Bank Management System

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in partial fulfilment for the award of the degree of

BACHELOR OF TECHNOLOGY

in

COMPUTER SCIENCE AND ENGINEERING

School of Computer Science and Engineering
Vellore Institute of Technology, Vellore

CERTIFICATE

This is to certify that the thesis entitled "**Bank Management System"** submitted by

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for the award of the degree of *Bachelor of Technology in Programme*, is a record of bonafide work carried out under ***Dr. Jayakumar K*** as per the VIT code of academic and research ethics.

The contents of this report have not been submitted and will not be submitted either in part or in full, for the award of any other degree or diploma in this institute or any other institute or university. The thesis fulfills the requirements and regulations of the University and meets the necessary standards for submission.

Place : Vellore
Date : 14th November, 2022

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Abstract

In the 21st century, people still struggle to make use of the manual banking system. Every citizen is required to physically go to a bank and provide legions of paperwork to open a new bank account or to update their existing account in any sort of manner. This socio-economic issue has inspired us to come up with a fully flexible bank management system that provides remote banking services. This web-based solution offers online banking services which can be accessed by new and existing users of the bank.
The user gets a very interactive and responsive page to perform all the operations by sitting in their places instead of standing in a queue. First, the user has to sign up for the first time to their account and link their bank account with the application. Later on, he/ she can just login into the page. After logging in, the user can perform all the operations for which he had to visit the bank. He/ She can apply for a loan, get their bank balances, give feedback for the application usage experience or can transfer money to some other account, or receive money from another account.

Introduction

1. Problem Statement

At present most of the banking applications are yet to overcome the rapidly growing attacks on their customer private data. Issues suck fraud operating within a conventional environment. However current systems are still trying to cope with the existing institutional structure, which is really meant for usual banking system only and not managing their customer's information more effectively. Lack of adequate security measure is making it really challenging to successfully transform the bank customers' management systems from where it is now to where it should be. This challenge still lingers.

2. Technical Specifications

- HTML
- CSS
- JavaScript
- Bootstrap
- SCSS
- PHP
- MySQL

Existing System Problems

Although the basic type of services offered by a bank depends upon the type of bank and the country, services provided usually include: Taking deposits from their customers and issuing current or checking accounts and savings accounts to individuals and business. Extending loans to individuals and business, Cashing cheque. Facilitating money transactions such as wire transfer and cashiers' cheque, Consumer & commercial financial advisory services, financial transaction can be performed through many different channels. In addition to this, the user interfaces of the currently available solutions are extraordinarily complicated and challenging to use for no discernible reason.

Proposed System Design

1. Module Description

For admin Module

1. This system allows the admin to login with username and password
2. This system allows the admin to add a Bank branch details
3. This system allows the admin to accept or reject a manager/customer
4. This system allows the admin to approve or reject customer transaction request
5. This system allows the admin to View Managers & Customers details

For Manager Module

1. This system allows the manager to register
2. This system allows the manager to login with email and password
3. This system allows the manager to accept/reject branch customers
4. This system allows the manager to view customer transactions
5. This system allows the manager to update personal information
6. This system allows the manager to reset password if password is forgotten
7. This system allows the manager to Register New Customer

For Customer Module

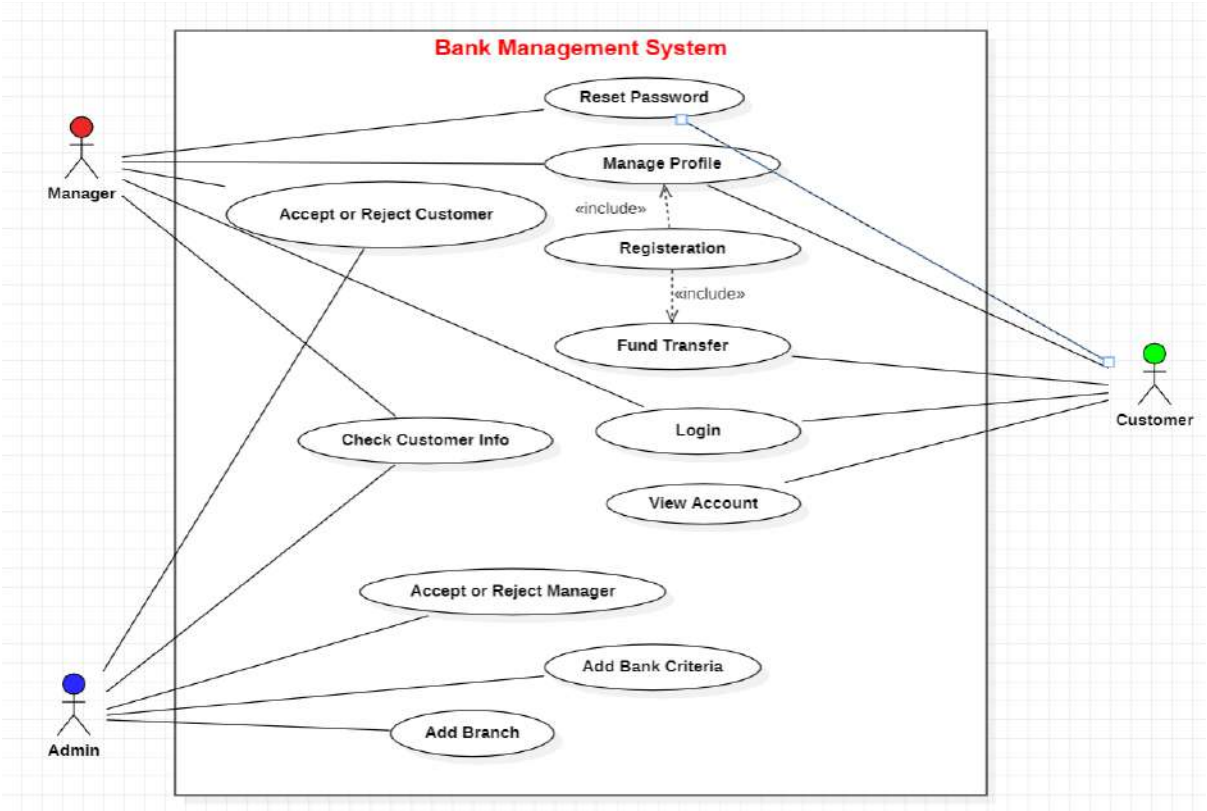
1. This system allows the customer to login with email and password
2. This system allows the customer to update personal details

3 This system allows the customer to reset password if password is forgotten

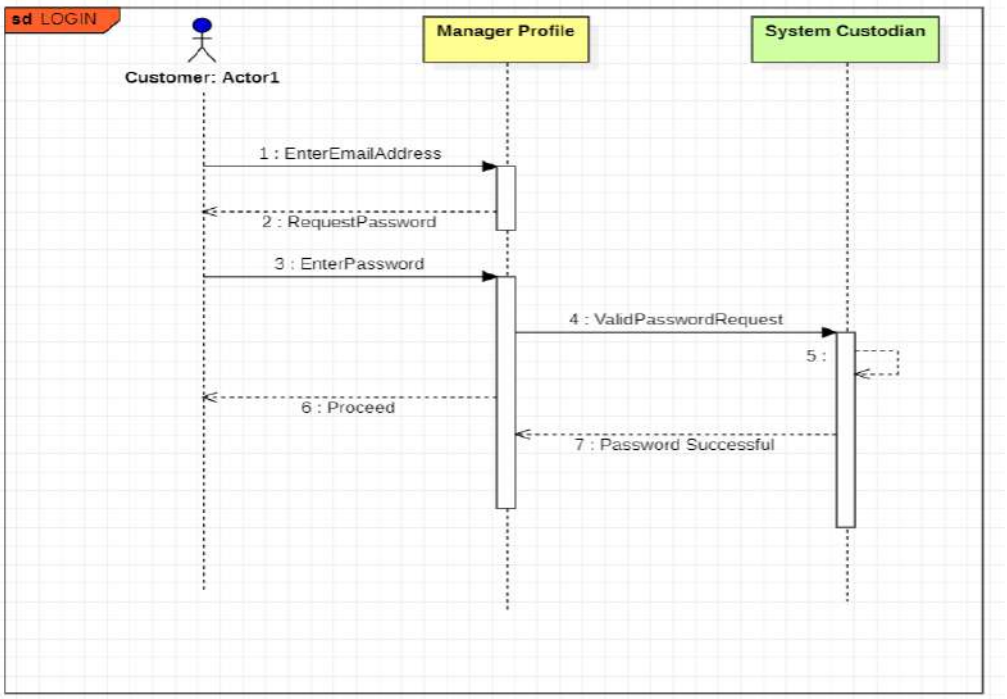
4. This system allows the customer to view his/her account balance
5. This system allows the customer to transfer money from his account to another account
6. This system allows the customer to recover password
7. This system allows the customer to change password
8. This system allows the customer to delete profile
9. This system allows the customer to choose image point.

