



YOUR  
RELIABLE  
PARTNER

for  
process  
optimization

HIGH-PRESSURE UNITS | FILTER SYSTEMS | CHIP REMOVAL UNIT

# COMPANY



For thirty years, we have been designing, manufacturing and optimising high-pressure, filtration and wet chip removal units. We are your partner for efficient, energy-saving solutions. In cooperation with our customers, we find solutions for even the most intricate challenges. We are dedicated to perfecting our existing models and developing innovative, future-proof solutions that meet customer needs. For SF-Systeme Büchele, customer satisfaction is the ultimate goal.

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# SFB-100 SMART

## Technical specifications

Max. performance	Filtration	Pressure range
65 bar / 9 l/min	40 $\mu\text{m}$	10 - 65 bar
65 bar / 20 l/min	40 $\mu\text{m}$	10 - 65 bar

### Options:

- Pressure-controlled discharge
- 2- to 4-way valve switching

### Dimension in mm (LxWxH)

650 x 445 x 720 mm  
Basic dimension without connections.

### Filter system:

- Change lfilter (40  $\mu\text{m}$ )

## SFB-100 SMART

Entry-level-machine

**Compact, flexible and easy to use.** Thanks to its compact design and user-friendliness the SFB-100smart is the perfect **entry-level unit** for use in conjunction with various machine tools. Its new design with fully enclosed housing creates a harmonious overall impression alongside any machining unit. The colour LEDs indicate the operating status.

**Entry-level model.**  
For installation under the  
loading magazin.



# High-pressure unit SFB-200 SMALL

## Technical specifications

Max. performance	Filtration	Tank capacity	Pressure range
65 bar / 9 l/min	40 $\mu\text{m}$	140 l	10 - 65 bar
65 bar / 20l /min	40 $\mu\text{m}$	140 l	10 - 65 bar
80 bar / 20 l/min	40 $\mu\text{m}$	140 l	10 - 80 bar
100 bar / 20 l/min	40 $\mu\text{m}$	140 l	10 - 100 bar
200 bar / 9 l/min	20 $\mu\text{m}$	140 l	100 - 200 bar
330 bar / 5 l/min	10 $\mu\text{m}$	140 l	200 - 300 bar

### Options:

- Pressure-controlled discharge
- 2- to 8-way valve switching
- 10  $\mu\text{m}$  filter for deep hole drilling

### Available filter systems:

- Changeover filter (40  $\mu\text{m}$ )
- Double changeover filter (40  $\mu\text{m}$ )
- Bag filter (10/25/50  $\mu\text{m}$ )

### Dimensions in mm (LxWxH):

1500 x 500 x 1000 mm

Basic dimensions without connections or add-on

**The perfect fit.**

**EXTRA low  
design**

## **SFB-200** SMALL

**Low-cost model**

The high-pressure unit SFB-200**SMALL** with a **powerful** and **low-maintenance** high-pressure pump producing up to 330 bar and can supply as many as 8 machining stations of the machine tool.



# High-pressure unit SFB-201

## Technical specifications

Max. performance	Filtration	Tank capacity
65 bar / 20l /min	40 $\mu\text{m}$	200 l
80 bar / 20l /min	40 $\mu\text{m}$	200 l
100 bar / 20 l/min	40 $\mu\text{m}$	200 l
200 bar / 9 l/min	20 $\mu\text{m}$	200 l
330 bar / 5 l/min	10 $\mu\text{m}$	200 l

All models come with a touch screen display. Unit with screw spindle pump (silent-version) available on request.

### Options:

- Pressure-controlled discharge
- 2- to 8-way valve switching
- 10  $\mu\text{m}$  filter for deep hole drilling

### wählbare Filtersysteme:

- Changeover filter (40  $\mu\text{m}$ )
- Bag filter\* (10/25/50  $\mu\text{m}$ )

\*Dimensions of system with bag filter deviate slightly from above.

### Cersion:

The **SFB-201** is available in various versions, based on the following criteria:

- Rod length (from 3200 mm)
- Spindle height (from 1040 mm)
- Also available for loading magazines with or without displacement unit

### Dimensions in mm (LxWxH):

1475 x 700 x 730 mm

Basic dimensions without connections or add-on components.

