

BATTLESHIP

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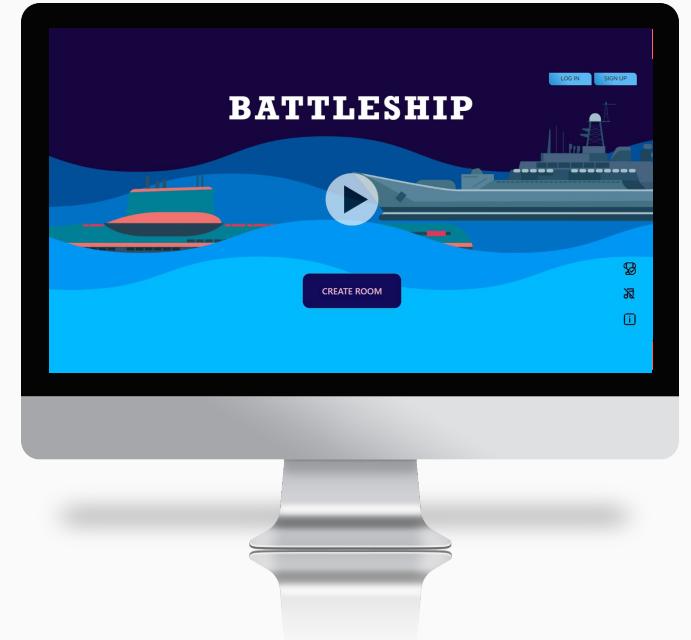
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01. ABOUT BATTLESHIP

1. Classic strategy type guessing game for multiplayer
2. Portable online browser game played on grids
3. Game of both luck and strategy.
4. Players alternate turns at the other player's ships, and the objective of the game is to destroy the opposing player's fleet.



02. OBJECTIVES

1. To gain experience on web development
2. To promote western game on eastern society.
3. To enhance strategic thinking skill of the player.
4. To gain experience on the game development.



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03. RELATED WORKS

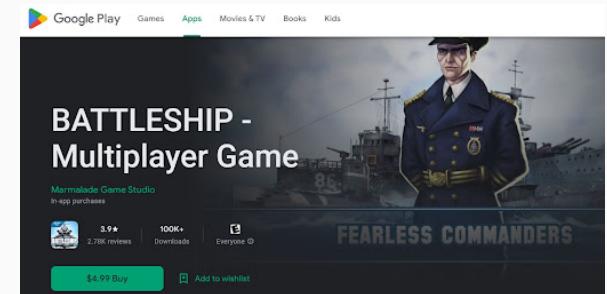
1. Hasbro Battleship

Cross platform, multiplayer game that runs on PC, Nintendo Switch and XBOX series launched by EA sports



2. Battleship Multiplayer

Another cross platform game providing its service on steam, Play Store, nintendo switch launched by Marmalade Game Studio in 2022

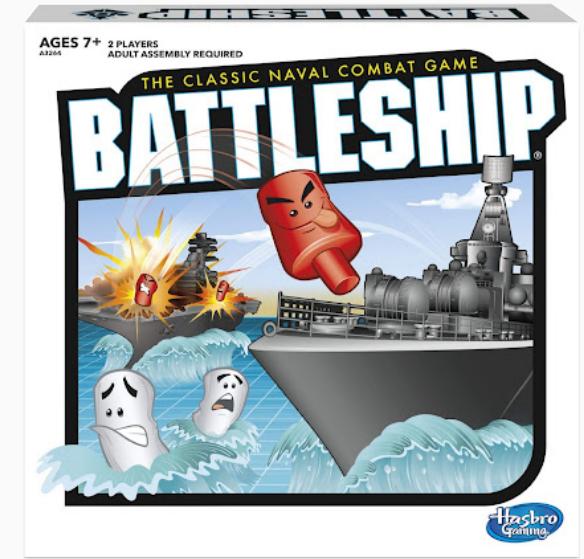


03. RELATED WORKS

3. Battleship Classic Board Game

A physical tabletop game made for children, played between two players.

