## **EID302: WEB TECHNOLOGIES**

LTPC

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Module I 8 hours

**Introduction to HTML Version5:** Basic syntax, HTML document structure, text formatting, images, lists, links, tables, forms, frames, section, article, range and date.

Cascading Style Sheets Version3: Levels of style sheets, style specification formats, selector forms, font properties, list properties, color properties, alignment of text, background images, span and div tags.

Module II 10 hours

**Introduction to Java Script:** Overview of java script, syntactic characteristics, primitives, operator and expression, control statements, arrays, functions, errors in scripts, Document Object Model(DOM), event driven computation, element access in java script, the navigator object.

**Dynamic Document with Java Script:** Element positioning, moving elements, changing colors and fonts, dynamic content, locating the mouse cursor, slow movements of elements, dragging and dropping elements.

Module III 8 hours

**Introduction to XML:** Syntax of XML, document structure, and document type definition, namespaces, XML schemas, document object model, presenting XML using CSS.

**Introduction to other XML Technologies:** XLink, XPointer, XQuery and XPath, XQuery and XSLT, XQuery processor and FLWOR expression.

Module IV 8 hours

**Introduction to Servlets:** Lifecycle of a servelet, the servlet api, the javax.servelet package, the javax.servlet.http package, handling http request & responses, using cookies, session tracking and security issues and servlets with database connectivity.

**Introduction to Model View Controller (MVC):** Architecture, its structure, components.

Module V 8 hours

**Introduction to JSP:** The problem with servlet, the anatomy of a JSP page, JSP processing, JSP applications, JSP components, comments, expressions, scriplets, JSTL tag library, JSP database connectivity.

**Introduction to Web Servers:** Installing the Java software development kit, tomcat server & testing tomcat, structure of web application, deploying web application, IIS web server, and GWS web server.

## Text Book(s)

- Robert W.Sebesta, Programming the World Wide Web, 4/e, Pearson, 2007.
- 2. Chris Bates, Web Technologies, 2/e, Wiley, 2002.
- 3. Jason Hunter, William Crawford, Java Servlet Programming, 2/e, O'Reilly, 2003.

## References

- 1. Dietel and Nieto, Internet and World Wide Web How to program, PHI/Pearson Education, 2006.
- Herbert Schildt, JAVA The Complete References, 8/e, McGraw Hill, 2014
- 3. Uttam K.Roy, Web Technologies, Oxford Higher Education publication, 2004.
- 4. Bai Ekedaw, Web Warrior Guide to Web Programmming, Thompson Publications, 2012.