Exam Questions 200-301

Cisco Certified Network Associate

https://www.2passeasy.com/dumps/200-301/

NEW QUESTION 1
- (Topic 3)
What is a requirement when configuring or removing LAG on a WLC?

A. The Incoming and outgoing ports for traffic flow must be specified If LAG Is enabled.
B. The controller must be rebooted after enabling or reconfiguring LAG.
C. The management interface must be reassigned if LAG disabled.
D. Multiple untagged interfaces on the same port must be supported.

Answer: C

NEW QUESTION 2
- (Topic 3)
Which wireless security protocol relies on Perfect Forward Secrecy?

A. WPA3
B. WPA
C. WEP
D. WPA2

Answer: A

NEW QUESTION 3
- (Topic 3)
An engineer is configuring remote access to a router from IP subnet 10.139.58.0/28. The domain name, crypto keys, and SSH have been configured. Which configuration enables the traffic on the destination router?
A)

```
interface FastEthernet0/0
    ip address 10.122.49.1 255.255.255.240
    access-group 120 in

ip access-list extended 120
    permit tcp 10.139.58.0 255.255.255.248 any eq 22
```

B)

```
interface FastEthernet0/0
    ip address 10.122.49.1 255.255.255.252
    ip access-group 110 in

ip access-list extended 110
    permit tcp 10.139.58.0 0.0.0.15 host 10.122.49.1 eq 22
```

C)

```
interface FastEthernet0/0
    ip address 10.122.49.1 255.255.255.248
    ip access-group 10 in

ip access-list standard 10
    permit udp 10.139.58.0 0.0.0.7 host 10.122.49.1 eq 22
```

D)

```
interface FastEthernet0/0
    ip address 10.122.49.1 255.255.255.252
    ip access-group 105 in

ip access-list standard 105
    permit tcp 10.139.58.0 0.0.0.7 eq 22 host 10.122.49.1
```

A. Option A

B. Option B
C. Option C
D. Option D

Answer: B

NEW QUESTION 4

- (Topic 3)
What are two benefits of FHRPs? (Choose two.)

A. They enable automatic failover of the default gateway.
B. They allow multiple devices to serve as a single virtual gateway for clients in the network.
C. They are able to bundle multiple ports to increase bandwidth.
D. They prevent loops in the Layer 2 network.
E. They allow encrypted traffic.

Answer: AB

NEW QUESTION 5

- (Topic 3)
What causes a port to be placed in the err-disabled state?

A. nothing plugged into the port
B. link flapping
C. shutdown command issued on the port
D. latency

Answer: B

NEW QUESTION 6

- (Topic 3)
What is a function of Opportunistic Wireless Encryption in an environment?

A. offer compression
B. increase security by using a WEP connection
C. provide authentication
D. protect traffic on open networks

Answer: D

NEW QUESTION 7

- (Topic 3)
Refer to the exhibit.


```
                FastEthernet 0/1          FastEthernet 0/1
    SW1                                                    SW2
                FastEthernet 0/2          FastEthernet 0/2

SW1#show run interface fastEthernet 0/1
switchport trunk encapsulation dot1q
switchport mode trunk
switchport trunk allowed vlan 100,200,300
channel-group 1 mode on

SW1#show run interface fastEthernet 0/2
switchport trunk encapsulation dot1q
switchport mode trunk
switchport trunk allowed vlan 100,200,300
channel-group 1 mode on

SW2#show run interface fastEthernet 0/1
switchport trunk encapsulation dot1q
switchport mode trunk
switchport trunk allowed vlan 100,200,300
channel-group 1 mode active

SW2#show run interface fastEthernet 0/2
switchport trunk encapsulation dot1q
switchport mode trunk
switchport trunk allowed vlan 100,200,300
channel-group 1 mode active
```

An engineer built a new L2 LACP EtherChannel between SW1 and SW2 and executed these show commands to verify the work. Which additional task allows the two switches to establish an LACP port channel?

A. Change the channel-group mode on SW2 to auto
B. Change the channel-group mode on SW1 to desirable.
C. Configure the interface port-channel 1 command on both switches.
D. Change the channel-group mode on SW1 to active or passive.

Answer: D

NEW QUESTION 8
- (Topic 3)
Which protocol uses the SSL?

A. HTTP
B. SSH
C. HTTPS
D. Telnet

Answer: C

NEW QUESTION 9
- (Topic 3)
Refer to the exhibit.

```
A# show ip ospf neighbor
Neighbor ID  Pri   State         Dead Time  Address      Interface
172.1.1.1    1     EXCHANGE/  -  00:00:36   172.16.32.1  Serial0.1
```

An engineer assumes a configuration task from a peer Router A must establish an OSPF neighbor relationship with neighbor 172 1 1 1 The output displays the status of the adjacency after 2 hours. What is the next step in the configuration process for the routers to establish an adjacency?

A. Configure router A to use the same MTU size as router B.
B. Set the router B OSPF ID to a nonhost address.
C. Configure a point-to-point link between router A and router B.
D. Set the router B OSPF ID to the same value as its IP address

Answer: B

NEW QUESTION 10
- (Topic 3)
Which protocol is used for secure remote CLI access?

A. HTTPS
B. HTTP
C. Telnet
D. SSH

Answer: D

NEW QUESTION 10
DRAG DROP - (Topic 3)
Drag and drop the threat-mitigation techniques from the left onto the types of threat or attack they mitigate on the right.

configure the BPDU guard feature		802.1q double tagging
configure the dynamic ARP inspection feature		ARP spoofing
configure the root guard feature		unwanted superior BPDUs
configure a VLAN access control list		unwanted BPDUs on PortFast-enabled interfaces

A. Mastered
B. Not Mastered

Answer: A

Explanation:

configure the BPDU guard feature		configure a VLAN access control list
configure the dynamic ARP inspection feature		configure the dynamic ARP inspection feature
configure the root guard feature		configure the root guard feature
configure a VLAN access control list		configure the BPDU guard feature

NEW QUESTION 13
DRAG DROP - (Topic 3)

Drag and drop the characteristics of networking from the left onto the networking types on the right.

focused on network	**Controller-Based Networking**
focused on devices	
user input is a configuration	
user input is a policy	**Traditional Networking**
uses allow list security model	
uses block list security model	

A. Mastered
B. Not Mastered

Answer: A

Explanation:

focused on network	**Controller-Based Networking**
focused on devices	focused on network
user input is a configuration	uses allow list security model
user input is a policy	user input is a policy
uses allow list security model	**Traditional Networking**
uses block list security model	focused on devices
	uses block list security model
	user input is a configuration

NEW QUESTION 17
DRAG DROP - (Topic 3)
Drag and drop the descriptions of AAA services from the left onto the corresponding services on the right.

allows the user to change to enable mode	**Accounting**
limits the user's access permissions	
logs session statistics	**Authentication**
records user commands	
secures access to routers	
validates user credentials	**Authorization**

A. Mastered
B. Not Mastered

Answer: A

Explanation:

allows the user to change to enable mode	**Accounting**
limits the user's access permissions	records user commands
logs session statistics	logs session statistics
records user commands	**Authentication**
secures access to routers	validates user credentials
validates user credentials	allows the user to change to enable mode
	Authorization
	limits the user's access permissions
	secures access to routers
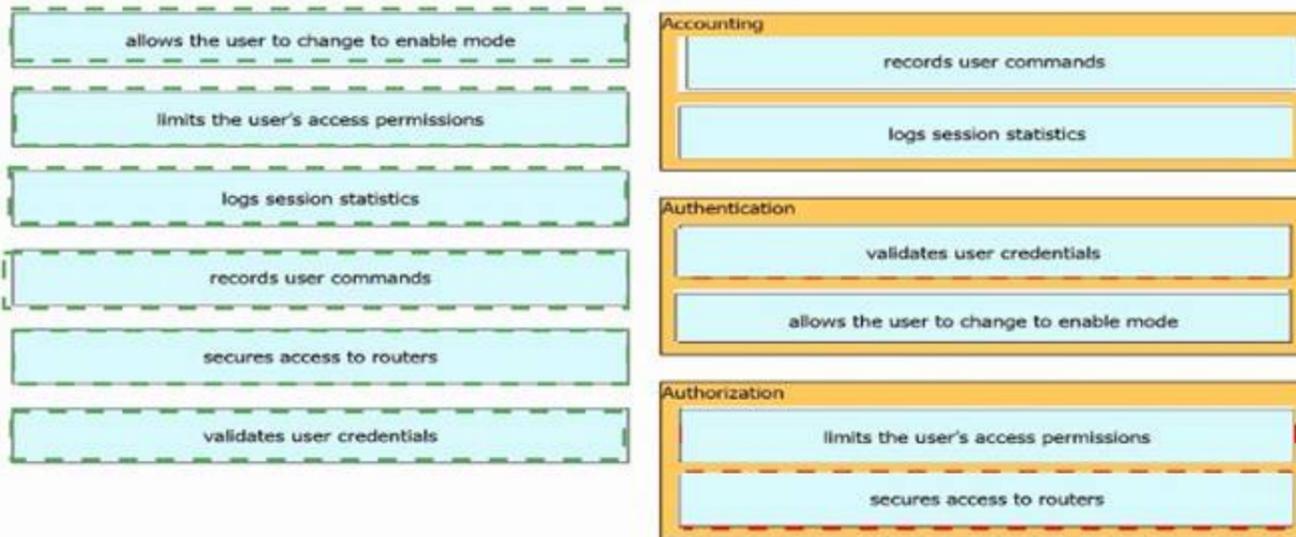
NEW QUESTION 20
- (Topic 3)
Refer to the exhibit.
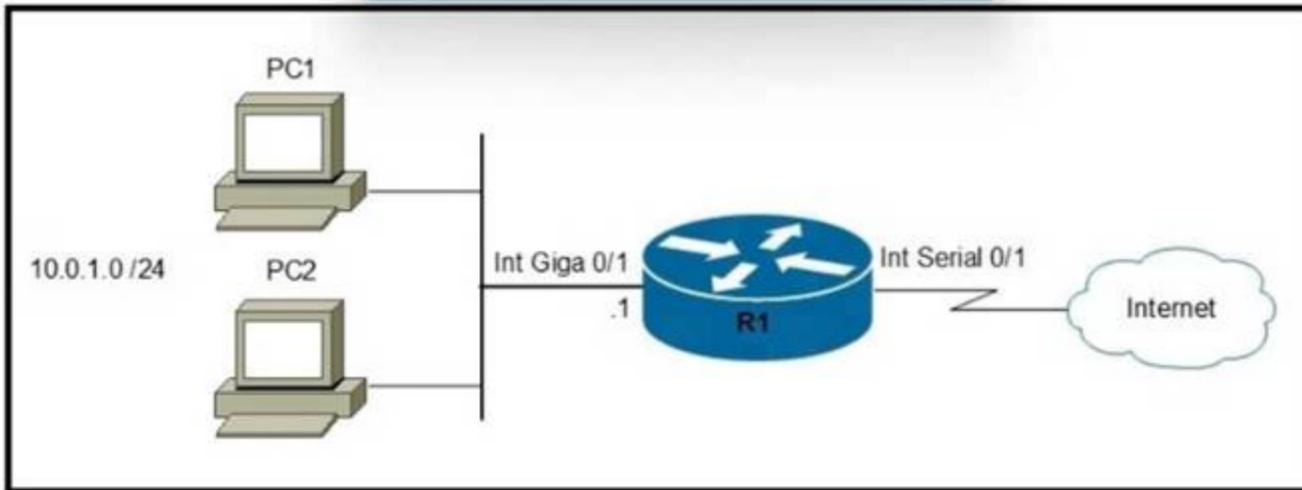
Which two commands must be configured on router R1 to enable the router to accept secure remote-access connections? (Choose two)

A. transport input telnet
B. crypto key generate rsa
C. ip ssh pubkey-chain
D. login console
E. username cisco password 0 Cisco

Answer: BE

NEW QUESTION 22
- (Topic 3)
Refer to the exhibit.

```
Switch#show etherchannel summary
[output omitted]

Group   Port-channel   Protocol      Ports
------+-------------+-----------+----------------------
10      Po10(SU)       LACP        Gi0/0(P)    Gi0/1(P)
20      Po20(SU)       LACP        Gi0/2(P)    Gi0/3(P)
```

Which two commands when used together create port channel 10? (Choose two.)

A. int range g0/0-1channel-group 10 mode active
B. int range g0/0-1 chanm.l-group 10 mode desirable
C. int range g0/0-1channel-group 10 mode passive
D. int range g0/0-1 channel-group 10 mode auto
E. int range g0/0-1 channel-group 10 mode on

Answer: AC

NEW QUESTION 26
- (Topic 3)
How does Rapid PVST+ create a fast loop-free network topology?

A. It requires multiple links between core switches
B. It generates one spanning-tree instance for each VLAN
C. It maps multiple VLANs into the same spanning-tree instance
D. It uses multiple active paths between end stations.

Answer: A

NEW QUESTION 29
- (Topic 3)
Which QoS per-hop behavior changes the value of the ToS field in the IPv4 packet header?

A. shaping
B. classification
C. policing
D. marking

Answer: D

NEW QUESTION 30
- (Topic 3)
Refer to the exhibit.

```
EIGRP    10.10.10.0/24[90/1441]    via    F0/10
EIGRP    10.10.10.0/24[90/144]     via    F0/11
EIGRP    10.10.10.0/24[90/1441]    via    F0/12
OSPF     10.10.10.0/24[110/20]     via    F0/13
OSPF     10.10.10.0/24[110/30]     via    F0/14
```

Packets received by the router from BGP enter via a serial interface at 209.165.201.10. Each route is present within the routing table. Which interface is used to forward traffic with a destination IP of 10.10.10.24?

A. F0/10
B. F0/11
C. F0/12
D. F0/13

Answer: B

NEW QUESTION 32
- (Topic 3)
Refer to the exhibit.

```
RIP      10.1.1.16/28[120/5]    via    F0/0
OSPF     10.1.1.0/24[110/30]    via    F0/1
OSPF     10.1.1.0/24[110/40]    via    F0/2
EIGRP    10.1.0.0/26[90/20]     via    F0/3
EIGRP    10.0.0.0/8 [90/133]    via    F0/4
```

Packets received by the router from BGP enter via a serial interface at 209 165 201 1 Each route is present within the routing table Which interface is used to forward traffic with a destination IP of 10.1.1.19?

A. F0/4
B. F0/0
C. F0/1
D. F0/3

Answer: B

NEW QUESTION 36
FILL IN THE BLANK - (Topic 3)
Refer to the exhibit.

```
           209.165.201.0/27 is subnetted, 1 subnets
    B      209.165.201.0 [20/0] via 10.10.12.2, 02:26:33
           209.165.202.0/27 is subnetted, 1 subnets
    B      209.165.202.128 [20/0] via 10.10.12.2, 02:26:03
           10.0.0.0/8 is variably subnetted, 8 subnets, 4 masks
    C      10.10.10.0/28 is directly connected, GigabitEthernet0/0
    C      10.10.11.0/30 is directly connected, FastEthernet2/0
    C      10.10.12.0/30 is directly connected, GigabitEthernet0/1
    O      10.10.13.0/25 [110/2] via 10.10.10.1, 00:00:04, GigabitEthernet0/0
    O      10.10.13.128/28 [110/2] via 10.10.10.1, 00:00:04, GigabitEthernet0/0
    O      10.10.13.144/28 [110/2] via 10.10.10.1, 00:00:04, GigabitEthernet0/0
    O      10.10.13.160/29 [110/2] via 10.10.10.1, 00:00:04, GigabitEthernet0/0
    O      10.10.13.208/29 [110/2] via 10.10.10.1, 00:00:04, GigabitEthernet0/0
    S*     0.0.0.0/0 [1/0] via 10.10.11.2
```

Drag and drop the prefix lengths from the left onto the corresponding prefixes on the right Not all prefixes are used

A. Mastered
B. Not Mastered

Answer: A

Explanation:
Diagram Description automatically generated with low confidence

NEW QUESTION 38
- (Topic 3)
What is the difference between IPv6 unicast and anycast addressing?

A. IPv6 anycast nodes must be explicitly configured to recognize the anycast address, but IPv6 unicast nodes require no special configuration
B. IPv6 unicast nodes must be explicitly configured to recognize the unicast address, but IPv6 anycast nodes require no special configuration
C. An individual IPv6 unicast address is supported on a single interface on one node but an IPv6 anycast address is assigned to a group of interfaces on multiple nodes.
D. Unlike an IPv6 anycast address, an IPv6 unicast address is assigned to a group of interfaces on multiple nodes

Answer: C

NEW QUESTION 41
- (Topic 3)
Which two network actions occur within the data plane? (Choose two.)

A. Add or remove an 802.1Q trunking header.
B. Make a configuration change from an incoming NETCONF RPC.
C. Run routing protocols.
D. Match the destination MAC address to the MAC address table.
E. Reply to an incoming ICMP echo request.

Answer: BD

NEW QUESTION 45
- (Topic 3)
An engineer must configure R1 for a new user account. The account must meet these requirements:
* It must be configured in the local database.
* The username is engineer.
* It must use the strongest password configurable. Which command must the engineer configure on the router?

A. R1 (config)# username engineer2 algorithm-type scrypt secret test2021
B. R1(config)# username engineer2 secret 5 .password S1$b1Ju$kZbBS1Pyh4QzwXyZ
C. R1(config)# username engineer2 privilege 1 password 7 test2021
D. R1(config)# username englneer2 secret 4 S1Sb1Ju$kZbBS1Pyh4QzwXyZ

Answer: B

NEW QUESTION 49
- (Topic 3)
Which QoS traffic handling technique retains excess packets in a queue and reschedules these packets for later transmission when the configured maximum bandwidth has been surpassed?

A. weighted random early detection
B. traffic policing
C. traffic shaping
D. traffic prioritization

Answer: C

NEW QUESTION 54
- (Topic 3)
What is an expected outcome when network management automation is deployed?

A. A distributed management plane must be used.
B. Software upgrades are performed from a central controller
C. Complexity increases when new device configurations are added
D. Custom applications are needed to configure network devices

Answer: B

NEW QUESTION 56
- (Topic 3)
Refer to the exhibit.

```
Switch#show interfaces status
Port          Name        Status          Vlan    Duplex  Speed Type
Fa0/1                     connected       1       auto    auto  10/100BaseTX
```
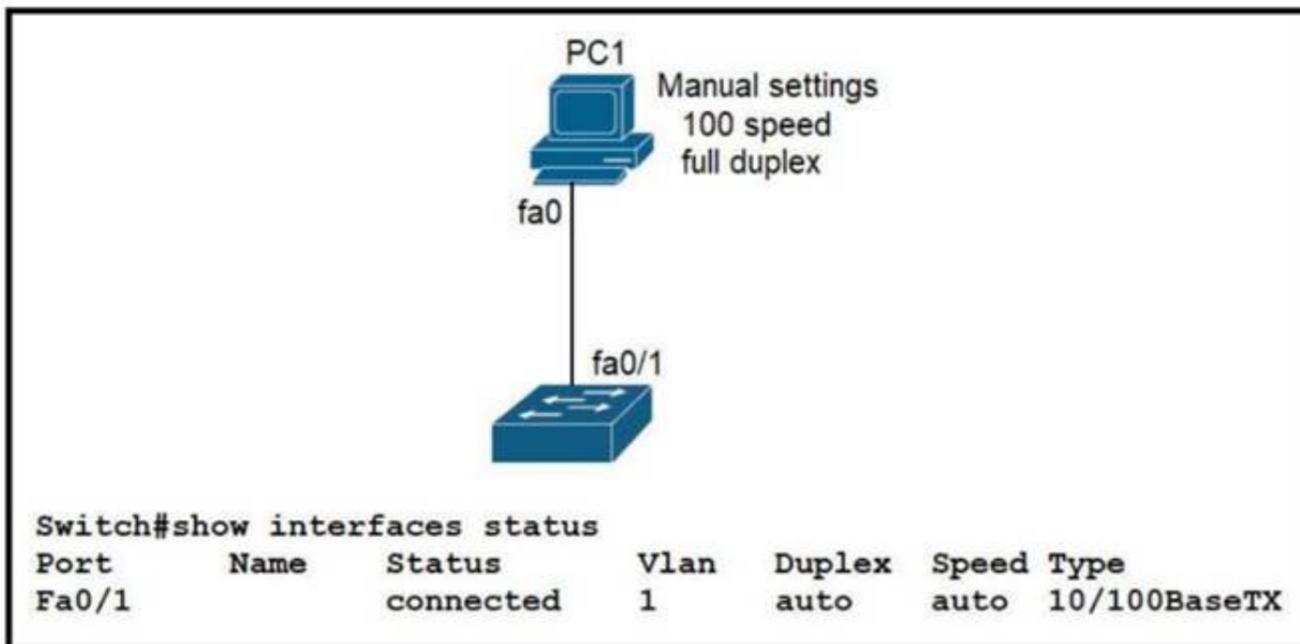
The link between PC1 and the switch is up. but it is performing poorly. Which interface condition is causing the performance problem?

A. There is a duplex mismatch on the interface
B. There is an issue with the fiber on the switch interface.
C. There is a speed mismatch on the interface.
D. There is an interface type mismatch

Answer: A

NEW QUESTION 58
- (Topic 3)
Refer to the exhibit.
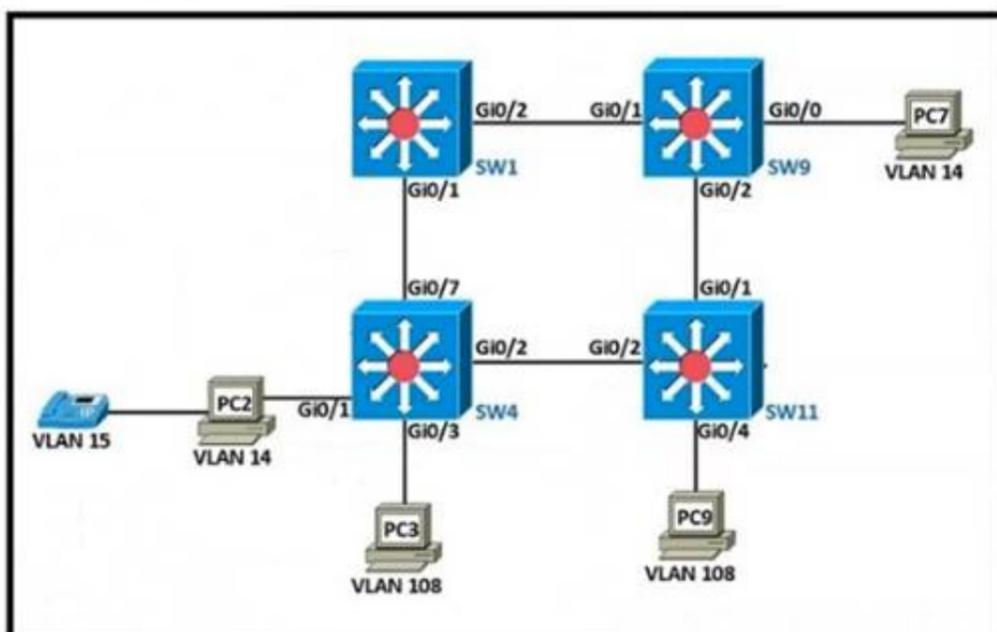
The following must be considered:
• SW1 is fully configured for all traffic
• The SW4 and SW9 links to SW1 have been configured
• The SW4 interface Gi0/1 and Gi0/0 on SW9 have been configured
• The remaining switches have had all VLANs adde d to their VLAN database
Which configuration establishes a successful ping from PC2 to PC7 without interruption to traffic flow between other PCs?
A)

```
SW4#
interface Gi0/2
switchport mode trunk
switchport trunk allowed vlan 14

SW11#
interface Gi0/1
switchport mode trunk
switchport trunk allowed vlan 14

SW9#
interface Gi0/2
switchport mode trunk
switchport trunk allowed vlan 108
```

B)

SW4#
interface Gi0/2
switchport mode trunk
switchport trunk allowed vlan 14

SW11#
interface Gi0/1
switchport mode trunk
switchport trunk allowed vlan 14

SW9#
interface Gi0/2
switchport mode trunk
switchport trunk allowed vlan 108

C)
SW4#
interface Gi0/2
switchport mode trunk
switchport trunk allowed vlan 14,108

SW11#
interface Gi0/2
switchport mode trunk
switchport trunk allowed vlan 14,108
!
interface Gi0/1
switchport mode trunk
switchport trunk allowed vlan 14,108

SW9#
interface Gi0/2
switchport mode trunk
switchport trunk allowed vlan 14

D)
SW4#
interface Gi0/2
switchport mode access
switchport access vlan 14

SW11#
interface Gi0/2
switchport mode access
switchport access vlan 14
!
interface Gi0/0
switchport mode access
switchport access vlan 14
!
interface Gi0/1
switchport mode trunk

SW9#
interface Gi0/2
switchport mode access
switchport access vlan 14

A. Option A
B. Option B
C. Option C
D. Option D

Answer: C

NEW QUESTION 61
- (Topic 3)
A network engineer is configuring a switch so that it is remotely reachable via SSH. The engineer has already configured the host name on the router. Which additional command must the engineer configure before entering the command to generate the RSA key?

A. password password
B. crypto key generate rsa modulus 1024
C. ip domain-name domain
D. ip ssh authentication-retries 2

Answer: C

Explanation:
 https://www.cisco.com/c/en/us/solutions/small-business/resource-center/networking/how-to-setup-network-switch.html

NEW QUESTION 62
DRAG DROP - (Topic 3)
Drag and drop the facts about wireless architectures from the left onto the types of access point on the right. Not all options are used.

A. Mastered
B. Not Mastered

Answer: A

Explanation:

NEW QUESTION 65
- (Topic 3)
What is a function of an endpoint on a network?

A. forwards traffic between VLANs on a network
B. connects server and client devices to a network
C. allows users to record data and transmit to a tile server
D. provides wireless services to users in a building

Answer: C

Explanation:
 An endpoint is a host that acts as the source or destination of data traffic flowing through a network.
When you are at your PC, editing your CV and uploading it to a file server, you are sitting at an endpoint.

NEW QUESTION 67
- (Topic 3)
Refer to the exhibit.
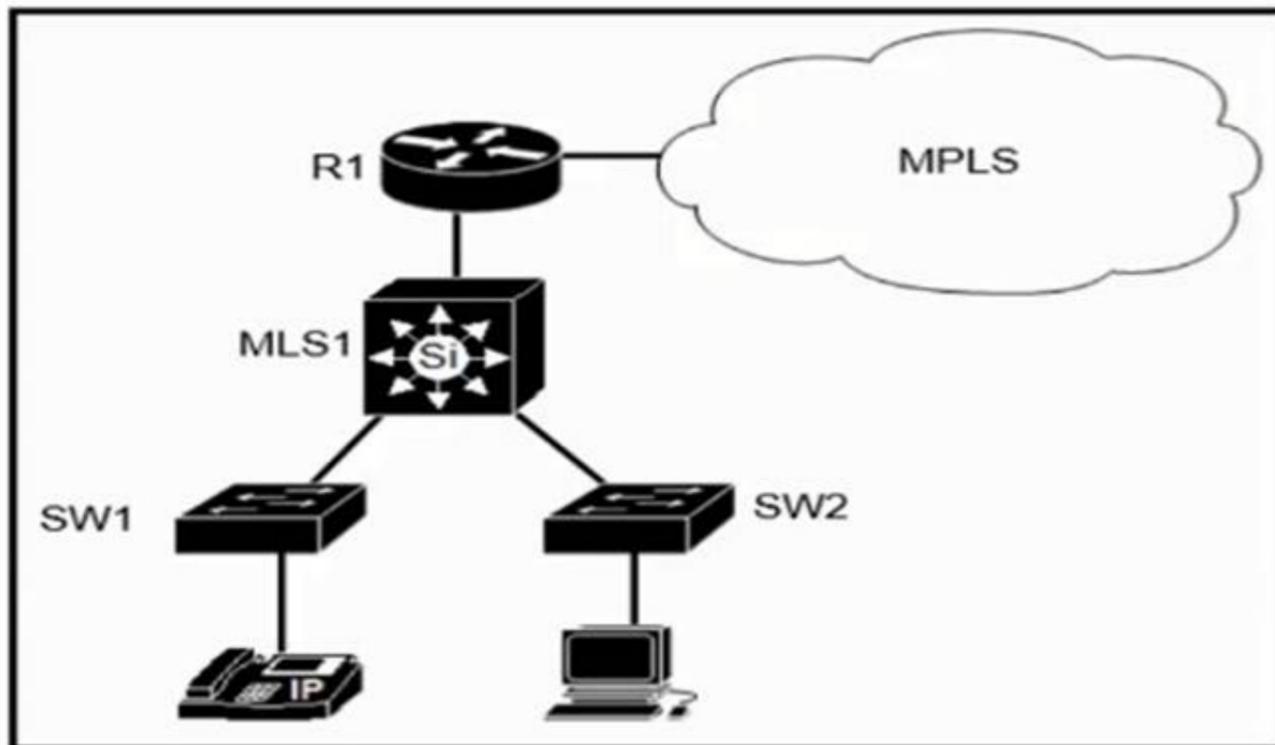
Which plan must be Implemented to ensure optimal QoS marking practices on this network?

