Course Information CSC B63H3 S: Design and Analysis of Data Structures Section L01S — Winter 2007

Instructor

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Web Site http://www.cs.utoronto.ca/~krueger/cscB63h/

The web site is the primary source of information about the course, including assignments, notes, marks and announcements. You are responsible for all announcements posted to the course web site, so please check it regularly.

Lectures

Mondays and Wednesdays, 1:10pm-2:00pm in room SW 309

Tutorials

Mondays, 2:10pm-3:00pm or 3:10pm-4:00pm in AC 334 (First tutorial on **January 8**)

Attendance in tutorials is as mandatory as attendance in lectures. Formal attendance is not taken in either venue; however, there will be new material that is presented only in tutorials (and not in lectures) for which you are responsible and on which you may be tested in homework or exams.

Required Textbook

Cormen, Leiserson, Rivest & Stein, Introduction to Algorithms (2nd edition). MIT Press and McGraw-Hill (2001), ISBN: 0-262-03293-7

Online access to this text is available free to UofT students through the library website at http://main.library.utoronto.ca/eir/resources.cfm

Course Topics

Design, analysis, implementation and comparison of efficient data structures for common abstract data types. Priority queues: heaps and mergeable heaps. Dictionaries: balanced binary search trees, B-trees, hashing. Amortization: data structures for managing dynamic tables and disjoint sets. Data structures for representing graphs. Graph searches.

Prerequisites: CSCB07H & CSCB36H & STAB52H & [CGPA 2.5 or in CSC POSt]

Marking Scheme and Schedule

Item	Weight	Dates
5 assignments	40% (8% each)	Jan 31, Feb 14, Mar 7, Mar 21, Apr 4
Midterm test	15%	week of Feb 28
Final exam	45%	April 14–May 1

Note: To pass the course, students must obtain a minimum mark of 40% on the final exam.

Course Policies

Homework: Each homework assignment will consist of a written "pencil-and-paper" component and a programming component. Assignments are due at the beginning of class on the date specified. The written portion should be submitted directly to the instructor; to prevent disruption, assignments will not be accepted after the first 5 minutes of class. The programming portion must be submitted electronically: paper printouts will not be accepted.

Group work: In each homework you may collaborate with at most one other student who is currently taking CSCB63H. If you choose to work with another student on a homework, you and your partner must submit only one copy of your solution (write both your names on the cover sheet of the written component and also include both names in the header of your program files you submit). The solution will be graded in the same way whether it was completed alone or with a partner. Collaboration involving groups of more than two students is not allowed.

It is critically important that both group members understand every problem. A divideand-conquer approach is a poor idea as it will leave members at a distinct disadvantage in learning the material and passing the exams. Instead, plan to work out the problems together, discussing it until you agree on a solution.

Consultation: For help with your homework you may consult only the instructor, TAs, your homework partner (if you have one), your textbook and your class notes. You may not consult any other source! In particular, you may not use the Internet to research the problems.

Lateness, Absence and Extensions: Late assignments will 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 request for special consideration must be presented to the course instructor (not a TA) with all supporting documentation as soon as possible. For medical excuses, only the official UTSC medical certificate will be accepted.

Remarking: Any dispute over the grading of an assignment or test should be stated in writing (using the form on the website) and submitted along with the original copy of your work.

Plagiarism and Academic Honesty

The work you submit must be your own and cannot contain anyone else's work or ideas, without proper attribution. Plagiarism is a form of academic fraud and is treated very seriously.

Note that it is a serious offense to help someone commit plagiarism. Do not let others look at your solutions, even in draft form. If you are unsure whether an activity may constitute plagiarism or undue collaboration, consult the instructor immediately.

If you are having trouble with the course, come speak to us, that's why we're here!

Important Dates

Deadline to add S section courses: January 21, 2007 Deadline to drop S section courses: March 25, 2007 Last class: April 4, 2007

Final Examinations: April 14–May 1, 2007