



Armaturen GmbH

Armaturen, Rohre, Sonderteile aus Edelstahl
Fittings, pipes, special parts of stainless steel

Operating Instructions

Dirt Collecting Filter

M&S Article No. 60600



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2 Symbols used



Danger warnings

Danger warnings are denoted by the danger symbol which appears on the left and are framed.



Information

Descriptions to which particular attention must be paid are denoted by this symbol which appears on the left and are also framed.

3 Sectional drawings

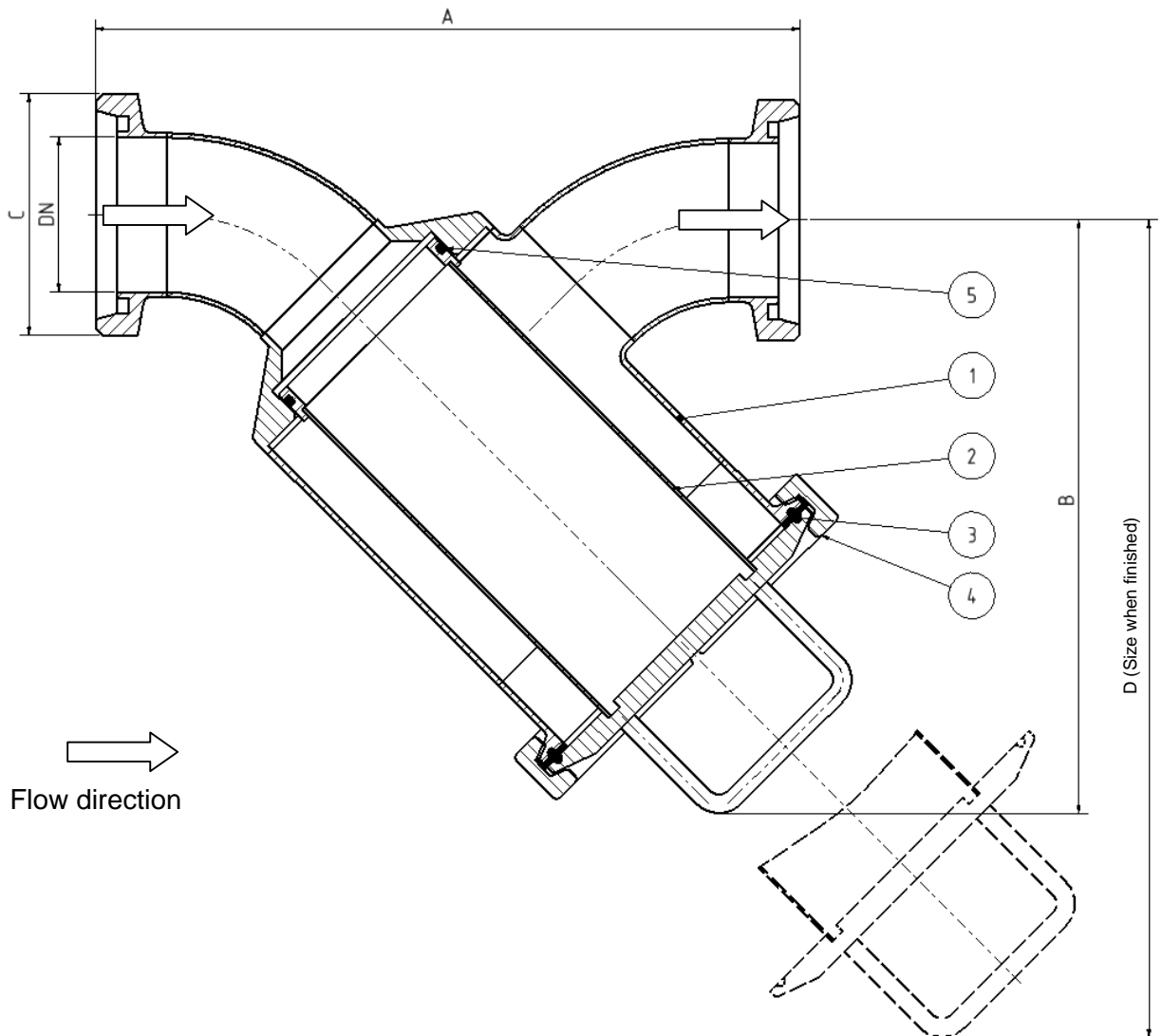


Fig. 1 Sectional view of dirt collecting filter GG

Tab. 1 Parts list of dirt collecting filter GG

Item	Designation
1	Sieve housing
2	Strainer
3	Clamp gasket TC
4	Clamp (solid)
5	O-ring

4 Use and operating principle

The dirt collecting filter acts as filter in process engineering systems. The grade of filtration can be adjusted via the inserted perforated plate (width of hole, spacing). By default, a perforated plate with a width of hole $W = \varnothing 1.5 \text{ mm}$ and a spacing $T = 2.5 \text{ mm}$ is used. The grade of filtration can be increased by covering the screen area with an additional gauze. The dirt collecting filters can in general be equipped with different perforated plates and/or gauzes. By default, the dirt collecting filter is equipped with thread connections. Other connection options (e.g. welded stub) are available upon request.

The medium to be filtered flows axially through the inlet stub into the interior of the strainer, flows through the filter and leaves the strainer via the outlet stub.

5 Transport

5.1 Checking the delivery contents



- When you receive the dirt collecting filter, check the delivery against the order to make sure they correspond.
- Check that the delivery is complete, and check its condition.

