



Chemical seals for hygienic pressure applications Daxx series

Hygienic seals are designed for systems needing contact surfaces that are rigorously clean and totally safe. The function of the chemical seal is to isolate the pressure gauge from the process fluid, preventing bacteria developing inside the pressure gauge's sensing element.

The fluid pressure being measured acts on the diaphragm and is transmitted to the pressure gauge by a neutral transmitting liquid.

The quick release coupling and flush diaphragm facilitate easy cleaning.

The following connection systems are offered :

- CLAMP system to NF E 29521, ISO 2852 and DIN 32676 standards
- NUT system to SMS 1145 standard
- NUT system to DIN 11 851 standard
- Homogenizer system
- NUT system according to BS 4825 (RTJ-IDF)
- Compatible system VARIVENT®
- **All stainless steel, flush diaphragm**
- **Rapid assembly and disassembly**
- **Sterilization in place (SIP), cleaning in place (CIP)**
- **Fluid temperature up to 150°C depending on pressure, measuring device or mounting.**
- **3-A approval (N°1118)** (DANC, DAEF, DAEL, DADF, DADL with pressure gauges MEX, MIX, MMX, MEP)
- **Roughness $\leq 0.8 \mu\text{m}$**



Specifications

Compatibility table of hygienic seals with pressure gauges (direct mounting)

Range in bar according to the temperature	Fluid temperature: -20 +100°C		
	Ambient temperature: -10/+50°C		
	MEX2 (Ø50) - MEX3 (Ø63)	MEX35 (Ø100)**	MEX5 (Ø100)
DN25 (DANC/DADL/DAEL)	0+10 ... 0+25	0+10 ... 0+25	Not available
DN32 - DN38 - DN40 + DN25 VARIVENT®	0+2.5 ... 0+40	0+2.5 ... 0+4	0+6 ... 0+40
DN50 - DN51 + DN40/125 VARIVENT®	0+1 ... 0+40	0+1 (*)	0+1.6 ... 0+40
DN32 - DN38 - DN40	-1+3 ... -1+39	-1+3	-1+5 ... -1+39
DN50 - DN51	-1+1.5 ... -1+39	-1+1.5	-1+3 ... -1+39

(*) class 2.5

Range in bar according to the temperature	Fluid temperature: -20 +150°C		
	Ambient temperature: -10/+70°C		
	MEX2 - MEX3	MEX35**	MEX5
DN25 (DANC/DADL/DAEL)	0+16 ... 0+25	0+16 ... 0+25	Not available
DN32 - DN38 - DN40 + DN25 VARIVENT®	0+4 ... 0+40	0+4 ... 0+6	0+10 ... 0+40
DN50 - DN51 + DN40/125 VARIVENT®	0+1.6 ... 0+40	0+1.6	0+2.5 ... 0+40
DN32 - DN38 - DN40	-1+5 ... -1+39	-1+5	-1+9 ... -1+39
DN50 - DN51	-1+3 ... -1+39	Not available	-1+3 ... -1+39

Pressure gauge accuracy (20°C)

MEX2 (Ø50) - MEX3 (Ø63) : class 1,6
MEX35 (Ø100) : class 1.6 except 0+1 bar (class 2,5)
MEX5 (Ø100) : class 1

Max. range 0+40 bar or -1+39 bar except DANC, limited to 25 bar (or -1+24 bar)
For varivent® : 40 bar

Note**:

The MEX35 is a pressure gauge DN100 stainless steel, class 1.6 specially designed to be mounted on seal only in the range above. D type and G½ connection exclusively.
Pressure gauges 50 and 63 mm dia. can be also mounted on homogenizer connection DHOM (optional) for P \leq 600 bar.

Type of assembly as a function of the fluid temperature to be measured

For detailed information on compatibility of these chemical seals with pressure switches, differential pressure gauges... consult the catalogue «chemical seal». The cooling system can be used to extend the lower pressure figures given in the table below.



