



Money Map

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PROBLEM

Tracking one's personal finance can become a burdensome task. There could be bank accounts spread across different institutions. Multiple loans, each with their own payments and interest, where missed payment can cause credit score deductions or increased future interest. Having two or more credit cards is also common with similar consequences to loans if not monitored properly.

CURRENT SYSTEM

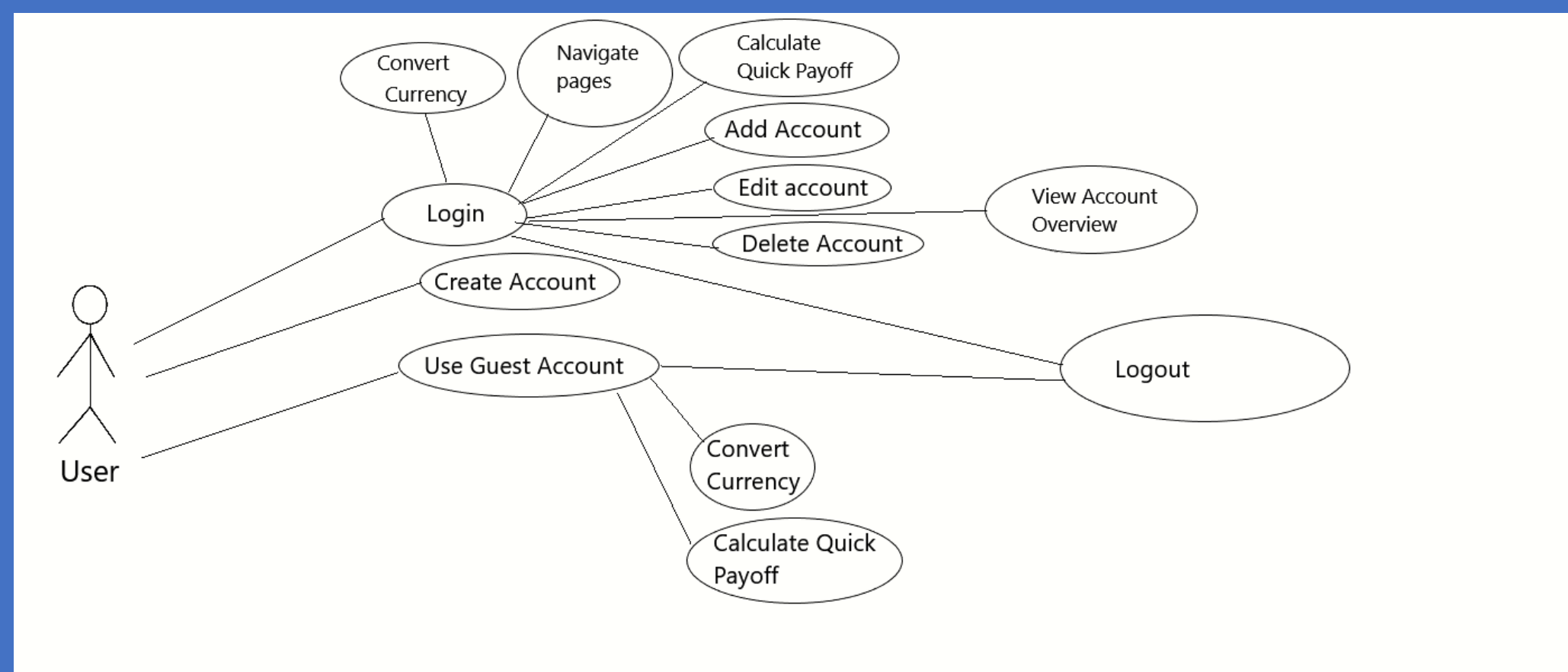
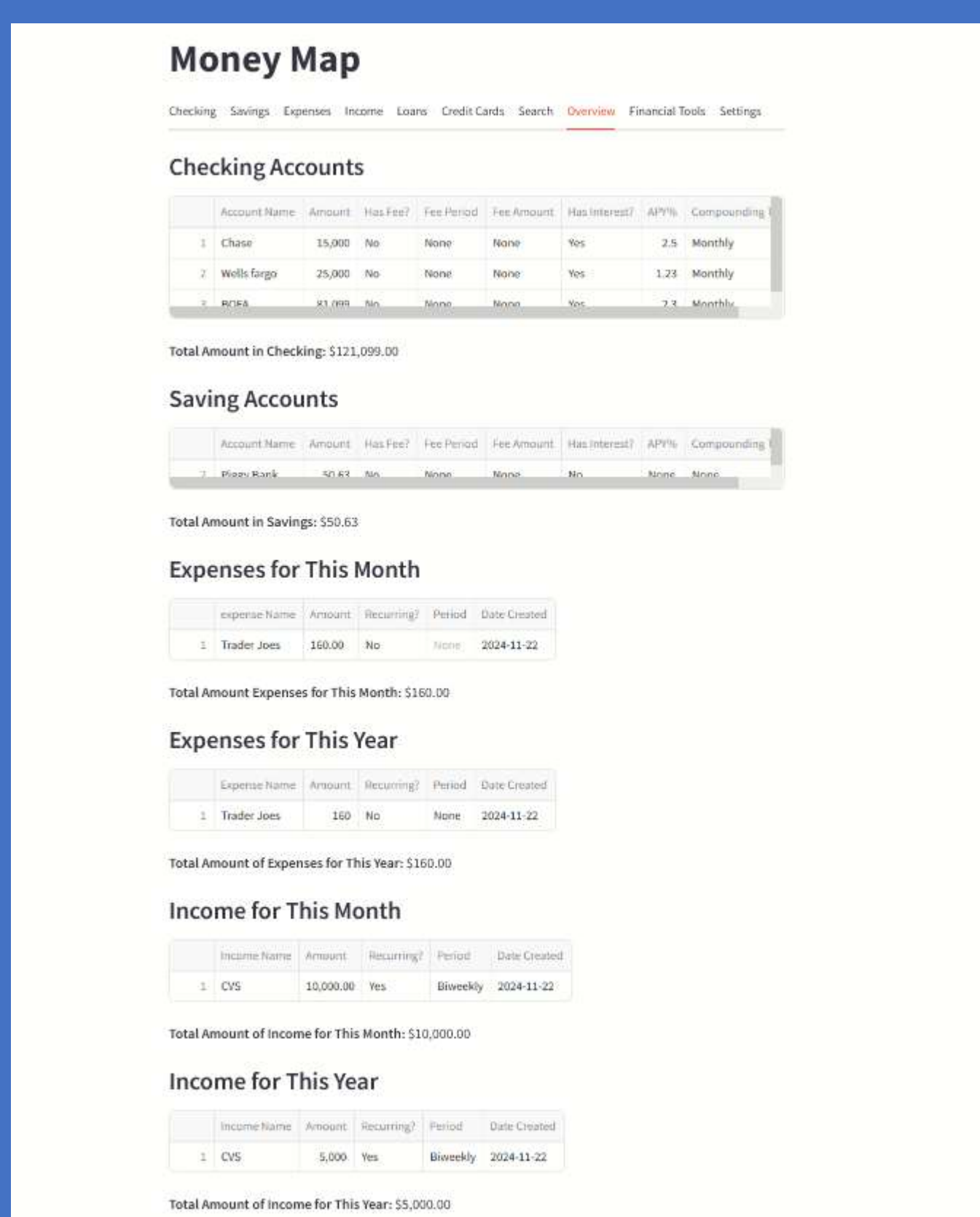
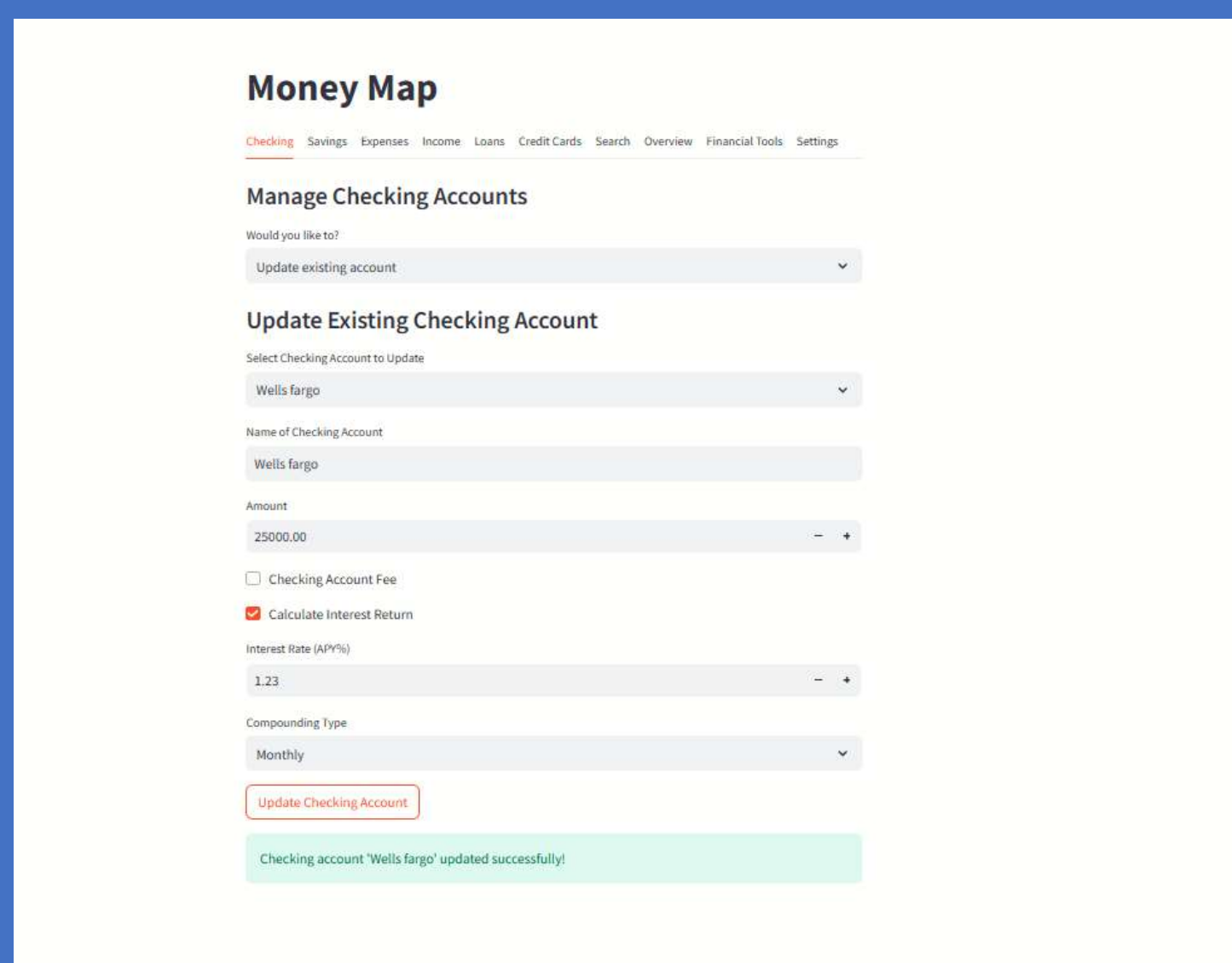
The latest version of Money Map, Version 1.2.04, allows users to easily enter and visualize their various bank accounts, incomes, expenses, and more.

