Exam : 350-029

Title : CCIE SP Written Exam

Ver : 10-04-07

QUESTION 1:

Based on the following output in Certkiller 1, which statement is true
Certkiller 1#show mpls forwarding-table 50.0.0.3 detail
Local Outgoing Prefix Bytes tag Outgoing Next Hop
tag tag or VC or Tunnel Id switched interface
19 17 50.0.0.3/32 0 Et0/0 192.168.0.14

A. None of the other alternatives apply.
B. If a labeled packet arrives with the top most label of 19, it will be replaced with label 17 and sent out on Ethernet 0/0 interface.
C. If a labeled packet arrives with the top most label of 17, it will be replaced with label 19 and sent out on Ethernet 0/0 interface.
D. If a labeled packet arrives with the top most label of 17, all the labels will be removed and a clear IP packet is sent to Next Hop 192.168.0.14 on Ethernet 0/0.

Answer: B

QUESTION 2:

Based on the following output in a router A running LDP, which statement is true?
show mpls ldp bindings 50.0.0.1 32
tib entry: 50.0.0.1/32, rev 5
local binding: tag: imp-null
remote binding:tsr:50.0.0.4:0, tag:16

A. The IP address 50.0.0.1/32 is assigned to the non-directly connected LDP neighbor, 50.0..0.4.
B. The IP address 50.0.0.1/32 is assigned to its directly connected LDP neighbor, 50.0..0.4.
C. None of the other alternatives apply.
D. The IP address 50.0.0.1/32 is assigned to one of its own interfaces.

Answer: D

QUESTION 3:

What OSPF LSA is used to support MPLS-traffic Engineering ?

A. Opaque LSA (Type 9)
B. Opaque LSA (Type 10)
C. NSSA LSA (Type 7)
D. Opaque LSA (Type 11)
E. External LSA (Type 5)

Answer: B

QUESTION 4:

What statement about Transit AS is true?

A. Traffic and prefixes originating from Source AS are carried across a Transit AS to reach their destination AS.
B. None of the other alternatives apply.
C. Traffic and prefixes originating from Transit AS are carried across a Stub AS to their destination AS.
D. Traffic and prefixes originating from Transit AS are carried across a Stub AS to their Source AS.

Answer: A

QUESTION 5:

In which state can BGP peers exchange Update messages?

A. Idle
B. OpenConfirm
C. OpenSent
D. Active
E. Established

Answer: E

QUESTION 6:

Which of the following technologies can improve convergence time following a link failure in a service provider network?

A. VPLS
B. MPLS TE FR
C. RSVP
D. MPLS VPN
E. SNMP
F. BFD

Answer: B,F

QUESTION 7:

A Successor is:

A. Any neighbor that is in the path towards the destination.
B. Any neighbor that is in the path towards the destination and whose reported distance equals the feasible distance.
C. A neighbor that has met the feasibility condition
D. A neighbor that has met the feasibility condition and has the lowest cost path towards the destination

Answer: D

QUESTION 8:

Which of the following processes in IOS XR run exclusively on the Route Processor?

A. gsp
B. wdsysmon
C. sysmgr
D. mpls_idp
E. bgp

Answer: D,E

QUESTION 9:

In which of the following lists of APS Action Requests is the priority correctly arranged from lowest to highest?

A. Wait-to-Restore, Forced Switch, Manual Switch, Lockout of Protection.
B. Wait-to-Restore, Manual Switch, Forced Switch, Lockout of Protection
C. Wait-to-Restore, Manual Switch, Lockout of Protection, Forced Switch
D. Manual Switch, Wait-to-Restore, Lockout of Protection, Forced Switch.
E. Lockout of Protection, Forced Switch, Manual Switch, Wait-to-Restore
F. Lockout of Protection, Manual Switch, Forced Switch, Wait-to-Restore

Answer: B

QUESTION 10:

Which two statements regarding the IS-IS DIS election process are true? (Choose Two.)

A. A priority of 0 will prevent a router from becoming a DIS.
B. Separate L1 and L2 election processes are held on a brodcast network.
C. Adding a router with a higher priority than the current DIS will result in the new router becoming DIS.
D. L1 routers on a broadcast network only establish adjacencies with the DIS.
E. If there is a tie based on priority, the router whose attached interface has the lowest

MAC address becomes the DIS.
F. If the DIS becomes unavailable the backup DIS is promoted to DIS.

Answer: B,C

QUESTION 11:

Which descriptions of Netflow is correct?

A. Netflow accounts for both transit traffic and traffic destined for the router.
B. Netflow answers questions regarding IP traffic:who,what,where,when,and how
C. By default,Netflow records bidirectional IP traffic flow.
D. Netflow returns the subinterface information in the flow records.

Answer: A,B,D

QUESTION 12:

When configuring Multicast VPN (MVPN) over an MPLS core, both the Default and Data MDT is configured under which configuration mode?

A. router(config-router-af)#
B. router(config)#
C. router(config-router)#
D. router(config-vrf)#
E. router(config-if)#

Answer: D

QUESTION 13:

Which two statements best describe the signalling requirements of virtual circuit setup of VPLS and exchange of reachability information (MAC addresses)?

A. In Cisco VPLS the virtual circuit setup uses Multi-Protocol BGP as autodiscovery and signaling mechanism. Using BGP allows BPDUs to be propagated across VPLS in a scaleable fashion.
B. Cisco VPLS does not require the exchange of reachability (MAC addresses) information via a signaling protocol. This information is learned from the data plane using standard address learning, aging, and filtering mechanisms defined for Ethernet bridging.
C. Cisco VPLS uses directed LDP as a signalling protocol to exchange reachability (MAC addresses) information to avoid maintanance of ARP cache.
D. In Cisco VPLS the virtual circuit setup uses the same LDP signaling mechanism defined for point-to-point services. Using a directed LDP session, each provider edge advertises a virtual circuit label mapping that is used as part of the label stack imposed on

the Ethernet frames by the ingress provider edge during packet forwarding.

Answer: B,D

QUESTION 14:

Which IOS features are used to avoid Routing loops when dynamic Routing protocols are used between PE and CE in MPLS-VPN networks?

A. BGP feature allow-as in
B. SHAM links with OSPF
C. RPF Reverse Path forwarding.
D. Site Of Origin SOO.
E. BGP cost community
F. Access-list Control in Distance Vector protocol like RIP and EIGRP.

Answer: D,F

QUESTION 15:

Which 4 statements regarding MPLS Label Stack Encoding is true?

A. A value of 3 represents the "Implicit NULL Label"
B. A value of 4 represents the "Implicit NULL Label."
C. A value of 2 represents the "IPv6 Explicit NULL Label"
D. A value of 1 represents the "IPv1 Explicit NULL Label"
E. A value of 0 represents the "IPv4 Explicit NULL Label."
F. A value of 1 represents the "Router Alert Label". The use of this label is analogous to the use of the "Router Alert Option" in IP packets (for example, ping with record route option).

Answer: A,C,E,F

QUESTION 16:

Unicast Reverse Path Forwarding (Urpf) can work in the following modes:

A. Tunnel mode
B. Loose mode
C. Strict mode
D. Safe mode
E. Express mode

Answer: B,C

QUESTION 17:

Which command will display the MPLS label binding for IP prefix 1.1.1.0 on the router?

A. show tag-switching interface e0/0
B. All of the above.
C. A and B both will show the binding.
D. show tag-switching tdp binding 1.1.1.0/24
E. show tag-switching tdp bindings neighbor 1.1.1.0

Answer: D

QUESTION 18:

Certkiller 1-wan1-core-abcxyz.com#show ip cache flow

SrcIf	SrcIPaddress	SrcP	SrcAS	DstIf	DstIPaddress	DstP	DstAS	Pr	Pkts	B/Pk
29	192.1.6.69	77	3042	49	194.10.6.2	1308	267	6	1	40
29	192.1.6.222	1243	3042	49	194.10.6.2	1774	267	6	1	40
29	192.1.6.108	1076	3042	49	194.10.6.2	1869	267	6	1	40
29	192.1.6.159	903	3042	49	194.10.6.2	1050	267	6	1	40
29	192.1.6.54	730	3042	49	194.10.6.2	2018	267	6	1	40
29	192.1.6.136	559	3042	49	194.10.6.2	1821	267	6	1	40
29	192.1.6.216	383	3042	49	194.10.6.2	1516	267	6	1	40
29	192.1.6.11	45	3042	49	194.10.6.2	1894	267	6	1	40
29	192.1.6.29	1209	3042	49	194.10.6.2	1600	267	6	1	40

A network administrator issues the command "show ip cache flow" and finds the shown output. What can be concluded?

A. It is multicast traffic destined for 194.10.6.2
B. It is normal traffic.
C. There is a potential DOS attack on device of 194.10.6.2.
D. It is multicast traffic source from 194.10.6.2
E. There is a potential sacrificed host located at network 192.1.6.0 generating attacks.

