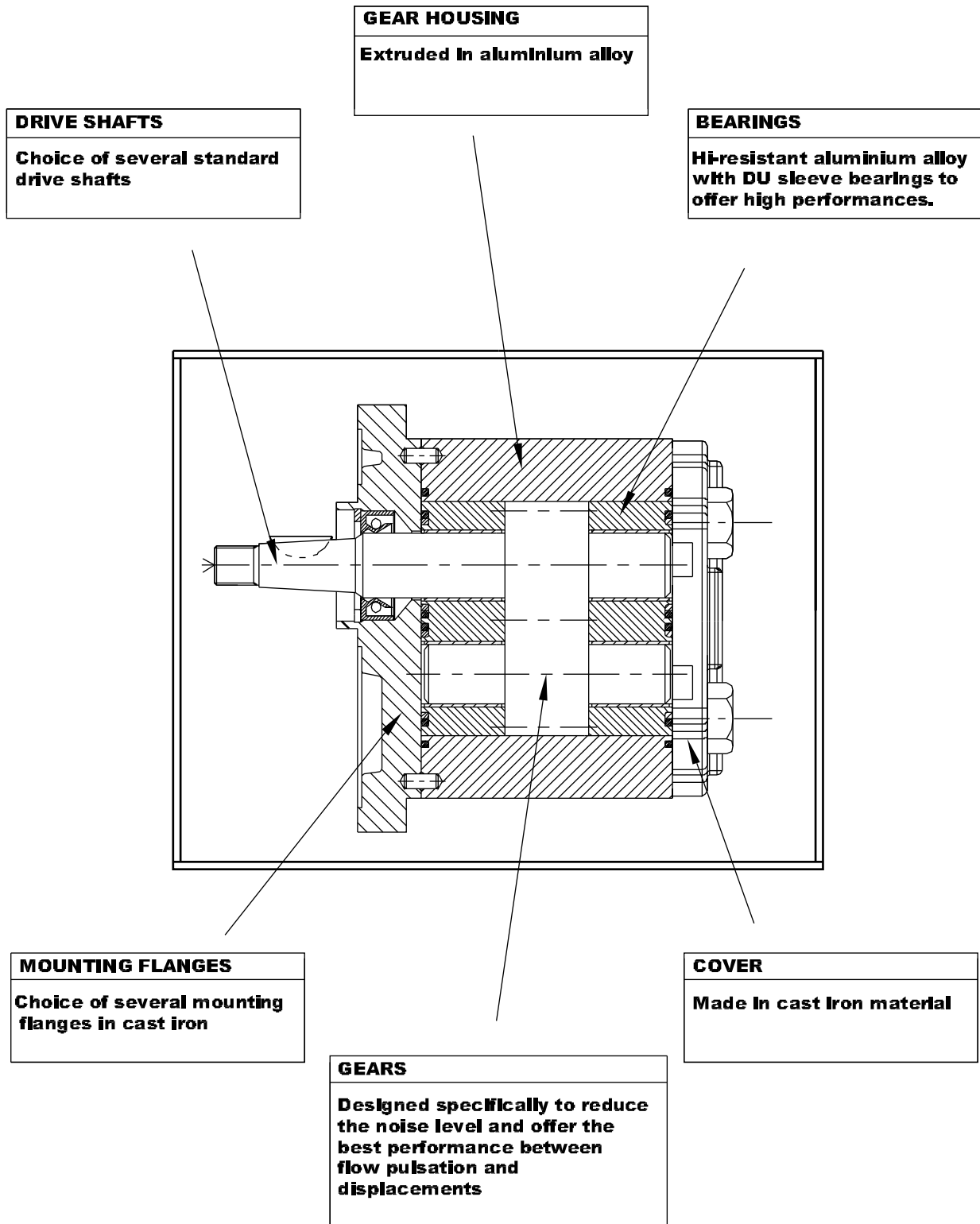


GROUP 3 PUMPS



GROUP 3 PUMPS

CONSTRUCTIVE CHARACTERISTICS:

<i>PART</i>	<i>MATERIAL</i>	<i>CHARACTERISTICS</i>
<i>GEARS</i>	Hardened steel UNI 7846	Rs= 1250 N/mm ² Rm= 1450 N/mm ²
<i>FLANGE AND COVER</i>	G25 / G30 cast iron	Rs= 300 N/mm ² Rm= 450 N/mm ²
<i>BEARINGS</i>	Avional Bearings with DU	Rs= 350 N/mm ² Rm= 390 N/mm ²
<i>BODY</i>	Etruded In aluminium alloy Series 7020	Rs= 350 N/mm ² Rm= 390 N/mm ²
<i>O- RINGS</i>	Buna N Viton	90 Shore, up to 90°C 80 Shore, for high temperature
<i>ANTIEXTRUSION</i>	Zitel	With glass fibres

Rs= Enervation load

Rm= Breaking load

GENERAL CHARACTERISTICS:

Maximum pressures up to 300 bar.

Weight : from 8,2 Kg to 10,5 kg

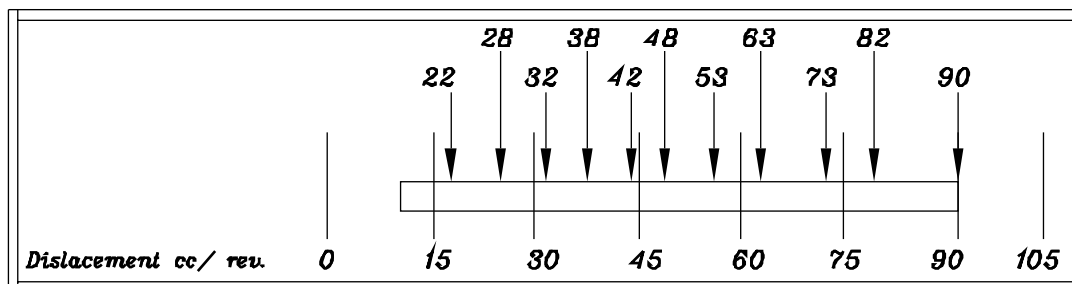
Maximum speed up to 3,000 rpm.

Type of shafts: Taper 1:8
SAE B splined-13 teeth
SAE B cylindrical - Ø22.2

Type of flanges: European standard
SAE A standard.

Displacements from 22 cc/rev to 90 cc/rev.

The displacements are available according this table:



DRIVE:

The connection of the pump to the motor must be done preferably with the use of a flexible coupling to avoid any radial and/or axial force on the shaft, otherwise pump efficiency will dramatically drop due to early wear of inner moving parts.

In any applications where the motion is trasmitted through belts, it is necessary to use a support to avoid any radial or axial load to the pump shaft.

GROUP 3 PUMPS

WORKING CONDITIONS- LIMIT PERFORMANCES

In normal working conditions there must be, in the suction pipe, a pressure lower than the atmospheric pressure.

The pressure range in suction must be:

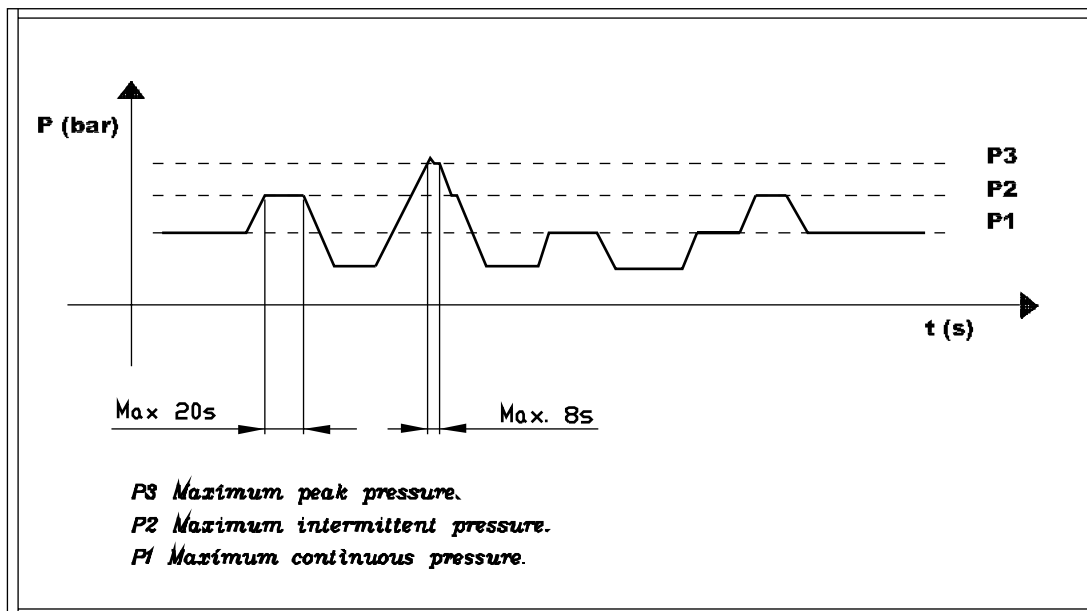
Min. 0.75 bar (absolute)

MAX 2,0 bar (absolute)

The maximum pressure values "P1" are referred to a continuous working at 1500 rpm with standard hydraulic fluids with minimum viscosity of 10 cSt.

For heavier working conditions (viscosity or high temperature) it is necessary to reduce the "P1" values.

In the following table are described the admitted pressures:

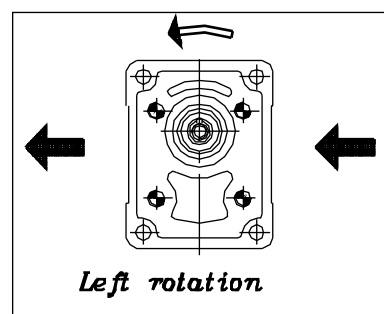
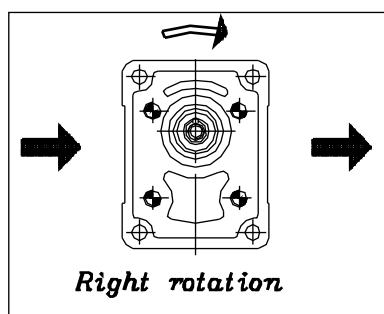


The standard working speeds (minimum and maximum) are the following:

Min. = 400 rpm

Max = (See following table)

DIRECTION OF ROTATION LOOKING AT THE SHAFT:



GROUP 3 PUMPS

FLUID FILTRATION

It is known that in many cases the premature pump performances reduction is due to a non correct filtration in the circuit.

The presence of contamination particles in the fluid usually corresponds to an irreparable wear of the pump internal parts.

It is recommended to pay attention to the plant cleaning, mainly in the starting activity.

The starting fluid contamination it must be according to the Norms ISO 4406 and it should not exceed the Class 19/16 with a filter 3x75.

Here below the technical parameters to respect:

<i>FILTRATION IN SUCTION LINE</i>	30 / 60 Nominal micron
<i>FILTRATION IN PRESSURE LINE</i>	10 / 25 absolute micron
<i>MAXIMUM SPEED IN SUCTION</i>	0,5 / 1,5 m/s
<i>MAXIMUM SPEED IN OUTPUT</i>	3,0 / 5,5 m/s

Sometime (contaminated places) it is recommended to improve the filtration in pressure line and fit also an air filter.

HYDRAULIC FLUIDS

It is recommended the use of fluids made for hydraulic circuits.

Usually they are hydraulic oils with mineral basis HLP HV (DIN 51524).

Here below the technical parameters to respect

<i>MINIMUM VISCOSITY</i>	10 mm²/s
<i>MAXIMUM VISCOSITY</i>	100 mm²/s
<i>SUGGESTED VISCOSITY</i>	20 mm²/s / 100 mm²/s
<i>SUGGESTED TEMPERATURE</i>	30°C / 50°C
<i>WORKING TEMPERATURE</i>	-15°C / +80°C

For applications with water-glycol (HF-C) it is recommended to consider the following limitations: 1500 rpm maximum speed and 200 bar maximum pressure.

For applications with phosphate ester fluids, please contact our Technical department.

INSTALLATION INSTRUCTION

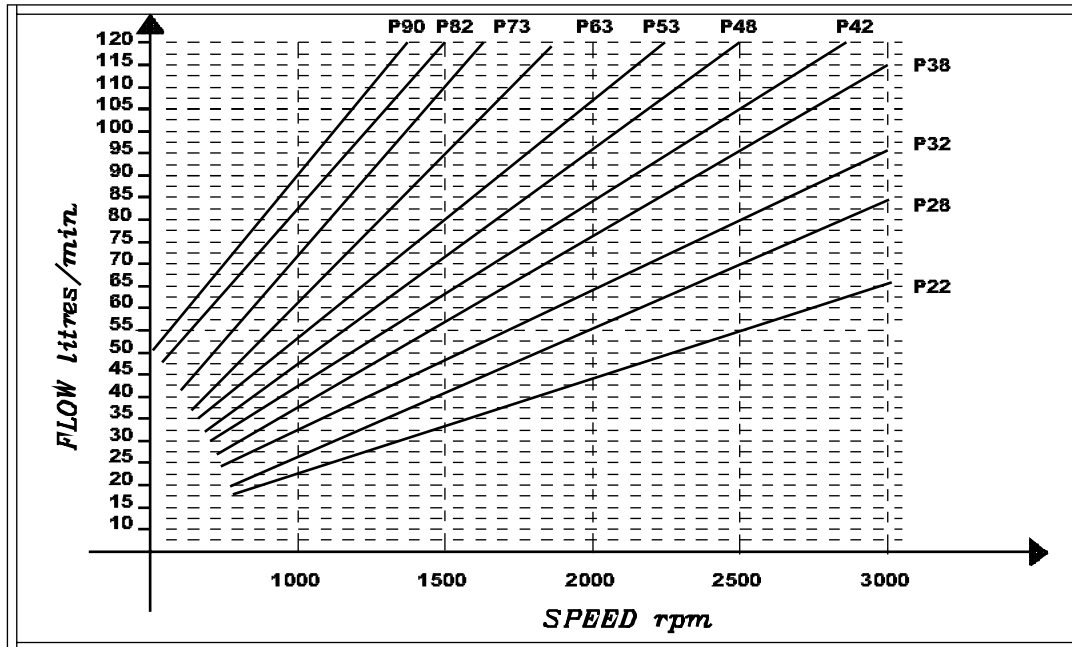
During the first starting it is recommended:

- to set the maximum pressure relief valves to a low value and gradually increase the pressure.
- to check, with single rotation pumps, that the rotation direction it is correct.
- to check that the connection between the motor and pump shaft is correct, without radial or axial load.
- to avoid starting under pressure in low temperature conditions or after long period of inactivity
- to check the fluid level in the tank
- to disconnect the return pipe and purge any air in the circuit
- to protect the pumpshaft seal when painting power pack
- to use suitable systems in the return lines to tank, to avoid turbulence in the circuit and ingress of air, water or contamination
- to check the torque that must be lower than the maximum torque admissible on the pump shaft
- to use new oil filters with absence of water or any other emulsifying substance
- to avoid starting with a air-oil solution

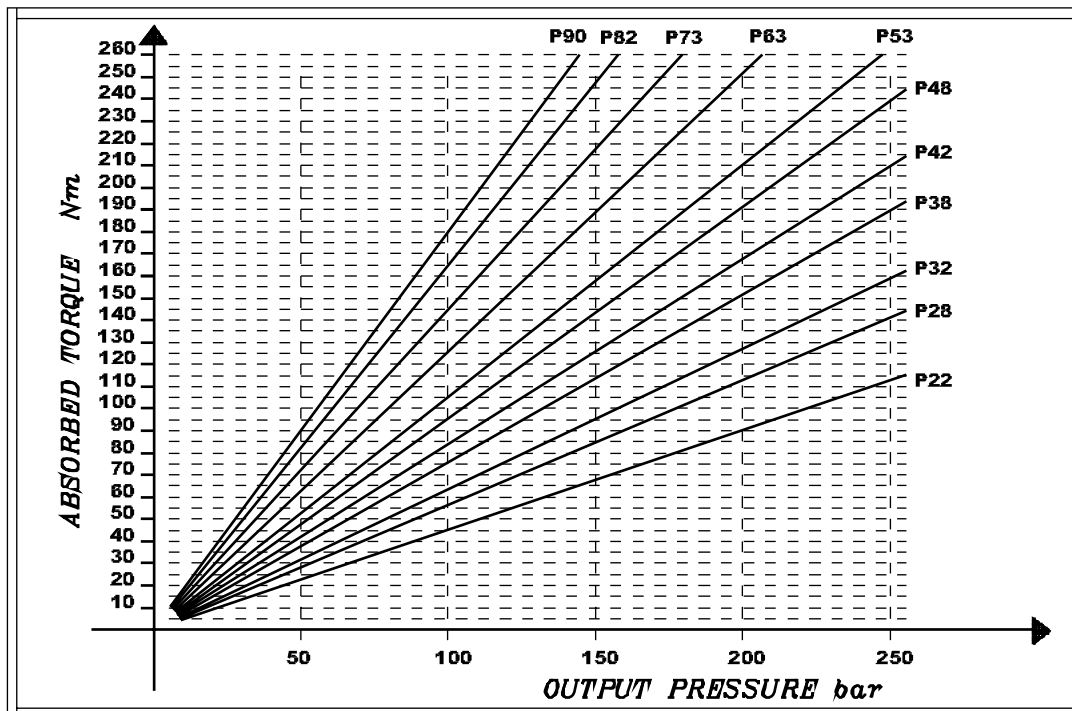
It is important to specify an oil tank at least twice the flow from the pump.

