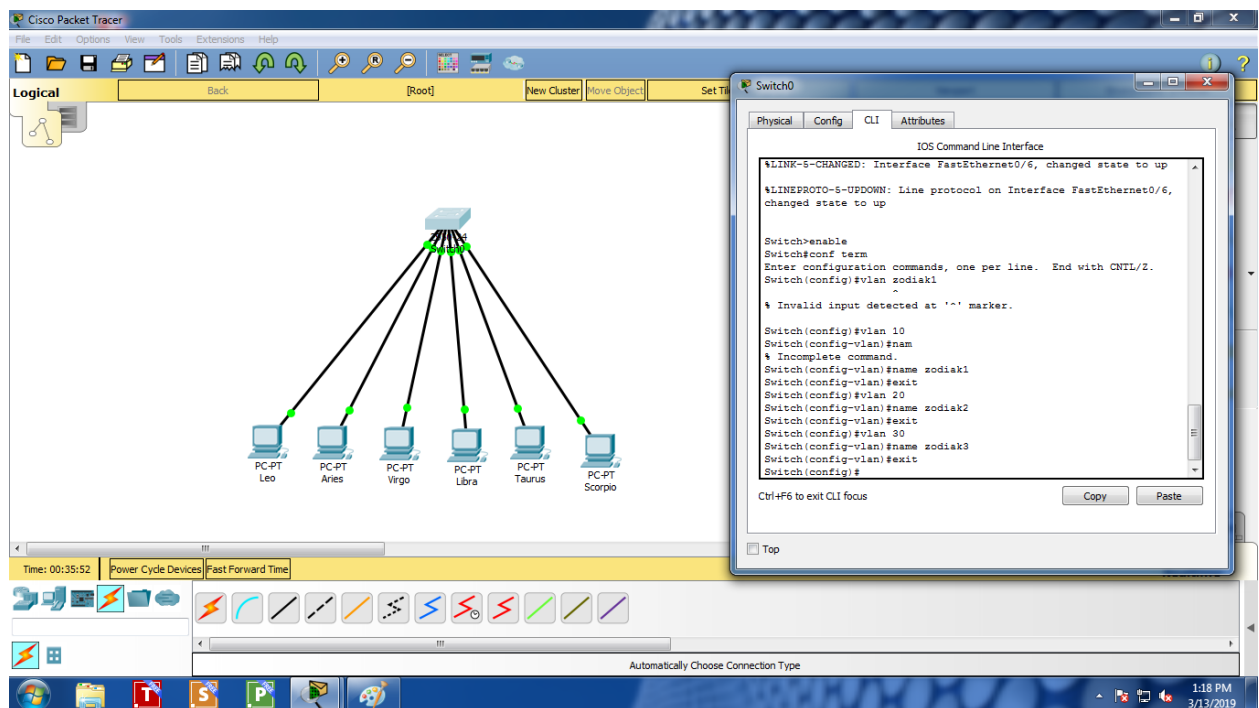


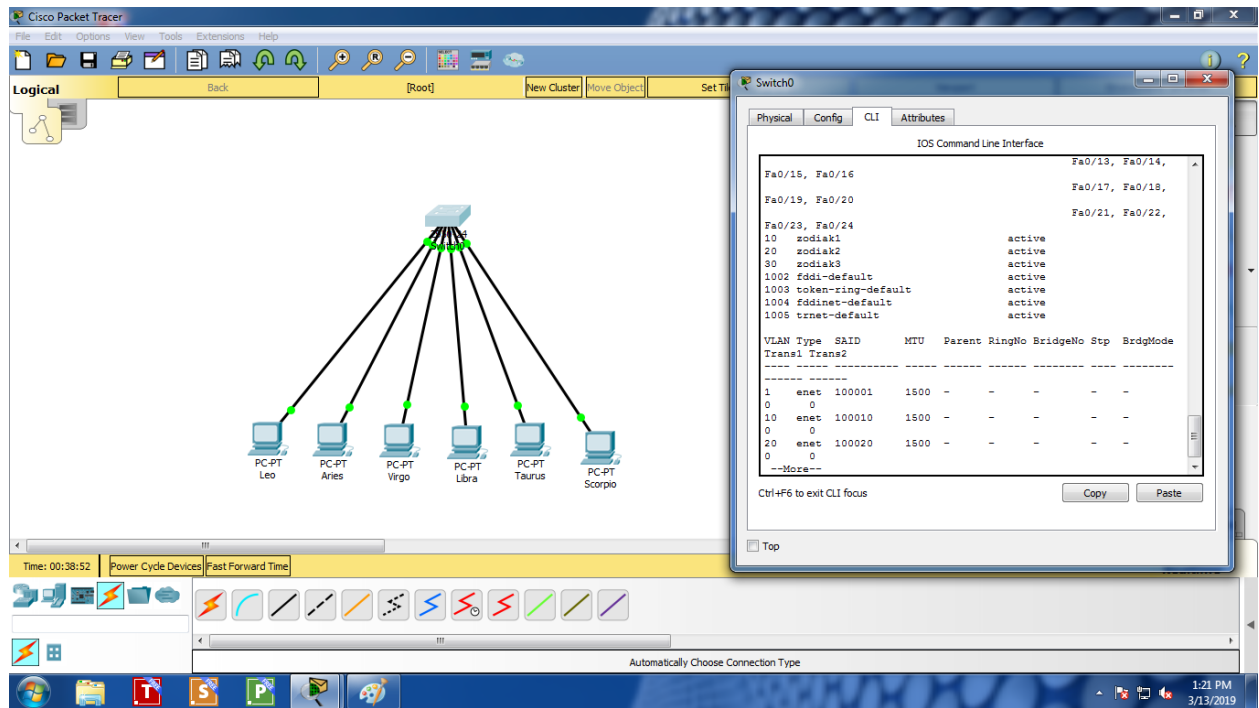
