

Cisco Systems, Inc. 170 West Tasman Drive San Jose, CA 95134-1706

Direct: 408 526 4000 FAX: 408 526 4100 www.cisco.com

Oct 6, 2013

Dear Mazba Uddin

Congratulations on completing the Cisco<sup>®</sup> **CCNA Exploration: Network Fundamentals** course as part of the Cisco Networking Academy<sup>®</sup> program. This hands-on, lab-oriented course has prepared you for exciting career opportunities in the technology industry.

By completing this course you have earned a Certificate of Completion for CCNA Exploration: Network Fundamentals and acquired competencies that include the following:

- · Explain how communication works in data networks and the Internet
- Recognize the devices and services that are used to support communications across an Internetwork
- Explain the role of protocols in data networks
- Describe the importance of addressing and naming schemes at various layers of data networks
- Describe the protocols and services provided by the application layer in the OSI model and describe how this layer operates in sample networks
- · Analyze the operations and features of the transport layer protocols and services
- Analyze the operations and features of the network layer protocols and services and explain the fundamental concepts of routing
- Design, calculate, and apply subnet masks
- · Describe the operation of protocols at the OSI data link layer
- Explain the role of physical layer protocols and services
- Build a simple Ethernet network using routers and switches
- Use Cisco CLI commands to perform basic router and switch configuration and verification

Technological literacy is more important today than ever before, and Cisco is proud to provide you with the knowledge and skills necessary to build and maintain computers.

Please accept my best wishes for your continued success. Sincerely,

John T. Chambers

John Chemb

Chairman and Chief Executive Officer



## **CCNA Exploration: Network Fundamentals**

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Mazba Uddin		
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Shahjalal University of Science and Technology (SUST)		
Academy Name		
Bangladesh	Mar 11, 2013	
Location	Date	
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Instructor	Instructor Signature	



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Nov 17, 2013

Dear Mazba Uddin

Congratulations on completing the Cisco<sup>®</sup> **CCNA Exploration: LAN Switching and Wireless** course as part of the Cisco Networking Academy<sup>®</sup> program. This hands-on, lab-oriented course has prepared you for exciting career opportunities in the technology industry.

By completing this course you have earned a Certificate of Completion for CCNA Exploration: LAN Switching and Wireless and acquired competencies that include the following:

- Explain basic switching concepts and the operation and configuration of Cisco switches
- Describe enhanced switching technologies such as VLANs, VLAN Trunking Protocol (VTP), Rapid Spanning Tree Protocol (RSTP), Per VLAN Spanning Tree Protocol (PVSTP), and 802.1q
- Identify and describe the purpose of the components in a small wireless network, such as Service Set Identification (SSID), Basic Service Set (BSS), and Extended Service Set (ESS)
- Configure, verify, and troubleshoot VLANs, trunking on Cisco switches, interVLAN routing, VTP, and RSTP
- Identify, prescribe, and resolve common switched network media issues, configuration issues, autonegotiation, and switch hardware failures

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Nov 19, 2013

Dear Mazba Uddin

Congratulations on completing the Cisco<sup>®</sup> CCNA Exploration: Routing Protocols and Concepts course as part of the Cisco Networking Academy<sup>®</sup> program. This hands-on, laboriented course has prepared you for exciting career opportunities in the technology industry.

By completing this course you have earned a Certificate of Completion for CCNA Exploration: Routing Protocols and Concepts and acquired competencies that include the following:

- · Describe the purpose, nature, and operations of a router and routing tables
- · Describe, configure, and certify router interfaces
- Explain the purpose and procedure for configuring static route
- Identify the characteristics of distance vector routing protocols
- Describe the network discovery process of distance vector routing protocols using Routing Information Protocol (RIP)
- Describe the functions, characteristics, and operations of the RIPv1 protocol
- Compare and contrast classful and classless IP addressing
- · Describe classful and classless routing behaviors in routed networks
- Design and implement a classless IP addressing scheme for a given network
- Demonstrate comprehensive RIPv1 configuration skills
- Describe the main features and operations of the Enhanced Interior Gateway Routing Protocol (EIGRP)
- Describe the basic features and concepts of link-state routing protocols
- Describe the purpose, nature, and operations of the Open Shortest Path First (OSPF) protocol

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Mar 3, 2014

Dear Mazba Uddin

Congratulations on completing the Cisco<sup>®</sup> CCNA Exploration: Accessing the WAN course as part of the Cisco Networking Academy<sup>®</sup> program. This hands-on, lab-oriented course has prepared you for exciting career opportunities in the technology industry.

By completing this course you have earned a Certificate of Completion for CCNA Exploration: Accessing the WAN and acquired competencies that include the following:

- Describe the impact of Voice Over IP and Video Over IP applications on a network
- · Describe the components required for network and Internet communications
- Implement basic switch security measures such as port security, trunk access, and management VLANs
- Configure, verify, and troubleshoot DHCP and DNS operations on a router
- Describe the functions of common security appliances and applications
- Describe, configure, apply, monitor, and troubleshoot Access Control Lists based on network requirements
- Explain, configure, verify, and troubleshoot Network Address Translation (NAT) for given network requirements
- Configure and verify basic WAN serial connections including serial, Point-to-Point, and Frame Relay
- · Describe the importance, benefits, role, impact, and components of VPN technology
- Describe recommended security practices to secure network devices

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## CCNA Exploration: Accessing the WAN

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