

VIDEOLOGY®

IMAGING SOLUTIONS INC.
Original Equipment Manufacturer

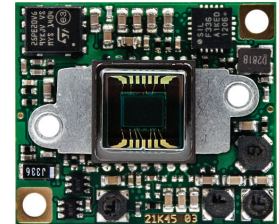
1/4" CCD High Resolution B&W Board Camera With 8-Bit DIGITAL Output

20K35XDIG/21K35XDIG

Preliminary

Product Features

- 22mm x 26mm mini-board is compatible with previous 20/21K13XDIG family products
- Delivers 8-Bit DIGITAL YUV
- I²C control
- Lens mounts: metal CS, M12 board or pinhole



Software controllable features & functions

- Mirror/flip mode option
- BLC
- Edge Enhancement
- Dynamic Noise Reduction
- Digital Pan/Tilt/Zoom (option)
- Sharpness
- Blemish Correction
- HLC control
- Sens-up

Technical Specifications

	20K35XDIG EIA	21K35XDIG CCIR
Electrical		
Image Sensor	1/4" Sony® Ex-View® CCD	
Active Pixels (HxV)	768 x 492	752 x 582
Resolution	>600 TVL	
Frame Rate (max)	30fps	25fps
Sensitivity	< 0.005 lux, near IR sensitive	
Signal to Noise Ratio	>50 dB (AGC off) digital output	
Gamma	0.45 default (1.0 via Software)	
Gain Control	Automatic (AGC default)/ Fixed (via software)	
Scan Mode	Interlaced	
Mirror/Flip Mode	Selectable via software (H & V direction)	
Synchronization	Internal	
Back Light Compensation	Default off (selectable via software)	
Contour Enhancement	Default on	
Iris Control	CCD Iris default	
Shutter speeds	Automatic	1/60 to 1/100,000
	Fixed	14 speeds via software
Video Outputs	8-bit digital YUV 4:2:2 @ CCIR656, CMOS output, 3.3V level 16-bit digital output CCIR601, CMOS Output, 3.3V Level	
Control Communication	I ² C control	
Power supply	5VDC +/- 5% (not polarity protected)	
Power consumption	< 1.2W	

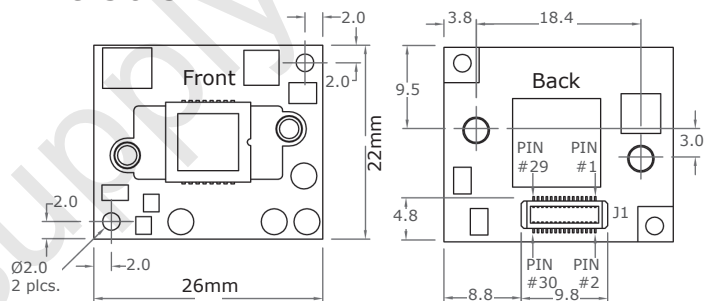
Environmental

Operating Temperature	-15°C ~ 55°C (5°F ~ 131°F)
Operating Humidity	20 up to 93%RH
Storage Temperature	-25°C ~ 70°C (-13°F ~ 158°F)
Storage Humidity	Up to 98%RH
Lifetime MTBF	> 150,000 hrs
Packaging	ESD safe package

Mechanical

Dimensions W x H x D	26mm x 22mm x 10.7mm without lens (1" x 0.87" x 0.42")
Lens Mounts	Replace "X" in model number with desired lens:
Change 20K35XDIG to 20K355DIG to select an M-12 board mount	2 = Metal M-12 Pinhole
	5 = Metal M-12 Board
	8 = Metal CS Board
Connectors (J1)	Power/video/digital, all in a 30 pole board to board connector
	MOLEX-501920-3001 Board to Board connector (J1)
	MOLEX-52991-0308 Mating part, must be used on the application side

Dimensions



J1 Connector

01 GROUND	11 YUV4 CCIR656	21 Iris out
02 GROUND	12 Not connected	22 GROUND
03 YUV0 CCIR656	13 YUV5 CCIR656	23 HREF
04 Not connected	14 Not connected	24 VREF
05 YUV1 CCIR656	15 YUV6 CCIR656	25 Not connected
06 Not connected	16 Not connected	26 Not connected
07 YUV2 CCIR656	17 YUV7 CCIR656	27 I2C data
08 Not connected	18 Not connected	28 I2C clock
09 YUV3 CCIR656	19 Data Clock	29 CVBS analog out
10 Not connected	20 Not connected	30 +5V power supply in

I²C Communication Kit (Optional)

60D5	I ² C board, program cable, DB25 serial cable, camera control software
60D5-U (USB version)	I ² C board, program cable, USB cable, camera control software

Complementary Models

X = Lens Mount Option (Refer to Mechanical)	20/21K45X	Color Sony IL, composite video output
	20/21K45XYC	Color Sony IL, S-Video (Y/C) video output
	20/21K45XDIG	Color Sony IL, Digital YUV video output
	20/21K45XUSB	Color Sony IL, USB 2.0 (dual board)
	20/21K35X	B&W Sony Ex-view®, composite video output
	20/21K35XUSB	B&W Sony Ex-view®, USB 2.0 (dual board)

07/24/13 PDS-20K35XDIG Rev B

Videology® Imaging Solutions, Inc.

37M Lark Industrial Parkway
Greenville, Rhode Island 02828 USA
Tel: (401) 949 - 5332 Fax: (401) 949 - 5276
Americas, Middle East, Far East & Australia sales: sales@videologyinc.com
SGS www.videologyinc.com

All data subject to change without notice.

Videology® Imaging Solutions, Europe B.V.

Neutronenlaan 4
Tel: +31

For design help, accessories or pricing, please contact:
sales@avsupply.com or call: 1-858-565-1101



1-800-284-2288 sales@avsupply.com
www.avsupply.com

Distributed By: Audio Video Supply -- Tel: 1-800-284-2288 -- www.avsupply.com