

Diaphragm Seal Accessories

NEUMO BioControl™ • Model 910.60

Diaphragm Seals

Service intended

The BioControl system is intended for the adaption of pressure gauges fitted to diaphragm seals model 990.60 and thermometers model TR451 and TR452 to pipeline systems and tanks. It has been specially developed to meet the requirements of sterile process engineering.

For the various types of requirements of sterile processes a variety of different versions of the BioControl system are available with type tests.

Features

Housing type G

This is a flow-through housing with welding ends for directly welding into the pipeline (process connection). Pressure and temperature measuring instrumentation that meets hygienic standards and avoids dead spaces is ensured by means of two aseptic flange connections (BioControl connection).



Housing type G

Housing, angled variant type U

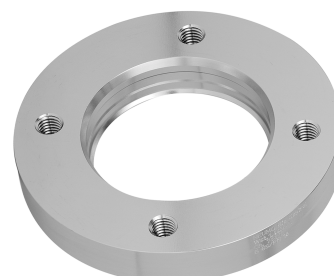
This is a 90° angled variant of the flow-through housing. This design is particularly suitable for the adaptation of thermometers with long insertion lengths.



Housing, angled variant type U

Mounting flange type B

The mounting flange has been developed for the adaptation of pressure gauges and thermometers to sterile tanks. It enables flush mounting of instrumentation without dead spaces in tanks.



Mounting flange type B

Blind flange type D

to seal the housing or the angled housing variant.

Glass set type S

consisting of:

- glass pane of borosilicate material, suitable up to a working pressure of 10 bar
- sealing cover of stainless steel 1.4435
- flat packing
- stainless steel screws

Material

Stainless steel 1.4435

Inner $R_a < 0,8 \mu m$, superfinish turned and electropolished

Washers

EPDM (FDA approved)

FEP / VITON (FDA approved)

Connection variants

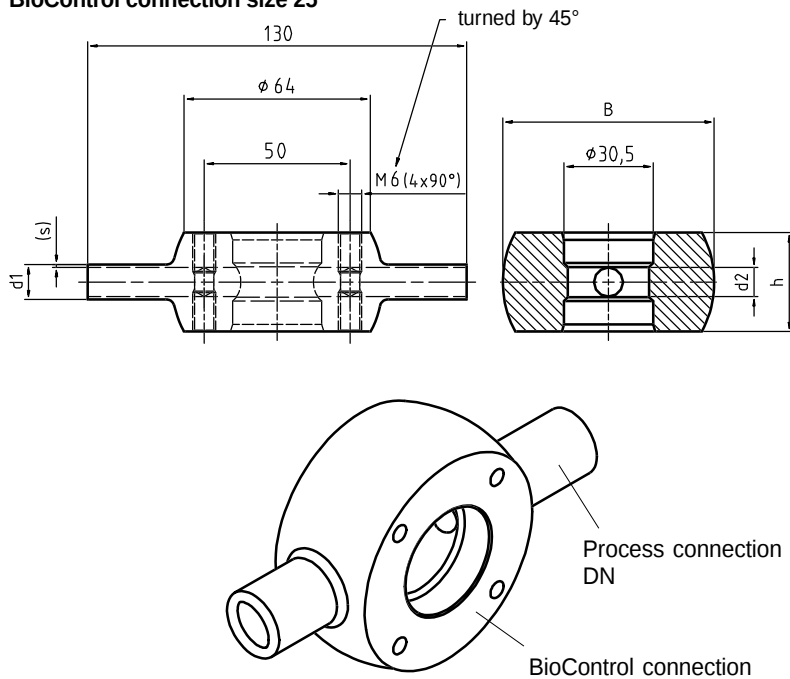
Pressure gauge with diaphragm seal Model 990.60, see data sheet CS 99.21

Resistance thermometers Model TR451 and TR452, see data sheet TE 60.27

Dimensions

Housing type G

BioControl connection size 25



for pipe per DIN 11 850

DN [mm]	Dimensions [mm]				
	d1	d2	s	h	B
6	8	6	1	28	70
8	10	8	1	30	71
10	12	10	1	32	71.5
15	19	16	1.5	38	74.5
20	23	20	1.5	42	76.5

for pipe per DIN EN ISO 1127

DN [mm]	Dimensions [mm]				
	d1	d2	s	h	B
8	13.5	10.3	1.6	32.3	72
10	17.2	14	1.6	36	73.5
15	21.3	18.1	1.6	40.1	75.5
20	26.9	23.7	1.6	45.7	78.5

