Instructor: Professor LeRoy Hardy

Office: BLB 367C } Mon 5:00-6:20, Th 5:00 to 6:20 or by appointment

Email: LeRoy.Hardy@unt.edu

Phone: 940.369.8569

Homework Email: BCIS.3630.2Th6@gmail.com

TEXTBOOK: UNT Bookstore [Amazon or Voertmans if UNT Bookstore is out]

Starting Out with JAVA - CONTROL STRUCTURES THRU OBJECTS

7th Edition, by Tony Gaddis from Pearson ISBN-13: 978-0134802817 loose leaf

Do not get the Mylab edition - it costs more and we don't use it.

COURSE OBJECTIVES

This course is an introduction to business computer programming and design in a corporate environment. The primary focus is on the information systems function in support of corporate activities. Students will learn business problem solving using JAVA PROGRAMMING in both a microcomputer environment and on an IBM System Z Mainframe.

JAVA TOPICS COVERED

JAVA program types, creating an application, syntax, variables, literals and identifiers, methods, expressions, print, println. primitive data types, arithmetic operators, final, string class, dialog boxes, joptionpane, scope, scanner class methods, decision structures, if-else, relational operators, nested ifs, logical operators, precedence, switch and the case structure, printf method, selection, repetition, formatting, loops, while loop, nested loop, methods, passing arguments, local variables, classes, instance fields, constructors, overloading methods and constructors, scope of instance fields, packages, import statements, iteration, instance, string arrays, arrays of objects, arrays, loops, external classes, table/arrays, arraylist class.

TO SUCCEED IN THIS CLASS

- 1. Read the book! Exams come from the material covered in the Java book by Gaddis, as does the programming.
- 2. Take notes! Vocabulary words, Java commands, etc. Use your notes to do the programming. If you must go back to the book, then update your notes.
- 3. Do the assignments on your own. This helps you understand the concepts. Only discuss concepts with other students. Use the tutor or me for additional help. Ask questions in class.

Academic Integrity Standards and Consequences.

Student Academic Integrity, academic dishonesty occurs when students engage in behaviors including, but not limited to cheating - [such as copying JAVA CODE from other students' computer programs and turning that code in as their own work, or copying JAVA CODE that they find on the internet and turning it in as part of their own work] also fabrication, facilitating academic dishonesty, forgery, plagiarism, and sabotage. A finding of academic dishonesty will result in a range of academic penalties or sanctions ranging from negative points on homework assignments OR the semester grade of F in the course OR expulsion from the University.

Specifically, for BCIS 3630:

- a. I will report **any** cheating on exams to the Dean of Students, and you will receive a zero on the exam. The second instance of cheating on an exam will result in an F in the course.
- b. Even one line of code **from the internet** or **another student** is considered copying.
- c. The first time a student turns in copied code, they will receive a grade of -10 on that chapter's entire assignment. However, I will report you to the Dean of Students on the first occurrence for copying code from a Chegg-like website or another student who used Chegg. You do NOT have permission to send the assignments to a Chegg-like company or pay anyone to write your homework for you, and doing so will infringe on copyright laws and is considered unethical behavior by UNT. The assignments belong to UNT, not Chegg or YOU. A \$25 million company was handed over to another company because an employee stole the code to start the second company. Most companies do background checks, and it will not look good if you are convicted of copyright infringement or plagiarism in college.
- d. The second time a student turns in copied code, they will receive a grade of -20 on that chapter's entire assignment. At this point, you are in danger of failing the course because you received no credit for two assignments and lost 30 points from what few points you have left. If you use code from a Chegg-like website or have it written for you, you will receive an F for the course at this point.
- e. Any other act of academic dishonesty in BCIS 3630 will result in a semester grade of F.
 - If students are bright, they will NOT EVEN MENTION any java homework assignments in GroupMe. Because I know you will do this despite my instruction, you should keep your discussion to concepts and not specific solutions to a program. Someone might take your code and turn it in as their own, and both students get punished equally. **Do not give another student as much as a single line of code.**
- f. The department has changed the requirements of more advanced BCIS classes to making a B in this class. You are required to complete all of your 3630 homework assignments; otherwise, you will not be able to write your Java programs in BCIS 3680, the advanced Java course you are required to take. Therefore, I have increased the weight of the homework assignments so that you will not receive a B if you do not do them. Copying someone else's work and getting negative points will hurt you the most, followed by not turning in your assignments. Turn in what you've completed when it is due. I need to know that you can write a program in a programming class, and I'm trying to keep students from failing BCIS 3680.

