

Titan Tough 85

Titan Tough Epoxy 85 combines mechanical toughness with enhanced impact resistance for functional prototypes and end-use components. Exhibits 14 % elongation, tensile strength of 45.2 MPa, and Izod impact resistance of 2.9 kJ/m², enabling design of housings, brackets, validating/testing snap-fit features, and general-purpose industrial parts.

Thermal performance remains consistent with an HDT of approximately 86 °C at 0.45 MPa, making Titan 85 a suitable default selection for parts subjected to repeated assembly, handling, and mechanical loading.



Titan Tough 85 Epoxy

Mechanical Properties	Method	Value XY	Value Z
Ultimate Tensile Strength	ASTM D638-IV	45.2 MPa	41.0 MPa
Elongation at Break	ASTM D638-IV	14.0%	5.6%
Elastic Modulus	ASTM D638-IV	1.8 GPa	1.7 GPa
Shore Hardness	ASTM 2240	75D	-
Izod Impact (notched)	ASTM D256	2.9 kJ/m ²	-

Thermal Properties	Method	Value XY	Value Z
HDT @ 0.45 MPa	ASTM D648	86.5 °C	84.4 °C
HDT @ 1.82 MPa	ASTM D648	72.9 °C	69.8 °C

UV Stability Testing

Indoor – ASTM D4329/D4459

Outdoor – ASTM G154

Outdoor Testing

Tested per ASTM G154, Cycle 1