



Broward Community College

Course Outline

STATUS: A

COMMON COURSE NUMBER: CGS 2554C

COURSE TITLE: E-Commerce Web Development

CREDIT HOURS: 3

CONTACT HOURS BREAKDOWN:

Lecture/Discussion 32

Lab 32

Other

Contact Hours/Week 4

CATALOG COURSE DESCRIPTION:

Prerequisite: CGS 1540C, CGS 1557C

Corequisite: None

This course teaches development of E-Commerce web sites for back-end server applications. It stresses development of database information and manipulation for web delivery. Students should have complete knowledge of HTML and database management, before taking this course. Students will conceptualize and develop E-Commerce web sites.

UNIT TITLES:

1. Defining and discussing E-Commerce.
2. Configuring the development environment.
3. Developing the database.
4. Building forms.
5. Building interfaces.
6. Inserting and updating records.
7. Using query builders for validation.
8. Securing web sites.
9. Creating final web pages for E-Commerce.

LAST REVIEW Academic Year 2004-2005 NEXT REVIEW Academic Year 2009-2010

I. Course Overview:

Upon successful completion of this course, the students should be able to conceptualize and develop E-Commerce web sites.

II. Units:

Unit 1. Defining and Discussing E-Commerce

General Outcome:

1.0 The students should be able to define & discuss E-Commerce.

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

- 1.1 Define and Discuss E-Commerce web sites.
- 1.2 Discuss how to navigate in E-Commerce web sites.
- 1.3 Discuss how purchasing is done in E-Commerce.
- 1.4 Discuss how selecting a product is done in E-Commerce.
- 1.5 Discuss the delivery of the product done in E-Commerce.
- 1.6 Discuss support after the sale is handled in E-Commerce.
- 1.7 Discuss Quick store application in E-Commerce.
- 1.8 Discuss delivery of the product done in E-Commerce.
- 1.9 Discuss payment options in E-Commerce.
- 1.10 Discuss uploading and managing files in E-Commerce.

Unit 2. Configuring the Development Environment

General Outcome:

2.0 The students should be able to configure the development environment

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

- 2.1 Discuss static web pages.
- 2.2 Understand the features and components of E-Commerce web sites.
- 2.3 Identify the work environment.
- 2.4 Understand the markup language to be used to develop the web pages.
- 2.5 Understand how dynamic page publishing works.
- 2.6 Configure the web page software environment.

Unit 3. Developing the Database

General Outcome:

3.0 The students should be able to develop the database.

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

3.1 Define database syntax.

3.2 Create local variables.

3.3 Output variables.

3.4 Connect to a database.

3.5 Set up an ODBC datasource.

3.6 Query a database.

3.7 Format output with HTML tables.

Unit 4. Building Forms

General Outcome:

4.0 The students should be able to build forms.

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

4.1 Define HTML forms.

4.2 Create HTML form controls.

4.3 Pass form variables.

4.4 Use conditional processing.

4.5 Test for form variable existence.

4.6 Process list boxes, text screens, buttons, submission forms.

4.7 Create a search form.

Unit 5. Building Interfaces

General Outcome:

5.0 The students should be able to build interfaces.

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

5.1 Dynamically populate select controls.

5.2 Create dynamic queries.

5.3 Test multiple conditions.

5.4 Build an action page.

5.5 Pass URL parameters.

5.6 Create data drill-downs.

5.7 Display database details.

Unit 6. Inserting and Updating Records

General Outcome:

6.0 The students should be able to insert and update records.

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

- 6.1 Build an insert form page.
- 6.2 Perform server-side validation.
- 6.3 Build an insert action page.
- 6.4 Redirect a URL.
- 6.5 Add a new database record.
- 6.6 Build an update form page.
- 6.7 Prefill HTML forms.
- 6.8 Perform client-side validation.
- 6.9 Compare server and client-side validation.
- 6.10 Build and update action pages.

Unit 7. Securing Web Sites

General Outcome:

7.0 The students should be able to secure web sites

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

7.1 Discuss the Web's statelessness.

7.2 Use application-level variables.

7.3 Use cookies.

7.4 Use session variables.

7.5 Create a login page.

Unit 8. Creating Final Web Pages for E-Commerce

General Outcome:

8.0 The students should be able to create final web pages for E-Commerce.

Specific Learning Outcomes:

Upon successful completion of this unit, the students should be able to:

8.1 Create final web pages for E-Commerce.

8.2 Debug web pages to fix errors.

8.3 Upload pages to the Web.

8.4 Critique final projects.