COVID Policy statement

COVID-19 impact on attendance

While I expect you to attend class as outlined above, all of us must be mindful of the health and safety of everyone in our community, especially given concerns about COVID-19. Don't hesitate to contact me if you cannot attend class because you are ill or unable to participate due to a related issue regarding COVID-19. It is vital that you communicate with me before being absent about what prevents you from coming to class so I can decide about accommodating your request to be excused from class.

If you are experiencing cough, shortness of breath or difficulty breathing, fever, or any of the other possible symptoms of COVID-19 (https://www.cdc.gov/coronavirus/2019-ncov/symptomstesting/symptoms.html), please seek medical attention from the Student Health and Wellness Center (940-565-2333 or askSHWC@unt.edu) or your health care provider. While attendance is an essential part of succeeding in this class, your health and others in the community are more important.

All 3630 homework assignments go to the student grader, and NO COPY GOES TO THE INSTRUCTOR. Each 3630 student must keep all submission emails to the grader along with the receipt that the grader sends the student when they receive the assignment. Your email is the only proof of turning in your work in case of a dispute.

NO MAKEUP EXAMS WILL BE GIVEN IN THIS COURSE

The official UNT exceptions do apply, but only if you notify me at the BEGINNING of the semester. You must give me signed documentation from the University at the beginning of the semester. If not notified at the beginning of the semester - you will not be allowed a makeup exam.

For everyone else, if you miss an exam, I will give you 75% of the average grade you make on the other two exams.

EXAMPLE: If you make 90% and 80% on the two exams you take, I will give you 75% of the average of the two scores for a grade of 63.75%.

BE SMART AND SHOW UP FOR ALL 3 EXAMS OR YOU WILL BE **PENALIZED**

CLICK BELOW TO DOWNLOAD JAVA

https://www.oracle.com/technetwork/java/javase/downloads/jdk8-downloads-2133151.html

The Windows 64-bit version is at the bottom; the Mac 64 bit is in the middle of the Java SE Development Kit 8u311 section.

Create an account as a student and log in to get your java software. Use UNT as your company.

If you have a MAC, install as you usually install software Hints for PC installation of JAVA in Windows

Be CERTAIN to install JAVA in:

C:\Program Files\Java

Do not install it anywhere else !!!

If you mess up - uninstall it - and reinstall it.

REMEMBER - BE CERTAIN THAT YOU download and install Java ONLY in:

C:\Program Files\Java

*You may use ANY jdk1.8.0_01 ... _311 etc. INSTEAD OF jdk1.8.0_311

NEXT set the "Path"

Open Control Panel on your Windows Computer - [Start--->Control Panel, or type <u>Control Panel</u> in the Search]

Click the "System" (or maybe System and Security, then System)

Click the "Advanced system settings"

Click the "Environment Variables" button near the bottom of the box

In the "System variables" window, look for a variable named "Path"

Path tells software programs such as JGrasp where to find the "JAVA" executable file. Path variables are separated by a ';'.

Click on the "Path" variable under "System variables" and click Edit

Scroll to the bottom of the window (or you might have to click New) and type the following:

";C:\Program Files\Java\jdk1.8.0_311\bin; "

Please be extra careful that you add the text to the END of the current information that you see, and be sure that you type the ";" along with the rest of the information stated above.

