



## Description

### **5 Megapixel premium camera with numerous image pre-processing functions**

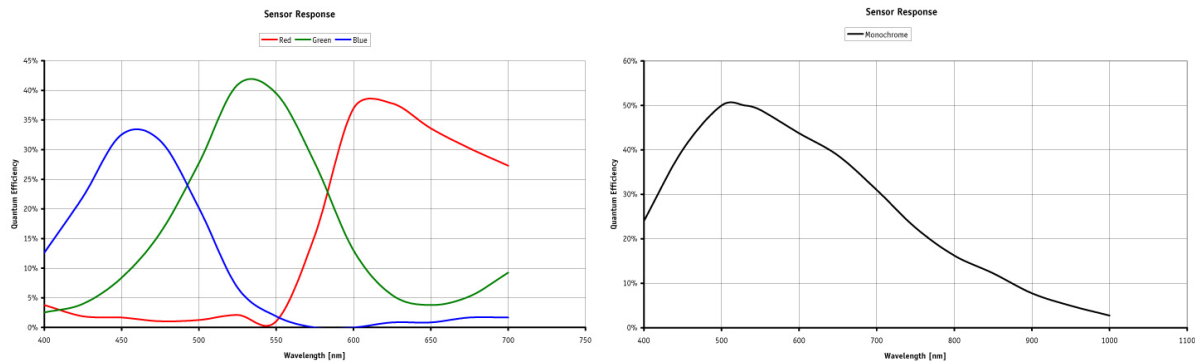
The Pike F-505B/C is equipped with a renowned Sony Super HAD CCD sensor and has an excellent image quality. At full resolution, it runs up to 15 fps. Higher frame rates can be reached by a smaller AOI, binning (b/w), or sub-sampling.

- Sony ICX625
- Two configurable inputs, four configurable outputs
- RS-232 port (serial port, IIDC V1.31)
- Trigger
  - Programmable, trigger level control, single trigger, bulk trigger, programmable trigger delay
- Options
  - 1394b connectors: daisy chain copper or copper and GOF
  - Various IR cut/pass filters
  - F/M39-Mount
  - Hirose power: out
  - Angled head
  - White medical housing

## Specifications

Pike	F-505
<b>Interface</b>	IEEE 1394b - 800 Mb/s, 2 ports, daisy chain, fiber optic (GOF) optional
<b>Resolution</b>	2452 x 2054
<b>Sensor</b>	Sony ICX625
<b>Type</b>	CCD Progressive
<b>Sensor Size</b>	Type 2/3
<b>Cell size</b>	3.45 $\mu$ m
<b>Lens mount</b>	C
<b>Max frame rate at full resolution</b>	15 fps
<b>A/D</b>	14 bit
<b>On-board FIFO</b>	64 MB
<b>Output</b>	
<b>Bit depth</b>	8-14 bit
<b>Mono modes</b>	Mono8, Mono12, Mono16
<b>Color modes YUV</b>	YUV411, YUV422
<b>Color modes RGB</b>	RGB8
<b>Raw modes</b>	Raw8, Raw12, Raw16
<b>General purpose inputs/outputs (GPIOs)</b>	
<b>TTL I/Os</b>	0
<b>Opto-coupled I/Os</b>	2 inputs, 4 outputs
<b>RS-232</b>	1
<b>Power/Mass/Dimensions/Regulations</b>	
<b>Power requirements (DC)</b>	8 V - 36 V
<b>Power consumption (12 V)</b>	4 W
<b>Mass</b>	250 g
<b>Body Dimensions (L x W x H in mm)</b>	96.8 x 44 x 44 mm including connectors, w/o tripod and lens
<b>Regulations</b>	CE, FCC Class B, RoHS

[Pike technical drawing \(C-Mount\)](#)



## Smart features

- Programmable LUT, white balance, hue, saturation
- Debayering
- Gain
  - Auto/manual
  - Manual gain control: 0 - 24 dB
- Exposure
  - Auto/manual
  - Exposure time: 27  $\mu$ s - 67 s
- Color correction
- Shading correction
- High SNR mode (up to 24 dB better signal-to-noise ratio)
- Smear reduction
- Sub-sampling, 2x - 8x binning (b/w)
- Separate AOI for auto features
- Sequence mode (changes the image settings on the fly)
- Image mirror
- Deferred image transport
- SIS (secure image signature, time stamp for trigger, frame count etc.)
- Storable user settings

## Applications

The Pike F-505B/C is perfectly suited for very demanding applications. The brilliant image quality can be enhanced by its image pre-processing functions. Due to the modular design, customization is easy and cost-effective. This camera fits especially for:

- Science and research
- Microscopy
- Healthcare and medical applications (white housing available)
- Multimedia, entertainment and sports
- Very demanding OEM camera applications
- Long cables - 400 meters and more without additional repeaters (fiber version)