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

Technical Architecture:

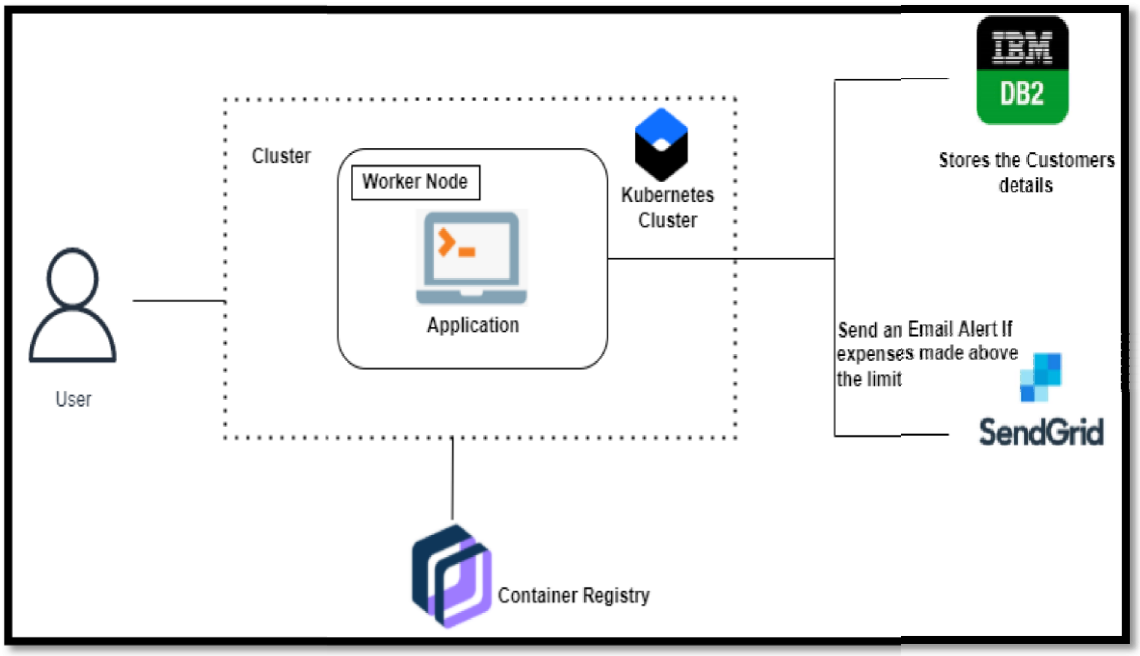

Table-1 : Components & Technologies:

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	The application contains the sign in/signup page where the user will login into the main dashboard	Python
3.	Application Logic-2	Dashboard contains the fields like Add income, Add expenses, Save Money	IBM Watson STT service

4.	Application Logic-3	The user will get expense report in the graph form and also get alerts if the expense limit exceeds	IBM Watson Assistant, SendGrid
5.	Database	The income can be stored in the database	MySQL
6.	Cloud Database	With the use of database service on cloud, the user data are stored in a well secured manner	IBM DB2, IBM Cloudant etc.
7.	File Storage	IBM block storage used the financed data of the user	IBM Block Storage or Other Storage Service or Local Filesystem
8.	Infrastructure (Server / Cloud)	Application deployment on local system or server	Local, Cloud Foundry, Kubernetes, etc.

Table-2: Application Characteristics:

S.No	Characteristics	Description	Technology
1.	Open-Source Frameworks	Flask framework in python is used to implement this application	Python – Flask
2.	Security Implementations	This application provides high security to the user financial data. It can ba done by using the container registry in IBM cloud.	Container registry, Kubernetes cluster
3.	Scalable Architecture	Expense tracker is a lifetime access supplication. It’s demand will increases when the users income are high	Container registery, Kubernetes cluster
4.	Availability	This application will be available to the user at any part of time	Container registery, Kubernetes cluster
5.	Performance	.the performance will be high because there will be no network traffics in the application	Kubernetes cluster