

Technical Data Sheet

Ultracur3D® EL 150

Flexible resin with optimum strength, rebound and medium hardness.

General Properties	Norm	Typical Values
Apperance	-	Clear
Viscosity, 30 °C	Cone/Plate Rheometer ¹	90 mPas
Viscosity, 50 °C	Cone/Plate Rheometer ¹	45 mPas
Density (printed part)	ASTM D792	1.09 g/cm ³
Density (liquid resin)	ASTM D4052-18a	1.04 g/cm ³

Tensile Properties	Norm	Typical Values
E Modulus	ASTM D412 C	25 MPa
Ultimate Tensile Strength	ASTM D412 C	6 MPa
Elongation at Break	ASTM D412 C	150 %

Impact Properties	Norm	Typical Values
Unnotched Izod, 23 °C	ASTM D256	No break

Mechanical Properties	Norm	Typical Values
Tear Strength (Graves)	ASTM D624 type C	15 N/mm
Tear Strength (Trouser)	ASTM D624 type T	4.2 N/mm
Rebound Resilience	ASTM D1054	25 %
Relative Abrasion Loss	ISO 4649	Information available on request
Compression set at 23°C, 72h	ASTM D395-A	11 %
Compression set at 23°C, 72h	ASTM D395-B	68 %
Rossflex, 23°C, 60° angle	ASTM D1052	> 40.000 Cycles (no crack propagation)
Rossflex, -10°C, 60° angle	ASTM D1052	> 100.000 Cycles (no crack propagation)

Thermal Properties	Norm	Typical Values
Glass transition temperature (DMA, tan(d))	ASTM D4065	-31 °C
Vicat temperature	ASTM D1525	73.5 °C

Hardness	Norm	Typical Values
Shore A	ASTM D2240	80

Other	Norm	Typical Values
Biocompatibility	ISO 10993	Information available on request
Water Absorption, Short Term (24 hours)	ASTM D570	1.27 %

1) Determined with TA-Instrument DHR rheometer, cone/plate, diameter 60 mm, shear rate 100 s⁻¹

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