

Files

distMeasurement.py → contains code for both the 325(contained in function probe) and 425
Extracredit(contained in function geographicalDistance).

- I didn't want to split these up into two different files because I wanted everything to print out at once.

targets.txt → List of 10 hosts:

case.edu
google.com
facebook.com
twitter.com
java.com
target.com
youtube.com
sony.com
riotgames.com
hulu.com

Instructions to Run Program

To run my program: `sudo python distMeasurement.py`

Expected Output From Program

TraceRoute for: HOSTNAME

IP Adress: _____

Bytes sent: _____

Rtt: _____

Total Hops: _____

ICMP Datagram Length: _____

Geographical Distance: _____

Bold Questions

Question: How will you match ICMP responses with the probes you are sending out.

Answer: I am able to compare the address of the destination and the address of the source, retrieved from the ICMP's IP header field, and if the source and previous destination address match then the ICMP response with the probes I sent out are valid.

Question: List all possible reasons you can think of for not getting the answer when probing an arbitrary host.

Answer:

- The probe packet is dropped.
- The ICMP packet is dropped.
- Host doesn't exist or is offline.
- Port is overloaded or not running.
- Firewall permissions.
- Weak internet connection.
- Request Timeout.