Answer: C,E

QUESTION 19:

Indentify the AVPs that must be present in L2TPv3ICRQ messages:

A. Remote session ID
B. Assigned control connection ID
C. PW capabilities list
D. Message type
E. PW type
F. Hostname

Answer: A,D,E

QUESTION 20:

What are BCP 38 (Best Common Practices 38)/RFC 2827 Ingress Packet Filtering Principles?

A. Filter as close to the core as possible
B. Filter as close to the edge as possible
C. Filter Smurf ICMP packets.
D. Filter both source and destination where possible.
E. Filter as precisely as possible

Answer: B,D,E

QUESTION 21:

The Outer.1Q tag represents customer VLAN ID and inner.1Q tag represents Provider VLAN (PVLAN)

A. QinQ is a way to hide native VLAN which can conflict with Provider native VLAN
B. It is an effective way to achieve VLAN transparency between Provider and enterprise customer by tunneling one ser of VLAN tags inside a second VLAN tag
C. The Outer.1Q tag represents customer VLAN ID and inner.1Q tag represents Provider VLAN (PVLAN)
D. The Outer.1Q tag represents Service VLAN (PVLAN) and inner.1Q tag represents customer VLAN

Answer: B,D

QUESTION 22:

Exhibit:

1) Data is scrambled and synchronous mapping takes place by octet into the SONET/SDH frame.
2) Encapsulated via Point-to-Point Protocol (PPP) takes place framing information is added with High-level Data Link Control (HDLC).
3) Gaps between frames are filled with flags, set to value 7E.
4) Octet stuffing occurs if any flags or resultant escape characters (of value 7D) are found in the data.
5) Data is segmented into an IP datagram with its 20-byte IP header.

Please refer to the exhibit.
The layer 2 protocol used by POS technology offers a standarized way for mapping IP packets into SONET/SDH payloads. Select the correct sequence of POS operation.

A. 2,3,5,4,1
B. 5,2,3,1,4
C. 1,2,3,4,5
D. 5,2,3,4,1
E. 1,3,4,5,2

Answer: D

QUESTION 23:

The IPv6 address FE80::656:78FF:FE9A:BCDE is what type of address?

A. None of the above
B. Site-local
C. Link-local
D. Multicast

Answer: C

QUESTION 24:

Which MQC-based output queueing method is designed to support multiple traffic classes including VoIP traffic, mission-critical traffic, bulk traffic, interactive traffic and default class traffic?

A. CBWFQ
B. Custom Queueing
C. CB-WRED
D. WRR Queueing
E. LLQ

Answer: E

QUESTION 25:

The show ip ospf database external command displays information about which OSPF LSA type?

A. LSA type 2
B. LSA type 3
C. LSA type 5
D. LSA type 9
E. LSA type 1
F. LSA type 7

Answer: C

QUESTION 26:

BCP (Best Common Practices) 38/RFC 2827 Ingress and Egress Packet Filtering would help mitigate what classification of attack?

A. Reconnaisance attack
B. Denial of service attack
C. Port Scan attack
D. Spoofing attack
E. Sniffing attack

Answer: D

QUESTION 27:

DSCP value "101110" looks like which IP Precedence value to non-DiffServ compliant devices?

A. IP Precedence 4
B. IP Precedence 7
C. IP Precedence 3
D. IP Precedence 5
E. IP Precedence 6
F. IP Precedence 2

Answer: D

QUESTION 28:

What is used as label in cell-based MPLS ?

A. VPI
B. None of above
C. Specific 4 bytes label
D. VCI
E. VPI and VCI

Answer: E

QUESTION 29:

What is the encapsulation mode for MPLS running on Ethernet?

A. Channel mode
B. Transparent mode.
C. Tunnel mode.
D. Frame mode
E. Packet mode.

Answer: D

QUESTION 30:

Which of the following statements regarding Selective Packet Discard(SPD) is correct?

A. None of above.
B. Selective Packet Discard(SPD) is a mechanism to drop normal IP packets instead of VOIP packets when the link is overloaded
C. Selective Packet Discard(SPD) is a mechanism to drop non-routing packets instead of routing packets when the process level queue is congested.
D. Selective Packet Discard(SPD) is a mechanism to drop Frame Relay frames with the DE bit set instead of Frame Relay frames DE bits without being set when the link is overloaded
E. Selective Packet Discard(SPD) is a mechanism to drop packets with low IP precedence instead of packets with high IP precedence when the link is overloaded

Answer: C

QUESTION 31:

Which statements about MPLS Label Distribution Protocol(LDP) are valid?

A. LDP can establishes a peer relationship with another router that is not directly attached
B. LDP hello packets are sent to TCP port 711
C. LDP sessions are TCP sessions to port 711
D. LDP sessions are TCP sessions to port 646
E. LDP establishes a peer relationship with another router that must be directly attached.
F. LDP hello packets are sent to UDP port 646

Answer: A,D,F

QUESTION 32:

What bit should be set in the link state PDUs in an IS-IS level-1-2 router to indicate that they are a potential exit point out of the area ?

A. ABR (Area Border Rorter) bit
B. P(Partition) bit
C. IS-Type bits
D. ATT (Attached)bit
E. Down bit
F. PN (Pseudonode)biy

Answer: D

QUESTION 33:

Which of the following statemets regarding Control Plane Policing (CoPP) is correct?

A. Control Plane Policing (CoPP) leverages MQC to define traffic classification criteria and to specify configurable policy actions for the classified traffic.
B. Control Plane Policing (CoPP) uses a dedicated "control-plane" command via the Modular QoS CLI (MQC) to provide filtering and rate limiting capabilities.
C. Control Plane Policing (CoPP) protects the transit management and data traffic through the router.
D. Control Plane Policing (CoPP) addresses the need to protect the management planes, ensuring routing stability, availability, and critical packet delivery.
E. Control Plane Policing (CoPP) uses "service policy" command under relevant interfaces to filter DOS packet to protect routing packets.

Answer: A,B,D

QUESTION 34:

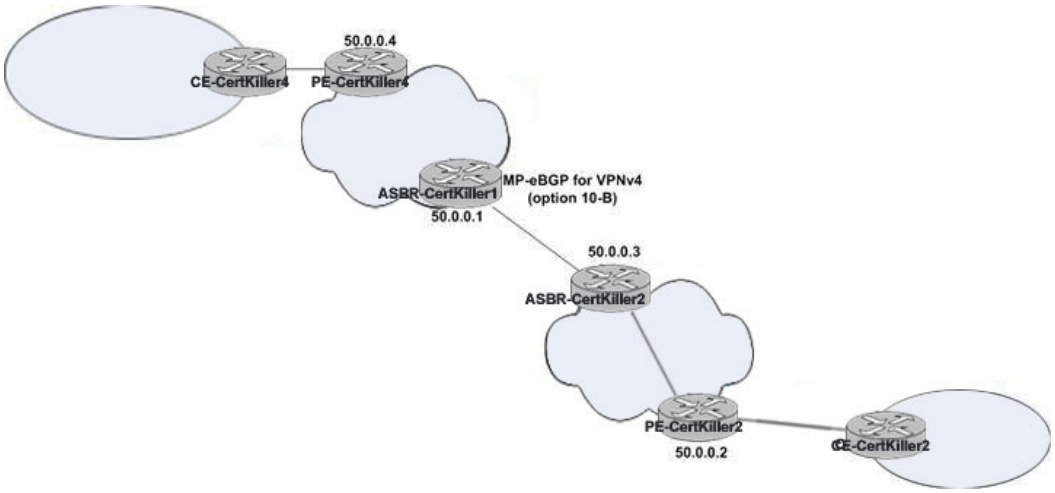
which of the following descriptions about urpf loose mode is correct?

A. It is typically used on multipoint interfaces or on routers where asymmetrical routing is used(packets are received on one interface but the return path is not on the same interface);loose mode verifies a source address by looking in forwarding information base(FIB). Created by routing protocols, to verify there is a return route to the source and to venrify that the path uses a valid interface
B. It is typically used on point-to-point interfaces where the same interface isused for both directiongs of packet flows; if the source address has a return route in the FIB table,it is then checked against the adjacency table to ensure the same interface receiving the packet is the same interface used for the return path
C. If a packet fails the uRPF loose mode check, the packet is then transmitted and creates a log message
D. None of above
E. If a packet fails the uRPF loose mode check ,the packet is then dropped

Answer: A,E

QUESTION 35:

Network topology exhibit:



In the Inter-AS VPN deployment shown in the diagram, what is the Next Hop address of MP-Ibgp Update for CE- Certkiller 4 network received at PE- Certkiller 2 ?

A. ASBR-2 50.0.0.3
B. PE- Certkiller 4 50.0.0.4
C. PE- Certkiller 2 50.0.0.2
D. ASBR- Certkiller 1 50.0.0.1

Answer: A

QUESTION 36:

What best describes the usage of Route-Target rewrite?

