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# A REVIEW ON ONLINE VOTING SYSTEM HAVING A FUNCTIONALITY OF MULTISECURITY

# Prof. Ku. Payal I. Shire\*, Ku. Bhavana Baneraj, Ku. Poonam Tayade

\*B.E Prof. in the Department of Electronic, Shri Shivaji College of Science, Arts, Commerce Akola (444001), India.

BSc 2nd year in the Department of Electronic, Shri Shivaji College of Science, Arts, Commerce Akola, India.

BSc 2nd year in the Department of Electronic, Shri Shivaji College of Science, Arts, Commerce Akola, India.

#### **ABSTRACT**

In past two decades we have used Electronic Voting Machine (EVM) for casting the votes which is reliable, easy to use and simple. But this needs large park area, security and bulk of man power, which make this system more time consuming. These problems can be overcome by using Online Voting System which is a faster, secure, highly reliable and less time consuming system. We will use Biometrics, cryptography and steganography methods in this system.

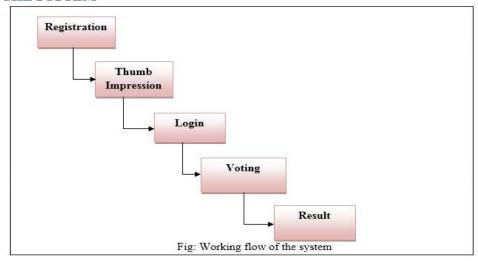
#### KEYWORDS:.

### **INTRODUCTION**

India is a democratic country and every Indian has rights to choose their Government. So Indian constitution provides us election commission to select the best ruler for the country. In past years we have used punch cards ballot boxes to cast our votes. Now we are using Electronic Voting Machine (EVM) etc. to cast our vote which take more time, labor work and pare work which is not advantageous in today's busy lives. So a new technique which is Online Voting System will be more suitable for current situation.

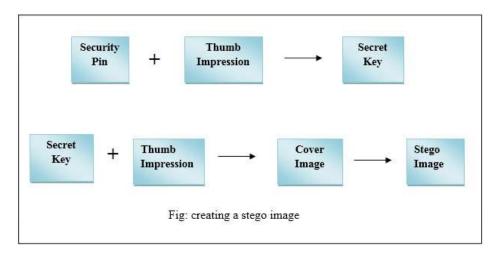
Online voting system is easier, less time consuming, faster and more secure than previous systems. We can cast our vote from anywhere in the country using PC, mobile, tablet, Smartphone via internet within a few seconds. This system is based on advance techniques such as cryptography, steganography, Biometric techniques which use person's fingerprints eye-face recognition etc.

## FLOW OF THE SYSTEM

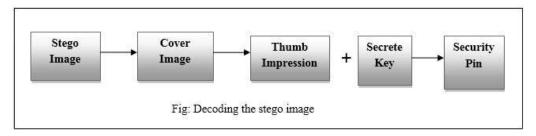


#### **WORKING**

- 1. In online voting system, the voter first has to register for voting by giving his/her name, address, ward number, phone number, e-mail address etc.
- 2. After registration, the voter has to give his/her thumb impression and then he/she will get voter ID and security pin.
- 3. This security pin with thumb impression creates a secret key which will later generate a cover image using thumb impression.
- 4. Using this cover image, a stego image is created as shown in fallowing fig.



- 5. After creation of stego image the registered user has to enter security PIN with secrete key and thumb impression to login to the voting system.
- 6. Now, the stego image is decoded at the server side using authentication algorithm as shown in fallowing fig.

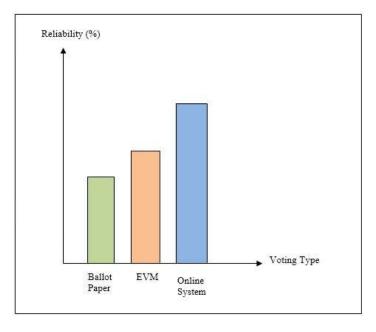


- 7. The stego image of the voter is then compared with the database stored at the server side and if they both are matched then the voter will authenticated for voting and will be able to cast his/her vote.
- 8. After casting the vote, result will be displayed on the web page that which candidate the person has chosen.

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#### **GRAPH**

The fallowing graph shows the reliability between different voting systems.



#### ADVANTAGES OF ONLINE VOTING SYSTEM

- 1. Online voting system is faster, easier and consume less time.
- 2. Ti does not require man power and separate area for voting booth.
- 3. We can do voting from anywhere in the country at any time
- 4. As there is no need of man power and park area, this system is uneconomical.
- 5. This method is highly secured because every individual has a unique thumb or fingerprints, eye etc.

#### DISADVANTAGES OF ONLINE VOTING SYSTEM

- 1. As this system is totally based on internet, so the persons who are not familiar with internet cannot use this system.
- 2. There may occur software problem.

#### **CONCLUSION**

It has been found that the online voting system is highly secure, reliable, less time consuming. So it is a better replacement for Electronic Voting Machine which has so many disadvantages. Use of online voting system will save money, time, and security officers. It used advance techniques such as cryptography, steganography, biometrics which make it more secure and convenient.

#### **REFERENCES**

- [1] Ankit Anand1, Pallavi Divya2, "An Efficient Online Voting System" Vol.2, Issue.4, July-Aug. 2012.
- [2] Malwade Nikita1, Patil Chetan2, Chavan Suruchi3, Prof. Raut S. Y4 Secure Online Voting System Proposed By Biometrics and Steganography in Volume 3, Issue 5, May 2013.
- [3] V. Jothi Lakshmi1, P.Vineka2, V.Anbarasu3Biometrics and Steganography based Secure Online Voting System, Volume2, April May, 2014.
- [4] Mayuri U. Chavan1, Priyanka V. Chavan2, Supriya S. Bankar3 Online Voting System Powered by Biometric Security using cryptography and steganography.
- [5] Volume 1, Issue 7, December 2013.