



Technical Specifications

MOBOTIX MOVE 2MP Varifocal IR Vandal Turret

The MOBOTIX MOVE2MP Varifocal IR Vandal Turret is designed to bring clarity and vigilance to your surveillance needs. This state-of-the-art turret camera with DNN-based video analytics combines advanced features with a compact and sleek design, making it an ideal choice for various indoor and outdoor applications. The Vari-Focal Turret Camera allows you to easily remote adjust the field of view and focus by a motorized lens, ensuring optimal positioning and alignment to meet the specific requirements of your surveillance scenario. The camera's weather-resistant design IP67 and IK10 ensures reliable operation even in challenging environmental conditions. Its compact turret form factor, combined with easy installation options, makes it a hassle-free choice.

- High Low-Light sensitivity
- 1/2.8" Progressive CMOS
- Motorized Vari-Focal Lens 2.7mm to 13.5mm
- WDR up to 120 dB
- Integrated adaptive IR Illumination, working distance up to 30 m/98 ft
- Triple Streaming H.264/H.265/MJPEG
- 2D & 3D Motion Compensated Noise Reduction (MCTF)
- ONVIF Profile S/G/T/M support
- microSD Card supports up to 512 GB.
- Integrated Microphone
- NDAA compliant
- DNN-based object detection with filtering (people/vehicles, etc.)
- Dual power Supply IEEE802.3af Class 3 / DC 12 V
- Temp. Range -30°C to 60°C/-22°F to 140 °F with integrated heater ON
- Protection Rate IP67 / IK10
- Intelligent Encoding, Smart Low Bitrate Control is same as Smart compression offering optimally useable bandwidth and storage.



BeyondHumanVision

MOBOTIX

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V1.22_7/1/2026, Order Code: Mx-VT1A-203-IR

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MOBOTIX MOVE 2MP Varifocal IR Vandal Turret

Product Information

| | |
|--------------|--------------------------------|
| Product Name | 2MP Varifocal IR Vandal Turret |
| Order Code | Mx-VT1A-203-IR |

Hardware Design

| | |
|-------------------------|--|
| Processor | Novatec NT98560 (Single-core ARM® Cortex®-A9, 960 MHz) |
| Memory | RAM: 512 MB FLASH: 256 MB |
| Image Sensor | 2MP, 1/2.8" Progressive CMOS |
| Effective (Used) Pixels | 1920x1080 (2MP) |

Lens

| | |
|----------------------|---|
| Minimum Illumination | Color: 0.03 lux B/W: 0.01 lux, (0 lux, IR on) F1.6, AGC=on, 30 IRE, 1/1 s |
| Lens Characteristics | Vari-Focal Lens Focal Length: 2.7mm to 13.5mm Aperture: F1.4-2.8 H x V FOV: 111°-34°(H) 61°-19°(V) |

Camera

| | |
|-----------------------|--|
| Day/Night | Automatically switchable IR-cut filter |
| Shutter Speed | Auto / Manual / WDR: 1 to 1/10000 s |
| Shutter Priority Mode | Up to 1/7.5 s |
| Frame Rate (maximum) | WDR on/off: H.265/H.264: 2MP@30 fps MJPEG: 2MP@30 fps |
| Auto Gain | Min. gain: 0 dB, max. gain: 36 dB, step size: 3 |
| WDR | Up to 120 dB |

| | |
|--------------------|--|
| Zoom | Motorized optical: 2.67x |
| Image Settings | Color, Brightness, Sharpness, Contrast, White Balance, Gain Control, 2DNR, 3DNR, BLC, EV, Gamma corection, Saturation, Hue |
| Image Rotation | 90°, 180°, 270° |
| Camera Body Adjust | Pan/Tilt/Rotation |

Video Codec

| | |
|----------------------|---|
| Compression/Encoding | H.265/H.264/MJPEG |
| Streaming | Up to 3 individually configurable streams in H.264/H.265/MJPEG. Configurable resolution, frame rate, bandwidth CVBR/CBR/istream in H.265/H.264 |

Audio Codec

| | |
|----------------------|-----------------------|
| Compression/Encoding | G.711a/u |
| Streaming | One-way |
| Audio Input | Integrated Microphone |

Cyber Security Features

| | |
|--|---|
| Password Protection | Yes (including “forced” password change during initial setup) |
| IP address filtering | Yes (to restrict unauthorized access based on IP addresses) |
| IEEE 802.1X network access control | Yes (for advanced network security and authentication) |
| Digest authentication | Yes (for secure user authentication) |
| Secure Boot | Yes (support of fixed IP setting and automatic DHCP IP configuration according to individual MAC address) |
| AES encryption for password protection | Yes (to ensure strong encryption for password storage) |
| HTTPS/SSL (using TLS) | Yes (TLS 1.2 default, TLS 1.0/1.1 optional selectable) |
| User and Group Management | Yes (for fine-grained access control) |

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| | |
|---------------------|--|
| Advanced Security | Yes (Active/Passive: Active protection controls the enabling and disabling of various network communications. Passive protection limits the number of operations and the duration of the ban. If the limit is reached, the user will be banned) |
| RTSP Authentication | Yes (for restricting unauthorized access to RTSP streams) |
| SFTP | Yes (network protocol that securely transfers files between a client and a server using SSH) |

Network

| | |
|---------------------|--|
| Interface | 10/100/1000 Mbps Ethernet |
| Supported Protocols | ARP, DHCP, DNS, FTP, HTTP, HTTPS, ICMP, IGMP, IPv4/6, NTP, RTSP/RTCP/RTP, RTMP, QoS, SMTP, SNMP v1/2c/3, TCP, TLS/TLS, UDP, UPnP, 802.1X, Bonjour, DDNS, PPPoE |
| ONVIF conformance | Supports profiles S/G/T/M |
| Supported Browsers | Microsoft Edge, Firefox, Google Chrome |

System Integration

| | |
|---------------|--|
| Event Actions | <ul style="list-style-type: none">■ Schedule Recording (JPG/MP4)■ DNN-based video analytics (line counting, border line, object classification/filtering for people, vehicles, etc.)■ Video and audio recording to edge storage■ File upload: FTP and email■ Notification: Email (JPG)■ OSD indication■ SD Card recording (*JPG/MP4) |
|---------------|--|

General

| | |
|--------------------------|--|
| Housing Material | Metal |
| Housing Color | RAL 9003 |
| Adaptive IR Illumination | 850 nm; up to 30 m/98 ft distance depending on reflection of scenery |

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Video Storage microSD card support up to 512 GB.
Support for recording to MOVE NVR, MOBOTIX Cloud (via MOBOTIX Bridge),
MOBOTIX HUB, MxMC (via MOBOTIX NAS)

Remotely Upgradable Yes

Power Requirements IEEE802.3af, class 3, max 10 watt
DC12V, max 10 watt

Connectors ■ RJ45
 ■ 1 x DC 12V Jack Socket
 ■ 1 x Reset / Default Button

Environmental Protection Class IP67/IK10

Operating Temperature -30°C to 60°C/-22°F to 140 °F with integrated heater ON

Relative Humidity 95 % non-condensing

Storage Conditions -40 to 60 °C/-4 to 158 °F

Approvals EMC: CE, FCC, BIS
Safety: LVD

Warranty 5 years; mechanically wearable parts (motor, gears, belts, etc.) excluded

Dimensions ø 120 x 104 mm (overall)

Weight 715 g

NOTE!

Observe the [MOBOTIX MOVE Installation Hints](#) document to ensure optimum performance of the camera features.

DORI Specifications

In the video surveillance context, “DORI” stands for Detection, Observation, Recognition and Identification and is based on IEC EN62676-4: 2015. These levels define the minimum pixels that a face of a person must have to provide proper identification, for example.

DORI Levels According to IEC EN62676-4: 2015

These levels define the minimum pixels that a face of a person must have to provide proper identification, for example.

- **Detection:** Up to this distance, you can reliably determine if a person or vehicle is present.
- **Observation:** Up to this distance, you can see characteristic details of an individual, such as distinctive clothing.
- **Recognition:** Up to this distance, you can determine with a high degree of certainty whether an individual is the same as someone that has been seen before.
- **Identification:** Up to this distance, you can determine the identity of an individual beyond reasonable doubt.

