

FW-500-EL Series (< 0.001Lx) Ball Shaped PTZ Camera

Series	FW-500-EL-A Family			FW-500-EL-C Family		
PN	FW-500-EL-A1/2	FW-500-EL-A5/6	FW-500-EL-A7/8	FW-500-EL-C1/2	FW-500-EL-C5/6	FW-500-EL-C7/8
Visible light camera	Description					
Imaging device	1/1.8 inch line-by-line scan 200 mega-pixel CMOS imaging sensor			1/1.8 inch line-by-line scan 400 mega-pixel CMOS imaging sensor		
Zoom system	21~1100mm , 52 times Continuous enhancement zoom					
Maximum aperture	F3.9~close					
Min illumination	Colour pattern : 0.01Lux Black and white pattern : 0.001Lux					
Signal to noise ratio	>53dB					
Optical Fog Reduction	Yes					
Day&Night Switching Mode	Automatic infrared filter switch colour to black					
Encoding resolution/frame rate	Main stream : 1080P(1920×1080) , 25 FPS Secondary stream : D1(704×576) , 25 FPS			Main stream : 4MP(2688×1520) , 25 FPS Secondary stream : D1(704×576) , 25 FPS		
Back focus compensation	Manual/Automatic					
OSD	time OSD、 user-defined OSD					
Cover up	Yes					
Front-end Storage	Micro SD , max 128GB(Standard equipped 32GB)					
Protocol	TCP/IP, UDP, RTSP, RTP, RTCP, HTTP, PPPoE, DHCP,NTP, FTP					
Compatible Interface	ONVIF、 GB/T28181、 API、 SDK					
Detection distance	Vehicle : 8200m(4m×1.8m) Human : 2750m(1.8m×0.6m) Mist : 15000m(2m×2m)			Vehicle : 10800m(4m×1.8m) Human : 3600m(1.8m×0.6m) Mist : 15000m(2m×2m)		
Identify distance	Vehicle : 4100m(4m×1.8m) Human : 1370m(1.8m×0.6m) Mist : 15000m(2m×2m)			Vehicle : 5400m(4m×1.8m) Human : 1800m(1.8m×0.6m) Mist : 15000m(2m×2m)		
Thermal imaging Camera	Description					
Sensor Type	Uncooled VOx					
Pixel pitch	17μm					
Resolution	384×288 / 640×512					
Encoding resolution/frame rate	768X576@ 50 fps / 1280×1024@ 25 fps					
NETD)	< 30mK@300K					

Wave range	8~14μm					
Fixed-focal/Zoom system	Fixed-focal 75mm	20-150mm , 5 times Continuous enhancement zoom	30-210mm , 7times Continuous enhancement zoom	Fixed-focal 75mm	20-150mm , 5times Continuous enhancement zoom	30-210mm , 7times Continuous enhancement zoom
Aperture	F1.0	F1.2		F1.0	F1.2	
Detection distance	Vehicle : 4000 m(4m× 1.8m) Human : 1300 m(1.8m× 0.6m) Fire : 4400(2m ×2m)	Vehicle : 8000 m(4m× 1.8m) Human : 2600 m(1.8m× 0.6m) Fire : 8800(2m×2m)	Vehicle : 11200 m(4m× 1.8m) Human : 3640m (1.8m× 0.6m) Fire : 12320(2m ×2m)	Vehicle : 4000 m(4m× 1.8m) Human : 1300 m(1.8m× 0.6m) Fire : 4400(2m×2m)	Vehicle : 800 0m(4m× 1.8m) Human : 260 0m(1.8m× 0.6m) Fire : 8800(2 m×2m)	Vehicle : 11200 m(4m× 1.8m) Human : 3640 m(1.8m× 0.6m) Fire : 12320(2m×2m)
Identify distance	Vehicle : 2000 m(4m× 1.8m) Human : 600m (1.8m×0.6m) Fire : 4400m(2 m×2m)	Vehicle : 4000 m(4m× 1.8m) Human : 1300 m(1.8m× 0.6m) Fire : 8800(2 m×2m)	Vehicle : 5600m (4m× 1.8m) Human : 1820m (1.8m× 0.6m) Fire : 12320(2m ×2m)	Vehicle : 2000 m(4m× 1.8m) Human : 600 m(1.8m×0.6m) Fire : 4400m(2 m×2m)	Vehicle : 400 0m(4m× 1.8m) Human : 130 0m(1.8m× 0.6m) Fire : 8800(2 m×2m)	Vehicle : 5600 m(4m× 1.8m) Human : 1820 m(1.8m× 0.6m) Fire : 12320(2 m×2m)
Intelligence features	Description					
Intelligent identification engine	ARM+ DSP+GPU core algorithm engine The front-end AI recognition engine has good timeliness, the back-end power failure does not affect the front-end recognition, the recognition efficiency is higher, the response speed is faster, and the long-distance transmission takes up less bandwidth			5-core ARM+quad-core DSP@700MHz+dual-core NNIE@840MHz neural network acceleration engine Mali G71 MP2@900MHz GPU processing unit Yes Neon acceleration, integrated FPU processing unit The front-end AI recognition engine has good timeliness, the back-end power failure does not affect the front-end recognition, the recognition efficiency is higher, the response speed is faster, and the long-distance transmission takes up less bandwidth		
Mist/Fire Recognition Algorithm (Optional)	Using Visible light and infrared , image dual recognition, real-time cross-recognition of Mist/Fire can be performed all day, improving the accuracy and reliability of Mist/Fire recognition Neural network deep learning algorithm, low false positives of Fire, accurate identification The cruise cycle is less than 30 minutes, so that the false alarm rate of Fire is less than 1‰, and the false alarm rate is less than 3 times/day/10,000 hectares. Mist minimum recognition pixel is better than 10×10 pixels, Fire minimum recognition pixel is better than 2×2 pixels					
Smart surveillance algorithm (Optional)	Regional invasion surveillance: support 3D regional settings, up to 64 Cross-border surveillance: supports 3D area settings, up to 64 Enter area surveillance: support 3D area settings, up to 64 Surveillance of leaving area: Support 3D area setting, up to 64 Privacy masking: support 3D area settings, up to 64					
Structural performance	Description					
Horz Range	360°Continuous rotation					

Horz speed	0.005°~90°/s ; Presetting bit speed : 90°/s	
Vertical Range	-90°~90°	
Vertical Speed	0.005°~90°/s ; Presetting bit speed : 90°/s	
Presetting bit	2048	
Location accuracy	0.0038°	
Cruise Scan	Strip Cruise、Presetting bit Cruise、Track Cruise	
Monitor position	Yes	
3D Location	Yes	
Non-volatile memory	Yes	
Automatic calibration	Yes , Automatic calibration of geographic coordinates and due north positions	
Interface	Description	
Alarm input/output	2 in/8 out	
Alarm linkage	Yes	
Audio input/output	1 in/1 out	
Network Interface	10M/100M Adaptive Ethernet port	
Power Supply	Amphenol connector	
General features	Description	
Power Supply	DC 48V±20% , Overall max power consumption 120W(max heating 40W) (Default without DC48V Power Adapter , to be purchased separately)	
	Φ380mm×650mm	Φ490mm×800mm
Weight	75kg	
Working environment	-40°C~60°C , ≤93%RH , Non-condensing	
Heater	Intelligent temperature control	
IP Rate	IP67	