

Recording Classical Guitar

Rick Alexander - October 2026

Summary



WHY RECORD
YOURSELF?



TYPICAL SETUPS FROM
LOWEST COST/SOUND
QUALITY TO HIGHEST



MICROPHONES (INC
PRICES)



HOW TO SET UP MICS
FOR GUITAR



AUDIO SOFTWARE -
AUDACITY

Why record yourself

It's a lot of fun.

Recording yourself can help you hear more clearly how you're playing.

For helping composition: you can record as a piece of music develops over time.

It's a way to share your playing.

Voice recorder app : low sound quality but simplest for practising



Record yourself and then play back. This will help you hear hesitations, unwanted variations in tempo, unwanted variations in dynamics for example.



These things will stand out more in the playback than they do while you're playing. (This is especially the case the next day or later.)



Recording yourself also helps practice for performance. It raises the stakes a little.



Disadvantage: The sound quality using the voice recorder is not high.

Methods for Higher Quality Recording

In order of cost and recorded sound quality

A computer or phone/tablet is needed for each case.

USB microphone (used with a phone, tablet or computer) (\$160 for the mic.)

Digital recorder with in-built mics (\$240 upwards)

Digital recorder with external mics

(\$300 for recorder. \$300 for a stereo pair of mics. Plus around \$150 - \$250 for mic stand/cables)

USB Audio interface and mics

(\$300 and up for a USB audio interface and \$300 upwards for a stereo pair of reasonable mics. Plus around \$150 - \$250 for mic stand/cables.)

Prices in Australian dollars.

USB Mic with phone/tablet or
computer

USB Mic with PC or tablet



Example of a USB Mic

Blue Yeti 3-Capsule USB Microphone Blue

Product Code: BLU1680 Category Links: Microphones | Gaming Microphones | Recording & Desktop Microphones Brand:



\$158.00

Buy Now Pay Later

openpay zip afterpay

★★★★★ 4.6 (36)
Write a review Ask a question

Colour: Midnight Blue



☐ Add Extra Cover
\$24.00 Repair / Replacement Plan

Quantity — 1 +

Add to Cart

+ Add to My List

Add to Compare



- Many of the USB Mics available seem to be the desk mounted ones like this which are intended for voice/podcasting.
- Can use this type for recording guitar but may prefer to mount the mic on a mic stand. (Examples later.)
- ***Note: all the gear prices in this document are in Australian dollars.***

USB Mic with phone or tablet



This link describes using Rode brand USB microphones with a phone/tablet.

The link notes that you may need to use a powered USB hub in order to supply enough power.

<https://rode.com/en-au/about/news-info/using-a-usb-microphone-with-your-ipad-iphone-or-other-mobile-device>

Digital Recorder



\$315

Zoom H4 Essential 32-Bit Four Track Recorder

Online Stock: In Stock (5+)

■■■ NSW Crows Nest (3) ■■■ VIC Windsor (1) ■■■ QLD Brisbane
 ■■■ VIC Fitzroy (3) ■■■ NSW Alexandria (4) ■■■ WA Perth (3)

zoom Free Shipping Support: 1 Year

ADD TO CART BUY NOW

\$19 Rent from \$3.13/week
afterpay \$78.75 4 payments
ZIP Up to 24 months interest free



\$469

Zoom H5 Handy Recorder

Online Stock: In Stock (5+)

■■■ VIC Fitzroy (1) ■■■ VIC Windsor (1) ■■■ QLD Brisbane (1)
 ■■■ NSW Alexandria (3) ■■■ NSW Crows Nest (1) ■■■ WA Perth (1)

zoom Free Shipping Support: 1 Year

ADD TO CART BUY NOW

\$19 Rent from \$4.66/week
afterpay \$117.25 4 payments
ZIP Up to 24 months interest free

The Zoom brand is the most popular brand of digital recorder. I own an older H4 model plus a H5. Both of these have built in mics but have the option of plugging in external analog mics.

Examples of digital recorders

TASCAM DR-05XP Portable Handheld Recorder

☆☆☆☆☆



FREE SHIPPING

\$239

SKU: DR-05XP

TASCAM

The Tascam DR-05XP is a professional handheld recorder designed for high-quality audio capture. Featuring 32-bit float recording and built-in condenser mics, it's perfect for music, meetings, dictations, and more.

PID: 632

✓ In stock

1

Select Option

	TASCAM DR-05XP Portable Handheld Recorder Selected	\$239
---	---	-------

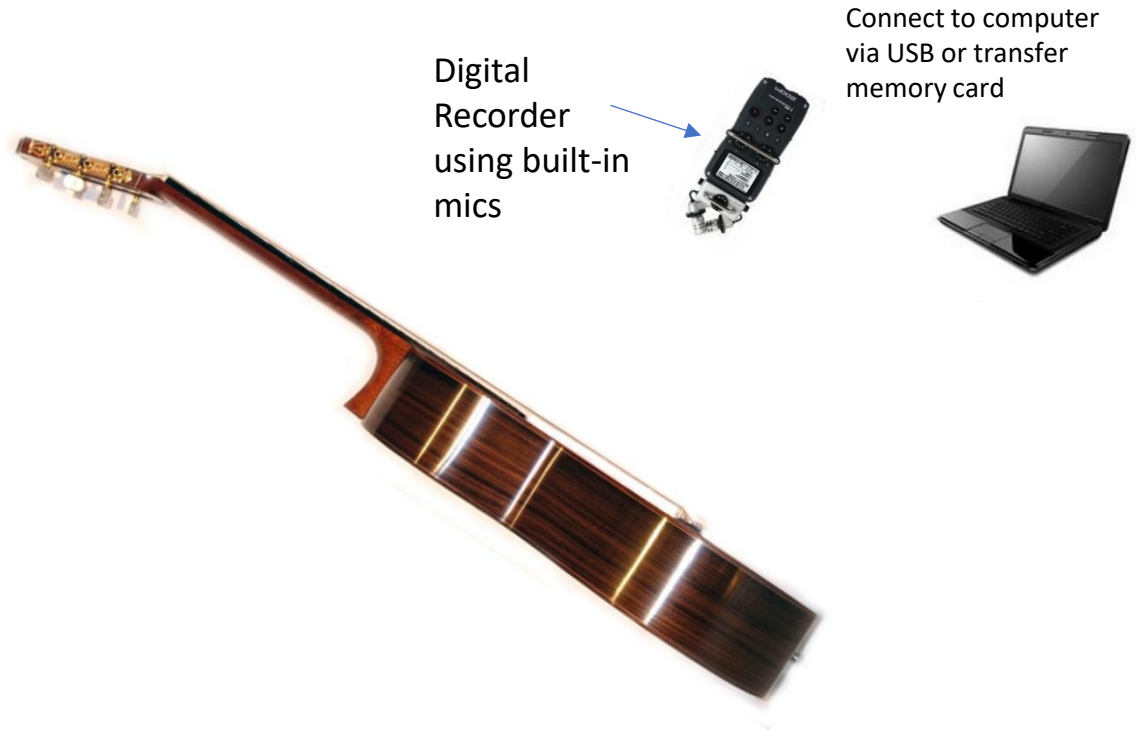
Or Rent From

STUDIO19 DENTALS

This cheaper model only has built in mics.

