

Practical – 4

Aim of the Practical: Configuration of an Email server in Cisco packet tracer.

Question-1: What are the key steps to configure PCs on the same network?

1. Setup a basic network topology with necessary servers, pcs, switches, and routers
2. Assign IPs to each end system and configure router and switches with default gateways

For example: 192.168.1.1/24 and so on

3. Setup a default gateway for switches in order to talk between servers
4. Configure SMTP server using server (end-system) available in cisco packet tracer
5. After setting up this IPs and SMTP service check if topology is working perfectly or not.

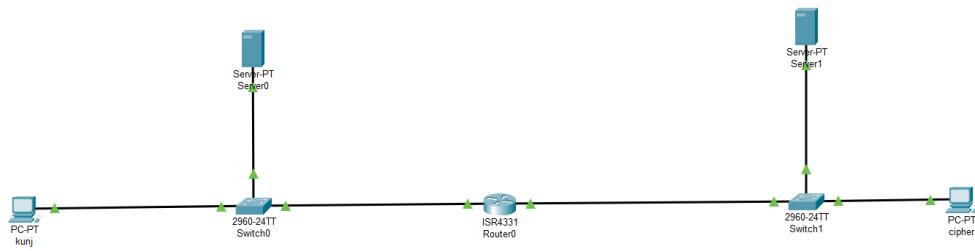
Question-2: How would you configure the PCs to send and receive emails using the server?

1. User servers in network and then setup the servers to provide SMTP (Simple Mail Transfer Protocol) service
2. Setup Email accounts provided by email server.
 - a. Use server's SMTP for sending mail and IMP/POP3 for receiving
 - b. Setup users and password in Server's configuration for authentication
3. In PC setup email configurations with incoming and outgoing email servers
4. Test the setup by sending an email to another user in same network

Question-3: Steps to configure a server to host email in a medium-sized network

Step-1

- ❖ Setup a basic topology with necessary end-systems, switches and routers
- ❖ Connect the network in proper manner

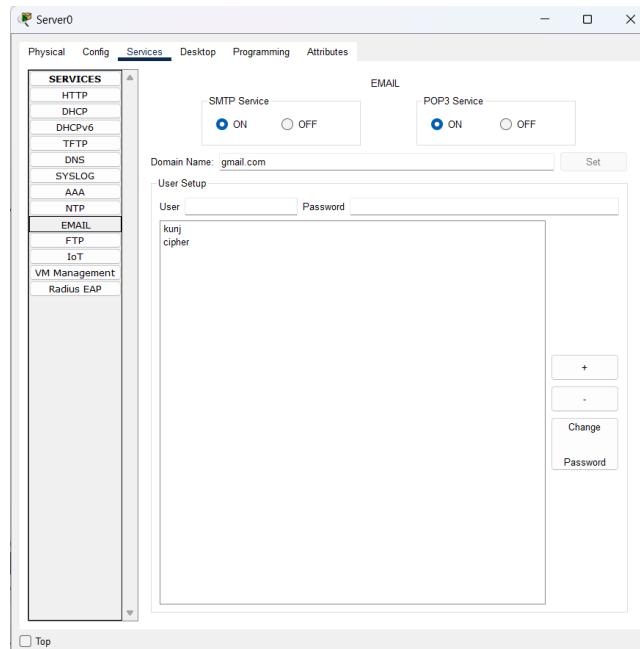


- ❖ Setup initial configuration in router with default gateways in order to establish effective communication

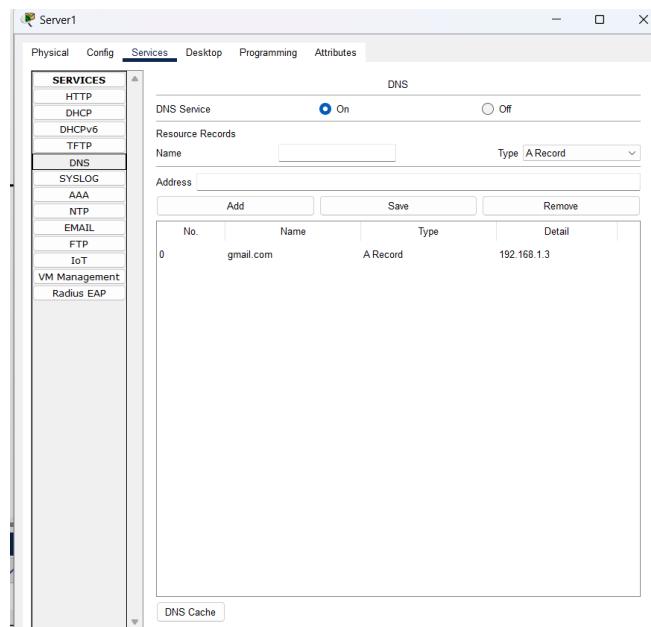
<div style="border: 1px solid #ccc; padding: 5px;"> GLOBAL Settings Algorithm Settings ROUTING Static RIP SWITCHING VLAN Database INTERFACE GigabitEthernet0/0/0 GigabitEthernet0/0/1 GigabitEthernet0/0/2 </div>	<div style="border: 1px solid #ccc; padding: 5px;"> GigabitEthernet0/0/0 Port Status: On Bandwidth: 1000 Mbps Duplex: Full Duplex MAC Address: 0001.C9CB.2801 IP Configuration IPv4 Address: 192.168.1.1 Subnet Mask: 255.255.255.0 Tx Ring Limit: 10 </div>
<div style="border: 1px solid #ccc; padding: 5px;"> GLOBAL Settings Algorithm Settings ROUTING Static RIP SWITCHING VLAN Database INTERFACE GigabitEthernet0/0/0 GigabitEthernet0/0/1 GigabitEthernet0/0/2 </div>	<div style="border: 1px solid #ccc; padding: 5px;"> GigabitEthernet0/0/1 Port Status: On Bandwidth: 1000 Mbps Duplex: Full Duplex MAC Address: 0001.C9CB.2802 IP Configuration IPv4 Address: 192.168.2.1 Subnet Mask: 255.255.255.0 Tx Ring Limit: 10 </div>

- ❖ Assign IPs to servers and PCs
 - PC (kunj) – 192.168.1.2
 - Server0 – 192.168.1.3
 - PC (cipher) – 192.168.2.2
 - Server0 – 192.168.2.3

❖ Setup Email server at server0



❖ Setup gmail.com as DNS service in server1



❖ Set this server's IP 192.168.2.3 as default DNS for each end-system (PTO)

- ❖ Setup email service in PC0 and PC1 and then test by sending email from one PC to another PC

