

09/2022



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

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
- 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. To avoid hydraulic shocks in pipelines, the flow velocities must be taken into account when designing valves for liquids.

specifications not highlighted are standard
 specifications highlighted in grey are optional

2/2-way valve

pressure range
orifice
connection
function

operating principle

body material

valve seat

seal materials

ports

function
pressure range

Kv value
vacuum
pressure-vacuum

back pressure
media

abrasive media
damping

flow direction
switching cycles
switching time

media temperature
ambient temperature
flush ports
leak ports
limit switches
manual override
approvals
mounting
weight
additional equipment

nominal voltage

power consumption

protection
energized duty rating
connection
optional additional equipment
max. temperature

explosion proof

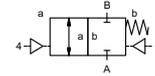
actuation pressure range
air consumption
cycle speed
control
pilot valve interface
actuator ports

actuation pressure range
control
actuator ports
by media

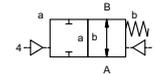
externally controlled

PN 0-100 bar
 DN 10 mm
 thread

valve normally closed
 symbol **NC**



valve normally open
 symbol **NO**



pressure balanced, with spring return

- | | |
|------------------------|-------------------|
| ① brass | ② |
| ③ brass, nickel plated | ⑤ |
| ④ | ⑥ stainless steel |
| ⑦ aluminium | |

synthetic materials on metal
 NBR PTFE, FPM, CR, EPDM

general specifications

VMK threads G 1/4 - G 3/4
 NC
 bar 0-16 / 0-40 / 0-63 / 0-100

options

special threads
 NO

m³/h 2.5 (> 63 bar = 2.1)
 leak rate < 10⁻⁶ mbar•L•s⁻¹
 P₁ ⇔ P₂ pressure side max. 100 bar
 P₂ > P₁ vacuum side leak rate upon request available (max. 16 bar)

opening closing by throttles on pilot valve
 A ⇔ B as marked bi-directional upon request

1/min 680
 ms opening 30-3000
 closing 50-3000
 °C direct mounted pilot valve 60 remote mounted pilot valve outside
 °C direct mounted pilot valve 50 temperatur range of media max. 160 °C

via pilot valve inductive

kg VMK 1.7 LR/DNV/WAZ mounting brackets upon request

electrical specifications

U_n DC 24 V special voltage upon request
 U_n AC 230 V 50 Hz special voltage upon request
 DC 4.8 W 2.5 W [actuation pressure range 4-7 bar]

options

AC pick up 11.0 VA holding 8.5 VA
 IP65 (P54) acc. DIN 40050
 ED 100%
 plug acc. DIN EN 175301-803 form B, 2 positions x180° / wire diameter 6-8 mm
 M12x1 connector acc. DESINA connector acc. VDMA
 illuminated plug with varistor
 media 60°C
 ambient 50°C
 E Ex e II T5 nominal voltage U_n DC 24 V 3.25 W
 power consumption AC 230 V 50 Hz 2.90 W

pneumatic specifications

bar 4-8
 cm³/stroke 2
 main valve speed variable by throttleson pilot valve preferably 5/2 way pilot valve
 co-ax NAMUR acc. VDI / VDE 3845
 2/4 G 1/8

options

hydraulic specifications

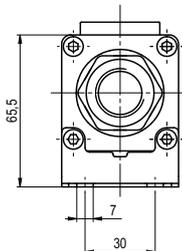
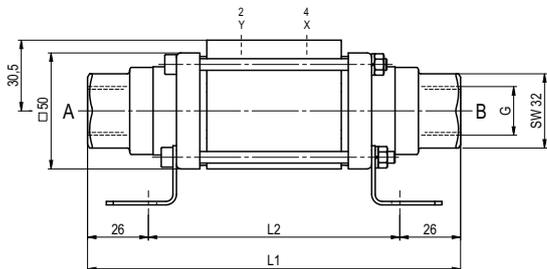
bar 4-10
 X/Y preferably 4/2 way control valve
 G 1/8

options

coax® data sheet - coaxial valve

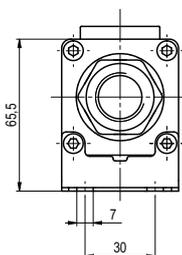
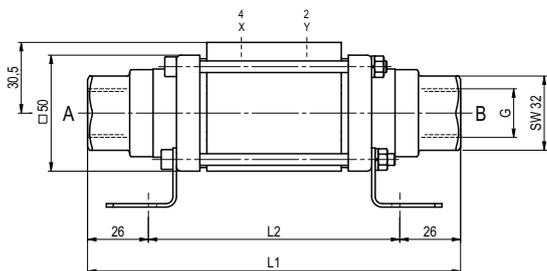
type VMK 10

function: **NC**
closed when not energized

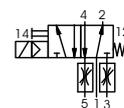


constructive length	L1	L2 [0-63 bar]	L2 (> 63 bar)
standard	159,5	107,5	114,5
with inductive limit switches	179,5	127,5	134,5

function: **NO**
open when not energized



pneumatic specifications



5/2 way pilot valve
flow rate 280 l/min
pressure range 3-10 bar G 1/8