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

Date	16 October 2022
Team ID	PNT2022TMID45187
Project Name	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	User Requirements	The Crop Protection Automatic Sprinkler System Tracks Temperature, Humidity, and Soil Moisture
FR-2	User Registration	Registration Manual Registration using a website Form-based registration Gmail-based registration
FR-3	User Confirmation	Phone confirmation Email confirmation required Reassurance via OTP
FR-4	Payment Options	On delivery of cash Net Banking, UPI Cards, Credit Cards, and ATMs
FR-5	Product Delivery and Installation	Door-to-door delivery Take out Totally free installation and a 12-month warranty

FR-6	Product Feedback	via a website Using Google forms and phone calls

Non-functional Requirements:

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

FR No.	Non-Functional Requirement	Description
NFR-1	Usability	Have an easy-to-understand guidebook. Simpler to use The product is easy to use even by farmers who are illiterate.
NFR-2	Security	Application security requires two-step authorization. The user's needs will determine how passwords and passkeys are assigned.
NFR-3	Reliability	Hardware needs to be checked and maintained regularly. Periodic software updates are possible. Any system breakdown will result in an immediate alarm.
NFR-4	Performance	The programme needs a good user interface. It should just demand a small amount of energy. It must conserve energy and water.

NFR-5	Availability	Every function will be accessible whenever the user needs it. It depends on the farmer's requirements and the level of customization the user has undertaken.
NFR-6	Scalability	Regardless of the size or area of a farm field, the product must cover the entire area of the ground.