

Product Texts

LNP THERMOCOMP DC006 compound is based on Polycarbonate (PC) resin containing 30% carbon fiber. Added features of this grade include: Electrically Conductive.

Processing/Physical Characteristics	Value	Unit	Test Standard
ASTM Data			
Mold Shrinkage, MD	0.15	mm/mm	ASTM D 955
Mold Shrinkage, TD	0.3	mm/mm	ASTM D 955

Mechanical properties	Value	Unit	Test Standard
ISO Data			
Tensile Modulus	15800	MPa	ISO 527
Yield stress	141	MPa	ISO 527
Yield strain	1.8	%	ISO 527
Stress at break	141	MPa	ISO 527
Strain at break	1.8	%	ISO 527
Flexural modulus	14300	MPa	ISO 178
Izod impact strength, +23°C, 4mm	44	kJ/m ²	ISO 180/1U
Izod notched impact strength, +23°C, 4mm	6	kJ/m ²	ISO 180/1A

ASTM Data	Value	Unit	Test Standard
Tensile Modulus	15870	MPa	ASTM D 638
Tensile Strength at Yield	141	MPa	ASTM D 638
Tensile Strength at Break	141	MPa	ASTM D 638
Elongation at Yield	1.9	%	ASTM D 638
Elongation at Break	1.9	%	ASTM D 638
Izod Impact notched, 1/8 in	69	J/m	ASTM D 256
Izod Impact unnotched, 1/8 in	587	J/m	ASTM D 256

Thermal properties	Value	Unit	Test Standard
ISO Data			
Temp. of deflection under load, 1.80 MPa	143	°C	ISO 75-1/-2
Temp. of deflection under load, 0.45 MPa	148	°C	ISO 75-1/-2
Coeff. of linear therm. expansion, parallel	20	E-6/K	ISO 11359-1/-2
Coeff. of linear therm. expansion, normal	44	E-6/K	ISO 11359-1/-2
ASTM Data			
DTUL @ 66 psi	147	°C	ASTM D 648
DTUL @ 264 psi	142	°C	ASTM D 648

Other properties	Value	Unit	Test Standard
Density	1330	kg/m ³	ISO 1183
Water Absorption, 24hr	0.12	%	ASTM D 570
Density	1330	kg/m ³	ASTM D 792

Processing Recommendation Injection Molding	Value	Unit	Test Standard
Pre-drying - Temperature	120	°C	-
Pre-drying - Time	4	h	-
Processing humidity	≤0.02	%	-
Melt temperature	305 - 325	°C	-
Mold temperature	80 - 110	°C	-
Zone 1	295 - 305	°C	-
Zone 2	310 - 320	°C	-
Zone 3	320 - 330	°C	-
Screw speed	30 - 60	rpm	-
Back pressure	0.2 - 0.3	MPa	-

Characteristics

Processing

Injection Molding

Regional Availability

North America, Europe, Asia Pacific

Special Characteristics

Increased electrical conductivity