# ASSIGNMENT-2

```python
import random
import winsound

# generate random temperature and humidity values
temperature = random.uniform(20, 40) # in Celsius
humidity = random.uniform(30, 70) # in percentage

# set threshold values for temperature and humidity
temp_threshold = 30 # in Celsius
humidity_threshold = 30 # in percentage

# define frequency and duration for alarm sound
freq = 2500 # in hertz
dur = 1000 # in milliseconds

# check if temperature or humidity exceed threshold values
if temperature > temp_threshold and humidity > humidity_threshold:
    print("ALERT: High temperature and high humidity detected!")
    winsound.Beep(freq, dur)
elif temperature > temp_threshold:
    print("ALERT: High temperature detected!")
    winsound.Beep(freq, dur)
elif humidity > humidity_threshold:
    print("ALERT: High humidity detected!")
    winsound.Beep(freq, dur)
```
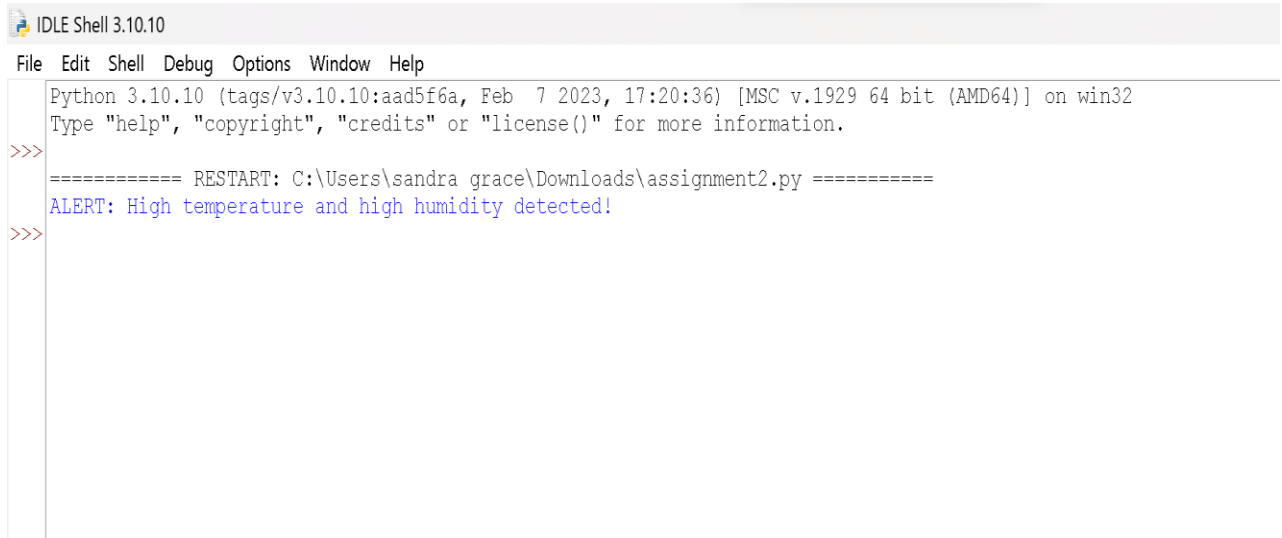
```
else:

    print("Temperature:", temperature, "C, Humidity:", humidity, "%")
```

IDLE Shell 3.10.10

File  Edit  Shell  Debug  Options  Window  Help

```
Python 3.10.10 (tags/v3.10.10:aad5f6a, Feb  7 2023, 17:20:36) [MSC v.1929 64 bit (AMD64)] on win32
Type "help", "copyright", "credits" or "license()" for more information.
>>>
============ RESTART: C:\Users\sandra grace\Downloads\assignment2.py ===========
ALERT: High temperature and high humidity detected!
>>>
```