BioControl connection 50 and 65

for pipe per DIN 11 850

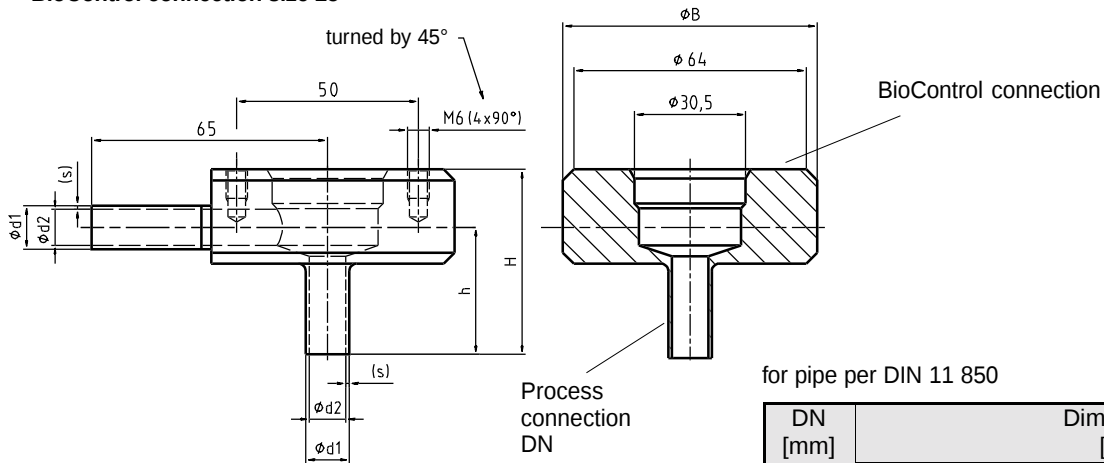
BioControl connection	DN [mm]	Dimensions [mm]								
		d1	d2	s	h	l	D	K	U	M
Size 50	25	29	26	1.5	60	150	90	70	50.1	M8
	40	41	38	1.5	72	150	90	70	50.1	M8
	50	53	50	1.5	84	150	90	70	50.1	M8
	65	70	66	2	100	170	90	70	50.1	M8
	80	85	81	2	115	170	90	70	50.1	M8
	100	104	100	2	134	170	90	70	50.1	M8
Size 65	40	41	38	1.5	72	180	120	95	68.1	M10
	50	53	50	1.5	84	180	120	95	68.1	M10
	65	70	66	2	100	200	120	95	68.1	M10
	80	85	81	2	115	200	120	95	68.1	M10
	100	104	100	2	134	200	120	95	68.1	M10

for pipe per DIN EN ISO 1127

BioControl connection	DN [mm]	Dimensions [mm]								
		d1	d2	s	h	l	D	K	U	M
Size 50	25	33.7	29.7	2	63.7	150	90	70	50.1	M8
	40	48.3	44.3	2	78.3	150	90	70	50.1	M8
	50	60.3	56.3	2	90.3	150	90	70	50.1	M8
	65	76.1	71.5	2.3	105.5	170	90	70	50.1	M8
	80	88.9	84.3	2.3	118.3	170	90	70	50.1	M8
	100	114.3	109.7	2.3	143.7	170	90	70	50.1	M8
Size 65	40	48.3	44.3	2	78.3	180	120	95	68.1	M10
	50	60.3	56.3	2	90.3	180	120	95	68.1	M10
	65	76.1	71.5	2.3	105.5	200	120	95	68.1	M10
	80	88.9	84.3	2.3	118.3	200	120	95	68.1	M10
	100	114.3	109.7	2.3	143.7	200	120	95	68.1	M10