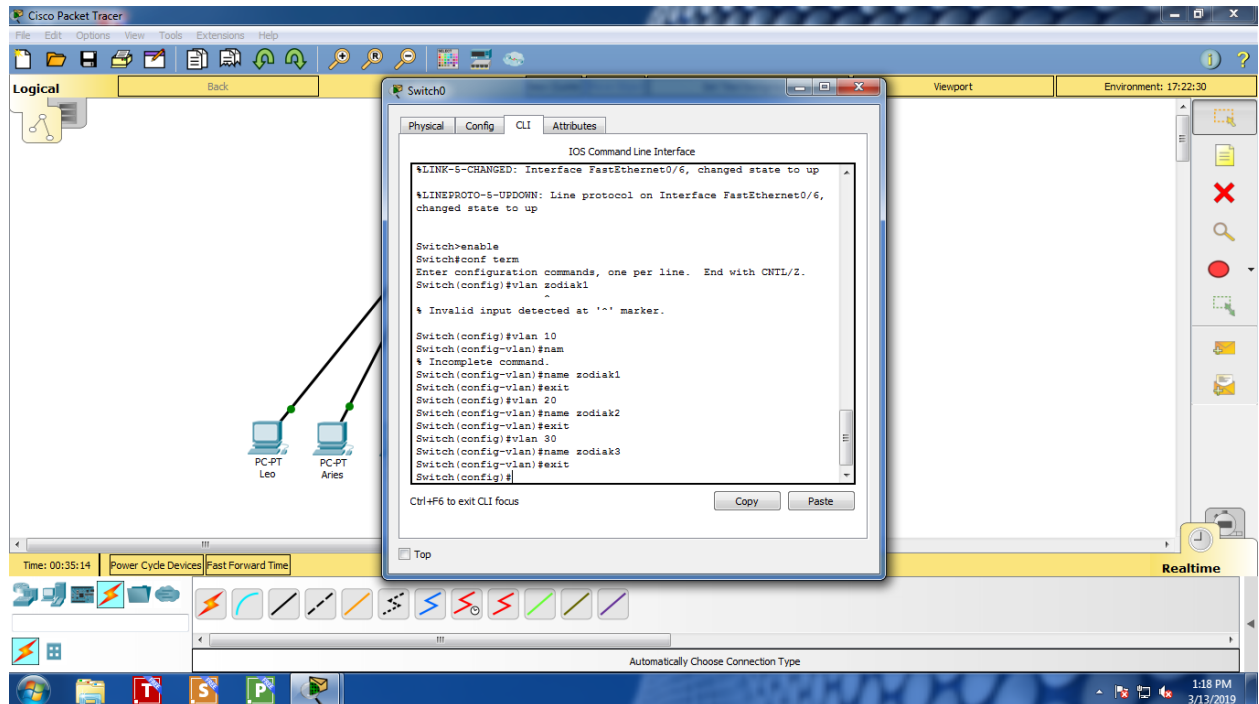
LAPORAN PRAKTIKUM JARINGAN KOMPUTER MODUL 4

