PRODUCT TECH SHEET



					SCAN FOR VIDEO	
MODEL	FALCON 2.0 - FQ50					
STYLE	Thermal Monocular (<u>no</u> LRF)					
RELEASE	Feb 2025	RRP	\$4,299	HIKMICRO		
F209.20				DIMENSIONS		
				LENGTH	205mm (8.1")	
				WIDTH	70mm (2.8")	
				HEIGHT	83mm (3.3")	
				WEIGHT	570g (incl batt)	
				PROTECTION		
IP67 (water resistant to 30 mins)					er resistant to 1m for	
				POWER		
1 x 21					x 21700 External Li-lon Battery	

SUMMARY

The **HIKMICRO FALCON 2.0 - FQ50** is the 2025 revised edition of the popular cylindrical-shaped HIKMICRO FALCON handheld Thermal Monocular, and now comes equipped with an upgraded 640 × 512 @12 µm thermal detector with much higher sensitivity (NETD <15 mK), ensuring the finest details are caught - no matter the weather or light conditions.

The screen is bigger too using a 0.49" 1920 × 1080 Full HD resolution OLED display that uses the innovative shutterless system (HSIS) to provide an immersive and smooth viewing experience.

The 50mm, F0.9 lens on this model delivers a massive 2600m detection range with 8x magnification (2.7x ~ 21.6x) and a huge 15.4m x 12.2m viewing window at 100m, with the added advantage of the newly-designed upper rear focus wheel for true one-hand operation.

Maintaining the traditional pocket-sized cylindrical design, the **FALCON 2.0 - FQ50** is perfect for forest & field hunting, birding, animal searching, rescuing and marine scenarios.

KEY FEATURES

- 640 × 512 resolution @12µm thermal detector for amazing thermal detail.
- High sensitivity thermal module NETD <15mK (@25°C, F# = 1.0), ensuring perfect image quality and detail recognition even in the toughest weather conditions.
- 50mm F0.9 lens with a 15.4m x 12.2m wide field of view at 100m, plus a detection range up to a massive 2600m, with identification up to 650m.
- 1920 × 1080 resolution 0.49-inch OLED display with HSIS (Shutterless Image System) for clarity.
- Picture and video recording using on-board, in-built 64GB memory.
- Powered by one 21700 external Li-ion battery, providing around 6.5 hours of operation even with WiFi
 and Zoom Pro on! The battery can be swapped out when discharged for the second of the two
 supplied batteries.
- Waterproof with an IP67 rating (to 1m for 30 minutes) for tackling the toughest of conditions.
- Three Year HikMicro Warranty for peace-of-mind.

TECHNICAL DETAILS

[3 Year Warranty]

THERMAL MODULE:

Image Sensor VOx Uncooled Focal Plane Arrays

Maximum Resolution (Thermal) 640 x 512 Frame Rate 50Hz Pixel Interval 12µm Response Waveband

8µm to 14µm

NETD Less than 15mK (@25°C), F# = 1.0

Lens (Focal Length) 50mm, F0.9 Focus Mode Rear Upper Focus Wheel

Detection Range 2600m

Minimum Focusing Distance 5.0m

Magnification 2.7× to 21.6× (8x)

Field of View (HxV), Degrees/m @100m $8.8^{\circ} \times 7.0^{\circ}/15.4 \text{m} \times 12.2 \text{m}$

IMAGE DISPLAY:

Display

HSIS (HIKMICRO Shutterless Image System) Yes (provides an immersive, smooth image)

Black Hot, White Hot, Red Hot, Fusion, Red Mono, Green Mono. **Palettes**

1920 × 1080, 0.49-inch OLED

Exit Pupil 8mm 15mm Eye Relief Diopter (Range) -5 D to +3 D Yes Brightness Adjustment

Contrast Adjustment Yes Zoom Pro Yes Yes Image Pro 2.0

Cold, Warm Tone Adjustment

SYSTEM:

Yes Capture Snapshot **Audio Recording** Yes Yes Video Recording Yes Local Album

Built-in EMMC (64GB) File Storage

PiP Yes

Yes (2.4G and 5G Dual Waveband) Hotspot

Hot Track

Yes (Stadiametric, not Laser) Distance Measurement

Yes Standby Mode

POWER SUPPLY:

Battery Type One replaceable and rechargeable 21700 battery (2 x Supplied)

Battery Operating Time 6.5 hours continuous running with WiFi and Zoom Pro functions

turned on (@25°C)

Type-C Power Supply 5V DC, 2A. Supports External Power Supply

Boot Time 3 Seconds

GENERAL:

Dimensions 205 mm × 69.6 mm × 82.9 mm Weiaht 570 g with external battery installed

Working Temperature -30°C to +55°C

Protection Level IP67



