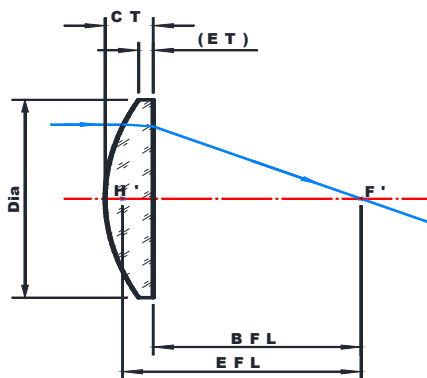


LBK/LFS Focusing Lens

This series of focusing lens is made of BK7 (H-K9L) or fused silica, light enters on one side and exits on the opposite side. It's purpose is to modify the wavefront curvature of the light, focusing the laser beam onto a very small precise spot size so that it is widely used to engrave graphic images, welding metal pieces together or cutting various type of materials. Following lens with most common anti-reflective coating at 1064/808/532nm.



Specifications	
Diameter Tolerance	+0/-0.13mm
Thickness Tolerance	±0.25mm
FL Tolerance	< +/-2%
ETV	<3 arc minutes
Clear Aperture	>80%
Surface Figure	λ/4 Per 1" Dia @632.8nm
Surface Quality	60-40 scratch and dig
AR/AR Coating	R<0.5% per surface

Plano-Convex Converging Lens

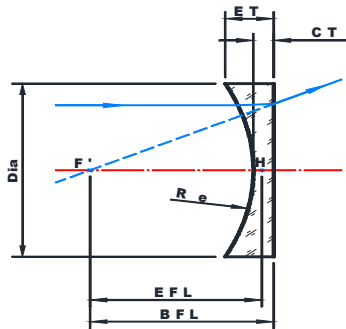
Part No.	Dia (mm)	EFL (mm)	E.T. (mm)	Material	Wavelength
LBK-5.9-10.3-ET1.9	5.9	10.3	1.9	BK7	1064nm
LBK-5.9-11.9-ET1.6	5.9	11.9	1.6	BK7	1064nm
LBK-7.8-127-ET2.6	7.8	127.0	2.6	BK7	1064nm
LBK-8-10-ET3.9	8.0	10.0	3.9	BK7	1064nm
LBK-10-50-ET2.5	10.0	50.0	2.5	BK7	1064nm
LBK-10.5-27.8-ET2.5	10.5	27.8	2.5	BK7	1064nm
LBK-0.5-15-ET2	12.7	15.0	2.0	BK7	1064nm
LBK-0.5-20-ET2	12.7	20.0	2.0	BK7	1064nm
LBK-0.5-30-ET2	12.7	30.0	2.0	BK7	1064nm
LBK-0.5-50-ET2	12.7	50.0	2.0	BK7	1064nm
LBK-0.5-75-ET2	12.7	75.0	2.0	BK7	1064nm
LBK-0.5-100-ET2	12.7	100.0	2.0	BK7	1064nm
LBK-0.5-120-ET2	12.7	120.0	2.0	BK7	1064nm
LBK-0.5-140-ET2	12.7	140.0	2.0	BK7	1064nm
LBK-0.5-160-ET2	12.7	160.0	2.0	BK7	1064nm
LBK-14-37.8-ET2.5	14.0	37.8	2.5	BK7	1064nm
LBK-15-20-ET2	15.0	20.0	2.0	BK7	1064nm

