**Liberty University**

**CSIS 331**

**Lab 12 Answer Sheet**

|  |  |  |  |
| --- | --- | --- | --- |
| **Ping From Device** | **Ping to Device IP** | **Possible Y/N** | **If no, Why Not?** |
| PC-A | PC-B | Y |  |
| PC-A | PC-C | N | They are in different networks |
| PC-A | S1 | N | They are in different networks |
| PC-B | PC-C | N | They are in different networks |
| PC-B | S2 | N | They are in different networks |
| PC-C | S2 | N | They are in different networks |
| S1 | S2 | Y |  |

1. What is the default VLAN?

Vlan 1

1. What ports are assigned to the default VLAN?

All ports

1. What is the status of VLAN 99?

up

1. Why?

No ports are assigne

1. Is PC-A able to ping PC-B? \_\_\_\_Yes \_\_\_\_No
2. Why? we have to configure s1 and s1
3. Is S1 able to ping S2? \_\_\_\_Yes \_\_\_\_No
4. Why? Link between s1 and s2 not set
5. Which VLAN is F0/24 now associated with?

Default vlan

1. What is the default name of VLAN 30?

VLAN0030

1. After deleting VLAN 30, what VLAN is port F0/24 assigned to?

Not assign to any vlan

1. What happens to the traffic destined to the host attached to F0/24?

No traffic will be transfer any trafic

1. To which VLAN is F0/24 assigned?

Default vlan 1

1. Why should you reassign a port to another VLAN before removing the VLAN from the VLAN database?

So the interface saying to VLAN that is removed from VLAN database are unavailable, and will not send the traffic until they are reassigned to another vlan.

|  |  |  |  |
| --- | --- | --- | --- |
| **Ping From Device** | **Ping to Device IP** | **Possible Y/N** | **If no, Why Not?** |
| S1 | S2 | Y |  |
| PC-A | PC-B | Y |  |
| PC-A | PC-C | N | Not configured in same network |
|  |  |  |  |
| PC-B | PC-C | N | Not configured in same network |
| PC-B | S2 | N | Not configured in same network |
| PC-C | S2 | N | Not configured in same network |

1. Why might you want to manually configure an interface to trunk mode instead of using DTP?
2. To initialize a switch back to its default settings, what other commands are needed?

Reflection Questions 1: What is needed to allow hosts on VLAN 10 to communicate to hosts on VLAN 20?

We have to keep layer 3 device

Reflection Questions 2. What are some primary benefits that an organization can receive through effective use of VLANs?

Better security, cost saving higher performance

Copy and Paste S1 show run Output:

S1#show running-config

Building configuration...

Current configuration : 2435 bytes

!

version 12.2

no service timestamps log datetime msec

no service timestamps debug datetime msec

service password-encryption

!

hostname S1

!

enable secret 5 $1$mERr$9cTjUIEqNGurQiFU.ZeCi1

!

!

!

no ip domain-lookup

!

!

spanning-tree mode pvst

spanning-tree extend system-id

!

interface FastEthernet0/1

switchport mode dynamic desirable

!

interface FastEthernet0/2

shutdown

!

interface FastEthernet0/3

shutdown

!

interface FastEthernet0/4

shutdown

!

interface FastEthernet0/5

shutdown

!

interface FastEthernet0/6

switchport access vlan 10

switchport mode access

!

interface FastEthernet0/7

shutdown

!

interface FastEthernet0/8

shutdown

!

interface FastEthernet0/9

shutdown

!

interface FastEthernet0/10

shutdown

!

interface FastEthernet0/11

switchport access vlan 20

switchport mode access

shutdown

!

interface FastEthernet0/12

switchport access vlan 10

switchport mode access

shutdown

!

interface FastEthernet0/13

switchport access vlan 10

switchport mode access

shutdown

!

interface FastEthernet0/14

switchport access vlan 10

switchport mode access

shutdown

!

interface FastEthernet0/15

switchport access vlan 10

switchport mode access

shutdown

!

interface FastEthernet0/16

switchport access vlan 10

switchport mode access

shutdown

!

interface FastEthernet0/17

switchport access vlan 10

switchport mode access

shutdown

!

interface FastEthernet0/18

switchport access vlan 10

switchport mode access

shutdown

!

interface FastEthernet0/19

switchport access vlan 10

switchport mode access

shutdown

!

interface FastEthernet0/20

switchport access vlan 10

switchport mode access

shutdown

!

interface FastEthernet0/21

switchport access vlan 20

switchport mode access

shutdown

!

interface FastEthernet0/22

switchport access vlan 10

switchport mode access

shutdown

!

interface FastEthernet0/23

switchport access vlan 10

switchport mode access

shutdown

!

interface FastEthernet0/24

switchport mode access

shutdown

!

interface GigabitEthernet0/1

shutdown

!

interface GigabitEthernet0/2

shutdown

!

interface Vlan1

no ip address

!

interface Vlan99

mac-address 0060.3e91.4201

ip address 192.168.10.11 255.255.255.0

!

banner motd ^C

Unauthorized access is strictly prohibited. ^C

!

!

!

line con 0

password 7 0822455D0A16

logging synchronous

login

!

line vty 0 4

password 7 0822455D0A16

logging synchronous

login

line vty 5 15

password 7 0822455D0A16

logging synchronous

login

!

!

!

!

end

Copy and Paste S2 show run Output:

S2#show running-config

Building configuration...

Current configuration : 1753 bytes

!

version 12.2

no service timestamps log datetime msec

no service timestamps debug datetime msec

service password-encryption

!

hostname S2

!

enable secret 5 $1$mERr$9cTjUIEqNGurQiFU.ZeCi1

!

!

!

no ip domain-lookup

!

!

spanning-tree mode pvst

spanning-tree extend system-id

!

interface FastEthernet0/1

!

interface FastEthernet0/2

shutdown

!

interface FastEthernet0/3

shutdown

!

interface FastEthernet0/4

shutdown

!

interface FastEthernet0/5

shutdown

!

interface FastEthernet0/6

shutdown

!

interface FastEthernet0/7

shutdown

!

interface FastEthernet0/8

shutdown

!

interface FastEthernet0/9

shutdown

!

interface FastEthernet0/10

shutdown

!

interface FastEthernet0/11

switchport access vlan 10

switchport mode access

!

interface FastEthernet0/12

shutdown

!

interface FastEthernet0/13

shutdown

!

interface FastEthernet0/14

shutdown

!

interface FastEthernet0/15

shutdown

!

interface FastEthernet0/16

shutdown

!

interface FastEthernet0/17

shutdown

!

interface FastEthernet0/18

switchport access vlan 20

switchport mode access

!

interface FastEthernet0/19

shutdown

!

interface FastEthernet0/20

shutdown

!

interface FastEthernet0/21

shutdown

!

interface FastEthernet0/22

shutdown

!

interface FastEthernet0/23

shutdown

!

interface FastEthernet0/24

shutdown

!

interface GigabitEthernet0/1

shutdown

!

interface GigabitEthernet0/2

shutdown

!

interface Vlan1

no ip address

!

interface Vlan99

mac-address 0090.2b36.2801

ip address 192.168.1.12 255.255.255.0

!

banner motd ^C

Unauthorized access is strictly prohibited. ^C

!

!

!

line con 0

password 7 0822455D0A16

logging synchronous

login

!

line vty 0 4

password 7 0822455D0A16

logging synchronous

login

line vty 5 15

password 7 0822455D0A16

logging synchronous

login

!

!

!

!

end