

ASSIGNMENT-2

HUMIDITY AND TEMPERATURE

PROGRAM:

```
# import the random and time library in python script.

import random

import time


# iterate the random values of Temperature and humidity within the specified range.
while True:

    temperature = random.randint(32, 212)

    humidity = random.randint(0, 100)

    #print the values of Temperature and humidity.

    print("Temperature is : "+str(temperature)+"°F")

    print("Temperature in celsius : "+str(((temperature-32)*5)//9)+"°C")

    print("The Humidity is : "+str(humidity)+"%")

    # check if the temperature values are higher than 100°F.

    if (temperature >= 100):

        print("High Temperature Alert : "+str(temperature)+"°F")

        time.sleep(10)
```

OUTPUT:

The screenshot shows an IDE window with the following components:

- Menu Bar:** File, Edit, View, Navigate, Code, Refactor, Run, Tools, VCS, Window, Help.
- Toolbar:** Includes icons for file operations, search, and running code.
- Project Explorer:** Shows the project structure with 'assignment2.py'.
- Run Console:** Displays the output of the script execution.
- Bottom Panel:** Includes tabs for Version Control, Run, Python Packages, TODO, Python Console, Problems, Terminal, and Services.
- Status Bar:** Shows 'CRLF', 'UTF-8', '4 spaces', and 'Python 3.6 (lbm)'.

The output of the script is as follows:

```
C:\Users\ELCOT\Desktop\Ibm\venv\Scripts\python.exe C:/Users/ELCOT/Desktop/Ibm/venv/assignment2.py
Temperature is : 192°F
Temperature in celsius : 88°C
The Humidity is : 59%
High Temperature Alert : 192°F
Temperature is : 142°F
Temperature in celsius : 61°C
The Humidity is : 12%
High Temperature Alert : 142°F
Temperature is : 108°F
Temperature in celsius : 42°C
The Humidity is : 83%
High Temperature Alert : 108°F
```