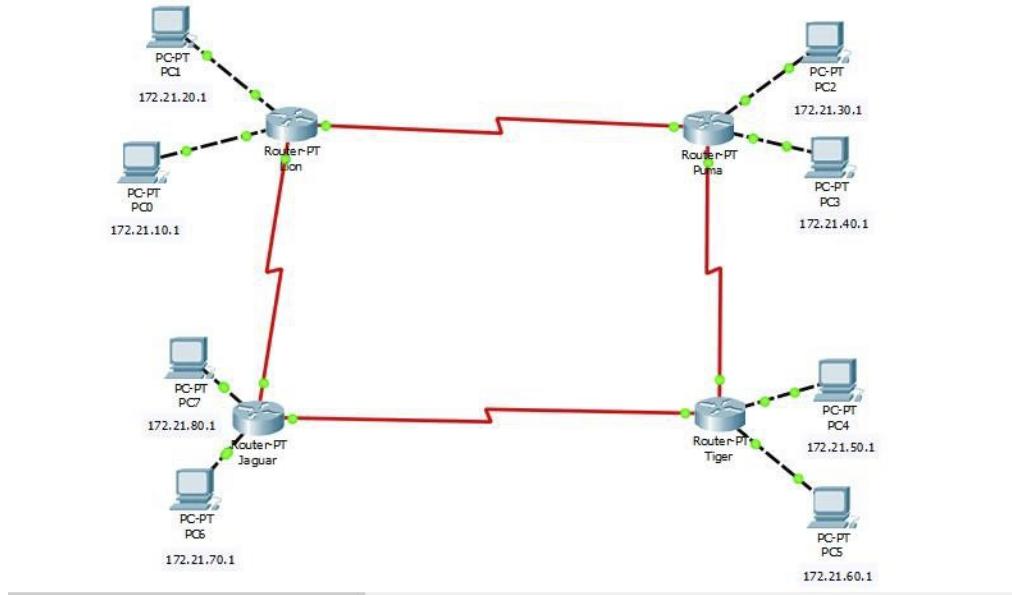


Nama : Muhammad Hilmy Raihan
NIM : L200180029
Kelas : B

Modul 7

1. Rancangan Jaringan



2. Melakukan konfigurasi ip router

a. Lion

```
Router>enable
Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#int fa 0/0
Router(config-if)#ip address 172.21.10.10 255.255.255.0
Router(config-if)#no shutdown
Router(config-if)#int fa 1/0
Router(config-if)#ip address 172.21.20.20 255.255.255.0
Router(config-if)#no shutdown
Router(config-if)#int se 2/0
Router(config-if)#clock rate 200000
Router(config-if)#ip address 172.21.1.1 255.255.255.0
Router(config-if)#no shutdown
Router(config-if)#int se 3/0
Router(config-if)#clock rate 200000
Router(config-if)#ip address 172.21.2.1 255.255.255.0
Router(config-if)#no shutdown
```

b. Puma

```
Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#int fa 0/0
Router(config-if)#ip address 172.21.30.30 255.255.255.0
Router(config-if)#no shutdown
Router(config-if)#int fa 1/0
Router(config-if)#ip address 172.21.40.40 255.255.255.0
Router(config-if)#no shutdown
Router(config-if)#int se 2/0
Router(config-if)#ip address 172.21.1.2 255.255.255.0
Router(config-if)#int se 3/0
Router(config-if)#clock rate 200000
Router(config-if)#ip address 172.21.3.1 255.255.255.0
Router(config-if)#no shutdown
```

