

# RM200F Handheld Thermal Camera

The RM200F is equipped with a self-developed 12 $\mu$ m high thermal sensitivity 256×192 infrared thermal imaging detector. Based on intelligent and precise temperature measurement algorithms, HD image algorithms, and cloud services, it strives to be a professional infrared thermal imaging tool with HD images, a large-screen display, and accurate temperature measurement for applications such as electrical maintenance and circuit design.



#### **Product Highlights**

### Powerful Detector, Clear Imaging

- Equipped with a 256 $\times$ 192 self-developed uncooled infrared detector.
- 40mK thermal sensitivity, capable of distinguishing the minimum temperature difference of 0.04°C, capturing small hot and cold spots.
- -20°C~+550°C wide measurement range for monitoring more temperature targets.

## **Fully-Functional Software**

- Manually adjusting the temperature range to meet the needs of multiple scenarios and uses.
- Support multiple image modes + multiple palettes to meet the needs of temperature measurement under different requirements.
- The PC software supports real-time image analysis.

## **Hardcore Configuration**

- Equipped with a 3.5-inch touch screen, supporting center point, hot and cold spot tracking and temperature display.
- IP54, 2m drop protection
- Standard configuration of 2 quick-removal batteries, with a battery life of up to 8h.







# Specifications

Thermal Imaging	
Detector Type	12μm uncooled infrared detector
Infrared Resolution	256×192
Spectral Band	7.5-14µm
Thermal Sensitivity (NETD)	<40mK (25°C,F1.0)
Frame Rate	25Hz
Lens Focal Length	7mm
FOV	24.8°×18.7°
Spatial Resolution (IFOV)	1.71mrad
Focus Mode	Manual focusing
Minimum Imaging Distance	0.2m
Measurement Range	-20~+150°C, 100~550°C
Measurement Accuracy	$\pm 2^{\circ}$ C or $\pm 2\%$ of readings, whichever is greater.
Image Display	
Display	3.5-inch touch screen, 640×480 resolution
Visible Light Camera	2 megapixels
Digital Zoom	1×,2×,4×
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)
Image Storage	
Storage Medium	Standard 32GB MicroSD, up to 128G
Text Notes	Support
Voice Annotation	Support
Image Naming	Auto/manual naming, naming by scanning QR code
System Functions	
Communication Protocol	Wi-Fi, USB
Laser Pointer	Support
Video Transmission	Support UVC video transmission
Others	
Battery	Rechargeable and detachable lithium-ion battery
Charging Mode	USB Type-C or desktop charger
Battery Life	About 8h (about 4h 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 660g, 258.4×105.1×102.3mm
Authentication	CE/RoHS/CMA, etc.
Packing List	i nermai camera × 1, 5v ZA power adaptor, USB cable, SU card, battery × 2, Quick Start Guide, battery charger, calibration certificate, package list, portable cloth bag

# Applications









Circuit Design

**HVAC** Maintenance

### RayThink Technology Co., Ltd.

Company Address: No.5 Wanshoushan Road, Fulaishan Street, Yantai Area of China (Shandong) Pilot Free Trade Zone Postal Code: 264000 Official Website: http://www.raythink-tech.com Service Email: sales@raythink-tech.com \*The information is for illustrative purposes only. The pictures and technical specifications are subject to change without prior notice. Sample No: G2024-RM200F-2P001