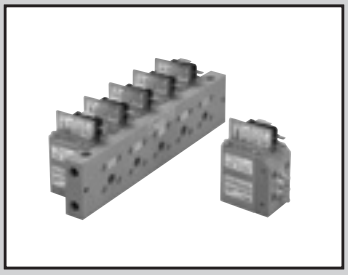
Discontinue



Fine level switch

KML50 Series

Level detector that boasts detection precision of ±1 mm and excellent installability

Specifications

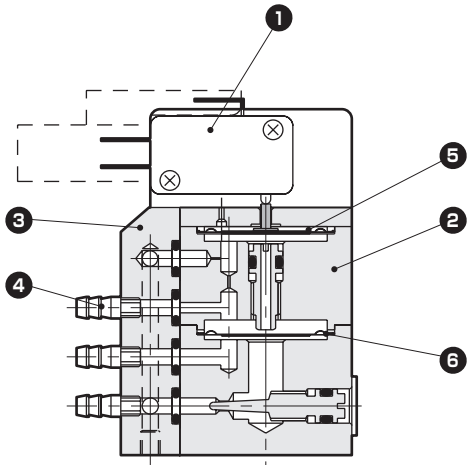
Item			KML50-0A-$^{A}_{B}$	KML50-1$^{B}_{C}$-$^{A}_{B}$	KML50-2$^{B}_{C}$-$^{A}_{B}$
Working fluid			Air, N_2		
Working pressure		kPa	15 to 35	10 to 30	
Fluid temperature		°C	5 to 60		
Ambient temperature		°C	15 to 40	5 to 60	
Proof pressure		kPa	50		
Detection water level		mm	8 to 100	1 to 600	
Contact capacity	A type		3 A 125 V / 250 VAC resistance load (micro switch)		
	B type		0.25 A 100 VDC resistance load (reed switch)		
Switching water level	Switching point		8 to 12 (*1)	8 to 12 (*1)	1 to 3 (*1)
	Hysteresis		5 or less (*1)	2 or less (*1)	2 or less (*1)
Repeatability		mm	±1		
Response time		ms	200 or less (detection flow rate 75cm^3/min (ANR), detection tube I.D. ø4 mm, length 2 m)		
Detection tube I.D.		ø mm	4		
Detection tube length		m	Within 2		
Air consumption		cm^3/min(ANR)	750 or less (at supply pressure of 20 kPa)		
Weight		kg	0.19	KML50-1B-* 0.27	KML50-2B-* 0.27
				KML50-1C-* 0.19	KML50-2C-* 0.19

*1: The above specifications are values obtained at supply pressure 20 kPa (ambient temperature: 24 ±2°C). Be sure to use supply pressure with a high degree of cleanliness. Value obtained with measured water.
*2: Micro switch is C contact and reed switch is A contact.

Safety precautions

1. Install the switch at a position higher than the liquid level to be detected.
2. Use pneumatic pressure with dust and oil filtered out through a submicron filter and micro alescer.
3. Use a low-pressure regulator with oil-free processing.
4. Water or a fluid of similar viscosity is used to adjust before shipping.
5. Use piping with a ø4 mm bore for detection. Do not install anything that will create resistance, such as a throttle, in the middle of the piping.
6. Eight P/S ports are provided on the manifold. Perform masking for piping ports that are not used.
7. Detection in sealed liquid tanks and similar liquid tanks is not possible.
8. Applying a pressure of 50 kPa or more to the PS port may cause damage. Gradually raise the pressure from 0.
9. With the switch section facing up, install at a position higher than the liquid level.
10. The needle is adjusted before shipping and should not be readjusted.
11. If the EXH port is blocked, excess pressure may be applied inside the product which may cause damage, so be sure to leave the EXH port open.
12. Do not stop supplying the supply gas if corrosive gas may enter from the detection tube. The switch protects the detection part from corrosive gas by discharging the detection gas from the detection tube.
13. This product cannot be used in an atmosphere where chemical liquid is present.

Internal structure and parts list

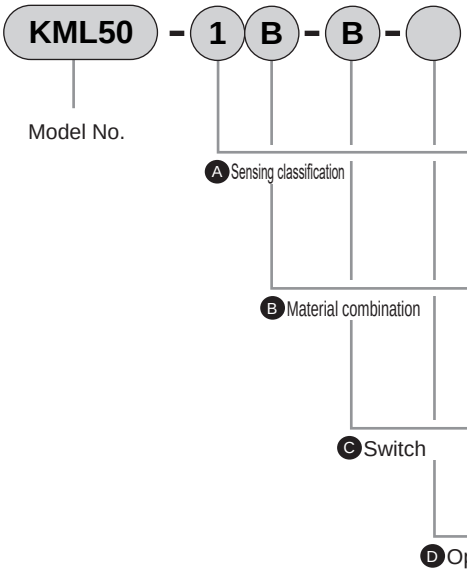


Part number	Part name	Material (by material combination)		
		A	B	C
1	Micro switch	-		
2	Body	PVC	A + 6063	PVC
3	Manifold	PVC	A + 6063	PVC
4	Nipple	SUS304		
5	Diaphragm A	U		
6	Diaphragm B	PTFE	U	U

Always read the precautions on Intro Pages 9 to 18 before use.