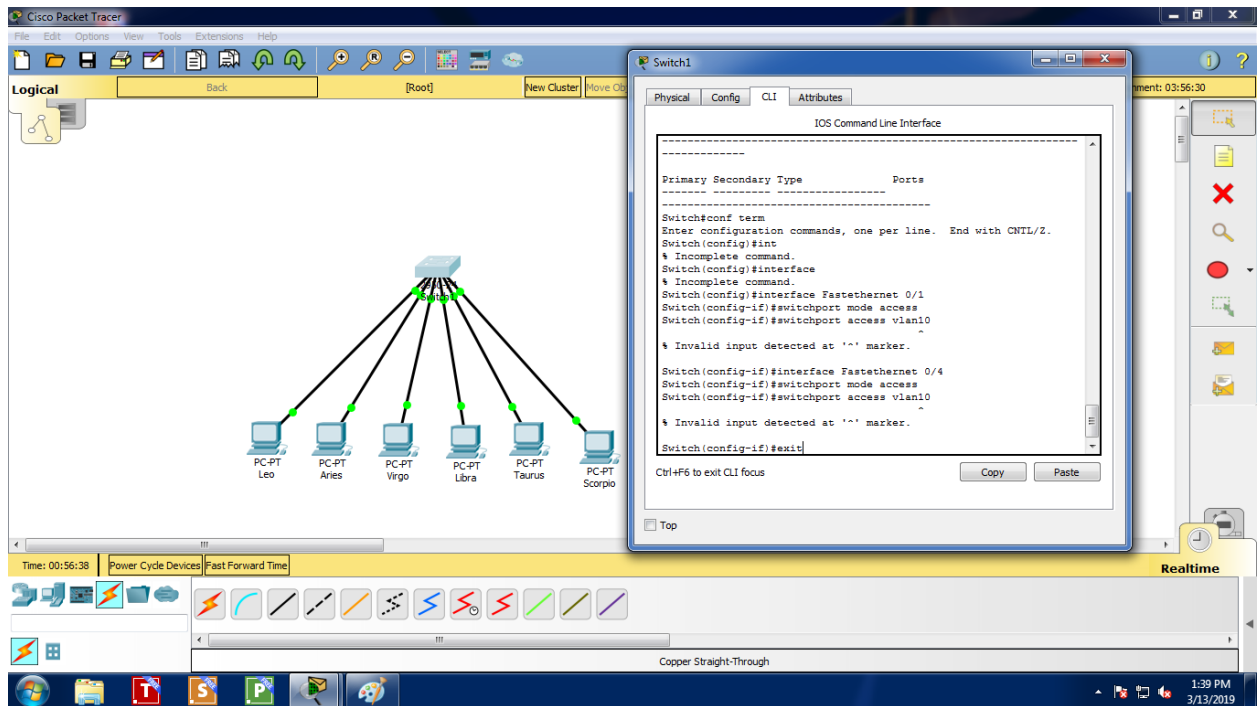
Nama : Ilham Athur Bayu W
NIM : L200170023
Kelas : A

