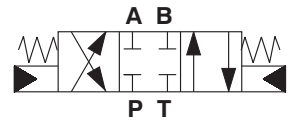


- 4/3, 4/2 way spool type directional valves hydraulic operated



- Installation dimensions to DIN 24 340 / ISO 4401 / CETOP RP121-H

- Connecting threads M10x1, G1/8



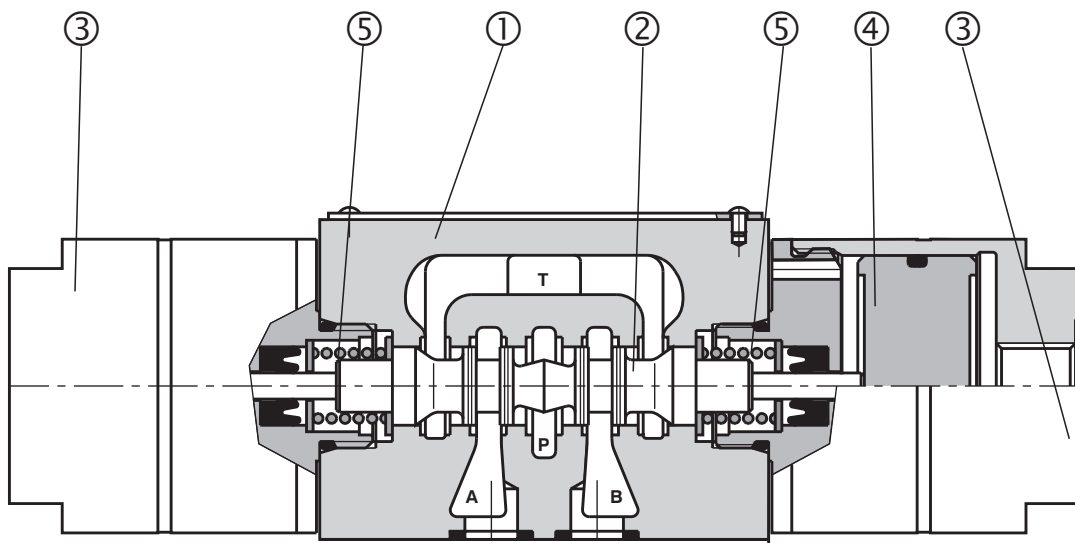
## Functional Description

The directional control valves are of modular design and comprise a housing (1) with a cylindrical spool (2) and one or two operating elements (3) consisting of hydraulic pistons (4) and return spring (5).

Three-position directional valves are fitted with two hydraulic operating elements and two centering

springs. Two-position directional valves have only one hydraulic operating element and one springs.

The basic surface treatment of the valve housing is phosphate.



## Ordering Code

RPH3-06   /

**Hydraulic Operated Directional Control Valve**

**Nominal size**

**Number of operating positions**

two positions

three positions

**2**  
**3**

**Functional symbols**

see the table functional symbols

no designation

**V**

**Seals**

NBR

FPM (Viton)

**Model**

Hydraulic

Pneumatic

**1**  
**2**

**Connecting threads**

M10x1

G1/8

**1**  
**2**

## Technical Data

Valve size	mm(US)	06
Maximum flow (according to pressure and functional symbols)	L/min (GPM)	see p-Q characteristics
Maximum operating pressure at ports P, A, B	bar (PSI)	350 (5076)
Maximum operating pressure at port T	bar (PSI)	160 (2321)
Minimum pilot pressure	bar (PSI)	2 (29)
Maximum pilot pressure	bar (PSI)	25 (362.6)
Pilot volume	cm <sup>3</sup> (cu.in.)	6,2 (0,378)
Pressure drop	bar (PSI)	see Δp-Q characteristics
Hydraulic fluid		Hydraulic oils of power classes (HL, HLP) to DIN 51524
Fluid temperature range for standard sealing (NBR)	°C (°F)	-30 ... +100 (-22 ... +21)
Fluid temperature range for Viton seals (FPM)	°C (°F)	-20 ... +120 (-4 ... +248)
Viscosity range	mm <sup>2</sup> /s (SUS)	20 ... 400 (98 ... 1840)
Maximum degree of fluid contamination		Class 21/18/15 to ISO 4406
Service life	cycles	10 <sup>7</sup>
Weight valve with 1 actuator valve with 2 actuators	kg (lbs)	1,8 (3.96) 2,5 (5.50)
Mounting position		unrestricted