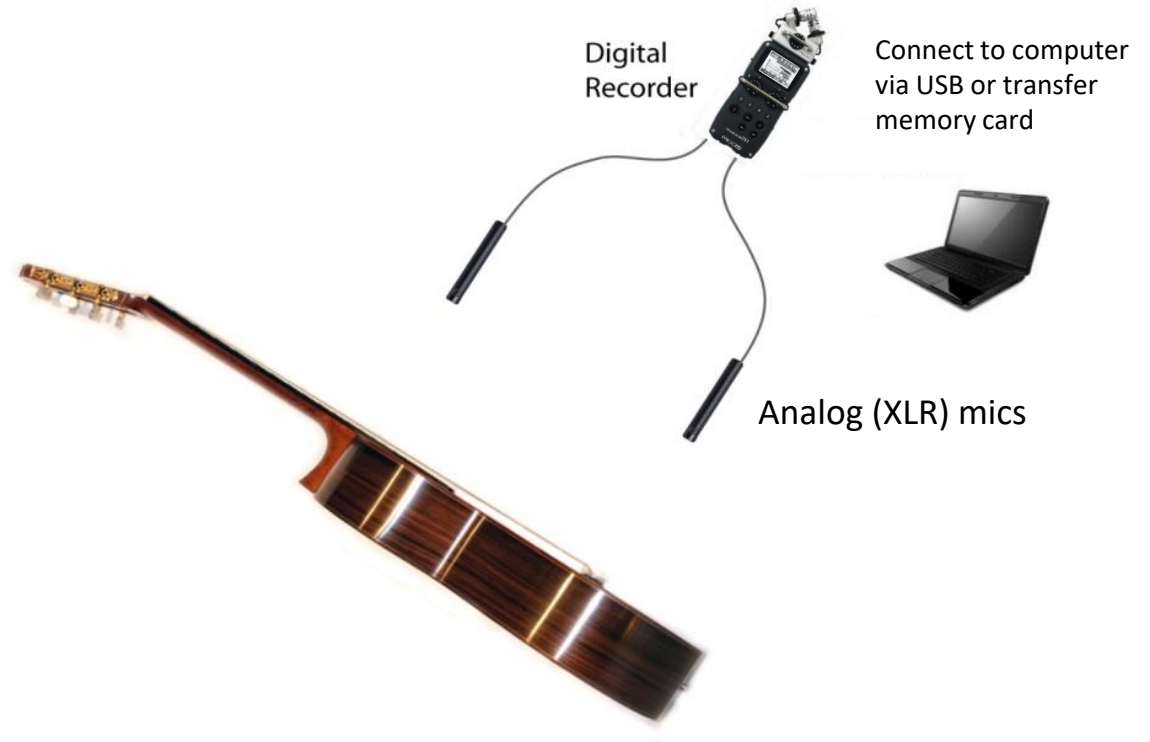
Examples of digital recorders

Digital recorder



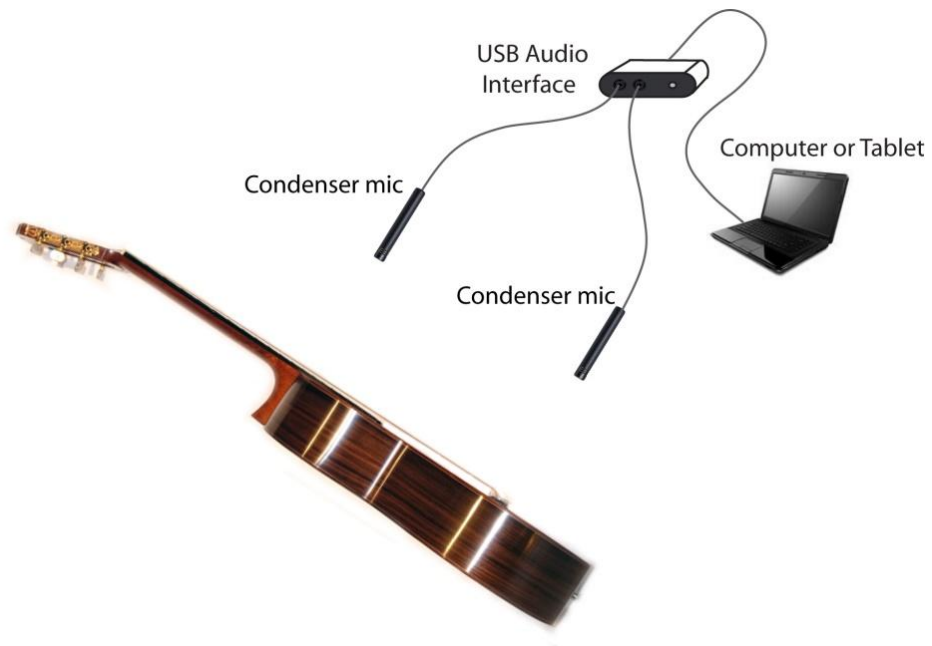
- Digital recorders usually have USB and can act as an audio interface. But they can also work “stand-alone”.
- When connected to a computer using USB and using the built-in mics the recorder is acting as a USB mic.
- Digital recorders make recording away from home easier.
- Zoom brand recorders have a $\frac{1}{4}$ ” thread for mounting on a camera tripod.

Digital recorder with external mics



Highest sound quality:
USB Audio Interface with
microphones

Typical setup for higher sound quality recording



- Two condenser microphones for stereo recording (plus mic stands).
- A USB digital audio interface.
- A computer or tablet.
- Recording software. (E.g. Audacity)
- It's useful to have powered speakers and/or headphones to play back on.

USB mics vs analog (XLR) mics

Until recently all mics had an “analog” voltage output. Using an “XLR” cable. Often called an “XLR microphone”.

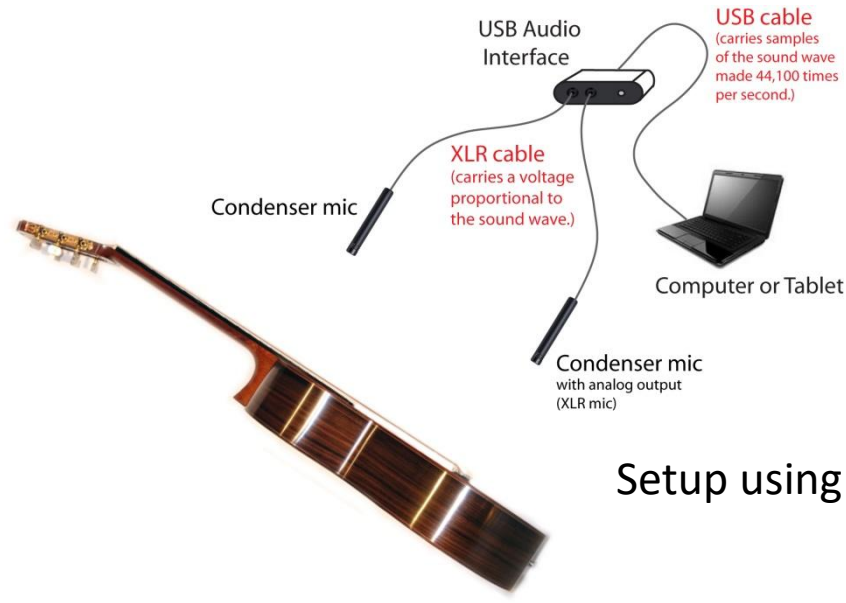
The voltage signal has to be converted to a digital signal using a USB audio interface.

