

# CoolCube 1

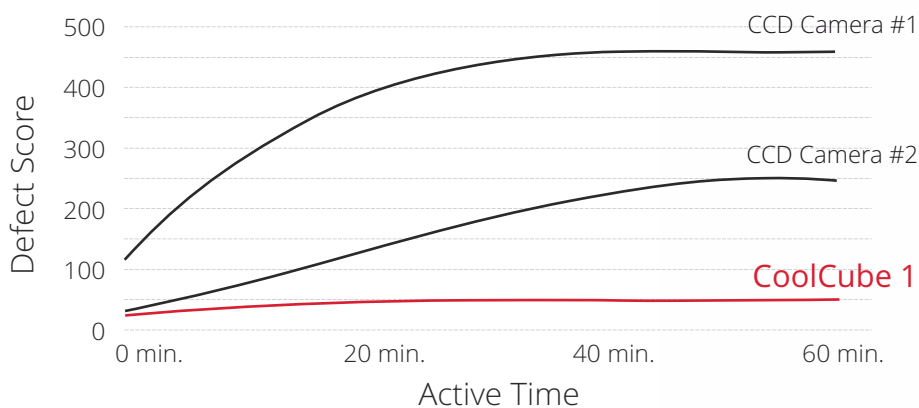
High-Resolution  
Digital CCD Camera

## USB-Camera for Monochrome or Color Imaging

*Extremely low image noise due to optimized housing*

The CoolCube 1 is a high-resolution digital CCD camera with progressive scan that combines excellent technical features with an attractive price. All MetaSystems imaging products are compatible with CoolCube cameras. Two different models are available: a monochrome version, CoolCube 1m, and a Bayer-mask color version, CoolCube 1c.

Thanks to its very low power consumption and optimized housing design, the CoolCube 1 keeps the imaging sensor cool. This results in unusually low thermal noise. The CoolCube 1 is therefore particularly suitable for low-light level situations and fluorescence imaging.



*The diagram shows the defect score (pixels with increased noise current) as a function of the operating time for different CCD cameras using the same sensor chip. The comparison of the noise levels clearly shows the excellent performance of the CoolCube 1.*



## Technical Specifications

<i>Resolution/Pixel Size</i>	1360 x 1024 pixels; 6.45 µm x 6.45 µm
<i>Sensor</i>	2/3" EXview HAD CCD™, quadratic pixels, monochrome or color (BAYER pattern)
<i>Order Number</i>	<b>CoolCube 1m</b> (monochrome): <b>H-0310-009-MS</b> <b>CoolCube 1c</b> (color): <b>H-0310-010-MS</b>
<i>Frame Rate</i>	15 fps @ full resolution
<i>Full Well Capacity</i>	17,000 e
<i>Digitization Depth</i>	12 Bit
<i>Shutter</i>	Global Shutter
<i>Exposure Time</i>	20 µs to 270 s
<i>Gain</i>	1 - 16
<i>Data Interface</i>	High Speed USB 2.0
<i>Power Supply / Power Consumption</i>	USB powered; 2.4 W
<i>Internal Image Memory</i>	32 MByte
<i>Mechanical Interface</i>	C-Mount
<i>Dimensions</i>	70 mm x 70 mm x 70 mm
<i>Weight</i>	730 g

The described functions refer to the following software versions: **Ikaros 6.3** | **Metafer 4.3**

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MetaSystems products are used in many countries worldwide. Depending on the regulations of the respective country or region, some products may not be used for clinical diagnostics.

Some hardware components supplied by other manufacturers are not included in MetaSystems IVD products and are therefore not IVD medical devices.

The CoolCube 1 camera is manufactured by ABS GmbH Jena, Germany.

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