**The perfect fit.**  
For installation under the  
loading magazine.

## SFB-201

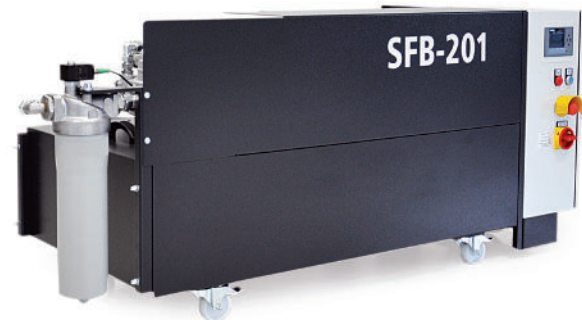
**Low-cost model -  
compact design for installation under the loading magazine!**

The SFB-201 high-pressure unit is equipped with a **powerful** and **low-maintenance** high-pressure pump producing up to 330 bar. It can supply as many as **8 machining stations** of the machine tool with high pressure.

### **Compatible loading magazines:**

minimag, micromag, turbo 2-20\* / 3-26 / 3 -36,  
turbo RS 2-20\*, turbo RS 3-38\*, turbo 4-52\*

\*Requires adjustment of loading magazine base;  
contact supplier prior to ordering.



# High-pressure unit SFB-300<sub>eco</sub> SMALL

## Technical specifications

Max. performance	Filtration	Tank capacity	Pressure programming
100 bar / 20 l/min	40 µm	140 l	4 pressure levels
150 bar / 20 l/min	40 µm	140 l	4 pressure levels

### Options:

- Pressure-controlled discharge
- 2- to 8-way valve switching
- 10 µm filter for deep hole drilling

### Available filter systems:

- Changeover filter (40 µm)
- Double changeover filter (40 µm)
- Bag filter\* (10/25/50 µm)

\*Dimensions of systems with bag filter deviate slightly from above.

### Dimensions in mm (LxWxH):

1290 x 500 x 800 mm  
Basic dimensions without connections or add-on components.

Heat exchanger at side:

**B:** 610 mm

Heat exchanger at front:

**L:** 1400 mm



**The perfect fit.**

**EXTRA compact  
design.**

## **SFB-300<sub>eco</sub> SMALL**

**Automatic pressure and volumetric flow control -  
energy efficient and compact!**

Thanks to its **low height** of only 800 mm, the **SFB-300<sub>eco</sub> SMALL** can be easily installed between the loading magazine and the machine. **Low energy consumption** combined with exceptional process advantages - that is what our high-pressure units offer our customers. Again, we paid great attention to energy optimisation. Thanks to the continuous control of the volumetric flow, the machine runs at all times within its **optimum efficiency range**. The unit caters for 4 high-pressure levels.



# high-pressure unit SFB-301<sub>eco</sub>

## Technical specifications

Max. performance	Filtration	Tank capacity	Dimensions in mm (LxWxH)
100 bar / 28 l/min	40 µm	200 l	1475 x 700 x 730 mm
150 bar / 24 l/min	40 µm	200 l	1475 x 700 x 730 mm

Unit with screw spindle pump (silent-version) available on request.

Basic dimensions without connections or add-on components.

### Options:

- Pressure-controlled discharge
- 2- to 8-way valve switching
- 10 µm filter for deep hole drilling

### Available filter systems:

- Changeover filter (40 µm)
  - Bag filter\* (10/25/50 µm)
- \*Dimensions of system with bag filter deviate slightly from above.

The **SFB-301<sub>eco</sub>** is available in various versions, based on the following criteria:

- Spindle height (from 1040 mm)
- Rod length (from 3200 mm)

### Compatible loading magazines:

minimag, micromag, turbo 2-20\* / 3-26 / 3 -36, turbo RS 2-20\*, turbo RS 3-38\*, turbo 4-52\*

\*Requires adjustment of loading magazine base; contact supplier prior to ordering.

**The perfect fit.**  
For installation under the  
loading magazine.

## SFB-301<sub>eco</sub>

Energy efficiency combined with compact design.

### SFB-301<sub>eco</sub> - the perfect fit!

High-pressure unit and FMB loading magazine form a highly efficient system.

This machine incorporates 25 years of expertise in the field.

