

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

Date	03 October 2022
Team ID	PNT2022TMID25913
Project Name	Project - Exploratory Analysis of Rainfall Data in India for Agriculture
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 Gmail
FR-2	User Confirmation	Confirmation via Email Confirmation via OTP
FR-3	User login	Send a confirmation email each time while logging
FR-4	Dashboard for platform	Creating a profile and adding necessary information
FR-5	Searching	Search for rainfall prediction region specifically
FR-6	Prediction	Giving prediction of rainfall or flood based on ML model
FR-7	User support	Collecting feedback from user and offering support for their problems or queries.

Non-functional Requirements:

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

FR No.	Non-Functional Requirement	Description
NFR-1	Usability	The error rate of users submitting to check the relevant details at the web page mustn't exceed 5 percent. The website has to be more efficient and with a pleasant web layout.
NFR-2	Security	Authorization and authentication for internal systems should be against the internal LDAP database. Every authentication attempt will be logged. No private data stored on internet accessible machines.
NFR-3	Reliability	The system must perform without failure in 98 percent of use cases during all months.
NFR-4	Performance	The landing page supporting 5,000 users per hour must provide 6 second or less response time in a Chrome desktop browser, including the rendering of text and images over an LTE connection.
NFR-5	Availability	The web dashboard must be available to the users all over the globe 99.98 percent of the time, every month during monsoon and seasonal change.
NFR-6	Scalability	The system must be scalable enough to support 1,00,000 visits at the same time while maintaining optimal performance.