



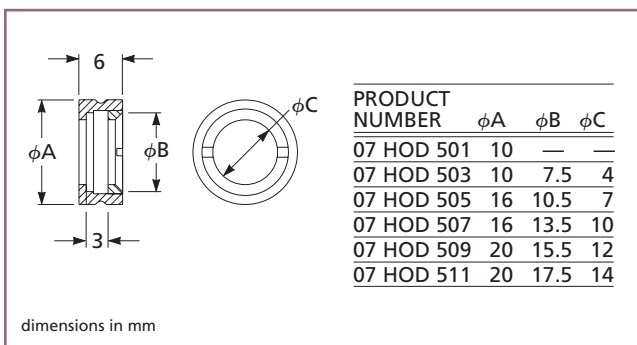
Available in:
✓ Production Quantities

Optical Component Cells and Holders

Optical Component Cells

- Convenient mounting of lenses and other miniature optics
- For 5- to 17.5-mm-diameter optics
- Standard 10-, 16-, and 20-mm cells
- Prism/tilt table
- Polarizer holders

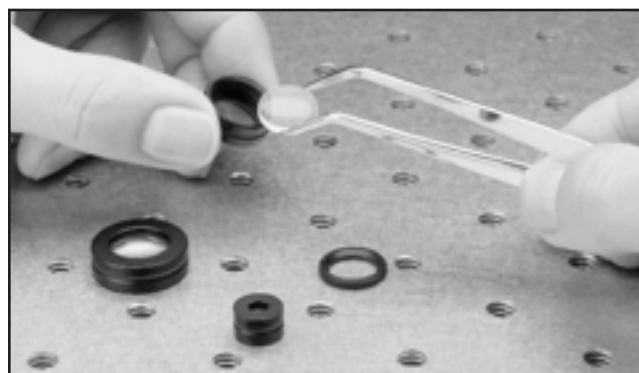
These cells are designed to hold lenses and other components for easier handling while mounting. There are three basic cell outer diameters: 10, 16, and 20 mm. The cells cover a component diameter range of from 5 to 17.5 mm. The optic is securely held in the cell with a retaining ring. A solid 10-mm-diameter cell is available for those wishing to machine a custom mount. The cells are made of black anodized aluminum.



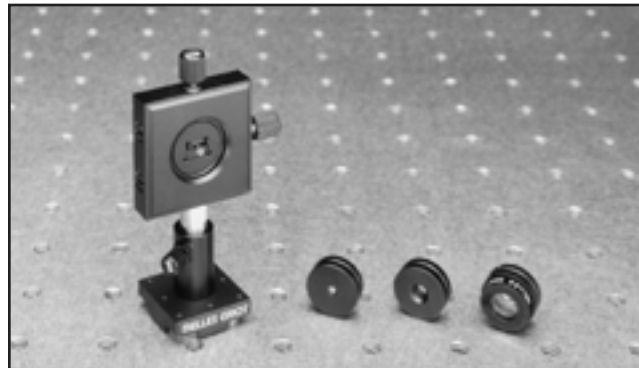
Optical component cells

Optical Component Cells

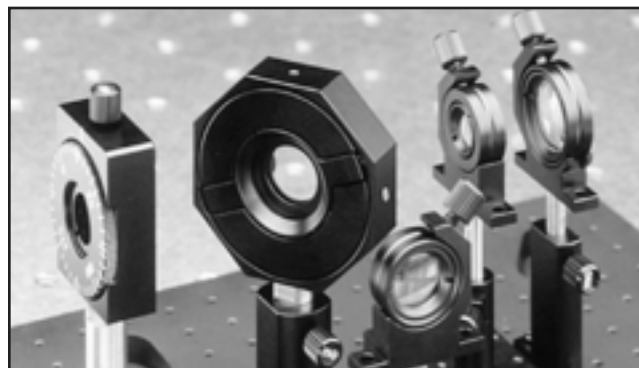
Outer Diameter (mm)	Component Diameter Range (mm)	ϕC Clear Aperture (mm)	Maximum Edge Thickness (mm)	PRODUCT NUMBER
10	Solid	—	—	07 HOD 501
10	5–7.5	4	3	07 HOD 503
16	8–10.5	7	3	07 HOD 505
16	11–13.5	10	3	07 HOD 507
20	13–15.5	12	3	07 HOD 509
20	15–17.5	14	3	07 HOD 511



