# DOCUMENTATION SHEET

Steel Spring Isolator Type HDT 3



### General

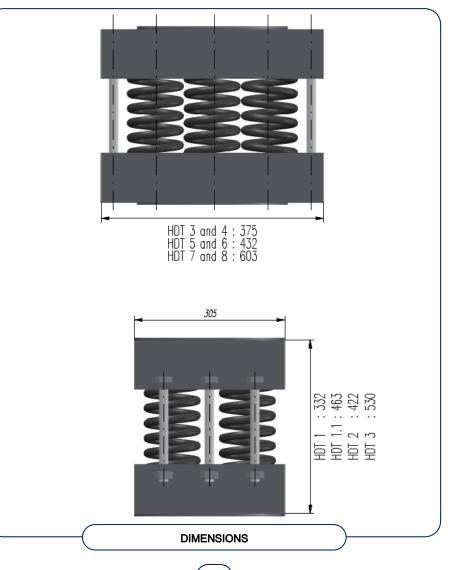
Medium and heavy duty spring isolators types MDL, HDL, HDT and HD (V) are available for a load range up to 404.5 kN and static deflections up to 76 mm. This enables the efficient support of very large machinery and/or a very high degree of isolation. The spring isolators are designed in top grade wire to low stress levels and produced by the hot deformation and annealing method. The finish is by means of protective coatings compatible with the working environment, ensuring a trouble-free service life. The housings formed by channels allow for pre-loading of the isolators up to the working load and are available in a tall (T) and low (L) version. The HD (V) isolators support an integrated damper unit for reduction of amplitudes in transient conditions. The other types of isolators can be equipped with separate viscous damper unit type DV 1, 2 and 3 to match the damping requirements. Our specialists will be happy to supply you with the selection.

### Applications

- Generator sets
- Heavy industrial machinery
- Large generator sets
- Roller mills and mixers
- Complete power plants
- Boilers

## Types

- MDL (medium-duty low)
- HDL (heavy-duty low)
- HDT (heavy-duty tall)
- HD (heavy duty)
- HDV
- Viscous damper units



1

SSM / HDT 3 / NOV 2012





Туре	Cz [N/mm]	Cx, y [N/mm] at preferential load	Fz max [N]	Fz preferential [N]
HDT 33	867	115	66000	56815
HDT 43	1156	153	88000	75750
HDT 53	1445	191.5	110000	94600
HDT 63	1734	306	132000	113500
HDT 73	2023	268	154000	132400
HDT 83	2312	306	176000	151500
	CHARACTERISTICS			)

# HDT 3

## Isolator selection

This described isolator selection is based on the vertical load of the isolators, if required seismic and 6 DOF calculations can be performed by our specialists.

- 1. Determine the total weight of the machine to be isolated, including work load
- 2. Determine the position of the combined centre of gravity in horizontal and vertical planes
- 3. Decide the number of isolators and the positions where the isolators are to be placed relative to the combined centre of gravity
- 4. Calculate the load per isolator
- 5. Select with the help of the preferential load in the table the suitable type of mounting

We recommend selection of the isolators be made with the load per isolator within + or - 10% of the preferential load. The static deflection of the isolator is calculated by dividing the load per isolator by the stiffness Cz given in the table for the selected isolator.



### Rubber Design B.V.

Industrieweg 21 2995BE Heerjansdam The Netherlands Phone: +31 (0)78 677 87 78 Fax: +31 (0)78 677 10 38 Email: info@rubberdesign.nl Web: www.rubberdesign.nl

