



# Coway

## Water Filtration Device **CHP-03AR/L/U**

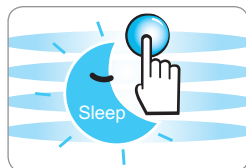
- This product can not be used if the voltage is different from that mentioned in the rating plate.
- For your safety and proper use of the product, please read this User's Manual before use.
- Warranty card is included in this User's Manual.



# FEATURES

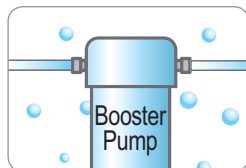
## 1. Power saving function using the light sensor

If you press the "Sleep" button, as it decreases the driving times of the motor and the heater at night automatically, the amount of the power consumption is decreased.



## 2. Booster pump for boosting the main water (CHP-03AR)

It equipped the booster pump to show the uniform filtering abilities in the region with the low main water pressure.



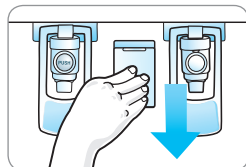
## 3. Low water level detecting function

It decreases the power consumption by stopping the working of the motor and the heater when the water level in the storage tank is lowered due to the water failure.



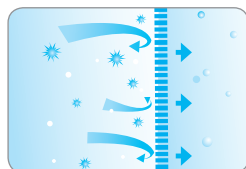
## 4. Front draining system

It is convenient as it can drain the hot water from the front side without moving the product when you open the front draining door.



## 5. Fine particles filtering system

It minimized the amount of the fine particle that can be entered into the water tank by equipping the inno-sence filter.



# DEAR CUSTOMERS

Thank you for using our **Coway Water Filtration Device.**

Please read this Users' Manual to use and maintain the product correctly.

If you encounter a problem while using the product, you may solve the problem referring to the User's Manual. As this manual contains the product warranty card, please keep it in a safe place. This system (CHP-03AR/L/U) conforms to NSF/ANSI 42 for aesthetic chlorine reduction and NSF/ANSI 53 for VOC reduction as verified and substantiated by test data.

This system (CHP-03AR/L) conforms to NSF/ANSI 58 for the reduction of pentavalent arsenic, barium, cadmium, selenium, radium 226/228, trivalent chromium, hexavalent chromium, lead, nitrate/nitrite as verified and substantiated by test data.

This system (CHP-03AR/L) registered in California.

See performance data sheet for individual contaminants and reduction performance.

This system (CHP-03AR/L) is acceptable for treatment for influent concentrations of no more than 27 mg/L nitrate and 3 mg/L nitrite in combination measured as N and is certified for nitrate/nitrite reduction only for water supplies with a pressure of 280 kPa(40 psi) or greater.

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# SAFETY INFORMATION

## Be careful to keep this safety information.

Please read this information to prevent property loss and ensure your safety.



**Danger**

If not observed,  
serious injury or  
even death could  
occur.



**Warning**

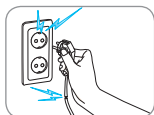
If not observed,  
serious injury or  
property damage  
could occur.



**Caution**

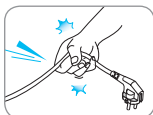
If not observed, slight  
injury or property  
damage could occur.

## | Electricity safety |



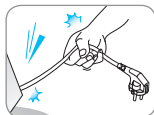
- ⚠ **Do not use a damaged power cord or plug, and loose outlet.**

Otherwise, electric shock or fire may occur as a result.



- ⚠ **Do not pull the power cord.**

Otherwise, electric shock or fire may occur as a result.



- ⚠ **Do not carry the unit by its power cord.**

Otherwise, electric shock or fire may occur as a result.



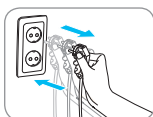
- ⚠ **Do not touch the power plug with a wet hand.**

Otherwise, electric shock or fire may occur as a result.



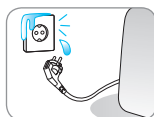
- ⚠ **Do not forcefully bend the power cord or put it under a heavy object to prevent it from being damaged or deformed.**

Otherwise, electric shock or fire may occur as a result.



- ⚠ **Do not connect and pull out the power plug repeatedly.**

Otherwise, electric shock or fire may occur as a result.



- ⚠ **If the electric outlet is wet, carefully unplug the unit and let the electric outlet completely dry before subsequent use.**

Otherwise, electric shock or fire may occur as a result.



- ⚠ **Unplug the product before repair, inspection, or parts replacement.**

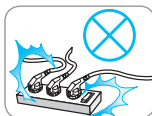
Otherwise, electric shock or fire may occur as a result.





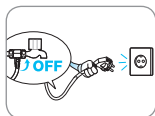
- ⚠ Remove any dust or water off in the pin and contacts of the power plug.

Otherwise, electric shock or fire may occur as a result.



- ⚠ Do not plug into an outlet that is being used by several other appliances. Use an electrical outlet dedicated.

Otherwise, fire may occur as a result.



- ⚠ When you don't use for a long time, close the main water supply valve and unplug.

Otherwise, electric shock or fire may occur as a result.



- ⚠ Do not attempt to repair or modify the power cord at your discretion.

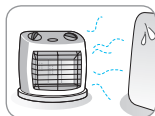
Otherwise, electric shock or fire may occur as a result.



- ⚠ In the case the power cord is damaged, do not replace the cord yourself. Call Coway Service Center to have it replaced.

Otherwise, electric shock or fire may occur as a result.

## Installation safety



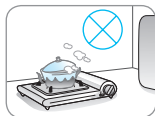
- ⚠ Do not install near a heating device.

Otherwise, fire may occur as a result.



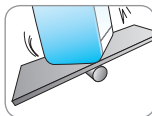
- ⚠ Avoid installing the system in places where the air is damp, dust is accumulated, or water drops.

Otherwise, electric shock or fire may occur as a result.



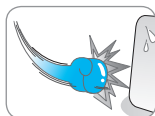
- ⚠ Do not place or use the flammable gases, nor the flammable materials near the product.

Otherwise, electric shock or fire may occur as a result.



- ⚠ Do not install the product on a sloped floor.

Injury to the user or damage to the unit may result.



- ⚠ Do not press the product by constraint or impact.

Injury to damage to the unit may result.



- ⚠ The filtration device installation shall comply with applicable state and local regulations.

# SAFETY INFORMATION



**Danger**

If not observed, serious injury or even death could occur.



**Warning**

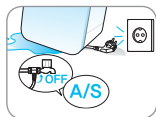
If not observed, serious injury or property damage could occur.



**Caution**

If not observed, slight injury or property damage could occur.

## Operation safety



- ⚠ When the water is coming inside of the product or there is a puddle on the product, call Service Center after closing the supplying valve and unplugging.

Otherwise, electric shock may occur as a result.



- ⚠ If our product produces a strange noise or odd smell, immediately unplug from the electrical outlet and call our Service Center.

Otherwise, electric shock or fire may occur as a result.



- ⚠ Do not put the candle, a light for cigarette on the products.

Otherwise, fire may occur as a result.



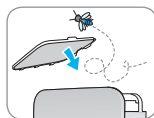
- ⚠ Do not place any containers with water, medicine, food, small metallic objects, or any flammable material on the top of the product.

In the case foreign material gets inside the product, electric shock, fire, product damage may occur as a result.



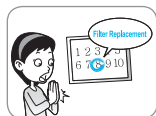
- ⚠ Do not allow hot water to come in contact with the human body.

Otherwise, burn may occur as a result.



- ⚠ Use after closing the water tank cover completely inside of the product.

The buck or the foreign body can be entered.



- ⚠ To drink the filtered water, change the filter according to the filter replacement cycle.

If you use the expired filter, the filter performance is lowered.



- ⚠ When you don't use for a long time, use after draining the saved water completely and emptying the newly room water once again.

The saved water can be polluted.



Danger

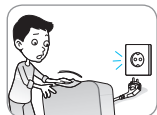


Warning



Caution

## | Others |



- ⚠ Clean after unplugging.**  
Otherwise, electric shock or fire may occur as a result.



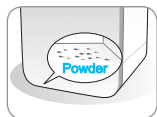
- ⚠ Do not clean by spraying the water directly or don't wipe the product using the benzene and thinner.**  
Otherwise, electric shock or fire may occur as a result.



- ⚠ Do not repair, disassemble, or modify.**  
Otherwise, electric shock or product damage may occur as a result.



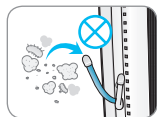
- ⚠ Do not use filtered water for the water exchange of an aquarium or a fishbowl.**  
The room water through the membrane isn't suitable for the fish's life environment as it removed the ionic material. In some cases, fishes might even die.



- ⚠ After moving the product or replacing the inno-sense filter, the black powder can be remained in the inner bottom of the water tank.**  
It is quiet harmless as the powder of the activated carbon used in the inno-sense filter was flowed out for improving the water tastes.



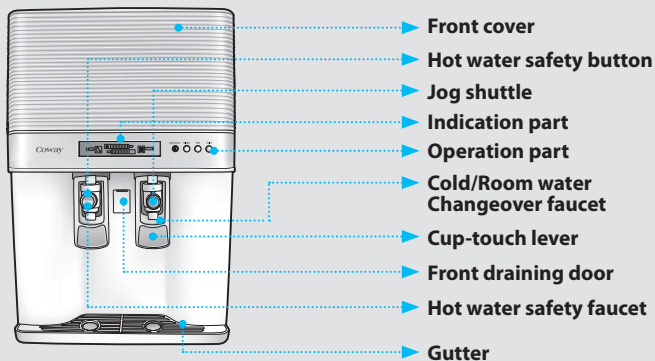
- ⚠ Rotate with grasping the room water extraction faucet or don't raise the product using the faucet.**  
Otherwise leakage or product damage may occur as a result.



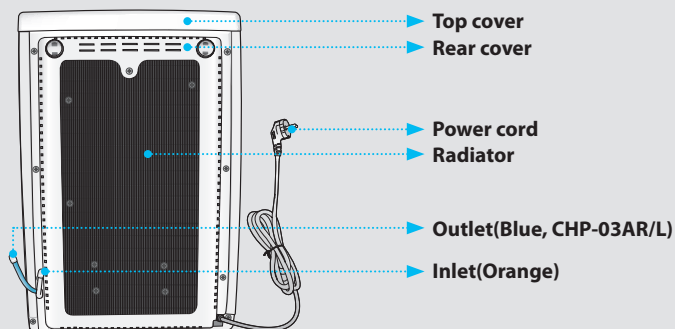
- ⚠ Do not use with water that is microbiologically unsafe or of unknown quality without adequate disinfection before or after the system.**

# PARTS NAME

## | Front |



## | Rear |



# WATER FILTRATION PROCESS

The filter is the core technology of the filtration system.