Advanced design, exceptional functionality and **energy efficiency** are the key features of this model. The **SFB-300<sub>eco</sub> SMALL** combines tried and tested components with exceptionally high performance (100 bar 28 l, 150 bar 24 l). The unit caters for 8 high-pressure levels.



with bag filter



# High-pressure unit SFB-310<sub>eco</sub>

## Technical specifications

Max. performance	Filtration	Tank capacity	Pressure programming
100 bar / 28 l/min	40 $\mu$ m	200 l	8 pressure levels
150 bar / 24 l/min	40 $\mu$ m	200 l	8 pressure levels

### Optionen:

- 2- to 8-way valve switching
- 10  $\mu$ m filter for deep hole drilling

### Compatible loading magazines:

turbo 3-26 / 3-36, RS 3-38

### Filter system:

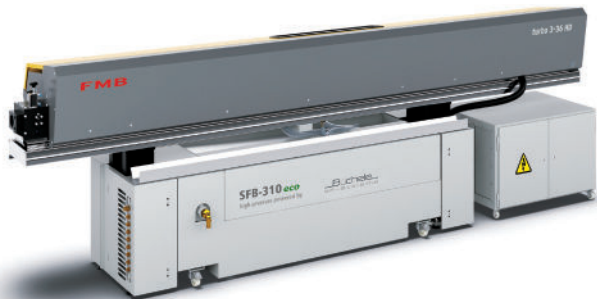
- Changeover filter (40  $\mu$ m)

## High-pressure unit SFB-310<sub>eco</sub>

High-pressure unit incorporated into FMB magazine

**SFB-310<sub>eco</sub>** – a unique, innovative solution! The high-pressure unit and the loading magazine form a compact system.

Advanced design, exceptional functionality and **energy efficiency** are the key features of this model. Wquipped with the proven features of the SFB-301<sub>eco</sub>, the capacities 100 bar 28 l and 150 bar 24 l can also be achieves here. The unit caters for 8 high-pressure levels.



**Unique solution.**  
High-pressure unit integrated  
into loading magazine.

# High-pressure unit SFB-M50

## Technical specifications

Pressure	Vol. high pressure	Tank capacity	Pressure programming
65 bar	20 l/min	200 l	4 pressure levels
80 bar	20 l/min	200 l	4 pressure levels
100 bar	20 l/min	200 l	4 pressure levels
200 bar	9 l/min	200 l	4 pressure levels
330 bar	5 l/min	200 l	4 pressure levels

Unit with screw spindle pump (silent-Version) available on request.

### Options:

- Pressure-controlled discharge
- 2- to 8-way valve switching
- 10  $\mu\text{m}$  filter for deep hole drilling
- S7 control (8 pressure levels, touch screen)

### Available filter systems:

- Changeover filter - WF, (40  $\mu\text{m}$ )
- Double changeover filter - DF, (40  $\mu\text{m}$ )
- Bag filter - BTF, (10/25/50  $\mu\text{m}$ )
- Belt filter - BF, (20-40  $\mu\text{m}$ )

### Dimensions in mm (LxWxH)

- WF: 1690 x 550 x 1140 mm
  - DF: 1690 x 550 x 1140 mm
  - BTF: 1490 x 550 x 1140 mm
  - BF: 1490 x 550 x 1140 mm
- Basic dimensions without connections and add-on components.

# High-pressure unit SFB-M50

Constant pump as standard

Exceptional process advantages - that is what our high-pressure units offer our customers. In the design of the **SFB-M50**, our focus was on **versatility as regards pressure levels**.

Our new model is equipped with a **powerful and low-maintenance high-pressure pump** producing up to 330 bar and can supply as many as 8 machining stations of the machine tool.

On request, the pumps can be customised.



# High-pressure unit SFB-M50<sub>eco</sub>

## Technical specifications

Pressure	Vol. high pressure	Tank capacity	Pressure programming
100 bar	28 l/min	220 l	4 pressure levels
100 bar	35 l/min	220 l	4 pressure levels - with BF
150 bar	24 l/min	220 l	4 pressure levels
80 bar	35 l/min	220 l	4 pressure levels - with BF

Unit with screw spindle pump (silent-Version) available on request.