c. Tiger

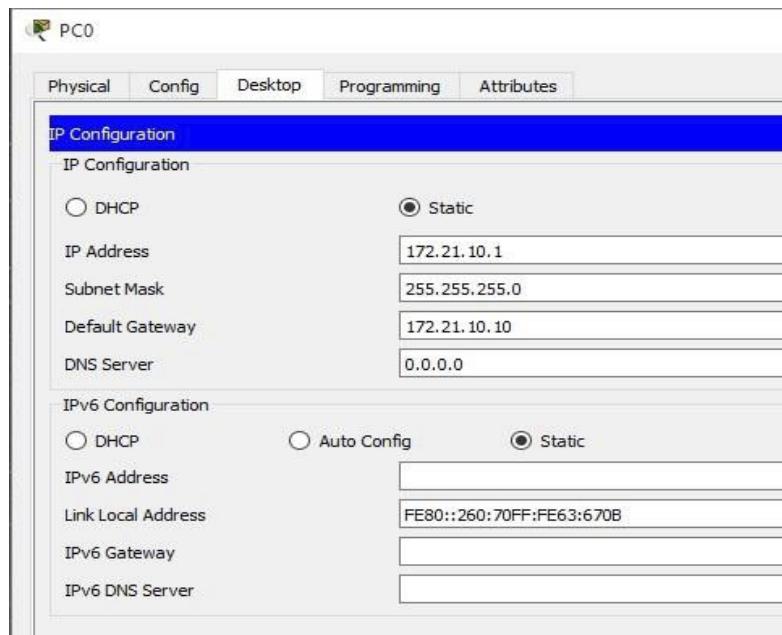
```
Router>enable
Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#int fa 0/0
Router(config-if)#ip address 172.21.60.60 255.255.255.0
Router(config-if)#no shutdown
Router(config-if)#int fa 1/0
Router(config-if)#ip address 172.21.60.60 255.255.255.0
Router(config-if)#no shutdown
Router(config-if)#int se 2/0
Router(config-if)#clock rate 2000000
Router(config-if)#ip address 172.21.4.1 255.255.255.0
Router(config-if)#no shutdown
Router(config-if)#int se 3/0
Router(config-if)#ip address 172.21.3.2 255.255.255.0
Router(config-if)#no shutdown
```

d. Jaguar

```
Router>enable
Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#int fa 0/0
Router(config-if)#ip address 172.21.70.70 255.255.255.0
Router(config-if)#no shutdown
Router(config-if)#int fa 1/0
Router(config-if)#ip address 172.21.80.80 255.255.255.0
Router(config-if)#no shutdown
Router(config-if)#int se 2/0
Router(config-if)#ip address 172.21.4.2 255.255.255.0
Router(config-if)#no shutdown
Router(config-if)#int se 3/0
Router(config-if)#ip address 172.21.2.2 255.255.255.0
Router(config-if)#no shutdown
Router(config-if)#

```

3. Konfigurasi pada PC



PC1

Physical Config Desktop Programming Attributes

IP Configuration

IP Configuration

DHCP Static

IP Address: 172.21.20.1

Subnet Mask: 255.255.255.0

Default Gateway: 172.21.20.20

DNS Server: 0.0.0.0

IPv6 Configuration

DHCP Auto Config Static

IPv6 Address: FE80::290:21FF:FE8E:9245

Link Local Address: FE80::2D0:58FF:FED7:5136

IPv6 Gateway:

IPv6 DNS Server:

PC2

Physical Config Desktop Programming Attributes

IP Configuration

IP Configuration

DHCP Static

IP Address: 172.21.30.1

Subnet Mask: 255.255.255.0

Default Gateway: 172.21.30.30

DNS Server: 0.0.0.0

IPv6 Configuration

DHCP Auto Config Static

IPv6 Address: FE80::2D0:58FF:FED7:5136

Link Local Address: FE80::290:21FF:FE8E:9245

IPv6 Gateway:

IPv6 DNS Server:

PC3

Physical Config Desktop Programming Attributes

IP Configuration

IP Configuration

DHCP Static

IP Address: 172.21.40.1

Subnet Mask: 255.255.255.0

Default Gateway: 172.21.40.40

DNS Server: 0.0.0.0

IPv6 Configuration

DHCP Auto Config Static

IPv6 Address:

Link Local Address: FE80::290:CFF:FE69:5254

IPv6 Gateway:

IPv6 DNS Server:

PC4

Physical Config Desktop Programming Attributes

IP Configuration

IP Configuration

DHCP Static

IP Address: 172.21.50.1

Subnet Mask: 255.255.255.0

Default Gateway: 172.21.50.50

DNS Server: 0.0.0.0

IPv6 Configuration

DHCP Auto Config Static

IPv6 Address:

Link Local Address: FE80::201:C9FF:FE7A:685A

IPv6 Gateway:

IPv6 DNS Server:

