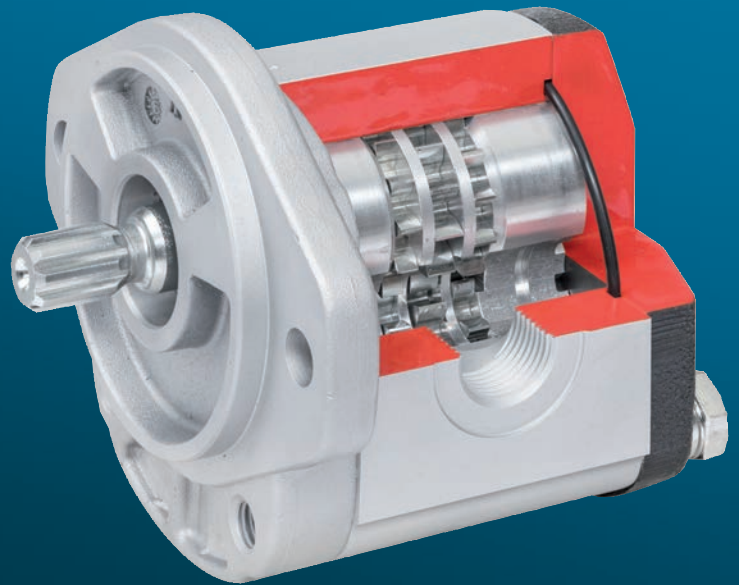
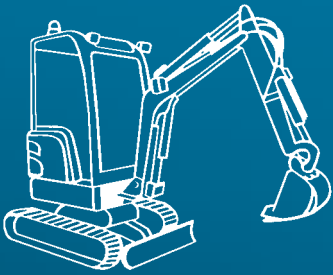


jühstroj

AERO TECHNOLOGY & HYDRAULICS



Displacement from 9 to 27 ccm
Pressure up to 250 bar
Speed from 500 to 3200 RPM

CQ3 
Continuous & Quiet

GEAR PUMPS

T3T

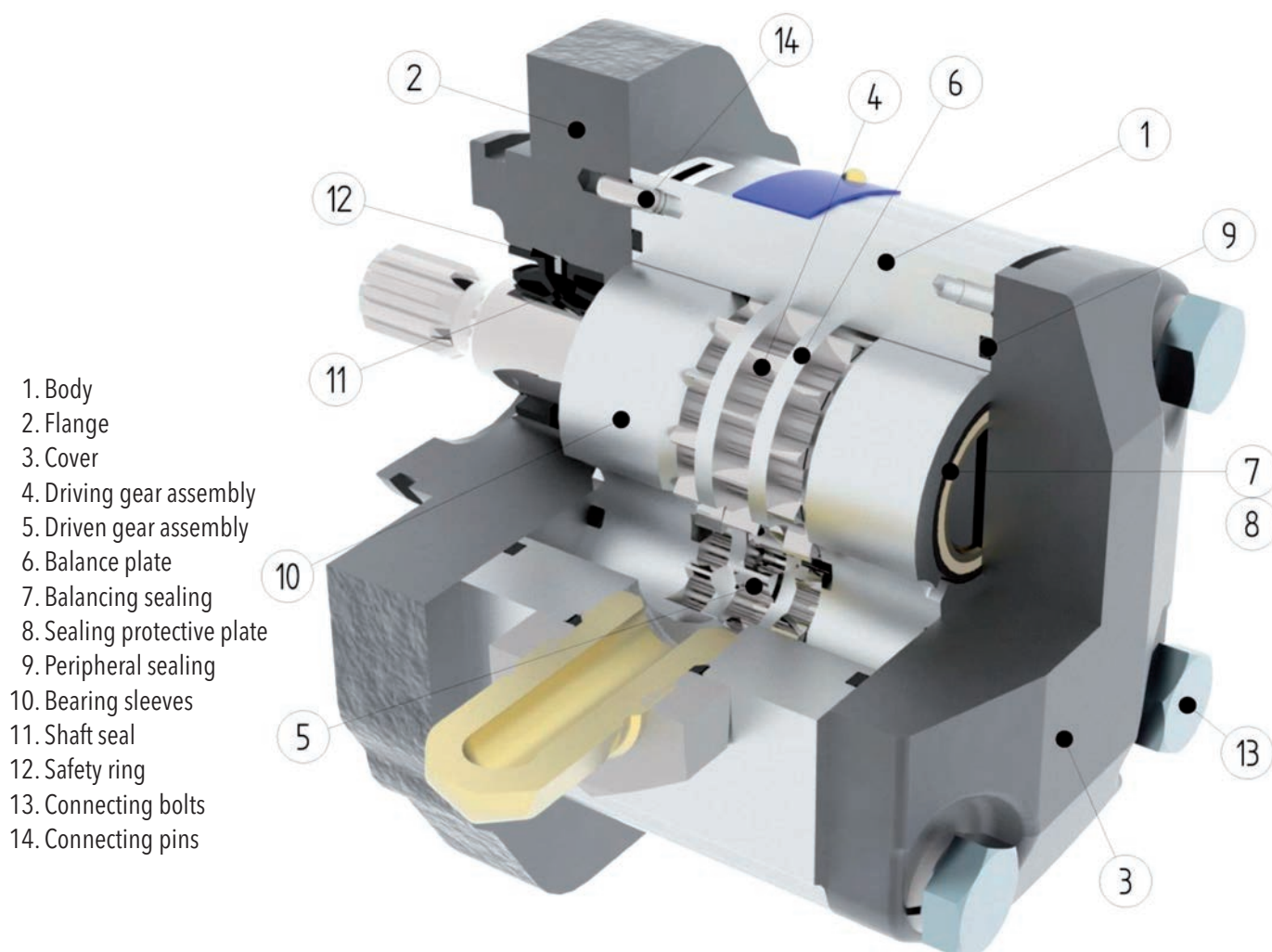
TABLE OF CONTENTS

DESCRIPTION.....	2
BASIC PARTS OF PUMP	2
PARAMETER TABLE	3
DIRECTION OF ROTATION	3
ACOUSTIC PRESSURE AND PRESSURE PULSATION.....	4
FORMULAS USED FOR CALCULATION.....	5
PUMP EFFICIENCIES	5
WORKING LIQUID.....	6
PRESSURE LOAD.....	6
T3T FLOW RATE AND POWER CURVES	7
ORDER KEY – SINGLE VERSION	10
ORDER KEY – MULTIPLE VERSION.....	11
COMBINATIONS OF FLANGES AND SHAFTS	12
FLANGES DESIGN.....	13
DRIVE SHAFTS.....	14
LIQUID INLET AND OUTLET CONNECTION.....	17
CATALOGUE SHETS OF T3T SERIES BASIC DESIGNS.....	18
NOTES	23

DESCRIPTION

- Pumps of T3T series with differential gearing (triple design) are applicable for its very low pulsation and lower noise in modern hydraulic systems, handling technologies and mobile hydraulics.
- Basic execution is composed from a few parts. The body of pump are produced from heavy duty aluminium alloy. Cover and Flange are from iron grey or aluminium alloy. All flanges as well as inlets and outlets (location on side – in body or axial – in cover) comply with all world – recognised standards. Gear wheels with special differential gearing are a special designed to achieve a low pulsation and also very good subjective noise without peaks at frequency spectrum, are made of ultrahigh-strength steel. Wheel journals with high quality surface are stored in bearings, which are constantly lubricated and cooled with flow working liquid.
- Available is also multiple-version pumps with inlets for each section or one common inlet.
- Upon requirement on very low pulsation is appropriate a special quarto design – designation T3Q.

BASIC PARTS OF PUMP

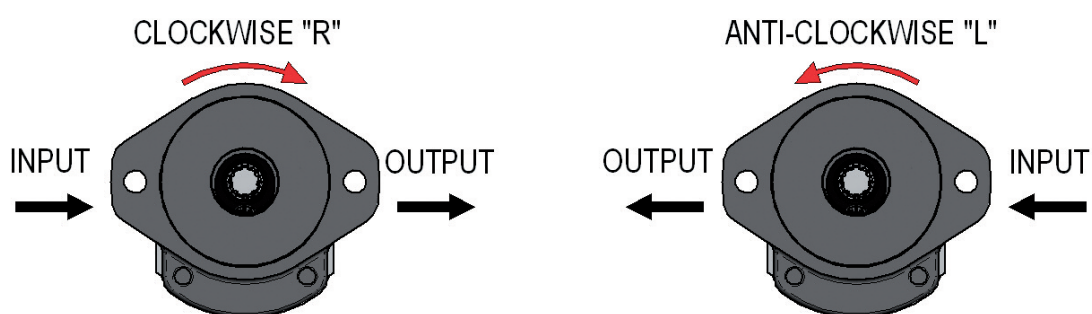


PARAMETER TABLE

Nominal Size Parameters		Sym.	Unit.	T3T 9	T3T 12	T3T 15	T3T 16	T3T 18	T3T 21	T3T 24	T3T 27
Actual displacement		V_g	[cm ³]	9.03	12.05	15.08	16.08	18.10	21.10	24.05	27.13
Rotation speed	nominal	n_n	[min ⁻¹]	1500	1500	1500	1500	1500	1500	1500	1500
	minimum	n_{min}	[min ⁻¹]	500	500	500	500	500	500	500	500
	maximum	n_{max}	[min ⁻¹]	2800	3200	3200	3200	2800	2200	2000	1900
Pressure at inlet	minimum	p_{1min}	[bar]	-0.30	-0.30	-0.30	-0.30	-0.30	-0.30	-0.30	-0.30
	maximum	p_{1max}	[bar]	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Pressure at outlet	max. continuous	p_{2n}	[bar]	240	240	240	240	240	220	200	160
	maximum	p_{2max}	[bar]	250	250	250	250	250	225	210	170
	peak	p_3	[bar]	260	260	260	260	260	230	220	180
Nominal flow rate (min.) at n_n and p_{2n}		Q_n	[dm ³ .min ⁻¹]	12.33	16.63	20.81	22.19	24.98	29.12	32.83	37.03
Maximum flow rate at n_{max} a p_{2max}		Q_{max}	[dm ³ .min ⁻¹]	23.01	35.48	44.40	47.34	46.63	42.71	43.77	46.91
Nominal input power (max.) at n_n and p_{2n}		P_n	[kW]	7.08	9.45	11.83	12.61	14.20	15.17	15.72	14.19
Maximum input power at n_{max} a p_{2max}		P_{max}	[kW]	13.77	21.00	26.28	28.03	27.60	22.75	22.01	19.09
Weight		m	[kg]	3.05	3.25	3.40	3.45	3.55	3.70	3.85	4.00

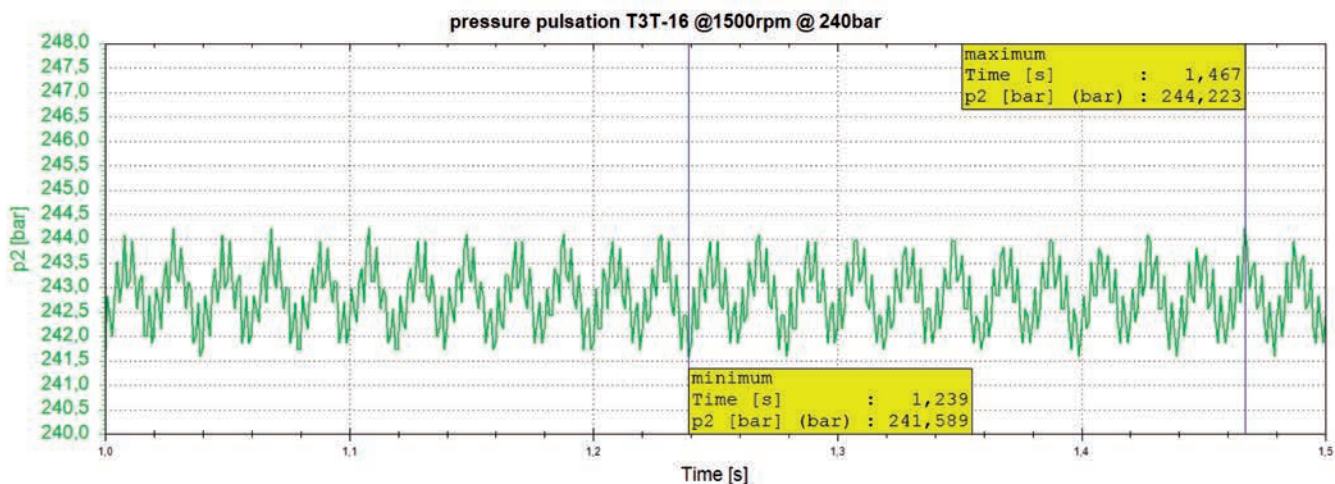
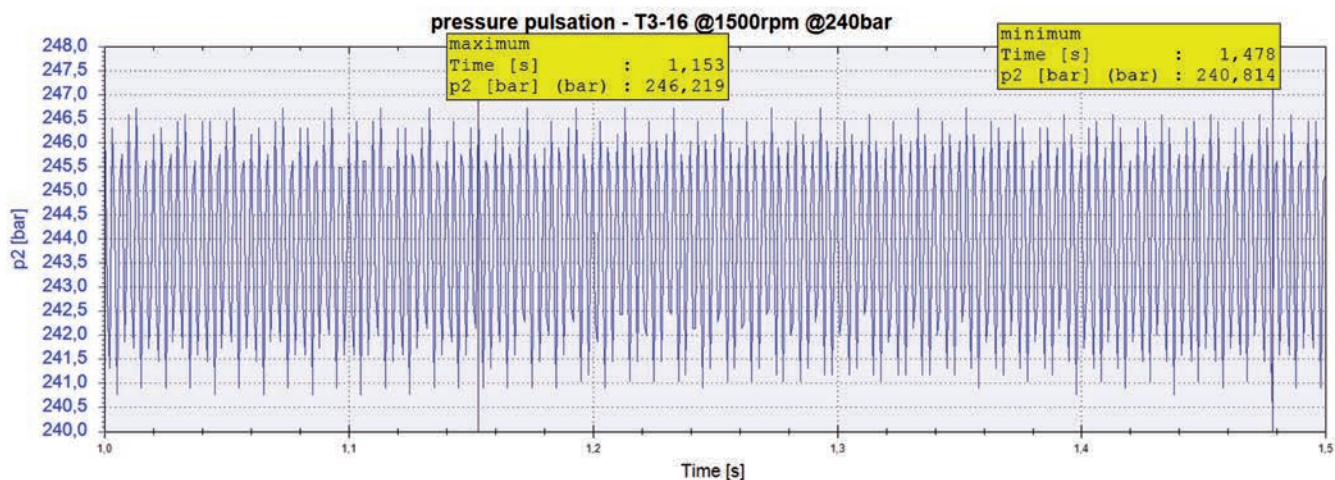
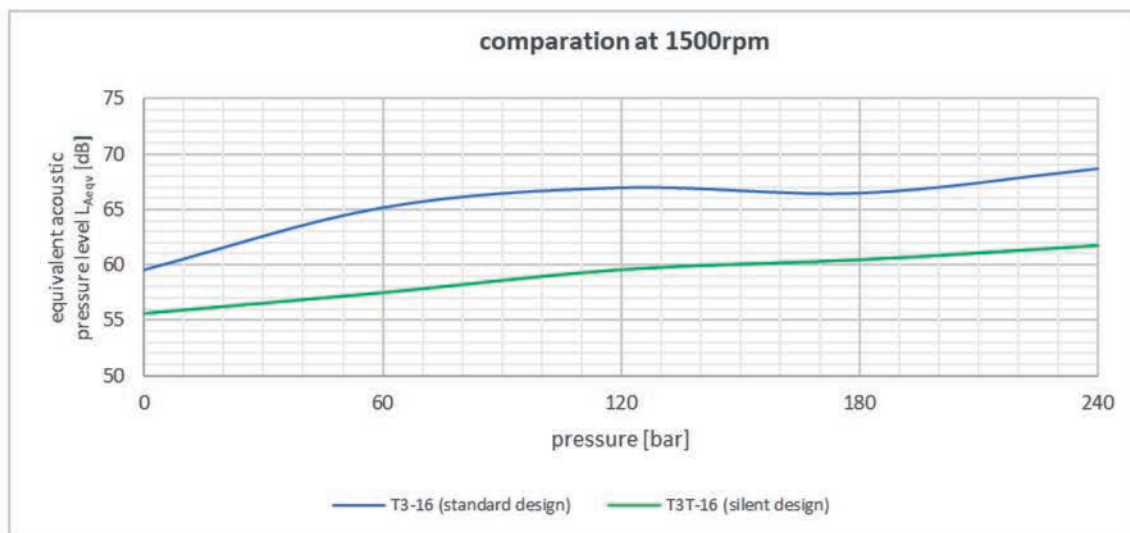
DIRECTION OF ROTATION

- Determine direction of rotation by looking at the drive shaft. The pump can only be used in the specified direction of rotation.



ACOUSTIC PRESSURE AND PRESSURE PULSATION

- Comparison of acoustic pressure and pressure pulsation between T3-16 (standard design) and T3T (silent design).



FORMULAS USED FOR CALCULATION

Flow rate
 Q

$$Q = \frac{V_g \cdot n}{1000} \cdot \eta_v \quad [\text{dm}^3 \cdot \text{min}^{-1}]$$

V_g [cm³] pump displacement
 n [min⁻¹] rotation speed
 η_v [-] volumetric efficiency

Displacement
 V_g

$$V_g = \frac{Q \cdot 1000}{n \cdot \eta_v} \quad [\text{cm}^3]$$

Torque
 M_k

$$M_k = \frac{V_g \cdot p}{20 \cdot \pi \cdot \eta_m} \quad [\text{Nm}]$$

p [bar] required pressure at outlet
 η_m [-] mechanical efficiency

Input power
 P

$$P = \frac{V_g \cdot n \cdot p}{600 \cdot 1000 \cdot \eta_t} \quad [\text{kW}]$$

η_t [-] total efficiency

PUMP EFFICIENCIES

Volumetric efficiency
 η_v

It determines the amount of flow losses. Its value is $\eta_v = 0,92 \div 0,98$ (depending on rotation speed, viscosity of working liquid and outlet pressure). It can be expressed as follows:

$$\eta_v = \frac{Q_{act.}}{Q_{theor}} \quad [-]$$

$Q_{act.}$ [dm³ · min⁻¹] actual flow rate
 Q_{theor} [dm³ · min⁻¹] theoretical flow rate

Mechanical efficiency
 η_m

It determines mechanical losses. Its value is about $\eta_m = 0,85$. It can be expressed as follows:

$$\eta_m = \frac{M_{theor}}{M_{act.}} \quad [-]$$

$M_{act.}$ [Nm] actual torque
 M_{theor} [Nm] theoretical torque

Total efficiency
 η_t

It is defined as product of η_v and η_m and determines difference between theoretical and actual required input power:

$$\eta_t = \eta_v \cdot \eta_m = \frac{P_{theor}}{P_{act.}} \quad [-]$$

$P_{act.}$ [kW] actual input power
 P_{theor} [kW] theoretical input power

WORKING LIQUID

- Mineral oils for hydraulic drives
- Hydraulic liquids based on plant oils suitable for hydraulic drives

Liquid temperature

- $t = -20 \div +80$ [°C]
when used with FKM (Viton) seal up to 120 [°C]

Cinematic viscosity

- Recommended (during continuous operation):
 $\nu = 20 \div 80 \cdot 10^{-6} [\text{m}^2 \cdot \text{s}^{-1}]$
- Maximum (cold starting, at viscosity > 1000 , operating pressure < 10 bar is permissible, speed $< 1500 \cdot \text{min}^{-1}$):
 $\nu = 1200 \cdot 10^{-6} [\text{m}^2 \cdot \text{s}^{-1}]$
- Minimum (operating mode at $10 \cdot 10^{-6}$ up $20 \cdot 10^{-6}$ should be consulted with manufacturer):
 $\nu = 10 \cdot 10^{-6} [\text{m}^2 \cdot \text{s}^{-1}]$

Filtration coefficient β_α

$\beta_{25\ 75} \geq$ (for pressure $p_2 < 200$ bar)
 $\beta_{10\ 75} \geq$ (for pressure $p_2 > 200$ bar)

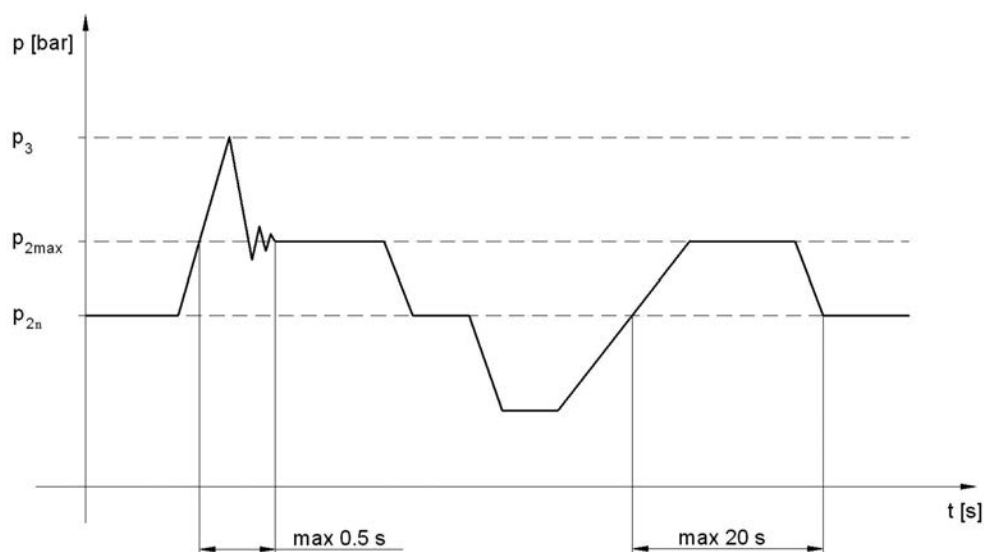
Liquid contamination class according to ISO 4406

21/18/15 (for pressure $p_2 < 200$ bar)
20/17/14 (for pressure $p_2 > 200$ bar)

Liquid contamination class according to NAS 1638

10 (for pressure $p_2 < 200$ bar)
8 (for pressure $p_2 > 200$ bar)

PRESSURE LOAD

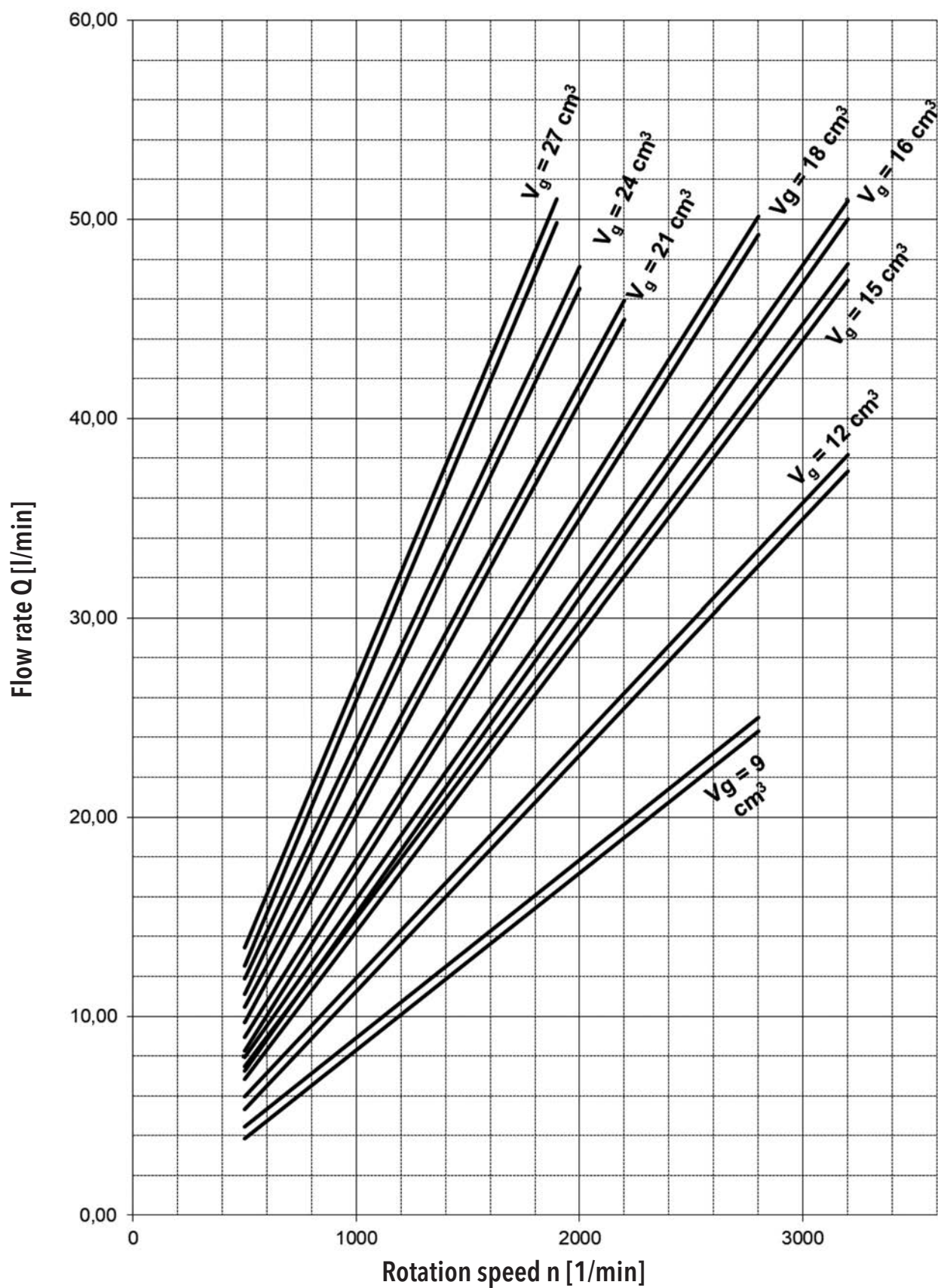


p_{2n} **max. contin. pressure** Max. working pressure, at which the pump can be operated without time limitation.

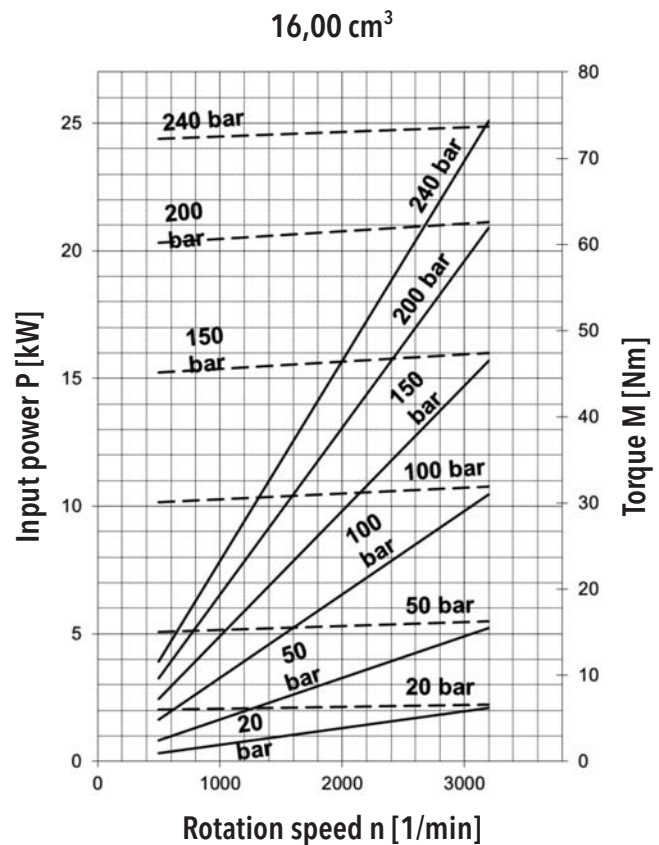
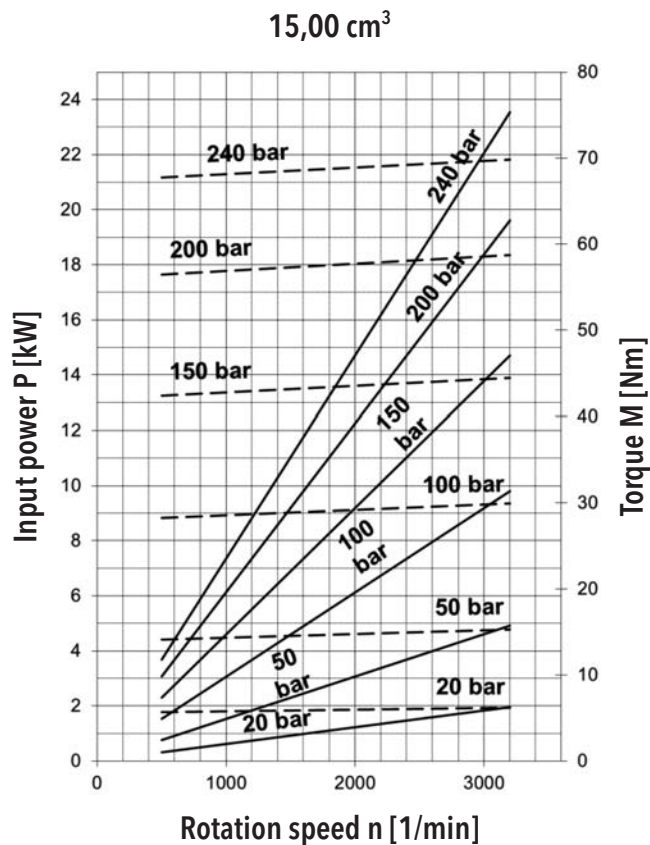
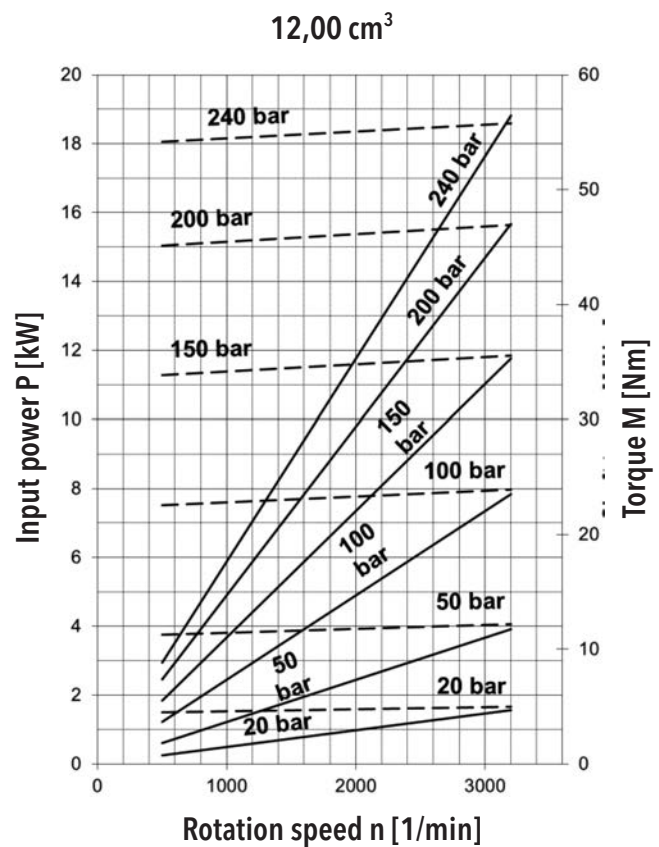
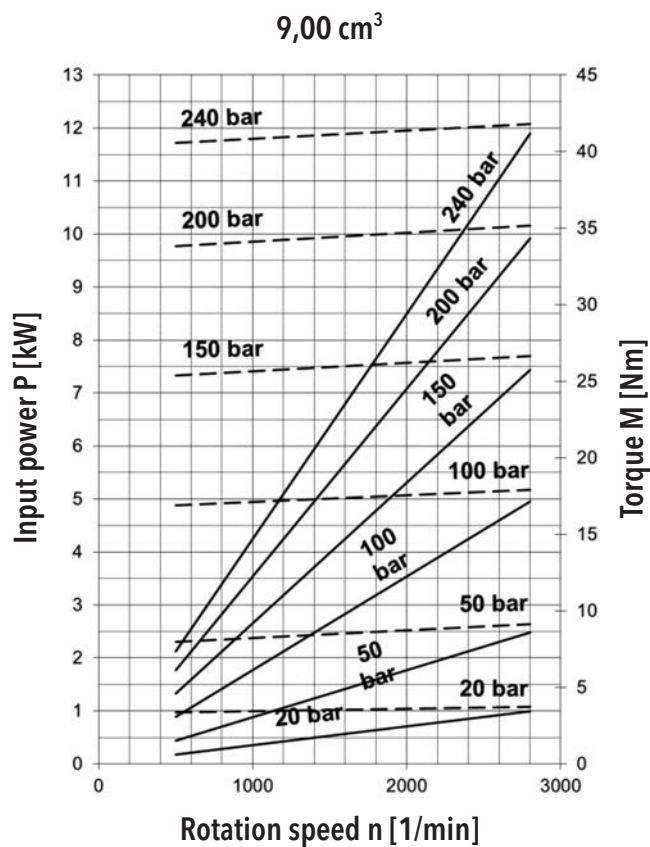
p_{2max} **max. pressure** Maximum pressure permissible for a short time, max. 20s.

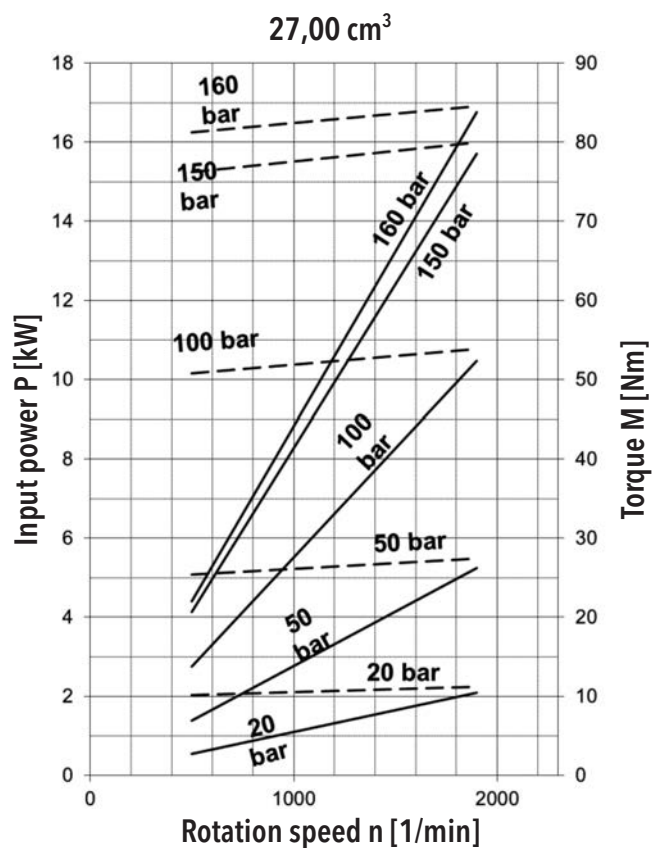
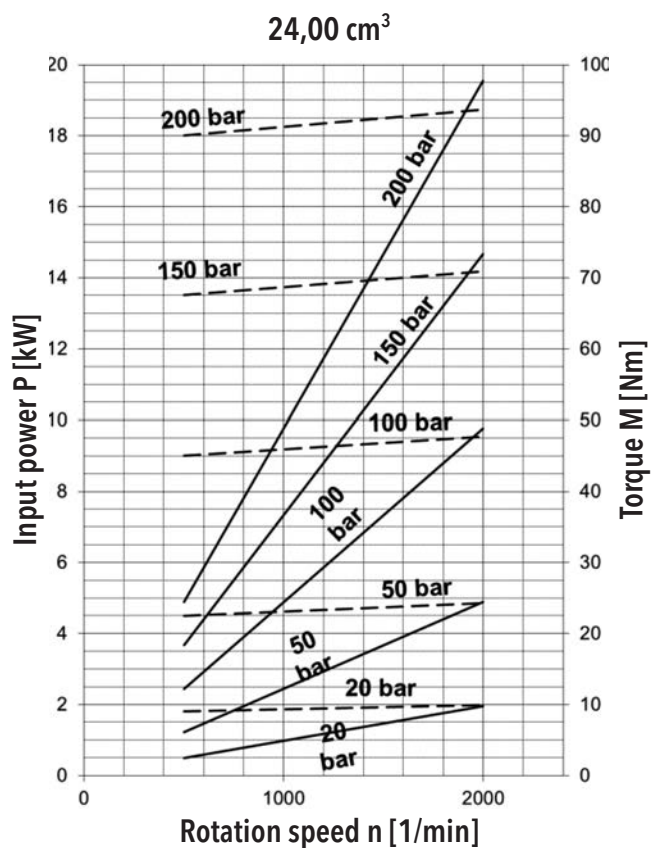
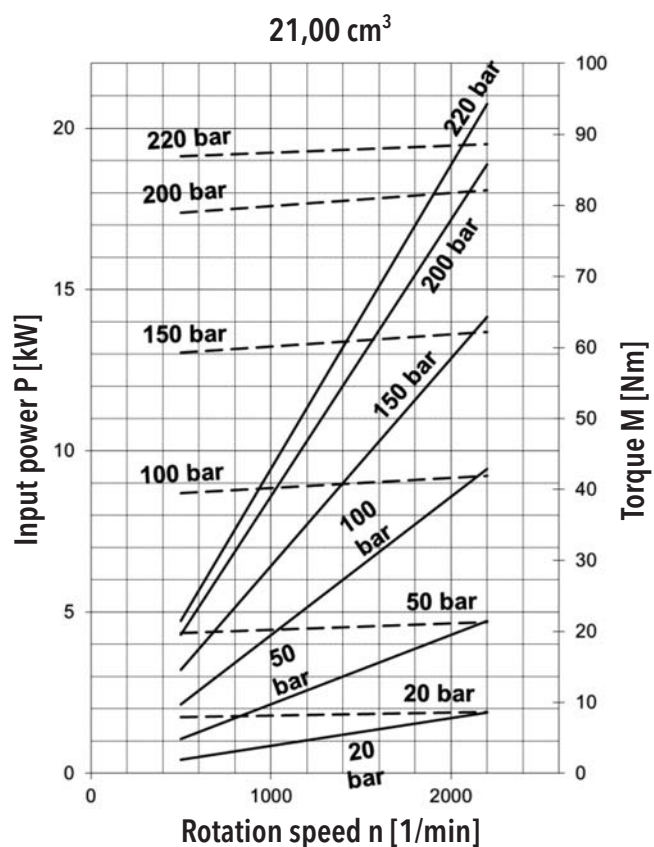
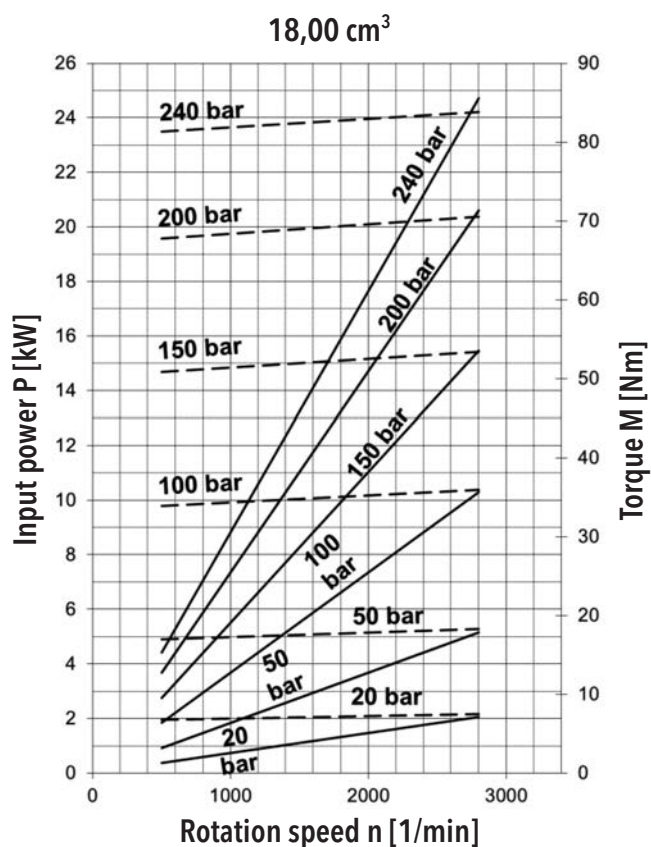
p_3 **peak pressure** Short-time pressure (fractions of a second) arising in case of a sudden change of the operating mode; any excess of this pressure during operation is impermissible.

T3T FLOW RATE AND POWER CURVES



Above curves apply to ISO Vg 46 oil at temperature $t = 45^\circ\text{C}$.





ORDER KEY - SINGLE VERSION

T3T - 16 R - S02 D04 - S G04 G03 - V . 001

Code	Displacement [cm ³]
9	9,03
12	12,05
15	15,08
16	16,08
18	18,10
21	21,10
24	24,05
27	27,13
XX	Other displacement on request

Code	Direction of rotation
R	Clockwise
L	Anti-clockwise

Code	Type
T3T	T3T series pump

Code	Flange design
F02	 Rectangular flange, centre ring Ø 80
R05	 Rectangular flange, centre ring Ø 36,5
R06	 Rectangular flange, centre ring Ø 80
R07	 Rectangular flange, centre ring Ø 60
S02	 SAE A
S03	 SAE B
A07	 Flange with through bolts centre ring Ø 50
A08	 Flange with through bolts centre ring Ø 50
A09	 Flange with through bolts centre ring Ø 52 s O-ring
A10	 Flange with through bolts centre ring Ø 52 s O-ring
Z	Special design

Code	Location of inlets and outlets
S	 Side (in body)
R	 Axial (in cover)
C	 Combination
Z	Special desing

Code	Drive shaft design
C07	 Cone 1:8 Key 3x5
C08	 Cone 1:8 Key 3,2x6,5
C09	 Cone 1:8 Key 4x6,5
C10	 Cone 1:5 Key 3x5
D04	 Spline SAE 9T
D06	 Spline SAE 11T, l = 32
D07	 Spline SAE 11T, l = 38
D08	 Spline CSN 17x1,25
D09	 Spline DIN 5482 B17X14
D10	 Spline GOST 6033-80
D11	 Spline 16x13x3,5
K07	 Cross coupling
V11	 Cylindric Ø 15 Key 4x4
V09	 Cylindric Ø 5/8" Key 4x4
V12	 Cylindric Ø 3/4" Key 4,8x4,8
V13	 Cylindric Ø 20 Key 6x6
Z	Special design

Code	Special arrangements
-	No special arrangements
001	With front-end bearing type 1
002	With front-end bearing type 2
004	Without shaft seal
005	Inlet in body, outlet in cover
006	Inlet in cover, outlet in cover
007	Inlet in body, outlet in flange
008	Inlet in flange, outlet in body
010	With front-end bearing type 3
013	Variseal
014	Double lip shaft seal

Code	Seal material
N	 NBR
V	 FKM
H	 HNBR

Code	Liquid inlet and outlet connection shape
M02	 Thread M 12x1,5
M05	 Thread M 18x1,5
M09	 Thread M 27x2
G01	 Thread BSP G1/4
G02	 Thread BSP G3/8
G03	 Thread BSP G1/2
G04	 Thread BSP G3/4
G05	 Thread BSP G1"
U01	 Thread 7/16-20 UNF-2B
U02	 Thread 9/16-18 UNF-2B
U04	 Thread 7/8-14 UNF-2B
U05	 Thread 1-1/16-12 UN-2B
H05	 Fitting Ø15 Square 4xM6 Ø35
H06	 Fitting Ø20 Square 4xM6 Ø40
H10	 Fitting Ø 25 Square 4xM8 Ø55
H07	 Fitting Ø13,5 Square 4xM6 Ø30
H08	 Fitting Ø20 Square 4xM8 Ø40
Z	Special design

An example of designation for the T3T anti-clockwise pump with displacement of 12 cm³, SAE A flange, SAE 9T spline, BSP inlets in cover and standard NBR seal without special arrangements: **T3T-12L-S02D04-RG03G03-N**

ORDER KEY – MULTIPLE VERSION

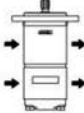
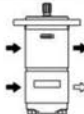
T3T - 16 / 8 / 8 R - S02 D04 - S G04 G03 / G03 G03 / G03 G03 - V . 001

Code	Displacement [cm ³]
9	9,03
12	12,05
15	15,08
16	16,08
18	18,10
21	21,10
24	24,05
27	27,13
XX	Other displacement on request

Code	Direction of rotation
R	Clockwise
L	Anti-clockwise

Code	Type
T3T	T3T series pump

Code	Flange design
F02	 Rectangular flange, centre ring Ø 80
R05	 Rectangular flange, centre ring Ø 36,5
R06	 Rectangular flange, centre ring Ø 80
R07	 Rectangular flange, centre ring Ø 60
S02	 SAE A
S03	 SAE B
A07	 Flange with through bolts centre ring Ø 50
A08	 Flange with through bolts centre ring Ø 50
A09	 Flange with through bolts centre ring Ø 52 s O-ring
A10	 Flange with through bolts centre ring Ø 52 s O-ring
Z	Special design

Code	Location of inlets and outlets
S	 Side (in the body)
C	 Combination

Code	Drive shaft design
C07	 Cone 1:8 Key 3x5
C08	 Cone 1:8 Key 3,2x6,5
C09	 Cone 1:8 Key 4x6,5
C10	 Cone 1:5 Key 3x5
D04	 Spline SAE 9T
D06	 Spline SAE 11T, l = 32
D07	 Spline SAE 11T, l = 38
D08	 Spline ČSN 17x1,25
D09	 Spline DIN 5482 B17X14
D10	 Spline GOST 6033-80
D11	 Spline 16x13x3,5
K07	 Cross coupling
V11	 Cylindric Ø 15 Key 4x4
V09	 Cylindric Ø 5/8" Key 4x4
V12	 Cylindric Ø 3/4" Key 4,8x4,8
V13	Cylindric Ø 20 Key 6x6
Z	Special design

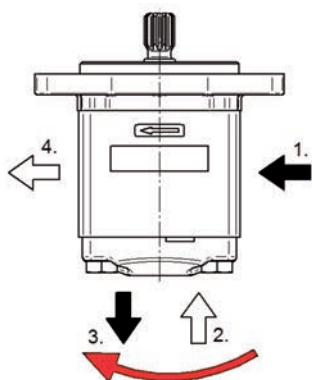
Code	Special arrangements
-	No special arrangements
001	With front-end bearing type 1
002	With front-end bearing type 2
003	Sealed section by multiple version
004	Without shaft seal
005	Inlet in body, outlet in cover
006	Inlet in cover, outlet in cover
007	Inlet in body, outlet in flange
008	Inlet in flange, outlet in body
010	With front-end bearing type 3
012	Inside drain
013	Variseal
014	Double lip shaft seal

Code	Seal material
N	 NBR
V	 FKM
H	 HNBR

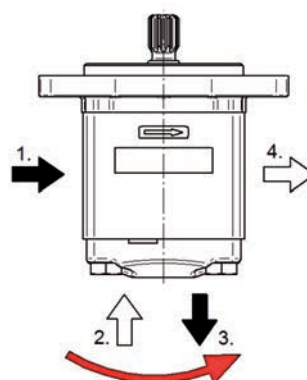
Code	Liquid inlet and outlet connection shape
M02	 Thread M 12x1,5
M05	 Thread M 18x1,5
M09	 Thread M 27x2
G01	 Thread BSP G1/4
G02	 Thread BSP G3/8
G03	 Thread BSP G1/2
G04	 Thread BSP G3/4
G05	 Thread BSP G1"
U01	 Thread 7/16-20 UNF-2B
U02	 Thread 9/16-18 UNF-2B
U04	 Thread 7/8-14 UNF-2B
U05	 Thread 1-1/16-12 UN-2B
H05	Fitting Ø15 Square 4xM6 Ø35
H06	Fitting Ø20 Square 4xM6 Ø40
H10	Fitting Ø 25 Square 4xM8 Ø55
H07	Fitting Ø13,5 Square 4xM6 Ø30
H08	Fitting Ø20 Square 4xM8 Ø40
Z	Special design

An example of designation for the T3T three-section clockwise pump with displacements 12, 12, 9 cm³, Rectangular flange, centre ring Ø 36,5, cone 1:8, metric one common inlet and three outlets and FKM sealing without special arrangements: **T3T-12/12/9R-R05C07-SNM05/M09M05/NM05-V**

Note: In case of combination inlets, with the code „C” is respected following sequence of inlets and outlets:



For clockwise and reverse gear pump,
in direction clockwise



For anti-clockwise gear pump,
in direction anti-clockwise

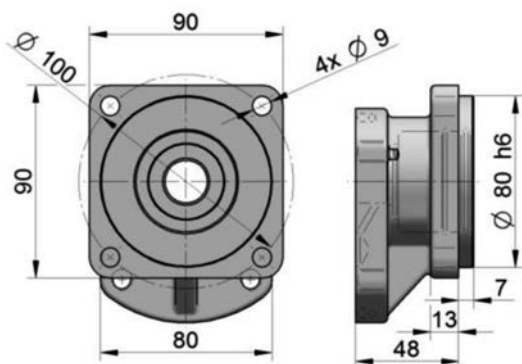
For. ex....: T3-12R-S02D04-CG04 G04 G03 G03 -N
1. 2. 3. 4.

COMBINATIONS OF FLANGES AND SHAFTS

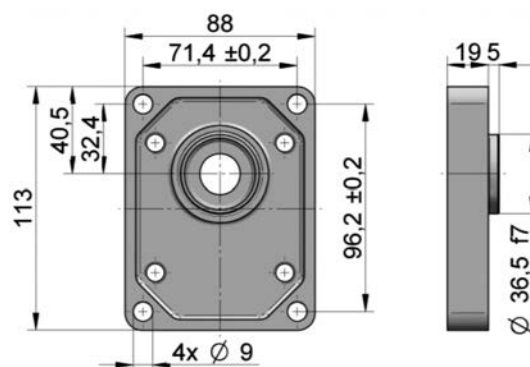
		FLANGE DESIGN									
		F02	R05	R06	R07	S02	S03	A07	A08	A09	A10
DRIVE SHAFT	C07		●								
	C08		●								
	C09		●								
	C10			●				●	●		
	D04					●	●				
	D06					●	●				
	D07					●	●				
	D08		●								
	D09			●				●	●		
	D10		●								
	D11				●						
	K05									●	●
	V09					●	●				
	V11		●								
	V12					●	●				
	V13		●								

FLANGES DESIGN

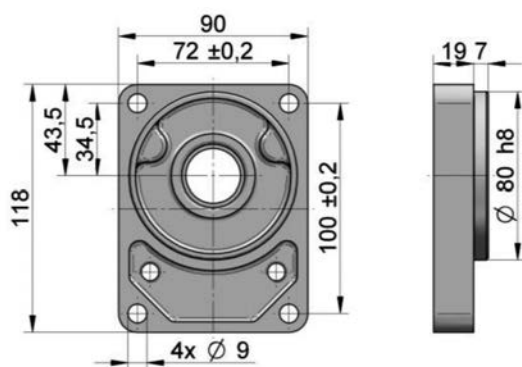
F02:



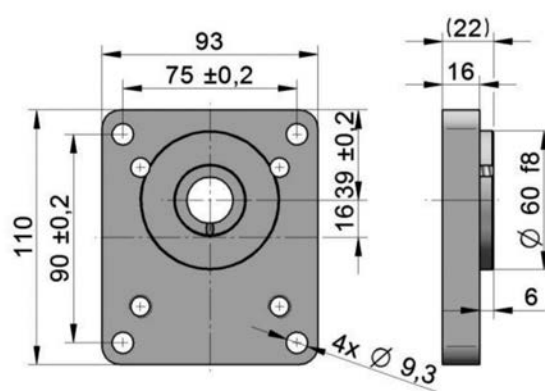
R05:



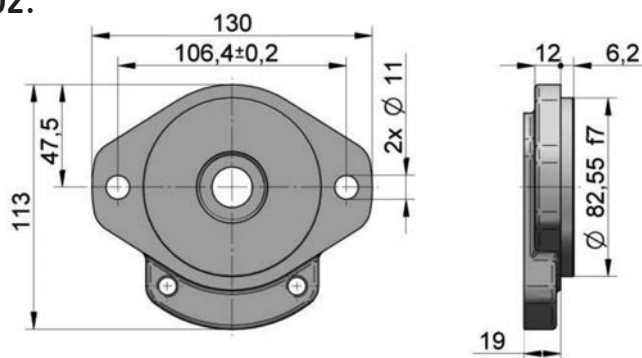
R06:



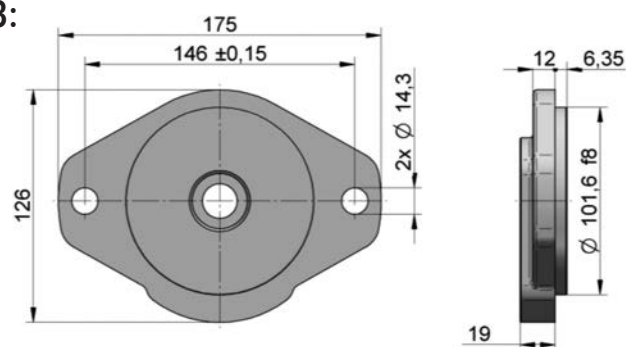
R07:



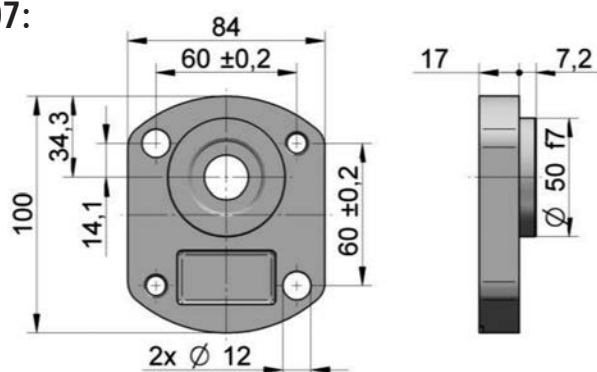
S02:



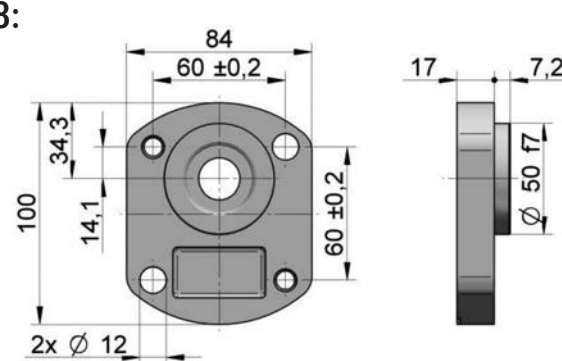
S03:



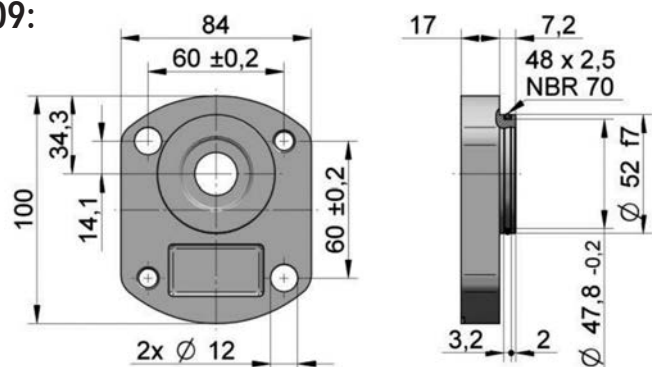
A07:



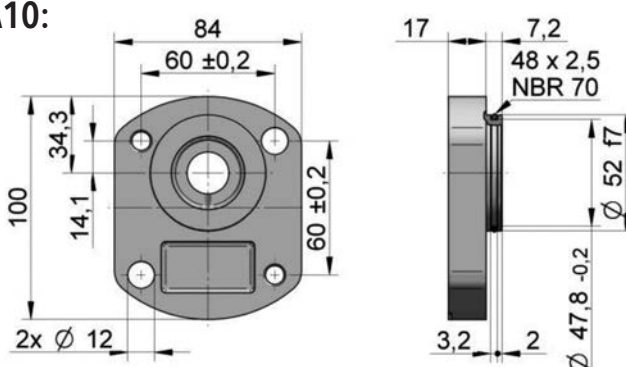
A08:



A09:



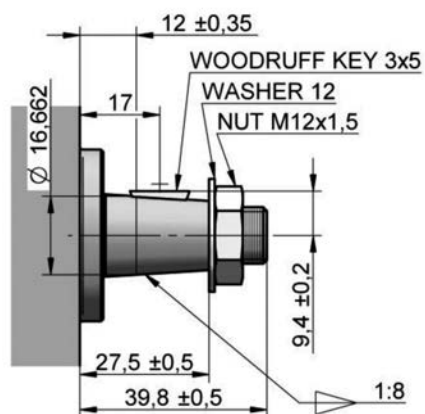
A10:



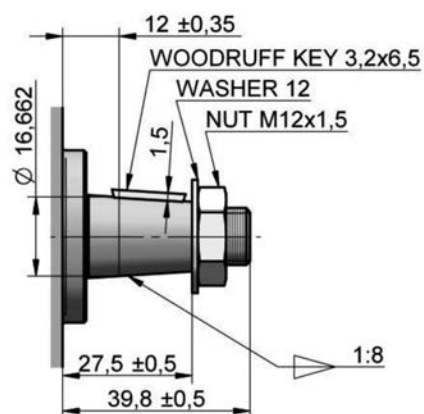
DRIVE SHAFT

Note: maximum allowed torque on a drive shaft is 100 Nm.

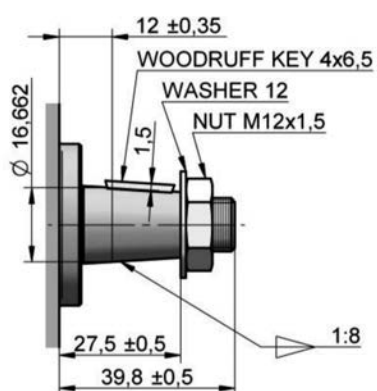
C07:



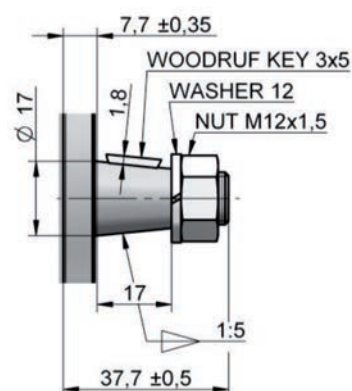
C08:



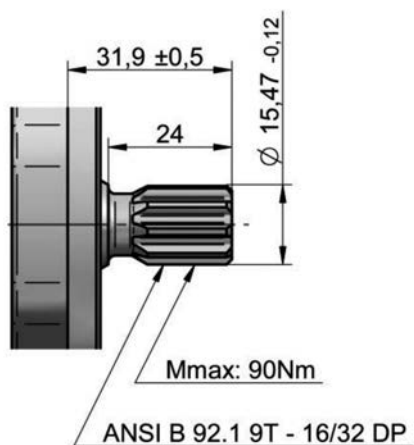
C09:



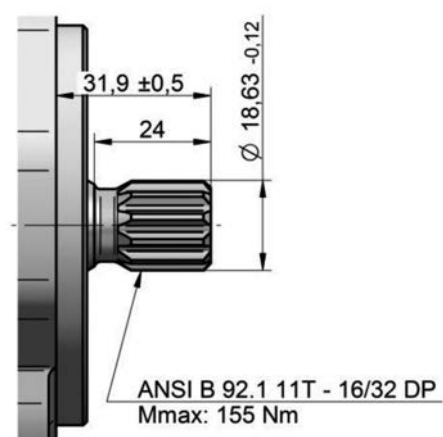
C10:



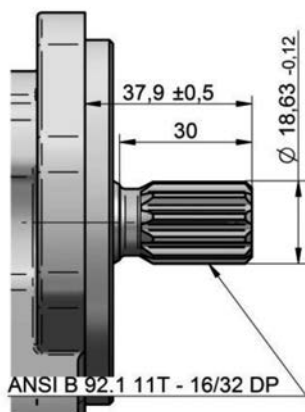
D04:



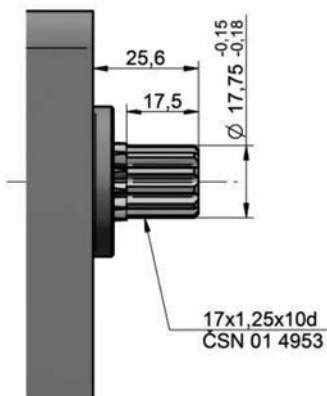
D06:



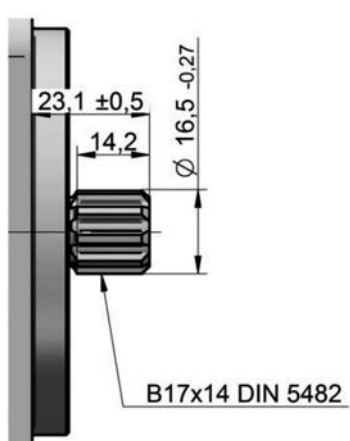
D07:



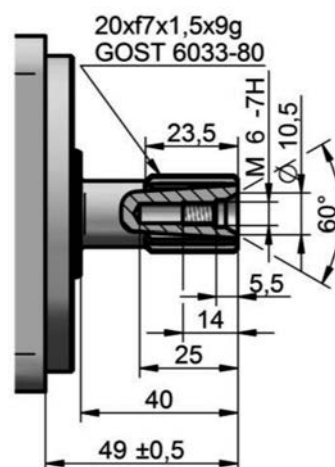
D08:



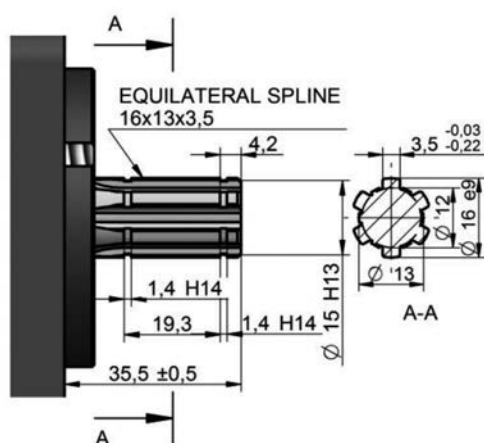
D09:



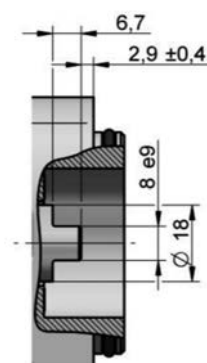
D10:



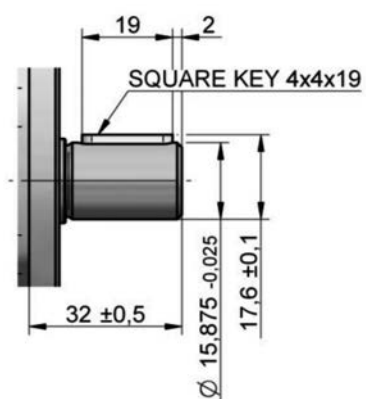
D11:



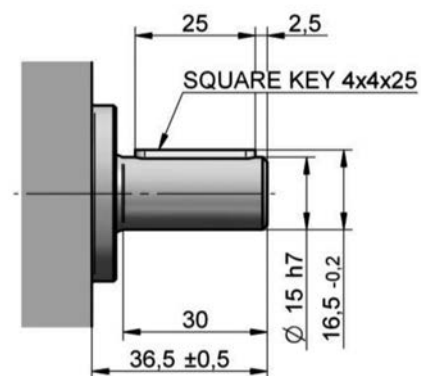
K07:



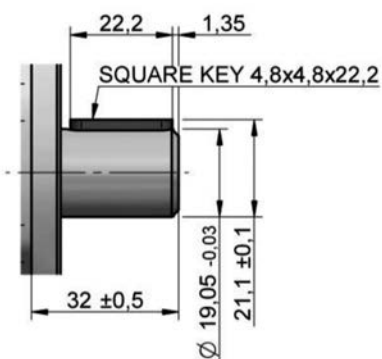
V09:



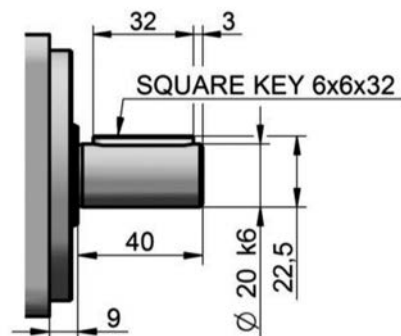
V11:



V12:

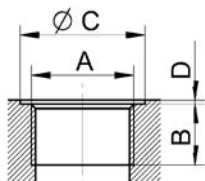


V13:



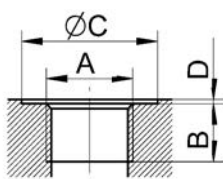
LIQUID INLET AND OUTLET CONNECTION

Metric thread according to ISO 6149



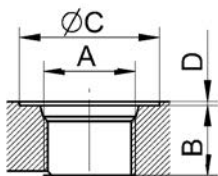
Displacement [cm ³]	kód	Inlet				kód	Outlet			
		A	B	C	D		A	B	C	D
all	M09	M 27x2	16	33	1	M05	M 18x1,5	14	24	1

BSPP pipe thread according to ISO 228 - 1



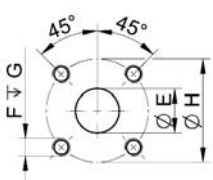
Displacement [cm ³]	Code	Inlet				Code	Outlet			
		A	B	C	D		A	B	C	D
to 10	G03	G 1/2"	14	33	1	G03	G 1/2"	14	33	1
10 - 25	G04	G 3/4"	16	39	1	G03	G 1/2"	14	33	1
above 25	G05	G 1"	18	45	1	G04	G 3/4"	16	39	1

UNF thread according to SAE



Displacement [cm ³]	Code	Inlet				Code	Outlet			
		A	B	C	D		A	B	C	D
to 10	U04	7/8-14 UNF-2B	17	34	1	U04	7/8-14 UNF-2B	17	34	1
11 - 31	U05	1-1/16-12 UNF-2B	19	41	1	U04	7/8-14 UNF-2B	17	34	1

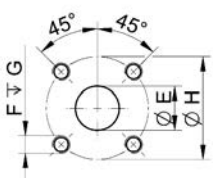
Flanged fittings according to DIN 8901/8902



Displacement [cm ³]	Code	Inlet				Code	Outlet			
		E	F	G	H		E	F	G	H
all	H06	20	M6	13	40	H05	15	M6	13	35
all	H10	25	M8	13	55	H05	15	M6	13	35

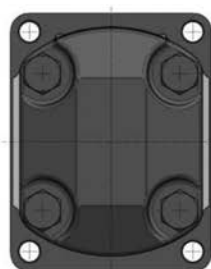
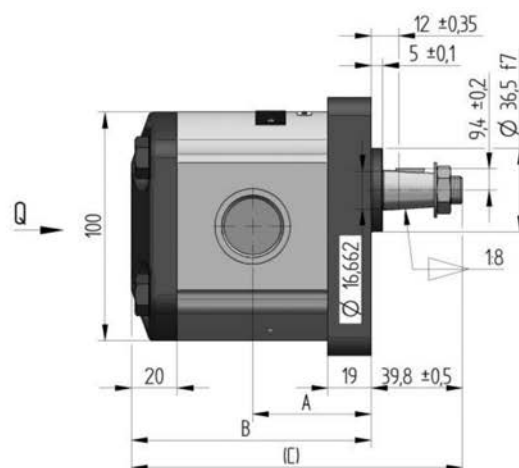
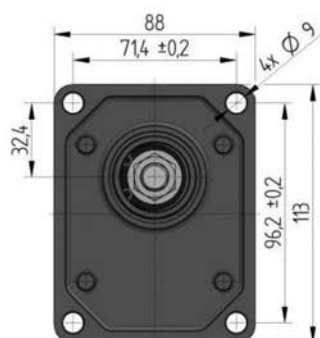
Note: H10H05 – for multiple version with one common inlet.

Flanged fittings - „square“



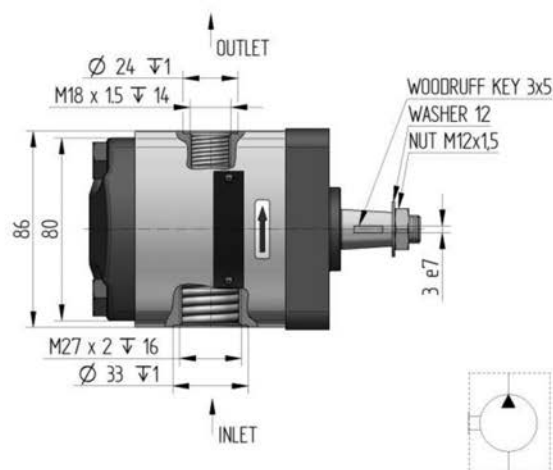
Displacement [cm ³]	Code	Inlet				Code	Outlet			
		E	F	G	H		E	F	G	H
all	H08	20	M8	13	40	H07	13.5	M6	13	30

CATALOGUE SHETS OF T3T SERIES BASIC DESIGNS

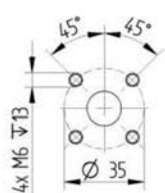
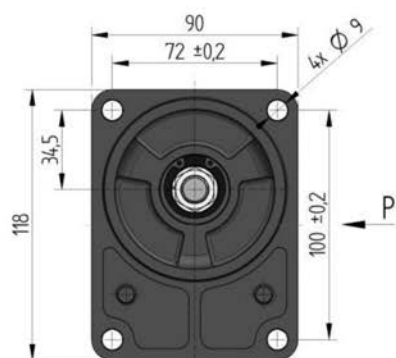


Q

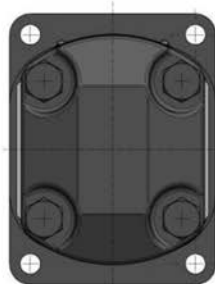
THE CLOCKWISE PUMP IS SHOWN



Order key	purch. code	direct. of rot.	displacement [cm ³ /1]	nom. press. [bar]	speed MIN. [min ⁻¹]	speed ORDER [min ⁻¹]	A [mm]	dimension B [mm]	C [mm]
T3T-27R-R05C07-SM09M05-N		R	27	160	500	1 900	63.7	128.4	168.2
T3T-27L-R05C07-SM09M05-N		L							
T3T-24R-R05C07-SM09M05-N		R	24	200	500	2 000	61.3	123.6	163.4
T3T-24L-R05C07-SM09M05-N		L							
T3T-21R-R05C07-SM09M05-N		R	21	220	500	2 200	59.0	119.0	158.8
T3T-21L-R05C07-SM09M05-N		L							
T3T-18R-R05C07-SM09M05-N		R	18	240	500	2 800	56.7	114.3	154.1
T3T-18L-R05C07-SM09M05-N		L							
T3T-16R-R05C07-SM09M05-N		R	16	240	500	3 200	55.1	111.2	151.0
T3T-16L-R05C07-SM09M05-N		L							
T3T-15R-R05C07-SM09M05-N		R	15	240	500	3 200	54.3	109.6	149.4
T3T-15L-R05C07-SM09M05-N		L							
T3T-12R-R05C07-SM09M05-N		R	12	240	500	3 200	51.9	104.9	144.7
T3T-12L-R05C07-SM09M05-N		L							
T3T-9R-R05C07-SM09M05-N		R	9	240	500	2 800	49.6	100.1	139.9
T3T-9L-R05C07-SM09M05-N		L							

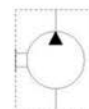
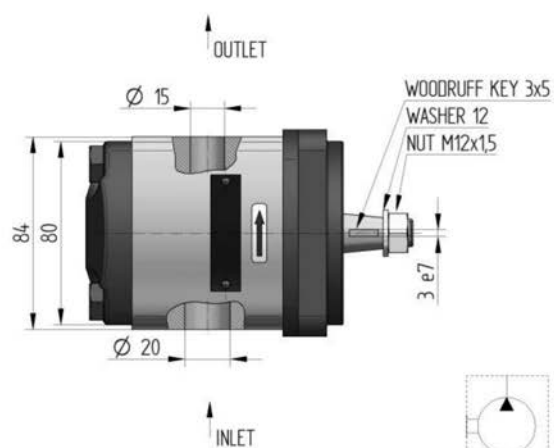
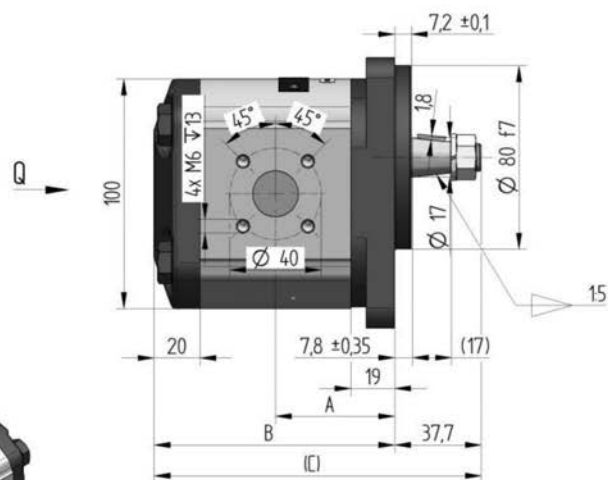


P

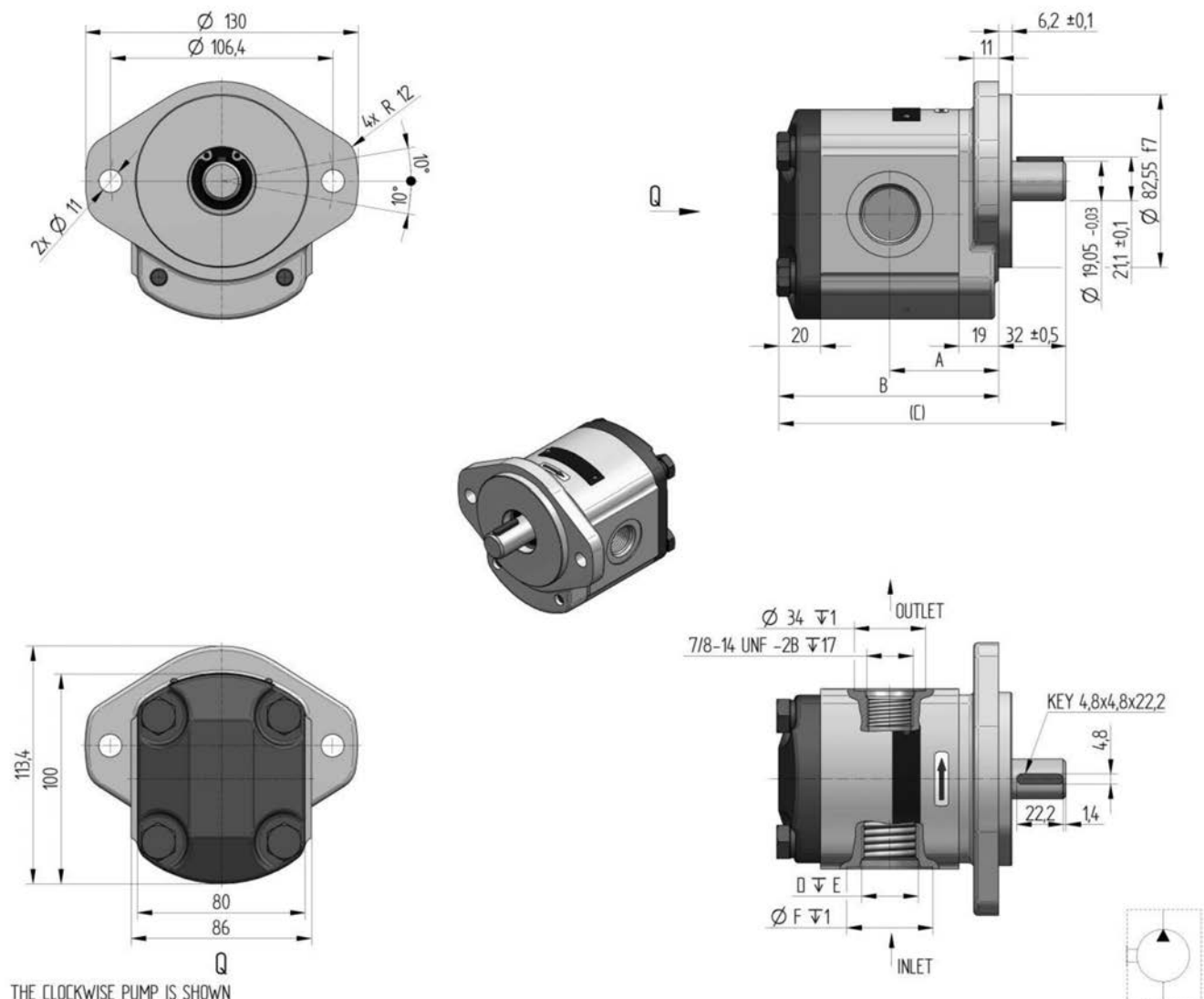


Q

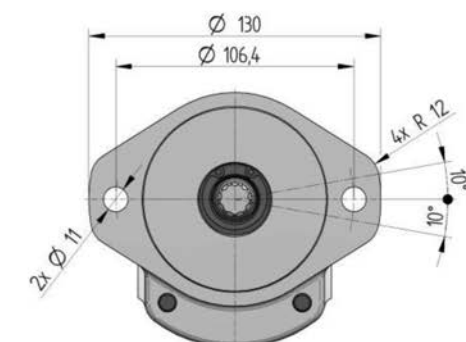
THE CLOCKWISE PUMP IS SHOWN



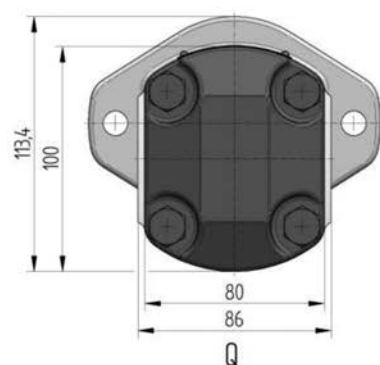
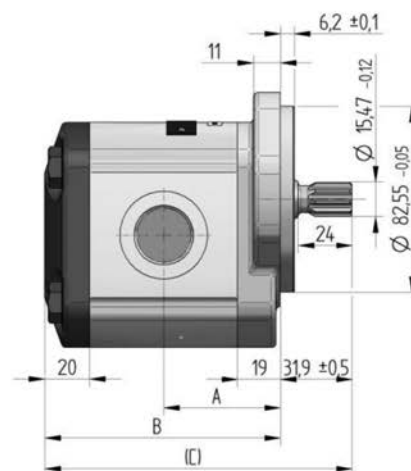
Order key	purch. code	direct. of rot.	displacement [cm ³ /1]	nom. press. [bar]	speed MIN. [min ⁻¹]	speed ORDER [min ⁻¹]	A [mm]	dimension B [mm]	C [mm]
T3T-27R-R06C10-SH06H05-N		R	27	160	500	1 900	63.7	128.4	166.1
T3T-27L-R06C10-SH06H05-N		L							
T3T-24R-R06C10-SH06H05-N		R	24	200	500	2 000	61.3	123.6	161.3
T3T-24L-R06C10-SH06H05-N		L							
T3T-21R-R06C10-SH06H05-N		R	21	220	500	2 200	59.0	119.0	156.7
T3T-21L-R06C10-SH06H05-N		L							
T3T-18R-R06C10-SH06H05-N		R	18	240	500	2 800	56.7	114.3	152.0
T3T-18L-R06C10-SH06H05-N		L							
T3T-16R-R06C10-SH06H05-N		R	16	240	500	3 200	55.1	111.2	148.9
T3T-16L-R06C10-SH06H05-N		L							
T3T-15R-R06C10-SH06H05-N		R	15	240	500	3 200	54.3	109.6	147.3
T3T-15L-R06C10-SH06H05-N		L							
T3T-12R-R06C10-SH06H05-N		R	12	240	500	3 200	51.9	104.9	142.6
T3T-12L-R06C10-SH06H05-N		L							
T3T-9R-R06C10-SH06H05-N		R	9	240	500	2 800	49.6	100.1	137.8
T3T-9L-R06C10-SH06H05-N		L							



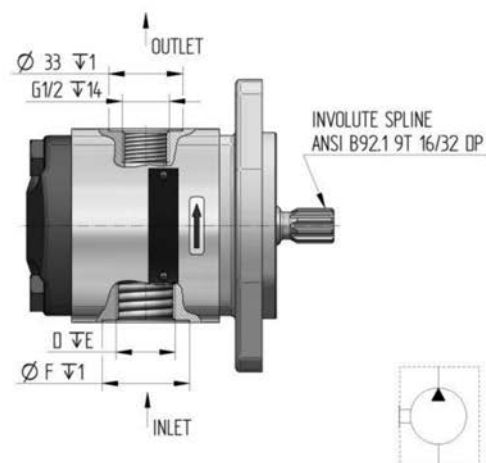
Order key	purch. code	direct. of rot.	displa- cement [cm³/1]	nom. press. [bar]	speed MIN. [min⁻¹]	speed MAX. [min⁻¹]	dimension					
							A [mm]	B [mm]	C [mm]	D [mm]	E [mm]	F [mm]
T3T-27R-S02V12-SU05U04-N		R	27	160	500	1 900	63.7	128.4	160.4	1-1/16-12 UN-2B	19	41
T3T-27L-S02V12-SU05U04-N		L										
T3T-24R-S02V12-SU05U04-N		R	24	200	500	2 000	61.3	123.6	155.6	1-1/16-12 UN-2B	19	41
T3T-24L-S02V12-SU05U04-N		L										
T3T-21R-S02V12-SU05U04-N		R	21	220	500	2 200	59.0	119.0	151.0	1-1/16-12 UN-2B	19	41
T3T-21L-S02V12-SU05U04-N		L										
T3T-18R-S02V12-SU05U04-N		R	18	240	500	2 800	56.7	114.3	146.3	1-1/16-12 UN-2B	19	41
T3T-18L-S02V12-SU05U04-N		L										
T3T-16R-S02V12-SU05U04-N		R	16	240	500	3 200	55.1	111.2	143.2	1-1/16-12 UN-2B	19	41
T3T-16L-S02V12-SU05U04-N		L										
T3T-15R-S02V12-SU05U04-N		R	15	240	500	3 200	54.3	109.6	141.6	1-1/16-12 UN-2B	19	41
T3T-15L-S02V12-SU05U04-N		L										
T3T-12R-S02V12-SU05U04-N		R	12	240	500	3 200	51.9	104.9	136.9	1-1/16-12 UN-2B	19	41
T3T-12L-S02V12-SU05U04-N		L										
T3T-9R-S02V12-SU04U04-N		R	9	240	500	2 800	49.6	100.1	132.1	7/8-14 UNF-2B	17	34
T3T-9L-S02V12-SU04U04-N		L										



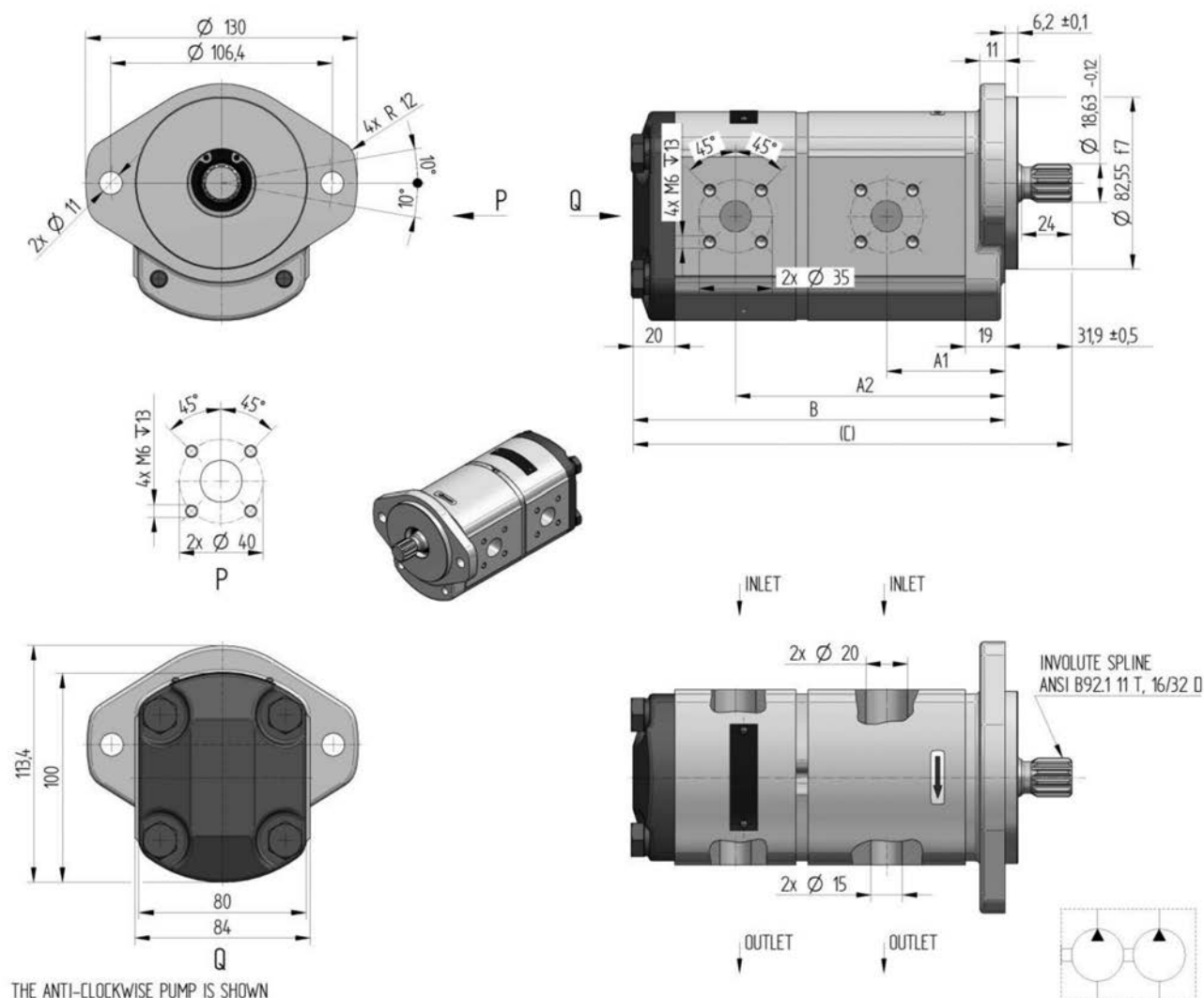
Q



THE CLOCKWISE PUMP IS SHOWN

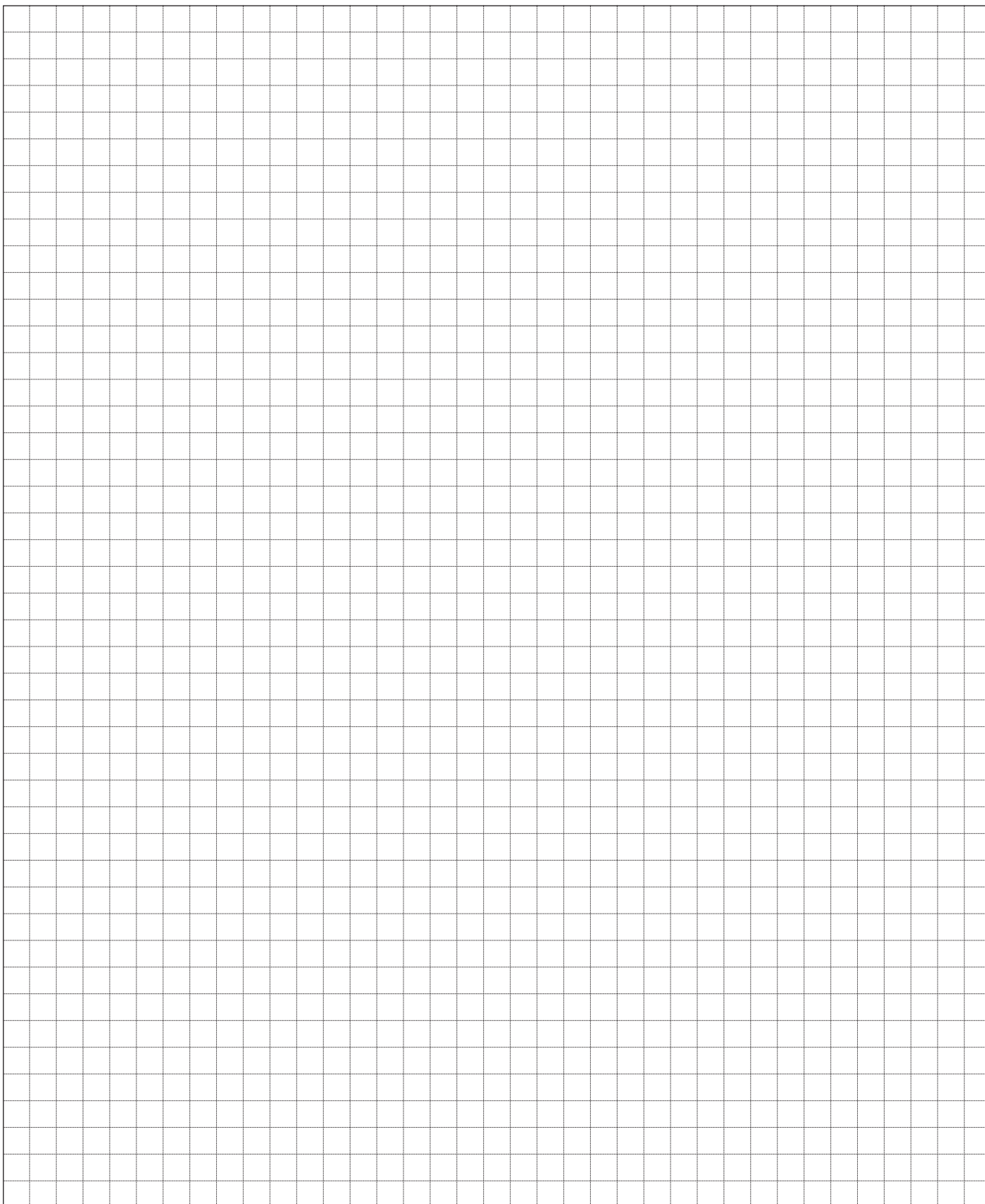


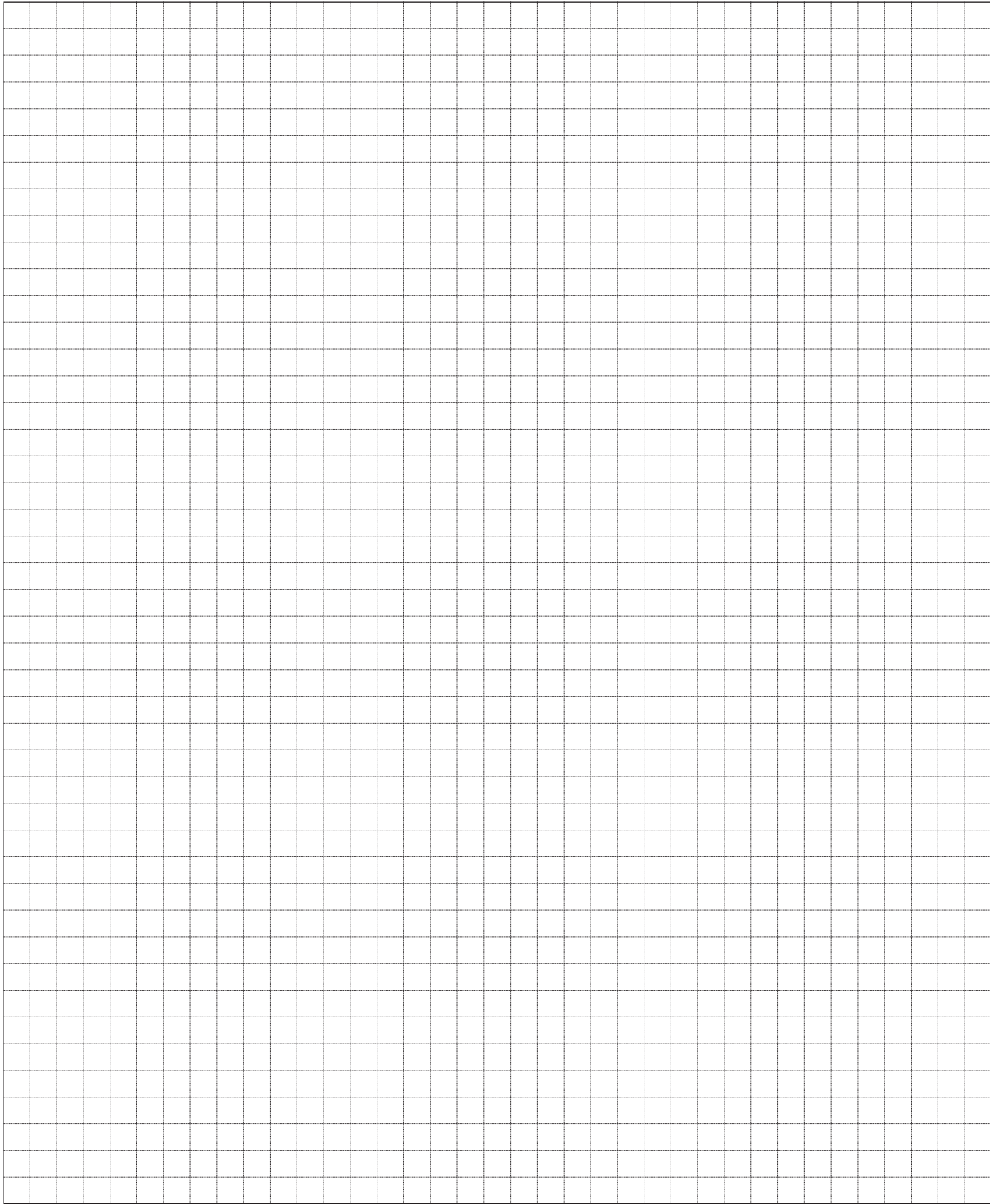
Order key	purch. code	direct. of rot.	displacement [cm ³ /1]	nom. press. [bar]	speed MIN. [min ⁻¹]	speed MAX. [min ⁻¹]	dimension					
							A [mm]	B [mm]	C [mm]	D [mm]	E [mm]	F [mm]
T3T-27R-S02D04-SG04G03-N		R	27	160	500	1 900	63.7	128.4	160.3	G 3/4	16	39
T3T-27L-S02D04-SG04G03-N		L										
T3T-24R-S02D04-SG04G03-N		R	24	200	500	2 000	61.3	123.6	155.5	G 3/4	16	39
T3T-24L-S02D04-SG04G03-N		L										
T3T-21R-S02D04-SG04G03-N		R	21	220	500	2 200	59.0	119.0	150.9	G 3/4	16	39
T3T-21L-S02D04-SG04G03-N		L										
T3T-18R-S02D04-SG04G03-N		R	18	240	500	2 800	56.7	114.3	146.2	G 3/4	16	39
T3T-18L-S02D04-SG04G03-N		L										
T3T-16R-S02D04-SG04G03-N		R	16	240	500	3 200	55.1	111.2	143.1	G 3/4	16	39
T3T-16L-S02D04-SG04G03-N		L										
T3T-15R-S02D04-SG04G03-N		R	15	240	500	3 200	54.3	109.6	141.5	G 3/4	16	39
T3T-15L-S02D04-SG04G03-N		L										
T3T-12R-S02D04-SG04G03-N		R	12	240	500	3 200	51.9	104.9	136.8	G 3/4	16	39
T3T-12L-S02D04-SG04G03-N		L										
T3T-9R-S02D04-SG03G03-N		R	9	240	500	2 800	49.6	100.1	132.0	G 1/2	14	33
T3T-9L-S02D04-SG03G03-N		L										



Other combinations are available after consultation.

Order key	purch. code	direct. of rot.	displacement [cm ³ /1]	nom. press. [bar]	speed MIN. [min ⁻¹]	speed MAX. [min ⁻¹]	dimension			
							A1 [mm]	A2 [mm]	B [mm]	C [mm]
T3T-21/12R-S02D06-SH06H05/H06H05-N		R	21/12	220/240	500	2 200	59.0	137.6	190.5	222.4
T3T-21/12L-S02D06-SH06H05/H06H05-N		L	21/12	220/240	500	2 200	59.0	137.6	190.5	222.4
T3T-16/12R-S02D06-SH06H05/H06H05-N		R	16/12	240/240	500	3 200	55.1	129.8	182.7	214.6
T3T-16/12L-S02D06-SH06H05/H06H05-N		L	16/12	240/240	500	3 200	55.1	129.8	182.7	214.6
T3T-12/9R-S02D06-SH06H05/H06H05-N		R	12/9	240/240	500	2 800	51.9	121.1	171.7	203.6
T3T-12/9L-S02D06-SH06H05/H06H05-N		L	12/9	240/240	500	2 800	51.9	121.1	171.7	203.6
T3T-9/9R-S02D06-SH06H05/H06H05-N		R	9/9	240/240	500	2 800	49.6	116.4	167.0	198.9
T3T-9/9L-S02D06-SH06H05/H06H05-N		L	9/9	240/240	500	2 800	49.6	116.4	167.0	198.9







jihostroj
AERO TECHNOLOGY & HYDRAULICS

JIHOSTROJ a.s.
Budějovická 148
CZ 382 32 Velešín
Czech Republic
tel.: +420 380 340 511
fax: +420 380 340 612
e-mail: mailbox@jihostroj.cz
http: // www.jihostroj.com

GPS 48°49'51.748" N 14°27'40.770" E

