

Product Texts

LNP THERMOCOMP COMPOUND DC0041PD is a compound based on Polycarbonate resin containing Carbon Fiber. Added feature of this grade is: Flame Retardant.

UL Yellow Card [E207780-104239264](https://www.ul.com/yellow-card/E207780-104239264)

Processing/Physical Characteristics	Value	Unit	Test Standard
ASTM Data			
Mold Shrinkage, MD	0.0006	mm/mm	ASTM D 955
Mold Shrinkage, TD	0.001	mm/mm	ASTM D 955

Mechanical properties	Value	Unit	Test Standard
ISO Data			
Tensile Modulus	17800	MPa	ISO 527
Stress at break	169	MPa	ISO 527
Strain at break	1.9	%	ISO 527
Flexural modulus, 23°C	16000	MPa	ISO 178
Flexural strength	212	MPa	ISO 178
Charpy impact strength, +23°C	26	kJ/m ²	ISO 179/1eU
Charpy impact strength, -30°C	30	kJ/m ²	ISO 179/1eU
Charpy notched impact strength, +23°C	6	kJ/m ²	ISO 179/1eA
Charpy notched impact strength, -30°C	5	kJ/m ²	ISO 179/1eA
Izod impact strength, +23°C	26	kJ/m ²	ISO 180/1U
Izod notched impact strength, +23°C	6	kJ/m ²	ISO 180/1A
Izod notched impact strength	5	kJ/m ²	ISO 180/1A
Temperature	-30	°C	-
ASTM Data			
Tensile Modulus	17900	MPa	ASTM D 638
Tensile Strength at Break	165	MPa	ASTM D 638
Elongation at Yield	1.4	%	ASTM D 638
Flexural Modulus	16500	MPa	ASTM D 790
Flexural Strength	220	MPa	ASTM D 790
Izod Impact notched, 1/8 in	58	J/m	ASTM D 256
Izod Impact notched, 1/4 in	51	J/m	ASTM D 256
Izod Impact notched, Low-Temperature	-30	J/m	ASTM D 256
Izod Impact unnotched, 1/8 in	475	J/m	ASTM D 256

Thermal properties	Value	Unit	Test Standard
ISO Data			
Temp. of deflection under load, 1.80 MPa	101	°C	ISO 75-1/-2
Temp. of deflection under load, 0.45 MPa	106	°C	ISO 75-1/-2
Vicat softening temperature, B	107	°C	ISO 306
Coeff. of linear therm. expansion, parallel	6.9	E-6/K	ISO 11359-1/-2
Coeff. of linear therm. expansion, normal	79	E-6/K	ISO 11359-1/-2
Burning behav. at thickness h	V-1	class	IEC 60695-11-10
Thickness tested	0.7	mm	-
Yellow Card available	yes	-	-
ASTM Data			
UL 94 Flame rating	V-0	-	UL 94
Thickness tested	0.8	mm	-
Coefficient of Thermal Expansion, MD	5.4	E-6/K	ASTM D 696
Coefficient of Thermal Expansion, TD	73	E-6/K	ASTM D 696
DTUL @ 66 psi	105	°C	ASTM D 648
DTUL @ 264 psi	100	°C	ASTM D 648

Electrical properties	Value	Unit	Test Standard
ASTM Data			

LNP™ THERMOCOMP™ Compound DC0041PD

PC-CF

Saudi Basic Industries Corporation (SABIC)

Surface Resistivity	1000000	Ohm	ASTM D 257
Volume Resistivity	1000000	Ohm*cm	ASTM D 257

Other properties	Value	Unit	Test Standard
Density	1290	kg/m ³	ASTM D 792

Processing Recommendation Injection Molding	Value	Unit	Test Standard
Pre-drying - Temperature	70	°C	-
Pre-drying - Time	4	h	-
Processing humidity	≤0.02	%	-
Melt temperature	275 - 330	°C	-
Mold temperature	60 - 85	°C	-
Zone 1	260 - 300	°C	-
Zone 2	270 - 310	°C	-
Zone 3	280 - 320	°C	-
Screw speed	30 - 63	rpm	-
Back pressure	0.2 - 0.3	MPa	-

Characteristics**Processing**

Injection Molding

Special Characteristics

Flame retardant, Halogen-free

Features

Ductile

Applications

IT / Business Machine, Electrical and Electronical

Regional Availability

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