

ALPHA® ARO®

Compact Body-Ported Solenoid and Pilot Valves

- Operating pressure range: 50 to 150 psi on 2-position valves; 60 to 150 psi on 3-position valves
- Temp. range: 0° to 180°F
- Up to 600 cycles per minute
- Vacuum rated to 29 in./Hg (requires kit 4HN96, sold separately on page 2549)
- Uses 22mm coils

Body-ported Alpha valves are compact 5-ported valves. Can operate without air line lubrication. For use with air or inert gas.

Note: When operating below 50 psi, Low Pressure Kit 4HN96, sold on page 2549, must be used.

Note: 1 NEMA 4 connector required for each coil. Coil connectors and replacement coils are sold separately on page 2549.

Actuator/Return	Pilot Pressure	Voltage	CFM	Cv	Mr. Model	Item No.
4-Way, 2-Position						
Pilot/Pilot	20 psi	—	30	0.9	A211PD	2F955
	20 psi	—	—	1.5	A212PD	2F971
Pilot/Spring	20 psi	—	61	1.7	A213PD	4KB32
	50 psi	—	30	0.9	A211PS	2F957
	50 psi	—	—	1.5	A212PS	2F973
Solenoid/Solenoid	—	120V AC	30	0.9	A211SD-120-A	2F963
	—	120V AC	50	1.5	A212SD-120-A	2F979
	—	120V AC	61	1.7	A213SD-120-A	2G551
	—	24V DC	50	1.5	A212SD-024-D	4XT33
	—	24V DC	61	1.7	A213SD-024-D	4XT35
	—	No Coil	30	0.9	A211SD-000-N	2F959 *
Solenoid/Spring	—	No Coil	50	1.5	A212SD-000-N	2F975 *
	—	120V AC	30	0.9	A211SS-120-A	2F969
	—	120V AC	—	1.5	A212SS-120-A	2F985
	—	120V AC	61	1.7	A213SS-120-A	2G549
	—	12V DC	30	0.9	A211SS-012-D	2F967
	—	12V DC	50	1.5	A212SS-012-D	2F983
Solenoid/Spring	—	24V DC	30	0.9	A211SS-024-D	4XT32
	—	24V DC	—	1.5	A212SS-024-D	4XT34
	—	24V DC	61	1.7	A213SS-024-D	4XT36
	—	No Coil	30	0.9	A211SS-000-N	2F965 *
	—	No Coil	—	1.5	A212SS-000-N	2F981 *
	4-Way, 3-Position (Spring Centered, All Ports Blocked in Neutral)					
Solenoid/Solenoid	—	120V AC	50	1.4	A312SD-120-A	2G451
	—	12V DC	50	1.4	A312SD-012-D	2G449
	—	24V DC	50	1.4	A312SD-024-D	4XT41
	—	No Coil	50	1.4	A312SD-000-N	2G447 *
4-Way, 3-Position (Spring Centered, Inlet Port Blocked, Cylinder Ports Open in Neutral)						
Solenoid/Solenoid	—	120V AC	50	1.4	A712SD-120-A	2G469
	—	12V DC	50	4.32	A712SD-012-D	2G467
	—	24V DC	50	1.4	A712SD-024-D	4XT44
	—	No Coil	50	1.65	A712SD-000-N	2G465 *

* Order coils separately.



2F981



2F985

ARO®
2-Hand Anti-Tie-Down Controls

4HN74



- Operating pressure: 50 to 125 psi

Note: These units provide only anti-tie-down logic function and not stroke-limiting devices. On machines with full revolution clutches and/or where repeat cycles can occur, approved safety and/or single-stroke devices must be used along with the anti-tie-down units.

Unassembled—Includes anti-tie-down control block, two 2 1/4"-dia. push-button valves, 10 ft. of 3/32" tubing, and fittings. Order pilot valve 2F973, sold on page 2551.

Assembled—Includes all internal connections ready to install. 2 1/4"-dia. valves. External supply and output to machine made by 3/32" (4mm) instant tube fittings. Do not use on any revolutionary press.

