Name: _____ Section _____ Activity No. 20

OSI Layers 1 and 2

Objective : In this lab you will learn about how to determine the IP Address and Physical Address of your computer. We will also learn what are the IP Address and Physical address that are normally interacting with your own PC.

Activity 1 : Checking IP and Physical Address

1. Using the ipconfig command check your IP Address:
   IP Address : _____
2. Using ipconfig /all command check your Physical Address:
   Physical Address or MAC Address : _____

Activity 2 : Checking ARP entries

Before we proceed we will learn a command in DOS named ARP:

ARP stands for Address Resolution Protocol. Now your computer stores the IP Address along with the physical address that it communicates with recently. And arp command in DOS allows you to see those IP and Physical Address matches.

3. Type **arp** in your DOS prompt and try to learn as much as possible the description about this command and the parameters that could be used by this command.
4. Type **arp –a** and input on the table below:

Internet Address	Physical Address	Type

5. You can add entry to your ARP table using the arp –s IP Address Physical Address. So, add an entry to your ARP table using the following format
   arp –s 192.168.10.<your computer number here> 00-11-FF-22-CC-3<your computer number here>
   So, if your computer number is let's say 5 then you will issue the command below:
   arp –s 192.168.10.5 00-11-FF-22-CC-35
6. Type **arp –a** command to see if your added to see the IP & Physical Address that you added
7. Now delete the entry using **arp –d 192.168.10.<your computer number here>**
8. Check again using **arp –a** if entry is no longer there