DEVELOP A PYTHON SCRIPT TO PUBLISH AND SUBSCRIBE TO IBM IoT PLATFORM
PYTHON CODE

Team ID	**PNT2022TMID41307**
Project Name	**Gas Leakage Monitoring and Alerting System for Industries**

Python Code:

```
#IBM Watson IOT Platform
#pip install wiotp-sdk
import wiotp.sdk.device
import time
import random
myConfig = {
   "identity":
   {
      "orgId": "9yby55",
      "typeId": "Gas",
      "deviceId":"18"
   },
   "auth":
   {
      "token": "zIbdsvljWkP@1S34*&"
   }
}

def myCommandCallback(cmd):
   print("Message received from IBM IoT Platform: %s" % cmd.data['command'])
   status=cmd.data['command']
   if status=="sprinkleron":
      print (" Rainwater sprinkler is ON")
   elif status=="sprinkleroff":
      print (" Rainwater sprinkler is OFF")
   else:
      print ("please send proper command")


client = wiotp.sdk.device.DeviceClient(config=myConfig, logHandlers=None)
client.connect()
```

```
while True:
    TemperatureZ1=random.randint(0,100)
    HumidityZ1=random.randint(0,100)
    GasLevelZ1=random.randint(0,100)
    PressureZ1=random.randint(0,100)
    TemperatureZ2=random.randint(0,100)
    HumidityZ2=random.randint(0,100)
    GasLevelZ2=random.randint(0,100)
    PressureZ2=random.randint(0,100)

    myData={'TemperatureZ1':TemperatureZ1,'HumidityZ1':HumidityZ1,'GasLevelZ1':GasLevelZ1,
    'PressureZ1':PressureZ1,'TemperatureZ2':TemperatureZ2
    'HumidityZ2':HumidityZ2,'GasLevelZ2':GasLevelZ2,'PressureZ2':PressureZ2}
    client.publishEvent(eventId="status", msgFormat="json", data=myData, qos=0,
    onPublish=None)
    print("Published data Successfully: %s", myData ,"to the IBM Platform")
    client.commandCallback = myCommandCallback
    time.sleep(2)
client.disconnect()
```

: