3 Port Solenoid Valve
Series VQZ100/200/300
Single Unit

CE [Option]

VQZ100 / How to Order Valve

VQZ 1 1 5 ☐ – 5 M ☐ 1 – 01 – ☐

Series

1	VQZ100 body width 10 mm

Type of actuation

1	N.C. (A) 2, 1 3 (P) (R)

Body type

5	Base mounted

Function

Symbol	Specifications	DC	AC
Nil	Standard	(0.35 W) ○	Note 3) ○
K Note 1)	High pressure type	(0.9 W) ○	—
R Note 1, 2)	External pilot type	○	○
KR Note 1, 2)	High pressure/External pilot type	(0.9 W) ○	—

Note 1) Option
Note 2) For details on external pilot type, refer to page 32.
Note 3) For AC specification power consumption, refer to page 19.

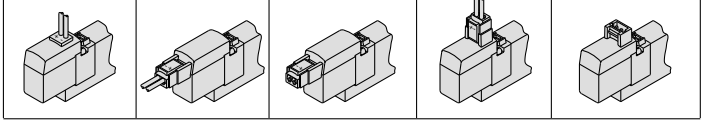
⚠ Caution
Use standard (DC) specification for continuous duty.

Coil voltage

1	100 VAC (50/60 Hz)
2	200 VAC (50/60 Hz)
3	110 VAC [115 VAC] (50/60 Hz)
4	220 VAC [230 VAC] (50/60 Hz)
5	24 VDC
6	12 VDC

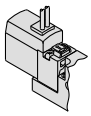
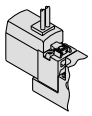
Electrical entry

G: Grommet (DC specification)	L: L-type plug connector with lead wire	LO: L-type plug connector without connector	M: M-type plug connector with lead wire	MO: M-type plug connector without connector
	With light/ surge voltage suppressor	With light/ surge voltage suppressor	With light/ surge voltage suppressor	With light/ surge voltage suppressor



Note) Standard lead wire length: 300 mm

Manual override

Nil: Non-locking push type	B: Locking type (Tool required)
	

Port size [2(A) port]

CP	Without sub-plate
01	Rc 1/8

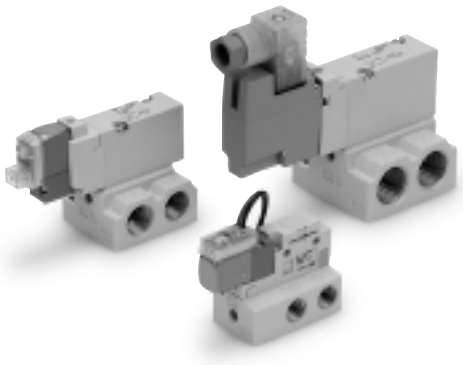
Note) For optional thread type, refer to page 32.

CE compliant

Nil	—
Q	CE marked

Note) For CE compliant models, DC-type only.

Note) For sub-plate part no., refer to page 33.



Specifications

Valve construction	Metal seal	Rubber seal	VQZ100 (Poppet seal)
Fluid	Air, Inert gas		
Max. operating pressure (MPa)	0.7 (High pressure type: 1.0)	0.7	0.7 (High pressure type: 1.0)
Min. operating pressure (MPa)	0.1	0.15	0.15
Ambient and fluid temperature (°C)	–10 to 50 (No freezing)		
Max. operating frequency (Hz)	20	5	20
Pilot exhaust method	Individual exhaust		Common exhaust
Lubrication	Not required		
Manual override	Push type, Locking type (Tool required)		
Mounting orientation	Free		
Impact/Vibration resistance (m/s²) Note 1)	150/30		
Enclosure	Dustproof (DIN terminal: IP65 Note 2))		

∗ Based on IEC60529

Note 1) Impact resistance: No malfunction occurred when it is tested with a drop tester in the axial direction and at the right angles to the main valve and armature in both energized and de-energized states every once for each condition. (Value in the initial state)

Vibration resistance: No malfunction occurred in one sweep test between 45 and 2000 Hz. Test was performed to axis and right angle directions of the main valve and armature when pilot signal is ON and OFF. (Value in the initial state)

Note 2) When IP65 compliant DIN terminals are selected: VQZ$^{2}_{3}$□5□-□Y□□W1-□-□

Solenoid Specifications

Electrical entry			Grommet (G) L-type plug connector (L)	M-type plug connector (M) DIN terminal (Y)
			G, L, M	Y
Coil rated voltage (V)	DC		24, 12	
	AC 50/60 Hz		100, 110, 200, 220∗	
Allowable voltage fluctuation			±10% of rated voltage∗	
Power consumption (W)	DC	Standard	0.35 [(With light: 0.4 (DIN terminal with light: 0.45)]	
		High speed response, high pressure	0.9 [(With light: 0.95 (DIN terminal with light: 1.0)]	
Apparent power (VA)	AC	100 V	0.78 (With light: 0.81)	0.78 (With light: 0.87)
		110 V [115 V]	0.86 (With light: 0.89) [0.94 (With light: 0.97)]	0.86 (With light: 0.87) [0.94 (With light: 1.07)]
		200 V	1.18 (With light: 1.22)	1.15 (With light: 1.30)
		220 V [230 V]	1.30 (With light: 1.34) [1.42 (With light: 1.46)]	1.27 (With light: 1.46) [1.39 (With light: 1.60)]
Surge voltage suppressor			Varistor	
Indicator light			LED (Neon light when AC with DIN terminal)	

∗ In common between 110 VAC and 115 VAC, and between 220 VAC and 230 VAC.

∗ For 115 VAC and 230 VAC, the allowable voltage is –15% to +5% of rated voltage.

Options

High speed response type
High pressure type (Metal seal type only)
External pilot type∗

∗ For details on external pilot type, refer to page 32.

