



LubriOne™ PC-20CF/15T

Polycarbonate

Key Characteristics

Product Description

LubriOne™ Lubricated and Wear-Resistant Compounds have been specifically formulated to be self-lubricating materials, offering low coefficient of friction and improved wear resistance properties. LubriOne compounds have been demonstrated to reduce friction, noise, vibration, heat buildup and improve product durability.

General

Material Status	• Commercial: Active
Regional Availability	• Africa & Middle East • Asia Pacific • Europe • Latin America
Features	• Good Wear Resistance • Low Friction • Lubricated
Uses	• Appliance Components • Automotive Applications • Bearings • Business Equipment • Consumer Applications • Conveyor Parts • Gears • Industrial Applications • Printer Parts • Pulleys • Rollers
RoHS Compliance	• RoHS Compliant
Forms	• Pellets
Processing Method	• Injection Molding

Technical Properties ¹

Physical	Typical Value (English)	Typical Value (SI)	Test Method
Specific Gravity	1.37	1.37	ASTM D792
Molding Shrinkage - Flow	1.0E-3 to 2.0E-3 in/in	0.10 to 0.20 %	ASTM D955
Water Absorption (24 hr, 0.125 in (3.18 mm))	0.15 %	0.15 %	ASTM D570
Mechanical	Typical Value (English)	Typical Value (SI)	Test Method
Tensile Modulus ²	1.60E+6 psi	11000 MPa	ASTM D638
Tensile Strength ² (Yield)	19500 psi	134 MPa	ASTM D638
Tensile Elongation ² (Break)	1.0 to 3.0 %	1.0 to 3.0 %	ASTM D638
Flexural Modulus	1.60E+6 psi	11000 MPa	ASTM D790
Flexural Strength	17500 psi	121 MPa	ASTM D790
Coefficient of Friction			ASTM D1894
vs. Steel - Dynamic	0.50	0.50	
vs. Steel - Static	0.39	0.39	
Impact	Typical Value (English)	Typical Value (SI)	Test Method
Notched Izod Impact			ASTM D256A
73°F (23°C), 0.125 in (3.18 mm), Injection Molded	1.8 ft-lb/in	96 J/m	
Thermal	Typical Value (English)	Typical Value (SI)	Test Method
Deflection Temperature Under Load			ASTM D648
66 psi (0.45 MPa), Unannealed, 0.250 in (6.35 mm)	300 °F	149 °C	
Deflection Temperature Under Load			ASTM D648
264 psi (1.8 MPa), Unannealed, 0.250 in (6.35 mm)	295 °F	146 °C	
Flammability	Typical Value (English)	Typical Value (SI)	Test Method
Flame Rating	HB	HB	UL 94

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Processing Information

Injection	Typical Value (English)	Typical Value (SI)
Processing (Melt) Temp	580 to 630 °F	304 to 332 °C

Notes

¹ Typical values are not to be construed as specifications.

² Type I, 0.20 in/min (5.1 mm/min)

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