- Users can login, logout, use a guest account, and create accounts
- Each account can be edited if there are errors or information changes after creation
 - Users can easily calculate their interest payments on loans and credit cards or gains on savings or checking accounts.
 - If a user needs travels overseas, they can convert their home currency to an overseas one.
- An overview is provided for users to easily look at their financial information

REQUIREMENTS

- Users can access, logout, or create an account
- There is a guest page for those who don't have accounts
- Bank Accounts, Credit Cards, Incomes, Expenses and more can be saved to each user
- Each entry by logged in users can be edited or deleted
 - An overview is provided showing the accounts provided by user
- An interest and quick payoff calculator is provided to users
- User Interface is neat and allows for easy access to features
- Currencies can be exchanged from one currency to another

SYSTEM DESIGN



Screenshots

Use Case Diagram

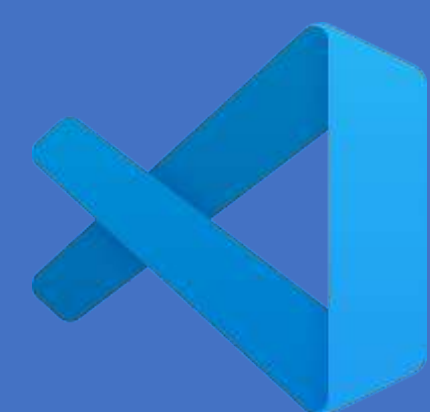
VERIFICATION

User verification and access is critical and was first of the features to be verified. We began by creating users and checking for changes on the database. Next was login which had a case for incorrect password, incorrect username, and one where both were correct. Once login and signup were verified to be functioning as expected, we started on the various accounts. We checked for what happens if we tried to delete or update account types that were not associated with a particular user. Next, we looked at if user created accounts were saved and had correct information in the database. Then we attempted to edit and delete accounts. Next was checking if calculations and numbers displayed were correct. Lastly, we attempted to logout and delete accounts. Any errors, unexpected results, or bugs were reported and handled.

SUMMARY

Money Map currently functions as expected. The UI is fully implemented and allows users to efficiently navigate and interact with the application. Each account can be edited, created, and deleted. Information from these accounts is accurate and displayed in a neat manner. Calculations for quick payoff, interest, and currency exchange are done quickly and correctly.

IMPLEMENTATION



Contribution

- Setup and create general UI/UX Layout in Streamlit
- Assisted with documentation and presentation material
- Reorganized code into separate files
- Helped test and debug

References

Exchange Rate API:
<https://www.exchangerate-api.com/>

ACKNOWLEDGEMENT

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