

# AVQDV

## 急速排水弁 | Quick drain valve

Specialty Valves and Control Products **Dymatrix™**



### Compact Design

Since AVQDV is including the actuator in the body, it is light, compact and do not require the plumbing space. It is possible to install or remove the valve body easily for both vertical and horizontal piping.

### Specifications

項目	Items	Unit	Body material													
			U-PVC							PP						
			Nominal size													
			20 mm	25 mm	32 mm	40 mm	50 mm	80 mm	100 mm	20 mm	25 mm	32 mm	40 mm	50 mm	80 mm	100 mm
作動	Actuation	—	Double acting													
流体温度	Medium Temperature	°C	5 ~ 50							5 ~ 80						
構造耐圧	Proof Pressure	MPa	0.06 8.7psi													
使用圧力範囲	Working Pressure range	MPa	0 ~ 0.02 0 ~ 2.9psi													
弁座漏れ量	Leakage Rate	cm <sup>3</sup> /min	0 (at hydraulic pressure 23°C )													
背圧	Back Pressure	MPa	0													
周囲温度	Ambient Temperature	°C	5 ~ 50													
開閉頻度	Frequency of opening and closing	times/min	< 6													
取付姿勢	Installation direction	—	Any direction													
接続	Connection	—	Socket													
			Threaded													
			Flanged													
オリフィス <sup>※1</sup>	Orifice diameter	mm	φ20	φ25	φ31	φ40	φ51	φ70	φ100	φ20	φ25	φ31	φ40	φ51	φ70	φ100
Cv値 <sup>※1</sup>	Cv value	—	13.8	14.2	40.5	55	84	194	314	13.7	14.1	40	53.5	83	190	312
Pilot	Pilot pressure	MPa	0.3 ~ 0.5 43.5 ~ 72.5psi													
	Pilot air consumption	L/times(ANR)	0.024	0.09	0.19	0.44	1.17	0.024	0.09	0.19	0.44	1.17				
	Pilot port	—	Rc1/8" , FNPT1/8"													

※1. Typical values.

※2. The value on the table shows the air consumption volume when the pilot pressure is 0.5 MPa.

Ordering Code

**AVQDV** — **F** **F** ① ② **B** ③ ④ — ⑤

Type	<b>F</b> True Union
Actuation	<b>F</b> (DA) Double acting
① Body material	<b>U</b> U-PVC <b>P</b> PP
② O-ring	<b>V</b> FKM <b>E</b> EPDM <b>F</b> <b>バイロン®F</b> ※1 <i>Viflon®F</i>
③ Connection※2	<b>TD</b> Socket•DIN <b>NJ</b> Threaded•Rc <b>F1</b> Flanged•JIS10K
④ 呼び径 Nominal size	<b>020</b> ※3 20mm <b>025</b> 25mm <b>032</b> 32mm <b>040</b> 40mm <b>050</b> 50mm <b>080</b> 80mm <b>100</b> 100mm
⑤ Body material	n/a Rc 1/8" <b>N</b> FNPT 1/8"

Specifications: **B** Bellows

Ordering code example  
AVQDV-FFUVBTJ040  
AVQDV-FFUVBTJ040-N

※1: "Viflon" is the Terpolymerization Fluorocarbon Elastomere.  
※2: Please consult us for the other connecting standard for detail.  
※3: Consult us for the connecting standards "NJ" and "F1" of nominal size 20mm.

● Upstream fitting and downstream fitting in case of different connections.

**AVQDV** — **F** **F** ① ② **B** ③ ④ ⑤ — ⑥

Upstream fitting: ③ ④ Downstream fitting: ⑤ ⑥

Type	<b>F</b> True Union
Actuation	<b>F</b> Double acting
① Body material	<b>U</b> U-PVC <b>P</b> PP
② O-ring	<b>V</b> FKM <b>E</b> EPDM <b>F</b> <b>バイロン®F</b> ※1 <i>Viflon®F</i>
③④ Connection※2	<b>TJ</b> Socket•JIS <b>TD</b> Socket•DIN <b>NJ</b> Threaded•Rc <b>F1</b> Flanged•JIS10K
⑤ 呼び径 Nominal size	<b>020</b> ※3 20mm <b>025</b> 25mm <b>032</b> 32mm <b>040</b> 40mm <b>050</b> 50mm <b>080</b> 80mm <b>100</b> 100mm
⑥ Body material	n/a Rc 1/8" <b>N</b> FNPT 1/8"

Specifications: **B** Bellows

Ordering code example  
AVQDV-FFUVBTJF1040  
AVQDV-FFUVBTJN1040-N

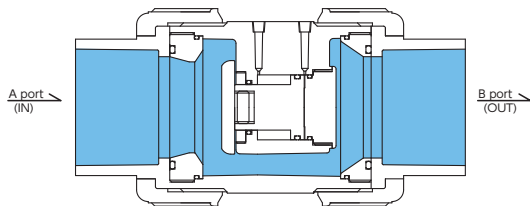
※1: "Viflon" is the Terpolymerization Fluorocarbon Elastomere.  
※2: Please consult us for the other connecting standard for detail.  
※3: Consult us for the connecting standards "NJ" and "F1" of nominal size 20mm.

