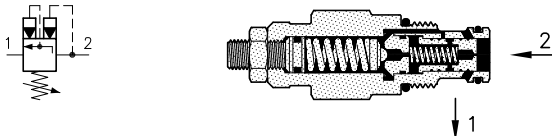
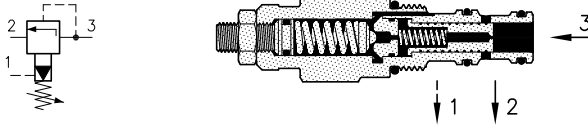
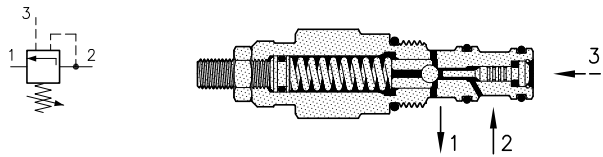


Sequence and unloading valves, secondary-pressure insensitive.

They are manufactured in different models suitable for unloading or sequence functions; the LPQ and LPY types are used in many applications where pressures addition is not allowed.

Main features	Type	Q max. (l/min.)	P max. (bar)	Technical schedule
<p>LPQ series – pilot operated spool-type. Are used to unload a line under pressure or as sequence valve. At setting pressure achievement the valve opens itself allowing the free passage with a very low pressure drop. The valve closes when pressure falls under a 7 bar value.</p> 	LPQ 30	70	420	04.010
	LPQ 50	160	420	04.020
	LPQ 70	320	420	04.030
<p>LPY series – pilot operated spool-type. Relief pilot operated valves with external drain. The line 1 (drain), directly connected with return line (T), makes the valve unsensitive to pressure of chamber 2 allowing to maintain the valve's setting and features.</p> 	LPY 30	70	420	04.040
	LPY 50	160	420	04.050
	LPY 70	320	420	04.060
<p>LCS 20 series – direct acting differential.</p> <p>Differential Area Unloading relief valves, are mainly used to charge accumulators or for pump unloading in high-low pressure circuits.</p> <p>They allow the automatic pump's by-pass as the circuit pressure reaches the setting value. The valve closes when this value drops at 88% and pump starts charging the accumulator.</p> <p>The valve LCS 20 series must be combined with logical elements of ELP series :</p> <ul style="list-style-type: none"> – version ELP .. P1 (hight-low pressure) – version ELP 30/D3-1.23 (accumulators) <p>For advice please ask our technical department.</p> 	LCS 20	1.5	350	04.075

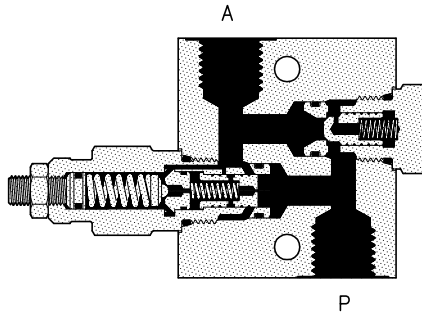
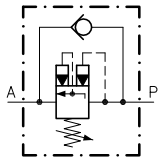
Main features

LPQ series CSL 10 circuits.

They are used as sequence valves. At reaching the setting value, the valve opens and allows the fluid free-flow passage.

When pressure drop under a value lower than 7 bar, the valve closes again.

The annexed by-pass valve allows the free-flow in direction from A to P.



**LPQ 30
CSL 10**

Q max.
(l/min.)

70

P max.
(bar)

420

Technical
schedule

04.080

**LPQ 50
CSL 10**

160

420

04.090

**LPQ 70
CSL 10**

320

420

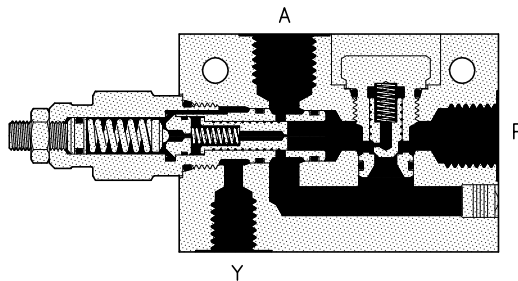
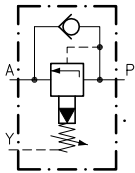
04.100

LPY series CSL 10 circuits.

They are sequence pilot operated valves with external drain.

The line Y (drain line) which is directly connected with return line (T), makes the valve indifferent to port A pressure, keeping the setting features unchanged.

The annexed by-pass valve allows the free-flow in direction from A to P.



**LPY 30
CSL 10**

70

420

04.110

**LPY 50
CSL 10**

160

420

04.120

**LPY 70
CSL 10**

320

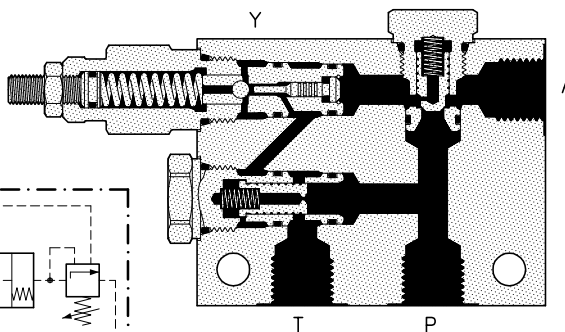
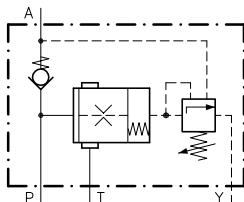
420

04.130

DPA series

These valves are used to unloading a pump once a certain pressure has been reached in the main circuit.

They are either used an accumulator circuit unload the pump when the accumulator charge pressure has been reached or in a two pump circuit to unload the low pressure pump.



DPA 30

60

315

04.140

DPA 50

135

315

04.142

DPA 70

300

315

04.144

Main features	Type	Q max. (l/min.)	P max. (bar)	Technical schedule
<p>DPE series These valves are used to unloading a pump once a certain pressure has been reached or electrically.</p>	DPE 30	60	420	04.200
	DPE 50	135	420	04.205
<p>LPS 20/20 series CSL 10 circuit. They are a simple unexpansive version for high pressure applications. Ideal solution for narrow flows, they have got a very good oiltight with total pressure peak absence. The pressure required from secondary circuit adds to the setting pressure and the by-pass valve allows the flow free-return with direction from A to P.</p>	LPS 20/20 CSL 10	12	420	04.150
<p>LPA 20 series CSL 10 circuit. They have the same body of LPS 20 series, moreover the use of valves LPA 20 series guarantees a better flow-pressure trend.</p>	LPA 20 CSL 10	20	350	04.160
<p>LPA 30 series CSL 10 circuit. The use of valve size 30 makes this series suitable for flows till 50 l/min. This series uses the same body of valve LPQ 30 - CSL 10.</p>	LPA 30 CSL 10	50	350	04.170