

Features

- 2-way normally closed operation
- Unique double disc design with overtravel provides redundant sealing for leak tight shutoff
- Visual indication of open & shut position
- Proof of closure switch 1 amp
- Die-cast aluminum bodies
- Zero differential piloted diaphragm
- For on-off control of fuel gas in commercial and industrial gas burners
- Valves provided with 1/8" NPT upstream and downstream pipe taps with plugs for routine testing

Construction

Valve Parts in Contact with Fluids	
Body	Aluminum
Seals and Disc	NBR
Core Tube	305 Stainless Steel
Core Guide	Acetal (20 watt only)
Rider Ring	PTFE (20 watt only)
Core and Plugnut	430F Stainless Steel
Springs	302 Stainless Steel
Shading Coil	Copper
Pipe Plug	Zinc-Plated Steel

Electrical

Standard Coil Class of Insulation	Watt Rating and Power Consumption			Ambient Temp. °F	Spare Coil Family	
	AC				General Purpose	Explosionproof
	Watts	VA Holding	VA Inrush		AC	AC
F	20	43	240	-40 to 125	99257	-
F	28.2	50	385	-40 to 125	206409	-

Standard Voltages: 24, 120, 240 volts AC, 60 Hz (or 110, 220 volts AC, 50 Hz) (99257); 120, 240 volts AC, 60 Hz (or 110, 220 volts AC, 50 Hz) (206409).
 (Note: 24 volt AC, 60 Hz not available with 28.2 watt coil)

Proof of Closure Switch

Switch is factory set and not to be field adjusted.

Reed Switch: SPST (closed when valve is in closed position.)

Max. Electricity: 1 amp, 120 volts

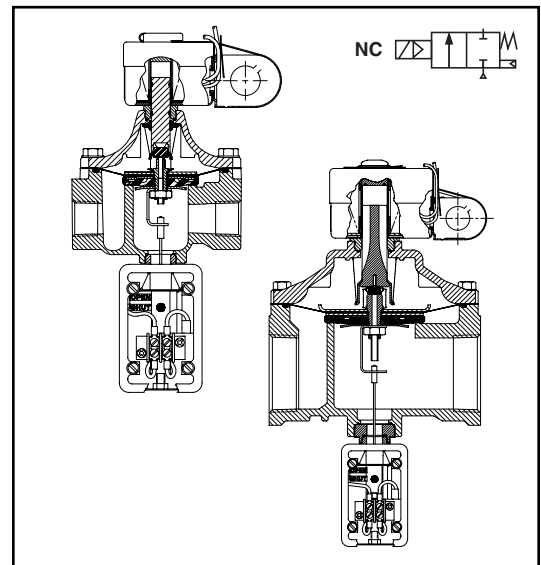
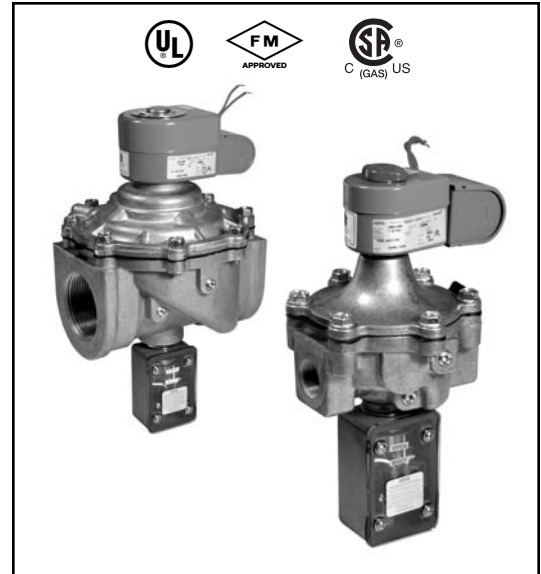
Load: 60 Hz, 15 watt (resistive)

Leads: 18" long

Enclosure: Type I General Purpose

Solenoid Enclosures

RedHat metal Type 1 General Purpose Junction Box housing with two 7/8" knock-outs for 1/2" conduit connection.



