GEM-SOL® | V/VL32 (GEM-V/VL)
Modular Manifold Installation

Technical Data

Function	2 Way, 3 Way NC, NO
Pressure range	• See table • Valves for pressure higher than 25 bar cannot be supplied with manual override.
Kv (l/min)	See table
Temperature range	**Fluid :** -10°C to 80°C (no freezing) **Ambient :** -10°C to 50°C
Mounting	Vertical, on sub-base, 2 screws M4. Any number of valves on the same sub-base plate. Any combination of 2 Way, 3 Way NC or NO valves may be grouped together. * Standard valve orientation : Manual override and base port on the same side
Materials in contact with media	**Manual override:** Plastic (Reinforced Nylon), Brass screw or finger knob. NOa* - manual override is not available. *pressure is supplied through the base **Main Valve:** Brass **Solenoid Operator:** Stainless Steel AISI 300 & 400 series **Seals:** NBR, FKM, EPDM, FFKM, PTFE
Media	Air, water, oil
Coil voltage	• Voltage and power consumption - see table • All Baccara coil voltages are ± 10% of nominal
Standard protection class	IP65 with connector * Option : IP68 (please refer to GEM-BP Coil)

• Latch valves are available upon request.
• Pressure separation plug is available.

Brass | 5 valves

Two types of NO valves :

• Supply pressure is through the base like NC valves. These valves can be combined in a standard manifold. They are not supplied with manual override.

• Supply pressure is through the tube. These valves cannot be combined in a standard manifold. They are supplied with manual override.

When using a manifold with more than 8 stations, it is advisable to use two air supplies, one at each end.

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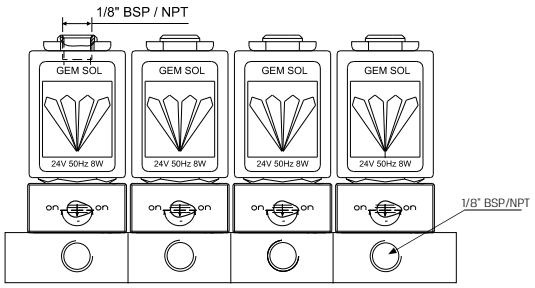
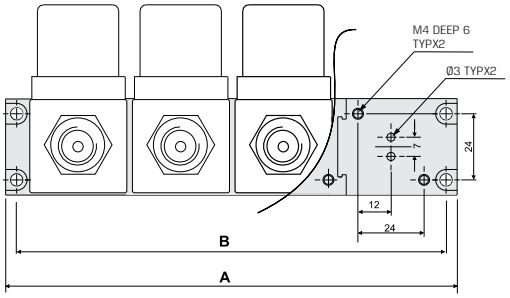
Dimensions



