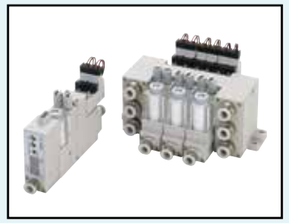


Ejector System/20 mm Width Integrated Type Vacuum Ejector Unit

VSJ Series

RoHS

Integrated type vacuum ejector unit with abundant variations such as break air flow rate & pressure adjustment needle

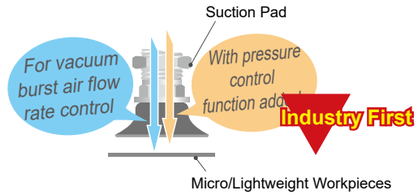
Abundant vacuum characteristic variations

Nozzle Diameter \ Vacuum Characteristics	Suction Flow Rate (L/min (ANR))			Air Consumption (L/min (ANR))			Ultimate Vacuum Pressure (-kPa)		
	H	L	E	H	L	E	H	L	E
0.5 mm	7	12		11.5			90.4	66.5	
0.7 mm	13	26	10.5	23		17	93.1	66.5	90.4
1.0 mm	27	40	21	46		34	93.1	66.5	90.4
1.2 mm	38		27	70		47	93.1		90.4

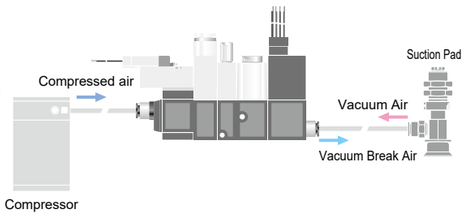
* Rated supply pressure; H, L⇒0.5 MPa, E⇒0.35 MPa

Adds pressure control to conventional vacuum break air flow control

Prevents workpiece blow-off.



Relief function in vacuum break circuit (Function to release excess pressure) is provided, achieving shorter vacuum break time.



3 types of vacuum generation valves available (Normally Closed, Normally Open, Self-holding)

Self-holding (double solenoid valve) is optimal for applications involving long-duration vacuum generation and supports energy saving.

Manifold type also available (max. 10 stations)

2 types of output port piping outlets available: front and back.

LED display adopted for pressure sensor display, improving visibility.

2 types available: with 2-point switch output and with analog output.
Also, connector system adopted for wiring, facilitating wiring layout.

Model No. Notation

●20 mm width integrated vacuum ejector unit, discrete

VSJ - H 07 A - 6 6 8 - 3 - W

- VSJ: Model No.
- H: ❶ Vacuum Characteristics
- 07: ❷ Nozzle Diameter
- A: ❸ Valve-type
- 6: ❹ Vacuum Port (V)
- 6: ❺ Air Supply Port (PS)
- 8: ❻ Exhaust Port (EX)
- 3: ❼ Solenoid Valve Voltage
- W: ❽ Vacuum Pressure Switch Specifications

❶ Vacuum Characteristics

Code	Content
H	High Vacuum/Medium Flow Type
L	Medium Vacuum/High Flow Type
E	High Vacuum/Low Flow Type

Note) The combinations 'E05' and 'L12' for items ❶ and ❷ cannot be selected.

❷ Nozzle Diameter

Code	Content
05	ø0.5
07	ø0.7
10	ø1.0
12	ø1.2

Note) The combinations 'E05' and 'L12' for items ❶ and ❷ cannot be selected.

❸ Valve-type

Code	Content
A	Normally Open Type
B	Normally Closed Type
D	Self-holding Type

❹ Vacuum Port (V)

Code	Content
4	ø4 Push-in fitting
6	ø6 Push-in fitting
8	ø8 Push-in fitting

❺ Air Supply Port (PS)

Code	Content
4	ø4 Push-in fitting
6	ø6 Push-in fitting

❻ Exhaust Port (EX)

Code	Content
S	Atmospheric Release with Silencer
8	*8 Push-in fitting centralized exhaust

❼ Solenoid Valve Voltage

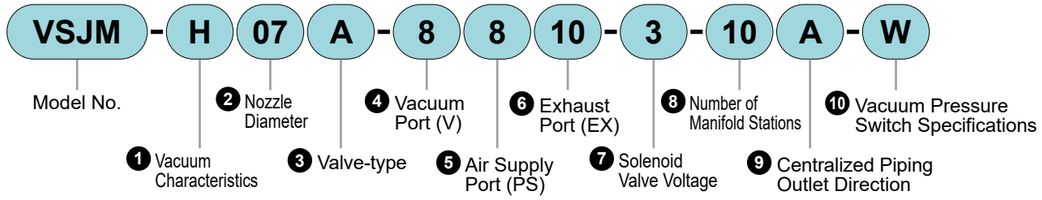
Code	Content
1	100 VAC
3	24 VDC

❽ Vacuum Pressure Switch Specifications

Code	Content
Blank	Without Vacuum Pressure Switch
W	NPN Output 2 points with Digital Display
A	NPN Output 1 point + Analog Output with Digital Display

model No. Indication Method (Manifold Type)

●20 mm width integrated vacuum ejector unit manifold



❶ Vacuum Characteristics

Code	Content
H	High Vacuum/Medium Flow Type
L	Medium Vacuum/High Flow Type
E	High Vacuum/Low Flow Type
Z	For mixed specifications (Provide details in the specification sheet)

Note1) The combinations 'E05' and 'L12' for items ❶ and ❷ cannot be selected.
Note2) When ❶ is 'Z', Nozzle Diameter ❷ is '00' only. When Nozzle Diameter ❷ is '00', ❶ is 'Z' only.
Note3) For mixed specifications, be sure to fill out the "Mixed Manifold Specification Sheet". For details, P. 212, 213.

❷ Nozzle Diameter

Code	Content
05	ø0.5
07	ø0.7
10	ø1.0
12	ø1.2
00	For mixed specifications (Provide details in the specification sheet)

Note1) The combinations 'E05' and 'L12' for items ❶ and ❷ cannot be selected.
Note2) When ❶ is 'Z', Nozzle Diameter ❷ is '00' only. When Nozzle Diameter ❷ is '00', ❶ is 'Z' only.
Note3) For mixed specifications, be sure to fill out the "Mixed Manifold Specification Sheet". For details, P. 212, 213.

❸ Valve-type

Code	Content
A	Normally Open Type
B	Normally Closed Type
D	Self-holding Type
Z	For mixed specifications (Provide details in the specification sheet)

Note) For mixed specifications, be sure to fill out the "Mixed Manifold Specification Sheet". For details, P. 212, 213.

❹ Vacuum Port (V)

Code	Content
4	ø4 Push-in fitting
6	ø6 Push-in fitting
8	ø8 Push-in fitting
CX	For fitting mix (Provide details in the specification sheet)

Note) For mixed specifications, be sure to fill out the "Mixed Manifold Specification Sheet". For details, see P. 212, 213.