Valve Response Time

Opening Time: Less than 1 second

Closing Time: Less than 1 second

Approvals

UL listed to standard 429 "Electrically Operated Valves," Guide Y10Z, File MP618 Safety Shutoff Valves.

FM Approved to Class 7400 "liquid and gas safety shutoff valves."

CSA Certified to:

- 1) Standard C22.2 No. 139 "Electrically Operated Valves," File 010381.
- 2) Automatic Gas Valves Z21.21 (6.5), File 112872.
- 3) Automatic Gas Safety Shutoff Valves C/I (3.9), File 112872.

Specifications (English units)

Pipe Size (ins.)	Orifice Size (ins.)	Cv Flow Factor	Gas Capacity ① Btu/hr.	Operating Pressure Differential (psi)		Max. Fluid Temp. °F	Catalog Number	Const. Ref.	Agency			Wattage	Approx. Shipping Weight (lbs)
				Min.	Max.				UL	FM	CSA		
COMBUSTION (Fuel Gas) - NORMALLY CLOSED													
3/4	1 5/8	11	580,000	0	5	125	8214 035C	1	○	○	○	20	4.8
1	1 5/8	21	1,119,000	0	5	125	8214 050C	1	○	○	○	20	4.8
1 1/4	1 5/8	32	1,730,000	0	5	125	8214 060C	2	○	○	○	20	4.8
1 1/2	1 5/8	35	1,900,000	0	5	125	8214 070C	2	○	○	○	20	4.8
2	2 3/32	60	2,800,000	0	5	125	8214 080C	3	○	○	○	20	6.8
2 1/2	3	104	5,765,500	0	5	125	8214 090C ②	4	○	○	○	28.2	13.5
3	3	105	5,796,000	0	5	125	8214 040C ②	4	○	○	○	28.2	14.5

○ = Safety Shutoff Valve. ① 1" W.C. Drop @ 2" W.C. Inlet Pressure, 1,000 Btu/cu.ft. or more, 0.64 Specific Gravity Gas. ② Not available with 24 volt, 60 Hz coil.

Specifications (Metric units)

Pipe Size (ins.)	Orifice Size (mm)	Kv Flow (m³/hr)	Gas Capacity ① Btu/hr.	Operating Pressure Differential (bar)		Max. Fluid Temp. °C	Catalog Number	Const. Ref.	Agency			Wattage	Approx. Shipping Weight (kgs)
				Min.	Max.				UL	FM	CSA		
COMBUSTION (Fuel Gas) - NORMALLY CLOSED													
3/4	41	9.4	580,000	0	0.3	52	8214 035C	1	○	○	○	20	2.2
1	41	17.9	1,119,000	0	0.3	52	8214 050C	1	○	○	○	20	2.2
1 1/4	41	27.2	1,730,000	0	0.3	52	8214 060C	2	○	○	○	20	2.2
1 1/2	41	29.8	1,900,000	0	0.3	52	8214 070C	2	○	○	○	20	2.2
2	53	51.0	2,800,000	0	0.3	52	8214 080C	3	○	○	○	20	3.1
2 1/2	76	88.4	5,765,500	0	0.3	52	8214 090C ②	4	○	○	○	28.2	6.1
3	76	89.3	5,796,000	0	0.3	52	8214 040C ②	4	○	○	○	28.2	6.6

○ = Safety Shutoff Valve. ① 1" W.C. Drop @ 2" W.C. Inlet Pressure, 1,000 Btu/cu.ft. or more, 0.64 Specific Gravity Gas. ② Not available with 24 volt, 60 Hz coil.

Capabilities Chart

Solenoid Options		Base Catalog Number	Resilient Materials	Standard Rebuild Kit
High Temp.	Junction Box	Aluminum	NBR	AC
HB	JB	8214 035C	●	Not Available
HB	JB	8214 050C	●	Not Available
HB	JB	8214 060C	●	Not Available
HB	JB	8214 070C	●	Not Available
HB	JB	8214 080C	●	Not Available
HT	JB	8214 090C	●	Not Available
HT	JB	8214 040C	●	Not Available

