

MVAC-PY-FV373-D3XF

CMOS USB3.0 Area Scan Camera



GEN*i*CAM

USBTM
VISION

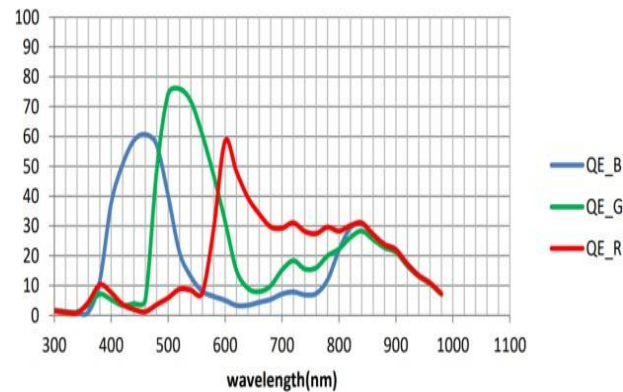
Introduction

Camera adopts CMOS sensor to provide high-quality images. It uses USB3.0 interface to transmit non-compressed images in real time, and its max. frame rate can reach 90.1 fps in full resolution.

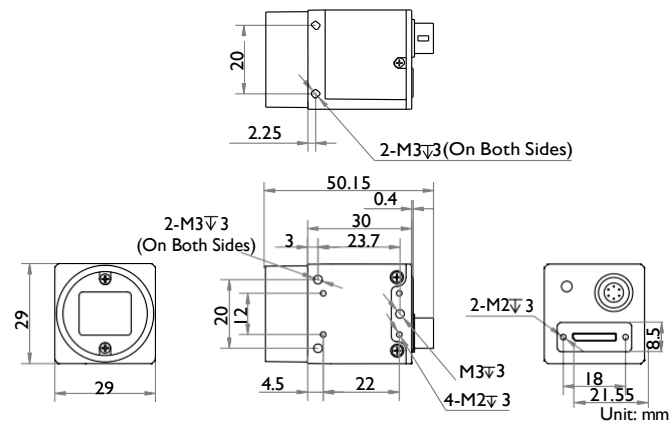
Key Feature

- Adopts global shutter CMOS sensor providing high signal-to-noise ratio, wide dynamic range and high quality images.
- Supports hardware trigger, software trigger, free run.
- Compact design with mounting holes on panels for flexible mounting from 4 sides.
- Compatible with USB3 Vision Protocol, GenICam Standard, and the third-party software based on the protocol and standard.

Sensor Quantum Efficiency



Dimension



Specification

Model	MVAC-PY-FV373-D3XF
Performance	
Sensor type	CMOS, global shutter
Pixel size	5.5 μm $\times$ 5.5 μm
Sensor size	1"
Resolution	4 Megapixel
Max. frame rate	90.1 fps @2048 $\times$ 2048 Bayer GB 8
Dynamic range	59.7 dB
SNR	39.6 dB
Gain	0 dB to 12 dB
Exposure time	30 μs to 10 sec
Exposure mode	Off/Once/Continuous exposure mode
Mono/color	Color
Pixel format	Mono 8/10/12, Bayer GB 8/10/10Packed/12/12Packed, YUV422Packed, YUV422_YUYV_Packed, RGB 8, BGR
Binning	Supports 1 $\times$ 1, 2 $\times$ 2, 4 $\times$ 4
Decimation	Supports 1 $\times$ 1, 2 $\times$ 2, 4 $\times$ 4
Reverse image	Supports horizontal and vertical reverse image output
Electrical features	
Data interface	USB3.0, compatible with USB2.0
Digital I/O	6-pin P7 connector provides power and I/O, including opto-isolated input $\times$ 1 (Line 0), opto-isolated output $\times$ 1 (Line 1), bi-directional non-isolated I/O $\times$ 1 (Line 2).
Power supply	9 VDC to 24 VDC, supports USB3.0 power supply
Power consumption	Typ. 2.4 W@5 VDC (USB3.0 provides power supply)
Mechanical	
Lens mount	C-mount
Dimension	29 mm $\times$ 29 mm $\times$ 30 mm (1.1" $\times$ 1.1" $\times$ 1.2")
Weight	Approx. 88 g (0.2 lb.)
Ingress protection	IP40 (under proper lens installation and wiring)
Temperature	Working temperature: -30 $^{\circ}\text{C}$ to 60 $^{\circ}\text{C}$ (-22 $^{\circ}\text{F}$ to 140 $^{\circ}\text{F}$) Storage temperature: -30 $^{\circ}\text{C}$ to 70 $^{\circ}\text{C}$ (-22 $^{\circ}\text{F}$ to 158 $^{\circ}\text{F}$)
Humidity	20% to 95% RH, non-condensing
General	
Client software	MVS or third-party software meeting with USB3 Vision Protocol
Operating system	32/64-bit Windows XP/7/10, 64-bit Windows 11, 32/64-bit Linux and 64-bit MacOS
Compatibility	USB3 Vision, GenICam
Certification	CE, RoHS, KC