DEVELOP A PYTHON SCRIPT

Team ID	PNT2022TMID21245
Project Name	INDUSTRY-SPECIFIC INTELLIGENT FIRE MANAGEMENT SYSTEM

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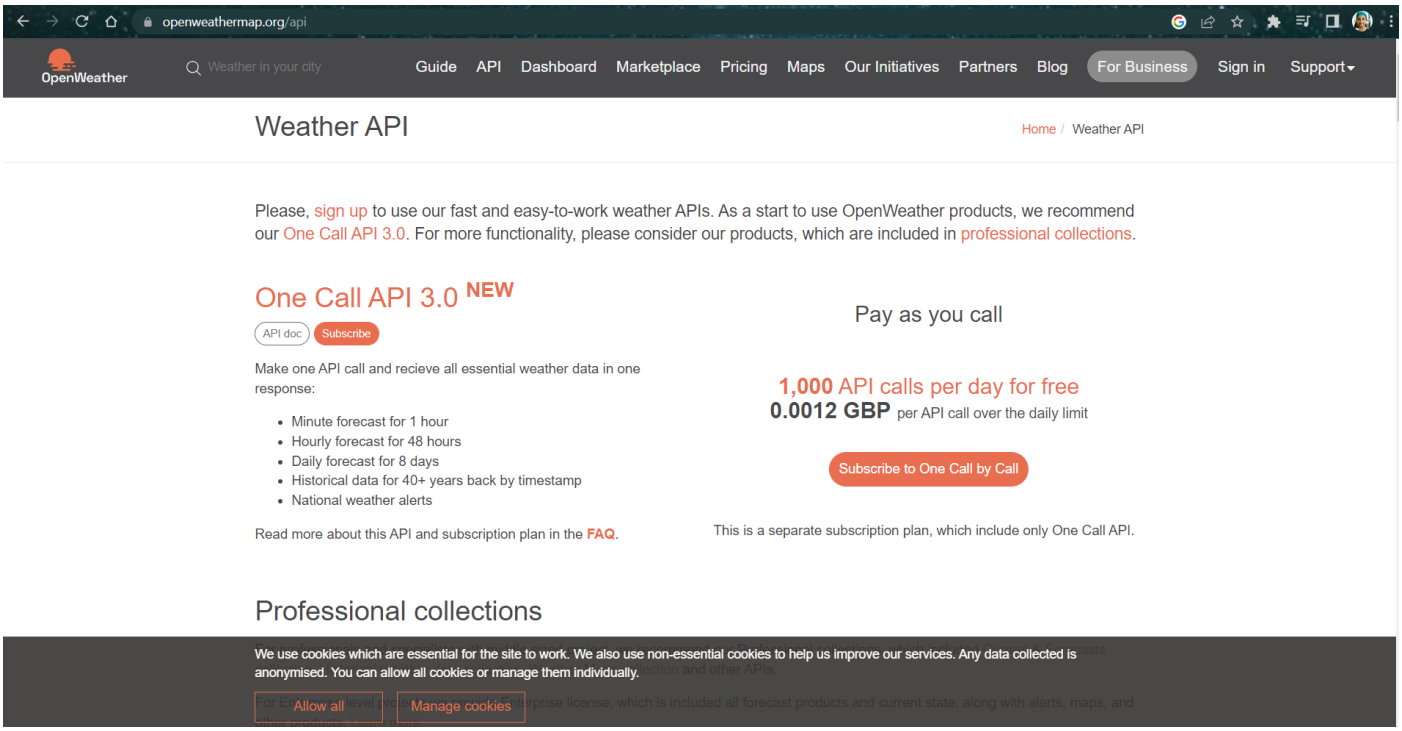
DEVELOPING PYTHON SCRIPT TO PUBLISH AND SUBSCRIBE UNDER A TOPIC

Step – 1:

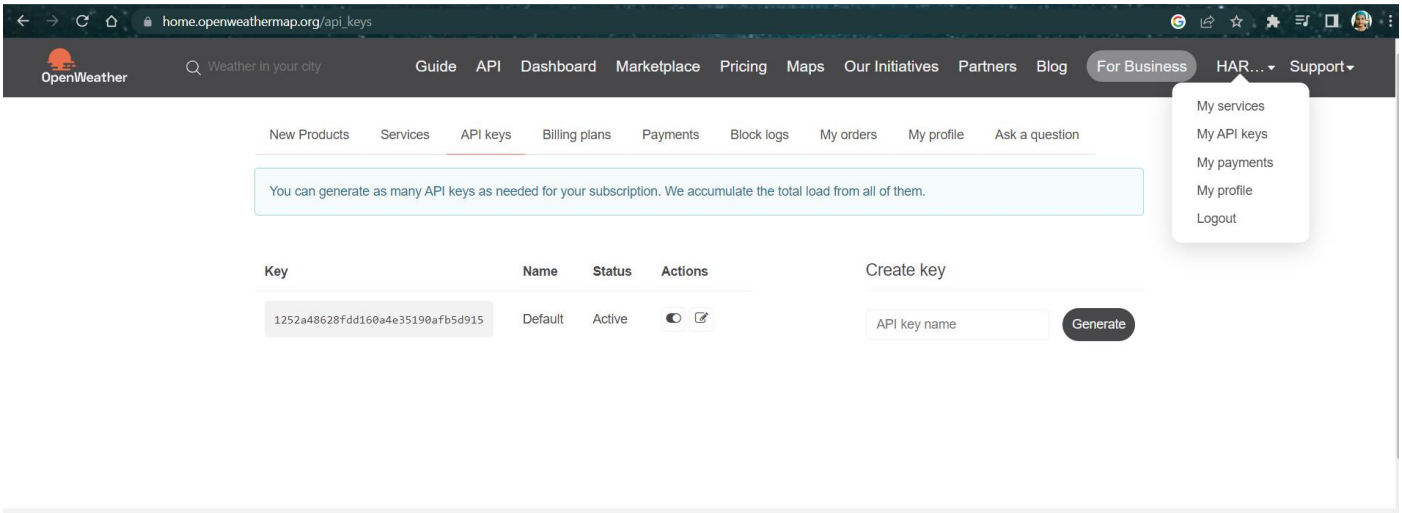
Pip install requests

Step – 2:

Creating account in Weather API



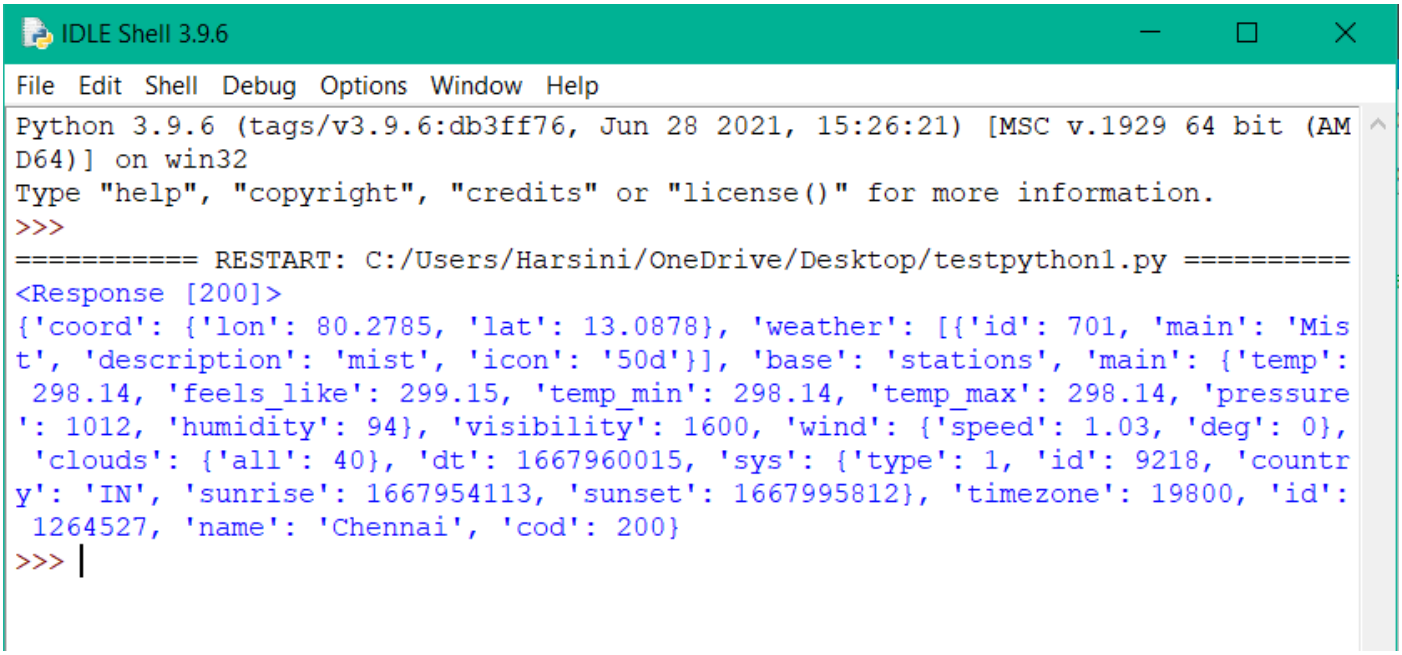
Step – 3:
Getting the API key for our account