How to order

●Single unit



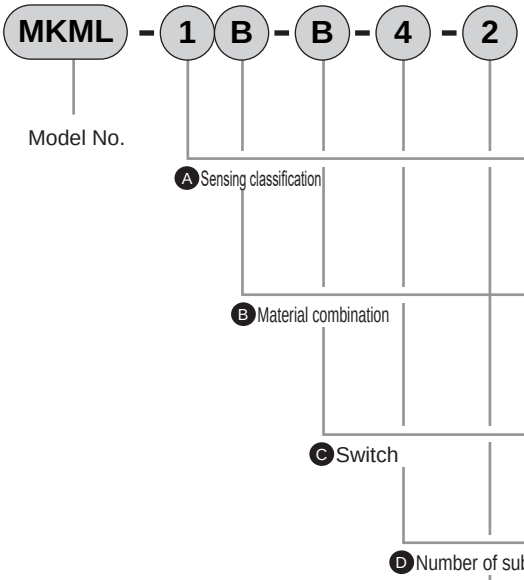
Code	Description	
A Sensing classification	Switching point	Hysteresis
0 (*1)	8 to 12	5
1 (*1)	8 to 12	2
2 (*1)	1 to 3	2

B Material combination	Body	Diaphragm
A	PVC	PTFE
B	A + 6063	U (Urethane)
C	PVC	U (Urethane)

C Switch	
A	Micro switch (C contact)
B	Reed switch (A contact)

D Option	
Blank	Single unit
0	Single unit for manifold

●Manifold



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B Material combination	Body	Diaphragm
A	PVC	PTFE
B	A + 6063	U (Urethane)
C	PVC	U (Urethane)

C Switch	
A	Micro switch (C contact)
B	Reed switch (A contact)

D Number of sub-plates	
1	1 stations
2	2 stations
3	3 stations
4	4 stations
5	5 stations

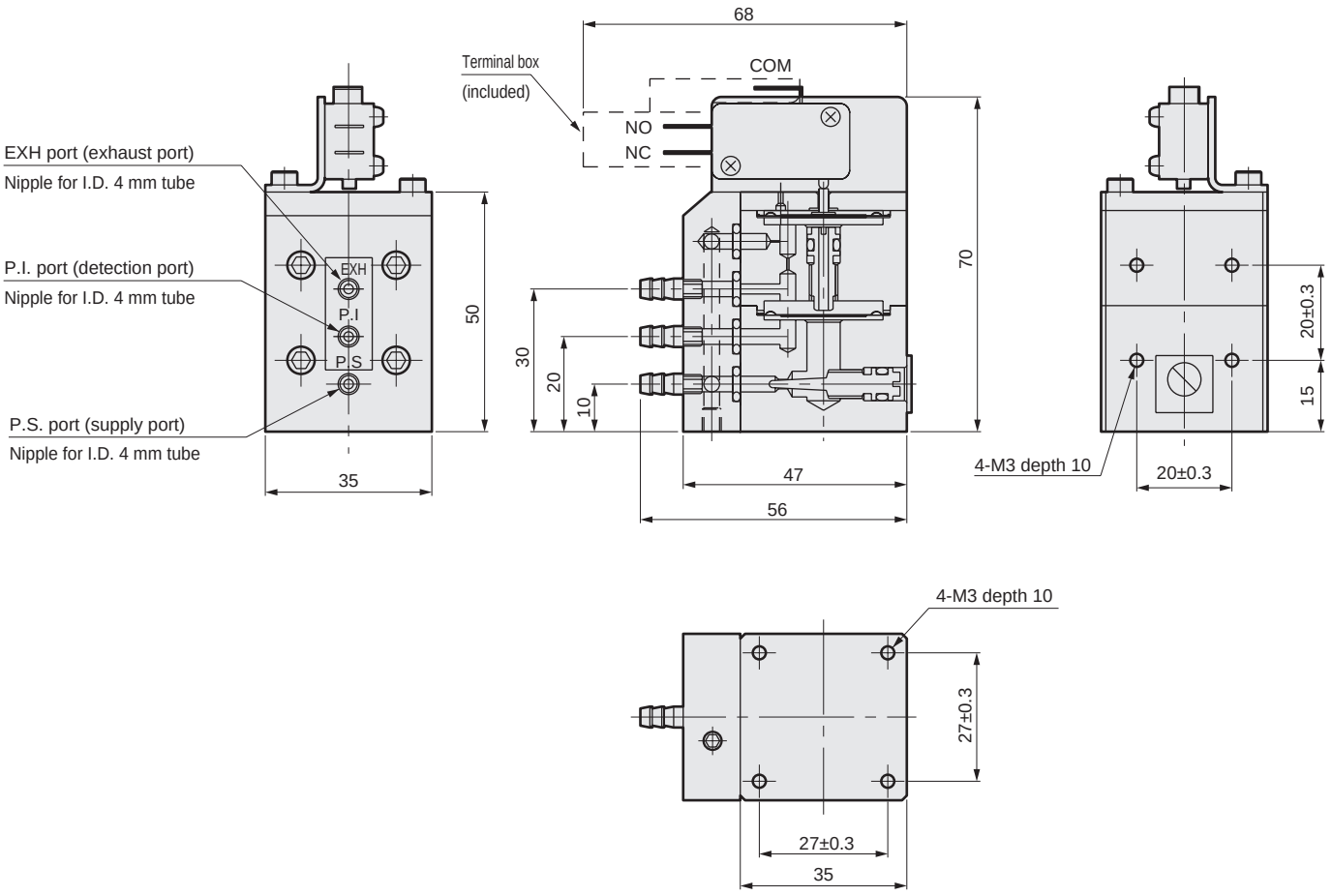
E Masking count	
0	No masking
1	1 mounted
2	2 mounted
3	3 mounted
4	4 mounted

