

W10MT3A
Variac Autotransformer
Operation Manual

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IET LABS, INC.

Email: info@ietlabs.com

www.ietlabs.com

TEL: (516) 334-5959 • (800) 899-8438 • FAX: (516) 334-5988

◆ PRECISION INSTRUMENTS FOR TEST AND MEASUREMENT ◆



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WARRANTY

We warrant that this product is free from defects in material and workmanship and, when properly used, will perform in accordance with applicable IET specifications. If within one year after original shipment, it is found not to meet this standard, it will be repaired or, at the option of IET, replaced at no charge when returned to IET. Changes in this product not approved by IET or application of voltages or currents greater than those allowed by the specifications shall void this warranty. IET shall not be liable for any indirect, special, or consequential damages, even if notice has been given to the possibility of such damages.

THIS WARRANTY IS IN LIEU OF ALL OTHER WARRANTIES, EXPRESSED OR IMPLIED, INCLUDING BUT NOT LIMITED TO, ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE.



WARNING



OBSERVE ALL SAFETY RULES
WHEN WORKING WITH HIGH VOLTAGES OR LINE VOLTAGES.

**Dangerous voltages may be present inside this instrument. Do not open the case
Refer servicing to qualified personnel**

HIGH VOLTAGES MAY BE PRESENT AT THE TERMINALS OF THIS INSTRUMENT

WHENEVER HAZARDOUS VOLTAGES (> 45 V) ARE USED, TAKE ALL MEASURES TO
AVOID ACCIDENTAL CONTACT WITH ANY LIVE COMPONENTS.

USE MAXIMUM INSULATION AND MINIMIZE THE USE OF BARE
CONDUCTORS WHEN USING THIS INSTRUMENT.

Use extreme caution when working with bare conductors or bus bars.

WHEN WORKING WITH HIGH VOLTAGES, POST WARNING SIGNS AND
KEEP UNREQUIRED PERSONNEL SAFELY AWAY.



CAUTION



DO NOT APPLY ANY VOLTAGES OR CURRENTS TO THE TERMINALS OF THIS
INSTRUMENT IN EXCESS OF THE MAXIMUM LIMITS INDICATED ON
THE FRONT PANEL OR THE OPERATING GUIDE LABEL.

INPUT POWER: Metered Variac Autotransformers are supplied with a three-wire cord and plug for connection to 50-to 60-cycle nominal 120-volt power line. The third wire in the cord-plug circuit provides automatic grounding of external metal parts, as a safety feature. Do not attempt to operate the units on direct current, or damage will result.

LOADS: Metered Variac Autotransformers are suitable for the control of any alternating-current load within their rating of 10 amperes. Since they are connected for overvoltage (117% of line) operation, care must be taken to avoid damage to loads that are incapable of withstanding higher-than-line voltage. Metered models are, of course, particularly useful in determining load current, or watts, versus applied voltage.

SWITCHING: To avoid possible destructive surges, set the control knob to the full counter clockwise (zero voltage) position before connecting the autotransformer to the line, or the load to the autotransformer. Slowly rotate the control knob clockwise (increasing the voltage), and observe the meter. Unusually high readings signify trouble; the voltage should be returned to zero and the trouble corrected. The meter range is changed by a current transformer for highest possible accuracy; make-before-break contacts permit switching under load.

ACCESS: No user-serviceable parts inside.

FUSE: The meter circuit of this unit are fused to prevent overload damage to the meter movements. The fuse required is: 12 ampere Bussman Type ABC-12. These are fast-blow types; replacement with slow blow fuses or fuses of a higher rating will endanger the meters.

Specifications

Frequency: 50-60 Hz

Input Voltage: 120 volts

No-Load Loss (60-cycle): 17 watts

Output: 0-140 volts; 10 amperes, maximum

Voltmeter Range: 0-150 volts

Ammeter Range: 0-10 amperes

Meter Accuracies: $\pm 3\%$ of full scale

Switching: OFF-ON, two-pole switch disconnects assembly from line in "OFF" position

Terminals:

Line-3-wire cord and plug

Load-3-wire outlet receptacle (will accept parallel 2-wire plug)

Fusing: 12-amperes BUSS ABC-12

Angle of Rotation: 320°

Driving Torque: 15-30 ounce/inches.

Case Dimensions: Width 9-5/8, height 12-5/8, depth 6-1/4 inches

Net Weight: 12 pounds (5.5 kg)

