

Product Texts

LNP LUBRICOMP RCL36S compound is based on Nylon 6/6 resin containing 30% carbon fiber, 15% PTFE. Added features of this grade include: Electrically Conductive, Wear Resistant, Heat Stabilized.

Processing/Physical Characteristics	Value	Unit	Test Standard
ISO Data			
Molding shrinkage, parallel	0.1	%	ISO 294-4, 2577
Molding shrinkage, normal	0.7	%	ISO 294-4, 2577
ASTM Data			
Mold Shrinkage, MD	0.1	mm/mm	ASTM D 955
Mold Shrinkage, TD	0.7	mm/mm	ASTM D 955

Mechanical properties	Value	Unit	Test Standard
ISO Data			
Tensile Modulus	22600	MPa	ISO 527
Stress at break	245	MPa	ISO 527
Strain at break	1.8	%	ISO 527
Flexural modulus	22700	MPa	ISO 178
Flexural strength	395	MPa	ISO 178
Izod impact strength, +23°C, 4mm	68	kJ/m ²	ISO 180/1U
Izod notched impact strength, +23°C, 4mm	10	kJ/m ²	ISO 180/1A
ASTM Data			
Tensile Modulus	32400	MPa	ASTM D 638
Tensile Strength at Break	182	MPa	ASTM D 638
Elongation at Break	0.9	%	ASTM D 638
Flexural Modulus	18400	MPa	ASTM D 790
Flexural Strength	372	MPa	ASTM D 790
Izod Impact notched, 1/8 in	101	J/m	ASTM D 256
Izod Impact unnotched, 1/8 in	1050	J/m	ASTM D 256

Thermal properties	Value	Unit	Test Standard
ISO Data			
Temp. of deflection under load, 1.80 MPa	240	°C	ISO 75-1/-2
ASTM Data			
DTUL @ 264 psi	255	°C	ASTM D 648

Other properties	Value	Unit	Test Standard
Humidity absorption	0.84	%	Sim. to ISO 62
Density	1380	kg/m ³	ISO 1183
Water Absorption, 24hr	0.53	%	ASTM D 570
Density	1380	kg/m ³	ASTM D 792

Processing Recommendation Injection Molding	Value	Unit	Test Standard
Pre-drying - Temperature	80	°C	-
Pre-drying - Time	4	h	-
Processing humidity	≤0.25	%	-
Melt temperature	275 - 290	°C	-
Mold temperature	80 - 95	°C	-
Zone 1	265 - 275	°C	-
Zone 2	280 - 295	°C	-
Zone 3	295 - 305	°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