

When the solenoid coil is de-energised, the valve allows flow in both directions between ports 3 and 2 and in both directions between ports 4 and 1. When the solenoid coil is energized is free flow through the valve directions between ports 3 a also between ports 1 and 2. the solenoid coil is energized, there is free flow through the valve in both directions between ports 3 and 4 and

**4/2 Solenoid Directional Valve UNE** Spool Type, Direct-Acting SAE-10 Cartridge – 350 bar WK10X-01

# FEATURES

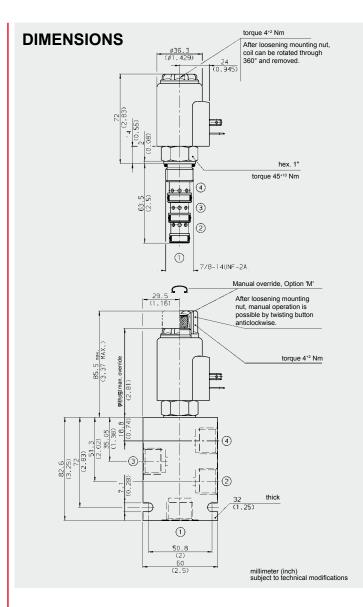
- External surfaces zinc-plated and corrosion-proof
- Hardened and ground internal valve components to ensure minimal wear and extended service life
- Coil seals protect the solenoid system
- Wide variety of connections available
- Excellent switching performance by high power HYDAC solenoid
- Low pressure drop due to CFD optimized flow path

# SPECIFICATIONS

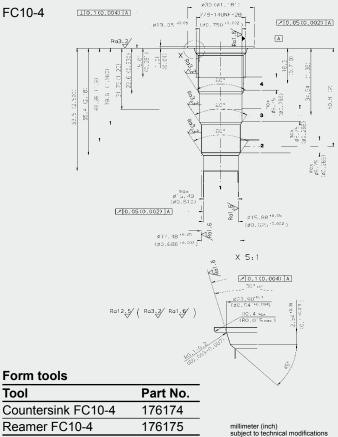
Operating pressure:	max. 350 bar			
Nominal flow:	max. 32 l/min			
Internal leakage:	max. 100 cm³/min	max. 100 cm³/min at 250 bar and 34 mm²/s		
Media operating temperature range:	min20 °C to ma	ax. +100 °C		
Ambient temperature range:	min20 °C to ma	ax. 60 °C		
Operating fluid:	Hydraulic oil to D	Hydraulic oil to DIN 51524 Part 1 and 2		
Viscosity range:	min. 7.4 mm²/s to max. 420 mm²/s			
Filtration:	Class 21/19/16 according to ISO 4406 or cleaner			
Installation:	No orientation restrictions			
MTTF <sub>d</sub> :	150 years (see "Conditions and instructions for valves" in brochure 5.300)			
Materials:	Valve body:	free-cutting steel		
	Spool:	hardened and ground steel		
	Seals:	NBR (standard) FKM (optional, media temperature range -20 °C to +120 °C)		
	Back-up rings:	PTFE		
	Coil:	Steel/Polyamide		
Cavity:	FC10-4			
Weight:	Valve complete	0.48 kg		
	Coil only	0.23 kg		
Electrical data:				
Current draw at 20 °C:	2.22 A at 12 V DC 1.13 A at 24 V DC			
Voltage tolerance:	± 15% of the nominal voltage			
Coil duty rating:	Continuous up to max. 115% of the nominal voltage at 60 °C ambient temperature			
Type of voltage:	DC solenoid, AC voltage is rectified using a bridge rectifier built into the coil			
Coil type:	Coil50-1836			

440 HYDAC

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## CAVITY



<b>MODEL CODE</b> <u>WK10X</u> - $01$ M - C - N - $24$ DG
Basic model Directional spool valve, UNF
01 = standard
Manual override
no details = without manual override
M = manual override
Body and ports* C = cartridge only
SB4 = G1/2 ports, steel body
AB4 = G1/2 ports, aluminium body
Seals
N = NBR (standard)
V = FKM
Coil voltage
12 = 12  V DC
24 = 24 V DC
AC voltages (bridge rectifier built into the coil)
115 = 115  VAC
230 = 230 V AC
Other voltages on request
Coil connectors (type 40-1836) DC: DG = DIN connector to EN 175301-803
DK = KOSTAL threaded connection M27x1
DL = 2 flying leads, 457 mm long, 0.75 mm <sup>2</sup>
DN = Deutsch connector, 2-pole, axial
DT = AMP Junior Timer, 2-pole, radial
AC: AG = DIN connector to EN 175301-803
Other connectors on request

#### Standard models

Model code	Part No.
WK10X-01-C-N-24DG	3079851
WK10X-01-C-N-230AG	3096314
Other models on request	

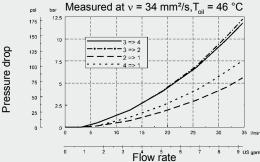
#### \*Standard in-line bodies

Code	Part No.	Material	Ports	Pressure
FH104-SB4	3037784	Steel, zinc-plated	G1/2	420 bar
FH104-AB3	3038097	Aluminium, anodized	G1/2	210 bar
Other housings on request				

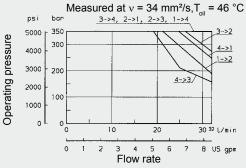
## Seal kits

Code	Material	Part No.	
FS104-N SEAL KIT	NBR	3051912	
FS104-V SEAL KIT	FKM	3071275	

## PERFORMANCE



### **OPERATING LIMITS**



**NOTE** The information in this brochure relates to the For applications or operating conditions not described. For applications or operating conditions not described, please contact the relevant technical department. Subject to technical modifications.

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