Мультидиспенсеры бутылочные CARL ROTH DURAN GL 45, GL 25, GL 14, GLS 80, GL 18

Технические характеристики

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Казахстан (772)734-952-31 Киргизия (996)312-96-26-47









DWK Life Sciences. Material: PP. Autoclavable: Yes.

Features two continuous connectors, angled at the top to prevent kinking of tubes. Withstands temperatures up to +140 $^{\circ}$ C, dishwasher safe

- Safe transfer of liquid media within closed systems
- The core rotates freely and allows a container to be replaced without twisting the fixed tubes
- Ideal for use with soft elastic tubes with ID 6-9 mm (Viton®, Tygon®, Silicone), e.g. when using peristaltic pumps
- Pressure equalisation filter attachment available as an option

For hoses with inner Ø (mm)	Thread	Art. No.	Pack Qty.	
6-9	GL 45	PY86.1	2 unit(s)	

Accessories pressure equalisation filter attachment

DWK Life Sciences.

Suitable for multiple distributor for GL 45 bottles with connectors.

Art. No.	Pack Qty.	€
PY87.1	2 unit(s)	46,10









Multiple distributor for bottles GL 45 with connectors

Bohlender. Material: PP. Autoclavable: Yes.

With curved connectors at the top and straight connectors at the bottom. Temperature stability -20 to +110 $^{\circ}\text{C}.$

Number of connections	For hoses with inner Ø (mm)	Thread	Art. No.	Pack Qty.	
2	7-11	GL 45	NP98.1	1 unit(s)	
3	6-0	GL 45	NPQQ 1	1 unit(e)	







Multiple distributor for bottles DURAN® GL 45 with stainless steel connectors

DWK Life Sciences. Autoclavable: Yes.

Screw cap made of PBT with silicone seal (platinum coated, USP <88> Class VI) and connections and centre part made of stainless steel (type 316L or 1.4404 / S31603).

Sturdy hose connection system for laboratory bottles with a GL 45 thread for the transfer of liquids in closed or sterilised systems. Connections for flexible hoses with inner Ø 8 mm. Freely rotating centre part enables bottles to be replaced without twisting the hoses. Temperature stability up to +180 °C. With retrace code.

Version	For hoses with inner Ø (mm)	Thread	Art. No.	Pack Qty.
With 1 stainless steel connector	8	GL 45	KCL5.1	1 unit(s)
With 2 stainless steel connectors	8	GL 45	KCL6.1	1 unit(s)
With 3 stainless steel connectors	8	GL 45	KCL7.1	1 unit(s)







Screw coupling

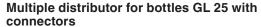
DWK Life Sciences. Material: PBT. Autoclavable: Yes. With GL threads and silicone seal, flexible and freely rotatable. Autoclavable. temperature stable from -45 to +180 °C.

Thread	Art. No.	Pack Qty.
GL 14	LL41.1	1 unit(s)
GL 18	LL42.1	1 unit(s)
GL 25	LL43.1	1 unit(s)
GL 32	LL44.1	1 unit(s)
GL 45	PY98.1	1 unit(s)









DWK Life Sciences. Material: PBT, PTFE insert with stainless steel connectors. Autoclavable: Yes.

With 2, 3 or 4 connections, suitable for hose inner \emptyset 3.2 mm. For GL 25 glass threaded bottles (10 ml or 25 ml).

Suitable for medium preparation for small bioreactors, for cell cultures with perfusion circuit, for fed-batch-bioreactors and for oxygenation/ventilation of very small sample volume.

Temperature stable up to 180 °C.

Delivery without GL 25 laboratory glass bottle, please order separately.

	For hoses with inner Ø (mm)	Thread	Art. No.	Pack Qty.	
2	3,2	GL 25	EXK7.1	1 unit(s)	
3	3,2	GL 25	EXK8.1	1 unit(s)	
4	3.2	GL 25	EXK9.1	1 unit(s)	







HPLC bottle with multiple distributor

DWK Life Sciences. Material: DURAN® glass, cap made of PP, sealing inserts made of silicone. Autoclavable: Yes.

Vacuum and pressure resistant. With retrace code. Suitable for the safe transfer of liquids, e.g. for loading HPLC machines. The sealing insert is freely rotatable and prevents hoses from twisting when changing the

Delivery incl. HPLC screw cap (GL 45, four metric M8 threaded necks) with hose connection set (each set includes 4 silicone sealing inserts for hose of \varnothing 1.6 mm and \varnothing 3.2 mm, 4 silicone closure seals and 4 screw caps with hole). Pressure equalisation set; please order separately, if required.

