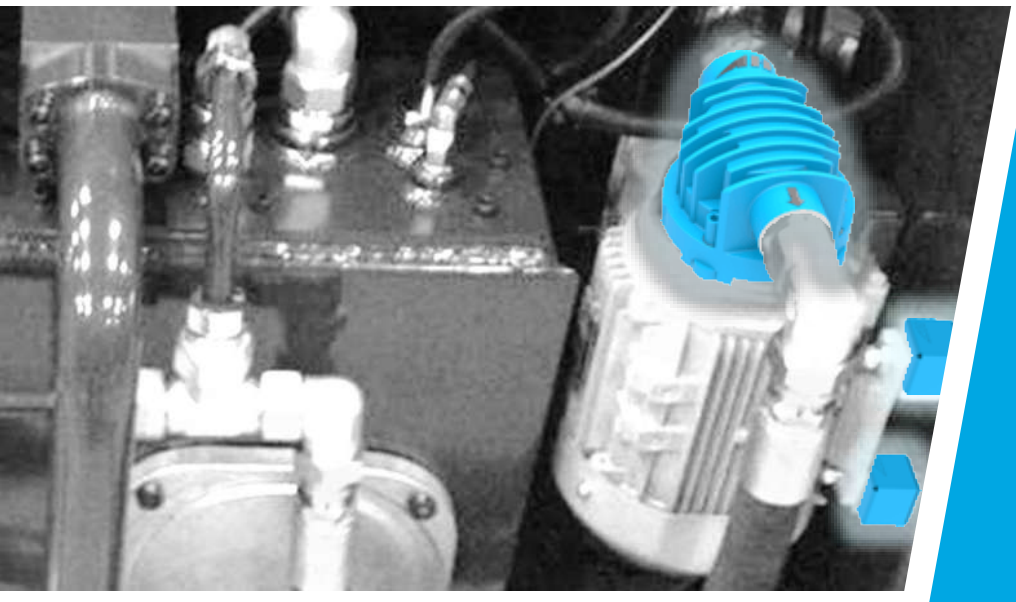
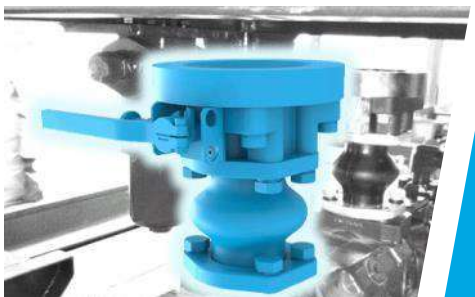
Fluid Controls

Gerotor Pump Generation 2





be different.
make a difference.

Fluid Controls
Gerotor Pump Generation 2

Design

The GERO generation 2 gerotor pumps are constant displacement pumps with compact measurements, high cleanness and a robust attribute. The asa gerotor pump generation 2 is a completely new design with trend setting modules to serve for highest flexibility to the actual application, while using the advantages of a standard product at the same time.

Applications

The aluminium body of the housing, the steel shaft and the standard NBR sealings are the perfect match for any mineral oil application. The pump is recommended for lubrication circuits as well as for oil supply, cooling and filtration systems.

Advantages

- **Modular design**
  Our pump design uses the same housing from smallest to largest application. This results a high reliability and the most economic approach on the market.
- **Cleanness**
  One of the most sophisticated topics and requirements on a modern hydraulic component is the cleanness. This is therefore the indicator for the ability to save costs and labour time for the designer and the complete system. We are working to the highest standards beyond the usual requirements.
- **Internal bypass**
  The internal bypass is a standard option and keeps the same overall measurements.
- **External bypass**
  For constant flow at over pressure to ensure lubrication & cooling of pump.
- **asa rail system**
  The asa rail system an additional option to the conventional SAE 1 ¼" connection on the outlet. The system requires separate connectors which can be turned in 4 different directions and offers an additional G ⅜" port for any monitoring or other purpose.