GROUP 3 PUMPS

FLOW CHARACTERISTICS CURVES



ABSORBED TORQUE



NOTE

Above flow characteristics curves have been made considering a volumetric efficiency of 95%

GROUP 3 PUMPS

PUMP CALCULATION

V	Displacement	CC / REV
Q	Flow	l/min
P	Power	kW
T	Torque	N · m
N	Speed	-15°C / +80°C
ΔP	Pressure	bar
η_v	Volumetric efficiency	0.95
η_m	Mechanical efficiency	0.9
η_t	Total efficiency	0.85

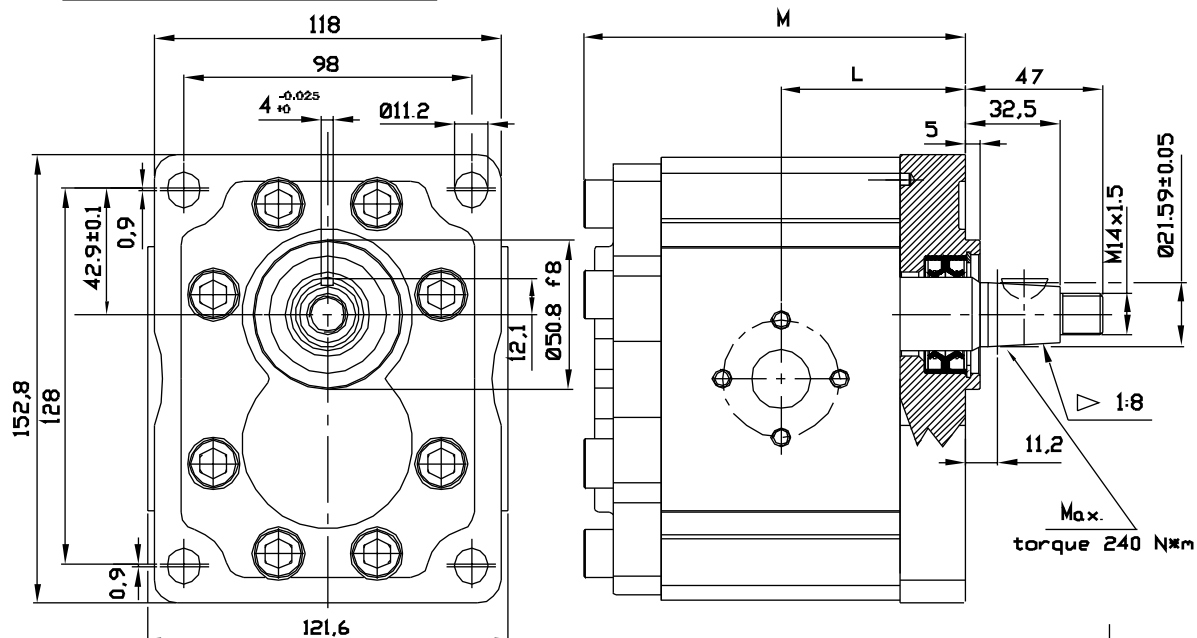
$$Q = V \cdot \eta_v \cdot N \cdot 10^{-3} \quad l/min$$

$$C = \frac{\Delta P \cdot V}{62.8 \cdot \eta_m} \quad N \cdot m$$

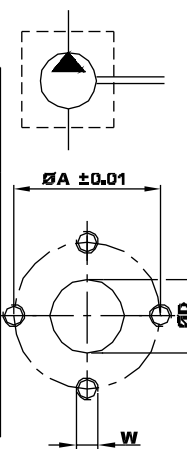
$$P = \frac{\Delta P \cdot V \cdot N}{612000 \cdot \eta_t} \quad kW$$

GROUP 3 PUMPS- EUROPEAN STANDARD

VERSION: P38 P3



Type	Displacement (cc/rev)	Max working pressure P1 (bar)	Peak pressure P3 (bar)	Max speed (r.p.m)	Dimension		Inlet port			Outlet port		
					L	M	ØD	ØA	W	ØD	ØA	W
					(mm)							
OT 300 P22	22	260	300	3000	57,4	119,3	27	51	M10	19	40	M8
OT 300 P28	28	260	300	3000	59,7	123,7	27	51	M10	19	40	M8
OT 300 P32	32	260	300	3000	61,2	126,9	27	51	M10	19	40	M8
OT 300 P38	38	240	280	3000	63,5	131,5	27	51	M10	19	40	M8
OT 300 P42	42	240	280	3000	65,0	134,5	27	51	M10	19	40	M8
OT 300 P48	48	240	280	3000	72,3	149,1	27	51	M10	19	40	M8
OT 300 P53	53	220	250	3000	74,2	152,9	27	51	M10	19	40	M8
OT 300 P63	63	200	240	2100	78,0	160,5	27	51	M10	19	40	M8
OT 300 P73	73	180	210	2100	81,9	168,2	36	62	M12	27	51	M10
OT 300 P82	82	170	200	2100	85,3	175,1	36	62	M12	27	51	M10
OT 300 P90	90	150	180	2100	88,3	181,1	36	62	M12	27	51	M10



EXAMPLE OF ORDERING CODE

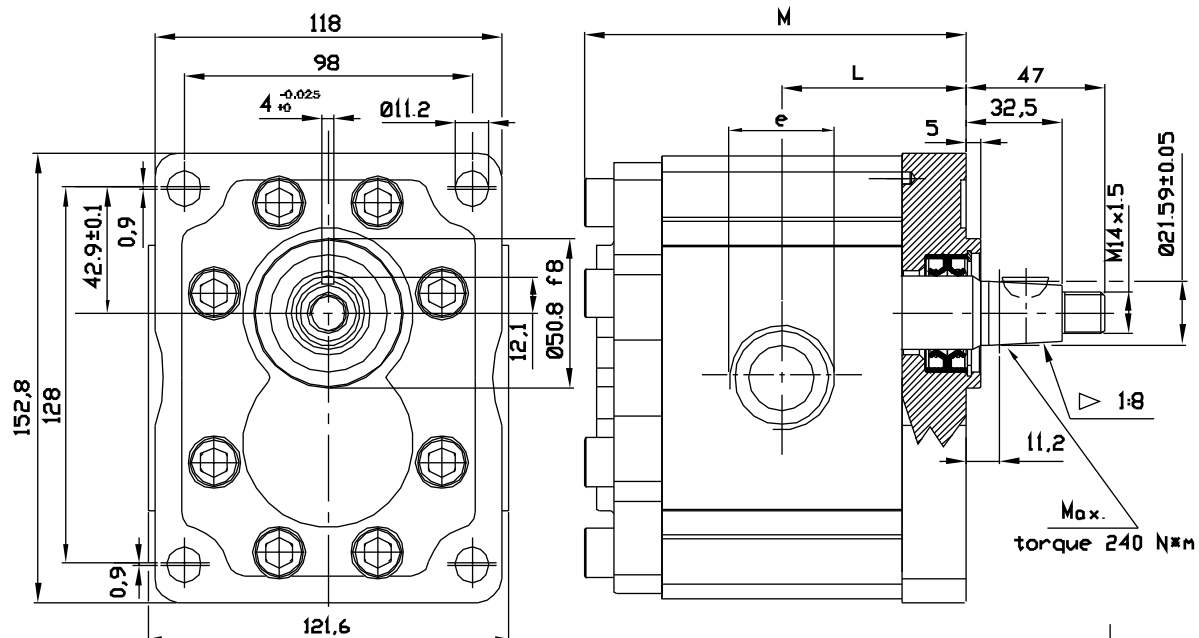
OT300 P 28 S / P 38 P3

Series	OT300	Pump	P	Displacement (see above table)	28	Rotation	S	Shaft	/ P	Body for European flanges	38	European standard flange	P3
Rotation	S	Anti-clockwise	D	Clockwise									

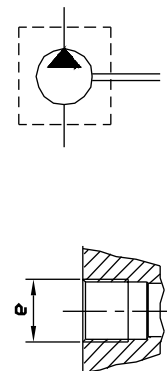
 AVAILABLE FOR QUANTITIES

GROUP 3 PUMPS- EUROPEAN STANDARD

VERSION: G38 P3



Type	Displacement (cc/rev)	Max working pressure P1 (bar)	Peak pressure P3 (bar)	Max speed (r.p.m)	Dimension		Inlet port e	Outlet port e
					L	M		
					(mm)			
OT 300 P22	22	260	300	3000	57,4	119,3	G 1	G 3/4
OT 300 P28	28	260	300	3000	59,7	123,7	G 1	G 3/4
OT 300 P32	32	260	300	3000	61,2	126,9	G 1	G 3/4
OT 300 P38	38	240	280	3000	63,5	131,5	G 1	G 3/4
OT 300 P42	42	240	280	3000	65,0	134,5	G 1	G 3/4
OT 300 P48	48	240	280	3000	72,3	149,1	G 1	G 3/4
OT 300 P53	53	220	250	3000	74,2	152,9	G 1	G 3/4
OT 300 P63	63	200	240	2100	78,0	160,5	G 1+1/4	G 3/4
OT 300 P73	73	180	210	2100	81,9	168,2	G 1+1/4	G 1
OT 300 P82	82	170	200	2100	85,3	175,1	G 1+1/4	G 1
OT 300 P90	90	150	180	2100	88,3	181,1	G 1+1/4	G 1



EXAMPLE OF ORDERING CODE

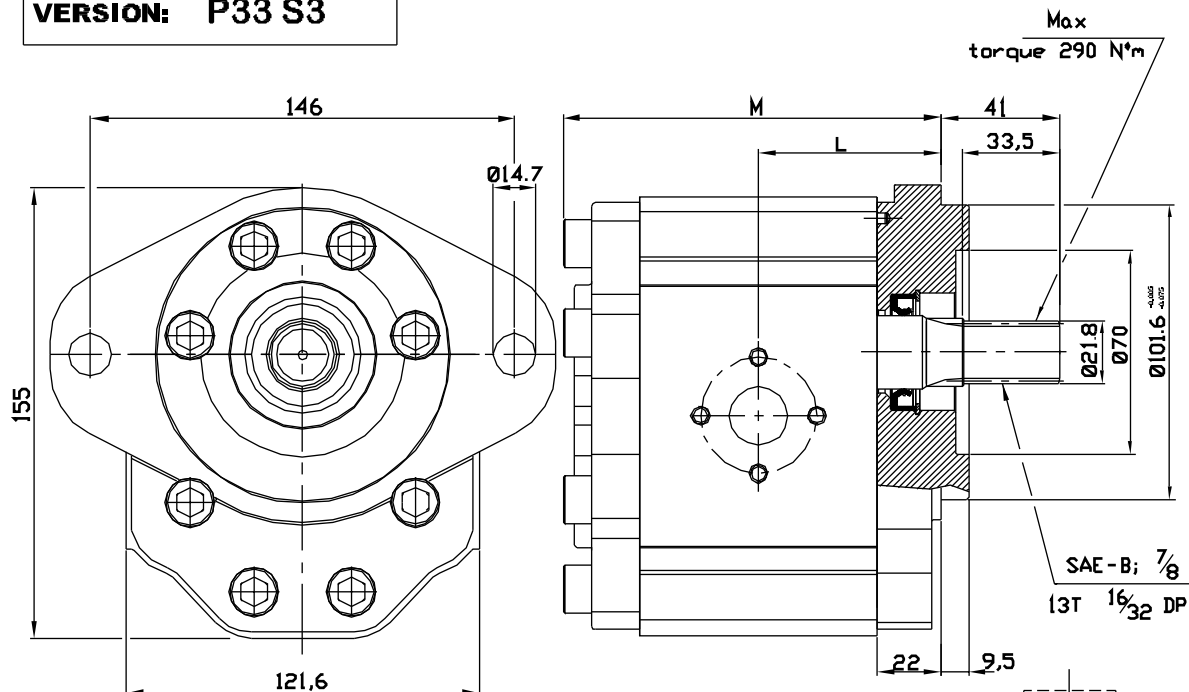
OT300 P 28 S / G 38 P3

Series	OT300	Pump	P	Displacement (see abovetable)	28	Rotation	S	Body with threaded ports (BSP)	G	Taper shaft (1:8)	38	European standard flange	P3
							D						

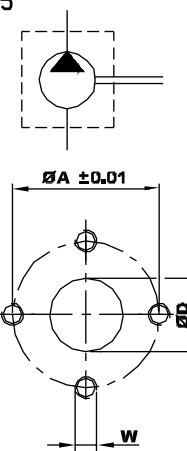
AVAILABLE FOR QUANTITIES

GROUP 3 PUMPS- SAE B STANDARD

VERSION: P33 S3



Type	Displacement	Max working pressure P1	Peak pressure P3	Max speed	Dimension		Inlet port			Outlet port		
					L	M	ØD	ØA	W	ØD	ØA	W
	(cc/rev)	(bar)	(bar)	(r.p.m)	(mm)							
OT 300 P22	22	260	300	3000	57,4	119,3	27	51	M10	19	40	M8
OT 300 P28	28	260	300	3000	59,7	123,7	27	51	M10	19	40	M8
OT 300 P32	32	260	300	3000	61,2	126,9	27	51	M10	19	40	M8
OT 300 P38	38	240	280	3000	63,5	131,5	27	51	M10	19	40	M8
OT 300 P42	42	240	280	3000	65,0	134,5	27	51	M10	19	40	M8
OT 300 P48	48	240	280	3000	72,3	149,1	27	51	M10	19	40	M8
OT 300 P53	53	220	250	3000	74,2	152,9	27	51	M10	19	40	M8
OT 300 P63	63	200	240	2100	78,0	160,5	27	51	M10	19	40	M8
OT 300 P73	73	180	210	2100	81,9	168,2	36	62	M12	27	51	M10
OT 300 P82	82	170	200	2100	85,3	175,1	36	62	M12	27	51	M10
OT 300 P90	90	150	180	2100	88,3	181,1	36	62	M12	27	51	M10



