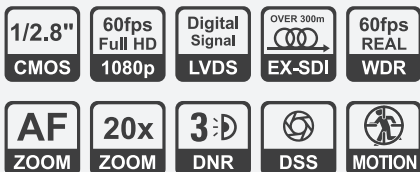


MC-209B

1080p 60fps 20x Zoom Module

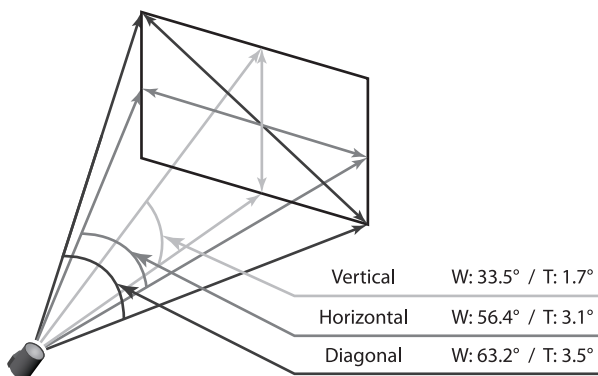
EX-SDI CVBS



Features

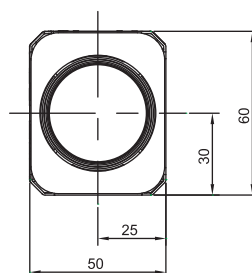
- 1/2.8" 2MP Sony Starvis CMOS sensor
- 1080p 60fps/30fps, 1080i 60fps, 720p 60fps/30fps
- 20x Optical Zoom(5.2mm ~ 104mm)
& 32x Digital Zoom
- Day & Night(ICR)
- Real-time True WDR
- Digital Noise Reduction(2D+3D)
- Digital Image Stabilization
- Privacy Mask Function
- High Light Compensation
- Intelligent Motion Detection
- Defog Function
- Supports VISCA, Pelco-D/P Protocol
- Video Out : EX-SDI, CVBS

