



 ewatersystems

Operating Manual

eWater VDW Auto Handwash System

Model N.
VDW-2PB-SC-EW

Have a Question?
Speak to the eWater Support Team

knowledge.ewatersystems.com
1300 EWATER

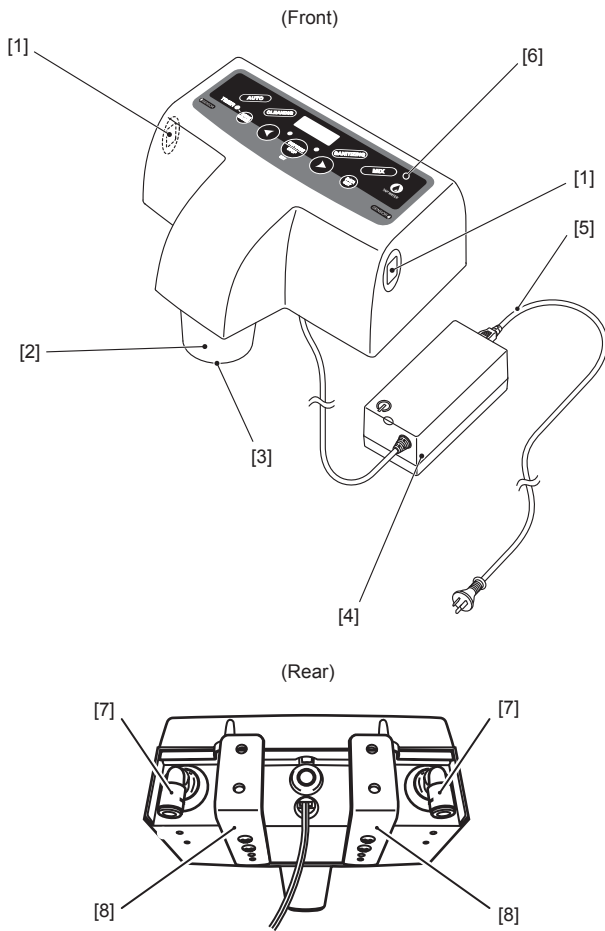
Original Equipment
Manufacturer



In the context of this manual, the term "sanitizing water" refers to acidic water and "cleaning water" refers to alkaline water.

1. CONSTRUCTION

[a] VALVE UNIT



[1] Dispense sensor
Functions in the same way as the dispense/stop button. Senses a hand or object to start and stop dispensing electrolyzed water without using the dispense/stop button. The detection range is 50 mm.

[2] Electrolyzed water outlet
Dispenses sanitizing water or cleaning water.

[3] Outlet lamp
Provided inside the electrolyzed water outlet. Illuminates in red while sanitizing water is being dispensed and in blue while cleaning water is being dispensed.

[4] AC adapter
1 phase 100 - 240V

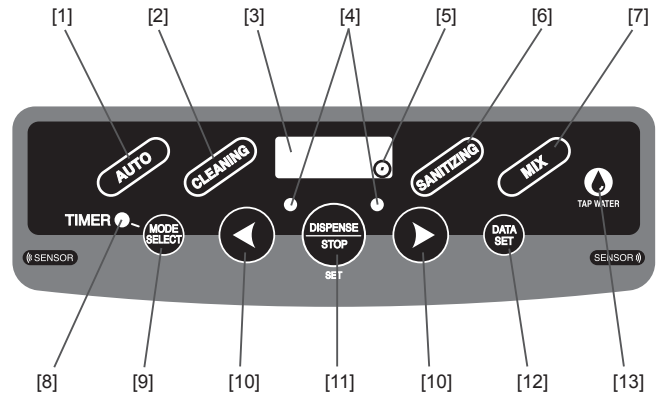
[5] Power cord (with plug)
If the power cord is damaged, it must be replaced by a special cord or assembly available from the manufacturer or its service agent.

[6] Operation panel
Provided with operation buttons, display, and lamps.

[7] Quick fitting
Connected to the water delivery lines.

[8] Mounting bracket
Fixes the product to the wall.

