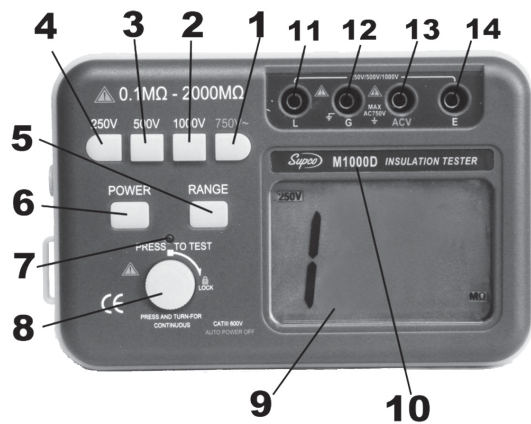




# M1000D Instruction Manual

## DESCRIPTION

Insulation resistance tester M1000D enables the user to measure the insulation value of appliances, hermetic compressors, motors and other electrical apparatus. Insulation test voltage is user selectable - 250V, 500V or 1000V. Test voltage selection depends on the particular apparatus requirement and is usually specified by the manufacturer. M1000D also provides an AC voltage measurement capability up to 750VAC.



1. AC Voltage measurement selector
- 2-4. Voltage selector
5. Resistor range selector
6. Power switch
7. High voltage LED indicator
8. Test button
9. LCD display
10. Instrument model number
11. L-test terminal
12. Ground terminal
13. AC voltage terminal
14. E-terminal

## Specifications

| Selected Voltage    | 250V +/-20%  | 500V +/-20%   | 1000V +/-20%   |
|---------------------|--------------|---------------|----------------|
| Range Button Up     | 0.1MΩ - 20MΩ | 0.1MΩ - 50MΩ  | 0.1MΩ - 100MΩ  |
| Range Button Down   | 20MΩ - 500MΩ | 50MΩ - 1000MΩ | 100MΩ - 2000MΩ |
| Resistance Accuracy | +/-5%        | +/-5%         | +/-5%          |
| Measurement Current | 1.8mA        | 1.8mA         | 1.6mA          |

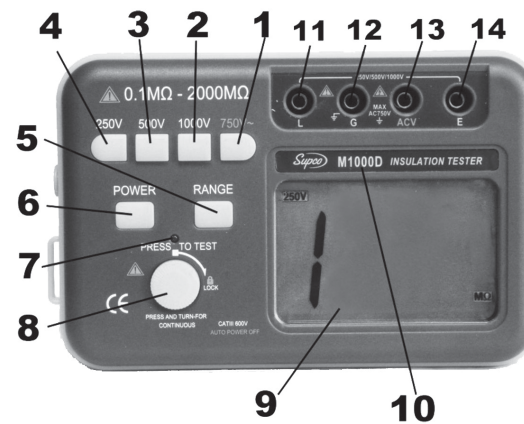
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|--|--|
| Voltage measurement accuracy               | +/-5%  |
| Input terminals for voltage measurement    | ACV & G  |
| Input terminals for insulation measurement | L & E  |
| Frequency range                            | 50 – 200 Hz.                                       |
| Power source                               | 6 AA alkaline batteries                            |
| Auto power off                             | 15 minutes   |
| Power consumption with open leads          | 300 mW.  |
| Temperature range                          | 32°F - 105°F (0°C - 40°C)                          |
| Relative humidity                          | 30%RH – 85%RH Non-condensing                       |
| Dimensions                                 | 7.95" x 4.25" x 2.25"<br>( 175 mm x 110 mm x 70mm) |
| Weight                                     | 1.39 Lbs. (630g)                                   |



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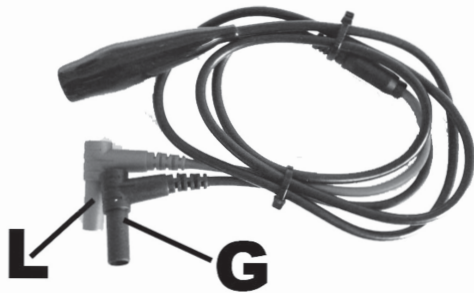
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## OPERATION

1. Insert six AA alkaline batteries following the printed polarity.
2. Select the desired voltage range (250V/500V/1000V), pos. 2, 3 or 4 for resistance measurement or AC750V for voltage measurement.
3. Select the desired resistance range or AC750V for voltage measurement.
4. Connect leads to L and E terminals for resistance measurement.
5. For voltage measurement press 750V button, pos.1.
6. Connect leads to ACV & G for AC voltage measurement.
7. Press power button, pos. 6 to turn the instrument on.
8. Press test button, pos. 8. Turn the knob clockwise to lock it and read the resistance or voltage value on the display.
9. When "1" only is displayed, as it is shown on the picture, over range is indicated. This means the resistance is more than 2000 M $\Omega$ .

## EMI/RFI Probe

- To eliminate EMI/FRI (Electro-Magnetic Interference/Radio-Frequency Interference), an additional probe is provided with the M1000D.
- Connect this probe as shown in the picture and use another standard probe connected to the terminal "E".



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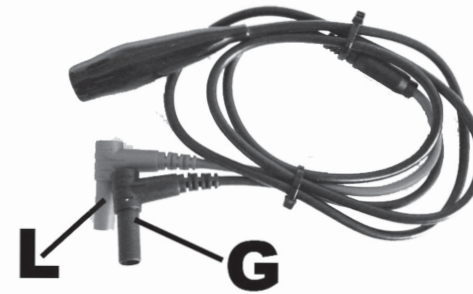
Rev. .01052012

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