PC5

Physical Config Desktop Programming Attributes

IP Configuration

IP Configuration

DHCP Static

IP Address: 172.21.60.1

Subnet Mask: 255.255.255.0

Default Gateway: 172.21.60.60

DNS Server: 0.0.0.0

IPv6 Configuration

DHCP Auto Config Static

IPv6 Address:

Link Local Address: FE80::2E0:B0FF:FE11:822A

IPv6 Gateway:

IPv6 DNS Server:

PC6

Physical Config Desktop Programming Attributes

IP Configuration

IP Configuration

DHCP Static

IP Address: 172.21.70.1

Subnet Mask: 255.255.255.0

Default Gateway: 172.21.70.70

DNS Server: 0.0.0.0

IPv6 Configuration

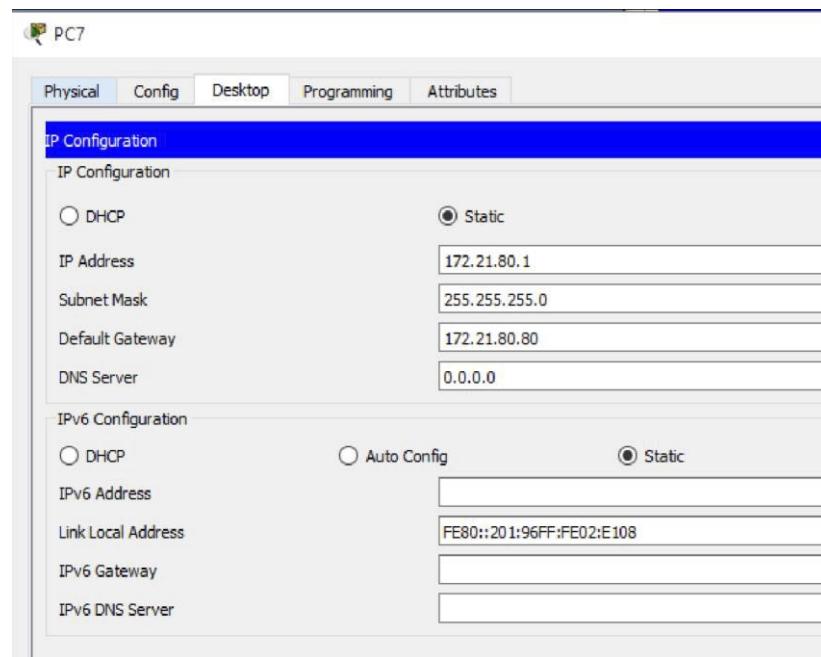
DHCP Auto Config Static

IPv6 Address:

Link Local Address: FE80::201:43FF:FEED:4DBE

IPv6 Gateway:

IPv6 DNS Server:



4. Melakukan cek koneksi dari PC 1 ke router Lion

```
Packet Tracer PC Command Line 1.0
C:\>ping 172.21.1.1

Pinging 172.21.1.1 with 32 bytes of data:
Reply from 172.21.1.1: bytes=32 time<1ms TTL=255

Ping statistics for 172.21.1.1:
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
    Approximate round trip times in milli-seconds:
        Minimum = 0ms, Maximum = 0ms, Average = 0ms

C:\>ping 172.21.2.1

Pinging 172.21.2.1 with 32 bytes of data:
Reply from 172.21.2.1: bytes=32 time<1ms TTL=255
Reply from 172.21.2.1: bytes=32 time=1ms TTL=255
Reply from 172.21.2.1: bytes=32 time<1ms TTL=255
Reply from 172.21.2.1: bytes=32 time<1ms TTL=255

Ping statistics for 172.21.2.1:
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
    Approximate round trip times in milli-seconds:
        Minimum = 0ms, Maximum = 1ms, Average = 0ms

C:\>
```

5. Melakukan routing

Lion

```
Router>enable
Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#ip route 172.21.30.0 255.255.255.0 172.21.1.2
Router(config)#ip route 172.21.40.0 255.255.255.0 172.21.1.2
Router(config)#ip route 172.21.50.0 255.255.255.0 172.21.1.2
Router(config)#ip route 172.21.60.0 255.255.255.0 172.21.1.2
Router(config)#ip route 172.21.70.0 255.255.255.0 172.21.1.2
Router(config)#ip route 172.21.80.0 255.255.255.0 172.21.1.2
Router(config)#
Router(config)!
```

