

HT TefloGas® Filter Cartridges

Hydrophobic PTFE Membrane · Sterile-Grade Filter for Critical Gas Filtration

HT TefloGas® Filter Cartridges are composed of a PTFE membrane with advanced high-temperature-resistant core and internal adaptor. They are specially designed for air, gas, and vent sterile filtration at critically high temperatures.

Features and Benefits

- Designed for Water Intrusion Test (requires no alcohol)
- Oxidation-resistant materials provides longer service life in high temperature air and vent applications
- Exceptionally high flow rates with low pressure drops
- Part/Serial number are laser-etched and have 2D matrix code for easy tracking
- Filter construction provides steam resistance at high temperatures

Quality Standards

- Bacterial quantitative retention of 10^7 CFU/cm² Brevundimonas Diminuta(ATCC 19146) according to ASTM F838 methodology .
- 100% Integrity testing in manufacturing .
- Each filter is fully traceable with unique serial number .
- Manufactured in a facility which adheres to ISO 9001:2015 Practices .
- Full Regulatory Compliance with following :
 - Bacterial Endotoxin :Aqueous extraction of autoclaved filter contains <0.25 EU/ml as determined by Limulus Amebocyte Lysate (LAL),USP<85>.
 - Non-fiber Releasing :Component materials meet the criteria for a " Non-fiber-releasing filter " as defined in 21 CFR 210.3(b)(6).
 - Component Material Toxicity :Meet the requirement of USP <87> In Vitro Cytotoxicity Test ; Meet the Criteria of USP<88> Biological Reactivity Test for Class VI-121 C plastics
 - TOC/Conductivity at 25 °C : Autoclaved filter effluent meet the USP<643> for Total Organic Carbon and USP<645> for Water Conductivity per WFI requirements after a UPW flush of specified volume .
 - Particle Shedding : Autoclaved filter effluent meet the USP<788>for large volume Injections .
 - Indirect Food Additive: All component materials meet the FDA Indirect Food Additive requirements cited in 21 CFR 177-182 , and EU framework regulation [1935/2004/EC].

Typical Applications

- Autoclaves
- Fermented Inlet Air
- Aseptic Packaging/Blow-fill Seal (BFS)
- Hot Water for Injection (WFI) Tank Vents
- Oxygen-rich Fermented Air



Materials of Construction

Filter Media	Hydrophobic PTFE Membrane
Support/Drainage Layers	Polyphenylenesulphide (PPS)
Core/Cage/Endcaps	Polypropylene

Operating Conditions

Max.Operating Pressure	6.9 bar (100 psi) at 25 °C 4.0 bar (58 psi) at 60 °C 2.4 bar (35 psi) at 80 °C
Max. Differential Pressure	Forward 6.9 bar (100 psi) at 25 °C 4.0 bar (58 psi) at 60 °C 2.4 bar (35 psi) at 80 °C Reverse 3.0 bar (44 psi) at 25 °C 1.0 bar (15 psi) at 80 °C
Effective Filtration Area	0.68m ² / Φ 68-10 inch

Sterilization

In-line Steam Sterilization	Up to 100 forward cycles and 50 reverse cycles (145 °C for 30 min < 0.3 bar per cycle)
Autoclave	up to 400 cycles (130°C for 30min per cycle)

Integrity Test Data

Bubble Point	BP : ≥0.11Mpa (60%/40%IPA/Water), 0.01µm
Diffusion Flow	DF : ≤ 16ml/min/10" cartridge@80KPa(60%/40%IPA/Water), 0.01µm
Water Intrusion Test	WFT : ≤0.53ml/min/10" cartridge@0.25MPa,0.01µm

Ordering Information

HSGPFP	Removal Ratings	End Cap	Nominal Length	Seal Material	-P
	0001=0.01 µm	HSC=226 /Fin (PBT Insert)	10=10"	S=Silicone	
	0022=0.22 µm	HSC=226 /Flat (PBT Insert)	20=20"	E=EPDM	
		HTF=222 /Fin (PBT Insert)	30=30"	V=Viton	
		HTC=222 /Flat (PBT Insert)	40=40"	P=PFA/Viton	
		DOE=Double Open End		K=PTFE	

Flow Rate Characteristics

