Assignment-3

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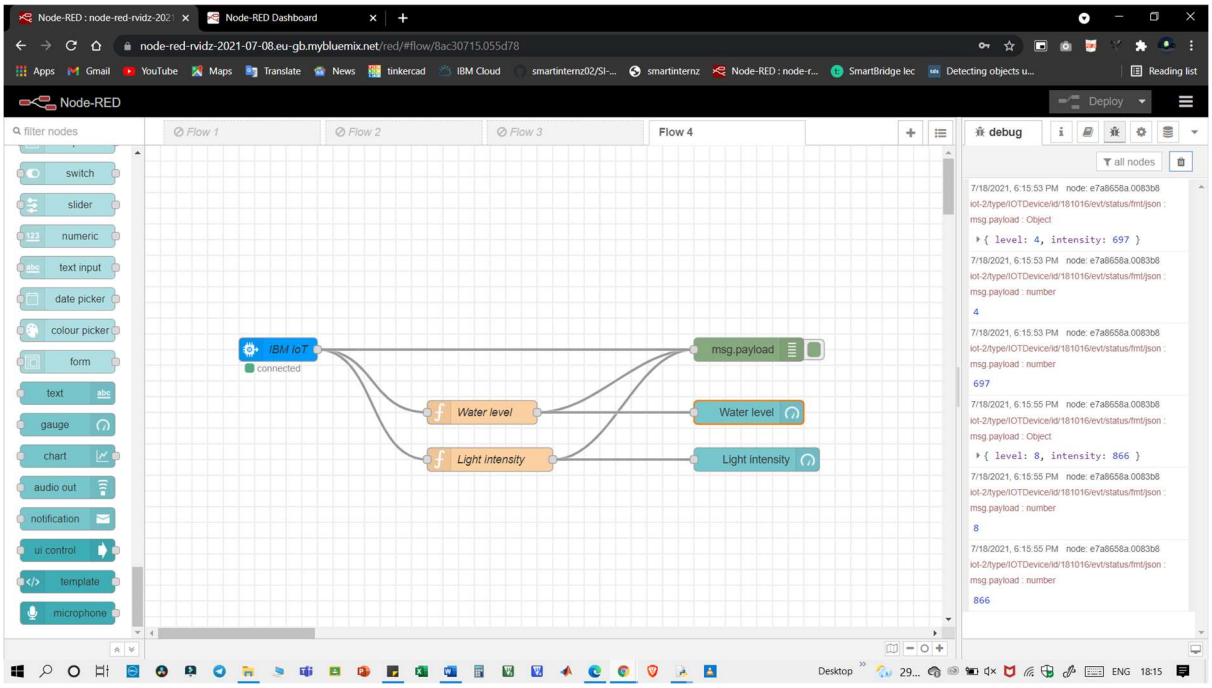
Develop a code to upload the water tank level and light intensity values to the IBM IoT platform and visualize them in the web application.



CODE:

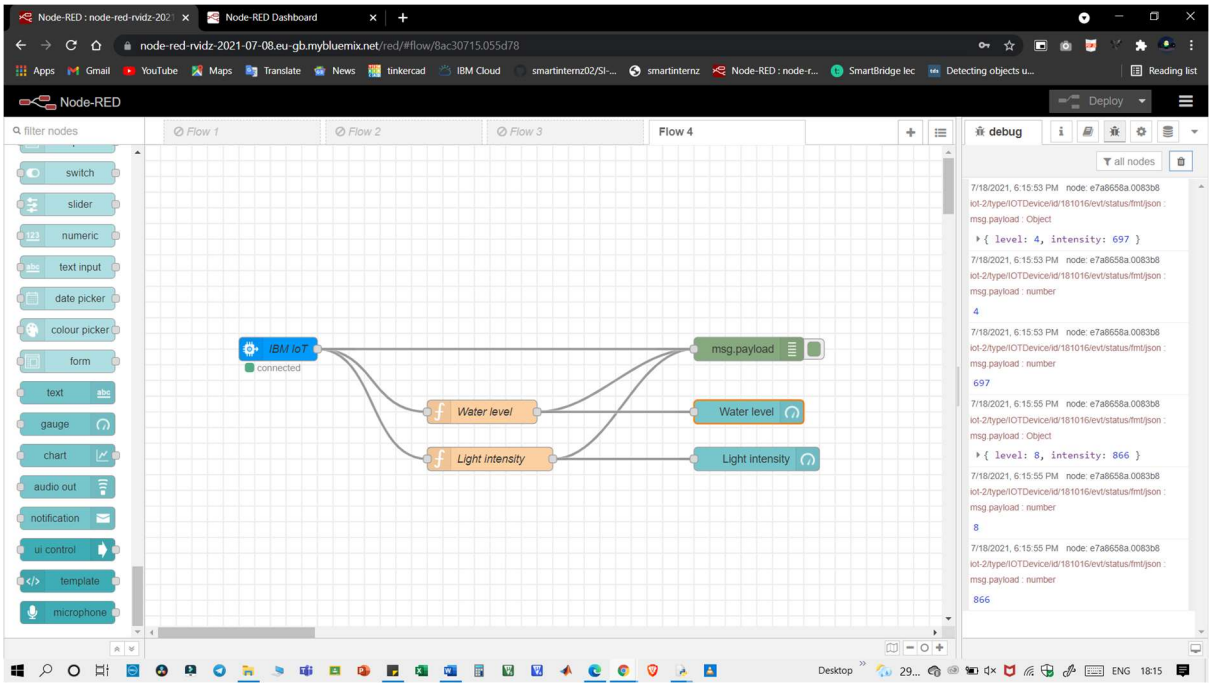
```
import wiotp.sdk.device
import time
import random
myConfig = {
    "identity": {
        "orgId": "xkdbgo",
        "typeId": "IOTDevice",
        "deviceId":"181016"
    },
    "auth": {
        "token": "147258369"
    }
```

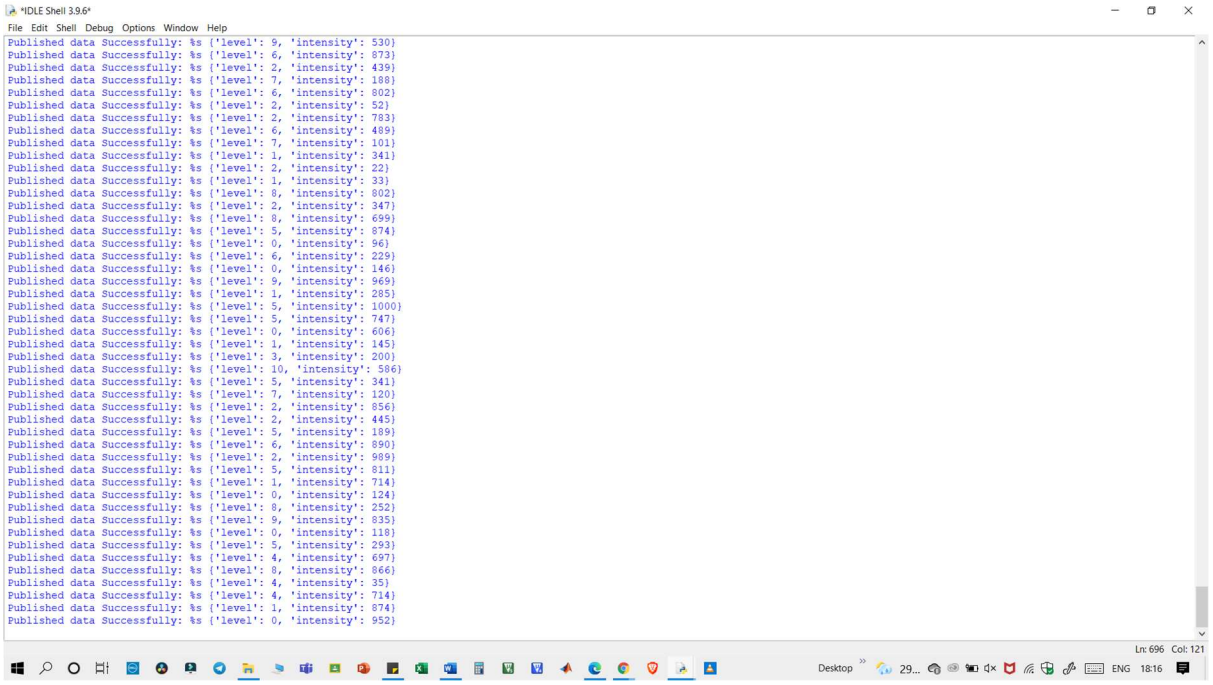
```
}
def myCommandCallback(cmd):
    print("Message received from IBM IoT Platform: %s" % cmd.data['command'])
    m=cmd.data['command']

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

while True:
    level=random.randint(0,10)
    intensity=random.randint(0,1000)
    myData={'level':level, 'intensity':intensity}
    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()
```

