DC Frame Solenoid

GUARDIAN

Model 2HD

Features:

Available return spring kit AC & DC Applications See Model 2HD AC UL recognized

Electrical:

Coil Voltages: 6, 12, 24, 48, 110 VDC standard Coil Termination: 3/16" QC terminals Duty Cycle: 100% Continuous, 25% Intermittent, 10% Intermittent, 1% Pulse

Coil treatment: Plastic cover

Insulation Class: Class A Rating - 105° C (221° F)

Dielectric Strength: 1500V 60 Hz

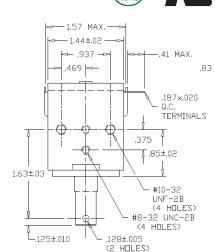
Mechanical:

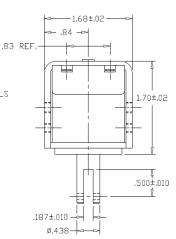
Size: 1.70" (L) x 1.68"(W) x 1.57"(H) Plunger Diameter: 0.438" Plunger Guide Material: Plastic Mounting: 8 - #8-32 holes Weight: Plunger 1.2 oz, Total 11.7 oz

Life Expectancy: 1 Million Cycles 1

 $^{\mathrm{1}}$ - Dependent on load conditions







Solenoid shown energized with plunger fully seated

Standard Part Numbers

Model No.	Part No.	Duty Cycle	Voltage	Resistance ² (Ω)	Power (W)	Current
2HD-C-12D	A420-065492-00	Cont.	12VDC	18.1	8.4	663 mA
2HD-I-12D	A420-065493-00	Inter. 25%	12VDC	5.8	26.1	2.07 A
2HD-C-24D	A420-065494-00	Cont.	24VDC	71	8.5	338 mA
2HD-I-24D	A420-065495-00	Inter. 25%	24VDC	22.6	26.8	1.06 A

2 - Coil resistance tolerance +/- 5%

Contact us for custom voltages or duty cycles

Available Customization:

- Plunger
- DC Voltage
- **Duty Cycle**
- Insulation systems up to class H 180° C (356° F)
- Minimum quantities apply

Typical Push Force Ounces [N] @ 20° C (68° F) (Distance from fully seated position)									HOLDING FORCE	Power (W)
Stroke (in.)	0.050	0.125	0.250	0.375	0.500	0.625	0.750	1.000	Ounces [N]	
Continuous 100%	100 [27.8]	48 [13.3]	15 [4.2]	8 [2.2]	4 [1.1]	2 [0.6]	1 [0.3]	N/A	155 [43.1]	8.5
Intermittent 25%	135 [37.5]	93 [25.9]	70 [19.5]	32 [8.9]	20 [5.6]	15 [4.2]	12 [3.3]	10 [2.8]	191 [53.1]	26.5
Intermittent 10% ³	175 [48.7]	145 [40.3]	110 [30.6]	80 [22.2]	60 [16.7]	48 [13.3]	25 [7]	11 [3.1]	200 [55.6]	72.2
Pulse 1%³	235 [65.3]	210 [58.4]	175 [48.7]	140 [38.9]	120 [33.4]	80 [22.2]	50 [13.9]	12 [3.3]	N/A	146.8

Optional Return Spring Kit A490-367461-00

Continuous Duty 100% = 100% On Time

Intermittent Duty 25% = 25% On Time (100 Seconds On Max Followed By 300 Seconds Off)
Intermittent Duty 10% = 90% On Time (10 Seconds On Max Followed By 90 Seconds Off)

Pulse Duty 1% = 99% On Time (1 Second On Max Followed By 99 Seconds Off)

3 - Calculated force values to be verified in application