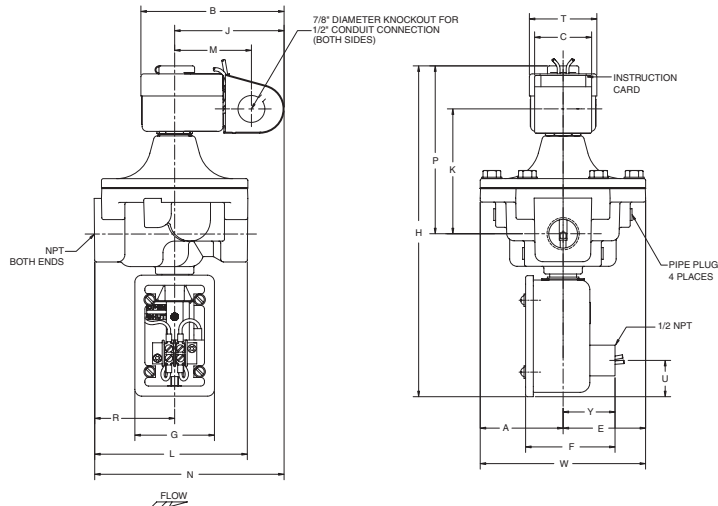
● = Standard. Other options may be available. All option combinations may not be available.

COMBUSTION

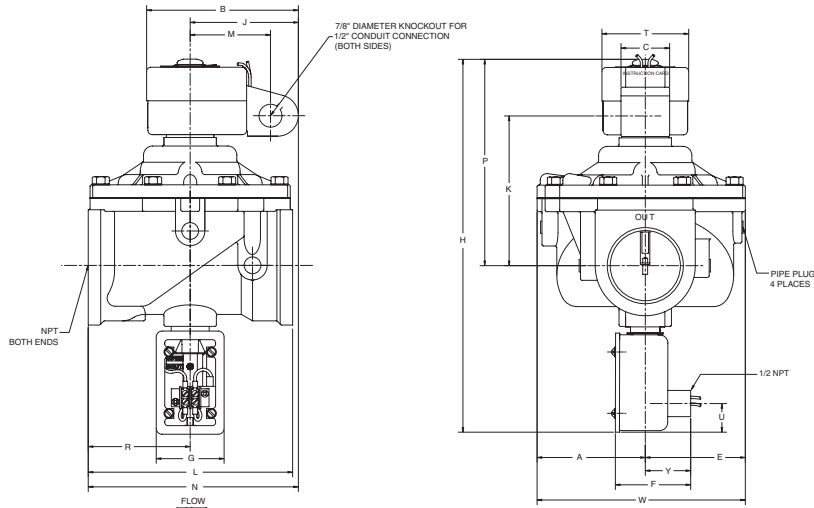
Dimensions inches (mm) Shown with Optional Junction Box

Const. Ref.		A	B	C	E	F	G	H	J	K	L	M	N	P	R	T	U	W	Y
1	ins.	2.69	4.59	1.88	2.69	2.75	2.44	10.54	3.53	4.06	5.00	2.50	6.15	5.46	2.62	2.20	1.12	5.39	1.63
	mm	68	117	48	68	70	62	268	90	103	127	64	156	139	67	56	28	137	41
2	ins.	2.69	4.59	1.88	2.69	2.75	2.44	10.54	3.53	4.13	5.00	2.50	6.15	5.53	2.62	2.20	1.12	5.39	1.63
	mm	68	117	48	68	70	62	268	90	105	127	64	156	140	67	56	28	137	41
3	ins.	3.16	4.59	1.88	3.16	2.75	2.44	11.15	3.53	4.49	6.09	2.50	6.81	5.89	3.28	2.20	1.12	6.32	1.63
	mm	80	117	48	80	70	62	283	90	114	155	64	173	150	83	56	28	161	41
4	ins.	4.13	5.72	1.88	3.82	2.75	2.44	14.25	4.07	5.71	7.80	3.07	7.96	7.87	3.89	3.31	1.12	7.95	1.63
	mm	105	145	48	97	70	62	362	103	145	198	78	202	200	99	84	28	202	41

Const. Ref. 1, 2, 3



Const. Ref. 4



Must be mounted with solenoid vertical and upright.

