Introduction

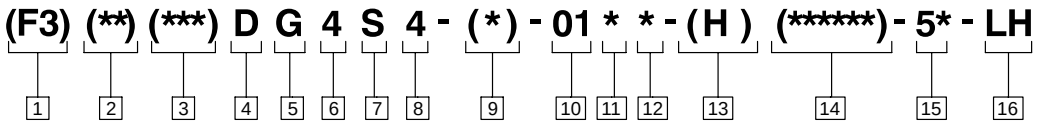
DG4S*-01 models are air gap type, direct solenoid operated, 2-way or 4-way directional control valves. Their primary function in a hydraulic circuit is to direct fluid flow to a work cylinder or to control the direction of rotation of a hydraulic motor.

Port connections are made by mounting the valve on a manifold or subplate containing the interface.

Valves are available with AC or DC solenoid(s). Electrical connections to the valve are made in an electrical wiring terminal box or by various plug-in devices. A ground terminal is provided.

Model Code

Two & Four-way Directional Valves



1 Special seals

Blank– For petroleum oils, water glycols and invert emulsions
F3 – Mineral oil & fire resistant fluids

2 Optional features

S - Monitor switch for spring offset (A and F models only)
X - Solenoids for hazardous locations
XM - Solenoids for mining applications NOTE: X or XM not available with plug-in options monitor switch or indicator lights.
Blank - Omit if not required

3 Electrical plug-in options

PA - Insta-plug (male receptacle)
PB - Insta-plug (male & female receptacle)
PA3 - NFPA 3-pin connector
PA5 - NFPA 5-pin connector
Blank - Omit if not required

4 Control type

D – Directional valve

5 Mounting type

G - Manifold or subplate

6 Operation

4 – Solenoid operated

7 Valve type

S – Sliding spool

8 Flow direction

2 - Two-way flow direction
4 - Four-way flow direction

9 Electrical accessories

L - Solenoid indicator lights (for use with 100 through 125 and 192 through 233 voltage service only). Not available for hazardous duty units.
W - Wiring housing
Blank - Omit if not required

10 Valve size

01 – NFPA-D05 (ISO-4401-05) Interface

11 Spool type

0 – Open center all ports
1 – Open center P & A, closed B
2 – Closed center all ports
3 – Closed center P & B
6 – Closed center P only
7 – Open center, T blocked
8 – Tandem open crossover

12 Spool/Spring arrangement

A - Spring offset
B - Spring center, two position
C - Spring centered, three position
F - Spring offset, energize to center
N - No spring, detented

13 Solenoid (air gap)

H - Oil immersed (optional)
Blank-Omit if not required

14 Electrical service

Blank - Standard 115V AC 60 Hz
* - Specify other voltages and frequencies, including 230V AC 60 Hz, 24V DC etc.

15 Design number

Subject to change. Installation dimensions remain as shown for designs 50 through 59

16 Spring offset models

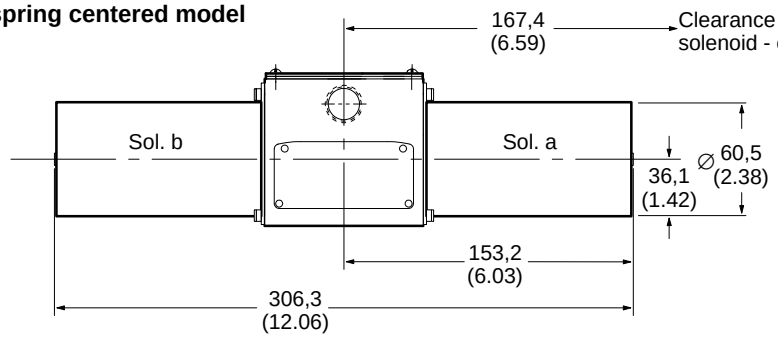
LH - Left hand assembly, solenoid A. Omit for right hand assembly For spool/spring arrangements A, B, & F only (energizing solenoid B provides flow from P to A)

318579-XDG4S4-012C-50

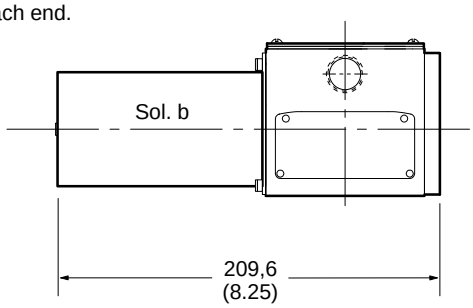
DC Solenoids

Millimeters (inches)

