

BOOSTMYSITES

FULL STACK WEB DEVELOPMENT

The course is covered in 3 modules

1. Front end development (JavaScript, HTML, CSS)
2. Middleware (MongoDB)
3. Back-end development (Python programming)

Detailed syllabus is as given below

HTML

1. Introduction
 - 1.1. What is HTML
2. HTML
 - 2.1. Role of HTML
3. Formatting text
 - 3.1. The syntax of HTML elements
 - 3.2. Paragraphs
 - 3.3. Headlines
 - 3.4. Bold and italics
 - 3.5. Lists
 - 3.6. Quotes
 - 3.7. Date & time
 - 3.8. Code, pre, and br
 - 3.9. Superscripts, subscripts, and small text
4. Understanding the Power of HTML
 - 4.1. Debugging HTML
 - 4.2. HTML attributes
 - 4.3. ARIA roles
 - 4.4. Formatting HTML
 - 4.5. Weird characters
5. Linking and Navigation

- 5.1. Links
 - 5.2. URL paths
 - 5.3. Navigations
6. Images and Graphics
- 6.1. Images
 - 6.2. Image format
 - 6.3. Responsive images
 - 6.4. Responsive width
 - 6.5. Responsive pictures
 - 6.6. Figure and figcation
- 6.7. Media
- 6.7.1. Audio
 - 6.7.2. Video
 - 6.7.3. Captions & Subtitle
 - 6.7.4. Embedding other media through iframes
- 6.8. Putting it all together
- 6.8.1. HTML page
 - 6.8.2. Document head
 - 6.8.3. Structuring content
- 6.9. Forms and interacting elements
- 6.9.1. HTML forms basics
 - 6.9.2. More on forms
- 6.10. Structuring tabular data
- 6.10.1. When to use tables
 - 6.10.2. Building table rows
- 6.11. Wrap up
- 6.11.1. HTML & CSS
 - 6.11.2. Browser developer tools
 - 6.11.3. Referencing CSS
 - 6.11.4. Overview & setup

CSS

1. Optimising images & Retina display
2. Relative paths in project

- 3. Absolute path
 - 4. Core concepts
 - 5. CSS specification and W3C
 - 6. CSS syntax and terminology
 - 7. CSS values and units
 - 8. Color and property value
 - 9. Type and universal selector
 - 10. Class & ID selector
 - 11. Class & ID selector exercise
 - 12. Descendant selectors
 - 13. Grouping selectors
 - 14. Inheritance and specificity
 - 15. The cascade and its importance
 - 16. Adding colors with project
 - 17. Pseudo class selectors and links
 - 18. Styling links with project
19. BOX model
- 19.1. Introduction
 - 19.2. Inline, block and display
 - 19.3. BOX model properties
 - 19.4. Syntax and usage
 - 19.5. Debugging
 - 19.6. Padding, margin and border
 - 19.7. Margin and layouts
 - 19.8. Adding content wrapper with project example
 - 19.9. Margin and padding in project example
20. Typography
- 20.1. Typography for the web
 - 20.2. Changing the font-family
 - 20.3. Font-weight and font-style
 - 20.4. Web fonts with @font-face
 - 20.5. Web fonts with Google Fonts
 - 20.6. Project: Google Fonts
 - 20.7. The font-size property
 - 20.8. Font shorthand
 - 20.9. Text-decoration, text-align, and line-height

20.10. Project: Typography styles

21.Layouts: Float and Position

- 21.1. Introduction to float
- 21.2. The float and clear properties
- 21.3. Float and collapsed container
- 21.4. Layouts and the box model
- 21.5. Project: Float and box model fix
- 21.6. Position
- 21.7. Position and z-index
- 21.8. Layouts: flexbox and grid

22.Layouts: Float and Position

- 22.1. Introduction to float
- 22.2. The float and clear properties
- 22.3. Float and collapsed container
- 22.4. Layouts and the box model
- 22.5. Project: Float and box model fix
- 22.6. Position
- 22.7. Position and z-index
- 22.8. Advanced selector
- 22.9. Layouts: Float and Position
- 22.10. Responsive Layouts Wrap Up

Javascript

- 1. JavaScript Introduction
- 2. Basics of JavaScript
- 3. Coding First Line of JavaScript
- 4. Brief Overview of JS, Websites & Web Technologies
- 5. Html, CSS & JavaScript Overview
- 6. Deep Dive in JavaScript
- 7. Downloading & Installing VS Code IDE
- 8. Writing JS in VS Code
- 9. Getting Started with JavaScript
- 10. JavaScript Console API
- 11. Different ways to write JavaScript
- 12. Variables in JavaScript

- 13.Comments in JavaScript
- 14.Data Types in JavaScript
- 15.Operators in JavaScript
- 16.Functions in JavaScript
- 17.Conditional Statements in JavaScript
- 18.Loops in JavaScript
- 19.Break and Continue Statements
- 20.Array Methods
- 21.String Methods
- 22.Dates in JS
- 23.JavaScript DOM Manipulation
- 24.JavaScript Events
- 25.JavaScript SetTimeout and SetInterval
- 26.Local Storage in JavaScript
- 27.About JSON
- 28.JavaScript Versions
- 29.Project – 1 (JavaScript Clock)
- 30.Project – 2 (An Amazing JavaScript To-do List)
- 31.Wrap Up

PYTHON

CORE PYTHON:

- 1. Basics
 - 1.1 Installation
 - 1.2 Environment Setting
 - 1.3 SDK for Code Execution
 - 1.4 Python Pros and Cons
 - 1.5 Advantages of Python
- 2. Data types
 - 2.1 Mutable and Immutable Categories
 - 2.2 Data Type Representation
- 3. Conditional statements
 - 3.1 if else if and else
 - 3.2 while statement

4. Loops and control statements
 - 4.1 iter_and_____next
 - 4.2 break and continue statement
 - 4.3 enumerate
 - 4.4 range
 - 4.5 else in for loop
5. Strings
 - 5.1 Inbuilt Function Manipulation
6. List
 - 6.1 Inbuilt Function Manipulation
7. Tuples
 - 7.1 Inbuilt Function Manipulation
8. Dictionaries
 - 8.1 Inbuilt Function Manipulation
9. Functions
 - 9.1 Types of Functions
 - 9.2 return statement
 - 9.3 Function Scoping
 - 9.4 Execution of Nested Function
10. Exception handling
 - 10.1 Types of Exception and Exception Base class
 - 10.2 Types of except block
 - 10.3 optimized Exception Execution
 - 10.4 raise method
 - 10.5 “else” and “finally”
 - 10.6 user Defined Exception

Advanced Python:

11. OOP concepts

- 11.1 document string
 - 11.2 Inheritance and Types
 - 11.3 Data Hiding (Access Specifier)
 - 11.4 Decorators
 - 11.5 Polymorphism
 - 11.6 Method Resolution Order
12. Regular expression
- 12.1 match and search method
 - 12.2 flags (re.I and re.M)
 - 12.3 findall method
 - 12.4 sub and split method
 - 12.5 detailed explanation on literals and anchor symbols
13. Database
- 1. SQLite3 Execution
 - 2. Basic of Tkinter implementation
 - 3. Code with Exception
 - 4. Basics of ORM implementation
14. Networking
- 14.1 Socket Basics
 - 14.2 Client and Server Message Sharing Code
 - 14.3 Paramiko and Netmiko Basics
15. Multi-threading
- 15.1 Multithreading Basics
 - 15.2 Difference between Multithreading and Multiprocessing
 - 15.3 Concurrency and Parallel Execution Thread
16. File Operation (txt file)
- 16.1 Context Manager
 - 16.2 Basic File Operation (read, write, append)
 - 16.3 tell() and seek() method
17. Date Time Manipulation
- 17.1 import datetime and time
 - 17.2 Change time format
 - 17.3 Adding Hours, minutes and Seconds

18. Import and Packages

- 18.1 Path Reference**
- 18.2 Optimized Code Execution**
- 18.3 Circular Import**
- 18.4 name_and_main_explanation**

19. Mongo DB

- 19.1 Introduction**
- 19.2 Data Modelling**
- 19.3 Data Types**
- 19.4 DB Operation – 1**
- 19.5 DB Operation – 2**
- 19.6 Modelling Relationship**
- 19.7 PyMongo**

20. Flask

- 20.1 API Introduction**
- 20.1 Hosting a website and server concepts**
- 20.3 Difference between Django and Flask**
- 20.4 Input Files and Output Files (JSON)**
- 20.5 Flask Running with Example**
- 20.6 Tools for Testing (PostMan or Insomania)**

21. Django

- 21.1 Django Essentials**
- 21.2 API Creation**
- 21.3 IP and PORT Change**
- 21.4 Admin Page Accessing**
- 21.5 Rendering HTML internally and Externally**