

GET A BITE: The charity-based application through which people can donate food, books and clothes to needy people

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ABSTRACT: - The sharp increase in the amount of wastage in terms of food makes the need for charity in terms of donation. In today's world, large amount of food is being wasted on a regular basis in our homes, Hotels weddings and parties and many other places. Many people donate food, clothes and books etc. manually by visiting different places on their own in order to solve this crisis of hunger as well as food wastage in our country. In order to help we develop a web-based application that will provide a platform to the people to donate their leftovers along with books and clothes, also the people who are in need of a meal will get something to fill their empty stomach. This platform will be of great advantage to avoid any kind of food wastage and people can also join us as volunteers who can donate food in their neighborhood. We will establish a partnership with NGO's who will be helping us to donate the food, clothes and books to the right people. This system will create a common collaboration portal for hotels/restaurants and NGO's. Hotels/restaurants, NGO's and users, registered to the admin, all of them will send a request to the admin and admin will fulfill these requests. In this system mainly there are four modules which are admin, NGO's, volunteers and third parties registered to the admin like the user, hotels, restaurants, etc. any individual or an organization trying to donate food through this application will create a new request to the admin and the admin will grant the request whenever it can.

Keywords- Web Based Application, Food donation, Cloths and books donation, Admin, NGO, Volunteer, User

I. INTRODUCTION

This application is going to help poor people of India as through this application we are going to distribute leftovers, clothes and books of the middle class and rich people to the poor people who need this food to fill their empty stomach and clothes to wear along with books to educate themselves. We will tie-up with some NGOs who will provide us details about these people and then first they will collect this food and then distribute it to the poor people who don't need taste in the food and just want to feed themselves in order to get the energy to survive. With approximately 195 million underweight people, India contributes one-fourth of the global hunger burden. Nearly 47 million or 4 out of 10 children in India are not meeting their full human potential because of chronic undernutrition or stunting. Stunting has consequences such as diminished learning capacity, poor school performance, reduced earnings and increased risks of chronic diseases. The impacts are multi-generational as malnourished girls and women often give birth to low birth-weight infants. There has also been an increase in the prevalence of overweight and obesity in children and adolescents in India, which has life-long consequences of non-communicable diseases in adulthood.

The government has huge food security and anti-famine programmed but there are demanding gaps in terms of involvement and omission failures. Women and girls are particularly handicaps. Although the achievement of national food autonomy, new challenges have appeared: Decelerate agriculture growth, climate change, land deterioration, and declining biodiversity. Large sections of farmlands in India have become desolate due to overloaded fertilizer use and extreme use of a single fertilizer, urea. With a five-fold increase in food grain manufacture from 50 million tons in 1950-51 to about 250 million tons in 2014-15, India has moved away from dependency on food aid to become a net food retailer. In 2016, the government launched a number of set-ups to double farmers' incomes by 2022.

These seek to remove bottlenecks for greater agricultural productivity, especially in rain-fed areas. They comprise the National Food Preservation Mission, Rashtriya Krishi Vikas Yojana (RKVY), the Unified Projects on Oilseeds, Pulses, Palm oil and Maize (ISOPOM), Pradhan Mantri Fasal Bima Yojana, the e-marketplace, as well as immense irrigation and soil and water harvesting compute to increase the country's gross irrigated area from 90 million hectares to 103 million hectares by 2017. The government has also taken significant steps to combat under- and malnutrition over the past two decades, such as through the introduction of mid-day meals at schools, angana systems to provide rations to pregnant and lactating mothers and subsidized grain for those living below the poverty line through a public distribution system. The National Food Security Act (NFSA), 2013, intended to secure food and nourishment security for the most sensitive through its associated project and programmed, making approach to food a legitimate right. So, by this application, we will help these people to get food.