Click OK

Next – set the CLASSPATH.

IF the "CLASSPATH" variable ALREADY EXISTS, do the following:

Click on the "CLASSPATH" [as you did with Path] and click Edit

Scroll to the bottom of the window and type the following:

";C:\Program Files\Java\jdk1.8.0_311\lib; "

Please be extra careful that you add the text to the end of the current information that you see, and be sure that you type the ";" along with the rest of the information stated above.

Click OK

IF the "CLASSPATH" variable DOES NOT EXIST, do the following:

Click the New button below the "System variables" dialog box

Type "CLASSPATH" in the Variable name field

Type the following in the Variable value field:

" C:\Program Files\Java\jdk1.8.0_311\lib; "

Click OK, OK, OK

For PC or MAC

CLICK THE LINK BELOW TO DOWNLOAD AND INSTALL THE **JGRASP IDE** program WHICH WE WILL USE TO RUN ALL OF OUR JAVA PROGRAMS:

http://www.jgrasp.org/

JGRASP software basics

- 1. Open the .java file you want to compile to run or debug it for logic errors.
- 2. Click the 'Toggle line numbers' ICON to turn on line numbering.
- 3. Click the 'Compile file' ICON to check for syntax errors. [fix any errors you find]
- 4. When you have NO syntax errors, click the 'Run application for current file' ICON.
- 5. If you still have a LOGIC error, set a breakpoint on the line where you want to start debugging and then click the 'Run debugger on current file' ICON.

Class Schedule

Class Schedule						
Jan 20	THIS IS A CRITICAL FULL 3 HOUR LECTURE – DO NOT MISS THIS CLASS Aptitude Test Instructions Lecture: Intro to Mainframe MAINFRAME PROBLEM ONE & TWO – [Logging in and editing on Sys Z] Installing TN3270 & FTP for mainframe Sys Z JAVA - Downloading and installing JAVA JDK					
	Setting PATH and CLASSPATH variables for JAVA in WINDOWS INSTALLING JGRASP FOR DEBUGGING JAVA Intro to Object-Oriented Programming					
27	Lecture over Gaddis Ch 1 & MF Prob Three Q&A MF Prob ONE & TWO Running JAVA Programs on Sys Z	Ethical Behavior due 1/31 MF Prob One due 1/28				
	Gaddis JAVA textbook Ch 1Terms Aptitude Test – last 70 minutes of class	No credit after Sat 1/29 8 am				
Feb 3	Lecture over Gaddis Ch 2 JAVA Fundamentals	MF Prob Two due 2/4 No credit after Sat 2/5 8 am				
10	Lecture over Gaddis Ch 3 Decision Structures Assign MF Prob 4	MF Prob Three due and JAVA One due 2/11 No credit after Sat 2/12 8 am				
17	Web Session A-No Class & Finish JAVA Two Hints for Gaddis Ch 1, 2, 3 Exam	JAVA Two due 2/18 No credit after Sat 2/19 8 am				
Feb 24	EXAM ONE on GADDIS Ch1, Ch2, and Ch3 40 MC/TF Questions worth 5.25 points each = 210 points					
Mar 3	Lecture over Gaddis Ch 4 – Loops (skip files)					
10	Lecture over Gaddis Ch 5 - Methods	JAVA Three due 3/11 No credit after Sat 3/12 8 am				
17	Spring Break					
24	Web Session B & C Hints for Gaddis Ch 4, 5 Exam	JAVA Four due 3/25 No credit after Sat 3/26 8 am MF Prob Four due Sun 3/27 4:45pm				
Mar 31	EXAM TWO on GADDIS Ch4 and Ch5 40 MC/TF Questions worth 5.25 points each = 210 points					
Apr 7	Lecture over Gaddis Ch 6 A First Look at Classes					
14	Lecture over Gaddis Ch 7 Arrays and ArrayList	JAVA Five due 4/15 No credit after Sat 4/16 8 am				
21	Q&A Ch 6, Review Java 5 Exam 3 review	JAVA Six due 4/22 No credit after Sat 4/23 8 am				
28	Web Session D & E Hints for Gaddis Ch 6 &7 Exam Finish JAVA SIX	ZXplore Extra Credit Due Sun 5/1 4:45 pm				
May 5	EXAM THREE on GADDIS Ch6 and Ch7 40 MC/TF Questions worth 5.25 points each = 210 points					

