

# **Dishwasher** Instruction Manual

### PART I:Generic Version RDW-M450



Please read this manual carefully before using the dishwasher. Keep this manual for future reference. Some figures in this manual may not match with the real object, just for reference only.

# 



### 🖲 NOTE:

- Reviewing the section on troubleshooting Tips will help you solve some common problems by yourself.
- If you cannot solve the problems by yourself, please ask for help from Shun Hing Electric Service Centre Ltd.
- If there are technical improvements on the appliance, the operation manual will be updated in new version without prior notice. The product appearance and specification are subject to the manufacturer information.
- The e-copy of user manual can be sent by e-mail on requested. For enquiries, please call Shun Hing Electric Works& Engineering Co., Ltd. hotline at 2861 2767.

# **SAFETY INFORMATION**

### A WARNING

When using your dishwasher, follow the precautions listed below.

Failure or negligence in observing these safety precautions could cause fire, electric shock or personal injury

- Installation and repair can only be carried out by a qualified technician
- This appliance is intended to be used in household and similar applications such as;
  -staff kitchen areas in shops, offices and other working environments;

-Do not use it outdoors.

- This appliance can be used by children aged from 8 years and above and persons with reduced physical, sensory or mental capabilities or lack of experience and knowledge if they have been given supervision or instruction concerning use of the appliance in a safe way and understand the hazards involved.
- Children shall not play with the appliance. Cleaning and user maintenance shall not be done by children without supervision.

This appliance is not intended for use by persons (including children ) with reduced physical, sensory or mental capabilities, or lack of experience and knowledge, unless they have been given supervision or instruction concerning use of the appliance by a person responsible for their safety.

- Packaging material could be dangerous for children!
- This appliance is for indoor household use only.
- To protect against the risk of electrical shock, do not immerse the unit, cord or plug in water or other liquid.
- Please unplug before cleaning and performing maintenance on the appliance.
- Use a soft cloth moistened with mild soap to clean, and then use a dry cloth to wipe it again.

# • 🖶 Earthing Instructions

- This appliance must be earthed. In the event of a malfunction or breakdown, earthing will reduce the risk of an electric shock by providing a path of least resistance of electric current. This appliance is equipped with an earthing conductor plug.
- The plug must be plugged into an appropriate outlet that is installed and earthed in accordance with all local codes and ordinances.
- Improper connection of the equipment-earthing conductor can result in the risk of an electric shock.
- Check with a qualified electrician or Shun Hing Electric Service Centre Ltd. if you are in doubt whether the appliance is properly grounded.

- Do not modify the plug provided with the appliance; If it does not fit the outlet.
- Have a proper outlet installed by a qualified electrician.
- Do not abuse, sit on, or stand on the door or dish rack of the dishwasher.
- Do not operate your dishwasher unless all enclosure panels are properly in place.
- Open the door very carefully if the dishwasher is operating, there is a risk of water squirting out.
- Do not place any heavy objects on or stand on the door when it is open. The appliance could tip forward.
- When loading items to be washed:
  - 1) Locate sharp items so that they are not likely to damage the door seal;
  - 2) WARNING: Knives and other utensils with sharp points must be loaded in the basket with their points facing down or placed in a horizontal position.
- Some dishwasher detergents are strongly alkaline. They can be extremely dangerous if swallowed. Avoid contact with the skin and eyes and keep children away from the dishwasher when the door is open.
- Check that the detergent powder is empty after completion of the wash cycle.

- Do not wash plastic items unless they are marked "dishwasher safe" or the equivalent.
- For unmarked plastic items not so marked, check the manufacturer's recommendations.
- Use only detergent and rinse agents recommended for use in an automatic dishwasher.
- Never use soap, laundry detergent, or hand washing detergent in your dishwasher.
- The door should not be left open, since this could increase the risk of tripping.
- If the supply cord is damaged, it must be replaced by the manufacturer or its service agent or a similarly qualified person in order to avoid a hazard.
- During installation, the power supply must not be excessively or dangerously bent or flattened.
- Do not tamper with controls.
- The appliance needs to be connected to the main water valve using new hose sets. Old sets should not be reused.
- To save energy, in stand by mode, the appliance will switch off automatically while there is no any operation in 30 minutes .
- The maximum number of place settings to be washed is 10.
- The maximum permissible inlet water pressure is 1MPa.
- The minimum permissible inlet water pressure is 0.04MPa.

