

**Model No.** **T7DD or T7DDS - B42 - B22 - 1 R 00 - A 1 M0 - ..**

**T7DD series** - ISO 6 bolts 3019-2

Mounting flange 125-A2-HW or 125-B4 HW

**T7DDS series** - SAE C 6 bolts

J744 mounting flange

**Displacement P1 & P2**

Volumetric displacement (ml/rev.)

B14 = 44,0 B31 = 99,2

B17 = 55,0 B35 = 113,4

B20 = 66,0 B38 = 120,6

B22 = 70,3 B42 = 137,5

B24 = 81,1 045 = 145,7

B28 = 90,0 050 = 158,0

**Type of shaft T7DDS**

1 = keyed (SAE C)

3 = splined (SAE C) 14 teeth

2 = keyed (SAE CC)

4 = splined (SAE BB)

**Type of shaft - T7DD and T7DDS**

5 = keyed (ISO 3019-2 - G32M)

**Modifications**

**Mounting w/connection variables**

4 bolts SAE flanges J518

P1 & P2 = 1.1/4" - S = 4"		
Type	Metric thread	UNC thread
T7DD	M0	
T7DDS	M0	00

**Seal class**

1 = S1 BUNA N - 0,7 bar max. (for mineral oil)

4 = S4 EPDM - 7 bar max. (for fire resistant fluids)

5 = S5 VITON® - 7 bar max. (for mineral oil and fire resistant fluids)

**Design letter**

**Porting combination (see page 72)**

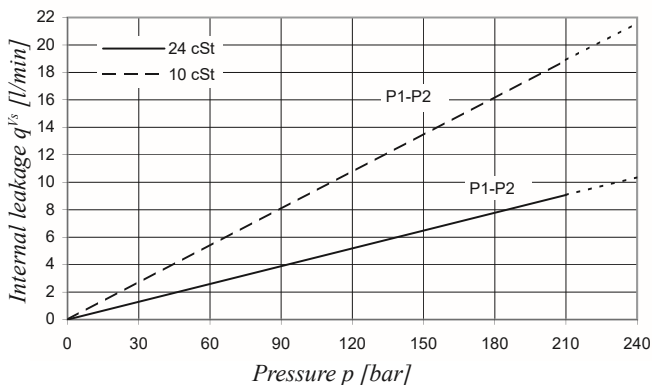
00 = standard

**Direction of rotation (shaft end view)**

R = Clockwise

L = Counter-clockwise

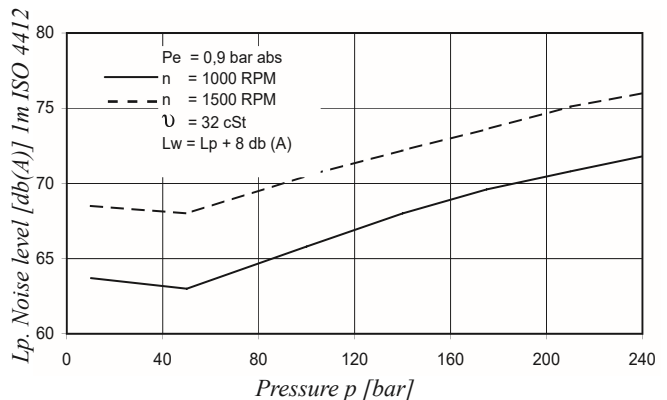
**INTERNAL LEAKAGE (TYPICAL)**



Do not operate pump more than 5 seconds at any speed or viscosity if internal leakage is higher than 50% of theoretical flow.

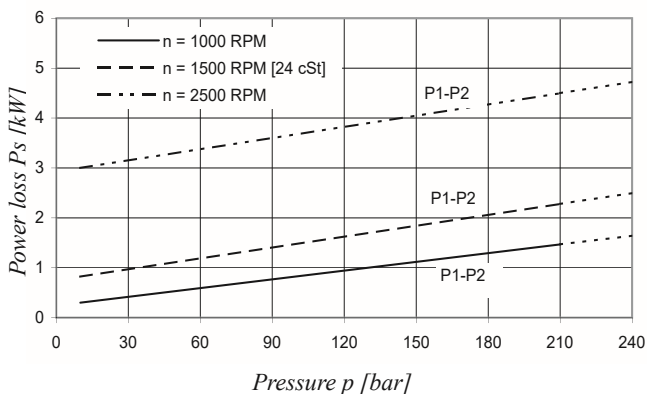
Total leakage is the sum of each section loss under its respective operating conditions.

**NOISE LEVEL (TYPICAL) - T7DDS - B31 - B31**



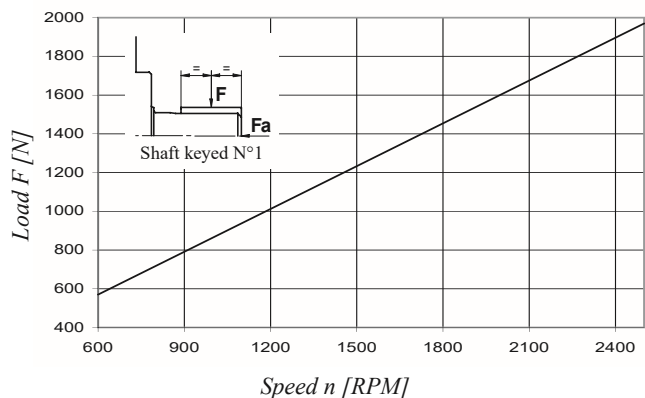
Double pump noise level is given with both stages discharging at the pressure value indicated on the curve.

**POWER LOSS HYDROMECHANICAL (TYPICAL)**

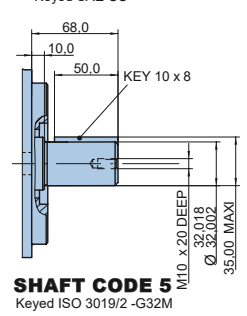
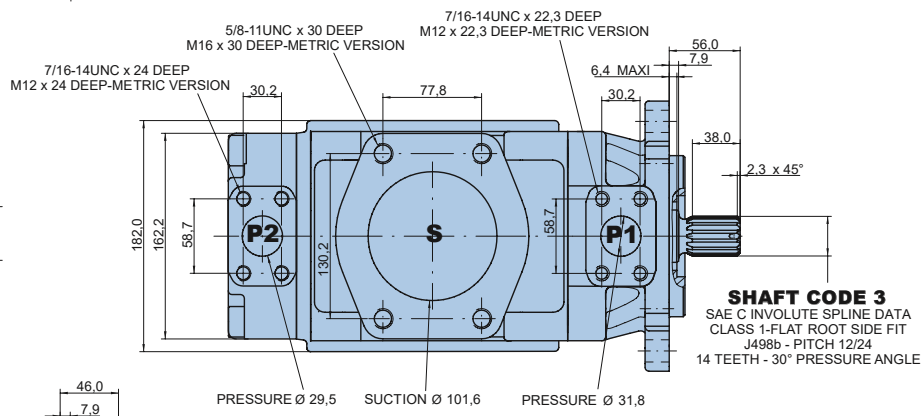
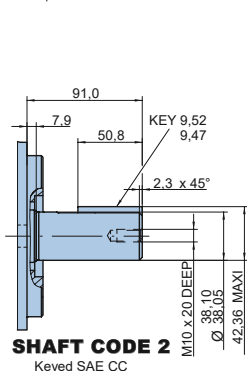
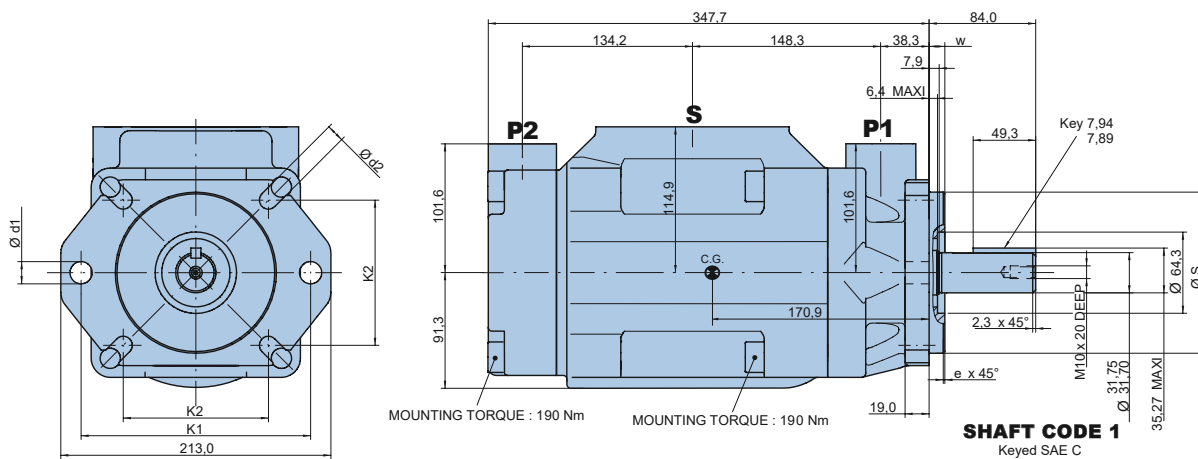


Total hydromechanical power loss is the sum of each section loss under its respective operating conditions.

**PERMISSIBLE RADIAL LOAD**



Maximum permissible axial load Fa = 1200 N



Alternate mounting flange								
Series	Dia S		e x 45°	W	K1	Dia d1	K2	Dia d2
	Max.	Min.						
T7DD	125,000	124,937	2,0	9,5	180,0	18,0	113,14	14,0
T7DDS	127,000	126,950	1,3	12,7	181,0	17,5	114,50	14,3

Shaft torque limits [ml/rev. x bar]			
Shaft	Vi x p max.	Shaft	Vi x p max.
1	43240	4	35880
2	71750	5	45200
3	61200		

**OPERATING CHARACTERISTICS - TYPICAL [24 cSt]**

Pressure port	Series	Vi Volumetric displacement	Flow q <sub>v</sub> [l/min] & n = 1500 RPM			Input power P [kW] & n = 1500 RPM		
			p = 0 bar	p = 140 bar	p = 250 bar	p = 7 bar	p = 140 bar	p = 250 bar
P1 & P2	B14	44,0 ml/rev	66,0	59,4	54,2	1,5	16,6	29,0
	B17	55,0 ml/rev	82,5	75,9	70,7	1,7	20,4	35,8
	B20	66,0 ml/rev	99,0	92,4	87,2	1,9	24,3	42,7
	B22	70,3 ml/rev	105,5	98,8	93,7	2,0	25,8	45,4
	B24	81,1 ml/rev	121,7	115,0	109,9	2,2	29,5	52,1
	B28	90,0 ml/rev	135,0	128,4	123,2	2,3	32,7	57,7
	B31	99,2 ml/rev	148,8	142,2	137,0	2,5	35,9	63,5
	B35	113,4 ml/rev	170,1	163,5	158,3	2,7	40,8	72,3
	B38	120,6 ml/rev	180,9	174,3	169,1	2,9	43,4	76,8
	B42	137,5 ml/rev	206,3	199,6	194,5	3,2	49,3	87,4
	045	145,7 ml/rev	218,6	209,2	202,6 <sup>1)</sup>	4,1	52,8	89,5 <sup>1)</sup>
	050	158,0 ml/rev	237,0	227,7	223,0 <sup>2)</sup>	4,4	57,1	85,0 <sup>2)</sup>

<sup>1)</sup> 045 = 240 bar max. int.      <sup>2)</sup> 050 = 210 bar max. int.

