

Pressure relief valves

Type DV700

NG 4 Bieri and NG 6 ISO
up to **700 bar**

Features

- Direct operated valve
- High degree of pressure stability
- Safe operation
- Flat characteristic
- Delivered only with released spring

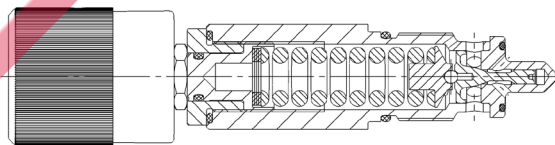


Applications

- Pressure limitation in a dynamic pressure system

Design

- As cartridge
- As modular valve with one or two cartridges
- Seat construction
- The system pressure can be set to the required pressure via the adjusting spindle
- Pressure adjustment possible over the entire pressure range
- Fixing of the pre-set maximum pressure by lock nut
- Stable control behaviour thanks to damping piston

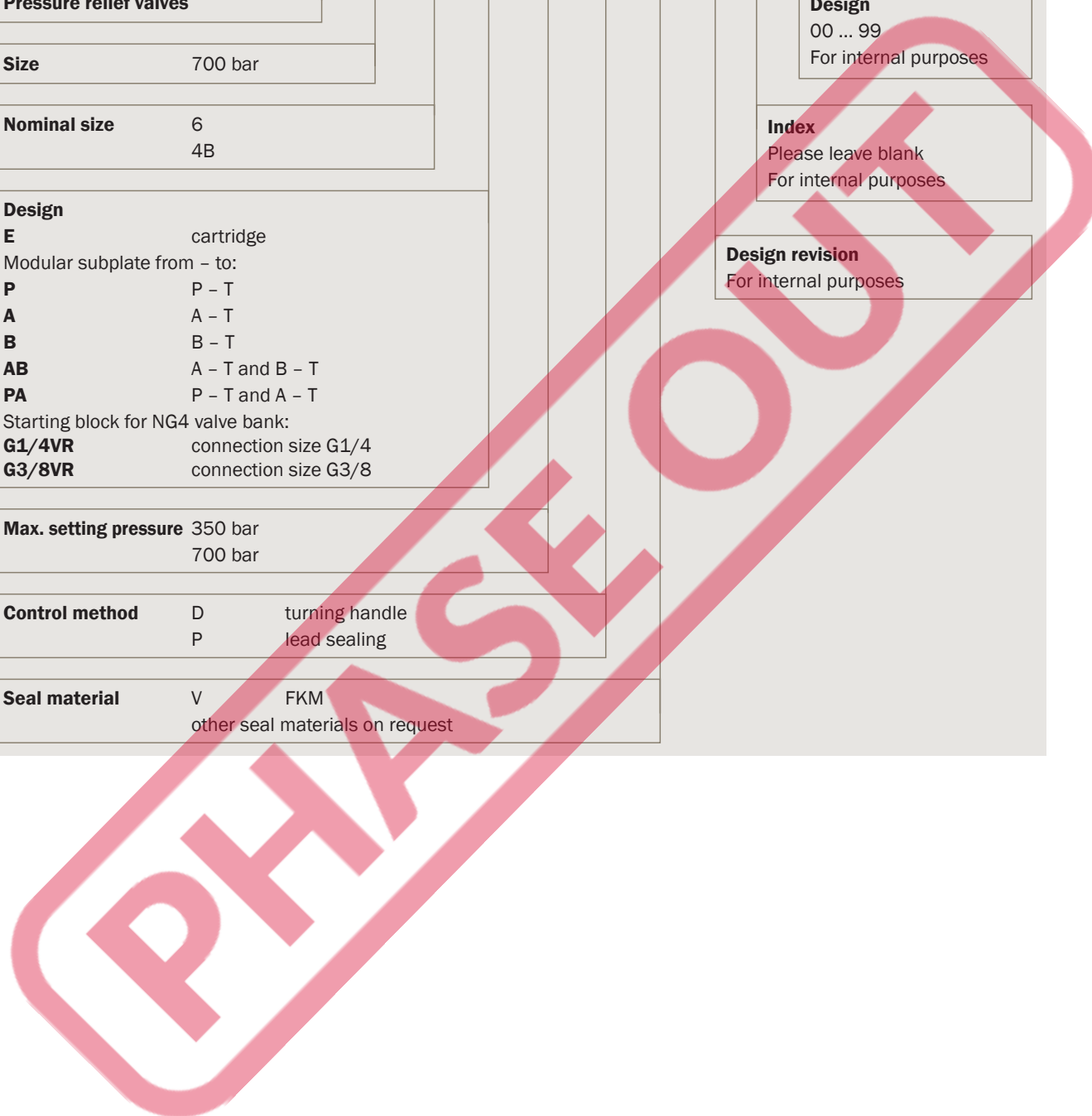


Technical data

Hydraulic fluid	mineral oil according to DIN 51524 (other fluids on request)	
Fluid temperature range	- 20 to 80 °C	
Ambient temperature range	- 30 to 50 °C	
Viscosity range	5 to 400 mm ² /s	
Porting	NG 4 according to Bieri standard NG 6 according to DIN 24340/ ISO 4401/ CETOP RP 121 H	
Max. operating pressure connection P, A, B	700 bar	
Max. operating pressure connection T	350 bar	
Max. flow rate	NG 4 12 l/min NG 6 25 l/min	
