

# Vacuum Solutions



A wide range of Components covering most industrial sectors

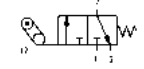
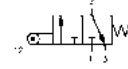
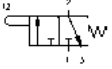
- *Basic Vacuum Ejectors*
- *In-line Ejectors*
- *Compact Ejectors with Integrated Filter/ Silencer and Blow-Off Function*
- *Compact Ejectors with Air Saving Circuits for Reduced Operation Costs*
- *Electronic Vacuum / Pressure Switches with or without Digital Display*
- *Flat Suction Pads (Round and Oval)*
- *Bellows Suction Pads (1.5 and 2.5 Folds)*
- *Check Valves for Automatic Exclusion*
- *Flexible Pad Mountings*
- *Spring Plungers for Height Compensation*

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**Series 2 Mechanically Operated Minivalves**

Series 2, 3/2-way Connections: M5, ø4mm cartridge



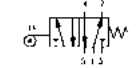
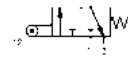
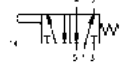
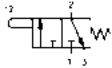
4.  
6

<b>Plunger</b>	<b>Panel Mounted Plunger</b>	<b>Roller Lever</b>	<b>One-Way Trip</b>
<b>235-945</b> (M5)	<b>235-985</b> (M5)	<b>235-955</b> (M5)	<b>235-965</b> (M5)
<b>234-945</b> (4mm)	<b>234-985</b> (4mm)	<b>234-955</b> (4mm)	<b>234-965</b> (4mm)

CODING EXAMPLE	
<b>2</b>	<b>3</b>   <b>4</b>   <b>-</b>   <b>94</b>   <b>5</b>
<b>2</b>	SERIES: 2
<b>3</b>	FUNCTION: 3 = 3/2-way NC 4 = 3/2-way NO on request
<b>4</b>	CONNECTIONS: 4 = ø4mm cartridge 5 = M5
<b>94</b>	ACTUATION: 94 = plunger 95 = roller/lever 96 = unidirectional lever 98 = plunger, panel mounting
<b>5</b>	RESETTING: 5 = Spring return

**Series 1 and 3 Mechanically Operated Valves**

Series 1, 3/2-way and 5/2-way Connections: 1/8 and 1/4  
Series 3, 3/2-way and 5/2-way Connections: 1/8



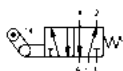
<b>Plunger 1/8" 3/2</b>	<b>Plunger 1/8" 5/2</b>	<b>Roller/Lever 1/8" 3/2</b>	<b>Roller/Lever 1/8" 5/2</b>
<b>338-945</b>	<b>358-945</b>	<b>338-955</b>	<b>358-955</b>

## MECHANICAL AND MANUAL VALVES

Series 1 and 3 Mechanically Operated Valves - continued



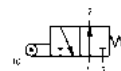
Roller/Lever One-Way Trip 1/8" 3/2  
**338-965**



Roller/Lever One-Way Trip 1/8 5/2  
**358-965**



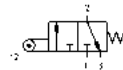
Plunger 1/8" 3/2 N.C.  
**138-945**



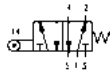
Plunger 1/8" 3/2 N.O.  
**148-945**



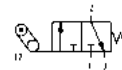
Plunger 1/8" 5/2  
**158-945**



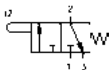
Roller/Lever 1/8" 3/2  
**138-955**



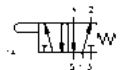
Roller/Lever 1/8" 5/2  
**158-955**



Roller/Lever One-Way Trip 1/8" 3/2  
**138-965**



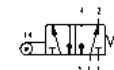
Plunger 1/4" 3/2  
**134-945**



Plunger 1/4" 5/2  
**154-945**



Roller/Lever 1/4" 3/2  
**134-955**



Roller/Lever 1/4" 5/2  
**154-955**

### CODING EXAMPLE

**3**

**3**

**8**

**-**

**94**

**5**

**3** SERIES: 1, 3

**3** FUNCTION:  
3 = 3/2 way N.C.  
4 = 3/2 way N.O.  
5 = 5/2 way

**94** ACTUATION:  
94 = plunger  
95 = roller/lever  
96 = unidirectional roller/lever

**8** CONNECTIONS:  
8 = 1/8  
4 = 1/4 only Series 1

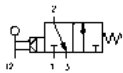
**5** RESETTING:  
5 = spring return

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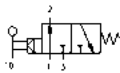
Series 3 and 4 Mechanically Operated Sensor Valves

