Technical leaflet **Date**
QTL066(02) 2023-04-03

Swarf Crusher type KB

Metal chip crusher

Design

The Primetek metal chip crusher type KB accepts, crushes and breaks up bushy swarf and at a low rotating speed the bushy swarf is cut down to small chips at a continuous rate.

The crusher can accept large quantities and then reduce the swarf to an even flow of chips. This makes the crusher ideal for installation in a chip processing system.

The crusher is used in industries where the amount of swarf is an issue and if long swarf should be centrifuged or briquetted. The crusher is intended for the following types of turnings:

- carbon steel
- stainless steel
- other alloyed steel with tensile strength up to 1200 N/mm^2 or higher
- aluminium alloys
- titanium

Advantages with the Primetek crushers

Very low operating costs
The main principle of the Primetek crushers is to allow the swarf to be ground against each other - without hammering or cutting.
This principle means very small demand for energy and very little wear, e.g. KB30 gives 5 tons/hr at 37 kW.

Versatile loading
The crushers accept most types of material irrespective of shape. They can be charged intermittently by a grab, hoist, fork lift or continuously by a conveyor.

High reliability
Unlike the hammer style crushers or shredders the Primetek crushers are not sensitive to large bundles of swarf or swarf balls. Even large swarf balls are handled with the small power of 7.5 kW.

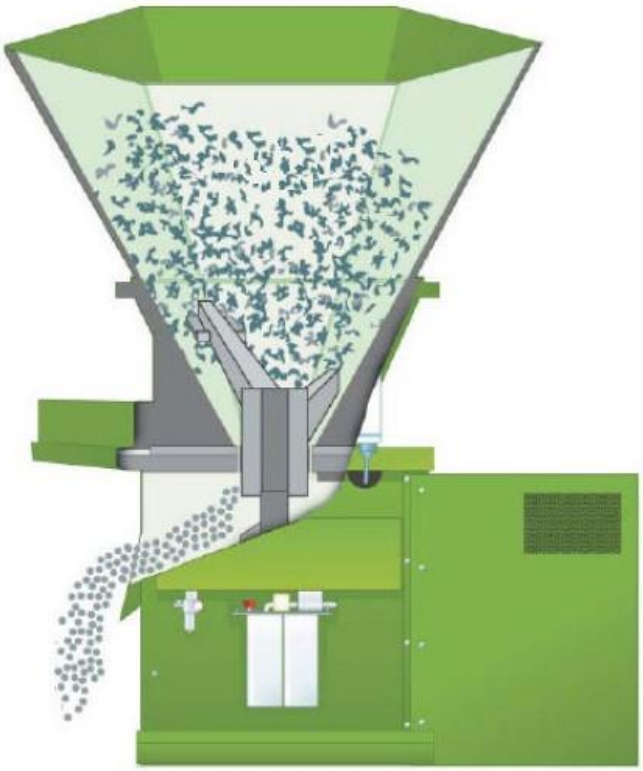
Low noise level
The crusher KB10 operates normally at 73 dB(A)*, KB20 <70 dB(A)*. This means that they are quiet and easy to install as they do not need to be enclosed or placed in special rooms.
* Measurement based on EN ISO 11201.

www.primetek.se
+46 (0) 21 33 80 500
info@primetek.se

Technical leaflet
QTL066(02)

Date
2023-04-03

Metal chip crusher



Function

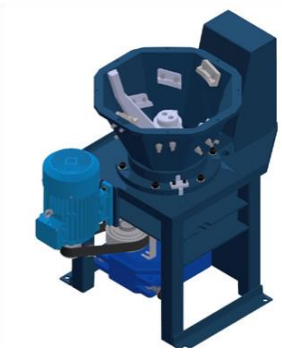
The swarf is fed into a conical hopper at the upper part of the crusher. In the centre of the hopper a shaft with a top-mountred feeder arm is rotating against angled cutters on the sides of the hopper. The arm and cutters jointly feed the swarf towards the bottom of the hopper, where a crusher head rotates inside a stationary crusher ring. The swarf is ground down and broken up into short chips by the crusher head and crusher ring. After completed crushing the chips are discharged through a chute in the frame.

To prevent solid parts as shaft ends, bolts etc. from getting jammed in the crusher, it is equipped with divisible tools. If the crusher head is blocked by a solid part, the crusher stops automatically and reverses. A segment in the crusher ring opens and the part can pass through the opening. The crusher then automatically resumes operation

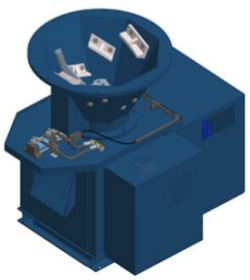
Technical data

Model	Motor power	Bar end rejector	Continuous capacity *		Height	Weight	Space requirements
			Steel and brass chips	Aluminium chips			
KB10	7.5 kW	pneumatic	400-700 kg/h	150-250 kg/h	1200 mm	800 kg	580x770 mm
KB20	15 kW	hydraulic	800-1000 kg/h	250-350 kg/h	1915 mm	1200 kg	740x1425 mm
KB30	37 kW	hydraulic	2000-5000 kg/h	700-1650 kg/h	3060 mm	4500 kg	1290x1520 mm

* Estimated. The capacity depends on specific weight, size and shape of the chips.



Crusher type KB10



Crusher type KB20

Crusher type KB30

www.primetek.se
+46 (0) 21 33 80 500
info@primetek.se