

JavaScript Web Development

(3 days hands-on)

JavaScript has grown a lot in recent years, and nowadays allows developers to create extremely dynamic and rich client-side Web applications. This course leads you through the latest JavaScript syntax and includes detailed coverage of Dynamic HTML (DTML), the Document Object Model (DOM), and Cascading Style Sheets (CSS). The course also shows how to use jQuery to simplify client-side programming and add Ajax support with ease!

Contents

- **Introduction to Web development and JavaScript:** Architecture of a Web application; Core Web technologies; DOM scripting and AJAX; Cross-browser compatibility
- **JavaScript Essential Syntax:** Declaring variables and arrays; Using operators and expressions; Loops and decision-making constructs; Functions; Alert, confirmation and prompt boxes; Regular expressions
- **JavaScript Objects:** Overview of objects; The Object type; Extending, modifying, and deleting an object; Inheriting properties and methods; cascading methods; Using predefined objects; Manipulating arrays; Creating new object types
- **HTML Forms:** Overview of HTML forms; Accessing elements in a form; Event-handling; Validating user input
- **Managing Images:** Overview of image objects; Defining rollovers; Loading images efficiently
- **Window and Document Management:** Interacting with the browser; Managing windows; Interacting with the status bar; Using timeouts, frames, and cookies; Managing documents; Detecting nodes; Searching for nodes; Adding content to the page
- **Advanced Event Handling:** The core event model; Understanding the Event object; Event propagation; Cross-browser events
- **How to script CSS:** Types of style sheets; Modifying styles of an element; CSS and positioning; Object models for DHTML; Portability
- **Using jQuery:** What is jQuery? jQuery selector syntax; Examples of jQuery selectors
- **Ajax Programming:** What is Ajax? Creating an XMLHttpRequest object; Interacting with a server; Handling XML and JSON responses; Updating the user interface; jQuery Ajax support; Examples of jQuery and Ajax
- **Using jQueryUI:** What is jQuery UI? Downloading and installing jQuery UI; Simple jQuery UI example; jQuery UI demos

Who Should Attend:

This training course is aimed at client-side Web developers.

Prerequisites:

Familiarity with any contemporary programming language.