

Embedded Based Electronic Voting Machine Using Password

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ABSTRACT

The Electronic voting machine plays a key role in elections. The Earlier EVM'S needs more man power, time and mislead the voting scenario due to influence of local people vote and after voting the other may vote only after the Password is set then the system gets ready to accept the polling. After completion of the polling we may make the system to reset .If the person is authenticated then the vote is issued and the polling process is done using buzzer system, else that denies the process. At every regular intervals of time the polled votes are recorded and give the count that how many votes are casted through LCD. This system gives an efficient way to conduct elections and display the results on the same day.

I. INTRODUCTION

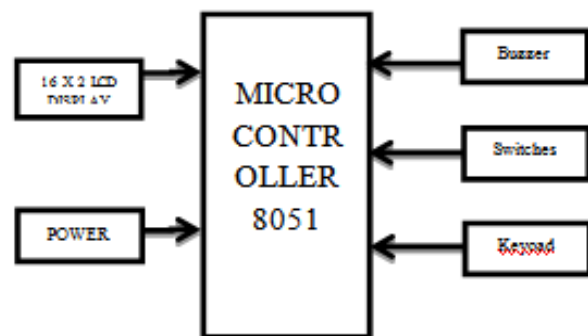
India is one of the Countries which have introduced EVM for Parliamentary and Assembly polls successfully. But EVM is not being used in preferential voting system because of high level complexities like need for calibration of machine before every election based on number of contestants and several other constraints in recording of votes and counting.

II. THE ELECTRONIC VOTING MACHINE

Electronic Voting Machine (EVM) retains all the characteristics of voting by ballot papers, while making polling a lot more expedient. Being fast and absolutely reliable, the EVM saves considerable time, money and manpower. And, of course, helps maintain total voting secrecy without the use of ballot papers. The EVM is 100 percent tamper proof. And, at the end of the polling, just press a button and there you have the results

ADVANTAGES

1. It is economical
2. Less manpower required
3. Time conscious, as less time required for voting & counting
4. Avoids invalid voting
5. Saves transportation cost due to its compact size, Eco friendly.
6. Convenient on the part of voter
7. easy transportation, storage, and maintenance
8. easy and accurate counting without any mischief at the counting centre
9. **BLOCK DIAGRAM**



III. PASSWORD GENERATOR

Password

generator is software program hardware device that takes input from a random or pseudo-random number generator and automatically generates a password. Random passwords can be generated manually, using simple sources of randomness such as dice or coins, or they can be generated using a computer.

While there are many examples of "random" password generator programs available on the Internet, generating randomness can be tricky and many programs do not generate random characters in a way that ensures strong security. A common recommendation is to use open source security tools where possible, since they allow independent checks on the quality of the methods used. Note that simply generating a password at random does not ensure the password is a strong password, because it is possible, although highly unlikely, to generate an easily guessed or cracked password. In fact there is no need at all for a password to have been produced by a perfectly random process: it just needs to be sufficiently difficult to guess.



IV. OPERATION OR WORKING OF PROJECT

1. Power on: When supply is turned on RED LED glows.

2. Mode selection:

i. Voting mode: toggle switch on VCC

ii. Counting mode: toggle switch on GND.

Voting Mode: When toggle switch is in voting mode "Voting mode" is displayed followed by "Please vote". After a vote being given, "Please wait for authority switch" is displayed and again enable for voting after Control switch being pressed by the voting Authority.

Counting Mode: When toggle switch is in counting mode "Counting mode" in displayed on the screen, and total number of votes to respective candidate can be displayed on the screen by pressing the respective key assigned to them.

3. Clear mode: Press clear switch when all entries are required to be erased. Clear switch should be pressed before voting procedure.

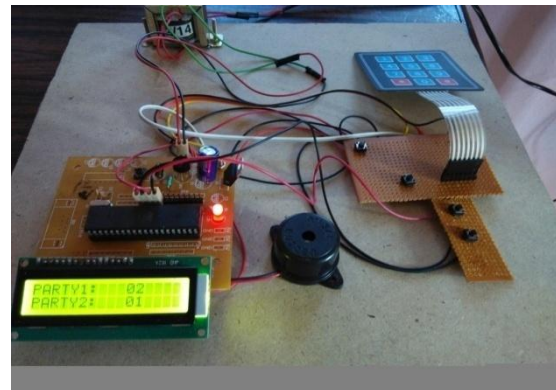
4. Buzzer indication: Pressing of key in voting mode is indicated by a buzzer sound.

5. Controller switch: This switch is provided for enabling the keypad in voting mode. This switch is under the control of voting authority

V. APPLICATION RELATING TO PROJECT

1. This could be used for voting purpose at any required place.
2. It is used in general elections for choosing candidates to represent people at various stages and it can be used in school, college student union elections.
3. Bogus votes can be controlled by using password.

VI. RESULT



VII. CONCLUSION

We found major security vulnerabilities that could compromise the confidentiality, integrity, and availability of the voting process. The results of our study suggest that there is a need for a drastic change in the way in which electronic systems are designed, developed, and tested. Researchers, practitioners, and policy makers need to define novel testing approaches that take into account the peculiar information flow of these systems, as well as the combination of computer security mechanisms and physical procedures necessary to provide a high level of assurance. Electronic voting software is not immune from security concerns.

VIII. FUTURE SCOPE

1. Timer could be included, which could automatically end the voting after specific duration of time.
2. Biometric Verification of voters, so that automatically it can be insured that one person is voting once.
3. It can be made more interactive by adding sound effect (Speech) to it.
4. EEPROM can be used to store data permanently.
5. If we make more than one EVM, each to be used at different locations and final result will be addition of result of all, we count.

REFERENCES

- [1] A. K. Agarwala, D. T. Shahani, and P. V. Indiresan. Report of the expert committee for evaluation of the upgraded electronic voting machine (EVM).
- [2] R. Anderson and M. Kuhn. Tamper resistance: A cautionary note. In Proc. Second USENIX Workshop on Electronic Commerce, Oakland, CA, 1996.
- [3] A.W.Appel. Certification of December 2008.
- [4] A. W. Appel, M. Ginsburg, H. Hursti, B. W. Kernighan, C. D. Richards, G. Tan, and P. Venetis.

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