



BUBT

Committed to Academic Excellence

**BANGLADESH UNIVERSITY OF
BUSINESS AND TECHNOLOGY**

Lab Report

Course Code: CSE 320

Course Title: Computer Networks Lab

Submitted to:

Name: Shamim Ahmed

Assistant Professor

Department of CSE

at Bangladesh University of Business and
Technology.

Submitted by:

Name: Syeda Nowshin Ibnat

ID: 17183103020

Intake: 39

Section: 1

Program: B.Sc. in CSE

Semester: Spring 2021

Date of Submission: 15.07.2021

Report number: 05

Report name: Basic RIP Configuration.

Objectives: The purpose of this lab was to configure routers with Routing Information Protocol (RIP).

Tools and Technology:

- Cisco Packet Tracer (version 8.0.0)
- End devices
- Switches
- Routers
- Copper Straight-Through Connection

Theory:

Routing Information Protocol (RIP) is a dynamic routing protocol which uses hop count as a routing metric to find the best path between the source and the destination network. It is a distance vector routing protocol which has AD value 120 and works on the application layer of OSI model. RIP uses port number 520.

Hop Count: Hop count is the number of routers occurring in between the source and destination network. The path with the lowest hop count is considered as the best route to reach a network and therefore placed in the routing table.

Features of RIP:

1. Updates of the network are exchanged periodically.
2. Updates (routing information) are always broadcast.
3. Full routing tables are sent in updates.

RIP versions: There are three versions of routing information protocol – RIP Version1, RIP Version2, and RIPv2.

Addressing Table:

Device	Interface	IP Address	Subnet Mask	Default Gateway
R1	FastEthernet 0/0	192.168.1.1	255.255.255.0	N/A
	Serial 2/0	10.10.0.2	255.0.0.0	N/A
R2	FastEthernet 0/0	192.168.2.1	255.255.255.0	N/A
	Serial 2/0	10.10.0.3	255.0.0.0	N/A
PC1	NIC	192.168.1.2	255.255.255.0	192.168.1.1
PC2	NIC	192.168.1.3	255.255.255.0	192.168.1.1
PC3	NIC	192.168.2.2	255.255.255.0	192.168.2.1
PC4	NIC	192.168.2.3	255.255.255.0	192.168.2.1

Figures:

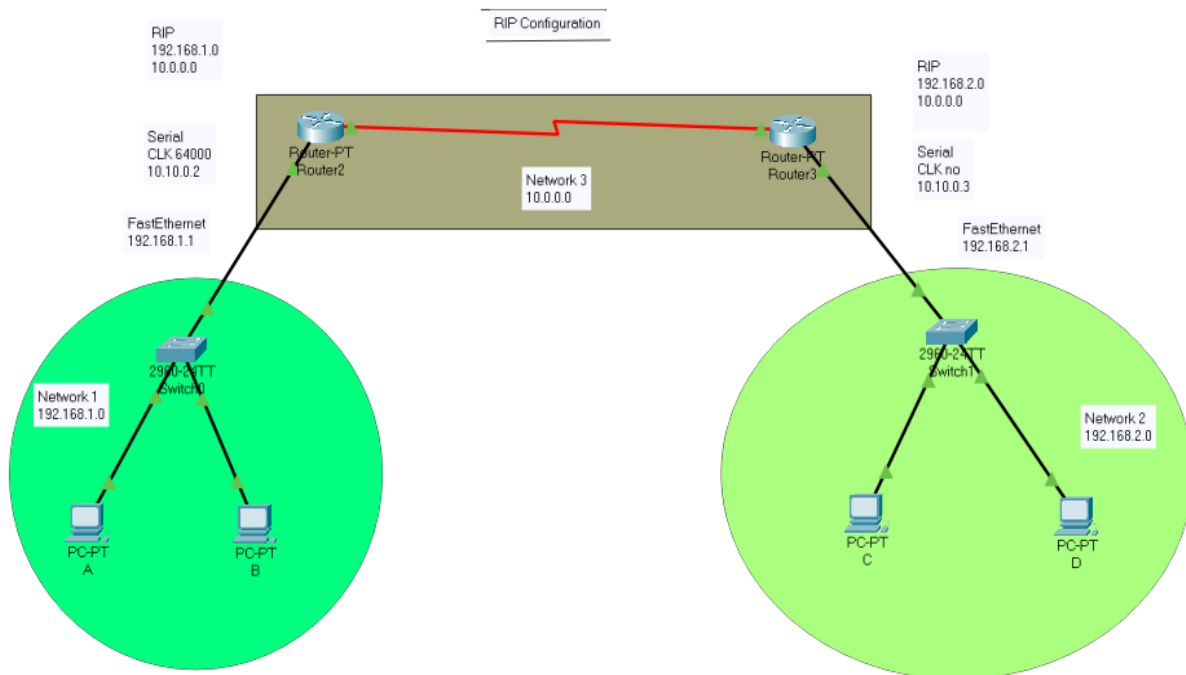








Figure 1: RIP Configuration

Output:

We can successfully transfer packet among one network to another network as well as routers.

Fire	Last Status	Source	Destination	Type	Color	Time(sec)	Periodic	Num	Edit	Delete
	Successful	1	Router 1	ICMP		0.000	N	0	(edit)	(delete)
	Successful	1	3	ICMP		0.000	N	1	(edit)	(delete)
	Successful	2	Router 2	ICMP		0.000	N	2	(edit)	(delete)

Conclusions:

In this lab we have gained the knowledge about basic RIP Configuration. At the time of doing it I did not face problem and I did found the output successfully. In Activity 1, we configured two routers and then tested the configuration through pinging across the network to each & every device and viewed all the routing tables of R1, R2. Activity 02 was a hands experience in which, we configured basic settings for all the three routes, and PC's IP Address. Finally, we configured RIP routing on all the two routers and then verified the routes. Overall, the lab session was fruitful and we all get to learn about RIP configuration.