Name : Diogo Rangel Dos Santos

Four web app ideas

1.**Simple Temperature and Weather Monitor (my favorite with my portfolio)**

Description: An app that displays the current temperature and weather conditions (e.g., sunny, cloudy, rainy) for a specific location (this can be the user's location via the Geolocation API, or a city entered). It can include additional information such as humidity, wind speed, and a simple forecast for the next few hours or the next day.

Course Concepts: External API Consumption: Make HTTP requests to a weather API (e.g., OpenWeatherMap, WeatherAPI.com) to fetch data.

DOM Manipulation: Dynamically update the user interface with weather data (temperature, icons, descriptions).

Event Handling: Text input for cities, search button, API error handling.

Data Storage (Optional): Use localStorage to save the last searched city or favorite cities.

Responsive Design: Adapt the display to different screen sizes.

2.**Simple Habit Tracker**

Description: An app to help users track their daily or weekly habits. Users can set habits (e.g., "Drink 2L of water," "Exercise for 30 minutes") and mark whether they've completed them each day. It can include a simple progress view (e.g., a list of days with a checkmark).

Course Concepts: DOM Manipulation: Add/remove habits, update daily status.

Event Handling: Clicks to check habits, buttons to add/edit.

Data Storage: localStorage to save habits and completion history.

Date/Time: Handle dates to record when a habit was completed.

Data Visualization: Simple progress display or a basic calendar.

3.**Interactive Quiz Creator/Solver**

Description: An application where users can create their own multiple-choice or true/false quizzes, save them, and then play them. At the end, the application displays the score.

Course Concepts: DOM Manipulation: Dynamically render questions and options; display results.

Event Handling: Answer selection, "Next Question" or "End Quiz" button.

Data Storage: localStorage to save the created quizzes and possibly the scores.

Business Logic: Implement scoring and feedback logic.

Forms: Create forms to add questions and answers.

4.Unit Converter (Offline)

Description: A unit converter that allows users to convert between different units of measurement (e.g., length - meters to feet; weight - kilograms to pounds; temperature - Celsius to Fahrenheit).

Course Concepts: DOM Manipulation: Input/output fields, dropdowns for unit selection.

Event Handling: Input or change events for real-time conversion.

Mathematical Logic: Implement conversion formulas.

Modular Structure: Separate conversion logic from UI functions.

Input Validation: Ensure the user enters valid numbers.