

CXQ.3... OPEN LOOP PROPORTIONAL PRESSURE COMPENSATED STACKABLE FLOW REGULATORS



CXQ.3...

"D15P" PROPORT. SOLENOIDS CH. XI PAGE 15
STUDS FOR MOUNTING CH. XI PAGE 10

ORDERING CODE

- CXQ** Open loop 3 way proportional compensated flow regulator for module units and stackable valves
- 3** Size
- C** 3 way compensation
- *** **P** = 3 way priority function version
T = 3 way version (with secondary line)
- *** Nominal flow rates
H = 15 l/min
I = 25 l/min
- D** with decompression
- *** Max. current at solenoid
E = 2.35 A
F = 11.76 A
G = 0.88 A
- **** **00** = No variant
P1 = Rotary emergency
P5 = Rotary emergency 180°
- 1** Serial No.

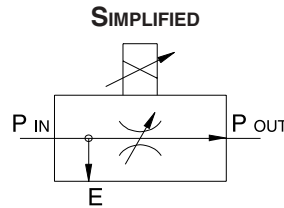
The open loop proportional flow regulator 3 way compensated with priority function is designed to regulate flow in proportion to an applied electrical current (REM or SE3AN power amplifier).

Flow regulation is independent both from load – P_{OUT} port – and pump flow variations. Load compensation is achieved by a spool compensator, which holds the pressure drop constant across the proportional spool.

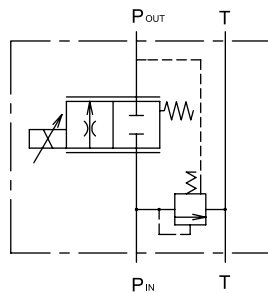
Operating specifications and overall size make this valve suitable to interlock to module units and stackable valves in order to combine a proportional control with directional control typical of stackable systems.

DIAGRAMS

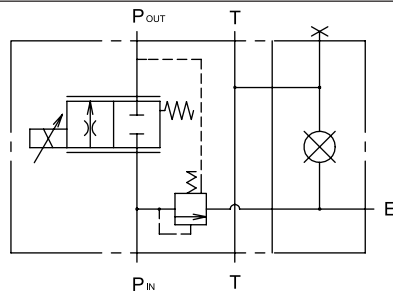
HYDRAULIC SYMBOLS



**3 WAY WITH SECONDARY LINE
CXQ.3.C.T...**

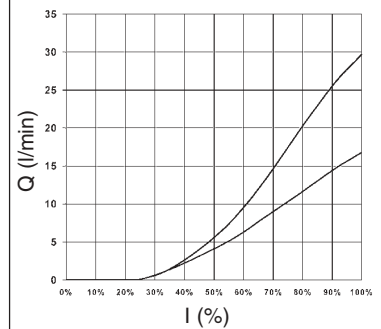


**3 WAY WITH PRIORITY FUNCTION
CXQ.3.C.P...**

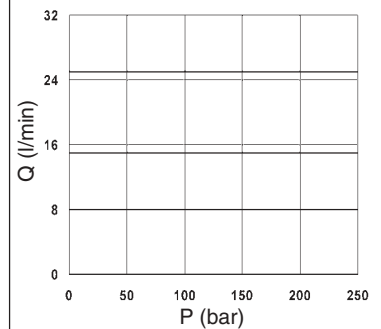


⊗ = Blind

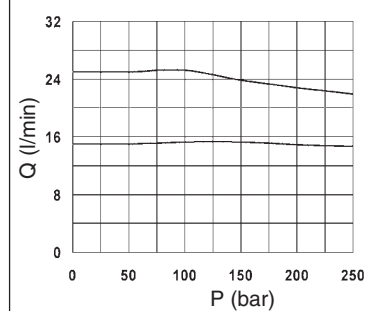
INPUT SIGNAL FLOW



FLOW RATE BACK PRESSURE ON PRIORITY LINE

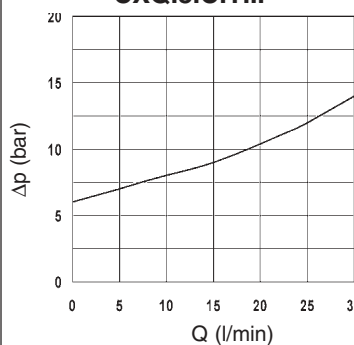


FLOW RATE BACK PRESSURE ON SECONDARY LINE

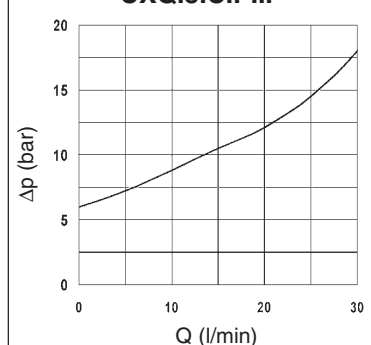


ΔP - PUMP FLOW P_{IN} → T

CXQ.3.C.T...



