



## Wefapress® St 6000® GB (DIN 16972 TG2)

Standard colour(s): grey-blue

Special colour(s): –

Fields of application:

- chemical industry
- food industry
- mechanical engineering
- transport- and conveyor systems

Properties:

- minimum abrasion without additives
- good sliding properties
- high bending- and impact strength
- good chemical resistance

Material designation		St 6000® GB	
Raw material	PE-UHMW		
Material colour(s)	grey-blue		
Properties	Unit	Test method	Value
Molecular weight (average molar mass)	g/mol		~ 6 Mio.
Mechanical properties			
Density	g/cm <sup>3</sup>	DIN 53479	0,959
Tensile strength	N/mm <sup>2</sup>	DIN 53455	
Shore D hardness, 15s - Value	Skala D	DIN 53505	66
Ball indentation hardness, 30s - Value	N/mm <sup>2</sup>	DIN ISO 2039 Part 1	43
Ultimate tensile strength	N/mm <sup>2</sup>	DIN 53455	
Elongation at break	%	DIN ISO / R 527	600
Modulus of elasticity	N/mm <sup>2</sup>	DIN 53457	
Notched impact strength (Charpy)	kJ/m <sup>2</sup>	DIN 53453	o.Br.
Abrasion	%	Sand slurry method	85
Coefficient of friction	μ		
Thermal properties			
Dimensional stability under heat	°C	DIN 53461	
Vicat softening temperature	°C	DIN 53460	
Crystalline melting range	°C	DTA	135 – 138
Thermal conductivity at 23 °C	W/ (K * m)	DIN 52612	
Specific heat at 23 °C	kJ/ (K * Kg)		
Coefficient of linear expansion at 23 °C	10 <sup>-5</sup> * (1/K)	DIN 53752	18
Fire behaviour		UL 94	HB
Application temperature (min.)	°C		- 269
Application temperature (constant)	°C		+ 80
Moisture absorption	%		< 0,01
Electrical properties			
Specific volume resistance	Ω * cm	DIN 53482	< 10 <sup>16</sup>
Surface resistance	Ω	DIN 53482	< 10 <sup>14</sup>
Dielectric strength	kV/mm	DIN 53481	90
Dielectric constant at 50 Hz		DIN 53485	