Launched by EA sports

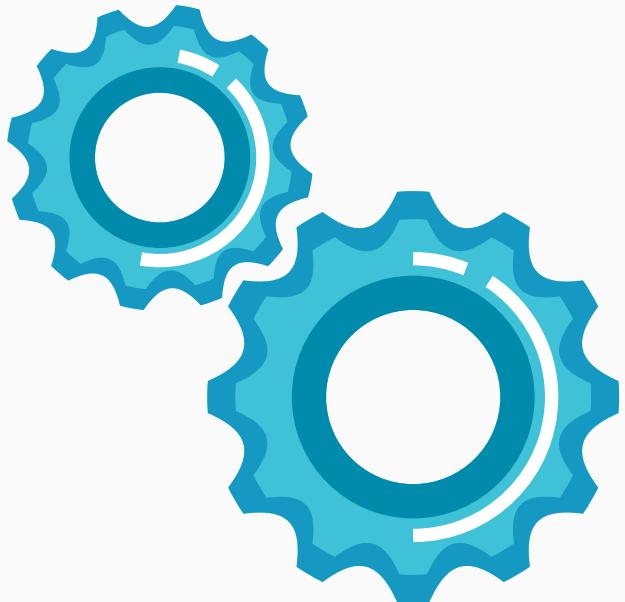


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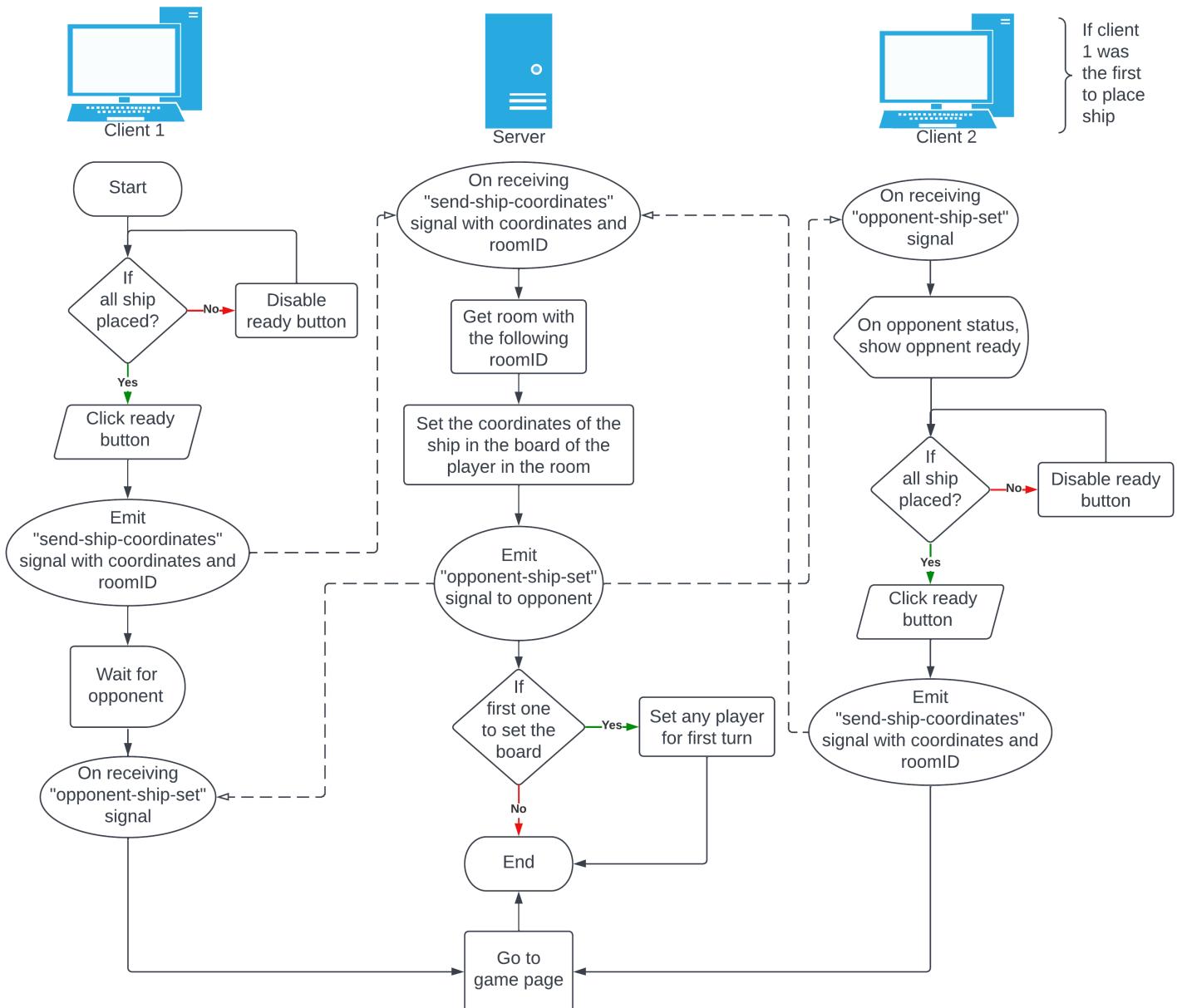