DORI Distances

| DORI Level | Focal Length | Detection | Observation | Recognition | Identification |
|----------------|----------------|------------------|------------------|-----------------|-----------------|
| Order Code | | | | | |
| Mx-VT1A-203-IR | 2.7 mm (Wide) | 19.9 m/ 65.46 ft | 11.5 m/ 37.83 ft | 7.2 m/ 23.68 ft | 3.2 m/ 10.53 ft |
| | 13.5 mm (Tele) | 51 m/ 167.76 ft | 26.1 m/ 85.86 ft | 15.9 m/ 52.3 ft | 6.9 m/ 22.7 ft |

Dimensions

NOTE! Drilling template: www.mobotix.com > Services > Download Center > Marketing & Documentation > Drilling Templates.

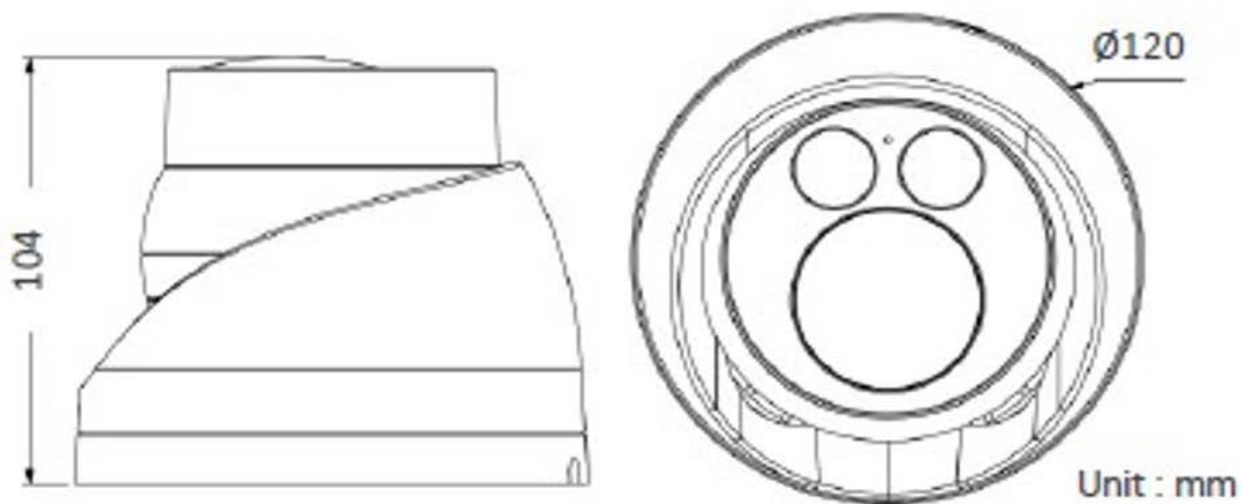




Fig. 1: Mx-VT1A-203-IR: All measurements in mm

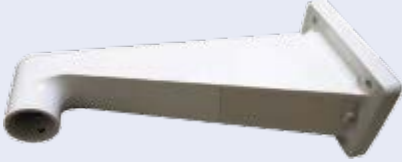

Accessories for Vandal Turret Cameras

| Picture/ Order Code | Description | Compatible Products | Material/ Color | Weight |
|--|----------------------------|---|---|---------|
|  <p data-bbox="323 981 459 1010">Mx-M-SD-C</p> | Weatherproof corner mount. | <p>Mx-M-SD-W or Mx-M-SD-WL.</p> <p>CAUTION! Cannot be used with MX-M-SD-WM or Mx-M-SD-WMJB!</p> | SPCC steel, hammer-blow painted RAL9003 | 2.17 kg |
|  <p data-bbox="323 1630 459 1659">Mx-M-SD-P</p> | Weatherproof pole mount. | <p>Mx-M-SD-W or Mx-M-SD-WL.</p> <p>CAUTION! Cannot be used with MX-M-SD-WM or Mx-M-SD-WMJB!</p> | Zinc-galvanized SECC steel, powder-coated RAL9003 | 1.58 kg |

