

RM305

Handheld Thermal Camera

RM305 is a professional handheld thermal camera, featuring high resolution and manual focus for temperature measurement. It is equipped with a self-developed 384×288 infrared detector, providing a high sensitivity of 35mK.

It finds extensive applications in fields such as electric power, electrical automation, building inspection, and commercial HVAC.



Product Highlights

Clear Thermal Images, Precise Temperature Measurement

- 12μm high-performance 384×288 uncooled infrared detector.
- NETD as low as 35mK, capable of distinguishing temperature differences of 0.035°C.
- USB plug-and-play analysis, real-time full-frame transmission, and analysis of temperature information.



Professional Functions, Multi-dimensional Design

- Support full-frame high/low-temperature alarms and scheduled image capture, and record temperature rise changes.
- Capable of automatically tracking the highest temperature, the lowest temperature, and the central-point temperature within the measurement area.
- Support multiple image modes+10 palette settings to meet temperature measurement under different requirements.
- Support professional thermal imaging analysis software on the app, PC, and cloud platform.



Hard-core Configuration, High-end Experience

- IP54 and 2m drop protection, solid and durable.
- 3.5-inch touch screen, 640×480 resolution
- Built-in laser pointer module for quick target locating.



Specifications

Thermal Imaging	
Detector Type	12μm uncooled infrared detector
Infrared Resolution	384×288
Spectral Band	7.5-14μm
Thermal Sensitivity (NETD)	<35mK (25°C,F1.0)
Frame Rate	30Hz
Lens Focal Length	6.2mm
FOV	43.7°×31.9°
Spatial Resolution (IFOV)	1.98mrad
Focus Mode	Manual focusing
Measurement Range	-20~+150°C, 100~550°C
Measurement Accuracy	±2°C or ±2% of readings, whichever is greater.
Image Display	
Display	3.5-inch touch screen, 640×480 resolution
Visible Light Camera	5 megapixels
Digital Zoom	1×, 2×, 4×, 8×
Palettes	10
Image Mode	Infrared, visible light, PIP, dual-spectrum fusion
Temperature Width Stretch	Automatic/Manual
Measurement and Analysis	
Analysis Functions on the Device	Custom points/lines/areas; up to 10 points, 10 areas, and 10 lines; Center point/Hot and cold spot tracking and temperature display
Supporting Software	PC (Infrared Analysis Software) & Mobile Device (iOS/Android APP)
Image Storage	
Storage Medium	Standard 32GB MicroSD, up to 512G
Text Notes	Support
Voice Annotation	Support
Image Naming	Auto/manual naming, naming by scanning QR code
System Functions	
Laser Pointer	Support
Video Transmission	Support UVC video transmission
Communication Protocol	Wi-Fi, USB
Others	
Battery	Rechargeable and detachable lithium-ion battery
Charging Mode	USB Type-C or desktop charger
Battery Life	About 6h (about 3h for a single battery)
Interface	USB Type-C, SD card
Tripod Socket	UNC 1/4-20 interface for tripod
Operating Temperature	-10°C~+50°C
Operating Humidity	10%~95% (non-condensing)
Storage Temperature	-20°C~+60°C
Ingress Protection Rating	IP54
Shock and Vibration	Shock: 25g (IEC 60068-2-27); vibration: 2.5g (IEC60068-2-6)
Weight and Dimensions	About 670g, 258.4×105.1×102.3mm
Authentication	CE/RoHS/CMA, etc.
Packing List	Thermal camera ×1, 5V 3A power adaptor, USB cable, SD card, battery ×2, Quick Start Guide, battery charger, calibration certificate, package list, safety box

Applications



Product R&D

Equipment Maintenance

Electric Routine Inspection

Electrical Maintenance