- Use specific powder detergents for dishwasher use only (liquid detergent is prohibited), and keep them out of reach of children.
- Do not touch the heating element during or immediately after operation to avoid burned by residual heat.
- To reduce the risk of injury, do not allow children to play inside or on the appliance.
- Danger of explosion! Do not add any solvent into the washing chamber.
- Keep children away from detergents. It may cause chemical burns in mouth, throat or eyes or as a result of suffocation. If accidentally splash into eyes, rinse immediately with water and seek medical treatment promptly.
- Keep children away from dishwasher when open door, as remaining water in the washing chamber may contain detergent residue.
- Prevent sharp objects from scratching the plastic packing of the door and the body, to avoid the body rupturing and leakaging, and leading to electric shock hazard.
- If door cannot be closed firmly; or any deformation or damage found on the door and handle, stop operating the appliance immediately to avoid hazards. Contact Shun Hing Electric Service Centre Limited for checking and repairing.
- Do not place any objects or allow dust or detergent residue accumulate between the body and the door.

- Always keep the spray arm and filters clean to avoid affecting the rotation of the spray arm and cleaning performance. If the rotation of the spray arm is not smooth or the cleaning effect is not good, check if the spray arm and the filters are installed firmly. Disassemble the spray arm and filters and check if any residue blocking the outlet nozzle.
- Make sure all accessories are well installed before operation, otherwise, overflow or water leakage may happen due to high water pressure.
- Use dishwasher powder detergent only. Do not use other easy-to-foaming detergents to substitute such as liquid detergent, soap, laundry detergent, or liquid soap etc; otherwise it may cause malfunction or dangerous.
- Never immerse the appliance, power cord and plug in water or let them wet, as to avoid functional damage to the appliance and electric shock.
- The appliance is for household use only. Do not use it outdoors and in any other purpose or method which is not following the instructions in the user manual. If the appliance is used improperly, for commercial or semi-commercial use, your warranty becomes invalid and our company will refuse any liability and repairing cost for the damage caused.

- Always check the power cord, plug, door, spray arm, filters and baskets to ensure they are in good condition. To avoid hazards, stop operating the appliance immediately if any damaged or the appliance is dropped. Contact Shun Hing Electric Service Centre Limited for checking and repairing.
- Do not use or attempt to replace any part or accessory which was produced without authorities to avoid accidents. Otherwise the warranty becomes invalid.

# , Disposal

 For disposing of package and the appliance please go to a recycling center. Therefore cut off the power supply cable and make the door closing device unusable.



- Cardboard packaging is manufactured from recycled paper and should be disposed in the waste paper collection for recycling.
- By ensuring this product is disposed of correctly, you will help prevent potential negative consequences for the environment and human health, which could otherwise be caused by inappropriate waste handling of this product.
- For more detailed information about recycling of this product, please contact local relevant department and your household waste disposal service.

# **PRODUCT OVERVIEW**

### 0

To get the best performance from your dishwasher, read all operating instructions



### NOTE:

Above illustration is for reference only, appearance refer to actual product.

## , Basket Used Tips

### Adjusting the upper basket

#### Type 1:

The height of the upper basket can be easily adjusted to accommodate taller dishes in either the upper or lower basket.

To adjust the height of the upper rack, follow these steps:



Type 2:



To raise the upper basket, just lift the upper basket at the center of each side until the basket locks into place in the upper position. It is not necessary to lift the adjuster handle.



To lower the upper basket, lift the adjust handles on each side to release the basket and lower it to the lower position.

### Folding back the cup shelves

To make room for taller items in the upper basket, raise the cup rack upwards. You can then lean the tall glasses against it. You can also remove it when it is not required for use.



### Folding back the rack shelves

The spikes of the lower basket are used for holding plates and a platter. They can be lowered to make more room for large items.



