Online IT 230 (CRN #45876) Computer Networking

Instructor: James Hart / hart56@unm.edu
Office Room Number: B 123
Instructor’s Campus Phone: 505.925.8720 / Mobile 505.239.3435
Office Hours: MW 12:30AM – 2:30 PM, TTh 10:30 AM – 12:30PM or ARR

Computer Networking. (4) Students will learn the fundamentals of network technology, technical concepts of network environments, identify the basic characteristics for local and wide area networks, list and describe the layers of the OSI networking model, list and identify the use of common network devices, describe the procedure for installing and configuring network adapters, list common network protocols, identify the best network protocol, describe the physical characteristics of a LAN, identify inter-network connectivity hardware by sight, define the roles of clients, servers, and peers on a network, list the most common network operating systems, identify potential network bottlenecks, and list fault tolerance procedures. Prerequisites: IT 125 and IT 131.

COURSE STUDENT LEARNING OUTCOMES: See in course’s learn.unm.edu

TEXTBOOK: Instructor issues individual student account for the Cisco Academy. From this account: https://www.netacad.com students have access to quizzes, tests and labs.

ATTENDANCE POLICY: Students are required to do a weekly “check in” through ZOOM or WebEx to address course materials and questions for the week. Time and dates of these “check in” sessions will be determined after class starts. Attendance to these sessions, live or recorded, is mandatory. Unless with instructor permission four missed weekly sessions will result in student being dropped.

GRADING POLICY

<table>
<thead>
<tr>
<th>Component</th>
<th>Percentage</th>
<th>Grade</th>
</tr>
</thead>
<tbody>
<tr>
<td>Weekly “Check in”</td>
<td>10%</td>
<td>A 90 +</td>
</tr>
<tr>
<td>Chapter Quizzes</td>
<td>10%</td>
<td>B 80 -89</td>
</tr>
<tr>
<td>Chapter Tests</td>
<td>20%</td>
<td>C 70 - 79</td>
</tr>
<tr>
<td>Hands on Skills</td>
<td>10%</td>
<td>D 60 - 69</td>
</tr>
<tr>
<td>PT Skills Exam</td>
<td>10%</td>
<td>F &lt;60</td>
</tr>
<tr>
<td>IP Skills</td>
<td>20%</td>
<td></td>
</tr>
<tr>
<td>Final</td>
<td>20%</td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>100%</td>
<td></td>
</tr>
</tbody>
</table>

The Cisco Academy breaks this curriculum into 11 chapters in the Module Tab. Each chapter is composed of chapter readings (Launch Tab), Terms and Concept Practices, Quizzes, and Chapter Exam. Instructor will determine due dates. Due dates are enforced unless instructor is notified prior to the due date. Late work is penalized 10%.
**Academic Integrity**
Having academic integrity is paramount to your success in any class. Plagiarism or cheating is not tolerated. Any instance of this will result in a grade of zero for that assignment. Here is the link to the UNM Academic Dishonesty Policy: [https://policy.unm.edu/regents-policies/section-4/4-8.html](https://policy.unm.edu/regents-policies/section-4/4-8.html). The policy states:

*Each student is expected to maintain the highest standards of honesty and integrity in academic and professional matters. The University reserves the right to take disciplinary action, up to and including dismissal, against any student who is found guilty of academic dishonesty or who otherwise fails to meet the expected standards. Any student judged to have engaged in academic dishonesty in course work may receive a reduced or failing grade for the work in question and/or for the course.*

Academic Dishonesty is defined as:
*"Academic dishonesty" includes, but is not limited to, dishonesty in quizzes, tests, or assignments; claiming credit for work not done or done by others; hindering the academic work of other students; misrepresenting academic or professional qualifications within or without the University; and nondisclosure or misrepresentation in filling out applications or other University records.*

**LIBRARY USAGE:** Be sure to always check out the library if you feel you need additional reading materials. They are open for any order suggestions you may have.

**STUDENTS WITH DISABILITIES:**

If you have a documented disability, the Equal Access Services office will provide me with a letter outlining your accommodations. I will then discuss the accommodations with you to determine the best learning environment. If you feel that you need accommodations, but have not documented your disability, please contact Jeanne Lujan, the coordinator for Equal Access Services at 925-8910 or jmlujan@unm.edu.

In an effort to meet obligations under Title IX, UNM faculty, Teaching Assistants, and Graduate Assistants are considered “responsible employees” by the Department of Education (see page 15 - [http://www2.ed.gov/about/offices/list/ocr/docs/qa-201404-title-ix.pdf](http://www2.ed.gov/about/offices/list/ocr/docs/qa-201404-title-ix.pdf)). This designation requires that any report of gender discrimination which includes sexual harassment, sexual misconduct and sexual violence made to a faculty member, TA, or GA must be reported to the Title IX Coordinator at the Office of Equal Opportunity (oeo.unm.edu). For more information on the campus policy regarding sexual misconduct, see: [https://policy.unm.edu/university-policies/2000/2740.html](https://policy.unm.edu/university-policies/2000/2740.html).

