



ACCUTEMPERATURE

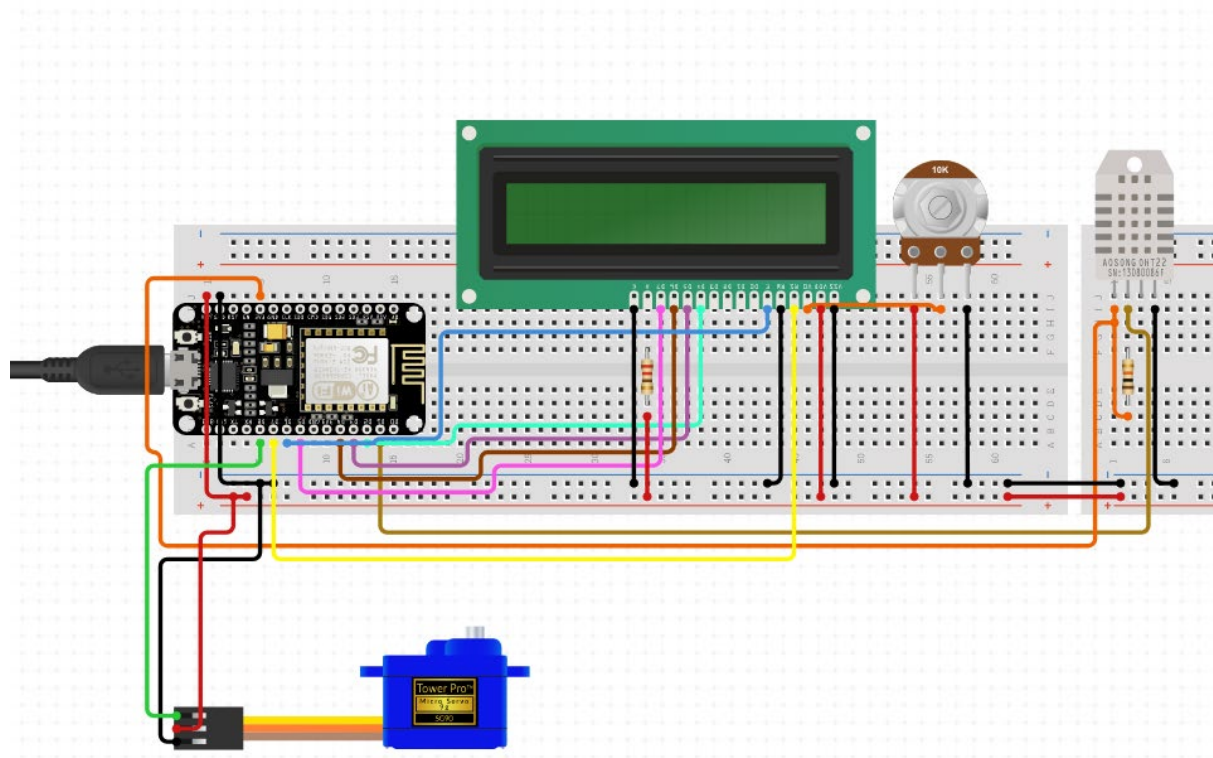
USING IOT TO GET TEMPERATURE
DATA ON TEXT AND WHATSAPP ON
COMMANDING GOOGLE ASSNT.

PROJECT BY:

SAI SHANMUKH MADUMURI

Our ostensible goal is whenever a command is given to google assistant asking the temperature and humidity in our room we gets a WhatsApp message showing information we were asked , we contemplated this using Twilio WhatsApp Helper Library to send information(data packets) from a NodeMCU to my phone as WhatsApp messages by transferring information through a webhook initially. In this way, we were able to create template messages with the data coming from NodeMCU through an HTTP Get Request to send them as WhatsApp messages via Twilio API.if we give a command to google assistant in your phone. It was made possible through ifttt.

Circuit Diagram:



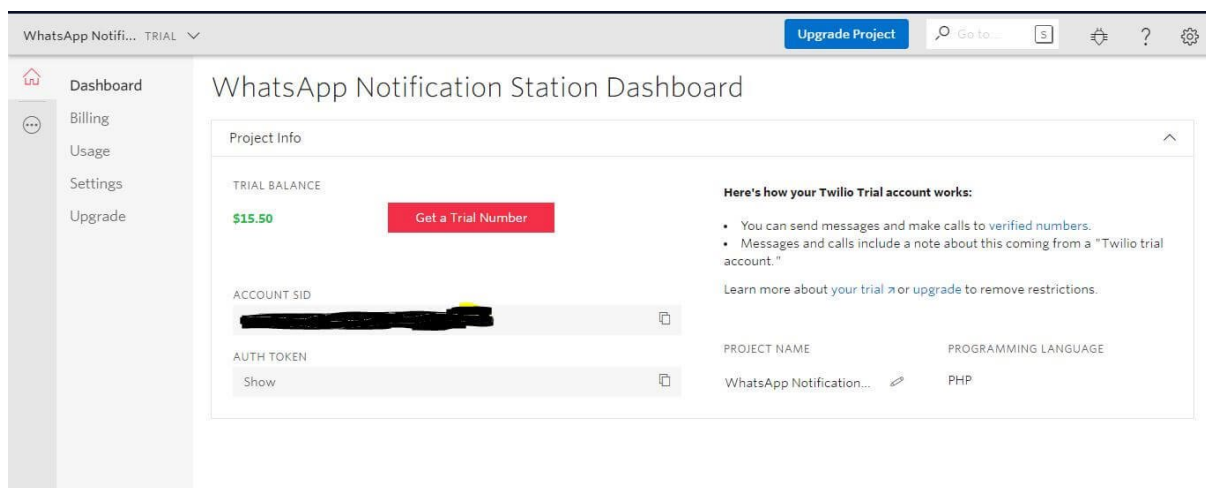
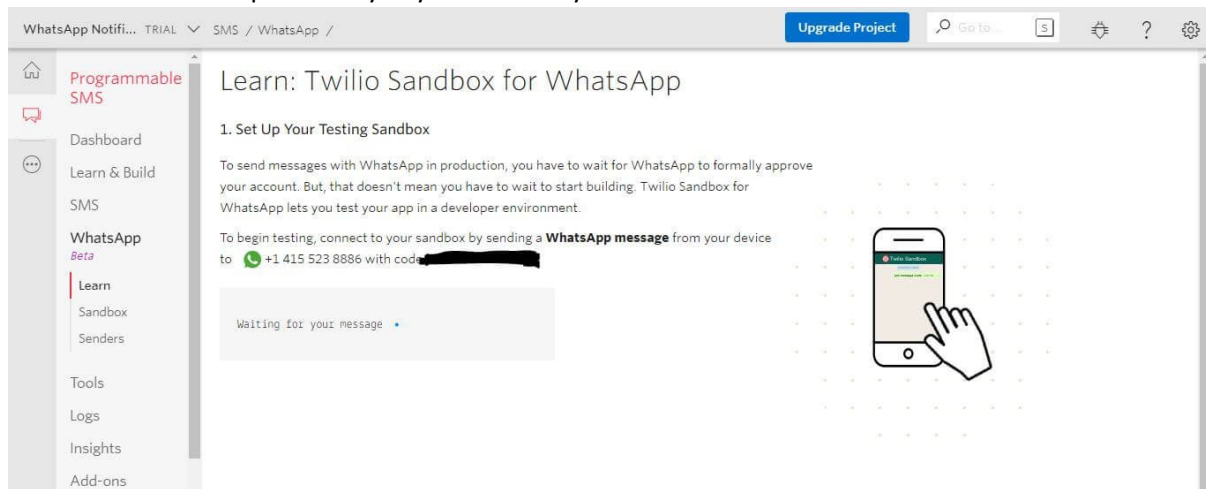
Required Libraries:

For NodeMCU boards.

For DHT11 Temperature and Humidity Sensor,

Twilio

if you want to use the localhost or any other link provider to create a webhook, but first, you have download Twilio Helper Library in your directory.



create a webhook to transmit data packets

In this project, the webhook gets information from NodeMCU through an HTTP Get Request.

By using this web application, you can connect directly to your Twilio account to send WhatsApp messages via ESP8266, Raspberry Pi, or any other device that is compatible with the operating system.

It is just a simple webhook requiring five parameters defined below.

1) Twilio Account SID

2) Twilio Account AUTH TOKEN

3) Message Body

4) From: Dedicated Business Phone Number(Shared)

5) To: Your Verified Phone Number

Note: Normally, you would have to enter the plus sign(+) and the country code, followed by the full phone number, like this +14081234567.

But, while sending information from your device to your phone through this web application(WhatsApp Webhook), enter the number like this 14081234567 without the plus sign(+).

For more information about this application and getting an auto-generated webhook, click the link below.

Go to WhatsApp Webhook.

But, to manage that, you have to download Twilio PHP Helper Library at your directory from here.

After creating a webhook and joining a shared number, when the webhook is triggered, you can transmit data packets as WhatsApp messages from NodeMCU to your verified phone.

Ifttt command1:

Integrate other services on IFTTT with your DIY projects. You can create Applets that work with any device or app that can make or receive a web request. If you'd like to build your own service and Applets, [check out the IFTTT platform](#).

**If Maker Event
"whatsapp_bot",
then Send an SMS
to 919381374776**

by [sai6789op](#)

 Connected

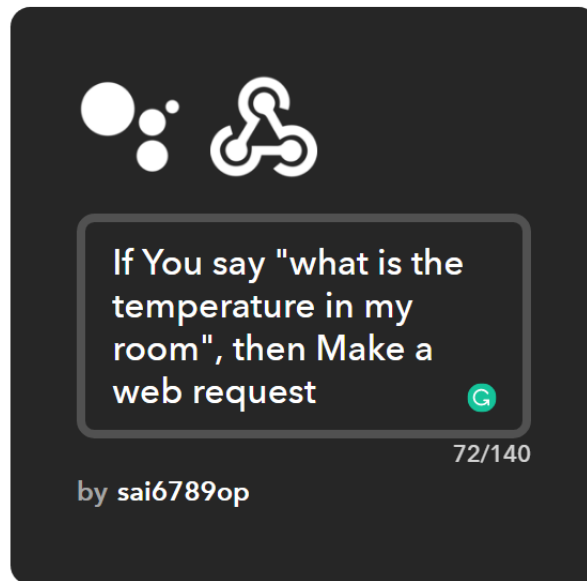


Now, another command that we focus on is getting the data accessible when requested to google assistant.

If we request google assistant "what is the temperature in my room" it should send a whatsapp message from the business account of which we mentioned earlier.

Review and finish

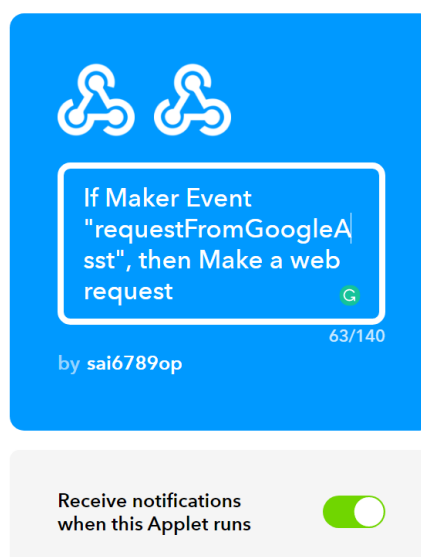
Step 6 of 6



On requesting, the google assistant sends a request to a webhooks URL and evokes it.

On progression, this webhooks server evokes and sends data to another URL and here a local server is created that can be seen as indicated in XAMPP.

Step 6 of 6



Your key is: **[REDACTED]**

[Back to service](#)

To trigger an Event

Make a POST or GET web request to:

```
https://maker.ifttt.com/trigger/whatsapp_bot/with/key/[REDACTED]
```

With an optional JSON body of:

```
{ "value1" : "[REDACTED]", "value2" : "[REDACTED]", "value3" : "[REDACTED]" }
```

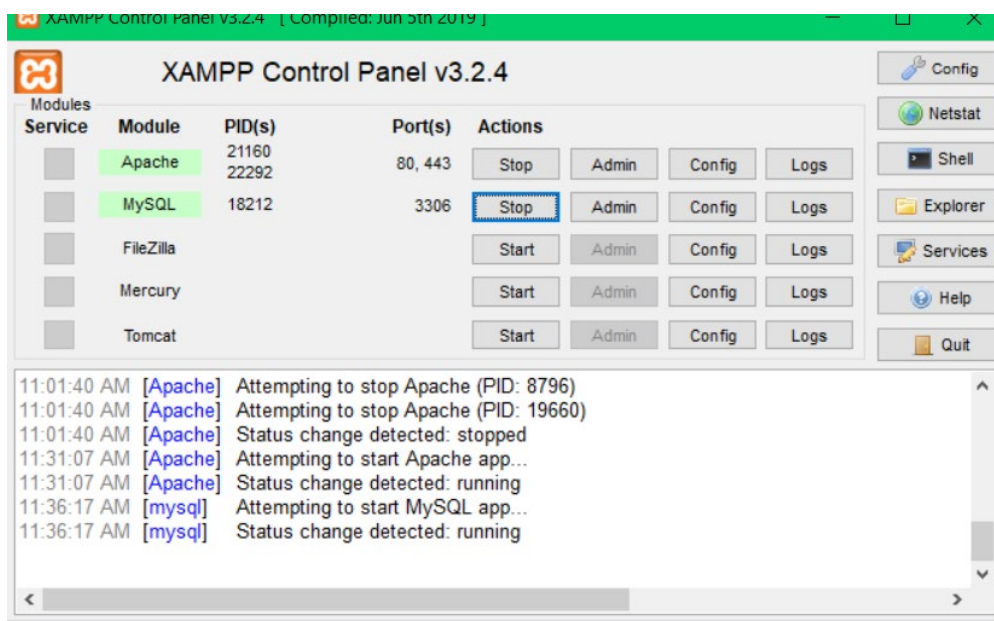
The data is completely optional, and you can also pass value1, value2, and value3 as query parameters or form variables. This content will be passed on to the Action in your Recipe.

You can also try it with `curl` from a command line.

```
curl -X POST https://maker.ifttt.com/trigger/whatsapp_bot/with/key/[REDACTED]
```

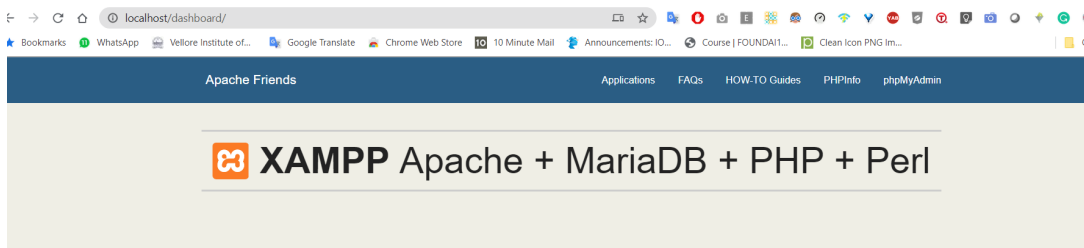
URL that Google assistant triggered using ifttt