04. KEY FEATURES

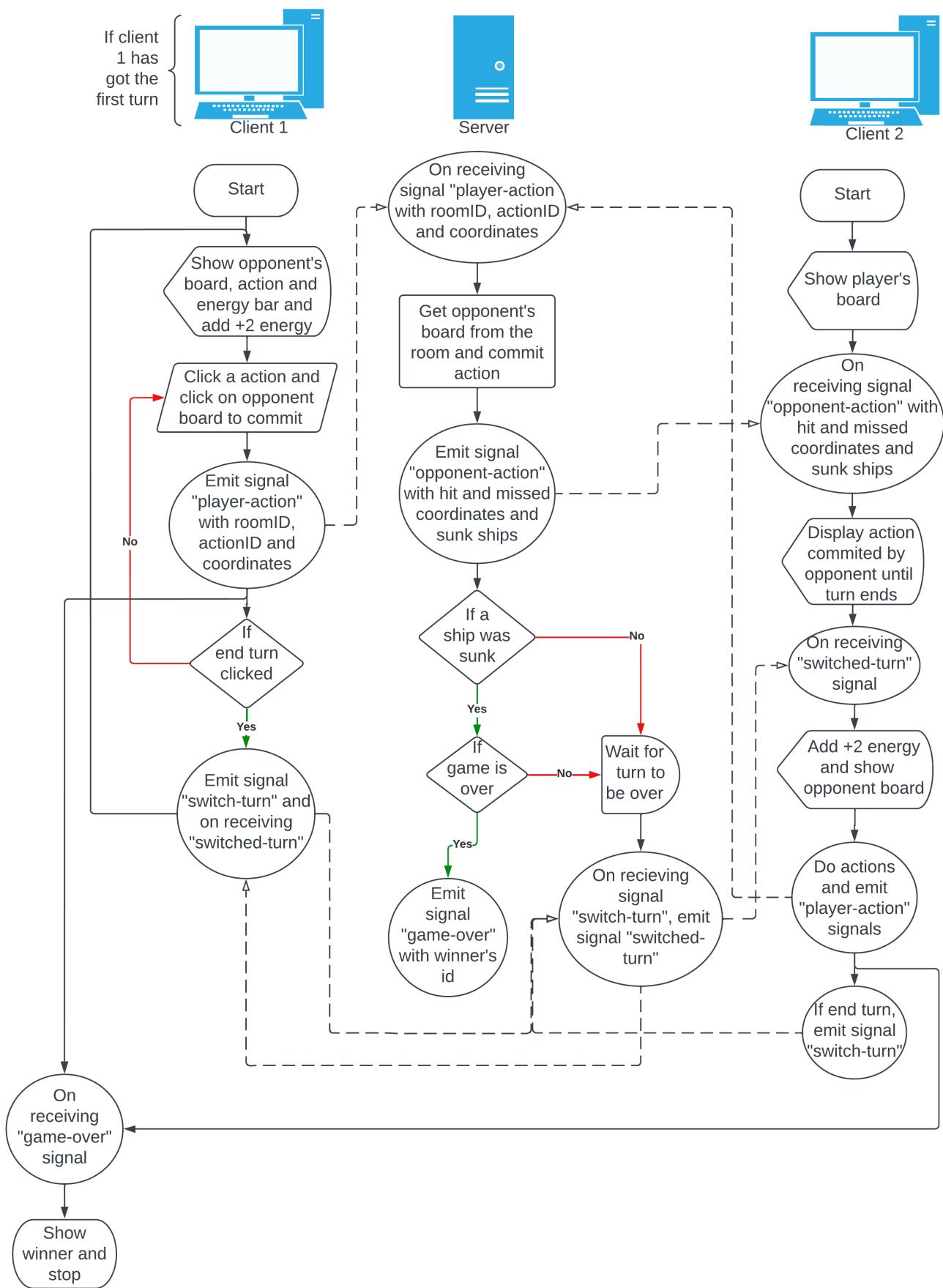
1. Turn-Based multiplayer game
2. Rank-Based matchmaking
3. Dual Game Modes: Random and Custom
4. Power-Ups to increase difficulty level



