

CompTIA

Exam JK0-016

CompTIA Network+

Version: 21.0

[Total Questions: 828]

Topic 1, Networking Concepts**Question No : 1 - (Topic 1)**

A user's laptop is unable to keep a stable network connection. Which of the following measures would MOST likely need to be configured?

- A. SSID name
- B. WAP encryption strength
- C. WAP radio power
- D. Channel overlay

Answer: C

Explanation: WAP radio power is the signal strength through which you can specify the range from which you can stay connected to the network and access internet. Here, when the user is not able to maintain a stable connection then it is a problem with the signal strength for sure so you can try to increase the signal strength by increasing the radio power.

Question No : 2 - (Topic 1)

The Network Interface Layer of the TCP/IP model corresponds to which of the following layers of the OSI model? (Select TWO).

- A. Network
- B. Session
- C. Transport
- D. Physical
- E. Data link

Answer: D,E

Explanation:

The network layer is responsible for packet forwarding including routing through intermediate routers, whereas the data link layer is responsible for media access control, flow control and error checking.

Question No : 3 - (Topic 1)

In which of the following layers of the OSI model would MAC addressing be found?

- A. Network
- B. Application
- C. Data Link
- D. Transport

Answer: C

Explanation:

The ITU-T G.hn standard, which provides high-speed local area networking over existing wires (power lines, phone lines and coaxial cables), includes a complete data link layer which provides both error correction and flow control by means of a selective repeat Sliding Window Protocol.

Question No : 4 - (Topic 1)

Several users from the finance department report that they are able to access the Internet, but unable to connect to their financial applications. The network technician is unable to ping the finance server. The technician decides to check the switch and determines that Internet access is working. Which of the following is a possible cause of the access issues?

- A. Faulty cable
- B. Remote management disabled
- C. Improper VLAN assignment
- D. Mismatched duplex

Answer: C

Explanation: Finance Server is placed in same VLAN which is assigned to finance users if they are able to access internet that's means connectivity to switch is good, so we have to check the VLAN assigned to users.

Question No : 5 - (Topic 1)

A technician needs to ensure that traffic from a specific department is separated within several switches. Which of the following needs to be configured on the switch to separate the traffic?

- A. Duplex settings
- B. SNMP string
- C. VLAN assignments
- D. Spanning tree

Answer: C

Explanation: A VLAN is a group of end stations with a common set of requirements, independent of physical location. VLANs have the same attributes as a physical LAN but allow you to group end stations even if they are not located physically on the same LAN segment.

Question No : 6 - (Topic 1)

Given a subnet mask of 255.255.255.0, how many usable IP addresses would be in that subnet?

- A. 250
- B. 254
- C. 255
- D. 256

Answer: B

Explanation: The Subnet Mask however, determines the "class" of a Network. 255.255.255.0 is a "Class C" network. A class c network can host up to 254 pc's

Question No : 7 - (Topic 1)

On which of the following OSI model layers would a MAC address be used?

- A. Network
- B. Data Link
- C. Transport
- D. Physical

Answer: B

Explanation:

The ITU-T G.hn standard, which provides high-speed local area networking over existing wires (power lines, phone lines and coaxial cables), includes a complete data link layer which provides both error correction and flow control by means of a selective repeat Sliding Window Protocol.

Question No : 8 - (Topic 1)

Joe, a user, has a computer that has a link light on his network interface card (NIC); however, Joe is unable to access the Internet. Which of the following is the cause of this issue?

- A. Faulty GBIC
- B. Faulty SFP
- C. Cable is a crossover
- D. VLAN mismatch

Answer: D

Explanation:

As user has link light on NIC that means he has connectivity with switch so he need to check his vlan assignment.

Question No : 9 - (Topic 1)

A network technician is troubleshooting signal problems with certain WAPs in an office and finds consistently high ping times across the units. Such an issue is called which of the following?

- A. Latency
- B. Attenuation
- C. Crosstalk
- D. Frequency hopping

Answer: A

Explanation:

During the high ping time users are using most of the bandwidth that causes latency so signal strength get affected by this.

Question No : 10 - (Topic 1)

Which of the following TCP/IP model layers does the OSI model Presentation layer map to?

- A. Transport
- B. Internet
- C. Application
- D. Network Interface

Answer: C

Explanation:

The Application layer provides applications the ability to access the services of the other layers and defines the protocols that applications use to exchange data. There are many Application layer protocols and new protocols are always being developed.

