

**LINEX<sup>®</sup>** conveyor belt centralizing idler  
...and conveyor belts are always in dead center

# LINEX® conveyor belt centralizing idler

LINEX® conveyor belt centralizing idlers ensure symmetrical belt running and protect the belt edges.

LINEX® conveyor belt centralizing idlers help to prevent expensive production breakdowns.

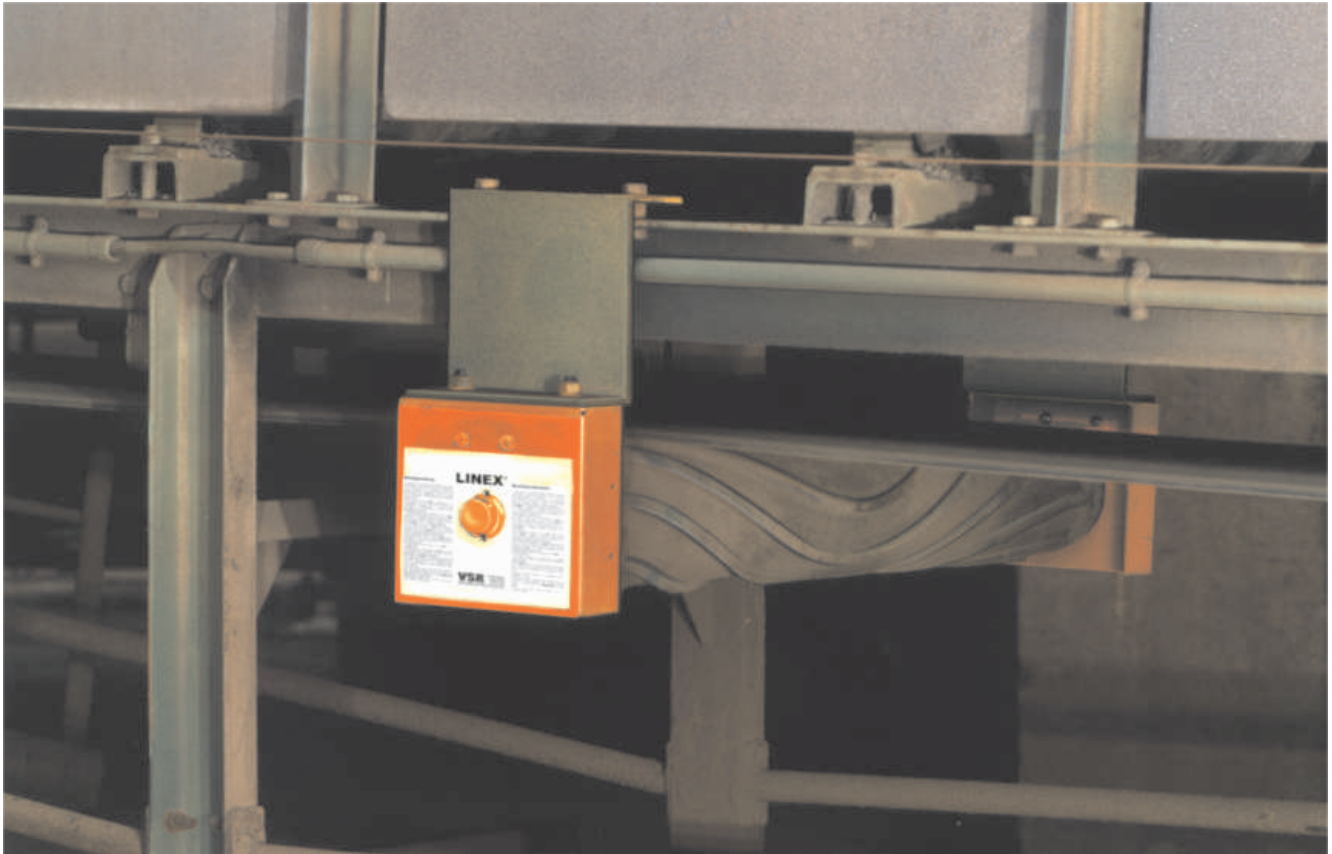
LINEX® conveyor belt centralizing idlers are maintenance-free, wear-resistant and easy to install.

Fields of application:

conveyor belts used in lignite and coal mining, power plants, cement works, gravel, stone and sand quarries, foundries, aluminium works, steel works, port loading facilities, chemical plants, water and sewage works, refuse incineration plants, and in the wood and metal processing industry.