Precautions for model No. selection

*1: When Item A is 0, only A is available for Item B. When Item A is 1 or 2, only B/C are available for Item B.

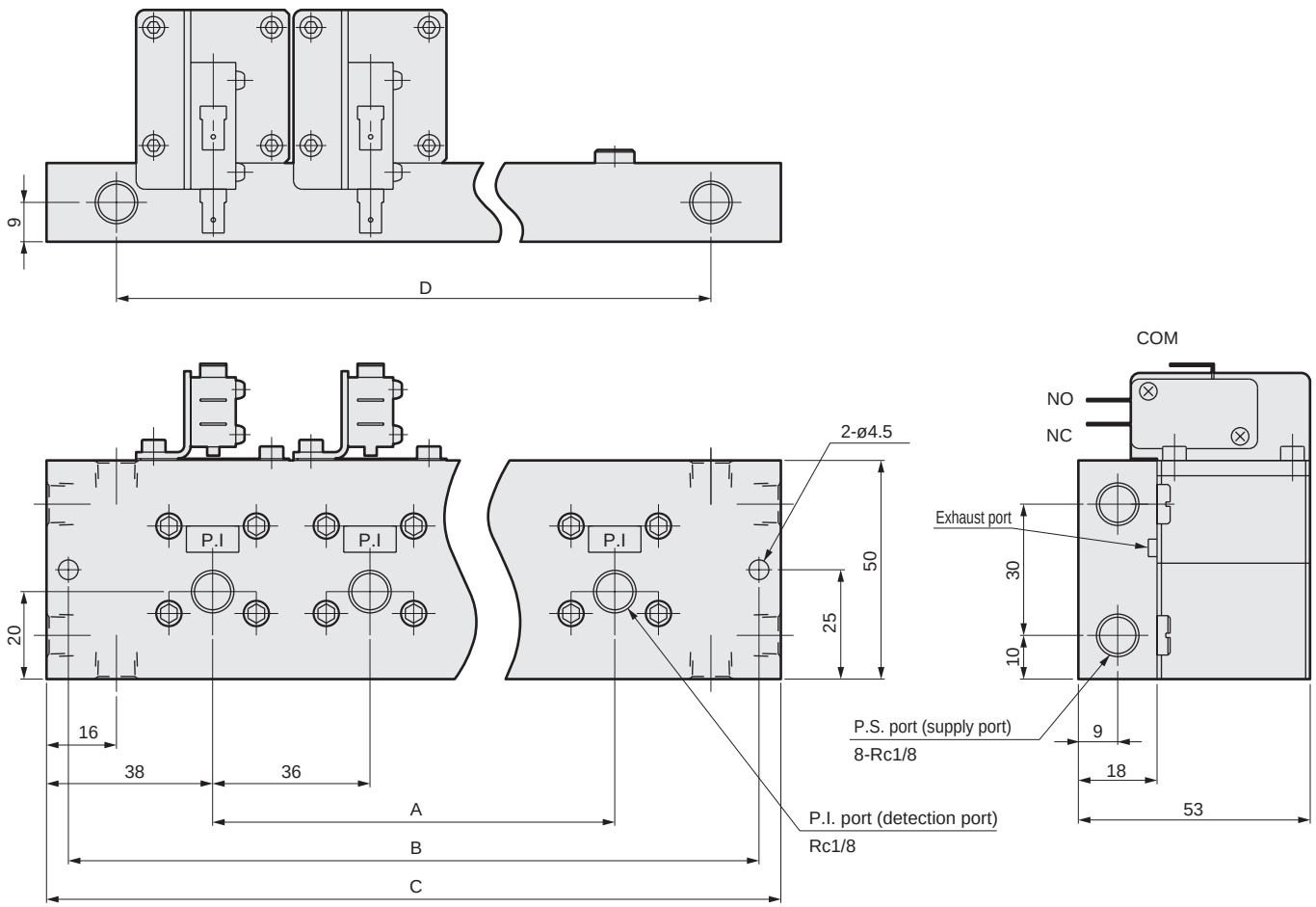
Dimensions

● KML50-0A-A



Dimensions

● MKML-0A-A-*-* (Manifold)



Number of sub-plates	A	B	C	D
1	-	66	76	44
2	36	102	112	80
3	72	138	148	116
4	108	174	184	152
5	144	210	220	188