EXAMPLE OF ORDERING CODE

OT300 P 28 S / P 33 S3

Series

Pump

Displacement (see above table)

Rotation

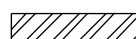
S Anti-clockwise

D Clockwise

SAE B flange

SAE B splined 13 Teeth-16/32 DP

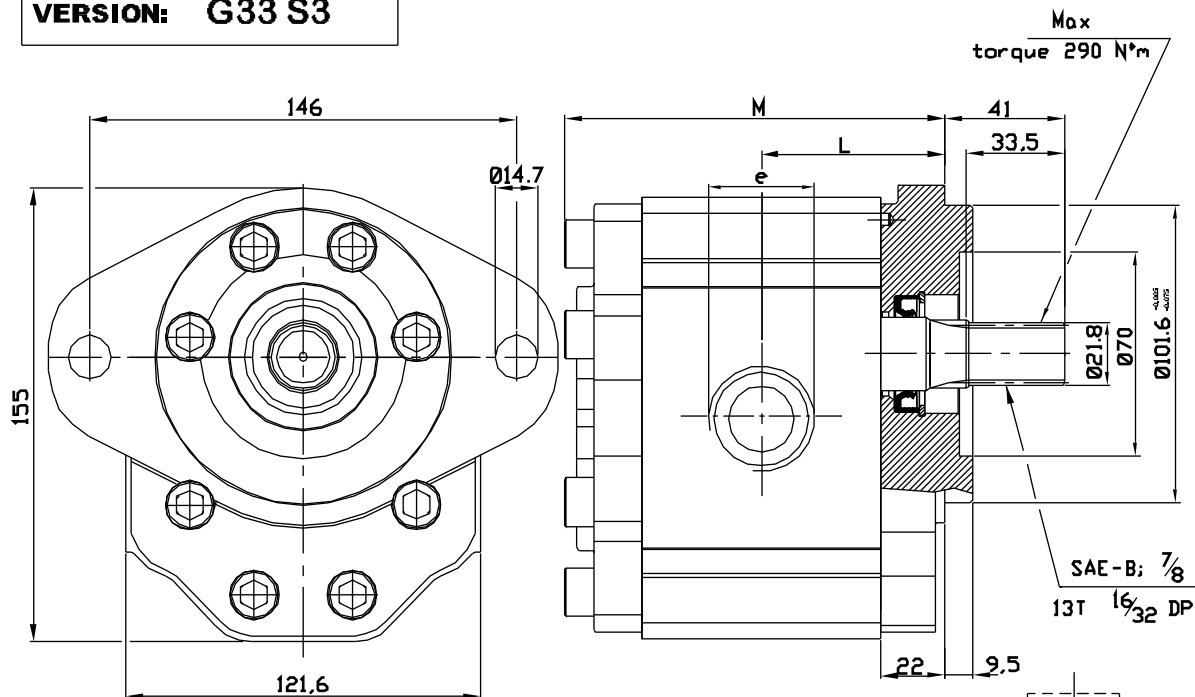
Body for European flanges



AVAILABLE FOR QUANTITIES

GROUP 3 PUMPS- SAE B STANDARD

VERSION: G33 S3



Type	Displacement (cc/rev)	Max working pressure P1 (bar)	Peak pressure P3 (bar)	Max speed (r.p.m)	Dimension L M		Inlet port e	Outlet port e
					(mm)			
OT 300 P22	22	260	300	3000	57,4	119,3	G 1	G 3/4
OT 300 P28	28	260	300	3000	59,7	123,7	G 1	G 3/4
OT 300 P32	32	260	300	3000	61,2	126,9	G 1	G 3/4
OT 300 P38	38	240	280	3000	63,5	131,5	G 1	G 3/4
OT 300 P42	42	240	280	3000	65,0	134,5	G 1	G 3/4
OT 300 P48	48	240	280	3000	72,3	149,1	G 1	G 3/4
OT 300 P53	53	220	250	3000	74,2	152,9	G 1	G 3/4
OT 300 P63	63	200	240	2100	78,0	160,5	G 1+1/4	G 3/4
OT 300 P73	73	180	210	2100	81,9	168,2	G 1+1/4	G 1
OT 300 P82	82	170	200	2100	85,3	175,1	G 1+1/4	G 1
OT 300 P90	90	150	180	2100	88,3	181,1	G 1+1/4	G 1

EXAMPLE OF ORDERING CODE

OT300 P 28 S / G 33 S3

Series

Pump

Displacement (see above table)

Rotation

S Anti-clockwise

D Clockwise

SAE B flange

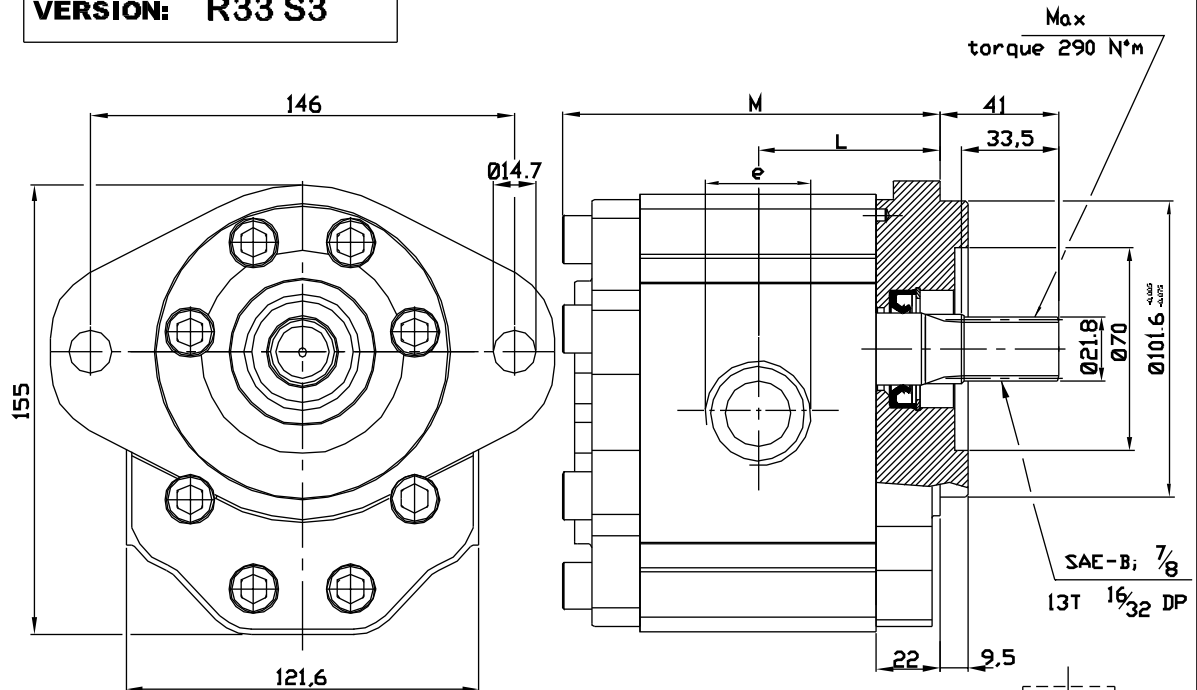
SAE B splined 13 Teeth-16/32 DP

Body with threaded ports (BSP)

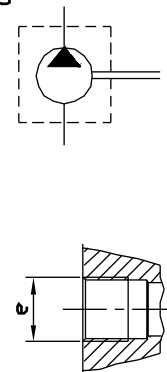
AVAILABLE FOR QUANTITIES

GROUP 3 PUMPS- SAE B STANDARD

VERSION: R33 S3



Type	Displacement	Max working pressure P1 (bar)	Peak pressure P3 (bar)	Max speed (r.p.m)	Dimension		Inlet port e	Outlet port e
					L	M		
	(cc/rev)				(mm)			
OT 300 P22	22	260	300	3000	57,4	119,3	1-5/16" UNF	1-1/16" UNF
OT 300 P28	28	260	300	3000	59,7	123,7	1-5/16" UNF	1-1/16" UNF
OT 300 P32	32	260	300	3000	61,2	126,9	1-5/16" UNF	1-1/16" UNF
OT 300 P38	38	240	280	3000	63,5	131,5	1-5/8" UNF	1-5/16" UNF
OT 300 P42	42	240	280	3000	65,0	134,5	1-5/8" UNF	1-5/16" UNF
OT 300 P48	48	240	280	3000	72,3	149,1	1-5/8" UNF	1-5/16" UNF
OT 300 P53	53	220	250	3000	74,2	152,9	1-5/8" UNF	1-5/16" UNF
OT 300 P63	63	200	240	2100	78,0	160,5	1-5/8" UNF	1-5/16" UNF
OT 300 P73	73	180	210	2100	81,9	168,2	1-7/8" UNF	1-5/8" UNF
OT 300 P82	82	170	200	2100	85,3	175,1	1-7/8" UNF	1-5/8" UNF
OT 300 P90	90	150	180	2100	88,3	181,1	1-7/8" UNF	1-5/8" UNF



EXAMPLE OF ORDERING CODE

OT300 P 28 S / R 33 S3

Series

Pump

Displacement (see above table)

Rotation

S Anti-clockwise

D Clockwise

SAE B flange

SAE B splined 13 Teeth-16/32 DP

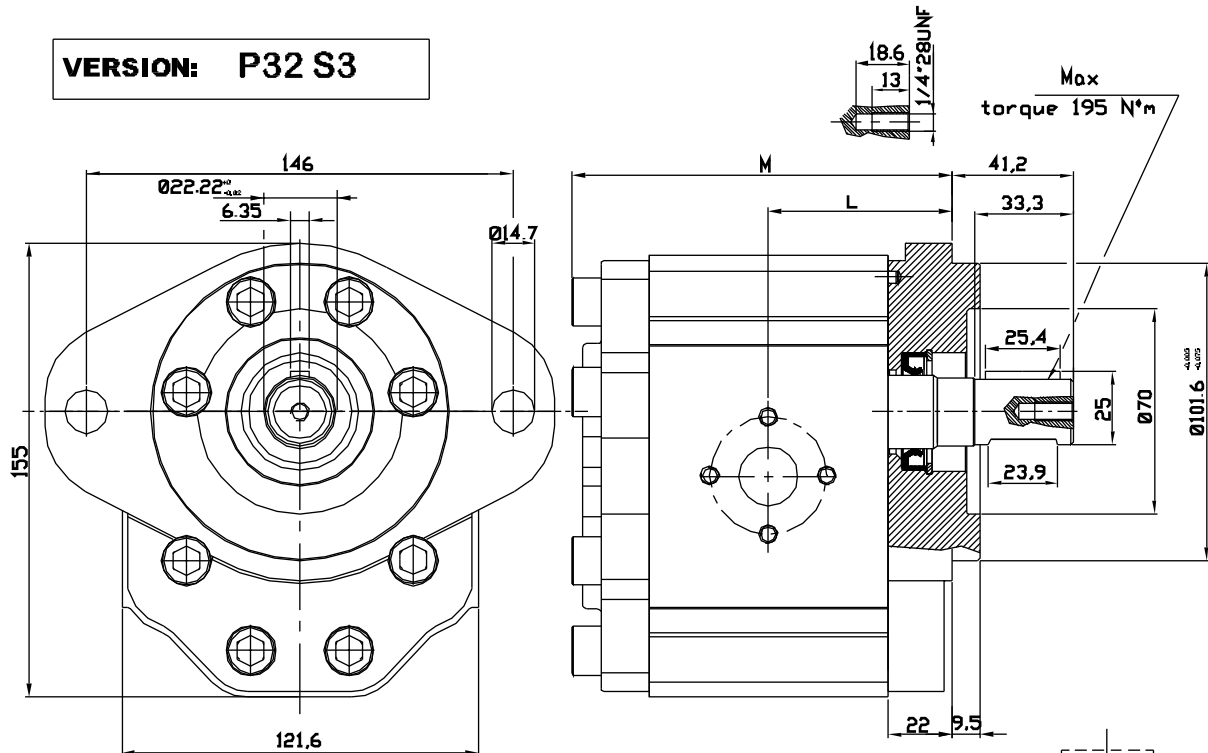
Body with O-ring boss ports



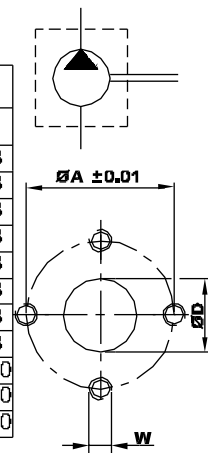
AVAILABLE FOR QUANTITIES

GROUP 3 PUMPS- SAE B STANDARD

VERSION: P32 S3



Type	Displacement (cc/rev)	Max working pressure P1 (bar)	Peak pressure P3 (bar)	Max speed (r.p.m)	Dimension L M		Inlet port			Outlet port		
					(mm)		ØD	ØA	W	ØD	ØA	W
OT 300 P22	22	260	300	3000	57,4	119,3	27	51	M10	19	40	M8
OT 300 P28	28	260	300	3000	59,7	123,7	27	51	M10	19	40	M8
OT 300 P32	32	260	300	3000	61,2	126,9	27	51	M10	19	40	M8
OT 300 P38	38	240	280	3000	63,5	131,5	27	51	M10	19	40	M8
OT 300 P42	42	240	280	3000	65,0	134,5	27	51	M10	19	40	M8
OT 300 P48	48	240	280	3000	72,3	149,1	27	51	M10	19	40	M8
OT 300 P53	53	220	250	3000	74,2	152,9	27	51	M10	19	40	M8
OT 300 P63	63	200	240	2100	78,0	160,5	27	51	M10	19	40	M8
OT 300 P73	73	180	210	2100	81,9	168,2	36	62	M12	27	51	M10
OT 300 P82	82	170	200	2100	85,3	175,1	36	62	M12	27	51	M10
OT 300 P90	90	150	180	2100	88,3	181,1	36	62	M12	27	51	M10



EXAMPLE OF ORDERING CODE

OT300 P 28 S / P 32 S3

Series

Pump

Displacement (see above table)

