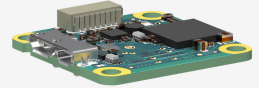
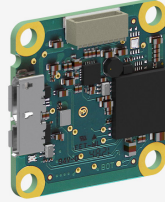
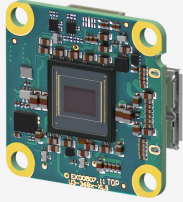


In series

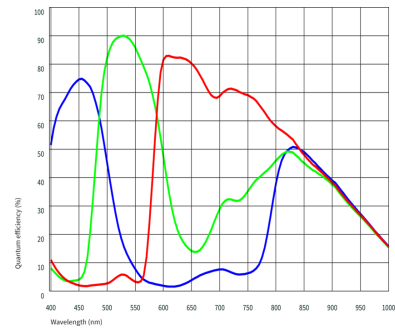
The model is in series and available for the long term.



Specification

Sensor

| | |
|---|----------------------|
| Sensor type | CMOS Color |
| Shutter | Rolling shutter |
| Sensor characteristic | Linear |
| Readout mode | Progressive scan |
| Pixel Class | 2 MP |
| Resolution | 2.16 Mpix |
| Resolution (h x v) | 1968 x 1100 Pixel |
| Aspect ratio | 16:9 |
| ADC | 12 bit |
| Color depth (camera) | 12 bit |
| Optical sensor class | 1/3" |
| Optical Size | 5.707 mm x 3.190 mm |
| Optical sensor diagonal | 6.54 mm (1/2.45") |
| Pixel size | 2.9 μm |
| Micro lens shift | 0.00 |
| Manufacturer | Sony |
| Sensor Model | IMX662-AAQR1-C |
| Gain (master/RGB) | -/- |
| AOI horizontal | same frame rate |
| AOI vertical | same frame rate |
| AOI image width / step width | 48 / 48 |
| AOI image height / step width | 2 / 2 |
| AOI position grid (horizontal/vertical) | 2 / 2 |
| Binning horizontal | increased frame rate |
| Binning vertical | increased frame rate |
| Binning method | M/C automatic |
| Binning factor | 2 |
| Subsampling horizontal | - |
| Subsampling vertical | - |
| Subsampling method | - |
| Subsampling factor | - |



Subject to technical modifications (2024-03-06)

Model

| | |
|--|--------------------|
| Frame rate freerun mode (in 10-bit mode) | 93 fps |
| Frame rate trigger (maximum) | - |
| Exposure time (minimum - maximum) | 0.009 ms - 2000 ms |
| Power consumption | 0.5 W - 0.9 W |

Ambient conditions

The temperature values given below refer to the outer device temperature of the camera housing.
For PCB versions, refer to the separate hints in the respective documentation.

| | |
|-------------------------------------|---------------------------------|
| Device temperature during operation | 0 °C - 55 °C / 32 °F - 131 °F |
| Device temperature during storage | -20 °C - 80 °C / -4 °F - 176 °F |
| Humidity (relative, non-condensing) | 20 % - 80 % |

Connectors

| | |
|---------------------|-----------------|
| Interface connector | USB 3.0 micro-B |
| I/O connector | 8-pin connector |
| Power supply | USB cable |

Pin assignment I/O connector

| | |
|---|-----------------------------------|
| 1 | Voltage output 3.3 V |
| 2 | Ground (GND) |
| 3 | Flash output without optocoupler |
| 4 | Trigger input without optocoupler |
| 5 | General Purpose I/O (GPIO) 1 |
| 6 | General Purpose I/O (GPIO) 2 |
| 7 | Ground (GND) |
| 8 | USB Power: 5 V, max. 400 mA |



Design

| | |
|------------------|----------------------------|
| Lens Mount | - |
| IP code | - |
| Dimensions H/W/L | 29.0 mm x 29.0 mm x 6.4 mm |
| Mass | 3 g |

Features

| | | |
|-------------------|-----------------------------|---|
| Image Acquisition | Freerun | ✓ |
| | Software trigger | ✓ |
| | Hardware trigger | ✓ |
| | Trigger controlled exposure | - |
| | Denoisier | - |
| | Long exposure | - |
| | Line scan | - |
| | Line scan highspeed | - |
| Global start | - | |
| Flashing | Flashing | - |
| | PWM flashing | - |

| | | |
|---------------------------|--------------------------------|------------------------------------|
| Image Adjustments | Auto exposure | - |
| | Auto gain | - |
| | Auto whitebalance | - |
| | Color correction | - |
| | Gamma | - |
| | LUT | - |
| | Mirror/flip | X/Y |
| On-board Image Processing | Pixel formats | BayerRG10g40IDS BayerRG12g24IDS |
| | Region of interest | ✓ |
| | Decimation (FPGA) | - |
| | Decimation (Sensor) | - |
| | Binning (FPGA) | - |
| | Binning (Sensor) | 2x2 Increases frame rate. |
| Others | Chunks | - |
| | Sequencer | - |
| | Events | - |
| | Firmware update | ✓ |
| | 1st supported firmware version | 3.x |