Specifications/Instructions

# **WIMATAKE**

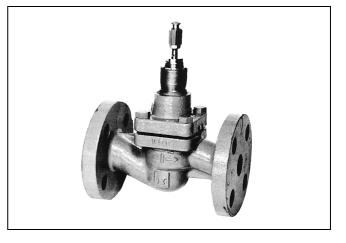
## Single Seated Two-Way Valve With Flanged-End Connection Model V5063A

### General

Model V5063A is a single seated two-way valve with cast iron body and JIS 10K flanged-end connection, and valve size ranges from DN15 to DN80.

(JIS: Japanese Industrial Standards)

Combined with a control motor Model MY3000, high-torque actuator Model MY9400, or a pneumatic actuator Model MP912/MP953, Model V5063A controls non-corrosive water (chilled/hot) or steam.



#### **Specifications**

Item	Specification					
Туре	Single seated two-way valve with flanged-end connection					
Materials	Body: Cast iron (JIS FC200) Plug, Seat: Stainless steel (JIS SCS13) Stem: Stainless steel (JIS SUS304) Packing, gasket: Non-asbestos					
Body pressure rating	1 MPa	1 MPa				
Allowable fluid temperature	0 °C to 200 °C Note: Due to the heat transmisson to the actuator to be combined, the valve may not satisfy this specification. Be sure to check the actuator specifications.					
End connection	JIS 10K flanged connection: Flat face (FF)					
Rated lift	19 mm					
Flow characteristics	Equal percentage					
Plug shape	Contoured (for DN15 and DN25 types) V-ported (for DN40 to DN80 types)					
Applicable actuators	Controle motor: Model MY3000 (With valve linkage Model Q455) High-torque actuator: Model MY9400 (With yoke assembly QMY9400A) Pneumatic actuator: Model MP912 / MP953 (\phi125 mm type)					
Standard replacement	Name	Ordering number	Applicable valve size	Descrip	tion	
parts	Stem button	228895	DN15 to DN80	M8 x 1 thre	eaded	
(Separate order is	Packing	83164120-001	DN40	For ∳8 mm stem	5 pcs	
required.)	set	83164120-002	DN50 to DN80	For $_{\varphi}$ 10 mm stem	per set	
Requirements for ordering	<ol> <li>Model number</li> <li>Actuator and linkage (if required)</li> </ol>					

#### **Model Number Specifications**

Model number	Valve size (DN)	Port size (mm)	Flow capacity (Cv)	Weight (kg)
V5063A6003		6	0.6	3.4
V5063A6011	15	8	1.0	3.3
V5063A6029	15	10	2.5	3.4
V5063A6037		15	4.0	3.3
V5063A6045	25	20	6.3	6.8
V5063A6052	25	25	11	6.6
V5063A6060	40	32	17	10.3
V5063A6078	40	40	25	10.5
V5063A6086	50	50	44	15.2
V5063A6094	65	65	68	20.4
V5063A6102	80	80	99	27.8

Note: Regarding the close-off ratings, see Table 1 on P. 2.

## Close-Off Ratings: Model V5063A combined with an electric actuator

- when using with Model MY3000/MY9400							
Valves		Operators and linkages					
Valve size	C v	Control motor Model MY3000		Model MY9400			
(DN)	Cv	Model Q455C	Model Q455F	Model QMY9400A			
15	0.6	980	980	980			
15	1.0	980	980	980			
15	2.5	980	980	980			
15	4.0	980	980	980			
25	6.3	980	980	980			
25	11	980	539	980			
40	17	470	225	902			
40	25	470	225	902			
50	44	314	137	578			
65	68	186	88	353			
80	99	127	58	235			

Table 1. Close-off ratings (kPa) when using with Model MY3000/MY9400

\* Note: Refer to the instruction of Model Q455 for a correct combination of a control motor and a linkage.

