

# **Fast Axis Collimator**

# FAC570 FS



#### **Features and Advantages**

Acylindrical biconvex lens for the collimation of the fast axis of diode lasers. The lens is made of fused silica and optimized for high power transmission so that it withstands powers of 300 W or even higher.

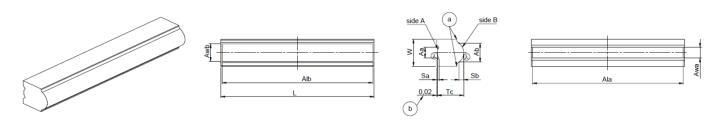
### **Product Specifications**

Specification Data	Unit	Value
Material		Fused Silica
Width (W)	mm	$1.0 \pm 0.05$
Thickness (T)	mm	$0.96 \pm 0.05$
Refractive index n @ 450 nm		1.466
Effective focal length (EFL) @ 450 nm	mm	0.57
Back focal length (BFL) @ 450 nm	mm	0.17
Numerical aperture (NA)		0.58
Transmission / AOI	%1°	> 99 / 0-30
Power within an angle of ± 1.1 mrad <sup>(1)</sup>	%	> 90

<b>Product Code</b>		ZLE002217 <sup>(3)</sup>	ZLE002150	ZLE002284 <sup>(3)</sup>	ZLE002270 <sup>(3)</sup>
Specification Data	Unit	Value			
Length (L)	mm	$14.0 \pm 0.1$	$5.6 \pm 0.1$	$4.0 \pm 0.1$	14.0 ± 0.1
Clear aperture (Side A)	mm²	13.0 x 0.4	$5.0 \times 0.4$	3.8 x 0.4	13.0 x 0.4
Clear aperture (Side B)	mm²	13.0 x 0.65	$5.0 \times 0.65$	3.8 x 0.65	13.0 x 0.6
AR-Coating	nm	400 - 480	400 - 480	400 - 480	790 - 990
Surface imperfections		5/5x0.025; C2x0.04;	5/5x0.025; C2x0.04;	5/2x0.1; C2x0.1;	5/5x0.025; C2x0.04;
(DIN ISO 10110-7)		L2x0.025; E <sup>(2)</sup>	L2x0.025; E <sup>(2)</sup>	L2x0.025; E <sup>(2)</sup>	L2x0.025; E <sup>(2)</sup>

<sup>(1)</sup> Valid for an emitter-height of 1µm and no smile of the laser diode.

### **Product Drawing (mm)**



Rev 02 | Updated April 16, 2021 | RoHS compliant 2011/65/EU and 2015/863/EU

<sup>(2)</sup> Chipping on short edge 0.2, chipping on long edge 0.08.

 $<sup>^{\</sup>rm (3)} \, {\rm Example}$  for customization — design, dimensions & coatings on request.