ONLINE TREE PLANTATION
A MINOR PROJECT REPORT

Submitted in partial fulfilment of the requirement for the award of Degree of

Master of Computer Applications

Submitted to

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MASTER OF COMPUTER APPLICATIONS

ACROPOLIS INSTITUTE OF TECHNOLOGY AND RESEARCH, INDORE

SESSION 2018-19

CERTIFICATE

This is to certify that, the project assigned on **'TREEPLANTATION'**has been successfully completed by **Mr. RISHABH SHUKLA& Mr. ANIMESH CHOUREY** of Acropolis Institute of Technology and Research.

The project is being completed as a part of the syllabus and also in partial fulfillment of the two-year full-time degree of Master of Computer Application conducted By Rajiv Gandhi Prodyogiki Vishwavidyalaya Bhopal (M.P).

ABSTRACT

This project is aimed at developing an online tree plantation and environmental protection. This article reviews the recent global expansion of different types of tree plantation. The review collates accounts from recent academic publications and by international, regional and local NGOs. Central features and likely futures of contemporary tree plantation expansion. This article offers the largest and most up-to-date review of tree plantations and tree plantation studies in the world and the very latest research and data is surveyed. Thousands of plants/vegetations existed with rich environmental value, medicinal value and nutrias values in south India with its tropical climate. They were mingled with the people's traditional and cultural life as livelihoods, medicine, nutrias, food, the god and full of spiritual power. But now lack of people interest and less motivation, they are losing so much the values and environmental life along with livelihoods. In the name of development, deforestation for industries, real-estate, tourism place, mono-crop cultivation/green revolution, etc takes place. Hills forest, plain forest, temple forest, bushes type forest and agro forest are under destruction. So, people are facing issues on livelihoods, fresh air, water, food, health, traditional and customaries rights and safety life

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ACKNOWLEDGEMENT

We are extremely grateful and remain indebted to our director sir **Mr. S.CSharma,Acropolis Institute of Technology & Research,Indore**for all the help they provided for the completion of project.

We express our deep gratitude to **Mrs. Geeta Santosh** and also for being a source of inspiration and for her constant support in the Design, Implementation and Evaluation of the project.

We are thankful to our project coordinator **Mrs. Varsha Sahga**l for their constant constructive and valuable suggestions, which benefited us a lot while developing the project on **"TREE PLANTATION.**

She has been a constant source of inspiration and motivation for hard work. She has been very co-operative throughout this project work. Through this column, it would be our utmost pleasure to express our warm thanks to her for their encouragement, co-operation and consent without which we mightn't be able to accomplish this project.

ACROPOLIS INSTITUTE OF TECHNOLOGY & RESEARCH, INDORE

F.C.A. Department

Following are the guideline for the Report's content.

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CHAPTER 1

INTRODUCTION

Tree Plantation means planting more trees in a planned way. It is necessary to the environment. Trees are our best friend.Theygive us oxygen. They also give shelter, shade, foods, fruits etc. They help our environment in many ways. They prevent soil erosion. They make our land fertile. If there are no trees our country will turn into desert.

Choosing a tree should be a well-thought-out decision. Tree planting can be a significant investment of money and time. Proper selection can provide you with years of enjoyment as well as significantly increase the value of your property. An inappropriate tree for your property can be a constant maintenance problem or even a hazard. Before you buy, take advantage of the abundant references on gardening at local libraries, universities, arboretums, parks where trees are identified, native plant and gardening clubs, and nurseries. Some questions to consider in selecting a tree include:

Trees can serve numerous landscape functions including beautification, screening of sights and sounds, shade and energy conservation, and wildlife habitat.

Some trees can live for hundreds of years. Others are considered "short-lived" and may live for only 20 or 30 years. Many short-lived trees tend to be smaller ornamental species. Short-lived species should not necessarily be ruled out when considering plantings. They may have other desirable characteristics, such as size, shape, tolerance of shade, or fruit, that would be useful in the landscape. These species may also fill a void in a young landscape, and can be removed as other larger, longer-lived speciesmature.Withoutconsideration of environment, daily thousands of plants and trees are cut and destroyed and so these are making a very challenge on environment values and impacting on Asian and global environmental value and natural disaster. In other side, low rain fall makes failure in cultivation and livelihoods that are causing drought, famine, destruction of lives and livelihoods. Today Ayurveda and Siddha, which are traditional and potential medicine system-based flora in India and several other countries and curing diseases as miracle which are incurable by other medicine system.

CURRENT SYSTEM

The main aim of project is to establish green society of India to be a healthy world and to make pollution free earth. This is an internet-based application that can be accessed throughout the world. The current system for plantation is to donate money at nursery for plantation The Tree plantation is gaining more importance as the number of its users are increasing rapidly. As the number is rising there is a need of effective system for plantation, one such effective system is our Tree plantation System its designed using php, html, CSS as frontend and SQL as backend. The transactions like login, select tree which you want to donate for plantation, search, issues are provided. The details of plants are available here. This system can be used for tree plantation, type of the plant can be selected for plantation. Our expert gardening advisor, Susan Patterson recommends, "It is always wise to take a soil sample before planting a tree to be sure that your soil will provide the necessary nutrients that the tree needs to thrive."

1.2 NEED FOR PROPOSED SYSTEM

- Help us to make Environment greenery
- Choosing a tree should be a well-thought-out decision. Tree planting can be a significant investment of money and time. Proper selection can provide us with years of enjoyment as well as significantly increase the value of your property. An inappropriate tree for your property can be a constant maintenance problem or even a hazard. Our expert gardening advisor, Susan Patterson recommends, "It is always wise to take a soil sample before planting a tree to be sure that your soil will provide the necessary nutrients that the tree needs to thrive."
- Reduces Climate change
- As tree grow, they help stop climate change by removing carbon dioxide from the air, storing carbon in trees and soil, and releasing oxygen into the atmosphere
- Trees contribute to their environment by providing oxygen, improving air quality, climate amelioration, conserving water, preserving soil, and supporting wildlife. During the process of photosynthesis, trees take in carbon dioxide and produce the oxygen we breathe. According to the U.S. Department of Agriculture, “One acre of forest absorbs

six tons of carbon dioxide and puts out four tons of oxygen. This is enough to meet the annual needs of 18 people." Trees, shrubs and turf also filter air by removing dust and absorbing other pollutants like carbon monoxide, sulfur dioxide and nitrogen dioxide. After trees intercept unhealthy particles, rain washes them to the ground.

