



ORGAN DONATION APPLICATION AND WEBSITE

Prof. Raghunathsingh Rajput¹, Javeriya Soudagar², Pavitra Viraktamatha³,
Snehal Jadhav⁴, Srushti S G⁵

^{1,2,3,4,5}CSE, AGMRCET

Abstract— Organ donation is one of the significant contributions that a person can make towards the society. Organ donation system is a combination of Android application and website that is made for such noble and great cause. The growing technology in android development has made this possible the hospitals, organ banks, medical stores, ambulances and user can register through online organ donation application provides a way to seeker to search for donor through app. This application is also used by organ donor and seeker where a person can register for interested in organ donation. Procedure to use the application is to first download the application in your smart phone, register on the app with basic details like name, address, contact details, email and medical history information of organ one could choose to donate. All this information can be saved in data server which is interconnected in between user, donor, seeker and hospital with multi connectivity server.

Keywords: Android, website, hospital, donor, seeker.

I. INTRODUCTION

Organ donation occurs when a voluntarily agreed. Donating organs may be of 2 types, one is when he/she is alive they can donate some of the organs such as eye, kidney. And another one after the brain death. Mobile based applications have become a part of our daily life. With revolution in mobile computing many features where added to field. This android application is developed to easily contact hospital. Once a donor has been evaluated and consent obtained, provisional allocation of organs commences. UNOS developed a computer program which automatically generates donor specific match list for suitable recipients based on criteria that they patient was listed. With android, it is fact that mobile device will have more user friendly application than ever before and putting internet in the handset of many people of the world. Even browsing through website user can do it easily.

In existing system registered user has to maintain the registered card, or his/her relatives should maintain. In case if the donor has or had any medical problem and comes toward to donate organs to the patient then it may lead to threat.

The proposed method is to create a android application in which the organs donation made easy. The donors who are all register in this application have donor card. After the death of the donor before 6hrs family members should inform the medical committee by a single step through this application

A. Objectives

- Covers donation, procurement, testing, preservation, transport and transportation of organs.
- To educate and inform the community, patients and their families and health professions about organ donation. Improve rates of donation
- Organ translation is life saving for patients with a end stage organ failure. And one of the greatest advancement in medicine.

II. LITERATURE REVIEW

Literature survey includes the current knowledge including substantive finding as well as theoretical and Methodological contribution to a particular topic.

1] Author Anish Hamlin M R and Albert Mayan J in Blood Donation App suggest that blood is one of the most necessity of our life. In our project we propose a new and efficient way to overcome such outline, such as just touch the button donor will be ask to enter an individual's details like name, phone number, age, weight, date of birth, blood group, address etc. At the emergency time of blood needs we can check for the blood donor nearby using GPS. Once the app user enter the blood group which he/she needed it will be automatically search the next donor which is present in queue.

[2]Author Igor Khokhlov, Leon Reznik in Android System Security Evaluation suggested that an application security score represents overall security level of the OS based device. The proposed application is based on the library that uses standard android OS API and Google SafteyNet library . We followed up modular approach that allows to use our library, independently from application in our stock OS 5.0 and above.

[3]Author Lance A.Allison and Mohammad Muztaba Fuad in Inter-App Communication between mobile apps is an important aspect of mobile platforms. Android is specifically designed with inter-App communication in mind and depends on this to provides different platforms to specific functionalities.

Android app an either be designed with the help of Android SDK and IDE such as Android Studio or by using a browser based platform called App-inventor.

III. METHODOLOGY

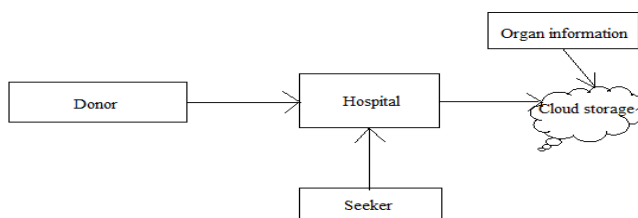


Fig 1: System Architecture

The system architecture is illustrated above which the system has 4 main domains as donors,seekers,hospital management.Both donor and seeker are provided with signup,login into the system.Hospital mamnagent plays admin rule they can view both donors and seekers records.And both donor seeker can perform deletion and modification along with viewing record.

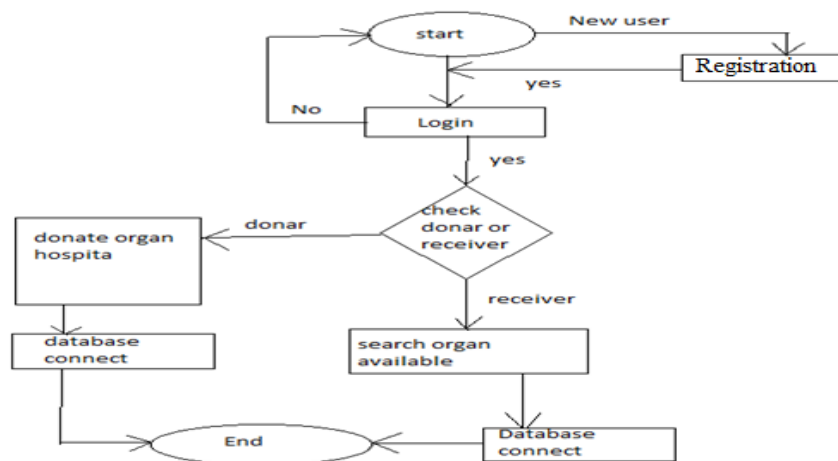


Fig 2: Flowchart of organ donation

A flowchart is type of diagram that represents an algorithm, workflow or process. The flow chart shows a step as boxes of various kinds and they order by connecting boxes with arrows. As the above figure depicts first both the donor and seeker has to login then it will check for the donors and seekers separately to perform the further process. Once the registration is done, donor or seeker needs to login into the system. If the validity of user is correct, then user can have the permission access the system.

Once the user has logged in he or she can donate or request for the organ. If the requested organ is not available then the seeker has to wait until the organ is available. If the organs are available then it will go according to FIFO manner those who registered first will get the organs first.

IV. CONCLUSION

Basic idea of our application is to provide ease to software project management. Our application works on Android, a phone that adds the mobility feature and also website. The user can access the data from anywhere anytime through the mobile phone and website. It can also estimate the cost of the project. It provides the facility to analyses and control the execution of project. Alerts are automatically sent to the users for the update in data.

V. FUTURE SCOPE

Organ transplantaion has a major role in the management of patients with failure of single organ system of the kidneys, liver, pancreas, heart, lungs or thymus. The guideline will focus on identifying potential donors and obtaining consent for solid organ donation under current legislation. It will help to address the burden of disease by increasing the availability of organs for transplant. It will address current inequalities by helping to make organ donation a usual part of NHS practice, meaning that families of all potential organ donors are approached and supported, irrespective of factors such as ethnicity and religion.

REFERENCES

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- III. Lance A.Allison and Mohammad Muztaba Fuad , “Inter-App communication between Android Apps Developed in Android Studio”.
- IV. Malgaonkar and Mukul Kulkarni ,”Multipurpose Android based Mobile Notifier”.