If you don't use qualifying filter or if you use an old filter that has expired, the system performance may degrade.

## The 5-step water filtering system (CHP-03AR/L)

### STEP 1, 2 : NEO-SENSE FILTER

This neo-sense filter has the function to reduce aesthetic chlorine, odor, volatile organic compounds(VOC's).

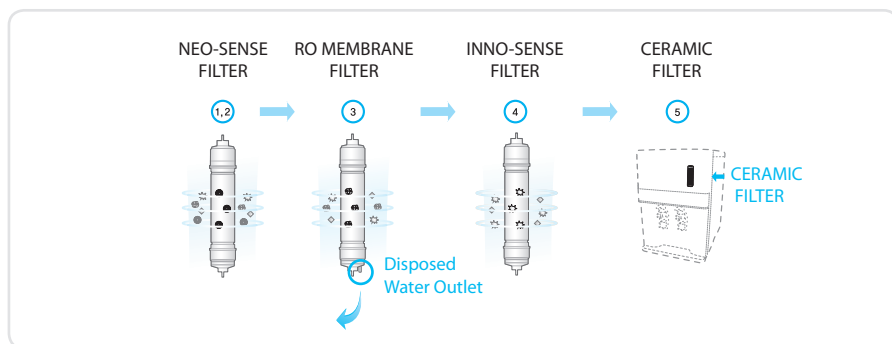
### STEP 3 : RO MEMBRANE FILTER

RO membrane filter has the function to reduce water contaminants such as pentavalent arsenic, barium, cadmium, selenium, radium 226/228, trivalent chromium, hexavalent chromium, lead, nitrate/nitrite.

### STEP 4 : INNO-SENSE FILTER

This inno-sense filter has the functions to reduce smell induction material and to improve taste of water. It also has the function to reduce aesthetic chlorine, volatile organic compounds(VOC's).

### STEP 5 : CERAMIC FILTER



#### Uses of disposed water

- The daily life water should be used for cleaning the restroom, the house, clothes, or purposes other than drinking.
- Never use the daily life water for a drinking water or a cook.

# WATER FILTRATION PROCESS

## ■ The 6-step water filtering system (CHP-03AR/L) ■

### STEP 1, 2 : NEO-SENSE FILTER

This neo-sense filter has the function to reduce aesthetic chlorine, odor, volatile organic compounds(VOC's).

### STEP 3 : RO MEMBRANE FILTER

RO membrane filter has the function to reduce water contaminants such as pentavalent arsenic, barium, cadmium, selenium, radium 226/228, trivalent chromium, hexavalent chromium, lead, nitrate/nitrite.

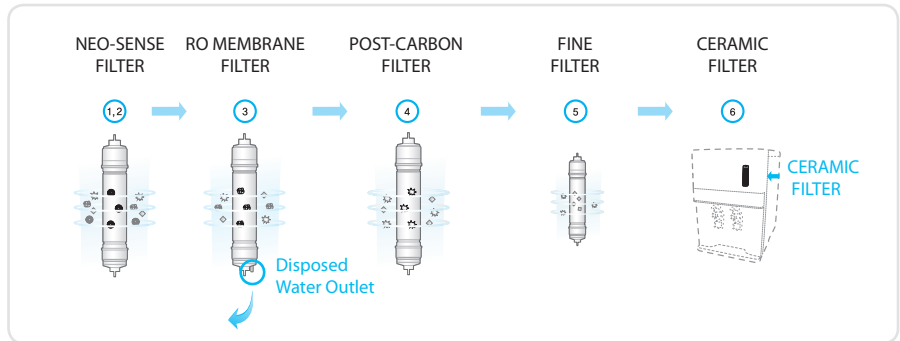
### STEP 4 : POST-CARBON FILTER

This post-carbon filter has the functions to reduce smell induction material and to improve taste of water. It also has the function to reduce aesthetic chlorine, volatile organic compounds(VOC's).

### STEP 5 : FINE FILTER

This fine filter has the function to reduce fine particles in the water.

### STEP 6 : CERAMIC FILTER



## ■ The 5-step water filtering system (CHP-03AU) ■

### STEP 1, 2 : NEO-SENSE FILTER

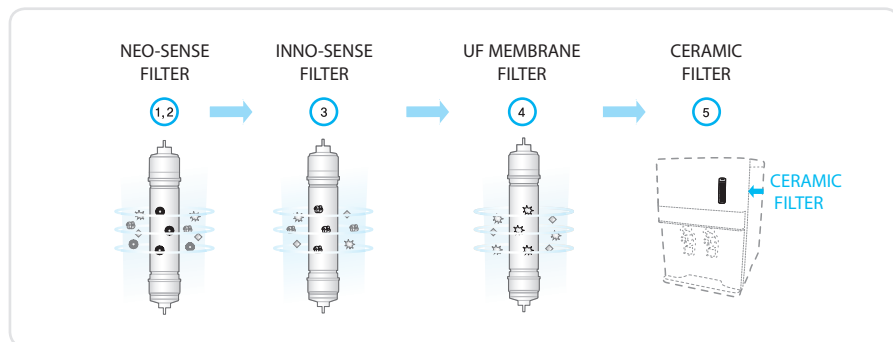
This neo-sense filter has the function to reduce aesthetic chlorine, odor, volatile organic compounds(VOC's).

### STEP 3 : INNO-SENSE FILTER

This inno-sense filter has the functions to reduce smell induction material and to improve taste of water. It also has the function to reduce aesthetic chlorine, volatile organic compounds(VOC's).

### STEP 4 : UF MEMBRANE FILTER

### STEP 5 : CERAMIC FILTER



# WATER FILTRATION PROCESS

## | The 5-step water filtering system (CHP-03AU) |

### STEP 1, 2 : NEO-SENSE FILTER

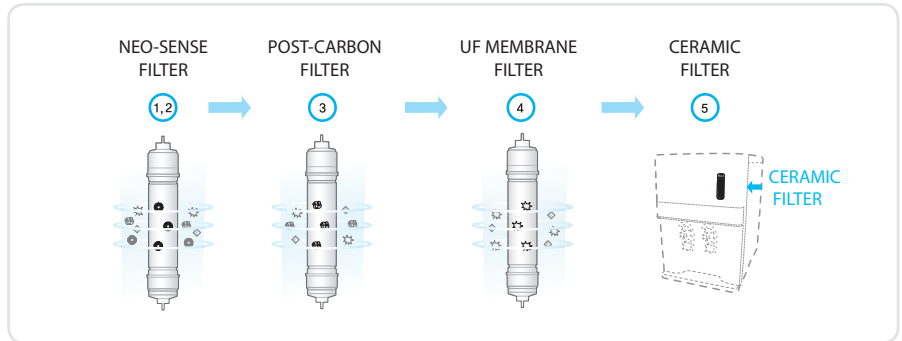
This neo-sense filter has the function to reduce aesthetic chlorine, odor, volatile organic compounds(VOC's).

### STEP 3 : POST-CARBON FILTER

This post-carbon filter has the functions to reduce smell induction material and to improve taste of water. It also has the function to reduce aesthetic chlorine, volatile organic compounds(VOC's).

### STEP 4 : UF MEMBRANE FILTER

### STEP 5 : CERAMIC FILTER

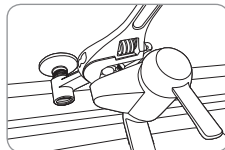




# INSTALLATION PRECAUTIONS

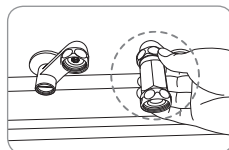
## ■ The summary for the proper installation of the water filtration device ■

1. Close main water supply valve to separate the faucet.



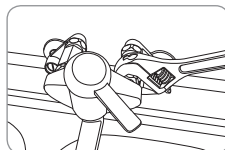
2. Wind the teflon tape on the adaptor and fit it to the pipe.

⚠ Do not turn the water pipe.



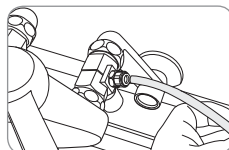
3. Connect the faucet with the adaptor.

⚠ Shall install the adaptor with connector on the cold water pipe.

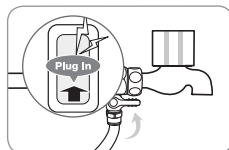


4. Connect 1/4 inch orange tubing with the connector on the adaptor.

⚠ Flush water through each filter at least 5 minutes before Connection.



5. Open the feed valve to supply water to the filtration system.

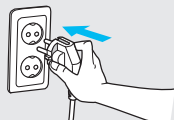


# INSTALLATION PRECAUTIONS

## | Please check before use! |

### **This product is for 120 V~ 60 Hz only.**

Please connect the power plug to a dedicated grounded electrical outlet for 120 V~ 60 Hz. The water filtration device works normally only when the electricity is connected.



- **Open the main water supply valve.**

The main water must be supplied to operate the water filtration device normally.

- **After installing the product**

Get rid of the saved water above the full water in the inner water tank 2 times or more to use.

- **When the indicator in the indication part is turned off**

When the indicator in the indication part is turned off, check if the power supply was stopped due to the power failure or other cause.

- **Regularly filter replacement**

It is important to replace the filter regularly to drink the pure water. If the filter is overused beyond its service life, the performance of the water filtration device deteriorate, Do not miss the filter replacement cycle.

- **When you didn't use for a long time**

If you saved the water for a long time or you didn't use, drain the water inside of the water filtration device completely and remove the newly filtered water one time to use.

- **When you don't want to use for a long time**

Close the main water supply valve and unplug.

- **Draining hot water**

Slide the draining cover at the front of the product off and connect the draining hose (continuous extraction hose) to drain the hot water in the hot water tank.  
(Take care not to burn yourself when draining the hot water.)



