

INNOVATIVE FILTRATION SOLUTIONS

Filter Systems for Pharmaceutical, Chemical, Food & Beverage



SEEBACH FILTER SYSTEMS FOR PHARMACEUTICAL, CHEMICAL, FOOD & BEVERAGE

Granulation



A common application in pharmaceutical and food processing industries, bulk quantities of flowable granules with narrow size distributions are suspended, or dissolved in liquids, so unwanted, undersized or oversized grains (or agglomerates) can be separated out and recycled into the process. Seebach granulation sieves and conical sieves are specially adapted to individual processes.

Coating



The Wurster spray coating process is commonly used to deposit active compounds on carrier particles or protective coatings on tablets and pills. Particles are fluidized by sieved air flow, before a coating material (as solution, suspension or melt) is injected into the air flow, until all particles are uniformly coated. Seebach sieves are specially adapted to the particle to be treated and air flow volume.

Pelleting



Used in pharmaceutical production and to treat seeds with pesticides or herbicides for agricultural applications, pelleting is depositing active compounds or auxiliaries in the form of powders. The process enables adhesion of active compounds, fillings or auxiliary substances, and produces uniform particle size facilitates transport and dosing processes. Seebach sieves are used to remove powder residues and oversized product.

Classification



After granulation and grinding, processes like classification are indispensable for standardizing particle size distributions. Seebach supply sieves in different geometries and hole variety (size and shape) including rhombus-shaped, circular and quadrilateral holes. We also support combination grinding, rubbing and classifying by means of sieves with grater perforations.

Drying



All drying processes, like spray drying, fluidized bed drying, or belt drying use hot air, that is then recycled during the process. Particles are removed from the circulating air by filtration; water vapor is condensed and the dry air is re-heated. In a fluidized bed dryer, the dry powder is carried out together with the air and recovered in a subsequent filtration step. Seebach filters are specifically adapted to the respective processes, employing high filtration efficiencies, minimum product losses and long working life

All Seebach filter elements can be cleaned in place (CIP). This means that they can be back-flushed, washed, and prepared for a new batch automatically. Seebach's world-renowned design combines maximum active filter area with minimum dead zones in order to guarantee complete removal of all residues during the CIP process.

Filtration of chemicals



Filtration is used in the chemical industry for processing reagents, such as separating impurities or undissolved substances from solutions, and for processing reaction mixtures. Seebach filters enable the recovery of solid products or by-products from reaction mixtures, the separation of biomass from product solutions after fermentation, and the recovery of powdery/granular catalysts and auxiliaries like adsorbents or absorbents. In addition, filtration of process flows protect downstream plant components from depositions or erosion, and facilitates thermal separation processes like distillation.

Food & beverage production



In the food and beverage industry, high hygienic standards must be met in combination with efficiency and product quality. Seebach stainless steel filter elements, designed without dead zones, can be cleaned in place and so are highly suitable for use in plants that process different types of products, to minimize operational costs. Seebach filters are used for virtually all imaginable liquid foods, even high-viscosity liquids like liquid chocolate or syrup.

Seebach filter systems



FILTER CANDLE, CODE 2

Applications	Pharma, food & beverage
ID	11096
Joining method	Cylindrical, welded
Filter medium	Wire mesh, metal fiber fleece
Outer diameter	70 mm
Filter rating	2 to 100 µm
Material	Stainless steel, Duplex, Hastelloy



FILTER CANDLE, CODE 3

Applications	Gas-liquid filtration, focuses on cleanability
ID	10921 / 10922
Joining method	Pleated or cylindrical, welded
Filter medium	Wire mesh, metal fiber fleece
Outer diameter	70 mm
Filter rating	2 to 100 µm
Material	Stainless steel, Duplex, Hastelloy



FILTER CANDLE, CODE 7

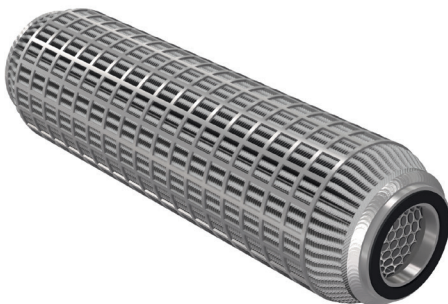
Applications	Flexible solutions combined with maximum filter life
ID	10801
Joining method	Pleated, welded
Filter medium	Wire mesh, metal fiber fleece
Outer diameter	70 mm
Filter rating	2 to 100 µm
Material	Stainless steel, Duplex, Hastelloy

