

PTZ series | Outdoor Vandal PTZ Camera

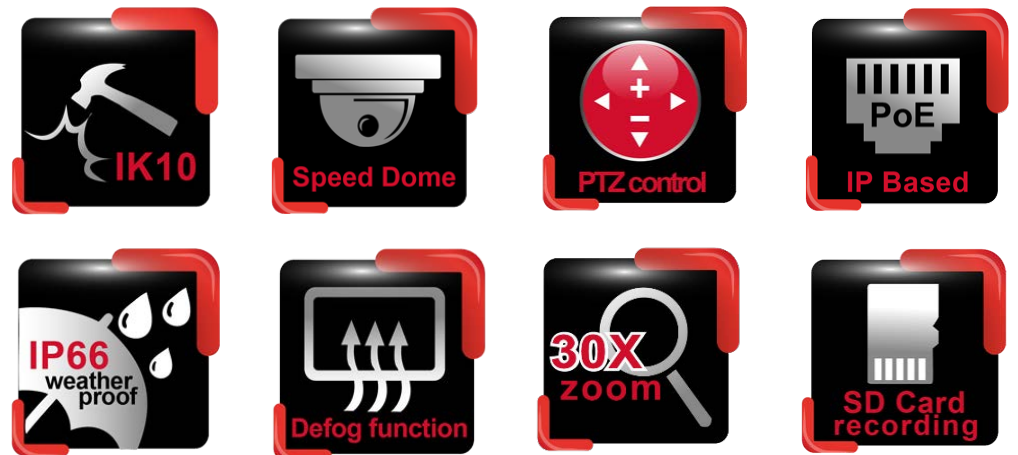
IPS4304E/4308E

30X Day & Night 2MP Outdoor Vandal PTZ Camera

www.meritlilin.com



The IPS4304E / IPS4308E is 1080P HD IP PTZ Dome camera. The high-speed dome is capable of streaming HD video at up to 30 FPS. Featuring Wide Dynamic Range (WDR) feature, the IPS4304E / IPS4308E captures highlights and shadows simultaneously, eliminating pixilation and smear. Combine this with 3D Noise Reduction technology and adaptive tone reproduction and the contrast of images in bright or dark areas is dramatically improved. Capable of making 360° continuous rotations, users can accurately position the camera to identify specific targets. The 30x optical zoom gives the IPS4304E / IPS4308E an impressive range. With a focal length of 4.4mm-132mm, an IP66 weatherproof rating and a compact design, the IPS4304E / IPS4308E is ideal for numerous applications.

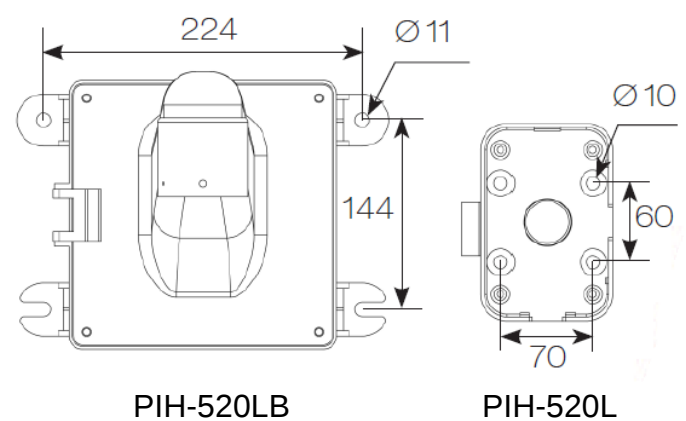


- ▶ Outdoor Vandal PTZ camera
- ▶ 30X optical zoom
- ▶ IP66 rain and dust resistant
- ▶ IR cut filter for day/night operations
- ▶ 1080p HD resolution
- ▶ Wide Dynamic Range
- ▶ IK10 impact resistant

Dimensions: Ø 210 x 332mm



Diagram of mounting holes (unit in mm):



Mounting Options	
Wall Mount	BTS03G
	PIH-520LB
Wall Mount	
	PIH-520L
Swan Neck	
	PIH-520G
Pendant Mount	
	PIH-520HB
Pendant Mount	
	BTS06W
Pendant Mount	

PTZ Control Function

Pan-Tilt-Zoom (PTZ) cameras are able to perform remote directional and zoom control. Capable of making 360° continuous rotations and 120° tilt angle, the cameras field of view can be quickly zoomed and repositioned as needed to identify specific targets



Video Security App

Available on Android and iOS – **LILINViewer** app provides security alarm push notification, real-time live viewing, and remote video playback



SD Cards in Sync with NAV Software

IPS4304E / 4308E camera with built-in Micro SD/SDHC card slots can provide redundant video viewing and recording. You can synchronise an SD card with LILIN VMS (Video Management Software) – Navigator (NAV)



Wind and Rain Standards

Meet international IP66 standards for dust and moisture resistant allowing you to install cameras in environments subject to wind and rain