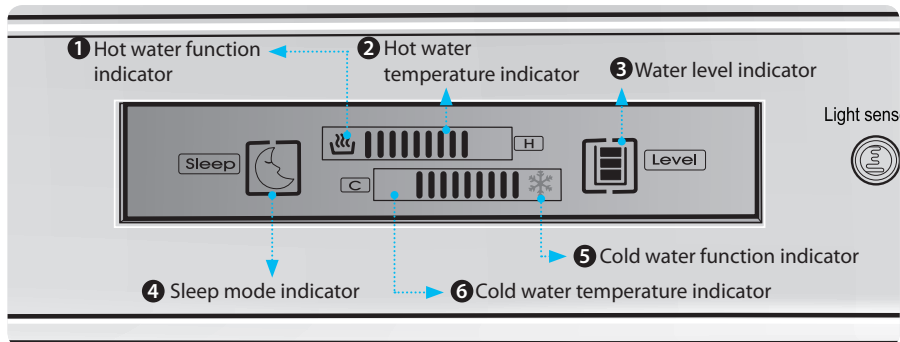
Tips

When you don't use for a long time, close the main water supply valve and unplug.

# OPERATION / INDICATION PART

## | Indication part/Operation part |

- Indication part      ■ Operation part



### 1 Hot water function indicator

When you select hot water mode, the indicator is turned on.



### 2 Hot water temperature indicator

The indicator is turned on according to the hot water temperature. As many indicators are turned on, the hot water becomes hot more and more.



### 3 Water level indicator

The indicator is lightened according to the water level of the storage tank.

\* If you connect the water filtration device, one blank is lightened basically.



### 4 Sleep mode indicator

When you select sleep mode, the indicator is turned on.



### 5 Cold water function indicator

When you select cold water function, the indicator is turned on.

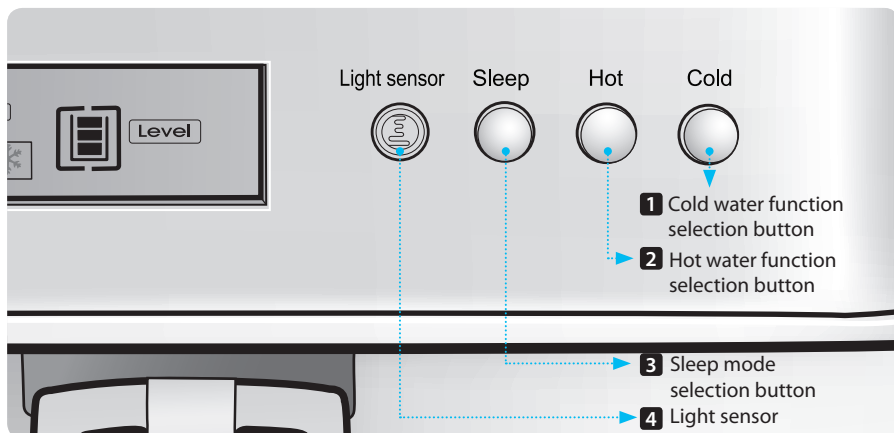


### 6 Cold water temperature indicator

The indicator is turned on according to the cold water temperature. As many indicators are turned on, the cold water becomes cold more and more.

## OPERATION / INDICATION PART

### | Operation part |



Cold



#### **1 Cold water function selection button**

When you want to select/deselect cold water function, use it.

Hot



#### **2 Hot water function selection button**

When you want to select/deselect Hot water function, use it.

Sleep



#### **3 Sleep mode selection button**

When you wish to select/deselect sleep mode, use it.

Light sensor



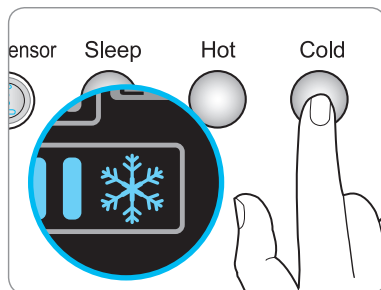
#### **4 Light sensor**

It is the sensor sensing the light around the product.

## To use the cold water function

Press the cold water function selection button and check if cold water mode indicator in the indication part is turned on. If you want to turn off the cold water mode, press the selection button for several seconds.

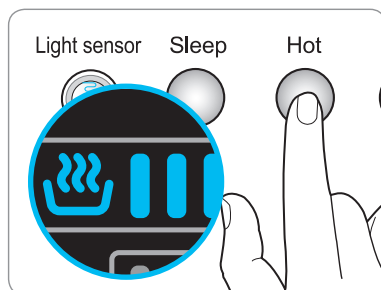
- \* You can drink the cold water when you turn on the cold water function and about 1 hour is passed.



## To use the hot water function

Press the hot water function selection button, check if the hot water function indicator in the indication part is turned on. If you want to turn off the hot water mode, please press the selection button for several seconds.

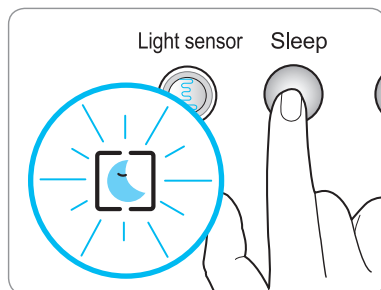
- \* You can drink the hot water when you turn on hot water function and 30 minutes is passed.



## To use the sleep mode

When you press the sleep mode selection button, as the sleep mode indicator is turned on and the number of the motor driving is decreased at night, the power consumption is decreased.

- \* When the sleep mode is operated, the cold water become less cool.

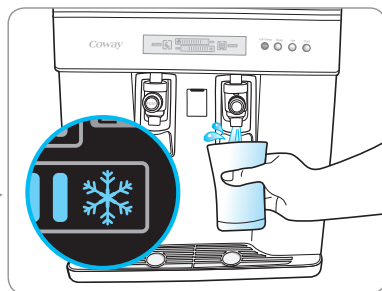
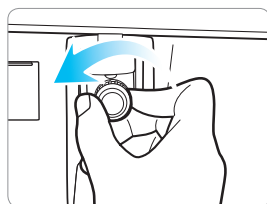


# HOW TO USE

## ■ To drink the cold water ■

**Press the cold water selection button and check the lightening status in the cold water function indicator.**

Turn the jog shuttle to the left in the cold water/room water changeover faucet and push the cup-touch lever.



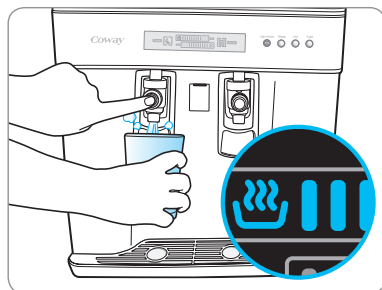
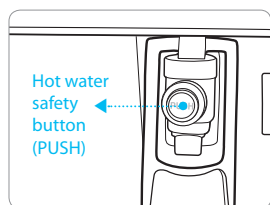
Tips

If the cold water doesn't come from the water filtration device, check if the cold water mode indicator in the indication part is turned on (See P.16).

## ■ To drink the hot water ■

**Press the hot water selection button and check the lightening status in the hot water function indicator.**

Press the hot water safety button and push the cup-touch lever.

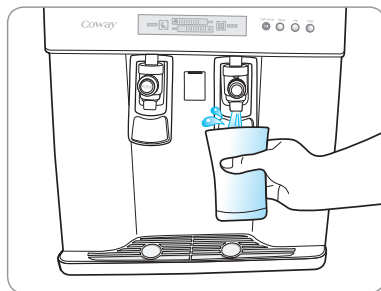
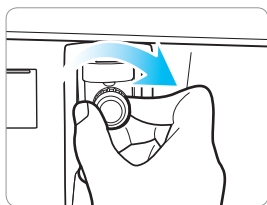


Tips

If the hot water doesn't come from the water filtration device, check if the hot water mode indicator in the indication part is turned on (See P.16).

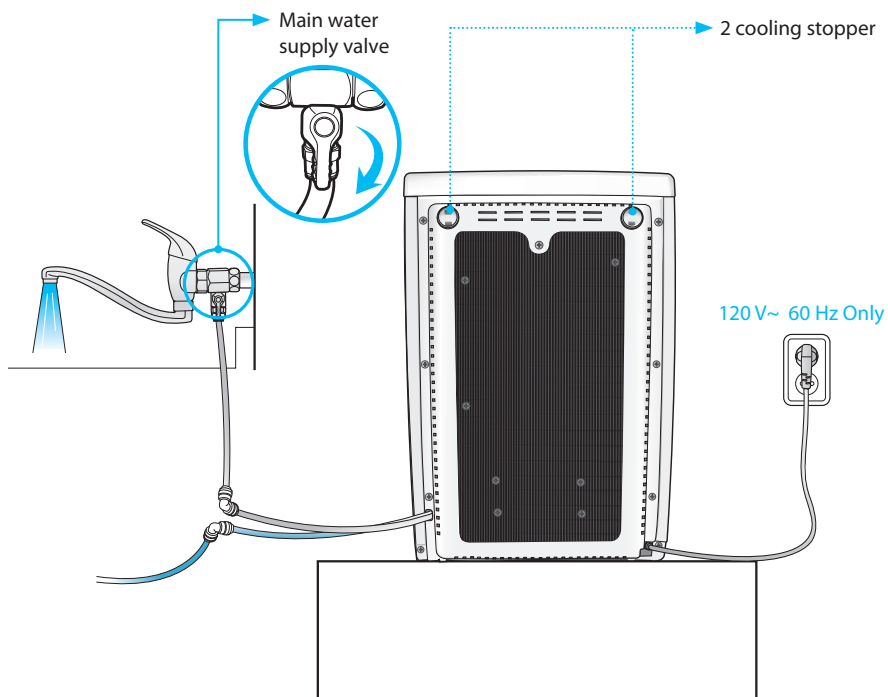
## ■ To drink the room water ■

Turn the jog shuttle to the right in the cold water/room water changeover faucet and push the cup-touch lever.



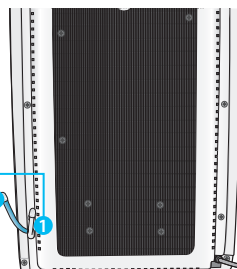
# INSTALLATION

## Follow the instruction for installation



Connect the orange color inlet tubing ① to the tap water supplying pipe. Connecting the outlet tubing ②.