❺ Air Supply Port (PS)

Code	Content
6	ø6 Push-in fitting
8	ø8 Push-in fitting
10	ø10 Push-in fitting

❻ Exhaust Port (EX)

Code	Content
S	Atmospheric Release with Silencer
8	ø8 Push-in fitting centralized exhaust
10	ø10 Push-in fitting centralized exhaust

❼ Solenoid Valve Voltage

Code	Content
1	100 VAC
3	24 VDC

❽ Number of Manifold Stations

Code	Content
2	2 stations
to	to
10	10 stations

Note) The number of stations that can operate simultaneously differs depending on the combination of nozzle diameter and port size. Please inquire for details.

❾ Centralized Piping Outlet Direction

Code	Content
A	Vacuum Port Side
B	Supply Port Side

❿ Vacuum Pressure Switch Specifications

Code	Content
Blank	Without Vacuum Pressure Switch
W	NPN Output 2 points with Digital Display
A	NPN Output 1 point + Analog Output with Digital Display
Z	For Mixed Specifications (Provide details in the specification sheet)

Note) For mixed specifications, be sure to fill out the "Mixed Manifold Specification Sheet". For details, P. 212, 213.

Rechargeable Battery Compatible Specification (Catalog No. CC-1226AA)

●Design compatible with rechargeable battery manufacturing process

VSJ -..... - P4*

VSJM -..... - P4*

* Please inquire for details.

Maintenance Part Model No. * For details on the maintenance parts, P. 209.

●Filter element for vacuum side

VSG - E

●Burst side filter element

VSJ - PE

●Silencer Element A

VSB - EA

●Silencer element C

VSJ - EC

Model No.

Specifications

Item	VSJ
Operating Fluid	Air
Operating Pressure MPa	0.3 to 0.7
Ambient Temperature/Fluid Temperature °C	5 to 50

Ejector Characteristics

Model No.	Nozzle Diameter (mm)	Rated Supply Pressure (MPa)	Ultimate Vacuum Pressure (-kPa)	Suction Flow Rate (L/min (ANR))	Air Consumption (L/min (ANR))
VSJ-H05...	0.5	0.5	90.4	7	11.5
VSJ-L05...		0.35	66.5	12	11.5
VSJ-H07...	0.7	0.5	93.1	13	23
VSJ-L07...		0.5	66.5	(24) 26	23
VSJ-E07...		0.35	90.4	10.5	17
VSJ-H10...	1.0	0.5	93.1	27	46
VSJ-L10...		0.5	66.5	(34) 40	46
VSJ-E10...		0.35	90.4	21	34
VSJ-H12...	1.2	0.5	93.1	(32) 38	70
VSJ-E12...		0.35	90.4	(24) 27	47

Note) Values in ( ) are for Vacuum Port: ø4 Push-in fitting.

Valve (for Vacuum Generation, Vacuum Breaking) Specifications

●Pilot solenoid valve

Item	Vacuum Generation Valve		Vacuum Breaking Valve	
Valve-type and Operation Method	Direct acting poppet valve			
Rated Voltage V	24 VDC	100 VAC	24 VDC	100 VAC
Voltage Fluctuation Range V	DC 24 ±10%	AC 100 ±10%	DC 24 ±10%	AC 100 ±10%
Surge Protection Circuit	Varistor	Bridge Diode	Varistor	Bridge Diode
Power Consumption	1.2 W (with LED)	1.5 VA (with LED)	1.2 W (with LED)	1.5 VA (with LED)
Manual Override	Push-type non-locking type			
Operation Indicator	When coil is energized: Red LED lights up			
Wiring Method	Connector (cable length: 500 mm)			
	Red: 24 VDC Black: COM	Blue	Red: 24 VDC Black: COM	Blue

●Main valve

Item	Vacuum Generation Valve		Vacuum Breaking Valve
Valve-type and Operation Method	Pilot operated poppet valve		
Proof Pressure MPa	1.05		
Valve-type	Self-holding, Normally Closed, Normally Open		Normally Closed
Lubrication	Not required		
Effective Area mm²	Air Supply (PS) Port Size	ø4: 3.5	1
		ø6: 5	

Vacuum Pressure Switch with LED Display Specifications

Item		With 2-point Switch Output (-W)	With Analog Output (-A)
Factory Set Value kPa		-50 (SW1), -10 (SW2)	-50
Current Consumption mA		≤ 40	
Pressure Sensing Element		Diffused Semiconductor Pressure Switch	
Working pressure kPa		-100 to 0	
Set Pressure kPa		-99 to 0	
Proof Pressure MPa		0.2	
Storage Temperature °C		-20 to 80 (Atmospheric pressure, ≤ 60% RH humidity)	
Operating Temperature °C		0 to 50 (However, no freezing)	
Operating Humidity		35 to 85% RH (However, no freezing)	
Power Supply Voltage V		DC 12 to 24 ±10% Ripple (P-P) ≤ 10%	
Protection Structure		Equivalent to IEC Standard IP40	
Number of Output Points		2	1
Repeatability		±3% F.S. max (at Ta=25°C)	
Differential		Fixed (≤ 2% F.S. max.)	Variable (Approx. 0 to 15% of set value)
Switch Output		NPN Transistor Open Collector Output ≤ 30 V 80 mA Residual Voltage ≤ 0.8 V	
Analog Output	Output Voltage V	-	1 to 5
	Zero Point Voltage V	-	1±0.1
	Span Voltage V	-	4±0.1
	Output Current mA	-	≤ 1 (Load resistance ≥ 5 kΩ)
	Linearity/Hysteresis	-	±0.5% F.S. max.
Response time ms		2 max.	
Display kPa		-99 to 0 (2-digit Red LED display)	
Display Update Rate		Approx. 4 times/1 second	
Display Accuracy		±3% F.S. ±2 digit	
Resolution		1 digit	
Operation Indicator		SW1: Red LED lights up at or above set pressure	Red LED lights up at or above set pressure
		SW2: Green LED lights up at or above set pressure	
Functions		1. MODE Switch (ME or S1 or S2)	1. MODE Switch (ME or SW)
		2. S1 Setting Trimmer (2/3 turn trimmer)	2. SW Setting Trimmer (2/3 turn trimmer)
		3. S2 Setting Trimmer (2/3 turn trimmer)	3. HYS Setting Trimmer (Approx. 0 to 15% of set value)

Vacuum Breaking Function Specifications

Item	Vacuum Breaking Function
Break Air Flow Rate L/min (ANR)	0 to 50 (at 0.5 MPa supply pressure)
Breaking Air Relief Valve Structure	Elastomer seal, poppet valve
Relief Pressure Setting Range kPa	-25 to 25

Vacuum Filter Specifications

Item		Vacuum Filter
Element Material		Polyvinyl formal
Filtration Rating	μm	10
Filtration area	mm²	1,130

