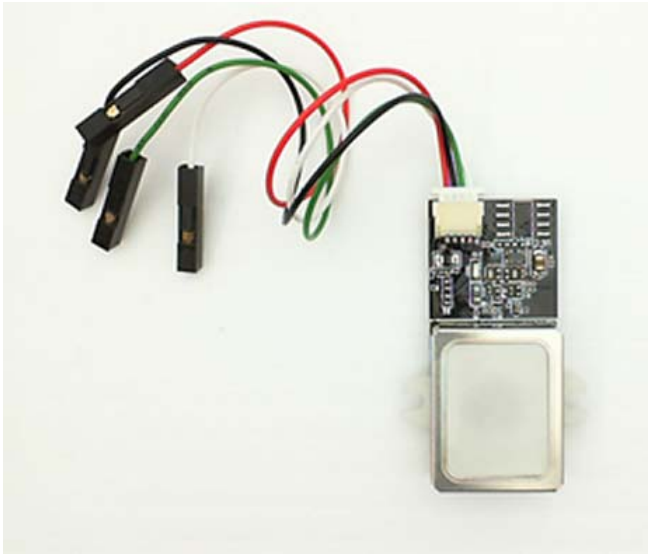
Connection guide for GT-511C3 Fingerprint Scanner and Raspberry Pi 2 Model B

I have a Fingerprint Scanner - TTL (GT-511C3)

and I want to connect that with Raspberry Pi 2 Model B, through GPIO. I have referred this website, to understand what input will go for different pins on that scanner, and referred this to understand how GPIO works in Raspberry. Below image will have a connector and 4 individual pins to connect my PI on Pins [1, 17, 9 and 2]. Now, my **doubt** should I directly connect those black female connector to Pi GPIO male connector, or do I need a bread board to do that.

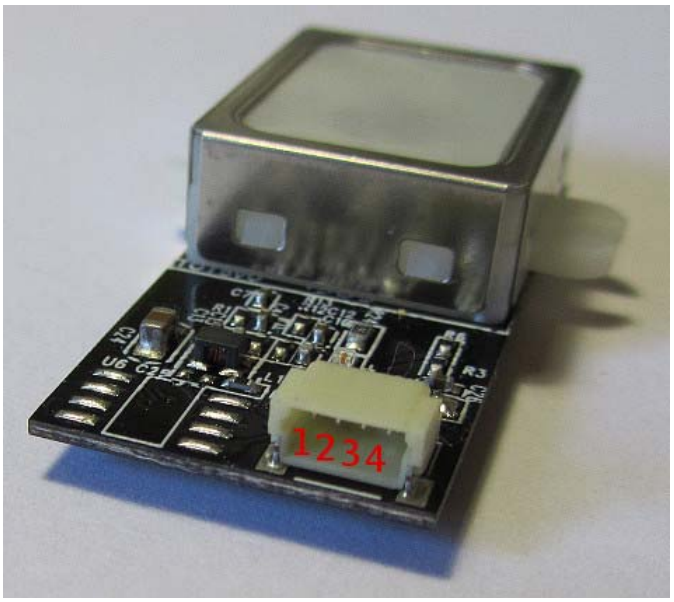
This is the only device I'll be connecting to my Pi.

