

✓

Congratulations! You passed!

TO PASS: 80% or higher

Keep Learning

GRADE
100%

Networking Basics

LATEST SUBMISSION GRADE
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1. Question

1 / 1 point

When data can flow across a cable in both directions, this is known as ____ communication.

☐ ethernet

☐ simplex

☐ cross talk

☒ duplex

✖

✓

✓ Correct

Wowho! Duplex communication occurs when data flows in both directions.
2. Question

1 / 1 point

The transmission method that sends data to every device on a LAN is known as a ____ transmission.

☒ broadcast

☐ unicast

☐ multicast

☐ simulcast

✖

✓

✓ Correct

Awesomel Broadcast transmissions are used to communicate with every node on a network segment.
3. Question

1 / 1 point

Something that requests data from a server is known as a ____.

☐ switch

☐ router

☐ server

☒ client

✖

✓

✓ Correct

Yep! A client requests data, and a server responds to that request.
4. Question

1 / 1 point

A device that connects lots of devices and remembers which ones are connected to each interface is known as a ____.

☐ hub

☒ switch

☐ router

☐ server

✖

✓

✓ Correct

Great work! By remembering which devices are connected to each interface, a switch reduces collision domains.
5. Question

1 / 1 point

A defined set of standards that computers must follow in order to communicate properly is known as a ____.

☐ switch

☐ collision domain

☐ modulation

☒ protocol

✖

✓

✓ Correct

Good job! Protocols help define standards so that different computers can communicate with each other.
6. Question

1 / 1 point

What layer in the Transmission Control Protocol/Internet Protocol (TCP/IP) model does IP use?

☐ Physical

☒ Network

☐ Data link

☐ Transport

✖

✓

✓ Correct

You got it! The network layer is also sometimes called the internet layer. The most common protocol used at this layer is Internet Protocol (IP).
7. Question

1 / 1 point

A user has multiple web pages open and is using email. Which layer of the Transmission Control Protocol/Internet Protocol (TCP/IP) model is responsible for sorting the data to send email and web pages to the appropriate location?

☐ Network

☒ Transport

☐ Application

☐ Data link

✖

✓

✓ Correct

Well done! The transport layer is responsible for sorting out which client and server programs are supposed to get data.
8. Question

1 / 1 point

What type of cable communicates binary data by changing the voltage between two ranges?

☐ Fiber

☒ Copper

☐ Silver

☐ Gold

✖

✓

✓ Correct

Awesomel Copper cables communicate binary data across wires by changing the voltage between two ranges.
9. Question

1 / 1 point

Multiple systems try to send data at the same time. The electrical pulses sent across the cable interfere with each other. What type of network segment is being used?

☐ Local Area Network (LAN)

☐ Wide Area Network (WAN)

☒ Collision domain

☐ Subnet

✖

✓

✓ Correct

You got it! A collision domain is a network segment where only one device can communicate at a time.
10. Question

1 / 1 point

A user logs on to a laptop and opens her email. What device will provide emails to the laptop?

☐ Router

☒ Server

☐ Hub

☐ Switch

✖

✓

✓ Correct

Right on! A server is anything that provides data to a client.
11. Question

1 / 1 point

How many wires are in a standard Category 6 cable?

☐ 10

☐ 4

☒ 8

☐ 6

✖

✓

✓ Correct

You nailed it! A standard Cat6 cable has 8 wires that consist of four twisted pairs inside of a single jacket.
12. Question

1 / 1 point

Select the device that will have the most network ports.

☒ Switch

☐ Laptop

☐ Server

☐ Desktop

✖

✓

✓ Correct

You got it! A switch will have the most network ports, because its purpose is to connect many devices.
13. Question

1 / 1 point

Which layer abstracts away the need for any other layers to care about what hardware is in use?

☒ Data link

☐ Physical

☐ Network

☐ Transport

✖

✓

✓ Correct

Well done! One of the primary purposes of the data link layer is to essentially abstract away the need for any other layers to care about the physical layer and what hardware is in use.
14. Question

1 / 1 point

What does the letter B represent in a Media Access Control (MAC) address?

☐ 15

☒ 11

☐ 10

☐ 9

✖

✓

✓ Correct

Well done! Since we don't have numerals to represent any individual digit larger than 9, hexadecimal numbers employ the letters A, B, C, D, E and F to represent the numbers 10, 11, 12, 13, 14 and 15.
15. Question

1 / 1 point

What section in an ethernet frame will you find a Virtual Local Area Network (VLAN) header?

☐ Frame Check Sequence

☒ EtherType field

☐ Preamble

☐ Payload

✖

✓

✓ Correct

Woohoo! You may find a VLAN header in the EtherType field. This will indicate that the frame is called a VLAN frame.
16. Question

1 / 1 point

Where is the Start Frame Delimiter (SFD) found in an ethernet frame?

☐ The first byte of the EtherType field

☒ The last byte of the preamble

☐ The last byte of the EtherType field

☐ The first byte of the preamble

✖

✓

✓ Correct

You nailed it! The SFD is found in the last byte of the preamble, and signals to a receiving device that the preamble is over, and that the actual frame contents will now follow.