Weight Table

①Single Unit

VSJ		Weight (g)	Remarks
Atmospheric	VSJ-□□□-□□S-□□-□	165	Vacuum Port: ø4, ø6
Release, With Sensor	VSJ-□□□-□8S-□□-□	171	Vacuum Port: ø8
Atmospheric Release,	VSJ-□□□-□□S-□□	156	Vacuum Port: ø4, ø6
Without Sensor	VSJ-□□□-8□S-□□	163	Vacuum Port: ø8
Centralized Exhaust,	VSJ-□□□-□□8-□□-□	169	Vacuum Port: ø4, ø6
With Sensor	VSJ-□□□-8□8-□□-□	176	Vacuum Port: ø8
Centralized Exhaust,	VSJ-□□□-□□8-□□	161	Vacuum Port: ø4, ø6
Without Sensor	VSJ-□□□-8□8-□□	167	Vacuum Port: ø8

②Manifold Intermediate Block

	Weight (g)	Remarks
Manifold Intermediate Block	19	For 1 station

③Manifold Side Block

VSJ	Weight (g)	Remarks
Vacuum Ejector Unit (Atmospheric Release)	118	Number of Cartridges Used: 2 pcs (PS Port) Plugs are attached to PV, EX ports
Vacuum Ejector Unit (Centralized Exhaust)	112	Number of Cartridges Used: 4 pcs (PS, EX Ports) A plug is attached to the PV port

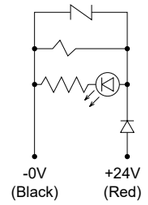
④Cartridge (Input/Exhaust Port)

	Weight (g)	Remarks
Push-in fitting for ø6	12	For ø6 mm
Push-in fitting for ø8	10	For ø8 mm
Push-in fitting for ø10	13	For ø10 mm

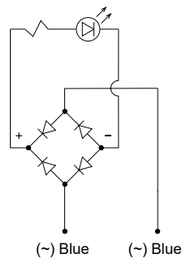
■Calculate the manifold weight using the formula below.
Manifold Weight =(① VSJ Single Unit + ② Manifold Intermediate Block) × Number of stations + ③ Manifold Side Block + ④ Cartridge × Number used

Electrical Circuit (Solenoid Valve)

●24 VDC specification Valve for vacuum generation and vacuum burst

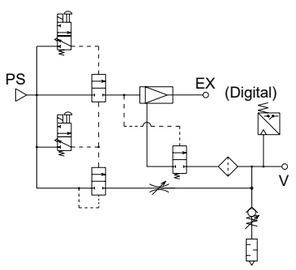


●100 VAC specification Valve for vacuum generation and vacuum burst

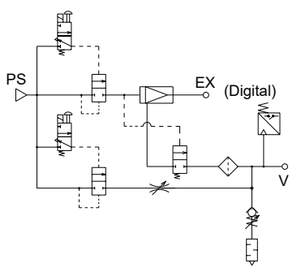


Circuit Diagram

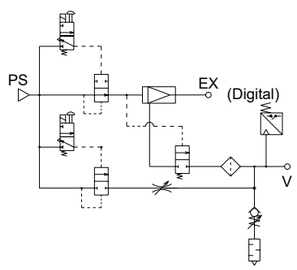
●Self-holding Type



●Normally Closed Type



●Normally Open Type

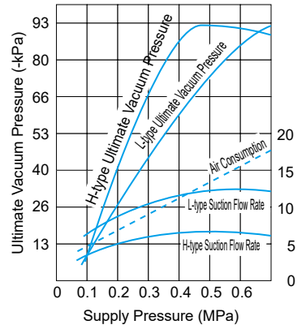


Vacuum Characteristics, Flow Characteristics

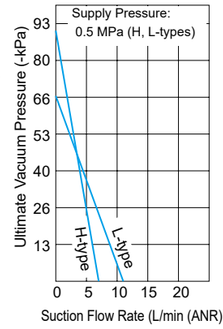
Supply Pressure - Ultimate Vacuum Pressure, Suction Flow Rate, Air Consumption

