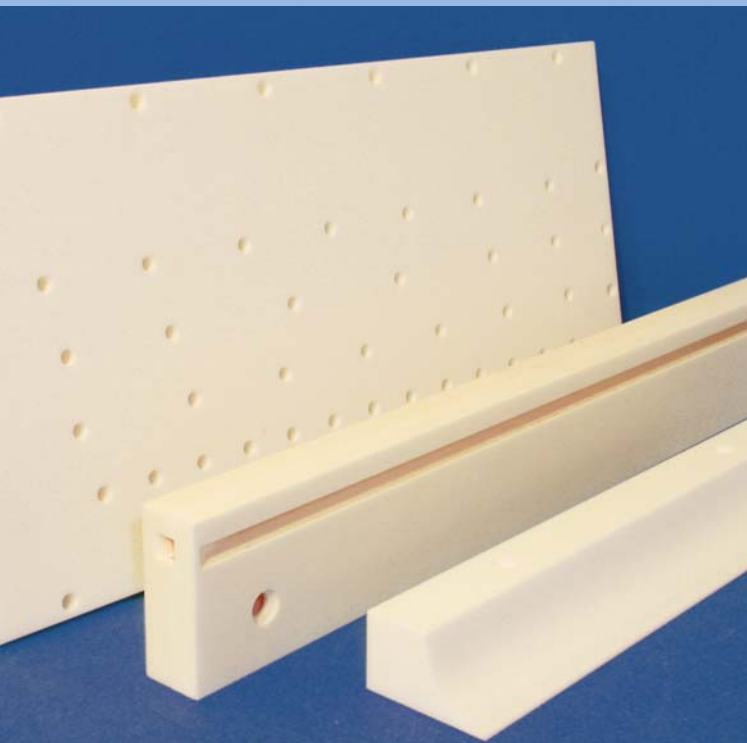
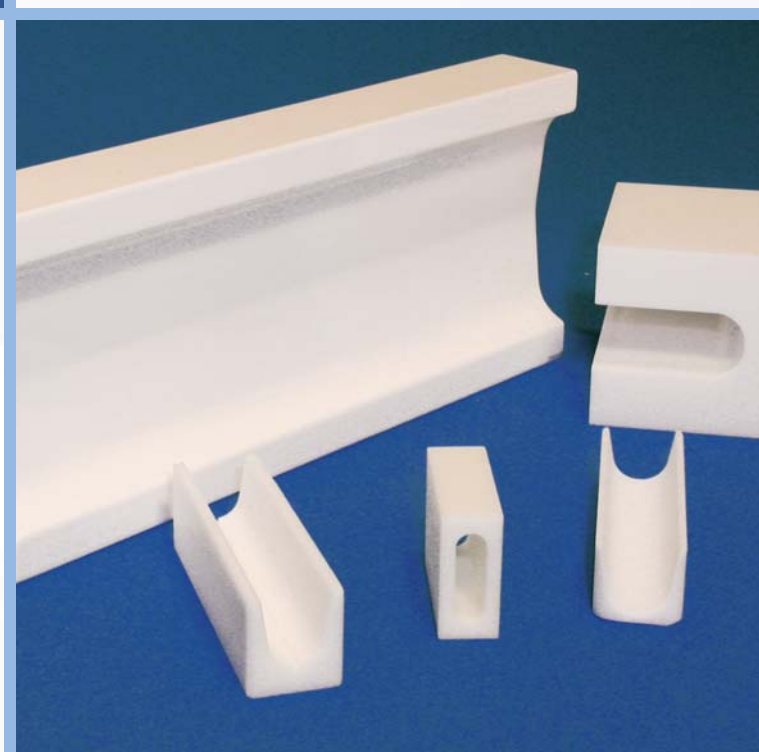


