

# Technical Data Sheet

## GEHR PVDF®



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0800 506 407

### I. Physical Properties

	Test method	Unit	Value
1. Specific gravity	ISO 1183	g/cm <sup>3</sup>	1,78
2. Water absorption	ISO 62	%	<= 0,04
3. Maximum permissible service temp. (no stronger mechanical stress involved)	-		-
Upper temperature limit	-	°C	150
Lower temperature limit	-	°C	-30

### II. Mechanical Properties

	Test method	Unit	Value
1. Tensile strength at yield	ISO 527	MPa	50
2. Elongation at yield.	ISO 527	%	9
3. Tensile strength at break	ISO 527	MPa	-
4. Elongation at break	ISO 527	%	> 50
5. Impact strength	ISO 179	kJ/m <sup>2</sup>	252
6. Notch impact strength	ISO 179	kJ/m <sup>2</sup>	22
7. Ball indentation / Rockwell hardness	ISO 2039-1	MPa	80 / -
8. Shore-D	DIN 53505		78
9. Flexural strength	ISO 178	MPa	80
10. Modulus of elasticity	ISO 527	MPa	2000

### III. Thermal Properties

		Test method	Unit	Value
1. Vicat-softening point	VST/B/50	ISO 306	°C	138
	VST/A/50		°C	160
2. Heat deflection temperature	HDT/B	ISO 75	°C	145
	HDT/A		°C	104
3. Coefficient of linear thermal expansion		DIN 53752	K <sup>-1</sup> *10 <sup>-4</sup>	1,5
4. Thermal conductivity at 20 °C			W/(m*K)	0,13

### IV. Electrical Properties

	Test method	Unit	Value
1. Volume resistivity	VDE 0303	Ω*cm	>= 10 <sup>10</sup>
2. Surface resistivity		Ω	>= 10 <sup>13</sup>
3. Dielectric constant at 1MHz		-	7
4. Dielectric loss factor at 1 MHz	DIN 53483	-	0,24
5. Dielectric strength	VDE 0303	kV/mm	27
6. Tracking resistance	IEC 60112	-	CTI 600

### V. Additional Data

	Test method	Unit	Value
1. Bond ability		-	fair
2. Friction coefficient	DIN 53375	-	0,34
3. Flammability	UL 94	-	HB
4. UV stabilisation	-	-	+

All values are attributes of the used raw materials.

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