**Python Challenge - Create App for the RIPE ATLAS API**

RIPE Atlas is a global active measurements platform <https://atlas.ripe.net/>

RIPE Atlas RIPE Atlas measures Internet connectivity and reachability <https://atlas.ripe.net/about/measurements/>

RIPE Atlas measurements are taken between probes and or anchors <https://atlas.ripe.net/landing/probes-and-anchors/>

On the measurements page, you can see a list of all scheduled, ongoing and completed measurements, which can be filtered by measurement type, target, protocol type and time period. You do not need to take your own measurements use measurements taken by other organisations, measurements are referenced by their measurement ID

**Primary Skills:**

**Grades D3- D1**

* Accept the input of a measurement ID for a RIPE ATLAS Measurement
* Display the value key pairs on the console

**Grade C3-C1**

* Use API documentation to determine what the values mean.

**Challenge Skills: Grades B3 -B1**

* Use the API documentation to do the following
* Display the address family ipv4 or ipv6
* Display Source and Destination IP addresses
* Display the number of packet sent
* Display the average round trip time of the measurement

**Example Output :**

Source Address 79.98.33.222

Destination Address 134.70.63.252

Address Family IPv4

Packets sent 3

Median Round Trip Time 3.183

Average Round Trip Time 3.732

**Master Skills: Grade B4- A1**

* Detect the measurement type as either Ping , traceroute, OR DNS, SSL or HTTP
* If the measurement type is Ping display : address family, Source and Destination IP addresses, number of packet sent, average round trip time of the measurement
* If the measurement type is Traceroute display : Address Family, Source address, Destination address, Total Hops, and Median Round trip time.

**Example Output for Traceroute:**

Address Family IPv4

Source address 129.250.50.30

Destination Address 185.203.19.1

Total\_hops 13

Median Round Trip Time 137.379

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