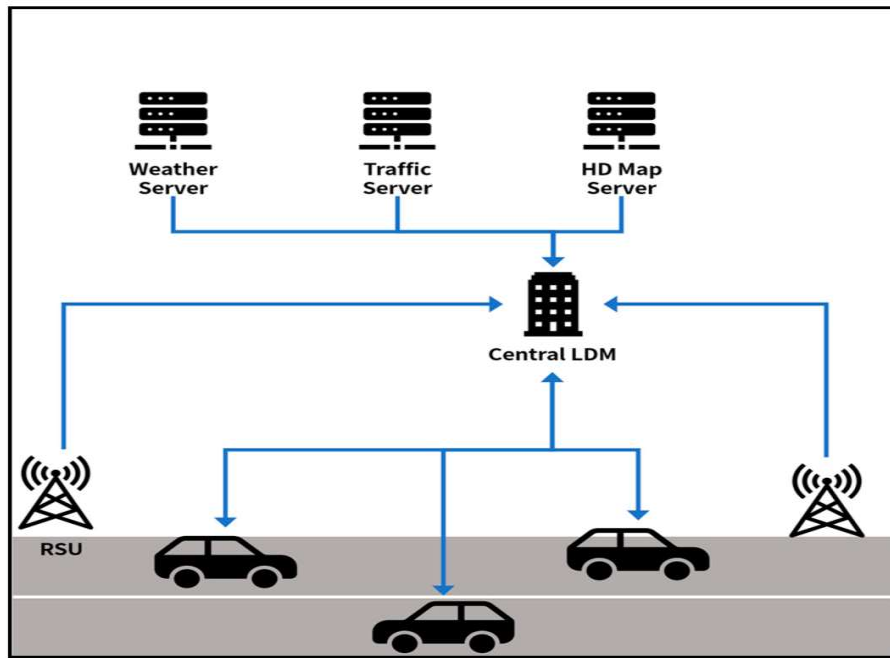


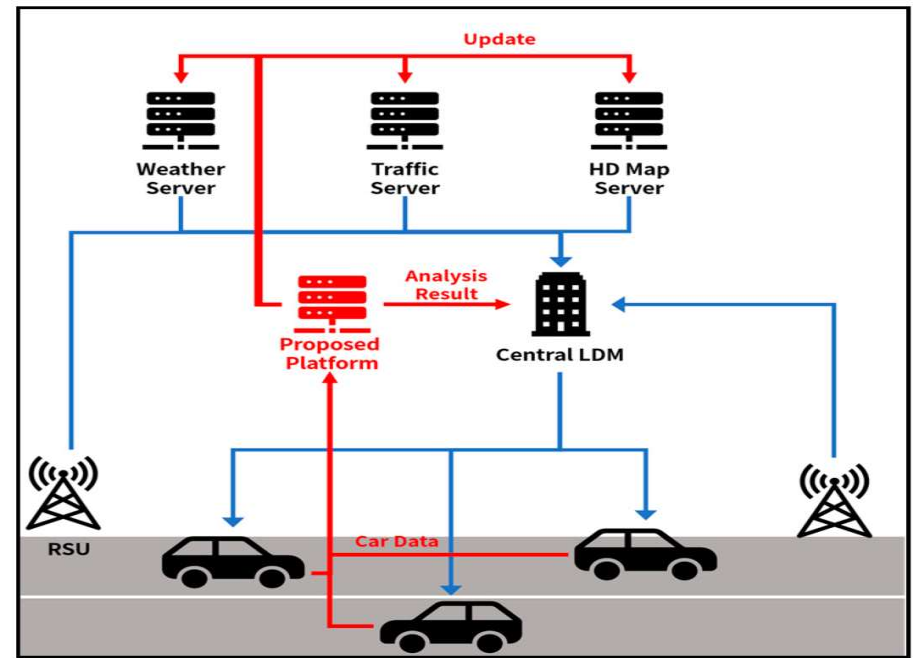
Project Design Phase-II Technology Stack (Architecture & Stack)

Date	05 October 2022
Team ID	PNT2022TMID41909
Project Name	Signs with Smart Connectivity for Better Road Safety
Maximum Marks	4 Marks

Technical Architecture:



(a)



(b)

Guide lines:

- To replace static sign boards into smart connected sign board
- These smart connected sign boards gather the speed limitations from the weather app using weather API and update automatically
- Based on the weather changes the speed may increase or decrease
- Sign boards in the vicinity of the hospitals, schools ,restarunts etc have signs displayed accordingly
- Different modes of operation can be selected with the help of buttons

Components and Technologies:

S.NO	Component	Description	Technology
1	User interface	How user interacts with application e.g Web UI, mobile App, chatbot etc.	HTML, CSS, JavaScript / Angular Js/React Js etc.
2	Application logic-1	Logic for a process in the application	Java / python
3	Application logic-2	Logic for a process in the application	IBM Watson STT service
4	Application logic-3	Logic for the process in the application	IBM Watson Assistant
5	Database	Data Type, Configuration etc.	MySQL , NoSQL, etc.
6	Cloud Database	Database Service on cloud	IBM DB2,IBM Cloudant etc.
7	File Storage	File storage requirements	IBM Block Storage or other storage service or local filesystem
8	External API-1	Purpose of external API used in the application	IBM weather API,etc

Application Characteristics:

S.NO	Characteristics	Description	Technology
1	Security Implementations	Strong security system that anyone without login credentials and hackers are not allowed to enter the network	Cyber, Firewall, fire base Resiliency strategy
2	Scalable Architecture	Easy to expand the operation range by increasing the bandwidth of the network	IOT internet
3	Availability	Available any time and everywhere as long as the user is signed into the network	IBM cloud
4	Performance	Support a large number of users to access the technology simultaneously	IBM cloud