LINEX® centralizing idlers should be fitted as original equipment to all conveyor belts in order to eliminate tracking faults due to:

- uneven, worn or wrongly spliced conveyor belts
- incorrect idler adjustment
- conical head pulleys
- distorted steel structure
- one-sided insolation
- asymmetrical or transverse shear-producing load
- asymmetrical friction forces with pulleys, idlers, scrapers and chute seals

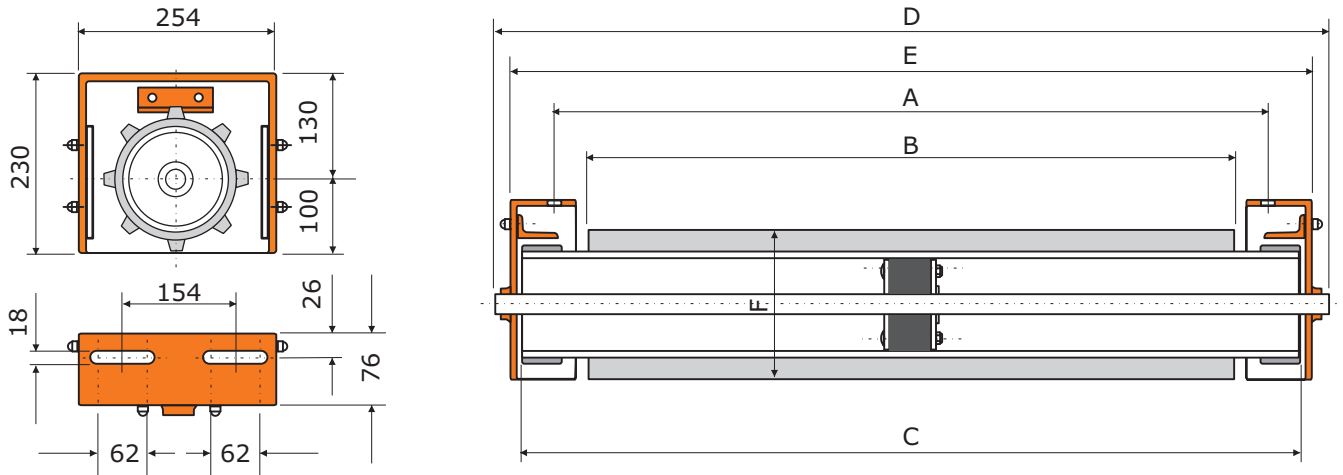


Specification for the LINEX® conveyor belt centralizing idlers:

rubber cover, with 8 twisted support ribs, friction linings at both ends, giration-mounted centrally on a heavy right-through axle by means of a double spherical roller bearing, dust boots out of cellular caoutchouc on both sides, 2 zinced bearing boxes with braking angle and 2 longitudinal holes for installation.

