PPguard®

Polypropylene Microfiber Filter



VANGUARD

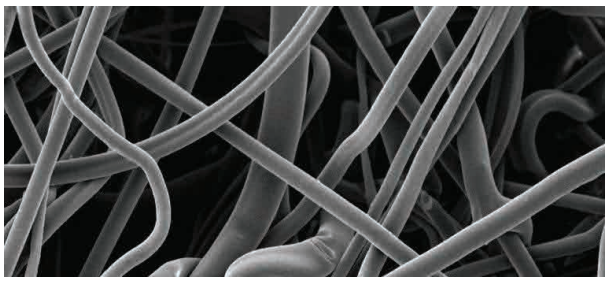
PPguard® Pariticle Reduction Filter Cartridge

The PPguard® filter cartridge is a high efficiency, long life, pleated filter made entirely of chemically resistant polypropylene. The PPguard® filter's advanced design and construction has resulted in a very economical, premium quality product that provides consistently high filtration efficiency, superior flow rates, considerable high dirt holding capacity and exceptionally long service life. Its all-polypropylene thermally bonded construction and its extremely low extractables make PPguard® effective in a wide range of fluids and applications.

The PPguard® filter cartridge is available in retention ratings from 0.2µm to 99µm and is offered in a variety of lengths and fittings that allow service in most commonly used filter housings.

PPguard® Efficiency

PPguard® filter cartridges combine a high dirt holding capacity, protective abilities and extremely high flow rates, These cartridges are easy to clean for an efficient regeneration if necessary.



PPguard® SEM

PPguard® User Manual

PPguard® filter cartridges user manual is available at www.vanguard.com.bd/ecodocs for your ready download. This eco approach from our side as a contribution to reserve the environment.

Features and Benefits

- All-polypropylene construction
- Wide chemical compatibility, permits application to broad range of fluids
- Particle removal ratings from 0.2µm to 99µm
- High filtration efficiency at rated level
- Self-bonded filter media
- Fixed pore structure, consistent particle removal, no migration of filter media, non-fiber releasing Contains no binders, adhesives or surfactants
- Wide solvent compatibility, extremely low extractables, immediately rinses in 18 megohm-cm water
- Maximum effective surface area
- High dirt holding capacity
- Long filter service life, high throughputs, lower operating costs
- Biologically inert and non-toxic
- Meets FDA requirements for food contact use, passes USP Class VI Plastics biological reactive test

Typical Application

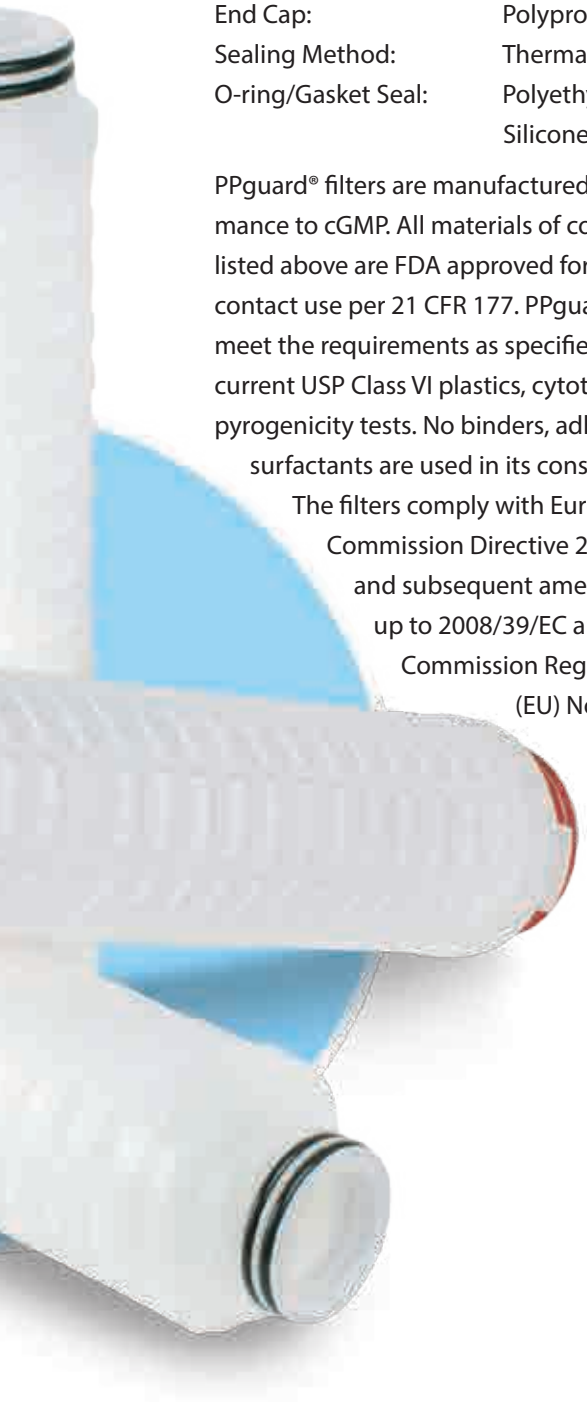
PPguard® polypropylene filter cartridges may be used as either prefilter or final filters. PPguard® filters are most appropriate for use when high efficiency filtration and economy are crucial.

Common industries that use PPguard® filters include:

- Pharmaceuticals
- Water purification
- Chemical
- Electronics
- Magnetic Store Media
- Biologicals
- Diagnostics
- Cosmetics
- Food and Beverage
- Photographic
- Plating
- Oil and Gas

Other uses for PPguard® filter include filtering electrostatic and jet ink, coating, paints, polymers, pesticides, metal etching solutions, air and gases.

