

**DEPARTMENT OF COMPUTER SCIENCE
CALIFORNIA STATE UNIVERSITY, SAN BERNARDINO
SUMMER SESSION 2018**

Course Number:	CSE 330	Instructor:
Course Title:	Data Structures	Owen Murphy
Prerequisites:	CSE 202 or CSCI 202 or equivalent.	JBH 345
Units:	4	(909) 537-5408
Meetings:	12:00pm - 01:15pm TR (Lect) 01:30pm - 02:45pm TR (Lect) 03:00pm - 04:50pm T (Lab 1) 03:00pm - 04:50pm R (Lab 2)	murphy@csusb.edu
Office hours:	11:00am - 12:00pm TR	

OBJECTIVE:

The objective of this course is to continue to learn about computer software design, implementation, methods and environments using the high-level programming language C++. Brief surveys of computers, applications and other areas of computer science is also provided.

TEXT:

Mark Weiss, Data Structures and Algorithm Analysis in C++, 4th Ed. Pearson, 2014.

OUTCOMES:

- An ability to apply knowledge of computing and mathematics appropriate to the discipline.
- An ability to analyze a problem, and identify and define the computing requirements appropriate to its solution.
- An ability to design, implement, and evaluate a computer-based system, process, component, or program to meet desired needs.
- An ability to apply design and development principles in the construction of software systems of varying complexity.

REQUIREMENTS:

The course requirements are:

- (1) Midterm Exam, ~70 min, (35%)
- (2) Final Exam, 120 min, (35%)
- (3) 8 Laboratory Assignments (30%)

SOME RULES:

- Laboratory assignments are due the following week of the laboratory. If a lab assignment is submitted on time, a single revision may be submitted no later than week 10.
- Submitted laboratory assignments must include the source code and a test run of the program.

- Students are expected to treat each other with respect. Any activity that disrupts or interferes with another student's learning experience is a violation of this policy. There is a zero-tolerance policy for socializing during lectures.
- Students may work on lab assignments in teams of two. **Examinations of course must be individual work.**
- Students must take exams at the scheduled day and time.
- Students are responsible for **reading** the text book chapters on the material discussed in class.
- All students must enroll for the weekly lab sessions and participate regularly. Lab attendance is not optional.
- **No cheating!!** Cheating on an exam will result in 0 points (= F) for the exam. Cheating on the homework (e.g., copying from another student) will result in the score being split.

WEB SITE:

<http://cse.csusb.edu/murphy/cse330>

ACCOUNTS:

All students must have a valid computer account. If you do not have an account, an account will be created for you, and you will be told your password. After you have logged on for the first time (using the password assigned to you), immediately change the password to your very own using the `yppasswd` command.

GRADING:

Each *homework assignment* is worth 10 points. At the end, laboratory scores will be translated into a percentage of the total number of points. The class grade will be based on the weighted sum

$$\text{Class\%} = \text{Mid\%} \times .35 + \text{Fin\%} \times .35 + \text{Lab\%} \times .3$$

All % scores translate into letter grades as shown below:

Total Score in % Grade		
-----+-----		
100 - 94		A
93 - 90		A-
89 - 85		B+
84 - 75		B
74 - 72		B-
71 - 67		C+
66 - 57		C
56 - 52		C-
51 - 49		D+
48 - 44		D
43 - 41		D-
40 - 0		F

TOPICS:

(This schedule may be subject to change)

Session 1: Review of C++ (Chapt 1)
 Session 2: Complexity (Chapt 2)

Session 3: Implementing Vectors (Chapt 3)

Session 4: Implementing Lists (Chapt 3)

Session 5: Review

-----> **MIDTERM EXAM** <-----

Session 6: Implementing Trees (Chapt 4)

Session 7: Implementing Sets and Maps (Chapt 4)

Session 8: Hashing (Chapt 5)

Session 9: Searching and Sorting (Chapt 7)

Session 10: Review

-----> **FINAL EXAM** <-----

ACADEMIC HONESTY: According to the CSUSB Catalog of Programs, plagiarism and cheating may result in penalties up to and including expulsion. Students are allowed and encouraged to discuss the material related to assignments, however writing down the solutions must be done individually. Exchanging solutions or parts of solutions is not allowed. When it comes to the attention of a student that possibly dishonest behavior took place, he or she should report it to the instructor. At the very least cheating on an assignment will result in a grade of zero.

ACADEMIC POLICIES: The student is referred to “Academic Regulations and Procedures” in the CSUSB Bulletin of Courses for the universitys policies on course withdrawal, cheating, and plagiarism.

DISABILITIES: If you are in need of an accommodation for a disability in order to participate in this class, please contact the instructor and the Services to Students with Disabilities at UH-183, (909) 537-5238. It is the student’s responsibility to seek academic accommodations for a verified disability in a timely manner.