Part No.	Dia (mm)	EFL (mm)	E.T. (mm)	Material	Wavelength
LBK-15-35-ET2.5	15.0	35.0	2.5	BK7	1064nm
LBK-19-25-ET5.8	19.0	25.0	5.8	BK7	1064nm
LBK-1-25-ET2.5	25.4	25.0	2.5	BK7	1064nm
LBK-1-25.4-ET2	25.4	25.4	2.0	BK7	1064nm
LBK-1-33-ET1.6	25.4	33.0	1.6	BK7	1064nm
LBK-1-35-ET2	25.4	35.0	2.0	BK7	1064nm
LBK-1-40-ET2.2	25.4	40.0	2.2	BK7	1064nm
LBK-1-50-ET2	25.4	50.0	2.0	BK7	1064nm
LBK-1-60-ET2	25.4	60.0	2.0	BK7	1064nm
LBK-1-70-ET2	25.4	70.0	2.0	BK7	1064nm
LBK-1-75-ET2	25.4	75.0	2.0	BK7	1064nm
LBK-1-100-ET2	25.4	100.0	2.0	BK7	1064nm
LBK-1-125-ET2	25.4	125.0	2.0	BK7	1064nm
LBK-1-150-ET2	25.4	150.0	2.0	BK7	1064nm
LBK-1-152-ET2	25.4	152.0	2.0	BK7	1064nm
LBK-1-175-ET2	25.4	175.0	2.0	BK7	1064nm
LBK-1-200-ET2	25.4	200.0	2.0	BK7	1064nm
LBK-1-250-ET2	25.4	250.0	2.0	BK7	1064nm
LBK-1-300-ET2	25.4	300.0	2.0	BK7	1064nm
LBK-1-350-ET3.5	25.4	350.0	3.5	BK7	1064nm
LBK-1-400-ET3.4	25.4	400.0	3.4	BK7	1064nm
LBK-1-500-ET2	25.4	500.0	2.0	BK7	1064nm
LBK-1-750-ET5	25.4	750.0	5.0	BK7	1064nm
LBK-1-1000-ET2	25.4	1000.0	2.0	BK7	1064nm
LBK-1-3000-ET3.2	25.4	3000.0	3.2	BK7	1064nm
LBK-1-5000-ET3.2	25.4	5000.0	3.2	BK7	1064nm
LBK-30-80-ET2	30.0	80.0	2.0	BK7	1064nm
LBK-30-100-ET2	30.0	100.0	2.0	BK7	1064nm
LBK-30-120-ET2	30.0	120.0	2.0	BK7	1064nm
LBK-1.5-150-ET5.3	38.1	150.0	5.3	BK7	1064nm
LBK-50-100-ET3	50.0	100.0	3.0	BK7	1064nm
LBK-50-150-ET3	50.0	150.0	3.0	BK7	1064nm
LBK-50-200-ET3	50.0	200.0	3.0	BK7	1064nm
LBK-50-250-ET2	50.0	250.0	2.0	BK7	1064nm
LBK-50-300-ET2	50.0	300.0	2.0	BK7	1064nm

Part No.	Dia (mm)	EFL (mm)	E.T. (mm)	Material	Wavelength
LBK-50-400-ET2	50.0	400.0	2.0	BK7	1064nm
LBK-50-450-ET2	50.0	450.0	2.0	BK7	1064nm
LBK-50-500-ET2	50.0	500.0	2.0	BK7	1064nm
LBK-50-600-ET2	50.0	600.0	2.0	BK7	1064nm
LBK-50-800-ET2	50.0	800.0	2.0	BK7	1064nm
LBK-50-1000-ET2	50.0	1000.0	2.0	BK7	1064nm
LBK-2-100-ET9.4	50.8	100.0	9.4	BK7	1064nm
LBK-2-200-ET6.2	50.8	200.0	6.2	BK7	1064nm
LBK-0.5-30-ET6	12.7	30.0	6.0	BK7	808nm
LBK-0.5-60-ET6	12.7	60.0	6.0	BK7	808nm
LBK-0.5-80-ET6	12.7	80.0	6.0	BK7	808nm
LBK-15-30-ET2	15.0	30.0	2.0	BK7	808nm
LBK-15-40-ET3.4	15.0	40.0	3.4	BK7	808nm
LBK-15-45-ET2	15.0	45.0	2.0	BK7	808nm
LBK-18-25-ET4.7	18.0	25.0	4.7	BK7	808nm
LBK-18-40-ET6.4	18.0	40.0	6.4	BK7	808nm
LBK-20-40-ET2	20.0	40.0	2.0	BK7	808nm
LBK-20-45-ET4.3	20.0	45.0	4.3	BK7	808nm
LBK-20-50-ET2	20.0	50.0	2.0	BK7	808nm
LBK-20-60-ET2	20.0	60.0	2.0	BK7	808nm
LBK-20-70-ET3.4	20.0	70.0	3.4	BK7	808nm
LBK-20-80-ET3.2	20.0	80.0	3.2	BK7	808nm
LBK-1-35-ET3	25.4	35.0	3.0	BK7	808nm
LBK-1-70-ET3	25.4	70.0	3.0	BK7	808nm
LFS-19-25-ET2	19.0	25.0	2.0	Fused Silica	1064nm
LFS-19-30-ET2	19.0	30.0	2.0	Fused Silica	1064nm
LFS-19-50-ET2	19.0	50.0	2.0	Fused Silica	1064nm
LFS-25-75-ET2	25.0	75.0	2.0	Fused Silica	1064nm
LFS-25-80-ET2	25.0	80.0	2.0	Fused Silica	1064nm
LFS-25-100-ET2	25.0	100.0	2.0	Fused Silica	1064nm
LFS-1-50-ET2	25.4	50.0	2.0	Fused Silica	1064nm
LFS-1-100-ET2	25.4	100.0	2.0	Fused Silica	1064nm
LFS-1-150-ET2	25.4	150.0	2.0	Fused Silica	1064nm
LFS-1-200-ET2	25.4	200.0	2.0	Fused Silica	1064nm
LFS-1-250-ET2	25.4	250.0	2.0	Fused Silica	1064nm