Inlet tubing(Orange)  
Outlet tubing  
(Blue, CHP-03AR/L)

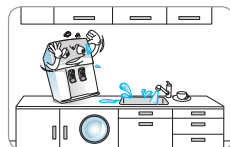




## Be cautious!

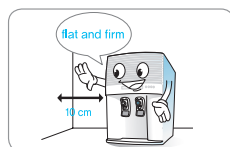
### Water filtration device installation place 1

Please install the water filtration system not at a rough place, a damp place, a place where the unit is exposed to the direct sunlight, a place where dust is present, or a place that the water drops.



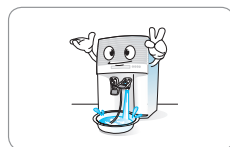
### Water filtration device installation place 2

Please install at the place where it is 10 cm or more off from the wall and the bottom is flat and firm.



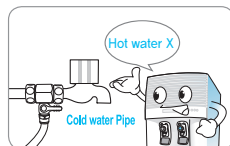
### After installing the water filtration system

Get rid of the filtered water above the full water 2 times or more necessarily after installing.



### Cold water plumbing

Please connect to the cold water pipe necessarily.  
(If you connect to the warm water pipe, the filter can be damaged.)



### Movement and installation

When the position is moved, connect the power cord when 30 minutes passes after installing.



To maintain optimal product performance, consult a Coway engineer for the detailed installation methods.



There may be some water remaining inside of the filter which was used to test the product during inspection process at the factory.  
Please feel at ease and use as it isn't the used product.

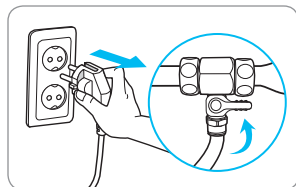


Don't reuse the main water supply valve and hose that was previously used when you install the product.

# CLEANINGMETHODOD

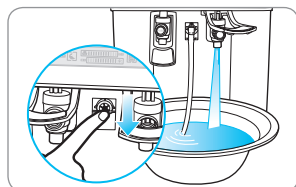
## | Storage tank |

1. Turn off by pressing cold water/hot water mode selection button in the front of the product for 2~3 seconds or more and unplug the power cord. Close the main water supply valve.

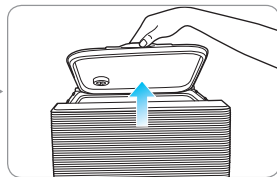
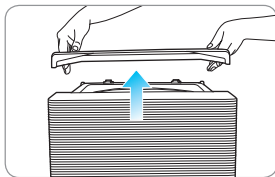
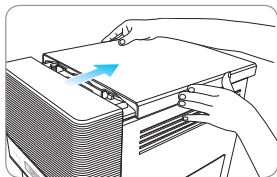


2. Drain the water inside of the water filtration device completely using the draining hose and the cold water/room water changeover faucet.

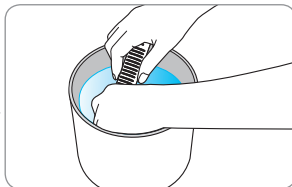
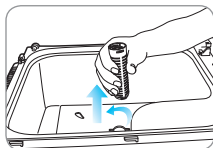
- \* Please drain the water in the cold water/room water tank from the cold water/room water extraction faucet and drain the water in the hot water tank from the front drain hole. (See P.13 for the hot water draining method)



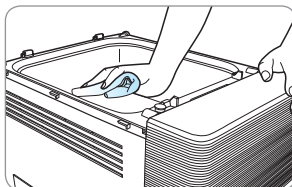
3. Open the upper cover of the product and open the storage tank cover.



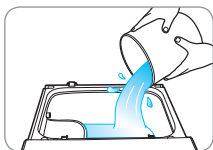
4. Shake and clean a ceramic filter in the taken water by rotating and separating it from the cold water/room water separation membrane.



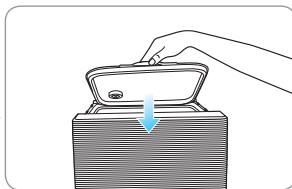
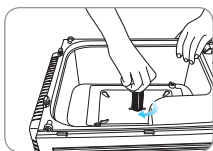
5. Please wipe the surface of the storage tank with soft clothes.



6. Use the storage tank after cleaning it with the taken water, draining completely using the draining hose, and emptying the newly filtered water one time or more.

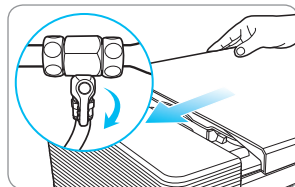


7. Close the storage tank cover after rotating and equipping the ceramic filter in the cold water/room water separation membrane.



## CLEANING METHOD

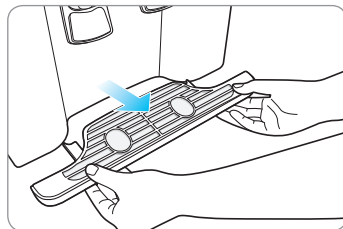
8. Open the main water supply valve after closing the upper cover and plugging the power cord. Please operate the water filtration device again by pressing cold water/hot water mode selection button in the front of the product after checking if the water is coming from the cold water/room water extraction faucet and the hot water extraction faucet.



### | Gutter |

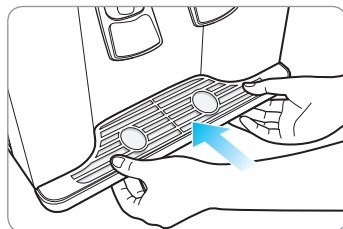
#### 1. Gutter separation method

If you pull the front part of the gutter, it is separated easily.



#### 2. Gutter assembling method

You just push the hook of the gutter slightly after sticking to the product.



Tips



**Close the storage tank cover completely.**

A worm or a foreign body can be entered.



**When you clean the storage tank, don't use the medicine or the detergent.**

If you don't clean the medicine or the detergent cleanly, it can be harmful to the body.

- Keep the surroundings cleanly and clean the storage tank once per two months.

Drugs,  
detergent, etc. X



# FILTER REPLACEMENT

## ■ Filter

The life of the water filtration system is the filter. It isn't the legitimated filter or you use too long even if it is the legitimated filter, the filter performance can be lowered.

Please change to the legitimated filter according to the replacement cycle.



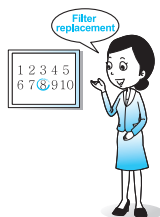
## ■ Filter replacement cycle

If the filter is not regularly replaced, it may degrade the water quality from the product. The filter replacement cycle depending on the main water quality can be shortened rather than the expected replacement cycle.

\* The period for the filter exchange is made based on 10 L use in a day for house use(4 people based) and 20 L use for business.

### CHP-03AR

Part No.	Names of Filter	Usable Period
WJNF11	Neo-sense filter	6 months
WJMF11-50	RO Membrane filter (CHP-03AR)	24 months
WJMF11-30-S	RO Membrane filter (CHP-03AL)	24 months
WJIF11 / WJCF11-POST	Inno-sense filter / Post-carbon filter	18 months
WJFF 7	Fine filter	18 months
WJCC-02	Ceramic filter	12 months



### CHP-03AU

Part No.	Names of Filter	Usable Period
WJNF11	Neo-sense filter	6 months
WJIF11 / WJCF11-POST	Inno-sense filter / Post-carbon filter	18 months
WJMF11-UF	Uf membrane filter	12 months
WJCC-02	Ceramic filter	12 months

## ■ About filter replacement cycle

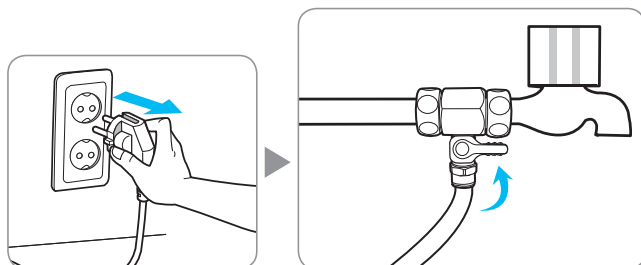
The filter replacement cycle described above is not the filter quality warranty period but the expected cycle (life) that the filter shows its original performance.

Therefore, the filter replacement cycle may be reduced for the area with the poor water quality or more application.

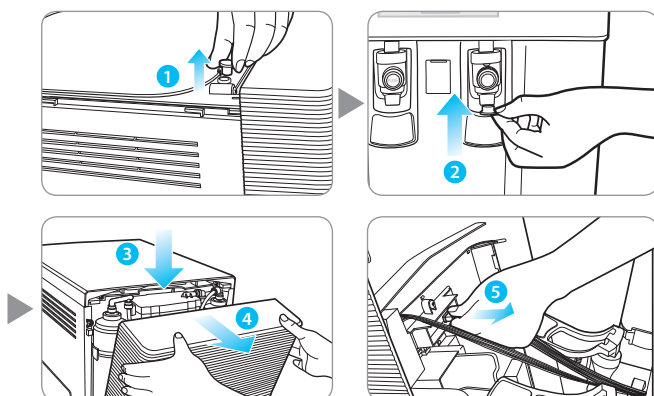


## FILTER REPLACEMENT METHOD

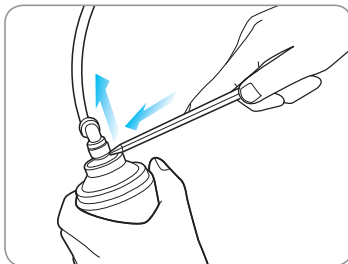
1. Close the main water supply valve after unplugging the power cord, and drain the water inside of the water filtration device (See P.21).



2. Remove the gutter, and separate the front cover by pressing down, and unplug and separate all the cables connected completely.  
(If the water in the storage tank remains, close the cold water/room water changeover faucet using the stopper inside of the upper cover and separate the front cover.)



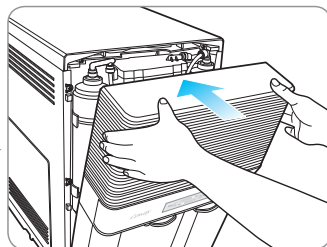
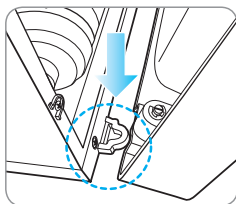
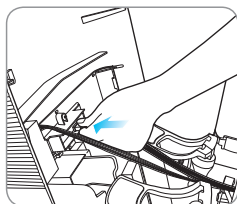
3. After separating the fitting connected to the filter trying to replace, please replace the filter. (Separate the fitting using the proper tool.)



