

Material	Silicon Carbide(SiC)		
	Sintered SiC (SSiC)	Reaction-bonded SiC (RBSiC)	Nitride-bonded SiC (NBSiC)
Density (g/cm <sup>3</sup> )	3.1	3.02	2.72
Flexure strength (MPa)	380	250	160
Young Modulus (GPa)	420	330	220
Poisson's ratio	0.15	0.19	0.19
Compressive strength (MPa)	3900	3500	3500
Hardness (HV)	2800	2500	2500
Fracture toughness (MPa*m <sup>1/2</sup> )	3.5	3.8	3.8
Maximum working temperature (°C)	≥1600	1380	1550
Thermal conductivity (W/m*K)	74-160	45	15
Thermal expansion coefficient (/°C)	4.1*10 <sup>-6</sup>	4.5*10 <sup>-6</sup>	5*10 <sup>-6</sup>
Thermal shock resistance (ΔT °C)	500	400	400

\* The actual product may have slight differences due to factors such as the composition of the raw material, molding and sintering process, etc.