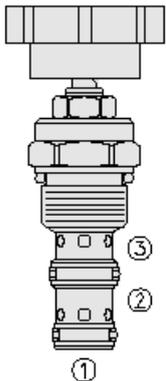




Overview



Description

FR10-39X is an adjustable, pressure compensated, flow control valve. It CAN be used as a priority type flow regulator, or a restrictive type, 2-way, flow regulator when the bypass line (port 2) is blocked.

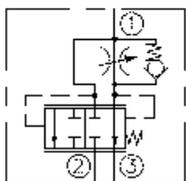
Operation

The valve provides set regulated flow regardless of pressure variations at regulated or bypass port. Regulated flow increases from closed to fully open with clockwise rotation of the adjusting screw.

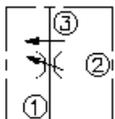
Features

- Bypass port 2 may be fully pressurized.
- Fine low-torque adjustment.
- Hardened steel parts for long life.
- Quiet, modulated response.
- Industry-common cavity.

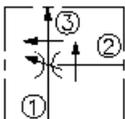
Symbol



2-Ported:



3-Ported:



Ratings

Pressure Ratings

Pressure rating 241 bar (3500 psi)

Flow Ratings

Flow rating	34.1 lpm (9.0 gpm)	- Note: Regulated, 2-ported
	37.9 lpm (10.0 gpm)	- Note: Regulated, 3-ported
Inlet flow rating	37.9 lpm (10.0 gpm)	- Note: Nominal, 3-ported
	56.8 lpm (15.0 gpm)	- Note: Maximum, 3-ported
Maximum internal leakage	0.38 lpm (0.10 gpm)	

Temperature Ratings

Operating fluid temperature	-40 to 120 °C (-40 to 250 °F)	- Note: With buna N seals
	-26 to 204 °C (-15 to 400 °F)	- Note: With fluorocarbon seals
	-54 to 107 °C (-65 to 225 °F)	- Note: With polyurethane seals
Storage temperature	-40 to 70 °C (-40 to 160 °F)	
Ambient temperature	-40 to 70 °C (-40 to 160 °F)	

Other Ratings

Corrosion protection 960 hr salt spray per ASTM b117 (model number gfr10-39x)

Operating Parameters

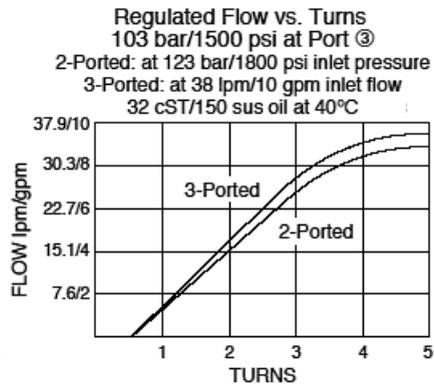
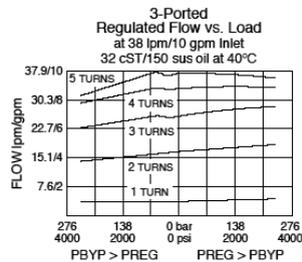
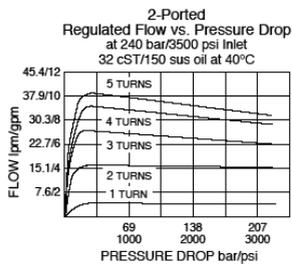
Fluids	Mineral based or synthetic hydraulic fluid with lubricating properties
Fluid viscosity range	7.4 to 420 cSt
Maximum operating contamination level	18/16/13 per iso4406



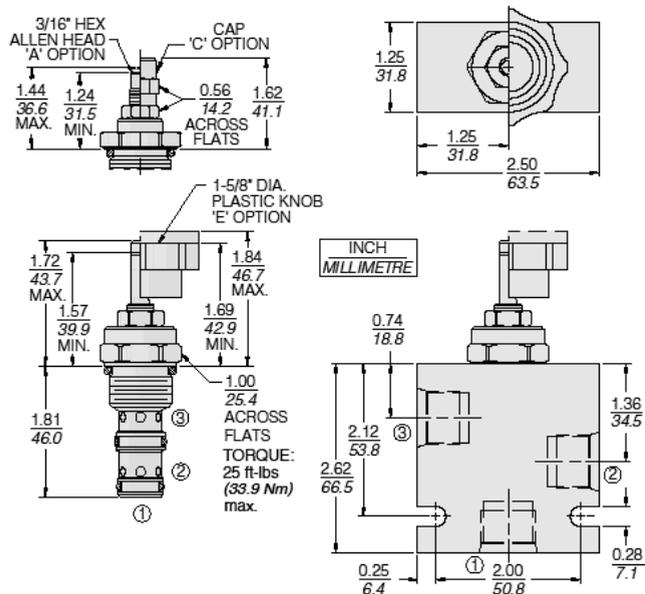
Properties

Unit weight	0.14 kg (0.31 lb)	- Note: Option A
Internal wetted surface area	135 cm ² (20.9 in ²)	

Performance



Dimensions



Installation Specifications

Cavity	VC10-3
Cartridge installation torque	33 to 35 N-m (24 to 26)
Maximum allowable torque	61 to 68 N-m (45 to 50)
Orientation restriction	None

Accessories

Seal kit	SK10-3X-MM	- Note: X = seal option
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Order Code

FR10-39		-		-		-		-		-	
Adjustment Option		Seals		Flow Setting							
Extended Shaft Only	Blank	Buna N (Std.)	N	(Blank)	Factory Set at						
3/16" Hex Allen Head	A	Fluorocarbon	V		4 to 5 gpm						
Option 'A' w/Cover Cap	C	Polyurethane	P		Specify, for example:						
Plastic Knob	E				Setting in lpm						
					Specify, for example:						
Porting					M4.0	4.0 lpm					
Cartridge Only	0				M12.0	12.0 lpm etc.					
SAE 6	6T				Setting in gpm						
SAE 8	8T				Specify, for example:						
1/4 in. BSP*	2B				1.5	1.5 gpm					
3/8 in. BSP*	3B				7.5	7.5 gpm etc.					
*BSP Body; U.K. Mfr. Only											

Model Options

FR10-39F-H-J-/T

F Adjustment Option

CODE	DESCRIPTION
A	3/16" Hex Allen Head
BLANK	Extended Shaft Only
C	3/16" Hex Allen Head with Cover Cap
E	Plastic Knob

H Line Body

CODE	DESCRIPTION
0	No Body
6T	Aluminum SAE 6
8T	Aluminum SAE 8
6TD	Ductile Iron SAE 6
8TD	Ductile Iron SAE 8
3B	Aluminum BSPP 3/8" (3)
3BD	Ductile Iron BSPP 3/8" (3)

J Seal

CODE	DESCRIPTION
N	Buna-N
V	Fluorocarbon
P	Polyurethane
U	PPDI Urethane

T Flow setting

CODE	DESCRIPTION
XX	Flow setting