[b] OPERATION PANEL



[1] Auto lamp (orange)
Comes on in the automatic dispensing mode.

[2] Cleaning lamp (blue)
Flashes while cleaning water is being dispensed. Stays off in standby for the automatic dispensing mode and stays on in standby for the timer dispensing or continuous dispensing mode.

[3] Display
Indicates the dispensing time and data settings.

[4] Select lamp (blue, red)
Indicates the type of electrolyzed water available by pressing the dispense/stop button in the timer dispensing or continuous dispensing mode.
Also indicates the type of electrolyzed water being dispensed.
Cleaning water = left, blue
Sanitizing water = right, red

[5] Valve reversal mark
Comes on while the valve operation is reversed (with "U9" set to "1").
See "5. [a] STANDARD SETTINGS".

[6] Sanitizing lamp (red)
Flashes while sanitizing water is being dispensed. Stays off in standby for the automatic dispensing mode and stays on in standby for the timer dispensing or continuous dispensing mode.

[7] Mix lamp (green) [option required]
Flashes while mixed water is being dispensed. Stays off in standby for the automatic dispensing mode and stays on in standby for the timer dispensing or continuous dispensing mode.

[8] Timer lamp (orange)
Comes on or goes off when the mode select button is pressed.
Timer dispensing mode = ON
Continuous dispensing mode = OFF

[9] Mode select button
Switches between the timer dispensing and continuous dispensing modes.

[10] Shift button
Shifts to another dispensing mode. See "4. [a] DISPENSING MODES".

[11] Dispense/stop button
Starts and stops dispensing electrolyzed water.

[12] Data set button
Press to check or adjust the dispensing mode settings.

[13] Tap water lamp (orange) [option required]
Flashes while tap water is being dispensed. Stays off in standby for the automatic dispensing mode and stays on in standby for the timer dispensing or continuous dispensing mode.

[c] ACCESSORIES

Instruction manual	1	Hose clamp	2
Quick fitting	2	Quick fitting hose (1 m long)	2
Truss head machine screw (with plastic washer)	6	Filter	2
Quick joint	2	Nut	2

2. INSTALLATION

IMPORTANT
To prevent water leaks and abnormal noise, connect both sanitizing water and cleaning water delivery pipes to the valve.

[a] WATER DELIVERY LINES

1) Run the water delivery pipes from the water electrolyzer to within a short distance of the quick fittings provided on the back of the valve.

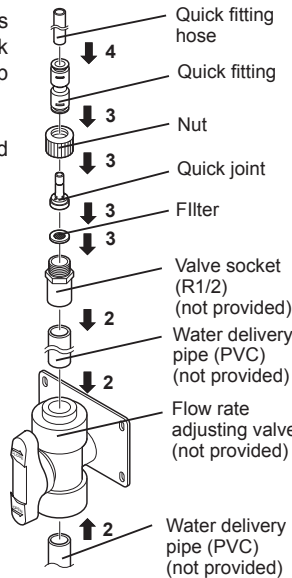
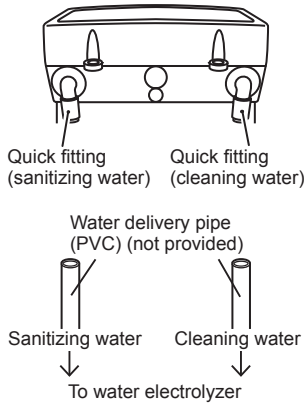
IMPORTANT
Use 13A or equivalent PVC pipes for the end pipes from the electrolyzer.

2) Attach water delivery pipes (13A or equivalent PVC) (not provided) and valve sockets (R1/2) (not provided) to flow rate adjusting valves (not provided).

3) Attach the accessory filters, quick joints, and nuts to the valve sockets in step 2). Attach the accessory quick fittings to the quick joints.

4) Cut the accessory quick fitting hoses to a suitable length. Attach the quick fitting hoses to the quick fittings in step 3).

