DESIGNING HUMAN CENTERED SOFTWARE (DHCS)

05-391 / 05-891
Fall 2015

Course Instructor:	Chris Harrison
Email:	chris.harrison@cs.cmu.edu
Class Time:	Tuesday/Thursday, 1:30-2:50
Class Location:	300 S. Craig Street, room 172
Chris' Office:	407 S. Craig Street, room 218
Office Hours:	Thursday, 1-2pm
Teaching Assistant:	Samantha Finkelstein (mailto:slfink@cs.cmu.edu)

1   DESCRIPTION

Why are things so hard to use these days? Why doesn't this thing I just bought work? Why is this web site so hard to use?

These are frustrations that we have all faced from systems not designed with people in mind. The question this course will focus on is: how can we design human-centered systems that people find useful and usable? This course is an introduction to designing, prototyping, and evaluating user interfaces. If you take only one course in Human-Computer Interaction, this is the course for you.

This class is open to all undergrads and grad students, with either technical or non-technical backgrounds. We will cover theory as well as practical application of ideas from Human-Computer Interaction. Course work includes lectures, class discussion, homework, class presentations, and group projects.

2   ATTENDANCE

A good portion of the learning in any upper level class comes from intelligent discussion involving the instructor and the students. If you don't attend class, you cannot participate, and your performance in the class will reflect that.

First, rather than taking attendance, there will be pop quizzes and also artifacts collected at the end of class that were generated from in class activities.

Second, don't use laptops in class. Everyone thinks they can multi-task. The research strongly suggests otherwise.

3   PROJECTS

The bulk of the work in this class will be a series of group projects, comprised of an interdisciplinary group of 4-5 people. Each project will go thru an iterative human-centered process, with each phase having a report, culminating in a presentation.

4   GRADING

Homework is due 11:59pm the day <u>before</u> class starts. Each day late will result in a 10% deduction (maximum 50% off).

Cheating and plagiarism will not be tolerated. Students caught cheating or plagiarizing will receive no credit for the assignment on which the cheating occurred. Additional actions -- including assigning the student a failing grade in the class or referring the case for disciplinary action -- may be taken at the discretion of the instructors. Please note that Blackboard has automated plagiarism detection built in now, so please don't cheat or turn-in uncited work.

Your final grade in this course will be based on:

- In-class activities   20%
- Pop quizzes   20%
- Homeworks   30%
- Bakeoffs   30%

5   INCOMPLETES

It is the policy of this class not to give incompletes. Several assignments have in-class components, so you will need to have each one finished on time.

6   TENTATIVE SEMESTER SCHEDULE

Week 1: Intro, HCI History
Week 2: Ideation & design process
Week 3: Prototyping
Week 4: Prototyping cont.
Week 5: Observation 1 and Evaluation 1
Week 6: Bakeoff 1 and Humans 1
Week 7: Evaluation cont.
Week 8: Visual Design 1 and Humans 2
Week 9: Spring break
Week 10: Visual Design 2 and Bakeoff 2
Week 11: Observation 2 and Humans 3
Week 12: Evaluation 3 and Bakeoff 3
Week 13: HCI special topics (e.g., Machine learning, computer vision, wearable computing)
Week 14: HCI special topics
Week 15: HCI special topics

No final exam, but there will be final presentations on the scheduled final examination date. Attendance is mandatory.