

Bi-telecentric lens for 39mm cameras (VCM71M series)

LS-VCM71M series · Telecentric lenses · 15 models



Bi-telecentric lens series for sensors up to 71M (39 mm dia.), F-Mount/Other. Models are named by object field of view (dia. mm); each lists magnification, working distance, F/#, MTF30, depth of field, distortion <0.1% and telecentricity <0.1°.

Features

- Matrix design with extremely high imaging quality
- Standard FOV from 26 to 240 mm, covering almost all industrial imaging applications
- Compatible with all C-mount cameras from 1/2.5" to 1.1", and F/M-mount cameras from 4/3" to 59 mm
- More than 168 standard types and hundreds of customised items
- Excellent F-number, high telecentricity, extremely low distortion, very large DoF
- Each lens comes with an imaging quality test report
- Lens mount with conveniently adjustable flange distance (AL)
- Matrix-design with extremely high imaging quality
- Compatible with all C mount cameras from 1/2.5" to 1.1", and F/M mount cameras from 4/3" to 59 mm
- Excellent F number, high telecentricity, extremely low distortion, super large DoF

Applications

- Industrial imaging applications (standard FOV 26 to 240 mm)

Common specifications

Max sensor size (dia. mm)	39(71M)
Distortion (% max)	<0.1
Telecentricity (deg max)	<0.1
Mount (selection chart)	F/M58
FOV range (dia. mm)	26 - 240
Telecentricity (° max)	<0.1
Mount	F-Mount/Other

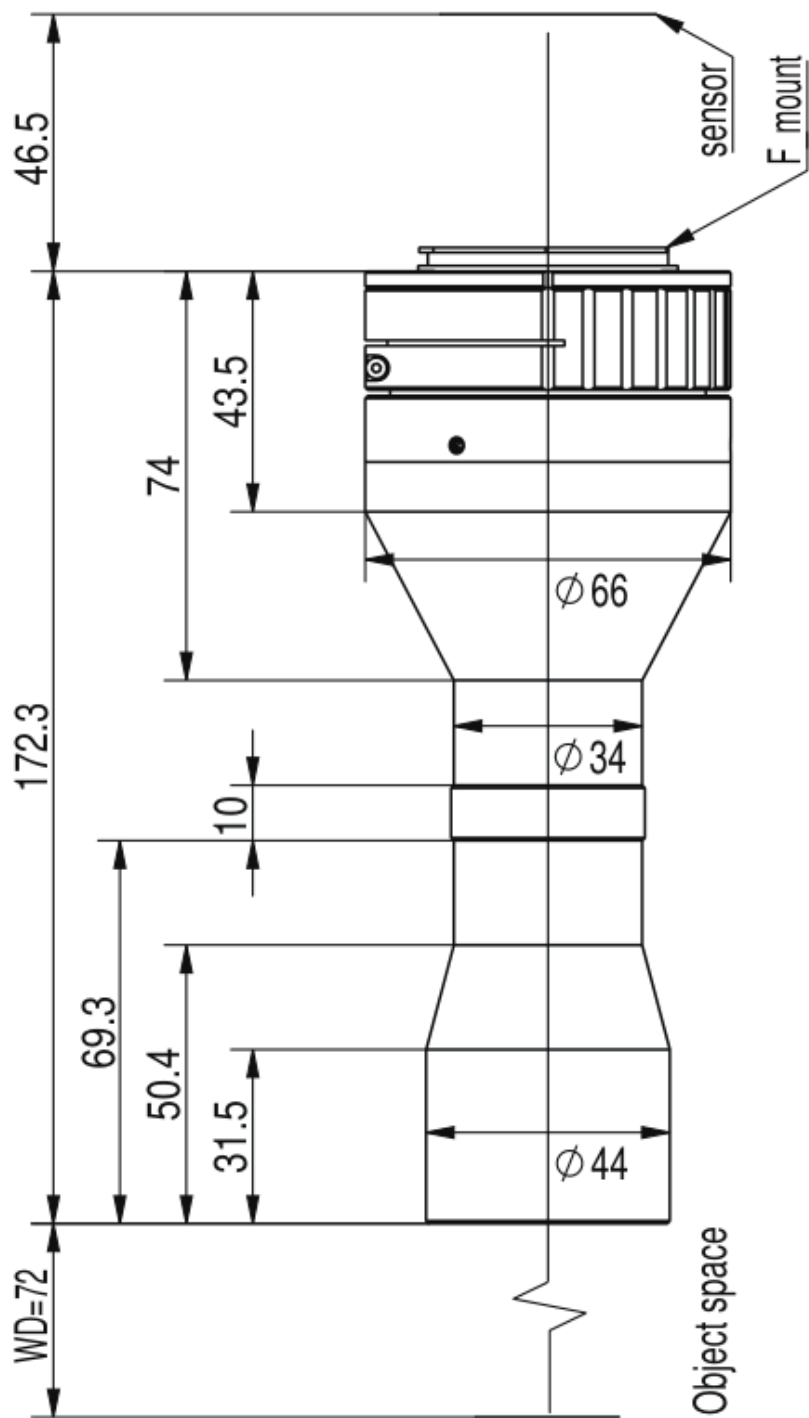
Ordering code: VCM71M-<FOV diagonal mm, P variant>-AL (LS-VCM125-64-AL: 125 = largest compatible sensor 1/2.5", 64 = diagonal of FOV 64 mm, AL = lens mount with adjustable flange distance)