A. Route-Target Rewrite is mainly used in Inter-AS MPLS-VPN deployments and is configured at the PE router in originating AS ASBR to avoid misconfiguration in Route-Target assignment for VPN configurations.
B. Route-Target Rewrite is mainly used in Inter-AS MPLS-VPN deployments and is configured at the ASBR to avoid misconfiguration in Route-Target assignment for VPN configurations.
C. None of the other alternatives apply.
D. Route-Target Rewrite is mainly used in Inter-AS MPLS-VPN deployments and is configured at the Route-Reflector in originating AS ASBR to avoid misconfiguration in Route-Target assignment for VPN configurations.

Answer: B

QUESTION 37:

The ASBR-summary LSA is :

A. Generated by the ABR and describes reachabilty to the ASBR for routers in the same area with the ASBR

B. Generated by the ASBR and describes reachability to itself
C. Generated by the ASBR and describes reachabilty to the ABR
D. Generated by the ABR and describes reachabilty to the ASBR for routers in a different area from the ASBR

Answer: D

QUESTION 38:

The OSPF External LSA for prefix x.x.x.x exists in the OSPF database, but the prefix is not installed in the routing table. Which are possible explanations?

A. Route to the Forwarding Address is an internal OSPF route.
B. Route to the ASBR does not follow the same path as the one to the Forwarding Address.
C. Inbound distribute-list is configured under the ospf process and it is denying x.x.x.x
D. Route to the Forwarding Address in not an internal OSPF route.
E. ASBR origination the LSA is not reachable.

Answer: C,D,E

QUESTION 39:

With the DSCP value fo "101110", what does the "11" in bits 1 and 2 indicate ?

A. CS(Class Selector Value)
B. AF Class
C. PHB (Per-Hop Behavior)
D. Queue Depth
E. IP Precedence
F. Drop Probability

Answer: F

QUESTION 40:

Identify the differences of option 10A, as opposed to option 10C, for interAS vpn offerings.For option 10A

A. Multihop E-BGP between ASBRs is utilized
B. The ASBR holds VPNv4 routes
C. Better suitability for InterProvider VPNs is provided
D. Greater scalability is offered
E. Relative technical simplicity is offered
F. Lower relative security is offered

Answer: B,C,E

QUESTION 41:

Which two statements are true about RPF checks in MSDP(Multicast Source Discovery Protocol)?

A. RPF check should be done against the route to the source S of the corresponding PIM-SM domain.
B. It prevents message looping, Session Advertisement (SA) messages must be RPF checked.
C. RPF check should be done against the route to the Rendez-vous Point of the corresponding PIM-SM domain, which originated the SA.
D. RPF checking Session Advertisement (SA) messages will cause message looping.

Answer: B,C

QUESTION 42:

Exhibit:

```
CertKiller1#show ip bgp summary
BGP router identifier 199.199.199.199, local AS number 20
BGP table version is 45, main routing table version 45
44 network entries using 4444 bytes of memory
81 path entries using 3888 bytes of memory
13 BGP path attribute entries using 780 bytes of memory
11 BGP AS-PATH entries using 264 bytes of memory
4 BGP route-map cache entries using 64 bytes of memory
0 BGP filter-list cache entries using 0 bytes of memory
BGP using 9440 total bytes of memory
BGP activity 88(44 prefixes, 191/110 paths, scan interval 5 secs

Neighbor        V    AS IegNtvd MigNabt   TolVer  InQ OutQ Up/Down  State/PfxRcd
192.168.1.17    4     1    1628    2693       45    0    0 00:42:22        31
192.168.20.22   4    22      70      73       45    0    0 00:42:26        31
192.168.31.1    4 65002     172     274        0    0    0 00:00:13 Idle

CertKiller1#telnet 192.168.31.1
Trying 192.168.31.1 ... Open


User Access Verification

Password: CertKiller

CertKiller2#sh run | begin bgp
router bgp 65002
 bgp confederation identifier 1
 bgp confederation peers 65001
 network 10.0.0.0
```

Referring to the exhibit, what could be preventing the Certkiller 1 router from receiving any prefixes from the Certkiller 2 BGP neighbor?

A. The no sync command is missing on Certkiller 1

B. There is a TCP session establishment problem between Certkiller 1 and Certkiller 2
C. The no sync command is missing on Certkiller 2
D. The neighbor 192.168.31.2 next-hop-self command is missing on Certkiller 2
E. Certkiller 1 is using the wrong remote AS number in its neighbor 192.168.31.1 remote-as configuration
F. There is a BGP version mismatch between Certkiller 1 and Certkiller 2

Answer: E

QUESTION 43:

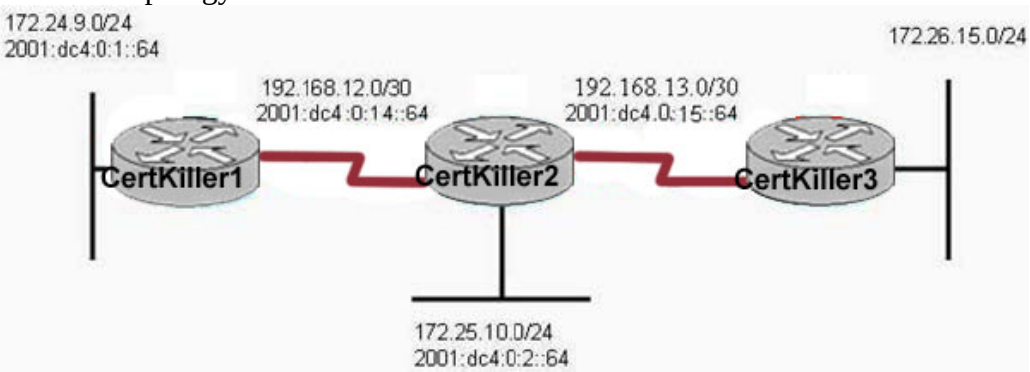
Which two statements best describe EtherChannel?

A. EtherChannel is defined for Rapid Spanning Tree for faster convergence.
B. EtherChannel technology helps aggregate traffic grouping multiple,full-duplex point-to-point links together
C. EtherChannel technology is based on the 802.1 IEEE stand
D. EtherChannel can aggregate up to 800 Mbps,8 Gbps,or Gbps of aggregate bandwidth for a Fast EtherChannel,Gigabit EtherChannel,or 10 Gigabit EtherChannel connection respectively.

Answer: B,D

QUESTION 44:

Network topology exhibit:



Refer to the exhibit. Certkiller .com has enabled IPv6 and IPv4 on routers Certkiller 1 and Certkiller 2, both running ISIS routing protocol, and they can no longer reach Certkiller 3 network 172.26.15.0/24 (Certkiller 3 does not enable IPv6, enables IPv4 only).
Which two steps should be taken no restore reachability to Certkiller 3? (Choose Two.)

A. Transition to IS-IS Multiple Topology Mode on Certkiller 3.
B. Enable wide metrics.
C. Transition to IS-IS Multiple Topology Mode on Certkiller 1 and Certkiller 2.
D. Enable OSPFv3 to support IPv4 and IPv6 simultaneously.

E. Configure static routes to all unreachable networks and redistribute to IS-IS.
F. Create an IPv6 tunnel from Certkiller 2 to Certkiller 3.

Answer: B,C

QUESTION 45:

In the context of MPLS,what is the correct action to be performed when an aggregate label is received ?

A. It removes the top label in the MPLS label stack and does a Layer 3 lookup on underlying IP packets
B. None of above
C. It replaces the bottom label in the MPLS label stack with a VPN label and propagates
D. It adds the VPN label into the top label in the MPLS label stack
E. It replaces the top label in the MPLS label stack with a VPN label and propagates

Answer: A

QUESTION 46:

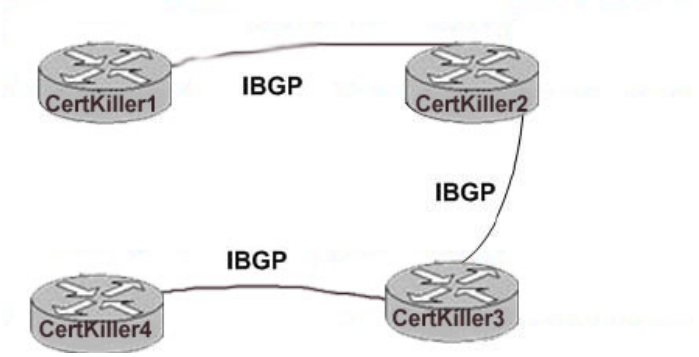
Which option describes the incorrect usage of the Label Distribution method?

