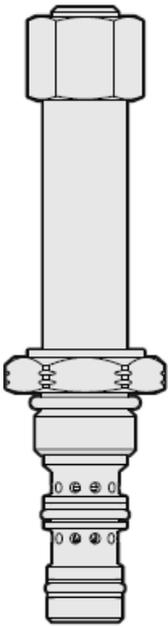




Overview



Description

The HTS38-36X is a screw-in, cartridge style, pilot-operated, spool-type, proportional pressure reducing/relieving valve which can be infinitely adjusted across a prescribed range using a variable electric input. The regulated pressure is proportional to the input electrical current applied to the valve coil.

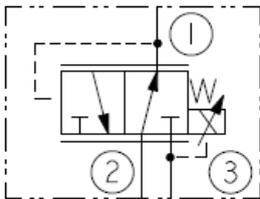
Operation

The HTS38-36X allows flow from port 2 to port 1 until sufficient pressure is present at port 1 to open the pilot section by off setting the electrically induced solenoid force. If the pressure at port 1 exceeds the regulated pressure set by the input electrical current, flow from port 1 is relieved to tank via port 3. With no current applied, the valve will relieve at approximately 115 psi [7,9 bar] (pressure code A) OR 80 psi [5,5 bar] (pressure code C). Pressure at port 3 is additive to regulated pressure.

Features

- Multifunction proportional relief valve with vented logic element
- Low pressure drop.
- Rated for high pressure operation
- Pressure can be set at factory at range between 55.2 to 345 bar (800 to 5000 psi)
- High flow rating
- Port 2 can be pressurized for logic applications
- Corrosion-resistant plating
- 12- or 24-volt environmental coils
- All HyPerformance products are tested to the rigorous standards of the NFPA specification T2.6.1.
- All HyPerformance valves are tested at a verification level of 90% and an assurance of 99%.

Symbol



Ratings

Pressure Ratings

Pressure rating	350 bar (5075 psi)	- Note: Port 1, 2
	420 bar (6090 psi)	- Note: Port 1, 10% cycle life
	68.9 bar (1000 psi)	- Note: Port 3
Proof pressure	689 bar (10000 psi)	
Burst pressure	1379 bar (20000 psi)	
Pressure setting range	7.9 to 350 bar (115 to 5075 psi)	- Note: From zero to maximum control current, pressure code A
	5.54 to 209.6 bar (80 to 3040 psi)	- Note: From zero to maximum control current, pressure code C

Flow Ratings

Flow rating	56.8 lpm (15 gpm)	
Maximum internal leakage	0.115 lpm (0.04 gpm)	- Note: Maximum de-energized at deadhead condition with inlet pressure of 350 bar (5075 psi) including pilot flow

Temperature Ratings

Operating fluid temperature	-40 to 100 °C (-40 to 212 °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 urethane seals
Storage temperature	-40 to 70 °C (-40 to 160 °F)	
Ambient temperature	-40 to 70 °C (-40 to 160 °F)	



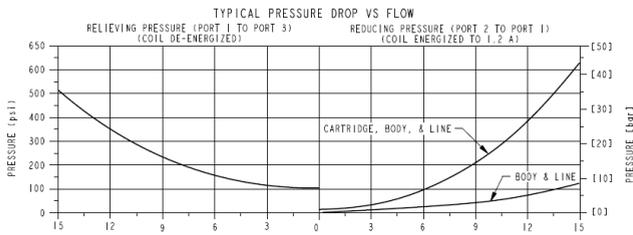
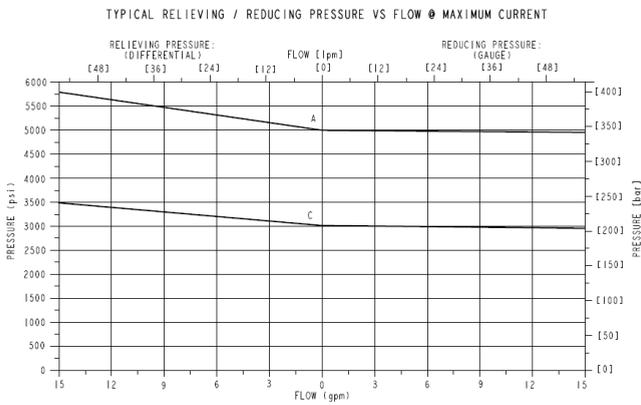
Operating Parameters

Fluids	Mineral based or synthetic with lubricating properties
Fluid viscosity range	7.4 to 420 cSt
Maximum operating contamination level	18/16/13 per ISO 4406

