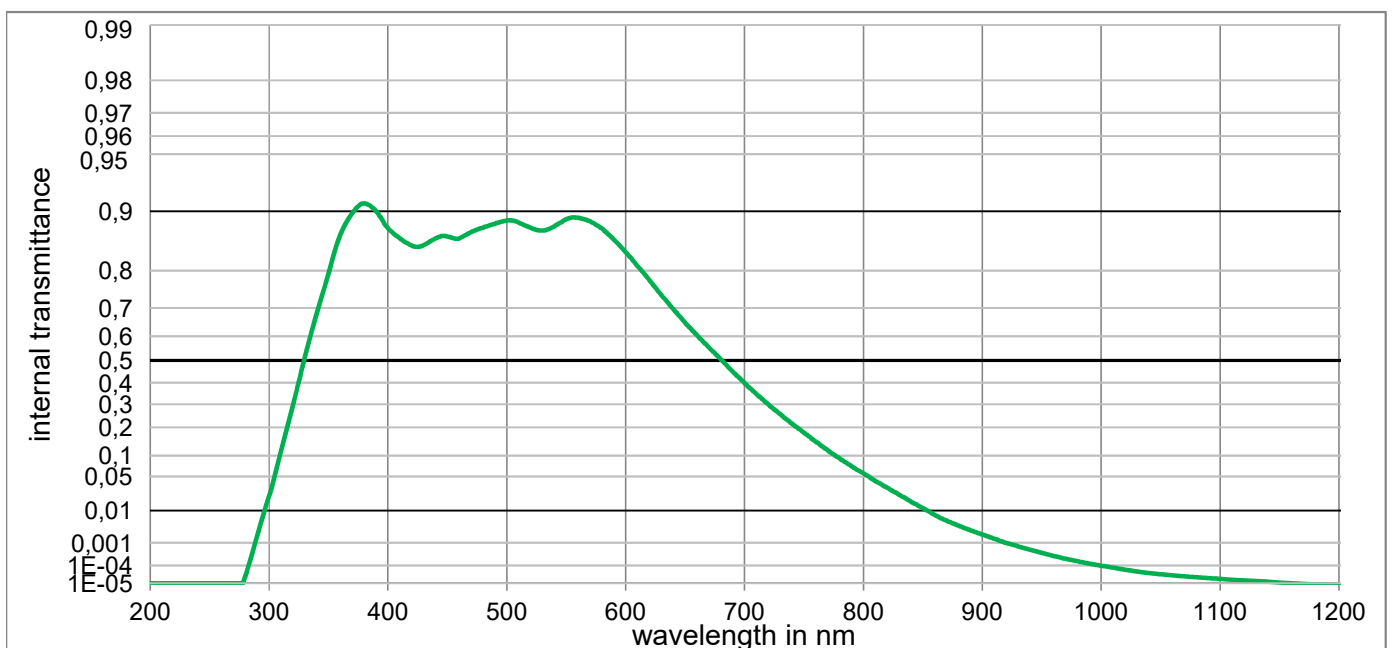
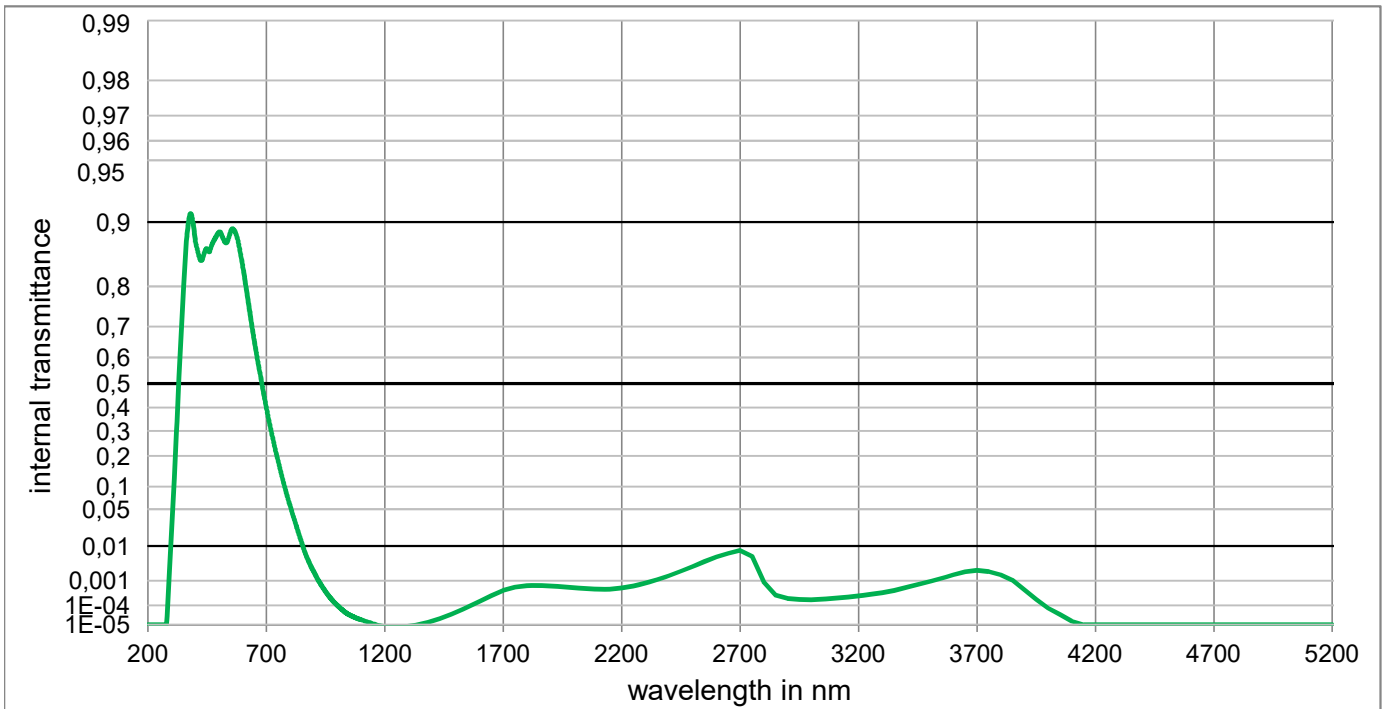


