

VIT-IOT-INDUSTRY CERTIFICATE-EXTERNSHIP PROGRAM

ASSIGNMENT-4

Q. Develop a mobile application that takes the user input and sends it to IoT device (python code). Print the received data in python shell.Keep a text box to accept the user input.integrate a submit button.Whenever user enters the text input in text box and clicks the button the data should be sent to IBM cloud using URL(HTTP API).

Code:

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

```
import time
```

```
import random
```

```
myConfig = {
```

```
    "identity": {
```

```
        "orgId": "ml9y3s",
```

```
        "typeId": "afifadevice"
```

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

```
    },
```

```
    "auth": {
```

```
        "token": "123456789"
```

```
    }
```

```
}
```

```
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)
```

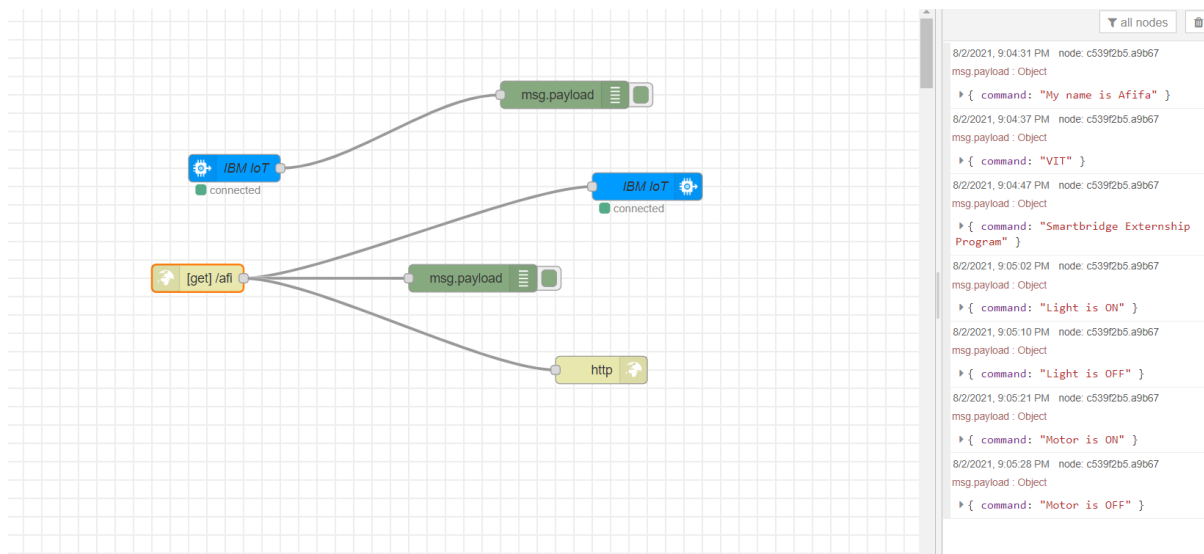
```
client.connect()
```

```
while True:
```

```
    client.commandCallback = myCommandCallback
```

