



Piranha4 Color 2K and 4K

High Speed Trilinear CMOS Cameras



70 kHz line rates trilinear color, superior image quality, and easy to use.

The new Piranha4 trilinear color cameras provide industry leading speeds to meet future requirements of higher throughput in demanding color imaging applications.

Based on Teledyne DALSA's unique CMOS linescan technology, the Piranha4 color family delivers superb color fidelity, responsive pixels, all in a compact footprint and with an easy to use interface. New features include multiple regions of interest for data reduction and regional calibration, sub-pixel spatial correction, factory calibration to white LED, white balance and colour calibration tools.

Key Features

- High speed: up to 70 kHz line rates
- Three native colors (RGB) per pixel
- Combination of various pixel sizes and resolutions
- Bi-directional
- Compact camera body
- Sub-pixel Spatial correction
- Horizontal Parallax Correction

Programmability

- Multiple Regions of Interest for calibration and data reduction
- 8, 10, or 12 bit output
- Flat field and lens shading correction
- 8 programmable coefficient sets
- GenICam or ASCII compliant interfacing

Typical Applications

- 100% print inspection (pharmaceuticals, bank note)
- Electronics inspection
- Materials grading systems
- Web inspection
- High performance color sorting systems
- Food inspection
- General purpose machine vision

Specifications

Resolution	2048 x 3 pixels or 4096 x 3 pixels
Line Rate	Up to 70 kHz
Pixel Size	14.08 μm x 14.08 μm (2k) and 10.56 μm x 10.56 μm (4k)
Data Format	8, 10, or 12 bits, selectable
Output	Base, Medium, Full and Deca Camera Link
Lens Mount	M42 x 1 (2k) and M58 x 0.75 (4k) F-mount adapter available
Responsivity	See graph
Dynamic Range	> 60 dB
Nominal Gain Range	1x to 10x
Size	62 mm x 62 mm x 48 mm
Mass	< 340 g
Operating Temp	0 °C to 65 °C (front plate)
Power	Hirose 6-pin male
Power Dissipation	8 W (2k) and 12 W (4k)
Control & Data	SDR-26 mini Camera Link
Regulatory Compliance	CE, FCC, and RoHS

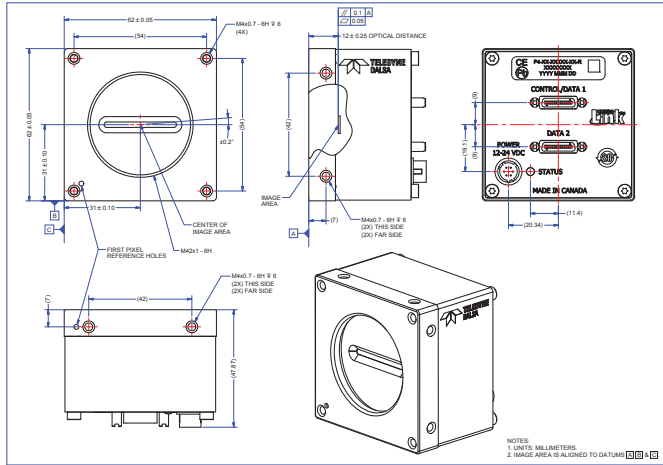
Piranha4 Trilinear Model Comparison

Part Number	Resolution	Maximum Line	Pixel Size
P4-CC-02K07T-00-R	2048 x 3 pixels	70 kHz	14.08 μm x 14.08 μm
P4-CC-02K04T-00-R	2048 x 3 pixels	40 kHz	14.08 μm x 14.08 μm
P4-CC-04K07T-00-R	4096 x 3 pixels	70 kHz	10.56 μm x 10.56 μm
P4-CC-04K04T-00-R	4096 x 3 pixels	40 kHz	10.56 μm x 10.56 μm

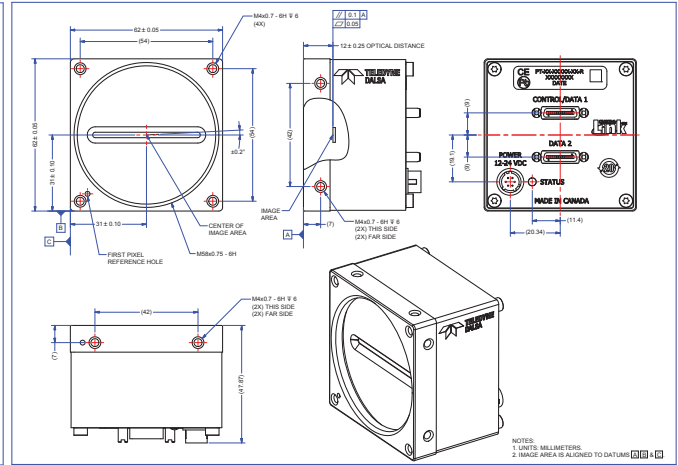


Piranha4 Color Trilinear 2K and 4K

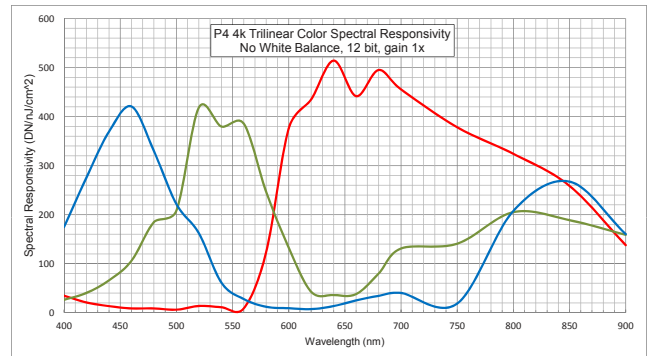
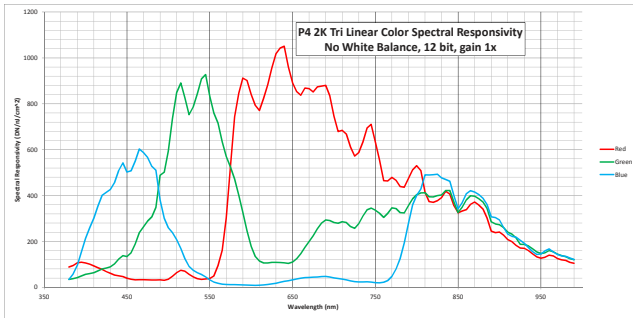
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2k model



4k model



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