

Residual pressure exhaust valve with spool position detection

# SNS Series

● Port size: Rc3/8, Rc1/2, G1/2, NPT3/8, NPT1/2

as standard  
P4 compliant

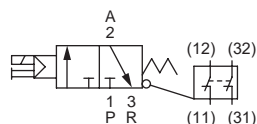


## Common specifications

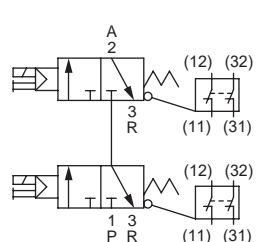
Item	Description
Valve type and operation	Pilot operated soft spool valve
Working fluid	Compressed air
Max. working pressure MPa	0.7
Min. working pressure MPa	0.2 (For internal pilot specifications) 0 (For external pilot specifications)
External pilot pressure MPa	0.2 to 0.7
Proof pressure MPa	1.05
Ambient temperature °C	-5 to 55 (no freezing)
Fluid temperature °C	5 to 55
Manual override	Non-locking/locking common (Standard)
Lubrication *1	Not required
Degree of protection *2	Dust proof/water jet proof (IP65)
Vibration resistance m/s <sup>2</sup>	50 or less
Shock resistance m/s <sup>2</sup>	300 or less
Atmosphere	Cannot be used in corrosive gas environments
Maximum operating frequency	30 cycles/min.
Minimum operating frequency	1 cycle/week

## JIS symbol

● 1 stations



● 2 stations



## Electrical specifications

Item	Description
Rated voltage V	24 DC
Voltage fluctuation range	±10%
Holding current A	0.042
Power consumption W	1.0
Thermal class	B
Surge suppressor	Varistor
Indicator	LED

## Individual specifications

Item	Description
Port size	Port P/A Rc3/8, Rc1/2, G1/2, NPT3/8, NPT1/2
	Port R Rc3/8, G3/8, NPT3/8

\*1. Use turbine oil Class 1 ISO VG32 for lubrication. Excessive or intermittent lubrication results in unstable operation.

\*2. Use the specified outer diameter of the cord and tightening torque for fixing. Do not use this product in environments where it will be constantly exposed to water or oil. IP65(IEC60529/IEC529:1989-11) Tested according to standards

\*3. For the working pressure, refer to "Pneumatic, Vacuum and Auxiliary Components (Catalog No. CB-024SA).

\*4. The pilot exhaust is released to the atmosphere. No port processing is performed.

## Weight

Unit: kg

Item		Weight
1 stations	With safety limit switch	Pg13.5 0.7
		M12-4P connector 0.7
	Without switch	0.6
2 stations	With safety limit switch	Pg13.5 1.2
	M12-4P connector	1.2

## Flow characteristics

Model No.	Station No.	P→A	A→R
		C(dm <sup>3</sup> /(s·bar))	
SNS	1 station	13	14
	2 stations	10	14

## Limit switch specifications

Item	Limit switch specifications	
Manufacturer model	D4N-1B31 (OMRON)	D4N-9B31 (OMRON)
Terminal	Pg13.5	M12-4P connector
Contact resistance	25 mΩ or less	
Minimum applicable load	5 VDC 1 mA resistance load	
Rated insulation voltage V	300	
Insulation resistance MΩ	100	
Electric shock protection class	Class II	
Pollution degree (working environment)	3 (EN60947-5-1)	
Conditional short-circuit current A	100	

\* Refer to the manufacturer's catalog for details.

### Compatibility table by variation

	SNS
Port size	3/8, 1/2
P4	●

●: Applicable models ○: Semi-applicable models ▲: Contact CKD for details. □: Not applicable

### How to order

**SNS - 2 - 15A - M B L K S - 3**

Model No.

Ⓐ Station No.

Ⓑ Port size

Ⓒ Manual override

Ⓓ Electrical connections

Ⓔ Safety limit switch

Ⓕ Pilot operated

Ⓖ Flow direction option

Ⓗ Silencer

Ⓘ Voltage



### Precautions for model No. selection

\*1: Ⓐ Available only when Station No. is "1". \* Not compliant with safety standards.

\*2: Ⓐ Available only when Station No. is "1".

\*3: Ⓑ Available only when Port size is 10A or 15A.

### [Example of model No.]

#### SNS-2-15A-MBLKS-3

Model No.	: SNS
Ⓐ Station No.	: 2 stations
Ⓑ Port size	: Rc1/2
Ⓒ Manual override	: Non-locking manual override
Ⓓ Electrical connections	: DIN terminal box (Pg7) with surge suppressor/lamp
Ⓔ Safety limit switch	: Pg13.5 (D4N-1B31: OMRON)
Ⓕ Pilot operated	: External pilot
Ⓖ Flow direction option	: Standard flow (left → right)
Ⓗ Silencer	: Silencer (SLW-10L) included
Ⓘ Voltage	: 24 VDC

Code	Description
<b>Ⓐ Station No.</b>	
1	1 station
2	2 stations
<b>Ⓑ Port size</b>	
10A	Rc3/8
15A	Rc1/2
15G	G1/2
10N	NPT3/8
15N	NPT1/2
<b>Ⓒ Manual override</b>	
Blank	Manual override of non-locking/locking common
M	Non-locking manual override
<b>Ⓓ Electrical connections</b>	
B	DIN terminal box (Pg7) with surge suppressor/lamp
BN	DIN terminal box (Pg7) (without terminal box) With surge suppressor
<b>Ⓔ Safety limit switch</b>	
Blank	Without switch (*1)
L	Pg13.5 (D4N-1B31: OMRON)
M	M12-4P connector (D4N-9B31: OMRON)
<b>Ⓕ Pilot operated</b>	
Blank	Internal pilot
K	External pilot
<b>Ⓖ Flow direction option</b>	
Blank	Standard flow (left → right)
X1	Reverse flow (right → left) (*2)
<b>Ⓗ Silencer</b>	
Blank	None
S	Silencer (SLW-10L) included (*3)
<b>Ⓘ Voltage</b>	
3	24 VDC

**P4**  
Series

Pneumatic actuator  
Pneumatic cylinder  
Hand/Chuck  
Related products  
Cylinder Switch

Vacuum components

Pneumatic valves

Clean air components  
Speed controller

Pneumatic auxiliary components  
Fitting  
Auxiliary valve

Silencer  
Tube

Gas generator

Fluid control components

Electric actuator  
Motor specification  
Motorless specifications