Python:

https://raspberrytips.com/python-tutorial-raspberry-pi/

https://duckduckgo.com/?q=raspberry+pi+thonny+tutorial&atb=v321-1&t=chromentp&iax=videos&ia=videos&iai=https%3A%2F%2Fwww.youtube.com%2Fwatch%3Fv%3DGssM7hkwJrc

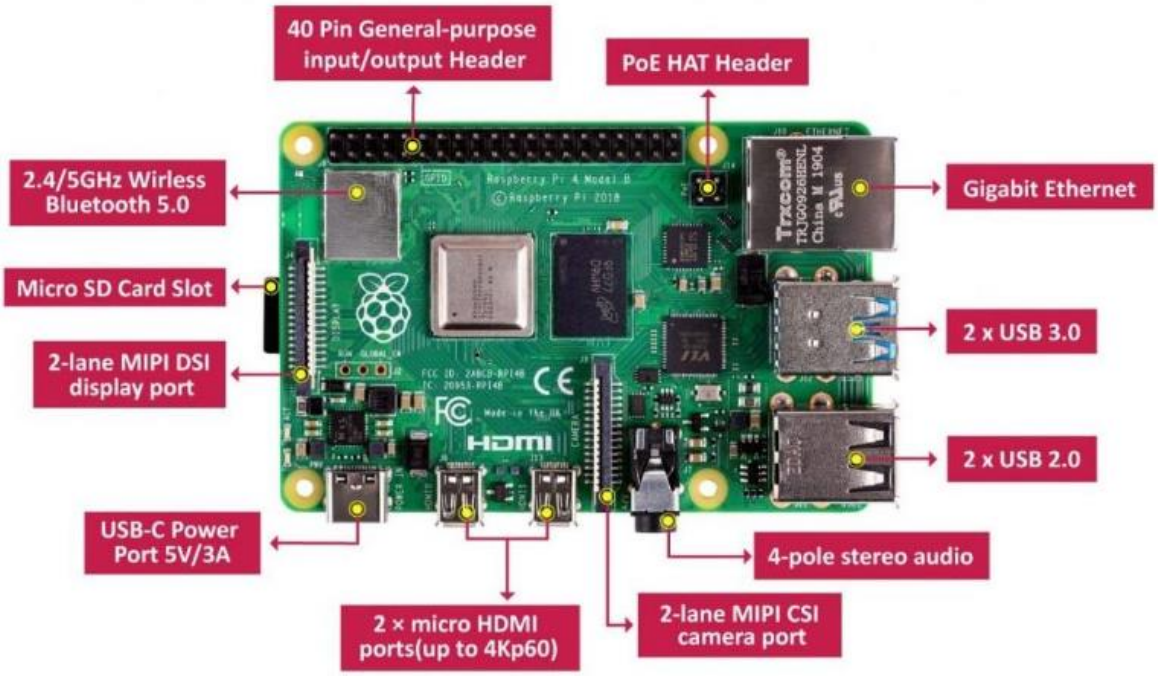
https://duckduckgo.com/?q=raspberry+pi+thonny+blinking+led+tutorial&atb=v321-1&t=chromentp&iar=videos&iax=videos&ia=videos&iai=https%3A%2F%2Fwww.youtube.com%2Fwatch%3Fv%3DOEilz2Cq_xY

Breadboard:

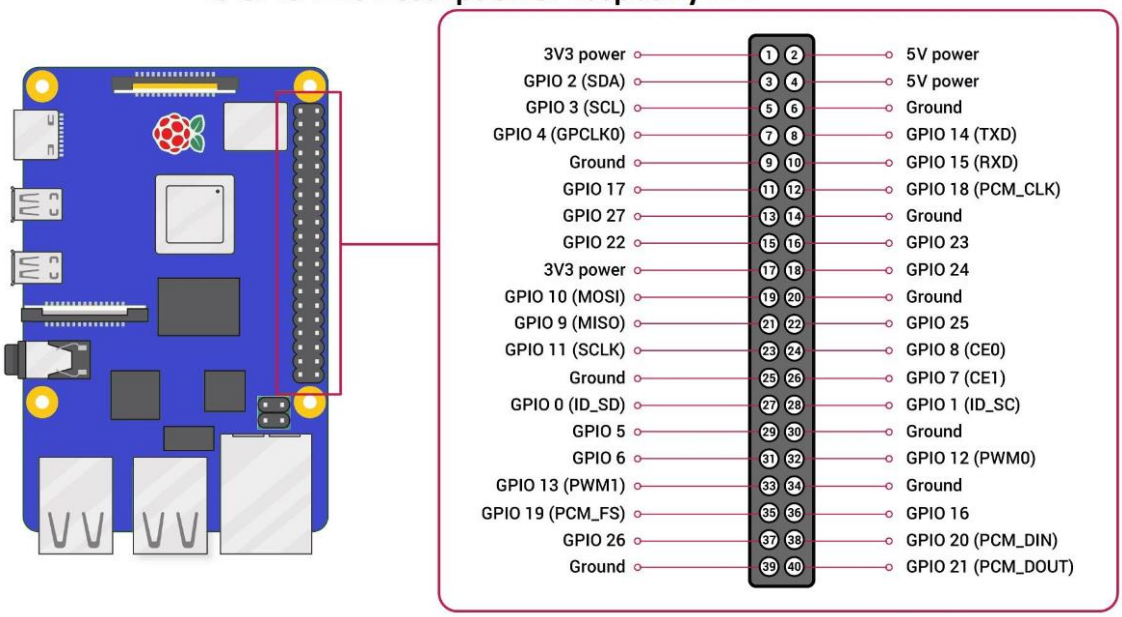
https://magpi.raspberrypi.com/articles/breadboard-tutorial

