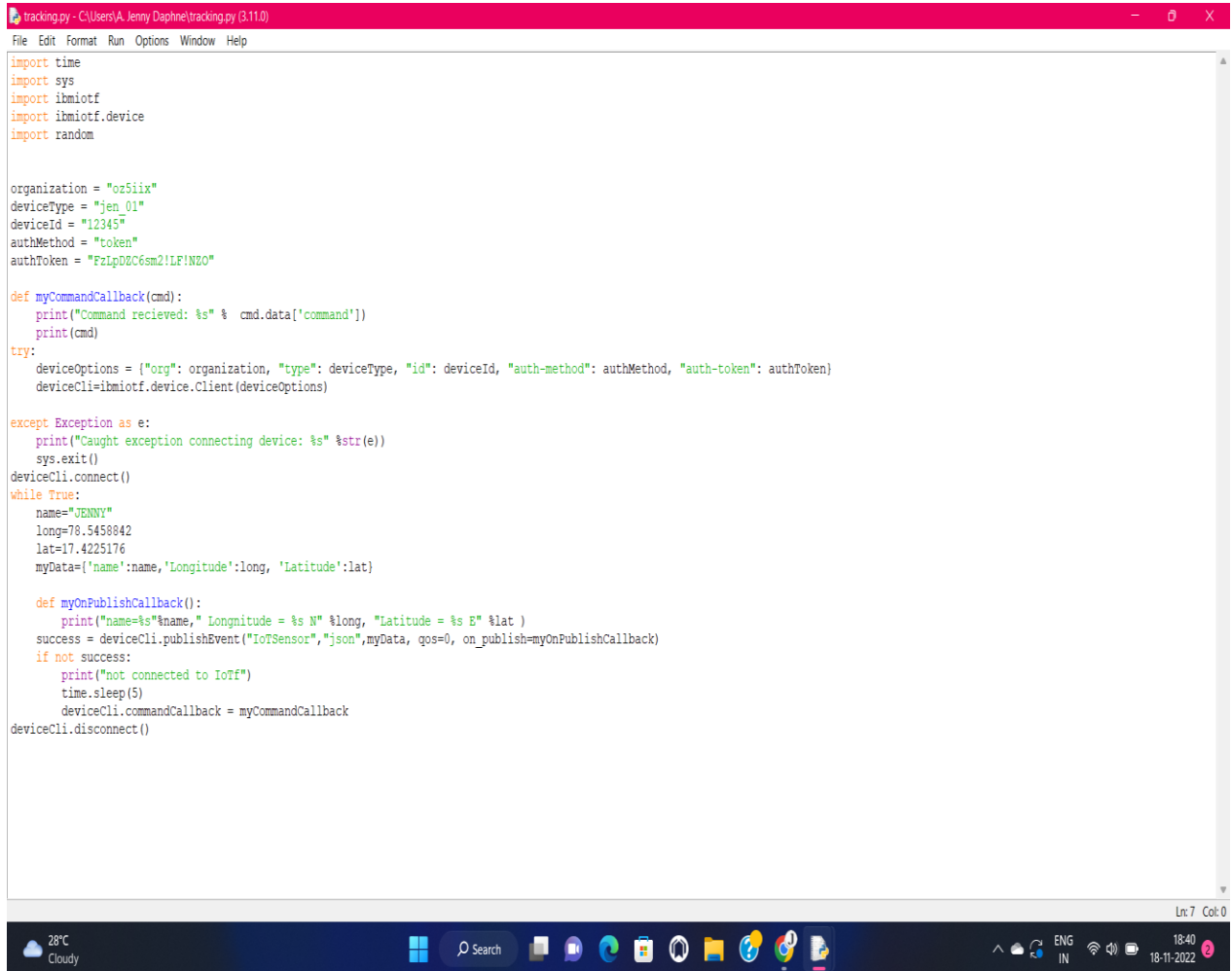


THE PYTHON SCRIPT

TEAM ID	PNT2022TMID34911
PROJECT NAME	IOT BASED SAFETY GADGET FOR CHILD SAFETY MONITORING AND NOTIFICATION

Python code:



```
tracking.py - C:\Users\A. Jenny Daphne\tracking.py (311.0)
File Edit Format Run Options Window Help

import time
import sys
import ibmiotf
import ibmiotf.device
import random

organization = "oz5iix"
deviceType = "jen_01"
deviceId = "12345"
authMethod = "token"
authToken = "FzLpDZC6sm2!lF!NZO"

def myCommandCallback(cmd):
    print("Command recieved: %s" % cmd.data['command'])
    print(cmd)

try:
    deviceOptions = {"org": organization, "type": deviceType, "id": deviceId, "auth-method": authMethod, "auth-token": authToken}
    deviceCli=ibmiotf.device.Client(deviceOptions)

except Exception as e:
    print("Caught exception connecting device: %s" %str(e))
    sys.exit()
deviceCli.connect()
while True:
    name="JENNY"
    long=78.5458842
    lat=17.4225176
    myData={'name':name, 'Longitude':long, 'Latitude':lat}

    def myOnPublishCallback():
        print("name=%s"%name, " Longitude = %s N" %long, "Latitude = %s E" %lat )
        success = deviceCli.publishEvent("IoTSensor","json",myData, qos=0, on_publish=myOnPublishCallback)
        if not success:
            print("not connected to IoTf")
            time.sleep(5)
            deviceCli.commandCallback = myCommandCallback
    deviceCli.disconnect()
```

Output execution:

The screenshot shows a Windows desktop environment. The primary focus is a Notepad++ window titled "HCSS Shell 3.11.0*", which contains a list of 40 lines of text. Each line represents a data entry with the following format: "name=JENNY Longitude = 78.5458842 N Latitude = 17.4225176 E". The text is displayed in a monospaced font, and the list is repeated 40 times. The Notepad++ window has a standard menu bar with options like File, Edit, Shell, Debug, Options, Window, and Help.

