

## Project Design Phase Solution Architecture

Date	27 JUNE 2025
Team ID	LTVIP2025TMID42853
Project Name	Revolutionizing Liver Care: Predicting Liver Cirrhosis using Advanced Machine Learning Techniques
Maximum Marks	4 Marks

### Solution Architecture

Solution architecture is a complex process with many sub-processes that bridge the gap between healthcare problems and modern AI solutions. Our solution aims to:

- ☒ Find the best tech solution to solve real-world medical diagnosis problems using ML.
- ☒ Describe the complete flow of data collection, processing, training, and prediction using structured inputs from patient medical reports.
- ☒ Define features (34 key input parameters), architecture (Flask-based ML model), development phases (data preprocessing, model training, UI integration), and deployment.
- ☒ Deliver a web-based liver cirrhosis prediction tool that is accurate, user-friendly, visually engaging, and instantly interpretable by health staff or patients.

### Example - Solution Architecture Diagram:

