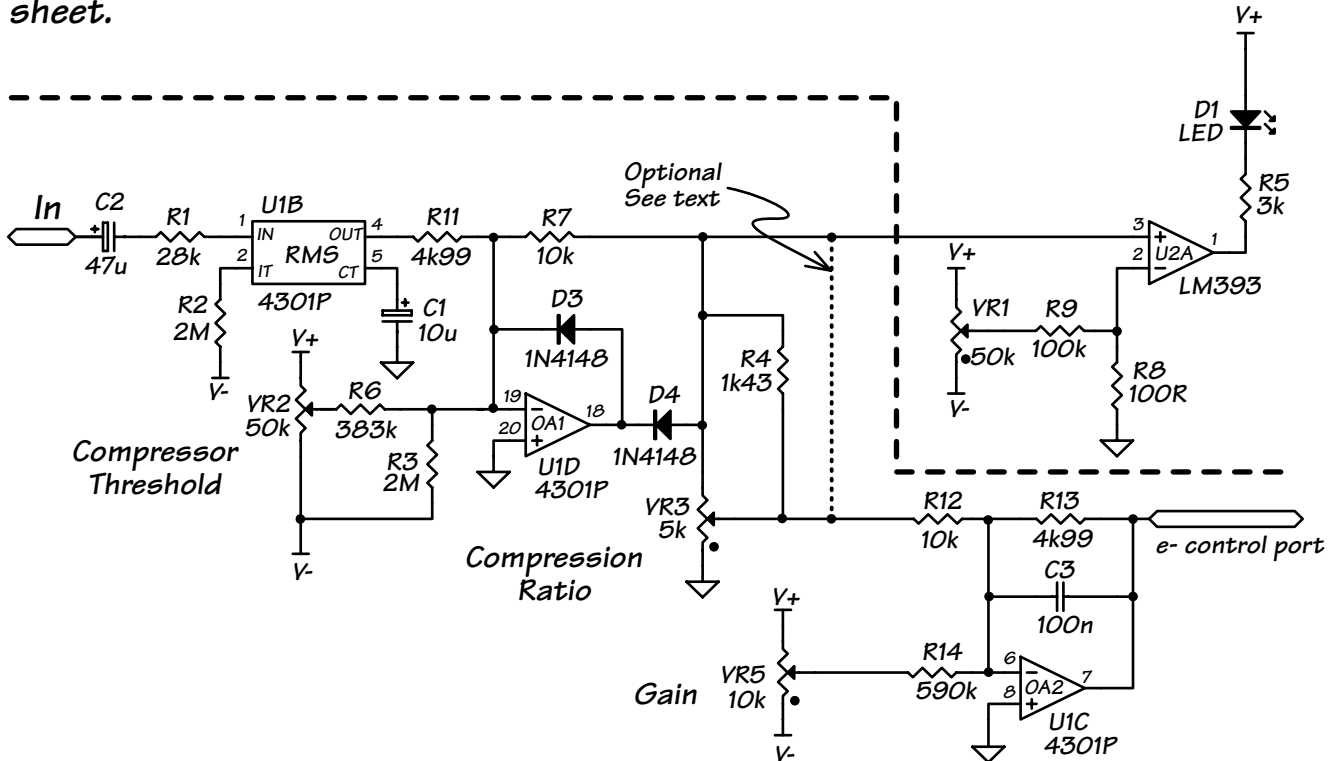


# THAT4301 Gain Reduction Indicator (above-threshold indicator)

The following circuit assumes that you are using the THAT 4301 in a typical compressor / limiter application. Below the dashed line, the circuit has an RMS detector, a threshold amplifier, and a control port buffer nearly identical to the compressor / limiter schematic shown in the 4301 data sheet.



The difference lies in the portion of the circuit above the dashed line. The comparator, ½ of an LM393, senses the output of the threshold amplifier, and when this voltage goes below ground, the LM393 (U2) switches low to indicate that the voltage at the control port is changing. This should work quite nicely unless the wiper of VR3 is turned all the way to ground. If that is a problem, you may instead connect the input of the comparator to the wiper of VR3, shown by the dotted line. This connection is less desirable because the wiper is a higher impedance point most of the time, but it will alleviate the grounded-wiper problem.

The purpose of VR1 is to null out the offset voltage of U2.