

SPRINT 2

Project Title	Industry-specific intelligent fire management system
Team ID	PNT2022TMID09410
Date	5 NOV 2022

Code for Simulation

```
#IBM Watson IOT Platform
```

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

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

```
import time
```

```
import random
```

```
myConfig = {
```

```
    "identity": {
```

```
        "orgId": "s8ov1q",
```

```
        "typeId": "abcd",
```

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

```
    },
```

```
    "auth": {
```

```
        "token": "12345678"
```

```
    }
```

```
}
```

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

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

```
m=cmd.data['command']
```

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

```
client.connect()
```

```
while True:
```

```
    temp=random.randint(-20,125)
```

```
    hum=random.randint(0,100)
```

```
    flame=random.randint(0,50)
```

```
    gas=random.randint(0,100)
```

```
    myData={'temperature':temp, 'humidity':hum,'flame':flame,'gas':gas}
```

```
    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()
```

OUTPUT (IBM IOT Watson)

Connection Details

Device ID	Status	Device Type	Class ID	Date Added	
12345	Connected	abcd	Device	Nov 15, 2022 11:38 AM	→ ...
<div> <div>Identity</div> <div>Device Information</div> <div>Recent Events</div> <div>State</div> <div>Logs</div> </div>					
Device ID	12345				
Device Type	abcd				
Date Added	Nov 15, 2022 11:38 AM				
Added By	gayathri19m2001@gmail.com				
Connection Status	Connected Connection Time: Nov 16, 2022 10:06 PM Client Address: 223.181.233.93 SecureToken				

The screenshot displays the IBM Watson IoT Platform interface. On the left is a dark sidebar with navigation icons. The main header area includes the title 'IBM Watson IoT Platform' and a breadcrumb trail: 'Browse > Action > Device Types > Interfaces'. Below this, a horizontal menu shows five tabs: 'Identity', 'Device Information', 'Recent Events' (which is selected), 'State', and 'Logs'. Under the 'Recent Events' tab, there is a descriptive paragraph stating: 'The recent events listed show the live stream of data that is coming and going from this device.' Below the text is a table with four columns: 'Event', 'Value', 'Format', and 'Last Received'. The table contains five rows of event data.

Event	Value	Format	Last Received
status	{"temperature":51,"humidity":2,"flame":44,"gas"...	json	a few seconds ago
status	{"temperature":45,"humidity":78,"flame":2,"gas"...	json	a few seconds ago
status	{"temperature":29,"humidity":41,"flame":10,"ga...	json	a few seconds ago
status	{"temperature":114,"humidity":67,"flame":25,"g...	json	a few seconds ago
status	{"temperature":82,"humidity":81,"flame":16,"ga...	json	a few seconds ago