Technical Specifications

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| Picture/ Order Code | Description | Compatible Products | Material/ Color | Weight |
|--|---|---|--|----------------|
|  <p data-bbox="161 954 472 987">MX-MH-SecureFlex-ESWS</p> | <p>Weatherproof pole mount for extreme conditions.</p> | <p>Mx-M-SD-W or Mx-M-SD-WL.</p> <div data-bbox="874 465 1129 712" style="background-color: #e0f0e0; padding: 5px;"> <p>CAUTION! Cannot be used with MX-M-SD-WM or Mx-M-SD-WMJB!</p> </div> | <p>Stainless steel 3 mm, white</p> | <p>1.23 kg</p> |
|  <p data-bbox="244 1361 387 1395">Mx-M-SD-W</p> | <p>Weatherproof wall mount for MOVE Speed Dome/Vandal Multi-sensor/Vandal Turret cameras.</p> | <p>All MOVE Speed Dome/Vandal Multi-sensor/Vandal Turret cameras.</p> <p>Can be combined with Mx-M-SD-C or Mx-M-SD-P and camera adaptor plates (MX-M-VT-AP, MX-M-VM-AP, Mx-M-VMSD-AP).</p> | <p>Die-cast ADC12 aluminium alloy, hammer-blow painted RAL9003</p> | <p>0.84 kg</p> |



| Picture/ Order Code | Description | Compatible Products | Material/ Color | Weight |
|--|---|--|--|---------------|
|  <p data-bbox="316 589 467 616">Mx-M-SD-WL</p> | <p>Extended weatherproof wall mount for MOVE Speed Dome/Vandal Multisensor/Vandal Turret cameras.</p> | <p>All MOVE Speed Dome/Vandal Multi-sensor/Vandal Turret cameras.</p> <p>Can be combined with Mx-M-SD-C or Mx-M-SD-P and camera adaptor plates (MX-M-VT-AP, MX-M-VM-AP, Mx-M-VMSD-AP).</p> | <p>Die-cast ADC12 aluminium alloy, hammer-blow painted RAL9003</p> | <p>1.5 kg</p> |
|  <p data-bbox="309 1424 474 1451">MX-M-SD-WM</p> | <p>Weatherproof wall mount for MOVE Speed Dome/Vandal Multi-sensor/Vandal Turret cameras. Can also be mounted on top of wall mount junction box MX-M-SD-WMJB.</p> | <p>All MOVE Speed Dome/Vandal Multi-sensor/Vandal Turret cameras.</p> <p>Can be combined with camera adaptor plates (MX-M-VT-AP, MX-M-VM-AP, Mx-M-VMSD-AP).</p> | <p>Die-cast ADC12 aluminium alloy, RAL9003</p> | <p>1.3 kg</p> |

NOTE!
Can be combined with MX-M-SD-WMJB (wall mount is mounted on top of junction box).

Technical Specifications


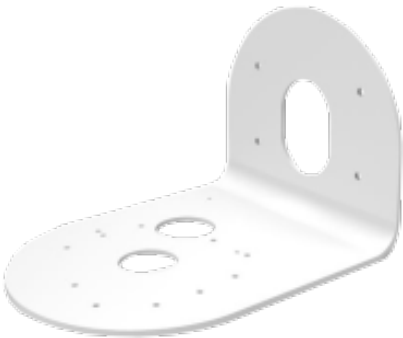

MOBOTIX MOVE 2MP Varifocal IR Vandal Turret

| Picture/ Order Code | Description | Compatible Products | Material/ Color | Weight |
|--|--|--|---|---------|
|  <p data-bbox="215 631 414 660">MX-M-SD-WMJB</p> | <p data-bbox="550 369 853 488">Weatherproof wall mount junction box (IP67) for Mx-M-SD-WM.</p> <p data-bbox="550 510 853 772">Allows for comfortable cabling and installation of additional HW equipment such as PoE Injectors, lightning protection, etc.</p> | <p data-bbox="874 369 1125 488">All MOVE Speed Dome/Vandal Turret cameras.</p> <div data-bbox="874 510 1125 795" style="background-color: #e0f0e0; padding: 5px;"> <p data-bbox="885 526 1013 555">CAUTION!</p> <p data-bbox="885 571 1117 784">Only to be used as base for Mx-M-SD-WM (wall mount is mounted on top of junction box).</p> </div> | <p data-bbox="1145 369 1316 488">Bracket: Steel, powder-coated</p> <p data-bbox="1145 548 1316 817">RAL9003 Junction box: Die-cast ADC12 aluminium alloy, RAL9003</p> | 4.8 kg |
|  <p data-bbox="231 1736 391 1765">MX-M-SD-PM</p> | <p data-bbox="550 846 853 1108">Pendant mount kit incl. base mount, 25 cm/10 in pendant pipe, installation materials and safety wires 50 cm/20 in & 1 m/39 in.</p> | <p data-bbox="874 846 1125 1019">All MOVE Speed Dome/Vandal Multi-sensor/Vandal Turret cameras.</p> <p data-bbox="874 1041 1125 1249">Can be combined with camera adaptor plates (MX-M-VT-AP, MX-M-VM-AP, Mx-M-VMSD-AP).</p> | <p data-bbox="1145 846 1316 1108">Die-cast ADC10 aluminium alloy, powder-coated RAL9003</p> | 1.58 kg |

