Area Scan Cameras

DALSA 4M15

This progressive scan camera uses a Full Frame architecture—it requires a mechanical shutter.

A scientific grade camera which combines high resolution, high speed and true 12 bit performance.

The 4M15 digital camera provides high-sensitivity 12-bit images with 2k x 2k spatial resolution at up to 15 frames per second (fps). The 4M15's full frame progressive scan CCD has a square pixel format and 100% fill factor to provide superior, quantifiable image quality even at low light levels.

True 12 bit performance provides up to 4096 distinct gray levels—perfect for applications with large interscene light variations. The low-noise, digitized video signal also makes the camera an excellent choice where low contrast images



must be captured in challenging applications. Complete interface cable sets and Windows 95/98/NT control software make system set up and integration both simple and quick.

Features

- 2048 x 2048 resolution @ 15fps
- True 12-bit digitization
- MPP for high sensitivity with low dark current
- Progressive scan readout
- Binning up to 4x4
- Programmable operation (via RS232)
- 100% fill factor

Specifications

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Resolution	2048 x 2048
Pixel Size	14 μ m x 14 μ m
Aperture	28.7mm x28.7mm
Lens Mount	F-mount
Max. Line/Frame Rate	15fps
Data Rate	4x20MHz
Data Format	4x12-bit RS422 or LVDS
Responsivity	18DN/(nJ/cm²) @540nm
Dynamic Range	3200:1
Nominal Gain Range	1 or 4x
Size	88x110x90mm
Mass	1.3kg
Operating Temp	10-45 C
Power Supply	+5V, -5V, +15V, -15V
Power Dissipation	<28W
Regulatory Compliance	

Applications

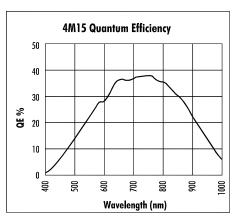
- Microscopy
- Laser based imaging
- Crystallography

Sensor

The 4M15 uses a high-performance full frame CCD.

Connectors

Control	SMA coax for sync	
Data	2xMDR60	
Power	DB15M	
Other	RJ-11F for serial link	



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4-Dec-00 03-70-00072-01 www.dalsa.com

Mechanical Dimensions 56.9 mm 47.0 mm 27.9 mm 54.4 mm 27.4 mm 0 Ø 16.8 mm 000 45.6 mm 16.9 mm Ø Ø 110,0 mm 41.4 mm 1/4-20 9,8 mm 35.2 mm 89.7 mm 22.9 mm 37,3 mm 11,5 mm 40.8 mm O 0 ON osi (mm 32.3 mm 22.7 Ť 32.3 mm E 13.9 mm 33.1 mm 49.1 mm 7.5 mm 6.7 mm 17.6 mm 13.3 mm 5.1 mm 36.8 mm

For More Information

For more detailed information on this and other products, including pinouts, timing, and signal descriptions, see the full product datasheet. Contact your local rep or visit our website at www.dalsa.com/products.

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