

VZ-2MU-M/C 168H00

Industrial Digital Cameras with USB3.0 Interface



USB[®]
VISION

GEN<i>i>CAM

VZ-2MU-M/C 168H00 is a monochrome/color USB3.0 Vision camera with the Sony IMX174 global shutter CMOS sensor. Thanks to the extremely compact design (29mm x 29mm x 29mm), robust metal housings and locking screw connectors, the VZ-2MU-M/C 168H00 camera has an outstanding price-to-performance ratio. VZ-2MU-M/C 168H00 is ideal for machine vision applications such as industrial inspection, medical, scientific research, education, security and so on.

VIEWORKS

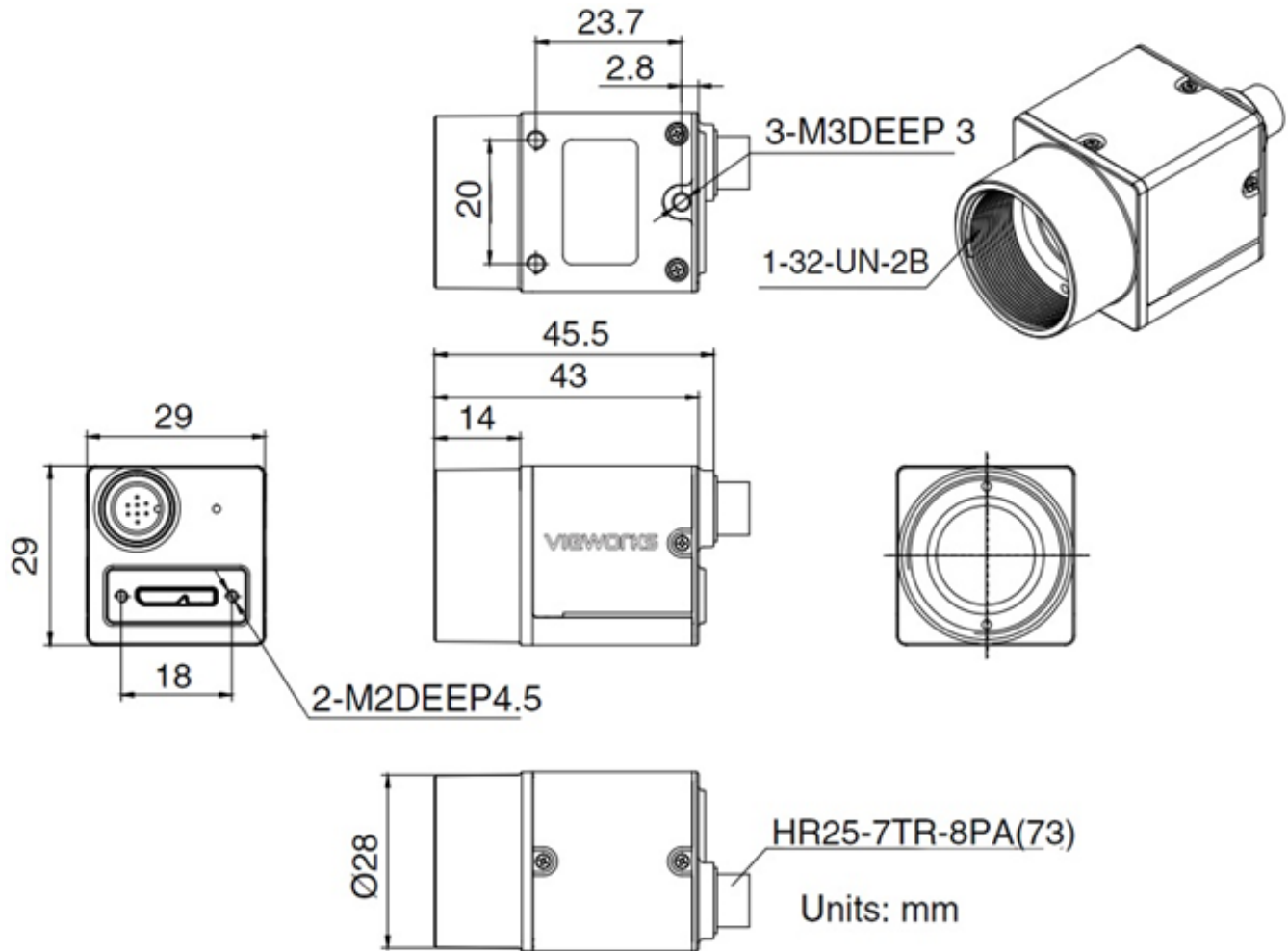
vision.vieworks.com

VZ-2MU-M/C 168H00

Industrial Digital Camera with USB3.0 Interface

Mechanical Dimensions

Unit: mm



VZ-2MU-M/C 168H00

Industrial Digital Camera with USB3.0 Interface

Main Features

- Supports auto gain, auto exposure and auto white balance (auto white balance only for color models)
- Programmable ROI, increased frame rate with partial scan
- Three acquisition controls: Continuous acquisition / Software trigger acquisition / External trigger acquisition
- Multiple samples and easy-to-integrate SDKs for various programming tools
- Support Storable user sets and software reset function
- Support Remove Parameter Limit to expand the range of exposure, gain, white balance, etc.
- Compatible with GenICam™ and USB3 Vision®

Applications

- Industrial Inspection
- Medical Research
- Scientific Research
- Education
- Security

