DevNatives Technologies

Frontend Development Internship Plan

Week 1: HTML Fundamentals

- **Topics:**
  - Basic structure of HTML
  - Elements, attributes, and nesting
  - Forms and input types
  - Semantic HTML (header, footer, article, etc.)
  - Tables and media embedding (images, video, audio)
- **Tasks:**
  - Create a personal portfolio webpage (HTML only)
  - Practice with semantic markup
- **Evaluation (Week 1)**

Week 2: CSS Essentials

- **Topics:**
  - Selectors, properties, and values
  - Box model and positioning
  - Flexbox and Grid
  - Pseudo-classes and pseudo-elements
  - Basic transitions and animations
- **Tasks:**
  - Style the portfolio webpage using Flexbox/Grid
  - Create a responsive layout for a landing page
- **Evaluation (Week 2)**

Week 3: JavaScript Basics

- **Topics:**
  - Variables (var, let, const)
  - Data types and type conversion
  - Operators and expressions
  - Control structures (if, switch)
  - Loops (for, while, do-while)
- **Tasks:**
  - Create a basic calculator
  - Write scripts for form validation
- **Evaluation (Week 3)**

Week 4: DOM Manipulation & Events

- **Topics:**
  - DOM traversal and manipulation (querySelector, createElement, etc.)
  - Event handling and delegation
  - Introduction to browser events (click, input, submit)
  - Working with forms and inputs dynamically
- **Tasks:**
  - Build a to-do list app
  - Add interactivity to previous projects
- **Evaluation (Week 4)**

Week 5: Advanced JavaScript

- **Topics:**
  - Functions (declaration, expression, arrow)
  - Scope, Hoisting, Closures
  - Array and Object methods (map, filter, reduce)
  - ES6+ features (spread, destructuring, template literals)
  - Fetch API and promises
- **Tasks:**
  - Create a weather app using a public API
  - Implement form data handling and display
- **Evaluation (Week 5)**

Week 6: Mini Project

- **Project:** "Task Tracker" or "Expense Manager"
- **Requirements:**
  - Use HTML, CSS, and Advanced JavaScript
  - Add features like localStorage, filtering, and sorting
  - Responsive design
- **Deliverables:**
  - Complete app with README
  - Presentation of code and features
- **Evaluation (Week 6)**

Week 7: Introduction to React

- **Topics:**
  - React concepts: components, props, state
  - JSX syntax
  - Functional vs class components (focus on functional)
  - Event handling and conditional rendering
  - Lists and keys
- **Tasks:**
  - Create a simple React counter and user form
  - Convert previous JS projects to React components

- **Evaluation (Week 7)**

Week 8: React Project

- **Project:** "Blog App" or "Product List Viewer"
- **Requirements:**
  - Use React functional components with hooks
  - Implement routing (if possible)
  - Use API for data fetching (like JSONPlaceholder)
  - Clean component structure and styling
- **Deliverables:**
  - Deployed app (e.g., on Netlify or Vercel)
  - GitHub repository with proper documentation
- **Comprehensive Evaluation**