



Flow Monitors 1007

Flow Monitors 1007

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Flow Monitors 1007

Description and function

Flow units work on the suspended body measurement principle. The suspended body is introduced into a cylindrical slotted nozzle. Depending on the model, the installation of the flow monitor is either dependent of position (only with suspended bodies) or independent of position (suspended bodies with spring). A reed switch is connected external to the flow circuit. The reed switch is sealed into a freely-adjustable housing (switch housing) and is thereby protected from external influences. The incoming medium moves the suspended body in the direction of flow. If the suspended body, with its integrated magnets, reaches the position of the reed switch, the contact studs close. If the rate of flow becomes greater, the suspended body will move further in the direction of flow, with the maximum movement limited by a stop, which prevents the suspended body moving beyond the switching area of the reed switch (bistable action).

Application

Monitoring of liquid and gaseous media, for example, in refrigeration systems and refrigeration circuits of welding machines, laser and piping systems, pumps, compressors, hydraulic systems and many more.

Switching point and switching range

The switching point can be continuously adjusted within the switching range. At the maximum scale setting, the flow-rate can be significantly higher than shown.

Assembly notices:

1. Units dependent of position

The flow monitor must be installed vertically in the system.

The flow must be from the bottom to the top.

2. Units independent of position

The flow monitor can be installed in the system in any position.

The direction of flow must be such that an increase in the flow produces a corresponding positive movement on the scale.

3. Viscosity compensated units

The flow monitor can be installed in the system in any position.

The direction of flow must be such that an increase in the flow produces a corresponding positive movement on the scale.

4. The medium must not carry any solid bodies

with it. We recommend the installation of a dirt trap of type SF, SFD or SFM.

Switching hysteresis

This refers to the distance travelled by the suspended body between the switch-on and switch-off quantities. The typical hysteresis of the suspended body tube is attained by selecting reed switches with lower differences between the pick-up and drop-off activation levels (dose differential).

Position dependence

The unit must be installed vertically, e.g. the flow must be from the bottom to the top.

Installation in any position

By installing a spring which moves the suspended body into its initial position, any installation orientation can be used. Re-adjustment is not required, as the springs have already been artificially aged and pre-tensioned.

Viscosity compensation

This is achieved by installing a spring connected to a perforated plate. As the spring has already been artificially aged, no readjusting is necessary.

Maintenance

Due to its design, the flow unit requires no maintenance. Cleaning at regular intervals should only be carried out in the case of media that contains magnetic particles. These cleaning intervals can be correspondingly extended by the use of a filter with a magnetic separator.

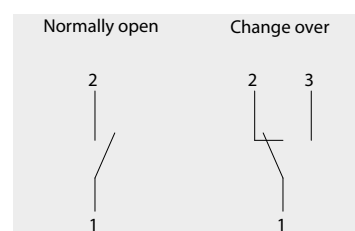
5. The unit with the contact device

must not be located within an induction field.

6. Always observe the maximum electrical values of the reed switch.

7. Setting the switching point:

Set the arrow on the switch housing to the desired switch-off quantity on the scale of the unit housing.



Flow Monitors 1007

Approvals

As an innovative manufacturer of instruments for level control, we can offer to our customers systems according to different directives. The types of approval, applications and limits of use can be taken from the following specifications.

Approvals

Ex

A large number of flow monitors from our standard range, or to customer requests, can be built according to the EU-Directive 94/9/EG with the protection types EEx ia IIC T6 or EEx d T6. By the combination of the instruments with the type key, the catalogue shows with the Ex hexagonal logo which components can be used for Ex-instruments.

Temperature of media:

EEx ia-instruments

T6 75 °C

EEx m-instruments

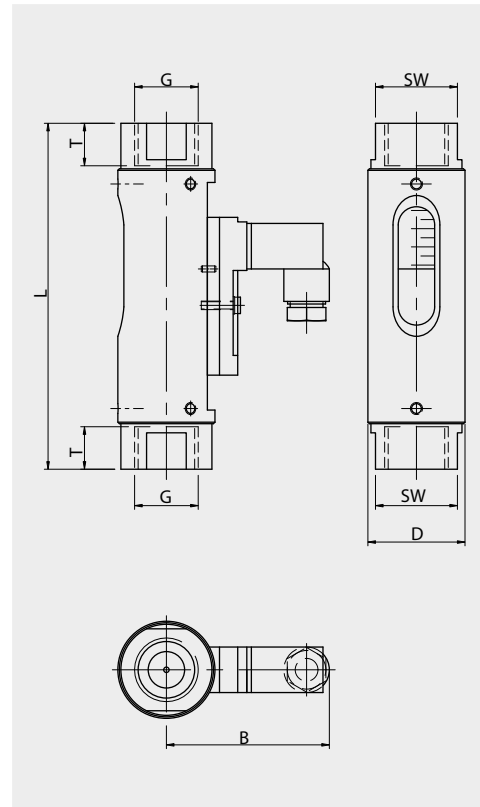
T6 75 °C

Flow Monitors 1007

RVO/U for water, independent of position

Technical data	
Material:	Stainless steel Brass nickel-plated
Operating pressure:	PN 10 - 16
Operating temperature:	100 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	±10 % of final value
Pressure drop:	0.02 ... 0.4 bar
Mounting position:	Independent of position
Display:	Glass
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	l/min	G	SW[mm]	D[mm]	B[mm]	T[mm]	L[mm]	Weight [g]
RVO/U-4/01	0.005 - 0.06	¼"	17	20	49	10	90	140
RVO/U-4/02	0.025 - 0.13							
RVO/U-4/06	0.1 - 0.6							
RVO/U-4/1	0.2 - 1.2							
RVO/U-4/2	0.4 - 2.0							
RVO/U-4/3	0.5 - 3.0							
RVO/U-4/5	1.0 - 5.0	½"	27	32	53	14	114	300
RVO/U-2/05	0.1 - 0.5							
RVO/U-2/1	0.2 - 1							
RVO/U-2/2	0.4 - 1.6							
RVO/U-2/4	1 - 4							
RVO/U-2/8	2 - 8							
RVO/U-2/15	4 - 15	¾" 1"	41	50	77	18 21 17	139 158	800 900
RVO/U-2/20	5 - 22							
RVO/U-2/28	6 - 28							
RVO/U-1/30	8 - 30							
RVO/U-1/45	15 - 45	1"	41	50	77	25	158	900
RVO/U-1/90	30 - 90							
RVO/U-1/150	60 - 150							

Type combination see type key Flow Monitors

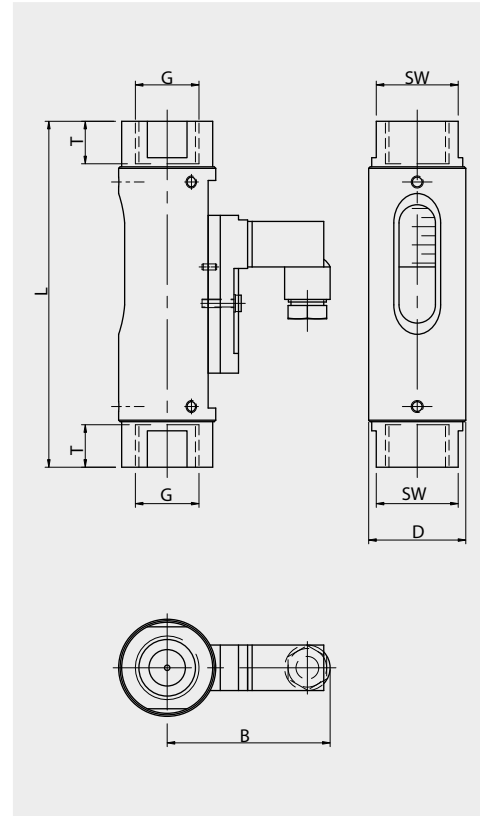
Flow Monitors 1007

RVO/U-L for air, independent of position

Technical data

Material:	Stainless steel Brass nickel-plated
Operating pressure:	PN 10 - 16
Operating temperature:	100 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 10 % of final value
Pressure drop:	0.02 ... 0.4 bar
Mounting position:	Independent of position
Display:	Glass
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	NI/min	G	SW[mm]	D[mm]	B[mm]	T[mm]	L[mm]	Weight [g]
RVO/U-L40001	0.2 - 1.3	1/4"	17	20	49	10	90	140
RVO/U-L40002	0.5 - 2							
RVO/U-L40003	0.8 - 3							
RVO/U-L40005	1.5 - 5							
RVO/U-L40008	2 - 8							
RVO/U-L40012	3 - 12							
RVO/U-L40014	3.5 - 14							
RVO/U-L40020	5.5 - 20							
RVO/U-L40024	7 - 24							
RVO/U-L40035	10 - 35							
RVO/U-L40042	10 - 42							

other switching ranges on request / other media on request / other connection sizes on request

Type combination see type key Flow Monitors

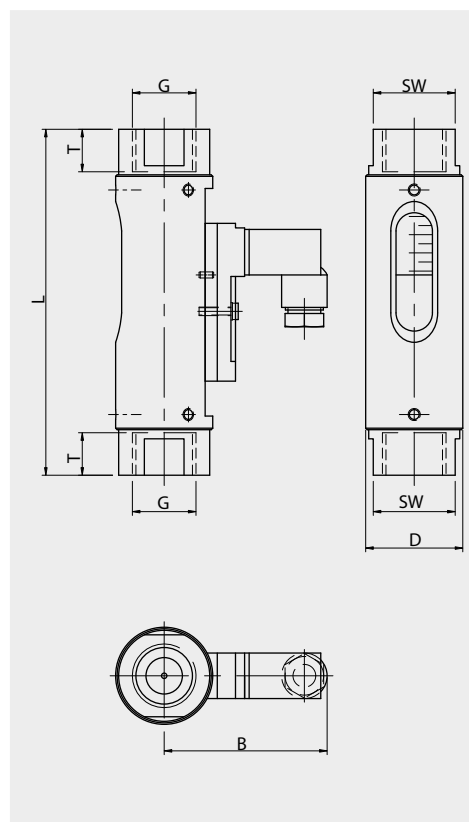
Flow Monitors 1007

RVO/U-L for air, independent of position

Technical data

Material:	Stainless steel Brass nickel-plated
Operating pressure:	PN 10 - 16
Operating temperature:	100 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 10 % of final value
Pressure drop:	0.02 ... 0.4 bar
Mounting position:	Independent of position
Display:	Glass
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	NI/min	G	SW[mm]	D[mm]	B[mm]	T[mm]	L[mm]	Weight [g]
RVO/U-L20012	3 - 12	½"	27	32	53	14	114	300
RVO/U-L20030	7 - 30							
RVO/U-L20040	12 - 40							
RVO/U-L20125	28 - 125							
RVO/U-L20200	20 - 200							
RVO/U-2/15L	100 - 420							
RVO/U-2/20L	120 - 480							
RVO/U-L10080	22.5 - 80	¾" 1"	41	50	77	21 17	139 158	800 900
RVO/U-L10130	50 - 130							
RVO/U-L10420	110 - 420							
RVO/U-L10625	200 - 625							

other switching ranges on request / other media on request / other connection sizes on request

