Cisco CCNA 1 Introduction to Networks - Online 10150111 | UGRD | 3 CR

Cisco CCNA 1 Introduction to Networks (ITN) covers networking architecture, structure, and functions. The course introduces IPv4 and IPv6 addressing structure and design, the fundamentals of Ethernet concepts, media, and operations, the OSI and TCP/IP models and associated protocols to set a strong networking foundation. Wireshark is used to examine protocols on the network. Students configure and troubleshoot routers (IOS), switches and clients for a basic network.

Cisco CCNA 2 Routing and Switching Essentials 10150113 | UGRD | 3 CR

Cisco CCNA 2 Routing and Switching Essentials (RSE) covers the architecture, components, and operations of routers and switches in a small network. Students learn how to configure, device management, switch ports, security, VLANs, Static and Dynamic routing, DHCP (v4 and v6), NAT and ACLs on routers and switches. At the completion of this course student may achieve a discount voucher for the CCENT certification exam. PREREQUISITE: 10150111 Cisco CCNA 1

Cisco CCNA 3 Enterprise Networking, Security and Automation 10150112 | UGRD | 3 CR

The CCNA 3 v7 curriculum uses Cisco NetAcademy curriculum, this course describes the architectures and considerations related to designing, securing, operating, and troubleshooting enterprise networks. This course covers wide area network (WAN) technologies and quality of service (QoS) mechanisms used for secure remote access along with the introduction of software-defined networking, virtualization, and automation concepts that support the digitalization of networks. Students gain skills to configure and troubleshoot enterprise networks, and learn to identify and protect against cybersecurity threats. Students are introduced to network management tools and learn key concepts of software-defined networking, including controller-based architectures and how application-programming interfaces (APIs) enable network automation. PREREQUISITE: 10150113 Cisco CCNA 2

Wireless Networking & Security 10150109 | UGRD | 3 CR

This course students will study the fundamentals of radio frequency (RF) and 802.11 technologies. They will be installing configuring, monitoring, securing and troubleshooting wireless devices. These skills will be applied to autonomous systems and wireless LAN controllers (WLC) to support business requirement. Site surveys will be conducted. Testing of secured implementations, identifying rouge devices and identify wireless attacks will be studied.

Information Security 10150102 | UGRD | 3 CR

This course will cover hardware, software, and the physical environment related to IT security. The processes of defense, prevention, detection, and response will be studied. Typical types of attacks will be studied and potential solutions or defenses will be explored. Networking and operating system experience is required along with a code of ethics. This course covers topics related to the CompTIA Security+ exam.