EcoPaXX®

EcoPaXX® Q-HG6

PA410-GF30

30% Glass Reinforced, Heat Stabilized

EcoPaXX® Q-HG6 is a long aliphatic polyamide with excellent chemical & hydrolysis resistance for use in thermal management applications as well as other structural parts.

Sustainability

Bio-based - 14C measurable
Also available as bio-based mass balanced alternative

Properties	Typical Data	Unit	Test Method
Rheological properties	dry / cond		
Molding shrinkage (parallel)	0.5 / *	%	ISO 294-4
Molding shrinkage (normal)	1 / *	%	ISO 294-4
Mechanical properties	dry / cond		
Tensile modulus	9200 / 7000	MPa	ISO 527-1/-2
Stress at break	180 / 120	MPa	ISO 527-1/-2
Strain at break	3.9 / 5.8	%	ISO 527-1/-2
Tensile modulus (80°C)	5700 / -	MPa	ISO 527-1/-2
Stress at break (80°C)	115 / -	MPa	ISO 527-1/-2
Strain at break (80°C)	8.5 / -	%	ISO 527-1/-2
Tensile modulus (120°C)	4600 / -	MPa	ISO 527-1/-2
Stress at break (120°C)	85 / -	MPa	ISO 527-1/-2
Strain at break (120°C)	9 / -	%	ISO 527-1/-2
Tensile modulus (160°C)	3700	MPa	ISO 527-1/-2
Stress at break (160°C)	70	MPa	ISO 527-1/-2
Strain at break (160°C)	9.5	%	ISO 527-1/-2
Charpy impact strength (+23°C)	80 / 80	kJ/m²	ISO 179/1eU
Charpy impact strength (-30°C)	60 / 60	kJ/m²	ISO 179/1eU

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Property Data

EcoPaXX® Q-HG6

Properties	Typical Data	Unit	Test Method
Charpy notched impact strength (+23°C)	11 / 15	kJ/m²	ISO 179/1eA
Charpy notched impact strength (-30°C)	9 / 9	kJ/m²	ISO 179/1eA
Flexural modulus	8500 / 6300	MPa	ISO 178
Flexural strength	260 / 185	MPa	ISO 178
Thermal properties	dry / cond		
Melting temperature (10°C/min)	250 / *	°C	ISO 11357-1/-3
Temp. of deflection under load (1.80 MPa)	215 / *	°C	ISO 75-1/-2
Temp. of deflection under load (0.45 MPa)	243 / *	°C	ISO 75-1/-2
Coeff. of linear therm. expansion (parallel)	0.32 / *	E-4/°C	ISO 11359-1/-2
Coeff. of linear therm. expansion (normal)	0.66 / *	E-4/°C	ISO 11359-1/-2
Electrical properties	dry / cond		
Volume resistivity	1E12 / 1E11	Ohm*m	IEC 62631-3-1
Surface resistivity	- / 1E13	Ohm	IEC 62631-3-2
Other properties	dry / cond		
Humidity absorption	1.5 / *	%	Sim. to ISO 62
Density	1340 / -	kg/m³	ISO 1183
Biobased content (in polymer)	70	% (Bio C/Total C)	ASTM D6866-12 Method B

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