HOMEWORK ASSIGNMENTS

Point Distribution for Assignments

MF Prob One – Login/Basics	SYS Z	5	1/28
MF Prob Two – More Editing	SYS Z	5	2/04
MF Prob Three – JAVA/FTP/JCL	SYS Z	10	2/11
MF Prob Four – ZXplore Fund 1&2	SYS Z	10	3/27 4:45pm
JAVA One	Gaddis Ch 2	15	2/11
JAVA Two	Gaddis Ch 3	20	2/18
JAVA Three	Gaddis Ch 4	25	3/11
JAVA Four	Gaddis Ch 5	25	3/25
JAVA Five	Gaddis Ch 6	25	4/15
JAVA Six	Gaddis Ch 7	20	4/22
TOTAL		160	

I WILL GRADE MAINFRAME PROBLEMS ONE, TWO, & THREE ON SYSTEM Z. MF 4 will be reported to me by IBM on 3/27 at 4:45

EMAIL Prof Hardy WHEN READY TO BE GRADED ON THE Sys/Z.

*** EMAIL ALL JAVA PROBLEMS, ONE thru SIX, TO THE 3630 STUDENT GRADER

You are required to complete all of your 3630 homework assignments; otherwise, you will not be able to write your JAVA programs in BCIS 3680, the advanced JAVA course you are required to take. Copying someone else's work and getting negative points will hurt you the most, followed by not turning in anything. Turn in what you've completed by the due date. *I need to know you can write a program in a programming class, and I'm trying to keep students from failing BCIS 3680*

After completing the four mainframe assignments at the beginning of the semester, you may want to earn EXTRA CREDIT by working on IBM's ZXplore by completing the Fundamentals, Concepts, and Advanced Challenges. It will be 50 bonus points. You can receive partial credit, but for me to post grades, there is a hard cutoff of 4:45 pm on Sun, 5/1, when IBM reports your progress. Note that people who complete all three levels get the attention of IBM companies and often get an offer for a mainframe job.

POINTS

APTITUDE TEST	50 points	(6.25%)
EXAM ONE	190 points	(23.75%)
EXAM TWO	200 points	(25.00%)
EXAM THREE	200 points	(25.00%)
<u>HOMEWORK</u>	160 points	<u>(20.00%)</u>
TOTAL	800 points	(100.00%)

720 TO 800 POINTS = A 640 TO 719 POINTS = B 480 TO 639 POINTS = C 400 TO 559 POINTS = D 0 TO 399 POINTS = F

FEB 24 EXAM ONE on GADDIS Ch1, Ch 2, and Ch 3

MAR 31 EXAM TWO on GADDIS Ch 4 and Ch 5

MAY 5 EXAM THREE on GADDIS Ch 6 and Ch 7

NO MAKEUP EXAMS WILL BE GIVEN IN THIS COURSE

The official UNT exceptions do apply but ONLY IF YOU NOTIFY ME AT THE SEMESTER'S BEGINNING. You must give me signed documentation from the University at the beginning of the semester. If you do not notify me at the beginning of the semester - you will not be allowed a makeup exam.

For the rest of the class, if you miss an exam, I will give you a grade of 75% of the average grade you make on the other two exams.

EXAMPLE: If you make 80% and 90% on the <u>two</u> exams you take, I will give you 75% of the average grade of 85% for a grade of 63.75% on the exam you missed.

