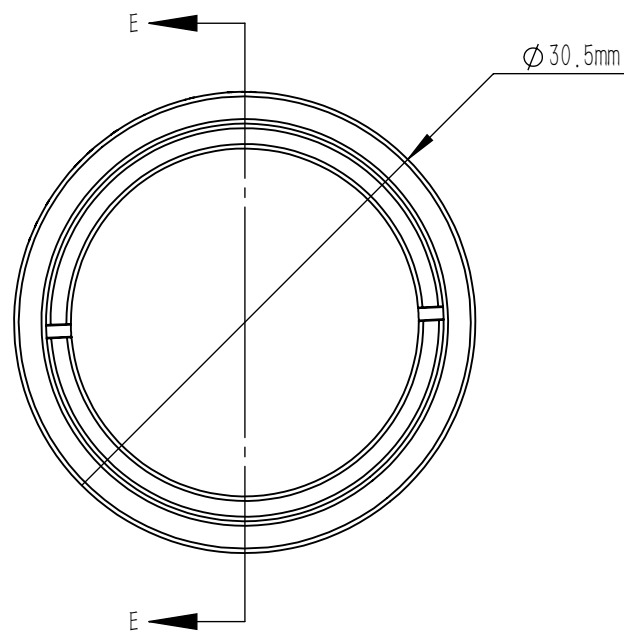


ASPHERIC COEFFICIENTS

	R	K	A4	A6	A8
S1	25.56	-1.010	-3.270e-06	7.721e-10	1.630e-13
S2	∞	-	-	-	-

ASPHERIC LENS EQUATION

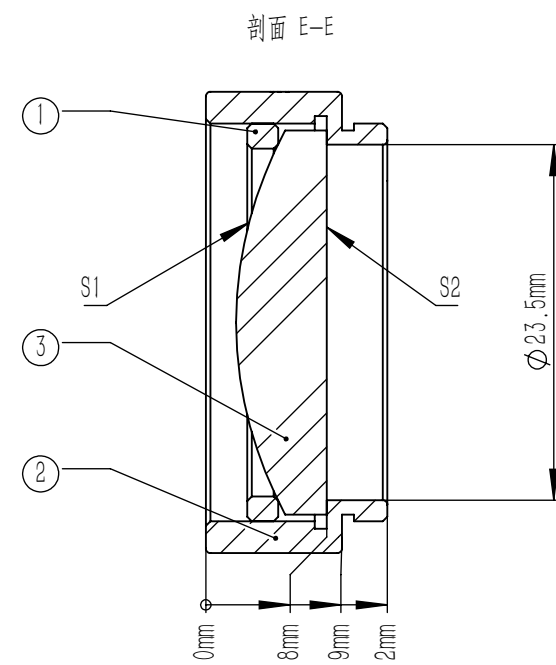
$$z = \frac{Y^2}{R(1 + \sqrt{1 - (1 + k)Y^2/R^2})} + A_4Y^4 + A_6Y^6 + A_8Y^8$$



NOTES

- DESIGN WAVELENGTH: 780.0 nm
- NUMERICAL APERTURE: 0.22
- FOCAL LENGTH: 50.0 mm  $\pm 1\%$
- BACK FOCAL LENGTH(REF): 46.0 mm
- CLEAR APERTURE:  $>90\%$ CA
- DIAMETER TOLERANCE:  $+0.0/-0.1$  mm
- THICKNESS TOLERANCE:  $\pm 0.1$  mm
- CHAMFER: 0.2 mm,  $45^\circ$
- WAVEFRONT ERROR(RMS):  $< 0.5 \mu\text{m}$
- SURFACE POWER(S1):  $\pm 7.5 \mu\text{m}$
- SURFACE IRREGULARITY(S1):  $< 3$  FRINGES
- SURFACE FLATNESS(S2):  $\lambda/4@633$  nm
- SURFACE QUALITY(S1,S2): 60/40 (S/D)
- CENTRATION:  $< 3$  arcmin
- AR COATING(S1,S2): UNCOATED

	Part Description	Material
①	SM1R	ANODIZED ALUMINUM
②	SM1-8A	ANODIZED ALUMINUM
③	AC1610	N-BK7 or Equivalent Materials



DRAWING PROJECTION			<b>LBTEK</b>			
NAME	DATE	MAC1610				
DRAWN	ZLIN	NOV./15th/25	ASPHERIC LENS			
APPROVAL	WCHENG	NOV./15th/25	MATERIAL	WEIGHT	SCALE	REV
FOR INFORMATION ONLY NOT FOR MANUFACTURING PURPOSES			N-BK7	23.49 g	2:1	A