

Product Texts

LNP THERMOCOMP OF00AN compound is based Polyphenylene Sulfide (PPS) containing 50% glass fiber. Added features include: High Modulus, Impact Modified, Low Chloride content, Good Warpage Control, Inherently Flame Retardant. Excellent High Heat and Chemical Resistance and Good Metal Bonding Strength suitable for Nano-Molding Technology (NMT) applications.

Processing/Physical Characteristics

	Value	Unit	Test Standard
ISO Data			
Melt volume-flow rate, MVR	18	cm ³ /10min	ISO 1133
Temperature	315	°C	-
Load	5	kg	-
ASTM Data			
Melt Flow Index, MFI	30	g/10min	ASTM D 1238
Temperature	315	°C	-
Load	5	kg	-

Mechanical properties

	Value	Unit	Test Standard
ISO Data			
Tensile Modulus	16800	MPa	ISO 527
Stress at break	205	MPa	ISO 527
Strain at break	1.8	%	ISO 527
Flexural modulus, 23°C	15400	MPa	ISO 178
Flexural strength	290	MPa	ISO 178
Charpy impact strength, +23°C	55	kJ/m ²	ISO 179/1eU
Charpy notched impact strength, +23°C	15	kJ/m ²	ISO 179/1eA
Izod impact strength, +23°C	55	kJ/m ²	ISO 180/1U
Izod notched impact strength, +23°C	15	kJ/m ²	ISO 180/1A
Izod notched impact strength	13.5	kJ/m ²	ISO 180/1A
Temperature	-40	°C	-
ASTM Data			
Tensile Modulus	16700	MPa	ASTM D 638
Tensile Strength at Break	203	MPa	ASTM D 638
Elongation at Break	1.8	%	ASTM D 638
Flexural Modulus	15200	MPa	ASTM D 790
Flexural Strength	285	MPa	ASTM D 790
Izod Impact notched, 1/8 in	145	J/m	ASTM D 256
Izod Impact unnotched, 1/8 in	650	J/m	ASTM D 256

Thermal properties

	Value	Unit	Test Standard
ISO Data			
Temp. of deflection under load, 1.80 MPa	270	°C	ISO 75-1/-2
Temp. of deflection under load, 0.45 MPa	276	°C	ISO 75-1/-2
Coeff. of linear therm. expansion, parallel	13	E-6/K	ISO 11359-1/-2
Coeff. of linear therm. expansion, normal	40	E-6/K	ISO 11359-1/-2
Burning behav. at thickness h	V-0	class	IEC 60695-11-10
Thickness tested	0.4	mm	-
Yellow Card available	yes	-	-
ASTM Data			
Coefficient of Thermal Expansion, MD	12	E-6/K	ASTM D 696
Coefficient of Thermal Expansion, TD	41	E-6/K	ASTM D 696
DTUL @ 66 psi	275	°C	ASTM D 648
DTUL @ 264 psi	268	°C	ASTM D 648

Other properties

	Value	Unit	Test Standard
Humidity absorption	0.01	%	Sim. to ISO 62
Water Absorption, 24hr	0.01	%	ASTM D 570
Density	1700	kg/m ³	ASTM D 792

Processing Recommendation Injection Molding	Value	Unit	Test Standard
Pre-drying - Temperature	120 - 140	°C	-
Pre-drying - Time	3 - 4	h	-
Melt temperature	310 - 330	°C	-
Mold temperature	135 - 160	°C	-
Feed temperature	50 - 70	°C	-
Zone 1	290 - 300	°C	-
Zone 2	300 - 320	°C	-
Zone 3	310 - 330	°C	-
Screw speed	50 - 100	rpm	-
Back pressure	0.3 - 0.7	MPa	-

Characteristics**Processing**

Injection Molding

Special Characteristics

Flame retardant, High impact or impact modified, Heat stabilized or stable to heat

Features

Good Adhesion, Low Warpage

Chemical Resistance

General Chemical Resistance

Applications

Electrical and Electronical

Regional Availability

North America, Europe, Asia Pacific, South and Central America