

GRAFSTAR™ CS-31 Grade Carbon

Technical Data Sheet 5083

Product Overview

GRAFSTAR™ CS-31 carbon is ideal for specific customer applications requiring very high hardness, high strength, and very low thermal conductivity.

Applications

- Anodes for electrolytic processes
- Applications that require low thermal conductivity material

Sizes

Shape	Measurement	Unit	Size	Unit	Size
Round	Diameter	in	3 - 30 x 72	mm	76 - 762 x 1830
Rectangle	Length	in	15 x 30 x 72	mm	380 x 762 x 1830
Rectangle	Length	in	17 x 17 x 72	mm	432 x 432 x 1830
Rectangle	Length	in	17 x 17 x 88	mm	432 x 432 x 2235
Rectangle	Length	in	20 x 20 x 72	mm	508 x 508 x 1830
Rectangle	Length	in	24 x 24 x 72	mm	610 x 610 x 1830

Typical Properties at Room Temperature*

Characteristic	Unit	WG	AG	Unit	WG	AG	Unit	WG	AG
Density	lbs/ft ³	101		g/cm³	1.62		g/cm³	1.62	
Maximum Particle Size	inches	0.030		mm	0.76		mm	0.76	
Specific Resistance	10⁻⁴Ωin	16.5	19.7	μΩm	41.9	50.0	μΩm	41.9	50.0
Flexural Strength	psi	2300		kg/cm ²	160		MPa	16	
Tensile Strength	psi	1700		kg/cm ²	120		MPa	12	
Compressive Strength	psi	psi 5585		kg/cm ²	390		MPa	39	
Thermal Conductivity	BTU-ft/hr ft ² °F	6		W/mK	10		W/mK		0
Ash Content	% 0.2		.2	%	0.2		%	0.2	

Notes:

* Properties listed are typical and cannot be used as accept/reject specifications

© 2020 Amsted Graphite Materials LLC. This information is based on data believed to be reliable but Amsted Graphite Materials LLC makes no warranties, express or implied, as to its accuracy and assumes no liability arising out of its use. The data listed falls within the normal range of product properties but should not be used to establish specification limits or used alone as the basis of design. Amsted Graphite Materials LLC's liability to purchasers is expressly limited to the terms and conditions of sale. GRAFSTAR is a trademark of Amsted Graphite Materials LLC.

