

Product Texts

PPA injection moulding grade 33% glass fibre reinforced with high glass transition temperature and high melting point. Black colour.

Suitable for parts requiring high stiffness and strength. High resistance to hot water and automotive cooling circuit liquids.

Processing/Physical Characteristics	dry / cond	Unit	Test Standard
ISO Data			
^[C] Molding shrinkage, parallel	0.3 / *	%	ISO 294-4, 2577
^[C] Molding shrinkage, normal	0.7 / *	%	ISO 294-4, 2577

[C]: CAMPUS

Mechanical properties	dry / cond	Unit	Test Standard
ISO Data			
^[C] Tensile Modulus	11800 / 11800	MPa	ISO 527
^[C] Stress at break	220 / 195	MPa	ISO 527
^[C] Strain at break	2.6 / 2.5	%	ISO 527
^[C] Charpy impact strength, +23°C	80 / -	kJ/m ²	ISO 179/1eU
^[C] Charpy impact strength, -30°C	65 / -	kJ/m ²	ISO 179/1eU
^[C] Charpy notched impact strength, +23°C	13 / 12	kJ/m ²	ISO 179/1eA
^[C] Charpy notched impact strength, -30°C	12 / -	kJ/m ²	ISO 179/1eA

[C]: CAMPUS

Thermal properties	dry / cond	Unit	Test Standard
ISO Data			
^[C] Melting temperature, 10°C/min	310 / *	°C	ISO 11357-1/-3
^[C] Temp. of deflection under load, 1.80 MPa	275 / *	°C	ISO 75-1/-2
^[C] Coeff. of linear therm. expansion, parallel	20 / *	E-6/K	ISO 11359-1/-2
^[C] Coeff. of linear therm. expansion, normal	68 / *	E-6/K	ISO 11359-1/-2
^[C] Burning Behav. at thickness h	HB / *	class	IEC 60695-11-10
Thickness tested	0.8 / *	mm	-

[C]: CAMPUS

Electrical properties	dry / cond	Unit	Test Standard
ISO Data			
^[C] Volume resistivity	1E13 / 1E11	Ohm*m	IEC 62631-3-1
^[C] Surface resistivity	* / 1E10	Ohm	IEC 62631-3-2

[C]: CAMPUS

Other properties	dry / cond	Unit	Test Standard
^[C] Density	1430 / -	kg/m ³	ISO 1183

[C]: CAMPUS

Processing Recommendation Injection Molding	Value	Unit	Test Standard
Pre-drying - Temperature	120	°C	-
Pre-drying - Time	≥4	h	-
Processing humidity	≤0.1	%	-
Melt temperature	320 - 340	°C	-
Mold temperature	130 - 150	°C	-

Characteristics

Processing

Injection Molding

Special Characteristics

Heat stabilized or stable to heat

Delivery form

Granules, Black

Applications

Automotive

Additives

Release agent

Regional AvailabilityNorth America, Europe, Asia Pacific, South and Central America,
Near East/Africa**Other text information****Injection molding**

The material is delivered in moisture-proof packaging ready for processing. Maximum recommended water content for best processing is 0.10%. Typical conditions with a desiccant drier: temperature 120° C, dew point -20 ° C or below, time 4 h or more. Avoid excessive shear rates and high thermal stresses for better processing. Special care must be taken to avoid moisture absorption and contamination with other polymers when adding regrind material. Colour variation and mechanical properties reduction may occur and should always be carefully monitored.

Injection Molding Processing Parameters

Melt Temperature

320 - 340°C

Mold Temperature

130 - 150°C

Injection Speed

high