Mounted optics are easier to handle



Y-Z positioning for optical component cells

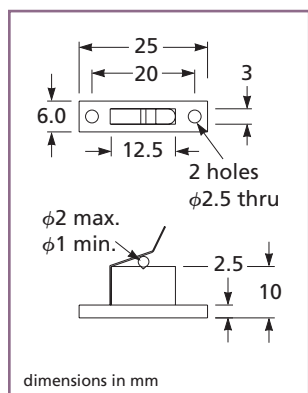


Mounting of optical component cells

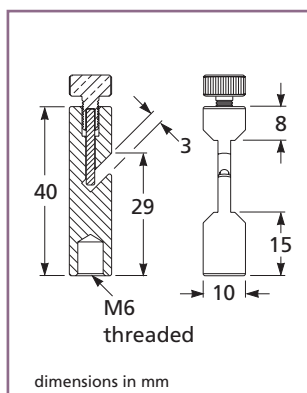


Gradient-Index Lens Holders

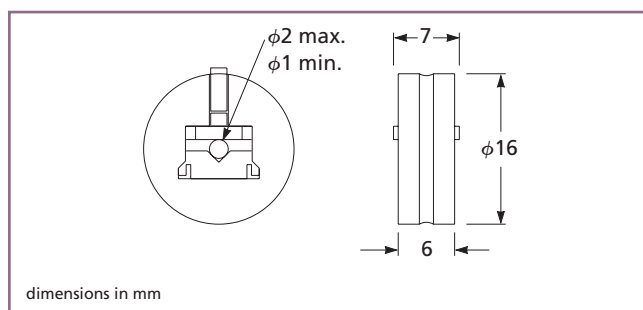
The 07 HGH 501 gradient-index lens holder is designed to be mounted in 16-mm cell holders. The lens is clamped in a removable nylon V-groove by a set screw that pushes against a nylon pad. Two V-grooves are supplied, one for 1-mm lenses and the other for 1.8- to 2-mm lenses. The 07 HGI 505 lens holder has an integral base and a small V-groove with a stainless steel spring clip to hold the lens.



07 HGI 505 lens holder with integral base



07 HGI 021 post mountable lens holder



07 HGH 501 lens holder for 16-mm cell holders

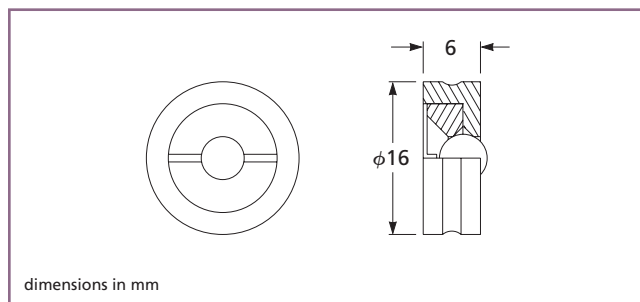
Gradient-Index Lens Holders

	PRODUCT NUMBER
For 16-mm Cell Holders	07 HGH 501
Spring Clip with Integral Base	07 HGI 505
Post Mountable	07 HGI 021



Spherical Ball Lens Holders

The spherical ball lens holders are designed to be mounted in 16-mm cell holders. Once mounted, the lenses can be aligned using the y-z positioner. Three mounts are offered, one for each size of ball lens: 2, 3, and 5 mm. The ball lenses are securely held in the cell with a retaining ring. The ball protrudes from one side of the mount allowing close access to the lens. The spherical ball lens holders are made of black anodized aluminum.



