

HR 10 GigE

hr65CXGE

The HR 10GigE series with its high-end high-resolution CMOS sensors permits making full use of the sensor bandwidth. 10GigE delivers up to 1.1 GB/s of image data with distances up to 100 m.

The clean design according to well established standards like GigE Vision, 10GigE Vision and GenICam ensure rapid integration into the final application. The camera features a rich choice of industrial hardware and software features. Burst mode enables even higher trigger frequencies.

Best suited for applications such as optical metrology, surface control, quality control or monitoring of large areas.



Technical Highlights

- Defect pixel correction, lens shading correction
- ROI, LUT, binning, offset, gamma, auto exposure
- GenICam interface with GenTL driver
- Integrated 4-channel power LED strobe controller
- POE (Power Over Ethernet)
- M58 lens thread (F-mount optional)
- Industrial TTL-24V I/O interface with SafeTrigger, programmable logic functions, sequencers and timers, RS232



Specifications

Resolution [MP]	65 MP
Resolution (h x v)	9344 x 7000 px
Frame rate (max.)	17.4 fps
Chroma	color
Interface	10GigE Vision (RJ-45)

Sensor

Sensor	GMAX3265
Manufacturer	Gpixel
Sensor type	Area CMOS
Shutter type	global shutter
Sensor size (h x v)	29.9 x 22.4 mm
Optical diagonal	37.36 mm
Sensor format	37.4mm
Pixel size (h x v)	3.2 x 3.2 μm

Camera

Exposure modes	MANUAL;AUTO
Trigger modes	INTERNAL;SOFTWARE;EXTERNAL
Exposure time (min)	62 μs
Exposure time (max)	10 sec
Pixel format / max	bayer8, bayer12 / 12 bit
Gain modes	manual, auto
S/N ratio (max)	40 dB (dep. on environment)
Dynamic range (max)	65.6 dB (dep. on environment)
Internal memory	512 MB SDRAM, 32 MB Flash

Feature Set

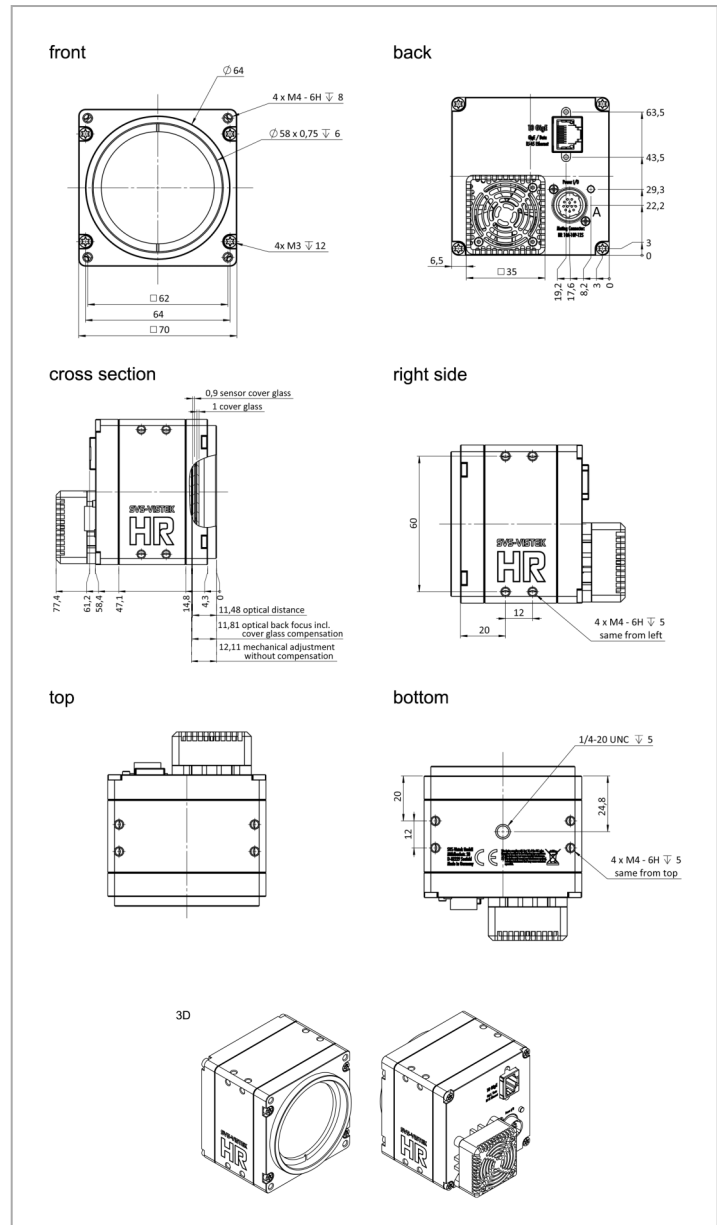
Manual white balance	yes
Automatic white balance	yes
AOI	yes
LUT	yes
Offset	yes
Binning	yes
Image flip	yes
Sequencer	yes
POE	yes (POE+) optional

Housing

Lens mount	M58x0.75
Dimensions (w x h x d)	70 x 70 x 75.9 mm
Weight	420 g
Operating temperature (housing)	-10 to 65 °C
Ambient humidity	10 to 90 % (non-condensing)
Protection class	IP30
Filter-/Coverglass	IR-Cut 680

I/O-Interfaces

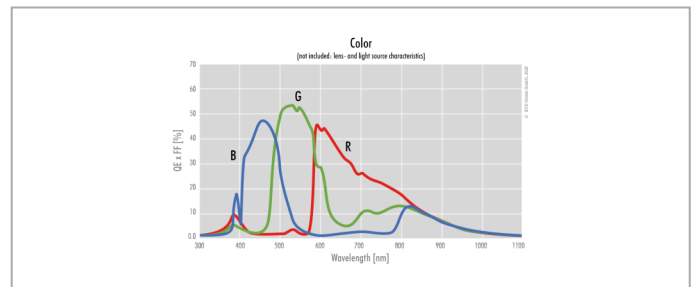
Input up to 24V	2 x
Input OPTO	1 x
Output open drain	4 x
I/O RS-232	1 x
Power supply	10 to 25 V (DC)
Power consumption	14 W (dep. on operating mode)



Pinout Mating Connector

Hirose 12 Pin	1	2	3	4	5	6	7	8	9	10	11	12
	VIN -	VIN +	IN 4	OUT 4	IN 1	IN 2	OUT 1	OUT 2	IN 3 +	IN 3 -	OUT 3	OUT 0
	(GND)	(10V to 25V DC)	(RXD RS232)	(TXD RS232)	(0 - 24V)	(0 - 24V)	(open drain)	(open drain)	(opto In +)	(opto In -)	(open drain)	(open drain)

Spectral Response *



* Sensor data - excludes camera cover- or IR-cut filter characteristics

