## 1PS60 - Pressure sequence valve

Spool, pilot operated, normally closed, internal pilot, external drain
$60 \mathrm{~L} / \mathrm{min}(16 \mathrm{USgpm}) \cdot 350$ bar (5000 psi)


## Sectional view



Inlet (1)

## Description

Pilot operated models are best suited for higher flows which may vary widely to:

1. Provide ordered or sequenced series of operations as in a clamp and drill circuit.
2. Serve as a relief valve where oil viscosity or restrictions in the downstream line would cause excessive back pressure. The separate spring chamber drain makes the sequence valve insensitive to this back pressure.

## Operation

As in the pilot operated relief, when the setting of the valve is exceeded the pilot section opens.

This pilot flow causes a pressure imbalance opening the main section and allowing flow to a secondary circuit (sequenced line).

## Features

Hardened steel working parts give long, trouble-free life. Selectively matched honed assemblies give accurate performance.

## Performance data

## Ratings and specifications

Figures based on: Oil Temp $=40^{\circ} \mathrm{C}$ Viscosity $=32$ cSt (150 SUS)

| Rated flow | $60 \mathrm{~L} / \mathrm{min}(16 \mathrm{USgpm})$ |
| :--- | ---: |
| Max setting | $350 \mathrm{bar}(5000 \mathrm{psi})$ |

Cartridge material $\quad$ Working parts hardened and ground steel.
Body material Standard aluminium (up to 210 bar* $^{*}$ ).

|  | Add suffix "377" for steel option. |
| :---: | :---: |
| Mounting position | Unrestricted |
| Cavity number | CVA-22-06-0 (See Section M) |
| Torque cartridge into cavity | $60 \mathrm{Nm}(44 \mathrm{lbs} \mathrm{ft})$ |
| Weight | 1 PS60 $\quad 0.16 \mathrm{~kg}(0.35 \mathrm{lbs})$ |
|  | 1 PS65 $\quad 0.50 \mathrm{~kg}(1.10 \mathrm{lbs})$ |
| Seal kit number | SK618 (Nitrile) SK618V (Viton®) |
| Filtration | BS5540/4 Class 18/12 (25 micron nominal) |
| Operating temp | $-30^{\circ} \mathrm{C}$ to $+90^{\circ} \mathrm{C}\left(-22^{\circ} \mathrm{C}\right.$ to $\left.+194^{\circ} \mathrm{F}\right)$ |
| Leakage | 35 milliliters/min @ 280 bar |
| Nominal viscosity range | 5 to 500 cSt |
| Viton is a registered tradema |  |

## Pressure drop curves



## 1PS60 - Pressure sequence valve

Spool, pilot operated, normally closed, internal pilot, external drain 60 L/min (16 USgpm) • 350 bar (5000 psi)


| 1 Basic Code |
| :--- |
| 1PS60 - Cartridge Only |
| 1PS65-Cartridge and Body |
| 2 Adjustment Means |
| P- Leakproof Screw |
| Rdjustment <br> R - Handknob Adjustment <br> Gamperproof Cap (See <br> page E-7 for dimensions) |

Dimensions
mm (inch)

| Code | Port size | Housing number |  |
| :---: | :---: | :---: | :---: |
|  |  | Aluminium Single | Steel Single |
| 3W | 3/8" BSP 1/4" BSP Drain Port | B12751 | B17070 |
| 4W | 1/2" BSP 1/4" BSP Drain Port | B8533 |  |
| 6 T | 3/4" SAE 1/4" SAE Drain Port | B10796 |  |
| $8 T$ | 1/2" SAE 1/4" SAE Drain Port | B10797 | B11802 |

Pressure range @4,8 L/min
Note: Code based on pressure in bar.
10-7-100 bar
Std setting 35 bar
20-10-210 bar
Std setting 100 bar
35-20-350 bar
Std setting 280 bar
Std setting made at 4.8 liters min

## 5 Seals

S - Nitrile (For use with most industrial hydraulic oils)
SV - Viton (For high temperature and most special fluid applications)


Note: For applications above 210 bar please consult our technical department or use the steel body option.

## Complete valve

3/8", 1/2" Ports
Basic Code

1PS65


2 holes Ø9.0 (0.35) thro'