●VSJ-H 05, VSJ-L 05

Vacuum Characteristics

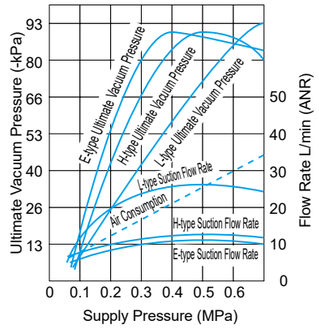


Flow Characteristics

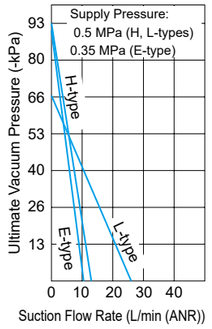


●VSJ-H 07, VSJ-L 07, VSJ-E 07

Vacuum Characteristics

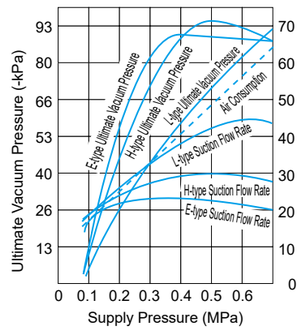


Flow Characteristics

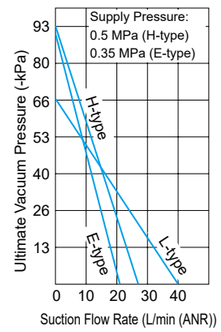


●VSJ-H 10, VSJ-L 10, VSJ-E 10

Vacuum Characteristics

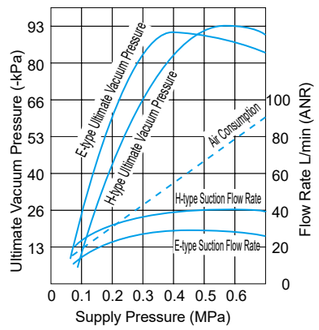


Flow Characteristics

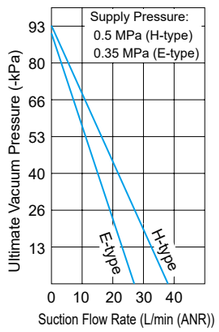


●VSJ-H 12, VSJ-E 12

Vacuum Characteristics



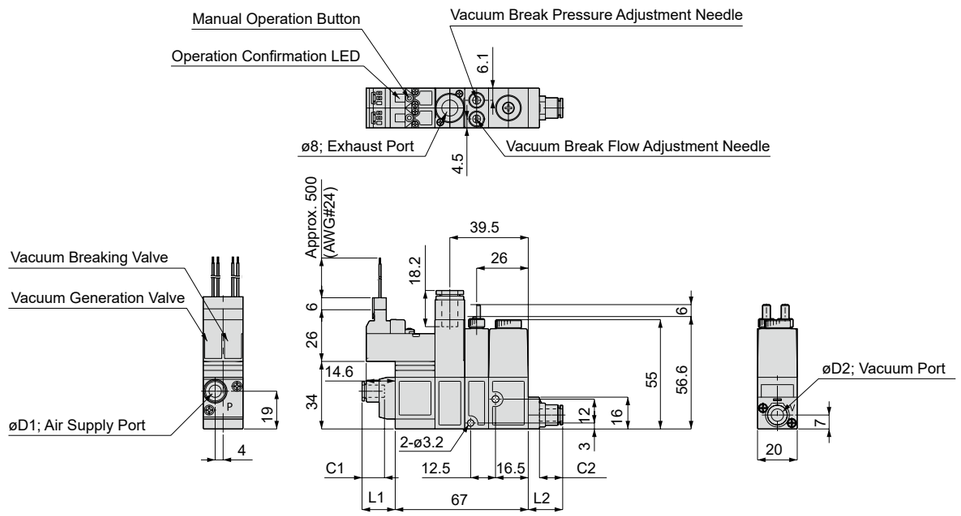
Flow Characteristics



1. The supply pressure in the characteristics above is during vacuum generation.
2. Abnormal noise (gurgling sound) may occur at a supply pressure slightly below the peak ultimate vacuum pressure in the characteristics above. In this state with abnormal noise, characteristics are unstable and noise level increases. Also, it may affect sensors, etc., causing trouble, so reset the supply pressure.
   (Ex. 1: For an H-type vacuum ejector with source pressure 0.5 MPa, during ejector operation, the supply pressure drops to 0.43 MPa due to pressure drop, causing abnormal noise.) → Reset the supply pressure during ejector operation to 0.5 MPa.)
3. Select piping or equipment using an effective cross-sectional area approximately 3 times the nozzle diameter cross-sectional area as a guideline. If sufficient supply air flow rate is not secured, satisfactory vacuum characteristics cannot be obtained.
   (Gurgling sound occurs even at the set pressure. Insufficient suction flow rate, failure to reach ultimate vacuum pressure, etc.)
   (Ex. 2: For an H-type vacuum ejector, abnormal noise occurs even though the pressure during ejector operation is 0.5 MPa.) → Insufficient supply air flow rate. (Supply air flow rate is restricted before the vacuum ejector due to piping resistance, etc., preventing the supply air flow rate required for satisfactory characteristics from being obtained.) → Select a pipe components that can secure the required effective cross-sectional area.))
   (Ex. 3: For a vacuum ejector with a 1.0 mm nozzle diameter, cross-sectional area $0.5^2 \times \pi = 0.785\ mm^2 \times 3 = 2.35\ mm^2$. Therefore, select piping and equipment to secure an effective cross-sectional area of 2.3 mm² or more.)

External Dimensions Diagram (Single Unit Type VSJ)

●Common exhaust, without vacuum pressure switch



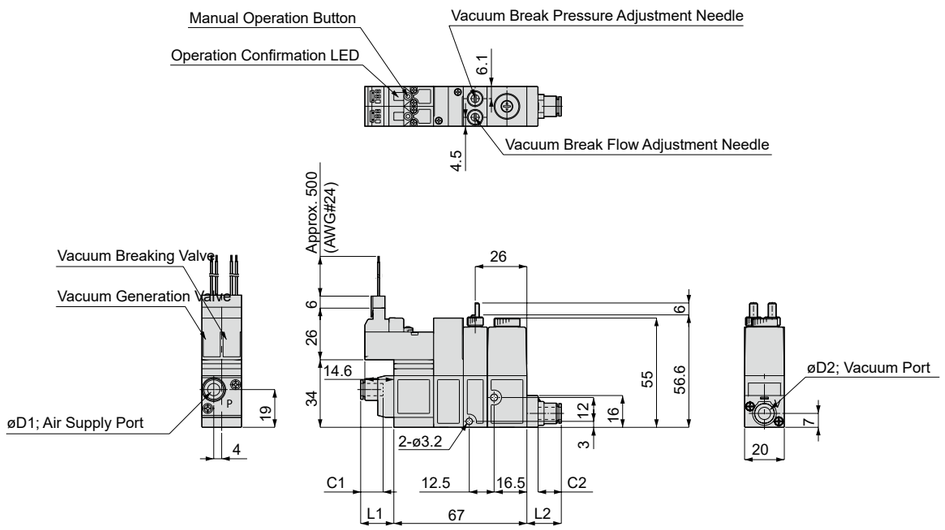
Unit: mm

Air Supply Port Bore size øD1	C1	L1
4	11.5	14.9
6	11.9	17.3

Unit: mm

Vacuum port Bore size øD2	C2	L2
4	11.2	14.6
6	11.9	17.4
8	18.2	25.8

●Atmospheric release, without vacuum pressure switch



Unit: mm

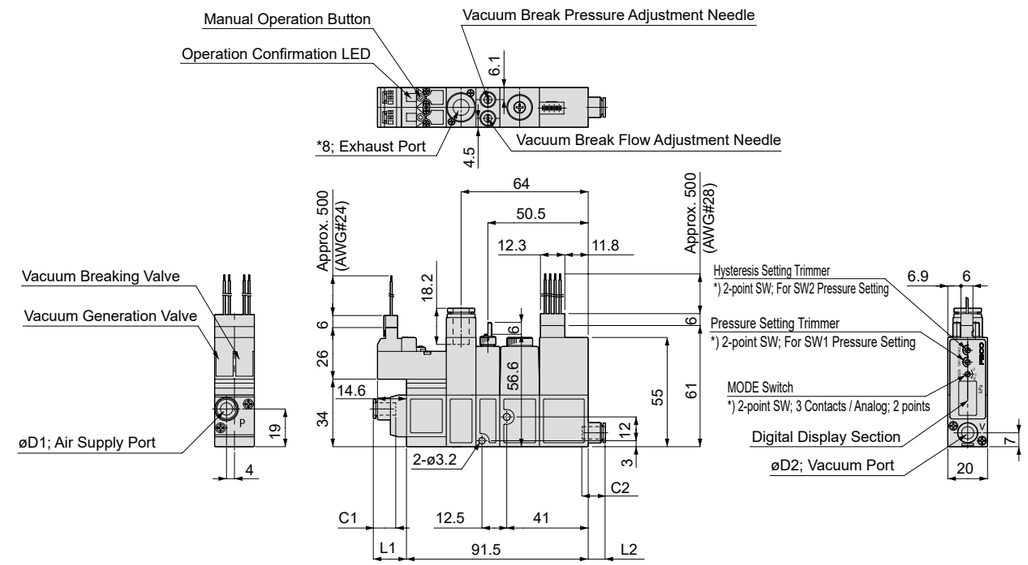
Air Supply Port Bore size øD1	C1	L1
4	11.5	14.9
6	11.9	17.3