2. UML Diagrams

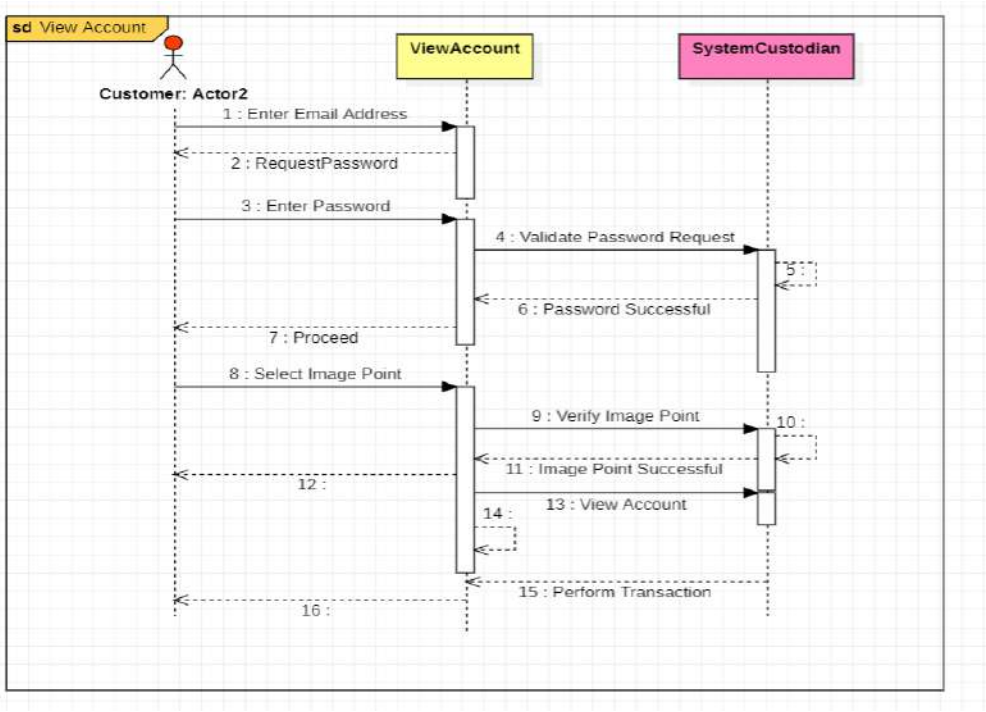
- **USE CASE DIAGRAM**



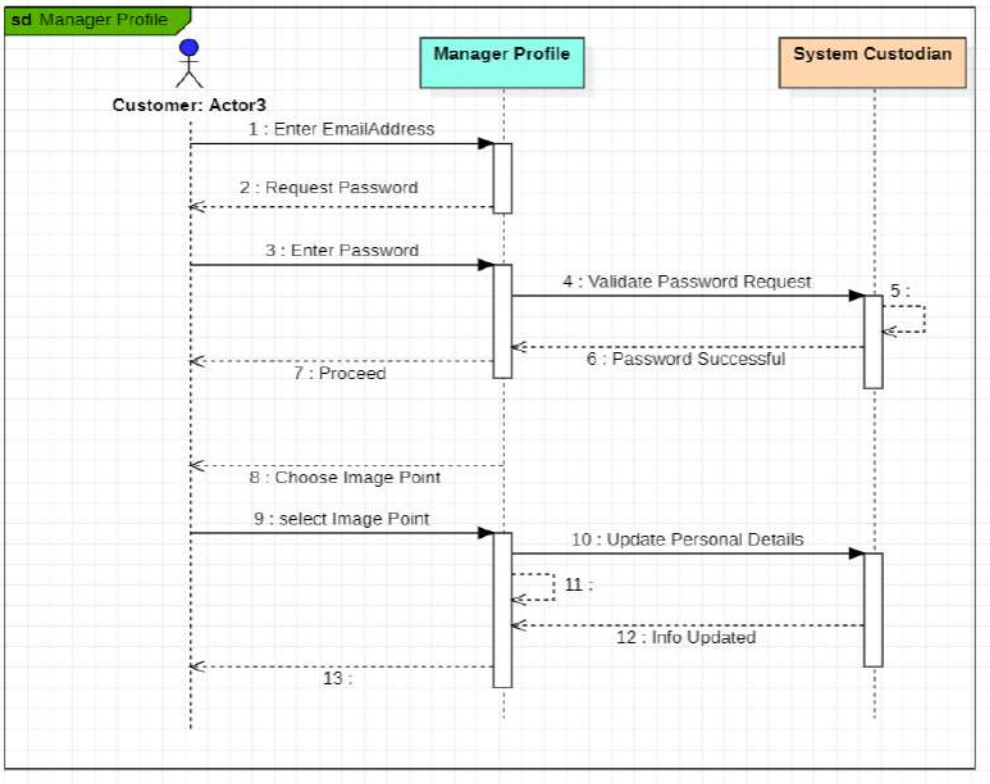
- **SEQUENCE DIAGRAM FOR LOGIN**



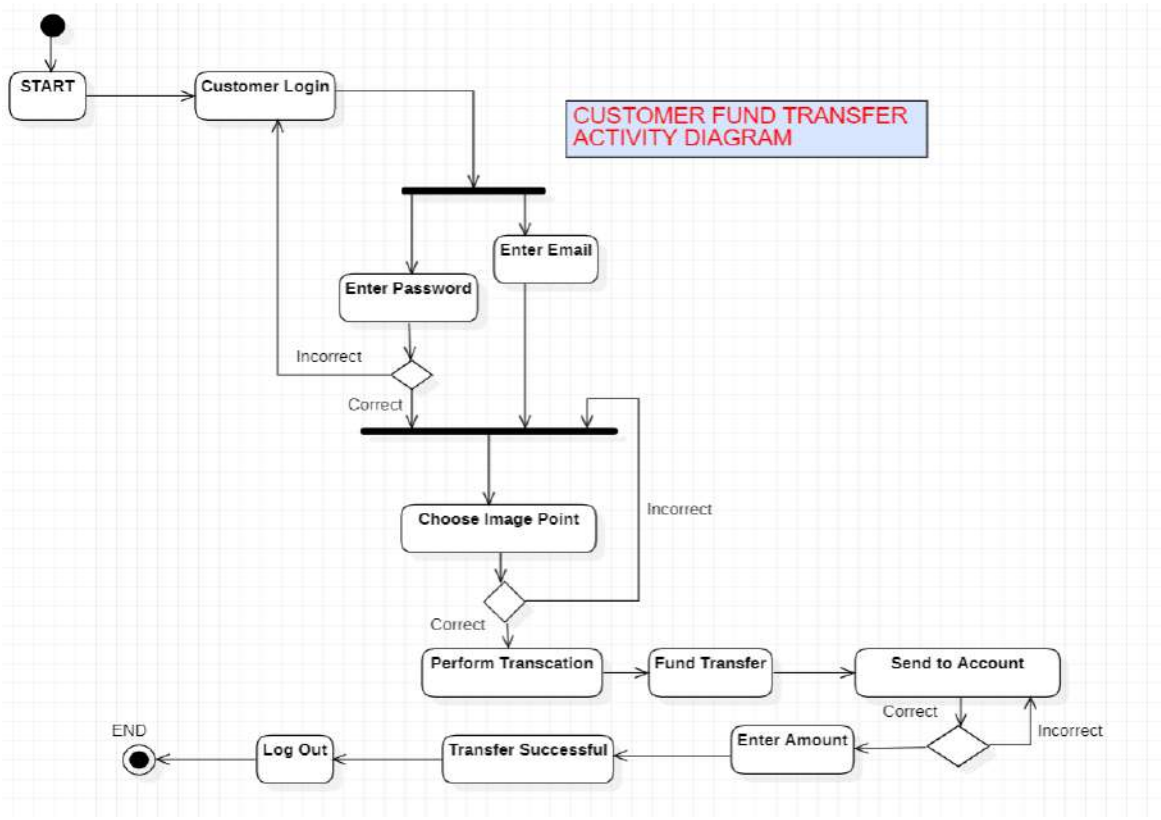
- **SEQUENCE DIAGRAM FOR VIEW ACCOUNT**



- **SEQUENCE DIAGRAM FOR MANAGER PROFILE**

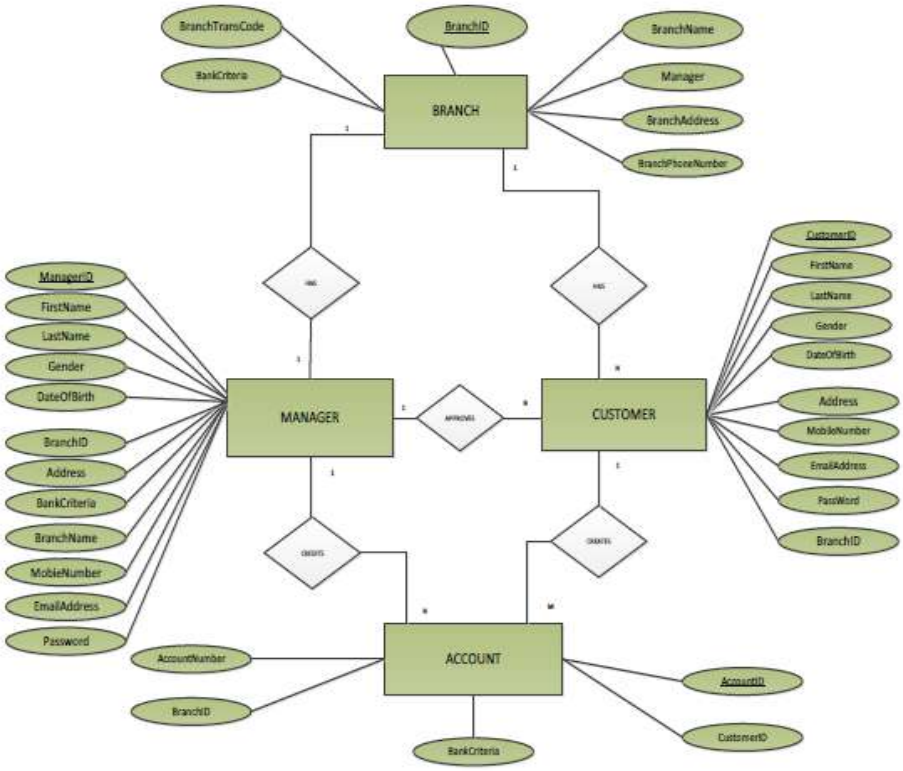


- **CUSTOMER FUND TRANSFER ACTIVITY DIAGRAM:**

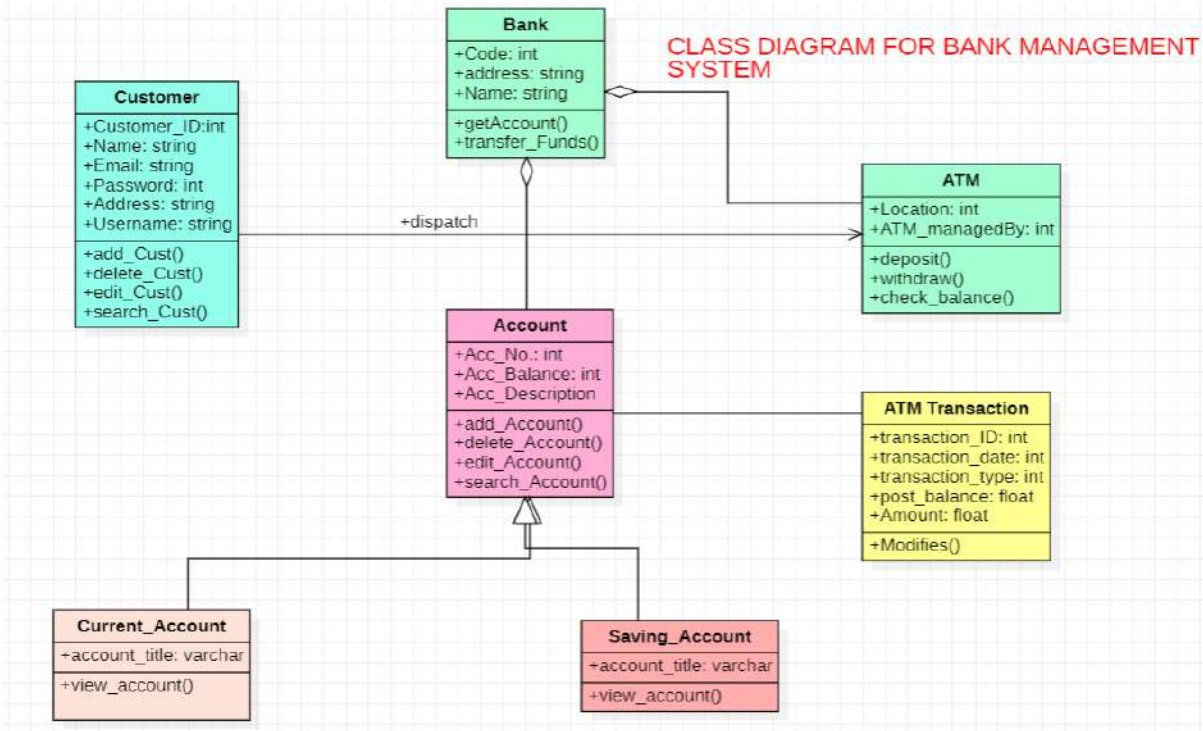


Results

- **ER DIAGRAM:**

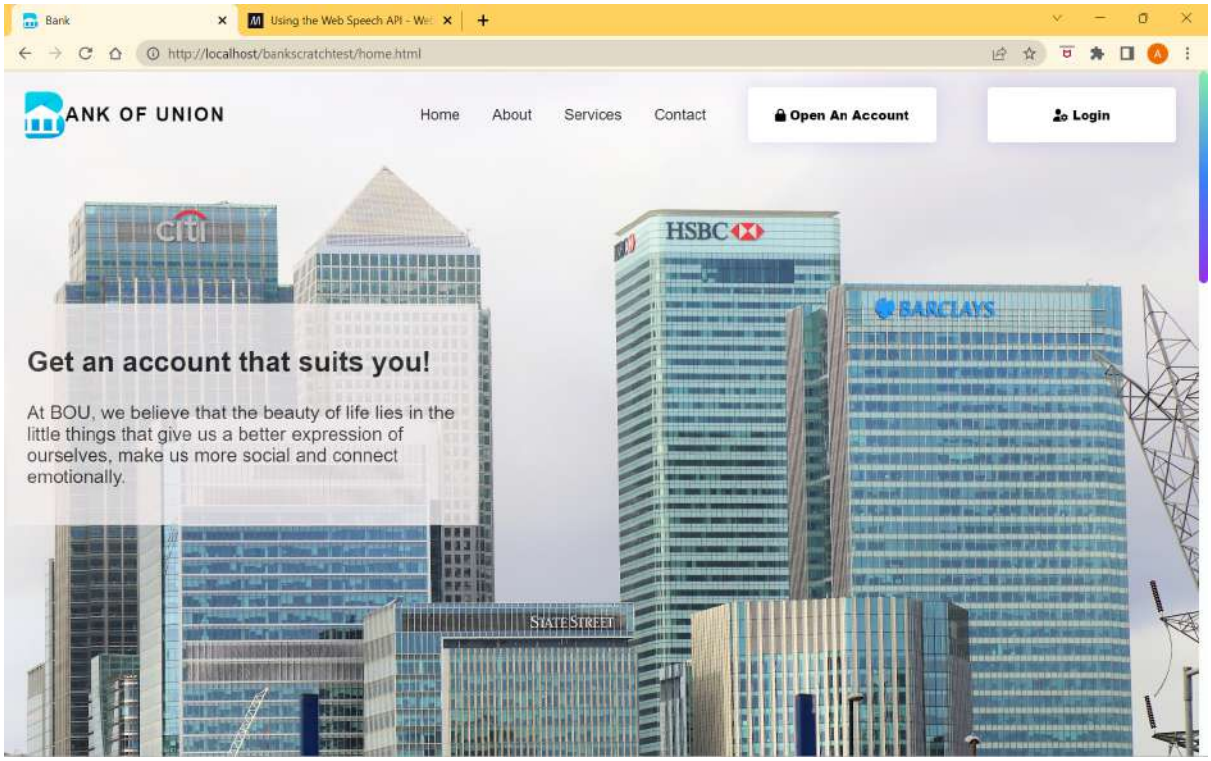


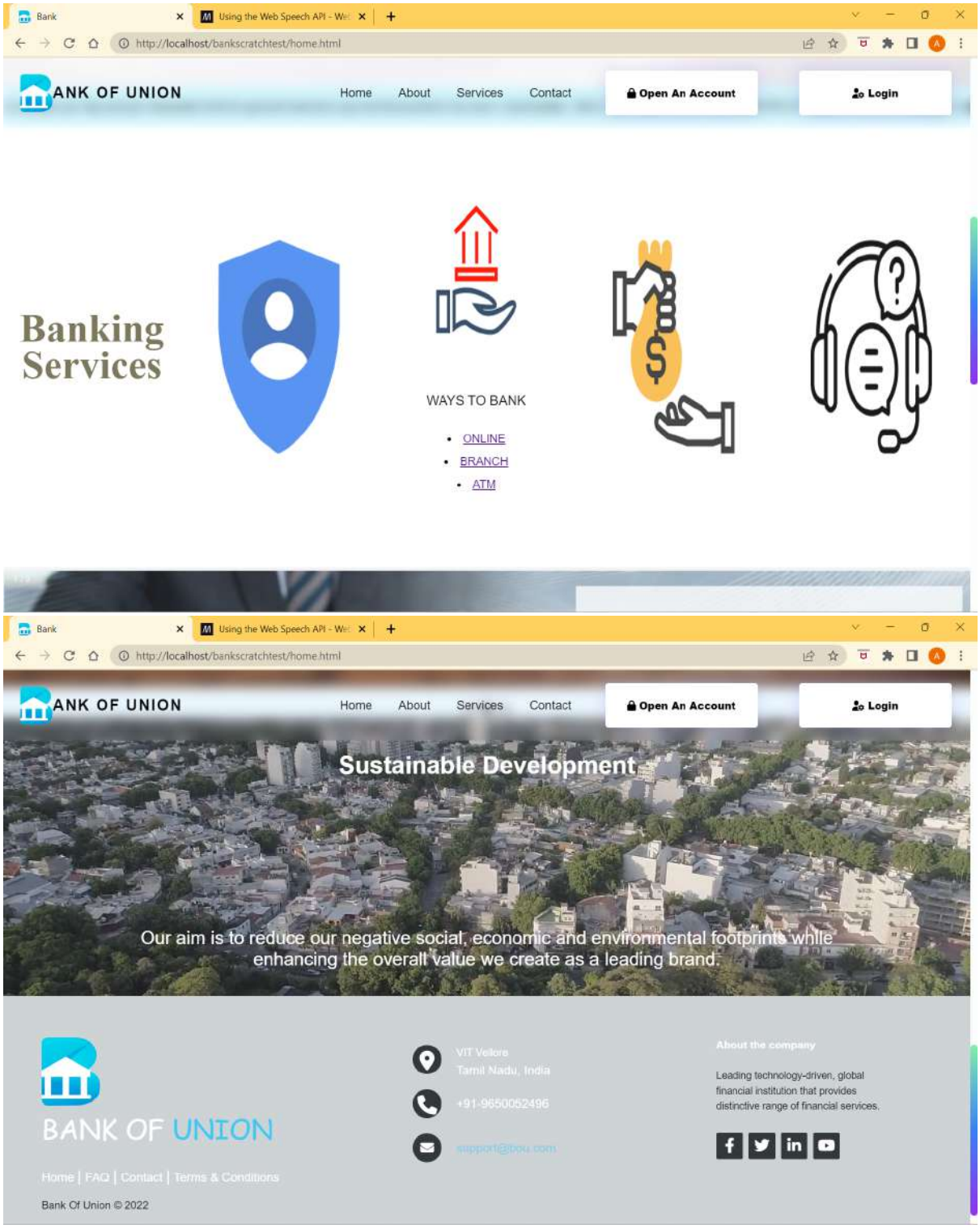
- **CLASS DIAGRAM:**



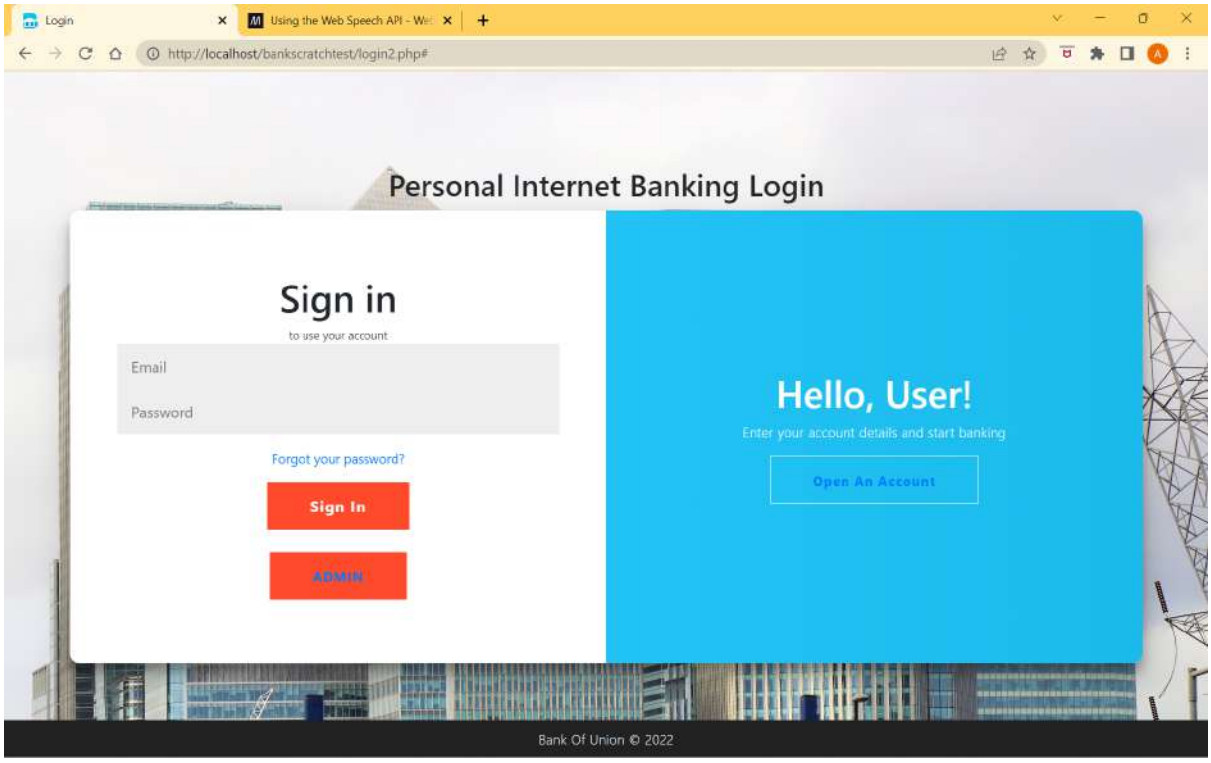
Screenshots

Home page

