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25.4mm Dia, 465-610nm, $\lambda/2$ Achromatic Waveplate



Achromatic Waveplates (Retarders)

Stock #46-559 **2 In Stock**

A\$1,696⁰⁰

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Volume Pricing

Qty 1-5	A\$1,696.00 each
Qty 6+	A\$1,408.00 each
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General

Type:
 Achromatic Waveplate

Configuration:
 Air Spaced

Physical & Mechanical Properties

Clear Aperture CA (mm):
 11.5

Diameter (mm):

25.40

8.00 ±0.1 Thickness (mm):

<1 Parallelism (arcmin):

+0/-0.25 Dimensional Tolerance (mm):

Crystalline Construction:

+0/-0.25 Housing Tolerance (mm):

Optical Properties

$R_{avg} < 1\%$ @ 465 - 610nm Coating:

Crystal Quartz and MgF₂ Substrate:

$\lambda/2$ Retardance:

20-10 Surface Quality:

$\lambda/4$ @ 633nm Transmitted Wavefront, P-V:

$\leq \lambda/100$ Retardance Tolerance:

<1/500 Temperature Coefficient ($\lambda^\circ\text{C}$):

$R_{avg} < 1\%$ @ 465 - 610nm Coating Specification:

465 - 610 Wavelength Range (nm):

500 kW/cm² Damage Threshold, By Design:

Regulatory Compliance

Compliant RoHS 2015:

Compliant Reach 209:

View Certificate of Conformance:

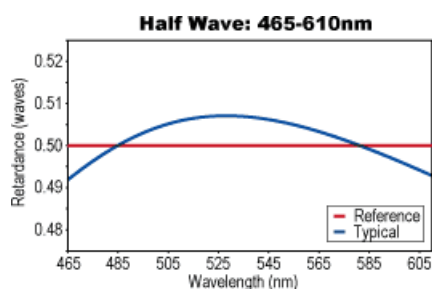
Product Details

- Multiple Wavelength Ranges Available
- Flat Response Over Each Broad Spectral Range
- $\lambda/4$ and $\lambda/2$ Retardance
- Mounted in Black Anodized Aluminum Housing

Achromatic Waveplates (Retarders) provide a constant phase shift independent of the wavelength of light that is used. This wavelength independence is achieved by using two different birefringent crystalline materials. The relative shifts in retardation over the wavelength range are balanced between the two materials used. Achromatic Waveplates (Retarders), with their flat response, are ideal for use with tunable lasers, multiple laser line systems, and other broad-spectrum sources.

Designed to be used at an angle of incidence of 0°, changes of $\pm 3^\circ$ will yield less than 1% change in retardance. The 23mm clear aperture waveplates will feature a cemented construction. All Achromatic Waveplates (Retarders) are mounted in an anodized aluminum housing with the fast axis clearly indicated.

Technical Information



25.4mm Diameter Waveplates