If there are visible signs of transit damage and/or packing units are missing notify the forwarding agent immediately in the consignment note. Recourse must be taken against the forwarding agent immediately in writing, and M&S Armaturen GmbH must be informed of this action.

Complaints regarding transit damage that is not immediately evident must be made to the forwarding agent within 6 days.

The recipient must carry the costs for claims made after this period.

5.2 Transport



- The packing units must only be transported using suitable lifting equipment and slinging gear.
- Pay attention to the graphic symbols on the packaging.
- Transport the dirt collecting filter carefully to prevent damage from sudden impacts; exercise due care when loading/unloading.

6 Safety advice



- Before starting the maintenance work, the pipeline system containing the dirt collecting filter must be de-energised pneumatically and be free from fluids!
- For safe maintenance of the dirt collecting filter refer to the installation instructions (chap. 7).

7 Assembly



- Observe the relevant national guidelines and regulations.

The dirt collecting filter must be connected to the supply/drain pipelines via the inlet stub and outlet stub. To do so, screw the pipe ends with the liner DIN 11851 and the corresponding gaskets DIN 11851-G (M&S Art.-No. 111) by means of a grooved nut DIN 11851-F (M&S Art.-No. 110) to the threaded stubs DIN11851 of the sieve housing .

8 Repairs/Maintenance



- The maintenance intervals differ from case to case, the operator should define them by himself basing sporadic checks.
- To replace the gaskets refer to the installation instructions (chap. 7).



- M&S Armaturen GmbH cannot accept liability for claims made as a result of non-observance of these operating instructions or constructional changes to the dirt collecting filter.
- Any other use or use outside the defined scope is considered to be improper use. M&S Armaturen GmbH will not accept liability for losses incurred as a result of improper use.

9 Cleaning



- Before starting the cleaning work, the pipeline system containing the dirt collecting filter must be de-energised pneumatically and be free from fluids!
- For safe maintenance of the dirt collecting filter refer to the installation instructions (chap. 7).

- Loosen the solid clamp (4)
- Pull the strainer (2) out of the sieve housing (1) using the bracket
- Remove the clamp gasket TC (3), clean and/or replace it, if necessary
- Remove the O-ring (5), clean and/or replace it, if necessary
- Clean the strainer (2) and the interior of the sieve housing (1)
- Apply the clamp gasket TC (3)
- Center the strainer (2) and insert it into the sieve housing (1). Make sure that the applied O-ring (5) and the clamp gasket TC (3) are not damaged in this step
- Press on the strainer tightly, apply the solid clamp (4) and tighten it
- Apply pressure to the system and check the screwed unions as well as the clamp connection for tightness

10 Technical Data

10.1 Dimensions

Tab. 2 Dimensions of dirt collecting filter GG

Nominal width DN	A [mm]	B [mm]	C	D [mm]
25	169	135	Rd52x1/6	200
32	175	135	Rd58x1/6	200
40	209	190	Rd65x1/6	300
50	227	190	Rd78x1/6	300
65	232	183	Rd95x1/6	300
80	298	256	Rd110x1/4	400
100	322	252	Rd130x1/4	400

10.2 Information of the open screen area of perforated plates

Tab. 3 Open screen area of perforated plates in [%]

DN	Screen area [m²]	Width of hole / spacing [mm]											
		1.0 / 2.0	1.5 / 2.5*	2.0 / 3.5	3.0 / 5.0	4.0 / 6.0	5.0 / 8.0						
25	0.0093	23	32	30	33	40	35						
32													
40	0.0283												
50													
65													
80	0.0612												
100													

(*) M&S standard

10.3 Information of the open screen area of wire gauze

Tab. 4 Open screen area of wire gauze in [%]

Designation w x D	mesh width w [mm]	wire diameter D [mm]	open screen area A ₀ [%]
0.1 / 0.063*	0.1	0.063	38
0.2 x 0.125	0.2	0.125	38
0.25 x 0.16	0.25	0.16	37
0.315 x 0.2	0.315	0.2	37
0.4 / 0.22*	0.4	0.22	42
0.5 / 0.25*	0.5	0.25	44
0.63 / 0.25*	0.63	0.25	51
0.8 x 0.32	0.8	0.32	51

(*) M&S standard

11 Materials and surfaces

in contact with product:	1.4301/1.4307	AISI 304/304L
	1.4404	AISI 316L (optional)
not in contact with product:	1.4301/1.4307	AISI 304/304L

Gaskets: NBR, EPDM or FKM (depending on order or design)

Inner surface: $R_a \leq 1.6\mu\text{m}$

Outer surface: matt or polished

12 Spare parts list

Tab. 5 Spare parts list with article No. M&S

DN	Pos.3 Clamp gasket TC			Pos.5 O-ring		
	NBR	EPDM	FKM	NBR	EPDM	FKM
DN 25	189000650200	189000650300	189000650400	020004002010	020004003040	020004004030
DN 32	189000650200	189000650300	189000650400	020004002010	020004003040	020004004030
DN 40	189001000200	189001000300	189001000400	020006702010	020006703020	020006704010
DN 50	189001000200	189001000300	189001000400	020006702010	020006703020	020006704010
DN 65	189001000200	189001000300	189001000400	020006702010	020006703020	020006704010
DN 80	189001500200	189001500300	189001500400	020010902010	020010903010	020010904010
DN100	189001500200	189001500300	189001500400	020010902010	020010903010	020010904010