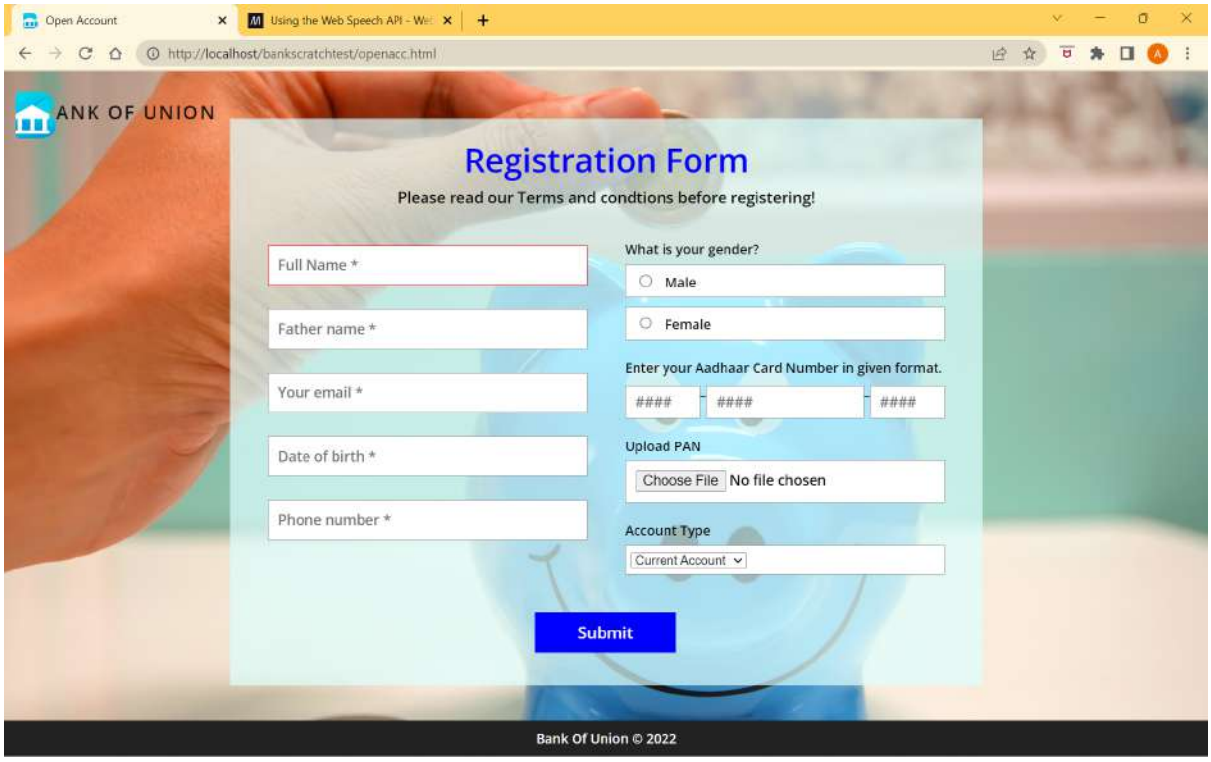



Bank
Using the Web Speech API - Web
http://localhost/bankscratchtest/home.html
ANK OF UNION
Home
About
Services
Contact
Open An Account
Login
Banking Services
WAYS TO BANK
ONLINE
BRANCH
ATM
Sustainable Development
Our aim is to reduce our negative social, economic and environmental footprints while enhancing the overall value we create as a leading brand.
BANK OF UNION
Home | FAQ | Contact | Terms & Conditions
Bank Of Union © 2022
VIT Vellore
Tamil Nadu, India
+91-9650052496
About the company
Leading technology-driven, global financial institution that provides distinctive range of financial services.