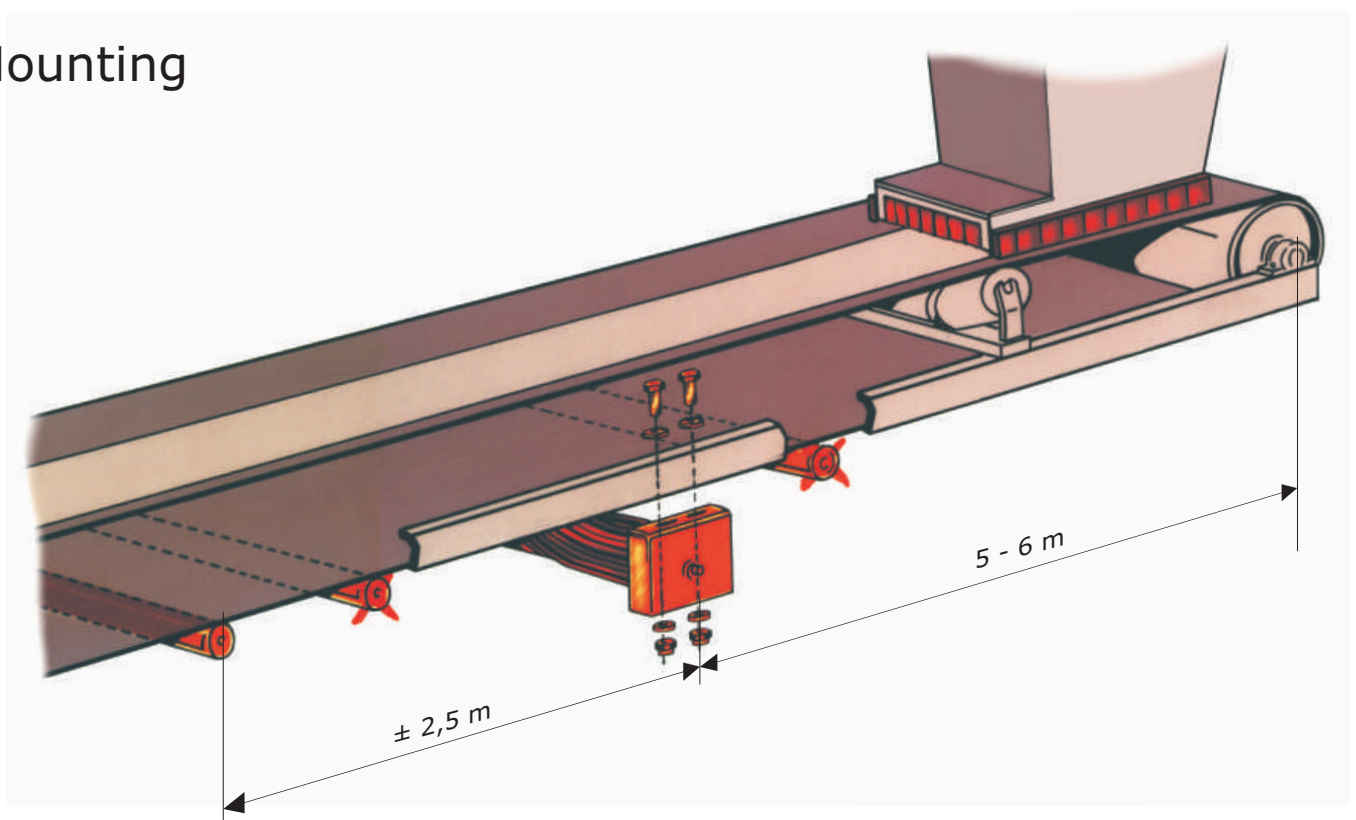
... for belt widths of 400 up to 2000 mm

# LINEX® Dimensions



LINEX® Type	Belt Width mm	A* mm	B mm	C mm	D mm	E mm	F mm	Weight kg
LID 40	400	640	550	700	785	740	190,5	40
LID 50	500	740	650	800	885	840	190,5	43
LID 65	650	890	800	950	1035	990	190,5	47
LID 80	800	1090	1000	1150	1235	1190	190,5	53
LID 100	1000	1280	1190	1340	1425	1380	190,5	59
LID 120	1200	1530	1440	1590	1675	1630	190,5	65
LID 140	1400	1720	1630	1780	1865	1820	190,5	73
LID 160	1600	1950	1860	2010	2095	2050	190,5	86
LID 180	1800	* can be fitted for standard supporting frames, other dimensions on request						
LID 200	2000							

## Mounting

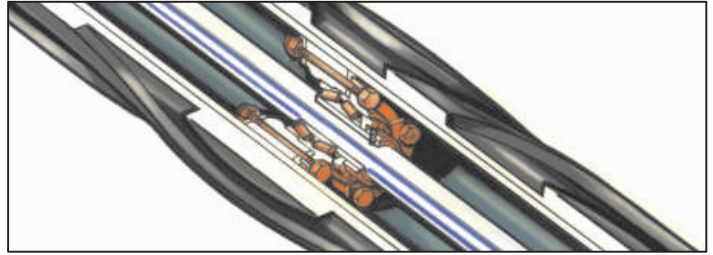


# LINEX<sup>®</sup> Function

## Central Spherical Roller Bearing:

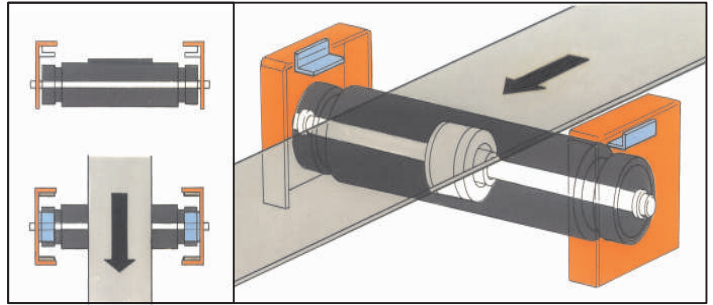
This spherical roller bearing has a tilting angle of  $\pm 3^\circ$  by virtue of which the centralizing idler can adjust to the running of the belt.