| Picture/ Order Code | Description | Compatible Products | Material/ Color | Weight |
|--|--|--|--|----------------|
|  | <p>Extension pipe 25 cm/10 in for MX-M-SD-PM.</p> | <p>Extends MX-M-SD-PM; max. extended total length is 1 m/39 in (3 extensions).</p> | <p>Die-cast ADC10 aluminium alloy, powder-coated RAL9003</p> | <p>0.8 kg</p> |
| <p>MX-M-SD-PMEXT</p> | <p>Weatherproof parapet mount (goose neck; IP67) with integrated junction box.</p> <p>Integrated junction box allows for comfortable cabling and installation of additional hardware equipment such as PoE Injectors, lightning protection, etc.</p> | <p>All MOVE Speed Dome/Vandal Multi-sensor/Vandal Turret cameras.</p> <p>Can be combined with camera adaptor plates (MX-M-VT-AP, MX-M-VM-AP, Mx-M-VM-SD-AP).</p> | <p>Bracket and goose neck: Steel, powder-coated RAL9003</p> <p>Junction box: Die-cast ADC12 aluminium alloy, RAL9003</p> | <p>14.8 kg</p> |
|  | <p>MX-M-SD-GN</p> | | | |

Technical Specifications

MOBOTIX MOVE 2MP Varifocal IR Vandal Turret

| Picture/ Order Code | Description | Compatible Products | Material/ Color | Weight |
|---|--|--|---|---------|
|  Mx-M-VT-AP | Adapter mounting plate for MOVE Vandal Turret cameras. | All MOVE Vandal Turret (VT) cameras. Can be combined with MX-M-SD-GN, MX-M-SD-PM, MX-M-SD-PMEXT, Mx-M-SD-W, Mx-M-SD-WL, Mx-M-SD-WM. | Bracket: Die-cast ADC12 aluminium alloy, stove-enamel finish RAL9003 Mounting plate: A1050P aluminium alloy, stove-enamel finish RAL9003 | 0.3 kg |
|  Mx-M-VT-WM | Wall mount for MOVE Vandal Turret cameras. | All MOVE Vandal Turret (VT) cameras. Can be combined with Mx-M-VT-JB. | A1050P aluminium alloy, stove-enamel finish RAL9003 | 0.3 kg |
|  Mx-M-VT-JB | Junction box for MOVE Vandal Turret cameras. | All MOVE Vandal Turret (VT) cameras. Can be combined with Mx-M-VT-WM. | Top/bottom covers: Die-cast ADC12 aluminium alloy, stove-enamel finish RAL9003 | 0.85 kg |