USB mics output a digital signal on USB.

No need for a USB Audio interface.



XLR cable



Setup using XLR mics

USB Audio Interfaces

You need an audio interface to convert the analog voltage signal from the XLR mic to digital.

Audio interfaces also have audio outputs for connecting to monitor speakers, plus a headphone output.

Two mic inputs are common – **I recommend two inputs as a minimum so you can do stereo recording.**

Focusrite audio interfaces can apparently work with phones or tablets. But should check first.

Need “phantom power” for powering condenser microphones. Almost all audio interfaces will have this.

Typical 2 input USB Audio Interface

Focusrite is a popular brand. Focusrite Scarlett – AU \$309 (2026)



\$309

Price Match

Focusrite Scarlett 2i2 Gen 4 2-in/2-out USB Audio Interface w/ Air Mode & Auto Gain

Online Stock: In Stock (5+)

■■■ VIC Fitzroy (5+) ■■■ WA Perth (5+) ■■■ VIC Windsor (5+)
■■■ QLD Brisbane (5+) ■■■ NSW Crows Nest (5+) ■■■ NSW Alexandria (1)



Want to try before you buy?

Getting the best sound

Which factors affect the sound quality of your recording the most?

- There's a simple answer: the microphones and the microphone positioning have the largest effect.
- Next would be the room you're recording in, followed by the audio interface.

Microphones

Like guitars, the more you pay for microphones, the better the sound quality!

Dynamic vs Condenser Microphones

- Two main types of microphone: Dynamic and Condenser.
- Dynamic mics: more rugged (often used by singers).
- Condenser mics: better recording of high frequencies - more realistic sounding recording.
- The small diaphragm condenser type (about 12mm diam) is usually considered the best for instrumental recording.
- The large diaphragm condenser type (about 25mm) is usually used for voice but can also be used for instruments.



Dynamic Microphones



Shure SM57 and SM58.

Very common. SM57 costs AU\$199

But not recommended for recording classical guitar – they will have less clarity than a condenser mic.

Condenser Microphones

Example of small
diaphragm mic: Rode M5.
AU \$310 for a pair (2026)

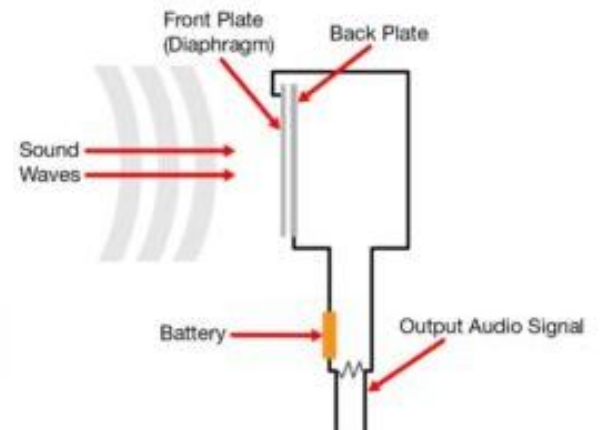
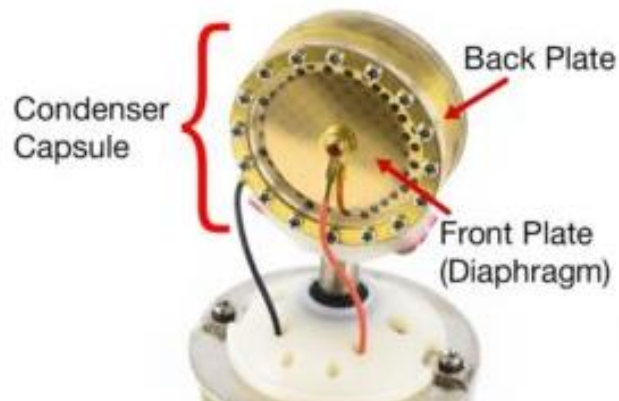
Rode M5 Small-diaphragm Condenser Microphone - Matched Pair

Small-diaphragm Matched Pair Cardioid Condenser Microphones

★★★★★ 36 reviews | [Write your review](#) | Item ID: M5MP



Condenser Microphones



Condenser Microphones

Example of a large diaphragm condenser mic:

Audio Technica – AT 2020 USBX AU\$186

Has a USB interface.

(There's an analog (XLR) version also.)



Similar items >

ON SALE

audio-technica

Audio-Technica AT2020USBX USB Microphone

★★★★☆ 4.3 (4) Write a review

MODEL: AT2020USBX SKU: 597878

TICKET \$249
\$186
\$63 OFF*

afterpay

ZIP

PayPal



Log in to see if you have coupons.

Add to cart



Condenser Microphones

Example of a large diaphragm condenser mic:

Rode NT1 AU\$430

Has both XLR (analog) and USB output



The image shows a Rode NT1 5th Generation Studio Condenser Microphone. It is a black, cylindrical microphone with a silver mesh grille at the top. The text "MADE IN AUSTRALIA" is visible near the base. The microphone is shown against a light gray background.

NT1 5th Generation
Studio Condenser Microphone

\$430 AUD In Stock

Tax included.

Free Shipping

☒ ☐
Black

ADD TO CART

[Find in Store](#)

The NT1 5th Generation is a revolutionary studio condenser microphone that fuses the classic sound signature of the iconic NT1 with cutting-edge, next-generation technology. It features RØDE's groundbreaking (patent-pending) Dual Connect output, offering both XLR and USB connectivity for incredible versatility, a world-first "unclippable" 32-bit float digital output, advanced digital signal processing, and more, all while delivering the same warm, silky character, extremely low noise, and high SPL handling that the NT1 is renowned for. The NT1 5th Generation is a true studio workhorse that excels on everything from vocals and speech, to guitar, piano, drums and percussion – the ultimate studio microphone.

Analog mic prices

(Manny's Music)

Examples of small diaphragm condenser mics are:

- Behringer C-2: AU\$99 for a pair.
- Rode M5: AU\$310 for a pair. (recommend this or higher priced options.)
- Rode NT5: AU\$629 for a pair.
- Shure SM81: AU\$939 each

Mic subtleties - Polar pattern

Microphones vary in their sensitivity versus the angle of the sound source from the direction the microphone is pointing.

This is called the microphone's "polar pattern".

The most common polar pattern for microphones used for instrumental recording is the "cardioid" pattern

Cardioid mics are most sensitive straight ahead and sensitivity falls off to zero directly behind.

The microphones I've listed above all have a cardioid polar pattern.

Mic subtleties – Proximity effect



Proximity effect – increased bass



Microphones with a cardioid polar pattern have increased bass when the sound source is close to the mic.



