

Degree Project Report

”GameStoreGG”

Follow Up on Project Plan

In my project plan I outlined a clear set of goals.

Implementing core e-commerce functionality such as user authentication, product browsing, shopping cart, payment system with stripe, coupon system and admin dashboard. I also did caching for optimization.

I managed to reach nearly all my goals. In the beginning I did pretty well but my mistake was to underestimate project complexity and time management. I had to reduce slightly the scope. While I focused on all core features but had to cut the rating video games feature and searching bar. Lucky me those parts were “Nice to have” in my project plan.

Final Result

The final result is a fully functional e-commerce website inspired by platforms like Itch.io, Steam and EpicGames.

The site includes:

Frontend built with ReactJs and Tailwind Css.

Backend built with NodeJs and Express with MongoDB for database.

Admin can upload the name, Image, description and set the price to pay in USD currency, all for each video game. Admin can also see the analytics for how revenue and sale has been during the past seven days.

The result for client is that the client can sign up/login and add games into their cart and pay(stripe is set on test mode, client can just spam 42 on card number and pass the payment). After payment the library section show the download link for the bought games. Clients can also write comments to let admin and other clients know what client's opinion is on those games.

New Skills and Knowledge Gained

I am happy with this project. I gained so much knowledge throughout this project. I learned how to do the frontend and backend, integrate them and do some caching techniques with Upstash Redis. With Redis some data are saved in Ram which makes the website to run faster and smoother.

Challenges Overcome

First and foremost learning new tools and libraries. For example ReactJs, Stripe, Redis, Cloudinary, Zustand etc.

Secondly In frontend I had asynchronous issues in data fetching from server.

Thirdly as I mentioned before one of my challenges was misconception about time estimation.

Finally, at the end I was able to overcome them by deep searching, reading and changing the scope.

Application to a Future Career

The skills I learned in this project are highly transferable to a future career.

Backend development for game relative systems like login system, leaderboards, in game stores, or analytics.

UI development for game launchers and web apps.

Problem solving which is a day to day requirement in game and web development.

Reflection and Summary

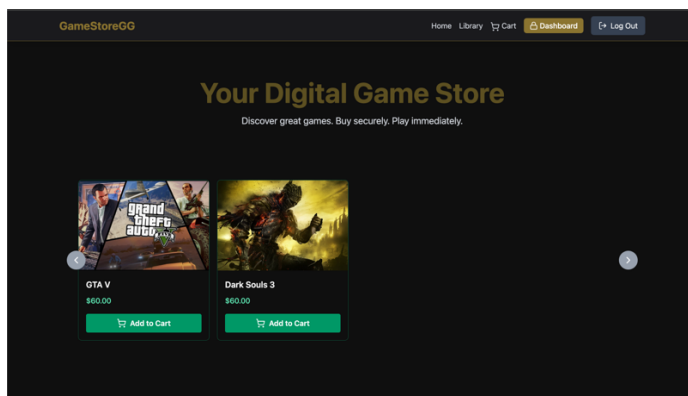
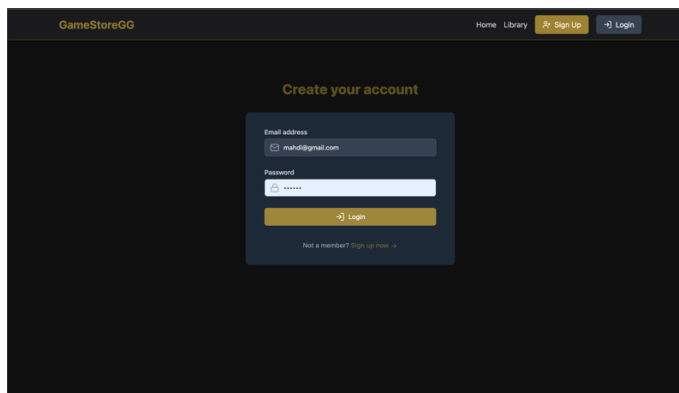
In summary this project was a great way of learning. If I could go back, I would do the same approach. I am regretting nothing, because I think mistakes are an important part of learning curve. But for the future projects I try to not make the same mistakes as I did before.