# **MAINTENANCE AND CLEANING**

## • External Care

### The door and the door seal

Clean the door seals regularly with a soft damp cloth to remove food deposits. When the dishwasher is being loaded, food and drink residues may drip onto the sides of the dishwasher door. These surfaces are outside the wash cabinet and are not accessed by water from the spray arms. Any deposits should be wiped off before the door is closed.

#### The control panel

If cleaning is required, the control panel should be wiped with a soft damp cloth only.

### **A**WARNING

- To avoid penetration of water into the door lock and electrical components, do not use a spray cleaner of any kind.
- Never use abrasive cleaners or scouring pads on the outer surfaces because they may scratch the finish. Some paper towels may also scratch or leave marks on the surface.

## • Internal Care

#### **Filtering system**

The filtering system in the base of the wash cabinet retains coarse debris from the washing cycle. The collected coarse debris may cause the filters to clog. Check the condition of the filters regularly and clean them if necessary under running water. Follow the steps below to clean the filters in the wash cabinet.

### 🕷 NOTE:

Pictures are only for reference, different models of the filtering system and spray arms may be different.



Hold the coarse filter and rotate it anticlockwise to unlock the filter. Lift the filter upwards and out of the dishwasher.



Larger food remnants can be cleaned by rinsing the filter under running water.

For a more thorough clean, use a soft cleaning brush.

### 



The fine filter can be pulled off the bottom of the filter assembly. The coarse filter can be detached from the main filter by gently squeezing the tabs at the top and pulling it away.



- Reassemble the filters in the reverse order of the disassembly, replace the filter insert, and rotate clockwise to the close arrow.
- Do not over tighten the filters. Put the filters back in sequence securely, otherwise coarse debris could get into the system and cause a blockage.
- Never use the dishwasher without filters in place. Improper replacement of the filter may reduce the performance level of the appliance and damage dishes and utensils.

### Spray arms

It is necessary to clean the spray arms regularly for mineral in water will clog the spray arm jets and bearings.

2

To clean the spray arms, follow the instructions below:



To remove the upper spray arm, hold the nut in the center still and rotate the spray arm counterclockwise to remove it.



To remove the lower spray arm, pull out the spray arm upward.



Wash the arms in soapy and warm water and use a soft brush to clean the jets. Install them after rinsing them thoroughly.

## , Caring For The Dishwasher

### **Frost precaution**

Please take frost protection measures on the dishwasher in winter. Every time after washing cycles, please operate as follows:

- 1. Cut off the electrical power to the dishwasher at the supply source.
- **2.** Turn off the water supply and disconnect the water inlet pipe from the water valve.
- 3. Drain the water from the inlet pipe and water valve. (Use a pan to gather the water)
- **4.** Reconnect the water inlet pipe to the water valve.
- **5.** Remove the filter at the bottom of the tub and use a sponge to soak up water in the sump.

#### After every wash

After every wash, turn off the water supply to the appliance and leave the door slightly open so that moisture and odors are not trapped inside.

### Remove the plug

Before cleaning or performing maintenance, always remove the plug from the socket.

#### No solvents or abrasive cleaning

To clean the exterior and rubber parts of the dishwasher, do not use solvents or abrasive cleaning products. Only use a cloth with warm soapy water. To remove spots or stains from the surface of the interior, use a cloth dampened with water an a little vinegar, or a cleaning product made specifically for dishwashers.

### When not in use for a longtime

It is recommend that you run a wash cycle with the dishwasher empty and then remove the plug from the socket, turn off the water supply and leave the door of the appliance slightly open. This will help the door seals to last longer and prevent odors from forming within the appliance.

### Moving the appliance

If the appliance must be moved, try to keep it in the vertical position. If absolutely necessary, it can be positioned on its back.

#### Seals

One of the factors that cause odours to form in the dishwasher is food that remains trapped in the seals. Periodic cleaning with a damp sponge will prevent this from occurring.

# INSTALLATION INSTRUCTION

### 



**Electrical Shock Hazard** Disconnect electrical power before installing dishwasher. Failure to do so could result in death or electrical shock.

### **A** Attention

The installation of the pipes and electrical equipments should be done by professionals.

