



L: 44.4 mm; W: 50.8 mm; H: 24.4 mm

## Features & Benefits:

- Aggressively Captures and Processes Images, as well as Reading 2D Barcodes
- Constructed of Solid-State Electronics with No Moving Parts Makes it Durable and Reliable
- Long Product Life Cycle

## Compact, .5 Megapixel Smart Camera

JADAK's FM-5V is designed for applications that require aggressive machine vision image processing functions. The FM-5V is the latest in smart camera imaging technology. Utilizing the only area sensor designed specifically for reading barcodes and processing images, the FM-5V has a longer product life cycle than devices using off the shelf area sensors. The FM-5V's dual-functionality sensor provides both dedicated black & white mode (ideal for barcode) and color mode (ideal for image analysis).

FM-5V has exceptional motion tolerance up to 584 cm (230") per second, making it ideal for applications where the barcode is moved by the scanner.

FM-5V's compact design is easy to integrate into Original Equipment Manufacturer (OEM) devices and works well as a fixed mount scanner.

## Applications:

- OEM Devices, incl. clinical analyzers
- Industrial robotic systems



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Scanning Performance	
<b>Sensor</b>	CMOS with 844 x 640 pixel resolution, Global Shutter
<b>Illumination</b>	617 nm visible read LED
<b>Aiming</b>	528 nm visible Green LED
<b>Typical Frame Rate</b>	60 frames per second, B&W and Color
<b>Motion Tolerance</b>	Up to 584 cm/sec (230 in/sec) in total darkness with .013" UPC at 4"
<b>Field of View</b>	SR Optics: Horizontal: 42.4°, Vertical: 33.0° ER Optics: Horizontal: 31.6°, Vertical: 24.4° HD Optics: Horizontal: 41.4°, Vertical: 32.2°
<b>Scan Angles</b>	Tilt: 360°, Pitch: ± 45°, Skew: ± 65°
<b>Symbol Contrast</b>	20% minimum reflectance
<b>Barcode Resolution</b>	Down to 3 mil (.003")
<b>Symbologies</b>	<b>Linear:</b> Code 128, Code 2 of 5, Code 32, Code 39, Code 93, UPC/EAN/JAN, Matrix 2 of 5, GS1 Databar, Codabar/NW7, Interleaved 2 of 5, Telepen, Trioptic, China Post <b>2D Stacked:</b> PDF417, MicroPDF417, GS1 Composite <b>2D Matrix:</b> Aztec Code, Data Matrix, MaxiCode, QR Code, Micro QR Code, MaxiCode, Chinese Sensible (Han Xin) code <b>Postal:</b> Australian Post, British Post, Canadian Post, Japanese Post, Netherlands (KIX) Post, Planet Code, Postnet, Intelligent Mail Barcode, Postal-4i <b>OCR:</b> OCR-A, OCR-B, E13B (MICR) (OCR Optional)
Regulatory	
	FCC Class B, CE
<b>Environmental</b>	RoHS compliant
Mechanical/Electrical	
<b>Weight</b>	40g
<b>Interface</b>	True RS232, USB 1.1 (HID COMM or Keyboard), USB 2.0 (HID COMM or Keyboard)
<b>Input Voltage</b>	Serial: 5 VDC ±5%
<b>Typical Current Draw</b>	<500mA
Environmental	
<b>Temperature</b>	Operating: -25°C to 50°C; Storage -25°C to 85°C
<b>Humidity</b>	0 - 95% Relative Humidity, non-condensing, at 50°C
<b>Ambient Light</b>	0-100,000 lux (total darkness to bright sunlight)

## ABOUT JADAK:

JADAK, a business unit of Novanta, is a market leader in machine vision, RFID, barcode, printing, and color and light measurement products and services for original equipment manufacturers. The company designs and manufactures embedded detection and analysis solutions that help customers solve unique inspection, tracking, scanning and documenting. The company is ISO 9001 and ISO 13485 registered.

Novanta is a trusted technology partner to OEMs in the medical and advanced industrial technology markets, with deep proprietary expertise in photonics, vision and precision motion technologies.

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