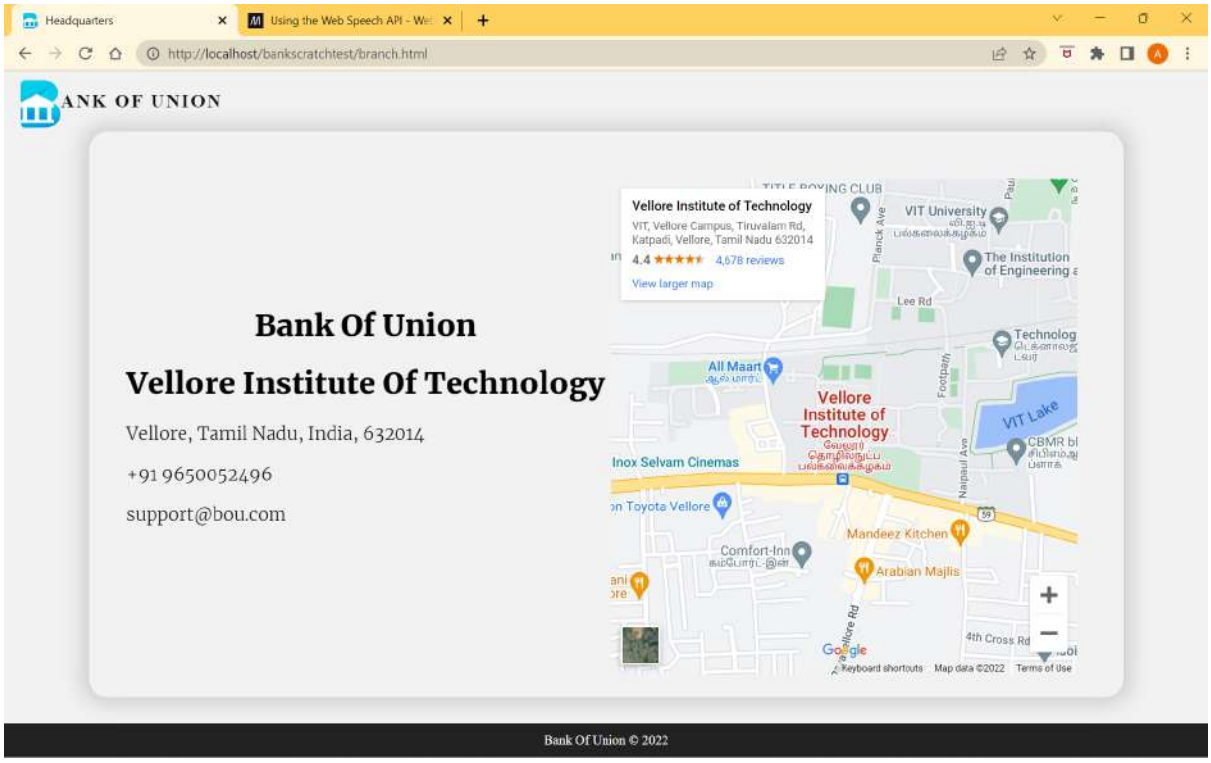
Login page



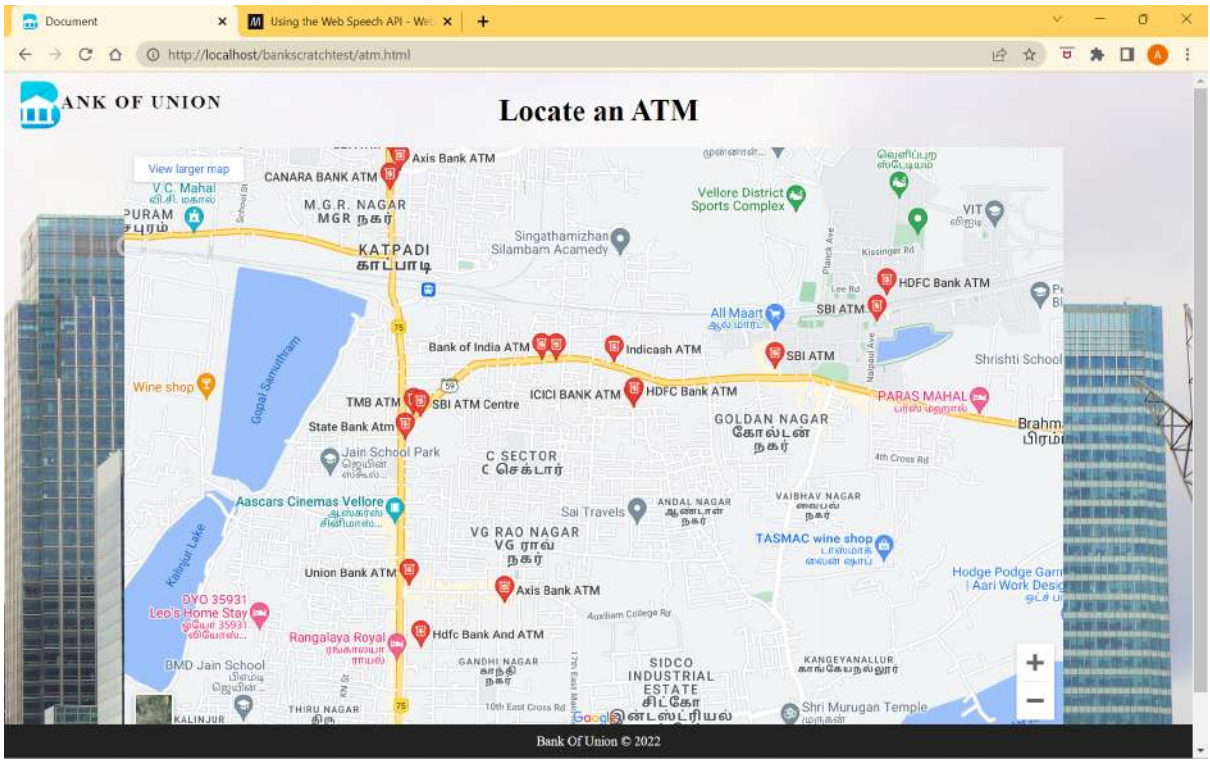
Open account page



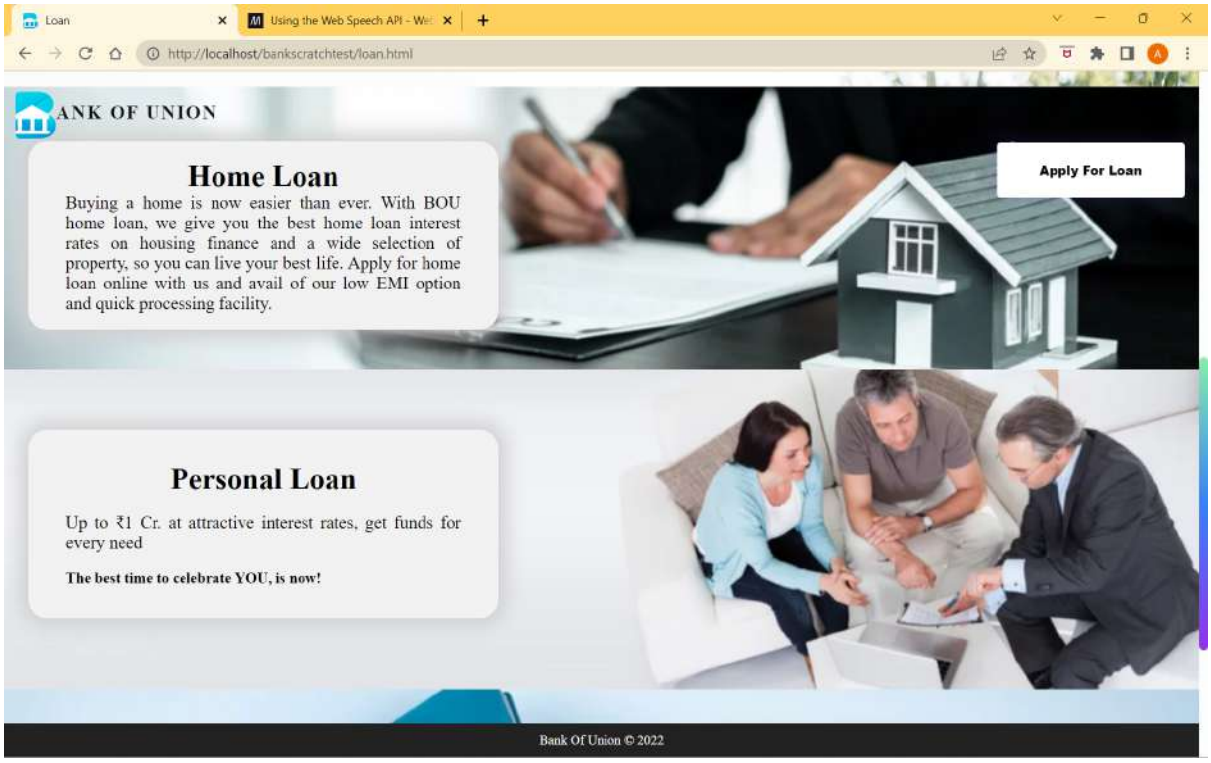
Main branch page



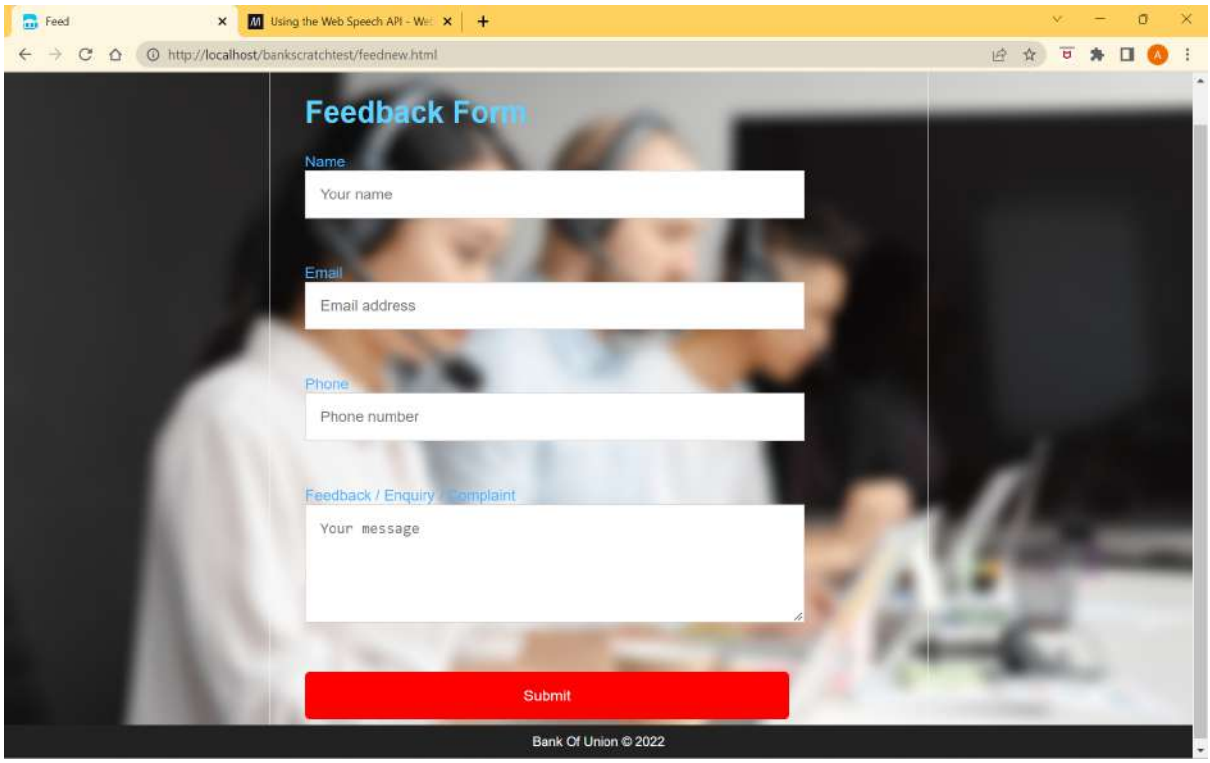
Nearest atm locator page



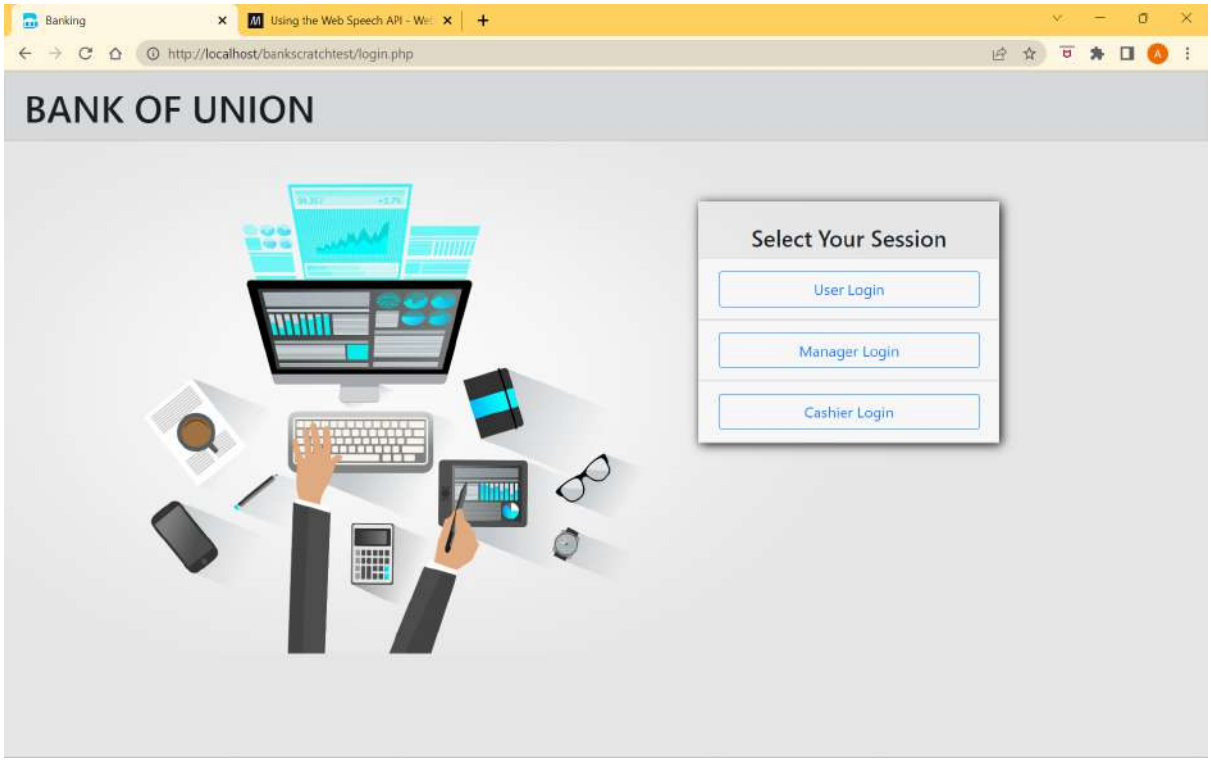
Loan page



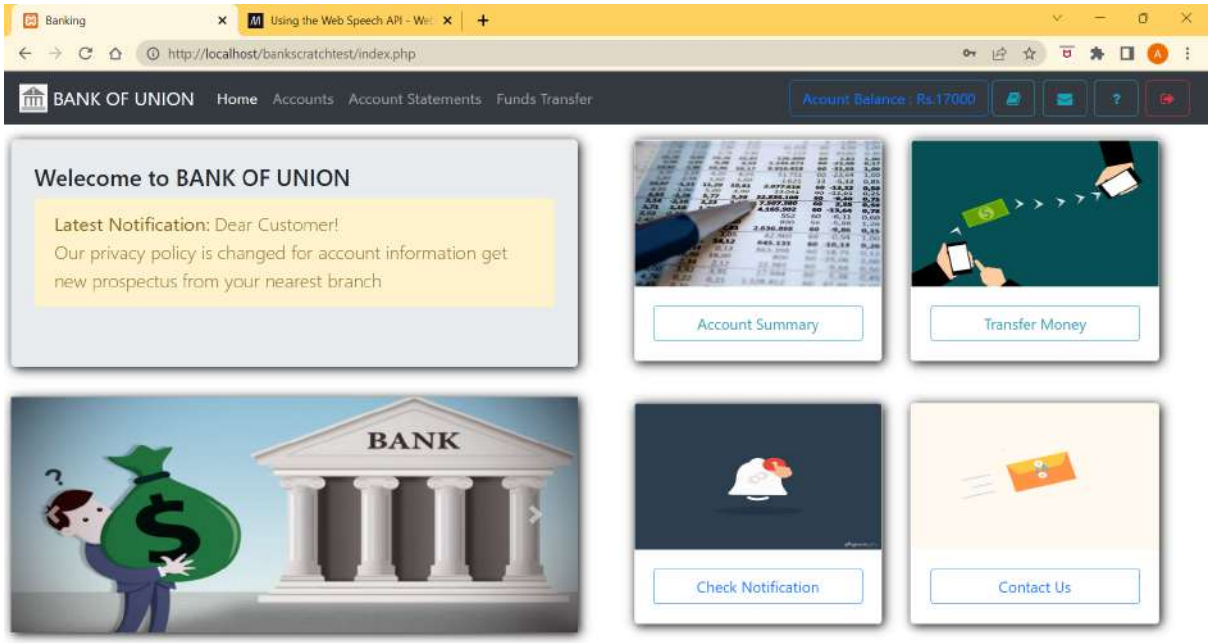
Feedback



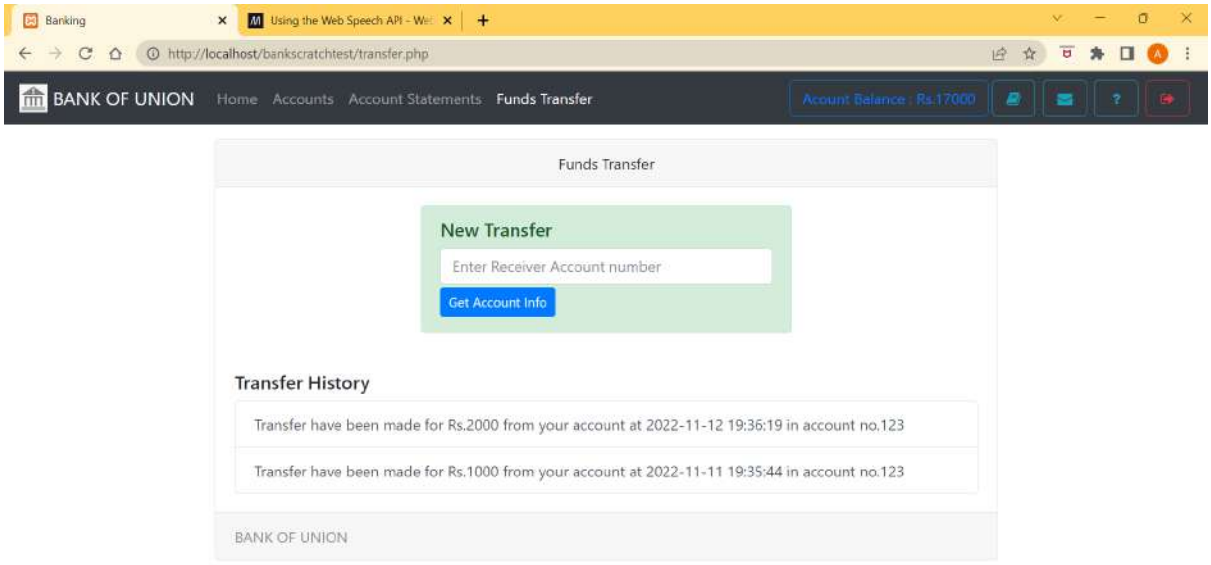
Admin login page



