Accessible Web Design Project

Assignment Overview

In this team-based project, students will design and build a **WCAG-compliant website** using HTML, CSS, and JavaScript. The goal is to address a real or imagined **community need**—such as providing accessible event info, health resources, or educational content. Students will learn to build inclusive digital spaces by applying principles of accessible web design.

Using **Visual Studio Code** as their primary development environment, students will build and test their websites, conduct **peer reviews using the WAVE Web Accessibility Evaluation Tool**, and present their projects to classmates or local organizations. This Open Educational Resource (OER) activity is supported by MDN Web Docs, which provide in-depth tutorials and references.

Learning Objectives

- Understand and apply **WCAG (Web Content Accessibility Guidelines)** in a real web project
- Use HTML/CSS/JavaScript to build functional, attractive, and **accessible websites**
- Conduct **peer accessibility audits** using WAVE and provide constructive feedback
- Communicate the **purpose and impact** of their project through a group presentation
- Explore how **web design choices** affect equity and access in digital spaces

Materials Needed

- Computer with internet access
- **Visual Studio Code** (installed)
- MDN Web Docs: https://developer.mozilla.org
- WAVE Tool: https://wave.webaim.org/
- Group planning tools (e.g., Google Docs, Notion, paper)

Steps and Instructions

1. **Research community needs** and brainstorm a website idea that solves a real-world problem or provides helpful information
2. **Plan your site** layout and features using wireframes or flowcharts
3. Build your site using HTML, CSS, and JavaScript in Visual Studio Code
4. Use the **WAVE tool** to test your site for accessibility. Revise and improve based on results
5. Conduct **peer reviews** of other group websites and give/receive feedback
6. Prepare a short presentation that explains:
    a. What your site is for
    b. Who it helps
    c. What accessibility features you included
7. Present your website to the class or a guest audience (e.g., school staff, local org)

Planning Table

Section of Website	Feature Description	Accessibility Considerations	HTML/JS/CSS to Use
Homepage			
Navigation			
Forms or Buttons			
Media or Images			

ISTE Standards Addressed

- **1.2.d – Digital Citizen**: Students manage digital identity and engage responsibly in digital environments.
- **1.6.b – Creative Communicator**: Students create content for specific purposes using appropriate formats and tools.
- **1.7.d – Global Collaborator**: Students contribute constructively to team projects and reflect on how they can make digital experiences inclusive for all.

Assessment Rubric – Accessible Web Design Challenge

Criteria	Beginning (1 Point)	Developing (2 Points)	Proficient (3 Points)
Accessibility Implementation	Few or no WCAG features included; site fails basic WAVE test.	Some accessibility features included; minor WAVE issues.	Strong compliance with WCAG; WAVE audit shows few or no errors.
Website Functionality	Site has broken links/features or is hard to navigate.	Most features work as intended; some minor usability issues.	Site is fully functional and user-friendly.
Code Quality	Code is messy or poorly organized.	Code is mostly readable and structured.	Code is clean, well-commented, and efficiently organized.
Peer Review & Feedback	Minimal or incomplete peer reviews; feedback not actionable.	Peer review completed with basic feedback.	Thorough peer review and thoughtful revisions based on feedback.
Presentation & Communication	Presentation is unclear or incomplete.	Presentation covers key points but lacks clarity or polish.	Presentation clearly communicates purpose, design choices, and accessibility features.

Total: /15