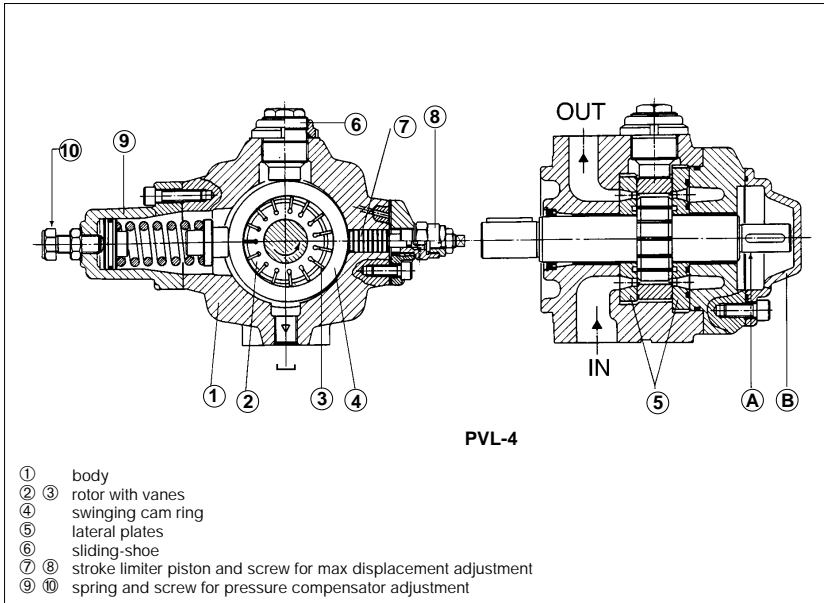


Vane pumps type PVL

variable displacement



PVL are variable displacement vane pumps equipped with mechanical compensator ⑨ for outlet pressure and max displacement adjustment ⑦, ⑧. These low-noise pumps are available in 3 different size, have flange port according to ISO 3019/2 and are designed to operate with anti-wear oil according to DIN 51524...535 and fire-resistant fluids with same lubricating characteristics. Wide variety of displacements: from 11 up to 43 cm³/rev. Max pressure up to 150 bar.

1 MODEL CODE

PVL - **3** **16** / **50** - ******

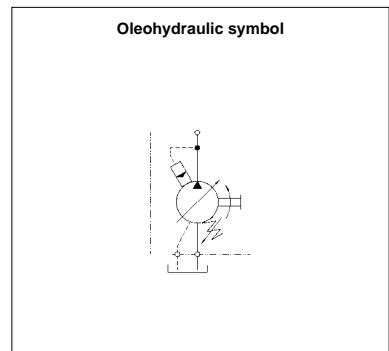
variable displacement vane pump

Conventional dimension:
2
3
4

Conventional displacement according to ISO 3662
10 (dimension 2)
16 (dimension 3)
40 (dimension 4)

Design number

Pressure compensator calibration range:
 - = 30=100 bar
50 = 15=50 bar
150 = 80=150 bar (for PVL-210 only)