Part No.	Dia (mm)	EFL (mm)	E.T. (mm)	Material	Wavelength
LFS-1-300-ET2	25.4	300.0	2.0	Fused Silica	1064nm
LFS-1-500-ET2	25.4	500.0	2.0	Fused Silica	1064nm
LFS-1-1000-ET2	25.4	1000.0	2.0	Fused Silica	1064nm
LFS-38-100-ET3	38.0	100.0	3.0	Fused Silica	1064nm
LFS-38-150-ET3	38.0	150.0	3.0	Fused Silica	1064nm
LFS-38-200-ET3	38.0	200.0	3.0	Fused Silica	1064nm
LFS-38-350-ET3	38.0	350.0	3.0	Fused Silica	1064nm
LFS-38-500-ET3	38.0	500.0	3.0	Fused Silica	1064nm
LFS-45-4-ET1.5	45.0	101.6	1.5	Fused Silica	1064nm
LFS-45-5-ET1.5	45.0	127.0	1.5	Fused Silica	1064nm
LFS-45-6-ET1.5	45.0	152.4	1.5	Fused Silica	1064nm
LFS-8-10-ET2	8.0	10.0	2.0	Fused Silica	808nm
LFS-8-20-ET2	8.0	20.0	2.0	Fused Silica	808nm
LFS-8-25-ET2	8.0	25.0	2.0	Fused Silica	808nm
LFS-0.5-25-ET6	12.7	25.0	6.0	Fused Silica	808nm
LFS-0.5-51.1-ET3	12.7	51.1	3.0	Fused Silica	808nm
LFS-18-36-ET6.4	18.0	36.0	6.4	Fused Silica	808nm

Plano-Concave Diverging Lens



Specifications	
Diameter Tolerance	+0/-0.13mm
Thickness Tolerance	±0.25mm
FL Tolerance	< +/-2%
ETV	<3 arc minutes
Clear Aperture	>80%
Surface Figure	λ/4 Per 1" Dia @632.8nm
Surface Quality	60-40 scratch and dig
AR/AR Coating	R<0.5% per surface

Part No.	Dia (mm)	EFL (mm)	E.T. (mm)	Material	Wavelength
LBK-9+10-ET1.5	9.0	-10.0	1.5	BK7	1064nm
LBK-12.7+150-ET3	12.7	-150.0	3.0	BK7	1064nm
LBK-12.7+300-ET3	12.7	-300.0	3.0	BK7	1064nm
LBK-1+75-ET5	25.4	-75.0	5.0	BK7	1064nm
LBK-1+125-ET5	25.4	-125.0	5.0	BK7	1064nm
LBK-1+150-ET5	25.4	-150.0	3.0	BK7	1064nm
LBK-1+500-ET5	25.4	-500.0	5.0	BK7	1064nm
LBK-0.5+15-ET2	12.7	-15.0	2.0	BK7	532nm