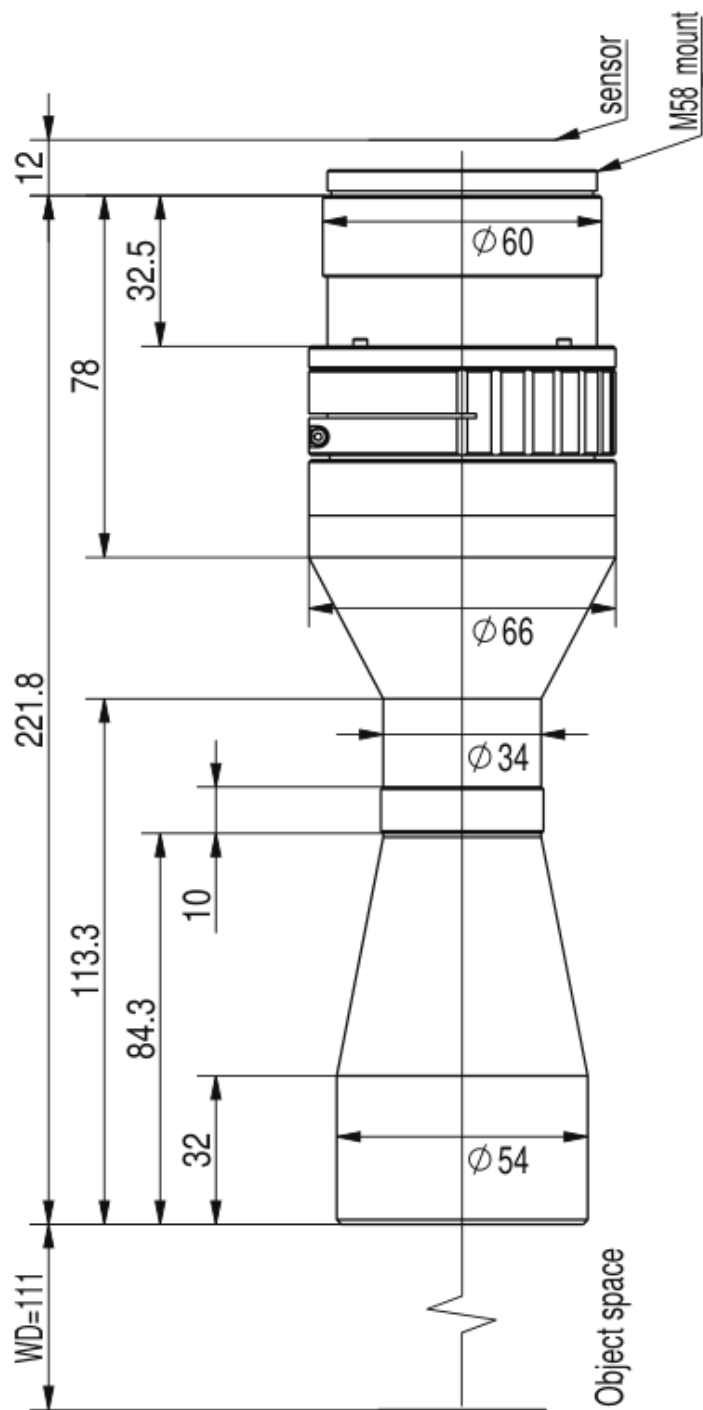
Models

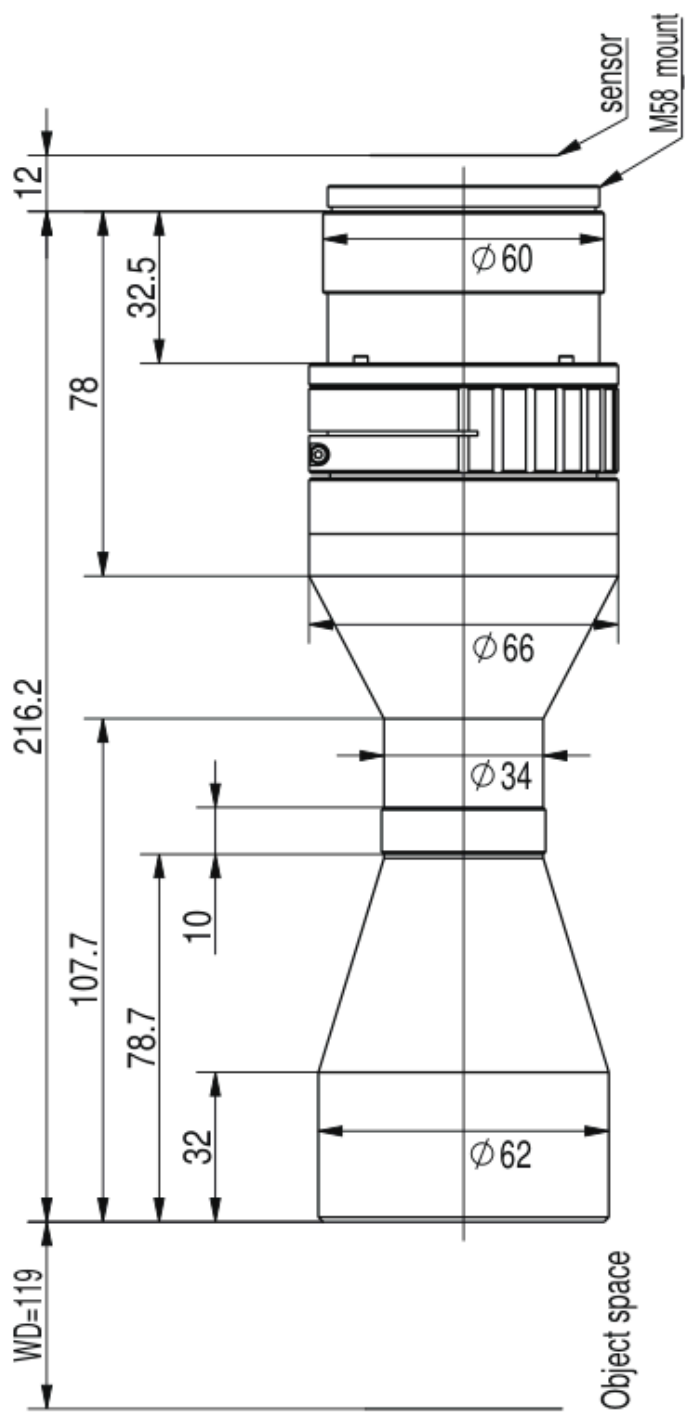
Model	FOV (dia. mm)	Mag. (x)	WD (mm)	F/#	MTF30 (lp/mm)	DoF (mm)	I/O (mm)
LS-VCM71M-26-AL	26	1.503	72±2	20.4	>55	±1	291
LS-VCM71M-36-AL	36	1.080	111±2	18	>65	±1	345
LS-VCM71M-42-AL	42	0.929	119±2	15.5	>75	±1	347.1
LS-VCM71M-48-AL	48	0.814	128±2	15	>70	±1	368
LS-VCM71M-56-AL	56	0.698	138±2	10	>80	±1	399.6
LS-VCM71M-64-AL	64	0.613	187±2	18	>35	±3.5	437.8
LS-VCM71M-64P-AL	64	0.610	159±2	10	>70	±1.5	427
LS-VCM71M-72-AL	72	0.543	178±2	10.5	>70	±2	472
LS-VCM71M-80-AL	80	0.487	229±2	15	>65	±4.5	513.2
LS-VCM71M-100-AL	93	0.419	254±3	15	>70	±5	554.8
LS-VCM71M-110-AL	111	0.351	251±3	8.5	>80	±3	610.3
LS-VCM71M-136-AL	136	0.287	288±4	7	>80	±4.5	765
LS-VCM71M-150-AL	150	0.261	301±4	10	>85	±5	739.5
LS-VCM71M-170-AL	170	0.230	318±4	6.5	>85	±5.5	821.8
LS-VCM71M-240-AL	240	0.163	410±5	6.5	>80	±10	1066.8