07 HCS spherical ball lens holder

Spherical Ball Lens Holders

	PRODUCT NUMBER
For 2-mm-Diameter Spheres	07 HCS 505
For 3-mm-Diameter Spheres	07 HCS 507
For 5-mm-Diameter Spheres	07 HCS 509

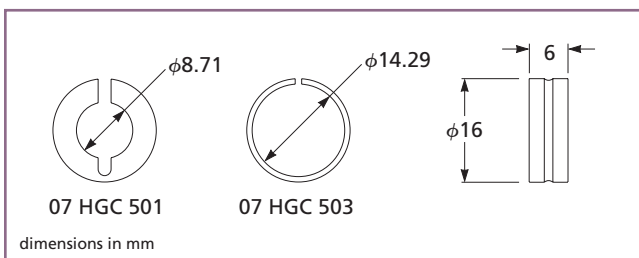
MICRO OPTICS

Melles Griot's extensive range of micro optics is outlined in Chapter 23, *Micro Optics* and each product is further described in the appropriate optics section of this catalog (Chapters 6 to 14). This comprehensive line of micro optics includes mounted and unmounted singlet and doublet lenses, diode-laser lenses, gradient-index lenses, spherical ball lenses, mirrors, prisms, beamsplitters, filters, and polarization components.

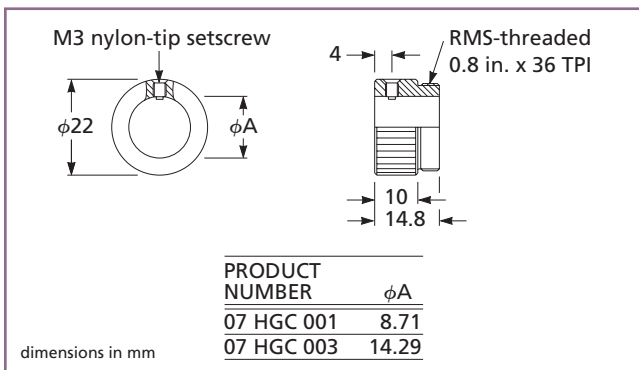


Lens Holders for 06 GLC Lenses

The 06 GLC Collimating and Focusing Lenses described in Chapter 14, *Diode Laser Optics*, are either 8.71 mm or 14.29 mm in diameter. The 07 HGC 501 and 503 lens holders adapt these lenses for mounting in a 16-mm cell holder. Once mounted, the lens can be aligned using the y-z positioner. The 17 HGC 001 and 003 are designed for mounting in a microscope objective lens holder. Both types of holders are made of black anodized aluminum.



Lens holders for 16-mm cell holders



Lens holder for microscope objective holders

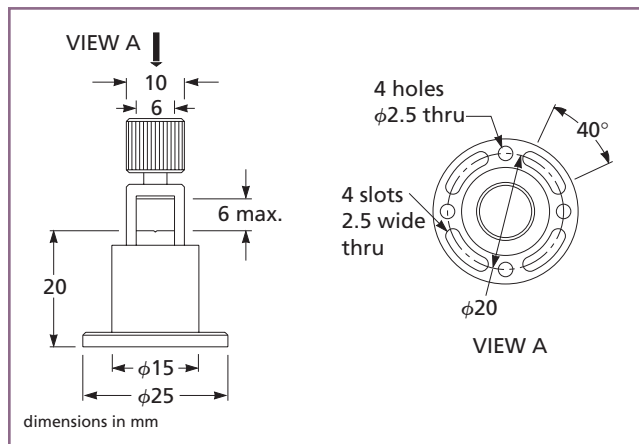
06 GLC Lens Holders

	Lens Diameter mm	PRODUCT NUMBER
16-mm Cell Holders	8.71	07 HGC 501
	14.29	07 HGC 503
For Microscope Objective Holders	8.71	07 HGC 001
	14.29	07 HGC 003



