

Specification

VY(A/B)Q series			Vacuum Inline Valve / Double Acting										
			Bellows STEM seal (A: SUS316L / B: AM350)										
Valve port	SIZE		16	25	40	50	63	80	100	160	200	250	320
Flange Standards	ISO-KF	KF	●	●	●	●	●	●	●	×	×	×	×
	ISO-K	KQ	×	×	×	×	●	●	●	×	×	×	×
	ISO-F	KC	×	×	×	×	●	●	●	×	×	×	×
Valve Actuating type			Double acting cylinder										
Fluid			Vacuum in an inert gas system										
Operating temperature °C			≤150 (Actuator: Max.60°C)										
Operating pressure Pa (Abs)			1×10 <sup>-6</sup> ~ to atmospheric pressure										
Conductance L / s <sup>(Note 1)</sup>			4.6	10	35	62	106	152	304	-	-	-	-
Leakage Pa·m <sup>3</sup> /s	Inside		Standard material (FKM) 1.0×10 <sup>-10</sup> at room temperature (excluding gas permeation)										
	Outside		Standard material (FKM) 1.0×10 <sup>-11</sup> at room temperature (excluding gas permeation)										
Main material			Body: SUS304, Bellows: (SUS316L / AM350) Main parts: SUS304, AL-6061, FKM (Standard seal)										
Operating pressure MPa (G)			0.4~0.7										
Operation Port Port Size			PT 1/8" (Rc1/8")										
Compressed air consumption (at 0.5MPa)	cc (mL) <sup>(Note 2)</sup>		22.5	22.5	45	100	185	210	400	-	-	-	-
Open stroke			14	14	18	25	30	35	40	-	-	-	-
Seal distance (A-Value)			101.6	106.7	130	117.8	210	250	305	-	-	-	-
w/Heater Spec.	Size		016	025	040	050	063	080	100	-	-	-	-
Type: Silicon Rubber Heater Jacket	Electric Capacity		25W	25W	30W	45W	70W	90W	150W	Not Available			
Temperature Max.: Amb.~150°C / TC.sensor													
Control: K-Type / Electric power: 220VAC													

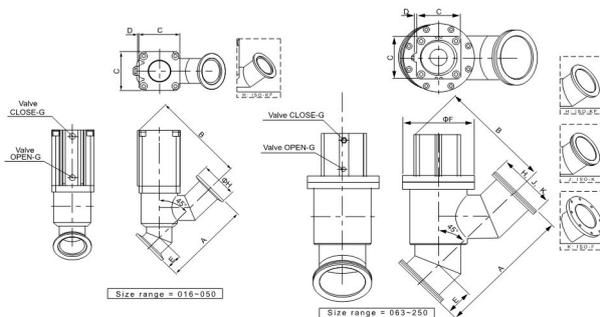
(Note 1) Conductance is represented by "molecular flow" of elbow of the same dimension. (Note 2) One stroke condition. (Open & Close)

▶ If heater is not included (not installed), type "W" at the end of model name

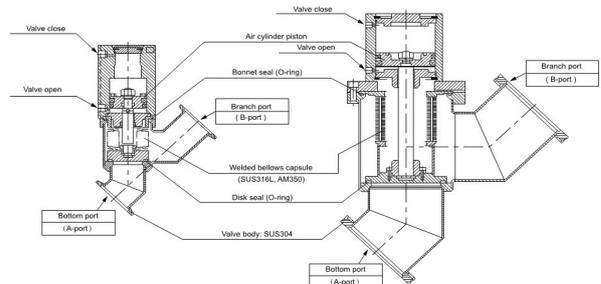
External dimension table

SIZE	16	25	40	50	63	80	100
A	101.6	106.7	130	117.8	210	250	305
B	111.5	111	138.5	162	191	209	256
C	48	48	60	69	77	77	98
D	3	3	2	2	5	5	5
E	16.3	18.7	21.5	27.5	40	50	60
F	-	-	-	-	Ø119	Ø119	Ø159
G	PT 1/8"						
H	Ø30	Ø40	Ø55	Ø75	Ø95	Ø114	Ø134
J	-	-	-	-	Ø95	Ø110	Ø130
K	-	-	-	-	Ø130	Ø145	Ø165

