



Goldeye P-008 SWIR

GiGE
VISION

CAMERA
Link

Description

SWIR camera with InGaAs sensor, 320 x 256 pixels, optional cooling

The Goldeye P-008 SWIR is a camera for short-wave infrared applications. It has a spectral response from 900 nm to 1700 nm. Its InGaAs sensor features high sensitivity, very good linearity, and a high damage threshold against intense illumination. The camera is optionally available with Peltier cooling. The Peltier cooling option is recommended for applications with long exposure times, or for exact temperature measurements.

- InGaAs sensor, spectral range 900 nm - 1700 nm (SWIR)
- 30 μm x 30 μm cell size, effective chip size 9.6 mm x 7.68 mm
- Excellent Quantum Efficiency at 1.0 μm -1.6 μm
- 118 fps at full resolution or 186 fps with reduced resolution (320 x 160)
- C-Mount, compatible with standard machine vision lenses
- GigE Vision, also available with Camera Link interface
- Options:
 - Peltier cooling for long exposure times and exact temperature measurements

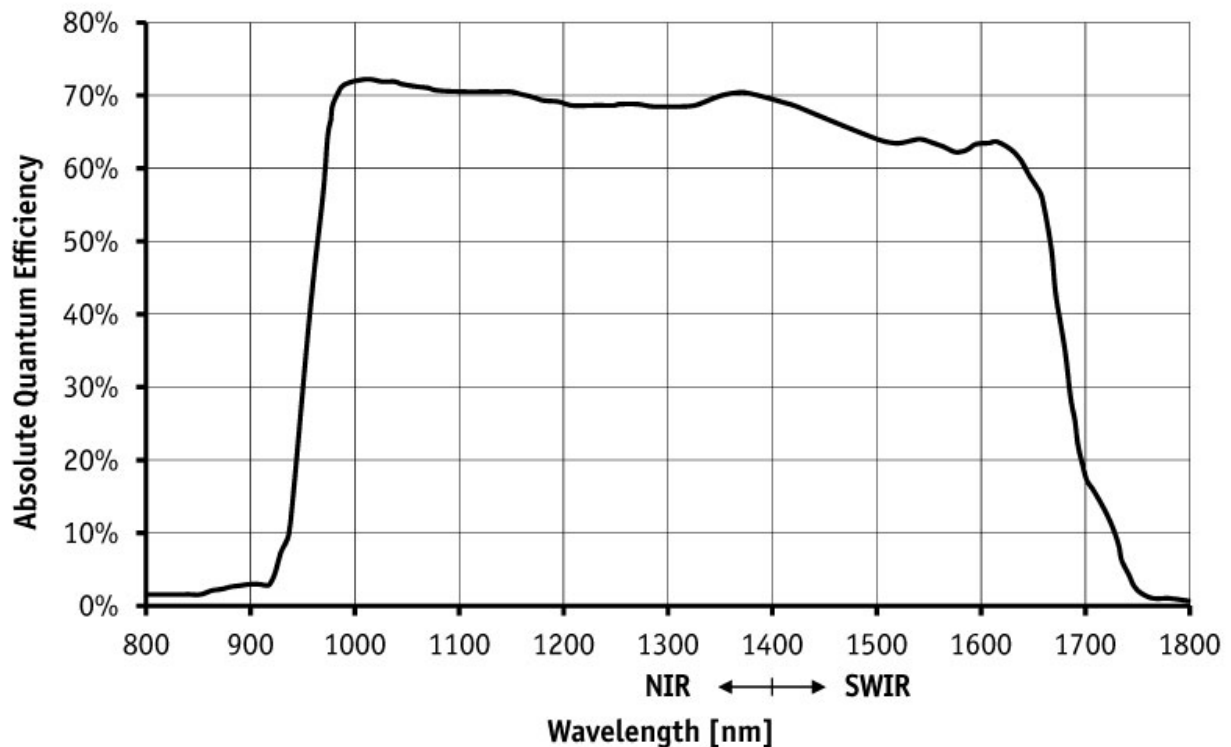
Models:

Goldeye P-008 SWIR (GigE Vision)
Goldeye P-008 SWIR Cool (GigE Vision)
Goldeye CL-008 SWIR (Camera Link)
Goldeye CL-008 SWIR Cool (Camera Link)

Specifications

Goldeye		P-008 SWIR	
Interface		IEEE 802.3 1000baseT	
Resolution		320 x 256	
Spectral range		SWIR, 900 - 1700 nm	
Sensor		InGaAs 320 x 256	
Sensor type		InGaAs	
Sensor size		No standard size	
Cell size		30 µm x 30 µm	
Lens mount		C-Mount	
Max frame rate at full resolution		118 fps	
A/D		14 bit	
		Output	
Bit depth		12 bit	
Mono modes		Mono12	
		Operating conditions/Dimensions	
Operating temperature		0°... +30°C, Cool: 0°... +40°C	
Power requirements (DC)		12 V	
Power consumption (12 V)		7.2 W / Cool: 33.6 W	
Mass		660 g /Cool: 1420 g	
Body Dimensions (L x W x H in mm)		89 x 90 x 71 / Cool: 116 x 90 x 99	
Regulations		CE, RoHS (2002/95/EC)	

[Download technical drawing \(click here\)](#)



Smart features

- Switchable gain, factor 10 with short exposure times
 - Exposure time 32 μ s – 100 ms (Goldeye P/CL-008 LWIR)
 - Exposure time 32 μ s – 1 s (Goldeye P/CL-008 LWIR Cool)
- Shipped with built-in correction data sets
- Gain/offset correction (NUC/non-uniformity correction) for each pixel
- Factory adjusted bad pixel correction
- Background (FPN) correction
- Continuous mode (image acquisition with maximum frame rate)
- Image On Demand mode (triggered image acquisition)

In combination with AVT's AcquireControl software, extensive image analysis functions are available:

- Pseudo color LUT with several color profiles
- Auto contrast
- Auto brightness
- Analyze multiple regions (rectangular, circle) within the image
- Real-time statistics and histogram display
- ... and more

Applications

Goldeye SWIR cameras are very sensitive in the short-wave infrared spectrum, show excellent linearity, and tolerate intense illumination. They are the perfect choice for numerous SWIR applications:

- Short-wave infrared imaging
- Thermal imaging of hot objects (in a range from 250°C to 800°C)
- Semiconductor inspection
- Water or moisture detection
- Imaging spectroscopy
- Laser beam profiling
- Plastic sorting
- Medical science and biology
- Vision enhancement