Version	Art. No.	Pack Qty.
HPLC bottle 500 ml	KY94.1	2 unit(s)
HPLC bottle 1000 ml	KY93.1	2 unit(s)





Multiple distributor for bottles GL 45

Autoclavable: Yes.

GL 45 screw cap with 2 or 3 GL 14 threaded necks. Suitable for the transfer of liquids, e.g. for loading a HPLC machine with solvents or for use in titration systems. Also usable as a Woulff bottle. Hoses with an outer Ø of between 1.6 and 6.0 mm can be attached to the multiple distributor for bottles by means of a GL 14 laboratory screw joints. The sealing insert is freely rotatable and prevents hoses from twisting when changing the bottle.

Delivery without bottles, laboratory screw joints and pressure equalisation set; please order separately.

Insert and screw cap made of PP

Material: PP. Good chemical resistance, temperature stable from -40 to \pm 140 °C.

Number of connections	Thread	Art. No.	Pack Qty.
2	GL 45	HX84.1	2 unit(s)
3	GL 45	HX85.1	2 unit(s)

Insert made of PFA

Material: PFA Screw cap made of polyphenylene sulphide. Universally applicable, chemically inert and temperature stable from -20 to +230 $^{\circ}$ C.

Number of connections	Thread	Art. No.	Pack Qty.	
2	GL 45	K094.1	1 unit(s)	

Insert made of PTFE

Material: PTFE Screw cap made of polyphenylene sulphide. Universally applicable, chemically inert and temperature stable from -20 to +230 °C.

Number of connections	Thread	Art. No.	Pack Qty.
3	GL 45	K095.1	1 unit(s)





Laboratory screw joints GL 14

DWK Life Sciences. Material: PP, Inserts made of PTFE with silicone ring. Autoclavable: Yes.

Each consists of 2 GL 14 threaded caps and 2 inserts for varying hose diameters.

For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.	
1.6	GL 14	HX86.1	2 unit(s)	
3.0	GL 14	HX87.1	2 unit(s)	
3.2	GL 14	HX88.1	2 unit(s)	
6.0	GL 14	HX89.1	2 unit(s)	





Multiple distributor for bottles GLS 80

Autoclavable: Yes.

GLS 80 screw cap with four GL 18 threaded necks. Suitable for the transfer of liquids, e.g. for loading HPLC machines with solvents or for use in titration systems. Also usable as a Woulff bottle. Hoses with an outer \varnothing of between 3.2 and 12.0 mm can be attached to the multiple distributor for bottles by means of GL 18 laboratory screw joints.

Delivery without bottles, laboratory screw joints and pressure equalisation set; please order separately.

Insert and screw cap made of PP

Material: PP. Temperature stability -40 to +140 °C.

Number of connections	Thread	Art. No.	Pack Qty.	
4	GLS 80	KE52.1	1 unit(s)	

Insert made of PTFE

Material: PTFE PP screw caps. Temperature stability 0 to +110 °C.

Number of connec- tions	Thread	Art. No.	Pack Qty.	
1	GI S 80	NV20 1	1 unit(c)	







Laboratory screw joints GL 18

DWK Life Sciences. Material: PP, Inserts made of PTFE with silicone ring. Autoclavable: Yes.

Each consists of 2 GL 18 threaded caps and 2 inserts for varying hose diameters.

For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.	
3.2	GL 18	KE53.1	2 unit(s)	
6.0	GL 18	KE54.1	2 unit(s)	
8.0	GL 18	KE55.1	2 unit(s)	
10.0	GL 18	KE56.1	2 unit(s)	
10.0	CL 10	VEE74	0	







HPLC screw cap b.safe GL 45

Bohlender. Material: PPS, PTFE, PFA. Autoclavable: Yes.

Screw cap for GL 45 bottle thread made of PPS with freely rotating distributor body made of PTFE, selectable with two, three or four connections. Connections with UNF $1_4^{\prime\prime}$ 28G inner thread for connecting PFA-fittings for hoses (external diameter 3.2 mm), PFA dummy stoppers for the closure of unnecessary connections or a venting valve with change indicator. Temperature resistance: -20 to +200 °C.