### Options:

- Pressure-controlled discharge
- 2- to 8-way valve switching
- 10  $\mu\text{m}$  filter for deep hole drilling
- S7 control (8 pressure levels, touch screen)

### available filter systems:

- Changeover filter - WF, (40  $\mu\text{m}$ )
- Double changeover filter - DF, (40  $\mu\text{m}$ )
- Bag filter - BTF, (10/25/50  $\mu\text{m}$ )
- Belt filter - BF, (20-40  $\mu\text{m}$ )

### Dimensions in mm (LxWxH)

- WF: 1690 x 550 x 1140 mm
- DF: 1690 x 550 x 1140 mm
- BTF: 1490 x 550 x 1140 mm
- BF: 1490 x 550 x 1140 mm

Basic dimensions without connections and add-on components.

# High-pressure unit SFB-M50<sub>eco</sub>

Automatic pressure and volumetric flow control - energy efficient through frequency control

**Low energy consumption** combined with exceptional process advantages - that is what our high-pressure units offer our customers. In the design of the **SFB-M50<sub>eco</sub>**, our focus was on **energy efficiency**.

Thanks to the **continuous control of the pressure and the volumetric flow**, the machine runs at all times within its optimum efficiency range. The unit caters for 4 high-pressure levels. On request, the pumps can be customised.



# High-pressure unit SFB-M60<sub>eco</sub> with belt filter system

## Technical specifications

Pressure	Vol. high pressure	Tank capacity	pressure programming
80 bar	35 l/min	280 l	8 pressure levels
80 bar	42 l/min	280 l	8 pressure levels
70 bar	45 l/min	280 l	8 pressure levels
100 bar	28 l/min	280 l	8 pressure levels
100 bar	35 l/min	280 l	8 pressure levels
150 bar	24 l/min	280 l	8 pressure levels
200 bar	9 l/min	280 l	8 pressure levels

Unit with screw spindle pump (silent version) available on request.

### Options:

- Pressure-controlled discharge
- 2- to 8-way valve switching
- 10  $\mu\text{m}$  filter for deep hole drilling
- Cooling system

### Filter system:

- Belt filter (20-40  $\mu\text{m}$ )

### Dimensions in mm (LxWxH):

1660 x 612 x 1500 mm  
Basic dimensions without connections  
or add-on components.

## High-pressure unit SFB-M60<sub>eco</sub>

Low energy consumption thanks to frequency control

The **modular design** of the SFB-M60<sub>eco</sub> provides exceptional versatility for greater flexibility in production. The energy-efficient high-pressure units are **individually configured** to meet the requirements of the connected machine tools. The **SFB-M60<sub>eco</sub>** is able to supply up to 8 machining stations with high pressure. The operating status of the high-pressure unit is indicated by LEDs. Thanks to continuous bypass filtration, the machine tool coolant is constantly cleaned during machining. This prolongs the tool service life and extends the cleaning intervals for the machine tank.

**EFFECTIVE.**

Bypass filtration of up to  
3000 l/h keeps the tank  
of the machine clean.



# High-pressure unit SFB-M60TWIN<sup>eco</sup> with belt filter system

## Technical specifications

Pump 1		Pump 2		Tank capacity	Pressure programming
Pressure	Vol. Pressure	Pressure	Vol. Pressure		
max 150 bar	max 45 l/min	max 200 bar	max 28 l/min	370 l	8 pressure levels

Unit with screw spindle pump (silent version) available on request.

### Options:

- Pressure-controlled discharge
- 2- to 8-way valve switching
- 10  $\mu\text{m}$  filter for deep hole drilling
- Cooling system

### Filter system:

- Belt filter (20-40  $\mu\text{m}$ )

### Dimensions in mm (LxWxH):

2060 x 612 x 1500 mm

Basic dimensions without connections or add-on components

## High-pressure unit SFB-M60TWINeco

Low energy consumption thanks to frequency control

“Higher performance means greater efficiency” – boost the high-pressure supply to your machine tools by investing in the future-proof **SFB-M60TWINeco**-high-pressure unit.

Two independently and parallel run high-pressure pumps supply up to **16 machining stations**. Thanks to **continuous bypass filtration**, the machine tool coolant is constantly cleaned during machining. This prolongs the tool service life and extends the cleaning intervals for the machine tank. On request, the pumps can be customised.

**EFFECTIVE.**

Bypass filtration of up to  
3000 l/h keeps the tank  
of the machine clean.