Tips

- ⚠ By changing the filter and connecting the fitting and the hose precisely, check that there is no leakage and drain the first filtered water necessarily.

4. After connecting all the separated cables, fit a groove in the front cover and close with pressing it down.



Tips

- ⚠ Please be sure to use the new filter after cleansing.
- Neo-sense filter: Please assemble after cleansing with Neo-sense filter for about 30 seconds.
  - Post carbon/Fine/Inno-sense/Membrane filter (RO): Please assemble after cleansing with the main water passed Neo-sense filter for about 3 minutes.

# TROUBLESHOOTING

The water filtration device may operate abnormally due to minor causes not because of the product malfunction but because of the fact that the user is not familiar with the product use. In such a case, problems can be solved easily even without the help from the Service Center by checking the following items. If you can't solve the problem after checking the following items, please call the Service Center.

Symptom	Check	Measures to take
The water tastes weird.	• Did you clean the storage tank?	Clean the storage tank.
	• You didn't use the water filtration device for a long time.	Get rid of the saved water and clean the storage tank.
	• Isn't it about time to change the filter?	Request the filter replacement.
The water doesn't come.	• Is the water supply cut or isn't the water supply valve closed?	Open the main water supply valve.
	• Did you miss the filter replacement times?	Request the filter replacement.
The water is flowing slower.	• Isn't it about time to change the filter?	Request the filter replacement.
	• Is the power connected?	Check if the power cord plug in 120 V~ 60 Hz outlet.
	• Didn't you close the main water supply valve?	Open the main water supply valve.
	• Didn't the temperature of the main water drop suddenly?	If the water temperature is lowered, the water amount is decreased.
The cold water doesn't come.	• Was the cold water mode indicator lightened?	Please press the cold water mode selection button.
	• Didn't you close the main water supply valve?	If it is the low water level to protect the electric motor, the cooling function doesn't operate. Open the main water supply valve.
	• Isn't the back side of the water filtration device and the wall too close?	Please keep the distance between the back of the water filtration device and the wall to 10 cm or more.
All operation was stopped suddenly when driving.	• Is the main water being supplied actively?	Check the main water supply valve.
	• Is the power connected?	Check if the power cord plug in 120 V~ 60 Hz outlet.
	• Isn't water overflowing or leaking?	Request A/S.



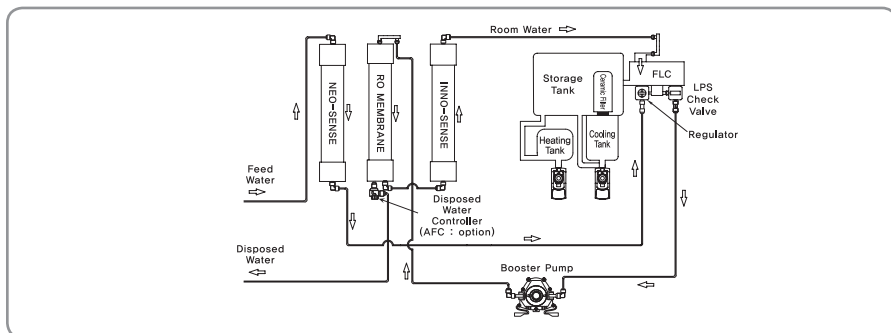
# SPECIFICATION

Product		Water Filtration Device		
Model		CHP-03AR	CHP-03AL	CHP-03AU
Filtration Method		RO(Reverse Osmosis)		UF
Power Supply		120 V~ 60 Hz		
Tank Capacity	Room Water	6.59 L		
	Cold Water	3.61 L		
	Hot Water	1.2 L		
	Total	11.4 L		
Dimension		344 mm(W) × 540 mm(D) × 525 mm(H)		
Working Temperature		5 °C - 35 °C		
Production Rate		190 L/d (25 °C, 414 kPa)	113 L/d (25 °C, 138 kPa)	1 500 L/d (25 °C, 108 kPa)
Working Pressure		69 kPa – 827 kPa	138 kPa – 827 kPa	69 kPa – 827 kPa
Net Weight		22.3 kg	19.8 kg	19.8 kg

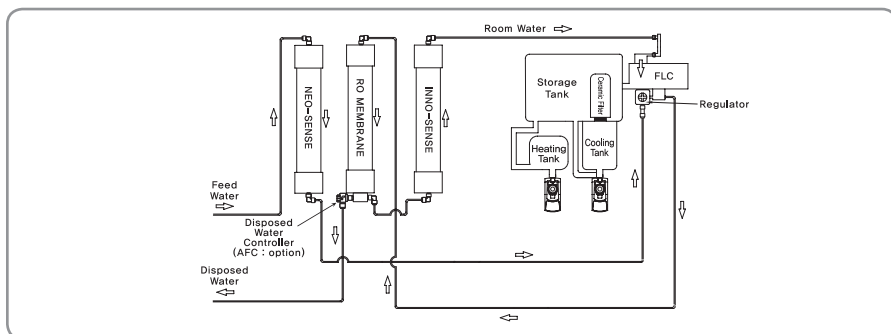
- The water amount can be differentiated according to the water pressure and the water temperature.
- The water tank capacity is the amount by the size and can be different from the extraction capacity.
- Without any prior notice, all or parts of the product are subject to change for the purpose of improving the performance of the product.
- Refer to performance data sheet for individual contaminants, reduction performance and general operating information.

# WATER FLOW DIAGRAM

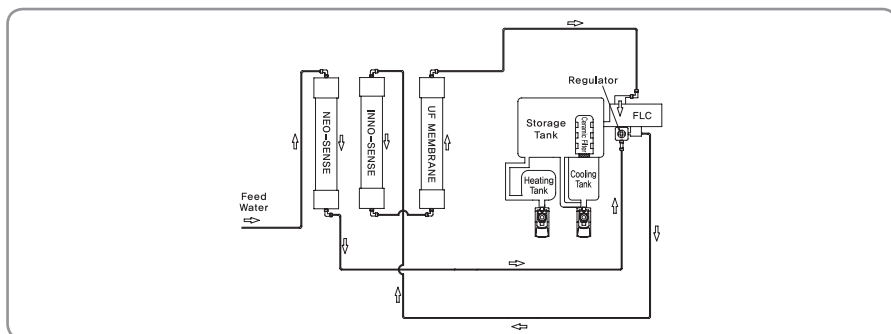
## CHP-03AR



## CHP-03AL



## CHP-03AU



- A post carbon filter may be installed instead of an inno-sense filter.  
For the precise specifications of your product, refer to the data plate on the product.

# Water Filtration System Performance Data Sheet



**Brand: Mach**

**Model: CHP-03AR**

This system has been tested and certified by the Water Quality Association according to NSF/ANSI 42, 53, and 58 for the reduction of the substances listed below. The concentration of the indicated substances in water entering the system was reduced to a concentration less than or equal to the permissible limit for water leaving the system, as specified in NSF/ANSI 42, 53, and 58.

Substance	Max. Allowable Concentration (mg/L)	Average Influent (mg/L)	Average Effluent (mg/L)	Minimum Percent Reduction (%)	Average Percent Reduction (%)
Arsenic (Pentavalent)	0.010	0.05	0.006	79.1	87.7
Barium	2.0	10	1.4	83.5	86.6
Radium 226/228	5pCi/L	25pCi/L	5pCi/L	N/A	N/A
Cadmium	0.005	0.031	0.002	89.0	92.7
Chromium (Hexavalent)	0.1	0.358	0.023	93.8	95.1
Chromium (Trivalent)	0.1	0.367	0.028	93.8	95.7
Lead	0.010	0.153	0.005	93.6	95.1
Nitrate/Nitrite	10	29.6	4.8	78.5	83.7
Selenium	0.05	0.117	0.003	96.0	97.8
TDS	<187.5	741.5	27.7	95.7	96.3
Aesthetic Chlorine					
INNOSENSE	≥ 50%	2.07	0.56	54.53	72.8
POST CARBON	≥ 50%	1.96	0.53	55.0	72.8
VOC*					
INNOSENSE	≥ 95% reduction	0.32	0.0077	95.70	97.6
POST CARBON	≥ 95% reduction	0.298	0.005	96.0	98.3

While testing was performed under laboratory conditions, actual performance may vary.

## General Operating Information:

Rated Capacity	INNO SENSE FILTER	229 gallons (for VOC) 6,103 gallons (for Aesthetic Chlorine)
	POST-CARBON FILTER	212 gallons (for VOC) 1,179 gallons (for Aesthetic Chlorine)
Min-Max operating pressure:		10 ~ 120 psi (0.7 ~ 8.4 kgf/cm <sup>2</sup> )
Min-Max feed water temperature:		41 ~ 95 °F (5 ~ 35 °C)
Rated Service Flow		0.07 GPM (for VOC) 0.5 GPM (for Aesthetic Chlorine)
Daily Water Production Rate		82.3 GPD
Product Efficiency Rating		39.2 %
Electrical Requirements:		120 Vac / 60Hz

- Do not use with water that is microbiologically unsafe or of unknown quality without adequate disinfection before or after the system.
- Refer to the owners manual for specific installation instructions, manufacturer's limited warranty, user responsibility, and parts and service availability.
- The influent water to the system shall include the following characteristics:
  - o No organic solvents
  - o Chlorine: < 2 ppm
  - o pH: 7 - 8
  - o Temperature: 41 ~ 95 °F (5 ~ 35 °C)
  - o Iron: < 2 ppm
  - o Turbidity: < 1 NTU
  - o Hardness: < 1000 mg/L

- For parts and service availability, please contact your local dealer or Coway.
- This system is acceptable for treatment of influent concentrations of no more than 27 mg/L nitrate and 3 mg/L nitrite in combination measured as N and is certified for nitrate/nitrite reduction only for water supplies with a pressure of 2.8 kgf/cm<sup>2</sup> (40 psi) or greater.
- A nitrate/nitrite sampling kit should be used to monitor the nitrate/nitrite levels in your product drinking water at least every six months. Kits maybe purchased from your local dealer or Coway.
- This system has been tested for the treatment of water containing pentavalent arsenic (also know as As(V), As(+5), or arsenate) at concentrations of 0.050 mg/L or less. This system reduces pentavalent arsenic, but may not remove other forms of arsenic. This system is to be used on water supplies containing a detectable free chlorine residual at the system inlet or on water supplies that have been demonstrated to contain only pentavalent arsenic. Treatment with chloramines (combined chlorine) is not sufficient to ensure complete conversion of trivalent arsenic to pentavalent arsenic. Please see the Arsenic Facts section of this Performance Data Sheet for further information.
- Efficiency rating means the percentage of the influent water to the system that is available to the user as reverse osmosis treated water under operating conditions that approximate typical daily usage.
- The product water should be tested every 6 months to ensure that the contaminants are being reduced effectively. Please contact your local dealer or Coway to initiate this service.
- This reverse osmosis system contains a replaceable treatment components, critical for the effective reduction of total dissolved solids and that product water shall be tested periodically to verify that the system is performing properly. Replacement of reverse osmosis component should be with one of identical specifications, as defined by the manufacturer, to assure the same efficiency and contaminant reduction performance.
- The estimated replacement time of filter, which is a consumable part, is not an indication of quality guarantee period, but it means the ideal time of filter replacement. Accordingly, the estimated time of filter replacement may be shortened in case it is used in an area of poor water quality.

