* [**Enable I2C**](http://osoyoo.com/2016/06/01/drive-i2c-lcd-screen-with-raspberry-pi/)**:**
  + Sudo raspi-config > 5.Interface Options > P5 I2C
* After rebooting the Pi, we need to modify the module’s config file. Type the following command in terminal:  
  sudo nano /etc/modules  
  Add following two lines in modules file if they do not exist:  
  i2c-bcm2708i2c-dev  
  Then Type Ctrl X and Yes to save the file.
* **Step 3: Step 3 – Install i2c tools**  
  Type following command in terminal:  
  sudo apt-get update && sudo apt-get upgradesudo apt-get install -y python3-[smbus](https://raspberry-projects.com/pi/programming-in-python/i2c-programming-in-python/using-the-i2c-interface-2) i2c-tools

Pip install [smbus2](https://pypi.org/project/smbus2/)sudo reboot

After rebooting the system, type the following command in order to check software installation:  
*lsmod | grep i2c\_*  
You should see i2c\_bcm2708 in a list, this means the library has been installed successfully.

* *sudo i2cdetect -y 1*
* You should see something as follows:  
  0 1  2  3  4  5  6  7  8  9  a  b  c  d  e  f  
  00:             — — — — — — — — — — — — —  
  10: — — — — — — — — — — — — — — — —  
  20: — — — — — — — — — — — — — — — —  
  30: — — — — — — — — — — — — — — — 27  
  40: — — — — — — — — — — — — — — — —  
  50: — — — — — — — — — — — — — — — —  
  60: — — — — — — — — — — — — — — — —  
  70: — — — — — — — —

**NOW YOU CAN USE THE OUTSIDE CODE TO PLAY!**

**REFERENCES:**

<https://github.com/adafruit/Adafruit_CircuitPython_ADS1x15>

<https://github.com/adafruit/Adafruit_CircuitPython_BusDevice>

<https://learn.adafruit.com/adafruit-4-channel-adc-breakouts/python-circuitpython>

<https://learn.adafruit.com/raspberry-pi-analog-to-digital-converters/ads1015-slash-ads1115>

We use the smbus2 i2c library, and i2c\_rdwr func to achieve the desired conversion from adafruit library

<https://pypi.org/project/smbus2/>

<https://raspberry-projects.com/pi/programming-in-python/i2c-programming-in-python/using-the-i2c-interface-2>