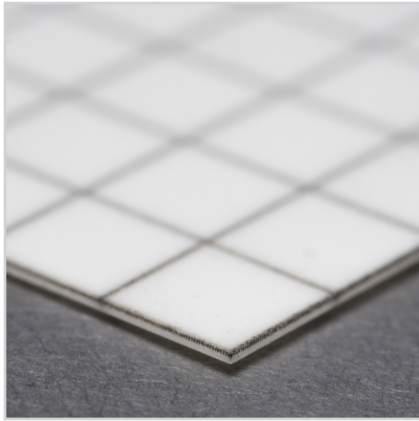


ATS

Alumina Thinfilm-Substrates



This zirconia toughened alumina substrate material shows very good results after laser scribing and breaking, or even when cut with a waver saw. ATS has been developed especially for thin-film applications. ATS can be easily cut or structured by laser or waver saw. Due to its inner mechanical strength and fine grains the material has much less material chipping at the processing edges during manufacturing process compared to other materials. Due to the very fine grains of the ATS very fine Pt-structures are possible.



We lasercut the material according to your wishes!

Please send in your CAD data.

Typical characteristics	Unit	Value
Colour	-	white
Density	g/cm ³	4
Surface roughness R _a	µm	< 0.08
Bending strength	MPa	> 600
Evenness	µm	50
Dielectric strength at 20°C	kV/mm	> 10
Thermal conductivity	W/mK	22
Standard dimensions	mm	101.6 x 101.6 and 50.8 x 50.8
Thickness	mm	0.25 up to 0.38
Structure	-	dense
Main components	%	96% Al ₂ O ₃ 4% ZrO ₂

Advantages

- very fine-grained homogeneous grain structure < 1 micron
- good electrical insulation properties
- high mechanical strength
- processing by laser or waver saw possible, very low on chipping
- very good evenness
- outstanding performance for thinfilm applications

Main Applications

- thinfilm application, e.g. temperature sensors

NOTE:

The information provided in this Technical Data Sheet (TDS) including the recommendations for use and application of the product are based on our knowledge and experience of the product as at the date of this TDS. The product can have a variety of different applications as well as differing application and working conditions in your environment that are beyond our control. KERAFOL® is, therefore, not liable for the suitability of our product for the production processes and conditions in respect of which you use them, as well as the intended applications and results. We strongly recommend that you carry out your own prior trials to confirm such suitability of our product. All specifications are subject to change without notice. Any liability in respect of the information in the Technical Data Sheet or any other written or oral recommendation(s) regarding the concerned product is excluded. In case KERAFOL® would be nevertheless held liable, on whatever legal ground, KERAFOL®'s liability will in no event exceed the amount of the concerned delivery. All KERAFOL® products are sold pursuant to the Kerafol's Terms and Conditions of sale and delivery in effect from time to time, a copy of which will be furnished upon request.