**EMAIL:** Be sure to check your contact information in Banner and keep it updated. UNM email as our official form of course communication.
Dates for Reference:
January 25    Enrollment Cancellation for non-payment
February 1    Last Day to Drop for 100% Tuition Refund/Last Day to Drop Without a “W”
February 8    Last Day to Change Grading Options
April 12      Last Day to Withdraw Without Student Services Permission
May 3         Last Day to Withdraw with Student Services Permission

COURSE OUTLINE references https://www.netacad.com:

Week 1 / Jan, 14

Modules / Launch Course Introduction
• Weekly “Check in”
• In Modules “click” Launch Introduction to Networks
• In Modules “click” First Time in This Course
• In Modules “click” Student Resources
• Review Binary, Hex, Decimal
• Take Pretest Exam

Week 2 / Jan. 21

MLK Day Jan. 21

Modules / Chapter 1 (Explore the Network)
• Weekly “Check in”
• Launch Chapter 1
• Chapter 1 Terms and Concepts Practice
• Review Binary, Hex, Decimal
• Take Chapter 1 Quiz
• Take Chapter 1 Exam

Week 3 / Jan. 28

Modules / Chapter 2 (Configuring a Network Operating System)
• Weekly “Check in”
• Launch Chapter 2
• Chapter 2 Terms and Concepts Practice
• Download Cisco’s Packet Tracer (Instructor recommends Packet Tracer tutorial also)
• In Packet Tracer construct a small network
• Review Binary, Hex, Decimal

Week 4 / Feb. 4

Modules / Chapter 2 (Configuring a Network Operating System)
• Weekly “Check in”
• More on Chapter 2
• More Packet Tracer
• Take Chapter 2 Quiz
• Take Chapter 2 Exam
• Review Binary, Hex, Decimal
Week 5 / Feb. 11

*Modules / Chapter 3 (Network Protocols and Communications)*
- *Weekly “Check in”*
- *Launch Chapter 3*
- *Chapter 3 Terms and Concepts Practice*
- More *Packet Tracer*
- Take Chapter 3 Quiz
- Take Chapter 3 Exam
- Review Binary, Hex, Decimal

Week 6 / Feb. 18

*Modules / Chapter 4 (Network Access)*
- *Weekly “Check in”*
- *Launch Chapter 4*
- *Chapter 4 Terms and Concepts Practice*
- More *Packet Tracer*
- Review Binary, Hex, Decimal

Week 7 / Feb. 25

*Modules / Chapter 4 (Network Access)*
- *Weekly “Check in”*
- More on Chapter 4
- More *Packet Tracer*
- Take Chapter 4 Quiz
- Take Chapter 4 Exam

*Modules / Chapter 5 (Ethernet)*
- *Launch Chapter 5*
- *Chapter 5 Terms and Concepts Practice*
- Review Binary, Hex, Decimal

Week 8 / March 4

*Modules / Chapter 5 (Ethernet)*
- *Weekly “Check in”*
- More Chapter 5
- More *Packet Tracer*
- Take Chapter 5 Quiz
- Take Chapter 5 Exam
- Review Binary, Hex, Decimal
Week 9 / March 11

SPRING BREAK

Week 10 / March 18

*Modules / Chapter 6 & 7 (Network Layer and IP Addressing)*
- Weekly “Check in”
- Launch Chapter 6
- Take Chapter 6 Exam
- Launch Chapter 7
- Take Chapter 7 Exam
- More Packet Tracer

Week 11 / March 25

*Modules / Chapter 8 (Subnetting IP Networks)*
- Weekly “Check in”
- Launch Chapter 8
- Chapter 8 Terms and Concepts Practice
- More Packet Tracer
- Review Binary, Hex, Decimal

Week 12 / April 1

*Modules / Chapter 8 (Subnetting IP Networks)*
- Weekly “Check in”
- More Chapter 8
- More Packet Tracer
- Review Binary, Hex, Decimal
- Take Chapter 8 Quiz
- Take Chapter 8 Exam

Week 13 / April 8

*Modules / Chapter 9 (Transport Layer)*
- Weekly “Check in”
- Launch Chapter 7
- Chapter 8 Terms and Concepts Practice
- More Packet Tracer
- Take Chapter 9 Quiz
- Take Chapter 9 Exam
- Review Binary, Hex, Decimal
Week 14 / April 15

Modules / Chapter 10 (Application Layer)
- Weekly “Check in”
- Launch Chapter 10
- Chapter 10 Terms and Concepts Practice
- More Packet Tracer
- Take Chapter 10 Quiz
- Take Chapter 10 Exam
- Review Binary, Hex, Decimal

Week 15 / April 22

Modules / Chapter 11 (Build a Small Network)
- Weekly “Check in”
- Launch Chapter 11
- Chapter 11 Terms and Concepts Practice
- More Packet Tracer
- Take Chapter 11 Quiz
- Take Chapter 11 Exam
- Review Binary, Hex, Decimal

Week 16 / April 29

- Practice Final / Practice Skills

Week 16 / May 6

ONLINE FINAL