



Sensata
Technologies

AT/3AT/4AT/10AT SERIES



Autorisierter Distributor:

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AT SERIES | POSITION SWITCHES

SNAP ACTION PRECISION POSITION SWITCHES (RATED 4 AMPS @ 28VDC)

Features

- Qualified per MIL-PRF-8805, Enclosure Symbol 5
- Hermetically sealed with dry nitrogen gas backfill
- Proven snap-action switching, reliable performance and long life
- Excellent shock and vibration resistance
- Switching up to 4 amps
- Optimal for low level circuits
- Temperature range between -275°F and 450°F
- Small, lightweight axis-symmetric design for robustness and reliability
- Single and multiple pole designs available
- Various mounting configurations for custom applications
- Sealed and unsealed plunger options
- Wide range of side plate designs for narrow width applications
- PMA Approvals for various commercial aircraft
- Customer approvals for space and military applications



Introduction

KLIXON® hermetic snap-action position switches are ideal for extremely harsh and demanding environments as found in aircraft, military, aerospace, and aircraft engines applications. KLIXON® precision hermetic position switches have been used for over 55 years in a wide range of applications. Our switches are found on virtually all commercial and military aircraft, as well as various space vehicles and satellites worldwide.

Our design library has over 2,000 switch package designs which allow for "off-the-shelf" solutions to meet most application needs. Custom designs are also available if the customer's application requires different form factors, or actuation methods. We offer a wide choice of precision position switches ideally suited for mission-critical applications that require accurate switching in extreme temperatures, high vibration and shock environments, or in the presence of typical aerospace fluids including but not limited to coolants, oils, hydraulic fluid, fuel, and de-icing fluids.

Applications

AT Series	<ul style="list-style-type: none"> • Flight Control Actuators • Landing Gear Steering • Landing Gear Down & Locked 	<ul style="list-style-type: none"> • Engine Start Quadrant • Helicopter Litter Door Latch • Helicopter Rotor Brake 	<ul style="list-style-type: none"> • Helicopter Rotor Brake • APU Valve Indication • Throttle Grip Control 	<ul style="list-style-type: none"> • Satellite Applications • Satellite Arm Extended • Parachute Release
3AT Series	<ul style="list-style-type: none"> • Engine Start Valves • Bleed Air Valves 	<ul style="list-style-type: none"> • Env. Control Systems Valve • Avionics Cooling Valves 	<ul style="list-style-type: none"> • Anti-Icing Valves • Fuel Valves 	<ul style="list-style-type: none"> • Thrust Reverser • Flap Assembly
4AT Series	<ul style="list-style-type: none"> • Liquid Oxygen Valves • Solar Array Position 	<ul style="list-style-type: none"> • Satellite Antenna Position • Mars Observer 	<ul style="list-style-type: none"> • International Space Station Applications • Lunar Rover Release & Power Up 	
10AT Series (MIL-PRF-8805)	<ul style="list-style-type: none"> • Gearbox • Blade Fold Indication • Landing Gear Indication • Steering Wheel Switch 	<ul style="list-style-type: none"> • Ejection Seat Armed • Cargo Handling Systems • Helicopter Rotor Condition • Helicopter Door Indication 	<ul style="list-style-type: none"> • Antenna Position • Throttle Quadrant • Thrust Reverser • Flight Control Actuators 	<ul style="list-style-type: none"> • EVA Space Suit • Space Capsule Controls • Inertial Upper Stage • Weapons Systems

Nomenclature

Precision hermetic position switches are sometimes referred to as:

- Position switches
- Aircraft switches
- Miniature switches
- Hermetic switches
- Aerospace switches
- Sensitive switches
- Limit switches
- Military switches
- Switches



SPECIFICATIONS

Performance & Actuation Characteristics Chart

	AT		3AT	4AT	10AT	
Device Type	Standard		High Temperature	Low Temperature	High Amperage	
Maximum Actuating Force (STP)	20 oz		20 oz	28 oz	30 oz	
Minimum Release Force (STP)	4 oz		4 oz	1 oz	1 oz	
Maximum Pretravel	0.009"		0.009"	0.009"	0.009"	
Maximum Movement Differential	0.003"		0.003"	0.003"	0.003"	
Minimum Overtravel	0.002"		0.002"	0.002"	0.002"	
Overtravel Stop	No		No	No	No	
Maximum Force on Actuator	5 lb		5 lb	5 lb	5 lb	
Current Ratings in Amps (28VDC)	Resistance	3	1	1	3	4
	Inductive	1	½	½	1	1
	Lamp	1	½	½	1	2
Minimum Life @ Rated Load	25K	50K	25K	25K	25K	
Minimum Mechanical Life Cycles	100K		100K	50K	50K	
Ambient Temperature Range	-65°F to 275°F (-53.8°C to 135°C)		-65°F to 450°F (-53.8°C to 232.2°C)	-275°F to 275°F (-170.5°C to 135°C)	-85°F to 275°F (-65°C to 135°C)	
Dielectric Strength Terminal to Case Terminal to Terminal	1000 VRMS 800 VRMS		500 VRMS 500 VRMS	1000 VRMS 800 VRMS	1000 VRMS 800 VRMS	
Max Leakage	1 x 10 ⁻⁸ Std. cc He/Sec @ 1 atmosphere differential					
Shock Resistance	200G, 6 ms sawtooth					
Vibration Resistance	65G, 10-2000Hz, .5DA or 65GTMS					
Insulation Resistance @ 500VDC	100 Megohms					
Voltage Drop @ 1 amp	0.04		0.12	0.04	0.04	
SEAL (MIL-S-8805)	Design Enclosure 5					
Backfill	Dry nitrogen with 10% helium					

NOTE FOR DRAWINGS

1. Because of restricted space we can only show a small percentage of our switch packages and dimensional drawings. Please contact the factory if you do not see the solution you need, or if you require more detailed envelope drawings.
2. Unless otherwise noted, standard leads are AWG #20 per MIL-W-22759/9.
3. All exposed materials on packaged designs are corrosion resistant steel with the exception of the side plates on Style 7 switches which are anodized aluminum alloy.
4. All hardware provided is corrosion resistant steel.

Technical Terms

Electrical Life

The minimum number of cycles allowable for a switch under a specified combination of electrical load, actuation and environmental criteria. Usually specified for the maximum current and temperature rating of the switch.

Mechanical Life

The minimum number of cycles allowable for a switch with no electrical load, and a specified combination of actuation and environmental criteria.

Contact Erosion

A general loss of material from one or both surfaces of a pair of mating contacts. This is as a result of switching electrical loads.

Technical Terms (cont.)

Pole

The number of completely separate circuits contained in a switch. A single pole switch can control only one circuit at a time. A double pole switch can control two independent circuits at the same time.

Throw

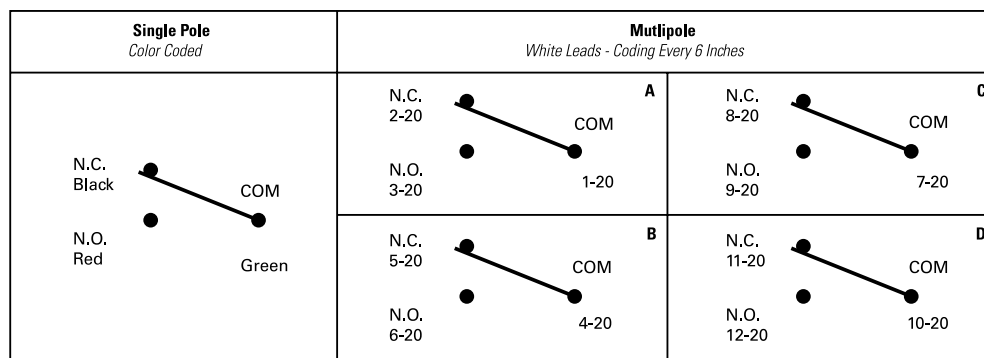
The number of circuits that each individual pole of a switch can control. The number of throws is completely independent of the number of poles.

Contact Resistance

The resistance offered to flow of current during its passage between electrical contacts. For practical reasons, lead and terminal resistance may be included in the actual measurement, as well as the contact resistance proper.

Termination Leads or Connectors

Sensata uses 20 gauge wire per MIL-W-22759 as shown below. Alternative gauges, MIL specs and color coding schemes are available upon request. Sensata will also provide switches with connectors to meet customer application needs.



Terminal Identification
 Red = Normally Open
 Green = Common
 Black = Normally Closed

Wire Leads
 AWG 20 MIL-W-22759/9

NOTE:
 Diagrams show circuits when actuator is in free position.

Dielectric Withstanding Voltage *

The maximum voltage that a switch can withstand between specified points without leakage current exceeding a specified value.

Insulation Resistance *

The resistance offered by the insulating members of a component part to a direct voltage tending to produce a leakage current through or on the surface of these members. Insulation resistance should not be considered the equivalent of dielectric withstanding voltage.

Loads

Three types of loads associated with electrical switches are: resistive, inductive and lamp. Of concern when discussing loads are their effect on the switch contacts.

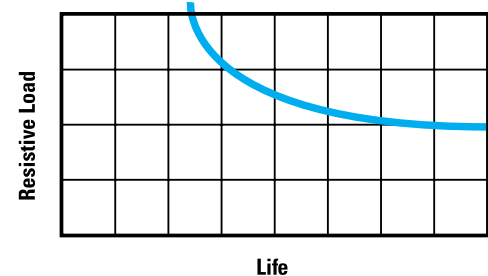
Resistive

Purely resistive loads are the easiest to switch. Contact life is maximized when switching purely resistive loads because contact erosion is minimized.

Inductive

Inductive loads result in the most contact erosion. This is due to the tendency of the current to continue traveling across the contact while opening, causing arcing.

Life Expectancy vs Current



* Insulation resistance measurements should not be considered to be equivalent to dielectric withstand voltage tests. A clear, dry insulation may have a high insulation resistance and yet possess a mechanical fault that would cause failure in the dielectric withstand voltage test. Conversely, a dirty, deteriorated insulation with a low insulation resistance might not break down under a high potential of a DWV test.

Technical Terms (cont.)

Lamp

In-rush current is the condition that result in the lamp load rating. The resistance rating of a lamp is normally specified when the lamp is hot. However, when the lamp is cold the resistance is low. This in-rush current can be 10 times the normal current, resulting in welding of the contacts.

Low Level Circuit

Low level circuits are classified in MIL-8805 as those with resistive loads less than 10mA at 30mV. The use of gold plated contacts and the hermetic enclosure of the switch contacts afford an ideal environment for switching low level loads.

Pretravel

The distance the button moves from the free position to the actuation point.

Free Position

The position of the button when there is no external force other than gravity applied to it.

