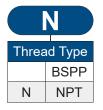
# pneuforce.com///°

The N2V Series of direct acting poppet valves are available in both a 2-way and 3-way configuration.

The exhaust port of the N2V035 valves is a 10-32UNF (M5) thread in the top of the solenoid stem.







Valv	е Туре
025	2-way
035	3-way



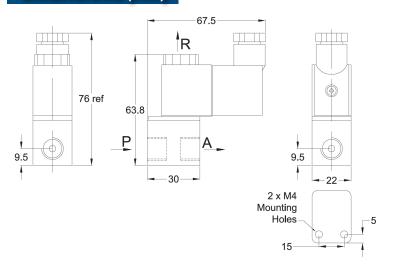
80

1/4

24VDC
Coil Voltage
12VDC
24VDC
24VAC
110VAC
230VAC



Dimension	N2V025-06-24VDC	N2V025-08-24VDC	N2V035-06-24VDC	N2V035-06-24VDC			
Valve Type	2-w	/ay	3-v	vay			
Port Sizes	1/8	1/4	1/8	1/4			
Cv	0.2	23	0.	05			
Orifice Size	Ø2.5	imm	Ø1.0	Omm			
Working Pressure		100bar(a) to 7bar(g)	/ 28" Hg to 115psi(g)				
Working Medium		А	ir				
Ambient Temperature	-5°C - +80°C / 23°F - 176°F						
Working Temperature	5°C - +60°C / 41°F - 140°F (no freezing)						
Cycle rate		10 cycles/sec					
Coil Insulation & Protection Class	F Class, IP65 (CE Certification)						
Coil Duty Cycle		100%	% ED				
Power Consumption		AC: 6.4VA DC: 6.5W					
Voltage Range	+/- 10%						
Reaction Time		0.05 sec					
Electrical Connection	D = Form B DIN (LED indicator) or W = Flying Lead Coil (18" Lead Wire)						
Body Material		Hard Anodiz	ed Aluminum				





### N2W & N2S Process Valves



The N2W series of brass process valves have been designed for general industry. These valves are developed with a coupled diaphragm and therefore can be used without a media pressure differential such as vacuum duty or very low air pressure applications.

Supplied with a DIN43650 Form A coil these simple and robust valves offer the user unparalleled performance via the over sized orifices. Port sizes from 3/8NPT to 2NPT and Viton® seals available as an option. N2W models are brass and N2S are stainless steel.



	N	(
Threa	ad Type	
	BSPP	
N	NPT	

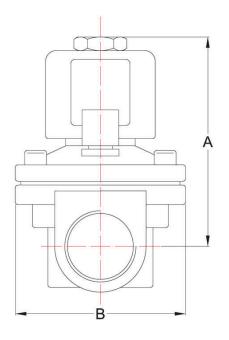
Valve Body							
W	Brass						
S	SS						

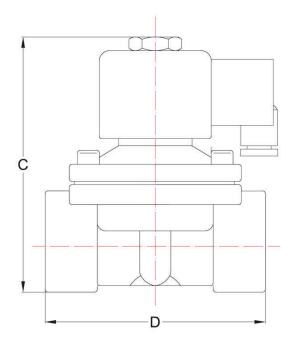
160		5	_	24VDC
Body Size	Por	t Size		Coil Voltage
160	10	3/8		12VDC
100	15	1/2		24VDC
200	20	3/4		24VAC
250	25	1		110VAC
350	35	1 1/4		230VAC
400	40	1 1/2		
500	50	2		
•				

0 111/1/1
Coil Voltage
12VDC
24VDC
24VAC
110VAC
230VAC

Dimension	N2*160-10	N2*160-15	N2*200-20	N2*250-25	N2*350-35	N2*400-40	N2*500-50	
Valve Type		2-Way Normally Closed NC						
Orifice Size Ø (mm)	1	6	20	25	35	40	50	
Cv	4.	8	7.6	12	24	29	48	
Working Pressure	0-10bar(g)	/ 0-150psi(g)	110 & 220VAC	Coil 0-8bar(g	) / 0-120psi(g	) 12/24VDC & 2	24VAC Coil	
Working Medium		Air, Vacuum, Steam and Water						
Operating Temperature		-10 to 80°C / 14 to 176°F NBR Seal   -15 to 120°C / 5 to 248°F Viton Seal						
Coil & Protection Class		H Class IP65						
Seal Material		NBR (Viton® Option - please inquire)						
Power Consumption	14W @ <100psi   20W @ <150psi							
Coil Duty	100%							
Electrical Connection			Form	n A DIN Conne	ector			