3/2 and 5/2  
Connections: 1/8, 1/4

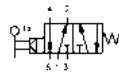
4.  
6



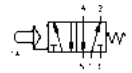
Lever 1/8" 3/2 N.C.  
**338-D15-9A5**



Lever 1/8" 3/2 N.O.  
**348-D15-9A5**



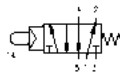
Lever 1/8" 5/2  
**358-D15-9A5**



Plunger 1/8" 5/2  
**458-015-194**



Double Plunger 1/8" 5/2  
**458-011-294**



Plunger 1/4" 5/2  
**454-015-194**



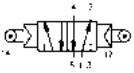
Double Plunger 1/4" 5/2  
**454-011-294**



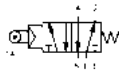
Roller/Lever 1/8" 5/2  
**458-015-195**

## MECHANICAL AND MANUAL VALVES

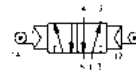
Series 3 and 4 Mechanically Operated Sensor Valves - continued



Double Roller/Lever 1/8" 5/2  
**458-011-295**



Roller/Lever 1/4" 5/2  
**454-015-195**



Double Roller/Lever 1/4" 5/2  
**454-011-295**

4.  
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**CODING EXAMPLE**

**3** | **3** | **8** | **-** | **D15** | **-** | **9A5**

**3** SERIES: 3, 4

**3** FUNCTION:  
3 = 3/2 way N.C.  
4 = 3/2 way N.O.  
5 = 5/2 way C.A.

**D15** D15 = pressure drop/spring  
015 = pressure/spring  
011 = pressure/pressure

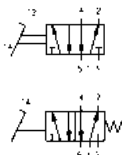
**8** CONNECTIONS:  
8 = 1/8  
4 = 1/4

**9A5** RESETTING:  
9A5 = lever sensor, spring return  
194 = plunger sensor, spring return  
294 = plunger sensor, bistable  
195 = roller/lever, spring return  
295 = roller/lever, bistable

Series 2 and 3 Pneumatic and Electrical - Foot Operated Pedal

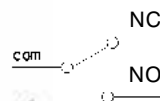
1/4 , 5/2 way (pneumatic).  
with NC/NO contacts (electrical).

Pneumatic Pedal



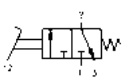
Foot Pedal 1/4" 5/2  
**354N-925**

Electrical Pedal



Foot Pedal  
**3E2-925**

Pneumatic Pedal



Foot Operated Valve 3/2  
**235-925** (M5)  
**234-925** (4mm)

Series 2 Manually Operated Console Minivalves

3/2 and 5/3

Connections: M5, ø4mm cartridge

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Push Button  
**200-895** 22



Palm Switch Spring Return  
**200-975** 22



Palm Switch Twist Unlock  
**200-972** 22



Palm Switch Push Unlock  
**200-970** 22



Joystick Spring Return  
**200-905** 22



P2-Position Selector  
**200-990** 22



3-Position Selector  
**200-870** 22



Key Switch  
**200-904** 22



Push Button 3/2  
**235-895** (M5)  
**234-895** (4mm)



Palm Switch Spring Return 3/2  
**235-975** (M5)  
**234-975** (4mm)



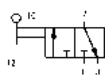
Palm Switch Twist Unlock 3/2  
**235-972** (M5)  
**234-972** (4mm)



Joystick Spring Return 3/2  
**235-905** (M5)  
**234-905** (4mm)

## MECHANICAL AND MANUAL VALVES

Series 2 Manually Operated Console Minivalves - continued



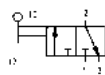
2-Position Selector 3/2

**235-990** (M5)  
**234-990** (4mm)



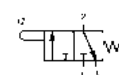
3-Position Selector 5/3

**285-870** (M5)  
**284-870** (4mm)



Key Switch 3/2

**235-904** (M5)  
**234-904** (4mm)



Valve for use with Operators

**235-000** (M5)  
**234-000** (4mm)

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Bracket

**210-000**



Bracket

**220-000**



Joystick 1/8" 3/2

**234-9054**

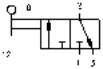
### CODING EXAMPLE

2	3	4	-	97	5
<b>2</b>	SERIES: 2				
<b>3</b>	FUNCTION: 3 = 3/2 way NC 4 = 3/2 way NO 8 = 5/3 way CO		<b>97</b>	MODE OF OPERATION*: 87 = 3 - position selector 89 = push button 97 = palm-switch 90 = joystick 99 = 2 - position selector 92 = pedal 904 = key 2 positions	
<b>4</b>	CONNECTIONS: 4 = ø4mm cartridge 5 = M5		<b>5</b>	RESETTING: 5 = spring return 0 = stable 2 = latching-twist to release	

