

PBV2 Bellows Valves

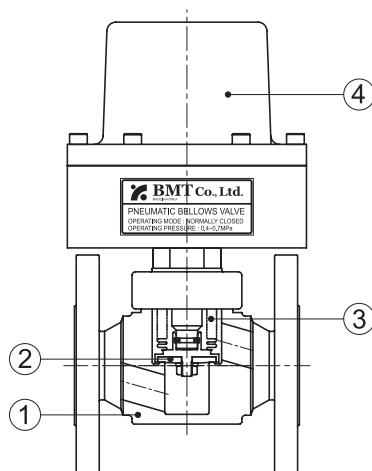
Low Pressure Pneumatic Bellows Valves (Forged Type)



Specifications

Size	3/4"	15A	1"	20A	25A	32A	40A	2"	50A
Cv Value	2.9	2.9	4.1	4.1	6.9	16	16	16	21
Orifice Size	15 mm	15 mm	19 mm	19 mm	25 mm	40 mm	40 mm	40 mm	45 mm
Max. Working Pressure	10 bar (145 psig)								
Operating Pressure	0.4 ~ 0.7 MPa (58 ~ 101 psig)								
Working Temperature	-10 ~ 80°C (14 ~ 176°F)								
Internal Leakage Allowance (He) (Holding Time ≥ 15 sec.)	≤1x10 ⁻⁵ atm.cc/s								
Inboard Leakage Allowance (He) (Holding Time ≥ 15 sec.)	≤1x10 ⁻⁵ atm.cc/s								
Particle Inspection (EP Only) (0.1µm and Larger)	No Count								

Material

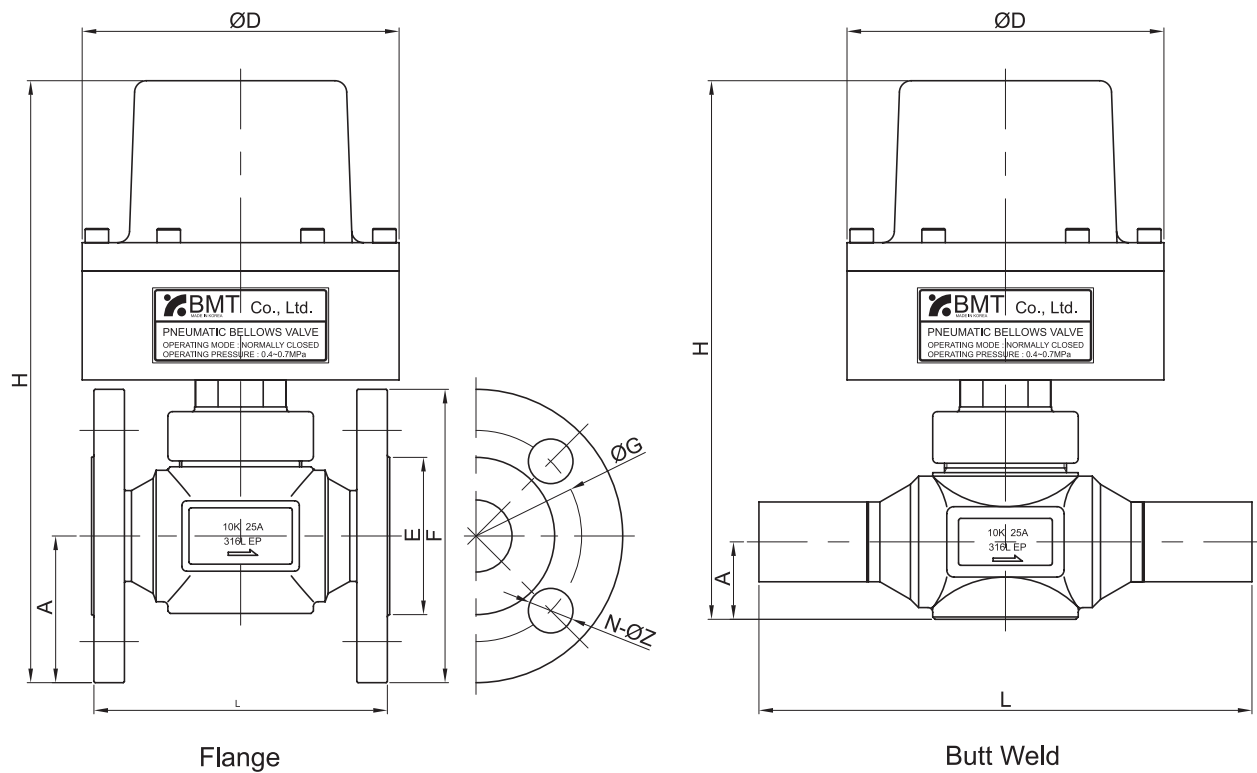


No.	Component	Material
1	Body	316L Stainless Steel
		316L Stainless Steel VAR
		304 Stainless Steel
2	Seat	PTFE (<i>standard</i>)
3	Bellows	316L Stainless Steel
4	Actuator	Aluminium

*Dimensions and Drawings are for reference only and are subject to change without prior notice.

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Dimensions



Flange

Butt Weld

Flange

Part No.	L	A	H	D	E	F	G	N	Z
SMPBV2C-FE15A	106	47.5	228	110	51	95	70	4	15
SMPBV2C-FE16	117	50	237	135	56	100	75	4	15
SMPBV2C-FE20A	117	50	237	135	56	100	75	4	15
SMPBV2C-FE25A	127	62.5	256	135	67	125	90	4	19
SMPBV2C-FE32A	165	67.5	309	188	76	135	100	4	19
SMPBV2C-FE40A	165	70	309	188	81	140	105	4	19
SMPBV2C-FE32	165	70	309	188	81	140	105	4	19
SMPBV2C-FE50A	203	77.5	350	188	96	155	120	4	19

Butt Weld

Part No.	L	A	H	D
SMPBV2C-TW15A	190	24	204	110
SMPBV2C-TW16	200	28	215	135
SMPBV2C-TW20A	200	28	215	135
SMPBV2C-TW25A	210	33	226	135
SMPBV2C-TW32A	270	51	309	188
SMPBV2C-TW40A	270	51	309	188
SMPBV2C-TW32	270	51	309	188
SMPBV2C-TW50A	295	57	350	188

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Ordering Information

Low Pressure Pneumatic Bellows Valves (Forged Type)

*Additional configurations available upon request.

A	PBV2	B	-	C	D	-	E	
SM	PBV2	C	-	FE	25A	-	P	

A Standard feature
B Optional
C Standard feature
E Optional

A	Materials	
SM	316L Stainless Steel	
DM	316L Stainless Steel VAR	
4SS	304 Stainless Steel	

B	Operation Method	
	Add an operation method designator for Pneumatic Valves .	
C	Normally Closed	
O	Normally Open	

C	Connection Type	
VM	Male BVC (BMT Vacuum Coupling)	
VF	Female BVC (BMT Vacuum Coupling)	
S	SUPERLOK Tube Fitting	
TW	Butt Weld	
VMXVF	In Male-Out Female	
FE	Flange	

E	Wetted Surface Grade	
	BA is standard. No part designator needed.	
P	EP	
AP	AP	

D	Connection Size				
	Tube				
	Designator	Nominal Size	Outside Diameter	Wall Thickness	
	16	1 in.	25.4 mm	1.65 mm	
	32	2 in.	50.8 mm	1.65 mm	
	JIS Pipe				
	Designator	Nominal Size	Outside Diameter	Schedule	Wall Thickness
	15A	15A	21.7 mm	SCH 5S	1.65 mm
	15AS			SCH 10S	2.10 mm
	20A	20A	27.2 mm	SCH 5S	1.65 mm
	20AS			SCH 10S	2.80 mm
	25A	25A	34.0 mm	SCH 5S	1.65 mm
	25AS			SCH 10S	2.80 mm
	32A	32A	42.7 mm	SCH 5S	1.65 mm
	32AS			SCH 10S	2.80 mm
	40A	40A	48.6 mm	SCH 5S	1.65 mm
	40AS			SCH 10S	2.80 mm
	50A	50A	60.5 mm	SCH 5S	1.65 mm
	50AS			SCH 10S	2.80 mm

Part Number Examples

	SMPBV2C-FE25A-P		4SSPBV2C-TW32A-AP	
Material	SM	316L Stainless Steel	4SS	304 Stainless Steel
Series	PBV2	PBV2 series	PBV2	PBV2 series
Operation Method	C	Normally Closed	C	Normally Closed
Connection Type	FE	Flange	TW	Butt Weld
Connection Size	25A	25A	32A	SCH5S, 32A
Flow Path		Omit for PBV2 series		Omit for PBV2 series
Seat Material		PTFE (standard)		PTFE (standard)
Grade	P	EP grade	AP	AP grade

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