

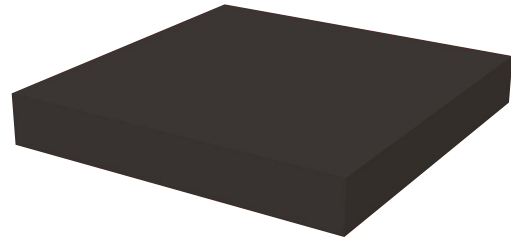
Ciflex N 170

Elastomeric bearing for vibration isolation

Product information

DIMENSIONS AND WEIGHTS

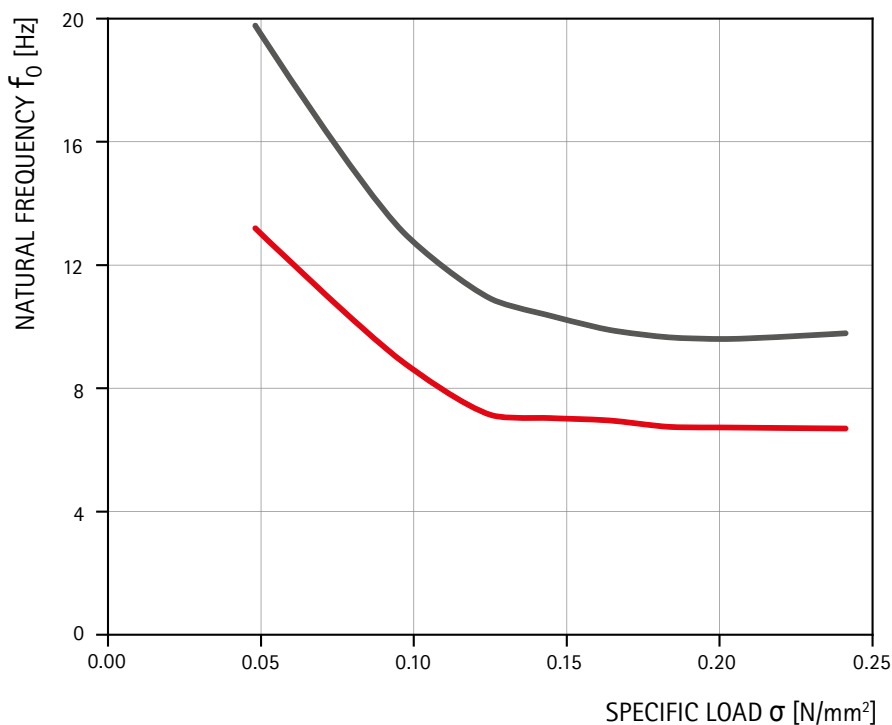
Length	1000 mm
Width	500 mm
Thickness	25 mm
	Other thicknesses on request
Weight	9.6 kg/m ²
Cut to size	available on request



PROPERTIES

Materials	Foamed polyurethane material
Permanent load	≤ 0.17 N/mm ²
Permanent load + dynamic load	≤ 0.25 N/mm ²
Load peaks (occasional and short-term)	≤ 0.85 N/mm ²
Thermal stability	-30°C + 60°C
Flammability	B2 acc. to DIN 4102 (normally combustible)
Water absorption	< 8%

