

Product Texts

Common features of Rynite® thermoplastic polyester include mechanical and physical properties such as excellent balance of strength and stiffness, dimensional stability, creep resistance, heat resistance, high surface gloss and good inherent electrical properties at elevated temperature. It can be processed over a broad temperature range and has excellent flow properties.

Rynite® thermoplastic polyester resins are typically used in demanding applications in the automotive, electrical and electronics, appliances where they successfully replace metals and thermosets, as well as other thermoplastic polymers.

Rynite® RE19051 BK507 is a 40% Glass/Mineral Reinforced, Flame Retardant, Modified Polyethylene Terephthalate Resin.

Processing/Physical Characteristics	Value	Unit	Test Standard
ISO Data			
^[C] Molding shrinkage, parallel	0.2	%	ISO 294-4, 2577
^[C] Molding shrinkage, normal	0.9	%	ISO 294-4, 2577
^[C] Ejection temperature	170	°C	-

[C]: CAMPUS

Mechanical properties	Value	Unit	Test Standard
ISO Data			
^[C] Tensile Modulus	11000	MPa	ISO 527
^[C] Stress at break	110	MPa	ISO 527
^[C] Strain at break	1.7	%	ISO 527
^[C] Charpy notched impact strength, +23°C	6.5	kJ/m ²	ISO 179/1eA

[C]: CAMPUS

Thermal properties	Value	Unit	Test Standard
ISO Data			
^[C] Melting temperature, 10°C/min	247	°C	ISO 11357-1/-3
^[C] Temp. of deflection under load, 1.80 MPa	214	°C	ISO 75-1/-2
^[C] Coeff. of linear therm. expansion, parallel	23	E-6/K	ISO 11359-1/-2
^[C] Coeff. of linear therm. expansion, normal	78	E-6/K	ISO 11359-1/-2
^[C] Burning Behav. at 1.5 mm nom. thickn.	V-0	class	IEC 60695-11-10
Thickness tested	1.5	mm	-
Yellow Card available	yes	-	-
^[C] Burning Behav. at thickness h	V-0	class	IEC 60695-11-10
Thickness tested	0.8	mm	-
Yellow Card available	yes	-	-
^[C] Burning Behav. 5V at thickness h	5VA	class	IEC 60695-11-20
Thickness tested	1.5	mm	-
Yellow Card available	yes	-	-

[C]: CAMPUS

Electrical properties	Value	Unit	Test Standard
ISO Data			
^[C] Volume resistivity	5E12	Ohm*m	IEC 62631-3-1
^[C] Surface resistivity	>1E15	Ohm	IEC 62631-3-2

[C]: CAMPUS

Other properties	Value	Unit	Test Standard
^[C] Density	1730	kg/m ³	ISO 1183

[C]: CAMPUS

Characteristics

Rynite® RE19051 BK507

PET-(GF+MD)40 FR(17)

Celanese

Processing

Injection Molding

Special Characteristics

Flame retardant

Delivery form

Pellets, Black

Regional Availability

North America, South and Central America