The spherical roller bearing is in the middle of the bearing axle and directly below the center of gravity of the conveyor belt.



## Ideal Running:

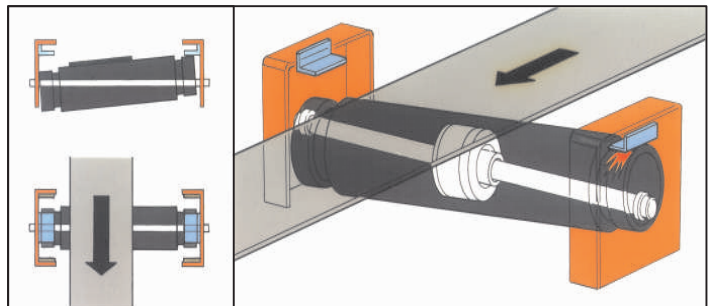
Centrally or symmetrically running conveyor belt in ideal position. Lateral running tolerance of  $\pm 6$  mm.



## Tilting:

If the belt runs off to one side up to approximately 10 mm, the center of gravity shifts, causing the LINEX<sup>®</sup> to react immediately.

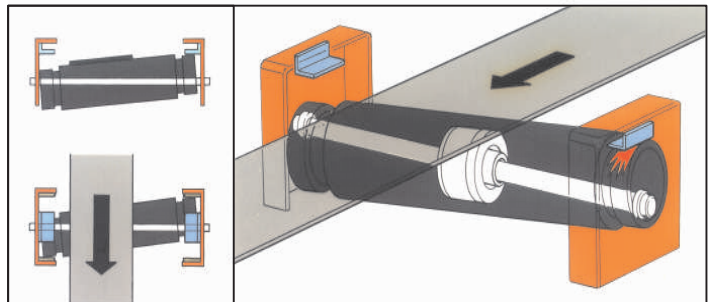
The centering roller tilts downwards on this side and at the same time the opposite side lifts up and the friction lining touches the upper brake angle.



## Twisting and Correcting:

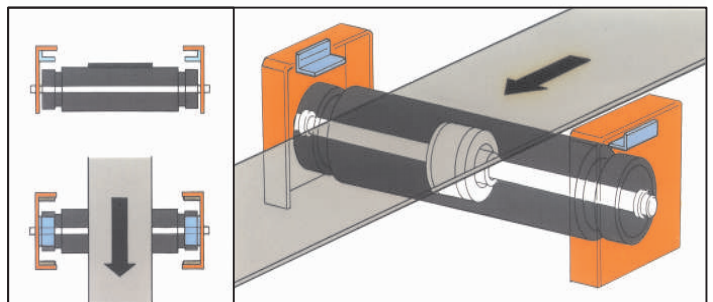
Due to the one-sided braking effect and as the centralizing idler rolls back over the braking angle, the idler positions itself at an inclined angle to the running direction of the conveyor belt.

The friction force of the rubber idler which is increased by the chevron-shaped rubber ribs acts towards the center of the structure and guides the belt back.



## Ideal Running:

After this correction the conveyor belt is running symmetrically again and the roller positions itself straight away horizontally and transversely to the running direction of the conveyor belt.



