

Sintered silicon carbide ceramic column cylinder

■ Introduction:

Sintered silicon carbide ceramic column cylinder is a high-performance ceramic material with excellent properties such as high hardness, high strength, high wear resistance, high corrosion resistance and high temperature stability. Sintered silicon carbide ceramic column cylinder is made of silicon and carbon powder mixed in proportion and sintered at high temperatures.

■ Technical data sheet:

Item	Unit	Data
Density	G/cm3	>3.14
Open porosity	%	<0.1
Bending strength	MPa	400-500
Viker Hardness	Kg/mm ²	2800
Rockwell Hardness	HRA	92
Acid-proof (98% H ₂ SO ₄ at 100C	Mg/cm ² .Y	0.98
Grain Size	nm	<10
Fracture toughness	Mpa	4-5
Silicon Carbide Content	%	>99

■ Advantages:

1. Sintered silicon carbide cylinder is widely used in a variety of industrial equipment in high temperature, high pressure, high speed and corrosive environments, such as chemical, petroleum, aerospace, metallurgy, electronics, machinery and other fields. Sintered silicon carbide cylinder can be used to manufacture valves, pump bodies, mechanical seals, bearings, heat exchangers, fused metal sensors and other high performance ceramic products.
2. No pressure silicon carbide has excellent wear resistance, corrosion resistance and high temperature stability, and can operate at high temperatures for a long time without damage. Sintered silicon carbide column's hardness is many times higher than ordinary steel, can resist all kinds of physical and chemical corrosion, has a long service life. In addition, silicon carbide ceramics also has excellent mechanical properties, can withstand high pressure and high speed working state, to ensure the stable operation of equipment.

