

PHP with CodeIgniter and Laravel

Objective: To design the interactive web based application design and development and writing dynamic web application using CI and Laravel Framework

Pre-requisites: Basic Fundamentals of HTML, CSS and JS

Session 1 (Introduction to HTML)

- Brief History of the Internet
- Web Server: IIS, Apache Server
- How the Internet Works
- Basics of HTML and its Tags
- Internet Protocol, HTTP Protocol, Domain Names
- HTML Forms, HTML Tables, Links, Div, List, Formatting etc.

Session 2 (CSS and Its Features)

- Introduction to CSS
- Types of CSS, Internal, External and Inline
- Linking a stylesheet to HTML document
- Designing Website Templates using CSS

Session 3 (Introduction to PHP)

- Introduction to Server Side Scripting Language
- Introduction to PHP
- Introduction to Server, Ports, Client Server Architecture
- Software Requirements and Installations
- Fundamentals Concepts of Programming, Syntax, Control Structure
- Arrays in PHP
- Library Functions in PHP
- Handling Data, Time and String
- Functions in PHP (In-built and Customized functions)
- Web Concepts –Session, Cookie, Query String, Hidden Fields)
- Working with HTTP Headers

Session 4 (MySQL)

- Introduction to Database
- Database Design and Schema

- Working with SQL DDL, DML, DCL queries and Writing Queries in PHP Code
- Insert, Update, Delete, Select, Joins, In-built Functions, Groups, Order By
- Joining in MySQL
- MySQL Data Types

Session 5 (Database Connectivity in PHP)

- Database Connectors in PHP
- Pre-defined functions for DB connectivity like MYSQLI_CONNECT(), MYSQLI_SELECT_DB()
- DB Connectivity using MYSQLI
- Creating user defined library for DB Connectivity

Session 6 (MVC Architecture with PHP)

- What is MVC?
- Create Controllers and its Actions
- Creating your own MVC
- Create Views and connect with Model and Controllers
- Create Models and its classes

Session 7 (JavaScript and JQuery)

- What is JavaScript?
- JavaScript Syntax and Language Basics
- Control Structure and Loops in JavaScript
- Function in JavaScript
- Arrays in JavaScript
- Objects in JavaScript
- Handling Date and Time in JavaScript
- Dynamic HTML and CSS using JavaScript
- JavaScript Events
- JQuery Introduction
- Working with JQuery Library

Session 8 (HTML 5 and Advance Feature)

- Canvas, Audio, Video Handling in HTML5
- Web Sockets, Micro-Sockets
- Maps, Web Storage, Drag and Drop

Session 9 (JQuery in Advance)

- Revision of Fundamentals of JQuery
- jQuery Functions, jQuery Selector, jQuery Attributes
- jQuery Traversing, jQuery and CSS
- Manipulating DOM using jQuery
- jQuery UI
- jQuery UI Plugins
- Minor Project in jQuery

Session 10 (Introduction to CodeIgniter)

- Introduction to CodeIgniter
- Application Structure
- Configuration, Routing
- MVC Fundamentals
- Controllers, Views and Models
- Request and Response
- Create Models and Its classes
- Redirections, Cookies and Sessions
- Error Handling
- Event Handling
- File Uploading
- Security and AJAX
- Validation in Code Igniter

Session 11 (Project Development)

- Requirement Analysis
- Designing Database Schema
- Designing Templates
- Make your project dynamic with CodeIgniter
- Working with MVC Structure
- Hosting of the project
- Working with FTP
- Debugging with developer tools of browser and PHP

Session 12 (Introduction to Laravel Framework)

- Laravel Introduction
- Install Laravel on Windows Machine
- Laravel Application Structure

- Laravel Configuration, Laravel Routing Parameters
- Laravel Request, Controller and Middleware
- Working with Views, Blade Templates, Redirections
- Working with Databases
- Errors and Logging, Forms, Localization
- Session, Validation, File Uploading
- AJAX, Error Handling, Event Handling

Session 13 (Introduction to BootStrap)

- BootStrap Introduction
- Grid Basic, Typography, Colors, Tables, Images, Jumbotron
- Alerts, Buttons, Button Groups, Badges, Progress Bars, Spinners
- Pagination, List Groups, Cards, Dropdowns, Collapse, Navs, Navbar
- Forms, Inputs, Input Groups, Custom Forms
- Carousel, Model, Tooltip, Popover, Toast, Scrollspy, Utilities, Flex, Icons
- Media Objects, Filters