Project Design Phase-II

Solution Requirements (Functional & Non-functional)

Functional Requirements:

Following are the functional requirements of the proposed solution.

FR No.	Functional Requirement (Epic)	Sub Requirement (Story / Sub-Task)
1	❖ ❖ ***User Registration***	✓ ✓ *Registration through Gmail* ✓ ✓ *Registration through phone number*
2	❖ ❖ ***User Confirmation***	✓ ✓ *Confirmation via Email* ✓ ✓ *Confirmation via OTP* ✓ ✓ *Confirmation via verification link sent to registered mail id*
3	❖ ❖ ***Roles and service***	✓ ✓ *Choose roles (ex: farmer, student etc.)* ✓ ✓ *Enter the personal details.* ✓ ✓ *Choose the type of service or options (ex: irrigation, pest management, crop management etc.)*
4	❖ ❖ ***Terms and conditions***	✓ ✓ *Accepts the terms and condition for the chosen role and options*
5	❖ ❖ ***Details of farm and plans***	✓ ✓ *Enter the details of farming land and vegetation.* ✓ ✓ *Choose the crop you want to plant* ✓ ✓ *Choose the types of plans (ex: regular and premium)*
6	❖ ❖ ***Details according to farm information***	✓ ✓ *Check the weather information* ✓ ✓ *Enter the soil nutrient and pH value* ✓ ✓ *click SAVE* ✓ ✓ *Soon the details will share to registered mail* ✓ ✓ *EXIT*

Non-functional Requirements:

Following are the non-functional requirements of the proposed solution.

NFR No.	Non-Functional Requirement	Description
1	❖ ❖ *Usability*	✓ ✓ ***A system is built for monitoring the crop field with the help of sensors and automating the irrigation system and helps the farmer to understand the important aspects.***
2	❖ ❖ *Security*	✓ ✓ ***Applications must be designed with the security of their use in mind. This includes personal data and their user's well-being.***
3	❖ ❖ *Reliability*	✓ ✓ ***It allows farmers to maximize yields using minimum resources such as water, fertilizers, seeds etc.***
4	❖ ❖ *Performance*	✓ ✓ ***It increases efficiency and reduce the environmental impacts and to implement technology properly to minimize cost.***
5	❖ ❖ *Availability*	✓ ✓ ***This concept focused on providing the agricultural industry with the infrastructure to leverage advanced technology.***
6	❖ ❖ *Scalability*	✓ ✓ ***It provides the recognition of each object that makes up a solution and ensure communication. The system must remain operational regardless.***