



ET-880

DIGITAL MULTIMETER OPERATING INSTRUCTION

Safety Precautions

1. Improper use of this meter can cause damage, shock injury or death. Read and understand this user manual before operating the meter.
2. Always remove the test leads before replacing the battery or fuses.
3. Inspect the condition of the test leads and the meter itself for any damage before operating the meter. Repair any damage before use.
4. Do not exceed the maximum as marked on meter.
5. Use great care when making measurements if the voltages are considered a shock hazard.
6. Always discharge capacitors and remove power from the device under test before performing Diode, Resistance or Continuity tests.
7. Remove the battery from the meter if the meter is to be stored for long periods.
8. To avoid electric shock, do not measurement AC current on any circuit whose voltage exceeds 250V AC.

Specification

Function	Ranges	Resolution	Accuracy	Overload Protection
DC Voltage	400m/4/40/400/600V	0.1mV	$\pm (0.8\% \text{ rdg} + 4\text{dgt})$	600V DC/AC(rms)
AC Voltage	4/40/400/600V	1mV	50-60Hz $\pm (1.2\% \text{ rdg} + 5\text{dgt})$ 40-400Hz $\pm (1.5\% \text{ rdg} + 5\text{dgt})$	
DC Current	400/4000mA, 40/400mA	0.1A	$\pm (1.2\% \text{ rdg} + 5\text{dgt})$	500mA fuse
AC Current (40-400Hz)	4/10A	1mA	$\pm (1.5\% \text{ rdg} + 5\text{dgt})$	no fuse
Resistance	400/4000mA, 40/400mA	0.1A	$\pm (1.5\% \text{ rdg} + 5\text{dgt})$	500mA fuse
Capacitance	4/10A	1mA	$\pm (2\% \text{ rdg} + 5\text{dgt})$	no fuse
Frequency	400/4000mA, 40/400mA	0.1A	$\pm (1.0\% \text{ rdg} + 4\text{dgt})$	250V DC/AC(rms)
Temp °C	4MΩ	1kΩ	$\pm (1.2\% \text{ rdg} + 4\text{dgt})$	
Temp °F	40.00MΩ	10kΩ	$\pm (1.5\% \text{ rdg} + 5\text{dgt})$	
Continuity	40nF/400nF/4μ/40μ/100μF	0.01nF	$\pm (3.0\% \text{ rdg} + 5\text{dgt})$	
Diode Check	10/100/1k/10k/1M	0.001Hz	$\pm (0.3\% \text{ rdg} + 4\text{dgt})$ Sensitivity: 1V rms, 5V rms ($>1\text{MHz}$)	250V DC/AC(rms)

*Accuracy no available for <10nF capacitance

**Probe accuracy not included

Display :

3999 Count LCD

Over range:

"OL" is displayed

Polarity: Automatic (no indication for positive

Polarity); Minus(-) sign for negative polarity

Low Battery : is displayed if battery voltage

drops below operating voltage

Batteries:

AAA 1.5V x 2

Fuse:

500mA / 250V

Operating environment:

0~40°C <75%

Storage environment:

-20~60°C <80%

Weight:

200g

Size :

150mm x 76mm x 38mm

Safety Certification :

CAT III 600V

Accessories: Test Lead, Instruction manual,

K type thermocouple

Operating Instructions

Voltage Measurements

1. Insert the black test lead banana plug into the negative COM jack and the red plug into the V jack.
2. Turn the rotary switch to the $\overline{V}$ position.

3. Press the SEL button to select either AC or DC.

4. Touch the test probes to the circuit under test.

5. Read the voltage on the display.

Current Measurement

CAUTION:

Do not make high current measurements on the 10A scale for longer than 15 seconds followed by a 15 minute cool down period. Exceeding 15 seconds may cause damage to the meter and /or the test leads.

1. Insert the black test lead banana plug into the negative COM jack.

2. For current measurement up to 400mA, Turn the rotary switch to the μ A or mA range and insert the red test lead banana plug into the mA jack.

3. For current measurement up to 10A, Turn the rotary switch to the 10A range and insert the red test lead banana plug into the 10A jack.

4. Press the SEL button to select either AC or DC.

5. Touch the black test probe tip to the negative side of the circuit and the red tip to the positive side.

6. Apply power to the circuit.

7. Read the current on the display.

Resistance Measurements

1. Insert the black test lead banana plug into the negative COM jack and the red plug into the Ω jack.
2. Turn the rotary switch to the Ω position.

3. Touch the test probe tips across the circuit or part under test. It is best to disconnect one side of the part under test so the rest of the circuit will not interfere with the resistance reading.

4. Read the resistance on the display.

5. Overload protection : 250Vrms.