For accessing it is necessary that this server is online. For this reason, we use ngrok and command it to make the local server accessible online. That is, the data is sent online and through ifttt again we can send a message through WhatsApp business account using Twilio. All we need to do is to connect the online server as such that it requests Twilio to send a message through WhatsApp.



```
*C:\xampp\htdocs\wappbot\webhooohp.php - Notepad++
Edit Search View Encoding Language Settings Tools Macro Run Plugins Window ?
new 1 Final Projectipynb api.py new 2 webhooohp.php webhooohp.php
1 <?php
2
3 require_once 'C:\xampp\htdocs\wappbot\webhooohp.php';
4
5
6 use Twilio\Rest\Client;
7
8 if(isset($_GET[ACfbfad2ee8918acf077bab27a36ac3ac8]) && isset($_GET[6d76c2a4f9ac79c370162a136730dae9])){
9     $sid = $_GET[ACfbfad2ee8918acf077bab27a36ac3ac8];
10    $token = $_GET[6d76c2a4f9ac79c370162a136730dae9];
11    $twilio = new Client($sid, $token);
12
13    $to = $_GET['to'];
14    $from = $_GET['from'];
15    $body = $_GET['body'];
16
17    $message = $twilio->messages
18        ->create(919381374776.$to,
19            array(
20                "from" => 12019756599.$from,
21                "body" => $body
22            )
23        );
24    echo 'Message Send...';
25}
```

PHP code to get and post request to our local server



Welcome to XAMPP for Windows 7.4.6

You have successfully installed XAMPP on this system! Now you can start using Apache, MariaDB, PHP and other components. You can find more info in the FAQs section or check the HOW-TO Guides for getting started with PHP applications.

XAMPP is meant only for development purposes. It has certain configuration settings that make it easy to develop locally but that are insecure if you want to have your installation accessible to others. If you want have your XAMPP accessible from the internet, make sure you understand the implications and you checked the FAQs to learn how to protect your site. Alternatively you can use WAMP, MAMP or LAMP which are similar packages which are more suitable for production.

Start the XAMPP Control Panel to check the server status.

Community

XAMPP has been around for more than 10 years – there is a huge community behind it. You can get involved by joining our Forums, or by contributing to the XAMPP project on GitHub.

Local Server running in our device on port 80 as XAMPP control panel displayed


```
Select D:\test\ngrok.exe - ngrok http 80
ngrok by @inconshreveable (Ctrl+C to quit)

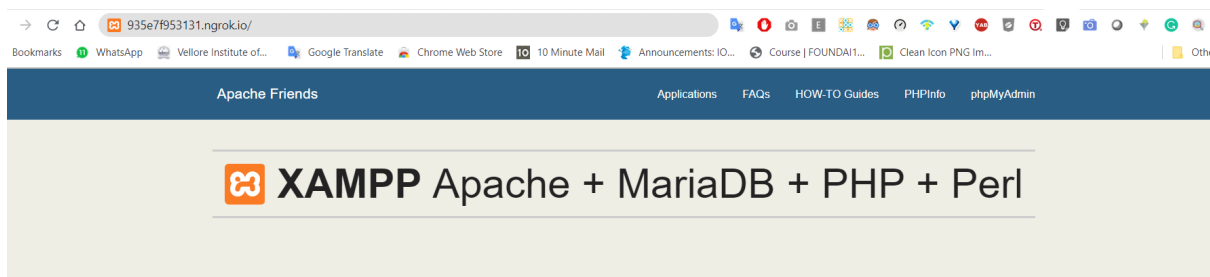
Session Status      online
Session Expires     4 hours, 44 minutes
Version             2.3.35
Region              United States (us)
Web Interface        http://127.0.0.1:4040
Forwarding           http://935e7f953131.ngrok.io -> http://localhost:80
Forwarding           https://935e7f953131.ngrok.io -> http://localhost:80

Connections          ttl    opn    rt1    rt5    p50    p90
                   9      0      0.00   0.00   7.73   20.56

HTTP Requests
-----
GET /                302 Found
GET /dashboard/images/favicon.png 200 OK
GET /dashboard/images/social-icons.png 200 OK
GET /dashboard/images/fastly-logo.png 200 OK
GET /dashboard/images/bitnami-xampp.png 200 OK
GET /dashboard/images/xampp-logo.svg 200 OK
GET /dashboard/images/xampp-logo.svg 200 OK
GET /dashboard/javascripts/all.js 206 Partial Content
GET /dashboard/stylesheets/all.css 206 Partial Content
GET /dashboard/javascripts/all.js 206 Partial Content
```