This is called the “proximity effect”.



My experience: position the mics around 30 to 40cm from the guitar to get a natural sounding bass response. Much closer than this can result in a thicker “muddier” sound.



Recommend experiment with longer distances. (But will get more “room” tone.)

Mono vs Stereo

Good results can be achieved using one mic but two mics this will allow stereo recording. I'd recommend trying this.

Stereo recording gives a more realistic, more satisfying sound. Gives "space" to the sound - especially noticeable on headphones.

Commercial classical guitar recordings almost always use stereo recording.

I've not tried setting up two USB mics for stereo recording. At this stage for recording stereo I'd recommend using two analog mics and an audio interface.

Mic Positioning

Need to experiment.

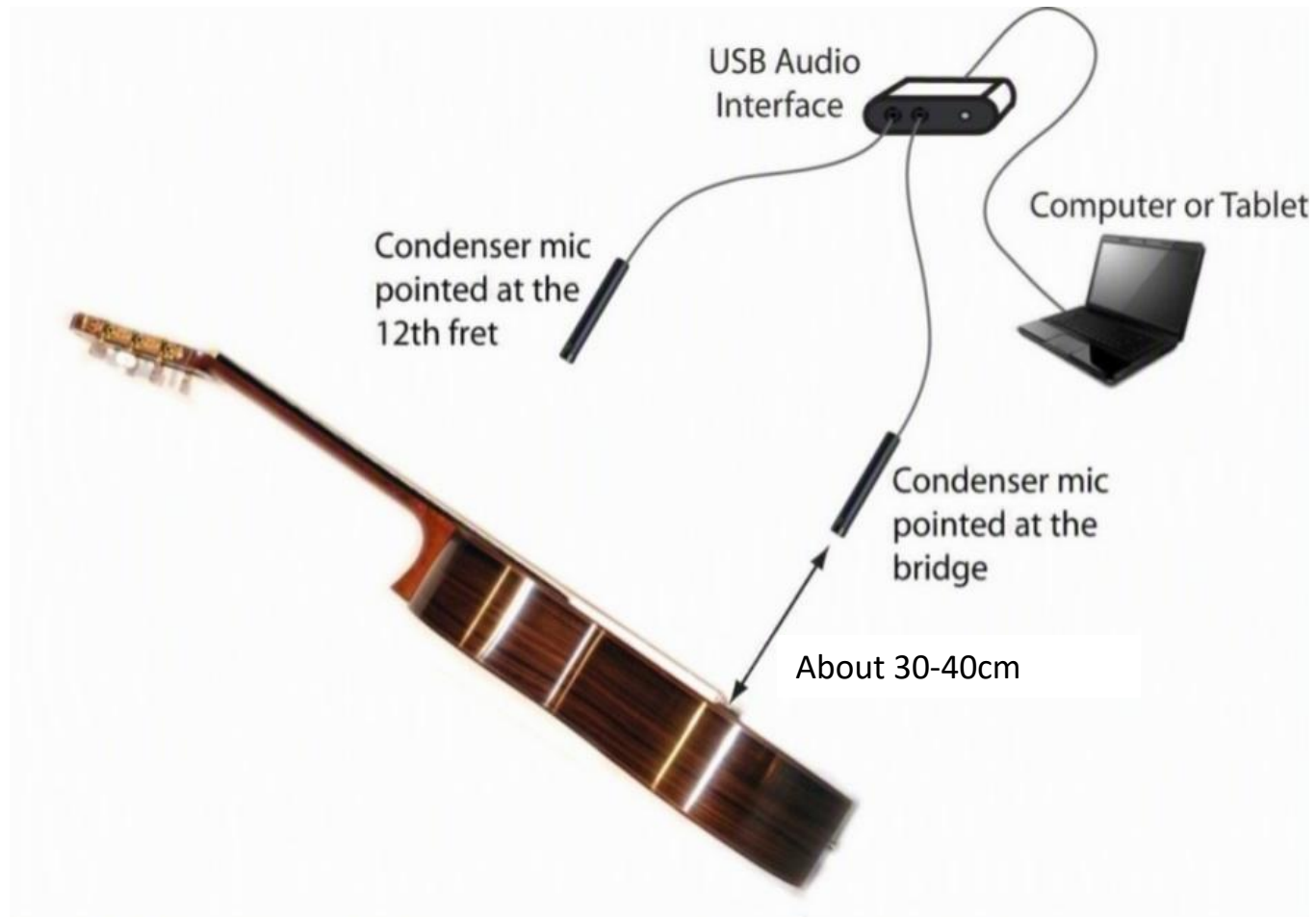
I'll show a couple of popular methods.

For stereo recording pointing one mic at the bridge, one mic at the 12th fret works well.

For mono recording you could point the mic either at the bridge or near the 12th fret.

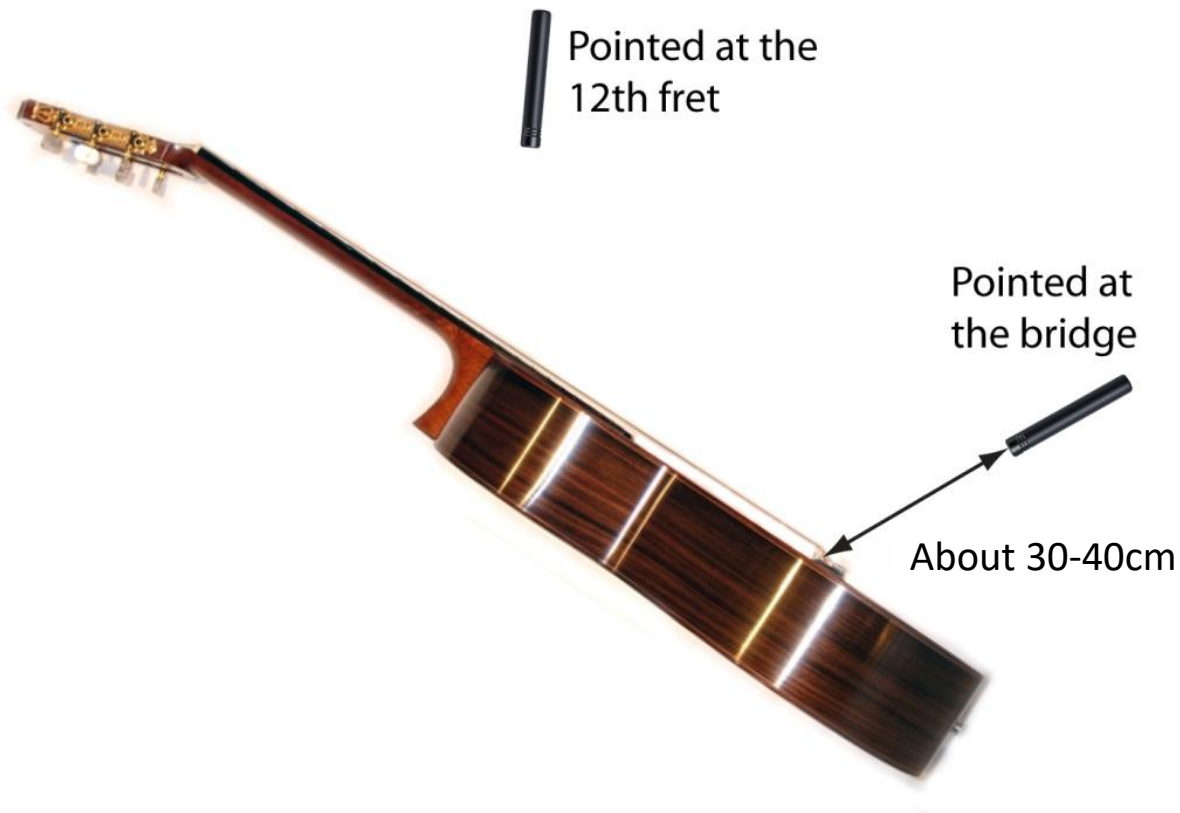
Don't point the mic directly at the sound hole because this gives a boomy sound.

