



## Genie HM640

Area Scan Monochrome Cameras



Genie HM640

### Overview

## Extreme high speed acquisition with uncompromised image quality.

The Genie HM640 offers unprecedented high speed image acquisition with uncompromised signal-to-noise ratio, significantly optimizing the opportunity for increased yield. DALSA's proprietary sensor technology allows for image capture rates of 295 fps in VGA resolution while maintaining exceptional image quality. The Genie HM640's gigabit Ethernet interface takes full advantage of this Genie's high frame rate by transmitting data over standard CAT-5e and CAT-6 cables to distances of up to 100 m. Like all Genies, the HM640 is based on the AIA (Automated Imaging Association) GigE Vision Standard to directly link the camera to a PC.



### Key Features

- Uses standard PC and server Ethernet ports & hardware
- Facilitates cable lengths up to 100 m (CAT-5e or CAT-6)
- Simplified set-up with field proven Sapera Essential software featuring CamExpert
- Engineered to accommodate industrial environment with a Ruggedize, screw mount, RJ-45 connector
- Small compact form factor

### Programmability

- Achieve 295 fps in full resolution
- Higher frame rates achievable in partial scan mode
- Global electronic shutter with exposure control
- Programmable LUT
- On-board flat-field correction
- 1000x antiblooming

### Typical Applications

- Electronics manufacturing inspection
- Industrial metrology
- Intelligent traffic systems

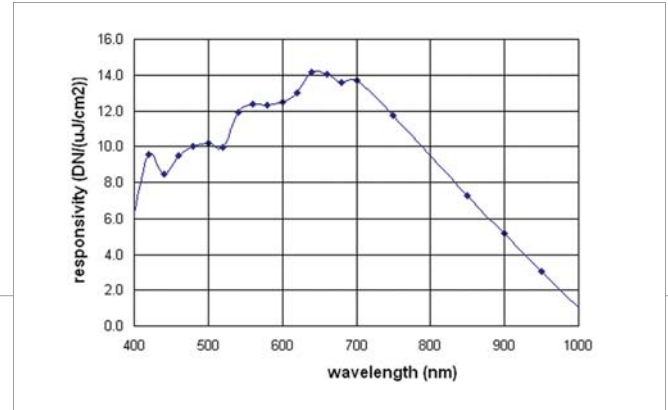
### Specifications

Active Resolution	640 x 480
Frame Rate	300 fps
Pixel Size	7.4 $\mu$ m
Data Format	8-bits
Exposure Control	Programmable, or via External Trigger
Dynamic Range	48 dB
Nominal Gain Range	0 dB to +12 dB
Output	Gigabit Ethernet, also supports 100 Mbps
I/O Ports	2 opto-isolated input, 2 opto-isolated output
Lens Mount	C or CS-mount
Size	44 mm x 29 mm x 67 mm (including lens adapter)
Mass	~115 g (without lens)
Operating Temp	0°-45°C
Power Supply	12 V
Power Dissipation	4W
Data Connector	Standard or Screw mount RJ-45
Power and I/O	Hirose 12-Pin
Software Platform	DALSA Sapera LT
GigE Vision Compliant	Yes
Regulatory Compliance	FCC Class A, CE, RoHs 2002/95/EC
Part Number	CR-GEN0-H640x

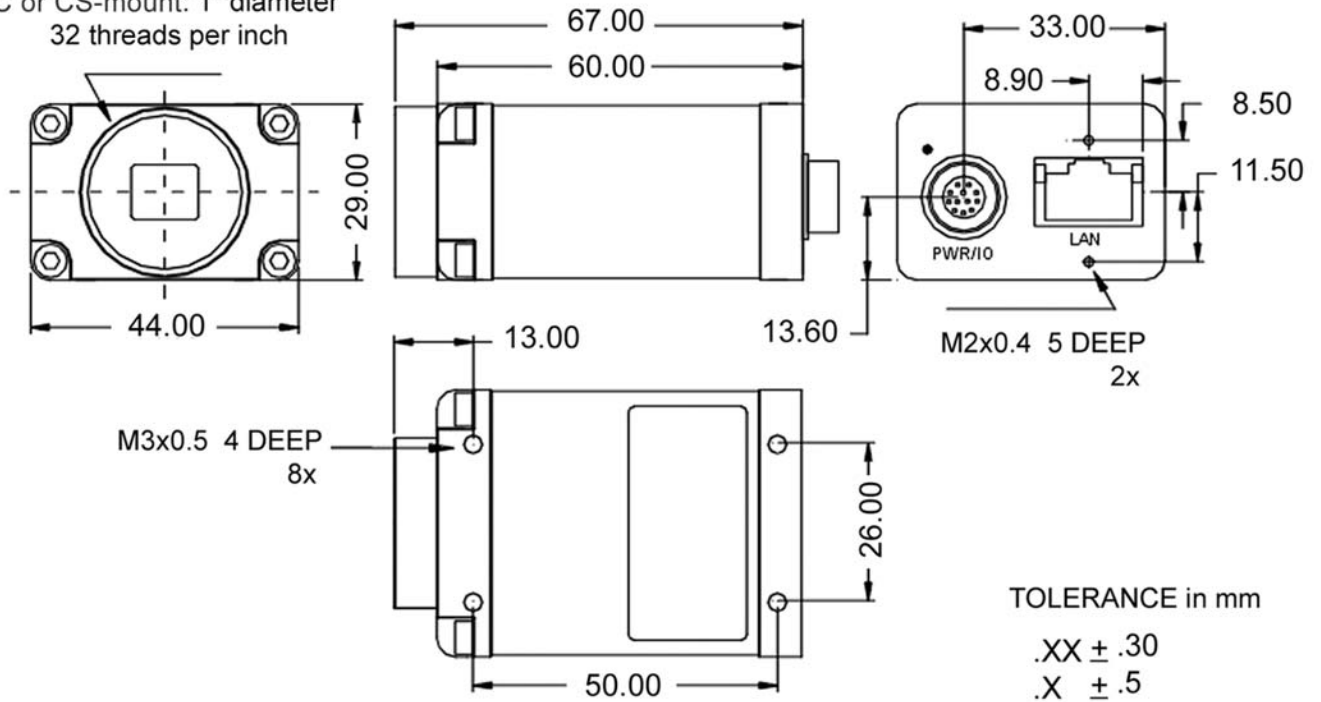
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All Genie cameras feature value added functionality designed specifically for imaging and machine vision applications. All features are easily accessible with DALSA's advanced software tools. These tools deliver superior image capture, performance, and control.



C or CS-mount: 1" diameter  
32 threads per inch



[www.dalsa.com](http://www.dalsa.com)

### Americas

Boston, USA  
Tel: +1 978-670-2000  
sales.americas@dalsa.com

### Europe

Munich, Germany  
Tel: +49 8142-46770  
sales.europe@dalsa.com

### Asia Pacific

Tokyo, Japan  
+81 3-5960-6353  
sales.asia@dalsa.com

DALSA is an international leader in digital imaging and semiconductors and has its corporate offices in Waterloo, Ontario, Canada.

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