# Oleodinamica Marchesini V0489/V180 single-branch motor relief valve

Manufacturer: Oleodinamica Marchesini

Manufacturer part number / published order designation: V0489/V180

Published model: V0489/V180

## About this compilation

Prepared by Hydmaster from selected manufacturer documentation. Original technical pages follow without cropped drawings, rewritten data or altered units. This cover and index are Hydmaster editorial material, not a manufacturer-issued exact-execution datasheet.

Coverage: selected pages relevant to the identified size and configuration. Other options or neighbouring models retained on an original page apply only where explicitly identified.

## Execution notes and conditions

Selected spring range not printed in exact supplier type; no numeric range/preset inferred from suffix.

Exact actually offered fullcode + primary original circuit/option legend, never ordering-matrix expansion. Base circuit row mass qualified; no preset or option envelope invented.

## Source-page index

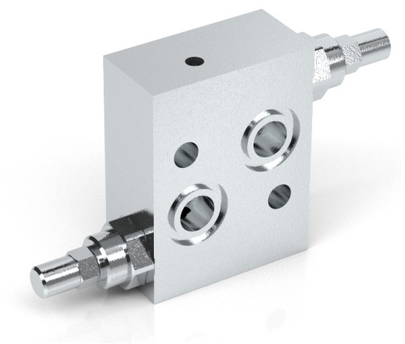
Source page numbers below are physical pages of each complete original PDF. The original printed page labels and technical content remain unchanged. Compiled page numbers count this cover/index.

## Source A: Oleodinamica Marchesini VAU OMS exact circuit execution reference

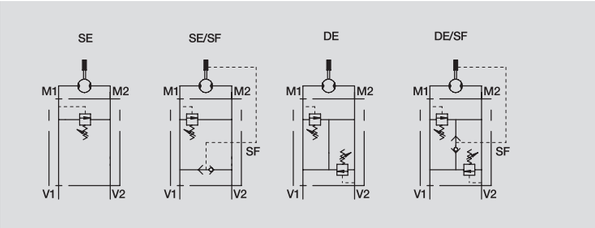
| Original pages | Compiled pages | Relevant content |
|---|---|---|
| 1 | 2 | Original matching SE/DE/SF circuit row, spring and adjustment legends, port table and interface drawing |

# VALVOLE ANTIURTO FLANGIABILI SU MOTORI DANFOSS SERIE OMS

## DUAL CROSS LINE RELIEF VALVES FLANGEABLE ON DANFOSS MOTORS OMS

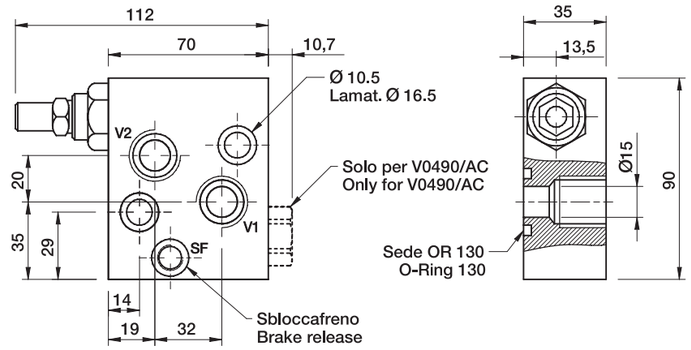


SCHEMA IDRAULICO
HYDRAULIC DIAGRAM

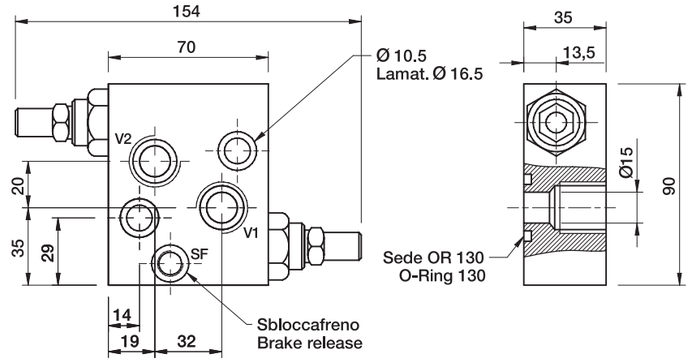



| CODICE<br>CODE | SIGLA<br>TYPE | PORTATA MAX<br>MAX FLOW<br>l/min | PRESSIONE MAX<br>MAX PRESSURE<br>Bar |
|---|---|---|---|
| **V0489** | VAU 1/2" SE OMS | 50 | 350 |
| **V0489/SF** | VAU 1/2" SE OMS SF | 50 | 350 |
| **V0490** | VAU 1/2" DE OMS | 50 | 350 |
| **V0490/SF** | VAU 1/2" DE OMS SF | 50 | 350 |
| **V0490/AC** | VAU 1/2" OMS AC | 50 | 350 |