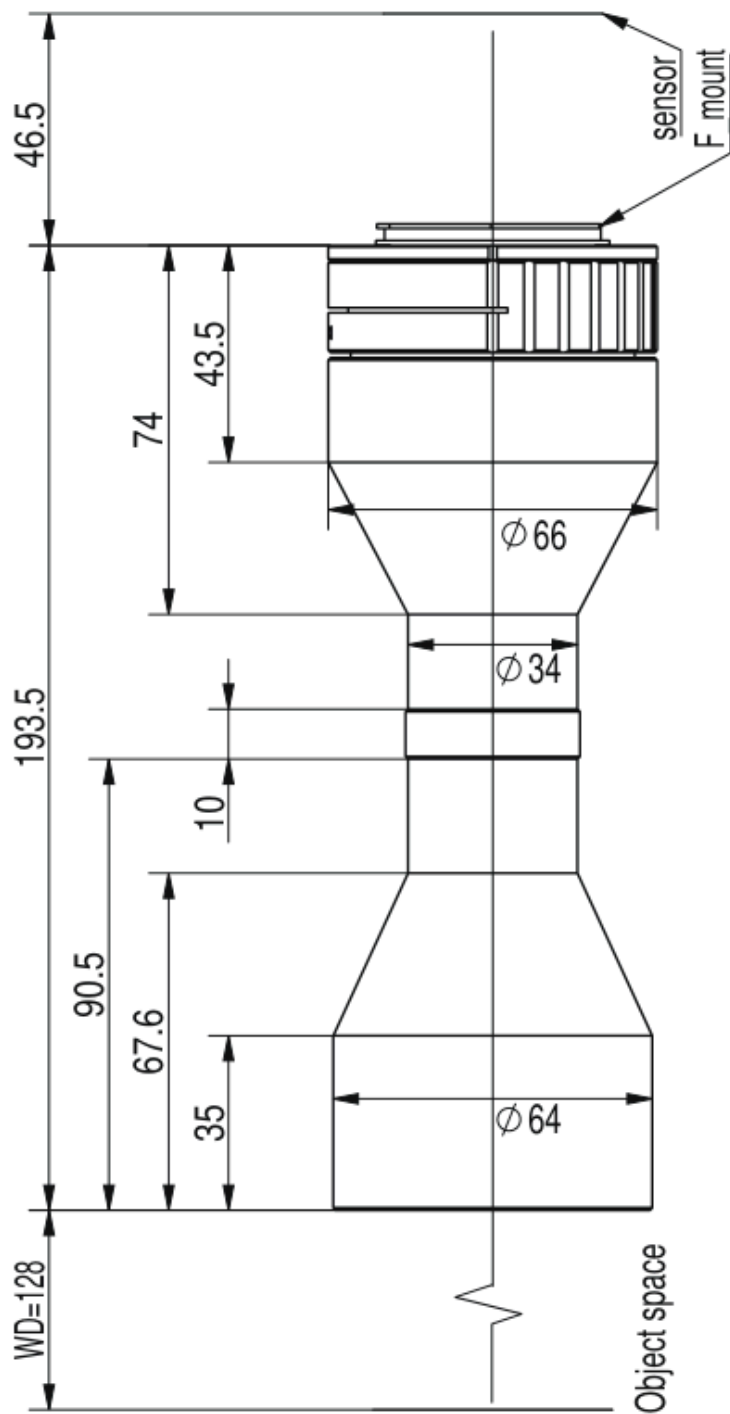
More values per model (Length (mm), Weight (kg), Mount shown in drawing, Field of view on CHR70M(31.0x21.7) (mm), Magnification (x), Working distance (mm), Depth of field (mm), Field of view on CHR70M(31.0x21.7) (mm x mm), Field of view (dia. mm), Object-to-image distance I/O (mm), Field of view with CHR70M(31.0x21.7) (mm), Model (spec table)...) are on each product page.