Filtration (recommendation)	according to NAS 1638, class 6 or ISO/ DIN 4406 17/15/12	
Weight	see overview "Product informations"	
Material	housing:	Steel, galvanized, chromated
	cartridge:	Steel, corrosion resistant
	adjusting knob:	Plastic

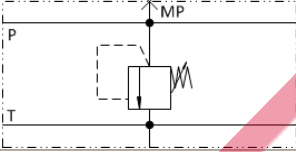
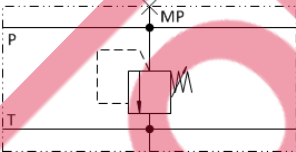
Type code

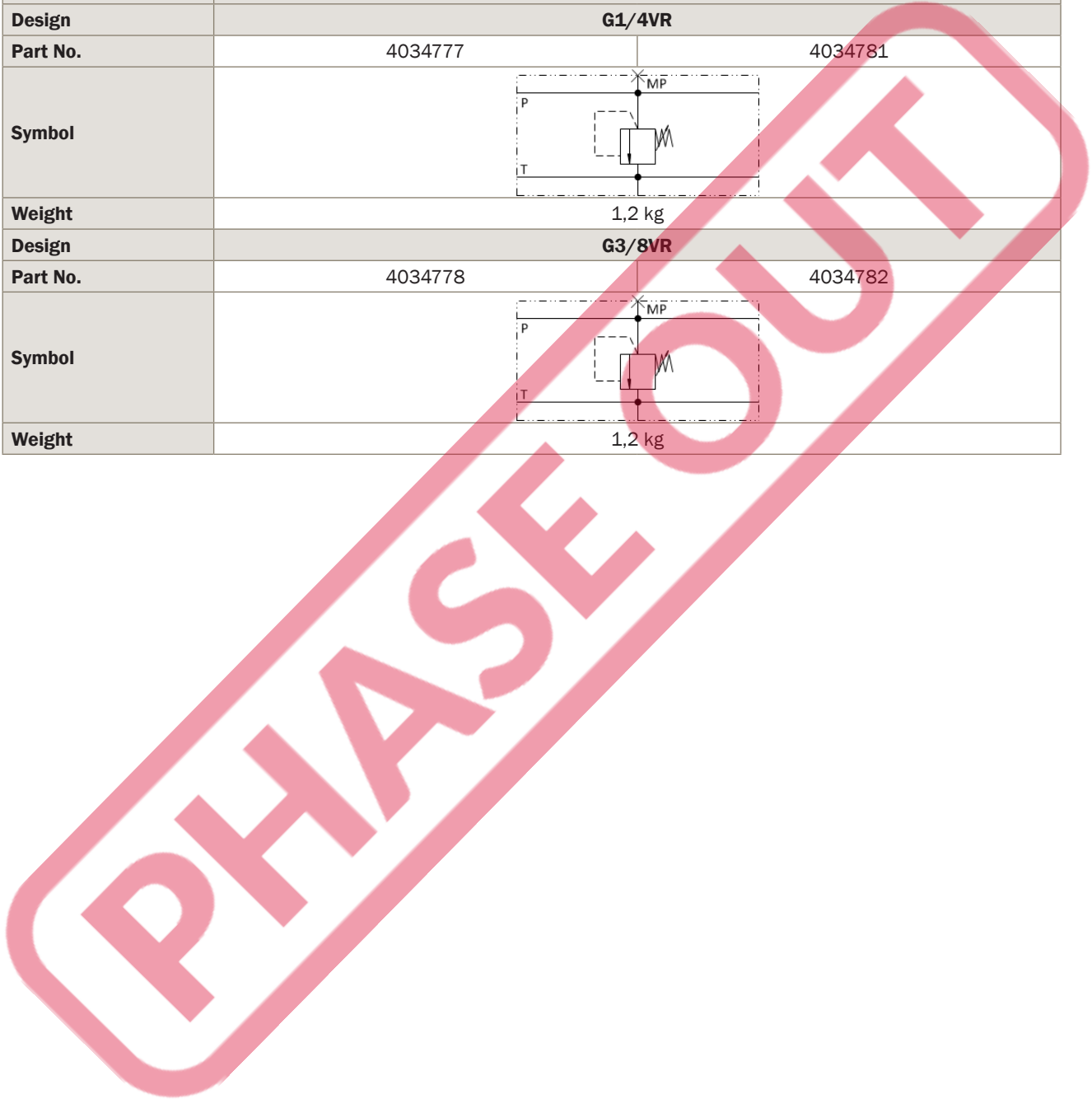
Example	DV	700	-	6	-	P	-	350	-	D	-	V	-	A		00
Pressure relief valves																
Size	700 bar															
Nominal size	6 4B															
Design	<p>E cartridge</p> <p>Modular subplate from - to:</p> <p>P P - T</p> <p>A A - T</p> <p>B B - T</p> <p>AB A - T and B - T</p> <p>PA P - T and A - T</p> <p>Starting block for NG4 valve bank:</p> <p>G1/4VR connection size G1/4</p> <p>G3/8VR connection size G3/8</p>															
Max. setting pressure	350 bar 700 bar															
Control method	<p>D turning handle</p> <p>P lead sealing</p>															
Seal material	<p>V FKM</p> <p>other seal materials on request</p>															
	<p>Design 00 ... 99 For internal purposes</p> <p>Index Please leave blank For internal purposes</p> <p>Design revision For internal purposes</p>															



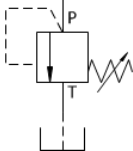

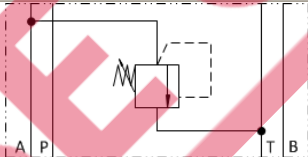
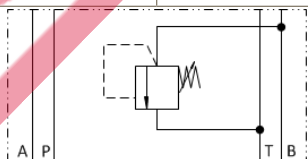
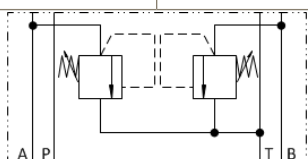
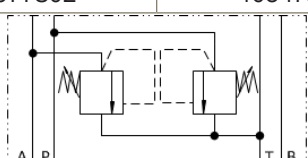
Standard design NG4

NG4

Control method	Turning handle	Lead sealing
Max. setting pressure	700 bar	
Design	G1/4VR	
Part No.	4034777	4034781
Symbol		
Weight	1,2 kg	
Design	G3/8VR	
Part No.	4034778	4034782
Symbol		
Weight	1,2 kg	

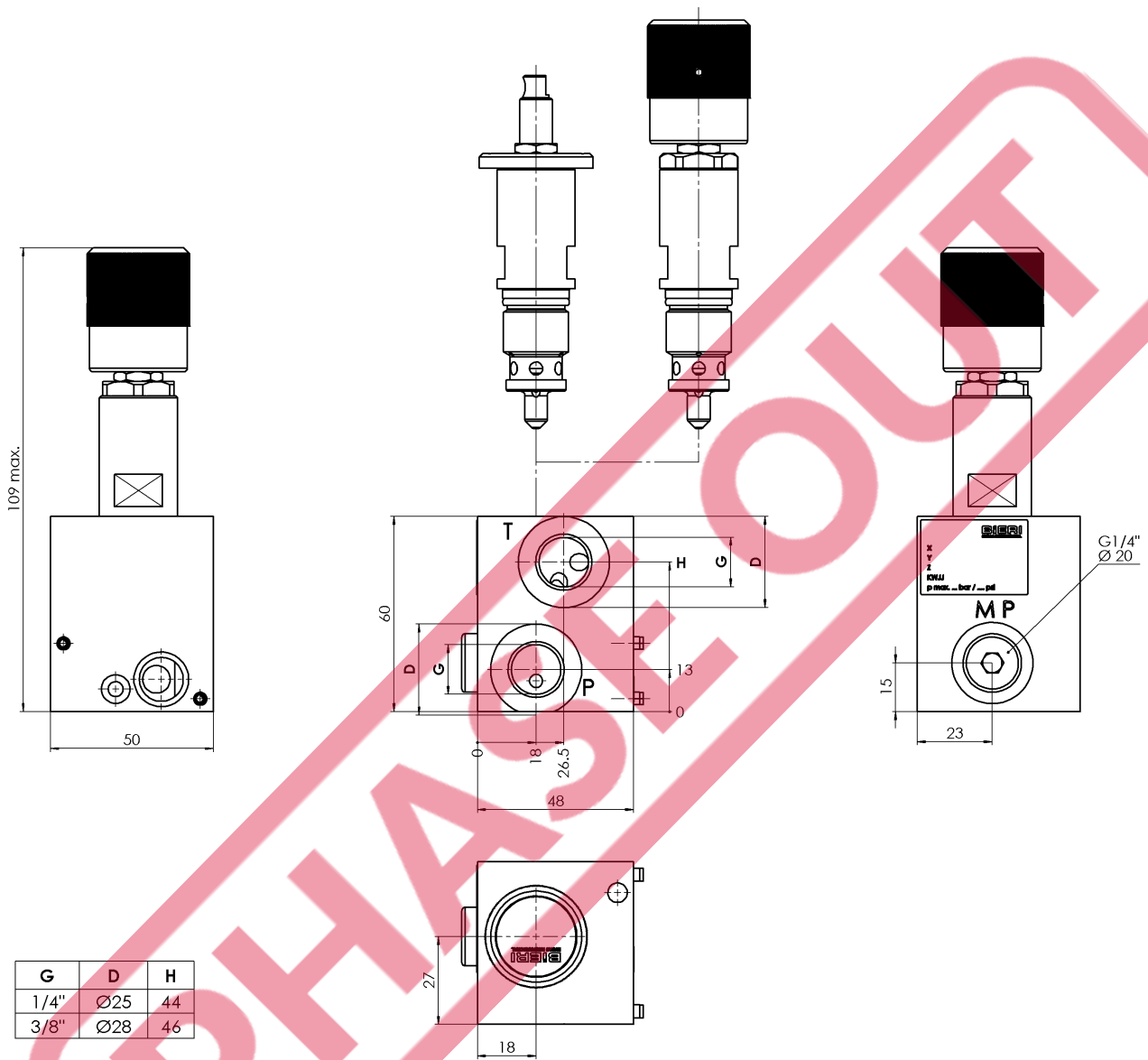


NG6

control method	Turning handle		Lead sealing	
Max. setting pressure	350 bar	700 bar	350 bar	700 bar
Design	E			
Part No.	3677793	3677794	4001031	3851977
Symbol				
Weight	0,2 kg			
Design	P			
Part No.	3677796	3677797	4054731	4031721
Symbol				
Weight	1,6 kg			
Design	A			
Part No.	3677780	3677783	4054732	4054733
Symbol				
Weight	1,6 kg			
Design	B			
Part No.	3677789	3677791	4054734	4054735
Symbol				
Weight	1,6 kg			
Design	AB			
Part No.	3677786	3677787	4054736	4031925
Symbol				
Weight	2,0 kg			
Design	PA			
Part No.	3677799	3677802	4054737	4054738
Symbol				
Weight	2,0 kg			