V0489
V0489/SF
V0490/AC




V0490
V0490/SF




**IMPIEGO:**
Costituite da due valvole di massima pressione con scarico incrociato, sono utilizzate per limitare la pressione in uno (SE) o entrambi i rami di un motore (DE). La flangiatura diretta, adatta per motori Danfoss della serie OMS, garantisce la massima sicurezza, minime perdite di carico e compattezza d'installazione.

**MATERIALI E CARATTERISTICHE:**
Corpo: acciaio zincato.
Componenti interni: acciaio temprato termicamente e rettificato.
Guarnizioni: BUNA N standard.
Tenuta: a cono guidato. Trafilamento trascurabile.

**MONTAGGIO:**
Flangiare M1 e M2 al motore e collegare le bocche V1 e V2 all'alimentazione.

**A RICHIESTA**
- molle per diversi campi di taratura (vedi tabella)
- pressione di taratura diversa da quella standard (CODICE/T000 specificando il valore di taratura)

PRESSIONE / PORTATA
PRESSURE / FLOW

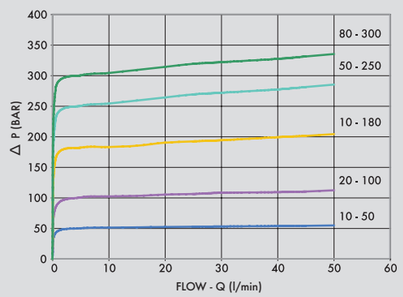
**USE AND OPERATION:**
Made up by two cross port relief valves, these valves are used to limit the pressure in the both (DE) or one (SE) ports of a hydraulic motor to a certain setting.
Direct flange mounting for Danfoss motors type OMS provides maximum safety, very low pressure drop and a robust installation.

**MATERIALS AND FEATURES:**
Body: zinc-plated steel.
Internal parts: hardened and ground steel.
Seals: BUNA N standard.
Leakage: Guided poppet - negligible leakage.

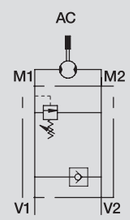
**CONNECTIONS:**
Flange M1 and M2 directly to the motor and connect ports V1 and V2 to the supply.

**ON REQUEST**
- different setting range (see the table)
- other setting available (CODE/T000 please specify the desired setting)

Temperatura olio: 50°C - Viscosità olio: 30 cSt
Oil temperature: 50° C - Oil viscosity: 30 cSt




SCHEMA IDRAULICO (con anticavitazione - AC)
HYDRAULIC DIAGRAM (with anticavitation - AC)




| CODICE<br>CODE | SIGLA<br>TYPE | V1 - V2<br>GAS | SF<br>GAS | PESO/<br>WEIGHT<br>Kg |
|---|---|---|---|---|
| **V0489** | VAU 1/2" SE OMS | G 1/2" | - | 1,462 |
| **V0489/SF** | VAU 1/2" SE OMS SF | G 1/2" | G 1/8" | 1,389 |
| **V0490** | VAU 1/2" DE OMS | G 1/2" | - | 1,326 |
| **V0490/SF** | VAU 1/2" DE OMS SF | G 1/2" | G 1/8" | 1,326 |
| **V0490/AC** | VAU 1/2" OMS AC | G 1/2" | - | 1,417 |

**MOLLE - SPRINGS**

| Campo di taratura<br>Setting range (bar) | Incremento bar per giro<br>Pressure increase (bar/turn)<br>Q= 4l/min | Taratura standard<br>Standard setting<br>(bar) |
|---|---|---|
| 10-50* | 5 | 30 |
| 20-100 | 15 | 75 |
| 10-180 standard | 30 | 90 |
| 50-250 | 45 | 130 |
| 80-300 | 60 | 150 |

*Per tarature inferiori a 70 Bar: Q = 12 l/min *For setting less than 70 Bar: Q = 12 l/min

**REGOLAZIONE - ADJUSTEMENT**

| | | |
|---|---|---|
| CODICE/V • CODE/V | Volantino | • Handknob |
| CODICE/PP • CODE/PP | Predisposizione alla piombatura | • Arranged for sealing cap |
| CODICE/P • CODE/P | Piombatura | • Sealing cap |