

weima

SHREDDING + COMPRESSING



● **WNZ | WSM SERIES
GRANULATORS**

TECHNICAL HIGHLIGHTS

Robust, low-maintenance rotor bearings designed for use in cutting mills

The spherical roller bearings used for the bearings of the cutting mill rotor are arranged in steel pillow block housings located on the outside and separated from the grinding chamber. This has the advantage that no dust or material can leave the grinding or cutting chamber in an uncontrolled manner and damage the bearings. Both bearings can also be easily relubricated and are provided with grease outlets.



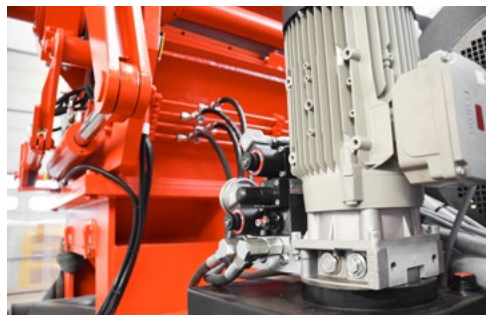
High cutting performance with low energy consumption

due to double helical cut technology

Users can choose between different rotor variants for individual material adjustment. In all rotors, both the rotating cutting knives and the stationary knives are angled toward each other. This results in a targeted cutting gap - across the entire working width. In addition, the shear cut not only ensures a constant regrind size, but also has a positive effect on the noise level.

Uniform power transmission thanks to electric motor with reinforced flywheel

To ensure optimum power transmission from the drive motor to the rotor of the granulator, even in continuous operation, a reinforced flywheel design is used. This makes it possible to cut and grind particularly hard feed material without any problems.



Perfect for
two-stage material
preparation
WNZ secondary shredder

High-speed shredders of the WNZ series operate according to the granulator principle and are therefore ideal for two-stage processing in combination with a primary shredder (e.g. WLK 1000). Almost any type of plastic or wood can be re-shredded. The multi-stage process proves to be particularly effective, quiet, and low in energy and wear.



Easy access
for cleaning and maintenance purposes

The upper part of the grinding chamber as well as the infeed hopper can be tilted backwards. This allows convenient access to the lower part of the grinding chamber, where the rotor, rotating knives, and front/rear stationary knives are located. The screen is also easily accessible, which reduces maintenance times to a minimum.

**EXTRA-STABLE
MACHINE DESIGN**

for highest demands

The granulator housing consists of an unbreakable welded steel construction. Castings are categorically not used. It must withstand exceptionally high loads even in continuous operation. If required, the housing can be additionally lined with replaceable wear plates at special impact zones.

TECHNICAL HIGHLIGHTS

Efficient noise level reduction thanks to sound insulation options

Unfortunately, granulators are inherently noisier than slow-running single-shaft shredders due to their high rotor speeds. For this reason WEIMA offers solutions to reduce noise emissions. These include a special noise reduction hopper, which also reduces vibrations, as well as a double bevel cut technology on the rotor. Even more effective is a complete sound enclosure. Such an enclosure reduces the emission of loud noises many times over. This has a positive effect on your employees and the working environment.



PERFECT CUTS EVERY TIME

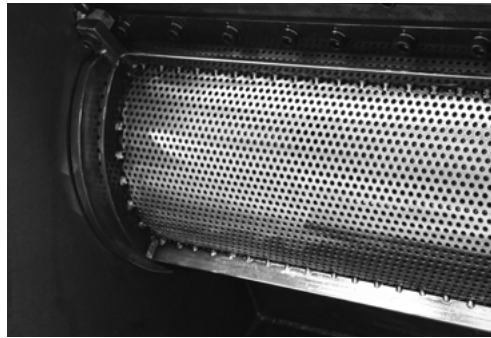
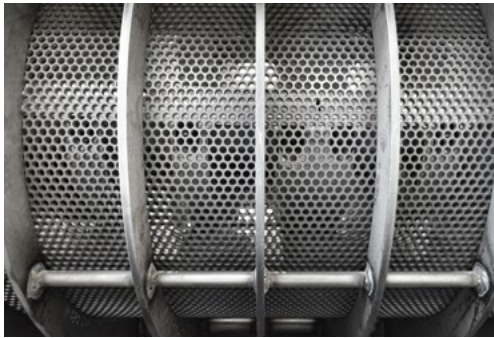
thanks to user-friendly
knife setting gauge

The cutting geometry is the heart of a secondary shredder. To ensure that it is always perfectly suited to the material being fed and that the cutting gap is correct, the cutting knives can be quickly and conveniently readjusted outside the machine with the aid of a setting gauge. Stationary knives can also be reversed on both sides. This means that once the first knife edge has worn out, a further edge is available simply by turning it over. Downtime, fines, and dust generation are thus reduced to a minimum. The result is a regrind of uniform size.

Universally suitable for many plastics applications

If you are looking for a flexible granulator solution, you will find it at WEIMA. With our machines you can granulate pre-shredded materials such as pipes, automotive parts, blow molding products such as PET bottles, PP/PE bottles, canisters, buckets, films, and other flexible materials. With a simple changeover, even start-up lumps or other thick-walled materials can be shredded. In all cases, you get a high-quality, homogeneous regrind that meets the high requirements of a modern recycling plant.





Fast screen replacement for maintenance or material changes

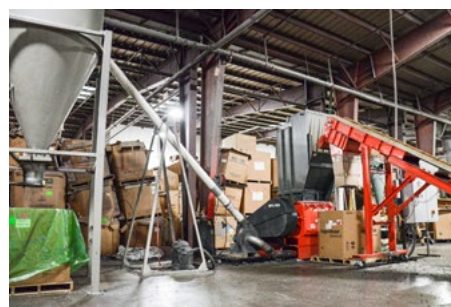
The screen size defines the material size after granulation. The smaller the hole diameter, the finer the material to be ground. If a screen must be removed for maintenance or changing material flows, this can be done easily by means of a threshold exchange mechanism.



Convenient filling and maintenance

via large, tiltable feed hopper

As a rule, WNZ and WSM machines function as secondary shredders of a two-stage shredding plant or recycling line. The particularly wide and high opening of the feed hopper facilitates filling of the machine. A lamella curtain serves as splash protection. The material can be fed manually or automatically by conveyor belt. For maintenance purposes, the entire hopper can be folded away via a tilting mechanism with safety limit switch, giving free access to the rotor.



Efficient material discharge via suction system or screw auger

As a standard feature, the side of the machine is equipped with a round suction port through which the granulated material can be extracted. If desired, a discharge solution by screw conveyor can also be implemented.



TECHNICAL DATA AND MACHINE CONFIGURATION

● Technical data granulators

	WNZ 200/600	WNZ 200/800	WNZ 310/600	WNZ 310/800
Feed opening length [mm]	650	650	650	650
Feed opening height [mm]	600	800	600	800
Rotor length [mm]	600	800	600	800
Rotor diameter [mm]	200	200	310	310
Rotor knives [quantity]	8	8	10	10
Stator knives [quantity]	2	2	2	2
Power [kW]	15 18,5 22	18,5 22 30	18,5 22 30	30 37 45
Screen perforation [mm]	5 - 25	5 - 25	5 - 25	5 - 25
Length [mm]	1,380	1,380	1,680	1,680
Width [mm]	1,070	1,270	1,120	1,320
Height [mm]	1,820	1,820	2,030	2,030
Weight [approx. kg]	610	780	980	1,200

Machine configuration granulators

● Standard ○ Optional – Not available

	WNZ 200/600	WNZ 200/800	WNZ 310/600	WNZ 310/800
Electromechanical drive	●	●	●	●
CUTTING GEOMETRY				
Rotor with 4 knife rows	●	●	–	–
Rotor with 5 knife rows	–	–	●	●
Solid steel rotor	●	●	●	●
V-cut technology	●	●	●	●
Knife setting gauge	○	○	○	○
Offset bearing	●	●	●	●
FRAME				
Robust machine frame	●	●	●	●
Vibration damping machine feet	●	●	●	●
MATERIAL DISCHARGE				
Screen manually tiltable	●	●	●	●
Discharge screw with gearbox motor	○	○	○	○
Air extraction port	●	●	●	●
MATERIAL FEED				
Large feed hopper	●	●	●	●
Funnel with lamella curtain	●	●	●	●
Hinged hopper	●	●	–	●
ELECTRONICS				
Control cabinet with Siemens PLC control	●	●	●	●
Light barrier with cable and control	○	○	○	○
Potential free contact	○	○	○	○

Other variants, special equipment and technical modifications available on request.



WEIMA Maschinenbau GmbH | weima.com

Bustadt 6-10 | 74360 Ilsfeld (Germany) | Phone: +49 (0)70 62 95 70-0 | Fax: +49 (0)70 62 95 70-92 | info@weima.com

Subject to technical changes | 01082021