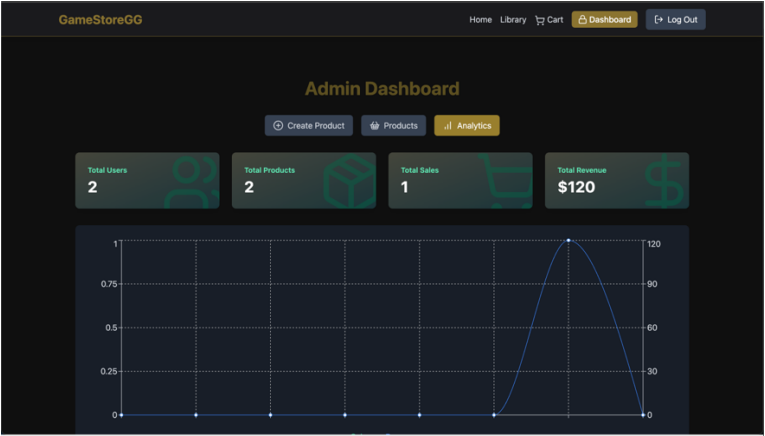
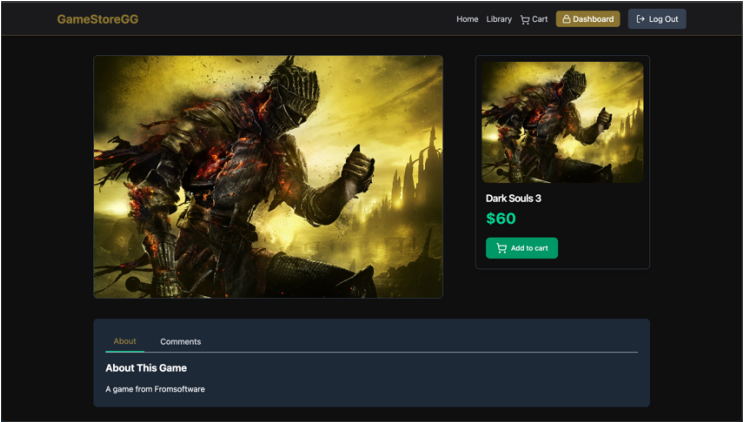
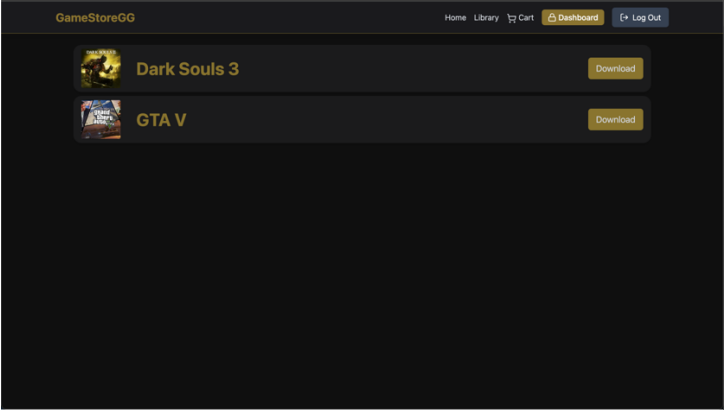
Future of This Project and Things That Can Be Added

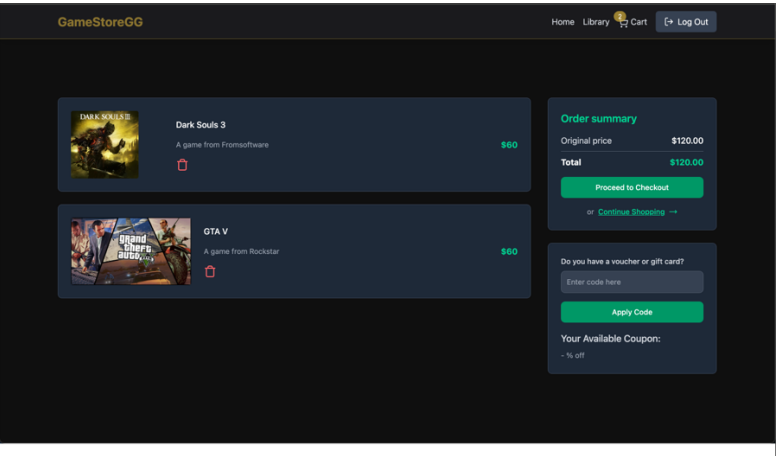
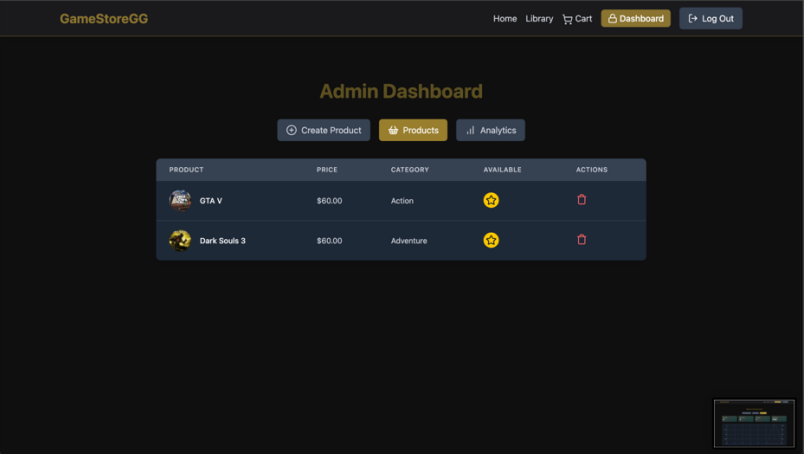
In future I may continue working on this project. There are many things that can be added and enhance the experience.

