Project Design Phase-I
Proposed Solution

Date	19 September 2022
Team ID	PNT2022TMID53940
Project Name	Project - Smart Solutions for Railways
Maximum Marks	2 Marks

S.No.	Parameter	Description
1.	Problem Statement (Problem to be solved)	Railway passengers need a way to book their tickets without delay and want to board their trains without having to stand in a long line to verify their tickets. Passengers are also in need of a way to check their current location and the estimated time of arrival.
2.	Idea / Solution description	Ticket booking will be facilitated using a Web application which can handle heavy traffic. Upon booking, unique QR code will be generated which can be used to verify the tickets while boarding. GPS module will send location details to the cloud. This data will be used to track the live location of the train and provide an interface to the users to view the same.
3.	Novelty / Uniqueness	Though the project has been simulated in the past, it has never been deployed to public use. Using this system on a large scale will reduce the time delay caused by long queues in booking centres. It will also ensure secured transaction and verification.
4.	Social Impact / Customer Satisfaction	Real time updates during travel will help the public plan out their travel effectively, encouraging the society to use the public transportation facilities. The project on the whole will reduce paper usage and pollution impacts caused by an individual.
5.	Business Model (Revenue Model)	Revenue is primarily generated through a processing fee for each transaction. We can have tie ups with the government for funding and R&D. Ads related to transportation services, networking and other in-demand facilities can be displayed.
6.	Scalability of the Solution	Can be scaled to other modes of transportation like airways, buses etc. Can be used in tourist spots to facilitate hassle-free entry.