Model	Port Size	Cv	Α	В	С	D	Weight (lbs)
N2*160-10	3/8	4.8	102		117	69	1.6
N2*160-15	1/2	4.8	57 117 69		57	09	4.0
N2*200-20	3/4	7.6	107		124	73	1.8
N2*250-25	1	12	112	74	135	99	3.2
N2*350-35	1 1/4	24	140	05	170	100	F 7
N2*400-40	1 1/2	29	142	95	172	123	5.7
N2*500-50	2	48	172	123	209	168	9.9





## **ASV Angle Seat Valves**



- Stainless steel body
- Pneumatic pilot operation
- Normally closed and normally open models
- Single acting and double acting options
- Available in BSPP & NPT threads & Flange
- Port sizes up to 2 1/2"



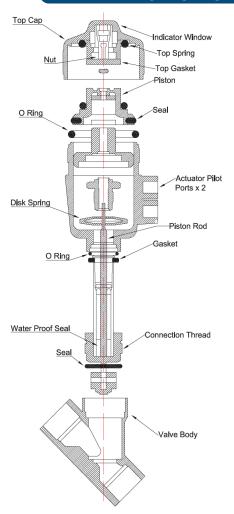
	G	- ASV	15	-(	S	-	1	)-(	NC
Con	nection Type	Model Series	Orifice (mm)		Body Material		Actuation		Туре
G	BSPP		15	S	Stainless Steel	1	Single Acting	NC	Normally Closed
N	NPT		20	<u></u>		2	Double Acting	NC	Normally Open
DN	Flange		25						
BL	Bolt Flange		35						
			40						
			50						
			65						

#### **SPECIFICATIONS**

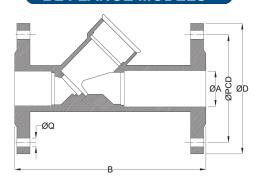
Orifice (mm)	Thread	Flow m³/hr / CFM	Max Working Pressure bar / psi	Min Operating Pressure bar / psi	Medium Temperature
15	1/2"	4.2 / 2.5	16 / 240	0.39 / 5.9	
20	3/4"	8 / 4.7	11 / 165	0.39 / 5.9	
25	1"	19 / 11.2	11 / 165	0.42 / 6.3	40.4.40000
35	1 1/4"	28 / 16.5	15 / 225	0.5 / 7.5	-10 to 180°C - 14 to 356°F
40	1 1/2"	42 / 25	12.5 / 188	0.44 / 6.6	14 10 000 1
50	2"	55 / 32.5	10 / 150	0.476	
65	2 1/2" 65 / 38.5		10 / 150	0.4 / 6	

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#### INTERNAL STRUCTURE

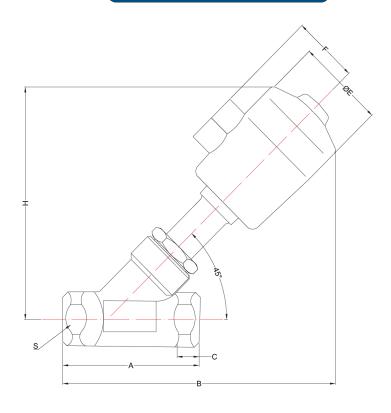


#### **BL FLANGE MODELS**



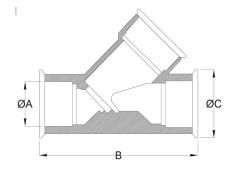
Orifice (mm)	ØA	В	ØD	PCD x 4	ØQ
15	19	130	95	65	
20	25	150	105	75	14
25	32	160	115	85	
32	38	180	135	100	
40	45	200	145	110	18
50	57	230	160	125	10
65	68	290	182	145	

#### **DIMENSIONS**



Orifice (mm)	Port D	А	В	С	ØE	F	Н	S
15	1/2"	85	173	12	64	44	137	27
20	3/4"	95	178	12	04	44	145	32
25	1"	105	212	14			173	41
32	1 1/4"	118	236	16	80	EO	100	EE
40	1 1/2"	130	230	18		52	189	55
50	2"	150	238	20	100		250	70
65	2 1/2"	155	300	25	125	62	265	80

#### **DN FLANGE MODELS**



Orifice (mm)	m) ØA B		ØС
15	19	120	
20	25	130	50.50
25	32	140	50.50
32	38	150	
40	45	180	64
50	57	195	04
65	68	230	77

