

UltiKleen™ G2 STP Filter and KC Assemblies

Description

The Pall UltiKleen STP filter is specifically engineered for filtering organic stripper. In the organic stripping process, a variety of sizes and types of gels and particles are generated as a result of the various ashing processes. The ashing can change the gels to a distribution of fine particles. These fine particles can quickly clog conventional design high surface area membrane filters.

The UltiKleen STP filter is the latest advance in Pall Corporation's stripper filtration offerings. It uses a combination of carefully controlled submicron filter media. The filter is further optimized with gel-capturing, depth matrix media to effectively filter organic stripper. The proprietary media layering construction maintains high flows while removing unwanted particles and gels.

- Excellent gel retention
- High flow rates
- Low extractables (< 25 ppb in a 5 % HCl extraction of 1.5 L for 24 hours)
- Downstream vent option with G2 KC assembly
- Multilayer filter media design
- All fluoropolymer construction
- 100% integrity tested
- Long service life



UltiKleen G2 STP Filter



UltiKleen G2 STP KC Assemblies

Specifications

Materials of Construction

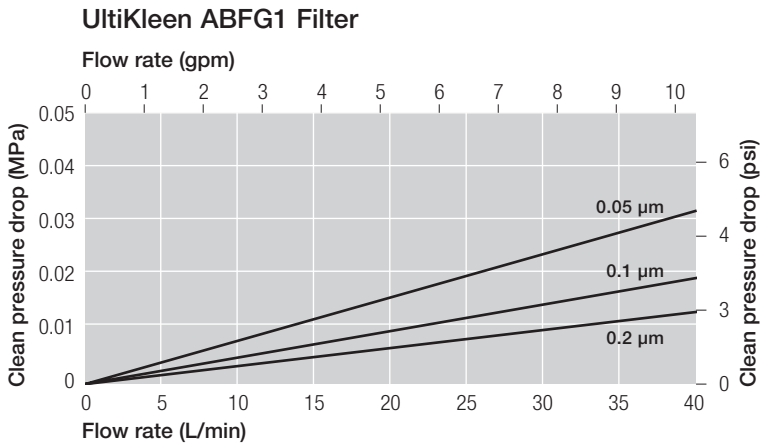
Components	Materials
Filter Medium	PTFE
Media Support	PFA
Inner Core / Outer Cage	PFA
End Caps	PFA
O-ring (for cartridge)	FEP Encapsulated fluoroelastomer
Housing (for KC type)	PFA

Removal Ratings and Operating Conditions

Removal Ratings	0.05 µm, 0.1 µm, 0.2 µm	
Configurations	Cartridge	254 mm / 10 inch
	KC (Kleen-Change®)	T flow, In-line
Nominal Filter Area	10 inch	1.7 m ² / 18.3 ft ²
Maximum Operating Temperature		170 °C / 338 °F
Maximum Forward Differential Pressure (Cartridge)		0.6 MPaG @ 50 °C / 87 psig @ 122 °F
Maximum Operating Pressure (KC Assemblies)		0.49 MPaG < 25 °C / 71 psig < 77 °F
		0.39 MPaG < 60 °C / 57 psig < 140 °F
		0.34 MPaG < 90 °C / 49 psig < 194 °F
		0.20 MPaG < 120 °C / 29 psig < 248 °F
		0.15 MPaG < 150 °C / 22 psig < 302 °F
		0.12 MPaG < 170 °C / 17 psig < 338 °F

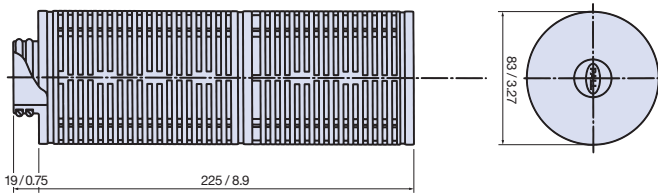
UltiKleen™ G2 STP Filter

Pressure Drop vs. Liquid flow Rate (Water, 20°C)¹



¹ Typical flow rates.
 For liquids other than water, multiply the differential pressure by fluid viscosity in centipoise.
 Unit conversion: 1 bar = 0.1 MPa

Dimensions²



² Nominal length (mm / in)

