

Full Stack Web Development Program

Course Curriculum



About Edureka Learning Center

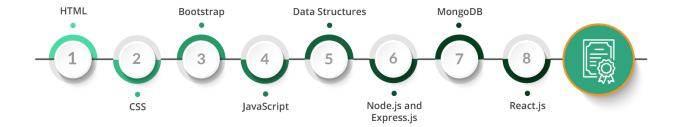
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Edureka Learning Center is democratizing access to high-quality education at an affordable price. We are playing our part in helping the country meet the growing demand for talent across segments. We follow an outcome-oriented approach while not compromising on either quality or affordability. Our emphasis is to become a bridge and fill the employment gap in our country by increasing the employment quotient of students and enabling them to access premium jobs.

About the Program

Edureka Learning Center Full Stack Web Development Program prepares you to get job-ready and enhance your skills to match the industry standards. This program will help you build an end-to-end full-fledged functional website using MERN stack technologies. This program starts with the basics of website designing using HTML and CSS, guides you to make it functional using the most popular JS library React, and finally helps you implement APIs & enables you to connect to a database. You will be learning complete MERN stack technologies like MongoDB, Express, React, and Node, which would help you develop dynamic and interactive websites efficiently while increasing your employability multifold.

Full Stack Web Development Program Roadmap



Index

- 1. HTML
- 2. CSS
- 3. Bootstrap
- 4. JavaScript
- 5. Data Structures
- 6. Node.js and Express.js
- 7. MongoDB
- 8. React.js

 $[\]hbox{*Depending on industry requirements, Edureka may make changes to the course curriculum}$



HTML

About the Module

This module is designed to make you familiar with the structure of a web page with the help of HTML as a Markup language. You will learn the basic concepts of HTML and use HTML5 to create the web page.

Module Outline

- Day 1
 - $_{\odot}$ $\,$ LU1 HTML Intro and HTML Tags
 - o LU2 HTML Elements
- Day 2
 - o LU1 HTML Input Tags
 - o LU2 HTML Forms
- Day 3
 - LU1 HTML Tables and List Tags
 - o LU2 HTML link and container tags
- Day 4
 - o LU1 HTML5
 - o LU2 HTML5 tags
- Day 5
 - o LU1 HTML5 Canvas
 - o LU2 HTML5 SVG

- Day 6
 - o LU1 Interview Preparation 1
 - o LU2 Interview Preparation 2



CSS

About the Module

This module is designed to make you familiar with the beautification of your HTML web pages. You will learn how to use different CSS Properties and Sass to add responsiveness to your HTML web page.

Module Outline

- Day 7
 - o LU1 Introduction to CSS
 - LU2 CSS Selectors
- Day 8
 - o LU1 CSS properties
 - o LU2 CSS box model
- Day 9
 - o LU1 CSS positioning & flexbox introduction
 - LU2 CSS flex vs grid
- Day 10
 - LU1 CSS typography
 - LU2 CSS responsiveness
- Day 11
 - o LU1 SASS part 1
 - o LU2 SASS part 2



Bootstrap

About the Module

In this module, you will learn about the grid system of Bootstrap to make your web page responsive.

Module Outline

- Day 12
 - o LU1 BootStrap5 introduction
 - LU2 BootStrap5 responsiveness
- Day 13
 - LU1 BootStrap5 Element Classes Part 1
 - o LU2 BootStrap5 Element Classes Part 2
- Day 14
 - o LU1 Interview Preparation -1
 - o LU2 Interview Preparation 2



JavaScript

About the Module

This module is designed to build the foundation of full-stack web development with the help of JavaScript as programming. You will learn all the fundamentals Concepts of JavaScript from basics to advance along with the ES6 feature.

Module Outline

- Day 15
 - o LU1 JavaScript introduction
 - LU2 JavaScript variables
- Day 16
 - o LU1 JavaScript data types 1
 - LU2 JavaScript data types 2
- Day 17
 - o LU1 JavaScript Operators 1
 - LU2 JavaScript Operators 2
- Day 18
 - o LU1 conditional statements
 - LU2 JavaScript Looping Statements
- Day 19
 - o LU1 Input and Output Statements
 - LU2 String Operations

- Day 20
 - o LU1 Array Operations 1
 - LU2 Array Operations 2
- Day 21
 - LU1 Objects
 - LU2 Date and Math Object
- Day 22
 - o LU1 Document Object Manipulation
 - LU2 Form Handling
- Day 23
 - o LU1 ES6
 - LU2 call-backs, async, await, and promises
- Day 24
 - o LU1 Modules and classes along with this keyword
 - o LU2 JavaScript Scopes
- Day 25
 - o LU1 this keyword
 - LU2 JS browser storage APIs, Cookies
- Day 26
 - o LU1 Advanced Functions
 - LU2 Fetch() method and Debugging
- Day 27
 - o LU1 Function Carrying and Borrowing
 - o LU2 Internal Working of JavaScript
- Day 28
 - o LU1 Event Handling
 - o LU2 OOPs Concepts using JavaScript
- Day 29
 - LU1 Debounce in JavaScript
 - o LU2 Throttling, async, and defer in JavaScript
- Day 30
 - LU1 Interview Preparation 1
 - o LU2 Interview Preparation 2



Data Structures

About the Module

This module is designed to make you familiar with the principles of data structures and algorithms. You will learn about different types of data structures that are available in JavaScript and will be able to find the optimal solution for your problem using the best possible approach.