Made to Order

(For details, refer to page 34.)

Symbol	Description
X30	Pilot valve common exhaust
X90	Main valve fluoro-rubber
X113	All fluoro-rubber

Flow Characteristics

Series	Valve construction	Model		Flow characteristics 1→2 (P→A) C [dm³/(s•bar)]	b	Cv	Flow characteristics 2→3 (A→R) C [dm³/(s•bar)]	b	Cv	Response time (ms) Note 1) Standard: 0.35 W	High speed response: 0.9 W	High pressure: 0.9 W	AC	Note 2) Weight (g)
VQZ100	N.C. valve	Poppet	**VQZ115**	0.87	0.46	0.23	1.0	0.35	0.25	10 or less	—	13 or less	22 or less	24
VQZ200	N.C. valve	Metal seal	**VQZ215**	1.7	0.17	0.38	2.0	0.20	0.45	22 or less	14 or less	18 or less	34 or less	52
		Rubber seal	**VQZ235**	2.3	0.46	0.65	3.0	0.40	0.80	22 or less	15 or less	—	36 or less	
	N.O. valve	Metal seal	**VQZ225**	1.7	0.18	0.38	1.8	0.21	0.39	22 or less	14 or less	18 or less	34 or less	
		Rubber seal	**VQZ245**	2.5	0.43	0.67	3.0	0.30	0.74	22 or less	15 or less	—	36 or less	
VQZ300	N.C. valve	Metal seal	**VQZ315**	3.0	0.21	0.70	3.2	0.27	0.80	22 or less	17 or less	22 or less	34 or less	78
		Rubber seal	**VQZ335**	4.5	0.42	1.3	4.1	0.36	1.0	33 or less	25 or less	—	57 or less	
	N.O. valve	Metal seal	**VQZ325**	2.9	0.21	0.72	2.9	0.16	0.69	22 or less	17 or less	22 or less	34 or less	
		Rubber seal	**VQZ345**	4.4	0.45	1.2	4.5	0.38	1.2	33 or less	25 or less	—	57 or less	

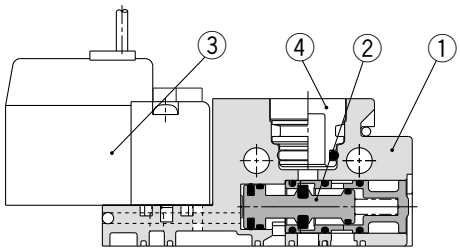
Note 1) Based on JIS B 8375-1981 (Supply pressure: 0.5 MPa; with light/surge voltage suppressor: clean air)
Response time values will change depending on pressure and air quality.

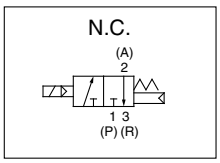
Note 2) Weight without sub-plate.

Construction

VQZ100

Poppet type



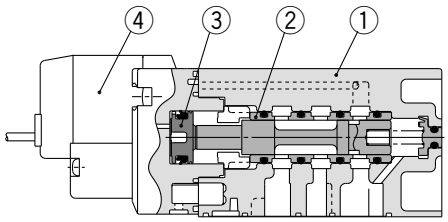


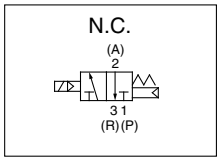
Component Parts

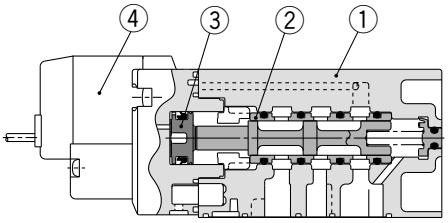
No.	Description	Material	Note
1	**Body**	Resin	
2	**Spool valve**	Aluminum/HNBR	
3	**Pilot valve assembly**	—	
4	**Port plug**	Resin/HNBR	VVQZ100-CP

