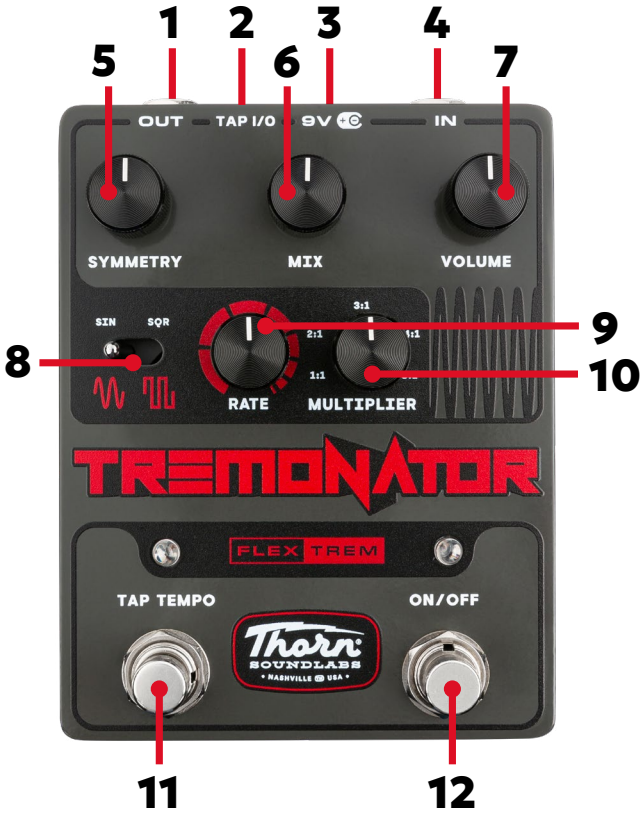
Tremonator

Flexible Tremolo

User Manual



Thank you for purchasing the Tremonator – Flex Trem.

The **Thorn Tremonator – Flex Trem** is a highly flexible tremolo pedal that offers a wide range of tonal possibilities, from subtle pulsations to rhythmic waveforms. With its intuitive controls, including **Symmetry, Mix, Volume, Rate,** and **Multiplier,** you can easily dial in the perfect tremolo effect to suit any musical style. The **Symmetry** control adjusts the waveform's shape, while the **Multiplier** control allows for precise manipulation of the tremolo speed, providing further creative possibilities.

The **Wave SIN/SQR** switch lets you choose between a smooth sine wave or a sharp square wave tremolo, giving you even more tonal flexibility. Additionally, the **Tap Tempo Footswitch** allows you to sync the tremolo speed to the tempo of your song.

The **Thorn Tremonator – Flex Trem** is the ideal tool for guitarists looking to add dynamic and rhythmic tremolo effects with full control over their sound.

Controls

1 – ¼" (6.35 mm) mono output: Use an instrument / patch cable to connect to your next pedal or the input of the amplifier.

2 – ⅛" (3.5 mm) TAP I/O: You can use this port to connect other pedals with a TAP I/O port to control both pedals with the same TAP TEMPO switch.

3 – 9 VDC power supply jack: Connect a regular pedal power supply unit with a 5.5 x 2.1 mm barrel plug, center negative. Battery operation is not possible. Do not connect more than 9 V!

4 – ¼" (6.35 mm) mono input: Use an instrument cable to connect your guitar or the previous pedal in your effects chain.

5 – SYMMETRY control: This controls the symmetry of the Low Frequency Oscillator (LFO) wave shape used to modulate the Tremolo signal. If Sine wave is selected, then at the 12 o'clock position the volume rises and falls at the same rate. At the 5 o'clock the volume rises slowly but drops fast. At the 7 o'clock position the volume rises fast and drops slowly.

6 – MIX control: This adjusts the mix between clean signal and tremolo signal.

7 o'clock = 100% clean signal

5 o'clock = 100% effect signal

7 – VOLUME control: This adjusts the signal level sent to the output jack.