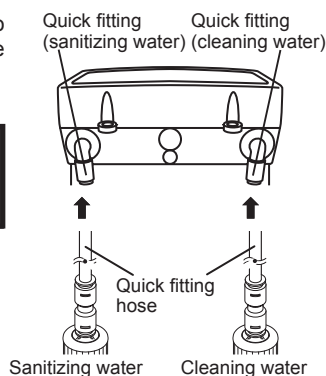
5) Flush the water circuit with electrolyzed water to wash away dirt inside.



6) Remove the nuts from the valve sockets and take out the filters. Remove dirt from the filters and reattach the nuts and the filters to the valve sockets.

7) Connect the quick fitting hoses to the quick fittings on the back of the valve unit.

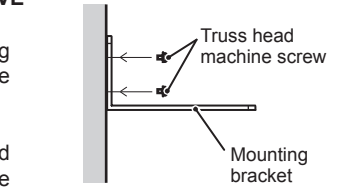
IMPORTANT
Before connecting the hoses, check the types of electrolyzed water one more time.



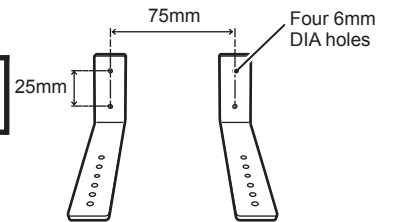
[b] AUTOMATIC DISPENSING VALVE

1) Unscrew and remove the mounting brackets from the bottom of the valve.

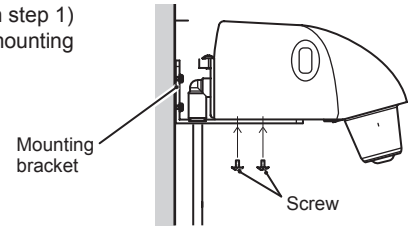
2) Use the accessory truss head machine screws to secure the mounting brackets to the wall.



IMPORTANT
Make screw holes as shown on the right.



3) Use the screws removed in step 1) to secure the valve to the mounting brackets.



3. TRIAL RUN

After the installation is complete, check the valve as follows:

- 1) Check the power supply and voltage.
 - * Is the valve plugged into a separate power supply?
- 2) Plug in the AC adapter.
 - * Is the AC adapter plugged in securely?
- 3) Provide instructions to the user.
 - * Has the end user been instructed on how to operate the valve?
- 4) Hand over the manual to the user.
 - * Has the end user been given the instruction manual?

4. DISPENSING MODES

[a] DISPENSING MODES

The following three dispensing modes are available:

Automatic Dispensing Mode

The valve dispenses electrolyzed water in the preset order and stops. Factory adjustment: 1) Cleaning water 15 seconds, 2) Sanitizing water 15 seconds, 3) Stop

The type of electrolyzed water and dispensing time are adjustable. See "5. [a] STANDARD SETTINGS".

Timer Dispensing Mode

The valve dispenses the selected type of electrolyzed water for the preset time and stops. The dispensing time is adjustable. See "5. [a] STANDARD SETTINGS".

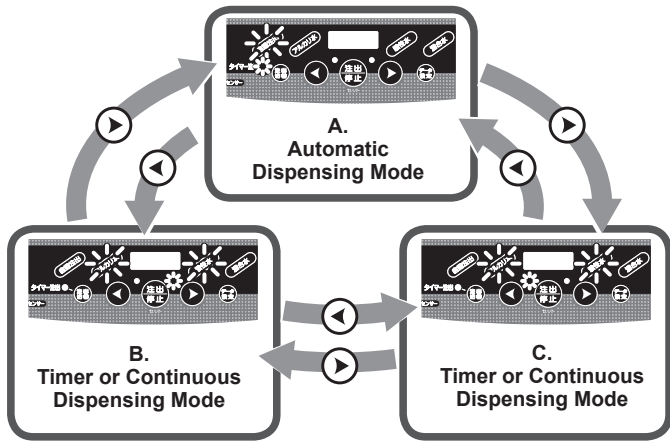
Continuous Dispensing Mode

The valve dispenses the selected type of electrolyzed water continuously up to 300 seconds.

Note: After dispensing sanitizing water, the valve dispenses neutralizing (cleaning) water automatically to prevent corrosion of the stainless steel parts and drain pipes. The dispensing time is adjustable from 0 to 10 seconds in 0.5 second steps (factory adjusted to 1.5 seconds). See "5. [a] STANDARD SETTINGS".