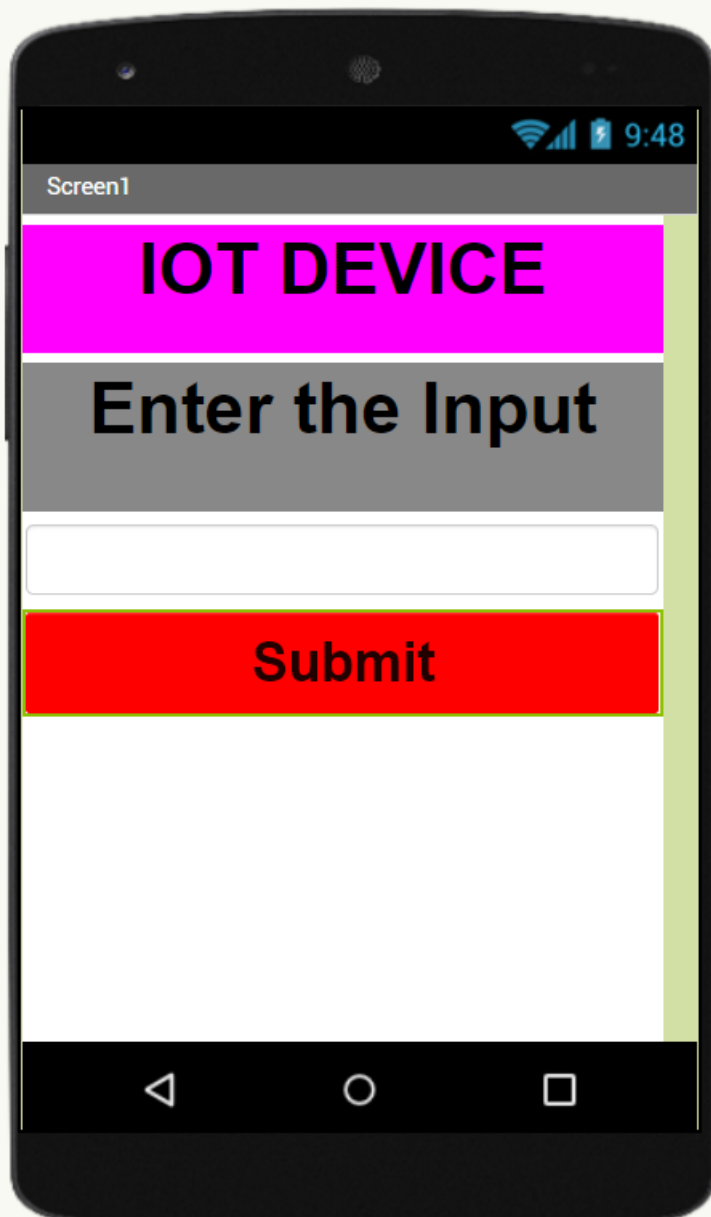
```
    time.sleep(2)
```

```
client.disconnect()
```



☐ Display hidden components in Viewer

Phone size (505,320) ▾



Non-visible components



Blocks

Built-in

Control

Logic

Math

Text

Lists

Dictionaries

Colors

Variables

Procedures

Screen1

Label1

HorizontalArrangement1

Label2

HorizontalArrangement2

TextBox1

HorizontalArrangement3

Rename

Delete

Media

Viewer

when Button1 .Click

do

set Web1 .Uri to join https://node-red-bnogz-2021-07-22.eu-gb.mybluemix.net/

call Web1 .Get

set TextBox1 .Text to

0

0

Show Warnings

+

-

debug

all nodes

8/2/2021, 9:04:31 PM node: c539f2b5.a9b67

msg.payload : Object

▶ { command: "My name is Afifa" }

8/2/2021, 9:04:37 PM node: c539f2b5.a9b67

msg.payload : Object

▶ { command: "VIT" }

8/2/2021, 9:04:47 PM node: c539f2b5.a9b67

msg.payload : Object

▶ { command: "Smartbridge Externship Program" }

8/2/2021, 9:05:02 PM node: c539f2b5.a9b67

msg.payload : Object

▶ { command: "Light is ON" }

8/2/2021, 9:05:10 PM node: c539f2b5.a9b67

msg.payload : Object

▶ { command: "Light is OFF" }

8/2/2021, 9:05:21 PM node: c539f2b5.a9b67

msg.payload : Object

▶ { command: "Motor is ON" }

8/2/2021, 9:05:28 PM node: c539f2b5.a9b67

msg.payload : Object

▶ { command: "Motor is OFF" }

Screen1

IOT DEVICE

Enter the Input

Hint for TextBox1

Submit

```
*IDLE Shell 3.9.6*
File Edit Shell Debug Options Window Help
Python 3.9.6 (tags/v3.9.6:db3ff76, Jun 28 2021, 15:26:21) [MSC v.1929 64 bit (AMD64)] on win32
Type "help", "copyright", "credits" or "license()" for more information.
>>>
==== RESTART: D:\SMART INTERNZ\Assignments\Assignment 4\Assignment4-code.py ====
2021-08-02 21:04:22,563 wiotp.sdk.device.client.DeviceClient INFO Connected successfully: d:cvtwoa:Device1:mydev123
Message received from IBM IoT Platform: My name is Afifa
Message received from IBM IoT Platform: VIT
Message received from IBM IoT Platform: Smartbridge Externship Program
Message received from IBM IoT Platform: Light is ON
Message received from IBM IoT Platform: Light is OFF
Message received from IBM IoT Platform: Motor is ON
Message received from IBM IoT Platform: Motor is OFF
|
```