Unit: mm

Vacuum port Bore size øD2	C2	L2
4	11.2	14.6
6	11.9	17.4
8	18.2	25.8

External Dimensions Diagram (Single Unit Type VSJ)

●Common exhaust, with vacuum pressure switch



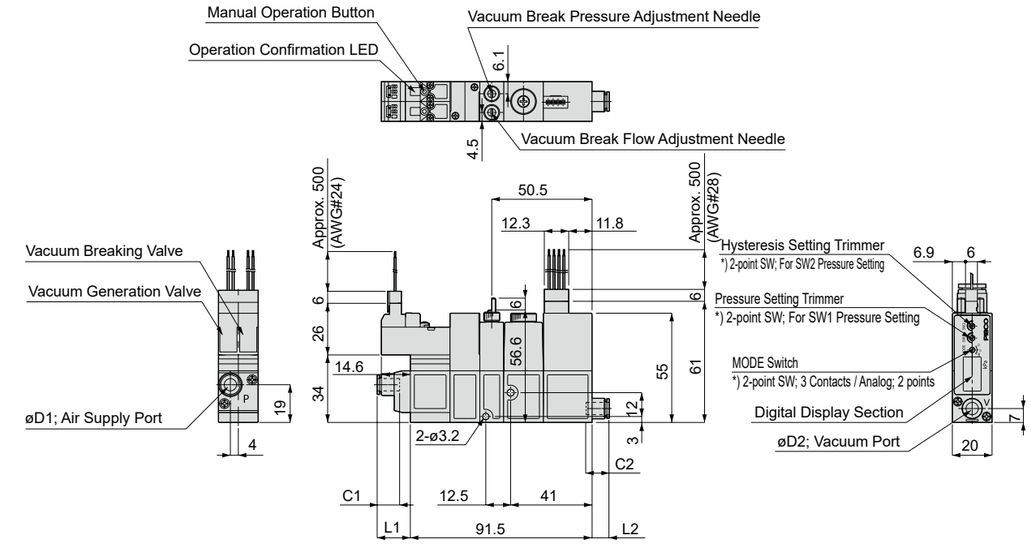
Unit: mm

Air Supply Port Bore size øD1	C1	L1
4	11.5	14.9
6	11.9	17.3

Unit: mm

Vacuum port Bore size øD2	C2	L2
4	11.2	6.1
6	11.9	8.9
8	18.2	17.3

●Atmospheric release, with vacuum pressure switch



Unit: mm

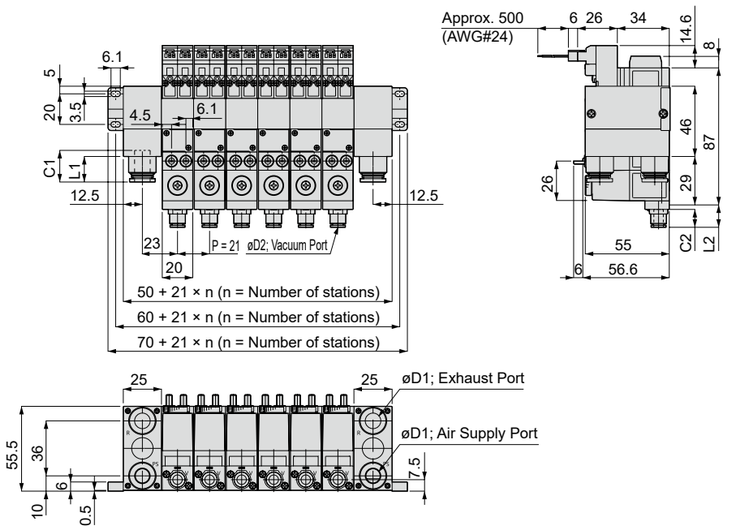
Air Supply Port Bore size øD1	C1	L1
4	11.5	14.9
6	11.9	17.3

Unit: mm

Vacuum port Bore size øD2	C2	L2
4	11.2	6.1
6	11.9	8.9
8	18.2	17.3

External Dimensions Diagram (Manifold Type VSJM)

●Common exhaust, common piping leadout direction on vacuum port side, without vacuum pressure switch



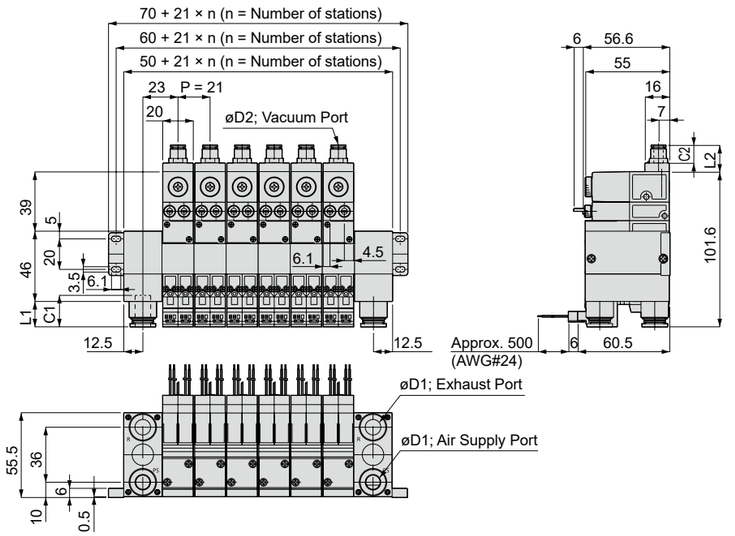
Unit: mm

Air Supply Port Bore size øD1	C1	L1
6	17	11.6
8	18.2	13.1
10	20.7	16.7

Unit: mm

Vacuum port Bore size øD2	C2	L2
4	11.2	14.6
6	11.9	17.4
8	18.2	23.0

●Common exhaust, common piping leadout direction on supply port side, without vacuum pressure switch



Unit: mm

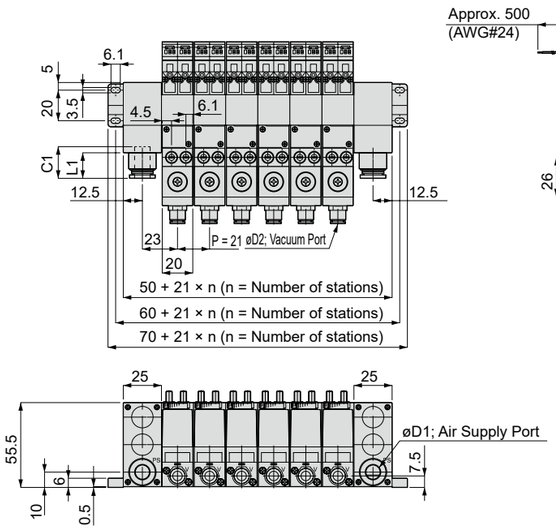
Air Supply Port Bore size øD1	C1	L1
6	17	11.6
8	18.2	13.1
10	20.7	16.7

