

Up-to-date Questions and Answers from authentic resources to improve knowledge and pass the exam at very first attempt. ---- Guaranteed.





killexams.com

**Ericsson** 

**ECP-206** 

Certified Associate - IP Networking











## Question: 140

Which network is reserved as a private network according to RFC1918?

A. 172.16.1.0/9

B. 10.254.1.0/24

C. 193.168.1.0/24

D. 172.15.1.0/24

#### **Answer: B**

# Explanation:

According to RFC1918, there are three network blocks reserved as private networks that are not allocated to any specific organization and are not routable on the public Internet.

These are:

## Question: 141

Which action will influence BGP route selection within your AS?

- A. reducing number of hops in the network
- B. changing the default value of the local preference
- C. changing the default link metric
- D. changing the administrative distance for eBGP

#### **Answer: B**

## Explanation:

The action that will influence BGP route selection within your AS is changing the default value of the local preference attribute. The local preference attribute is used to indicate the preference of a path among multiple paths learned from different external BGP neighbors or autonomous systems (ASes). The higher the local preference value, the more preferred the path is within your AS, and vice versa. The default value of local preference is 100, but you can change it using route maps or other configuration methods on your BGP routers.

Reference: Ericsson IP Networking - Routing Protocols, BGP Attributes and Path Selection, BGP Local Preference Attribute: Controlling Traffic Like a Pro

# Question: 142

Which statement is true about LDP?

- A. LDP and IGP both exchange their databases every 60 seconds.
- B. LDP and IGP both exchange their databases every 30 seconds.
- C. LDP relies on IGP for all routing-related decisions.
- D. LDP performs routing functions along with IG

#### **Answer: C**

## Explanation:

LDP relies on IGP for all routing-related decisions. LDP is a protocol that distributes labels in an MPLS environment, but it does not perform any routing functions. LDP uses the underlying routing information provided by an IGP, such as OSPF or IS-IS, to forward label packets. LDP and IGP do not exchange their databases at regular intervals, but rather use hello messages to maintain adjacencies and sessions.

Reference: Ericsson IP Networking - Routing Protocols, Label Distribution Protocol - Wikipedia

# **Question: 143**

Which two statements are true about priority queuing (PQ)? (Choose two.)

- A. Traffic in the highest priority queue will experience the least amount of jitter and delay compared to traffic in the other queues.
- B. Traffic in the highest priority queue is only reserved for voice traffic.
- C. Traffic in lower priority queues can be starved of bandwidth.
- D. Traffic in all queues are always guaranteed a minimum bandwidth.

# Answer: A,C

## Explanation:

Priority queuing (PQ) is a queuing method that establishes four interface output queues that serve different priority levels: high, medium, normal, and low. Traffic in the highest priority queue will experience the least amount of jitter and delay compared to traffic in the other queues, because PQ always services the higher-priority queues first. However, this can also cause traffic in lower priority queues to be starved of bandwidth, especially if the highest priority queue is oversubscribed. Traffic in the highest priority queue is not only reserved for voice traffic, but can also include network control and routing traffic. Traffic in all queues are not always guaranteed a minimum bandwidth, because PQ does not provide any bandwidth reservation mechanism.

Reference: Quality of Service (QoS) Queues and Queuing Explained, Chapter: Configuring Priority Queueing - Cisco

# **Question: 144**

Review the exhibit.

| Network          | Next Hop       |
|------------------|----------------|
| 0.0.0.0/0        | 10.126.131.254 |
| 192.168.1.0/24   | 10.126.131.253 |
| 192.168.1.128/25 | 10.126.131.252 |
| 192.168.1.64/26  | 10.126.131.251 |
| 192.168.0.65/32  | 10.126.131.250 |
| 192.168.1.64/27  | 10.126.131.249 |

Given the routing table shown in the exhibit, what is the next-hop to reach the host 192.168.1.129?

