



TECHNICAL DATA

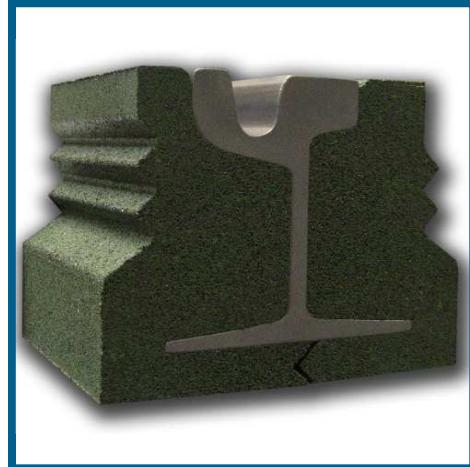
Protrack Set

Vibration insulation in railways and tramways

Product description and Technical Specification

Left and right side profile for rail systems. produced using fibres and granules of SBR rubber (Styrene Butadiene Rubber) or EPDM rubber (Ethylene Propylene Diene Monomer) selected and compacted using polyurethane glue by pressing process; 750 mm lenght, 800-900 kg/m³ density.

- Acoustic and electric insulation
- Easy to lay, to substitute and to maintain
- Protection of pavements for single or crossing tracks



AREA OF APPLICATION

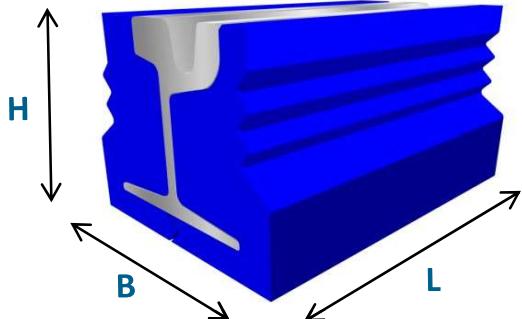
- Vibration and acoustic rail insulation
- Electric rail insulation

- Protection against corrosion of the rails
- Junction between track and road

PHYSICAL CHARACTERISTICS

	Unit	M	H	Tolerance
Density	kg/m ³	800	900	± 5%
Colour		black		
Length (L)	mm	750		± 1%

The base (B) and height (H) depends on the type of rail



TECHNICAL CHARACTERISTICS

	Norm	Unit	M	H	Tolerance
Stiffness characteristic		MN/m/m	43	62	± 10%
Water absorption	DIN 52103/A		≤ 2%		
Frost strength test with water	DIN 52104/B		< 1%		
Elongation at break	DIN 53455		> 50%		
Hardness	ASTM D2240	Shore A	70		± 10%
Electrical resistance	UNI 5572	Ω x cm	≥ 10 ⁸		
Inflammability	DIN 4102		B2		

The suggestions and technical information given above represent our knowledge regarding the properties and the product's uses. ISOLGOMMA reserve the right to modify or update this data without prior notice. This document is the property of ISOLGOMMA and all rights are therefore reserved

