Sai M. Valluru

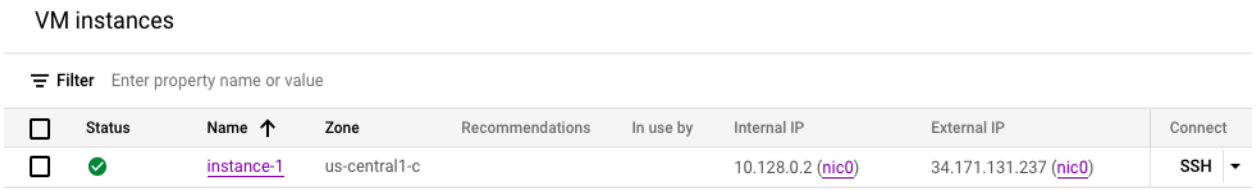
Professor Bo Sheng

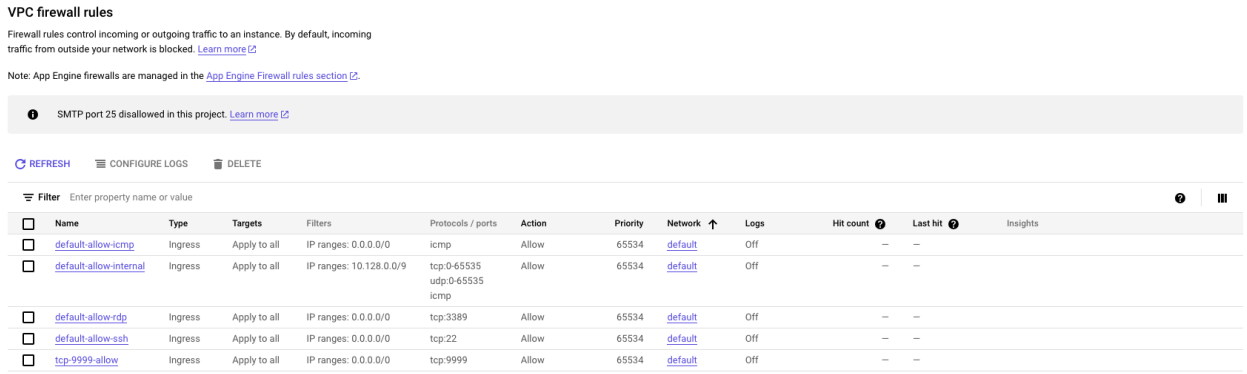
CS446

10/20/23

Homework 1 GCP Testing

Step 1: As mentioned in the instructions, I created a VM on GCP with the configured firewall rules to allow incoming TCP traffic to the port number (9999) the program will use.





Step 2: I then transferred the necessary files of my proxy server program to my VM and compiled HW1Server.java in the VM, which will act as the server. Similarly, I also compiled my HW1Client.java on my local machine, which will act as the client.

```
srisai_valluru@instance-1:~/ProxyServerProject/src$ pwd
/home/srisai_valluru/ProxyServerProject/src
srisai_valluru@instance-1:~/ProxyServerProject/src$ javac server/HW1Server.java
srisai_valluru@instance-1:~/ProxyServerProject/src$
```

```
~/Desktop/ProxyServerProject/src (1.006s)
javac client/HW1Client.java
```

Step 3: I ran HW1Server.java on my VM and HW1Client on my local machine with the following inputs respectively. Once the client connection was established, I typed in the required command to fetch the requested file and download it. Once the download was complete, I used the command “ls” to check if my downloaded file, “Summary.html” was present in my directory.

- IP address of my VM: 34.171.131.237

```
srisai_valluru@instance-1:~/ProxyServerProject/src$ java server/HW1Server 9999
Client connection established: /73.16.36.73
```

```
~/Desktop/ProxyServerProject/src (22.405s)
java client/HW1Client 34.171.131.237 9999
GET http://info.cern.ch/hypertext/WWW/Summary.html

~/Desktop/ProxyServerProject/src (0.034s)
ls
Summary.html    client          server

~/Desktop/ProxyServerProject/src
```

Step 4: Lastly, I used “cat” to verify if the downloaded file in my directory was accurate.