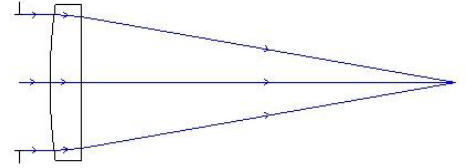


## CO<sub>2</sub> Laser Plano-Convex Lenses

### Specifications

Diameter tolerance:	+0/-0.004" (+0/-0.1 mm)
Thickness tolerance:	±0.004" (±0.1 mm)
Edge thickness variation:	≤ 0.002" (0.05 mm)
Focal length tolerance:	± 0.5%
Surface irregularity:	1/40 Lambda @ 10.6 μm
Surface quality:	20-10 Scratch-Dig
Clear aperture:	≥ 90%
Absorption:	0.10% - 0.20% depending on thickness
Transmission:	≥ 99.6% when AR/AR coated for 10.6 μm



Lens Type	Material	Diameter		Focal Length		Edge Thickness		BFL		Part No.						
		inch	mm	inch	mm	inch	Mm	inch	mm							
Plano - Convex	ZnSe	0.5	12.7	1.5	38.1	0.080	2.03	1.455	37.0	ZnSe-PV-0.5-1.5-2						
				2.0	50.8	0.080	2.03	1.956	49.7	ZnSe-PV-0.5-2.0-2						
				2.5	63.5	0.080	2.03	2.458	62.4	ZnSe-PV-0.5-2.5-2						
		0.6	15.2	1.5	38.1	0.080	2.03	1.453	36.9	ZnSe-PV-0.6-1.5-2						
				2.0	50.8	0.080	2.03	1.954	49.6	ZnSe-PV-0.6-2.0-2						
				3.0	76.2	0.080	2.03	2.957	75.1	ZnSe-PV-0.6-3.0-2						
		0.75	19.1	2.0	50.8	0.080	2.03	1.950	49.5	ZnSe-PV-0.75-2.0-2						
				2.5	63.5	0.080	2.03	2.453	62.3	ZnSe-PV-0.75-2.5-2						
				3.75	95.3	0.080	2.03	3.708	94.2	ZnSe-PV-0.75-3.7-2						
		1.0	25.4	2.5	63.5	0.098	2.49	2.439	61.9	ZnSe-PV-1.0-2.5-2.5						
				3.5	88.9	0.098	2.49	3.445	87.5	ZnSe-PV-1.0-3.5-2.5						
				5.0	127	0.098	2.49	4.909	124.7	ZnSe-PV-1.0-5.0-2.5						
		1.1	27.9	2.5	63.5	0.085	2.16	2.441	62.0	ZnSe-PV-1.1-2.5-2.2						
				3.5	88.9	0.089	2.26	3.447	87.5	ZnSe-PV-1.1-3.5-2.3						
				5.0	127	0.160	4.06	4.913	124.8	ZnSe-PV-1.1-5.0-4.1						
				5.0	127	0.098	2.49	4.939	125.5	ZnSe-PV-1.1-5.0-2.5						
		1.5	38.1	3.75	95.3	0.086	2.18	3.688	93.7	ZnSe-PV-1.5-3.7-2.2						
						0.085	2.16	4.933	125.3	ZnSe-PV-1.5-5.0-2.2						
				0.118	3.00	4.919	124.9	124.9	3.00	4.919	124.9	ZnSe-PV-1.5-5.0-3				
												0.160	4.06	4.902	124.5	ZnSe-PV-1.5-5.0-4.1
												0.236	5.99	4.870	123.7	ZnSe-PV-1.5-5.0-6
												0.300	7.62	4.972	126.3	ZnSe-PV-1.5-5.0-7.6
												0.310	7.87	4.844	123.0	ZnSe-PV-1.5-5.0-7.9
				5.13	130.3	0.280	7.11	4.829	122.7	ZnSe-PV-1.5-5.1-7.1						
				7.5	190.5	0.236	5.99	7.374	187.3	ZnSe-PV-1.5-7.5-6						
						0.300	7.62	7.347	186.6	ZnSe-PV-1.5-7.5-7.6						
						0.315	8.00	7.341	186.5	ZnSe-PV-1.5-7.5-8						
		7.63	193.8	0.310	7.87	7.473	189.8	ZnSe-PV-1.5-7.6-7.9								
		2.0	50.8	5.0	127	0.310	7.87	4.846	123.1	ZnSe-PV-2.0-5.0-7.9						
						0.380	9.65	4.817	122.3	ZnSe-PV-2.0-5.0-9.6						
				7.5	190.5	0.300	7.62	7.331	186.2	ZnSe-PV-2.0-7.5-7.6						
						0.310	7.87	7.327	186.1	ZnSe-PV-2.0-7.5-7.9						
						0.380	9.65	7.298	185.4	ZnSe-PV-2.0-7.5-9.6						

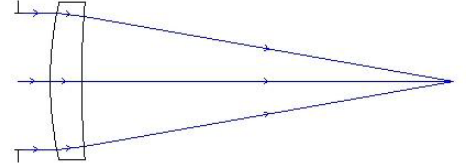
NOTE: Other diameters and focal lengths available on custom basis. Please inquire.

