

# Material separation, the optimized recycling technology





## Service means: everything from one source

Schuko is your specialist for extraction and filter systems. From consulting, planning and production to delivery, installation, commissioning, maintenance and operator training – everything is in our hands. That is what we mean when we say service.

Another strength is our staff of 200 specialists in five plants. For over 50 years, the employees of the owner-operated company have manufactured extraction and filter systems for use in the wood, paper and plastics processing industries and in the recycling sector.

This wealth of experience enables Schuko to develop concepts that produce highly efficient, practically oriented solutions.

As a member of the VDMA German Engineering Association, a top priority at Schuko is process safety based on the state of the art and the applicable standards. Many products have been tested and inspected by the responsible trade associations (e.g. the wood trade association); these products bear the GS mark for tested safety and the „dust-tested“ stamp of quality.

– The Schuko brand name is a sign of performance and quality.  
Take us at our word and see for yourself.



**Sorting chamber for manual separation of materials with aeration and deaeration.**



**Modern recycling processes require efficient methods for separating materials**



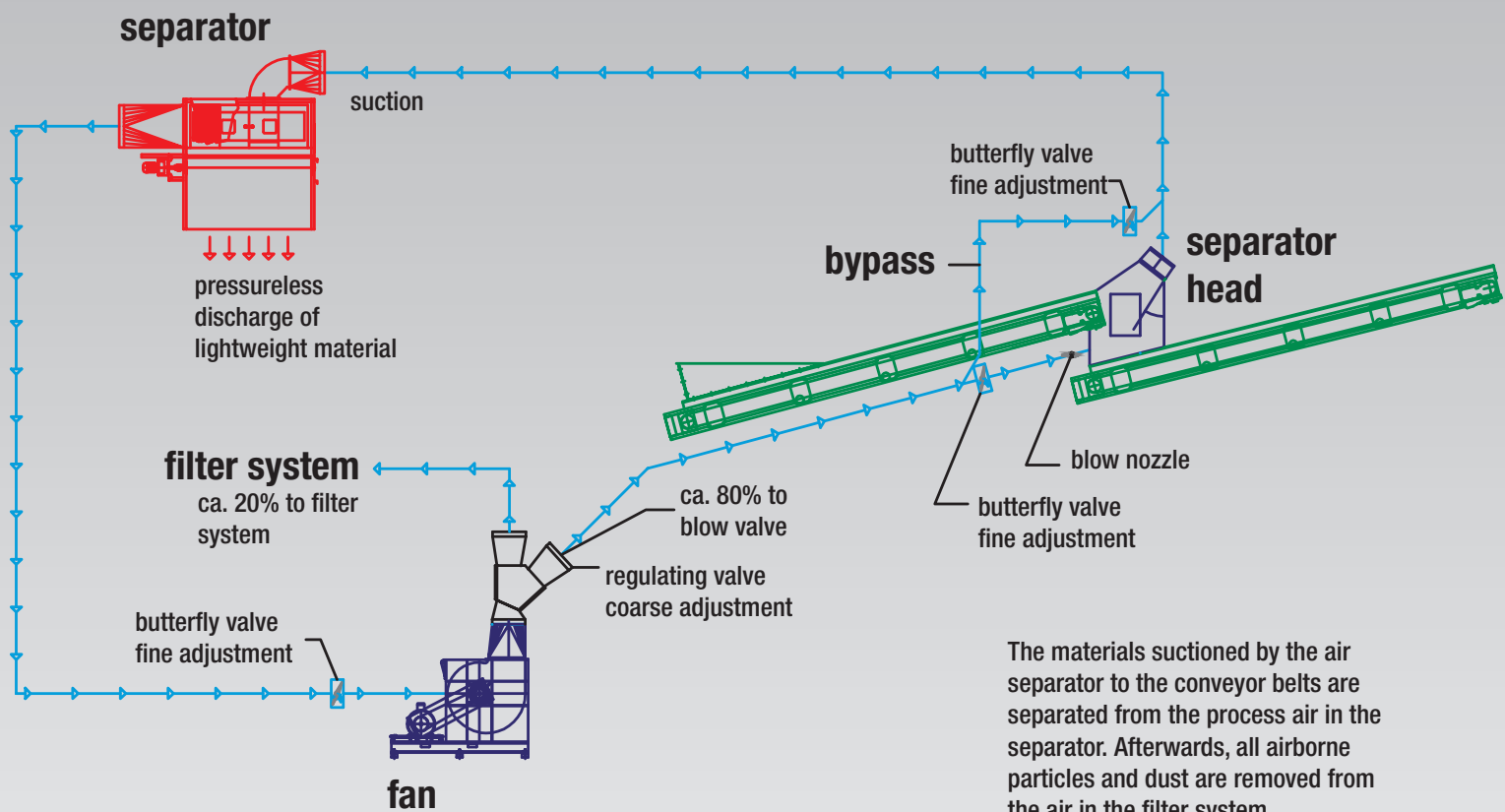
### **Recyclable materials are commodities**

Recyclable materials are raw materials - based on this principle, Schuko has developed sorting systems for waste disposal plants in cooperation with partners from the conveyor technology sector. Of course, everything is optimized exactly to meet the individual customer's requirements.

