INFO 5707 Section 004 - Data Modelling for Information Professionals

PROJECT PROPOSAL

TITLE: - BANK MANAGEMENT SYSTEM USING MYSQL & PYTHON

Group Members:

Name	ID
Venkateswara Reddy Thummuru	11601604
Eswara Reddy Thimmapuram	11506566
Vishnu Vardhan Reddy Yemireddy	11590496
Aravind Bethapudi	11591321
Yaswanth Kumar Reddy Etur	11595410

OBJECTIVE AND SCOPE OF THE DATABASE:

- The goal of bank management system designed by utilizing MySQL and Python is to develop a dependable, effective, and user-friendly database system for managing banking activities. Customer data, account information, transaction history, and other pertinent information will all be stored in this database system. And we can easily access the data which is already stored in the database system.
- The scope of the database system will cover Account administration, transaction processing, and report production which are just a few of the banking activities that the database system will be used for. Other account types, including savings, current, and fixed deposit accounts, will also be supported.

SPECIFIC USER REQUIREMENTS:

1) Customers: They can see the balance of their accounts, a history of their transactions, and change their personal data.
   - Create and manage their account profile, including personal information.
   - View their account balances, transaction history and other details.
   - Initiate and authorize transactions, withdrawals and transfers.
   - Receive notifications for transactions and account activities.

2) Bank employees: They are capable of a wide range of responsibilities, including adding new clients, opening new accounts, handling transactions, and producing reports.
   - Create and manage customer accounts, including verifying customer identity and account details.
   - Process transactions such as deposits, withdrawals, and transfers.
   - Manage loan applications and approvals.
   - Generate reports on customer activities, account balances, and transactions.
   - Update customer account details and contact information.

3) Bank managers: They may keep an eye on staff members' actions, provide different kinds of reports, and manage the bank's overall operation.
   - Monitor employee activities, including errors, and processing times.
   - Monitor account activities, including transactions, account balances, and trends.
   - Generate reports on bank performance, including profitability, loan portfolios, and customer demographics.
   - Approve loan applications and other high-risk transactions.

CHOICE OF DBMS:

- MySQL will be the preferred database management system (DBMS) for this project. Web applications, particularly banking systems, frequently employ MySQL, an open-source relational database management system. It is a fantastic option for this project since it provides excellent performance, scalability, and security. Python will also be used to create the application's front end and back end.