

GAS LEAKAGE MONITORING AND ALERTING SYSTEM FOR INDUSTRIES

Assignment 2

Problem Statement :

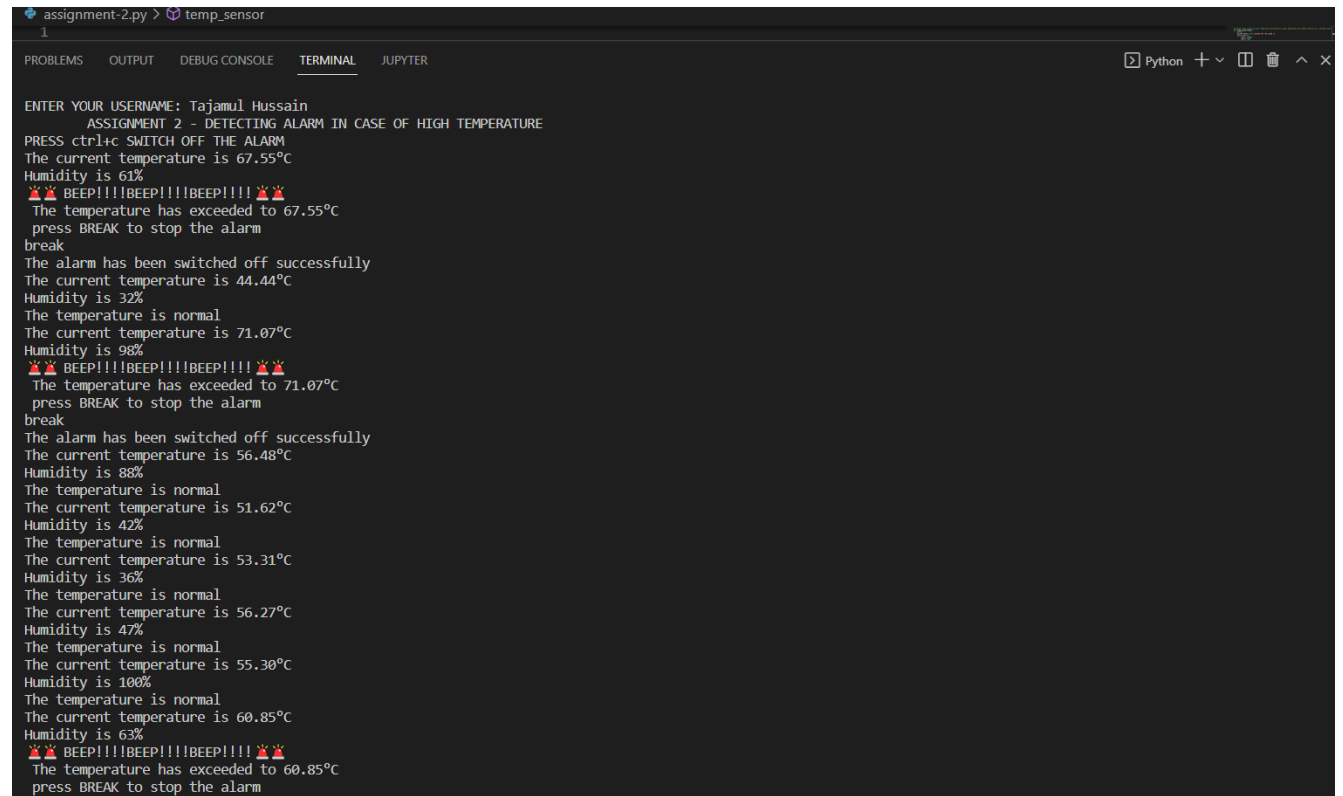
Build a python code, Assume you get temperature and humidity values (generated with random function to a variable) and write a condition to continuously detect alarm in case of high temperature.

Code:

```
#A python code assume you get temperature and humidity values generated with
random function to a variable and write a condition to continuously detect
alarm in case of high temperature
def temp_sensor(name):
    k=True    print("PRESS ctrl+c SWITCH OFF THE ALARM ")
while k==True:        import random        import time
temperature=random.uniform(35,90)        print (f"The current
temperature is {temperature:.2f}°C")
humidity=random.randint(30,100)        print(f"Humidity is
{humidity}%")        if temperature>60:
    print(f" 🚨 🚨 BEEP!!!!BEEP!!!!BEEP!!!! 🚨 🚨 \n The temperature
has exceeded to {temperature:.2f}°C \n press BREAK to stop the alarm")
while temperature>60:        k=str(input())        k=k.upper()
if k=="BREAK" :
    break
else:
    print('''Uh-oh I guess you've used wrong word kindly type
"BREAK" to stop the alarm ''')
    continue        break
    if
temperature>60:
    print("The alarm has been switched off successfully")
else:
    print("The temperature is normal")
```

```
        time.sleep(7)
k=True
name=str(input("ENTER YOUR USERNAME: ")) print("\tASSIGNMENT 2 -
DETECTING ALARM IN CASE OF HIGH TEMPERATURE") temp_sensor(name)
```

Output:



```
assignment-2.py > temp_sensor
1
PROBLEMS OUTPUT DEBUG CONSOLE TERMINAL JUPYTER
Python + - [ ] [ ] ^ x

ENTER YOUR USERNAME: Tajamul Hussain
ASSIGNMENT 2 - DETECTING ALARM IN CASE OF HIGH TEMPERATURE
PRESS ctrl+c SWITCH OFF THE ALARM
The current temperature is 67.55°C
Humidity is 61%
🔥🔥 BEEP!!!!BEEP!!!!BEEP!!!!🔥🔥
The temperature has exceeded to 67.55°C
press BREAK to stop the alarm
break
The alarm has been switched off successfully
The current temperature is 44.44°C
Humidity is 32%
The temperature is normal
The current temperature is 71.07°C
Humidity is 98%
🔥🔥 BEEP!!!!BEEP!!!!BEEP!!!!🔥🔥
The temperature has exceeded to 71.07°C
press BREAK to stop the alarm
break
The alarm has been switched off successfully
The current temperature is 56.48°C
Humidity is 88%
The temperature is normal
The current temperature is 51.62°C
Humidity is 42%
The temperature is normal
The current temperature is 53.31°C
Humidity is 36%
The temperature is normal
The current temperature is 56.27°C
Humidity is 47%
The temperature is normal
The current temperature is 55.30°C
Humidity is 100%
The temperature is normal
The current temperature is 60.85°C
Humidity is 63%
🔥🔥 BEEP!!!!BEEP!!!!BEEP!!!!🔥🔥
The temperature has exceeded to 60.85°C
press BREAK to stop the alarm
```