



# SKAMOL VIP-900

Hot-face and back-up insulation for iron & steel industries



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<b>Maximum service temperature</b>		
	°C	1150
	°F	2102
<b>Bulk density, dry (EN 1094-4)</b>		
	kg/m <sup>3</sup>	900
	lbs/cu.ft.	56
<b>Compressive strength (EN 1094-5: 1995)</b>		
@ room temperature	MPa	6.3
	lbs/sq.in.	914
<b>Modulus of rupture (EN 993-6: 1995)</b>		
	MPa	2.1
	lbs/sq.in.	305
<b>Apparent porosity (EN 993-1)</b>		
	%	67
<b>Specific heat</b>		
	kJ/(kg×K)	0.97
	BTU/(lb×°F)	0.23
<b>Coefficient of reversible thermal expansion (BS 1902: section 5.3: 1990)</b>		
@ 20°C-750°C (68°F-1382°F)	K <sup>-1</sup>	10.5×10 <sup>-6</sup>
	°F <sup>-1</sup>	5.9×10 <sup>-6</sup>
<b>Resistance to thermal shock (EN 993-11: 1998)</b>		
heating to 950°C (1742°F)	cycles	>30
<b>Linear reheat shrinkage (EN 1094-6: 1999)</b>		
12 h at 1100°C (2012°F)		1.2
<b>Pyrometric cone equivalent (ASTM C24-89 ORTON cones)</b>		
	°C	1310
	°F	2390
<b>Thermal conductivity (ASTM C-182)</b>		
mean temp. @ 200°C	W/(m×K)	0.23
@ 400°C		0.25
@ 600°C		0.26
@ 800°C		0.28
@ 1000°C		0.30
@ 392°F	BTU/(sq.ft.×h×°F/in)	1.59
@ 752°F		1.73
@ 1112°F		1.80
@ 1472°F		1.94
@ 1832°F		2.08
<b>Chemical analysis, typical</b>		
	%	
Silica	SiO <sub>2</sub>	48
Titanium dioxide	TiO <sub>2</sub>	1.5
Ferric oxide	Fe <sub>2</sub> O <sub>3</sub>	5.4
Alumina	Al <sub>2</sub> O <sub>3</sub>	16
Magnesium oxide	MgO	14
Calcium oxide	CaO	3.4
Sodium oxide	Na <sub>2</sub> O	0.1
Potassium oxide	K <sub>2</sub> O	6.8
Loss on ignition 1025°C (1877°F)	LOI	3.6
<b>Colour</b>		<b>SAND</b>
<b>HS Tariff number</b>		
(Harmonized Commodity Description and Coding System)		6806.90.00

Data are average results of tests conducted under standard procedures and are subject to variation. Data contained in this data sheet are supplied in good faith as a technical service and are subject to change without notice. Misprint and errors excepted.

Note: The TC value at 1000°C (1832°F) is estimated.

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