A. As traffic traverses MLS1 remark the traffic, but trust all markings at the access layer.
B. Trust the IP phone markings on SW1 and mark traffic entering SW2 at SW2.
C. Remark traffic as it traverses R1 and trust all markings at the access layer.
D. As traffic enters from the access layer on SW1 and SW2. trust all traffic markings.

Answer: C

NEW QUESTION 71
- (Topic 2)
What is the primary different between AAA authentication and authorization?

A. Authentication verifies a username and password, and authorization handles the communication between the authentication agent and the user database.
B. Authentication identifies a user who is attempting to access a system, and authorization validates the users password
C. Authentication identifies and verifies a user who is attempting to access a system, and authorization controls the tasks the user can perform.
D. Authentication controls the system processes a user can access and authorization logs the activities the user initiates

Answer: C

Explanation:
 AAA stands for Authentication, Authorization and Accounting.+ Authentication: Specify who you are (usually via login username & password)+ Authorization: Specify what actions you can do, what resource you can access+ Accounting: Monitor what you do, how long you do it (can be used for billing and auditing)An example of AAA is shown below:+ Authentication: "I am a normal user. My username/password is user_tom/learnforever"+ Authorization: "user_tom can access LearnCCNA server via HTTP and FTP"+ Accounting: "user_tom accessed LearnCCNA server for 2 hours". This user only uses "show" commands.

NEW QUESTION 74
- (Topic 2)
Which networking function occurs on the data plane?

A. forwarding remote client/server traffic
B. facilitates spanning-tree elections
C. processing inbound SSH management traffic
D. sending and receiving OSPF Hello packets

Answer: A

NEW QUESTION 76
- (Topic 2)
What are two differences between optical-fiber cabling and copper cabling? (Choose two)

A. Light is transmitted through the core of the fiber
B. A BNC connector is used for fiber connections
C. The glass core component is encased in a cladding
D. Fiber connects to physical interfaces using Rj-45 connections
E. The data can pass through the cladding

Answer: AC

NEW QUESTION 77
- (Topic 2)
Refer to the exhibit.

```
R1#show ip route
#output suppressed

Gateway of last resort is 192.168.14.4 to network 0.0.0.0

C       172.16.1.128/25 is directly connected, GigabitEthernet1/1/0
C       192.168.12.0/24 is directly connected, FastEthernet0/0
C       192.168.13.0/24 is directly connected, FastEthernet0/1
C       192.168.14.0/24 is directly connected, FastEthernet1/0
C       172.16.16.1 is directly connected, Loopback1
        192.168.10.0/24 is variably subnetted, 3 subnets, 3 masks
O       192.168.10.0.24 [110/2] via 192.168.14.4, 00:02:01, FastEthernet1/0
O       192.168.10.32/27 [110/11] via 192.168.13.3, 00:00:52, FastEthernet0/1
O       192.168.0.0/16 [110/2] via 192.168.15.5, 00:05:01, FastEthernet1/1
D       192.168.10.1/32 [90/52778] via 192.168.12.2, 00:03:44, FastEthernet0/0
O*E2    0.0.0.0/0 [110/1] via 192.168.14.4, 00:00:10, FastEthernet1/0
```

If R1 receives a packet destined to 172.161.1, to which IP address does it send the packet?

A. 192.168.12.2
B. 192.168.13.3
C. 192.168.14.4
D. 192.168.15.5

Answer: C

NEW QUESTION 81
- (Topic 2)
Using direct sequence spread spectrum, which three 2.4-GHz channels are used to limit collisions?

A. 1,6,11
B. 1,5,10
C. 1,2,3
D. 5,6,7

Answer: A

NEW QUESTION 86
DRAG DROP - (Topic 2)
Drag the descriptions of IP protocol transmissions from the left onto the IP traffic types on the right.

|	TCP
sends transmissions in sequence	
transmissions include an 8-byte header	
transmits packets as a stream	
transmits packets individually	UDP
uses a higher transmission rate to support latency-sensitive applications	
uses a lower transmission rate to ensure reliability	

A. Mastered
B. Not Mastered

Answer: A

Explanation:

	TCP
sends transmissions in sequence	sends transmissions in sequence
transmissions include an 8-byte header	transmits packets as a stream
transmits packets as a stream	uses a lower transmission rate to ensure reliability
transmits packets individually	**UDP**
uses a higher transmission rate to support latency-sensitive applications	transmissions include an 8-byte header
uses a lower transmission rate to ensure reliability	transmits packets individually
	uses a higher transmission rate to support latency-sensitive applications

NEW QUESTION 91
- (Topic 2)
Refer to the exhibit.

```
R1          .18
    10.10.10.16/30    Internet
    .17
   .2
10.10.10.0/30
   .1               Firewall
MLS1  Si

S1
              10.10.13.10/25

R1#sh ip ro
Gateway of last resort is 10.10.10.18 to network 0.0.0.0

      10.0.0.0/8 is variably subnetted, 4 subnets, 3 masks
C         10.10.10.0/30 is directly connected, FastEthernet0/1
O         10.10.13.0/25 [110/6576] via 10.10.10.1, 06:58:21, FastEthernet0/1
C         10.10.10.16/30 is directly connected, FastEthernet0/24
O         10.10.13.144/28 [110/110] via 10.10.10.1, 06:58:21, FastEthernet0/1
B*   0.0.0.0/0 [20/0] via 10.10.10.18, 01:17:58
```

Which route type is configured to reach the internet?

A. host route
B. default route
C. floating static route
D. network route

Answer: B

NEW QUESTION 93
- (Topic 2)
An engineer is configuring NAT to translate the source subnet of 10.10.0.0/24 to any of three addresses 192.168.30.1, 192.168.3.2, 192.168.3.3 Which configuration should be used?

```
◯  enable
   configure terminal
   ip nat pool mypool 192.168.3.1 192.168.3.3 prefix-length 30
   route-map permit 10.10.0.0 255.255.255.0
   ip nat outside destination list 1 pool mypool
   interface g1/1
   ip nat inside
   interface g1/2
   ip nat outside
```

```
◯  enable
   configure terminal
   ip nat pool mypool 192.168.3.1 192.168.3.3 prefix-length 30
   access-list 1 permit 10.10.0.0 0.0.0.255
   ip nat inside source list 1 pool mypool
   interface g1/1
   ip nat inside
   interface g1/2
   ip nat outside
```

```
◯  enable
   configure terminal
   ip nat pool mypool 192.168.3.1 192.168.3.3 prefix-length 30
   access-list 1 permit 10.10.0.0 0.0.0.255
   ip nat outside destination list 1 pool mypool
   interface g1/1
   ip nat inside
   interface g1/2
   ip nat outside
```

```
◯  enable
   configure terminal
   ip nat pool mypool 192.168.3.1 192.168.3.3 prefix-length 30
   access-list 1 permit 10.10.0.0 0.0.0.254
   ip nat inside source list 1 pool mypool
   interface g1/1
   ip nat inside
   interface g1/2
   ip nat outside
```

A. Option A
B. Option B
C. Option C
D. Option D

Answer: C

NEW QUESTION 96
DRAG DROP - (Topic 2)
Drag and drop the Cisco Wireless LAN Controller security settings from the left onto the correct security mechanism categories on the right.

web policy		Layer 2 Security Mechanisms
Passthrough		
WPA+WPA2		Layer 3 Security Mechanisms (for WLAN)
802.1X		

A. Mastered
B. Not Mastered

Answer: A

Explanation:

web policy	Layer 2 Security Mechanisms
Passthrough	802.1X
WPA+WPA2	WPA+WPA2
802.1X	Layer 3 Security Mechanisms (for WLAN)
	web policy
	Passthrough
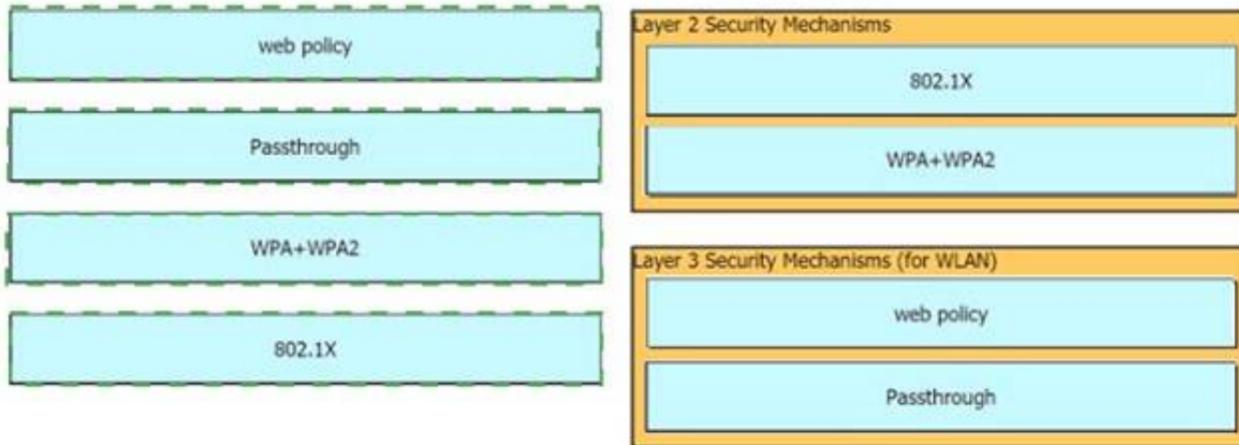
NEW QUESTION 98
- (Topic 2)
Refer to the exhibit.
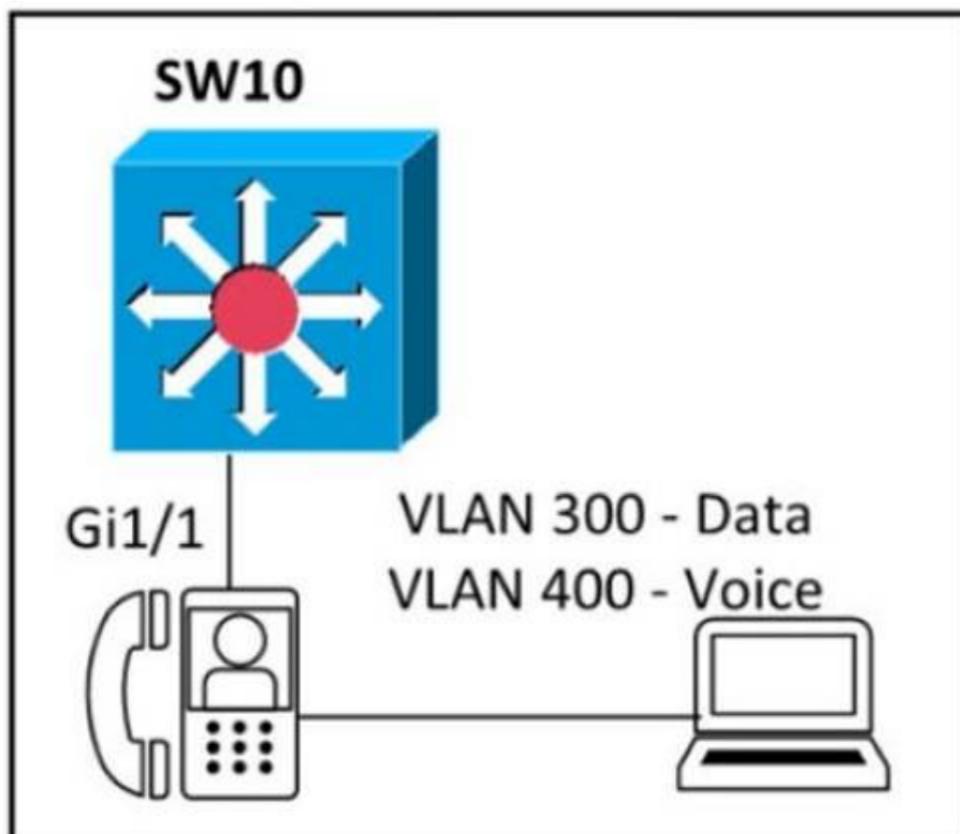
An engineer must configure GigabitEthernet1/1 to accommodate voice and data traffic Which configuration accomplishes this task?

```
interface gigabitethernet1/1
switchport mode access
switchport access vlan 300
switchport voice vlan 400
```

```
interface gigabitethernet1/1
switchport mode trunk
switchport trunk vlan 300
switchport voice vlan 400
```

```
interface gigabitethernet1/1
switchport mode trunk
switchport trunk vlan 300
switchport trunk vlan 400
```

```
interface gigabitethernet1/1
switchport mode access
switchport voice vlan 300
switchport access vlan 400
```

A. Option A
B. Option B
C. Option C
D. Option D

Answer: A

NEW QUESTION 103
- (Topic 2)
Which two QoS tools provides congestion management? (Choose two)

A. CAR
B. CBWFQ
C. PQ
D. PBR
E. FRTS

Answer: BC

Explanation:
 Type of queuing methods are available:• First-In-First-Out (FIFO)• Priority Queuing (PQ)• Custom Queuing (CQ)• Weighted Fair Queuing (WFQ)• Class-Based Weighted Fair Queuing (CBWFQ)• Low-Latency Queuing (LLQ)
https://www.orbit-computer-solutions.com/qos-congestion-management-tools/

NEW QUESTION 105
- (Topic 2)
Which plane is centralized by an SDN controller?

A. management-plane
B. control-plane
C. data-plane
D. services-plane

Answer: B

NEW QUESTION 109
DRAG DROP - (Topic 2)
Drag the descriptions of device management from the left onto the types of device management on the right.

A. Mastered
B. Not Mastered

Answer: A

Explanation:

implements changes via an SSH terminal	**Cisco DNA Center Device Management**
manages device configurations on a per-device basis	monitors the cloud for software updates
monitors the cloud for software updates	uses CLI templates to apply a consistent configuration to multiple devices at an individual location
security is managed near the perimeter of the network with firewalls, VPNs, and IPS	uses NetFlow to analyze potential security threats throughout the network and take appropriate action on that traffic
uses CLI templates to apply a consistent configuration to multiple devices at an individual location	**Traditional Device Management**
uses NetFlow to analyze potential security threats throughout the network and take appropriate action on that traffic	manages device configurations on a per-device basis
	security is managed near the perimeter of the network with firewalls, VPNs, and IPS
	implements changes via an SSH terminal
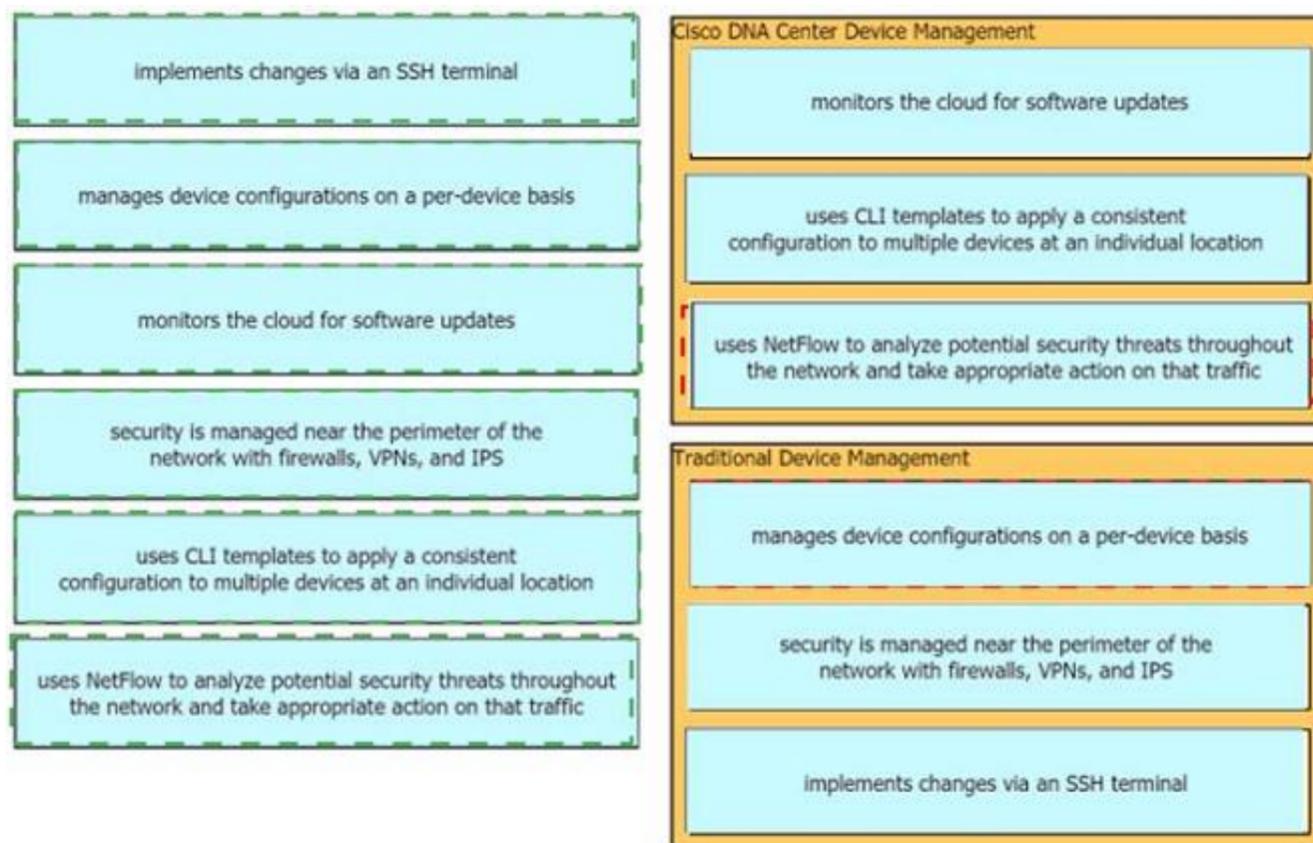
NEW QUESTION 110
- (Topic 2)
Refer to the exhibit.

```
SW1#sh lacp neighbor
Flags:   S - Device is requesting Slow LACPDUs
         F - Device is requesting Fast LACPDUs
         A - Device is in Active mode        P - Device is in Passive mode

Channel group 35 neighbors

Partner's information:

                      LACP port                          Admin  Oper   Port     Port
Port       Flags      Priority  Dev ID          Age      key    Key    Number   State
Et1/0      SP         32768     aabb.cc80.7000  8s       0x0    0x23   0x101    0x3C
Et1/1      SP         32768     aabb.cc80.7000  8s       0x0    0x23   0x102    0x3C
```

Based on the LACP neighbor status, in which mode is the SW1 port channel configured?

A. passive
B. mode on
C. auto
D. active

Answer: D

Explanation:
 From the neighbor status, we notice the "Flags" are SP. "P" here means the neighbor is in Passive mode.In order to create an Etherchannel interface, the (local)
SW1 ports should be in Active mode.Moreover, the "Port State" in the exhibit is "0x3c" (which equals to "00111100 in binary format).Bit 3 is "1" which means the
ports are synchronizing -
> the ports are working so the local ports should be in Active mode.

NEW QUESTION 113
- (Topic 2)
A packet is destined for 10.10.1.22. Which static route does the router choose to forward the packet?

A. ip route 10.10.1.0 255.255.255.240 10.10.255.1
B. ip route 10.10.1.16 255.255.255.252 10.10.255.1
C. ip route 10.10.1.20 255.255.255.252 10.10.255.1
D. ip route 10.10.1.20 255.255.255.254 10.10.255.1

Answer: C

NEW QUESTION 118
- (Topic 2)
Refer to the exhibit.

```
R1# show ip route
....
D         172.16.32.0/27 [90/2888597172]  via 20.1.1.1
O         172.16.32.0/19  [110/292094]    via 20.1.1.10
R         172.16.32.0/24  [120/2]  via 20.1.1.3
```

Router R1 is running three different routing protocols. Which route characteristic is used by the router to forward the packet that it receives for destination IP 172.16.32.1?

A. longest prefix
B. metric
C. cost
D. administrative distance

Answer: A

Explanation:
https://learningnetwork.cisco.com/s/question/0D53i00000KszSlCAJ/administrative- distance-vs-longest-match-rule

NEW QUESTION 121
- (Topic 2)
When the active router in an HSRP group fails, what router assumes the role and forwards packets?

A. backup
B. standby
C. listening
D. forwarding

Answer: B

NEW QUESTION 125
- (Topic 2)
Refer to the exhibit.

```
Router#show ip route
Codes: L - local, C - connected, S - static, R - RIP, M - mobile, B - BGP
       D - EIGRP, EX - EIGRP external, O - OSPF, IA - OSPF inter area
       N1 - OSPF NSSA external type 1, N2 - OSPF NSSA external type 2
       E1 - OSPF external type 1, E2 - OSPF external type 2
       i - IS-IS, su - IS-IS summary, L1 - IS-IS level-1, L2 - IS-IS level-2
       ia - IS-IS inter area, * - candidate default, U - per-user static route

Gateway of last resort is 209.165.202.131 to network 0.0.0.0

S*    0.0.0.0/0 [1/0] via 209.165.202.131
      209.165.200.0/27 is subnetted, 1 subnets
S        209.165.200.224 [254/0] via 209.165.202.129
      209.165.201.0/27 is subnetted, 1 subnets
S        209.165.201.0 [1/0] via 209.165.202.130
```

Which command configures a floating static route to provide a backup to the primary link?

A. ip route 0.0.0.0 0.0.0.0 209.165.202.131
B. ip route 209.165.201.0 255.255.255.224 209.165.202.130
C. ip route 0.0.0.0 0.0.0.0 209.165.200.224
D. ip route 209.165.200.224 255.255.255.224 209.165.202.129 254

Answer: D

NEW QUESTION 126
- (Topic 2)
An engineer configured an OSPF neighbor as a designated router. Which state verifies the designated router is in the proper mode?

A. Exchange
B. 2-way
C. Full
D. Init

Answer: C

NEW QUESTION 131
- (Topic 2)
Refer to the exhibit.

2passeasy

R17 Fa0/0 2001:db8:2::201/64
R17 Fa1/0 2001:db8:3::201/64
R17 Fa2/0 2001:db8:5::101/64

R18 Fa1/0 2001:db8:3::301/64
R18 Fa0/0 2001:db8:4::301/64

R16 Fa0/0 2001:db8:2::101/64

2001:db8:5::104/64

2001:db8:4::302/64
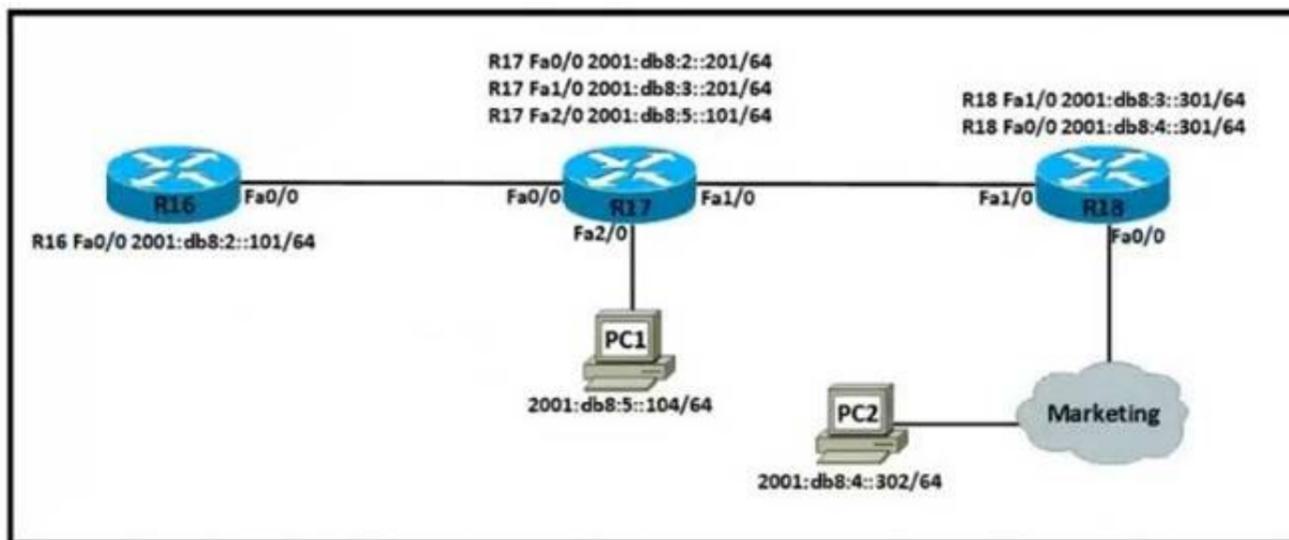
Which IPv6 configuration is required for R17 to successfully ping the WAN interface on R18?

A)

```
R17#
!
no ip domain lookup
ip cef
!
interface FastEthernet0/0
no ip address
duplex auto
speed auto
ipv6 address 2001:DB8:3::201/64
!
interface FastEthernet1/0
no ip address
duplex auto
speed auto
ipv6 address 2001:DB8:2::201/64
!
no cdp log mismatch duplex
ipv6 route 2001:DB8:4::/64 2001:DB8:5::101
```

B)

```
R17#
!
no ip domain lookup
ip cef
ipv6 unicast-routing
!
interface FastEthernet0/0
no ip address
duplex auto
speed auto
ipv6 address 2001:DB8:2::201/64
!
interface FastEthernet1/0
no ip address
duplex auto
speed auto
ipv6 address 2001:DB8:3::201/64
!
no cdp log mismatch duplex
ipv6 route 2001:DB8:4::/64 2001:DB8:3::301
```

C)

```
R17#
 !
 no ip domain lookup
 ip cef
 ipv6 cef
 !
 interface FastEthernet0/0
 no ip address
 duplex auto
 speed auto
 ipv6 address 2001:DB8:2::201/64
 !
 interface FastEthernet1/0
 no ip address
 duplex auto
 speed auto
 ipv6 address 2001:DB8:3::201/64
 !
 no cdp log mismatch duplex
 ipv6 route 2001:DB8:4::/64 2001:DB8:4::302
```

D)

```
R17#
 !
 no ip domain lookup
 ip cef
 ipv6 unicast-routing
 !
 interface FastEthernet0/0
 no ip address
 duplex auto
 speed auto
 ipv6 address 2001:DB8:2::201/64
 !
 interface FastEthernet1/0
 no ip address
 duplex auto
 speed auto
 ipv6 address 2001:DB8:3::201/64
 !
 no cdp log mismatch duplex
 ipv6 route 2001:DB8:4::/64 2001:DB8:2::201
```

A. Option A
B. Option B
C. Option C
D. Option D

Answer: B

Explanation:
 ipv6 unicast-routing statement included (IPv6 is enabled on the router).Compared to the exhibit, Fa0/0 and Fa0/1 have correct configurations.The route to subnet 2001:db8:4::/64 points to R18's Fa1/0 (correct next-hop).

NEW QUESTION 133
- (Topic 2)
A user configured OSPF in a single area between two routers A serial interface connecting R1 and R2 is running encapsulation PPP By default which OSPF network type is seen on this interface when the user types show ip ospf interface on R1 or R2?

A. port-to-multipoint
B. broadcast
C. point-to-point
D. nonbroadcast

Answer: C

Explanation:
 The default OSPF network type for HDLC and PPP on Serial link is point-to- point (while the default OSPF network type for Ethernet link is Broadcast).

NEW QUESTION 137
- (Topic 2)
When a WLAN with WPA2 PSK is configured in the Wireless LAN Controller GUI which format is supported?

A. Unicode
B. base64
C. decimal
D. ASCII

Answer: D

NEW QUESTION 142
- (Topic 2)
Which statement correctly compares traditional networks and controller-based networks?

A. Only traditional networks offer a centralized control plane
B. Only traditional networks natively support centralized management
C. Traditional and controller-based networks abstract policies from device configurations
D. Only controller-based networks decouple the control plane and the data plane

Answer: D

Explanation:
 Most traditional devices use a distributed architecture, in which each control plane is resided in a networking device. Therefore they need to communicate with each other via messages to work correctly.In contrast to distributed architecture, centralized (or controller-based) architectures centralizes the control of networking devices into one device, called SDN controller

NEW QUESTION 143
- (Topic 2)
Refer to the exhibit.

```
SW1(config-line)#line vty 0 15
SW1(config-line)#no login local
SW1(config-line)#password cisco

SW2(config)#username admin1 password abcd1234
SW2(config)#username admin2 password abcd1234
SW2(config-line)#line vty 0 15
SW2(config-line)#login local

SW3(config)#username admin1 secret abcd1234
SW3(config)#username admin2 secret abcd1234
SW3(config-line)#line vty 0 15
SW3(config-line)#login local

SW4(config)#username admin1 secret abcd1234
SW4(config)#username admin2 secret abcd1234
SW4(config-line)#line console 0
SW4(config-line)#login local
```

An administrator configures four switches for local authentication using passwords that are stored in a cryptographic hash. The four switches must also support SSH access for administrators to manage the network infrastructure. Which switch is configured correctly to meet these requirements?

A. SW1
B. SW2
C. SW3
D. SW4

Answer: C

NEW QUESTION 144
- (Topic 2)
What is the primary function of a Layer 3 device?

A. to analyze traffic and drop unauthorized traffic from the Internet
B. to transmit wireless traffic between hosts
C. to pass traffic between different networks
D. forward traffic within the same broadcast domain

Answer: C

NEW QUESTION 145
- (Topic 2)
Which statement about Link Aggregation when implemented on a Cisco Wireless LAN Controller is true?

A. To pass client traffic two or more ports must be configured.
B. The EtherChannel must be configured in "mode active"
C. When enabled the WLC bandwidth drops to 500 Mbps
D. One functional physical port is needed to pass client traffic

Answer: D

Explanation:
 Reference: https://www.cisco.com/c/en/us/td/docs/wireless/controller/8-2/config-guide/b_cg82/b_cg82_chapter_010101011.html

NEW QUESTION 150
- (Topic 2)
An engineer must establish a trunk link between two switches. The neighboring switch is set to trunk or desirable mode. What action should be taken?

A. configure switchport nonegotiate
B. configure switchport mode dynamic desirable
C. configure switchport mode dynamic auto
D. configure switchport trunk dynamic desirable

Answer: C

NEW QUESTION 154
- (Topic 2)
Refer to the exhibit.
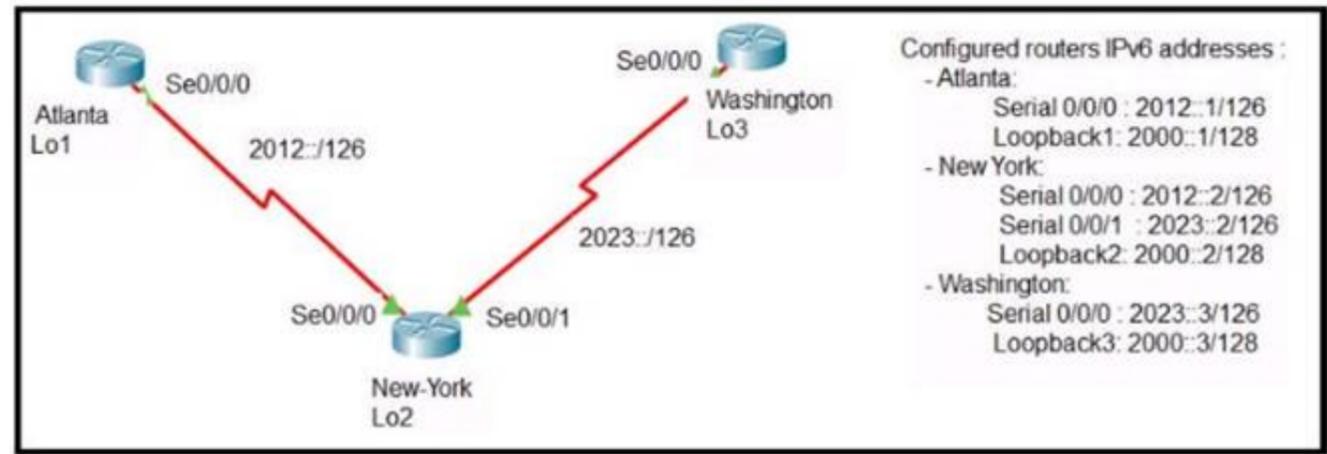
The New York router is configured with static routes pointing to the Atlanta and Washington sites. Which two tasks must be performed so that the Serial0/0/0 interfaces on the Atlanta and Washington routers can reach one another?
(Choose two.)

A. Configure the ipv6 route 2012::/126 2023::1 command on the Washington router.
B. Configure the ipv6 route 2023::/126 2012::1 command on the Atlanta router.
C. Configure the Ipv6 route 2012::/126 s0/0/0 command on the Atlanta router.
D. Configure the ipv6 route 2023::/126 2012::2 command on the Atlanta router.
E. Configure the ipv6 route 2012::/126 2023::2 command on the Washington router.

Answer: DE

Explanation:
 The short syntax of static IPv6 route is:ipv6 route <destination-IPv6-address>
{next-hop-IPv6-address | exit-interface}

NEW QUESTION 155
- (Topic 2)
What is the benefit of configuring PortFast on an interface?

A. After the cable is connected, the interface uses the fastest speed setting available for that cable type
B. After the cable is connected, the interface is available faster to send and receive user data
C. The frames entering the interface are marked with higher priority and then processed faster by a switch.
D. Real-time voice and video frames entering the interface are processed faster

Answer: B

NEW QUESTION 158

- (Topic 2)
What are two benefits of network automation? (Choose two)

A. reduced operational costs
B. reduced hardware footprint
C. faster changes with more reliable results
D. fewer network failures
E. increased network security

Answer: AC

NEW QUESTION 161
- (Topic 2)
A user configured OSPF and advertised the Gigabit Ethernet interface in OSPF By default, which type of OSPF network does this interface belong to?

A. point-to-multipoint
B. point-to-point
C. broadcast
D. nonbroadcast

Answer: C

Explanation:
https://www.oreilly.com/library/view/cisco-ios- cookbook/0596527225/ch08s15.html
The Broadcast network type is the default for an OSPF enabled ethernet interface (while Point-toPoint is the default OSPF network type for Serial interface with HDLC and PPP encapsulation).

NEW QUESTION 162
- (Topic 2)
What is the effect when loopback interfaces and the configured router ID are absent during the OSPF Process configuration?

A. No router ID is set, and the OSPF protocol does not run.
B. The highest up/up physical interface IP address is selected as the router ID.
C. The lowest IP address is incremented by 1 and selected as the router ID.
D. The router ID 0.0.0.0 is selected and placed in the OSPF process.

Answer: B

NEW QUESTION 166
- (Topic 2)
Refer to the exhibit.
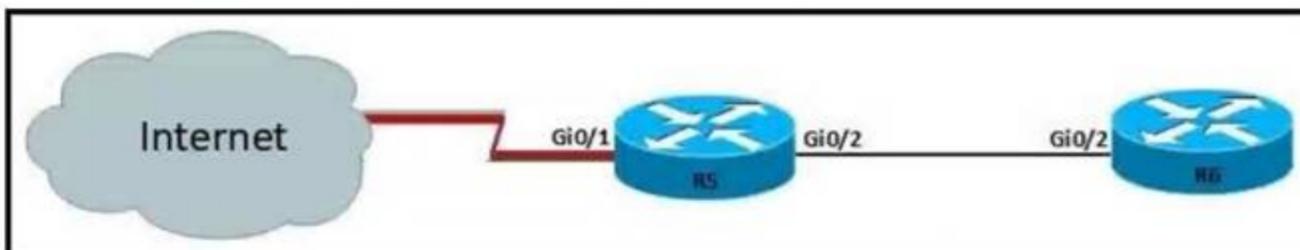
For security reasons, automatic neighbor discovery must be disabled on the R5 Gi0/1 interface. These tasks must be completed:
• Disable all neighbor discovery methods on R5 interface GiO/1.
• Permit neighbor discovery on R5 interface GiO/2.
• Verify there are no dynamically learned neighbors on R5 interface Gi0/1.
• Display the IP address of R6*s interface Gi0/2. Which configuration must be used?

⚪ R5(config)#**int Gi0/1**
　R5(config-if)#**no cdp run**
　R5(config-if)#**exit**
　R5(config)#**lldp run**
　R5(config)#**cdp enable**
　R5#**sh cdp neighbor**
　R5#**sh lldp neighbor**

☐ R5(config)#**int Gi0/1**
　R5(config-if)#**no cdp enable**
　R5(config-if)#**exit**
　R5(config)#**no lldp run**
　R5(config)#**cdp run**
　R5#**sh cdp neighbor**
　R5#**sh lldp neighbor**

⚪ R5(config)#**int Gi0/1**
　R5(config-if)#**no cdp enable**
　R5(config-if)#**exit**
　R5(config)#**no lldp run**
　R5(config)#**cdp run**
　R5#**sh cdp neighbor detail**
　R5#**sh lldp neighbor**

⚪ R5(config)#**int Gi0/1**
　R5(config-if)#**no cdp enable**
　R5(config-if)#**exit**
　R5(config)#**lldp run**
　R5(config)#**no cdp run**
　R5#**sh cdp neighbor detail**
　R5#**sh lldp neighbor**

A. Option A
B. Option B
C. Option C
D. Option D

Answer: C

NEW QUESTION 171
- (Topic 2)
Refer to the exhibit.

```
R1#config t
R1(config)# interface gi1/1
R1(config-if)# ip address 192.168.0.1 255.255.255.0

R1(config)# router bgp 65000
R1(config-router)# neighbor 192.168.0.2 remote-as 65001
R1(config-router)# network 10.1.1.0 mask 255.255.255.0

R1(config)# router ospf 1
R1(config)# router-id 1.1.1.1
R1(config)# network 192.168.0.1 0.0.0.0 area 0
R1(config)# network 10.1.1.0 0.0.0.255 area 0

R1(config)# router eigrp 1
R1(config)# eigrp router-id 1.1.1.1
R1(config)# network 10.1.1.0 0.0.0.255
R1(config)# network 192.168.0.1 0.0.0.0

R2#config t
R2(config)# interface gi1/1
R2(config-if)# ip address 192.168.0.2 255.255.255.0

R2#config t
R2(config)# router bgp 65001
R2(config-router)# neighbor 192.168.0.1 remote-as 65000

R2(config)# router ospf 1
R2(config)# router-id 2.2.2.2
R2(config)# network 192.168.1.2 0.0.0.0 area 0

R2(config)# router eigrp 1
R2(config)# eigrp router-id 1.1.1.1
R2(config)# network 192.168.0.1 0.0.0.0

R2(config)# ip route 10.1.1.0 255.255.255.0 192.168.0.1
```

Router R2 is configured with multiple routes to reach network 10 1.1 0/24 from router R1. What protocol is chosen by router R2 to reach the destination network 10.1 1 0/24?

A. eBGP
B. static
C. OSPF
D. EIGRP

Answer: B

NEW QUESTION 175
- (Topic 2)
What are two reasons that cause late collisions to increment on an Ethernet interface? (Choose two)

A. when the sending device waits 15 seconds before sending the frame again
B. when the cable length limits are exceeded
C. when one side of the connection is configured for half-duplex
D. when Carrier Sense Multiple Access/Collision Detection is used
E. when a collision occurs after the 32nd byte of a frame has been transmitted

Answer: BC

Explanation:
 The usual possible causes are full-duplex/half-duplex mismatch, exceeded Ethernet cable length limits, or defective hardware such as incorrect cabling, non-compliant number of hubs in the network, or a bad NIC.

NEW QUESTION 180
- (Topic 2)
A network administrator must to configure SSH for remote access to router R1 The requirement is to use a public and private key pair to encrypt management traffic to and from the connecting client.
Which configuration, when applied, meets the requirements?

```
R1#enable
R1#configure terminal
R1(config)#ip domain-name cisco.com
R1(config)#crypto key generate ec keysize 2048
```

```
R1#enable
R1#configure terminal
R1(config)#ip domain-name cisco.com
R1(config)#crypto key generate rsa modulus 1024
```

```
R1#enable
R1#configure terminal
R1(config)#ip domain-name cisco.com
R1(config)#crypto key generate ec keysize 1024
```

```
R1#enable
R1#configure terminal
R1(config)#ip domain-name cisco.com
R1(config)#crypto key encrypt rsa name myKey
```

A. Option A
B. Option B
C. Option C
D. Option D

Answer: C

NEW QUESTION 181
- (Topic 2)
Which mode must be set for APs to communicate to a Wireless LAN Controller using the Control and Provisioning of Wireless Access Points (CAPWAP) protocol?

A. bridge
B. route
C. autonomous
D. lightweight

Answer: D

NEW QUESTION 183
- (Topic 2)
What is the expected outcome when an EUI-64 address is generated?

A. The seventh bit of the original MAC address of the interface is inverted
B. The interface ID is configured as a random 64-bit value
C. The characters FE80 are inserted at the beginning of the MAC address of the interface
D. The MAC address of the interface is used as the interface ID without modification

Answer: A

NEW QUESTION 185
- (Topic 2)
Refer to Exhibit.
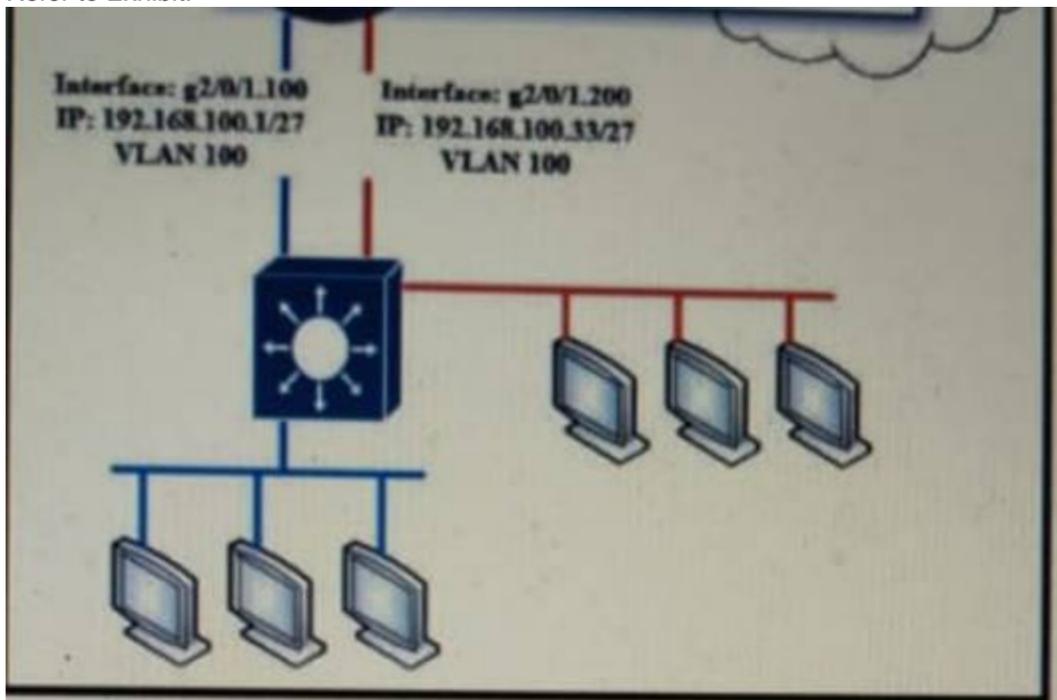
Which configuration must be applied to the router that configures PAT to translate all addresses in VLAN 200 while allowing devices on VLAN 100 to use their own IP addresses?

A. Option A
B. Option B
C. Option C
D. Option D

Answer: D

NEW QUESTION 189
- (Topic 2)
What Is a syslog facility?

A. Host that is configured for the system to send log messages
B. password that authenticates a Network Management System to receive log messages
C. group of log messages associated with the configured severity level
D. set of values that represent the processes that can generate a log message

Answer: C

Explanation:
 Cisco Community – Difference between logging level and logging facility Post by ahmednaas
"The logging facility command basically tells the syslog server where to put the log message. You configure the syslog server with something like:
local7.debug /var/adm/local7.log
Now, when you use the "logging facility local7" on your device, all messages with severity "debug" or greater should be saved in /var/adm/local7.log."
Example: on a switch, any process (CDP, SNMP, etc.) can generate a log message. On a syslog server, the logging facility is the place where all received messages with the same priority level are stored.

NEW QUESTION 194
- (Topic 2)
An engineer must configure traffic for a VLAN that is untagged by the switch as it crosses a trunk link. Which command should be used?

A. switchport trunk allowed vlan 10
B. switchport trunk native vlan 10
C. switchport mode trunk
D. switchport trunk encapsulation dot1q

Answer: B

NEW QUESTION 199
- (Topic 2)
Which goal is achieved by the implementation of private IPv4 addressing on a network?

A. provides an added level of protection against Internet exposure
B. provides a reduction in size of the forwarding table on network routers
C. allows communication across the Internet to other private networks
D. allows servers and workstations to communicate across public network boundaries

Answer: A

NEW QUESTION 201
- (Topic 2)
When a WPA2-PSK WLAN is configured in the wireless LAN Controller, what is the minimum number of characters that in ASCII format?

A. 6
B. 8
C. 12
D. 18

Answer: B

NEW QUESTION 205
- (Topic 2)
With REST API, which standard HTTP header tells a server which media type is expected by the client?

A. Accept-Encoding: gzi
B. deflate
C. Accept-Patch: text/example; charset=utf-8
D. Content-Type: application/json; charset=utf-8
E. Accept: application/json

Answer: D

Explanation:
 Accept header is a way for a client to specify the media type of the response content it is expecting and Content-type is a way to specify the media type of request being sent from the client to the server.
http://www.java-allandsundry.com/2012/08/accept-header-vs-content-type-
header.html#:~:text=Accept%20and%20Content%2Dtype%20are,the%20client%20to%20t he%20server

NEW QUESTION 208
- (Topic 2)

10.10.225.0/28   10.10.225.16/28   10.10.225.64/26   20 Hosts
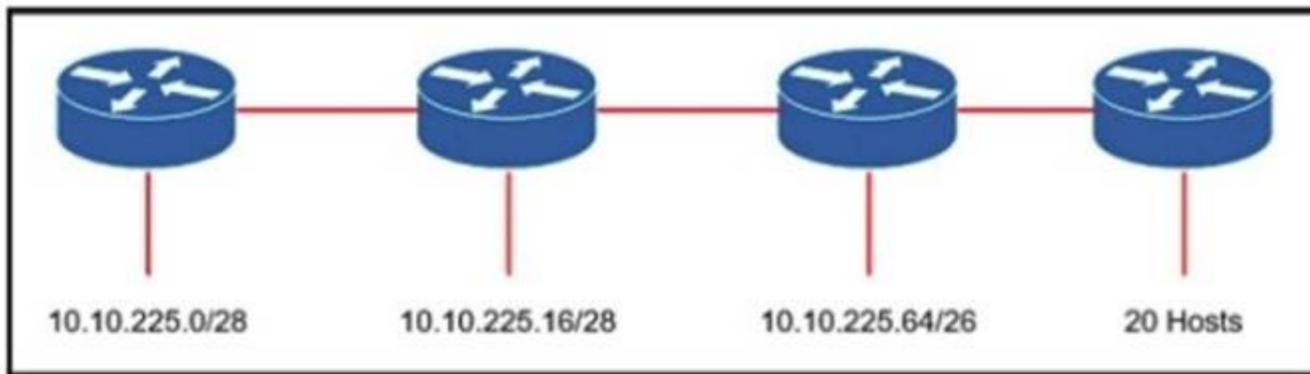
Refer to the exhibit. An engineer must add a subnet for a new office that will add 20 users to the network. Which IPv4 network and subnet mask combination does the engineer assign to minimize wasting addresses?

A. 10.10.225.48 255.255.255.240
B. 10.10.225.32 255.255.255.240
C. 10.10.225.48 255.255.255.224
D. 10.10.225.32 255.255.255.224

Answer: D

NEW QUESTION 213
- (Topic 2)
An administrator must secure the WLC from receiving spoofed association requests. Which steps must be taken to configure the WLC to restrict the requests and force the user to wait 10 ms to retry an association request?

A. Enable Security Association Teardown Protection and set the SA Query timeout to 10
B. Enable MAC filtering and set the SA Query timeout to 10
C. Enable 802.1x Layer 2 security and set me Comeback timer to 10
D. Enable the Protected Management Frame service and set the Comeback timer to 10

Answer: C

NEW QUESTION 217
- (Topic 2)
How does CAPWAP communicate between an access point in local mode and a WLC?

A. The access point must directly connect to the WLC using a copper cable
B. The access point must not be connected to the wired network, as it would create a loop
C. The access point must be connected to the same switch as the WLC
D. The access point has the ability to link to any switch in the network, assuming connectivity to the WLC

Answer: D

NEW QUESTION 219
- (Topic 2)
Which 802.11 frame type is indicated by a probe response after a client sends a probe request?

A. action
B. management
C. control
D. data

Answer: B

NEW QUESTION 223
- (Topic 2)
Which network plane is centralized and manages routing decisions?

A. policy plane
B. management plane
C. control plane
D. data plane

Answer: C

NEW QUESTION 227
- (Topic 2)
Refer to the exhibit.

```
      10.0.0.0/24 is subsetted, 1 subnets
C         10.0.0.0 is directly connected, FastEthernet0/1
C      172.160.0/16 is directly connected, FastEthernet0/0
D      192.168.0.0/24 [90/30720] via 172.16.0.2, 00:00:03, FastEthernet0/0
```

Which route type does the routing protocol Code D represent in the output?

A. internal BGP route
B. /24 route of a locally configured IP
C. statically assigned route
D. route learned through EIGRP

Answer: D

NEW QUESTION 228
- (Topic 2)
A router running EIGRP has learned the same route from two different paths. Which parameter does the router use to select the best path?

A. cost
B. adminstrative distance
C. metric
D. as-path

Answer: C

Explanation:
If a router learns two different paths for the same network from the same routing protocol, it has to decide which route is better and will be placed in the routing table. Metric is the measure used to decide which route is better (lower number is better). Each routing protocol uses its own metric.For example, RIP uses hop counts as a metric, while OSPF uses cost.

NEW QUESTION 232
- (Topic 2)
Which port type supports the spanning-tree portfast command without additional configuration?

A. access ports
B. Layer 3 main Interfaces
C. Layer 3 suninterfaces
D. trunk ports

Answer: A

NEW QUESTION 233
- (Topic 2)
Refer to the exhibit.

```
R1# show ip route | begin gateway
Gateway of last resort is 209.165.200.246 to network 0.0.0.0
S*    0.0.0.0/0 [1/0] via 209.165.200.246, Serial0/1/0
      is directly connected, Serial0/1/0
      172.16.0.0/16 is variably subnetted, 2 subnets, 2 masks
S     172.16.3.0/24 [1/0] via 207.165.200.250, Serial0/0/0
O     172.16.3.0/28 [110/84437] via 207.165.200.254, 00:00:28, Serial0/0/1
      207.165.200.0/24 is variably subnetted, 6 subnets, 2 masks
C     207.165.200.244/30 is directly connected, Serial0/1/0
L     207.165.200.245/32 is directly connected, Serial0/1/0
C     207.165.200.248/30 is directly connected, Serial0/0/0
L     207.165.200.249/32 is directly connected, Serial0/0/0
C     207.165.200.252/30 is directly connected, Serial0/0/1
L     207.165.200.253/32 is directly connected, Serial0/0/1
```

A packet is being sent across router R1 to host 172.163.3.14. To which destination does the router send the packet?

A. 207.165.200.246 via Serial0/1/0
B. 207.165.200.254 via Serial0/0/1
C. 207.165.200.254 via Serial0/0/0
D. 207.165.200.250 via Serial/0/0/0

Answer: B

NEW QUESTION 235
- (Topic 2)
Which JSON data type is an unordered set of attribute- value pairs?

A. array
B. string
C. object
D. Boolean

Answer: C

NEW QUESTION 239
- (Topic 2)
What are two characteristics of a controller-based network? (Choose two)

A. The administrator can make configuration updates from the CLI
B. It uses northbound and southbound APIs to communicate between architectural layers
C. It moves the control plane to a central point.

D. It decentralizes the control plane, which allows each device to make its own forwarding decisions
E. It uses Telnet to report system issues.

Answer: BC

NEW QUESTION 241
- (Topic 2)
How does a Cisco Unified Wireless network respond to Wi-Fi channel overlap?

A. It alternates automatically between 2.4 GHz and 5 GHz on adjacent access points
B. It allows the administrator to assign channels on a per-device or per-interface basis.
C. It segregates devices from different manufacturers onto different channels.
D. It analyzes client load and background noise and dynamically assigns a channel.

Answer: A

NEW QUESTION 242
- (Topic 2)
Refer to the exhibit.

```
R1#show ip interface brief
Interface              IP-Address      OK? Method Status                 Protocol
FastEthernet0/0        unassigned      YES NVRAM  administratively down   down
GigabitEthernet1/0     192.168.0.1     YES NVRAM  up                      up
GigabitEthernet2/0     10.10.1.10      YES manual up                      up
GigabitEthernet3/0     10.10.10.20     YES manual up                      up
GigabitEthernet4/0     unassigned      YES NVRAM  administratively down   down
Loopback0              172.16.15.10    YES manual
```

What does router R1 use as its OSPF router-ID?

A. 10.10.1.10
B. 10.10.10.20
C. 172.16.15.10
D. 192.168.0.1

Answer: C

Explanation:
 OSPF uses the following criteria to select the router ID:1. Manual configuration of the router ID (via the "router-id x.x.x.x" command under OSPF router configuration mode).2. Highest IP address on a loopback interface.3. Highest IP address on a non-loopback and active (no shutdown) interface.

NEW QUESTION 244
- (Topic 2)
What is the purpose of an SSID?

A. It provides network security
B. It differentiates traffic entering access posits
C. It identities an individual access point on a WLAN
D. It identifies a WLAN

Answer: D

Explanation:
 "In IEEE 802.11 wireless local area networking standards (including Wi-Fi), a service set is a group of wireless network devices which share a service set identifier (SSID)… A service set forms a logical network of nodes operating with shared link-layer networking parameters; they form one logical network segment."

NEW QUESTION 248
- (Topic 2)
How do traditional campus device management and Cisco DNA Center device management differ in regards to deployment?

A. Cisco DNA Center device management can deploy a network more quickly thantraditional campus device management
B. Traditional campus device management allows a network to scale more quickly than with Cisco DNA Center device management
C. Cisco DNA Center device management can be implemented at a lower cost than most traditional campus device management options
D. Traditional campus device management schemes can typically deploy patches and updates more quickly than Cisco DNA Center device management

Answer: A

NEW QUESTION 253
- (Topic 2)
Which QoS tool is used to optimize voice traffic on a network that is primarily intended for data traffic?

A. FIFO
B. WFQ
C. PQ
D. WRED

Answer: C

NEW QUESTION 255
- (Topic 2)
An organization secures its network with multi-factor authentication using an authenticator app on employee smartphone. How is the application secured in the case of a user's smartphone being lost or stolen?

A. The application requires an administrator password to reactivate after a configured Interval.
B. The application requires the user to enter a PIN before it provides the second factor.
C. The application challenges a user by requiring an administrator password to reactivate when the smartphone is rebooted.
D. The application verifies that the user is in a specific location before it provides the second factor.

Answer: B

NEW QUESTION 260
- (Topic 2)
Which IPv6 address type provides communication between subnets and is unable to route on the Internet?

A. global unicast
B. unique local
C. link-local
D. multicast

Answer: B

NEW QUESTION 263
- (Topic 1)
Which access layer threat-mitigation technique provides security based on identity?

A. Dynamic ARP Inspection
B. using a non-default native VLAN
C. 802.1x
D. DHCP snooping

Answer: C

NEW QUESTION 268
DRAG DROP - (Topic 2)
Drag and drop the descriptions from the left onto the configuration-management technologies on the right.

A. Mastered
B. Not Mastered

Answer: A

Explanation:
Ansible:– uses SSH for remote device communication– uses YAML for fundamental configuration elements
Chef:– uses TCP port 10002 for configuration push jobs– uses Ruby for fundamental configuration elements
Puppet:– fundamental configuration elements are stored in a manifest– uses TCP 8140 for communication
The focus of Ansible is to be streamlined and fast, and to require no node agent installation.Thus, Ansible performs all functions over SSH. Ansible is built on Python, in contrast to the Ruby foundation of Puppet and Chef.TCP port 10002 is the command port. It may be configured in the Chef Push Jobs configuration file .This port allows Chef Push Jobs clients to communicate with the Chef Push Jobs server.Puppet is an open-source configuration management solution, which is built with Ruby and offers custom Domain Specific Language (DSL) and Embedded Ruby (ERB) templates to create custom Puppet language files, offering a declarative-paradigm programming approach.A Puppet piece of code is called a manifest, and is a file with .pp extension.

NEW QUESTION 269
DRAG DROP - (Topic 1)
Drag and drop the SNMP components from the left onto the descriptions on the right.

