

# Model 4010

## Three-Way Thermostatic Valve



4010	4" Flange
4010M	4" Flange with Manual Override

Fluid Power Energy (FPE) Thermostatic Valves utilize the principle of expanding wax, which in the semi-liquid state undergoes large expansion rates within a relatively narrow temperature range. The self-contained element activates a stainless steel sleeve, which directs flow. All FPE Thermostatic Valves are factory set at predetermined temperatures: no further adjustments are necessary. A wide range of temperatures are available for water and oil temperature control applications.

When used in a diverting application, on start-up the total fluid flow is routed back to the main system. As fluid temperature rises to the control range, some fluid is diverted to the cooling system. As fluid temperature continues to increase, more flow is diverted. When the thermostat is in a fully stroked condition, all fluid flow is directed to the cooling system. FPE Thermostatic Valves may also be used in a mixing application.

In a mixing application, hot fluid enters the "B" port and colder fluid enters the "C" port. The flows mix and the thermostat adjusts to reach the desired temperature, exiting the "A" port.

Standard FPE thermostatic valve housings are made from aluminum and grey iron castings, however, ductile iron, bronze, steel and stainless steel housings are available.

Available Connections: 125# FF Flange, 150# RF Flange, 300# RF Flange, and Navy Flanges.

Optional features: Manual Override, High Over Temp element, Plated element. Other options available upon request.

## Features

Wide Range of Temperatures

Heavy Duty

Self-Contained

Replaceable Element

Non-Adjustable

Rugged Construction

Tamper-Proof

Operate in Any Position

Available for Refrigeration Service



## FLUID POWER ENERGY, INC.

W229 N591 Foster Court • Waukesha, WI 53186

262 • 548 • 6220 Fax 262 • 548 • 6239

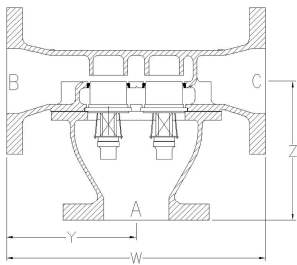
[www.fpevalves.com](http://www.fpevalves.com)



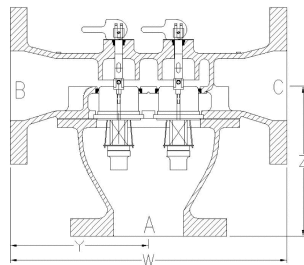
# Model 4010

MODEL NUMBER	BODY MATERIAL (*)	NOMINAL PIPE SIZE	PRINCIPAL DIMENSIONS (UNITS in. & (mm))				MAX WIDTH IN THE OTHER PLANE	FLANGE DRILLING			NO. OF ELEMENTS	APPROX. SHIPPING WEIGHT	NOTES OR NUMBERED ENDNOTES
			"X"	"Y"	"W"	"Z"		NO. OF HOLES	DIA. OF HOLES	BOLT CIRCLE			
*4010	A, B, D	4" 125# FF FLANGE	N/A	7 15/16 (201.61)	15 7/8 (403.23)	8 9/16 (217.49)	11 (279.40)	8	3/4 (19.05)	7 1/2 (190.50)	4	A=95#, B=116# D=90#	
	S, SS	4" 150# RF FLANGE	N/A	7 15/16 (201.61)	15 7/8 (403.23)	8 9/16 (217.49)	11 (279.40)	8	3/4 (19.05)	7 1/2 (190.50)	4	S & SS=104#	
*4010M	A, B, D	4" 125# FF FLANGE	N/A	7 15/16 (201.61)	15 7/8 (403.23)	8 9/16 (217.49)	11 (279.40)	8	3/4 (19.05)	7 1/2 (190.50)	4	A=97#, B=118# D=92#	Manual Override
	S, SS	4" 150# RF FLANGE	N/A	7 15/16 (201.61)	15 7/8 (403.23)	8 9/16 (217.49)	11 (279.40)	8	3/4 (19.05)	7 1/2 (190.50)	4	S & SS=106#	Manual Override
*4010X	S, SS	4" 300# RF FLANGE	N/A	7 15/16 (201.61)	15 7/8 (403.23)	8 9/16 (217.49)	11 (279.40)	8	7/8 (22.23)	7 7/8 (200.03)	4	S & SS=126#	
*4010XM	S, SS	4" 300# RF FLANGE	N/A	7 15/16 (201.61)	15 7/8 (403.23)	8 9/16 (217.49)	11 (279.40)	8	7/8 (22.23)	7 7/8 (200.03)	4	S & SS=127#	Manual Override

\* (Replace \* with body material type; A=Cast Iron, B=Bronze, D=Ductile, S=Steel, SS=Stainless Steel)



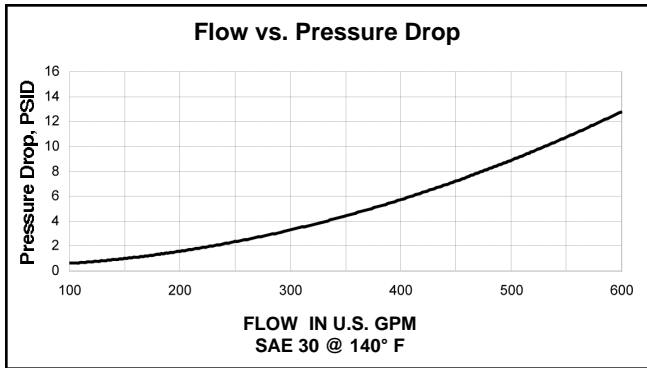
\*4010, \*4010X



\*4010M, \*4010XM

### PRESSURE RATINGS

MATERIAL	PSI
A	150
B	125
D	200
S, SS	275
SX, SSX	720



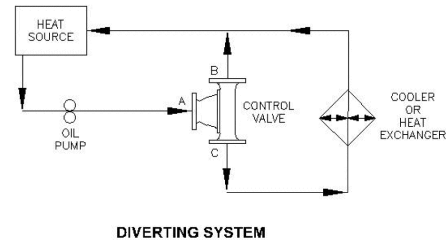
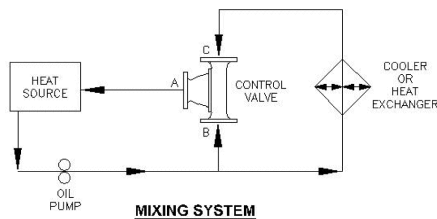
Recommended Pressure Drop is 2 to 7 PSI

PART #	DESCRIPTION
*4010	VALVE BODY (*See table for material)
*4020	VALVE COVER (*See table for material)
2071	LIP SEAL
4080-C	GASKET
2050-Temp	THERMOSTAT (Temp to follow dash)
1604	HEX BOLT
1605	LOCK WASHER
1590	NAMEPLATE

### FPE Model 4000 Replacement Kit (Includes the following:)

4080-C	GASKET
(4) 2071	LIP SEAL
(4) 2050-Temp	THERMOSTAT (Temp to follow dash)

### APPLICATION CHARTS



## To Order

Specify Model Number, nominal temperature desired, and housing material. For Model coding information, visit our website or consult your factory representative.



## FLUID POWER ENERGY, INC.

W229 N591 Foster Court • Waukesha, WI 53186

262•548•6220 Fax 262•548•6239

www.fpevalves.com