

DIGITAL NON-CONTACT INFRARED INDUSTRIAL THERMOMETER

MT-18

INTRODUCTION

This is capable of non-contact (infrared) temperature measurements at the touch of a button. The built-in laser pointer increases target accuracy while the backlight LCD and handy push-buttons combine for convenient, ergonomic operation.

The Non-contact Infrared Thermometers can be used to measure the temperature of objects' surface that is improper to be measured by traditional (contact) thermometer (such as moving object, the surface with electricity current or the objects which are uneasy to be touched.)

Proper use and care of this meter will provide years of reliable service.





FEATURES

- Rapid detection function
- Precise non-contact measurements
- **Dual laser sighting**
- Unique flat surface, modern housing design
- Automatic Data Hold
- Emissivity Digitally adjustable from 0.10 to 1.0
- MAX MIN AVG DIF temperature displays
- Backlight LCD display
- Automatic selection range and Display Resolution 0.1°C $(0.1^{\circ}F)$
- Trigger lock
- Set high and low alarms
- Data logger (LOG)
- Transmit data to PC with USB.

WIDE RANGE APPLICATION:

Food preparation, Safety and Fire inspectors, Plastic molding, Asphalt, Marine and Screen printing, measure ink and Dryer temperature, HVAC/R, Diesel and Fleet maintenance.

Distance & Spot Size

As the distance (D) from the object increases, the spot size (S) of the area measured by the unit becomes larger. The relationship between distance and spot size for each unit is listed below. The focal point for each unit is 914mm (36"). The spot sizes indicate 90% encircled energy.

1in(25,4mm) 2in(50,8mm) 3in(76,2mm) 50in(1270mm) 100in(2540mm) 150in(3810mm) Distance: Spot = 50:1

SPECIFICATIONS

TK Temperature Range -50 to 1370 °C (-58 to 2498 °F)		
Accuracy	-50 ~ 1000 °C	± 1.5% of reading + 3 °C (± 5 °F)
	1000 ~ 1370 °C	± 1.5% of reading + 2 °C (± 3.6 °F)
Display resolution	0.1°C (0.1°F)	<1000
	1°C (1°F)	>1000
Repeatability		
	-50 ~ 1370 °C (-58 ~ 2498 °F) :	± 1.5% of reading
IR Temperature	Range -50 to 2200°C (-58 to 3992 °F)	D: S 50:1
Display resolution	0.1 °C (0.1 °F)	<1000
	1°C (1 °F)	>1000

Accuracy for targets:			
Assumes ambient operating temperature of 23 to 25 °C (73 to 77°F)			
	-50 ~ 20 °C (-58°F ~ -68 °F)	± 3.0 °C (5.4 °F)	
	20 °C ~ 500 °C (68 °F ~ 932 °F)	± 1.0% ±1.0 °C (1.8 °F)	
	500 °C ~ 1000 °C (932 °F ~ 1832 °F)	± 1.5%	
	1000°C ~ 2200°C (1832°F ~ 3992 °F)	± 2.0%	
Repeatability	-50 ~ 20 °C (-58 ~ 68 °F) :	± 1.5 °C (2.7 °F)	
	20 ~ 1000 °C (68 ~ 1832 °F):	± 0.5% or ± 0.5 °C (0.9 °C)	
	1000 ~ 2200 °C (1832 ~ 3992 °F):	± 1.0%	

150ms Response time Spectral response 8 ~ 14um

Emissivity Digitally adjustable from 0.10 to 1.0

Over range indication LCD will show "----"

Polarity Automatic (no indication for positive polarity);

Minus (-) sign for negative polarity

Diode laser output <1mW Wavelength 630~670nm,

Class 2 laser product

Operating temp. 0 to 50 °C (32 to 122 °F) Storage temp. -10 to 60 °C (14 to 140 °F)

Relative humidity 10% ~ 90% RH operating, <80%RH storage

9V battery, NEDA 1604A or IEC 6LR61 or equivalent Power supply

" CE " Comply with EMC Safety

^{*}Technical Specifications & Appearance are subject to change without prior notice