## Spare Parts

### Seal kit

Type	Dimensions, number		Ordering number
Standard NBR	9,25 x 1,68 NBR70 (4 pcs.)	17 x 1,8 (2 pcs.)	15845200
Viton	9,25 x 1,78 (4 pcs.)	17,17 x 1,78 (2 pcs.)	15845400

### Mounting bolts

Dimensions, number	Tightening torque	Ordering number
M5 x 45 DIN 912-10.9 (4 pcs.)	8.9 Nm (6.6 ft-lbf)	15845100

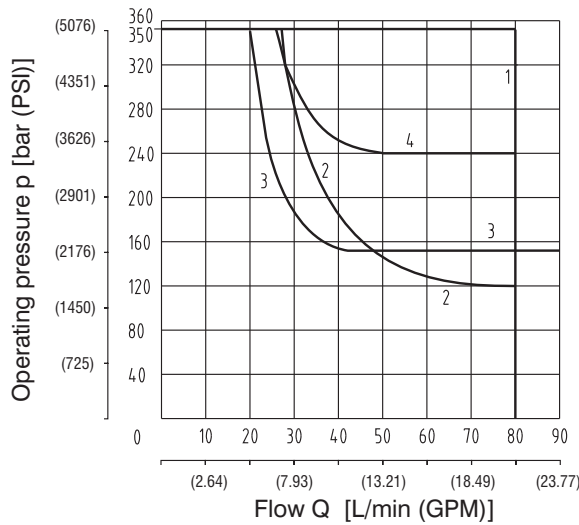
# Functional Symbols

Three position directional valves RPH3-063			Two position directional valves RPH3-062		
Type	Symbol	Crossover	Type	Symbol	Crossover
Z11			R11		
C11			A51		
H11			P51		
P11			Y51		
Y11			X11		
L21			J15		
B11			J75		

## p-Q Characteristics

Measured at  $v = 32 \text{ mm}^2/\text{s}$  (156 SUS)

Operating limits for maximum hydraulic power transferred by the directional valve. Measured by steering pressure 2 bar (29 PSI). For respective spool type - see Functional Symbols.

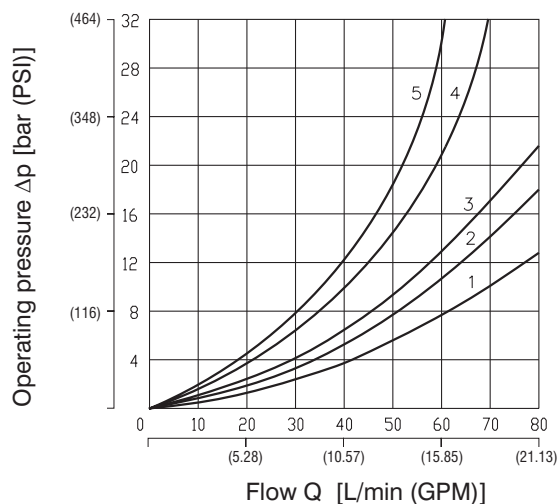


Z11	1
C11	2
H11	3
P11	1
Y11	1
L21	4
B11	1
R11	1
A51	1
P51	1
Y51	2
X11	1
J15	1
J75	1

## $\Delta p$ -Q Characteristics

Measured at  $v = 32 \text{ mm}^2/\text{s}$  (156 SUS)

