
vicotar[®] Telecentric Lens - TO125/28.5-190-V-BW

Short description:	Telecentric Lens, M42, Sensor max. DX, aperture F10 - F22, blue
Order number:	2-05-855
EAN:	4251692621721
Actual Notice:	Also available with fixed aperture on request. (F-numbers in the range as for adjustable aperture)



Characteristics

- telecentric measurement objective with object-sided telecentric beam path
- color corrected for the visible spectral range and near infrared
- color correction extended deep into the blue spectral range
- very well suited for blue LEDs including "Deep Blue" LEDs
- thus especially suitable for white LEDs, as these have a strong blue light component
- high resolution, low lateral chromatic aberration, low distortion, low telecentric error
- adjustable aperture with identification of the aperture numbers, arrestable
- robust industrial design
- with lens adapter (5-00-012), the lens connection M40x0.75 is also possible
 - without restriction of the optical properties (back focal distance = 17.526 mm)

Technical data

Image scale	0.227
Spectral range	400 nm - 900 nm
Working distance	190 mm
Camera distance (object-camera flange)	521.3 mm
Object field diagonal (max)	125 mm
Sensor format (max)	Type DX
Image field diagonal (max)	28.5 mm
Suitable for camera resolution	119.4 MPixel
Recommended pixel size	1.76 µm
Aperture	variable (F10 - F22)
Lens mount	M42x1 (Auflagemaß 45.46 mm)
Weight	3030 g
Usable object field with:	
• Sensor type DX (23.7 x 15.6 mm ²)	104.4 mm x 68.7 mm
• Sensor type 4/3 (17.3 x 13.0 mm ²)	76.2 mm x 57.3 mm
• 1" sensor (12.8 x 9.6 mm ²)	56.4 mm x 42.3 mm

Notices

The lightings combination products shown are a selection. Depending on the application, other colors and light source types can also be used.

Can be combined with

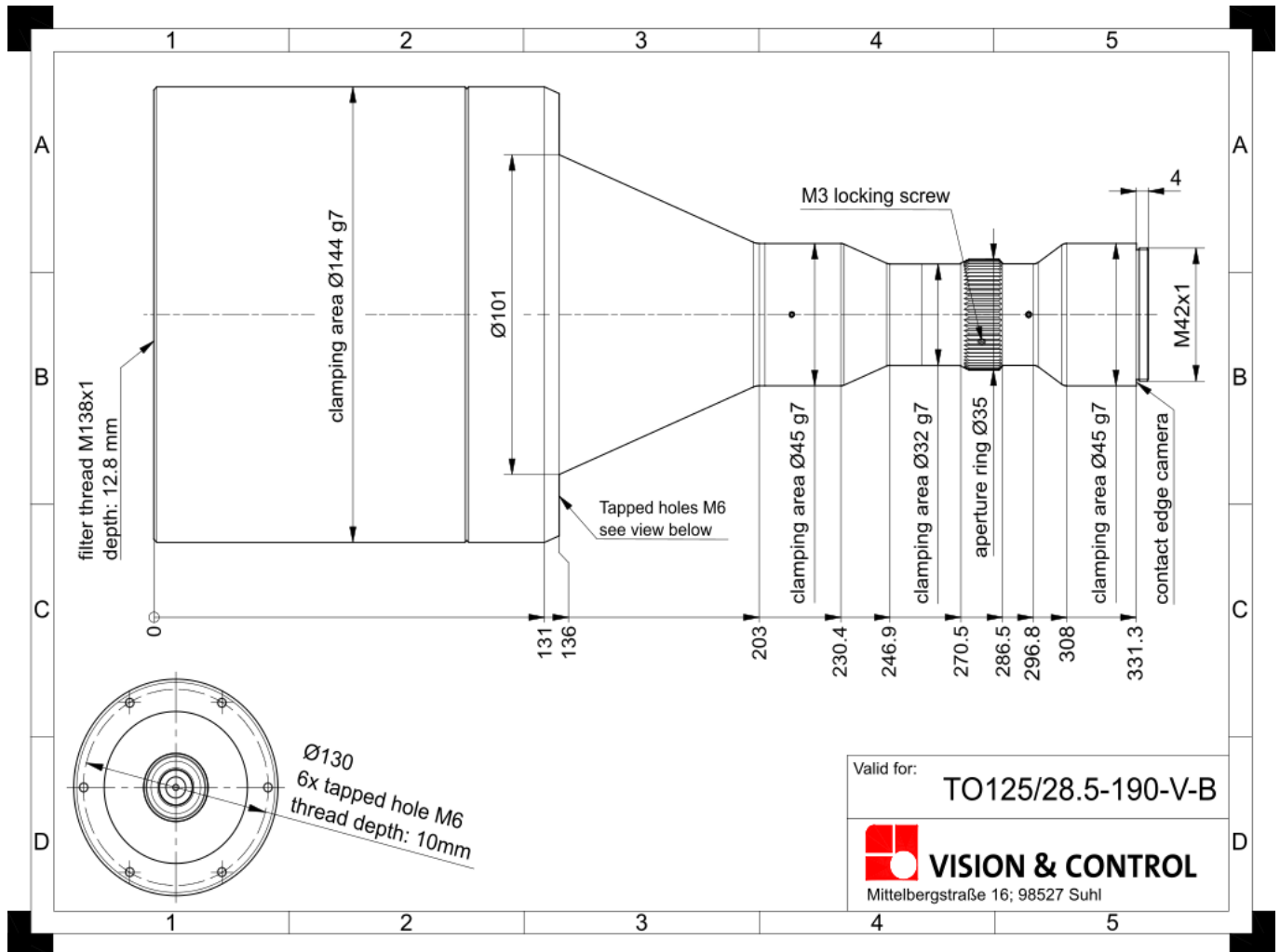
Order number	Title	Description
<i>TZB130 series</i>		
1-10-187	TZB130-B470-24V	telecentric light, blue, If diameter: 130 mm, static, cable open-ended
1-10-195	TZB130-W5K7-24V	telecentric light, white, If diameter: 130 mm, static, cable open-ended
1-10-189	TZB130-IR880-24V	telecentric light, IR850, If diameter: 130 mm, static, cable open-ended
1-10-185	TZB130-R625-24V	telecentric light, red, If diameter: 130 mm, static, cable open-ended
1-10-077	TZB130-G525-24V	telecentric light, green, If diameter: 130 mm, static, cable open-ended
<i>TZB130-UDC-a Serie</i>		
1-10-956	TZB130-B470/UDC/-a	telecentric light, blue, If diameter: 130 mm, flashable by flash controller
1-10-957	TZB130-W5K7/UDC/-a	telecentric light, white, If diameter: 130 mm, flashable by flash controller
1-10-958	TZB130-IR880/UDC/-a	telecentric light, IR850, If diameter: 130 mm, flashable by flash controller
1-10-955	TZB130-R625/UDC/-a	telecentric light, red, If diameter: 130 mm, flashable by flash controller
1-10-959	TZB130-G525/UDC/-a	telecentric light, green, If diameter: 130 mm, flashable by flash controller
<i>R-CLR-132-SL series</i>		
1-33-017	R-CLR-132x104-B470-SL	ring light, blue, coaxial, If diameter: 104/132 mm, smart light technology
<i>RK5268-24V series</i>		
1-29-802	RK5268-B470-24V/C	ring light, blue, coaxial, If diameter: 104/132 mm, controlled, pot.: 0-10V,

