

# Bevflo PVDF



- \* Easy integrity testable in situ
- \* Repeatedly steamable in situ and in autoclave
- \* Thermowelded construction
- \* EC-listed materials for Food contact
- \* FDA-listed materials per 21 CFR
- Bio-Safety per USP-Plastics

The new Bevflo PVDF filter element is a perfect combination between the PVDF membrane with enhanced hydrophilic characteristic and the polypropylene stratification with its high mechanical resistance.

The Bevflo PVDF filter element has been designed to meet the high standard quality and safety requirements for the most critical application of enology and beverages applications.

This filter element assures the microbiology stability and remove all the contaminants not welcome during the bottling activity, keeping the original color, flavor and scent of the filtered product.

The controlled porosity together with the high resistance to heat sterilization, the chemical compatibility and the resistance to mechanical strengths are the highlights of this new filter elements series.

Its enhanced service life and the easy regenerations activity even using soda, contributes to a great cost reduction specially when treating fluids with high colloidal burden.

Typical applications are all the soft drinks, water, wine, cider and raw beer. The manufacturing is performed in a controlled environment; all the filter elements are 100% integrity tested and verified in production.

The filter element is available in 0.2, 0.45 and 0.65 micron configuration.



MATERIALS OF CONSTRUCTION			
Filter media	Hydrophilic PVDF		
Upstream supports	Polypropylene		
Downstream supports	Polypropylene		
Internal Core	Polypropylene		
External Cage	Polypropylene		
End caps	Polypropylene		

#### **FOOD-SAFETY**

Bevflo PVDF filter element materialsmeet (EU) regulation 10/2011 and its amendments, regulations (EC) 1935/2004 and 1895/2005

## **BIO-SAFETY**

Filter media and components pass USP Class VI Biological Reactivity and Chemical-Phisical tests for USP plastics.

### **QUALITY STANDARDS**

Produced under a certified Quality Sistem to guarantee traceability of manufacturing records and integrity testing results

# RECOMMENDED OPERATING CONDITIONS

max. continuous temperature	85 °C
max. cumulative time of steam sterilisation	80 hours at 125 °C with cycles of 60 minutes /> 100 hours at 121 °C
sanitisation with hot water	90 °C max
sanitisation with chemicals	Can be sanitized by standard chemical agents
max. differential pressure	5,0 bar at 25 °C-2,5 bar 80 °C-0,3 bar 135 °C
recommended change out differential pressure	2.0 bar at 25 °C
re generation	NaOH solution up to 2% at 80 °C

CODE Absolute filtration rating in liquids	Max. decay value*	Acceptable limit for diffusion flow test
	8 of 30" cartridges	with water for 10" cartridge (ml/min)
0,2 μm	≤ 0,12 bar	≤ 20 @ 1,6 bar
0,45 μm	≤ 0,12 bar	≤ 25 @ 1,2 bar
0,65 μm	≤ 0,11 bar	≤ 22 @ 0.9 bar
	rating in liquids 0,2 μm 0,45 μm	rating in liquids 8 of 30" cartridges  0,2 μm ≤ 0,12 bar  0,45 μm ≤ 0,12 bar

<sup>\*</sup> The values are related to 5 minutes and are indicative as they depend on the housing volume upstream the filter element.

# MAX FLOW RATE FOR 30" CARTRIDGES

CODE	L/H	
0,2	1000	
0,45	1500	
0,65	2000	

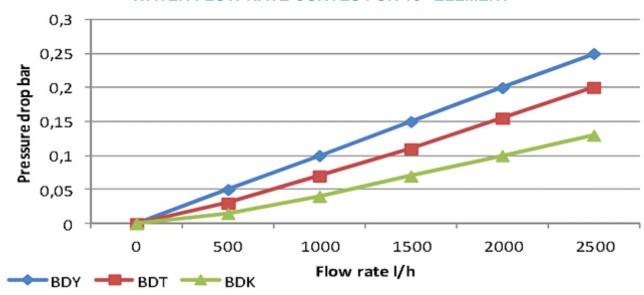
#### **BACTERIAL RETENTION**

CODE	FILTRATION RATING	* BACTERIAL RETENTION > 10 <sup>7</sup> PER cm <sup>2</sup>
	0,2 μm	Pseudomonas aeruginosa / Escherichia coli / Enterobacteriacee
	0,45 µm	Oenococcus oeni / Saccharomyces cerevisiae / Brettanomyces bruxellensis / Lactobacilius brevis / Oocystes cryptosporidium / Giardia / Pediococcus damnosus
	0,65 μm	Saccharomyces cerevisiae /Brettanomyces bruxellensis

<sup>\*</sup> Secondo ASTM F838-15



## **WATER FLOW RATE CURVES FOR 10" ELEMENT**



# Ordering Information

Name	Micron Rating	Nominal Length	End Cap Type	Seal Type	Special
Bevflo PVDF	0.2	10"	03	S - Silicone	Biological grade
	0.45 μm	20"	04 - DOE	V - Viton	tested and
	0.65 μm	30"	07	E - EPDM	preflushed
		40"	08		
			28		

Data contained in this bulletin are informative and subject to change without notice. User is responsible for determining whether the product is fit for particular purpose and suitable for User's method of application.

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