# IES0 Series Sarix® IP Rugged Fixed Dome
## INDOOR/OUTDOOR, 0.5 MPX STANDARD DEFINITION DIGITAL CAMERA

## Product Features

- Up to SVGA Resolution (800 x 600)
- Up to 30 Images per Second (ips) at All Resolutions
- Auto Back Focus for High Precision Focusing
- H.264, MPEG4, and MJPEG Compression
- Day/Night Capability
- Sensitivity Down to 0.03 lux
- Power over Ethernet (IEEE 802.3af) or 24 VAC
- Focus Button with Delay Enables Precision Focus Through Bubble
- Up to 2 Simultaneous Video Streams
- Electronic PTZ Through the Web Browser
- Local Storage (Micro SD) for Alarm Capture
- Adaptive Motion Detection

**(SHOWN WITH OPTIONAL IE-S SURFACE MOUNT ADAPTER)**

- Open IP Standards
- ONVIF v1.02 Conformant
- Bidirectional Half-Duplex Audio

The **Sarix® IES0 Series** is a standard definition network indoor/outdoor rugged fixed dome camera designed with industry-leading image quality and high performance processing power. Its sturdy metal design is vandal and tamper resistant and is designed for worry-free use in a wide range of environmental operating conditions.

The **IES0 Series** is perfect for use in environmental air handling spaces. The back box is plenum rated per 2008 NEC article 300.22(C)(2).

**Sarix** technology defines the next generation of video security imaging performance, delivering high resolution, advanced low-light capabilities, consistent color science, and fast processing power. The H.264 compression video files are considerably smaller, making network video storage more affordable.

### Fixed Dome Camera
The **IES0 Series** can be ordered with or without lenses. All models include advance low-light technology and a camera in an indoor enclosure that is ready to install. The day/night model has a mechanical IR cut filter for increased sensitivity in low-light installations. These cameras accept a wide range of megapixel varifocal CS-mount lenses.

The **IES0 Series** supports two simultaneous video streams. The two streams can be compressed in MJPEG, MPEG-4, and H.264 formats across several resolution configurations. The streams can be configured in a variety of frame rates, bit rates, and group of pictures (GOP) structures for additional bandwidth administration.

### Built-In Analytics
The **Pelco Camera Sabotage** and **Adaptive Motion Detection** behaviors are standard features of the IES0 Series. **Camera Sabotage** detects contrast changes in the field of view. An alarm is triggered if the lens is obstructed with spray paint, a cloth, or covered with a lens cap. **Adaptive Motion Detection** tracks objects that enter the field of view and triggers an alarm when an object enters a user-defined zone.

### Web Interface
The **IES0 Series** uses a standard Web browser for powerful remote setup and administration.

### Window Blanking
Window blanking is used to conceal user-defined privacy areas that cannot be viewed by an operator. The **IES0 Series** supports up to four blanked windows. A blanked area will appear on the screen as a solid gray window.

### Video Systemization
The **IES0 Series** easily connects to Pelco IP and hybrid systems such as Endura® version 2.0 (or later) and Digital Sentry® version 7.3 (or later). The camera is also compatible with Digital Sentry NVs (DS NVs), a full-featured video management software, which is available as a free download at *www.pelco.com*. DS NVs includes four free Pelco IP licenses and allows for the management of video from up to 64 cameras.

The **IES0 Series** features open architecture connectivity to third-party software. Pelco offers an application programming interface (API) and software developer's kit (SDK) for interfacing with Pelco's IP cameras.

## GENERAL

| | |
|---|---|
| Imaging Device | 1/3-inch (effective) |
| Imager Type | CMOS |
| Imager Readout | Progressive scan |
| Maximum Resolution | 800 x 600 |
| Signal-to-Noise Ratio | 50 dB |
| Auto Iris Lens Type | DC drive |
| Electronic Shutter Range | 1 ~ 1/100,000 sec |
| Wide Dynamic Range | 60 dB |
| White Balance Range | 2,000° to 10,000°K |
| Sensitivity | f/1.2; 2,850°K; SNR >24 dB |
|    Color (1x/33 ms) | 0.5 lux |
|    Color SENS (15x/500 ms) | 0.12 lux |
|    Mono (1x/33 ms) | 0.25 lux |
|    Mono SENS (15x/500 ms) | 0.03 lux |
| Dome Attenuation | |
|    Clear | Zero light loss |
|    Smoked | f/1.0 light loss |
| Construction | Cast aluminum body with polycarbonate bubble |
| Finish | Light gray powder coat |
| Weight (without lens) | |
|    Unit | 1.5 kg (3.3 lb) |
|    Shipping | 2.3 kg (5.0 lb) |
| Available Languages | Chinese, English, French, German, Italian, Portuguese, Russian, Spanish, and Turkish |

