### Department of Computer Engineering

TE: SEM V Subject: CN

**Experiment: 04** 

**AIM:** Build a simple network topology and configure it for static routing protocol using packet tracer.

**THEORY:** Cisco Packet Tracer is a cross-platform visual simulation tool designed by Cisco Systems that allows users to create network topologies and imitate modern computer networks. The software allows users to simulate the configuration of Cisco routers and switches using a simulated command line interface. Packet Tracer makes use of a drag and drop user interface, allowing users to add and remove simulated network devices as they see fit. The software is mainly focused towards Certified Cisco Network Associate Academy students as an educational tool for helping them learn fundamental CCNA concepts.

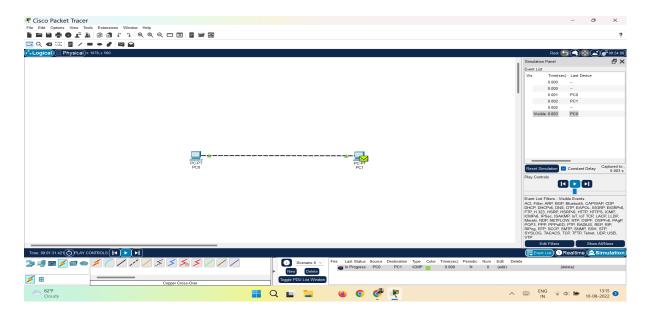
### To install cisco packet tracer-

- 1.Go to www.netacad.com
- 2. Sign up and then login
- 3.Go to resources
- 4.Go to packet tracer (https://www.netacad.com/portal/resources/packet-tracer)
- 5.Download packet tracer with respect to OS and processor
- 6. Agree to all terms and conditions and proceed.
- 7. Packet tracer environment is ready to use.

### 1.To create peer to peer network

- 1. Select two pcs
- 2. Select cable to connect
- 3. Set up ip address for the pcs
- 4. Now check for connection by performing ping operation.

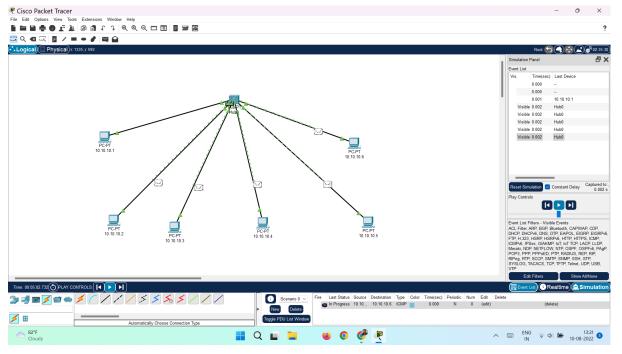
#### Connect the devices as shown below:



# 2.To set up network using Hub

- 1.Select hub
- 2. Select 6 pcs(hub has 6 max ports)
- 3. Connect with cable.
- 4. Set up ip address for the pcs
- 5. Now check for connection by performing ping operation
- 6.Use simulation to check packet transmission.

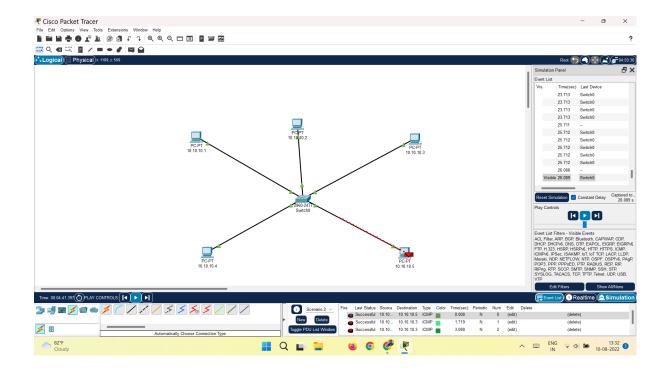
### Connect the devices as shown below:



## 3.To set up network in LAN using switch

- 1.Select switch
- 2. Select 5 pcs(Switch has 24 max ports and 2 gigabit ports)
- 3. Connect with cable.
- 4. Set up ip address for the pcs
- 5. Now check for connection by performing ping operation
- 6.Use simulation to check packet transmission.

### Connect the devices as shown below:



**CONCLUSION:** Hence we have successfully created peer to peer network and used hub and switch devices to create network using CISCO PACKET TRACER