Experiment with the distance of the mics from the guitar. I find that 30cm to 40cm gives good results. But you should experiment. You'll often see photos of recording setups with mics placed further away.



Mic Positioning – spaced pair

This is a typical setup using two mics for stereo recording.



Mic Positioning – wider spacing

Angled mics with wider spacing. Better stereo effect in headphones. I use this arrangement.

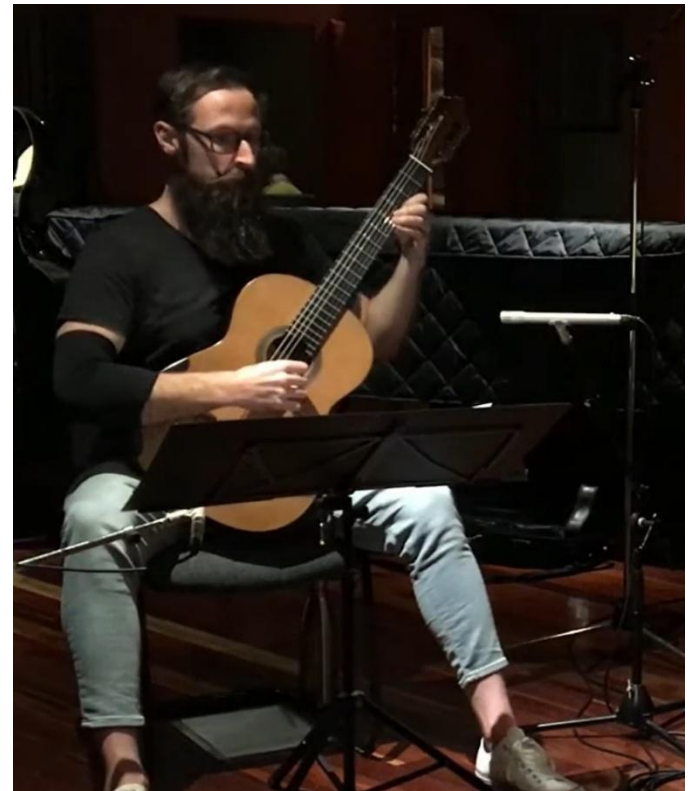
Mic positioning – My Setup

An example of “spaced pair” positioning



Mic positioning – Spaced pair Setup

An example of “spaced pair” positioning



Mic Positioning - XY

- A common positioning method is “XY” positioning.
- An advantage is that only one mic stand is needed.
- A disadvantage is that the stereo effect (the effect of “space”) isn’t as strong as with the spaced pair.



Mic mounting: stereo bar



- Two mics can be mounted on one mic stand using a stereo bar.
- This is convenient for XY positioning and can also be used for a spaced pair.

Mic positioning - XY

An example of “XY”
positioning.



Other tips

Experiment! Try different mic positions.
Compare your result with recordings you like.

If mics are further away you'll pick up more of the sound reflections from your room's walls and floor.
Not good.

Closer microphones will help the guitar's sound outweigh outside sound such as traffic.

If your computer is noisy - suggest point the back of the mics towards the computer.

With a hard wooden floor people recommend using a rug.

Recording Software

Recording Software

Allows you to record, edit, add reverb.

- Can get software for stereo or multitrack recording. Only need stereo for classical guitar solos.

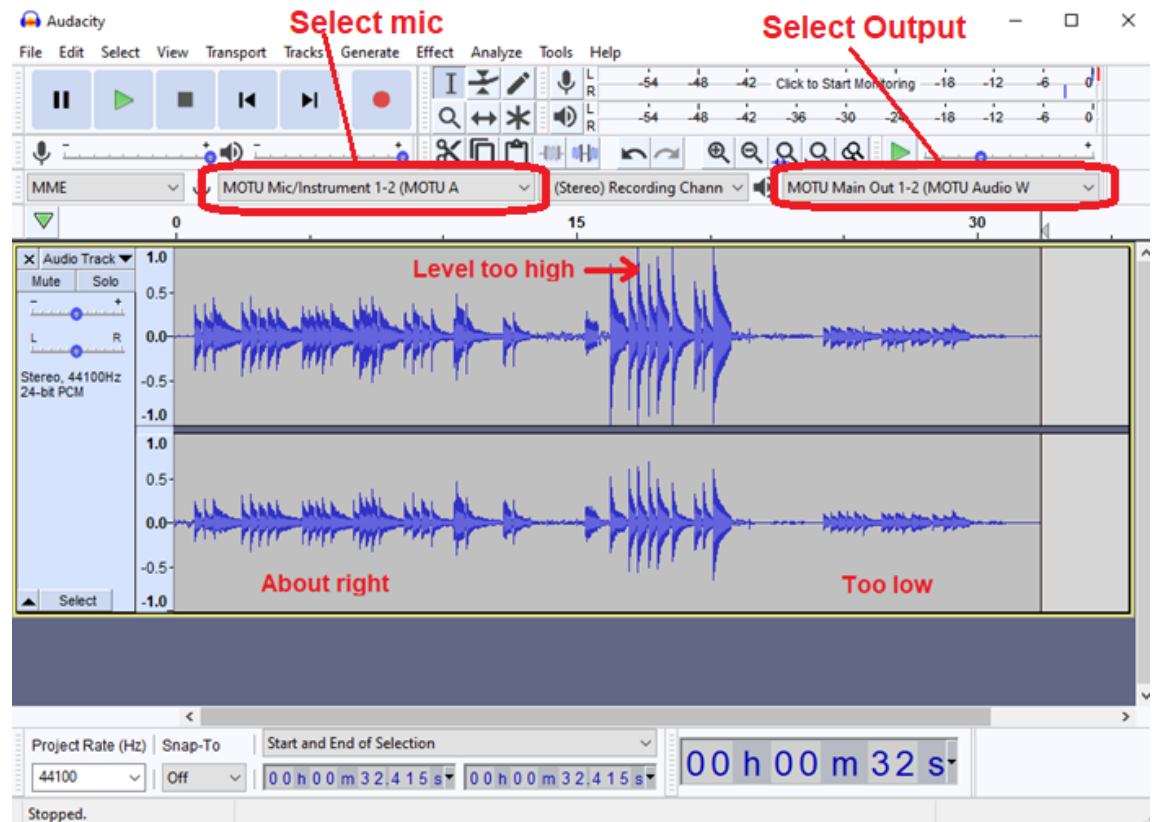
Examples for PC or Mac:

- Audacity (free):
- Reaper (US \$60 non commercial) – for multitrack recording.
- Ardour (free) – for multitrack.

