# Spectra® Mini IP Network Dome System

## DIGITAL, INDOOR, SURFACE MOUNT/IN-CEILING

## Product Features

- Ability to Control and Monitor Video Over IP Network
- 3 Simultaneous Video Streams
  - Dual MPEG-4 (30 ips)
  - Scalable MJPEG
- Supported Protocols: TCP/IP, UDP/IP (Unicast, Multicast IGMp), UPnP, DNS, DHCP, RTP, NTP
- Power over Ethernet (PoE) Compatible
- Single Model for Surface Mount and In-Ceiling Applications
- Autofocus, High Resolution Integrated Color Camera/Optics Package
- 80X Zoom (10X Optical, 8X Digital)
- Zone Blanking
- 64 Presets
- 0.5° Preset Accuracy
- 140°/Second Pan Speed
- 360° Continuous Pan
- Rotating Discreet Liner
- Bidirectional Full-Duplex Audio

**SURFACE MOUNT
APPLICATION**

**RECESSED CEILING
APPLICATION**

**Spectra® Mini IP** dome systems incorporate all of the features and functions of Spectra Mini, while allowing you to control and monitor video over an IP network from virtually anywhere in the world.

**Spectra Mini IP** is a miniature dome with a built-in 100Base-TX network interface for live streaming to a standard Web browser. The dome system features open architecture connectivity for third-party software recording solutions allowing integration into virtually any IP-based system.

The **Spectra Mini IP** is compatible with Integral Digital Sentry® video management systems. The dome system is also Endura Enabled™ to record, manage, configure, and view multiple live streams. When connected to an Endura® network-based video security system, the dome system has access to EnduraStor™ and EnduraView™ for optimized image quality and bandwidth efficiency.

**Spectra Mini IP** features the same ease of installation and ease of maintenance that you have come to expect from Spectra Mini. The easy-to-install dome system can be mounted to the surface of ceilings or recessed into hard ceilings and suspended tile ceilings. **Spectra Mini IP** is IEEE 802.3af PoE compatible, which supplies power to the dome system through the network. If PoE is not available, the unit is prewired for 24 VAC.

Variable speed capabilities of **Spectra Mini IP** range from a fast pan motion of 140 degrees per second to a smooth "creep" speed of 0.4 degrees per second. The system is capable of continuous 360 degrees rotation, and it has an autoflip feature that allows the dome to rotate 180 degrees and reposition itself for uninterrupted viewing of any subject that passes directly beneath the dome's location.

# TECHNICAL SPECIFICATIONS

## ADDITIONAL PRODUCT FEATURES

- 64 Presets: 53 User Definable and 11 Predefined
- Multilingual Menus (English, Spanish, Portuguese, Italian, French, and German)
- Alternate Language Files (includes Russian, Polish, Turkish, and Czech) Available as Optional Software Upload
- On-Screen Compass, Tilt, and Zoom Display
- Password Protection
- 140°/sec Pan Preset Speed and 80°/sec Tilt Preset Speed
- Rotating Discreet Liner
- 4 Zones (programmable in size) Can Be Labeled with up to 20 Characters Each or Set to Output Blank Video
- Programmable Locations of Labels and On-Screen Displays
- 1 On-Screen, User-Defined Programmable Pattern. Includes Pan, Tilt, Zoom, and Preset Functions
- 1 Programmable Window Blanking Area
- Proportional Pan and Tilt: Continually Decreases Pan/Tilt Speeds in Proportion to Depth of Zoom
- Variable Scan Speed: Scan Speed Can Be 3, 6, or 12°/sec
- Pan Motion Allows 0.4° to 140°/sec Pan Speed
- Programmable Limit Stops for Auto/Random/Frame Scan Modes
- Built-in Menu System for Setup of Programmable Functions
- Auto Flip Rotates Dome 180° at Bottom of Tilt Travel
- Programmable Zoom Speeds
- 1 Alarm Input
- 1 Auxiliary Relay Output

## VIDEO

| | |
|---|---|
| Digital Compression | MJPEG, MPEG-4 (available only with Microsoft® Internet Explorer®) |
| Video Streams | 3, simultaneous |

| Video Resolutions | NTSC | PAL |
|---|---|---|
| 4CIF | 704 x 480 | 704 x 576 |
| 2CIF | 704 x 240 | 704 x 288 |
| CIF | 352 x 240 | 352 x 288 |
| QCIF | 176 x 120 | 176 x 144 |

