



**DIPLOMATIC  
HYDRAULICS**

21 310/104 ED



# RQM\*-P

## SOLENOID OPERATED PRESSURE RELIEF VALVES WITH UNLOADING AND PRESSURE SELECTION SERIES 60

### SUBPLATE MOUNTING:

**RQM3-P** CETOP R06

**RQM5-P** CETOP R08

**RQM7-P** CETOP R10

### OPERATING PRINCIPLE

- The RQM\*-P valves are pressure relief valves available in three nominal sizes for flow up to 500 l/min.
- They are available in CETOP subplate mounting version.
- Available in five versions that allow, by means of a solenoid valve, unloading of the total flow and selection up to three pressure values (see table 2 Versions).
- The adjustment of the second and third pressure values is obtained by a pressure relief valve placed between the main stage and the solenoid valve.
- It is normally supplied with a hexagonal head adjustment screw. Upon request, it can be equipped with a SICBLOC adjustment knob on the main pressure control.

PERFORMANCE RATINGS (measured with mineral oil of viscosity 36 cSt at 50°C)		RQM3-P	RQM5-P	RQM7-P
Maximum operating pressure	bar	350		
Maximum flow rate	l/min	200	400	500
Ambient temperature range	°C	-20 ÷ +50		
Fluid temperature range	°C	-20 ÷ +70		
Fluid viscosity range	cSt	10 ÷ 400		
Recommended viscosity	cSt	25		
Degree of fluid contamination	According to NAS 1638 class 10			

**NOTE:** for the solenoid valve DS3 characteristics see catalogue 41 150



# RQM\*-P

## SERIES 60

### 1 - IDENTIFICATION CODE

<b>R</b>	<b>Q</b>	<b>M</b>	<b>-</b>	<b>P</b>	<b>/</b>	<b>/</b>	<b>/</b>	<b>60</b>	<b>-</b>	<b>K1</b>	<b>/</b>
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pilot operated pressure relief valve

solenoid valve for unloading/pressure selection

Size: **3** = CETOP R06  
**5** = CETOP R08  
**7** = CETOP R10

Subplate mounting

Pressure adjustment range:  
**3** = up to 70 bar    **6** = up to 350 bar  
**5** = up to 210 bar

Versions: **A** } see description in hydraulic symbols table  
**B** }  
**C** }  
**D** }  
**G** }

**M** = adjustment with SICBLOC knob available only on the main pressure control (Omit for adjustment with hexagonal head screw)

Series No. (the overall and mounting dimensions remain unchanged from 60 to 69)

Manual override: omit for override integrated in the tube (**standard**)  
**CM** = manual override, boot protected

Coil electrical connection: plug for connector type DIN 43650 (**standard**)

DC power supply  
**D12** = 12 V  
**D24** = 24 V  
**D48** = 48 V  
**D110** = 110 V  
**D220** = 220 V  
**D00** = valve without coils (see note)

AC power supply  
**A24** = 24 V - 50 Hz  
**A48** = 48 V - 50 Hz  
**A110** = 110 V - 50 Hz / 120 V - 60 Hz  
**A230** = 230 V - 50 Hz / 240 V - 60 Hz  
**A00** = valve without coils (see note)

**F110** = 110 V - 60 Hz  
**F220** = 220 V - 60 Hz

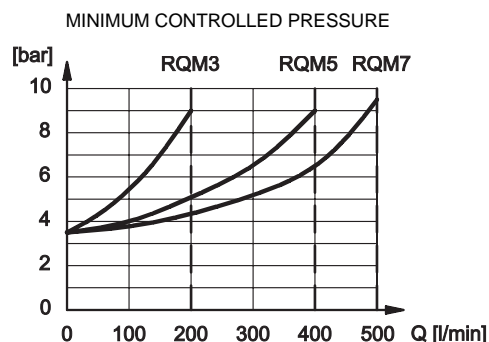
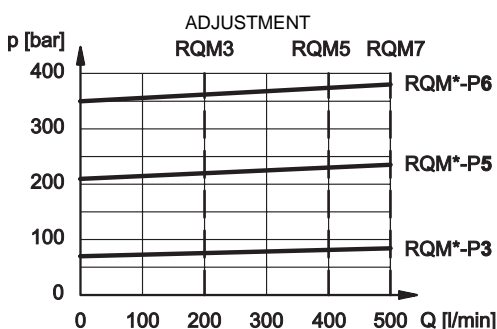
Seals:  
**N** = NBR seals for mineral oil (**standard**)  
**V** = FPM seals for special fluids

