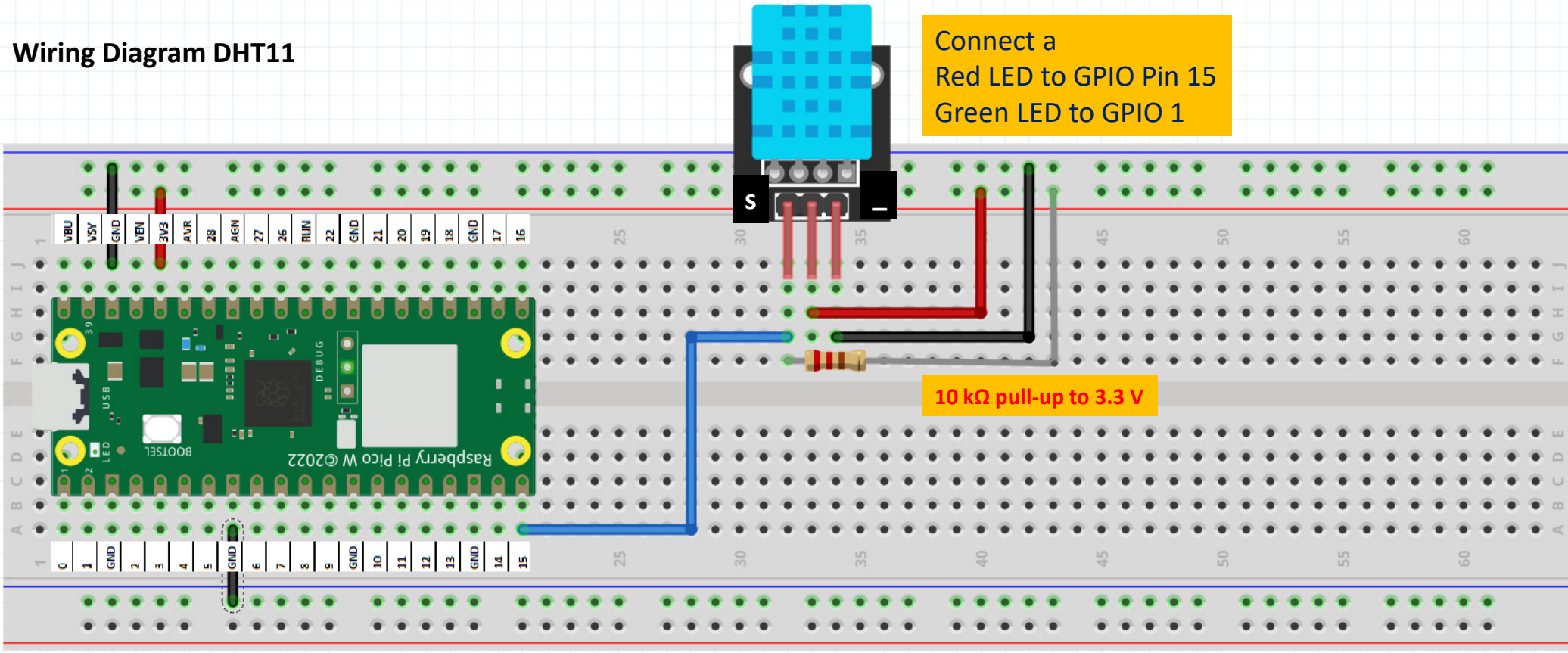
Wiring Diagram DHT11



fritzing

wificonfig.py

```
ssid='ASUS'
password='Study090317'

whatsapp_phone_no="6591080064"
whatsapp_api_key="5854910"

```

wificonfig.py should contain your access point ssid/password
And Whatsapp API key and the Phone number you used to register

```
Traceback (most recent call last):
  File "<stdin>", line 41, in <module>
  File "dht.py", line 1, in measure
OSError: [Errno 110] ETIMEDOUT
```

If you see this error message in the shell. Plug out the usb cable and Reconnect the pico again.