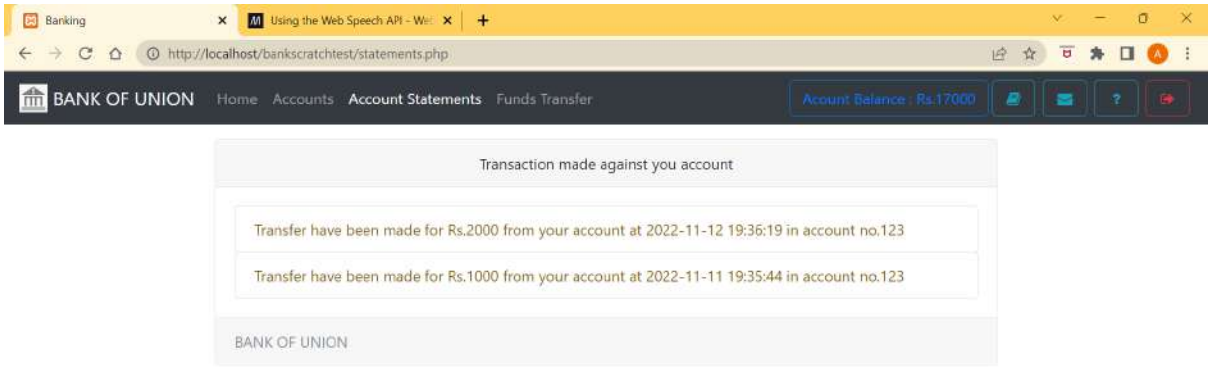
Main user after login page



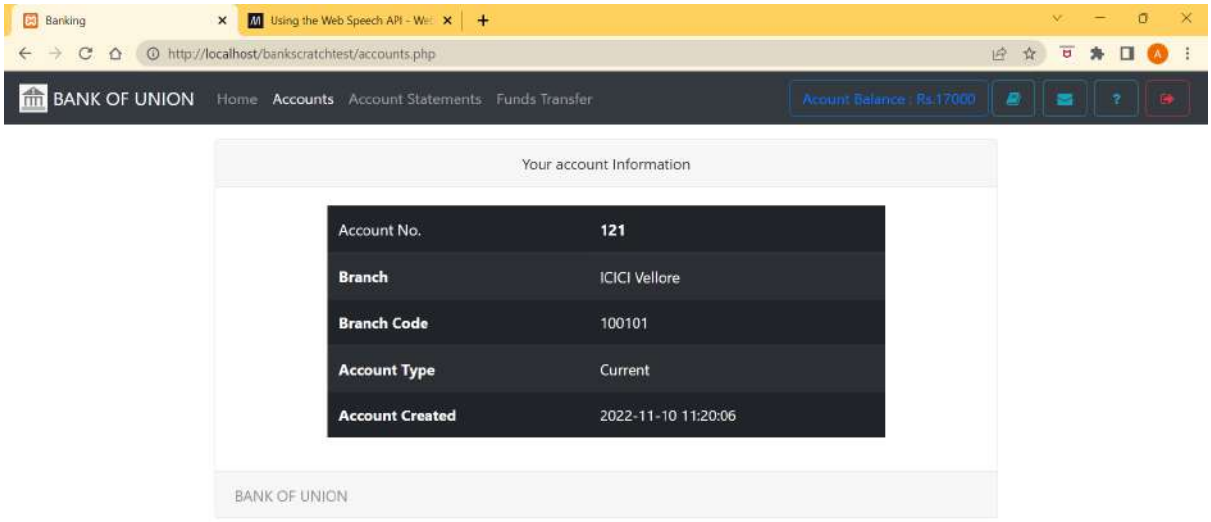
Funds transfer



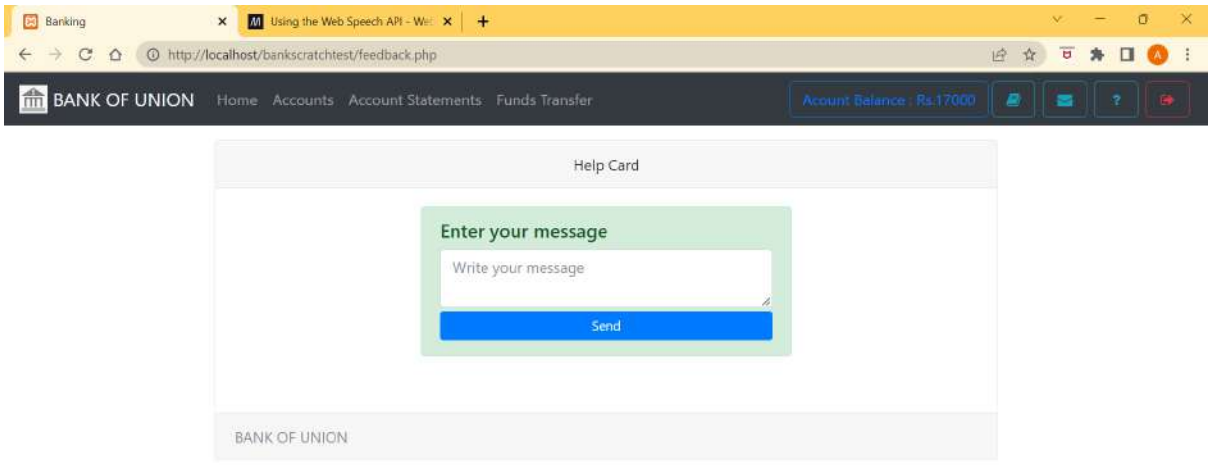
Account statement



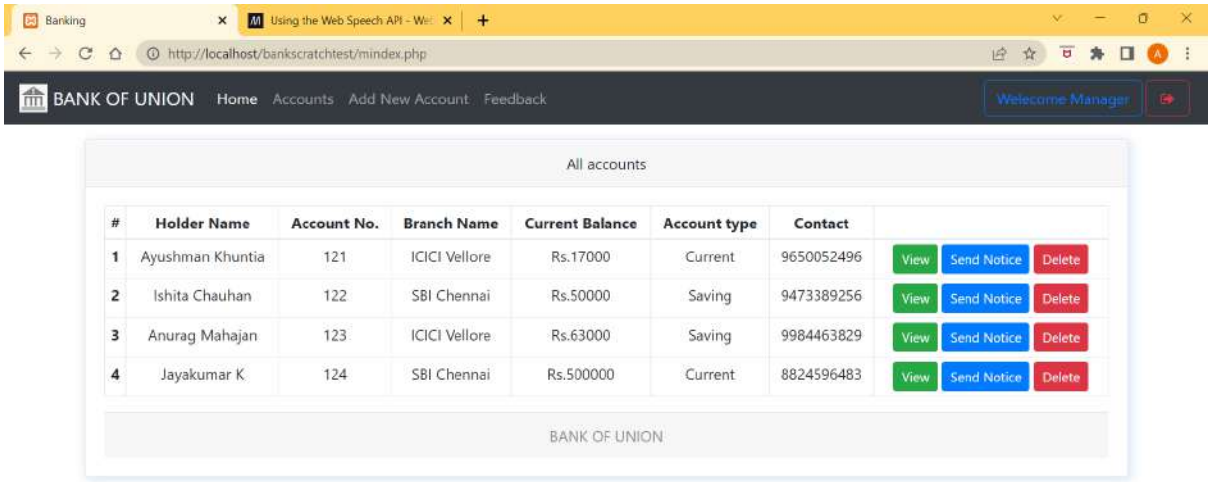
User account info



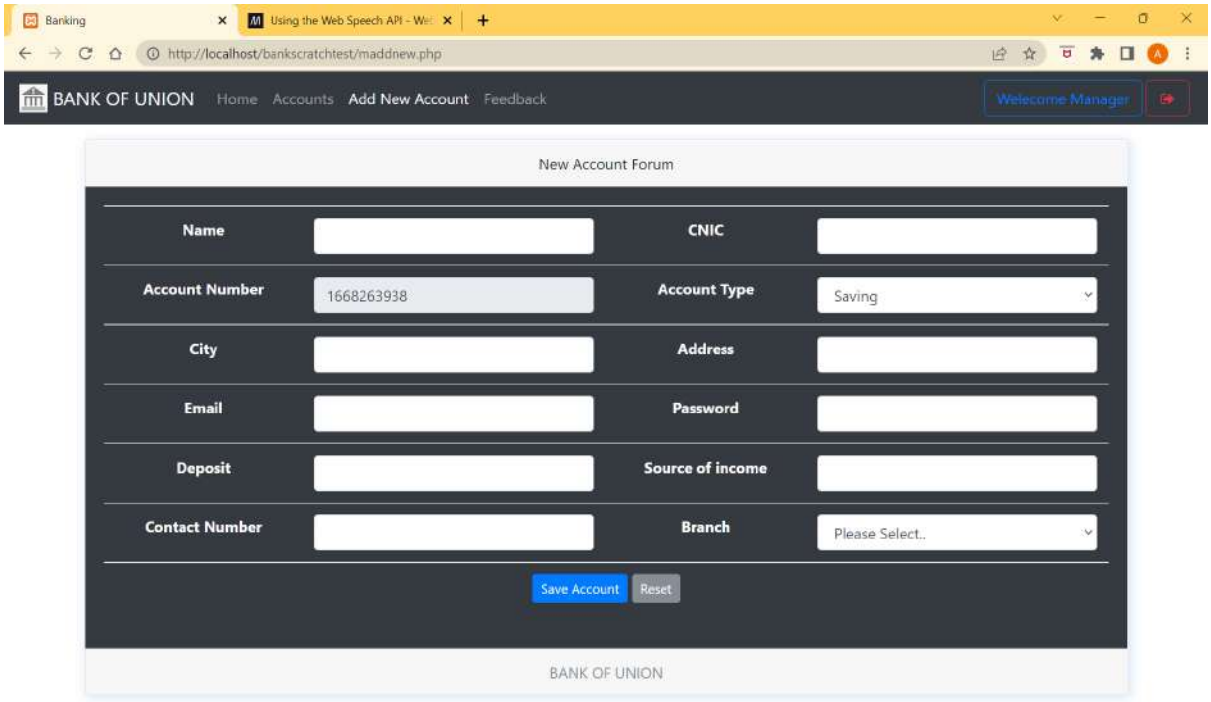
Send message to manager page



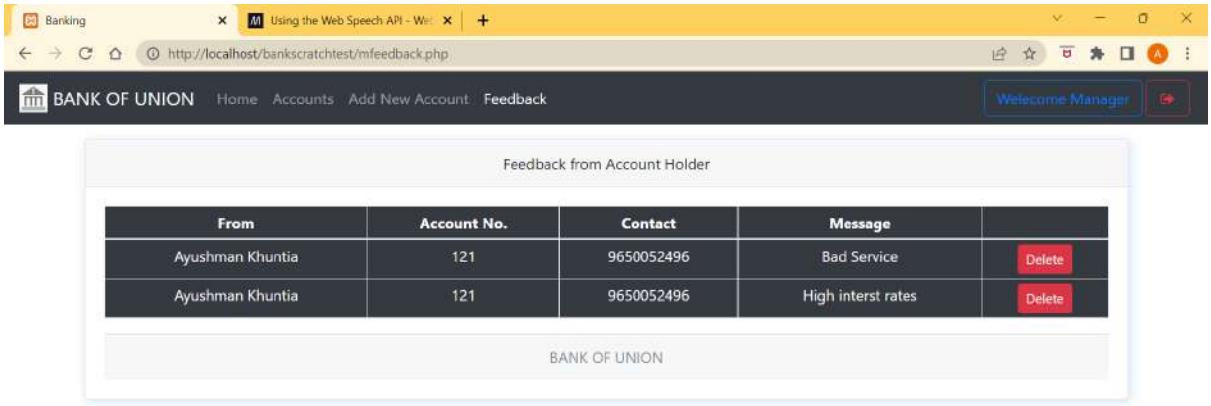
Manager after login page



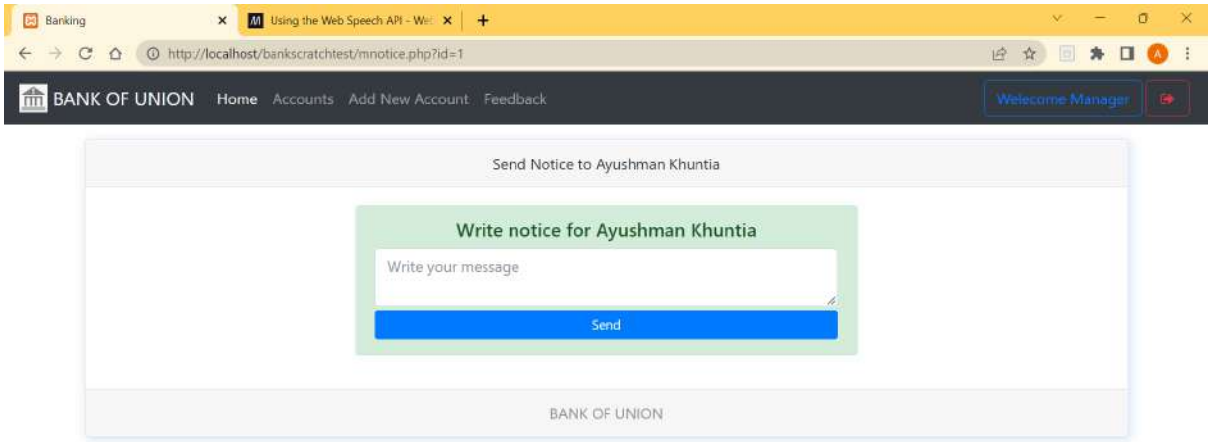
