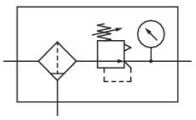
Filter pressure regulator, Series NL6-FRE

0821300857

AVENTICS Series NL6 Air Preparation Units

The AVENTICS Series NL maintenance units are suitable for all areas: as individual components or as assembled maintenance units, for centralized or decentralized compressed air preparation, in compact or powerful versions, for use in high or low temperatures. This line offers a complete, customizable compressed air preparation technology. It includes an option to combine every component in the Series to achieve the desired function, making it possible to adjust the components precisely to the application requirements.





Technical data

Industry	Industrial
Parts	Filter pressure regulator
Reservoir	reservoir, polycarbonate, with metal protective guard
Port	G 1
Nominal flow Qn	15000 l/min
Filter porosity	40 µm
Condensate drain	semi-automatic, open without pressure
Pressure gauge	with pressure gauge
Min. working pressure	1.5 bar
Max. working pressure	16 bar
Min. ambient temperature	-10 °C
Max. ambient temperature	60 °C
Min. regulation range	0.5 bar
Max. regulation range	10 bar
Lock type	not lockable
Type	1-part
Type	Can be assembled into blocks
Pressure supply	single
Mounting orientation	vertical

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Regulator type	Diaphragm-type pressure regulator
Regulator function	with relieving air exhaust
Max. Internal air consumption	0.5 l/min
Filter element	exchangeable
Filter reservoir volume	125 cm³
Max. achievable compressed air class acc. to ISO 8573-1:2010	7 : 7 : -
Medium	Compressed air Neutral gases
Weight	2.25 kg

Material

Housing material	Die-cast aluminum
Seal material	Acrylonitrile butadiene rubber
Material front plate	Acrylonitrile butadiene styrene
Material reservoir	Polycarbonate
Material protective guard	Steel, chrome-plated
Material filter insert	Polyethylene
Part No.	0821300857

Technical information

The pressure dew point must be at least 15 °C less than ambient and medium temperature and may not exceed 3 °C.

Nominal flow Qn with secondary pressure p2 = 6 bar at Δp = 1 bar

Note: Polycarbonate reservoirs are susceptible to solvents, supplementary information can be found at "Customer information".

A change in the flow direction (from air supply on the left to air supply on the right) occurs by rotating installation by 180° about the vertical axis. Please see the operating instructions for further details.

Also suitable for separation of fluid oil or water due to the design.

The rear pressure gauge connection on the pressure regulator is closed with a blanking plug, the front connection is open. Depending on the customer application, a second blanking plug may be necessary. Please order separately (see accessories).

Mounting: mounting bracket 1821336017 / block assembly kit 1827009593

Metal protective guard can be retrofitted for all polycarbonate reservoirs

Pressure gauge enclosed separately

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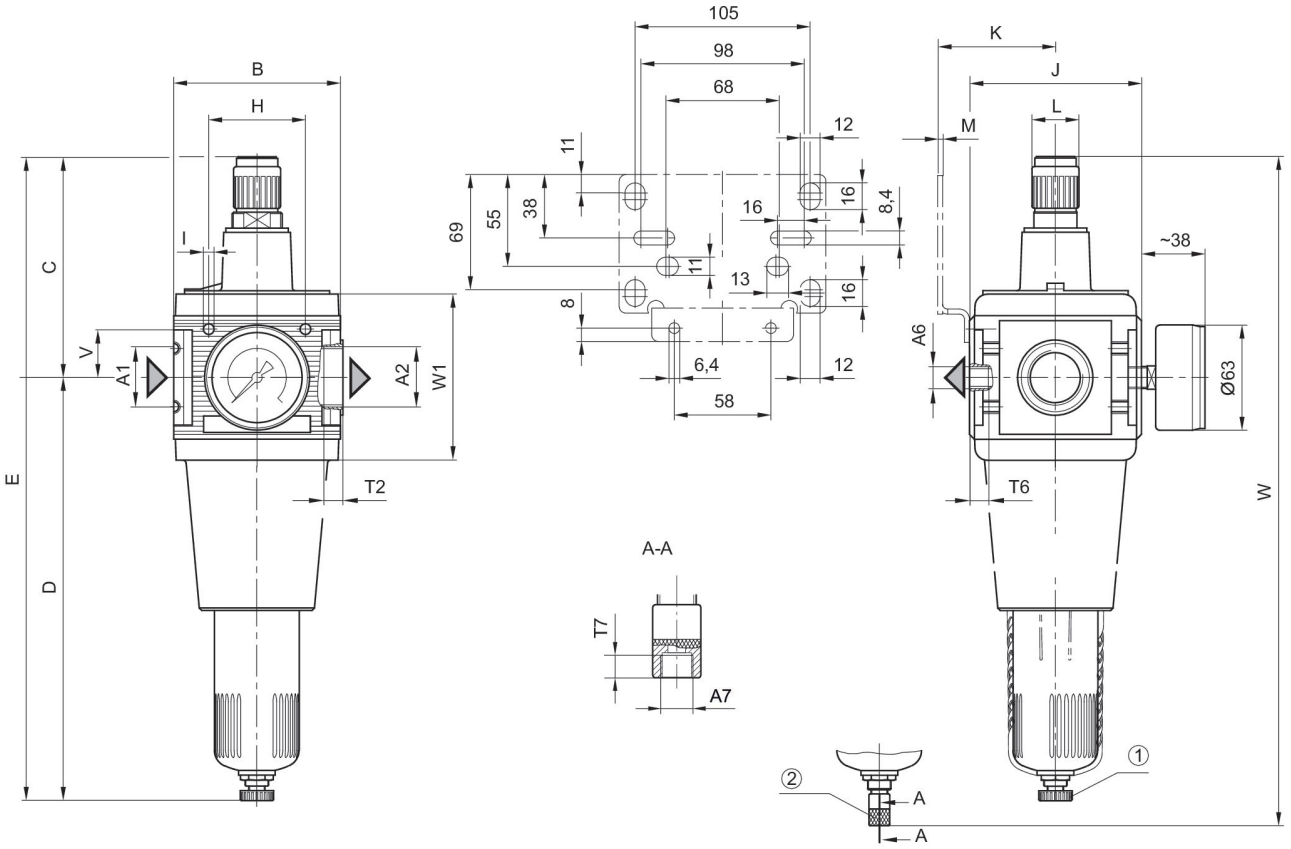
Dimensions