- **1.3PROBLEM FORMULATION**

- Software is to be developed for tree plantation. The system should be stand alone in nature. It should be designed with a focus on tree plantation and environmental protection it is the best way to make our environment greenery:
- Any person can donate the plant from any place with the of our project. The person has to select the plant which he wants to donate and the he has to select the payment option and then he has to pay for that plant then our NGO will plant that tree in the public area which makes the public area greenery

CHAPTER 2
SPECIFICATION OF FRONT-END AND BACK-END

2.1 Front-end system

A front-end system is part of an information system that is directly accessed and interacted with by the user to receive or utilize back-end capabilities of the host system. It enables users to access and request the features and services of the underlying information system. The front-end system can be a software application or the combination or hardware, software and network resources.

A front-end system is primarily used to send queries and requests, and receive data from the back-end system or the host information system. It serves or provides users with the ability to interact and use an information system. Typically, front-end systems have very limited computational or business logic processing capabilities and rely on the data and functions from the host system. However, some advanced level front-end systems do maintain copies of data, such as a duplicate of each transaction sent to the back-end system.

A front-end system may include or consist of textual or graphical user interface (GUI) and/or a front-end client application that is connected by the back-end system.

Front-end system: HTML,CSS,PHP,JAVASCRIPT(BASIC).

HTML

First developed by Tim Berners-Lee in 1990, **HTML** is short for **Hypertext Markup Language**. HTML is used to create electronic documents (called pages) that are displayed on the World Wide Web. Each page contains a series of connections to other pages called hyperlinks. Every web page you see on the Internet is written using one version of HTML code or another.

CSS

stands for Cascading Style Sheets.CSS describes how html elements are to be displayed on screen paper, or in other media **.**CSS saves a lot of work. It can control the layout of multiple web pages all at once. External stylesheets are stored in CSS files.

PHP

PHP was written in the C programming language by Rasmus Lerdorf in 1994 for use in monitoring his online resume and related personal information. For this reason, PHP originally stood for "Personal Home Page". Lerdorf combined PHP with his own Form Interpreter, releasing the combination publicly as PHP/FI (generally referred to as PHP 2.0) on June 8, 1995.

2.2 Back-end System

A back-end system is any system that supports back-office applications. These systems are used as part of corporate management and they work by obtaining user input and gathering input from other systems to provide responsive output.

The separation of front-end and back-end computer systems simplifies the computing process when dealing with multilayered development and maintenance. Back-end systems deal with databases and data processing components, so the purpose of the back-end system is to launch the operating system's programs in response to front-end system requests and operations. In other words, the back-end system implements responses to what the front end has initiated.

Back-end system: SQL SERVER

SQL:SQL stands for Structured Query Language. sql lets you access and manipulate databases. SQL became a standard of the American National Standards Institute (ANSI) in 1986, and of the International Organization for Standardization (ISO) in 1987.

Chapter 3

SYSTEM ANALYSIS

IT is a process of planning a new business system or replacing an existing system by defining its components or modules to satisfy the specific requirements. Before planning, you need to understand the old system thoroughly and determine how computers can best be used in order to operate efficiently.

System Design focuses on how to accomplish the objective of the system.

System Analysis and Design (SAD) mainly focuses on –

- Systems
- Processes
- Technology

What is a System?

The word System is derived from Greek word systema, which means an organized relationship between any set of components to achieve some common cause or objective.

A system is "an orderly grouping of interdependent components linked together according to a plan to achieve a specific goal."

3.1REQUIREMENT ANALYSIS

3.1.1 Purpose:

Aim of planting tree is to make the environment greenery. Planting trees is holy act. One tree is equated to 10 children. Planting tree reduces carbon dioxide,a principal greenhouse gas that contribute to global warming. Tree contributes to their environment by providing oxygen.

3.1.2 Scope:

The mainstay of rural economy is agriculture and allied occupation, about 85% of the rural population are engaged in agriculture and agricultural labor. The proposed Tree Plantation aims at helping the tribal establish mix tree plantation to provide long term sustainable income & keeping of environment balance in environment.

3.1.2 Overall Description:

This **“ACADEMIC CENTRE”** has been computed successfully and is also tested successfully by taking test cases. It is user friendly and has required options which can be utilized by the user to perform the donation for the environment.

3.2 Requirement Specification

3.2.1 Functional Requirement:

A **functional requirement** defines a function of a system or its component. A function is described as a set of inputs, the behavior, and outputs. **Functional requirements** may be calculations, technical details, data manipulation and processing and other specific functionality that define what a system is supposed to accomplish.

3.2.2 Non-Functional Requirement:

. Product Requirements

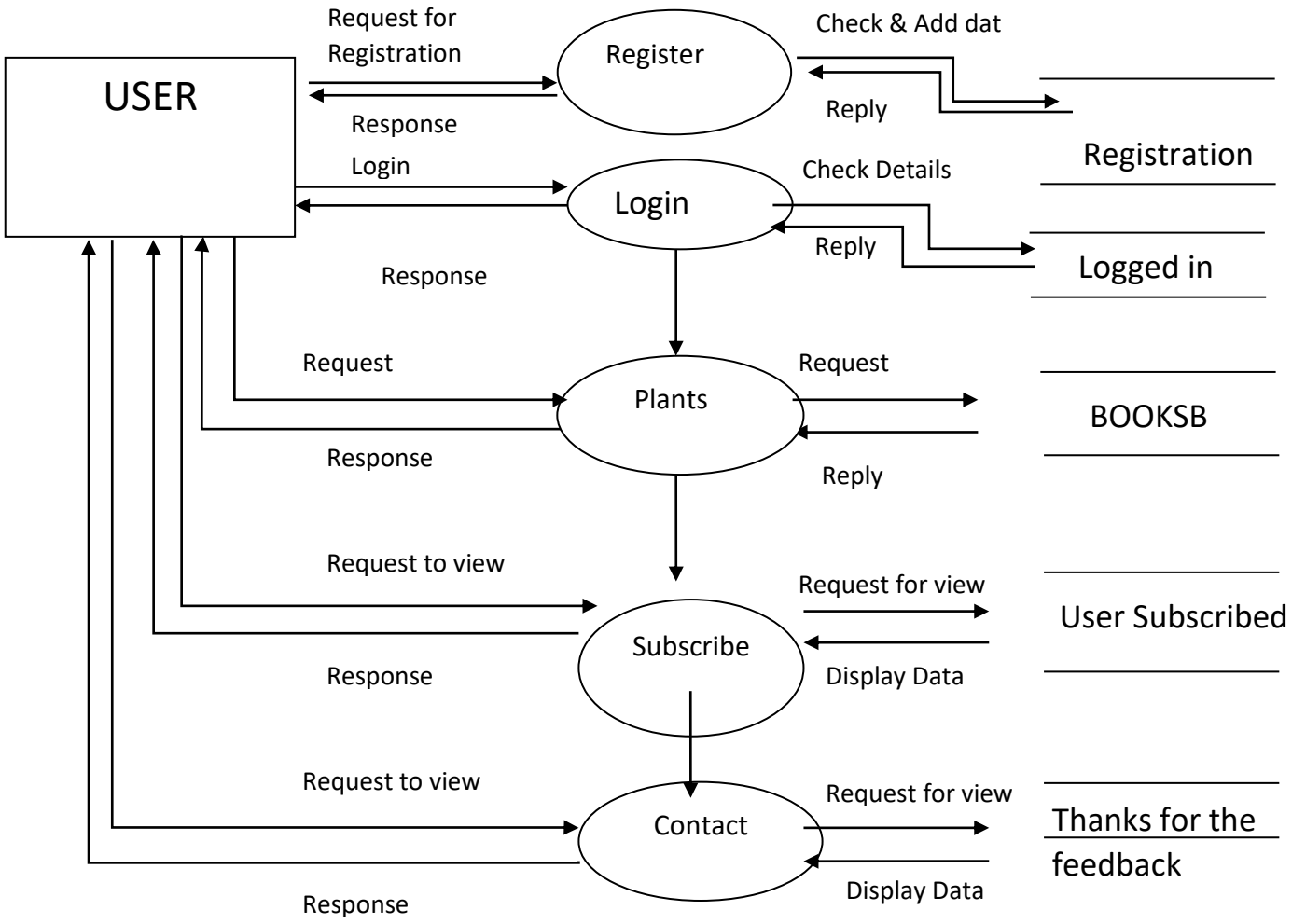
• Usability Requirement
The system shall allow the users to access the system from the Internet using HTML or it’s derivative technologies like XML/CSS.