A. Mastered
B. Not Mastered

Answer: A

Explanation:
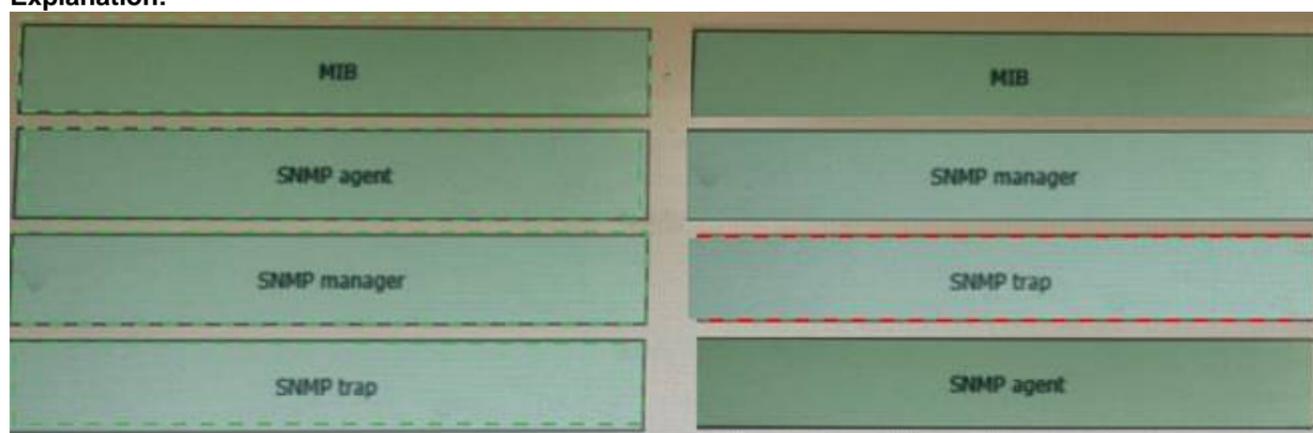
NEW QUESTION 272
- (Topic 1)
Refer to the exhibit.

```
import ncclient

with ncclient.manager.connect(host='192.168.1.1', port=830, username='root',
                              password='teset123!', allow_agent=False) as m:
    print(m.get_config('running').data_xml)
```

After running the code in the exhibit, which step reduces the amount of data that the NETCONF server returns to the NETCONF client, to only the interface's configuration?

A. Use the lxml library to parse the data returned by the NETCONF server for the interface's configuration.
B. Create an XML filter as a string and pass it to get_config() method as an argument.
C. Create a JSON filter as a string and pass it to the get_config() method as an argument.
D. Use the JSON library to parse the data returned by the NETCONF server for the interface's configuration.

Answer: D

NEW QUESTION 275
- (Topic 1)
Refer to the exhibit.
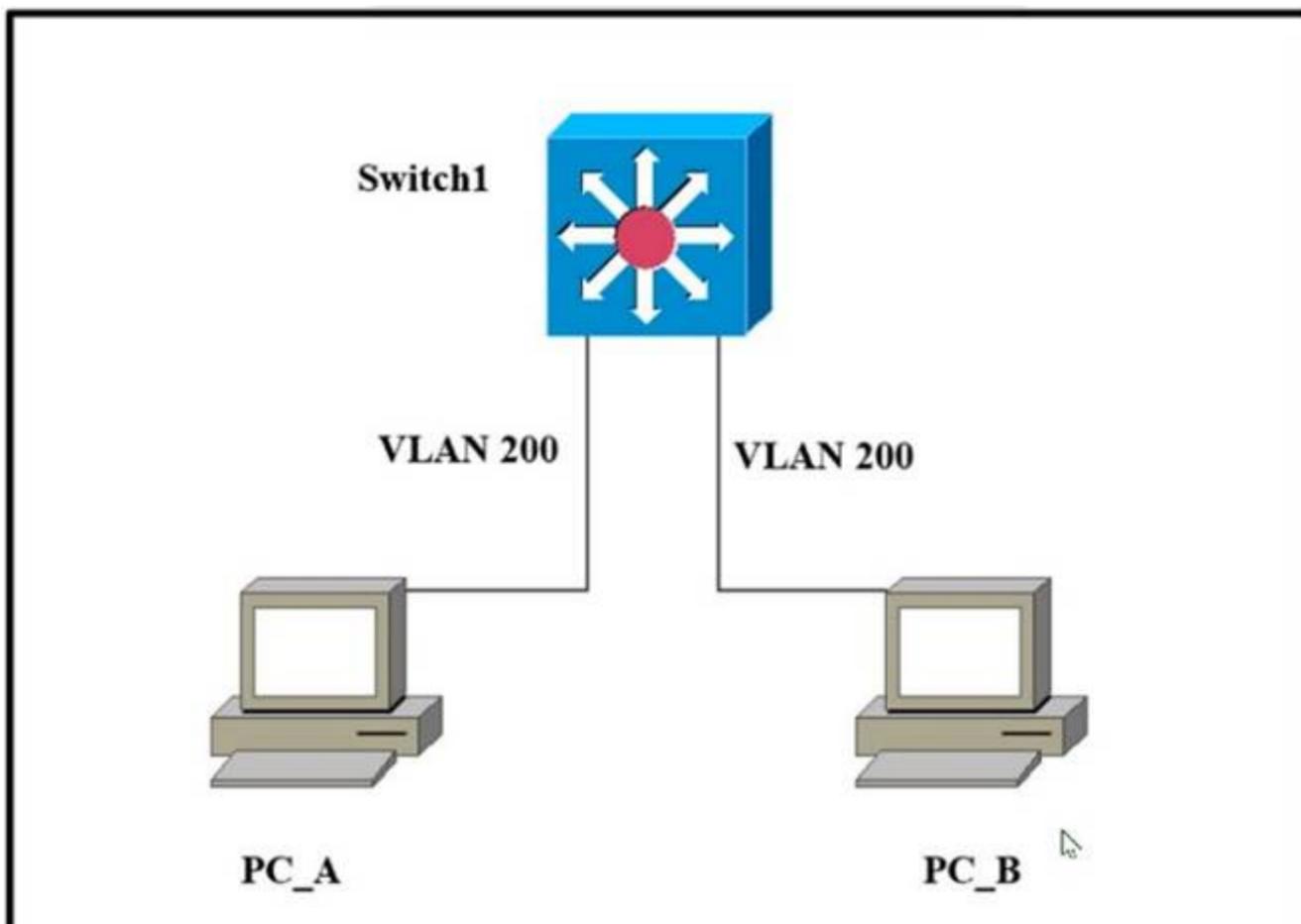
Which outcome is expected when PC_A sends data to PC_B?

A. The switch rewrites the source and destination MAC addresses with its own.
B. The source MAC address is changed.
C. The source and destination MAC addresses remain the same.
D. The destination MAC address is replaced with ffff.ffff.ffff.

Answer: C

NEW QUESTION 280
- (Topic 1)
What are network endpoints?

A. act as routers to connect a user to the service prowler network
B. a threat to the network if they are compromised
C. support inter-VLAN connectivity
D. enforce policies for campus-wide traffic going to the internet

Answer: B

NEW QUESTION 282
- (Topic 1)
Refer to the exhibit.
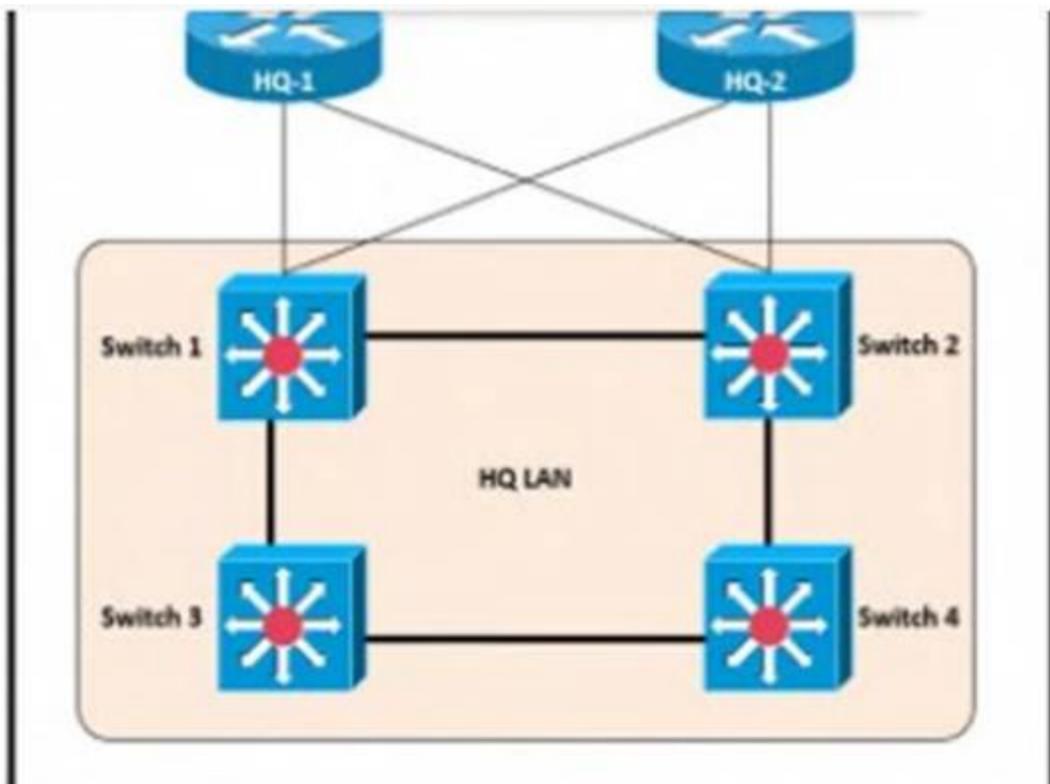
After the election process what is the root bridge in the HQ LAN?

```
Switch 1: 0C:E0:38:58:15:77
Switch 2: 0C:0E:15:22:1A:61
Switch 3: 0C:0E:15:1D:3C:9A
Switch 4: 0C:E0:19:A1:4D:16
```

A. Switch 1
B. Switch 2
C. Switch 3
D. Switch 4

Answer: C

Explanation:
The root bridge is determined by the lowest bridge ID, which consists of the priority value and the MAC address. Because the priority values of all of the switches are not avalable, the MAC address is used to determine the root bridge. Because S3 has the lowest MAC address, S3 becomes the root bridge.

NEW QUESTION 285
- (Topic 1)
How do TCP and UDP differ in the way they guarantee packet delivery?

A. TCP uses checksum, acknowledgement, and retransmissions, and UDP uses checksums only.
B. TCP uses two-dimensional parity checks, checksums, and cyclic redundancy checks and UDP uses retransmissions only.
C. TCP uses checksum, parity checks, and retransmissions, and UDP uses acknowledgements only.
D. TCP uses retransmissions, acknowledgement and parity checks and UDP uses cyclic redundancy checks only.

Answer: A

NEW QUESTION 288
- (Topic 1)
What occurs when overlapping Wi-Fi channels are implemented?

A. The wireless network becomes vulnerable to unauthorized access.
B. Wireless devices are unable to distinguish between different SSIDs
C. Users experience poor wireless network performance.
D. Network communications are open to eavesdropping.

Answer: C

NEW QUESTION 293
- (Topic 1)
What mechanism carries multicast traffic between remote sites and supports encryption?

A. ISATAP
B. GRE over iPsec
C. iPsec over ISATAP
D. GRE

Answer: B

NEW QUESTION 296
- (Topic 1)
Which virtual MAC address is used by VRRP group 1?

A. 0050.0c05.ad81
B. 0007.c061.bc01
C. 0000.5E00.0101
D. 0500.3976.6401

Answer: C

Explanation:
The virtual router MAC address associated with a virtual router is an IEEE 802 MAC Address in the following format:
00-00-5E-00-01-{VRID} (in hex in internet standard bit-order)

NEW QUESTION 300
- (Topic 1)
What is a characteristic of cloud-based network topology?

A. wireless connections provide the sole access method to services
B. onsite network services are provided with physical Layer 2 and Layer 3 components
C. services are provided by a public, private, or hybrid deployment
D. physical workstations are configured to share resources

Answer: A

NEW QUESTION 305
- (Topic 1)
Which CRUD operation corresponds to the HTTP GET method?

A. read
B. update
C. create
D. delete

Answer: A

Explanation:
 GET: This method retrieves the information identified by the request URI. In the context of the RESTful web services, this method is used to retrieve resources. This is the method used for read operations (the R in CRUD).
https://hub.packtpub.com/crud-operations-rest/

NEW QUESTION 307
- (Topic 1)
What is a benefit of using a Cisco Wireless LAN Controller?

A. Central AP management requires more complex configurations
B. Unique SSIDs cannot use the same authentication method
C. It supports autonomous and lightweight APs
D. It eliminates the need to configure each access point individually

Answer: D

NEW QUESTION 312
DRAG DROP - (Topic 1)
Drag and drop the descriptions of file-transfer protocols from the left onto the correct protocols on the right.
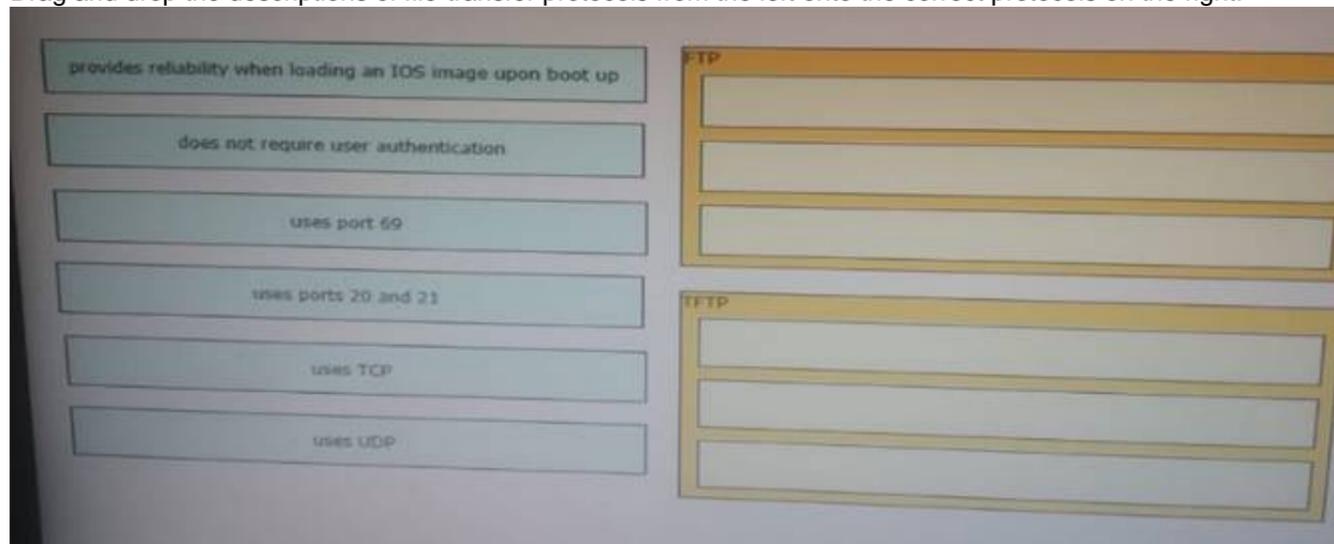
A. Mastered
B. Not Mastered

Answer: A

Explanation:
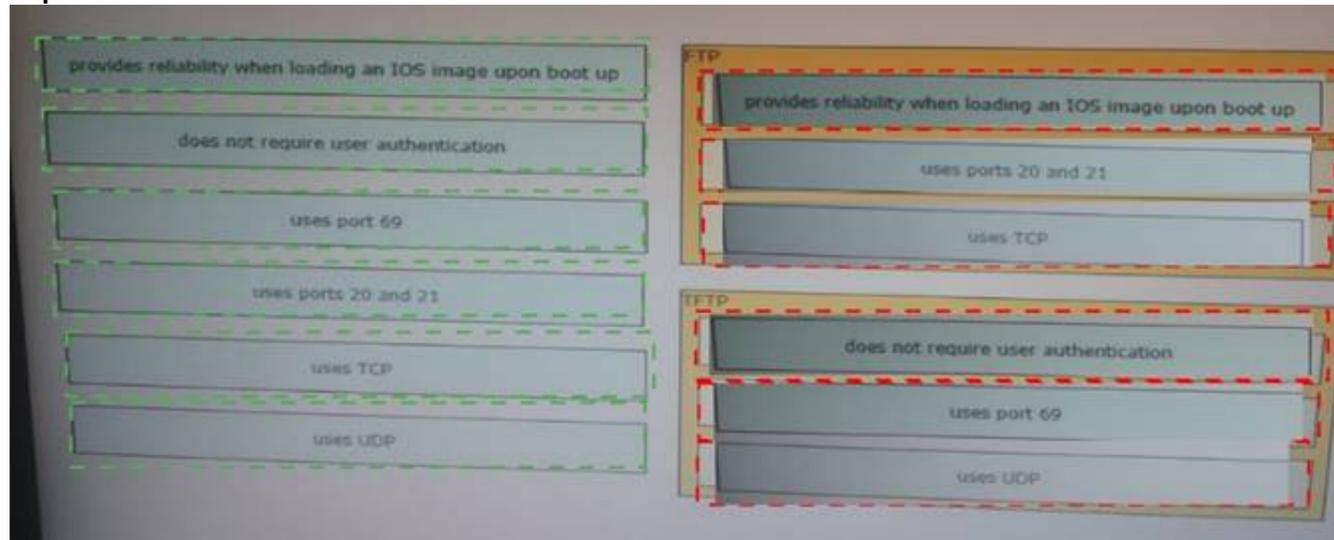
NEW QUESTION 313
- (Topic 1)
What is a DHCP client?

A. a host that is configured to request an IP address automatically

B. a server that dynamically assigns IP addresses to hosts
C. a workstation that requests a domain name associated with its IP address
D. a rooter that statically assigns IP addresses to hosts

Answer: A

NEW QUESTION 317
- (Topic 1)
Which type of wireless encryption is used for WPA2 in preshared key mode?

A. TKIP with RC4
B. RC4
C. AES-128
D. AES-256

Answer: D

Explanation:
We can see in this picture we have to type 64 hexadecimal characters (256 bit) for the WPA2 passphrase so we can deduce the encryption is AES-256, not AES-128.

https://www.cisco.com/c/en/us/support/docs/wireless-mobility/wireless-lan-wlan/67134- wpa2-config.html
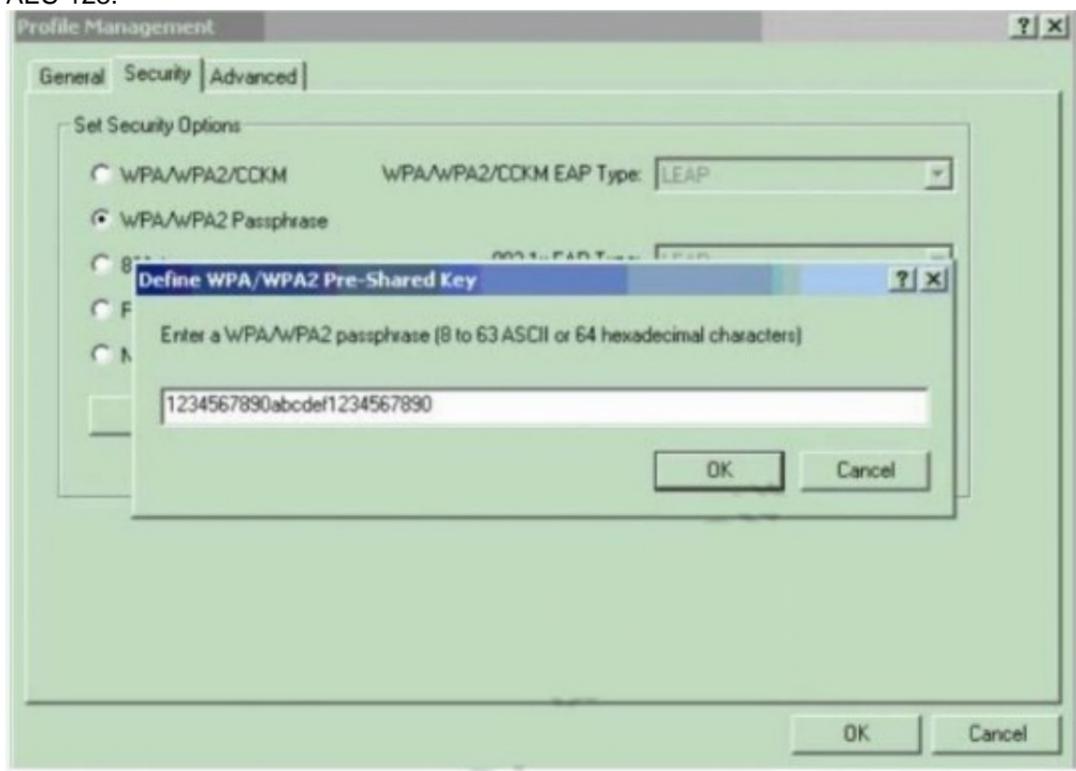
NEW QUESTION 321
DRAG DROP - (Topic 1)
Drag and drop the WLAN components from the left onto the correct descriptions on the right.

access point		device that manages access points
virtual interface		device that provides Wi-Fi devices with a connection to a wired network
dynamic interface		used for out of band management of a WLC
service port		used to support mobility management of the WLC
wireless LAN controller		applied to the WLAN for wireless client communication

A. Mastered
B. Not Mastered

Answer: A

Explanation:

access point		wireless LAN controller
virtual interface		access point
dynamic interface		service port
service port		virtual interface
wireless LAN controller		dynamic interface
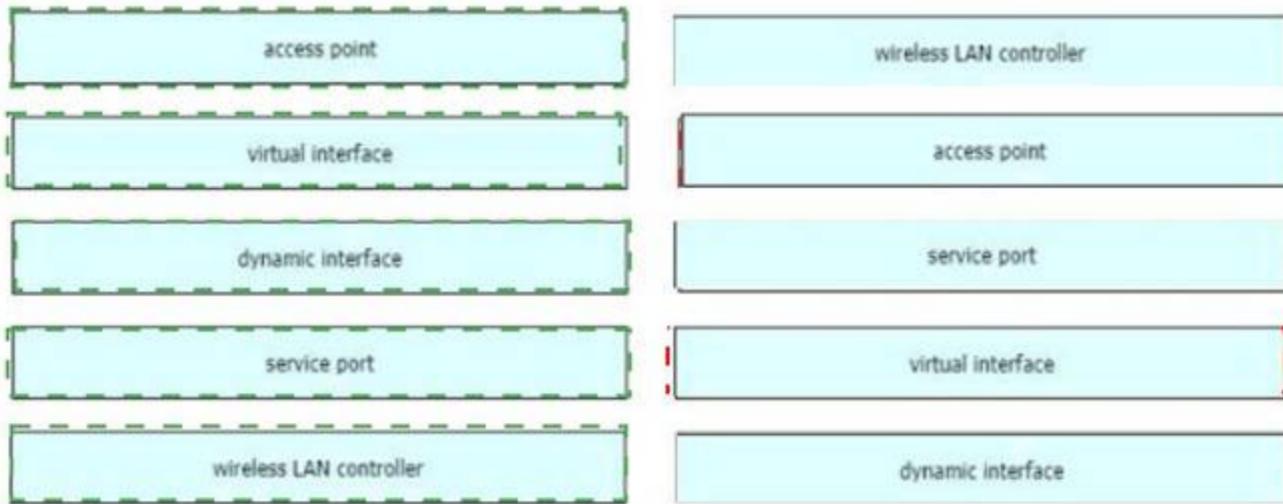
NEW QUESTION 323
- (Topic 1)
What is the default behavior of a Layer 2 switch when a frame with an unknown destination MAC address is received?

A. The Layer 2 switch drops the received frame
B. The Layer 2 switch floods packets to all ports except the receiving port in the given VLAN.
C. The Layer 2 switch sends a copy of a packet to CPU for destination MAC address learning.
D. The Layer 2 switch forwards the packet and adds the destination MAC address to its MAC address table

Answer: B

Explanation:
If the destination MAC address is not in the CAM table (unknown destination MAC address), the switch sends the frame out all other ports that are in the same VLAN as the received frame. This is called flooding. It does not flood the frame out the same port on which the frame was received.

NEW QUESTION 325
- (Topic 1)
What must be considered when using 802:11 ta?

A. It is compatible with 802 lib- and 802 11-compliant wireless devices
B. It is used in place of 802 11b/g when many nonoverlapping channels are required
C. It is susceptible to interference from 2 4 GHz devices such as microwave ovens.
D. It is chosen over 802 11b/g when a lower-cost solution is necessary

Answer: A

NEW QUESTION 326
- (Topic 1)
Refer to the exhibit.
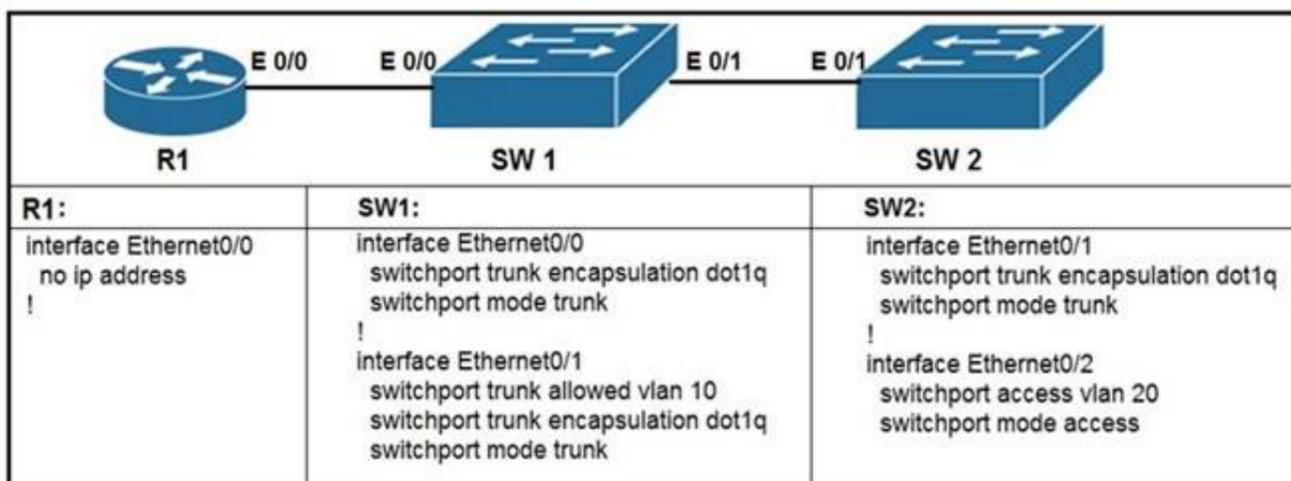
What commands are needed to add a subinterface to Ethernet0/0 on R1 to allow for VLAN 20, with IP address 10.20.20.1/24?

A. R1(config)#interface ethernet0/0 R1(config)#encapsulation dot1q 20R1(config)#ip address 10.20.20.1 255.255.255.0
B. R1(config)#interface ethernet0/0.20 R1(config)#encapsulation dot1q 20R1(config)#ip address 10.20.20.1 255.255.255.0
C. R1(config)#interface ethernet0/0.20 R1(config)#ip address 10.20.20.1 255.255.255.0
D. R1(config)#interface ethernet0/0 R1(config)#ip address 10.20.20.1 255.255.255.0

Answer: B

NEW QUESTION 328
- (Topic 1)
Which command prevents passwords from being stored in the configuration as plain text on a router or switch?

A. enable secret
B. service password-encryption
C. username Cisco password encrypt

D. enable password

Answer: B

NEW QUESTION 332
- (Topic 1)
How does a switch process a frame received on Fa0/1 with the destination MAC address of 0e38.7363.657b when the table is missing the address?

A. It drops the frame immediately.
B. It forwards the frame back out of interface Fa0/1.
C. It floods the frame to all interfaces except Fa0/1.
D. It holds the frame until the MAC address timer expires and then drops the frame.

Answer: C

NEW QUESTION 333
- (Topic 1)
An engineer needs to add an old switch back into a network. To prevent the switch from corrupting the VLAN database which action must be taken?

A. Add the switch in the VTP domain with a lower revision number
B. Add the switch with DTP set to dynamic desirable
C. Add the switch in the VTP domain with a higher revision number
D. Add the switch with DTP set to desirable

Answer: A

NEW QUESTION 337
- (Topic 1)
An engineer is asked to protect unused ports that are configured in the default VLAN on a switch.
Which two steps will fulfill the request? (Choose two)

A. Configure the ports in an EtherChannel.
B. Administratively shut down the ports
C. Configure the port type as access and place in VLAN 99
D. Configure the ports as trunk ports
E. Enable the Cisco Discovery Protocol

Answer: BC

NEW QUESTION 338
- (Topic 1)
What is a difference between local AP mode and FiexConnet AP mode?

A. Local AP mode creates two CAPWAP tunnels per AP to the WLC
B. FiexConnect AP mode fails to function if the AP loses connectivity with the WLC
C. FlexConnect AP mode bridges the traffic from the AP to the WLC when local switching is configured
D. Local AP mode causes the AP to behave as if it were an autonomous AP

Answer: A

NEW QUESTION 342
- (Topic 1)
An engineer must configure the IPv6 address 2001:0db8:0000:0000:0700:0003:400F:572B on the serial0/0 interface of the HQ router and wants to compress it for easier configuration. Which command must be issued on the router interface?