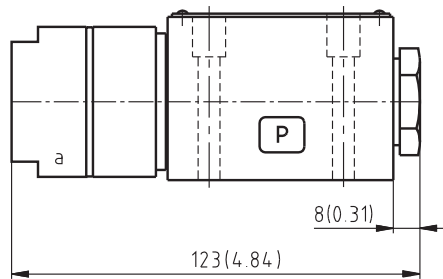
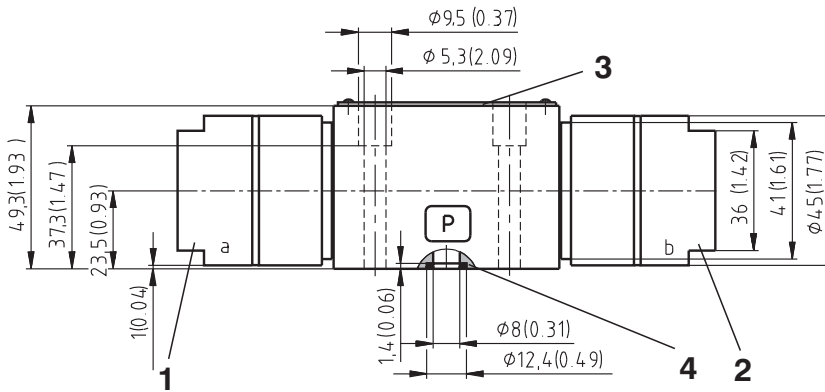
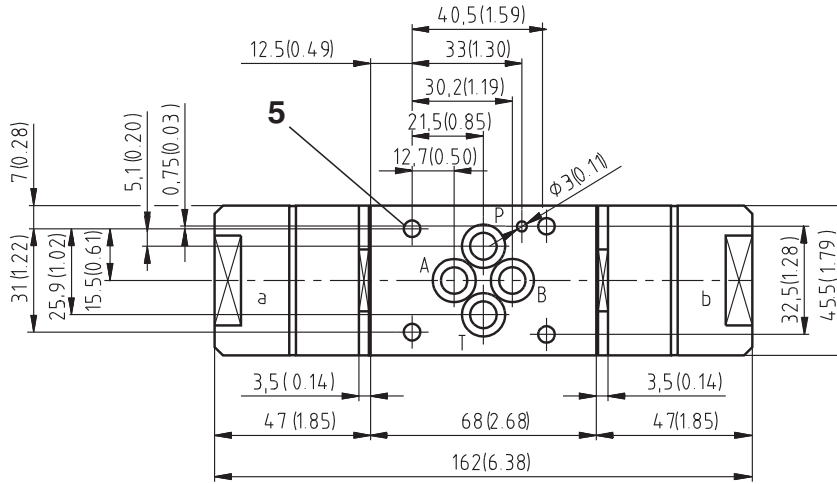
Pressure drop  $\Delta p$  related to flow rate.



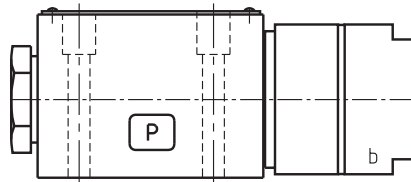
	P-A	P-B	A-T	B-T	P-T
Z11	2	2	3	3	
C11	4	4	4	5	3
H11	2	2	2	2	3
P11	1	1	3	3	
Y11	2	2	2	2	
L21	2	2	3	3	
B11	2	2	3	3	
R11	2	2	3	3	
A51	2	2			
P51		1	3		
Y51		2	2		
X11	2	2	3	3	
J15	2	2	3	3	
J75	2	2			

# Valve Dimensions

Dimensions in millimeters (inches)



Required surface finish of interface



- 1 Operating element 1
- 2 Operating element 2
- 3 Name plate
- 4 Square ring 9.25 x 1.68 (4 pcs.)  
supplied with each valve
- 5 4 mounting holes

## Caution!

- For applications outside the given parameters, please consult us.
- Other for spool symbols on request.
- The packing foil is recyclable.
- The protective plate can be returned to manufacturer.
- Mounting screws M5 x 45 DIN 912-10.9 or bolts must be ordered separately.  
The screws tightening torque is 8.9 Nm (6.6 ft-lbs).
- The technical information regarding the product presented in this catalogue is for descriptive purposes only. It should not be construed in any case as a guaranteed representation of the product properties in the sense of the law.

ARGO-HYTOS s.r.o. CZ - 543 15 Vrchlaví  
 Tel.: +420-499-403111, Fax: +420-499-403421  
 E-mail: sales.cz@argo-hytos.com  
 www.argo-hytos.com