II. LITERATURE SURVEY

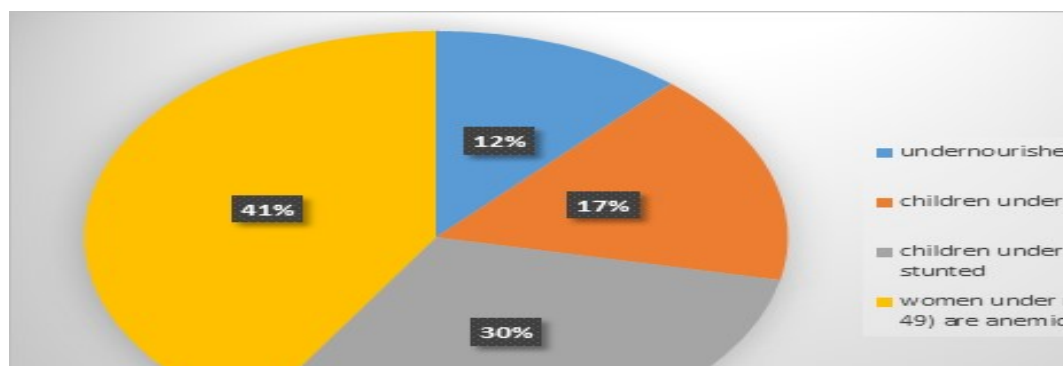


FIGURE 1- India with Population of 1.3 billion

If we take number of people undernourished (194.4 Million) as 100% then we can divide them as done in above figure 1.

According to India food banking network" India, with a population of over 1.3 billion, has seen tremendous growth in the past two decades. Gross Domestic Product has increased 4.5 times and per central utilization has increased 3 times. Similarly, FOOD grain manufacture has increased almost 2 times. However, despite substantial industrial and commercial expansion and while India produces plenty of food to feed its population, it is unable to provide access to food to a large number of people, especially women and children".

According to FAO evaluates in 'The State of Food Security and Nourishment in the World, 2019' report, 194.4 million people are underweighted in India. By this measure, 14.5% of the population is underweight in India. Also, 51.4% of women in reproductive age between 15 to 49 years are anemic. Further according to the report 37.9% of the children aged under five in India are decreased (too short for their age), while 20.8% suffer from drain, meaning their weight is too low for their height. Malnourished children have a higher risk of death from common childhood illnesses such as diarrhea, pneumonia, and malaria. The Global Hunger Index 2018 ranks India at 103 out of 119 countries on the basis of three leading index -- popularity of wasting and decrease in children under 5 years, under 5 child fatality rate and the proportion of underweight in the population.

The paper "Food donations using a forecasting-simulation model" [1], published in 2016, provides an approach to measure donations for non-profit hunger relief institutions. These institutions are committed to mollifying hunger around the world and rely primarily on the benevolence of donors to accomplish their goals. However, the amount and frequency of donations they obtain changes significantly over time which puts forward an obstacle in their battle to terminate starvation. A simulation model is prepared to assess the expected amount of food donations obtained per month in a multiwarehouse allocation network. The simulation model is built on a state-space model for exponential flattening. A numerical survey is carried out utilizing data from a non-profit hunger relief institution. The outcomes show that excellent evaluation accuracies can be accomplished with this approach. Furthermore, non-profit hunger relief institutions can use this approach stated in this paper to foretell donations for proactive planning. The paper 'Helping Hands' [2], published in 2016, a modern web-based application that provides a steppingstone for donating old goods and leftover food to all poverty-stricken/institutions. It provides facts and data about the encouragement to come forward with such an application, thereby outlining the current donation system and how the suggested product works for the betterment of society. The drawbacks of this project is that there is no control panel available that is, at the month end the system don't get all the facts and data that how much things are donated or received by someone.

The paper 'Beyond food sharing: Supporting food waste reduction With ICTs' [3], published in 2016, stated that food security plays a major role in enhancing the quality of life of people at all levels of society. The latest economic crisis has raised the number of people living in conditions of food poverty, especially in developed areas. Despite a growing awareness about the significance of reducing waste and controlling food surplus, the role of ICTs in this domain is still not so clear and barely documented. This paper tells us about the use of ICT tools to restore food surplus at various stages of the supply chain and also tell us the way forward for an integrated set of ICT tools to mitigate waste out of producers to houses.

The paper 'Food Wastage Reduction through Donation' [4], published in 2018, stated that large amount of food is wasted in marriages, restaurants, social functions and some other places. So they come up with an idea of developing a web-based application through which people would be able to donate their leftovers easily without doing any manual work. They worked on developing a food donation portal in which large retail chains and potentially other organizations can donate food. Their application focused solemnly on food donation and no other items like clothes or books etc.

The paper 'Mobile Application for Excess Food Donation and Analysis' [5], published in 2018, stated that 1.3 billion tons of food is usually wasted every year and One third of food consumed are leftover. They focused on developing an android application that utilize data analysis to visualize the impact of excess food, thus reducing food wastage. They focus on feeding the hungry people and reducing food wastage at once. They send notification to nearby NGO's, orphanages and volunteers to pick the food.