Field of View

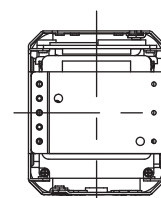


Dimensions

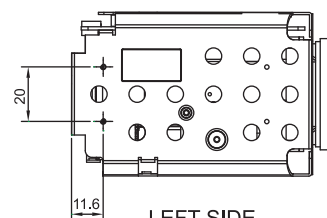
Unit : mm



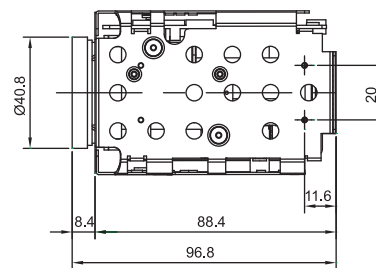
FRONT



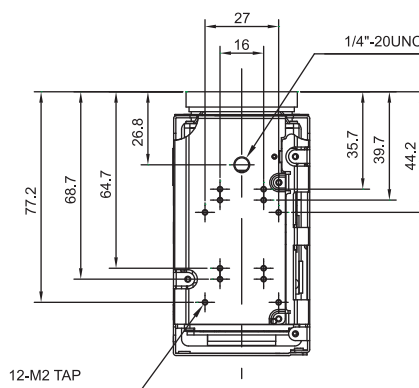
BACK



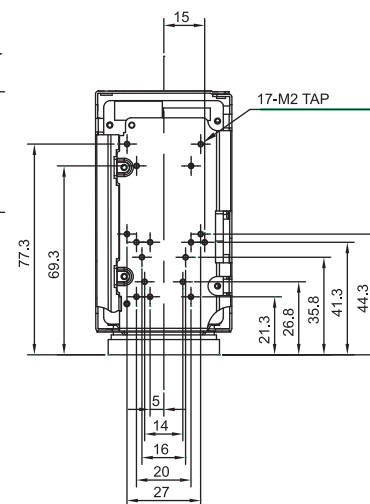
LEFT SIDE



RIGHT SIDE



BOTTOM



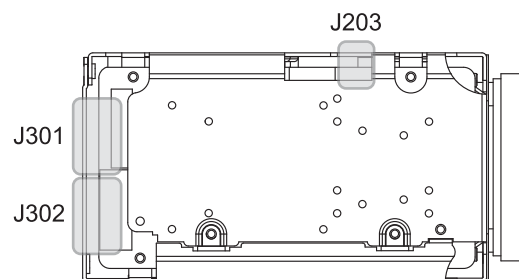
TOP

Specifications

MC-209B				
Image Sensor	1/2.8" Sony Starvis CMOS Sensor			
Total Pixels	1,945 (H) x 1,109 (V) = 2.16M pixels			
Active Pixels	1,937,(H) x 1,097 (V) = 2.12M pixels			
Scanning System	Progressive Scan			
Sync. System	Internal			
Resolution	Digital : 1080p/60(50)fps, 1080i60(50)fps,1080p/30(25)fps, 720p/60(50)fps, 720p/30(25)fps Analog : 700TVL			
Min. Illumination	Color(1/30s, 78dB) : 0.01 lux , BW(1/30s, 78dB) : 0.001lux Color DSS(1/1s, 78dB) : 0.001 lux , BW DSS(1/1s, 78dB) : 0.0001 lux			
Video Output	HD : EX-SDI Analog : VBS(except WDR mode)			
S/N Ratio	more than 50dB(AGC off)			
Lens Type	20x Day & Night Zoom Lens			
Zoom Ratio	Optical 20x, Digital 32x Zoom			
Focal Length	f = 5.2 mm ~ 104 mm			
Aperture Ratio	F1.5 (wide) ~ F3.5 (tele)			
Angle Of View(D, H, V)	Wide	63.2°	56.4°	33.5°
	Tele	3.5°	3.1°	1.7°
AF Mode	Auto / One Push / Manual			
Min. Distance	0.5 / 1.5 / 3.0 / 5.0 / 10.0 m			
Lens Refresh	One Push / 1 ~ 10Day			
Digital Zoom	Off / MAX 2x ~ 32x			
Exposure	Auto / Iris.P / Shut.P / Manual			
Gain Control(AGC)	Off / On			
Shutter Speed	1/30(25) ~ 1/60,000 sec			
Iris	0 ~ 20 steps			
Digital Slow Shutter(DSS)	Off / 2x / 4x / 8x / 16x / 32x (/64x : 60 or 50 fps mode only)			
Brightness	0 ~ 20 steps			
WDR/BLC	Off / WDR / BLC			
Day&Night	Auto / Day / Night / Ext-in			
White Balance	Auto / One Push / Manual / Indoor / Outdoor / Auto-Ext			
HLC	Off / On / Night Only			
DNR	Auto / Off / Low / Middle / High			
Mirror	Off / H / V / H&V			
Sharpness	0 ~ 10 steps			
ACE	Off / Low / Middle / High			
Defog	Off / On(Auto / Manual)			
Privacy Mask	Max. 24 Areas			
Motion Detection	Max. 3 Areas			
Defect Detection	Off / On			
System	NTSC / PAL			
Communication	Baud Rate : 2400 / 4800 / 9600 / 19200 / 38400 / 57600 / 115200 Protocol : VISCA / Pelco-D / Pelco- P / Update			
Language	English / Simplified Chinese / Traditional Chinese / Japanese			
Power Source	9V to 15V DC			
Power Consumption	500mA			
Power Input	Connector			
Video Output	Connector			
Storage Temperature	-20℃ ~ +60℃ (Humidity : 0%RH ~ 90%RH)			
Operating Temperature	-10℃ ~ +50℃ (Humidity : 0%RH ~ 90%RH)			
Dimensions	50(W) x 60(H) x 97(D)			
Weight	232g			

* Design and specifications are subject to change without notice.

Pin Assignment



J301		J302	
1	NC	1	RxD
2	GND	2	TxD
3	VBS-OUT	3	GND
4	GND	4	DC+12V IN
5	NC	5	GND
6		6	VBS-OUT
7		7	GND
8		8	NC
9		9	GND
10		Ref 10019HR-09(YEONHO)	
11		J203	
12		-	EX-SDI
13		Ref MMCX-R/A	
14			
15			
16	DC+5V OUT		
17	GND		
18	GND		
19	DC+12V IN		
20	DC+12V IN		
21	DC+12V IN		
22	GND		
23	GPIO2		
24	GPIO1		
25	ADKEY(OSD Control)		
26	D/N-IN		
27	IR-ON		
28	MD-OUT		
29	RS-485(-)		
30	RS-485(+)		

Ref USL00-30L-C(KEL Cop.)