# High-pressure unit SFB-M60<sub>eco</sub> “main flow carefree pack”

## Technical specifications

Filter / System	Low-pressure pume	HD pump	Tank capacity	pressure programming
110 l/min (oil)	1 to 20 bar	max. 45 l/min	370 l	8 pressure levels
160 l/min (emulsion)				

Unit with screw spindle pump (silent version) available on request.

### Options:

- Pressure-controlled discharge
- 2- to 8-way valve switching
- 10  $\mu\text{m}$  filter for deep hole drilling
- Equipped for connection to external cooling unit
- Plate heat exchanger cooling control through SFB-M60 control system
- Chip conveyor in belt filter catering for high chip volumes
- Fleece reel and filter cake scraper for efficient removal of chips from filter fleece and fleece disposal

### Filter system:

- Belt filter (20-40  $\mu\text{m}$ )

### Dimensions in mm (LxWxH):

2060 x 612 x 1500 mm

Basic dimensions without connections or add-on components.

# Main flow carefree pack.

Clean coolant.

## High-pressure unit SFB-M60<sub>eco</sub>

Low energy consumption thanks to frequency control

Future-proof: **“main flow carefree pack”** - guarantees clean coolant for the machining of any material. The tried and tested modular design of the **SFB-M60TWIN<sub>eco</sub> “main flow carefree pack”** caters for both low pressure and high pressure, making the unit extra efficient.

The frequency-controlled high-pressure pump and the coolant pump supply the machining tool parallel yet independently of each other.

Thanks to **continuous main flow filtration**, the machine tool coolant is continuously cleaned by a paper belt filter during machining. This prolongs the tool service life and extends the cleaning intervals for the machine tank, thus saving costs.

On request, the pumps can be customised.



# High-pressure/filter unit SFB-600<sub>eco</sub>

## Technical specifications

Pressure	Vol. high-pressure	Filtration	Tank capacity	Filter performance
max. 330 bar	max.100 l/min	20 - 40 $\mu\text{m}$	560 - 1500 l	max. 300 l/min

Unit with screw spindle pump (silent version) available on request.

### Options:

- Pressure-controlled discharge
- Pressure monitoring system
- 2- to 8-way valve switching
- 10  $\mu\text{m}$  filter for deep hole drilling
- Cooling system
- Heater

### Filter system:

- Belt filter (20-40  $\mu\text{m}$ )  
The unit can be adjusted to meet customer requirements.

# High-pressure/filter unit SFB-600<sub>eco</sub>

## The universal solution

Innovative technology paired and **extra large filter capacity** are the outstanding features with which the **SFB-600<sub>eco</sub>** filters large volume flows in a most efficient manner. Depending on the type of chip/material, the main flow filter system can be equipped with a belt filter so that the machining unit is supplied with clean, filtered medium.

The optional built-in cooling system and heater ensure **optimised medium temperature** at all times.

Main flow filtration allows for **best possible surface** finish in turned or milled parts, guaranteed by the permanent supply of clean medium through the low-pressure and high-pressure pump. This prolongs the tool service life and extends the cleaning intervals for the machine tank, thus saving costs.



# Slat band conveyor with high pressure SFB-700<sup>eco</sup>

## Technical specifications

Pressure	Vol. high-pressure	Filtration	Tank capacity
max. 330 bar	max. 42 l/min	20 - 40 $\mu\text{m}$	200 - 800 l

Unit with screw spindle pump (silent version) available on request.

### Options:

- Pressure-monitoring system
- Double changeover filters
- 2- to 8-way valve switching
- 10  $\mu\text{m}$  filter for deep hole drilling
- Cooling system

### Filtersystem:

- Belt filter (20-40  $\mu\text{m}$ )



## Slat band conveyor with high-pressure SFB-700<sub>eco</sub>

Bypass- or main flow filtration keeps the machine tank clean.

The **SFB-700<sub>eco</sub>** slat band conveyor is a high-efficiency unit with extra small footprint.

The combination of a **chip conveyor and a high-pressure unit** caters for maximum process automation.

The machine is customised to suit your machining system.



# Belt filter unit SFB-F30-M

## Technical specifications

Filter performance	Filtration	Dimensions in mm (LxWxH)
max. 2400 l/h	10 - 40 $\mu\text{m}$	1030 x 500 x 1300 mm Basic dimensions without connections or add-on components

The SFB-F30 is currently available as model "M".

### Options:

- Filter cake scraper with fleece reel
- Swivelling chip conveyor



Version with fleece reel.