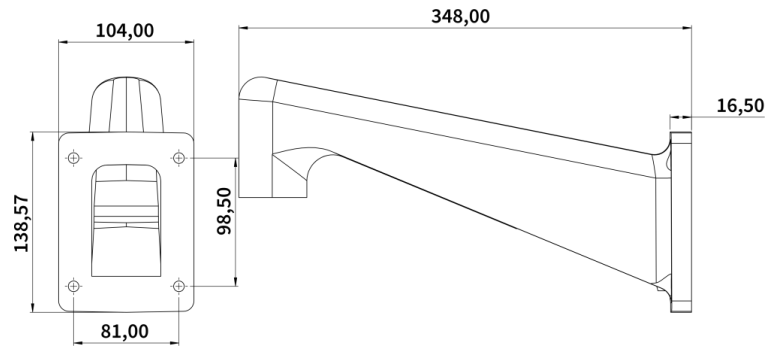
Technical Specifications

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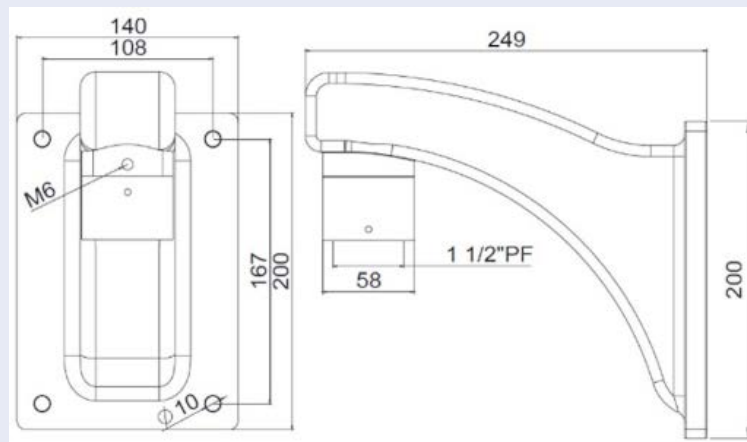
Order Code

