Course Number: IS117
Course Title: Introduction to Website Development
Section: 003
Semester: Fall 2017
Date & Time: Monday & Wednesday: 10:00 AM – 11:25AM
Location: Mondays - PC MALL 36, Wednesdays - GITC 2400.
Credits: 3
Contact Hours: 3 Hours Face-to-Face

Instructor Information:  
Name: Dr. Art Hendela  
Office: 5108 GITC  
Phone Number: 973-596-5841  
Email (preferred): ahh2@njit.edu

Office Hours:  
By Mon and Wed, 2:30 PM-3:30 PM.  
Thu 11:30 AM – 12:30 PM

Course Materials

Murach's HTML and CSS3 3rd Edition  
By Boehm, Anne Fresno, Calif  
Publisher: Mike Murach & Associates, 2015  

Where Wizards Stay up Late: The Origins of the Internet  
By Hafner, Katie and Lyon, Matthew  

Other supplemental materials:  
Code Academy

Code Academy is the best available tool for teaching HTML, CSS, and JavaScript. In this course you are required to complete one code academy course. There is a code academy assignment posted in Moodle, this is where you should submit a link to your code academy user profile. The user profile displays badges for completing parts of each course and you will receive a grade based on your completion percentage of the courses.

Required Courses:

Specific course information

a. Brief description of the content of the course (Catalog Description)

This course discusses the concepts and skills required to plan, design and build websites. It will be taught in a lab to ensure hands-on experience with each of these tasks. The course begins with an overview of web technologies. Students learn to plan websites, which includes determining the business and end-user requirements for the site. Design includes learning to develop "mockups" of how the site will look and how people will use it. The major tools for building websites will be industry standard HTML and XHTML to describe web page content, and Cascading Style Sheets (CSS) for flexibly formatting the content. Using entire site, as well as "future-proofs" a website, allowing it to be viewed on every major web browser (such as Firefox or Chrome) and easily adapt to changes in future browser technology. The course features substantial hands-on projects comprising websites of several interlinked pages and images, enabling students to thoroughly learn the course's important concepts and skills.

b. Prerequisites or co-requisites: None

c. Is this course a required, elective, or selected elective course in the program: required

Specific goals for the course

a. Students will be able to create a visual design mockup for a multi-page website that demonstrates visual design concepts (composition / typography / color)

b. Students will be able to develop a multi-page website using HTML, CSS, and JavaScript

c. Students will be able to explain how a cookie is used to track Internet users as they go from site to site

Learning outcomes versus course goals.

<table>
<thead>
<tr>
<th>Student Outcomes</th>
<th>Addressed by</th>
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<tbody>
<tr>
<td>(a) An ability to apply knowledge from computing, mathematics, statistics, and management to effective Information Systems practice.</td>
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<tr>
<td>(b) Have demonstrated the capability to analyze problems and systems, and identify/define/design</td>
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</table>
(c) Have achieved and demonstrated a working knowledge of the SDLC (Software Development Life Cycle) which includes requirements analysis, systems design, implementation, testing, deployment, maintenance, and evaluation, and applied it to Information Systems projects that solve problems where computing solutions are appropriate.

(d) An ability to function effectively on teams in order to accomplish a desired goal.

(e) An understanding of the ethical, societal and professional responsibilities of the Information Systems professional.

(f) An ability to communicate effectively in both oral and written modes.

(g) An ability to identify and analyze the bi-directional impact of socio-technical problems and computing on individuals, organizations and society, including ethical, legal, security and policy issues.

(h) An ability to invoke current techniques, skills, tools and methodologies necessary to becoming an effective Information Systems professional.

(i) An understanding of the need to engage in continuing professional development, and to understand the purpose of research in the Information Systems and Computing fields, and how this benefits current practice.

(j) (BSBIS) An understanding of processes that support the delivery and management of information systems within a business/managerial/organizational environment.
   OR (BAIS) An understanding of processes that support the delivery and management of information systems to either a business/managerial/organizational environment, or a publishing/media/communications environment.