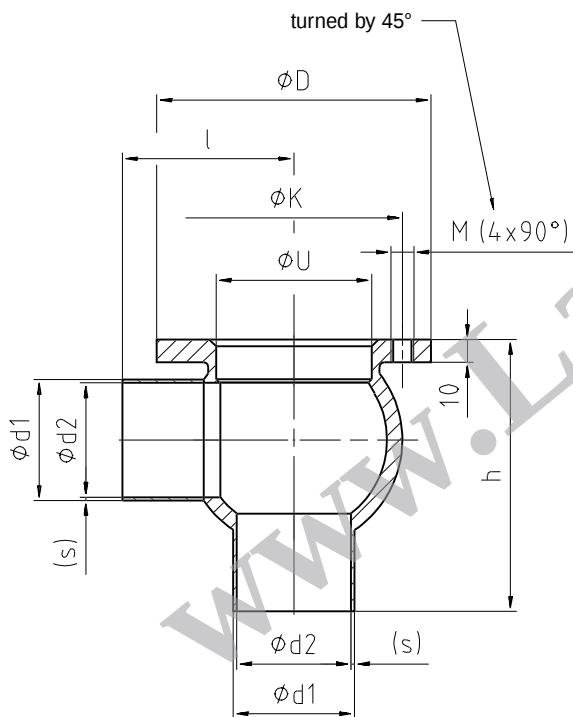
Housing, angled variant type U

BioControl connection size 25



DN [mm]	Dimensions [mm]					
	d1	d2	s	h	B	H
6	8	6	1	34	70	48
8	10	8	1	35	70	50
10	12	10	1	35	70	51
15	19	16	1.5	41	72	60
20	23	20	1.5	41	73	65

BioControl connection size 50 and 65

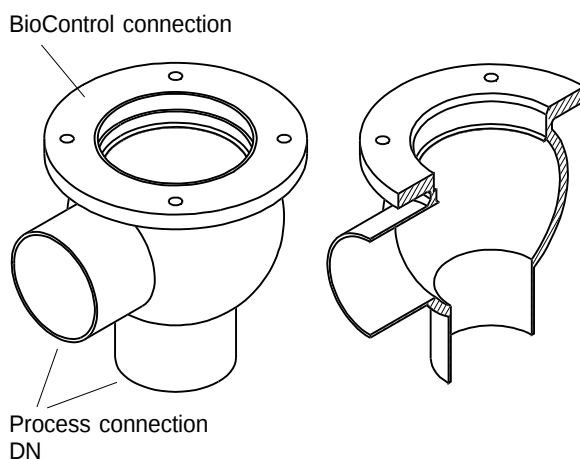


for pipe per DIN 11 850

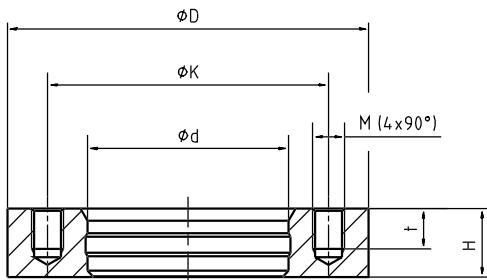
BioControl connection	DN [mm]	Dimensions [mm]								
		d1	d2	s	h	l	D	K	U	M
Size 50	25	29	26	1.5	90	75	90	70	50.1	M8
	40	41	38	1.5	95	75	90	70	50.1	M8
	50	53	50	1.5	105	75	90	70	50.1	M8
	65	70	66	2	130	85	90	70	50.1	M8
	80	85	81	2	145	90	90	70	50.1	M8
	100	104	100	2	165	100	90	70	50.1	M8
Size 65	40	41	38	1.5	105	90	120	95	68.1	M10
	50	53	50	1.5	112	90	120	95	68.1	M10
	65	70	66	2	130	100	120	95	68.1	M10
	80	85	81	2	145	100	120	95	68.1	M10
	100	104	100	2	165	100	120	95	68.1	M10

for pipe per DIN EN ISO 1127

BioControl connection	DN [mm]	Dimensions [mm]								
		d1	d2	s	h	l	D	K	U	M
Size 50	25	33.7	29.7	2	95	75	90	70	50.1	M8
	40	48.3	44.3	2	100	75	90	70	50.1	M8
	50	60.3	56.3	2	110	75	90	70	50.1	M8
	65	76.1	71.5	2.3	135	85	90	70	50.1	M8
	80	88.9	84.3	2.3	150	90	90	70	50.1	M8
	100	114.3	109.7	2.3	175	100	90	70	50.1	M8
Size 65	40	48.3	44.3	2	107	90	120	95	68.1	M10
	50	60.3	56.3	2	115	90	120	95	68.1	M10
	65	76.1	71.5	2.3	135	100	120	95	68.1	M10
	80	88.9	84.3	2.3	155	100	120	95	68.1	M10
	100	114.3	109.7	2.3	175	100	120	95	68.1	M10

