

**Product Texts**

Zenite® 7145L is a 45% glass fiber reinforced and lubricated liquid crystal polymer for injection molding. It has excellent impact resistance and high heat deflection temperature.

Flammability @1.6mm nom. V-0  
thickn.

Flammability at thickness h (1.5 V-0  
mm)

UL recognition (h)

Processing/Physical Characteristics	Value	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Molding shrinkage, parallel	0.1	%	ISO 294-4, 2577
<sup>[C]</sup> Molding shrinkage, normal	0.5	%	ISO 294-4, 2577
<sup>[C]</sup> Density of melt	1450	kg/m <sup>3</sup>	-
<sup>[C]</sup> Thermal conductivity of melt	0.32	W/(m K)	-
<sup>[C]</sup> Spec. heat capacity of melt	1500	J/(kg K)	-
<sup>[C]</sup> Ejection temperature	275	°C	-

[C]: CAMPUS

Mechanical properties	Value	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Tensile Modulus	18000	MPa	ISO 527
<sup>[C]</sup> Stress at break	120	MPa	ISO 527
<sup>[C]</sup> Strain at break	0.9	%	ISO 527
<sup>[C]</sup> Charpy impact strength, +23°C	18	kJ/m <sup>2</sup>	ISO 179/1eU
<sup>[C]</sup> Charpy impact strength, -30°C	13	kJ/m <sup>2</sup>	ISO 179/1eU
<sup>[C]</sup> Charpy notched impact strength, +23°C	10	kJ/m <sup>2</sup>	ISO 179/1eA
<sup>[C]</sup> Charpy notched impact strength, -30°C	10	kJ/m <sup>2</sup>	ISO 179/1eA

[C]: CAMPUS

Thermal properties	Value	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Melting temperature, 10°C/min	355	°C	ISO 11357-1/-3
<sup>[C]</sup> Temp. of deflection under load, 1.80 MPa	295	°C	ISO 75-1/-2
<sup>[C]</sup> Coeff. of linear therm. expansion, parallel	7	E-6/K	ISO 11359-1/-2
<sup>[C]</sup> Coeff. of linear therm. expansion, normal	24	E-6/K	ISO 11359-1/-2
<sup>[C]</sup> Burning Behav. at 1.5 mm nom. thickn.	V-0	class	IEC 60695-11-10
Thickness tested	1.5	mm	-
<sup>[C]</sup> Burning Behav. at thickness h	V-0	class	IEC 60695-11-10
Thickness tested	1.5	mm	-
Yellow Card available	yes	-	-
<sup>[C]</sup> Oxygen index	45	%	ISO 4589-1/-2

[C]: CAMPUS

Electrical properties	Value	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Relative permittivity, 100Hz	4.8	-	IEC 62631-2-1
<sup>[C]</sup> Relative permittivity, 1MHz	4.4	-	IEC 62631-2-1
<sup>[C]</sup> Dissipation factor, 100Hz	130	E-4	IEC 62631-2-1
<sup>[C]</sup> Dissipation factor, 1MHz	240	E-4	IEC 62631-2-1
<sup>[C]</sup> Volume resistivity	>1E13	Ohm*m	IEC 62631-3-1
<sup>[C]</sup> Surface resistivity	>1E15	Ohm	IEC 62631-3-2
<sup>[C]</sup> Electric strength	36	kV/mm	IEC 60243-1

[C]: CAMPUS

<b>Other properties</b>	<b>Value</b>	<b>Unit</b>	<b>Test Standard</b>
<sup>[C]</sup> Density	<b>1740</b>	kg/m <sup>3</sup>	ISO 1183

[C]: CAMPUS

**Characteristics****Processing**

Injection Molding

**Special Characteristics**

Flame retardant, High impact or impact modified

**Additives**

Lubricants

**Regional Availability**

North America, Europe, Asia Pacific, South and Central America, Near East/Africa