Project Design Phase Solution Architecture

Date	26 June 2026	
Team ID	LTVIP2025TMID35978	
Project Name	Traffictelligence	
Maximum Marks	4 Marks	

Solution Architecture:

Solution architecture is a complex process – with many sub-processes – that bridges the gap between business problems and technology solutions. Its goals are to:

- Find the best tech solution to solve existing business problems.
- Describe the structure, characteristics, behavior, and other aspects of the software to project stakeholders.
- Define features, development phases, and solution requirements.
- Provide specifications according to which the solution is defined, managed, and delivered.

Example - Solution Architecture Diagram:

Figure 1: Architecture and data flow of the Traffic Volume Estimation System

- User Interface (HTML/CSS) \rightarrow Input Data (Weather, Time, Holiday) \rightarrow Flask Backend \rightarrow Preprocessing (ColumnTransformer, Scaler) \rightarrow Machine Learning Model (RandomForestRegressor) \rightarrow Output (Traffic Volume) \rightarrow Display on Web Page