Actuation Point

The position of the button at which the movable contact snaps from the normally closed contact position to the normally open contact position.

Release Position

The position of the button at which the movable contact snaps from the normally open contact position to the normally closed contact position.

Maximum Overtravel Position

The position of the button when the positive overtravel stop is reached. Further overtravel would damage the switch.

Actuation Force

The force which must be applied to the button to cause the movable contact to snap from the normally closed contact position to the normally open contact position.

Release Force

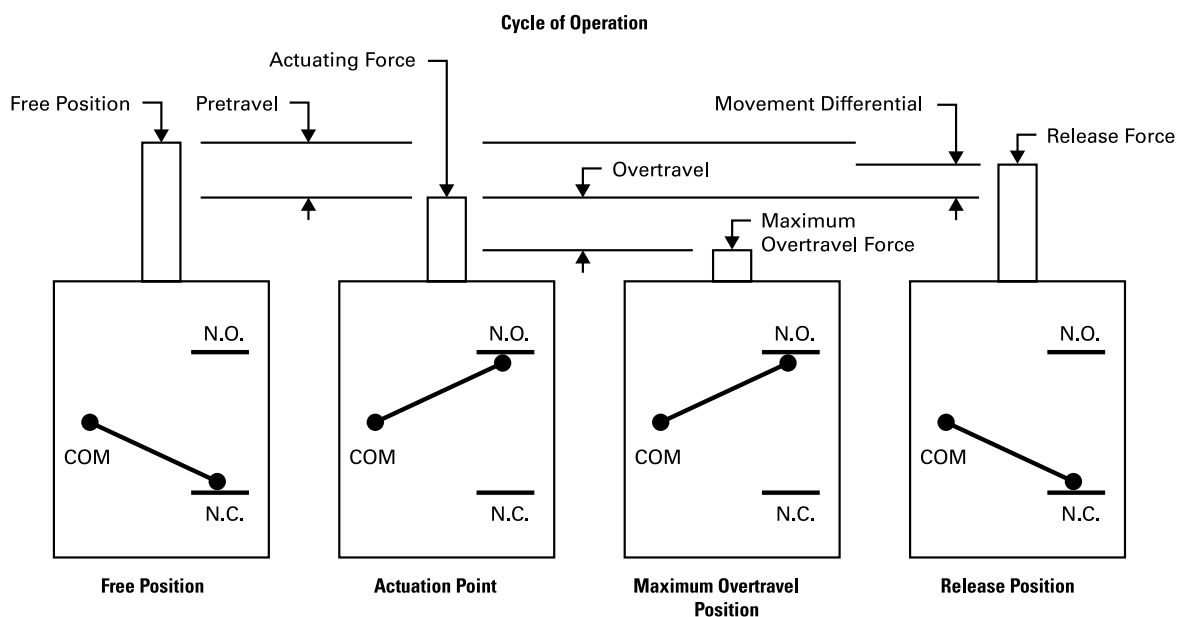
The level to which the force on the button must be reduced to allow the contacts to snap from the normally open position to the normally closed contact position.

Overtravel

The distance that the button can travel beyond the actuation point.

Movement Differential

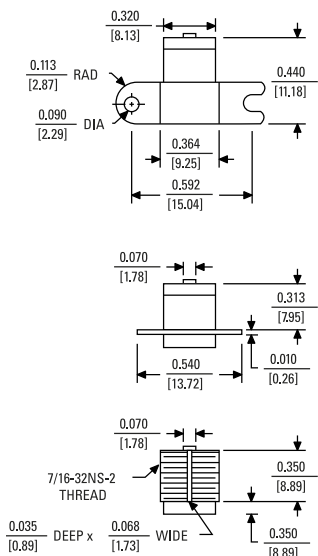
The distance the button moves from the actuation point to the release point.





DIMENSIONS AND ORDERING OPTIONS

All dimensions are in millimeters.



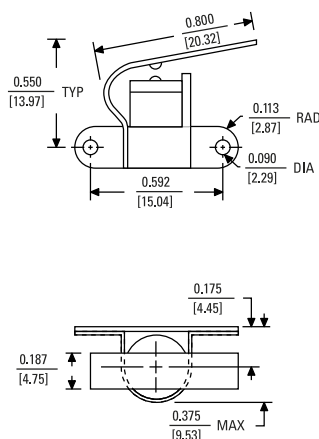
BASIC "AT", BRACKET/FLANGE/THREADS, 1 POLE

3AT47 - 13 - 6

	Basic Switch & Actuator/Body Style				Operation	Termination	Lead Length																				
Bracket	AT373	3AT46	4AT48	10AT15	0 SPDT		<table border="1"> <tr><td>1</td><td>6" (153mm)</td></tr> <tr><td>2</td><td>12" (305mm)</td></tr> <tr><td>3</td><td>18" (458mm)</td></tr> <tr><td>4</td><td>24" (610mm)</td></tr> <tr><td>5</td><td>30" (762mm)</td></tr> <tr><td>6</td><td>36" (915mm)</td></tr> <tr><td>7</td><td>42" (1067mm)</td></tr> <tr><td>8</td><td>48" (1220mm)</td></tr> <tr><td>9</td><td>60" (1524mm)</td></tr> <tr><td>10</td><td>72" (1829mm)</td></tr> </table>	1	6" (153mm)	2	12" (305mm)	3	18" (458mm)	4	24" (610mm)	5	30" (762mm)	6	36" (915mm)	7	42" (1067mm)	8	48" (1220mm)	9	60" (1524mm)	10	72" (1829mm)
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Flange	AT104	3AT47	4AT49	10AT124	1 SPST, N.C.																						
Threads	AT362	3AT48	4AT64	10AT17	2 SPST, N.O.																						
	<i>std</i>	<i>hi temp</i>	<i>low temp</i>	<i>hi amp</i>																							
Actuating Force (max)	20 oz	20 oz	28 oz	30 oz																							
Release Force (max)	1 oz	1 oz	1 oz	4 oz																							
Pretravel (max)		.009"	(0.23mm)																								
Movement Diff. (max)		.003" (0.08mm)		.005" (0.13mm)																							
Overtravel (min)		.003" (0.38mm)																									
Positive Overtravel Stop	No	No	No	No																							
Max. Force on Actuator approx. Weight (no leads)	5 lb	5 lb	5 lb	5 lb																							
	0.15 oz	0.15 oz	0.15 oz	0.15 oz																							

BASIC "AT", RIGHT HAND ACTUATOR, 1 POLE

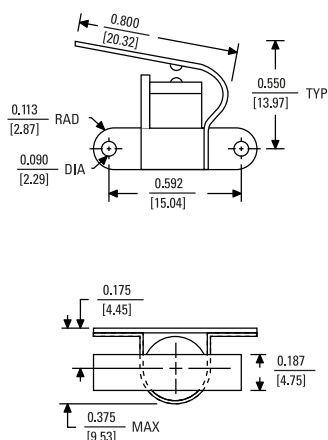
AT289 - 22 - 5



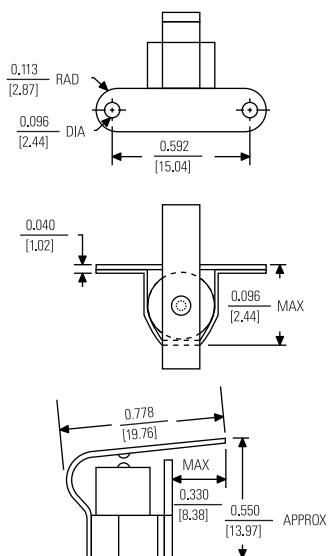
	Basic Switch & Actuator/Body Style				Operation	Termination	Lead Length																				
	AT289	3AT40	4AT43	10AT27	0 SPDT		<table border="1"> <tr><td>1</td><td>6" (153mm)</td></tr> <tr><td>2</td><td>12" (305mm)</td></tr> <tr><td>3</td><td>18" (458mm)</td></tr> <tr><td>4</td><td>24" (610mm)</td></tr> <tr><td>5</td><td>30" (762mm)</td></tr> <tr><td>6</td><td>36" (915mm)</td></tr> <tr><td>7</td><td>42" (1067mm)</td></tr> <tr><td>8</td><td>48" (1220mm)</td></tr> <tr><td>9</td><td>60" (1524mm)</td></tr> <tr><td>10</td><td>72" (1829mm)</td></tr> </table>	1	6" (153mm)	2	12" (305mm)	3	18" (458mm)	4	24" (610mm)	5	30" (762mm)	6	36" (915mm)	7	42" (1067mm)	8	48" (1220mm)	9	60" (1524mm)	10	72" (1829mm)
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8	48" (1220mm)																										
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10	72" (1829mm)																										
Actuating Force (max)	24 oz	24 oz	35 oz	35 oz	1 SPST, N.C.																						
Release Force (max)	1 oz	1 oz	1 oz	4 oz	2 SPST, N.O.																						
Pretravel (max)		.250" (6.35mm)																									
Movement Diff. (max)		.050" (1.27mm)																									
Overtravel (min)		.015" (0.38mm)																									
Positive Overtravel Stop	Yes	Yes	Yes	Yes																							
Max. Force on Actuator approx. Weight (no leads)	5 lb	5 lb	5 lb	5 lb																							
	0.18 oz	0.18 oz	0.18 oz	0.18 oz																							

BASIC "AT", LEFT HAND ACTUATOR, 1 POLE

AT290 - 22 - 4



	Basic Switch & Actuator/Body Style				Operation	Termination	Lead Length																				
	AT290	3AT41	4AT44	10AT28	0 SPDT		<table border="1"> <tr><td>1</td><td>6" (153mm)</td></tr> <tr><td>2</td><td>12" (305mm)</td></tr> <tr><td>3</td><td>18" (458mm)</td></tr> <tr><td>4</td><td>24" (610mm)</td></tr> <tr><td>5</td><td>30" (762mm)</td></tr> <tr><td>6</td><td>36" (915mm)</td></tr> <tr><td>7</td><td>42" (1067mm)</td></tr> <tr><td>8</td><td>48" (1220mm)</td></tr> <tr><td>9</td><td>60" (1524mm)</td></tr> <tr><td>10</td><td>72" (1829mm)</td></tr> </table>	1	6" (153mm)	2	12" (305mm)	3	18" (458mm)	4	24" (610mm)	5	30" (762mm)	6	36" (915mm)	7	42" (1067mm)	8	48" (1220mm)	9	60" (1524mm)	10	72" (1829mm)
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Actuating Force (max)	24 oz	24 oz	35 oz	35 oz	1 SPST, N.C.																						
Release Force (max)	1 oz	1 oz	1 oz	4 oz	2 SPST, N.O.																						
Pretravel (max)		.250" (6.35mm)																									
Movement Diff. (max)		.050" (1.27mm)																									
Overtravel (min)		.015" (0.38mm)																									
Positive Overtravel Stop	Yes	Yes	Yes	Yes																							
Max. Force on Actuator approx. Weight (no leads)	5 lb	5 lb	5 lb	5 lb																							
	0.18 oz	0.18 oz	0.18 oz	0.18 oz																							

