

Big Crusher MGB

Reduction of large volume materials



The MAIER Big Crusher MGB is the ideal solution for the reduction of wooden bulky material and other brittle residues. The machine is used for the pre-crushing of waste wood, pallets, furniture, cable drums, wood residues, damaged boards, railway ties, root stumps or electronic waste.

Material can be directly fed over the large-dimensioned infeed hopper by bucket-wheel loader or grapple. The slanted hopper wall makes the material slide directly into the lower crushing chamber. To avoid material bridges the hopper can be executed with a slewable side wall.

In the lower crushing chamber the material is crushed by a slow rotating large-dimensioned crusher roller with wear-protected teeth. These teeth "comb" with aggressive crushing bars, ensuring thus a high reduction degree.

The crusher operates on the proven single-shaft-principle. The power transmission to the crusher roller is executed by a rigid electro-mechanical power train with hydro clutch.

The material is discharged through a frontal discharge grate.

+ Your benefits

- Quick feeding
- Optimum material infeed
- High capacities up to 50 t bd./h
- Final material size individually adjustable, usually in the range of 100–500 mm
- Insensitive against impurities and contaminations
- Electro-mechanical power train
- Low energy consumption
- Uncomplicated overfloor installation
- Tried and trusted worldwide
- Low maintenance and service-friendly
- High machine availability



Infeed hopper/Machine casing

- Large dimensioned hopper for fast feeding of the machine by bucket-wheel loader or grappler, extendable when required
- Fast and safe feeding even when dealing with bulky input material without pre-sorting
- Hydraulically slewable hopper wall to avoid material bridges by processing of bulky and large volume materials
- Easy exchangeable, segmented crushing edges in area of material infeed
- Crushing bars with aggressive crushing edges, easily exchangeable or weldable (cost-efficient alternative to screwed-on tools)



Crusher roller

- Single-shaft-principle with large dimensioned crusher roller
- External big-dimensioned bearings
- Low rotation speed, thus low wear and high insensitivity against contaminants such as metal
- Tooth shapes and position on the crusher roller is individually adapted to the input and output material size
- Wear-protected crushing teeth, can be re-armored when worn (cost-efficient alternative to screwed-on tools)
- Automatic reversing mode for self-cleaning and protection of the machine in case of overload due to exceedingly large metal parts, impurities or jamming





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Features

Drive

- Rigid electro-mechanical power train, consisting of an electric motor, hydro clutch, gearbox, followed by speed reduction gearwheel-pair
- Cost-efficient and wear-resistant electric main drive motor
- Hydraulic turbo coupling supports the start-up of the electric motor and ensures quick build-up of breaking torque
- Start-up under load possible
- Easy maintenance without hydraulic specialist
- Gearbox protection by shearing bolts, e.g. in case of a sudden blockage of the crusher shaft
- Central lubrication of speed reduction gearwheel-pair



Discharge grate

- Frontal positioned segmented discharge grate for material discharge, allows easy overfloor installation
- Discharge grate segments can be hinged upwards for easy exchange and access to the crusher roller
- Execution „VARIO“ - for manual or „VARIO-h“ for hydraulically supported hinging of the discharge grate segments
- Output material size can be influenced in a wide range by distance of the grate bars
- Coverage of material discharge for dust reduction



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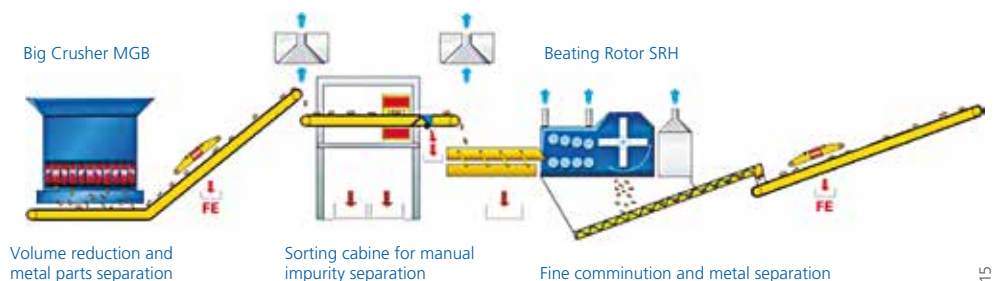
Technical Data

2-Stage recycling concept

The layout shows the combination of volume reduction by MGB and fine comminution by MAIER beating rotor SRH.

The opportunities correspond to recycling wood and others solid waste material.

Profitable use of recycling wood, industrial & electronic waste



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Type of machine ¹⁾	Rotor diameter ²⁾ [mm]	Rotor speed [rpm]	Main drive [kW]	Capacity ³⁾ [t b.d./h]	Hopper volume [m ³]	Hopper cross section (L x W) [m]	Transport dimensions (L x W x H) [m]	Machine dimensions (L x W x H) [m]	Weight approx. [t]
MGB 90 / 3000	815	16 / 20	90	10 - 15	15	3.0 x 2.8	5.0 x 2.6 x 2.8	4.8 x 3.3 x 3.3	21
MGB 132 / 3000	815	24	132	15 - 20	15	3.0 x 2.8	5.0 x 2.6 x 2.8	4.8 x 3.3 x 3.3	25
MGB 132 / 4000	1,025	24	132	20 - 25	20	4.0 x 2.8	6.0 x 2.6 x 2.8	5.8 x 3.3 x 3.3	32
MGB 160 / 4000	1,025	24	160	25 - 35	20	4.0 x 2.8	6.0 x 2.6 x 2.8	5.8 x 3.3 x 3.3	32
MGB 200 / 4000	1,025	21	200	35 - 40	20	4.0 x 2.8	6.0 x 2.6 x 2.8	5.8 x 3.3 x 3.3	32
MGB 200 / 5000	1,025	21	200	40 - 50	25	5.0 x 2.8	7.0 x 2.6 x 2.8	6.8 x 3.6 x 3.3	36

1) Individual machine sizes and motor power upon request. 2) Vary depending on number and type of teeth. 3) Depending on input and size of output material.

Please contact us for further information:



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