The paper "Food donation portal" [6], which was published in 2015 tell us about the evolution of food donation services and offers a way to connect donors with NGOs. An idea for a food donation grid is introduced and influence on society through this means is indicated. The drawback of this paper is that there is no GPS service available to track the person who will pick the donation from the donor which means the system does not permit the institution or NGO to find the closest donor ready to donate in the region and they have to find the donors on their own.

III. PROPOSED SYSTEM

The proposed system is a web-based application which provides a platform to the people for donating their left-over food along with books and clothes to all the people who are in need of these items. Through this application people can effectively donate food (left-overs) and stuff from their homes or workplace conveniently through internet. India

is a highly populated country where a lot of food is wasted in marriages, parties, family get-togethers and even in their day to day life whereas some people don't even get a single meal in a whole day. So, with the help of this application leftovers along with books and clothes can be donated to many organizations like orphanages, schools and institutions, beggars or to the people who need these things. This system basically consists of four modules which are admin, NGOs, volunteer, user. User, NGO and volunteer would be registered to the application and admin has access to all their data and will be responsible for accepting and denying the requests, can give approval for login and approval to volunteer or NGO for picking the item from donator's place and then volunteer/NGO can donate the item.

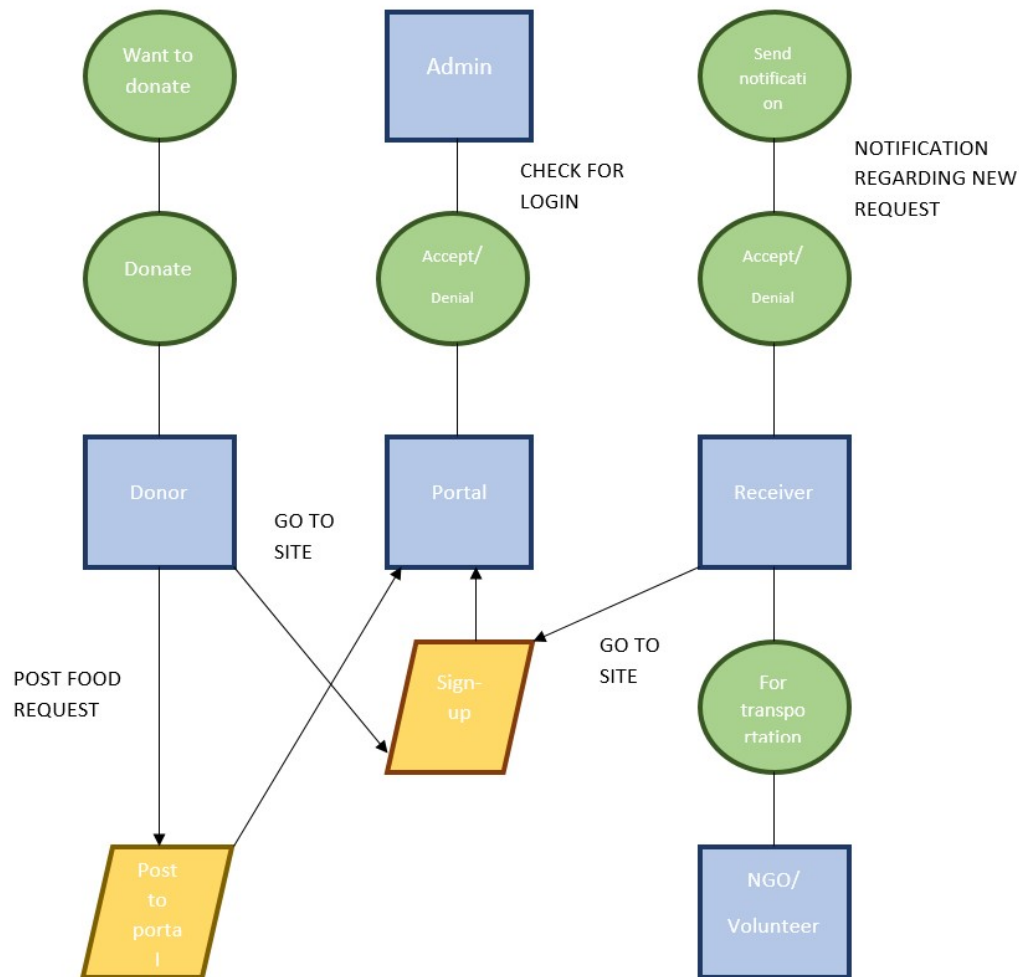


Figure 2- workflow of project

IV. DESIGN OF PROPOSED SYSTEM

Project is divided into following three section:-

- 1) **UI Design**:- This phase consists of the user interface through which people other than admin are going to interact with the admin using the application. The technology used for designing the front end of the applications are **html5, CSS, bootstrap, jQuery, JavaScript**.
- 2) **Database design**:- This phase consists of all the login id details of user, NGO, volunteer and all the other data that needs to be stored. Database is a necessary component of any application as it is used to store the all the data. It will store the data like how much item is donated by which user, the date and time of donation etc. in the forms of tables. The technology used to create database is **Workbench, MySQL, and CMD**.
- 3) **System design** :- The system is divided into four modules which are **Admin, NGO, Volunteer, and User**.

