

**NAMA : DEWI RAHMAWATI**

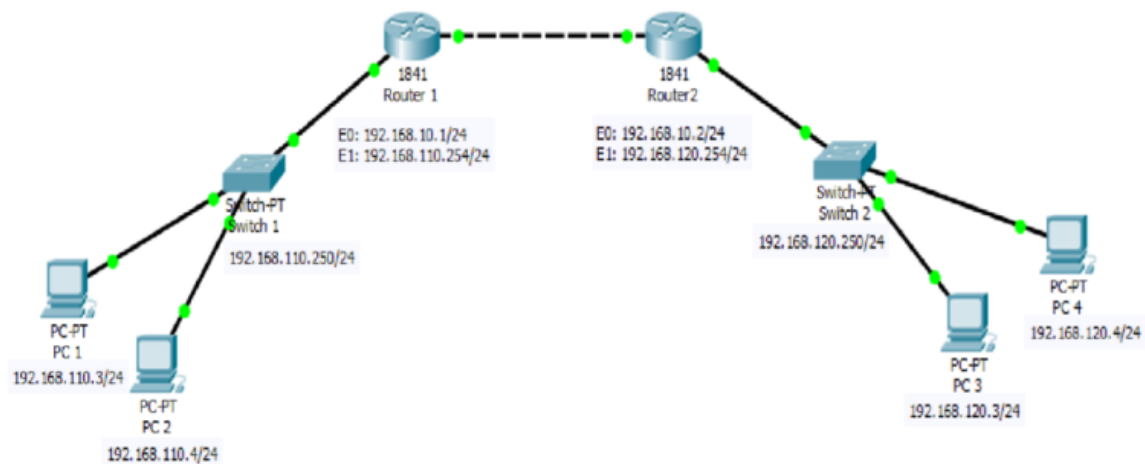
**NIM : L200170188**

**KELAS : D**

**TUGAS MODUL 8**

## **JARINGAN KOMPUTER**

### **KEGIATAN 1**



#### **1. Melakukan konfigurasi Switch**

##### **a. Switch 1**

```
Switch>enable
Switch#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Switch(config)#int vlan 1
Switch(config-if)#ip address 192.168.110.250 255.255.255.0
Switch(config-if)#no shutdown

Switch(config-if)#
%LINK-5-CHANGED: Interface Vlan1, changed state to up

%LINEPROTO-5-UPDOWN: Line protocol on Interface Vlan1, changed state to up

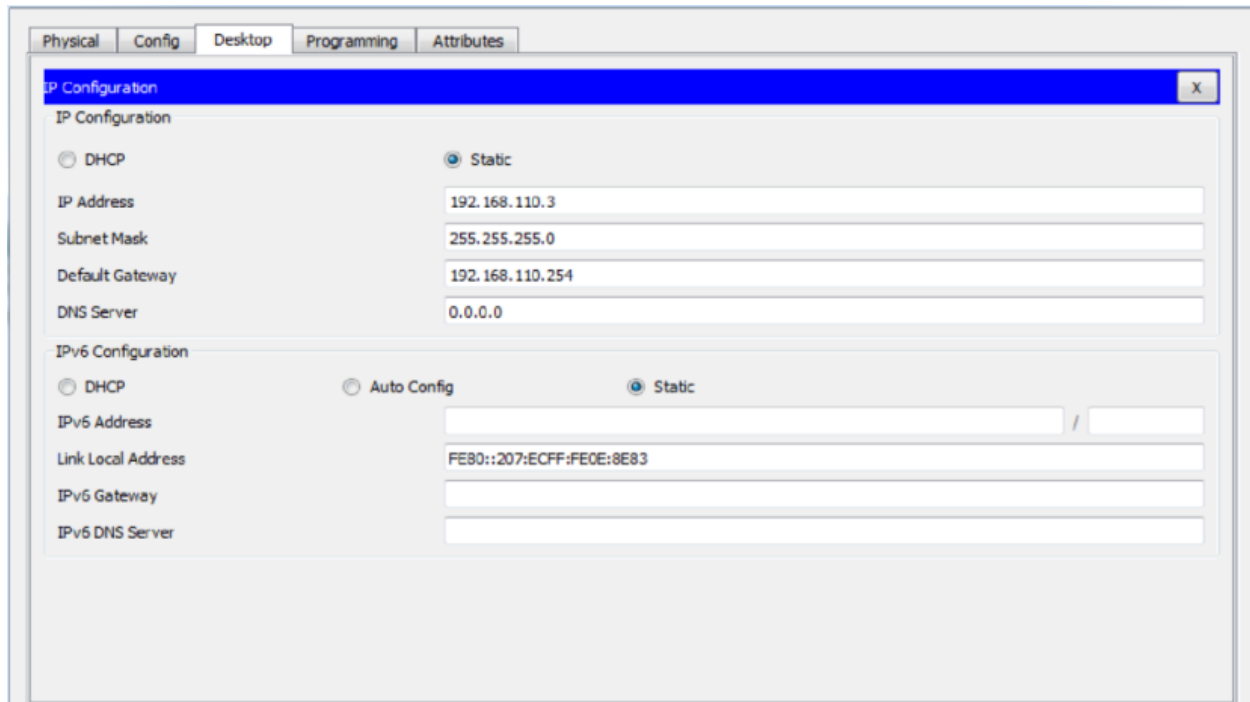
Switch(config-if)#exit
Switch(config)#
```

