

Door Switches



NEMA1 to NEMA9 Models

atmosphere is everything

14716 S. BROADWAY, GARDENA, CA 90248 • Ph: (310)532-1555 Fax: (310)-532-3030 • www.marsair.com
© Copyright Mars Air Systems, LLC 2014

Door Switch Number	Description	Max Voltage	Phase	Max HP	Amperage	NEMA Rating
Mechanical Switches – controller not required for air curtains under switch electrical limits						
99-014	Combination Plunger/Roller	Up to 250V	1	1	20 A	NEMA 1
99-270	Washdown Roller	Up to 250V	1	1	20 A	NEMA 4X
99-016	Explosion Resistant Roller	Up to 250V	1	3/4	15 A	NEMA 7 and 9
Magnetic Switches – controller required						
99-018	Commercial, Plastic, Surface Mounted	Up to 24V	1	-	-	NEMA 1
99-125	Industrial, Metal, Surface Mounted	Up to 120V	1	-	-	NEMA 1
99-124	Industrial, Metal, Floor Mounted	Up to 120V	1	-	-	NEMA 1

Note: DO NOT ground the green wire (for 99-124 and 99-125) or COM terminal (for all others). This is the switch common, not ground or neutral. Please refer to the wiring instructions included with the switches.

Mechanical Switch Features:

Combination Roller/Plunger Switch (99-014)

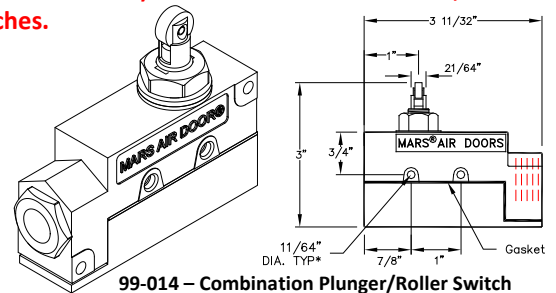
- ❖ Rated for NEMA 1 applications (field installed by others)
 - ❖ Used to enable automatic control of air curtain(s): turns air curtain on when door opens and off when door closes
 - ❖ Suitable for various applications and installation types
 - ❖ Maximum ratings of 250V, 20A, and 1HP (see individual model specs for details)
 - If the air curtain exceeds any of these ratings, or if it is three phase, a [Motor Control Panel \(MCP\)](#) or [solid state controller](#) is required
 - ❖ Single pole (1P) switch with normally closed (NC) and normally open (NO) contacts
 - Only normally closed and common (COM) terminals are provided with screws for wiring
 - ❖ Requires less than 1/8" of travel and 2 lbs. of force on plunger to activate switch
 - ❖ 1/2" FPT conduit connection (field wired by others)
 - ❖ (2) 11/64" mounting holes*
- *Do not use a fastener larger than a #6 sheet metal screw or a #8 Machine screw to mount this door limit switch. Larger screws may damage the switch and void the warranty.
- ❖ 1 year parts warranty for all switches

Washdown Roller Switch (99-270)

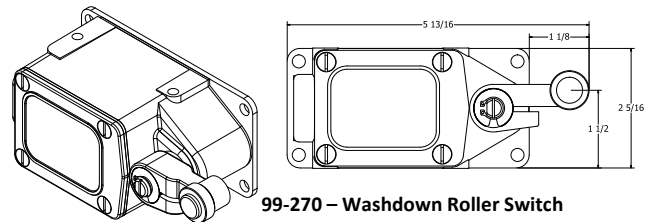
- ❖ UR (UL Recognized) and rated for NEMA4X/IP55

Explosion Resistant Roller Switch (99-016)

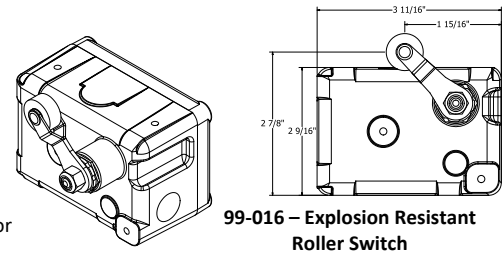
- ❖ UR (UL Recognized) and rated for NEMA 7 & 9 (Class 1, Division 1, Group D)



99-014 – Combination Plunger/Roller Switch



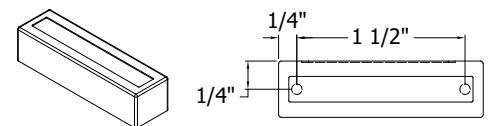
99-270 – Washdown Roller Switch



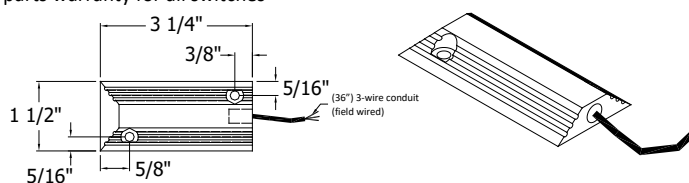
99-016 – Explosion Resistant Roller Switch

Magnetic Switch Features:

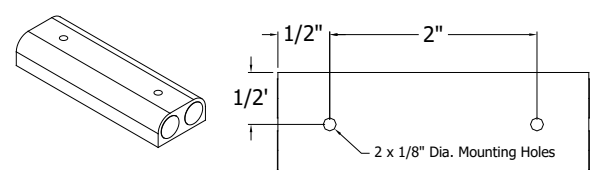
- ❖ UR (UL Recognized) and rated for NEMA 1 applications (field installed by others)
- ❖ Used to enable automatic control of air curtain(s): turns air curtain on when door opens and off when door closes
- ❖ Typical applications for each switch:
 - 99-018: for neat trim and finish in commercial applications
 - 99-125: for heavy duty industrial applications
 - 99-124: for roll-up doors with forklift traffic
- ❖ A [Motor Control Panel \(MCP\)](#) or [solid state controller](#) is required for use with all magnetic door switches (except for electric heated air curtain)
 - For 99-018, MCP-24V adder is required for use with MCP
- ❖ Single pole (1P) switch with normally closed (NC) and normally open (NO) contacts
- ❖ Maximum acceptable gap of 1/8" distance (commercial) or 1/2" (industrial) between magnets to activate switch
- ❖ Lightweight and easy to install
- ❖ 1 year parts warranty for all switches



99-018 – Commercial Surface Mounted Magnetic Switch



99-124 – Industrial Floor Mounted Magnetic



99-125 – Industrial Surface Mounted Magnetic Switch

NOTE: MARS AIR SYSTEMS, LLC reserves the right to change specifications and product design without notice. Such revisions do not entitle the buyer to corresponding changes, improvements, additions, or replacements for previously purchased equipment.