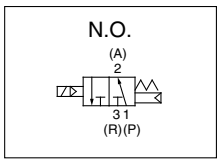
VQZ200/300

Metal seal type

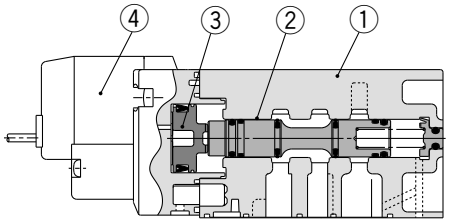


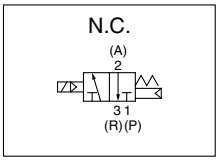


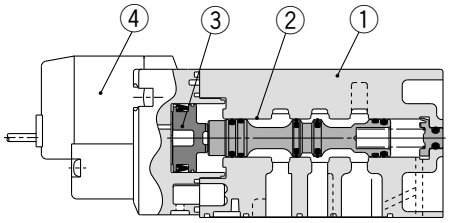


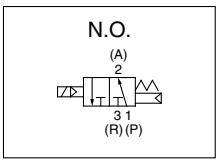


Rubber seal type









Component Parts

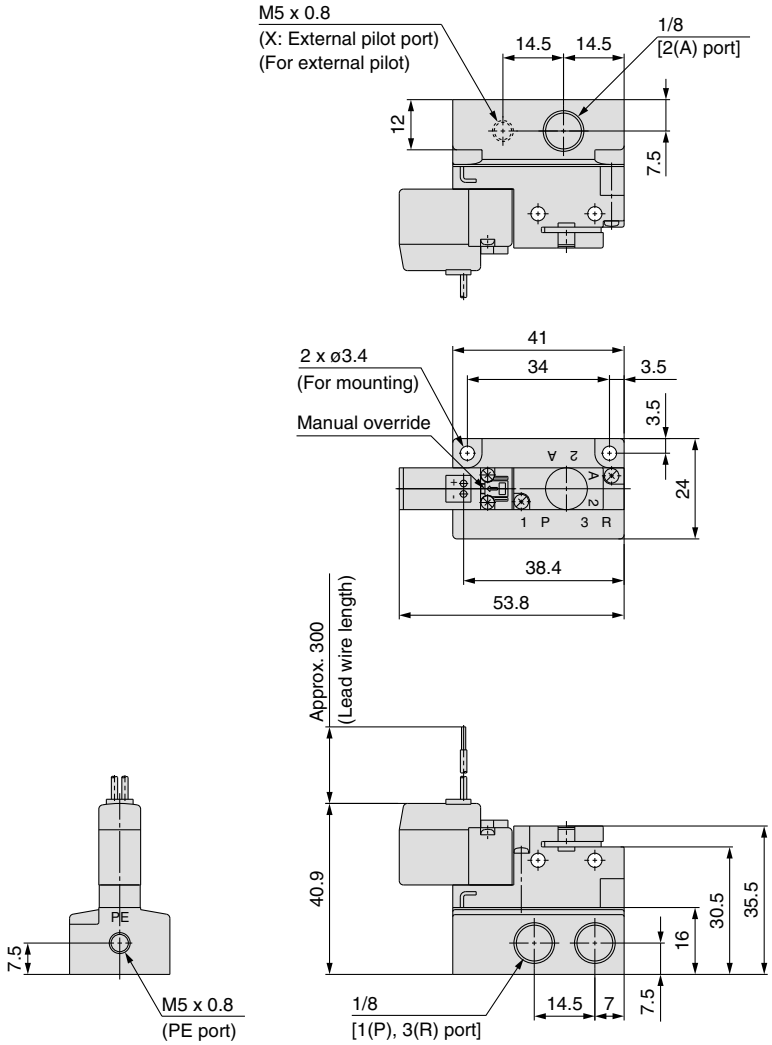
No.	Description	Material	Note
1	**Body**	Aluminum die-casted	
2	**Spool, Sleeve**	Stainless steel	Metal seal
	Spool valve	Aluminum/HNBR	Rubber seal
3	**Piston**	Resin	
4	**Pilot valve assembly**	—	

Note) For “How to Order Pilot Valve Assembly”, refer to page 33.

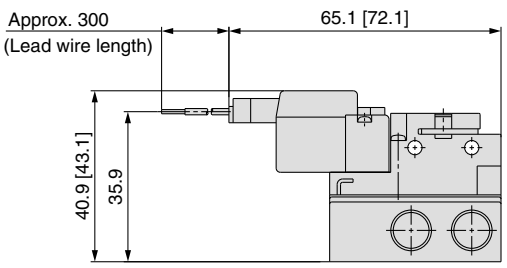
Dimensions: VQZ100

Single Unit

Grommet (G): VQZ115□-□G□1-01

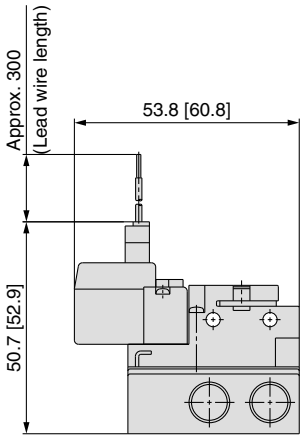


L-type plug connector (L): VQZ115□-□L□1-01



Unless otherwise indicated, dimensions are the same as Grommet (G).
[ ]: AC

M-type plug connector (M): VQZ115□-□M□1-01



Unless otherwise indicated, dimensions are the same as Grommet (G).
[ ]: AC

3 Port Solenoid Valve
Series VQZ100/200/300
Manifold Connector Kit

CE [Option]

VQZ100 / How to Order Manifold

VV3QZ 1 5 – 08 C6 C – □ – □

Series

1	VQZ100

Manifold type

5	Base mounted

Stations

02	2 stations
⋮	⋮
20	20 stations

Port size [2(A) port]

C3	ø3.2 one-touch fitting	For side ported
C4	ø4 one-touch fitting	
C6	ø6 one-touch fitting	
M5	M5 thread (Replaceable type)	
CP Note 1)	With port plug	For top ported
CM Note 2)	Mixed port sizes	—

Note 1) When CP port plug is attached on all 2(A) port. Valve on manifold is top ported.
Note 2) Specify the mixture port (including top and side piping) by the manifold specification sheet.
Note 3) For inch size one-touch fittings, refer to page 32.

Option

Nil	None
D	DIN rail mounting (With standard DIN rail length)
D0 Note)	DIN rail mounting (Without DIN rail)
R	External pilot type

Note 1) Order DIN rail separately.
For DIN rail part no., refer to page 31.
Note 2) When two or more symbols are specified, indicate them alphabetically.

CE compliant

Nil	—
Q	CE marked

Kit type

C	Connector

VQZ100 / How to Order Valve

VQZ 1 1 5 □ – 5 M □ 1 – C4 – □

Series

1	VQZ100 body width 10 mm

Type of actuation

1	N.C.

Body type

5	Base mouned

Function

Symbol	Specifications	DC	AC
Nil	Standard	(0.35 W) ○	Note 3) ○
K Note 1)	High pressure type	(0.9 W) ○	—
R Note 1, 2)	External pilot type	○	○
KR Note 1, 2)	High pressure/External pilot type	(0.9 W) ○	—

Note 1) Option
Note 2) For details on external pilot type, refer to page 32.
Note 3) For AC specification power consumption, refer to page 19.

⚠ Caution
Use standard (DC) specification for continuous duty.