Model of Filter	Type	Usable period (months)	COST US \$
WJNF11	NEO SENSE FILTER	6	44.00
WJMF11-50	RO MEMBRANE FILTER	24	140.00
WJIF11 / WJCF11-POST	INNO SENSE FILTER / POST-CARBON FILTER	18	31.00
WJFF7	FINE FILTER	18	26.00
WJCC-02	CERAMIC FILTER	12	11.00

## ARSENIC FACTS

Arsenic (abbreviated As) is found naturally in some well water. Arsenic in water has no color, taste or odor. It must be measured by a lab test. Public water utilities must have their water tested for arsenic. You can get the results from your water utility. If you have your own well, you can have the water tested. The local health department or the state environmental health agency can provide a list of certified labs. The cost is typically \$15 to \$30. Information about arsenic in water can be found on the Internet at the US Environmental Protection Agency website:

[www.epa.gov/safewater/arsenic.html](http://www.epa.gov/safewater/arsenic.html)

There are two forms of arsenic: pentavalent arsenic (also called As(V), As(+5), and arsenate) and trivalent arsenic (also called As(III), As(+3), and arsenite). In well water, arsenic may be pentavalent, trivalent, or a combination of both. Special sampling procedures are needed for a lab to determine what type and how much of each type of arsenic is in the water. Check with the labs in your area to see if they can provide this type of service.

Reverse osmosis (RO) water treatment systems do not remove trivalent arsenic from water very well. RO systems are very effective at removing pentavalent arsenic. A free chlorine residual will rapidly convert trivalent arsenic to pentavalent arsenic. Other water treatment chemicals such as ozone and potassium permanganate will also change trivalent arsenic to pentavalent arsenic. A combined chlorine residual (also called chloramine) may not convert all the trivalent arsenic. If you get your water from a public water utility, contact the utility to find out if free chlorine or combined chlorine is used in the water system.

The CHP-03AR system is designed to remove pentavalent arsenic. It will not convert trivalent arsenic to pentavalent arsenic. The system was tested in a lab. Under those conditions, the system reduced 0.050 mg/L pentavalent arsenic to 0.010 mg/L (ppm) (the USEPA standard for drinking water) or less. The performance of the system may be different at your installation. Have the treated water tested for arsenic to check if the system is working properly.

The RO component of the CHP-03AR system must be replaced every 24 months to ensure the system will

State of California  
Department of Public Health  
**Water Treatment Device**  
**Certificate Number**  
**08 - 1867**

Date Issued: June 24, 2008

**Trademark/Model Designation**

Mach CHP-03AR

**Replacement Element(s)**

WJNF11 Neo-Sense Filter  
WJMF11-50 RO Membrane Filter  
WJCF11-POST Post-carbon Filter  
WJFF7 Fine Filter  
WJCC-02 Ceramic Filter

Manufacturer: Woongjin Coway Co LTD

The water treatment device(s) listed on this certificate have met the testing requirements pursuant to Section 116830 of the Health and Safety Code for the following health related contaminants:

**Microbiological Contaminants and Turbidity**

None

**Inorganic/Radiological Contaminants**

Arsenic (Pentavalent)<sup>1</sup>  
Barium  
Cadmium  
Chromium (Hexavalent)  
Chromium (Trivalent)  
Lead  
Nitrate/Nitrite<sup>2</sup>  
Radium 226/228  
Selenium

**Organic Contaminants**

**VOCs**

Alachlor  
Atrazine  
Benzene  
Carbofuran  
Carbon Tetrachloride  
Chlorobenzene  
Chloropicrin  
2,4-D  
DBCP  
o-Dichlorobenzene  
p-Dichlorobenzene  
1,2-Dichloroethane  
1,1-Dichloroethylene  
cis-1,2-Dichloroethylene  
trans-1,2-Dichloroethylene  
1,2-Dichloropropane  
cis-1,3-Dichloropropylene  
Dinoseb

Endrin  
Ethylbenzene  
EDB  
Haloacetonitriles (HAN)  
Bromochloroacetonitrile  
Dibromoacetonitrile  
Dichloroacetonitrile  
Trichloroacetonitrile  
Haloketones (HK)  
1,1-Dichloro-2-Propanone  
1,1,1-Trichloro-2-Propanone  
Heptachlor  
Heptachlor Epoxide  
Hexachlorobutadiene  
Hexachlorocyclopentadiene  
Lindane  
Methoxychlor  
Pentachlorophenol

Simazine  
Styrene  
1,1,2,2-Tetrachloroethane  
Tetrachloroethylene  
Toluene  
2,4,5-TP (Silvex)  
Tribromoacetic Acid  
1,2,4-Trichlorobenzene  
1,1,1-Trichloroethane  
1,1,2-Trichloroethane  
Trichloroethylene  
Trihalomethanes (THMs)  
Bromodichloromethane  
Bromoform  
Chloroform  
Chlorodibromomethane  
Xylenes

**Rated Service Capacity: 229 gal**

**Rated Service Flow: 0.07 gpm**

**Do not use with water that is microbiologically unsafe or of unknown quality, without adequate disinfection before or after the system.**

<sup>1</sup> Claims for arsenic reduction shall only be made on water supplies maintaining detectable residual free chlorine at the reverse osmosis (RO) system inlet. Water systems using an in-line chlorinator should provide a minimum of 1 minute chlorine contact time before the RO system.

<sup>2</sup> This system is acceptable for treatment of influent concentrations of no more than 27 mg/L nitrate and 3 mg/L nitrite in combination measured as N and is certified for nitrate/nitrite reduction only for water supplies with a pressure of 280 kPa (40 psig) or greater. A sampling and analysis test kit for nitrate is provided for checking the performance of this system. Frequent analysis is encouraged.

# Water Filtration System Performance Data Sheet



**Brand: Mach**

**Model: CHP-03AL**

This system has been tested and certified by the Water Quality Association according to NSF/ANSI 42, 53, and 58 for the reduction of the substances listed below. The concentration of the indicated substances in water entering the system was reduced to a concentration less than or equal to the permissible limit for water leaving the system, as specified in NSF/ANSI 42, 53, and 58.

Substance	Max. Allowable Concentration (mg/L)	Average Influent (mg/L)	Average Effluent (mg/L)	Minimum Percent Reduction (%)	Average Percent Reduction (%)
Arsenic (Pentavalent)	0.010	0.05	0.006	79.1	87.7
Barium	2.0	10	1.4	83.5	86.6
Radium 226/228	5pCi/L	25pCi/L	5pCi/L	N/A	N/A
Cadmium	0.005	0.031	0.002	89.0	92.7
Chromium (Hexavalent)	0.1	0.358	0.023	93.8	95.1
Chromium (Trivalent)	0.1	0.367	0.028	93.8	95.7
Lead	0.010	0.153	0.005	93.6	95.1
Nitrate/Nitrite	10	29.6	4.8	78.5	83.7
Selenium	0.05	0.117	0.003	96.0	97.8
TDS	<187.5	741.5	57.8	91.5	92.2
Aesthetic Chlorine					
INNOSENSE	≥ 50%	2.07	0.56	54.53	72.8
POST CARBON	≥ 50%	1.96	0.53	55.0	72.8
VOC*					
INNOSENSE	≥ 95% reduction	0.32	0.0077	95.70	97.6
POST CARBON	≥ 95% reduction	0.298	0.005	96.0	98.3

While testing was performed under laboratory conditions, actual performance may vary.