Demo Whatsapp Alert

dht11_whatsapp.py

Practical Application : Monitoring an Event

Creating a Thingspeak Account

Signing up for a **ThingSpeak** account is straightforward. Here's a step-by-step guide:

Step 1: Go to the ThingSpeak website

Open your browser and go to:
https://thingspeak.com ↗

Step 2: Click "Sign Up"

- On the top right corner of the homepage, click **Sign Up**.

Step 3: Fill in your information

- **Name**: Your full name or nickname
- **Email**: Your valid email address
- **Username**: Choose a unique username
- **Password**: Set a secure password
- Accept **Terms of Service** and **Privacy Policy**

Step 4: Verify your email

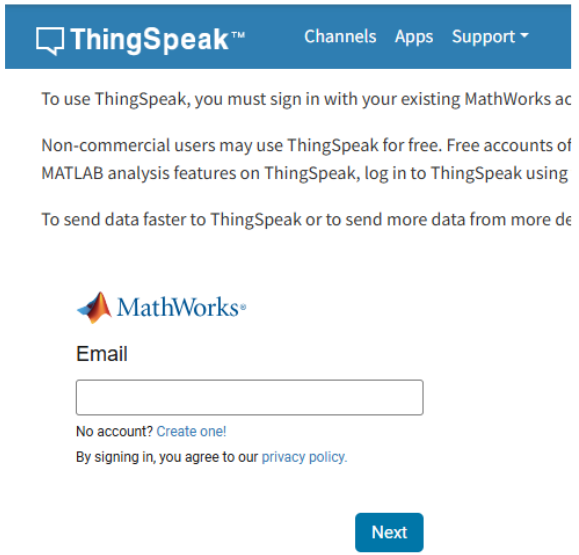
- After signing up, ThingSpeak will send a **verification email**.
- Open your email inbox, find the email from ThingSpeak, and **click the verification link**.

Step 5: Log in

- Return to https://thingspeak.com ↗
- Click **Log In** and enter your username/email and password.

Logging into Thingspeak

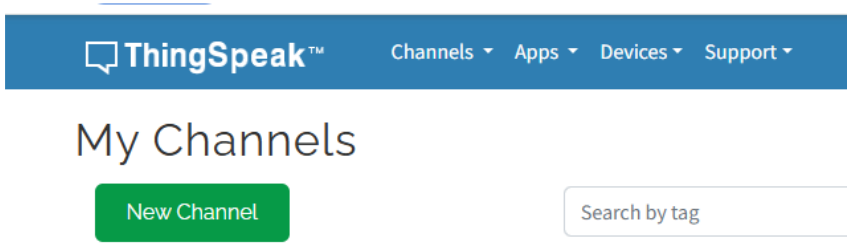
Go to:
https:/www.thingspeak.com/login



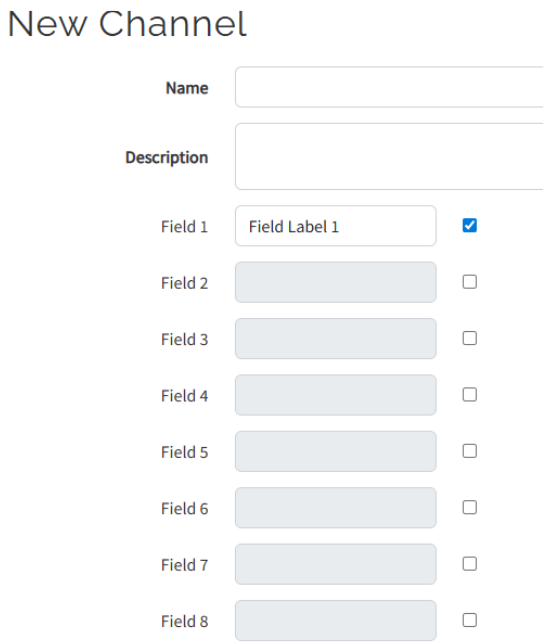
Enter the email address you used to create the account and click the [Next] button.

