Small – easy – ingenious: Analog goes Guppy.



Description

The AVT Guppy camera family is distinguished by an IEEE 1394 interface and an extremely compact design. It consists of twelve different camera variants (each available in b/w and color) and, with a wide variety of sensors and bandwidths, offers the right solution for nearly any conceivable application.

A selection of high-quality, sensitive sensors (CCD, CMOS) help the Guppy provide outstanding image quality and true color.

Two additional interlaced versions (EIA, CCIR) make it even more attractive to switch from analog to digital image processing.

Due to its modularity and the remarkable price/performance ratio, for many applications the Guppy is the ideal way to make the move to digital image processing.

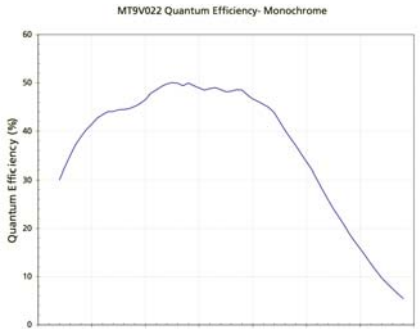
Highlights

- IEEE 1394a
- > Wide VGA (752 x 480)
- Up to 64 fps (full resolution)
- Progressive scan CMOS, monochrome and color
- True partial scan (higher frame rates by smaller AOI)
- Flexible AOI, flexible speed (full Format_7 support)
- Asynchronous image trigger
- Image pre-processing features:
  - Auto controlled gain, auto white balance
  - Natural color response
  - Programmable LUT
  - HDR mode
  - Binning (b/w only)
  - And lots more ...
- Smart frame grabber features:
  - Single-shot, multi-shot, free run
  - 1 prog. input / 3 prog. outputs
  - On-board RS232 port
  - And lots more ...
- Industry proven and robust housing
- C-Mount / CS-Mount (convertible via adapter
- Optional OEM board level version, customized housings

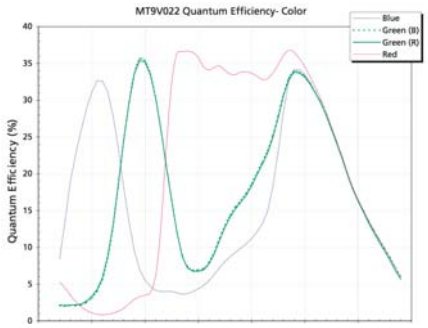
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Sensor specification b/w

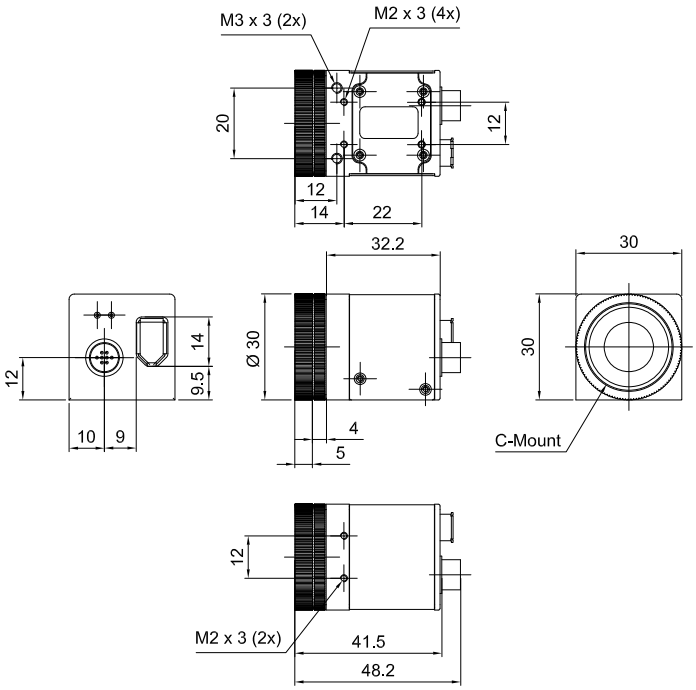


Sensor specification color



The sensor specifications (excluding lens and filter) are typical for this camera model.

Dimensions



Connections



Front view

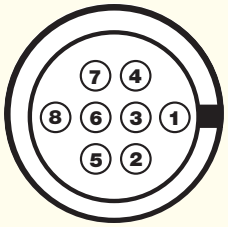


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Preview mode (by sub-sampling)	
AOI height / pixel	**Frame rate**
480	63.5
400	75
320	91
240	116
180	148
120	199
64	307

I/O Connector	
Pin	**Signal**
1	GP Output 1 (Default: IntEna)
2	GP Output 2 (Default: -)
3	GP Output 3 (Default: Busy)
4	GP Input1 (Default: Trigger)
5	RxD RS232
6	TxD RS232
7	External Power (+8 ... +36V DC)
8	External GND



Camera specifications	Guppy F-036B (b/w)	Guppy F-036 C (color)
Image device	Type 1/3 (diag. 5.35 mm) progressive scan, Micron / Aptina CMOS MT9V022	
Picture size	752 (H) x 480 (V) (all modes and color formats)	
Cell size	6 µm x 6 µm	
Resolution depth	8 bit (10 bit ADC)	
Lens mount	C-Mount, CS-Mount (convertible via adapter)	
Digital interface	IEEE 1394a (IIDC V1.3), single port	
Transfer rate	100 Mbit/s, 200 Mbit/s, 400 Mbit/s	
Frame rates	Up to 64 fps (full frames)	
Gain control	Manual 0 - 12 dB, auto gain)	
Shutter speed	179 µs ... 979 ms	
External trigger shutter	Programmable; programmable trigger delay	
Smart features	Only b/w: binning (average); b/w and color: AGC (auto gain control), mirror; LUT, 1 config. input, 3 config. outputs, RS-232 port (serial port, IIDC v. 1.31); only color: AWB (auto white balance)	
Power requirements	DC 8 V – 36 V via IEEE 1394 cable or 8-pin HIROSE	
Power consumption	Less than 2 watt (@ 12V DC)	
Dimensions	48.2 mm x 30 mm x 30 mm (L x W x H), w/o tripod and lens	
Mass	50 g (without lens)	
Operating temperature	+5... + 45° Celsius without condensation	
Storage temperature	-10... + 60° Celsius without condensation	
Regulations	CE, FCC Class B, RoHS (2002/95/EC)	
Options	Board level version, power out (HIROSE), AVT FirePackage / Active FirePackage / Fire4Linux	

Design and specifications of the described product(s) are subject to change without notice.
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