

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

Date	13 October 2022
Team ID	PNT2022TMID38617
Project Name	Natural Disasters Intensity Analysis and Classification using Artificial Intelligence
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	<ul style="list-style-type: none">• Registering via Google Accounts• Registering via Product's own user management system
FR-2	User Authentication	<ul style="list-style-type: none">• Verification through OTP• Verification through Email Link
FR-3	Designation of Region	<ul style="list-style-type: none">• Ease of selection of necessary areas to be monitored.• Versatile and Flexible operations on designated areas
FR-4	Analysis of Required Phenomenon	<ul style="list-style-type: none">• Simple and easy analysis on the specific phenomenon to be observed
FR-5	Accumulation of required Data	<ul style="list-style-type: none">• Fast and Efficient data gathering capabilities.• regarding past event analysis and future prediction
FR-6	Organizing Unstructured data	<ul style="list-style-type: none">• Processing of raw and clustered data into clear and refined data which is useful for analysis and prediction tasks
FR-7	Algorithm selection	<ul style="list-style-type: none">• The freedom to choose from several classes of algorithm to be used in the process.• Customization of algorithm to suit the needs of a specific purpose
FR-8	Prediction and analysis of data	<ul style="list-style-type: none">• Accurate results of the analysis provided by the process.• Advanced visualization techniques to help visualize the processed data for effective observation
FR-9	Report generation	<ul style="list-style-type: none">• Restructuring of obtained results into clear and detailed report for future studies

Non-functional Requirements:

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

FR No.	Non-Functional Requirement	Description
NFR-1	Usability	It is easy and quick method to predict the disasters.
NFR-2	Security	The secure pattern shares components with monitor and control for logging and control access and for providing audit trails
NFR-3	Reliability	it should be highly reliable
NFR-4	Performance	It deals with the measure of the system's response time.
NFR-5	Availability	t can be available at the any time and we can access during any disasters.
NFR-6	Scalability	Disaster damages are measured involves examining the number of fatalities, of injuries, of people affected.