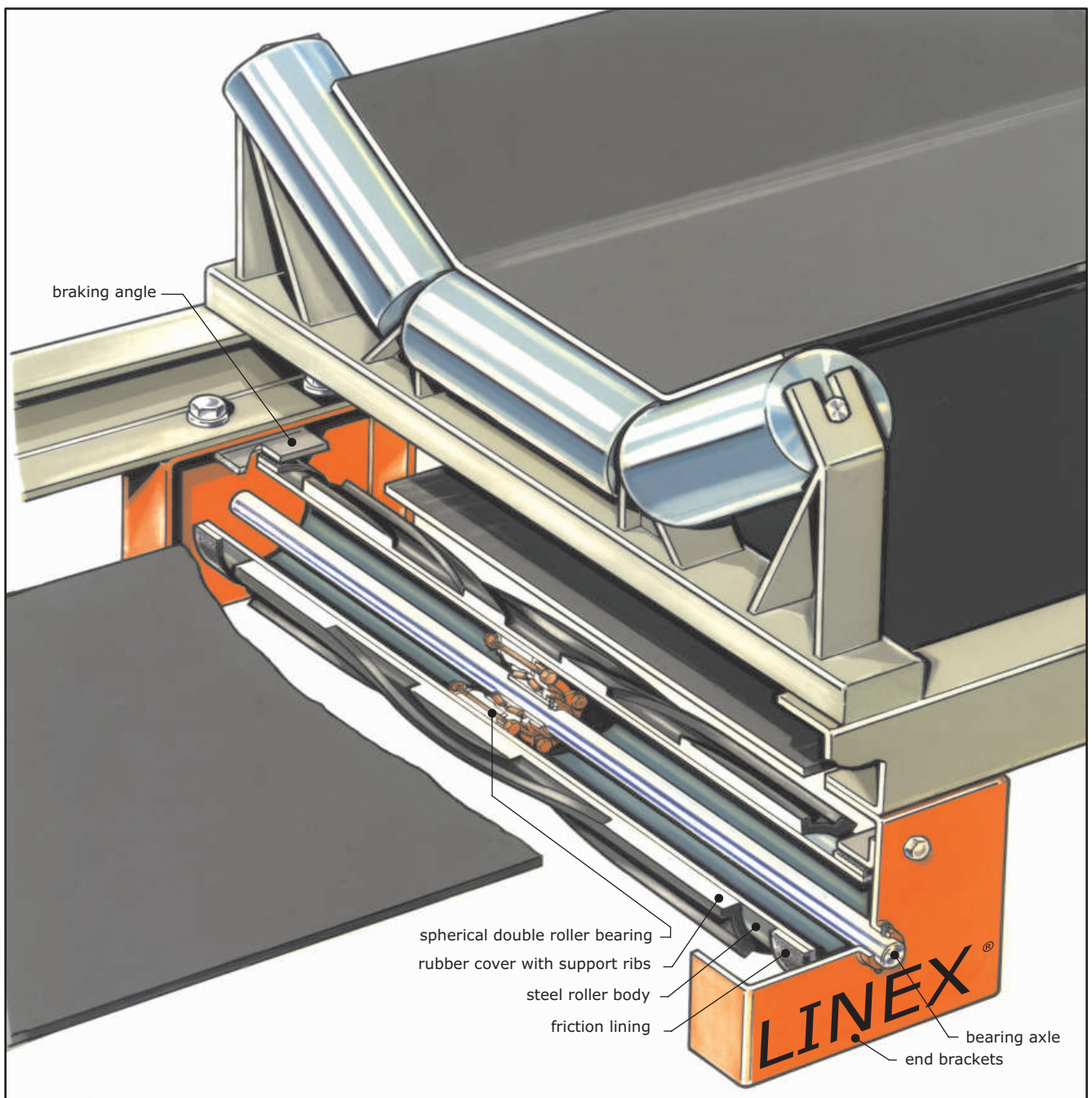
The corrective effect of the LINEX<sup>®</sup> is achieved by the weight of the conveyor belt and not by its tension.

# LINEX® conveyor belt centralizing idler

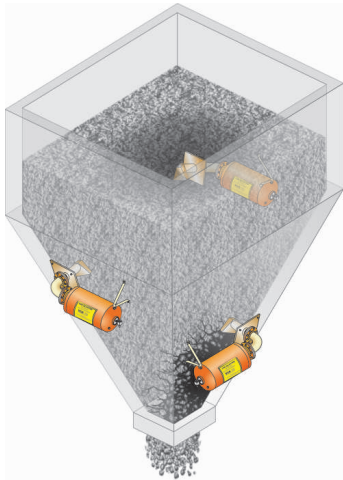
LINEX® conveyor belt centralizing idlers have been designed according to the physical laws of gravity and friction - and on the basis of many years experience with conveyor belts in practical use.

The LINEX® conveyor belt centralizing idler ensures true and in-line running of the conveyor belt. It is usually installed just before the tail pulley, virtually beneath the material transfer chute, in place of a support idler.

