

Removing the molybdenum converter from a TEI 42iTL presents two issues. First, the converter case also houses an ozone scrubber which only works when heated. We suggest replacing this with a catalytic ozone scrubber which works at ambient temperatures (Carulite 200). Second, the instrument has safety overrides to not turn the ozonizer on if the molybdenum converter temperature is below 300C. This temperature is taken from a type K thermocouple which can be replicated using a voltage divider. 15V can be taken from a spare connector on the measurement interface board and run through a 1M $\Omega$  resistor in series with a 5k potentiometer which allows dialing in a voltage to match the expected thermocouple voltage at 325C. This is shown in Figure 1. The voltage of a thermocouple at 325C with a reference junction at 0C is 13.25mV.

