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

Date	20October 2022
Team ID	PNT2022TMID35656
Project Name	Analytics For Hospital's Health-Care Data
Maximum Marks	4 Marks

Technical Architecture:

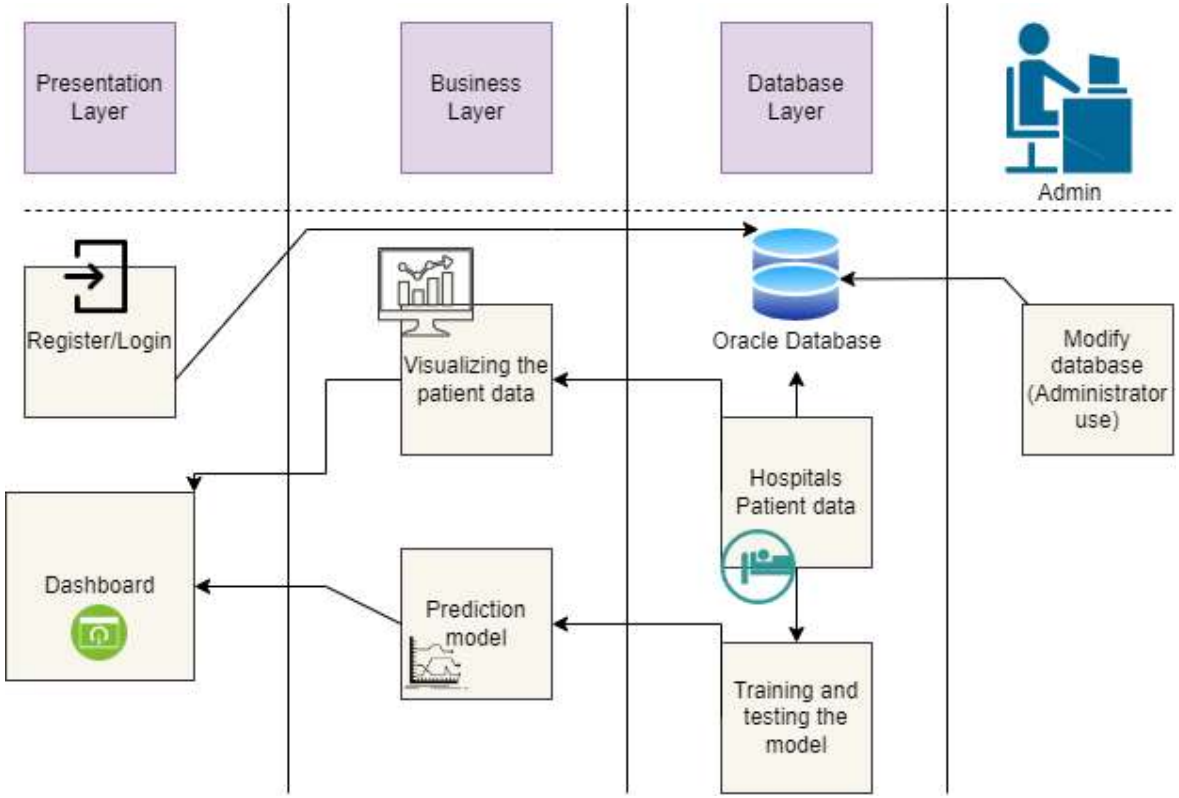

Table-1 : Components & Technologies:

S.No	Component	Description	Technology
1.	User Interface	user interacts with application inWeb UI.	HTML, CSS, JavaScript / Angular Js etc.
2.	Data Visualization	Data is visualized so that the userscan understand the important patterns in data.	IBM Watson
3.	Data Classification	Data is classified using classification algorithms to classify the data into 10 classifications	IBM Watson , colab
4.	Data Prediction	Logic for a process in the application	colab, IBM watson
5.	Database	All the datasets of the patients andthe hospital	MySQL, etc.
6.	File Storage	File storage requirements	Local Filesystem
7.	External API-1	Build models and helps in predict thedata	IBM watson api
8	Machine Learning Model	Helps in developing the model	Classification algorithms
8.	Infrastructure	The application is deployed in cloud	IBM cloud

Table-2: Application Characteristics:

S.No	Characteristics	Description	Technology
1.	Open-Source Frameworks	The data prediction is done in open-source framework	Colab ,python
2.	Security Implementations	The login and sign in purpose are implemented with security concerns.	Salt hashing
3.	Scalable Architecture	The application is done 3 tier architecture	Presentation layer-HTML/CSS javascript Business Logic Layer-colab, IBMcognos Database layer-IBM db2
4.	Availability	The application is available for allthe users at anytime	IBM Cognos
5.	Performance	The application provides various visualization types in the dashboard	IBM cognos