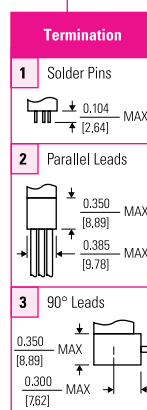


BASIC "AT", CENTRAL ACTUATOR, 1 POLE

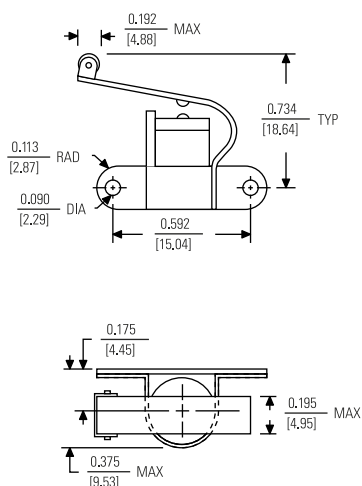
3AT53 - 2 1 - 4

	Basic Switch & Actuator/Body Style			
	AT294	3AT53	4AT50	10AT29
	std	hi temp	low temp	hi amp
Actuating Force (max)	24 oz	24 oz	35 oz	35 oz
Release Force (max)	1 oz	1 oz	1 oz	4 oz
Pretravel (max)	.250" (6.35mm)			
Movement Diff. (max)	.050" (1.27mm)			
Overtravel (min)	.015" (0.38mm)			
Positive Overtravel Stop	Yes	Yes	Yes	Yes
Max. Force on Actuator approx. Weight (no leads)	5 lb	5 lb	5 lb	5 lb
	0.2 oz	0.2 oz	0.2 oz	0.2 oz

Operation	
0	SPDT
1	SPST, N.C.
2	SPST, N.O.



Lead Length	
1	6" (153mm)
2	12" (305mm)
3	18" (458mm)
4	24" (610mm)
5	30" (762mm)
6	36" (915mm)
7	42" (1067mm)
8	48" (1220mm)
9	60" (1524mm)
10	72" (1829mm)

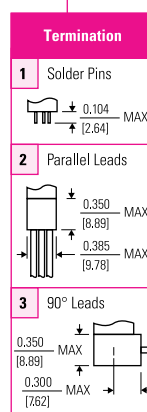


BASIC "AT", LEFT HAND ACTUATOR, 1 POLE

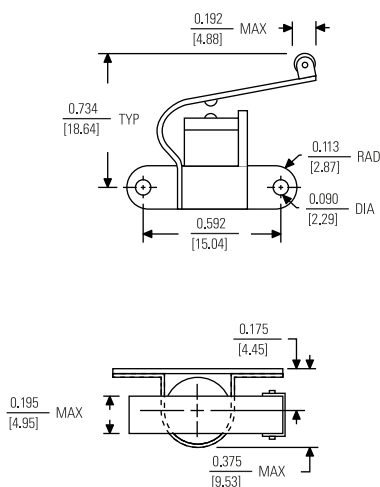
AT292 - 1 2 - 5

	Basic Switch & Actuator/Body Style			
	AT292	3AT43	4AT46	10AT31
	std	hi temp	low temp	hi amp
Actuating Force (max)	24 oz	24 oz	35 oz	35 oz
Release Force (max)	1 oz	1 oz	1 oz	4 oz
Pretravel (max)	.250" (6.35mm)			
Movement Diff. (max)	.050" (1.27mm)			
Overtravel (min)	.015" (0.38mm)			
Positive Overtravel Stop	Yes	Yes	Yes	Yes
Max. Force on Actuator approx. Weight (no leads)	5 lb	5 lb	5 lb	5 lb
	0.18 oz	0.18 oz	0.18 oz	0.18 oz

Operation	
0	SPDT
1	SPST, N.C.
2	SPST, N.O.



Lead Length	
1	6" (153mm)
2	12" (305mm)
3	18" (458mm)
4	24" (610mm)
5	30" (762mm)
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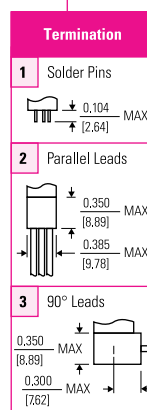


BASIC "AT", RIGHT HAND ACTUATOR, 1 POLE

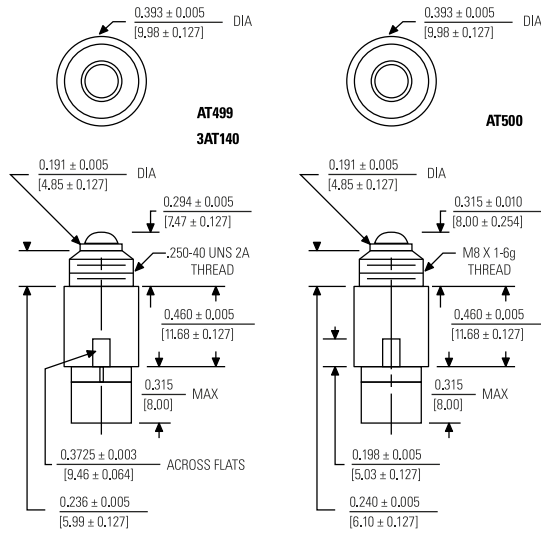
AT291 - 2 2 - 2

	Basic Switch & Actuator/Body Style			
	AT291	3AT42	4AT45	10AT30
	std	hi temp	low temp	hi amp
Actuating Force (max)	24 oz	24 oz	35 oz	35 oz
Release Force (max)	1 oz	1 oz	1 oz	4 oz
Pretravel (max)	.250" (6.35mm)			
Movement Diff. (max)	.050" (1.27mm)			
Overtravel (min)	.015" (0.38mm)			
Positive Overtravel Stop	Yes	Yes	Yes	Yes
Max. Force on Actuator approx. Weight (no leads)	5 lb	5 lb	5 lb	5 lb
	0.2 oz	0.2 oz	0.2 oz	0.2 oz

Operation	
0	SPDT
1	SPST, N.C.
2	SPST, N.O.



Lead Length	
1	6" (153mm)
2	12" (305mm)
3	18" (458mm)
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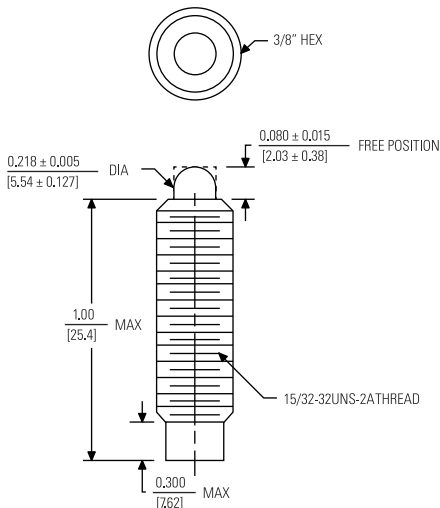
THREADED HEX BODY, FLAT & ROUND PLUNGER, 1 POLE

AT500 - 2 2 - 10

Basic Switch & Actuator/Body Style			Operation	Termination	Lead Length
AT499	3AT140	AT500			
<i>std</i>	<i>hi temp</i>	<i>std</i>	0 SPDT	1 Solder Pins 	1 6" (153mm) 2 12" (305mm) 3 18" (458mm) 4 24" (610mm) 5 30" (762mm) 6 36" (915mm) 7 42" (1067mm) 8 48" (1220mm) 9 60" (1524mm) 10 72" (1829mm)
Actuating Force (max)			1 SPST, N.C.		
Release Force (max)			2 SPST, N.O.	2 Parallel Leads 	
Pretravel (max)					
Movement Diff. (max)				3 90° Leads 	
Overtravel (min)					
Positive Overtravel Stop					
Max. Force on Actuator					
Approx. Weight (no leads)					

THREADED HEX BODY, FLAT & ROUND PLUNGER, 1 POLE

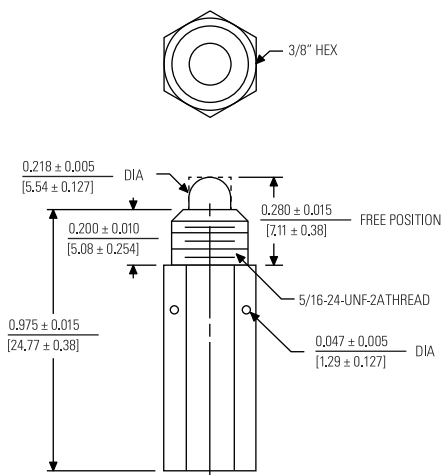
10AT384 - 2 2 - 10



Basic Switch & Actuator/Body Style			Operation	Termination	Lead Length
AT414	3AT141	10AT384			
<i>std</i>	<i>hi temp</i>	<i>hi amp</i>	0 SPDT	1 Solder Pins 	1 6" (153mm) 2 12" (305mm) 3 18" (458mm) 4 24" (610mm) 5 30" (762mm) 6 36" (915mm) 7 42" (1067mm) 8 48" (1220mm) 9 60" (1524mm) 10 72" (1829mm)
Actuating Force (max)			1 SPST, N.C.		
Release Force (max)			2 SPST, N.O.	2 Parallel Leads 	
Pretravel (max)					
Movement Diff. (max)				3 90° Leads 	
Overtravel (min)					
Positive Overtravel Stop					
Max. Force on Actuator					
Approx. Weight (no leads)					

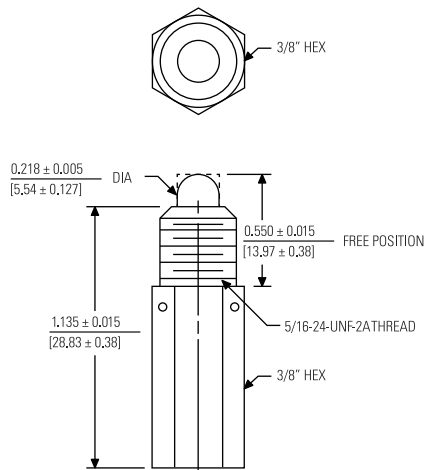
THREADED HEX BODY, FLAT & ROUND PLUNGER, 1 POLE

AT394 - 0 3 - 3



Basic Switch & Actuator/Body Style			Operation	Termination	Lead Length
AT393	3AT143	10AT361			
<i>std</i>	<i>hi temp</i>	<i>hi amp</i>	0 SPDT	1 Solder Pins 	1 6" (153mm) 2 12" (305mm) 3 18" (458mm) 4 24" (610mm) 5 30" (762mm) 6 36" (915mm) 7 42" (1067mm) 8 48" (1220mm) 9 60" (1524mm) 10 72" (1829mm)
Actuating Force (max)			1 SPST, N.C.		
Release Force (max)			2 SPST, N.O.	2 Parallel Leads 	
Pretravel (max)					
Movement Diff. (max)				3 90° Leads 	
Overtravel (min)					
Positive Overtravel Stop					
Max. Force on Actuator					
Approx. Weight (no leads)					

THREADED HEX BODY, FLAT & ROUND PLUNGER, 1 POLE



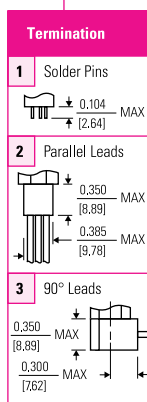
Flat Plunger
Round Plunger

Actuating Force (max)
Release Force (max)
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Positive Overtravel Stop
Max Force on Actuator
Approx Weight (no leads)

Basic Switch & Actuator/Body Style		
AT395	3AT145	10AT363
std	hi temp	hi amp
20 oz		30 oz
	1 oz	4 oz
	.010" (.254mm)	
	.005" (.127mm)	
	.125" (3.18mm)	
Yes		Yes
	20 lb	20 lb
	0.6 oz	0.6 oz

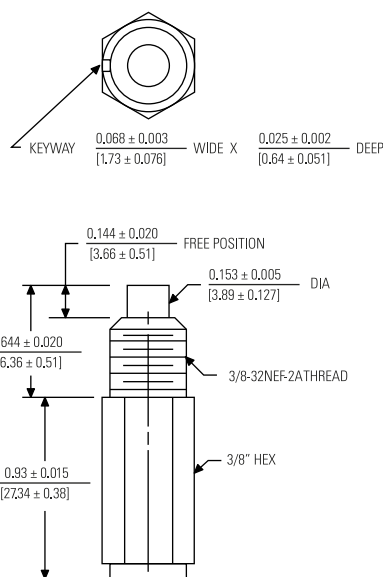
10AT364 - 0 3 - 10

Operation	
0	SPDT
1	SPST, N.C.
2	SPST, N.O.



Lead Length	
1	6" (153mm)
2	12" (305mm)
3	18" (458mm)
4	24" (610mm)
5	30" (762mm)
6	36" (915mm)
7	42" (1067mm)
8	48" (1220mm)
9	60" (1524mm)
10	72" (1829mm)

THREADED HEX BODY, FLAT PLUNGER, 1 POLE

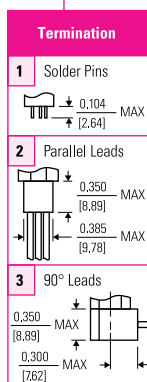


Actuating Force (max)
Release Force (max)
Plunger Seal / MIL-8805
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Positive Overtravel Stop
Max Force on Actuator
Approx Weight (no leads)

Basic Switch & Actuator/Body Style		
AT268	3AT138	10AT7
std	hi temp	hi amp
104 oz		
	24 oz	
	Yes	
	.010" (.254mm)	
	.005" (.127mm)	
	.060" (1.52mm)	
Yes		
	20 lb	
	0.5 oz	

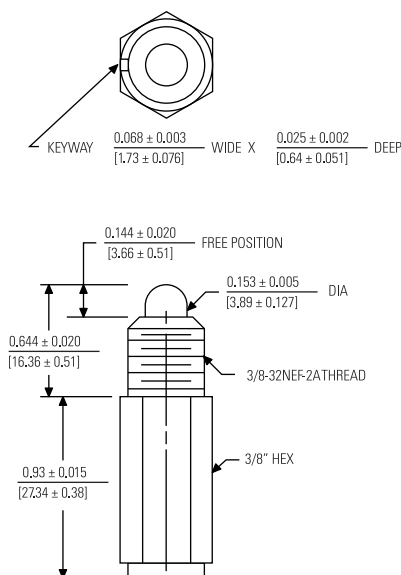
AT268 - 2 2 - 2

Operation	
0	SPDT
1	SPST, N.C.
2	SPST, N.O.



Lead Length	
1	6" (153mm)
2	12" (305mm)
3	18" (458mm)
4	24" (610mm)
5	30" (762mm)
6	36" (915mm)
7	42" (1067mm)
8	48" (1220mm)
9	60" (1524mm)
10	72" (1829mm)

THREADED HEX BODY, ROUND PLUNGER, 1 POLE

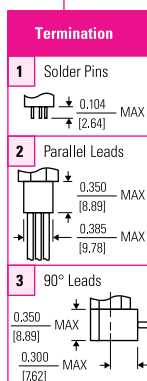


Actuating Force (max)
Release Force (max)
Plunger Seal / MIL-8805
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Positive Overtravel Stop
Max Force on Actuator
Approx Weight (no leads)

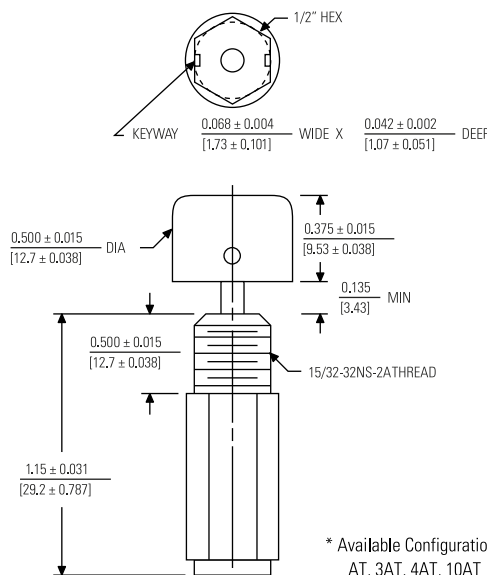
Basic Switch & Actuator/Body Style		
AT269	3AT139	10AT76
std	hi temp	hi amp
104 oz		
	24 oz	
	Yes	
	.020" (.508mm)	
	.010" (.254mm)	
	.125" (3.18mm)	
Yes		
	30 lb	
	1.0 oz	

AT269 - 2 2 - 2

Operation	
0	SPDT
1	SPST, N.C.
2	SPST, N.O.



Lead Length	
1	6" (153mm)
2	12" (305mm)
3	18" (458mm)
4	24" (610mm)
5	30" (762mm)
6	36" (915mm)
7	42" (1067mm)
8	48" (1220mm)
9	60" (1524mm)
10	72" (1829mm)



* 3AT / 4AT versions available

- Actuating Force (max)
- Release Force (max)
- Plunger Seal / MIL-S-8805
- Pretravel (max)
- Movement Diff. (max)
- Overtravel (min)
- Positive Overtravel Stop
- Max Force on Actuator
- Approx Weight (no leads)

* Available Configurations:
AT, 3AT, 4AT, 10AT

THREADED HEX BODY, PADDLE PLUNGER, 1 POLE

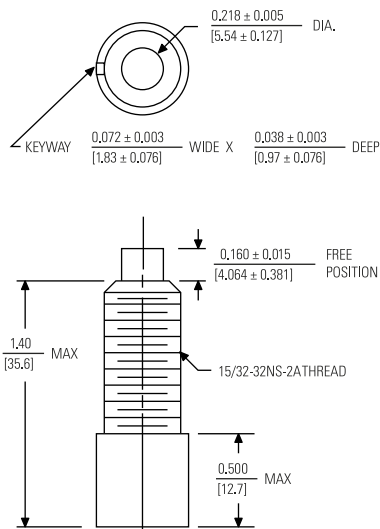
AT87 - 0 3 - 9

Basic Switch & Actuator/Body Style	
AT224	10AT87
std	hi amp
104 oz	104 oz
24 oz	24 oz
Yes	Yes
.020" (.508mm)	
.010" (.254mm)	
.125" (3.18mm)	
Yes	Yes
30 lb	30 lb
1.1 oz	1.1 oz

Operation	
0	SPDT
1	SPST, N.C.
2	SPST, N.O.

Termination	
1	Solder Pins
2	Parallel Leads
3	90° Leads

Lead Length	
1	6" (153mm)
2	12" (305mm)
3	18" (458mm)
4	24" (610mm)
5	30" (762mm)
6	36" (915mm)
7	42" (1067mm)
8	48" (1220mm)
9	60" (1524mm)
10	72" (1829mm)



- Actuating Force (max)
- Release Force (max)
- Plunger Seal / MIL-S-8805
- Pretravel (max)
- Movement Diff. (max)
- Overtravel (min)
- Positive Overtravel Stop
- Max Force on Actuator
- Approx Weight (no leads)

THREADED, FLAT PLUNGER, 1 POLE

AT403 - 0 2 - 4

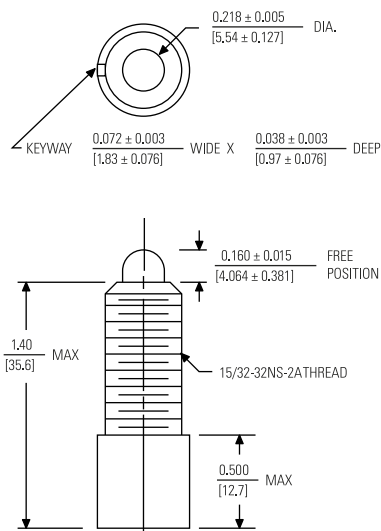
Basic Switch & Actuator/Body Style			
AT400	10AT366	AT403	10AT369
std	hi amp	std	hi amp
20 oz	30 oz	104 oz	112 oz
1 oz	4 oz	24 oz	24 oz
No	No	Yes	Yes
.010" (.254mm)		.020" (.51mm)	
.005" (.127mm)		.005" (.127mm)	
.125" (3.18mm)		.125" (3.18mm)	
Yes	Yes	Yes	Yes
30 lb	30 lb	30 lb	30 lb
1.2 oz	1.2 oz	1.2 oz	1.2 oz

Operation	
0	SPDT
1	SPST, N.C.
2	SPST, N.O.

