



LNP™ THERMOCOMP™ Compound LC006E

Americas: COMMERCIAL

Also known as: LNP™ THERMOCOMP™ Compound LC-1006 EM

Product reorder name: LC006E

LNP THERMOCOMP™ LC006E is a compound based on Polyetheretherketone resin containing Carbon Fiber. Added features of this material include: Easy Molding.

TYPICAL PROPERTIES ¹	TYPICAL VALUE	Unit	Standard
MECHANICAL			
Tensile Stress, break	2320	kgf/cm ²	ASTM D 638
Tensile Strain, break	1.3	%	ASTM D 638
Tensile Modulus, 50 mm/min	254500	kgf/cm ²	ASTM D 638
Flexural Stress	3470	kgf/cm ²	ASTM D 790
Flexural Modulus	220700	kgf/cm ²	ASTM D 790
Tensile Stress, break	228	MPa	ISO 527
Tensile Strain, break	1	%	ISO 527
Tensile Modulus, 1 mm/min	24560	MPa	ISO 527
Flexural Stress	340	MPa	ISO 178
Flexural Modulus	21650	MPa	ISO 178
IMPACT			
Izod Impact, unnotched, 23°C	44	cm-kgf/cm	ASTM D 4812
Izod Impact, notched, 23°C	6	cm-kgf/cm	ASTM D 256
Instrumented Impact Energy @ peak, 23°C	77	cm-kgf	ASTM D 3763
Multiaxial Impact	46	cm-kgf	ISO 6603
Izod Impact, unnotched 80*10*4 +23°C	37	kJ/m ²	ISO 180/1U
Izod Impact, notched 80*10*4 +23°C	6	kJ/m ²	ISO 180/1A
THERMAL			
HDT, 0.45 MPa, 3.2 mm, unannealed	300	°C	ASTM D 648
CTE, -40°C to 40°C, flow	1.8E-05	1/°C	ASTM E 831
CTE, -40°C to 40°C, xflow	3.4E-05	1/°C	ASTM E 831
CTE, -40°C to 40°C, flow	1.8E-05	1/°C	ISO 11359-2
CTE, -40°C to 40°C, xflow	3.4E-05	1/°C	ISO 11359-2



LNP™ THERMOCOMP™ Compound LC006E

Americas: COMMERCIAL

TYPICAL PROPERTIES ¹	TYPICAL VALUE	Unit	Standard
PHYSICAL			
Density	1.41	g/cm ³	ASTM D 792
Moisture Absorption, 50% RH, 24 hrs	0.06	%	ASTM D 570
Mold Shrinkage, flow, 24 hrs (5)	0.1	%	ASTM D 955
Mold Shrinkage, xflow, 24 hrs (5)	0.8	%	ASTM D 955
Mold Shrinkage, flow, 24 hrs (5)	0.11	%	ISO 294
Mold Shrinkage, xflow, 24 hrs (5)	0.77	%	ISO 294
Density	1.4	g/cm ³	ISO 1183
Moisture Absorption (23°C / 50% RH)	0.1	%	ISO 62



LNP™ THERMOCOMP™ Compound LC006E

Americas: COMMERCIAL

PROCESSING PARAMETERS	TYPICAL VALUE	Unit
Injection Molding		
Drying Temperature	120 - 150	°C
Drying Time	4	hrs
Maximum Moisture Content	0.1	%
Melt Temperature	380 - 390	°C
Front - Zone 3 Temperature	380 - 395	°C
Middle - Zone 2 Temperature	365 - 375	°C
Rear - Zone 1 Temperature	350 - 360	°C
Mold Temperature	140 - 165	°C
Back Pressure	0.3 - 0.7	MPa
Screw Speed	60 - 100	rpm