Rating video games to see what games most clients do like.
Making a proper profile for client to add bio text, profile picture, unlocking badges etc.

Here are some pictures: Note that those video game pictures are for testing purposes.








← Default sandbox


Service

Pay Default sandbox

\$120.00

 Dark Souls 3

\$60.00

 GTA V

\$60.00

Pay with link

Or

Email

mahdi@gmail.com

Card information

4242 4242 4242 4242

12 / 25

424

visa

Cardholder name

Mahdi

Country or region

Sweden

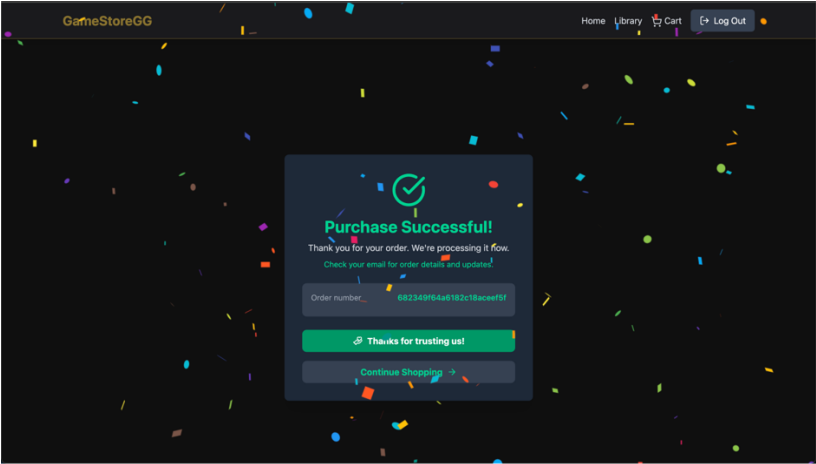
☐ Securely save my information for 1-click checkout

Pay faster on Default sandbox and everywhere Link is accepted.

