



# Computer Information Systems Course Syllabus

## Course Information:

Course Number and Name:	IX 220 Cyber Security
Semester:	Spring 2021
Days / Time:	Online
Catalog Description:	IX 220 Cyber Security (3) This course presents an overview of networks technologies, and Internet technologies, Internet attacks, hacking, and identity theft. Finally, how to protect and prevent these attacks. Prerequisite: CI 211.

## Instructor:

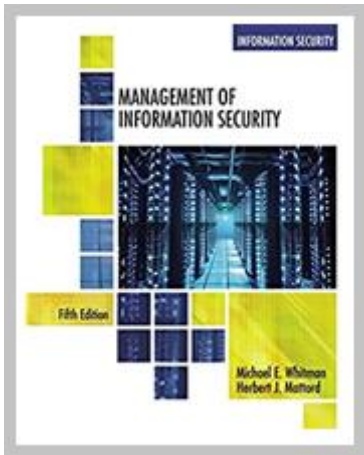
Name:	Russell Diaz
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## Textbook:

Principles of Information Security (6th Edition)

By Michael E. Whitman, Herbert J. Mattord. Published 2017

ISBN-10: 1-337-68575-5 / ISBN-13: 978-1-337-68575-7



## Student Responsibilities and College Policies as Described in the Student Handbook:

- Class Attendance
- Excused Absences
- Statement of Academic Integrity
- Responsibility and rights
- Breaches of Academic Integrity
- Attendance Policy
- Excused Absences

## General Course Objectives:

This course will cover the following Topics:

1. Lesson 1
  - a. Origins of Information Security
  - b. Origin of the Internet
  - c. Securing the Data, Network Design



- d. Project Management
- 2. Lesson 2
  - a. Computer Information Systems
  - b. Technology Security Departments
  - c. Intellectual Property
  - d. Copyright
  - e. Trademark
  - f. Patent
  - g. Trade Secrets
  - h. Quality of Service
  - i. Human Error
  - j. Sabotage or Vandalism
  - k. Disposing of Computers
  - l. Remote Access Users
  - m. Third Party Access
  - n. Web Portals
- 3. Lesson 3
  - a. Law and Ethics in Information Technology
  - b. Legal Terminology
  - c. Ethics
  - d. Liability
  - e. Policies
  - f. Types of Laws
  - g. Computer and Cyber Crimes
  - h. Customer Information and Privacy
  - i. Websites can collect data
  - j. Health Insurance Portability and Accountability Act (HIPAA)
  - k. Identity Theft
  - l. Medical Identity Theft
  - m. Financial Reporting
  - n. Prevent Unethical Behavior in the Workplace



o. Homeland Security

4. Lesson 4

- a. Information Security Planning
- b. Types of problems, Cyber attacks
- c. Strategic Plans
- d. Operational Plans
- e. Enterprise Information Security Policy
- f. Structure of a policy
- g. Business Impact Study
- h. Incident Response Planning
- i. Software as a Service (SaaS)
- j. Capital Expenses verses Operational Expenses

5. Lesson 5

- a. Internet Technology
- b. Top ISPs in the US
- c. Domain Name Service (DNS)
- d. Protocols
- e. Internet firewall
- f. Securing and monitoring the Internet Connection
- g. Virtual Local Area Networks (VLANs)

6. Lesson 6

- a. Server Based Security
- b. Internet connections
- c. Microsoft Networks
- d. Active Directory, Domain User Accounts
- e. Corporate Antivirus
- f. Disposing of old computers
- g. Two factor authentications

7. Lesson 7

- a. Physical Security



- b. Security Perimeter
  - c. Controlling Access to the Site, Doors and Locks
  - d. Electronic Access Control System
  - e. Alarm Systems
  - f. Fire Alarm Systems
8. Lesson 8
- a. Final Research Assignment
  - b. Question 1, Internet connection
  - c. Question 2, Computers Security
  - d. Question 3, User Account Security
  - e. Question 4, Power
  - f. Question 5, Backups, and planning
  - g. Question 6, Network Design
  - h. Question 7, Shared Data
  - i. Question 8, Physical Security
  - j. Question 9, Cyber Security
  - k. Question 10, adding a website

### Course Assignments:

Each chapter will have a Homework assignment, a research assignment and a discussion question.

All work must be submitted into Blackboard by Monday 3:00 AM. The assignments must be Word or PDF documents.

### Specific Course Objectives:

Each lesson will have a Homework assignment, a research assignment, and a Blackboard discussion question. Your grade will be based on the total number of points you get.



## Grading, points by week.

Your final grade is calculated directly from the number of points you earn. See the grading scales for the letter grade based on your point score.

The fastest way to lower your grade is to not submit the work on time.