*Standard valve orientation : Manual override and base port on the same side



A = 80 + (n - 2) x 33

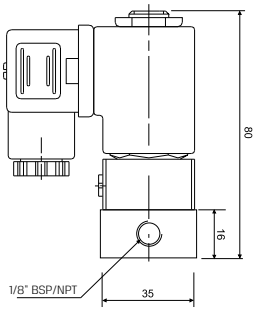
B = 72 + (n - 2) x 33

n = the number of valves

Example : For 6 Valves

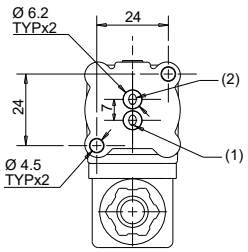
A = 80 + 4 x 33 = 212

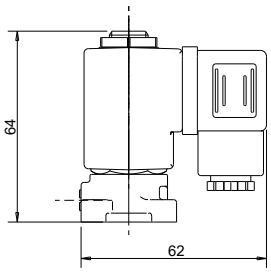
B = 72 + 4 x 33 = 204

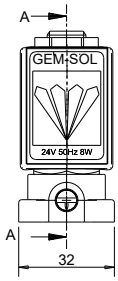


TYPE V32

Brass Forging
2 Way / 3 Way NC

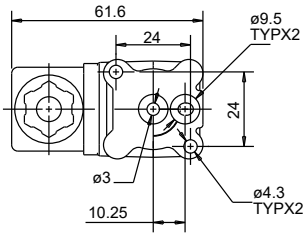


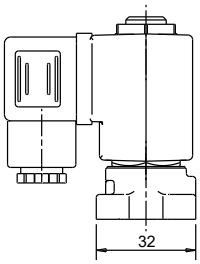


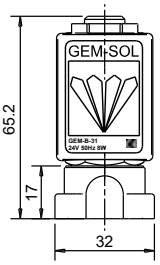


TYPE VL32

Brass Forging
2 Way / 3 Way NC

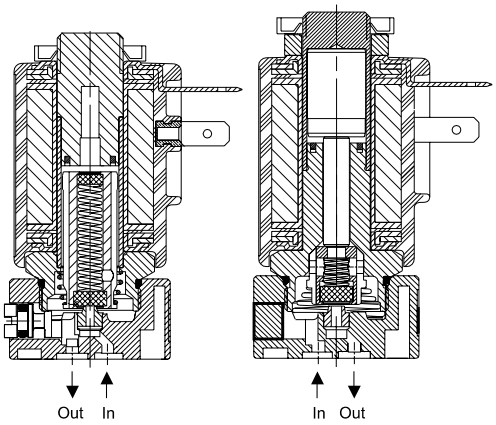




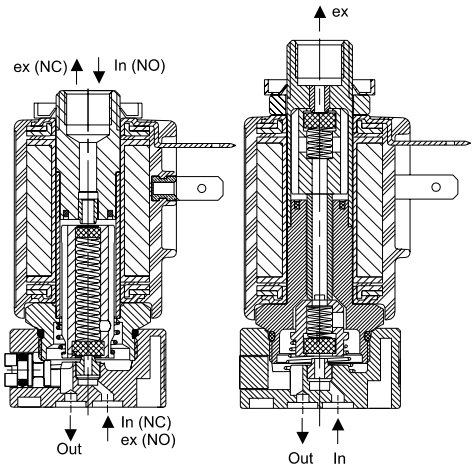


GEM-SOL® | V/VL32 (GEM-V/VL) | Modular Manifold Installation

Type V32 (GEM-V) 2 Way, 3 Way NC, NO

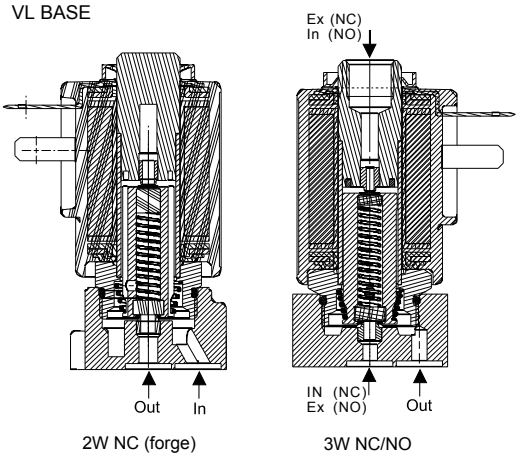


2 Way NC — 2 Way NO through base



3 Way NC/NO — 3 Way NO through base

Type VL32 (GEM-VL) 2 Way, 3 Way NC, NO



2W NC (forge) — 3W NC/NO

Size : Any number of stations, built from three basic components: left end section, right end section and middle section.
Assembly : Push in and turn 90° clockwise
Port size : 1/8" BSP or NPT
Material : Brass

Max. Pressure (bar) 2 Way, 3 Way NC

Coil Current/Power	Orifice (mm)						
	0.8	1.2	1.6	2.0	2.4	3.0	4.0 (1)
• ADC	23	20	15	10	8	5.5	2.5
AC8W, DC10W	35	30	17	14	10	6	3
AC5.5W	23	20	15	10	8	5.5	2.5
AC2.5W, DC5.5W, DC3.5W	20	16	10	9	5	4	1.6
Flow factor Kv(l/min)	0.6	1.1	1.7	2.5	3.5	4.5	5