Unit: mm

Vacuum port Bore size øD2	C2	L2
4	11.2	14.6
6	11.9	17.4
8	18.2	23.0

External Dimensions Diagram (Manifold Type VSJM)

●Atmospheric release, common piping leadout direction on vacuum port side, without vacuum pressure switch



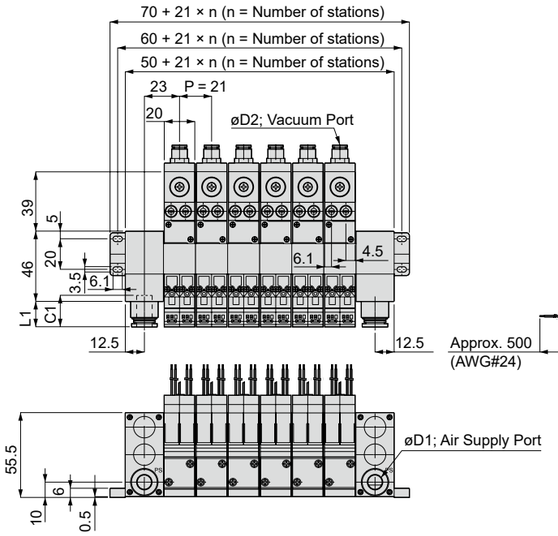
Unit: mm

Air Supply Port Bore size øD1	C1	L1
6	17	11.6
8	18.2	13.1
10	20.7	16.7

Unit: mm

Vacuum port Bore size øD2	C2	L2
4	11.2	14.6
6	11.9	17.4
8	18.2	23.0

●Atmospheric release, common piping leadout direction on supply port side, without vacuum pressure switch



Unit: mm

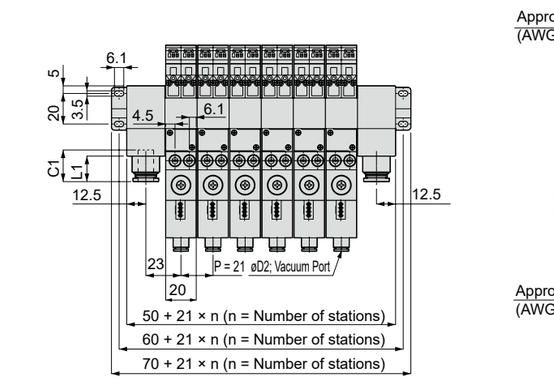
Air Supply Port Bore size øD1	C1	L1
6	17	11.6
8	18.2	13.1
10	20.7	16.7

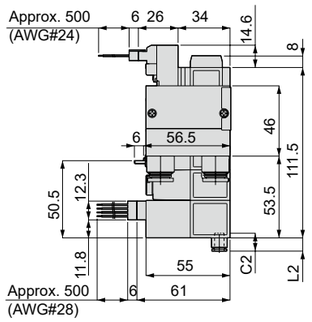
Unit: mm

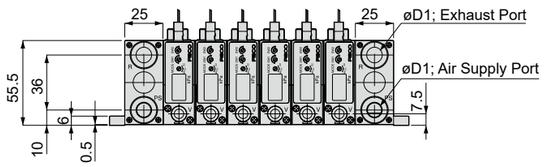
Vacuum port Bore size øD2	C2	L2
4	11.2	14.6
6	11.9	17.4
8	18.2	23.0

External Dimensions Diagram (Manifold Type VSJM)

●Common exhaust, common piping leadout direction on vacuum port side, with vacuum pressure switch







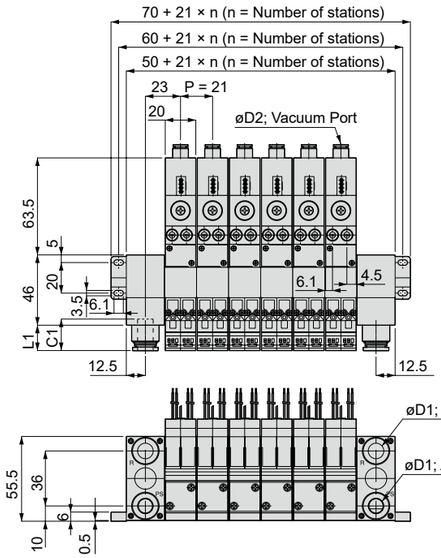
Unit: mm

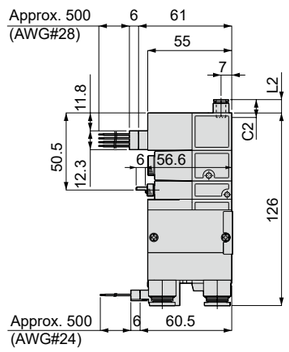
Air Supply Port Bore size øD1	C1	L1
6	17	11.6
8	18.2	13.1
10	20.7	16.7

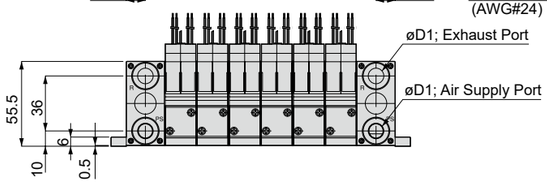
Unit: mm

Vacuum port Bore size øD2	C2	L2
4	11.2	6.1
6	11.9	8.9
8	18.2	17.3

●Common exhaust, common piping leadout direction on supply port side, with vacuum pressure switch







Unit: mm

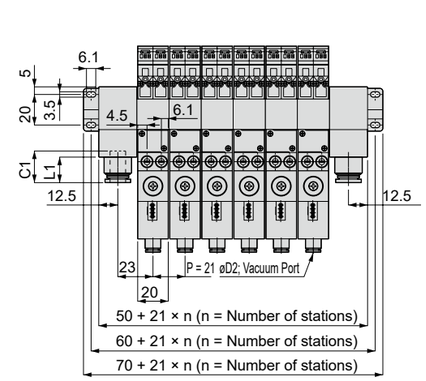
Air Supply Port Bore size øD1	C1	L1
6	17	11.6
8	18.2	13.1
10	20.7	16.7

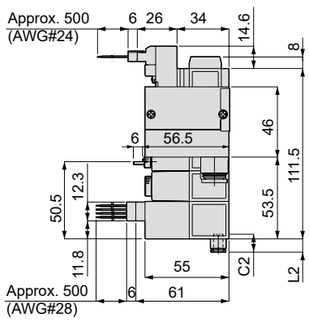
Unit: mm

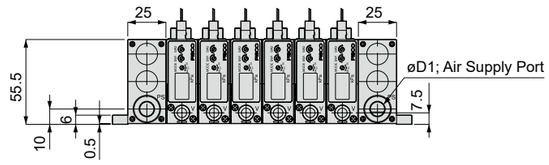
Vacuum port Bore size øD2	C2	L2
4	11.2	6.1
6	11.9	8.9
8	18.2	17.3