Seebach filter systems



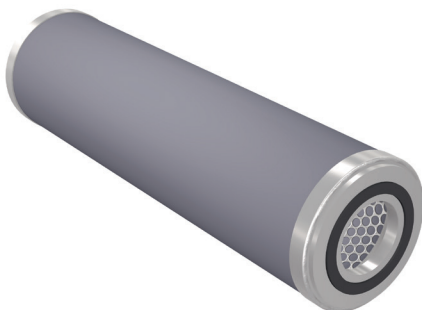
FILTER CANDLE, CODE 7

Applications	Steam filtration, gaseous media treatment, solvent filtration
ID	10802
Joining method	Pleated, welded
Filter medium	Wire mesh/metal fiber fleece
Outer diameter	70 mm
Filter rating	2 to 100 µm
Material	Stainless steel, Duplex, Hastelloy



FILTER CANDLE, DOE

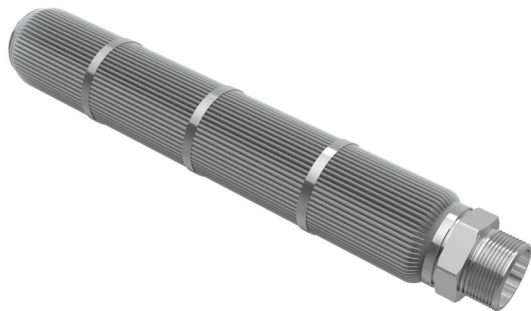
Applications	Customized connectors for pharma, food & beverage
ID	10923
Joining method	Pleated, welded
Filter medium	Wire mesh/metal fiber fleece
Outer diameter	70 mm
Filter rating	2 to 100 µm
Material	Stainless steel, Duplex, Hastelloy



FILTER CANDLE, DOE

Applications	Perfectly cleanable geometries
ID	10924
Joining method	Cylindrical, welded
Filter medium	Wire mesh/metal fiber fleece
Outer diameter	70 mm
Filter rating	2 to 100 µm
Material	Stainless steel, Duplex, Hastelloy

Seebach filter systems



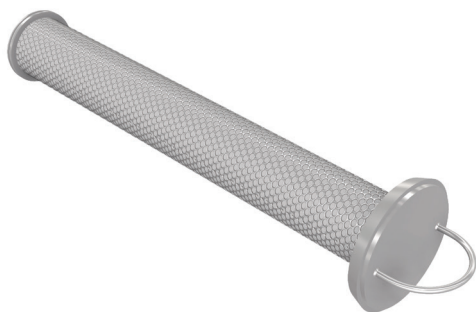
FILTER CANDLE, SCREWED CONNECTOR

Applications	Perfectly suitable solutions for any housing in the market
ID	10052
Joining method	Pleated, welded
Filter medium	Wire mesh/metal fiber fleece
Outer diameter	70 mm
Filter rating	2 to 100 µm
Material	Stainless steel, Duplex, Hastelloy



CATALYST FILTER, SCREWED

Applications	Customized connectors for false air, vacuum system protection, retention of process substrates
ID	10608
Joining method	Cylindrical, welded
Filter medium	Metal fiber fleece
Outer diameter	30 mm
Filter rating	3 µm
Material	Stainless steel



FILTER ELEMENT, STRAINER

Applications	Product filters for filling, decanting and pretreatment
ID	10862
Joining method	Cylindrical, welded
Filter medium	Wire mesh/metal fiber fleece
Outer diameter	176 mm
Filter rating	2 to 100 µm
Material	Stainless steel, Duplex, Hastelloy

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FILTER - CONTAINS 7 TO 30 ELEMENTS

