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

Date	
Team ID	LTVIP2026TMIDS45374
Project Name	Online payments Fraud detection using ml
Maximum Marks	4 Marks

Functional Requirements:

Following are the functional requirements of the proposed solution.

- The system should collect and process transaction data (amount, time, location, device, etc.).
- It should preprocess and clean the dataset before model training.
- The system must train a machine learning model using historical transaction data.
- It should classify transactions as **Fraud** or **Legitimate**.
- The system should generate a fraud probability or risk score.
- It must detect suspicious transactions in real time.
- The system should trigger alerts for high-risk transactions.
- It should store transaction results for future analysis and retraining.
- The model should support periodic retraining with updated data.

Non-functional Requirements:

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

 The system must provide high accuracy in fraud detection.

 It should minimize false positives and false negatives.

 The response time must be fast (real-time or near real-time processing).

 The system should be scalable to handle large volumes of transactions.

 It must ensure data privacy and security.

 The solution should be reliable and available with minimal downtime.

 The model should be maintainable and easy to update.

 The system should be user-friendly and easy to integrate with payment platforms.