A. LDP is primarily used in internal networks of MPLS-VPN providers.
B. Directed LDP is used for label distribution in L2-VPN Attachement Circuits.
C. MP-BGP is used for label distribution in MPLS Traffic Engineered networks.
D. MP-BGP is used for label distribution for VPN customer routes.

Answer: C

QUESTION 47:

Network topology exhibit:



With the BGP peerings shown, which 3 solutions are most correct? Select three.

A. Certkiller 1, Certkiller 2 and Certkiller 3 are part of a confederation sub-AS and Certkiller 4 is part of a different confederation sub-AS

B. Certkiller 1 and Certkiller 4 are route-reflector-clients; Certkiller 2 and Certkiller 3 are route reflectors part of the same cluster.
C. Certkiller 1, Certkiller 2 are part of one confederation sub-AS and Certkiller 3, Certkiller 4 are part of a different confederation sub-AS
D. Certkiller 1, Certkiller 2 and Certkiller 3 are part of a confederation sub-AS where Certkiller 2 is a route reflector and Certkiller 1, Certkiller 3 are route-reflector-clients.
E. Certkiller 1 and Certkiller 4 are route-reflector-clients; Certkiller 2 and Certkiller 3 are route reflectors part of the different cluster.

Answer: C,D,E

QUESTION 48:

Select the three valid LMI extension.

A. Multicasting
B. Global addressing
C. Forward-explicit congestion notification (FECN)
D. Backward-explicit congestion notification (BECN)
E. Virtual circuit status messages.

Answer: A,B,E

QUESTION 49:

What is the action of "pop" in the context of MPLS switching?

A. It replaces the top label in the MPLS label stack with another value.
B. It adds a top label in MPLS label stack.
C. None of above.
D. It removes the top label in the MPLS label stack.
E. It replaces the top label in the MPLS label stack with a set of labels.

Answer: D

QUESTION 50:

Which of the following IOS commands cause syslog messages to be stamped with time and dates?

A. service logging datetime
B. logging trap datetime
C. logging datetime on
D. logging timestamps on
E. service timestamps log datetime

Answer: E

QUESTION 51:

What is the role of Forwarding Equivalence Class (FEC) in MPLS?

A. None of above.
B. FEC determines how IP packets are forwarded in MPLS LSP.
C. FEC determines how a group of IP packets are mapped to an LSP.
D. FEC determines how to establish an LSP path.
E. FEC determines how MPLS labels are stacked in LSP.

Answer: C

QUESTION 52:

Which of the following statements about MD5 Routing Updates authentication is valid?
(Select two)

A. The MD5 algorithm inputs the routing updates of arbitrary length and outputs a 128-bit hash
B. Shared secret keys are delivered in encrypted messages
C. Multiple keys are supported
D. The MD5 algorithm inputs the routing updates of every 64bit length and outputs an 8-bit hash
E. Routing updates packets are delivered in encrypted messages

Answer: A,C

QUESTION 53:

Which two statements are correct?

A. A VC type 5 tunnels an Ethernet port over MPLS.
B. A VC type 4 transports a VLAN over MPLS.
C. A VC type 5 transports a VLAN over MPLS.
D. A VC type 4 tunnels an Ethernet port over MPLS.

Answer: A,B

QUESTION 54:

Which three choices are BGP Extended communities used in MPLS-VPN deployment?

A. Route-Target

B. Site Of Origin SOO
C. Route-Distinguisher
D. Domain Identifier BGP extended commumity

Answer: A,B,D

QUESTION 55:

Which of the following comparison of Control Plane Policing (CoPP) with Receive ACL(Racl) is correct?

A. CoPP applies to a dedicated control plane interface;Racl applies to all interfaces.
B. CoPP protects against IP spoofing;Racl protects against DoS attacks.
C. CoPP can not use named access lists;Racl can use named access lists
D. CoPP supports rate limits;Racl does not support rate limits
E. CoPP needs a AAA server,Racl does not need a AAA server

Answer: A,D

QUESTION 56:

Select the three best answers which best describe Private Network-to Network Interface (PNNI) in an ATM network

A. PNNI uses the same Dijsktra algorithm for SPF calculation
B. PNNI and OSPF use the same Database to make cohesive decision for packet forwarding
C. PNNI measures line capacities and delays in addition to simple cost metrics
D. It is the Routing protocol used between ATM switches

Answer: A,C,D

QUESTION 57:

What protocol is used for Path Setup in MPLS traffic engineering?

A. PIM
B. RSVP
C. OSPF
D. ISIS
E. BGP

Answer: B

QUESTION 58:

Which two statements are TRUE ?

A. Subsequent Address Family identifier (SNFI) provides additional information about the type of the Network Layer ports carried in the BGP update
B. Address Family identifier (AFI) field carries the identity of the Network Layer ports for which the BGP speaker intends to advertise multiple paths
C. Address Family identifier (AFI) carries the identity of the Network Layer protocol for which the BGP speaker intends to advertise multiple paths
D. Subsequent Address Family identifier (SAFI) provides additional information about the type of the Network Layer Reachability Information carried in the attribute

Answer: C,D

QUESTION 59:

Which of the following are steps to configure destination-based Remote Triggered Black Hole(RTBH) filtering?(choose three)

A. Activate black hole by redistributing route for victim into BGP with next-hop set to the static(reserved) host route configured on edge routers.
B. Configure OSPF between trigger router and black hole routes
C. Configure BGP beteen trigger and black hole routers.
D. Configure on trigger router to advertise victim host route with commumity
E. Configure all edge routers with static (reserved) host route to Null0

Answer: A,C,E

QUESTION 60:

What best describes the usage of Route-Target rewrite?

A. Route-Target Rewrite is mainly used in Inter-AS MPLS-VPN deployments and is configured at the PE router in originating AS ASBR to avoid misconfiguration in Route-Target assignment for VPN configurations.
B. None of the other alternatives apply.
C. Route-Target Rewrite is mainly used in Inter-AS MPLS-VPN deployments and is configured at the Route-Reflector in originating AS ASBR to avoid misconfiguration in Route-Target assignment for VPN configurations.
D. Route-Target Rewrite is mainly used in Inter-AS MPLS-VPN deployments and is configured at the ASBR to avoid misconfiguration in Route-Target assignment for VPN configurations.

Answer: D

QUESTION 61:

There is MPLS VPN traffic traversing through a TE intermediate router. What is the MPLS packet label stack sequence (from outer to inner) for the VPN traffic on this router?

A. TE label, VPN label, IGP label
B. IGP label, TE label, VPN label
C. TE label, IGP label, VPN label
D. IGP label, VPN label, TE label
E. VPN label, IGP label, TE label

Answer: C

QUESTION 62:

Which of the following IOS features can prevent IP spoofing attacks?

A. IS-IS routing
B. Unicast Reverse Path Forwarding (uRPF)
C. Cisco Express forwarding
D. PPP over Ethernet
E. MPLS traffic Engineering

Answer: B

QUESTION 63:

Which methods would enable traffic to be forwarded along an MPLS TE tunnel (Choose 4)

A. Autoroute
B. MP-BGP routing
C. Policy routing
D. Static routing
E. Forwarding adjacency

Answer: A,C,D,E

QUESTION 64:

Using more than one label on a single packet is required in what context?

A. When CEF switching and Label switching is done
B. MPLS TE
C. MPLS VPN
D. In all the above circumstances.

Answer: C

QUESTION 65:

How many token buckets are needed to support a multi-actions policer that meters conforming, exceeding and violating traffic?

A. 5
B. 3
C. 2
D. 4
E. 6
F. 1

Answer: C

QUESTION 66:

Which of the following events can NOT be tuned via router configuration to provide for faster convergence following a link failure?

A. IGP LSP/LSA origination
B. Failure detection
C. Failure reporting
D. Per-hop flooding time of new link state
E. Number of hops that need to be notified of new link state

Answer: E

QUESTION 67:

What is the BGP synchronization rule?

A. Routing information received through an EBGP session is not forwarded to another EBGP neighbor, only to IBGP neighbors.
B. BGP neighbor peerings are established and sychronized using the TCP 3-way handshake.
C. BGP shall not advertise a route until that route has been learned via an IGP also.
D. Routing information received through an IBGP session is not forwarded to another IBGP neighbor, only to EBGP neighbors.

Answer: C

QUESTION 68:

BGP best route selection process is based on what ?

A. lowest delay
B. path attributes
C. highest bandwidth
D. lowest hop-count
E. lowest cost

Answer: B

QUESTION 69:

Which of the following AT Om traffic encapsulations require the use of a Control Word?

A. PPP
B. Cell relay
C. aal5
D. Ethernet VLAN
E. Frame Relay
F. HDLC

Answer: C,E

QUESTION 70:

Which of the following statements is correct regarding PIM Sparse Mode operations?