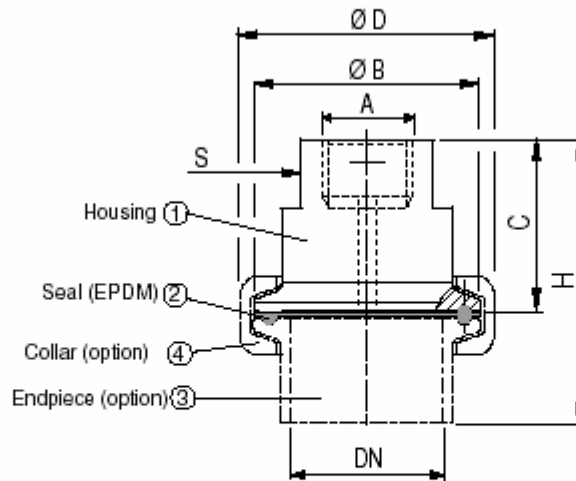
Direct mounting



Mounting with cooling system

Range of hygienic seals, dimensions

DANC (CLAMP according to NF E 29521 / ISO 2852 / DIN 32676 standards)

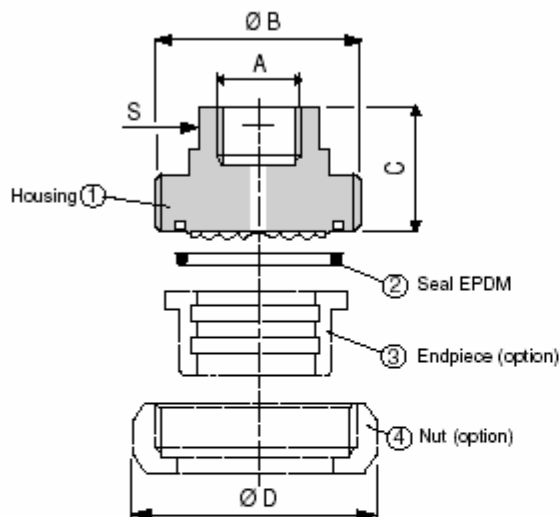


Dimensions mm

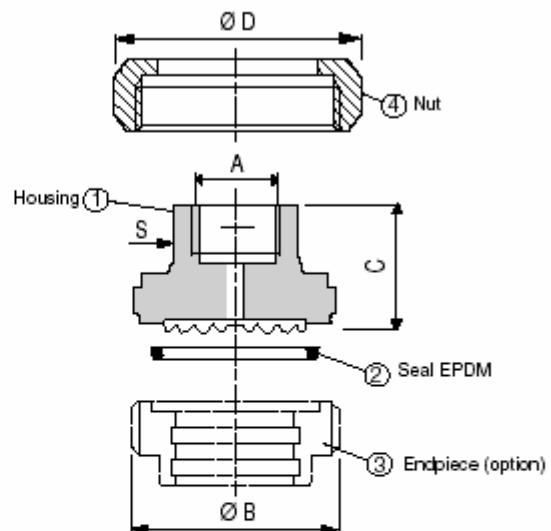
DN to NF E 29521 ISO 2852 std	DN to DIN 32676 std	A	Ø B	C	D	H	S /flats	Weight Kg ①+②
DN25 & 38	DN25 & 40	G½ or G¾	50.5	32 ¹⁾	66	-60	27	0.200
DN51	DN50	G½ or G¾	64	32 ¹⁾	79	-65	27	0.320

¹⁾ for G¾, C = 30

DAEF (SMS 1145 with threaded housing)



DAEL (SMS 1145 with smooth housing)



