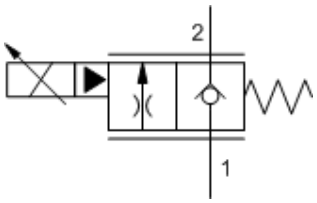
MODEL
FPHK

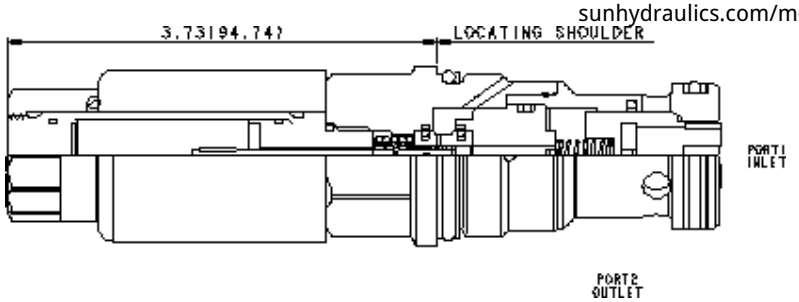
Pilot-operated, normally closed, electro-proportional throttle with reverse flow check

SERIES 3 / CAPACITY: 240 L/min. / CAVITY: T-16A

sunhydraulics.com/model/FPHK



X-Control



CONFIGURATION

X	Control	No Manual Override
E	Flow Rate	Nominal 60 gpm @ 200 psi (14 bar) differential (240 L/min.)
N	Seal Material	Buna-N
224	Coil	DIN 43650-Form A, 24 VDC

This valve is a pilot-operated, normally closed, electro-proportional throttle with reverse free-flow check. Energizing the coil generates an opening force on the pilot stage which vents the main stage poppet to open proportionally. Metered flow is from port 1 to port 2 with reverse free flow from port 2 to port 1.

TECHNICAL DATA

NOTE: DATA MAY VARY BY CONFIGURATION. SEE CONFIGURATION SECTION.

Recommended dither frequency	100 Hz
Maximum Valve Leakage at 110 SUS (24 cSt)	20 drops/min.@5000 psi
Manual Override Force Requirement	33 N/100 bar @ Port 1
Deadband, nominal (as a percentage of input)	25%
Manual Override Stroke	1,50 mm
Seal kit - Cartridge	Buna: 990016007
Seal kit - Cartridge	EPDM: 990016014
Seal kit - Cartridge	Polyurethane: 990016002
Seal kit - Cartridge	Viton: 990016006

CONFIGURATION OPTIONS

Model Code Example: FPHKXEN224

CONTROL (X)

- **X** No Manual Override
- **E** Twist (Extended) Manual Override
- **M** Manual Override

FLOW RATE (E)

- **E** Nominal 60 gpm @ 200 psi (14 bar) differential (240 L/min.)
- **C** Nominal 40 gpm @ 200 psi (14 bar) differential (160 L/min.)
- **A** Nominal 20 gpm @ 200 psi (14 bar) differential (80 L/min.)

SEAL MATERIAL (N)

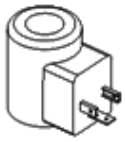
- **N** Buna-N
- **E** EPDM
- **V** Viton

COIL * (224)

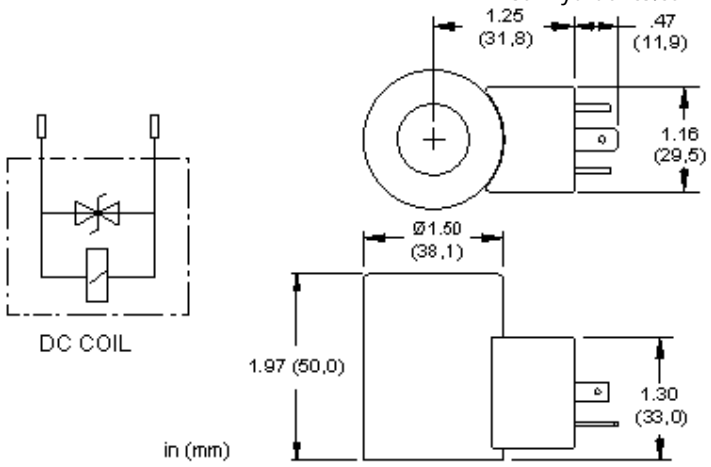
- **224** DIN 43650-Form A, 24 VDC
- No coil
- **212** DIN 43650-Form A, 12 VDC
- **224NX01** DIN 43650-Form A, 24 VDC, no transient voltage suppression (TVS) diodes, with XMD-01 driver
- **224NX02** DIN 43650-Form A, 24 VDC, no transient voltage suppression (TVS) diodes, with XMD-02 driver
- **912** Deutsch DT04-2P, 12 VDC
- **912NX01** Deutsch DT04-2P, 12 VDC, no transient voltage suppression (TVS) diodes, with XMD-01 driver
- **912NX02** Deutsch DT04-2P, 12

	VDC, no transient voltage suppression (TVS) diodes, with XMD-02 driver
924	Deutsch DT04-2P, 24 VDC
924NX01	Deutsch DT04-2P, 24 VDC, no transient voltage suppression (TVS) diodes, with XMD-01 driver
924NX02	Deutsch DT04-2P, 24 VDC, no transient voltage suppression (TVS) diodes, with XMD-02 driver

* Additional coil options are available



CONFIGURATION



TECHNICAL DATA

Maximum Coil Temperature at 68°F (20°C) Ambient	218°F (105°C)
Arc Suppression (TVS)	Included
Power Consumption (cold) - at rated voltage	22 watts
Maximum Ambient Temperature	50 °C
Voltage/Frequency	24 VDC
Operating Voltage Range	+/- 10% nominal
Duty Cycle Rating	100 %
Connector	ISO4400 - EN/DIN175301-803, Form A (ISO/DIN 43650) 3-pin
Connector Environment Rating	IP65/IP67
Coil Nut Torque	0,5 Nm

USED WITH

DMDA DMDAS DNCA DNDA DNDAS DNDC DNDY DNDYS FMDA FMDB FPCC FPCH FPFK FPHK HDDA PRDM PRDN PSDL PSDP RBAN RBAP