



EMERGE™ PC/ABS 7580 EU

Advanced Resin

Overview

EMERGE™ PC/ABS 7580 EU is an ignition resistant PC/ABS blend that contains no chlorinated or brominated flame retardant additives. It has UL94 flammability rating of 1.5mm V-0. It fits into applications that require high heat distortion temperature. It is easy processing and high heat properties make it ideal for optimizing productivity in injection molding. Major applications include: Power adaptor & charger, Laser printer & MFP, Copiers, LAN/WLAN facilities and Electrical & Electronic components. Available in natural or matched colour.

Physical	Nominal Value (English)	Nominal Value (SI)	Test Method
Density	1.19 g/cm ³	1.19 g/cm ³	ISO 1183/A
Melt Mass-Flow Rate (MFR)			ISO 1133
230°C/3.8 kg	8.0 g/10 min	8.0 g/10 min	
260°C/5.0 kg	37 g/10 min	37 g/10 min	
Molding Shrinkage - Flow	4.0E-3 to 6.0E-3 in/in	0.40 to 0.60 %	ASTM D955 ISO 294-4
Mechanical	Nominal Value (English)	Nominal Value (SI)	Test Method
Tensile Modulus	392000 psi	2700 MPa	ISO 527-1
Tensile Stress (Yield)	9430 psi	65.0 MPa	ISO 527-2/50
Tensile Strain			ISO 527-2/50
Yield	4.5 %	4.5 %	
Break	75 %	75 %	
Flexural Modulus	377000 psi	2600 MPa	ISO 178
Flexural Stress	14500 psi	100 MPa	ISO 178
Impact	Nominal Value (English)	Nominal Value (SI)	Test Method
Notched Izod Impact			
73°F (23°C)	12 ft-lb/in	650 J/m	ASTM D256
73°F (23°C)	17 ft-lb/in ²	35 kJ/m ²	ISO 180/1A
Thermal	Nominal Value (English)	Nominal Value (SI)	Test Method
Deflection Temperature Under Load			
66 psi (0.45 MPa), Unannealed	221 °F	105 °C	ASTM D648
66 psi (0.45 MPa), Unannealed	225 °F	107 °C	ISO 75-2/B
264 psi (1.8 MPa), Unannealed	205 °F	96.0 °C	ASTM D648
264 psi (1.8 MPa), Unannealed	203 °F	95.0 °C	ISO 75-2/A
Vicat Softening Temperature			
--	248 °F	120 °C	ASTM D1525 ¹
--	235 °F	113 °C	ISO 306/B50
Ball Indentation Temperature ²	221 °F	105 °C	IEC 60598-1
Flammability	Nominal Value (English)	Nominal Value (SI)	Test Method
Flame Rating ²			UL 94
0.06 in (1.5 mm)	V-0	V-0	
0.12 in (3.0 mm)	V-0	V-0	
Injection	Nominal Value (English)	Nominal Value (SI)	
Drying Temperature	176 to 194 °F	80 to 90 °C	
Drying Time	3.0 to 4.0 hr	3.0 to 4.0 hr	
Processing (Melt) Temp	428 to 518 °F	220 to 270 °C	
Mold Temperature	140 to 194 °F	60 to 90 °C	