Technical Data

SpyGlass™ Lens and ViewPorts

An effective and safe method for inspecting the interior of electrical cabinets without resorting to opening the cabinet doors or shutting down electrical circuits. This UL approved method is increasingly becoming the norm of industry due to its cost effectiveness.

Requirements and Solution:

Hotspots in electrical cabinets can be quickly pinpointed while circuits are energized and under load, using Mikron's Spy-Glass™ Lens and economical ViewPorts.

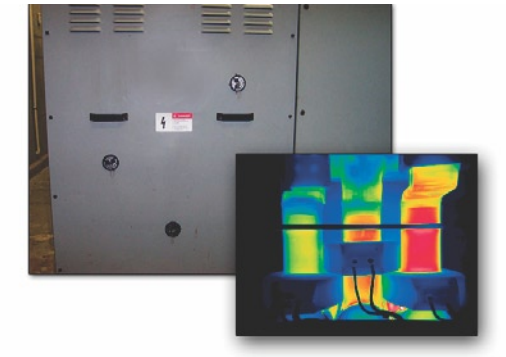
Raising the safety and convenience standard for thermal inspections, the SpyGlass Lens and ViewPort encourage frequent examinations of electrical switchgear because – with cabinet doors closed – no downtime is required to de-energize circuits for safety reasons.

Characteristics of the solution:

- Permits thermal inspection of electrical switch gear without opening the enclosure and disconnecting circuits.
- Views entire scene through a 5/8" (16mm) diameter hole in the cabinet.
- Offers 53°H x 40°V (66° Diagonal) Field of View.
- Provides minimum focus range of 4″.
- Large depth of field reduces the need to re-focus for different cabinet depths.
- Provides Temperature Measurement accuracy: ±3°C
- Attaches to Mikron's MIDAS camera and any MIKRON MikroScan® 7000 Series cameras, making them multi-purpose imagers.
- Allows immediate field installation without having to return the camera to MIKRON for specialized calibration.

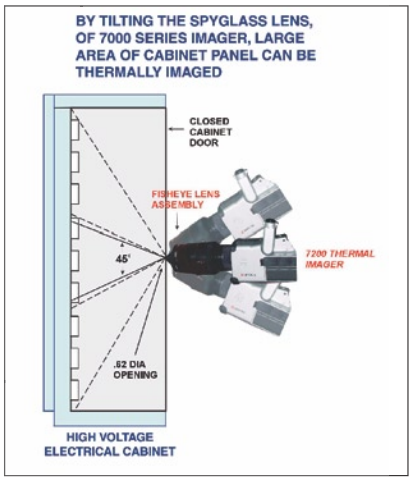
SpyGlass™ Lens

The SpyGlass fisheye lens, with its wide field of view (53° horizontal by 40° vertical, or 66° diagonal), allows easy scanning of the interior of the electrical cabinet through the Viewport, providing a temperature measurement accuracy of ±3°C.



The SpyGlass lens attaches to Mikron's MIDAS thermal imaging camera or any Mikron 7000 Series imager, allowing the light-weight, high performance infrared camera to view entire electrical panels from just inches away.

With a minimum focus range of 4″(10 cm) and large depth of field, the SpyGlass lens reduces the need to re-focus for different electrical cabinet depths.



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FM Approvals
Quality System Registration
ISO 9001:2000 Certified

