Isotop® MSN-DAMP

PU Shock Absorber with Metal Caps and Threaded Fastening

by getzner isotop®

Version

Isotop® MSN-DAMP shock absorbers consist of two metal caps with an M8 internal thread and a cylindrical damping body made of polyurethane. The metal caps are bonded to the damping body with a special type of inseparable adhesive and finished in a CDP coating (cathodic dip-painted) in RAL 9005 (Jet Black), thus guaranteeing high resistance against corrosion. An M8 internal thread is cut into the spring caps as standard, while the metal caps can also be fitted with a stud bolt as an option.

Area of application

Isotop® MSN-DAMP shock absorbers have a natural frequency (resonance frequency) of roughly 11 Hz depending on the load, and are mainly used for bearing compact components and units such as:

- Small compressors
- Compact ventilators
- Small heat pumps
- Compact pumps
- Small refrigeration plants

Data needed to choose the right product

- The total weight to be cushioned
- Number and position of contact points
- Centre of gravity
- Shape of the device (dimensional sketch)
- Load direction
- Lowest disturbing frequency (number of revolutions or strokes)

Isotop® MSN-DAMP, CDP

Advantages

- Extremely low overall height
- Screw-mountable PU shock absorber
- Interchangeable due to consistent overall height
- Easy to integrate into existing systems

Special versions with a high-damping Sylodamp® are also available in the following dimensions. Quotation on request.

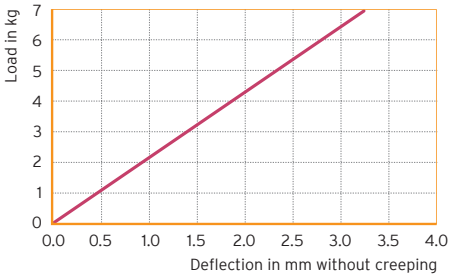
Our service

Take advantage of our expertise in vibration engineering. We will gladly advise you and calculate your individual vibration isolation solution.

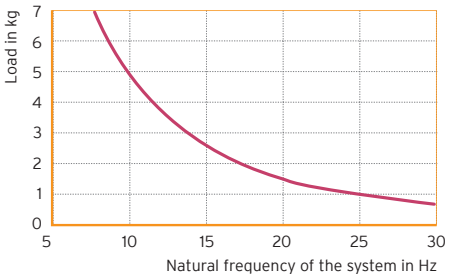
Isotop® MSN-DAMP

Isotop® MSN-DAMP 70

Deflection curve

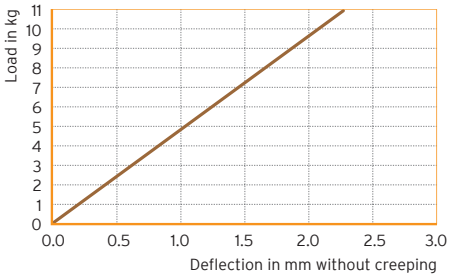


Natural frequency

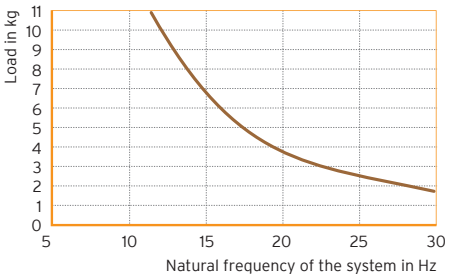


Isotop® MSN-DAMP 110

Deflection curve

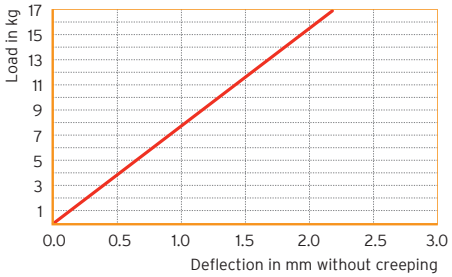


Natural frequency

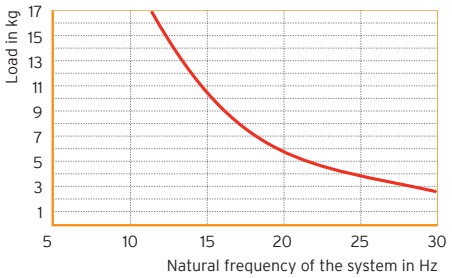


Isotop® MSN-DAMP 170

Deflection curve

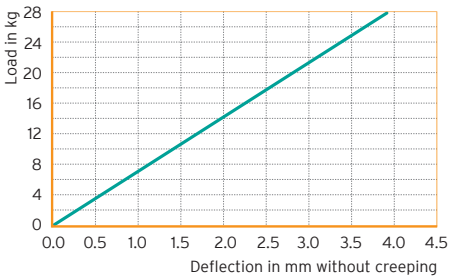


Natural frequency

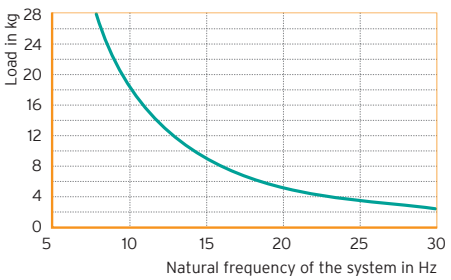


Isotop® MSN-DAMP 280

Deflection curve

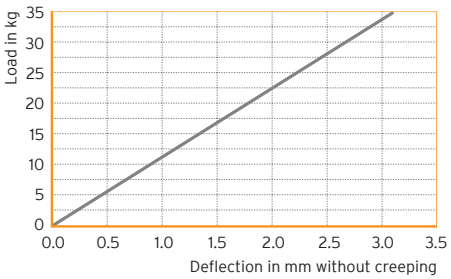


Natural frequency

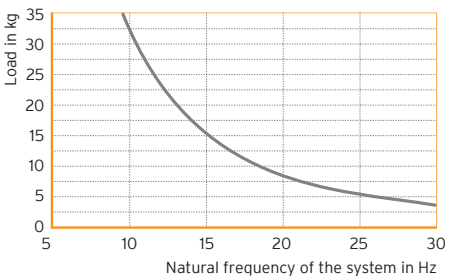


Isotop® MSN-DAMP 350

Deflection curve



Natural frequency



For creep behaviour data, see page 3.

