

# AB - AA

## DELTA series absolute filters for unidirectional flows

Product	AB	AA
MPPS efficiency*	99,995 %	99,9995 %
CEN EN 1822 classification	H 14	U 15
Suggested final pressure drop	400 Pa	400 Pa
Maximum pressure drop	600 Pa	600 Pa
Maximum operating temperature	70 °C	70 °C
Maximum relative humidity	90 %	90 %

\* Average efficiency Punctual efficiency has an admitted penetration rate 5 times higher.

Delta AB – AA absolute filters are mini-pleated, not very deep, for unidirectional flow system applications. AB models are produced in a wide range of sizes with air flow rates ranging from 65 to 2700 m<sup>3</sup>/h. All the filters have an extruded anodized aluminium frame, 69 mm deep, with white epoxy painted micro-drawn steel protection grids. The filtration splitter is in micro-fiber glass, water-proof and fire-proof; the small pleats are fitted with thermoplastic

continuous separators, whereas the sealant is made of polyurethane. The filters are also fitted with a one piece gasket. Low pressure drop levels limit fan energy consumption levels. All the filters are individually tested and labeled to indicate performance levels.

ceilings or walls compliant with the project surface requirements to reach the desired air cleanliness levels in the work space. The numerous sizes available allow you to solve all system situations.

**Applications** AB – AA filters are suitable for controlled contamination unidirectional flows. They can be used to create filtration

**Installation** AB – AA filters can be installed vertically or horizontally in proper frames. They are very light and this makes installation operations very easy and quick.

Type	Sizes (mm)			Nominal air flow rate Q.		Filtering surface m <sup>2</sup>	Initial pressure drop Pa	
	A	B	C	m <sup>3</sup> /h	m <sup>3</sup> /sx10 <sup>-3*</sup>		AB	AA
AB - AA 2	203	x 203	x 69	65	18	1	120	-
3	305	x 305	x 69	150	42	2,5	120	-
42	305	x 610	x 69	300	84	5	120	145
33	305	x 762	x 69	375	105	6	120	-
34	305	x 915	x 69	450	125	7	120	-
43	457	x 457	x 69	340	95	5,5	120	-
41	457	x 610	x 69	450	125	7	120	-
44	515	x 515	x 69	450	125	7	120	-
4	610	x 610	x 69	600	167	10	120	145
7	762	x 610	x 69	750	209	12	120	145
8	915	x 610	x 69	900	250	14	120	145
9	1219	x 610	x 69	1200	333	20	120	145
10	1524	x 610	x 69	1500	417	24	120	145
11	1829	x 610	x 69	1800	500	28	120	145
71	762	x 762	x 69	940	261	15	120	-
72	915	x 762	x 69	1130	314	18	120	-
73	1219	x 762	x 69	1500	418	23	120	-
74	1524	x 762	x 69	1880	523	29	120	-
75	1829	x 762	x 69	2260	627	35	120	-
82	915	x 915	x 69	1360	378	21	120	-
83	1219	x 915	x 69	1800	502	28	120	-
84	1524	x 915	x 69	2260	627	35	120	-
85	1829	x 915	x 69	2700	753	42	120	-



