

Stainless Steel High Pressure



A comprehensive range of high efficiency, high pressure filters ideal for a wide variety of specialist applications.

With 21 models and 3 pressure ranges to choose from, our range of stainless steel high pressure filters is comprehensive. The range is precision engineered with high pressure applications in mind.

Manufactured from high grade 316 stainless steel and specially coated carbon steel, the range offers varied flow rate capacities at 50, 100 and 350 barg (725, 1450 and 5000 psig).

50, 100 and 350 barg

The 50 barg range incorporates unique push-fit elements which are colour coded for ease of grade identification. The 100 and 350 barg ranges incorporate a high performance stainless steel end capped element.

Walker Filtration are able to offer 25, 5, 1 and 0.01 micron and activated carbon filtration grades to encompass all requirements. The custom engineered filter media is designed to offer high efficiency filtration with minimal pressure drop.

Low air velocities prevent oil carry-over to guarantee performance.

This range of housings can also be adapted to operate as water separators.

Independently tested and verified to international standard ISO 12500-1:2007 and in accordance with NACE MR 01-75.



Applications include

Chemical

Food & Beverage

Manufacturing

Military

Oil & Gas

Pharmaceutical



THE QUEEN'S AWARDS
FOR ENTERPRISE
INTERNATIONAL TRADE
2006





Technical Specification

filter model	pipe size	flow rate		dimensions (mm)				weight Kg	element model
		Nm³/h	SCFM	A	B	C	D		
50 barg (725 psig) maximum working pressure									
C25 (grade)	¼	100	60	85	18	170	75	1.7	E50 (grade)
C37 (grade)	⅜	200	120	85	18	205	100	2.0	E51 (grade)
C50 (grade)	½	340	200	85	18	255	100	2.2	E52 (grade)
C75 (grade)	¾	500	300	110	27	270	150	4.0	E715 (grade)
C101 (grade)	1	1000	600	110	27	420	300	5.0	E730 (grade)
C150 (grade)	1½	1700	1000	150	45	525	300	15.0	E830 (grade)
C200 (grade)	2	2040	1200	150	45	525	300	15.0	E830 (grade)
C201 (grade)	2	3400	2000	150	45	825	500	21.0	E86 (grade)

100 barg (1450 psig) maximum working pressure									
100HP24 (grade)	¼	100	60	65	20	135	70	3.2	HP371 (grade)
100HP49 (grade)	½	315	185	65	20	250	180	5.6	HP381 (grade)
100HP75 (grade)	¾	460	270	88	20	275	250	6.1	HP420 (grade)
100HP100 (grade)	1	680	400	132	26	265	150	10.5	HP710 (grade)
100HP101 (grade)	1	1200	700	132	26	480	300	14.7	HP730 (grade)
100HP150 (grade)	1½	1700	1000	150	45	525	300	22.0	HP830 (grade)
100HP200 (grade)	2	3400	2000	150	45	825	500	28.0	HP860 (grade)

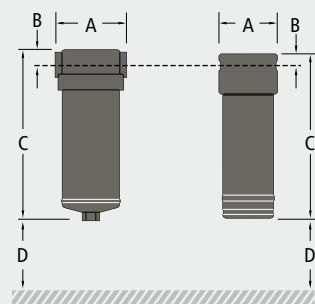
350 barg (5000 psig) maximum working pressure									
350HP24 (grade)	¼	48	28	41	10	103	60	1.6	HP261 (grade)
350HP26 (grade)	¼	111	67	65	20	135	70	3.2	HP371 (grade)
350HP50 (grade)	½	255	150	88	20	210	150	5.6	HP410 (grade)
350HP75 (grade)	¾	510	300	88	25	280	250	6.1	HP420 (grade)
350HP100 (grade)	1	750	445	150	35	330	200	14.5	HP710 (grade)
350HP101 (grade)	1	1330	775	150	35	480	300	17.4	HP730 (grade)

Coalescing filter element grades

Grade	WS		X25		X5		X1		XA		AC	
Particle removal	-		25 micron		5 micron		1 micron		0.01 micron		0.01 micron	
Maximum oil carryover at 20°C (68°F)	-		10 mg/m³	8.2 ppm	5 mg/m³	4.1 ppm	0.1 mg/m³	0.1 ppm	0.01 mg/m³	0.01 ppm	0.003 mg/m³	0.003 ppm
Maximum temperature	120°C	248°F	120°C	248°F	120°C	248°F	120°C	248°F	120°C	248°F	25°C	77°F
Element end cap material	stainless steel											

Dust filter element grades

Grade	RX25		RX5		RX1		RXA		RAC	
Particle removal	25 micron		5 micron		1 micron		0.01 micron		0.01 micron	
Maximum oil carryover at 20°C (68°F)	-		-	-	-	-	-	-	0.003 mg/m³	0.003 ppm
Maximum temperature	120°C	248°F	120°C	248°F	120°C	248°F	120°C	248°F	25°C	77°F
Element end cap material	stainless steel									



C25 (grade) to C201 (grade) | 100HP24 (grade) to 350HP101 (grade)

Operating pressure	barg	4	6	8	10	15	20	30	40	50
50 barg (725 psig)	psi	58	87	116	145	220	290	435	580	725
Correction factor		0.14	0.22	0.28	0.34	0.47	0.56	0.7	0.85	1.00
Operating pressure	barg	20	30	40	50	60	70	80	90	100
100 barg (1450 psig)	psi	290	435	580	725	870	1015	1160	1300	1450
Correction factor		0.45	0.57	0.68	0.80	0.84	0.88	0.92	0.96	1.00
Operating pressure	barg	50	100	150	200	250	300	350		
350 barg (5000 psig)	psi	725	1450	2175	2900	3625	4350	5000		
Correction factor		0.73	0.78	0.82	0.87	0.91	0.96	1.00		

technical notes

- Direction of air flow is inside to out through filter elements for coalescing grades and outside to in for dust grades.
- All high pressure filters are supplied with a drain plug. High pressure drains are available.
- Activated carbon filters must not operate in oil saturated conditions and will not remove certain types of gases including carbon monoxide (CO) and carbon dioxide (CO₂).
- Threaded filters are PED 97/23/EC compliant for group 2 gases.
- Threaded connections are Rp (BSP parallel) to ISO 7/1 or NPT to ANSI B2.1 if supplied within North America, with the following exceptions: 100HP24, 100HP49, 350HP24 and 350HP26 are NPT.
- For NPT connections, add the suffix N e.g. C75SSX5N.
- Filter elements should be changed every 12 months / 8000 hours (whichever comes first). Activated carbon filter elements should be changed every 6 months / 1000 hours (whichever comes first).