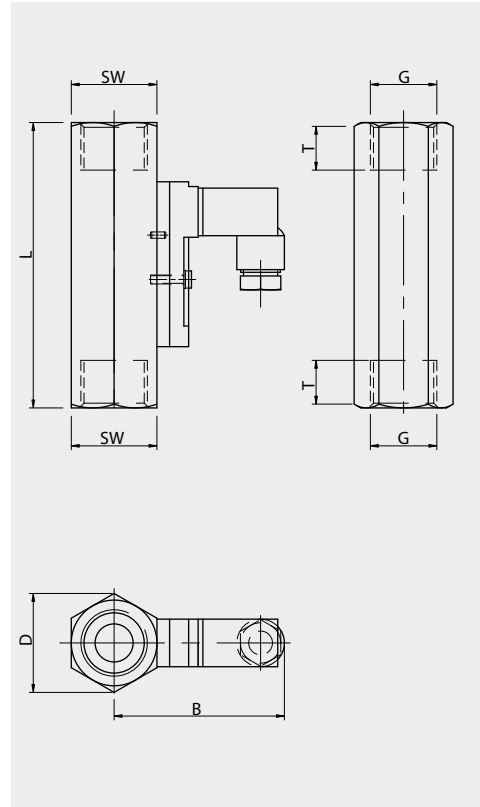
Type combination see type key Flow Monitors

Flow Monitors 1007

RVM/U for water, independent of position

Technical data	
Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel 300 - 350 bar Brass 250 - 300 bar
Operating temperature:	100 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 10 % of final value
Pressure drop:	0.02 ... 0.4 bar
Mounting position:	Independent of position
Display:	Without
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	l/min	G	SW[mm]	D[mm]	B[mm]	T[mm]	L[mm]	Weight [g]
RVM/U-4/01	0.005 - 0.06	¼"	17	17	47	10	65	140
RVM/U-4/04	0.04 - 0.13							
RVM/U-4/06	0.1 - 0.6							
RVM/U-4/1	0.2 - 1.2							
RVM/U-4/2	0.4 - 2.0							
RVM/U-4/3	0.5 - 3.0							
RVM/U-4/5	1.0 - 5.0							
RVM/U-2/02	0.02 - 0.2	½"	27	31	52	14	90	350
RVM/U-2/06	0.1 - 0.6							
RVM/U-2/1	0.4 - 1.8							
RVM/U-2/3	0.8 - 3.2							
RVM/U-2/7	2 - 7							
RVM/U-2/13	3 - 13							
RVM/U-2/20	4 - 20							
RVM/U-2/30	8 - 30							
RVM/U-1/45	15 - 45	¾" 1"	41	47	76	21 17	152 130	1200 1050
RVM/U-1/90	30 - 90							
RVM/U-1/150	60 - 150							

other switching ranges on request / other media on request / other connection sizes on request

Type combination see type key Flow Monitors

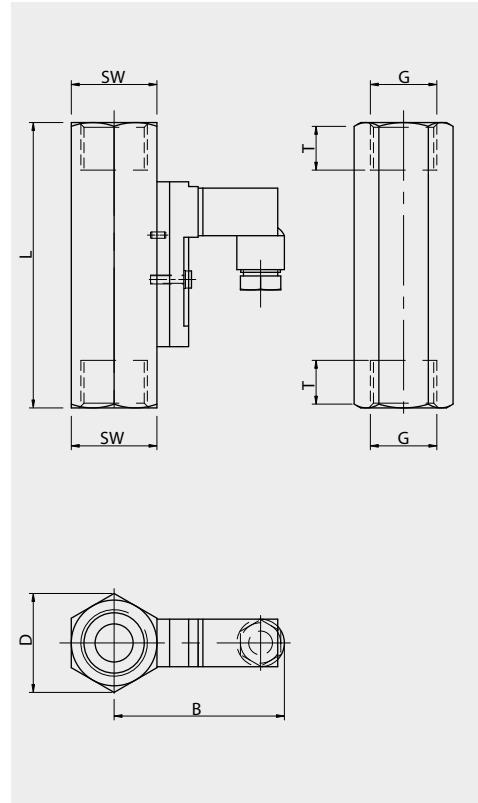
Flow Monitors 1007

RVM/U-L for air, independent of position

Technical data

Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel 300 - 350 bar Brass 250 - 300 bar
Operating temperature:	120 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 10 % of final value
Pressure drop:	0.02 ... 0.4 bar
Mounting position:	Independent of position
Display:	Without
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	NI/min	G	SW[mm]	D[mm]	B[mm]	T[mm]	L[mm]	Weight [g]
RVM/U-L40002	0.6 - 2.2	¼"	17	17	47	10	65	140
RVM/U-L40006	1.7 - 6							
RVM/U-L40008	2.5 - 8							
RVM/U-L40012	3 - 12							
RVM/U-4/06L	3 - 22							
RVM/U-L40024	7 - 24							
RVM/U-L40034	12 - 34							
RVM/U-4/2L	16 - 56							
RVM/U-4/3L	20 - 80							
RVM/U-L20010	2.5 - 10							
RVM/U-L20020	5.5 - 20							
RVM/U-L20030	8 - 30							
RVM/U-L20035	10 - 35							
RVM/U-2/3L	24 - 90							
RVM/U-L20220	55 - 220							
RVM/U-L20240	65 - 240							
RVM/U-L20300	80 - 300							
RVM/U-2/20L	140 - 525							

other switching ranges on request / other media on request / other connection sizes on request

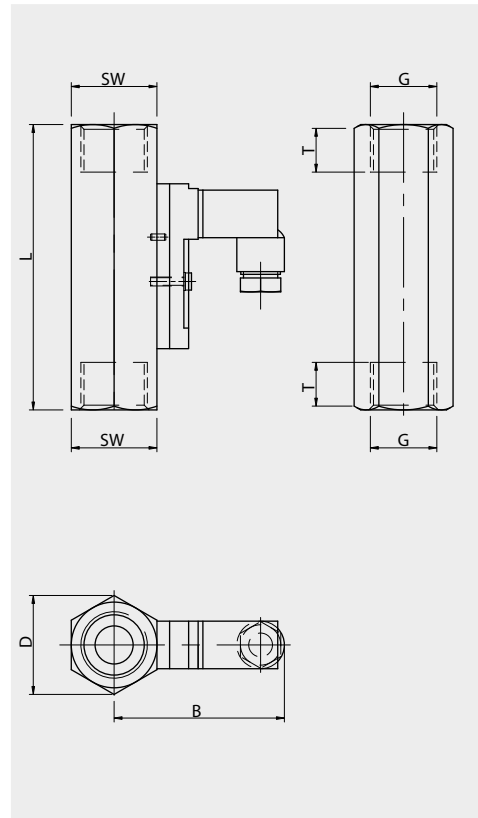
Type combination see type key Flow Monitors

Flow Monitors 1007

RVM/U-L for air, independent of position

Technical data	
Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel 300 - 350 bar Brass 250 - 300 bar
Operating temperature:	120 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 10 % of final value
Pressure drop:	0.02 ... 0.4 bar
Mounting position:	Independent of position
Display:	Without
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	NI/min	G	SW[mm]	D[mm]	B[mm]	T[mm]	L[mm]	Weight [g]
RVM/U-L10180	60 - 180	1"	41	47	76	21 17	152 130	1100 1200
RVM/U-L10300	100 - 300							
RVM/U-L10650	200 - 650							

other switching ranges on request / other media on request / other connection sizes on request

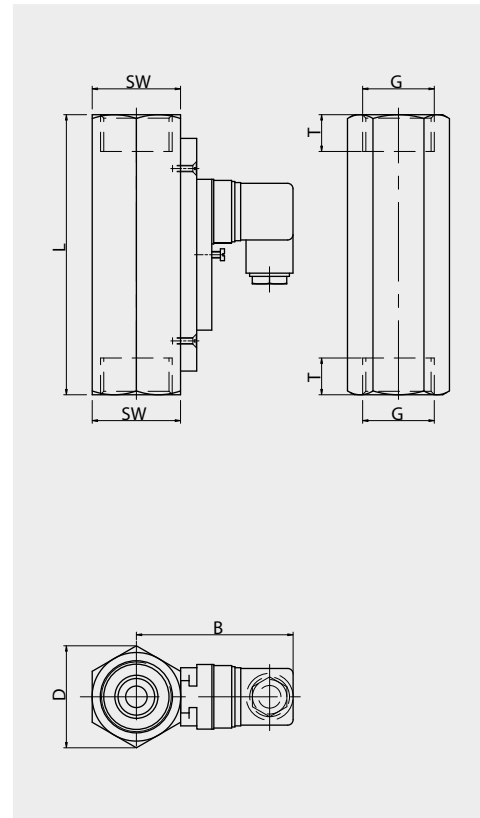
Type combination see type key Flow Monitors

Flow Monitors 1007

RVM/UM for water, independent of position

Technical data	
Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel to 250 bar Brass to 250 bar
Operating temperature:	120 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 5 % of final value
Pressure drop:	0.1 ... 0.8 bar
Mounting position:	Independent of position
Display:	Without
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	l/min	G	SW[mm]	D[mm]	B[mm]	T[mm]	L[mm]	Weight [g]
RVM/UM	0.1 - 60	1"	41	47	72	20	130	1000

Attention: switching point (... l/min) has to be mentioned in case of an order!

other switching ranges on request / other media on request / other connection sizes on request

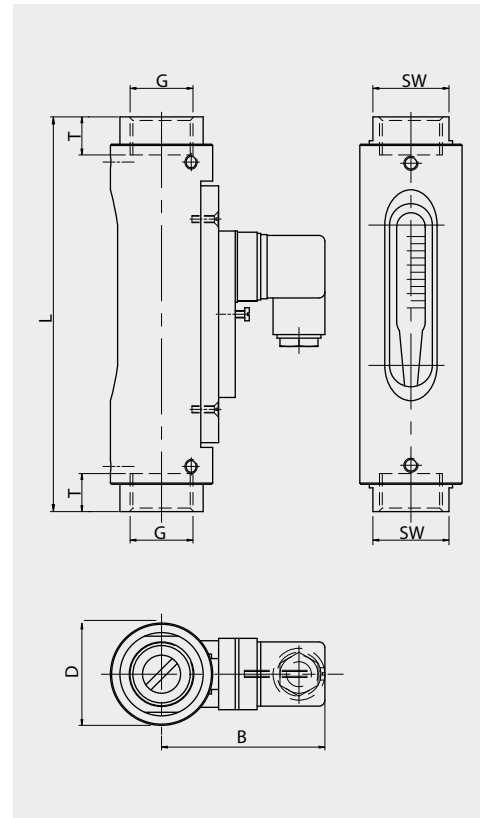
Type combination see type key Flow Monitors

