



# HYDRAULIC SCREW-IN VALVES (Ex) proof II 2 GD, Ex db IIC T5 Gb & Ex tb IIIC T100 °C Db EVX-\*-C5/25 25 I/min 25 MPa (250 bar)

### **1** DESCRIPTION

Valves EVX-\*-C5 are ATEX directional control valve in cartridge style poppet type. It is suitable for 2 way metric cavity M22 x 1,5 or cavity SAE 08. The valve is available with ATEX metallic DC and AC solenoids. The coil is Zinc-nichel coated for an enhanced surface protection (ISO 9227, 520 h salt spray).

Protection according to IEC 144: Class IP67- External surfaces zinc-nickel coated (min. thickness 7 micron)

Connection: 3,5 mm<sup>2</sup>wire cable (CEI 20-22), length 3 m already connected to coil. Electrical connection must be accordance to Ex-proof norm ATEX. Earth connection both internal, with yellow-green wire in the cable,and external with a minimum 4mm<sup>2</sup> cable fastened to earth screw.

### 2 ORDERING CODE

(1)		(2)		(3)		(4)		(5)		(6)
EVX	-		-	C5	-		-		/	25

(1) EVX: Ex-proof solenoid operated screw-in poppet valve

(2) Size:

- 06: metric cavity M22x1,5 See 5 34: SAE 08 cavity 3/4" 16 UNF See 5
- (3) C5: two way type

(4) Coils:

012C: 12V DC-0,92A 024C: 24V DC-0,46A 115A: 115V AC-0,10A 230A: 230V AC-0,05A

(5) Cable lenght :

no designation: standard 3m cable

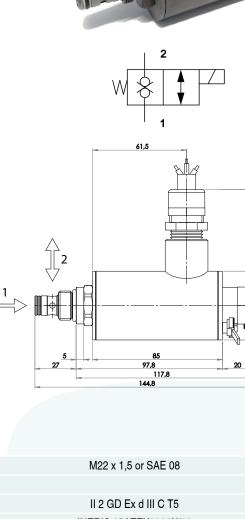
5: 5m

- 10: 10m
- 16: 16m
- 20: 20m

(6) /25: Design number of the valves Atex solenoid for G and D

## **3** TECHNICAL DATA

Suitable for standard cavity:	M22 x 1,5 or SAE 08						
Solenoids according to ATEX 94/9/CE and conform to EN 50281-1-1							
ATEX code/class:	II 2 GD Ex d III C T5						
Certificate:	INERIS 05ATEX0028X/02						
Max. operating pressure:	250 bar						
Max. flow rate:	25 l/min						
Duty cycle:	100%						
Materials:	Steel body, poppet in tempered and grinded steel						
Mass	1,40 kg (coil included)						



**6**0015

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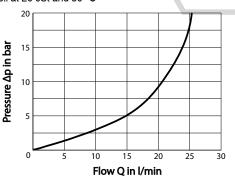
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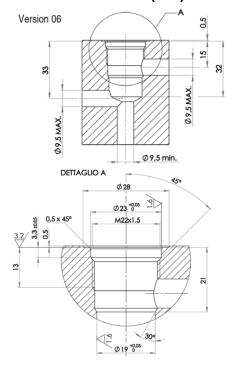


### 4 TYPICAL DIAGRAMS

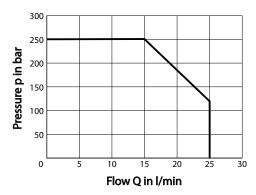
Typical  $\Delta p$ -Q curves for valves EVX-\*-C5 in standard configuration, with mineral oil at 26 cSt and 50 °C



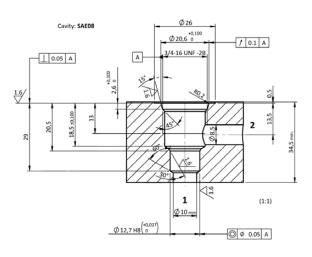
5 INSTALLATION DIMENSIONS (mm)



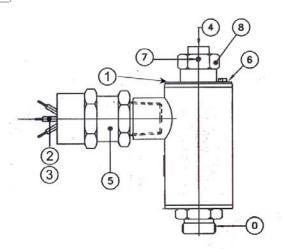
Typical p-Q curves of operating limits for maximum hydraulic power transferred by valves EVX-\*-C5







#### 6 EXPLOSION PROOF SOLENOID GMA-6/HD SERIES 271 GD



Atex Certificates : INERIS 05ATEX0028X/02 for Gas and Dust

0: Ex proof solenoid according to ATEX 94/9/EC.

II 2GD Ex db IIC T5 Gb, Ex tb IIIC T100 °C Db IP66/67.

Solenoid outside surfaces are zinc-nickel plated, with 7µm minimum thickness 1: Solenoid label indicates supply voltage, protection class Ex d, certification number by INERIS and maximum absorbed power.

2: 3-wires cable, according to CEI 20-22, of standard length of 3 m, is fastened to the coil and locked by cable gland.

3: Wires have 1,5 mm<sup>2</sup> section; earth connection wire is green-yellow.

- Electric connection must be in accordance with Ex-proof norm ATEX.
- 4: Manual override operation is by pushing the extended pin.

5: Normalised cable gland –torque 8 Nm  $\pm$  1 – device has threaded attachment  $1\!\!\!/2"$  conical – ISO 7/1

- 6: Earth connection screw
- 7: Threaded plug (socket hexagon 1,5 mm)to lock the retaining coil nut
- 8: Nut for retaining the coil -torque 6 Nm ± 1 hexagon 24 mm.

Conformity of unit to the norms is not granted if coil is used separately from its electromagnetic tube.