Enter your password and click [Sign In] to access Thingspeak

Creating a Thingspeak Channel



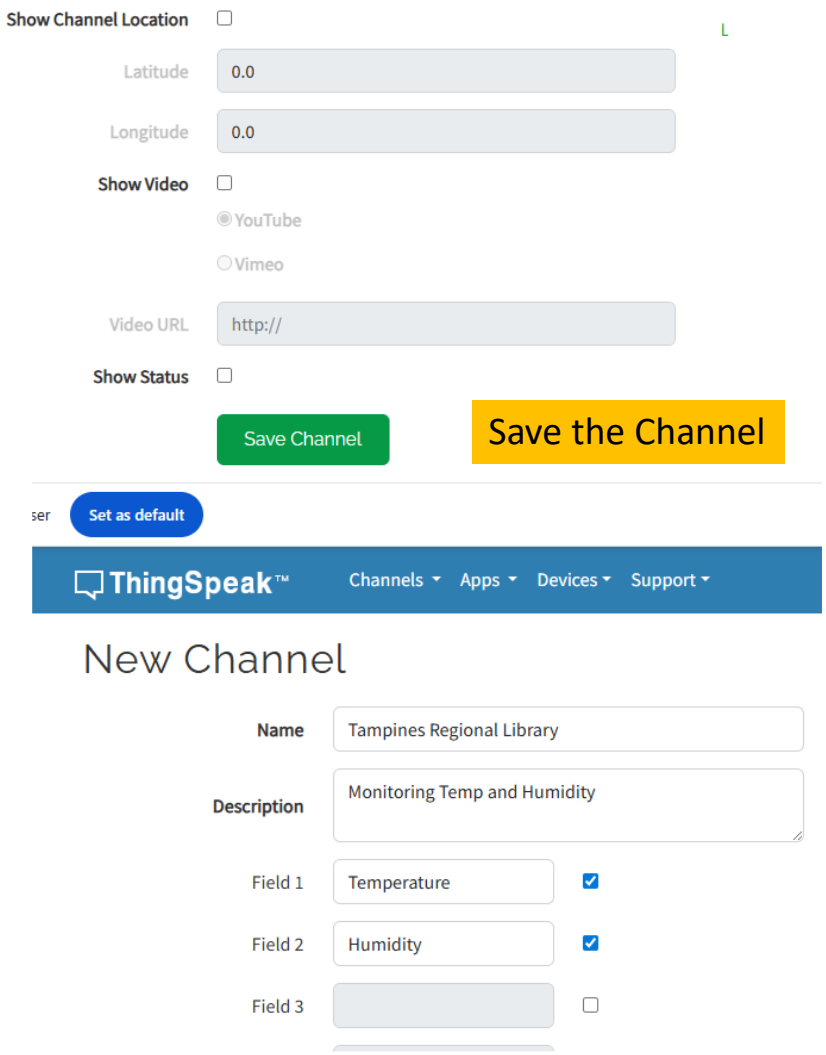
Click [New Channel]