ONVIF-compliant

Open Network Video Interface Forum (ONVIF) is a standard for physical IP based security products. IPS4304E / 4308E PTZ camera is ONVIF Profile S conformant



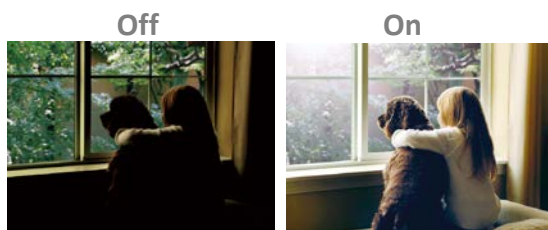
Alarm Detection

Alarm Detection is designed to provide the electronic detection of intruders



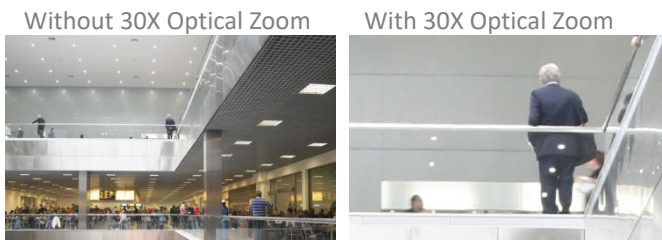
Back Light Compensation

Back Light Compensation (BLC) adjusts the exposure of the entire image to properly expose the subject in the foreground. No matter if the main object is moving toward left, right, upper, lower, or any location in the screen, BLC provides perfect exposure for an object in front of strong back light



30X Optical Zoom

Remote pan/tilt/zoom operations with 30X optical lens makes it possible to zoom in on distant object with absolute clarity



Day and Night Operations via Removal of the IR-cut filter

IPS4304E / 4308E camera was designed using a mechanical IR cut filter for increased IR sensitivity resulting in improved night time images. The removable IR-cut filter allows day and night operations even in the low lux condition providing outstanding vision



Motion Detection

Detect motion and capture the event. Motion in the selected area will provoke an alert



Two-way Audio Support

With 2-way audio communication, you can project your voice through the camera's speaker instead of hearing what's going on (1-way audio)



Wide Dynamic Range (WDR)

Wide Dynamic Range (WDR) displays details of both the brightest and darkest areas. WDR can extend image visibility under high contrast lighting scenes and improve image quality



Noise Reduction

Remove noise from a signal. Suppressing noise in an image in low light conditions and able to retain quality videos at the same time



IK10 Impact Resistant

IK10-certified housing designed to protect the camera from destructive behavior



Technical Specifications

IPS4304E / 4308E

30X Day & Night 2MP Outdoor Vandal PTZ Camera

Video performance		
Model#	IPS4304E	IPS4308E
Low Light Mode (Colour)	0.4 lux (1/30 sec, F1.4(Wide), 50 IRE, AGC-Gain:45dB ICR-OFF) 0.1 lux (1/8 sec, F1.4(Wide), 50 IRE, AGC-Gain:45dB ICR-OFF) 0.01 lux (1/8 sec, F1.4(Wide), 50 IRE, AGC-Gain:45dB ICR-ON)	
WDR	Yes	

Power	
Power consumption	37W (with heater) / PoE+ 14W
PoE+	High power PoE
Power supply	AC24V Power over Ethernet+

Sensor	
Sensor type	1/3 Type CMOS Sensor
Effective pixels	1944 (H) × 1092 (V) = 2,122,848 (pixels)
Total number of pixels	1956 (H) × 1266 (V) = 2,476,296 (pixels)

Certifications	
CE	Yes, EMICLASSA
FCC	Yes, EMICLASSA
IP Rating	IP66 waterproof
Vandal resistant rating	IK10 impact resistant

Lens	
Zoom ratio	30X optical zoom
Focal length	4.4mm (WIDE) - 132mm (TELE)
Minimum aperture ratio	1:1.4 (WIDE)-4.6 (TELE)
Minimum object distance	10mm (WIDE end), 1.5m (TELE end)
Iris range	F1.4 - 32, close
Angle field of view	Approx. 63.4° (H) 38.51° (V) (WIDE end), approx. 2.3° (H) 1.33° (V) (TELE end), (1080p mode)

Pan & Tilt	
Panning range	360° Endless
Panning mode	Manual, Auto, Manual Position, Sequential Position
Panning speed	Manual Approx. 0.1°/s - 120°/s 8 Steps, 16 Steps / Preset Approx. 1°/s - 255°/s, Alarm Trigger Speed 360°/s
Tilting range	-6° - +96°
Tilting mode	Manual, Auto, Manual Position, Sequential Position
Tilting speed	Manual approx. 0.15°/s-120°/s 8 Steps, 16 Steps / Preset approx. 1°/s-255°/s, Alarm Trigger Speed 360°/s

Environmental	
Ambient operating temperature	-10°C-+ 50°C (14°F-122°F) / PoE+ - 40°C-+ 50°C (-40°F-122°F) / AC
Operating humidity	0%-90%

PC requirement	
CPU	Intel Pentium 4 1.8GHz or above
OS	Windows 2000, Windows XP, Windows Vista, Windows 7, Windows 8
RAM	1GB or above, Independent Display Card
Web browser	Microsoft® Internet Explorer® 6.0 and later

Mechanical	
Dimensions (H x D)	332mm x 210mm
Weight	3200g approx.

