# **NETWORK SECURITY**

# CIS 56 (CRN: 22328) Fall 2015

## **COURSE DESCRIPTION**

Provides broad-based knowledge and hands-on experience with network security. Security topics include access control, cryptography, policies, physical, network, application, data defenses, auditing and security protocols. Also, course can help prepare students to pass the CompTIA Security+ Certification exam.

## **PREREQUISITE SKILLS**

Advisory: Computer Information Systems 108.

#### **INSTRUCTOR INFORMATION: MARK SHERBY**



Office Hours Held: Office hours: Phone/Voicemail: Office Location: E-mail address: Website: From Monday, September 21 to Thursday, December 3 Monday, Wednesday 5:00-5:50PM --- Tuesday, Thursday 2:30-3:20PM (408) 864-5471 F-51D Sherbymark@deanza.edu Catalyst.deanza.edu

## **ATTENDANCE POLICY**

Students are required to attend all class meetings every Monday and Wednesday, 6:00-7:50 PM in AT 205. See drop policy below.

## **DROP POLICY**

- Students who want to be dropped from the class MUST take the initiative to follow the De Anza College drop procedures. Drop calendar deadlines can be found at <u>https://www.deanza.edu/calendar</u>. Do not assume you will be automatically dropped from this course. If you intend to drop the course, you must drop yourself!
- 2. Drop Deadline
  - a. By **WEDNESDAY** OF THE FIRST WEEK OF THE COURSE you must purchase and log into Jones and Bartlett site. We will explore the Jones and Bartlett site during class on Wednesday so you'll need to have purchased your materials in bookstore Wednesday of first week.
  - b. Successfully complete ALL the Week 1 ASSIGNMENTS in Jones & Bartlett Moodle.

# **OBJECTIVES**

Upon completion of this course, you will be able to use a personal computer and understand the following personal computer objectives.

- A. Explore network security issues
- B. Investigate access control and identity management
- C. Utilize cryptography
- D. Investigate policies, procedures, and awareness
- E. Identify physical security
- F. Explore perimeter defenses
- G. Explore network defenses
- H. Explore host defenses
- I. Identify application defenses
- J. Identify data defenses
- K. Explore security assessments and audits

# STUDENT LEARNING OUTCOMES FOR THIS COURSE:

Determine methods to protect network against security vulnerabilities.

# **REQUIRED COURSE MATERIALS**

- There are two purchase options for your Jones and Bartlett course materials (You can <u>only</u> purchase these two options through the De Anza bookstore). <u>Do not purchase these materials below</u> from any other source because they will not include the lab code access and you will have to pay twice.
  - a. Bookstore <u>ebook</u> & virtual lab option
    - *i*. Purchase your Jones and Bartlett access code in the bookstore ISBN
      9781284074444 (Fundamentals of Information Systems Security, second edition). This is the <u>least</u> expensive option and includes an ebook (rather than printed textbook).
  - b. Bookstore Print book & virtual lab option
    - Purchase your Jones and Bartlett access code in the bookstore ISBN 9781284074451 (Fundamentals of Information Systems Security, second edition). This is the <u>more</u> expensive option but will include a hard cover textbook instead of ebook.
- 2. High speed internet connection (not dial up) required IF you complete lab assignments at home.

# **GETTING STARTED IN YOUR COURSE**

 After completing one of the purchase options above, you will need to access <u>www.jblcourses.com</u> then click on "**Redeem an Access Code**" as shown below left. Next, you must enter the Lab Access Code (that you purchased in Step 1 above) and the Course Code <u>7255</u> as shown below. After clicking "New User Sign Up" as shown below, you will be prompted to create a username and password.



2. After you have created your username and password in step above, click "log in to your Existing Account" as shown below to log into jblcourses.com.

Redeem An Access Code	JONES & BARTLETT LEARNING An Accent Learning Company
Click Here	Login
	Step 1: Enter the user name that you have used to register previously.
Click Here	Step 2: Enter the password that you have used to register previously.
Contact Technical Support	Step 3: Click the Submit button.
Click Here	User name:
	Password
	Submit
	Forgot Password

# **REQUIRED COMPUTER COMPONENTS AND AVAILABILITY**

**Hardware Requirements:** A PC computer is required to run the Jones and Bartlett software. If you do not own a PC, you may use our AT 203 lab computers.

**Software:** The only software required for this class in the Jones and Bartlett software using an up-to-date browser as will be discussed in class.

