

AXIS P3818-PVE Panoramic Camera

Seamless, 180° coverage with no blind spots

AXIS P3818-PVE delivers a 180° panoramic overview of extensive areas with ultra-high resolution images and incredible details up to 30 fps. With 13 MP resolution and seamless stitching of all three images, it offers 180° horizontal and 90° vertical coverage with no blind spots. Including a variety of mounting options, it's also possible to mount two cameras back-to-back for a complete 360° overview, using AXIS T94V01C Dual Camera Mount. Featuring edge-to-edge technology, it's easy to add support for audio enabling you to listen in to transactions or incidents. Additionally, built-in cybersecurity features prevent unauthorized access and safeguard your system.

- > **13 MP multisensor camera with one IP address**
- > **180° horizontal, 90° vertical coverage**
- > **Seamlessly stitched images**
- > **Support for audio input**
- > **Built-in cybersecurity features**



AXIS P3818-PVE Panoramic Camera

Camera	
Image sensor	3 x 5 MP 1/2.8" progressive scan RGB CMOS
Lens	Fixed 3.2 mm, F2.0 Horizontal field of view: 180° Vertical field of view: 90°
Day and night	Automatically removable infrared-cut filter
Minimum illumination	With Forensic WDR and Lightfinder: Color: 0.16 lux, F2.0 B/W: 0.05 lux, F2.0
Shutter speed	1/91000 to 1/25 s With WDR: 1/50000 to 1/25 s
Camera adjustment	Pan +/- 180° Tilt 0° to 50° Roll +/- 5°

System on chip (SoC)	
Model	ARTPEC-7 (x2)
Memory	2048 MB RAM (x2), 512 MB Flash

Video	
Video compression	H.264 (MPEG-4 Part 10/AVC) Baseline, Main and High Profiles H.265 (MPEG-H Part 2/HEVC) Main Profile Motion JPEG
Resolution	5120x2560 (13.1 MP) to 256x128
Frame rate	13.1 MP @ 25/30 fps (50/60 Hz) WDR
Video streaming	13.1 MP: 1 configurable stream in H.264, H.265 and Motion JPEG in full frame rate Controllable frame rate and bandwidth VBR/ABR/MBR H.264/H.265 Low latency mode
Image settings	Saturation, contrast, brightness, sharpness, Forensic WDR: up to 120 dB depending on scene, white balance, day/night threshold, exposure mode, compression, dynamic text and image overlay, orientation aid, exposure control, noise reduction, fine tuning of behavior at low light, polygon privacy masks

Audio	
Audio streaming	Two-way audio via edge-to-edge technology
Audio input/output	External microphone input, line input, digital audio input, automatic gain control, network speaker pairing
Audio encoding	24bit LPCM, AAC-LC 8/16/32/48 kHz, G.711 PCM 8 kHz, G.726 ADPCM 8 kHz, Opus 8/16/48 kHz, 44.1 kHz ACC-LC, LPCM Configurable bit rate

Network	
Security	IP address filtering, HTTPS ^a encryption, IEEE 802.1X (EAP-TLS) ^a network access control, user access log, centralized certificate management, signed video, Axis Edge Vault, Axis device ID, secure keystore (CC EAL4 certified), TPM (FIPS 140-2 certified)
Network protocols	IPv4, IPv6 USGv6, ICMPv4/ICMPv6, HTTP, HTTP/2, HTTPS ^a , TLS ^a , QoS Layer 3 DiffServ, FTP, SFTP, CIFS/SMB, SMTP, mDNS (Bonjour), UPnP [®] , SNMP v1/v2c/v3 (MIB-II), DNS/DNSv6, DDNS, NTP, NTS, RTSP, RTP, TCP, UDP, IGMP, RTCP, ICMP, DHCPv4/v6, ARP, SSH, LLDP, CDP, MQTT, Secure syslog (RFC 3164/5424, UDP/TCP/TLS), Link-Local address (ZeroConf)

System integration	
Application Programming Interface	Open API for software integration ONVIF [®] Profile G, ONVIF [®] Profile M, ONVIF [®] Profile S and ONVIF [®] Profile T, specification at onvif.org
Event conditions	Analytics, external input, supervised external input, edge storage events, virtual inputs through API Audio: audio detection Digital audio: digital signal contains Axis metadata, digital signal as invalid sample rate, digital signal missing, digital signal ok Device status: above operating temperature, above or below operating temperature, below operating temperature, fan failure, IP address removed, network lost, new IP address, shock detected, storage failure, system ready, within operating temperature, casing open, ring power overcurrent protection Edge storage: recording ongoing, storage disruption, storage health issues detected

I/O:	digital input, manual trigger, virtual input MQTT subscribe Scheduled and recurring: scheduled event Video: live stream open, average bitrate degradation, day-night mode, tampering
Event actions	Day/night mode, overlay text, video recording to edge storage, pre- and post-alarm video buffering, send SNMP trap, play audio clip I/O events, status LED events File upload: FTP, SFTP, HTTP, HTTPS network share, email MQTT publish Notification: email, HTTP, HTTPS TCP

Data streaming	Event data
Built-in installation aids	Pixel counter, leveling guide