• Availability Requirement
The system is available 100% for the user and is used 24 hours a dayand 365 daysa year. The system shall be operational 24 hours a day and 7 days a week.

• Accuracy
The system should accurately provide real time information taking into consideration various concurrency issues.

• Performance Requirement
The information is refreshed at regular intervals depending upon whether some updates have occurred or not. The system shall respond to the member in not less than two seconds from the time of the request submittal.

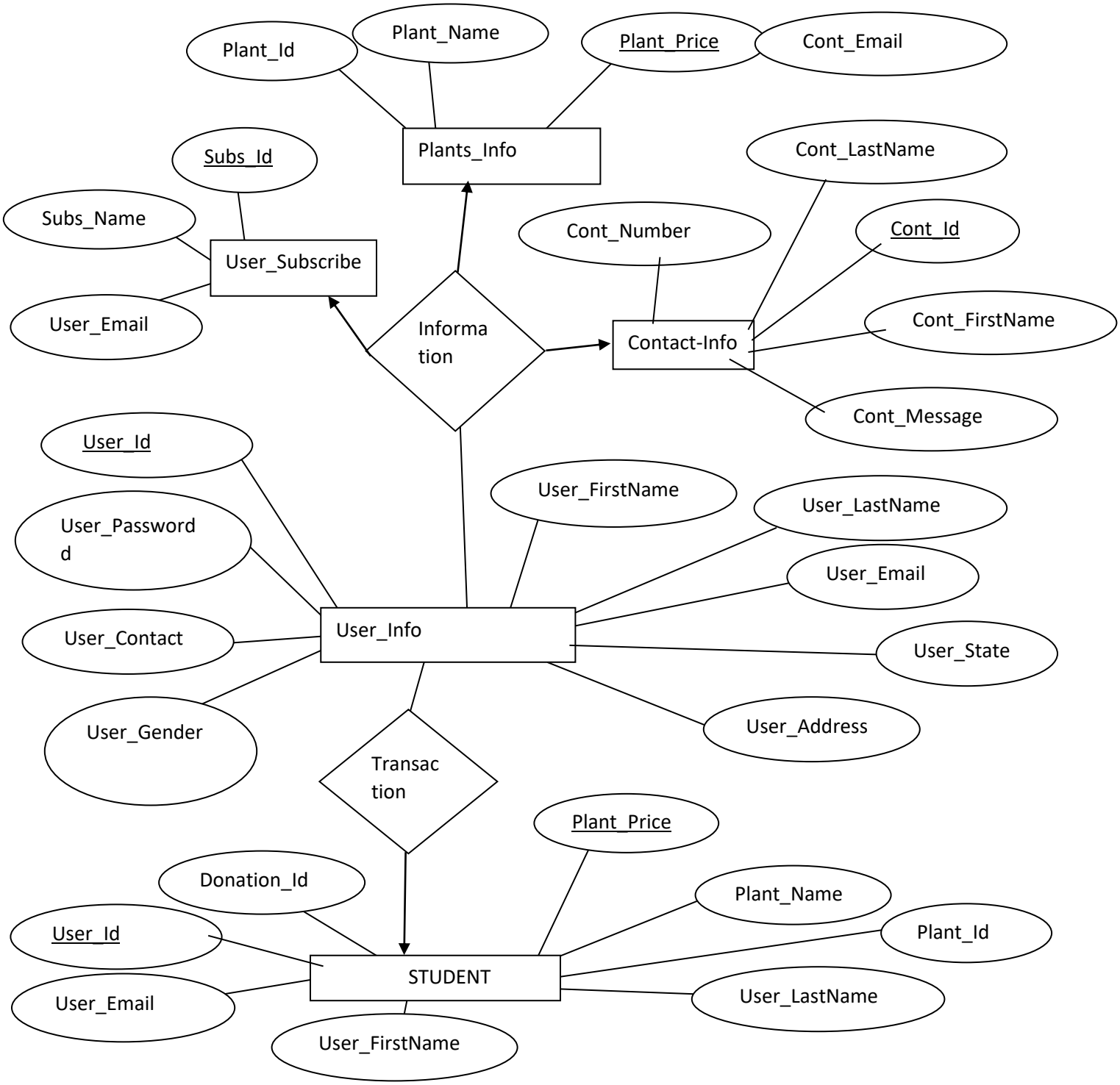
Data Flow Diagram



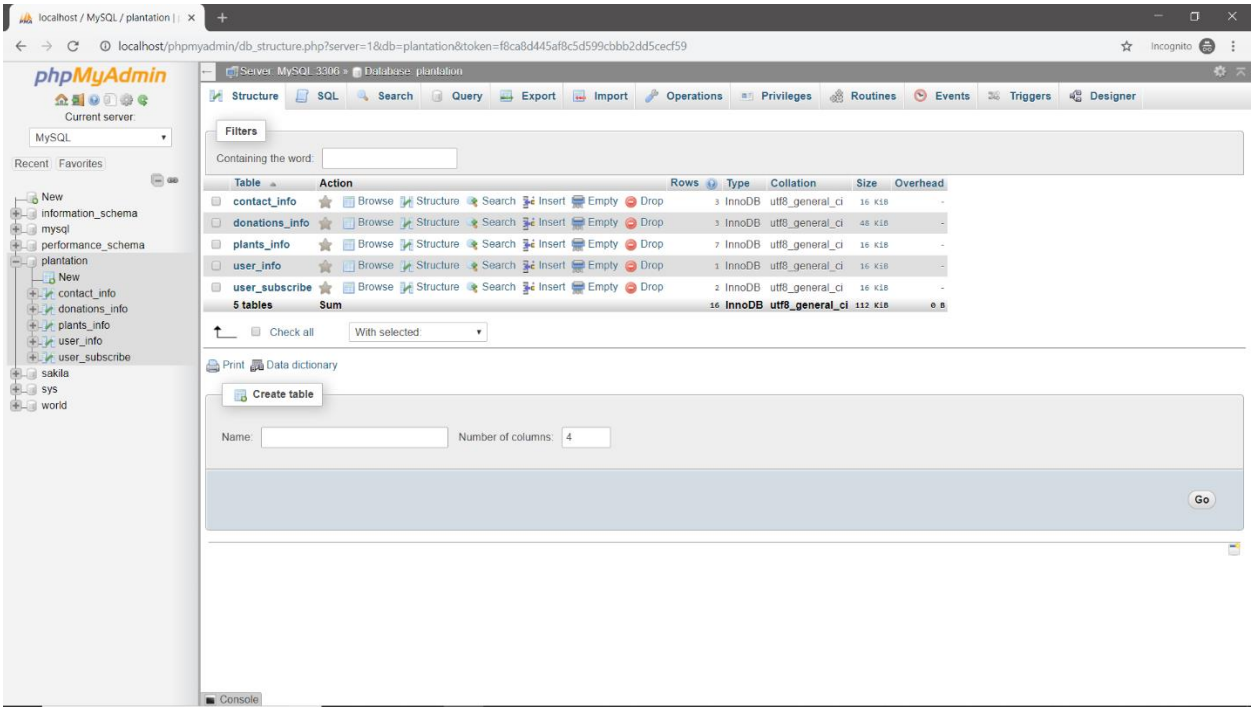
Chapter 4

DESIGN

4.1 ER DIAGRAM



4.2 DATABASE DESIGN



4.3 MODULES IDENTIFIED

MODULES IDENTIFIED INTREE PLANTATION

4.3 Module Identified:

The system should be designed in such a way that only authorized people be allowed for plant donationand can access some particular modules. The records should be modified by only administrators and no one else. The user should always be in control of the application and not the vice versa. The user interface should be consistent so that the user can handle the application with ease and speed. The application should be visually, conceptually clear.

4.3.1 User Module:

- **Home:** This module define that the user can get some information about our project and can also learn how to make environment greenery.
