



# How to Perform an Ohm Test



## A Step by Step Guide

### Measure the surface temperature of your infrared heater

Verify that your heater is not working by measuring the surface temperature

Use an Infrared Thermometer that can reach up to 500° F. A broken panel will read room temp (~60-90° F).



If multiple heaters are not working have your electrician take photo confirmation of voltage measurement using a multimeter and send the photo to HG Support along with the results of your Ohm test.

### Perform an Ohm test $\Omega$



Disconnect the heater from power. Set the correct range for resistance mode  $\Omega$  and attach the probes to the black & white leads in the junction box.

An OL (open loop) or infinity ohm reading qualifies for a warranty replacement element.

Send HG Support photos of the Ohm reading along with your invoice number, and heater model # to request a warranty replacement.

### What is an Ohm test & what does it measure?

An OHM test, or resistance reading, measures the electrical flow and continuity between two points on the element of the heater.

The heater is similar to a lamp and the continuity tests if the "lightbulb" or element is functioning properly.

When there is an OL or open loop reading this means there is no continuity in the element of your heater and the element will need to be replaced.

$$\frac{\text{Voltage X Voltage}}{\text{Wattage}} = \text{OHMS}$$

Example:

$$\frac{240\text{V X } 240\text{V}}{1,500\text{W}} = 38.4$$

### What do I do if my Ohm test does not result in an OL reading?

The next step would be to have your electrician check all of the electrical connections and controls linked to your infrared system.

Correlation is not always causation and there are a multitude of factors which can lead to a malfunctioning heater such as short-circuiting, improper gauge wiring, faulty relay, and leaking voltage.

If the problem is electrical based and not the heater itself, a new heating element will not solve the issue.