Termination	
2	Parallel Leads
3	90° Leads

Lead Length	
1	6" (153mm)
2	12" (305mm)
3	18" (458mm)
4	24" (610mm)
5	30" (762mm)
6	36" (915mm)
7	42" (1067mm)
8	48" (1220mm)
9	60" (1524mm)
10	72" (1829mm)

* 3AT / 4AT versions available



- Actuating Force (max)
- Release Force (max)
- Plunger Seal / MIL-S-8805
- Pretravel (max)
- Movement Diff. (max)
- Overtravel (min)
- Positive Overtravel Stop
- Max Force on Actuator
- Approx Weight (no leads)

THREADED, ROUND PLUNGER, 1 POLE

AT401 - 2 3 - 1

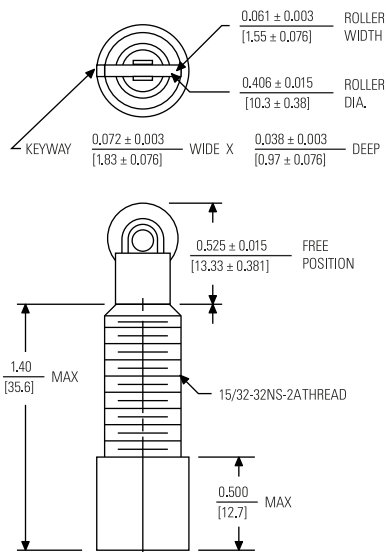
Basic Switch & Actuator/Body Style			
AT401	10AT367	AT404	10AT370
std	hi amp	std	hi amp
20 oz	30 oz	104 oz	112 oz
1 oz	4 oz	24 oz	24 oz
No	No	Yes	Yes
.010" (.254mm)		.020" (.51mm)	
.005" (.127mm)		.005" (.127mm)	
.125" (3.18mm)		.125" (3.18mm)	
Yes	Yes	Yes	Yes
30 lb	30 lb	30 lb	30 lb
1.2 oz	1.2 oz	1.2 oz	1.2 oz

Operation	
0	SPDT
1	SPST, N.C.
2	SPST, N.O.

Termination	
2	Parallel Leads
3	90° Leads

Lead Length	
1	6" (153mm)
2	12" (305mm)
3	18" (458mm)
4	24" (610mm)
5	30" (762mm)
6	36" (915mm)
7	42" (1067mm)
8	48" (1220mm)
9	60" (1524mm)
10	72" (1829mm)

* 3AT / 4AT versions available



Actuating Force (max)
 Release Force (max)
 Plunger Seal / MIL-S-8805
 Pretravel (max)
 Movement Diff. (max)
 Overtravel (min)
 Positive Overtravel Stop
 Max Force on Actuator
 Approx Weight (no leads)

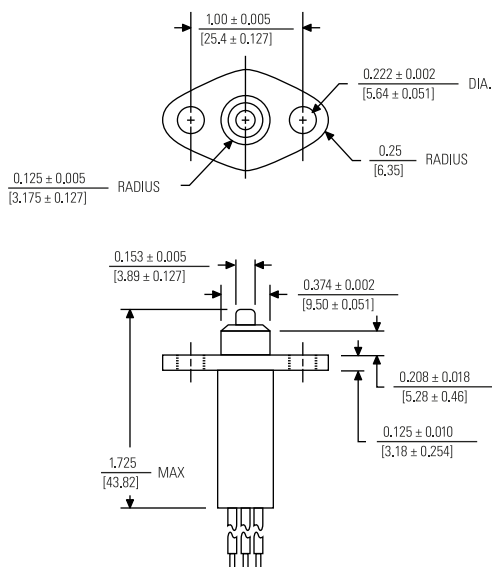
Basic Switch & Actuator/Body Style			
AT402	10AT368	AT405	10AT371
std	hi amp	std	hi amp
20 oz	30 oz	104 oz	112 oz
1 oz	4 oz	24 oz	24 oz
No	No	Yes	Yes
.010" (.254mm)	.020" (.51mm)	.020" (.51mm)	.020" (.51mm)
.005" (.127mm)	.005" (.127mm)	.005" (.127mm)	.005" (.127mm)
.125" (3.18mm)	.125" (3.18mm)	.125" (3.18mm)	.125" (3.18mm)
Yes	Yes	Yes	Yes
30 lb	30 lb	30 lb	30 lb
1.3 oz	1.3 oz	1.3 oz	1.3 oz

THREADED, ROLLER PLUNGER, 1 POLE

10AT371 - 1 3 - 9

Operation		Termination		Lead Length	
0	SPDT	2	Parallel Leads	1	6" (153mm)
1	SPST, N.C.			2	12" (305mm)
2	SPST, N.O.			3	18" (458mm)
				4	24" (610mm)
				5	30" (762mm)
				6	36" (915mm)
				7	42" (1067mm)
				8	48" (1220mm)
				9	60" (1524mm)
				10	72" (1829mm)

*3AT / 4AT versions available



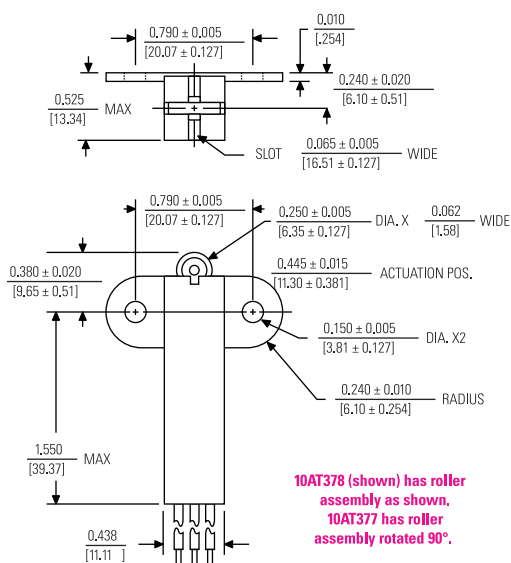
Actuating Force (max)
 Release Force (max)
 Plunger Seal / MIL-S-8805
 Pretravel (max)
 Movement Diff. (max)
 Overtravel (min)
 Positive Overtravel Stop
 Max Force on Actuator
 Approx Weight (no leads)

Basic Switch & Actuator/Body Style	
10AT376	
hi amp	
192 oz	
112 oz	
Yes	
.040" (1.02mm)	
.010" (.254mm)	
.125" (3.18mm)	
Yes	
30 lbs	
1.1 oz	

FLANGE MOUNT, SEALED PLUNGER, 1 POLE

10AT376 - 0 2 - 7

Operation		Termination		Lead Length	
0	SPDT	2	Parallel Leads	1	6" (153mm)
1	SPST, N.C.			2	12" (305mm)
2	SPST, N.O.			3	18" (458mm)
				4	24" (610mm)
				5	30" (762mm)
				6	36" (915mm)
				7	42" (1067mm)
				8	48" (1220mm)
				9	60" (1524mm)
				10	72" (1829mm)



10AT378 (shown) has roller assembly as shown.
 10AT377 has roller assembly rotated 90°.

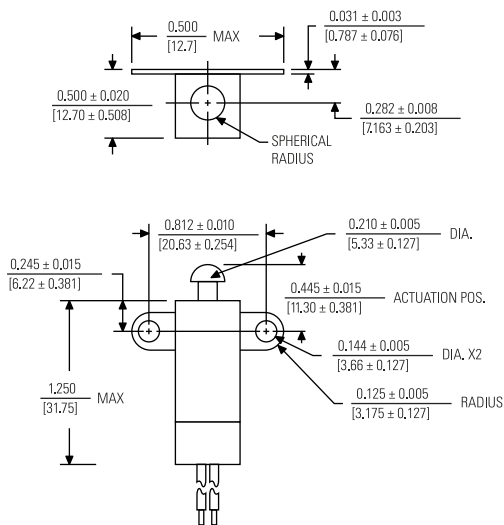
Actuating Force (max)
 Release Force (max)
 Plunger Seal / MIL-S-8805
 Pretravel (max)
 Movement Diff. (max)
 Overtravel (min)
 Positive Overtravel Stop
 Max Force on Actuator
 Approx Weight (no leads)

Basic Switch & Actuator/Body Style	
10AT377	10AT378
hi amp	hi amp
30 oz	30 oz
16 oz	16 oz
Yes	Yes
.040" (1.02mm)	
.010" (.254mm)	
.125" (3.18mm)	
Yes	Yes
30 lbs	30 lbs
1.2 oz	1.2 oz

FLANGE MOUNT, SEALED ROLLER PLUNGER, 1 POLE

10AT377 - 1 2 - 5

Operation		Termination		Lead Length	
0	SPDT	2	Parallel Leads	1	6" (153mm)
1	SPST, N.C.			2	12" (305mm)
2	SPST, N.O.			3	18" (458mm)
				4	24" (610mm)
				5	30" (762mm)
				6	36" (915mm)
				7	42" (1067mm)
				8	48" (1220mm)
				9	60" (1524mm)
				10	72" (1829mm)

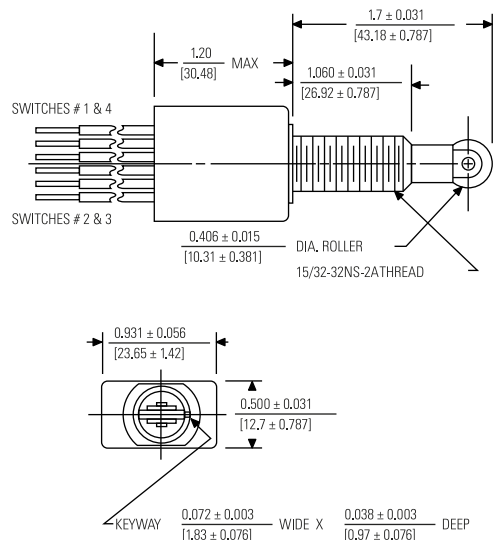


FLANGE MOUNT, UNSEALED ROUND PLUNGER, 1 POLE

10AT379 - 1 2 - 9

Basic Switch & Actuator/Body Style		Operation		Termination		Lead Length	
10AT379		0	SPDT	2	Parallel Leads	1	6" (153mm)
<i>hi amp</i>		1	SPST, N.C.			2	12" (305mm)
Actuating Force (max)		2	SPST, N.O.			3	18" (458mm)
Release Force (max)						4	24" (610mm)
Plunger Seal / MIL-S-8805						5	30" (762mm)
Pretravel (max)						6	36" (915mm)
Movement Diff. (max)						7	42" (1067mm)
Overtravel (min)						8	48" (1220mm)
Positive Overtravel Stop						9	60" (1524mm)
Max Force on Actuator						10	72" (1829mm)
Approx Weight (no leads)							

Actuating Force (max)
Release Force (max)
Plunger Seal / MIL-S-8805
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Positive Overtravel Stop
Max Force on Actuator
Approx Weight (no leads)

