

Deploying HP FlexNetwork Core Technologies

Verson: Demo

[Total Questions: 10]

Question No: 1 HOTSPOT

Match the Comware quality of service (QoS) scheduling mechanism to its use case.

Ensures that traffic in a higher priority queue is always forwarded before traffic in a lower priority queue; lower priority traffic might be starved out.

Gives more forwarding opportunities to higher priority queues. Higher priority queues receive more bandwidth, but queues with large packets might receive more bandwidth than queues with small packets.

Guarantees a specific bandwidth to traffic flows in each priority queue; divide any remaining bandwidth among queue: based on relative priority. Strict priority (SP) Weighted Fair Queuing (WFQ)

Weighted Round Robin (WRR) weight-based setting

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| | - |
|--|-------|
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| Weighted Round Robin (WRR) weight-based se | tting |

Answer:

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|-------------------|-------------|----------------|---------|
| Weighted Round | Robin (WRR) |) weight-based | setting |
| | | | - |
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| | | | |
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Weighted Round Robin (WRR) weight-based setting

Weighted Fair Queuing (WFQ)

Explanation:

1 Strict Priority2 Weighted Round Robin3 Weighted Fair queueing

*Strict PriorityWith strict priority queuing, the switch services the queues in order of their priority. The highest priority queue is serviced until it is empty, and then the lower priority queues are serviced sequentially until they are empty.

*Weighted Round Robin

Weighted round robin (WRR) is a network scheduling discipline. Each packet flow or connection has its own packet queue in a network interface card. It is the simplest approximation of generalized processor sharing (GPS). While GPS serves infinitesimal amounts of data from each nonempty queue, WRR serves a number of packets for each nonempty queue: number = normalized(weight / mean packet size).3 Weighted Fair queueing

Weighted fair queueing (WFQ) is a data packet scheduling used by network schedulers. WFQ is both a packet based implementation of the generalized processor sharing policy (GPS), and a natural generalization of fair queuing (FQ): whereas FQ shares the links capacity in equal subparts, WFQ allows to specify, for each flow, which fraction of the capacity will be given.

Question No: 2

A company plans to use Intelligent Management Center(IMC) Network Traffic Analyzer (NTA) to monitor network utilization. How do HP switches with the solution?

A. Provision switches use the NTA server as their sFlow collector. Comware switches use the NTA server as their NetStream server.

B. Provision switches use the NTA server as their sFlow collector. NetStream server, or both Comware switches use the NTA server as their sFlow collector NetStream server, or both.

C. ProVision switches use the NTA server as their sFlow collector. Comware switches as their sFlow collector, NetStream server, or both.

D. ProVision switches use the NTA server as their sFlow collector, NetStream server, or both. Comware switches use the NTA server as their sFlow collector

Answer: C

Explanation:

*HP Intelligent Management Center Network Traffic Analyzer Softwaresupport sFlow, NetFlow, and NetStream.

*ProVision switches were formerly called Procurve switches. You can monitor Procurve/Provision switches using sFlow.

*NetStream module— Provides traffic analysis and statistics capture to allow network administrators to rapidly identify network anomalies and security threats as well as obtain capacity planning information; and supportsNetFlow v5 and v9 (JD254A Comware v5 only) http://h17007.www1.hp.com/us/en/networking/products/networkmanagement/IMC_NTA_Software/index.aspx#.VYI1MPmqpBc

Question No:3

A network administrator is configuring several HP Comware switches as an HP Intelligent Resilient Framework(IRF) virtual device. According to best practices at, which point during the IRF configuration process should the administrator activate the IRF ports?

A. After enabling the physical interfaces that are assigned to IRF ports and saving the settings

B. After configuring IRF ports but before assigning physical interfaces to them

C. After enabling the physical interfaces that are assigned to IRF ports but before saving the settings

D. Before configuring IRF ports or assigning physical interfaces to them

Answer: A

Explanation:

(see steps 5 and 6 below)

Use the **irf-port-configuration active** command to activate configurations on all IRF ports on the device.

When you physically connect members of an IRF virtual device and bind physical IRF port(s) to an IRF port whose link state is**DIS**or**DOWN**, which you can display with the **display irf topology**command, execution of this command is required to establish the IRF virtual device.

Note that activating IRF port configurations may cause merge of IRF virtual devices and automatic device reboot. Therefore, to avoid configuration loss you are recommended to set the member ID for the device in the following way:

1)Plan the network and member IDs in advance. Determine the number of IRF ports to be created, and which physical IRF ports is used for IRF virtual device establishment.

2)Change member IDs. (Member ID change takes effective after device reboot, so change member IDs before executing the **irf-port-configuration active** command.)

3)Connect SFP+ cables or fibers and make sure that the physical IRF ports are well connected.

4)Create IRF ports.

5)Bind physical IRF ports to IRF ports.

6)Save the current configurations to the configuration file to be used at the next startup.

7)Activate configurations on all IRF ports.

When the system starts up, if you bind a physical IRF port to an IRF port through the configuration file, or add a new physical port, configurations on IRF ports are automatically activated without the need to execute this command again.

Reference: IRF Configuration Commands

http://www.h3c.com/portal/Technical_Support___Documents/Technical_Documents/Voice_ Products/H3C_VG_Series_Voice_Gateway/Command/Command/0708test2/10/

Question No:4

A company is determining whether HP IMC User Access manager (UAM) meets its needs for a RADIUS server. The company requires a solution for dynamic access control lists based on user identity and location (connected switch ID). Which statement correctly describes UAM support for this requirement?

A. Administrator can use UAM service and access rules to apply identity-based ACLs. The location-based component is configured in individual switch CLIs.

B. UAM can only meet these requirements if it is synchronized with Microsoft Active Directory (AD).

C. UAM can meet these requirements if the company adds Endpoint Admission Defense (EAD) to the solution.

D. Administrator can configure UAM service policies, scenarios, and access rules to meet these requirements.

Answer: D

Explanation: Endpoint Admission Defensecandynamically deploy ACLs to access devices for dynamic access control.

Endpoint Admission Defensee requires that a fullylicensed version of the HP IMC User Access Management (UAM) software module be installed.

Reference: HP IMC Endpoint Admission Defense Software

http://h20195.www2.hp.com/V2/GetPDF.aspx/4AA3-0700ENW.pdf

In which components of HP FlexNetwork solutions can Intelligent Resilient Framework (IRF) play a role?

A. IRF can operate at any layer of both campus and data center solutions.

B. IRF can operate at the access layer of both campus and data center solutions. It cannot operate at the core.

C. IRF can operate within data center solutions but not in campus solutions.

D. IRF can operate at the core of both campus and data center solutions. It cannot operate at the access layer.

Answer: D

Explanation: HP FlexNetwork Architecture provides a common and consistent environment for enterprise data centers, campus and branch networks.

FlexCampus is based on a flat two-tieralso described as two-levelarchitecture.

Reference:https://en.wikipedia.org/wiki/HP_FlexNetwork_Architecture

Question No: 6

An HP switch is a member of an Intelligent Resilient Framework (IRF) virtual device that has two members. What is a proper situation for issuing the**mad restore**command on this switch?

A. The IRF link has failed, and MAD has caused a new member to become master. The administrator wants to restore the previous master's MAC address.

B. The IRF link has failed, and MAD placed this member in recovery mode. The administrator wants the switch to automatically repair the failed link.

C. The IRF link has failed, and the administrator needs to put this switch in MAD recovery mode.

D. The IRF link has failed, and MAD placed this member in recovery mode. The active member has gone offline.

Answer: B

Explanation: Restore the normal MAD state of the IRF fabric in Recovery state.Use mad restore to restore the normal MAD state of the IRF fabric in Recovery state. When MAD detects that an IRF fabric has split into multiple IRF fabrics, only the one whose master has the lowest member ID among all the masters can still forward traffic. All the other fabrics are set in Recovery state and cannot forward traffic.

Reference: HP 6125XLG Command Reference Manual: Mad Restore; Port Group Interface

http://www.manualslib.com/manual/579819/Hp-6125xlg.html?page=27

Question No:7

Refer to the exhibit.



This HP 10500 Switch Series is receiving an average of 1 Gbps of HTTP traffic from 10.1.4.0/24. The switch starts to receive an additional 1 Gbps of HTTP traffic from 10.1.4.0/24. How does the switch handle the traffic?

- A. It drops the traffic
- B. It forwards the traffic but marks it yellow (for a higher drop precedence)
- C. It forwards the traffic without remarking it in any way
- D. It forwards the traffic but marks it for forwarding in a lower priority queue

Answer: C

Explanation:

Parameters

cir*committed-information-rate*: Specifies the committed information rate (CIR) in kbps. **cbs***committed-burst-size*: Specifies the committed burst size (CBS) in bytes. The *committed-burst-size*argument ranges from 4000 to 16000000, the default is 4000. **ebs***excess-burst-size*: Specifies excess burst size (EBS) in bytes. The*excess-burst-size* argument ranges from 0 to 16000000, the default is 4000.

pirpeak-information-rate: Specifies the peak information rate (PIR) in kbps.

greenaction: Specifies the action to be conducted for the traffic conforming to CIR. The *action*argument can be:

discard: Drops the packets.

pass: Forwards the packets.

remark-dscp-pass*new-dscp*: Marks the packets with a new DSCP precedence and forwards them to their destinations. The *new-dscp* argument is in the range 0 to 63. By default, packets conforming to CIR are forwarded.

red*action*: Specifies the action to be conducted for the traffic conforms to neither CIR nor PIR. The *action* argument can be:

discard: Drops the packets.

pass: Forwards the packets.

remark-dscp-pass*new-dscp*: Marks the packets with a new DSCP precedence and forwards them to their destinations. The *new-dscp*argument is in the range 0 to 63. By default, packets conforming to neither CIR nor PIR are dropped.

yellow*action*: Specifies the action to be conducted for the traffic conforms to PIR but does not conform to CIR. The *action* argument can be:

discard: Drops the packets.

pass: Forwards the packets.

remark-dscp-pass*new-dscp*: Marks the packets with a new DSCP precedence and forwards them to their destinations. The *new-dscp*argument is in the range 0 to 63. By default, packets conforming to PIR but not conforming to CIR are forwarded.

