

Technical Data Sheet

ALUCOBOND®

Panel Thickness		Standards	Units	3 mm	4 mm	6 mm
Thickness of Aluminium Layers			[mm]	0.50		
Weight			[kg/m ²]	4.5	5.5	7.3
Technical Properties						
Section Modulus	W	DIN 53293	[cm ³ /m]	1.25	1.75	2.75
Rigidity (Poisson's ratio $\mu = 0,3$)	E-I	DIN 53293	[kNcm ² /m]	1250	2400	5900
Alloy /		EN 573-3		EN AW-5005A (AlMg1),		
Temper of Cover Sheets		EN 515		H22 / H42		
Modulus of Elasticity		EN 1999 1-1	[N/mm ²]	70'000		
Tensile Strength of Aluminium		EN 485-2	[N/mm ²]	R _m ≥ 130		
0.2% Proof Stress		EN 485-2	[N/mm ²]	R _{p0,2} ≥ 90		
Elongation		EN 485-2	[%]	A ₅₀ ≥ 5		
Linear Thermal Expansion		EN 1999 1-1		2,4 mm / m at 100°C temperature difference		
Core						
Polyethylene, Type LDPE						
Surface						
Lacquering						
Gloss (initial value)						
Pencil Hardness						
		EN 13523-2	[%]	Coil Coating Fluorocarbon based (e.g. PVdF) 30 – 80		
		EN 13523-4		HB - F		
Acoustical Properties						
Sound Absorption Factor	α_s	ISO 354		0.05		
Sound Transmission Loss	R _w	ISO 717-1	[dB]	25	26	27
Loss Factor	d	EN ISO 6721		0.0072	0.0087	0.0138
Thermal Properties						
Thermal Resistance	R	DIN 52612	[m ² K/W]	0.0069	0.0103	0.0172
Heat Transition Coefficient	U	DIN 4108	[W/m ² K]	5.65	5.54	5.34
Temperature Resistance			[°C]	-50 to +80		
Fire Classification						
acc. to BS 476, Part 6: Index I ≤ 12 i ≤ 6 , Part 7: Class 1						