

# TC 23 144

## BI-TELECENTRIC LENS FOR DETECTORS UP TO 2/3"



<b>Model:</b>	<b>TC 23 144</b>	
<b>Magnification (X):</b>	0,061 +/- 3%	
<b>Object Field (mm):</b>	1/4" (3,6 x 2,7):	58,9 x 44,2
	1/3" (4,8 x 3,6):	78,6 x 58,9
	1/2" (6,4 x 4,8):	104,8 x 78,6
	1/1.8" (7,13 x 5,37):	116,7 x 87,9
	2/3" (8,8 x 6,6):	144,0 x 108,0
<b>Working Distance (mm):</b>	398,0 +/- 12	
<b>Working F-number:</b>	8	
<b>MTF @70 lp/mm (%):</b>	> 40	
<b>Field Depth (mm):</b>	160,0 @ F/ 8	
<b>Image side N.A.:</b>	0,062	
<b>Object side N.A.:</b>	0,004	
<b>Telecentricity (degree):</b>	< 0,08	
<b>Distortion (%):</b>	<0,08	
<b>Mount:</b>	C	
<b>Length (mm):</b>	482	
<b>Maximum external diameter (mm):</b>	200	
<b>Weigh (g):</b>	5770	

### ACCESSORIES AND OPTIONS:



**Collimated/Telecentric illumination:**  
compatible with LTCL144 illuminator;  
green light suggested.



**Coaxial illumination:**  
not available.



**Back Light illumination:**  
compatible with LTBK96 illuminator.



**Clamping Mechanics:**  
use the built-in holed flange to mount  
the lens.

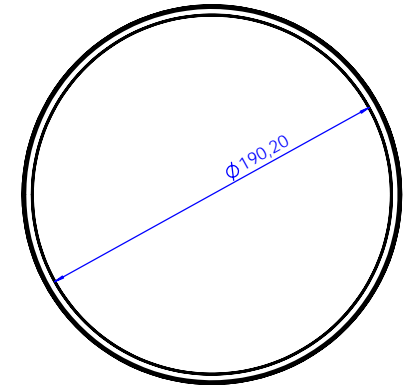
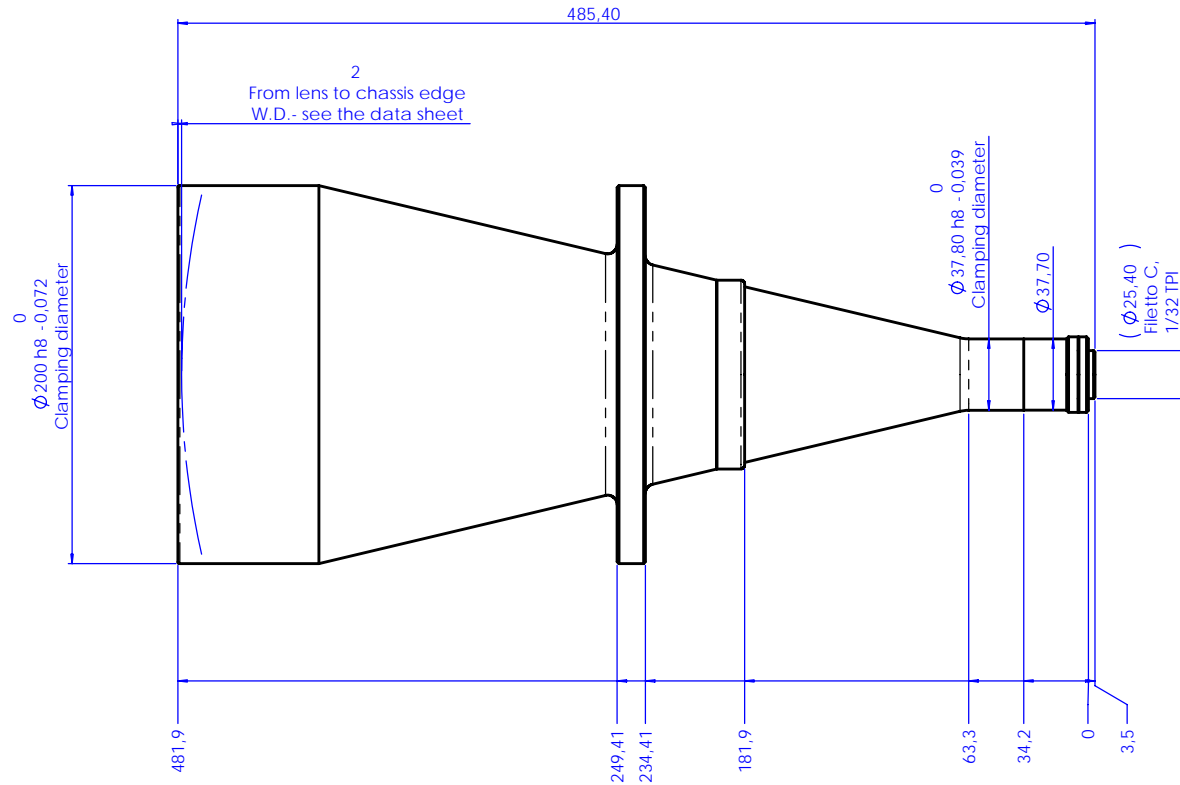
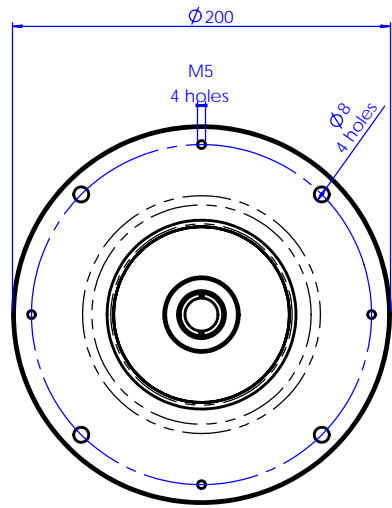


**Direct illumination:**  
not available.



**Filters:**  
filters can be inserted in the rear part  
of the lens, by means of TC Filter Kit.

Rev No.	Description	Date	Name
A	First light	17/03/06	A.Vismara



Material	N.A.	Mass	5.77 kg	Scale	1:2
Surface treatment	N.A.	Project-Prod.Item/Instrument	Telecentric lens 23 144		
Geometrical tolerances (ISO 2768-2)		Class	K	Undimensioned Bevels	1x45°
Linear tolerance (ISO 2768-2)		Class	m	Undimensioned radii	R 0.5
0.5	>3-	>6-	>30-	>120	>400-
-3	6	30	120	400	1000
±0.1	±0.1	±0.2	±0.3	±0.5	±0.8
		Class	m	±1.2	±2
www.opto-engineering.com		Date	17/03/06		
Designed		17/03/06	A.Vismara		
Draw		17/03/06	A.Vismara		
Checked		x	C.Sedazzari		
Drawing No.		02351-0-A			Sheet
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