Rotation

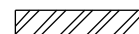
S Anti-clockwise

D Clockwise

SAE B flange

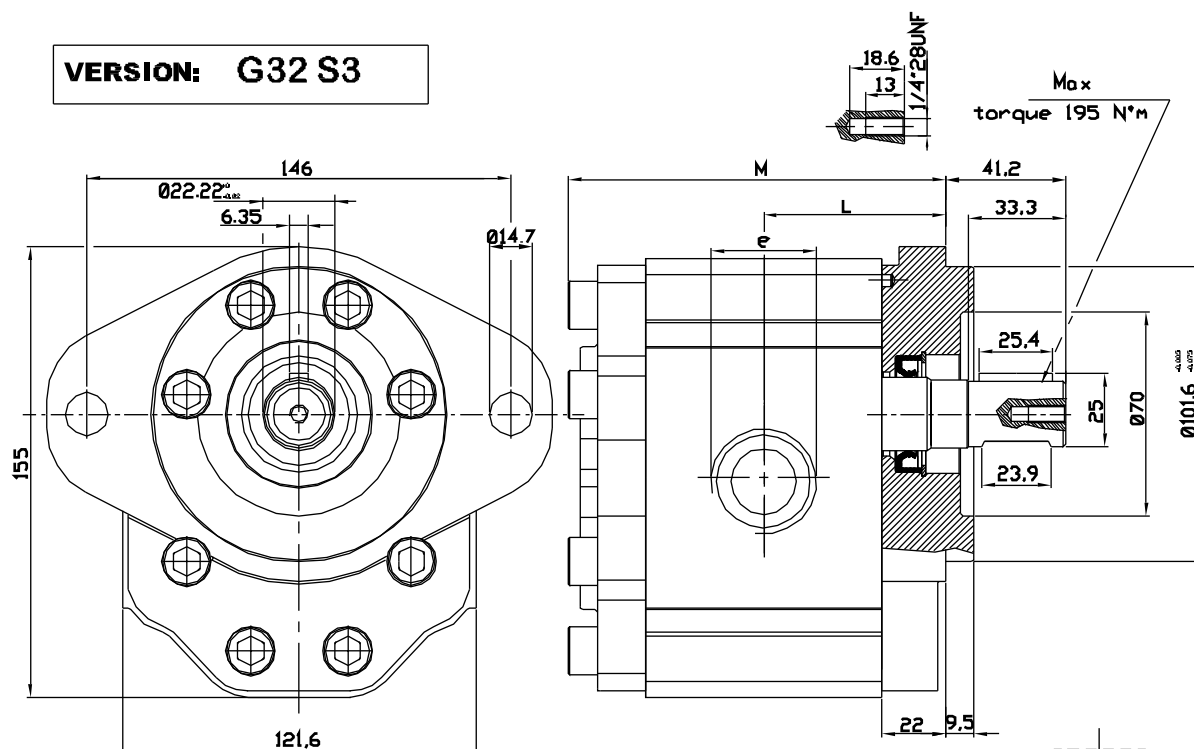
SAE B cylindrical shaft 022.2

Body for European flanges

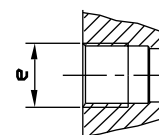
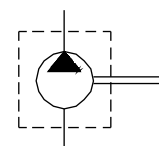
 AVAILABLE FOR QUANTITIES

GROUP 3 PUMPS- SAE B STANDARD

VERSION: G32 S3



Type	Displacement (cc/rev)	Max working pressure P1 (bar)	Peak pressure P3 (bar)	Max speed (r.p.m)	Dimension		Inlet port e	Outlet port e
					L	M		
					(mm)			
OT 300 P22	22	260	300	3000	57,4	119,3	G 1	G 3/4
OT 300 P28	28	260	300	3000	59,7	123,7	G 1	G 3/4
OT 300 P32	32	260	300	3000	61,2	126,9	G 1	G 3/4
OT 300 P38	38	240	280	3000	63,5	131,5	G 1	G 3/4
OT 300 P42	42	240	280	3000	65,0	134,5	G 1	G 3/4
OT 300 P48	48	240	280	3000	72,3	149,1	G 1	G 3/4
OT 300 P53	53	220	250	3000	74,2	152,9	G 1	G 3/4
OT 300 P63	63	200	240	2100	78,0	160,5	G 1+1/4	G 3/4
OT 300 P73	73	180	210	2100	81,9	168,2	G 1+1/4	G 1
OT 300 P82	82	170	200	2100	85,3	175,1	G 1+1/4	G 1
OT 300 P90	90	150	180	2100	88,3	181,1	G 1+1/4	G 1



EXAMPLE OF ORDERING CODE

OT300 P 28 S / G 32 S3

Series

Pump

Displacement (see above table)

Rotation

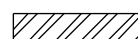
S Anti-clockwise

D Clockwise

SAE B flange

SAE B cylindrical shaft 022.2

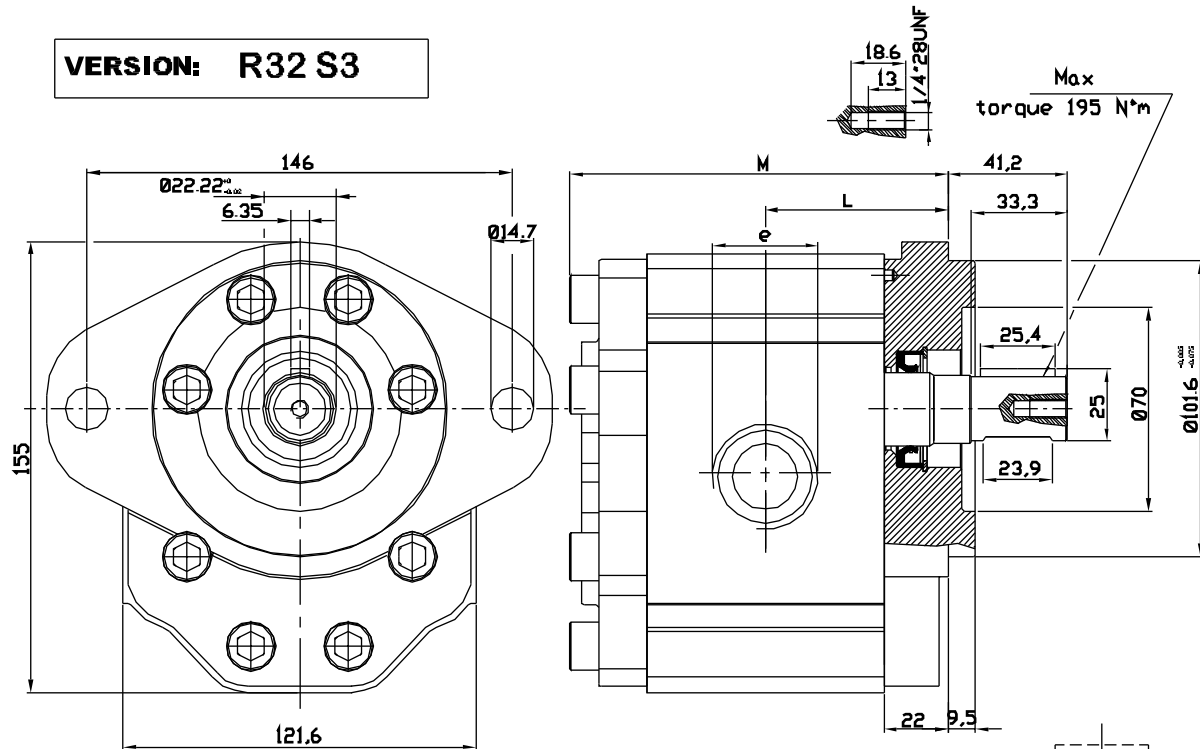
Body with threaded ports (BSP)



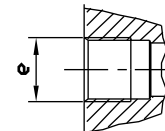
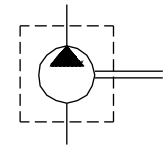
AVAILABLE FOR QUANTITIES

GROUP 3 PUMPS- SAE B STANDARD

VERSION: R32 S3



Type	Displacement (cc/rev)	Max working pressure P1 (bar)	Peak pressure P3 (bar)	Max speed (r.p.m)	Dimension		Inlet port e	Outlet port e
					L	M		
					(mm)			
OT 300 P22	22	260	300	3000	57,4	119,3	1-5/16" UNF	1-1/16" UNF
OT 300 P28	28	260	300	3000	59,7	123,7	1-5/16" UNF	1-1/16" UNF
OT 300 P32	32	260	300	3000	61,2	126,9	1-5/16" UNF	1-1/16" UNF
OT 300 P38	38	240	280	3000	63,5	131,5	1-5/8" UNF	1-5/16" UNF
OT 300 P42	42	240	280	3000	65,0	134,5	1-5/8" UNF	1-5/16" UNF
OT 300 P48	48	240	280	3000	72,3	149,1	1-5/8" UNF	1-5/16" UNF
OT 300 P53	53	220	250	3000	74,2	152,9	1-5/8" UNF	1-5/16" UNF
OT 300 P63	63	200	240	2100	78,0	160,5	1-5/8" UNF	1-5/16" UNF
OT 300 P73	73	180	210	2100	81,9	168,2	1-7/8" UNF	1-5/8" UNF
OT 300 P82	82	170	200	2100	85,3	175,1	1-7/8" UNF	1-5/8" UNF
OT 300 P90	90	150	180	2100	88,3	181,1	1-7/8" UNF	1-5/8" UNF



EXAMPLE OF ORDERING CODE

OT300 P 28 S / R 32 S3

Series

Pump

Displacement (see above table)

Rotation

S Anti-clockwise

D Clockwise

SAE B flange

SAE B cylindrical shaft 022.2

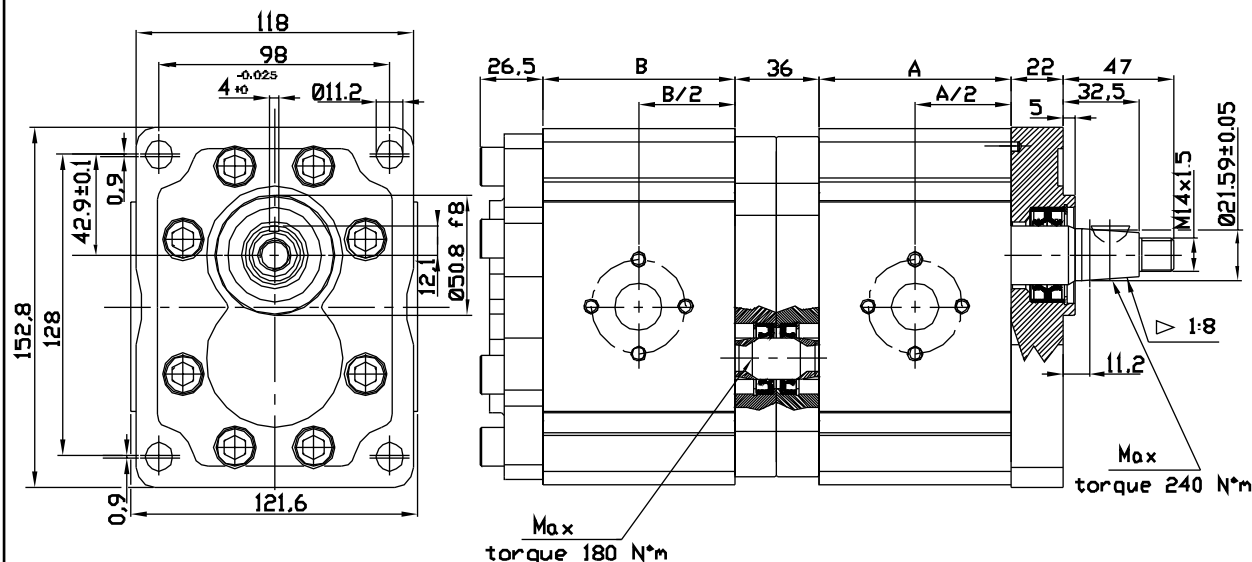
Body with O-ring boss ports



AVAILABLE FOR QUANTITIES

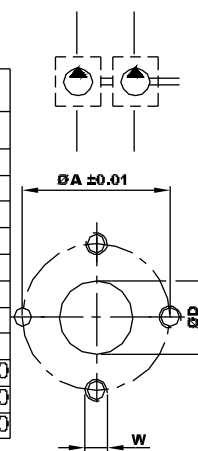
GROUP 3 PUMPS- TANDEM

VERSION: P38 P3



NOTE: The biggest displacement pump must be in the front position

Type	Displacement (cc/rev)	Max working pressure P1 (bar)	Peak pressure P3 (bar)	Max speed (r.p.m)	Dimension L M (mm)		Inlet port			Outlet port		
							ØD	ØA	W	ØD	ØA	W
OT 300 P22	22	260	300	3000	70,8	70,8	27	51	M10	19	40	M8
OT 300 P28	28	260	300	3000	75,4	75,4	27	51	M10	19	40	M8
OT 300 P32	32	260	300	3000	78,4	78,4	27	51	M10	19	40	M8
OT 300 P38	38	240	280	3000	83,0	83,0	27	51	M10	19	40	M8
OT 300 P42	42	240	280	3000	86,0	86,0	27	51	M10	19	40	M8
OT 300 P48	48	240	280	3000	100,6	100,6	27	51	M10	19	40	M8
OT 300 P53	53	220	250	3000	104,4	104,4	27	51	M10	19	40	M8
OT 300 P63	63	200	240	2100	112,0	112,0	27	51	M10	19	40	M8
OT 300 P73	73	180	210	2100	119,7	119,7	36	62	M12	27	51	M10
OT 300 P82	82	170	200	2100	126,6	126,6	36	62	M12	27	51	M10
OT 300 P90	90	150	180	2100	132,6	132,6	36	62	M12	27	51	M10



EXAMPLE OF ORDERING CODE

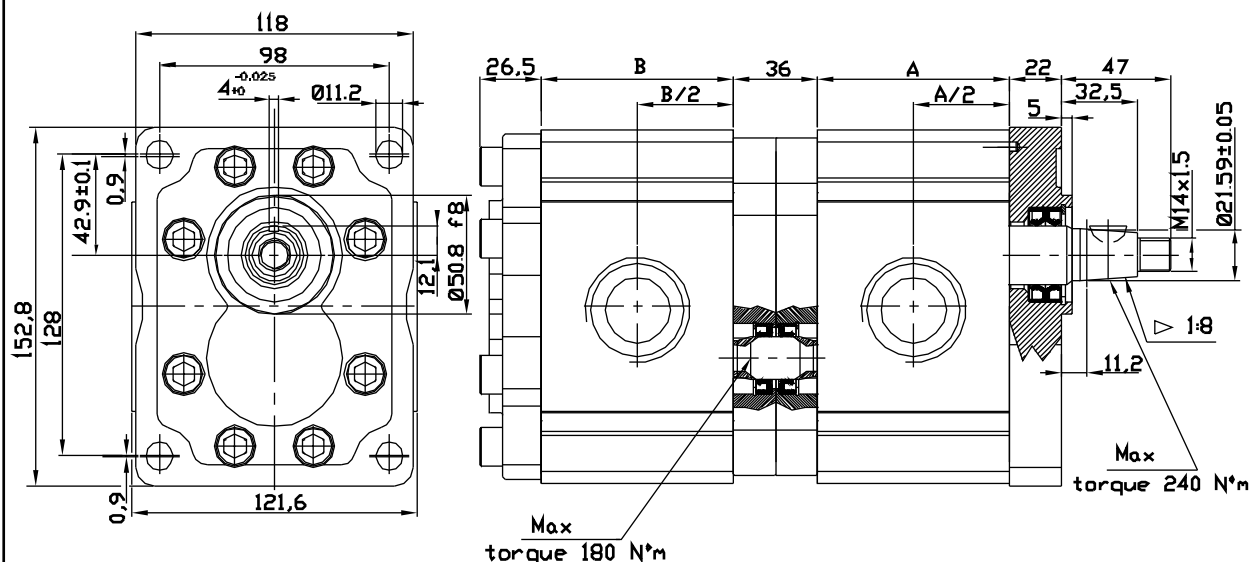
OT300 P 48 / 22 S / P 38 P3 / 2

Series	OT300	Pump	P	Front pump displacement (see above table)	48	Second pump displacement (see above table)	22	Rotation	S	Anti-clockwise	1 = One inlet port 2 = Two inlet ports	European standard flange	Taper shaft (1:8)	Body for European flanges
									D	Clockwise				