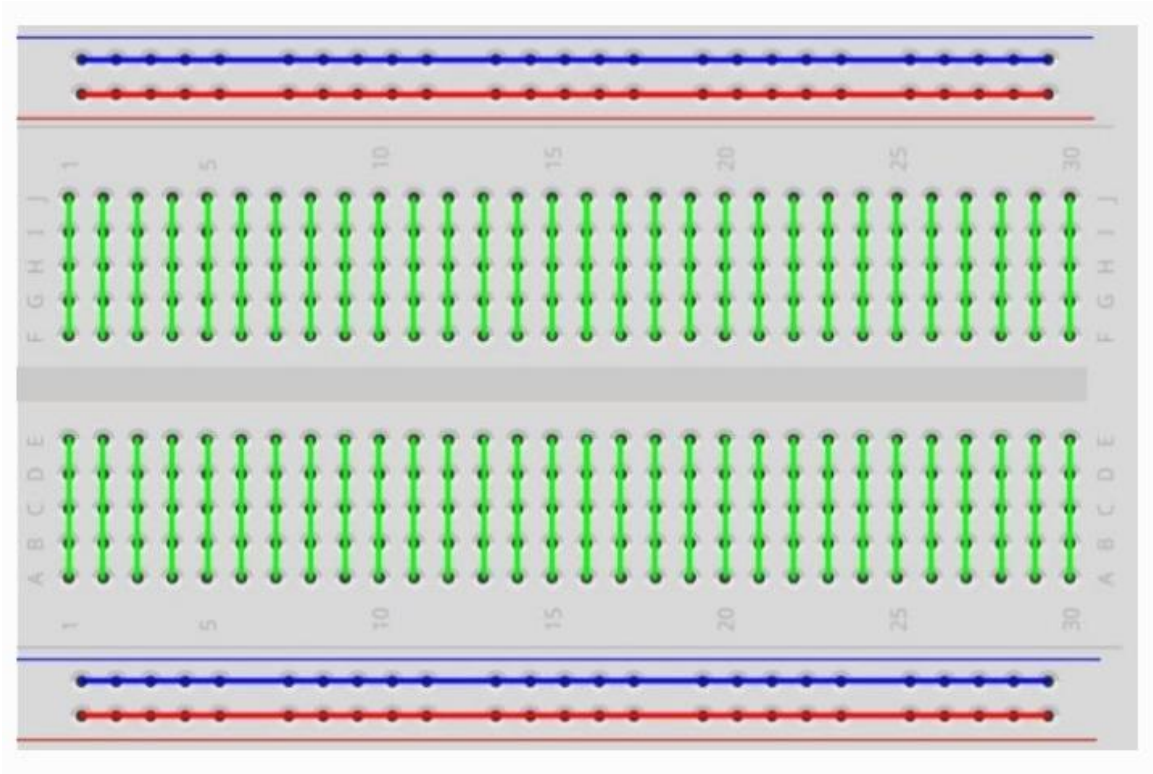
Raspberry Pi:

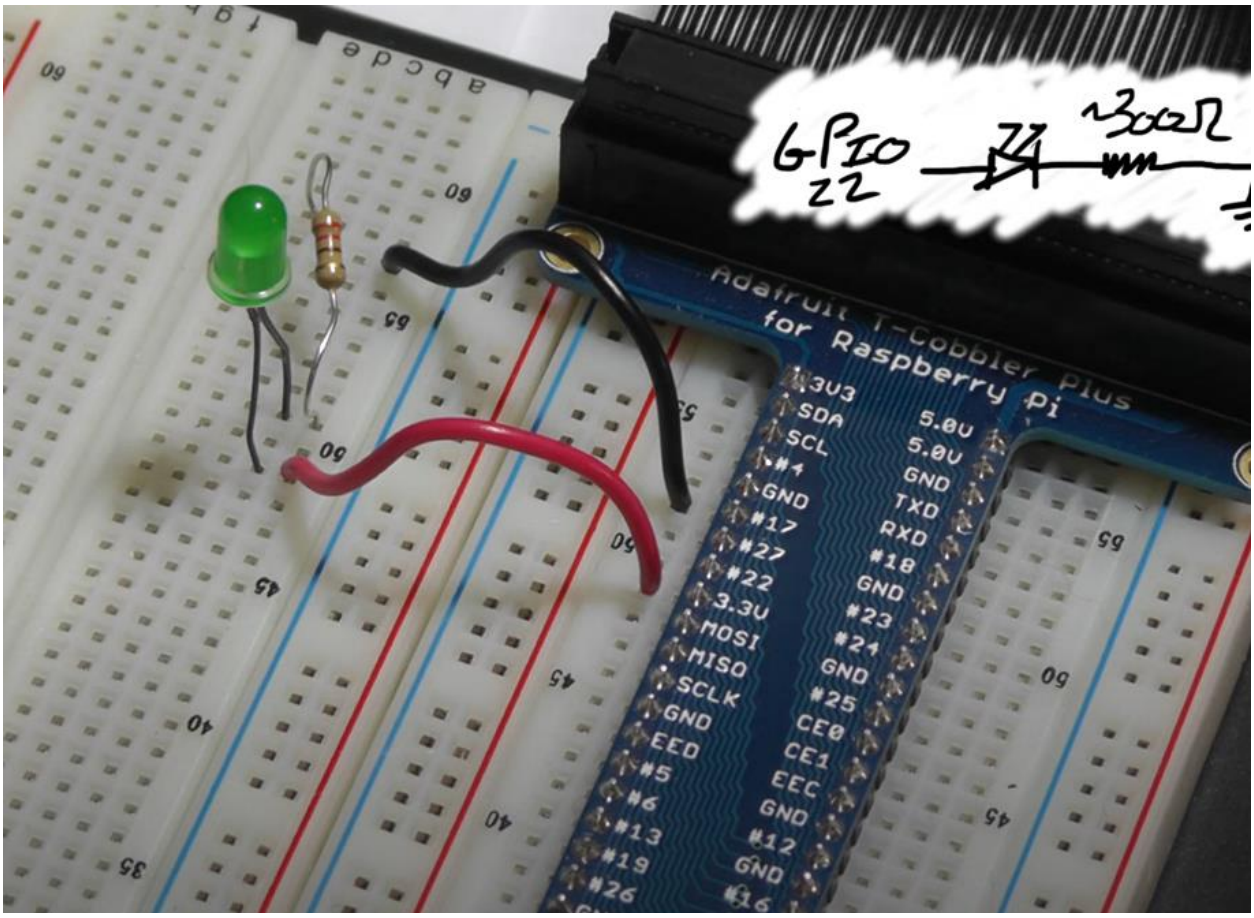
https://www.hackatronic.com/raspberry-pi-4-specifications-pin-diagram-and-description/



40 GPIO Pins Description of Raspberry Pi 4






GPIO
22
~300Ω
Adafruit T-Cobbler Plus
for Raspberry Pi
3V3
SDA
SCL
#4
GND
#17
#27
#22
3.3V
MOSI
MISO
SCLK
GND
EED
#5
#6
#13
#19
#26
5.0V
5.0V
GND
TXD
RXD
#18
GND
#23
#24
GND
#25
CE0
CE1
EEC
GND
#12
GND
#16

PYTHON: BLINK Thonny PROJECT:

```
import RPi.GPIO as GPIO      # Import Pi GPIO library
from time import sleep       # Import the sleep function

GPIO.setwarnings(False)      # Ignore warning
GPIO.setmode(GPIO.BCM)       # Use physical pin numbering
GPIO.setup(22, GPIO.OUT, initial=GPIO.LOW)     # Set pin 22
to be an output pin and set initial value to False(off)

myCounter = 1
while myCounter<5:     # Loop five times

    GPIO.output(22, True)     # Turn on
    sleep(3) # Sleep for 3 seconds
    print('LED on')

    GPIO.output(22, False)     # Turn off
    sleep(1) # Sleep for 1 second
    print('LED off')

    myCounter = myCounter + 1
    print('myCounter')


GPIO.output(22, True)     # Turn on
Print('Done!')
```