

Revision 20241028

# LEXANTM VISUALFXTM RESIN FXM171R

### **REGION EUROPE**

#### DESCRIPTION

PC in special effects colors. Metallic and pearlescent additives. Color may affect performance.

## TYPICAL PROPERTY VALUES

PROPERTIES TYPICAL VALUES UNITS TEST METHODS MECHANICAL<sup>(1)</sup> Tensile Stress, yield, 50 mm/min 63 MPa ISO 527 Tensile Stress, break, 50 mm/min 50 MPa ISO 527 Tensile Strain, yield, 50 mm/min 6 % ISO 527 Tensile Strain, break, 50 mm/min 50 % ISO 527 Tensile Modulus, 1 mm/min 2350 MPa ISO 527 Flexural Stress, yield, 2 mm/min 90 MPa ISO 178 Flexural Modulus, 2 mm/min 2300 ISO 178 MPa THERMAL (1) CTE, 23°C to 80°C, flow ISO 11359-2 7.E-05 1/°C Ball Pressure Test, 125°C +/- 2°C PASSES IEC 60695-10-2 °C Vicat Softening Temp, Rate B/120 141 ISO 306 HDT/Be, 0.45MPa Edgew 120\*10\*4 sp=100mm 133 °C ISO 75/Be HDT/Ae, 1.8 MPa Edgew 120\*10\*4 sp=100mm 122 °C ISO 75/Ae Relative Temp Index, Elec (2) °C UL 746B 80 Relative Temp Index, Mech w/impact<sup>(2)</sup> 80 °C UL 746B Relative Temp Index, Mech w/o impact<sup>(2)</sup> °C 80 UL 746B PHYSICAL (1) Mold Shrinkage on Tensile Bar, flow (3) 0.5 - 0.7 % SABIC method ISO 1183 Density 1.2 g/cm<sup>3</sup> Water Absorption, (23°C/saturated) 0.35 ISO 62-1 % Moisture Absorption (23°C / 50% RH) 0.15 % ISO 62 Melt Volume Rate, MVR at 300°C/1.2 kg 26 cm<sup>3</sup>/10 min ISO 1133 FLAME CHARACTERISTICS (2) UL Yellow Card Link E45329-541344 UL Recognized, 94V-2 Flame Class Rating UL 94 ≥1.2 mm INJECTION MOLDING (4) Drying Temperature 120 °C 2 – 4 **Drying Time** Hrs Maximum Moisture Content 0.02 % °C 280 - 300 Melt Temperature °C 270 - 290 Nozzle Temperature Front - Zone 3 Temperature 280 - 300 °C °C Middle - Zone 2 Temperature 270 - 290 Rear - Zone 1 Temperature °C 260 - 280

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CHEMISTRY THAT MATTERS



PROPERTIES	TYPICAL VALUES	UNITS	TEST METHODS
Hopper Temperature	60 - 80	°C	
Mold Temperature	80 – 100	°C	

- (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) UL Ratings shown on the technical datasheet might not cover the full range of thicknesses and colors. For details, please see the UL Yellow Card.
- (3) 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., 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.
- (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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