Question No : 8

Refer to the exhibit.

Exhibit 1



| [IRF-1-ospf-1]display this | |
|---|---|
| ospf 1 area 0.0.0.0 | |
| abr-summary 10.0.0.0 255.255.0.0 cost 1 network 10.0.0.0 0.0.255.255 | L |
| abr-summary 10.1.0.0 255.255.0.0 cost 1 network 10.1.0.0 0.0.255.255 stub | L |

Exhibit 1 shows a simplified network topology. All infrastructure devices shown in the exhibit are successfully implementing (OSPF) on the interfaces. The exhibit also shows settings for OSPF areas. Exhibit 2 shows additional settings on IRF. The master within IRF 1 fails. Connectivity is disrupted for about one minute.

What can the network administrator do to prevent this issue occurring again?

A. Set up OSPF Bidirectional Forwarding Detection (BFD) on the routed link aggregation groups between the IRF virtual switches

B. Enable extended Link Access Control Detection Data Units (LACPDUs) on IRF 1 and IRF 4

C. On IRF 1, set up Bidirectional Forwarding Detection (BFD) Multi-Access Detection (MAD) with a dedicated link.

D. On each of the IRF virtual switches, enable opaque LSAs and set the OSPF graceful restart mode to IETF mode.

Answer: D

Explanation: In a nutshell, the OSPF enhancements for graceful restart are as follows:

- The router attempting a graceful restart originates link-local Opaque-LSAs, herein called Grace-LSAs, announcing its intention to perform a graceful restart within a specified amount of time or "grace period".

- During the grace period, its neighbors continue to announce the restarting router in their LSAs as if it were fully adjacent (i.e., OSPF neighbor state Full), but only if the network topology remains static (i.e., the contents of the LSAs in the link-state database having LS types 1-5,7 remain unchanged and periodic refreshes are allowed).

Reference:https://tools.ietf.org/html/rfc3623

Question No:9

A company uses 802.1X authentication to force users to authenticate to connect to the network. The company uses HP IMC User Access manager (UAM) as the RADIUS server. The company wants to assign users to VLANs based on their identity. For example, contractor should be assigned in VLAN 20. Assume that VLANs are extended correctly across the network infrastructure.

Where does a network administrator configure the VLAN policy?

A. In the access device configuration UAM

B. In local-user accounts for contractors, which are configured on access layer switches

C. In an authorized VLAN list, which is applied to access layer switches edge ports

D. In an access rule on UAM, which will be selected in the contractor service policy

Answer: D

Explanation: The HP IMC User Access Management (UAM) Module supports user identity authentication based on access policies associated with infrastructure resources.

Reference:Intelligent Management Center User Access Management Software

http://h17007.www1.hp.com/us/en/networking/products/networkmanagement/IMC_UAM_Software/index.aspx#.VYeq3vmqpBc

Question No : 10

Refer to the exhibit.

```
interface GigabitEthernet1/0/1
qos trust dscp
<comware-switch> display qos map-table dscp-dot1p
MAP-TABLE NAME: dscp-dot1p TYPE: pre-define
0
   : 0
16 : 2
<Comware-switch> display qos map-table dot1p-1p
MAP-TABLE NAME: dot1p-1p TYPE: pre-define
IMPORT : EXPORT
1
    0
2:1
3 :
    3
4
    4
5
  ....
    5
6
    6
7
```

A server connects to GigabitEthernet1/0/1 on an HP Comware switch. The server sends tagged traffic in VLAN2. It has an application that sets the DiffServ Code Point (DSCP) for its traffic to 16 and the 802.1p value to 2. The switch should use the DSCP to place the traffic in priority queue. The traffic belongs to the queue that is one priority level higher than the queue for best effort traffic(traffic without a QoS value)

What can the network administrator do to meet this requirement?

A. Change GigabitEthernet1/0/1's trust setting to "dot1p" set the port priority to 3.DSCP will not be used

B. Keep Gigabit Ethernet1/0/1's QoS trust setting to "dot1p" Set the port priority to 3.

C. Change the dot1p-lp map to map 802.1p value 2 to lp 2 and 802.1p value0to lp1.

D. Change the dscp-dot1p map to map DSCP 16 to 802.1p value 1.RECEIBE priority 0

Answer: C