

CALIBRE™ 300-3

Trinseo - Polycarbonate Resin

General Information

Product Description

CALIBRE™ 300-3 polycarbonate resins offer exceptional impact resistance, heat distortion resistance and optical clarity as well as high melt strength for various extrusion processes. CALIBRE 300-3 contains no mold release or UV stabilizer and is available in natural transparent colour only.

Govt. and Industry Standards:

- Underwriters Laboratory, Inc. (UL)

Applications:

- Blending,
- Compounding
- Sheet, film and profile extrusion

General

Forms • Pellets

Properties ¹

Physical	Nominal Value	Unit	Test Method
Density / Specific Gravity	1.20		ASTM D792
Density	1.20	g/cm ³	ISO 1183/B
Melt Mass-Flow Rate (MFR) (300°C/1.2 kg)	3.0	g/10 min	ASTM D1238
Melt Mass-Flow Rate (MFR) (300°C/1.2 kg)	3.0	g/10 min	ISO 1133
Water Absorption (Saturation, 73°F)	0.32	%	ISO 62
Water Absorption (Equilibrium, 73°F, 50% RH)	0.12	%	ISO 62
Mechanical	Nominal Value	Unit	Test Method
Tensile Modulus	334000	psi	ISO 527-1/1
Tensile Stress (Yield)	8700	psi	ISO 527-2/50
Tensile Stress (Break)	10400	psi	ISO 527-2/50
Tensile Strain (Yield)	6.0	%	ISO 527-2/50
Tensile Strain (Break)	150	%	ISO 527-2/50
Flexural Modulus ²	348000	psi	ISO 178
Flexural Stress ²	14100	psi	ISO 178
Impact	Nominal Value	Unit	Test Method
Charpy Notched Impact Strength			ISO 179/1eA
-22°F	6.7	ft·lb/in ²	
73°F	36	ft·lb/in ²	
Notched Izod Impact (73°F)	18	ft·lb/in	ASTM D256
Notched Izod Impact Strength (73°F)	44	ft·lb/in ²	ISO 180/A
Thermal	Nominal Value	Unit	Test Method
Deflection Temperature Under Load			ISO 75-2/A
264 psi, Unannealed	259	°F	
Vicat Softening Temperature	309	°F	ISO 306/B50
Optical	Nominal Value	Unit	Test Method
Refractive Index	1.586		ISO 489
Light Transmittance (118.1 mil)	87.0 to 91.0	%	ASTM D1003
Haze	< 1.00	%	ASTM D1003