

The *Siminoff* Tap Tuning Hammer was designed specifically for the purpose of tuning the tone bars and structural components of wood bodied stringed acoustical instruments.

- The head of the *Siminoff* Tap Tuning Hammer features an air cushioned rubber head with two layers of different durometer felt that combine to virtually eliminate hammer noise. The soft attack helps to stimulate the fundamental only, eliminating as much of the overtone or “partial” series as possible.

- The hammer’s ball-end permits the hammer to be rotated in the hand so that the head can be dropped rather than forced. This ensures consistency in each excitation of the part since the attack is a result of the inertia of the head falling only (as opposed to being driven by a motion of the hand).



Fig. 1, #820 Tap Tune Hammer

Tap Tuning:

1) Tap tuning enables the components of the instrument to be tuned relative to the concert pitch of the strings with the end result of offering improved tonal qualities. Tap tuning is the art of adjusting the stiffness of the parts of an instrument by tuning them to specific notes. Since frequency and stiffness are related, tap tuning provides a means of achieving consistency when building musical instruments.

2) Keep records of the changes that occur in your tuning process so that you know the changes that occurred and can repeat previous successful tunings.

3) A detailed outline of the tap tuning process is provided in *The Art of Tap Tuning and accompanied by a 50-minute instructional DVD* (available from us, most luthier supply companies, and better music stores).

4) The use of a “compressor” (Fig. 3) between the microphone and tuner will help increase



Fig. 2. We recommend the *Peterson AutoStrobe 490*. This tuner features a true mechanical strobe with fast response and great accuracy. The Peterson tuner displays the note in an LCD screen and uses a spinning wheel to display the sharp or flat qualities of the desired note.



Fig. 3, #825 Compressor

sustain and provide a steady reading. (A compressor is typically used with electric guitars to improve sustain. We recommend the Behringer CS100, available in most music stores or directly from us. Our part #825.)

5) StoboSoft, a software version of the strobe tuner, is available to run on a Mac or PC. For more information, see our web site in the Tap Tuning tools section.

NOTES:

- Use the *Siminoff* Tap Tune Hammer for the purposes of acoustical tuning only. Do not use the Tap Tune Hammer as a soft mallet or light hammer. Improper use could damage the felt head and reduce its effectiveness.

- Keep the hammer in its protective pouch when not in use.

Recommended reading:

The Art of Tap Tuning, Roger Siminoff

The Luthier’s Handbook, Roger Siminoff, Hal Leonard Publishing, Milwaukee, WI.

The Ultimate Bluegrass Mandolin Construction Manual, Roger Siminoff, Hal Leonard Publishing, Milwaukee, WI.

What was Loar hearing?, Roger Siminoff, Arroyo Grande, CA (a free download is available from our web-site at www.siminoff.net in the “downloads” page).