Manager add account page



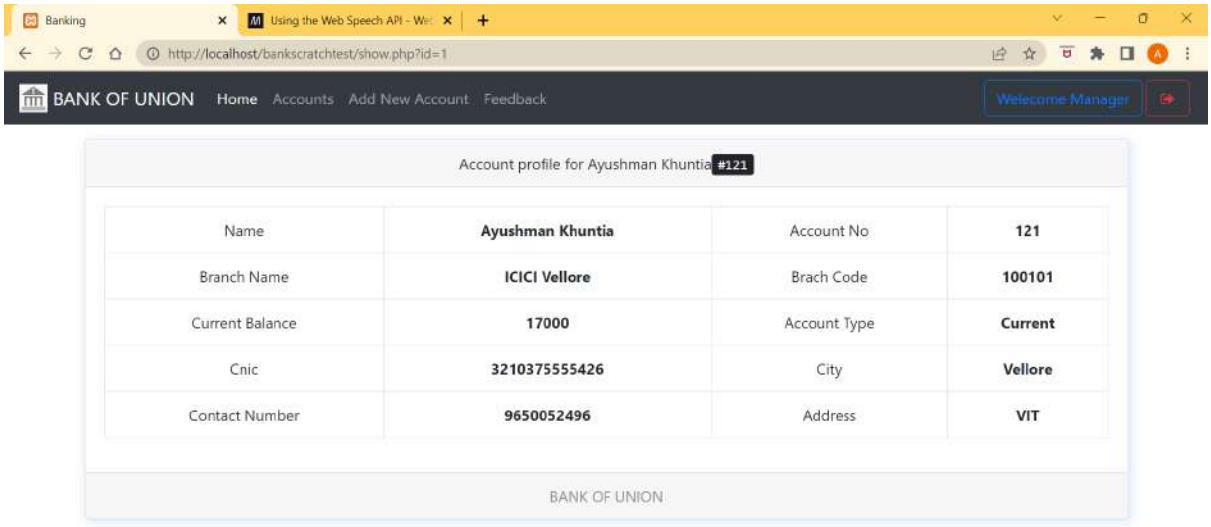
Feedback from users page



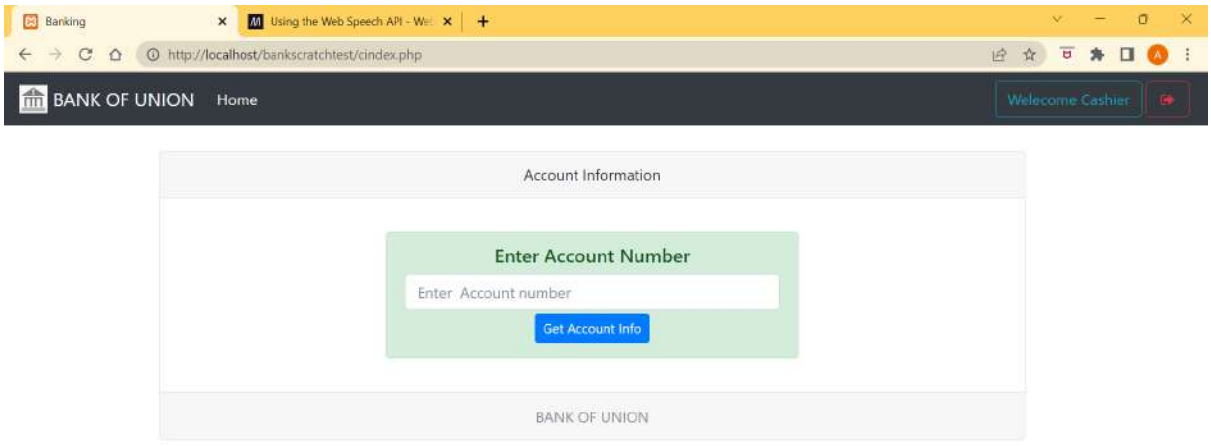
Send notice to user page



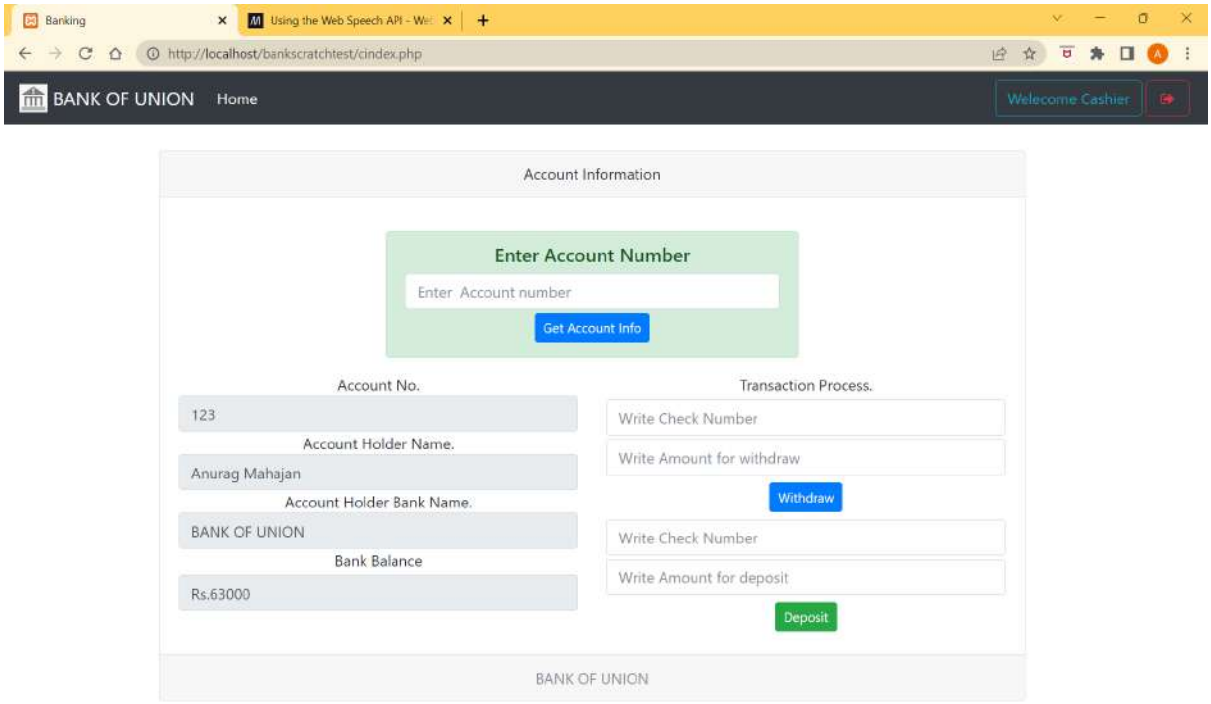
View user details



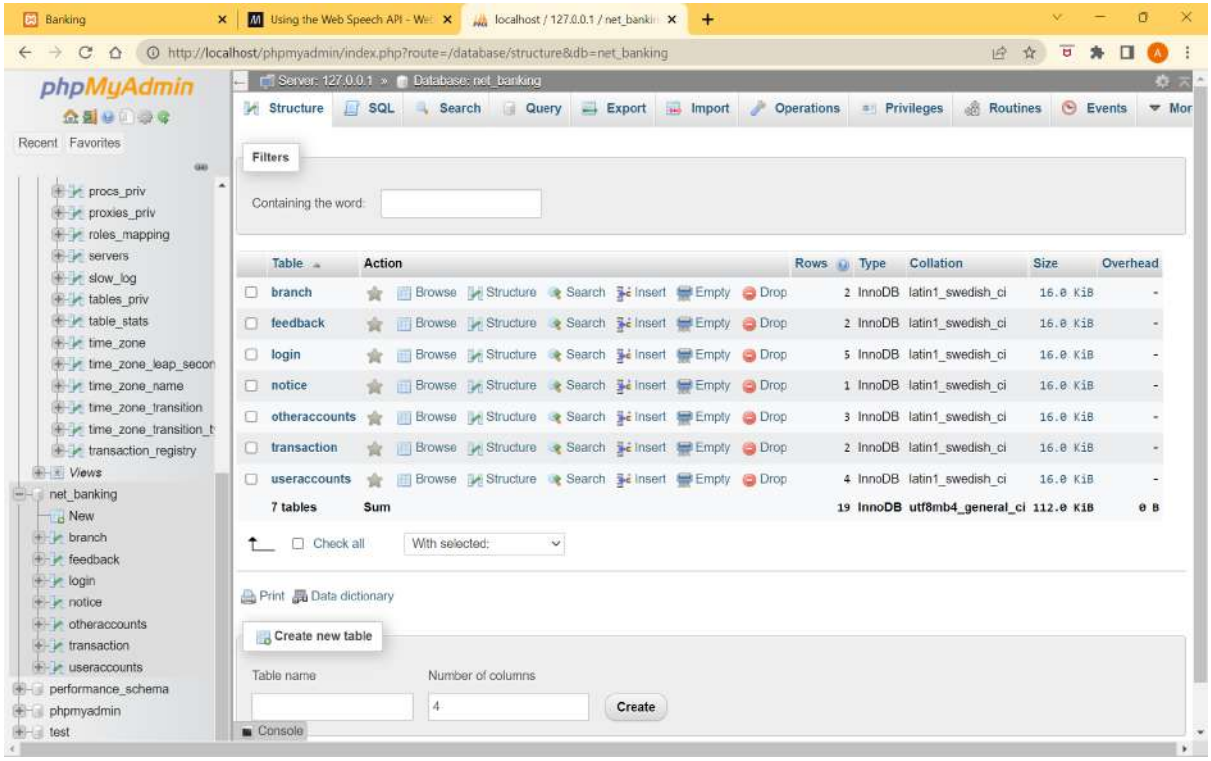
For offline
Cashier after login page



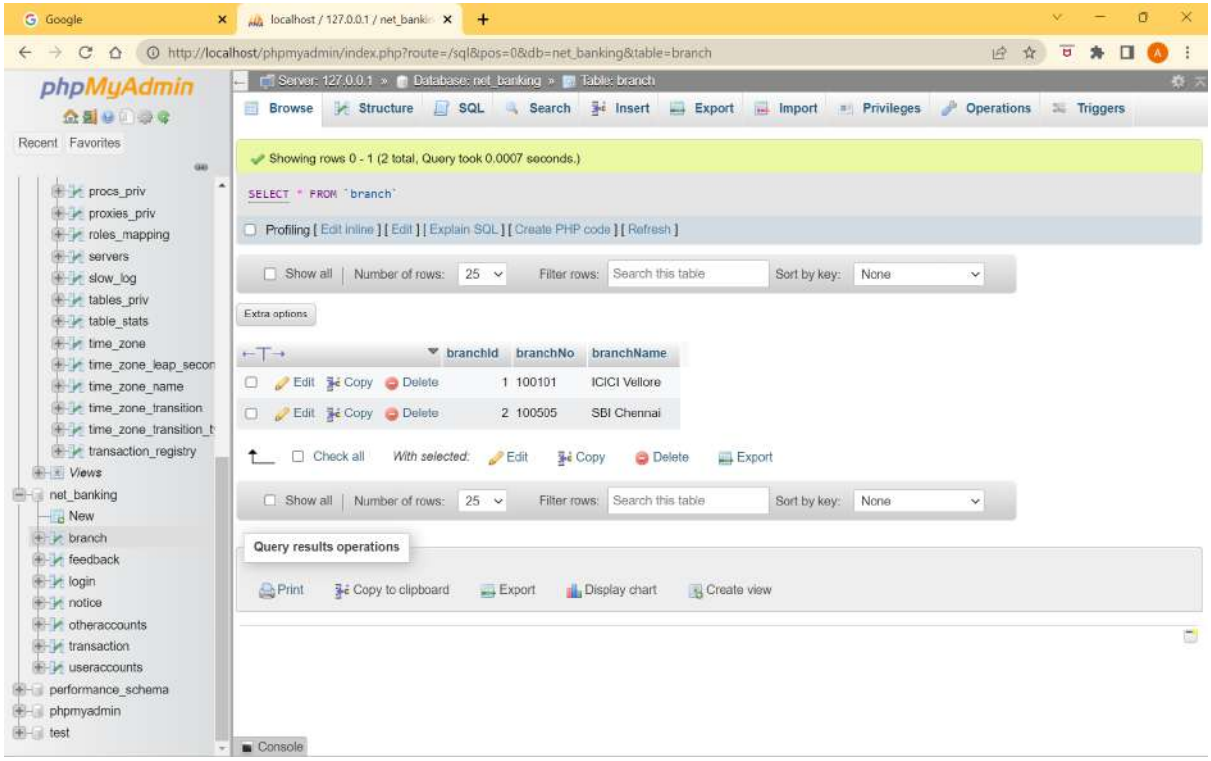
Cashier transaction page after entering account number



