

LONGLITE® PA 10G9-104

Chang Chun Plastics Co., Ltd. (CCP Group) - Polyamide 6

General Information

Product Description

Polyamide 6, 45% glass-fiber reinforced injection molding grade.

General

Material Status	• Commercial: Active
Availability	• Asia Pacific • Europe • North America
Filler / Reinforcement	• Glass Fiber, 45% Filler by Weight
Additive	• Mold Release
Forms	• Pellets
Processing Method	• Extrusion • Injection Molding • Profile Extrusion
Part Marking Code (ISO 11469)	• >PA6-GF45<

 Properties ¹

Physical	Nominal Value	Unit	Test Method
Density	1.50	g/cm ³	ISO 1183
Molding Shrinkage - Across Flow	0.10 to 0.30	%	ISO 294-4
Water Absorption (Equilibrium, 73°F, 50% RH)	1.7	%	ISO 62
Mechanical	Nominal Value	Unit	Test Method
Tensile Modulus	1.09E+6	psi	ISO 527-1
Tensile Stress (Break)	25400	psi	ISO 527-2
Tensile Strain (Break)	4.0	%	ISO 527-2
Flexural Modulus	1.61E+6	psi	ISO 178
Flexural Stress	37700	psi	ISO 178
Impact	Nominal Value	Unit	Test Method
Charpy Notched Impact Strength (73°F)	7.9	ft-lb/in ²	ISO 179/1eA
Thermal	Nominal Value	Unit	Test Method
Deflection Temperature Under Load (66 psi, Unannealed)	430	°F	ISO 75-2/B
Deflection Temperature Under Load (264 psi, Unannealed)	415	°F	ISO 75-2/A
Melting Temperature ²	432	°F	ISO 11357-3
Electrical	Nominal Value	Unit	Test Method
Surface Resistivity	1.0E+12	ohms	IEC 60093
Volume Resistivity	1.0E+15	ohms·cm	IEC 60093
Electric Strength (0.0787 in)	660	V/mil	IEC 60243-1
Flammability	Nominal Value	Unit	Test Method
Flame Rating (0.031 in)	HB		UL 94

Processing Information

Injection	Nominal Value	Unit
Drying Temperature	176	°F
Drying Time	4.0	hr
Suggested Max Moisture	0.20	%
Processing (Melt) Temp	464 to 536	°F
Mold Temperature	176 to 203	°F

Notes

¹ Typical properties: these are not to be construed as specifications.

² 10°C/min
