



ROTOR BEATER MILL SR 300

The Rotor Beater Mill SR 300 is suitable for **coarse and fine size reduction**. It can process **dry, soft, medium-hard, organic and inorganic substances**. For increased sample discharge and for processing heat-sensitive samples, an optionally available cyclone unit can be used instead of the gravity outlet.

PRODUCT ADVANTAGES

- | wide range of accessories including various feeding systems, rotors and sieves
- | defined final fineness due to bottom sieves with aperture sizes from 0.08 - 10 mm
- | optional grinding inserts 180° for grinding of hard-brittle materials by additional impact
- | gravity outlet with 5l or 30 L collecting vessel for batchwise collection of larger sample quantities
- | optionally available cyclone unit with 0.25 - 0.5 - 1 - 2 - 5 or 30 liters collecting vessel
- | optional distance rotor to reduce frictional heat
- | adjustable speed for different applications
- | removable hopper for easy cleaning
- | easy cleaning thanks to exchangeable push-fit grinding insert, rotor and cassette
- | central locking device
- | grinding chamber, feed hopper and material inlet and outlet made of stainless steel
- | electric engine brake

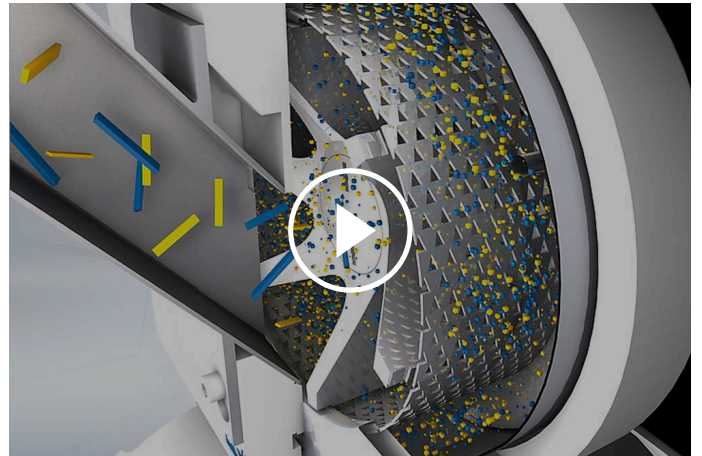
APPLICATION EXAMPLES

bentonite, chemical products, coal, coke, drugs, feed pellets, fertilizers, food, graphite, gypsum, herbs, pharmaceutical materials, plant materials, plastics, powder coating, resins, rice, salts, seeds, soils, spices, sugar, ...

To find the best solution for your sample preparation task, visit our application database.

FUNCTIONAL PRINCIPLE

Size reduction and deagglomeration in the SR 300 are achieved by **impact and shear effects**. The feed material passes from the hopper into the center of the grinding chamber where it is crushed between the rotor, sieve and grinding inserts. As soon as the material is smaller than the aperture size of the sieve it enters the collecting receptacle through the gravity outlet. The airborne fine fraction is separated off by a downstream filter system. The optionally available cyclone separator ensures a cooling of the sample material and the cutting tools and improves the discharge of the sample from the grinding chamber. The quick-acting door lock ensures easy access to the grinding chamber for quick cleaning. With their safety switch, splashback and access barrier in the inlet and outlet areas, Rotor Beater Mills offer the highest degree of operating safety.



[Click to view video](#)

ROTOR BEATER MILL SR 300

TECHNICAL DATA

Applications	size reduction, deagglomeration
Field of application	agriculture, chemistry / plastics, construction materials, environment / recycling, food, geology / metallurgy, medicine / pharmaceuticals
Feed material	soft, medium-hard
Material feed size*	< 25 mm
Final fineness*	< 50 µm
Speed at 50 Hz (60 Hz)	3,000 - 10,000 min ⁻¹ (in steps of 500 min ⁻¹)
Rotor peripheral speed	22 ..72 m/s
Types of rotors	standard / distance
Material of grinding tools	rotor and sieves of stainless steel
Sieve sizes	trapezoid holes 0.08 / 0.12 / 0.20 / 0.25 / 0.35 / 0.50 / 0.75 / 1.00 / 1.25 / 1.50 / 2.00 mm round holes 3.00 / 4.00 / 10.00 mm
Hinged hopper	removeable hopper
Dust extraction unit	optional cyclone
Collector capacity	5 l / optional: 30 l
Drive	3-phase motor
Electrical supply data	200-240 V, 50/60 Hz
Power connection	1-phase
Engine brake	yes, electric
Protection code	IP 41
Power consumption	2.5 kW
W x H x D closed	600 x 1200 x 700 mm (with base frame)
Net weight	~ 60 kg (with base frame)
Standards	CE

*depending on feed material and instrument configuration/settings

www.retsch.com/sr300

ORDER DATA

ROTOR BEATER MILL SR 300

Rotor Beater Mill SR 300 with rotor, 240 mm filter hose and collecting receptacle (please order retaining frame, sieves and optional base frame separately)