Accessories for Telecentric Lenses - T0125/28.5-190-V-BW

Order number	Title	Description
<i>Lens mount</i>		
2-91-331	Mounting angle	Holder for telecentric lenses and lightings with with threaded hole M5
2-91-332	Mounting angle SH	Holder for telecentric lenses and lightings with with slotted hole for M4-M6
2-91-330	Lens Holder d45 wide	Holder for telecentric lenses and lightings with d = 45 mm, width = 32 mm
2-91-335	Mounting Bracket TO88 SH	Holder for telecentric lenses of the series TO88 with slotted hole for M4-M6
2-91-336	Mounting Bracket TO125	Holder for telecentric lenses of the series TO125 with threaded hole M5
<i>Extension tubes</i>		
2-90-415	Extension ring 0.5 mm	26 x 31 x 0.5 reduces the minimum object distance (MOD)
2-90-416	Extension ring 1.0 mm	26 x 31 x 1.0 reduces the minimum object distance (MOD)
2-90-419	Extension ring 0.1 mm	25.5 x 29 x 0.1 reduces the minimum object distance (MOD)
2-90-420	Extension ring 0.2 mm	25.5 x 29 x 0.2 reduces the minimum object distance (MOD)
<i>Lens adapter M42</i>		
5-00-012	Thread adapter M42x1-M40x0.75	Adapter for mounting lenses with M42x1 mount on cameras with M40x0.75
<i>Daylight blocking filter</i>		
2-91-324	IR filter M138x1	long-pass filter from 830 nm, daylight absorbing filter, filter thread M138x1
<i>Colour filter blue</i>		
2-91-294	Colour filter blue M138x1	band-pass filter, range 350 nm - 600 nm, filter thread M138x1
<i>UV Cut-Off Filter</i>		
2-91-326	UV blocking filter M138x1	long-pass filter from 350 nm, usable as protective glass, filter thread M138x1
<i>Colour filter red</i>		

Order number	Title	Description
2-91-323	Colour filter red M138x1	long-pass filter from 630 nm, red, filter thread M138x1
Colour filter green		
2-91-307	Colour filter green M138x1	band-pass filter, range 430 nm - 620 nm, filter thread M138x1
Colour filter yellow		
2-91-280	Colour filter yellow M138x1	long-pass filter from 530 nm, yellow, filter thread M138x1
Adapters for attaching lights to lenses		
1-29-876	Adapter ring d104 - M138x1	for R-CLR-132x104 and RK5268, for attachment to lenses with filter thread M138x1

Drawings



Dimensional drawing in mm