##### **b. Switch 2**

```
Switch>enable
Switch#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Switch(config)#int vlan 1
Switch(config-if)#ip address 192.168.120.250 255.255.255.0
Switch(config-if)#exit
Switch(config)#
```

## 2. Melakukan konfigurasi PC

### a. PC 1



The screenshot shows a network configuration window titled "IP Configuration" with a close button (X) in the top right corner. The window has a tabbed interface with "Physical", "Config", "Desktop", "Programming", and "Attributes" tabs. The "Config" tab is active. Under the "IP Configuration" section, the "Static" radio button is selected. The fields are filled with the following values:

Field	Value
IP Address	192.168.110.3
Subnet Mask	255.255.255.0
Default Gateway	192.168.110.254
DNS Server	0.0.0.0

Below the IP Configuration section is the "IPv6 Configuration" section. The "Static" radio button is selected. The fields are filled with the following values:

Field	Value
IPv6 Address	/
Link Local Address	FE80::207:ECFF:FE0E:8E83
IPv6 Gateway	
IPv6 DNS Server	

### b. PC 2

Physical Config Desktop Programming Attributes

IP Configuration

IP Configuration

☐ DHCP ☒ Static

IP Address 192.168.110.4

Subnet Mask 255.255.255.0

Default Gateway 192.168.110.254

DNS Server 0.0.0.0

IPv6 Configuration

☐ DHCP ☐ Auto Config ☒ Static

IPv6 Address /

Link Local Address FE80::2E0:B0FF:FEA3:CBAE

IPv6 Gateway

IPv6 DNS Server

c. PC 3

Physical Config Desktop Programming Attributes

IP Configuration

IP Configuration

☐ DHCP ☒ Static

IP Address 192.168.120.3

Subnet Mask 255.255.255.0

Default Gateway 192.168.120.254

DNS Server 0.0.0.0

IPv6 Configuration

☐ DHCP ☐ Auto Config ☒ Static

IPv6 Address /

Link Local Address FE80::20A:41FF:FEA5:A07B

IPv6 Gateway

IPv6 DNS Server

d. PC 4

Physical Config Desktop Programming Attributes

**IP Configuration** X

IP Configuration

☐ DHCP ☒ Static

IP Address 192.168.120.4

Subnet Mask 255.255.255.0

Default Gateway 192.168.120.254

DNS Server 0.0.0.0

IPv6 Configuration

☐ DHCP ☐ Auto Config ☒ Static

IPv6 Address /

Link Local Address FE80::202:17FF:FE78:735

IPv6 Gateway

IPv6 DNS Server

3. Melakukan konfigurasi pada Router.

a. Router 1

```
Router>enable
Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#router rip
Router(config-router)#network 192.168.110.0
Router(config-router)#network 192.168.10.0
Router(config-router)#^Z
~
% Invalid input detected at '^' marker.

Router(config-router)#^Z
Router#
%SYS-5-CONFIG_I: Configured from console by console

Router#
```

b. Router 2

```

Router>enable
Router#router rip
      ^
