

# Prosilica GC

## 655



- Sony ICX414 sensor
- 90 fps @ full resolution
- Rugged housing
- Video-type auto iris

## Description

Very Small VGA CCD camera, 90 frames per second

Prosilica#GC655/GC655C is a fast, VGA resolution, high-performance machine vision camera with a GigE Vision compliant Gigabit Ethernet interface. The 1/2" Sony ICX414 CCD sensor with HAD technology has excellent image quality and sensitivity.

### Options:

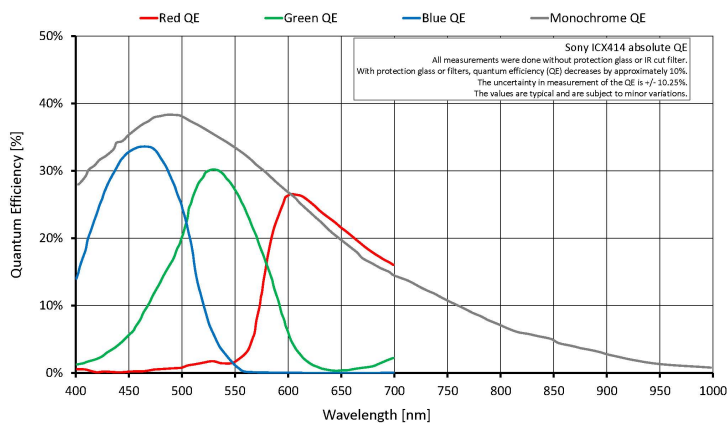
- CS-Mount
- Optical filters (IR cut filter/Protection glass)

See the [#Modular Concept#](#) for lens mount and optical filter options.

## Specifications

| Prosilica GC                      | 655                         |
|-----------------------------------|-----------------------------|
| Interface                         | IEEE 802.3 1000baseT        |
| Resolution                        | 659 (H) × 493 (V)           |
| Sensor                            | Sony ICX414                 |
| Sensor type                       | CCD Progressive             |
| Cell size                         | 9.9 μm x 9.9 μm             |
| Lens mount                        | C-Mount                     |
| Max frame rate at full resolution | 90 fps                      |
| ADC                               | 12 bit                      |
| Image buffer (RAM)                | 16 MByte                    |
| <b>Output</b>                     |                             |
| Bit depth                         | 8/12 bit                    |
| Mono modes                        | Mono8, Mono12, Mono12Packed |

| Prosilica GC                                  | 655   |
|---|---|
| Color modes RGB                               | RGB8Packed, BGR8Packed                        |
| Raw modes                                     | BayerRG8, BayerRG12, BayerGR12Packed          |
| <b>General purpose inputs/outputs (GPIOs)</b> |   |
| TTL I/Os                                      | 1 input, 1 output                             |
| Opto-isolated I/Os                            | 1 input, 1 output                             |
| RS-232  | 1   |
| <b>Operating conditions/dimensions</b>        |   |
| Operating temperature                         | 0 °C to +50 °C ambient (without condensation) |
| Power requirements (DC)                       | 5 to 25 VDC                                   |
| Power consumption (@12 V)                     | 3 W   |
| Mass  | 100 g   |
| Body dimensions (L × W × H in mm)             | 59 × 46 × 33 (including connectors)           |
| Regulations                                   | CE, RoHS, REACH, WEEE, FCC, ICES              |



## Features

### Image optimization features:

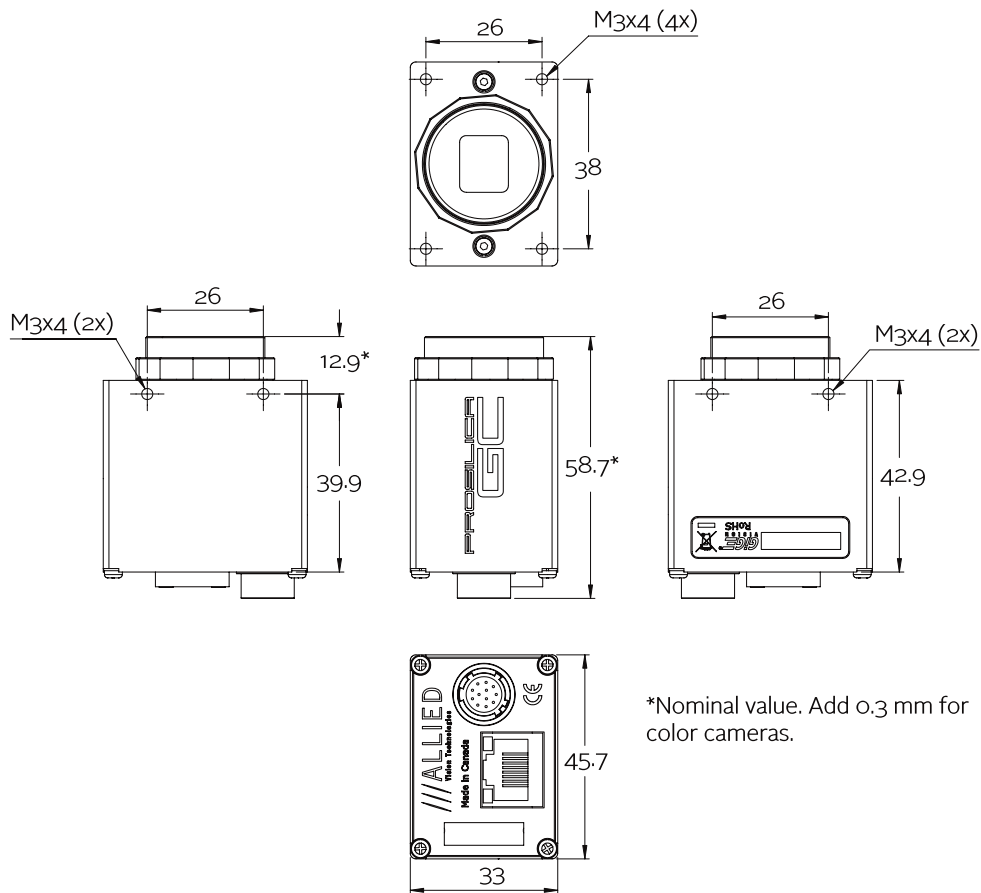
- Auto gain (manual gain control: 0 to 22 dB)
- Auto exposure (manual exposure control: 8 #s to 116.8 s @ 1 #s increments)
- Auto white balance
- Binning (horizontal and vertical)
- Region of interest (ROI), DSP subregion (selectable ROI for auto features)



**Camera control features:**

- Auto-iris (video type)
- Event channel
- Global shutter (digital shutter)
- IEEE 1588 Precision Time Protocol
- Image chunk data
- Recorder and Multiframe acquisition modes
- RS232
- Storable user sets (5)
- StreamBytesPerSecond (easy bandwidth control)
- Stream hold
- Sync out modes: Trigger ready, input, exposing, readout, imaging, strobe, GPO

## Technical drawing





## Applications

**Prosilica#GC655/GC655C is ideal for a wide range of applications including:**

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