Pump Order Code

A	B	P	H	0	2	0	M	N	B	P	2	0	B	0	0
1			2	3			4	5	6				7		

1 Product Category

ABP	Pumps

2 Product Series

H	Gerotor Generation 2 for hydraulic use

3 Pump Displacement

nominal	Displ./rotation
020	20 cm³
030	32 cm³
040	40 cm³
060	60 cm³
080	80 cm³

4 Type of Connection

M	metric 4-hole / ISO 3019-2
/	SAE B-B 4-hole / SAE J744

5 Sealing Material

N	NBR

6 Bypass Options

BP20	internal 2 bar reliefvalve
BP60	internal 6 bar reliefvalve
BP99	internal 10 bar reliefvalve (standard)
EB60	external 6 bar reliefvalve

7 Index / Customized

K	standard sales kit
B00	special / customized specifications; to be advised by asa

General Data

max. outlet pressure:	10 bar (relative)
max. kinematic viscosity	up to 500 mm²/s *)
oil temperature range	-20°C to +80°C
ambient working temperature range	-20°C to +80°C**
compatible media	any mineral oil acc. DIN 51524

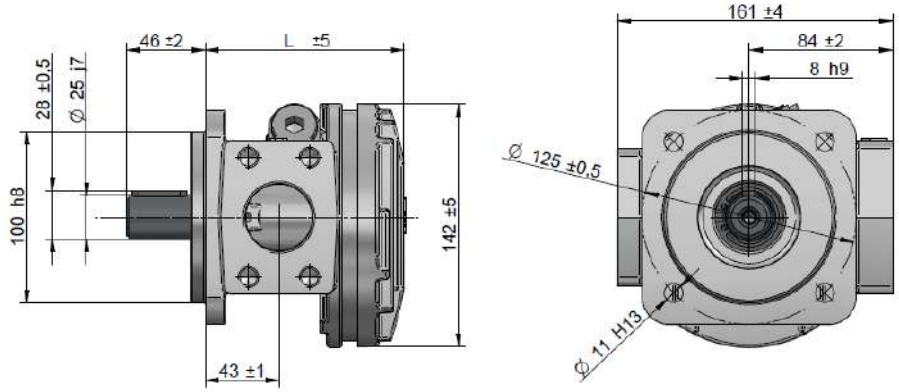
*) *depending on motor power*
**) *...consider the maximum ambient temperature of the used electric motor*

Materials

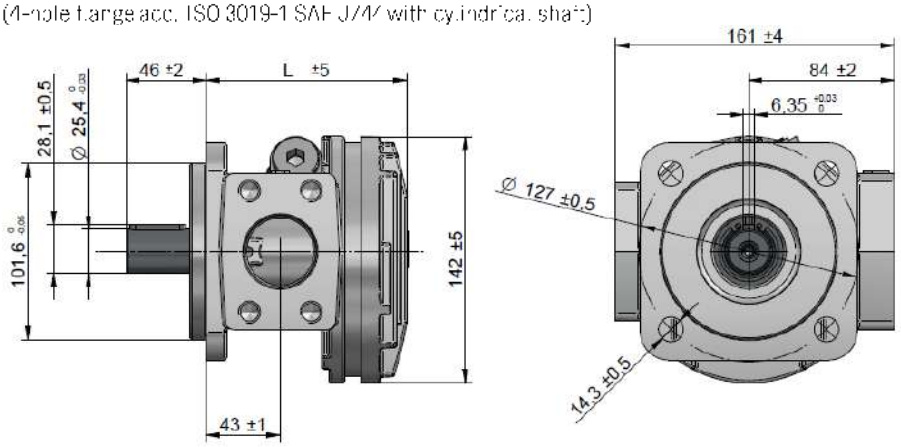
housing and cover	aluminium
shaft	steel
gerotor	steel
sealings	NBR
centering plate	aluminium

Fluid Controls
Gerotor Pump Generation 2

Metric version
(4-hole flange acc. ISO 3019-2 100B4HW with cylindrical shaft)



SAE version
(4-hole flange acc. ISO 3019-1 SAE J744 with cylindrical shaft)

