



Bigeye G G-132 NIR Cool

- Sensitive in both the visible and NIR spectrum
- Exposure time up to more than 4200 s

Description

NIR optimized camera with ICX285, Peltier cooling -20 °C

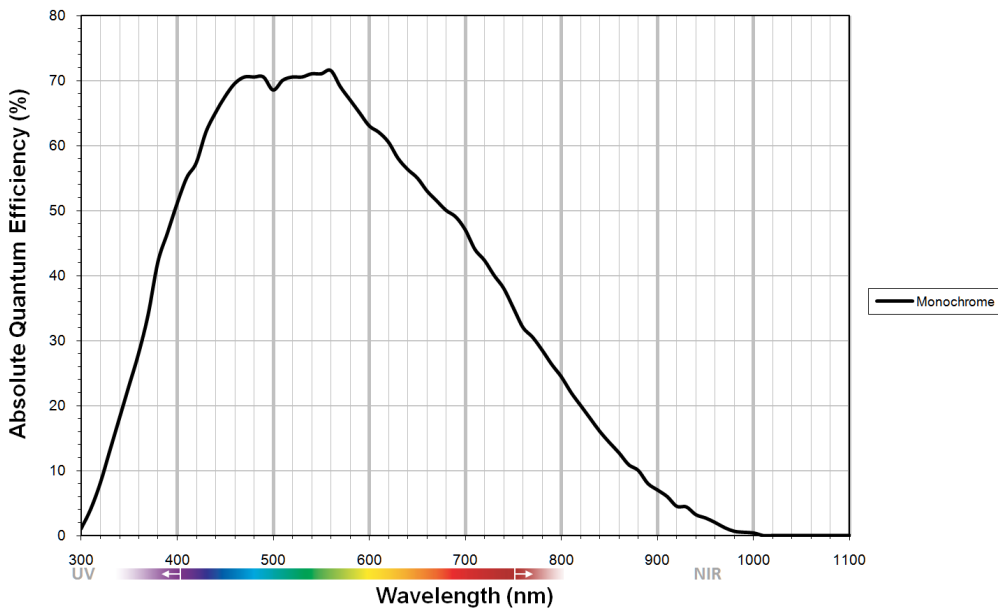
The Bigeye G-132B NIR Cool is distinguished by high performance both in the visible spectrum and the NIR spectrum; its ICX285 CCD sensor is modified for enhanced NIR sensitivity.

- GigE Vision, multi-functional, user-configurable I/O interface
- ICX285 EXview HAD CCD sensor, 1280 x 1024 pixels, extended sensitivity ranging from 350 nm to 1000 nm, peltier cooling, stabilized to -20 °C, exposure time up to 4292 s (≈ 71 min)
- Reliable operation under rough industrial conditions

Specifications

Bigeye G	G-132 NIR Cool
Interface	IEEE 802.3 1000baseT
Resolution	1280 × 1024
Sensor	Sony ICX285
Sensor type	CCD Progressive
Sensor size	Type 2/3
Cell size	6.45 μm
Cooling temperature	-20 °C
Dark noise	tbd
Dark current	tbd
Saturation capacity	tbd
Dynamic range	tbd
Lens mount	C-Mount
Max frame rate at full resolution	12.5 fps

Bigeye G	G-132 NIR Cool
ADC	12 bit
On-board FIFO	32 Mbyte
Output	
Bit depth	12 bit
Mono modes	Mono8, Mono12, Mono12Packed
General purpose inputs/outputs (GPIOs)	
TTL I/Os	1
Opto-isolated I/Os	3/3
RS-232	2
Operating conditions/dimensions	
Operating temperature	0 °C ... 35 °C
Power consumption (@12 V)	max. <36 W, typ. <18 W
Mass	1270 g
Body dimensions (L × W × H in mm)	100.8 × 90 × 99 mm incl. connectors, w/o lens
Regulations	CE, RoHS (2011/65/EU), WEEE, FCC Class B



Features

- Gain (6 dB)
- Exposure time 80077 μ s to 4294 seconds (\approx 71 min)
- Binning (2x1, 2x2)
- Three look-up tables (LUTs)
- Gamma (0.45, 0.5, 0.7)



- Five storable user sets

Easy integration

The Bigeye G-132 NIR Cool can be easily integrated into your application, since it is GigE Vision compliant and compatible with AVT's GigE SDKs. Additionally, this camera can be used with numerous third-party software solutions.

Applications

The Bigeye G-132B NIR Cool is a prime quality CCD camera that is sensitive both in the visible and the NIR spectrum. It is optimal for applications requiring long exposure times.

Typical applications:

- Low-noise imaging (industrial and scientific imaging)
- Image acquisition with long exposure times
- Microscopy with high resolution
- Fluorescence microscopy
- Gel electrophoresis, DNA documentation
- Non-destructive evaluation of photosensitive objects
- Astronomy
- Solar cell/wafer inspection