UTD Course Syllabus

Course Information:

- Course Number: CS/CE/TE 2336, Section 005 (M/W 1:00pm 2:15pm, GR 2.302)
- Course Title: Computer Science II
- Credit Hours: 3
- Term: Fall 2016

Professor and TA Contact Information:

- Name: Anjum Chida
- Phone: (972) 883-2185
- Office Location: ECSS 4.230
- Office Hours: M/W 2:30 pm 3:50 pm; T/Th 1:00 pm 2:20 pm (or by appointment)
- Email: anjum.chida@utdallas.edu
- TA: TBD

Course Pre-Requisites, co-requisites, and/or other restrictions:

- Prerequisites: CE 1337 or CS 1337 or TE 1337 with a grade of C or better.
- Prerequisite or co-requisite: CE 2305 or CS 2305 or TE 2305 with a grade of C or better. (Same as CE 2336 and TE 2336) (3-0) S

Course Description:

Further applications of programming techniques, introducing the fundamental concepts of data structures and algorithms. Topics include recursion, fundamental data structures (including stacks, queues, linked lists, hash tables, trees, and graphs), and algorithmic analysis. Includes comprehensive programming projects. Programming language of choice is Java.

Student Learning Objectives/Outcomes

- 1. Ability to implement recursive algorithms
- 2. Ability to implement linked lists, stacks, and queues
- 3. Ability to implement a binary tree
- 4. Ability to use hash tables and graphs
- 5. Ability to understand algorithmic analysis
- 6. Ability to create a comprehensive programming project

Required Textbooks and Materials

- Introduction to JAVA Programming, 10th Edition, Y. Daniel Liang, Prentice Hall. ISBN 978-0133761313

- Extra material may be posted on eLearning

Assignments & Academic Calendar

Class	Date	Material Covered	Major Topics	
1, 2	Aug 22, 24	Introduction, Chapter 1, 2 & 3	Introduction & Elementary Programming	
3, 4	Aug 29, 31	Chapter 4, 5 & 6	Selection, Mathematical Functions Loops & Methods	
5, 6	Sep 5*, 7	Chapter 7 & 8	Holiday Arrays	
7, 8	Sep 12, 14	Chapter 9 & 10	Objects and Classes	
9, 10	Sep 19, 21	Chapter 11 & 12	Inheritance, Polymorphism & Exceptional Handling	
11,12	Sep 26, 28	Chapter 13	Abstract Classes and Interfaces	
13	Oct 3	Review		
14	Oct 5	Exam 1		
15, 16	Oct 10, 12	Chapter 17, 18 & 19	Recursion Generics	
17, 18	Oct 17, 19	Chapter 20 & 21	List, Stacks, Queues, Priority Queues, Sets and Maps	
19, 20, 21	Oct 24, 26, 31	Chapter 22 & 23	Sorting Algorithmic analysis	
22,23, 24	Nov 2, 7, 9	Chapter 24	Implementations	
25, 26	Nov 14, 16	Chapter 25 & 27	Binary Search Tress and Hash Tables	
Thanks Giving Holiday Nov 21 -25				
27, 28	Nov 28, 30	Chapter 28 & 29	Graphs	
29, 30	Dec 5, 7		Review	
TBD		Final Exam / Exam 2		

Tentative Test Dates:

Exam 1: October 5th

Exam 2: TBD

Grading Policy:

The grade will be determined as described below. No other bonus work, make-up work, dropped scores, or other means of raising your grade should be expected. At the end of the semester, it is possible that grades may be curved, but a curve should not be expected.

Exam 1	25%
Exam 2	35%
Class Participation & Quizzes	10%
Assignment Average	15%
Term Project	15%

Letter grades are determined using the standard 10-point range for each letter, then dividing this range into three equal parts to determine the +/- designation.

Attendance Policy:

Attendance will be taken in class. Missing three consecutive classes without approval by the instructor will automatically result in one letter grade drop and missing four consecutive classes will result in F in class.

Course & Instructor Policies:

Assignments and projects must be turned in on time. Each day late will result in a deduction of 10 % of points. It is your responsibility to upload your work early enough to avoid possible problems uploading to eLearning. It is your responsibility to ensure that you have submitted the correct items. It is recommended that you double-check your submission to ensure it is correct.

Exams must be taken on time. Exceptions require advance approval by the instructor. It is up to the instructor to determine whether an exception will be made, and will depend largely on proof of extraordinary circumstances. Otherwise, a missed exam will either incur a substantial penalty or be recorded as a zero.

Exams have time limits. Students who continue to write on the exam after time is called or who start writing before the exam begins are subject to a penalty.

Students are expected to attend all class lectures. If absent, the student is still responsible for any material covered or anything said which the student missed.

All assignments, projects and exams are to be individual efforts. You are not to collaborate with other students, or to discuss solutions with other students prior to submission. Copying of assignments, projects and exams, in whole or in part, from other students in this semester or previous semesters will be considered to be an act of scholastic dishonesty.

Grades are not based on needs or consequences, but are based only on performance.

UT Dallas Syllabus Policies and Procedures

The information contained in the following link constitutes the University's policies and procedures segment of the course syllabus.

Please go to http://go.utdallas.edu/syllabus-policies for these policies.

These descriptions and timelines are subject to change at the discretion of the Professor.

Syllabus Addendum

Each student in this course is expected to exercise independent scholarly thought, expression and aptitude. This addendum to the course syllabus is provided to assist you in developing and maintaining academic integrity while seeking scholastic success.

General Comments:

- All academic exercises (including assignments, essays, laboratory experiments and reports, examinations, etc.) require individual, independent work. Any exception(s) will be clearly identified.

- Be sure your name or identifying number is on your paper.

- Complete and turn in academic exercises on time and in the required format (hardcopy, electronic, etc.).

- Retain confirmation of document delivery if submitted electronically.

- Retain all research notes and drafts until the project or assignment has been graded.

- Obtain written authorization from your instructor prior to submitting a portion of academic work previously submitted for any academic exercise. (This includes an individual or group project submitted for another course or at another school.)

Essays and Significant Papers:

Be prepared

- To present periodic drafts of work in process

- To correctly and completely reference all sources of information using the citation format prescribed

- To turn your completed assignment in timely and in the prescribed manner (electronic, hardcopy, etc.)

Examinations:

Be prepared

- To leave all personal belonging at the front of the room or other designated location (this includes cell phones, turned off of course, and beverage containers)

- To present your UTD Comet Card
- To remove your cap or hat
- To remove the batteries from any electronic device (e.g. calculator)
- To change seating
- To sign out when exiting the testing room
- To be escorted for lavatory use

All episodes of suspected scholastic dishonesty will be reported according to University policy. Students who violate University rules on scholastic dishonesty are subject to disciplinary penalties, including the possibility of failure in the course and/or dismissal from the University. Since such dishonesty harms the individual, all students and the University, policies on scholastic dishonesty will be strictly enforced. Penalties that may be assessed for scholastic dishonesty may be reviewed in *Subchapter D. Penalties* at http://www.utdallas.edu/student/slife/chapter49.html