Kegiatan 1 Desain

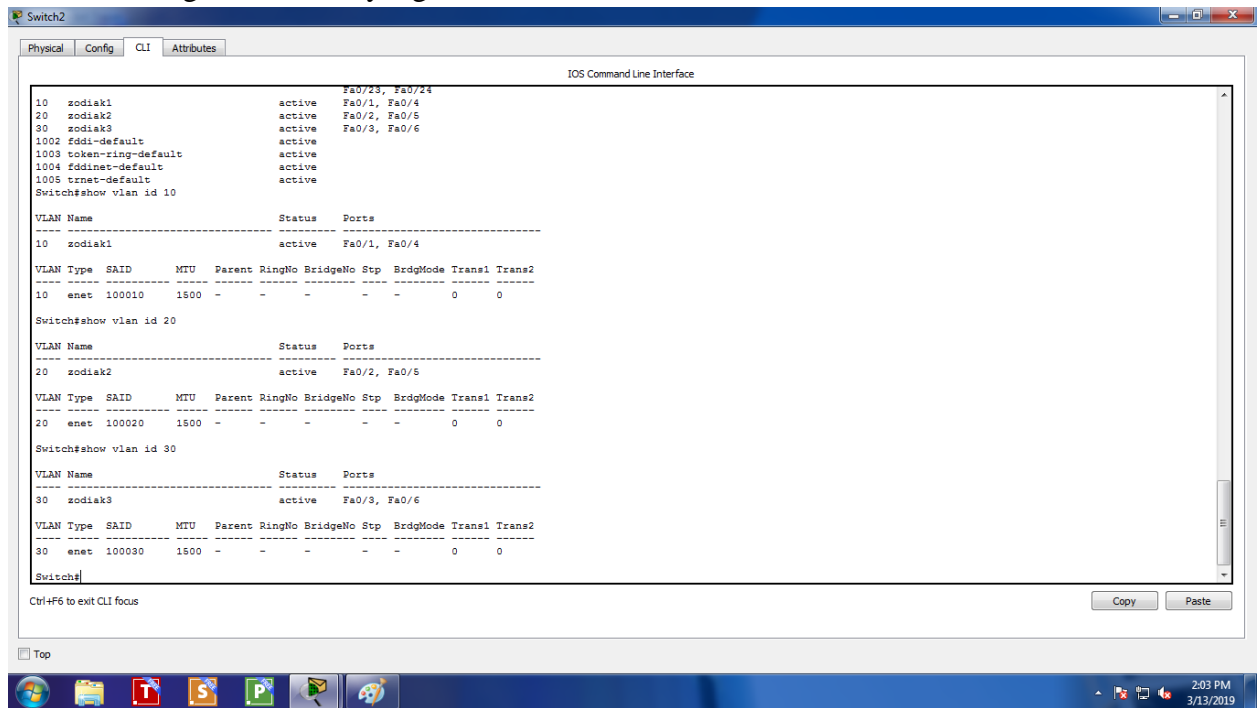


Konfigurasi pada switch dengan mode user dan mode privilege





Melihat konfigurasi VLAN yang telah dibuat.