- **Plants:**This module define the types of the plants available in our website with their prices.
- **Sign up:** This module is used to do the registration of the user.
- **Subscribe:** This module defines that, If the user wants to subscribe our page so by entering the name and email id the user can subscribe our page by subscribing, he can get some notification regarding to our website.
- **Blogs:** This module defines that the links which are attached to us so in blogs we can watch the videos related to that link and some links of NGOs also where we get information how they are working for the environment.

CHAPTER 5

IMPLEMENTATION

5.1 Platform Used:

5.1.1 Hardware Platform:

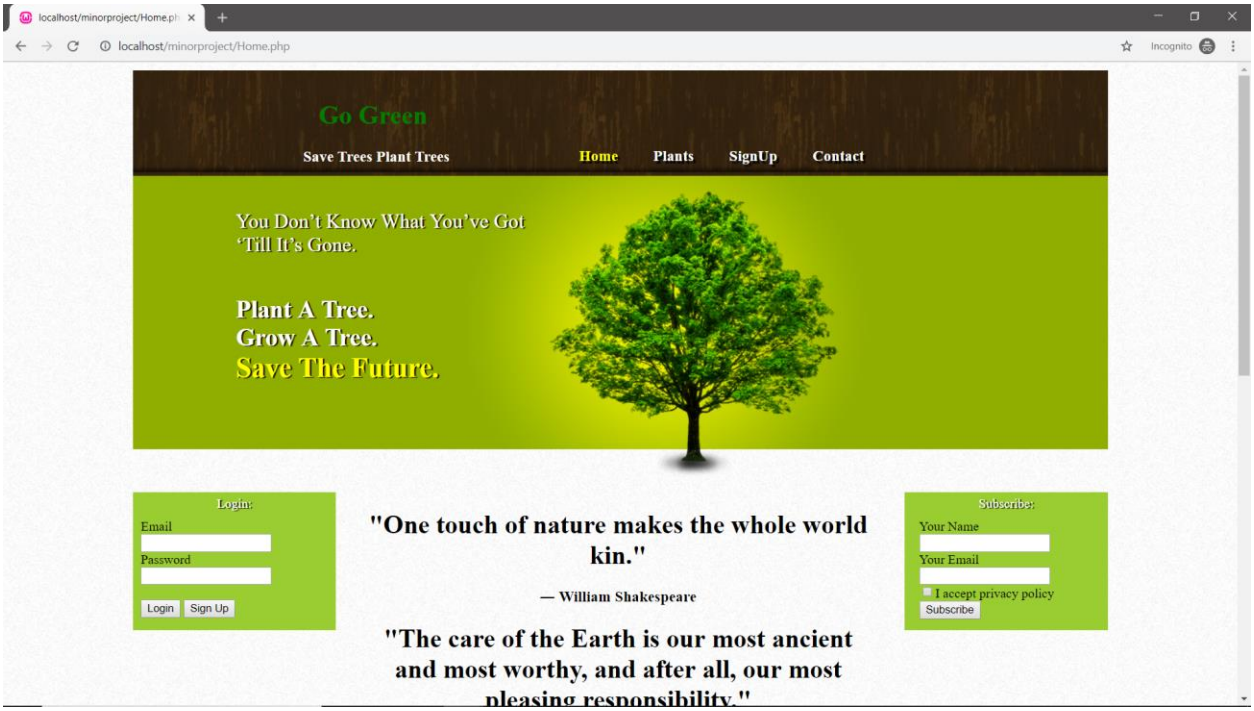
Component	Minimum requirement
Processor	64-bit, four-core, 2.5 GHz minimum per core
RAM	2 GB for developer and evaluation use
Hard disk	2 GB for installation For production use, you need additional free disk space for day-to-day operations. Add two times as much free space as you have RAM for production environments.
Computer and Processor	1 GHz or faster x86/x64 processor with SSE2 instruction set
Memory	1 GB RAM (32-bit) 2 GB RAM (64-bit)
Hard disk	2 GB available
Operating system	Supported versions: Windows 7 Windows 8 Windows 8.1 Windows 10 Android

