CMPE 207 Project Proposal

For the course project, we aim to develop a distributed banking application with multiple entities acting as clients and a server that includes business logic to serve clients accordingly based on their roles.

Our objective is to use a client-server architecture where the server can process multiple requests from clients concurrently. It is very intuitive for us to use multithreading to achieve this objective. At a high level, it will be a 3-tier application where we have a command line interface as the presentation tier, the business logic in the 2nd tier and an SQL database as a 3rd tier that communicates with the server. We believe such modularization will help us work together simultaneously and build an overall solid detailed design for the project. Below we talk about some functional and non-functional specifications that we want to propose for this project. Later, we discuss a high-level approach that that we have brainstormed to set us working straight after we finish the low-level design.

The application will have the following clients-

1. Customer

Deposit

Withdraw

Enquiry

GetStatement

1. Banking staff (Tellers)

Create customer

Block customer

Unblock customer

Notify

Access customer information and transactions

Modify customer details upon request

1. Branch head (System Admin)

Has control over both customers and banking staff

Can access both customer as well as staff information

Block/Unblock staff or customer

Create staff

Delete staff

Design

Api

Methodology

Features