

MV-CH120-40XM

12MPCMoSCoaXPressAreaScan Camera



GEN*i*CAM

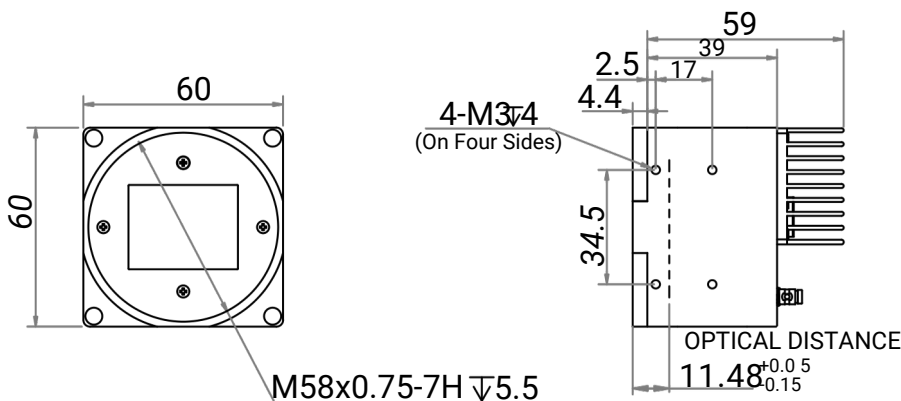
Introduction

MV-CH120-40XM camera adopts CMOS sensor to provide high-quality images. It uses CXP-6 interface to transmit non-compressed images in real time, and its max. frame rate can reach 188 fps in full resolution.

Key Feature

- ☐ Resolution of 4096×3072 , pixel size of $5.5 \mu\text{m} \times 5.5 \mu\text{m}$.
- ☐ Adopts global shutter CMOS sensor to provide high dynamic range, SNR, and high-quality images. Supports LSC sequencer polling function. Adopts CXP-6 interface to transmit data. Compatible with CoaXPress Protocol and GenICam Standard.

Dimension



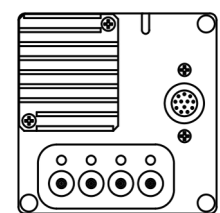
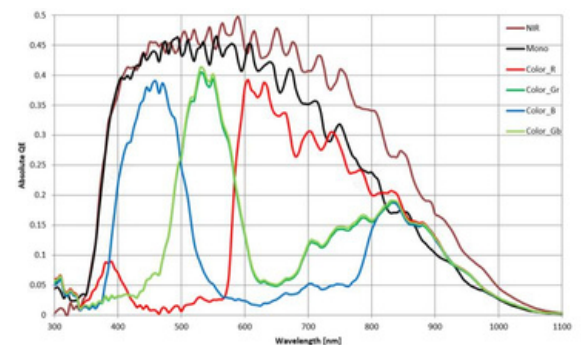
Available Model

MV-CH120-40XM-M58S-NN

Applicable Industry

Electronics, semiconductor, PCB AOI, 3D application, motioncapture, etc.

Sensor Quantum Efficiency



Unit: mm

Specification

Model	MV-CH120-40XM
Performance	
Sensor type	CMOS, global shutter
Sensor model	AMS CMV12000
Pixel size	5.5 μm $\times$ 5.5 μm
Resolution	22.5 mm $\times$ 16.9 mm
Max. frame rate	4096 $\times$ 3072
Dynamic range	188 fps @ 4096 $\times$ 3072 Mono 8
SNR	55.2 dB
Exposure time	39.5 dB
Exposure mode	1.0 $\times$, 2.0 $\times$, 3.0 $\times$, 4.0 $\times$
Mono/color	20 μs to 10 sec
Pixel format	Off/Once/Continuous exposure mode
Binning	
Decimation	Mono
Reverse image	Mono 8/10
Electrical features	Supports 1 $\times$ 1, 1 $\times$ 2, 1 $\times$ 4, 2 $\times$ 1, 2 $\times$ 2, 2 $\times$ 4, 4 $\times$ 1, 4 $\times$ 2, 4 $\times$ 4
Data interface	Supports 1 $\times$ 1, 1 $\times$ 2, 1 $\times$ 4, 2 $\times$ 1, 2 $\times$ 2, 2 $\times$ 4, 4 $\times$ 1, 4 $\times$ 2, 4 $\times$ 4
Digital I/O	Supports horizontal and vertical reverse image output
	CoaXPress with DIN interface
	12-pin P10 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), and RS-232 $\times$ 1.
Power supply	12 VDC to 24 VDC, CXP-1 and CXP-2 support PoCXP
Power consumption	Typ. 11.6 W @ 12 VDC
Mechanical	
Lens mount	M58*0.75, flange back length 11.48 mm
Dimension	60 mm $\times$ 60 mm $\times$ 59 mm (2.4" $\times$ 2.4" $\times$ 2.3"), optional with heat sink fins
Weight	Approx. 269 g (0.6 lb.)
Ingress protection	IP40 (under proper lens installation and wiring)
Temperature	Working temperature: 0 $^{\circ}\text{C}$ to 30 $^{\circ}\text{C}$ (32 $^{\circ}\text{F}$ to 86 $^{\circ}\text{F}$) Storage temperature: -30 $^{\circ}\text{C}$ to 70 $^{\circ}\text{C}$ (-22 $^{\circ}\text{F}$ to 158 $^{\circ}\text{F}$)
Humidity	20% RH to 95% RH (no condensation)
General	
Client software	MVS or frame grabber software meeting with CoaXPress Protocol
Operating system	32/64-bit Windows 7/10, 64-bit Windows 11, and 32/64-bit Linux
Compatibility	CoaXPress, GenICam
Certification	CE, RoHS, KC, UL