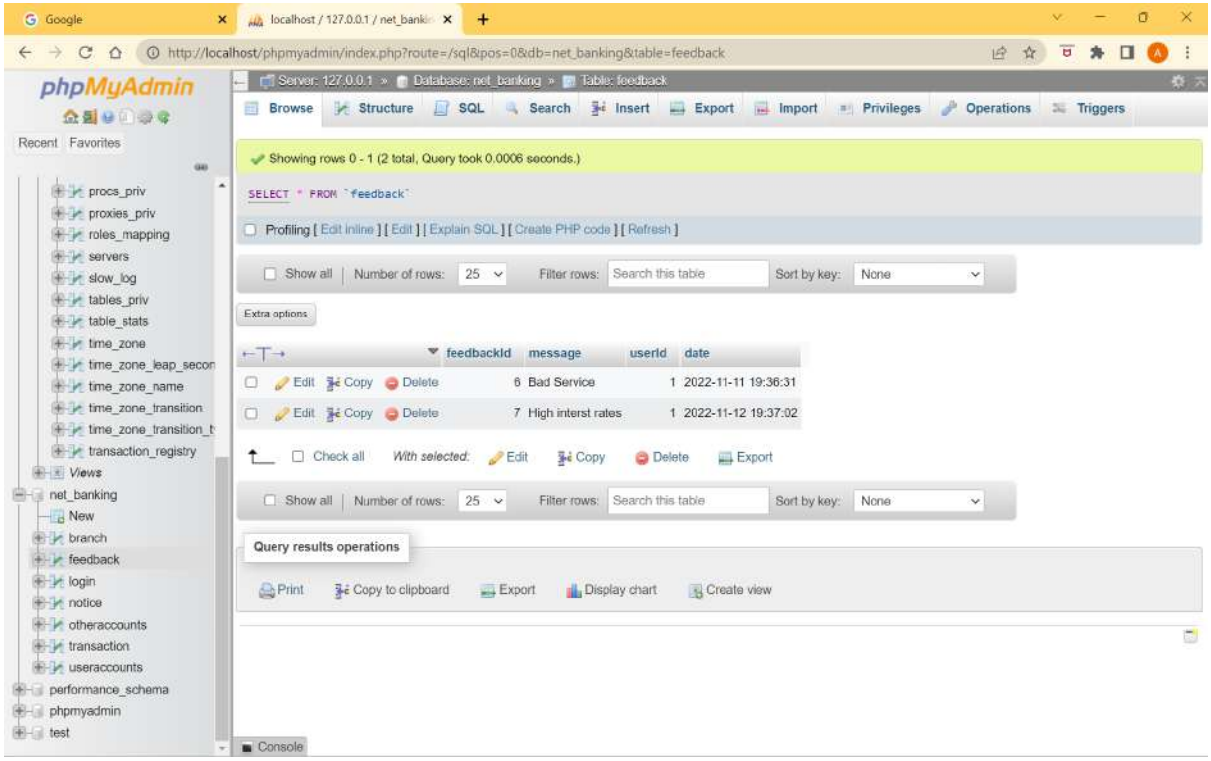
Database



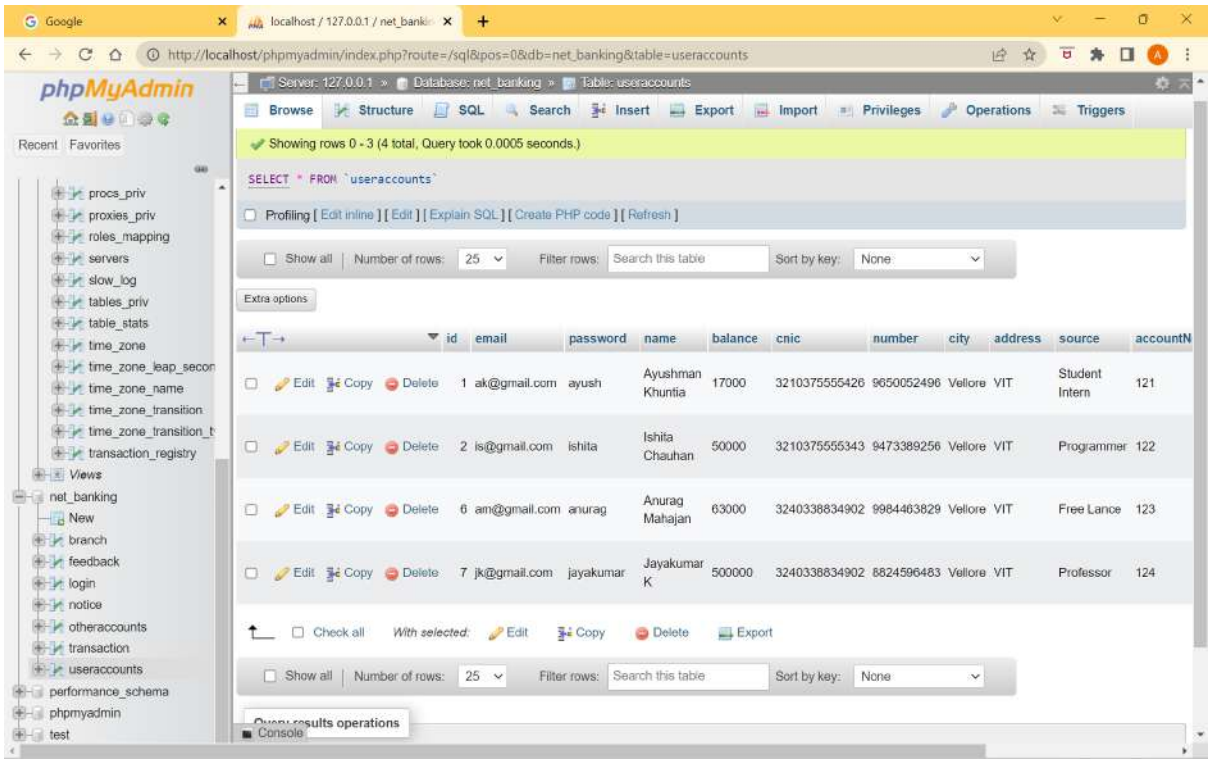
Branch



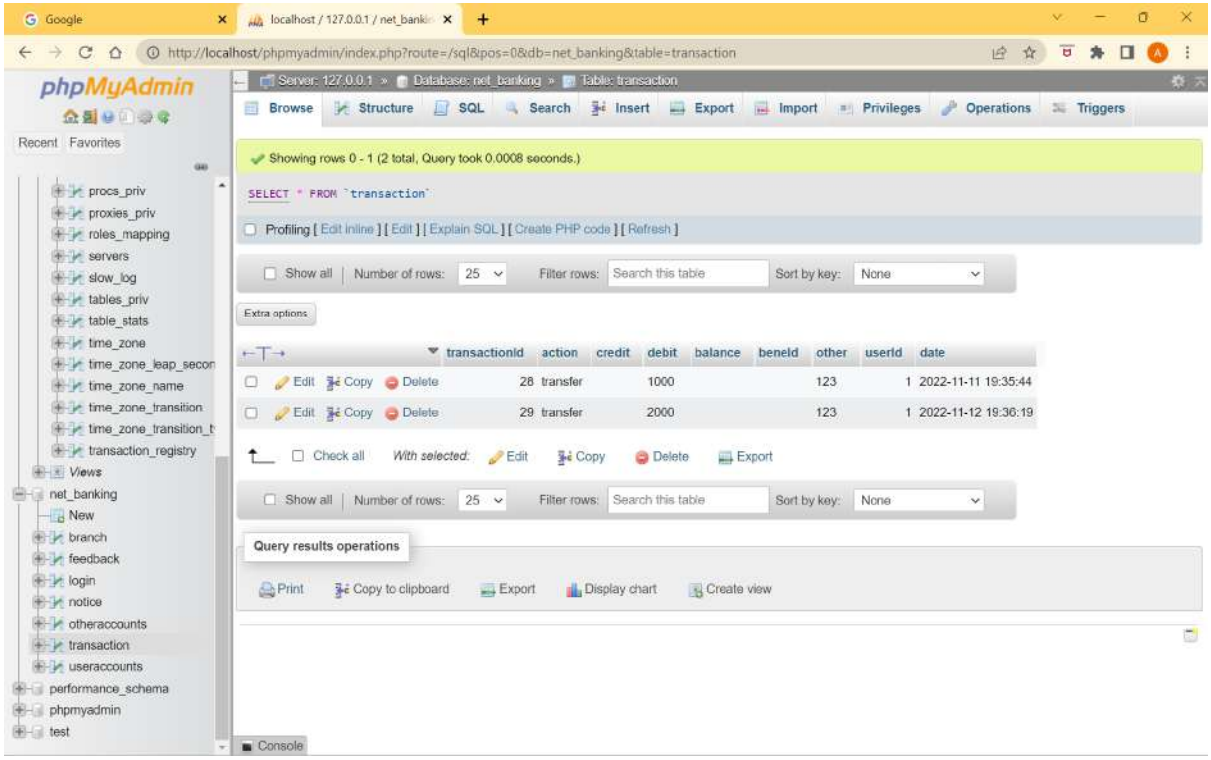
Feedback



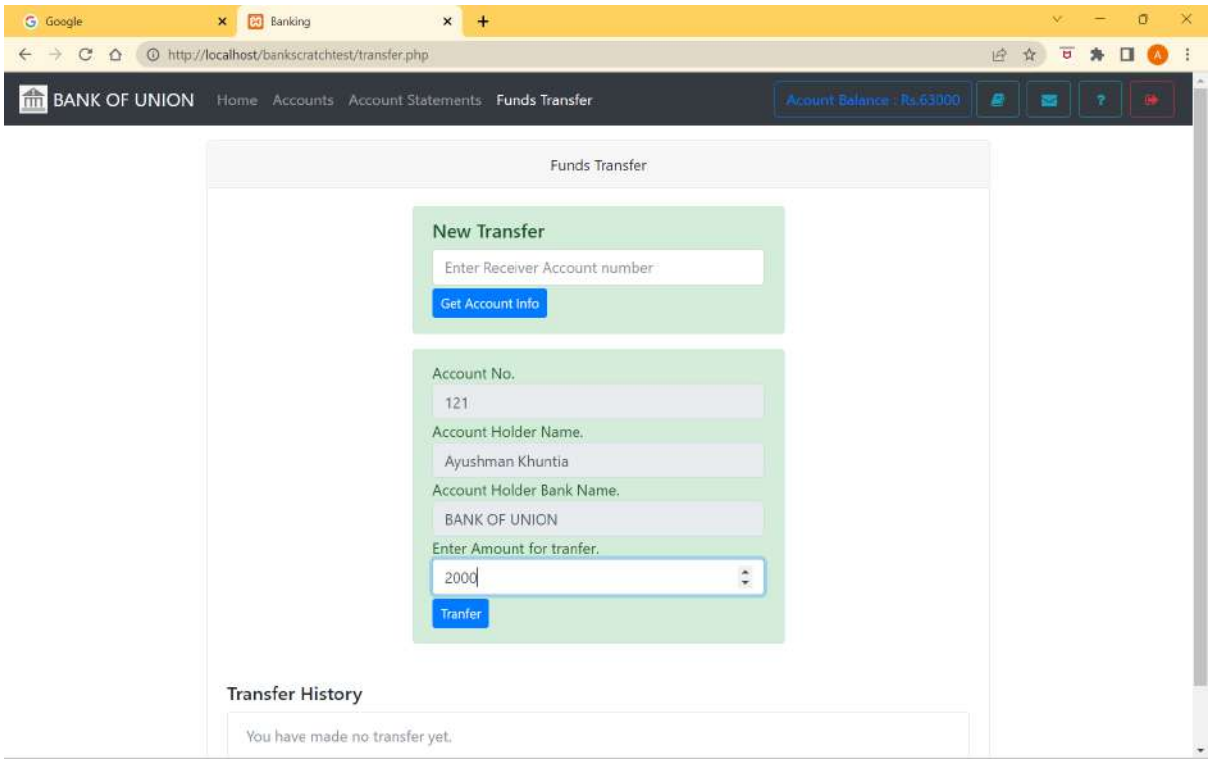
User accounts

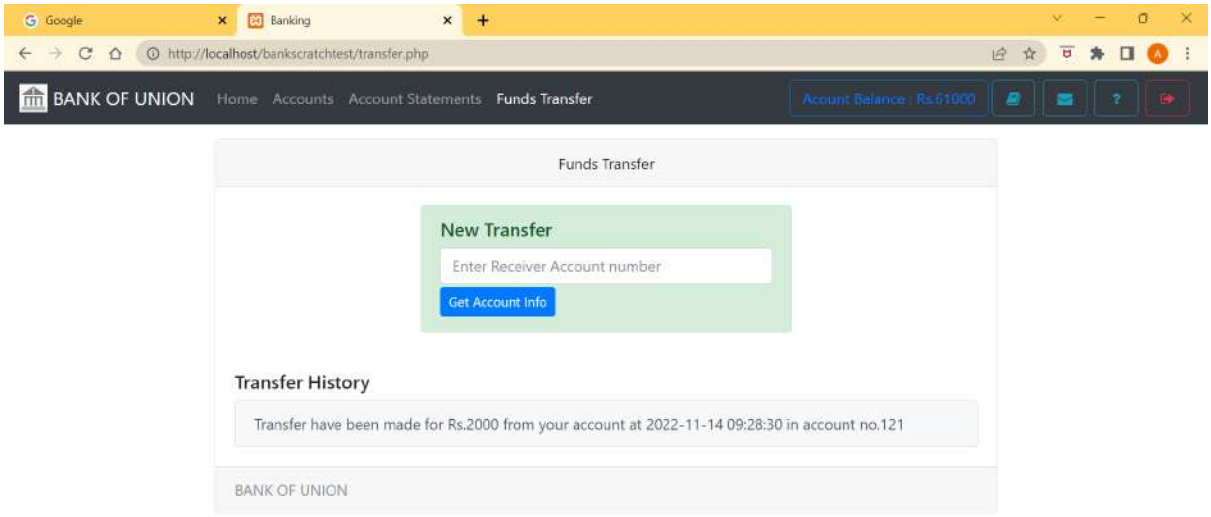


Transaction

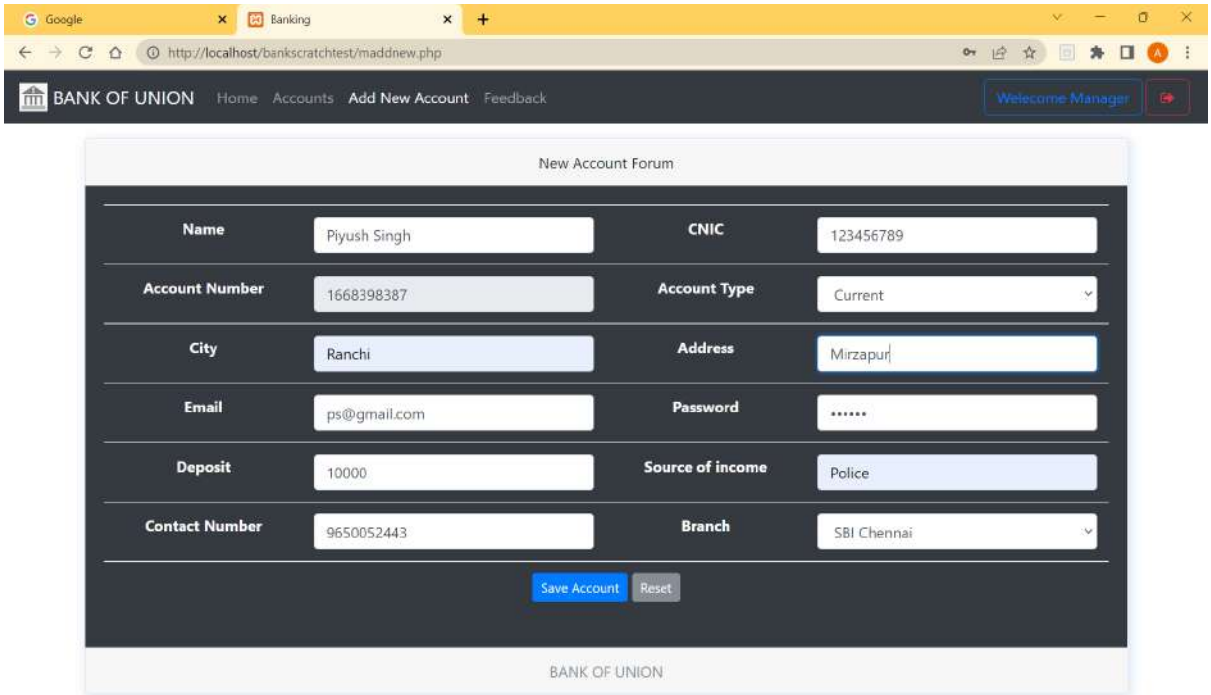


Implementation
Transaction




Google
Banking
http://localhost/bankscratchtest/transfer.php
BANK OF UNION
Home
Accounts
Account Statements
Funds Transfer
Acount Balance : Rs.61000
Funds Transfer
New Transfer
Enter Receiver Account number
Get Account Info
Transfer History
Transfer have been made for Rs.2000 from your account at 2022-11-14 09:28:30 in account no.121
BANK OF UNION

Add account


Google
Banking
http://localhost/bankscratchtest/maddnew.php
BANK OF UNION
Home
Accounts
Add New Account
Feedback
Welcome Manager
New Account Forum
Name
Piyush Singh
CNIC
123456789
Account Number
1668398387
Account Type
Current
City
Ranchi
Address
Mirzapur
Email
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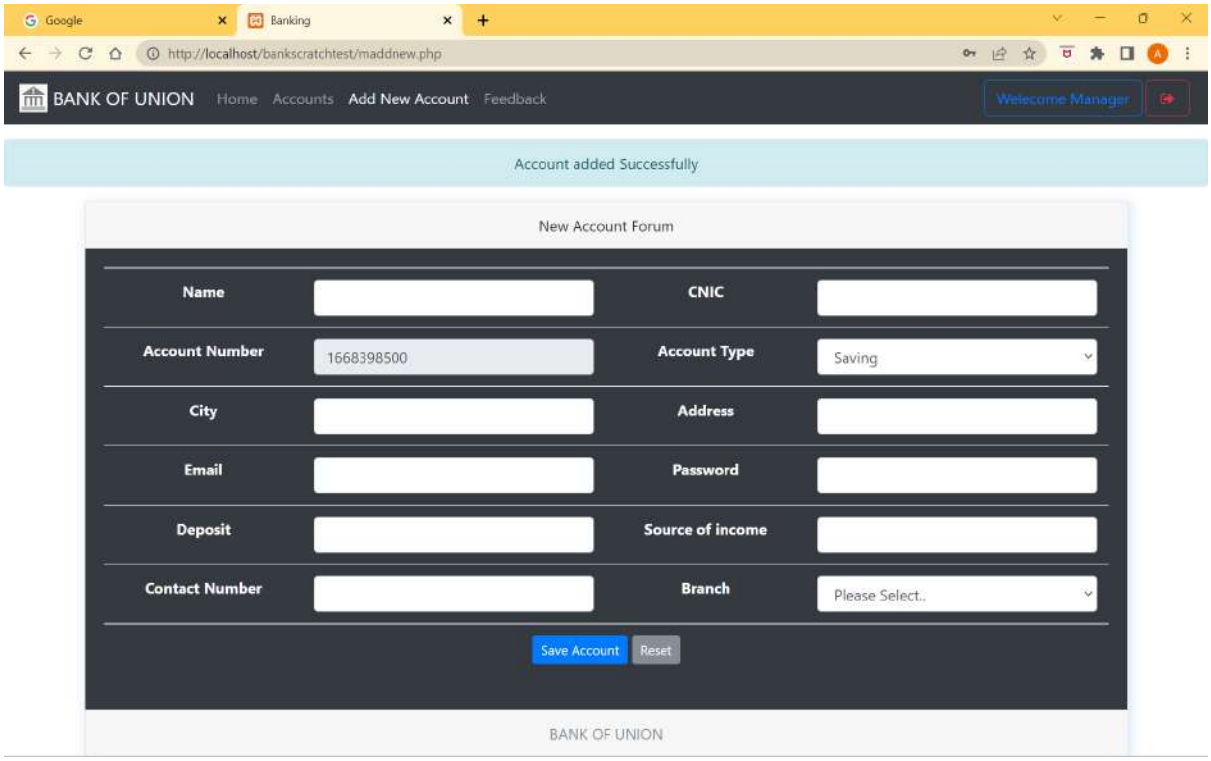
Password
Deposit
10000
Source of income
Police
Contact Number
9650052443
Branch
SBI Chennai
Save Account
Reset
BANK OF UNION


Google
Banking
http://localhost/bankscratchtest/maddnew.php
BANK OF UNION
Home
Accounts
Add New Account
Feedback
Welcome Manager
Account added Successfully
New Account Forum
Name
CNIC
Account Number
1668398500
Account Type
Saving
City
Address
Email
Password
Deposit
Source of income
Contact Number
Branch
Please Select..
Save Account
Reset
BANK OF UNION

Conclusion

We have successfully designed, develop and implemented this Bank Management system which provides a more secured approach in managing bank customer's information and strengthens the relationships between banks and their customers by providing the right solutions that uses a multi-level security to improve customer satisfaction. We, therefore, encourages other developers of similar application to think twice on how best they can improve in developing a more secured system that will meet the challenges we face today especially on the banking sector and other financial institutions.

References

- https://www.zenithbank.com
- https://www.sc.com/in/
- https://www.yesbank.in
- https://www.hdfcbank.com
- https://home.barclays
- https://www.jpmorganchase.com
- https://www.goldmansachs.com

Link to Project Demo and Code files:

https://drive.google.com/drive/folders/1JX_w92a_7MRkwymJfOomA2bU9ZGYUQIA?usp=sharing