Coil voltage

1	100 VAC (50/60 Hz)
2	200 VAC (50/60 Hz)
3	110 VAC [115 VAC] (50/60 Hz)
4	220 VAC [230 VAC] (50/60 Hz)
5	24 VDC
6	12 VDC

Manual override

Nil	Non-locking push type (Tool required)
B	Locking type (Tool required)

Electrical entry

Symbol	Electrical entry	Light/surge voltage suppressor
G	Grommet (DC specification)	None
L	L-plug plug connector with lead wire	Yes
LO	L-plug plug connector without connector	
M	M-plug plug connector with lead wire	
MO	M-plug plug connector without connector	

Note) Standard lead wire length: 300 mm

Port size

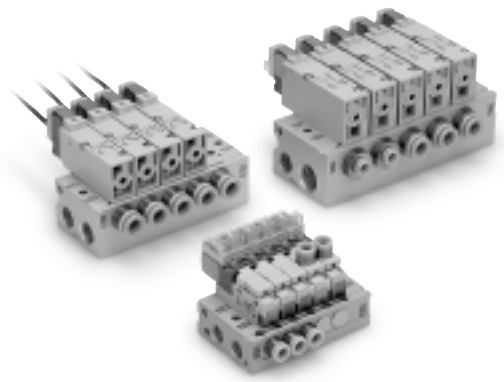
CP	With port plug	For side ported
C3	ø3.2 one-touch fitting	For top ported
C4	ø4 one-touch fitting	
C6	ø6 one-touch fitting	
M5	M5 thread	

Note) For inch size one-touch fittings, refer to page 32.

CE compliant

Nil	—
Q	CE marked

Note) For CE compliant models, DC type only.

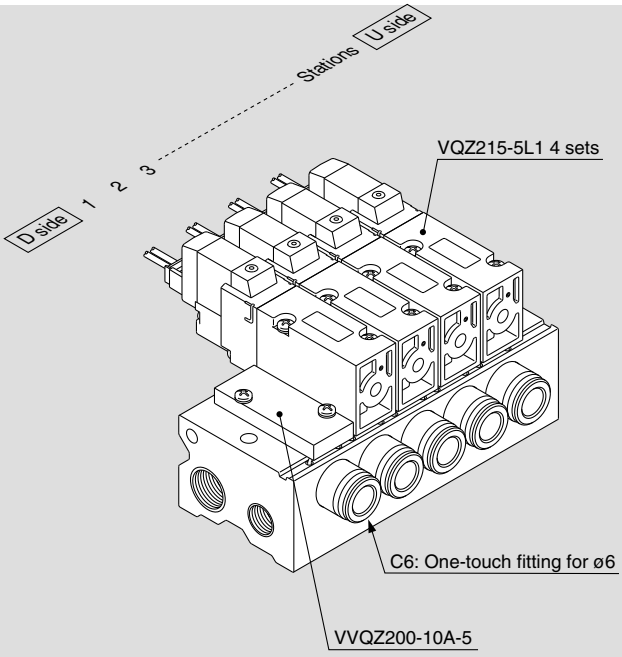


Manifold Specifications

Series	Base model	Piping specifications			Applicable solenoid valve	Applicable stations	Manifold base weight (g) Note)
		Piping direction	Port size				
			1(P), 3(R)	2(A)			
VQZ100	**VV3QZ15-□□□**	Side/Top	Rc 1/8	C3 (for ø3.2) C4 (for ø4) C6 (for ø6) M5 (M5 thread)	**VQZ115**	2 to 20 stations	2 stations: 83 Addition per station: 19
VQZ200	**VV3QZ25-□□□**	Side	Rc 1/4	C4 (for ø4) C6 (for ø6) C8 (for ø8) Rc 1/8	**VQZ2□5**	2 to 20 stations	2 stations: 126 Addition per station: 38
VQZ300	**VV3QZ35-□□□**	Side	1(P) port Rc 3/8 3(R) port Rc 1/4	C6 (for ø6) C8 (for ø8) C10 (for ø10) Rc 1/4	**VQZ3□5**	2 to 20 stations	2 stations: 209 Addition per station: 60

Note) Weight for threaded connection.

How to Order Manifold Assembly (Example)



VV3QZ25-05C6C ···· 1 set (C kit 5-station manifold base part no.)
*** VVQZ200-10A-5 ··· 1 set (Blanking plate assembly part no.)**
*** VQZ215-5L1 ····· 4 sets (N.C. type part no.)**

The asterisk denotes the symbol for assembly.
Prefix it to the part nos. of the solenoid valve, etc.