Flow Monitors 1007

DUG for water, independent of position

Technical data	
Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel to 10 bar Brass to 10 bar
Operating temperature:	100 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 5 % of final value
Pressure drop:	0.02 ... 0.8 bar
Mounting position:	Independent of position
Display:	Glass
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	l/min	G	SW[mm]	D[mm]	B[mm]	T[mm]	L[mm]	Weight [g]
DUG - 4	0.2 - 4	1/4" 3/8" 1/2"	32	43	73	14	132	625
DUG - 6	0.4 - 6					14	132	
DUG - 8	0.5 - 8					15	135	
DUG - 14	1 - 14	1/2"	32	43	73	15	135	650
DUG - 22	2 - 22					15	135	
DUG - 28	1 - 28	3/4"	32	43	73	18	167	850
DUG - 45	2.5 - 45					18	167	
DUG - 80	2 - 80					18	164	
DUG - 90	6 - 90	1"	41	50	76	19	184	1000
DUG - 110	6 - 110	1"	41	50	76	19	184	1000
DUG - 150	15 - 150	1 1/4"	50	55	79	21	216	1300
DUG - 220	30 - 220	1 1/4"	50	60	81	21	210	1700
DUG - 250	30 - 250	1 1/4"	50	55	79	21	222	1400

other switching ranges on request / other media on request / other connection sizes on request

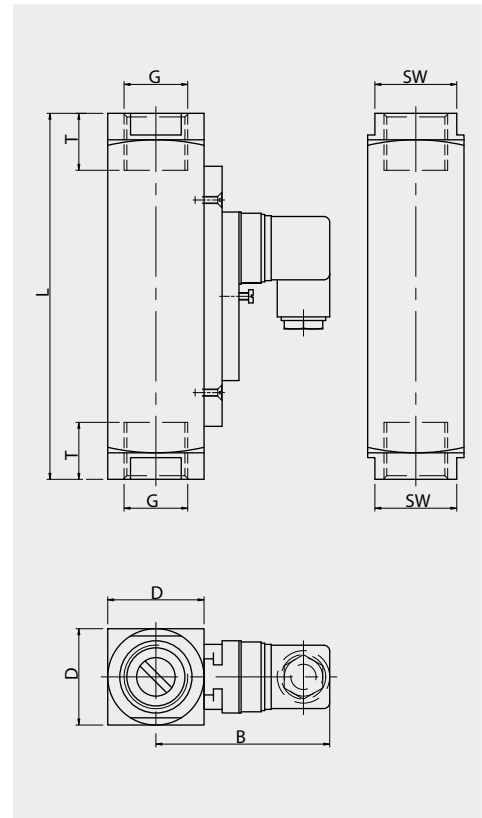
Type combination see type key Flow Monitors

Flow Monitors 1007

DUM for water, independent of position

Technical data	
Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel to 300 bar Brass to 200 bar
Operating temperature:	100 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 5 % of final value
Pressure drop:	0.02 ... 0.8 bar
Mounting position:	Independent of position
Display:	Without
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	l/min	G	SW[mm]	D[mm]	B[mm]	T[mm]	L[mm]	Weight [g]
DUM - 4	0.2 - 4	1/4" 3/8" 1/2"	27	30	71	14	130	850
DUM - 5	0.6 - 5							
DUM - 8	0.5 - 8							
DUM - 14	1 - 14							
DUM - 28	1 - 28	1/2" 3/4"	27	30	71	14 16	148	900
DUM - 40	2 - 40							
DUM - 55	4 - 55	3/4" 1"	34 40	40 40	76 76	18 19	152 156	1400 1100
DUM - 70	1 - 70							
DUM - 90	8 - 90							
DUM - 110	5 - 110	1"	40	40	76	21	200	2750
DUM - 150	15 - 150							
DUM - 220	35 - 220	1 1/4" 1 1/2"	50 60	50 60	81 82	21 24	200 200	3000 3800
DUM - 250	35 - 250							

other switching ranges on request / other media on request / other connection sizes on request

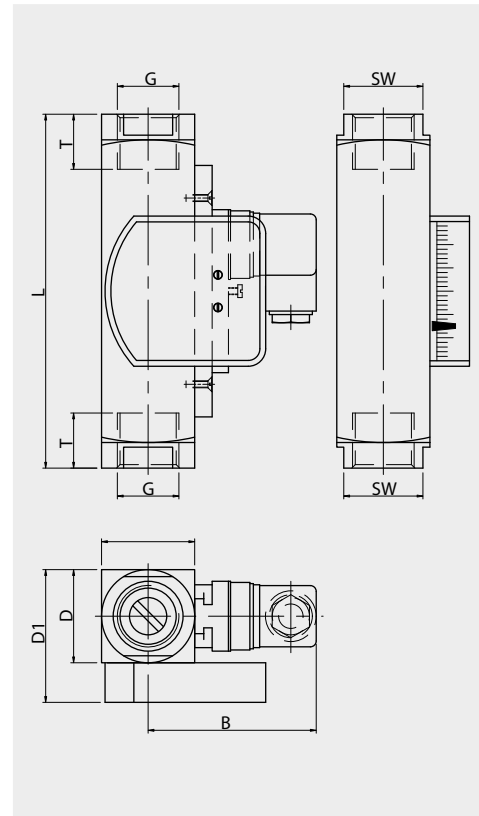
Type combination see type key Flow Monitors

Flow Monitors 1007

DUM/A for water, independent of position

Technical data	
Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel to 300 bar Brass to 200 bar
Operating temperature:	100 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 5 % of final value
Pressure drop:	0.02 ... 0.8 bar
Mounting position:	Independent of position
Display:	Display instrument macrolon
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	l/min	G	SW[mm]	D[mm]	D1[mm]	B[mm]	T[mm]	L[mm]	Weight [g]
DUM/A - 4	0.2 - 4	1/4" 3/8" 1/2"	27	30	47	71	14	130	900
DUM/A - 5	0.6 - 5								
DUM/A - 8	0.5 - 8								
DUM/A - 14	1 - 14								
DUM/A - 28	1 - 28	1/2" 3/4"	27	30	47	71	14 16	148	950
DUM/A - 40	2 - 40								
DUM/A - 55	4 - 55	3/4" 1"	34 40	40 40	57 57	76 76	18 19	152 156	1450 1150
DUM/A - 70	1 - 70								
DUM/A - 90	8 - 90								
DUM/A - 110	5 - 110	1 1/4"	40	40	57	76	21	200	2800
DUM/A - 150	15 - 150								
DUM/A - 220	35 - 220	1 1/4" 1 1/2"	50 60	50 60	67 71	81 82	21 24	200 200	3050 3850
DUM/A - 250	35 - 250								

other switching ranges on request / other media on request / other connection sizes on request

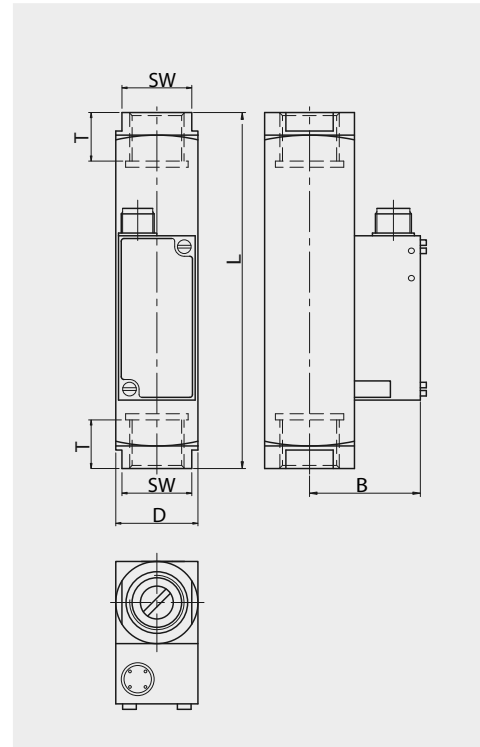
Type combination see type key Flow Monitors

Flow Monitors 1007

DUM/TA for water, independent of position

Technical data	
Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel to 300 bar Brass to 200 bar
Operating temperature:	-20 °C ... +70 °C
Measuring output:	4-20 mA / 15 ... 30 V DC 4-Leiter
Ex - design:	-
Electrical connections:	Patch plug, M12 x 1
Linearity deviation:	± 10% of final value
Pressure drop:	0.02 ... 0.8 bar
Mounting position:	Independent of position
Display:	Without
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	l/min	G	SW	D[mm]	B[mm]	T[mm]	L[mm]	Weight g
DUM/TA - 4	0.2 - 4	1/4" 3/8" 1/2"	27	30	37	14	130	850
DUM/TA - 5	0.6 - 5							
DUM/TA - 8	0.5 - 8							
DUM/TA - 14	1 - 14							
DUM/TA - 28	1 - 28	1/2" 3/4"	27	30	37	14 16	148	900
DUM/TA - 40	1 - 40							
DUM/TA - 55	4 - 55							

other switching ranges on request / other media on request / other connection sizes on request

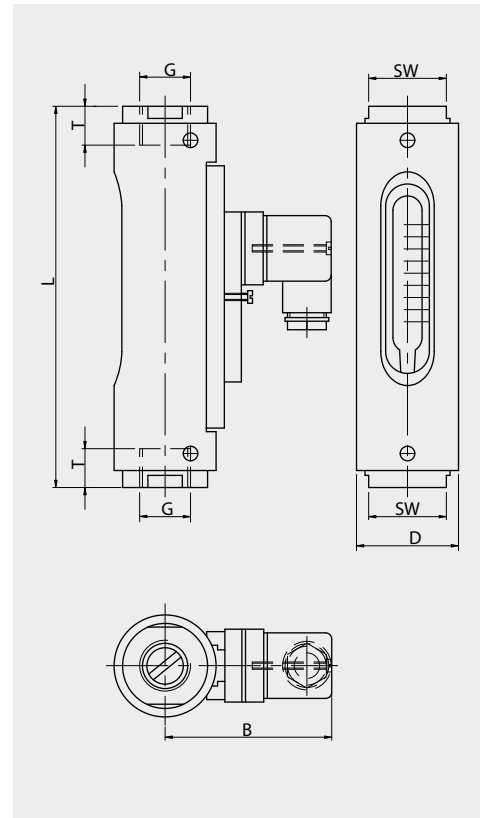
Type combination see type key Flow Monitors

