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

Date	03 October 2022
Team ID	PNT2022TMID41287
Project Name	Smart Farmers-IOT based Smart Farming
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	User interface	Mobile Application
FR-2	Read parameters	Reading field parameters like soil moisture, humidity , temperature
FR-3	Motor controlling	Motor pump controlling
FR-4	Hardware device	For handling sensors and value
FR-5	Cloud Connectivity	Connecting Hardware to cloud
FR-6	Cloud Database	Database service on cloud
FR-7	External API-1	External API for weather access
FR-8	External API-2	External API for GPS access

Non-functional Requirements:

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

FR No.	Non-Functional Requirement	Description
NFR-1	Usability	*Remote management.with farms being located in far off areas and distant lands,farmers are seeking a better solution to their management issues *real-time crop monitoring *crop protection *soil testing and it's quality
NFR-2	Security	User login
NFR-3	Reliability	High quality sensor used so, we can get high precision and accurate value for long time
NFR-4	Performance	Due to the use of high performance microprocessor board. we can get high performance.
NFR-5	Availability	Online shopping, agency
NFR-6	Scalability	Camera module