

<b>H-ZF50</b> <b>741278</b>	$n_d = 1.74077$	$v_d = 27.76$	$n_F - n_C = 0.026685$
	$n_e = 1.74707$	$v_e = 27.54$	$n_{F'} - n_{C'} = 0.027125$

Refractive Indices		
	$\lambda(\text{nm})$	$n_\lambda$
$n_{2325}$	2325.42	1.69064
$n_{1970}$	1970.09	1.69692
$n_{1530}$	1529.58	1.70426
$n_{1129}$	1128.64	1.71195
$n_t$	1013.98	1.71491
$n_s$	852.11	1.72060
$n_{A'}$	768.19	1.72483
$n_r$	706.52	1.72888
$n_C$	656.27	1.73307
$n_{C'}$	643.85	1.73427
$n_{\text{He-Ne}}$	632.80	1.73540
$n_D$	589.29	1.74054
$n_d$	587.56	1.74077
$n_e$	546.07	1.74707
$n_F$	486.13	1.75976
$n_{F'}$	479.99	1.76139
$n_g$	435.84	1.77598
$n_h$	404.66	1.79059
$n_i$	365.01	1.81850

Constants of Dispersion Formula	
$A_0$	2.91816811E+00
$A_1$	-1.22621813E-02
$A_2$	3.41878382E-02
$A_3$	2.36117574E-03
$A_4$	-1.68240994E-04
$A_5$	2.26673138E-05

Relative Partial Dispersions			
$P_{d,C}$	0.2885	$P'_{d,C'}$	0.2397
$P_{e,d}$	0.2360	$P'_{e,d}$	0.2323
$P_{g,F}$	0.6077	$P'_{g,F'}$	0.5380

Range of Temperature (°C)	Temperature Coefficients of Refractive Index						
	dn/dt relative ( $10^{-6} / ^\circ\text{C}$ )						
	t	C'	He-Ne	D	e	F'	g
-40 ~ -20	0.9	1.8	1.9	2.2	2.6	3.7	5.0
-20 ~ 0	0.8	1.9	1.9	2.3	2.7	3.9	5.3
0 ~ 20	0.8	1.9	2.0	2.4	2.9	4.1	5.5
20 ~ 40	0.8	2.0	2.1	2.4	3.0	4.2	5.8
40 ~ 60	0.9	2.1	2.2	2.6	3.1	4.5	6.1
60 ~ 80	1.1	2.3	2.4	2.8	3.3	4.7	6.4

Chemical Properties (grade)	
RC(S)	1
RA(S)	1
$D_W$	1
$D_A$	1
$R_{OH}(S)$	1
RP(S)	1

Thermal Properties	
$T_g(^\circ\text{C})$	601
$T_s(^\circ\text{C})$	645
$T_{10}^{14.5}(^\circ\text{C})$	540
$T_{10}^{13}(^\circ\text{C})$	591
$\alpha_{-50/80^\circ\text{C}}(10^{-7}/\text{K})$	81
$\alpha_{100/300^\circ\text{C}}(10^{-7}/\text{K})$	101

Mechanical Properties	
HK( $10^7\text{Pa}$ )	555
$F_A$	143
$E(10^7\text{Pa})$	9209
$G(10^7\text{Pa})$	3672
$\mu$	0.254
$B(\text{nm}/\text{cm}/10^5\text{Pa})$	2.750

Density	
$\rho(\text{g}/\text{cm}^3)$	3.05

Deviation of Relative Partial Dispersions	
$\Delta P_{F,e}$	0.0006
$\Delta P_{g,F}$	0.0102
$\Delta P_{C,t}$	0.0058
$\Delta P_{C,s}$	0.0002

Internal Transmittance		
$\lambda(\text{nm})$	$\tau_5\text{mm}$	$\tau_{10}\text{mm}$
2400	0.956	0.910
2200	0.969	0.944
2000	0.990	0.980
1800	0.993	0.986
1600	0.998	0.996
1400	0.998	0.996
1200	0.998	0.996
1060	0.998	0.996
1000	0.998	0.996
900	0.998	0.996
850	0.998	0.996
800	0.998	0.996
750	0.998	0.996
700	0.998	0.996
650	0.998	0.996
600	0.998	0.996
550	0.998	0.996
500	0.996	0.994
480	0.993	0.991
460	0.990	0.988
440	0.987	0.981
420	0.982	0.965
400	0.955	0.914
390	0.914	0.834
380	0.790	0.623
370	0.467	0.219
360		
350		
340		
330		
320		
310		
300		
290		
280		

Coloration Code	
$\lambda_{80}(\lambda_{70})/\lambda_5$	410/365

Coloration of Internal Transmittance	
$\lambda\tau_{80}/\lambda\tau_5$	