Applications	For maximum performance with metallic, polymer or glass fiber fleece
ID	3194
Input / Output	DN100 - DN350
Max. operating press.	10 bar
Max. flow rate	3 to 18 m ³ /min
Max. operating temp.	80°C
Material	Stainless steel, Duplex, Hastelloy



MEDIA FILTER - CONTAINS 1 ELEMENT

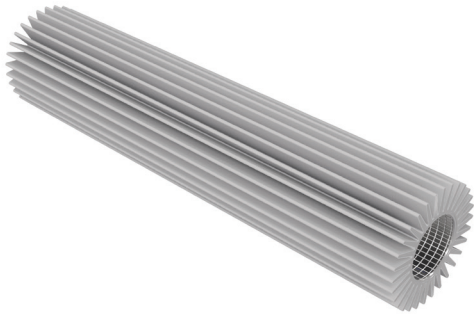
Applications	Steam filtration, gaseous media treatment, solvent filtration and water treatment
ID	10938
Input / Output	DN25
Max. operating press.	10 bar
Max. flow rate	5 to 3000 l/min
Max. operating temp.	80°C



IN-LINE FILTER - CONTAINS 1 ELEMENT

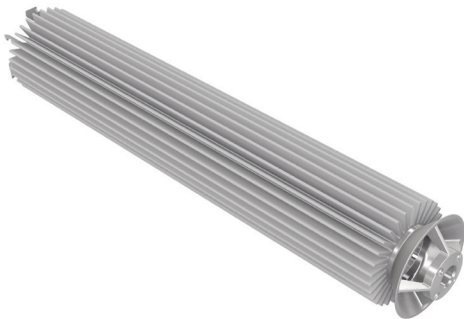
Applications	Gas/liquid filtration
ID	10959
Input / Output	G1
Filter rating	Code 3 Kerze
Max. operating press.	10 bar
Max. operating temp.	-10 to 150°C

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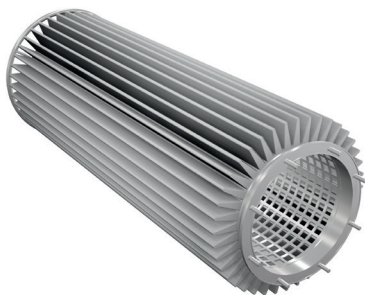
CIP-ELEMENT

Applications	Vacuum drying, fluidized bed drying, solid dosages
ID	10223
Joining method	Pleated, welded
Filter medium	Wire mesh laminate
Outer diameter	180 mm
Filter rating	2 to 10 μm



CIP-ELEMENT

Applications	Fluidized bed systems for drying and coating applications
ID	10254
Joining method	Pleated, welded
Filter medium	Wire mesh laminate
Outer diameter	180 mm
Filter rating	2 to 10 μm



CIP-ELEMENT

Applications	Solid dosage fluidized bed systems
ID	10936
Joining method	Pleated, welded
Filter medium	Wire mesh laminate
Outer diameter	330 mm
Filter rating	2 to 10 μm

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CIP-ELEMENT

Applications	Granulation and coating processes
ID	10952
Joining method	Pleated, welded
Filter medium	Wire mesh laminate
Outer diameter	80 mm
Filter rating	2 to 10 μm



CONICAL STAR SHAPED FILTER CARTRIDGE

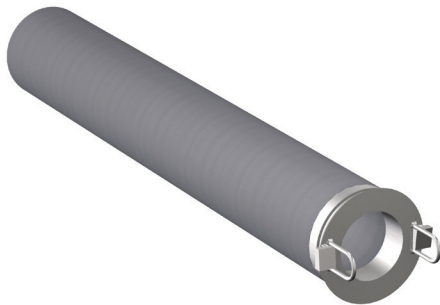
Applications	Vacuum conveying systems with CIP installations
ID	10625
Joining method	Pleated, welded
Filter medium	Wire mesh laminate
Filter rating	2 to 10 μm



CIP CARTRIDGE - CUSTOMISED PLEATED

Applications	Customized solutions for CIP dryer
ID	11160
Joining method	Pleated, welded
Filter medium	Wire mesh laminate
Outer diameter	330 mm
Filter rating	2 to 10 μm