Use this control to recover a perceived volume loss at some tremolo settings. Any setting above 12 o'clock will boost your signal above unity.

8 – SIN/ SQR switch: Switches the tremolo LFO wave form between sine wave and square wave. Square wave delivers a more percussive sounding tremolo effect.

9 – RATE control: This is the manual adjustment of the tempo for the tremolo effect. Turning the knob overrides the tempo set by the TAP TEMPO footswitch.

10 – MULTIPLIER control: Use this control to multiply any tempo input made on the RATE control or with the TAP TEMPO footswitch.

Example: Tap the first note of each bar with a setting of 4:1 and the resulting tremolo tempo will be quarter notes of your input.

11 – TAP TEMPO footswitch & LED: This is the footswitch input for the tremolo tempo. Tap the switch several times to enter the desired tempo. This overrides the tempo set by the RATE control. The LED flashes to indicate the selected tempo. It does not turn off when the pedal is switched to bypass. This way you can set the TEMPO with the pedal in bypass mode before you actually use the Tremolo effect.

12 – ON/OFF footswitch & LED: This footswitch activates the TREMONATOR (LED above the switch is lit) or switches the pedal into TRUE BYPASSS mode.

Specifications

- Input: 1/4" (6.35 mm) mono (TS) jack, impedance = 470 kΩ
  Output: 1/4" (6.35 mm) mono (TS) jack, impedance = 2.2 kΩ
- Power supply: 9 VDC, 5.5 x 2.1 mm barrel plug, center negative ⊕—◉—⊖

  Battery operation is not possible.

  Do not connect more than 9 V!

  Current draw: max. 32 mA
- Dimensions: 3.70" x 4.72" x 1.50" (94 x 120 x 38 mm)
- Weight: 0.84 lbs (380 g)

Safety precautions

Power Requirements

Please only use a power supply adapter approved by the manufacturer (9 VDC and center negative polarity). ⊕—◉—⊖

Only use power supplies that have been approved by the relevant authorities and that meet UL, CSA, VDE or CCC standards. Unplug the power adapter when not in use or during thunderstorms.

We recommend pedal-specific, transformer-isolated wallwart power supplies or multiple isolated-output supplies. Pedals will make extra noise if there is ripple or unclean power. Switching-type power supplies, daisy chains and non-pedal specific power supplies do not filter dirty power as well and will let unwanted noise through.

DO NOT RUN AT HIGHER VOLTAGES!

Storage and handling

- Do not use excessive force to operate the control elements of the pedal.
- Do not drop the pedal, and avoid placing the pedal in locations where it may be subject to shock or vibrations.
- Do not modify the pedal without authorization.
- Do not place the pedal in locations exposed to direct sunlight or excessively high or low temperatures.
- Do not place the pedal in wet locations or places with high humidity.
- Do not place the pedal in excessively dusty or dirty locations.

Cleaning

Clean only with a soft, dry cloth. If necessary, lightly moisten the cloth. Do not use abrasive cleaners, cleaning alcohol, paint thinners, wax, solvents, cleaning fluids, or chemical-impregnated wiping cloths.

Connections

Always disconnect the power supply from the pedal and any other equipment before connecting or disconnecting signal cables. Also make sure to disconnect all connection cables and the power supply before moving the pedal.

Warranty

This device has a limited warranty of 2 years to the original owner.

Should you encounter any issues, please visit
www.thorn-soundlabs.com/warranty

RECYCLING

This product carries the selective sorting symbol for Waste Electrical and Electronic Equipment (WEEE). This means that this product must be treated in accordance with European Directive 2012/19/EU in order to be recycled or dismantled to minimize its impact on the environment.

The user has the option of returning the product to a competent recycling organization or to the retailer when purchasing new electrical or electronic equipment.

The exclamation point within an equilateral triangle is intended to alert the user to the presence of important operating and maintenance (servicing) instructions in the literature accompanying the appliance.

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