

SPRINT 2-REPORT

**SMART FARMER-IoT BASED SMART
FARMING APPILCATION**

TEAM ID : PNT2022TMID31713

TEAM LEAD : SAMRITHA S

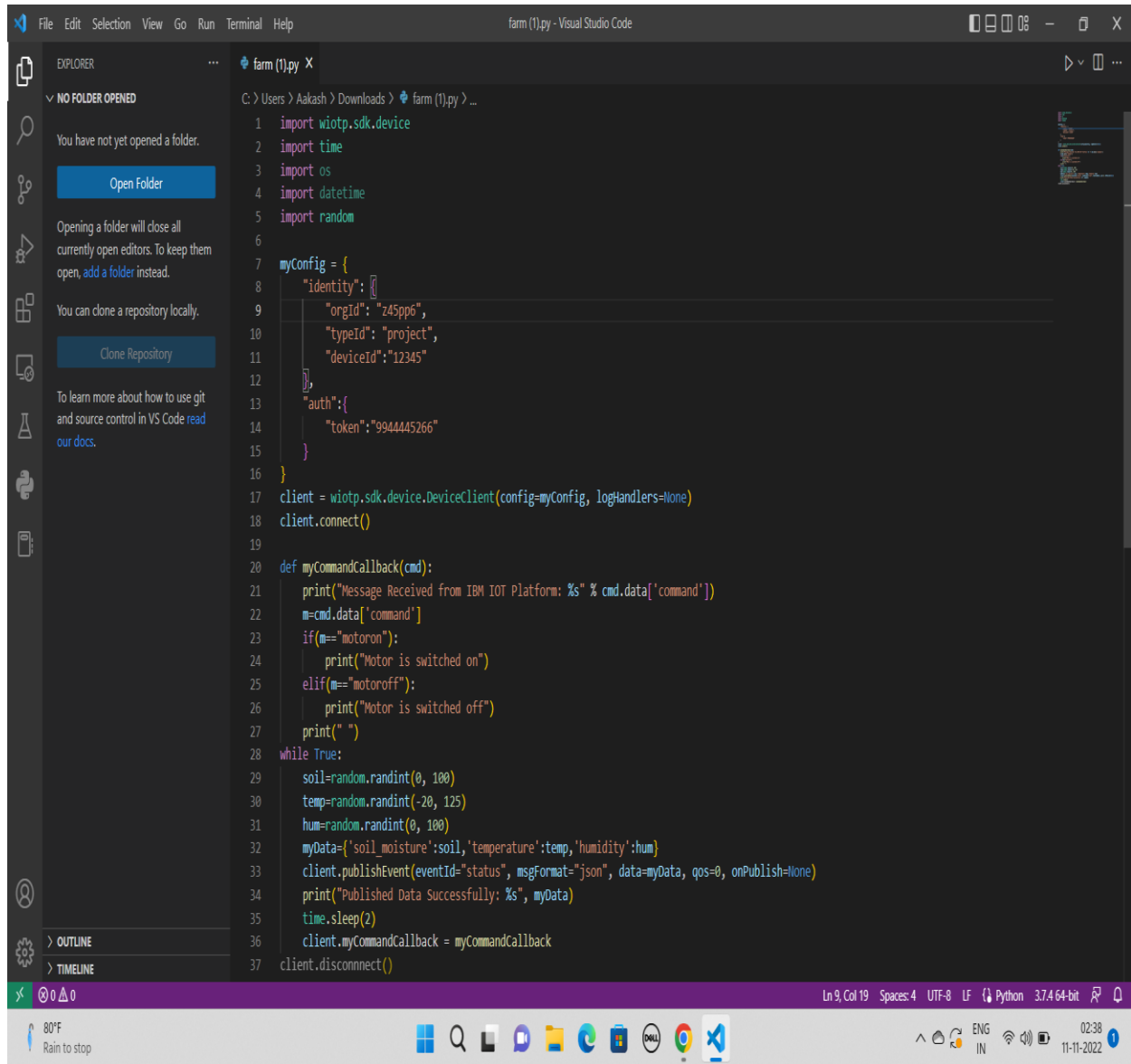
TEAM MEMBERS : 1. AAKASH J

2. DHEVAKI V

3. JANANI S

4. GOWTHAM S

Develop python code

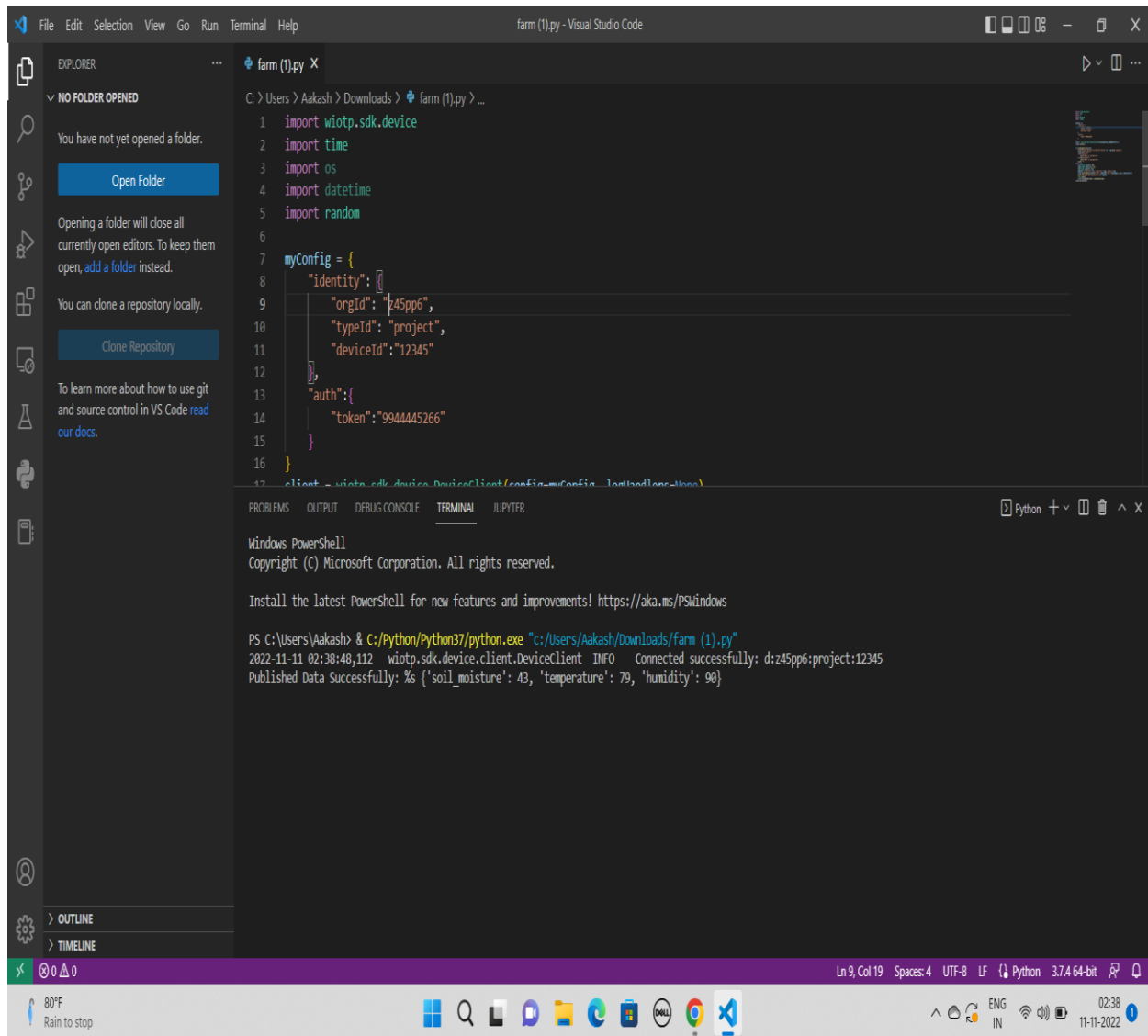


The screenshot displays the Visual Studio Code interface with a Python file named `farm (1).py` open. The Explorer sidebar on the left shows "NO FOLDER OPENED" with buttons for "Open Folder" and "Clone Repository". The main editor area contains the following Python code:

```
1 import wiotp.sdk.device
2 import time
3 import os
4 import datetime
5 import random
6
7 myConfig = {
8     "identity": {
9         "orgId": "z45pp6",
10        "typeId": "project",
11        "deviceId": "12345"
12    },
13    "auth": {
14        "token": "9944445266"
15    }
16 }
17 client = wiotp.sdk.device.DeviceClient(config=myConfig, logHandlers=None)
18 client.connect()
19
20 def myCommandCallback(cmd):
21     print("Message Received from IBM IOT Platform: %s" % cmd.data['command'])
22     m=cmd.data['command']
23     if(m=="motoron"):
24         print("Motor is switched on")
25     elif(m=="motoroff"):
26         print("Motor is switched off")
27     print(" ")
28 while True:
29     soil=random.randint(0, 100)
30     temp=random.randint(-20, 125)
31     hum=random.randint(0, 100)
32     myData={'soil_moisture':soil,'temperature':temp,'humidity':hum}
33     client.publishEvent(eventId="status", msgFormat="json", data=myData, qos=0, onPublish=None)
34     print("Published Data Successfully: %s", myData)
35     time.sleep(2)