Microcomponent Holder

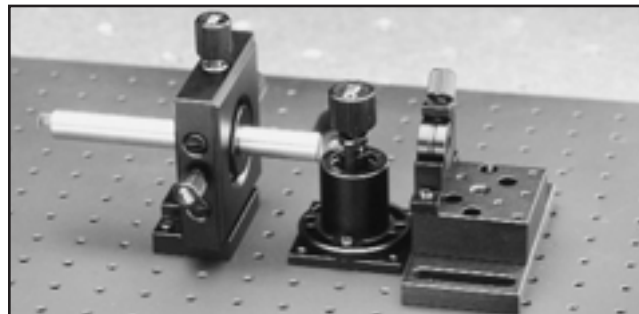
This mount is designed to hold a variety of microcomponents. When the spring-loaded knob is pulled up, a component can be placed on the platform, which has a small V-groove. When the knob is slowly released, a nylon pad clamps the component down to the platform. The base has both M2-clearance holes for mounting and slots for rotation. The microcomponent holder is made of black anodized aluminum.



07 HMC 501 microcomponent holder

Microcomponent Holder

	PRODUCT NUMBER
Microcomponent Holder	07 HMC 501

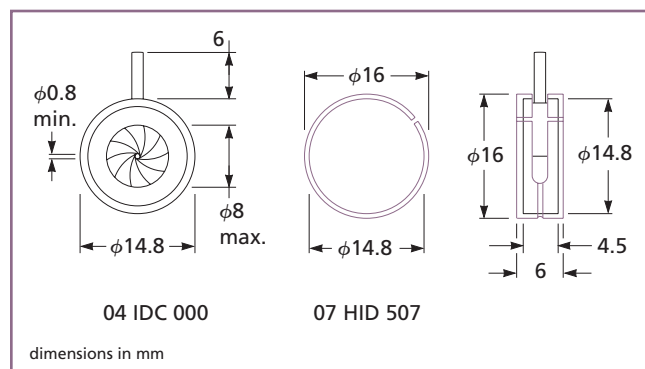


Microcomponent holder with fiber-optic chuck

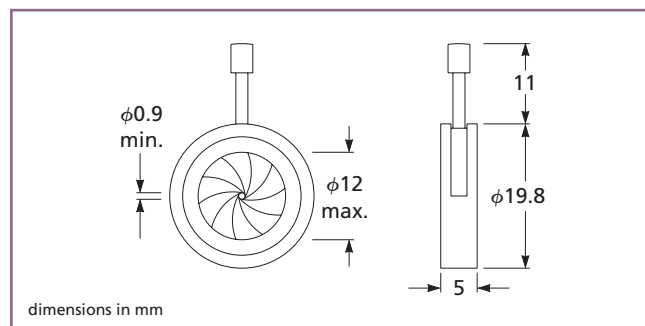


Iris Diaphragms

These two iris diaphragms mount in the 07 HOC series cell holders with integral base (see Chapter 24, *Lens, Filter, and Polarizer Mounts*). The 04 IDC 000 iris diaphragm, 14.8 mm in diameter, requires an 07 HID 507 adaptor ring to be able to mount in the 16-mm cell holders. The adaptor ring has a slot to enable adjustment of the actuating pin. The 04 IDC 001 iris diaphragm mounts directly into 20-mm cell holders.



Iris diaphragms for 16-mm cell holders



04 IDC 001 iris diaphragm for 20-mm cell holders

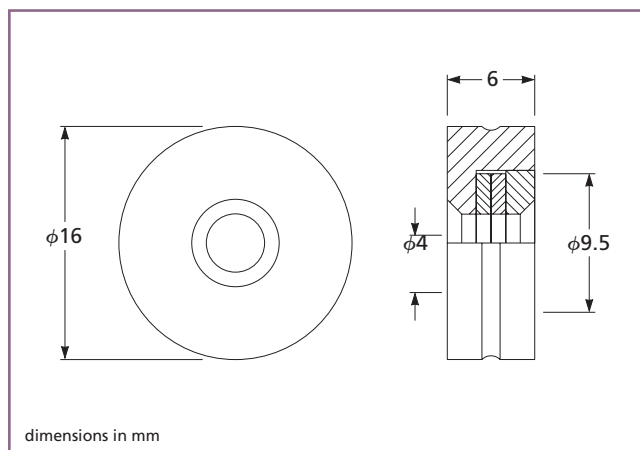
Iris Diaphragms

	PRODUCT NUMBER
Iris Diaphragm for 16-mm Cell Holders	04 IDC 000
Adaptor Ring for 04 IDC 000 (fits 16-mm cell holders)	07 HID 507
Iris Diaphragm (for 20-mm cell holder)	04 IDC 001