A. ipv6 address 2001:db8::700:3:400F:572B
B. ipv6 address 2001:db8:0::700:3:4F:572B
C. ipv6 address 2001:Odb8::7:3:4F:572B
D. ipv6 address 2001::db8:0000::700:3:400F:572B

Answer: A

NEW QUESTION 344
- (Topic 1)
Which two events occur automatically when a device is added to Cisco DNA Center?
(Choose two.)

A. The device Is assigned to the Global site.
B. The device Is placed into the Unmanaged state.
C. The device is placed into the Provisioned state.
D. The device is placed into the Managed state.
E. The device is assigned to the Local site.

Answer: AB

NEW QUESTION 348

- (Topic 1)
Which network allows devices to communicate without the need to access the Internet?

A. 1729.0.0/16
B. 172.28.0.0/16
C. 192.0.0.0/8
D. 209.165.201.0/24

Answer: B

Explanation:
The private ranges of each class of IPv4 are listed below:
Class A private IP address ranges from 10.0.0.0 to 10.255.255.255 Class B private IP address ranges from 172.16.0.0 to 172.31.255.255 Class C private IP address ranges from 192.168.0.0 to 192.168.255.255 Only the network 172.28.0.0/16 belongs to the private IP address (of class B).

NEW QUESTION 349
- (Topic 1)
What is a DHCP client?

A. a workstation that requests a domain name associated with its IP address
B. a host that is configured to request an IP address automatically
C. a server that dynamically assigns IP addresses to hosts.
D. a router that statically assigns IP addresses to hosts.

Answer: B

NEW QUESTION 354
- (Topic 1)
What is the primary purpose of a First Hop Redundancy Protocol?

A. It allows directly connected neighbors to share configuration information.
B. It allows a router to use bridge priorities to create multiple loop-free paths to a single destination.
C. It reduces routing failures by allowing Layer 3 load balancing between OSPF neighbors that have the same link metric.
D. It reduces routing failures by allowing more than one router to represent itself, as the default gateway of a network.

Answer: D

NEW QUESTION 355
- (Topic 1)
How is the native VLAN secured in a network?

A. separate from other VLANs within the administrative domain
B. give it a value in the private VLAN range
C. assign it as VLAN 1
D. configure it as a different VLAN ID on each end of the link

Answer: A

NEW QUESTION 360
DRAG DROP - (Topic 1)
An engineer is configuring an encrypted password for the enable command on a router
where the local user database has already been configured Drag and drop the configuration commands from the left into the correct sequence on the right Not all commands are used

A. Mastered
B. Not Mastered

Answer: A

Explanation:

configure terminal		enable	
enable		configure terminal	
enable secret $hf!@4fs		enable secret $hf!@4fs	
exit		line vty 0 4	
line vty 0 4			
service password-encryption			

NEW QUESTION 364

- (Topic 1)

A network administrator is asked to configure VLANS 2, 3 and 4 for a new implementation. Some ports must be assigned to the new VLANS with unused remaining. Which action should be taken for the unused ports?

A. configure port in the native VLAN
B. configure ports in a black hole VLAN
C. configure in a nondefault native VLAN
D. configure ports as access ports

Answer: B

NEW QUESTION 366

- (Topic 1)

Which attribute does a router use to select the best path when two or more different routes to the same destination exist from two different routing protocols.

A. dual algorithm
B. metric
C. administrative distance
D. hop count

Answer: C

Explanation:

 Administrative distance is the feature used by routers to select the best path when there are two or more different routes to the same destination from different routing protocols. Administrative distance defines the reliability of a routing protocol.

NEW QUESTION 368

- (Topic 1)

Which output displays a JSON data representation?

A.
```
{
    "response": {
    "taskId": {};
    "url": "string"
    };
    "version": "string"
}
```

B.
```
{
    "response"- {
    "taskId"- {},
    "url"- "string"
    },
    "version"- "string"
}
```

C.
```
{
    "response": {
    "taskId": {},
    "url": "string"
    },
    "version": "string"
}
```

D.
```
{
    "response". {
    "taskId". {};
    "url". "string"
    };
    "version". "string"
}
```

A. Option A
B. Option B
C. Option C
D. Option D

Answer: C

Explanation:
 JSON data is written as name/value pairs.A name/value pair consists of a field name (in double quotes), followed by a colon, followed by a value:"name":"Mark"JSON can use arrays. Array values must be of type string, number, object, array, boolean or null.For example:{"name":"John","age":30,"cars":["Ford", "BMW", "Fiat"]}JSON can have empty object like "taskId":{}

NEW QUESTION 370
DRAG DROP - (Topic 1)
Drag and drop the IPv6 address type characteristics from the left to the right.

|	Link-Local Address
attached to a single subnet	
addresses with prefix FC00::/7	
configured only once per interface	Unique Local Address
addressing for exclusive use internally without Internet routing	

A. Mastered

B. Not Mastered

Answer: A
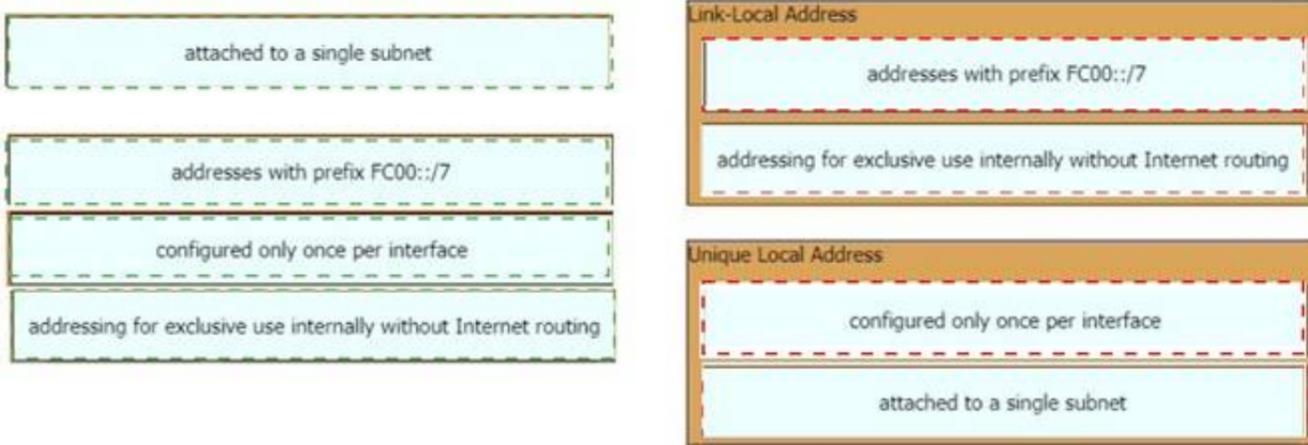
Explanation:

NEW QUESTION 374
- (Topic 1)
Which feature on the Cisco Wireless LAN Controller when enabled restricts management access from specific networks?

A. CPU ACL
B. TACACS
C. Flex ACL
D. RADIUS

Answer: A

Explanation:
 Reference: https://www.cisco.com/c/en/us/support/docs/wireless-mobility/wlan-security/71978-acl-wlc.html

NEW QUESTION 375
DRAG DROP - (Topic 1)
Drag and drop the SNMP manager and agent identifier commands from the left onto the functions on the right
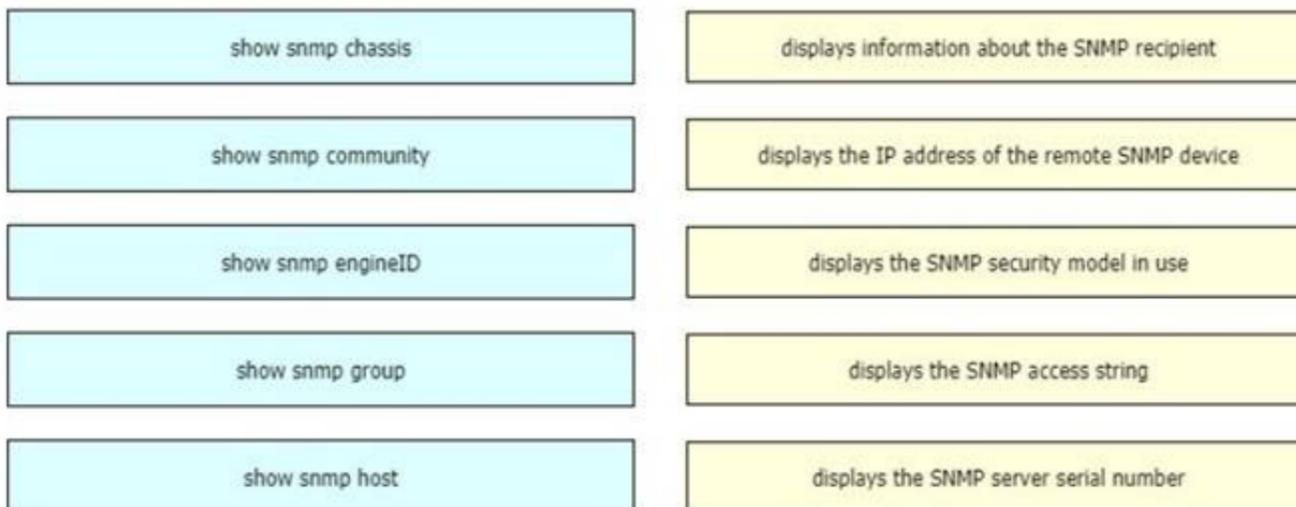
A. Mastered
B. Not Mastered

Answer: A

Explanation:

NEW QUESTION 379
- (Topic 1)
Refer to the exhibit.
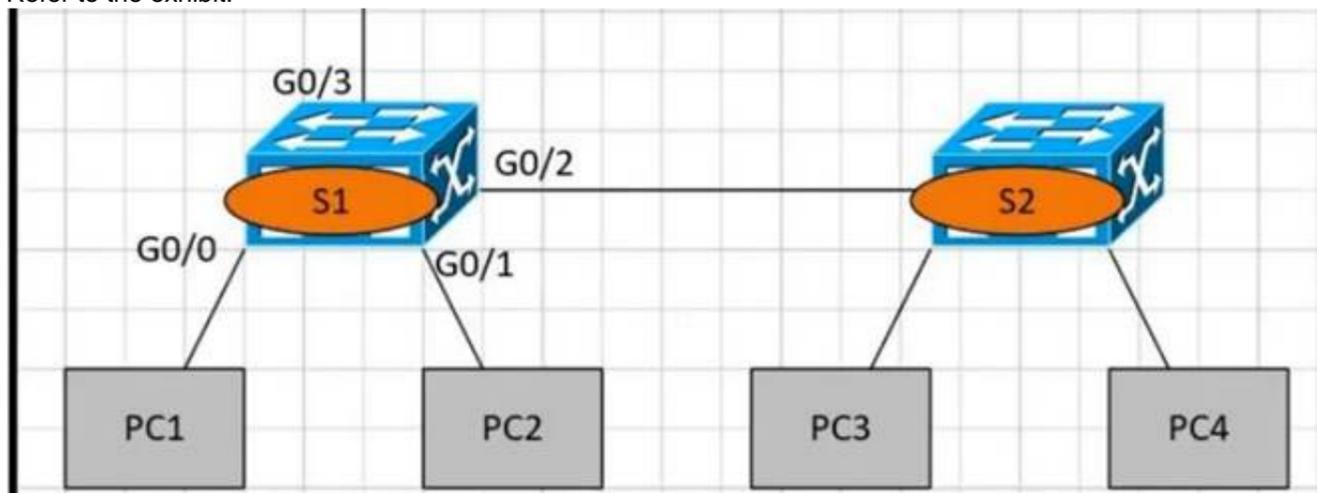
PC1 is trying to ping PC3 for the first time and sends out an ARP to S1 Which action is taken by S1?

A. It forwards it out G0/3 only
B. It is flooded out every port except G0/0.
C. It drops the frame.
D. It forwards it out interface G0/2 only.

Answer: B

NEW QUESTION 380
- (Topic 1)
Which HTTP status code is returned after a successful REST API request?

A. 200
B. 301
C. 404
D. 500

Answer: A

NEW QUESTION 381
- (Topic 1)
Refer to the exhibit.
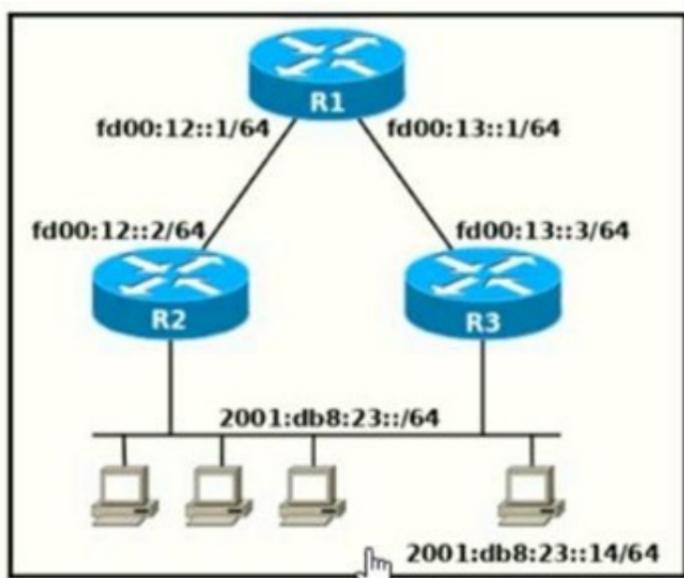
Which two commands, when configured on router R1, fulfill these requirements? (Choose two.)
Packets towards the entire network 2001:db8:2::/64 must be forwarded through router R2. Packets toward host 2001:db8:23::14 preferably must be forwarded through R3.

A. Ipv6 route 2001:db8:23::/128 fd00:12::2
B. Ipv6 route 2001:db8:23::14/128 fd00:13::3
C. Ipv6 route 2001:db8:23::14/64 fd00:12::2
D. Ipv6 route 2001:db8:23::/64 fd00:12::2
E. Ipv6 route 2001:db8:23::14/64 fd00:12::2 200

Answer: DE

NEW QUESTION 386
DRAG DROP - (Topic 1)
Drag and drop the DHCP snooping terms from the left onto the descriptions on the right.

DHCP server		list of hosts on the network that are unknown to the administrative domain
snooping binding database		network component that propagates IP addresses to hosts on the network
spurious DHCP server		internal device under the control of the network administrator
trusted		unknown DHCP server within an administrative domain
untrusted		default state of all interfaces

A. Mastered
B. Not Mastered

Answer: A

Explanation:

DHCP server		snooping binding database
snooping binding database		spurious DHCP server
spurious DHCP server		trusted
trusted		DHCP server
untrusted		untrusted

NEW QUESTION 387
- (Topic 1)
When a site-to-site VPN is configured, which IPsec mode provides encapsulation and encryption of the entire original P packet?

A. IPsec tunnel mode with AH
B. IPsec transport mode with AH
C. IPsec tunnel mode with ESP
D. IPsec transport mode with ESP

Answer: C

Explanation:
"Encapsulating Security Payload…Unlike Authentication Header (AH), ESP in transport mode does not provide integrity and authentication for the entire IP packet. However, in Tunnel Mode, where the entire original IP packet is encapsulated with a new packet header added, ESP protection is afforded to the whole inner IP packet (including the inner header) while the outer header (including any outer IPv4 options or IPv6 extension headers) remains unprotected.

NEW QUESTION 391
- (Topic 1)
A port security violation has occurred on a switch port due to the maximum MAC address count being exceeded. Which command must be configured to increment the security- violation count and forward an SNMP trap?

A. switchport port-security violation access
B. switchport port-security violation protect
C. switchport port-security violation restrict
D. switchport port-security violation shutdown

Answer: C

Explanation:
https://www.cisco.com/c/en/us/td/docs/switches/lan/catalyst4500/12-2/25ew/configuration/guide/conf/port_sec.html

NEW QUESTION 395
- (Topic 1)
Which WLC port connects to a switch to pass normal access-point traffic?

A. redundancy

B. console
C. distribution system
D. service

Answer: C

NEW QUESTION 399
DRAG DROP - (Topic 1)
Drag and drop the 802.11 wireless standards from the left onto the matching statements on the right

|	
802.11a	Operates in the 2.4 GHz and 5 GHz bands.
802.11ac	Operates in the 2.4 GHz band only and supports a maximum data rate of 54 Mbps.
802.11b	Operates in the 5 GHz band only and supports a maximum data rate that can exceed 100 Mbps.
802.11g	Supports a maximum data rate of 11 Mbps.
802.11n	Operates in the 5 GHz band only and supports a maximum data rate of 54 Mbps.

A. Mastered
B. Not Mastered

Answer: A

Explanation:

802.11a	802.11n
802.11ac	802.11g
802.11b	802.11ac
802.11g	802.11b
802.11n	802.11a

NEW QUESTION 402
- (Topic 1)
Refer to the exhibit.
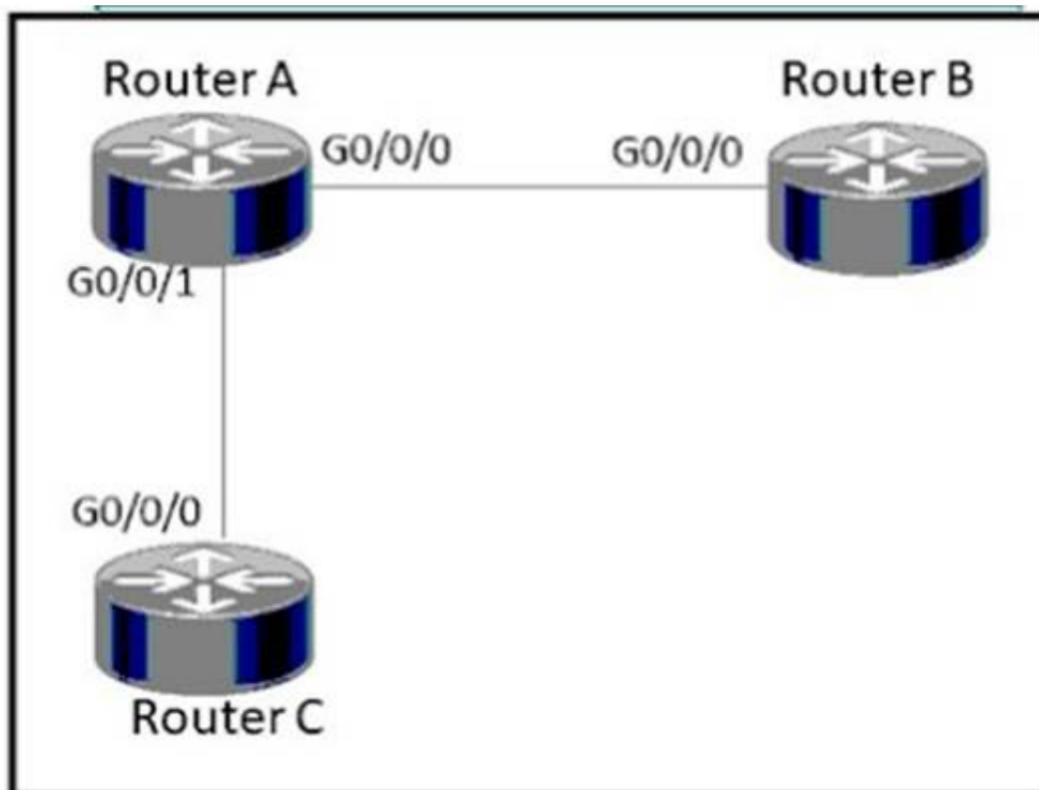
How must router A be configured so that it only sends Cisco Discovery Protocol Information to router C?

⊖ #config t
Router A (config)#**cdp run**
Router A (config)#**interface gi0/0/0**
Router A (config-if)#**no cdp enable**

⊖ #config t
Router A (config)#**cdp run**
Router A (config)#**interface gi0/0/0**
Router A (config-if)#**cdp enable**

⊖ #config t
Router A (config)#**cdp run**
Router A (config)#**interface gi0/0/1**
Router A (config-if)#**cdp enable**

○ #config t
Router A (config)#**no cdp run**
Router A (config)#**interface gi0/0/1**
Router A (config-if)#**cdp enable**

A. Option A
B. Option B
C. Option C
D. Option D

Answer: D

NEW QUESTION 405
- (Topic 1)
How does QoS optimize voice traffic?

A. reducing bandwidth usage
B. by reducing packet loss
C. by differentiating voice and video traffic
D. by increasing jitter

Answer: C

NEW QUESTION 408
- (Topic 1)
What is the difference in data transmission delivery and reliability between TCP and UDP?

A. TCP transmits data at a higher rate and ensures packet deliver
B. UDP retransmits lost data to ensure applications receive the data on the remote end.
C. UDP sets up a connection between both devices before transmitting dat

D. TCP uses the three-way handshake to transmit data with a reliable connection.
E. UDP is used for multicast and broadcast communicatio
F. TCP is used for unicast communication and transmits data at a higher rate with error checking.
G. TCP requires the connection to be established before transmitting dat
H. UDP transmits data at a higher rate without ensuring packet delivery.

Answer: D

NEW QUESTION 413
- (Topic 1)
What is a characteristic of a SOHO network?

A. connects each switch to every other switch in the network
B. enables multiple users to share a single broadband connection
C. provides high throughput access for 1000 or more users
D. includes at least three tiers of devices to provide load balancing and redundancy

Answer: B

NEW QUESTION 415
- (Topic 1)
What are two functions of an SDN controller? (Choose two)

A. Layer 2 forwarding
B. coordinating VTNs
C. tracking hosts
D. managing the topology
E. protecting against DDoS attacks

Answer: BD

NEW QUESTION 416
- (Topic 1)
A manager asks a network engineer to advise which cloud service models are used so employees do not have to waste their time installing, managing, and updating software which is only used occasionally Which cloud service model does the engineer recommend?

A. infrastructure-as-a-service
B. platform-as-a-service
C. business process as service to support different types of service
D. software-as-a-service

Answer: D

NEW QUESTION 418
- (Topic 1)
What is a function of a remote access VPN?

A. used cryptographic tunneling to protect the privacy of data for multiple users simultaneously
B. used exclusively when a user is connected to a company's internal network
C. establishes a secure tunnel between two branch sites
D. allows the users to access company internal network resources through a secure tunnel

Answer: D

NEW QUESTION 420
- (Topic 1)
Refer to the Exhibit.

Switch 1:
Name: Gi0/1
Switchport: Enabled
Administrative Mode: trunk
Operational Mode: trunk
Administrative Trunking Encapsulation: dot1q
Operational Trunking Encapsulation: dot1q
Negotiation of Trunking: Off
Access Mode VLAN: 1 (default)
Trunking Native Mode VLAN: 1 (default)
Administrative Native VLAN tagging: enabled
Voice VLAN: none
[output omitted]
Trunking VLANs Enabled: 50-100
Pruning VLANs Enabled: 2-1001
Capture Mode Disabled
Capture VLANs Allowed: ALL

Switch 2:
Name: Gi0/1
Switchport: Enabled
Administrative Mode: trunk
Operational Mode: trunk
Administrative Trunking Encapsulation: dot1q
Operational Trunking Encapsulation: dot1q
Negotiation of Trunking: Off
Access Mode VLAN: 1 (default)
Trunking Native Mode VLAN: 99 (VLAN0099)
Administrative Native VLAN tagging: enabled
Voice VLAN: none
[output omitted]
Trunking VLANs Enabled: 50-100
Pruning VLANs Enabled: 2-1001
Capture Mode Disabled
Capture VLANs Allowed: ALL

After the switch configuration the ping test fails between PC A and PC B Based on the output for switch 1. which error must be corrected?

A. There is a native VLAN mismatch
B. Access mode is configured on the switch ports.
C. The PCs are m the incorrect VLAN
D. All VLANs are not enabled on the trunk

Answer: A

Explanation:
From the output we see the native VLAN of Switch1 on Gi0/1 interface is VLAN 1 while that of Switch2 is VLAN 99 so there would be a native VLAN mismatch.

NEW QUESTION 424
- (Topic 1)
What is the purpose of using First Hop Redundancy Protocol in a specific subnet?

A. Filter traffic based on destination IP addressing
B. Sends the default route to the hosts on a network
C. ensures a loop-free physical topology
D. forwards multicast hello messages between routers

Answer: D

Explanation:
FHRP is layer 3 protocol whose purpose is to protect the default gateway by offering redundancy of the gateway in a subnet. This is achieved by allowing two or more routers to provide a backup for the first-hop IP router address. If a failure of an active router occurs, the backup router will take over the address. The routers negotiate their roles (Active/Standby) with each other by multicast hello messages to share the VIP (virtual IP address) between the FHRP routers. The terms Active/Standby vary between the different types of FHRP. The active router will act as the default gateway and the standby router acts as a backup the active router.

NEW QUESTION 425
- (Topic 1)
What facilitates a Telnet connection between devices by entering the device name?

A. SNMP
B. DNS lookup
C. syslog
D. NTP

Answer: B

NEW QUESTION 429
- (Topic 1)
A frame that enters a switch fails the Frame Check Sequence. Which two interface counters are incremented? (Choose two)

A. runts
B. giants

C. frame
D. CRC
E. input errors

Answer: DE

Explanation:
Whenever the physical transmission has problems, the receiving device might receive a frame whose bits have changed values. These frames do not pass the error detection logic as implemented in the FCS field in the Ethernet trailer. The receiving device discards the frame and counts it as some kind of input error. Cisco switches list this error as a CRC error. Cyclic redundancy check (CRC) is a term related to how the FCS math detects an error.
The "input errors" includes runts, giants, no buffer, CRC, frame, overrun, and ignored counts.
The output below show the interface counters with the "show interface s0/0/0" command:

```
Router#show interface s0/0/0
Serial0/0/0 is up, line protocol is up
  Hardware is M4T
  Description: Link to R2
  Internet address is 10.1.1.1/30
  MTU 1500 bytes, BW 1544 Kbit, DLY 20000 usec,
    reliability 255/255, txload 1/255, rxload 1/255
  --output omitted--
  5 minute output rate 0 bits/sec, 0 packets/sec
    268 packets input, 24889 bytes, 0 no buffer
    Received 0 broadcasts, 0 runts, 0 giants, 0 throttles
    0 input errors, 0 CRC, 0 frame, 0 overrun, 0 ignored, 0 abort
    251 packets output, 23498 bytes, 0 underruns
    0 output errors, 0 collisions, 0 interface resets
    0 output buffer failures, 0 output buffers swapped out
    0 carrier transitions    DCD=up  DSR=up  DTR=up  RTS=up  CTS=up
```

NEW QUESTION 433
- (Topic 1)
What are two fundamentals of virtualization? (choose two)

A. The environment must be configured with one hypervisor that serves solely as a network manager to monitor SNMP traffic
B. It allows logical network devices to move traffic between virtual machines and the rest of the physical network
C. It allows multiple operating systems and applications to run independently on one physical server.
D. It allows a physical router to directly connect NICs from each virtual machine into the network
E. It requires that some servers, virtual machines and network gear reside on the Internet

Answer: BC

NEW QUESTION 438
- (Topic 1)
How are VLAN hopping attacks mitigated?

A. enable dynamic ARP inspection
B. manually implement trunk ports and disable DTP
C. activate all ports and place in the default VLAN
D. configure extended VLANs

Answer: B

NEW QUESTION 440
- (Topic 1)
Which state does the switch port move to when PortFast is enabled?

A. learning
B. forwarding
C. blocking
D. listening

Answer: B

NEW QUESTION 443
- (Topic 1)
Which QoS Profile is selected in the GUI when configuring a voice over WLAN deployment?

A. Bronze
B. Platinum
C. Silver

D. Gold

Answer: B

Explanation:
 Reference: https://www.cisco.com/c/en/us/support/docs/wireless-mobility/wireless-lan-wlan/81831-qos-wlc-lap.html
Cisco Unified Wireless Network solution WLANs support four levels of QoS: Platinum/Voice, Gold/Video, Silver/Best Effort (default), and Bronze/Background.

NEW QUESTION 448
SIMULATION - (Topic 5)
Physical connectivity is implemented between the two Layer 2 switches, and the network connectivity between them must be configured.
* 1 . Configure an LACP EtherChanneI and number it as 44; configure it between switches SWI and SW2 using interfaces EthernetO/O and Ethernet0/1 on both sides. The LACP mode must match on both ends.
* 2. Configure the EtherChannel as a trunk link.
* 3. Configure the trunk link with 802. Iq tags.
* 4. Configure VLAN 'MONITORING' as the untagged VLAN of the EtherChannel.
==================
Guidelines
This is a lab item in which tasks will be performed on virtual devices.
• Refer to the Tasks tab to view the tasks for this lab item.
• Refer to the Topology tab to access the device console(s) and perform the tasks.
• Console access is available for all required devices by clicking the device icon or using the tab(s) above the console window.
• All necessary preconfigurations have been applied.
• Do not change the enable password or hostname for any device.
• Save your configurations to NVRAM before moving to the next item.
• Click Next at the bottom of the screen to submit this lab and move to the next question.
• When Next is clicked, the lab closes and cannot be reopened.