#### **Computers in CIS Lab:**

If you need help with your course, you can use our CIS lab computers. For CIS computer lab hours access <u>http://www.deanza.edu/buscs/lab/hours.html</u>

### SUBMITTING WEEKLY LAB ASSIGNMENTS

This course uses a Moodle website called Jones and Bartlett (moodle.jblcourses.com). All course information including assignments, homework, course deadlines, etc. will be available to you online in your Jones and Bartlett course Moodle web site. When you enter your Jones and Bartlett on-line course, you will see a list of assignments that you will complete. The actual course schedule and due dates for exams and assignments are subject to change.

#### HOMEWORK ASSIGNMENTS

Homework assignments will include answering multiple choice and true-false quiz questions. Students will have 30 minutes to complete each 20-question quiz. However, quizzes may be retaken an unlimited number of times to improve your score. The highest score will be recorded. <u>No feedback will be given on questions missed</u> during this open book, open notes homework quiz. The final exam will be based on these same homework questions.

#### FINAL EXAM

The 40-question, multiple choice closed-book, closed-notes Final Exam will be based on the homework questions. Final exam on **Wednesday December 9, 6:15-8:15 PM**.

#### LAB ASSIGNMENTS

The required lab assignments can be found in Moodle are counted towards your grade (see below for grading scale). Each lab is due each week as shown in Moodle. You may throw out your lowest scoring lab assignment (one assignment will be dropped).

Students may not install or execute unauthorized software on any De Anza college classroom or lab computers or use unauthorized software to connect to or scan any part of the De Anza College's internal, wi-fi or public network. Such unauthorized actions could lead to expulsion from course, program and/or De Anza College.

## ATTENDANCE/PARTICIPATION

You must attend lectures and participate in class discussions to receive Attendance/Participation credit. (see below).

#### **MOODLE PORTAL**

Jones and Bartlett Moodle must be used as the portal for completing all assignments. To post any discussion questions, use moodle.jblcourses.com. The optional online portion of the class is conducted online and I will be available **Tuesdays from 10:00AM to 11:15AM** to answer questions you may have in Moodle or through email during this time. However, you are not restricted from asking questions only during this time period. Email me anytime.

## **TESTING/GRADING POLICIES/FINAL GRADES**

To pass this course, you must complete ALL labs, homework quizzes plus Final Exam. Weekly deadlines for each assignment are posted inside the Jones and Bartlett Moodle web site.

#### **Exams Grading Scale:**

- A+ 100% +
- A 93% 99.9%
- A- 90%-92%
- B+ 87%-89%
- B 83%-86%
- B- 80%-82%
- C+ 77%-79%
- C 70%-76%
- D+ 67%-69%
- D 63%-66%

#### Final Grade Mix:

The following percentages reflect how the final grade will be determined:

Attendance/Participation	10%
Homework (Quizzes)	30%
Lab Assignments	30%
Final Exam	30%
Total=	100%

Extra Credit

3% (can attain A+ grade!)

#### Academic Integrity:

If a student is found to have cheated or plagiarized on any particular assignment or examination, the student will receive a failing grade for that assignment or examination, and they will be reported to college authorities.

#### Extra Credit:

Students are encouraged to present a 10-minute presentation to the class on a relevant security topic or security camera project. A short slide presentation in Microsoft PowerPoint of Seven to ten slides is required to accompany the presentation. These slides will be posted on Moodle following the presentation. Consult the instructor first with your proposed topic and when to present on the schedule. Other extra credit can be found listed within Moodle. The maximum total extra credit awarded for this course is 3%.

# **DISRUPTIVE CLASSROOM BEHAVIOR**

Disruptive classroom behavior may include (but is not limited to) the following: talking when it does not relate to the discussion topic, sleeping, reading other material (e.g. newspapers, magazines, textbooks, from other classes), eating or drinking, monopolizing discussion time, refusing to

participate in classroom activities, leaving cell phones and pagers on, texting, and engaging in any other activity not related to the classroom activity. Students who engage in disruptive behavior will be approached by the instructor. If the disruptive behavior continues, students may be asked to leave the classroom and/or eventually be dropped from the course.

# NOTE TO STUDENTS WITH DISABILITIES

If you have a disability-related need for reasonable academic accommodations or services in this course, provide your instructor with a Test Accommodation Verification Form (also known as a TAV form) from Disability Support Services (DSS) or the Educational Diagnostic Center (EDC). Students are expected to give five days notice of the need for accommodations. Students with disabilities can obtain a TAV form from their DSS counselor (864-8753 DSS main number) or EDC advisor (864-8839 EDC main number).

# **TECHNICAL DIFFICULTIES**

If you have technical problems with the Jones and Bartlett software on your home computer, please contact Jones and Bartlett Technical Support directly at <u>www.jblcourses.com/techsupport</u> or call 1-866-601-4525 OR complete your course work using our computers in the AT203 CIS lab.