

4 - ELECTRICAL CHARACTERISTICS

Proportional solenoid

The proportional solenoid comprises two parts: tube and coil.

The tube, screwed to the valve body, contains the armature which is designed to maintain friction to a minimum thereby reducing hysteresis.

The coil is mounted on the tube secured by means of a lock nut.

It can be rotated through 360° depending on installation clearances.

Protection from atmospheric agents IEC 60529

The IP protection degree is guaranteed only with both valve and connectors of an equivalent IP degree correctly connected and installed.

electric connection	electric connection protection	whole valve protection
K1 EN 175301-803 (ex DIN 43650)	IP65	IP65
K7 DEUTSCH DT04 male	IP65/67	

NOMINAL VOLTAGE	V DC	12	24
RESISTANCE (at 20°C) K1 coil K7, WK1, WK7 coil	Ω	3.66 4.4	17.6 18.6
	A	1.88	0.86
DUTY CYCLE		100%	
ELECTROMAGNETIC COMPATIBILITY (EMC)		According to 2014/30/EU	
CLASS OF PROTECTION : Coil insulation (VDE 0580) Impregnation		class H class F	

5 - STEP RESPONSE

(obtained with mineral oil with viscosity of 36 cSt at 50°C and electronic control card)

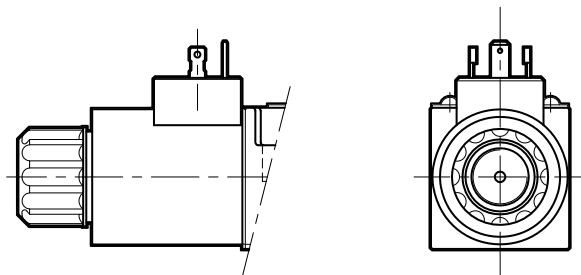
Step response is the time taken for the valve to reach 90% of the setted positioning value, following a step change of reference signal. The table shows typical response times tested with spool type C16 and $\Delta p = 30$ bar P-T.

REFERENCE SIGNAL STEP	0 → 100%	100 → 0%
Step response [ms]	50	40

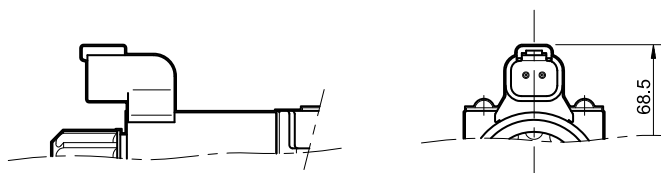
6 - ELECTRIC CONNECTIONS

Connectors for K1 connection are always delivered together with the valve.

connection for EN 175301-803 (ex DIN 43650) connector
code **K1** (standard)
code **WK1** (W7 version only)



connection for DEUTSCH DT06-2S male connector
code **K7**



connection for DEUTSCH DT06-2S male connector
code **WK7** (W7 version only)