With comprehensive services for high-efficiency extraction and filter systems, Schuko is your competent partner for the separation of recyclable materials.



Our sound expertise from many years of experience and close cooperation with strong partners is the basis for efficient plant engineering with highly effective performance – not only in the recycling and environmental engineering sector.



## Take advantage of Schuko recycling technology

For many years Schuko has built systems that enable the recycling of valuable raw materials. The goal of recycling is to reduce the consumption of raw materials and the amount of waste that has to be disposed of. Take advantage of Schuko recycling technology, which has gained considerable importance in the past years.

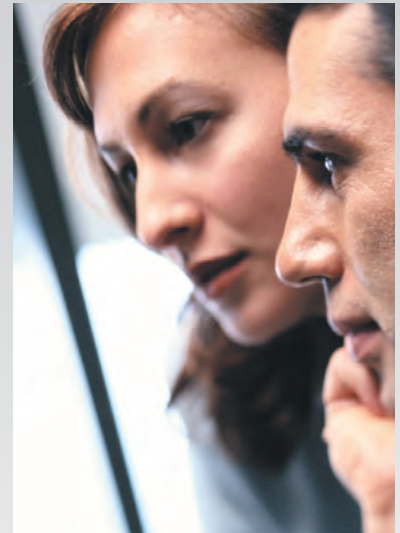
### Your benefits:

- ✓ Maximum economy due to innovative Schuko extraction technology
- ✓ Precise separation of lightweight and heavy materials through air separation
- ✓ Separation of precipitated materials and process air in the separator
- ✓ Subsequent filtering and purification of the contaminated exhaust air

The result is a significant reduction of energy consumption and an optimum working atmosphere without impairments to health.

Schuko places maximum emphasis on the quality of materials used for the plant components, from the fan and conduits to the filter systems and advanced controller technology. This attention to quality ensures trouble-free work processes and a long service life.

## The Schuko air separator – precise separation



The precisely adjustable air separator separates heavy and light materials on the conveyor belt. An air stream is directed through the loosened material so that all components are separated that have a rate of fall that is less than the upward velocity of the separating air.



A large control window enables full control of the adjustment of the air separator for optimum sorting results.

The Schuko air separator is available in different belt widths:

**Model 1**  
for belt width of 400 - 800 mm

**Model 2**  
for belt width of 800 - 1,400 mm



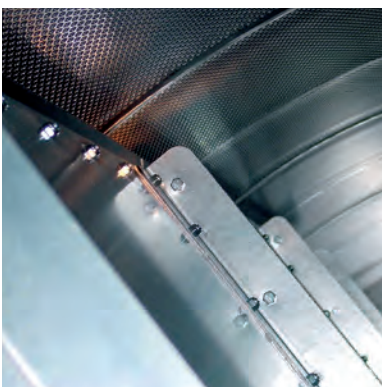


## Core of the disposal process – the Schuko Separator

The Schuko Separator separates the precipitated materials from the process air and directs the exhaust air to the filter for removal of airborne particles and dust.

Afterwards, all airborne particles and dust are removed from the air in the filter system.

The use of a perforated stainless steel shell (show picture down left) reduces the friction within the separator. In addition, caking of material is reduced, which increases the process reliability of the overall system.





## The Schuko separator in figures

### Schuko Separator

Perforated screen 5mm (special model with 3mm perforated screen is possible) VA

Model	Both sides pipe-connection (mm)	Discharge for material waste l x w (mm)	Motor (kW)	Input speed (RPM)	Absolute airflow rate m <sup>3</sup> /h	Dimensions length x width x height (mm)	Weight (kg)
80/120/5/LF	300	1,274 x 480	0,75	4,8	10,000	2,320 x 1,180 x 1,090	625
120/120/5/LF	450	1,274 x 600	0,75	4,8	15,000	2,320 x 1690 x 1530	1,150
120/160/5/LF	500	1,674 x 600	0,75	4,8	22,800	2,720 x 1690 x 1530	1,250
120/200/5/LF	560	2,047 x 600	0,75	4,8	28,000	3,145 x 1,490 x 1,530	1,350
200/150/5/LF	630	1,574 x 710	1,10	4,8	32,000	2,720 x 2,386 x 2,290	2,100
200/200/5/LF	710	2,074 x 710	1,10	4,8	51,000	3,310 x 2,386 x 2,290	2,250
200/280/5/LF	900	2,874 x 710	2 units à 1,1	4,8	75,000	4,020 x 2,386 x 2,290	2,500
240/250/5/LF	1000	2,574 x 710	2 units à 1,5	6,7	92,000	3,766 x 2,890 x 2,679	2,690

Optionally, a safety package for separators can be installed, consisting of maintenance and inspection openings equipped with quick-release latches.