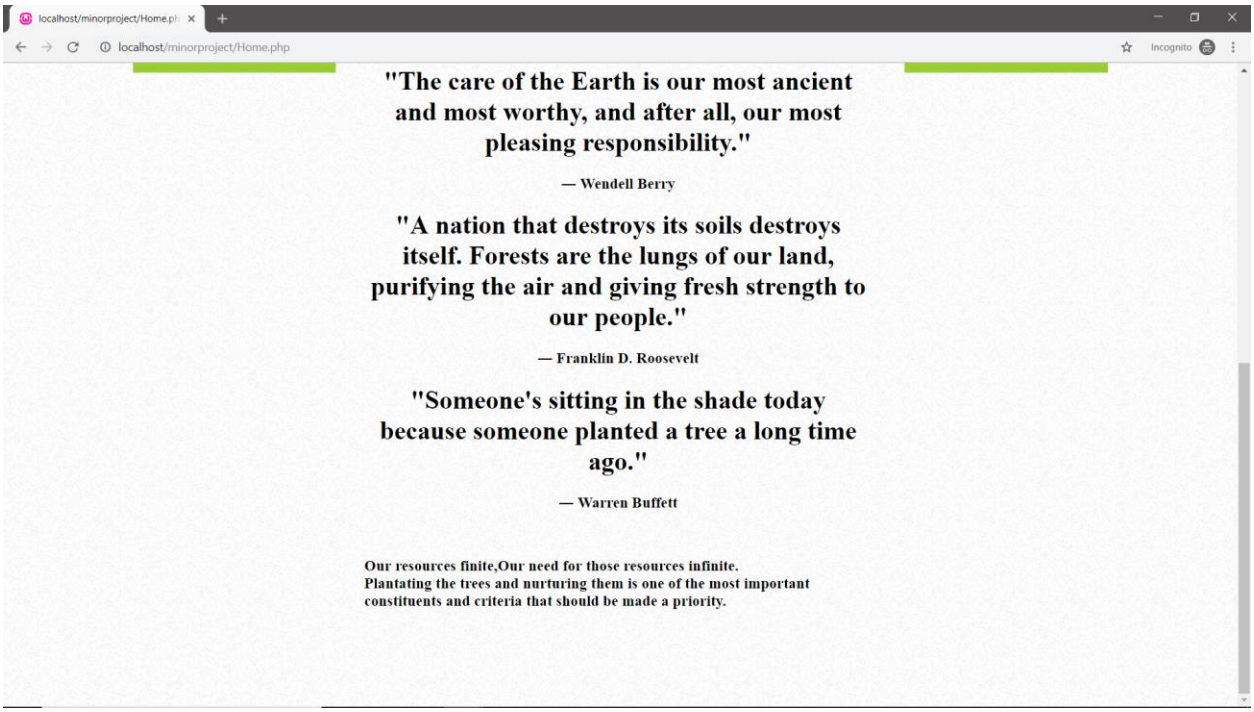
Component	Minimum requirement
	IOS

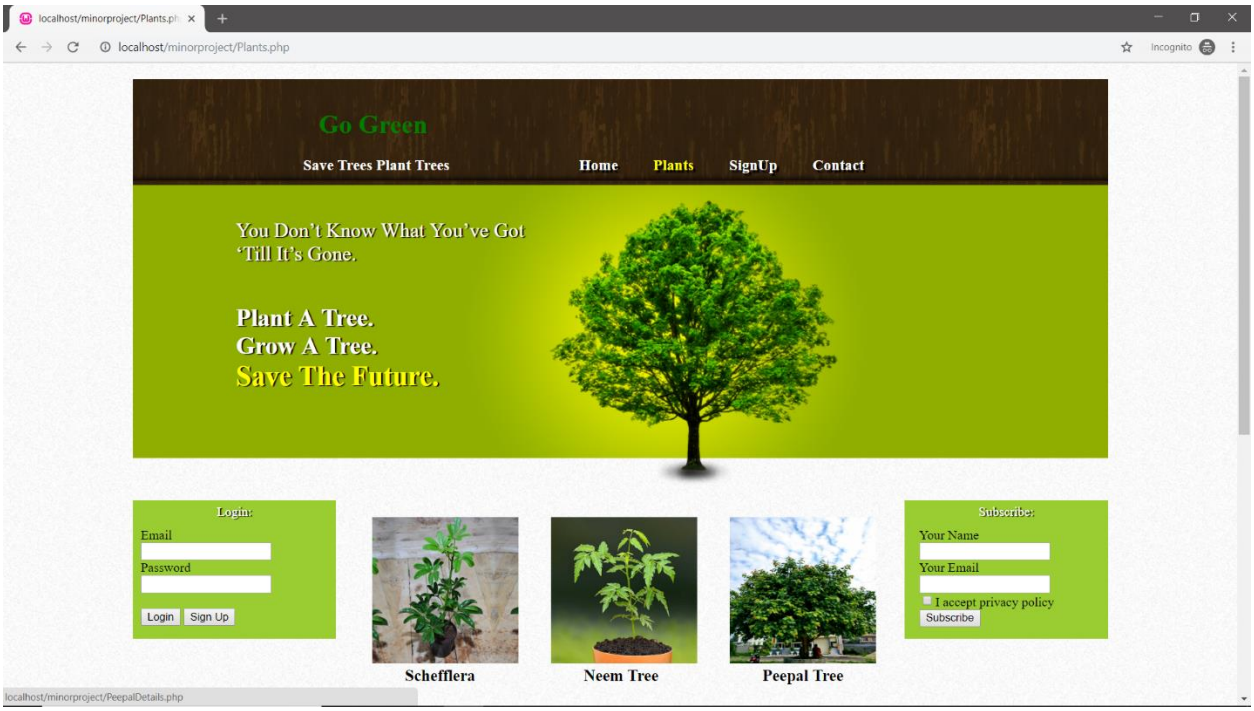
5.1.2 Software Platform:

Software's can be defined as aprogram which can run on our computer. It acts as petrol in a vehicle. It provides the relationship between the human and a computer. It is very important to run software to function the computer. Various Software's are needed in this project for its development.

