

Assignment 2

IOT Assignment Topic: Assignment on temperature and humidity sensing and alarm automation using python

CODE:

```
import random
from time import sleep

while True:
    temperature=round(random.uniform(10, 50),2)
    humidity=round(random.uniform(10, 100),2)
    print("\nTemperature =", temperature,"degree celsius")
    print("Humidity = ",humidity,"%")
    if(temperature>30):
        print("STATE : ALARM ON")
    else:
        print("STATE : ALARM OFF")
    sleep(5)
```

OUTPUT:

main.py	Shell
1 import random	Temperature = 23.1 degree celsius
2 from time import sleep	Humidity = 89.3 %
3	STATE : ALARM OFF
4 while True:	Temperature = 22.04 degree celsius
5 temperature=round(random.uniform(10, 50),2)	Humidity = 92.67 %
6 humidity=round(random.uniform(10, 100),2)	STATE : ALARM OFF
7 print("\nTemperature =", temperature,"degree celsius")	Temperature = 30.88 degree celsius
8 print("Humidity = ",humidity,"%")	Humidity = 64.37 %
9 if(temperature>30):	STATE : ALARM ON
10 print("STATE : ALARM ON")	Temperature = 16.29 degree celsius
11 else:	Humidity = 48.31 %
12 print("STATE : ALARM OFF")	STATE : ALARM OFF
13 sleep(5)	Temperature = 49.21 degree celsius
14	Humidity = 37.08 %
	STATE : ALARM ON
	Temperature = 42.58 degree celsius
	Humidity = 46.55 %
	STATE : ALARM ON
	Temperature = 33.2 degree celsius
	Humidity = 67.1 %
	STATE : ALARM ON
	Temperature = 43.76 degree celsius
	Humidity = 83.78 %
	STATE : ALARM ON