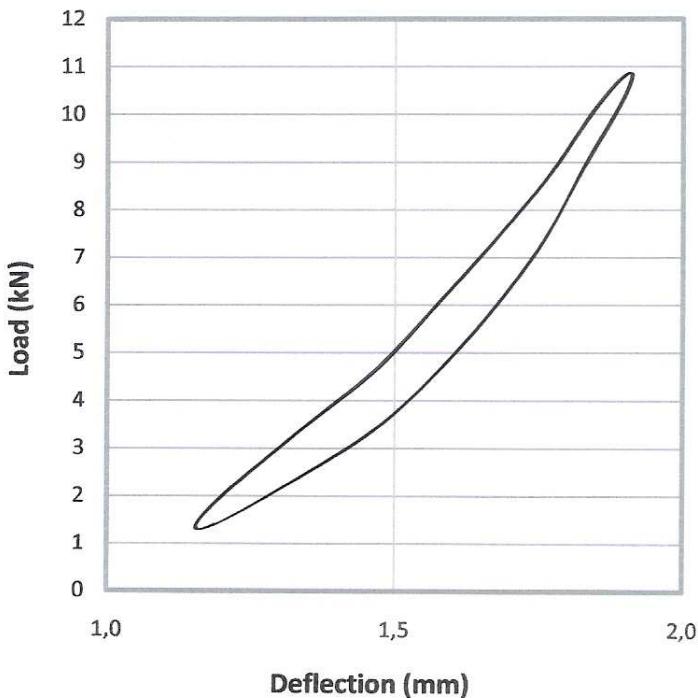


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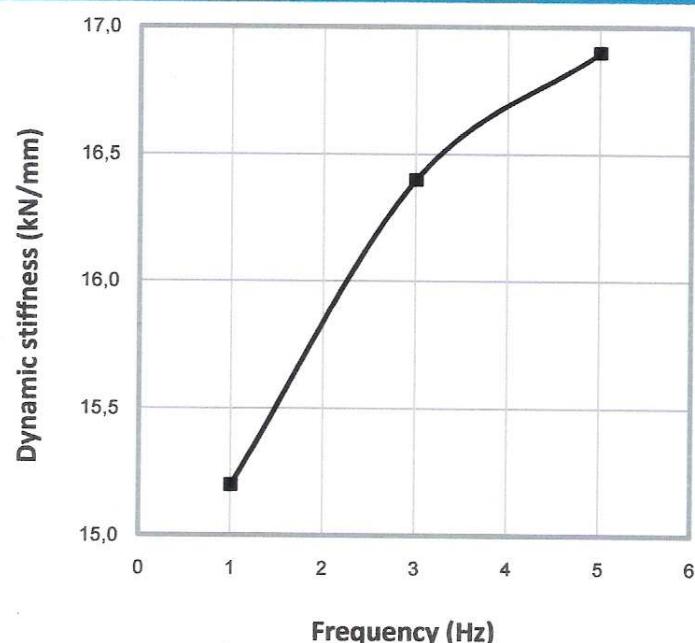
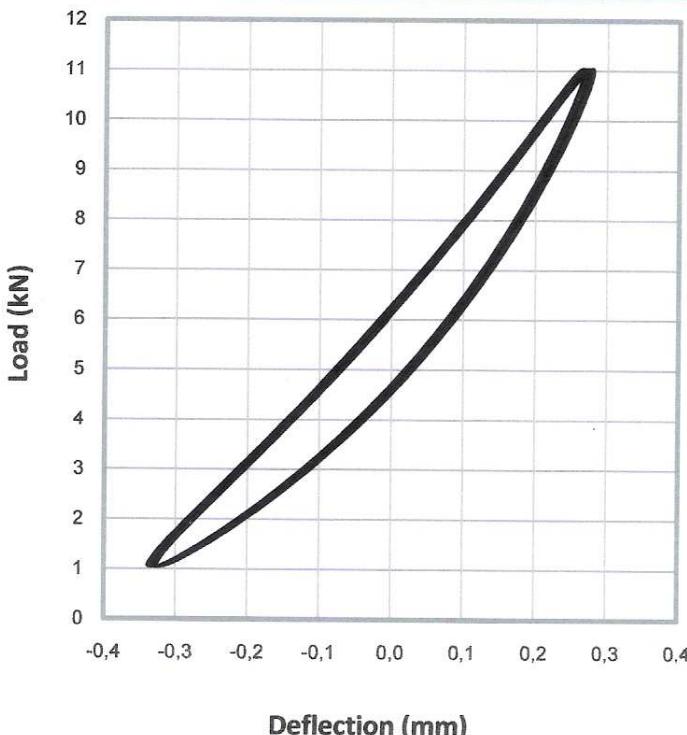
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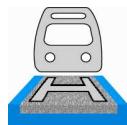
Quasi-static stiffness - Embedded system vertical 0°



Maximum load = $F_{max} = 11 \text{ kN}$
Quasi-static stiffness = $k_{qs} = 12,80 \text{ kN/mm}$