**NOTE:** The locking rings of the coils and the relevant O-Rings are supplied together with valves

### 2 - VERSIONS

<p>RQM*-P*/A</p> <p><b>1 pressure setting and unloading with de-energized solenoid</b></p>	<p>RQM*-P*/B</p> <p><b>1 pressure setting and unloading with energized solenoid</b></p>	<p>RQM*-P*/C</p> <p><b>2 pressure settings</b> The highest setting is reached with energized solenoid</p>	<p>RQM*-P*/D</p> <p><b>2 pressure settings and unloading with de-energized solenoids</b></p>	<p>RQM*-P*/G</p> <p><b>3 pressure settings</b> The highest setting is reached with de-energized solenoids</p>
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### 3 - CHARACTERISTIC CURVES (values obtained with viscosity of 36 cSt at 50°C)

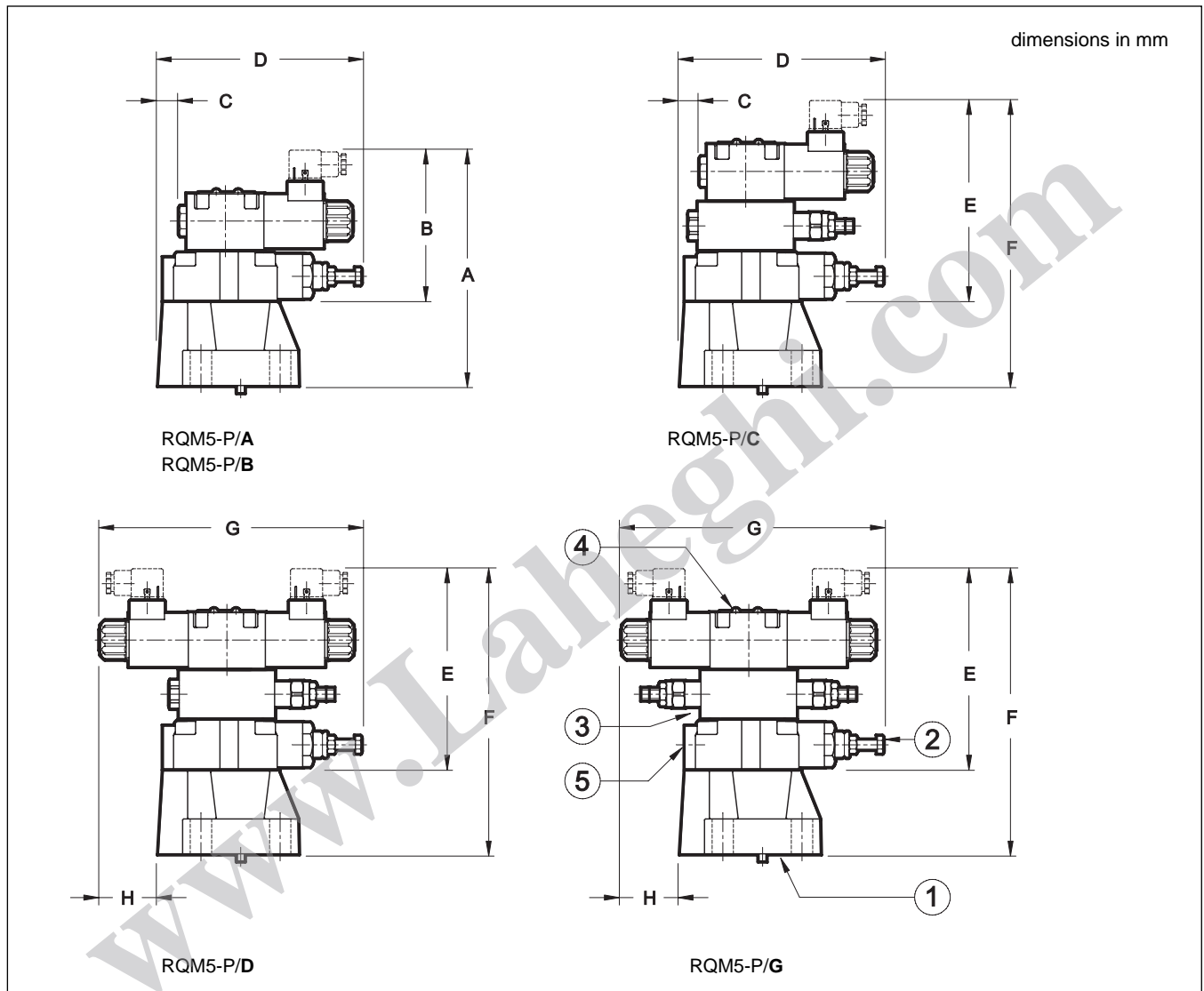




## 4 - HYDRAULIC FLUIDS

Use mineral oil-based hydraulic fluids, with the addition of suitable anti-frothing and anti-oxidizing agents.  
For the use of other types (water glycol, phosphate esters and others), please consult our technical department.

