

59800 - 59822 Glass Beads

These solid glass beads are manufactured of soda-lime glass in a specially developed process and then provided with a gliding cut polish which does not damage the material and is environment friendly.

The development of this type of bead is primarily based **on its use as grinding media in pearl mills** for grinding and dispersing color pigments, paint, ink, agro chemicals, pharmaceuticals, minerals, magnetic coatings and fillers for paper and plastic industry.

Further applications:

- As an agent used for mechanical plating (electroplating) for small metallic parts,
- Mixed elements in atomizers,
- Reflector beads > 1 mm for road markings - particularly to increase visibility at night by rain,
- Filling media in electronics for protection against explosion stirring media in aerosols,
- Polishing elements in the optical industry.

Chemical Characterization:

SiO ₂	72 %
Na ₂ O	13 %
CaO	9 %
MgO	4 %
Al ₂ O ₃	1 %
K ₂ O; Fe ₂ O ₃	1 %

Deviations of +/- 1 % are possible.

PbO free < 0.01 %

Approximate technical and physical values:

Hardness according to Mohs:	≥ 6
Elasticity module:	63 GPa
Specific weight:	2.5 kg/dm ³
Bulk weight:	1.5 kg/dm ³
Abrasion after 100 h grinding:	1.5 – 1.8 %
Softening temperature:	740°C
Thermal expansion 20/400:	8.57 / 10 ⁶ K

Size range	
Product No. 59820:	0.40 – 0.60 mm
Product No. 59821:	0.04 – 0.07 mm
Product No. 59822:	0.00 – 0.05 mm

Subject to the modification of technical details.