

LIST OF PROGRAMS / EXPERIMENTS / EXERCISES:

WEEK-1:

HTML Frames: Frame Structure: Design a webpage for the online book store using HTML frames. Include a navigation frame, a content frame for displaying book details, and a footer frame for additional information.

WEEK-2:

CSS Styling: Apply CSS styling to enhance the visual appeal of the frames and content. Use appropriate styles for fonts, colors, and layout.

WEEK-3:

JavaScript:

a) User Registration Form

Create a registration form for users signing up on the online bookstore. Validate the following:

- Username: Should not be empty and must be at least 5 characters long.
- Password: Should not be empty and must be at least 8 characters long.
- Confirm Password: Should match the entered password.

b) Forgot Password Form

Implement a form for users to reset their password. Validate the following:

- Email Address: Should be a valid email format.
- Provide feedback if the email address is not associated with any account.

c) Dynamically Content Loading

Use JavaScript to dynamically load book details into the content frame when a user clicks on a book in the navigation frame.

WEEK-4:

Shopping Cart Functionality: Implement a simple shopping cart using JavaScript. Allow users to add books to their cart and view the cart's contents.

WEEK-5:

XML Structure and Design: Book Catalog XML: Design an XML structure to represent the catalog of books in the online store. Include details such as book title, author, genre, price, and availability.

WEEK-6:

User Account XML: Create an XML structure to store user account information, including details like username, password (encrypted), email, and purchase history.

WEEK-7: Install and configure Apache Tomcat server in Eclipse

WEEK-8:

Servlet for Book Retrieval: Develop a servlet that retrieves book information from a database and sends it to the content frame.

WEEK-9:

User Authentication: Implement user authentication using servlets and JSP. Create a login page and restrict access to certain pages for authenticated users.

WEEK-10:

Hibernate: Hibernate Entity Mapping: Create Hibernate entity classes to represent books and users. Map these entities to corresponding database tables.

WEEK-11:

CRUD Operations: Implement CRUD operations using Hibernate for managing book information in the database.

WEEK-12:

Full-Stack Integration: Integrate JavaScript with Servlets: Enhance the shopping cart functionality by integrating JavaScript with servlets. Allow users to update the cart without page refresh.

WEEK-13:

Checkout Process: Implement a checkout process using servlets and JSP. Allow users to review their cart, enter shipping information, and complete the purchase.

WEEK-14:

Deployment and Advanced Features: Web Deployment: Deploy the online bookstore application to a servlet container (e.g., Apache Tomcat) on a cloud platform.

TEXT BOOKS:

1. Web Programming, Building Internet Applications, Chris Bates, 2nd Edition, Wiley Dreamtech
2. Core Servlets and Java Server Pages, Volume 1: Core Technologies, Marty Hall and Larry Brown, Pearson
3. Beginning Hibernate: For Hibernate 5, Joseph B. Ottinger, Jeff Linwood, Dave Minter, 4th Edition, Apress

REFERENCES:

1. Programming World Wide Web, Sebesta, Pearson
2. Internet and World Wide Web – How to program, Dietel and Nieto, PHI/Pearson Education Asia
3. Java: The Complete Reference, Herbert Schildt, 7th Edition, Tata McGraw-Hill
4. Java Persistence with Hibernate, Christian Bauer, Gavin King, Gary Gregory, 2nd Edition, Manning Publications