

# 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

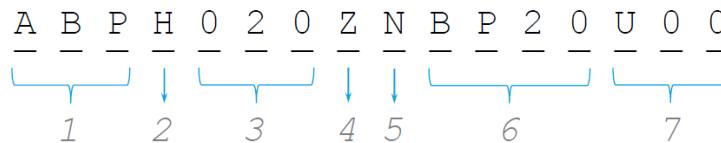
The aluminium body of the housing, the steel shaft and the standard NBR sealings are the perfect match for any mineral oil application. The pump is recommended for lubrication circuits as well as for oil supply, cooling and filtration systems.



### 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 ½" port for any monitoring or other purpose.

### Pump Order Code



#### 1 Product Category

ABP	Pumps
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#### 2 Product Series

H	Gerotor Generation 2 for hydraulic use
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#### 3 Pump Displacement

nominal	Displ./rotation
O20	1.22 in <sup>3</sup>
O30	1.83 in <sup>3</sup>
O40	2.44 in <sup>3</sup>
O60	3.66 in <sup>3</sup>
O80	4.88 in <sup>3</sup>

#### 4 Type of Connection

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

#### 5 Sealing Material

N	NBR
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#### 6 Bypass Options

BP20	internal 29 PSI relief valve
BP60	internal 87 PSI relief valve
BP99	internal 145 PSI relief valve (standard)
EB60	external 87PSI relief valve

#### 7 Index / Customized

U00	Standard US configuration
Uxx	special / customized specifications; to be advised by asa

### General Data

max. outlet pressure:	145 psi
max. kinematic viscosity:	up to 0,78 in <sup>2</sup> /s <sup>*)</sup>
oil temperature range	-4°F to 176°F
ambient working temperature range	-4°F to 176°F <sup>**)</sup>
compatible media	any mineral oil acc. DIN 51524

<sup>\*)</sup> depending on motor power

<sup>\*\*)</sup>...consider the maximum ambient temperature of the used electric motor

### Materials

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

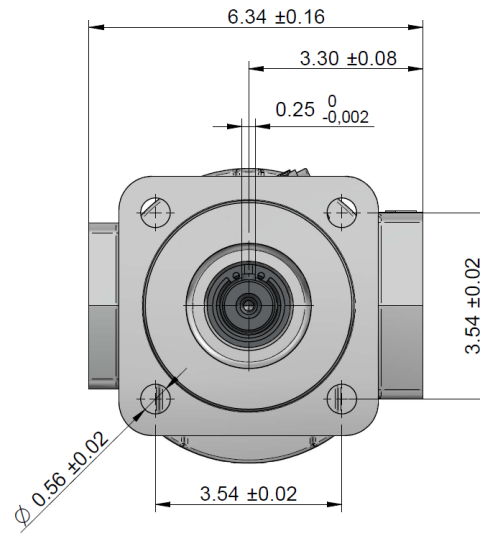
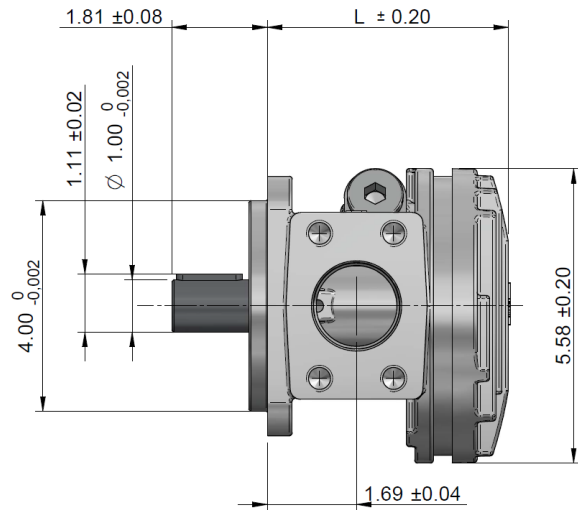
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### SAE version