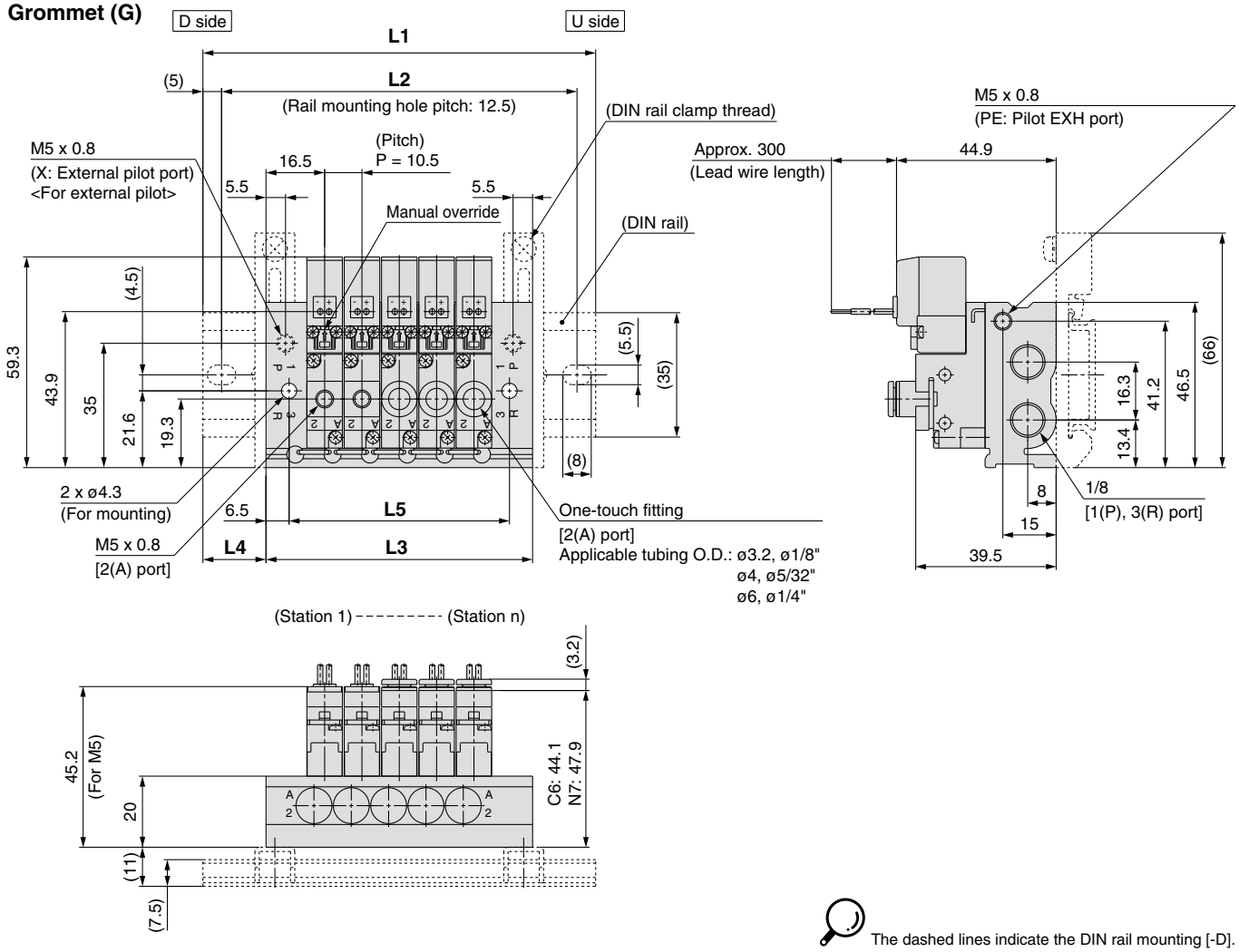
Enter in order starting from the first station on the D side.

Add the valve and option part number under the manifold base part number.
When entry of part numbers becomes complicated, indicate by the manifold specification sheet.

Dimensions: VQZ100: Top Ported

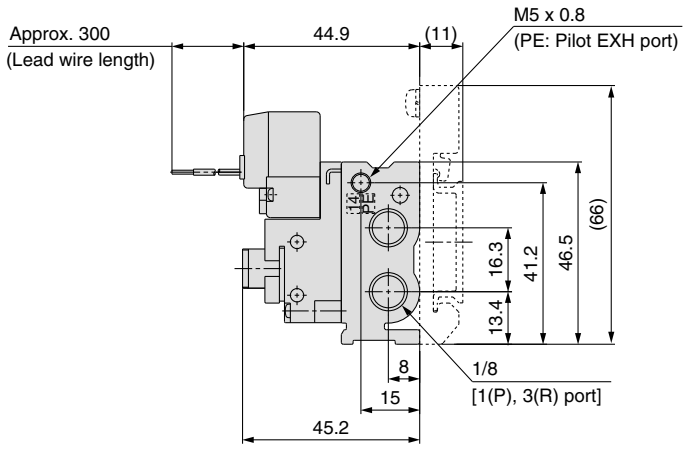
VV3QZ15- Stations Port size C

Grommet (G)



The dashed lines indicate the DIN rail mounting [-D].