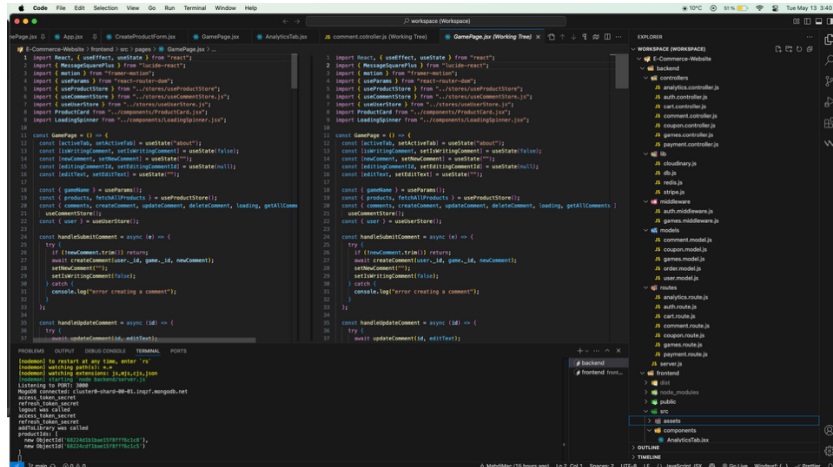
Pay

Powered by Stripe

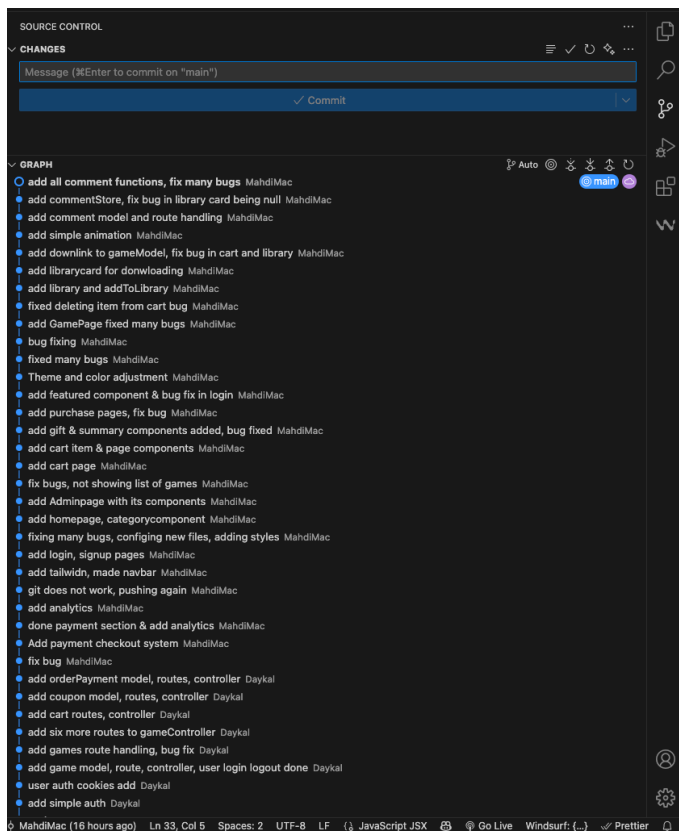
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A part of my code and journey of git pushes



The screenshot shows the VS Code editor interface. The main editor area displays the `GamePage.js` file, which contains React code for a game page. The code includes imports for various components and state management, and it defines a `GamePage` component. The terminal window at the bottom shows the output of a command, indicating that the code is running successfully.

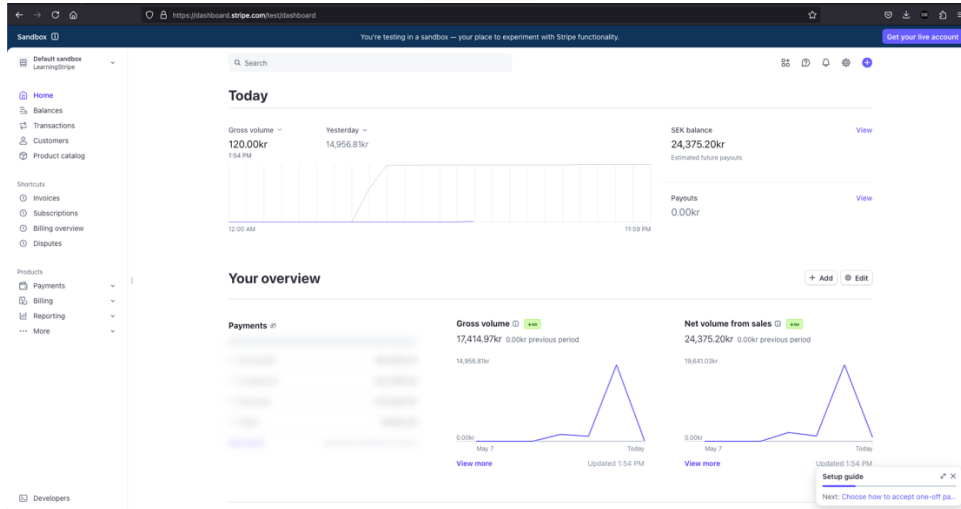


The SOURCE CONTROL panel in VS Code is shown, displaying a list of changes. The changes are categorized by commit message and author. The list includes:

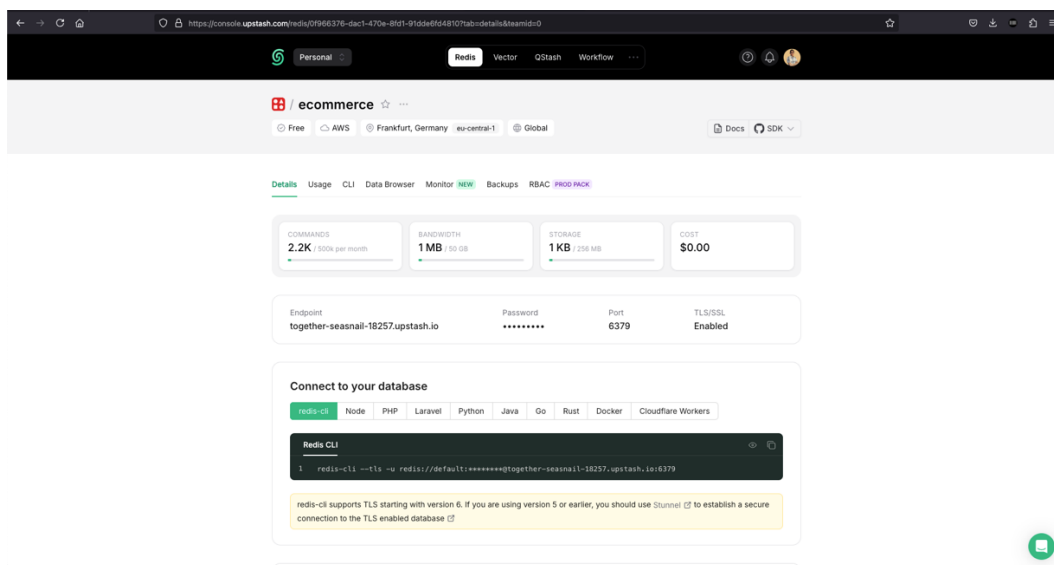
- add all comment functions, fix many bugs MahdiMac
- add commentStore, fix bug in library card being null MahdiMac
- add comment model and route handling MahdiMac
- add simple animation MahdiMac
- add downlink to gameModel, fix bug in cart and library MahdiMac
- add librarycard for downloading MahdiMac
- add library and addToLibrary MahdiMac
- fixed deleting item from cart bug MahdiMac
- add GamePage fixed many bugs MahdiMac
- bug fixing MahdiMac
- fixed many bugs MahdiMac
- Theme and color adjustment MahdiMac
- add featured component & bug fix in login MahdiMac
- add purchase pages, fix bug MahdiMac
- add gift & summary components added, bug fixed MahdiMac
- add cart item & page components MahdiMac
- add cart page MahdiMac
- fix bugs, not showing list of games MahdiMac
- add Adminpage with its components MahdiMac
- add homepage, categorycomponent MahdiMac
- fixing many bugs, configing new files, adding styles MahdiMac
- add login, signup pages MahdiMac
- add tailwind, made navbar MahdiMac
- git does not work, pushing again MahdiMac
- add analytics MahdiMac
- done payment section & add analytics MahdiMac
- Add payment checkout system MahdiMac
- fix bug MahdiMac
- add orderPayment model, routes, controller Daykal
- add coupon model, routes, controller Daykal
- add cart routes, controller Daykal
- add six more routes to gameController Daykal
- add games route handling, bug fix Daykal
- add game model, route, controller, user login logout done Daykal
- user auth cookies add Daykal
- add simple auth Daykal

The panel also shows a commit message input field and a commit button.

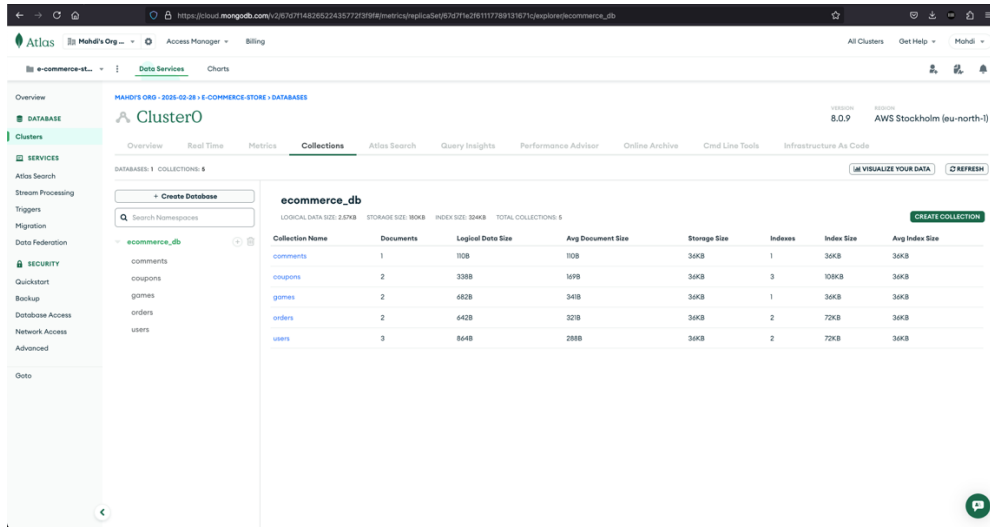
Stripe which handles payment, it is integrated in my website



Upstash Redis for storing data for fast access



MongoDB used for Database management



Finally, Cloudinary for uploading and saving game images

