

# H.V. Insulation Tester(1kV up)



## **FEATURES**

- Smart microprocessor controlled.
- 2 x 16 characters, large, High Contrast, Intelligent LCD Module.
- 20 Insulation test voltages
   500V, 1kV, 1.5kV, 2kV, 2.5kV, 3kV, 3.5kV, 4kV, 4,5kV, 5kV,
   5.5kV, 6kV, 6.5kV, 7kV, 7.5kV, 8kV, 8.5kV, 9kV, 9.5kV, 10kV.
- Calculate Dielectric Absorption Ratio (DAR) Automatically.
- Calculate Polarization Index (PI) Automatically.
- Insulation resistance Auto-Ranging on all ranges.
- Ener-Save<sup>TM</sup>.
- Bar-graph indicates test voltage. Rise and decay can be observed.
- Warning of external voltage presence(>500Vac or Vdc).
- Overload protection.
- Low battery indicator(real time battery voltage measurement).
- Measure insulation time duration of the test.
- Low battery consumption.
- Better than 10% accuracy on all ranges.
- Auto-off.

● EN 61010-1 : 2001 EN 61326-1

#### **SPECIFICATIONS**

Test Voltage	From 500Vdc to 10KVdc Adjustable in 500 V Steps
Preset Buttons	1KV, 2.5KV, 5KV, 10KV
Measuring Range	800K $\Omega$ -500G $\Omega$ (AUTO-RANGING)
Accuracy	± 5% ± 2 digits
<b>Output Power Limit</b>	1W
Voltage Regulation	Selected Voltage +20%-5% of nominal value unless current limited. Meaning that if output current is too high, the voltage will be lowered automatically.
Weight	3.6 kg Approx.
Dimensions	330(L) x 260(W) x 160(D)mm
Power Source	1.5V "C" x 8 Alkaline Batteries
Accessories	Color coded flexible silicone test leads (AL-50+AL-30+AL-30C) Instruction manual Batteries

## **SPECIAL FEATURES**

# ● DAR = Dielectric Absorption Ratio.

The dielectric Absorption Ratio is the ratio of the Insulation Resistance measured at 1 Min divided per the Insulation Resistance measured at 30 Seconds.

30 Seconds after starting a test (with Ener-Save™ disabled), the tester will beep, indicating the operator that the resistance value measured at 30 second now has been saved internally.

1 Minute after starting a test (with Ener-Save™ disabled), the tester will beep again, indicating the user that the DAR result is now computed, and change the display format to now display the DAR result.

#### PI = Polarization Index.

The Polarization Index or PI is the ratio of the Insulation Resistance measured at 10 Minutes divided per the Insulation Resistance measured at 1 Minute.

10 Minutes after starting a test (with Ener-Save™ disabled), the tester will beep again, indicating the user that the PI result is now computed, and change the display format to now display the PI result.

The tester will Auto-Stop at 10 minutes.

#### Digital Display.

The digital Liquid Crystal Display is large. It measures 98mm(W) x 24mm(H) and has a 2 Lines of 16 characters. Language can be changed on demand, as an option. Dutch / French / German etc... (factory fitted at order)

# Automatic Battery Test.

When the tester starts, it test it's batteries by drawing a heavy current from the batteries. During that heavy current, it measures the battery voltage and displays it for a few seconds on the display.

During normal use, the tester monitors the battery voltage, but without drawing a battery test current. It just measures the battery while in normal use.

# Automatic Discharge of Capacitive and Inductive Circuits.

This tester will discharge automatically all circuits charged by the tester, after a test is done, again, this will only be activated if the test leads make contact at any time before, during and after the test.

# It's your responsibility to ensure proper contact of the leads at all Times.

Once a test is finished, the testers will automatically discharge capacitive or inductive circuit of their charge. The discharge can be observed on the display, in the form of a bar-graph. Again, do not disconnect the leads while discharging.

Wait until completion of the discharge before removing any lead. During discharge, the Buzzer will beep and the bar-graph will show some voltage. With some high charges, this may take some time. Be patient and let the instrument discharge completely before proceeding to removing the leads.