M5



Dimensions

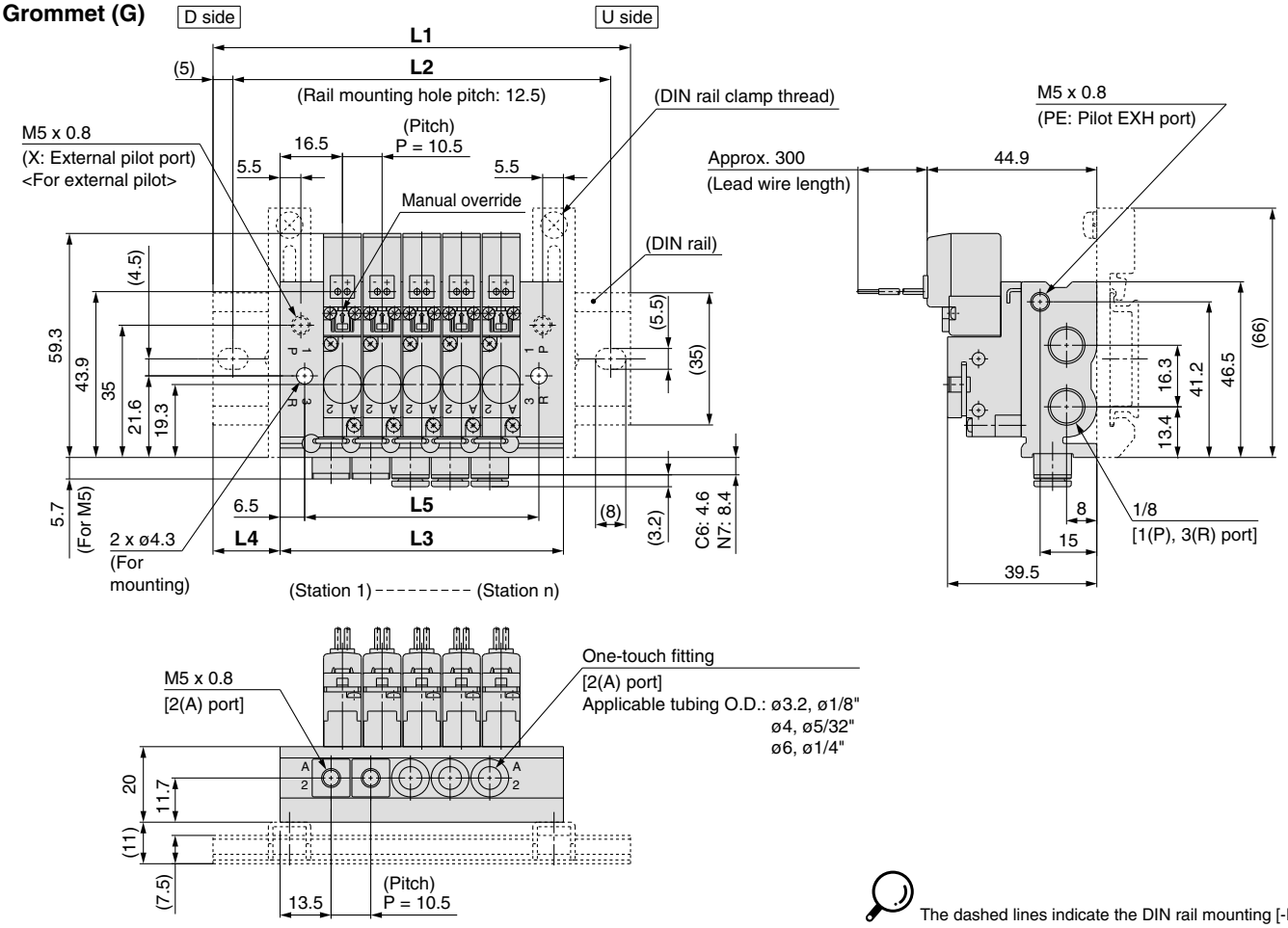
Formula: L5 = 10.5n + 9.5 L3 = 10.5n + 22.5 n: Stations (Max. 20 stations)

L \ n	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20
L1	85.5	85.5	98	110.5	123	135.5	148	148	160.5	173	185.5	198	210.5	210.5	223	235.5	248	260.5	273
L2	75	75	87.5	100	112.5	125	137.5	137.5	150	162.5	175	187.5	200	200	212.5	225	237.5	250	262.5
L3	43.5	54	64.5	75	85.5	96	106.5	117	127.5	138	148.5	159	169.5	180	190.5	201	211.5	222	232.5
L4	21	16	17	18	19	20	21	15.5	16.5	17.5	18.5	19.5	20.5	15.5	16.5	17.5	18.5	19.5	20.5
L5	30.5	41	51.5	62	72.5	83	93.5	104	114.5	125	135.5	146	156.5	167	177.5	188	198.5	209	219.5

Dimensions: VQZ100: Side Ported

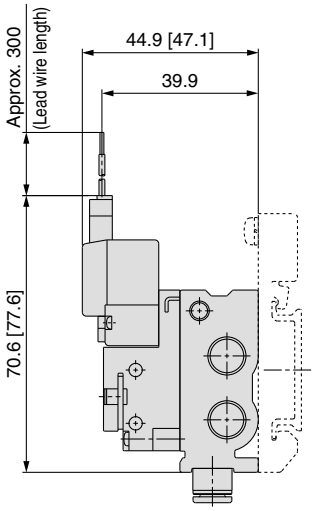
VV3QZ15- Stations Port size C

Grommet (G)



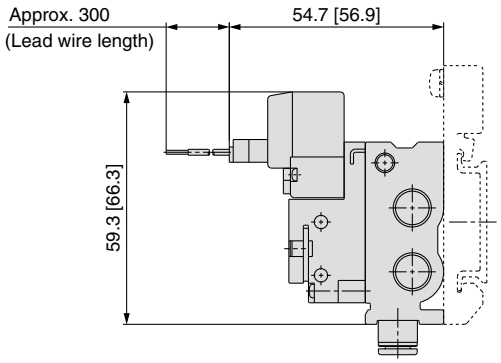
The dashed lines indicate the DIN rail mounting [-D].

L-type plug connector (L)



Unless otherwise indicated, dimensions are the same as Grommet (G).
[ ]: AC

M-type plug connector (M)



Unless otherwise indicated, dimensions are the same as Grommet (G).
[ ]: AC

Dimensions

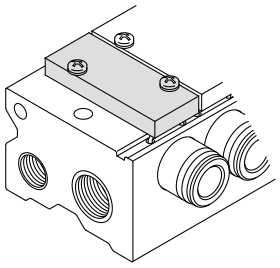
Formula: L5 = 10.5n + 9.5 L3 = 10.5n + 22.5 n: Stations (Max. 20 stations)

L \ n	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20
L1	85.5	85.5	98	110.5	123	135.5	148	148	160.5	173	185.5	198	210.5	210.5	223	235.5	248	260.5	273
L2	75	75	87.5	100	112.5	125	137.5	137.5	150	162.5	175	187.5	200	200	212.5	225	237.5	250	262.5
L3	43.5	54	64.5	75	85.5	96	106.5	117	127.5	138	148.5	159	169.5	180	190.5	201	211.5	222	232.5
L4	21	16	17	18	19	20	21	15.5	16.5	17.5	18.5	19.5	20.5	15.5	16.5	17.5	18.5	19.5	20.5
L5	30.5	41	51.5	62	72.5	83	93.5	104	114.5	125	135.5	146	156.5	167	177.5	188	198.5	209	219.5

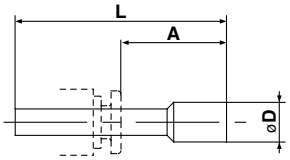
Manifold Options

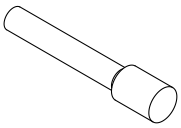
Blanking plate assembly
VVQZ100-10A-5 (for VQZ100)
VVQZ200-10A-5 (for VQZ200)
VVQZ300-10A-5 (for VQZ300)

It is used by attaching on the manifold block for being prepared for removing a valve for maintenance reasons or planning to mount a spare valve, etc.



