



Mechanical Properties

Specific gravity	1650 - 1770 kg/m ³	(DIN 53455)
Tensile strength	36 - 42 N/mm ²	(DIN 53455)
Bending strength	52 - 54 N/mm ²	(DIN 53452)
E-modulus tensile	8741 - 10540 N/mm ²	(DIN 53457)
E-modulus bending	8560 - 10000 N/mm ²	(DIN 53453)
Elongation at fracture	-0,45% - 0,5%	(DIN 53255)
Hardness	60-70 Barcol	(DIN EN 59)

Dynamic Properties

Impact (falling ball)	no fracture	(ANSI Z 124)
Thermoshock bowls	>4000 cycles 65°C /90sec. 15 C/90sec	(ANSI Z 124)
Scratch resistance	Wm = 94 mg (± 13 mg)	(DIN 53745)
Colourfastness	no change after 200 hrs. light contrast after 600 hrs	(ANSI Z 124) (ISO 105 A03)

Thermal Properties

Thermal expansion	0,045 mm/m1 K. up to 90o C.	(ASTM E 570)
Cigarette resistance	no lasting effect	(ANSI Z 124)
Hot pan test	10 minutes 180° Celsius no lasting effect	(DIN 53799)

Gases, Liquids, Solids

Water absorption	23° C. 0,03%	(ASTM D 570)
Boiling water	no visible change	(DIN 53799)
Contact with food	physiological suitable, contact with food allowed	(ISEGA 19392U03)
Environment	biological neutral, no chemical waste	(INT DSM)

Fire, Explosion

Flammability	Baustoffklasse B1	(DIN 4102, 05/98)
	Klasse S4, SR2, ST2 (DB)	(DIN 5510, part 2)
	Class 1 surface spread of flame	(BS 476, part 6 and 7)
	Class 0, in accordance of national building regulations	(BS 476, part 6 and 7)
	Classement M2	(CSTB No RA02-0333)
Dust explosion	Klasse St 1	(PB 2001-1127)
Oxygen index (LOI)	27% - 32%	(ASTM 2863)