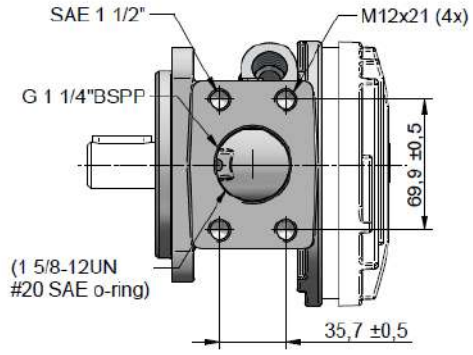


Dimensions

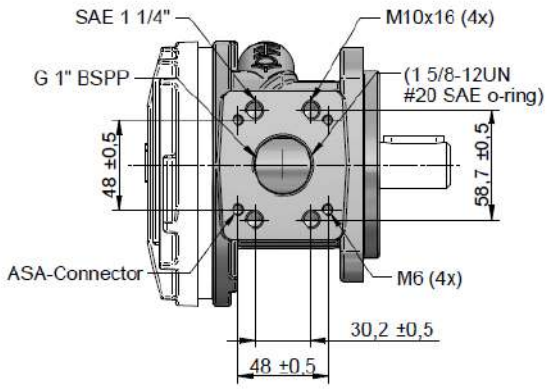
Nominal size	l [mm]
20	117
30	127
40	128
60	139
80	150

Hydraulic connection

Inlet Port



Outlet Port



Specific Data

order number	description	displacement	oil flow[2]	min. required motor power[2]	weight
		[cm³/rotation]	[l/min]	[kW]	[kg]
ABPH020MNBP99	Gerotor pump 2, 20cm³, metric, bypass 10 bar	20	29	1,1	4,3
ABPH030MNBP99	Gerotor pump 2, 32cm³, metric, bypass 10 bar	32	47	1,1	4,8
ABPH040MNBP99	Gerotor pump 2, 40cm³, metric, bypass 10 bar	40	58	1,5	5,1
ABPH060MNBP99	Gerotor pump 2, 60cm³, metric, bypass 10 bar	60	87	1,5	6,0
ABPH080MNBP99	Gerotor pump 2, 80cm³, metric, bypass 10 bar	80	110	1,5	7,0

[1]...measured at rotation of 1450rpm, pressure 0,5bar and viscosity of 46mm²/s / for 60Hz oil flow values to be multiplied by 1,2
[2]...check page 6 for max.pressure and viscosity

Fluid Controls
Gerotor Pump Generation 2

Motor / Pump Unit

Our motor / pump units are simplified options for you to the best practice configurations with the highest versatility to the possible applications. They consists of a configured gerotor pump, bell housing, mounting feet, flexible coupling and electric motor. The high quality components are in line with the pump concept. The motor/pump unit can be used as autonomous circulation power pack.

Saving space and highest cost efficiency are the most important characteristics for the available configurations.

Contact us in case of questions and for any special requirements, so we can offer our support to select the optimal product.

Pump Order Code

H	Y	H	0	4	0	1	5	0	6	N	B	P	2	0	B	0	0
		1		2		3			4		5	6		7		8	

1 Product Category

HY	motor/pump unit

2 Product Series

H	gerotor generation 2 for hydraulic use

3 Pump Displacement

nominal	Displ./rotation
020	20 cm³
030	30 cm³
040	40 cm³
060	60 cm³
080	80 cm³

4 Motor power

110	1.10 kW	6-pole motor
150	1.50 kW	6-pole / 4-pole motor
220	2.20 kW	6-pole / 4-pole motor
300	3.00 kW	4-pole motor
400	4.00 kW	4-pole motor

5 No. of Poles

4	4-pole motor
6	6-pole motor

6 Sealing Material

N	NBR

7 Bypass Options

BP20	internal 2 bar reliefvalve
BP60	internal 6 bar reliefvalve
BP99	internal 10 bar reliefvalve (standard)
EB60	external 6 bar reliefvalve