## 5 - OVERALL AND MOUNTING DIMENSIONS

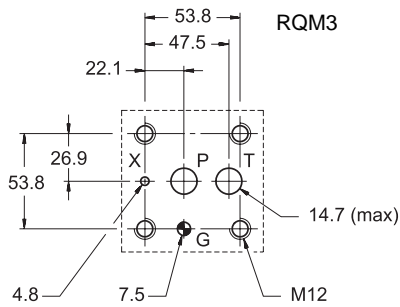


1	Mounting surface. For fastening bolts and sealing rings see par. 10	3	Second value pressure adjustment valve. Countersunk hex adjustment screw: Spanner 5 Clockwise rotation to increase pressure
		4	CETOP 03 solenoid valve for pressure selection / unloading
2	Hexagonal head main pressure adjustment screw: Spanner 13 Clockwise rotation to increase pressure	5	Pressure gauge port 3/8" NPT

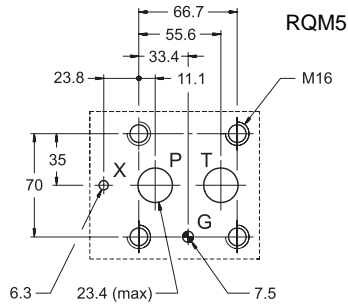
	A	B	C	D	E	F	G	H
<b>RQM3</b>	186	126	22	179	164	226	223	44
<b>RQM5</b>	196	126	14	170	164	236	222	52
<b>RQM7</b>	206	126	25	180	164	246	221	41



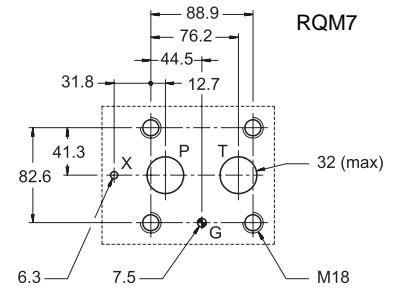
### 6 - MOUNTING INTERFACES



CETOP 4.4.2-2-R06-350



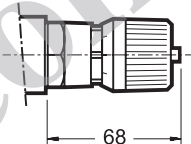
CETOP 4.4.2-2-R08-350



CETOP 4.4.2-2-R10-350

### 7 - ADJUSTMENT KNOB

The RQ valves can be equipped with a SICBLOC adjustment knob, only on the main pressure regulation. To operate it, push and rotate at the same time. To request this option, add: /M (see par.1).



### 8 - ELECTRIC CONNECTORS

The solenoid valves are never supplied with connector.

Connectors must be ordered separately.

For the identification of the connector type to be ordered, please see catalogue 49 000.

### 9 - MANUAL OVERRIDE, BOOT PROTECTED: CM

Whenever the solenoid valve installation may involve exposure to atmospheric agents or utilization in tropical climates, use of the manual override, boot protected is recommended. Add the suffix **CM** to request this device (see par. 1). For overall dimensions see catalogue 41 150.

### 10 - FASTENING BOLTS AND SEALING RINGS

	RQM3-P	RQM5	RQM7
Fastening (4 bolts)	M12 x 40	M16 x 50	M18 x 60
Torque	69 Nm	170 Nm	235 Nm
Sealing rings	2 OR type 123 1 OR type 109	2 OR type 3118 1 OR type 109	2 OR type 4137 1 OR type 109

### 11 - SUBPLATES (see catalogue 51 000)

	RQM3-P	RQM5-P	RQM7-P
Type	PMRQ3-AI4G rear ports	PMRQ5-AI5G rear ports	PMRQ7-AI7G rear ports
PT port dimensions	1/2" BSP	3/4" BSP	1" 1/4 BSP
X port dimensions	1/4" BSP	1/4" BSP	1/4" BSP

	<p><b>DIPLOMATIC OLEODINAMICA SpA</b>          20025 LEGNANO (MI) - P.le Bozzi, 1 / Via Edison          Tel. 0331/472111 - Fax 0331/548328</p>
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