Bit Rate Configurable

| | |
|---|---|
| MPEG-4 | 30 ips, 2 Mbps for primary stream, 1 Mbps for secondary stream; implements EnduraView |
| MJPEG | 15 ips, 3 Mbps, MJPEG |

Web User Interface

| | |
|---|---|
| Pelco Device Utility | For viewing HTTP, requires Java Runtime Environment (JRE™) |
| Internet Explorer | For viewing and control, requires ActiveX® |
| Firefox® | For viewing and control |
| Users | 5 simultaneous users MJPEG or MPEG-4 unicast; unlimited number of users using multicast (MPEG-4 only) |

Minimum System Requirements

| | |
|---|---|
| Processor | Intel® Pentium® 4 microprocessor, 1.6 GHz |
| Operating System | Microsoft® Windows® 98, Windows 2000, Windows XP (or later), or Mac® OS X 10.4 (or later) |
| Memory | 512 MB RAM |
| Network Interface Card | 100 megabits, minimum |
| Monitor | Minimum of 1024 x 768 resolution, 16- or 32-bit pixel color resolution |
| Web Browser | Internet Explorer® 5.5 (or later) or Mozilla® Firefox® 1.5 (or later) |

| | |
|---|---|
| Firmware Upgrade | Pelco Device Utility or Endura Application |
| Supported Protocols | TCP/IP, UDP/IP (unicast, multicast IGMP), UPnP, DNS, DHCP, RTP, NTP |

## GENERAL

Construction

| | |
|---|---|
| Top Cap | Alodined cast aluminum |
| Dome Drive | ABS plastic |
| Trim Ring and Surface Mount Ring | ABS plastic |
| Bubble | Acrylic |
| Finish | White or black |

Light Attenuation

| | |
|---|---|
| Smoked | f/0.5 light loss |
| Clear | Zero light loss |
| Cable Entry | RJ45-10 connector for PoE and 100Base-TX, auto MDI/MDI-X, autonegotiate; 2-position 24 VAC input terminal connector |
| Cable Type | Cat5 or better for 100Base-TX |
| Environment | Indoor |
| Operating Temperature | 32° to 122°F (0° to 50°C) |
| Unit Weight | 1.88 lb (0.85 kg) |
| Shipping Weight | 4 lb (1.81 kg) |

## MECHANICAL

| | |
|---|---|
| Pan Movement | 360° continuous pan rotation |
| Vertical Tilt | Unobstructed +2° to -92° |

Manual Pan/Tilt Speeds

| | |
|---|---|
| Pan | 0.4° to 80°/sec manual operation, 100°/sec turbo |
| Tilt | 0.7° to 40°/sec manual operation |

Preset Speeds

| | |
|---|---|
| Pan | 140°/sec |
| Tilt | 80°/sec |

**Note:** For variable speed operation, an appropriate controller is required.

## ELECTRICAL

| | |
|---|---|
| Input Voltage/Amps | 18 to 30 VAC, 24 VAC nominal; 0.75 A, 50/60 Hz nominal |
| Input Power | 18 VA nominal |
| PoE | IEEE 802.3af class 3 |

## AUDIO

| | |
|---|---|
| Streaming | Bidirectional: full or half duplex |
| Input/Output | Terminal block, analog for microphone and speaker; 600-ohm differential; 1 Vp-p maximum signal level |
| Compression | G.711 PCM 8 bit, 8 kHz mono at 64 kbit/s |

## CAMERA

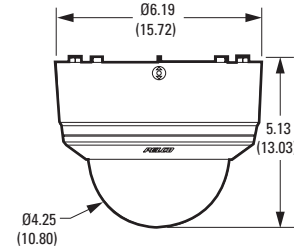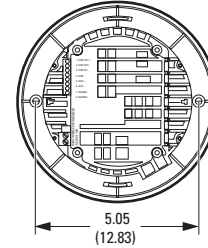| | |
|---|---|
| Signal Format | NTSC/PAL |
| Scanning System | 2:1 interlace |
| Image Sensor | 1/4-inch interline CCD |
| Effective Pixels | |
|   NTSC | 768 (H) x 494 (V) |
|   PAL | 752 (H) x 582 (V) |
| Minimum Illumination | 3.0 lux |
| White Balance | Automatic with manual override |
| Shutter Speed | Automatic (electronic iris)/manual 1/60~/30,000 |
| Gain Control | Automatic with manual override |