8 Index / Customized

B00	special / customized specifications; to be advised by asa

General Data

frequency	50Hz
voltage	230/400V
protection	IP 55
efficiency electric motor	IE3

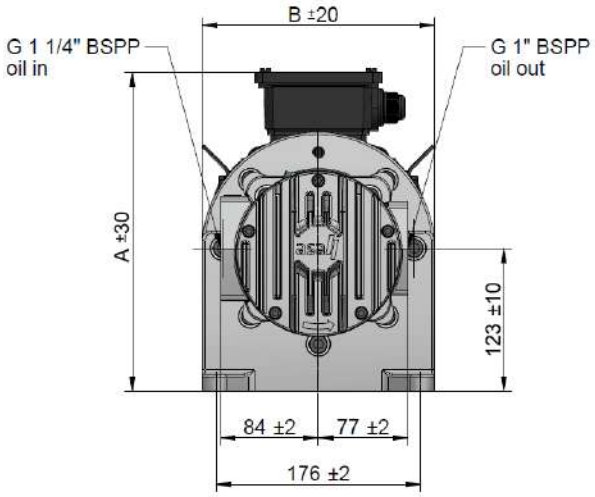
Materials

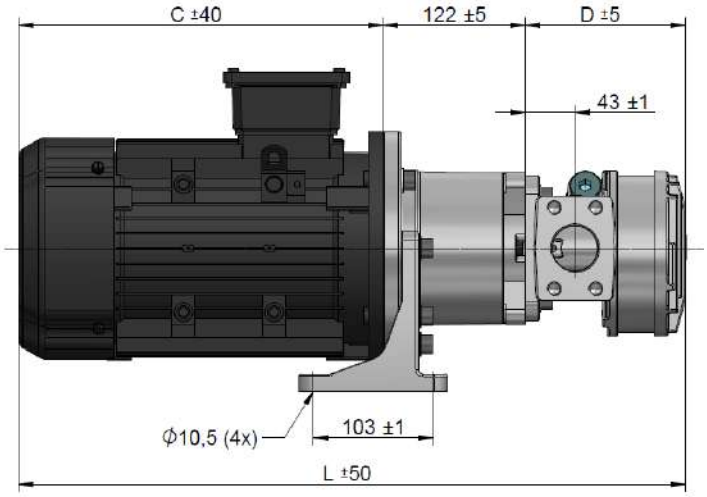
pump	aluminium
flexible coupling	aluminium/polyurethan
bell housing	aluminium
feet	aluminium

Working Range

ambient temperature	-15°C to +70°C
max. oil temperature	80°C
fluids	mineral oil acc. DIN51524

Fluid Controls
Gerotor Pump Generation 2





Dimensions

order number	description	A	B	C *	D	I	weight
		[mm]	[mm]	[mm]	[mm]	[mm]	[kg]
HYH0201106NBI*99	Gero pump unit 50Hz 20cm³ 1,1kW 6-pol. BI³	265	200	270	117	509	25
HYH0201506NBI*99	Gero pump unit 50Hz 20cm³ 1,5kW 6-pol. BI³	282	200	335	117	573	36
HYH0201504NBI*99	Gero pump unit 50Hz 20cm³ 1,5kW 4-pol. BI³	265	200	295	117	533	26
HYH0202204NBI*99	Gero pump unit 50Hz 20cm³ 2,2kW 4-pol. BI³	277	200	315	117	553	25
HYH0301106NBI*99	Gero pump unit 50Hz 30cm³ 1,1kW 6-pol. BI³	265	200	270	127	515	25
HYH0301506NBI*99	Gero pump unit 50Hz 30cm³ 1,5kW 6-pol. BI³	282	200	335	127	580	37
HYH0301504NBI*99	Gero pump unit 50Hz 30cm³ 1,5kW 4-pol. BI³	265	200	295	127	540	26
HYH0302204NBI*99	Gero pump unit 50Hz 30cm³ 2,2kW 4-pol. BI³	277	200	315	127	560	30
HYH0401106NBI*99	Gero pump unit 50Hz 40cm³ 1,1kW 6-pol. BI³	265	200	270	128	520	26
HYH0401506NBI*99	Gero pump unit 50Hz 40cm³ 1,5kW 6-pol. BI³	282	200	335	128	585	37
HYH0402204NBI*99	Gero pump unit 50Hz 40cm³ 2,2kW 4-pol. BI³	277	200	315	128	565	30
HYH0403004NBI*99	Gero pump unit 50Hz 40cm³ 3,0kW 4-pol. BI³	282	200	335	128	585	33
HYH0601506NBI*99	Gero pump unit 50Hz 60cm³ 1,5kW 6-pol. BI³	282	200	335	139	595	38
HYH0602206NBI*99	Gero pump unit 50Hz 60cm³ 2,2kW 6-pol. BI³	300	230	335	139	595	40
HYH0602204NBI*99	Gero pump unit 50Hz 60cm³ 2,2kW 4-pol. BI³	277	200	315	139	575	31
HYH0603004NBI*99	Gero pump unit 50Hz 60cm³ 3,0kW 4-pol. BI³	282	200	335	139	595	34
HYH0604004NBI*99	Gero pump unit 50Hz 60cm³ 4,0kW 4-pol. BI³	300	230	335	139	595	45
HYH0801506NBI*99	Gero pump unit 50Hz 80cm³ 1,5kW 6-pol. BI³	282	200	335	150	605	39
HYH0802206NBI*99	Gero pump unit 50Hz 80cm³ 2,2kW 6-pol. BI³	300	230	335	150	605	41
HYH0802204NBI*99	Gero pump unit 50Hz 80cm³ 2,2kW 4-pol. BI³	277	200	314	150	585	32
HYH0803004NBI*99	Gero pump unit 50Hz 80cm³ 3,0kW 4-pol. BI³	282	200	335	150	606	35
HYH0804004NBI*99	Gero pump unit 50Hz 80cm³ 4,0kW 4-pol. BI³	300	230	335	150	606	46

