

DEVELOP A PYTHON SCRIPT TO PUBLISH AND SUBSCRIBE TO IBM IOT PLATFORM

Team Id	PNT2022TMID16026
Project Name	Smart Farmer – IOT Enabled Smart Farming Application

PROGRAM:

```
#IBM Watson IOT Platform
```

```
#pip install wiotp-sdk
```

```
import wiotp.sdk.device
```

```
import time
```

```
import random
```

```
myConfig = {
```

```
    "identity": {
```

```
        "orgId": "14dcvs",
```

```
        "typeId": "Device1",
```

```
        "deviceId": "12345"
```

```
    },
```

```
    "auth": {
```

```
        "token": "87654321"
```

```
    }
```

```
}
```

```
def myCommandCallback(cmd):
```

```
    print("Message received from IBM IoT Platform: %s" % cmd.data['command'])
```

```
m=cmd.data['command']  
  
if(m=="Motor On"):  
    print("****///Motors ARE ON///****")  
  
else:  
    print("****///Motors ARE OFF///****")
```

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

```
while True:  
    temp=random.randint(-20,125)  
    hum=random.randint(0,100)  
    Mois=random.randint(20,120)  
    myData={'temperature':temp, 'humidity':hum, 'moisture':Mois}  
    client.publishEvent(eventId="status", msgFormat="json", data=myData, qos=0,  
onPublish=None)  
    print("Published data Successfully: %s", myData)  
    client.commandCallback = myCommandCallback  
    time.sleep(2)  
  
client.disconnect()
```

IBM Watson IoT Platform

?

111719106060@smartinternz.com
ID: 14dcys

Browse

Action

Device Types

Interfaces

Add Device

12345

Connected

Device1

Device

Nov 17, 2022 5:44 PM

Identity

Device Information

Recent Events

State

Logs

The recent events listed show the live stream of data that is coming and going from this device.

Event	Value	Format	Last Received
status	{"temperature":2,"humidity":51,"moisture":70}	json	a few seconds ago
status	{"temperature":15,"humidity":55,"moisture":61}	json	a few seconds ago
status	{"temperature":24,"humidity":16,"moisture":89}	json	a few seconds ago
status	{"temperature":76,"humidity":66,"moisture":108}	json	a few seconds ago
status	{"temperature":-18,"humidity":45,"moisture":50}	json	a few seconds ago

Activate Windows