## ELECTRICAL

| | |
|---|---|
| Port | RJ-45 connector for 100Base-TX Auto MDI/MDI-X |
| Cable Type | Cat5 or better for 100Base-TX |
| Power Input | 18 to 30 VAC; 24 VAC nominal or PoE (IEEE 802.3af class 3) |
| Power Consumption* | <7 W, < 40 W with heater operation |
| Current Consumption | |
|    PoE | <140 mA maximum |
|    24 VAC† | <510 mA without heater operation; <2.5 A maximum with heater operation |
| Local Storage | Micro SD |
| Alarm Input | 10 VDC maximum, 5 mA maximum |
| Alarm Output | 0 to 15 VDC maximum, 75 mA maximum |
| Service Port | External 3-connector, 2.5 mm provides NTSC/PAL video output |
| Accessory Port | Connects Pelco accessories |
| Audio | Bidirectional: half duplex; line level/external microphone input; 600-ohm differential; 1 Vp-p max signal level |
| Compression | G.711 PCM 64 kbit/s |

*Does not include optional devices connected to the accessory port.
†24 VAC is required for heater operation.

## MECHANICAL

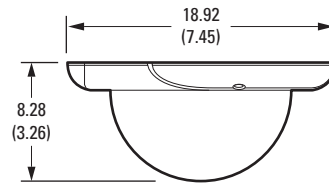| | |
|---|---|
| Lens Mount | CS mount, adjustable |
| Pan/Tilt Adjustment | |
|    Pan | 368° |
|    Tilt | 160° (10° to 170°) |
|    Rotate | 355° |

## ENVIRONMENTAL

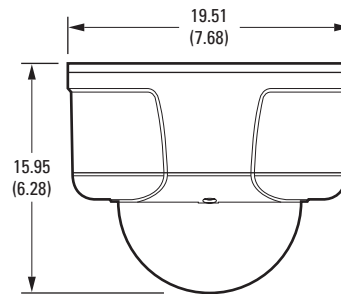| | |
|---|---|
| Operational Temperature | −30° to 50°C (−22° to 122°F); PoE operates between 0° to 50°C (32° to 122°F), 24 VAC power is required for heater operation below 0°C (32°F) |
| Thermostat Operation | Heater thermostatically controlled to operate below <5°C (<41°F) |
| Operational Humidity | 20% to 80%, noncondensing |
| Impact Resistance | IK10++ per EN62262 (70J) |

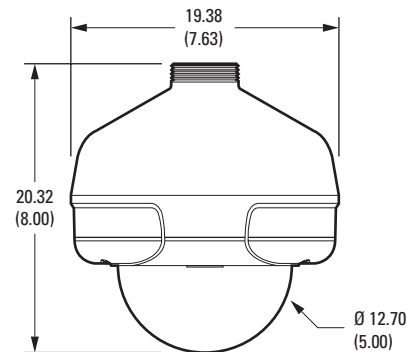NOTE: VALUES IN PARENTHESES ARE INCHES; ALL OTHERS ARE CENTIMETERS.

**IN-CEILING**

18.92 (7.45)

8.28 (3.26)

**SURFACE MOUNT**
(Mount Is Available as an Accessory)

19.51 (7.68)

15.95 (6.28)

**PENDANT**
(Mount Is Available as an Accessory)

19.38 (7.63)

20.32 (8.00)

Ø 12.70 (5.00)

# TECHNICAL SPECIFICATIONS

## VIDEO

| | |
|---|---|
| Video Encoding | H.264 Base profile, MPEG-4, and MJPEG |
| Video Streams | Up to 2 simultaneous streams; the second stream is variable based on the setup of the primary stream |
| Frame Rate | Up to 30, 25, 24, 15, 12.5, 12, 10, 8, 7. 5, 6, 5, 4, 3, 2, 1 (dependent upon coding, resolution, and stream configuration) |

Available Resolutions

| Resolution | | | | MJPEG | | H.264 Base Profile | | MPEG-4 | |
|---|---|---|---|---|---|---|---|---|---|
| MPx | Width | Height | Aspect Ratio | Maximum IPS | Recommended Bit Rate | Maximum IPS | Recommended Bit Rate | Maximum IPS | Recommended Bit Rate |
| 0.5 | 800 | 600 | 4:3 | 30 ips | 5.8 Mbps | 25 ips | 2.0 Mbps | N/A | N/A |
| 0.3 | 640 | 480 | 4:3 | 30 ips | 3.7 Mbps | 30 ips | 1.6 Mbps | 30 ips | 1.7 Mbps |
| 0.1 | 320 | 240 | 4:3 | 30 ips | 0.9 Mbps | 30 ips | 0.4 Mbps | 30 ips | 0.4 Mbps |