Blanking plate
KQ2P-23
KQ2P-04
KQ2P-06
KQ2P-08
KQ2P-10





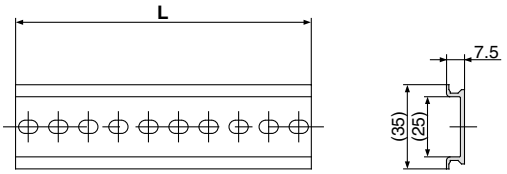
Dimensions (mm)

Applicable fitting size ød	Model	A	L	D
3.2	**KQ2P-23**	16	31.5	3.2
4	**KQ2P-04**	16	32	6
6	**KQ2P-06**	18	35	8
8	**KQ2P-08**	20.5	39	10
10	**KQ2P-10**	22	43	12

DIN rail
AXT100-DR-□

∗ As for □, enter the number from the DIN rail dimensions table. For L dimension, refer to the dimensions of each kit.

Each manifold can be mounted on a DIN rail. Insert "D" at the end of the manifold part number. The DIN rail is approximately 30 mm longer than the length of manifold.



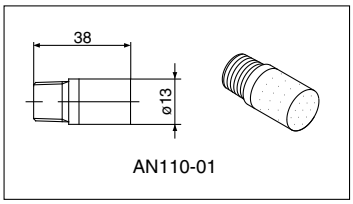
L Dimension L = 12.5n + 10.5

No.	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20
L dimension	23	35.5	48	60.5	73	85.5	98	110.5	123	135.5	148	160.5	173	185.5	198	210.5	223	235.5	248	260.5

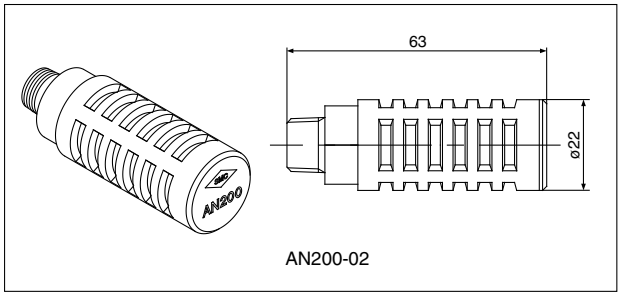
No.	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40
L dimension	273	285.5	298	310.5	323	335.5	348	360.5	373	385.5	398	410.5	423	435.5	448	460.5	473	485.5	498	510.5

Silencer
(for manifold EXH port)

Silencer is installed in the manifold EXH port.



AN110-01



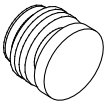
AN200-02

Dimensions

Model	Silencer part no.
VQZ100	AN110-01
VQZ200	AN200-02
VQZ300	AN200-02

Port plug
VVQZ100-CP (for VQZ100)

This is used when changing piping location. (Side or Top)



Options

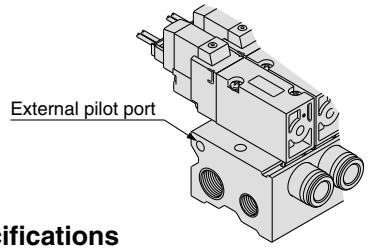
External Pilot Specification

The external pilot specification is used when the operating pressure is below the minimum operating pressure 0.1 to 0.15 MPa or when valve is used for a vacuum application. Order a valve by adding the external pilot specification [R] to the part number.

Valve Part No.

VQZ □□ 5R — □□□□ 1 — □ — □

Entry is the same as standard products.



Manifold Part No.

VV3QZ □ 5 — □□ C — □ R — □

Entry is the same as standard products.

Pressure Specifications

Series		VQZ100 Note 2)	VQZ200/300
Note 1) External pilot pressure range	Metal seal	—	0.1 to 0.7 MPa
	Rubber seal (VQZ100: poppet)	0.2 to 0.7 MPa	0.15 to 0.7 MPa
Operating pressure range Note 1)		–100 kPa to 0.7 MPa	

Note 1) In case of the high pressure type, upper limit of max. operating pressure and external pilot pressure range is 1 MPa.
Note 2) When using the VQZ100 series for a vacuum application, vacuum air through its 1(P) port. When supplying vacuum-release air, supply it through its 3(R) port. But do not supply vacuum-release air exceeding 50% for the external pilot pressure.

Inch Size One-touch Fittings and Optional Threads

Inch size one-touch fittings and NPT, NPTF and G thread are available.

Manifold Part No.

VV3QZ □ 5 — □ N7 T C — □ — □

Entry is the same as standard products.

Cylinder port

Thread type (Cylinder port and 1(P), 3(R) ports)

Symbol		N1	N3	N7	N9	N11	NM Note 1)	M5	01	02
Applicable tubing O.D.		ø1/8"	ø5/32"	ø1/4"	ø5/16"	ø3/8"	Mixed	M5 thread	1/8 thread	1/4 thread
Cylinder port	VQZ100	●	●	●	—	—	●	●	—	—
	VQZ200	—	●	●	●	—	●	—	●	—
	VQZ300	—	—	●	●	●	●	—	—	●

Nil	Rc
N	NPT
T	NPTF
F	G

Note 1) Except VQZ100, mixing one-touch fittings and thread types is impossible.
Note 2) Metric size one-touch fittings (C□) are also available.