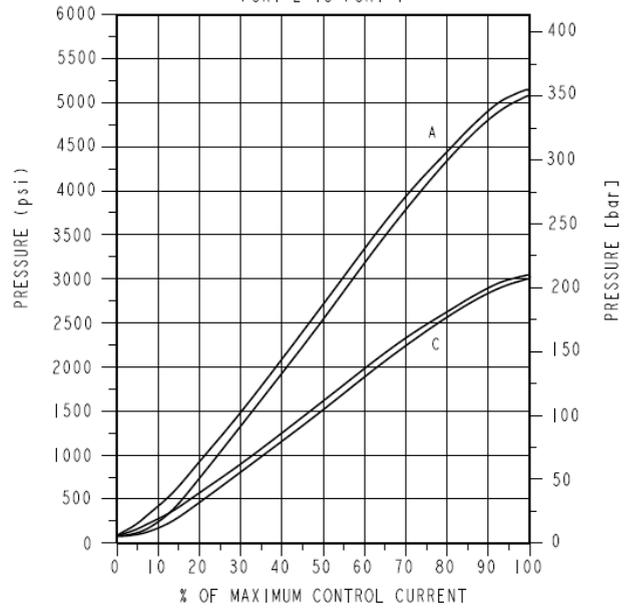
Properties

Unit weight	0.19 kg (0.41 lb)
Internal wetted surface area	166 cm ² (25.7 in ²)

Performance

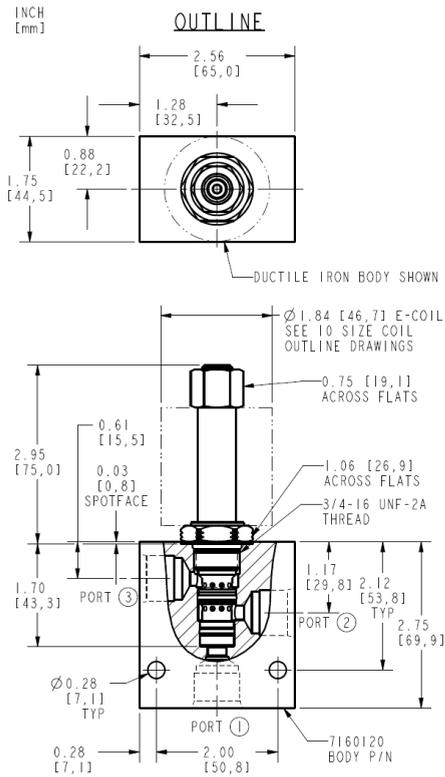


TYPICAL REDUCING PRESSURE VS CURRENT (200 Hz PWM)
PORT 2 TO PORT 1





Dimensions



Installation Specifications

Cavity	HVC08-3
Cartridge installation torque	54 to 61 N-m (40 to 45 ft-lb)
Coil nut torque	9.5 to 13.6 N-m (7 to 10 ft-lb)
Orientation restriction	None

Accessories

Seal kit	SK08-3X-BM	- Note: X = N, V seal option
	SK08-3U-OO	- Note: Urethane seal option

Order Code



ORDERING INFORMATION:

HTS38-36X-X-X-XXXX

BASE MODEL NUMBER:

PRESSURE CODE:

115-5075 psi - A
[7,9-350 bar]

80-3040 psi - C
[5,5-209,6 bar]

PORTING:

CARTRIDGE ONLY - 0

SEAL OPTION:

BUNA N - N
FLUOROCARBON - V
URETHANE - U

COIL VOLTAGE:

LESS COIL - 00
12 VDC COIL - 12
24 VDC COIL - 24

COIL TERMINATIONS:

DIN 43650 - EG
LEAD WIRES (18 GAUGE) - EL
DEUTSCH DT04-2P - ER
METRI-PACK 150 - EY

Model Options

HTS38-36D-H-J-L

D Regulating Pressure Range

CODE	DESCRIPTION
A	7.9 to 350 bar (115 to 5075 psi) Pressure Range
C	5.5 to 209.6 bar (80 to 3040 psi) Pressure Range

H Line Body

CODE	DESCRIPTION
0	No Body
8HT	Ductile Iron SAE 8

J Seal

CODE	DESCRIPTION
N	Buna-N
V	Fluorocarbon
U	PPDI Urethane

L Coil

CODE	DESCRIPTION
0	No Coil
10EL	10 VDC, E-Coil, Dual Lead Wires, 18 inches long
10EL/36	10 VDC, E-Coil, Dual Lead Wires, 36 inches long
10ER	10 VDC, E-Coil, Deutsch
12EG	12 VDC, E-Coil, DIN 43650
12EJ	12 VDC, E-Coil, AMP Jr.
12EL	12 VDC, E-Coil, Dual Lead Wires, 18 inches long



CODE	DESCRIPTION
12EL/36	12 VDC, E-Coil, Dual Lead Wires, 36 inches long
12ER	12 VDC, E-Coil, Deutsch
12EY	12 VDC, E-Coil, Metri-Pack 150
20ER	20 VDC, E-Coil, Deutsch
24EG	24 VDC, E-Coil, DIN 43650
24EJ	24 VDC, E-Coil, AMP Jr.
24ER	24 VDC, E-Coil, Deutsch
24EY	24 VDC, E-Coil, Metri-Pack 150