Max. Pressure (bar) 2 Way, 3 Way NO

Coil Current/Power	Orifice (mm)						
	0.8	1.2	1.6	2.0	2.4	3.0	4.0 (1)
• ADC	25	20	15	11	8	6	4.5
*AC8W, DC10W	30	22	17	12	10	7	4.5
*AC5.5W, DC5.5W	25	20	15	11	8	6	
*AC2.5W, DC3.5W	20	18	12	8	6	4	
Flow factor Kv(l/min)	0.6	1	1.4	2.2	3.0	3.5	5

(1) 4.0 - Bottom orifice only. Available in 2 Way only
* These are not applicable for NO through base valves
• ADC valves are only suitable for use with AC8W or DC10W coils.

How to Order manifold components

GEM-V	-	PORT		COMPONENT		BODY	
		1/8" BSP	10	Left	1	Brass	2
		1/8" NPT	11	Right	2		
				Middle	3		

Example : **GEM-V-1022**

V32 (GEM-V) type manifold 1/8" BSP, right component, Brass body

Voltage & Power Consumption

	AC (W)						DC (W)		
	50 Hz			60 Hz					
V	8	5.5	2.5	8	5.5	2.5	10	5.5	3.5
6							•	•	•
12	•			•			•	•	•
24	•	•	•	•	•	•	•	•	•
48	•			•			•		
110	•			•	•		•		
120	•			•	•				
220	•	•	•	•			•		
230	•	•		•	•				
240	•			•			•		

• Available options

GEM-SOL® | V/VL32 (GEM-V/VL) | Modular Manifold Installation

How to Order | V32 (GEM-V) Manifold | all valves having identical functions

GEM-V	-	No. of VALVES	No. of STATIONS	-	PORT	BODY	FUNCTION	ORIFICE	SEALS	MANUAL OVERRIDE	-	VOLTAGE	POWER	CONNECTOR
		specify quantity	specify quantity		1/8" BSP 10	Brass 2	2W NC 1	0.8 1	NBR N	None 0		without coil 0	No coil 0	with 1
			without manifold 0		1/8" NPT 11		2W NO 2	1.2 2	FKM V	**Plastic * 1**		6 [3] 1	AC8W 50Hz 1	with LED 2
							2W NO [1] 2a	1.6 3	EPDM E	Slot 2		12 2	AC8W 60Hz 2	**flying leads coil * 4**
							3W NC 3	2.0 4	FFKM K	**Knob * 3**		24 3	DC10W 3	with 1/2" Hub 5
							3W NO 4	2.4 5	**PTFE * T**	Push 4		48 4	AC5.5W 50Hz 4	**surge protection with LED * 6**
							3W NO * [1] 4a	4.0 [2] 7		Push lock 5		110 5	AC5.5W 60Hz 5	connector with moulded cable 7
												120 6	AC2.5W 50/60Hz 6	other 9
												220 7A	DC5.5W 7	
												230 7	DC3.5W 8	
												240 8		
												Latch/ other * [4] 9		

Example : GEM-V-6/6-10232V2-331

GEM-SOL® V32 (GEM-V) direct operated 6/6 Stations, 1/8" BSP,
Brass, 3WNC, 1.2, FKM, slot manual override, 24VDC 10W with connector

(1) Supply pressure through base
(2) 4.0 - Bottom orifice only. Available in 2 Way only
(3) DC only
(4) For specifying Latch type coil, please refer to A3P32 (GEM-A3P)valve - How to Order table

*** SPECIAL OPTIONS |** Extended lead times, Non-stock items, MOQ may be applicable

How to Order | V32 (GEM-V) | individual valves with independent functions

GEM-V	-	No. of VALVES	No. of STATIONS	-	PORT	BODY	FUNCTION	ORIFICE	SEALS	MANUAL OVERRIDE	ADDITIONAL FEATURE	-	VOLTAGE	POWER	CONNECTOR
		specify quantity	specify quantity		As above table										
		specify quantity	specify quantity												

