

CELANEX® 6443R - PBT

Description

40% glass/mineral reinforced, low warp, general purpose

Mechanical properties	Value	Unit	Test Standard
Tensile modulus	9300	MPa	ISO 527-2/1A
Tensile stress at break, 5mm/min	80	MPa	ISO 527-2/1A
Tensile strain at break, 5mm/min	2.5	%	ISO 527-2/1A
Flexural modulus, 23°C	8600	MPa	ISO 178
Flexural strength, 23°C	135	MPa	ISO 178
Charpy notched impact strength, 23°C	7.5	kJ/m ²	ISO 179/1eA
Izod impact unnotched, 23°C	7.9	kJ/m ²	ISO 180/1U

Thermal properties	Value	Unit	Test Standard
Flammability at thickness h	HB	class	UL 94
thickness tested (h)	0.89	mm	UL 94

Typical injection moulding processing conditions

Pre Drying	Value	Unit	Test Standard
Necessary low maximum residual moisture content	0.02	%	-
Drying time	4	h	-
Drying temperature	120 - 130	°C	-
Temperature	Value	Unit	Test Standard
Hopper temperature	20 - 50	°C	-
Feeding zone temperature	230 - 250	°C	-
Zone1 temperature	230 - 250	°C	-
Zone2 temperature	235 - 255	°C	-
Zone3 temperature	235 - 255	°C	-
Zone4 temperature	240 - 265	°C	-
Nozzle temperature	240 - 265	°C	-
Melt temperature	235 - 265	°C	-
Mold temperature	65 - 96	°C	-
Hot runner temperature	250 - 265	°C	-
Speed	Value	Unit	Test Standard
Injection speed	medium-fast	-	-

Other text information

Pre-drying

To avoid hydrolytic degradation during processing, CELANEX resins have to be dried to a moisture level equal to or less than 0.02%. Drying should be done in a dehumidifying hopper dryer capable of dewpoints <-40°F (-40°C) at 250°F (121°C) for 4 hours.

Longer pre-drying times/storage

For subsequent storage of the material in the dryer until processed (<= 60 h) it is necessary to lower the temperature to 100° C.

Characteristics

Special Characteristics	Processing
Low warpage	Injection molding
Product Categories	Delivery Form
Mineral/Glass reinforced	Pellets