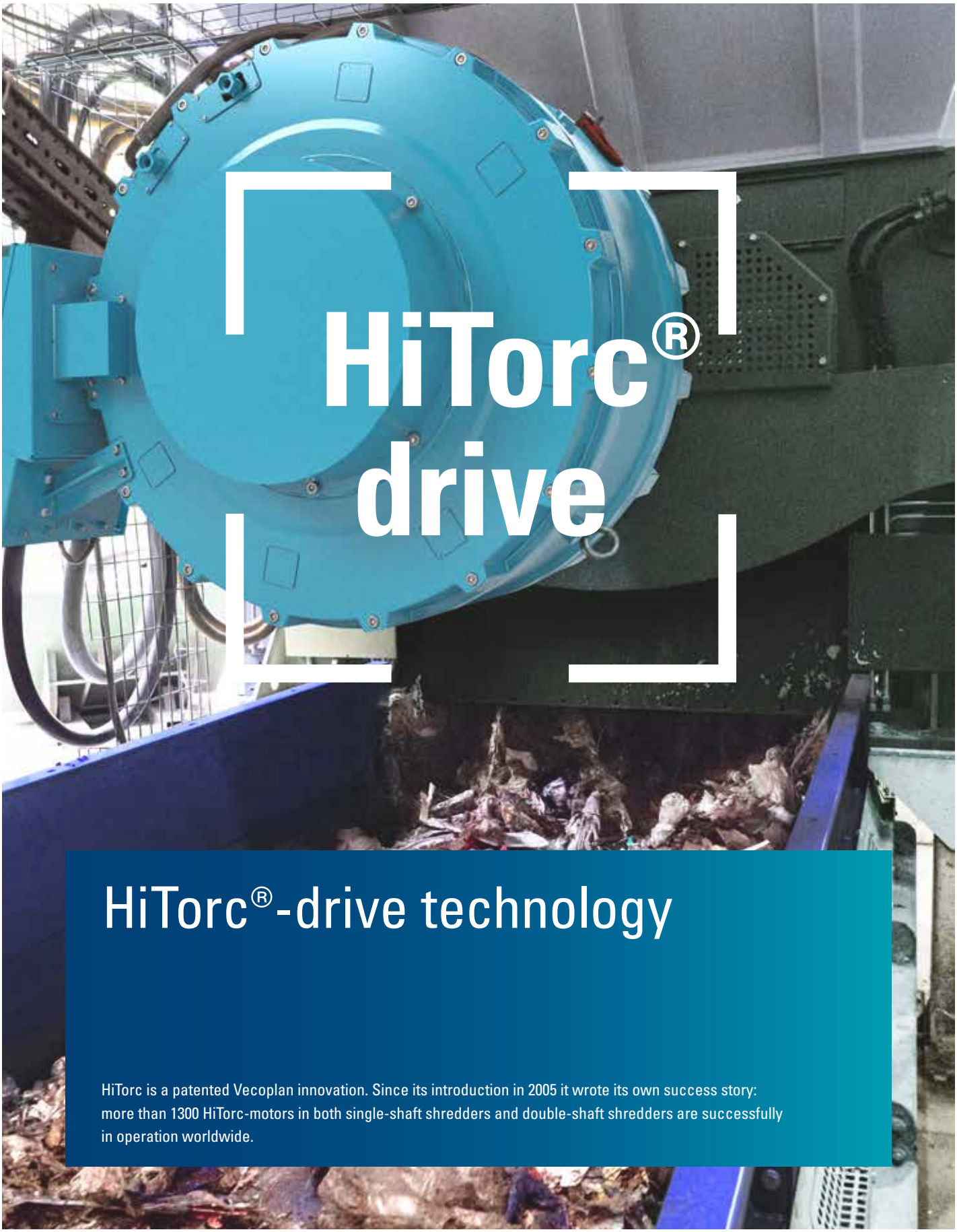
Vecoplan®



HiTorc® drive

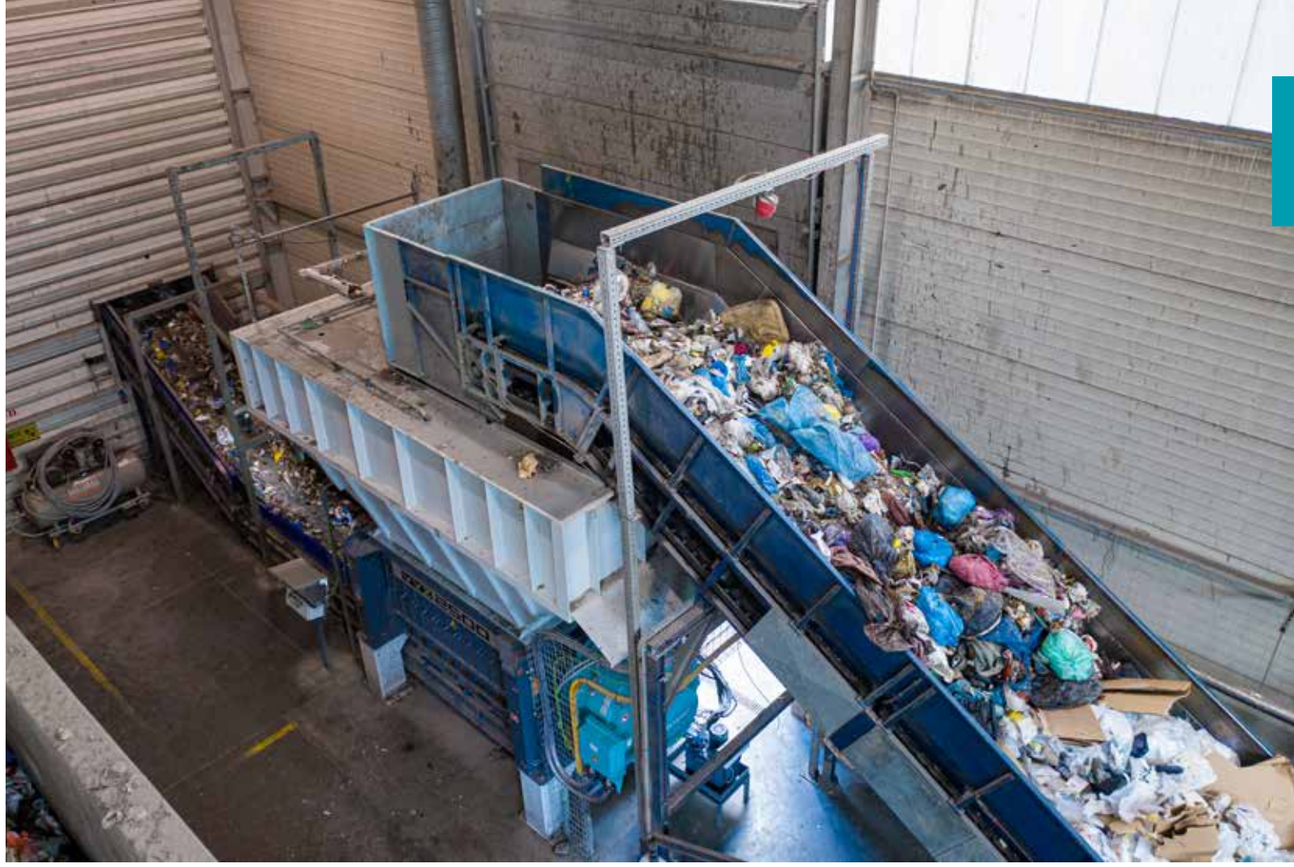
HiTorc®-drive technology

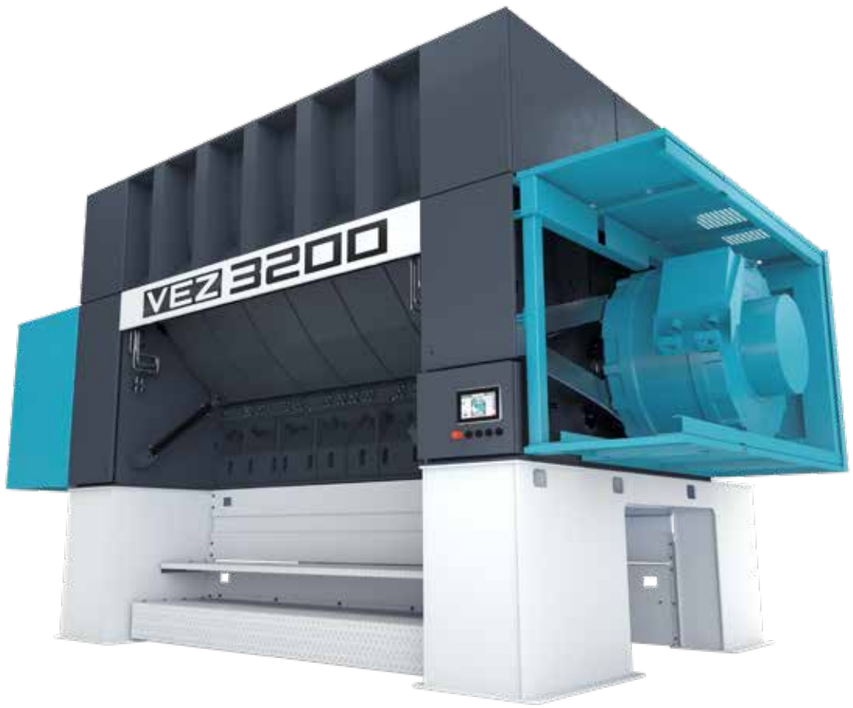
HiTorc is a patented Vecoplan innovation. Since its introduction in 2005 it wrote its own success story: more than 1300 HiTorc-motors in both single-shaft shredders and double-shaft shredders are successfully in operation worldwide.

