

Project Design Phase-II
Solution Requirements (Functional & Non-functional)

Date	14 October 2022
Team ID	PNT2022TMID30034
Project Name	Project – Smart Farmer-IOT Enabled Smart Farming Application.
Maximum Marks	4 Marks

Functional Requirements:

Following are the functional requirements of the proposed solution.

FR No.	Functional Requirement (Epic)	Sub Requirement (Story / Sub-Task)
FR-1	Basic Requirements	Smart Phone with minimum 2GB RAM & 8GB ROM
FR-2	User Registration	Registration through Email Registration through Form Registration through Mobile Number
FR-3	User Confirmation	Confirmation via Email Confirmation via OTP
FR-4	Access Permission	User should enable their Audio, Contacts, Location, Wi-Fi & Camera
FR-5	User Details	Name, Mobile Number, Email-id, Address, Type of crop, Land details etc

Non-functional Requirements:

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

FR No.	Non-Functional Requirement	Description
NFR-1	Usability	<ul style="list-style-type: none">➤ Can be used in all agricultural fields.➤ Can be Monitor their field from anywhere at any time.➤ Irrigation can be easily done to all crops at regular time intervals.

NFR-2	Security	<ul style="list-style-type: none"> ➤ Confidentiality-Requires information in a computer only be accessible for reading by authorized parties. ➤ Access be available only to authorized users. ➤ All the details about the user are protected from unauthorized access. ➤ Detection and identification of any misfunctions of sensors.
NFR-3	Reliability	<ul style="list-style-type: none"> ➤ High speed of data results in better monitoring. ➤ Efficient of the system consisting for a long period of time. ➤ Cost effective. ➤ Easily Accessible by the users.
NFR-4	Performance	<ul style="list-style-type: none"> ➤ The idea of implementing integrating sensors with soil sensing and environmental or ambient parameters in farming will be more efficient for overall monitoring.
NFR-5	Availability	<ul style="list-style-type: none"> ➤ Information about Water, Crop conditions, Soil and Weather are available through the use of sensors which is linked to the cloud and can be accessible via Application or Website. ➤ Application can be available in play stores.
NFR-6	Scalability	<ul style="list-style-type: none"> ➤ Business to business and business to customer can be implemented and it can be used for enhancing the profit in large scale.