





- Compact
- High frame rate
- Rugged housing
- Video-type auto iris

Description

Very small VGA CCD camera with GigE Vision

Prosilica GC650 is a fast, VGA-resolution, high-performance machine vision camera with Gigabit Ethernet interface (GigE Vision). The CCD sensor has excellent image quality and sensitivity. The camera is suitable for applications where speed and excellent image quality are key requirements. Options

• IR cut filter, CS-Mount

Specifications

| Prosilica GC | 650 |
|-----------------------------------|-----------------------------|
| Interface | IEEE 802.3 1000baseT |
| Resolution | 659 × 493 |
| Sensor | Sony ICX424 |
| Sensor type | CCD Progressive |
| Sensor size | Туре 1/3 |
| Cell size | 7.4 µm |
| Lens mount | C (adjustable) / CS |
| Max frame rate at full resolution | 90 fps |
| ADC | 12 bit |
| On-board FIFO | 16 Mbyte |
| Output | |
| Bit depth | 8/12 bit |
| Mono modes | Mono8, Mono12, Mono12Packed |
| Color modes RGB | RGB8Packed, BGR8Packed |





| Prosilica GC | 650 |
|--|---|
| Raw modes | BayerRG8, BayerRG12, BayerGR12Packed |
| General purpose inputs/outputs (GPIOs) | |
| TTL I/Os | 1 input, 1 output |
| Opto-isolated I/Os | 1 input, 1 output |
| RS-232 | 1 |
| Operating conditions/dimensions | |
| Operating temperature | 0°C +50°C |
| Power requirements (DC) | 5-25 VDC* |
| Power consumption (@12 V) | 3 W |
| Mass | 99 g |
| Body dimensions (L × W × H in mm) | 59 × 46 × 33 including connectors, w/o tripod and lens |
| Regulations | CE, FCC Class A, RoHS (2011/65/EU) |



Features

Prosilica GC650 features include:

- Video-type auto iris
- ROI, DSP subregion (selectable ROI for auto features)
- Binning
- Auto gain (manual gain control: 0 to 19 dB)
- Auto exposure (manual exposure controls: 10 µs to 116.8 s)





- Auto white balance
- StreamBytesPerSecond (easy bandwidth control)
- Stream hold
- Sync out modes: Trigger ready, input, exposing, readout, imaging, strobe, GPO
- Global shutter (digital shutter)
- Recorder and Multiframe acquisition modes
- Event channel
- Chunk data
- Storable user sets





Technical drawing





*Nominal value. Add 0.3 mm for color cameras.





Applications

Prosilica GC650 is suitable for applications where speed and excellent image quality are key requirements. These include:

- Machine vision
- Industrial inspection
- Public security
- Traffic monitoring
- Robotics

