

Gentle Delivering and Metering

Hose Pumps DULCO®flex for Applications in Laboratories and Industry

Printed in Germany, PT PM 087 04/09 GB



Compact, Robust Design

Type	Application	Capacity max. [l/h]	Pressure [bar]	Rollers/shoes	Rotor bearing
DFAa	Laboratory	84	2	Rollers	Drive
DFBa	Industry	375	8	Rollers	Drive
DFCa	Industry	12,000	8	Rollers	Ball bearing
DFDa	Industry	17,500	15	Shoes	Ball bearing

Hose Pumps manufactured by ProMinent are characterised by their simple functional principle and their compact, robust design. They are self-priming, without gaskets and valves.

The hose pumps of the DULCO®flex series for low, medium and high outputs with a large output range of 17 to 25,000 l/h and a large number of different hose materials are suitable for almost all metering and delivery tasks in laboratories and industry.

While the pumps for low pressures up to 8 bar are equipped with roller technology, pressing shoes are used for higher pressures up to 15 bar.

Because of their design, the hose is the only wearing part which, however, can be quickly and easily replaced.

Advantages

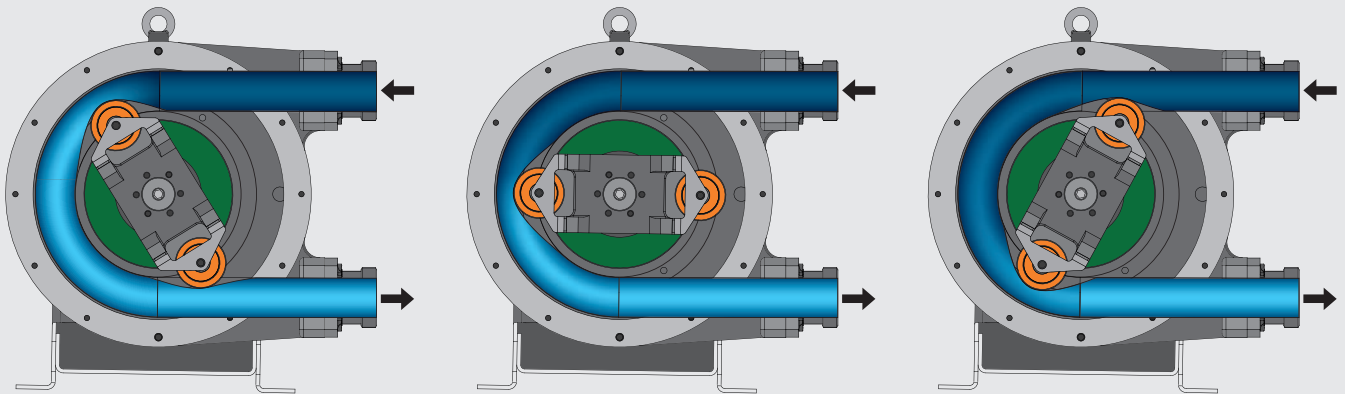
- Easy to operate
- Suitable for continuous operation
- Matching hose materials for different chemicals
- Easy and quick hose replacement
- Can run dry
- Self-priming
- Capacity from 17 to 25,000 l/h
- Pressure range from 2 to 15 bar
- Ideal for delivery of pasty, viscous, abrasive, and outgassing media

Drive options

- Drive without speed control
- Drive with manually adjustable speed
- Drive for frequency converter operation
- No drive

Hose Pumps of the DULCO®flex Series

For Abrasive, Viscous, and Sensitive Media



The metering medium is delivered by squeezing the hose with the rotor in flow direction. No valves are required to do so. Abrasive, viscous, and sensitive media are thus gently delivered.

The pumping process is started by an elastomer hose which is pressed against the pump housing by two rotating rollers or pressing shoes.

The rollers or pressing shoes having passed, the reinforced hose immediately restores its shape and creates a vacuum at the inlet of the pump. The atmospheric pressure provides for a continued flow of the medium. The flow rate is proportional to the speed of the pump.

For pumps of the series DFCa and DFDa, the option vacuum device in the pump housing can support the restoration of the hose's shape. This improves the suction behaviour and provides for a steady delivery of viscous media.

