



SPECIFICATION

E1101088-v4

DrawingNo Vers

Sheet 1 of 1

0.5" Curved high reflector OMC optics

APPROVALS	DATE	R E V	DCN NO.	BY	CHEC K	DCC	DATE
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DCC RELEASE							

1 Description

0.5" diameter curved/flat fused silica mirrors used as cavity optics for the Output Mode Cleaner

2 Material

Corning HPFS 7980 (high purity fused silica, UV grade)
Grade 0A (Low inclusion class: <0.3 mm² cross section, 0.1 mm max. size;
Homogeneity < 1ppm)

3 Dimensions

CURVED-FLAT
Diameter: 12.7mm +/-0.2mm
Thickness (center): Uniform within lot to 0.1mm
3.1mm minimum thickness
6.5mm maximum thickness
Chamfers: 0.25-0.76 mm face width 45° ±15°
Arrow marking Side 1 on barrel
Drawing number E1101088 etched onto barrel, if possible

4 Surface Specification

Side 1

Super-polished
Micro-roughness: < 1 Angstrom rms over central 80% of diameter with 10-5 scratch-dig
best effort for 20-10 scratch-dig outside central 80% of diameter
Surface Figure: 250cm ± 1% concave radius of curvature

Side 2

Micro-roughness: < 5 Angstrom rms over central 80% of diameter
Surface figure: Flat to λ/4 at 632.8 over central 80%

Barrel

Inspection polish

5 Coatings

As per coating specification E1101095 and statement of work E1101096

6 Metrology

Vendor to provide Side 1 surface figure measurement