- A) ADMIN:- Admin will be responsible for accepting and denying all the request regarding donation. When someone will post a request for donation than admin can accept the donation request and grant it to a volunteer or NGO, or admin can cancel the request according to then circumstances.

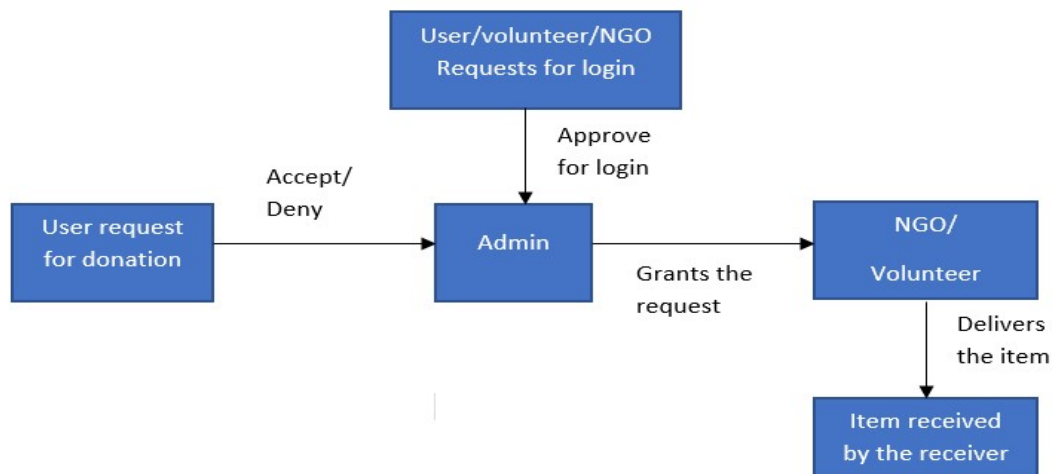


Figure 3-Admin module

- B) NGO:- NGO will help us in distributing these items to the right places and people. They will register to our application and when admin will grant them a request of donation than they will fulfill it by delivering the item to the receiver.

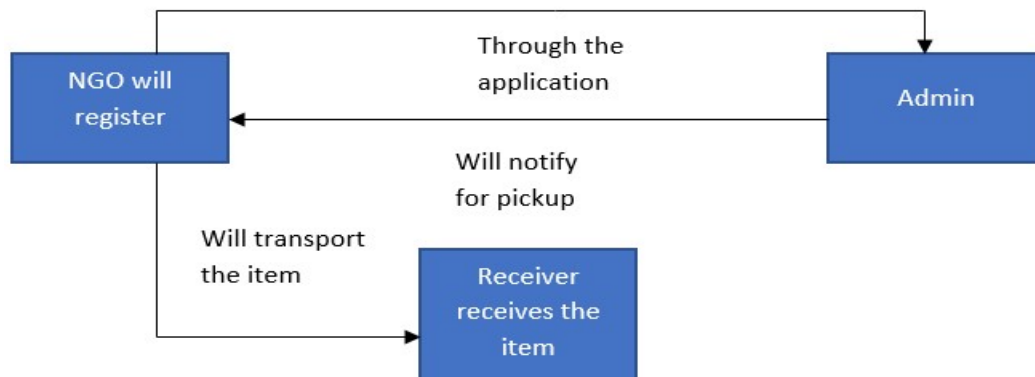


Figure 4-NGO module

- C) Volunteer:- Volunteer will also join us by registering to the application and will volunteer for picking up the food from pickup location and donating it to the receiver.

