

DEVELOP A PYTHON SCRIPT

Date	16 November 2022
Team ID	PNT2022TMID40718
Project Name	Project: IOT- Signs with Smart Connectivity for Better Road Safety
Maximum Marks	4 Marks

Enter your API key here

```
api_key = "Your_API_Key"
```

base_url variable to store url

```
base_url = "http://api.openweathermap.org/data/2.5/weather?"
```

Give city name

```
city_name = input("Enter city name : ")
```

complete_url variable to store

complete url address

```
complete_url = base_url + "appid=" + api_key + "&q=" + city_name
```

get method of requests module

return response object

```
response = requests.get(complete_url)
```

json method of response object

convert json format data into

python format data

```
x = response.json()
```

Now x contains list of nested dictionaries

Check the value of "cod" key is equal to

"404", means city is found otherwise,

```
# city is not found
if x["cod"] != "404":

    # store the value of "main"
    # key in variable y
    y = x["main"]

    # store the value corresponding
    # to the "temp" key of y
    current_temperature = y["temp"]

    # store the value corresponding
    # to the "pressure" key of y
    current_pressure = y["pressure"]

    # store the value corresponding
    # to the "humidity" key of y
    current_humidity = y["humidity"]

    # store the value of "weather"
    # key in variable z
    z = x["weather"]

    # store the value corresponding
    # to the "description" key at
    # the 0th index of z
    weather_description = z[0]["description"]

    # print following values
    print(" Temperature (in kelvin unit) = " +
          str(current_temperature) +
          "\n atmospheric pressure (in hPa unit) = " +
```

```
        str(current_pressure) +  
        "\n humidity (in percentage) = " +  
        str(current_humidity) +  
        "\n description = " +  
        str(weather_description))
```

else:

```
    print(" City Not Found ")
```

OUTPUT:

Enter city name : chennai

Temperature (in kelvin unit) = 312.15

atmospheric pressure (in hPa unit) = 996

humidity (in percentage) = 40

description = haze