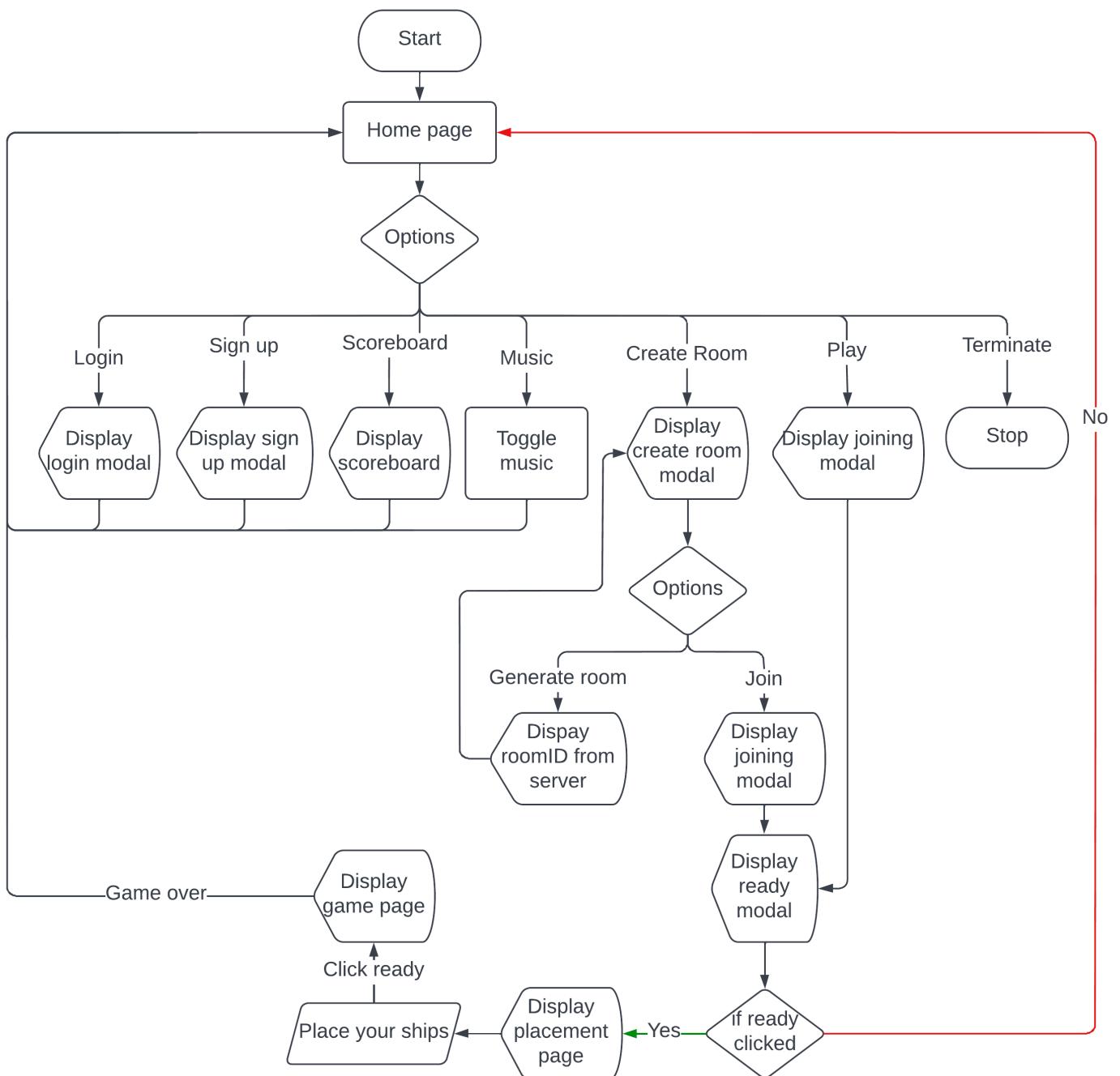
05. FLOW-CHARTS



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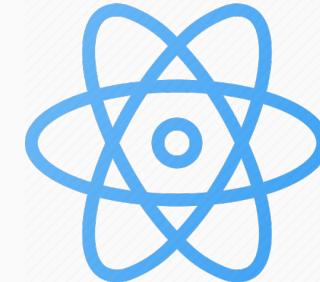
05. FLOW-CHARTS



06. TOOLS USED

1. ReactJS

- Free and open source front-end JavaScript library
- Build reusable user interfaces based on UI components



2. SASS

- Syntactically Awesome Stylesheet
- Like a superset of CSS



3. NodeJS

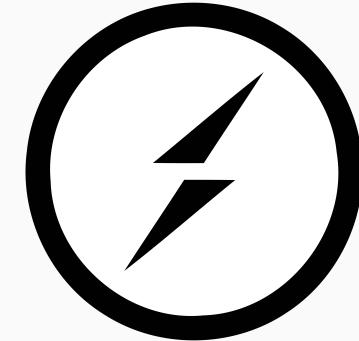
- An open source server environment
- Free to use
- Uses JavaScript on the server



06. TOOLS USED

4. Socket.IO

- Library that enables low-latency, bidirectional and event-based communication between a client and a server
- Two parts: a client-side library that runs in the browser, and a server-side library for Node.js
- Has free clusters for online databases



