The Tightest Optical Positions

SCHOTT provides selected optical glasses with the tightest tolerances for refractive index and Abbe number.

Product Information
SCHOTT is the first manufacturer to offer selected optical glasses in the new tolerance step 0.5.

For step 0.5 the maximum allowed deviation from the nominal values listed in the datasheet is only
± 0.0001 for the refractive index $n_d$
± 0.1 % for the Abbe number $v_d$

Among the currently available glass types are
- N-FK5
- N-FK51A
- N-PK51
- N-PSK53A
- SCHOTT N-BK7® and N-BK7HT
- N-SK2
- N-LAK9
- N-LASF44
- N-SF5
- SF2
- SF57HTultra
- N-KZFS2
- N-KZFS4 and N-KZFS4HT
- N-KZFS5
- N-KZFS8
- N-KZFS11

Further glasses in tolerance step 0.5 are available upon request.

Advantages
- Small optical tolerances enable precise optical designs
- Well-suited for use in high precision lenses and prism applications
- Precise apochromatic color correction with KZFS glasses in combination with N-FK51A
- HT glasses combine tightest refractive index tolerance with highest transmittance

Applications
- Lenses and prisms used in industrial applications (e.g. inspection systems and microscopy)
- Apochromatic color correction
- Digital projection (N-BK7HT)

Forms of Supply
- Fine annealed cut blanks (e.g. prisms, plates and discs)
- Coarse annealed pressings (not available for N-KZFS2, N-KZFS8, N-KZFS11)

These small tolerances are enabled by a precise control of the melting and fine annealing process. The refractive index glasses in step 0.5 will be certified using SCHOTT’s unique v-block measurement system with enhanced accuracy.