

Pocket filters of type PF

Pocket filters of type PF are used for cleaning of supply and recirculation air in general ventilation and air conditioning systems.

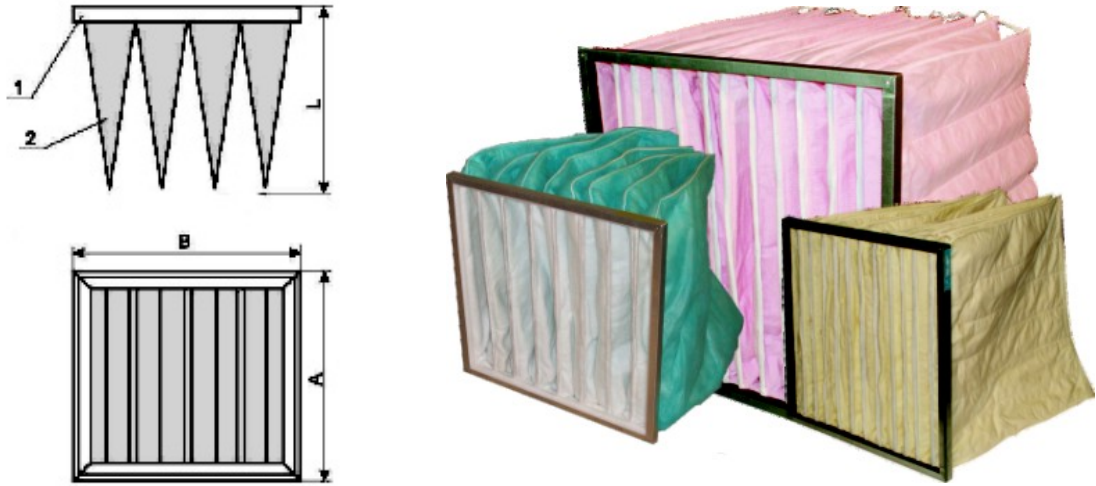


Fig. 1 Scheme of filter PF

GENERAL DESIGN

Filters (fig. 1) consists of metal framework 1 (galvanized steel) and the filter medium tailored as pockets 2. Opposite surfaces of pockets are strapped with limiters that prevent severe blowing and sticking of adjacent pockets. 3.

At cleaning of large volume air these filters can be placed in filtering chamber of pocket filters of type FCPF (Look the catalogue of company “NPP “Folter”)

CHARACTERISTICS

Table 1

Class of filter PF by EN 779	Specific air flow, (q_H), m^3/hm^2	Pressure drop, Pa	
		Initial	Recommended final
G3 (EU3)	10000-11400	20-40	250
G4 (EU4)	10000-11400	40-60	250
F5(EU5)	10000-11400	60-70	450
F6(EU6)	10000-11400	80-90	450
F7(EU7)	10000-11400	90 -110	450
F8/9(EU8/9)	10000-11400	120-140	450

Nominal volume air flow of filter is determined by formula:

$$Q = F_{BX} \times q_H, m^3/h,$$

where F_{BX} – inlet sectional area of filter, m^2 (for standard sizes, see table 2; for nonstandard -product of width and height)

q_H – specific air flow, $m^3/h.m^2$ of inlet sectional area (table 1).

BASIC DIMENSION-TYPES

Table 2

Dimensions at inlet section, mm			Inlet sectional area, m ²	Pocket length L, mm		The number of pockets	
Width, B	Height, A	Digit(s) in index of filter PF		Value	Index digit	Value	Index digit
500	500	0	0,25			5;7	5;7
287	592	1	0,17			3;4	3;4
592	592	2	0,35	300	3	6;8	6;8
490	287	3	0,14	600	6	5;7	5;7
490	592	4	0,29	800	8	5;7	5;7
305	610	5	0,186			3;4	3;4
610	610	6	0,37			6;8	6;8
592	892	7	0,53			6;8	6;8
287	892	8	0,17			3;4	3;4
490	892	9	0,44			5;7	5;7
287	287	01	0,08			3;4	3;4
305	305	05	0,09			3;4	3;4

Other dimension types of filters can be manufactured by request

MARKING

Encoding: PF 3362

3 – filter class G3;

3 – pocket length – 300mm;

6 – the number of pockets – 6;

2 – overall dimensions of inlet section 592 x 592mm (width x height).

There are basic standard dimension-types and parameters of pocket filters in table 2.

By request the filters can be manufactured:

- with different dimensions at inlet section;
- with different pocket length;
- with different number of pockets.

For filters of nonstandard dimension-types:

Encoding: PF F5 535x732 x360 - 5

F5 – filter class;

535x732 – overall dimensions (width x height) of inlet section, mm;

360 – pocket length, mm.;

5 – the number of pockets.

MAINTENANCE

When filters are in operation it is necessary to check their pressure drop by readings of manometer attached to connecting pipes, arranged in walls of air cleaning chambers before and after filters.

Upon reaching pressure difference specified in project, or based on available ventilation system pressure, it is necessary to replace filters.