External Dimensions Diagram (Manifold Type VSJM)

●Atmospheric release, common piping leadout direction on vacuum port side, with vacuum pressure switch







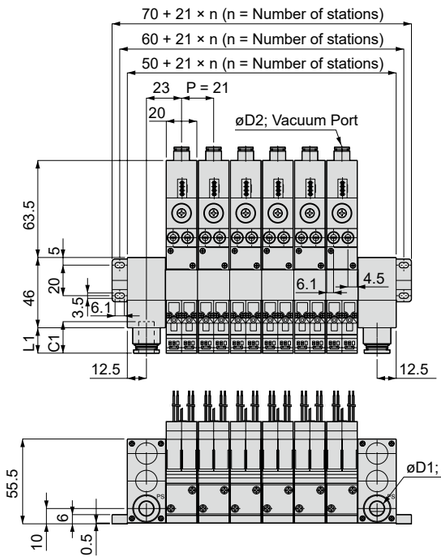
Unit: mm

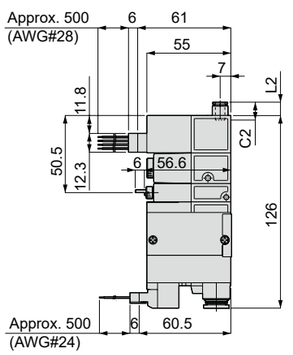
Air Supply Port Bore size øD1	C1	L1
6	17	11.6
8	18.2	13.1
10	20.7	16.7

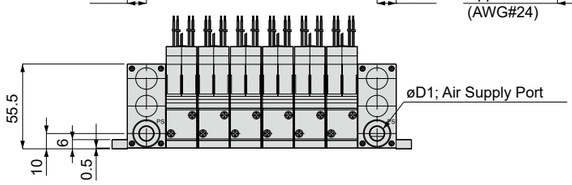
Unit: mm

Vacuum port Bore size øD2	C2	L2
4	11.2	6.1
6	11.9	8.9
8	18.2	17.3

●Atmospheric release, common piping leadout direction on supply port side, with vacuum pressure switch







Unit: mm

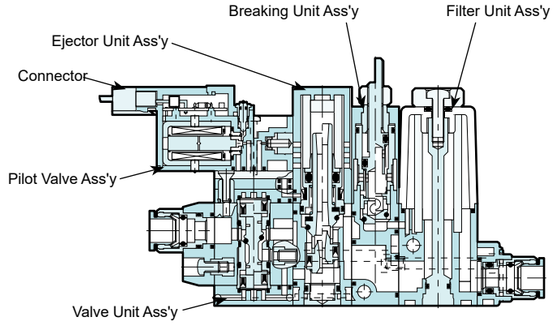
Air Supply Port Bore size øD1	C1	L1
6	17	11.6
8	18.2	13.1
10	20.7	16.7

Unit: mm

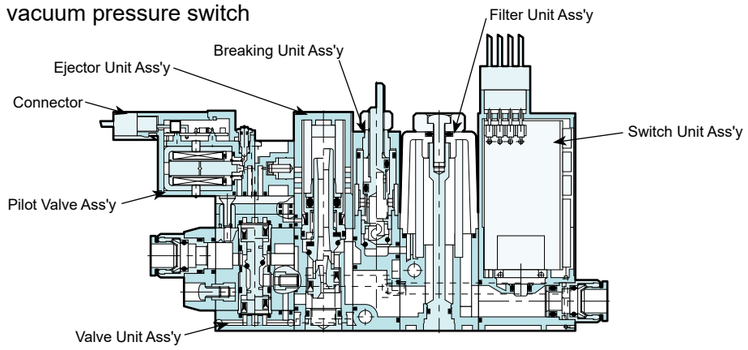
Vacuum port Bore size øD2	C2	L2
4	11.2	6.1
6	11.9	8.9
8	18.2	17.3

Internal Structure Diagram

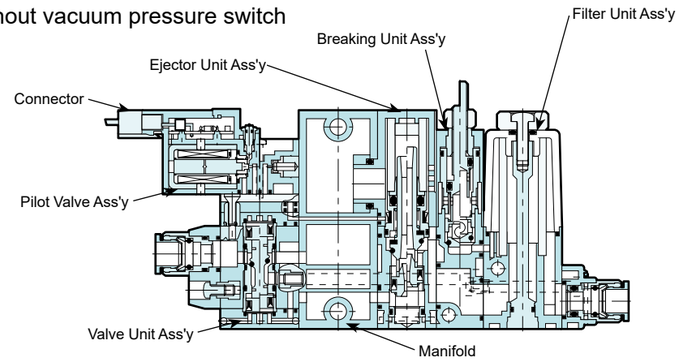
●Single unit VSJ, without vacuum pressure switch



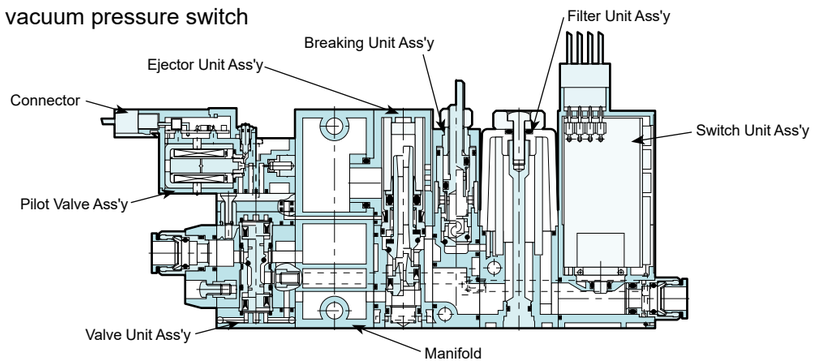
●Single unit VSJ, with vacuum pressure switch



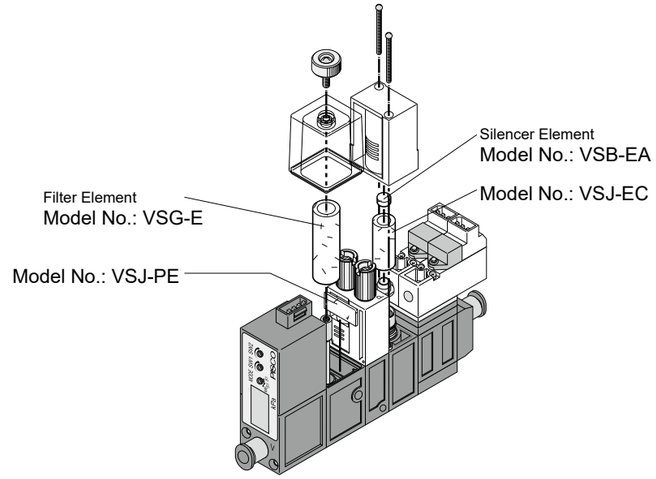
●Manifold VSJM, without vacuum pressure switch



●Manifold VSJM, with vacuum pressure switch



Maintenance Parts



To Use This Product Safely

Be sure to read this before use.
For general pneumatic components precautions, Intro P 15 for details.