Module Outline

- Day 31
 - o LU1 Data Structures Basics
 - LU2 Algorithms Basics
- Day 32
 - o LU1 Sorting Part 1
 - o LU2 Sorting Part − 2
- Day 33
 - LU1 Searching Part 1
 - LU2 Searching Part 2
- Day 34
 - o LU1 Recursion
 - o LU2 Recursion Problems
- Day 35
 - o LU1 Arrays Part -1
 - LU2 Arrays Part -2

- Day 36
 - LU1 Stacks
 - o LU2 Queues
- Day 37
 - LU1 Map() Object
 - LU2 Hash Tables 1
- Day 38
 - o LU1 Hash Tables 2
 - LU2 Single Linked List
- Day 39
 - o LU1 Double Linked List
 - o LU2 Circular Linked List and Circular Doubly Linked List
- Day 40
 - o LU1 Trees Part 1
 - LU2 Trees Part 2
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 - o LU1 Sets
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- Day 42
 - o LU1 Graphs 1
 - o LU2 Graphs 2
- Day 43
 - o LU1 Advanced Data Structures 1
 - LU2 Advanced Data Structures 2
- Day 44
 - o LU1 Algorithms 1
 - LU2 Algorithms 2
- Day 45
 - o LU1 Algorithms 3
 - o LU2 Algorithms 4
- Day 46
 - o LU1 Interview Preparation 1
 - o LU2 Interview Preparation 2



Node.js and Express.js

About the Module

This module is designed to make you familiar with all the fundamentals of back-end development. You will use the Node.js runtime environment and express.js library to handle backend operations and create APIs respectively.

Module Outline

- Day 47
 - o LU1 Node.js 1
 - o LU2 Node.js − 2
- Day 48
 - o LU1 Node.js 3
 - o LU2 Node.js − 4
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 - LU1 Node.js 5
 - o LU2 Node.js − 6
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 - o LU1 Node.js 7
 - o LU2 Node.js -8
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 - o LU1 Node.js 9
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 - o LU1 Express.js -2
 - o LU2 CORS
- Day 53
 - o LU1 MVC Architecture
 - o LU2 Databases
- Day 54
 - \circ LU1 Interview Preparation 1
 - \circ LU2 Interview Preparation 2



MongoDB

About the Module

This module is designed to make you familiar with the Concepts of Databases. You will be using MongoDB to create your database and collections. You will also learn how to create different data models and schemas with the help of mongoose.

Module Outline

- Day 55
 - o LU1 MongoDB -1
 - o LU2 MongoDB -2
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 - o LU1 MongoDB -3
 - o LU2 MongoDB -4
- Day 57
 - o LU1 MongoDB -5
 - o LU2 MongoDB − 6
- Day 58
 - o LU1 MongoDB 7
 - o LU2 MongoDB Connections
- Day 59
 - o LU1 MongoDB CRUD Operations
 - o LU2 MVC Architecture

- Day 60
 - o LU1 Interview Preparation 1
 - o LU2 Interview Preparation 2



React.js

About the Module

This module is designed to make you familiar with the front-end library React.js. You will learn to design responsive User interfaces with MVC architecture that can use different APIs to add dynamic nature to your User Interface. You will also learn to divide the User Interface into different independent, small, and reusable components.

Module Outline

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 - o LU1 React.js 1
 - o LU2 React.js − 2
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 - o LU1 React.js 3
 - LU2 React.js 4
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 - o LU1 React.js 5
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- Day 65
 - o LU1 Installation of React.js
 - o LU2 React Elements

- Day 66
 - LU1 React Components -1
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 - o LU1 Props
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 - o LU1 React Components Lifecycle 1
 - \circ LU2 React Component Lifecycle 2
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 - o LU1 React Bootstrap Typeahead
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 - o LU1 React Events
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 - o LU1 Manage Navigations
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 - o LU1 Styling in React
 - LU2 Hooks 1
- Day 74
 - o LU1 useState() Hook
 - o LU2 useEffect() Hook
- Day 75
 - LU1 useContext() Hook
 - o LU2 Additional Hooks
- Day 76
 - o LU1 Interview Preparation 1
 - o LU2 Interview Preparation − 2

- Day 77
 - o LU1 Custom Hooks
 - o LU2 React Component for Home Page
- Day 78
 - LU1 React Component for Filter Page
 - o LU2 Details Page
- Day 79
 - LU1 Header Functionality
 - LU2 Location Dropdown
- Day 80
 - o LU1 Restaurant Search Dropdown
 - LU2 Rendering Details Page based on Searched Restaurant
- Day 81
 - o LU1 Fetching Meal Types on Quick Searches component
 - LU2 React Modal
- Day 82
 - o LU1 Signup and Login Up with Zomato credentials
 - LU2 Social Media Integration -1
- Day 83
 - o LU1 Social Media Integration 2
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- Day 84
 - LU1 Search Functionality
 - o LU2 Cuisine Functionality
- Day 85
 - o LU1 Cost for Two
 - o LU2 Sorting Price: low to high and high to low
- Day 86
 - o LU1 Pagination
 - o LU2 adding Functionality to Menu Modal
- Day 87
 - o LU1 Payment Integration -1
 - o LU2 Payment Integration -2

- Day 88
 - \circ LU1 Heroku Deployment BE
 - o LU2 Heroku Deployment FE
- Day 89
 - o LU1 Domain
 - o LU2 Hosting
- Day 90
 - \circ LU1 Interview Preparation -1
 - o LU2 Interview Preparation -2