

Project

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Group project: Game Launcher with JavaScript UI

This project involves creating a user interface (UI) using JavaScript that allows users to choose between two games:

- Tic-Tac-Toe
- Rock Scissors Paper
- Another game of choice - don't make your life too complicated

Project Overview

- Technologies: HTML, CSS, JavaScript
- The games are built in JavaScript and run in the browser.
- A simple homepage (Game Launcher UI) with buttons for both games.
- Clicking on a game opens the respective game interface.
- We should be able to play, at least, the Tic-Tac-Toe game and have access to the other game, even if it isn't finished.
- Add local storage, using SQL, to track wins/losses.

Evaluation

- Interface: 10%
- Tic-Tac-Toe: 15%
- Rock Scissors Paper: 15%
- Other game: 10%
- Code: 20% (readability, indentations, comments... the easier it is for me to understand the easier it is to get a good mark)
- Presentation: 30%
 - Explaining the choices made, explaining the interface and who did what

Files to submit

Use this structure to develop your project and send it to be evaluated later.

```
./group_project
game.html      # Main UI
game.css       # Styles for layout, should be the same for everyone
tic-tac-toe.html # Tic-Tac-Toe
tic-tac-toe.js # Tic-Tac-Toe logic
```

```

rsp.html          # Rock Scissors Paper
rsp.js            # Rock Scissors Paper logic
about.html        # add your names

```

Your Tic-Tac-Toe

Verifying the logic of this game can be too much, and I don't want you working on this. So, let's use the code below:

```

function startTicTacToe() {
  const board = document.getElementById("game-container");
  board.style.display = "grid";
  board.style.gridTemplateColumns = "repeat(3, 100px)";

  let gameState = ["", "", "", "", "", "", "", "", ""];
  let currentPlayer = "X";

  function checkWinner() {
    const winPatterns = [
      [0, 1, 2], [3, 4, 5], [6, 7, 8],
      [0, 3, 6], [1, 4, 7], [2, 5, 8],
      [0, 4, 8], [2, 4, 6]
    ];

    return winPatterns.some(pattern =>
      gameState[pattern[0]] &&
      gameState[pattern[0]] === gameState[pattern[1]] &&
      gameState[pattern[1]] === gameState[pattern[2]]
    );
  }

  //etc, continue your work

```

Don't forget to continue the code above, it's super incomplete.

Your Rock Scissors Paper

For this one, I want to see what you show me. You will need to work on the game logic (unlike the game above) and everything else.

Organization

1. Start by creating your layout IN A SHEET PAPER, don't use your computers for this part. 1.1 Define the design of the interface, style and the main structure.
2. Think about the logic on how to access the game, keep scores and return to the main page. 2.1 You can use many sheets for this.
3. Organize yourselves: which tasks you will do, individually and in group.
4. Don't forget to comment your code.
5. Make a nice presentation!