Natural frequency



NATURAL FREQUENCY CURVE

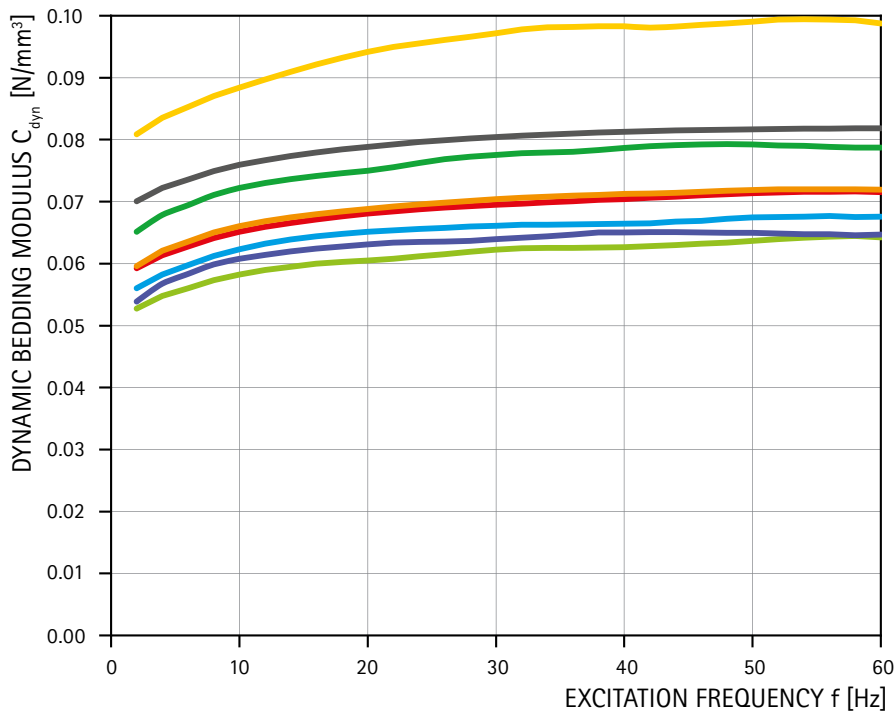
The figure shows the natural frequency of a single-degree-oscillator with Ciflex N 170 as an elastic bearing for an excitation with a velocity amplitude of 1 mm/s.

— t = 25 mm
— t = 50 mm

Ciflex N 170

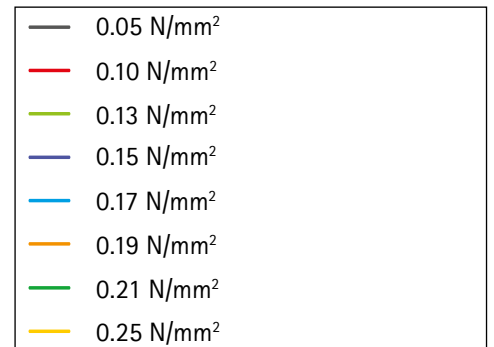
Elastomeric bearing for vibration isolation

Dynamic bedding modulus depending on the excitation frequency (25 mm)

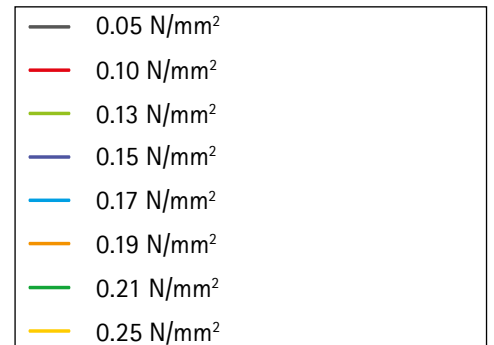
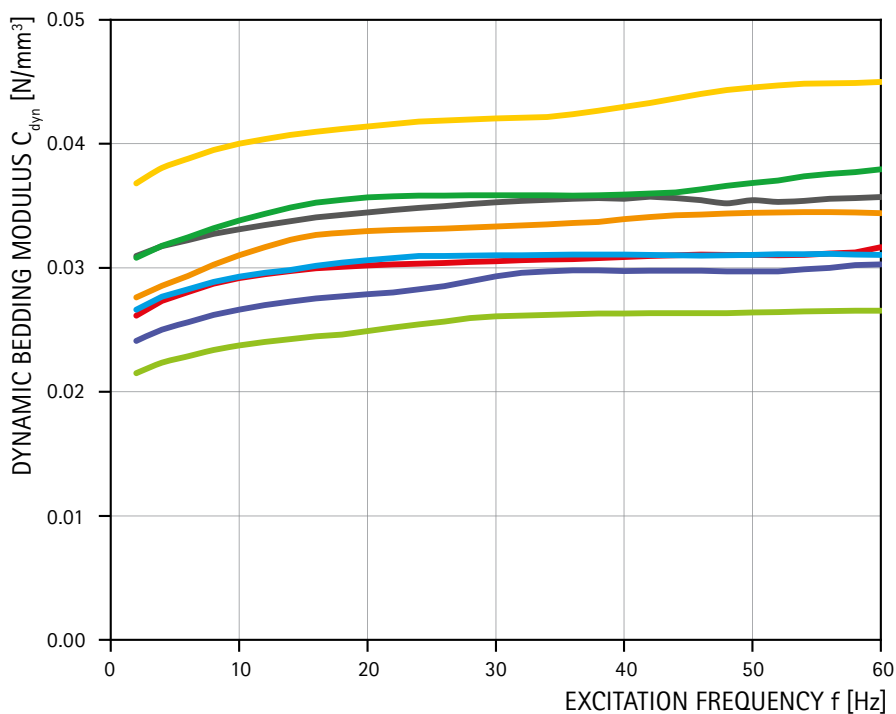