A. 10.126.131.251 B. 10.126.131.252

C. 10.126.131.250

D. 10.126.131.248

## **Answer: C**

## Explanation:

The next-hop to reach the host 192.168.1.129 is 10.126.131.250. This can be determined by looking at the routing table in the exhibit. The host 192.168.1.129 falls within the range of the network 192.168.1.64/26, which has a next-hop of 10.126.131.250.

Reference: Ericsson IP Networking - IP Addressing, Software Installation and Upgrade Overview (Junos OS)

## **Question: 145**

Which two statements are true about link-state routing protocols? (Choose two.)

- A. The advertisement exchange is mainly triggered by a change in the network.
- B. Each router uses a reliable update mechanism to exchange topology information with its neighbors.
- C. Link-state routing protocols mainly use hop-counts to determine the link cost
- D. A distance vector algorithm is very processor intensive compared to Dijkstra's algorithm.

## **Answer: A,B**

# Explanation:

Link-state routing protocols are one of the two main classes of routing protocols used in packet switching networks for computer communications, the other being distance-vector routing protocols. Examples of link-state routing protocols include Open Shortest Path First (OSPF) and Intermediate System to Intermediate System (IS-IS). The basic concept of link-state routing is that every node constructs a map of the connectivity to the network, in the form of a graph, showing which nodes are connected to which other nodes. Each node then independently calculates the next best logical path from it to every possible destination in the network. Each collection of best paths will then form each nodeâs routing table.

Two statements that are true about link-state routing protocols are:

The advertisement exchange is mainly triggered by a change in the network. Link-state routing protocols use a

flooding mechanism to distribute information about the network topology to all routers in the same area or domain. This information is encapsulated in link-state packets (LSPs) or link-state advertisements (LSAs), which contain information about the router, its directly connected links, and the state of those links. LSPs or LSAs are sent only when there is a change in the topology, such as a link failure or recovery, or when a periodic refresh timer expires. This way, link-state routing protocols can quickly adapt to network changes and maintain an accurate and consistent view of the network.

Each router uses a reliable update mechanism to exchange topology information with its neighbors. Link-state routing protocols use a reliable update mechanism to ensure that all routers receive and acknowledge the LSPs or LSAs sent by their neighbors. This mechanism involves sending hello messages to establish and maintain adjacencies with neighbors, sending acknowledgment messages to confirm the receipt of LSPs or LSAs, and requesting missing or outdated LSPs or LSAs from neighbors. This mechanism ensures that all routers have a synchronized database of LSPs or LSAs, which is used to build a complete network connectivity map and to calculate the shortest path to destinations.

Reference: Link-state routing protocol - Wikipedia, Ericsson IP Networking - Routing Protocols

# **Question: 146**

Which operating system is used in Ericsson Router 6000 products?

A. SE-OS

B. ERS

C. ERS

D. IPOS

E. Junos

#### **Answer: C**

#### Explanation:

The operating system used in Ericsson Router 6000 products is ERS (Ericsson Router Software). ERS is based on IPOS (IP Operating System), which is a common operating system for Ericssonâs IP portfolio. ERS provides advanced features and functionality for IP transport, such as MPLS, Segment Routing, QoS, IPSec, synchronization, SDN, and more. ERS also supports seamless integration with Ericsson

Radio System and Ericsson Network Manager.

Reference: Router 6000 Series - Ericsson, Router 6675 Datasheet - Winncom

# Question: 147

What network information is, without additional configuration, shared between two iBGP neighbors by default?

- A. BGP routes learned from an OSPF neighbor
- B. IP address information of loopback interfaces
- C. BGP routes learned from eBGP neighbors
- D. IP address information from all directly connected interfaces

## **Answer: C**

## Explanation:

iBGP works by exchanging routing information between two or more routers within an AS. Each router sends its own routing table to its neighbors, which contains information about the networks it knows and how they can be reached from that router. By default, iBGP neighbors only share BGP routes learned from eBGP neighbors, which are routers in different ASes. This is because iBGP assumes that all routers within an AS have consistent internal routing information provided by an IGP, such as OSPF or IS-IS. Therefore, iBGP neighbors do not need to share IP address information of loopback interfaces or directly connected interfaces, unless explicitly configured to do so by using commands such as neighbor update-source or network.