## **About Power Connection**

### 

For personal safety:

- Do not use an extension cord or an adapter plug with this appliance.
- Do not cut or remove the earthing connection from the power cord under any circumstances.

### **Electrical requirements**

Please look at the rated label to know the rating voltage and connect the dishwasher to the appropriate power supply.

#### **A** Ensure that proper earthing exists before use

## • Water Supply And Drain

### **Cold water connection**

Connect the cold water supply hose to a threaded 3/4(inch) connector and make sure that it is fastened tightly in place.

If the water pipes are new or have not been used for an extended period of time, let the water run to make sure that the water is clear. This precaution is needed to avoid the risk of the water inlet to be blocked and damage the appliance.



ordinary supply hose

## Connection Of Drain Hoses

Insert the drain hose into a drain pipe with a minimum diameter of 4 cm, or let it run into the sink, making sure to avoid bending or crimping it. The height of drain pipe must be less than 1000mm. The free end of the hose must not be immersed in water to avoid the back flow of it.



A Please securely fix the drain hose in either position A or position B

#### How to drain excess water from hoses

If the sink is 1000mm higher from the floor, the excess water in hoses cannot be drained directly into the sink.

### Water outlet

Connect the water drain hose. The drain hose must be correctly fitted to avoid water leaks. Ensure that the water drain hose is not kinked or squashed.

### **Extension hose**

If you need a drain hose extension, make sure to use a similar drain hose. It must be no longer than 4 meters; otherwise the cleaning effect of the dishwasher could be reduced.

### Syphon connection

The waste connection must be at a height less than 1000 mm (maximum) from the bottom of the dish. The water drain hose should be fixed .

# Position The Appliance

Position the appliance in the desired location. The back should rest against the wall behind it, and the sides, along the adjacent cabinets or walls. The dishwasher is equipped with water supply and drain hoses that can be positioned either to the right or the left sides to facilitate proper installation.

### Levelling the appliance

Once the appliance is positioned for levelling, the height of the dishwasher may be altered via adjustment of the screwing level of the feet. In any case, the appliance should not be inclined more than  $2^{\circ}$ .

## \* NOTE:

Only apply to the free standing dishwasher.

## Free Standing Installation

### Fitting between existing carbinets

The height of the dishwasher, 845 mm, has been designed in order to allow the machine to be fitted between existing cabinets of the same height in modern fitted kitchens. The feet can be adjusted so that correct height is reached.

The laminated top of the machine does not require any particular care since it is heatproof, scratchproof and stainproof.





## Dishwasher Installation

### Selecting the best location for the dishwasher

The installation position of dishwasher should be near the existing inlet drain hoses and power cord.

Illustrations of cabinet dimensions and installation position of the dishwasher.

1. Less than 5 mm between the top of dishwasher and cabinet and the outer door aligned to cabinet.



**2.** If dishwasher is installed at the corner of the cabinet, there should be some space when the door is opened.



### 🖲 NOTE:

Depending on where your electrical outlet is, you may need to cut a hole in the opposite cabinet side.

### Levelling the dishwasher

Dishwasher must be level for proper dish rack operation and wash performance.

- **1.** Place a spirit level on door and rack track inside the tub as shown to check that the dishwasher is level.
- 2. Level the dishwasher by adjusting the three levelling legs individually.
- 3. When level the dishwasher, please pay attention not to let the dishwasher tip over.



### NOTE:

The maximum adjustment height of the feet is 50 mm.

# **TROUBLESHOOTING TIPS**

### **Before Calling For Service**

Reviewing the charts on the following pages may save you from calling for service.

Problem	Possible Causes	What To Do
Dishwasher doesn't start	Fuse blown, or the circuit break tripped.	Replace fuse or reset circuit breaker. Remove any other appliances sharing the same circuit with the dishwasher.
	Power supply is not turned on.	Make sure the dishwasher is turned on and the door is closed securely. Make sure the power cord is properly plugged into the wall socket.
	Water pressure is low	Check that the water supply is connected properly and the water is turned on.
	Door of dishwasher not properly closed.	Make sure to close the door properly and latch it.
Water not pumped form dishwasher	Twisted or trapped drain hose.	Check the drain hose.
	Filter clogged.	Check coarse the filter.
	Kitchen sink clogged.	Check the kitchen sink to make sure it is draining well. If the problem is the kitchen sink that is not draining , you may need a plumber rather than a serviceman for dishwashers.
Suds in the tub	Wrong detergent.	Use only the special dishwasher detergent to avoid suds. If this occurs, open the dishwasher and let suds evaporate. Add 1 gallon of cold water to the bottom of the dishwasher. Close the dishwasher door, then select any cycle. Initially, the dishwasher will drain out the water. Open the door after draining stage is complete and check if the suds have disappeared. Repeat if necessary.