Static creep behaviour

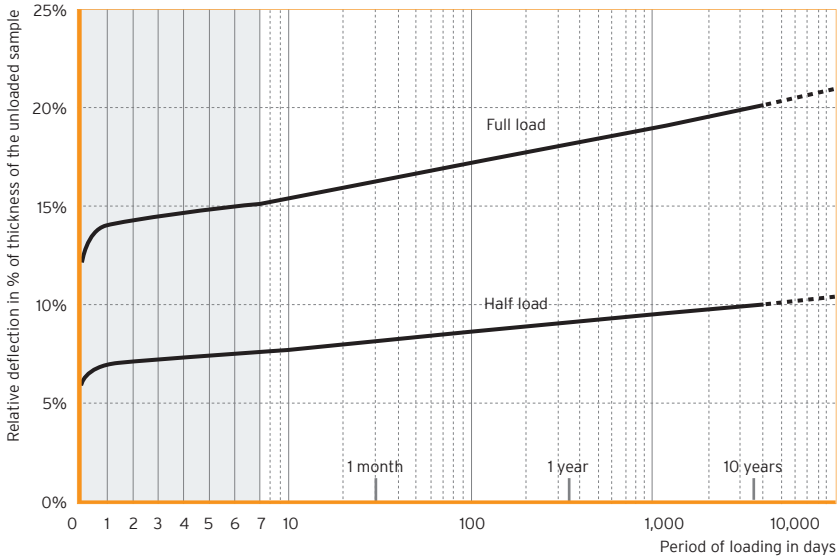


Fig. 1: Typical creep curve

Dynamic creep behaviour

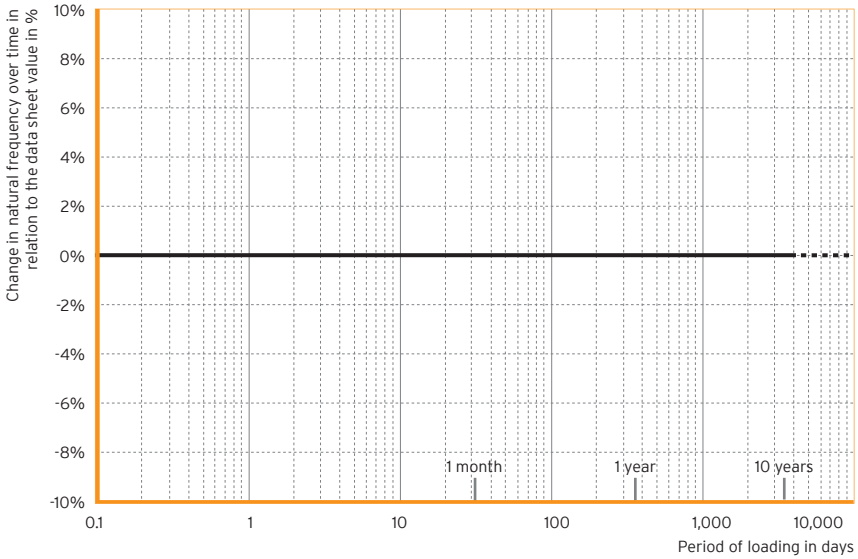


Fig. 2: If Isotop® MSN-DAMP is loaded in the specified areas of application, no change in the natural frequency occurs during the period of loading provided that the ambient conditions remain constant.

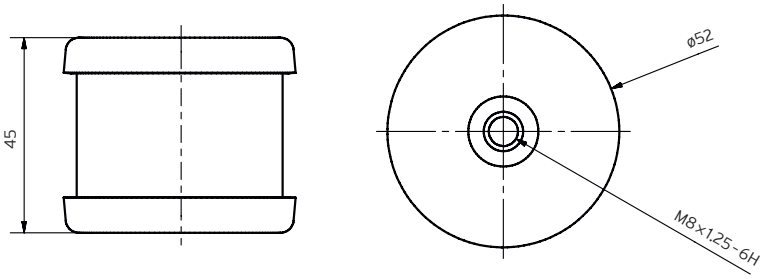
Like all elastomers, Isotop® MSN-DAMP exhibits increased deformation under a static load (creeping). This increase in deformation is proportional to the time logarithm. In other words, the additional deformation that occurs is always the same for each decade (1 day, 10 days, 100 days, etc.). The largest increase in deformation due to creeping is completed after a relatively short period of time. The areas of application for Isotop® MSN-DAMP have therefore been selected so that the creep curve is the same for all types.

Selection table			
TYPE	ITEM NO.	MAX. LOAD IN KG	NATURAL FREQUENCY AT MAX. LOAD IN HZ
MSN-DAMP 70 T/T	45001012	7	8.1
MSN-DAMP 110 T/T	45001013	11	11.6
MSN-DAMP 170 T/T	45001014	17	11.6
MSN-DAMP 280 T/T	45001015	28	7.9
MSN-DAMP 350 T/T	45001016	35	9.6

Dimensions of Isotop® MSN-DAMP XX T/T

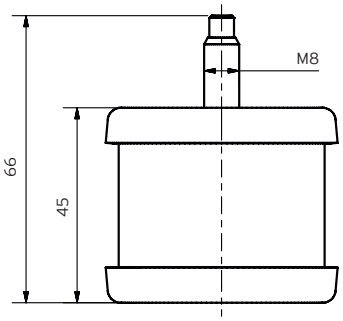
Thread reach into the internal thread max. approx. 15 mm plus material thickness of device frame

T = Internal thread
B = Stud bolt

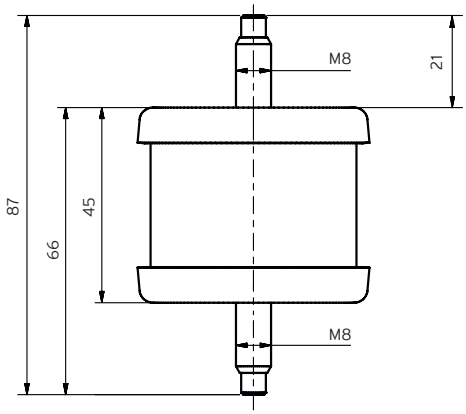


Optional versions:

Isotop® MSN-DAMP XX B/T



Isotop® MSN-DAMP XX B/B



All data is based on our current level of knowledge.
It can be used in calculations and for reference purposes, but is subject to typical manufacturing tolerances; errors excepted and subject to change without notice.