

Single counterbalance, relief compensated

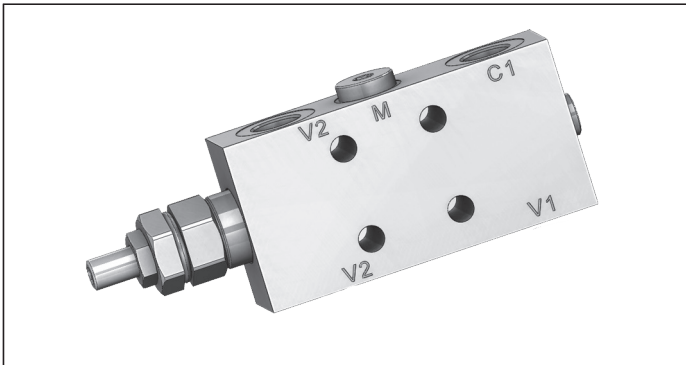
A-VBSO-SE-CC-30-PL-FC1

08.45.19 - X - Y - Z

RE 18307-49

Edition: 03.2016

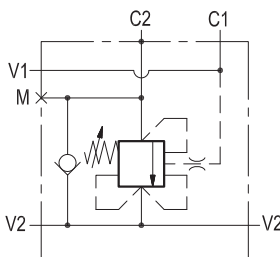
Replaces: 07.2012



Description

When pressure at V2 rises above the spring bias pressure, the check seat is pushed away from the piston and flow is allowed from V2 to C2. When load pressure at C2 rises above the pressure setting, flow is relieved from C2 to V2. With pilot pressure at V1–C1, the pressure setting is reduced in proportion to the stated ratio of the valve, until opening and allowing flow from C2 to V2. The spring chamber is drained to V2. The valve applies a balanced piston and relief is operated at the valve setting independent of back-pressure at V2. However, the piloted opening of the valve remains subject to additive pressure at port V2. For safety and compactness, the C2 port is gasket mounted the actuator.

Note: port identified with M are not protected with calibrated orifice but in direct connection with pressure channels.



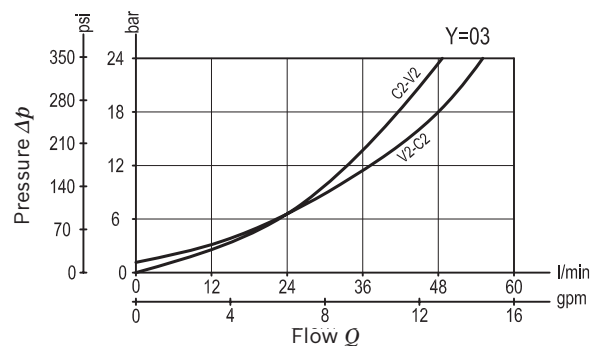
Technical data

| | |
|---|---|
| Max. operating pressure | 410 bar (5945 psi) |
| Max. flow | 60 l/min. (16 gpm) |
| Weight | see "Dimensions" |
| Manifold material | Zinc plated steel |
| Flange seal kit ¹⁾ | E00000000000056 (R930060579) |
| Fluid | Mineral oil (HL, HLP) according DIN 51524 |
| Fluid temperature range | -30 °C to 100 (-22 to 212 °F) |
| Viscosity range | 5 to 800 mm ² /s (cSt) |
| Recommended degree of fluid contamination | Class 19/17/14 according to ISO 4406 |
| MTTFd | 150 years see data sheet 18350-51 |
| Other technical data | see data sheet 18350-50 |
| Relief setting: at least 1.3 times the highest expected load. | |

Note: for applications outside these parameters, please consult us.

¹⁾ Seals for 10 valves.

Characteristic curve



Ordering code

| | | | |
|-----------------|----------|----------|----------|
| 08.45.19 | X | Y | Z |
|-----------------|----------|----------|----------|

Single counterbalance,
relief compensated

Pilot ratio

03 4.2 : 1

| Port sizes | V1 - V2 - C1 | C2 | M |
|------------|--------------|------------|-------|
| 02 | G 3/8 | ∅ 9 (0.35) | G 1/4 |
| 03 | G 1/2 | ∅ 9 (0.35) | G 1/4 |

| SPRINGS | | | |
|-----------|-------------------------------|------------------------------------|------------------------------------|
| | Adj. pressure range bar (psi) | Pres. increase bar/turn (psi/turn) | Std. setting Q=5 (l/min) bar (psi) |
| 20 | 60-210 (870-3000) | 75 (1088) | 200 (2900) |
| 35 | 100-350 (1450-5000) | 165 (2393) | 350 (5000) |

Pressure setting up to 410 bar: code on request.

Tamper resistant cap code ordering code 11.04.23.003
Mat. no. R930000754

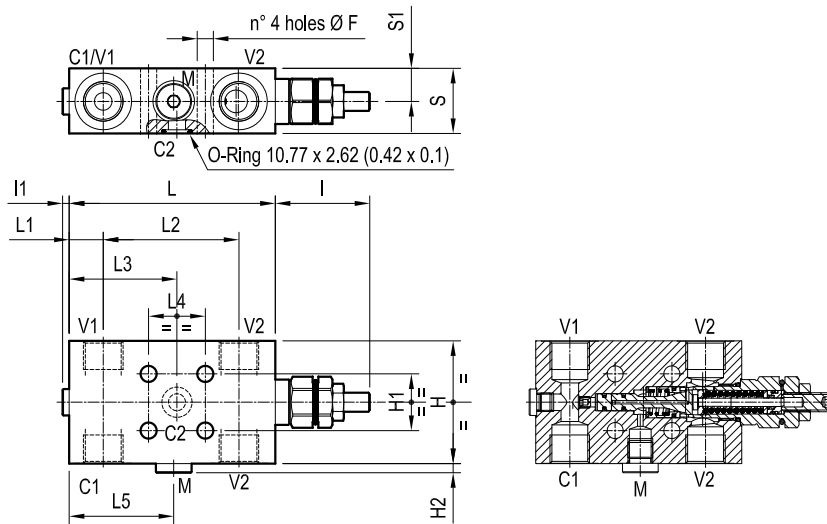


Preferred types

| Type | Material number |
|-----------------|-----------------|
| 08451903022000A | R930050435 |
| 08451903023500B | R930006213 |
| 08451903032000A | R930007175 |
| 08451903033500B | R930007174 |

| Type | Material number |
|------|-----------------|
| | |
| | |
| | |
| | |

Dimensions



| | | | | | | | | | | | | | | | |
|-------------|-------------|-------------|-----------|-------------|-------------|-------------|------------|------------|-----------|---------|-----------|-----------|------------|-------|-----------------|
| 17.5 (0.69) | 34.5 (1.36) | 53.7 (2.11) | 30 (1.18) | 52 (2.05) | 70.3 (2.77) | 19.2 (0.76) | 109 (4.29) | 4.5 (0.18) | 50 (1.97) | 5 (0.2) | 30 (1.18) | 65 (2.56) | 8.5 (0.34) | G 1/2 | 1.81 (3.99) |
| 15 (0.59) | 29.5 (1.16) | 51.7 (2.04) | 30 (1.18) | 51.7 (2.04) | 70.3 (2.77) | 20.7 (0.82) | 109 (4.29) | 4.5 (0.18) | 50 (1.97) | 5 (0.2) | 30 (1.18) | 55 (2.17) | 8.5 (0.34) | G 3/8 | 1.29 (2.84) |
| S | S | L5 | L4 | L3 | L2 | L1 | L | I1 | I | H2 | H1 | H | F | Y | Weight kg (lbs) |