Puma

```
Router>enable
Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#ip route 172.21.10.0 255.255.255.0 172.21.1.1
Router(config)#ip route 172.21.20.0 255.255.255.0 172.21.1.1
Router(config)#ip route 172.21.50.0 255.255.255.0 172.21.3.2
Router(config)#ip route 172.21.60.0 255.255.255.0 172.21.3.2
Router(config)#ip route 172.21.70.0 255.255.255.0 172.21.3.2
Router(config)#ip route 172.21.80.0 255.255.255.0 172.21.3.2
```

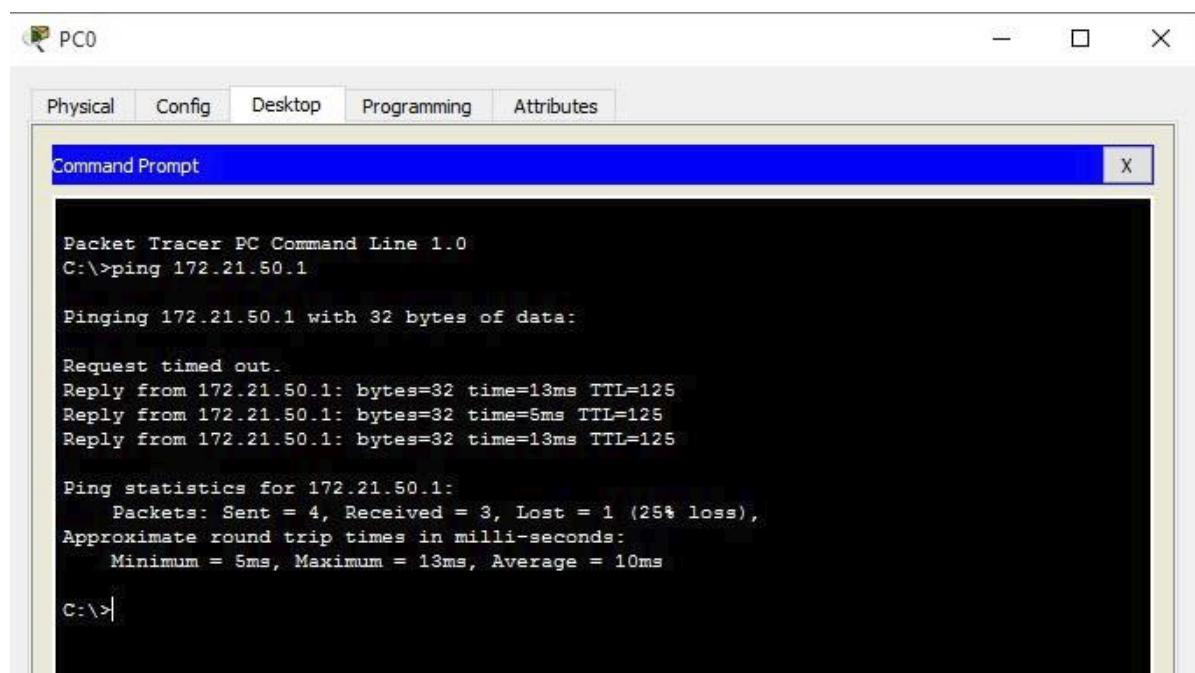
Tiger

```
Router>enable
Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#ip route 172.21.10.0 255.255.255.0 172.21.4.2
Router(config)#ip route 172.21.20.0 255.255.255.0 172.21.4.2
Router(config)#ip route 172.21.30.0 255.255.255.0 172.21.3.1
Router(config)#ip route 172.21.40.0 255.255.255.0 172.21.3.1
Router(config)#ip route 172.21.70.0 255.255.255.0 172.21.4.2
Router(config)#ip route 172.21.80.0 255.255.255.0 172.21.4.2
```