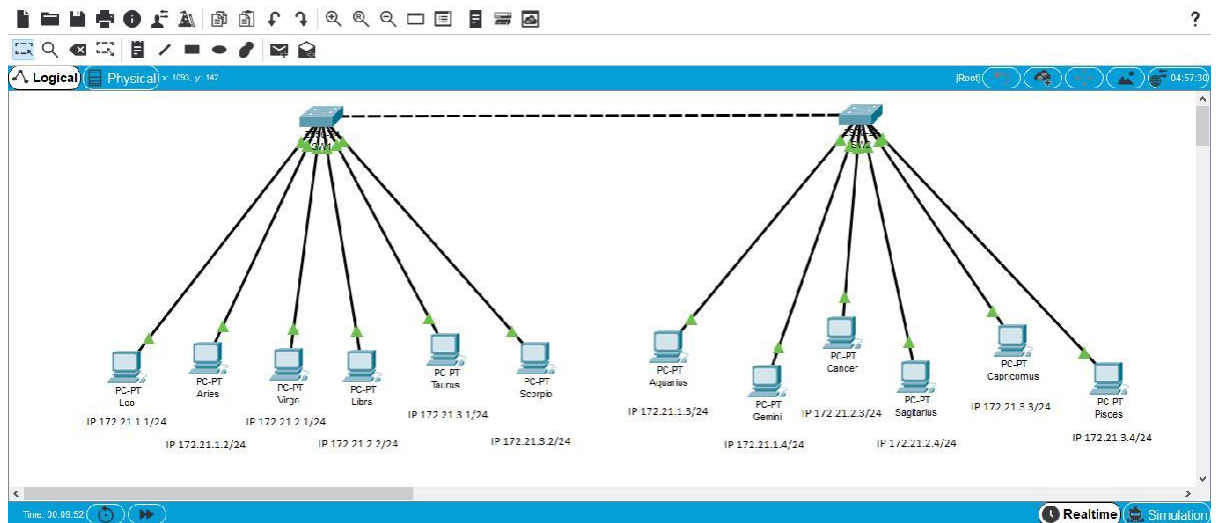
NO.	VARIABEL	NILAI
1.	Nomor VLAN	10
2.	Nama VLAN	Zodiak1
3.	Port	Fa 0/1, fa 0/4
4.	Status	Active

NO.	VARIABEL	NILAI
1.	Nomor VLAN	20
2.	Nama VLAN	Zodiak2
3.	Port	Fa 0/2, fa 0/5
4.	Status	Active

NO.	VARIABEL	NILAI
1.	Nomor VLAN	30
2.	Nama VLAN	Zodiak3
3.	Port	Fa 0/5, fa 0/6
4.	Status	Active

Kegiatan 2

1. Menggunakan cisco packet tracer untuk membuat topologi menggunakan Switch Catalyst 2950.



2. Nama perangkat SW1 (switch0), leo (PC0), aries (PC1), virgo (PC2), libra (PC3), taurus (PC4), scorpio (PC5)
3. Nama perangkat SW2 (switch1), aquarius (PC6), gemini (PC7), cancer (PC8), sagittarius (PC9), capricornus (PC10), Pisces (PC11)

4. Konfigurasi masing-masing PC :

- Leo = 172.21.1.1/24
- Aries = 172.21.1.2/24
- Virgo = 172.21.2.1/24
- Libra = 172.21.2.2/24
- Taurus = 172.21.3.1/24
- Scorpio = 172.21.3.2/24
- Aquarius = 172.21.1.3/24
- Gemini = 172.21.1.4/24
- Cancer = 172.21.2.3/24
- Sagitarius = 172.21.2.4/24
- Capricornus = 172.21.3.3/24
- Pisces = 172.21.3.4/24

5. Melakukan langkah 4 dan 5 pada kegiatan 1

```
Physical  Config  CLI  Attributes

%LINK-5-CHANGED: Interface FastEthernet0/4, changed state to up
%LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/4, cha

Switch>en
Switch#conf term
Enter configuration commands, one per line.  End with CNTL/Z.
Switch(config)#vlan 10
Switch(config-vlan)#name zodiak1
Switch(config-vlan)#ex
Switch(config)#vlan 20
Switch(config-vlan)#name zodiak2
Switch(config-vlan)#ex
Switch(config)#vlan 30
Switch(config-vlan)#name zodiak3
Switch(config-vlan)#ex
Switch(config)#int fa 0/1
Switch(config-if)#sw mode access
Switch(config-if)#sw access vlan 10
Switch(config-if)#int fa 0/4
Switch(config-if)#sw mode access
Switch(config-if)#sw access vlan 10
Switch(config-if)#int fa 0/2
Switch(config-if)#sw mode access
Switch(config-if)#sw access vlan 20
Switch(config-if)#int fa 0/5
Switch(config-if)#sw mode access
Switch(config-if)#sw access vlan 20
Switch(config-if)#int fa 0/3
Switch(config-if)#sw mode access
Switch(config-if)#sw access vlan 30
Switch(config-if)#int fa 0/6
Switch(config-if)#sw mode access
Switch(config-if)#sw access vlan 30
Switch(config-if)#ex
Switch(config)#
```