A. It supports shared trees only assuming all hosts want the multicast traffic
B. It does not support all underlying unicast routing protocols like GBP
C. Receivers are joined to the Shared Tree (rooted the rp) by their local Designated Router (DR)
D. Receivers are registered with RP by their first-hop router
E. From the RP, traffic flows down a Source Tree to each receiver

Answer: C

QUESTION 71:

According to RFC 3931,L2TPv3 utilizes the IANA assigned IP protocol ID of:

A. 110
B. 115
C. 121
D. 101
E. 151
F. 51

Answer: B

QUESTION 72:

As described in rfc 3270,short-pipe mode operstion, the PE to CE egress polices are based upon:

A. remarked IP tos value
B. Innerrnost label exp value
C. MDRR quantam
D. topmost label exp value
E. customer marking
F. Qos groups/discard class

Answer: E

QUESTION 73:

With EIGRP DUAL, a feasible successor is considered loop-free if which condition is true ?

A. Its AD is equal to the successor's FD
B. Its AD is greater than the successor's FD
C. Its AD is equal to the metric of the successor
D. Its FD is equal to the metric of the successor
E. Its AD is less than the successor's FD

Answer: E

QUESTION 74:

Selective packet discard(SPD)operates in the following modes: (choose3)

A. select
B. random
C. normal
D. full
E. discard

Answer: B,C,D

QUESTION 75:

Select the 3 best answers describing operation and configuration of Frame-Relay Inverse ARP. Choose three.

A. Inverse ARP is configured using the following command under the Interface configuration 'frame-relay map dlci (dlci number) protocol protocol-address'.
B. Dynamic address mapping uses Frame Relay Inverse ARP to request the next-hop protocol address for a specific connection on its known DLCI.
C. Inverse ARP is enabled by default for all protocols enabled on the physical interface.
D. Responses to Inverse ARP requests are entered in an address-to-DLCI mapping table on the router or access server which is used to supply the next-hop protoco address or the DLCI for outgoing traffic.
E. Inverse ARP in Frame-Relay is synonymous of ARP in Ethernet.

Answer: B,C,D

QUESTION 76:

When IPv6 is deployed by a Service Provider to bring on an IPv6 Enterprise, which transition strategy works the best?

A. Deploy IPv6 at the Edges and tunnel Enterprise through the core
B. Deploy IPv6 at the core first and then move to Edges toward the end customer
C. None of the above will work
D. Deploy IPv6 at Edges and Core at the same time for smooth transition

Answer: A

QUESTION 77:

Which are correct descriptions and configurations of Anycast RP?

A. Routers with Anycast RP can be configured statically (loopback 1.1.1.1)with the command ip anycast-rp pim 1.1.1.1
B. Routers with Anycast RP can be configured statically (loopback 1.1.1.1)with the command ip rp-address pim 1.1.1.1
C. Anycast RP provides redundancy and load-sharing capabilities.
D. Routers with Anycast RP can be configured statically (loopback 1.1.1.1)with the command ip pim rp-address 1.1.1.1
E. In Anycast RP, two or more RPs are configured with the same IP address on loopback interfaces.

Answer: C,D,E

QUESTION 78:

RFC 3270 describes Differentiated Services (Diff-Serv) over Multi-Protocol Label Switching (MPLS) networks. Which model alters Differentiated Services (Diff-Serv) code points set in different Differentiated Services (Diff-Serv) domain?

A. Uniform model
B. Pipe Model
C. Short Pipe
D. None of the above will alter Differentiated Services (Diff-Serv) code points set in different Differentiated Services (Diff-Serv) domain.

Answer: A

QUESTION 79:

In Any Transport over MPLS (AtoM) Control word is an optional 4-byte field used in the pseudowire packet. The control word carries generic and Layer 2 payload-specific information to emulate L2 packets correctly. In pseudowire packet, where is this Control Word inserted ?

A. Inserted between the MPLS label stack and the Layer 2 payload
B. Inserted between the MPLS label stack and the Layer 3 Header
C. Inserted between the MPLS label stack and the Layer 2 header
D. Inserted between the MPLS label stack and the Layer 3 payload

Answer: A

QUESTION 80:

In Multicast VPN (MVPN) implementations, which two of the following statements are regarding the Default MDT Group? (Choose two.)

A. Within the VPF configuration in the PE router, multiple Default MDT groups are configured so each VPF can support multiple multicast sources.
B. There is a reduced multicast state in the MPLS core P routers.
C. When multicast traffic exceeds a certain configured threshold, traffic from the Data MDT is switched to the Default MDT to conserve bandwidth.
D. It is used for PIM control traffic.
E. It is optionally configured for a high bandwidth multicast source to reduce multicast traffic replication to uninterested PE routers.

Answer: B,D

QUESTION 81:

router bgp 1
Neighbor 1.1.1.1 remote-as 2
The above bgp configuration has what effect on the configured router?

A. Allows incoming TCP connections from 1.1.1.1 that are destined to port 179

B. Allows incoming TCP connections from 1.1.1.1 and destined to,or sourced from port 179
C. Allows incoming TCP connections destined to port 179
D. Allows incoming TCP connections from 1.1.1.1 that are sourced from port 179
E. Allows incoming TCP connections sourced from port 179

Answer: A

QUESTION 82:

What Cisco IOS feature examines packets received to make sure that the source address and interface are in the routing table and matck the interface that the packet was received on?

A. Dynamic access-lists
B. Receive ACL
C. Unicast RPF
D. MPLS Traffic Engineering
E. Authentication

Answer: C

QUESTION 83:

What is jitter?

A. The delay caused by placing the bits on the wire.
B. The total end-to-end delay
C. The variations of delay.
D. The time it takes for the bits to transit the physical media.

Answer: C

QUESTION 84:

What are the differences between LLQ and CBWFQ? (Choose two.)

A. LLQ is configured using MQC and CBWFQ is configured using the fair-queue command.
B. LLQ does not support WFQ on the default traffic class (class-default).
C. LLQ supports the addition of strict priority queuing.
D. LLQ priority queue bandwidth is policed with a congestion aware policer.
E. With LLQ, bandwidth allocations for the priority queue and all the CBWFQ queues are configured using the priority command.

Answer: C,D

QUESTION 85:

In the context of GMPLS,LMP stands for;

A. Load Management Protocol
B. Link Management Protocol
C. Loop Management Protocol
D. Label Management Protocol
E. None of above

Answer: B

QUESTION 86:

What statement is true?

A. Link Control Protocol(LCP) is used for basic PPP link setup and operation
B. None of the other alternatives apply.
C. Link Control Protocol(LCP) for PPP is synonymous to ARP for Ethernet.
D. Link Control Protocol(LCP) is used for denying PPP connections to unauthorized devices.

Answer: A

QUESTION 87:

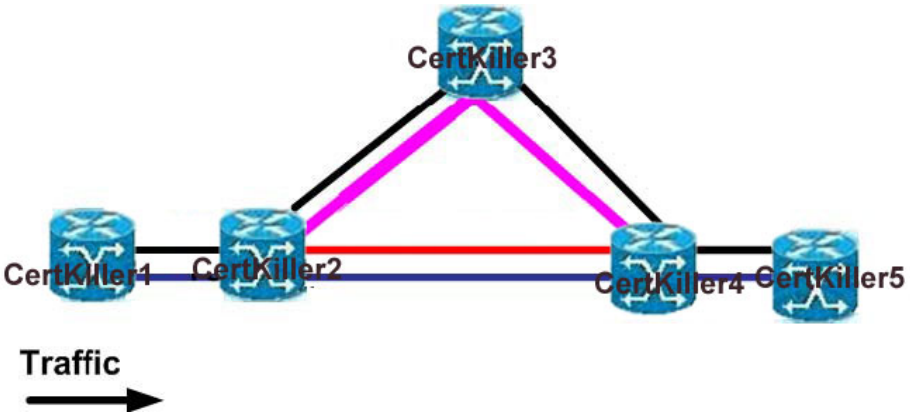
What is periodically multicasted (every 10 seconds) by the DIS on a LAN to ensure IS-IS Link State Database accuracy?

A. ISH
B. IIH
C. LSP
D. PSNP
E. CSNP

Answer: E

QUESTION 88:

Network Topology exhibit:



In the diagram, Certkiller 1 is the head-end of a TE tunnel that terminates on Certkiller 5. The red line indicates the protected link, and the gold line indicates the backup tunnel. Which router is the Point of Local Repair?

A. Certkiller 3
B. Certkiller 4
C. Certkiller 5
D. Certkiller 1
E. None of the other alternatives apply.
F. Certkiller 2

Answer: F

QUESTION 89:

A network administrator wants to detect a login attack against a router. What IOS command can make the attack recorded in syslog server?

A. Login detect login-failure log
B. none of the above
C. Logging login on-failure
D. Login on-failure log
E. Logging detect fail-login

Answer: D

QUESTION 90:

What best explains the BGP route-reflector function?