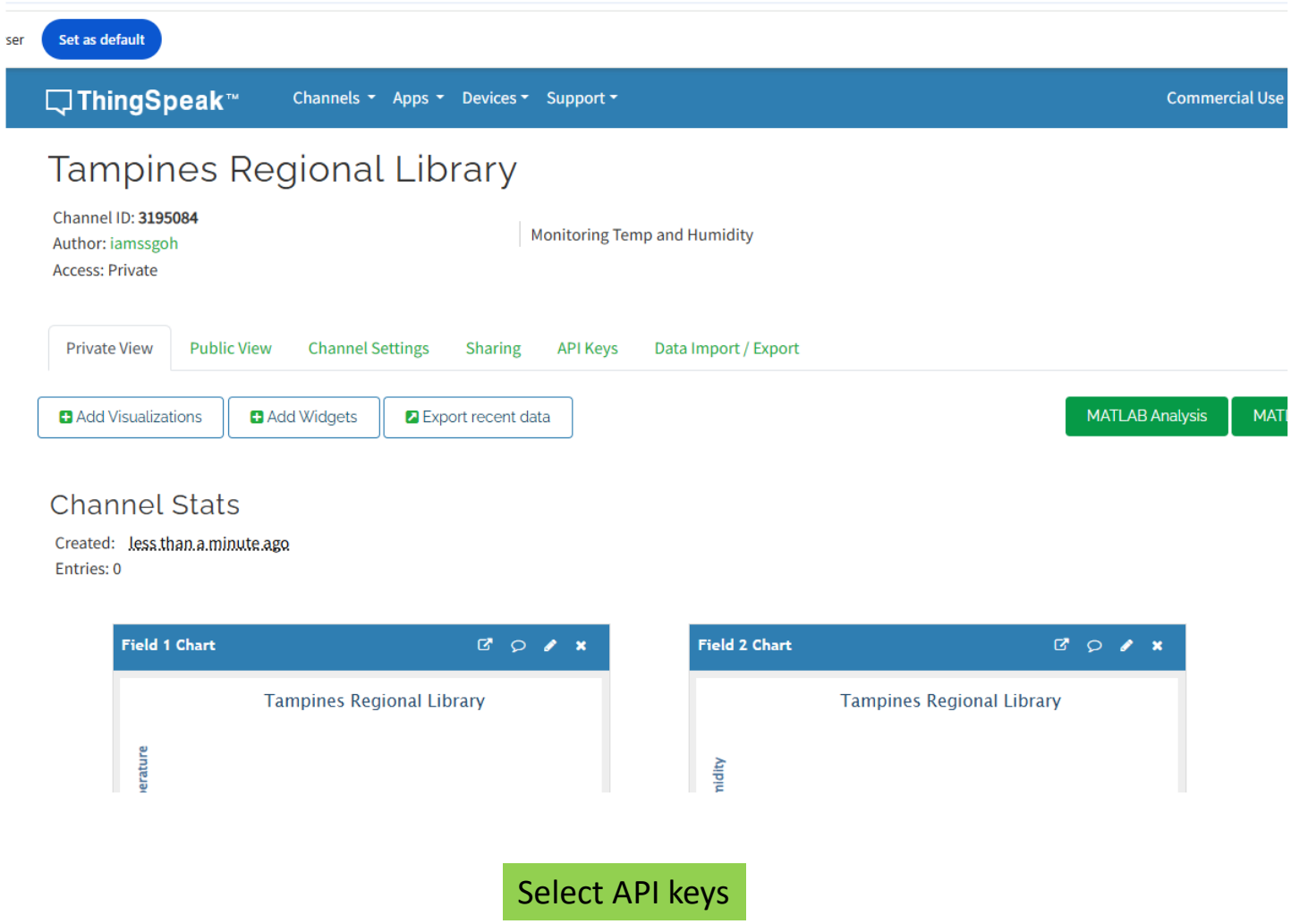
Give it a name and provide some description

Create the data fields you are collecting for visualization.
E.g.
Field 1 = Temperature
Field 2 = Humidity

