



# Testing Amperage

## AMPERAGE MEASUREMENTS:

Remember from ohms law that amperage readings are only meaningful when the voltage is known. 48 amps on a 240 volt circuit produce much more wattage than 48 amps on a 208 volt circuit.  $Watts = amps \times volts$  and watts heat up your kiln!

Amperage readings can give you a very good indication of how your kiln is performing under load (with the kiln on). If the amperage is lower than the nominal kiln amperage then your kiln is not going to heat up properly to the rated temperatures. Low amperage is usually caused by low voltage to the kiln or elements resistance increasing but may also be a bad connection in the kiln wiring or at the element connectors.



*Testing Amperage at Feeder Wires*

On KilnMaster (KM) kilns the amperage readings can be done with a clamp on ammeter around the feeder wires and jumper wires going to the elements. The RAMP/HOLD 9999 program will be useful to keep the relays on during this measurement. On Kiln Sitter (KS) kilns manufactured after 1998 the readings can be made at the feeder wires to the elements after unscrewing and swinging open the top or bottom section boxes. You should always turn the kiln off until you plan where you will be taking your amperage readings, then turn the kiln on to make your readings.

Amperage readings can also be performed on the wiring to the kiln inside the circuit breaker box by qualified electricians.