Milam H

KLINGER® Milam H - the pure mica sheet
Is a homogeneous, phlogopite mica material suitable for gasket applications. KLINGER® milam H gasket material is specifically designed for hot, dry, gas applications up to 1000°C and 5 bar internal pressure. Its outstanding chemical resistance also makes it suitable for a wide range of other applications.

Basic composition Mica with resin binder

Colour beige gold to green

Certificates

Sheet size 1000 x 1200 mm

Thickness 0.6 mm, 0.8 mm, 1.0 mm, 1.5 mm, 2.0 mm, 3.0 mm

Tolerances

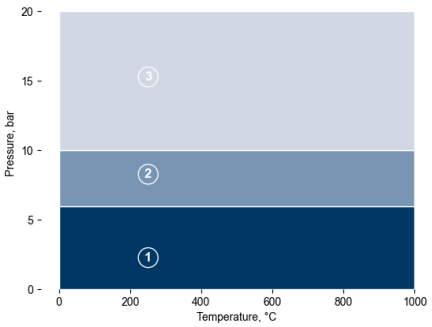
Thickness	± 10 %
Length	± 5 mm
Width	± 5 mm

Industries
General industry | Chemical | Oil&Gas | Energy | Pulp&Paper | Marine | Automotive

Technical data - Typical values for a thickness of 2.0 mm.

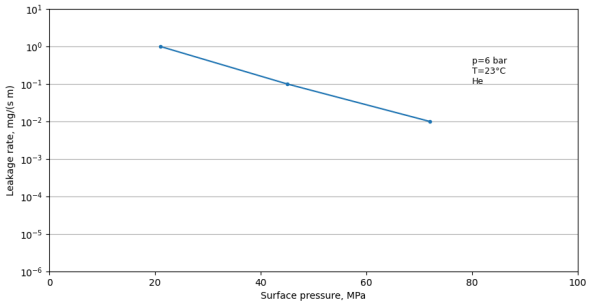
Density of the mica layer	DIN 28090-2	g/cm³	1.9
Loss on ignition	TGA at 1000°C for 4 h	%	≤ 5
Compressibility	ASTM F36J	%	15-25
Recovery	ASTM F36J	%	35 - 45
Maximum gasket stress Q_{smax} at RT	EN 13555	MPa	220
Maximum gasket stress Q_{smax} at 400°C	EN 13555	MPa	80
Minimum required gasket stress in assembly $Q_{min(0.1)}$ at RT and 6 bar	EN 13555	MPa	45

P-T diagram - thickness 2.0 mm



The area of the P-T diagram
In area one, the gasket material is normally suitable subject to chemical compatibility.
In area two, the gasket material may be suitable but a technical evaluation is recommended.
In area three, do not install the gasket without a technical evaluation.
Always confirm the chemical resistance of the gasket to the media.

Tightness performance



The tightness performance of mica
The graph shows the required stress at assembly to seal a certain tightness class.
The determination of the graph is based on the EN13555 test procedure which applies 6 bar Helium at room temperature. The sloping curve indicates the ability of the gasket to increase tightness with raising gasket stress.

Chemical resistance chart

Simplified overview of the chemical resistance depending on the most important groups of raw materials:

A: small or no attack **B**: weak till moderate attack **C**: strong attack

Paraffinic hydrocarbon	Motor fuel	Aromates	Chlorinated hydrocarbon fluids	Motor oil	Mineral lubricants	Alcohol	Ketone	Ester	Water	Acid (diluted)	Base (diluted)
A	A	A	A	A	A	A	A	A	A	B	B

All information is based on years of experience in production and operation of sealing elements. However, in view of the wide variety of possible installation and operating conditions one cannot draw final conclusions in all application cases regarding the behaviour in gasket joint. The data may not, therefore, be used to support any warranty claims. This edition cancels all previous issues. Subject to change without notice.