Examples for iOS:

- Garage Band (free)
- WavePad (free)

Audacity



Note: these screen shots are from an earlier version of Audacity. Audacity version 4 has been released in September 2026 and has a different user interface and method of working. But the general principles still apply.

Audacity



Select Microphones and
Speakers



Adjust recording level. (See
previous slide.)



Record



Edit – to cut the start and
end or to fix mistakes.



Add reverb (to make the
recording sound like it was
recorded in a hall or church
for example.)



Save result as .mp3 or .wav
file.



Merge audio with video if
desired. (A separate story.)
Can use Shotcut (free) or
other video editors such as
iMovie, Pinnacle Studio,
Filmora, Davinci Resolve

Audacity Instructions

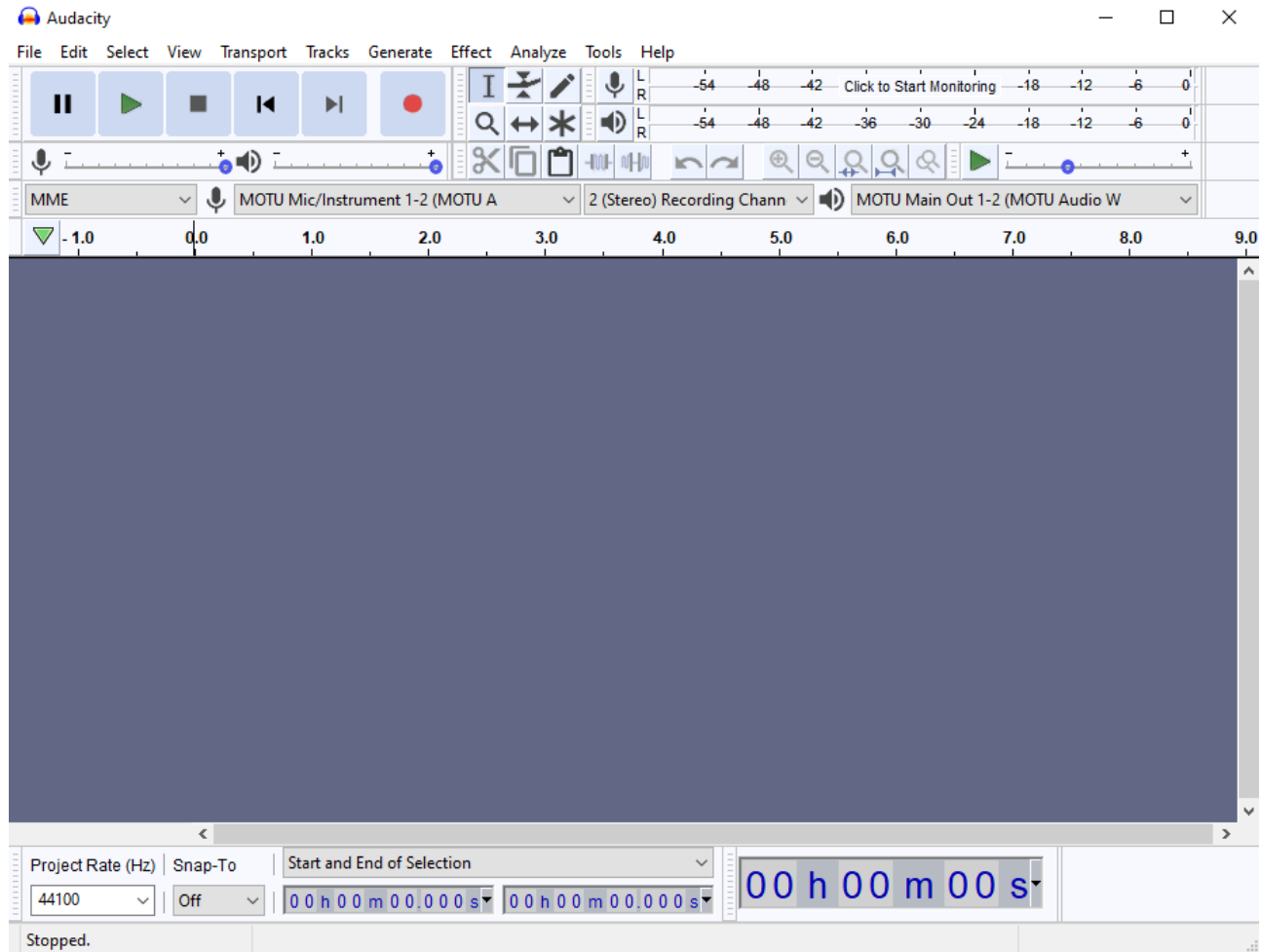


There are many tutorial videos online:

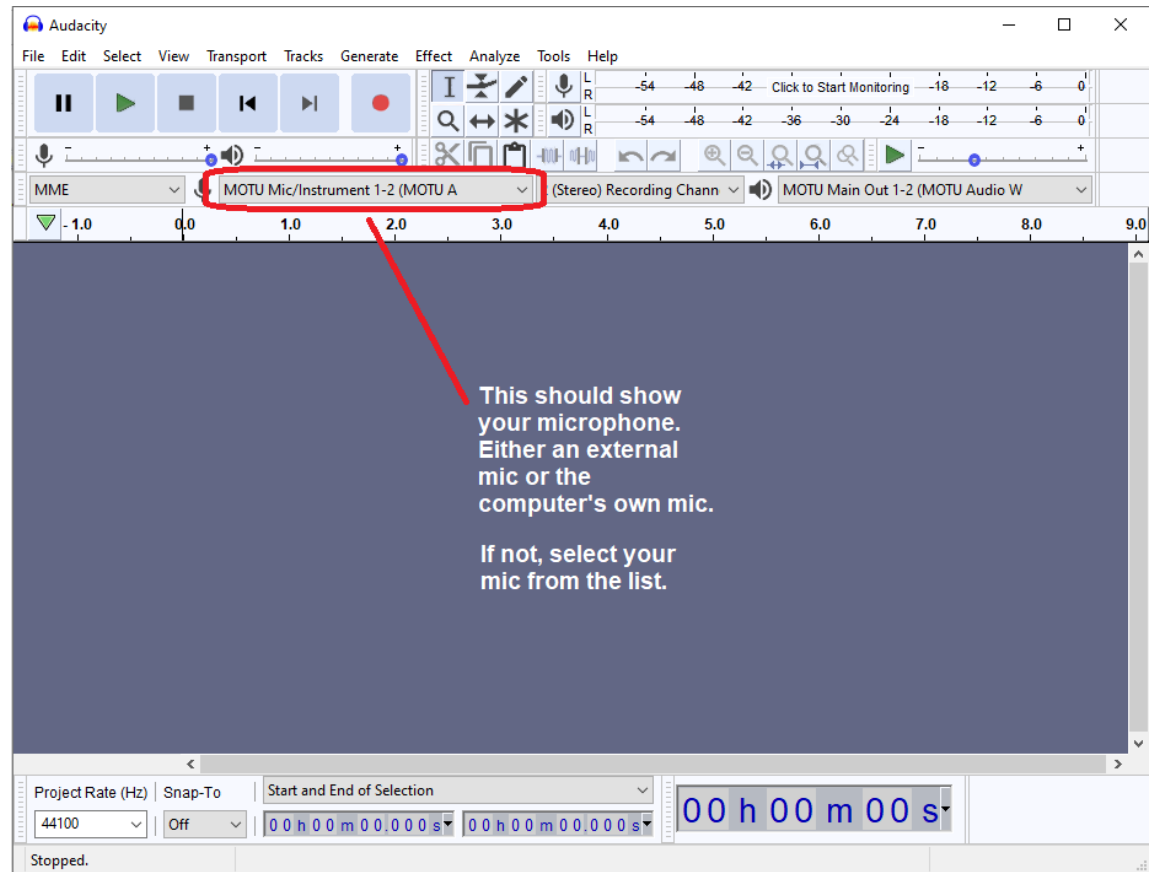
E.g. This one for recording using a USB mic
<https://youtu.be/pN6qEZEp3kc>