5.2 Implementation Level Details



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Go Green
Save Trees Plant Trees
Home
Plants
SignUp
Contact
You Don't Know What You've Got
'Till It's Gone.
Plant A Tree.
Grow A Tree.
Save The Future.
Login:
Email
Password
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Sign Up
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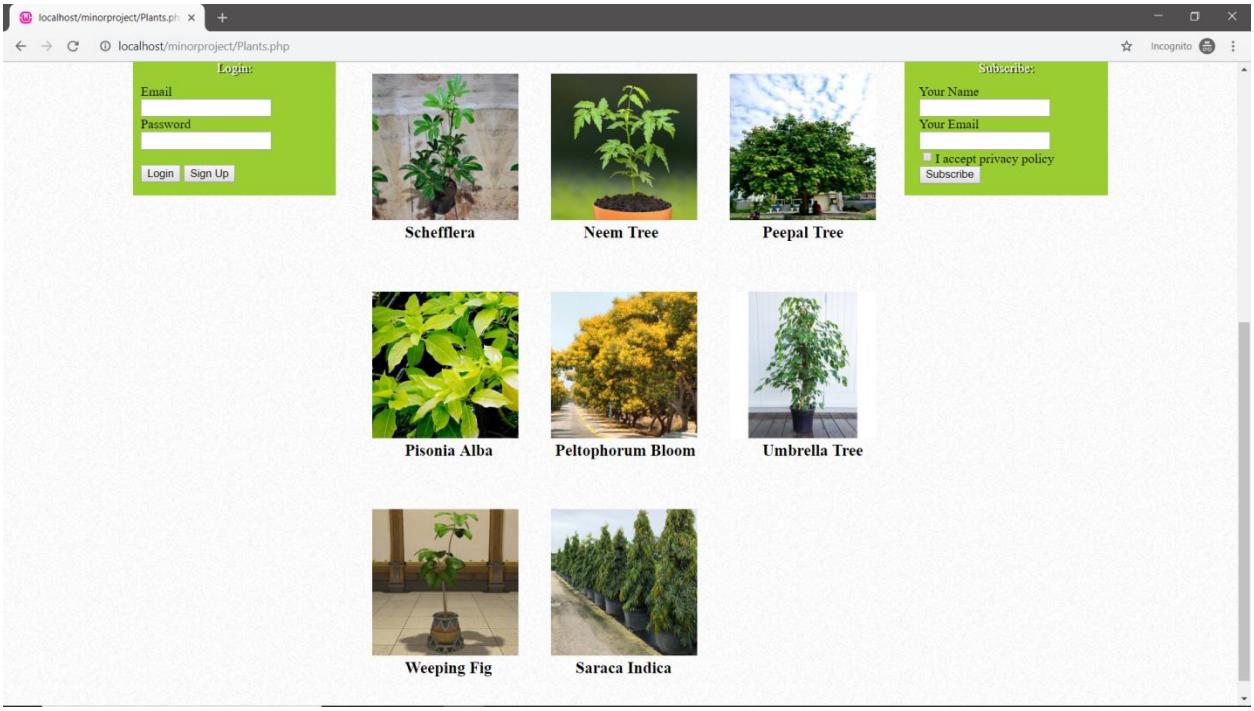
Peepal Tree
Subscribe:
Your Name
Your Email
I accept privacy policy
Subscribe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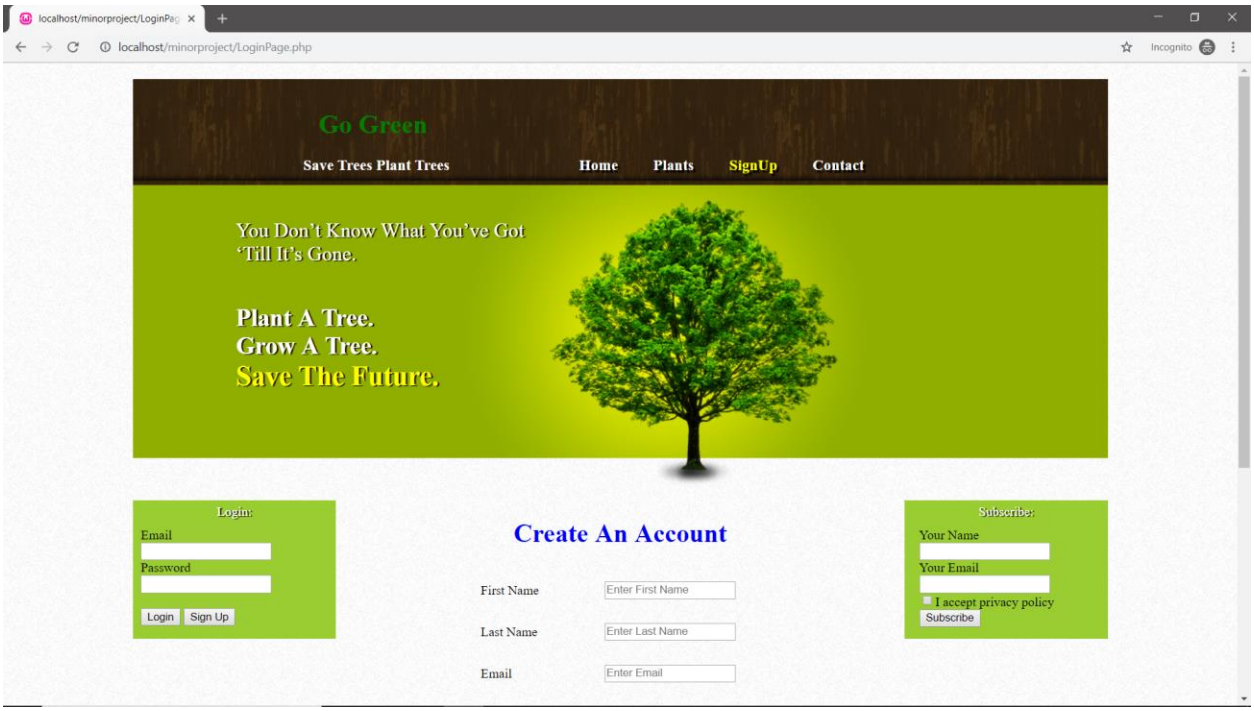
Neem Tree
Peepal Tree
Subscribe:
Your Name
Your Email
I accept privacy policy
Subscribe
Pisonia Alba
Peltophorum Bloom
Umbrella Tree
Weeping Fig
Saraca Indica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Login:
Email
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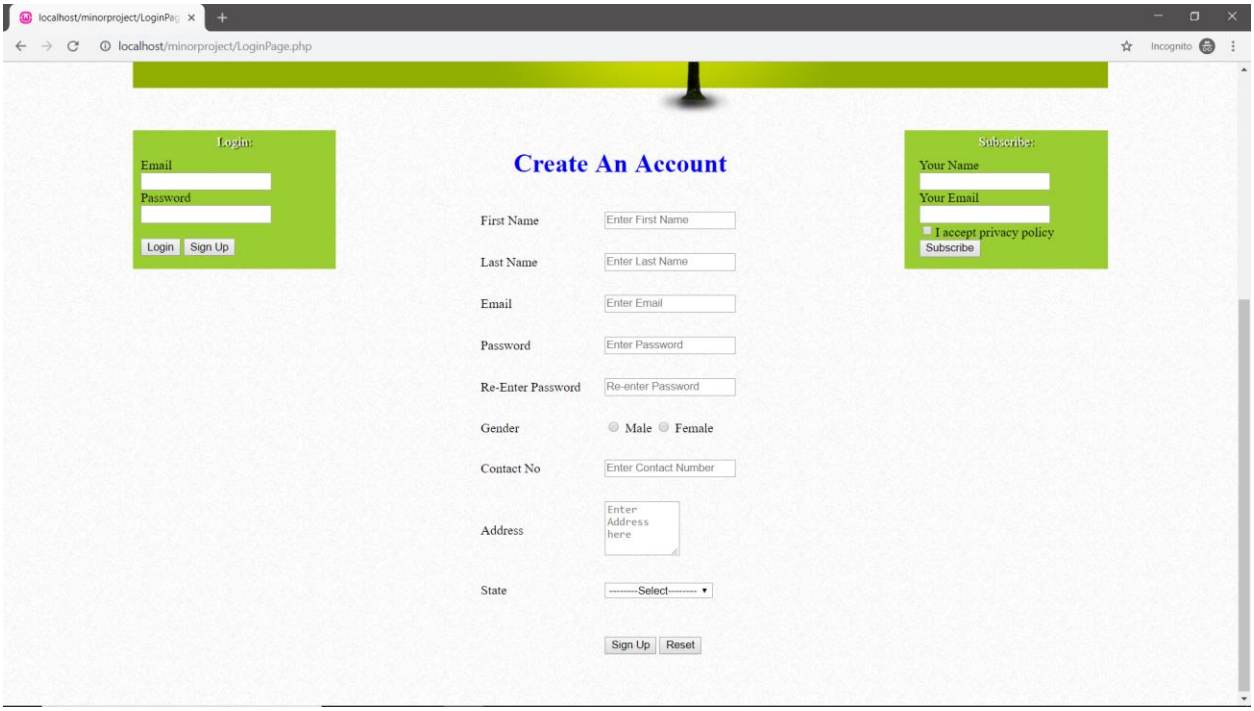
Login
