



2.0 Megapixel CMOS USB 2.0 Camera

High Resolution CMOS Color or Monochrome Microscopy Camera for Qualitative Image Archiving

Outline

Lumenera's INFINITY 1-2 CMOS digital camera is designed to be a cost-effective, versatile solution for clinical, life science, materials science and educational professionals. With 1600x1200 resolution and on-board processing, the INFINITY 1-2 delivers outstanding image quality for a wide variety of scientific applications.



Live video preview provides for real-time focus, while auto exposure and auto white balance efficiently capture your optimal image. An intuitive user application provides camera controls, while full integration to popular third-party imaging applications is available through our TWAIN drivers.

The USB 2.0 digital interface ensures a simple plug and play installation – and one standard cable minimizes camera clutter. No framegrabber required.

INFINITY cameras are supported by an experienced team of technical support and imaging experts. We understand your imaging needs and are here to help you get the most out of your camera.

Performance Features

- ❑ High-speed USB 2.0 interface eliminates a framegrabber and facilitates ease of installation on both laptop and desktop computers
- ❑ Low noise characteristic of progressive scan 2.0 megapixel image sensor results in crisp color quality for the most demanding brightfield and darkfield microscopy applications including clinical pathology and cytology, life science and geology
- ❑ Full color sub-windowing allows for rapid, focus and scanning of samples: 20 fps at full 1600x1200 resolution and 96 fps at 640x480 resolution
- ❑ Includes INFINITY ANALYZE software for advanced camera control, image processing, measuring and annotation included, as well as INFINITY CAPTURE software for camera control and image capture.
- ❑ Select 8 & 10-bit pixel data modes
- ❑ RGB data captured through each pixel contains 30-bits of color image information resulting in 1024 intensity values
- ❑ Camera control through an intuitive user TWAIN interface results in rapid image capture archiving and documentation for high throughput applications, demanding research environments and teaching facilities
- ❑ GPI/O for control of peripherals and synchronization
- ❑ The INFINITY 1-2 has a compact design equipped with a C-Mount, facilitating installation on all microscope configurations including upright, inverted and stereo
- ❑ INFINITY 1-2 cameras are software compatible with Windows 2K, Windows XP, Windows Vista 32 and 64-bit operating systems

Specifications

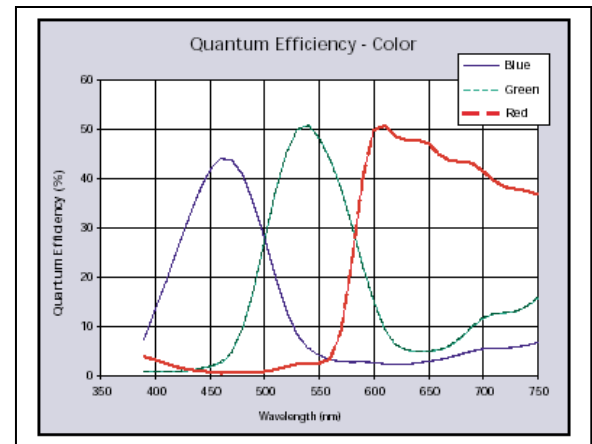
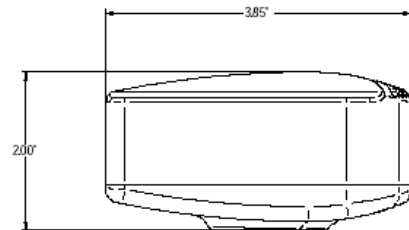
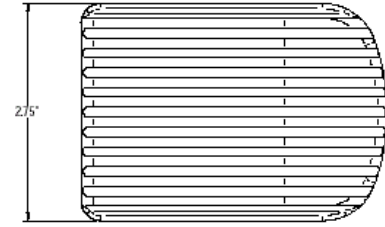
INFINITY 1-2

Camera Sensor

Image Sensor	1/2" CMOS format, color or monochrome, 6.7mmx5.0mm array
Effective Pixels	1600x1200, 4.2µm square pixels
Frame Rate	20 fps at 1600x1200, 96 fps at 640x480
Dynamic Range	>60dB
Digital Output	8 and 10-bit uncompressed
Read Noise	20 e- rms

Camera Controls

Mass	300g
Power Requirement	USB bus power, or external 5VDC - 500mA
Power Consumption	~2.5Watts
Operating Temperature	0° C to +50° C
Operating Humidity	5%-95%, Non-condensing
Integration Time	84µs – 3s
Shutter	Rolling shutter with single frame capture
ROI	User Selectable
Auto Exposure	Automatic / Manual
White Balance	Automatic / Manual
Gain	1 to 10X Programmable
Interface Connector	USB 2.0 high-speed interface
Dimensions (L x W x H)	3.85 x 2.00 x 2.75 inches
Lens Mount	C-Mount lens adapter (CS-Mount option)



Recommended PC Specs:

- Pentium 4, 1.3 GHz or higher
- 512 Mb RAM
- 60 GB hard drive free space or more
- USB 2.0 Port
- Windows 2000 or XP

Minimum PC Specs:

- 600 MHz Processor
- 256 MB of SDRAM
- 20 GB hard drive free space
- USB 2.0 Port
- Windows 2K, XP, Vista 32 and 64-bit OS

Product Includes:

- INFINITY 1-2 digital camera for USB 2.0
- CD-ROM with INFINITY user application software
- TWAIN driver
- Documentation
- USB 2.0 cable

Ordering Information

INFINITY 1-2C – 2 Megapixel Color Camera

LuSDK – Software Developer's Kit

**Full customization available
to meet your exact needs!**