Problem	Possible Causes	What To Do
	Spilled rinse-aid.	Always wipe up rinse-aid spills immediately.
Stained tub interior	Detergent with colourant may have been used.	Make sure that the detergent has no colourant.
White film on inside surface	Hard water minerals.	To clean the interior, use a damp sponge with dishwasher detergent and wear rubber gloves. Never use any other cleaner than dishwasher detergent otherwise, it may cause foaming or suds.
There are rust stains on cutlery	The affected items are not corrosion resistant.	Avoid washing items that are not corrosion resistant in the dishwasher.
Knocking noise in the dishwasher	A spray arm is knocking against an item in a basket	Interrupt the program and rearrange the items which are obstructing the spray arm.
Rattling noise in the dishwasher	Items of crockery are loose in the dishwasher.	Interrupt the program and rearrange the items of crockery.
Knocking noise in the water pipes	This may be caused by on-site installation or the cross-section of the piping.	This has no influence on the dishwasher function. If in doubt, contact a qualified plumber.
The dishes are not clean	The dishes were not loaded correctly.	See PART II "Preparing And Loading Dishes".
	The program was not powerful enough.	Select a more intensive program.

Problem	Possible Causes	What To Do
The dishes are not clean.	Not enough detergent was dispensed.	Use more detergent, or change other detergent.
	Items are blocking the movement of the spray arms.	Rearrange the items so that the spray can rotate freely.
	The filter combination is not clean or is not correctly fitted in the base of wash cabinet. This may cause the spray arm jets to get blocked.	Clean and/or fit the filter correctly. Clean the spray arm jets.
Cloudiness on glassware.	Too much detergent.	Use less detergent if you have soft water and select a shorter cycle to wash the glassware and to get them clean.
White spots appear on dishes and glasses.	Hard water area can cause limescale deposits.	Add more detergent.
Black or grey marks on dishes	Aluminium utensils have rubbed against dishes	Use a mild abrasive cleaner to eliminate those marks.
Detergent left in dispenser	Dishes block detergent dispenser	Re-loading the dishes properly.
The dishes aren't drying	Improper loading	Load the dishwasher as suggested in the directions.
	Dishes are removed too soon	Do not empty your dishwasher immediately after washing. Open the door slightly so that the steam can come out. Take out the dishes until the inside temperature is safe to touch. Unload the lower basket first to prevent the dropping water from the upper basket.

Problem	Possible Causes	What To Do
The dishes aren't drying	Wrong program has been selected.	With a short program, the washing temperature is lower, decreasing cleaning performance. Choose a program with a long washing time.
	Use of cutlery with a low-quality coating.	Water drainage is more difficult with these items. Cutlery or dishes of this type are not suitable for washing in the dishwasher.

# LOADING THE BASKETS

### 1.Upper basket:



Number	ltem
1	Cups
2	Saucers
3	Glasses
4	Small serving bowl
5	Medium serving bow
6	Large serving bowl

2.Lower basket:



Number	ltem
7	Dessert dishes
8	Dinner p <b>l</b> ates
9	Soup plates
10	Oval platter





Number	ltem
1	Soup spoons
2	Forks
3	Knives
4	Teaspoons
5	Dessert spoons
6	Serving spoons
7	Serving forks
8	Gravy ladles



# **Dishwasher** Instruction Manual

PART II: Special Version RDW-M450

# 



### 🖲 NOTE:

- If you cannot solve the problems by yourself, please ask for help from a Shun Hing Electric Service Centre Ltd.
- If there are technical improvements on the appliance, the operation manual will be updated in new version without prior notice. The product appearance and specification are subject to the manufacturer information.
- The e-copy of user manual can be sent by e-mail on requested. For enquiries, please call Shun Hing Electric Works& Engineering Co., Ltd. hotline at 2861 2767

# QUICK USER GUIDE

Please read the corresponding content on the instruction manual for detailed operating method.