BE SMART AND SHOW UP FOR ALL 3 EXAMS OR YOU'LL BE PENALIZED.

OFFICIAL UNT REQUIRED SYLLABUS STATEMENTS

RCOB Statement on Academic Honesty

The G. Brint Ryan College of Business takes academic honesty seriously. Ethics and integrity are important business values, essential to building trust and adhering to both professional and legal standards. Academic dishonesty destroys trust, damages the reputation and the value of the degree and is unacceptable.

According to UNT Policy 06.003, Student Academic Integrity, academic dishonesty occurs when students engage in behaviors including, but not limited to cheating, fabrication, facilitating academic dishonesty, forgery, plagiarism, and sabotage. A finding of academic dishonesty may result in a range of academic penalties or sanctions from admonition (a warning) to expulsion from the University.

Some of the most common examples of academic integrity violations include plagiarism or cheating, such as unauthorized assistance on examinations, homework, research papers or case analyses. Your work must be entirely your own. When working on assignments, you should not discuss your work with others unless approved by the course instructor. Group assignments should only be discussed with members assigned to your group, and all group members may be held accountable in some way for known academic integrity violations in a group assignment.

Another example of academic dishonesty relates to improper attribution. When preparing your assignments, you must cite all outside sources in the manner requested by your instructor. Copying or using material from any source prepared by or previously submitted by others, at UNT or other institutions, or downloaded from the Internet, is plagiarism. Unless directed otherwise in an assignment, large scale "cutting and pasting" from other sources, even if properly footnoted, is not appropriate. You should synthesize this material in your own words and provide a footnote.

Your instructor will specify what materials, if any, may be used on the tests and exams. Using materials other than those permitted, talking with other individuals during the exam, individuals exchanging information about an exam when one has taken the exam and the other has not, or copying or using material from another individual's exam is academic dishonesty and will result in a meeting to discuss academic integrity violations and potentially issue sanctions mentioned above, and may result in ineligibility for academic scholarships. The use of online assistance, such as sites commonly used for finding homework solutions, group chat, cell phones, smart watches, and similar tools during exams is not allowed for any reason unless specifically permitted. No portion of an exam may be copied or photographed without permission.

Students are expected to conduct themselves in a manner consistent with the University's status as an institution of higher education. A student is responsible for responding to a request to discuss suspected academic dishonesty when issued by an instructor or other University official. If a student fails to respond after a proper attempt at notification has been made, the University may take appropriate academic actions in the absence of the student's participation.

<u>ADA Accommodation Statement</u>. UNT makes reasonable academic accommodations for students with disabilities. Students seeking accommodation must first register with the Office of Disability Accommodation (ODA) to verify their eligibility. If a disability is confirmed, the ODA will provide a student with an accommodation letter to be delivered to faculty to begin a private discussion regarding one's specific course needs. Students may request accommodations at any time; however, ODA notices of accommodation should be provided as early as possible in the semester to avoid any delay in implementation. Note that **students must obtain a new letter of accommodation for every semester** and meet with each faculty member before implementation in each class.

Emergency Evacuation Procedures for Business Leadership Building:

Severe Weather In the event of severe weather, all building occupants should immediately seek shelter in the designated shelter-in-place area in the building. If unable to safely move to the designated shelter-in-place area, seek shelter in a windowless interior room or hallway on the lowest floor of the building. All building occupants should take refuge in rooms 055, 077, 090 and the restrooms on the basement level. In rooms 170, 155, and the bathrooms on the first floor.

□ Bomb Threat/Fire In the event of a bomb threat or fire in the building, all building occupants should immediately evacuate the building using the nearest exit. Once outside, proceed to the designated assembly area. If unable to safely move to the designated assembly area, contact one or more members of your department or unit to let them know you are safe and inform them of your whereabouts. Persons with mobility impairments who cannot safely exit the building should move to a designated refuge area and await assistance from emergency responders. All building occupants should immediately evacuate and proceed to the south side of Crumley Hall in the grassy area west of parking lot 24.

