

Asia Pacific: COMMERCIAL

LNP* Lubricomp* Compound DBL32

Product Reorder Name: DBL32

Also known as: DBL-4032

LNP* Lubricomp* DBL32 is a compound based on Polycarbonate resin containing PTFE, Carbon Fiber. Added features of this material include: Electrically Conductive, Internally Lubricated.

Property

TYPICAL PROPERTIES (1)			
MECHANICAL	Value	Unit	Standard
Tensile Stress, yield	42	MPa	ASTM D 638
Tensile Stress, break	38	MPa	ASTM D 638
Tensile Strain, yield	5.4	%	ASTM D 638
Tensile Strain, break	22.3	%	ASTM D 638
Tensile Modulus, 50 mm/min	2060	MPa	ASTM D 638
Flexural Modulus	2750	MPa	ASTM D 790
Tensile Stress, yield	43	MPa	ISO 527
Tensile Stress, break	38	MPa	ISO 527
Tensile Strain, yield	5.1	%	ISO 527
Tensile Strain, break	18.2	%	ISO 527
Tensile Modulus, 1 mm/min	2580	MPa	ISO 527
Flexural Stress	69	MPa	ISO 178
Flexural Modulus	2400	MPa	ISO 178
IMPACT	Value	Unit	Standard
Izod Impact, unnotched, 23°C	1500	J/m	ASTM D 4812
Izod Impact, notched, 23°C	192	J/m	ASTM D 256
Instrumented Impact Energy @ peak, 23°C	31	J	ASTM D 3763
Multiaxial Impact	25	J	ISO 6603
Izod Impact, unnotched 80*10*4 +23°C	105	kJ/m²	ISO 180/1U
Izod Impact, notched 80*10*4 +23°C	14	kJ/m²	ISO 180/1A
THERMAL	Value	Unit	Standard
HDT, 0.45 MPa, 3.2 mm, unannealed	142	°C	ASTM D 648
HDT, 1.82 MPa, 3.2mm, unannealed	135	°C	ASTM D 648
CTE, -40°C to 40°C, flow	5.4E-05	1/°C	ASTM E 831
CTE, -40°C to 40°C, xflow	5.94E-05	1/°C	ASTM E 831
CTE, -40°C to 40°C, flow	5.3E-05	1/°C	ISO 11359-2
CTE, -40°C to 40°C, xflow	6.E-05	1/°C	ISO 11359-2
HDT/Bf, 0.45 MPa Flatw 80*10*4 sp=64mm	139	°C	ISO 75/Bf
HDT/Af, 1.8 MPa Flatw 80*10*4 sp=64mm	135	°C	ISO 75/Af
PHYSICAL	Value	Unit	Standard
Density	1.37	g/cm³	ASTM D 792
Mold Shrinkage, flow, 24 hrs	0.7 - 0.9	%	ASTM D 955
Mold Shrinkage, xflow, 24 hrs	0.9 - 1.1	%	ASTM D 955
Mold Shrinkage, flow, 24 hrs	0.8	%	ISO 294
Mold Shrinkage, xflow, 24 hrs	0.96	%	ISO 294
Wear Factor Washer	139	10^-10 in^5-min/ft-lb-hr	ASTM D 3702 Modified

Dynamic COF	0.41	-	ASTM D 3702 Modified
Static COF	0.48	-	ASTM D 3702 Modified
Density	1.37	g/cm³	ISO 1183

Source GMD, last updated:09/24/2008

Processing

Parameter		
Injection Molding	Value	Unit
Drying Temperature	120	°C
Drying Time	4	hrs
Maximum Moisture Content	0.02	%
Melt Temperature	305 - 325	°C
Front - Zone 3 Temperature	320 - 330	°C
Middle - Zone 2 Temperature	310 - 320	°C
Rear - Zone 1 Temperature	295 - 305	°C
Mold Temperature	80 - 110	°C
Back Pressure	0.2 - 0.3	MPa
Screw Speed	30 - 60	rpm

Source GMD, last updated:09/24/2008

THESE PROPERTY VALUES ARE NOT INTENDED FOR SPECIFICATION PURPOSES.

PLEASE CHECK WITH YOUR (LOCAL SALES OFFICE) FOR AVAILABILITY IN YOUR REGION

(1) Typical values only. Variations within normal tolerances are possible for various colors. All values are measured after at least 48 hours storage at 23°C/50% relative humidity. All properties, except the melt volume and melt flow rates, are measured on injection molded samples. All samples tested under ISO test standards are prepared according to ISO 294.

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- (2) Only typical data for selection purposes. Not to be used for part or tool design.
- (3) This rating is not intended to reflect hazards presented by this or any other material under actual fire conditions.
- (4) Internal measurements according to UL standards.

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