

## Technical Data Sheet

# SustaPEEK - ASTM

### Typical characteristics

- Flame retardant and self-extinguishing
- Very low smoke density
- Good dimensional stability

### Typical industries

- Elektrotechnický průmysl
- Ropa a plyn
- Stavba strojů a zařízení
- Elektronika
- Letectví a kosmonautika
- Healthcare
- Semiconductor Wafer Handling
- Semiconductor Front-End Wet Bench
- Semiconductor CMP
- Semiconductor High and low temperature
- Semiconductor Back-End applications
- Semiconductor factory equipment
- Semiconductor Dicing

	Test method	Unit	Guideline value
<b>General properties</b>			
Density	ASTM D792	g / cm <sup>3</sup>	1.32
Water Absorption 24 hours	ASTM D570	%	0.1
Dissipation Factor	ASTM D150	1MHz	0.003
Water Absorption Saturation	ASTM D570	%	0.5
<b>Mechanical properties</b>			
Hardness	ASTM D2240	Shore D	85
Tensile Strength at yield 73°F	ASTM D638	psi	16000
Tensile Modulus	ASTM D638	psi	500000
Elongation at Break	ASTM D638	%	20
Flexural Strength	ASTM D790	psi	25000



	Test method	Unit	Guideline value
Flexural Modulus	ASTM D790	psi	600000
Compressive Strength	ASTM D695	psi	18000
Rockwell Hardness	ASTM D785		105
Rockwell Hardness	ASTM D785	R	126
Shear Strength	ASTM D732	psi	7700
Izod Impact, Notched	ASTM D256	ft-lb/in	1.2
Coefficient of Friction, Dynamic			0.4
<b>Thermal properties</b>			
Thermal Conductivity		in/hr/ft <sup>2</sup> /°F	1.73
Coefficient of Linear Thermal Expansion	ASTM D696	in/in/°F x10 <sup>-5</sup>	2.6
Melting Point	ASTM D789	°F	630
Continuous Service Temperature, Air		°F	480
Deflection Temperature at 1.8Mpa (264psi)	ASTM D648	°F	320
Deflection Temperature at 1.8Mpa (66psi)	ASTM D648	°F	360
Flammability, UL94		1/8 inch	V-0
<b>Electrical properties</b>			
Dielectric constant	ASTM D150	1MHz	3.3
Dielectric strength	ASTM D149	V/mil	480
Surface resistivity	ASTM D257	Ω/cm	10 <sup>13</sup>
<b>Compliance properties</b>			
FDA			Yes
NSF			No
USDA			Yes

The data stated above are average values ascertained by statistical tests on a regular basis. The data above are provided purely for information and shall not be regarded as binding unless expressly agreed in a contract of sale.

