

B1922



INTERFACES AVAILABLE:

Resolution
 Sensor
 Sensor Format

Pixel Size
 Frame Rate Standard Clock
 Frame Rate Overclocked
 Maximum Frame Rate
 Minimum S/N Ratio
 Output Format

Analog Gain Control
 Black Level Control
 Digital Gain and Offset
 RGB Gain and Offset
 White Balance
 Shutter Speed
 Exposure Control
 Long Integration
 Regions of Interest (ROI)
 Binning H/V
 Trigger Inputs

Trigger Options

Trigger Modes

Double Trigger (PIV) Interframe
 External Inputs/Outputs
 Strobe Output
 RS232 Interface
 Pulse Generator
 Image Overlay
 Image Enhancement

Internal DDR Memory
 On Board FIFO (GEV & PoE)
 Gamma Correction
 Data Corrections

Minimum Illumination

Lens Mount
 Video Iris Control
 Iris, Zoom Focus Control
 Supply Input Range
 Power Consumption
 Size – Width/Height
 Size – Length

Weight
 Vibration, Shock
 Environmental
 Humidity
 MTBF
 Regulatory

Camera Link® Base (PoCL), GigE Vision, PoE,
 CoaXPress, HD-SDI

1940 x 1460
 ICX-674 EXview HAD CCD
 8.81mm (H) x 6.63 mm (V) 10.97mm diagonal
 2/3" optical format

4.54 μm
 40 MHz / 20 fps
 50 MHz / 25 fps
 89 fps
 60dB
 Mono CCD: 8, 10, 12, 14-bit (Single only)
 Color CCD: 8, 10, 12

Manual, Auto: 0 - 36dB 1024 steps
 Manual, 1024 steps

Manual
 Manual

Manual, auto, off
 1 μs /step, 1/500,000 to 1/32 sec (nom)

Manual, auto, external
 Up to 16 seconds

7 ROIs, any line to any line, any pixel to any pixel
 1x, 2x, 3x, 4x, 8x (Independent for H & V)
 External (TTL via IN1/IN2), pulse generator,
 software, computer

Level, edge, pulse width, internal exposure,
 up to 16 seconds trigger delay, debounce
 Free-run, standard, double, fast, asynchronous,
 frame accumulation

Time: 200 nanoseconds
 2 IN, 2 OUT, user programmable
 2 strobes, programmable position and duration
 Yes, programmable
 Yes, programmable
 Optical center, programmable H & V lines

Threshold, contrast enhancement, knee correction,
 horizontal flip, negative image, bit shift (+/- 7 places)
 2Gb (256 MB)
 1Gb (128 MB)
 G=1.0, G=0.45, user upgradeable LUT
 Defective/hot pixel correction (static, dynamic),
 black level, vertical smear

0.5 Lux, F/1.4

C-Mount

Auto, programmable

Manual, user programmable
 12VDC (10V - 15V), 1.5 A inrush
 CLB 3.1 W, GEV 4.7W, PoE 5.8W, CXP TBD
 46mm (W) x 46mm (H) – Applies to all interfaces
 CLB 59.6mm (L), GEV 77.5mm (L), PoE 91.1mm (L),
 CXP 67.2mm (L)

CLB 201g, GEV 236g, PoE 349g, CXP 229g

100g (20-200) HZ XYZ, 1000g

-40°C to +85°C Operating, -50°C to +90°C Storage

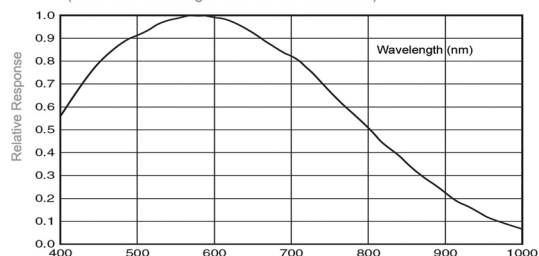
10% to 90% non-condensing

>660,000 hours @ 40°C (Telcordia SR-332)

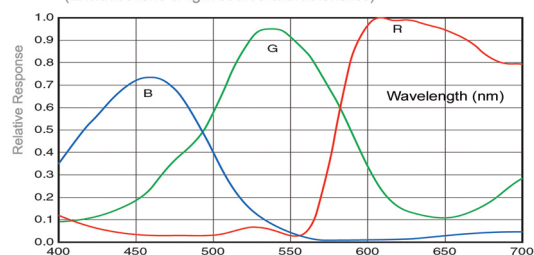
FCC 15 part A, CE, RoHS

IMPERX: Technically superior products, full tech support, rapid-response customer care. "Bobcat 2.0" adds many new features, lens control, more memory and enhanced image quality. Each easy to use Bobcat is supported by IMPERX professionals.