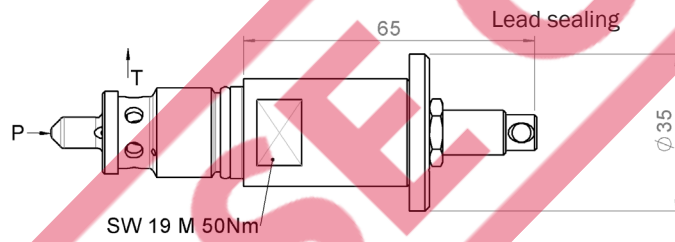
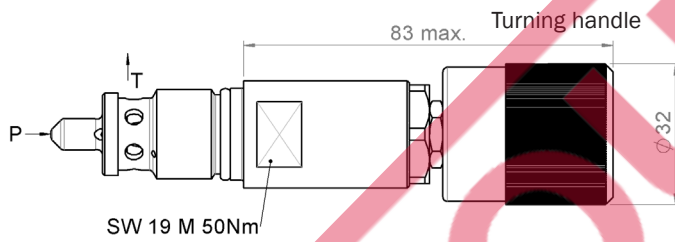
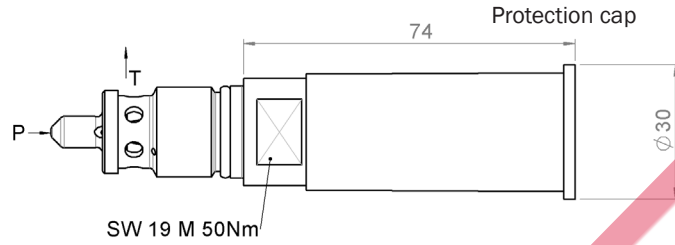
Dimensional drawings