A. BGP route-reflector should be in forwarding path of data coming from its clients.
B. BGP route-reflector does not have to be in the forwarding path of data coming from its clients.
C. None of the other alternatives apply.
D. BGP route-reflector will stop reflecting the routes if they're not directly-connected

clients.

Answer: B

QUESTION 91:

The Attribute field within the IS-IS LSP header contains which of the following flags?
(Choose four)

A. Overload (LSPDBOL)
B. Partition (P)
C. Fragment (Frag-Nr)
D. IS-Type
E. Pseudonode (PN)
F. Attached (ATT)

Answer: A,B,D,F

QUESTION 92:

Which of the following processes are likely to be found in a microkernel?

A. Process scheduling
B. Host stack
C. Memory management
D. Lightweight messaging
E. All of the above
F. Hardware abstraction

Answer: E

QUESTION 93:

Forwarding Equivalence Class (FEC) corresponds to :

A. IPSEC Encryption Algorithm
B. Layer 2 circuits (ATM, FR, PPP, HDLC, Ethernet)
C. Tunnel interface-traffic engineering
D. Groups of addresses/sites-VPN x
E. A bridge/switch instance-VSI

Answer: B,C,D,E

QUESTION 94:

MPLS label headers for packet media consist of:

A. COS/EXP
B. Label
C. Version
D. TTL
E. S flag

Answer: A,B,D,E

QUESTION 95:

VoIP bearer traffic is typically marked to which DSCP value ?

A. ef
B. cs3
C. 0 (default)
D. af41
E. af31
F. cs7

Answer: A

QUESTION 96:

Pick the 4 valid ATM Cell Header fields:

A. Forward-explicit congestion notification(FECN)
B. ATM Discard Eligibility(DE) bit
C. HEC-8 bit of header error control
D. GFC-4 bits of generic flow control
E. CLP-1 bit of congestion loss
F. VCI-16 bits of virtual channel identifier

Answer: C,D,E,F

QUESTION 97:

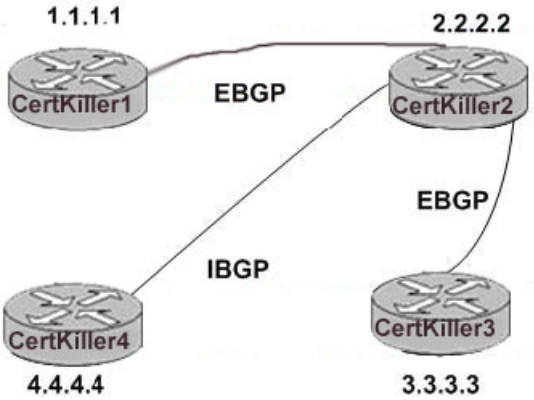
What is the default SPF throuttle timer in OSPF?

A. 5s
B. 1s
C. 0ms
D. 30s
E. 10ms
F. 500ms

Answer: A

QUESTION 98:

Having the above BGP peerings, select the two configurations for Certkiller 2 that will fulfill the following criteria:
-Will advertise all routes from Certkiller 1 to Certkiller 4 but not to Certkiller 3
-Will advertise the routes from Certkiller 4 to Certkiller 3



A. router bgp 2
neighbor 1.1.1.1 remote-as 1
neighbor 1.1.1.1 route-map Certkiller 1 in
neighbor 3.3.3.3 remote-as 3
neighbor 3.3.3.3 route-map Certkiller 3 out
!
route-map Certkiller 1 permit 10
set community 5
!
route-map Certkiller 3 permit 10
match community 5
!
B. router bgp 2
neighbor 1.1.1.1 remote-as 1
neighbor 1.1.1.1 route-map Certkiller 1 in
neighbor 3.3.3.3 remote-as 3
neighbor 3.3.3.3 route-map Certkiller 3 out
!
route-map Certkiller 1 permit 10
set community 5
!
route-map Certkiller 3 permit 10
match community 5
!
route-map Certkiller 3 permit 20
!
C. router bgp 2

neighbor 1.1.1.1 remote-as 1
neighbor 1.1.1.1 route-map Certkiller 1 in
!
route-map Certkiller 1 permit 10
set community no-export
!
D. router bgp 2
neighbor 1.1.1.1 remote-as 1
neighbor 1.1.1.1 route-map Certkiller 1 in
!
route-map Certkiller 1 permit 10
set community no-advertise
!

Answer: B,C

QUESTION 99:

How would you characterize the source and type in a Denial of Service attack on a router ?

A. By performing a show interfaceto see the transmitted load txloadand receive load rxload if the interface utilization is not maxed out, there is no attack underway
B. By applying and access-list to all incoming and outgoing interfaces, turning off route-cache on all interfaces, then, when telnetting into the router perform a 'debug ip packet detail'.
C. By performing a show ip interfaceto see the type and source of the attack based upon the access-list matches
D. By setting up and access-list to permit all ICMP, TCP, and UDP traffic with the log or lot Cinput commands, then use the show access-list and show log commands to determine the type and source of attack

Answer: D

QUESTION 100:

Typical ADSL broadband Internet access requires a username and password to be entered on end-user PC connected to the ADSL modem in order for the end user to gain access to the Internet.if a Cisco ADSL router is used instead of an ADSL modem,what functionality is required on the Cisco ADSL router so the end-user connected to the Cisco ADSL router can access the Internet without entering a username and password?

A. AAA
B. PPPoE client
C. Route Bridge Encapsulation(RBE)
D. PPPoA

E. Integrated Routing and Bridging(IRB)

Answer: B

QUESTION 101:

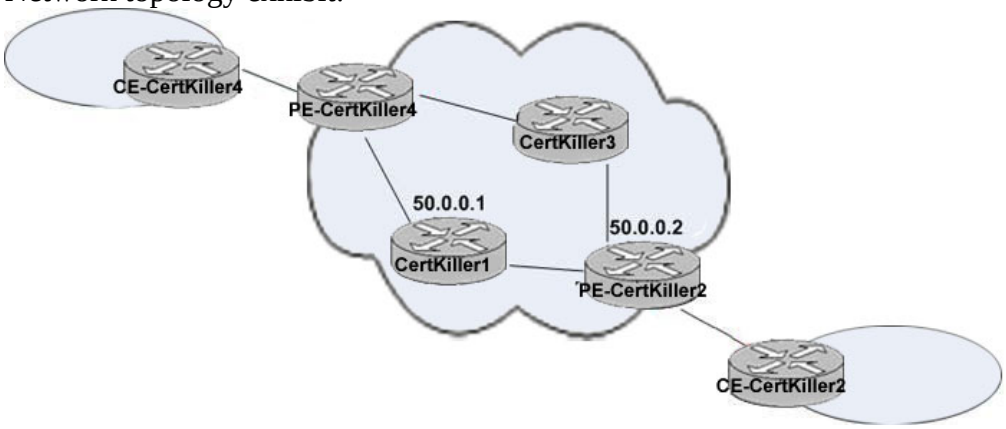
The mechanisms for distributing LDP are:

A. A and B
B. UDP and IP
C. LDP and RSVP
D. CEF and the FIB table
E. RSVP and CEF

Answer: C

QUESTION 102:

Network topology exhibit:



What is the proper MP-BGP configuration between the shown PE routers to implement MPLS VPNs on PE- Certkiller 2 ?

A. router bgp 1
neighbor 50.0.0.4 remote-as 1
neighbor 50.0.0.4 update-source Loopback0
no auto-summary
!
address-family vpnv4
neighbor 50.0.0.4 activate
neighbor 50.0.0.4 send-community extended
exit-address-family
B. None of the above
C. router bgp 1
neighbor 50.0.0.4 remote-as 1
neighbor 50.0.0.4 update-source Loopback0

no auto-summary
!
address-family vpnv4 unicast multicast
neighbor 50.0.0.4 activate
neighbor 50.0.0.4 send-community extended
exit-address-family
D. router bgp 1
neighbor 50.0.0.4 remote-as 1
neighbor 50.0.0.4 update-source Loopback0
no auto-summary
!
address-family ipv4
neighbor 50.0.0.4 activate
neighbor 50.0.0.4 send-community extended
exit-address-family

Answer: A

QUESTION 103:

Which BGP Community option is used to prevent the advertisement of the BGP prefix to any other BGP peer?

A. local-as
B. no-export
C. none
D. no-advertise
E. additive

Answer: D

QUESTION 104:

Which two statements are correct with regard to route distinguisher as defined in RFC 4364-AKA IP-VPN(MPLS-VPN)?

A. The configuration to define Route-Distinguisher is:
Ip vrf bulle
Rd 1:1
B. Route-Distinguisher is an 8 byte value used in creating unique VPNv4 address.
C. Route-Distinguisher is an 8 byte BGP attribute value used in influencing BGP best path algorithm.
D. A route distinguisher can be imported and exported to and from a VRF

Answer: A,B

QUESTION 105:

SONET's three layers are:

A. Frame
B. Line
C. DS1
D. Path
E. Section

Answer: B,D,E

QUESTION 106:

Assume two routers on the same subnet, Certkiller 1 and Certkiller 2, both configured for HSRP. Certkiller 1 has a priority of 120. Which of the following HSRP interface configurations will always result in the Certkiller 2 becoming the primary?

