

# KONGU ENGINEERING COLLEGE (AUTONOMOUS) PERUNDURAI, ERODE – 638 060

#### DEPARTMENT OF INFORMATION TECHNOLOGY

# **CASE TOOL LABORATORY**

# **AGRI SOLUTIONS**

# SOFTWARE REQUIREMENT SPECIFICATION

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# 1. INTRODUCTION:

Agri solutions is a Web-based tool that makes it easy to buy plants online and assists peoples in finding the disease caused to plants without any difficulty. The idea is to encourage the people towards farming.

#### 1.1 PURPOSE

- The website has been created to be user-friendly and simple to use.
- Saves time and money
- Professional's share their thoughts and ideas with customers.

#### 1.2 SCOPE

- This system may make it easier for them to buy without limitations.
- Users can identify the type of disease to which plants are affected.
- To ensure the consistent response.

#### 1.3 DEFINITION

• The people can view the different types of gardening plants and the disease which affects the plants and the remedies to cure the plants which are affected by disease.

# 2. OVERVIEW OF THE PROJECT:

- This website is particularly for peoples who are keen to take practise agriculture by their own.
- The software's goal is to create a system that will be more advantageous for all the people who need to do agriculture.

#### 2.1 PRODUCT PERSPECTIVE

- The system will be operated within global environment.
- We need interfaces between this system and other systems because they will interact in this environment.

# 3. <u>INTERFACE REQUIREMENTS:</u>

#### **3.1 SOFTWARE INTERFACE:**

- **USER INTERFACE:** The interface is to provide the basic details about plants by the admin.
- The interface is built using REACT and styled with CSS.
- Backend Environment: Node JS
- Backend Database: MongoDB database

#### **3.2 HARDWARE INTERFACE:**

 The absence of defined hardware means that the programme lacks any direct hardware interfaces. The only necessary hardware is a PC with internet access on both the server and client sides.

## 4. <u>FUNCTIONAL REQUIREMENTS</u>:

- To add plants, each and every people has the access. So that large number plants are added.
- To add the plants and disease, the people's profile need not to be logged in where the admin can see it and take actions accordingly.
- When the people adds it will reflect in the database.
- In contrast, the admin adds, removes, and updates the details provided.

# 5. <u>USER CHARACTERISTICS</u>:

#### **5.1 ADMIN:**

- The list of plants and disease is provided by the administrator, who can also add, remove, and update the plants and disease and provide resources as necessary.
- Once the plant is uploaded, admin will publish the plant whether the uploaded plant is valid or not.
- After the upload is over, the admin will enable the user to buy.

#### **5.2 PEOPLE:**

- From the plant list offered by the admin, peoples can buy any plants that suits their needs.
- People can also see the remedies for the selected plants.

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### 6. NON-FUNCTIONAL REQUIREMENTS:

#### **6.1 PERFOMANCE:**

- Access to the existing plant and disease catalogue database will be made available via the system.
- Our productivity was increased by the concurrent sharing and hourly updating of new functions.

#### **6.2 RELIABILITY:**

- All of the database records are only accessible to the admin.
- User can access at any time.
- Admin has the safer and secured credentials.

#### **6.3 USABILITY**

• Users should have no trouble using the the website because of it's user-friendly design.

#### **6.4 SECURITY:**

- Effective encryption schemes can be used to improve the security of the system.
- Application do not ask any personal details of the user for effective functioning of application.

# 7. CONSTRAINTS:

#### **7.1 ASSUMPTIONS:**

- Both the user and the admin must be knowledgeable in the English language and capable of using computer.
- No need for login to identify users.
- The guest user can just surf the different types of plants and the disease which affects the plants.

#### 7.2 DEPENDENCIES:

- User's familiarity with computers and their interface varies.
- The computer has internet connection and internet browsing capabilities.