

DS938Z and ZX938Z Series Panoramic PIR Detectors



- ► Motion Analyzer II processing
- **▶** Motion Monitor
- Self-test supervision systems
- ► Changeable mirrors
- > 360° x 18 m (60 ft) diameter pattern
- > 2.5 m to 6 m (8 ft to 18 ft) mounting height

These ceiling mount, 18 m (60 ft) panoramic PIR Detectors use Motion Analyzer II processing to reduce false alarms. The series consists of the:

- DS938Z Panoramic Detector
- ZX938Z Panoramic Detector with POPIT Several unique self-test features, including Motion Monitor, provide coverage integrity. Field replaceable mirrored optics allow them to be mounted on ceilings from 2.5 m to 6 m (8 ft to 18 ft) in height.

Functions

Motion Analyzer II Processing

Motion Analyzer II uses multiple thresholds and timing windows to analyze timing, amplitude, duration, and polarity of signals to make an alarm decision. It will not alarm on extreme levels of thermal and illumination disturbances caused by heaters and air conditioners, hot and cold drafts, sunlight, lightning, and moving headlights. Provides three sensitivity settings.

PIR Supervision

PIR supervision provides trouble output in the event that PIR circuitry fails.

Motion Monitor

Switch-selectable four or thirty day Motion Monitor supervision timers provide the detector with the ability to verify that there is a clear view of the protection area and that it has not been blocked.

Test Features

Three externally visible high output alarm LEDs visible from any angle, flash to indicate trouble condition. Internal noise voltage test pins provide precise pattern location and background disturbance evaluation using a standard analog meter.

Certifications and Approvals

DS938Z

Listings and Ap-

UL ANSR: Intrusion Detection Units, (UL639)

provals:

Afnor (NF A2P)

Complies with: EN50131-1 grade 2

DS938Z-CHI

Listings and Ap-

CCC (2004031901000036)

provals:

DS938Z-FRA

Listings and Ap- Afnor (NF A2P)

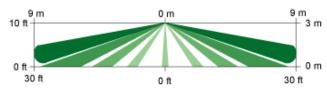
provals:

ZX938Z

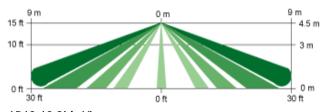
Listings and Ap- UL ANSR: Intrusion Detection Units, (UL639) provals:

Oft 30 ft

Top View 360° x 18 m (60 ft) diameter



AR8-13 Side View 360° x 18 m (60 ft) diameter



AR13-18 Side View 360° x 18 m (60 ft) diameter

Technical Specifications

Enclosure Design

Material:	High impact ABS plastic enclosure	
Dimensions:	8.4 cm x 13.3 cm (3.3 in. x 5.25 in.)	

Environmental Considerations

Operating Temperature:	-29°C to +49°C (-20°F to +120°F) For UL Listed Applications, 0°C to + 49°C (+32°F to +120°F)
Radio Frequency Interference (RFI) Immunity:	No alarm or setup on critical frequencies in the range from 26 MHz to 950 MHz at 50 V/m.
DS938Z:	Complies with Environmental Class II (EN50130-5)

Mounting

Height (recommended):	2.5 m to 6 m (8 ft to 18 ft)
Location:	Mounts directly to ceiling or to standard octagonal electrical box.
Internal Pointability:	Coverage is adjustable ±10° horizontally, +2° to -18° vertically.

Outputs (DS models)

Alarm:	Form C reed relay at 3.0 W, 125 mA at 28 VDC for resistive loads $$
Tamper:	Normally-closed. Contacts rated at 28 VDC, 125 mA maximum

Outputs (ZX model)

Alarm:	Signal through POPEX data bus.
Tamper:	Signal through POPEX data bus. Signaled as missing.
Trouble:	Signal through POPEX data bus.

Power Requirements (DS models)

Current:	18 mA at 12 VDC
Voltage:	6 VDC to 15 VDC

Power Requirements (ZX model)

Current:	< 0.5 mA nominal, 2 mA in alarm with LED enabled
Voltage:	Power comes from two-wire POPEX bus.

Note: Do not leave Walk Test LEDs enabled.

Ordering Information

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DS938Z Panoramic Detector Provides Motion Analyzer II processing, movable mirrors, and 360° x 18 m (60 ft) diameter coverage.	DS938Z
DS938Z-CHI Panoramic Detector For use in China. Provides Motion Analyzer Il processing, movable mirrors, and 360° x 18 m (60 ft) diameter coverage.	DS938Z-CHI
DS938Z-FRA Panoramic Detector For use in France. Provides Motion Analyzer Il processing, movable mirrors, and 360° x 18 m (60 ft) diameter coverage.	DS938Z-FRA
ZX938Z Panoramic Detector	ZX938Z

Provides an internal POPIT, Motion Analyzer Il processing, movable mirrors, and 360° x 18 m (60 ft) diameter coverage.

Ordering Information

Accessories

AR13-18-3 Optical Module

TC6000 Test Cord

AR13-18-3

Designed for 4 m (13 ft) to 6 m (18 ft) mounting height. Shipped in packages of

TC6000

Test cord for connecting a compatible $detector's \, test \, pins \, to \, a \, voltmeter. \, It \, is \, 4.6 \, m$ (15 ft) long.

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