Heater & Fan	
Heater activation	On: 15°C, Off: 25°C
Fan activation	On: 35°C, Off: 25°C

Input / output	
Alarm input / output	6 Input (TTL 5Vdc), 2 Output (0.5A 120Vac,1A 24Vac)
Video output	CVBS 1.0 Vp-p / 75 Ω BNC

Video streaming	
Video compression	H.264, Motion JPEG
Streaming	RTP/HTTP, RTP/TCP, RTP/UDP, Multicast
Bitrate	128 Kbps to 5 Mbps Frame rate and bitrate controllable on-the-fly VBR / CBR / GOP supported

Video resolution (H x V)		
1080p HD		1920 x 1080
720p HD		1280 x 720
D1		720 x 480
CIF		352 x 240
Multiple profile	Profile #1	H.264: up to 30fps @ 1920 x 1080, MJPEG: up to 30fps @ 720 x 480
	Profile #2	H.264: up to 30fps @ 1280 x 720, MJPEG: up to 30fps @ 352 x 240
	Profile #3	H.264: up to 30fps @ 1920 x 1080, MJPEG: up to 30fps @ 1280 x 720
	Profile #4	H.264: up to 30fps @ 720 x 480, MJPEG: up to 15fps @ 1920 x 1080
Frame rate		H.264: up to 30fps at SXG (1280 x 1024)
		Motion JPEG: up to 30fps at D1 (720 x 480)

Video functions	
Day/Night (IR-cut filter)	Colour (Day), Monochrome (Night), Auto
Scanning system	Progressive scan
White balance	ATW / Manual (1800K-10500K)
Electric shutter speed	Auto / manual (1/1 to 1/30,000)
Adjustable settings	Sharpness
Exposure mode	Auto / Manual
Back light compensation	Off / BLC / WDR
Digital noise reduction	Off / On (2D, 3D)
Dynamic privacy zone mask	Off / On (up to 16 areas)
Auto mode	Off / AUTO / SEQ / TOUR / PATROL
Web PTZ control	Pan, tilt, zoom-in / zoom-out, absolute position, and video-click-n-move
Schedule setting	OFF / AUTO / SEQ / TOUR / PATROL / Preset Position
Electronic Image stabilization	OFF / ON (Digital Zoom max 2.0x)
Auto gain control	0 - 45dB
Defog	OFF / ON (Defog-1, Defog-2, Defog-3, AUTO)
Digital effect	OFF / Mirror / Flip
D/N quality setting	Yes

Integration	
Mobile application	Integrated to LILIN mobile app (LILINViewer) iPhone, iPad, Android support
Video management	ONVIF Profile S LILIN CMX3.6 / NAV 1.0 Third party VMS through LILIN HTTP API
SD card recording	Support Micro SD/SDHC/SDXC card for circular recording (card is not included)
Firmware	Firmware upgrade via HTTP Firmware available to download at meritlilin.com
Alarm event triggers	Image upload over FTP and E-mail by alarm / motion detection
Alarm event actions	FTP, SMTP, HTTP post, SD card, SAMBA
Alarm weighted mode	Support

Network	
Ethernet	10Mbps / 100Mbps, RJ-45
Connectivity	ONVIF Profile S
User accounts	8 simultaneous users
PTZ preset scheduling	Yes, via Web interface
OSD	Text overlay for date, time, and camera name
CPU, Memory	Embedded SoC ARM11, 528MHz, 256MB DDR2, 256MB flash memory
Video display	LILIN Universal ActiveX & LILIN Java Applet
OS	Embedded Linux 2.6.32
Audio	G.711 u-law
Protocols	IP, TCP, UDP, HTTP, SMTP, NTP, DDNS, UPnP, FTP, ARP, DHCP, PPPoE, DNS, RTSP, RTCP, Telnet, ICMP, IGMP, ONVIF Profile S, SNMP
Multi IP address	Yes

Network security	
Max number of online users	10 users accounts available
Access	Multiple user access levels with password protection
Encryption	Base 64 HTTP encryption
IP address filter	Yes
RTSP Authentication	On / Off

Main functions	
Control function	Pan and Tilt / Zoom and Focus / Iris and ICR / 128 Preset Position / Home Position
Digital zoom ratio	12X
Zoom speed	Slow / MID. / Fast Selectable [Fast: Approx. 5.0 Second (Tele to Wide) in Manual Mode]
Focus speed	Slow / MID. / Fast Selectable [Fast: Approx. 5.0 Second (Far to Near) in Manual Mode]
Focus	Auto / Manual
Iris	Auto / Manual
Sense up (slow shutter)	OFF / Auto
Enhanced intensity	Off / On / HLC