## KG5

Optical properties	Mechanical properties	Colorimetric properties
<b>Reflection factor</b>	<b>Reference thickness</b>	1 mm    2 mm    3 mm
$P_d = 0,921$	$d = 2,00 \text{ mm}$	Illuminant D65 x 0,308    0,304    0,300 y 0,331    0,332    0,334 Y 85,4    79,3    73,7 $\lambda_d$ 496 nm    496 nm    496 nm P <sub>e</sub> 0,015    0,029    0,042
<b>Spectral values guaranteed (d = 2 mm)</b>	<b>Density</b>	
$\lambda_c (\tau_i = 0,5) = \text{nm nm}$	$\rho = 2,53 \text{ g/cm}^3$	
$\lambda_s (\tau_{i,U} = ) = \text{nm}$	<b>Knoop hardness</b>	
$\lambda_p (\tau_{i,L} = ) = \text{nm}$	$HK_{[0,1/20]} = 435$	
$t_i (800 \text{ nm} \leq 0,09)$	<b>Thermal properties</b>	Illuminant A x 0,440    0,434    0,427 y 0,411    0,415    0,418 Y 84,6    77,9    71,9 $\lambda_d$ 504 nm    505 nm    505 nm P <sub>e</sub> 0,016    0,031    0,045
$\tau_i (900 \text{ nm} \leq 0,01)$	<b>Transformation temperature</b>	
	$T_g = 565 \text{ }^\circ\text{C}$	
	<b>Thermal expansion in <math>10^{-6}/\text{K}</math></b>	
	$\alpha_{(-30^\circ\text{C}/+70^\circ\text{C})} = 5,4$	
<b>Refractive indices</b>	$\alpha_{(20^\circ\text{C}/300^\circ\text{C})} = 6,2$	<b>Notes</b>
$n_d (587,6 \text{ nm}) = 1,51$		UV
		Transmission changes are possible under the action of intense ultraviolet radiation.
		Ionically colored glass
<b>Sellmeier coefficients</b>	<b>Chemical properties</b>	
on request	<b>Chemical resistance</b>	
	FR class = 0	
	SR class = 3	
	AR class = 4	
		DIN 58131
	Long-term changes in the polished surface are possible under some circumstances.	
<b>Internal quality</b>		<b>Disclaimer</b>
Bubble class 3		All data without tolerances are to be understood to be reference values



## KG5



**Internal transmittance  $\tau_i$  at reference thickness**  
 The internal transmittance values, tabulated and graphically represented, are reference values only

