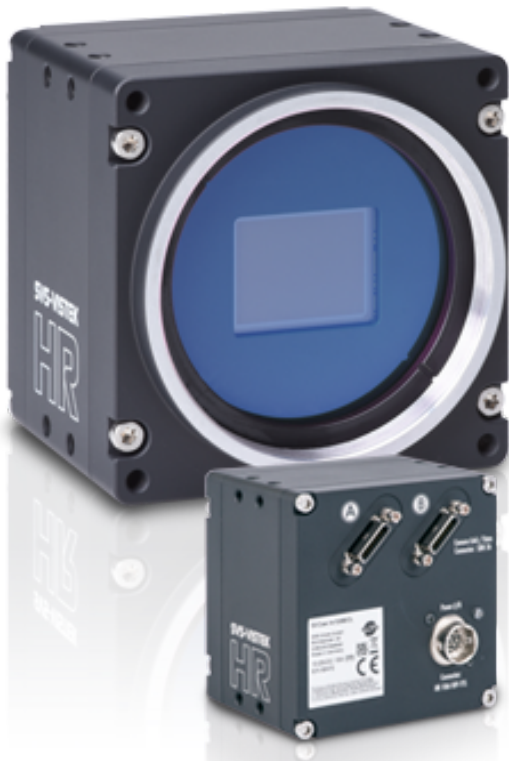# hr49MCL

HR Camera Link

Camera Link has its advantages regarding data transfer speed, a deterministic timing and a very direct access to the imaging sensor itself. Thus it permits settings and operating modes that are not available with other interfaces. HR series with Camera Link provides a wide range of unique camera core features.

A sophisticated I/O interface provides a rich choice of industrial hardware and software features, including a GenICam multi-channel LED strobe control. Best suited for applications such as optical metrology, surface control, quality control or monitoring of large areas.

Technical Highlights

> User defined defect pixel correction
> Lens shading correction
> ROI, LUT, binning, gamma, offset
> Integrated multi channel LED strobe controller
> Industrial TTL-24V I/O interface with SafeTrigger, programmable logic functions, sequencer, timer, RS232
> Power over Camera Link (PoCL)

HR Series   hr49MCL

Resolution [MP]	49 MP
Resolution (h x v)	7008 x 7000 px
Frame rate (max.)	17 fps
Chroma	mono
Interface	Camera Link 80-Bit

Sensor

Sensor	GMAX3265-49-BVM-BU2
Manufacturer	Gpixel
Sensor type	Area CMOS
Shutter type	global shutter
Sensor size (h x v)	22.43 x 22.4 mm
Optical diagonal	31.7 mm
Sensor format	37.4mm
Pixel size (h x v)	3.2 x 3.2 μm

Camera

Exposure modes	MANUAL;AUTO;EXTERNAL
Trigger modes	INTERNAL;SOFTWARE;EXTERNAL
Exposure time (min)	19 μs
Exposure time (max)	1 sec (external ∞)
Pixel format / max	mono8, mono10 / 10 bit
Gain modes	manual, auto
Internal memory	512 MB SDRAM, 160 MB Flash

Feature Set

LUT	yes
Offset	yes
Binning	yes
Image flip	yes
Shading correction	yes (external)
Defect pixel correction	yes
Sequencer	yes

Housing

Lens mount	M58x0.75
Dimensions (w x h x d)	70 x 70 x 75.9 mm
Weight	420 g
Ambient temperature	-10 to 45 °C
Protection class	IP30

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	9 W (dep. on operating mode)

Dimensions [mm]
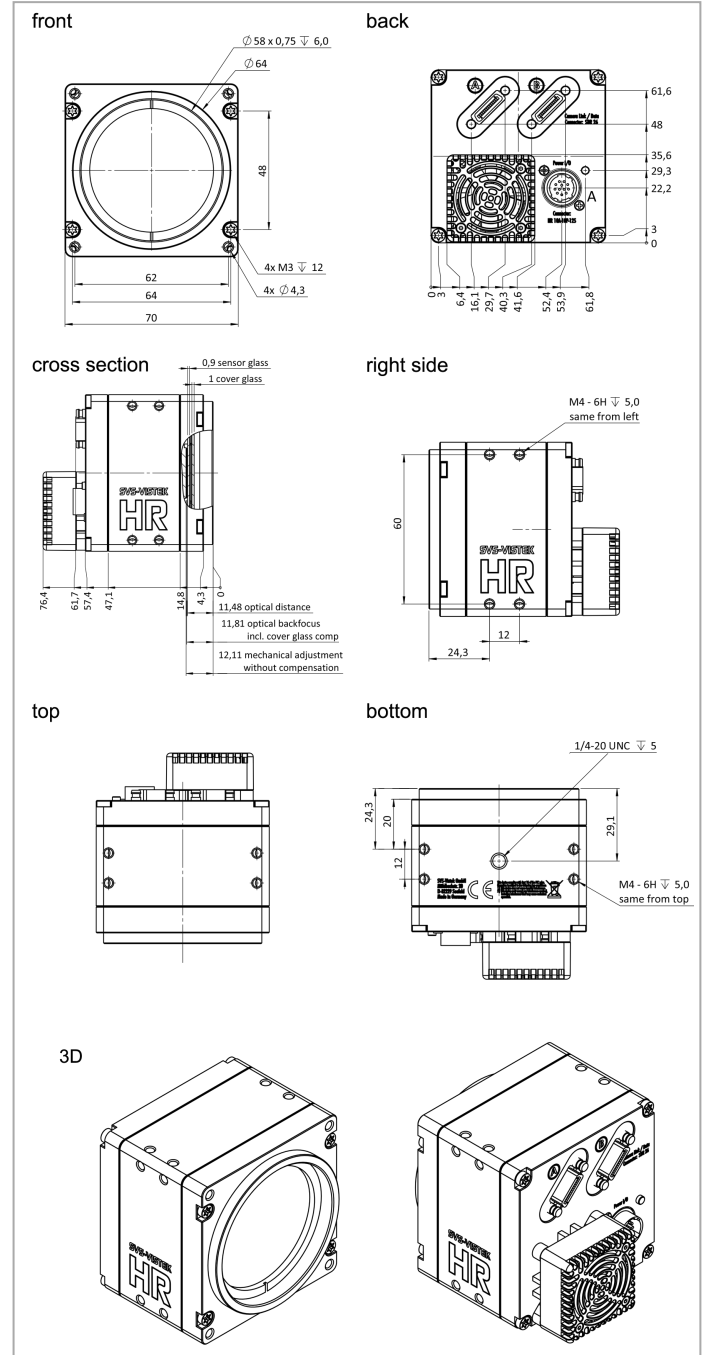
Pinout Mating Connector

Hirose 12 Pin

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

Spectral Response *

Monochrome
(not included: lens- and light source characteristics)
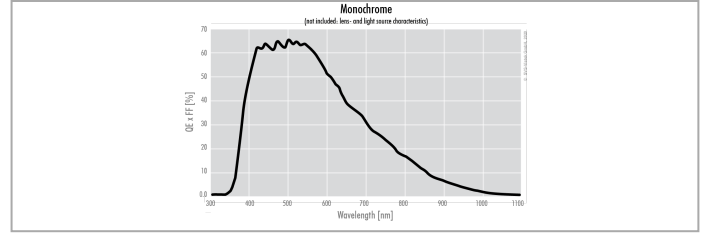
* Sensor data — excludes camera cover- or IR-cut filter characteristics