## **Safety Instructions**

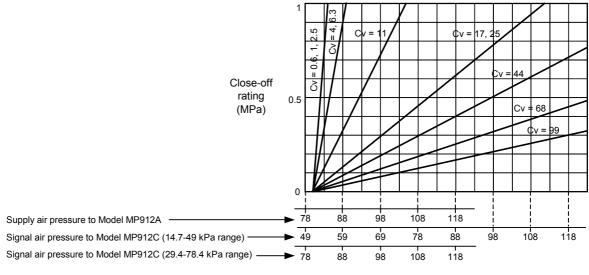
Please read instructions carefully and use the product as specified in this manual. Be sure to keep this manual nearby for ready reference.

## **Usage Restrictions**

This product is targeted for general air conditioning. Do not use this product in a situation where human life may be affected. If this product is used in a clean room or a place where reliability or control accuracy is particularly required, please contact Yamatake's sales representatives. Yamatake Corporation will not bear any responsibility for the results produced by the operators.

0	•	Installation must be performed by qualified personnel in accordance with all applicable safety standards.
0	•	This product must be operated within its operating ranges specified in this manual. Failure to comply will cause equipment damages.
0	•	Installation must be carried out under the operating conditions specified in this manual to prevent equip- ment damages.
0	•	For storage, do not stack too many container boxes in which products are packed.
0	•	Do not leave the controlled fluid frozen. Equipment damages and leakage may occur.
0	•	Make sure the flow direction and install the product in the direction and position specified in this manual. Excessively tight connection of piping and improper installation position may cause equipment damages.
0	•	Flush the piping so that no foreign substance remains. Attach a strainer at upstream side of the piping to prevent equipment damages.
0	•	After the piping installation, make sure no fluid leaks from the connecting parts.
0	•	Use a full gasket for the flat face flange to prevent equipment damages or fluid leakage.
0	•	Avoid instrumentation that keeps equipment operating cycle excessively frequent so as not to shorten the equipment operating life.
0	•	To prevent equipment damages, do not disassemble the product

#### Close-Off Ratings: Model V5063A combined with a pneumatic actuator



Air pressure to actuator (kPa)

Figure 1. Close-off ratings for the combination with Model MP912A/MP912C

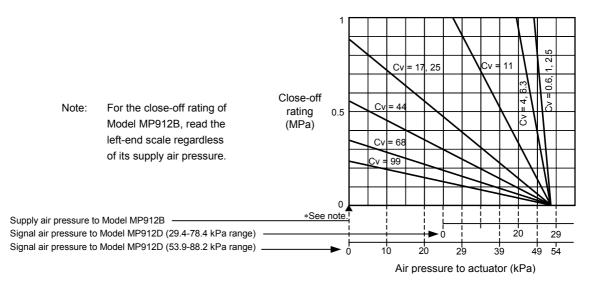
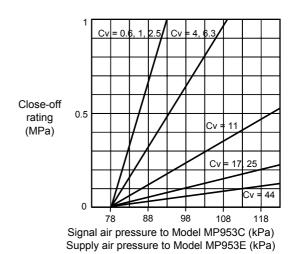
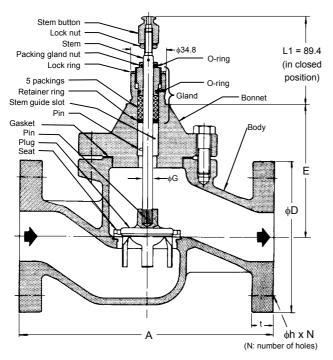


Figure 2. Close-off ratings for the combination with Model MP912B/MP912D



### **Dimensions and Parts Identification**



Valve size	DN15	DN25	DN40	DN50	DN65	DN80
A	120	184	222	254	276	298
E	82	81	103	126	176	180
φD	95	125	140	155	175	185
t	16	18	20	20	22	22
φh	15	19	19	19	19	19
N	4	4	4	4	4	8
φG	8	8	8	10	10	10

Note: For a DN15 valve, bonnet and body are connected with thread.

Figure 4. Dimensions (mm) and parts identification

### **Precautions for Installation**

- Do not install the valve to the pipe where water hammer occurs, or slag and other solid objects may accumulate.
- Install the valve in a position allowing easy access for maintenance and inspection. Be sure to secure enough clearance around the valve for maintenance and inspection (e.g., attaching/detaching the actuator, replacing a packing, etc.) See Fig. 5 for the minimum clearance for detaching the actuator.

