#sudo pip3 install adafruit-circuitpython-dht

#sudo apt-get install libgpiod2

import time

import board

import digitalio

import adafruit\_character\_lcd.character\_lcd as characterlcd

import adafruit\_dht

import RPi.GPIO as GPIO

# Initial the dht device, with data pin connected to:

dhtDevice = adafruit\_dht.DHT11(board.D19)

# Modify this if you have a different sized character LCD

lcd\_columns = 16

lcd\_rows = 2

# Raspberry Pi Pin Config:

lcd\_rs = digitalio.DigitalInOut(board.D5)

lcd\_en = digitalio.DigitalInOut(board.D6)

lcd\_d4 = digitalio.DigitalInOut(board.D12)

lcd\_d5 = digitalio.DigitalInOut(board.D13)

lcd\_d6 = digitalio.DigitalInOut(board.D16)

lcd\_d7 = digitalio.DigitalInOut(board.D17)

# Initialise the lcd class

lcd = characterlcd.Character\_LCD\_Mono(

lcd\_rs, lcd\_en, lcd\_d4, lcd\_d5, lcd\_d6, lcd\_d7, lcd\_columns, lcd\_rows)

if \_\_name\_\_ == '\_\_main\_\_':

while True:

try:

# Print the values to the serial port

temperature\_c = dhtDevice.temperature

temperature\_f = temperature\_c \* (9 / 5) + 32

humidity = dhtDevice.humidity

print("Temp: {:.1f} F / {:.1f} C Humidity: {}% "

.format(temperature\_f, temperature\_c, humidity))

lcd.clear()

#lcd\_line\_1 = "Temperature:" + str(temperature\_c) + " C"

#lcd\_line\_2 = "\nHumidity:"+ str(humidity) + " %"

#lcd.message = lcd\_line\_1 + lcd\_line\_2;

lcd.message = ("Temper:%.1f C " %temperature\_c)

lcd.message = ("\nHumidity:%.1F " %humidity)

time.sleep(2.0)

except RuntimeError as error:

# Errors happen fairly often, DHT's are hard to read, just keep going

print(error.args[0])

time.sleep(2.0)

continue

except KeyboardInterrupt:

GPIO.cleanup()

print ('Exiting Program')

exit()