Reference: iBGP Ultimate Guide | How iBGP Is Different From eBGP, Ericsson IP Networking - Routing Protocols

# Question: 148

An IS-IS router has been assigned the NSAP address: 49.00F0.0100.5012.3010.00.

What is the Area ID to which the router belongs?

A. 49.00F0

B. 49.00F0.0100

C. 5012.3010.00

D. 00F0 0100

#### **Answer: B**

## Explanation:

The Area ID to which the router belongs is 49.00F0.0100. The Area ID is a variable-length field in the NSAP address that identifies the area to which the router belongs. The Area ID can be between 1 and 13 bytes long, but it must start and end with an octet (8 bits). The NSAP address is composed of three parts: the authority and format identifier (AFI), the area ID, and the system ID. The AFI is a one-octet field that indicates the format and authority of the rest of the address. The system ID is a fixed-length field of six octets that uniquely identifies the router within an area. The NSAP address also has a

network selector (NSEL) field, which is a one-octet field that identifies the network layer service to which a packet should be sent. For IS-IS routers, the NSEL must always be 00.

In this question, the NSAP address is 49.00F0.0100.5012.3010.00.

This means that:

The AFI is 49, which indicates a private address.

The Area ID is 00F0.0100, which is four octets long and starts and ends with an octet.

The system ID is 5012.3010, which is six octets long and identifies the router within the area.

The NSEL is 00, which indicates IS-IS.

Therefore, the answer is B.

Reference: Ericsson IP Networking - Routing Protocols, IS-IS NSAP address - Cisco Community, Understanding IS-IS NSAP Addresses - Todd Lammle, LLC, IS-IS - Nokia, Network service access point address - Wikipedia

## **Question: 149**

P routers forward packets based on the \_\_\_\_\_.

A. flow label

B. VPN label

C. LSP label

D. inner label

## **Answer: C**

#### Explanation:

Prouters forward packets based on the LSP label. The LSP label is the label that corresponds to the label-switched path (LSP) that is established between two PE routers in an MPLS network. The LSP label is also called the outer label or the transport label, because it is used to transport packets across the MPLS core network. Prouters are also called LSRs (label switch routers) or transit routers, because they switch packets based on their labels or remove the labels. Prouters do not need to look at the IP header or any other information in the packet, except for the top label in the label stack. Prouters perform one of three possible operations on labels: swap, pop, or PHP (penultimate hop popping). In a swap operation, the label is swapped with a new label, and the packet is forwarded along the path associated with the new label. In a pop operation, the label is removed from the packet, and the packet is forwarded based on its IP header or another label in the stack. In a PHP operation, the label is removed from the packet at the last P router before reaching the egress PE router, and the packet is forwarded without any label to the egress PE router.

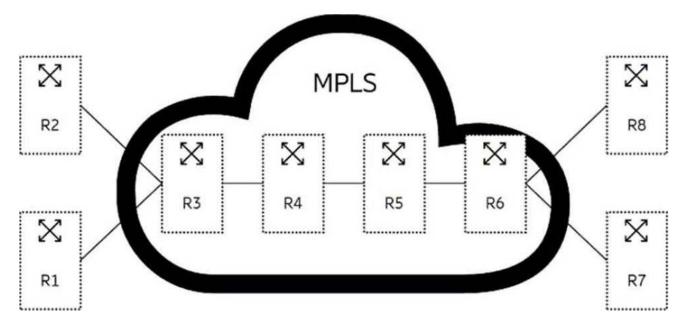
The LSP label is different from other types of labels that may be used in MPLS networks, such as VPN labels or service labels. These labels are used to identify different VPNs or services that run over MPLS networks, such as Layer 2 VPNs, Layer 3 VPNs, traffic engineering, or QoS. These labels are also called inner labels or payload labels, because they are related to the payload of the packet. These labels are not used by P routers for forwarding decisions, but only by PE routers for delivering packets to their destinations.

Therefore, the answer is C.