Example : **GEM-V-3/6-10242N0-331** : V32 (GEM-V) Direct Operated sub-base :
3/6 Stations with 1/8" BSP Brass, 3WN0, 1.2, NBR, no M/0, 24VDC 10W with connector
Example : **GEM-V-1/6-10212N0-331** : 1/6 Stations with 1/8" BSP Brass, 2WNC, 1.2, NBR, no M/0, 24VDC 10W with connector

How to Order | V32 (GEM-V) Body

GEM-V-BODY	-	PORT	BODY	FUNCTION	ORIFICE	SEALS	MANUAL OVERRIDE	-	VOLTAGE	POWER	CONNECTOR
		1/8" BSP 10	Brass 2	2W NC 1	0.8 1	NBR N	None 0		without coil 0	No coil 0	with 1
		1/8" NPT 11		2W NO 2	1.2 2	FKM V	**Plastic * 1**		6 [3] 1	AC8W 50Hz 1	with LED 2
				2W NO [1] 2a	1.6 3	EPDM E	Slot 2		12 2	AC8W 60Hz 2	**flying leads coil * 4**
				3W NC 3	2.0 4	FFKM K	**Knob * 3**		24 3	DC10W 3	with 1/2" Hub 5
				3W NO 4	2.4 5	**PTFE * T**	Push 4		48 4	AC5.5W 50Hz 4	**surge protection with LED * 6**
				3W NO * [1] 4a	4.0 [2] 7		Push lock 5		110 5	AC5.5W 60Hz 5	connector with moulded cable 7
									120 6	AC2.5W 50/60Hz 6	other 9
									220 7A	DC5.5W 7	
									230 7	DC3.5W 8	
									240 8		
									Latch/ other * [4] 9		

Example : GEM-V-BODY-10232V2-331

GEM-SOL® V32-Body (GEM-V-BODY), direct operated, 1/8" BSP, Brass, 3WNC, 1.2, FKM,
slot manual override, 24 VDC 10W with connector

(1) Supply pressure through base
(2) 4.0 - Bottom orifice only. Available in 2 Way only
(3) DC only
(4) For specifying Latch type coil, please refer to A3P32 (GEM-A3P)valve - How to Order table

*** SPECIAL OPTIONS |** Extended lead times, Non-stock items, MOQ may be applicable

How to Order | VL32 (GEM-VL)

GEM-VL	-	PORT	BODY	FUNCTION	ORIFICE	SEALS	MANUAL OVERRIDE	-	VOLTAGE	POWER	CONNECTOR
		1/8" BSP 10	Brass 2	2W NC 1	0.8 1	NBR N	None 0		without coil 0	No coil 0	with 1
		1/8" NPT 11		2W NO 2	1.2 2	FKM V	**Plastic * 1**		6 [3] 1	AC8W 50Hz 1	with LED 2
				2W NO [1] 2a	1.6 3	EPDM E	**Slot * 2**		12 2	AC8W 60Hz 2	**flying leads coil * 4**
				3W NC 3	2.0 4	FFKM K	**Knob * 3**		24 3	DC10W 3	with 1/2" Hub 5
				3W NO 4	2.4 5	**PTFE * T**	**Push * 4**		48 4	AC5.5W 50Hz 4	**surge protection with LED * 6**
				3W NO * [1] 4a	4.0 [2] 7		**Push lock 5**		110 5	AC5.5W 60Hz 5	connector with moulded cable 7
									120 6	AC2.5W 50/60Hz 6	other 9
									220 7A	DC5.5W 7	
									230 7	DC3.5W 8	
									240 8		
									Latch/ other * [4] 9		

Example : GEM-VL-10211V0-331

GEM-SOL® VL32 (GEM-VL) direct operated, 1/8" BSP, Brass, 2WNC, 0.8, FKM,
no manual override, 24 VDC 10W with connector

(1) Supply pressure through base
(2) 4.0 - Bottom orifice only. Available in 2 Way only
(3) DC only
(4) For specifying Latch type coil, please refer to A3P32 (GEM-A3P)valve - How to Order table

*** SPECIAL OPTIONS |** Extended lead times, Non-stock items, MOQ may be applicable

* To order manifolds manufactured according to your specific requirements, please contact our technical sales department.