



MOUNTING INTERFACES



ZC2 BALANCING VALVES SERIES 51

SUBPLATE MOUNTING ISO 4401-03

p max 350 bar Q max 25 l/min

OPERATING PRINCIPLE



- The type ZC2 balancing valves act as pressure reducing valves that, besides reducing the pressure from line P to user A, allow the flow to return from user A to discharge T when a pressure greater than the set value is generated in the downstream circuit (user A). (A typical case of hydraulic counterweight or load balancing)
- They have a mounting surface in accordance with ISO 4401 standards. Port B is never used.

PERFORMANCES (measured with mineral oil of viscosity 36 cSt at 50°C)

Maximum operating pressure	bar	350
Maximum flow rate	l/min	25
Ambient temperature range	°C	-20 / +60
Fluid temperature range	°C	-20 / +80
Fluid viscosity range	cSt	10 ÷ 400
Fluid contamination degree	According to ISO 4406:1999 class 20/18/15	
Recommended viscosity	cSt	25
Mass	kg	1,3

HYDRAULIC SYMBOL



24 300/117 ED

1 - IDENTIFICATION CODE



2 - CHARACTERISTIC CURVES

(values obtained with viscosity of 36 cSt at 50°C)



4 - ZC2 OVERALL AND MOUNTING DIMENSIONS

3 - HYDRAULIC FLUIDS

Use mineral oil-based hydraulic fluids HL or HM type, according to ISO 6743-4. For these fluids, use NBR seals. For fluids HFDR type (phosphate esters) use FPM seals (code V). For the use of other kinds of fluid such as HFA, HFB, HFC, please consult our technical department.

Using fluids at temperatures higher than 80 °C causes a faster degradation of the fluid and of the seals characteristics. The fluid must be preserved in its physical and chemical characteristics.



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9 - INSTALLATION

The ZC2 valves can be installed in any position without impairing correct operation.

Valves are fixed by means of screws or tie rods on a flat surface with planarity and roughness equal to or better than those indicated in the relative symbols. If minimum values are not observed, fluid can easily leak between the valve and support surface.



6 - FASTENING BOLTS

Fastening bolts are delivered with the valve.

N. 4 bolts M5x55	
Tightening torque: 5 Nm (A 8.8 screws)	

7 - SUBPLATES (see cat. 51 000)

Type PMMD-AI3G ports on rear 3/8" BSP

Type PMMD-AL3G side ports 3/8" BSP



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