Vecoplan engineers develop the progress

Winning arguments for the HiTorc drive to our customers' benefit

- Adjustment of motors depending on specification. Powerful with up to 80,000 Nm peak torque and high-speed with up to 420 rpm.
- The power range extends from 62 kW to 247 kW.
- Two drives can act on one shredding rotor at the same time, thus doubling the torque and power.
- Start-up with filled machine.





HiTorc® drive – the revolution of shredding technology

- Increased machine throughput capacity by big speed range
- Very dynamic – thus improving the starting and reversing characteristics
- Speed limit adjustable to throughput capacity or cutting force (torque and centrifugal moment)
- Drive is absolutely insensitive to tramp material
- As a gearless drive, almost maintenance-free and noiseless - HiTorc drive technology
- No wear parts (belt drive, coupling, etc).
- Best availability
- No spare parts storage required (Vecoplan stores motors and converters for you!)
- Almost no drive noise
- Space saving
- Best efficiency as all mechanical drive elements are omitted

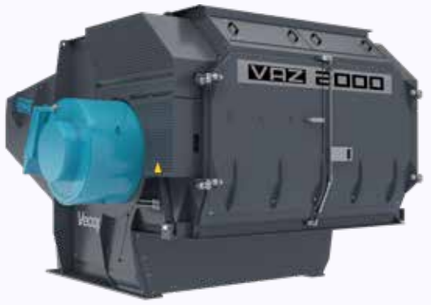
Application

Pre shredding

The double-shaft shredder VVZ 2500 is a pre shredder for difficult and tramp material, as e.g. pallets, crates, cable drums, scrap wood, furniture, chipboard, domestic and industrial waste.

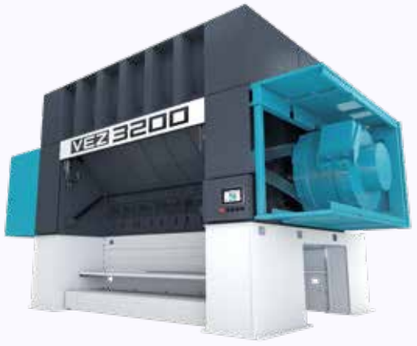
Single-shaft shredders

The VAZ Vecoplan shredder saves about 30 % of energy compared to electro-mechanical direct connected drives and about 10 to 15 % compared to electro-mechanical drives with frequency converter and asynchronous motors.



Pre and re shredder

The newly developed high capacity shredder VEZ 2500/3200, which can be used for two-stage as well as for single-stage shredding in waste treatment, actually averages energy savings of about 30 % compared to electromechanical direct connected drives. The energy savings compared to electro-mechanical drives with frequency converter and asynchronous motor add up to 10–15 %.



Advantages

Improved efficiency

Improved effeciency by about 10 – 15 % due to the omission of mechanical drive elements.

Synchronous motor

The synchronous motor is extremely energy efficient at the nominal-speed range and/or part-load operational range. At idle motion this motor only consumes 10 % of the energy compared to the needs of a similar direct connected asynchronous motor.

Dynamic drive

The full torque is available over almost the entire speed range.

Energy efficient

The re shredder VEZ is designed for an operating speed of about 420 rpm and is therefore very energy-efficient. Since almost no maintenance is required consequently the operating costs are reduced.
Example:
energy cost savings at pre-shredding of domestic waste:
60,000 to/á x 3 KWh/to energy cost savings x 0.1 €/KWh = 18,000.- €/á electricity cost savings

Availability

Almost no maintenance leads to increased operation time.
The drive is completely insensitive to tramp material. The use of the HiTorc-drive is already justified if just one unscheduled downtime occurs due to e.g. a broken rotor shaft or a faulty drive coupling, a defective belt drive and damaged gear-box, etc.

Vecoplan Smart Center –

Intuitive control concept for almost all Vecoplan machines

Another powerful concept by Vecoplan pushes maximum efficiency in shredding

- With the VSC control, the user receives support to increase productivity as well as to make the operation more energy efficient. The machine parameters are adjusted intuitively.
- The new user interface VSC control can be used on all conventional mobile devices.

Vecoplan®

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