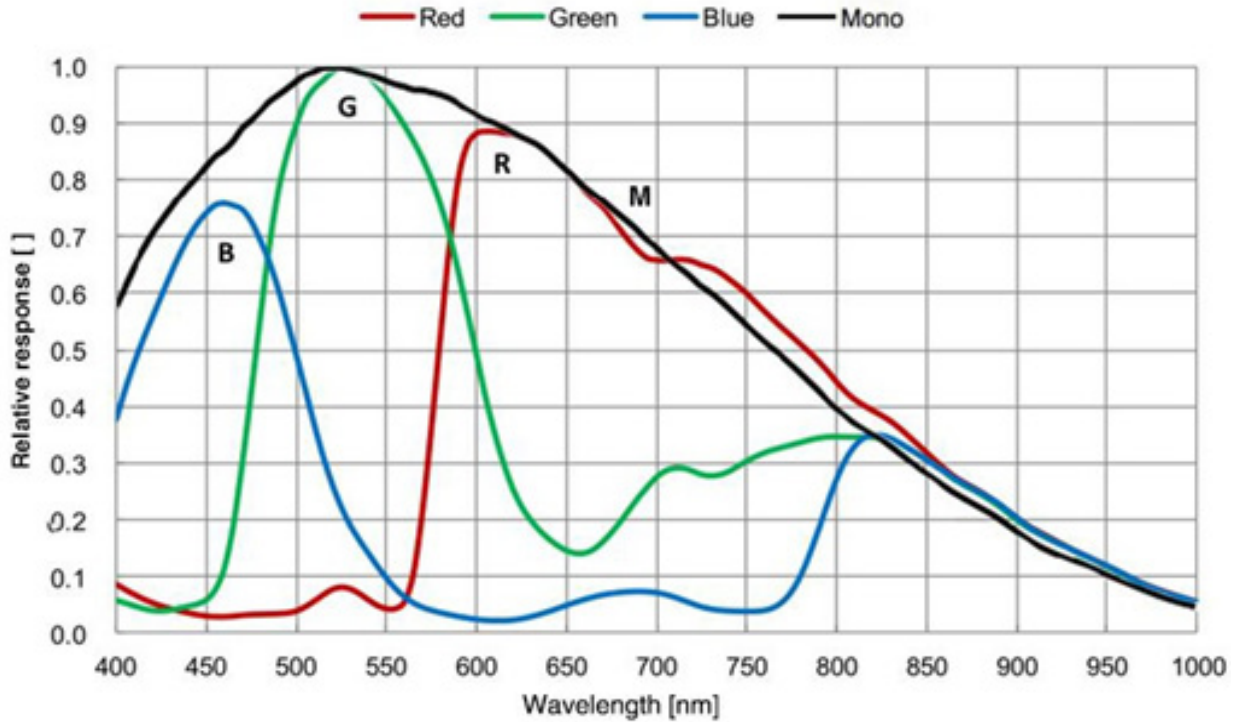
Specifications

Model	VZ-2MU-M/C 168H00	
Resolution (H x V)	1920 x 1200	
Sensor	Sony IMX174 Global Shutter CMOS	
Pixel Size	5.86 μm \times 5.86 μm	
Data Interface	USB 3.0	
Frame Rate	168 fps@1920 \times 1200	
ADC Bit Depth	10 bit	
Pixel Bit Depth	8 bit and 10 bit	
Exposure Time	Standard: 20 μs to 1 s, Actual Steps: 1 row period	
Gain	0dB to 24dB, Default: 0dB, Steps: 0.1dB	
Mono / Color	Color	Mono
Pixel Formats	Bayer RG8 and Bayer RG10	Mono8 and Mono10
Signal Noise Ratio	45.32dB	45.32dB
Synchronization	Hardware trigger and Software trigger	
I/O	1 input and 1 output with opto-isolated, 2 programmable GPIOs	
Temperature	Operating: 0°C to 45°C, Storage: -20°C to 70°C	
Operating Humidity	10% to 80%	
Power Requirements	5 VDC via USB cable	
Power Consumption	< 2.7W@5V	
Lens Mount	C	
Dimensions and Weight	29mm x 29mm x 29mm (without lens adapter or connectors), 65g	
Programmable Control	Image size, Gain, Exposure time, Trigger polarity, Flash polarity	
Conformity	CE, RoHS, FCC, USB3 Vision, GenICam, and KC	

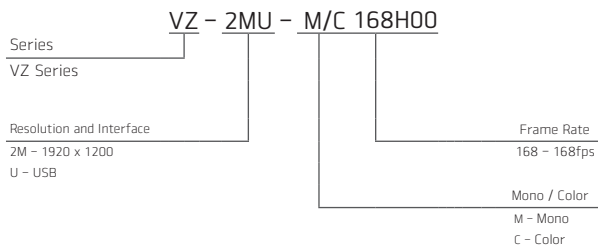
VZ-2MU-M/C 168H00

Industrial Digital Camera with USB3.0 Interface

Spectral Response



Ordering Scheme



Connector Specification

I/O Connector



- 1: Line0+ Opto-isolated input+
- 2: Ground GPIO GND
- 3: Line0- Opto-isolated input-
- 4: NC NC
- 5: Line2 GPIO input/output
- 6: Line3 GPIO input/output
- 7: Line1- Opto-isolated input-
- 8: Line1+ Opto-isolated input+

Connectors on camera body