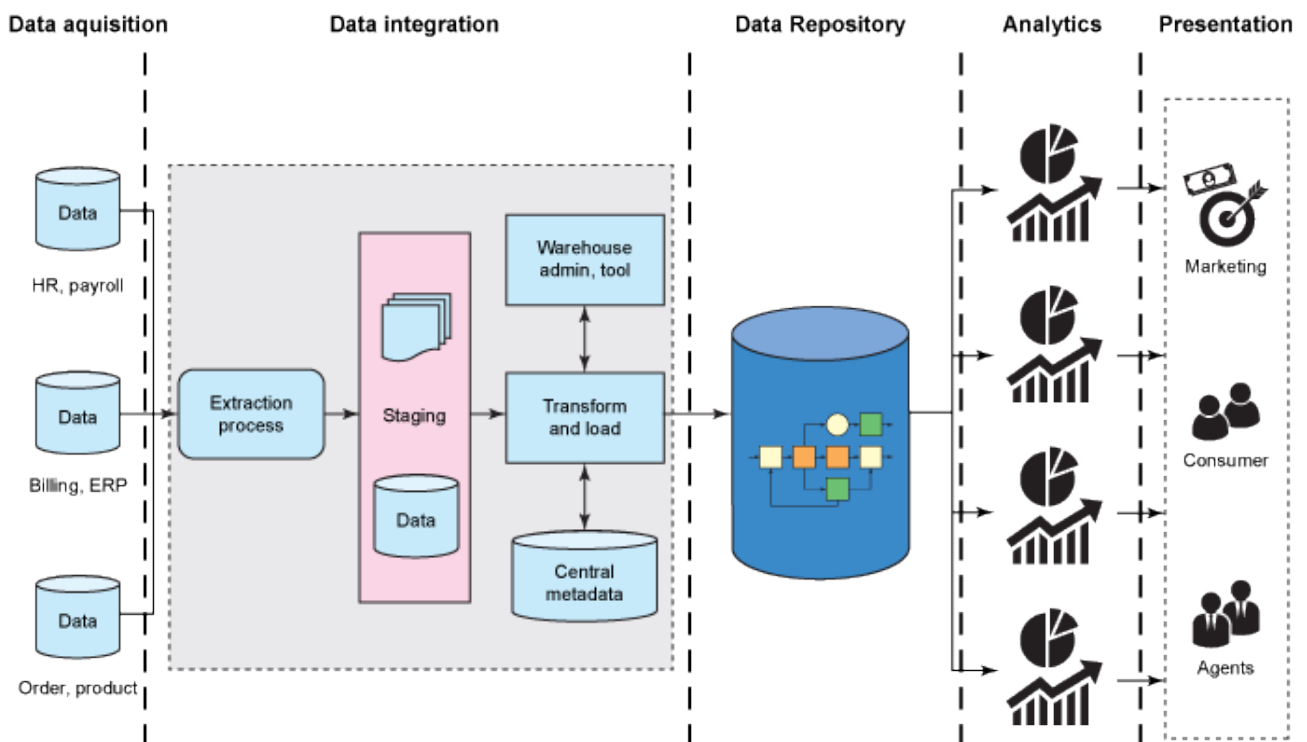


## Project Design Phase-II Technology Stack (Architecture & Stack)

Date	12.10.2022
Team Id	PNT2022TMID29546
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	The user interacts with application using Web UI	HTML, CSS, JavaScript
2	Data processing	The data from the dataset is pre-processed	IBM Cognos Analytics
3	Cloud database	The clean dataset is stored on IBM Cloud	IBM Cloud
4	Data Visualisation	The data is visualized into different forms	IBM Cognos Analytics, python
5	Prediction	ML algorithms are used for predicting the length of stay	ML algorithms – Fuzzy Logic, Tree Bagger, Random Forest, Decision Tree

**Table-2: Application Characteristics:**

s.no	Component	Description	Technology
1	Open-Source Frameworks	Open-source frameworks used	IBM Cognos Analytics, Python
2	Security Implementations	s Request authentication using Encryptions	Encryptions
3	Scalable Architecture	Scalability consists of 3-tiers	Web Server – HTML, CSS Application Server – Python
4	Availability	The application is available for cloud users	IBM Cloud Hosting
5	Performance	The user can know the prolonged period of stay	ML-Algorithms