

**Sharp Cut Filter (Yellow)**

**Y-50**

Catalog Thickness t = 2.5 mm Reflection Factor P<sub>r</sub> = 0.913 Diagram-1

Transmittance (T) & Internal Transmittance (τ) units: (%)		200	210	220	230	240	250	260	270	280	290	300	310	320	330	340	350	360	370	380	390	400	410	420	430	440
λ <sub>lim</sub>																										
T																										
τ																										
λ <sub>lim</sub>	450	460	470	480	490	500	510	520	530	540	550	560	570	580	590	600	610	620	630	640	650	660	670	680	690	
T				.01	5.8	40.0	71.3	84.0	88.3	90.0	90.8	91.1														
τ				.01	6.4	43.8	78.1	92.0	96.7	98.6	99.5	99.8														
λ <sub>lim</sub>	700	710	720	730	740	750	800	850	900	950	1,000	1,100	1,200	1,300	1,400	1,500	1,600	1,700	1,800	1,900	2,000	2,100	2,200	2,300	2,400	
T																										
τ																										

**Refractive Indices**

Symbol	i	h	g	e	d	D	C'	C	r	A'	t
λ <sub>lim</sub>	365.0	404.7	435.8	546.1	587.6	589.3	643.8	656.3	705.5	768.2	1,014.0
n				1.544	1.541	1.541	1.539	1.538	1.537	1.535	1.531

Abbe-Number

$$V_d = \frac{n_d - 1}{n_F - n_C} = 57$$

**Color Specifications**

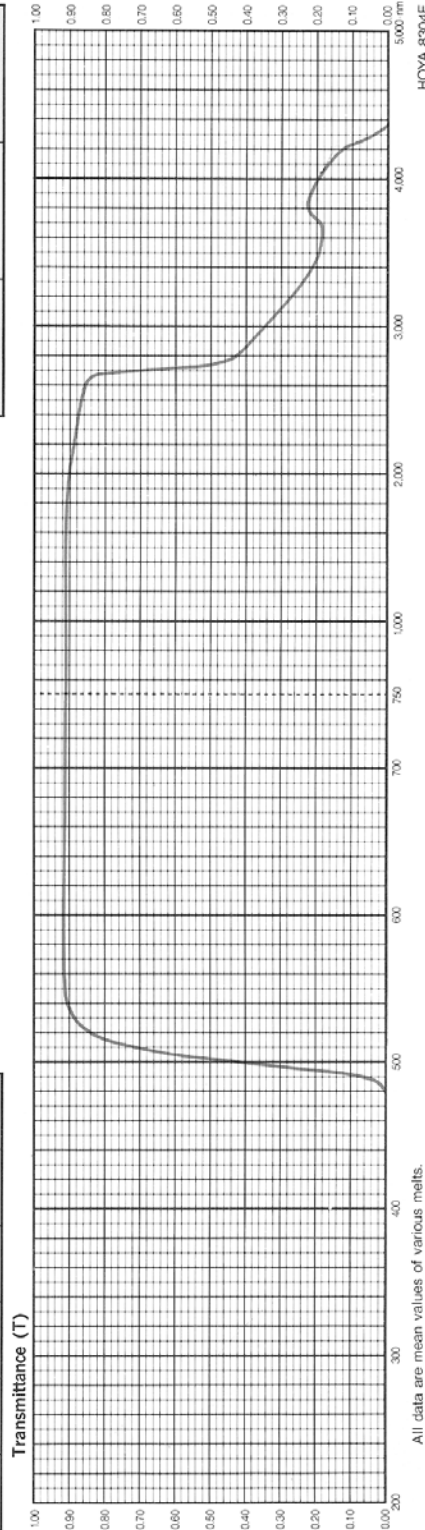
	X	Y	λ <sub>d</sub>	P <sub>e</sub>
A	.516	.470	87.0	91
C	.455	.521	81.8	94
D <sub>65</sub>	.450	.525	82.2	93

**Properties**

Chemical		Thermal		Mechanical		Other	
D <sub>w</sub>	D <sub>A</sub>	T <sub>s</sub>	T <sub>a</sub>	H <sub>k</sub>	F <sub>A</sub>	S	
2	1	560	620	96	108	540	130
						2.68	

**Tolerances of Transmittance (T)**

Transition Wavelength λT (nm)	Transition Interval Δλ (nm)	Average High Transmittance T <sub>HK</sub> (%)
500 ± 5	< 25	> 85



All data are mean values of various melts.

WHILE EVERY ATTEMPT HAS BEEN MADE TO VERIFY THE SOURCE OF THE INFORMATION, NO RESPONSIBILITY IS ACCEPTED FOR ACCURACY OF DATA.

**UQG LTD, THE NORMAN INDUSTRIAL ESTATE, 99-101 CAMBRIDGE ROAD, MILTON, CAMBRIDGE, CB4 6AT, ENGLAND. TEL: +44 (0) 1223 420329 FAX: +44 (0) 1223 420506**