SQL Library Project

CS 4347.002

Team F

Team member:
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Github Repository:
https://github.com/4347groupF/dbproject

I. Project Description

For this project, we selected Python Django for backend development and HTML, CSS, and JavaScript for the frontend. Our architectural choices were informed by the need to integrate with Django's Model-Template-View framework. This integration required us to adopt a non-traditional approach, specifically segregating data access and user interface components into distinct files. To enhance the user experience, we focused on creating an intuitive and user-friendly graphical interface. This was achieved by utilizing CSS and JavaScript to complement our HTML structure, starting with a clear initial login/sign-up/librarian menu that leads to the book search feature. Additionally, we have incorporated a consistent menu tab accessible across all pages for effortless navigation of our website. One of the most significant strengths of our application is its independence from any specific platform, operating system, or framework requirements; a current version of Python is sufficient to run the program.

II. Architecture

```
.
└── booksearchproject/
    ├── booksearch/
    │   ├── static/
    │   │   └── booksearch/
    │   │       ├── any image files
    │   │       └── .js files
    │   ├── templates/
    │   │   └── booksearch/
    │   │       └── .html files
    │   ├── urls.py
    │   ├── views.py
    │   ├── models.py
    │   └── forms.py
    ├── booksearchproject/
    │   ├── settings.py
    │   ├── urls.py
    │   └── etc
    ├── scripts/
    │   └── Update Fine.sql
    └── manage.py
```

III. Roles

Name	Responsibility	Sub-group
Sailesh Andra	MENU bar, Profile, CheckOut, SearchResults design	Front-end
Caleb Ernst	Librarian features, SignIn, SignUp, index page, and Failure page design	Front-end
Yong hyun Lee	Primary architect and team lead / Login, Profile, Check-In & Out logic	Back-end
David Yang	Database setup and schema creation, Book loans, SignUp, Fines page	Back-end
Matthew Basinger	Primary documenting / Index and Book search logic	Back-end