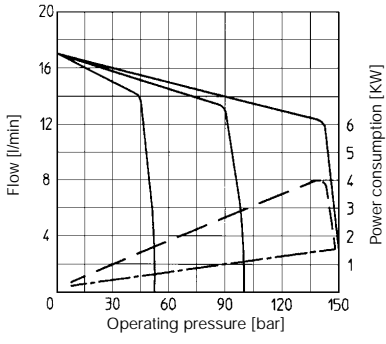


2 MAIN CHARACTERISTICS OF THE PVL VANE PUMP

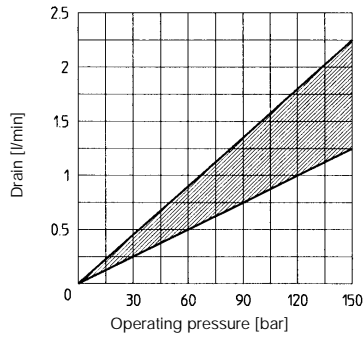
Model	PVL-210	PVL-316	PVL-440
Max displacement [cm ³ /rev]	11	18	43
Flow rate at 1500 rpm and 7 bar [l/min]	16	26	62
Max operating pressure [bar]	150	100	100
Max available torque on first shaft [Nm]	110	197	400
Inlet port	1/2" BSP	1" BSP	SAE flange 1 1/4"
Outlet port	3/8" BSP	3/4" BSP	SAE flange 1"
Drain port	1/4" BSP	3/8" BSP	1/2" BSP
Recommended pressure on inlet port [bar]	0,5 ÷ 1,5		
Max pressure at drain port [bar]	1		
Min/max shaft speed [rpm]	800/1800		
Direction of rotation	Clockwise rotation		
Loads on the shaft	Radial or axial loads on shaft not allowed		
Recommended viscosity	23÷45 mm ² /s at 40°C (ISO VG22-46). For cold start-up and *0" pressure max: 800 mm ² /s		
Fluid contamination class	ISO 19/16 (filters of 25 µm absolute and β ₂₅ ≥ 75)		
Fluid temperature	+70°C		
Drain [l/min]	from 1 to 4 - continuous -		
Installation position	Any. For above oil level installation use a foot valve		

3 DIAGRAMS

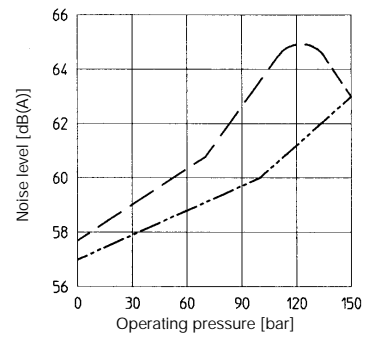
PVL - 210



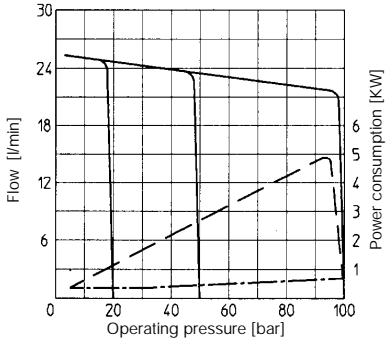
PVL - 210



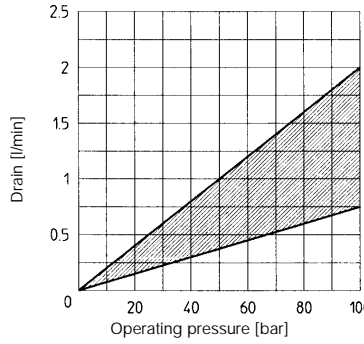
PVL - 210



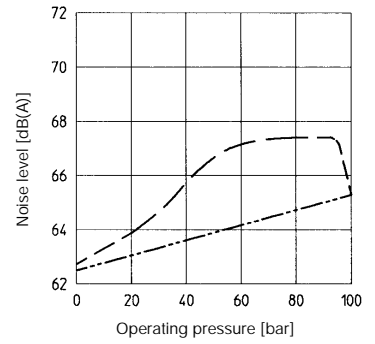
PVL - 316



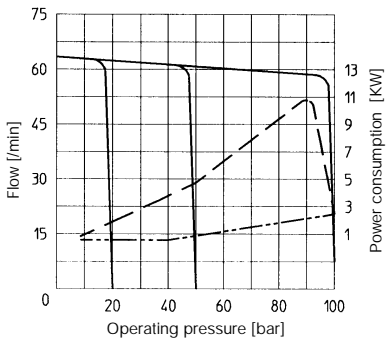
PVL - 316



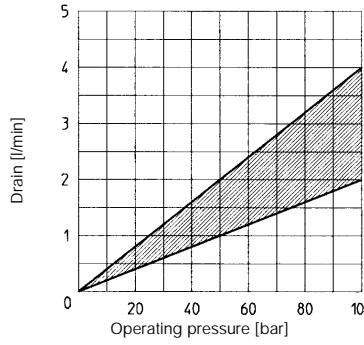
PVL - 316



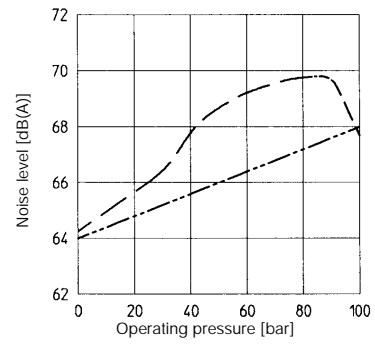
PVL - 440



PVL - 440



PVL - 440



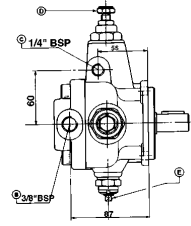
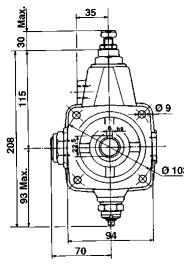
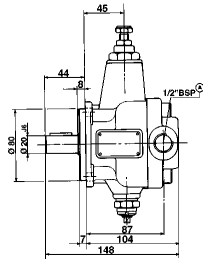
————— Pressure versus flow diagram
 - - - - - Power consumption at max flow rate
 - . - . - Power consumption at null flow rate

Drain in pressure compensation

Noise measured with ambient conditions, according to ISO 4412-1
 - - - - - max. flow
 - . - . - null flow

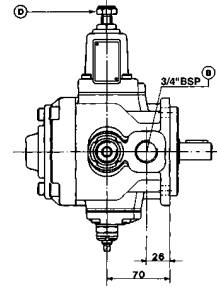
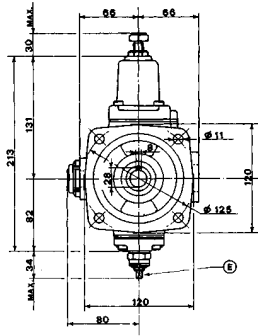
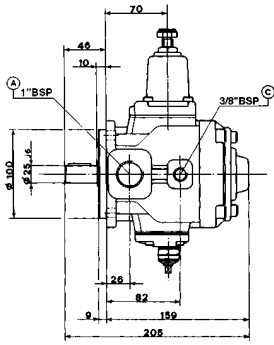
4 INSTALLATION DIMENSIONS [mm]

PVL-210



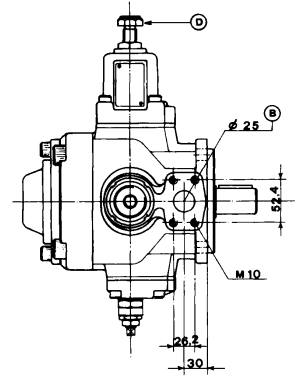
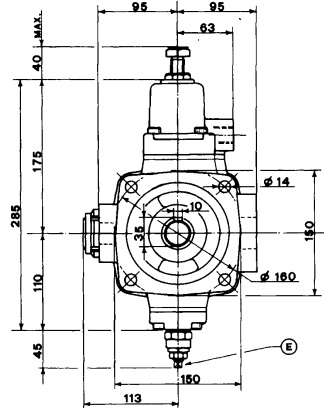
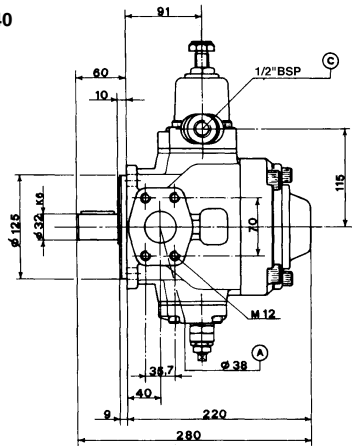
Massa: 6,5 kg

PVL-316



Massa: 12 kg

PVL-440



Massa: 32 kg

- (A) inlet port
- (B) outlet port
- (C) drain port
- (D) screw for pressure compensator adjustment
- (E) screw for max displacement adjustment

See table K120 for flanges available for inlet and outlet ports of pumps PVL-440.