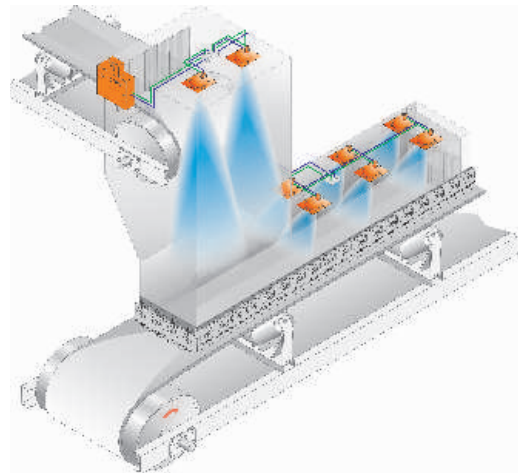
If there is the slightest deviation in the running of the belt, the LINEX conveyor belt centralizing idler, which is centrally mounted, is tilting and twisting and leads the belt back to the center by the frictional action of its chevron-shaped rubber ribs. This ensures that the belt is centrally loaded, and any lateral spillage or damage to the belt edges or to the lateral rubber sealings are reliably prevented.



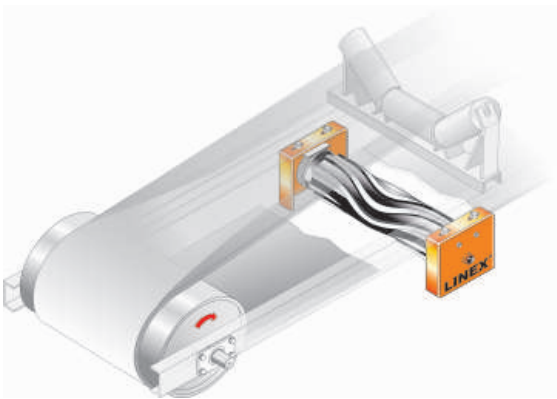
# Product programme



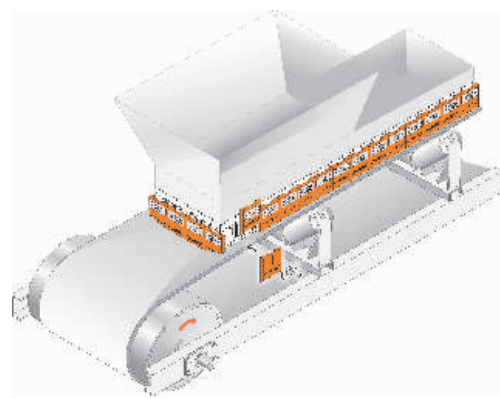
VSR BLASTER® Air cannons and air injectors



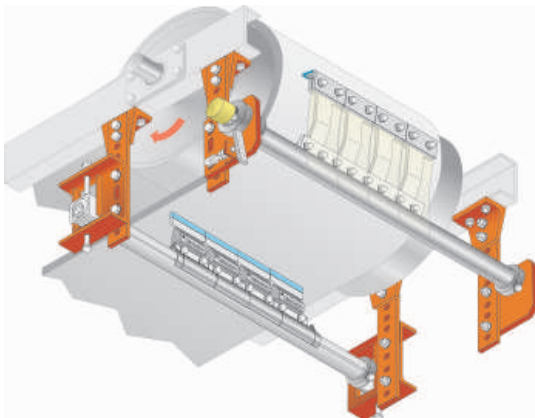
DUSTEX® Dust suppression system



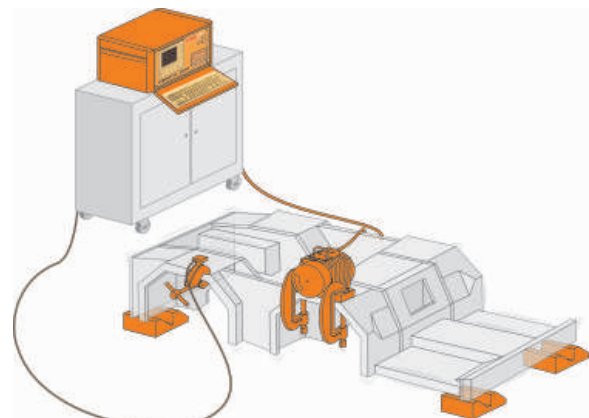
LINEX® Conveyor belt centralizing idlers



CAREX® sealing of conveyor belt transfers



VIBREX® Conveyor belt cleaning



VIBMATIC 6000® Vibration stress reduction

# VSR



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