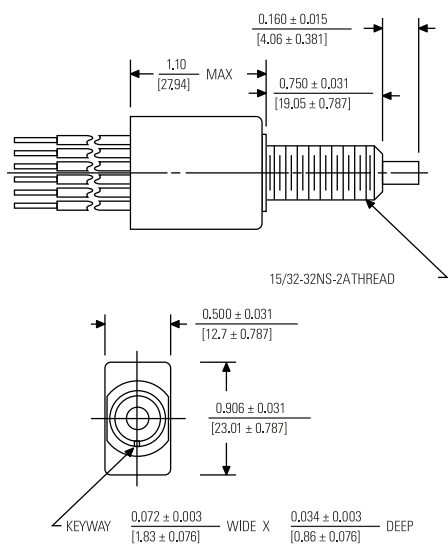


THREADED, SEALED ROLLER PLUNGER, 2 POLE

10AT373 - 3 3 - 1

Basic Switch & Actuator/Body Style		Operation		Termination		Lead Length	
3AT147	10AT373	3	DPDT	2	Parallel Leads	1	6" (153mm)
<i>hi temp</i>	<i>hi amp</i>	4	DPST, N.C.			2	12" (305mm)
Actuating Force (max)		5	DPST, N.O.			3	18" (458mm)
Release Force (max)		6	DPST, NC/NO			4	24" (610mm)
Plunger Seal / MIL-S-8805						5	30" (762mm)
Pretravel (max)					6	36" (915mm)	
Movement Diff. (max)					7	42" (1067mm)	
Overtravel (min)					8	48" (1220mm)	
Positive Overtravel Stop					9	60" (1524mm)	
Max Force on Actuator					10	72" (1829mm)	
Approx Weight (no leads)							

Actuating Force (max)
Release Force (max)
Plunger Seal / MIL-S-8805
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Positive Overtravel Stop
Max Force on Actuator
Approx Weight (no leads)

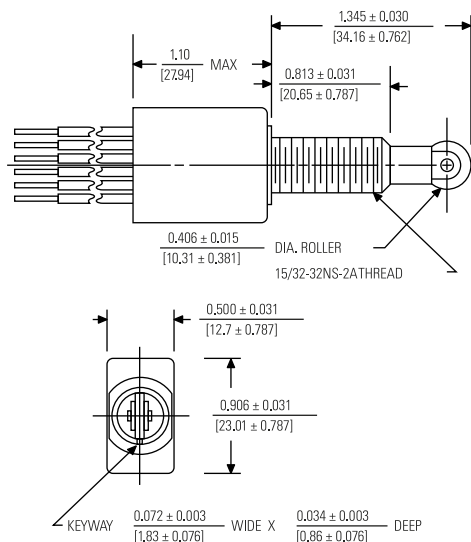


THREADED, SEALED FLAT PLUNGER, 2 POLE

AT391 - 3 2 - 7

Basic Switch & Actuator/Body Style			Operation		Termination		Lead Length	
AT391	3AT148	10AT358	3	DPDT	2	Parallel Leads	1	6" (153mm)
<i>std</i>	<i>hi temp</i>	<i>hi amp</i>	4	DPST, N.C.			2	12" (305mm)
Actuating Force (max)			5	DPST, N.O.			3	18" (458mm)
Release Force (max)			6	DPST, N.C./N.O.			4	24" (610mm)
Plunger Seal / MIL-S-8805					5		30" (762mm)	
Pretravel (max)					6	36" (915mm)		
Movement Diff. (max)					7	42" (1067mm)		
Overtravel (min)					8	48" (1220mm)		
Positive Overtravel Stop					9	60" (1524mm)		
Max Force on Actuator					10	72" (1829mm)		
Approx Weight (no leads)								

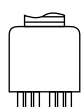

Actuating Force (max)
Release Force (max)
Plunger Seal / MIL-S-8805
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Positive Overtravel Stop
Max Force on Actuator
Approx Weight (no leads)

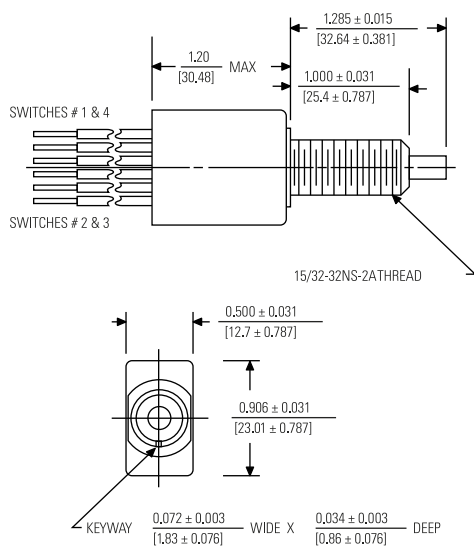


Actuating Force (max)
Release Force (max)
Plunger Seal / MIL-S-8805
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Positive Overtravel Stop
Max Force on Actuator
Approx Weight (no leads)

THREADED, SEALED ROLLER PLUNGER, 2 POLE

AT392 - 4 3 - 2



Basic Switch & Actuator/Body Style		Operation	Termination	Lead Length
AT392	10AT359	3 DPDT	2 Parallel Leads	1 6" (153mm)
<i>std</i>	<i>hi amp</i>	4 DPST, N.C.		2 12" (305mm)
160 oz	160 oz	5 DPST, N.O.		3 18" (458mm)
16 oz	16 oz	6 DPST, N.C./N.O.		4 24" (610mm)
Yes	Yes			5 30" (762mm)
Pretravel (max) .030" (.76mm)				6 36" (915mm)
Movement Diff. (max) .020" (.51mm)			7 42" (1067mm)	
Overtravel (min) .125" (3.18mm)			8 48" (1220mm)	
Yes	Yes		9 60" (1524mm)	
30 lb	30 lb		10 72" (1829mm)	
1.4 oz	1.4 oz			

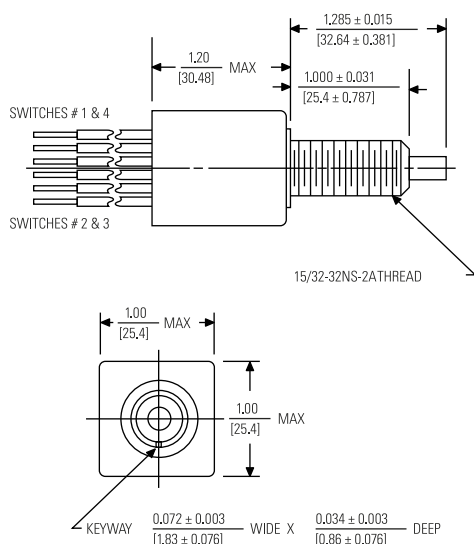


Actuating Force (max)
Release Force (max)
Plunger Seal / MIL-S-8805
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Positive Overtravel Stop
Max Force on Actuator
Approx Weight (no leads)

THREADED, SEALED FLAT PLUNGER, 2 POLE

AT406 - 6 2 - 6



Basic Switch & Actuator/Body Style		Operation	Termination	Lead Length
AT406	10AT372	3 DPDT	2 Parallel Leads	1 6" (153mm)
<i>hi amp</i>	<i>hi amp</i>	4 DPST, N.C.		2 12" (305mm)
160 oz	160 oz	5 DPST, N.O.		3 18" (458mm)
16 oz	16 oz	6 DPST, N.C./N.O.		4 24" (610mm)
Yes	Yes			5 30" (762mm)
Pretravel (max) .030" (.76mm)				6 36" (915mm)
Movement Diff. (max) .020" (.51mm)			7 42" (1067mm)	
Overtravel (min) .200" (5.1mm)			8 48" (1220mm)	
Yes	Yes		9 60" (1524mm)	
30 lb	30 lb		10 72" (1829mm)	
1.6 oz	1.6 oz			



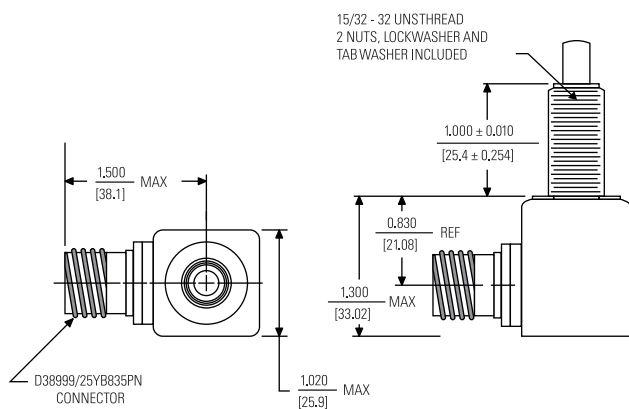
Actuating Force (max)
Release Force (max)
Plunger Seal / MIL-S-8805
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Positive Overtravel Stop
Max Force on Actuator
Approx Weight (no leads)

THREADED, SEALED FLAT PLUNGER, 3 OR 4 POLE

AT409 - 9 2 - 4

Basic Switch & Actuator/Body Style		Operation	Termination	Lead Length
AT409	10AT375	7 3PDT	2 Parallel Leads	1 6" (153mm)
<i>hi amp</i>	<i>hi amp</i>	8 3PST, N.C.		2 12" (305mm)
160 oz	160 oz	9 3PST, N.O.		3 18" (458mm)
16 oz	16 oz	10 4PDT		4 24" (610mm)
Yes	Yes	11 4PST, N.C.		5 30" (762mm)
Pretravel (max) .030" (.76mm)		12 4PST, N.O.		6 36" (915mm)
Movement Diff. (max) .020" (.51mm)			7 42" (1067mm)	
Overtravel (min) .200" (5.1mm)			8 48" (1220mm)	
Yes	Yes		9 60" (1524mm)	
30 lb	30 lb		10 72" (1829mm)	
3.4 oz	3.4 oz			

PLUNGER SWITCH, 1 POLE

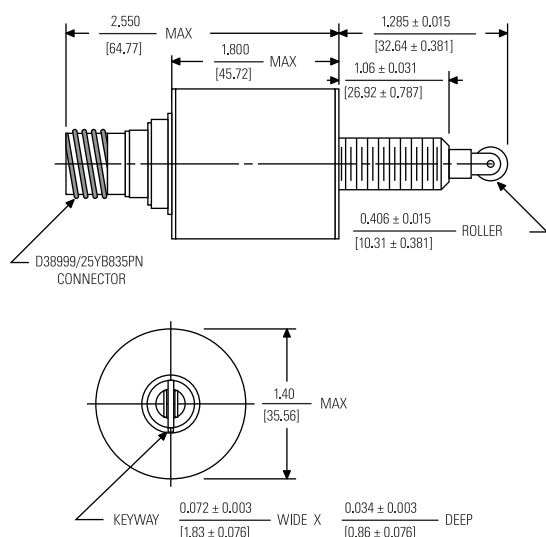


10AT482 - 1

Basic Switch & Actuator/Body Style		Operation	
10AT482		1 SPST	
std			
Actuating Force (max)	112 oz		
Release Force (max)	16 oz		
Pretravel (max)	.020" (.508mm)		
Movement Diff. (max)	.010" (.254mm)		
Overtravel (min)	.125" (3.18mm)		
Approx Weight (no leads)	4 oz		