NG4

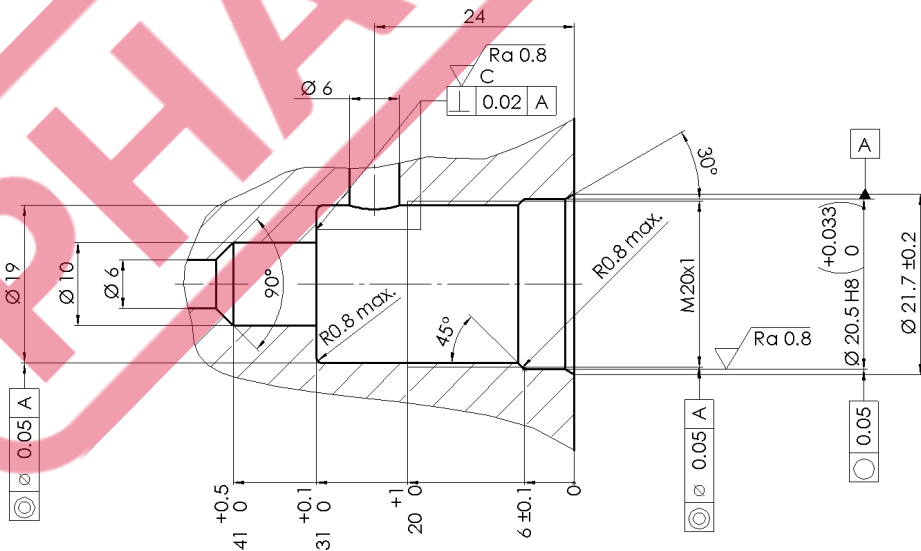


NG6

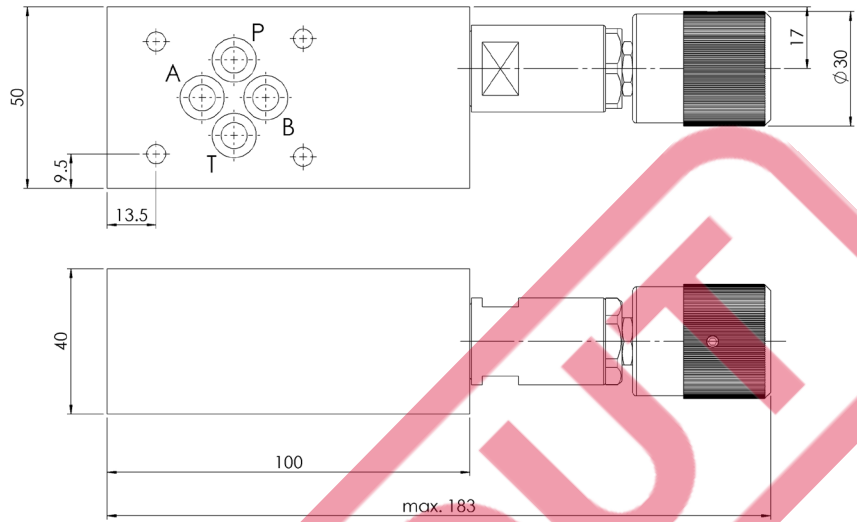
Cartridge



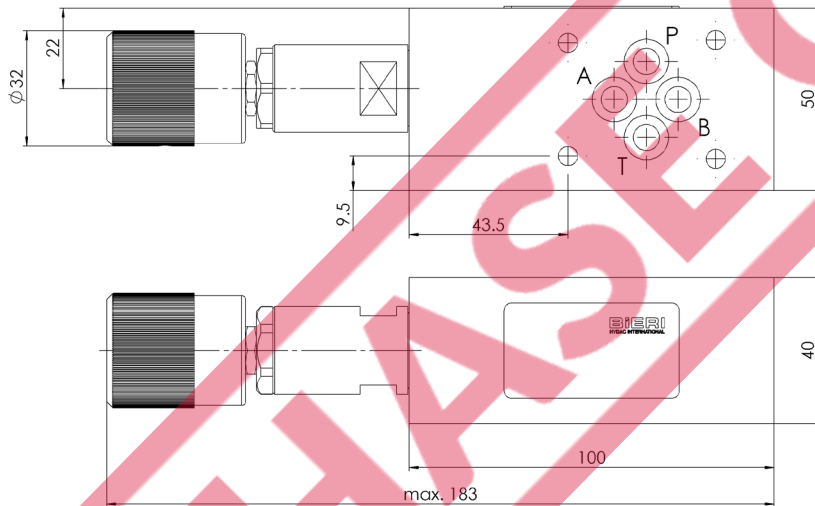
Cartridge cavity



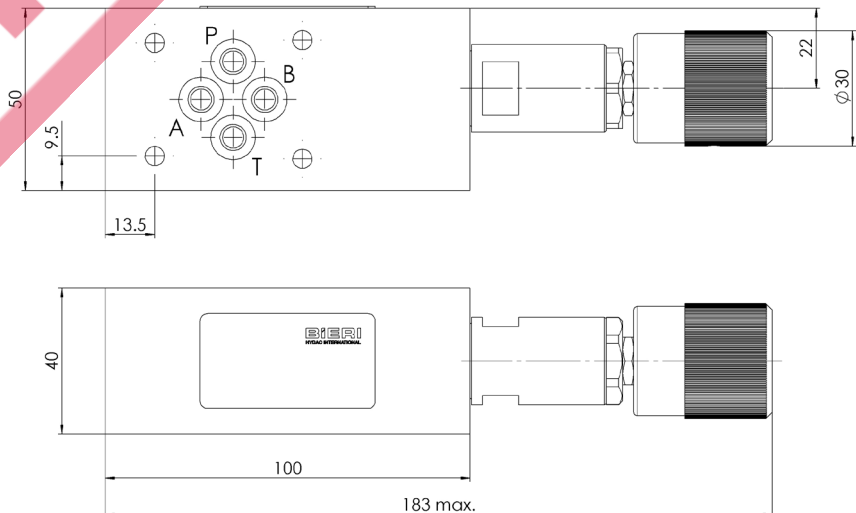
Modular subplate from P to T



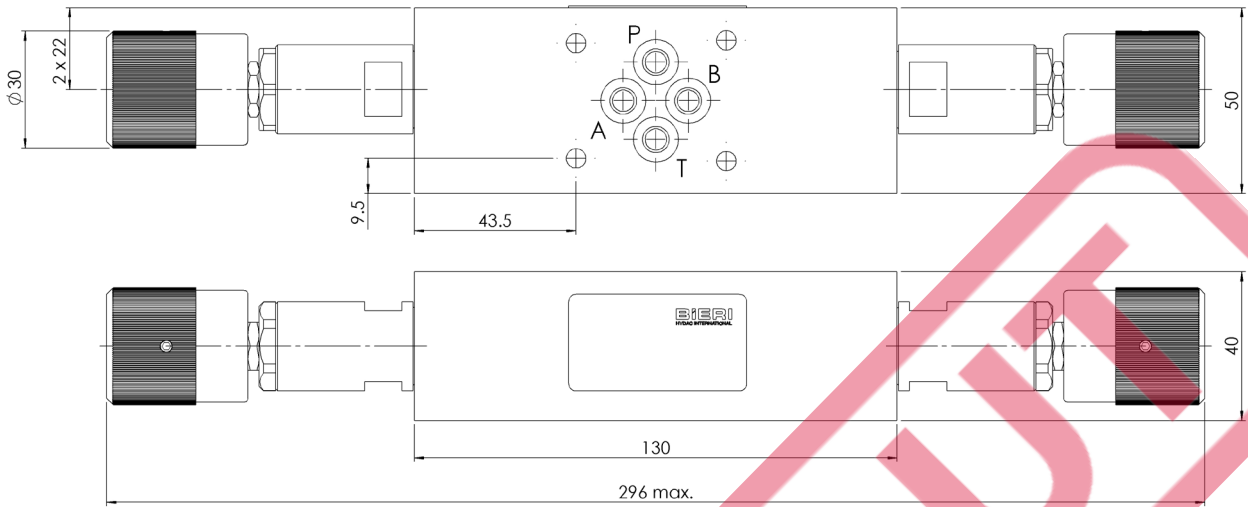
Modular subplate from A to T



