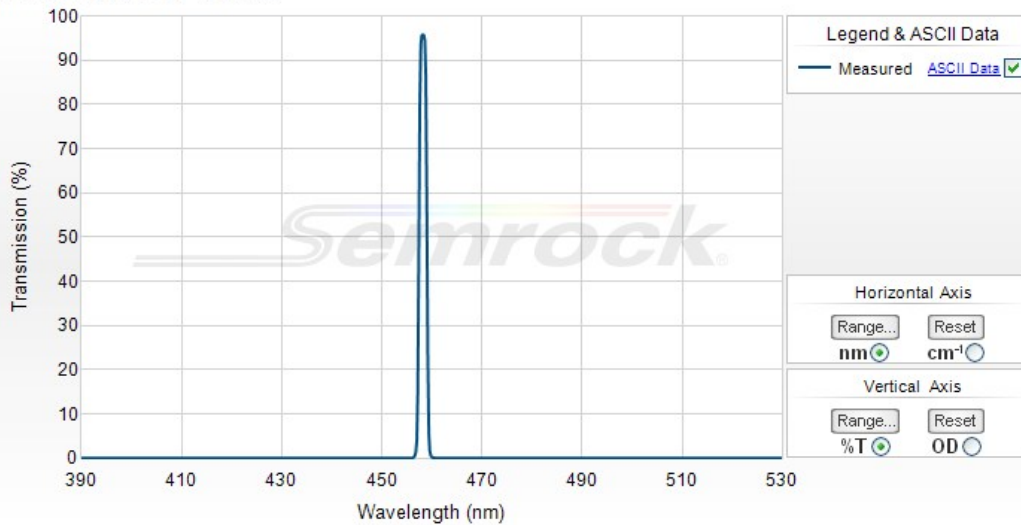


## 457.9 nm MaxLine® laser clean-up filter

Part Number: LL01-458-12.5



### Semrock, Inc

3625 Buffalo Road, Suite 6  
Rochester, New York 14624

Main Phone: +1 585.594.7050 (worldwide)  
Toll Free Phone: 866.736.7625 (866-SEMROCK)  
(within US and Canada)

Your filter spectrum may differ slightly from the typical spectrum above, but is certified to meet the optical specifications noted below.



### 457.9 nm MaxLine® laser clean-up filter

MaxLine laser-line filters transmit greater than 90% of the light at a precisely defined laser line, while offering incredibly steep edges to eliminate optical noise from non-lasing (plasma) lines and spontaneous emission.

Part Number	Size	Price <sup>1</sup>	Stock Status
LL01-458-12.5	12.5 mm x 3.5 mm	\$305	In Stock
LL01-458-25	25 mm x 3.5 mm	\$610	In Stock

Don't see a size you need? Contact us for custom sizing – available in less than a week (sizing fee applies).

1) US domestic pricing only. If you are ordering from outside the US, please contact your nearest [regional distributor](#) for the correct list price.

### Optical Specifications

Specification	Value
Transmission Band 1	Tab <sub>s</sub> > 90% 457.9 nm
Center Wavelength 1	457.9 nm
Guaranteed Minimum Bandwidth 1	Transmission guaranteed for laser wavelength only
FWHM Bandwidth 1 (nominal)	1.7 nm (typical); 3.2 nm (maximum)
Blocking Band 1	OD <sub>abs</sub> > 5 393.1 – 453.3 nm
Blocking Band 2	OD <sub>abs</sub> > 6 421.3 – 451 nm
Blocking Band 3	OD <sub>abs</sub> > 6 464.8 – 503.7 nm
Blocking Band 4	OD <sub>abs</sub> > 5 462.5 – 576.7 nm

### General Filter Specifications

Specification	Value
Laser Wavelength 1	457.9 nm
Angle of Incidence	0 ± 2 degrees
Cone Half-angle	0.5 degrees
Optical Damage Rating	0.1 J/cm <sup>2</sup> @ 532 nm (10 ns pulse width)
Effective Index	1.98

### Physical Filter Specifications (applies to standard sized parts; contact us regarding other sizes)

Specification	Value
Transverse Dimensions (Diameter)	12.5 mm
Transverse Dimensions 2 (Diameter)	25 mm
Transverse Tolerance (mounted)	+ 0.0 / - 0.1 mm
Filter Thickness (Mounted)	3.5 mm
Filter Thickness Tolerance (Mounted)	± 0.1 mm

Clear Aperture	$\geq 10$ mm
Clear Aperture 2	$\geq 22$ mm
Scratch-Dig	60-40
Substrate Thickness (unmounted)	2.0 mm
Substrate Thickness Tolerance (unmounted)	$\pm 0.1$ mm
Orientation	Arrow on ring indicates preferred direction of propagation of light