Another good suggestions from a customer: a bypass-able tone control. This option provides the same benefit as Fender’s no-load tone pot, though that wasn’t really the idea behind it. In our opinion it’s a more elegant solution than a no-load pot, plus it adds a couple of benefits that a no-load pot doesn’t.

We think of this control as a tone preset control. Rolling back your tone control to warm up the guitar may be just the ticket for rhythm work where you need to lay back in the mix a little, especially when using one bridge pickup. But when it’s solo time, you want it to cut. This control is perfect for that. Pre-set your tone control, and when it’s time to cut, simply push the little pushbutton switch. Voilà, full treble! Push the button again, and you’re back at your preset tone. So once you get the tone control adjusted right where you like it, you don’t have to change this setting in order to go to full treble. Just push the button to toggle between your settings.

Also, when the tone control is bypassed, it functions like a no-load pot. A traditional tone pot “loads” the circuit when it’s fully clockwise, because even though the attached capacitor is taken out of play (and therefore no treble frequencies are being removed), the pot is in fact a resistor, and remains visible to the circuit. Whether or not this is a problem depends on your perception: certainly none of the ‘50s and ‘60s Tele’s that many players revere had no-load tone pots (which came about in the 1990s); but there is a tonal consequence of leaving the pot visible to the circuit, therefore many players like the idea of a no-load tone pot.

Our implementation does this, by making the pot itself invisible to the circuit when it’s bypassed.

We offer this tone control with several of our popular Tele wiring configurations, including this series/parallel wiring. Wiring two coils together in series rather than parallel yields markedly different results. On Telecasters with 2 pickups, the traditional parallel wiring provides relatively consistent output across all three positions. A Telecaster with its pickups wired in series differs in that when both pickups are on at the same time, the combination produces higher output and a fatter tone. A 4-position Tele switch allows players to have both wiring options at once. The resulting pickup combinations are:

- Position 4: Bridge & Neck Pickups in Series (fatter tone than position 2 & more output than positions 1, 2, or 3)
- Position 3: Neck Pickup (standard Tele)
- Position 2: Bridge & Neck Pickups in Parallel (standard Tele)
- Position 1: Bridge Pickup (standard Tele)

Players with reverse-wound, reverse-polarity pickups receive the additional benefit of hum-cancellation in switch positions 2 and 4.

If your neck pickup has a cover, the cover must be isolated from the pickup’s black wire and a separate ground wire added to it in order to maintain its shielding capability (if your neck pickup is uncovered, then this is a non-issue). The exceptions to this are the Fender Texas Special neck pickup (which already has a separate [yellow] ground wire), and pickups that are bought from ToneShapers as part of a prewired assembly (we’ll add a yellow wire to the cover for you). If you need to modify your neck pickup in this way and are unclear on how to do it, please refer to the illustrations on either of our 4-way Tele wiring diagrams, available on our website.
**PUSHBUTTON USED IN VOLUME POSITION**

Bridge Pickup Ground + Neck Pickup Cover
Neck Pickup Return
Neck Pickup Hot
Bridge Pickup Hot

**PUSHBUTTON USED IN TONE POSITION**

Bridge Pickup Ground + Neck Pickup Cover
Neck Pickup Return
Neck Pickup Hot
Bridge Pickup Hot

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**ToneShaper**

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Tone Shapers, Inc.
777-565-3103
www.toneshapers.com

**Design Notes**

- George Ellison
- Date: 11/26/11
- Style: Telecaster®
- 4-Way Fender Wiring
- w/ Tone Control Bypass
- 1 of 1

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