

# SPHERICAL OPTICS

## SPHERICAL LENSES

### TECHNICAL SPECIFICATION

<b>Materials</b>	<ul style="list-style-type: none"><li>• Оптични стъкла (Schott, Ohara, Corning, Sumita, Hoya, Pilkington, Heraeus, Hikari, CDGM и други, посочени от клиента производителите)</li><li>• Optical glasses Schott, Ohara, Corning, Sumita and others on the customer needs</li><li>• Кварц</li><li>• Оптични кристали (CaF<sub>2</sub>, MgF<sub>2</sub>, ZnS, Si, Ge) и др.</li></ul>
<b>Forms</b>	<ul style="list-style-type: none"><li>• Negative Lenses (plano-concave)</li><li>• Concave – Concave Lenses</li><li>• Convex – Convex Lenses</li><li>• Plano – Convex Lenses</li><li>• Convex – Concave Lenses (positive and negative meniscus)</li></ul>
<b>Centering accuracy</b>	Measurements are in arcmin and depend on the diameter: <ul style="list-style-type: none"><li>• from 10 mm to 50 mm ≤ 1 arcmin</li><li>• from 50 mm to 100 mm ≤ 2 arcmin</li><li>• from 100 mm to 250 mm ≤ 3 arcmin</li></ul>
<b>Surface accuracy (633nm)</b>	<ul style="list-style-type: none"><li>• <math>\lambda/10</math></li></ul>
<b>Surface Quality</b>	According to ISO 10100
<b>Diameter Range</b>	10 – 250 mm
<b>Diameter Tolerance</b>	-0,01 mm
<b>Thickness tolerance</b>	to +/- 0,02 mm
<b>Radius convex/concave</b>	from 10 mm to $\infty$ +/- 1 %
<b>Micro-roughness Sigma (RMS)</b>	< 1.5 nm
<b>AR Coating</b>	Specification: DIN 58197-W-400-600 Standard class: <ul style="list-style-type: none"><li>• R ≤ 0.4 % abs. 400 – 610 nm</li><li>• R ≤ 0.3 % avg. 400 – 610 nm</li><li>• Cleanness 2 x 0.016</li><li>• Other customized</li></ul> Environment: MIL-C-675 A <ul style="list-style-type: none"><li>• 4.6.8 Salt water 24h 4.5% NaCl</li><li>• 4.6.9 Humidity 24h 49°C / 95% r. F.</li><li>• 4.6.10 Salt fog 24h 4.5% NaCl</li><li>• 4.6.11 Rubber hardness 20 strokes</li></ul>
<b>Other AR coatings</b>	On request