- · For removing solvents for HPLC
- Freely rotating distributor bodies, prevents the hoses twisting when replacing the bottle
- Using the fittings, hoses can be introduced up to the base of the bottle; conical nipple clamps the hose and seals reliably at the connection
- The venting valve is specially adapted to the flow rates in HPLC; integrated non-return valve prevents the evaporation of solvents and lets ambient air flow into the bottle in the event of a vacuum. The upstream membrane made of porous PTFE effectively keeps out dirt particles and other contaminations from outside
- Venting valve with change indicator after activation at the press of a button and with labelling area

With two connections

Delivery incl. 1 x fitting (PFA) and 1 x venting valve with change-indicator

	For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.	
2	3.2	UNF 1/4" G28	1HPC.1	1 unit(s)	

With three connections

Delivery incl. 2 x fittings (PFA), 1 x dummy stopper (PFA) and 1 x venting valve with change indicator.

Number of connections	For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.	
3	3.2	UNF 1/4" G28	1HPA.1	1 unit(s)	

With four connections

Delivery incl. 3 x fittings (PFA), 2 x dummy stoppers (PFA) and 1 x venting valve with change indicator.

Number of connections	For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.	
4	3.2	UNF 1/4" G28	1HP9.1	1 unit(s)	









HPLC screw caps starter box b.safe GL 45

Bohlender. Material: PPS, PTFE, PFA. Autoclavable: Yes.

Initial equipment box for HPLC with four HPLC b.safe screw caps made of PPS each, with freely rotating distributor heads made of PTFE, for GL 45 bottle thread. Selectable with two, three or four connections. The items supplied also include PFA fittings for easy connection of transfer hoses (external diameter 3.2 mm), dummy stoppers made of PFA for the closure of unnecessary connections and venting valves with change indicator. Every starter box allows undisturbed HPLC eluent removal from up to four supply bottles with GL 45.

Temperature resistance: -20 to +200 °C.

Starter box 1

Contents:

- 3 x HPLC GL 45 b.safe screw caps with two connections each (UNF ½" 28G)
- 1 x HPLC GL 45 b.safe screw caps with three connections (UNF ½" 28G)
- 4 x venting valve with change indicator
- 5 x PFA fittings (yellow) for external hose Ø 3.2 mm
- 1 x PFA dummy stopper (white)

	For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.	
2/3	3.2	UNF 1/4" G28	1HPP.1	1 unit(s)	

Starter box 2

Contents

- 4 x HPLC GL 45 b.safe screw caps with three connections each (UNF ½" 28G)
- 4 x venting valve with change indicator
- 8 x PFA fittings (yellow) for external hose Ø 3.2 mm
- 4 x PFA dummy stoppers (white)

	For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.	
3	3.2	UNF 1/4" G28	1HPX.1	1 unit(s)	

Starter box 3

Contents:

- 4 x HPLC GL 45 b.safe screw cap with four connections each (UNF ½" 28G)
- 4 x venting valve with change indicator
- 12 x PFA fittings (yellow) for external hose Ø 3.2 mm
- 8 x PFA dummy stoppers (white)

Number of connections	For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.	
4	3.2	UNF 1/4" G28	1HPT.1	1 unit(s)	

HPLC flushing bottle distributor b.safe

Bohlender. Material: PPS, PP, PFA.

GL 45 flushing bottle distributor made of PPS, GLS 80 flushing bottle distributor made of PP. Each with freely rotating distributor head made of PP with four side connections (GL 45) appropriate for HPLC GL 45 b.safe screw caps. Distributor heads are additionally provided with three central capillary openings each (UNF $^{1}\!\!/_{\!4}''$ 28G). Temperature resistance: 0 to +110 °C.

Application:

Flushing the HPLC system without contamination or loss of solvents. For this, a distributor head is placed on a flushing bottle, the HPLC b.safe screw caps are removed from the eluent bottles and these are installed on the connections of the flushing bottle distributor. Passage at the distributor neck is sufficiently measured so that the capillary hoses installed on the HPLC screw cap along with filter can be introduced into the flushing bottle. With the GL 45 flushing bottle distributor, the use of intake filters that are as small as possible (max. Ø 14 mm) makes introducing the capillaries through the bottle neck easier. Should a connection of the flushing bottle distributor not be used, this can be closed with a GL 45 screw cap. The escape of solvent vapours that are hazardous to health or a contamination of the flushing solution with ambient air is prevented by the HPLC b.safe screw caps with venting valve. In addition, the flushing bottle distributor can also be used directly for rear flask and needle seat flushing. For this, connect the desired capillaries and a venting valve to the central capillary connections using

Delivery incl. 3 x PFA dummy stoppers (white).

