ORALITE® 6700

Engineer Prismatic Grade

Reflective Properties

Reflectivity classes: RA1, Reflective film structure: C, Reflection norm: ORALITE® 6700 - Tabelle 1 (EN12899-1:2007 and ASTM D4956-13), ORALITE® 6700 - Tabelle 2 (ASTM 4956-13, Type I), ORALITE® 6700 - Tabelle 3 (DIN 6171-1:2013-10), ORALITE® 6700 - Tabelle 4 (ASTM D4956)

Areas of Application

- Construction sites

Colours

ORALITE® 6700 is available in the following colours: White (F010), Yellow (F020), Red (F030), Orange (F035), Blue (F050), Green (F060), Brown (F080)

Total thickness

- 0.25 mm (Without protective paper, average value)

Liner

One-sided silicon-coated PP film, 0.06 mm

Adhesive

Solvent-polyacrylate, permanent, White

Recommended laminating films

ORALITE® 5071 Lettering Film, ORALITE® 5062 Transparent Film

Technical properties

RESISTANCE

Resistance to cleaning agents	No change	adhered to aluminum, 8h in solution (0.5% household cleaning agents) at room temperature and 65° C (150° F)
Durability	by specialist application	
	7 Year(s)	unprinted | Under vertical outdoor exposure in Central European standard climate
Shelf Life	1 Year(s)	in original packaging, at 20° C and 50% relative humidity
Temperature resistance	Minimum temperature -56 °C Maximum temperature 82 °C	adhered to aluminium

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ADHESIVE PROPERTIES

Adhesive power	15 N/25 mm	After 24h, stainless steel | FINAT-TM 1, average value, 180° peel at 300 mm (12") / min

PROCESSING

Recommended printing procedure	Digital print with UV-curing inks, Eco-solvent printing, Screen printing
Application temperature	Minimum temperature 10 °C

Table 1 - Specific coefficient of retroreflection R' in cd / (lx m²) (New condition; EN12899-1: 2007 RA1)

Observation Angle		0.2°			0.33°			2°		
Entrance angle		5°	30°	40°	5°	30°	40°	5°	30°	40°
White	(010)	70	30	10	80	24	9	5	2.5	1.5
Yellow	(020)	50	22	7	35	16	6	3	1.5	1
Orange	(035)	30	12	2.2	25	10	2.2	1.2	0.5	#
Red	(030)	14.5	6	2	10	4	1.8	1	0.5	0.5
Blue	(050)	4	1.7	0.5	2	1	#	#	#	#
Green	(060)	9	3.5	1.5	7	3	1.2	0.5	0.3	0.2
Brown	(080)	1	0.3	#	0.6	0.2	#	#	#	#

Table 2 - Specific coefficient of retroreflection R' in cd / (lx m²) (New condition; ASTM 4956-13 (type I))

Observation Angle		0.2°		0.5°	
Entrance angle		-4°	30°	-4°	30°
White	(010)	70	30	30	15
Yellow	(020)	50	22	25	13
Orange	(035)	25	7	13	4

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Observation Angle	0.2°		0.5°	
Entrance angle	-4°	30°	-4°	30°
Red (030)	14	6	7.5	3
Blue (050)	4	1.7	2	0.8
Green (060)	9	3.5	4.5	2.2
Brown (080)	1	0.3	0.3	0.2

Table 3 - Chromaticity coordinates (New condition; DIN 6171-1: 2013-10)

Colours	1		2		3		4		Luminance factor β
	x	y	x	y	x	y	x	y	
White (010)	0.305	0.315	0.335	0.345	0.325	0.355	0.295	0.325	□ 0.27
Yellow (020)	0.494	0.506	0.470	0.480	0.513	0.437	0.545	0.455	□ 0.16
Orange (035)	0.631	0.369	0.552	0.359	0.506	0.404	0.570	0.430	□ 0.12
Red (030)	0.735	0.265	0.700	0.250	0.607	0.343	0.655	0.345	□ 0.03
Blue (050)	0.100	0.109	0.146	0.156	0.183	0.115	0.137	0.038	□ 0.01
Green (060)	0.007	0.703	0.216	0.448	0.147	0.400	0.018	0.454	□ 0.03
Brown (080)	0.455	0.397	0.523	0.429	0.479	0.373	0.558	0.394	0.03 – 0.09

Table 4 - Chromaticity coordinates (New condition; ASTM D4956)

Colours	1		2		3		4		Luminance factor (Y %)
	x	y	x	y	x	y	x	y	
White (010)	0.303	0.300	0.368	0.366	0.340	0.393	0.274	0.329	□ 27
Yellow (020)	0.498	0.412	0.557	0.442	0.479	0.520	0.438	0.472	15 □ Y □ 45
Orange (035)	0.558	0.352	0.636	0.364	0.570	0.429	0.506	0.404	10 □ Y □ 30
Red (030)	0.648	0.351	0.735	0.265	0.629	0.281	0.565	0.346	2.5 □ Y □ 15
Blue (050)	0.140	0.035	0.244	0.210	0.190	0.255	0.065	0.216	1 □ Y □ 10
Green (060)	0.026	0.399	0.166	0.364	0.286	0.446	0.207	0.771	3 □ Y □ 12
Brown (080)	0.430	0.340	0.610	0.390	0.550	0.450	0.430	0.390	1 □ Y □ 9

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