Actuating Force (max)
Release Force (max)
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Approx Weight (no leads)

* Various connectors available



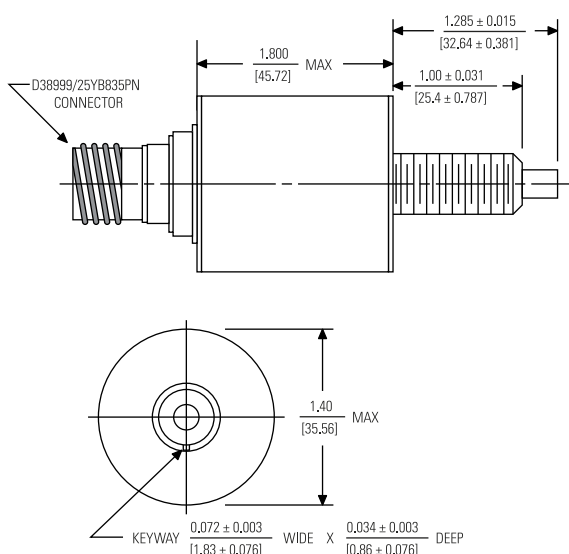
ROLLER PLUNGER SWITCH, 4 POLE

10AT490 - 1

Basic Switch & Actuator/Body Style		Operation	
10AT490		1 4PDT	
std			
Actuating Force (max)	160 oz		
Release Force (max)	16 oz		
Pretravel (max)	.030" (.76mm)		
Movement Diff. (max)	.020" (.51mm)		
Overtravel (min)	.200" (5.08mm)		
Max Force on Actuator	30 lbs		
Approx Weight (no leads)	5.1 oz		

Actuating Force (max)
Release Force (max)
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Max Force on Actuator
Approx Weight (no leads)

* Various connectors available



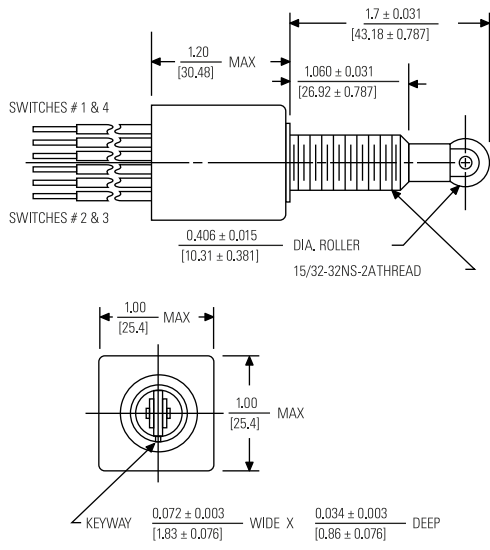
FLAT PLUNGER SWITCH, 4 POLE

10AT493 - 1

Basic Switch & Actuator/Body Style		Operation	
10AT493		1 4PDT	
std			
Actuating Force (max)	160 oz		
Release Force (max)	16 oz		
Pretravel (max)	.030" (.76mm)		
Movement Diff. (max)	.020" (.51mm)		
Overtravel (min)	.200" (5.08mm)		
Max Force on Actuator	30 lbs		
Approx Weight (no leads)	5.1 oz		

Actuating Force (max)
Release Force (max)
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Max Force on Actuator
Approx Weight (no leads)

* Various connectors available

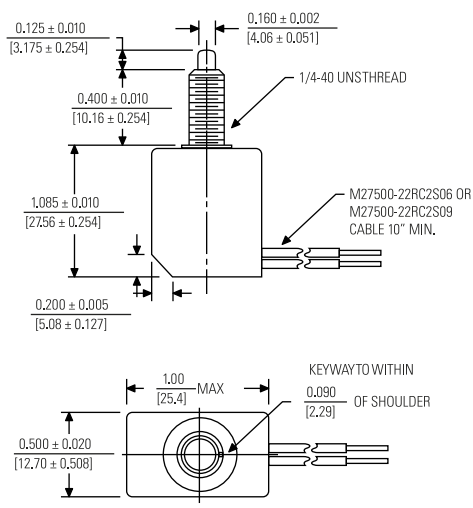


THREADED, SEALED ROLLER PLUNGER, 3 OR 4 POLE

AT408 - 7 3 - 1

Basic Switch & Actuator/Body Style		Operation	Termination	Lead Length
AT408	10AT374	7 3PDT	2 Parallel Leads	1 6" (153mm)
<i>hi amp</i>	<i>hi amp</i>	8 3PST, N.C.		2 12" (305mm)
160 oz	160 oz	9 3PST, N.O.		3 18" (458mm)
16 oz	16 oz	10 4PDT		4 24" (610mm)
Yes	Yes	11 4PST, N.C.		5 30" (762mm)
.030" (.76mm)	.030" (.76mm)	12 4PST, N.O.		6 36" (915mm)
.020" (.51mm)	.020" (.51mm)		7 42" (1067mm)	
.200" (5.1mm)	.200" (5.1mm)		8 48" (1220mm)	
Yes	Yes		9 60" (1524mm)	
30 lb	30 lb		10 72" (1829mm)	
3.4 oz	3.4 oz			

Actuating Force (max)
Release Force (max)
Plunger Seal / MIL-S-8805
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Positive Overtravel Stop
Max Force on Actuator
Approx Weight (no leads)

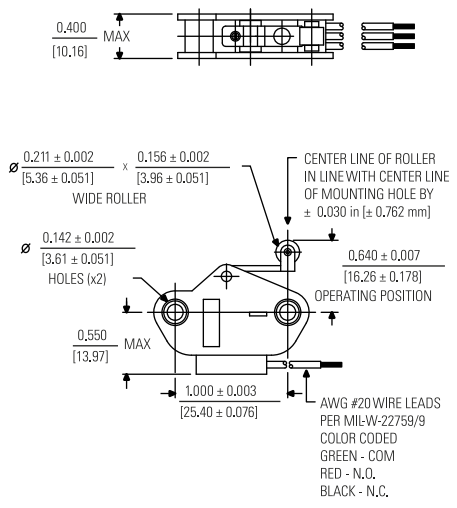


SMALLEST HERMETIC 2-POLE, PLUNGER (FLAT) SWITCH

10AT503 - 6 3 - 8

Basic Switch & Actuator/Body Style		Operation	Termination	Lead Length
3AT149	10AT503	3 DPDT	3 90° Leads	1 6" (153mm)
<i>hi temp</i>	<i>hi amp</i>	4 DPST, N.C.		2 12" (305mm)
64 oz	16 oz	5 DPST, N.O.		3 18" (458mm)
No	No	6 DPST, N.C. / N.O.		4 24" (610mm)
.010" (.254mm)	.010" (.254mm)		5 30" (762mm)	
.010" (.254mm)	.010" (.254mm)		6 36" (915mm)	
.095" (2.41mm)	.095" (2.41mm)		7 42" (1067mm)	
20 lbs	1.0 oz		8 48" (1220mm)	
			9 60" (1524mm)	
			10 72" (1829mm)	

Actuating Force (max)
Release Force (max)
Plunger Seal / MIL-S-8805
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Max Force on Actuator
Approx Weight (no leads)

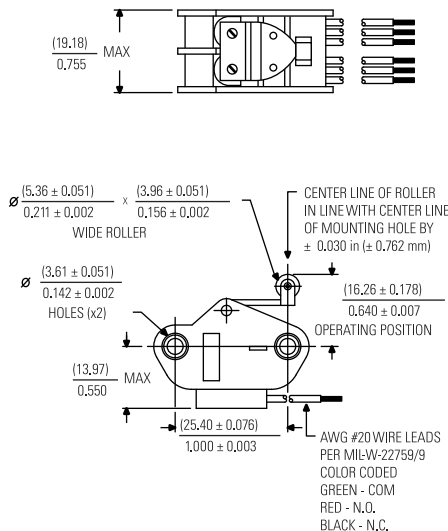


SIDE PLATE, RIGHT ARM, 1 POLE

AT355 - 2 3 - 8

Basic Switch & Actuator/Body Style			Operation	Termination	Lead Length
AT355	3AT150	10AT313	0 SPDT	3 90° Leads	1 6" (153mm)
<i>std</i>	<i>hi temp</i>	<i>hi amp</i>			2 12" (305mm)
24 oz	4 oz	4 oz		3 18" (458mm)	
4 oz	4 oz	4 oz		4 24" (610mm)	
.040" (1.02mm)	.040" (1.02mm)	.040" (1.02mm)		5 30" (762mm)	
.030" (.76mm)	.030" (.76mm)	.030" (.76mm)		6 36" (915mm)	
.125" (3.18mm)	.125" (3.18mm)	.125" (3.18mm)	7 42" (1067mm)		
Yes	Yes	Yes	8 48" (1220mm)		
10 lbs	0.40 oz	0.40 oz	9 60" (1524mm)		
			10 72" (1829mm)		

Actuating Force (max)
Release Force (max)
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Positive Overtravel Stop
Max Force on Actuator
Approx Weight (no leads)



Actuating Force (max)
Release Force (max)
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Positive Overtravel Stop
Max Force on Actuator
Approx Weight (no leads)

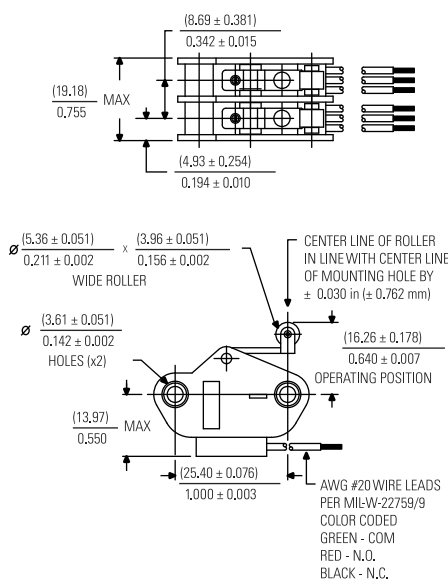
Basic Switch & Actuator/Body Style	
AT356	10AT314
<i>std</i>	<i>hi amp</i>
48 oz	48 oz
4 oz	4 oz
.040" (1.02mm)	
.040" (1.02mm)	
.125" (3.18mm)	
Yes	Yes
10 lbs	10 lbs
0.70 oz	0.70 oz

Operation	
3	DPDT
4	DPST, N.C.
5	DPST, N.O.
6	DPST, N.C / N.O.