Version	Number of connections	Thread	Art. No.	Pack Qty.	
Four flushing head connec- tions (GL 45)	3 (UNF 1/4" 28G)	GL 45	1HPY.1	1 unit(s)	
Four flushing head connec- tions (GL 45)	3 (UNF ½" 28G)	GLS 80	1HT0.1	1 unit(s)	







HPLC screw cap b.safe Waste Cap GL 45

Bohlender. Material: PPS, PTFE, PFA. Autoclavable: Yes.

Screw cap made of PPS for GL 45 threads with freely rotating distributor element made of PTFE. Available with 3, 2 or 4 capillary connections with UNF $\frac{1}{4}$ " 28G internal thread for connecting PFA fittings for Ø capillary hoses (external Ø 1.6 mm (green)/2.2 mm (purple)/3.2 mm (yellow)). With PFA dummy stopper (white) to seal capillary connections that are not needed. Depending on the version, with 1 x hose connector (NPT $\frac{1}{4}$ " thread) for hose internal Ø 5.5-8 mm. 1 x connection (GL 14 thread) to screw in a b.safe exhaust air filter. Temperature resistance: -20 to +200 °C.

- For safe disposal of waste solvents without leaks of harmful solvent vapours
- Freely rotating distributor bodies, prevents the hoses twisting when replacing the collecting bottle
- Using the fittings, hoses can be easily introduced into the collecting container; conical nipple clamps the hose and reliably seals at the connection
- Large quantities of fluid can optionally be disposed of by connecting hoses with internal Ø 5.5-8 mm, via the hose connectors
- Suitable exhaust air filter available as an option; its activated carbon filling binds harmful solvent vapours

Type A: 3 x capillary connection (UNF $\frac{1}{4}$ " 28G), 1 x exhaust air filter connection (GL 14)

Delivery incl. PFA fittings: $3 \times 1.6 \text{ mm}$, $3 \times 2.2 \text{ mm}$, 3×3.2 , $2 \times \text{PFA}$ dummy stopper. **Delivery without** exhaust air filter, please order separately.

	connec- tions	For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.	
Without hose- connector	3	1.6 mm/ 2.2 mm/ 3.2	UNF ¼" G28	1HT3.1	1 unit(s)	

Type B: 2 x capillary connection (UNF $\frac{1}{4}$ " 28G), 1 x hose connector (NPT $\frac{1}{8}$ "), 1 x exhaust air filter connection (GL 14)

Delivery incl. PFA fittings: 2 x 1.6 mm, 2 x 2.2 mm, 2 x 3.2 mm, 1 x hose connector (NPT $\frac{y}{8}$ ") 2 x PFA dummy stopper. **Delivery without** exhaust air filter, please order separately.

Version	Number of connections	For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.	
With hose connector (Ø 5.5-8 mm)	2	1.6 mm/ 2.2 mm/ 3.2	UNF 1/4" G28	1HT4.1	1 unit(s)	

Type C: 4 x capillary connection (UNF $\frac{1}{4}$ " 28G), 1 x hose connector (NPT $\frac{1}{8}$ "), 1 x exhaust air filter connection (GL 14)

Delivery incl. PFA fittings: 4×1.6 mm, 4×2.2 mm, 4×3.2 mm, 1×1.6 km, 4×1.6 mm, 4×1.6 mm

Version	Number of connections	For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.
With hose connector (Ø 5.5-8 mm)	4	1.6 mm/ 2.2 mm/ 3.2	UNF 1/4" G28	1HT5.1	1 unit(s)



Accessories for b.safe Waste Cap HPLC screw cap b.safe exhaust air filter

Bohlender. Material: PP, PE and activated carbon.

Filter housing made of PP with connection (GL 14 thread) suitable for b.safe Waste Cap HPLC screw caps. Lid with integrated splash-proof ventilation openings and change indicator with labelling area for monitoring service life. The activated carbon filling is protected with two filter membranes made of porous PE. The exhaust air can circulate unobstructed around the activated carbon at the same time, so that the solvent components are reliably absorbed by the activated carbon and only filtered exhaust air escapes into the surrounding area via the ventilation openings. Temperature resistance: 0 to +110 °C.

Small

Service life three months, for up to five litres of capacity

Version	Thread	Art. No.	Pack Qty.	
Small	GL 14	1HX5.1	2 unit(s)	

Medium

Service life six months, for up to 5-10 litres of capacity

ı	Version	Thread	Art. No.	Pack Qty.
	Medium	GL 14	1HX6.1	2 unit(s)

Large

Service life six months, for more than 10 litres of capacity

Version	Thread	Art. No.	Pack Qty.	
Large	GL 14	1HX7.1	2 unit(s)	







Accessories for b.safe HPLC screw caps b.safe venting valve

Bohlender. Material: PP, PTFE. Autoclavable: Yes.