	Wk. 1	Wk. 2	Wk. 3	Wk. 4	Wk. 5	Wk. 6	Wk. 7	Wk. 8	
	Lesson 1	Lesson 2	Lesson 3	Lesson 4	Lesson 5	Lesson 6	Lesson 7	Final Project	Total Points
Introduction	1								
Homework	4	4	4	4	4	4	4		
Research Assignment	5	5	5	5	5	5	5		
Discussion	2	2	2	2	2	2	2		
Final Project								22	
<b>Weekly Total</b>	<b>12</b>	<b>11</b>	<b>11</b>	<b>11</b>	<b>11</b>	<b>11</b>	<b>11</b>	<b>22</b>	<b>100</b>

## Undergraduate Grading System

Grade	% Scale	Quality Points per Semester Hour of Credit
A	(100-95)	4.0
A-	(94 - 90)	3.7
B+	(89 - 87)	3.3
B	(86 - 83)	3.0
B-	(82 - 80)	2.7
C+	(79 - 77)	2.3
C	(76 - 73)	2.0
C-	(72 - 70)	1.7
D+	(69 - 66)	1.3
D	(65 - 60)	1.0



F	(Below 60)	0
WU	Failure due to unauthorized withdrawal.	0
W	Withdrawal without penalty	- *
I**	Incomplete	- *
P	Passing	- *
MP	Minimally Passing	- *

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## Services for Students with Disabilities:

ADAAA (Americans with Disabilities Act Amendments Act of 2008): All students who identify themselves to faculty as having a disability or suspect that they have a disability are encouraged to contact the Office of Special Services (OSS). Faculty is not obligated to provide accommodations without proper notification from Special Services. Students may also contact the OSS Director by telephone to make an intake appointment at 845.848.4035, or email: [margaret.giuliano@dc.edu](mailto:margaret.giuliano@dc.edu).



## College –Wide Academic Learning Objectives that are met by this course are:

- Discover and utilize information through responsible use of appropriate technologies
  - By using the Internet to do research each week.
- Consider diverse perspectives, beliefs, and values in relation to their own cultural frameworks.
  - Many of the research topics answers are based on your personal perspective on the topics. There is not right and wrong answers. You justify your answer based on the research that you did.
- Analyze, synthesize, and evaluate ideas and information to formulate meaningful conclusions
  - The meaningful conclusions to the research questions are based on your evaluation of the information you found.
- Evaluate the ethical implications of their actions
  - In some cases, you must consider the ethics or lack of ethics of people when designing technology solutions. The network, services and data must be protected.
- Express and exchange ideas effectively through various modes of communication
  - As an online course, you will do this by using the weekly discussion board topics.

## Title IX/NY State Education Law 129-B Compliance:

The health, safety and well-being of our students is Dominican College's primary concern. If you or someone you know is a victim/survivor of sexual assault, domestic violence, dating violence, and/or stalking, know that you can find the appropriate resources on campus and in the Rockland County community to assist in both immediate and long-term care and recovery. As a faculty member, I am required by the College to report any incident of sexual misconduct to the College's Title IX Coordinator and, therefore cannot guarantee confidentiality. This includes all relevant details I may become aware of. Although I have to make that notification, our goal is to make sure you feel safe and are aware of the different resources available to you, as well as how to easily access them.

The College understands that sexual violence can undermine your academic success. It is important that you know you can choose to seek out confidential resources on campus, including:

- Counseling Services (845.848.4036/4037)
- The Student Health Center (845.848.7918)





- Campus Ministry (845.848. 4031)
- The Center for Safety and Change Campus Advocate (Hotline: 845-634-3344)

For more information about these confidential resources, additional off-campus resources, or to formally report a violation of policy to the College or local law enforcement, visit <https://www.dc.edu/health-safety-wellness/sexual-misconduct-title-ix/> <https://www.dc.edu/health-safety-wellness/sexual-misconduct-title-ix/> or contact the acting Title IX Coordinator

## Sexual Misconduct & Title IX - Dominican College

Sexual Violence Victim and Survivor Bill of Rights. Dominican College is committed to providing options, support and assistance to victims/survivors of sexual assault, domestic violence, dating violence, and/or stalking to ensure that they can continue to participate in College programs, activities, and employment.

Plagiarism is the presentation of someone else's ideas or works as one's own. It is imperative that students give credit for any information that is not original research or common knowledge. If a student borrows ideas or information from another source, he/she must acknowledge the author in the body of the text and site the reference in the reference page. Students found plagiarizing will receive an "F" for the assignment and the possibility of course failure or stricter school penalties.

Attendance/Participation in-class and online: Attendance will be considered in grading. To ensure a fair and comprehensive student evaluation, a student is expected to complete all assignments on time, timely response to all Bb assignments, complete all exams as scheduled.