

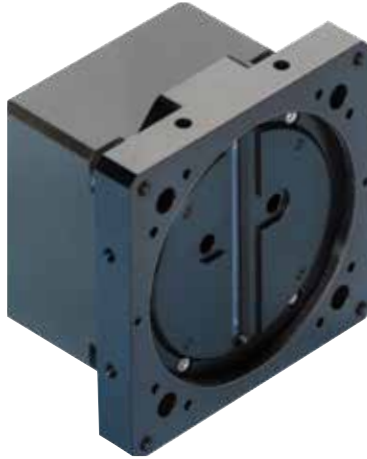
## Line Scan Camera SK4096GTDI-XL

CCD

Time Delay  
Integration  
**Tdi**

Gigabit  
**ETHERNET**

96-stages Time Delay and Integration Digital camera with very high sensitivity and high line frequency, gain and offset adjustable by PC, anti blooming



### ■ Sensor Characteristics

Sensor type:	CCD, TDI
Pixel number:	96x 4096
Pixel size:	13 x 13 $\mu\text{m}^2$
Active sensor length:	53.2 mm
Pixel frequency:	100 / 50 MHz
Max. line frequency:	22.7 kHz
Min. integration time:	0.01 ms
Max. integration time:	20 ms
Spectral range:	400 - 1000 nm
Dynamic range:	1:2500 (rms)

### ■ Mechanical data

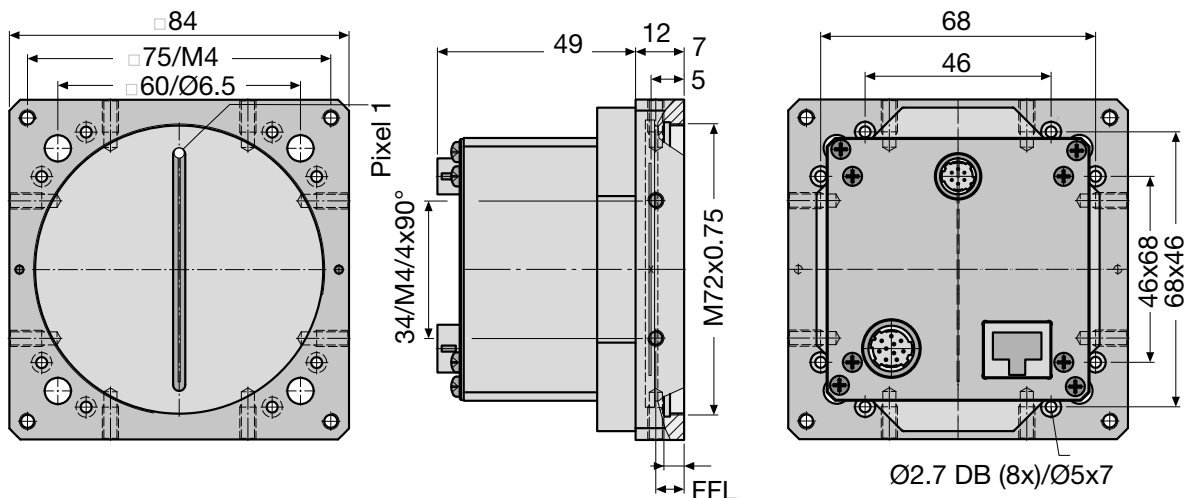
Case type:	CG5
Size:	84 mm x 84 mm x 62 mm
Mass:	0.3 kg
Lens mount:	M72x0.75
Flange focal length (FFL):	8.2 mm

### ■ Functioning Features


Anti blooming:	x
Integration control:	-
Shading correction:	x
Look-up table:	x
Region of interest (ROI):	x
Thresholding:	x
Temperature sensor:	x
External synchronization:	x
Operating temperature:	+5 ... +45°C

### ■ Connections

Interface:	GigaBit Ethernet RJ-45 (8P8C)
Video signals:	monochrome 8/12 Bit digital
Power supply:	+5/+15V DC 7 W @100 MHz Hirose 10A, 6-pin, male
External synchronization:	TTL Hirose 10A, 12-pin, male



## Software



**Software**

**SK91GigE-WIN** Order Code


SDK from Schäfter + Kirchhoff including the **SKLineScan** operating program, as well as API, C++ class library and examples.

