Oleodinamica Marchesini V0380 VRAP 110/130 DE + VMP plough overturning valve

Manufacturer: Oleodinamica Marchesini

Manufacturer part number / published order designation: V0380

Published model: V0380

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

Exact supplier-offered code, not a generated pressure-setting option.

Manufacturer photo represents the series.

No operating temperature range inferred from 50C curve conditions.

Source-page index

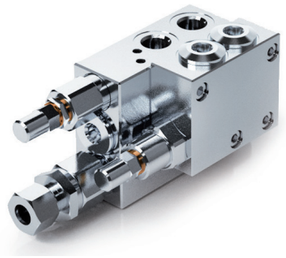
Source page numbers below are physical pages of each complete original PDF. The original printed page labels and technical content remain unchanged. Compiled page numbers count this cover/index.

Source A: Oleodinamica Marchesini VRAP DE + VMP technical datasheet

Original pages	Compiled pages	Relevant content
1	2	Complete applicable manufacturer article table, circuit, ratings, installation and dimensions

VALVOLE DI RIBALTAMENTO ARATRO A DOPPIO EFFETTO CON VALVOLA DI MASSIMA PRESSIONE

DOUBLE ACTING PLOUGH OVERTURNING VALVES WITH RELIEF VALVE

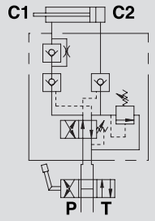


IMPIEGO:
Valvola realizzata per l'impiego su cilindri per aratri reversibili, in modo da ottenere l'inversione automatica del flusso d'olio e quindi del moto del cilindro idraulico atto a portare in rotazione l'aratro. È dotata, oltre che di valvola di blocco a doppio effetto, anche di valvola di massima pressione: questo permette di ridurre la pressione nella spinta (parte del fondello) in modo da non danneggiare i fermi meccanici e la testata dell'aratro. L'inversione di marcia dell'asta del pistone si effettua tramite una valvola di massima pressione compensata esattamente nel punto morto dell'aratro, sviluppando maggiore potenza e velocità.
È indicata per il montaggio su aratri pesanti e sbilanciati con cilindri aventi i seguenti diametri interni: 40/50, 60/80, 80/100, 100/110 e 110/130 mm.

MATERIALI E CARATTERISTICHE:
Corpo: acciaio zincato.
Componenti interni: acciaio temprato termicamente e rettificato.
Guarnizioni: BUNA N standard.
Tenuta: a cono guidato. Non ammette trafilamenti
Le valvole vengono fornite con pressione di scambio di circa 150 Bar: a seconda delle varie esigenze la pressione di scambio può essere variata agendo sul regolatore di pressione. La valvola di massima pressione è tarata a 90 Bar.

MONTAGGIO:
Collegare C1 allo stelo del cilindro, C2 al fondello e P e T alle prese macchina. Data la particolare configurazione, queste valvole possono essere montate in linea sul cilindro idraulico o fissate direttamente alla struttura dell'aratro tramite il foro filettato ricavato nel corpo.

SCHEMA IDRAULICO
HYDRAULIC DIAGRAM

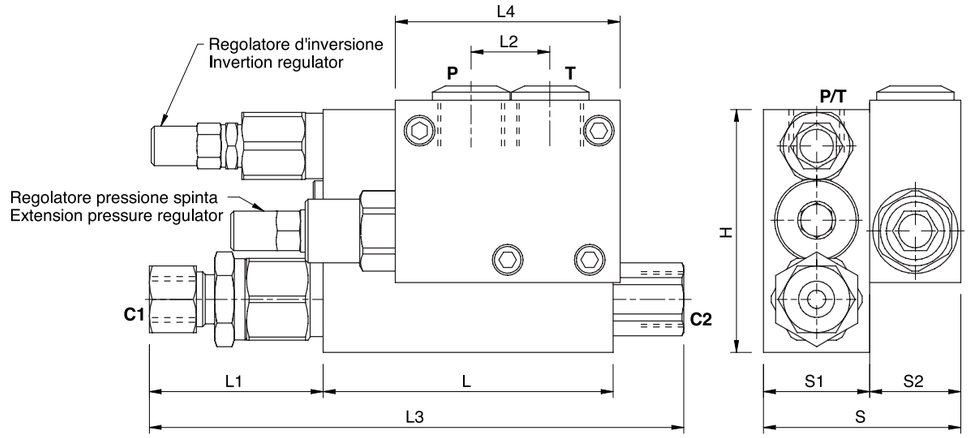


USE AND OPERATION:
This valve has been designed for use on cylinders for reversible ploughs to obtain the automatic oil flow reversal, and therefore the reversal of the hydraulic cylinder which rotates the plough. As well as a double pilot operated check valve it is provided with a maximum relief valve which reduces the pressure of cylinder extension (head side pressure) in order to protect the mechanical stops and the plough's structure. The reversal of the cylinder is controlled by a pressure compensated relief valve set to exactly in the dead head point of the plough, generating more power and speed.
It can be assembled on heavy and unbalanced ploughs with cylinders with the following internal diameters: 40/50, 60/80, 80/100, 100/110, 110/130 mm.

MATERIALS AND FEATURES:
Body: zinc-plated steel.
Internal parts: hardened and ground steel.
Seals: BUNA N standard.
Load holding: guided poppet, negligible leakage.
These valves are supplied with exchange pressure at about 150 Bar: according to your requirements, pressure setting can be modified by adjusting the pressure regulator.
Relief valve is set at 90 Bar.

CONNECTIONS:
Connect C1 to the cylinder's rod side, C2 to the head side, P and T to the machine's suply. Thanks to its shape, it can beassembled in-line on the hydraulic cylinder or directly fixed onto the plough by the threaded hole in the valve body.

CODICE CODE	SIGLA TYPE	PRESSIONE MASSIMA DI SCAMBIO MAX EXCHANGE PRESSURE Bar	PRESSIONE MAX MAX PRESSURE Bar
V0348	VRAP 40/50 DE + VMP	250	250
V0350	VRAP 60/80 DE + VMP	250	400
V0360	VRAP 80/100 DE + VMP	250	400
V0376	VRAP 100/110 DE + VMP	250	400
V0380	VRAP 110/130 DE + VMP	250	400



CODICE CODE	SIGLA TYPE	C2 P - T GAS	C1 mm	L mm	L1 mm	L2 mm	L3 mm	L4 mm	H mm	S1 mm	S2 mm	S mm	PESO WEIGHT Kg.
V0348	VRAP 40/50 DE + VMP	G 3/8"	Ø12	95	58	30	176	72	80	35	30	65	3,200
V0350	VRAP 60/80 DE + VMP	G 3/8"	Ø12	95	58	30	176	72	80	35	30	65	3,200
V0360	VRAP 80/100 DE + VMP	G 3/8"	Ø12	95	58	30	176	72	80	35	30	65	3,190
V0376	VRAP 100/110 DE + VMP	G 3/8"	Ø12	95	58	30	176	72	80	35	30	65	3,190
V0380	VRAP 110/130 DE + VMP	G 3/8"	Ø12	95	58	30	176	72	80	35	30	65	3,160