

Re: where use all three terminals on a potentiometer?

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- *From:* Tim Wescott <tim@xxxxxxxxxxxxxxxxxxxx>
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layoutdesign wrote:

I have used two of the three terminals to vary the resistance for controlling the gain or amplification for audio. I am newbie and haven't used the three terminals all at the same time. I guess it might be used to split current or perhaps some usage for varying the voltage drop? Is there any circuit for hobbyist to build to use all three terminals for some sort of cool device?

The "right" way to use a potentiometer for a volume control is to connect the output of your preamp stage to the 'top' of the pot, connect the 'bottom' to ground, and take the audio off of the tap.

Similarly, if you want to use a potentiometer for a position feedback, you would power the top and bottom terminals with either +V and ground, or +V and -V, and take the position reading off of the tap. Using the +V/-V method means that the tap voltage is proportional to the (signed) position around center, where the +V/0V method means you have to interpret the position as having one sign, or you have to add in an offset yourself.

Start paying attention to circuit design projects on web pages or in magazines, and you'll see this.

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