

Centre for Continuing Education

CERTIFICATE IN WEB DEVELOPMENT

Course Title:	CEWP 329 HTML5 and Cascading Style Sheets				
Course Number:	CEWP 329				
Course hours:	40	Course Weighting:	2-3-3	Number of Credits (Units):	N/C
Pre-requisite:	CEWD 319 Adobe Dreamweaver – Interface Design				



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Web Development Term Project

Deadline for submission: Class 10 (as per schedule)

Late submissions will not be accepted.

Purpose

To design, develop, and publish a web site using recommended design practices. You will work to prepare final project based on a case problem. You should use all techniques covered in this course such as HTML5 and Cascading Style Sheets.

You must adapt your new Website so that it works equally well on a desktop computer, tablet, and mobile phone.

You work on a web project of your own choosing during the entire program or choose the Web project sample explained at the end of this document. You will work in team, 4 members or less, for the term project Web site. Students are expected to form their teams and select a project topic. Before you begin your project, I would like to see a rough outline and OK it.

Building a Web Site Development Team

Although one person can maintain small Web sites, larger sites require groups of people filling a variety of roles [5]. Of course, the line between these roles can be blurred, and many aspects of



site design require collaboration to solve a problem. The following are examples of the types of talent necessary to build a larger, well-conceived site.

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Project management – The project management team is responsible for planning, scheduling, and integrating the many tasks that it takes to create a Web site. They create the milestones for deliverables and balance the staffing resources to keep the project on schedule and within budget. The project manager coordinates communication among team members and keeps the focus on the deliverables promised to the client.

HTML developers – These are the people responsible for creating the HTML code, conforming to standards, validating code, troubleshooting the site, and testing the site across different operating systems and Web browsers.

Designers – Designers are the graphic artists responsible for the look of the site. They use graphic design software such as Adobe Photoshop, Adobe Illustrator, or Adobe Fireworks. Designers are responsible for the wireframes, page template design, navigation icons, color scheme, and logos. If your site uses photographic content, the designers are called upon to prepare the photos for online display. They might also create animations and interactive content using Adobe Flash.

Writers and information designers – Writers prepare content for online display, including taxonomies, hypertext linking conventions, and navigation paths. In addition, many writers are responsible for creating a site style guide and defining typographic conventions, as well as consistency, grammar, spelling, and tone. They also work closely with the designers to develop page templates and interactive content.

Application developers—Developers write the software programs and scripts you need to build interaction into your site. They may write a variety of applications in different programming languages for user interaction or write back-end applications that interact with a database.

Database administrators – The people who are responsible for maintaining the databases play an important role in commercial Web sites. Databases store all the information for customer transactions and e-commerce. Database administrators, application developers, and HTML developers work together when designing front-end forms used to collect data from the user. Database administrators are also responsible for data security backup and data recovery.

Server administrators – Get to know and appreciate the technical people who run your Web server. They take care of the sticky technical issues such as firewalls, ports, internal security, file administration, and backup procedures. Consult with them to determine your Web site's default filename and directory structure. They also can manage the server logs that contribute to your Web analytics reporting to determine how many visitors your site is attracting, where the visitors are coming from, and what pages they like best.



Project Milestones

Web Site Topic Approval: The topic of your web site must be approved by your instructor. Your instructor must approve your topic before you may begin to work on the next phase. Before starting to create a Web site, it is very important to spend some time designing the site, just as you should write an outline prior to writing a report or draw a flowchart before writing a computer program.

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Determining the Objectives and Intended Audience of the Site:

Using a word processor, write a Planning Analysis Sheet that includes the following headings:

- What is the purpose of the site?
- Who is the intended audience? Will the audience consist of potential customers, current customers, or employees of a particular company or industry?
- What are the objectives of the site? To advertise a company or organization, provide information to customers; provide a service, or process orders?
- What do you want the web site to accomplish? What results do you want to see?
- What information do you need?
- What opportunity, problem, or issue is your site addressing?
- List the working title of each page on your Web site.
- List where you will obtain the content (facts, text, graphics, sounds, and video) for the web pages you listed above.

Determining the Content and Drawing a Flowchart of the Site:

A flowchart for a Web site (Site map) illustrates the relationships between the pages on the site starting with the Home page. Draw a flowchart (storyboard) of your web site that shows the hierarchy of pages and relationships between the pages, using a word processor, PowerPoint, or drawing software like Microsoft Visio.

Sketching a Tentative Page Layout:

A Page layout includes one tentative layout to be used for the home page and one general tentative to be used for all the content pages (the rest of the pages on the Web site).

List at least two related or similar sites found on the Web.

Visit other Web sites that are similar to your proposed site. What do you like about these sites? What do you dislike? Look for inspirational ideas. How can you make your Web site better?

Best Practices Check List – Use the <u>Web Design Best Practices Checklist</u> (http://terrymorris.net/bestpractices/) to analyze the competition. For each competitor, note two strengths and two weaknesses.

Requirements

Your system is to include as many of the HTML, CSS, JavaScript features that we have discussed and used in previous courses. It should have a minimum of 10 pages with the main page. You will create whatever pages, banners, links, etc. you think would be necessary. Everything you create should be based on coherent organization; conciseness; clarity. You will



hand in printouts and instructions on how to operate the system. Included with these instructions will be table layouts and a disk containing all of your system's information.

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Deliverables

- The Web site and other pertinent files.
- Project description: describe the major points of your Web application that make it the best in the class!
- Web site flowchart

The content pages will include at least:

- One page containing a form with at least three elements (place the form content in an email message or text file),
- Appropriate meta tags,
- One page utilizing tables effectively (most students will use tables on each page),
- One animated image,
- One thumbnail image,
- One e-mail link,
- One link outside your site,
- One External CSS document, and
- One External Script document

You must use media queries to optimize each page for display on different-sized devices.