% Invalid input detected at '^' marker.

Router#conf term
Enter configuration commands, one per line.  End with CNTL/Z.
Router(config)#router rip
Router(config-router)#network 192.168.120.0
Router(config-router)#network 192.168.10.0
Router(config-router)#^Z
Router#
%SYS-5-CONFIG_I: Configured from console by console

Router#|

```

---

4. Melakukan Show ip route
  - a. Pada Router 1

```

Router(config)#exit
Router#
%SYS-5-CONFIG_I: Configured from console by console

Router#show ip route
Codes: C - connected, S - static, I - IGRP, R - RIP, M - mobile,
B - BGP
       D - EIGRP, EX - EIGRP external, O - OSPF, IA - OSPF inter
area
       N1 - OSPF NSSA external type 1, N2 - OSPF NSSA external
type 2
       E1 - OSPF external type 1, E2 - OSPF external type 2, E -
EGP
       i - IS-IS, L1 - IS-IS level-1, L2 - IS-IS level-2, ia -
IS-IS inter area
       * - candidate default, U - per-user static route, o - ODR
       P - periodic downloaded static route

Gateway of last resort is not set

C    192.168.10.0/24 is directly connected, FastEthernet0/0
C    192.168.110.0/24 is directly connected, FastEthernet0/1
R    192.168.120.0/24 [120/1] via 192.168.10.2, 00:00:15,
FastEthernet0/0

Router#|

```

- b. Pada Router 2

```

Router(config)#exit
Router#
%SYS-5-CONFIG_I: Configured from console by console

Router#show ip route
Codes: C - connected, S - static, I - IGRP, R - RIP, M - mobile,
B - BGP
       D - EIGRP, EX - EIGRP external, O - OSPF, IA - OSPF inter
area
       N1 - OSPF NSSA external type 1, N2 - OSPF NSSA external
type 2
       E1 - OSPF external type 1, E2 - OSPF external type 2, E -
EGP
       i - IS-IS, L1 - IS-IS level-1, L2 - IS-IS level-2, ia -
IS-IS inter area
       * - candidate default, U - per-user static route, o - ODR
       P - periodic downloaded static route

Gateway of last resort is not set

C     192.168.10.0/24 is directly connected, FastEthernet0/0
R     192.168.110.0/24 [120/1] via 192.168.10.1, 00:00:24,
FastEthernet0/0
C     192.168.120.0/24 is directly connected, FastEthernet0/1

Router#

```

5. Melakukan cek koneksi pada PC 1.

```

C:\>ping 192.168.120.4

Pinging 192.168.120.4 with 32 bytes of data:

Reply from 192.168.120.4: bytes=32 time=1ms TTL=126
Reply from 192.168.120.4: bytes=32 time=11ms TTL=126
Reply from 192.168.120.4: bytes=32 time=11ms TTL=126
Reply from 192.168.120.4: bytes=32 time<1ms TTL=126

Ping statistics for 192.168.120.4:
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
    Approximate round trip times in milli-seconds:
        Minimum = 0ms, Maximum = 11ms, Average = 5ms

C:\>