Seebach filter systems



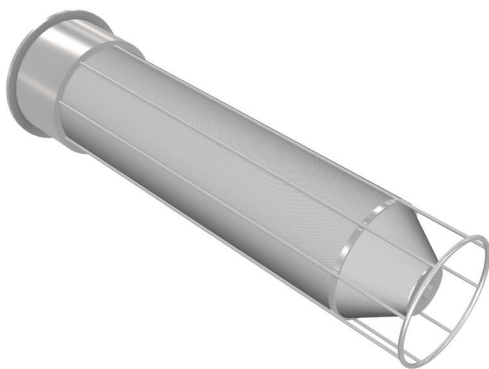
CIP CANDLE

Applications	Active component drying plant
ID	10865
Joining method	Cylindrical, welded
Filter medium	Wire mesh laminate
Outer diameter	150 mm
Filter rating	2 to 10 μm



CIP CARTRIDGE

Applications	Backwash applications with CIP equipment
ID	10695
Joining method	Cylindrical, welded
Filter medium	Wire mesh laminate
Outer diameter	105 mm
Filter rating	2 to 10 μm



CIP - CUSTOM DESIGN MODEL

Applications	Drying of API or liquefaction, granulation and drying
ID	10656
Joining method	Cylindrical, drainage device and protection basket, welded
Filter medium	Wire mesh laminate
Outer diameter	300 mm
Filter rating	2 to 10 μm

Seebach filter systems



CONE FILTER

Applications	CIP enabled systems for coating plants
ID	10884
Joining method	Conical, welded
Filter medium	Wire mesh laminate
Outer diameter	As requested
Filter rating	2 to 10 μm



CIP CUSTOM GEOMETRY

Applications	Drying, coating, granulation
ID	10450
Joining method	Welded
Filter medium	Wire mesh laminate
Outer diameter	175 mm
Filter rating	2 to 10 μm



VAPOR FILTER

Applications	Vapor filter for dedusting and separation of moist products of various particle diameters
ID	20150310-010
Joining method	Welded
Filter medium	Wire mesh laminate
Outer diameter	600 to 1200 mm
Filter rating	2 to 10 μm

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RASP CONES

Applications	Food & beverage, pharma, fine chemistry
ID	1672
Hole shape	Rasp tips 3 mm
Open angle	15° alternative 30°
Outer diameter	100 mm
Adapter flange	Open
Customer specific	Perforation, signature



RASP CONES

Applications	Food & beverage, pharma, fine chemistry
ID	1672
Hole shape	Rasp tips 1,5 mm
Open angle	30°
Outer diameter	200 mm
Adapter flange	Top/bottom
Customer specific	Perforation, signature



RASP CONES

Applications	Food & beverage, pharma, fine chemistry
ID	11072
Hole shape	Rasp tips 0,45 mm
Open angle	30°
Outer diameter	248 / 70 mm
Adapter flange	Top/bottom customer-specific perforation, signature

Seebach filter systems



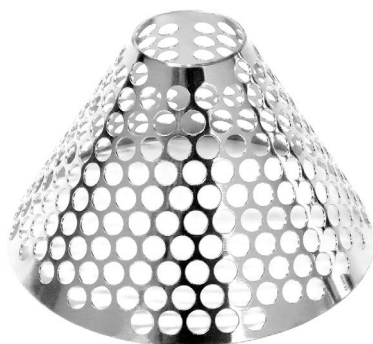
SIEVE CONES

Applications	Classification, grinding
ID	1622
Hole shape	18 mm
Open angle	30°
Outer diameter	80 to 400 mm
Adapter flange	Upper/lower flange
Customer specific	Adapter flange, perforation, signature



SIEVE CONES

Applications	Food & beverage, pharma, fine chemistry
ID	1672
Hole shape	Squared hole shaped 2 x 2 mm to 16 x 16 mm
Open angle	30°
Outer diameter	248 mm
Adapter flange	Top/bottom
Customer specific	Perforation, signature



SIEVE CONES

Applications	Food & beverage, pharma, fine chemistry
ID	10148-015
Hole shape	Round hole shape 8 mm
Open angle	30°
Outer diameter	136 mm
Adapter flange	Without
Customer specific	Perforation, signature

