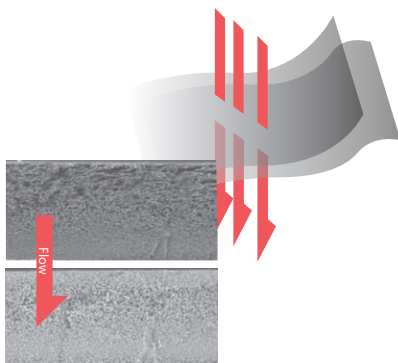




PAD Series Filter Cartridge is constructed of highly asymmetric polyethersulfone membrane from Germany and imported support layer. Unique double layer hydrophilic polyethersulfone contribute to its excellent filtration performance and reliable bacteria-intercepting ability. It is especially used in pharmaceutical industry with stringent requirement. All components of PAD filter cartridges comply with FDA regulations. This filter can withstand repeated steam sterilization.

## Features

- Unique double layer hydrophilic polyethersulfone with double security makes it have reliable bacteria-intercepting ability, increasing filtration safety factor by more than 10 times.
- Large effective filtration area makes the filter longer service life and lower cost.
- Broad chemical compatibility ( PH1-14 ) ,it is suitable for various pharmaceutical filtration.
- Structure Stabilization,it can withstand sterilization cycle with 50 times
- 100% integrity test ensures absolute sterilization
- Low protein adsorption
- ISO9001:2015 certified Quality Management System
- Full traceability to each filter with unique serial number



## Material of Constructions

Media	PES
Support	PP
Cage/core/end cap	PP
Sealing	Silicone, EPDM,NBR, FKM,Teflon,E-FKM

## Dimension

Outer Diameter	69mm
Length	5", 10", 20", 30", 40"

## Performance

Max Operating Temperature	80°C
Max Operating DP	4.0 Bar @ 20°C 2.4 Bar @ 80°C

## Sterilization

Autoclave Sterilization	121°C, 60Min
SIP	125°C, 30Min

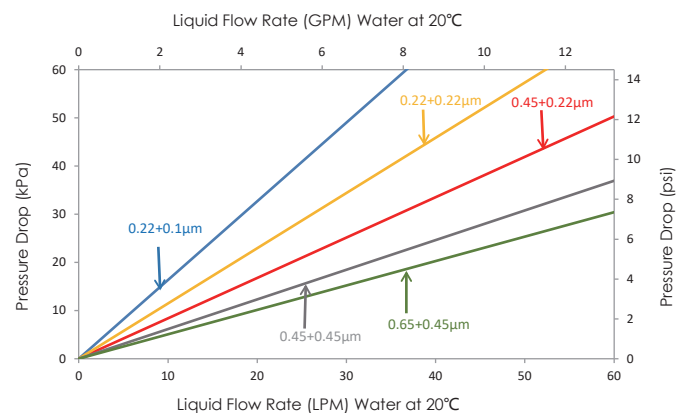
## Filtration Area

Ø 69mm	0.65m <sup>2</sup> /10"
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## Extractables

10" Filter Cartridges < 20mg

### PAD Flow Rate Per 10"



## Applications

- Biological vaccine/blood products sterilization filtration
- API sterilization filtration
- Large infusion (LVP), small injection (SVP) sterilization filtration
- Ophthalmic preparation sterilization filtration
- Buffers and reagents sterilization filtration

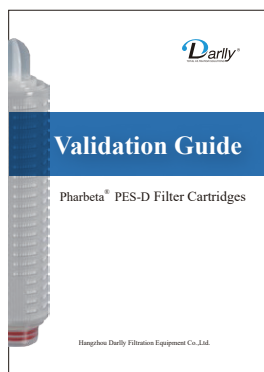
## Quality

- Validated with *B. diminuta* (ATCC 191463) at 10<sup>7</sup>/cm<sup>2</sup> (0.22μm).
- Each membrane filter element has been individually tested for integrity.
- Individual element is tracked by serial number.
- Manufactured according to ISO 9001:2015 certified quality management system.
- Meets USP Biological Reactivity Test requirements of the current USP <88> for plastic class VI-121°C.

## Effluent quality

- Non-fiber releasing
- Non-pyrogenic per USP Bacterial Endotoxins (<0.25EV/mL)
- Meets TOC and water conductivity per USP Purified Water, pH per USP Sterile Purified Water.

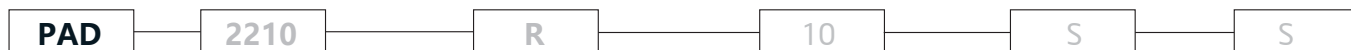
## Validation Guide



## Integrity Test

Removal Rating	Bubble Point $\geq$ (Water)	Diffusion Flow $\leq$ (10" Ø69mm)
2210 = 0.22+0.1	4.8Bar	25ml/min@4.475Bar
2222 = 0.22+0.22	3.2Bar	20ml/min@2.76Bar
4522 = 0.45+ 0.22	3.2Bar	25ml/min@2.76Bar
4545 = 0.45+0.45	2.1Bar	20ml/min@1.70Bar
6545 = 0.65+0.45	2.1Bar	25ml/min@1.70Bar

## Ordering Information



Removal Rating	End Cap Type		Length	Seal Material	Core
2210 = 0.22+0.1	F = DOE	K = 222 Extended (SS Insert) / Fin	5 = 5"	S = Silicone	P = PP Core
2222 = 0.22+0.22	M = 222 / Flat	R = 226 (SS Insert) / Fin	10 = 10"	E = EPDM	S = SS Core
4522 = 0.45+0.22	T = 226 / Flat	V = 226 (SS Insert) / Flat	20 = 20"	B = NBR	
4545 = 0.45+0.45	P = 222 / Fin	J = 222 Extended (SS Insert) / Flat	30 = 30"	V = FKM	
6545 = 0.65+0.45	Q = 226 / Fin	G = 226 (PSU Insert) / Fin	40 = 40"	F = E-FKM	
	H = 213 / Flat	I = 226 (PSU Insert) / Flat			
	E = 222 Extended / Fin	X = 222 (SS Insert) / Spear Fin			
	N = 222 Extended / Flat	Y = 226 Spear Fin			
	W = 222 Spear Fin	Z = 226 (SS Insert) / Spear Fin			

DISCLAIMER: Filtration data presented is representative of performance observed in controlled laboratory testing. It is not given as a warranty, specification or statement of fitness for use. Specific performance can vary widely depending on contaminant type, fluid properties, flow rates and environmental conditions. It is recommended that users conduct thorough qualification testing to assure the product functions as required.