## Belt filter unit SFB-F30-M

Clean medium for your machine tool

The **SFB-F30-M** is a **reliable, portable filtration unit** for cooling lubricants and features a fully automated paper belt filter.

The filter unit has been designed to keep the coolant in the machine tool tank clean during production. Thanks to its compact design, the filter unit is suitable for both small and large coolant tanks. The **SFB-F30-M** offers a filter performance of up to 2400 l/h (40 l/min), depending on the filter fleece, medium, chip volume and material to be machined. If you encounter problems in production due to contaminated medium, clogged lines or blocked tools, we recommend installing a **SFB-F30-M** unit to keep the medium in the machine tank clean both during production and machine standstill.

**Portable  
filtration**  
Clean Coolant.



# High-pressure pumps

## General information

Pump typ	Features Pump design	Efficiency	Medium/ viscosity	Max. temp.	Max. pressure
External gear pump	High efficiency, smooth, low-pulsation pumping, good cost-performance ratio	80 -90 %	Oil min. 10 mm <sup>2</sup> /sec at 40 °C	60°C	200 bar
Screw spindle- pump	Low-noise, dirt-resistant pump, ideal for oil and emulsion	60 -85 %	Oil/emulsion min. 2 – 30 mm <sup>2</sup> /sec at 40°C	60°C	150 bar
Internal gear pump	High efficiency, low pulsation, low noise level	80 -90 %	Oil min. 10 mm <sup>2</sup> /sec at 40 °C	60°C	330 bar

# High-pressure pumps

## General information

Where high-pressure pumps **without frequency control** are to be installed, overdimensioning should be avoided. Otherwise, there is a risk that heat is transferred to the chip cutting process, affecting the machining tolerances.

High-pressure pumps **with frequency control**, which include all our „*eco*“ models, prevent such heat transfer and minimise wear.

The operator has the option to continuously adjust the pressure and volumetric flow rate.

**This allows for effective machine control, significantly reducing energy consumption and heat transfer.**

# Filter systems

## General information

The filter system must be carefully chosen to suit the machining process and the material to be machined. The degree of contamination of the medium greatly affects the service life of the high-pressure pump.

Pump wear is primarily determined by the size of the dirt particles as well as the particle load.

To achieve a long pump service life, the tank must be topped up with fresh or filtered medium (max. particle load 50 - 150 mg/l).

In the case of large quantities of ultra-fine chips, hard materials to be machined or highly contaminated medium, the filter system must be customised to meet the process.

That is why we offer a range of filter sizes for our filter systems.

Please observe our recommendations for filter and operating conditions.

# Filter systems

## General information

### Changeover filters:

The standard filter element is the 40 $\mu$ m element. 20 $\mu$  and 10 $\mu$  filter elements are available on request. The 40 $\mu$ m filter element can be cleaned, which is not possible with the 20 $\mu$ m and 10 $\mu$ m elements. With 20 $\mu$ m filters, the maximum flow rate is 9 l/min. With 10 $\mu$ m filters, the maximum flow rate is 5 l/min.

### Bag filters:

The standard filter bag is the 50 $\mu$ m filter bag. 25 $\mu$ m and 10 $\mu$ m filter bags are available on request. The filter must be chosen to suit the actual machining process. In contrast to changeover filters, filter bags do not need to be cleaned and can be easily and quickly changed. The service life of a filter bag is much longer than that of a changeover filter element. Filter bags, irrespective of the mesh size, are not expensive.

### Belt filters:

The standard filter fleece is the HP 40 (40g/m<sup>2</sup>, corresponding to 20 - 40  $\mu$ m) fleece. A finer filter fleece (HP 70 (70g/m<sup>2</sup> corresponding to 20 - 30  $\mu$ m) is available on request. The capacity of the machine must be adjusted to the filter fleece. The filter performance might vary, depending on the viscosity of the medium, the dirt load, the particle properties and the fleece quality. The key advantages of the belt filter are a long service life, easy handling and low maintenance. The automatic paper advance mechanism is controlled by level sensors and ensures that the belt filter runs independently of the rest of the unit.

