

## ZENITE® ZE16401 - LCP

### Description

Zenite® ZE16401 is a 30% mineral reinforced and Teflon® PTFE powder filled liquid crystal polymer for injection molding. and It is well suited for low wear / low friction applications.

Physical properties	Value	Unit	Test Standard
Density	104	lb/ft <sup>3</sup>	ISO 1183

Mechanical properties	Value	Unit	Test Standard
Tensile modulus	1.23E6	psi	ISO 527-2/1A
Tensile stress at break, 5mm/min	17400	psi	ISO 527-2/1A
Tensile strain at break, 5mm/min	3.8	%	ISO 527-2/1A
Flexural modulus, 23°C	957000	psi	ISO 178
Flexural strength, 23°C	19600	psi	ISO 178
Charpy notched impact strength, 23°C	4.28	ft-lb/in <sup>2</sup>	ISO 179/1eA

Thermal properties	Value	Unit	Test Standard
Melting temperature, 10°C/min	635	°F	ISO 11357-1/-3
DTUL at 1.8 MPa	464	°F	ISO 75-1, -2
Flammability @1.6mm nom. thickn.	V-0	class	UL 94
thickness tested (1.6)	0.1	in	UL 94
UL recognition (1.6)	UL	-	UL 94

### Typical injection moulding processing conditions

Pre Drying	Value	Unit	Test Standard
Drying time	4 - 6	h	-
Drying temperature	284 - 320	°F	-
Temperature	Value	Unit	Test Standard
Hopper temperature	68 - 86	°F	-
Feeding zone temperature	104 - 140	°F	-
Zone1 temperature	635 - 653	°F	-
Zone2 temperature	662 - 680	°F	-
Zone3 temperature	662 - 680	°F	-
Zone4 temperature	662 - 680	°F	-
Melt temperature	662 - 680	°F	-
Mold temperature	176 - 248	°F	-
Pressure	Value	Unit	Test Standard
Back pressure max.	30	bar	-

### Other text information

#### Pre-drying

Pre Drying:  
Necessary low maximum residual moisture content: 0.01%