# USING YOUR DISHWASHER

## Control Panel



### **Operation (Button)**

1 Power	Press this button to turn on your dishwasher, the screen lights up.
2 opt	Press the button to select either upper basket or lower basket loaded, and the response indicators will be lit.
3 Delay	Press this button to set the delayed hours for washing. You can delay the start of washing up to 24 hours. One press on this button delays the start of washing by one hour.
4 Child lock	This option allows you to lock the buttons on the control panel, except the Power button, so children cannot accidentally start the dishwasher by pressing the buttons on the panel. To lock or unlock the buttons on the control panel, press and hold the opt button+ Delay button for 3 seconds simultaneously.
5 Program	Press this button to select the appropriate washing program, the selected program indicator will be lit. Press pause button, then press program button for 3 seconds to cancel the selected program.
6 Funciton	Press the button to select a function, corresponding indicator will be lit.
7 Start/Pause	Press the button to start the selected program.

	Prog	ram indication
	(A)	Auto For lightly, normally or heavily soiled crockery with or without dried-on food.
	Ċ	Intensive For heaviest soiled crockery, and normally soiled pots, pans, dishes etc. With dried-on food.
	D)	Normal For normally soiled loads, such as pots, plates, glasses and lightly soiled pans.
	ECO	ECO This is standard program, it is suitable to clean normally soiled tableware and it is the most efficient program in terms of its combined energy and water consumption for that type of tableware.
	Ţ	Glass For lightly soiled crockery and glass.
8 Screen	(-) <sub>90'</sub>	<b>90 mins</b> For normally soiled loads that need quick wash.
	$\overline{\Delta}^{\Delta}$	Rapid A shorter wash for lightly soiled loads that do not need drying.
	ℼ	<b>Soak</b> To rinse dishes that you plan to wash later that day.
	Func	tion indication
	//\`	<b>Upper</b> When you select Upper, only the upper rack nozzle is activated.The lower nozzle will not operate.
	11/	<b>Lower</b> When you select Lower, only the lower rack nozzle is activated. The upper nozzle will not operate.

	Func	tion indication
	ġ,	<b>Extra Cleaning</b> To wash very dirty, hard to clean dishes. ( It can only be used with Intensive, Normal, ECO, Glass, 90mins)
	Ú	<b>Extra Drying</b> To dry dishes more completely.( It can only be used with Intensive, Normal, ECO, Glass, 90mins)
	<u>-</u> 0	Express Reduce the program time.
8 Screen	8:8	B To show the reminding time and delay time,error codes etc.
	Warning indication	
	茶	<b>Rinse Aid</b> If the " $\frac{1}{2}$ " indicator is lit, it means the dishwasher is low on dishwasher rinse aid and requires a refill.
	Ŷ	Salt If the " $\Leftrightarrow$ " indicator is lit, it means the dishwasher is low on dishwasher salt and needs to be refilled.
	<b>-</b> 5	Water Faucet If the " ${\to}$ " indicator is lit, it means the water faucet closed.

### NOTE:

#### If your model does not have any water softener, you may skip this section. Water Softener

The hardness of the water varies from place to place. If hard water is used in the dishwasher, deposits will form on the dishes and utensils.

The appliance is equipped with a special softener that uses a salt container specifically designed to eliminate lime and minerals from the water.

## Preparing And Loading Dishes

- Consider buying utensils which are identified as dishwasher-proof.
- For particular items, select a program with the lowest possible temperature.
- To prevent damage, do not take glass and cutlery out of the dishwasher immediately after the program has ended.