```

6. Menentukan access -list dan menerapkannya.



```

D - EIGRP, EX - EIGRP external, O - OSPF, IA - OSPF inter
area
N1 - OSPF NSSA external type 1, N2 - OSPF NSSA external
type 2
E1 - OSPF external type 1, E2 - OSPF external type 2, E -
EGP
i - IS-IS, L1 - IS-IS level-1, L2 - IS-IS level-2, ia -
IS-IS inter area
* - candidate default, U - per-user static route, o - ODR
P - periodic downloaded static route

```

Gateway of last resort is not set

```

C    192.168.10.0/24 is directly connected, FastEthernet0/0
C    192.168.110.0/24 is directly connected, FastEthernet0/1
R    192.168.120.0/24 [120/1] via 192.168.10.2, 00:00:15,
FastEthernet0/0

```

```

Router#conf term
Enter configuration commands, one per line.  End with CNTL/Z.
Router(config)#access-list 10 permit 192.168.120.0 0.0.255.255
Router(config)#end
Router#
%SYS-5-CONFIG_I: Configured from console by console

```

Router#

```

Router(config)#access-list 10 permit 192.168.120.0 0.0.255.255
Router(config)#end
Router#
%SYS-5-CONFIG_I: Configured from console by console

```

```

Router#conf term
Enter configuration commands, one per line.  End with CNTL/Z.
Router(config)#int e1
^
% Invalid input detected at '^' marker.

```

```

Router(config)#int e1
^
% Invalid input detected at '^' marker.

```

```

Router(config)#int e1
^
% Invalid input detected at '^' marker.

```

```

Router(config)#int fa 0/1
Router(config-if)#ip access-group 10 out
Router(config-if)#^Z
Router#
%SYS-5-CONFIG_I: Configured from console by console

```

Router#

7. Melakukan cek koneksi pada

a. PC 1.

```
Pinging 192.168.120.4 with 32 bytes of data:
Request timed out.
Request timed out.
Reply from 192.168.120.4: bytes=32 time=10ms TTL=126
Reply from 192.168.120.4: bytes=32 time=12ms TTL=126

Ping statistics for 192.168.120.4:
    Packets: Sent = 4, Received = 2, Lost = 2 (50% loss),
Approximate round trip times in milli-seconds:
    Minimum = 10ms, Maximum = 12ms, Average = 11ms

C:\>ping 192.168.120.4

Pinging 192.168.120.4 with 32 bytes of data:
Reply from 192.168.120.4: bytes=32 time=1ms TTL=126
Reply from 192.168.120.4: bytes=32 time=11ms TTL=126
Reply from 192.168.120.4: bytes=32 time=11ms TTL=126
Reply from 192.168.120.4: bytes=32 time<1ms TTL=126

Ping statistics for 192.168.120.4:
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
Approximate round trip times in milli-seconds:
    Minimum = 0ms, Maximum = 11ms, Average = 5ms

C:\>ping 192.168.120.3

Pinging 192.168.120.3 with 32 bytes of data:
Request timed out.
Reply from 192.168.120.3: bytes=32 time=11ms TTL=126
Reply from 192.168.120.3: bytes=32 time=10ms TTL=126
Reply from 192.168.120.3: bytes=32 time<1ms TTL=126

Ping statistics for 192.168.120.3:
    Packets: Sent = 4, Received = 3, Lost = 1 (25% loss),
Approximate round trip times in milli-seconds:
    Minimum = 0ms, Maximum = 11ms, Average = 7ms

C:\>|
```

b. Pada PC 3

```
Packet Tracer PC Command Line 1.0
C:\>ping 192.168.110.3

Pinging 192.168.110.3 with 32 bytes of data:

Reply from 192.168.110.3: bytes=32 time=11ms TTL=126
Reply from 192.168.110.3: bytes=32 time<1ms TTL=126
Reply from 192.168.110.3: bytes=32 time=11ms TTL=126
Reply from 192.168.110.3: bytes=32 time=11ms TTL=126

Ping statistics for 192.168.110.3:
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
Approximate round trip times in milli-seconds:
    Minimum = 0ms, Maximum = 11ms, Average = 8ms

C:\>|
```