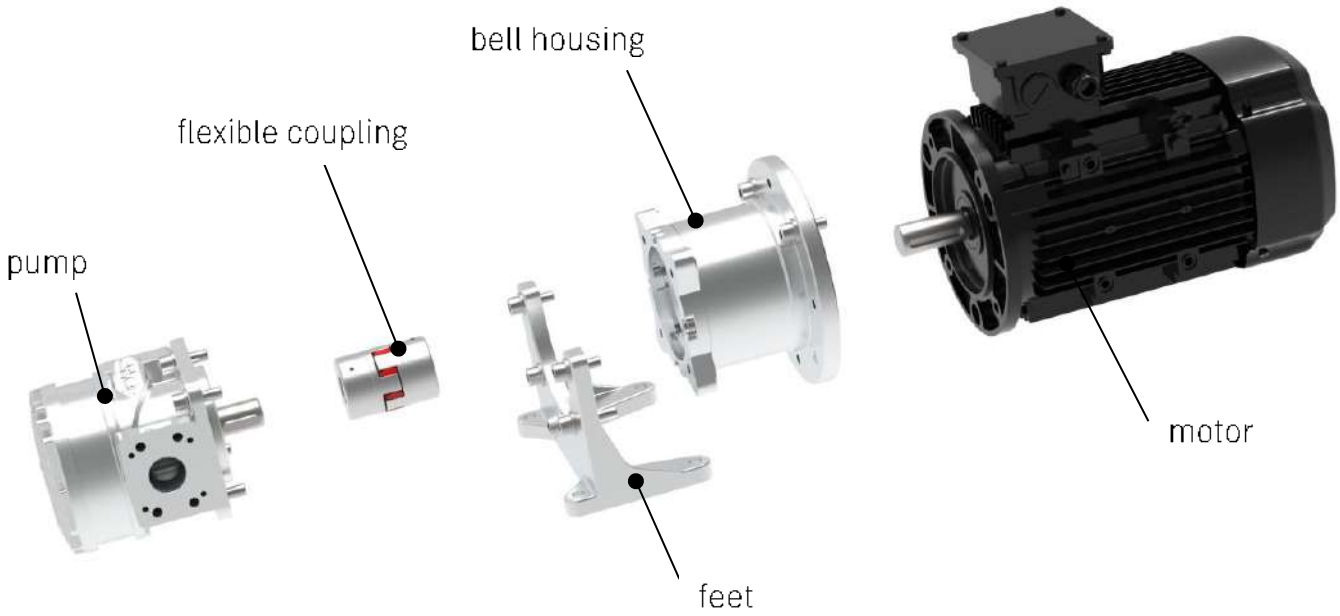
*...depending engine type

Fluid Controls
Gerotor Pump Generation 2

Technical Data

order number	description	motor power	motor size	poles	oil flow	max. pressure	max. viscosity	noise level *)
		[kW]	IEC		[lpm]	[bar]	[cSt]	[dB(A)]
HYH0201106NBI99	Gero pump unit 50Hz 20cm³ 1,1kW 6-pol. BI³	1,10	90l	6	18	8	150	64
HYH0201506NBI99	Gero pump unit 50Hz 20cm³ 1,5kW 6-pol. BI³	1,50	100l	6	18	8	250	64
HYH0201504NBI99	Gero pump unit 50Hz 20cm³ 1,5kW 4-pol. BI³	1,50	90l	4	28	10	250	64
HYH0202204NBI99	Gero pump unit 50Hz 20cm³ 2,2kW 4-pol. BI³	2,20	100l	4	28	10	500	64
HYH0301106NBI99	Gero pump unit 50Hz 30cm³ 1,1kW 6-pol. BI³	1,10	90l	6	29	8	150	64
HYH0301506NBI99	Gero pump unit 50Hz 30cm³ 1,5kW 6-pol. BI³	1,50	100l	6	29	8	250	64
HYH0301504NBI99	Gero pump unit 50Hz 30cm³ 1,5kW 4-pol. BI³	1,50	90l	4	44	10	250	64
HYH0302204NBI99	Gero pump unit 50Hz 30cm³ 2,2kW 4-pol. BI³	2,20	100l	4	44	10	500	64
HYH0401106NBI99	Gero pump unit 50Hz 40cm³ 1,1kW 6-pol. BI³	1,10	100l	6	35	8	150	66
HYH0401506NBI99	Gero pump unit 50Hz 40cm³ 1,5kW 6-pol. BI³	1,50	100l	6	35	8	250	66
HYH0402204NBI99	Gero pump unit 50Hz 40cm³ 2,2kW 4-pol. BI³	2,20	100l	4	54	10	250	66
HYH0403004NBI99	Gero pump unit 50Hz 40cm³ 3,0kW 4-pol. BI³	3,00	100l	4	54	10	500	66