Optional Threads Other than Rc

Rc specifications are standard for all ports, however, NPT, NPTF and G are available for overseas markets. Add the appropriate symbol following the port size in the standard part number.

Valve Part No.

VQZ □□ 5□ — □□□□ 1 — □ T

Entry is the same as standard products.

Thread type (Cylinder port and 1(P), 3(R) ports of sub-plate)

Nil	Rc
N	NPT
T	NPTF
F	G

IP65 Enclosure (Based on IEC529)

DIN terminal is available with IP65 enclosure.

Valve Part No.
(Applicable to the VQZ200/300 rubber seal with the exception of the external pilot type)

VQZ 2/3 □ 5 □ — □ Y □□ W1 — □ — □

Entry is the same as standard products.

Note) The pilot exhaust IP65 valves is common with main valve exhaust.
(The standard valve has an individual exhaust for the pilot valve.)

Replacement Parts

One-touch Fitting Assembly (for Cylinder port)

Model \ Fitting size	C3	C4	C6	C8	C10	M5 (VQZ100 only)
VQZ100	VVQ1000-50A-C3	VVQ1000-50A-C4	VVQ1000-50A-C6	—	—	VVQ1000-50A-M5
VQZ200	—	VVQ1000-51A-C4	VVQ1000-51A-C6	VVQ1000-51A-C8	—	—
VQZ300	—	—	VVQ2000-51A-C6	VVQ2000-51A-C8	VVQ2000-51A-C10	—

Note) Purchasing order is available in units of 10 pieces.

<Plug connector assembly>

DC: SY100-30-4A- □

100 VAC: SY100-30-1A- □

200 VAC: SY100-30-2A- □

Other AC voltages: SY100-30-3A- □

Without lead wire: SY100-30-A
(with connector and 2 sockets only)

Lead wire length

Nil	300 mm
6	600 mm
10	1000 mm
15	1500 mm
20	2000 mm
25	2500 mm
30	3000 mm
50	5000 mm

How to Order

Include the connector assembly part number together with the part number for the plug connector's solenoid valve without connector.

Example) In case of 2000 mm of lead wire

DC	**AC**
VQZ115-5LO1-M5	VQZ115-1LO1-M5
SY100-30-4A-20	SY100-30-1A-20

<Pilot valve assembly>

V111 □ □ **— 5 G** □

Function

Symbol	Specifications	DC	AC
Nil	Standard	(0.35 W) ○	○
B Note)	High speed response type (Applicable to VQZ200/300)	(0.9 W) ○	—
K Note)	High pressure type (Applicable to Metal seal type, Poppet seal type)	(0.9 W) ○	—

Note) Option

Manual override

Nil	None (Applicable to VQZ200/300)
M	Yes (Applicable to VQZ100)

Manual override (Applicable to the VQZ100)

Nil	Non-locking push type
B	Locking slotted type

Coil voltage

1	100 VAC (50/60 Hz)
2	200 VAC (50/60 Hz)
3	110 VAC (50/60 Hz)
4	220 VAC (50/60 Hz)
5	24 VDC
6	12 VDC

Electrical entry

Symbol DC	Symbol AC	Electrical entry	Light/surge voltage suppressor
G	—	Grommet (DC specification)	None
LU	**LZ**	L-type plug connector with lead wire	Yes
LOU	**LOZ**	L-type plug connector without connector	
MU	**MZ**	M-type plug connector with lead wire	
MOU	**MOZ**	M-type plug connector without connector	

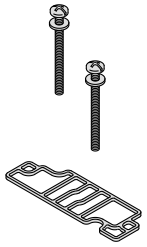
Note) The electrical entry (L, M) for the VQZ100 pilot valve is different from that of the main valve model number.

Valve model	Pilot valve model
VQZ115□-□L□1	**V111□M-□M□**
VQZ115□-□M□1	**V111□M-□L□**

<Gasket and screw assembly>

Model	Part no.
VQZ100	VQZ100-GS-5
VQZ200	VQZ200-GS-5
VQZ300	VQZ300-GS-5

Note) Above part number consists of 10 units. Each unit has one gasket and two screws. Purchasing order is available in units of 10 pieces.



<Sub-plate>

Model	Sub-plate part no.
VQZ100	VQZ100-S-01(R)[✻] (-Q)Note)
VQZ200	VQZ200-S-$^{01}_{02}$[✻] (-Q)
VQZ300	VQZ300-S-$^{02}_{03}$[✻] (-Q)

✻ Thread type

Note) R indicates external pilot type. Except VQZ100, external pilot type and internal pilot type are common.

<DIN terminal type (Applicable to the VQZ200/300)>

V115 □ **— 5 Y —X110**

Function

Symbol	Specifications	DC	AC
Nil	Standard	(0.35 W) ○	○
B Note)	High speed response type	(0.9 W) ○	—
K Note)	High pressure type (Metal seal type only)	(0.9 W) ○	—

Note) Option

Coil voltage

1	100 VAC (50/60 Hz)
2	200 VAC (50/60 Hz)
3	110 VAC (50/60 Hz)
4	220 VAC (50/60 Hz)
5	24 VDC
6	12 VDC

Electrical entry

Symbol	Electrical entry	Light/surge voltage suppressor
Y	DIN terminal	None
YO	DIN terminal without connector	
YZ	DIN terminal with light/surge voltage suppressor	Yes
YS Note)	DIN terminal with surge voltage suppressor (DC specification)	Yes (Without light)
YOS Note)	DIN terminal with surge voltage suppressor, without connector (DC specification)	

Note) For AC voltage valves there is no "S" option. It is already built-in to the rectifier circuit.

⚠ Caution

When replacing only the pilot valve assembly, use caution because it is not possible to convert to a V115 (DIN terminal) from a V111 (Grommet, L-type, M-type), or vice versa.