

WITH EFFECT FROM THE ACADEMIC YEAR 2008-2009

CS 351

### WEB PROGRAMMING & SERVICES

Instruction	4	Periods per week
Duration of University Examination	3	Hours
University Examination	75	Marks
Sessional	25	Marks

#### UNIT-I

Web Basics and overview: Introduction to Internet ,World Wide Web, Web Browsers, URL, MIME, HTTP, Web Programmer's tool box

Introduction to XHTML Cascading Style Sheets

Basics of Java Script

#### UNIT-II

Java Scripts and HTML Documents DOM Events and Event Handling

Dynamic documentation with Java scripts

Introduction to XML XML document structure, namespaces Schemas XSLT style sheets XML processors

#### UNIT-III

J2EE Platform for Web Development servelets and JSPs

Extending and enhancing WEB services with Java servelets , major features of servelets : filters, session management;

Creating dynamic WEB pages with JSPs: elements, directives, actions and scripting;

#### UNIT-IV

.NET Platform

Introduction to .NET Framework; Common Type System: Types and Objects, Generics;

Common Language Runtime CLR , .NET Languages ASP.NET Constructing WEB Services Advertising WEB Services

Database access thro the WEB JDBC and MYSQL

## UNIT-V

Service oriented Architecture and Web Services Fundamentals: common characteristics of contemporary SOA ;WEB services and primitive SOA: web service framework – services, modes, service description(WSDL), messaging (SOAP)

Contemporary service oriented Architecture: message exchange patterns, service activity, coordination, atomic transactions, business activities, orchestration, advanced messaging

### Suggested Reading:

1. *Programming the World Wide Web* (third edition) Robert W Sebesta Pearson Education, 2007.
2. *Service Oriented Architecture Concepts, Technology and Design*, Thomas Erl - Pearson Education Pub. (chapters 3,5,6 and 7)
3. *An Introduction to WEB Design + Programming*, Paul S Wang Sanda S Katila Thomson Learning 2007 (chapters 1 2, 3, 6, 8 and 9).
4. *J2EE 1.4 – A Professional guide*, Aaron E Walsh Wiley 2004 (chapters 1, 2, 3, 5, 6, 9, 10 and 11).
5. *Professional .NET Framework 2.0*, Joe Duffy Wiley India 2007 (chapters 1, 2, 3, 4, 5 and 7).