

J-KF6

$n_d = 1.517420$

$n_e = 1.519777$

$v_d = 52.20$

$v_e = 51.93$

Glass code (d)	517522
Glass code (e)	520519

Spectral l.	Refractive idx
2.058	1.49223
1.970	1.49357
1.530	1.49959
1.129	1.50471
1.064	1.50561
t	1.50635
s	1.50914
A'	1.511021
r	1.512730
C	1.514429
C'	1.514905
He-Ne	1.515348
D	1.517332
d	1.517420
e	1.519777
F	1.524341
F'	1.524914
g	1.529871
h	1.534576
0.389	1.537508
i	1.542910

Coef. disp. form. (pwr ser.)	
A0	2.26653222E+00
A1	-9.74283829E-03
A2	-8.49115572E-05
A3	1.27195343E-02
A4	3.15395806E-04
A5	-8.83703038E-06
A6	1.84064027E-06
A7	0.00000000E+00
A8	0.00000000E+00

Partial dispersion	
F-C	0.009912
F'-C'	0.010009
C-t	0.008080
C-A'	0.003408
d-C	0.002991
e-C	0.005348
g-d	0.012451
g-F	0.005530
h-g	0.004705
i-g	0.013039
C'-t	0.008556
e-C'	0.004872
F'-e	0.005137
i-F'	0.017996

Relative partial dispersion	
C-t/F-C	0.8152
C-A'/F-C	0.3438
d-C/F-C	0.3018
e-C/F-C	0.5395
g-d/F-C	1.2562
g-F/F-C	0.5579
h-g/F-C	0.4747
i-g/F-C	1.3155
C'-t/F'-C'	0.8548
e-C'/F'-C'	0.4868
F'-e/F'-C'	0.5132
i-F'/F'-C'	1.7980

Deviation of relative partial disp.	
ΔPdC	0.0010
ΔPgF	0.0011

Internal CC (80%/5%)	
359/334	

Color Code (80%/5%)	
365/335	

CCI	
B	0.00
G	0.30
R	0.31

Thermal properties	
CTE(-30,70) [1E-7/°C]	68
CTE(100,300) [1E-7/°C]	79
Tg [°C]	443
At [°C]	524
Ht condct. [W/m·K]	1.023
Sp. heat [kJ/kg·K]	0.748
Ht diffus. [1E-6 m2/sec]	0.555

Chemical properties [class]	
Acid res. (surface)	1
Alkaline detergent res.	1
Climate resistance	1
Water res. (powder)	3
Acid res. (powder)	1

Mechanical properties	
Knoop hardness	458 (5)
Abrasion hardness	84
Young's mod. [GPa]	66.9
Shear mod. [GPa]	27.5
Poisson's ratio	0.214
Stress optical coef. [1E-5 nm/cm/Pa]	3.52

Internal trans. (10mm)	
λ [nm]	τ
280	0.00
290	0.00
300	0.00
310	0.00
320	0.00
330	0.00
340	0.18
350	0.55
360	0.83
370	0.940
380	0.970
390	0.982
400	0.988
420	0.991
440	0.992
460	0.994
480	0.996
500	0.997
550	0.999
600	0.999
650	0.999
700	0.999
800	0.999
900	0.999
1000	0.999
1200	0.999
1400	0.989
1600	0.994
1800	0.990
2000	0.985
2200	0.921
2400	0.88

Specific gravity	
2.47	

Relative $\Delta n / \Delta T$ [1E-6/°C]																
Temp. [°C]	1.083	t	s	A'	r	C	C'	He-Ne	d	e	F	F'	g	h	0.389	
80 to 90 (ref.)	2.5	2.5	2.6	2.7	2.8	2.9	3.0	3.0	3.1	3.3	3.7	3.7	4.1	4.6	4.9	
60 to 80 (ref.)	2.3	2.4	2.5	2.6	2.7	2.8	2.8	2.8	3.0	3.1	3.5	3.5	3.9	4.4	4.7	
40 to 60	2.2	2.2	2.3	2.4	2.5	2.6	2.6	2.7	2.8	2.9	3.3	3.3	3.7	4.2	4.5	
20 to 40	2.0	2.1	2.2	2.2	2.3	2.4	2.5	2.5	2.6	2.8	3.1	3.1	3.5	3.9	4.2	
0 to 20	1.9	1.9	2.0	2.1	2.2	2.3	2.3	2.4	2.5	2.6	2.9	3.0	3.4	3.8	4.1	
-20 to 0	1.9	1.9	2.0	2.1	2.1	2.2	2.3	2.3	2.4	2.5	2.8	2.9	3.2	3.6	3.9	
-40 to -20	1.9	1.9	2.0	2.0	2.1	2.2	2.2	2.3	2.4	2.5	2.8	2.8	3.2	3.6	3.9	
-60 to -40 (ref.)	1.9	2.0	2.1	2.1	2.2	2.3	2.3	2.3	2.4	2.6	2.9	2.9	3.2	3.6	3.9	
-70 to -60 (ref.)	2.1	2.1	2.2	2.3	2.3	2.4	2.4	2.5	2.6	2.7	3.0	3.0	3.3	3.7	4.0	

Absolute $\Delta n / \Delta T$ [1E-6/°C]																
Temp. [°C]	1.083	t	s	A'	r	C	C'	He-Ne	d	e	F	F'	g	h	0.389	
80 to 90	1.5	1.6	1.7	1.8	1.9	2.0	2.0	2.1	2.2	2.4	2.7	2.7	3.2	3.6	3.9	
60 to 80	1.3	1.4	1.5	1.6	1.7	1.8	1.8	1.8	1.9	2.1	2.4	2.5	2.9	3.3	3.6	
40 to 60	1.0	1.1	1.2	1.3	1.3	1.4	1.5	1.5	1.6	1.8	2.1	2.1	2.5	3.0	3.3	
20 to 40	0.7	0.8	0.9	0.9	1.0	1.1	1.1	1.2	1.3	1.4	1.8	1.8	2.2	2.6	2.9	
0 to 20	0.4	0.5	0.6	0.6	0.7	0.8	0.8	0.9	1.0	1.1	1.4	1.4	1.8	2.2	2.5	
-20 to 0	0.1	0.2	0.2	0.3	0.4	0.5	0.5	0.5	0.6	0.8	1.1	1.1	1.4	1.8	2.1	
-40 to -20	-0.2	-0.1	-0.1	0.0	0.1	0.2	0.2	0.2	0.3	0.4	0.7	0.8	1.1	1.5	1.7	
-60 to -40	-0.5	-0.4	-0.4	-0.3	-0.2	-0.2	-0.1	-0.1	0.0	0.1	0.4	0.4	0.7	1.1	1.3	
-70 to -60	-0.7	-0.7	-0.6	-0.5	-0.5	-0.4	-0.4	-0.4	-0.3	-0.1	0.1	0.1	0.5	0.8	1.1	

Coef. disp. form. (frac. eq.) (ref.)	
P1	1.31586600E-01
Q1	8.28160644E+01
P2	7.42229602E-03
Q2	5.27857629E-02
P3	2.89400464E-01
Q3	6.01259424E-03

Fitting error of disp. form. σ [1E-6]		
	Visible	Infrared
Power ser. eq.	0.8	5.0
Frac. eq. (ref.)	0.5	6.5

Prod. Freq. (A to D)	C
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Similar glass type			
OHARA	S-NSL36	HOYA	E-CF6
CDGM	H-KF6	SCHOTT	-

2019-4-1	Transmittance
2015-4-1	Color Code
2011-2-1	Stress optical coefficient