VX-25MG-M 5

Aerial Imaging / Surveillance Camera



The VX-25MG-5 camera is ideal for aerial imaging and ground surveillance applications which require Photographic Quality resolution and easy-to-use system integration. The VX-25MG-5, the new member of the VX series, uses the industrial proven CMOS image sensor technology and performs as fast as 5 fps with 25 million pixel resolution. Taking pictures with this camera is made easy with features such as; auto exposure, auto gain, auto focus, lens aperture control, and several innovative features to manage network bandwidth when connecting multiple cameras together on a gigabit Ethernet network.



Main Features

- 25 Megapixel Resolution (ON Semiconductor)
- Extended Operating Temperature: $-50\,^{\circ}\text{C}$ ~ $80\,^{\circ}\text{C}$
- Auto Controls (Exposure, Gain, Aperture, Focus)
- Canon-EF Adapter Control
- Pixel Defect Correction
- Non-uniformity Correction (DSNU and PRNU)
- IEEE 802.3 (Pause Frame Control) and Inter-packet Delay
- Internal Frame Buffer
- Stream Hold

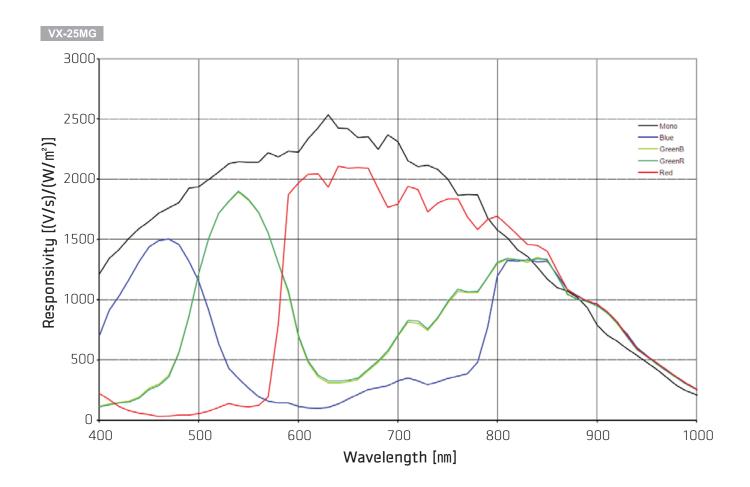
Specifications

Applications

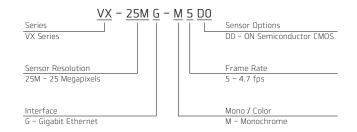
- Aerial Imaging
- Ground Surveillance
- Research and Scientific Imaging

Model		VX-25MG-M 5
Resolution (H \times V)		5120 × 5120
Sensor		ON Semiconductor VITA-25K
Sensor Size (Optical Format)		$23.04 \text{ mm} \times 23.04 \text{ mm} (35 \text{ mm})$
Sensor Type		High Speed CMOS Image Sensor
Pixel Size		4.5 μ m $ imes$ 4.5 μ m
Sensor Output		32 CH LVDS
Interface		Gigabit Ethernet
Max. Frame Rate		4.7 fps / 25 fps (Burst Mode)
Exposure Time		1/1,000,000 - 60 s
Partial Scan (Max. Speed)		13,888 fps at 1 Line (H: 256)
Pixel Data Format		8 bit
Electronic Shutter		Global Shutter
Trigger Synchronization		Free-Run, Hardware Trigger or Software Trigger
Dynamic Range		54 dB
Binning		1×, 2× (Horizontal and Vertical Independent)
Black Level Control		0 ~ 16 LSB (16 steps)
Gain Control		Digital Gain: $1.0 \times \sim 4.0 \times (1/128 \text{ step})$
Camera Image Memory		2 Gb
Dimension / Weight		68 mm \times 68 mm \times 80 mm / 420 g (with F-mount)
		68 mm $ imes$ 68 mm $ imes$ 77 mm / 578 g (with Canon-EF Adapter)
Temperature		Operating: -50°C ~ 80°C, Storage: -50°C ~ 90°C
Vibration / Shock		10G (20 ~ 200 Hz) XYZ / 70G 10 ms
Lens Mount		F-mount or Interface for Canon-EF Adapter
Power	External	10 ~ 36 V DC
	Dissipation	Typ. 7.5 W
Compliance		CE, FCC, KC
API SDK		Vieworks Imaging Solution 7.X

Quantum Efficiency



Ordering Scheme



Connector Specification

Power



1, 2, 3: +12 V DC 4, 5, 6: GND (HR10A-7R-6PB)

Control

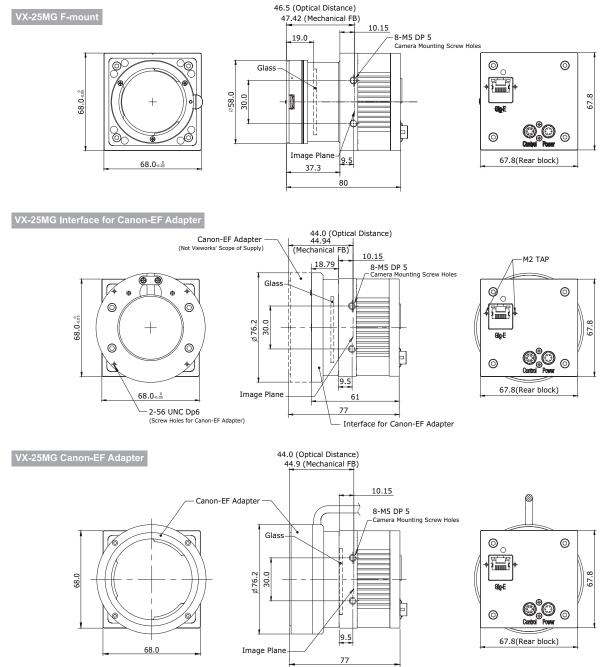


1: Trigger IN+ 3: Strobe Out 5: RS-232-RX← (HR10A-7R-6SB) 2: Trigger IN− 4: DC Ground 6: RS-232-TX→

Connectors on camera body

Mechanical Dimensions

Unit: mm



*. Vieworks does not provide a Canon-EF Adapter (Birger Mount).