

Product Texts

LNP ELCRES ML0111 is based on Polycarbonate (PC) siloxane copolymer resin with high flow, high impact resistance performance and colorable. This is an injection molding (IM) grade and especially suitable for IMT/IML process.

UL Yellow Card Link [E207780-104263180](https://www.ul.com/yellow-card/E207780-104263180)

Processing/Physical Characteristics	Value	Unit	Test Standard
ASTM Data			
Melt Flow Index, MFI	20	g/10min	ASTM D 1238
Temperature	300	°C	-
Load	1.2	kg	-
Mold Shrinkage, MD	0.6	mm/mm	ASTM D 955
Mold Shrinkage, TD	0.6	mm/mm	ASTM D 955

Mechanical properties	Value	Unit	Test Standard
ISO Data			
Tensile Modulus	2350	MPa	ISO 527
Yield stress	60	MPa	ISO 527
Yield strain	4.5	%	ISO 527
Stress at break	47	MPa	ISO 527
Strain at break	46	%	ISO 527
Flexural modulus	2300	MPa	ISO 178
Flexural strength	93	MPa	ISO 178
Izod impact strength, +23°C, 4mm	N	kJ/m ²	ISO 180/1U
Izod notched impact strength, +23°C, 4mm	51	kJ/m ²	ISO 180/1A
Izod notched impact strength, -30°C, 4mm	10	kJ/m ²	ISO 180/1A
ASTM Data			
Tensile Modulus	2380	MPa	ASTM D 638
Tensile Strength at Yield	60	MPa	ASTM D 638
Tensile Strength at Break	54	MPa	ASTM D 638
Elongation at Yield	4	%	ASTM D 638
Elongation at Break	76	%	ASTM D 638
Flexural Modulus	2400	MPa	ASTM D 790
Rockwell Hardness	L92	-	ASTM D 785
Izod Impact notched, 1/8 in	753	J/m	ASTM D 256
Izod Impact notched, Low-Temperature	124	J/m	ASTM D 256
Temperature	-30	°C	-
Izod Impact unnotched, 1/8 in	N	J/m	ASTM D 256

Thermal properties	Value	Unit	Test Standard
ISO Data			
Temp. of deflection under load, 1.80 MPa	103	°C	ISO 75-1/-2
Temp. of deflection under load, 0.45 MPa	110	°C	ISO 75-1/-2
Vicat softening temperature, B	117	°C	ISO 306
Vicat softening temperature, 120°C/h 50N	119	°C	ISO 306
Burning behav. at thickness h	HB	class	IEC 60695-11-10
Thickness tested	0.4	mm	-
ASTM Data			
DTUL @ 66 psi	110	°C	ASTM D 648
DTUL @ 264 psi	100	°C	ASTM D 648
Vicat Temperature	125	°C	ASTM D 1525

Electrical properties	Value	Unit	Test Standard
ASTM Data			
Surface Resistivity	>1E15	Ohm	ASTM D 257
Volume Resistivity	>1E15	Ohm*cm	ASTM D 257

Other properties	Value	Unit	Test Standard
Humidity absorption	0.43	%	Sim. to ISO 62
Density	1180	kg/m ³	ASTM D 792

Processing Recommendation Injection Molding	Value	Unit	Test Standard
Pre-drying - Temperature	100	°C	-
Pre-drying - Time	3 - 4	h	-
Processing humidity	≤0.02	%	-
Melt temperature	280 - 305	°C	-
Mold temperature	60 - 80	°C	-
Zone 1	260 - 285	°C	-
Zone 2	275 - 295	°C	-
Zone 3	280 - 305	°C	-

Characteristics

Processing

Injection Molding

Regional Availability

North America, Europe, Asia Pacific