## Breathe freely with Schuko sorting chambers

A healthy work environment is the foundation for a successful enterprise. Schuko designed the sorting chambers especially with this in mind, in order to ensure optimum working conditions for the health of your employees.

The effective extraction of the contaminated exhaust air in the sorting chambers and the simultaneous constant supply of fresh, purified air ensures that employees can breathe freely.

Health hazards are eliminated, therefore increasing employee productivity. This also reduces the rate of absences due to illness.

In addition to sorting chambers, Schuko also plans and manufactures entire production hall aeration and deaeration systems.





## Customer service = Schuko philosophy

### Our concept is to be there for you around the clock.

Our service employees support you during installation of the plant and are available for on-site maintenance. Your operating personnel receive expert training by our service team. Disruptions are analyzed by our service personnel and eliminated reliably and promptly.

We recommend regularly scheduled preventive maintenance, since lack of maintenance can cause secondary damages, which can cost you dearly in terms of downtimes and additional repairs.

Of course, our service includes pointing out maintenance intervals to you, such as when it is time to change filters.







## Schuko paper separators – different from the competition!

### Schuko separators can be used in diverse industries:

woodworking, paper and printing industry, recycling and mold and pattern making.

Separation in the paper and printing industry is a job for the Schuko paper separator. This separator is ideal for separating paper and materials with pneumatic conveyor systems. Seven sizes allow optimum dimensioning of the separator.



Schuko separators separate the suctioned material from the air current and feed it to press containers or bale presses (see photos at left and above). The dust loaded air current continues its path to the filter, where the dust is separated and the filtered air is re-circulated to the production halls. This saves energy and ensures a pleasant atmosphere in the working areas.

Schuko makes use of state-of-the-art technology – the stainless steel rotor housing is highly wear-resistant. It can be used both in pressure and low-dust vacuum mode and can easily be accessed for servicing and maintenance.



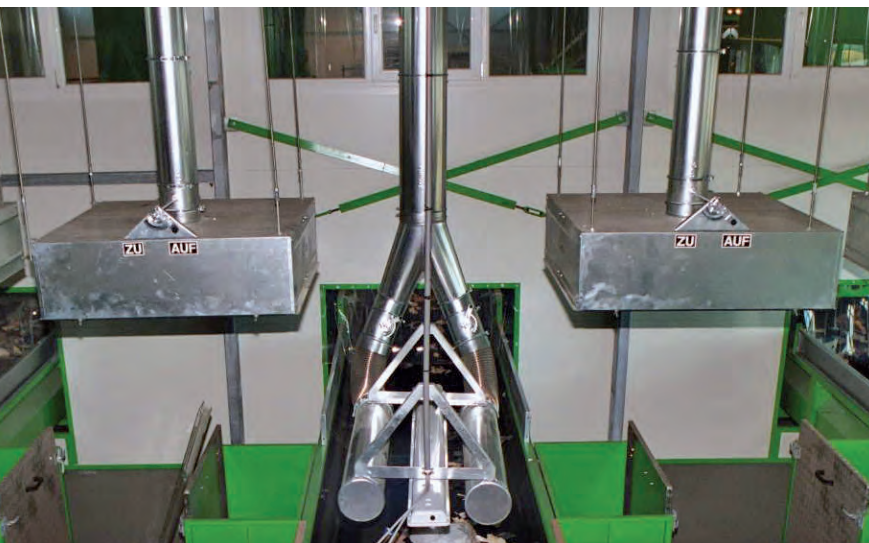


## Certified for the future

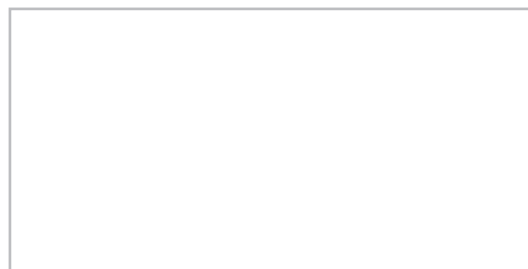
The regulations created by the Committee for European Normalization (CEN/TC 142/WG 10) and manufacturers' specifications for chip and dust extraction systems (CADES) are taken into account during the design and construction of our filter systems.

In addition to compliance with the national standards, Schuko places special emphasis on the European and international standards, so that you, too, are prepared for the future.

**We are always a step ahead.  
Contact us and see for yourself.**



**We plan for the future not for the past.**



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