Dimensional drawing



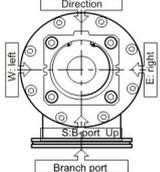
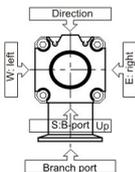
Internal detail



How to Order

Valve **V(A)B(C)** - ① ② - ③ - ④ - ⑤ ⑥ - (⑦)

Model VLAP - □□□ □□-□□ - □ - □□

Series	Body shape	V(L)B(C)	L	L-type(Angle valve) 304SS Body
		V(Y)B(C)	Y	Y-type(Inline valve) 304SS Body
	Stem Seal	V(A)A(C)	A	316L Bellows STEM Seal
		V(A)B(C)	B	AM350 Bellows STEM Seal
		V(A)S(C)	S	O-Ring STEM Seal
	Operation type	V(A)P	P	Double Acting (Pneumatic)
		V(A)S	S	Single Acting (N.C.)
		V(A)M	M	Manual operation
		V(A)Q	Q	Double Acting, w/Heater (Pneumatic)
		V(A)R	R	Single Acting, w/Heater (N.C.)
		V(A)H	H	Double Acting, Heating model(Pneumatic)
		V(A)K	K	Double Acting, Heating model, w/Heater(Pneumatic)
		V(L)D	D	Double Acting, w/Soft start bypass valve(Pneumatic)
		V(L)T	T	Single Acting, w/Soft start bypass valve(N.C.)
		V(L)X	X	Single Acting, w/Soft start integrated valve(N.C.)
Port flange	Valve size ①	□□□	016 025 040 050 063 080 100 160 200 250 320	
	Flange Spec. ②	□□ Specific	KF KQ KC CF JF	
			ISO-KF ISO-K ISO-F ISO-CF JIS VF	
Seal material (Disc, Bonnet, Stem) ③ (Note 1)	□□	N1 ED S1 FS R1 R2 R3 P1 P2 U1		
		FKM NBR EPDM VMQ FFKM Chemraz® Chemraz® Chemraz® Kalrez® Kalrez® ULTIC ARMOR®		
		SS592 SS630 SSE38 4079 9100 UA4640 Im case of FFKM (FS), please specify a separate material.		
CDA port position ④ (Note 2)	□ Branch port Lower part	None E S W		
		Rear Right Left Same Direction		
				
				
Sensor ⑤	□	0 1 2		
		None 1 EA 2 EA		
Solenoid or Heater Mounting ⑥	□	C N P H		
		W8H(TPC) W9HN(TPC) W9HP(TPC) D-*****[SMC]		
Valve (Note 3)	(G) or (W)	G: Mounting Solenoid valve(Applicable Model) / W:Heater exclude (Not installed)		
		VLAP- / VLBP- / VLAS- / VLBS- / VLAD- / VLBD- / VLAT- / VLSP- / VLSS- / VLBT- / VYAP- / VYAS- / VYBP- / VYBS- / VYSP- / VYSS-		
Modified special [ ]		※Please consult our technical department.		
w/Solenoid Valve Spec.	size range	016 025 040 050 063 080 100 160 200 250 320		
Single acting [V(A)S]	Solenoid Valve Spec.	RDV412-5DZ-01 RDS301-5DZ-01A (Note 4) Not Available		
Double acting [V(A)P]	Solenoid Valve Spec.	DS2120-5HZ-01 RDS5120-5DZ-03		
Solenoid valve maker: TPC / Electric power: DC24V				
w/Heater Spec.	size range	016 025 040 050 063 080 100 160 200 250 320		
Type: Silicon Rubber Heater		25W 25W 30W 45W 70W 90W 150W Not Available		
Temperature Max.: Amb.~150℃ / TC.sensor control: K-Type / Electric power: AC220V				

(Note 1) For standard products, use sealing material of vacuum secretion as a FKM (flammable O-ring).

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(Note 2) Applies only to the double and single operating valves (except VABM-series)

(Note 3) Specifications that are partially changed in standards or standards other than standard products can be specially designed to meet the customer's needs, so please consult with them.

(Note 4) Solenoid valve specification: RDS301-5DZ-02A