HYH0601506NBI99	Gero pump unit 50Hz 60cm³ 1,5kW 6-pol. BI³	1,50	100l	6	52	8	150	67
HYH0602206NBI99	Gero pump unit 50Hz 60cm³ 2,2kW 6-pol. BI³	2,20	112M	6	52	8	250	67
HYH0602204NBI99	Gero pump unit 50Hz 60cm³ 2,2kW 4-pol. BI³	2,20	100l	4	80	10	150	67
HYH0603004NBI99	Gero pump unit 50Hz 60cm³ 3,0kW 4-pol. BI³	3,00	100l	4	80	10	250	67
HYH0604004NBI99	Gero pump unit 50Hz 60cm³ 4,0kW 4-pol. BI³	4,00	112M	4	80	10	500	67
HYH0801506NBI99	Gero pump unit 50Hz 80cm³ 1,5kW 6-pol. BI³	1,50	100l	6	69	8	150	70
HYH0802206NBI99	Gero pump unit 50Hz 80cm³ 2,2kW 6-pol. BI³	2,20	112M	6	69	8	250	70
HYH0802204NBI99	Gero pump unit 50Hz 80cm³ 2,2kW 4-pol. BI³	2,20	100l	4	105	10	150	70
HYH0803004NBI99	Gero pump unit 50Hz 80cm³ 3,0kW 4-pol. BI³	3,00	100l	4	105	10	250	70
HYH0804004NBI99	Gero pump unit 50Hz 80cm³ 4,0kW 4-pol. BI³	4,00	112M	4	105	10	500	70

*)depending on motor



Fluid Controls
Gerotor Pump Generation 2

Options

Filtration
We offer an optional spin on filterkit to mount on the outlet port in combination with our hydraulic rail connection system, see below.

spin on filter kit BSP ¾"	III/RH11G2010 (10µm, 60 gpm) III/RH11G2025 (25µm, 60 gpm) III/RH12G2010 (10µm, 100 gpm) III/RH12G2025 (25µm, 100 gpm)
clogging indicator	electric, optical
temperature switches	III/TH5069K, III/TH7/65K III/TH6065K

