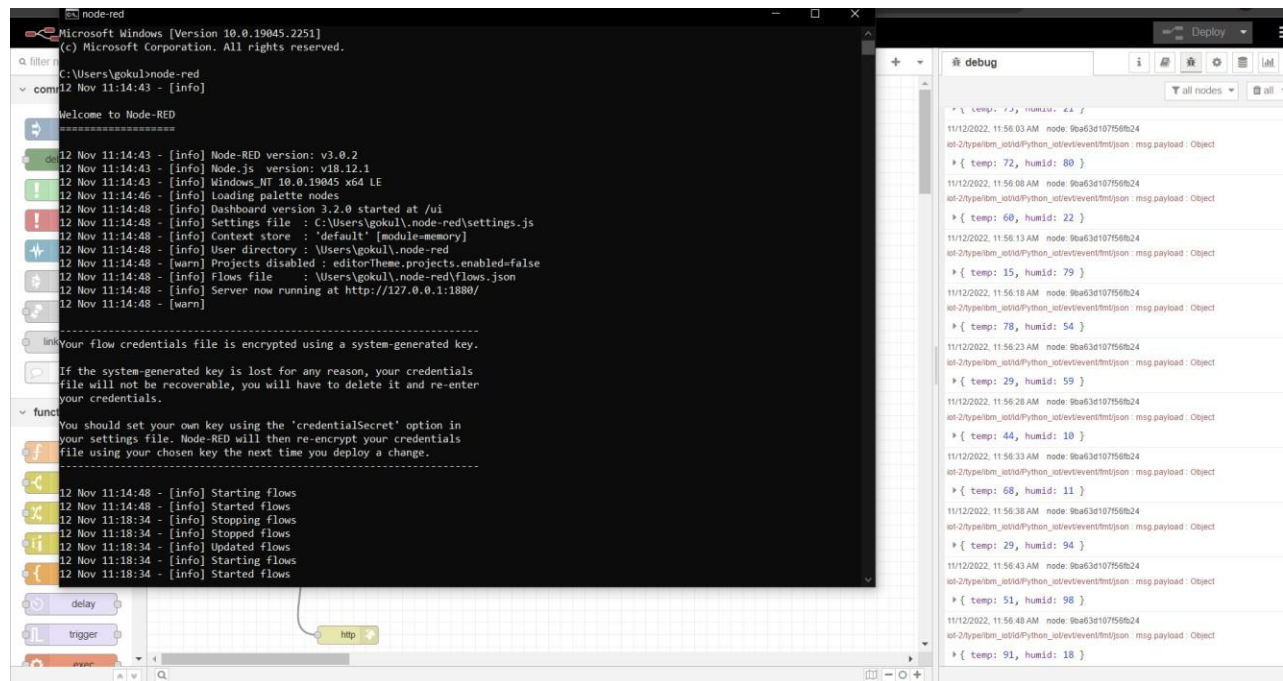
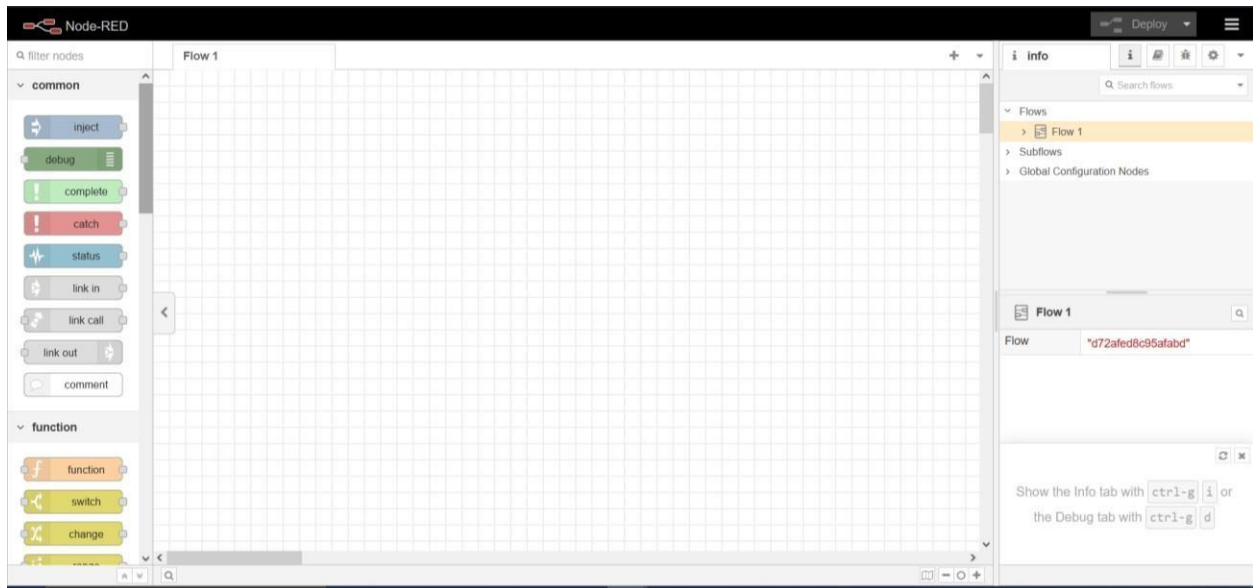


CREATION OF NODE-RED

Team ID	PNT2022TMID51591
Project Name	Real – time River Water Quality Monitoring and Control System



```
File Edit Selection View Go Run Terminal Help
ibm.py - vs_code - Visual Studio Code

EXPLORER
> VS CODE
> OUTLINE
> TIMELINE

ibm.py
32 deviceOptions = {"org": organization, "type": deviceType, "id": deviceId, "auth-method": authMethod,
33                  "auth-token": authToken}
34 deviceCli = ibmiotf.device.Client(deviceOptions)
35 # .....
36
37 except Exception as e:
38     print("caught exception connecting device: %s" % str(e))
39     sys.exit()
40
41 deviceCli.connect()
42
43 while True:
44     pH = random.randint(0,100)
45     turbidity = random.randint(0,100)
46     # Send Temperature & Humidity to IBM Watson
47     data = {'temp':pH, 'humid':turbidity} #output
48
49
50 # print data
51 def myOnPublishCallback():
52     print("Data publish ",data, "to IBM Watson")
53
54
55 success = deviceCli.publishEvent("event", "json", data, 0, myOnPublishCallback)
56 if not success:
57     print("Not connected to IoTF")
58     time.sleep(5)

OUTPUT DEBUG CONSOLE TERMINAL JUPYTER SQL CONSOLE COMMENTS
> TERMINAL
Data publish {'temp': 60, 'humid': 24} to IBM Watson
Data publish {'temp': 83, 'humid': 94} to IBM Watson
Data publish {'temp': 0, 'humid': 33} to IBM Watson
Data publish {'temp': 22, 'humid': 3} to IBM Watson
Data publish {'temp': 12, 'humid': 91} to IBM Watson
Data publish {'temp': 60, 'humid': 85} to IBM Watson
Data publish {'temp': 22, 'humid': 2} to IBM Watson
Data publish {'temp': 71, 'humid': 46} to IBM Watson
Data publish {'temp': 2, 'humid': 76} to IBM Watson
Data publish {'temp': 72, 'humid': 60} to IBM Watson

Ln 47, Col 31 Spaces: 4 UTF-8 CRLF Python 3.8.8 (base:conda)
```