Pinhole/Slit Holder

Unmounted 9.5-mm-diameter precision pinholes or slits can be mounted in this 16-mm-diameter cell. Once mounted, pinholes and slits are much easier to handle and can be aligned using the y-z positioner described on page 20.16.

The pinhole or slit is placed between two nylon washers which are held in the mount by a retaining ring. The pinhole/slit holder is made of black anodized aluminum.



07 HPI 501 pinhole/slit holder

Pinhole/Slit Holder

	PRODUCT NUMBER
Pinhole/slit holder	07 HPI 501

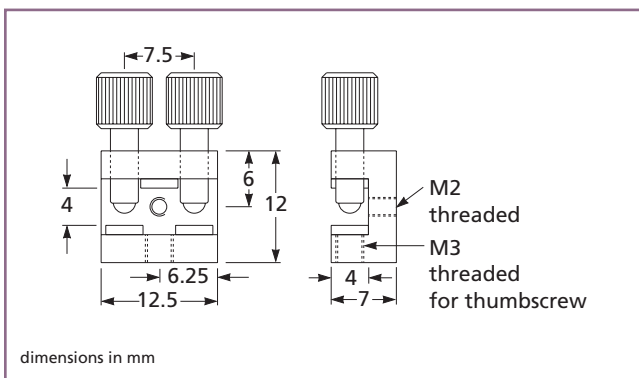
PINHOLES AND SLITS

Melles Griot offers standard diameter pinholes ranging from 1 to 1000 μm . Slits are available in standard widths ranging from 5 to 200 μm . All slits are 3 mm long. The pinholes and slits are all laser drilled in very thin 9.5-mm-diameter stainless steel substrates. See Chapter 29, *Microscope Components, Spatial Filters, and Apertures* for further details.



Filter Holder

This filter holder is designed to hold any flat optical component less than 4 mm in thickness. The optic can be round or square, large or small. Two nylon-tipped thumbscrews hold the filter against nylon pads. For smaller components, one central thumbscrew can be used. An M2-threaded hole is provided for post mounting. The filter holder is made of black anodized aluminum.



07 HFP 501 Filter holder

Filter Holder

	PRODUCT NUMBER
Filter Holder	07 HFP 501



Adjustable Lens Holder

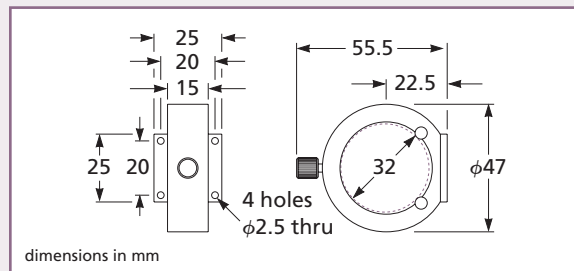
Optical components in a diameter range of from 5 to 15 mm can be mounted in this holder. The bottom has two sides, one side for round optics and the other for square optics. The vertical posts are simply threaded into either side. There is a central M2-threaded hole for post mounting and two M2-clearance holes for base mounting. This holder is made of black anodized aluminum and stainless steel.

Adjustable Lens Holder

	PRODUCT NUMBER
Adjustable Lens Holder	07 LHA 511

LASER HOLDER

This mount is designed to hold 32-mm-diameter diode or helium neon lasers, such as the 06 DAL 001 or 05 LLR 811.



07 HLJ 501 laser holder



Laser holder with 06 DAL 001 diode laser

	PRODUCT NUMBER
Laser Holder	07 HLJ 501