Monochrome with Microlens ICX-674
 (Excludes lens & light source characteristics)

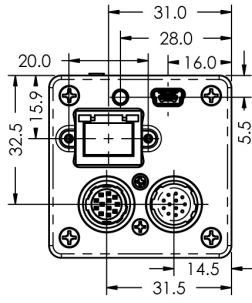
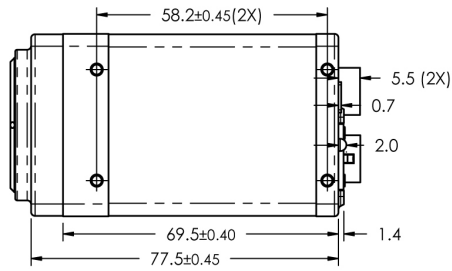


Color with Microlens
 (Excludes lens & light source characteristics)



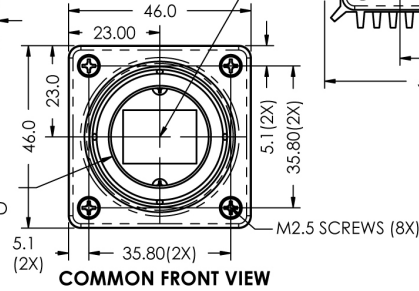
BOBCAT 2.0 B1922 Specifications

GigE Vision(Without PoE)

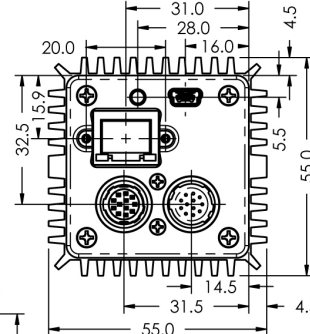
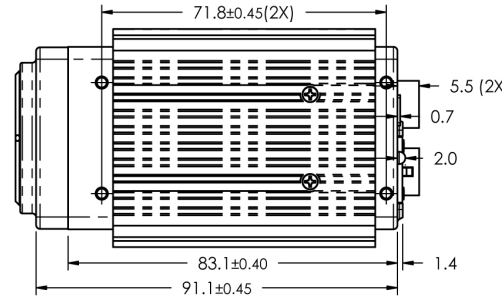


CENTER OF IMAGE IS NOMINALLY AT CENTER OF LENS

C-MOUNT
1" - 32 THREAD

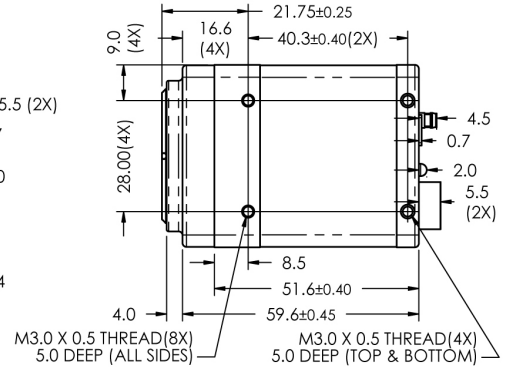


GigE Vision(With PoE)

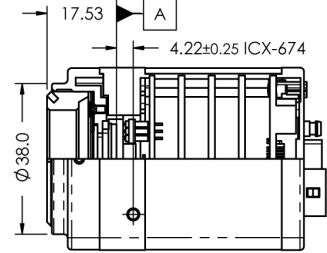


M2.5 SCREWS (8X)

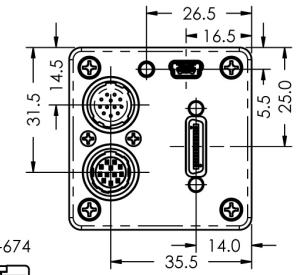
Camera Link



NOTE:
DATUM "A" REFERS TO
THE IMAGE PLANE
(TOP OF IMAGING DIE)



COMMON IMAGE PLANE DISTANCE



Hirose Connectors

Power and I/O Interface



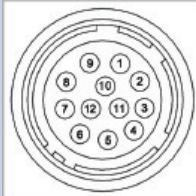
- | | |
|-------------------|-----------------|
| 1 12V DC Return * | 7 OUT1 Signal |
| 2 +12V DC* | 8 IN1 Signal |
| 3 IRIS VCC | 9 IN2 Signal |
| 4 IRIS Video | 10 IN1/2 Return |
| 5 IRIS Return | 11 Reserved |
| 6 OUT1/2 Return | 12 OUT2 Signal |

*Not connected for CXP

Connector: Hirose HR 10A- 10R- 12PB(71)

Lens Control/RS232

See manual for PIN information



- | | |
|---------------|-------------|
| 1 IRIS Return | 7 FOCUS + |
| 2 IRIS VCC | 8 ZOOM - |
| 3 IRIS Video | 9 ZOOM + |
| 4 IRIS - | 10 UART_COM |
| 5 IRIS + | 11 UART_RX |
| 6 FOCUS - | 12 UART_TX |

Connector: Hirose HR 10A- 10R- 12SB(71)

B1922 Ordering Information

Interfaces available

- Camera Link® Base (CLB)
- GigE Vision (GEV / PoE)
- CoaXPress (CXP)

Sensor types available

- Monochrome
- Bayer Color

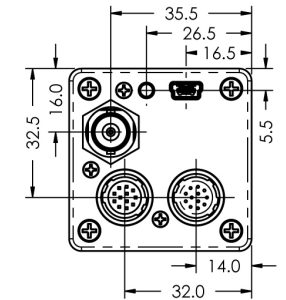
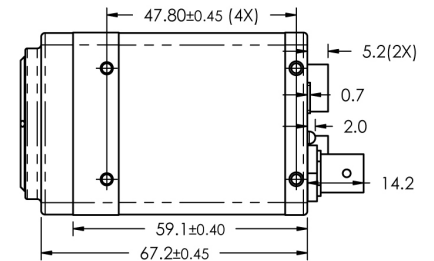
Accessories (Sold separately)

- PS12v04-Power Supply w/ 1 input and 1 output
- PS12v05-Power Supply (as above) and Video Iris



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CoaXPress



Quality Management System ISO 9001:2008 Registered
Environmental Management System ISO 14001:2004 Registered
DDTC Registered (Directorate of Defense Trade Controls, US Department of State)



bobcat-B1922_Rev1