Operating systems:  
Windows 7 / 8.1 / 10 - x64 and x86

**SK91GigE-LV VI** Order Code

VI-Library for LabVIEW®, requires **SK91GigE-WIN**

## Accessories




**CAT6 Network cable**

Shielded CAT6 patch cable, halogen-free, both ends with RJ45 connectors for Gigabit Ethernet

**CAT6.x** Order Code

└ cable length 3 / 5 / 10 m or length according to choice, max. 100m



**Power supply unit PS051515**

Input: 100-240 VAC, 0.8 A, 50/60 Hz  
IEC 60320 C14 coupler (for IEC C13 power cord)


Output: +5VDC, 2.5 A / +15VDC, 0.5 A / -15VDC, 0.3 A  
Cable length: 1 m, with Lumberg connector KV60, female 6-pin

**PS051515** Order Code

**Power cord IEC 60320 C13, 1.5 m, 10 A, 250 VAC**

**PC150DE** Order Code

└ DE = Europe / US = USA, Canada, Japan / UK = United Kingdom




**External synchronization cable SK9024...**

for line scan cameras with GigE / GigE Vision™ interface.

Shielded cable with Hirose plug HR10A, female 12-pin (camera side), and Phoenix 4-pin connector incl. terminal block.

**SK9024.x** Order Code

└ cable length 3 / 5 m  
Other lengths on request




**Power cable SK9015.x**

for GigE Vision™, CameraLink and externally supplied USB3 line scan cameras.

Shielded cable with Hirose plug HR10A, female 6-pin (camera side), and Lumberg SV60, male 6-pin connector (power supply unit side).

**SK9015.x** Order Code

└ cable length 0.2 / 1.5 m



**Adapter cable for sync signals CAB-ADSync-BNC-1**

BNC/SMA (3x) to line scan camera synchronization cable SK9016/SK9024/SK9026.

Shielded cable, length 0.25 m

Connectors:  
1x Phoenix 4-pin connector  
3x SMA plug (Line Sync A, Line Sync B, Frame Sync)  
3x adapter SMA socket (outside thread) to BNC-plug

**CAB-ADSync-BNC-1** Order Code



**Focus Adapter FA26-Sx**

High-precision adapter with linear tracking rods for precise travel of the focussing encasement and for locking focus position. Focussing range 29 mm, 1 turn of the focussing ring corresponds to 10 mm. Screws for focus locking.

**FA26-Sx** Order Code

└ 45 = thread M45x0.75  
length 40.5 ... 69.5 mm

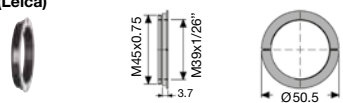
└ 55 = thread M55x0.75  
length 51 ... 80 mm

**Lens Adapters and Extension Rings M45x0.75**

**Lens Adapter M45x0.75 to M39x1/26 (Leica)**

Order Code  
**M39-45**


length L=3.7 mm



**Adapter M45 x 0.75 46 mm to AM43**

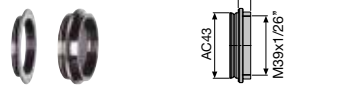
Order Code  
**AM43-M45-S** L=20 mm  
**AM43-M45** L=35 mm

The AM43-M45 accepts the V-groove lens adapter M39x26G-AC43.



**Lens Adapter V-Groove AC43 to M39x1/26"**

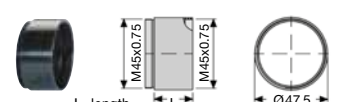
Order Code  
**M39x26G-AC43-S** L=1.5 mm  
**M39x26-AC43** L=8.2 mm



**Extension Ring M45x0.75**

**ZR-L...** Order Code

└ 15 = length 15 mm  
└ 25 = length 25 mm  
└ 60 = length 60 mm  
└ 87 = length 87 mm

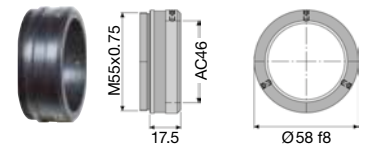


**Lens Adapters and Extension Rings M55x0.75**

**Lens adapter 46 mm V-groove - M55 x 0.75**  
for macro lens inspec.x L5.6/105

**AC46-55** Order Code

The Adapter AC46-55 adds 17.5 mm to the optical tube length. It accepts the AC46 V-groove of the Inspec.x macro lenses.



**Extension Ring M55x0.75**

**ZR55-...** Order Code

└ 15 = length 15 mm  
└ 25 = length 25 mm  
└ 60 = length 60 mm