5. MongoDB

- Source-available cross-platform document-oriented database program
- NoSQL database program
- Uses JSON-like documents with optional schemas
- Has free clusters for online databases



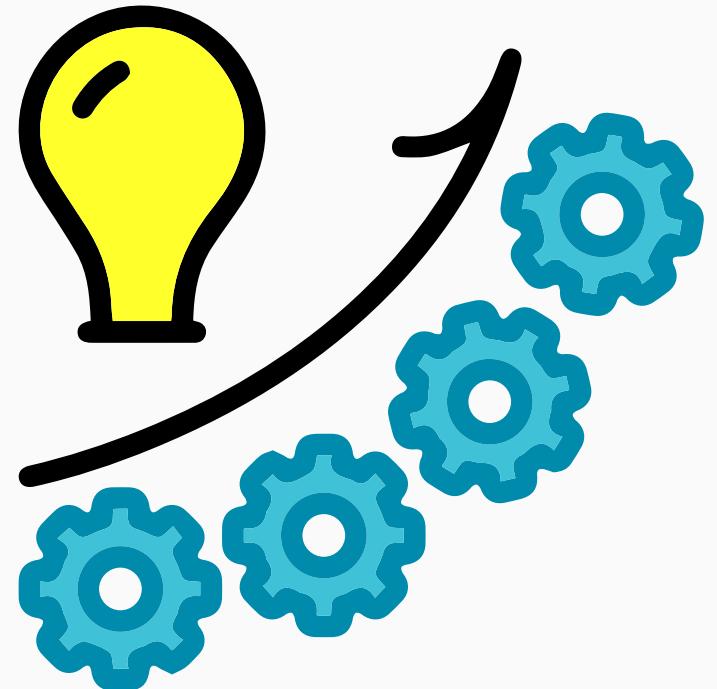
07. LIMITATIONS

1. It can only operate on the localhost for now.
2. It needs a premium tier for hosting and multiplayer mode.
3. It needs considerable bandwidth of the network for faster rendering and latency on the game.



08. FUTURE ENHANCEMENT

1. Adding sound effects on clicking the buttons
2. Adding animation in the gameboard
3. Removing a player account
4. Micro-transactions
5. Make UI more responsive
6. Making game more user friendly
7. Adding demo on how to play



THANKYOU

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