INTEGRAL PRESSURE CONTROL



Cat Pumps integral pressure controls are the longest-lasting and easiest to maintain.



Pumps with integral pressure control valves are built to our exacting high-quality standards. From the precision machined piston and seat to the longest-lasting seals available, every pump is designed to provide maximum uptime. When servicing is required, the procedure is easy to perform using standard tools.

Integral pressure control valves provide many benefits for equipment use, including:

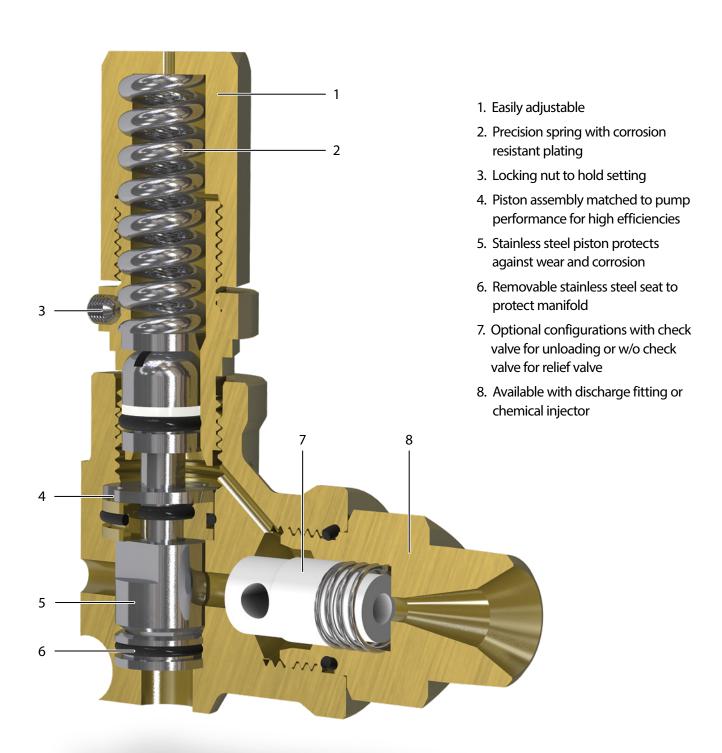
- · Can be configured as pressure regulating unloader or pressure relief valve
- Matched pump/valve performance for higher efficiencies with less pressure loss
- · Lower cost due to fewer fittings and less plumbing
- · Integral control valve reduces the number of potential leak paths, resulting in less mess and cleaner operation

Integral pressure control available on various pump models ranging from:

- · Flow: 0.3 to 4 gpm (1.1 to 15.1 lpm)
- Pressure: 100 to 4000 psi (6.9 to 276 bar)
- Hollow Shaft: 5/8, 3/4, 1", 1-1/8"
- · 1750 or 3450 rpm
- · Engine or Motor Drive

Longest Lasting – Easy to Maintain

From matched components to precision machining to serviceability, no detail was overlooked.



Control Valve Servicing — Done in Minutes









Disassemble Pressure Relief

Unthread adjustment cap and remove spring and cap. With 19 mm wrench, remove piston retainer. Use needle nose pliers to remove piston assembly. Use a #5 Easy Out to remove piston seat.

Easy to Reassemble

Install new valve seat with tapered inside diameter facing downward. A pen or screwdriver can be used to guide the seat into proper positon. Use a 1/4" socket (1/4 drive), to press seat in until bottomed-out. Install new piston assembly into piston retainer, then thread into port. Tighten retainer with 19 mm wrench, add spring and adjustment cap.

Control Valve Maintenance

Easy to Service

- · No special tools required
- · Repair kits are preassembled with only three (3) parts
- · Simply drop in replacement components for quick service
- · Repair kits are on-the-shelf stock items for 24-hour shipping









Check Valve Repair Kit (unloader only)

Relief Valve Repair Kit

Cat Pumps Keeps Your Equipment Running — and You on Schedule

Nothing is worse than equipment downtime when there are customers to be served. That is why leading equipment manufacturers and users specify Cat Pumps products. Down to the last detail, Cat Pumps products are designed to keep your equipment running longer with less downtime.

With Cat Pumps on the job with you, you can enjoy the advantages of higher productivity, fewer repairs with less maintenance costs and greater confidence in equipment performance. Get the best — get Cat Pumps!



Available Pump Options



Model 4DX10ER

DIRECT DRIVE, HOLLOW SHAFT, BRASS MANIFOLD

Electric Motor, 5/8" and 3/4", 56C Face

PUMP MODEL	MAXIMUM FLOW		MAXIMUM PRESSURE		RPM	SHAFT
	gpm	lpm	psi	bar		
4DX03ELR	0.3	1.1	2000	138	1725	5/8"
4DX10ER	1.0	3.8	2000	138	3450	5/8"
4DX15ER	1.5	5.7	2000	138	3450	5/8"
4DX20ER	2.0	7.6	2000	138	3450	5/8"
4SP21ELR	2.1	7.9	2000	138	1750	5/8"
4DX27ER	2.7	10.3	2000	138	3450	5/8"
4SP29ELR	2.85	10.8	1200	83	1725	5/8"
4DX30ER	3.0	11.4	2000	138	3450	5/8"

Note: Pumps rated at 3450 rpm can operate at 1725 rpm, reducing flow by 50%.



Model 5SP35ELR

DIRECT DRIVE, HOLLOW SHAFT, BRASS MANIFOLD

Electric Motor, 1 1/8", 184TC Face

PUMP MODEL	MAXIMUM FLOW		MAXIMUM PRESSURE		RPM	SHAFT
PUMP MODEL	gpm	lpm	psi	bar	RPM	SHAFT
5SP30ELR	3.0	11.4	3000	207	1750	1-1/8"
5SP35ELR	3.5	13.3	2500	172	1750	1-1/8"
5SP40ELR	4.0	15.2	2000	138	1750	1-1/8"



Model 4DNX25GSI

DIRECT DRIVE, HOLLOW SHAFT, BRASS MANIFOLD

Engine, 3/4"

PUMP MODEL	MAXIMU gpm	M FLOW Ipm	MAXIMUM psi	PRESSURE bar	RPM	SHAFT
4DNX25GSI	2.5	9.5	3000	207	3450	3/4"
4DNX27GSI	2.7	10.3	3000	207	3450	3/4"
3DX29GSI	2.9	11.0	2500	172	3450	3/4"

 $[\]hbox{*Consult engine manufacturer for actual torque available at required speed.}$

Contact Cat Pumps for more information at info@catpumps.com or 763-780-5440



CAT PUMPS

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