Audacity

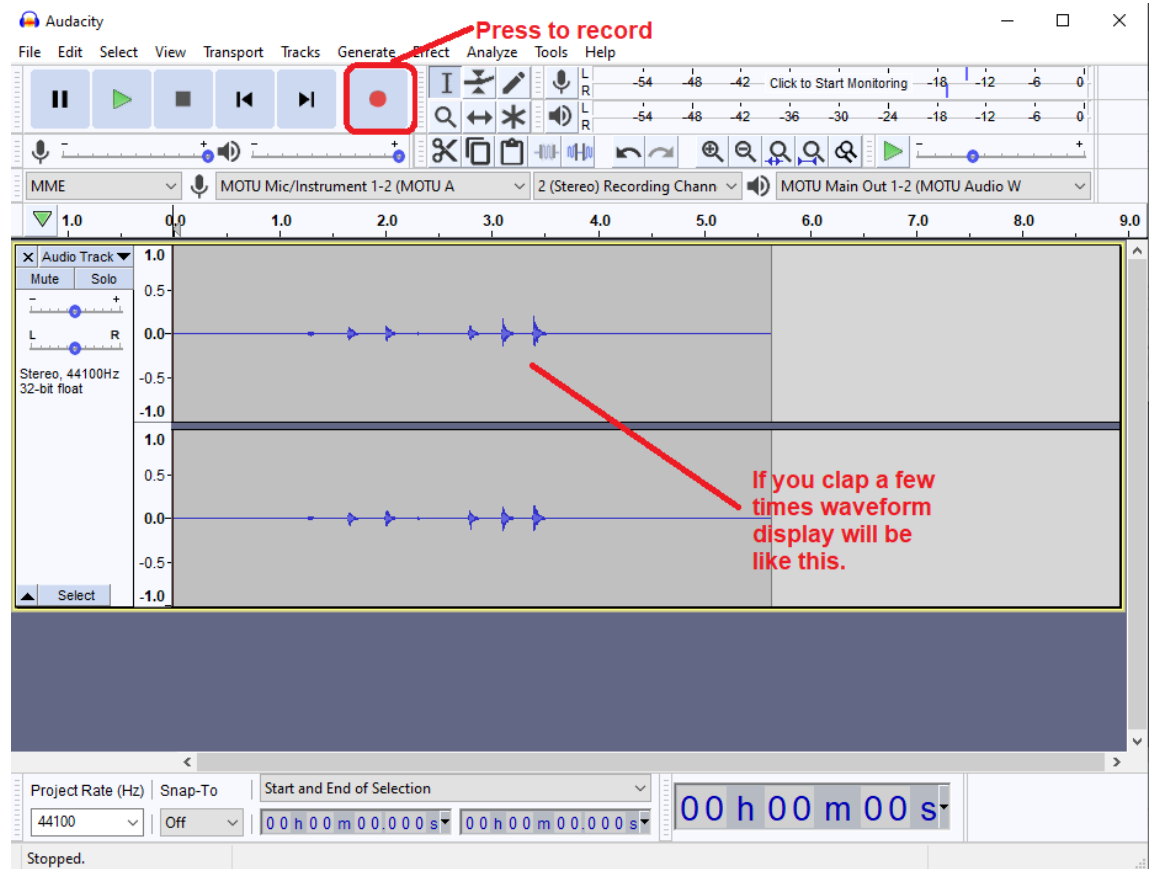
- Main screen



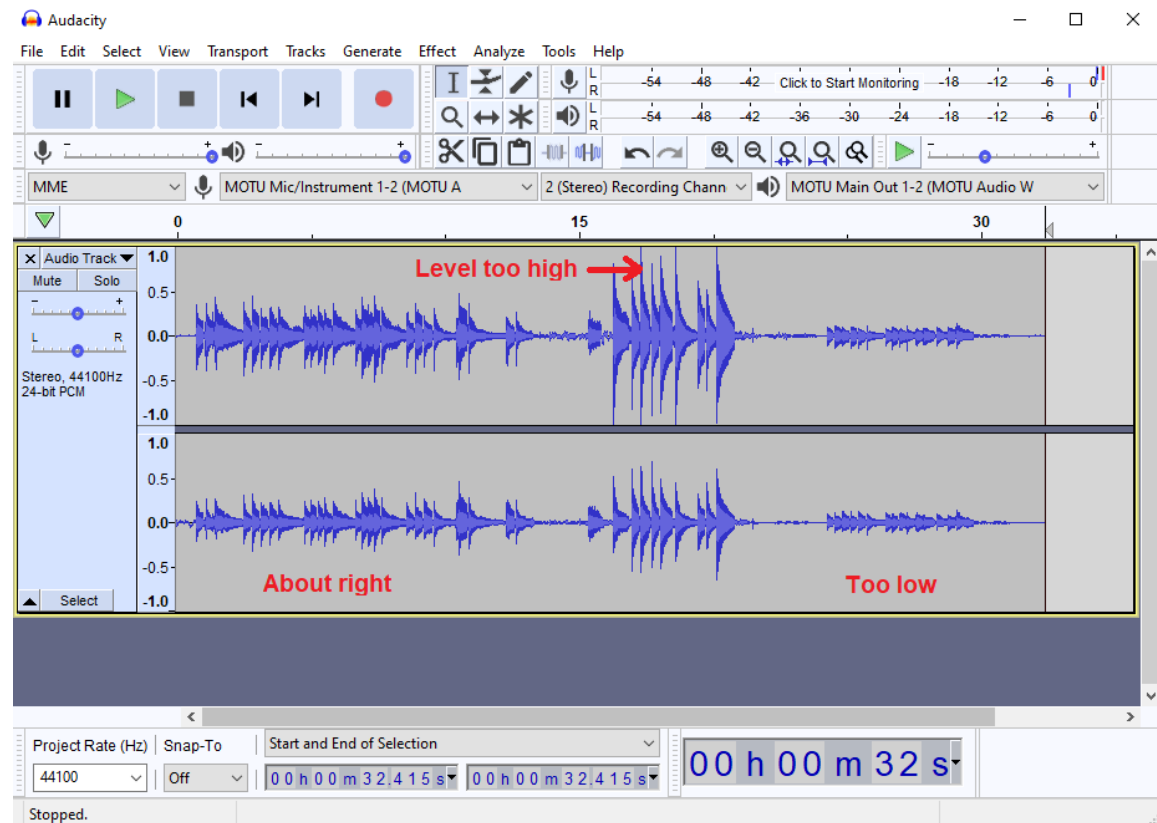
Select Mic



Record

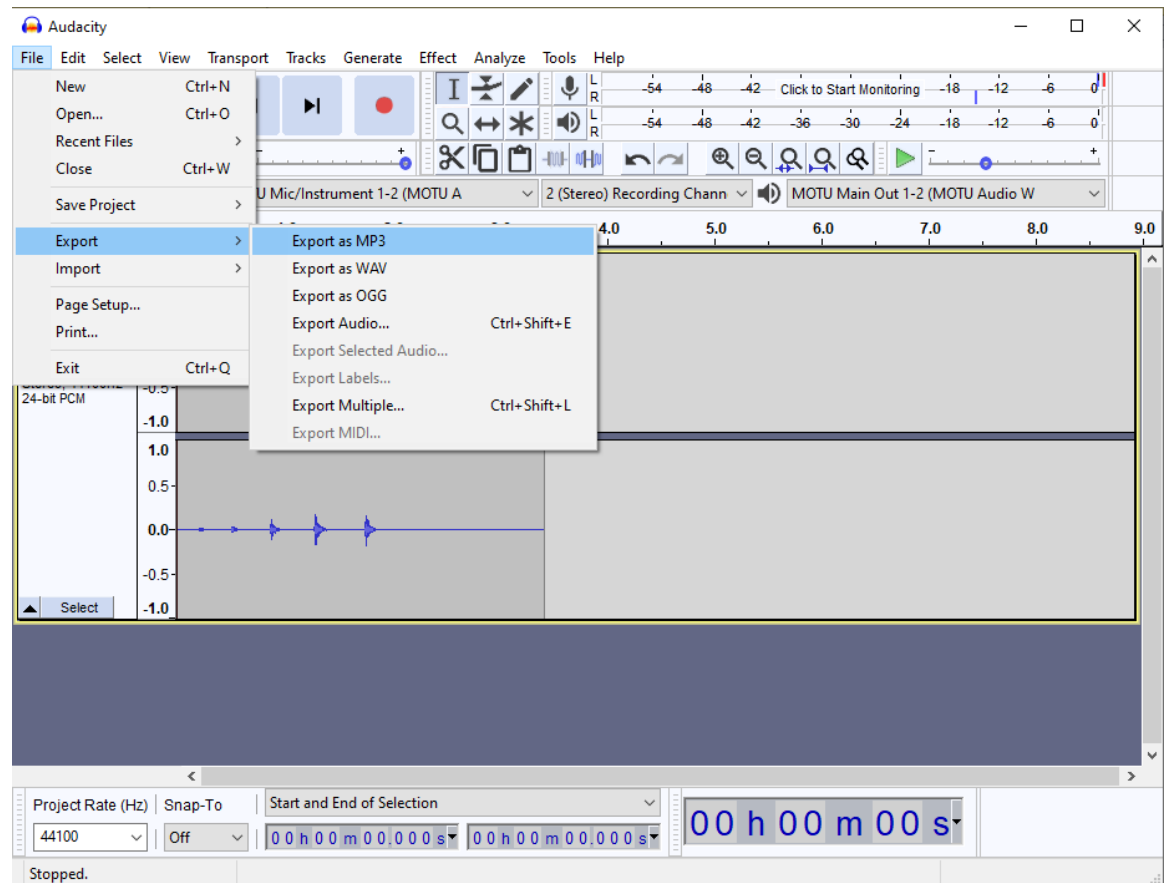


Adjust recording level



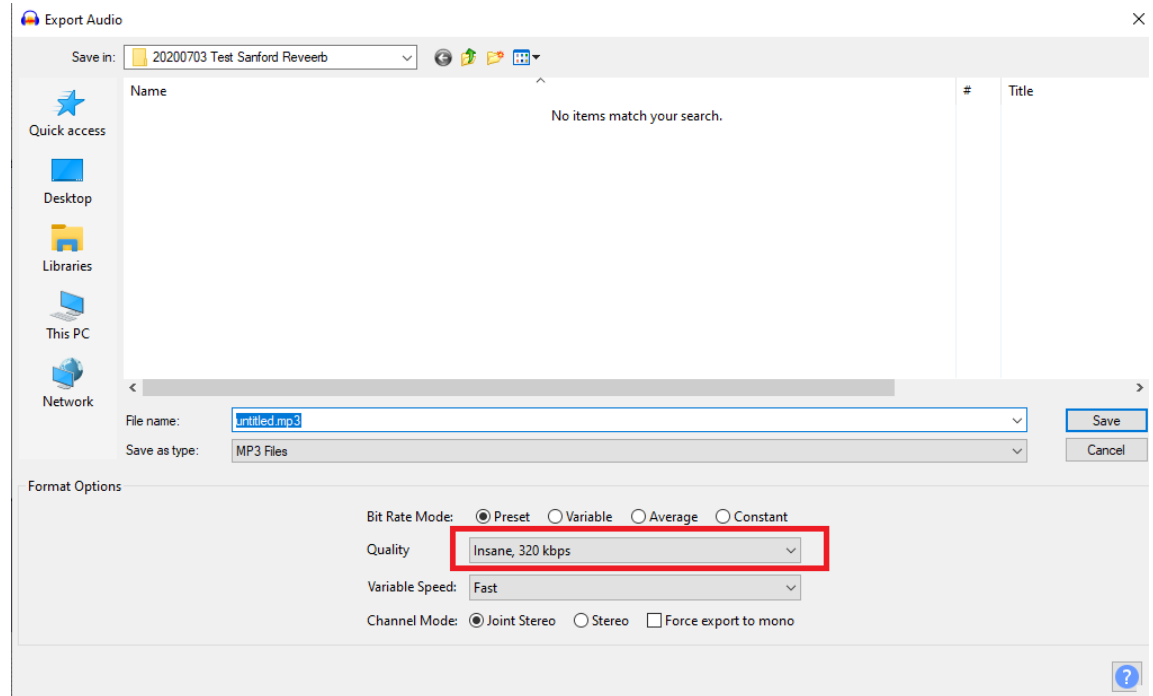
- Adjust recording volume using the computer's microphone volume setting. (In Control Panel for PC.)
- Ideally the level should be about half way up the scale. But it doesn't matter if it's a bit higher or lower as long as it's not so high that clipping occurs.

Save audio file



- Export as .wav (bigger but highest quality) or .mp3 (small enough to email) – still extremely good quality.

Save as
mp3



Questions

