

**High dust loading capacity -
long cartridge life
Good for temperatures to 450° F
(232° C)
Removes all solid particles one
micron and larger**

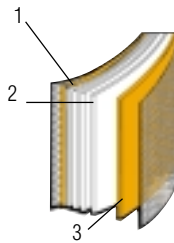
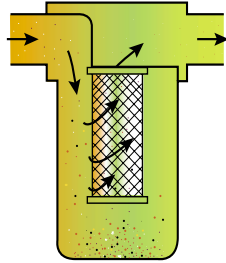
Hankison® HTA Series high temperature afterfilters are designed to hold a large amount of desiccant fines without plugging. The result is long cartridge life, even when installed downstream of heated type dryers using highly friable desiccant.

Operation

Three filtration techniques maximize cartridge life

Gravitational Setting

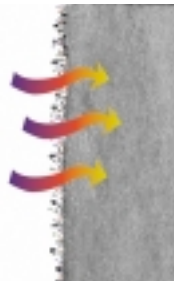
Compressed air leaves a desiccant dryer containing dust concentrations typically in the range of up to 0.05 ppm by weight in heatless type dryers and up to 5 ppm by weight in heated type dryers. Particle size ranges from 200 microns to about 1 micron. This desiccant laden compressed air enters the filter housing where a reduction in air velocity and a sharp change of direction cause particles in the range of 200 to 20 microns to drop to the bottom of the housing.



Surface Filtration

The air stream then enters the outside of the filter cartridge and flows through a layer of glass fabric cloth (1). Small diameter fibers, which form a web in the openings between thread strands, cause a dust layer to form as dust bridges the pores. Dust continues to collect on the outside of the cloth as separate loose particles. The voids between these particles form pores and flow-passages and become an efficient filter in itself.

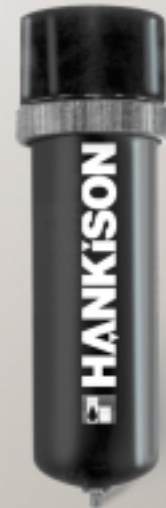
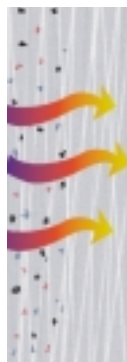
As the dust bed continues to thicken it reaches a point where outer layers of dust shed off the cartridge into the bottom of the housing.



In-Depth Fibrous Filtration

Air next travels through a multi-layer graded in-depth filter media (2) where all remaining fines one micron and larger are captured.

A final wrap of glass fabric cloth (3) prevents fiber migration.



HTA SERIES

HIGH

TEMPERATURE

AFTERFILTER

HTA Series High Temperature Afterfilter

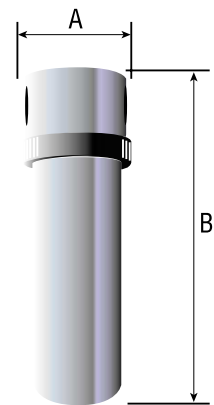
Model Number	Max. Flow @ 100 psig (7 kgf/cm ²)		Housing Type	MWP (1) @ 450°F (232°C) psig (kgf/cm ²)	In/Out Connection	Dimensions in (mm)		Weight lb (kg)	Replacement Cartridge No.	Qty Reqd.
	scfm	m ³ /min				A	B			
HTA100	100	2.8	Head/Bowl	250 (17.6)	1" NPT	4.25 (108)	14.31 (364)	13 (5.9)	0740-1	1
HTA200	200	5.7	Head/Bowl	250 (17.6)	1" NPT	4.25 (108)	23.81 (605)	19 (8.6)	0740-2	1
HTA400	400	11	Pressure Vessel	165 (11.6)	3" NPT	10.25 (260)	39.56 (1005)	95 (43)	0740-3	1
HTA600	600	17	Pressure Vessel	165 (11.6)	3" NPT	10.25 (260)	39.56 (1005)	95 (43)	0740-4	1
HTA1200	1200	34	Pressure Vessel	165 (11.6)	3" NPT	16.00 (406)	41.44 (1053)	159 (72)	0740-4	2
HTA1800	1800	51	Pressure Vessel	165 (11.6)	3" NPT	16.25 (413)	43.25 (1099)	219 (99)	0740-4	3
HTA2400	2400	68	Pressure Vessel	165 (11.6)	4" ANSI Flange	20.00 (508)	54.69 (1389)	236 (107)	0740-4	4
HTA3000	3000	85	Pressure Vessel	165 (11.6)	4" ANSI Flange	20.00 (508)	54.69 (1389)	239 (108)	0740-4	5
HTA4800	4800	136	Pressure Vessel	165 (11.6)	6" ANSI Flange	24.00 (610)	53.00 (1346)	319 (145)	0740-4	8
HTA6600	6600	187	Pressure Vessel	165 (11.6)	6" ANSI Flange	28.00 (711)	62.00 (1575)	548 (249)	0740-4	11
HTA8400	8400	238	Pressure Vessel	165 (11.6)	6" ANSI Flange	28.00 (711)	62.00 (1575)	548 (249)	0740-4	14
HTA11400	11400	323	Pressure Vessel	165 (11.6)	8" ANSI Flange	33.00 (838)	68.19 (1732)	772 (350)	0740-4	19

(1) Units with higher MWP are available; contact factory. Model HTA1200 and larger are ASME code constructed and stamped.

Pressure drop: At rated flow conditions pressure drop will be less than 1 psid (0.07 kgf/cm²). Pressure drop will increase only as the filter cartridges become loaded with solid particles.

Filter cartridge replacement: Filter cartridges should be replaced when pressure drop across the cartridge exceeds 10 psid (0.7 kgf/cm²).

Maximum temperature: 450°F (232°C)



Sizing

To find the maximum flow at pressures other than 100 psig (7 kgf/cm²), multiply the flow (from table above) by the correction factor corresponding to the minimum pressure at the inlet of the filter. Do not select filters by pipe size; use flow rate and operating pressure.

Minimum Inlet Pressure	psig kgf/cm ²	20	30	40	60	80	100	120	150	200	250
		1.4	2.1	2.8	4.2	5.6	7.0	8.4	10.5	14.1	17.6
Correction Factor		0.30	0.39	0.48	0.65	0.82	1.00	1.17	1.43	1.87	2.31