AVAILABLE FOR QUANTITIES

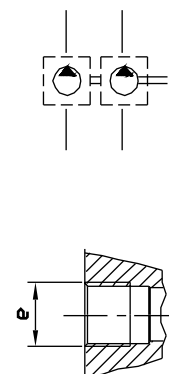
GROUP 3 PUMPS- TANDEM

VERSION: G38 P3



NOTE: The biggest displacement pump must be in the front position

Type	Displacement (cc/rev)	Max working pressure P1 (bar)	Peak pressure P3	Max speed (r.p.m)	Dimension		Inlet port	Outlet port
					L	M		
					(mm)		e	e
OT 300 P22	22	260	300	3000	70,8	70,8	G 1	G 3/4
OT 300 P28	28	260	300	3000	75,4	75,4	G 1	G 3/4
OT 300 P32	32	260	300	3000	78,4	78,4	G 1	G 3/4
OT 300 P38	38	240	280	3000	83,0	83,0	G 1	G 3/4
OT 300 P42	42	240	280	3000	86,0	86,0	G 1	G 3/4
OT 300 P48	48	240	280	3000	100,6	100,6	G 1	G 3/4
OT 300 P53	53	220	250	3000	104,4	104,4	G 1	G 3/4
OT 300 P63	63	200	240	2100	112,0	112,0	G 1+1/4	G 3/4
OT 300 P73	73	180	210	2100	119,7	119,7	G 1+1/4	G 1
OT 300 P82	82	170	200	2100	126,6	126,6	G 1+1/4	G 1
OT 300 P90	90	150	180	2100	132,6	132,6	G 1+1/4	G 1



EXAMPLE OF ORDERING CODE

OT300 P 48 / 22 S / G 38 P3 / 2

Series

Pump

Front pump displacement
(see above table)

Second pump displacement
(see above table)

Rotation

S

Anti-clockwise

D

Clockwise

1 = One inlet port

2 = Two inlet ports

European standard flange

Taper shaft (1:8)

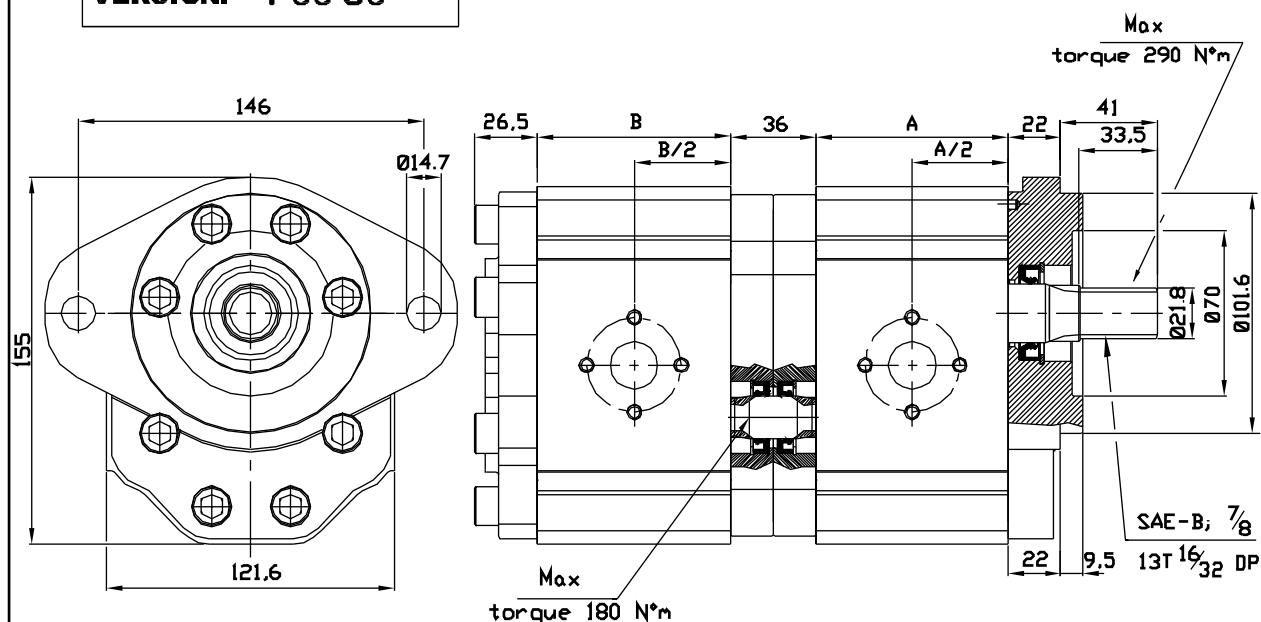
Body with threaded ports (BSP)



AVAILABLE FOR QUANTITIES

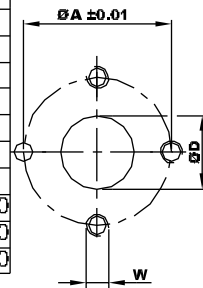
GROUP 3 PUMPS- TANDEM

VERSION: P33 S3



NOTE: The biggest displacement pump must be in the front position

Type	Displacement (cc/rev)	Max working pressure P1 (bar)	Peak pressure P3 (bar)	Max speed (r.p.m)	Dimension L M		Inlet port			Outlet port		
					(mm)	(mm)	ØD	ØA	W	ØD	ØA	W
OT 300 P22	22	260	300	3000	70,8	70,8	27	51	M10	19	40	M8
OT 300 P28	28	260	300	3000	75,4	75,4	27	51	M10	19	40	M8
OT 300 P32	32	260	300	3000	78,4	78,4	27	51	M10	19	40	M8
OT 300 P38	38	240	280	3000	83,0	83,0	27	51	M10	19	40	M8
OT 300 P42	42	240	280	3000	86,0	86,0	27	51	M10	19	40	M8
OT 300 P48	48	240	280	3000	100,6	100,6	27	51	M10	19	40	M8
OT 300 P53	53	220	250	3000	104,4	104,4	27	51	M10	19	40	M8
OT 300 P63	63	200	240	2100	112,0	112,0	27	51	M10	19	40	M8
OT 300 P73	73	180	210	2100	119,7	119,7	36	62	M12	27	51	M10
OT 300 P82	82	170	200	2100	126,6	126,6	36	62	M12	27	51	M10
OT 300 P90	90	150	180	2100	132,6	132,6	36	62	M12	27	51	M10



EXAMPLE OF ORDERING CODE

OT300 P 48 / 22 S / P 33 S3 / 2

Series

Pump

Front pump displacement
(see above table)

Second pump displacement
(see above table)

Rotation

S Anti-clockwise

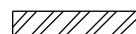
D Clockwise

1 = One inlet port
2 = Two inlet ports

SAE B flange

SAE B 13 Teeth -16/32 DP

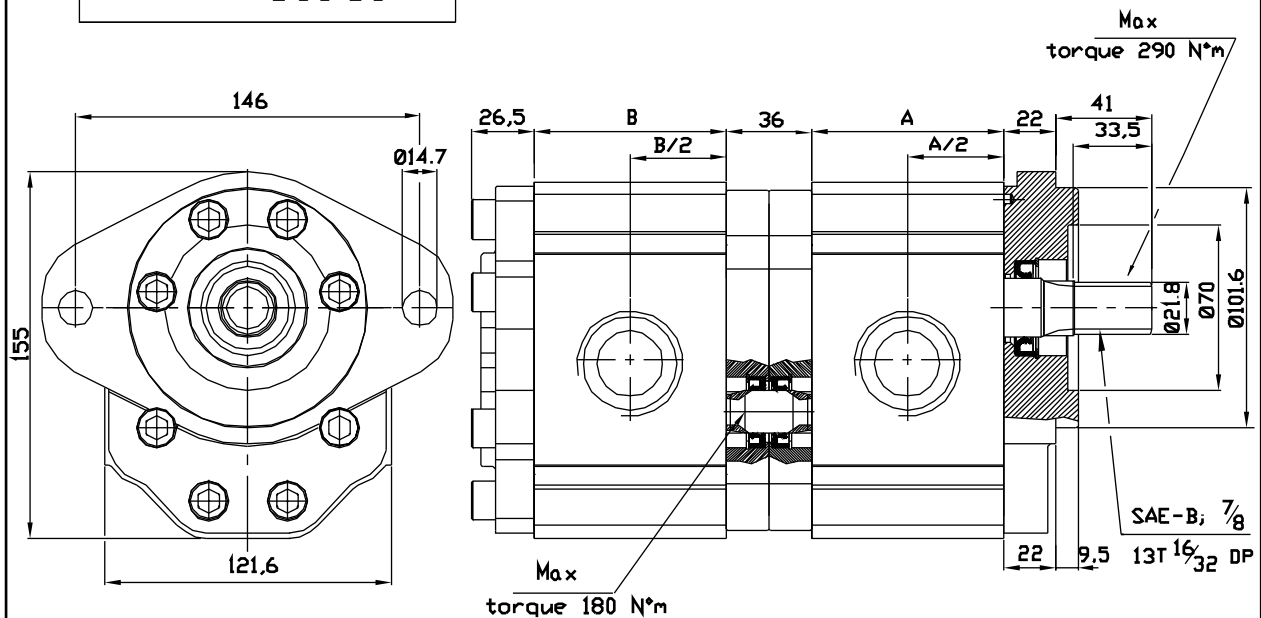
Body for European flanges



AVAILABLE FOR QUANTITIES

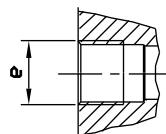
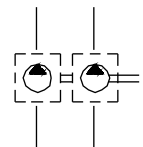
GROUP 3 PUMPS- TANDEM

VERSION: G33 S3



NOTE: The biggest displacement pump must be in the front position

Type	Displacement (cc/rev)	Max working pressure P1 (bar)	Peak pressure P3	Max speed (r.p.m)	Dimension L M		Inlet port e	Outlet port e
					(mm)			
OT 300 P22	22	260	300	3000	70,8	70,8	G 1	G 3/4
OT 300 P28	28	260	300	3000	75,4	75,4	G 1	G 3/4
OT 300 P32	32	260	300	3000	78,4	78,4	G 1	G 3/4
OT 300 P38	38	240	280	3000	83,0	83,0	G 1	G 3/4
OT 300 P42	42	240	280	3000	86,0	86,0	G 1	G 3/4
OT 300 P48	48	240	280	3000	100,6	100,6	G 1	G 3/4
OT 300 P53	53	220	250	3000	104,4	104,4	G 1	G 3/4
OT 300 P63	63	200	240	2100	112,0	112,0	G 1+1/4	G 3/4
OT 300 P73	73	180	210	2100	119,7	119,7	G 1+1/4	G 1
OT 300 P82	82	170	200	2100	126,6	126,6	G 1+1/4	G 1
OT 300 P90	90	150	180	2100	132,6	132,6	G 1+1/4	G 1



EXAMPLE OF ORDERING CODE

OT300 P 48 / 22 S / G 33 S3 / 2

Series

Pump

Front pump displacement
(see above table)

Second pump displacement
(see above table)

Rotation

S Anti-clockwise
D Clockwise

1 = One inlet port
2 = Two inlet ports

SAE B flange

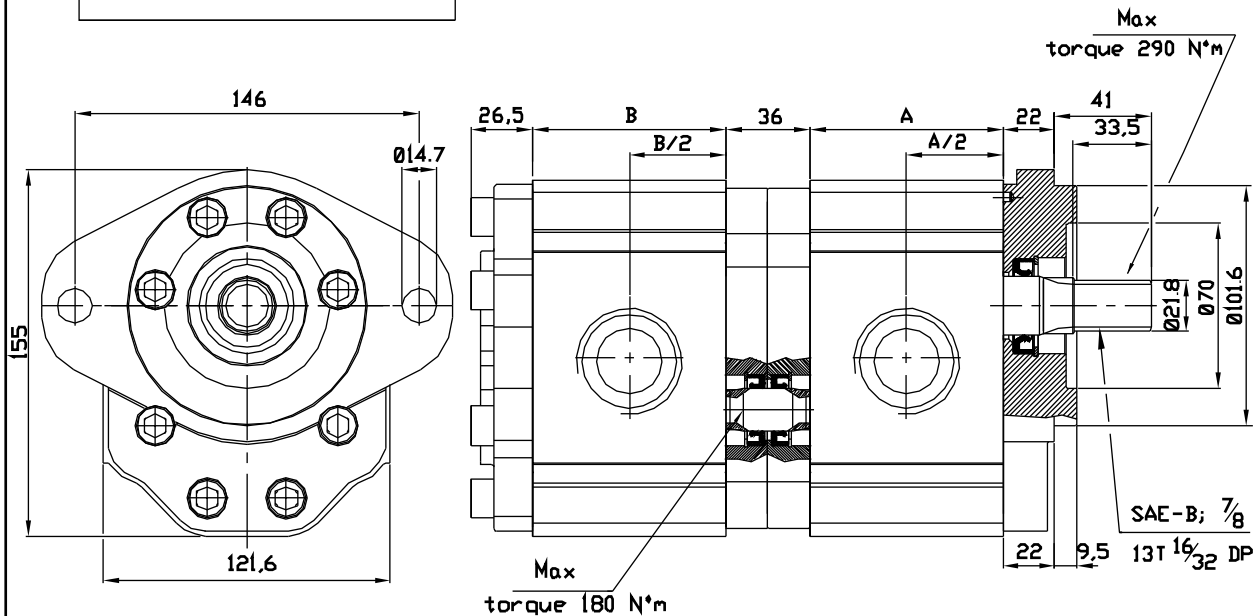
SAE B 13 Teeth -16/32 DP

Body with threaded ports (BSP)

AVAILABLE FOR QUANTITIES

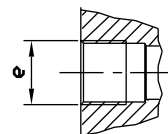
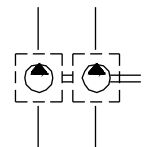
GROUP 3 PUMPS- TANDEM

VERSION: R33 S3



NOTE: The biggest displacement pump must be in the front position

Type	Displacement (cc/rev)	Max working pressure P1 (bar)	Peak pressure P3 (bar)	Max speed (r.p.m)	Dimension		Inlet port e	Outlet port e
					L	M		
					(mm)			
OT 300 P22	22	260	300	3000	70,8	70,8	1-5/16" UNF	1-1/16" UNF
OT 300 P28	28	260	300	3000	75,4	75,4	1-5/16" UNF	1-1/16" UNF
OT 300 P32	32	260	300	3000	78,4	78,4	1-5/16" UNF	1-1/16" UNF
OT 300 P38	38	240	280	3000	83,0	83,0	1-5/8" UNF	1-5/16" UNF
OT 300 P42	42	240	280	3000	86,0	86,0	1-5/8" UNF	1-5/16" UNF
OT 300 P48	48	240	280	3000	100,6	100,6	1-5/8" UNF	1-5/16" UNF
OT 300 P53	53	220	250	3000	104,4	104,4	1-5/8" UNF	1-5/16" UNF
OT 300 P63	63	200	240	2100	112,0	112,0	1-5/8" UNF	1-5/16" UNF
OT 300 P73	73	180	210	2100	119,7	119,7	1-7/8" UNF	1-5/8" UNF
OT 300 P82	82	170	200	2100	126,6	126,6	1-7/8" UNF	1-5/8" UNF
OT 300 P90	90	150	180	2100	132,6	132,6	1-7/8" UNF	1-5/8" UNF



