

MONOLUX® materials are rigid insulation boards with a low thermal conductivity. They are specifically formulated without asbestos and mineral fibres.

MONOLUX® products have low shrinkage and high strength and therefore provide effective and stable insulation solutions for industrial applications.

MONOLUX®-500 is a rigid machinable insulation used as a thermal break in process plants and as single skin insulation in ovens and dryers.

MONOLUX®-800 boards are strong rigid insulation boards ideally suited for applications where good insulation values and high mechanical resistance are required.

Properties & advantages

- Low thermal conductivity
- High mechanical strength
- Resistant to moisture and chemicals
- Excellent machinability to close tolerances
- Tough and durable
- Dust free surface
- Asbestos free

Typical applications

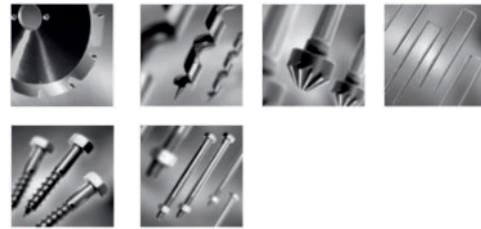
- Platen press insulation
- Load bearing pipe supports
- Heat shields
- Structural thermal breaks
- Furnace bottom boards

Working & processing

MONOLUX® products can be accurately machined with special processing machinery and appropriate tools. The fine material structure allows the production of precision machined parts.

MONOLUX® boards can be easily fixed in place by screws or Tucker Fasteners. When using screws, slot holes should be included.

When cutting to size, the maximum allowable recommended workplace concentration for dust generation must be observed. We advise localised dust extraction in the cutting zone.

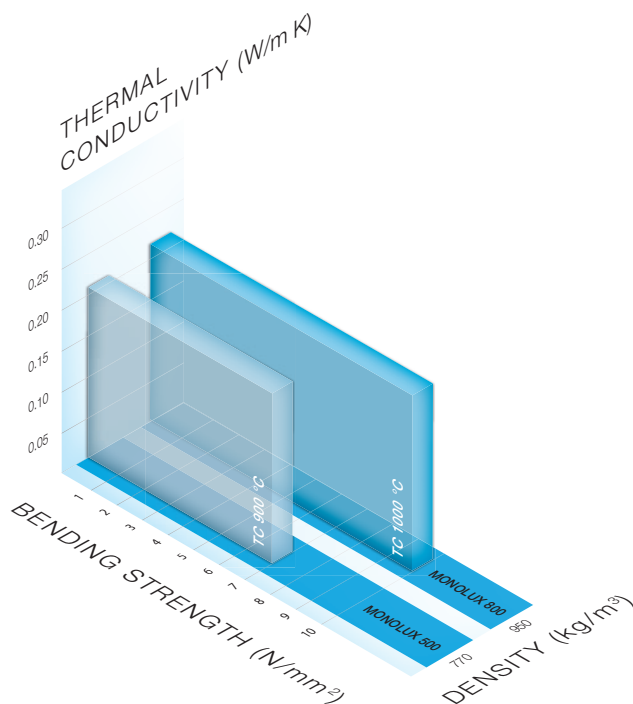




Technical data

Brand		MONOLUX®		
Grade		-500	-800	
Colour		White/beige	White/beige	
Building material class (DIN 4102)		A1, Non-combustible	A1, Non-combustible	
Classification temperature	°C	900	1000	
Nominal density	kg/m ³	770	950	
Cold compressive strength	N/mm ²	13	27	
Bending strength	N/mm ²	7	10	
Shrinkage @ CT, 12 h	%	0.4	0.4	
Thermal conductivity	200 °C mean	W/m K	0.21	0.22
	400 °C mean	W/m K	0.23	0.24
	600 °C mean	W/m K	0.25	0.25
	800 °C mean	W/m K	0.27	0.28
Specific heat capacity	kJ/kg K	0.96	1.03	
Reversible thermal expansion	m/m K	2.2x10 ⁻⁶	2.2x10 ⁻⁶	

Graph: Thermal conductivity vs. bending strength vs. density (Thermal conductivity @ 200 °C)



Product dimensions & size availability

	Length [mm]	Width [mm]	Thickness [mm]
MONOLUX®-500	2440	1220	12.7-19.1-25.4 31.8-38.1-50.8
MONOLUX®-800	2440	1220	12.7-20-25-30-50

Other sizes and shaped parts are available on request.

Production tolerances

Length [mm]	± 5.0
Width [mm]	± 5.0
Thickness [mm]	+0/-0.8