

Using Acoustic Keyboard Sounds on Electronic Instruments

by Don Muro

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If you own a synthesizer or other electronic keyboard instrument, you can probably improve the quality of your acoustic piano, harpsichord, and pipe organ sounds. In the following paragraphs you will find some suggestions which might help you get the most out of these keyboard sounds.

Acoustic Piano

1) Adjust the keyboard velocity sensitivity to match your technique. Keyboard players trained on acoustic piano usually play electronic keyboards with a heavier touch, especially if the electronic instrument has a non-weighted keyboard action. If it is too easy to produce a bright or loud piano sound on your electronic keyboard, try decreasing the keyboard velocity sensitivity. Decreasing the sensitivity will make it more difficult to produce brighter and louder sounds. On the other hand, if it takes too much effort to produce a brighter or louder piano sound on your electronic keyboard, try increasing the keyboard velocity sensitivity. Increasing the sensitivity will make it easier to produce brighter or louder sounds.

2) Adjust the playing range of the piano sound. If you don't have an 88 note keyboard, you won't have access to the full note range of the piano. By transposing the piano sound, however, you can adjust your electronic keyboard to play in any note range of the piano. For example, if you have a 61 note electronic keyboard, you can transpose the piano sound so that the keyboard will play the lower notes of the piano range. If the music calls for very high piano notes, you can select another piano sound that is transposed up one or two octaves. (This technique will work only when there is enough time in the music to select the transposed piano sound; it will not work if there are rapid octave leaps in the music.)

3) Increase the note range by splitting the keyboard. If the right hand part is written in the top octaves of the keyboard and the left hand part is written in the lower octaves of the keyboard, you can split the keyboard into two sections and transpose each section so that the music is heard as originally intended. The split point on the keyboard should be determined by the music to be played.

4) Use a sustain footswitch. Any piano sound will be more realistic with the use of a sustain pedal.

Harpichord

1) Adjust the brightness for a more authentic sound. On most electronic instruments, the harpsichord sound is far too bright. Listen to recordings of harpsichord music and notice that the sound is bright and clear without sounding harsh.

2) Don't play too loudly. Playing an imitative sound at the wrong volume level is the easiest way to destroy any illusion that you are trying to create. Be sure to play the harpsichord sound at a realistic volume level, especially if you are playing along with other acoustic instruments.

3) Don't use a volume pedal. Volume pedal swells are impossible to perform on a harpsichord.

4) Layer two harpsichord sounds together in octaves. This effect can suggest the full sound of a two manual harpsichord. For a richer sound, detune one of the programs slightly.

5) Don't boost the low frequency response. The low notes on your harpsichord sound should be clear, not boomy.

Pipe Organ

1) Use velocity sensitivity only when you have tracker organ sounds. The mechanical keyboard action on tracker organs is velocity sensitive. Most of the generic organ sounds on electronic instruments, however, are not tracker organ samples or simulations. Playing without velocity sensitivity will help you to phrase and articulate like an organist.

2) Use a volume pedal. This is the perfect performance opportunity for organ swell effects. On some instruments you can program the pedal to affect timbre as well as volume. This will greatly enhance the swell effect.

3) Add the sound of a pedal section by creating a layer. Transpose an organ sound down one or two octaves, then assign this sound to the lowest two octaves on the keyboard. Assign another organ sound to the entire keyboard, and you will have an organ sound with a pedal doubling for the bottom two octaves.

4) Create an antiphonal organ effect. Split the keyboard into two sections, and assign either the same organ sound or a different organ sound to each section. Assign the lower split sound to the right speaker, and assign the upper split sound to the left speaker. Place one speaker in the front of the room, and place the other speaker in the back of the room. If your instrument has built-in effects, add reverberation to the speaker in the back of the room.

5) Detune the organ sound with a user-programmable scale tuning. There is no such thing as a perfectly tuned pipe organ. If your instrument has a user-programmable scale tuning, detune several notes - some notes a few cents sharp and others a few cents flat. This will help to thicken the sound and to make it sound more like a typical pipe organ.

I hope you find these tips useful. Remember that in order to achieve successful imitative synthesis you must combine a high quality sound with an appropriate performance technique.
