

MICROSWITCH
a Honeywell Division

FED. MFG. CODE 91929

SWITCH-BASIC

CATALOG LISTING

38HM65-A

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SPECIFICATION DETAILS:

STANDARD:	BASIC SWITCHES CONFORM TO MS-27216-6 (MIL-PRF-8805/8) EXCEPT AS NOTED		
CONSTRUCTION:	HERMETIC SEAL PER MIL-PRF-8805, SYMBOL 5		
ENCLOSURE DESIGN	GOLD BIFURCATED CONTACTS		
CONTACT MATERIAL & CONFIGURATION	GOLD BIFURCATED CONTACTS		
CIRCUIT CONFIGURATION			
TERMINATION	2X 22 GAGE LEADWIRES PER BMS 13-60, TYPE 1, CLASS 1		
WEIGHT			

ELECTRICAL CHARACTERISTICS:

CONTACT ARRANGEMENT	S.P.N.O.		
ELECTRICAL RATINGS	VOLTAGE	INDUCTIVE	RESISTIVE
-SEA LEVEL	28 VDC	.10 AMP	.10 AMP
-50,000 FEET	28 VDC	.10 AMP	.10 AMP
DIELECTRIC STRENGTH & INSULATION RES	DIELECTRIC STRENGTH (60 Hz FOR 5 SEC)		INSULATION RESISTANCE (500 VDC ±10%)
-BETWEEN TERMINALS AND EXPOSED NON-CURRENT CARRYING METAL	800V RMS, 500 μA (MAX LKG)		1000 MEGOHM MIN
-BETWEEN TERMINALS OF MUTUALLY INSULATED CIRCUITS	800V RMS, 500 μA (MAX LKG)		1000 MEGOHM MIN
-BETWEEN ALL UNCONNECTED TERMINALS OF THE SAME POLE	800V RMS, 500 μA (MAX LKG)		1000 MEGOHM MIN

SWITCH RESISTANCE	N/A
RECOMMENDATION OR USE IN APPL LESS THAN .5 amps AND/OR 12 volts	RECOMMENDED $\triangle 2$

MECHANICAL CHARACTERISTICS:	
OPERATING FORCE	9 OZ MAX
RELEASE FORCE	2 OZ MIN
PRETRAVEL	
FREE POSITION	
OVERTRAVEL	.020-.030
MOUNTING STRENGTH	
ACTUATOR STRENGTH	

LIFE:	
MECHANICAL LIFE	25,000 MIN, PER MIL-PRF-8805/8 $\triangle 3$
ELECTRICAL LIFE AT FULL RATED LOAD	25,000 MIN, PER MIL-PRF-8805/8 $\triangle 3$

ENVIRONMENTAL:	
TEMPERATURE RANGE	-65° C TO +125° C
ALTITUDE RANGE	SEA LEVEL TO 70,000 FT
SHOCK	
VIBRATION	PER BOEING D6-81926 ZONE 3 CATEGORY C 10-2000 Hz 3.9g RMS
MOISTURE RESISTANCE	PER MIL-PRF-8805 (10 DAYS)
THERMAL SHOCK	PER MIL-PRF-8805 (5 CYCLES)
SALT SPRAY	PER MIL-PRF-8805 (96 HOURS)

LIFE RATINGS BEYOND MIL-PRF-8805 REQUIREMENTS PER MICRO SWITCH TEST PLAN (95% SURVIVAL)	
MECHANICAL LIFE	100,000
ELECTRICAL LIFE, AT FULL RATED LOAD	80,000