Double solenoid, no-spring detented & spring centered model

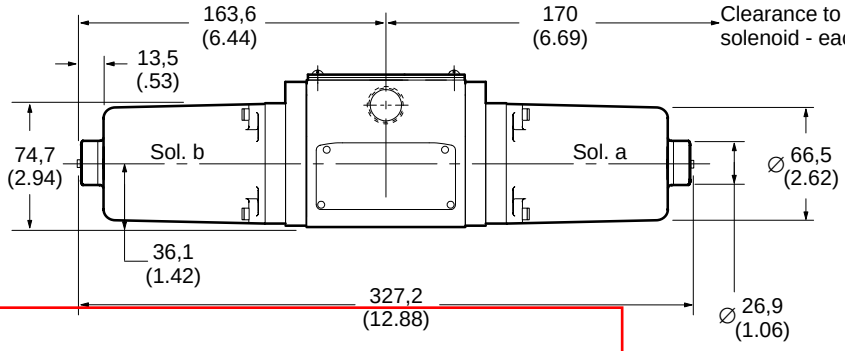


Single solenoid, spring offset model

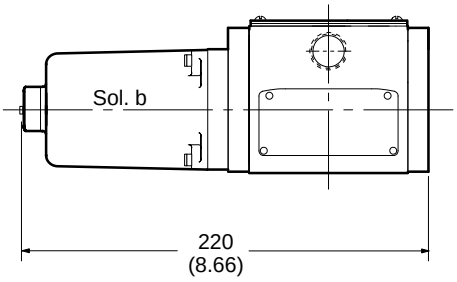


Oil Immersed Solenoids

Double solenoid, no-spring detented & spring centered model

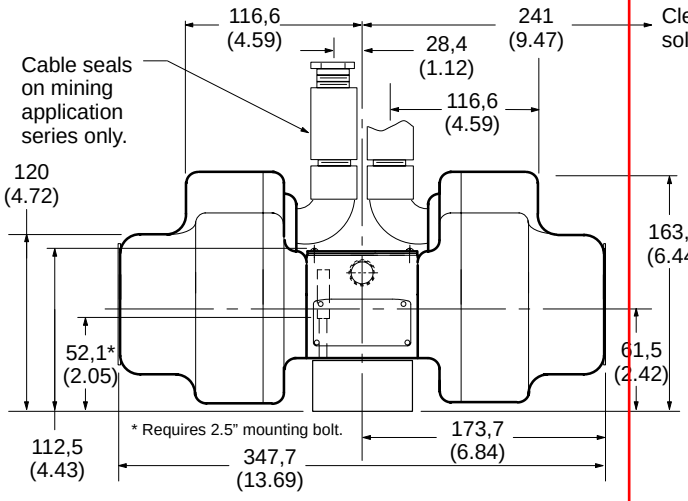


Single solenoid, spring offset model

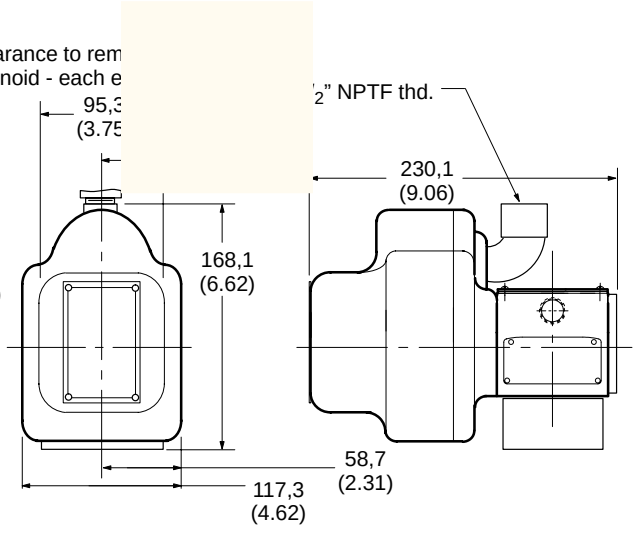


Hazardous Location & Mining Applications (X and XM)

Double solenoid, no-spring detented & spring centered model



Single solenoid, spring offset model



X - Valves have "UL" listed solenoids for use in hazardous locations. Class I Group D, Class II Group E-F-G, for 115 and 230 V AC, 60 Hz service.
XM - Valves for mining applications are built to MSHA schedule 2G-File X/P837-2. Available in all standard AC voltages.

VICKERS

DIRECTIONAL VALVE

PILOT VALVE MODEL NO.

318579-XDG4S4 012C 50

SEE MAINSTAGE NAMEPLATE FOR
TWO-STAGE VALVE MODEL NO.
VICKERS, INCORPORATED.
TROY, MI USA

VICKERS®

SOLENOID FOR USE
IN HAZARDOUS LOCATIONS

LISTED 288627

UL 378G

CLASS I GR. D
CLASS II GR. E-F-G
OPERATING
TEMPERATURE T3B

115 VOLTS MAX.
.60 AMPS (HOLDING)
60 HERTZ

CAUTION

TO PREVENT IGNITION OF
HAZARDOUS ATMOSPHERES
UNIT MUST BE DISCONNECTED
FROM ITS SUPPLYING CIRCUIT
BEFORE OPENING COVER
COVER MUST BE TIGHTLY
CLOSED AGAIN BEFORE UNIT