GS650/650C

Description

90-degree GigE Vision camera, VGA resolution, 120 fps

The GS650 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 GS650 is available in landscape or portrait orientation.
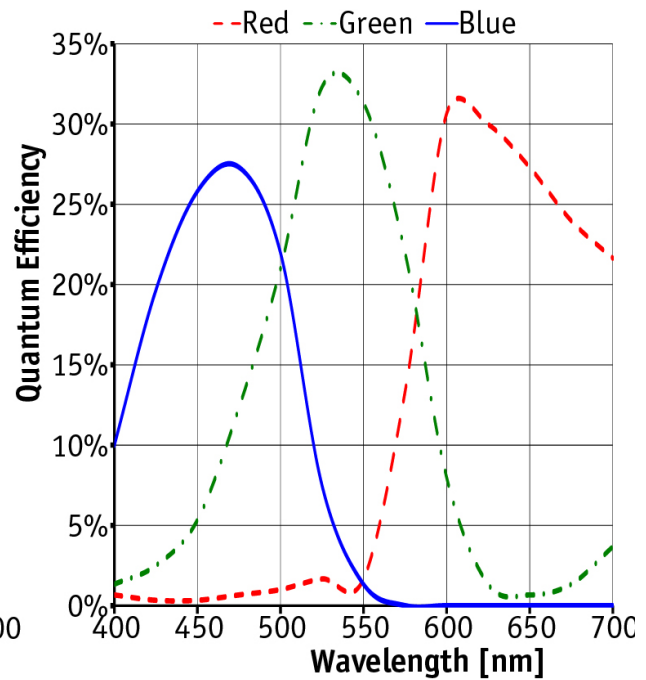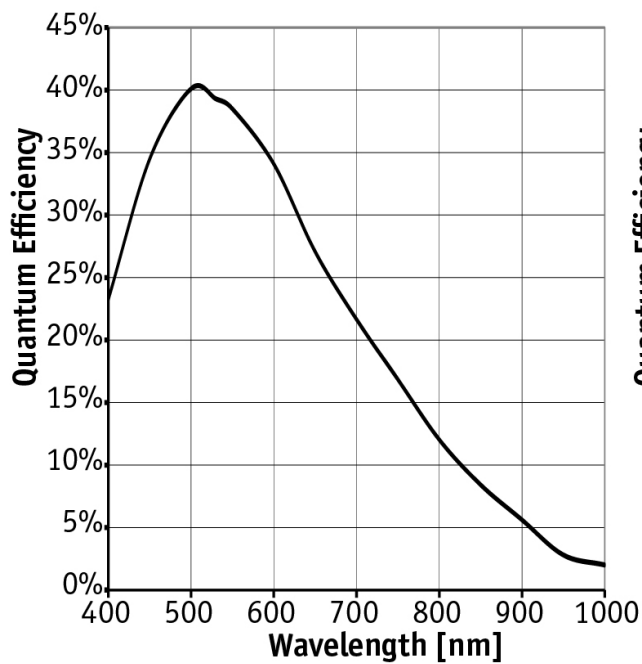
- Sony ICX424 Progressive Scan CCD
- 120 fps at 659 x 493
- Global shutter (Snapshot shutter)

- **Models:**
  - GS650, 659 x 493, 120 fps, CCD, Mono
  - GS650C, 659 x 493, 120 fps, CCD, Color
  - GS650-P, 659 x 493, 120 fps, CCD, Mono, Portrait
  - GS650C-P, 659 x 493, 120 fps, CCD, Color, Portrait

- **Modular Options:**
  - White Medical enclosure
  - CS Lens Mount (Factory conversion)
  - IRC Filter on Monochrome cameras (Factory installation)

Specifications

Prosilica GS	650
Interface	IEEE 802.3 1000baseT
Resolution	659 x 493
Sensor	Sony ICX424
Sensor type	CCD Progressive
Sensor size	Type 1/3
Cell size	7.4 µm
Lens mount	C (adjustable) / CS
Max frame rate at full resolution	120 fps
A/D	14 bit
On-board FIFO	16 MB
	Output
Bit depth	8/12 bit
Mono modes	Mono8, Mono12, Mono12Packed
Color modes YUV	YUV411Packed, YUV422Packed, YUV444Packed
Color modes RGB	RGB8Packed, BGR8Packed
Raw modes	BayerRG8, BayerRG12, BayerGR12Packed
	General purpose inputs/outputs (GPIOs)
TTL I/Os	1 input, 1 output
Opto-coupled 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)	3W
Mass	184 g
Body Dimensions (L x W x H in mm)	96 x 56 x 26 including connectors, w/o tripod and lens
Regulations	CE, FCC Class A, RoHS (2011/65/EU)

*5-16 VDC for cameras with SN: 02-22XX**A**

Download Prosilica GS650 technical drawing (click here)

Smart features

The GS650 features include:

- Auto Exposure
- Auto Gain
- Auto White balance
- Flexible Binning
- Region of Interest readout (AOI partial scan)
- DSP subregion (selectable ROI for auto features)
- StreamBytesPerSecond (easy bandwidth control)
- Stream hold
- Asynchronous external trigger and sync I/O
- Global shutter (digital shutter)
- Recorder and Multiframe Acquisition Modes

Applications

The GS650 is suitable for applications where speed and excellent image quality are key requirements. These include:

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