36     client.myCommandCallback = myCommandCallback
37 client.disconnect()
```

The status bar at the bottom indicates the current position is Line 9, Column 19, with 4 spaces, UTF-8 encoding, LF line endings, Python 3.7.4 64-bit, and a file icon. The system tray at the very bottom shows a temperature of 80°F, rain status, and the date 11-11-2022.

Output:



The screenshot displays the Visual Studio Code interface. The Explorer panel on the left shows 'NO FOLDER OPENED'. The main editor area contains a file named 'farm (1).py' with the following Python code:

```
1 import wiotp.sdk.device
2 import time
3 import os
4 import datetime
5 import random
6
7 myConfig = {
8     "identity": {
9         "orgId": "d45pp6",
10        "typeId": "project",
11        "deviceId": "12345"
12    },
13    "auth": {
14        "token": "9944445266"
15    }
16 }
17 client = wiotp.sdk.device.DeviceClient(config=myConfig, loglevel=logging.INFO)
```

The TERMINAL panel at the bottom shows the execution of the script using PowerShell:

```
Windows PowerShell
Copyright (c) Microsoft Corporation. All rights reserved.

Install the latest PowerShell for new features and improvements! https://aka.ms/PSWindows

PS C:\Users\Aakash> & C:/Python/Python37/python.exe "c:/Users/Aakash/Downloads/farm (1).py"
2022-11-11 02:38:48,112 wiotp.sdk.device.client.DeviceClient INFO Connected successfully: d:z45pp6:project:12345
Published Data Successfully: %s {'soil_moisture': 43, 'temperature': 79, 'humidity': 90}
```

The status bar at the bottom indicates the current position is 'Ln 9, Col 19' and the file encoding is 'UTF-8'.

