

WD-PHP-JS-202407

Programming Like a Food🍔

Course Outlines

- **Lecture 1**
 - Introduction on Web development?
 - What languages will we learn about in this course?
 - What's our goal?
 - What we will achieve after finishing this course?
 - Job market
 - What the next step?
 - Class routine & time
 - Let's start with PHP
 - What is PHP
 - Programming paradigm in PHP
 - Why and How PHP was Created
 - PHP: Programming Language or Server-Side Language
 - PHP: Past, Present, and Future
 - PHP Foundation
 - Prepare your machine to start
 - How to run PHP code
 - What is function in programming?
 - Intro to some basic PHP syntaxes
 - I/O methods
 - **Assignment**
 - Practice more with I/O methods
- **Lecture 2**
 - Variables
 - Constants
 - Data types
 - Type hinting
 - Type casting
 - Operator
 - Control flow statements.
 - String manipulation

- **Assignment**

- Develop Simple Calculator by PHP CLI.
- GPA calculator project.
- **String Manipulation Toolkit**
 1. **String Length:** Calculate and display the length of a given string.
 2. **Reverse String:** Reverse the characters in a string and display the result.
 3. **Count Words:** Count the number of words in a string and display the result.
 4. **Uppercase/Lowercase Conversion:** Convert the string to uppercase or lowercase and display the result.
 5. **Substring Extraction:** Allow users to input a starting index and length to extract a substring from the string and display the result.
 6. **Find and Replace:** Enable users to search for a specific substring within the string and replace it with another substring. Display the modified string.

- Lecture 3

- Introduction to Arrays
- Types of Array
- Loops
- Right Half Pyramid
- Array manipulation
- Array iteration

- **Assignment**

- Find the all of odd number from 1-100.
- Factorial number
- Fibonacci series
- Find the summation of diagonal numbers of the rectangle tables
- Find the summation of only 4 sides numbers of the rectangle tables.
- **Pattern:** Left Half & Full Pyramid,
- Find the summation of diagonal numbers of the rectangle tables
- Find the summation of only 4 sides numbers of the rectangle tables.

- Lecture 4

- Talk about previous assignment
- Solve previous class problems
- Again Function
- User-defined functions
- Function arguments
- Returning values
- Encryption & Decryption - HW

- Variable functions - HW
- Anonymous functions - HW
- Arrow Functions - HW
- Lecture 5
 - Web primer
 - Intro to the Web and Internet
 - Understand Client↔Server Architecture
 - HTTP Basics
 - Cookie, Session
 - Request handling in PHP using Form
 - Let's build a Login form without encrypt password
 - **Assignment**
 - Build Authentication System(only Login) using PHP
 - Password should be encrypted
- Lecture 6
 - Mastering multipage web application
 - include vs require
 - Discuss **E-Shopper**
 - **Assignment**
 - **E-Shopper** Frontend design
- Lecture 7
 - Introduction to OOP Programming
 - Principles of OOP
 - 4 Pillars of OOP
 - Class properties
 - Access modifiers
 - Inheritance
 - Polymorphism
 - Constants & Enums
 - **Assignment**
 - Practice with class codes
 - Some real life problems
 - **E-Shopper** Frontend design
- Lecture 8
 - Traits
 - Interface
 - Abstract class
 - Magic methods
 - **Assignment**

- Practice with class codes
 - Some real life problems
 - **E-Shopper** Frontend design
- Lecture 9
 - Composer
 - Namespace
 - **Assignment**
 - Practice with class codes
 - Some real life problems
 - **E-Shopper** Frontend design
- Lecture 10
 - Intro to JavaScript
 - Why JavaScript
 - How many way to run JS code?
 - JS I/O
- Lecture 11
 - let vs var vs const
 - Variable
 - Data types
 - function
 - Built in function
 - User defined function
 - Rest parameters
 - Arrow function - HW
 - Anonymous function - HW
 - Operator
 - Control flow statement
 - Loop
 - Array
- Lecture 12
 - Complete DOM Manipulation
 - Event Listener
 - BOM Manipulation
 - **Assignment**
 - Build Light on/off project with DOM
- Lecture 13
 - Recap Previous JS
 - Develop Task management app
- Lecture 14

- Introduction to Database
- Why we need Database
- Database Types and Other Data Storage Options
- How to decide which database to choose
- How to run query?
- Intro to MySQL
- DDL vs DML
- Database
 - Table/Schema
 - Data Types
 - Query in database
 - Mutation (insert, update, delete) in Database
- Lecture 15
 - Database drivers and how to connect PHP with database
 - Introduction to PDO (PHP Data Objects)
 - Introduction to MySQLi
 - Establishing a Database Connection
 - Executing Queries
 - Handling Transactions
 - Error Handling and Debugging
 - **Assignment**
 - Re-Develop Task management application by PHP & MySQL
- Lecture 16
 - Requirement analysis of **E-Shopper**
 - Breakdown the project requirements into modules/features
 - Database design for **E-Shopper**
 - Primary Key, Foreign Key, Indexing basics
 - **Assignment**
 - Choose your own project which you develop by your own way.
 - Design Database for your own requirements.
- Lecture 17
 - Project Environment setup
 - Composer setup
 - File folder structure
 - Request Handling
 - Core controller
 - Models files
 - Core configuration setup
 - **Assignment**

- Setup your own project by the following my way
- Lecture 18
 - Project Environment setup
 - DB configuration
 - DB connection
 - Upload into git
 - Globally Session handling
 - Globally Error handling
 - **Assignment**
 - Setup your own project by the following my way
- Lecture 26
 - Separate frontend & backend routing logic
 - Develop Authentication System for
 - Admin users
 - Customer
 - **Assignment**
 - Integrate all frontend pages into the frontend module
 - Implement all of those in your own project.
- Lecture 19
 - Implement Customer CRUD
 - Implement global pagination handler
 - **Assignment**
 - Implement Supplier CRUD with pagination
 - Implement User CRUD with pagination
- Lecture 20
 - Product CRUD
 - Product Image Upload
 - Product Image Delete
 - Discuss and planning about Inventory handling
 - **Assignment**
 - Design Inventory CRUD pages
- Lecture 21
 - Implement Inventory backend logic
 - Discuss and planning about Coupon management handling
 - **Assignment**
 - Implement Coupon management system
- Lecture 22
 - Recap so far implemented modules
- Lecture 31

- Show all category in website home page
- Show products in the website home page as per the design
- Lecture 23
 - Implement Shop page with
 - Pagination
 - Filtering
- Lecture 24
 - Implement product cart functionality with
 - Availability checking
- Lecture 25
 - Implement Checkout(Frontend) page with
 - Coupon
 - Customer login or not login
- Lecture 26
 - Implement Checkout form submit & handle backend logic
- Lecture 27
 - Customer portal integration
 - Customer dashboard integrate
 - Integrate customer order list & details design.
- Lecture 28
 - Show **Order** list & details page in admin
 - Admin can update the order list by the status.
- Lecture 29
 - Recap the whole order procedure
 - Current user profile update & change password
- Lecture 30
 - Customer profile update & change password(both frontend/backend)
 - **Assignment**
 - Handle promotional slider CRUD
- Lecture 31
 - Email Sending by Mailtrap on update of each status
- Lecture 32
 - Website searching mechanism
- Lecture 33
 - What more features can we implement in this project?
- Lecture 34
 - Happy Farewell