Information and specifications contained herein are deemed to be reliable and accurate as of the publication date. **TYBANG** reserves the right to make changes at any time without prior notification. Consult the factory for current engineering drawings and data.

## CO<sub>2</sub> Laser Positive Meniscus Lenses

### Specifications

Diameter tolerance: +0/-0.004" (+0/-0.1 mm)  
 Thickness tolerance: ±0.004" (±0.1 mm)  
 Edge thickness variation: ≤ 0.002" (0.05 mm)  
 Focal length tolerance: ± 0.5%  
 Surface irregularity: 1/40 Lambda @ 10.6 μm  
 Surface quality: 20-10 Scratch-Dig  
 Clear aperture: ≥ 90%  
 Absorption: 0.10% - 0.20% depending on thickness  
 Transmission: ≥ 99.6% when AR/AR coated for 10.6 μm



Lens Type	Material	Diameter		Focal Length		Edge Thickness		BFL		Part No.
		inch	mm	inch	mm	inch	Mm	inch	mm	
Positive meniscus	ZnSe	0.5	12.7	1.5	38.1	0.080	2.03	1.438	36.5	ZnSe-PM-0.5-1.5-2
				2.0	50.8	0.080	2.03	1.930	49.0	ZnSe-PM-0.5-2.0-2
				2.5	63.5	0.080	2.03	2.443	62.0	ZnSe-PM-0.5-2.5-2
		0.6	15.2	1.5	38.1	0.080	2.03	1.429	36.3	ZnSe-PM-0.6-1.5-2
				2.0	50.8	0.080	2.03	1.922	48.8	ZnSe-PM-0.6-2.0-2
				3.0	76.2	0.080	2.03	2.930	74.4	ZnSe-PM-0.6-3.0-2
		0.75	19.1	2.0	50.8	0.080	2.03	1.909	48.5	ZnSe-PM-0.75-2.0-2
				2.5	63.5	0.080	2.03	2.426	61.6	ZnSe-PM-0.75-2.5-2
				3.75	95.3	0.080	2.03	3.682	93.5	ZnSe-PM-0.75-3.75-2
		1.0	25.4	2.5	63.5	0.098	2.49	2.384	60.6	ZnSe-PM-1.0-2.5-2.5
				3.5	88.9	0.098	2.49	3.397	86.3	ZnSe-PM-1.0-3.5-2.5
				5.0	127	0.098	2.49	4.907	124.6	ZnSe-PM-1.0-5.0-2.5
		1.1	27.9	2.5	63.5	0.085	2.16	2.383	60.5	ZnSe-PM-1.1-2.5-2.2
				2.5	88.9	0.080	2.03	2.386	60.6	ZnSe-PM-1.1-2.5-2
				3.75	95.3	0.085	2.16	3.650	92.7	ZnSe-PM-1.1-3.75-2.2
				5.0	127	0.085	2.16	4.910	124.7	ZnSe-PM-1.1-5.0-2.2
		1.5	38.1	3.75	95.3	0.236	5.99	3.518	89.4	ZnSe-PM-1.5-3.75-6
						0.236	5.99	4.793	121.7	ZnSe-PM-1.5-5.0-6
						0.290	7.37	4.741	120.4	ZnSe-PM-1.5-5.0-7.4
						0.354	8.99	4.688	119.1	ZnSe-PM-1.5-5.0-9
				7.5	190.5	0.125	3.18	7.376	187.3	ZnSe-PM-1.5-7.5-3.2
						0.236	5.99	7.316	185.8	ZnSe-PM-1.5-7.5-6
						0.290	7.37	7.267	184.6	ZnSe-PM-1.5-7.5-7.4
						0.354	8.99	7.209	183.1	ZnSe-PM-1.5-7.5-9
		2.0	50.8	5.0	127	0.310	7.87	4.708	119.6	ZnSe-PM-2.0-5.0-7.9
						0.380	9.65	4.646	118.0	ZnSe-PM-2.0-5.0-9.6
				7.5	190.5	0.310	7.87	7.242	183.9	ZnSe-PM-2.0-7.5-7.9
						0.380	9.65	7.177	182.3	ZnSe-PM-2.0-7.5-9.6

NOTE: Other diameters and focal lengths available on custom basis. Please inquire.

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