Weight List (Reference)

(Unit) : kg

Body material	U-PVC			PP				
	Connection		Socket	Threaded	Flanged	Socket	Threaded	Flanged
Nominal size	mm	inch						
	20	¾	0.4	—	—	0.3	—	—
	25	1	0.4	0.4	0.9	0.3	0.3	0.6
	32	1¼	1.1	1.1	1.8	0.7	0.7	1.2
	40	1½	1.1	1.1	1.8	0.7	0.7	1.2
	50	2	1.8	1.8	2.6	1.2	1.3	1.8
	80	3	3.3	3.2	4.5	2.0	2.0	3.2
100	4	8.2	8.1	9.8	5.0	5.2	6.8	

Parts & Materials

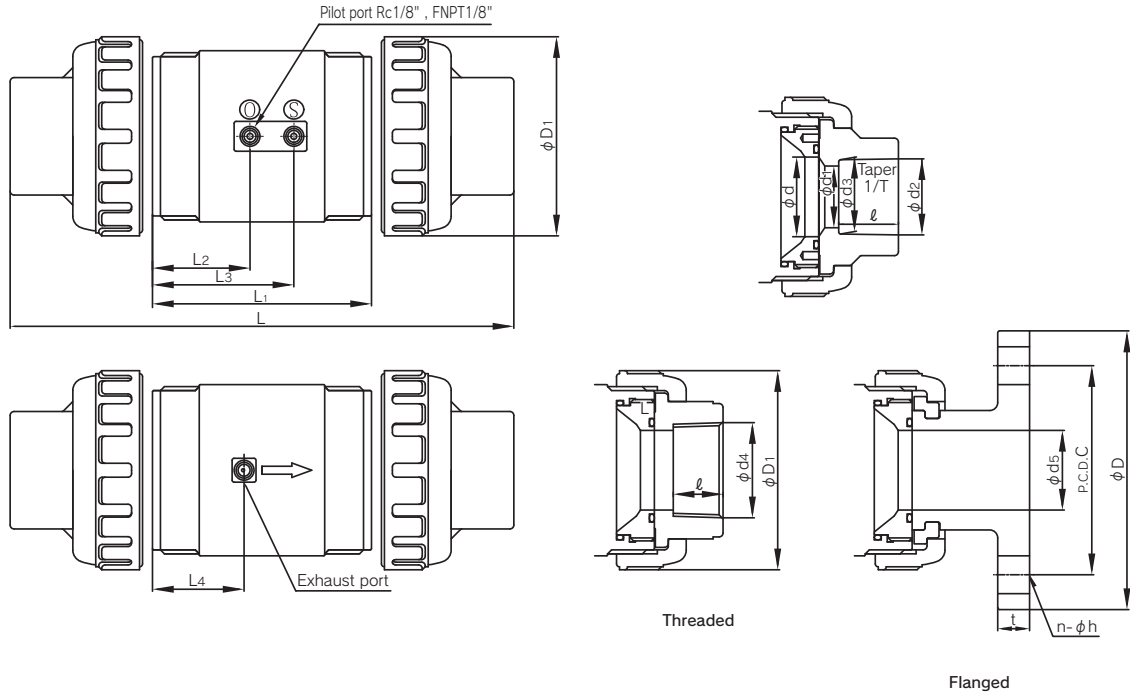


Parts	Material	Wetted parts
Body	U-PVC or PP	○
Seat	PTFE	○
O-ring	FKM / EPDM / <b>バイロン®F</b> <i>Viflon®F</i>	○

AVPV3  
AVPVM  
AVPVS  
AVSDV  
AVSDVM  
AVSDVT  
AVSAS  
AVMPV  
AVDIV  
AVVM  
AVHRL  
AVHRL-M  
AVHPRS  
AVBPR  
AVCFV  
HDV12R  
HDVM  
AVQDV  
AVBVX  
AVPJX  
AVSIV  
AVFCS2  
AVFCN  
OTHER