Jaguar

```
Router>enable
Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#ip route 172.21.10.0 255.255.255.0 172.21.2.1
Router(config)#ip route 172.21.20.0 255.255.255.0 172.21.2.1
Router(config)#ip route 172.21.30.0 255.255.255.0 172.21.2.1
Router(config)#ip route 172.21.40.0 255.255.255.0 172.21.2.1
Router(config)#ip route 172.21.50.0 255.255.255.0 172.21.4.1
Router(config)#ip route 172.21.60.0 255.255.255.0 172.21.4.1
Router(config)#
Router(config)!
```

6. Melakukan dari PC 0 ke PC 4



RIP

Melakukan konfigurasi ip dan routing

Lion

Physical Config CLI Attributes

IOS Command Line Interface

```
*LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/0,
changed state to up

*LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet1/0,
changed state to up

*LINEPROTO-5-UPDOWN: Line protocol on Interface Serial2/0,
changed state to up

*LINEPROTO-5-UPDOWN: Line protocol on Interface Serial3/0,
changed state to up

Router>enable
Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#router rip
Router(config-router)#network 172.21.0.0
Router(config-router)#exit
Router(config)#exit
Router#
*SYS-5-CONFIG_I: Configured from console by console

Router#ping |
```

Ctrl+F6 to exit CLI focus Copy Paste

Top

Puma

Physical Config CLI Attributes

IOS Command Line Interface

```
Cisco Internetwork Operating System Software
IOS (tm) PT1000 Software (PT1000-I-M), Version 12.2(28), RELEASE SOFTWARE (fc5)
Technical Support: http://www.cisco.com/techsupport
Copyright (c) 1986-2005 by cisco Systems, Inc.
Compiled Wed 27-Apr-04 19:01 by miwang

PT 1001 (PTSC2005) processor (revision 0x200) with 60416K/5120K bytes of memory
.
Processor board ID PT0128 (0128)
PT2005 processor: part number 0, mask 01
Bridging software.
X.25 software, Version 3.0.0.
4 FastEthernet/IEEE 802.3 interface(s)
2 Low-speed serial(sync/async) network interface(s)
32K bytes of non-volatile configuration memory.
69488K bytes of ATA CompactFlash (Read/Write)

Press RETURN to get started!

*LINK-5-CHANGED: Interface Serial2/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet1/0, changed state to up
*LINK-5-CHANGED: Interface Serial3/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface Serial3/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface Serial2/0, changed state to up

Router>enable
Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#router rip
Router(config-router)#network 172.21.0.0
Router(config-router)#exit
Router(config)#exit
Router#
*SYS-5-CONFIG_I: Configured from console by console

Router#ping |
```

Ctrl+F6 to exit CLI focus Copy Paste

Top

Tiger

Physical Config CLI Attributes

IOS Command Line Interface

```
Compiled Wed 27-Apr-04 19:01 by miwang
PT1001 (PTSC2005) processor (revision 0x200) with 60416K/5120K bytes of memory
Processor board ID PT0123 (0123)
PT2005 processor: part number 0, mask 01
Bridging software.
K.25 software, Version 3.0.0.
4 FastEthernet/IEEE 802.3 interface(s)
2 Low-speed serial(sync/async) network interface(s)
32K bytes of non-volatile configuration memory.
63488K bytes of ATA CompactFlash (Read/Write)

Press RETURN to get started!

%LINK-5-CHANGED: Interface Serial2/0, changed state to up
%LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/0, changed state to up
%LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet1/0, changed state to up
%LINK-5-CHANGED: Interface Serial3/0, changed state to up
%LINEPROTO-5-UPDOWN: Line protocol on Interface Serial2/0, changed state to up
%LINEPROTO-5-UPDOWN: Line protocol on Interface Serial3/0, changed state to up

Router>enable
Router#conf ter
% 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 172.21.0.0
Router(config-router)#

Ctrl+F6 to exit CLI focus
```