Flow Monitors 1007

DWG for water, dependent of position / vertical

Technical data	
Material:	Stainless steel Brass nickel-plated
Operating pressure:	PN 10 bar
Operating temperature:	100 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 5 % of final value
Pressure drop:	0.01 ... 0.2 bar
Mounting position:	Dependent of position / vertical
Display:	Glass
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	l/min	G	SW[mm]	D[mm]	B[mm]	T[mm]	L[mm]	Weight [g]
DWG - 1.5	0.1 - 1.5	1/4" 3/8" 1/2"	32	43	73	14	132	625
DWG - 3	0.2 - 3.0					14	135	
DWG - 8	0.3 - 8.0					15	135	
DWG - 12	1 - 12							
DWG - 18	2 - 18	1/2" 3/4"	32	43	73	15 16	163 167	650
DWG - 35	3 - 35	3/4" 1"	41	50	76	18	164	850
DWG - 50	4 - 50					19	184	

other switching ranges on request / other media on request / other connection sizes on request

Type combination see type key Flow Monitors

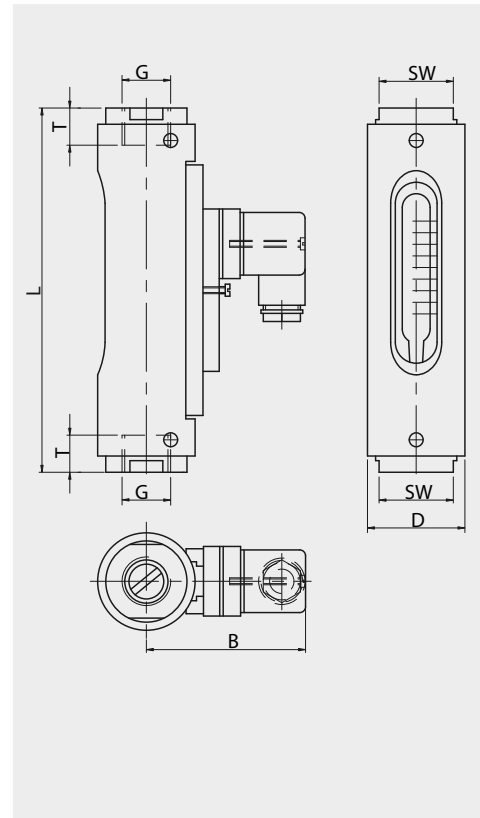
Flow Monitors 1007

DWG-L for air, dependent of position / vertical

Technical data

Material:	Stainless steel Brass nickel-plated
Operating pressure:	PN 10 bar
Operating temperature:	max. 80 °C
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 10% of final value
Pressure drop:	0.01 ... 0.8 bar
Mounting position:	Dependent of position / vertical
Display:	Glass
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	L/min	G	SW	D[mm]	B[mm]	T[mm]	L[mm]	Weight g
DWG-L1.5	3 - 30	1/4" 3/8" 1/2"	32	43	73	14 14 15	132 132 135	625
DWG-L3	6 - 60							
DWG-L8	6 - 160							
DWG-L12	20 - 220	1/2" 1/4"	32	43	73	15 16	163 167	650
DWG-L18	40 - 360							
DWG-L35	60 - 700	3/4" 1"	41	50	76	18 19	164 184	850 1000
DWG-L50	60 - 825							
DWG-L100	200 - 1600	1"	41	50	76	19	204	1100

other switching ranges on request / other media on request / other connection sizes on request

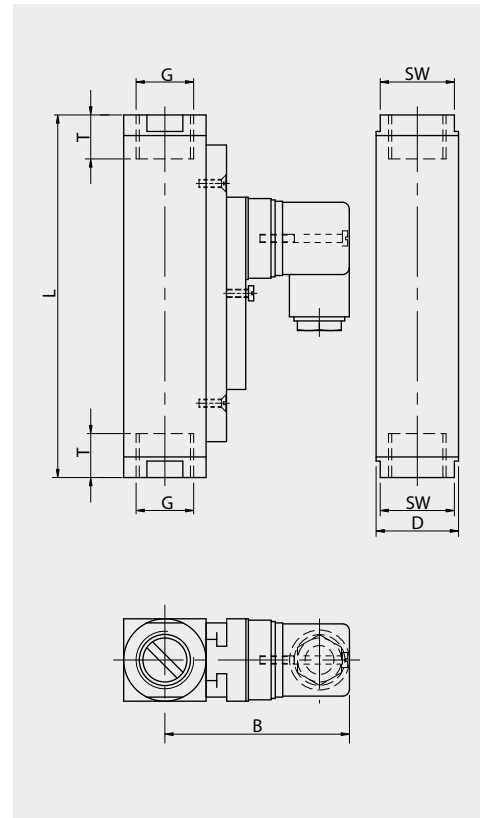
Type combination see type key Flow Monitors

Flow Monitors 1007

DWM for water, dependent of position / vertical

Technical data	
Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel to 300 bar Brass to 200 bar
Operating temperature:	120 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 5 % of final value
Pressure drop:	0.02 ... 0.4 bar
Mounting position:	Dependent of position / vertical
Display:	Without
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	l/min	G	SW[mm]	D[mm]	B[mm]	T[mm]	L[mm]	Weight [g]
DWM - 1.5	0.1 - 1.5	1/4" 3/8" 1/2"	27	30	71	14	130	800
DWM - 3	0.2 - 3					19		
DWM - 8	0.3 - 8					19		
DWM - 12	1 - 12	1/2" 3/4"	27	30	71	19	148	850
DWM - 18	2 - 18					17		
DWM - 35	3 - 35	3/4" 1"	34	40	76	18	152	1350
DWM - 50	4 - 50					19		
DWM - 100	10 - 100	1"	50	50	81	20	200	2750
DWM - 150	10 - 150	1 1/4"	50	50	81	21	200	2950

other switching ranges on request / other media on request / other connection sizes on request

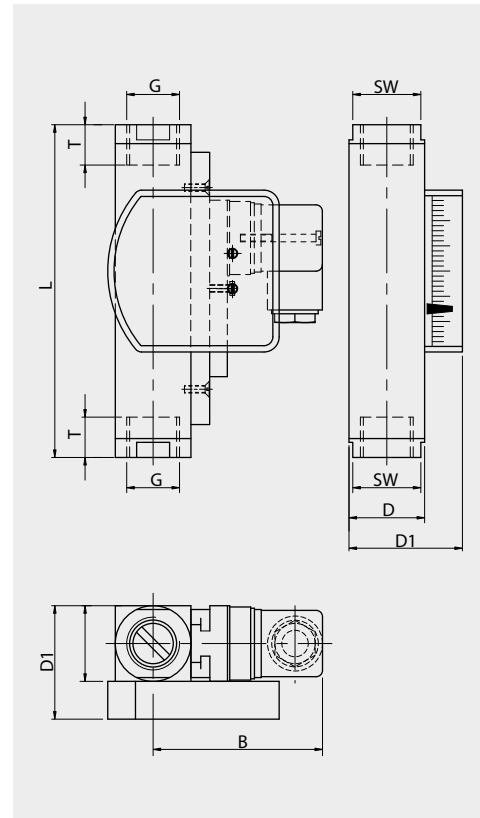
Type combination see type key Flow Monitors

Flow Monitors 1007

DWM/A for water, dependent of position / vertical

Technical data	
Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel to 300 bar Brass to 200 bar
Operating temperature:	100 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 5 % of final value
Pressure drop:	0.02 ... 0.2 bar
Mounting position:	Dependent of position / vertical
Display:	Display instrument macrolon
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	l/min	G	SW[mm]	D[mm]	D1[mm]	B[mm]	T[mm]	L[mm]	Weight [g]
DWM/A - 1.5	0.1 - 1.5	1/4" 3/8" 1/2"	27	30	47	71	14 19 19	131	850
DWM/A - 3	0.2 - 3								
DWM/A - 8	0.3 - 8								
DWM/A - 12	1 - 12	1/2" 3/4"	27 32	30	47	71	19 17	148 174	850 1010
DWM/A - 18	2 - 18								
DWM/A - 35	3 - 35	3/4" 1"	34 40	40	57	76	18 19	152 156	1500 1500
DWM/A - 50	4 - 50								

other switching ranges on request / other media on request / other connection sizes on request

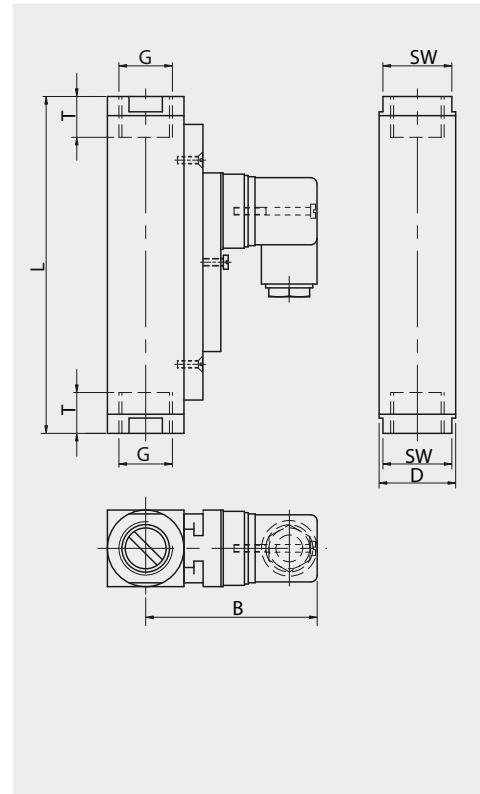
Type combination see type key Flow Monitors

Flow Monitors 1007

DWM-L for air, dependent of position / vertical

Technical data	
Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel to 300 bar Brass to 200 bar
Operating temperature:	max. 80 °C
Contacts:	Normally open Change over see contacts p.144
Ex - design:	Ex II 2 D EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 10% of final value
Pressure drop:	0.02 ... 0.4 bar
Mounting position:	Dependent of position / vertical
Display:	Without
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	L/min	G	SW	D[mm]	B[mm]	T[mm]	L[mm]	Weight g
DWM - L1.5	1 - 28	1/4" 3/8" 1/2"	27	30	71	14 19 19	130	800
DWM - L3	4 - 60							
DWM - L8	6 - 160							
DWM - L12	20 - 240							
DWM - L18	40 - 360	1/2" 3/4"	27	30	71	19 17	148 174	850 960
DWM - L50	60 - 700	1/2" 3/4"	34 40	40	76	18 19	152 156	1350 1050
DWM - L100	200 - 1450	1"	50	50	81	20	200	2750

other switching ranges on request / other media on request / other connection sizes on request