Sign Up
Create An Account
First Name
Enter First Name
Last Name
Enter Last Name
Email
Enter Email
Subscribe:
Your Name
Your Email
I accept privacy policy
Subscribe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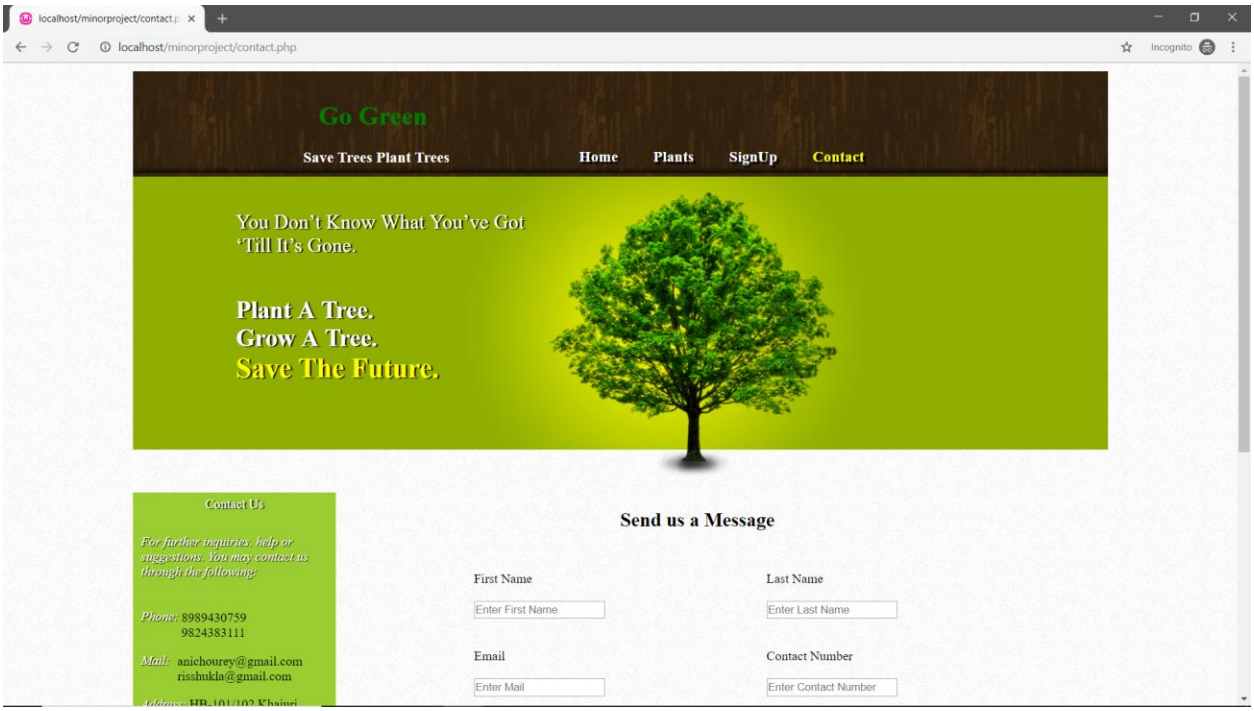
Login:
Email
Password
Login
Sign Up
Create An Account
First Name
Enter First Name
Last Name
Enter Last Name
Email
Enter Email
Password
Enter Password
Re-Enter Password
Re-enter Password
Gender
Male
Female
Contact No
Enter Contact Number
Address
Enter Address here
State
--------Select--------
Sign Up
Reset
Subscribe:
Your Name
Your Email
I accept privacy policy
Subscribe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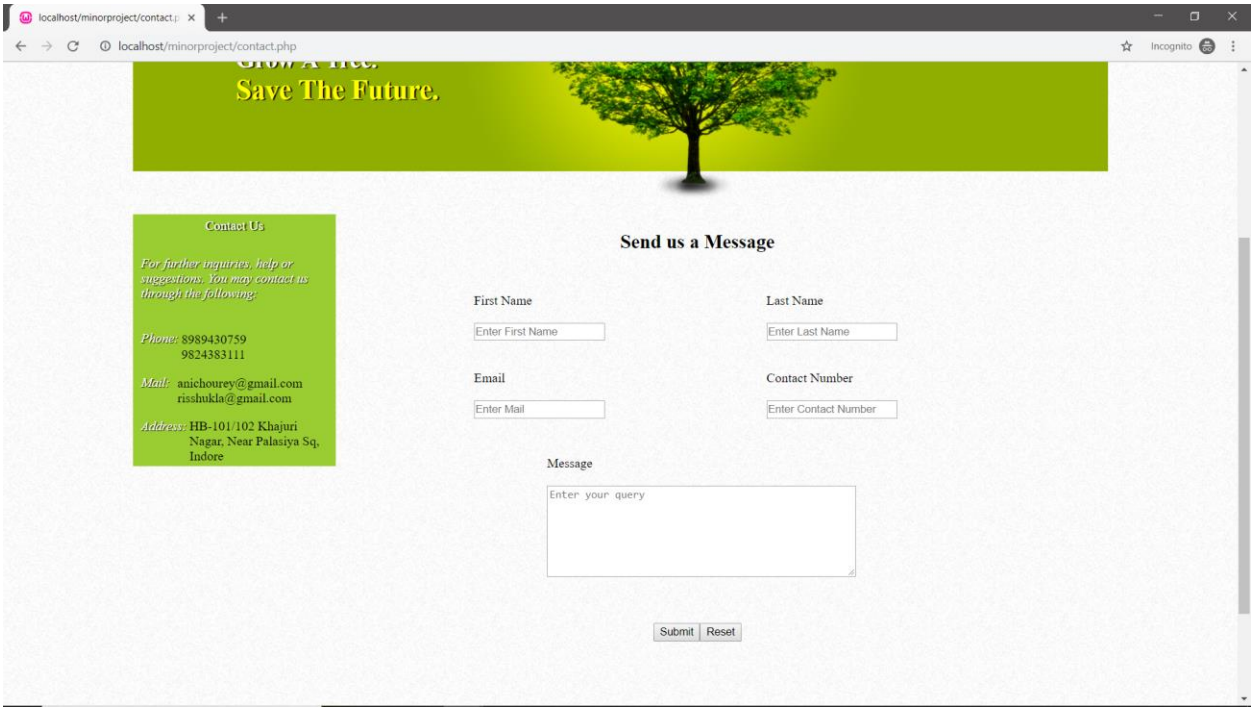
9824383111
Mail: anichourey@gmail.com
risshukla@gmail.com
Send us a Message
First Name
Enter First Name
Last Name
Enter Last Name
Email
Enter Mail
Contact Number
Enter Contact Number