## N4V 100 Series Spool Valves



- Valve series uses low friction spool design with manual piston reset for improved reliability, functionality and life
- Spool passage has a Ra0.1 surface finish for smooth spool movement and extended O ring life
- HNBR Spool seals
- 5/2 and 5/3 way models
- · Pilot actuator models (N5A) available upon request



Port 06

	N	4V	) (
Thre	ad Type	Series Type	
	BSPP		
N	NPT		

	Valve Function								
10	Single Actuator 5/2								
20	Double Actuator 5/2								
30C	Double Coil Center Closed								
30E	Double Coil Center Exhaust								
30P	Double Coil Center Pressure								

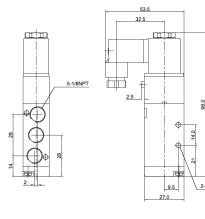
U	, –	<b>247DG</b>
Size		Voltage
1/8		12VDC
		24VDC
		24VAC
		110VAC
		230VAC

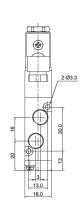
Valve Model	N4V110-06	N4V120-06	N4V130C-06	N4V130E-06	N4V130P-06				
Valve Type	5/	5/2 5/3							
Orifice and Cv	12mm²	0.56Cv		9mm²   0.5Cv					
Port Size		Inlet, Exhau	st and Signal Port	s all 1/8NPT					
Working Medium		4	0 Micron Filtered A	\ir					
Operation			Internal Pilot						
Working Pressure		1.5-	8bar (g)   22 - 12	0psi					
Test Pressure			12bar(g)   180psi						
Ambient Temperature		-20°C	to 70°C   -4°F to	160°F					
Solenoid Tolerance		DO	C +/-10% AC +/-15	5%					
Power Consumption		]	OC 2.5W AC 2.4V	Α					
Insulation			Class F IP65						
Coil Connection		DIN Connector Form C 9.4mm							
Cycle Rate		5/sec							
Response Time			0.05sec						



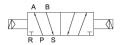
N5V110-06

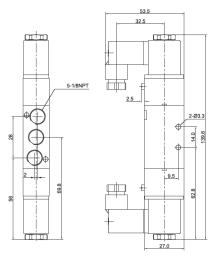


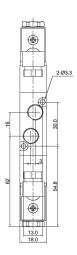




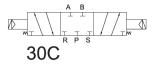
N5V120-06

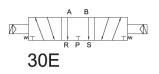




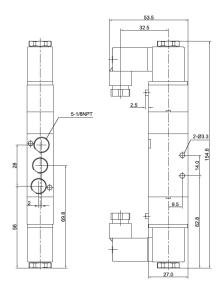


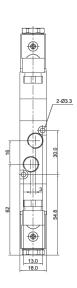
#### N5V130-06











## N4V 200 Series Spool Valves

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 Valve series uses low friction spool design with manual piston reset for improved reliability, functionality and life

 Spool passage has a Ra0.1 surface finish for smooth spool movement and extended O ring life

- HNBR Spool seals
- 5/2 and 5/3 way models
- Pilot actuator models (N5A) available upon request



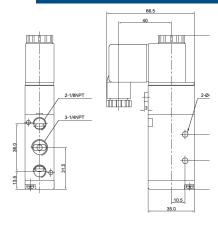
	N	4V	2		10	<b>)</b> –	0	8	<b>–</b>	24VDC
Thre	ad Type	Series Type	Body Size		Valve Function		Port	Size		Voltage
	BSPP			10	Single Actuator 5/2		80	1/4		12VDC
N	NPT			20	Double Actuator 5/2					24VDC
				30C	Double Coil Center Closed					24VAC
				30E	Double Coil Center Exhaust					110VAC
				30P	Double Coil Center Pressure					230VAC

Valve Model	N4V210-08	N4V220-08	N4V230C-08	N4V230P-08					
Valve Type	5/	/2	5/3						
Orifice and Cv	16mm²	0.89Cv		12mm²   0.67Cv					
Port Size		Inlet and Signal	Ports all 1/4NPT,	Exhaust 1/8NPT					
Working Medium		4	0 Micron Filtered A	Air					
Operation			Internal Pilot						
Working Pressure		1.5-	8bar (g)   22 - 12	0psi					
Test Pressure			12bar(g)   180psi	i					
Ambient Temperature		-20°C	to 70°C   -4°F to	160°F					
Solenoid Tolerance		DO	C +/-10% AC +/-15	5%					
Power Consumption		]	OC 2.5W AC 2.4V	A					
Insulation			Class F IP65						
Coil Connection		DI	N Connector Form	пВ					
Cycle Rate	5/sec								
Response Time	0.05sec								



