

INSTRUCTION SHEET

For

12081-05 POWERSTAT®

with ACE WARNING GLOW*

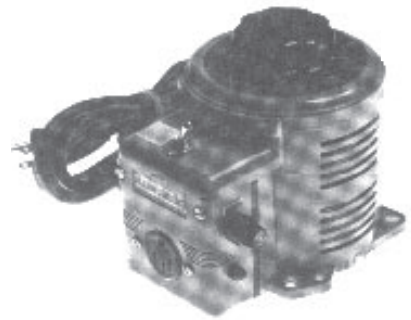
*Warns of lethal hazard when light glows

HOW IT WORKS:

In autotransformers, one wire is continuous from input to load. If this wire happens to be connected to the "hot side" of the service, a 110 to 120v potential exists between it and ground. Contact between this terminal and ground can be lethal even though the autotransformer is set for only 1 volt output between its terminals.

The Warning Glow (light) indicates this condition exists. Reversing the Hot and Neutral wires in the service receptacle corrects this condition. It is now only the voltage between the output terminals which must be considered. The warning light also reappears when a hazardous transformer output voltage is reached (50-55v). This is a compromise voltage usually causing an unpleasant "sticking sensation". Under

normal conditions, skin resistance will vary between 20,000 and 100,000 ohms, but after current starts to flow this value decreases rapidly. Hands wet with perspiration, etc. have a low resistance and a number of cases are on record of electrocution from 36 volt home systems. A current of 0.050 amps through the cardio-pulmonary region is sufficient to cause ventricular fibrillation (heart convulsions) a condition for which there is no field treatment or cure. Care should be exercised to avoid creating a conducting path through the arms or arm and leg.



OPERATION:

1. Plug autotransformer into standard 120 volt A.C. standard service grounding receptacle, 60 Hz.
2. Set autotransformer dial to ZERO volts.
3. Flip power switch ON.
4. Observe RED Warning Light.
 - a. Light is glowing: neutral and black "hot" wire are reversed at your service receptacle. This condition should be corrected immediately for safe operation.
 - b. Light should not glow: Indicates correctly wired service receptacle. Turn dial increasing the output voltage to 60 volts. The warning light should begin to glow since there is now a dangerous voltage at the output socket terminals and to ground; therefore the light does glow.

Note: If light does not glow in either condition (a) or (b), then: (1) your service receptacle is inoperative or the ground might not be connected. (2) Check fuse of autotransformer (10.A.).

Input Power: 120 volts, 50/60 Hz, 10. amps., max.

Output Power: 0-140. volts, 50/60 Hz, 10. Amps., max.

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