IMPORTANT
Automatically dispensed neutralizing (cleaning) water is not enough to prevent corrosion of the stainless steel parts and drain pipes. Always use tap water to thoroughly rinse these parts after using electrolyzed water.

Use the shift buttons to select the desired dispensing mode. The mode changes every time the left or right shift button is pressed.



A. Automatic Dispensing Mode

Auto lamp: ON
 Timer lamp: ON
 Type of water: 1) Cleaning, 2) Sanitizing

B. Timer or Continuous Dispensing Mode

Cleaning lamp: ON
 Sanitizing lamp: ON
 Select lamp (red): ON
 Type of water: Sanitizing
 Timer lamp ON: Timer dispensing mode
 Timer lamp OFF: Continuous dispensing mode

C. Timer or Continuous Dispensing Mode

Cleaning lamp: ON
 Sanitizing lamp: ON
 Select lamp (blue): ON
 Type of water: Cleaning
 Timer lamp ON: Timer dispensing mode
 Timer lamp OFF: Continuous dispensing mode

[b] AUTOMATIC DISPENSING MODE

The valve dispenses cleaning water first, then sanitizing water (factory adjustment: 15 seconds each). See “5. [a] STANDARD SETTINGS”.

- 1) Plug in the AC adapter securely. The auto lamp and timer lamp come on.
- 2) Press the dispense/stop button, or hold a hand over the left or right dispense sensor.

The cleaning lamp flashes, the outlet lamp illuminates in blue, and cleaning water is dispensed for 15 seconds.

The sanitizing lamp flashes, the outlet lamp illuminates in red, and sanitizing water is dispensed for 15 seconds.

The two select lamps flash, and neutralizing (cleaning) water is automatically dispensed for 1.5 seconds. See “[a] DISPENSING MODES”.

To stop dispensing the water:

- 3) Press the dispense/stop button, or hold a hand over the left or right dispense sensor. The auto lamp, timer lamp, and outlet lamp go off, and the water stops.

Note: If sanitizing water is dispensed last, the two select lamps flash, and neutralizing (cleaning) water is automatically dispensed for 1.5 seconds. See “[a] DISPENSING MODES”.

[c] TIMER DISPENSING MODE

The valve dispenses cleaning water or sanitizing water, whichever is selected, for a specific time (factory adjustment: 15 seconds). See “5. [a] STANDARD SETTINGS”.

The water can be dispensed by using either the dispense/stop button or the dispense sensor.

- 1) Plug in the AC adapter securely. The auto lamp and timer lamp come on.
- 2) [Dispense/stop button]
 Press the left or right shift button to switch on the select lamp for the desired water (red: sanitizing water, blue: cleaning water). The cleaning lamp, sanitizing lamp, and select lamp (red or blue) come on.

[Dispense sensor]
 Press the left or right shift button. The cleaning lamp, sanitizing lamp, and select lamp (either red or blue is OK) come on.

- 3) Check that the timer lamp is on.

Note: If the timer lamp is on, the timer dispensing mode is available. If the timer lamp is off, press the mode select button to switch on the timer lamp.

- 4) Press the dispense/stop button, or hold a hand over the dispense sensor for the desired water.

The display starts counting down, and the selected water is dispensed for 15 seconds.

While cleaning water is dispensed, the cleaning lamp flashes and the outlet lamp illuminates in blue.

While sanitizing water is dispensed, the sanitizing lamp flashes and the outlet lamp illuminates in red.

Note: [Dispense sensor]
 To change the type of water in the middle of dispensing, hold a hand over the opposite side of the dispense sensor.

To stop dispensing the water:

- 5) Press the dispense/stop button, or hold a hand over the left or right dispense sensor. The timer lamp and outlet lamp go off, and the water stops.

Note: If sanitizing water is dispensed last, the two select lamps flash, and neutralizing (cleaning) water is automatically dispensed for 1.5 seconds. See “[a] DISPENSING MODES”.

