

Frontend Developer Course Syllabus (7 Days, 2 Hours Daily)

July 2025

Course Overview

This 7-day course introduces frontend development with HTML, CSS, JavaScript, and React. Each day includes 1 hour of theory, 1 hour of practicals, and a 5-question MCQ test (14 hours total).

Prerequisites

- Basic computer literacy.
- Text editor (e.g., VS Code) and Node.js installed.

Daily Breakdown

Day 1: HTML and CSS Basics • **Theory (1 hr):** HTML structure, CSS selectors, box model. W3Schools: HTML

- **Practical (1 hr):** Create a styled HTML page (e.g., landing page).
- **MCQ Test (5 questions):**
 1. What does HTML define? (a) Style (b) Structure (c) Behavior (d) None
 2. What is a CSS selector? (a) HTML tag (b) Targets elements (c) JavaScript function (d) None
 3. What is the box model? (a) Layout structure (b) Color scheme (c) Font style (d) None
 4. Which tag creates a heading? (a) <p> (b) <h1> (c) <div> (d)
 5. What does CSS stand for? (a) Cascading Style Sheets (b) Computer Style Sheets (c) None

Answers: b, b, a, b, a

Day 2: JavaScript Basics • **Theory (1 hr):** Variables, functions, events. W3Schools: JavaScript

- **Practical (1 hr):** Add interactivity (e.g., button toggle) to a page.
- **MCQ Test (5 questions):**
 1. What is JavaScript used for? (a) Styling (b) Interactivity (c) Structure (d) None
 2. How do you declare a variable? (a) var (b) function (c) class (d) None
 3. What is an event? (a) User action (b) CSS style (c) HTML tag (d) None
 4. Which keyword defines a function? (a) var (b) function (c) class (d) None
 5. What does console.log do? (a) Displays output (b) Styles page (c) None

Answers: b, a, a, b, a

Day 3: Responsive Design • **Theory (1 hr):** Media queries, Bootstrap. Bootstrap Docs

- **Practical (1 hr):** Create a responsive layout with Bootstrap.
- **MCQ Test (5 questions):**
 1. What is responsive design? (a) Fixed layout (b) Adapts to screen size (c) None
 2. What is a media query? (a) CSS rule (b) HTML tag (c) JavaScript function (d) None
 3. What is Bootstrap? (a) JavaScript library (b) CSS framework (c) None

4. Which unit is relative? (a) px (b) vw (c) cm (d) None
5. What improves user experience? (a) Responsive design (b) File size (c) None

Answers: b, a, b, b, a

Day 4: Introduction to React • **Theory (1 hr):** React components, JSX. React Docs

- **Practical (1 hr):** Create a simple React component.
- **MCQ Test (5 questions):**
 1. What is React? (a) CSS framework (b) JavaScript library (c) Database (d) None
 2. What is JSX? (a) JavaScript syntax extension (b) CSS rule (c) None
 3. What is a component? (a) Reusable UI element (b) Database table (c) None
 4. How do you create a React app? (a) create-react-app (b) npm install (c) None
 5. What manages state in React? (a) useState (b) useEffect (c) None

Answers: b, a, a, a, a

Day 5: React State and Props • **Theory (1 hr):** State management, props in React. React Docs

- **Practical (1 hr):** Build a counter app using React state.
- **MCQ Test (5 questions):**
 1. What is state in React? (a) Static data (b) Dynamic data (c) None
 2. What are props? (a) Component properties (b) CSS styles (c) None
 3. Which hook manages state? (a) useState (b) useEffect (c) None
 4. How do props pass data? (a) Parent to child (b) Child to parent (c) None
 5. What updates state? (a) setState (b) getState (c) None

Answers: b, a, a, a, a

Day 6: React Routing • **Theory (1 hr):** React Router, navigation. React Router Docs

- **Practical (1 hr):** Implement routing in a React app.
- **MCQ Test (5 questions):**
 1. What is React Router? (a) Styling tool (b) Navigation library (c) None
 2. What component defines a route? (a) Route (b) Link (c) None
 3. What does Link do? (a) Navigates pages (b) Styles pages (c) None
 4. What is a single-page app? (a) No reloading (b) Full reload (c) None
 5. Why use routing? (a) Multi-page navigation (b) Single-page navigation (c) None

Answers: b, a, a, a, b

Day 7: Capstone Project • **Theory (1 hr):** Portfolio building, deployment basics. Coursera: Career Development

- **Practical (1 hr):** Build a React-based portfolio site.
- **MCQ Test (5 questions):**
 1. Why build a portfolio? (a) Show skills (b) Store data (c) None
 2. What is deployment? (a) Styling app (b) Hosting app (c) None
 3. Which platform hosts React apps? (a) Netlify (b) Photoshop (c) None
 4. What should a portfolio include? (a) Projects (b) Raw data (c) None
 5. Why test a frontend app? (a) Ensure functionality (b) Change style (c) None

Answers: a, b, a, a, a

Resources

- W3Schools
- React
- CodePen