## General Operating Information:

Rated Capacity	INNO SENSE FILTER	229 gallons (for VOC) 6,103 gallons (for Aesthetic Chlorine)
	POST-CARBON FILTER	212 gallons (for VOC) 1,179 gallons (for Aesthetic Chlorine)
Min-Max operating pressure:		20 ~ 120 psi (1.4 ~ 8.4 kgf/cm <sup>2</sup> )
Min-Max feed water temperature:		41 ~ 95 °F (5 ~ 35 °C)
Rated Service Flow		0.07 GPM (for VOC) 0.5 GPM (for Aesthetic Chlorine)
Daily Water Production Rate		43.7 GPD
Product Efficiency Rating		29.5 %
Electrical Requirements:		120 Vac / 60Hz

- Do not use with water that is microbiologically unsafe or of unknown quality without adequate disinfection before or after the system.
- Refer to the owners manual for specific installation instructions, manufacturer's limited warranty, user responsibility, and parts and service availability.
- The influent water to the system shall include the following characteristics:
  - No organic solvents
  - Chlorine: < 2 ppm
  - pH: 7 - 8
  - Temperature: 41 ~ 95 °F (5 ~ 35 °C)
  - Iron: < 2 ppm
  - Turbidity: < 1 NTU
  - Hardness: < 1000 mg/L

- For parts and service availability, please contact your local dealer or Coway.
- This system is acceptable for treatment of influent concentrations of no more than 27 mg/L nitrate and 3 mg/L nitrite in combination measured as N and is certified for nitrate/nitrite reduction only for water supplies with a pressure of 2.8 kgf/cm<sup>2</sup> (40 psi) or greater.
- A nitrate/nitrite sampling kit should be used to monitor the nitrate/nitrite levels in your product drinking water at least every six months. Kits may be purchased from your local dealer or Coway.
- This system has been tested for the treatment of water containing pentavalent arsenic (also known as As(V), As(+5), or arsenate) at concentrations of 0.050 mg/L or less. This system reduces pentavalent arsenic, but may not remove other forms of arsenic. This system is to be used on water supplies containing a detectable free chlorine residual at the system inlet or on water supplies that have been demonstrated to contain only pentavalent arsenic. Treatment with chloramines (combined chlorine) is not sufficient to ensure complete conversion of trivalent arsenic to pentavalent arsenic. Please see the Arsenic Facts section of this Performance Data Sheet for further information.
- Efficiency rating means the percentage of the influent water to the system that is available to the user as reverse osmosis treated water under operating conditions that approximate typical daily usage.
- The product water should be tested every 6 months to ensure that the contaminants are being reduced effectively. Please contact your local dealer or Coway to initiate this service.
- This reverse osmosis system contains a replaceable treatment components, critical for the effective reduction of total dissolved solids and that product water shall be tested periodically to verify that the system is performing properly. Replacement of reverse osmosis component should be with one of identical specifications, as defined by the manufacturer, to assure the same efficiency and contaminant reduction performance.
- The estimated replacement time of filter, which is a consumable part, is not an indication of quality guarantee period, but it means the ideal time of filter replacement. Accordingly, the estimated time of filter replacement may be shortened in case it is used in an area of poor water quality.

Model of Filter	Type	Usable period (months)	COST US \$
WJNF11	NEO-SENSE FILTER	6	44.00
WJMF11-30-S	RO MEMBRANE FILTER	24	131.00
WJIF11 / WJCF11-POST	INNO SENSE FILTER / POST-CARBON FILTER	18	31.00
WJFF 7	FINE FILTER	18	26.00
WJCC-02	CERAMIC FILTER	12	11.00

## ARSENIC FACTS

Arsenic (abbreviated As) is found naturally in some well water. Arsenic in water has no color, taste or odor. It must be measured by a lab test. Public water utilities must have their water tested for arsenic. You can get the results from your water utility. If you have your own well, you can have the water tested. The local health department or the state environmental health agency can provide a list of certified labs. The cost is typically \$15 to \$30. Information about arsenic in water can be found on the Internet at the US Environmental Protection Agency website: [www.epa.gov/safewater/arsenic.html](http://www.epa.gov/safewater/arsenic.html)

There are two forms of arsenic: pentavalent arsenic (also called As(V), As(+5), and arsenate) and trivalent arsenic (also called As(III), As(+3), and arsenite). In well water, arsenic may be pentavalent, trivalent, or a combination of both. Special sampling procedures are needed for a lab to determine what type and how much of each type of arsenic is in the water. Check with the labs in your area to see if they can provide this type of service.

Reverse osmosis (RO) water treatment systems do not remove trivalent arsenic from water very well. RO systems are very effective at removing pentavalent arsenic. A free chlorine residual will rapidly convert trivalent arsenic to pentavalent arsenic. Other water treatment chemicals such as ozone and potassium permanganate will also change trivalent arsenic to pentavalent arsenic. A combined chlorine residual (also called chloramine) may not convert all the trivalent arsenic. If you get your water from a public water utility, contact the utility to find out if free chlorine or combined chlorine is used in the water system.

The CHP-03AL system is designed to remove pentavalent arsenic. It will not convert trivalent arsenic to pentavalent arsenic. The system was tested in a lab. Under those conditions, the system reduced 0.050 mg/L pentavalent arsenic to 0.010 mg/L (ppm) (the USEPA standard for drinking water) or less. The performance of the system may be different at your installation. Have the treated water tested for arsenic to check if the system is working properly. The RO component of the CHP-03AL system must be replaced every 24 months to ensure the system will continue to remove pentavalent arsenic. The component identification and locations where you can purchase the component are listed in the installation/operation manual.

State of California  
Department of Public Health  
**Water Treatment Device**  
**Certificate Number**  
**08 - 1866**

Date Issued: June 24, 2008

**Trademark/Model Designation**

Mach CHP-03AL

**Replacement Element(s)**

WJNF11 Neo-Sense Filter  
WJMF11S-30 RO Membrane Filter  
WJCF11-POST Post-carbon Filter  
WJFF7 Fine Filter  
WJCC-02 Ceramic Filter

Manufacturer: Woongjin Coway Co LTD

The water treatment device(s) listed on this certificate have met the testing requirements pursuant to Section 116830 of the Health and Safety Code for the following health related contaminants:

**Microbiological Contaminants and Turbidity**

None

**Inorganic/Radiological Contaminants**

Arsenic (Pentavalent)<sup>1</sup>  
Barium  
Cadmium  
Chromium (Hexavalent)  
Chromium (Trivalent)  
Lead  
Nitrate/Nitrite<sup>2</sup>  
Radium 226/228  
Selenium

**Organic Contaminants**

**VOCs**

Alachlor  
Atrazine  
Benzene  
Carbofuran  
Carbon Tetrachloride  
Chlorobenzene  
Chloropicrin  
2,4-D  
DBCP  
o-Dichlorobenzene  
p-Dichlorobenzene  
1,2-Dichloroethane  
1,1-Dichloroethylene  
cis-1,2-Dichloroethylene  
trans-1,2-Dichloroethylene  
1,2-Dichloropropane  
cis-1,3-Dichloropropylene  
Dinoseb

Endrin  
Ethylbenzene  
EDB  
Haloacetonitriles (HAN)  
Bromochloroacetonitrile  
Dibromoacetonitrile  
Dichloroacetonitrile  
Trichloroacetonitrile  
Haloketones (HK)  
1,1-Dichloro-2-Propanone  
1,1,1-Trichloro-2-Propanone  
Heptachlor  
Heptachlor Epoxide  
Hexachlorobutadiene  
Hexachlorocyclopentadiene  
Lindane  
Methoxychlor  
Pentachlorophenol

Simazine  
Styrene  
1,1,2,2-Tetrachloroethane  
Tetrachloroethylene  
Toluene  
2,4,5-TP (Silvex)  
Tribromoacetic Acid  
1,2,4-Trichlorobenzene  
1,1,1-Trichloroethane  
1,1,2-Trichloroethane  
Trichloroethylene  
Trihalomethanes (THMs)  
Bromodichloromethane  
Bromoform  
Chloroform  
Chlorodibromomethane  
Xylenes

**Rated Service Capacity: 229 gal**

**Rated Service Flow: 0.07 gpm**

**Do not use with water that is microbiologically unsafe or of unknown quality, without adequate disinfection before or after the system.**

<sup>1</sup> Claims for arsenic reduction shall only be made on water supplies maintaining detectable residual free chlorine at the reverse osmosis (RO) system inlet. Water systems using an in-line chlorinator should provide a minimum of 1minute chlorine contact time before the RO system.

<sup>2</sup> This system is acceptable for treatment of influent concentrations of no more than 27 mg/L nitrate and 3 mg/L nitrite in combination measured as N and is certified for nitrate/nitrite reduction only for water supplies with a pressure of 280 kPa (40 psig) or greater. A sampling and analysis test kit for nitrate is provided for checking the performance of this system. Frequent analysis is encouraged.



# Water Filtration System Performance Data Sheet

Brand: Mach



Model: CHP-03AU

This system has been tested and certified by the Water Quality Association according to NSF/ANSI 42, and 53 for the reduction of the substances listed below. The concentration of the indicated substances in water entering the system was reduced to a concentration less than or equal to the permissible limit for water leaving the system, as specified in NSF/ANSI 42 and 53.

Substance	Max. Allowable Concentration (mg/L)	Average Influent (mg/L)	Average Effluent (mg/L)	Minimum Percent Reduction (%)	Average Percent Reduction (%)
Aesthetic Chlorine					
INNOSENSE	≥ 50%	2.07	0.56	54.53	72.8
POST CARBON	≥ 50%	1.96	0.53	55.0	72.8
VOC*					
INNOSENSE	≥ 95% reduction	0.32	0.0077	95.70	97.6
POST CARBON	≥ 95% reduction	0.298	0.005	96.0	98.3

While testing was performed under laboratory conditions, actual performance may vary.

## General Operating Information:

Rated Capacity	INNO SENSE FILTER	229 gallons (for VOC) 6,103 gallons (for Aesthetic Chlorine)
	POST-CARBON FILTER	212 gallons (for VOC) 1,179 gallons (for Aesthetic Chlorine)
Min-Max operating pressure:		10 ~ 120 psi (0.7 ~ 8.4 kgf/cm <sup>2</sup> )
Min-Max feed water temperature:		41 ~ 95 °F (5 ~ 35 °C)
Rated Service Flow		0.07 GPM (for VOC) 0.5 GPM (for Aesthetic Chlorine)
Electrical Requirements:		120 Vac / 60Hz

- Do not use with water that is microbiologically unsafe or of unknown quality without adequate disinfection before or after the system.
- Refer to the owners manual for specific installation instructions, manufacturer's limited warranty, user responsibility, and parts and service availability.
- For parts and service availability, please contact your local dealer or Coway.