DIAGRAMS

The figures shows the dynamic bedding moduli for an excitation with a velocity amplitude of 1 mm/s and for different vertical compressive stresses.



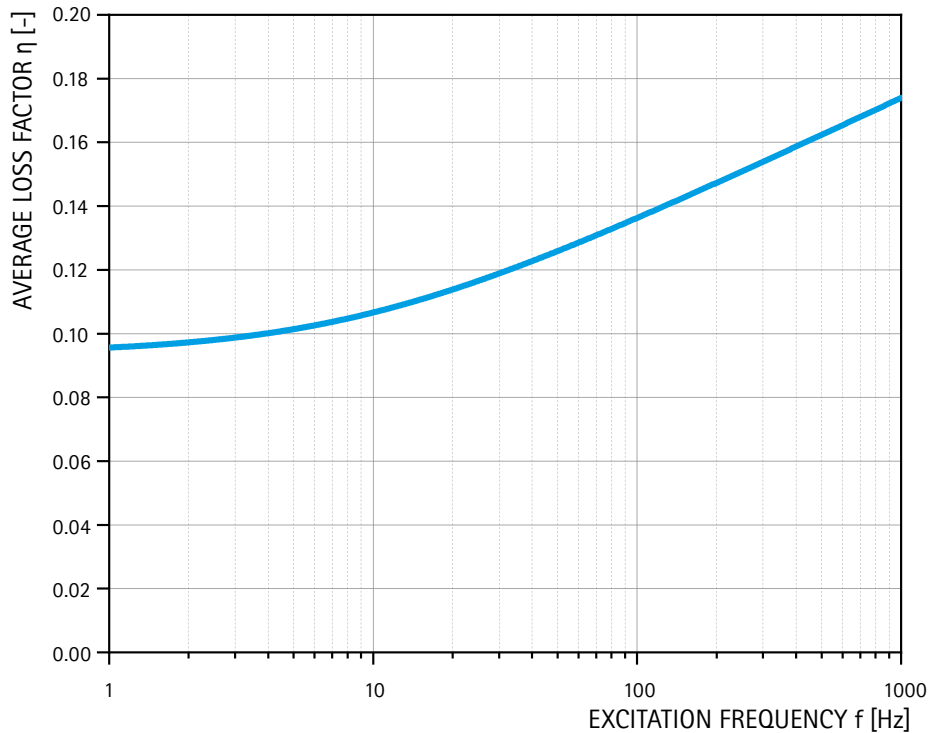
Dynamic bedding modulus depending on the excitation frequency (50 mm)



