# Automatic Compliance Made Quick & Easy…

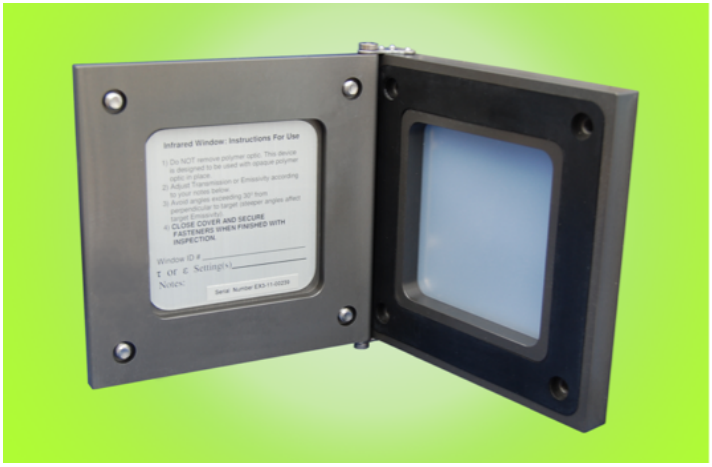
Easily comply with OSHA, NFPA 70E, CSA Z462 and similar electrical safety mandates by using closed-panel inspection methods. Infrared (IR) Windows allow workers to perform IR inspections of electrical components while keeping energized electrical equipment closed, and in “normal operating condition.”

Closed-panel inspections eliminate inherently high-risk tasks, such as removing panels or opening hinged doors, making IR inspections safer for personnel, plant assets and processes.

The more efficient work process can also reduce inspection costs by 75% to 95%, while improving worker safety.


## Analyze Better Data:

Because using inspection windows does not increase risk of electrical hazards, inspections can be performed during peak load, when data collection is ideal, without worry of accidental process interruption.



## Access the Inaccessible:

How does your facility inspect equipment that can no longer be opened while energized due to that equipment’s voltage or incident energy rating? How does your facility inspect equipment protected by switched interlocks? IR inspection windows allow maintenance engineers to monitor otherwise “inaccessible” equipment.

## Over-Engineered for Your Safety

The XIR series is built to out-live your enclosure. Our window body and cover are machined from half-inch bar stock aluminum. All other components are stainless steel.

When it comes to durability and brute strength, Exiscan® is without peers. See it for yourself, contact your local Distributor.

*Patent Pending*

Made In America





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1-866-313-9004
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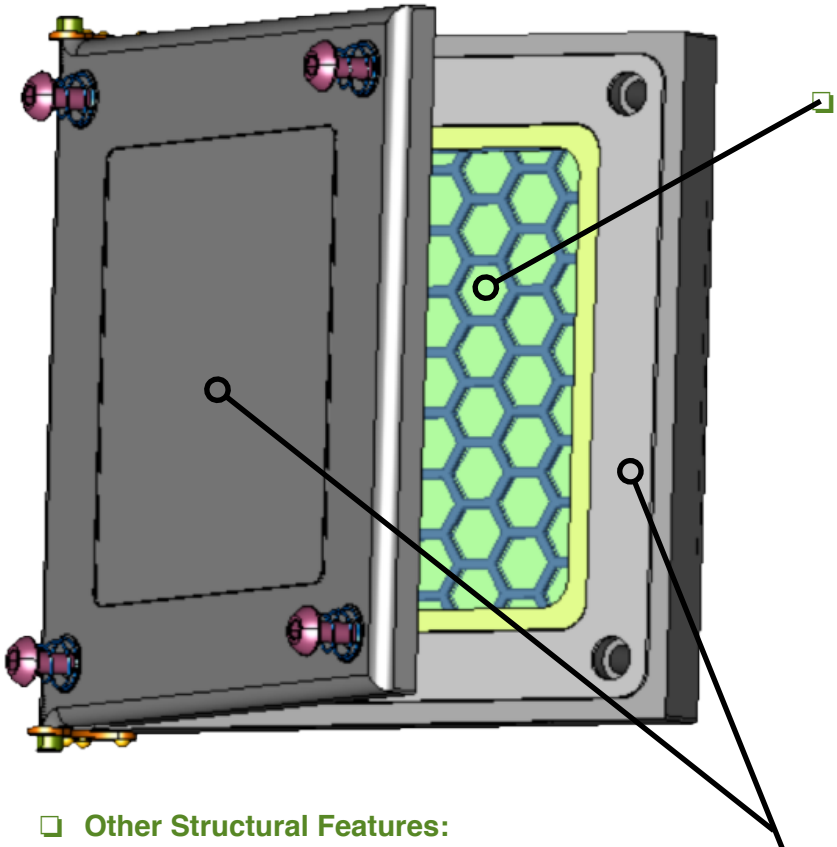
# Anatomy of an Industrial-Grade IR Window



## ❑ Infrared (IR) Window:

- Square IR window optic provides best in class field of view, with 28% to 65% more optic area than similar sized round windows.
- Square format yields superior field of view. When images are taken at broad angles through the window, the square aperture matches the camera's squared display resulting in little to no cropping.
- Impact-resistant optic for unsurpassed durability.
- User get's full field of view by placing camera lens on the window optic.
- Polymer optic is inherently resistant to moisture, humidity, broad spectrum of acids and alkalis for longevity and stable transmission.
- Transmission throughout the entire long wave and mid wave IR spectra for accurate temperate and ΔT calculations.
- Fail safe stainless steel finger guard.