Model of Filter	Type	Usable period (months)	COST US \$
WJNF11	NEO SENSE FILTER	6	44.00
WJIF11 / WJCF11-POST	INNO SENSE FILTER / POST-CARBON FILTER	18	31.00
WJMF11-UF	UF MEMBRANE FILTER	12	63.00
WJCC-02	CERAMIC FILTER	12	11.00

## \* VOC Surrogate Claims

Chemical	Drinking water regulatory level <sup>1</sup> (MCL/MAC) mg/L	Influent challenge concentration <sup>2</sup> mg/L	Chemical reduction percent	Maximum product water concentration mg/L
alachlor	0.002	0.050	> 98	0.001 <sup>3</sup>
atrazine	0.003	0.100	> 97	0.003 <sup>3</sup>
benzene	0.005	0.081	> 99	0.001 <sup>3</sup>
carbofuran	0.04	0.190	> 99	0.001 <sup>3</sup>
carbon tetrachloride	0.005	0.078	98	0.0018 <sup>4</sup>
chlorobenzene	0.1	0.077	> 99	0.001 <sup>3</sup>
chloropicrin	-	0.015	99	0.0002 <sup>3</sup>
2,4-D	0.07	0.110	98	0.0017 <sup>4</sup>
dibromochloropropane(DBCP)	0.0002	0.052	> 99	0.00002 <sup>3</sup>
o-dichlorobenzene	0.6	0.080	> 99	0.001 <sup>3</sup>
p-dichlorobenzene	0.075	0.040	> 98	0.001 <sup>3</sup>
1,2-dichloroethane	0.005	0.088	95 <sup>5</sup>	0.0048 <sup>5</sup>
1,1-dichloroethylene	0.007	0.083	> 99	0.001 <sup>3</sup>
cis-1,2-dichloroethylene	0.07	0.170	> 99	0.0005 <sup>3</sup>
trans-1,2-dichloroethylene	0.1	0.086	> 99	0.001 <sup>3</sup>
1,2-dichloropropane	0.005	0.080	> 99	0.001 <sup>3</sup>
cis-1,3-dichloropropylene	-	0.079	> 99	0.001 <sup>3</sup>
dinoseb	0.007	0.170	99	0.0002 <sup>4</sup>
endrin	0.002	0.053	99	0.00059 <sup>4</sup>
ethylbenzene	0.7	0.088	> 99	0.001 <sup>3</sup>
ethylene dibromide (EDB)	0.00005	0.044	> 99	0.00002 <sup>3</sup>
haloacetonitriles (HAN)				
bromochloroacetonitrile	-	0.022	98	0.0005 <sup>3</sup>
dibromoacetonitrile	-	0.024	98	0.0006 <sup>3</sup>
dichloroacetonitrile	-	0.0096	98	0.0002 <sup>3</sup>
trichloroacetonitrile	-	0.015	98	0.0003 <sup>3</sup>
haloketones (HK):				
1,1-dichloro-2-propanone	-	0.0072	99	0.0001 <sup>3</sup>
1,1,1-trichloro-2-propanone	-	0.0082	96	0.0003 <sup>3</sup>
heptachlor (H-34,Heptox)	0.0004	0.08	> 99	0.0004
heptachlor epoxide	0.0002	0.0107 <sup>6</sup>	98	0.0002 <sup>6</sup>
hexachlorobutadiene	-	0.044	> 98	0.001 <sup>3</sup>
hexachlorocyclopentadiene	0.05	0.060	> 99	0.000002 <sup>3</sup>
lindane	0.0002	0.055	> 99	0.00001 <sup>3</sup>
methoxychlor	0.04	0.050	> 99	0.0001 <sup>3</sup>
pentachlorophenol	0.001	0.096	> 99	0.001 <sup>3</sup>
simazine	0.004	0.120	> 97	0.004 <sup>3</sup>
styrene	0.1	0.150	> 99	0.0005 <sup>3</sup>
1,1,2,2-tetrachloroethane	-	0.081	> 99	0.001 <sup>3</sup>
tetrachloroethylene	0.005	0.081	> 99	0.001 <sup>3</sup>
toluene	1	0.078	> 99	0.001 <sup>3</sup>
2,4,5-TP (silvex)	0.05	0.270	99	0.0016 <sup>4</sup>
tribromoacetic acid	-	0.042	> 98	0.001 <sup>3</sup>
1,2,4-trichlorobenzene	0.07	0.160	> 99	0.0005 <sup>3</sup>
1,1,1-trichloroethane	0.2	0.084	95	0.0046 <sup>4</sup>
1,1,2-trichloroethane	0.005	0.150	> 99	0.0005 <sup>3</sup>
trichloroethylene	0.005	0.180	> 99	0.0010 <sup>3</sup>
trihalomethanes (includes):				
chloroform (surrogate chemical)				
bromoform				
bromodichloromethane	0.080	0.300	95	0.015
chlorodibromomethane				
xlenes (total)	10	0.070	> 99	0.001 <sup>3</sup>

1. These harmonized values were agreed upon by representatives of USEPA and Health Canada for the purpose of evaluating products to the requirements of this Standard.

2. Influent challenge levels are average influent concentrations determined in surrogate qualification testing.

3. Maximum product water level was not observed but was set at the detection limit of the analysis.

4. Maximum product water level is set at a value determined in surrogate qualification testing.

5. Chemical reduction percent and maximum product water level calculated at chloroform 95% breakthrough point as determined in surrogate qualification testing.

6. The surrogate test results for heptachlor epoxide demonstrated a 98% reduction. These data were used to calculate an upper occurrence concentration which would produce a maximum product water level at the MCL.

# MEMO

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**WARRANTY CARD OR WARRANTY LETTER**  
**ONE YEAR LIMITED WARRANTY**  
**WATER FILTRATION DEVICE CHP-03AR/L/U ("PRODUCT")**

**Model:**

**Serial Number:**

**Customer Name:**

**("OWNER")**

**Date of Purchase:**

**What This Warranty Covers:**

Commencing with the date of purchase of the Product and continuing for a period of one year, if manufacturing defects in the Product cause the Product to not operate properly for its intended use, then subject to the exclusions, conditions, and limitations contained herein, COWAY at its sole option will repair or replace the Product.

Decisions as to the extent of repair or replacement required will be made solely by COWAY.

The remedy under this Warranty is available only for that portion of the Product exhibiting defects at the time of the warranty claim. The replacement Product as well as any remaining original Product will be warranted only for the original one year warranty period. This limited warranty applies only to Product used for an application specified by COWAY for the Product and applied in strict accordance with COWAY published specifications in effect at the time of application. IF PRODUCT IS USED FOR OTHER THAN ITS INTENDED PURPOSE, IT IS SOLD AS IS AND WITHOUT ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE.

**What This Warranty Does Not Cover:**

This Warranty warrants that the Product will be free from manufacturing defects which affect the ability of the Product to operate for its intended use; it is not a warranty that the Product will never require repairs or to undertake responsibilities, liabilities or obligations other than those specifically identified in the preceding section. COWAY is not responsible or liable for personal injury or property damage of any kind, even if arising from a breach of this Warranty.

**Limitations and Exclusions:**

TO THE EXTENT PERMITTED BY APPLICABLE LAW, COWAY DISCLAIMS ANY OTHER WARRANTY EXPRESS OR IMPLIED, THAN THAT PROVIDED FOR HEREIN. THIS WARRANTY IS IN LIEU OF AND EXCLUDES ALL OTHER WARRANTIES, GUARANTEES, CONDITIONS AND REPRESENTATIONS, EXPRESS OR IMPLIED, ORAL OR WRITTEN, STATUTORY OR OTHERWISE, INCLUDING BUT NOT LIMITED TO ANY IMPLIED CONDITIONS OR WARRANTIES AS TO THE MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE OF THE COWAY PRODUCT. SOME STATES DO NOT ALLOW LIMITATIONS ON HOW LONG AN IMPLIED WARRANTY LASTS, SO THE ABOVE LIMITATION MAY NOT APPLY TO YOU. COWAY DOES NOT AUTHORIZE ANY PERSON INCLUDING ITS REPRESENTATIVES, TO MAKE ANY REPRESENTATION OR TO OFFER ANY WARRANTY, CONDITION OR GUARANTY IN RESPECT OF THE PRODUCT OTHER THAN THIS WARRANTY. THIS LIMITED WARRANTY SHALL BE THE OWNER'S SOLE AND EXCLUSIVE REMEDY AGAINST COWAY AND COWAY SHALL NOT BE LIABLE FOR ANY CONSEQUENTIAL, EXEMPLARY, SPECIAL, INCIDENTAL OR OTHER DAMAGES INCLUDING, BUT NOT LIMITED TO, LOSS OF PROFITS, AND LOSS OF USE. INCIDENTAL, CONSEQUENTIAL AND EXEMPLARY DAMAGES SHALL NOT BE RECOVERABLE EVEN IF THE REMEDIES OR THE ACTIONS PROVIDED FOR IN THIS WARRANTY FAIL OF THEIR ESSENTIAL PURPOSE. SOME STATES DO NOT ALLOW THE EXCLUSION OR LIMITATION OF INCIDENTAL OR CONSEQUENTIAL DAMAGES, SO THE ABOVE LIMITATION OR EXCLUSION MAY NOT APPLY TO YOU. COWAY SHALL NOT BE LIABLE FOR ANY DAMAGES WHICH ARE BASED UPON NEGLIGENCE, BREACH OF WARRANTY, STRICT LIABILITY OR ANY OTHER LEGAL THEORY OF LIABILITY OTHER THAN THE EXCLUSIVE LIABILITY SET FORTH IN THIS WARRANTY

**Limitations on Implied Warranties:**

Any implied warranty of merchantability or fitness for a particular purpose or use, shall be limited to the duration of the foregoing express written warranty.

**Conditions of Warranty:**

COWAY's continuing liability under this Warranty is conditioned upon the following :

- a) The defect or damage is not caused by or is the result of : abnormal use or conditions; improper storage, unauthorized modifications or repair; misuse, neglect, accident, alteration, improper installation or other acts that are not the fault of Coway or the manufacturer of the product or that are not covered by the manufacturer's warranty;
- b) The Product has not been altered, modified or repaired without prior written approval of COWAY;
- c) The OWNER has notified COWAY in writing of any failure of the Product covered by this Warranty within thirty (30) days following such failure;
- d) There has been no misuse, abuse or negligence with respect to the Product on the part of the OWNER.

**Waiver:**

COWAY's failure at any time to enforce or rely upon any of the terms or conditions stated herein shall not be construed to be a waiver of its rights hereunder.

**Obtaining Warranty Service and OWNER'S Duties:**

If the Product fails to operate for its intended purpose, then notify Coway or its Representative Agency within 48 hours or within the next business day after discovery of any defect in the Product. The OWNER must give written notice to COWAY no later than thirty (30) days after a defect is discovered or should by reasonable diligence have been discovered. Claims under this Warranty will require proof of purchase by the OWNER.

**USA**

Add : WOONGJIN COWAY USA, INC.  
695 SOUTH VERMONT, STE. 110(SOUTH TOWER) LOS ANGELES, CA 90005, USA  
Call center. : (213) 386-9900 / (213) 480-1600  
Fax. : (213) 386-3990

