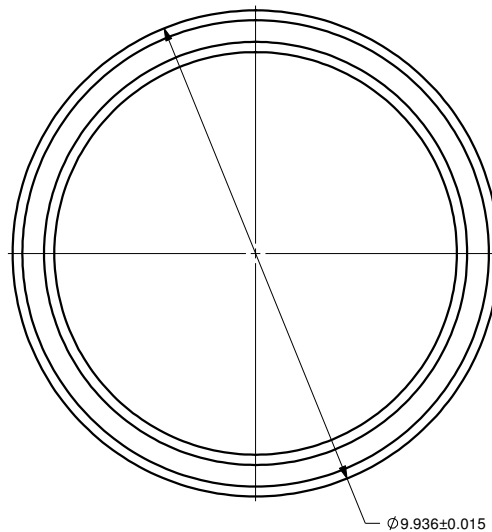


$$z = \frac{Y^2}{R \left(1 + \sqrt{1 - (1+k) \frac{Y^2}{R^2}} \right)} + A_4 Y^4 + A_6 Y^6 + \dots + A_n Y^n$$

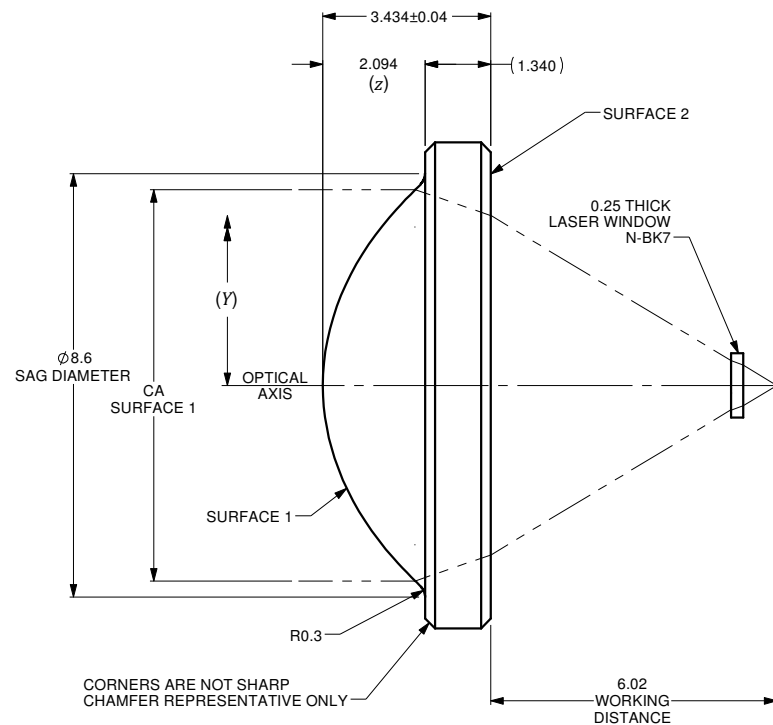
| | SURFACE 1 | SURFACE 2 |
|------------------------|---------------|--------------|
| SURFACE TYPE | ASPHERIC | PLANO |
| CLEAR APERTURE (CA) | ø8.00mm | ø6.94mm MIN. |
| RADIUS OF CURVATURE | 4.63478mm | INF. |
| <i>k</i> | -0.92308 | 0 |
| <i>A</i> ₄ | 4.77359E-004 | 0 |
| <i>A</i> ₆ | 4.00285E-006 | 0 |
| <i>A</i> ₈ | 3.57382E-008 | 0 |
| <i>A</i> ₁₀ | -7.56948E-010 | 0 |
| <i>A</i> ₁₂ | 0 | 0 |
| <i>A</i> ₁₄ | 0 | 0 |



| VARIABLES | |
|------------------------------|--|
| <i>z</i> | SURFACE PROFILE |
| <i>Y</i> | DISTANCE FROM OPTICAL AXIS |
| <i>R</i> | RADIUS OF CURVATURE |
| <i>k</i> | CONIC CONSTANT |
| <i>A</i> ₄ | 4th ORDER ASPHERIC COEFFICIENT |
| <i>A</i> ₆ | 6th ORDER ASPHERIC COEFFICIENT |
| <i>A</i> _{<i>n</i>} | <i>n</i> th ORDER ASPHERIC COEFFICIENT |

NOTES :

- MATERIAL: D-ZK3
- WAVEFRONT ABERRATION (RMS): <0.08λ @ 632.8nm
- AR COATING: 1000-1650 nm
REFLECTIVITY R_{max} <1.00%



| | |
|------------------------|-------|
| NUMERICAL APERTURE | 0.5 |
| EFFECTIVE FOCAL LENGTH | 8.1mm |

| | | |
|--|---|---|
| ALL DIMENSIONS ARE IN MILLIMETERS UNLESS NOTED OTHERWISE, DIMENSIONS ARE IN MILLIMETERS. INCHES ARE IN SQUARE BRACKETS, AND TOLERANCES APPLY AS SHOWN BELOW. INCHES: BASIC DIMENSION: .XX, .XXX, .XXX; DECIMAL PLACES: BELOW .4: ±.01, ±.005; OVER .4: ±.02, ±.01 MILLIMETERS: BASIC DIMENSION: X, XX; DECIMAL PLACES: BELOW 10.6: ±.25, ±.15; OVER 101.6: ±.50, ±.20 ANGULAR DIMENSIONS: BASIC DIMENSION: X, XX; ALL ANGLES: ±2.5°, ±0.3° SURFACE FINISH: MILLED 125μ; PROFILED 63μ | | A: N/A ORIGINAL ISSUE C.M. 27-SEP-2019 ENG. BY DATE |
| DRAWN BY: P. SUMMERS CHECKED BY: M/S CHECKED BY: AP/VD BY: PROJECTION: | DATE: 9/27/2019 DATE: DATE: DATE: DATE: | 219 WESTBROOK ROAD OTTAWA, ONTARIO CANADA K0A 1L0 ozOptics www.ozoptics.com PART BARCODE #: 1803 ASPHERIC LENS f=8mm, OD=9.94mm. AR COATED FOR 1000-1650nm AS-F8-D9.94-1000/1650 PART NO. REV A |
| CONFIDENTIAL THIS PRINT IS THE EXCLUSIVE PROPERTY OF OZ OPTICS AND MUST BE RETURNED UPON REQUEST. UNAUTHORIZED USE, MANUFACTURE OR REPRODUCTION IN WHOLE OR IN PART IS PROHIBITED. | SIZE: B DWG.# 4000-0227 SHEET 1 OF 1 SCALE: 10:1 | |