Creating a Thingspeak Channel

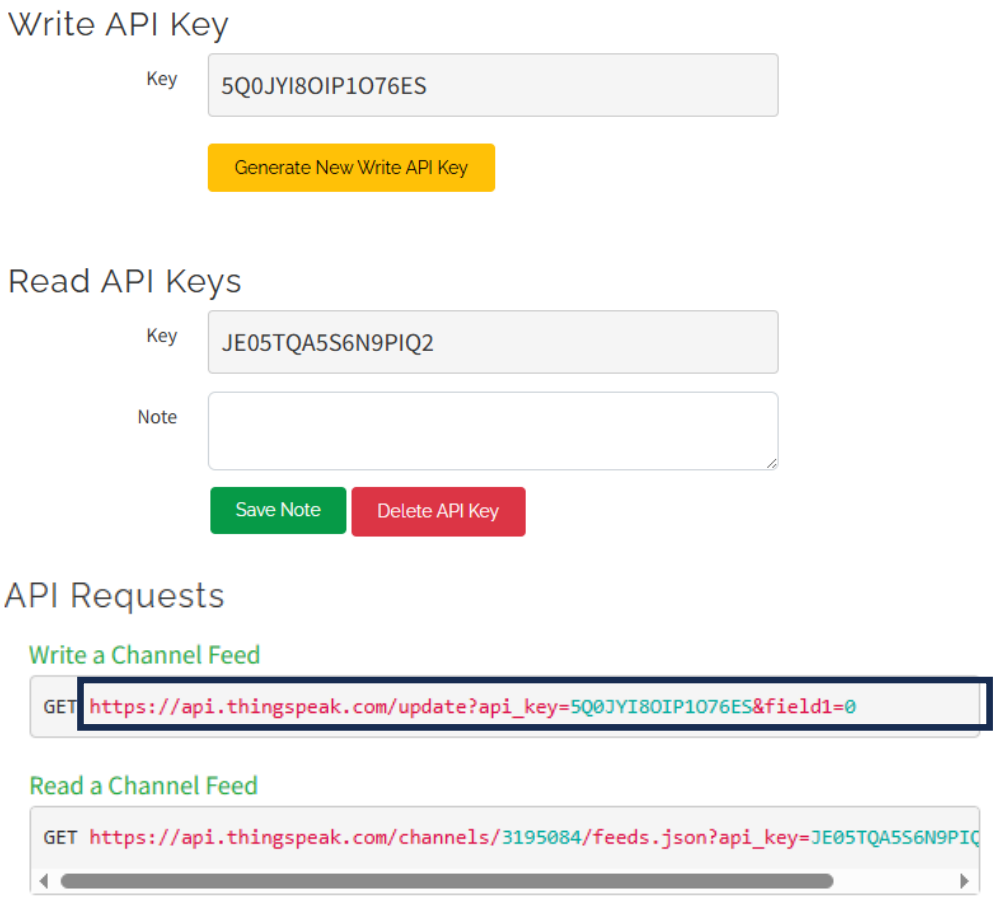


Getting the Channel API
And API key



Select API keys

Getting the Channel API
And API key

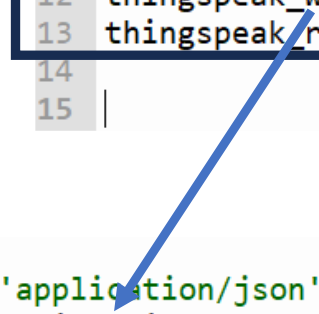



```
request = urequests.post( 'http://api.thingspeak.com/update?api_key=' + THINGSPEAK_WRITE_API_KEY, json = readings, headers = HTTP_HEADERS )
```