At the bottom of the screen is the Windows taskbar. On the left, it shows the system clock with a temperature of 28°C and the word "Cloudy". In the center, there is a search bar labeled "Search" and several pinned application icons, including the Start button, File Explorer, Microsoft Edge, and others. On the right side of the taskbar, there are icons for network status, volume, and the system clock, which displays the date "18-11-2022" and the time "18:41". The taskbar also indicates the user is logged in as "Ln: 5" with a profile picture icon.

Connection to IBM Watson:

IBM Watson IoT Platform

Browse Action Device Types Interfaces

Browse Devices

All Devices Diagnose

This table shows a summary of all devices that have been added. It can be filtered, organized, and searched on using different criteria. To get started, you can add devices by using the Add Device button, or by using API.

Search by Device ID

Device Simulator

Device ID	Status	Device Type	Class ID	Date Added	Descriptive Location
12345	Connected	jen_01	Device	Oct 29, 2022 8:19 PM	

Identity Device Information Recent Events State Logs

Device ID: 12345
 Device Type: jen_01
 Date Added: Oct 29, 2022 8:19 PM
 Added By: jennydaphne01@gmail.com

Output in Watson:

The screenshot displays the IBM Watson IoT Platform interface. The top navigation bar includes tabs for 'Browse', 'Action', 'Device Types', and 'Interfaces'. A sidebar on the left contains various icons for navigation. The main content area shows a modal window with tabs for 'Identity', 'Device Information', 'Recent Events', 'State', and 'Logs'. The 'Recent Events' tab is active, displaying a table of recent events. The table has four columns: 'Event', 'Value', 'Format', and 'Last Received'. It lists five events, all from an 'IoT Sensor' with a JSON value containing name, longitude, and latitude information, all in 'json' format, and all received 'a few seconds ago'. The bottom of the modal shows 'Items per page: 50' and '1 of 1 page'.

Event	Value	Format	Last Received
IoT Sensor	{"name":"JENNY","Longitude":78.5458842,"Latit..."}	json	a few seconds ago
IoT Sensor	{"name":"JENNY","Longitude":78.5458842,"Latit..."}	json	a few seconds ago
IoT Sensor	{"name":"JENNY","Longitude":78.5458842,"Latit..."}	json	a few seconds ago
IoT Sensor	{"name":"JENNY","Longitude":78.5458842,"Latit..."}	json	a few seconds ago
IoT Sensor	{"name":"JENNY","Longitude":78.5458842,"Latit..."}	json	a few seconds ago