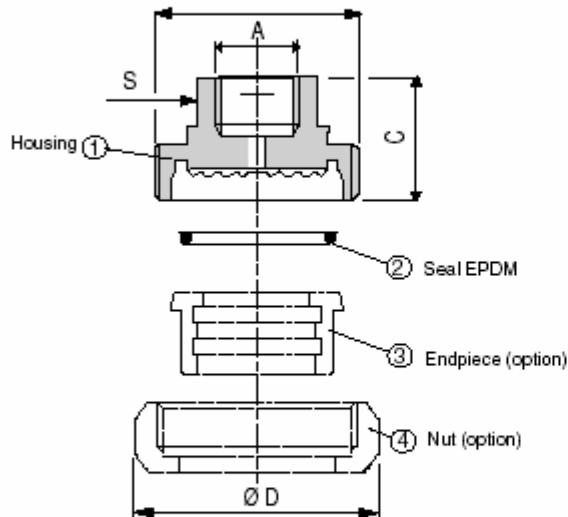
Dimensions mm

Model	DN mm or in.	A	Ø B to SMS std	C	D	S /flats	dimensions ①+②+③+④	Weight Kg ①+②	Weight Kg ①+②+④
DAEF (SMS 1145)	DN38 (1½")	G½ or G¾	60 x 1/8	32	74	27	-55	0.400	
	DN51 (2")	G½ or G¾	70 x 1/8	32	84	27	-55	0.480	
DAEL (SMS 1145)	DN25 (1")	G½ or G¾	40 x 1/8	32 ¹⁾	51	27	-50	0.160	0.310
	DN38 (1½")	G½ or G¾	60 x 1/8	32 ¹⁾	74	27	-55	0.300	0.540
	DN51 (2")	G½ or G¾	70 x 1/8	32 ¹⁾	84	27	-60	0.420	0.730

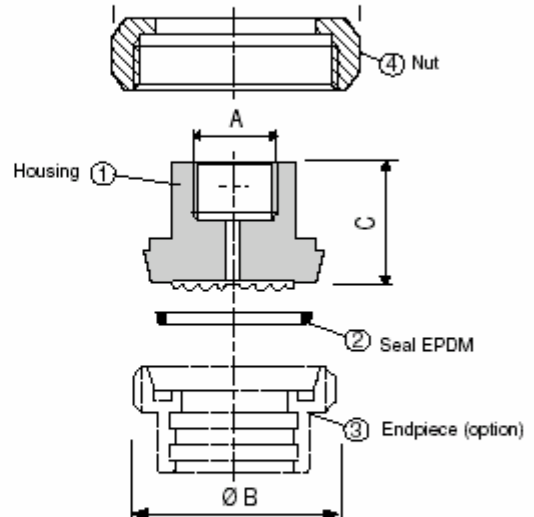
¹⁾ for G¾, C = 28

Range of hygienic seals, dimensions

DADF (DIN 11851 with threaded housing)



DADL (DIN 11851 with smooth housing)



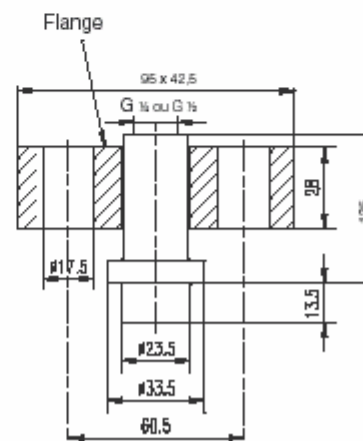
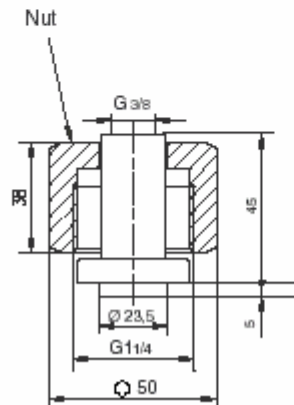
Dimensions mm

Model	DN mm	A	Ø B to DIN std	C	D	S /flats	dimensions ①+②+③+④	Weight Kg ①+②	Weight Kg ①+②+④
DADF (DIN 11851)	DN32	G 1/2 or G 1/4	58 x 1/8	39 2)	70	27	-57	0.360	
	DN40	G 1/2 or G 1/4	65 x 1/8	39 2)	78	27	-58	0.460	
	DN50	G 1/2 or G 1/4	78 x 1/8	39 2)	92	27	-60	0.580	
DADL (DIN 11851)	DN25	G 1/2 or G 1/4	52 x 1/8	35 1)	63	27	-57	0.230	0.420
	DN32	G 1/2 or G 1/4	58 x 1/8	35 1)	70	27	-60	0.290	0.500
	DN40	G 1/2 or G 1/4	65 x 1/8	35 1)	78	27	-61	0.360	0.610
	DN50	G 1/2 or G 1/4	78 x 1/8	35 1)	92	27	-63	0.530	0.880

