

Arnitel® CM551 - Shore 51 D

TPC

DSM Engineering Plastics

Product Texts

Heat Resistant Copolyester

ISO 18064 TPC-ES

[Arnitel website](#)

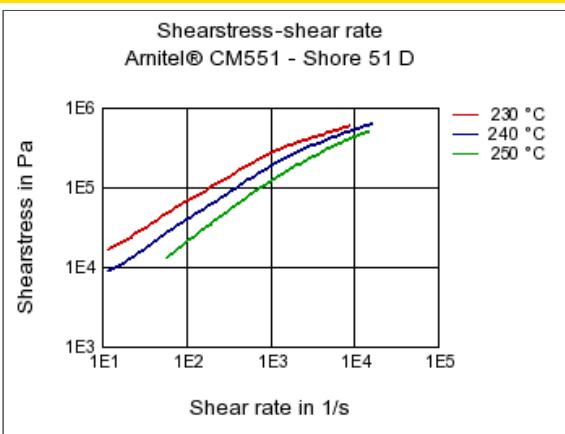
Rheological properties	Value	Unit	Test Standard
ISO Data			
Melt volume-flow rate, MVR	8	cm ³ /10min	ISO 1133
Temperature	230	°C	ISO 1133
Load	2.16	kg	ISO 1133
Mechanical properties			
ISO Data			
Tensile Modulus	140	MPa	ISO 527-1/-2
Yield stress	16	MPa	ISO 527-1/-2
Yield strain	38	%	ISO 527-1/-2
Nominal strain at break	>50	%	ISO 527-1/-2
Charpy notched impact strength (+23°C)	N	kJ/m ²	ISO 179/1eA
Stress at break TPE	32	MPa	ISO 527-1/-2
Thermal properties			
ISO Data			
Melting temperature (10°C/min)	205	°C	ISO 11357-1/-3
Glass transition temperature, 10°C/min	-10	°C	ISO 11357-1/-2
Vicat softening temperature, 50°C/h 50N	170	°C	ISO 306
Coeff. of linear therm. expansion, normal	190	E-6/K	ISO 11359-1/-2
Electrical properties			
ISO Data			
Relative permittivity, 100Hz	4.34	-	IEC 60250
Relative permittivity, 1MHz	3.58	-	IEC 60250
Dissipation factor, 100Hz	212	E-4	IEC 60250
Dissipation factor, 1MHz	460	E-4	IEC 60250
Volume resistivity	>1E13	Ohm*m	IEC 60093
Electric strength	15	kV/mm	IEC 60243-1
Comparative tracking index	600	-	IEC 60112
Other properties			
ISO Data			
Density	1240	kg/m ³	ISO 1183

Diagrams

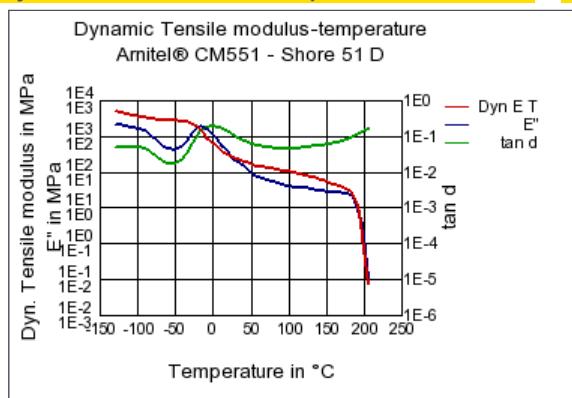
Viscosity-shear rate



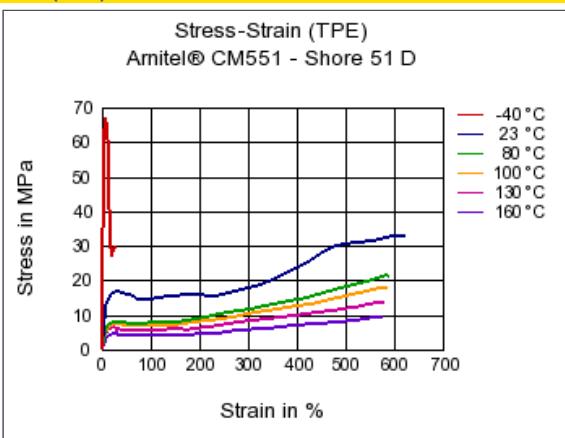
Shearstress-shear rate



Dynamic Tensile modulus-temperature



Stress-Strain (TPE)



Characteristics

Processing

Other Extrusion

Delivery form

Pellets

Other text information

Injection Molding

[Injection Molding Recommendations](#)