A1 = input A2 = output A6 = output
A7 = condensate drain
1) Semi-automatic condensate drain 2) fully automatic condensate drain

Dimensions in mm

Part No.	A1	A2	A6	A7	B	C	D	E	H
0821300850	G 3/4	G 3/4	G 1/4	G 1/8	100	132	253	385	58
0821300851	G 3/4	G 3/4	G 1/4	G 1/8	100	132	253	385	58
0821300852	G 3/4	G 3/4	G 1/4	G 1/8	100	132	253	385	58
0821300853	G 3/4	G 3/4	G 1/4	G 1/8	100	132	253	385	58
0821300854	G 3/4	G 3/4	G 1/4	G 1/8	100	132	253	385	58
0821300855	G 3/4	G 3/4	G 1/4	G 1/8	100	132	253	385	58
0821300856	G 1	G 1	G 1/4	G 1/8	100	132	253	385	58
0821300857	G 1	G 1	G 1/4	G 1/8	100	132	253	385	58
0821300858	G 1	G 1	G 1/4	G 1/8	100	132	253	385	58
0821300859	G 1	G 1	G 1/4	G 1/8	100	132	253	385	58
0821300860	G 1	G 1	G 1/4	G 1/8	100	132	253	385	58
0821300861	G 1	G 1	G 1/4	G 1/8	100	132	253	385	58

Part No.	I	J	K	L	M	T2	T6	T7	V
0821300850	M6	103	70.5	28	3	18	7	8.5	29

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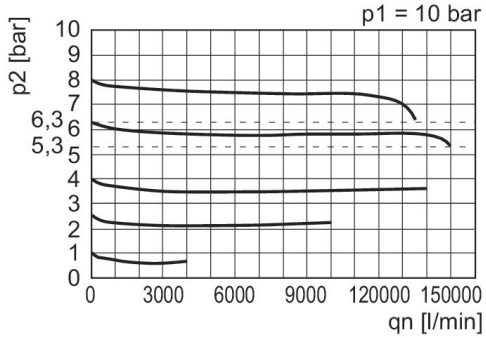
Part No.	I	J	K	L	M	T2	T6	T7	V
0821300851	M6	103	70.5	28	3	18	7	8.5	29
0821300852	M6	103	70.5	28	3	18	7	8.5	29
0821300853	M6	103	70.5	28	3	18	7	8.5	29
0821300854	M6	103	70.5	28	3	18	7	8.5	29
0821300855	M6	103	70.5	28	3	18	7	8.5	29
0821300856	M6	103	70.5	28	3	18	7	8.5	29
0821300857	M6	103	70.5	28	3	18	7	8.5	29
0821300858	M6	103	70.5	28	3	18	7	8.5	29
0821300859	M6	103	70.5	28	3	18	7	8.5	29
0821300860	M6	103	70.5	28	3	18	7	8.5	29
0821300861	M6	103	70.5	28	3	18	7	8.5	29

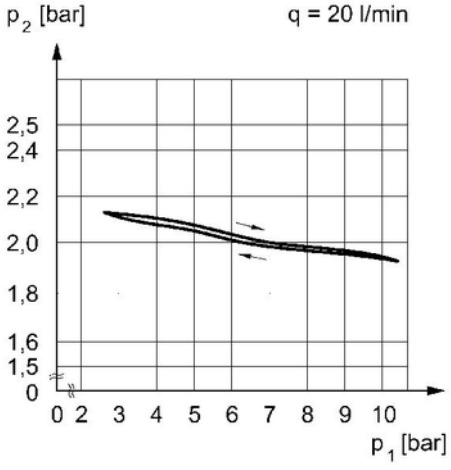
Part No.	W	W1
0821300850	403	101.5
0821300851	403	101.5
0821300852	403	101.5
0821300853	403	101.5
0821300854	403	101.5
0821300855	403	101.5
0821300856	403	101.5
0821300857	403	101.5
0821300858	403	101.5
0821300859	403	101.5
0821300860	403	101.5
0821300861	403	101.5

Flow rate characteristic, p2 = 0,05 - 7 bar



p1 = Working pressure
p2 = Secondary pressure
qn = Nominal flow

Pressure characteristics curve



p1 = Working pressure
p2 = Secondary pressure
qn = Nominal flow
q = flow rate