# Economical High-Speed Cameras in a Compact Package for Laptop Control



### Compact, Versatile and Easy to Use

The i-SPEED 210 and the i-SPEED 211 are the perfect high-speed cameras for real-world situations where access, portability and rapid deployment matter. These cameras fit in the palm of your hand; when tethered to a laptop or Ethernet cable, they can fit almost anywhere – under dashboards, in engine compartments, in machinery and more.

Providing a balance between cost, speed, resolution and compact size, the i-SPEED 210 and i-SPEED 211 are ideal high-speed cameras for budget-conscious test laboratories, production lines and test facilities. The high-sensitivity CMOS sensor provides over 1.3 million pixels of resolution at 500 fps -- suitable for slowing down most life science, robotics and machinery applications. The global exposure shutter makes this a true professional high-speed camera capable of recording complicated rotating objects, but at a price that will not break a laboratory budget.

The 1-hour battery that comes standard on the model 211 coupled with a standard laptop make this camera ideal for untethered portable field work. Add a layer of rugged durability with the optional Hi-G shock package.

## **FEATURES**

- SVGA resolution 1280 x 1024 CMOS sensor
- Maximum frame rate of 79,500 frames per second
- Fits in the palm of your hand; the 210 is a 2.5" cube and the 211 is a 3.5" cube
- · Excellent light sensitivity
- Full resolution to 500 fps (1,750 fps in quad mode)
- · Certified to 100 G shock, 10 G vibration
- Up to 8 GB of memory for long recordings
- Interchangeable C-mount lenses
- 1 hr battery charge while recording, 1.5 hours while while in standby (Model 211 only)



## **SPECIFICATIONS**

# i-SPEED. 210 | 211

#### **IMAGER**

Frame rate at full resolution 500 fps (1,750 fps in quad mode)

Shutter Global Electronic Shutter: 2µs to 1s

**Spectral bandwidth** 400 - 900 nm

**Amplification** Digital Gain 1 - 4 in 8 steps

Maximum resolution1280 x 1024Maximum frame rate79,500 fpsSensor diagonalSize 22.9mmPixel size14μm squareBit depth10-bit

**Light sensitivity** 2,500 Mono / 2,000 Color

#### SYNCHRONIZATION and CAPTURE

**Memory** 2GB / 4GB / 8GB\*

Memory segments 16

Video AVI (JPG, BMP)

Image sequence TIFF, BMP, JPG, DNG, PNG

#### PHYSICAL and ENVIRONMENTAL

 220 Dimensions Inches
 2.5 (W) x 2.5 (H) x 2.6 (L)

 Dimensions mm
 64 (W) x 64 (H) x 66 (L)

 Weight
 0.66 lbs (300 g) without lens

 221 Dimensions Inches
 3.7 (W) x 2.7 (H) x 3.6 (L)

 Dimensions mm
 94 (W) x 69 (H) x 92 (L)

 Weight
 2.00 lbs (900 g) without lens

 Input Voltage
 10 - 30 VDC

 Power Consumption
 210 / 7.5 w Max

 211 / 15 w Max

Mounting ¼-20

**Battery Charge** Recording: 1 hr, Standby: 1.5 hr (Model 211 only)

 Lens options
 C mount / F mount / FG mount

 G shock
 Hi-G 100 G shock, 10 G vibration

**Temperature °F**41 to 113 operation **Temperature °C**5 to 45 operation

Ethernet 1 Gb

**Remote control** via supplied software

#### CONNECTIVITY

IRIG Input B synchronization\*
Network 1GB RJ45

**Power input** 6pin female connector

Trigger External signal/switch triggering
Input/Output 8pin female I/O module (Model 211 only)
Trigger modes Video trigger, Burst trigger mode

#### PURCHASING OPTIONS

Sensor Color / Mono

 Memory
 2 GB (Std) / 4 GB / 8GB\*

 Package
 Standard / Hi-G rated

 Warranty
 1 yr (std) /2 yr

\*Model 211 only

# FRAME RATES, RESOLUTION and DURATION

FPS	Resolution	Record Time(s)		
		2 GB	4 GB	8 GB
500	1280 x 1024	3.3 s	6.5 s	13.1 s
700	1280 x 720	3.3 s	6.7 s	13.3 s
1,000	1280 x 512	3.3 s	6.5 s	13.1 s
1,250	800 x 600	3.6 s	7.2 s	14.3 s
1,850	640 x 480	3.8 s	7.6 s	15.1 s
2.000	512 x 512	4.1 s	8.2 s	16.4 s
5,650	320 x 240	4.9 s	9.9 s	19.8 s
18,500	128 x 100	9.1 s	18.1 s	36.3 s
79,500	128 x 10	21.1 s	42.2 s	84.4 s

Note: Other resolutions and speeds are available.