Dimensions









Performance

FOV (mm)		26	36	42	48	56	64	64P	72.00	80	100	110	136	150	170	240	Mount
CCD (mm)	Mag(x)																
LS-VCM125 (1/2.5"7.2mm)	0.277	0.199	0.172	0.15	0.129	0.113	0.1122	0.1	0.09	0.0771	0.0647	0.0529	0.048	0.0424	0.03	C	
	0.309	0.2217	0.192	0.167	0.144	0.126	0.125	0.112	0.1002	0.0859	0.072	0.0589	0.054	0.0472	0.0334	C	
	0.348	0.25	0.217	0.188	0.162	0.142	0.141	0.126	0.113	0.097	0.082	0.066	0.061	0.053	0.038	C	
LS-VCM118 (1/1.8"9.0mm)	0.409	0.293	0.252	0.221	0.19	0.166	0.165	0.147	0.132	0.114	0.095	0.078	0.071	0.063	0.044	C	
LS-VCM238 (2/3"11.4mm)	0.439	0.314	0.271	0.238	0.204	0.179	0.179	0.159	0.143	0.123	0.103	0.084	0.076	0.067	0.048	C	
LS-VCM110 (1"16.6mm)	0.641	0.461	0.396	0.347	0.298	0.26	0.26	0.231	0.208	0.179	0.15	0.122	0.111	0.098	0.069	C	
LS-VCM111 (1"18.4mm)	0.72	0.516	0.444	0.389	0.334	0.293	0.292	0.26	0.233	0.201	0.168	0.138	0.125	0.11	0.078	C	
LS-VCM176 (1.75"29mm)	1.115	0.798	0.686	0.603	0.517	0.456	0.452	0.401	0.36	0.312	0.261	0.214	0.193	0.171	0.12	F/M42	
LS-VCM218 (2"33mm)	1.269	0.912	0.781	0.687	0.589	0.518	0.514	0.458	0.412	0.354	0.296	0.242	0.22	0.194	0.137	F/M42	
LS-VCM71M (39mm)	1.503	1.08	0.929	0.814	0.698	0.613	0.61	0.543	0.487	0.419	0.351	0.287	0.261	0.23	0.163	F/M58	
LS-VCM30F (44mm)	1.503	1.208	1.0348	0.911	0.781	0.686	0.682	0.607	0.546	0.4681	0.3924	0.321	0.292	0.257	0.182	F/M58	
LS-VCM10K (59mm)	2.264	1.626	1.396	1.256	1.051	0.92	0.916	0.817	0.735	0.63	0.528	0.432	0.392	0.346	0.245	M72	
WD (mm)	72	111	119	128	138	187	159	178	229	254	251	288	301	318	410		

Product views