$\lambda$ /nm	$\tau_i$	$\lambda$ /nm	$\tau_i$	$\lambda$ /nm	$\tau_i$	$\lambda$ /nm	$\tau_i$	$\lambda$ /nm	$\tau_i$	$\lambda$ /nm	$\tau_i$
200	< 1,0E-05	500	8,883E-01	800	5,600E-02	1100	1,875E-05	2200	5,413E-04	3700	2,208E-03
210	< 1,0E-05	510	8,854E-01	810	4,211E-02	1110	1,667E-05	2250	6,482E-04	3750	2,015E-03
220	< 1,0E-05	520	8,781E-01	820	3,171E-02	1120	1,500E-05	2300	8,290E-04	3800	1,577E-03
230	< 1,0E-05	530	8,743E-01	830	2,311E-02	1130	1,370E-05	2350	1,095E-03	3850	1,039E-03
240	< 1,0E-05	540	8,806E-01	840	1,632E-02	1140	1,239E-05	2400	1,479E-03	3900	4,560E-04
250	< 1,0E-05	550	8,900E-01	850	1,135E-02	1150	1,109E-05	2450	2,058E-03	3950	1,861E-04
260	< 1,0E-05	560	8,919E-01	860	7,720E-03	1160	1,007E-05	2500	2,914E-03	4000	7,390E-05
270	< 1,0E-05	570	8,870E-01	870	5,300E-03	1170	< 1,000E-05	2550	4,090E-03	4050	3,650E-05
280	2,8E-05	580	8,770E-01	880	3,839E-03	1180	< 1,000E-05	2600	5,337E-03	4100	1,570E-05
290	1,9E-03	590	8,600E-01	890	2,716E-03	1190	< 1,000E-05	2650	6,620E-03	4150	< 1,000E-05
300	2,2E-02	600	8,380E-01	900	1,990E-03	1200	< 1,000E-05	2700	7,858E-03	4200	< 1,000E-05
310	1,1E-01	610	8,100E-01	910	1,410E-03	1250	< 1,000E-05	2750	5,622E-03	4250	< 1,000E-05
320	2,950E-01	620	7,770E-01	920	1,000E-03	1300	< 1,000E-05	2800	8,872E-04	4300	< 1,000E-05
330	5,160E-01	630	7,380E-01	930	7,311E-04	1350	1,050E-05	2850	2,754E-04	4350	< 1,000E-05
340	6,840E-01	640	6,960E-01	940	5,320E-04	1400	1,549E-05	2900	2,037E-04	4400	< 1,000E-05
350	7,950E-01	650	6,500E-01	950	3,917E-04	1450	2,588E-05	2950	1,856E-04	4450	< 1,000E-05
360	8,690E-01	660	6,040E-01	960	2,877E-04	1500	4,550E-05	3000	1,817E-04	4500	< 1,000E-05
370	8,980E-01	670	5,550E-01	970	2,153E-04	1550	8,507E-05	3050	1,894E-04	4550	< 1,000E-05
380	9,090E-01	680	5,050E-01	980	1,633E-04	1600	1,545E-04	3100	2,083E-04	4600	< 1,000E-05
390	8,998E-01	690	4,500E-01	990	1,256E-04	1650	2,683E-04	3150	2,330E-04	4650	< 1,000E-05
400	8,774E-01	700	3,980E-01	1000	9,931E-05	1700	4,375E-04	3200	2,670E-04	4700	< 1,000E-05
410	8,619E-01	710	3,470E-01	1010	7,816E-05	1750	5,757E-04	3250	3,098E-04	4750	< 1,000E-05
420	8,497E-01	720	2,990E-01	1020	6,166E-05	1800	6,608E-04	3300	3,557E-04	4800	< 1,000E-05
430	8,505E-01	730	2,550E-01	1030	4,932E-05	1850	6,868E-04	3350	4,320E-04	4850	< 1,000E-05
440	8,619E-01	740	2,140E-01	1040	4,055E-05	1900	6,537E-04	3400	5,640E-04	4900	< 1,000E-05
450	8,651E-01	750	1,780E-01	1050	3,467E-05	1950	6,034E-04	3450	7,280E-04	4950	< 1,000E-05
460	8,620E-01	760	1,450E-01	1060	3,006E-05	2000	5,593E-04	3500	9,320E-04	5000	< 1,000E-05
470	8,720E-01	770	1,160E-01	1070	2,630E-05	2050	5,136E-04	3550	1,222E-03	5050	< 1,000E-05
480	8,787E-01	780	9,200E-02	1080	2,323E-05	2100	4,851E-04	3600	1,604E-03	5100	< 1,000E-05
490	8,841E-01	790	7,200E-02	1090	2,075E-05	2150	4,927E-04	3650	1,950E-03	5150	< 1,000E-05