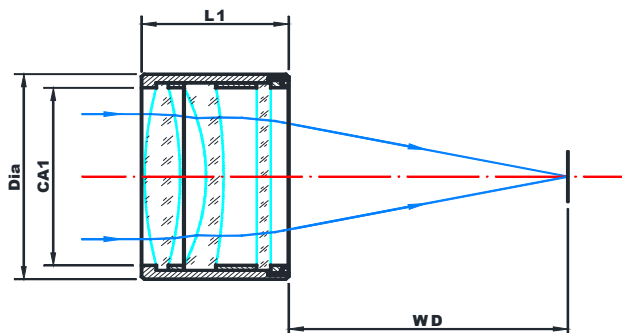
Part No.	Dia (mm)	EFL (mm)	E.T. (mm)	Material	Wavelength
LBK-0.5+20-ET2	12.7	-20.0	2.0	BK7	532nm
LBK-0.5+25-ET2	12.7	-25.0	2.0	BK7	532nm
LBK-0.5+30-ET2	12.7	-30.0	2.0	BK7	532nm
LBK-0.5+40-ET2	12.7	-40.0	2.0	BK7	532nm
LFS-10+33.5-ET3.3FB	10.0	-33.5	3.3	Fused Silica	1090nm
LFS-10+33.8-ET3.3FB	10.0	-33.8	3.3	Fused Silica	1090nm
LFS-7+0.6-ET2.2	7.0	-15.2	2.2	Fused Silica	1064nm
LFS-12+2.5-ET2.4	12.0	-64.2	2.4	Fused Silica	1064nm
LFS-12+16-ET3.2	12.0	-16.0	3.2	Fused Silica	1064nm
LFS-12+25-ET3.1	12.0	-25.0	3.1	Fused Silica	1064nm
LFS-12+1-ET3.2	12.0	-25.4	3.2	Fused Silica	1064nm
LFS-12+34.3-ET2.7	12.0	-34.3	2.7	Fused Silica	1064nm
LFS-12+39.2-ET3	12.0	-39.2	3.0	Fused Silica	1064nm
LFS-12+64.2-ET2.4	12.0	-64.2	2.4	Fused Silica	1064nm
LFS-12.5+0.37-ET4	12.5	-9.5	4.0	Fused Silica	1064nm
LFS-12.5+0.5-ET4	12.5	-12.7	4.0	Fused Silica	1064nm
LFS-12.5+16-ET4.3	12.5	-16.0	4.3	Fused Silica	1064nm
LFS-15+50-ET2.5	15.0	-50.0	2.5	Fused Silica	1064nm
LFS-17.5+36.8-ET3.4	17.5	-36.8	3.4	Fused Silica	1064nm
LFS-17.5+65.4-ET3	17.5	-65.4	3.0	Fused Silica	1064nm
LFS-28+252.7-ET3.2	28.0	-252.7	3.2	Fused Silica	1064nm
LFS-36+189.7-ET4.7	36.0	-189.7	4.7	Fused Silica	1064nm
LFS-36+192.8-ET4.6	36.0	-192.8	4.6	Fused Silica	1064nm
LFS-36+383.9-ET4.7	36.0	-384.0	4.7	Fused Silica	1064nm
LFS-8+7.35-ET2.9G	8.0	-7.4	2.9	Fused Silica	532nm
LFS-10+8.46-ET4.1G	10.0	-8.5	4.1	Fused Silica	532nm
LFS-10+14.9-ET3.7G	10.0	-14.9	3.7	Fused Silica	532nm
LFS-10+18.8-ET2.5G	10.0	-18.8	2.5	Fused Silica	532nm
LFS-10+35.7-ET2G	10.0	-36.7	2.0	Fused Silica	532nm
LFS-10+73.3-ET2.4G	10.0	-73.3	2.4	Fused Silica	532nm
LFS-20+54.5-ET4.2G	20.0	-54.5	4.2	Fused Silica	532nm
LFS-10+5.11-ET5U	10.0	-5.1	5.0	Fused Silica	355nm
LFS-10+15.9-ET2.6U	10.0	-15.9	2.6	Fused Silica	355nm
LFS-12+34.3-ET2.7U	12.0	-34.3	2.7	Fused Silica	355nm
LFS-12.5+6.57-ET5U	12.5	-6.6	5.0	Fused Silica	355nm

Part No.	Dia (mm)	EFL (mm)	E.T. (mm)	Material	Wavelength
LFS-12.5+0.5-T5.6U	12.5	-12.7	5.6	Fused Silica	355nm
LFS-12.5+12.7-3.5U	12.5	-12.7	3.5	Fused Silica	355nm
LFS-18+58.9-ET2.7U	18.0	-58.9	2.7	Fused Silica	355nm
LFS-18+89.1-ET2.5U	18.0	-89.1	2.5	Fused Silica	355nm
LFS-20+45.0-ET4U	20.0	-45.0	4.0	Fused Silica	355nm
LFS-1+50-ET5.8U	25.4	-50.0	5.8	Fused Silica	355nm

NOTE: Focusing Lens at different FL, size, material and coating are available upon request

HFL Series—High Power YAG Focusing Lens

- High power focusing lens for fiber laser is made by Fused Silica, with low absorption coating. It is applied for over 1000w YAG laser.
- Following focusing lens comes with protective window, we supply separate lens and window for water cool application



Part No.	EFL (mm)	WD (mm)	Dia (mm)	Type	Wavelength	Application
HFL80-42	80.0	68.6	42.0	Singlet	1064nm	Cutting
HFL100-25	100.0	89.5	25.0	Singlet	1064nm	Cutting
HFL100-30	100.0	89.5	30.0	Singlet	1064nm	Cutting
HFL100-42	100.0	89.5	42.0	Singlet	1064nm	Cutting
HFL120-42	120.0	109.5	42.0	Singlet	1064nm	Cutting
HFL120-42-2	120.0	109.1	42.0	Doublet	1064nm	Cutting
HFL100-40V	100.0	89.5	40.0	Singlet	1060-1080nm	Welding
HFL120-40V	120.0	109.5	40.0	Singlet	1060-1080nm	Welding
HFL150-40V	150.0	146.0	40.0	Singlet	1060-1080nm	Welding

NOTE: High Power Focusing lens of different FL are available upon request.