

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

Date	14 October 2022
Team ID	PNT2022TMID21513
Project Name	Estimate the crop yield using data analytics
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 Registration	Registration through Form Registration through Gmail Registration through LinkedIn Register with valid mobile number
FR-2	User Confirmation	Confirmation via Email Confirmation via OTP Two step verification for new device login.
FR-3	Admin	Admin have user details and maintains the crop productions.

Non-functional Requirements:

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

FR No.	Non-Functional Requirement	Description
NFR-1	Usability	We have primarily focused on making our website easy to navigate in order to deliver the best usability for the farmers. Users may quickly log in using existing credentials, and if they don't already have an account, they can also register on their own by providing a unique, valid email address or a mobile number which make their process easier. Following effective navigation, we focused on visual clarity and created a web application that looks nice and is straightforward, making it easier for any elderly person to utilize. In order to improve user happiness, a Guide tour will also be offered to first-time visitors.
NFR-2	Security	A verification code will be provided to the registered email address or mobile number of any user before they attempt to log into their account on a new device. They won't be able to login until they enter their code. The code will also be made to expire after a certain period of time. Additionally, notifications will be provided for any action taken by a user. As a result, each user will have a

		safe account, and the admin side will maintain each user's information securely.
NFR-3	Reliability	Since we had split the crops into categories in order to make easier choice for the user. Data processing time for each and every individual will be lesser. Thus making our web application more reliable.
NFR-4	Performance	In order to bring best performance, we have concentrated on overload of data's. To minimize the overloads and to minimize the system's response time we have processed the data in structured organized form. So that the data (crop) will be categorized according to the user's needs.
NFR-5	Availability	As the server is online the site is available 24/7 for the user needs.
NFR-6	Scalability	With respect to increase in streaming data , the data storage will also increase accordingly and the prediction will be preciously stored. Rescaling is always adaptable here.