

Sartobran® P 0.45 µm

Bioburden Reduction and Particle Retention Filters

Product Information

- Ideally suited for bioburden and particle reduction, in particular in vaccine and blood & plasma processes
- High product yield due to extremely low unspecific adsorption
- An excellent choice for processing high-value biological solutions



Outstanding Bioburden Reduction

Sartobran® P 0.45 µm rated filter elements are ideally suited for bioburden and defined particle reduction from biopharmaceutical solutions. They can be used for protection of sterilizing-grade membrane filters or subsequent downstream processing equipment in biotech production processes.

High Product Yield

Sartobran® P's cellulose acetate membrane provides the lowest unspecific adsorption of any membrane material available, ensuring high product and excipient recovery rates.

Flexibility & Compatibility

Sartobran® P 0.45 µm filters are available with various filtration areas from 0.03 m² | 0.32 ft² up to 1.8 m² | 19.4 ft² for simple linear scale-up and process flexibility. Sartobran® P filter elements can be used over pH range 4 - 8 thereby covering the vast majority of biopharmaceutical applications.

Applications

- Coagulation Factors, Albumin, IgG
- Bacterial and Viral Vaccines
- Bioprocessed pharmaceuticals
- Intermediate and purified protein solutions
- Biological fluids
- Fluids containing preservatives

Technical Specifications

Available Sizes	Filtration Area	Max. Diffusion at 1.5 bar 22 psi [ml/min]	Min. Bubble Point [bar psi]
Cartridges Maxicaps®			
Size 0.5 (Only Cartridges)	0.3 m ² 3.2 ft ²	10	2.0 29
Size 1	0.6 m ² 6.5 ft ²	15	2.0 29
Size 2	1.2 m ² 12.9 ft ²	30	2.0 29
Size 3	1.8 m ² 19.4 ft ²	45	2.0 29
Mini Cartridges Midicaps®			
Size 7	0.05 m ² 0.54 ft ²	3	2.0 29
Size 8	0.1 m ² 1.1 ft ²	4	2.0 29
Size 9	0.2 m ² 2.2 ft ²	5	2.0 29
Size 0 (Only Midicaps®)	0.45 m ² 4.8 ft ²	10	2.0 29
Capsules			
Size 5	0.03 m ² 0.32 ft ²	2	2.0 29

Services

Sartorius Confidence® Validation Services is the perfect complement to Sartobran® P.

Our services provide

- Extractables and leachables services
- Microbiological testing
- Physicochemical testing

in compliance with regulatory requirements. Our local teams of validation experts support you with our tailored and consultative approach to determine the most cost-effective solution and give you the confidence you need to succeed.

Max. Allowable Differential Pressure

Cartridges | Mini Cartridges

5 bar | 72.5 psi at 20 °C
2 bar | 29 psi at 80 °C

Maxicaps® | Midicaps®

5 bar | 72.5 psi at 20 °C
3 bar | 43.5 psi at 50 °C (only Maxicaps®)

Capsules

4 bar | 58 psi at 20 °C
2 bar | 29 psi at 50 °C

Materials

Prefilter Membrane

Cellulose Acetate

Endfilter Membrane

Cellulose Acetate

Support Fleece

Polypropylene

Core

Polypropylene

End Caps

Polypropylene

Capsule Housing

Polypropylene

O-Ring

Silicone

Filling Bell

Polycarbonate

Max. Allowable Back Pressure

2 bar | 29 psi at 20 °C
(for all elements)

Pore Size Combination

0.65 µm + 0.45 µm

Regulatory Compliance

- Each individual element is tested for integrity by Bubble Point and Diffusion test
- Designed, developed and manufactured in accordance with an ISO 9001 certified Quality Management System
- Meet or exceed the requirements for WFI quality standards set by the current USP
- Non pyrogenic according to USP Bacterial Endotoxins
- USP Plastic Class VI Test
- Non fiber releasing according to 21 CFR