Description	Inlet Port	Outlet Port	Mr. Model	Item No.
Unassembled Control Package	3/32" Tubing	3/32" Tubing	59003-842	4HN74
Assembled Control Package	3/32" Tubing	3/32" Tubing	59809	4HN76
Control Block Only	1/8" NPT	1/8" NPT	59191	4HN75

ARO® SPEEDAIRE®
Exhaust Port Flow Controls and Mufflers



4ZJ85

- Operating pressure: 0 to 250 psi
- Operating temp. range: -65° to 300°F

Speedaire—Provide an infinite variation of motoring airflow at an acceptable sound level. 40-micron sintered bronze sleeve with brass housing.

- Max. operating pressure: 300 psi
- Operating temp. range: 35° to 300°F

Valve Port Size	Mr. Model	Item No.
ARO Flow Controls		
1/4 in NPT	20313-2	4ZJ85
3/8 in NPT	20313-3	4ZJ86
1/2 in NPT	20313-4	4ZJ87
Speedaire® Flow Control Mufflers		
1/8 in NPT	1EJ02	1EJ02
1/4 in NPT	1EJ03	1EJ03
3/8 in NPT	1EJ04	1EJ04
1/2 in NPT	1EJ05	1EJ05
3/4 in NPT	1EJ06	1EJ06
1 in NPT	1EJ07	1EJ07

SPEEDAIRE®
Pneumatic Exhaust Mufflers

1A326



- Max. operating pressure: 300 psi
 - Operating temp. range: 35° to 300°F, except 1EJX3 has 160°F max. temp.
- 40-micron porous sintered bronze element.

NPT Port (in.)	Hex (in.)	Item No.
10-32	5/16 in	1EJX3
1/8 in	7/16 in	1A325
1/4 in	9/16 in	1A326
3/8 in	1 1/16 in	1A327
1/2 in	7/8 in	1A328
3/4 in	1 1/8 in	6F600
1 in	1 3/8 in	6F601

ARO®
Air Line Flow Controls

- Operating temp. range: 0° to 200°F
- Thermoplastic

Glass-reinforced valves provide free flow in 1 direction, controlled flow in opposite direction. Color-coded micrometer and calibrated adjustment knob. Ring lock keeps adjustment from accidentally moving. Panel-mount nut included.



6ZC08

Inlet Port	Outlet Port	Max. Operating Pressure (psi)	Mr. Model	Item No.
ARO Thermoplastic				
1/8" NPT	1/8" NPT	—	104104-F01-G	6ZC07
1/4" NPT	1/4" NPT	200	104104-F02-G	6ZC08
3/8" NPT	3/8" NPT	200	104104-F03-G	6ZC09
1/2" NPT	1/2" NPT	200	104104-F04-G	6ZC10

SPEEDAIRE®
Silencer Mufflers

Greatly reduce noise levels on valves and prevent contamination.

Economy—50-mesh, stainless steel screen with glass-filled nylon housing.

Heavy-Duty—50-mesh self-cleaning stainless steel screen with aluminum shell.



1EJX1

NPT Port (in.)	SCFM @ 100 psi Temp. (in.)	Max. psi	Hex (in.)	Item No.
Economy, 150 psi psi, 50 Microns				
1/8 M	20	120 °F	1/8 in	1EJW9
1/4 M	33	120 °F	1/4 in	1EJW1
3/8 M	82	120 °F	1 1/8 in	1EJW2
1/2 M	110	120 °F	1 1/8 in	1EJW3
Heavy-Duty, 300 psi psi, 50 Microns				
1/8 M	20	160 °F	3/8 in	1EJW4
1/4 M	33	160 °F	3/8 in	1EJW6
1/4 F	33	160 °F	3/8 in	1EJW7
3/8 M	82	160 °F	1 in	1EJW8
3/8 F	82	160 °F	1 in	1EJW9
1/2 M	110	160 °F	1 in	1EJX1
1/2 F	110	160 °F	1 in	1EJX2

SPEEDAIRE®
Breather Vents

- Max. operating pressure: 150 psi
- Operating temp. range: 35° to 300°F

Low-profile vents insert easily into cylinders, gear boxes, and storage tanks. Prevent dirt and particles from entering open ports.



1EJT5

NPT Port (in.)	Hex (in.)	Item No.
1/8 in	7/16 in	1EJT5
1/4 in	9/16 in	1EJT6
3/8 in	1 1/16 in	1EJT7
1/2 in	7/8 in	1EJT8
3/4 in	1 1/8 in	1EJT9
1 in	1 3/8 in	1EJT1