| | |
|---|---|
| Additional Resolutions | 640 x 512, 640 x 352, 480 x 368, 480 x 272, 320 x 256, 320 x 176, 4CIF (704 x 489 and 704 x 576), and CIF (352 x 240 and 352 x 288) |
| Supported Protocols | TCP/IP, UDP/IP (Unicast, Multicast IGMP), UPnP, DNS, DHCP, RTP, RTSP, NTP, IPv4, SNMP v2c/v3, QoS, HTTP, HTTPS, LDAP (client), SSH, SSL, SMTP, FTP, and 802.1x (EAP) |
| Users | |
|     Unicast | Up to 20 simultaneous users |
|     Multicast | Unlimited users H.264 |
| Security Access | Password protected |
| Software Interface | Web browser view and setup |
| Pelco System Integration | Endura 2.0 (or later) or Digital Sentry 7.3 (or later) |
| Open API | Pelco API or ONVIF v1.02 |
| Minimum System Requirements | |
|     Processor | Intel®, Pentium® 4 microprocessor, 1.6 GHz |
|     Operating System | Microsoft® Windows® XP, Windows Vista®, or Mac® OS X 10.4 (or later) |
|     Memory | 512 MB RAM |
|     Network Interface Card | 100 megabits (or greater) |
|     Monitor | Minimum of 1024 x 768 resolution, 16- or 32-bit pixel color resolution |
|     Web Browser* | Internet Explorer® 7.0 (or later) or Mozilla® Firefox® 3.5 (or later); Internet Explorer 8.0 (or later) is recommended for configuring analytics |
|     Media Player† | Pelco Media Player or QuickTime® 7.6.5 for Windows XP, Windows Vista, or QuickTime 7.6.4 for Mac OS X 10.4 |

*Internet Explorer is not supported by Mac OS X 10.4.

†This product is not compatible with QuickTime version 7.6.4 for Windows XP or Windows Vista. If you have this version installed on your PC, you will need to upgrade to QuickTime version 7.6.5.

## MODELS

| | |
|---|---|
| IES0DN12-1 | Sarix outdoor fixed dome network camera, 0.5 MPx, day/night, 2.8 ~ 12 mm varifocal lens, clear dome |
| IES0DN-0 | Sarix outdoor fixed dome network camera, 0.5 MPx, day/night, no lens, smoked dome |
| IES0DN-1 | Sarix outdoor fixed dome network camera, 0.5 MPx, day/night, no lens, clear dome |

## CERTIFICATIONS/RATINGS/PATENTS

- CE, Class A
- FCC, Class A
- UL/cUL Listed
- C-Tick
- Meets NEMA Type 4X and IP66 standards
- ONVIF 1.02

## OPTIONAL ACCESSORIES

| | |
|---|---|
| IX-SC | Service/monitor cable, 1.22 m (4 ft); compatible with standard BNC connectors |
| POE20U560G | Single port PoE injector |

## RECOMMENDED MOUNTS

| | |
|---|---|
| IE-P | Pendant mount adapter, light gray |
| IE-S | Surface mount adapter, light gray |
| SWM-SR, IWM-SR* | Wall mounts, light gray |
| IWM24-SR* | Wall mount with cable feedthrough; includes integral 24 VAC, 100 VA transformer; light gray finish |
| PP350* | Parapet mount, gray |
| PP351* | Rooftop or horizontal surface mount, gray |

*Requires the IE-P pendant mount adapter.

## RECOMMENDED LENSES

| | |
|---|---|
| 13VD2.5-6 | Varifocal lens, 2.5 ~ 6.0 mm, f/1.4 ~ 2.1 |
| 13VD2.8-12 | Varifocal lens, 2.8 ~ 12.0 mm, f/1.4 ~ 2.9 |
| 13VD5-50 | Varifocal lens, 5.0 ~ 50.0 mm, f/1.4 ~ 2.9 |

| Field of View in Degrees | | Aspect Ratio | | |
|---|---|---|---|---|
| | | 16:9 | 4:3 | 5:4 |
| 2.5 mm | Horizontal | 98 | 83 | 80 |
| | Vertical | 55 | 63 | 64 |
| 2.8 mm | Horizontal | 89 | 74 | 71 |
| | Vertical | 48 | 55 | 56 |
| 5.0 mm | Horizontal | 50 | 42 | 40 |
| | Vertical | 28 | 32 | 32 |
| 6.0 mm | Horizontal | 42 | 36 | 34 |
| | Vertical | 24 | 27 | 28 |
| 8.0 mm | Horizontal | 32 | 27 | 26 |
| | Vertical | 18 | 20 | 20 |
| 12.0 mm | Horizontal | 21 | 18 | 17 |
| | Vertical | 12 | 13 | 14 |
| 50.0 mm | Horizontal | 5 | 4 | 4 |
| | Vertical | 3 | 3 | 3 |