



# Decoupling of the Power Distribution Units

Solutions for reduction noise and vibrations

The combined spring/damper properties of Sylomer<sup>®</sup> make it ideal for the bearing of machines and electrical units on ships and in the off-shore sector. Sylomer<sup>®</sup> has been used for the bearing of machines and floors on ships since the 1980s. The long-lasting, consistent material properties guarantee high efficiency levels throughout the entire service life, and the resistance of the material to machine oil and salt water make it perfect for use in this environment.

## Benefits and product features

- Highly effective protection against vibrations and shocks
- Durable elastic properties without settling mean long-lasting and effective decoupling of structure-borne noise
- Height of the bearing can be adapted to existing systems
- Resistant to oil and salt water
- Self-adhesive equipment for easy mounting

## Usage

The power distribution unit and power supply on ships are responsible for the smooth running of almost all the electrical equipment on board. This includes control systems, the air supply, lighting, etc. A failure in the power supply can lead to critical situations and even loss of manoeuvrability.

It is therefore important to protect the power distribution unit from vibrations, including continuous vibrations generated by drive motors as well as unprecedented shocks and impacts caused by strong waves, collisions or external impacts.

When designing Sylomer® bearings, the load specifications of the power distribution unit are considered under static conditions, as well as the test conditions during the usual drop tests for dynamic testing. Isolation of the power distribution unit from vibrations using Sylomer® increases the service life of the entire unit and ensures that vibrations, shocks and impacts do not result in unwanted failures or damage. To mount components with screw connections and extremely low natural frequencies, a bearing with Isotop® spring elements can be used.



Before Installation



Sylomer® is placed directly under the frame



### Application areas

- Decoupling of pumps
- Decoupling of suspension points and steel frames
- Damping elements for hose clamps
- Sandwich elements as pre-stressed bearings
- Bearing of generators, motors and compressors