

# Flexible, adaptable and individual. READY FOR RAIL.

Composite panel for rail and road transportation

**Application area:** Areas subject to high loads, e. g. floor area

**Lay-up thickness:** 11.8 mm

Glass fibre layers

Foam core

Glass fibre layers



strength



lightweight



environment



serviceability



integration



customization



3D



stiffness

## Technical Data

### MATERIAL



layers  
glass fibre and  
phenol-formaldehyde



core material  
structural foam

### DIMENSIONS



surface weight  
(semi-finished sandwich)  
5.4 kg/m<sup>2</sup>



thickness  
11.8 mm



length & width  
Standard:  
2810 mm x 1860 mm  
Arbitrarily expandable

### TEMPERATURE



fire & smoke, HL2  
FST according to  
DIN EN 45545-2



operating temperature  
-25 – +55 °C



temperature  
resistance  
-35 – +70 °C



Thermal expansion  
coefficient  
50 E-06 K<sup>-1</sup>  
at +20 to +50 °C  
34 E-06 K<sup>-1</sup>  
at -20 to +20 °C

### MECHANICAL & PHYSICAL PROPERTIES



thermal insulation  
4.2 W/(m<sup>2</sup>K)



acoustic damping  
29.1 dB according to  
DIN EN ISO 10140-2



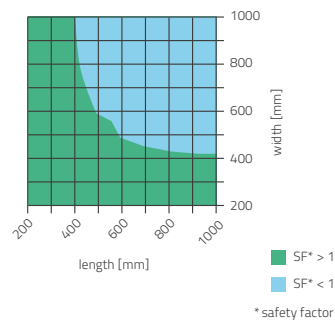
drum peel strength  
1.4 N/mm according to  
DIN EN 2243-3



indentation (Ø 6 mm)  
750 N



support distance for L/300  
550 mm



### SPECIAL FEATURES



product lifetime  
32 years at  
20 million load cycles



certifications  
DIN EN 9100  
DIN 6701



design elements  
selective and area  
reinforcement, edge  
protection, floating  
inserts, panel connection  
elements, heatable

# Flexible, adaptable and individual. READY FOR RAIL.

Composite panel for rail and road transportation

**Application area:** Areas subject to high loads, e.g. floor area

**Lay-up thickness:** 18 mm

Glass fibre layers

Foam core

Glass fibre layers



## Technical Data

MATERIAL	DIMENSIONS	TEMPERATURE	MECHANICAL & PHYSICAL PROPERTIES		SPECIAL FEATURES
<p>layers glass fibre and phenol-formaldehyde</p>	<p>surface weight (semi-finished sandwich) 5.7 kg/m<sup>2</sup></p>	<p>fire &amp; smoke, HL2 FST according to DIN EN 45545-2</p>	<p>thermal insulation 2.4 W/(m<sup>2</sup>K)</p>	<p>drum peel strength 2.4 N/mm according to DIN EN 2243-3</p>	<p>product lifetime 32 years at 20 million load cycles</p>
<p>core material structural foam</p>	<p>thickness 18 mm</p>	<p>operating temperature -25 – +55 °C</p>	<p>acoustic damping 30 dB according to DIN EN ISO 10140-2</p>	<p>indentation (Ø 8 mm) 750 N</p>	<p>certifications DIN EN 9100 DIN 6701</p>
	<p>length &amp; width Standard: 2900 mm x 1870 mm Arbitrarily expandable</p>	<p>temperature resistance -35 – +70 °C</p>	<p>support distance for L/300 750 mm</p>		<p>design elements selective and area reinforcement, edge protection, floating inserts, panel connection elements, heatable</p>
		<p>Thermal expansion coefficient 50 E-06 K<sup>-1</sup> at +20 to +50 °C 34 E-06 K<sup>-1</sup> at -20 to +20 °C</p>	<p>* safety factor</p>		