SPRINT-2

SOFTWARE

Date	13 November 2022
Team ID	PNT2022TMID42278
Project Name	Hazardous Area Monitoring for Industrial Power Plant powered by IOT

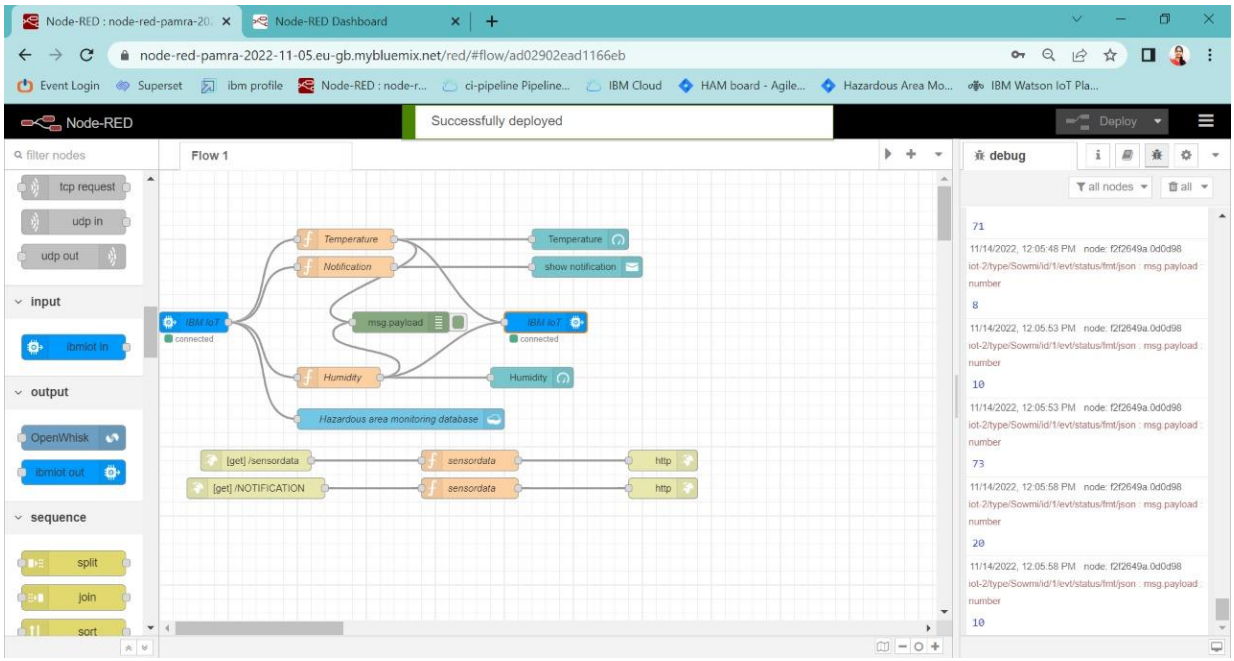
PROCEDURE:

Step1: Develop node red application.

Step2: Install the required nodes from manage palette option.

Step3: Connect the node flow. Step4: Deploy the flow.

NODE RED:



FUNCTION NODE COMMAND TO INDICATE THE TEMPERATURE:

msg.payload=msg.payload.temperature;

global.set('temperature',msg.payload); return msg;

FUNCTION NODE COMMAND TO INDICATE THE HUMIDITY:

```
msg.payload=msg.payload.humidity;
global.set('humidity',msg.payload); return msg;
```

FUNCTION NODE COMMAND TO SHOW THE STATUS:

```
temperature=msg.payload.temperature;
humidity=msg.payload.humidity; if(temperature>50
& humidity>50){ msg.payload="Temperature and
Humidity Alert!";
}
else if(temperature>50){ msg.payload="Temperature
Alert!";
}
else if(humidity>50){ msg.payload="Humidity
Alert!";
}
else {msg.payload="safe";} return msg;
```

FUNCTION NODE COMMAND TO GET THE HTTP REQUEST FOR SENSOR DATA:

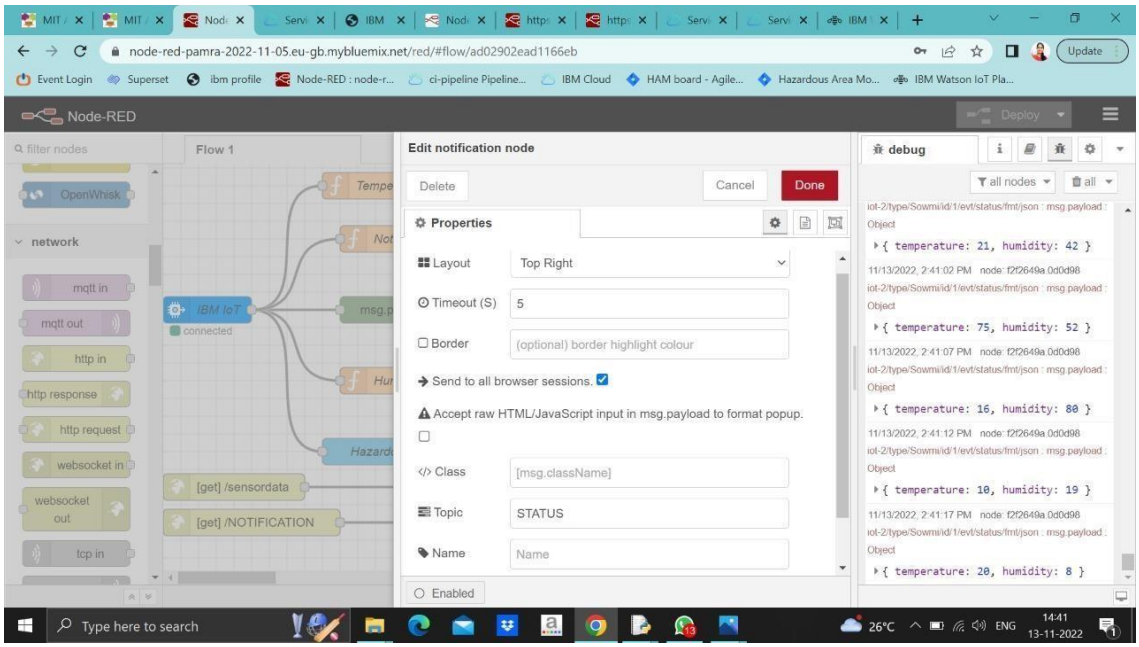
```
msg.payload={
   "temperature":global.get('temperature'),
   "humidity":global.get('humidity')
}
return msg;
```

FUNCTION NODE COMMAND TO GET THE HTTP REQUEST FOR STATUS:

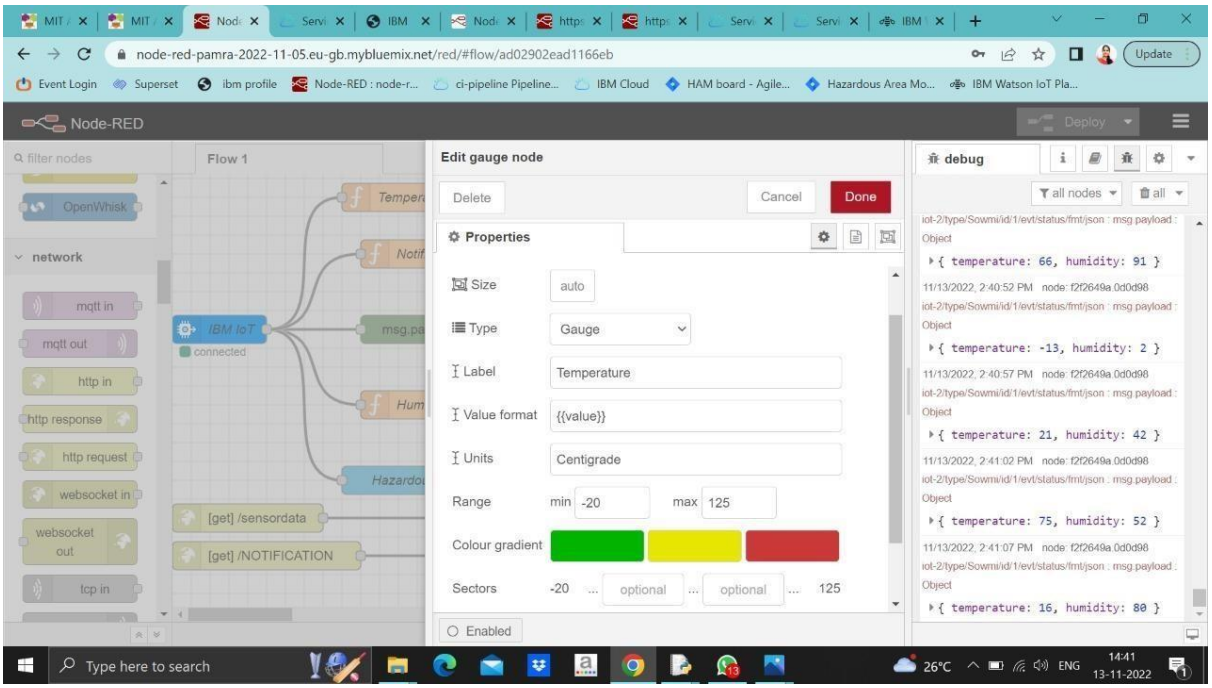
```
msg.payload={
```

```
   "temperature":global.get('temperature'),
   "humidity":global.get('humidity')
}
temperature=msg.payload.temperature; humidity=msg.payload.humidity;
if(temperature>50
& humidity>50){ msg.payload="Temperature and
Humidity Alert!";
}
else if(temperature>50){ msg.payload="Temperature
Alert!";
}
else if(humidity>50){ msg.payload="Humidity
Alert!";
}
else {msg.payload="safe";} return msg;
```

NOTIFICATION NODE:



GAUGE-TEMPERATURE NODE:



GAUGE-HUMIDITY NODE: