

Innovative technology for maximum light efficiency

- **Extremely light sensitive:**
2,500 ASA monochrome, 2,000 ASA RGB
- **Up to 506 frames per second at**
1,280 x 1,024 pixel resolution
- **Stepless adjustable frame rate up to**
113,000 frames per second at reduced resolution
- **3.3 seconds onboard Recording Memory**
at full resolution
- **GigE Vision® compatible**
- **ImageBLITZ® Auto Trigger**
- **Crashproof up to 100 g**
- **Pixel-based Fixed Pattern Noise Correction**
- **Burst Trigger Mode**
- **Multi Sequence Mode**

Lighting becomes a minor matter

So far, lighting was the crucial point in high speed recording. It caused a lot of attention and expense to be paid for this item. MotionBLITZ EoSens® mini1 packs up the lighting issue! Its unprecedented photo sensitivity enables real high speed recordings under normal lighting conditions.

Fixed Pattern Noise Correction

MotionBLITZ EoSens® mini1 adjusts every single pixel regarding blackvalue and dynamic, in real time. In consequence one gains low noise and crystal clear pictures.

Onboard Ring Buffer (pre/post Trigger)

The MotionBLITZ EoSens® mini1 onboard Ring Buffer allows buffering of triggered events up to 3.3 seconds at full resolution and speed. The history function allows pre and post event recording through free selection of frames or recording time



ImageBLITZ® Auto Trigger

The ImageBLITZ® Auto Trigger allows objectdriven triggering directly through the camera by a selectable image region defined as sensor. A free selectable rectangle can be adjusted as trigger sensor. If there is a change in the lightness (on single frame level), the camera will trigger automatically.

Burst Trigger Mode (post Trigger)

In Burst Trigger Mode, it is possible to divide the memory into several thousand sequences. Events can be recorded over a longer period without the data having to be read out between.

Dynamic Range Adjustment for extreme contrasts

The camera's Dynamic Range Adjustment option allows to change the CMOS sensor's linear range into a non-linear one. Thus, provides clear details even at extreme dark/light contrasts.

Maximum performance at minimum form factor

MotionBLITZ EoSens® mini1 comes up with a small form factor. This ultra compact housing with a depth of appx. 63 mm (C-Mount Version) allows universal using, even in cramped space conditions.

Flexible and easy use

The camera's Gigabit Ethernet interface even allows to operate multiple cameras from any standard Notebook/PC over a distance of 100 m.

A great variety of extensions

Color Version, F-Mount Front, rearside or side placed connectors, Cooling Option, Hi-G Version are optional available.



MotionBLITZ EoSens® mini1 High Speed Recording Camera

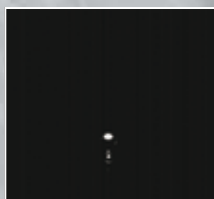
Technical Data	
Sensor	CMOS Sensor 1,280 (H) x 1,024 (V) pixel active area 22.9 mm (diagonal) 19.92 (H) x 14.34 (V) mm 10-bit monochrome or RGB color with BAYER-Filter
Pixel size	14 x 14 µm
Light sensitivity	monochrome 25 V/lux-s 2,500 ASA monochrome, 2,000 ASA RGB
Image speed	1-506 fps* at full 1,280 (H) x 1,024 (V) resolution, up to 113,000 fps at reduced resolution
Recording time	3.3 s at full resolution & 506 fps. Extended recording times at reduced resolution and/or image speed
Shutter	global electronic shutter from 2 µs to 1 s, in 2 µs steps
Internal dynamics	up to 90 dB using dynamic shutter control
Spectral bandwidth	400-900 nm
Amplification	Digital Gain 1-4 in 8 steps
System design	Scaleable and network-compatible with standard- or Notebook PCs. Synchronous processing of multiple cameras
Camera size	63 x 63 x 64.5 mm (C-Mount) 63 x 63 x 92.5 mm (F-Mount)
Weight	280 g, without lens
Environment	+5...35 °C (without Cooling Option) +5...45 °C (with Cooling Option)
Lens mount	C-Mount or F-Mount
Power supply	10-30 V DC external power supply
Power consumption	7.5 W max.
Software	MotionBLITZ® Director2 operator software for Windows 2000/XP/Vista
Frame storage	BMP oder AVI file format
Camera-PC Interface	1000/100 Ethernet Interface (Gigabit Ethernet)
Trigger	Triggering with external signal/switch, MotionBLITZ® Software or ImageBLITZ®
Synchronisation	Synchronisation in- and output to synchronise e.g. multiple cameras (5V TTL)
Plug position	Models: alternative rearside- or side placed connectors

Standard Equipment
ImageBLITZ® Auto Trigger · Multi Sequence Mode · Burst Trigger Mode Fixed Pattern Noise Correction · Dynamic Range Adjustment onboard Ring Buffer · C-Mount Front · rearside placed connectors power supply · operator software

Optional Extensions	
Hi-G Schock 100 g/25 ms Vibration 10 g	Cooling Option +5...45 °C

Recording Data			
Resolution	Frame Rate	Resolution	Frame Rate
1,280 (H) x 1,024 (V)	506 fps	512 (H) x 512 (V)	2,040 fps
1,280 (H) x 720 (V)	718 fps	320 (H) x 240 (V)	5,670 fps
1,280 (H) x 512 (V)	1,008 fps	100 (H) x 100 (V)	19,000 fps
640 (H) x 480 (V)	1,869 fps	100 (H) x 10 (V)	81,512 fps

* fps = frames per second



Standard High Speed



EoSens®



EoSens®-Dynamic Range Adjustment

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