DIGITAL THERMOMETER INSTRUCTION MANUAL

INTRODUCTION

This thermometer is a 3 1/2 digit LCD displaying meter, which driven by 9V battery. Any K-type can be used as the temperature sensor.

SPECIFICATIONS

- 1. Display: 3 1/2 digit large LCD display, Max. display 1999.
- 2. Sampling rate: Approx. 2.5times/ sec.
- 3. Over range display: "1" or "-1".
- 4. Low battery indication: LCD display ":".
- 5. Working environment: $-10\sim50$ °C, relative humidity<80%.
- 6. Store environment: -20~60°C, relative humidity <80%.
- 7. Battery: 9V battery, 006P or IEC6F22 or NEDA1604.
- 8. Battery life: alkaline battery about 200hours, carbon battery about 100hours.
- 9. Size: 130mm (length) ×95mm (width) ×28mm (height).
- 10. Weight: Approx. 240g (including battery).
- 11. Accessories: Manual, case, TPO1 probe, 9V battery.

TECHNICAL DATA

- 1. Accuracy: \pm (a%×reading + digit)
- 2. Accuracy adjust environment: $23^{\circ}\text{C} \pm 5^{\circ}\text{C}$
- 3. Measurement range: $-50\,^{\circ}\mathrm{C} \sim 1300\,^{\circ}\mathrm{C}$

 $-50^{\circ}\text{F} \sim 1999^{\circ}\text{F}$

4. Temperature will effect error coefficient: The coefficient is $0.1 \times accuracy/^{\circ}C$ when the temperature is lower than $18^{\circ}C$ or higher than $28^{\circ}C$.

Resolution	Range	Accuracy	
0. 1℃	-50°C ~199.9°C	-50° C \sim 199.9°C $\pm (0.3\%+1^{\circ}$ C)	
0. 1°F	-50°F ∼199. 9°F	$-50^{\circ}\text{F} \sim 199.9^{\circ}\text{F} \qquad \pm (0.3\% + 1^{\circ}\text{F})$	
1℃	-50°C∼1300°C	$\begin{array}{ccc} -50^{\circ}\text{C} \sim 1000^{\circ}\text{C} & \pm (0.3\% + 2^{\circ}\text{C}) \\ 1000^{\circ}\text{C} \sim 1300^{\circ}\text{C} & \pm (0.6\% + 2^{\circ}\text{C}) \end{array}$	
1°F	-50°F ∼1999°F	$\begin{array}{ccc} -50^{\circ}\text{F} \sim & 1000^{\circ}\text{F} & \pm & (0.3\% + 2^{\circ}\text{F}) \\ 1000^{\circ}\text{F} \sim & 1999^{\circ}\text{F} & \pm & (0.6\% + 2^{\circ}\text{F}) \end{array}$	

- Note: 1. For ensuring the accuracy, please start to measure for 3 minutes later when the meter turn
- 2. The accuracy of table above not includes the error of probe. Please refer to the accuracy of the probe to adjust it.

PANEL INTRUDUCTION

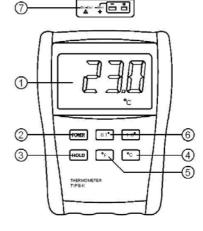
- 1. LCD: 3 1/2 digit LCD display.
- 2. Power: Power key
- 3. HOLD: it will display "HOLD" symbol when you hold the data.
- 4. $^{\circ}$ C mode selection key.
- 5. °F mode selection key.
- 6.0.1°C/1°C resolution mode selection key:

-50℃~199.9℃, 0.1℃

-50°F \sim 199.9°F, 0.1°F

-50℃~1300℃, 1℃

-50°F ~1999°F, 1°F



7. K-type thermocouple input end, Max. input voltage: DCV 60V or ACV 24V.

OPERATION INSTRUCTION

- 1. Press Power key; let the meter warm-up for 3 minutes.
- 2. Insert the thermocouple into the input end.
- 3. Select the function and range.
- 4. The probe of thermocouple touches the object need to measure.
- 5. Read the value.

Warning! If displays over range, it maybe cause by the following:

- 1. The thermocouple haven't insert into the input end.
- 2. The thermocouple inserted into the input end, it maybe the open circuit or poor contact.
- 3. The temperature measured is beyond the range you selected.

K-TYPE THERMOCOUPLE SELECTION

Model	Range	Field	Error
TP01	-50°C ~250°C	Any condition	-50°C∼250°C ±2.2°C
TP02	-50°C∼750°C	Liquid temperature	-50°C∼750°C ±0.4%
TP03	-50°C ~1300°C	Solid temperature	-50°C∼1300°C ±0.3%

E-DM6801A+/V1.0