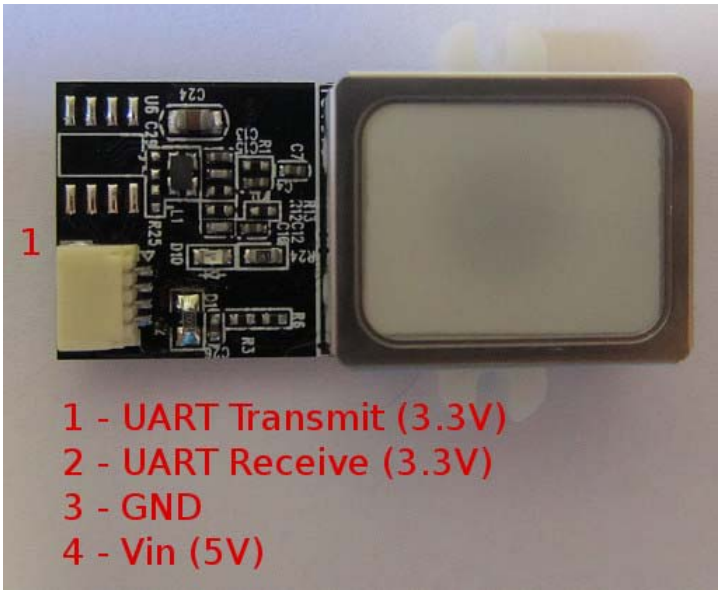


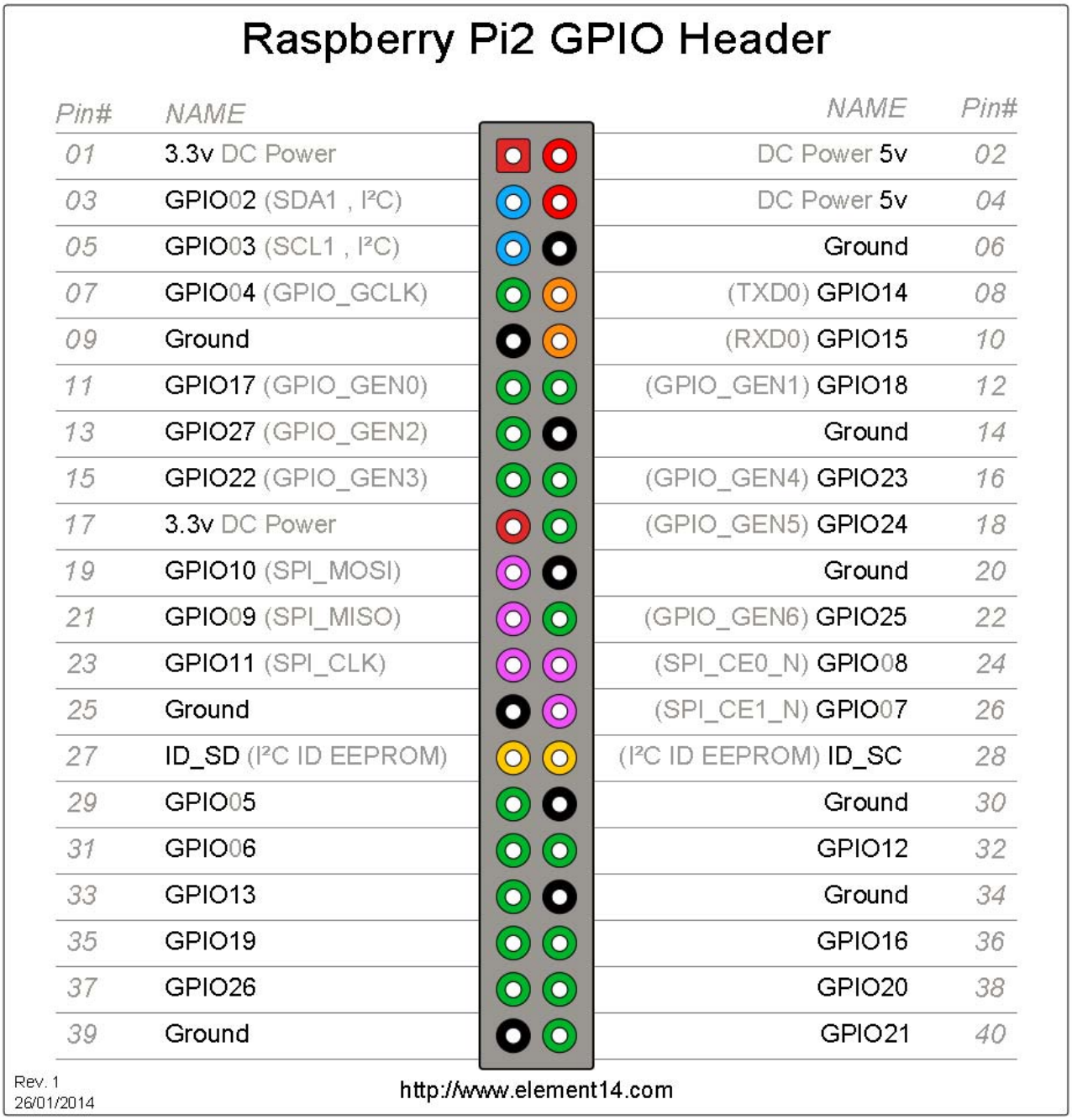
P.S. I don't have much of a hold in electronics, so I just want to be sure. + I asked the same question on electronics.stackexchange, but got 0 fruitful response.

I have even looked here, as it is something similar to my case, but the approved answer is saying to connect the device on 14 and 15 pin, which I'm not sure, as it will provide ground and IO, but no power.

Image(s) for Finger Print Male Connectors:







pi-2 electronics cable

edited Mar 16 '16 at 9:02

asked Mar 16 '16 at 8:33

Gaurav Dave
170 12

2 Answers

I have connected the `Raspberry Pi Zero` to the `GT511-C3` , and made a simple GUI for it. You can get the connection pin guide from the previous answer.

Here is the Python code on GitHub. Sorry I cannot paste the code here because the package spans several files.

I think the following connection diagram should be working:

```
----------------------                 -------------------------
GT-511C3     Tx (1)--|-----------------|--(10) RxD   R-Pi
             Rx (2)--|---.-----/\/\----|--(8)  TxD
                     |   |    1kOhm    |
```

```
                    |   \            |
                    |   /            |
                    |   \ 2kOhm      |
                    |   |            |
           Gnd (3)--|---.------------|--(6) Gnd
            5V (4)--|----------------|--(2) 5V
---------------------                ------------------------
```

answered Oct 22 '16 at 3:53

RafazZ
126 1

The pictured module has the following connections.

> Vcc, GND, Tx, Rx.

You need to make the following connections.

- 1 Transmit needs to be connected to pin 10 (GPIO 15, RXD)
- 2 Receive needs to be connected to pin 8 (GPIO 14, TXD)
- 3 GND needs to be connected to a Pi ground pin (pin 6 or 9 or any other ground pin)
- 4 Vcc need to be connected to a Pi 5V pin (pin 2 or pin 4)

edited Mar 16 '16 at 9:05

answered Mar 16 '16 at 8:56

joan
30.9k 2 33 53

@GauravDave Edited answer. – joan Mar 16 '16 at 9:05

That is up to you. Do whatever is most convenient for your circumstances. – joan Mar 16 '16 at 10:02