Delivery of media with the following properties

- Pasty and solid-containing
- Viscous
- Abrasive
- Shear-sensitive
- Outgassing
- Corrosive



Further information:

www.prominent.com/peristaltic_pumps

Precise Metering of Smallest Amounts



The hose pump DULCO®flex DFAa is designed as low-pressure pump and suitable for use in laboratories as well as OEM applications. It can be used for precise metering of small quantities up to 84 l/h at 2 bar. The rotor is equipped with 3 rollers to reduce pulsation. The hose can be quickly replaced using the quick-release fastener.

Options

- Stainless steel base panel
- Single-phase motor
- Two pump heads
- Batch operation with foot switch

Hose diameter	3.2 to 8 mm
Flow rates	1.6 to 10 ml/rev
Hose materials	SOLVA, silicone, Norprene A60G, Norprene A60F (food-grade)
Self-priming	up to 8 m
Backpressure	up to 2.0 bar

Pump type	Flow rate/revolution [ml/rev]	P max [bar]	Capacity at max. pressure [l/h]	Rollers/shoes	Ø hose (internal) [mm]
DFAa 003	1.6	2	17	Rollers	3.2
DFAa 008	10	2	84	Rollers	8.0



For Low and Medium Capacities



The hose pump DULCO®flex DFBa is designed for small and medium flow rates up to 375 l/h at 8 bar. With rollers and fabric-reinforced hoses, it is suitable for use in tough industrial applications.

On customer request, pumps of the series DFBa can be equipped with a controller for precise batch metering. For use in the chemical industry, the pumps can be equipped with a Halar-coated pump housing.

Options

- Stainless steel base panel
- Mobile unit
- Rotor with 3 rollers
- Various connections such as BSP, NPT, Tri-clamp, and DIN 11851
- Pulsation dampers
- Leakage sensor (optical)
- Batch operation with foot switch
- Halar-coated housing

Connection sizes

3/8 - 1"

Flow rates

0.024 - 0,24 l/rev

Hose materials

NR, NBR, EPDM, NR-A, Norprene, NBR-A, Hypalon, TYGON

Self-priming

up to 8 m

Backpressure

up to bar

Pump type	Flow rate revolution [l/rev]	P max [bar]	Capacity at max. pressure [l/h]	Rollers/shoes	Ø hose (internal) [mm]	Solid max. [mm]	Weight without drive [kg]	Connection DN
DFBa 010	0.024	8	56	Rollers	10	2,5	6	3/8"
DFBa 013	0.039	8	92	Rollers	13	3,3	6	3/8"
DFBa 016	0.092	8	200	Rollers	16	4,0	13	3/4"
DFBa 019	0.12	2	600	Rollers	19	4,8	13	1"
DFBa 022	0.24	8	375	Rollers	22	5,5	22	1"



Further information:

www.prominent.com/peristaltic_pumps

For High Outputs



The hose pump DULCO®flex DFCa is equipped with rollers and fabric-reinforced hoses. The DFCa is suitable for tough industrial applications and flow rates up to 12,000 l/h at 8 bar backpressure.

A ball-bearing rotor ensures a high level of smoothness and long life. For pumps of the series DFCa, the option vacuum device in the pump housing can support the restoration of the hose's shape. This improves the suction behaviour and provides for a steady delivery of viscous media.

Options

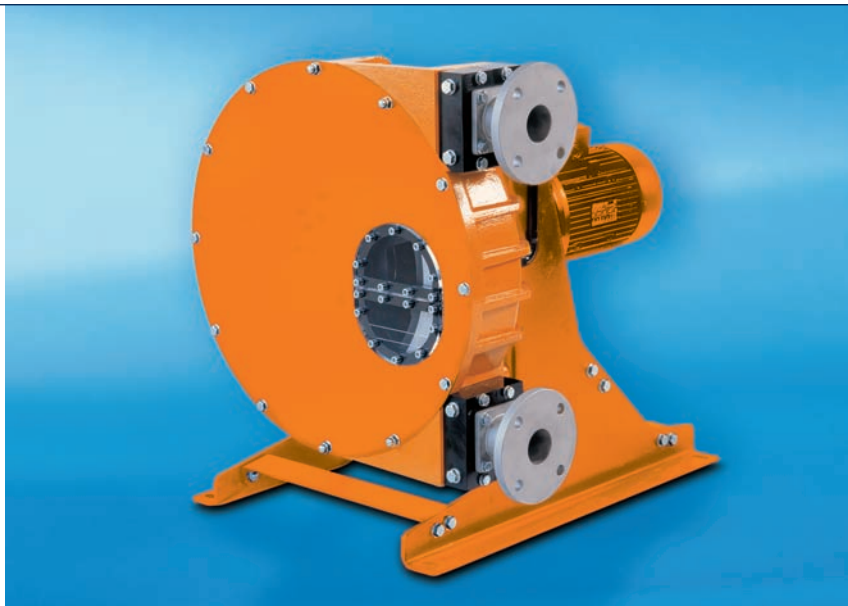
- Stainless steel base panel
- Mobile unit
- Various connections such as BSP, NPT, Tri-clamp, DIN 11851, and flange
- Pulsation dampers
- Leakage sensor (optical)
- Vacuum system