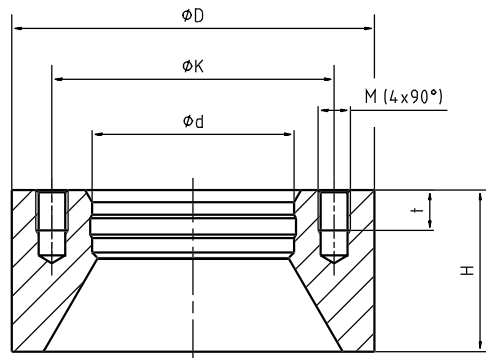


Mounting flange type B



Mounting flange low design

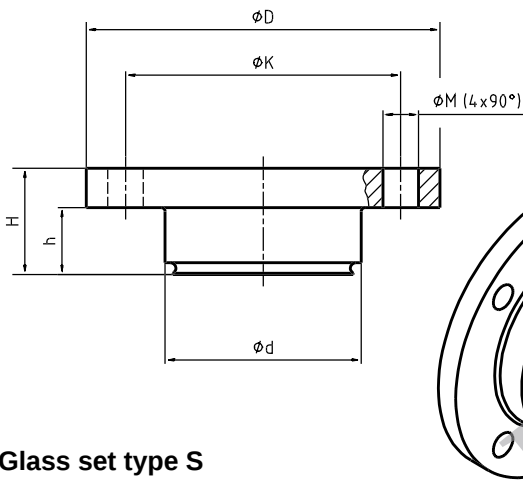
BioControl connection	Dimensions [mm]					
	d	D	K	H	t	M
Size 25	30.5	64	50	11	6.5	M6
Size 50	50	90	70	17	10	M8
Size 65	68	120	95	17	10	M10
Size 80	87.5	140	115	25	12	M10



Mounting flange high design

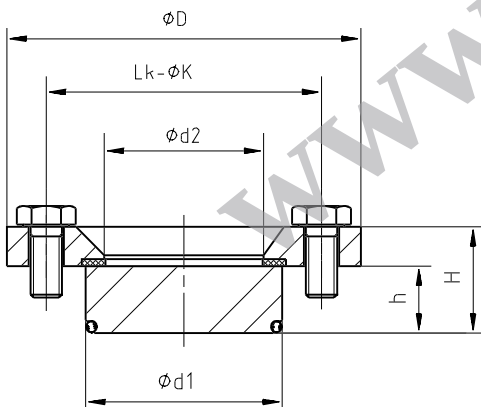
BioControl connection	Dimensions [mm]					
	d	D	K	H	t	M
Size 25 h	30.5	64	50	25	7	M6
Size 50 h	50	90	70	40	10	M8
Size 65 h	68	120	95	50	12	M10

Blind flange type D



BioControl connection	Dimensions [mm]					
	d	D	K	H	h	M
Size 25	30.5	64	50	20	11	7
Size 50	50	90	70	27	17	9
Size 65	68	120	95	27	17	11
Size 80	87.5	140	115	37	25	11

Glass set type S



BioControl connection	Dimension [mm]							
	d1	d2	D	K	H	h	O-ring	Washer
Size 25	30.5	25	64	50	20	11	Ø23.5x3	Ø32/26x1.5
Size 50	50	40.5	90	70	27	17	Ø42x3	Ø52/40x1.5
Size 65	68	58.5	120	95	27	17	Ø60x3	Ø70/58x1.5
Size 80	87.5	78	140	115	37	25	Ø78x3	Ø87,5/78x1.5

Ordering information

Model / Features (housing, housing angled variant, mounting flange, blind flange, glass set) / BioControl connection size / Nominal size DN / Washer

Specifications and dimensions given in this leaflet represent the state of engineering at the time of printing. Modifications may take place and materials specified may be replaced by others without prior notice.



WIKA Alexander Wiegand GmbH & Co. KG
 Alexander-Wiegand-Straße · 63911 Klingenberg
 Tel.: (0 93 72) 132-0 · Fax: (0 93 72) 132-406
<http://www.wika.de> · E-mail: info@wika.de