20.752.0001  SR 300 200–240 V, 50/60 Hz, incl. standard rotor

20.752.0002  SR 300 200–240 V, 50/60 Hz, incl. distance rotor

22.824.0007 Base frame with wheels

RETAINING FRAMES AND RING SIEVES FOR SR 300

RETAINING FRAME 360° OF STAINLESS STEEL

22.642.0004  Retaining frame 360°

RING SIEVES 360° OF STAINLESS STEEL

02.407.0057  Trapezoid holes 0.08 mm

02.407.0026  Trapezoid holes 0.12 mm

02.407.0028  Trapezoid holes 0.20 mm

02.407.0029  Trapezoid holes 0.25 mm

02.407.0120  Trapezoid holes 0.35 mm

02.407.0030  Trapezoid holes 0.50 mm

02.407.0031  Trapezoid holes 0.75 mm

02.407.0032		Trapezoid holes	1.00 mm	
02.407.0058		Trapezoid holes	1.25 mm	
02.407.0033		Trapezoid holes	1.50 mm	
02.407.0034		Trapezoid holes	2.00 mm	
02.407.0035		Round holes	3.00 mm	
02.407.0036		Round holes	4.00 mm	
02.407.0037		Round holes	5.00 mm	
02.407.0043		Round holes	6.00 mm	
02.407.0039		Round holes	8.00 mm	for pre-grinding
02.407.0040		Round holes	10.00 mm	

RETAINING FRAME 180° OF STAINLESS STEEL

02.143.0066		Retaining frame with grinding insert for sieves 180°		
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SIEVES 180° OF STAINLESS STEEL

03.647.0081		Trapezoid holes	0.08 mm	
03.647.0039		Trapezoid holes	0.12 mm	
03.647.0040		Trapezoid holes	0.20 mm	

03.647.0041		Trapezoid holes	0.25 mm	
03.647.0395		Trapezoid holes	0.35 mm	
03.647.0042		Trapezoid holes	0.50 mm	
03.647.0043		Trapezoid holes	0.75 mm	
03.647.0044		Trapezoid holes	1.00 mm	
03.647.0045		Trapezoid holes	1.25 mm	
03.647.0046		Trapezoid holes	1.50 mm	
03.647.0047		Trapezoid holes	2.00 mm	
03.647.0048		Round holes	3.00 mm	
03.647.0049		Round holes	4.00 mm	
03.647.0050		Round holes	5.00 mm	
03.647.0051		Round holes	6.00 mm	
03.647.0052		Round holes	8.00 mm	
03.647.0053		Round holes	10.00 mm	for pre-grinding

ACCESSORIES SR 300

CYCLONE-SUCTION-COMBINATION FOR SR 300

22.935.0020	Cyclone unit incl. 5 litres collection receptacle (to be used with industrial vacuum cleaner)
22.935.0021	Cyclone unit incl. 26 litres collection receptacle (to be used with industrial vacuum cleaner)
22.748.0005	Industrial vacuum cleaner for mills, 230 V, 50/60 Hz (other electrical versions and spare filter bags available upon request)

ADDITIONAL ITEMS SR 300

22.717.0007		Distance rotor of stainless steel
22.717.0006		Standard rotor of stainless steel
03.010.0052		Sieve cassette, stainless steel
22.187.0008	 	Ring-type filter for collecting receptacle 5 litres
22.748.0001		Dust filter clamping rings for ring-type filter, incl. 5 dust filters
05.742.0008		Dust filters for ring-type filter, 1 piece (please order amount multiple of 25 pcs.)
02.011.0038		Collecting receptacle, 5 litres, stainless steel
02.187.0020		Filter hose for collecting receptacle 5 litres, length 240 mm, incl. "comfort" flange
02.186.0037		Spare filter hose for 02.187.0020
22.003.0015		Collecting receptacle, 26 litres, plastic, incl. filter hose and "comfort" flange
02.186.0042		Spare filter hose for 22.003.0015
99.200.0024		IQ/OQ Documentation for SR 300

VIBRATORY FEEDER DR 100 FOR SR 300

DR 100 drive unit (please order feeding kit separately)

70.938.0001		DR 100 drive unit	220–240 V, 50 Hz
70.938.0003		DR 100 drive unit	220–240 V, 60 Hz
70.938.0010		DR 100 drive unit	200 V, 50 Hz
70.938.0006		DR 100 drive unit	200 V, 60 Hz
72.020.0019		Feeding kit DR 100/3.5 litres for SR 300/SK 300, incl. push-fit feed chute 75 mm, holder for push-fit feed chute, hopper 3.5 litres and holder for hopper and fixture	
72.020.0020		Feeding kit DR 100/22 litres for SR 300/SK 300, incl. push-fit feed chute 75 mm, holder for push-fit feed chute, hopper 22 litres and holder for hopper and fixture	