ERIKS

Solutions in Plastics

KASI-PC Flex scratch-resistant coating for PC

Special coating for polycarbonate providing high scratch-resistance and hardness combined with improved climatic and chemical resistance.

Typical properties

	Standard	Dimension	KASI-PC Flex
General properties			
Bulk density	ISO 1183	g/cm³	1,2
Water absorption 24 h, 23°C	ISO 62	mg/kg	<8
Mechanical characteristics			
Tensile strength*	ISO 527	MPa	60
Elongation at tear*	ISO 527	%	110
Modulus of elasticity*	ISO 527	MPa	2200
Impact resistance	ISO 179	kJ/m²	not broken
Extensibility of surface	DIN 53455	%	1,2
Abrasion (Taber-process; 100 rotations; CS-10F; 500 g)	ISO 9352	% Haze	1,4 – 1,8
Thickness of layer		µm	4 – 8
Adhesive properties 0,5/1,0/2,0 h boiling period at 100°C	ISO 2409		GT 0/0/0
Climatic resistance	ISO 4892	% Diff.	0,1
Sand trickle test	DIN 52348		4
Thermal characteristics			
Vicat diluting temperature VST/B 50	ISO 306	°C	150
Constancy temperature HDT/A (1,8 N/mm²)	ISO 75	°C	135
Temperature of permanent use	DIN 53446	°C	115
Linear coefficient of cubical thermal expansion (α) 0 - 50 °C	DIN 53752	K^{-1}	65 x 10^{-6}
Heat conductibility (λ)	DIN 52612	W/mK	0,21
Specific heat (c)		J/gK	1,3
Optical characteristics			
Refractive index	ISO 489	nD 20	1,428 (1,585)
Transparency 380-780 nm D = 3 mm	DIN 5036	%	>86
Chamfer angle*	DIN 52305	Bg'	<5
Refractive power*	DIN 52305	dpt	<0,1
Electrical characteristics			
Specific volume resistivity	DIN VDE 0303	Ωcm	10^{15}
Dielectric strength	DIN EN 60243	kV/mm	>30
Special characteristics			
Behaviour in fire	DIN 4102	Fire classification	B 2

*The information applies to the carrier material.