RoHS

**Rod Lenses are cylindrical lenses with polished on its circumference surface. These are used in several applications including laser focusing beam into a line, changing beam shape into sheet-shape or irradiating at a distance with elongated line.**

- Focal length shortened by reducing the rod lense diameter compared to cylindrical lenses.
- Precise processing and polishing yields distortion-free, flex free straight line gain when projection is made from a distance.
- Suitable for collecting large amount of light when installed it in front of a line sensor.

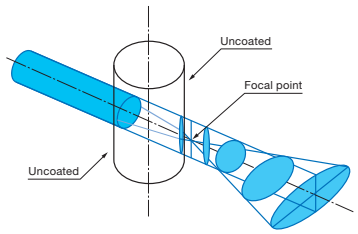
## Specifications

| | |
|---|---|
| Material | BK7 |
| Design wavelength | 546.1nm |
| Polish | Rod circumference surface polished |
| Coating | Uncoated |
| Surface Quality (Scratch–Dig) | 40–20 |

## Guide

- Please contact our Sales Division for rod lens with AR coating requirements.
- Contact our Sales Division for customized products. (customized on outer diameter, length, etc.)
- Use MLH-10 (Small Lens Claw) or MLH-SF (Selfoc® Lens Claws) to hold cylindrical lens.

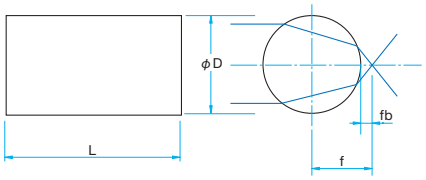
## Schematic




## Attention

- Align the beam on the circumference sufrace for proper use.
- Notable spherical aberration may occur due to the small curvature of rod lenses it is recommended that you use cylindrical lenses for precise optical systems.
- When diverging laser beam through rod lenses, operators' eyes may be exposed to diverged beam. Make sure to check the power of laser and to apply safety goggles before using rod lenses.
- Rod lenses are not chamfered use caution when handling the product.

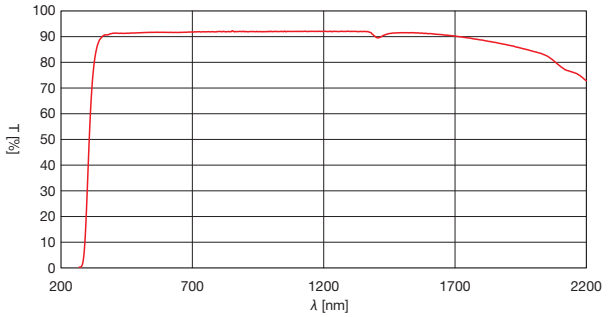
## Outline Drawing (in mm)




●Tolerance
Diameter $\phi D^{+0}_{-0.05}$
Length L ±0.1

## BK7(Uncoated) Typical Transmittance Data

T: Transmission




## Specifications

| Part Number | Diameter ϕD [mm] | Length L [mm] | Focal length f [mm] | Back focal length fb [mm] |
|---|---|---|---|---|
| **RODB-03L06** | ϕ3 | 6 | 2.2 | 0.7 |
| **RODB-03L08** | ϕ3 | 8 | 2.2 | 0.7 |
| **RODB-03L10** | ϕ3 | 10 | 2.2 | 0.7 |
| **RODB-04L06** | ϕ4 | 6 | 2.9 | 0.9 |
| **RODB-04L08** | ϕ4 | 8 | 2.9 | 0.9 |
| **RODB-04L10** | ϕ4 | 10 | 2.9 | 0.9 |
| **RODB-05L06** | ϕ5 | 6 | 3.7 | 1.2 |
| **RODB-05L08** | ϕ5 | 8 | 3.7 | 1.2 |
| **RODB-05L10** | ϕ5 | 10 | 3.7 | 1.2 |

## Compatible Optic Mounts

MLH-10 / MLH-SF + MLH-10ADP-2 + FOP-1