Acceptable Student Behavior. Student behavior that interferes with an instructor's ability to conduct a class or other students' learning opportunity is unacceptable and disruptive and will not be tolerated in any instructional forum at UNT. Students engaging in inappropriate behavior will be directed to leave the classroom. The instructor may also refer the student to the Dean of Students to consider whether the student's conduct violated the Code of Student Conduct. The University's expectations for student conduct apply to all instructional forums, including University and electronic classrooms, labs, discussion groups, field trips, etc.

Welcome to BCIS 3630 JAVA programming. Logic Preparedness Test.

I hope that every student is successful in this course. If you are a bright student with strong analytical skills, attempt all of the JAVA homework assignments, and do not copy anything from the internet or another student, you should make an A or B.

However, there are some things that I must discuss first. In Fall 2020, approximately 33% of the students who started the semester did not complete this course successfully. The three primary reasons for this happening are:

- 1. Some students enrolling in BCIS 3630 do not have the quantitative, analytical, and logical skills necessary to succeed in a programming course.
- 2. There were 38 zeros on the first two straightforward JAVA homework assignments.
- 3. There were 29 instances of admitted cheating on the first 2 JAVA homework assignments.

The Dean of the College of Business and the Chair of the ITDS Department are very upset about this poor level of performance and want us to implement measures to stop it.

- 1. I am addressing cheating by giving -10 points for the first assignment. Cheating on the second assignment will result in a grade of -20, and you will be reported to the Dean of Students. If a student is caught a third time, they will receive an F in the course. If you use a Chegg.com-like service or pay someone to write your programs for you, I will immediately report you to the Dean of Students.
- 2. I am addressing not turning in the assignments in two ways. First, the ITDS department has adopted a rule that you must make a B in BCIS 3630 to take other BCIS courses. Second, I am increasing the weight of the homework to 20% of your grade so that if you don't do any assignments, you can only get a B if you get 100% on all exams (which is highly unlikely).
- 3. I am addressing the preparedness issue by giving a LOGIC PREPAREDNESS TEST during the second week of class in BCIS 3630.

Any student who does poorly on that test will be encouraged to drop 3630 and seriously ask themselves if they want to be an ITDS major, which involves a significant amount of computer programming.

To help a student prepare for the LOGIC PREPAREDNESS TEST, I am giving each student a STUDY GUIDE to work thru before the first day of class. This STUDY GUIDE contains 21 pages of textual material and a 40-question sample test to take at your leisure after you have studied the STUDY GUIDE. Therefore, I suggest that you start working thru the STUDY GUIDE right away.

4. Whenever you complete the sample test, email me [LeRoy.Hardy@unt.edu], and I will send you the answer key to grade your sample test.

If you do well, you will be ready for the actual LOGIC PREPAREDNESS TEST on the 2nd week of class.

However, you have two options if you do poorly on the sample test. The 1st is to reread the study guide closely and take the sample test again and again until you do well on it. Your 2nd choice is to drop BCIS 3630 and look for another major that better suits your talents.

If you do poorly on the sample test, you are almost sure to do worse on the actual LOGIC PREPAREDNESS TEST taken after the semester starts. Also, the grade you earn on the LOGIC PREPAREDNESS TEST, which you will take during the 2nd class period, will count as 50 points of your semester grade in BCIS 3630, so please take it very seriously.

5. The companies that hire our ITDS majors demand that they are technically competent and have good grades, and ITDS decided that this is the best way to accomplish that requirement.

The UNT Accounting Department implemented a similar 'preparedness test' to get into intermediate accounting several years ago, and it has cut their drop rate drastically. Accounting is stringent in that if you do not do well on the 'preparedness test,' you cannot even register for the intermediate accounting course.