Concordia University
SOEN 287: Web Programming (3 Credits)
Winter 2023
Course Outline/Syllabus

Section	Instructor	Contact	Office
S.	B. Molokwu.	bonaventure.molokwu@concordia.ca 514-8482424 ext 4786	H961-23
U,W	Y. Yan	yuhong.yan@concordia.ca tel: 514-8482424 ext 8715 (forward to cell phone)	ER1147 (Coordinator) Office hour: Tuesday, Thursday 10:30 - 12:00 (from 2nd week)

Tutorial TA Contact

Section	TA for tutorials	Email	Phone
WA, WD	Amarta Lohana	ammielohana@gmail.com	
UA, UC	Amarta Lohana	ammielohana@gmail.com	
UB, UD	Yash Patel	ycpatel1999@gmail.com	
WB, WC	Zaedul Islam	islam.zaedul@gmail.com	
Marker	Mostafa Sharifzadeh	mostafasharifzade@gmail.com	
Marker	Pouria Pirian	pouriapirian1993@gmail.com	

Individual instructor's office hours are posted on each section's course Moodle web pages accessible via the portal. Please check https://www.concordia.ca/ginacody/students/course-schedules/winter-2022-2023.html for the course schedule, including tutorial time.

Background Knowledge

Prerequisite: COMP 248 Oriented Programming I.
You should have basic programming skills; in particular, you should have a good understanding of expressions, statements, methods, parameters, and arrays. You are assumed zero background on Web programming.

Course Calendar Description

Internet architecture and protocols. Web applications through clients and servers. Markup languages. Client-side programming using scripting languages. Static website contents and dynamic page generation through server-side programming. Preserving state (client-side) in web applications. Lectures: three hours per week. Tutorial: two hours per week.

Course Objectives and Content

This is an introduction course on Web programming.

The course will include discussions and explanations of the following topics: Internet architecture and protocols; Web applications through clients and servers; markup languages; client-side programming using scripting languages; static website contents and dynamic page generation through server-side programming; preserving state in Web applications.

Please notice that Web programming and Web application is a very wide domain. Many techniques are used to build a complex online business system. The following topics are NOT covered in this course, but in some other courses:

- J2EE, JSP, Servlet, (SOEN 387), Web services (SOEN 487)
- Security (SOEN 321)
- Enterprise level systems and applications (SOEN 387, SOEN 487)
- Database and SQL(COMP 353)

Course Learning Outcomes (CLO)

Upon successful completion of this course, students will be able to:

CLO 1. Have gained factual knowledge on Web site development.
CLO 2. Be able to analyze and evaluate different technical solutions when developing a Web site and apply the learned techniques properly.
CLO 3. Be able to cultivate creative and innovative ideas when developing Internet applications.

CEAB Attribute Assessment

As part of either the Computer Science or Software Engineering program curriculum, the content of this course includes material and exercises related to the teaching and evaluation of graduate attributes. Graduate attributes are skills that have been identified by the Canadian Engineering Accreditation Board (CEAB) and the Canadian Information Processing Society (CIPS) as being central to the formation of Engineers, computer scientists and information technology professionals.

As such, the accreditation criteria for the Software Engineering and Computer Science programs dictate that graduate attributes are taught and evaluated as part of the courses.

The following is the list of graduate attributes covered in SOEN 287, along with a description of how these attributes are incorporated in the course:

- **Knowledge-base:** Internet architecture and protocols. Web applications through clients and servers. Markup languages. Client-side programming using scripting languages. Static website contents and dynamic page generation through server-side programming. Preserving state (client-side) in web applications. (CLO 1)
- **Design:** Design and implementation of web-based systems using different basic architectures and design principles. (CLO 2)
- **Use of Engineering tools:** Use of appropriate software development tools and languages to develop web applications both on client and server side. (CLO 3)

Required Text Book

Programming the World Wide Web by Robert W. Sebesta, 8th edition, Pearson, 2014. The book is available in 2 formats:

- Hard Copy: ISBN: 978-0-13-377598-3
- Digital Copy: ISBN: 978-0-13-377612-6

Computing Facilities

You should obtain a computer account, if you don't already have one, from the help desk at H-960 or EV-007.182. For more information on CSE Computer accounts please visit the website: *http://www.encs.concordia.ca/helpdesk/access.html*.