## ❑ Other Structural Features:

- Stainless steel reinforcing plate (inside the enclosure) ensures a tight, flat seal in the event of blast forces.
- Stainless steel studs with Nyloc nuts ground and anchor the window into virtually any enclosure.
- Gaskets between the cover and body, and between the body and enclosure provide a NEMA 4X seal for indoor and outdoor use.

## ❑ Window Body & Cover:

- Machined from 1/2" aluminum bar stock for unmatched resilience (stainless steel available).
- Corrosion Resistant: Treated with Mil Spec anodizing process and then powder coated for "belt and suspenders" protection against industrial environments.
- Cover mounted on stainless steel hinges for ease of use and captivated component .
- Cover fastens with 1/4-28 stainless steel captive screws for a safe, secure seal.

## ❑ Get More Out of Your Inspection Windows

- More Durability
- More Field of View
- More Accuracy
- More for your Money
- Contact your local Distributor for a demonstration.





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| Material Specifications | |
|---|---|
| Body & Cover Material | Aluminum: Anodized & Powder Coated (Stainless Steel Available) |
| Backer Plate & Finger Guard | Stainless Steel |
| Hardware & Fasteners | Stainless Steel |
| Self-Locking Nuts | Nickel-Plated, Nylon Insert Lock Nuts (“Nyloc") |
| IR Optic | Transmissive Polymer |
| Gaskets | Silicone & Neoprene |
| Cover Screws* | Stainless Steel, ¼-20, Captive |
| **Dimension Specifications (nom.)** | |
| Body and Cover (L x H) | 6.0 in x 6.0 in (152 mm) x (152 mm) |
| Total Width (Body + Cover) | 0.9 in (23 mm) |
| Cover Thickness | 0.4 in (10 mm) |
| IR Aperture Dimension | 4.0 in x 4.0 in (102 mm) x (102 mm) |
| IR Aperture Area | 16 sq in (406 sq mm) |
| **Tested / Certified** | |
| UL 50V (IR Window Standard) | Yes |
| NEMA Environmental Rating | NEMA 4X |
| Ingress Protection (IP) | IP66 |
| UL 746C (Impact & Flame Resistance) | Yes |
| ANSI/IEEE C37.20.2 Sec A.3.6 (Switchgear Window Impact Resistance) | Yes |
| CSA Compliant (cUL) | Yes |
| **Transmission Compatibility** | |
| Mid Wave & Long Wave Imagers | All Brands |
| Vibration | Unaffected |
| Broad Spectrum Acids / Alkalis | Unaffected |
| Humidity & Moisture | Unaffected |
| **General** | |
| Voltage Range | Low, Medium & High |
| Grounding | Automatically grounds when mounted to grounded panel/door |
| Operating Temperature | -40°C (-40°F) to 150°C (300°F) |
| Installation | Saw-Cut or Punch |
| **Lifetime Warranty** | Unconditional for Materials & Workmanship |
| **Patent** | Patent Pending: USA and International |
| **Country of Origin** | **Proudly Made in the USA** |

**Standard Cover Screw Type: Allen Head (5/32” Hex Socket). Other options available.*





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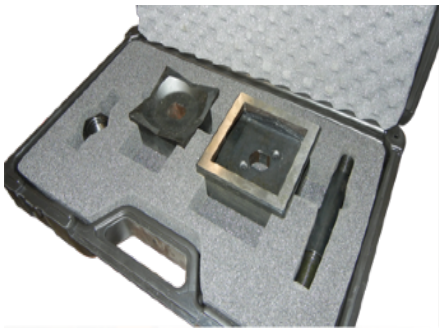
## Quick & Easy Installation:

XIR infrared Windows require a one-time modification to the enclosure. A qualified person simply cuts a 4”x 4” opening and drills 8 pilot holes in the panel or door.

The rectangular opening gives users the latitude to either use a knockout punch, saw, cutoff wheel or nibbler. Properly equipped, a team of two technicians can install five to eight windows an hour.



*X-AAP-4040-X Knockout Punch*

## Why Polymer?

Exiscan® designed it’s IR windows for the industrial electrical market. With this in mind, traditional laboratory crystals were not an option. After extensive testing and research, we saw that only polymer satisfies the most important demands of the industrial market:

- Durability: Industrial electrical equipment requires impact resistant optics
- Longevity: Transmission characteristics must be resistant to humidity, moisture, chemicals
- Accuracy: Accurate Temperatures and ΔTs require an optic that transmits the *entire* LWIR spectrum
- Large Field of View: Larger, square windows allow Thermographers to evaluate more with less
- Value: Closed-panel inspection is safe and efficient, but industry requires affordable solutions

XIR Infrared Windows with patent-pending polymer infrared optic is uniquely suited for industrial and facilities maintenance environments: Built like a tank, resilient and warranted for life, accurate and compatible with all models of cameras, big enough to see it all with fewer windows, yet surprisingly affordable.

Exiscan® won’t compromise on safety, accuracy or usability. That’s why we over-engineer our design and only use industrial-grade materials — like polymer, aluminum and stainless steel.

## Ordering Information:

Made In America

XIR - # - # - # - 2 (#)

**Body/Cover Material:**
A = Aluminum - Anodized & Powder Coated (Standard)
S = Stainless Steel

**Aperture Size:**
4 = 4 in x 4 in
3 = 3 in x 3 in
2 = 2.25 in x 2.25 in

**Cover Screw Type:**
H = Hex Head Screws (Standard)
S = Hex Safety Screw
P = Philips Head Screw
T = Torx Head Screw
X = Torx Safety Screw

**Custom Feature:**
Normally left blank unless client desires some custom feature or features





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