# Filter systems

## Application - changeover filter

### Applications:

- Suitable for: free machining steel
- Level of contamination: low
- Chip cutting method: large chips, few fine chips

### Advantages:

- Compact design
- Minimal pressure loss thanks to flow-optimised design of its components
- Visual/electronic maintenance indicators
- Easy to service
- With double changeover filter no downtimes for filter change
- Filter elements can be cleaned 5-10 times

### Requirements:

- Preliminary chip removal in wedge wire strainer/basket strainer > 2 mm or chip conveyor

Changeover filter



# Filter systems

## Application - bag filter

### Applications:

- Ideal for: free machining steel, stainless steel
- Suitable for: non-ferrous metals (copper, aluminium, zinc, bronze, brass), stainless steel
- Level of contamination: medium
- Chip cutting method: Mix of fine/large chips

### Advantages:

- Fine filtration with three-dimensional filter fleece (in contrast to two-dimensional fabric filtration)
- Material versions and combinations for wide range of applications
- The hydrostatic pressure in the filter housing and the quick formation of a filter cake result in a significantly higher filter retention rate with optimised utilisation of the filter bag
- Suitable for the removal of all types of particles from cooling lubricants, emulsions and oils
- Large range of available filter mesh sizes: 50, 25, 10  $\mu\text{m}$
- Compact filter design with high throughput rate and small footprint
- Virtually maintenance-free and easy to handle

### Requirements:

- Preliminary chip removal with wedge wire strainer/basket strainer > 2 mm or chip conveyor

Bag filter



# Filter systems

## Application - Bandfilter

### Applications:

- Ideal for: non-ferrous metals (copper, aluminium, zinc, bronze, brass), stainless steel, titanium, magnesium
- Level of contamination: high (large share of ultra-fine chips)
- Chip cutting method: turning, milling, drilling, thread whirling, finishing

### Advantages:

- Optimised ultra-fine filtration thanks HP filter medium; low consumption resulting in low total costs; multiple fibre layers with different structures for quick filter cake formation
- Material versions and combinations for wide range of applications
- No contamination of filter, as retained material is removed from the unit on the filter fleece
- The hydrostatic pressure in the filter tray and the quick formation of a filter cake result in a significantly higher filter retention rate with optimised utilisation of the filter fleece
- Suitable for the removal of all types of particles from cooling lubricants, emulsions and oils
- Large sludge and chip volumes are discharged from the unit by the rotating conveyor
- For large chip quantities, the unit can be equipped with a swivelling conveyor for forced discharge
- Compact filter design with high throughput rate, small footprint and low energy consumption
- Virtually maintenance-free and easy to handle
- Prolonged cooling lubricant life

# Filter systems

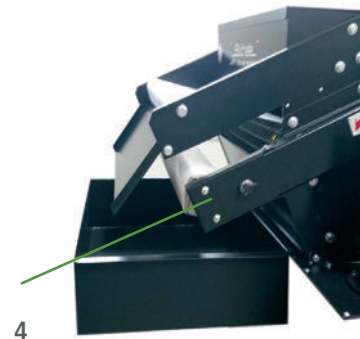
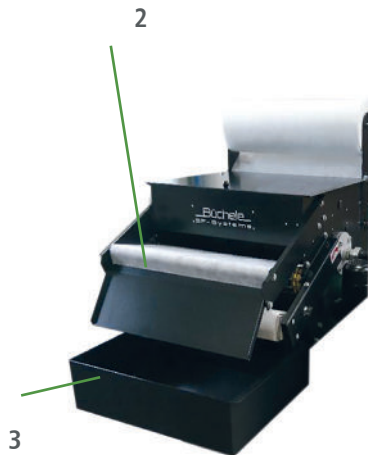
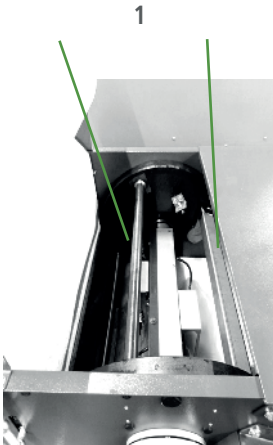
## Belt filter

### Requirements:

- Preliminary chip removal with wedge wire strainer/ basket strainer > 2 mm or chip conveyor