Sterilization

Cartridges | Mini Cartridges

In-Line Steam Sterilization
 Max. 134 °C, 0.3 bar, 20 min
 Min. 25 Sterilization Cycles

or

Autoclaving

Max. 134 °C, 2 bar, 30 min
 Min. 25 Sterilization Cycles

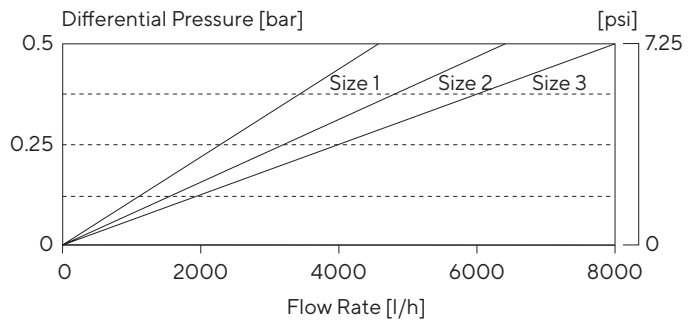
Maxicaps® | Midicaps® | Capsules

Autoclaving

Max. 134 °C, 2 bar, 30 min
 Min. 25 Sterilization Cycles (Maxicaps® | Midicaps®)
 Min. 3 Sterilization Cycles (Capsules)

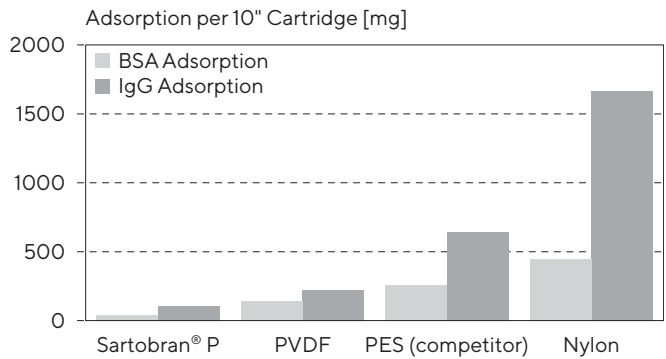
Performance

Water Flow Rates of Maxicaps®



Standardized at 20°C

Protein Binding



Technical References

Validation Guide SPK5726-e
 Extractables Guide 100002449247

Ordering Information



Mini Cartridge



Adapter

15: bayonet adapter with O-ring
18: plug adapter with double O-ring
(Standard with silicone O-ring)

Filter Size

7: 0.05 m² | 0.5 ft²
8: 0.1 m² | 1.1 ft²
9: 0.2 m² | 2.2 ft²

Packing Size

B: box of 5



Cartridge



Adapter

21: double open end with flat gaskets
25: 2 flange bayonet adapter with 226 double O-ring
27: bayonet adapter with 222 double O-ring
28: 3 flange bayonet adapter with 222 double O-ring
(Standard with silicone O-ring)

Filter Size

0: 0.3 m² | 3.2 ft² (5")
1: 0.6 m² | 6.5 ft² (10")
2: 1.2 m² | 12.9 ft² (20")
3: 1.8 m² | 19.4 ft² (30")



Maxicaps®



Filter Size

1: 0.6 m² | 6.5 ft² (10")
2: 1.2 m² | 12.9 ft² (20")
3: 1.8 m² | 19.4 ft² (30")

Sterilization

--: autoclavable

Connector Inlet

S: 1/2" tri-clamp 50 mm
O: 1/2" single stepped hose barb
F: 3/4" tri-clamp 25 mm

Connector Outlet

S: 1/2" tri-clamp 50 mm
O: 1/2" single stepped hose barb
F: 3/4" tri-clamp 25 mm



Midicaps®



Filter Size

7: 0.05 m² | 0.5 ft²
8: 0.1 m² | 1.1 ft²
9: 0.2 m² | 2.2 ft²
0: 0.45 m² | 4.8 ft²

Sterilization

--: autoclavable

Connector Inlet

S: 1/2" tri-clamp 50 mm
O: 1/2" single stepped hose barb
F: 3/4" tri-clamp 25 mm

Connector Outlet

S: 1/2" tri-clamp 50 mm
O: 1/2" single stepped hose barb
F: 3/4" tri-clamp 25 mm

Packing Size

A: box of 4
(size 7, 8, 9)
V: box of 2
(size 0)



Capsules



Filter Size

5: 0.03 m² | 0.32 ft²

Sterilization

--: autoclavable

Connector Inlet

O: 1/4" multiple stepped hose barb

Connector Outlet

O: 1/4" multiple stepped hose barb (with filling bell)

Packing Size

B: box of 5

Check the availability of your desired configuration with your Sartorius sales representative or online at www.sartorius.com

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