything.

D. No *Why?* It's more transparent for people to vote under their names rather than anonymously.

E. Yes, we should retain the ability to check the machines! Are they made by Diebold?!

F. Yes, if it will increase efficiency by more than 10% in a measurable fashion. (I.E. - average meeting time of 150 minutes, decreased by 15 minutes due to evoting;

H. What is the life expectancy of the system and is there any annual cost expected other than the upfront purchase cost?

95-A1. No! Keep it as first order response

A2. *Non-procedural;

D. Yes *Why?* some issues like procedural votes should not clutter up the tally vote records

96-B. Voice votes should continue to be the primary mechanism, with a low threshold (perhaps one member doubting) for going to an e-vote. Tally vote should be eliminated (to save printing costs). Standing vote should be retained only as a backup in case of system failure.

D. No **Why?** If electronic voting is used, it should replace both standing votes and tally votes.

E. Yes. I think this will be important to many people.

H. I am interested in serving on the group that does implementation on this (bylaw changes, etc.). Please contact me if assistance is needed.

97-B. I think voice votes will still be more efficient in many circumstances.

D. No **Why?** Even if we allowed for this option, I anticipate that 99% of the time there would be requests to tally.

E. Yes. I think many TM members will be confused if their vote is not displayed on their device.

F. Yes - but there must be VERY clear printed instructions accompanying the devices.

H. Concerned about the confusion it will cause with some members. Also a bit concerned with 'security' issues - how to prevent a member from leaving early and giving his device to a friend so his vote can still be recorded.

98-D. Yes **Why?** The current tally vote system provides an adequate method of accountability for TM members voting on articles and motions that have typically generated debate. Most votes don't.

G. No--but I am familiar with electronic voting systems. My opposition to electronic voting for Amherst TM is not about the nuances of the software, but rather about the use of electronic voting at all in this venue.

H. Electronic voting--and it's perceived need--seems to me to be yet another way to divert attention from more serious TM issues that exist apart from the particular voting system used, such as: the lack of transparency in the determination and presentation of the budget, the role of committees to promote their positions on issues without presenting full information on both sides of the issue to TM, the pattern of recognizing (or not recognizing) members to speak on issues by the speaker. I am also concerned that electronic voting introduces an environment of "Big Brother is watching" into TM, that, far from encouraging open, democratic debate, could well discourage members from raising questions and engaging in the full TM process. Electronic voting is solely focused, in a narrow and redundant way, on statistical outcomes. It in no way encourages debate and the healthy democratic **process** of decision-making (which, any student of Constitutional Law will tell you, has never been a matter of efficiency. Dictatorships are efficient. Democracy just isn't, and there are good reasons for that).

Moreover, at a time when municipal budgets should reflect the imperative to make every tax dollar count, electronic voting can only be a very low priority. Last year, TM turned down a request to restore +/- \$30K to insure accreditation of our library.....\$3,200 was initially excluded from this year's budget for the Cambodian outreach worker position...and the War Memorial pool will again remain closed this year, after leaving \$30K on the table by closing it last year.....and now we're being asked to spend \$12K - \$22K on electronic voting for TM? How about putting some of that money toward filling UP TM and encouraging MORE people to participate in the process? If that's not the objective, then why doesn't the town just buy a system that allows us all to vote from our **home** computers and bag the whole IDEA of TM members coming together every year to engage in our democratic process? Are there actually people on TM LOOKING for new and unnecessary ways to spend tax dollars that benefit but a few when needs still remain that would benefit the quality of life for many in our town?

While I appreciate the TMCC's efforts to investigate ways to sustain, improve and support TM, this idea is one that, once examined and balanced with other needs, just doesn't fly.

99-F. Undecided. Yes, if assured that technical problems would be under control and easily fixed at

time of a call for a vote, this way of voting does not discourage people from being Town Meeting members, and if cost is not too high.

100-D. Don't have a preference.

F. Yes, if we can use money already in the coffers. I don't want to give up half a teacher next year to pay for electronic voting.

H. I'm concerned that if contentious votes go very closely, some members might doubt the results, and I would hate to see anyone say "the fix is in". I don't know how to resolve that.

101-B. Losing voice vote would be regressive but the data collected would be excellent

D. No Why? Lean in favor of more data

H. Excellent idea!

102-B. Never

H. The world is warming! Why add yet another power-consuming device when human labor works perfectly well and uses no extra energy.

I can also see voting records being used to influence voters during town elections. I'm against this because the voters are usually uninformed about the various issues behind a vote. The "presenter" of the "voting score" can definitely slant the voting record in favor of his/her political position. I'm proud to say that I had a large negative score in an earlier Sustainable Amherst tabulation.

103-B. If we buy them, let's use them to stop concern about accuracy of votes.

D. No Why? Efficiency

F. Yes, if we can find the money

104-B. It would be slower than most voice votes

E. Yes, Absolutely!

H. • I think the price is still very expensive.

• I still have lots of questions. For example, what is the expected lifespan or guaranteed usefulness of the electronic units? What provisions could be in place to prevent or discourage a TM member from leaving his/her unit with someone in TM and leaving for the evening?

• I suggest we can save paper costs and waste by just printing one set of pink & green cards per TM member, mailing them with the warrant, having blank pink & green cards available for those who forget. If we run through 6 tally votes, new sets could be printed and distributed as they are now.

• I would be very concerned if my vote did not register on my handheld unit. How would one handle a vote that a TM member claims was recorded incorrectly? Will there be some kind of appeal process?

• There are several TM members that I expect might be very reluctant to use this sort of electronic device. I would not want them to drop out of Town Meeting because of this kind of voting.

106 - We spend enough for voting. If there is a question, tally is proving what the vote is.

107-B. Accuracy + time efficiency; needed precision - esp. during 2/3's required voting;

E. Yes. However, if this feature adds cost beyond possible purchase, I'd weigh in for the more affordable options that can also assure voting accuracy.

H. 1) cost of purchase at this time given other extraordinary fiscal needs

2) need to have informed system operators; staff to be on-site to deal with assistance electronic glitches, etc. Need for 2 screens: one for motion, for EV results during TM sessions

3) Having used EV in the past as a legislative counselor for a professional organization, it

proved to be a valuable tool for resolution voting & freed up more time for deliberations, caucuses & individual comments/questions from the delegation. Following all votes cast, names and votes were displayed briefly on screen for accuracy check.

108-B. None of the above

109-B. I do not favor using electronic voting.

D. No--I do not believe it is worth the investment

110-D. I am not sure what you mean, but I do think constituents need to know who voted for whom.

F. I am undecided... perhaps in some extreme instances, but for the most part No

H. Yes, for lack of a better word, it seems "flaky" at times. Just look at the recent presidential elections. Surprisingly, to this day, there is still a lot of controversy.... after how many dead in Iraq? While that situation might seem remote, I still think it speaks a lot about the situation of electronic voting today.

111-B. I feel that TM members should stand up and be counted, and that the precinct should see how their representatives voted.

F. Undecided - Not sure how much time would be saved!-- malfunctions, confusion, etc.
yes, if we had the money & if it were used properly

H. This issue was discussed in the 1990's & rejected then. I see _____ (evoting?) different now.

112-B. I think the expense exceeds the value. We need to tighten the belt. The devices are fun, and would save some time, but don't warrant the expense.

G. No But I am familiar with the devices used at Mass Medical Society meetings.