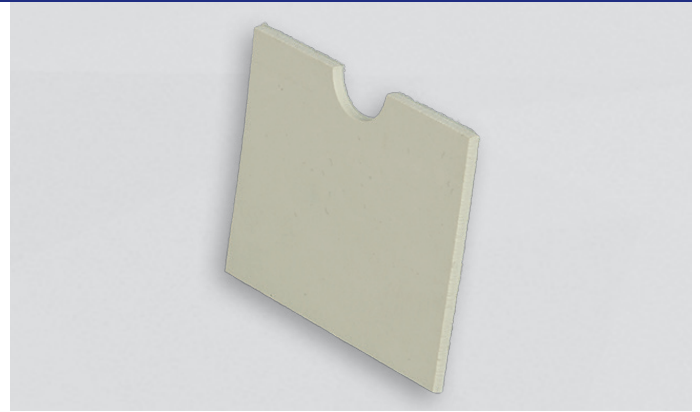




CELLO® HL FIRESTOP R (HLFR)

Fire-protective heavy layer made from thermoplastic polyolefins with a high content of mineral fillers and fireproofing agents.

Applications: As fire containment barrier with additional sound-attenuation function in buses/utility vehicles, rail vehicles



TECHNICAL DATA

FLAMMABILITY	<ul style="list-style-type: none"> ▶ FMVSS 302, DIN 75 200, fulfilled ▶ ISO 3795, burning rate < 100 mm/min ▶ ECE R-118, annexes 6, 7 and 8 fulfilled; Flame propagation: 0 mm/min (HLFR 5) ▶ UL 94, V-0 (HLFR 5) ▶ EN 45545-2: requirement R1 + R7 + R17, HL 3 fulfilled (HLFR 5 SK + HLFR 8 SK)
TEMPERATURE RESISTANCE	placed on a steel surface: -40°C to +110°C, flame protection activated at 220°C
THERMAL CONDUCTIVITY / EN 12667	≤ 0.123 W/(m·K) at 10°C
WEIGHT	HLFR 4: 4 kg/m ² HLFR 5: 5 kg/m ² HLFR 8: 8 kg/m ²
HARDNESS / DIN 53505	85 ± 10 Shore A
STRAIN VALUES / DIN 53504	elongation at break > 20%
LOSS FACTOR / DIN EN ISO 6721-3	applied on 1 mm steel sheet at 20°C / 200 Hz: > 0.08 (HLFR 5)
ELECTRICAL RESISTANCE / DIN EN 1081	volume resistance R _v : 7·10 ⁹ Ω surface resistance R _s : 5.3·10 ¹⁰ Ω



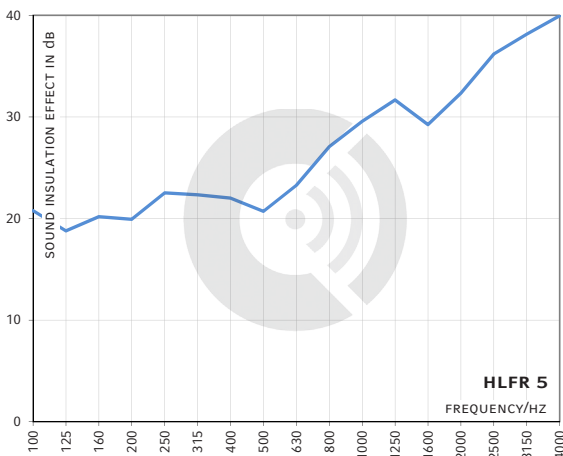
DIMENSIONS

PRODUCT	THICKNESS [mm]	THICKNESS TOLERANCE [mm]	SHEETS* [mm]
HLFR 4	2.0	± 0.5	1050 X 1250 or 2100 X 1250
HLFR 5	2.5	± 0.5	1050 X 1250 or 2100 X 1250
HLFR 8	4.0	± 0.5	1050 X 1250 or 2100 X 1250

Other thicknesses / dimensions on request. Ready-to-use parts according to your specifications or drawing.

*Untrimmed: Effective dimensions guaranteed as ordered, may be exceeded by some layers (foam, film, non-woven etc.).

TRANSMISSION LOSS / TEST PROCEDURE SIMILAR TO DIN EN ISO 10140-2



BENEFITS	<ul style="list-style-type: none"> ▶ Prevention of flame propagation ▶ Fire containment solution ▶ Exceptional fire performance ▶ Good sound insulation values ▶ High aging stability
OPTION	<ul style="list-style-type: none"> HLFR NK: no self-adhesive equipment HLFR SK: with self-adhesive finish
ADVICE	When applied on vertical surfaces or overhead, additional mechanical fixation is recommended.