1) for G 1/2, C = 31

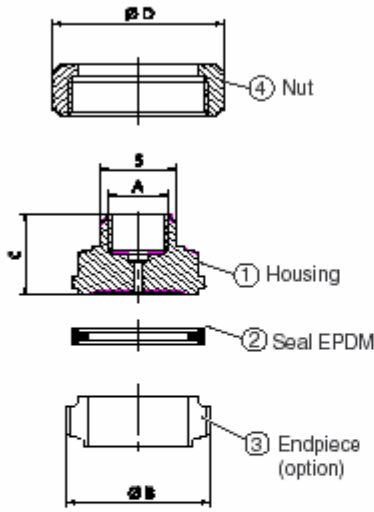
2) for G 1/4, C = 35

DHOM for homogeneizer



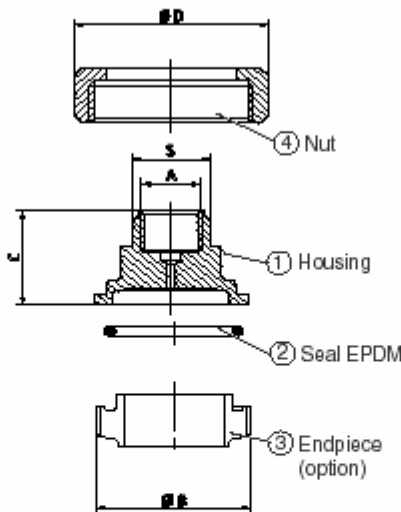
DAIL

(IDF according to BS 4825 part 4)

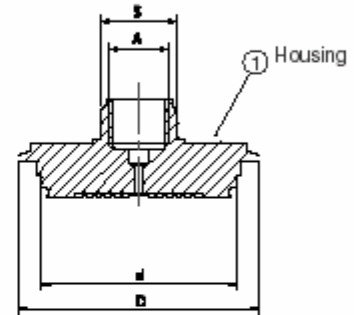


DARL

(RTJ according to BS 4825 part 5)



DAVA - VARIVENT®



DAIL (IDF)	DN	A	B	C	D Hexagonal	S /flats	Dimensions	Weight kg ① + ② + ④
	1½"	G½ or G¼	50.7 8x1	35	60	27	60	540
	2"	G½ or G¼	64.2 8x1	27	75	27	52	700
DARL (RTJ)	1½"	G½ or G¼	58.4 8x1	38	65	27	60	440
	2"	G½ or G¼	72.7 6x1	33	79	27	55	590

DAVA VARIVENT®	DN	A	d	D	S /flats	Weight kg ①
	25	G½ or G¼	50	66	27	550
	40/125	G½ or G¼	68	84	27	620

Ordering information

Family: **D** | **A** | | |

Chemical seal: **D**

Model:

Clamp NF _____ NC

SMS FF _____ EF

SMS FL _____ EL

DIN FF _____ DF

DIN FL _____ DL

IDF _____ IL

RTJ _____ RL

VARIVENT® _____ VA

Code **	L Filling fluid	
	Operating temperature	Application
LRS 0	No filling	
LRS 1	-15° + 150°C	Application food and industry
LRS 2	-60° + 150°C	Other applications
LRS 3	-20° + 300°C	
LRS 4	-15° + 150°C	Oxygen-chlorinated products max. P. = 150 bar
LRS 7	-20° + 80°C	Paint application No vacuum scale available Filling under vacuum

After specifying the model: DANC, DAEF, DAEL, DADF, DADL, note the various characteristics of the product in the following order :

Process connection _____

(DN25, DN32, DN38, DN40, DN50, DN51)

Filling fluid (0=without, 1=LRS1, 2=LRS2, 3=LRS3, 4=LRS4, 7=LRS7) _____

Female thread (H=G¼, L=G½) _____

Description _____

(0=complete set ①+②+③+④, 1=upper housing, 2=①+②+④, 3=complete set + extension, 5=polished upper housing, 6==special to be defined)