

Grade: GR-CFRWT

Manufacturer:

Graphtek LLC

Description:

A roll wrapped carbon tube is manufactured by wrapping unidirectional carbon fiber prepreg tape around a mandrel with the majority, but not all, of the carbon fiber running longitudinally. This type of construction offers a higher strength to weight ratio

PROPERTY	US VALUE		METRIC VALUE	
Fiber Type	33 m.s.i. Carbon			
Composite Type	Unidirectional Orientation			
Tensile Strength	151000	psi	1041.1	MPa
Compressive Strength	132000	psi	910.1	MPa
Torsional Strength	15000	psi	103.4	mpa
Flexural Strength	272000	psi	1875.4	MPa
Fatigue Strength	90	10 ⁹		
CTE	1.0	in/in °F x 10 ⁻⁶		Microns/m °C
Density	0.055	lb/in ³	1.52	gr/cm ³