Seebach filter systems



SIEVE CONES

Applications	Food & beverage, pharma, fine chemistry
ID	10148-020
Hole shape	Round hole shape 1.6 mm
Open angle	30°
Outer diameter	136 mm
Adapter flange	Without
Customer specific	Perforation, signature



SIEVE CONES

Applications	Food & beverage, pharma, fine chemistry
ID	10401
Hole shape	Round hole shape 0.6 mm
Open angle	30°
Outer diameter	360 / 101.9 mm
Adapter flange	Top/bottom closed
Customer specific	Perforation, signature



SIEVE CONES

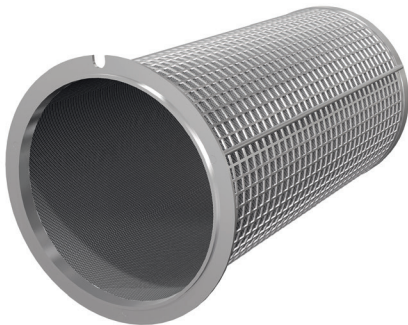
Applications	Food & beverage, pharma, fine chemistry
ID	11182
Hole shape	Round hole shape 0.8 to 6 mm
Open angle	30°
Outer diameter	165 / 60 mm
Adapter flange	Customized adaptation
Customer specific	Perforation, signature

Seebach filter systems



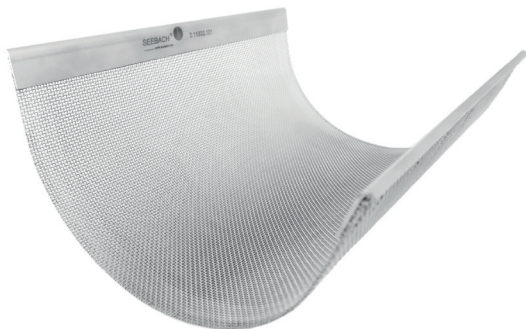
FILTER CONES

Applications	Food & beverage, product filter
ID	0408
Filter medium	Mesh 5 to 200 μm
Open angle	15°
Outer diameter	93 / 40 mm
Customer specific	Adapter flange, perforation, signature



FINE GRANULATION SIEVE

Applications	Fine granulation, sieving, rotor sieves for pharma, food & beverage, fine chemistry
ID	10535
Hole shape	Single or multi layer wire mesh round hole 50 to 2000 μm
Material	SS 304, 316, alloy, Hastelloy



GRANULATION SIEVE

Applications	Sieving stages for heat sensitive products, oscillating rotor sieves for pharma, fine chemistry
ID	11332
Hole shape	Single or multi layer wire mesh round hole 50 to 2000 μm
Outer diameter	Customized dimension
Material	SS 304, 316, alloy, Hastelloy

“Unparalleled quality”

Seebach

your competent partner for innovative
and reliable filtration solutions

- Leading in filtration technology since 1970
- Tailor-made filtration solutions designed and manufactured in Germany
- Continuous process optimization and innovation for challenging applications in plastic, pharmaceutical, chemical, food & beverage, aerospace, mining, oil and gas industries
- Seebach filtration solutions stand for effectiveness, flexibility, sustainability and reliability
- Highest production quality and operational reliability by optimization of filtration solutions
- Seebach clients benefit from our fast and competent service worldwide

For more information please contact us at

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The Seebach name is renowned for filtration solutions that utilize leading edge application knowledge and precision manufacturing expertise. John Crane acquired Seebach GmbH in 2018 to complement its existing filtration business, further enhancing its technology leadership and providing new capabilities to reduce innovation cycles and grow into mission-critical process industries.



Global Service Network

- » Over 200 facilities in more than 50 countries
- » Close proximity to customers' operations
- » Local service and expert global support
- » Seebach is a leader in filtration since 1970.

North America

United States of America
Tel: 1-847-967-2400

Europe

Germany
Tel: 49-561-98297-0

Latin America

Brazil
Tel: 55-11-3371-2500

Middle East & Africa

United Arab Emirates
Tel: 971-481-27800

Asia Pacific

Singapore
Tel: 65-6518-1800

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