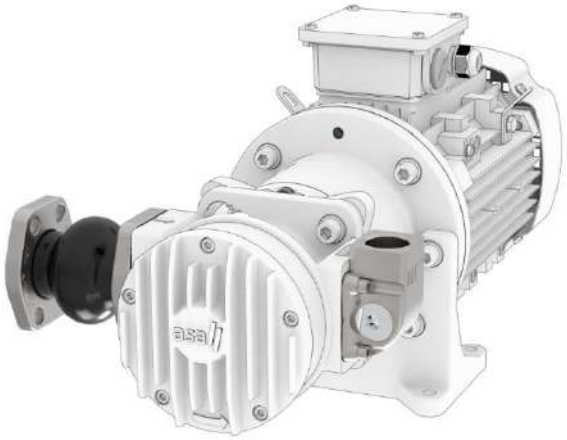
Contact us for complete data sheet of this filter integration system.

Hydraulic connection
For the suction side, you can choose from our connection technology program a flexible rubber compensator with SAE flanges. For the outlet port you can choose any of our rail connectors, with the possibility to turn the port direction at the below given dimensions.

Inlet Port	
SAE rubber compensator NBR/CR, NG40, SAE 1 ½"	
order number:	SDKSS040

Outlet Port	
optional rail connector order numbers	
90° rail connector BSP 1"	III/AT153G25
straight rail connector BSP 1"	III/AT1S1G25
90° rail connector BSP 1 ¼"	III/AT153G32

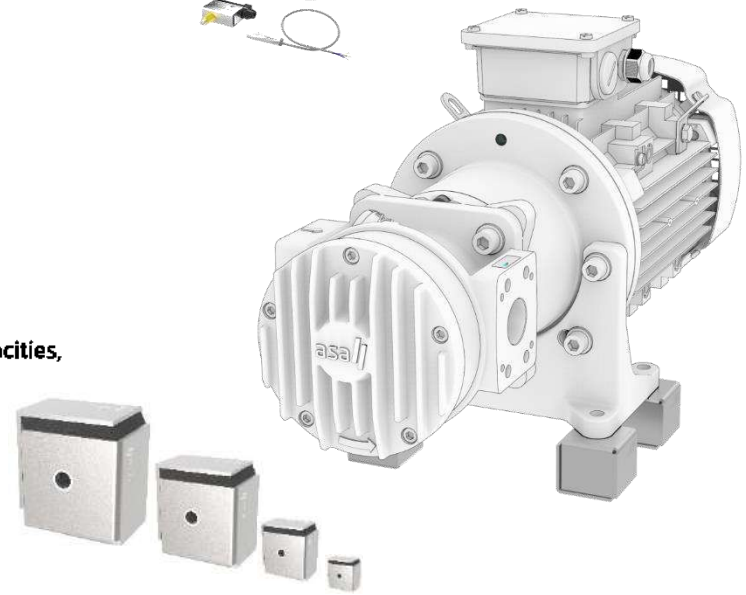
Contact us for our complete suction line product program, including adapter flanges and butterfly valves.



Vibration Absorbers
Using our patented vibration absorbers extends the duration of the pump unit. The unique design has highest capabilities with higher vulcanization surface then conventional products. The shear load capabilities can be maximized by the given arrow system on the product.

50x50x45mm absorber with M10 threads	Extended duration and highest shear loads through our design and arrows system on the product.
order number 50x50x45 M10	MIDGQ50/510IIK

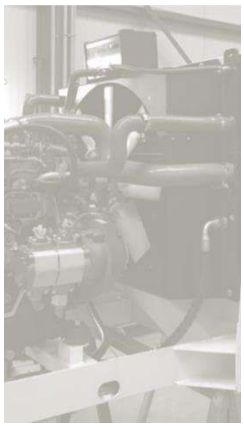
Contact us for full vibration absorber program with load capacities, maximum static loads and spring rates.



asa

Thermal Systems
Connection Technology
Fluid Controls

be different.
make a difference.





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