

21.9.25
Ex: 10A

Internetworking with Router in CISCO PACKET TRACER SIMULATOR

Aim:- To design and configure a simple internetwork using a router.

In this network, a Router and 2 PC's are used. Computers are connected with Router using a copper or through cable. After forming the network, check its connectivity using a simple PDU Transfer from PC0 to PC1.

Procedure :-

Step -1 Configuring Router .1

1. Select the Router and open CLI
2. Press enter to start configuring Router.
3. Type enable to activate the privileged mode

Step -2 Configuring PC's

1. Assign IP address to every PC in the network
2. Select the PC, Config and assign ip address default gateway, Submit mode
3. ~~Assign the default gateway of PC0 as 192.168.10.1~~
4. Assign the default gateway of PC1 as 192.168.20.1

Step 3 - Connecting PC with router :-

- 1) Connect fast ethernet (1) port of PC O with fast ethernet 0/0 port of Router 1 using a copper straight through cable.
- 2) Connect fast ethernet (1) port of PC 1 with fast ethernet 0/1 port of Router 1 using a copper straight through cable.

Router Configuration Table :-

| Device name | IP address fast ethernet 0/0 | Subnet mask | IP address Fast ethernet 0/1 | Subnet mask |
|-------------|---------------------------------|---------------|---------------------------------|---------------|
| Router 1 | 192.168.10.1 | 255.255.255.0 | 192.168.10.1 | 255.255.255.0 |

PC Configuration Table :-

| Device Name | IP Address | Subnet Mask | Gateway |
|-------------|--------------|---------------|--------------|
| PC O | 192.168.10.2 | 255.255.255.0 | 192.168.10.1 |
| PC 1 | 192.168.20.1 | 255.255.255.0 | 192.168.20.1 |

Designed Network Topology :-

Simulation of Designed network showing  PC O from PC O to PC 1

RESULT _____

Frame has

with
a copy

with forward
you straight.

IP address
Subnet
Mask
0.0.0.1
192.168.20.1 255.255.255.0

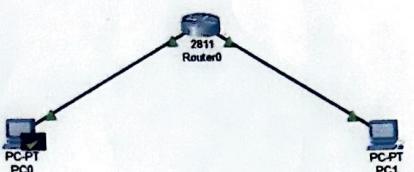
GATEWAY

- 192.168.10.1

- 192.168.20.1

PC0 from

10(a)



| # | Last Status | Source | Destination | Type | Color | Time(sec) | Periodic | Num | Edit |
|---|-------------|--------|-------------|------|-------|-----------|----------|-----|--------|
| 1 | Successful | PC0 | PC1 | ICMP | ■ | 0.000 | N | 0 | (edit) |
| 2 | Successful | PC0 | PC1 | ICMP | ■ | 0.000 | N | 1 | (edit) |

RESULT:

From the experiment on interworking with switch
has been recently successfully

✓ 14/6/2