Tutorials

Tutorials will take place every week starting from the second week. Tutorial attendance is strongly encouraged. The tutorials will reinforce the material seen during the lectures with examples and practical exercises.

Assignments/Examinations

a) Assignments.

There will be 3 assignments. The assignments are done individually. The assignment descriptions are made available on the course webpage. All assignment questions must be downloaded from the course Moodle web page and submitted electronically to Moodel. Instructions on submitting assignments will be available on the course web page. The assignment schedule can be found in the tentative course schedule on page 5 of this handout.

Please Note:

- No late assignments will be accepted.
- Assignment submitted in the incorrect location and/or not in the proper format will **not** be considered.

b) Examinations

- Midterm Exam: There will be one term test in week 8. The test will take place during regular lecture times. **There are no make-up term tests**.

- Final Examination: The final examination lasts two hours, and will be administered during the examination period at the end of the term. The final examination covers all material seen during the term.

Evaluation Scheme

3 Assignments	20%	(6%, 7%, 7%)
1 Term Test	35%	
1 Final Exam	45%	

1. In order to pass the course, you must pass the final exam by getting over 50% of the marks, regardless of your grade in other required components, submit at least 60% of the assignments, and attend both the midterm tests and the final exam.
2. There is no standard relationship between percentages and letter grades assigned.
3. Although we encourage discussion of the assignment questions among students, you should be aware of the University regulations concerning plagiarism described in 16.3.13 of the undergraduate Calendar. All students should become familiar with the University's Code of Conduct located at http://www.concordia.ca/students/academic-integrity/code.html .
   In cases where cheating or plagiarism is suspected, the case will be forwarded directly to the appropriate university office for consideration. Please do not assume that you get "second chances" when it comes to cheating. Once is often enough to damage your academic career.

How to study in this course:

- If certain concepts are unclear to you, seek help right away. Ask your TA during the tutorial and/or your instructor for help. Make use of your instructor's office hours; book an appointment with your instructor if the office hours are not suitable.
- Programming is not a "spectator sport". You need to get your hands dirty by trying the examples discussed in class and doing the assignments.

Note from University Administration

"In the event of extraordinary circumstances beyond the University's control, the content and/or evaluation scheme in this course is subject to change".

Special Needs:

If you have any special needs please contact your instructor to arrange a time to discuss the situation.

Academic Support:

If you are experiencing difficulties that are affecting your studies, Concordia offers many on-campus free of charge services. You can find a list of resources at the Student Success Centre Website: http://www.concordia.ca/students/success.html

TENTATIVE SCHEDULE

The list below provides a summary of the material that will be covered during the course as well as a *tentative* schedule. Please check course webpage for any changes.

Week	Week of	Chapter	Topics	Notes and Events
1	Jan. 10, 11	1, 2, 3	Fundamentals, HTML, CSS	term starts from Jan 9
2	Jan. 17, 19	1, 2, 3	Fundamentals, HTML, CSS	Tutorials Starts
3	Jan. 24, 26	2, 3	HTML, CSS	
4	Jan. 31, Feb 2	3, 4	JavaScript	
5	Feb. 7, 9	4, 5	JavaScript	
6	Feb. 14, 16	5	JavaScript	Assignment 1 due
7	Feb. 21, 23	5	Dynamic HTML with JavaScript	**Midterm Feb 23**
	Feb. 27 - Mar 3		Spring Break	
8	Mar. 7, 9	6	Dynamic HTML with JavaScript	
9	Mar. 14, 16	6	Dynamic HTML with JavaScript	Assignment 2 due
10	Mar. 21, 23	9	PHP: syntax	
11	Mar. 28, 30	9	form handling	
12	Apr. 4, 6	9	PHP: cookies, sessions	
13	Apr.11, 13	9	PHP: patterns, File I/O	Assignment 3 due
14				

Assignment handouts will indicate the exact due date.