

wokwi.com/projects/new/esp32

Excel | Microsoft 365

WOKWI SAVE SHARE Docs S

sketch.ino • diagram.json • Library Manager

libraries.txt

```
1 #include <DHT.h>
2
3 #define DHTPIN 2
4 #define DHTTYPE DHT22
5
6 DHT dht(DHTPIN, DHTTYPE);
7
8 void setup() {
9     Serial.begin(115200);
10    dht.begin();
11 }
12
13 void loop() {
14     float temp = dht.readTemperature();
15     float hum = dht.readHumidity();
16
17     Serial.print("Temp: ");
18     Serial.println(temp);
19
20     Serial.print("Humidity: ");
21     Serial.println(hum);
22
23     delay(2000);
24 }
```

Simulation

00:25.459 99%

Humidity: 40.00
Temp: 24.00
Humidity: 40.00
Temp: 24.00
Humidity: 40.00
Temp: 24.00
Humidity: 40.00

Search

WOKWI SAVE SHARE Docs S

sketch.ino • diagram.json • Library Manager

libraries.txt

```
1 #include <WiFi.h>
2 #include <PubSubClient.h>
3 #include <DHT.h>
4
5 #define DHTPIN 2
6 #define DHTTYPE DHT22
7
8 const char* ssid = "Wokwi-GUEST";
9 const char* password = "";
10 const char* mqtt_server = "test.mosquitto.org";
11
12 WiFiClient espClient;
13 PubSubClient client(espClient);
14 DHT dht(DHTPIN, DHTTYPE);
15
16 void setup_wifi() {
17     Serial.print("Connecting to WiFi...");
18     WiFi.begin(ssid, password);
19
20     while (WiFi.status() != WL_CONNECTED) {
21         delay(500);
22         Serial.print(".");
23     }
24
25     Serial.println("\nWiFi Connected!");
26 }
```

Simulation

00:32.958 100%

Humidity: 40.00
Data Sent to MQTT
Temp: 24.00
Humidity: 40.00
Data Sent to MQTT

localhost:1880/#flow/7c308a0bb3f87d4e

Excel | Microsoft 365

Node-RED

Flow 1

```

graph LR
    T1[sensors/temperature] --> H1[Humidity]
    H1 --> T1
    T2[sensors/temperature] --> D1[debug 1]

```

Common Nodes

- inject
- debug
- complete
- catch
- status
- link in
- link call
- link out
- comment

Function Nodes

ESP32 Pinout Diagram:

Detailed description: The diagram illustrates the hardware connection between a DHT22 sensor and an ESP32 module. The DHT22 is shown as a small grey chip with pins. The ESP32 is shown as a larger grey chip with many pins. A red line connects the DHT22's VCC pin to the ESP32's 3.3V pin. A green line connects the DHT22's GND pin to the ESP32's GND pin. A black line connects the DHT22's DATA pin to the ESP32's D2 pin. The ESP32's pinout is detailed, showing various digital and analog pins.