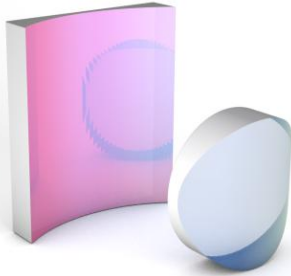


Cylindrical Lenses

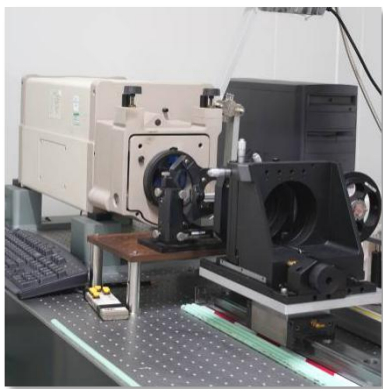


- Material from DUV to IR
- Custom dimension and shapes
- Diameter from 2 to 500 mm
- Clear aperture: Central 90% of diameter
- Irregularity : $\lambda/10@632.8\text{nm}$
- Surface quality: 10-5 S/D
- Centration: $<1'$
- Standard and custom coating options available
- High laser damage threshold

Cylindrical lenses condense or expand light in only one single dimension. CASTECH offers Plano-Convex Cylindrical Lenses, Plano-Concave Cylindrical Lenses and Achromatic Cylindrical Lenses, which are made of Optical glass, Fused Silica, BK7, CaF_2 or ZnSe with uncoated or coated options and cover from ultraviolet(UV) to infrared(IR) spectral region. Utilizing a range of processing technologies including tradition polishing, high speed polishing or ion beam figure(IBF) and best-in-class metrology, CASTECH has the ability to ensure consistent high-quality performance of each lens.

Metrology

Computer Generated-Hologram (CGH) is commonly utilized as a null for testing cylindrical optics. CASTECH equips with cylinder CGH which creates cylindrical wavefront to test a specific cylindrical surface. Each cylinder CGH is able to measure a family of cylindrical surfaces of similar F/# but different sizes.



ZYGO Interferometer for high accuracy cylindrical surface measurement
CGH transmission spheres: $\lambda/10$ surface accuracy



CGH Transmission Spheres