A. standby 1 priority 120
B. standby 1 priority 110
C. standby 1 priority 110 preempt
D. standby 1 priority 130 preempt
E. standby 1 priority 120 preempt
F. standby 1 priority 130

Answer: D,F

QUESTION 107:

In which of the following BGP-related events is an End-of-RIB (EOR) message sent?

A. During capability negotiation.
B. During initial convergence.
C. Following a link flap in the BGP speaker's AS.
D. Following a Route Processor Switchover.
E. Just before sending a CEASE message to tear down the session.

Answer: B,D

QUESTION 108:

In PIM-SM operations, the first router connected to the multicast source sends the Register message to which device?

A. RP mapping agent
B. Multicast receiver

C. Designated Router (DR)
D. RP
E. Multicast source

Answer: D

QUESTION 109:

With VPLS, which protocol is used for label exchange and PW signalling.

A. MP-BGP
B. LDP
C. IGP
D. BGP
E. MTP
F. Directed LDP

Answer: F

QUESTION 110:

Which two are characteristics of an IPv6 multicast address? (Choose two)

A. Is allocated from the unicast address space
B. Starts with a prefix of FE80 to FEBF in hex
C. First (most significant) octet is FF in hex
D. Last 64 bit contains the modified MAC address of the Ethernet interface
E. Starts with a prefix of FECO to FEFF in hex
F. Second octet contains a 4-bit multicast scope field

Answer: C,F

QUESTION 111:

Which two options best describe the purpose of session ID and cookie field in a L2TPv3 packet?

A. The session ID is a 32-bit locally significant field used to identify the call on the destination or egress tunnel endport.The session ID will be negotiated by the control connection or statically defined if using the L2TP v3 data plane only
B. The cookie is a variable length(with a maximum of eight bytes),word-aligned optional field.The control connection can negotiate this as an additional level of guarantee beyond the regular session ID lookup to make sure that a data message has been directed to the correct session or that any recently reused session ID will not be misdirected.
C. The session ID is a variable length(with a maximum of eight bytes),word-aligned optional field.The control connection can negotiate this as an additional level of

guarantee beyond the regular cookie lookup to make sure that a data message has been directed to the correct session or that any recently reused cookie will not be misdirected.
D. The cookie is a 32-bit locally significant field used to identify the call on the destination or egress tunnel endpoint.The cookie will be negotiated by the control connection or statically defined if using the L2TPv3 data plane only

Answer: A,B

QUESTION 112:

Packed Cell Relay encapsulation with AToM inclues which of the following?

A. Tunnel label
B. 5-byte ATM header
C. VC-label
D. 4 byte ATM header
E. Support for 30 packed cells.
F. Payload

Answer: A,C,D,F

QUESTION 113:

What ISIS TLVs are used to support MPLS-traffic Engineering?

A. Extended IS reachability TLV #135
B. Extended IS neighbor TLV # 22
C. Extended IS resource TLV #138
D. Router ID TLV # 134
E. Extended IS name TLV #137

Answer: A,B,D

QUESTION 114:

What is the importance of using Virtual Output Queues on ingress Line Cards in a high-end router?

A. Simplifies configuration
B. Uses less memory
C. Increases forwarding performance
D. Prevents head-of-line blocking

Answer: D

QUESTION 115:

Select the two answers that best describe the IP Event Dampening feature:

A. BGP Operators use IP Event Dampening to suppress the effect of unstable internet Routes
B. When IP Event Dampened internet routes resch their re-use limit, BGP installs them in the Routing Table and announces them to other BGP speakers
C. The IP Event Dampening works with routing protocols by stopping the announcement of dampened Interface subnets in their updates
D. The IP Event Dampening uses exponential decay mechanism to suppress the effects of excessive interface flapping

Answer: C,D

QUESTION 116:

What IOS commands display MPLS label mapping on an LSR?

A. Show mpls ldp neighbor detail
B. Show mpls ldp discovery
C. Show mpls ldp parameters
D. Show mpls ldp bindings
E. Show mpls forwading-table

Answer: D

QUESTION 117:

What is used to provide read access to QoS configuration and statistics information on Cisco platforms that support Modular QoS CLI (MQC)?

A. CDP
B. Cisco Class-Based QoS MIB.
C. Cisco SDM QoS Wizard
D. Cisco AutoQoS
E. Cisco NBAR Discovery

Answer: B

QUESTION 118:

Which two statements are true?

A. An internal BGP (iBGP) network cannot have Route-Reflectors within a Confederation because Confederation works between External Autonomous System (AS)

numbers.
B. An internal BGP (iBGP) network can have Route-Reflectors within a Confederation.
C. Clusters are used in Route-Reflector schemes to avoid loops.
D. A confederation uses confederation clusters to avoid routing loops.

Answer: B,C

QUESTION 119:

If the OSPF protocol is used to connect customer edge (CE) routers to service provider edge (PE) routers in the VPN backbone,which two options best describe the use of SHAM links?

A. A SHAM link is part of OSPF network of MPLS-VPN provider.
B. A sham-link is seen as an intra-area link between PE routers,an OSPF adjacency is created and database is exchanged
C. A sham-link is created between any twoo VPN sites that belong to the same OSPF area and share an OSPF backdoor link
D. A SHAM link is created between two directly connected PE routers so that it is preferred over the low speed backdoor door

Answer: B,C

QUESTION 120:

How do routers in an IS-IS Level-1 domain exit to reach other Level-1 (L1) domains ?(Select 2)

A. Level-1 routers use default routes installed based on ATT bit (Attach Bit) in announcements from Level-1-2(L1/L2) router
B. Level-1(L1) routers use default routes announced by Level-2(L2) routers in Level-1(L1) domain
C. Level-1 routers use specific routes, for other Level-1 domain, announced by Level-1-2(L1/L2) by route-leaking feature of Cisco IOS
D. Level-1 routers use specific routes, for other Level-1 domain, announced by Level-2(L2) by route-leaking feature of Cisco IOS

Answer: A,C

QUESTION 121:

RIPv2 differs from RIPv1 in that:

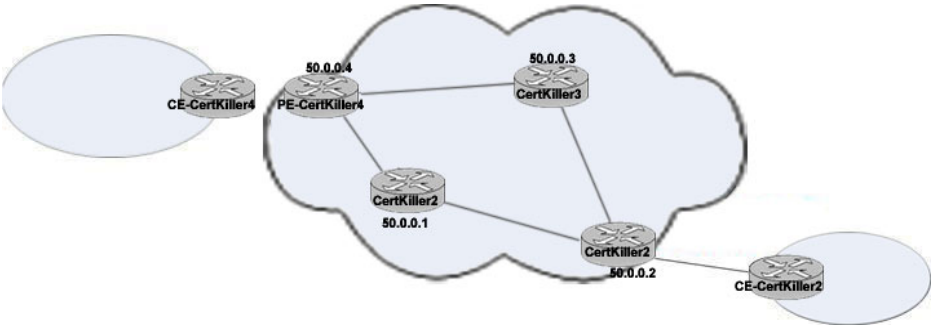
A. it supports authentication,and RIPv1 does not
B. it uses multicast address 224.0.0.10,instead of broadcast.
C. it can use either multicast or broadcast addresses,instead of just broadcast.

D. it uses multicast address 224.0.0.9,instead of broadcast.
E. it sends incremental updates,instead of periodic updates.
F. it is classless,instead of classful

Answer: A,D,F

QUESTION 122:

Certkiller 3 and Certkiller 4 are Route-Reflectors and there is an I-BGP session between them, there is NO I-BGP session between Certkiller 1 and Certkiller 2. For an External Route from CE- Certkiller 2 in Certkiller 2 to reach Certkiller 1, which two statements are true? Select two.



A. CE- Certkiller 2 establishes multi-hop E-BGP sessions with Certkiller 3 and Certkiller 4.
B. Certkiller 1, Certkiller 3 and Certkiller 4 establish full mesh I-BGP sessions, Certkiller 2, Certkiller 3 and Certkiller 4 establish full mesh I-BGP sessions.
C. Certkiller 1 acts as a Route-Reflector client to Certkiller 3, Certkiller 2 acts as a Route-Reflector client to Certkiller 4.
D. Certkiller 1 acts as a Route-Reflector client to Certkiller 4, Certkiller 4 acts as a Route-Reflector client to Certkiller 4, Certkiller 2 acts as a Route-Reflector client to Certkiller 3.

Answer: C,D

QUESTION 123:

In which of the following BGP-related events is an End-of-RIB (EOR) message sent?