# Dimensions

## Socket



(Unit) : mm

Nominal size		d	Socket								Threaded				
			d <sub>1</sub>	JIS (U-PVC)				DIN (PP)				d <sub>4</sub>	ℓ	U-PVC	PP
				d <sub>2</sub>	ℓ	1/T	L	d <sub>2</sub>	d <sub>3</sub>	ℓ	L			L	L
mm	inch														
20	3/4"	25	20	26.13	24.7	1/34	132	24.5	24.3	16.5	115	Rc <sup>3</sup> / <sub>4</sub>	17	126	—
25	1"	25	25	32.16	27	1/34	140	31.5	31.3	18	118	Rc1	20	126	125
32	1 1/4"	40	31	38.19	30	1/34	190	39.45	39.2	20.5	165	Rc1 1/4	22	179	179
40	1 1/2"	40	40	48.21	37	1/37	205	49.45	49.2	23.5	165	Rc1 1/2	25	179	176
50	2	51	51	60.25	42	1/37	234	62.5	62.1	27.5	190	Rc2	28	211	208
80	3	70	78	89.6	64	1/49	300	89.2	88.85	35.5	237	Rc3	35	249	248
100	4	100	100	114.7	84	1/56	404	109.05	108.65	41.5	319	Rc4	45	347	345

※ Reference values.

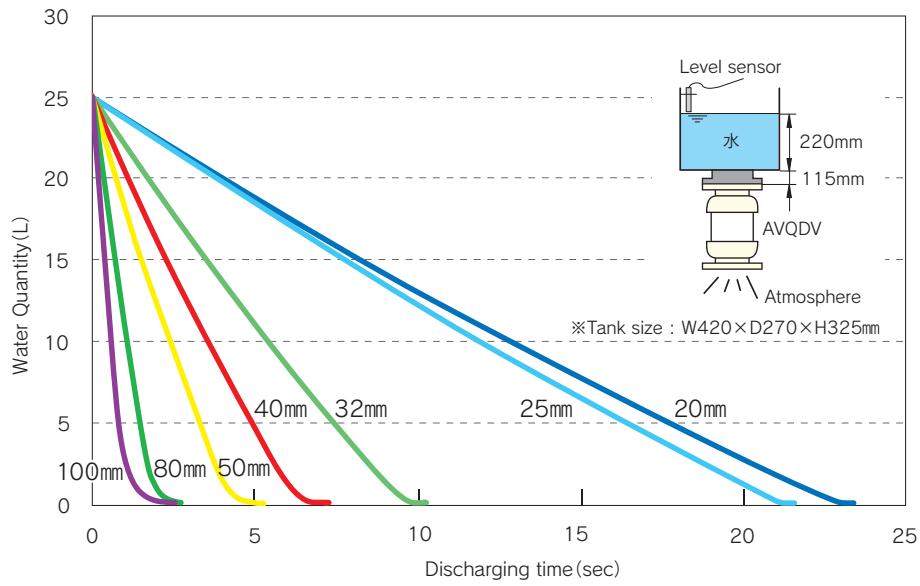
Unit) : mm

Nominal size		Flanged								L <sub>1</sub>	L <sub>2</sub>	L <sub>3</sub>	L <sub>4</sub>	D <sub>1</sub>
		JIS10K												
		d <sub>5</sub>	L	t	D	C	n	h						
mm	inch													
20	3/4"	—	—	—	—	—	—	—	—	71	34	46	31.5	70
25	1"	25	182	14	125	90	4	19	71	71	34	46	31.5	70
32	1 1/4"	40	228	16	135	100	4	19	110	110	49	71	45.5	100
40	1 1/2"	40	228	16	140	105	4	19	110	110	49	71	45.5	100
50	2	51	248	16	155	120	4	19	128	128	56	84	53.75	126
80	3	78	290	18	185	150	8	19	155	155	68.75	104.75	66.5	152
100	4	100	359	18	210	175	8	19	205	205	89	141	86.5	210

※ Reference values.

Technical Data

Draining performance



※ The data shown here is in the case of vertical piping.  
 The discharging time depends on the condition of downstream piping.  
 The data shown here is the experimental values and the reference values.

- AVP/3
- AVP/M
- AVP/S
- AVP/S
- AVSDV
- AVSD/M
- AVSD/V
- AVSAS
- AVMPV
- AVD/V
- AVN/M
- AVH/P
- AVH/P
- AVH/P
- AVB/P
- AVCFV
- HDV/2R
- HDV/W
- AVQDV
- AVB/V
- AVP/J
- AVS/V
- AVFCS2
- AVFCN
- OTHER