Boston University

MET CS401 - Introduction to Web Application Development

Instructor Information

Larry Robertie
LGRobert@BHCC.Mass.edu
617-228-3227
Office hours by appointment
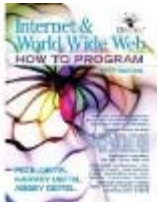
Larry Robertie
ProfRobertie

ProfRobertie No class Monday February 6
171 days ago · reply · retweet · favorite

ProfRobertie This is a

Join the conversation

Required Course Materials

Textbook:

Required	Recommended
Internet and World Wide Web How To Program (5th Edition) 978-0-13215-100-9	*Dynamic Web Application Development using PHP and MySQL* *Simon Stobart & David Parsons, Cengage* *978-1-84480-753-6*

Other Resources:

http://www.robertie.com/edu - class web site
http://www.Zymic.com - free web hosting
http://kompozer.net/ - opensource HTML editor
BU Accademic Alliance - Free Microsoft (Web Expressions)
http://www.mozilla.com/en-US/firefox/fx/ - Firefox Web browser
https://addons.mozilla.org/en-US/firefox/addon/firebug/ - Firebug web

development tool for Firefox
http://www.apachefriends.org/en/xampp.html - install development environment locally
http://www.w3schools.com/ - W3Schools Web Tutioials
http://php.net/manual/en/langref.php - The official PHP reference manual

Top of Page

Course Description

This course focuses on building core competencies in web design and development. It begins with a complete immersion into HTML essentially XHTML and Dynamic HTML (DHTML). Students are exposed to Cascading Style Sheets (CSS), as well as Dynamic CSS. The fundamentals of JavaScript language including object-oriented JavaScript is covered comprehensively. AJAX with XML and JSON are covered, as they are the primary means to transfer data from client and server. Open source libraries such as Prototype, jQuery and Mootools might optionally be covered, as they assist in building cross-browser web applications rapidly and efficiently. The PHP language will be presented and covered; however, students can use other server-side languages; such as ASP.NET, Java (JEE) or Ruby on Rails (RoR) for their projects. The course will focus on MySQL as a relational database system with the final project. Students may use other databases with instructor approval. Students will work with either IIS 6 (or better) or Apache 2, using any conventional operating system when working on their term projects and class laboratories.

Prerequisites:

The prerequisites to this course are introductory programming classes. Students should bring a laptop with its power supply to every class. We will have in-class laboratories; otherwise, you will be writing XHTML with pen and paper; which is not fun at all.

Top of Page

Goals and Objectives

By successfully completing this course you will be able to:

- Understand web programming concepts.
- Demonstrate client-side competency with knowledge of XHTML and CSS.
- Develop web applications skills using software such as Dreamweaver.
- Create dynamic web pages with JavaScript and Ajax.
- Understand the basics of XML.
- Understand the basics of PHP and MySQL.
- Gain hands-on exposure to the web site design and development process.
- Develop a basic website.

Top of Page

Instructional Methods

Lecture, demonstration, problem solving, and discussion.

Top of Page

Grading

Course Grading Criteria

Event	% of Grade
Attendance & Participation	10%
Assignments	30%
Quizzes	30%
Final Project	30%

Note: there will be no "extra credit" assignments, any assignment passed in late will receive an automatic 20% reduction in grade

Standard Grading

Letter Grade	Numerical Equivalent	Grade Points
A	95-100	4.00
A-	90-94	3.67
B+	86-89	3.33
B	83-85	3.00
B-	80-82	2.67
C+	75-79	2.33
C	70-74	2.00
C-	not at BHCC	
D	64-69	1.00
F	less than 64	0.00
IP	In Progress (incomplete)	
W	Withdrawn	

Top of Page

Attendance

- Be on time for all class meetings
- Any student who misses three classes may be at risk for failing the course.
- Each student is responsible for reading chapters from the text, as well as other reading materials as assigned by the instructor.
- Texting or use of cell phones in class is **prohibited**

Top of Page

Code of Conduct

The course is governed by the Academic Conduct Committee policies regarding plagiarism (any attempt to represent the work of another person as one's own). This includes copying (even with modifications) of a program or a segment of code without attribution. You can discuss general ideas with other people, but the work you submit must be your own. Collaboration is not permitted unless you are otherwise instructed.

Top of Page

Schedule

week	topic
1	Introductions, course outline & expectation Introduction to Web Architecture
2	Introduction to HTML5: Part 1
3	Introduction to HTML5: Part 2
4	Introduction to Cascading Style Sheet (CSS): Part 1
5	Introduction to Cascading Style Sheets™ (CSS): Part 2
6	JavaScript: Introduction to Scripting JavaScript: Control Statements: Part 1 JavaScript: Control Statements: Part 2
7	JavaScript: Functions JavaScript: Arrays JavaScript: Objects
8	Document Object Model (DOM): Objects and Collections JavaScript Event Handling: A Deeper Look
9	XML
10	Ajax-Enabled Rich Internet Applications with XML, JSON, and PHP
11	Database: SQL and MySQL
12	PHP 1
13	PHP 2
14	Project Presentations
15	Project Presentations

This schedule is subject to change. For more detail, consult the class website.

Top of Page