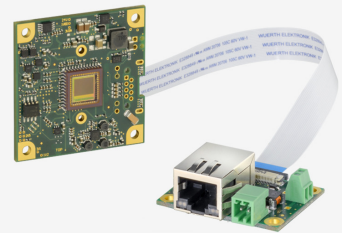
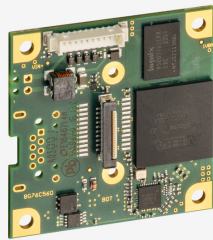
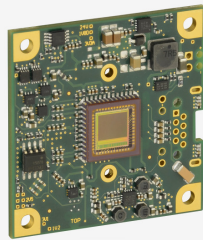


**In series**

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



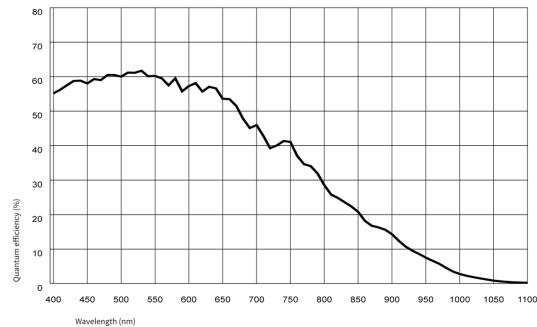
Daughterboard and flex ribbon cable shown are optional accessories



Specification

Sensor

|                                         |                                                         |
|-----------------------------------------|---------------------------------------------------------|
| Sensor type                             | CMOS Mono                                               |
| Shutter                                 | Global Shutter / Rolling shutter / Global Start Shutter |
| Sensor characteristic                   | Linear                                                  |
| Readout mode                            | -                                                       |
| Pixel Class                             | 1.3 MP                                                  |
| Resolution                              | 1.31 Mpix                                               |
| Resolution (h x v)                      | 1280 x 1024 Pixel                                       |
| Aspect ratio                            | 5:4                                                     |
| ADC                                     | 10 bit                                                  |
| Color depth (camera)                    | 12 bit                                                  |
| Optical sensor class                    | 1/1.8"                                                  |
| Optical Size                            | 0.000 mm x 0.000 mm                                     |
| Optical sensor diagonal                 | 0 mm                                                    |
| Pixel size                              | 5.3 µm                                                  |
| Manufacturer                            | e2v                                                     |
| Sensor Model                            | EV76C560ABT                                             |
| Gain (master/RGB)                       | 4x/-                                                    |
| AOI horizontal                          | same frame rate                                         |
| AOI vertical                            | increased frame rate                                    |
| AOI image width / step width            | 16 / 4                                                  |
| AOI image height / step width           | 4 / 2                                                   |
| AOI position grid (horizontal/vertical) | 2 / 2                                                   |
| Binning horizontal                      | same frame rate                                         |
| Binning vertical                        | same frame rate                                         |
| Binning method                          | M/C automatic                                           |
| Binning factor                          | 2                                                       |
| Subsampling horizontal                  | -                                                       |
| Subsampling vertical                    | -                                                       |
| Subsampling method                      | -                                                       |
| Subsampling factor                      | -                                                       |



## Model

|                                   |                                                                                                               |
|-----------------------------------|---------------------------------------------------------------------------------------------------------------|
| Pixel clock range                 | 7 MHz - 71 MHz                                                                                                |
| Frame rate freerun mode           | 50 fps                                                                                                        |
| Frame rate trigger (maximum)      | 48 fps                                                                                                        |
| Exposure time (minimum - maximum) | 0.009 ms - 2000 ms                                                                                            |
| Power consumption                 | 2.2 W - 2.9 W                                                                                                 |
| Image memory                      | 60 MB                                                                                                         |
| Special features                  | Linescan mode<br>Scaler<br>Sequencer<br>Log mode<br>Sensor hot pixel correction<br>Fine exposure<br>Multi-AOI |

## Ambient conditions

For PCB versions, refer to the separate hints in the respective documentation.

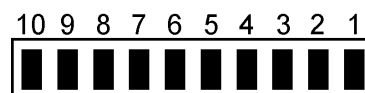
|                                             |                                 |
|---------------------------------------------|---------------------------------|
| Allowed device temperature during operation | 0 °C - 55 °C / 32 °F - 131 °F   |
| Allowed device temperature during storage   | -20 °C - 60 °C / -4 °F - 140 °F |
| Humidity (relative, non-condensing)         | 20 % - 80 %                     |

## Connectors

|                     |                                     |
|---------------------|-------------------------------------|
| Interface connector | ZIF                                 |
| I/O connector       | 10-pin Molex connector (Pico Blade) |
| Power supply        | 12 V - 24 V                         |

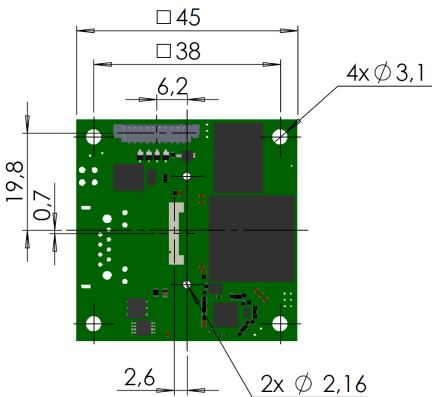
## Pin assignment I/O connector

|    |                                   |
|----|-----------------------------------|
| 1  | Ground (GND)                      |
| 2  | Vout 3.1 V max. 100 mA            |
| 3  | Trigger input without optocoupler |
| 4  | Flash output without optocoupler  |
| 5  | General Purpose I/O (GPIO) 1      |
| 6  | General Purpose I/O (GPIO) 2      |
| 7  | I2C bus clock signal              |
| 8  | I2C bus data signal               |
| 9  | Vin+ 12 V (160 mA) - 24 V (90 mA) |
| 10 | Vin- (GND)                        |



## Design

|                  |                             |
|------------------|-----------------------------|
| Lens Mount       | -                           |
| IP code          | -                           |
| Dimensions H/W/L | 45.0 mm x 45.0 mm x 13.0 mm |
| Mass             | 10 g                        |
| Housing material | -                           |



Features

List of on-camera image pre-processing features.  
All features of the table are available via our IDS peak software for image pre-processing on the host computer (sensor model dependent).

|                           |                                |        |
|---------------------------|--------------------------------|--------|
| Image Acquisition         | Freerun                        | ✓      |
|                           | Software trigger               | -      |
|                           | Hardware trigger               | ✓      |
|                           | Trigger controlled exposure    | -      |
|                           | Denoiser                       | -      |
|                           | Long exposure                  | -      |
|                           | Line scan                      | ✓      |
|                           | Global start                   | ✓      |
| Flashing                  | Flashing                       | -      |
|                           | PWM flashing                   | -      |
| Image Adjustments         | Auto exposure                  | -      |
|                           | Auto gain                      | -      |
|                           | Auto whitebalance              | -      |
|                           | Color correction               | -      |
|                           | Gamma                          | -      |
|                           | LUT                            | -      |
|                           | Mirror/flip                    | -      |
| On-board Image Processing | Pixel formats                  |        |
|                           | Region of interest             | ✓      |
|                           | Decimation (FPGA)              | -      |
|                           | Decimation (Sensor)            |        |
|                           | Binning (FPGA)                 | -      |
| Others                    | Chunks                         | -      |
|                           | Sequencer                      | ✓      |
|                           | Firmware update                | -      |
|                           | 1st supported firmware version | 4.96.1 |