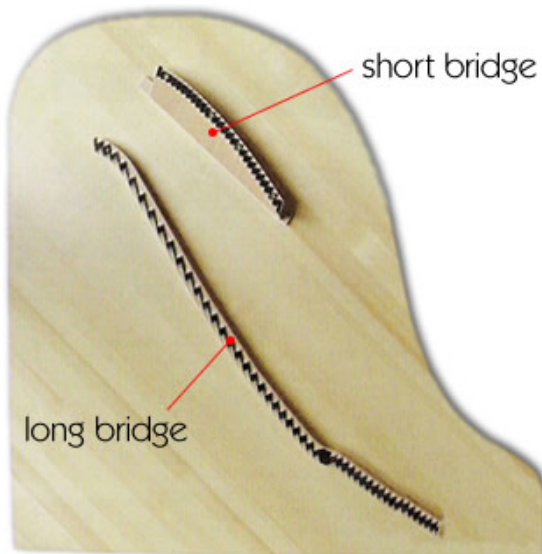


## GETTING TO KNOW YOUR SOUNDBOARD



Soundboards are almost always made of a collection of 1/4" thick spruce boards glued together and secured by struts running along the back side called ribs.

Have you ever wondered how pianos generate sound? There are many factors to consider, but for now we will focus on the soundboard. This is the part of the piano that is responsible for turning the quiet string vibration into a full and colorful piano sound. It is a large diaphragm-like structure that vibrates along with the strings, but unlike the strings, it has a much more extensive surface area to push the air to create sound. The energy transfer occurs through other pieces of wood glued to the face of the soundboard called bridges. Soundboards are almost always made of a collection of 1/4" thick spruce boards glued together and secured by struts running along the back side called ribs.

If you have a grand piano, the soundboard is easily visible if the lid is fully lifted. It is the large, flat piece of wood below the strings. In an upright, it and the ribs are most easily visible from the back side of the instrument. What may not be so visible is the slight arch in the entire board. This is called soundboard crown and is what creates resonance in newer pianos of good condition. The soundboard crown forces the bridges up to meet the strings, allowing for strong, direct contact with the strings and the best sound production.



The soundboard is the main reason your or any piano goes out of tune. There is constant pressure between the strings and the bridges. If the board were to swell, like any piece of wood in a humid location (60% or higher relative humidity), it would grow larger toward the strings putting more pressure or tension on them and changing the pitch. If the piano is in a dry environment (35% or lower relative humidity), the wood will shrink away from the strings causing less tension on the them and changing the pitch. Changes in humidity will happen normally throughout the year and will cumulatively detune your piano.

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Sometimes soundboards will dry out too much and crack. Cracks are bad news for your piano's condition and its overall value. Cracks are fixable, but only if the strings are removed. That is a major repair and even when repaired, the soundboard will never be the same.

One of the best ways to care for your piano's soundboard is by using a Dampp-Chaser Life Saver system. It is a device that is stashed away inside or underneath the piano, close to the soundboard, that monitors the relative humidity and creates a micro climate to counteract whatever is going on around the outside of the instrument. When properly installed, it will eliminate major shrinking and swelling of the wood. This ultimately will prevent the soundboard from cracking, stabilize the instrument and keep it in tune for a longer time period. Your piano will still need to be tuned and serviced every six months, but the time between tunings will be much more satisfying. You can find out more about the Dampp-Chaser system at the website: <https://www.pianolifesaver.com/english>

### \$5 OFF YOUR NEXT TUNING

For every person you refer me to that I complete work for, I will give you a \$5 credit toward your next tuning as my thanks. This only applies to private piano owners and not to institutions (Churches, Schools, Piano dealerships, etc.).