Dynamic stiffness - Embedded system vertical 0°



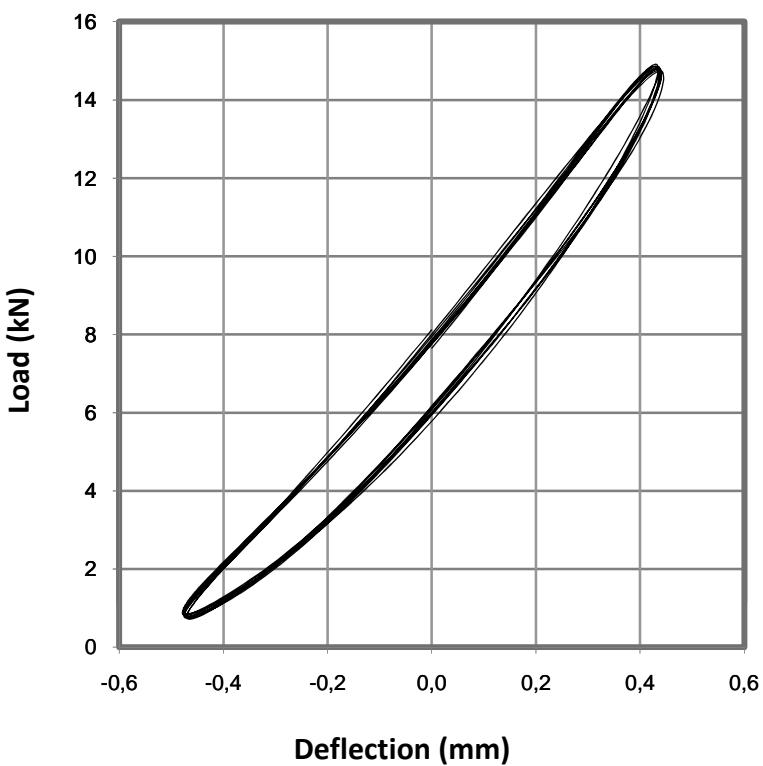


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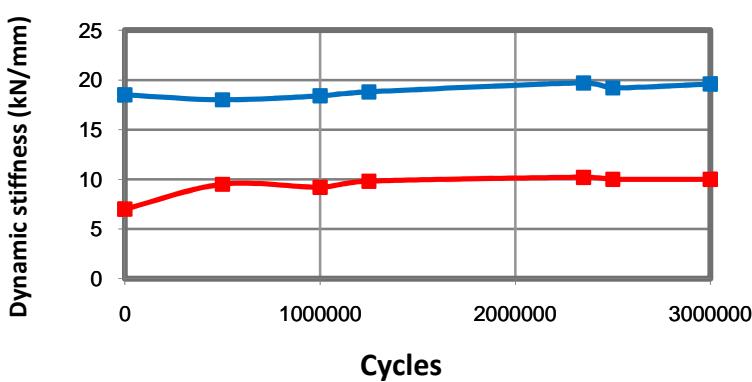
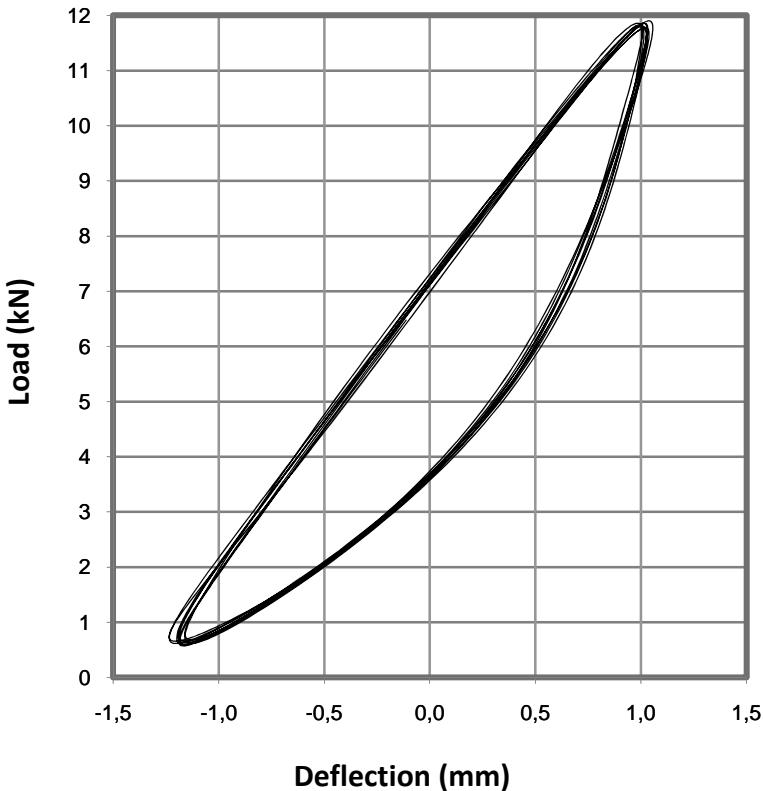
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Vertical dynamic stiffness - Embedded system inclination 38,6°



Vertical hysteresis cycles to 3 Hz
 k_d vertical = 15,42 kN/mm

Lateral dynamic stiffness - Embedded system inclination 38,6°



k_d vertical	k_d lateral
Variation of the static stiffness post fatigue	
9,28%	< 25%
Variation of the dynamic stiffness post fatigue	
9,28%	< 25%