Type combination see type key Flow Monitors

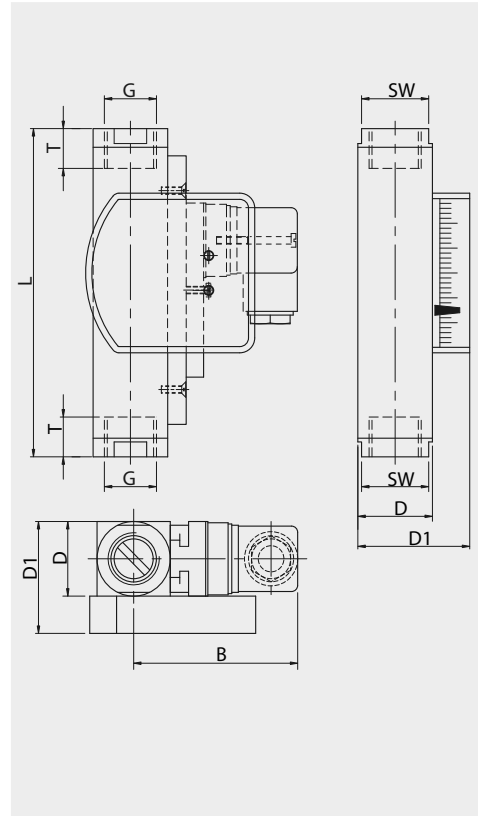
Flow Monitors 1007

DWM/A-L for air, dependent of position / vertical

Technical data

Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel to 300 bar Brass to 200 bar
Operating temperature:	max. 80 °C
Contacts:	Normally open Change over see contacts p. 144
Ex - design:	Ex II 2 D EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 10% of final value
Pressure drop:	0.02 ... 0.4 bar
Mounting position:	Dependent of position / vertical
Display:	Display instrument macrolon
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	L/min	G	SW	D[mm]	B[mm]	T[mm]	L[mm]	Weight g
DWM/A - L1.5	1 - 28	1/4" 3/8" 1/2"	27	30	71	14 19 19	130	850
DWM/A - L3	4 - 60							
DWM/A - L8	6 - 160							
DWM/A - L12	20 - 240	1/2" 3/4"	27	30	71	19 17	148	900 1010
DWM/A - L18	40 - 360							
DWM/A - L50	60 - 700	1/2" 3/4"	34 40	40	76	18 19	152 156	1400 1100
DWM/A - L100	200 - 1450	1"	50	50	81	20	200	2800

other switching ranges on request / other media on request / other connection sizes on request

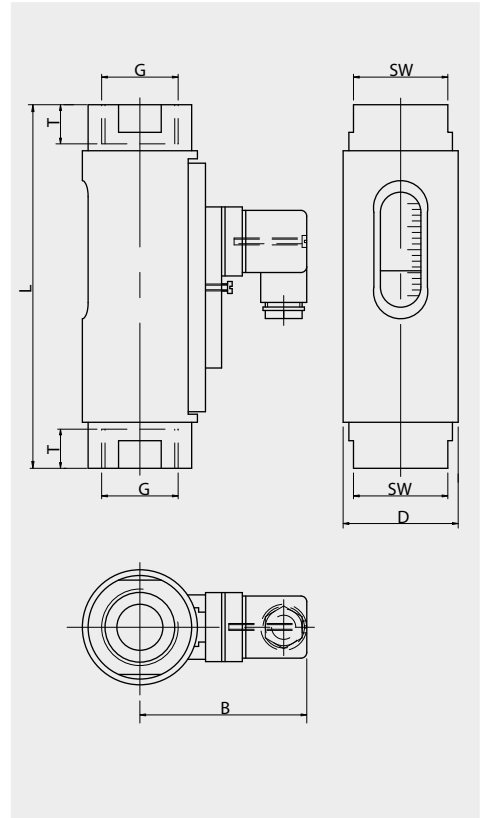
Type combination see type key Flow Monitors

Flow Monitors 1007

DKG viscosity compensated to 600 mm²/s independent of position

Technical data	
Material:	Stainless steel Brass nickel-plated
Operating pressure:	PN 10 ... 16 bar
Operating temperature:	120 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	10 % of final value
Pressure drop:	0.02 ... 0.4 bar
Mounting position:	Independent of position
Display:	Glass
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	l/min	G	SW[mm]	D[mm]	B[mm]	T[mm]	L[mm]	Weight [g]
DKG - 2/08	0.1 - 0.8	½"	27	32	53	14	114	300
DKG - 2/1	0.2 - 1							
DKG - 2/2	0.5 - 1.7							
DKG - 2/4	1.3 - 4							
DKG - 2/8	2.5 - 8							
DKG - 1/1	0.1 - 0.8	¼" ½" ¾" 1"	41	50	77	17	145 145 139 158	850
DKG - 1/2	0.5 - 1.5							
DKG - 1/4	1 - 4							
DKG - 1/8	2 - 8							
DKG - 1/10	3 - 10	½" ¾" 1"	41	50	77	17	145 139 158	850
DKG - 1/15	5 - 15							
DKG - 1/24	8 - 24							
DKG - 1/30	10 - 30	¾" 1"	41	50	77	17	139 158	850
DKG - 1/45	15 - 45							
DKG - 1/60	20 - 60							
DKG - 1/90	30 - 90							

other switching ranges on request / other media on request / other connection sizes on request

Type combination see type key Flow Monitors

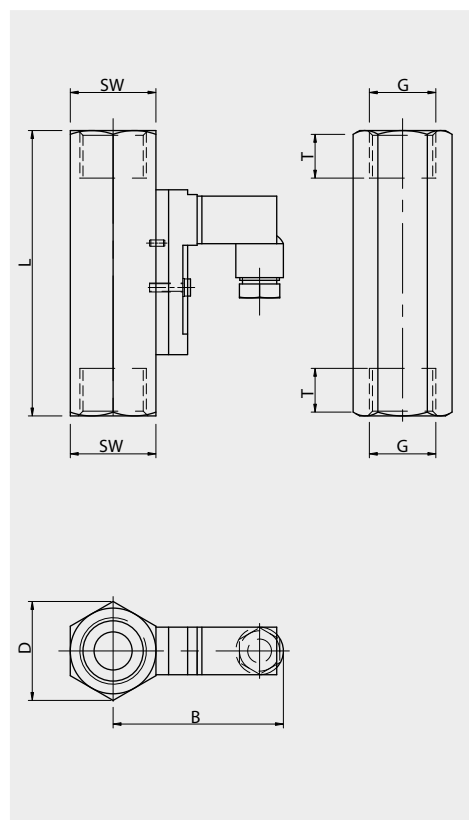
Flow Monitors 1007

DKM viscosity compensated to 600 mm²/s independent of position

Technical data

Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel to 300 bar Brass to 200 bar
Operating temperature:	120 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	10 % of final value
Pressure drop:	0.02 ... 0.4 bar
Mounting position:	Independent of position
Display:	Without
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	l/min	G	SW[mm]	D[mm]	B[mm]	T[mm]	L[mm]	Weight [g]		
DKM - 2/1	0.1 - 0.8	1/4"	24	31	52	14	98	400		
DKM - 2/2	0.5 - 1.6	3/8"	24				108	450		
		1/2"	27				90	350		
DKM - 2/3	0.8 - 3	1/2"	27	31	52	14	90	350		
DKM - 2/7	2 - 7									
DKM - 1/1	0.1 - 0.8	1/4"	34	40	76	21	152	1500		
DKM - 1/2	0.5 - 1.5	1/2"	34				152	1425		
		3/4"	34				152	1340		
		1"	40				17	130	1160	
DKM - 1/4	1 - 4	1"	40							
DKM - 1/8	2 - 8	1/2"	34	40	76	21	152	1425		
DKM - 1/10	3 - 10						3/4"	152	1340	
DKM - 1/15	5 - 15						1"	17	130	1160
DKM - 1/24	8 - 24	3/4"	34	40	76	21	152	1340		
DKM - 1/30	10 - 30						1"	17	130	1160
DKM - 1/45	15 - 45						1"	40		
DKM - 1/60	20 - 60	1"	40	40	76	17	130	1160		
DKM - 1/90	30 - 90						17	130	1160	
DKM - 1/100	35 - 110						17	130	1160	

other switching ranges on request / other media on request / other connection sizes on request

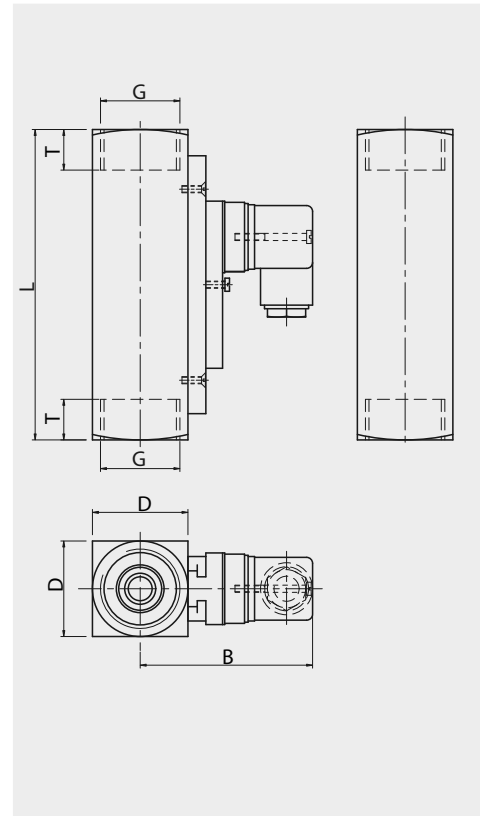
Type combination see type key Flow Monitors

Flow Monitors 1007

DKME viscosity compensated to 600mm²/s independent of position

Technical data	
Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel to 300 bar Brass to 200 bar
Operating temperature:	120 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 10% of final value
Pressure drop:	0.02 ... 0.4 bar
Mounting position:	Independent of position
Display:	Without
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	L/min	G	SW	D[mm]	B[mm]	T[mm]	L[mm]	Weight g
DKME - 1/20	1 - 20	1/2"	34	40	76	21	152	1425
DKME - 1/40	4 - 40	3/4"	34			21	152	1340
		1"	40			17	130	1160
DKME - 1/50	5 - 50	3/4"	34	40	76	21	152	1340
DKME - 1/60	8 - 60	1"	40			17	130	1160
DKME - 1/70	12 - 70	1"	40	76	76	17	130	1160
DKME - 1/80	15 - 80							

other switching ranges on request / other media on request / other connection sizes on request

Type combination see type key Flow Monitors

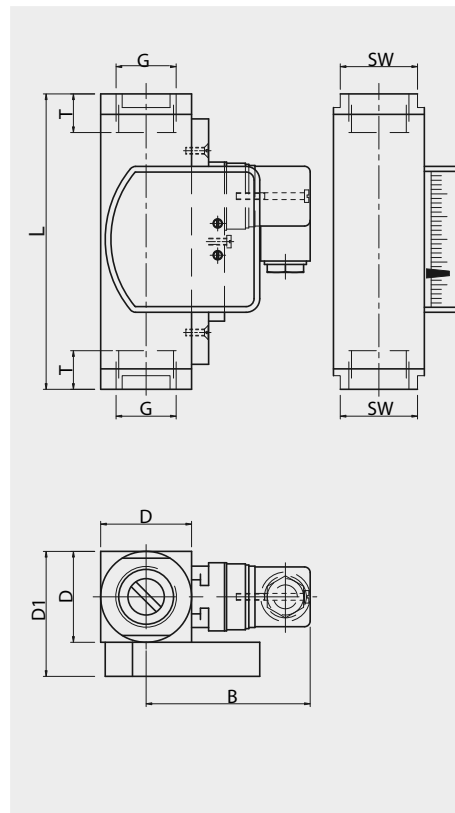
Flow Monitors 1007

DKME/A viscosity compensated to 600mm²/s independent of position

Technical data

Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel to 300 bar Brass to 200 bar
Operating temperature:	120 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 10% of final value
Pressure drop:	0.02 ... 0.4 bar
Mounting position:	Independent of position
Display:	Display instrument macrolon
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	L/min	G	SW	D[mm]	B[mm]	T[mm]	L[mm]	Weight g
DKME/A - 1/20	1 - 20	1/2"	34	40	76	21	152	1510
DKME/A - 1/40	4 - 40	3/4"	34			21	152	1425
		1"	40			17	130	1250
DKME/A - 1/50	5 - 50	3/4"	34	40	76	21	152	1425
DKME/A - 1/60	8 - 60	1"	40			17	130	1245
DKME/A - 1/70	12 - 70	1"	40	40	76	17	130	1245
DKME/A - 1/80	15 - 80							

other switching ranges on request / other media on request / other connection sizes on request

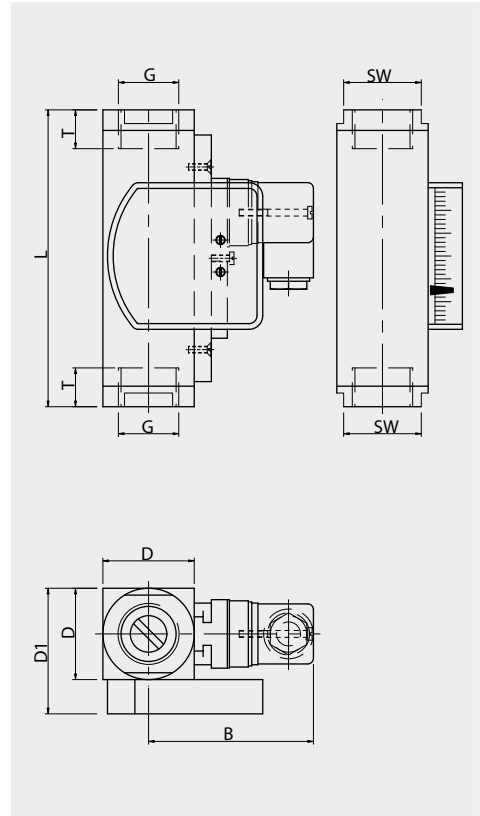
Type combination see type key Flow Monitors

Flow Monitors 1007

DKM/A viscosity compensated to 600mm²/s independent of position

Technical data	
Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel to 300 bar Brass to 250 bar
Operating temperature:	120 °C (standard) 160 °C (optional)
Contacts:	Normally open Change over see contacts p.144
Ex - design:	EExia IIC T6 EExm II T6
Electrical connections:	Plug DIN 43650 / IP65 Connection cable / IP67
Measuring accuracy:	± 10 % of final value
Pressure drop:	0.02 ... 0.4 bar
Mounting position:	Independent of position
Display:	Display instrument macrolon
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	l/min	G	SW[mm]	D[mm]	D1[mm]	B[mm]	T[mm]	L[mm]	Weight [g]
DKM/A - 1/1	0.1 - 0.8	1/4" 1/2" 3/4" 1"	34	40	57	76	21	152	1590
DKM/A - 1/2	0.5 - 1.5		34				21	152	1515
			34				21	152	1430
DKM/A - 1/4	1 - 4		40				17	130	1250
DKM/A - 1/8	2 - 8	1/2" 3/4" 1"	34	40	57	76	21	152	1515
DKM/A - 1/10	3 - 10		34				21	152	1430
DKM/A - 1/15	5 - 15		40				17	130	1250
DKM/A - 1/24	8 - 24	3/4" 1"	34	40	57	76	21	152	1430
DKM/A - 1/30	10 - 30		40				17	130	1250
DKM/A - 1/45	15 - 45	1"	40	40	57	76	17	130	1250
DKM/A - 1/60	20 - 60								
DKM/A - 1/90	30 - 90	1"	40	40	57	76	17	130	1250
DKM/A - 1/110	35 - 110								

other switching ranges on request / other media on request / other connection sizes on request

Type combination see type key Flow Monitors

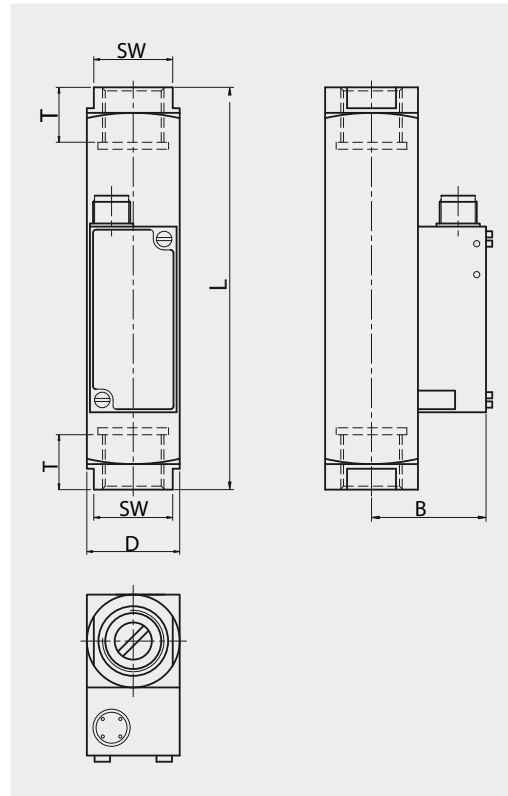
Flow Monitors 1007

DKM/TA viscosity compensated to 600mm²/s independent of position

Technical data

Material:	Stainless steel Brass nickel-plated
Operating pressure:	Stainless steel to 300 bar Brass to 200 bar
Operating temperature:	-20 °C ... +70 °C
Measuring output:	4-20 mA / 15-30 V DC 4-Leiter
Ex - design:	-
Electrical connections:	Patch plug, M12 x 1
Linearity deviation:	± 10% of final value
Pressure drop:	0.02 ... 0.4 bar
Mounting position:	Independent of position
Display:	Without
Connection:	Thread female BSP
Gaskets:	Perbunan Optional Viton, EPDM

Stainless steel / Brass nickel-plated



Type	l/min	G	SW	D[mm]	B[mm]	T[mm]	L[mm]	Weight g				
DKM/TA - 1/1	0.1 - 0.8	1/4"	34	40	42	21	152	1500				
DKM/TA - 1/2	0.5 - 1.5	1/2"	34			21	152	1425				
		3/4"	34			21	152	1340				
DKM/TA - 1/4	1 - 4	1"	40			17	130	1160				
DKM/TA - 1/8	2 - 8	1/2"	34	40	42	21	152	1425				
DKM/TA - 1/10	3 - 10					21	152	1425				
DKM/TA - 1/15	5 - 15					3/4"	34	21	152	1340		
						1"	40	17	130	1160		
DKM/TA - 1/24	8 - 24	3/4"	34	40	42	21	152	1340				
DKM/TA - 1/30	10 - 30					17	130	1160				
DKM/TA - 1/45	15 - 45					1"	40	17	130	1160		
						1"	40	17	130	1160		
DKM/TA - 1/60	20 - 60	1"	40	40	42	17	130	1160				
DKM/TA - 1/90	30 - 90					17	130	1160				
DKM/TA - 1/110	35 - 110					1"	40	40	42	17	130	1160
						1"	40	40	42	17	130	1160

other switching ranges on request / other media on request / other connection sizes on request

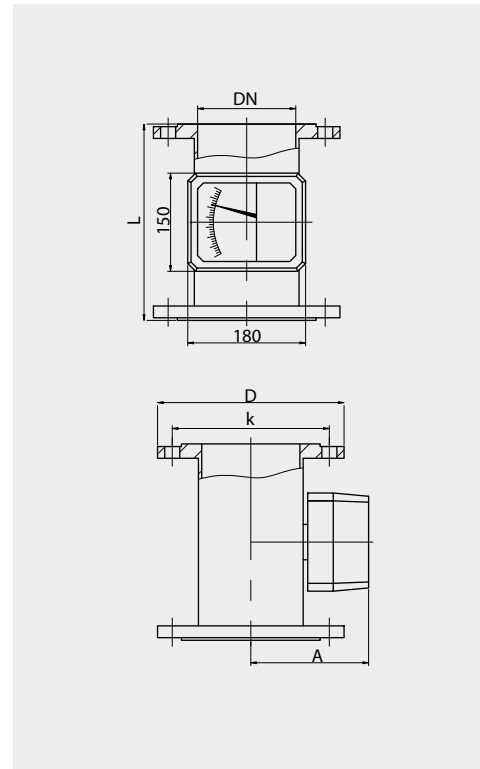
Type combination see type key Flow Monitors

Flow Monitors 1007

SC for air, dependent of position / vertical

Technical data	
Material:	Stainless steel Steel
Operating pressure:	Stainless steel to 40 bar Steel to 40 bar
Operating temperature:	-20 °C ... +200 °C
Contacts:	Change over 250 V / AC / 6 A
Control unit:	TEH 4-wire 24 V DC / 4-20 mA TK 2-wire 24 V DC / 4-20 mA EExib
Electrical connections:	Terminal box aluminium
Measuring accuracy:	± 2.5 % of final value
Pressure drop:	0.04 ... 0.22 bar
Mounting position:	Dependent of position
Display:	Display instrument 150x180 mm
Connection:	Flange PN40
Gaskets:	Viton, EPDM or Perbunan
Protection rating:	IP65

Stainless steel / Steel



Type	Nm ³ /h air	DN	PN	D[mm]	L[mm]	k[mm]	A[mm]	Weight [kg]
SC - 15	0.07 - 0.7 0.12 - 1.2 0.18 - 1.8 0.3 - 3 0.5 - 5 0.7 - 7.5 1.2 - 12 1.8 - 18	15	40	95	250	65	114	3.5
SC - 25	3 - 30 5 - 50 7 - 75 12 - 120	25	40	115	250	85	120	4.5
SC - 40	12 - 120 15 - 180 24 - 240	40	40	150	250	110	128	7.3
SC - 50	24 - 240 30 - 300 45 - 450	50	40	165	250	125	130	8.3

other switching ranges on request / other media on request / other connection sizes on request