THIRD ANGLE PROJECTION

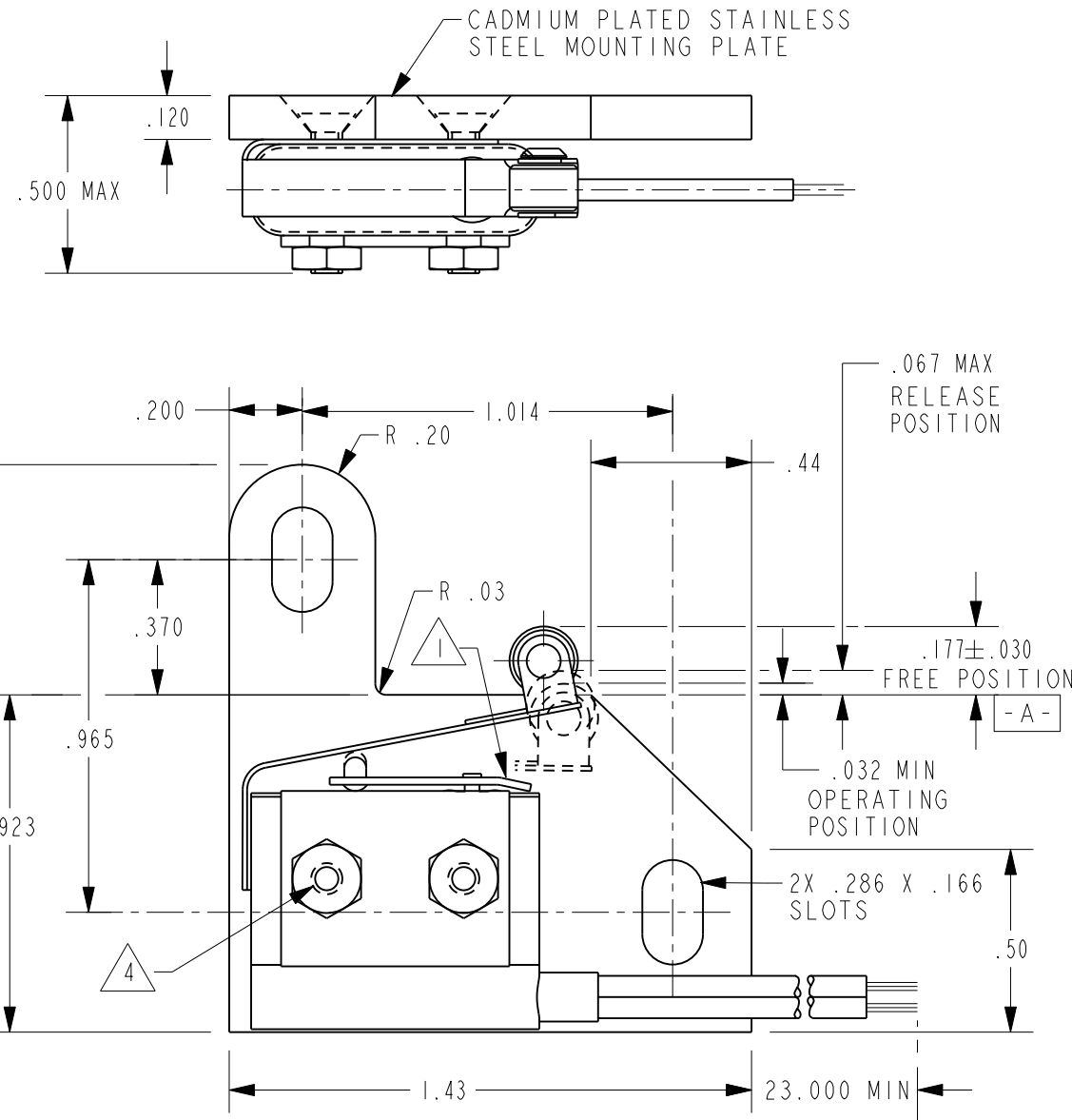
SCALE 2 : 1

DO NOT SCALE PRINT

UNLESS OTHERWISE SPECIFIED TOLERANCES ARE

ONE PLACE	(.0)	±.030
TWO PLACE	(.00)	±.015
THREE PLACE	(.000)	±.005
ANGLES		±

WEIGHT



- NOTES
- 1 ADJUSTMENT CAUTION: DO NOT ALLOW ACTUATOR LEAF TO COME IN CONTACT WITH HM LEVER TO PREVENT SWITCH SEAL DAMAGE
 - 2 CONTACT HONEYWELL - MICRO SWITCH IF ADDITIONAL INFORMATION ON LOW ENERGY LOADS IS REQUIRED OR FOR HELP WITH SPECIFIC APPLICATIONS
 - 3 LIFE RATINGS PER MIL-PRF-8805 REQUIREMENTS. ACTUAL LIFE EXCEEDS RATED LIFE. CONTACT HONEYWELL - MICRO SWITCH FOR ADDITIONAL DATA
 - 4 2X NUTS WELDED TO SCREWS
 - 5 - SWITCH BONDED TO MOUNTING PLATE BY EPOXY ENCAPSULANT

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 RELEASE NO. PR-23297
 REPLACES -
 ISSUE 5
 CHECK
 REVISIONS
 A 203177 G J W 29MAY01 24OCT05
 B 0016179 DVM 24OCT05
 CHECK
 RJ
 CHECK
 29MAY01
 SAV
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 29MAY01
 DRAWN
 G J W
 PTC/CAD 2D

ANSI Y14.5M-1982 APPLIES