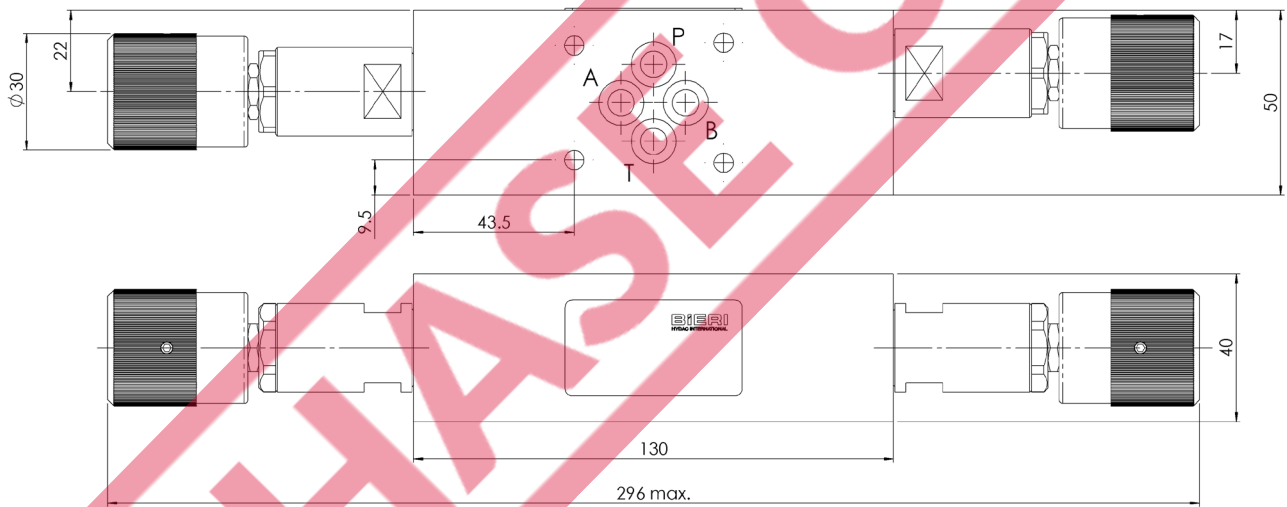
Modular subplate from B to T



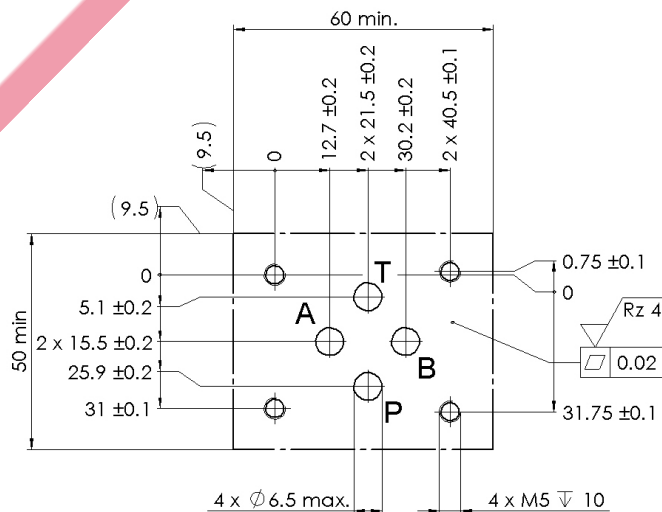
Modular subplate from A to T and B to T



Modular subplate from P to T and A to T



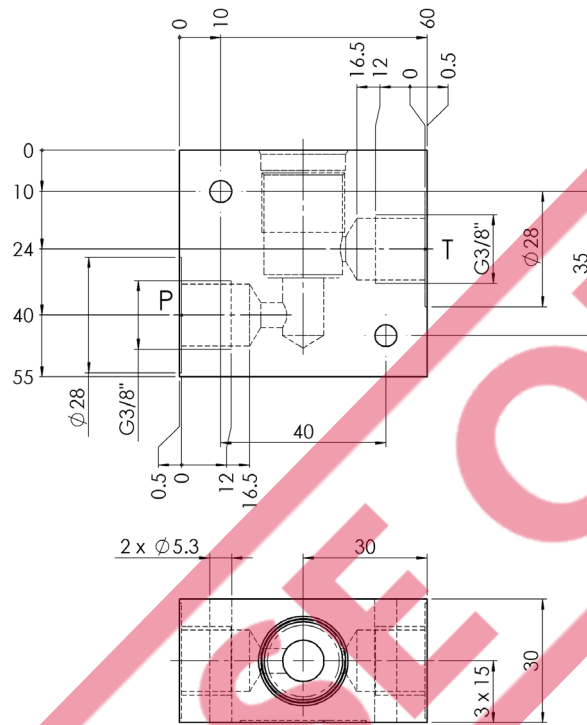
Drilling pattern



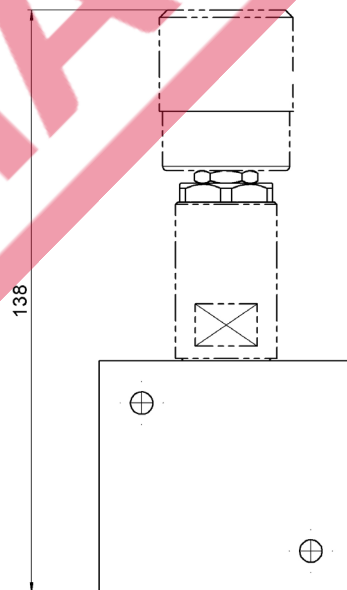
