

ViewNyx

Athermalized fixed focus

o Molded LWIR Lens FL 4.7 mm f/1.1 (Model VN4.711)

Introduction



- **Precision molded LWIR lenses using chalcogenide glass**
High-volume, cost effective manufacturing
Optimized for the 8~12 μm wavelength range
- **High performance LWIR lenses**
FL 4.7 mm, f/1.1 lens
Use of diffractive-aspheric lens
Wide-angle, passively athermalized LWIR lens
- **Suitable for use with VGA and qVGA detectors and smaller**
- **Applications and capabilities**
Thermal imaging and thermography
Thermal security cameras

Optical Specifications

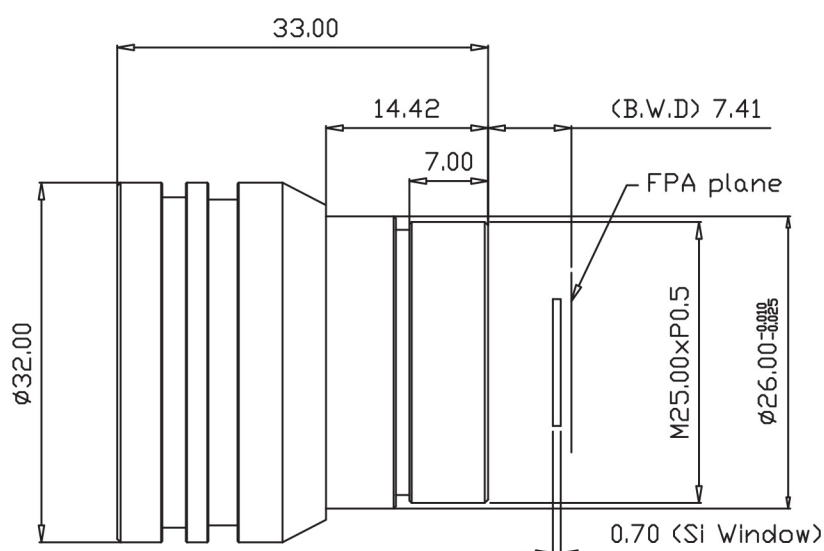
- **Focal length** 4.7 mm
- **Aperture-based f-number** f/1.1
- **Maximum image circle** 13.8 mm
- **Waveband** 8~12 μm
- **Focus range** 0.4 m to infinity
- **Transmittance** > 95 % (AR coating)
> 90 % (DLC coating)
- **Field of view (FOV)**

Sensor array	Pixel size (μm)	FOV (deg)		
		H	V	D
640 X 480	12	93.7	70	119
384 X 288	17	79.3	60	100
	12	56	42	70
320 X 240	17	66	49.6	82.7
	12	46.7	35	58.3

Note : Each lens is optimized for a specific detector format represented by bold values.
This table shows values for other compatible detector formats with non-optimal performance.

Mechanical Specifications

- Lens mount Threaded (M25 x P0.5)
- Weight 53.2 g
- Sealing IP67 / on front
- Dimension



Environmental Specifications

- Operating temperature $-35 \sim +60^{\circ}\text{C}$
- Storage temperature $-55 \sim +85^{\circ}\text{C}$