Question No : 11 - (Topic 1)

A customer wants to keep cost to a minimum and has only ordered a single static IP address from the ISP. Which of the following must be configured on the router to allow for all the computers to share the same public IP address?

- A. VLANs
- B. PoE
- C. PAT

D. VPN**Answer: C****Explanation:**

Port Address Translation (PAT), is an extension to network address translation (NAT) that permits multiple devices on a local area network (LAN) to be mapped to a single public IP address. The goal of PAT is to conserve IP addresses.

Question No : 12 - (Topic 1)

Which of the following LAN technologies is used to provide a MAXIMUM bandwidth of 1Gbps through singlemode fiber?

- A. 10GBaseLR
- B. 100BaseFX
- C. 100BaseTX
- D. 1000BaseX

Answer: D**Explanation:**

1000BaseX identifies various Gigabit Ethernet physical layer standards as defined in IEEE802.3z, such as 1000BaseLX, 1000BaseSX, 1000BaseCX and 1000BaseLH. Basically, all standards included in 1000BaseX uses 8B/10B coding scheme with 8 bits of data and 2 bits of error-correction data. Each specification allows various cable (fiber or copper) lengths, and uses different cable media.

Question No : 13 - (Topic 1)

Which of the following properties of DHCP would a technician use to ensure an IP address is not leased out from the active scope?

- A. Reservations
- B. Lease times
- C. Removing IPs from the active leases

D. Configuring the DNS options**Answer: A****Explanation:**

Reservations are permanent lease assignments that are used to ensure that a specified client on a subnet can always use the same IP address. You can use DHCP reservations for hosts that require a consistent IP address, but do not need to be statically configured.

Question No : 14 - (Topic 1)

Spanning-Tree Protocol is used with which of the following network devices?

- A. Router
- B. NIC
- C. Switch
- D. DHCP server

Answer: C**Explanation:**

Spanning Tree Protocol (STP) is a Layer 2 protocol that runs on bridges and switches. The specification for STP is IEEE 802.1D. The main purpose of STP is to ensure that you do not create loops when you have redundant paths in your network. Loops are deadly to a network.

Question No : 15 - (Topic 1)

A technician wants to separate networks on a switch. Which of the following should be configured to allow this?

- A. VLAN
- B. Trunking
- C. Spanning tree
- D. Traffic filtering

Answer: A**Explanation:**

A VLAN is a group of end stations in a switched network that is logically segmented by function, project team, or application, without regard to the physical locations of the users. VLANs have the same attributes as physical LANs, but you can group end stations even if they are not physically located on the same LAN segment.

Question No : 16 - (Topic 1)

A user wants to connect seven PCs together for a game night. Which of the following should the user install to help with this task?

- A. Media convertor
- B. Switch
- C. Firewall
- D. Bridge

Answer: B

Explanation:

They connect multiple PCs, printers, servers and other hardware. Switches allow you to send information, such as email, and access shared resources, including printers, in a smooth, efficient, and transparent manner.

Question No : 17 - (Topic 1)

Which of the following defines the amount of time a host retains a specific IP address before it is renewed or released?

- A. DHCP lease
- B. DNS suffix
- C. Subnet mask
- D. DHCP reservation

Answer: A

Explanation:

By default, each IP address assigned by a DHCP Server comes with a one-day lease,

which is the amount of time that the address is valid.

Question No : 18 - (Topic 1)

Users are reporting that some Internet websites are not accessible anymore. Which of the following will allow the network administrator to quickly isolate the remote router that is causing the network communication issue, so that the problem can be reported to the appropriate responsible party?

- A. Ping
- B. Protocol analyzer
- C. Tracert
- D. Dig

Answer: C

Explanation:

Tracert command will tell the administrator which route is not present or which is present so he will come to know whether he has appropriate route or not.

Question No : 19 - (Topic 1)

Ann, a new user, has a workstation that has connectivity to the printer located in her department, but cannot access the Internet. The result of an ipconfig command on Ann's workstation is as follows:

IP address: 192.168.0.124

Subnet Mask: 255.255.255.128

Default Gateway: 192.168.0.254

Which is MOST likely preventing the user from accessing the Internet?

- A. Duplicate IP address