

GLOSSARY

Lug pitch: Pitch obtained by striking the drum head near one of the lugs. Lug pitch differs from lug to lug. Also, lug pitches of batter lugs are unrelated to lug pitches of resonant lugs.

Fundamental pitch: The overall pitch of the drum. The dominant and lowest pitch you hear when you hit the center of the drum head. The fundamental pitch is the same for both the batter and resonant head.

Matching lugs: Trying to get the same or similar lug pitch at each lug.

MODES

Absolute mode: Shows the pitch in Hz as well as the nearest note and octave. The dial shows the pitch error.

Difference mode: Useful for matching lugs, it lets you choose one lug pitch as a reference and compares other readings to that lug pitch. The difference between the new reading and the reference is displayed as +/- Hz, it also displays the reference pitch at the bottom of the LCD and the frequency error on the dial. Note: Difference mode also filters around the reference pitch and rejects sounds more than 20% higher or lower in pitch.

HOW TO USE

Install the battery. We have included two AAA batteries. Open the battery cover by pushing down and sliding in the direction of the arrow on the cover. Install the batteries, making sure to match the positive and negative ends of the batteries to the correct contacts. Then replace the cover.

Place your drum on a stool or carpet as to mute the opposite head. Then, clip the Tune-Bot gig to the drum hoop between any two lugs. Push the small button to turn the unit on.

Strike the head of your drum lightly about 1" inward of any lug and wait for a reading on the display, this reading is your lug pitch.

Tightening a lug will raise the pitch while loosening the lug will lower the pitch. Try to get nearly the same pitch at each lug. Measure each of the lugs and make adjustments until all lugs are within 2Hz of each other. We have lug pitch suggestions, including Artist tunings, listed on our website, www.tune-bot.com, and on our free tuning calculator app which you can download at the Apple app store or Google Play store.

You can also tune your drums using the difference mode. First, get a lug pitch reading the same way as listed in the previous paragraph. Next, press the Difference button. Now strike 1" inward of the remaining lugs. You are aiming for a reading close to 0. If your reading is positive, loosen the lug, if it is negative, tighten the lug. Repeat for all lugs until all readings are within +/- 2 Hz.

In order to read the fundamental pitch (overall pitch) of the drum, you must allow both heads to resonate. With both heads unmuted, strike the center of the drum head, the LCD will display the fundamental pitch in both Hz and note. Make sure not to use difference mode when reading the fundamental pitch.

SPECIFICATIONS

Tuning Range: 30 - 400 Hz, 1C - 4G[#]

Sine-Wave Resolution: +/- 0.5 Hz.
Response Time: 750 mSec.
Power: 2 AAA Batteries

Weight: 72 g. (without batteries)

PRECAUTIONS

- 1. Avoid the following situations to prevent a potential malfunction of the tuner: Exposure to liquids, Direct sunlight, Extreme temperature or humidity, Excessive dust or dirt.
- 2. Remove the batteries to prevent leakage when the unit is not in use for long periods.
- 3. To avoid breakage, do not apply excessive force to the pushbuttons, battery cover, clamp or display. Do not take apart the tuner, it is not user serviceable. Dismantling the tuner voids the manufacturer's warranty.
- 4. Do not use liquid cleaners on the product.

REGULATIONS: FCC (USA)

This Class B digital device has been tested and found to comply with Part 15 of the FCC Rules. These FCC limits provide reasonable protection against radiated interference in a residential installation.

REGULATIONS: CE Mark (European Harmonized Standards)

This battery operated apparatus has been tested and found to comply with EMC Directive (89/336/EEC) and CE mark Directive (93/68/EEC).