## LENS

| | |
|---|---|
| Lens | f/1.8 (f= 4.2~42 mm optical) 10X optical zoom, 8X digital zoom |
| Zoom Speed (optical range) | 1.5/2.5/4.3 seconds |
| Horizontal Angle of View | 46.4° wide zoom; 5.0° telephoto zoom |
| Focus | Automatic with manual override |
| Iris Control | Automatic with manual override |

## CERTIFICATIONS

- CE, Class B
- FCC, Class B
- UL/cUL Listed
- C-Tick

## MODELS

| | |
|---|---|
| SD4N-B0 | Indoor dome system, black, smoked bubble, NTSC |
| SD4N-B1 | Indoor dome system, black, clear bubble, NTSC |
| SD4N-B0-X | Indoor dome system, black, smoked bubble, PAL |
| SD4N-B1-X | Indoor dome system, black, clear bubble, PAL |
| SD4N-W0 | Indoor dome system, white, smoked bubble, NTSC |
| SD4N-W1 | Indoor dome system, white, clear bubble, NTSC |
| SD4N-W0-X | Indoor dome system, white, smoked bubble, PAL |
| SD4N-W1-X | Indoor dome system, white, clear bubble, PAL |

5.05
(12.83)

Ø6.19
(15.72)

5.13
(13.03)

Ø4.25
(10.80)

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

## OPTIONAL MOUNTS
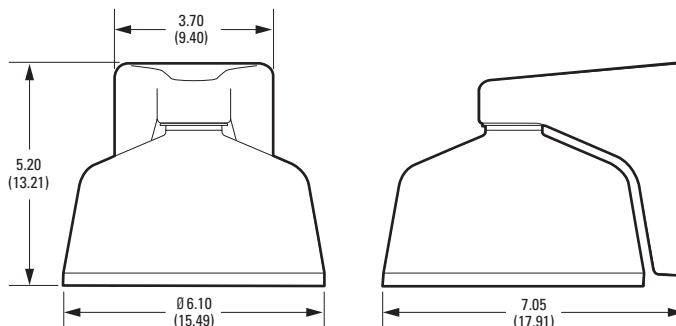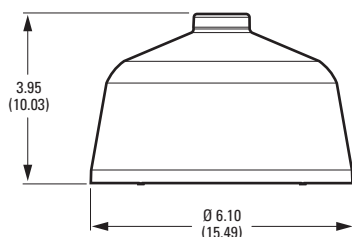
| | |
|---|---|
| SPM4-W | Pendant mount, white |
| SPM4-B | Pendant mount, black |
| SWM4-W | Pendant-wall mount, white |
| SWM4-B | Pendant-wall mount, black |

**SPECTRA MINI DOME SHOWN WITH
OPTIONAL SPM4-W PENDANT MOUNT**

**SPECTRA MINI DOME SHOWN WITH
OPTIONAL SWM4-W PENDANT-WALL MOUNT**

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

### SPM4-W/SPM4-B

| | |
|---|---|
| Mounting Method | Attach mount to 0.75-inch NPT pipe or 20 mm threaded conduit; attach Spectra Mini IP dome with hardware supplied with mount |
| Construction | ABS plastic |
| Finish | |
|    SPM4-W | White |
|    SPM4-B | Black |
| Unit Weight | 0.30 lb (0.14 kg) |
| Shipping Weight | 2 lb (0.91 kg) |

### SWM4-W/SWM4-B

| | |
|---|---|
| Mounting Method | Install adapter plate on wall or junction box using appropriate hardware; attach wall mount to adapter plate; attach Spectra Mini IP dome with hardware supplied with mount |
| Construction | ABS plastic, aluminum |
| Finish | |
|    SWM4-W | White |
|    SWM4-B | Black |
| Unit Weight | 0.72 lb (0.33 kg) |
| Shipping Weight | 2 lb (0.91 kg) |