[d] CONTINUOUS DISPENSING MODE

The valve dispenses cleaning water or sanitizing water, whichever is selected, continuously.

The water can be dispensed by using either the dispense/stop button or the dispense sensor.

- 1) Plug in the AC adapter securely. The auto lamp and timer lamp come on.
- 2) [Dispense/stop button]
 Press the left or right shift button to switch on the select lamp for the desired water (red: sanitizing water, blue: cleaning water). The cleaning lamp, sanitizing lamp, and select lamp (red or blue) come on.

[Dispense sensor]
 Press the left or right shift button. The cleaning lamp, sanitizing lamp, and select lamp (either red or blue is OK) come on.

- 3) Check that the timer lamp is off.

Note: If the timer lamp is off, the continuous dispensing mode is available. If the timer lamp is on, press the mode select button to switch off the timer lamp.

- 4) Press the dispense/stop button, or hold a hand over the dispense sensor for the desired water.

The display starts counting up, and the selected water is dispensed continuously.

While cleaning water is dispensed, the cleaning lamp flashes and the outlet lamp illuminates in blue.

While sanitizing water is dispensed, the sanitizing lamp flashes and the outlet lamp illuminates in red.

Note: [Dispense sensor]

To change the type of water in the middle of dispensing, hold a hand over the opposite side of the dispense sensor.

To stop dispensing the water:

- 5) Press the dispense/stop button, or hold a hand over the left or right dispense sensor. The timer lamp and outlet lamp go off, and the water stops.

Note: If sanitizing water is dispensed last, the two select lamps flash, and neutralizing (cleaning) water is automatically dispensed for 1.5 seconds. See “[a] DISPENSING MODES”.

5. ADJUSTMENT

The default settings for the dispensing operation can be checked and adjusted.

[a] STANDARD SETTINGS

* < > = optional setting

Code	Item	Description	Default
U1	1st water & dispensing time in automatic dispensing mode	0: None, 1: Cleaning, 2: Sanitizing, <3: Mixed>, <4: Tap> 1 to 200 sec (in 1 sec steps)	1: Cleaning 15 sec
U2	2nd water & dispensing time in automatic dispensing mode	0: None, 1: Cleaning, 2: Sanitizing, <3: Mixed>, <4: Tap> 1 to 200 sec (in 1 sec steps)	2: Sanitizing 15 sec
U3	3rd water & dispensing time in automatic dispensing mode	0: None, 1: Cleaning, 2: Sanitizing, <3: Mixed>, <4: Tap> 1 to 200 sec (in 1 sec steps)	0: None 15 sec
U4	4th water & dispensing time in automatic dispensing mode	0: None, 1: Cleaning, 2: Sanitizing, <3: Mixed>, <4: Tap> 1 to 200 sec (in 1 sec steps)	0: None 15 sec
U5	5th water & dispensing time in automatic dispensing mode	0: None, 1: Cleaning, 2: Sanitizing, <3: Mixed>, <4: Tap> 1 to 200 sec (in 1 sec steps)	0: None 15 sec
U6	Cleaning water dispensing time in timer dispensing mode	1 to 200 sec (in 1 sec steps)	15 sec
U7	Sanitizing water dispensing time in timer dispensing mode	1 to 200 sec (in 1 sec steps)	15 sec
U8	Neutralizing (cleaning) water dispensing time	0 to 10 sec (in 0.5 sec steps)	1.5 sec
U9	Valve reversal (*1)	0: L-cleaning, R-sanitizing 1: L-sanitizing, R-cleaning	0: L-cleaning, R-sanitizing
U10	Undetectable time after switching sensor ON/OFF (*2)	0 to 10 sec (in 0.5 sec steps)	1.5 sec
U11	Left/right sensor distinction (*3)	0: Yes 1: No	0: Yes
U12	Countdown in automatic dispensing mode (*4)	0: Individual 1: Total	0: Individual
U13	Cleaning water outlet lamp color & brightness (*5)	0 to 100% (in 1% steps)	Blue: 90% Red: 0% Green: 0%
U14	Sanitizing water outlet lamp color & brightness (*6)	0 to 100% (in 1% steps)	Blue: 0% Red: 90% Green: 0%
U20	Dispensing mode lock (*7)	0: Unlocked 1: Locked	0: Unlocked
U50	Initialization (*8)	0: None 1: Initialize	0: None