When installing the valve in a ceiling space, provide an access hole for inspection within 50 cm radius from the valve. Additionally, place a drain pan under the valve.

- Install a bypass pipe and gate valves on the inflow, outflow and bypass sides. Also, install a strainer on the inflow side.
- 4) To prevent the valve stem from being damaged and distorted, be sure to cover the stem with a protective tube for shipment. Remove the tube right before the actuator is mounted.
- 5) Install the valve so that the fluid flowing direction agrees with the arrow indicated on the valve body.
- 6) The valve should be installed with its actuator vertically positioned above the valve.
- When the valve is combined with Model MY3000 or MY9400, install the valve with the motor shaft being horizontal.

#### Mounting of the Actuator

- Mounting of Model MY3000 control motor: Refer to the instructions of Model Q455 valve linkage.
- Mounting of Model MY9400 high-torque actuator: Remove the stem button screwed on the top of the stem. Mount the actuator with the yoke set Model QMY9400A yoke assembly.

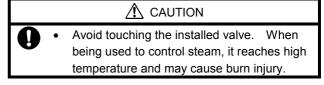
Refer to the instructions of Model MY940X.

 Mounting of Model MP912/ MP953 pneumatic actuator:

The actuator can be mounted directly onto the valve. The stem button is screwed and locked at the exact position on the valve stem, before shipment. If the position is shifted, reset it to the position specified with 'L1' in Fig. 4 by adjusting the lock nut.

Refer to the instruction of each actuator for details.

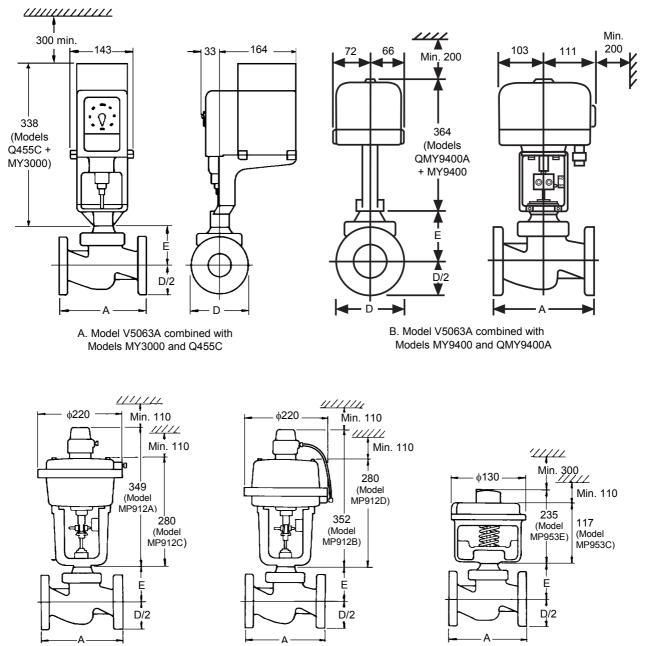
#### Inspection and Maintenance



Visually inspect fluid leakage from the inside of the valve every three month. To prevent the fluid leakage from the gland, fasten the packing with the packing gland nut. Replace the packing if it doesn't completely seal the gland.

Refer to the related instruction manuals for the actuator inspection and maintenance.

## Dimensions of Model V5063A Combined with the Actuators



- C. Model V5063A combined with Models MP912A/MP912C
- D. Model V5063A combined with Model MP912B/MP912D

E. Model VY5063A combined with Model MP953C/MP953E ( $\phi$ 125 mm type)

Valve size (DN)	15	25	40	50	65	80
А	120	184	222	254	276	298
E	82	81	103	126	176	180
φD	95	125	140	155	175	185

Figure 5. Dimensions of the valve combined with the actuators (mm)

Specifications are subject to change without notice.

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## **ΥΖΙΜΔΤΔΚΕ**