Connection sizes	1 ¼" - DN 80
Flow rates	0.43 - 15.83 l/rev
Hose materials	NR, NBR, EPDM, Hypalon, Norprene
Self-priming	up to 8 m
Backpressure	up to 8 bar

Pump typ	Flow rate/ revolution [l/rev]	P max [bar]	Capacity at max. pressure [l/h]	Rollers/ shoes	Ø hose (internal) [mm]	Solid max. [mm]	Weigh without drive [kg]	Connection DN
DFCa 030	0.43	8	700	Rollers	28	7.0	62	1 1/4"
DFCa 040	0.91	8	1,550	Rollers	35	8.8	89	1 1/2"
DFCa 050	1.46	8	2,400	Rollers	40	10.0	140	DN40
DFCa 060	3.12	8	6,000	Rollers	55	13.8	235	DN50
DFCa 070	8.05	8	12,000	Rollers	65	16.3	440	DN65
DFCa 70D	15.83	4	25,000	Rollers	2 x 65	16.3	850	DN80



For High Flow Rates and High Pressures



The hose pump DULCO®flex DFDa is designed for largest flow rates and high pressures. It is equipped with pressing shoes and fabric-reinforced hoses. The pump housing is filled with glycerine to reduce friction. A ball-bearing rotor ensures a high level of smoothness and long life. The DFDa delivers flow rates up to 17,500 l/h at backpressures up to 15 bar in tough industrial applications.

For pumps of the series DFDa, the option vacuum device in the pump housing can support the restoration of the hose's shape. This improves the suction behaviour and provides for a steady delivery of viscous media.

Options

- Stainless steel base panel
- Mobile unit
- Various connections such as Tri-clamp, DIN 11851, and flange
- Pulsation damper
- Leakage sensor (optical)
- Vacuum system

Connection sizes	DN25 - DN100
Flow rates	0.3 - 20.0 l/rev
Hose materials	NR, NBR, EPDM, Hypalon, Norprene
Self-priming	up to 8 m
Backpressure	up to 15 bar

Pump typ	Flow rate/revolution [l/rev]	P max [bar]	Capacity at max. pressure [l/h]	Rollers/shoes	Ø hose (internal) [mm]	Solid max. [mm]	Weight without drive [kg]	Connection DN
DFDa 025	0.3	15	1,000	Pressing shoes	25	6.3	57	DN25
DFDa 032	0.62	15	1,700	Pressing shoes	32	8.0	89	DN32
DFDa 040	1.40	15	2,600	Pressing shoes	40	10.0	150	DN40
DFDa 060	3.21	15	4,000	Pressing shoes	57	14.3	252	DN65
DFDa 070	6.66	15	10,000	Pressing shoes	65	16.3	530	DN65
DFDa 100	20.00	15	17,500	Pressing shoes	100	25.0	1,100	DN100



Worldwide Contact



The ProMinent group is represented in more than 100 countries of the world. This guarantees a worldwide availability of the products and short distances to the customer. All over the world, we offer identical quality standards for products and services. For you at site: Experience and know-how in water treatment and metering technology.

ProMinent Dosiertechnik GmbH
Im Schuhmachergewann 5-11
69123 Heidelberg
Germany
Telephone: +49 6221 842-0
Fax: +49 6221 842-419
info@prominent.com
www.prominent.com

Experts in Chem-Feed and Water Treatment