

<b>H-BaK2</b>	<b>540597</b>	$n_d = 1.53996$	$v_d = 59.72$	$n_F - n_C = 0.009041$
		$n_e = 1.54212$	$v_e = 59.45$	$n_F - n_C = 0.009119$

Refractive Indices		
	$\lambda$ (nm)	$n_\lambda$
$n_{2325}$	2325.42	1.51376
$n_{1970}$	1970.09	1.51856
$n_{1530}$	1529.58	1.52378
$n_{1129}$	1128.64	1.52833
$n_{1064}$	1064.00	1.52914
$n_t$	1013.98	1.52981
$n_s$	852.11	1.53235
$n_{A'}$	768.19	1.53407
$n_f$	706.52	1.53565
$n_C$	656.27	1.53721
$n_{C'}$	643.85	1.53765
$n_{He-Ne}$	632.80	1.53806
$n_D$	589.29	1.53988
$n_d$	587.56	1.53996
$n_e$	546.07	1.54212
$n_F$	486.13	1.54625
$n_{F'}$	479.99	1.54677
$n_g$	435.84	1.55117
$n_h$	404.66	1.55525
$n_i$	365.01	1.56225

Relative Partial Dispersion	
$P_{d,C}$	0.3042
$P_{e,d}$	0.2389
$P_{g,F}$	0.5442
$P'_{d,c'}$	0.2533
$P'_{e,d}$	0.2369
$P'_{g,F'}$	0.4825

Chemical Properties (grade)	
RC (S)	1
RA (S)	2
D <sub>w</sub>	1
D <sub>A</sub>	1
R <sub>OH</sub> (S)	2
RP (S)	1
CR	

Internal Transmittance		
$\lambda$ (nm)	$\tau_{5mm}$	$\tau_{10mm}$
2400	0.917	0.842
2200	0.937	0.880
2000	0.974	0.947
1800	0.987	0.976
1600	0.999	0.998
1400	0.999	0.998
1200	0.999	0.998
1060	0.999	0.998
1000	0.999	0.998
950	0.999	0.998
900	0.999	0.998
850	0.999	0.998
800	0.999	0.998
750	0.999	0.998
700	0.999	0.998
650	0.999	0.998
600	0.999	0.998
550	0.999	0.998
500	0.999	0.998
480	0.999	0.998
460	0.999	0.998
440	0.999	0.998
420	0.999	0.998
400	0.999	0.998
390	0.999	0.998
380	0.998	0.997
370	0.998	0.996
360	0.997	0.993
350	0.994	0.988
340	0.988	0.976
330	0.973	0.947
320	0.940	0.885
310	0.863	0.745
300	0.707	0.500
290	0.478	0.228
280	0.260	0.068

Deviation of Relative Partial Dispersions	
$\Delta P_{F,e}$	-0.0004
$\Delta P_{g,F}$	-0.0002
$\Delta P_{C,t}$	-0.0110
$\Delta P_{C,s}$	-0.0062

Expansion Coefficient $\alpha$ ( $\times 10^{-7}/K$ )	
$^{\circ}C$	$\alpha$
-50/-40	69
-40/-30	71
-30/-20	73
-20/-10	74
-10/0	75
0/10	76
10/20	77
20/30	77
30/40	78
40/50	79
50/60	80
60/70	80
70/80	81
80/90	82
90/100	83
100/110	83
110/120	84
120/130	88
130/140	89
140/150	90
150/160	92

Thermal Properties	
T <sub>g</sub> ( $^{\circ}C$ )	560
T <sub>s</sub> ( $^{\circ}C$ )	623
T <sub>10</sub> <sup>14.5</sup> ( $^{\circ}C$ )	491
T <sub>10</sub> <sup>13</sup> ( $^{\circ}C$ )	534
$\alpha_{-50/80^{\circ}C}$ ( $10^{-7}/K$ )	78
$\alpha_{100/300^{\circ}C}$ ( $10^{-7}/K$ )	93
$\lambda$ (W/(m K))	1.02

Constants of Dispersion Formula	
A <sub>0</sub>	2.33787692E+00
A <sub>1</sub>	-8.98050049E-03
A <sub>2</sub>	1.15593975E-02
A <sub>3</sub>	4.92789833E-04
A <sub>4</sub>	-4.58314132E-05
A <sub>5</sub>	2.77373664E-06

Mechanical Properties	
HK ( $10^7 Pa$ )	532
F <sub>A</sub>	103
E (GPa)	71.1
G (GPa)	28.1
$\mu$	0.266
$\sigma_b$ (MPa)	79
B ( $10^{-12}/Pa$ )	2.51

Density	Solarization
$\rho$ (g/cm <sup>3</sup> )	$\Delta\lambda$ (%)
2.85	-29.0

Range of Temperature ( $^{\circ}C$ )	Temperature Coefficients of Refractive Index									
	dn/dt relative ( $\times 10^{-6} / ^{\circ}C$ )									
	t	s	C	C'	He-Ne	d	e	F	F'	g
-60 ~ -40	0.4	0.6	0.7	0.7	0.8	0.9	1.0	1.3	1.4	2.0
-40 ~ -20	0.6	0.8	0.9	0.9	1.0	1.1	1.2	1.4	1.5	2.1
-20 ~ 0	0.8	0.9	1.0	1.1	1.2	1.3	1.5	1.5	1.6	2.3
0 ~ 20	0.9	1.1	1.2	1.2	1.4	1.5	1.8	1.9	2.1	2.6
20 ~ 40	1.4	1.4	1.5	1.5	1.6	1.7	2.0	2.2	2.3	2.6
40 ~ 60	1.5	1.6	1.7	1.7	1.8	1.9	2.1	2.3	2.4	2.7
60 ~ 80	1.6	1.7	1.8	1.8	2.0	2.1	2.4	2.5	2.5	2.9
80 ~ 100	1.7	1.8	1.9	2.0	2.1	2.3	2.5	2.6	2.7	3.1
100 ~ 120	1.9	2.0	2.1	2.2	2.3	2.5	2.6	2.7	2.9	3.3
120 ~ 140	2.1	2.1	2.2	2.3	2.4	2.7	2.8	2.8	2.9	3.5
140 ~ 160	2.2	2.3	2.3	2.4	2.5	2.8	2.9	2.9	3.0	3.7

Coloration Code	
$\lambda_{80}(\lambda_{70})/\lambda_5$	330/290
Coloration of Internal Transmittance	
$\lambda\tau_{80}/\lambda\tau_5$	313/281

Constants of dn/dt		
D <sub>0</sub>	D <sub>1</sub>	D <sub>2</sub>
-1.01E-06	2.38E-08	-4.15E-11
E <sub>0</sub>	E <sub>1</sub>	$\lambda_{TK}$
3.35E-07	-1.37E-10	3.01E-01