- *1 Open/close the solenoid valve opposite to the detecting sensor.
*2 Set the sensor response speed.
*3 Make the left and right sensors indistinctive.
*4 Select the automatic dispensing mode countdown between individual dispensing time for each type of water or total dispensing time.
*5 Adjust the color and brightness of the outlet lamp for cleaning water.
*6 Adjust the color and brightness of the outlet lamp for sanitizing water.
*7 Lock the mode select button and shift buttons.
*8 Reset all the settings to the default settings.

[b] OPTIONAL SETTINGS (OPTION REQUIRED)

Code	Item	Description	Default
U15	Mixed water dispensing time in portion dispensing mode	1 to 200 sec (in 1 sec steps)	15 sec
U16	Mixed water outlet lamp color & brightness (*8)	0 to 100% (in 1% steps)	Blue: 0% Red: 0% Green: 90%
U17	Tap water dispensing time in portion dispensing mode	1 to 200 sec (in 1 sec steps)	15 sec
U18	Tap water outlet lamp color & brightness (*9)	0 to 100% (in 1% steps)	Blue: 40% Red: 40% Green: 0%
U19	Tap water addition (*10)	0: No 1: Yes	0: No

*8 Adjust the color and brightness of the outlet lamp for mixed water.

*9 Adjust the color and brightness of the outlet lamp for tap water.

*10 Add tap water to sanitizing water, cleaning water, and mixed water.

[c] ADJUSTING AUTOMATIC DISPENSING MODE

The type and dispensing time of the first to fifth water to be dispensed in the automatic dispensing mode are adjustable (codes “U1” to “U5”). The dispensing time is adjustable from 1 to 200 seconds in 1 second steps. See “[a] STANDARD SETTINGS”.

Factory adjustment: 1) Cleaning water 15 seconds
2) Sanitizing water 15 seconds

1) Plug in the AC adapter securely. The auto lamp and timer lamp come on.

2) Press and hold the data set button for more than 3 seconds. “USEr” appears on the display.

3) Press the shift button to have “U1” on the display. The type and dispensing time of the first water becomes adjustable.

Note: To adjust the second water, have “U2” on the display.

4) Press the dispense/stop button. The current setting appears on the display, and the left digit (type of water) flashes.

5) Press the shift button to select the desired type of water (1: cleaning water, 2: sanitizing water).

6) Press the dispense/stop button to set the type of water. The left digit stops flashing, and the right digits (dispensing time) start flashing.

7) Press the shift button to adjust the dispensing time.

Note: The dispensing time is adjustable up to 200 seconds in 1 second steps.

8) Press the dispense/stop button to set the dispensing time. “U1” appears on the display.

Note: To adjust the type and dispensing time of the second to fifth water, repeat the above steps 3) to 8).

If there is no need to set the third to fifth water, set the type of the third water to “0”.

9) Press and hold the data set button for more than 3 seconds. The valve returns to the normal mode with “oooo” on the display, and the setting is stored.

[d] ADJUSTING TIMER DISPENSING MODE

The dispensing time in the timer dispensing mode is adjustable (codes "U6" and "U7").

The dispensing time is adjustable from 1 to 200 seconds in 1 second steps. See "[a] STANDARD SETTINGS".

Factory adjustment: 15 seconds

- 1) Plug in the AC adapter securely. The auto lamp and timer lamp come on.
- 2) Press and hold the data set button for more than 3 seconds. "USER" appears on the display.
- 3) Press the shift button to have "U6" (cleaning water) or "U7" (sanitizing water) on the display.
- 4) Press the dispense/stop button. The current setting appears and flashes on the display.
- 5) Press the shift button to adjust the dispensing time.
- 6) Press the dispense/stop button to set the dispensing time. "U6" or "U7" appears on the display.
- 7) Press and hold the data set button for more than 3 seconds. The valve returns to the normal mode with "oooo" on the display, and the setting is stored.

