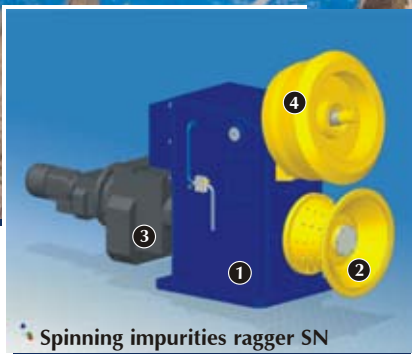


**spinning impurities ragger SN**  
**spinning impurities cutter DZS**

engineering - progressive engineering



**Spinning impurities ragger SN**

**Main parts**

- stand (1)
- drawing pulley (2)
- gearbox with electric motor (3)
- pressure pulley with pneumatic swinging (4)

**Design**

The ragger frame is anchored by four anchoring bolts. In the frame bottom part there is a driven shaft with its end provided with a spiked pulley. This pulley is driven by an electric motor with its gearbox.

The pressure pulley is pivoted in the frame top part and acts on a tangle by its own weight. Its swinging is controlled by a pneumatic roll attached to the frame. If necessary, it is possible to swing it manually by means of a lever put on an extended pin.

Quantity of spinning impurities being drawn out depends on the stock impurity rate. The ragger operating speed can be regulated in dependence on quantity of impurities so that the tangle diameter is kept within a range from 100 to 200 mm.

A necessity for tangle creation is sufficient quantity of spinning impurities in loaded materials. For example, cores and cardboards of bigger sizes bring negative impacts on creation and drawing of tangle as they entangle and tangle cannot go through an output branch.

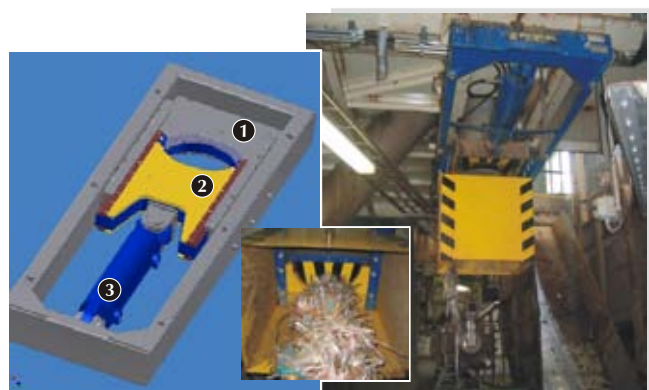
**Material**

Machine is made of structural steel St 52. Its exposed parts are made of special high-grade steels. External surfaces are protected against corrosion with high-quality polyurethane coating.

Machine design and work safety are in compliance with EU standards.

**Spinning impurities ragger SN** is designed for drawing of spinning impurities out of pulper chest particularly at waste paper pulping. Machine is recommended only for continuously working pulpers with chest diameter exceeding 3 800 mm. A necessity for tangle creation is a sufficient quantity of spinning impurities, such as strands, rags, wires, synthetic foils etc.

**Spinning impurities cutter DZS** is designed for mechanical cutting of spinning impurities tangle being drawn from pulper chest (horizontal or vertical type) while pulping waste paper. Dovetailed sliding blade guiding provide higher rigidity and easier adjustment of cutting play. Blades are provided with replaceable edges.



**Spinning impurities cutter DZS**

**Main parts**

- hydraulic shears with blades: stationary (1) and sliding (2)
- hydroaggregate with drive (3)
- control board
- anchoring bolts

**Design**

A tangle of impurities, being drawn out from the pulper chest, contains spinning impurities, such as thin wires, strands, synthetic foils etc. This tangle of impurities is put in the hydraulic shears, between the stationary and sliding blade. The tangle is cut into pieces of required length upon customer's possibilities. The cutting process itself is controlled by push buttons of a control board. We do not recommend cutting of tangle with diameter exceeding 200 mm.

**Material**

The cutter parts are made of structural steel St 52 and protected with high-quality zinc coating.

Machine design and work safety are in compliance with EU standards.

- easy attendance
- trouble-free operation
- minimum space requirements
- low energy consumption

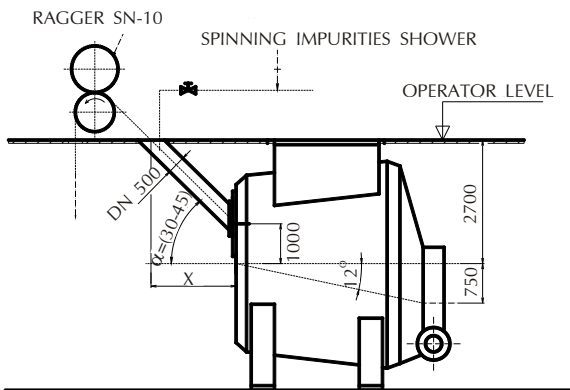
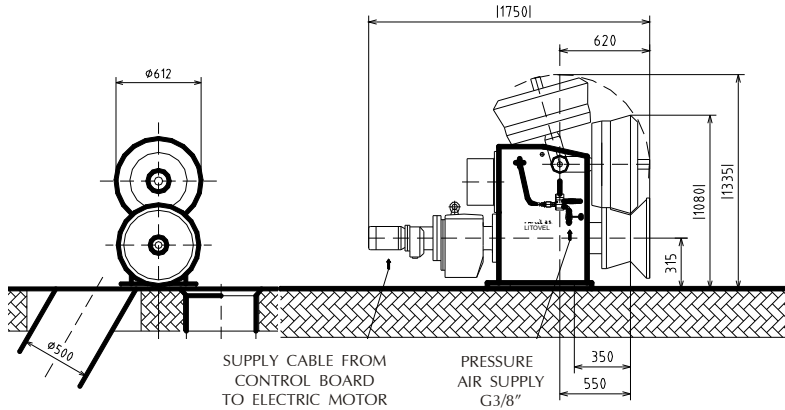
**Advantages of SN**