Valve housing made of PP with threaded connection (UNF $^{1}\!\!/_{4}''$ 28G) suitable for b.safe HPLC screw caps. Lid with ventilation opening and Luer-Lock fitting, integrated non-return valve with upstream membrane made of porous PTFE (1 μ m). Includes attachable change indicator.

Application:

The b.safe venting valve is specially adapted to the volume flow in HPLC. The integrated non-return valve prevents evaporation of solvents and allows ambient air to flow into the bottle if there is a vacuum. The upstream membrane made of porous PTFE keeps out dirt particles and other contaminations from outside. The clip-on change indicator enables six-month monitoring of service life: Activate the change indicator by pressing the button and replace the valve when the display is completely red.

		Art. No.	Pack Qty.	
Suitable for b.safe HPLC screw caps	UNF 1/4" G28	1HT1.1	2 unit(s)	



Accessories for b.safe Waste Cap HPLC screw cap b.safe corrugated hose coupling

Bohlender. Material: PP, FEP. Autoclavable: Yes.

Three-piece coupling comprising coupling, locknut made of PP and clamping ring made of FEP. Corrugated hose coupling to connect hard-walled corrugated hoses to the b.safe Waste Cap HPLC screw cap via the NPT $^{\prime\prime}_8{}^{\prime\prime}$ threaded connection. Locknut with ergonomic gripping surfaces, additional recessed grips with SW10 at the coupling. Temperature stable: 0 to +110 °C.

Select the b.safe corrugated hose coupling suitable for the hoses of your HPLC. Corrugated hoses with 6.5 mm internal Ø, for example, are included with devices from Agilent Technologies; corrugated hoses with 8.5 mm internal Ø, for example, with devices from Thermo Scientific.

For hoses with outer Ø (mm)	Art. No.	Pack Qty.
6,5	1HXA.1	1 unit(s)
8,5	1HXC.1	1 unit(s)

HPLC cap GL 45

Bohlender. Material: PTFE, Screw cap made of PPS, stopcocks (optional) with cock plug made of FEP.

Connections with UNF $1_4^{\prime\prime\prime}$ 28G internal thread on top and bottom for attaching connecting hoses. Freely rotatable distributor element, cap can be screwed on and off without twisting the hoses. Excellent chemical resistance, Temperature stability -50 to +200 °C.





Delivery without connecting hoses, please order separately.

Connections without stopcocks

Number of connections	For hoses with outer Ø (mm)	For hoses with inner Ø (mm)	Thread	Art. No.	Pack Qty.
2	1.6	0,8	GL 45	NX21.1	1 unit(s)
2	3.2	1,6	GL 45	NX25.1	1 unit(s)
4	1.6	0,8	GL 45	NX22.1	1 unit(s)
4	3.2	1,6	GL 45	NX26.1	1 unit(s)

Connections with stopcocks

Number of connections	For hoses with outer Ø (mm)	For hoses with inner Ø (mm)	Thread	Art. No.	Pack Qty.
2	1.6	0,8	GL 45	NX23.1	1 unit(s)
2	3.2	1,6	GL 45	NX27.1	1 unit(s)
3	1.6	0,8	GL 45	NX24.1	1 unit(s)
3	3.2	1.6	GL 45	NX28.1	1 unit(s)

HPLC connecting hose

Bohlender. Material: PTFE, Banjo screw made of PP, thrust washers made of PA.

Flanged hoses with preassembled black banjo screws, UNF $\frac{1}{4}''$ 28G, and thrust washers. Ready to use straight from the box, no need for time-consuming assembly in the lab. Temperature stable from -50 to +120 °C, pressure resistant up to 30 bar.



Inner x outer Ø 0.8 x 1.6 mm (1/32" x 1/18")

Ø Internal (mm)	Ø ext. (mm)	Total length (mm)	Art. No.	Pack Qty.
0.8	1.6	100	NX29.1	1 unit(s)
0.8	1.6	250	NX30.1	1 unit(s)
0.8	1.6	500	NX31.1	1 unit(s)
0.8	1.6	750	NX32.1	1 unit(s)
0.8	1.6	1,000	NX33.1	1 unit(s)

Inner x outer Ø 1.6 x 3.2 mm ($\frac{1}{16}$ " x $\frac{1}{8}$ ")

Ø Internal (mm)	Ø ext. (mm)	Total length (mm)	Art. No. Pack Qty.
1.6	3.2	100	NX34.1 1 unit(s)
1.6	3.2	250	NX35.1 1 unit(s)
1.6	3.2	500	NX36.1 1 unit(s)
1.6	3.2	750	NX37.1 1 unit(s)
1.6	3.2	1,000	NX38.1 1 unit(s)



HPLC screw

Bohlender.