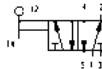


**Series 1, 3, 4 and VMS Manually Operated Valves**

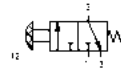
Series 1, 3 and 4, 3/2, 5/2 and 5/3  
Connections: 1/8 - 1/4  
VMS Series, 3/2  
Connections: 1/8 - 1/4 - 3/8 - 1/2, 3/4



Switch 1/8" 3/2  
**338-990**



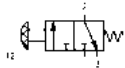
Switch 1/8" 5/2  
**358-990**



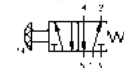
Push Button 1/8" 3/2  
**338-895** (Black)  
**338-896** (Green)  
**338-897** (Red)



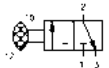
Push Button 1/8" 5/2  
**358-895** (Black)  
**358-896** (Green)  
**358-897** (Red)



Palm Switch 1/8" 3/2  
**338-975** (Black)  
**338-976** (Green)  
**338-977** (Red)



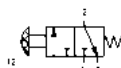
Palm Switch 1/8" 5/2  
**358-975** (Black)  
**358-976** (Green)  
**358-977** (Red)



Knob 1/8" 3/2  
**338-910**



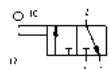
Knob 1/8" 5/2  
**358-910**



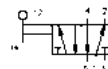
Knob 1/8" 3/2  
**338-915**



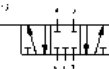
Knob 1/8" 5/2  
**358-915**



Lever 1/8" 3/2  
**338-900**



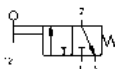
Lever 1/8" 5/2  
**358-900**



Lever 1/8" 5/3  
**368-900**



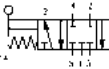
Lever 1/8" 5/3  
**378-900**



Lever 1/8" 3/2  
**338-905**



Lever 1/8" 5/2  
**358-905**



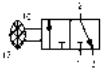
Lever 1/8" 5/3  
**368-905**



Lever 1/8" 5/3  
**378-905**

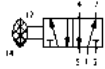
## MECHANICAL AND MANUAL VALVES

Series 1, 3, 4 and VMS Manually Operated Valves - continued



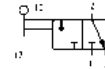
Knob 1/4" 3/2

**434-910**



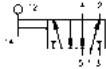
Knob 1/4" 5/2

**454-910**



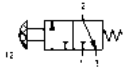
Lever 1/4" 3/2

**434-900**



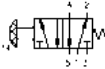
Lever 1/4" 5/2

**454-900**



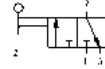
Knob 1/4" 3/2

**434-915**



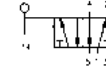
Knob 1/4" 5/2

**454-915**



Lever 1/4" 3/2

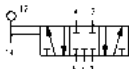
**434-905**



Lever 1/4" 5/2

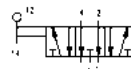
**454-905**

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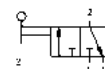
Lever 1/4" 5/3

**464-900**



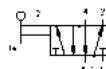
Lever 1/4" 5/3

**474-900**



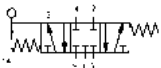
Lever 1/8" 3/2

**138-900**



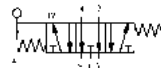
Lever 1/8" 5/2

**158-900**



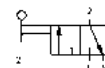
Lever 1/4" 5/3

**464-905**



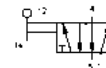
Lever 1/4" 5/3

**474-905**



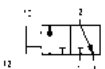
Lever 1/4" 3/2

**134-900**



Lever 1/4" 5/2

**154-900**



Slide Valve

**VMS-105-M5**

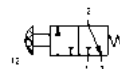
**VMS-118-1/8**

**VMS-114-1/4**

**VMS-138-3/8**

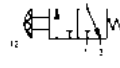
**VMS-112-1/2**

**VMS-134-3/4**



Lever 1/8" 3/2

**138-935**



Lever 1/4" 3/2

**134-935**