



GRADE: ORION® PCGF20, PCGF20R, PCGF20UV, PCGF20RUV

Molding Grade PC with 20% Glass, with Release, with UV, with UV & Release

Typical Material Properties

Physical	Nominal Values	ASTM Test
Specific Gravity	1.34	D792
Melt Flow (300°C/1.2 kg)	15.0 g/10 min	D1238
Mechanical		
Tensile Modulus	745,000 psi	D638
Tensile Strength @ Yield	14,000 psi	D638
Flexural Modulus	750,000 psi	D790
Flexural Strength @ Yield	17,500 psi	D790
Impact		
Notched Izod Impact (73°F, 0.125 in)	1.0 ft-lb/in	D256
Thermal		
DTUL @ 264 psi – Unannealed (0.125 in)	285°F	D648
Mold Shrinkage		
Linear Flow	.001 – .003 in/in	D955

Recommended Processing Guidelines

	Nominal Values
Drying Time and Temperature	4.0 hrs at 250°F
Suggested Max Moisture	0.020%
Rear Temperature	550 – 600°F
Middle Temperature	575 – 625°F
Front Temperature	600 – 650°F
Nozzle Temperature	600 – 650°F
Processing (Melt) Temperature	666 – 650°F
Mold Temperature	50 – 200°F
Back Pressure	40 – 100 psi
Screw Speed	25 – 75 RPM