EXAMPLE OF ORDERING CODE

OT300 P 48 / 22 S / R 33 S3 / 2

Series

Pump

Front pump displacement
(see above table)

Second pump displacement
(see above table)

Rotation

S Anti-clockwise
D Clockwise

1 = One inlet port
2 = Two inlet ports

SAE B flange

SAE B 13 Teeth -16/32 DP

Body with O-ring boss ports

AVAILABLE FOR QUANTITIES

TANDEM PUMPS- OT300+OT200

VERSION: P38 P3

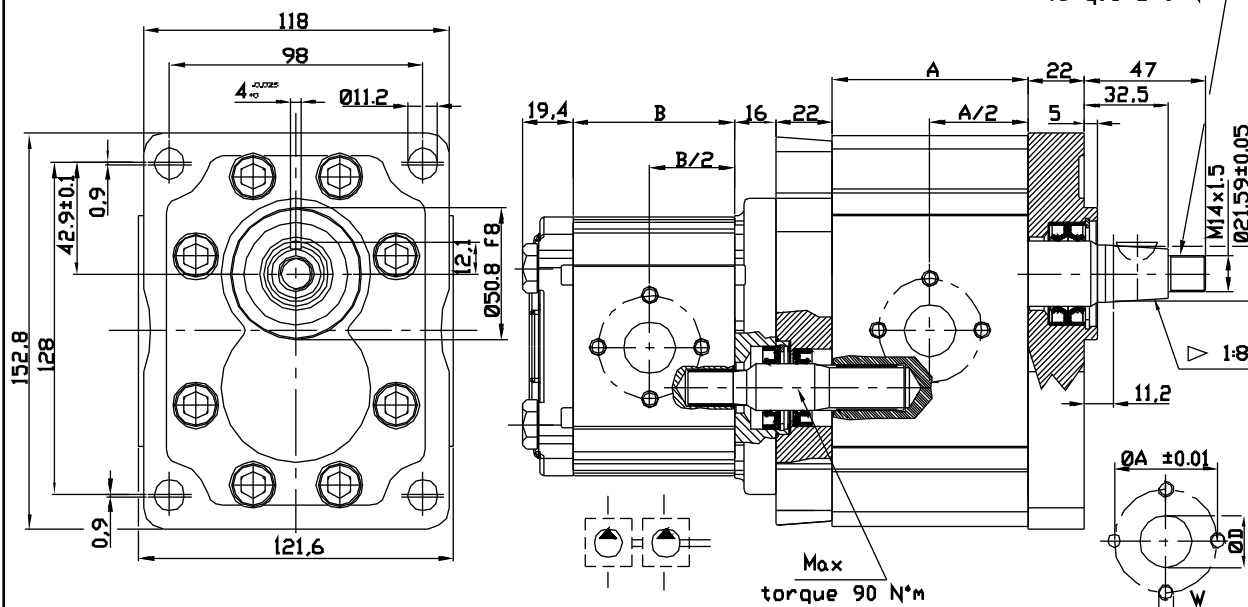


TABLE OT300

Type	Displacement (cc/rev)	Dim. A (mm)	Inlet port			Outlet port		
			ØD	ØA	W	ØD	ØA	W
OT 300 P22	22	70,8	27	51	M10	19	40	M8
OT 300 P28	28	75,4	27	51	M10	19	40	M8
OT 300 P32	32	78,4	27	51	M10	19	40	M8
OT 300 P38	38	83,0	27	51	M10	19	40	M8
OT 300 P42	42	86,0	27	51	M10	19	40	M8
OT 300 P48	48	100,6	27	51	M10	19	40	M8
OT 300 P53	53	104,4	27	51	M10	19	40	M8
OT 300 P63	63	112,0	27	51	M10	19	40	M8
OT 300 P73	73	119,7	36	62	M12	27	51	M10
OT 300 P82	82	126,6	36	62	M12	27	51	M10
OT 300 P90	90	132,6	36	62	M12	27	51	M10

TABLE OT200

Type	Displacement (cc/rev)	Dim. B (mm)	Inlet port			Outlet port		
			ØD	ØA	W	ØD	ØA	W
OT 200 P04	04,10	48,00	13	30	M6	13	30	M6
OT 200 P06	06,20	51,00	13	30	M6	13	30	M6
OT 200 P08	08,20	54,00	13	30	M6	13	30	M6
OT 200 P11	11,20	58,30	13	30	M6	13	30	M6
OT 200 P14	14,00	62,30	20	40	M8	13	30	M6
OT 200 P16	16,00	65,20	20	40	M8	13	30	M6
OT 200 P20	20,00	71,00	20	40	M8	13	30	M6
OT 200 P22	22,50	82,70	20	40	M8	13	30	M6
OT 200 P25	25,10	86,50	20	40	M8	13	30	M6
OT 200 P28	28,00	90,70	20	40	M8	13	30	M6
OT 200 P30	30,00	93,50	20	40	M8	13	30	M6

NOTE: Define relative working and peak pressure consulting relative single pump table.

EXAMPLE OF ORDERING CODE

OT300/200 P 38 / 16 S / P 38 P3 / 2

Series

Pump

Displacement front pump
(See table - OT300)

Displacement second pump
(See table - OT200)

Rotation

S Anti-clockwise
D Clockwise

Two inlet ports

European standard flange

Taper shaft (1:8)

Body for European flanges

AVAILABLE FOR QUANTITIES

TANDEM PUMPS- OT300+OT200

VERSION: G38 P3

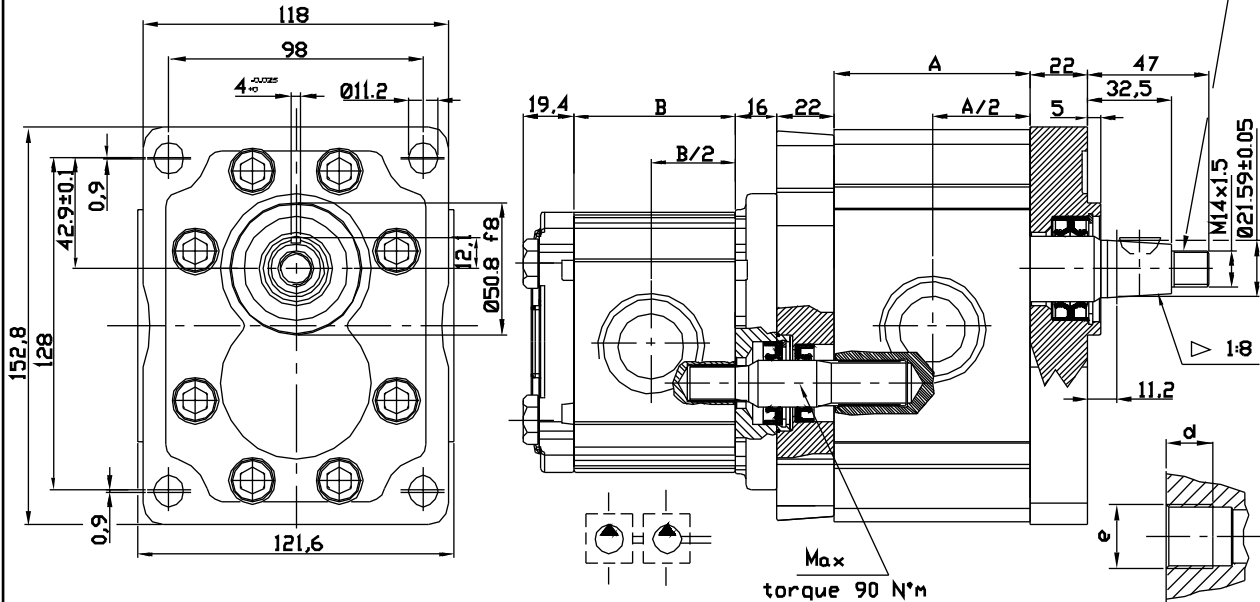


TABLE OT300

Type	Displacement (cc/rev)	Dim. A (mm)	Inlet port e	Outlet port e
OT 300 P22	22	70,8	G 1	G 3/4
OT 300 P28	28	75,4	G 1	G 3/4
OT 300 P32	32	78,4	G 1	G 3/4
OT 300 P38	38	83,0	G 1	G 3/4
OT 300 P42	42	86,0	G 1	G 3/4
OT 300 P48	48	100,6	G 1	G 3/4
OT 300 P53	53	104,4	G 1	G 3/4
OT 300 P63	63	112,0	G 1+1/4	G 3/4
OT 300 P73	73	119,7	G 1+1/4	G 1
OT 300 P82	82	126,6	G 1+1/4	G 1
OT 300 P90	90	132,6	G 1+1/4	G 1

TABLE OT200

Type	Displacement (cc/rev)	Dim. B (mm)	Inlet port e	d	Outlet port e	d
OT 200 P04	04,10	48,00	G1/2	14	G1/2	14
OT 200 P06	06,20	51,00	G1/2	14	G1/2	14
OT 200 P08	08,20	54,00	G1/2	14	G1/2	14
OT 200 P11	11,20	58,30	G1/2	14	G1/2	14
OT 200 P14	14,00	62,30	G3/4	16	G1/2	14
OT 200 P16	16,00	65,20	G3/4	16	G1/2	14
OT 200 P20	20,00	71,00	G3/4	16	G1/2	14
OT 200 P22	22,50	82,70	G3/4	16	G1/2	14
OT 200 P25	25,10	86,50	G3/4	16	G1/2	14
OT 200 P28	28,00	90,70	G3/4	16	G1/2	14
OT 200 P30	30,00	93,50	G3/4	16	G1/2	14

NOTE: Define relative working and peak pressure consulting relative single pump table.

EXAMPLE OF ORDERING CODE

OT300/200 P 38 / 16 S / G 38 P3 / 2

Series

Pump

Displacement front pump
(See table - OT300)

Displacement second pump
(See table - OT200)

Rotation

S Anti-clockwise

D Clockwise

Two inlet ports

European standard flange

Taper shaft (1:8)

Body with threaded ports (BSP)

AVAILABLE FOR QUANTITIES

TANDEM PUMPS- OT300+OT200

VERSION: G33 S3

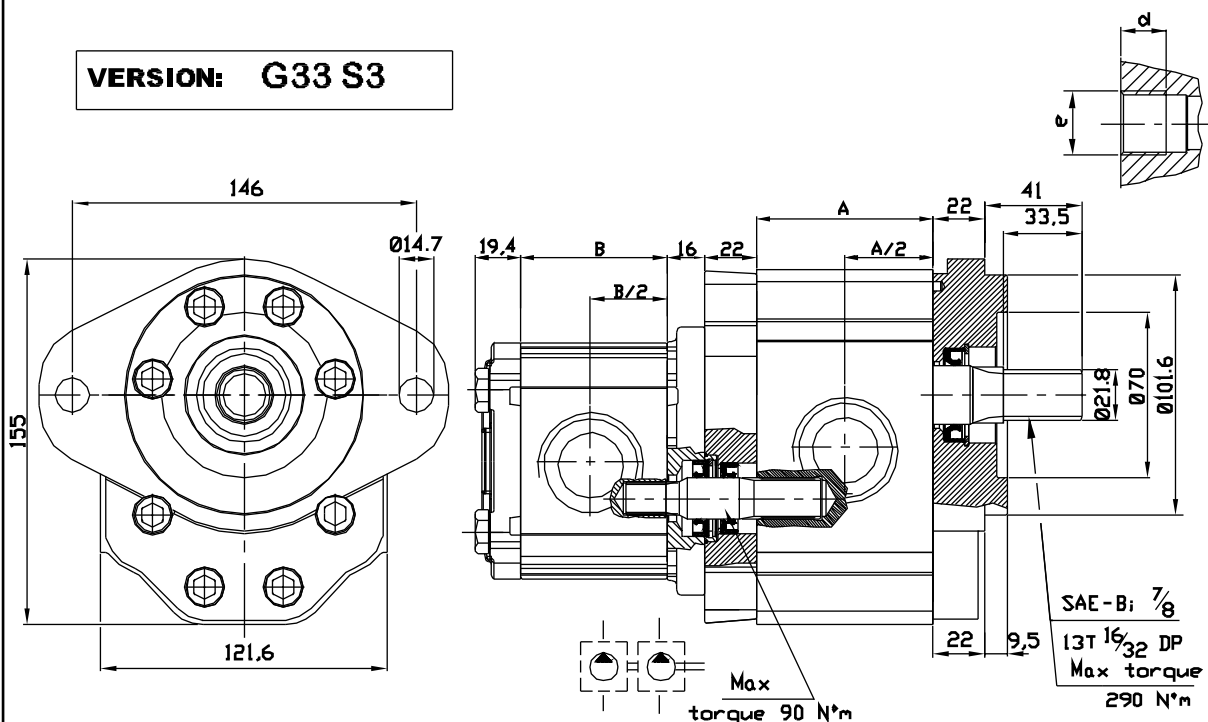


TABLE OT300

Type	Displacement (cc/rev)	Dim. A (mm)	Inlet port	Outlet port
			e	e
OT 300 P22	22	70,8	G 1	G 3/4
OT 300 P28	28	75,4	G 1	G 3/4
OT 300 P32	32	78,4	G 1	G 3/4
OT 300 P38	38	83,0	G 1	G 3/4
OT 300 P42	42	86,0	G 1	G 3/4
OT 300 P48	48	100,6	G 1	G 3/4
OT 300 P53	53	104,4	G 1	G 3/4
OT 300 P63	63	112,0	G 1+1/4	G 3/4
OT 300 P73	73	119,7	G 1+1/4	G 1
OT 300 P82	82	126,6	G 1+1/4	G 1
OT 300 P90	90	132,6	G 1+1/4	G 1

TABLE OT200

Type	Displacement (cc/rev)	Dim. B (mm)	Inlet port		Outlet port	
			e	d	e	d
OT 200 P04	04,10	48,00	G1/2	14	G1/2	14
OT 200 P06	06,20	51,00	G1/2	14	G1/2	14
OT 200 P08	08,20	54,00	G1/2	14	G1/2	14
OT 200 P11	11,20	58,30	G1/2	14	G1/2	14
OT 200 P14	14,00	62,30	G3/4	16	G1/2	14
OT 200 P16	16,00	65,20	G3/4	16	G1/2	14
OT 200 P20	20,00	71,00	G3/4	16	G1/2	14
OT 200 P22	22,50	82,70	G3/4	16	G1/2	14
OT 200 P25	25,10	86,50	G3/4	16	G1/2	14
OT 200 P28	28,00	90,70	G3/4	16	G1/2	14
OT 200 P30	30,00	93,50	G3/4	16	G1/2	14

NOTE: Define relative working and peak pressure consulting relative single pump table.

EXAMPLE OF ORDERING CODE

OT300/200 P 38 / 16 S / G 33 S3 / 2

Series	OT300/200	Pump	P	Displacement front pump (See table - OT300)	38	Displacement second pump (See table - OT200)	16	Rotation	S	SAE B flange	SAE B 13 Teeth - 16/32 DP	Body with threaded ports (BSP)
								Anti-clockwise				
								Clockwise				

AVAILABLE FOR QUANTITIES

TANDEM PUMPS- OT300+OT200

VERSION: R33 S3

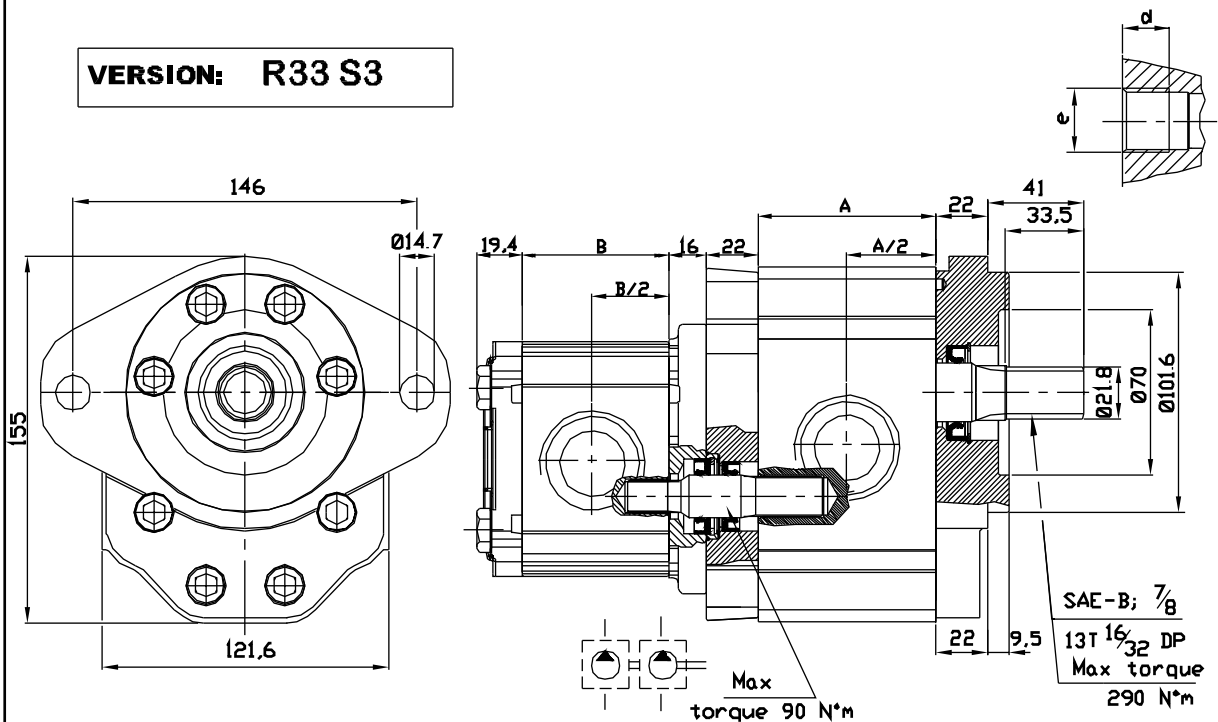


TABLE OT300

Type	Displacement (cc/rev)	Dim. A (mm)	Inlet port e	Outlet port e
OT 300 P22	22	70,8	1-5/16" UNF	1-1/16" UNF
OT 300 P28	28	75,4	1-5/16" UNF	1-1/16" UNF
OT 300 P32	32	78,4	1-5/16" UNF	1-1/16" UNF
OT 300 P38	38	83,0	1-5/8" UNF	1-5/16" UNF
OT 300 P42	42	86,0	1-5/8" UNF	1-5/16" UNF
OT 300 P48	48	100,6	1-5/8" UNF	1-5/16" UNF
OT 300 P53	53	104,4	1-5/8" UNF	1-5/16" UNF
OT 300 P63	63	112,0	1-5/8" UNF	1-5/16" UNF
OT 300 P73	73	119,7	1-7/8" UNF	1-5/8" UNF
OT 300 P82	82	126,6	1-7/8" UNF	1-5/8" UNF
OT 300 P90	90	132,6	1-7/8" UNF	1-5/8" UNF

TABLE OT200

Type	Displacement (cc/rev)	Dim. B (mm)	Inlet port e	Outlet port e
OT 200 P04	04,10	48,00	7/8-14UNF	7/8-14UNF
OT 200 P06	06,20	51,00	7/8-14UNF	7/8-14UNF
OT 200 P08	08,20	54,00	7/8-14UNF	7/8-14UNF
OT 200 P11	11,20	58,30	7/8-14UNF	7/8-14UNF
OT 200 P14	14,00	62,30	1-1/16" UNF	7/8-14UNF
OT 200 P16	16,00	65,20	1-1/16" UNF	7/8-14UNF
OT 200 P20	20,00	71,00	1-1/16" UNF	7/8-14UNF
OT 200 P22	22,50	82,70	1-1/16" UNF	7/8-14UNF
OT 200 P25	25,10	86,50	1-1/16" UNF	7/8-14UNF
OT 200 P28	28,00	90,70	1-1/16" UNF	7/8-14UNF
OT 200 P30	30,00	93,50	1-1/16" UNF	7/8-14UNF

NOTE: Define relative working and peak pressure consulting relative single pump table.

EXAMPLE OF ORDERING CODE

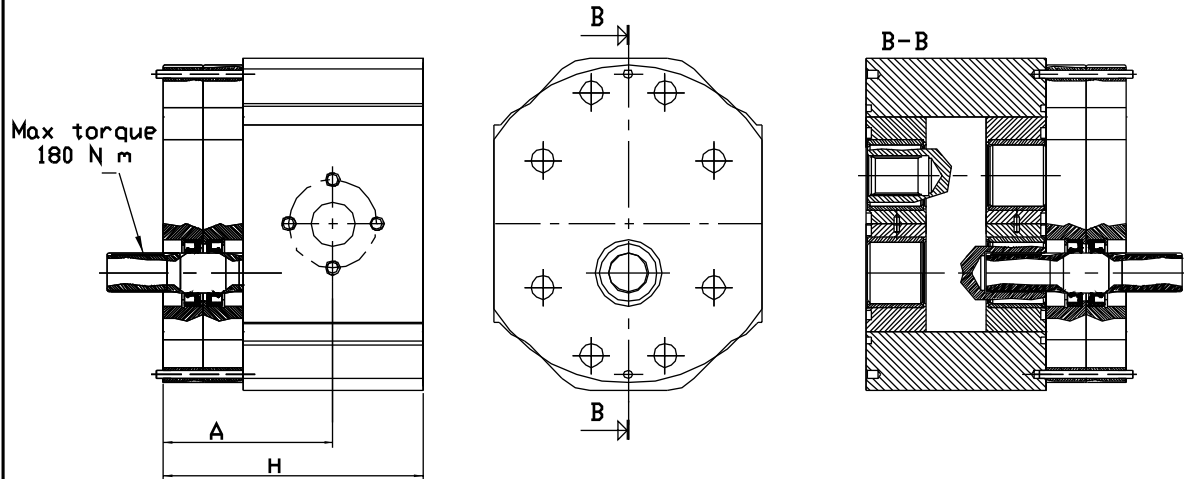
OT300/200 P 38 / 16 S / R 33 S3 / 2

Series	OT300/200	Pump	P	Displacement front pump (See table - OT300)	38	Displacement second pump (See table - OT200)	16	Rotation	S / R	SAE B flange	33	SAE B 13 Teeth -16/32 DP	S3	Body with O-ring boss ports	/ 2
								Anti-clockwise							
								Clockwise							

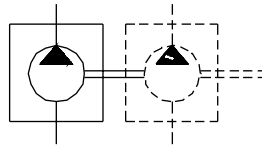
AVAILABLE FOR QUANTITIES

INTERMEDIATE GROUP 3 PUMPS FOR TANDEM UNITS

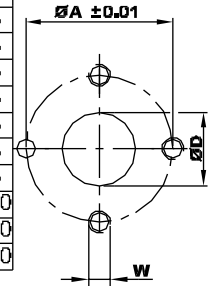
VERSION: P X X INTERMEDIATE



NOTE : Screw tightening torque 48 N·m



Type	Displacement	Max working pressure P1 (bar)	Peak pressure P3 (bar)	Max speed (r.p.m)	Dimension		Inlet port			Outlet port		
					A	H						
	(cc/rev)				(mm)	e	e					
OT 300 P22	22	260	300	3000	71.4	106.8	27	51	M10	19	40	M8
OT 300 P28	28	260	300	3000	73.7	111.4	27	51	M10	19	40	M8
OT 300 P32	32	260	300	3000	75.2	114.4	27	51	M10	19	40	M8
OT 300 P38	38	240	280	3000	77.5	119.0	27	51	M10	19	40	M8
OT 300 P42	42	240	280	3000	79.0	122.0	27	51	M10	19	40	M8
OT 300 P48	48	240	280	3000	86.3	136.6	27	51	M10	19	40	M8
OT 300 P53	53	220	250	3000	88.2	140.4	27	51	M10	19	40	M8
OT 300 P63	63	200	240	2100	92.0	148.0	27	51	M10	19	40	M8
OT 300 P73	73	180	210	2100	95.9	155.7	36	62	M12	27	51	M10
OT 300 P82	82	170	200	2100	99.3	162.6	36	62	M12	27	51	M10
OT 300 P90	90	150	180	2100	102.3	168.6	36	62	M12	27	51	M10



EXAMPLE OF ORDERING CODE

OT300 P 22 S / P X X INTERMEDIATE

Series

Pump

Displacement (see above table)

Rotation

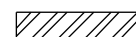
S

Anti-clockwise

D

Clockwise

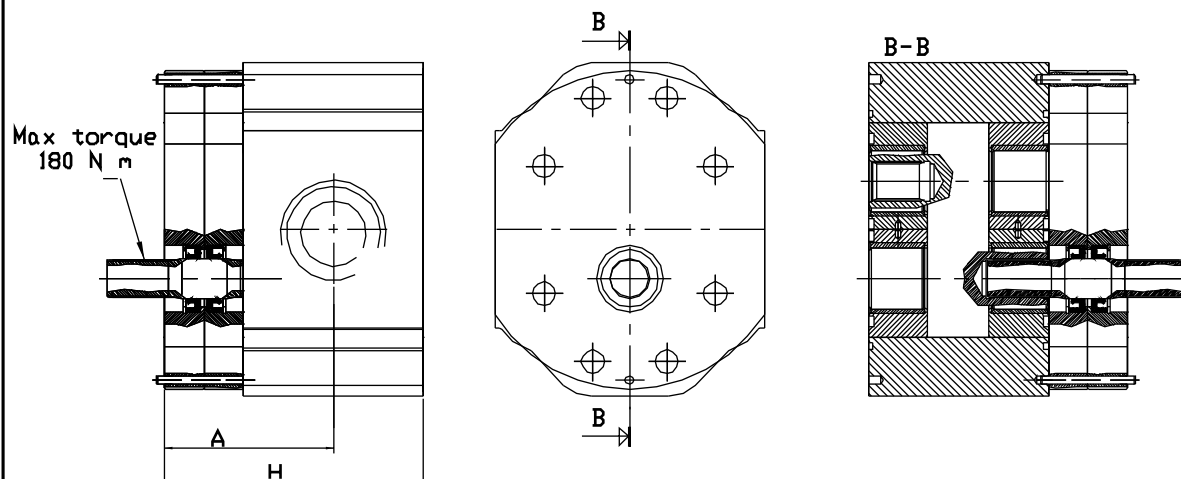
Body for flanges



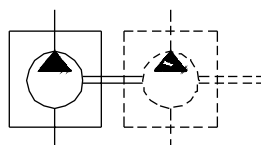
AVAILABLE FOR QUANTITIES

INTERMEDIATE GROUP 3 PUMPS FOR TANDEM UNITS

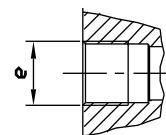
VERSION: P X X INTERMEDIATE



NOTE : Screw tightening torque 48-N m



Type	Displacement (cc/rev)	Max working pressure P1 (bar)	Peak pressure P3	Max speed (r.p.m)	Dimension L M		Inlet port e	Outlet port e
					(mm)			
OT 300 P22	22	260	300	3000	71.4	106.8	G 1	G 3/4
OT 300 P28	28	260	300	3000	73.7	111.4	G 1	G 3/4
OT 300 P32	32	260	300	3000	75.2	114.4	G 1	G 3/4
OT 300 P38	38	240	280	3000	77.5	119.0	G 1	G 3/4
OT 300 P42	42	240	280	3000	79.0	122.0	G 1	G 3/4
OT 300 P48	48	240	280	3000	86.3	136.6	G 1	G 3/4
OT 300 P53	53	220	250	3000	88.2	140.4	G 1	G 3/4
OT 300 P63	63	200	240	2100	92.0	148.0	G 1+1/4	G 3/4
OT 300 P73	73	180	210	2100	95.9	155.7	G 1+1/4	G 1
OT 300 P82	82	170	200	2100	99.3	162.6	G 1+1/4	G 1
OT 300 P90	90	150	180	2100	102.3	168.6	G 1+1/4	G 1



EXAMPLE OF ORDERING CODE

OT300 P 22 S / P X X INTERMEDIATE

Series

Pump

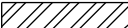
Displacement (see above table)

Rotation

S Anti-clockwise

D Clockwise

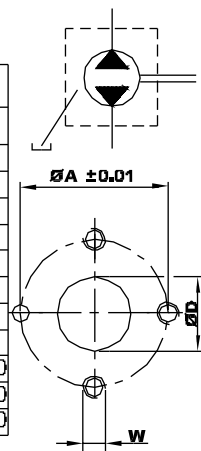
Body with threaded ports (BSP)

 AVAILABLE FOR QUANTITIES

EUROPEAN STANDARD

[illegible]

Type	Displacement (cc/rev)	Max working pressure P1 (bar)	Peak pressure P3 (bar)	Max speed (r.p.m)	Dimension		Inlet port			Outlet port		
					L	M	ØD	ØA	W	ØD	ØA	W
					(mm)							
OT 300 P22	22	220	250	3000	57,4	119,3	27	51	M10	19	40	M8
OT 300 P28	28	220	250	3000	59,7	123,7	27	51	M10	19	40	M8
OT 300 P32	32	220	250	3000	61,2	126,9	27	51	M10	19	40	M8
OT 300 P38	38	200	230	3000	63,5	131,5	27	51	M10	19	40	M8
OT 300 P42	42	200	230	3000	65,0	134,5	27	51	M10	19	40	M8
OT 300 P48	48	200	230	3000	72,3	149,1	27	51	M10	19	40	M8
OT 300 P53	53	180	200	3000	74,2	152,9	27	51	M10	19	40	M8
OT 300 P63	63	180	200	2100	78,0	160,5	27	51	M10	19	40	M8
OT 300 P73	73	160	180	2100	81,9	168,2	36	62	M12	27	51	M10
OT 300 P82	82	160	180	2100	85,3	175,1	36	62	M12	27	51	M10
OT 300 P90	90	130	150	2100	88,3	181,1	36	62	M12	27	51	M10



OT300	P	28	R / P	38	P3
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The diagram illustrates the exploded view of a pump assembly. The components are organized into two main vertical columns. The left column contains the following components from top to bottom: a box labeled 'Series', a box labeled 'Pump', a box labeled 'Displacement (see above table)', and a box labeled 'Rotation' which contains a sub-table with 'R' and 'Reversible'. The right column contains three components: 'European standard flange', 'Taper shaft (1:8)', and 'Body for flanges'. Lines connect the components to show their assembly relationships: 'Series', 'Pump', and 'Displacement' are connected to a common vertical line. 'Rotation' is connected to a common vertical line. 'European standard flange', 'Taper shaft (1:8)', and 'Body for flanges' are connected to a common vertical line. The lines from the left and right columns converge towards the center, indicating the assembly path.