Part Numbers / Ordering Information

ABFG 1 STQ 2 3E 3 4

Table 1

Code	Nominal Length	
	Inch	L (mm)
1	10	225

Table 2

Code	Removal Ratings
D	0.05 µm
T	0.1 µm
R	0.2 µm

Table 3

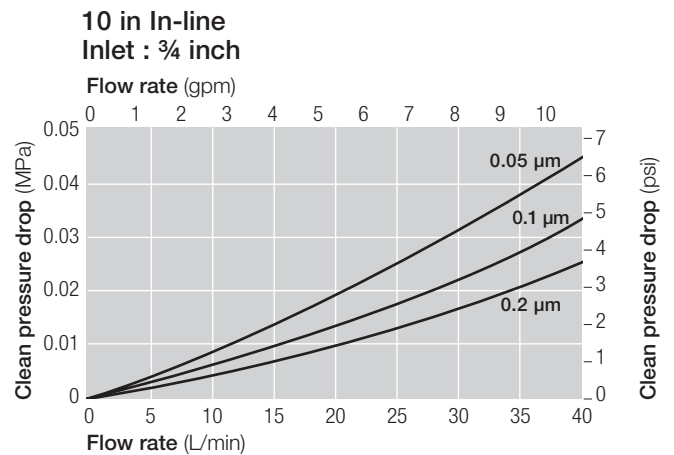
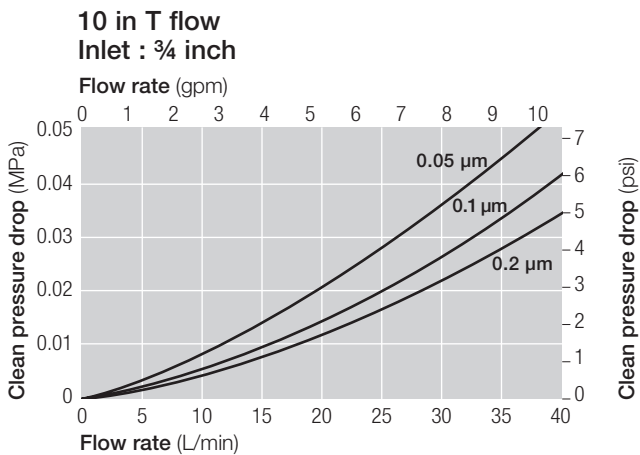
Code	O-ring options
H1	FEP encapsulated fluoroelastomer
H11	Kalrez ^{™2}

Table 4

Code	Prewet Option
-K3	Prewet filter (packaged in DI water)
-K7	Prewet filter (packaged in DI water), Low metal extractables ³

UltiKleen™ G2 STP KC Assemblies

Pressure Drop vs. Liquid flow Rate (Water, 20°C)¹



¹ Typical flow rates.
 For liquids other than water, multiply the differential pressure by fluid viscosity in centipoise.
 Unit conversion: 1 bar = 0.1 MPa

Part Numbers / Ordering Information

LDF 1 2 1STQ 3 4 E 5 6

Table 1

Code	Downstream Venting
G	N/A
V	Available

Table 2

Code	Flow
T	T-flow
N	In-line
L	L-flow

Table 3

Code	Removal Ratings
D	0.05 µm
T	0.1 µm
R	0.2 µm

Table 4

Code	Inlet/Outlet	Vent/Drain		Memo
		Head end	Bowl end	
12	¾ in male	½ in male	½ in male	T-flow / L-flow
12	¾ in male	½ in male	½ in female	Downstream venting-type
12	¾ in male	⅜ in male	⅜ in male	In-line
124	¾ in male	¼ in male	¼ in male	In-line
128	¾ in male	½ in male	½ in male	Downstream venting-type
13	¾ in female	½ in female	½ in female	T-flow
16	1 in male	½ in male	½ in male	T-flow
16	1 in male	½ in male	½ in female	Downstream venting-type
16	1 in male	⅜ in male	⅜ in male	In-line
164	1 in male	¼ in male	¼ in male	In-line
168	1 in male	½ in male	½ in male	Downstream venting-type
17	1 in female	½ in female	½ in female	In-line

Table 5

Code Connections

Code	Connections
0	Non-connection
1	20 series (Flowell)
2	Super Pillar Type (Nippon Pillar) ⁴
51	Flare style
6	FinalLock ⁵
71	Super Pillar 300 P series (Nippon Pillar)
72	Super Pillar 300 P series L type (Nippon Pillar)
8	60 series (Flowell)
9	11CR series (Flowell)

² Kalrez is a trade mark of E.I. du Pont de Nemours and Company

³ Please contact Pall on the extractable conditions

⁴ Pillar is a trademark of Nippon Pillar Packing Co.

⁵ FinalLock is a trademark of Kurabo Industries Ltd.

⁶ Please contact Pall on the extractable conditions.

⁷ Part numbers in combination with all codes are not always available.

Please contact Pall for the part number availability.

Table 6

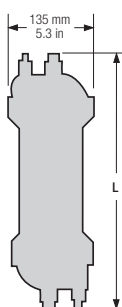
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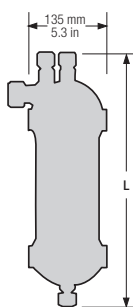
Dimensions by Configuration G2 Kleen-Change® Assembly (LDFG/LDFV)

In-Line	Nominal Length (L) (mm / in)	T-flow	Nominal Length (L) (mm / in)	VT-style	Nominal Length (L) (mm / in)	L-flow	Nominal Length (L) (mm / in)
12E2	396.5 / 15.6	12E2	408 / 16.1	12E2	377 / 14.8	12E2	408 / 16.1
12E51	412 / 16.2	12E71	403 / 15.9	128E2	385 / 15.2	VL-style	Nominal Length (L) (mm / in)
124E51	412 / 16.2	13E0	495 / 19.5	12E71	377 / 14.8		
16E8	428 / 16.9	13E1	432 / 17	12E72	377 / 14.8	12E2	440 / 17.35
16E51	436 / 17.2	13E2	442 / 17.4	128E71	402 / 15.8		
17E0	448 / 17.6	13E6	416 / 16.4	128E72	402 / 15.8		
17E1	445 / 17.7	13E9	433 / 17.1	13E1	445 / 17.5		
17E51	442 / 17.4	13E51	473 / 18.6	13E51	444 / 17.4		
17E71	462 / 18.2	13E71	444 / 17.5	168E71	403 / 15.9		
				168E72	403 / 15.9		

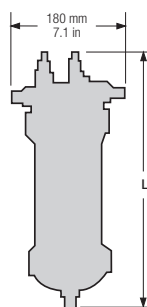
In-Line



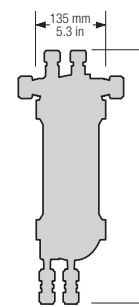
L-Flow



T-Flow



T-Flow Downstream Vent





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