A. Mastered
B. Not Mastered

Answer: A

Explanation:
To configure an LACP EtherChannel and number it as 44, configure it between switches SW1 and SW2 using interfaces Ethernet0/0 and Ethernet0/1 on both sides, configure the EtherChannel as a trunk link, configure the trunk link with 802.1q tags, and configure VLAN 'MONITORING' as the untagged VLAN of the EtherChannel, you need to follow these steps:
? On both SW1 and SW2, enter the global configuration mode by using the
configure terminal command.
? On both SW1 and SW2, select the two interfaces that will form the EtherChannel by using the interface range ethernet 0/0 - 1 command. This will enter the interface range configuration mode.
? On both SW1 and SW2, set the protocol to LACP by using the channel-protocol
lacp command.
? On both SW1 and SW2, assign the interfaces to an EtherChannel group number 44 by using the channel-group 44 mode active command. This will create a logical interface named Port-channel44 and set the LACP mode to active on both ends. The LACP mode must match on both ends for the EtherChannel to form.
? On both SW1 and SW2, exit the interface range configuration mode by using the exit command.
? On both SW1 and SW2, enter the Port-channel interface configuration mode by using the interface port-channel 44 command.
? On both SW1 and SW2, configure the Port-channel interface as a trunk link by using the switchport mode trunk command.
? On both SW1 and SW2, configure the Port-channel interface to use 802.1q tags for VLAN identification by using the switchport trunk encapsulation dot1q command.
? On both SW1 and SW2, configure VLAN 'MONITORING' as the untagged VLAN of the Port-channel interface by using the switchport trunk native vlan MONITORING command.
? On both SW1 and SW2, exit the Port-channel interface configuration mode by using the exit command.

? On both SW1 and SW2, save the configuration to NVRAM by using the copy running-config startup-config command.

NEW QUESTION 452
SIMULATION - (Topic 5)

L1: 192.168.1.1/24
L0: 10.10.1.1/32

OSPF Process ID 1
Area 0

E0/0   R1   E0/1

.1   .1

10.10.12.0/24   10.10.13.0/24

E0/0   .2   .3   E0/1

.2   10.10.23.0/24   .3

R2   E0/2   E0/2   R3

L0: 10.10.2.2/32   L0: 10.10.3.3/32
L1: 192.168.2.2/24   L1: 192.168.3.3/24

Topology Diagram

Guidelines

This is a lab item in which tasks will be performed on virtual devices.

- Refer to the **Tasks** tab to view the tasks for this lab item.
- Refer to the **Topology** tab to access the device console(s) and perform the tasks.
- Console access is available for all required devices by clicking the device icon or using the tab(s) above the console window.
- All necessary preconfigurations have been applied.
- Do not change the enable password or hostname for any device.
- **Save your configurations** to NVRAM before moving to the next item.
- Click **Next** at the bottom of the screen to submit this lab and move to the next question.
- When **Next** is clicked, the lab closes and cannot be reopened.

IP connectivity between the three routers is configured. OSPF adjacencies must be established.
* 1. Configure R1 and R2 Router IDs using the interface IP addresses from the link that is shared between them.
* 2. Configure the R2 links with a max value facing R1 and R3. R2 must become the DR. R1 and R3 links facing R2 must remain with the default OSPF configuration for DR election. Verify the configuration after clearing the OSPF process.
* 3. Using a host wildcard mask, configure all three routers to advertise their respective Loopback1 networks.
* 4. Configure the link between R1 and R3 to disable their ability to add other OSPF routers.

A. Mastered
B. Not Mastered

Answer: A

Explanation:
Answer as below configuration:
on R1
conf terminal interface Loopback0
ip address 10.10.1.1 255.255.255.255
!
interface Loopback1
ip address 192.168.1.1 255.255.255.0
!
interface Ethernet0/0 no shut
ip address 10.10.12.1 255.255.255.0
ip ospf 1 area 0 duplex auto
!
interface Ethernet0/1 no shut
ip address 10.10.13.1 255.255.255.0
ip ospf 1 area 0 duplex auto
!
router ospf 1
router-id 10.10.12.1
network 10.10.1.1 0.0.0.0 area 0
network 192.168.1.0 0.0.0.255 area 0
!
copy run star

```
---------------------------------------
On R2
conf terminal interface Loopback0
ip address 10.10.2.2 255.255.255.255
!
interface Loopback1
ip address 192.168.2.2 255.255.255.0
!
interface Ethernet0/0
no shut
ip address 10.10.12.2 255.255.255.0
ip ospf priority 255 ip ospf 1 area 0 duplex auto
!
interface Ethernet0/2 no shut
ip address 10.10.23.2 255.255.255.0
ip ospf priority 255 ip ospf 1 area 0 duplex auto
!
router ospf 1
network 10.10.2.2 0.0.0.0 area 0
network 192.168.2.0 0.0.0.255 area 0
!
copy runs start
----------------------
On R3
conf ter
interface Loopback0
ip address 10.10.3.3 255.255.255.255
!
interface Loopback1
ip address 192.168.3.3 255.255.255.0
!
interface Ethernet0/1 no shut
ip address 10.10.13.3 255.255.255.0
ip ospf 1 area 0 duplex auto
!
interface Ethernet0/2 no shut
ip address 10.10.23.3 255.255.255.0
ip ospf 1 area 0 duplex auto
!
router ospf 1
network 10.10.3.3 0.0.0.0 area 0
network 192.168.3.0 0.0.0.255 area 0
!
copy run start
!
```

NEW QUESTION 453

SIMULATION - (Topic 5)

All physical cabling is in place. A company plans to deploy 32 new sites. The sites will utilize both IPv4 and IPv6 networks.

* 1 . Subnet 172.25.0.0/16 to meet the subnet requirements and maximize the number of hosts

Using the second subnet

• Assign the first usable IP address to e0/0 on Sw1O1

• Assign the last usable IP address to e0/0 on Sw102

* 2. Subnet to meet the subnet requirements and maximize the number of hosts

c Using the second subnet

• Assign an IPv6 GUA using a unique 64-Bit interface identifier on e0/0 on Sw101

• Assign an IPv6 GUA using a unique 64-Bit interface identifier on eO/O on swi02

Guidelines

This is a lab item in which tasks will be performed on virtual devices.

• Refer to the Tasks tab to view the tasks for this lab item.

• Refer to the Topology tab to access the device console(s) and perform the tasks.

• Console access is available for all required devices by clicking the device icon or using the tab(s) above the console window.

• All necessary preconfigurations have been applied.

• Do not change the enable password or hostname for any device.

• Save your configurations to NVRAM before moving to the next item.

• Click Next at the bottom of the screen to submit this lab and move to the next question.

• When Next is clicked, the lab closes and cannot be reopened.

A. Mastered
B. Not Mastered

Answer: A

Explanation:
? To subnet 172.25.0.0/16 to meet the subnet requirements and maximize the number of hosts, you need to determine how many bits you need to borrow from the host portion of the address to create enough subnets for 32 sites. Since 32 is 2^5, you need to borrow 5 bits, which means your new subnet mask will be /21 or 255.255.248.0. To find the second subnet, you need to add the value of the fifth bit (32) to the third octet of the network address (0), which gives you 172.25.32.0/21 as the second subnet. The first usable IP address in this subnet is 172.25.32.1, and the last usable IP address is 172.25.39.254.
? To assign the first usable IP address to e0/0 on Sw101, you need to enter the following commands on the device console:
Sw101#configure terminal Sw101(config)#interface e0/0 Sw101(config-if)#ip address 172.25.32.1 255.255.248.0 Sw101(config-if)#no shutdown Sw101(config-if)#end
? To assign the last usable IP address to e0/0 on Sw102, you need to enter the following commands on the device console:
Sw102#configure terminal Sw102(config)#interface e0/0 Sw102(config-if)#ip address 172.25.39.254 255.255.248.0 Sw102(config-if)#no shutdown Sw102(config-if)#end
? To subnet an IPv6 GUA to meet the subnet requirements and maximize the number of hosts, you need to determine how many bits you need to borrow from the interface identifier portion of the address to create enough subnets for 32 sites. Since 32 is 2^5, you need to borrow 5 bits, which means your new prefix length will be /69 or ffff:ffff:ffff:fff8::/69 (assuming that your IPv6 GUA has a /64 prefix by default). To find the second subnet, you need to add the value of the fifth bit (32) to the fourth hextet of the network address (0000), which gives you xxxx:xxxx:xxxx:0020::/69 as the second subnet (where xxxx:xxxx:xxxx is your IPv6 GUA prefix). The first and last IPv6 addresses in this subnet are xxxx:xxxx:xxxx:0020::1 and xxxx:xxxx:xxxx:0027:ffff:ffff:ffff:fffe respectively.
? To assign an IPv6 GUA using a unique 64-bit interface identifier on e0/0 on
Sw101, you need to enter the following commands on the device console (assuming that your IPv6 GUA prefix is 2001:db8::/64):
Sw101#configure terminal Sw101(config)#interface e0/0 Sw101(config-if)#ipv6 address 2001:db8::20::1/69 Sw101(config-if)#no shutdown Sw101(config-if)#end
? To assign an IPv6 GUA using a unique 64-bit interface identifier on e0/0 on
Sw102, you need to enter the following commands on the device console (assuming that your IPv6 GUA prefix is 2001:db8::/64):
Sw102#configure terminal Sw102(config)#interface e0/0 Sw102(config-if)#ipv6 address 2001:db8::27::fffe/69 Sw102(config-if)#no shutdown Sw102(config-if)#end

NEW QUESTION 456
- (Topic 4)
Which encryption method is used by WPA3?

A. PSK
B. TKIP
C. SAE
D. AES

Answer: D

NEW QUESTION 457
DRAG DROP - (Topic 4)
Drag and drop the IPv6 addresses from the left onto the corresponding address types on the right.

A. Mastered
B. Not Mastered

Answer: A

Explanation:

NEW QUESTION 461
- (Topic 4)
A packet from a company s branch office is destined to host 172.31.0.1 at headquarters. The sending router has three possible matches in its routing table for the packet prefixes: 172. 31.0 .0/16.72.31.0.0724. and 172.31 0 0/25.
How does the router handle the packet?

A. It sends the traffic via prefix 172.31.0.0/16
B. It sends the traffic via the default gateway 0.0.0.070.
C. It sends the traffic via prefix 172.31.0.0/24
D. It sends the traffic via prefix 172.31.0.0/25

Answer: D

NEW QUESTION 463
- (Topic 4)
Which interface or port on the WLC is the default for in-band device administration and communications between the controller and access points?

A. virtual interface
B. management interface
C. console port
D. service port

Answer: B

NEW QUESTION 466
- (Topic 4)
What is a function of the core and distribution layers in a collapsed-core architecture?

A. The router must use IPv4 and IPv6 addresses at Layer 3.
B. The core and distribution layers are deployed on two different devices to enable failover.
C. The router can support HSRP for Layer 2 redundancy in an IPv6 network.
D. The router operates on a single device or a redundant pair.

Answer: D

Explanation:
The core and distribution layers are collapsed into one layer in a collapsed- core architecture, and this layer operates on a single device or a redundant pair. This layer is responsible for the routing between the access layer and the WAN, as well as providing redundancy.

NEW QUESTION 467
- (Topic 4)
Refer to the exhibit.

```
.1                                    .2
      10.10.10.0/30
R1    10.10.10.4/30      R2
.5                                    .6


Client A                        Image Server
192.168.0.100/24                10.10.13.10/25
```
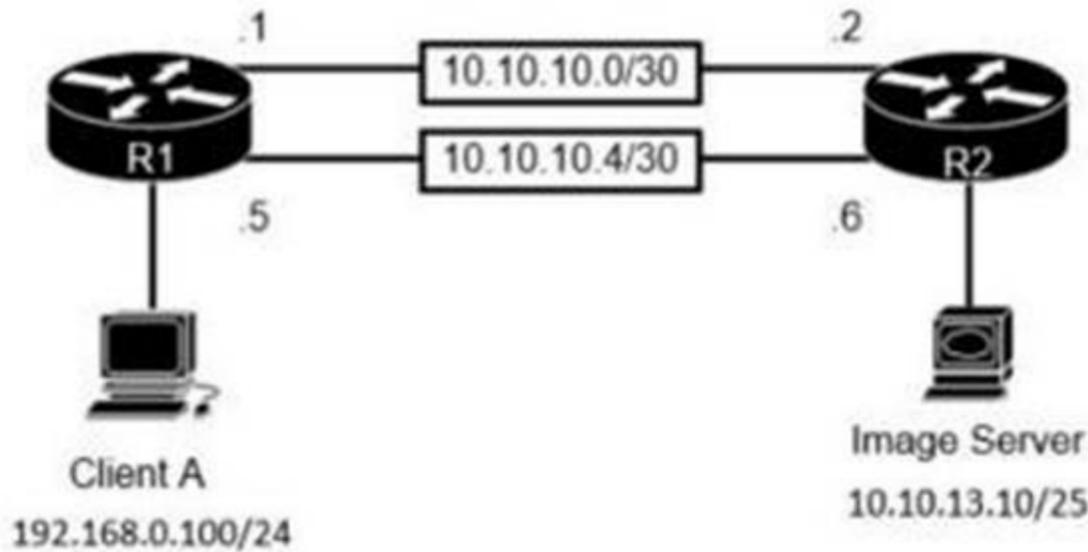
```
R1#show ip route
Gateway of last resort is 10.10.10.2 to network 0.0.0.0
S*    0.0.0.0/0 [1/0] via 10.10.10.2

R2#show ip route
Gateway of last resort is 10.10.10.1 to network 0.0.0.0
S*    0.0.0.0/0 [1/0] via 10.10.10.1
```

The image server and client A are running an application that transfers an extremely high volume of data between the two. An engineer is configuring a dedicated circuit between R1 and R2. Which set of commands must the engineer apply to the routers so that only traffic between the image server and client A is forces to use the new circuit?

A. R1(config)#ip route 10.10.13.10 255.255.255.255 10.10.10.6R2(config)#ip route 192.168.0.100 255.255.255.255 10.10.10.5
B. R1(config)#ip route 10.10.13.10 255.255.255.128 10.10.10.6R2(config)#lp route 192.168.0.100 255.255.255.0 10.10.10.5
C. R1(config)#ip route 10.10.13.10 255.255.255.252 10.10.10.6R2(config)#tp route 192.168.0.100 255.255.255.252 10.10.10.5
D. R1(config)#ip route 10.10.13.10 255.255.255.255 10.10.10.2R2(config)#ip route 192.168.0.100 255.255.255.255 10.10.10.1

Answer: D

NEW QUESTION 471
- (Topic 4)
Refer to the exhibit.

```
Router1#show ip route
Gateway of last resort is not set
     209.165.200.0/27 is subnetted, 1 subnets
B        209.165.200.224 [20/0] via 10.10.12.2, 00:09:57
     10.0.0.0/8 is variably subnetted, 4 subnets, 3 masks
C        10.10.10.0/28 is directly connected, GigabitEthernet0/0
C        10.10.11.0/30 is directly connected, FastEthernet2/0
O        10.10.13.0/24 [110/2] via 10.10.10.1, 00:08:34, GigabitEthernet0/0
C        10.10.12.0/30 is directly connected, GigabitEthernet0/1
```

Which action by the router when a packet is sourced from 10.10.10.2 and destined 10.10.10.16?

A. It queues the packets waiting for the route to be learned.
B. It floods packets to all learned next hops.
C. It discards the packets.
D. It uses a route that is similar to the destination address.

Answer: D

NEW QUESTION 472
- (Topic 4)
What is a link-local all-nodes IPv6 multicast address?

A. ff02:0:0:0:0:0:0:1
B. 2004:31c:73d9:683e:255::
C. fffe:034:0dd:45d6:789e::
D. fe80:4433:034:0dd::2

Answer: D

NEW QUESTION 475

- (Topic 4)
Refer to the exhibit.

```
{
        "Test_Questions" :  [
                        "Automation",
                        "Configuration",
        ],
        "Test_Exam_Level" :  [
                        "CCNA",
                        "CCNP",
        ],
        "Test_Response" :  [
                        "Correct",
                        "Incorrect",
        ],
}
```

How many objects, Keys and JSON list values are present?

A. three objects, two Keys, and three JSON list values
B. three objects, three keys and two JSON MI values
C. one object, three keys, and three JSON list values
D. one object, three keys and two JSON list values

Answer: C

NEW QUESTION 476
- (Topic 4)
Refer to the exhibit.


```
C:\>ipconfig /all
Ethernet adapter Ethernet:
    Connection-specific DNS Suffix  . :
    Physical Address. . . . . . . . . : F8-75-A4-3B-AB-4F
    Link-local IPv6 Address . . . . . : fe80::644a:b01:3e5f:ae6%14(Preferred)
    IPv4 Address. . . . . . . . . . . : 10.2.2.2(Preferred)
    Subnet Mask . . . . . . . . . . . : 255.255.255.192
    Default Gateway . . . . . . . . . : 10.2.2.1
    DHCP Server . . . . . . . . . . . : 192.168.1.15
    DNS Servers . . . . . . . . . . . : 8.8.8.8
    NetBIOS over Tcpip. . . . . . . . : Enabled
```
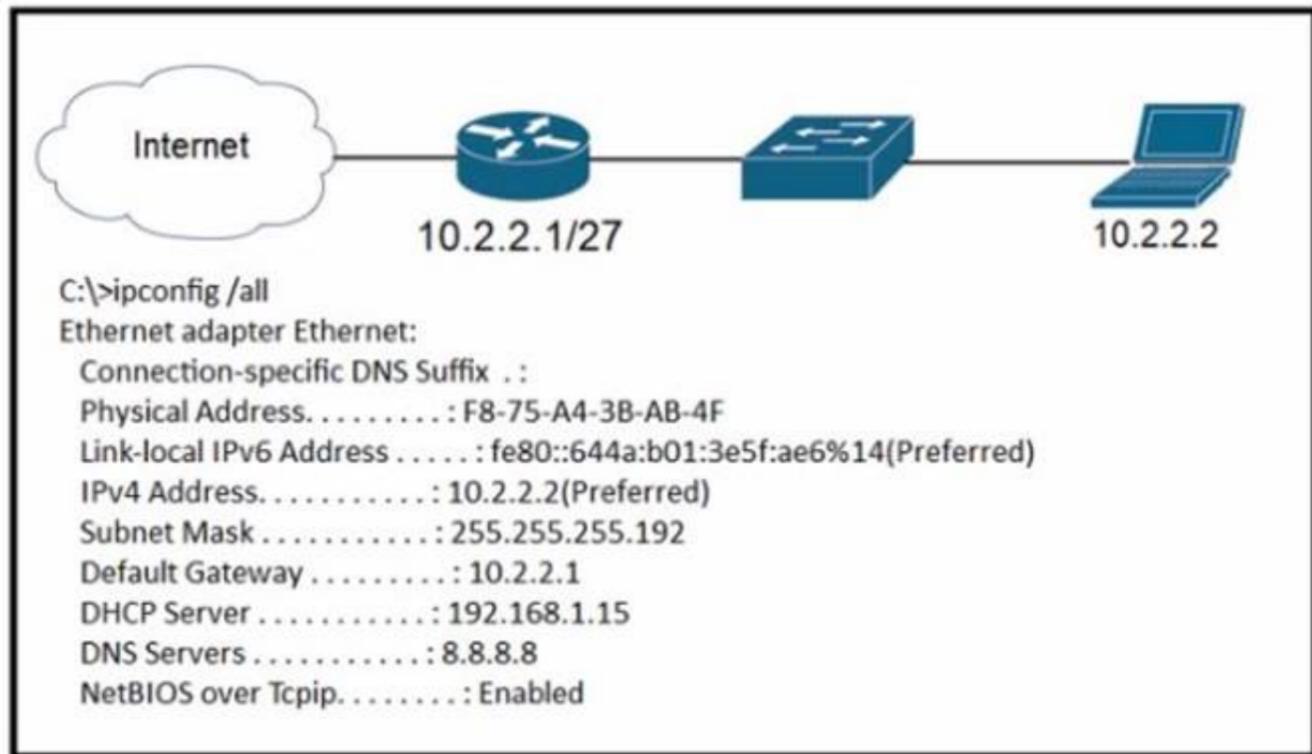
A newly configured PC fails to connect to the internet using TCP port 80 to www cisco com Which setting must be modified for the connection to work?

A. Subnet Mask
B. DNS Servers
C. Default Gateway
D. DHCP Server

Answer: B

NEW QUESTION 480
- (Topic 4)
What is the definition of backdoor malware?

A. malicious code that is installed onto a computer to allow access by an unauthorized user
B. malicious code with the main purpose of downloading other malicious code
C. malicious program that is used to launch other malicious programs
D. malicious code that infects a user machine and then uses that machine to send spam

Answer: A

NEW QUESTION 481
- (Topic 4)
Refer to the exhibit.


```
RouterA(config)#ip route 0.0.0.0 0.0.0.0 192.168.2.2
```
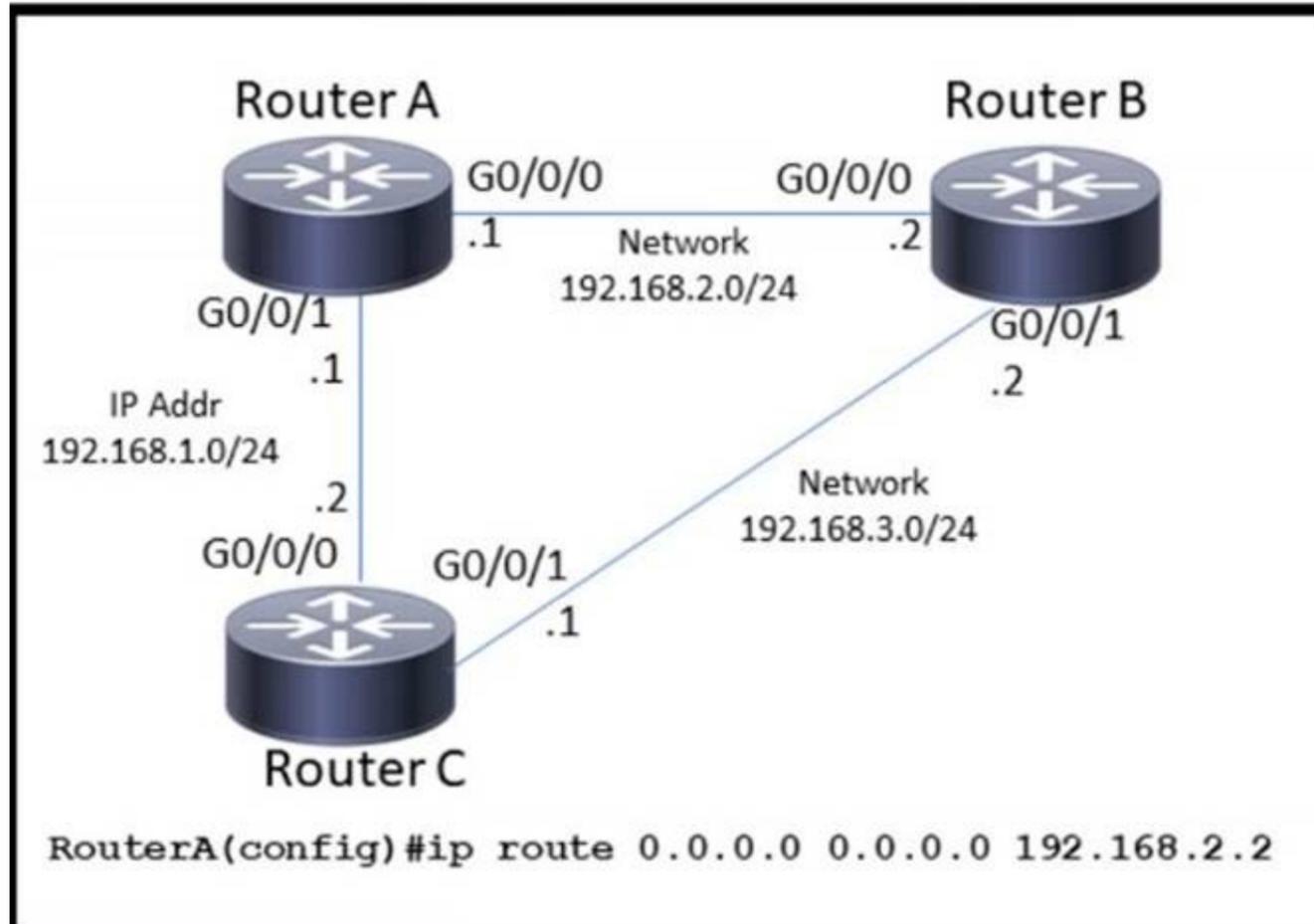
Which command must be enable a floating default route on router A?

A. ip route 0.0.0.0 0.0.0.0 192.168.1.2
B. ip default-gateway 192.168.2.1
C. ip route 0.0.0.0 0.0.0.0 192.168.1.2 10
D. ip route 0.0.0.0 0.0.0.0 192.168.2.1 10

Answer: C

NEW QUESTION 483
DRAG DROP - (Topic 4)
Drag and drop the characteristics of transport layer protocols from the left onto the corresponding protocols on the right.

A. Mastered
B. Not Mastered

Answer: A

Explanation:
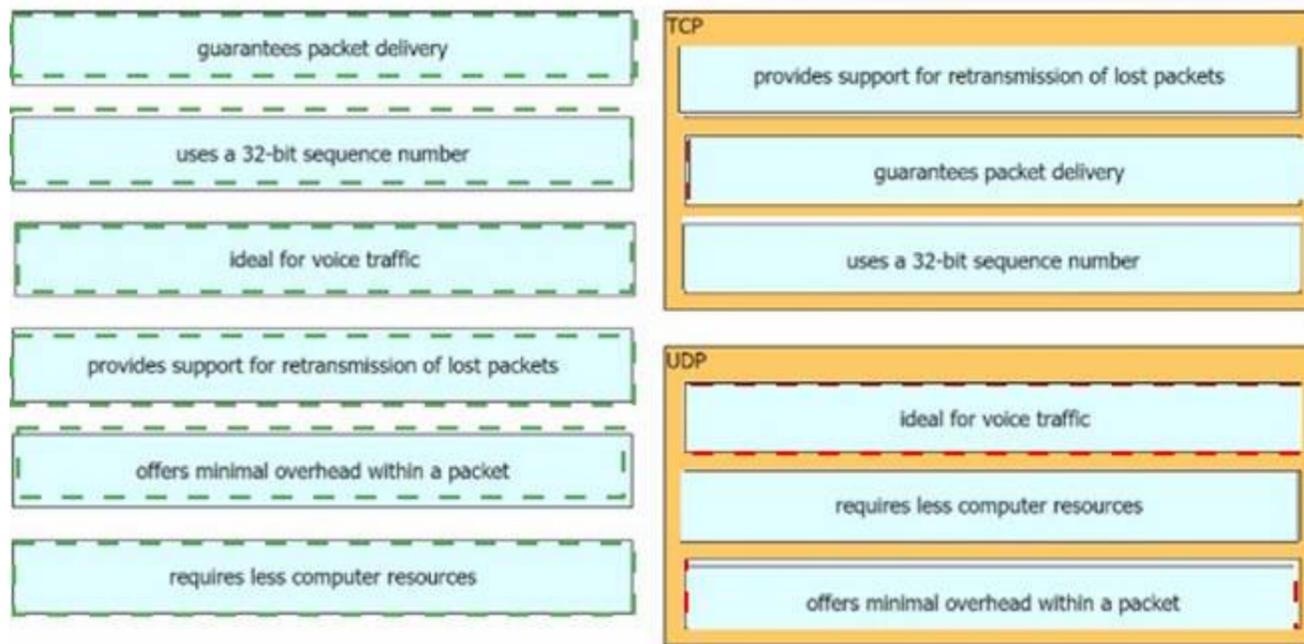
NEW QUESTION 487
- (Topic 4)
Which 802.11 frame type is Association Response?

A. management
B. control
C. action
D. protected frame

Answer: A

NEW QUESTION 490
- (Topic 4)
An engineer has configured the domain name, user name, and password on the local router. What is the next step to complete the configuration tor a Secure Shell access RSA key?

A. crypto key Import rsa pem
B. crypto key pubkey-chain rsa
C. crypto key generate rsa
D. crypto key zeroize rsa

Answer: C

NEW QUESTION 492
- (Topic 4)
What are two reasons a switch experiences frame flooding? (Choose two.)

