Speed, Resolution, and More Speed

5,315fps @ 2048x1536 | 16GPx/s throughput | ISO 16,000 / 125,000

- High resolution 2048x1536 pixel sensor (3.1MPx)
- 1080p resolution at 7,960 frames/second
- Up to 288 GB of on-board memory for long recordings
- Internal or external SSD drive for fast data transfer
- Microlens sensor for exceptional light sensitivity
- Wide Dynamic Range recording
- Global electronic shutter to 289 ns*
- 1 hour battery life
- Compatible with all Nikon F and Canon EF mount lenses
- Maximum frame rate – 1,000,000 fps
- Flexible frame synchronization from 10 Hz to 200 kHz
- Environmentally rugged package available
- 32 point integrated real-time health monitoring system
- Upgrade path between models

* Subject to export regulations, shorter shutter speeds are available by request. Contact IX Cameras for more information.
**IMAGER**

- **Sensor type**: Custom CMOS
- **Sensor resolution**: 2048 x 1536 pixel
- **Sensor size**: 27.972 mm x 20.736 mm
- **Sensor diagonal**: 34.82 mm
- **Pixel size**: 13.5 μm
- **Bit depth**: 12 bit (36 bit color)
- **Light sensitivity Mono (Gain off/on)**: 16,000 / 125,000
- **Light sensitivity Color (Gain off/on)**: 4,000 / 32,000
- **Maximum frame rate**: 1,000,000 fps
- **Shutter type**: Global Exposure
- **Shutter time, standard**: 1 μs minimum
- **Shutter time, fast mode**: 289 ns
- **WDR**: Wide Dynamic Range

**SYNCHRONIZATION and CAPTURE**

- **Trigger**: TTL T0 to 0-100%
- **Trigger modes**: Circular, ROC, BROC
- **Sync**: 10 Hz - 200 kHz
- **Luminance histogram**: Iris setting aid tool
- **i-CHEQ 360**: Camera status LEDs
- **i-FOCUS**: Focusing aid tool
- **i-EXPOSE**: High/low exposure highlight
- **Control**: PC or CDUe
- **IRIG input**: IRIG – B to sub 1 μs
- **TRIGGER**: Camera sync to IRIG
- **Control**: IRIG – B to sub 1 μs
- **WDR**: Wide Dynamic Range

**PHYSICAL and ENVIRONMENTAL**

**Dimensions**

- **Instrumentation package**: 14.3 (W) x 6.2 (H) x 6.2 (L)
- **mm**: 363 (W) x 157 (H) x 154 (L)
- **Rugged package**: 14.75 (W) x 6.0 (H) x 5.75 (L)
- **mm**: 374 (W) x 150 (H) x 143.5 (L)
- **Weight**: 18.7 lb (8.5 kg) with battery
- **Input voltage**: 12-36 V
- **Power consumption**: 150 W Nominal, 200 W Max
- **Mounting**: 1/4x20 and 3/8x16 tripod plate
- **Battery**: 2x 14.4 V 90 Wh
- **Battery life**: 1 hour
- **Lens mount**: Custom, swappable lens plate
- **EMC**: EN55032-A, EN55024
- **Safety**: BS EN61010-1 (camera), IEC60950 (PSU)
- **CE marking**: EMC Directive (Camera), EMI Directive, LV Directive (PSU)
- **Lead free**: RoHS Directive
- **WEEE**: Compliant
- **IP rating**: IP 20
- **Temperature “F”**: 32 to 104 operation, -4 to 140 storage
- **Temperature “C”**: 0 to 40 operation, -20 to 60 storage
- **Pressure**: 71 kpa to 106 kpa
- **Relative humidity**: 95% at 104°F non-condensing
- **G-shock, Instrumentation package**: 10 G
- **G-shock, Rugged package**: 30 G @ 11 ms IEC 68-2-27 Ea

**Power input connector**: 6 pin Lemo
**Trigger input**: BNC 75 Ω
**Feature connector**: 18 pin Lemo, trigger in / sync / sync out / exposure out / remote power

**CONNECTIVITY**

- **Video outputs**: 2x HD-SDI, HDMI
- **USB**: USB 3
- **Network**: 1 Gb R/HS
- **Video**: IXV, AV (compressed or uncompressed)
- **Image sequence**: TIFF, JPG, RAW
- **Ethernet control**: 1 Gb
- **Remote control**: Via supplied software

**PC SOFTWARE**

- **Standard control**: Control ONE
- **Premium control**: Control MULTI-DAQ
- **Editing**: i-SPEED Movie Maker
- **Analysis**: ProAnalyst® Lite by Xcitex
- **Viewer**: i-SPEED Viewer
- **Utilities**: i-SPEED Lens Calculator, i-SPEED Viewer
- **Software Developers Kit**: C++, LabView
- **Synchronized data acquisition**: USB DAQ, 8 options

**PURCHASING OPTIONS**

- **CDUe**: Portable Control Unit
- **Sensor**: Color / Mono
- **Memory**: 36 GB (std) / 72 GB / 96 GB / 144 GB / 288 GB
- **Shutter time**: 1 μs (std) / 289 ns (subject to export restrictions)
- **Internal SSD**: 500GB / 1TB / 2TB
- **External SSD**: 250GB / 500GB / 1TB / 2TB
- **Lens mounts**: F mount (Nikkor D) / F mount (Nikkor G)
- **C mount / EF mount**: C mount / EF mount
- **Package type**: Instrumentation / Rugged
- **Warranty**: 1 yr (std) / 2 yr / 3 yr
- **Internal Batteries**: Set of 2 batteries

**FRAME RATES, RESOLUTION, and DURATION (in seconds)**

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<thead>
<tr>
<th>Frame Speed</th>
<th>Resolution</th>
<th>36GB</th>
<th>72GB</th>
<th>96GB</th>
<th>144GB</th>
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*Note: Other resolutions and speeds are available.*

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