Termination	
3	90° Leads

Lead Length	
1	6" (153mm)
2	12" (305mm)
3	18" (458mm)
4	24" (610mm)
5	30" (762mm)
6	36" (915mm)
7	42" (1067mm)
8	48" (1220mm)
9	60" (1524mm)
10	72" (1829mm)

SIDE PLATE, RIGHT ARM, 2 POLE



Actuating Force (max)
Release Force (max)
Pretravel (max)
Movement Diff. (max)
Overtravel (min)
Positive Overtravel Stop
Max Force on Actuator
Approx Weight (no leads)

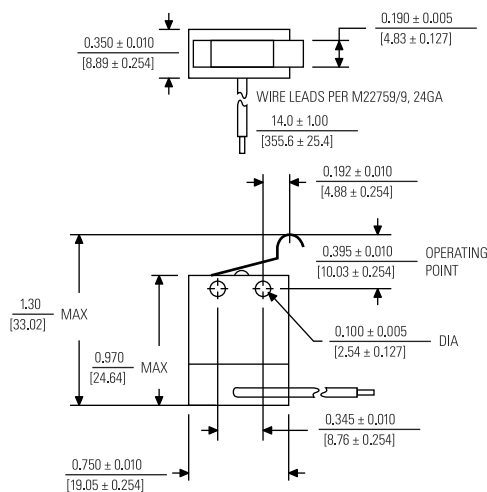
Basic Switch & Actuator/Body Style	
AT357	10AT315
<i>std</i>	<i>hi amp</i>
24 oz	24 oz
4 oz	4 oz
.040" (1.02mm)	
.030" (.76mm)	
.125" (3.18mm)	
Yes	Yes
10 lbs	10 lbs
0.80 oz	0.80 oz

Operation	
3	DPDT
4	DPST, N.C.
5	DPST, N.O.
6	DPST, N.C / N.O.

Termination	
3	90° Leads

Lead Length	
1	6" (153mm)
2	12" (305mm)
3	18" (458mm)
4	24" (610mm)
5	30" (762mm)
6	36" (915mm)
7	42" (1067mm)
8	48" (1220mm)
9	60" (1524mm)
10	72" (1829mm)

LEAF SPRING SWITCH, 1 POLE



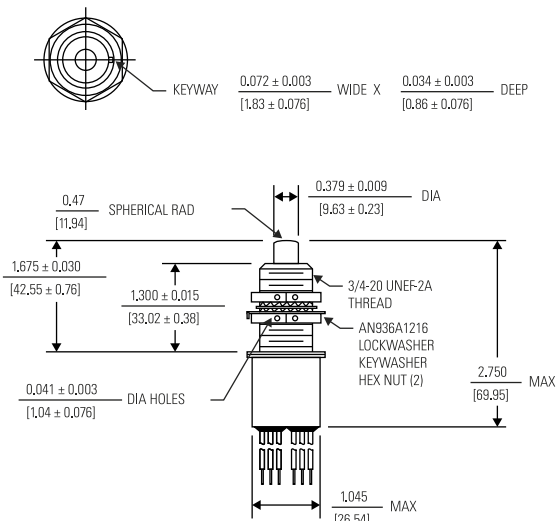
Actuating Force (max)
Plunger Seal / MIL-S-8805
Pretravel (max)
Release Force (max)
Movement Diff. (max)
Overtravel (min)
Positive Overtravel Stop
Max Force on Actuator
Approx Weight (no leads)

Basic Switch & Actuator/Body Style	
3AT151	10AT505
<i>hi temp</i>	<i>hi amp</i>
20 oz	
Yes	
.035" (.89mm)	
4.0 oz	
.010" (.254mm)	
.065" (1.65mm)	
Yes	
5 lb	
0.6 oz	

Operation	
0	SPDT

Termination	
3	90° Leads

Lead Length	
1	6" (153mm)
2	12" (305mm)
3	18" (458mm)
4	24" (610mm)
5	30" (762mm)
6	36" (915mm)
7	42" (1067mm)
8	48" (1220mm)
9	60" (1524mm)
10	72" (1829mm)



ROUNDED PLUNGER SWITCH, 2 POLE

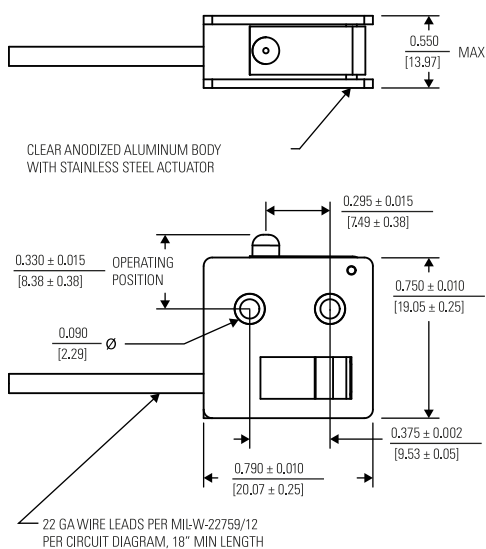
3AT152 - 3 2 - 10

Basic Switch & Actuator/Body Style	Operation	Termination	Lead Length
3AT152	3 DPDT	2 Parallel Leads	1 6" (153mm)
High Temp (500°F)	4 DPST, N.C.		2 12" (305mm)
	5 DPST, N.O.		3 18" (458mm)
	6 DPST, N.C / N.O.		4 24" (610mm)
			5 30" (762mm)
			6 36" (915mm)
			7 42" (1067mm)
			8 48" (1220mm)
			9 60" (1524mm)
			10 72" (1829mm)

Actuating Force (max)
 Release Force (max)
 Pretravel (max)
 Movement Diff. (max)
 Overtravel (min)
 Max Force on Actuator
 Approx Weight (no leads)

Ref: MS24594-1 & M8805/41

* Various connectors available



SIDE PLATE, 1 POLE

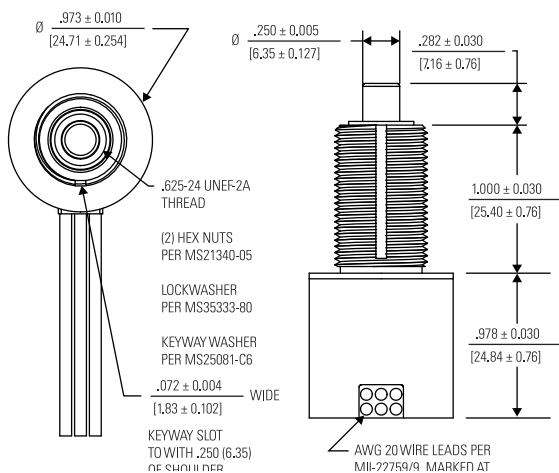
10AT511 - 0 3 - 10

Basic Switch & Actuator/Body Style	Operation	Termination	Lead Length
3AT137	0 SPDT	3 90° Leads	1 6" (153mm)
hi temp	1 SPST, N.C.		2 12" (305mm)
hi amp	2 SPST, N.O.		3 18" (458mm)
			4 24" (610mm)
			5 30" (762mm)
			6 36" (915mm)
			7 42" (1067mm)
			8 48" (1220mm)
			9 60" (1524mm)
			10 72" (1829mm)

Actuating Force (max)
 Release Force (max)
 Movement Diff. (max)
 Overtravel (min)

Ref: MS27216 & M8805/8

* Various connectors available

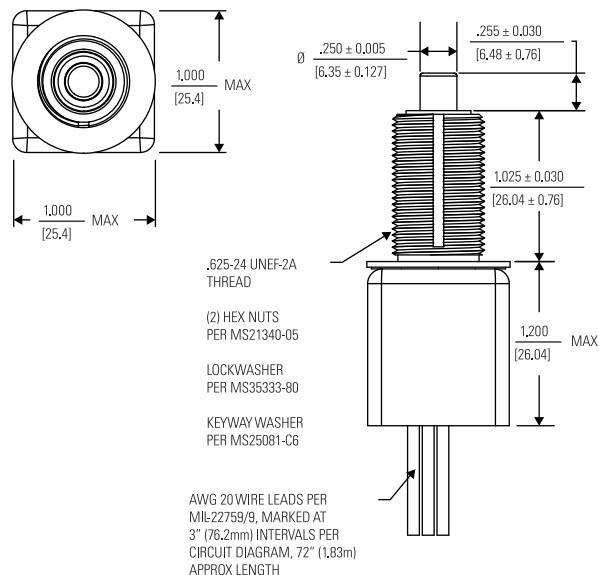


FLAT PLUNGER SWITCH, 2 POLE

10AT506 - 3 2 - 10

Basic Switch & Actuator/Body Style	Operation	Termination	Lead Length
10AT506	3 DPDT	2 Parallel Leads	1 6" (153mm)
hi temp	4 DPST, N.C.		2 12" (305mm)
	5 DPST, N.O.	3 90° Angle Leads	3 18" (458mm)
	6 DPST, N.C / N.O.		4 24" (610mm)
			5 30" (762mm)
			6 36" (915mm)
			7 42" (1067mm)
			8 48" (1220mm)
			9 60" (1524mm)
			10 72" (1829mm)

Actuating Force (max)
 Release Force (max)
 Pretravel (max)
 Movement Diff. (max)
 Overtravel (min)
 Max Force on Actuator
 Approx Weight (no leads)



FLAT PLUNGER SWITCH, 3 or 4 POLE

- Actuating Force (max)
- Release Force (max)
- Pretravel (max)
- Movement Diff. (max)
- Overtravel (min)
- Max Force on Actuator
- Approx Weight (no leads)

Basic Switch & Actuator/Body Style	
10AT507	
<i>hi temp</i>	
96 to 192 oz	
64 oz	
.030" (7.62mm)	
.010" (.254mm)	
.250" (6.35mm)	
192 oz	
7.4 oz	

Ref: M8805/80-04

Operation	Termination	Lead Length
7 3PDT	2 Parallel Leads	1 6" (153mm)
8 3PST, N.C.	3 90° Angle Leads	2 12" (305mm)
9 3PST, N.O.		3 18" (458mm)
10 4PDT		4 24" (610mm)
11 4PST, N.C.		5 30" (762mm)
12 4PST, N.O.		6 36" (915mm)
		7 42" (1067mm)
		8 48" (1220mm)
		9 60" (1524mm)
		10 72" (1829mm)

* Various connectors available

WARNINGS



HAZARD OF ELECTRIC SHOCK, EXPLOSION OR ARC FLASH

- Disconnect all power before installing or working with this equipment
- Verify all connections and replace all covers before turning on power

Failure to follow these instructions will result in death or serious injury

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