

## sintered silicon carbide beam pipe for kiln furniture

## ■ Introduction:

Sintered silicon carbide beam pipe for kiln furniture is a material used in sintering furnace furniture. It is made of high purity silicon carbide powder sintered at high temperature. The material has extremely high hardness, corrosion resistance and high temperature resistance, and can withstand oxidation and corrosion at high temperatures. Therefore, sintered silicon carbide beam pipe is widely used in sintering furnace furniture, such as kiln pipe, beam, plate and so on.

## ■ Technical data sheet:

Item	Unit	Data
Density	G/cm3	>3. 14
Open porosity	%	<0.1
Bending strength	MPa	400-500
Viker Hardness	Kg/mm <sup>2</sup>	2800
Rockwell Hardness	HRA	92
Acid-proof (98% $H_2SO_4$ at 100C	Mg/cm <sup>2</sup> .Y	0.98
Grain Size	nm	< 10
Fracture toughness	Мра	4-5
Silicon Carbide Content	%	>99

## ■ Advantages:

- 1. SSIC beam for kiln has excellent wear resistance, impact resistance and corrosion resistance;
- 2. Sintered silicon carbide kiln furniture has longer service life than that of reaction bonded silicon carbide ceramic
- 3. Sintered silicon carbide square pipe has higher self-lubrication than other abrasion resistant material.
- 4. Refractory SiC beam has good oxidation resistance in oxidizing environment and can prolong the service life.