Step – 4:
PYTHON SCRIPT – TO GET WEATHER INFORMATION ABOUT CHENNAI CITY

```
import requests

a= "https://api.openweathermap.org/data/2.5/weather?q=Chennai,
IN&appid=1252a48628fdd160a4e35190afb5d915"

r = requests.get(url = a)

data = r.json()

print(r)
print(data)
```

OUTPUT REGARDING CHENNAI CITY'S WEATHER INFORMATION:



PYTHON SCRIPT TO SEND DATA UNDER A TOPIC:

Step - 1

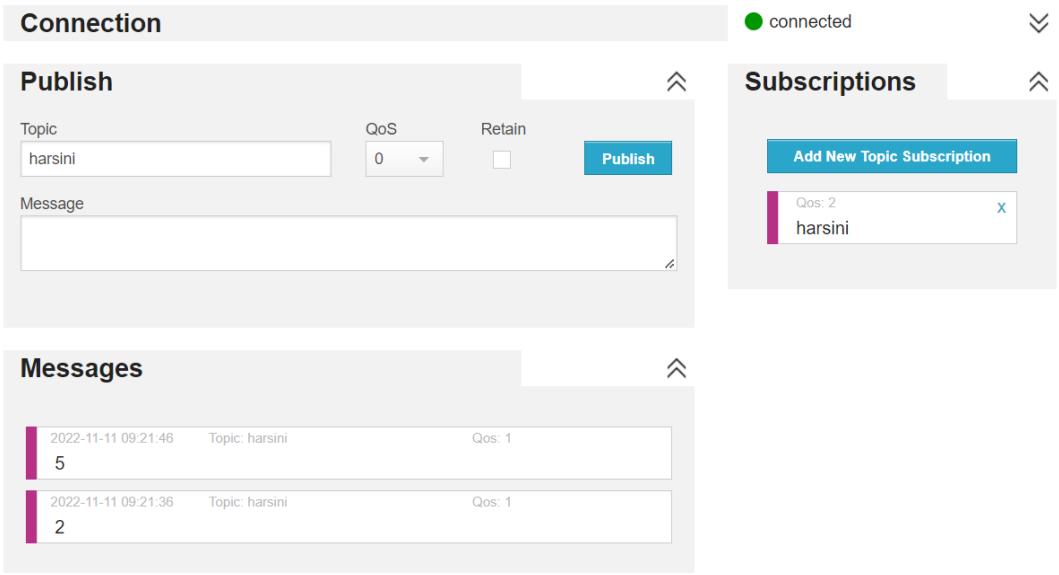
pip install paho_mqtt

step- 2:

PYTHON SCRIPT:

```
import time
import random

def on_publish(client,usrdata,mid):
    print("published")

client = paho.Client()
client.on_publish = on_publish
client.connect('broker.mqttdashboard.com',1883)
client.loop_start()

while True:
    temp = random.randint(1,10)
    (rc,mid) = client.publish("harsini",str(temp),qos = 1)
    print(temp)
    time.sleep(10)
```

Step-3:


Connection
connected
Publish
Topic
harsini
QoS
0
Retain
Publish
Message
Subscriptions
Add New Topic Subscription
Qos: 2
harsini
x
Messages
2022-11-11 09:21:46
Topic: harsini
Qos: 1
5
2022-11-11 09:21:36
Topic: harsini
Qos: 1
2