CXQ.3.C.P...



The fluid used is a mineral based oil with a viscosity of 46 mm²/s at 40°C. The tests have been carried out at with a fluid of a 40°C.

CXQ.3... OPEN LOOP PROPORTIONAL PRESSURE COMPENSATED STACKABLE FLOW REGULATORS



OPERATING SPECIFICATIONS

Max. operating pressure ports $P_{in} / P_{out} / E / T$	250 bar		
Regulated flow rate	15 / 25 l/min		
Decompression drain flow	max 0,7 l/min		
Relative duty cycle	Continuous 100% ED		
Type of protection (in relation to the connector used)	IP 66		
Flow rate gain	See diagram "Input signal flow"		
Fluid viscosity	10 ÷ 500 mm ² /s		
Fluid temperature	-20°C ÷ 75°C		
Ambient temperature	-20°C ÷ 70°C		
Max. contamination level	from class 7 to 9 in accordance with NAS 1638 with filter $\beta_{10} \geq 75$		
Weight CXQ.3.C.P... version	Kg 2,25		
Weight CXQ.3.C.T... version	Kg 1,75		
Max. current at solenoid	2.35A	1.76 A	0.88 A
Solenoid coil resistance at 25°C (77°F)	2.25 Ohm	4.0 Ohm	16.0 Ohm

(*) Pressure dynamic allowed for 2 millions of cycles.

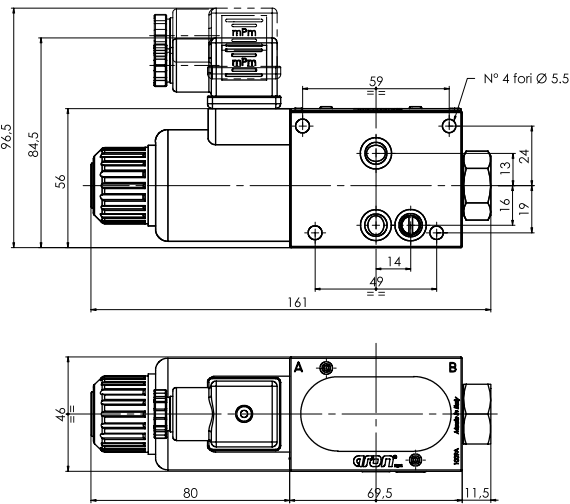
AMPLIFIER UNIT AND CONTROL

REM.S.RA.*.*...
electronic card for control single proportional solenoid valve

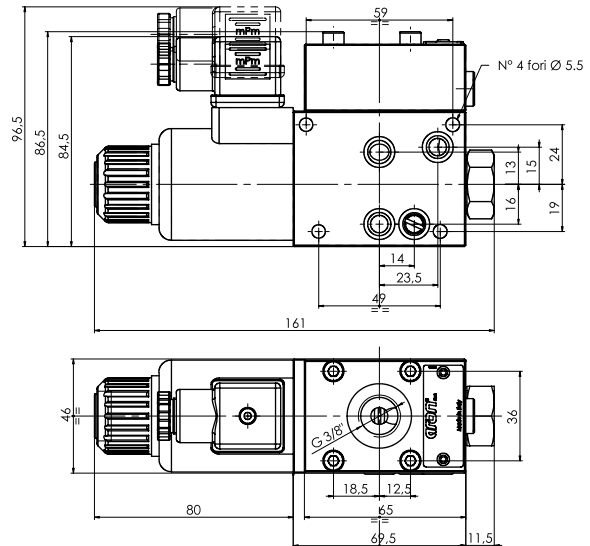
SE.3.AN.21.00...
EUROCARD type control for single solenoid

- Operating specifications are valid for fluid with 46 mm²/s viscosity at 40°C, using the specified ARON electronic control units.

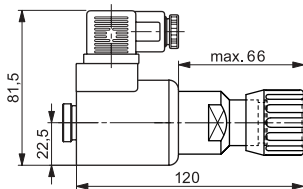
OVERALL DIMENSIONS CXQ.3.C.T...



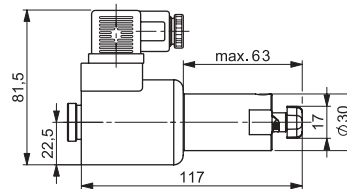
OVERALL DIMENSIONS CXQ.3.C.P...



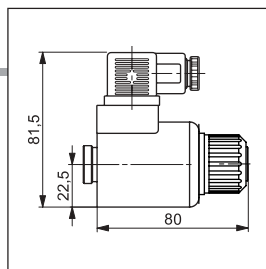
P1 ROTARY EMERGENCY



P5 ROTARY EMERGENCY 180°



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"D15P" PROPORTIONAL SOLENOIDS



Type of protection (in relation to connector used)	IP 66
Duty cycle	100% ED
Insulation class	H
Weight (coil)	0,354 Kg
Weight (solenoid)	0,608 Kg

ETD15P - 01/2002/e