Top

Copy Paste

Jaguar

Physical Config CLI Attributes

IOS Command Line Interface

```
63488K bytes of ATA CompactFlash (Read/Write)

Press RETURN to get started!

%LINK-5-CHANGED: Interface Serial3/0, changed state to up
%LINK-5-CHANGED: Interface Serial2/0, changed state to up
%LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/0, changed state to up
%LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet1/0, changed state to up
%LINEPROTO-5-UPDOWN: Line protocol on Interface Serial3/0, changed state to up
%LINEPROTO-5-UPDOWN: Line protocol on Interface Serial2/0, changed state to up

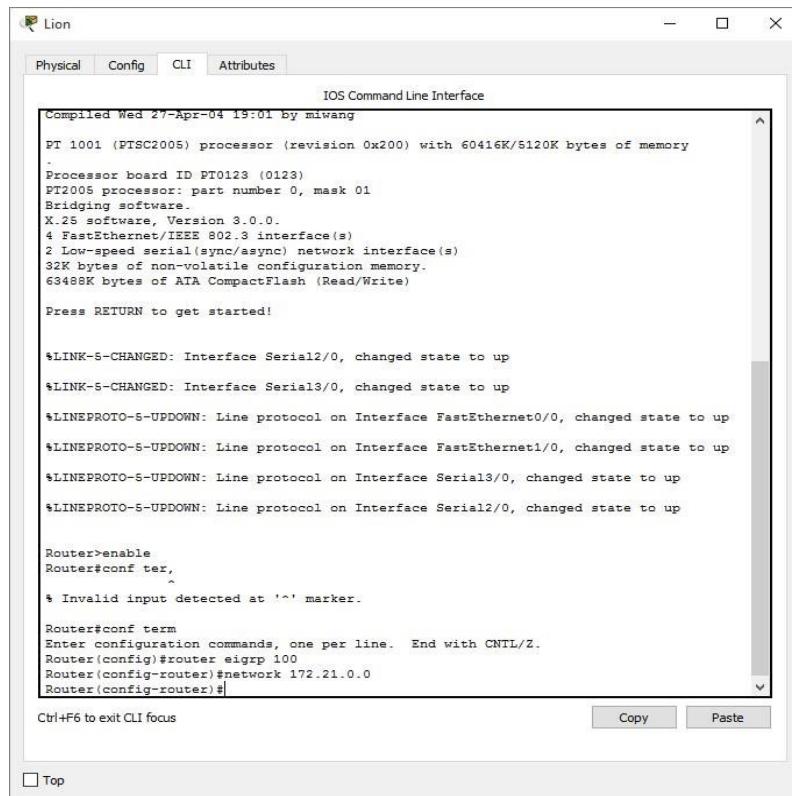
Router>enable
Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#router rip
Router(config-router)#network 172.21.0.0
Router(config-router)#

Ctrl+F6 to exit CLI focus
```

Top

IGRP

Melakukan konfigurasi ip dan routing secara otomatis



Lion

Physical Config CLI Attributes

IOS Command Line Interface

```
Compiled Wed 27-Apr-04 19:01 by miwang
PT 1001 (PTSC2005) processor (revision 0x200) with 60416K/5120K bytes of memory
Processor board ID PT0123 (0123)
PT2005 processor: part number 0, mask 01
Bridging software.
X.25 software, Version 3.0.0.
4 FastEthernet/IEEE 802.3 interface(s)
2 Low-speed serial(sync/async) network interface(s)
32K bytes of non-volatile configuration memory.
63488K bytes of ATA CompactFlash (Read/Write)

Press RETURN to get started!

*LINK-5-CHANGED: Interface Serial2/0, changed state to up
*LINK-5-CHANGED: Interface Serial3/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet1/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface Serial3/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface Serial2/0, changed state to up

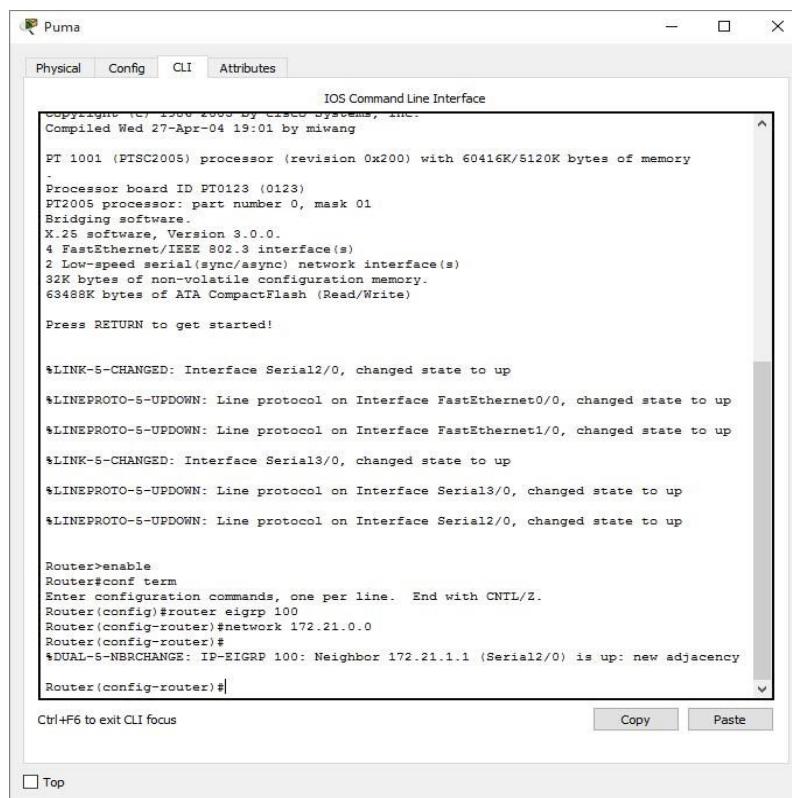
Router>enable
Router#conf ter
Router#conf ter
* Invalid input detected at '^' marker.

Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#router eigrp 100
Router(config-router)#network 172.21.0.0
Router(config-router)#

Ctrl+F6 to exit CLI focus
```

