

A) INSTRUCTIONS

Firstly in the command prompt we will go to the destination location in which files controla.py and topoa.py are present using the **cd command**.

We need files controla.py and topoa.py in the mininet VM. So, we will be using the scp command to transfer the file to the VM.

For topoa.py: **\$ scp topoa.py mininet@192.168.56.101:~/mininet/custom**

For controla.py: **\$ scp controla.py mininet@192.168.56.101:~/pox/pox/forwarding**

Now on linux terminal firstly connect mininet using **ssh mininet@192.168.56.101**

To run Controller:

1. Change directory to: **\$ cd pox**
2. To start the pox controller: **\$./pox.py log.level --DEBUG forwarding.controla**

To run Topology:

1. Open a new terminal window.
2. Change directory to: **\$ cd mininet/custom**
3. To run the topology: **\$ sudo python topoa.py**

Now on the same window:

- **h1 ping h2**
- **h3 ping server**
- **iperf h1 h2**
- **iperf h3 server**
- **pingall**

On the new terminal window to dump the output of the flow rules:

- **\$ sudo ovs-ofctl dump-flows s1**
Run this command for all the switches (s1,s2,s3,s4,s5)