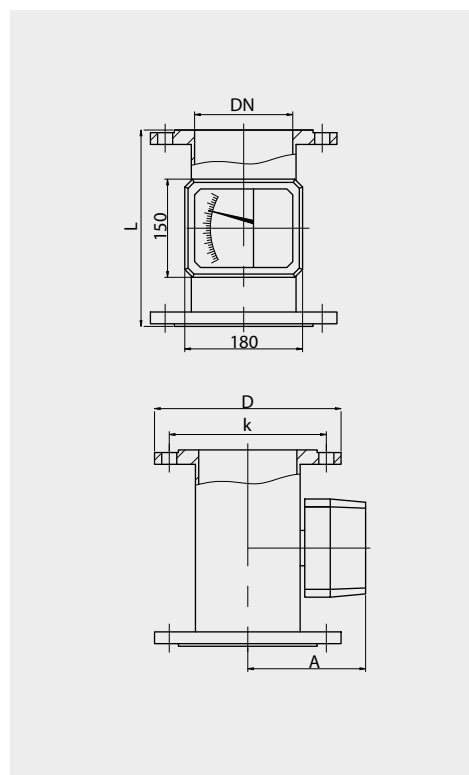
Type combination see type key Flow Monitors

Flow Monitors 1007

SC for air, dependent of position / vertical

Technical data	
Material:	Stainless steel Steel
Operating pressure:	Stainless steel to 40 bar Steel to 40 bar
Operating temperature:	-20 °C ... +200 °C
Contacts:	Change over 250 V / AC / 6 A
Control unit:	TEH 4-wire 24 V DC / 4-20 mA TK 2-wire 24 V DC / 4-20 mA EExib
Electrical connections:	Terminal box aluminium
Measuring accuracy:	± 2.5 % of final value
Pressure drop:	0.04 ... 0.22 bar
Mounting position:	Dependent of position
Display:	Display instrument 150x180 mm
Connection:	Flange PN40
Gaskets:	Viton, EPDM or Perbunan
Protection rating:	IP65

Stainless steel / Steel



Type	Nm ³ /h air	DN	PN	D[mm]	L[mm]	k[mm]	A[mm]	Weight [kg]
SC - 65	45 - 450 60 - 600	65	16	185	250	145	130	10
SC - 80	60 - 600 75 - 750 90 - 900	80	16	200	250	160	142	12
SC - 100	120 - 1200 150 - 1500 180 - 1800	100	16	220	250	180	150	15
SC - 125	240 - 2400 300 - 3000 360 - 3600	125	16	250	250	210	162	20
SC - 150	450 - 4500 500 - 5400	150	10	285	300	240	10	32

other switching ranges on request / other media on request / other connection sizes on request

Type combination see type key Flow Monitors

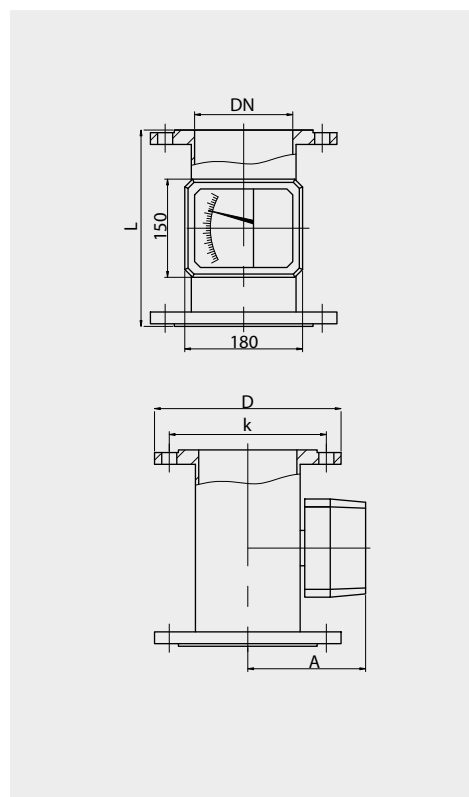
Flow Monitors 1007

SC for water, dependent of position / vertical

Technical data

Material:	Stainless steel Steel
Operating pressure:	Stainless steel to 40 bar Steel to 40 bar
Operating temperature:	-20 °C ... +200 °C
Contacts:	Change over 250 V / AC / 6 A
Control unit:	TEH 4-wire 24 V DC / 4-20 mA TK 2-wire 24 V DC / 4-20 mA EExib
Electrical connections:	Terminal box aluminium
Measuring accuracy:	± 2.5 % of final value
Pressure drop:	0.04 ... 0.22 bar
Mounting position:	Dependent of position
Display:	Display instrument 150x180 mm
Connection:	Flange PN40
Gaskets:	Viton, EPDM or Perbunan
Protection rating:	IP65

Stainless steel / Steel



Type	I/h	DN	PN	D[mm]	L[mm]	k[mm]	A[mm]	Weight [kg]
SC - 15	2.5 - 25 4 - 40 6 - 60 10 - 100 16 - 160 25 - 250 40 - 400 60 - 600	15	40	95	250	65	114	3.5
SC - 25	100 - 1000 160 - 1600 250 - 2500 400 - 4000	25	40	115	250	85	120	4.5
SC - 40	400 - 4000 500 - 6300 800 - 8000	40	40	150	250	110	128	7.3
SC - 50	0.8 - 8m³/h 1 - 10m³/h 1.5 - 15m³/h	50	40	165	250	125	130	8.3

other switching ranges on request / other media on request / other connection sizes on request

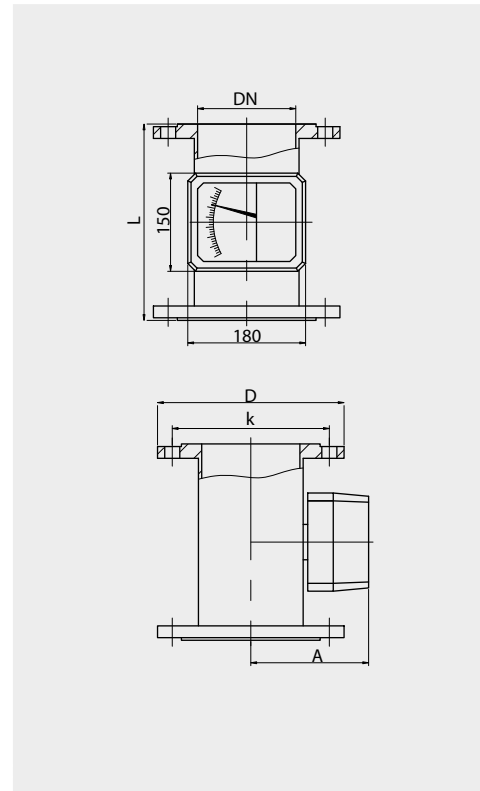
Type combination see type key Flow Monitors

Flow Monitors 1007

SC for water, dependent of position / vertical

Technical data	
Material:	Stainless steel Steel
Operating pressure:	Stainless steel to 40 bar Steel to 40 bar
Operating temperature:	-20 °C ... +200 °C
Contacts:	Change over 250 V / AC / 6 A
Control unit:	TEH 4-wire 24 V DC / 4-20 mA TK 2-wire 24 V DC / 4-20 mA EExib
Electrical connections:	Terminal box aluminium
Measuring accuracy:	± 2.5 % of final value
Pressure drop:	0.04 ... 0.22 bar
Mounting position:	Dependent of position
Display:	Display instrument 150x180 mm
Connection:	Flange PN40
Gaskets:	Viton, EPDM or Perbunan
Protection rating:	IP65

Stainless steel / Steel



Type	m³/h	DN	PN	D[mm]	L[mm]	k[mm]	A[mm]	Weight [kg]
SC - 65	1.5 - 15 2 - 20	65	16	185	250	145	130	10
SC - 80	2 - 20 2.5 - 25 3 - 30	80	16	200	250	160	142	12
SC - 100	4 - 40 5 - 50 6 - 60	100	16	220	250	180	150	15
SC - 125	8 - 80 10 - 100 12 - 120	125	16	250	250	210	162	20
SC - 150	15 - 150 18 - 180	150	10	285	300	240	10	32

other switching ranges on request / other media on request / other connection sizes on request

Type combination see type key Flow Monitors

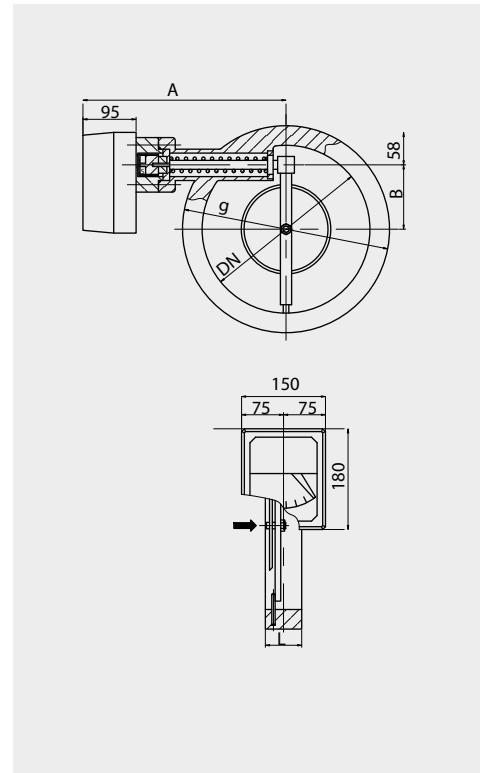
Flow Monitors 1007

DP for water, dependent of position / vertical / horizontal

Technical data

Material:	Stainless steel Plastic coated steel
Operating pressure:	Stainless steel to 40 bar Steel to 40 bar
Operating temperature:	Stainless steel -20 °C ... +180 °C Steel coated -20 °C ... +130 °C
Contacts:	Change over 250 V / AC / 6 A
Control unit:	TEH 4-wire 24 V DC / 4-20 mA TK 2-wire 24 V DC / 4-20 mA EExib
Electrical connections:	Terminal box aluminium
Measuring accuracy:	± 2.5 % of final value
Pressure drop:	0.15 ... 0.22 bar
Mounting position:	Horizontal or vertical
Display:	Display instrument 150x180 mm
Connection:	Flange PN40
Gaskets:	Viton, EPDM or Perbunan
Protection rating:	IP65

Stainless steel / Steel coated



Type	m³/h	DN	PN	A[mm]	B[mm]	L[mm]	g[mm]	Weight [kg]
DP - 50	0.8 - 6 2 - 10 3 - 15	50	40	250	33	65	102	6
DP - 65	2 - 10 3 - 16 3 - 25	65	40	250	40	65	122	7
DP - 80	2 - 16 3 - 25 5 - 40	80	40	250	50	65	138	8
DP - 100	5 - 40 8 - 60 10 - 80	100	16	250	60	65	158	10
DP - 125	8 - 60 15 - 100 15 - 120	125	16	280	70	65	188	12

other switching ranges on request / other media on request / other connection sizes on request