6. Melakukan konfigurasi VLAN trunking pada switch 1

```
Physical  Config  CLI  Attributes
IOS Command

Switch#conf term
Enter configuration commands, one per line.  End with CNTL/Z.
Switch(config)#int fa 0/1
Switch(config-if)#sw mode trunk

Switch(config-if)#
%LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/1, changed state to down

%LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/1, changed state to up

Switch(config-if)#end
Switch#
%SYS-5-CONFIG_I: Configured from console by console
```

7. Melihat konfigurasi trunking yang telah dibuat

```
Physical  Config  CLI  Attributes
IOS Command Line Interface

Switch#show int fa 0/1 sw
Name: Fa0/1
Switchport: Enabled
Administrative Mode: trunk
Operational Mode: trunk
Administrative Trunking Encapsulation: dot1q
Operational Trunking Encapsulation: dot1q
Negotiation of Trunking: Off
Access Mode VLAN: 10 (zodiak1)
Trunking Native Mode VLAN: 1 (default)
Voice VLAN: none
Administrative private-vlan host-association: none
Administrative private-vlan mapping: none
Administrative private-vlan trunk native VLAN: none
Administrative private-vlan trunk encapsulation: dot1q
Administrative private-vlan trunk normal VLANs: none
Administrative private-vlan trunk private VLANs: none
Operational private-vlan: none
Trunking VLANs Enabled: All
Pruning VLANs Enabled: 2-1001
Capture Mode Disabled
Capture VLANs Allowed: ALL
Protected: false
Appliance trust: none

Switch#show int trunk
Port      Mode      Encapsulation  Status      Native vlan
Fa0/1     on        802.1q         trunking    1

Port      Vlans allowed on trunk
Fa0/1     1-1005

Port      Vlans allowed and active in management domain
Fa0/1     1,10,20,30

Port      Vlans in spanning tree forwarding state and not pruned
Fa0/1     1,10,20,30
```

Tab/1 1,20,20,20

GetSwitchShow vlan

VLAN Name	Status	Ports
1 default	active	Eth0/7, Eth0/8, Eth0/9, Eth0/10 Eth0/11, Eth0/12, Eth0/13, Eth0/14 Eth0/15, Eth0/16, Eth0/17, Eth0/18 Eth0/19, Eth0/20, Eth0/21, Eth0/22 Eth0/23, Eth0/24
10 vnet101	active	Eth0/2
50 vnet105	active	Eth0/6, Eth0/8
80 vnet108	active	Eth0/8, Eth0/8
1000 vnet1000	active	
1008 vnet1008	active	
1009 vnet1009	active	
1000 vnet1000	active	

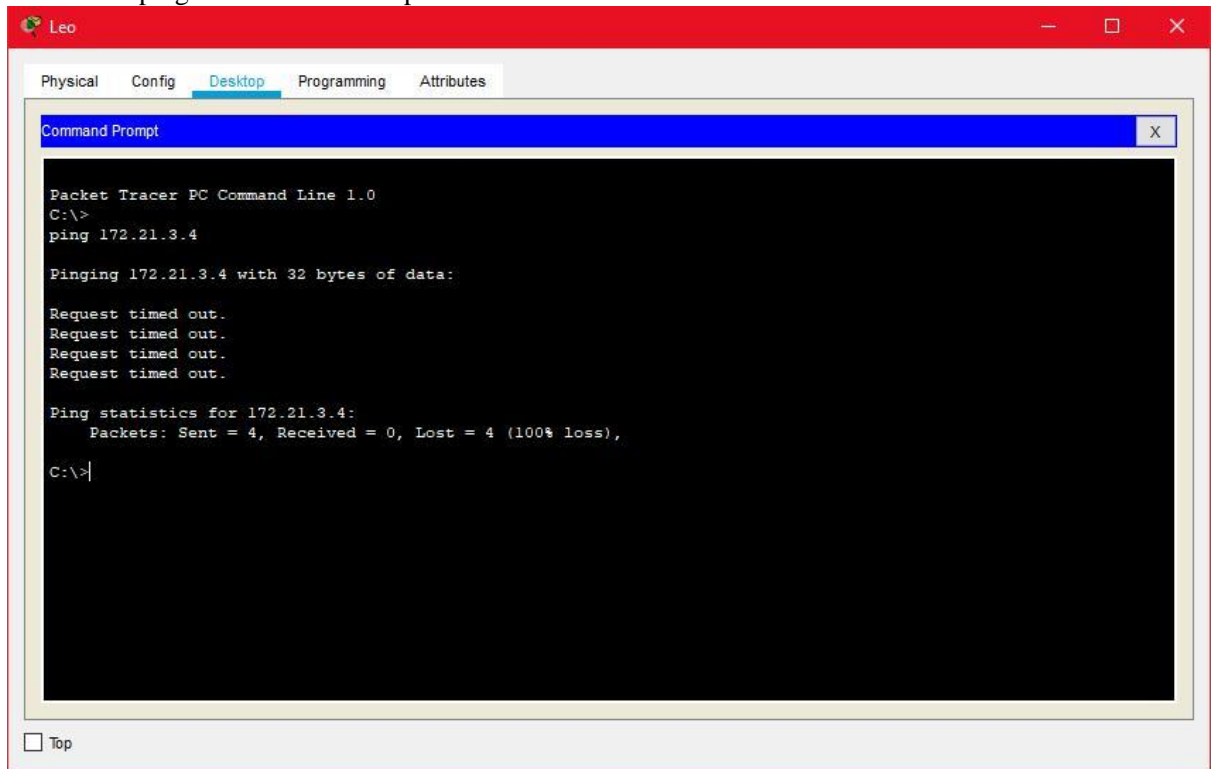
VLAN Type	SAID	MTU	Parent	Range	BridgeNo	Stp	BridgeMode	Trans1	Trans2
1	vnet	10000	1000	-	-	-	-	0	0
10	vnet	10000	1000	-	-	-	-	0	0
10	vnet	10000	1000	-	-	-	-	0	0
70	vnet	10000	1000	-	-	-	-	0	0
1002	vnet	10000	1000	-	-	-	-	0	0
1003	vnet	10000	1000	-	-	-	-	0	0
1004	vnet	10000	1000	-	-	-	-	0	0
1005	vnet	10000	1000	-	-	-	-	0	0

VLAN Type	SAID	MTU	Parent	Range	BridgeNo	Stp	BridgeMode	Trans1	Trans2
-----------	------	-----	--------	-------	----------	-----	------------	--------	--------

Remove FROM VLANs

Primary Secondary Type	Ports
-----	-----
Default	

8. Melakukan ping dari PC leo ke PC pisces



9. Melakukan konfigurasi VLAN trunking pada switch 2

```
Physical Config CLI Attributes
IOS Command Lin

Switch#
%SYS-5-CONFIG_I: Configured from console by console

Switch#en
Switch#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Switch(config)#int fa 0/1
Switch(config-if)#sw mode trunk

Switch(config-if)#
%LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/1, changed state to down

%LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/1, changed state to up

Switch(config-if)#end
Switch#
```