Reference: Ericsson IP Networking - Routing Protocols, MPLS Fundamentals: Forwarding Labeled Packets - Cisco Press, MPLS Labels and Devices - NetworkLessons.com, Multiprotocol Label Switching - Wikipedia, VPN Packet Forwarding > MPLS/VPN Architecture Overview | Cisco Press, Basic concepts - Hewlett Packard Enterprise

Question: 150

Review the exhibit.



In the exhibit, which action is performed by router R4?

A. pop

B. push

C. PHP

D. swap

## **Answer: D**

## Explanation:

In the exhibit, router R4 is performing a swap action. This means that router R4 is replacing the incoming label with a new label and forwarding the packet to the next hop along the LSP. In this case, router R4 receives a packet with label 20 from router R3 and swaps it with label 30 before sending it to router R5.

The exhibit shows an example of an MPLS network with four routers: R1, R2, R3, and R4. Router R1 is the ingress PE router and router R4 is the egress PE router. Router R2 and R3 are P routers. Router R1 assigns label 10 to the packet and sends it to router R2. Router R2 swaps label 10 with label 20 and sends it to router R3. Router R3 swaps label 20 with label 30 and sends it to router R4. Router R4 removes label 30 from the packet and forwards it based on its IP header  $\hat{a}$  or another label in the stack. Therefore, the answer is D.

Reference: MPLS Label Switching | MPLS Operation | Push, Swap,Push IPCisco, A Complete Guide to Multiprotocol Label Switching (MPLS) - G2, Multiprotocol Label Switching - Wikipedia

# **Question: 151**

In a company network, a host sends an Ethernet frame destined to the address FF:FF:FF:FF:FF.

What will an Ethernet switch do with this frame?

- A. It will forward the frame to only one port.
- B. It will forward the frame to all ports.
- C. It will drop it.

D. It will send the frame only to management port.

#### **Answer: B**

#### Explanation:

An Ethernet switch will forward the frame to all ports when the destination address is FF:FF:FF:FF:FF:FF. This is because this address is the broadcast MAC address, which means that the frame is intended for all devices on the same LAN segment. The switch does not need to look up its MAC address table to find a matching entry for this address, but simply floods the frame out of all ports except the one where it received the frame. This way, the frame reaches every device on the LAN segment, regardless of their MAC addresses.

Reference: Ethernet - Wireshark, Broadcast MAC Address - omnisecu.com

# Question: 152

Which two statements are true about route summarization? (Choose two.)

- A. It reduces the size of a routing table.
- B. It reduces signaling.
- C. It summaries the routing table entries into a default route
- D. It improves the best route calculation.

## **Answer: A,B**

## Explanation:

Route summarization is a technique that reduces the number of routes that a router advertises to its neighbors by creating a single summary route that covers multiple subnets or networks.

Route summarization has several benefits, such as:

It reduces the size of a routing table, which saves memory and CPU resources on the router. A smaller routing table also improves the lookup efficiency and convergence time of the routing protocol.

It reduces signaling, which means that less bandwidth is consumed by routing updates and less processing is required by neighboring routers. This also enhances the stability and scalability of the network, as fewer routing changes are propagated.

It improves route aggregation, which means that more specific routes are replaced by a less specific route that can be advertised to other autonomous systems or routing domains. This simplifies the inter-domain routing and hides the internal topology details.

Route summarization does not necessarily summarize the routing table entries into a default route, although a default route can be considered a special case of route summarization where all destinations are covered by one route. Route summarization also does not improve the best route calculation, as it may introduce suboptimal routing or black holes if not done properly.

Reference: Introduction to Route Summarization - NetworkLessons.com, Route

Summarization > Example for Understanding Route Summarization - Cisco Press

# **Question: 153**

Which two label actions are performed by a P router? (Choose two.)

A. push

B. php

C. drop

D. swap

# Answer: A,B,D

## Explanation:

A P router is a provider router that is part of the service providerâs core network in an MPLS environment. A P router does not have any customer routes or VPN information, but only has information about how to reach other P routers and PE routers in the same MPLS domain. A P router performs label switching, which means that it forwards labeled packets based on their top label in the label stack. A P router can perform two possible label actions:

Swap: The P router replaces the incoming label with a new label that corresponds to the next hop along the label-switched path (LSP). The new label is determined by looking up the label forwarding information base (LFIB) based on the incoming label and interface.