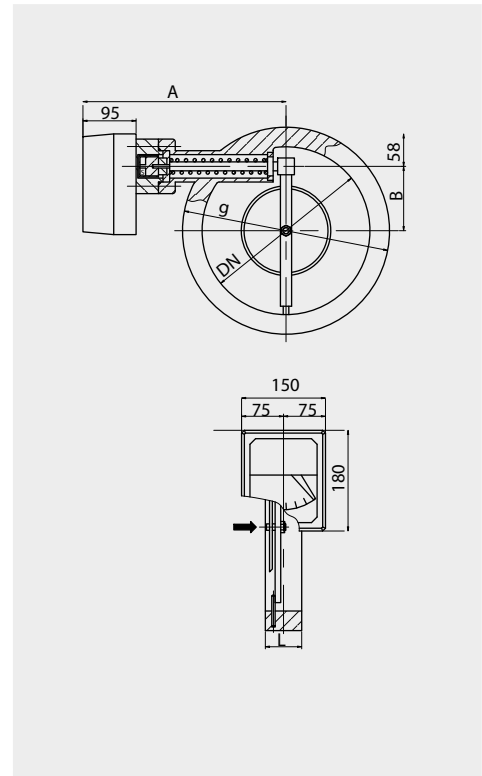
Type combination see type key Flow Monitors

Flow Monitors 1007

DP for water, dependent of position / vertical / horizontal

Technical data	
Material:	Stainless steel Plastic coated steel
Operating pressure:	Stainless steel to 40 bar Steel to 40 bar
Operating temperature:	Stainless steel -20 °C ... +180 °C Steel coated -20 °C ... +130 °C
Contacts:	Change over 250 V / AC / 6 A
Control unit:	TEH 4-wire 24 V DC / 4-20 mA TK 2-wire 24 V DC / 4-20 mA EExib
Electrical connections:	Terminal box aluminium
Measuring accuracy:	± 2.5 % of final value
Pressure drop:	0.15 .. 0.22 bar
Mounting position:	Horizontal or vertical
Display:	Display instrument 150x180 mm
Connection:	Flange PN40
Gaskets:	Viton, EPDM or Perbunan
Protection rating:	IP65

Stainless steel / Steel coated



Type	m ³ /h	DN	PN	A[mm]	B[mm]	L[mm]	g[mm]	Weight [kg]
DP - 150	15 - 100 20 - 160 25 - 200	150	16	280	78	65	212	14
DP - 200	20 - 160 30 - 250 40 - 350	200	16	320	102	65	268	20
DP - 250	25 - 200 50 - 400 60 - 500	250	10	350	109	65	320	29
DP - 300	30 - 250 50 - 400 80 - 600	300	10	370	115	65	370	35

other switching ranges on request / other media on request / other connection sizes on request

Type combination see type key Flow Monitors

Flow Monitors 1007

Electrical switching capacity of the contacts

Type	Normally open	Change over	EEx ia IIC T6	EEx m II T6
RVO/U-1	max. 250 V/3 A/100 VA	max. 500 V/1.5 A/50 VA	Chang.over 45 V/1 A	Chang.over 250 V/1 A/30 VA
			Norm.open 45 V/1 A	Norm.open 250 V/2 A/60 VA
RVO/U-2	max. 230 V/3 A/60 VA	max. 250 V/1.5 A/50 VA	-	-
RVO/U-4	max. 200 V/1A/20VA	max. 200 V/1 A/20 VA	-	-
RVM/U-1	max. 250 V/3 A/100 VA	max. 500 V/1.5 A/50 VA	Chang.over 45 V/1 A	Chang.over 250 V/1 A/30 VA
			Norm.open 45 V/1 A	Norm.open 250 V/2 A/60 VA
RVM/U-2	max. 230 V/3 A/60 VA	max. 250 V/1.5 A/50 VA	-	-
			-	-
RVM/U-4	max. 200 V/1 A/20 VA	max. 200 V/1 A/20 VA	-	-
RVM/UM	max. 250 V/3 A/100 VA	max. 500 V/1.5 A/50 VA	Chang.over 45 V/1 A	Chang.over 250 V/1 A/30 VA
			Norm.open 45 V/1 A	Norm.open 250 V/2 A/60 VA
DUG	max. 250 V/3 A/100 VA	max. 500 V/1.5 A/50 VA	Chang.over 45 V/1 A	Chang.over 250 V/1 A/30 VA
			Norm.open 45 V/1 A	Norm.open 250 V/2 A/60 VA
DUM	max. 400 V/3 A/100 VA	max. 500 V/1.5 A/50 VA	Chang.over 45 V/1 A	Chang.over 250 V/1 A/30 VA
			Norm.open 45 V/1 A	Norm.open 250 V/2 A/60 VA
DUM/A	max. 250 V/3 A/100 VA	max. 500 V/1.5 A/50 VA	Chang.over 45 V/1 A	Chang.over 250 V/1 A/30 VA
			Norm.open 45 V/1 A	Norm.open 250 V/2 A/60 VA
DWG	max. 250 V/3 A/100 VA	max. 500 V/1.5 A/50 VA	Chang.over 45 V/1 A	Chang.over 250 V/1 A/30 VA
			Norm.open 45V/1A	Norm.open 250 V/2 A/60 VA
DWM	max. 250 V/3 A/100 VA	max. 500 V/1.5 A/50 VA	Chang.over 45 V/1 A	Chang.over 250 V/1 A/30 VA
			Norm.open 45 V/1 A	Norm.open 250 V/2 A/60 VA
DWM/A	max. 250V/3A/100VA	max. 500 V/1.5 A/50 VA	Chang.over 45 V/1 A	Chang.over 250 V/1 A/30 VA
			Norm.open 45 V/1 A	Norm.open 250 V/2 A/60 VA
DKG-1	max. 250 V/3 A/100 VA	max. 500 V/1.5 A/50 VA	Chang.over 45 V/1 A	Chang.over 250 V/1 A/30 VA
			Norm.open 45 V/1 A	Norm.open 250 V/2 A/60 VA
DKG-2	max. 230 V/3 A/60 VA	max. 250 V/1.5 A/50 VA	-	-
DKM-1	max. 250 V/3 A/100 VA	max. 500 V/1.5 A/50 VA	Chang.over 45 V/1 A	Chang.over 250 V/1 A/30 VA
			Norm.open 45 V/1 A	Norm.open 250 V/2 A/60 VA
DKM-2 DKME	max. 230 V/3 A/60 VA	max. 250 V/1.5 A/50 VA	-	-
			-	-
DKM-A DKME/A	max. 250 V/3 A/100 VA	max. 250 V/1.5 A/50 VA	Chang.over 45 V/1 A	Chang.over 250 V/1 A/30 VA
			Norm.open 45 V/1 A	Norm.open 250 V/2 A/60 VA
SC	-	max. 230 V AC/6 A/50 VA	Acc.to approval	-
DP	-	max. 230 V AC/6 A/50 VA	Acc.to approval	-

Flow Monitors 1007

Type key

Code 1	Key 1	Type of flow monitor	ATEX
	RVO/U - .. / .. -	Type of flow monitor with sight glass	Ex
	RVM/U - .. / .. -	Type of flow monitor without sight glass	Ex
	RVM/UM - .. / .. -	Type of flow monitor without sight glass	Ex
	DUG - .. -	Type of flow monitor with sight glass	Ex
	DUM - .. -	Type of flow monitor without sight glass	Ex
	DUM/A - .. -	Type of flow monitor with display instrument	Ex
	DUM/TA - .. -	Type of flow monitor with analog exit	Ex
	DWG - .. -	Type of flow monitor with sight glass	Ex
	DWG/L - .. -	Type of flow monitor with sight glass	Ex
	DWM - .. -	Type of flow monitor without sight glass	Ex
	DWM/A - .. -	Type of flow monitor with display instrument	Ex
	DWM/L - .. -	Type of flow monitor without sight glass	Ex
	DWM/A-L - .. -	Type of flow monitor with display instrument	Ex
	DKG - .. -	Type of flow monitor with sight glass	Ex
	DKM - .. -	Type of flow monitor without sight glass	Ex
	DKME - .. -	Type of flow monitor without sight glass	Ex
	DKME/A - .. -	Type of flow monitor with display instrument	Ex
	DKM/A - .. -	Type of flow monitor with display instrument	Ex
	DKM/TA - .. -	Type of flow monitor with analog exit	Ex
	SC - .. -	Flow meter with display instrument	Ex
	DP - .. -	Flow meter with display instrument	Ex
Code 2	Key 1	Design of process connection	ATEX
	1 -	¼" Thread female BSP	Ex
	2 -	⅜" Thread female BSP	Ex
	3 -	½" Thread female BSP	Ex
	4 -	¾" Thread female BSP	Ex
	5 -	1" Thread female BSP	Ex
	6 -	1¼" Thread female BSP	Ex
	7 -	1½" Thread female BSP	Ex
	8 -	1¾" Thread female BSP	Ex
	9 -	2" Thread female BSP	Ex
	X -	Various	Ex
Code 3	Key 1	Material	ATEX
	V -	Stainless steel	Ex
	VK -	Steel plastic coated	Ex
	M -	Brass nickel-plated	Ex
	S -	Steel	Ex
	X -	Various	Ex

Type combination

Code	1	2	3	4	5	6	7
Key	1	1	1	1	1/2	1	1
Example	DUG-8 -	3 -	V -	SGW -	S/ST -	120 -	EEExia

Flow Monitors 1007

Type key

Code 4	Key 1	Sight glass / scale / scaling	ATEX
	SGW -	Sight glass with water scaling L/min	
	SGL -	Sight glass with air scaling NI/min	
	KW -	With adhesive scaling for water L/min	
	KL -	With adhesive scaling for air NI/min	
	X -	Various	
Code 5	Key 1	Switching function / contact - analog exit	ATEX
	S / .. -	Normally open contact	
	S2 / .. -	2 normally open contacts	
	U / .. -	Change over contact	
	U2 / .. -	2 change over contacts	
	SE / .. -	Normally open contact with increased switching capacity	
	S2E / .. -	2 normally open contacts with increased switching capacity	
	UE / .. -	Change over contact with increased switching capacity	
	U2E / .. -	2 change over contacts with increased switching capacity	
	AI / .. -	analog exit mA	
	AV / .. -	analog exit V	
	X / .. -	Various	
	Key 2	Contact connection	ATEX
	.. / ST-	Hirschmann connection plug	
	.. / KV-	Cable connection compound-filled	
	.. / X-	Various	
Code 6	Key 1	Temperature indication	ATEX
	120 -	Up to 120 °C	
	130 -	Up to 130 °C	
	160 -	Up to 160 °C	
	180 -	Up to 180 °C	
	200 -	Up to 200 °C	
	X -	Various	
Code 7	Key 1	Approvals	ATEX
	EExia	Only for intrinsically safe connection	
	EExm	Explosion proof / cable compound-filled	
	X	Various	

Type combination

Code	1	2	3	4	5	6	7
Key	1	1	1	1	1/2	1	1
Example	DUG-8 -	3 -	V -	SGW -	S/ST -	120 -	EExia