Save API keys to wificonfig.py

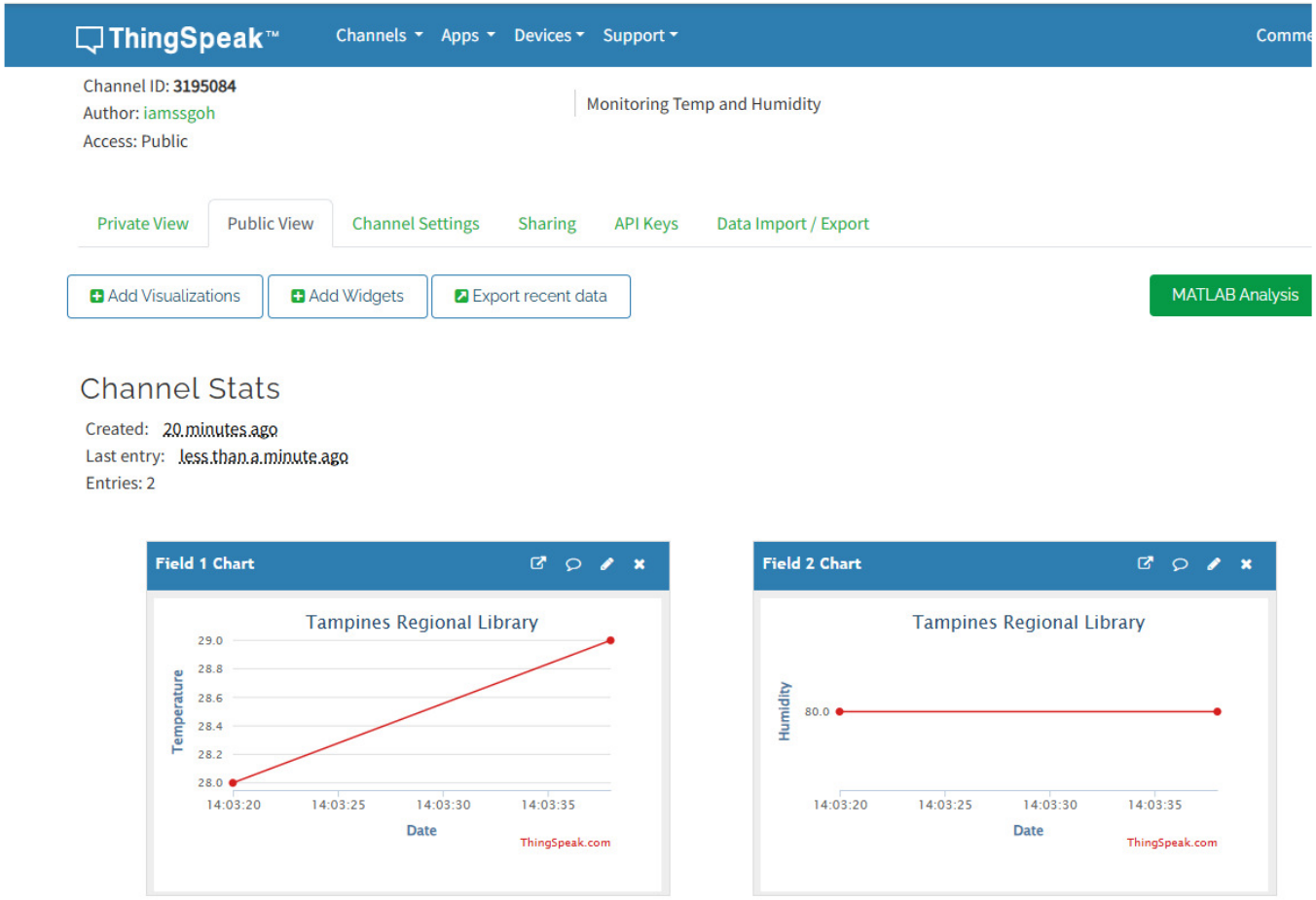
wificonfig.py

```
1  ssid='ASUS'
2  password='Study090317'
3
4  whatsapp_phone_no="6591080064"
5  whatsapp_api_key="5854910"
6
7  mailjet_api_key="8e1996475f43d56c0a186b9ab65394fb"
8  mailjet_secret_key="d8586c5c77b4962c226e5c490078a03f"
9  email_address="iamssgoh@gmail.com"
10 email_sender="ssgoh"
11
12 thingspeak_write_api="5Q0JYI8OIP1O76ES"
13 thingspeak_read_api="JE05TQA5S6N9PIQ2"
14
15
```



```
24
25 HTTP_HEADERS = {'Content-Type': 'application/json'}
26 THINGSPEAK_WRITE_API_KEY = wificonfig.thingspeak_write_api
27
```

Visualization



Demo Gmail alert using Mailjet

dht11_gmail.py
email_utils.py