(k) None of the above

Topics Covered

1. Students will understand the history behind the development of the Internet.
2. Students will be able to create a multi-page website using HTML, CSS and Javascript.
3. Students will be able to create a website using a structured process that consists of defining requirements, creating a mockup, and coding the final website using the visual design components of Typography, Color, and Composition.
4. Students will be able to select the most appropriate image file format for use online.
5. Students will be able to use Linux commands to manage files and folders on a web server.
6. Students will be able to use SFTP/FTP to upload and download files to a web server.
7. Students will be able to demonstrate website usability concepts by designing a navigation menu for a website.
8. Students will be able to demonstrate information architecture principles by designing a website home page.
9. Students will be able to define basic terminology used by web page analytics tools such as Google Analytics.
10. Students will be able to explain the architecture behind the processing of how web pages are accessed and transmitted across the Internet.

**Grading**

**Grading Category Weights**

- Project(s): 20%
- Mid-Term Exam: 30%
- Final Exam: 30%
- Homework: 10%
- Work Participation: 10%

**Grading Scale**

- A: 90 - 100
- B+: 86-89
- B: 80 - 85
- C+: 76-79
- C: 70 - 75
- D: 60 - 69
- F: 0 - 59

Incompletes are only given for extenuating and documented medical, or personal issues.

**Project Rubric**

The project is broken up into four separate parts totaling 20% of your final grade. Each of the four parts is graded on a scale of 0-100. Each part is worth 5% of your total grade. Make sure you complete and submit all parts on time.

**Homework Rubric**

You are expected to complete all of your homework assignments. The following grades will be given for each homework assignment.

- **3 – Above Average Performance** – Thoughtful Visual Design and/or Technically Advanced. All requirements are met.
- **2 – Average Performance** – Demonstrates all major requirements.
- **1 – Below Average Performance** – Submitted with obvious technical and/or visual deficiencies.
0- **Non-passing Performance** – Assignment submitted but did not meet minimum requirements

**Blank in Moodle** – no submission. No assignment credit. Work participation grade is also lowered.

**Late Project Policy**

All projects and assignments must be turned in on time, or no credit is given.

**Work Participation and Attendance**

Attendance will be taken for each class meeting and is important for you to gain the most from this course. This course is offered face to face in order for you to gain the most understanding of the material and to be able to ask questions in real-time. Attendance will be used to determine the higher or lower of two grades when you are between grade cutoffs such as above 85 but not fully 86. The more classes you attend, the better chance you have of gaining the higher grade.

Work Participation is worth 10% of your final grade. Many people, including the course coordinator worked for a long time as a consultant that was home-based. Customers only knew me from the work I handed to them on time. My customers did not accept excuses for late work. In order to better prepare you for the many work places which work on a results basis with flexible hours and attendance policies, I put the weight of this grade into your results, not just sitting in a seat. That said, if you have a life situation that needs to be taken into account for your performance, please see me. Medical excuses must go through the Dean of Students office.

Any missing homework assignments, A01-A15, go against your work participation grade. Missed homework assignments not only get a zero for the assignment but also a lowering of your work participation grade. This is how I calculate your participation grade:

\[
(Number \ of \ assignments \ attempted \ / \ Number \ of \ total \ assignments \ * \ 10)
\]

With this formula, the proportion of the work you attempt is considered your participation. Do not miss assignments. They must be on time or no credit is given.
Academic Integrity Policy

My expectation is that each person will complete original work for this course and will not copy from fellow students or tutorials online. It is OK to refer to tutorials online; however, you will be considered in violation of the NJIT honor code by submitting work found online. Any violations of the honor code will be referred to the Dean of Students for investigation and possible disciplinary action.

THE INSTRUCTOR RESERVES THE RIGHT TO REQUIRE REMOTE EXAM PROCTORING SOFTWARE SUCH AS RESPONDUS.