- rugged structure providing long service life
- simple design
- easy maintenance and servicing
- simple operation and high work safety
- high cutting force

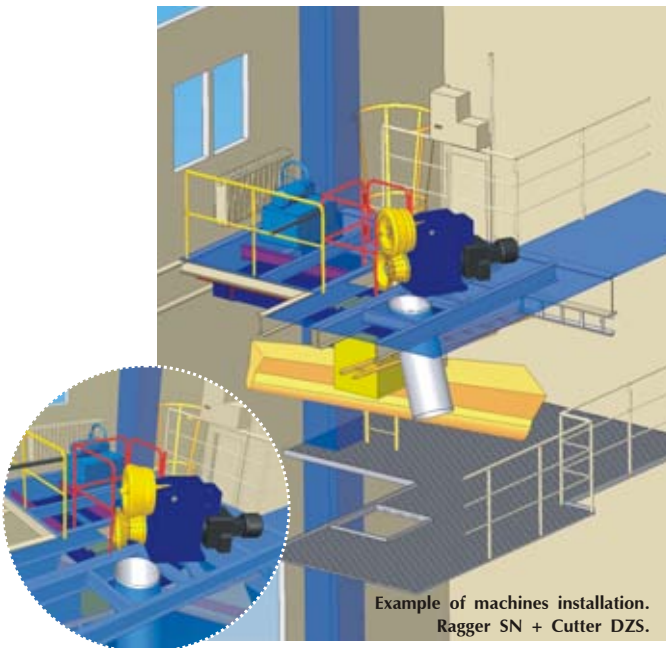
**Advantages of DZS**

**TECHNICAL PARAMETERS OF RAGGER SN**

Machine weight	1017 kg
Maximal drawing force	12 000 N
Max. tangle diameter (which can go through this system)	400 mm
Minimal diameter of tangle	60 mm
Maximal shifting speed	1,4 m/min
Electric motor output power	0,55 kW
Air pressure (pneumatic roll)	0,5 MPa



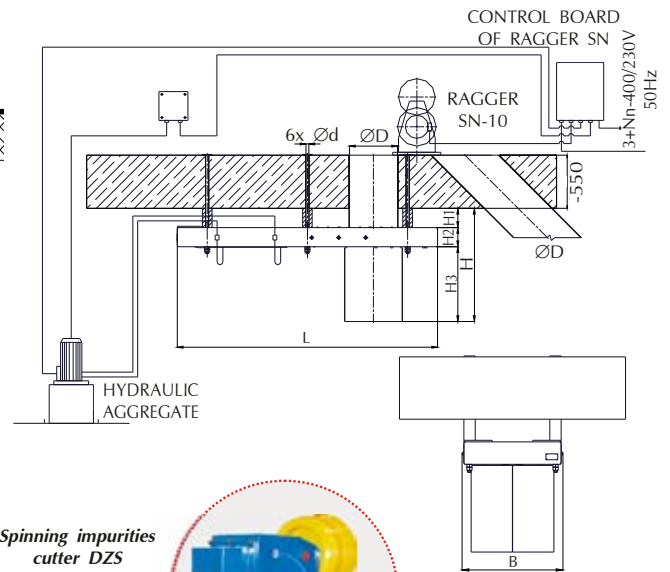
Connection of ragger SN to horizontal pulper HV



Example of machines installation. Ragger SN + Cutter DZS.

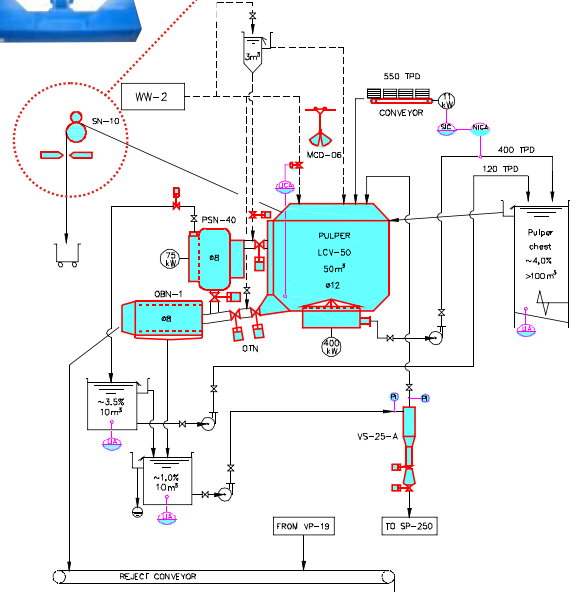
**TECHNICAL PARAMETERS OF CUTTER DZS**

Installed output power of electric motor	7,5 kW
Max. operating pressure of hydraulic aggregate	25 MPa
Maximal pressure in roll	20 MPa
Maximal cutting force	402 kN
Clearance between blades	Ø400 mm
Machine length (L)	2700 mm
Machine width (B)	892 mm
Machine height (H)	1175 mm
Block height (H1)	200 mm
Shears height (H2)	200 mm
Hood height (H3)	775 mm
Input diameter (ØD)	500 mm
Anchoring bores (Ød)	30 mm
Machine weight	1350 kg



Spinning impurities cutter DZS

Spinning impurities ragger SN-10



Example of machine installation. Pulping stage: stock preparation line for OCC/OMP processing, production of liners, capacity 500 tpd.