\*1 m<sup>3</sup>/s x 10<sup>-3</sup> = 1 l/s

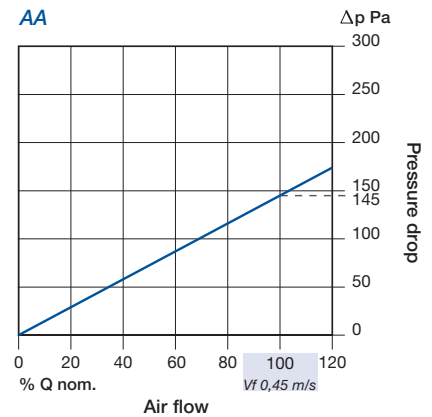
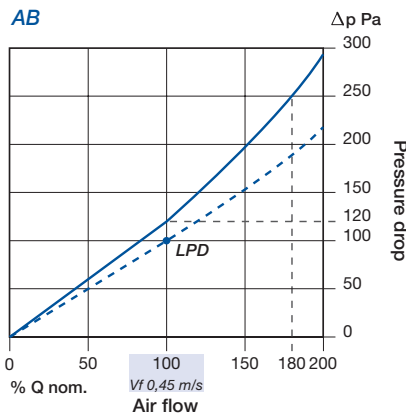
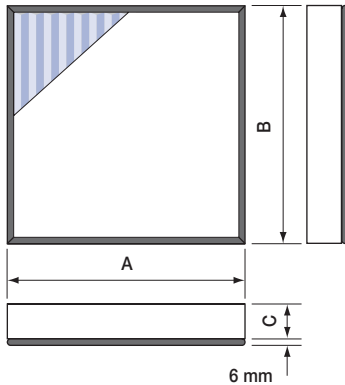
**Special type:** a special version with low pressure drop and an equalized version which guarantees an an uniformity of velocity equal to +/- 5% are available.



# Special types

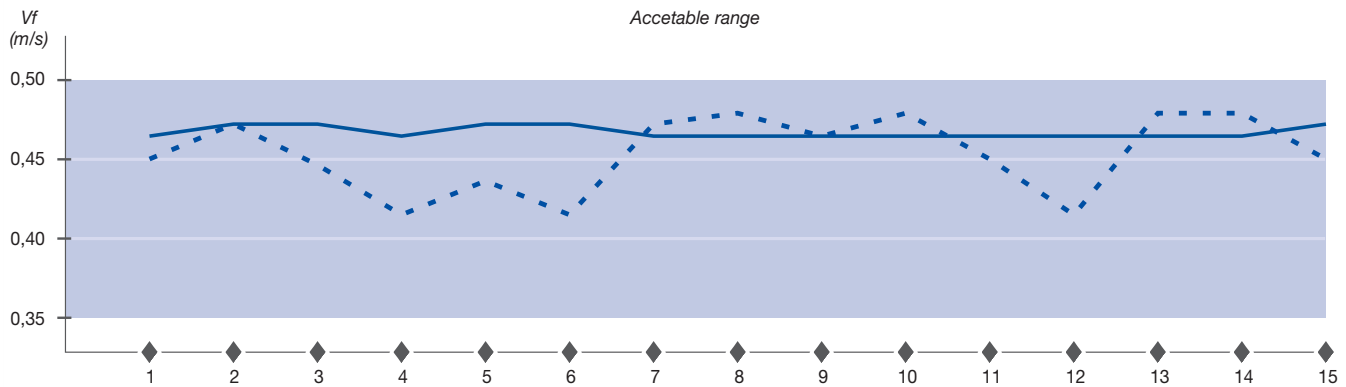
AB - AB DELTA absolute filters for unidirectional flows

## Size - Typical curves



In case filters are used in turbulent flows at a max frontal velocity, the efficiency grade decreases.

## Comparison curve of air diffusion between a traditional mini pleated filter and DELTA-STAR filter with "LV" equalizer



— DELTA-STAR AB9LV  
 - - - DELTA AB9

Note: the measurements have been performed in 3 points on the side 610 mm with 205 mm pitch on the side 1219 mm.

## LV

Thanks to the installation of a special equalizer on the air outlet side, it is possible to reach high air cleanliness levels, according to the various international standards:

- Fed. Std. 209 E
- ISO 14644
- BS 5295
- DIN 12950
- BS 5726
- NF X44

but also a perfect air distribution from the entire surface of the filter, with a flow speed uniformity never before reached with similar filters.

## LPD

DELTA absolute filter, version as for AB filters but with low resistance

- H 14  
Initial pressure drop = 100 Pa
- U 15  
Initial pressure drop = 120 Pa

## AB rls

Absolute filter, inverted liquid seal version with the same technical features of the standard AB-AA model but with GEL gasket.

