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Stereo Tape Simulator, setup guide

Follow the testing procedure in the shown order. If one test fails, find out the problem, correct it then resume.

Always unplug power between steps because it is very easy to create a shortcut when moving a DMM probe. And most of the time, shortcuts are fatal to the circuits.

Step		Description
1.	Short circuit check	Do a basic short circuit check with your digital multimeter (DMM) set to Ohms :
		Between Test point OV and V+ .
		Between Test point OV and V
		In both cases you should get several kilo-Ohms. If it is not the case, find out and fix the short before applying power.
2.	PSU check	Set your DMM to DC Volts on a 20 V scale and connect it between test points $\overline{\text{OV}}$ and $\overline{\text{V+}}$.
		Plug in power. Check that you get + 15V.
		Repeat operation between test points OV and V -, you must get -15 V .
3.	Sound check	Insert the STS between the output of a line level audio source and a monitoring input.
		Test the STS with an audio source.
		Check the BYPASS switch action.
		Check the IN potentiometer action. It modifies the input gain. The effect is immediately visible on the vu-meter.
		Check the OUT potentiometer action. It modifies the output level.
		Check the speed switch on audio (subtle effect).
4.	Left vu-meter setting	Connect a TKHz sine source to the input. You can use your multitrack software loop playing a sine tone like the one that is downloadable from the "Downloads & Useful links" section on our website. Adjust the output level in order to get around 2.5VAC.
		Now connect the multimeter (AC Volts) between test points OV and TPI .
		Move the panel IN potentiometer until you read exactly 6.5V. This is 3 dB below clipping.
		Adjust trimmer PI on the vu-meter board to the point where the last red LED (clip) just starts lighting up while turning clockwise.
5.	Right vu-meter setting	Repeat the same operation for the right channel.
6.	Congratulations!	You're done!