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

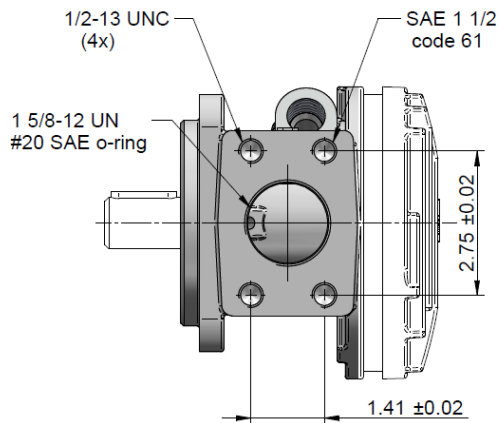


### Dimensions

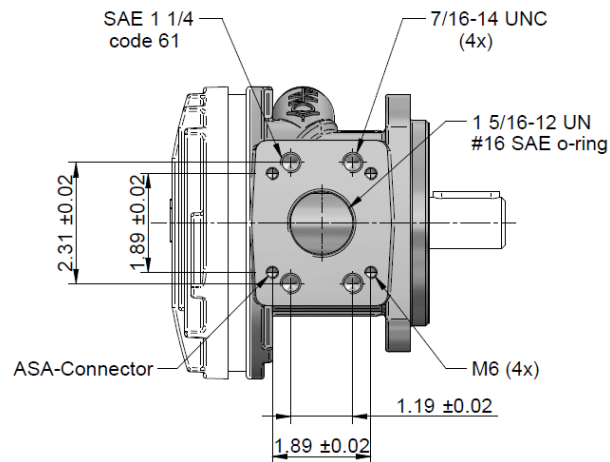
Nominal size	L [inch]
20	4.61
30	4.88
40	5.04
60	5.47
80	5.91

### Hydraulic connection

#### Inlet Port



#### Outlet Port



### Specific Data

order number	description	displacement [in <sup>3</sup> /rotation]	oil flow <sup>1)</sup> [gpm]	min. required motor power <sup>2)</sup> [HP]	weight [lbs]
ABPH020ZNP99U00	Gerotor pump 2, 1.22 in <sup>3</sup> , SAE, int.BP, 145PSI	1,22	7,7	1.78	9.5
ABPH030ZNP99U00	Gerotor pump 2, 1.95 in <sup>3</sup> , SAE, int.BP, 145PSI	1,95	12,4	1.78	10.6
ABPH040ZNP99U00	Gerotor pump 2, 2.44 in <sup>3</sup> , SAE, int.BP, 145PSI	2,44	15,3	2.41	11.2
ABPH060ZNP99U00	Gerotor pump 2, 3.66 in <sup>3</sup> , SAE, int.BP, 145PSI	3,66	23,0	2.41	13.2
ABPH080ZNP99U00	Gerotor pump 2, 4.88 in <sup>3</sup> , SAE, int.BP, 145PSI	4,88	29,0	2.41	15.4

<sup>1)</sup>...measured at rotation of 1450rpm, pressure 0,5bar and viscosity of 46mm<sup>2</sup>/s / for 60Hz oil flow values to be multiplied by 1,2

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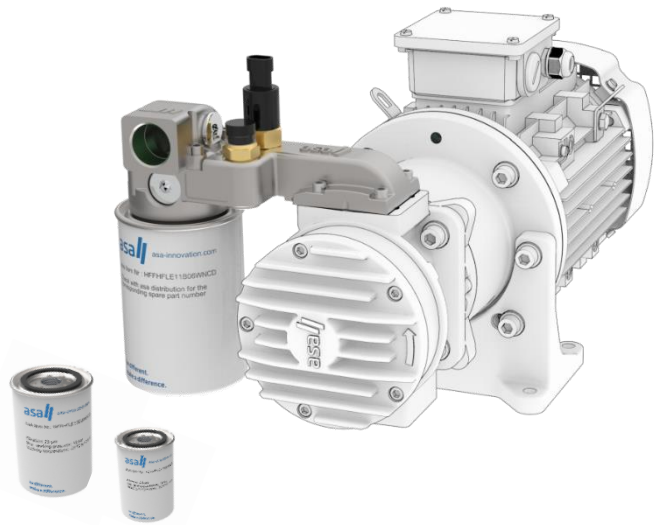
### Options

#### Filtration

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

spin on filter kit	ILLZRF11U1110U00 (10µm, 16gpm)
BSP ¾"	ILLZRF11U1125U00 (25µm, 16gpm)
	ILLZRF12U1110U00 (10µm, 26gpm)
	ILLZRF12U1125U00 (25µm, 26gpm)
clogging indicator	electric, optical
temperature switches	ILLZTH5069KU00, ILLZTH4765KU00
	ILLZTH6065KU00

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.

<b>Inlet Port</b>	
SAE rubber compensator NBR/CR, NG 40, SAE 1 ½"	
order number:	SDKSS040U00
<b>Outlet Port</b>	
optional rail connector order numbers	
90° rail connector UNF 1 1/16"	ILLZET53U12U00
straight rail connector BSP 1"	ILLZATTS1G25U00
90° rail connector UN 1 5/16"	ILLZET53U16U00

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 than 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	MDGQ504510IIKU00
50x50x45 M10	

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

