Modern JavaScript Training Curriculum

STRUCTURE

JavaScript with ES6 Training Curriculum

"Learn the latest JS and ES6 best practices & advanced techniques by joining our comprehensive Training Program at Croma Campus"

About Croma Campus:

Croma Campus Training & Development Private Limited is an education platform since 2010 providing rigorous industry-relevant programs designed and delivered in collaboration with world-class faculty and industry.

- Hands-On Live Projects
- Simulation Test Papers
- Industry Cases Studies
- 61,640+ Satisfied Learners
- 140+ Training Courses
- 100% Certification Passing Rate
- Live Instructor Classroom / Online Training
- 100% Placement Assistance

Course Objectives:

- Apply Functional Programming techniques for transforming data
- Encapsulate code with ES6 modules
- Manage and debug problems with Scope
- Structure code with ES6 classes
- Handle asynchronous situations with Promises

Course Description:

- Explores the unique JS development ecosystem in depth with a particular focus on ES6.
- Gain a deep-dive into the language and related technologies.
- Gain hands-on experience exploring Scope, Functional Programming, TypeScript, Node, Asynchronous programming, Reactive programming with RxJS and Design Patterns for JavaScript.
- We'll take you through key ES6 capabilities including arrow functions, DE structuring, classes, modules and the spread operator.
- It's a great introduction to JavaScript development if you're coming from other languages / technologies such as C# / ASP.NET, Python, Java, PHP - or if you just want to polish up your existing JS web development skills.

Croma Campus Training Program Deliverables:

- **Session Recordings** - Original Class Room Voice & Video Recording
- **Training Material** - Soft Copy Handbooks
- **Assignments** | Multiple Hands-on Exercises
- **Test Papers** - We provide **Practice Test** as part of our course to help you prepare for the actual certification exam.
- **Live Case Studies**
- **Live Projects** - Hands-on exercises and Project work. You will work on real time industry-oriented projects and assignments for each module to practice.

- **Key focus on Hands-on exercises and Project work**. You will work on real time industry-oriented projects.
- Faculty with more than **10+ Years of Experience** in the Industry.
- **Technical Resume Designing & Job Assistance:** With more than 100+ Clients across the Globe and we help learners to get a good job in their respective field. We also help learners with resume preparation.
- **Interview Q&A**
- **About Croma Campus Training Certificate:** Croma Campus will provide you with an industry-recognized (Certified by **ISO 9001:2015** & **E-Cell IIT Jodhpur**) course completion certificate which has lifelong validity.
- **How I Unlock my Croma Campus Certificate:** Attend Complete Batch & Submit at least One Completed Project.

Course Content:

Module 1: Modern JavaScript fundamentals with ES6

JavaScript Roadmap

- ES6
- JavaScript frameworks
- Node
- App-development and build tools

JavaScript Basics

- The HTML DOM
- JavaScript Syntax
- Literals, identifiers and reserved words
- Basic Rules
- Dot Notation
- Square Bracket Notation
- Expressions and expression evaluation
- JavaScript Objects, Methods and Properties
- Statements

JavaScript Core

- Objects and Arrays
- JSON
- Functions
- Scope
- Closure

Language fundamentals

- JavaScript Variables
- Working with Numbers and Strings
- A Loosely-typed Language

- Storing User-Entered Data
- Arrays
- Associative Arrays
- Array Properties and Methods
- JavaScript Operators
  - Typeof Operator
- Objects
  - Built-In JavaScript Objects
- Functions
  - Built-in Functions
  - User-defined Functions
  - Function Syntax
  - Passing Values to Functions
  - Returning Values from Functions
- Copy-by-reference/value, truth/false

Conditionals and Loops

- if - else if - else Conditions
- Switch / Case
- while Loop Syntax
- do...while Loop Syntax
- for Loop Syntax
- for...in Loop Syntax

JavaScript and the Browser

- The Implicit Window Object
- The getElementById () Method
- The getElementsByTagName () Method
- The getElementsByClassname () method
- The querySelector () and querySelectorAll () methods
- Event Handlers
- Creating, Inserting and Deleting Nodes
- Element Position Manipulation
- Scrolling
- Manipulating CSS
- Scripting Inline Styles
- Scripting CSS Classes
- Scripting Style Sheets
- Working with cookies

JavaScript Advanced

- Form handling in JS
- Error handling in JS
- Debugging JavaScript

- Closures in-depth
- Object orientation with prototypes
- Using Templates
- Modular JS
- JQuery
- Wrapped Sets
- Manipulating element properties & attributes
- Changing element styles
- Animations
- Configuration options in JS

ES6 / ECMAScript Essentials

- De-structuring
- Modules
- Classes
- Arrow functions
- Template literals
- Spread operator

Scope

- Closure
- Bind
- This
- Arrow-functions
- Modules
- IIFEs

Functional Programming with JavaScript

- Understanding map filter, reduce and sort
- Chaining pure functions to transform data

Object-Oriented Patterns

- OO Patterns to use with ES6 classes

Async programming

- Promises
- Async/await
- Understanding RxJS using Observables

Using ES6 / ECMAScript modules

- Defining clear code boundaries and managing Scope

Browser Document Object Model

- Scripting the DOM with JavaScript

TypeScript

- Defining custom types using interfaces
- Generics and utility functions

RxJS: Reactive Extensions for JavaScript

- Adopting the Reactive way of thinking
- Programming with asynchronous data streams
- Subscribing to a stream of events over time
- Transforming streams of data with map and filter
- Applying Reactive ideas to real-world problems
- Using RxJS in Angular and React

Tools

- Node
- NPM
- Transpilers
- Module bundlers

JavaScript Design Patterns

- Mediator pattern
- Isolating application state with Redux

JavaScript Testing

- Unit Testing with Jasmine/Jest

Module 2: Placement Guide

- Tips to clear an Interview
- Common Interview questions and answers
- JS 2018 Interview Questions and Answers
- Resume Building Guide
- Attempt for the related Global Certification Exam
- Earn Credentials and Start applying for Jobs