A. A defective patch cable is connected to the switch port
B. Topology changes are occurring within spanning-tree
C. An aged MAC (able entry is causing excessive updates
D. Port-security is configured globally
E. The forwarding table has overflowed

Answer: AB

NEW QUESTION 493
- (Topic 4)
What is the collapsed layer in collapsed core architectures?

A. core and WAN
B. access and WAN
C. distribution and access
D. core and distribution

Answer: D

NEW QUESTION 494
- (Topic 4)
How do UTP and STP cables compare?

A. STP cables are cheaper to procure and easier to install and UTP cables are more expensive and harder to install.
B. UTP cables are less prone to crosstalk and interference and STP cables are more prone to crosstalk and interference.
C. UTP cables provide taster and more reliable data transfer rates and STP cables are slower and less reliable.
D. STP cables are shielded and protect against electromagnetic interference and UTP lacks the same protection against electromagnetic interference.

Answer: D

NEW QUESTION 495
DRAG DROP - (Topic 4)
Drag and drop the DNS commands from the left onto their effects on the right.

Drag and drop the DNS commands from the left onto their effects on the right.

ip domain-lookup		adds an entry to the host table
ip domain-name		completes the FQDN of the DNS server
ip host switch_1 192.168.0.1		displays address-mapping information
ip name-server		enables host-to-IP-address translation
show hosts		specifies the IP address of the DNS server

A. Mastered
B. Not Mastered

Answer: A

Explanation:
Drag and drop the DNS commands from the left onto their effects on the right.

ip domain-lookup		ip domain-name
ip domain-name		ip domain-lookup
ip host switch_1 192.168.0.1		show hosts
ip name-server		ip host switch_1 192.168.0.1
show hosts		ip name-server

NEW QUESTION 499
- (Topic 4)
Refer to the exhibit.

```
MacOs$ ifconfig

en0: flags=8863<UP,BROADCAST,SMART,RUNNING,SIMPLEX,MULTICAST> mtu 1500
     options=400<CHANNEL_IO>
     ether f0:18:98:64:60:32
     inet6 fe80::492:c09f:57cf:8c36%en0 prefixlen 64 secured scopeid 0x6
     inet 10.8.138.14 netmask 0xffffe000 broadcast 10.8.159.255
     nd6 options=201<PERFORMNUD,DAD>
     media: autoselect
     status: active
```

A network engineer must provide configured IP addressing details to investigate a firewall rule Issue. Which subnet and mask Identify what is configured on the en0 interface?

A. 10.8.0.0/16
B. 10.8.64.0/18
C. 10.8.128.0/19
D. 10.8.138.0/24

Answer: D

NEW QUESTION 504
- (Topic 4)
Refer to the exhibit.

```
{
    "Routers":["R1","R2","R3"],
    "Switches":["SW1","SW2","SW3"]
}
```

What is represented by "R1" and "SW1" within the JSON output?

A. key
B. array
C. value
D. object

Answer: C

NEW QUESTION 508
- (Topic 4)
Which component controls and distributes physical resources for each virtual machine?

A. OS
B. hypervisor
C. CPU
D. physical enclosure

Answer: B

NEW QUESTION 510
- (Topic 4)
What is a function performed by a web server?

A. provide an application that is transmitted over HTTP
B. send and retrieve email from client devices
C. authenticate and authorize a user's identity
D. securely store flies for FTP access

Answer: A

NEW QUESTION 512
- (Topic 4)
Refer to the exhibit.

Current Neighbor Relationship

Neighbor ID	Pri	State	Dead Time	Address	Interface
192.168.1.1	1	FULL/DR	00:00:33	192.168.1.1	GigabitEthernet0/0

Desired Neighbor Relationship

Neighbor ID	Pri	State	Dead Time	Address	Interface
192.168.1.1	0	FULL/ -	00:00:31	192.168.1.1	GigabitEthernet0/0

How must OSPF be configured on the GigabitEthernet0/0 interface of the neighbor device to achieve.
A)

Router(config)#interface GigabitEthernet 0/0
Router(config-if)#ip ospf priority 1

B)

Router(config)#interface GigabitEthernet 0/0
Router(config-if)#ip ospf 1 area 2

C)

Router(config)#interface GigabitEthernet 0/0
Router(config-if)#ip ospf cost 5

D)

```
Router(config)#interface GigabitEthernet 0/0
Router(config-if)#ip ospf network point-to-point
```

A. Option A
B. Option B
C. Option C
D. Option D

Answer: A

NEW QUESTION 514
- (Topic 4)
What differentiates device management enabled by Cisco DNA Center from traditional campus device management?

A. per-device
B. centralized
C. device-by-device hands-on
D. CLI-oriented device

Answer: B

NEW QUESTION 517
- (Topic 4)
Which two capabilities of Cisco DNA Center make it more extensible as compared to traditional campus device management? (Choose two.)

A. REST APIs that allow for external applications to interact natively
B. adapters that support all families of Cisco IOS software
C. SDKs that support interaction with third-party network equipment
D. customized versions for small, medium, and large enterprises
E. modular design that is upgradable as needed

Answer: AC

NEW QUESTION 519
DRAG DROP - (Topic 4)
Drag and drop the elements of a security program from the left onto the corresponding descriptions on the right.

awareness	document that outlines an organization's security goals and practices and the roles and responsibilities of the organization's personnel
education	tactical document that sets out specific tasks and methods to maintain security
security policy	user-awareness learning level that focuses on learning about topics and practices beyond what is typically required by the user's job
security standard	user-awareness learning level that focuses on security practices that all employees must understand and enforce
training	user-awareness learning level that focuses on teaching employees how to perform tasks specifically required by their jobs

A. Mastered
B. Not Mastered

Answer: A

Explanation:

awareness	document that outlines an organization's security goals and practices and the roles and responsibilities of the organization's personnel	*Security Standard*
education	tactical document that sets out specific tasks and methods to maintain security	*Security policy*
security policy	user-awareness learning level that focuses on learning about topics and practices beyond what is typically required by the user's job	*Education*
security standard	user-awareness learning level that focuses on security practices that all employees must understand and enforce	*Awareness*
training	user-awareness learning level that focuses on teaching employees how to perform tasks specifically required by their jobs	*Training*

https://www.ciscopress.com/articles/article.asp?p=1998559&seqNum=3

NEW QUESTION 523
- (Topic 4)
What is a function of an endpoint?

A. It is used directly by an individual user to access network services
B. It passes unicast communication between hosts in a network
C. It transmits broadcast traffic between devices in the same VLAN
D. It provides security between trusted and untrusted sections of the network.

Answer: A

NEW QUESTION 528
DRAG DROP - (Topic 4)
Drag and drop the IPv6 address types from the left onto their description on the right.

2001:DB8::bced:1234:456d:aacc	multicast address used only locally within the site
FD00:0000:0000:1a2d:a153:3992:a19d:ccca	address that is automatically created on a link when IPv6 is enabled on an interface
FE80::abcf:ffff:12de:3992	address that is prohibited from routing to the Internet
FF05::23:becf:22:1111	address that is unique and reserved for documentation purposes

A. Mastered
B. Not Mastered

Answer: A

Explanation:

2001:DB8::bced:1234:456d:aacc	FF05::23:becf:22:1111
FD00:0000:0000:1a2d:a153:3992:a19d:ccca	FE80::abcf:ffff:12de:3992
FE80::abcf:ffff:12de:3992	FD00:0000:0000:1a2d:a153:3992:a19d:ccca
FF05::23:becf:22:1111	2001:DB8::bced:1234:456d:aacc

NEW QUESTION 529
- (Topic 4)

A wireless access point is needed and must meet these requirements:
• "zero-touch" deployed and managed by a WLC
• process only real-time MAC functionality
• used in a split-MAC architecture. Which access point type must be used?

A. autonomous
B. lightweight
C. mesh
D. cloud-based

Answer: B

Explanation:
https://www.cisco.com/c/en/us/support/docs/wireless/aironet-1200- series/70278-lap-faq.html

NEW QUESTION 530
- (Topic 4)
What is a feature of WPA?

A. 802.1x authentication
B. preshared key
C. TKIP/MIC encryption
D. small Wi-Fi application

Answer: A

NEW QUESTION 535
- (Topic 4)
Refer to the exhibit. A multivendor network exists and the company is implementing VoIP over the network for the first time.
A)

```
SW1(config)#no cdp enable
SW1(config)#interface gigabitethernet1/0/1
SW1(config-if)#cdp run
```

B)

```
SW1(config)#lldp enable
SW1(config)#interface gigabitethernet1/0/1
SW1(config-if)#lldp run
```

C)

```
SW1(config)#lldp run
SW1(config)#interface gigabitethernet1/0/1
SW1(config-if)#lldp enable
```

D)

```
SW1(config)#no cdp run
SW1(config)#interface gigabitethernet1/0/1
SW1(config-if)#lldp transmit
SW1(config-if)#lldp receive
```

A. Option A
B. Option B
C. Option C
D. Option D

Answer: B

NEW QUESTION 540
DRAG DROP - (Topic 4)

```
R1# show ip route | begin gateway
Gateway of last resort is not set
     172.16.0.0/16 is variably subnetted, 3 subnets, 2 masks
     172.16.1.0/24 is directly connected, FastEthernet0/0
     172.16.1.1/32 is directly connected, FastEthernet0/0
     172.16.2.0/24 [120/2] via 207.165.200.250, 00:00:25, Serial0/0/0
     192.168.1.0/24 [110/84437] via 207.165.200.254, 00:00:17, Serial0/0/1
     192.168.2.0/24 [90/3184437] via 207.165.200.254, 00:00:15, Serial0/0/1
     207.165.200.0/24 is variably subnetted, 5 subnets, 2 masks
     207.165.200.244/30 [1/1] via 207.165.200.254, Serial0/0/1
     207.165.200.248/30 is directly connected, Serial0/0/0
     207.165.200.249/32 is directly connected, Serial0/0/0
     207.165.200.252/30 is directly connected, Serial0/0/1
     207.165.200.253/32 is directly connected, Serial0/0/1
```

Refer to the exhibit. Drag and drop the learned prefixes from the left onto the preferred route methods from which they were learned on the right.

172.16.2.0/24	static
192.168.1.0/24	EIGRP
192.168.2.0/24	OSPF
207.165.200.244/30	RIP
207.165.200.248/30	

A. Mastered
B. Not Mastered

Answer: A

Explanation:

172.16.2.0/24	192.168.1.0/24
192.168.1.0/24	172.16.2.0/24
192.168.2.0/24	192.168.2.0/24
207.165.200.244/30	207.165.200.244/30
207.165.200.248/30	

NEW QUESTION 542
DRAG DROP - (Topic 4)
Drag and drop the device behaviors from the left onto the matching HSRP slate on the right.

has heard from the neighbor device and is receiving hello packets	Active
is forwarding packets	Learn
is ready to forward packets if the device that is currently forwarding packets fails	Listen
is transmitting and receiving hello packets	Speak
is waiting to hear from the neighbor device	Standby

A. Mastered
B. Not Mastered

Answer: A

Explanation:

has heard from the neighbor device and is receiving hello packets	is forwarding packets
is forwarding packets	has heard from the neighbor device and is receiving hello packets
is ready to forward packets if the device that is currently forwarding packets fails	is waiting to hear from the neighbor device
is transmitting and receiving hello packets	is transmitting and receiving hello packets
is waiting to hear from the neighbor device	is ready to forward packets if the device that is currently forwarding packets fails

NEW QUESTION 546
- (Topic 4)
Refer to the exhibit.

```
interface g2/0/0
    channel-group 1 mode active
interface g4/0/0
    channel-group 1 mode active
interface Port-channel1
    ip address 203.0.113.65 255.255.255.252

%LINEPROTO-5-UPDOWN: Line protocol on Interface Port-channel1, changed state to down
```

An engineer is configuring a Layer 3 port-channel interface with LACP. The configuration on the first device is complete, and it is verified that both interfaces have registered the neighbor device in the CDP table. Which task on the neighbor device enables the new port channel to come up without negotiating the channel?

A. Change the EtherChannel mode on the neighboring interfaces to auto.
B. Configure the IP address of the neighboring device.
C. Bring up the neighboring interfaces using the no shutdown command.
D. Modify the static EtherChannel configuration of the device to passive mode.

Answer: D

NEW QUESTION 551
- (Topic 4)
What is a reason why an administrator would choose to implement an automated network management approach?

A. Reduce inconsistencies in the network configuration.
B. Enable "box by box" configuration and deployment.
C. Decipher simple password policies.
D. Increase recurrent management costs.

Answer: A

NEW QUESTION 552
DRAG DROP - (Topic 4)
Drag and drop the characteristics of device-management technologies from the left onto the corresponding deployment types on the right.

2passeasy

orchestrates background device configuration	**Cisco DNA Center**
provides greater flexibility for custom and non-standard configurations	
relies on per-device management	
supports centralized software management	**Traditional**
supports open APIs	
uses individual software management	

A. Mastered
B. Not Mastered

Answer: A

Explanation:

orchestrates background device configuration	**Cisco DNA Center**
provides greater flexibility for custom and non-standard configurations	supports centralized software management
relies on per-device management	orchestrates background device configuration
	relies on per-device management
supports centralized software management	**Traditional**
supports open APIs	provides greater flexibility for custom and non-standard configurations
uses individual software management	uses individual software management
	supports open APIs

NEW QUESTION 555
- (Topic 4)
When is the PUT method used within HTTP?

A. when a nonidempotent operation is needed
B. to update a DNS server
C. to display a web site
D. when a read-only operation it required

Answer: B

NEW QUESTION 558
- (Topic 4)
Why is TCP desired over UDP for application that require extensive error checking, such as HTTPS?

A. UDP operates without acknowledgments, and TCP sends an acknowledgment for every packet received.
B. UDP reliably guarantees delivery of all packets, and TCP drops packets under heavy load.
C. UDP uses flow control mechanisms for the delivery of packets, and TCP uses congestion control for efficient packet delivery.
D. UDP uses sequencing data tor packets to arrive in order, and TCP offers trie capability to receive packets in random order.

Answer: A

NEW QUESTION 560
- (Topic 4)
Which type of address is shared by routers in a HSRP implementation and used by hosts on the subnet as their default gateway address?

A. multicast address
B. loopback IP address
C. virtual IP address
D. broadcast address

Answer: C

NEW QUESTION 564
DRAG DROP - (Topic 4)
Drag and drop the configuration management terms from the left onto the descriptions on the right. Not all terms are used.

agent	daemon that determines when the central authority has updates available
agentless	model in which the central server sends updates to nodes on an as-needed basis
provision	easy-to-manage deployment option that may lack scalability
pull	device hardware that runs without embedded management features
push	to automatically install or deploy a configuration or update
post	

A. Mastered
B. Not Mastered

Answer: A

Explanation:

agent	pull
agentless	push
provision	agent
pull	agentless
push	provision
post	

NEW QUESTION 567
- (Topic 4)
Which functionality is provided by the console connection on a Cisco WLC?

A. out-of-band management
B. secure in-band connectivity for device administration
C. unencrypted in-band connectivity for file transfers
D. HTTP-based GUI connectivity

Answer: B

NEW QUESTION 570
- (Topic 4)
What does a switch search for in the CAM table when forwarding a frame?

A. source MAC address and aging time
B. destination MAC address and flush time
C. source MAC address and source port

D. destination MAC address and destination port

Answer: D

Explanation:
A switch searches for the destination MAC address and the destination port in the CAM table when forwarding a frame. The CAM table, or content addressable memory table, is a data structure that stores the MAC addresses of the devices connected to the switch ports and their associated VLANs. The switch uses the CAM table to make layer 2 forwarding decisions based on the destination MAC address of a frame. When a frame arrives at a switch port, the switch first learns the source MAC address and the source port of the frame and updates the CAM table accordingly. Then, the switch looks up the destination MAC address of the frame in the CAM table and finds the corresponding destination port. If there is a match, the switch forwards the frame out of that port only. If there is no match, the switch floods the frame out of all ports except the source port123.
References:
? 1: Why is the CAM table in a switch called CAM table and not MAC table even though it holds MAC addresses?
? 2: ARP and CAM Table
? 3: The CAM Table or MAC address Table

NEW QUESTION 575
DRAG DROP - (Topic 4)
Drag and drop the SNMP components from the left onto the description on the right.

A. Mastered
B. Not Mastered

Answer: A

Explanation:
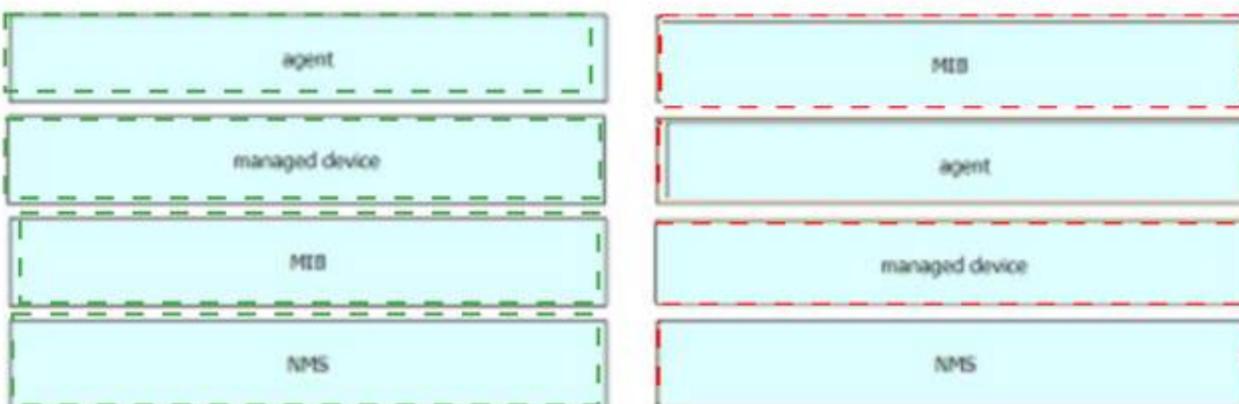
NEW QUESTION 579
- (Topic 4)
Refer to the exhibit.

```
Output from R1

GigabitEthernet0/0/1 is up, line protocol is down
Hardware is SPA-10X1GE-V2, address is 0023.33ee.7c00 (bia 0023.33ee.7c00)
MTU 1500 bytes, BW 1000000 Kbit/sec, DLY 10 usec,
reliability 255/255, txload 1/255, rxload 1/255
Encapsulation ARPA, loopback not set
Keepalive not supported
Half Duplex, 1000Mbps, link type is auto, media type is LX
output flow-control is off, input flow-control is off
ARP type: ARPA, ARP Timeout 04:00:00
Last input 00:00:01, output 00:02:31, output hang never

10 input errors, 0 CRC, 0 frame, 0 overrun, 0 ignored
0 watchdog, 314 multicast, 0 pause input
1 packets output, 77 bytes, 0 underruns
0 output errors, 50 collisions, 6 interface resets
17 unknown protocol drops
0 babbles, 0 late collision, 0 deferred
```

What is the issue with the interface GigabitEthernet0/0/1?

A. Port security
B. High throughput
C. Cable disconnect
D. duplex mismatch

Answer: C

NEW QUESTION 581
- (Topic 4)
Refer to the exhibit.
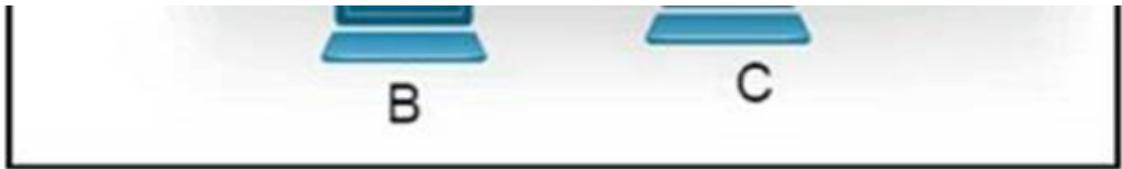
Host A switch interface is configured in VLAN 2. Host D sends a unicast packet destined for the IP address of host A.

```
Sw1#show mac-address table
        Mac Address Table
--------------------------------------------
Vlan    Mac Address       Type      Ports
-----   -----------       -----     -----
2       000c.859c.bb7b    DYNAMIC   e0/1
3       000c.859c.bb7b    DYNAMIC   e0/1
2       0010.11dc.3e91    DYNAMIC   e0/2
3       0010.11dc.3e91    DYNAMIC   e0/2
2       0043.49d4.c383    DYNAMIC   e0/3
Sw1#
```

What does the switch do when it receives the frame from host D?

A. It creates a broadcast storm.
B. It drops the frame from the MAC table of the switch.
C. It shuts down the source port and places It In err-disable mode.
D. It floods the frame out of every port except the source port.

Answer: C

NEW QUESTION 586
- (Topic 4)
Refer to the exhibit.
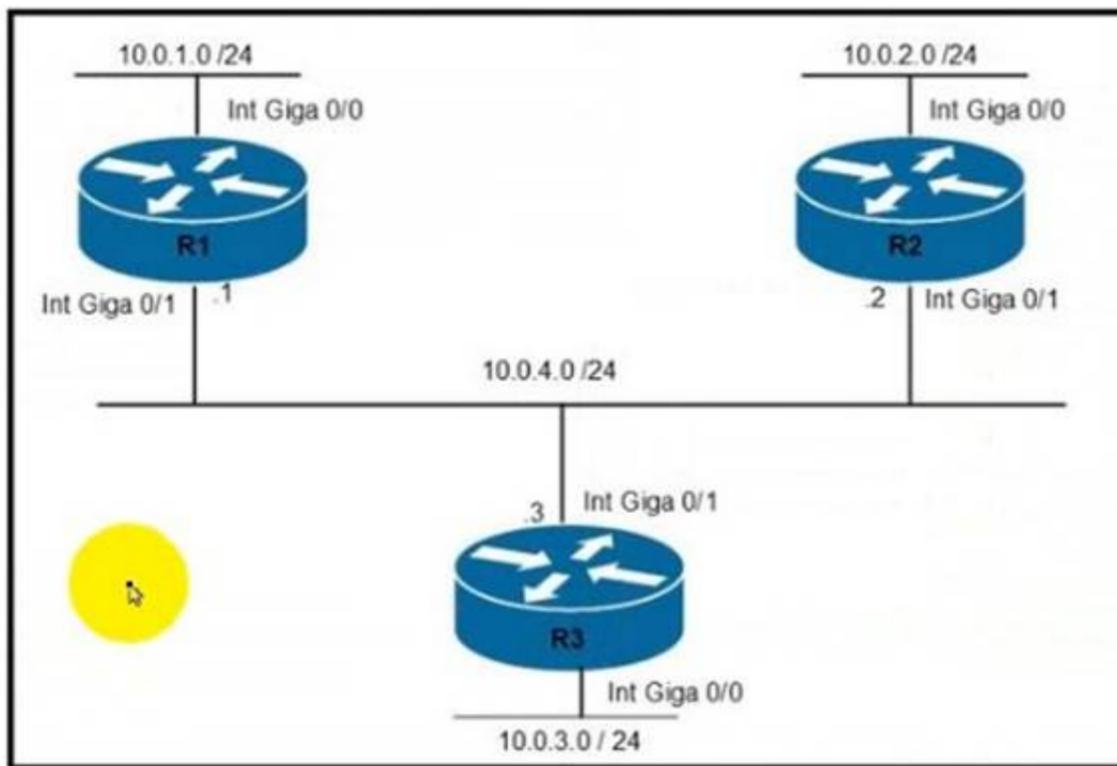
Router R1 must be configured to reach the 10.0.3.0/24 network from the 10.0.1.0/24 segment.
Which command must be used to configure the route?

A. ip route 10.0.3.0 0.255255.255 10.0.4.2
B. route add 10.0.3.0 mask 255.255.255.0 10.0.4.3
C. Ip route 10.0.3.0 255.255.255.0 10.0.4.3
D. route add 10.0.3.0 0.255.255.255 10.0.4.2

Answer: C

NEW QUESTION 590
- (Topic 4)
Which remote access protocol provides unsecured remote CLI access?

A. console
B. Telnet
C. Bash
D. SSH

Answer: B

NEW QUESTION 594
- (Topic 4)
Refer to the exhibit.

```
Last clearing of "show interface" counters never
Input queue: 1/75/1/0 (size/max/drops/flushes); Total output drops: 0
Queueing strategy: random early detection(RED)
Output queue :0/40 (size/max)
5 minute input rate 1000 bits/sec, 2 packets/sec
5 minute output rate 0 bits/sec, 0 packets/sec
    7558065 packets input, 783768942 bytes, 1 no buffer
    Received 8280963 broadcasts, 0 runts, 0 giants, 1 throttles
    15 input errors, 14278 CRC, 0 frame, 0 overrun, 3 ignored
    0 input packets with dribble condition detected
    798092 packets output, 50280266 bytes, 0 underruns
    0 output errors,15000 collisions,0 interface resets
    0 babbles, 0 late collision, 179 deferred
    0 lost carrier, 0 no carrier
    0 output buffer failures, 0 output buffers swapped out
```

An administrator received a call from a branch office regarding poor application performance hosted at the headquarters. Ethernet 1 is connected between Router1 and the LAN switch. What identifies the issue?

A. The QoS policy is dropping traffic.
B. There is a duplex mismatch.
C. The link is over utilized.
D. The MTU is not set to the default value.

Answer: C

NEW QUESTION 598
DRAG DROP - (Topic 4)
Drag and drop the Cisco IOS attack mitigation features from the left onto the types of network attack they mitigate on the right.

DHCP snooping	rogue server that spoofs IP configuration
Dynamic ARP Inspection	cache poisoning
IP Source Guard	flood attacks
storm control	rogue clients on the network

A. Mastered
B. Not Mastered

Answer: A

Explanation:

DHCP snooping	IP Source Guard
Dynamic ARP Inspection	Dynamic ARP Inspection
IP Source Guard	storm control
storm control	DHCP snooping
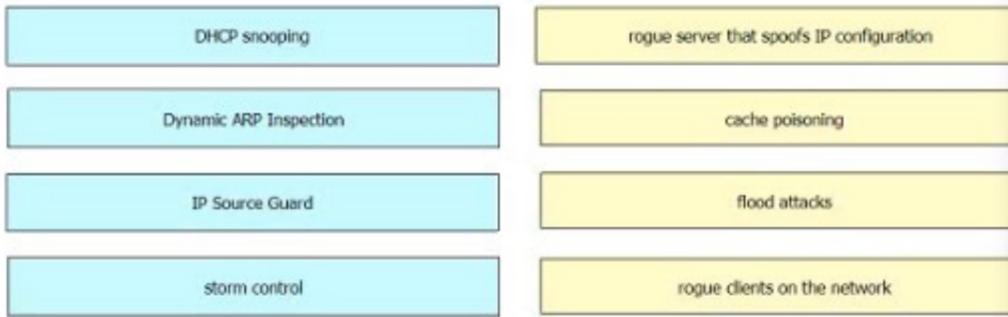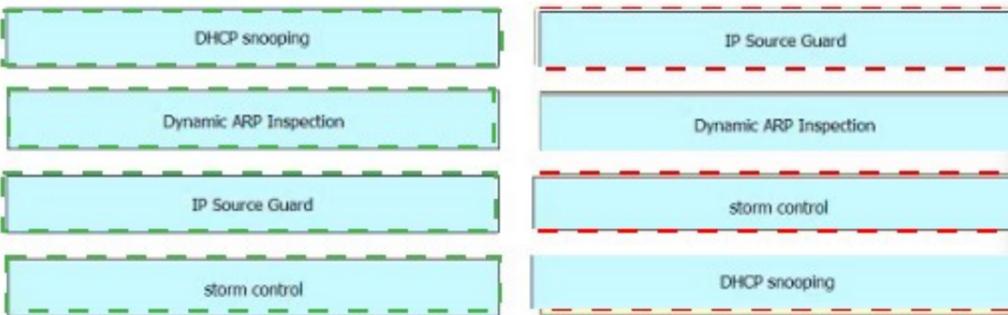
NEW QUESTION 601
- (Topic 4)
Refer to the exhibit.
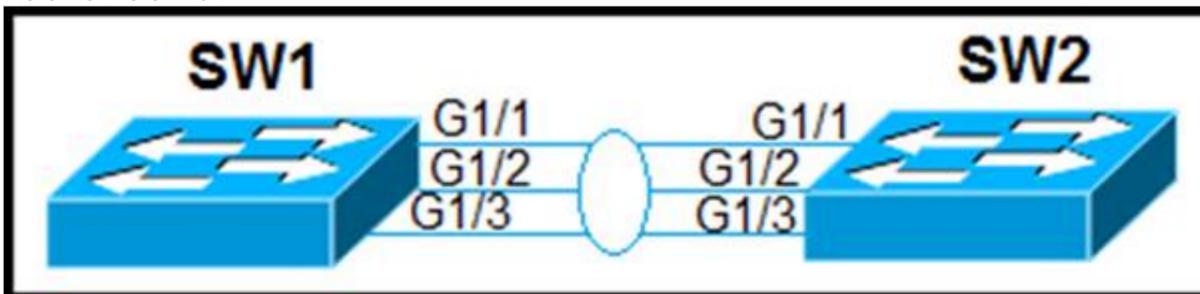
Which configuration establishes a Layer 2 LACP EtherChannel when applied to both switches?

