

In []:

In [1]:

```
pip install pyaudio
```

Requirement already satisfied: pyaudio in c:\users\shree\anaconda3\lib\site-packages (0.2.12)
Note: you may need to restart the kernel to use updated packages.

In [2]:

```
pip install wave
```

Requirement already satisfied: wave in c:\users\shree\anaconda3\lib\site-packages (0.0.2)
Note: you may need to restart the kernel to use updated packages.

In [24]:

```
import pyaudio
import wave

filename = 'file_example_WAV_1MG.wav'

# Set chunk size of 1024 samples per data frame
CHUNKSIZE = 1024

# Now open the sound file, name as wavefile
wavefile = wave.open ( filename, 'rb' )

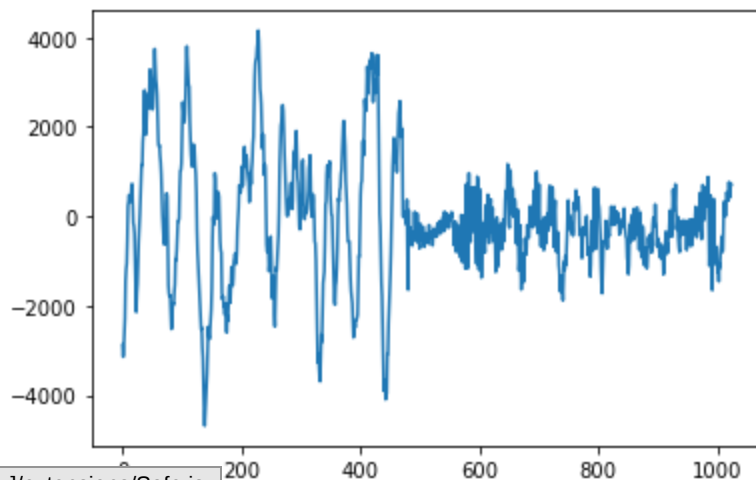
# Create an interface to PortAudio
portaudio = pyaudio.PyAudio ( )

# Open a .Stream object to write the WAV file to play the audio using pyaudio
# in this code, 'output = True' means that the audio will be played rather than recorded
stream = portaudio.open(format=pyaudio.paInt16, channels=1, rate=44100, input=False, frames_per_buffer=CHUNKSIZE)

# do this as long as you want fresh samples
data = stream.read(CHUNKSIZE)
numpydata = np.frombuffer(data, dtype=np.int16)

# plot data
plt.plot(numpydata)
plt.show()

# close stream
stream.stop_stream()
stream.close()
portaudio.terminate()
```



In []: