

LNPTM STAT-KONTM COMPOUND DE003E

DC1003EM

DESCRIPTION

LNP STAT-KON DE003E compound is based on Polycarbonate (PC) resin containing 15% carbon fiber. Added features of this grade include: Easy Molding, Electrically Conductive.

| GENERAL INFORMATION | |
|-----------------------|---|
| Features | Electrically Conductive, Good Processability, Carbon fiber filled, High stiffness/Strength, No PFAS intentionally added |
| Fillers | Carbon Fiber |
| Polymer Types | Polycarbonate (PC) |
| Processing Techniques | Injection Molding |

| INDUSTRY | SUB INDUSTRY |
|----------------------------|-----------------------|
| Electrical and Electronics | Electronic Components |
| Industrial | Material Handling |

TYPICAL PROPERTY VALUES

PROPERTIES TYPICAL VALUES UNITS TEST METHODS MECHANICAL⁽¹⁾ Tensile Stress, break, 5 mm/min 134 MPa ISO 527 % ISO 527 Tensile Strain, break, 5 mm/min 1.6 Tensile Modulus, 1 mm/min 12200 MPa ISO 527 ISO 178 Flexural Stress, yield, 2 mm/min 184 MPa Flexural Modulus, 2 mm/min 10800 ISO 178 MPa IMPACT (1) Izod Impact, unnotched 80*10*4 +23°C 25 kJ/m² ISO 180/1U Izod Impact, notched 80*10*4 +23°C 6 kJ/m² ISO 180/1A THERMAL (1) CTE, 23°C to 60°C, flow 1/°C ISO 11359-2 1 E-05 CTE, 23°C to 60°C, xflow 6.7E-05 1/°C ISO 11359-2 HDT/Bf, 0.45 MPa Flatw 80*10*4 sp=64mm 143 °C ISO 75/Bf HDT/Af, 1.8 MPa Flatw 80*10*4 sp=64mm 138 °C ISO 75/Af PHYSICAL (1) Mold Shrinkage on Tensile Bar, flow (2) 0.1 - 0.2 SABIC method % g/cm³ Density 1.26 ISO 1183 ELECTRICAL (1) Surface Resistivity (3) 1.E+02 - 1.E+04 Ω ASTM D257 INJECTION MOLDING (4) 120 °C **Drying Temperature** Drying Time 4 Hrs

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CHEMISTRY THAT MATTERS

Revision 20231109



| PROPERTIES | TYPICAL VALUES | UNITS | TEST METHODS |
|-----------------------------|----------------|-------|--------------|
| 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 | |

(1) The information stated on Technical Datasheets should be used as indicative only for material selection purposes and not be utilized as specification or used for part or tool design.

(2) Measurements made from laboratory test coupon. Actual shrinkage may vary outside of range due to differences in processing conditions, equipment, part geometry and tool design. It is recommended that mold shrinkage studies be performed with surrogate or legacy tooling prior to cutting tools for new molded article.

(3) Measurement meets requirements as specified in ASTM D4496.

(4) Injection Molding parameters are only mentioned as general guidelines. These may not apply or may need adjustment in specific situations such as low shot sizes, large part molding, thin wall molding and gas-assist molding.

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