

# CIS\*3150 F16 (0101) Theory of Computation

## Course Outline

## CIS 3150 Course Outline (Fall 2016)

School of Computer Science University of Guelph

Instructor: Joe Sawada
Email: jsawada@uoguelph.ca

Office: Reynolds 217

Office hours: Tues 11:00-12:30 Thurs 11-12

Website: courselink

Lectures: Tues/Thur 8:30-9:50 in ROZH 105

TA office hours: TBD

#### NO Labs!

**Course Description:** This course explores the theory of computation including automata theory, Turing machines and their variants, formal languages, parsing, the Halting problem, undecidability, and NP-completeness.

**Required Text:** Sipser, Introduction to the Theory of Computation, 2nd Edition (or 3rd). http://www-math.mit.edu/~sipser/book.html

Grading Scheme: 30% Assignments -- 10% Quizzes -- 20% Midterm -- 40% Final

### **Important Dates:**

- Thu Sept 8: First day of class
- Thu Sept 22: Assignment 1
- Thu Oct 6: Assignment 2
- Thu Oct 13: Midterm
- Thu Oct 27: Assignment 3
- Tue Nov 15: Assignment 4
- Thu Dec 1: Assignment 5 (last day of class)
- Tues Dec 13: Final 2:30 PM 4:30 PM

Quizzes: There are 11 quizzes (one due each Sunday 11:59pm), the top 10 of 11 quizzes will be counted.

**Assignments:** Each assignment is worth 6% of your final mark, and is due at the START of class on the day it is due. See policies below.

**Policy on Lateness, Absence and Extensions**: Late assignments will generally not be accepted. In the case of a missed test, a mark of zero will be recorded. No make-up test will be provided. Only in exceptional circumstances will requests for extensions for assignment deadlines or excuses for missed tests be entertained. Any such request must be presented to the course instructor (not a TA) with all supporting documentation as soon as possible. The sole remedy available in exceptional circumstances for missed tests is redistribution of its weight to other components.

**Policy on Collaboration**: You are expected to work on each problem on your own and present your own solution. You may use the textbooks, notes, lectures, instructors, tutors and classmates to help you find general strategies to solve the problems, but you may not go out and find complete solutions to the problems. You may discuss the strategies to solve these problems with your fellow students, but you may

not discuss complete solutions. You cannot take written notes or solutions away from a discussion with another student. Using other people's work or solutions, whether cited or not, is considered plagiarism and carries stiff academic penalties. If you are unsure whether an activity may constitute plagiarism or undue collaboration, consult the instructor immediately.

Acceptable Use Policy: http://www.uoguelph.ca/web/aupg

University Policy on Academic Misconduct: See Section VIII of Undergraduate Calendar