Vertical hysteresis cycles to 3 Hz
 k_d lateral = 4,82 kN/mm

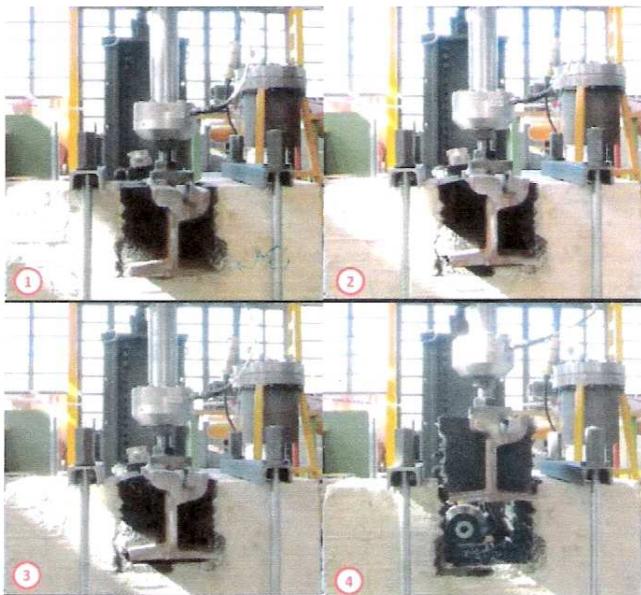
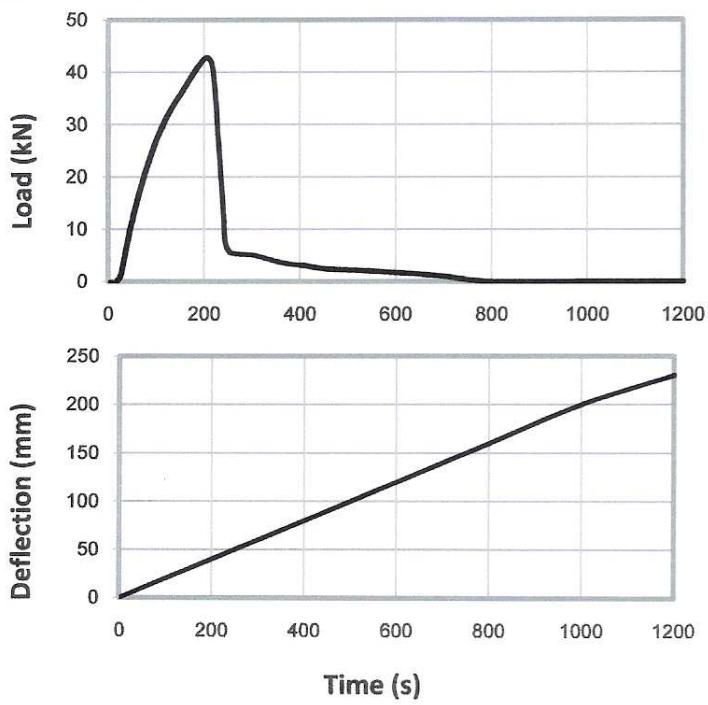


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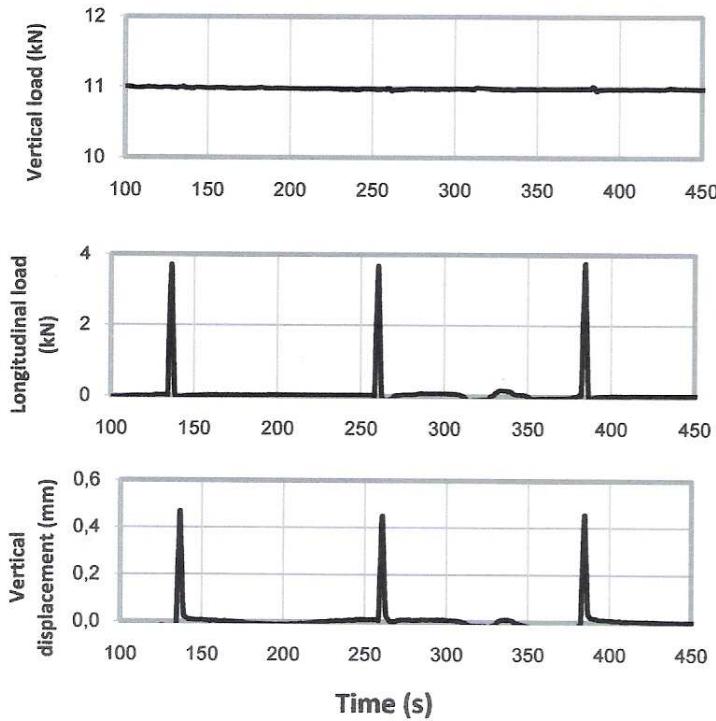
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Vertical pull-out



$F_{max} = 43 \text{ kN}$

Longitudinal stiffness



$k_{longitudinal} = 7,95 \text{ kN/mm}$

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