Question: 1

In a VPRN the PE device is configured to run which of the following protocols? (Choose three.)

A. MP-BGP for exchanging customer routes with other PEs
B. A routing protocol for exchanging customer routes with the CE
C. MPLS for exchanging labels with other provider core devices
D. MPLS for exchanging labels with the CE devices
E. Targeted LDP for exchanging VPRN labels with other PE devices
F. A label signaling protocol for defining transport tunnels between PE and CE devices

Answer: A, B, C

Question: 2

Choose the answer that best completes the following sentence. The CE device is typically configured with _____.

A. A single routing protocol for exchanging routes with both the internal customer routers and with the PE
B. MP-BGP to exchange routes with the PE.
C. MPLS and a routing protocol for the exchange of labels and routes with the PE
D. MPLS for exchanging labels with other CE devices
E. A routing protocol for exchanging routes with the internal customer routers and a routing protocol for exchanging routes with the PE

Answer: E

Question: 3

Which of the following terms also correctly describes a Layer 3 VPN?(Choose three)

A. VPRN
B. BGP/MPLS VPN
C. VLL
D. VPLS
E. IP-VPN
F. ePipe

Answer: A, B, E

Question: 4

What are the main functions of a Layer 3 VPN? (Choose three).

A. Distributing customer routing information between sites
B. Forwarding customer data packets
C. Providing an integrated billing solution
D. Maintaining separation between distinct customer networks
E. Allowing the implementation of Layer 3 devices in the provider core

Answer: A, B, D

Question: 5

Which of the following statements are true regarding P devices in an MPLS VPRN? (Choose two.)

A. Participate in service provider core routing
B. P devices are not required to be MPLS enabled. MPLS is only required on the PE devices
C. Run a common routing protocol with the CE router
D. Must support MP-BGP
E. Do not have any connections to the CE
F. Must be aware of the VPRNs

Answer: A, E

Question: 6

What are the two primary problems the service provider must consider when providing traditional Layer 3 VPN services using only a single common routing table in the provider core? (Choose two)

A. Memory exhaustion in the provider core
B. Route leaking between the customer networks
C. CPU utilization for route processing
D. Unwanted packet forwarding between customer networks

Answer: B, D

Question: 7

When a Service Provider offers VPRN services to its customers, which of the following functions are expected to be the responsibility of the Service Provider? (Choose three)

A. Distributing the customer generated labels between sites
B. Distributing the customer routing information between
C. Forwarding the customer originated data packets to the appropriate destination
D. Forwarding the provider originated data packets to the appropriate customer site
E. Providing secure layer 3 routing exchange between sites

Answer: B, C, E

Question: 8

In a traditional layer 3 VPN which of the following will be an issue when there is overlapping address space between two customers? Choose the best answer.

A. There will be increased memory usage on the PE
B. There will be increased CPU utilization on the PE
C. The CE will reject the overlapping prefix
D. The PE will not recognize the prefixes as being different
E. There is no issue with overlapping address space in a traditional Layer 3 VPN

Answer: D

Question: 9

Complete the following statement. In a VPRN, the label signaled by RSVP-TE is used to _____.

A. Identify the egress PE in the MPLS domain
B. Signal the egress VPRN ID
C. Identify the ingress PE in the MPLS domain
D. Transport route updates between PEs

Answer: A

Question: 10

Complete the following statement. In a VPRN, the label signaled by RSVP-TE is used to _____.

A. Identify the egress PE in the MPLS domain
B. Signal the egress VPRN ID
C. Identify the ingress PE in the MPLS domain
D. Transport route updates between PEs

Answer: A

Question: 11

Complete the following statement. In a VPRN, the inner label is used to _____.

A. Identify the customer network on the egress PE
B. Establish the LSPs between PE devices
C. Identify the egress PE in the MPLS domain
D. Identify the customer network on the ingress PE

Answer: A

Question: 12

Which of the following devices would typically have VRF instances?

A. Any CE device
B. Any PE device
C. Any P device
D. Any router in the service provider core
E. Any customer router

Answer: B

Question: 13

What operation is performed by a P device on the label signaled by MP-BGP when it receives a labeled packet for a VPRN service?

A. It will label switch the packet based on this label
B. It will decrement the TTL and label switch the packet based on this label
C. It will SWAP the label for a new label and then label switch the packet
D. The P router does not perform any operation on this label

Answer: D

Question: 14

Which of the following statements is true? Choose the best answer.

A. A P router may forward customer packets to their destination without the presence of a route to that destination
B. The ingress PE router may forward customer packets to their destination without the presence of a route to that destination
C. The egress PE router may forward customer packets to their destination without the presence of a route to that destination
D. Any provider core router (P or PE) may forward customer packets to their destination without the presence of a route to that destination

Answer: A

Question: 15

Which protocol is used to exchange customer VPRN routes between PE devices?

A. OSPF
B. ISIS
C. MP-BGP
D. BGP
E. Targeted LDP

Answer: C