PHP: The P router removes the top label from the packet at the penultimate hop before reaching the egress PE router. This is done to avoid an extra lookup on the egress PE router, which can forward the packet based on its IP header or another label in the stack.

A P router does not perform push or drop actions on labels. A push action means adding one or more labels to the packet, which is done by an ingress PE router when initiating an LSP. A drop action means discarding a packet, which is done by any router when there is no matching entry in its LFIB or routing table. Reference: â Provider (P) Router in IP MPLS Network - Cisco Community, MPLS Fundamentals: Forwarding Labeled Packets - Cisco Press, MPLS Label Switching | MPLS Operation | Push, Swap, Push IP Cisco

## Question: 154

How is a BGP session established between two routers?

- A. The BGP router sends a unicast NOTIFICATION message.
- B. The BGP router sends a unicast OPEN message.
- C. The BGP router sends a multicast CONNECT message.
- D. The BGP router sends a multicast HELLO packet.

## **Answer: B**

#### Explanation:

A BGP session is established between two routers by sending a unicast OPEN message. BGP uses TCP as its transport protocol, which means that before exchanging any BGP information, a TCP connection must be established between the routers. The TCP connection uses port 179 as both source and destination port. After establishing a TCP connection, each router sends an OPEN message to its neighbor, containing parameters such as BGP version number, AS number, hold time, BGP identifier, and optional capabilities. The OPEN message also serves as a keepalive

message for BGP. If both routers agree on these parameters, they proceed to exchange UPDATE messages containing routing information and establish a BGP session.

A BGP router does not send a NOTIFICATION message to establish a session, but rather to terminate a session due to an error or a manual shutdown. A BGP router does not send a CONNECT message, as this is a TCP state, not a BGP message. A BGP router does not send a multicast HELLO packet, as this is an OSPF message, not a BGP message.

Reference: BGP Neighbor States > BGP Fundamentals | Cisco Press, Demystifying BGP Session Establishments - Packet Pushers, The TCP/IP Guide - BGP Connection Establishment: Open Messages

# **SAMPLE QUESTIONS**



These questions are for demo purpose only. **Full version** is up to date and contains actual questions and answers.

Killexams.com is an online platform that offers a wide range of services related to certification exam preparation. The platform provides actual questions, exam dumps, and practice tests to help individuals prepare for various certification exams with confidence. Here are some key features and services offered by Killexams.com:



<u>Actual Exam Questions</u>: Killexams.com provides actual exam questions that are experienced in test centers. These questions are updated regularly to ensure they are up-to-date and relevant to the latest exam syllabus. By studying these actual questions, candidates can familiarize themselves with the content and format of the real exam.

**Exam Dumps**: Killexams.com offers exam dumps in PDF format. These dumps contain a comprehensive collection of questions and answers that cover the exam topics. By using these dumps, candidates can enhance their knowledge and improve their chances of success in the certification exam.

<u>Practice Tests</u>: Killexams.com provides practice tests through their desktop VCE exam simulator and online test engine. These practice tests simulate the real exam environment and help candidates assess their readiness for the actual exam. The practice tests cover a wide range of questions and enable candidates to identify their strengths and weaknesses.

<u>Guaranteed Success</u>: Killexams.com offers a success guarantee with their exam dumps. They claim that by using their materials, candidates will pass their exams on the first attempt or they will refund the purchase price. This guarantee provides assurance and confidence to individuals preparing for certification exams.

<u>Updated Content:</u> Killexams.com regularly updates its question bank and exam dumps to ensure that they are current and reflect the latest changes in the exam syllabus. This helps candidates stay up-to-date with the exam content and increases their chances of success.

<u>Technical Support</u>: Killexams.com provides free 24x7 technical support to assist candidates with any queries or issues they may encounter while using their services. Their certified experts are available to provide guidance and help candidates throughout their exam preparation journey.