

TECAPEEK GF30 natural - 型材(棒材,板材,管件)

化學命名
PEEK (聚醚醚酮)

顏色
米黃色 不透明

密度
1.53 g/cm³

添加物
玻璃纖維

- 主要特色**
- 固有的防火性
 - 改良過的強度
 - 極高的耐蠕變性
 - 良好的耐化學性
 - 耐水解和熱蒸氣
 - 極高的剛性
 - 良好的尺寸穩定性
 - 高能輻射抗性

- 目標產業**
- 汽車工業
 - 化學技術
 - 電子學
 - 石油和天然氣工業
 - 真空科技
 - 機械工程
 - 航空與航太科技

機械特性	參數	值	單位	標準	註解
抗拉強度	5mm/min	113	MPa	DIN EN ISO 527-2	
彈性模數 (張力測試)	1mm/min	6300	MPa	DIN EN ISO 527-2	1)
斷裂伸長率	5mm/min	5	%	DIN EN ISO 527-2	
壓縮強度	1% / 2% / 5% 5mm/min, 10 N	29/52/120	MPa	EN ISO 604	2)
衝擊強度(Charpy)	max. 7,5J	52	kJ/m ²	DIN EN ISO 179-1eU	3)
蕭氏硬度	D	90		DIN EN ISO 868	
熱特性	參數	值	單位	標準	註解
玻璃轉化溫度		147	°C	DIN EN ISO 11357	1)
熔化溫度		341	°C	DIN EN ISO 11357	
使用溫度	short term	300	°C		2)
使用溫度	long term	260	°C		
熱膨脹 (CLTE)	23-60°C, long.	4	10 ⁻⁵ K ⁻¹	DIN EN ISO 11359-1;2	
熱膨脹 (CLTE)	23-100°C, long.	4	10 ⁻⁵ K ⁻¹	DIN EN ISO 11359-1;2	
熱膨脹 (CLTE)	100-150°C, long.	5	10 ⁻⁵ K ⁻¹	DIN EN ISO 11359-1;2	
比熱		1.0	J/(g*K)	ISO 22007-4:2008	
導熱係數		0.35	W/(K*m)	ISO 22007-4:2008	
電性特性	參數	值	單位	標準	註解
表面電阻		10 ¹⁴	Ω	-	(1) Specimen in 1mm thickness
體積電阻		10 ¹⁴	Ω*cm	-	
介電強度	23°C, 50% r.h.	36	kV/mm	ISO 60243-1	1)
其他特性	參數	值	單位	標準	註解
吸水率	24h / 96h (23°C)	0.02 / 0.03	%	DIN EN ISO 62	1)
耐熱水/鹼		+	-		(1) Ø ca. 50mm, h=13mm (2) + good resistance (3) - poor resistance
耐候性		-	-		(4) Corresponding means no listing at UL (yellow card). The information might be taken from resin, stock shape or estimation. Individual testing regarding application conditions is mandatory.
耐燃性(UL94)	corresponding to	V0		DIN IEC 60695-11-10;	4)

→ TECAPEEK產品使用Victrex®PEEK 450或Solvay KetaSpire®製成

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