

## N-PK51 529770.386

$n_d = 1.52855$	$v_d = 76.98$	$n_F - n_C = 0.006867$
$n_e = 1.53019$	$v_e = 76.58$	$n_{F'} - n_{C'} = 0.006923$

Refractive Indices		
	$\lambda$ [nm]	
$n_{2325.4}$	2325.4	1.50987
$n_{1970.1}$	1970.1	1.51312
$n_{1529.6}$	1529.6	1.51665
$n_{1060.0}$	1060.0	1.52045
$n_t$	1014.0	1.52089
$n_s$	852.1	1.52278
$n_r$	706.5	1.52527
$n_C$	656.3	1.52646
$n_{C'}$	643.8	1.52680
$n_{632.8}$	632.8	1.52711
$n_D$	589.3	1.52849
$n_d$	587.6	1.52855
$n_e$	546.1	1.53019
$n_F$	486.1	1.53333
$n_{F'}$	480.0	1.53372
$n_g$	435.8	1.53704
$n_h$	404.7	1.54010
$n_i$	365.0	1.54527
$n_{334.1}$	334.1	1.55079
$n_{312.6}$	312.6	1.55579
$n_{296.7}$	296.7	
$n_{280.4}$	280.4	
$n_{248.3}$	248.3	

Internal Transmittance $\tau_i$		
$\lambda$ [nm]	$\tau_i$ (10mm)	$\tau_i$ (25mm)
2500	0.919	0.810
2325	0.941	0.860
1970	0.976	0.940
1530	0.994	0.985
1060	0.998	0.994
700	0.997	0.992
660	0.996	0.991
620	0.997	0.992
580	0.998	0.995
546	0.998	0.996
500	0.997	0.993
460	0.995	0.988
436	0.994	0.984
420	0.994	0.984
405	0.994	0.986
400	0.994	0.986
390	0.994	0.984
380	0.989	0.973
370	0.982	0.955
365	0.976	0.940
350	0.933	0.840
334	0.815	0.600
320	0.601	0.280
310	0.398	0.100
300	0.209	0.020
290	0.063	
280	0.010	
270	0.001	
260		
250		

Relative Partial Dispersion	
$P_{s,t}$	0.2750
$P_{C,s}$	0.5360
$P_{d,C}$	0.3046
$P_{e,d}$	0.2387
$P_{g,F}$	0.5401
$P_{i,h}$	0.7535
$P'_{s,t}$	0.2727
$P'_{C',s}$	0.5797
$P'_{d,C'}$	0.2540
$P'_{e,d}$	0.2367
$P'_{g,F'}$	0.4794
$P'_{i,h}$	0.7473

### Deviation of Relative Partial Dispersions $\Delta P$ from the "Normal Line"

$\Delta P_{C,t}$	-0.0991
$\Delta P_{C,s}$	-0.0463
$\Delta P_{F,e}$	0.0088
$\Delta P_{g,F}$	0.0258
$\Delta P_{i,g}$	0.1203

Constants of Dispersion Formula	
$B_1$	1.15610775
$B_2$	0.153229344
$B_3$	0.785618966
$C_1$	0.00585597402
$C_2$	0.0194072416
$C_3$	140.537046

Constants of Dispersion $dn/dT$	
$D_0$	$-1.98 \cdot 10^{-5}$
$D_1$	$-6.06 \cdot 10^{-9}$
$D_2$	$1.60 \cdot 10^{-11}$
$E_0$	$4.16 \cdot 10^{-7}$
$E_1$	$5.01 \cdot 10^{-10}$
$\lambda_{TK} [\mu m]$	0.134

Color Code	
$\lambda_{80}/\lambda_5$	34/29
(*= $\lambda_{70}/\lambda_5$ )	

Remarks
suitable for precision molding, step 0.5 available

Other Properties	
$\alpha_{-30/+70^\circ C} [10^{-6}/K]$	12.4
$\alpha_{+20/+300^\circ C} [10^{-6}/K]$	14.1
$T_g [^\circ C]$	487
$T_{10}^{13.0} [^\circ C]$	488
$T_{10}^{7.6} [^\circ C]$	568
$c_p [J/(g \cdot K)]$	0.620
$\lambda [W/(m \cdot K)]$	0.650
$AT [^\circ C]$	528
$\rho [g/cm^3]$	3.86
$E [10^3 N/mm^2]$	74
$\mu$	0.295
$K [10^{-6} mm^2/N]$	0.54
$HK_{0.1/20}$	415
$HG$	6
<b>Abrasion Aa</b>	592
<b>CR</b>	1
<b>FR</b>	0
<b>SR</b>	52.3
<b>AR</b>	3.3
<b>PR</b>	4.3
<b>SR-J</b>	3
<b>WR-J</b>	1

Temperature Coefficients of Refractive Index						
[ $^\circ C$ ]	$\Delta n_{rel}/\Delta T [10^{-6}/K]$			$\Delta n_{abs}/\Delta T [10^{-6}/K]$		
	1060.0	e	g	1060.0	e	g
-40/ -20	-6.0	-5.7	-5.4	-8.1	-7.8	-7.5
+20/ +40	-7.1	-6.7	-6.4	-8.4	-8.1	-7.7
+60/ +80	-7.5	-7.1	-6.7	-8.6	-8.2	-7.8