ASSIGNMENT-2

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

Assignment Date	24 September 2022
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Maximum Marks	2 marks

Question 1

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

CODE:

```python
import random
import time
thresh1=int(input("Enter threshold value for temperature:"))
thresh2=int
(input("Enter threshold value for humidity:"))
hu=0
tp=0

while(True):
    temp=random.uniform(1,100)
    humidity=random.uniform(1,50)
    print("temperature is : {0:.2f}".format(temp))
    print("humidity is : {0:.2f} %".format(humidity))
    time.sleep(2)
    if temp>=thresh1 and humidity<=thresh2:
        tp=1
        hu=1
        print("\nHigh ALERT\nHumidity alarm & Temperature alarm are ON \n")
        time.sleep(3)
```

```python
    elif humidity<=thresh2:
        tp=0
        hu=1
        print("\nHumidity alarm is ON & Temperature alarm is OFF \n")
        time.sleep(3)
    elif temp>=thresh1:
        tp=1
        hu=0
        print("\nHumidity alarm is OFF & Temperature alarm is ON \n")
        time.sleep(3)
    else:
        tp=0
        hu=0
        print("\nBoth alarms are OFF \n")
        time.sleep(3)
```