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## 45° Fan Angle, 500 - 850nm AR Coated, High Precision Powell Lens



Stock #70-142 **1 In Stock**

S\$455<sup>.00</sup>

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Volume Pricing	
Qty 1-10	<b>S\$455.00</b> each
Qty 11-49	<b>S\$408.80</b> each
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### Product Downloads

### General

Beam Shaping Lens **Type:**

### Physical & Mechanical Properties

8.90 +0.00/-0.15 **Dimensions (mm):**

8.90 +0.00/-2.00 **Height (mm):**

1.3 **Input Beam Diameter, 1/e<sup>2</sup> (mm):**

## Optical Properties

**N-SF6**

**Substrate:** □

BBAR (500-850nm)

**Coating:**

500 - 850

**Wavelength Range (nm):**

R<sub>abs</sub> <1.0% @ 500 - 700nm  
R<sub>abs</sub> <1.5% @ 700 - 850nm

**Coating Specification:**

1.458

**Index of Refraction (n<sub>d</sub>):**

45.00

**Fan Angle (°):**

## Regulatory Compliance

[View](#)

**Certificate of Conformance:**

## Product Details

- Generate Uniform, Flat-Top Profile Over Entire Line
- Fan Angles from 1° to 75° Available
- AR Coated for 400 - 500nm or 500 - 850nm

Precision Powell Lenses, also known as aspheric line generators (ALGs), spread an input beam across a uniform line with a top-hat beam profile at a specified fan angle. These Powell lenses are produced through a precision manufacturing process to ensure high contained power, uniformity, and line straightness across the entire produced line, as well as superior part-to-part consistency. They are designed for a specific input beam diameter to provide best line uniformity; larger input beams will result in higher intensity at the ends of the generated line, while smaller will create a more Gaussian distribution. Precision Powell Lenses are ideal for use in machine vision and life science applications including 3D profile measurement, PCB inspection, line-scan SD-OCT, line-scan confocal microscopy, flow cytometry, and particle analysis.