Note: To adjust the other settings, press the shift button.

[e] ADJUSTING OTHER MODES

The other modes are also adjustable (codes "U8" to "U14", "U50"). See "[a] STANDARD SETTINGS".

- 1) Plug in the AC adapter securely. The auto lamp and timer lamp come on.
- 2) Press and hold the data set button for more than 3 seconds. "USER" appears on the display.
- 3) Press the shift button to have the desired code on the display. See "[a] STANDARD SETTINGS".
- 4) Press the dispense/stop button. The current setting appears and flashes on the display.
- 5) Press the shift button to adjust the setting.
- 6) Press the dispense/stop button to set the adjusted setting. The code appears on the display.

Note: To adjust the other settings, repeat the above steps 3) to 6).

- 7) Press and hold the data set button for more than 3 seconds. The valve returns to the normal mode with "oooo" on the display, and the setting is stored.

6. MAINTENANCE

IMPORTANT

1. Use a neutral cleaner for daily maintenance. As a sanitizer, we recommend the use of invert soap (benzalkonium chloride) available at a drugstore.
2. To prevent damage to the painted or plastic surfaces, do not use thinner, benzine, alcohol, petroleum, soap powder, polishing powder, alkaline detergent, acid, scrub brush, and especially cleanser for use on fans and cooking ranges. Also, to prevent corrosion, do not use a chlorine bleach.
3. Follow the manufacturer's instructions when using a disposable cloth.
4. Remove heavy soil as required.

7. BEFORE CALLING A SERVICE AGENT

If something seems wrong with the valve, check for possible causes according to the following instructions.

If the problem still exists, unplug the AC adapter, and contact an authorized Hoshizaki service company.

Only qualified personnel may repair the unit. Do not attempt to repair it yourself.

Problem	Possible Cause	Remedy
Abnormal noise	Operating sounds (clicks, clacks)	No problem (solenoid valve opens/closes).
	Unstable installation	Contact an authorized Hoshizaki service company.
	Contact with other objects	Keep them away from the valve.
Electrolyzed water is not available	Power failure	Wait until power is resumed.
	Unplugged	Plug in the AC adapter.
	Electrolyzer water tank level is too low	Wait until the water tank level reaches the minimum level.
Sensor does not detect	Water delivery pipe is disconnected and leaking	Contact an authorized Hoshizaki service company.
	Sensor is not clean	Clean.
Electrolyzed water comes out unexpectedly	Some reflective object (glass, metal) is nearby	Keep it away from the valve.
Water leaks	Water leaks from the valve	Contact an authorized Hoshizaki service company.
	Water delivery pipe is bent and crushed	
	Water delivery pipe is disconnected	

8. WARRANTY

Hoshizaki warrants to the original owner/user that all Hoshizaki branded products shall be free of defects in material and/or workmanship for the duration of the "warranty period". The warranty shall be effective for one year from the date of installation.

Hoshizaki's liability under the terms of the warranty are limited and shall exclude routine servicing, cleaning, essential maintenance and/or repairs occasioned by misuse and installations not in accordance with Hoshizaki guidelines.

Warranty repairs should be completed by an approved Hoshizaki dealer or service agency using genuine Hoshizaki components.

To obtain full details of your warranty and approved service agency, please contact:

e-Water Systems Pty Ltd
 TEL : 1300 EWATER
 FAX: +61(3) 9686 1377

9. SPECIFICATIONS

Model	VDW-2PB-EW VDW-2PB-G-EW VDW-2PB-SC-EW
Power Supply	1 phase 100 - 240V 47 - 63Hz 0.05kVA (Unit: 12V DC)
Electric Consumption	25W/25W
Dimensions	196mm(W) x 174mm(D) x 112mm(H) Depth: Adjustable 174 - 204mm in 10mm steps
Exterior	ABS plastic
Water Electrolyzer Connections	Two quick fittings (cleaning water, sanitizing water)
Safety Device	Overvoltage protection, overcurrent protection, short circuit protection
Weight	2kg
Operating Conditions	Indoor Ambient Temperature: 5 - 35°C Water Supply Pressure: 0.2MPa from water electrolyzer