Minuteman International

Component Testing Guide

Diodes

Where Used:

On all automatic scrubbers and battery powered burnishers and vacuums.

Purpose:

A diode is a one-way electrical check valve that prevents electrical current from flowing in one direction. This allows us to protect a circuit and electrical components from electrical spikes. A diode also allows us to prevent back feeding of current in a shared circuit.

How to Test:

To test a diode, you will need a continuity tester or an OHM meter.

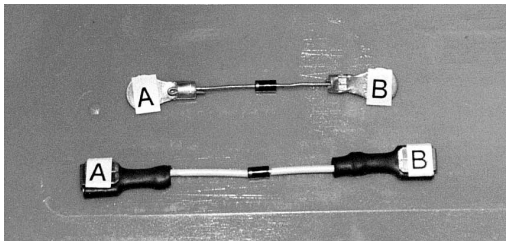
To test the diode:

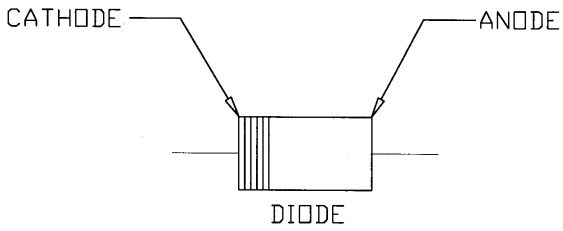
1). Put your OHM meter on the highest scale, i.e. R x 10,000 scale and "zero" out your meter and remove the diode from the circuit.

2). Put the red lead of your OHM meter on the cathode side of the diode (the side with the silver or white band - In Photo - Side "A").

3). Put the black lead from your OHM meter on the opposite side of the diode. (In Photo - Side B). Your OHM meter or continuity tester should show no counting through the diode if it does, your diode is defective and must be replaced.

4). Reverse the leads and check the diode again. The red lead should be on the "B" side as shown in the photo, and the black lead should be on the cathode or a side of the diode. At this time your OHM meter or continuity tester will show continuity.





NOTE: *If the customer has had repeated tripping of the circuit breaker the breaker must be replaced and the components in the circuit must be tested for excessive current draw. A circuit breaker valve drops each time it is tripped.*

CAUTION: These tests should only be performed by a qualified technician. Working with electricity can be dangerous. When using jumper wires to help diagnosis an electrical component, care must be exercised to prevent a short circuit from occurring. Do not allow the two test leads (jumpers) to touch or personal injury or damage to the equipment will result.