After simulation:




IDLE Shell 3.9.6
File Edit Shell Debug Options Window Help
Published data Successfully: %s {'level': 9, 'intensity': 530}
Published data Successfully: %s {'level': 6, 'intensity': 873}
Published data Successfully: %s {'level': 2, 'intensity': 439}
Published data Successfully: %s {'level': 7, 'intensity': 188}
Published data Successfully: %s {'level': 6, 'intensity': 802}
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Published data Successfully: %s {'level': 2, 'intensity': 783}
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Published data Successfully: %s {'level': 5, 'intensity': 1000}
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Ln: 696 Col: 121
Desktop
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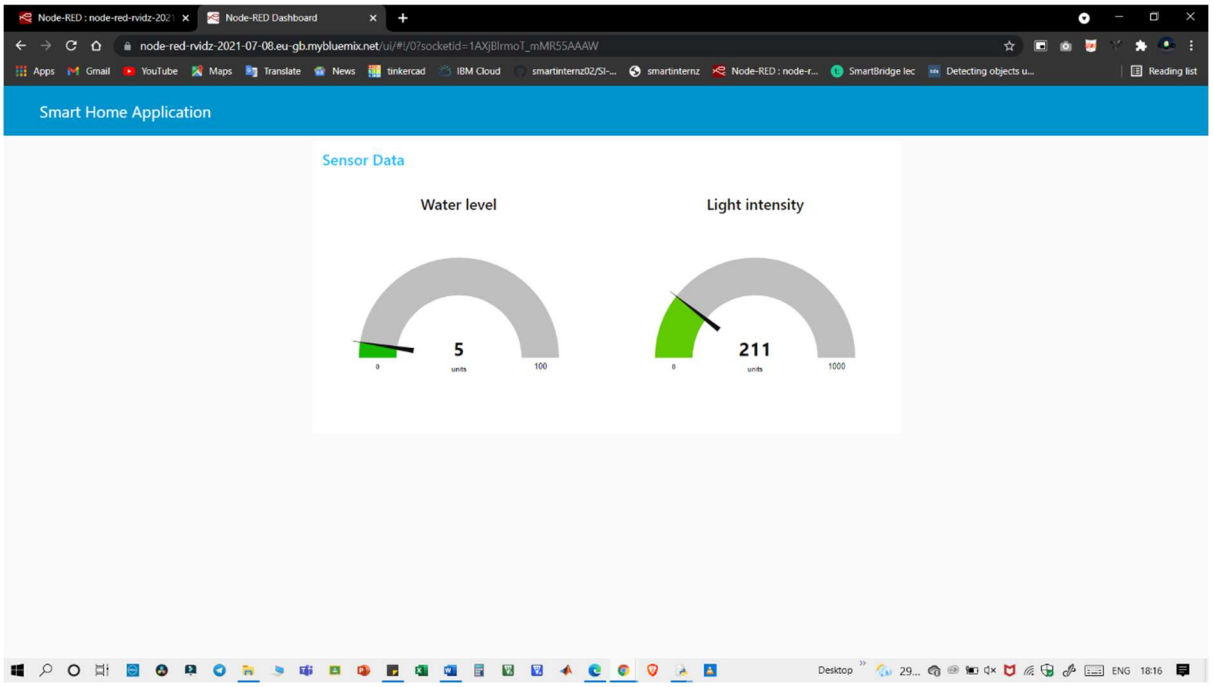
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Node-RED Dashboard
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Apps Gmail YouTube Maps Translate News tinkercad IBM Cloud smartinternz02/SI-... smartinternz Node-RED : node-r... SmartBridge lec Detecting objects u... Reading list
Smart Home Application
Sensor Data
Water level
5
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units
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Light intensity
211
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units
1000
Desktop
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