

**5-VMK 15 DR****5-VFK 15 DR**

valve type with pilot valve

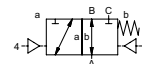
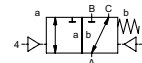
# coaxial valve


## type VMK 15 DR

## VFK 15 DR



**3/2 way valve** externally controlled  
**pressure range** PN 0-100 bar  
**orifice** DN 15 mm  
**connection** thread/flange  
**function** valve  
 normally closed (A ► B)  
 symbol **NC**  
 valve  
 normally open (A ► B)  
 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, switching overlap  
**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
- inlet pressure at A, B or C
- 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.

general specifications		options
<b>ports</b>	VMK threads G 3/8 - G 3/4 VFK flanges PN 16 / 40 / 100	special threads special flanges
<b>function</b>	NC	NO
<b>pressure range</b>	bar 0-16 / 0-40 / 0-64 / 0-100 A ► B max. 100 / B ► A max. 16 / A ► C max. 100 / C ► A max. 100	
<b>Kv value</b>	m³/h 5,6	
<b>vacuum</b>	leak rate < 10 <sup>-6</sup> mbar·l·s <sup>-1</sup>	
<b>pressure-vacuum</b>	P <sub>1</sub> ► P <sub>2</sub>	pressure side max. 100 bar vacuum side leak rate upon request
<b>back pressure</b>	P <sub>2</sub> > P <sub>1</sub> see pressure range	
<b>media</b>	gaseous - liquid - highly viscous - gelatinous - pasty - contaminated	
<b>abrasive media</b>		version available
<b>damping</b>	opening by throttles on pilot valve closing see pressure range	
<b>flow direction</b>	see pressure range	
<b>switching cycles</b>	1/min 200	
<b>switching time</b>	ms opening 50-3000 closing 50-3000	
<b>media temperature</b>	°C direct mounted pilot valve 60	remote mounted pilot valve outside temperature range of media max. 160 °C
<b>ambient temperature</b>	°C direct mounted pilot valve 50	
<b>flush ports</b>		available
<b>leak ports</b>		available
<b>limit switches</b>		inductive / mechanical upon request
<b>manual override</b>	via pilot valve	
<b>approvals</b>		LR/GL/WAZ
<b>mounting</b>		mounting brackets
<b>weight</b>	kg VMK 4,5 VFK 5,3	
<b>additional equipment</b>		upon request

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

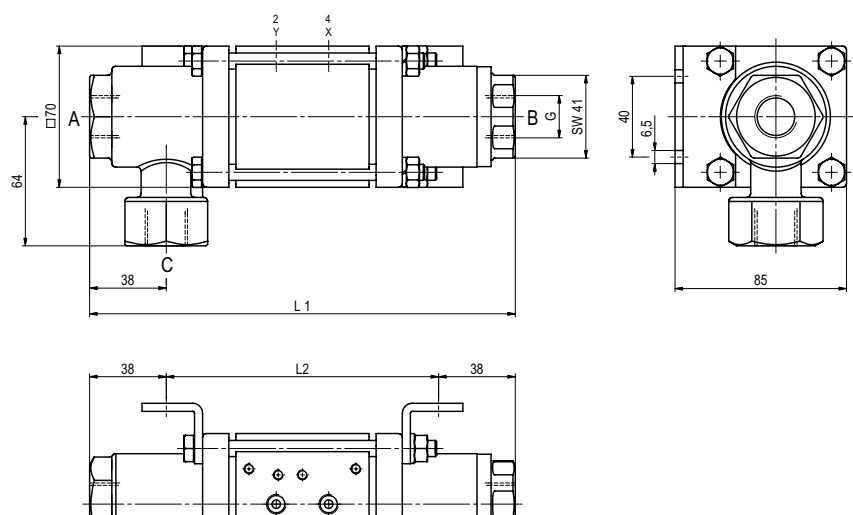
pneumatic specifications		options
<b>actuation pressure range</b>	bar 4-10	
<b>air consumption</b>	cm³/stroke 11	
<b>cycle speed</b>	main valve speed variable by throttles on pilot valve preferably 5/2 way pilot valve	
<b>control</b>	co-ax / NAMUR	ISO 1
<b>pilot valve interface</b>	2/4 G 1/8	G 1/4
<b>actuator ports</b>		

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

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

type **VMK 15 DR**

function: **NC**  
closed when not energized (A ► B)

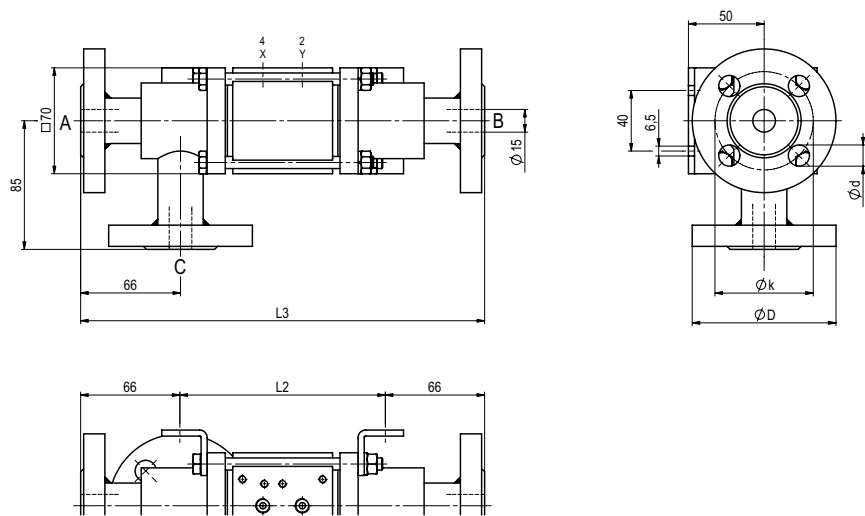


constructive length	L1	L2	L3
standard	211	135	267
with 1/2 inductive limit switches	237	161	293
with force-feed lubrication nipple	244	168	300
with mechanical limit switches	237	161	293

flanges PN	DIN	ØD	Øk	Ød
16	EN 1092-1	95	65	14
40	EN 1092-1	95	65	14
100	EN 1092-1	105	75	14

type **VFK 15 DR**

function: **NO**  
open when not energized (A ► B)



**pneumatic actuation**

