

Audio Recording Best Practices

We all know that professional audio recording makes a big difference in the quality of an elearning course. It's difficult to listen to even a short audio clip when the sound quality is bad.

However, many of us are faced with ever-shrinking project budgets and look for ways to reduce some development costs. Bringing audio recording in-house seems like a good way to reduce expenses, but you also worry about reducing quality.

As we started to create more video support content for Claro, here's how we were able to save money and make professional-quality recording at the same time.

The microphone

The first thing we did was purchase a good-quality USB microphone (mic). The mic on your laptop just isn't going to get you the quality you need for audio, so this is one expense you shouldn't try to avoid. A lapel mic is also not recommended. Every time you move or bump the cord you risk picking up the sound and spoiling your recording. A headset mic with an audio jack is a bit better but there is a noticeable improvement with a good USB mic. A microphone on a stand also helps isolate the mic from vibrations.

The model we use is the Snowball, by Blue. Check it out at the Blue site (<http://www.bluemic.com/snowball/>). It's a great mic and with a bit of online shopping you can usually find it priced well under \$100. It can be switched from unidirectional mode for narration to omnidirectional mode in order to record live music, conferences, or interviews. It also has a really cool retro vibe and looks great.

The DIY sound booth

The mic alone is a great improvement in sound quality, but it's even better if you can control the background noise when you are recording. Few of us have the luxury or the budget for a sound room, but you can put together a mini-recording booth quite easily.

The idea is to deaden down the white noise of the room you are working in. Sound can be really bouncy off of windows and painted walls. Professional booths use acoustic foam all over the room to help remove that and give the cleanest sound quality possible. You can make your own mini-booth to improve the quality without transforming your whole office.

I used a soft-cover laundry basket and lined it with foam purchased at a department store—the foam was actually a mattress pad, which had a variety of cones and wiggles. This will dampen the sound nicely.

Last updated July 2011

There was enough foam left over that I considered making a sombrero-style hat to wear while I recorded too! That would cut out even more room sound. You may want to consider this if you don't have a private room where you can close the door... and if you don't mind what your co-workers think of you wearing a sombrero with your head stuck in a box!

The mic stands inside with foam tucked around its legs. I pin the script I'm reading to the back wall so I can see it while recording without having to hold the paper.

The cost of the "booth" was under \$20. A search on Google for a phrase like "mini recording booth" shows several sites with similar plans.



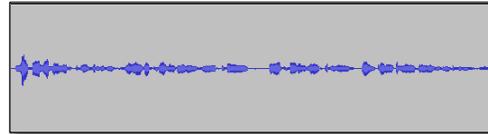
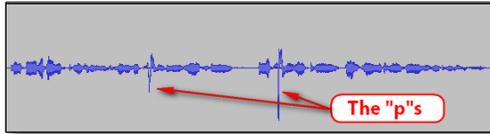
Pop screen

You could also add a pop screen, a simple device that keeps the hard breath of air from words that start with a plosive consonant like the letter "p". You can buy these fairly inexpensively or search online for plans to make your own (use a nylon stocking and an embroidery hoop!). There are even a couple YouTube videos that show the process. Search for "pop screen" or "pop filter".

I finally made a pop filter after I had to re-do recordings a few times to eliminate pops.

Following is an image of an audio track. I recorded the same two sentences twice, the first time without a pop filter and the second time using my DIY filter. Note the spikes the first time where I pronounced a "p":

Last updated July 2011



To hear this audio track, click here: [Pops and Pop Filters Audio](#).

Here is an image of the pop screen I made for my booth. It hangs in front of the mic. I may secure it with a couple of elastic bands as well since it does swing a bit!

The second pop filter is another one I made using a spring embroidery hoop. Both of these hoops and the nylons needed to make them were less than \$10.

“On the Air” or “Recording in Session” sign

The last thing I added to my “studio” was the least expensive of all. I printed out a sign that says, “ON THE AIR”. It also has a retro vibe.



I close my office door and tape the sign up and everyone in the office knows to walk a little lighter in the hallway past the door.

Audio programs

You can record directly into Claro using the Record Narration tool. You can even clip “dead air” from the beginning and end of your audio right in the tool.

If you want to do more cutting, mixing, or filtering, use one of the many recording tools available. There are a couple free audio recording and editing programs we’ve used (and you can find many others on the web):

- Audacity (<http://audacity.sourceforge.net/>)
- GarageBand if you have a Mac

Once you’re happy with your recording, you’ll export it as an MP3 file and import it into Claro.

Last updated July 2011

The recording session

I've mounted my basket booth on a corkboard above my desk to keep it at a good height for reading while standing. Believe it or not, your posture and position can affect your tone of voice greatly. A standing position helps us make better use of our diaphragm for breathing, which in turn means we deliver a better quality of sound.

Put your phone on auto-answer or re-direct calls if you can. Hang your sign out and shut the door too.

Turn off any fluorescent lights in your room. The buzz from these may affect the sound quality.



I move my keyboard so it's right under my booth when I'm setting up to record. That way I can easily pause and resume recording. I also make sure that I can see my monitor clearly.

Make sure you practice reading over the script a few times first, and do it out loud! It is easier for the words to flow once you've said them a number of times. You might also want to edit the script a bit at this point for an easier read.

Next, I cut or fold up the script into segments and pin each one as needed to the back of my booth.

Turn the mic slightly towards one side of your booth to reduce direct breath. Turn your head slightly in the other direction when starting words with plosive consonants, like b, d, g, k, p, q, and t.

Last updated July 2011

Record in short yet smooth segments. Click Pause between segments. It's easier to clip out parts you're not satisfied with when you record short sessions. It's also easier not to get parched or out of breath.

Keep a glass of water nearby and have a sip between segments.

Try smiling or at least thinking happy thoughts while recording. You might even post a smiley face on your booth which reminds you to smile while talking! Our mood comes across in our voices so you want to sound positive... without sounding over-enthusiastic.