8. Melakukan konfigurasi router pada Router 1



```

line con 0
!
line aux 0
!
line vty 0 4
  login
!
!
!
end

Router#
Router#
Router#
Router#
Router#
Router#conf term
Enter configuration commands, one per line.  End with CNTL/Z.
Router(config)#access-list 20 permit 192.168.120.4 0.0.0.0
Router(config)#^Z
Router#
%SYS-5-CONFIG_I: Configured from console by console

Router#

```

---

#### 9. Menerapkannya pada Router 1

```

end

Router#
Router#
Router#
Router#
Router#
Router#conf term
Enter configuration commands, one per line.  End with CNTL/Z.
Router(config)#access-list 20 permit 192.168.120.4 0.0.0.0
Router(config)#^Z
Router#
%SYS-5-CONFIG_I: Configured from console by console

Router#conf term
Enter configuration commands, one per line.  End with CNTL/Z.
Router(config)#int fa 0/1
Router(config-if)#ip access-group 20 out
Router(config-if)#^Z
Router#
%SYS-5-CONFIG_I: Configured from console by console

Router#

```

---

#### 10. Melakukan cek koneksi

##### a. Pada PC 3

```

C:\>ping 192.168.110.3

Pinging 192.168.110.3 with 32 bytes of data:

Reply from 192.168.10.1: Destination host unreachable.
Reply from 192.168.10.1: Destination host unreachable.
Reply from 192.168.10.1: Destination host unreachable.
Reply from 192.168.10.1: Destination host unreachable.

Ping statistics for 192.168.110.3:
    Packets: Sent = 4, Received = 0, Lost = 4 (100% loss),

C:\>ping 192.168.110.4

Pinging 192.168.110.4 with 32 bytes of data:

Reply from 192.168.10.1: Destination host unreachable.
Reply from 192.168.10.1: Destination host unreachable.
Reply from 192.168.10.1: Destination host unreachable.
Reply from 192.168.10.1: Destination host unreachable.

Ping statistics for 192.168.110.4:
    Packets: Sent = 4, Received = 0, Lost = 4 (100% loss),

C:\>

```

b. Pada PC 4

```

Packet Tracer PC Command Line 1.0
C:\>ping 192.168.110.3

Pinging 192.168.110.3 with 32 bytes of data:

Reply from 192.168.110.3: bytes=32 time=11ms TTL=126
Reply from 192.168.110.3: bytes=32 time<1ms TTL=126
Reply from 192.168.110.3: bytes=32 time<1ms TTL=126
Reply from 192.168.110.3: bytes=32 time=10ms TTL=126

Ping statistics for 192.168.110.3:
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
    Approximate round trip times in milli-seconds:
        Minimum = 0ms, Maximum = 11ms, Average = 5ms

C:\>ping 192.168.110.4

Pinging 192.168.110.4 with 32 bytes of data:

Request timed out.
Reply from 192.168.110.4: bytes=32 time<1ms TTL=126
Reply from 192.168.110.4: bytes=32 time=10ms TTL=126
Reply from 192.168.110.4: bytes=32 time=11ms TTL=126

Ping statistics for 192.168.110.4:
    Packets: Sent = 4, Received = 3, Lost = 1 (25% loss),
    Approximate round trip times in milli-seconds:
        Minimum = 0ms, Maximum = 11ms, Average = 7ms

C:\>

```

## KEGIATAN 2

Melakukan konfigurasi extended access-list

```
Router>enable
Router#conf term
Enter configuration commands, one per line.  End with CNTL/Z.
Router(config)#access-list 100 permit tcp 192.168.120.0 0.0.0.255
192.168.110.3 0.0.0.0 eq telnet
Router(config)#int fa 0/0
Router(config-if)#ip access-group 100 in
Router(config-if)#|
```