Dummy screws

Material: PTFE. With UNF 1/4" 28G external thread. For sealing unused HPLC distributor cap connections. Temperature stable from -200 to +260 °C.

For hoses with outer Ø (mm)	For hoses with inner Ø (mm)	Colour	Art. No.	Pack Qty.	
1.6	0.8	white	NX39.1	10 unit(s)	
3.2	1.6	white	NX40.1	10 unit(s)	

Banjo screws made of PP

Material: PP with thrust washers made of PA. With UNF $\frac{1}{4}$ " 28G external thread. Temperature stable from -10 to +100 °C.

For hoses with outer Ø (mm)	For hoses with inner Ø (mm)	Colour	Art. No.	Pack Qty.
1.6	0.8	black	NX43.1	10 unit(s)
1.6	0.8	white	NX44.1	10 unit(s)
1.6	0.8	red	NX45.1	10 unit(s)
3.2	1.6	black	NX46.1	10 unit(s)
3.2	1.6	white	NX47.1	10 unit(s)
3.2	1.6	red	NX48.1	10 unit(s)

Banjo screws made of PTFE

Material: PTFE with thrust washers made of PA. With UNF $\frac{1}{4}$ " 28G external thread. Temperature stable from -200 to +260 °C.

For hoses with outer Ø (mm)	For hoses with inner Ø (mm)	Colour	Art. No.	Pack Qty.
1.6	0.8	white	NX41.1	10 unit(s)
3.2	1.6	white	NX42.1	10 unit(s)

HPLC screw coupling

Bohlender. Material: PTFE.

With UNF $1_4^{\prime\prime}$ 28G internal thread. For connecting or extending HPLC connecting hoses.





Version	Number of connections	For hoses with outer Ø (mm)	For hoses with inner Ø (mm)	Art. No.	Pack Qty.
straight	2	1.6	0.8	NX49.1	1 unit(s)
straight	2	3.2	1.6	NX50.1	1 unit(s)
T-shape	3	1.6	0.8	NX51.1	1 unit(s)
T-shape	3	3.2	1.6	NX52.1	1 unit(s)
X-shape	4	1.6	0.8	NX53.1	1 unit(s)
X-shape	4	3.2	1.6	NX54.1	1 unit(s)



Laboratory screw joint HT (high-temperature)

Bohlender. Material: PPS, FKM, PTFE.

Screw cap (PPS, black) with interior comprising clamping ring (PPS), sealing wedge and sealing plate (both made of PTFE) and additional O-ring (FKM) for screwed connections for hose outer Ø smaller than 3 mm (without coming into contact with flow medium).

High chemical resistance since medium only comes into contact with PTFE. Temperature stable -50 $^{\circ}\text{C}$ up to +250 $^{\circ}\text{C}.$

Pressure stable up to max. 10 bar, suitable for use in a vacuum.

Application

For connecting apparatus and fittings with GL thread to hard-walled hoses made of glass, plastic or metal. For fixing in place probes, thermometers, immersion tubes and cable feeds that have been inserted in reaction vials.

Delivery incl. screw cap, clamping ring, sealing wedge and sealing plate, as well as additional O-ring for laboratory screw joints for hose outer Ø smaller than 3 mm.

Thread GL 14

For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.	
0.8	GL 14	KKN3.1	1 unit(s)	
1.0	GL 14	KKN4.1	1 unit(s)	
1.6	GL 14	KKN5.1	1 unit(s)	
2.0	GL 14	KKN6.1	1 unit(s)	
3.0	GL 14	KKN7.1	1 unit(s)	
3.2	GL 14	KKN8.1	1 unit(s)	
4.0	GL 14	KKN9.1	1 unit(s)	
5.0	GL 14	KKP0.1	1 unit(s)	
6.0	GL 14	KKP1.1	1 unit(s)	
6.35	GL 14	KKP2.1	1 unit(s)	
8.0	GL 14	KKP3.1	1 unit(s)	