Copy Paste

Top



Puma

Physical Config CLI Attributes

IOS Command Line Interface

```
Copyright (c) 1986-2005 by Cisco Systems, Inc.
Compiled Wed 27-Apr-04 19:01 by miwang

PT 1001 (PTSC2005) processor (revision 0x200) with 60416K/5120K bytes of memory
Processor board ID PT0123 (0123)
PT2005 processor: part number 0, mask 01
Bridging software.
X.25 software, Version 3.0.0.
4 FastEthernet/IEEE 802.3 interface(s)
2 Low-speed serial(sync/async) network interface(s)
32K bytes of non-volatile configuration memory.
63488K bytes of ATA CompactFlash (Read/Write)

Press RETURN to get started!

*LINK-5-CHANGED: Interface Serial2/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet1/0, changed state to up
*LINK-5-CHANGED: Interface Serial3/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface Serial3/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface Serial2/0, changed state to up

Router>enable
Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#router eigrp 100
Router(config-router)#network 172.21.0.0
Router(config-router)#
*DUAL-S-NBRCHANGE: IP-EIGRP 100: Neighbor 172.21.1.1 (Serial2/0) is up: new adjacency
Router(config-router)#

Ctrl+F6 to exit CLI focus
```

Copy Paste

Top

Tiger

Physical Config **CLI** Attributes

IOS Command Line Interface

```
*LINK-5-CHANGED: Interface Serial2/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet1/0, changed state to up
*LINK-5-CHANGED: Interface Serial3/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface Serial2/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface Serial3/0, changed state to up

Router>enable
Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#router eigrp 100
Router(config-router)#network 172.21.0.0
Router(config-router)#
*DUAL-5-NBRCHANGE: IP-EIGRP 100: Neighbor 172.21.3.1 (Serial3/0) is up: new adjacency
Router(config-router)#

Ctrl+F6 to exit CLI focus
```

Top

Copy Paste

Jaguar

Physical Config **CLI** Attributes

IOS Command Line Interface

```
*LINK-5-CHANGED: Interface Serial3/0, changed state to up
*LINK-5-CHANGED: Interface Serial2/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet1/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface Serial2/0, changed state to up
*LINEPROTO-5-UPDOWN: Line protocol on Interface Serial3/0, changed state to up

Router>enable
Router#conf term
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#router eigrp 100
Router(config-router)#network 172.21.0.0
Router(config-router)#
*DUAL-5-NBRCHANGE: IP-EIGRP 100: Neighbor 172.21.4.1 (Serial2/0) is up: new adjacency
*DUAL-5-NBRCHANGE: IP-EIGRP 100: Neighbor 172.21.2.1 (Serial3/0) is up: new adjacency
Router(config-router)#

Ctrl+F6 to exit CLI focus
```

Top

Copy Paste