Analytics	
Applications	Included AXIS Fence Guard, AXIS Motion Guard, AXIS Loitering Guard AXIS Video Motion Detection, active tampering alarm, audio detection Supported Support for AXIS Camera Application Platform enabling installation of third-party applications, see axis.com/acap

Approvals	
EMC	EAC, CISPR 24, CISPR 35, EN 55024, EN 55035, EN 55032 Class A, EN 50121-4, EN 61000-6-1, EN 61000-6-2 Australia/New Zealand: RCM AS/NZS CISPR 32 Class A Canada: ICES-3(A)/NMB-3(A) Japan: VCCI Class A Korea: KC KN35, KC KN32 Class A USA: FCC Part 15 Subpart B Class A Railway: IEC 62236-4

Safety	CAN/CSA C22.2 No. 62368-1 ed. 3, CAN/CSA C22.2 No. 60950-22, IEC/EN/UL 62368-1, IEC/EN/UL 60950-22, IS 13252
---------------	--

Environment	IEC 60068-2-1, IEC 60068-2-2, IEC 60068-2-6, IEC 60068-2-14, IEC 60068-2-27, IEC 60068-2-78, IEC/EN 60529 IP66/IP67, IEC/EN 62262 IK10, NEMA 250 Type 4X, NEMA TS 2 (2.2.7-2.2.9), MIL-STD-810H (Method 501.7), 502.7, 505.7, 506.6, 507.6, 509.7, 512.6
--------------------	--

Network	NIST SP500-267
----------------	----------------

Cybersecurity	ETSI EN 303 645, FIPS 140
----------------------	---------------------------

Cybersecurity	
Edge security	Software: Signed OS, brute force delay protection, digest authentication and OAuth 2.0 RFC6749 OpenID Authorization Code Flow for centralized ADFS account management, password protection, AES-XTS-Plain64 256bit SD card encryption Hardware: Axis Edge Vault cybersecurity platform TPM 2.0 (CC EAL4+, FIPS 140-2 Level 2), secure element (CC EAL 6+), Axis device ID, secure boot

Network security	IEEE 802.1X (EAP-TLS, PEAP-MSCHAPv2) ^a , IEEE 802.1AE (MACsec PSK/EAP-TLS), IEEE 802.1AR, HTTPS/HSTS ^a , TLS v1.2/v1.3 ^a , Network Time Security (NTS), X.509 Certificate PKI, host-based firewall
-------------------------	---

Documentation	<i>AXIS OS Hardening Guide</i> <i>Axis Vulnerability Management Policy</i> <i>Axis Security Development Model</i> AXIS OS Software Bill of Material (SBOM) To download documents, go to axis.com/support/cybersecurity/resources To read more about Axis cybersecurity support, go to axis.com/cybersecurity
----------------------	---

General	
Casing	IP66-/IP67- and NEMA 4X-rated, IK10-rated impact-resistant casing with polycarbonate hard coated clear dome, aluminum base and dehumidifying membrane Color: white NCS S 1002-B Casing open detection For repainting instructions and impact on warranty, contact your distributor partner.

Mounting	Mounting bracket with junction box holes (double-gang, single-gang, 4" square, and 4" octagon) and for wall or ceiling mount ¾" (M25) conduit side entries
Sustainability	PVC free, 20% recycled plastic
Power	Power over Ethernet (PoE) IEEE 802.3at Type 2 Class 4 Typical 11 W, max 18 W
Connectors	Shielded RJ45 1000BASE-T Terminal block for two configurable supervised inputs/digital outputs (12 V DC output, max load 50 mA), 3.5 mm analog/digital mic/line in
Storage	Support for microSD/microSDHC/microSDXC card Support for SD card encryption (AES-XTS-Plain64 256bit) Support for recording to network-attached storage (NAS)
Operating conditions	-40 °C to 50 °C (-40 °F to 122 °F) Humidity 10–100% RH (condensing) Maximum temperature according to NEMA TS 2 (2.2.7): 74 °C (165 °F) Start-up temperature: -40 °C
Storage conditions	-40 °C to 65 °C (-40 °F to 149 °F) Humidity 5–95% RH (non-condensing)
Dimensions	Height: 170 mm (6.6 in) Width in diameter: 195 mm (7.6 in)

	With weathershield: Height 221 mm (8.7 in) Width 206 mm (8.1 in)
Weight	2.2 kg (4.9 lb)
Mounting height	Recommended: 4–15 m
Included accessories	Installation guide, Windows® decoder 1-user license, weathershield, RESITORX® T20 bit, connector guard
Optional accessories	AXIS T8415 Wireless Installation Tool AXIS Surveillance Cards AXIS TQ3102 Pendant Kit AXIS TQ3101-E Pendant Kit AXIS TQ3201-E Recessed Mount ^b AXIS T94V01C Dual Camera Mount For more accessories, see axis.com
Languages	English, German, French, Spanish, Italian, Russian, Simplified Chinese, Japanese, Korean, Portuguese, Traditional Chinese, Dutch, Czech, Swedish, Finnish, Turkish, Thai, Vietnamese
Warranty	5-year warranty, see axis.com/warranty

- a. *This product includes software developed by the OpenSSL Project for use in the OpenSSL Toolkit. (openssl.org), and cryptographic software written by Eric Young (eay@cryptsoft.com).*
- b. *The camera's tampering alarm doesn't work when mounted in AXIS TQ3201-E Recessed Mount*