Running ngrok to bring our local server Online so that it can access from anywhere

Now our local server is on internet with url >><http://935e7f953131.ngrok.io/>



Welcome to XAMPP for Windows 7.4.6

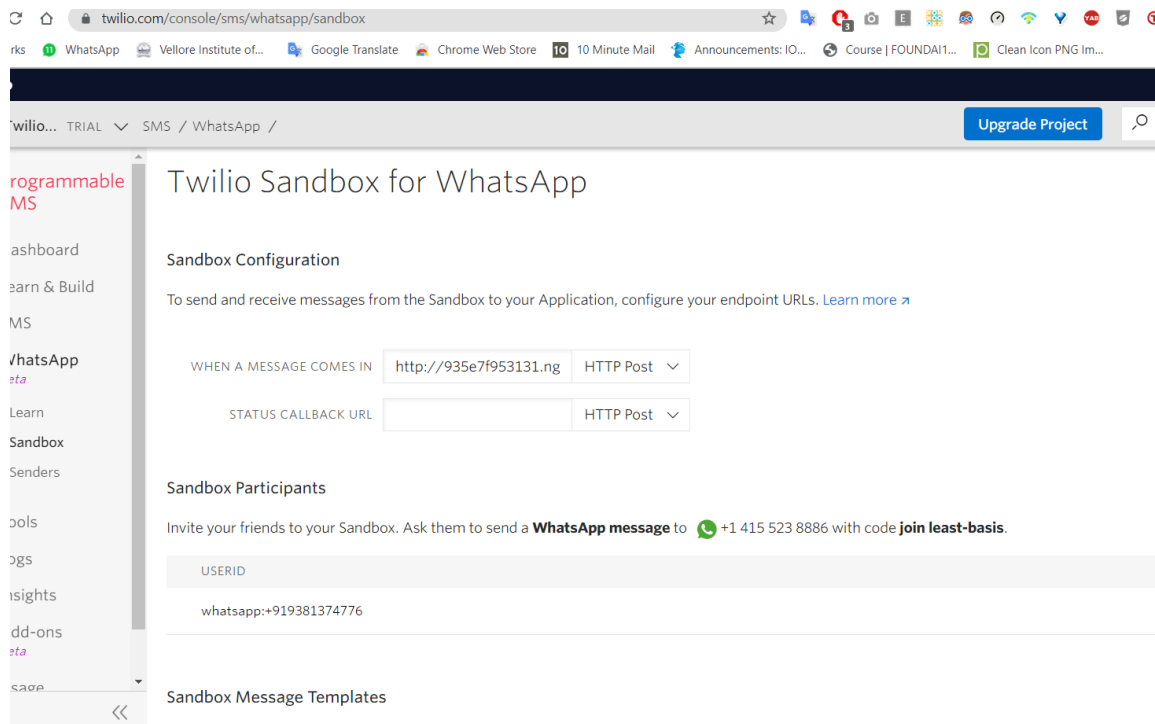
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Community

And hence the data that we initially got in the hardware now is accessible through text message and also WhatsApp.



Basically,

The URL creates a local server that runs in our local device. This is shown in XAMPP. Now for accessing we put this local server on internet using ngrok. Ngrok URL is now used by Twilio so as to send message. To send to Twilio we use PHP code that processes the data and send it to Twilio's for further getting a message on WhatsApp as required.