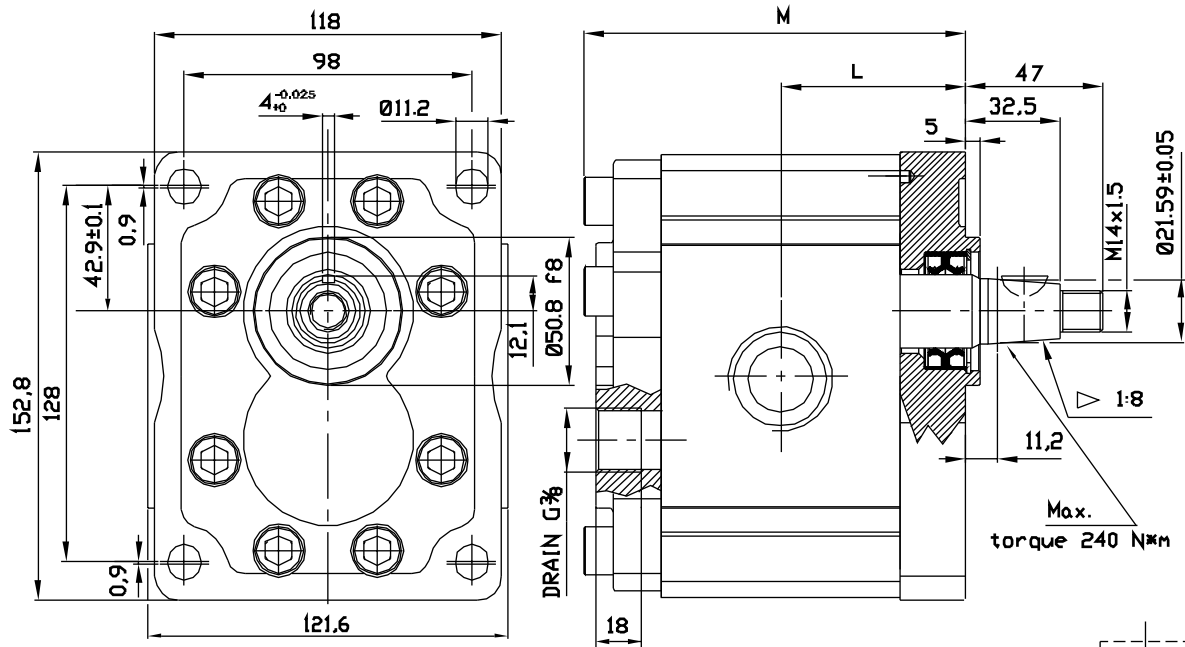
Rotation	
R	Reversible

 AVAILABLE FOR QUANTITIES

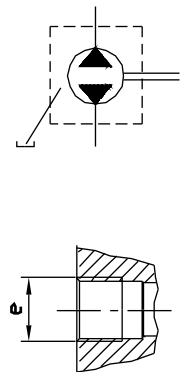
GROUP3 REVERSIBLE PUMPS-

EUROPEAN STANDARD

VERSION: G38 P3



OT 300 P22	22	220	250	3000	57,4	119,3	G 1	G 1
OT 300 P28	28	220	250	3000	59,7	123,7	G 1	G 1
OT 300 P32	32	220	250	3000	61,2	126,9	G 1	G 1
OT 300 P38	38	200	230	3000	63,5	131,5	G 1	G 1
OT 300 P42	42	200	230	3000	65,0	134,5	G 1	G 1
OT 300 P48	48	200	230	3000	72,3	149,1	G 1	G 1
OT 300 P53	53	180	200	3000	74,2	152,9	G 1	G 1
OT 300 P63	63	180	200	2100	78,0	160,5	G 1+1/4	G 1+1/4
OT 300 P73	73	160	180	2100	81,9	168,2	G 1+1/4	G 1+1/4
OT 300 P82	82	160	180	2100	85,3	175,1	G 1+1/4	G 1+1/4
OT 300 P90	90	130	150	2100	88,3	181,1	G 1+1/4	G 1+1/4



EXAMPLE OF ORDERING CODE

OT300 P 28 R / G 38 P3

Series

Pump

Displacement (see above table)

Rotation

R Reversible

European standard flange

Taper shaft (1:8)

Body with threaded ports (BSF)

AVAILABLE FOR QUANTITIES

GROUP3 MOTORS

OT300 SINGLE ROTATION MOTORS GENERAL DATA

MOTOR TYPE	DISPLACEMENT	MAX. PRESSURE			MAX. SPEED	MIN. SPEED
		P1	P2	P3		
	cc ³ / rev	bar			rev ⁻¹	rev ⁻¹
OT300 M22	22	250	280	300	4000	600
OT300 M28	28					
OT300 M32	32					
OT300 M38	38	240	260	280	3500	500
OT300 M42	42					
OT300 M48	48					
OT300 M53	53	190	210	250	3000	
OT300 M63	63	190	210	240	2500	
OT300 M73	73	160	180	210		
OT300 M82	82	150	170	200	2000	
OT300 M90	90	130	150	180		

P1= Max. continuous pressure

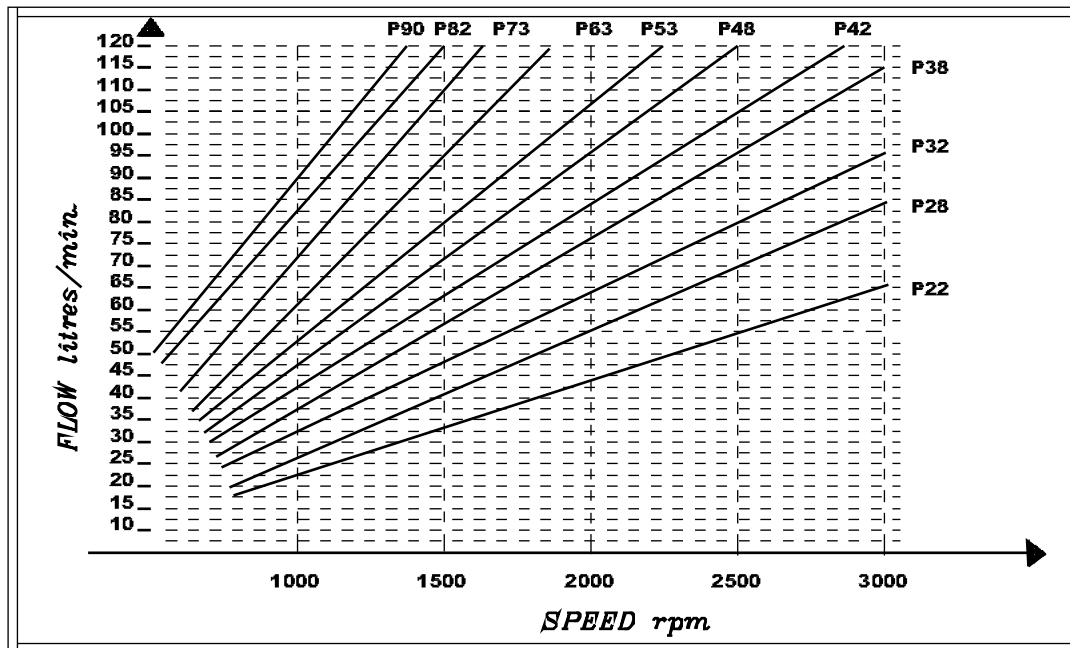
P2= Max. intermittent pressure

P3= Max. peak pressure

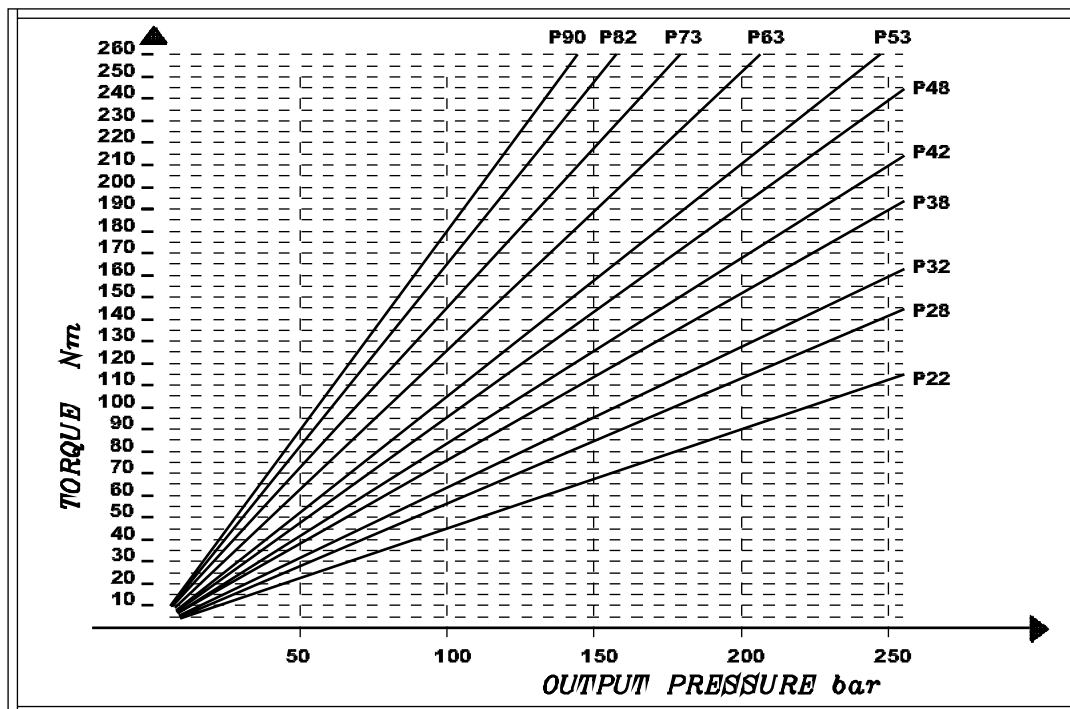
**FOR DIMENSION PLEASE CHECK
RELATIVE SINGLE PUMP TABLES**

GROUP3 MOTORS

FLOW CHARACTERISTICS CURVES



ABSORBED TORQUE



NOTE

The flow characteristics curves have been made at P1 pressure.



GROUP3 MOTORS

MOTOR CALCULATION

V	Displacement	CC / REV
Q	Flow	l/min
P	Power	kW
C	Torque	N · m
N	Speed	-15°C / +80°C
ΔP	Pressure	bar
n_v	Volumetric efficiency	0.95
n_m	Mechanical efficiency	0.85
n_t	Total efficiency	0.81

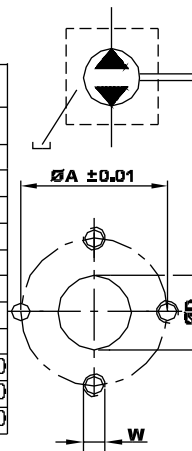
$$Q = \frac{V \cdot N}{n_v} \cdot 10^{-3} \quad l/min$$

$$C = \frac{\Delta P \cdot V \cdot n_m}{62.8} \quad N \cdot m$$

$$P = \frac{\Delta P \cdot V \cdot N \cdot n_t}{612000} \quad kW$$

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VERSION: P38 P3



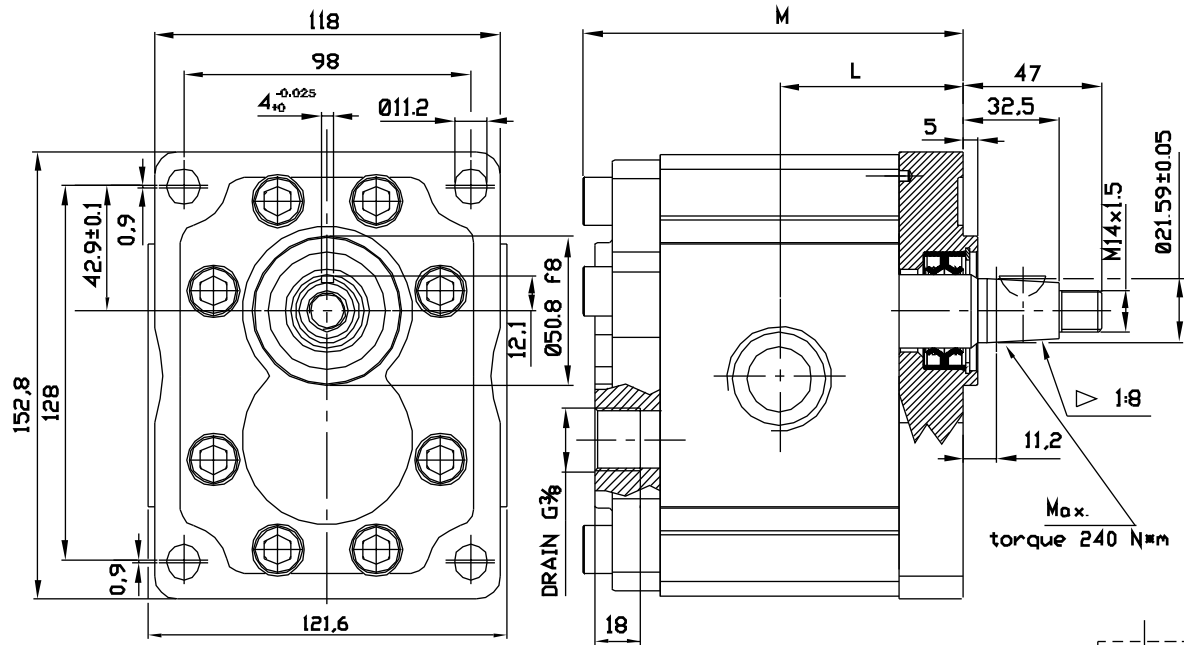
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OT300	M	28	R / P	38	P3
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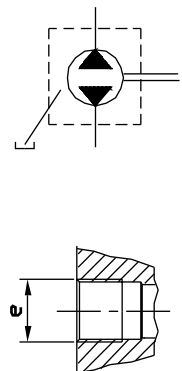
 AVAILABLE FOR QUANTITIES

GROUP3 REVERSIBLE MOTORS- EUROPEAN STANDARD

VERSION: G38 P3



OT 300 P22	22	220	250	3000	57,4	119,3	G 1	G 1
OT 300 P28	28	220	250	3000	59,7	123,7	G 1	G 1
OT 300 P32	32	220	250	3000	61,2	126,9	G 1	G 1
OT 300 P38	38	200	230	3000	63,5	131,5	G 1	G 1
OT 300 P42	42	200	230	3000	65,0	134,5	G 1	G 1
OT 300 P48	48	200	230	3000	72,3	149,1	G 1	G 1
OT 300 P53	53	180	200	3000	74,2	152,9	G 1	G 1
OT 300 P63	63	180	200	2100	78,0	160,5	G 1+1/4	G 1+1/4
OT 300 P73	73	160	180	2100	81,9	168,2	G 1+1/4	G 1+1/4
OT 300 P82	82	160	180	2100	85,3	175,1	G 1+1/4	G 1+1/4
OT 300 P90	90	130	150	2100	88,3	181,1	G 1+1/4	G 1+1/4



EXAMPLE OF ORDERING CODE

OT300 M 28 R / G 38 P3

Series	OT300	Motor	M	Displacement (see above table)	28	Rotation	R / G	Body with threaded ports (BSP)	38	European standard flange	P3
						R	Reversible				

AVAILABLE FOR QUANTITIES