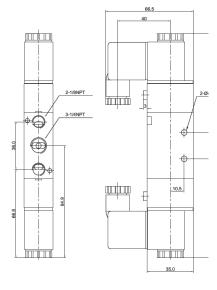
N5V210-08



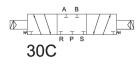




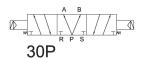


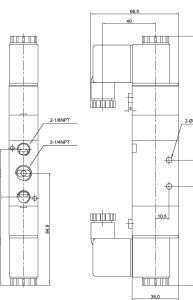


N5V230-08









## N4V 300 Series Spool Valves



 Valve series uses low friction spool design with manual piston reset for improved reliability, functionality and life

 Spool passage has a Ra0.1 surface finish for smooth spool movement and extended O ring life

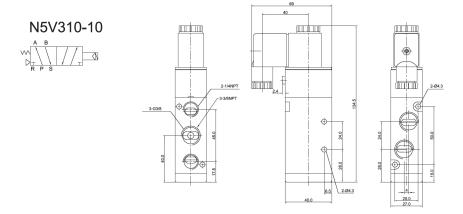
- HNBR Spool seals
- 5/2 and 5/3 way models
- Pilot actuator models (N5A) available upon request

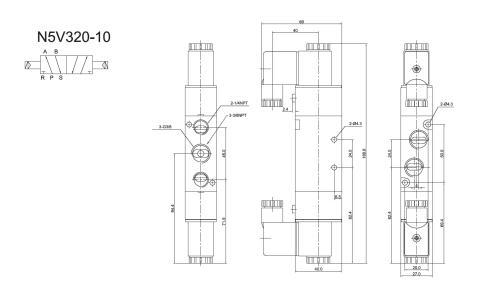


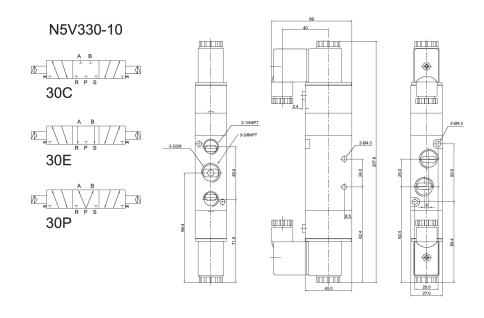
	N	4V	3		10	) <b>–</b> (	1	0	-	24VDC
Thre	ad Type	Series Type	Body Size		Valve Function		Port	Size		Voltage
	BSPP			10	Single Actuator 5/2		10	3/8		12VDC
Ν	NPT			20	Double Actuator 5/2					24VDC
				30C	Double Coil Center Closed					24VAC
				30E	Double Coil Center Exhaust					110VAC
				30P	Double Coil Center Pressure					230VAC

Valve Model	N4V310-10	N4V320-10	N4V330C-10	N4V330E-10	N4V330P-10				
Valve Type	5	/2	5/3						
Orifice and Cv	30mm²	1.68Cv		18mm²   1.0Cv					
Port Size		Inlet and Signal	Ports all 3/8NPT,	Exhaust 1/4NPT					
Working Medium		4	0 Micron Filtered A	Air					
Operation			Internal Pilot						
Working Pressure		1.5-	8bar (g)   22 - 12	0psi					
Test Pressure			12bar(g)   180ps	i					
Ambient Temperature		-20°C	to 70°C   -4°F to	160°F					
Solenoid Tolerance		DO	C +/-10% AC +/-15	5%					
Power Consumption		Γ	OC 2.5W AC 2.4V	A					
Insulation			Class F IP65						
Coil Connection		DIN Connector Form B							
Cycle Rate	5/sec								
Response Time		0.05sec							









## N4V 400 Series Spool Valves

## pneuforce.com///°

- Valve series uses low friction spool design with manual piston reset for improved reliability, functionality and life
- Spool passage has a Ra0.1 surface finish for smooth spool movement and extended O ring life
- HNBR Spool seals
- 5/2 and 5/3 way models
- Pilot actuator models (N5A) available upon request

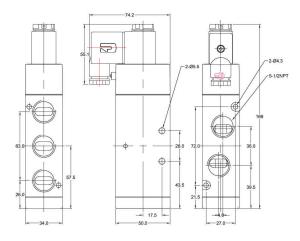


	N	4V	4		10	<b>)</b> –	1	5	<b>)</b> – (	24VDC
Thre	ad Type	Series Type	Body Size		Valve Function		Port	Size		Voltage
	BSPP			10	Single Actuator 5/2		15	1/2		12VDC
N	NPT			20	Double Actuator 5/2					24VDC
				30C	Double Coil Center Closed					24VAC
				30E	Double Coil Center Exhaust					110VAC
				30P	Double Coil Center Pressure					230VAC