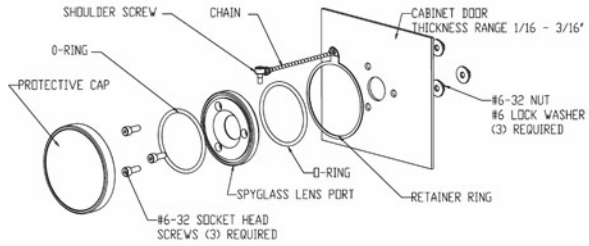
SpyGlass™ ViewPorts

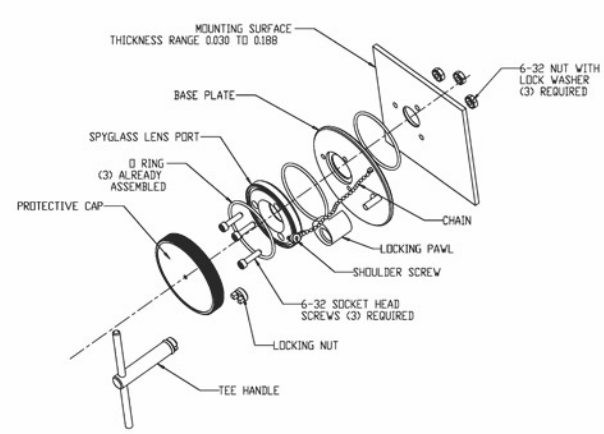
The unique design of the Viewport uses only a 0.62″ aperture, maintaining the integrity and safety rating of the cabinet, without the need for a metal screen barrier which can skew thermal readings, or break and compromise safety. The Viewport is unaffected by moisture, dirt, UV and corrosive environments – it never needs cleaning or replacement glass. When used with the plastic-tipped SpyGlass™ lens, there is no "path to ground" through the camera, enhancing operator safety.

These viewports have received a UL approval number of NITW2.E228318 for use in the United States and a UL approval number of NITW8.E228318 for use in Canada. These UL approved view-ports are designed for use with NEMA Type 1, 2, 3, 3R, 4, 5, 12, 12K, and 13 enclosures. They are available in three styles, with a list price starting under $50.

SpyGlass™ Standard ViewPort (Model 19015-1)

The SpyGlass Standard Viewport is UL-rated and approved for installation at the OEM level or as a retrofit in the field. Suitable for both low-and high-voltage applications from 480 volts and up, it can be installed in 20 minutes or less on cabinets indoors or outdoors, in either vertical or horizontal positions. The Standard ViewPort design contains two o-rings for the purposes of insuring that the addition of this assembly still maintains complete immunity to dust and water penetration to the inside of the cabinet.



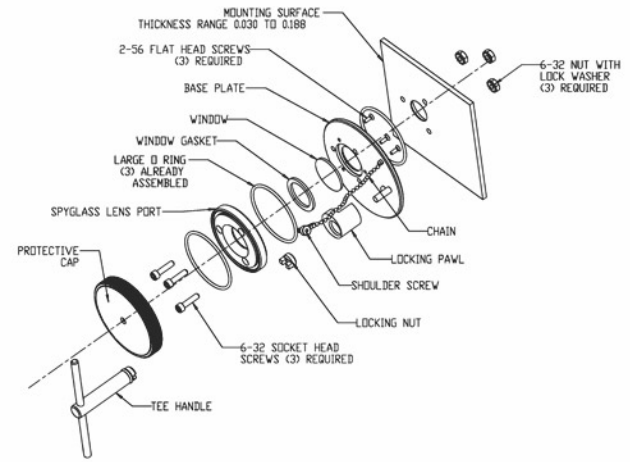


SpyGlass™ Lockable Viewport (Model 19015-4)

The Lockable Viewport is UL-rated and approved for installation at the OEM level or as a retrofit in the field. Suitable for both low-and high-voltage applications from 480 volts and up, it can be installed in 20 minutes or less on cabinets indoors or outdoors, in either vertical or horizontal positions. The Lockable ViewPort design contains three o-rings for the purposes of insuring that the addition of this assembly still maintains complete immunity to dust, water, and oil penetration to the inside of the cabinet. The keyed locking feature prevents unauthorized opening of the Viewport protective cover.

SpyGlass™ Lockable ViewPort with Window (Model 19015-3)

The Lockable Viewport with Window is UL-rated and approved for installation at the OEM level or as a retrofit in the field. Suitable for both low-and high-voltage applications from 480 volts and up, it can be installed in 20 minutes or less on cabinets indoors or outdoors, in either vertical or horizontal positions. The Lockable ViewPort with Window design includes an infrared window and contains three o-rings for the purposes of insuring that the addition of this assembly still maintains complete immunity to dust, water, and oil penetration to the inside of the cabinet. The keyed locking feature prevents unauthorized opening of the Viewport protective cover.



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