A. Following a link flap in the BGP speaker's AS
B. During initial convergence.
C. Following a Route Processor Switchover.
D. During capability negotiation
E. Just before sending a CEASE message to tear down the session.

Answer: B,C

QUESTION 124:

When provisioning for Interactive-Video(e,g,video conferencing traffic)which three statements depicts the correct requirements?

A. Jitter should be no more than 30 ms
B. One-way latency should be no more than 150 ms
C. Loss should be no more than 1 percent.
D. Loss should be no more than 3 percent
E. One-way latency should be no more than 150/2=75 ms
F. Jitter should be no more than 300 ms

Answer: A,B,C

QUESTION 125:

How would you characterize the source and type in a denial of service attack on a router?

A. By setting up an access-list to permit all ICMP ,TCP ,and UDP traffic with the log or log-input commands ,then use the show access-list and show log commands to determine the type and source of attack
B. By applying an access-list to all incoming and outgoing interfaces,turning off route-cache on all interfaces,then,when telnetting into the router perform a debug IP packet detail
C. By perfornubg a show ip interface to see the type and source of the attack based upon the access-list matches
D. By performing a show interface to see the transmitted load "txload" and receive load "rxload" ;if the interface utilization is not maxed out ,there is no attack underway

Answer: A

QUESTION 126:

GMPLS is based upon. Select one or two options.

A. Packet-based switching devices
B. VPI/VCI-based switching devices
C. None of the above
D. Non-Packet-based devices

Answer: D

QUESTION 127:

Select 3 AVPs (Attribute-Value Pair) which MUST be present in the ICRQ:

A. Call Serial Number
B. Calling Number

C. Message Type
D. Called Number
E. Assigned Session ID

Answer: A,C,E

QUESTION 128:

Which of the following IOS commands can detect whether the SQL slammer virus propagates in your networks?

A. None of the other alternatives apply..
B. access-list 100 permit any any udp eq 1434
C. access-list 110 permit any any udp eq 69
D. access-list 100 permit any any udp eq 1434 log
E. access-list 110 permit any any udp eq 69 log

Answer: D

QUESTION 129:

What is true regarding Autonomous Systems (AS)?

A. All of the Above
B. AS numbers are assigned by the IANA
C. In the internet, an Autonomous System (AS) is a collection of IP networks and routers under the control
D. AS numbers are used by BGP (Border Gateway protocol) to exchange IP routing information with neighboring AS

Answer: A

QUESTION 130:

Select the statement that best describes The cure for Amplification Principle in the Internet domain, as explained in RFC 3429 (Internet Architectural Guidelines)

A. Amplification is prevented if local changes have only a local effect as opposed to system in which local change have a global effect
B. None of the above
C. Internet domain does not suffer from The Amplification Principle as BGP takes care of misbehaving advertisers
D. Amplification is prevented if global changes have only a local effect as opposed to systems in which global changes have a local effect

Answer: A

QUESTION 131:

If two routers, both reachable from one another, originate functionally equivalent type 2 external-LSAs (i.e, same destination, cost and non-zero forwarding address), Which of the following statements would apply ?

A. Two LSAs will exist in the network for this destination, and both will be used
B. Only the LSA generated by the lowest RID ASBR will exist in the network
C. Two LSAs will exist in the network for this destination, but only the one generated by the highest RID ASBR will be used
D. Only the LSA generated by the highest RID ASBR will exist in the network

Answer: D

QUESTION 132:

When should traffic shaping be implemented on Frame Relay PVCs? (Choose two)

A. When you want to drop excess traffic above the CIR
B. When over-subscribing the central site link
C. When there is a speed mismatch between the central site and the remote site.
D. When LLQ is implemented on the Frame Relay PVC.
E. When using Frame Relay SVCs
F. When Multilink PPP LFI is implemented on the Frame Relay PVC.

Answer: B,C

QUESTION 133:

What are the benefits of using TCAM technology in high-end routing products ?

A. Lower power consumption
B. Longer uptime
C. Lower maintenance cost
D. Simplified configuration
E. Deterministic performance

Answer: B,E

QUESTION 134:

Which two statements are true? Select all that apply.,

A. DPT/RPR is defined in the IEEE 802.17 standard and it uses Token Bucket system to avoid collisions on the fiber.

B. DPT/RPR uses a bi-directional ring consisting of two symmetric counter rotating fibre rings.
C. In DPT/RPR rings, data packets can be sent in one direction (downstream) and the corresponding control packets in the opposite direction (upstream), thus using both fibres concurrently to maximise bandwidth.
D. DPT/RPR can be deployed in the Core of the SP networks where point-to-point POS links are used to make best use of the Bandwidth.

Answer: B,C

QUESTION 135:

What is a limitation of implementing uRPF?

A. Domain name must be defined.
B. Symmetrical routing is required.
C. MPLS LDP must be enabled.
D. Named access-lists must be configured.
E. BGP routing protocol must be running.

Answer: B

QUESTION 136:

Which of the following is a correct arrangement of APS Action Requests in order of priority, with highest priority first?

A. Lockout of Protection, Manual Switch, SD, Forced Switch
B. Lookout of Protection, Forced Switch, SD, Manual Switch
C. Manual Switch, Forced Switch, Lockout of Protection, SD
D. Manual Switch, Lockout of Protection, Forced Switch, SD
E. None of the above
F. SD, Lockout of Protection, Forced Switch, Manual Switch

Answer: B

QUESTION 137:

In the context of MPLS Traffic engineering, TE path calculation is conducted by:

A. TE tail end
B. All TE nodes along the path
C. TE middle point
D. Independent server
E. TE head end

Answer: E

QUESTION 138:

Routes redistributed into an OSPF ASBR are which LSA type?

A. LSA type 3
B. LSA type 4
C. LSA type 5
D. LSA type 1
E. LSA type 6
F. LSA type 2

Answer: C

QUESTION 139:

Which two of the following are designated fields for MAC tunneling protocol(802.1 ah)?

A. Tunnel Label
B. 802.1q VLAN TAG
C. Control Word
D. Service Ethertype
E. ISL
F. PseudoLAN TAG

Answer: D,F

QUESTION 140:

What is the requirement of Remote Triggered Black Hole (RTBH) filtering?

A. ISIS updates exchange between trigger router and black hole router
B. None of above
C. OSPF updates exchange between trigger router and black hole router
D. IBGP updates exchange between trigger router and black hole router
E. EBGP updates exchange between trigger router and black hole router

Answer: D

QUESTION 141:

In a frame ,the MPLS label is imposed

A. Before the layer 2 header

B. Within the Layer 3 header
C. After the Laye Certkiller 3 header and before Laye Certkiller 2 header
D. After the Laye Certkiller 2 header and before Laye Certkiller 3 header

Answer: D

QUESTION 142:

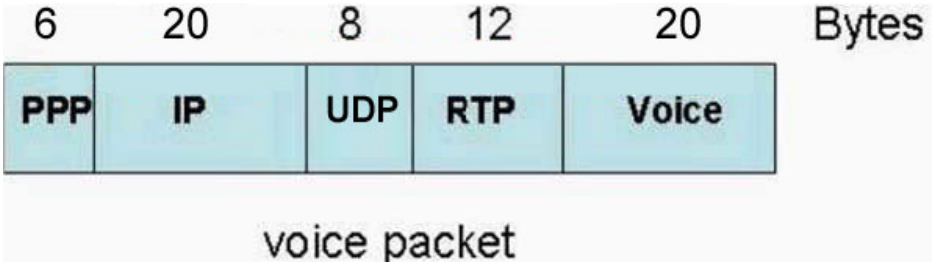
Which statements are correct for forwarding traffic into MPLS TE tunnels? (Choose 3)

A. Autoroute causes the TE head-end to establish IGP adjacency with the tail-end over the tunnel.
B. Autoroute causes the tunnel to be treated as a directly connected link to the head-end.
C. Forwarding adjacency makes the TE head-end node advertise the Tunnel LSP into the IGP.
D. Forwarding adjacency supports unequal cost load balancing over multiple TE tunnels.

Answer: B,C,D

QUESTION 143:

Exhibit:



Referring to the exhibit, if RTP header compression is used on the link, the header's overhead on the voice packet will be reduced by what percent?

A. from 50% to 20%
B. from 70% to 33%
C. from 50% to 25%
D. from 70% to 20%

Answer: B

QUESTION 144:

Select two valid administratively scoped multicast addresses in networks running Interior Gateway protocols like EIGRP and OSPF

A. 224.0.0.5
B. 239.255.255.255

C. 239.0.0.1
D. 224.0.0.10

Answer: B,C

QUESTION 145:

Which of the following descriptions about IP spoofing is correct?

A. IP destination address is forged
B. IP TCP destination port is forged
C. IP source address is forged
D. None of above
E. IP TCP source port is forged

Answer: C