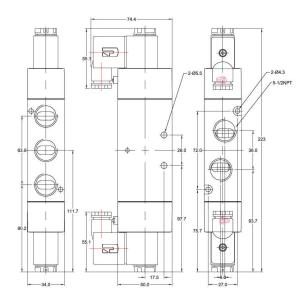
Valve Model	N4V410-15	N4V420-15	N4V430C-15	N4V430E-15	N4V430P-15				
Valve Type	5	/2	5/3						
Orifice and Cv	50mm²	2.79Cv		30mm²   1.68Cv					
Port Size		Inlet, Exhau	st and Signal Port	s all 1/2NPT					
Working Medium		4	0 Micron Filtered A	Air					
Operation			Internal Pilot						
Working Pressure		1.5-	8bar (g)   22 - 12	0psi					
Test Pressure			12bar(g)   180ps	i					
Ambient Temperature		-20°C	to 70°C   -4°F to	160°F					
Solenoid Tolerance		DO	C +/-10% AC +/-15	5%					
Power Consumption		Γ	OC 2.5W AC 2.4V	A					
Insulation			Class F IP65						
Coil Connection		DIN Connector Form B							
Cycle Rate		5/sec							
Response Time			0.05sec						



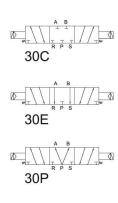


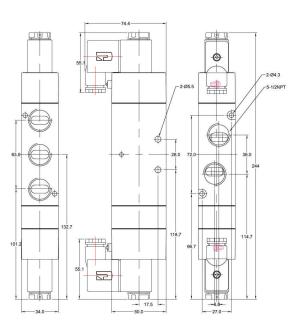


# N5V420-15



#### N5V430-15





## MCS CONTROL VALVES



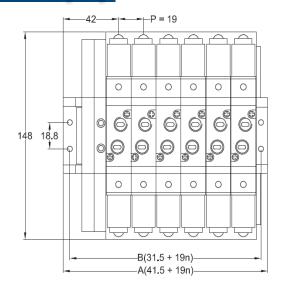
- Centralized Manifold System
- Compact and Efficient Control Valve Installations
- Common Supply and Exhaust ports
- 25 pin D-sub Electrical Connector
- 5/2 and 5/3 way Control Valve Options
- Single and Double Coil Options

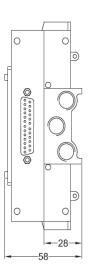


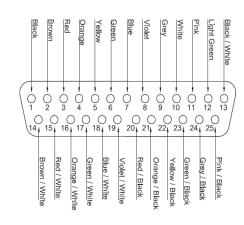
M	CS)	100	-	06	-	C	E4	-24VDC
Series	з Туре	oe Valve Type Valve Port Size			Valve Function	Valve Combination	Voltage	
MCS	BSPP	100 Series	06	1/8	С	Double Coil Center Closed	Refer to Table	12VDC
NMCS	NPT		1		Е	Double Coil Center Exhaust	Opposite	24VDC
	_				Р	Double Coil Center Pressure	for Code	

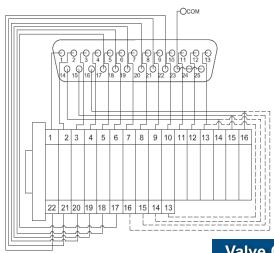
SPECIFICATIONS										
Valve Type	5/2 Single Coil	5/2 Double Coil	5/3 Double Coil							
Orifice and Cv	12mm²	9mm² 0.5Cv								
Port Size	G1/8 or 1/8NPT									
Working Media	40μ Compressed Air									
Operation	Internally Piloted									
Working Pressure	1.5 - 8bar (22.5 - 120psi)									
Ambient Temperature	5-50°C (41-122°F)									
Voltage Tolerance	+/-10%									
Power Consumption	2.8W per coil									
Connector Insulation	F Type IP65									
Cycle Rate	5/sec									
Response Time	0.05sec									













#### **Valve Combination**

	SINGLE SOLENOID VALVE																		
			а	b	С	d	е	f	g	h	i	j	k	I	m	n	0	р	q
		0	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	
DOUBLE SOLENOID VALVE	Α	0																	
	В	1																	
	С	2																	
	D	3																	
	Е	4																	
	F	5																	
	G	6																	
	Н	7																	
	I	8																	
	J	9																	
	K	10																	