For more information about the NJIT honor code, you should refer to this document:

http://www.njit.edu/doss/code-student-conduct-article-11-university-policy-academic-integrity/

Class Communication Space/Learning Management System

We will be using Moodle, an open source Learning Management System at NJIT, for the posting of projects and class resources and other class announcements are postings. Students having questions on projects, etc., may contact Dr. Hendela directly at ahh2@njit.edu or, if the answer would benefit the class, post the question in the appropriate forum within Moodle. Students are obligated to log into Moodle on a near-daily basis, and to keep current. DO NOT use the Moodle Message feature. It does not give your name or class section. I cannot respond to these messages. Email me instead.
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<thead>
<tr>
<th>Week Assigned</th>
<th>Lecture/Homework</th>
<th>Due Date</th>
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<tbody>
<tr>
<td>Sep 3</td>
<td><strong>1. History of the Internet</strong></td>
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<tr>
<td></td>
<td>A01. Create an account on Code Academy</td>
<td>Sep 13</td>
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<td>A02. History of the Internet - Timeline</td>
<td>Sep 20</td>
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<td>P1. Project - 1st Step</td>
<td>Oct 25</td>
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<td>P2. Project - 2nd Step</td>
<td>Nov 8</td>
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<td>P3. Project - 3rd Step</td>
<td>Nov 22</td>
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<td>P4. Project – 4th Step</td>
<td>Dec 11</td>
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<td>Sep 10</td>
<td><strong>2. How the Internet Works</strong></td>
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<td>A03. Create an Infographic for browsing a secure web page</td>
<td>Sep 27</td>
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<td>A04. Complete the Code Academy course</td>
<td>Sep 27</td>
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<td>Sep 17</td>
<td><strong>3. Gentle intro to HTML and CSS - Murach Chpt 1</strong></td>
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<td>A05. Getting your feet wet - HW assignment CH1</td>
<td>Oct 4</td>
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<td>Sep 24</td>
<td><strong>4. Linux and Basic HTML &amp; CSS - Murach Chpt 2</strong></td>
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<td>A06. Edit your first web page</td>
<td>Oct 11</td>
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<td>A07. How to code, test, and validate a web page</td>
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<td>Oct 1</td>
<td><strong>5. Website design guidelines, methods, and procedures – Murach Chpt 18</strong></td>
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<td>Oct 8</td>
<td><strong>6. How to use HTML to structure a web page - Murach Chpt 3</strong></td>
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<td>A08. Chapter - 3 - HW Assignment - Main</td>
<td>Oct 25</td>
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<td>A09. Create an HTML page for a speaker</td>
<td>Oct 25</td>
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<td>Oct 15</td>
<td><strong>7. How to use CSS to format the elements of a web page - Murach Chpt 4</strong></td>
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<td>A10. Unit 7 - HW Assignment</td>
<td>Nov 1</td>
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<td>Week Assigned</td>
<td>Lecture/Homework</td>
<td>Due Date</td>
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<td>Oct 22</td>
<td>8. How to use the CSS box model for spacing, borders, and backgrounds - Murach Chpt 5</td>
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<td>A11. Applying techniques learned using the CSS box model for spacing, borders, and backgrounds</td>
<td>Nov 8</td>
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<td><strong>Mid Term</strong></td>
<td>Oct 27-29</td>
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<td>Oct 29</td>
<td>9. How to use CSS for page layout - Murach Chpt 6</td>
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<td>A12. How to use CSS for page layout</td>
<td>Nov 15</td>
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<td>Nov 05</td>
<td>10. How to work with lists and links - Murach Chpt 7</td>
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<td>A13. Unit 10 – Chapter 7 Murach - HW</td>
<td>Nov 22</td>
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<td><strong>Last date for withdrawal</strong></td>
<td>Nov 6</td>
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<td>Nov 12</td>
<td>11. Responsive Web Design, Javascript and Cookies - Murach Chpt 8</td>
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<td>A14. Unit 11 - HW Create and Display Cookies</td>
<td>Nov 29</td>
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<td>A15. Unit 11 - Chapter 8 Murach - HW - Media Queries</td>
<td>Nov 29</td>
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<td>Nov 19</td>
<td>12. (11/19) Images - Murach Chpt 9</td>
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<td>Nov 26</td>
<td>13. Project Workshop</td>
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<td>Dec 3</td>
<td>14. Fonts and Printing - Murach Chpt 13</td>
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<tr>
<td>Dec 10</td>
<td><strong>Final Exam</strong></td>
<td>Dec 15-17</td>
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