

Zircar Refractory Composites RSLE-501 CYLINDERS Refractory Sheet

Category : Ceramic , Oxide , Silicon Oxide

Material Notes:

ZIRCAR Refractory Sheet Type RSLE-501 is a low expansion high strength reinforced silica matrix composites in a cylindrical form. This material was designed for use as a high strength, durable insulator in induction heat treating applications. RSLE-501's very low thermal expansion coefficient and high hot strength combine to give it thermal shock resistance not found in other structural ceramic materials. Information provided by ZIRCAR Refractory Composites, Inc. (ZRCI)

Order this product through the following link:

http://www.lookpolymers.com/polymer_Zircar-Refractory-Composites-RSLE-501-CYLINDERS-Refractory-Sheet.php

Physical Properties	Metric	English	Comments
Density	2.10 g/cc	0.0759 lb/in ³	
Porosity	31 %	31 %	

Mechanical Properties	Metric	English	Comments
Hardness, Shore D	87	87	
Modulus of Rupture	0.0300 GPa	4.35 ksi	parallel to thickness
Compressive Yield Strength	48.0 MPa	6960 psi	at 2.7% consolidation parallel to thickness
Charpy Impact	1.08 J	0.800 ft-lb	

Thermal Properties	Metric	English	Comments
CTE, linear	0.300 $\mu\text{m/m-}^{\circ}\text{C}$	0.167 $\mu\text{in/in-}^{\circ}\text{F}$	
	@Temperature 20.0 - 800 $^{\circ}\text{C}$	@Temperature 68.0 - 1470 $^{\circ}\text{F}$	
Thermal Conductivity	0.550 W/m-K	3.82 BTU-in/hr-ft ² - $^{\circ}\text{F}$	parallel to thickness; ASTM C1113
	@Temperature 200 $^{\circ}\text{C}$	@Temperature 392 $^{\circ}\text{F}$	
	0.610 W/m-K	4.23 BTU-in/hr-ft ² - $^{\circ}\text{F}$	parallel to thickness; ASTM C1113
	@Temperature 600 $^{\circ}\text{C}$	@Temperature 1110 $^{\circ}\text{F}$	
	0.750 W/m-K	5.20 BTU-in/hr-ft ² - $^{\circ}\text{F}$	parallel to thickness; ASTM C1113
	@Temperature 1000 $^{\circ}\text{C}$	@Temperature 1830 $^{\circ}\text{F}$	
Shrinkage	0.100 %	0.100 %	
	@Temperature 800 $^{\circ}\text{C}$, Time 86400 sec	@Temperature 1470 $^{\circ}\text{F}$, Time 24.0 hour	
	4.90 %	4.90 %	

Thermal Properties	Metric	English	Comments
	@Temperature 1100 °C, Time 86400 sec	@Temperature 2010 °F, Time 24.0 hour	
	7.90 %	7.90 %	
	@Temperature 1100 °C, Time 86400 sec	@Temperature 2010 °F, Time 24.0 hour	Thickness

Component Elements Properties	Metric	English	Comments
Other	<= 0.30 %	<= 0.30 %	
SiO2	99.7 %	99.7 %	

Electrical Properties	Metric	English	Comments
Volume Resistivity	7.50e+9 ohm-cm	7.50e+9 ohm-cm	ASTM D257-93
Dielectric Strength	1.69 kV/mm	43.0 kV/in	ASTM D149-95

Descriptive Properties	Value	Comments
Color	White	

Contact Songhan Plastic Technology Co.,Ltd.

Website : www.lookpolymers.com

Email : sales@lookpolymers.com

Tel : +86 021-51131842

Mobile : +86 13061808058

Skype : lookpolymers

Address : United North Road 215,Fengxian District, Shanghai City,China