Filtersource.com Inc.
A Trumpler-Clancy brand

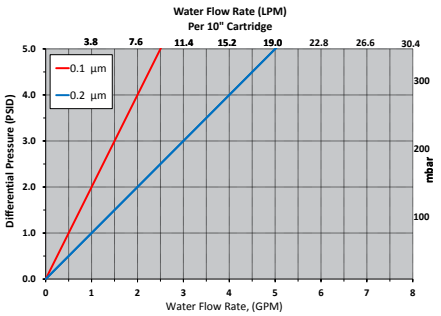
High Purity - Pharmaceutical Grade PES, 0.2μm and 0.1μm

Hydrophilic Polyethersulfone Membrane Cartridges for Pharmaceutical and Biological Applications

PPES Pharmaceutical Grade filter cartridges are ideal for sterile filtration and clarification of pharmaceutical and biological solutions. Each PPES cartridge is integrity tested during manufacturing and is supported by a validation guide for regulatory compliance. Low protein binding and the broad chemical compatibility characteristics of the polyethersulfone membrane, along with exceptional flow rate vs pressure drop, makes the PPES series the ideal choice for a variety of valuable and/or critical pharmaceutical solutions.

PPES cartridges are fully validated as sterilizing grade filters in accordance with HIMA and ASTM F838-05 guidelines. For the 0.2 micron series elements, validation studies demonstrate sterile effluent is achieved with challenge concentration in excess of 10^7 Brevundimonas diminuta organism per cm^2 of filter area. Additionally, validation studies of 0.1 micron series elements demonstrate 10^7 retention of Mycoplasma (Acholeplasma laidlawii) per cm^2 of filter area.

Flow Rate vs Pressure Drop



Typical Applications

- Vaccines
- Large Volume Parenteral (LVP's)
- Water for Injection (WFI)
- Diagnostics
- Ophthalmics
- Cell and Tissue Culture Media
- Protein Solutions
- Serum and Blood Products

Construction Materials

Membrane..... Polyethersulfone
Support Media..... Polypropylene
End Caps..... Polypropylene
Center Core..... Polypropylene
Outer Support Cage..... Polypropylene
O-Rings/Gaskets.....Buna, EPDM, Silicone, Viton®, Teflon® Encapsulated Viton®

Note: O-ring adapters include integral reinforcement that will not deform with repeated steam sterilization or hot water sanitation cycles.

Toxicity

All polypropylene components meet the specifications for biological safety per USP Class VI – 121˚C for plastics.

Sterilization

Hot Water..... 85°- 95°C, 30 min., max. ΔP 7 psi
In-Line Steaming..... 134°C, 30 min., max. ΔP 7 psi; 100 cycles

Dimensions

Length:
10 to 40 inches (25.4 to 101.6 cm) nominal
Outside Diameter:
2.70 inches (7.0 cm) nominal

Maximum Recommended Operating Conditions

Temperature.....176°F (80°C)
Forward .....72 PSI (5 bar) at 68˚F (20°C)
29 PSI (2 bar) at 176°F (80°C)
Reverse.....29 PSI (2 bar)

Food Safety Compliance

Materials of construction comply with FDA regulations for food and beverage contact use as detailed in the US Code of Federal Regulations, 21CFR. Materials used to produce filter media and hardware are deemed safe for use in contact with foodstuffs in accordance with EU Directives 2002/72/EC, 1935/2004, and/or 10/2011.

Ordering Information

PPES	Rating (μ)	A	Length, Nominal	C	End Cap Style	O-Rings/Gaskets
	0.1		10" (25.4 cm)		2 = DOE Flat Gasket	B = Buna-N
	0.2		20" (50.8 cm)		3 = 222 w/ Fin	E = EPDM
			30" (76.2 cm)		4 = 222 w/ Flat Cap	S = Silicone
			40" (101.6 cm)		6 = 226 w/ Flat Cap	V = Viton®
					7 = 226 w/ Fin	T = Teflon® Encapsulated Viton®
						Z = Teflon® Encapsulated Silicone