Thread GL 18

For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.
1.6	GL 18	KKP4.1	1 unit(s)
2.0	GL 18	KKP5.1	1 unit(s)
3.0	GL 18	KKP6.1	1 unit(s)
3.2	GL 18	KKP7.1	1 unit(s)
4.0	GL 18	KKP8.1	1 unit(s)
6.0	GL 18	KKP9.1	1 unit(s)
6.35	GL 18	KKT0.1	1 unit(s)
8.0	GL 18	KKT1.1	1 unit(s)
9.52	GL 18	KKT2.1	1 unit(s)
10.0	GL 18	KKT3.1	1 unit(s)

Thread GL 25

For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.	
1.6	GL 25	KKT4.1	1 unit(s)	
2.0	GL 25	KKT5.1	1 unit(s)	
3.0	GL 25	KKT6.1	1 unit(s)	
3.2	GL 25	KKT7.1	1 unit(s)	
4.0	GL 25	KKT8.1	1 unit(s)	
6.0	GL 25	KKT9.1	1 unit(s)	
6.35	GL 25	KKX0.1	1 unit(s)	
8.0	GL 25	KKX1.1	1 unit(s)	
9.52	GL 25	KKX2.1	1 unit(s)	
10.0	GL 25	KKX3.1	1 unit(s)	



Connecting piece GL

Bohlender. Material: PTFE.

With GL thread. Unlimited chemical resistance since medium only comes into contact with PTFE. Temperature stable from -200 $^{\circ}$ C to +250 $^{\circ}$ C. Pressure stable up to max. 10 bar, suitable for use in a vacuum.

Application

For the distribution of liquids or gases. As a reducer for connecting various tube and hose outer \varnothing .

Delivery without laboratory screw joints. Please order separately.

Straight

Two connections with GL thread

Thread	Ø Hole (mm)		Width across flats	Art. No.	Pack Qty.	
GL 14	6.5	50	Hexagon, 15 mm	KKX4.1	1 unit(s)	
GL 18	10.5	50	Hexagon, 19 mm	KKX5.1	1 unit(s)	

T-shape

Three connections with GL thread

Thread	Ø Hole (mm)	Height (mm)	length	Width across flats	Art. No.	Pack Qty.	
GL 14	6.5	37	54	Hexa- gon, 20 mm	KKX6.1	1 unit(s)	
GL 18	10.5	39	56	Hexa- gon, 20 mm	KKX7.1	1 unit(s)	





HPLC intake filter

Bohlender. Material: PTFE.

Filter cartridge holder with UNF $\frac{1}{4}$ " 28G internal thread with replaceable filter cartridge made of porous PTFE. Protects HPLC-systems, pumps, seals, pistons and membranes against contamination by particles or crystallising residues. Filter-Ø 14 mm. Filter length 25 mm.

Delivery without connecting hose (Art. No. NX29.1 ff or . NX34.1 ff); please order separately.

For hoses with inner Ø (mm)	Pore size (µm)	Art. No.	Pack Qty.
0,8 mm (1/32")	2	NX55.1	1 unit(s)
0,8 mm (1/32")	10	NX57.1	1 unit(s)
1,6 mm (1/16")	2	NX56.1	1 unit(s)
1,6 mm (½")	10	NX58.1	1 unit(s)



Multiple distributor for bottles

Bohlender. Material: PE Screw cap, Distributor body made of PTFE. Excellent chemical resistance, temperature stable from -50 $^{\circ}$ C to +80 $^{\circ}$ C.

Application

For drawing and filling aggressive or pure liquids and for inserting hoses, tubes and probes into carboys or vacuum bottles by the manufacturer Nalgene® with thread types 53 B or 83 B.

Delivery without HT laboratory screw joints with GL thread, please order separately.

Suitable for Nalgene® 53 B thread

Number of connec- tions	Thread	Art. No.	Pack Qty.
2	GL 14	KKL2.1	1 unit(s)

Suitable for Nalgene® 83 B thread

Number of connec- tions	Thread	Art. No.	Pack Qty.	
3/1	GL 18 / GL 25	KKL3.1	1 unit(s)	



Multiple distributor for barrels

Bohlender. Screw cap made of PTFE glass fibre..

Suitable for barrels and bins with internal thread. Movable distributor body with GL connecting necks made of PTFE. Very high chemical resistance since medium only comes into contact with PTFE. Temperature-stable from -20 $^{\circ}$ C to +200 $^{\circ}$ C.

Pressure-stable up to max. 1 bar, suitable for use in a vacuum.

Application

For drawing and filling aggressive or pure liquids and for inserting hoses, tubes and probes into barrels.

Delivery without HT laboratory screw joints with GL thread, please order separately.