Valve block for in-line mounting

Type	Max. operating pressure	Part No.
VKR-6	700 bar	3678841

Dimensional drawing



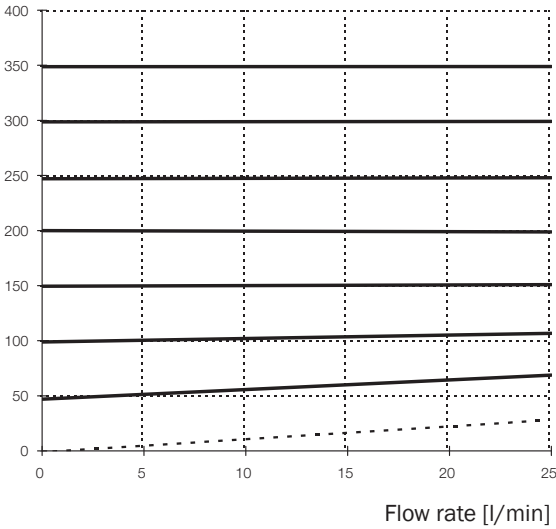
Dimensional drawing with pressure relief cartridge (Cartridge not included in scope of supply)



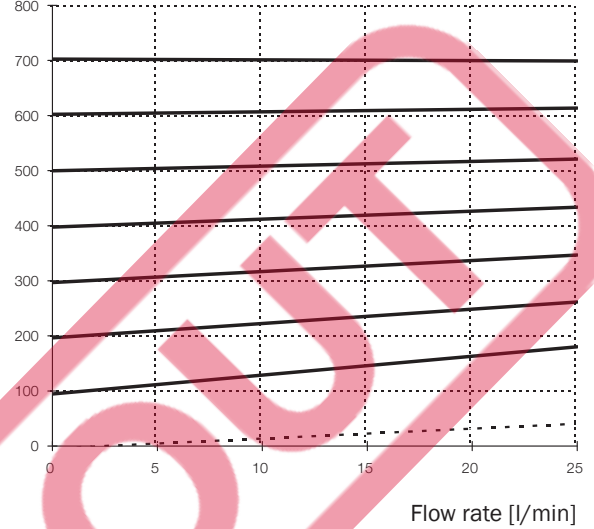
Characteristics

Measured at $v = 32 \text{ mm}^2/\text{s}$, $T = 40^\circ\text{C}$

Setting pressure [bar]



Setting pressure [bar]



---- Min. setting pressure
— Max. setting pressure 350 bar

---- Min. setting pressure
— Max. setting pressure 700 bar

Tie bolts/ fixation screws and subplates see technical data sheet AP700 / RP700 / EP700!