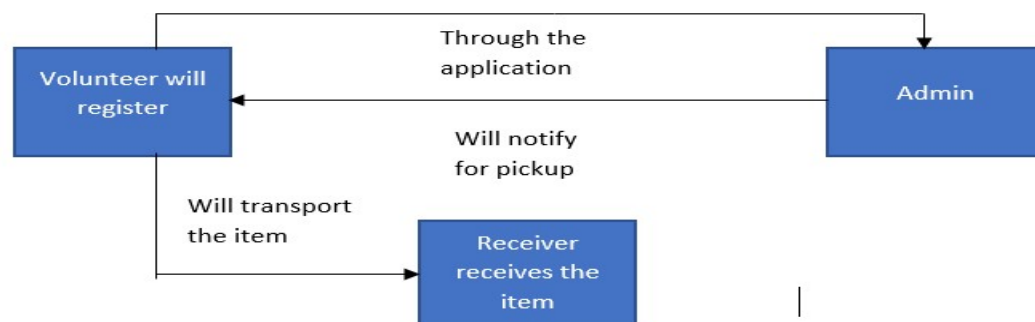


Figure 5-Volunteer module

D) User:-User will also register to the application and login to the application after which he/she will request a pick up for the item they are willing to donate and then if admin accepts the request than someone will collect the item from the user. User can check whether his request has been accepted or not.

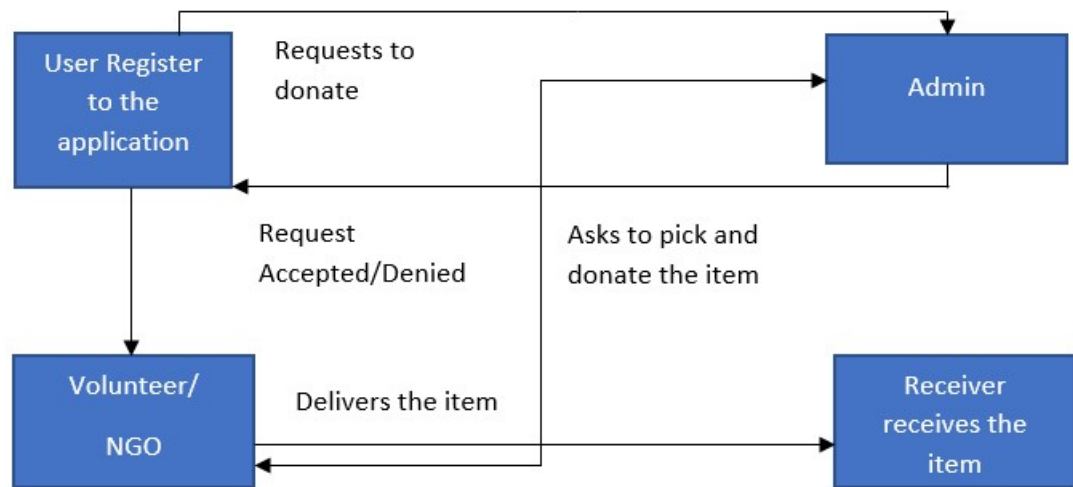


Figure 6-User module

V. AUTHENTICATION AND SECURITY

Authentication is a very important phase for the admin in which user needs to give verifications in order to get access to the application. In this process user needs to provide login credentials like user id and password every time user wants to log in to the application. That is why all the data which user provides during registration is stored into the database of the system so that he/she can be verified whenever they try to login using that stored data. This data of the user is confidential and is not shared with anyone but user himself, as user can check this data under his/her profile. If user forgets his/her login credentials than admin will help him in login process by contacting him via email id or contact number. The address of the user will be shared to the volunteer/NGO when they request for a pickup for the item they want to donate.

VI. FUTURE SCOPE

This application has a wide scope in future as India is a developing country which consist of rich as well as poor people. Some people have access to a lot of things whereas some people can't even afford a basic lifestyle. If this donation business will be put online than people can donate their extra stuff without any discomfort and those who really need this stuff can have these items. Moreover, this application will be of great use in case of a natural calamity like an epidemic break where people would be able to donate food and clothes in time of need to their fellow citizens of India. Hundreds of thousands of food is wasted in celebrations like a wedding or a party just because nobody wants to spend their time in finding people for donating their food so our application will ease their work as they don't have to take do anything but just register to this application and someone will pick up the items they want to donate from their doorstep. This application can bring a great revolution in solving the food crisis problem of India.

VII. CONCLUSION

It can be said that if this application will reach to all the people of India than it is going to bring joy in life of many people as some will feel happy by donating food, clothes and books and the people who will receive these items will also feel euphoriated. This application can play a major role to help India become more developed in coming future by making all the citizen of India happy and prosperous.

This application will help those people who suffers from malnutrition and salvation, people who can't get books to educate themselves, and people who have to wear same torn old clothes in their daily life. This is an initiative taken by us to help the citizen of our country by making their life easier.

VIII. REFERENCES

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