A. Interface range G1/1 – 1/3 switchport mode trunk channel-group 1 mode active no shutdown
B. Interface range G1/1 – 1/3 switchport mode access channel-group 1 mode passive no shutdown
C. Interface range G1/1 – 1/3 switchport mode trunk channel-group 1 mode desirableno shutdown
D. Interface range G1/1 – 1/3 switchport mode access channel-group 1 mode on no shutdown

Answer: A

NEW QUESTION 602
- (Topic 4)
Refer to the exhibit.

```
R1# show ip route
Codes: C - connected, S - static, I - IGRP, R - RIP, M - mobile, B - BGP
       D - EIGRP, EX - EIGRP external, O - OSPF, IA - OSPF inter area
       N1 - OSPF NSSA external type 1, N2 - OSPF NSSA external type 2
       E1 - OSPF external type 1, E2 - OSPF external type 2, E - EGP
       i - IS-IS, L1 - IS-IS level-1, L2 - IS-IS level-2, * - candidate
default
       U - per-user static route, o - ODR
Gateway of last resort is not set
C    10.0.0.0/8 is directly connected, Loopback0
     10.0.0.0/8 is variably subnetted, 4 subnets, 2 masks
O       10.0.1.3/32 [110/100] via 10.0.1.100, 00:39:08, Serial0
C       10.0.1.0/24 is directly connected, Serial0
O       10.0.1.5/32 [110/5] via 10.0.1.50, 00:39:08, Gigabit Ethernet 0/0
D       10.0.1.4/32 [110/10] via 10.0.1.4, 00:39:08, Gigabit Ethernet 0/0
```

What does route 10.0.1.3/32 represent in the routing table?

A. the 10.0.0.0 network
B. a single destination address
C. the source 10.0.1.100
D. all hosts in the 10.0.1.0 subnet

Answer: A

NEW QUESTION 603
- (Topic 4)
Which command configures the Cisco WLC to prevent a serial session with the WLC CLI from being automatical togged out?

A. config sessions maxsessions 0
B. config sessions timeout 0
C. config serial timeout 0
D. config serial timeout 9600

Answer: B

NEW QUESTION 604
- (Topic 4)
Which two protocols are used by an administrator for authentication and configuration on access points?

A. Kerberos
B. 802.1Q
C. 802.1x
D. TACACS+
E. RADIUS

Answer: DE

NEW QUESTION 607
- (Topic 4)
Which access point mode relies on a centralized controller for management, roaming, and SSID configuration?

A. repeater mode
B. autonomous mode
C. bridge mode
D. lightweight mode

Answer: D

NEW QUESTION 611
- (Topic 4)
An engineer is configuring switch SW1 to act an NTP server when all upstream NTP server connectivity fails. Which configuration must be used?
A)

```
SW1# config t
SW1(config)#ntp peer 192.168.1.1
SW1(config)#ntp access-group peer accesslist1
```

B)

```
SW1# config t
SW1(config)#ntp master
SW1(config)#ntp server 192.168.1.1
```

C)

```
SW1# config t
SW1(config)#ntp server 192.168.1.1
SW1(config)#ntp access-group server accesslist1
```

D)

```
SW1# config t
SW1(config)#ntp backup
SW1(config)#ntp server 192.168.1.1
```

A. Option A
B. Option B
C. Option C
D. Option D

Answer: B

NEW QUESTION 612
FILL IN THE BLANK - (Topic 4)
Refer to the exhibit.

```
R2#show ip ospf interface
GigabitEthernet0/0/0 is up, line protocol is up
   Internet address is 192.168.1.1/24, Area 0
   Process ID 1, Router ID 192.168.1.1, Network Type BROADCAST, Cost: 1
   Transmit Delay is 1 sec, State DROTHER, Priority 1
   Designated Router (ID) 192.168.1.1, Interface address 192.168.1.2
   Backup Designated Router (ID) 192.168.1.1, Interface address 192.168.1.2
   Timer intervals configured, Hello 10, Dead 40, Wait 40, Retransmit 5
     Hello due in 00:00:02
   Index 2/2, flood queue length 0
    Neighbor Count is 1, Adjacent neighbor count is 2
```

Router OldR is replacing another router on the network with the intention of having OldR and R2 exchange routes_ After the engineer applied the initial OSPF configuration: the routes were still missing on both devices. Which command sequence must be issued before the clear IP ospf process command is entered to enable the neighbor relationship?

○ OldR(config)#**interface g0/0/0**
   OldR(config-if)#**ip ospf dead-interval 15**

○ OldR(config)#**router ospf 1**
   OldR(config-router)#**no router-id 192.168.1.1**

◉ OldR(config)#**router ospf 1**
   OldR(config-router)#**network 192.168.1.0 255.255.255.0 area 2**

○ OldR(config)#**interface g0/0/0**
   OldR(config-if)#**ip ospf hello-interval 15**

A. Option A
B. Option B
C. Option C
D. Option D

Answer: C

NEW QUESTION 616
- (Topic 4)
When a switch receives a frame for an unknown destination MAC address, how is the frame handled?

A. broadcast to all ports on the switch
B. flooded to all ports except the origination port
C. forwarded to the first available port
D. inspected and dropped by the switch

Answer: D

NEW QUESTION 617
- (Topic 4)
A DHCP pool has been created with the name NOCC. The pool is using 192.168.20.0/24 and must use the next to last usable IP address as the default gateway for the DHCP clients. What is the next step in the process?

A. default-router192.168.20.253
B. network 192.168.20.254 255.255.255.0 secondary
C. ip default-gateway 0.0.0.0 0.0.0.0 192.168.20.253
D. next-server 192.168.20.254

Answer: A

NEW QUESTION 620
- (Topic 4)
Refer to the exhibit.
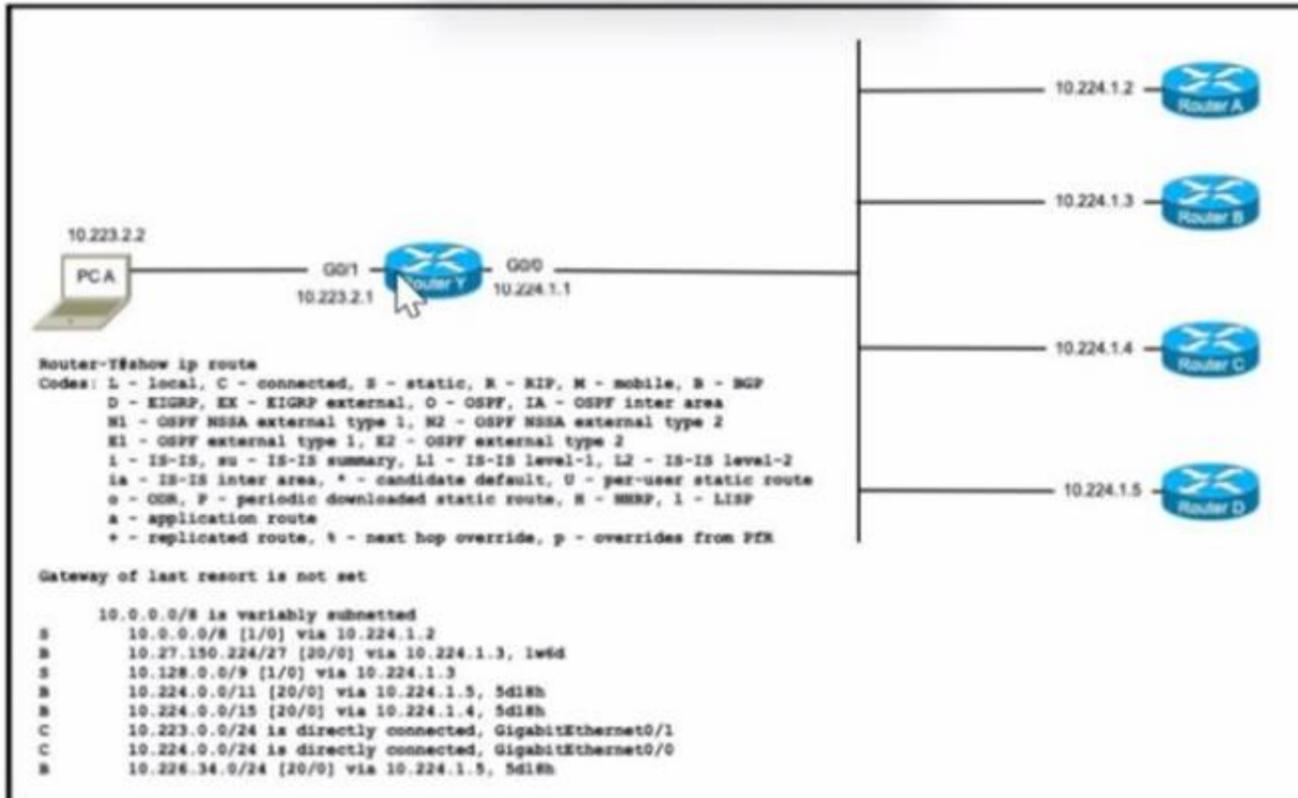
PC A is communicating with another device at IP address 10.227.225.255. Through which router does router Y route the traffic?

A. router A
B. router B
C. router C
D. router D

Answer: C

NEW QUESTION 624
- (Topic 4)
What is the difference between 1000BASE-LX/LH and 1000BASE-ZX interfaces?

A. 1000BASE-ZX is supported on links up to 1000km, and 1000BASE-LX/LH operates over links up to 70 km.
B. 1000BASE-LX/LH interoperates with multimode and single-mode fiber, and 10008ASE- ZX needs a conditioning patch cable with a multimode.
C. 1000BASE-LX/LH is supported on links up to 10km, and 1000BASE-ZX operates over links up to 70 km
D. 1000BASE-ZX interoperates with dual-rate 100M/1G 10Km SFP over multimode fiber, and 1000BASE-LX/LH supports only single-rate.

Answer: C

NEW QUESTION 625
- (Topic 4)
What are two functions of DHCP servers? (Choose two.)

A. prevent users from assigning their own IP addresses to hosts
B. assign dynamic IP configurations to hosts in a network
C. support centralized IP management
D. issue DHCPDISCOVER messages when added to the network
E. respond to client DHCPOFFER requests by issuing an IP address

Answer: BC

NEW QUESTION 629
- (Topic 4)
Refer to the exhibit.
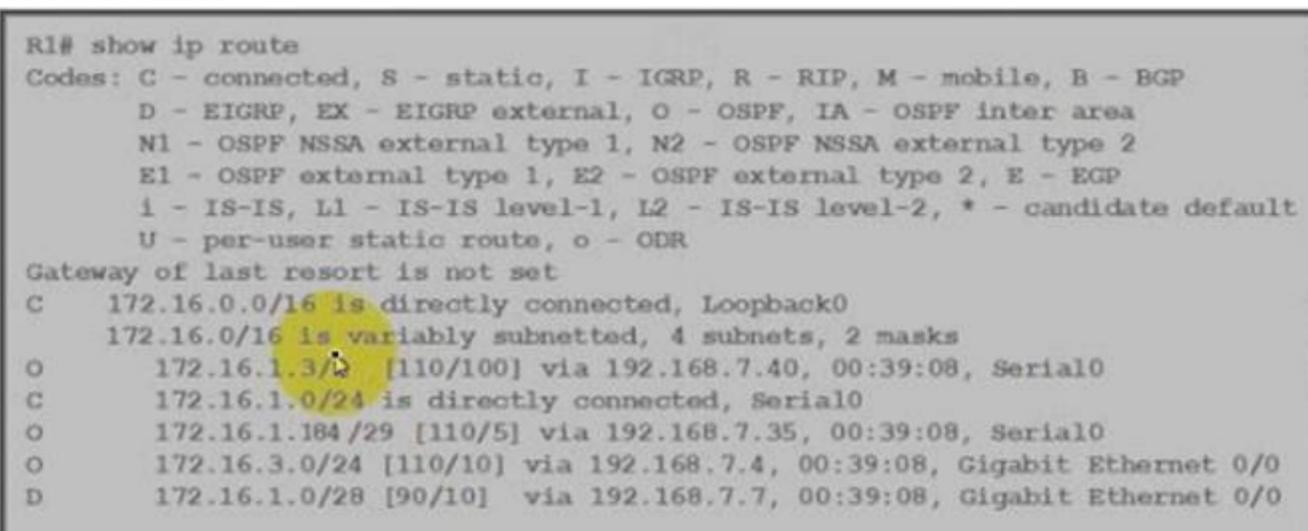
Load-balanced traffic is coming in from the WAN destined to a host at 172.16.1.190. Which next-hop is used by the router to forward the request?

A. 192.168.7.4
B. 192.168.7.7
C. 192.168.7.35
D. 192.168.7.40

Answer: D

NEW QUESTION 630
- (Topic 4)
Refer to the exhibit.
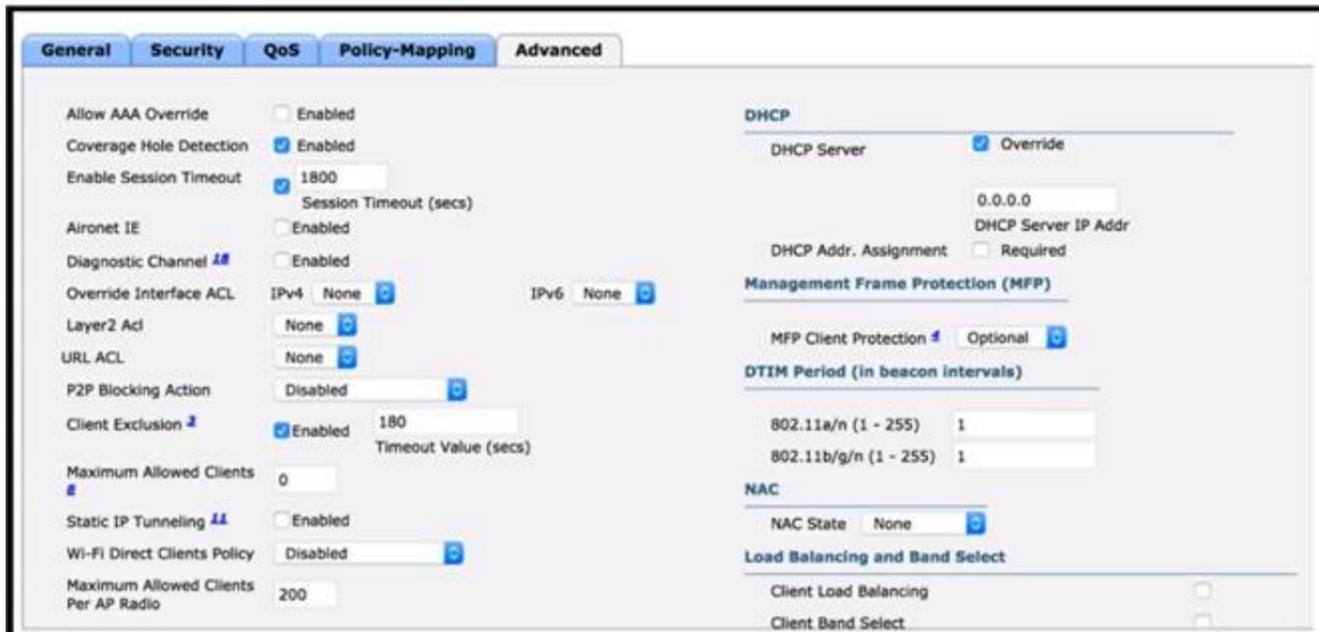
The P2P blocking action option is disabled on the WLC.

A. Enable the Static IP Tunneling option.
B. Disable the Coverage Hole Detection option.
C. Check the DHCP Add
D. Assignment check box.
E. Set the P2P Blocking Action option to Forward-UpStream.

Answer: A

NEW QUESTION 633
- (Topic 4)
What describes the functionality of southbound APIs?

A. They use HTTP messages to communicate.
B. They enable communication between the controller and the network device.
C. They convey information from the controller to the SDN applications.
D. They communicate with the management plane.

Answer: B

NEW QUESTION 634
- (Topic 4)
Refer to the exhibit.
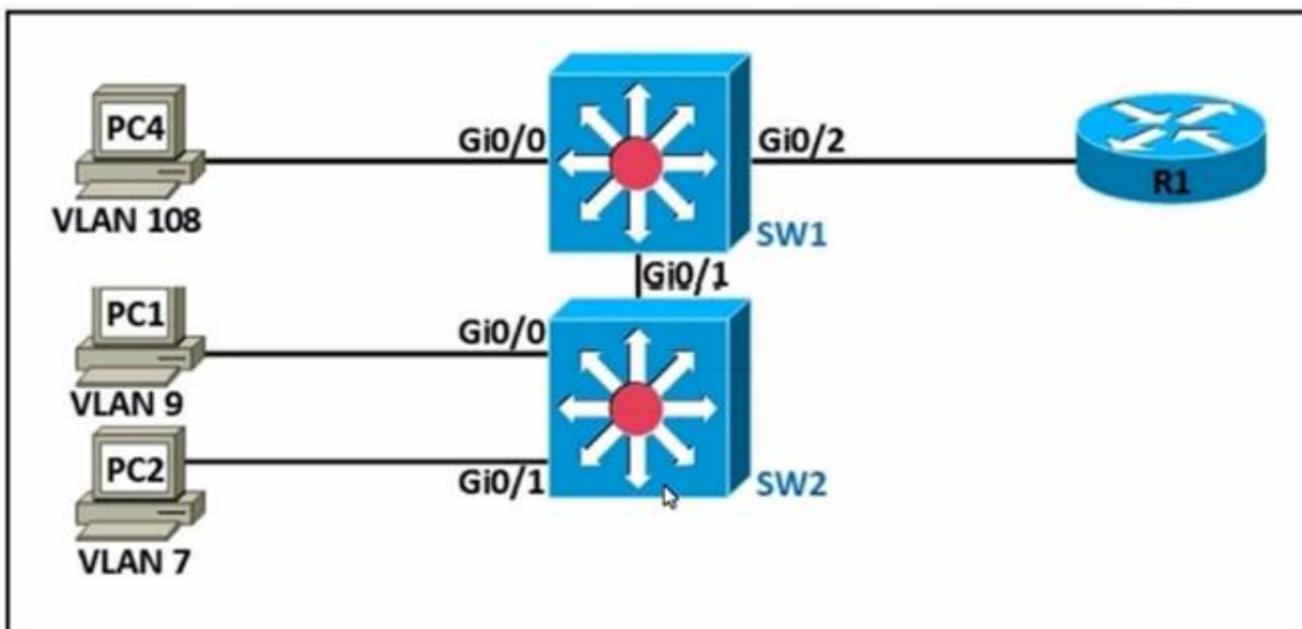
The SW1 and SW2 Gi0/0 ports have been preconfigured. An engineer is given these requirements:
• Allow all PCs to communicate with each other at Layer 3.
• Configure untagged traffic to use VLAN 5.
• Disable VLAN 1 from being used.
Which configuration set meets these requirements?

A. SW1#interface Gi0/1switchport mode trunkswitchport trunk allowed vlan 5,7,9,108 switchport trunk native vlan 5interface Gi0/2 switchport mode trunkswitchport trunk allowed vlan 5,7,9,108 SW2#interface Gi0/1 switchport mode access switchport access vlan 7 interface Gi0/7 switchport mode trunkswitchport trunk allowed vlan 7,9,108

B. SW1#interface Gi0/1 switchport mode trunkswitchport trunk allowed vlan 5,7,9,108 switchport trunk native vlan 5interface Gi0/2 switchport mode accessswitchport trunk allowed vlan 7,9,108 SW2#interface Gi0/1 switchport mode accessno switchport access vlan 1 switchport access vlan 7 interface Gi0/7switchport mode trunkswitchport trunk allowed vlan 7,9,108 switchport trunk native vlan 5

C. SW#1 -interface Gi0/1 switchport mode trunkswitchport trunk allowed vlan 5,7,9,108 switchport trunk native vlan 5interface Gi0/2 switchport mode trunkswitchport trunk allowed vlan 5,7,9,108 SW2#interface Gi0/1 switchport mode access switchport access vlan 7 interface Gi0/7 switchport mode trunkswitchport trunk allowed vlan 5,7,9,108 switchport trunk native vlan 5

D. SW1#interface Gi0/1 switchport mode trunkswitchport trunk allowed vian 5,7,9,108 interface Gi0/2switchport mode trunkswitchport trunk allowed vlan 7,9,108 SW2#interface Gi0/1 switchport mode trunkswitchport trunk allowed vlan 7 interface Gi0/7switchport mode trunkswitchport trunk allowed vlan 5,7,9,108

Answer: C

NEW QUESTION 638
DRAG DROP - (Topic 4)
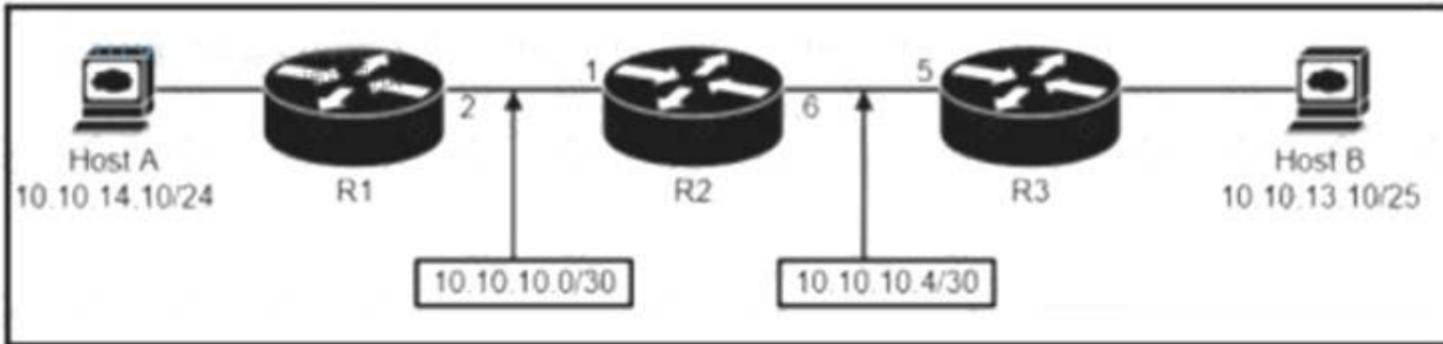
Refer to the exhibit. An engineer must configure a static network route between two networks so that host A communicates with host B. Drag and drop the commands from the left onto the routers where they must be configured on the right. Not all commands are used.

A. Mastered
B. Not Mastered

Answer: A

Explanation:

NEW QUESTION 639
- (Topic 4)
Refer to the exhibit.
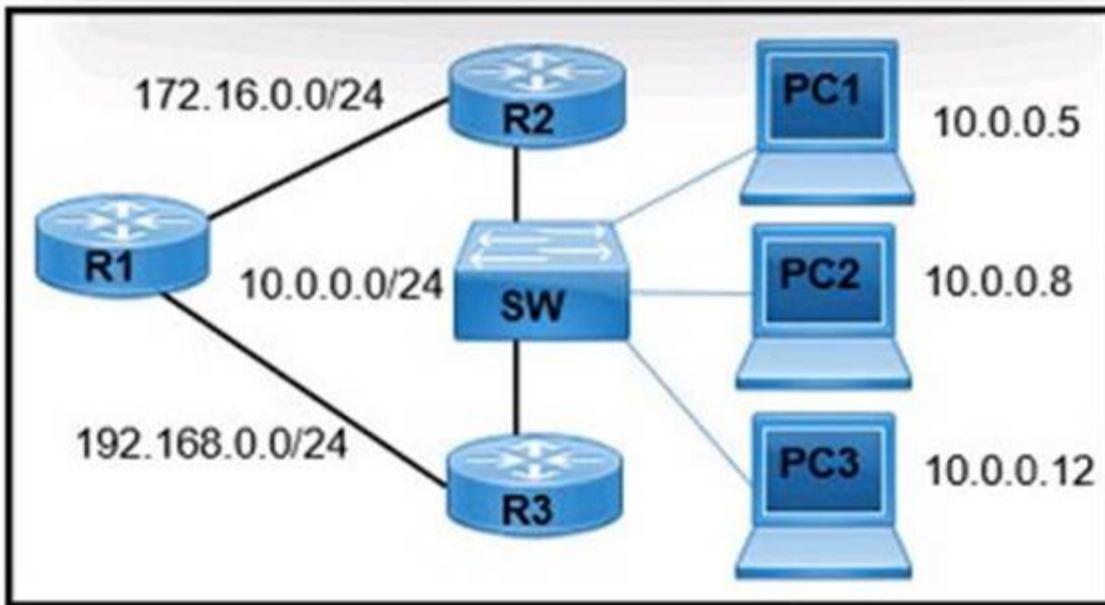
A network engineer must configure R1 so that it sends all packets destined to the 10.0.0.0/24 network to R3, and all packets destined to PCI to R2. Which configuration must the engineer implement?

A)

R1(config)#ip route 10.0.0.0 255.255.255.0 172.16.0.2
R1(config)#ip route 10.0.0.5 255.255.255.255 192.168.0.2

B)

R1(config)#ip route 10.0.0.0 255.255.0.0 172.16.0.2
R1(config)#ip route 10.0.0.5 255.255.255.255 192.168.0.2

C)

R1(config)#ip route 10.0.0.0 255.255.255.0 192.168.0.2
R1(config)#ip route 10.0.0.5 255.255.255.255 172.16.0.2

D)

R1(config)#ip route 10.0.0.0 255.255.0.0 192.168.0.2
R1(config)#ip route 10.0.0.0 255.255.255.0 172.16.0.2

A. Option A
B. Option B
C. Option C
D. Option D

Answer: C

NEW QUESTION 640
DRAG DROP - (Topic 4)
Drag and drop the use cases for device-management technologies from the left onto the corresponding.

A. Mastered
B. Not Mastered

Answer: A

Explanation:
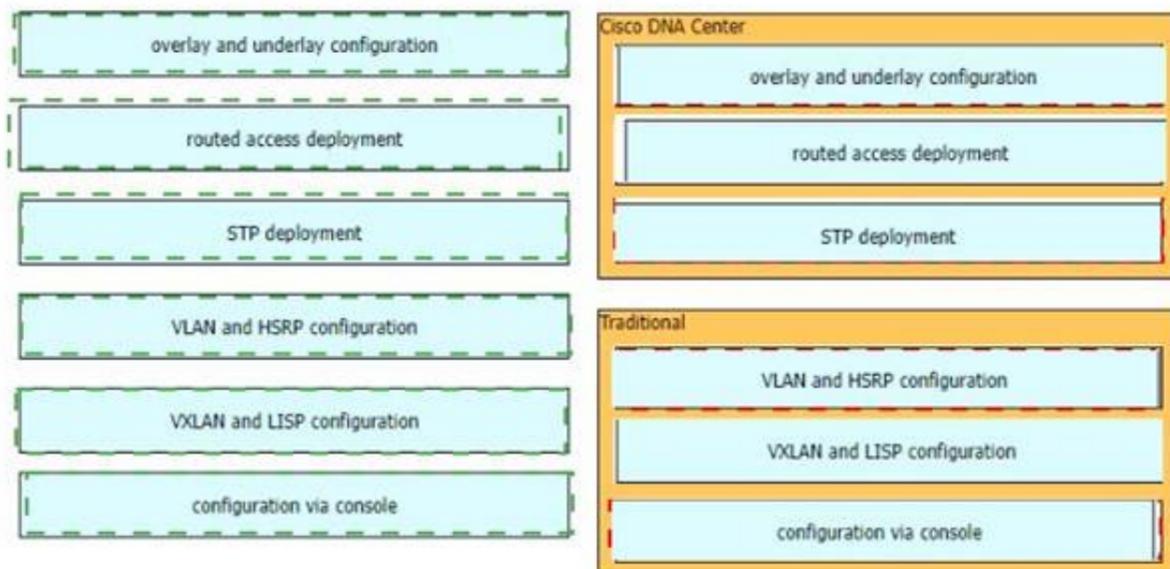
NEW QUESTION 643
FILL IN THE BLANK - (Topic 4)
A network architect is deciding whether to implement Cisco autonomous access points or lightweight access points. Which fact about firmware updates must the architect consider?

A. Unlike lightweight access points, which require
B. Unlike lightweight access points, which require redundant WLCs to support firmware upgrades, autonomous access points require only one WLC.
C. Unlike autonomous access points, lightweight access points store a complete copy of the current firmware for backup.
D. Unlike lightweight access points, autonomous access points can recover automatically from a corrupt firmware update.
E. Unlike autonomous access points, lightweight access points require a WLC to implement remote firmware updates.

Answer: D

NEW QUESTION 644
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