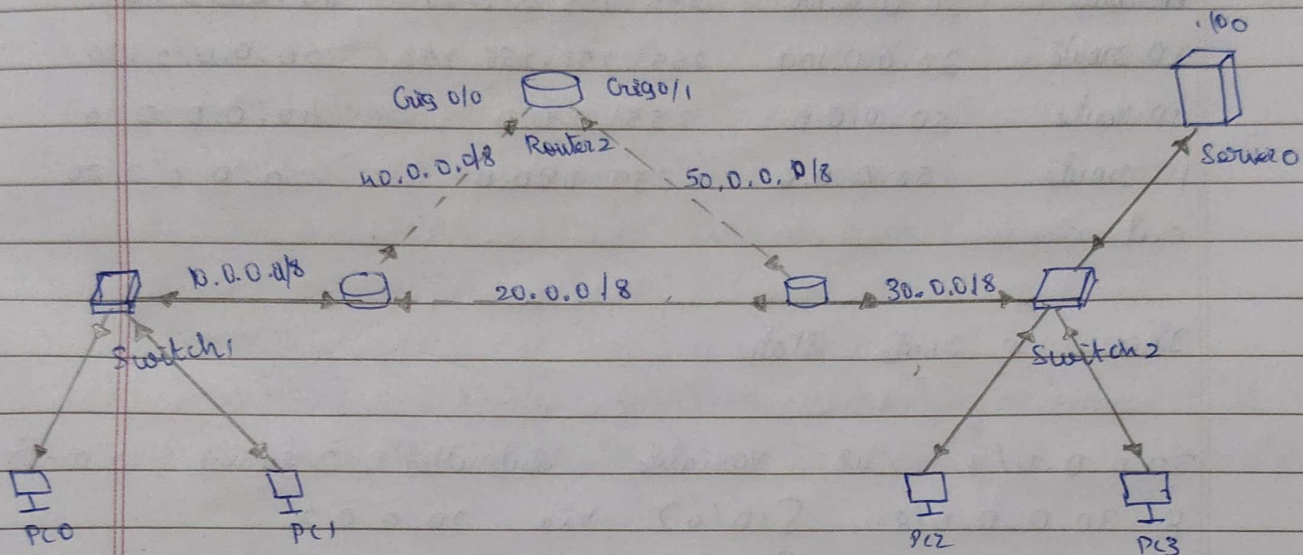


26/10/24

PRACTICAL - 11 A

AIM:

a) Simulate static Routing configuration using CISCO Packet Tracer.



ADDING ROUTES

```
# ip route 30.0.0.0 255.0.0.0 20.0.0.210
```

```
# ip route 30.0.0.0 255.0.0.0 40.0.0.220
```

Router	Available local	Network - on other router
Router0	10.0.0.0/8, 20.0.0.0/8, 40.0.0.0/8	30.0.0.0/8, 50.0.0.0/8
Router1	20.0.0.0/8, 30.0.0.0/8, 50.0.0.0/8	10.0.0.0/8, 40.0.0.0/8
Router2	20.0.0.0/8, 50.0.0.0/8	10.0.0.0/8, 20.0.0.0/8, 30.0.0.0/8

Router 0

enable

configure terminal

```

ip route 30.0.0.0 255.0.0.0 20.0.0.2 10
ip route 30.0.0.0 255.0.0.0 40.0.0.2 20
ip route 30.0.0.100 255.255.255.255 40.0.0.2 10
ip route 30.0.0.100 255.255.255.255 20.0.0.2 20
ip route 50.0.0.0 255.0.0.0 40.0.0.2 10
ip route 50.0.0.0 255.0.0.0 20.0.0.2 20
exit

```

Show ip route static

```

30.0.0.0/8 is Variable Subnetted, 2 subnet, 2 masks
S 30.0.0.0/8 [10/0] Via 20.0.0.2
S 30.0.0.100/32 [10/0] Via 40.0.0.2
S 50.0.0.0/8 [10/0] Via 40.0.0.2

```

ROUTER 1

enable

configure terminal

```

ip route 10.0.0.0 255.0.0.0 20.0.0.1 10
ip route 10.0.0.0 255.0.0.0 50.0.0.1 20
ip route 40.0.0.0 255.0.0.0 20.0.0.1 10
ip route 40.0.0.0 255.0.0.0 50.0.0.1 20
ip route
exit

```

Show ip route static

```

S 10.0.0.0/8 [10/0] Via 20.0.0.1
S 40.0.0.0/8 [10/0] Via 20.0.0.1

```


ROUTER 2

enable

configure terminal

IP route 10.0.0.0 255.0.0.0 40.0.0.1

IP route 30.0.0.0 255.0.0.0 50.0.0.2

exit

show IP route static

S 10.0.0.0/8 [1/0] via 40.0.0.1

S 30.0.0.0/8 [1/0] via 50.0.0.2

RESULT:

Thus static Routing configuration is executed & the output is verified successfully

W (9/14)

PRACTICAL - 11 B

26/10/24 AIM:

b) Simulate RIP using Cisco Packet Tracer

Device	Interface	IP confi	(w)
Pc0	Fast Ethernet	10.0.2/8	R0 Fa0/1
Router0	Fa0/1	10.0.0.1/8	Pc0 FE
Router0	SO10/1	192.168.1.254/30	R2 SO10/1
Router0	SO10/0	192.168.1.249/30	R1 SO10/0
Router1	SO10/0/1	192.168.1.250/30	R0 SO10/0
Router1	SO10/1	192.168.1.246/30	R2 SO10/0
Router2	SO10/0	192.168.1.245/30	R1 SO10/1
Router2	SO10/1	192.168.1.253/30	R0 SO10/1
Router2	Fa0/1	20.0.0.1/30	Pc1 Fast Ether
PC1	Fast Ethernet	20.0.0.2/30	R2 Fa0/1

ROUTER 0

Configure Terminal

interface Serial 0/0/0

IP address 192.168.1.299 255.255.255.254

clockrate 64000

bandwidth

no shutdown

exit

interface 192.168.1.254

clock rate 64000

bandwidth 64

no shutdown

exit.

255.255.255.254

ROUTER 1

enable

configure terminal

interface 0/0/0

ip address 192.168.125.0 255.255.255.256

no shutdown

exit

interface serial 0/0/1

ip address 192.168.1.24/3. 255.255.255.252

clock rate 64000

bandwidth

no shutdown

exit

ROUTER 2

enable

terminal

interface fast ethernet 0/0

ip address 20.0.0.1 255.0.0.0

no shutdown

exit

interface serial 0/0/0

ip address 192.168.0.1.6.45 255.255.255.252

no shutdown

exit

interface serial 0/0/1

ip address 192.168.1.255, 255.255.255.252

~~no shutdown~~

exit

ROUTER 0

```
router rip
network 10.0.0.0
network 192.168.1.252
network 192.168.1.248
```

ROUTER 1

```
Router rip
network 192.168.1.244
network 192.168.1.248
```

ROUTER 2

```
router rip
network 20.0.0.0
network 192.168.1.252
network 192.168.1.244
```

RESULT:

Thus R/P using CISCO PACKET TRACE
is executed & the output is Verified

(9/11)