CERAMIC COMPONENTS FOR LASERS

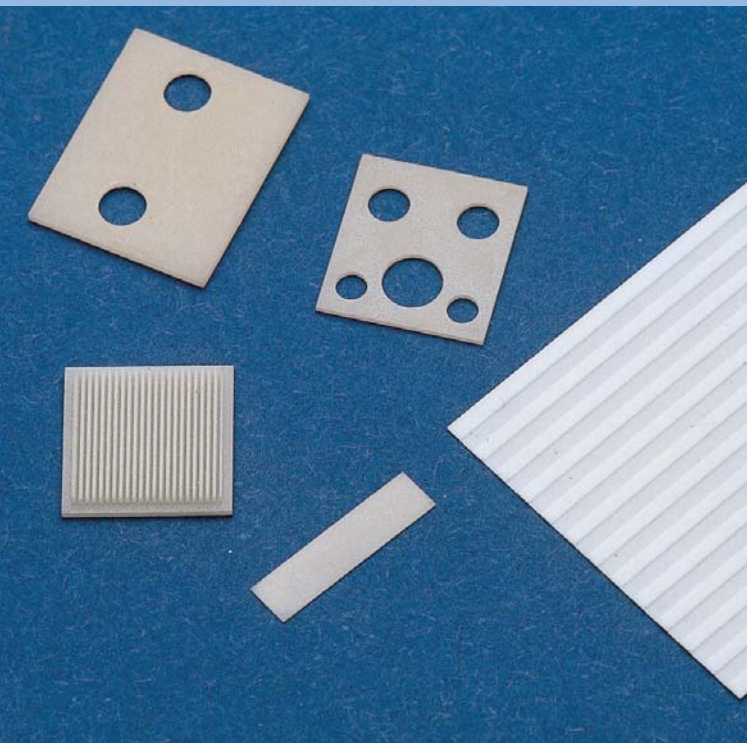
Insulators



Reflectors



Heat sinks



Applications

- Solid-state lasers
- High-intensity light systems
- Gas lasers (excimer lasers, CO₂ lasers....)
- High-power laser diodes

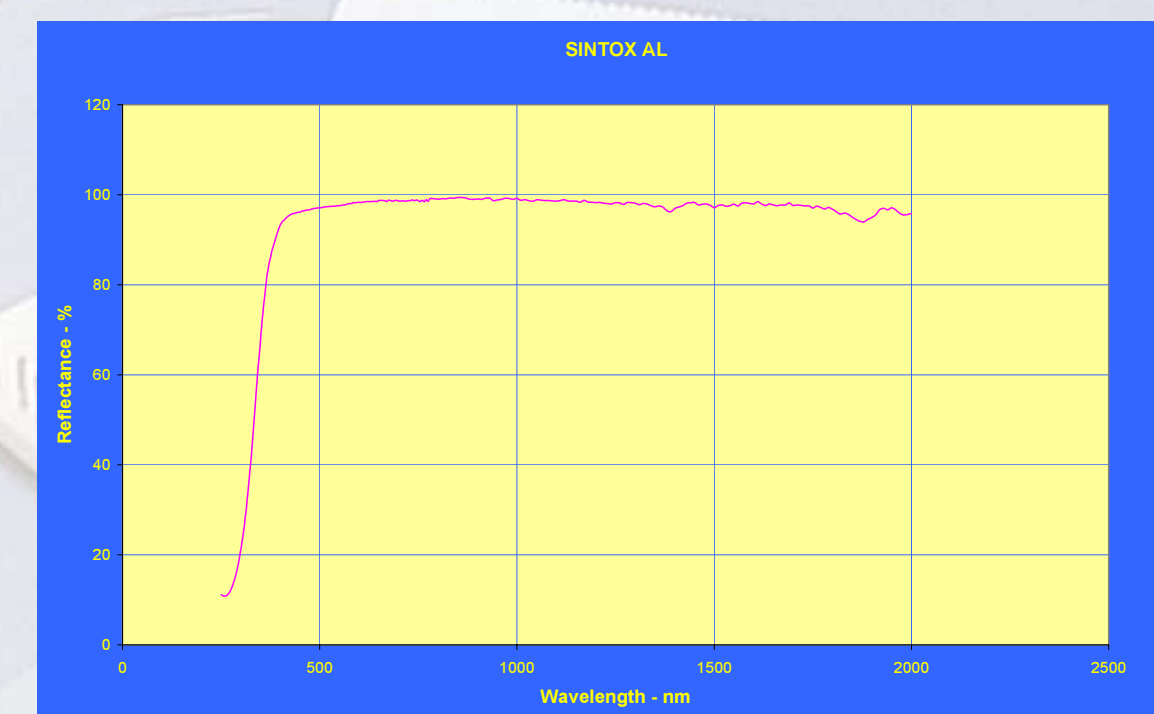
Products

- Diffusing / reflecting cavities
- High-voltage insulators
- Gas-attack resistant components
- Heat sinks

Materials

- High Purity alumina : fully dense & controlled porosity
- Glass ceramic
- Aluminium nitride

99.7 % controlled-porosity alumina for laser cavities



Material Properties (typical values)	Aluminium nitride	Alumina 99.5 %
Open porosity	Nil	Nil
Dielectric strength (ac-Kv/mm)	> 20	30
Electrical resistivity (Ohm.cm)	> 10 ¹⁴	> 10 ¹⁴
Dielectric constant @ 1 Mhz	8.6	9.5
Thermal conductivity (W/m.K) @ 20°C	> 180	29
Coef. Linear Thermal Expansion (10 ⁻⁶ /°C) 25-1000°C	5.6	8.2
Young's Modulus (GPa)	310	300
Flexural strenght (Mpa)	310	350