Mx-M-SD-WL

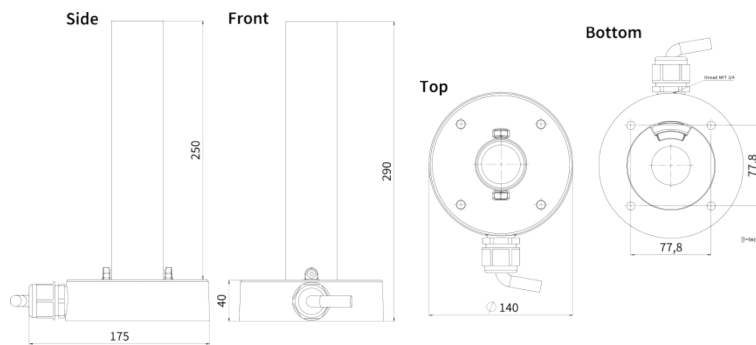
Dimensions



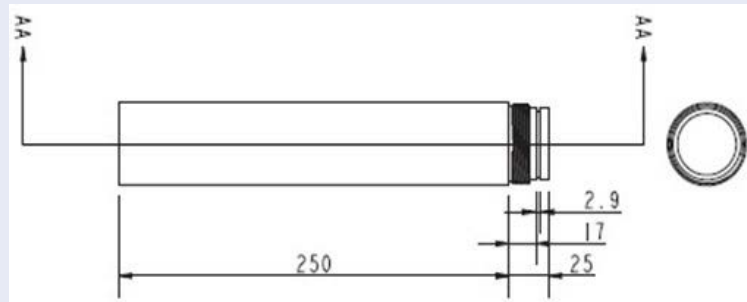
MX-M-SD-WM



MX-M-SD-PM



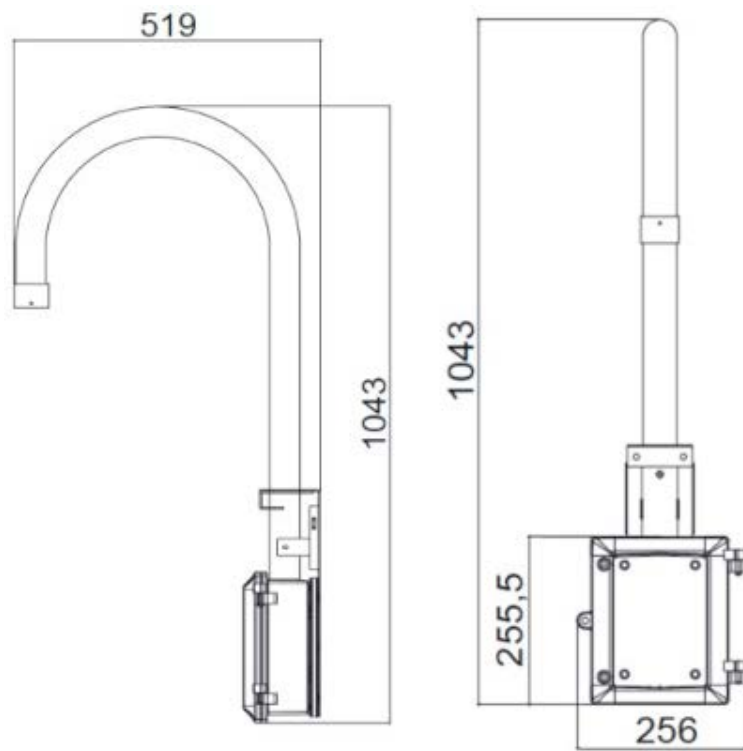
MX-M-SD-PMEXT



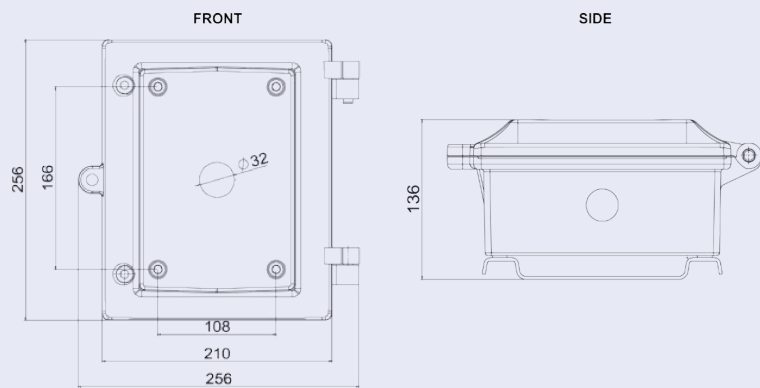
Order Code

MX-M-SD-GN

Dimensions



MX-M-SD-WMJB



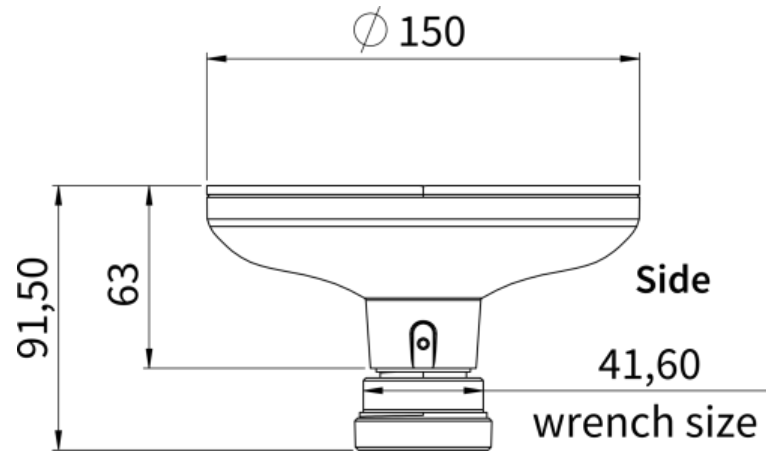
Technical Specifications

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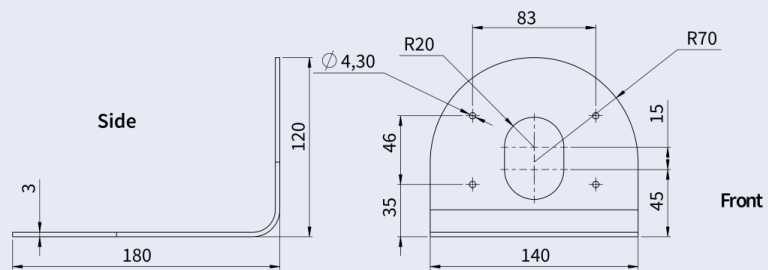
Order Code

Mx-M-VT-AP

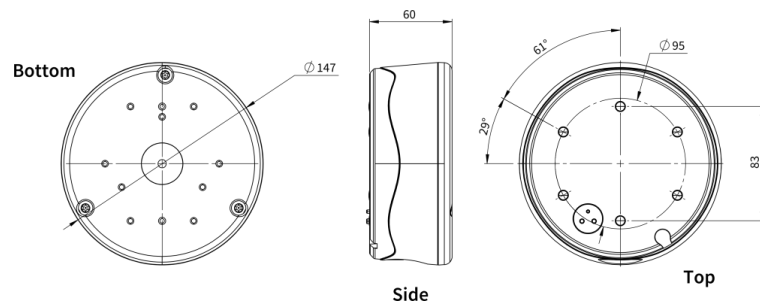
Dimensions



Mx-M-VT-WM



Mx-M-VT-JB




All measurements in mm.

