CMPT 225 - D100 Data Structures/Programming

Instructor(s): Igor Shinkar

SFU Burnaby

Calendar Objective/Description:
Data Structures/Programming

Instructor's Objectives:
This course explores fundamental algorithms and data structures that can help in developing elegant and efficient solutions to complex problems. We will study their specification, analysis, implementation, experimental evaluation, and applications.

Prerequisites:
see go.sfu.ca

Topics:
- Object-oriented programming
- Abstract data types (ADTs)
- Data structures: lists, stacks, queues, trees, heaps, sets, hash tables, disk-bound data
- Algorithms: searching and sorting as well as time and space efficiency analysis of algorithms

Grading:
Grades for this course may be based on: programming assignments; lab activities; midterm exam; final exam, and participation. The exact details of the marking scheme will be given in the first week of the course.

Students must attain an overall passing grade on the weighted average of exams in the course in order to obtain a clear pass (C- or better).

Academic Honesty Statement:
Academic honesty plays a key role in our efforts to maintain a high standard of academic excellence and integrity. Students are advised that ALL acts of intellectual dishonesty will be handled in accordance with the SFU Academic Honesty and Student Conduct Policies (http://www.sfu.ca/policies/gazette/student.html).