

CSIS 3784 - Cisco Networking Academy 3

Fall 2026 Syllabus, Section 01, CRN 42761,

Credit hours: 3

Instructor

Todd Jones

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Public Instructor Information

Instructor Title: Senior Lecturer

Instructor Professional Qualifications: Master of Computing Information Systems, Youngstown State University, 2019

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Course Description

3784. Cisco Networking Academy 3. Enterprise Networking, Security, and Automation (ENSA) describes the architecture, components, operations, and security to scale for large, complex networks, including wide area network (WAN) technologies. The course emphasizes network security concepts and introduces network virtualization and automation. Students learn how to configure, troubleshoot, and secure enterprise. Two hours lecture and two hours lab per week. Prereq.: CSIS 3782. 3 s.h.

Course Readings

Group	Title	Author	ISBN
Required	CCNA 200-301 Official Cert Guide Library	Wendell Odom	1587147149

The course readings are subject to change in the event of extenuating circumstances, research developments, current events, and/or to ensure better learning.

Tentative Course Schedule

Week of	Reading(s)	Proposed Topic	Due/To Prepare for Class
8/24	Review	Review of Basics	
8/31	Module 1	Single Area OSPF	
9/7	Module 2	Single Area OSPF Config	Checkpoint Exam: OSPF Concepts and Configuration Exam 2.3.11 Determine the DR and BDR 2.4.11 Modify Single Area OSPF 2.5.3 Propagate a Default Route in OSPF 2.6.6 Verify Single Area OSPF 2.7.1 Single Area OSPF Configuration
9/14	Module 3	Network Security Concepts	Discussion: Summarize Network Security Today. Biggest Threats. Best Practices. Ethical Hacking. ETC..
9/21	Module 4	ACL Concepts	
9/28	Module 5	ACL Configurations	Checkpoint Exam: Network Security 5.1.8 Configure Numbered ACLs 5.1.9 Configure Named ACLs 5.2.7 Configure and Modify Standard ACLs 5.4.2 Configure Extended ACLs 1 5.4.3 Configure Extended ACLs 2 5.5.1 ACL Implementation Challenge



10/5	Module 6	Network Address Translation	6.2.7 Investigate NAT Operations 6.4.5 Configure Static NAT 6.5.6 Configure Dynamic NAT 6.6.7 Configure PAT 6.8.1 Configure NAT for IPv4
10/12	Module 7	WAN Concepts	
10/19	Module 8	VPN and IPsec Concepts	Checkpoint Exam: WAN Concepts Midterm 1
10/26	Module 9	QoS concepts	
11/2	Module 10	Network Management	10.1.5 Use CDP to Map a Network 10.2.6 Use LLDP to Map a Network 10.3.4 Configure and Verify NTP 10.6.10 Back up Configuration Files 10.7.6 Use a TFTP server to upgrade a Cisco IOS image 10.8.1 Configure CDP, LLDP, NTP
11/9	Module 11	Network Design	
11/16	Module 12	Network Troubleshooting	Checkpoint Exam: Optimize, Monitor, and Troubleshoot Networks 12.5.13 Troubleshoot Enterprise Networks 12.6.1 Troubleshooting Challenge – Document the Network 12.6.2 Troubleshooting Challenge – Use Documentation to solve Issues
11/23	Module 13	Virtualization	
11/30	Module 14	Network Automation	Checkpoint Exam: Emerging Network Technologies
12/7	Special Topics: Review and Final	Special Topics, Review, and Final	Final Exam

The course schedule, policies, procedures, and assignments in this course are subject to change in the event of extenuating circumstances, by mutual agreement, and/or to ensure better learning.