10. Melihat konfigurasi vlan pada switch 2

```
Physical Config CLI Attributes

Switch(config-if)#end
Switch#
%SYS-5-CONFIG_I: Configured from console by console

Switch#show vlan

VLAN Name                Status    Ports
-----
1    default                active    Fa0/2, Fa0/3, Fa0/4, Fa0/5
                                           Fa0/6, Fa0/7, Fa0/8, Fa0/9
                                           Fa0/10, Fa0/11, Fa0/12, Fa0/13
                                           Fa0/14, Fa0/15, Fa0/16, Fa0/17
                                           Fa0/18, Fa0/19, Fa0/20, Fa0/21
                                           Fa0/22, Fa0/23, Fa0/24

1002 fddi-default         active
1003 token-ring-default   active
1004 fddinet-default       active
1005 trnet-default         active

VLAN Type  SAID          MTU   Parent RingNo BridgeNo Stp    BrdgMode Trans1 Trans2
-----
1    enet    100001       1500  -     -     -     -     -     0      0
1002 fddi    101002       1500  -     -     -     -     -     0      0
1003 tr     101003       1500  -     -     -     -     -     0      0
1004 fdnet  101004       1500  -     -     -     ieee  -     0      0
1005 trnet  101005       1500  -     -     -     ibm   -     0      0

VLAN Type  SAID          MTU   Parent RingNo BridgeNo Stp    BrdgMode Trans1 Trans2
-----

Remote SPAN VLANs
-----

Primary Secondary Type                Ports
-----
```

11. Melakukan konfigurasi port-port switch ke dalam VLAN dengan anggota
 - Zodiak1 = aquarius dan gemini
 - Zodiak2 = cancer dan sagitarius
 - Zodiak3 = capricornus dan pisces

Physical Config **CLI** Attributes

IOS Command

```
-----
Remove Span Ports
-----
Primary Secondary Type          Ports
-----
Switch#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Switch(config)#int fa 0/1
Switch(config-if)#sw mode access
Switch(config-if)#sw access vlan 10
Switch(config-if)#int fa 0/2
Switch(config-if)#sw mode access
Switch(config-if)#sw access vlan 10
Switch(config-if)#int fa 0/3
Switch(config-if)#sw mode access vlan 20
Switch(config-if)#sw mode access
^
% Invalid input detected at '^' marker.

Switch(config-if)#sw mode access
Switch(config-if)#sw access vlan 20
Switch(config-if)#int fa 0/4
Switch(config-if)#sw mode access
Switch(config-if)#sw access vlan 20
Switch(config-if)#int fa 0/5
Switch(config-if)#sw mode access
Switch(config-if)#sw access vlan 30
Switch(config-if)#int fa 0/6
Switch(config-if)#sw mode access
Switch(config-if)#sw access vlan 30
Switch(config-if)#end
Switch#
```

12. Melakukan ping

PC leo ke PC aries dan PC leo ke PC aquarius

Leo

Physical Config **Desktop** Programming Attributes

Command Prompt

```
C:\>
C:\>
C:\>ping 172.21.1.2

Pinging 172.21.1.2 with 32 bytes of data:

Request timed out.
Request timed out.
Request timed out.
Request timed out.

Ping statistics for 172.21.1.2:
    Packets: Sent = 4, Received = 0, Lost = 4 (100% loss),

C:\>ping 172.21.1.3

Pinging 172.21.1.3 with 32 bytes of data:

Request timed out.
Request timed out.
Request timed out.
Request timed out.

Ping statistics for 172.21.1.3:
    Packets: Sent = 4, Received = 0, Lost = 4 (100% loss),

C:\>
```

☐ Top

PC leo ke PC pisces



The image shows a screenshot of a virtual machine window titled "Leo". The window has a red title bar and a menu bar with "Physical", "Config", "Desktop", "Programming", and "Attributes". The "Desktop" tab is selected. Inside the window, a "Command Prompt" window is open, displaying the following text:

```
C:\>
ping 172.21.1.2

Pinging 172.21.1.2 with 32 bytes of data:

Request timed out.
Request timed out.
Request timed out.
Request timed out.

Ping statistics for 172.21.1.2:
    Packets: Sent = 4, Received = 0, Lost = 4 (100% loss),
```

PC libra ke PC cancer dan PC libra ke PC leo