Individual Precautions: VSJ Series

Design / Selection

Warning

■For the self-hold (VSJ-□□D...), when resupplying after the pilot air supply is stopped (including the first use after shipment), the position of the switching valve is in neutral. When restarting pilot air supply, be sure to send a signal to the pilot valve or perform switching reliably by manual operation.

Caution

■Fittings When replacing the supply port sheath block, make sure that the packing has not fallen out, remove the deposits in the vicinity, then securely tighten it at the specified tightening torque.

Precautions for Manifold Use

■As the number of manifold stations increases, malfunctions such as the deterioration of vacuum performance due to shortage of supply air or insufficient exhaust port capacity and exhaust flowing into the vacuum port may occur. The allowable number of simultaneously operating stations differs depending on nozzle size, vacuum performance, etc., so please inquire.

For precautions regarding mounting, installation, adjustment, operation, and maintenance, please refer to the CKD Equipment Product Site (https: //www.ckd.co.jp/kiki/en/) → 'model No.' → Instruction Manual.

MEMO

How to Create a VSJM Mixed Manifold Specification Sheet

●Mix manifold model No.(example)

❶	❷	❸		❹	❺	❻		❼		❽	❾	❿
VSJM -	Z	00	Z	-	CX	8	8	-	3	-	5	B	-	Z

●Mix manifold specifications sheet (example)

Vacuum Ejector Model No. ❶ ❷ ❸ ❹ ❺						Arrangement Position 1	2	3	4	5	6	7	8	9	10	Quantity
VSJM -	H	07	B	- 4 -	W	○	○									2
VSJM -	H	07	A	- 4 -	W			○	○							2
VSJM -	E	10	B	- 6 -	A					○						1
VSJM -				-												
VSJM -				-												

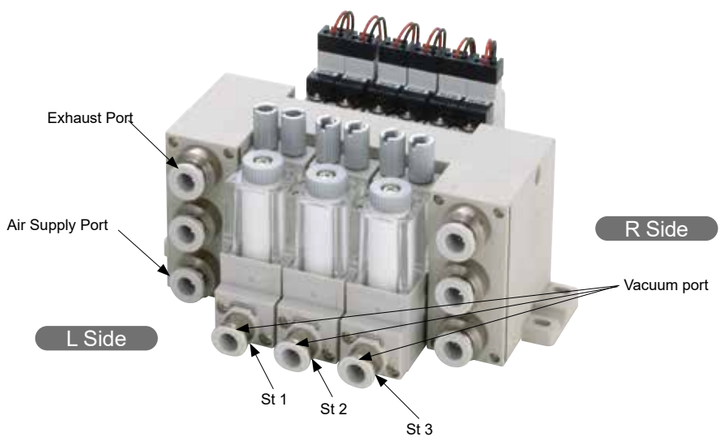
[For Fitting Mix Specification with Output Port Size Only]

●Mix manifold model No.(example)

❶	❷	❸		❹	❺	❻		❼		❽	❾	❿
VSJM -	H	07	B	- CX	8	5	-	3	-	5	B	-	W

●Mix manifold specifications sheet (example)

Vacuum Ejector Model No. ❶ ❷ ❸ ❹ ❺						Arrangement Position 1	2	3	4	5	6	7	8	9	10	Quantity
VSJM -	H	07	B	- 4 -	W	○	○									2
VSJM -	H	07	B	- 6 -	W			○	○							2
VSJM -	H	07	B	- 8 -	W					○						1
VSJM -				-												
VSJM -				-												



* : The station No. is St.1, St.2... from the L side when the vacuum port is viewed forwardSt.10.

[Notes for Filling Out]
- For piping position, place the vacuum port at the front and install sequentially from the left.
- In the Required Quantity column at the right end of the table, enter the total quantity of the specified product model No.s.

VSJM Mixed Manifold Specification Sheet

Contact Person | Quantity Set | Delivery Date (Month/Day)

Voucher No. | Order Received No.

Date of Issue
Company
Attn:
Order No.

●Mix manifold model No.

❶	❷	❸		❹	❺	❻		❼		❽	❾	❿
VSJM -				-				-		-		-

❶ Vacuum Characteristics Note1, 2, 3)	
H	High Vacuum/Medium Flow Type
L	Medium Vacuum/High Flow Type
E	High Vacuum/Low Flow Type
Z	For mixed specifications (Provide details in the specification sheet)

❷ Nozzle Diameter Note1, 2)	
05	ø0.5
07	ø0.7
10	ø1.0
12	ø1.2
00	For mixed specifications (Provide details in the specification sheet)

❸ Valve-type	
A	Normally Open Type
B	Normally Closed Type
D	Double Solenoid Type
Z	For mixed specifications (Provide details in the specification sheet)

❹ Vacuum Port (V)	
4	ø4 Push-in fitting
6	ø6 Push-in fitting
8	ø8 Push-in fitting
CX	For fitting mix (Provide details in the specification sheet)

❺ Air Supply Port (PS)	
6	ø6 Push-in fitting
8	ø8 Push-in fitting
10	ø10 Push-in fitting

❻ Exhaust Port (EX)	
S	Atmospheric Release with Silencer
8	ø8 Push-in fitting centralized exhaust
10	ø10 Push-in fitting centralized exhaust

❼ Solenoid Valve Voltage	
1	100 VAC
3	24 VDC

❽ Number of Manifold Stations	
2 to 10	2 to 10 Stations

❾ Centralized Piping Outlet Direction	
A	Vacuum Port Side
B	Supply Port Side

❿ Vacuum Pressure Switch Specifications	
Blank	Without Vacuum Pressure Switch
W	NPN Output 2 points with Digital Display
A	NPN Output 1 point + Analog Output with Digital Display
Z	For mixed specifications (Provide details in the specification sheet)

Notes for model No. Selection

Note1) The combination of ❶ Vacuum Characteristics 'E' and Nozzle Diameter ❷ '05', and the combination of ❶ 'L' and ❷ '12' cannot be selected.
Note2) For mixed specifications, please be sure to fill out the 'Mixed Manifold Specification Sheet'.
Note3) When ❶ is 'Z', only ❷ '00' can be selected. When ❷ is '00', only ❶ 'Z' can be selected.

●Mix manifold specifications sheet

Vacuum Ejector Model No. ❶ ❷ ❸ ❹ ❺						Arrangement Position 1	2	3	4	5	6	7	8	9	10	Quantity
VSJM -				-	-											
VSJM -				-	-											
VSJM -				-	-											
VSJM -				-	-											
VSJM -				-	-											