Project Evaluation

Your web site project will be evaluated on the following criteria:

- Project Milestones,
- Including all required web page elements,
- Following recommended web site design practices,
- Visual appeal of site, and
- Accomplishment of project's objectives.

Project Update Meeting 1: You should have at least three pages of your site completed by this time. Unless prior arrangements to meet are made, the Project Update Meetings will be held during class lab time. Bring the following items to discuss with and hand in to your instructor:

- The URL of your web site, if you want to publish your pages to your web site
- The source files of your web pages and images
- A sketch of your page(s) that will utilize a table.
- The Site Flowchart (revise as needed).

Project Update Meeting 2: You should have at least six pages of your site completed by this time. Unless prior arrangements to meet are made, the Project Update Meetings will be held during class lab time. Prepare the following to discuss with your instructor:

• The URL of your web site, if you want to publish your pages to your web site



- A sketch of your form(s)
- The Site Flowchart (revise as needed)

Project Update Meeting 3: You should have all pages of your site completed by this time. Unless prior arrangements to meet are made, the Project Update Meetings will be held during class lab time. Prepare the following to discuss with your instructor:

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- The URL of your web site, if you want to publish your pages to your web site
- A sketch of your style, inline, embedded, and external CSS files
- The Site Flowchart (revise as needed)

Be prepared to show your web site to the class, explaining the purpose behind each page / group of pages.

You should have all pages of your site completed by this time: HTML5, CSS3, Script, and other files.

Note: Lateness, incompletion and typographical errors in the final project will be penalized.

Group Web Site Evaluation

You will work in a group and collaborate with other students as you evaluate an assigned web site according to best practices of web design.

Use the information from your textbook [1] and the <u>Web Design Best Practices Checklist</u> criteria at http://terrymorris.net/bestpractices to help you with your evaluation. (Note: Just use the criteria provided, do not numerically score the website.)

Begin working with your group in class 1. It's often helpful if someone volunteers to be the "leader". Another group member should volunteer to post the group's SUMMARY message. Some groups divide up the work and each student has a smaller task. Other groups have each member research and then they combine the best of the answers together. It's up to you.

Your group will need to evaluate your assigned web site and comment on the following:

- 1. Determine the target audience
- 2. Indicate if the site appeals to the target audience
- 3. Comment on the following components:
 - a. Page Layout
 - b. Browser Compatibility
 - c. Navigation
 - d. Color and Graphics
 - e. Multimedia (if applicable)
 - f. Content Presentation
 - g. Functionality



- h. Accessibility
- 4. Suggest one or two ideas about how to improve the website.
- 5. NOTE: After your discussion is complete (but before class 2) one person from each group will post a summary response using the subject of "GROUP # SUMMARY".

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How to be successful in the group work:

- First -- determine which group you are in.
- Review the Web Design Chapter and the best practices list.
- Decide in class 2 how to divide the work. Decide who will post the summary response.
- ONE of the group members needs to post a SUMMARY of your group's evaluation.

Have fun evaluating the websites!

Web Project Sample

Your goal is to redesign the "K Street Dental" Web site. K Street Dental provides patients with all services that their teeth need. The Dental Center is located at 1990 K Street N.W, suite 15 A Washington, DC 20006, and the Web site address is: http://www.kstreetdental.com

The company wants to have a Medical Office Schedule System that offers a powerful scheduling with a user-friendly interface and critical features such as patient, physicians, and equipment scheduling and custom reporting.

You have to describe in details what you think about this Web site, the company, the products, and the services.

The Medical Office Schedule System might be divided into different modules:

1. Appointment Scheduler

- Create / Edit Appointment
- Create New Patients on the Fly
- Cancel, No Show or Arrive a Patient

2. Patients Module

- Register New Patient's Information
- Search for an Existing Patient

3. Insurance Module

- Looking Up Insurances
- Adding a Primary and Secondary Insurances
- Editing an Insurance
- Searching for an Insurance Company

4. Claims Module



- Adding Diagnosis and Adding Changes
- Submitting Claim

5. Recall Module

- Make a Customer Recall Letter
- Schedule a Recall Letter on a Patient
- Printing Batches of Custom Letters

6. Reports Module

- Make a Custom Recall Letter
- Schedule a Recall Letter on a Patient
- Printing Batches of Custom Letters
- 7. Other Modules that you think are necessary to better manage the Web Site

Some Useful Web Site related to the Web Project Sample

http://www.synerios.com/index.asp

http://www.soft-aid.com/products/products.htm

References

- 1. **Beginning HTML and CSS** | Rob Larsen | ISBN: 978-1-1183-4018-9 © 2013 | Published by John Wiley & Sons, Inc.
- 2. **HTML, XHTML, and CSS Bible, 5th Edition** | Steven M. Schafer | ISBN: 978-0-470-52396-4 © 2010 | Published by John Wiley & Sons, Inc.
- 3. **Web Development and Design Foundations with XHTML**, 5/E | Terry Felke-Morris, Harper College | ISBN: 978-0132783392 © 2012 | Pearson Education
- 4. **Developing Web Applications** | Ralph Moseley | ISBN: 978-0-470-01719-7 © 2007 | Published by John Wiley & Sons, Inc.
- 5. **Principles of Web Design: The Web Technologies Series, 5th Edition** | Joel Sklar | ISBN: 9781111528706 © 2012 | Published by Course Technology



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