

Air Cylinder CDS1 Series

ø125, ø140, ø160, ø180, ø200

How to Order

With auto switch CDS1 **L** **160** - **300** - **M9BW**

With auto switch (Built-in magnet)

Mounting

B	Basic type
L	Foot type
F	Rod side flange type
G	Head side flange type
C	Single clevis type
D	Double clevis type
T	Center trunnion type

Type

Nil	Lube
N	Non-lube
H	Air-hydro

Bore size

Lube, Non-lube		Air-hydro	
125	125 mm	125	125 mm
140	140 mm	140	140 mm
160	160 mm	160	160 mm
180	180 mm		
200	200 mm		

Port thread type

Nil	Rc
TN	NPT
TF	G

Number of auto switches

Nil	2 pcs.
3	3 pcs.
S	1 pc.
n	"n" pcs.

Auto switch

Nil	Without auto switch
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* Refer to the table below for the applicable auto switch model.

Suffix for cylinder

Rod boot	J	Nylon tarpaulin
Cushion	K	Heat resistant tarpaulin
	N	Without cushion
	R	With cushion in rod side
	H	With cushion in head side
	Nil	With cushion in both sides (Air-hydro type has no cushion.)

* If specifying more than one symbol, indicate them alphabetically.

* * Air-hydro type has no cushion. No symbol indicates no cushion.

Built-in Magnet Cylinder Model

If a built-in magnet cylinder without auto switch is required, there is no need to enter the symbol for auto switch.

Example) CDS1B125-200

Cylinder stroke (mm)

(Refer to Maximum Stroke on page 536.)

Applicable Auto Switches/Refer to pages 1575 to 1701 for further information on auto switches.

Type	Special function	Electrical entry	Indicator light	Wiring (Output)	Load voltage		Auto switch model		Lead wire length (m)				Pre-wired connector	Applicable load						
					DC	AC	Tie-rod mounting	Band mounting	0.5 (Nil)	1 (M)	3 (L)	5 (Z)								
Solid state auto switch	—	Grommet	Yes	3-wire (NPN)	24 V	5 V, 12 V	—	M9N	●	●	●	○	○	IC circuit	Relay, PLC					
				3-wire (PNP)				M9P	●	●	●	○	○							
		2-wire		M9B	●	●	●	○	○	○	—									
		Terminal conduit		3-wire (NPN)	24 V	5 V, 12 V	—	—	G39	—	—	—	—	—		IC circuit				
	2-wire	K39	—	—				—	—	—	—	—								
	Diagnostic indication (2-color indicator)	Grommet	Yes	3-wire (NPN)	24 V	5 V, 12 V	—	M9NW	●	●	●	○	○	IC circuit						
				3-wire (PNP)				M9PW	●	●	●	○	○	—						
	Water resistant (2-color indicator)	Grommet	Yes	3-wire (NPN)	24 V	5 V, 12 V	—	M9NA ^{*1}	—	○	○	●	○	○		IC circuit				
				3-wire (PNP)				M9PA ^{*1}	—	○	○	●	○	○		—				
	With diagnostic output (2-color indicator) Magnetic field resistant (2-color indicator)	Grommet	Yes	2-wire	24 V	12 V	—	M9BW	●	●	●	○	○	—						
3-wire (NPN)				M9NA ^{*1}				—	○	○	●	○	○	—						
3-wire (PNP)				M9PA ^{*1}				—	○	○	●	○	○	—						
4-wire (NPN)				F59F				—	○	○	●	○	○	IC circuit						
Reed auto switch	—	Grommet	Yes	3-wire (NPN equivalent)	24 V	5 V	—	A96	—	●	—	●	—	IC circuit	Relay, PLC					
				2-wire				A93	—	●	●	●	—	—		—				
		Terminal conduit		Yes	No/Yes/No	2-wire	24 V	12 V	100 V	A90	—	●	—	●		—	IC circuit			
										100 V or less	A90	—	●	—		●	—	—	—	
		DIN terminal		Yes	No/Yes/No	2-wire	24 V	12 V	100 V, 200 V	A54	—	●	—	●		—	—			
										200 V or less	A64	—	●	—		●	—	—	—	
		Diagnostic indication (2-color indicator)		Grommet	Yes	No/Yes/No	2-wire	24 V	100 V, 200 V	—	A33	—	—	—		—	—	PLC		
										—	A34	—	—	—		—	—	—	—	
										—	A44	—	—	—		—	—	—	—	Relay, PLC
										—	A59W	—	●	—		●	—	—	—	

*1 Water resistant type auto switches can be mounted on the above models, but in such case SMC cannot guarantee water resistance. Consult with SMC regarding water resistant types with the above model numbers.

* Lead wire length symbols: 0.5 m Nil (Example) M9NW (Example) M9NWM
1 m M (Example) M9NWL (Example) M9NWL
3 m L (Example) M9NWL (Example) M9NWL
5 m Z (Example) M9NWL

* Solid state auto switches marked with "○" are produced upon receipt of order.

* Since there are other applicable auto switches than listed above, refer to page 563 for details.

* For details about auto switches with pre-wired connector, refer to pages 1648 and 1649.

* D-A9□/M9□/M9□/W9□/A/P3DWA□ auto switches are shipped together (not assembled). (Only auto switch mounting brackets are assembled before shipped.)

CJ1
CJP
CJ2
JCM
CM2
CM3
CG1
CG3
JMB
MB
MB1
CA2
CS1
CS2

D-□
-X□
Technical Data