For barrel inner thread R2"/G2"/BSP 2"

	For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.
3	8	GL 14	KKL4.1	1 unit(s)
4	10	GL 18	KKL5.1	1 unit(s)
2/1	2x10 / 1x14	GL 18 / GL 25	KKL6.1	1 unit(s)

For Mauser 2" barrel inner thread

	For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.	
4	10	GL 18	KKL7.1	1 unit(s)	
2/1	2x10 / 1x14	GL 18 / GL 25	KKL8.1	1 unit(s)	

For Tri-Sure 2" barrel inner thread

	For hoses with outer Ø (mm)	Thread	Art. No.	Pack Qty.
3	8	GL 14	KKL9.1	1 unit(s)
4	10	GL 18	KKN0.1	1 unit(s)
2/1	2x10 / 1x14	GL 18 / GL 25	KKN1.1	1 unit(s)

Barrel aeration

Bohlender. Material: PTFE Basic body suitable for $R^{3}_{4}{}''$ internal thread, with GL32 cap thread, with PTFE/silicone gasket and replaceable filter membrane (pore size 2.5 μ m) made of PTFE, screw cap made of PPS.

High chemical resistance, the medium only comes into contact with PTFE. Membrane outer Ø 29, membrane thickness approx. 0.2 mm. Temperature stability from -20 °C to +230 °C, autoclavable. Pressure compensation from 0.1 bar differential pressure.

Maximum flow rate:

 \cdot At 0.5 bar differential pressure: 80 l/h \cdot At 1.0 bar differential pressure: 320 l/h

Application

For pressure compensation during liquid removal or when filling containers. The integrated filter membrane prevents contamination of the medium with dust or dirt particles.

Version	Art. No.	Pack Qty.	
Barrel aeration	KKN2.1	1 unit(s)	

Алматы (7273)495-231 Ангарск (3955)60-70-56 Архангельск (8182)63-90-72 Астрахань (8512)99-46-04 Барнаул (3852)73-04-60 Белгород (4722)40-23-64 Благовещенск (4162)22-76-07 Брянск (4832)59-03-52 Владивосток (423)249-28-31 Владикавказ (8672)28-90-48 Владимир (4922)49-43-18 Волгоград (844)278-03-48 Вологра (8172)26-41-59 Воронеж (473)204-51-73 Екатеринбург (343)384-55-89 Иваново (4932)77-34-06 Ижевск (3412)26-03-58 Иркутск (395)279-98-46 Казань (843)206-01-48 Калининград (4012)72-03-81 Калуга (4842)92-23-67 Кемерово (3842)65-04-62 Киров (8332)68-02-04 Коломна (4966)23-41-49 Кострома (4942)77-07-48 Краснодар (861)203-40-90 Красноярск (391)204-63-61 Курск (4712)77-13-04 Курган (3522)50-90-47

Липецк (4742)52-20-81

Москва (495)268-04-70 Мурманск (8152)59-64-93 Набережные Челны (8552)20-53-41 Нижний Новгород (831)429-08-12 Новокузнецк (3843)20-46-81 Ноябрьск (3496)41-32-12 Новосибирск (383)227-86-73 Омск (3812)21-46-40 Орел (4862)44-53-42 Оренбург (3532)37-68-04 Пенза (8412)22-31-16 Петрозаводск (8142)55-98-37 Псков (8112)59-10-37 Пермь (342)205-81-47

Магнитогорск (3519)55-03-13

Ростов-на-Дону (863)308-18-15 Рязань (4912)46-61-64 Самара (846)206-03-16 Саранск (8342)22-96-24 Санкт-Петербург (812)309-46-40 Саратов (845)249-38-78 Севастополь (8692)22-31-93 Симферополь (3652)67-13-56 Смоленск (4812)29-41-54 Сочи (862)225-72-31 Ставрополь (8652)20-65-13 Сыктывкар (8212)25-95-17 Тамбов (4752)50-40-97 Сургут (3462)77-98-35 Тверь (4822)63-31-35 Тольятти (8482)63-91-07 Томск (3822)98-41-53 Тула (4872)74-02-29 Тюмень (3452)66-21-18 Ульяновск (8422)24-23-59 Улан-Удэ (3012)59-97-51 Уфа (347)229-48-12 Хабаровск (4212)92-98-04 Чебоксары (8352)28-53-07 Челябинск (351)202-03-61 Череповец (8202)49-02-64 Чита (3022)38-34-83 Якутск (4112)23-90-97 Ярославль (4852)69-52-93

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