Accessories for All Cameras

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MOBOTIX MOVE 2MP Varifocal IR Vandal Turret

| Picture/ Order Code | Description | Compatible Products | Material/ Color | Weight |
|--|---|------------------------|------------------------|---------|
|  MX-NPA-UPOE1A-60W | UPoE Power Injector 60W. PoE++ 60W Network Power injector • AC Input Voltage: 100 to 240 VAC (50 to 60Hz) • AC Input Current: 1.5A @100-240 VAC • Operating Ambient Temperature: • -10° to 40°C @60W • -10° to 50°C, humidity 10 to 90% @30W • IEEE 802.3bt compliant • Output power of 60W over 4-pairs • Supports 10/100/1000Base-T applications • Plug-and-play installation • Full Protection OVP, OCP• Supports 10/100/1000Base-T applications. | All cameras. | Plastic housing, black | 0.45 kg |

Picture/
Order Code



Mx-A-ETP1A-2601-SET

Description

Media converter set Ethernet (PoE+) – Twisted-Pair. Complete set consisting of two two-wire transmit/receive units for establishing an Ethernet transmission path via twisted-pair cables. • Transmission of Ethernet and PoE+ power supply via two-wire line according to IEEE1901. • Simple connection of 10/100 Mbps Ethernet end devices • Max. 95 Mbps transmission bandwidth, range up to 600 m/656 yd for data only, 300 m/328 yd for PoE depending on the quality of the twisted-pair link • 128 bit AES network data encryption • Power supply 2-wire transmitter (Tx) and receiver (Rx) as well as end device via PoE+ network switch or external power supply 56VDC / 1.2A (not included!) • Connected end devices are supplied via PoE switch IEEE802.3af(PoE), IEEE802.3at (PoE+), UPoE up to 60W (requires ext. power supply unit). • Status LEDs (data, power supply, data link, PoE) • Integrated Over-voltage protection (IEC 61000-4-5 4kV(1.2 / 50us), 2kA(8 / 20us)) • Power Supply: TX: T-

Compatible
Products

All cameras. Requires Mx-A-ETP1A-2601-POW.

Material/
Color



Plastic housing, black

Weight

0.368 kg

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MOBOTIX MOVE 2MP Varifocal IR Vandal Turret

| Picture/ Order Code | Description | Compatible Products | Material/ Color | Weight |
|---|--|---|--|--|
|  <p data-bbox="161 1151 448 1178">Mx-A-ETP1A-2601-POW</p> | <p data-bbox="533 360 900 667">Linx or DC12V~57V, RX: PoE Switch or DC48V~57V • Operational temperature: -20 to 60°C • Dimensions: 80.4(L) x 61.6(W) x 24(H)mm • Weight: RX/TX: 102g • Warranty: 2 years</p> | <p data-bbox="930 701 1080 772">Mx-A-ETP1A-2601-SET</p> | <p data-bbox="1155 701 1305 772">Plastic housing, black</p> | <p data-bbox="1334 701 1426 728">0.49 kg</p> |
|  <p data-bbox="225 1630 384 1657">MX-SWITCH1</p> | <p data-bbox="533 1211 900 1803">MOBOTIX network switch for DIN (top-hat) rail mounting. 5x RJ45 port with 100 MBit/s (1x uplink, 4x PoE+ with max. 75 W). Supply: 48 V DC, max. 75 W. Simplified cabling for door stations due to available connectivity for anti-theft protection, door opener and MxBus. MxBus, anti-theft protection, door and lock contact can be connected via separate wires of Ethernet cable.</p> | <p data-bbox="930 1211 1080 1238">All cameras.</p> | <p data-bbox="1155 1211 1305 1283">Plastic housing, gray</p> | <p data-bbox="1334 1211 1426 1238">0.31 kg</p> |

Further Reading

[Manuals and Quick Installation documents](#)



[Technical Specifications](#)



[MOBOTIX MOVE Installation Hints](#)



[MOBOTIX Community](#)



MOBOTIX

BeyondHumanVision

EN_07/26

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