

SSUI -Web Lab
05-633D - Fall 2015
Syllabus

Class

Monday 9:00am - 10:30am, NSH 3002

Instructor

Nathan Hahn - nhahn@cs.cmu.edu

Nathan's Office Hours:

TBD

Coordinator

Jen Mankoff - jmankoff@cs.cmu.edu

Jen's Office Hours:

Monday and Wednesday 12:00-12:30pm, NSH 3612E

Thursday 11:30-12:30am, NSH3612E

Website: <http://nhahn.org/SSUI-Web-2015/>

Lab Description

In this lab, we will apply the principles learned in SSUI through a series of lectures, demonstrations, and hands-on projects using HTML and JavaScript.

There is no textbook for this class. All the class materials will be on the website. If you are interested in learning JavaScript by yourself in your leisure time, I recommend David Flanagan's "JavaScript: The Definitive Guide" (\$25ish Amazon used, big comprehensive reference) and Doug Crockford's "JavaScript: The Good Parts" (\$15ish Amazon used, quicker tips). This StackOverflow link (<http://stackoverflow.com/questions/11246/best-resources-to-learn-javascript>) has more resources recommended by others.

Grading / Projects (Tentative)

Grades for this lab will tentatively be assigned based on the projects.

Lab is 40% of your final class grade.

All projects are due at 9:00AM on the due date except P4

P0 (10% of grade): writing some basic functions. Fibonacci and stuff. Just to make sure you've got the basics. Part 1 due Sept 9, Part 2 due Sept 14

P1 (15% of grade): Make a sliding puzzle game. Part 1 due Sept 21, Part 2 due Sept 28

P2 - (20% of grade): Make a drawing library, then create something sort of like a Google doodle. Part 1 due Oct 5, Part 2 due Oct 14

P3 - state machines and input (20% of grade) Build a general finite state machine, then use : Part 1 due Oct 26, Part 2 due Nov 2

P4 - your own project (35% of grade): Description Due Nov 9, Project Due Dec 4

Rules

Work individually. You can discuss general concepts with other students, but you can't work together. You must document any help that you got on any of these assignments. If you really want an exception to work with someone on something, or have questions about appropriate collaboration, discuss it with me.

We follow the CMU Policy for Academic Integrity:

<http://www.cmu.edu/policies/documents/Academic%20Integrity.htm> and will follow the

Academic Disciplinary Actions as outlined here, if necessary:

http://www.cmu.edu/student-affairs/theword/acad_standards/creative/disciplinary.html

Attendance

Attendance is required on the P4 presentation day, or 5% will be deducted from your final grade. Other days, we expect you to come to class. If you're a little more advanced, your presence will be helpful to those who are not so advanced. Also, it's hard to tell what you'll miss if you don't attend.

Late Policy

Be on time. Each day (24 hrs) late 10% will be deducted from your assignment grade.

Tentative Class Schedule (subject to change)

Aug 31	Course Intro, JavaScript basics	P0 assigned
Sep 7	Labor Day	P0 part 1 due (9/9)
Sep 14	HTML and CSS	P0 due , P1 assigned
Sep 21	The DOM, jQuery, Debugger	P1 part 1 due
Sep 28	Closures, Objects and Prototype	P1 due , P2 assigned
Oct 5	HTML Canvas	P2 part 1 due
Oct 12	Callbacks & events	P2 due (10/14)
Oct 19	Input & FSMs	P3 assigned
Oct 26	AJAX	P3 part 1 due
Nov 2	Server-side development	P3 due , P4 assigned
Nov 9	SASS, ES6, and Promises	
Nov 16	Frameworks (Angular, Backbone)	
Nov 23	Dependency Injection and Testing	
Nov 30	TBD*	
Dec 4	P4 Presentations	P4 due 8pm

* Possible topics are: Visualization libraries (ex. d3), CSS3 animations, Web accessibility ...