localhost/minorproject/contact.p
localhost/minorproject/contact.php
Incognito
Save The Future.
Contact Us
For further inquiries, help or suggestions. You may contact us through the following:
Phone: 8989430759
9824383111
Mail: anichourey@gmail.com
risshukla@gmail.com
Address: HB-101/102 Khajuri Nagar, Near Palasiya Sq, Indore
Send us a Message
First Name
Enter First Name
Last Name
Enter Last Name
Email
Enter Mail
Contact Number
Enter Contact Number
Message
Enter your query
Submit
Reset

5.2 TESTING

The process or method of finding errors in a software application or program so that the application functions according to the user's requirement is called software testing.

5.2.1 Testing methodology

The entire testing process can be divided into 3 stages

- **Unit testing**
- **Integrated testing**
- **Final/system testing**

Unit testing In our system, unit testing has been successfully handled. the test data was given to each and every module in all respects and got the desired output. each module has been tested found working properly.

INTEGRATION TESTING is a level of software testing where individual units are combined and tested as a group. The purpose of this level of testing is to expose faults in the interaction between integrated units. Test drivers and test stubs are used to assist in Integration Testing.

Validation Testing Process

The aim of software testing is to measure the quality of a software in terms of number of defects found in it, the number of tests run, and the system covered by the tests. When bugs or defects are found with the help of testing, the bugs are logged and the development team fixes them. Once the bugs are fixed, testing is carried out again to ensure that they are indeed fixed, and no new defects have been introduced in the software. With the entire cycle, the quality of the software increases.

5.2.2 TEST CASES :

Sno	Test case id	Test case name	Test case desc.	Step	Expected result	Actual result	Test case Status Pass/Fail
1.	Login admin	Validate login	To verify login name on the login page	Enter the login name and password on the page and click submit	Login message or an error message.	Login successful	Pass
2.	Login Student	Validate Login	To verify login name on the login page	Enter the login name and password on the page and click submit	Login message or an error message.	Login successful	Pass
3.	Password	Validate password	To verify that password on login page	Enter the login name and password on the page and click submit	An error message occurred	An error message	Fail

Chapter 6

Conclusion

6.1 Features

- Providing different varieties of Plant to donate.
- Providing plant donation to make environment greenery.
- Login page was also available by which we can move forward for transaction.
- A message page was also available from where you can get information about your plant which you have donated.
- Validation portion was also available in signup page

Advantages of Online tree plantation system :

The advantages of online tree plantation are:

We can make environment greenery.

Sitting at our home only we can donate plant for a specific location.

We can also track our plant status also by sending message to admin person.

And we can get different varieties of plant according to soil.

6.2 Limitation

Without computers, as some libraries are, all of them are dependent on paper work. When compared to computerized systems, data backup and data retrieval systems are inefficient and labor intensive.

Users of a paper based system become almost wholly reliant on the librarians, for all levels of service, whether they are enquiries about existing books, inter-library loans, or the availability of books. There is additionally no real involvement of a user in the entire process.

Researching which new books are required by users becomes very difficult, and again, labor intensive. Librarians must be consulted directly to find out the availability of a book since it may already be issued to some other library user.

6.3 Future Work

1. Providing a Transaction system for Payment
2. Augmented reality app
3. Converting it into a mobile app
4. Providing some more features if plants are out of stock so fulfill stock automatically.

7 References

1· PHP book by Vasvani (TMH publications).

2· Beginning PHP5 by WROX.

3· www.google.com.

4· www.wikipedia.com

5· www.w3schools.com

6· Informatics practices by Sumita Arora.

7· Head First PHP & MySQL by Lynn Beighley and Michael Morrison(O'Reilly)