

5-VMK 20

5-VFK 20

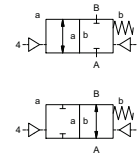
valve type with pilot valve

coaxial valve

type VMK 20 VFK 20



2/2 way valve externally controlled
pressure range PN 0-100 bar
orifice DN 20 mm
connection thread/flange
function valve normally closed symbol **NC**
 valve normally open symbol **NO**



△ Above stated body materials refer to the valve port connections that get in contact with the media only!

design pressure balanced, with spring return
body materials ① brass ② steel, galvanized
 ③ brass, nickel plated ⑤ without non-ferr. metals
 ④ steel, nickel plated ⑥ stainless steel
valve seat synthetic resin on metal
seal materials NBR PTFE, FPM, CR, EPDM

details needed for main valve

- orifice
- port
- function NC/NO
- operating pressure
- flow rate
- media
- media temperature
- ambient temperature
- type of actuation

details needed for pneumatic actuation

- nominal voltage
- type of protection
- actuation pressure range min/max
- low wattage coil, actuation pressure range 4-7 bar
- pilot valve type

details needed for hydraulic actuation

- actuation pressure range min/max
- hydraulic control valve function

⚠ The valves' technical design is based on media and application requirements. This can lead to deviations from the general specifications shown on the data sheet with regards to the design, sealing materials and characteristics.

⚠ If order or application specifications are incomplete or imprecise there exists a risk of an incorrect technical design of the valve for the required application. As a consequence, the physical and / or chemical properties of the materials or seals used, may not be suitable for the intended application.

■ specifications not highlighted are standard
 ■ specifications highlighted in grey are optional

general specifications		options
ports	VMK threads G 3/4 - G 1 1/4 VFK flanges PN 16 / 40 / 100	special threads special flanges
function	NC	NO
pressure range	bar 0-16 / 0-40 / 0-64 / 0-100	> 100 bar upon request
Kv value	m ³ /h 8,8	
vacuum	leak rate	< 10 ⁻⁶ mbar·l·s ⁻¹
pressure-vacuum	P ₁ ↔ P ₂	pressure side max. 100 bar vacuum side leak rate upon request
back pressure	P ₂ > P ₁	available (max. 16 bar)
media	gaseous - liquid - highly viscous - gelatinous - pasty - contaminated	version available
abrasive media		
damping	opening by throttles on pilot valve closing as marked	bi-directional upon request
flow direction	A ↔ B as marked	
switching cycles	1/min 200	
switching time	ms opening 50-3000 closing 50-3000	
media temperature	°C direct mounted pilot valve 60	remote mounted pilot valve outside temper-
ambient temperature	°C direct mounted pilot valve 50	ratur range of media max. 160 °C
flush ports		available
leak ports		available
limit switches		inductive / mechanical upon request
manual override	via pilot valve	
approvals		LR/GL/WAZ
mounting		mounting brackets
weight	kg VMK 4,7 VFK 6,7	
additional equipment		upon request

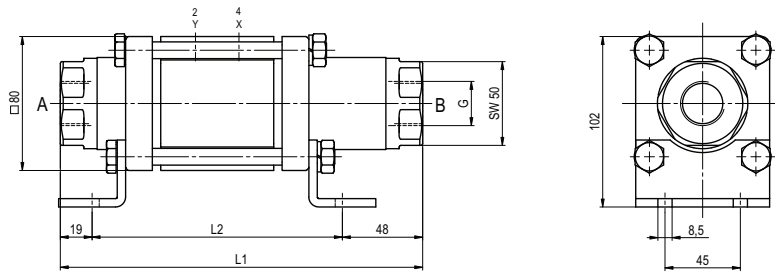
electrical specifications		options
nominal voltage	U _n DC 24 V U _n AC 230 V 50 Hz	special voltage upon request special voltage upon request
power consumption	DC 4,8 W AC pick up 11,0 VA holding 8,5 VA	2,5 W
protection	IP65 (P54) acc. DIN 40050	
energized duty rating	ED 100%	
connection	plug acc. DIN EN 175301-803 form B, 4 positions x90° / wire diameter 6-8 mm	connector acc. VDMA
optional	M12x1 connector acc. DESINA	
additional equipment	illuminated plug with varistor	
max. temperature	media 60°C ambient 50°C	
explosion proof	E Ex e II T5 nominal voltage U _n power consumption	DC 24 V 3,25 W AC 230 V 50 Hz 2,90 W

pneumatic specifications		options
actuation pressure range	bar 4-10	
air consumption	cm ³ /stroke 11	
cycle speed	main valve speed variable by throttleson pilot valve	
control	preferably 5/2 way pilot valve	
pilot valve interface	co-ax / Namur	ISO 1
actuator ports	2/4 G 1/8	G 1/4

hydraulic specifications		options
actuation pressure range	bar 10-30 / 30-60	
control	preferably 4/2 way control valve	
actuator ports	X/Y G 1/4	NPT 1/4
by media		

type VMK 20

function: **NC**
closed when not energized

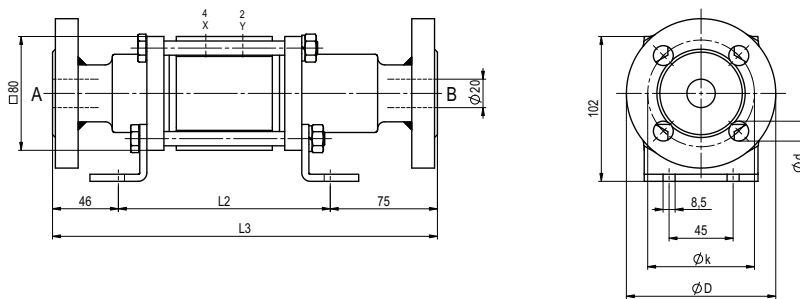


constructive length	L1	L2	L3
standard	216	149	270
with 1/2 inductive limit switches	235	168	289
with force-feed lubrication nipple	254	187	308
with mechanical limit switches	237	170	291

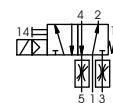
flanges PN	DIN	ØD	Øk	Ød
16	EN 1092-1	105	75	14
40	EN 1092-1	105	75	14
100	EN 1092-1	130	90	18

type VFK 20

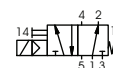
function: **NO**
open when not energized



pneumatic actuation



5/2 way pilot valve
flow rate 700 l/min
pressure range 3-10 bar G 1/8



5/2 way pilot valve ISO 1
flow rate 700 l/min
pressure range 3-10 bar G 1/4