### Options:

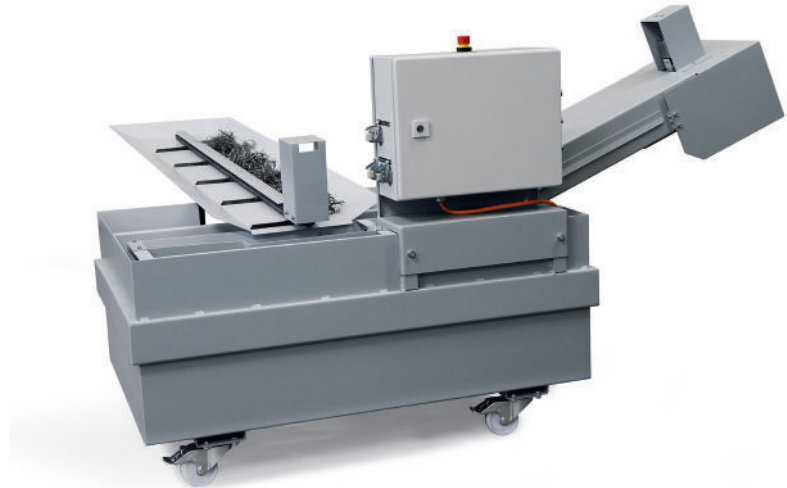
- Chip conveyor in belt filter catering for high chip volumes (1)
- Filter cake scraper for removal of filter cake and recovery (2)
- Large chip tray for models with fleece reel and filter cake scraper (3)
- Paper web winder (4)



# Wet chip conveyor

## With separator attachment

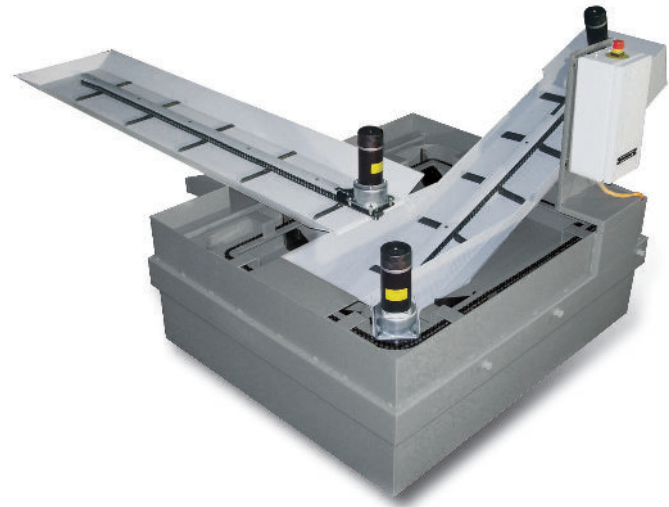
The innovative functional design of our wet chip removal system significantly enhances the efficiency of the machine tool. The coolant and solids are transferred through a flush tray or a wet chip conveyor away from the machine into the collection tank. The baffle and screen plate inserts and the integrated separator remove all large chips and solids from the coolant. The chips are then transferred on the integrated chip conveyor to the chip bin.



# Wet chip conveyor

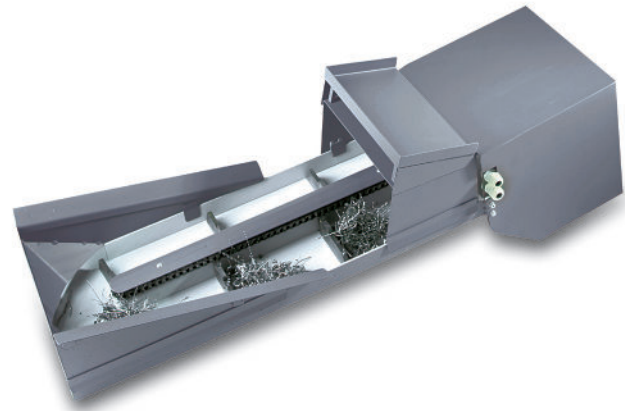
## With rotating scraper system

The wet chip conveyor is fitted with a rotating scraper system and thus able to remove even minute chips from the coolant by means of the integrated 1mm-perforated plate. The chips and particles are then transferred on the chip conveyor out of the oil collection vessel to the chip bin. The cleaned coolant is returned through a return line to the machine.



# Chip conveyor

Our product range includes efficient and reliable chip conveyors. As they continuously move the chips away from the machining area, there is no need for time-consuming manual removal. This boosts the utilisation rate of the machine and eliminates downtimes for chip removal.





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