Product Specifications



Materials of Construction

Filter Media:	Polypropylene
Upstream Support:	Polypropylene
Downstream Support:	Polypropylene
Core/Outer Guard:	Polypropylene
End Cap:	Polypropylene
Sealing Method:	Thermal Bonding
O-ring/Gasket Seal:	Polyethylene or Silicone

PPguard® filters are manufactured in conformance to cGMP. All materials of construction listed above are FDA approved for food contact use per 21 CFR 177. PPguard® filters meet the requirements as specified in the current USP Class VI plastics, cytotoxicity and pyrogenicity tests. No binders, adhesives or surfactants are used in its construction. The filters comply with European Commission Directive 2002/72/EC and subsequent amendments up to 2008/39/EC and Commission Regulation (EU) No 10/2011.

Filtration Ratings

Pore Sizes:
0.2, 1, 5, 10, 20, 30, 50, 60 and 99µm

Cartridge Dimensions

Diameter: 2.75" (7cm)
Lengths: 10", 20", 30", 40" (25cm, 50cm, 75cm, 100cm)

Maximum Operating Temperature And Pressure

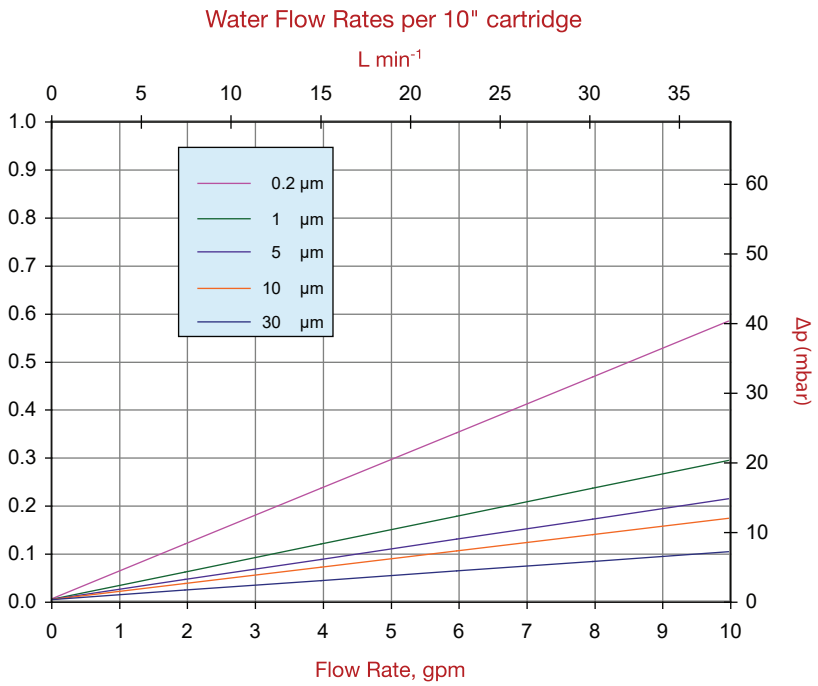
Δp 80 psi @ 32 °F to 100 °F (Δp 5.5 bar @ 0 °C to 38 °C)
Δp 60 psi @ 150 °F (Δp 4.1 bar @ 66 °C)
Δp 30 psi @ 180 °F (Δp 2.1 bar @ 82 °C)

Sterilization

Steam-in-place (SIP):
Saturated steam @ 121-135 °C, 30-60 minutes.
[15 psi (1 bar) to 30 psi (2 bar), 30-60 minutes]

Autoclave: 121-135 °C, 30-60 minutes.

PPguard® cartridges are capable of repeated sterilization cycles. For applications requiring autoclave/SIP, a stainless steel reinforcement ring must be ordered. See "Reinforcement Ring Option" within "Ordering Information".



End Cap Configuration



-226 O-ring

External -226 O-ring with locking tab; open end for C6 and F6 SOE configurations



-222 O-ring

External -222 O-ring with locking tab; open end for C2 and F2 SOE configurations



Flat Gasket

Flat Gasket; open end for OO DOE configurations



Flat Gasket

Flat Gasket; open end for OO DOE configurations



Button Cap

Button Cap; Close end for B2, F2, B6 and F6 configurations



Alignment Fin

Fin; Close end for B2, F2, B6 and F6 configurations

DOE = Double Open End
SOE = Single Open End

Ordering Information

Filter Media	Rating (µm)		Cartridge Length	End Cap Configuration		Reinforcement Ring Option	Seal Material (O-ring or Gasket
PG	5	-	3	F2		R	S
PG = PPguard polypropylene Microfiber	0.2 1 5 10 20 30 40 50 60 99		1 10″ (25cm) 2 20″ (50cm) 3 30″ (75cm) 4 40″ (100CM)	OO = DOE; Flat gaskets (9.75″, 19.5″, 29.25″, 39″ length filters) B2 = SOE; -222 O-ring, button cap end F2 = SOE; -222 O-ring, fin end B6 = SOE; -226 O-ring, button cap end F6 = SOE; -226 O-ring, fin end		(Blank) = Standard - no reinforcement ring R = Reinforcement ring; required for autoclave/SIP applications (not "OO")	O-ring Seal E = ERP (For DOE only) S = Silicone

VANGUARD
Vanguard Life Science Ltd.
Deul, Birulia, Savar, Dhaka 1216
+880 1713 178681-89
info@vanguard.com.bd
www.vanguard.com.bd