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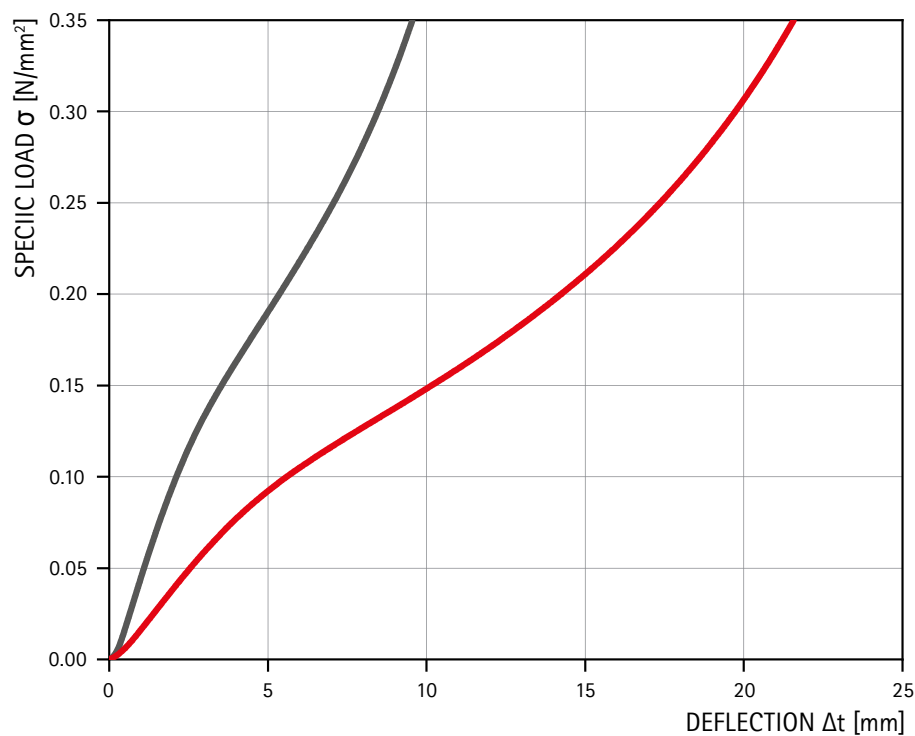
Loss factor



LOSS FACTOR CURVE

The loss factor is a measure of the energy loss per cycle in a vibrating system. The values shown in the diagram were determined by a DMA analysis using the WLF master curve method with a reference temperature of 20°C in order to be able to represent as wide a frequency range as possible.

Load deflection



LOAD DEFLECTION CURVE

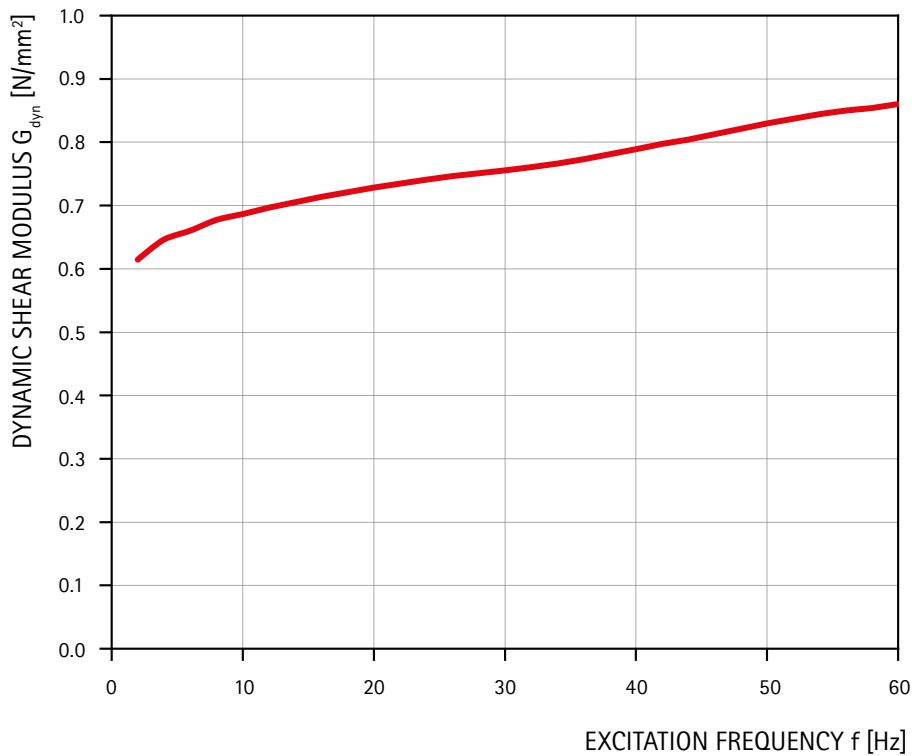
Application of uniaxial pressure against vertical deformation.

— t = 25 mm
— t = 50 mm

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Shear modulus



SHEAR MODULUS CURVE

The diagram shows the shear modulus of the 25 mm thick Ciflex N 170 at a vibration velocity amplitude of 1 mm/s as a function of frequency. For greater thicknesses, the shear modulus tends to be lower.

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