### For washing the following cutlery/dishes

#### Are not suitable

- Cutlery with wooden, horn china or mother-of-pearl handles
- Plastic items that are not heat resistant
- Older cutlery with glued parts that are not temperature resistant
- Bonded cutlery items or dishes
- Pewter or copper items
- Crystal glass
- Steel items subject to rusting
- Wooden platters
- Items made from synthetic fibres

#### Are of limited suitability

- Some types of glasses can become dull after a large number of washes
- Silver and aluminum parts have a tendency to discolour during washing
- Glazed patterns may fade if machine washed frequently
### **Recommendations for loading the dishwasher**

Scrape off any large amounts of leftover food. Soften remnants of burnt food in pans. It is not necessary to rinse the dishes under running water.

For best performance of the dishwasher, follow these loading guidelines.

# (Features and appearance of baskets and cutlery baskets may vary from your model.)

Place objects in the dishwasher in following way:

- Items such as cups, glasses, pots/pans, etc. are faced downwards.
- Curved items, or ones with recesses, should be loaded aslant so that water can run off.
- All utensils are stacked securely and can not tip over.
- All utensils are placed in the way that the spray arms can rotate freely during washing.
- Load hollow items such as cups, glasses, pans etc. With the opening facing downwards so that water cannot collect in the container or a deep base.
- Dishes and items of cutlery must not lie inside one another, or cover each other.
- To avoid damage, glasses should not touch one another.
- The upper basket is designed to hold more delicate and lighter dishware such as glasses, coffee and tea cups.
- Long and / or sharp items of cutlery such as carving knives must be positioned horizontally in the upper basket.
- Please do not overload your dishwasher. This is important for good results and for reasonable consumption of energy.

#### NOTE:

Very small items should not be washed in the dishwasher as they could easily fall out of the basket.

### Removing the dishes

To prevent water dripping from the upper basket into the lower basket, we recommend that you empty the lower basket first, followed by the upper basket.

### 

**Items will be hot!** To prevent damage and scald, do not take glass and cutlery out of the dishwasher for around 15 minutes after the program has ended.

#### 9

### Loading the upper basket

The upper basket is designed to hold more delicate and lighter dishware such as glasses, coffee and tea cups and saucers, as well as plates, small bowls and shallow pans (as long as they are not too dirty). Position the dishes and cookware so that they will not get moved by the spray of water.

### Loading the lower basket

We suggest that you place large items and the most difficult to clean items are to be placed into the lower basket: such as pots, pans, lids, serving dishes and bowls, as shown in the figure below. It is preferable to place serving dishes and lids on the side of the racks in order to avoid blocking the rotation of the top spray arm. The maximum diameter advised for plates in front of the detergent dispenser is of 19 cm, this not to hamper the opening of it.

### Loading the cutlery basket

Cutlery should be placed in the cutlery rack separately from each other in the appropriate positions, and do make sure the utensils do not nest together, this may cause bad performance.

### 

Do not let any item extend through the bottom. Always load sharp utensils with the sharp point down!

For the best washing performance, please load the baskets refer to standard loading options on last section of PART I : Generic Version







# • Function Of The Rinse Aid And Detergent

The rinse aid is released during the final rinse to prevent water from forming droplets on your dishes, which can leave spots and streaks. It also improves drying by allowing water to roll off the dishes. Your dishwasher is designed to use liquid rinse aids.

### **A**WARNING

Only use branded rinse aid for dishwasher. Never fill the rinse aid dispenser with any other substances (e.g. Dishwasher cleaning agent, liquid detergent). This would damage the appliance.

### When to refill the rinse aid

The regularity of the dispenser needing to be refilled depends on how often dishes are washed and the rinse aid setting used.

- The Low Rinse Aid indicator (  $~~\ref{lines}~~$  ) will appear in the display when more rinse aid is needed.
- Do not overfill the rinse aid dispenser.

### Function of detergent

The chemical ingredients that compose the detergent are necessary to remove, crush and dispense all dirt out of the dishwasher. Most of the commercial quality detergents are suitable for this purpose.

## 

- Proper Use of Detergent
- Use only detergent specifically made for dishwashers use. Keep your detergent fresh and dry.
- Don't put powdered detergent into the dispenser until you are ready to wash dishes.



Dishwasher detergent is corrosive! Keep dishwasher detergent out of the reach of children.



### Adjusting the rinse aid reservoir

To achieve a better drying performance with limited rinse aid, the dishwasher is designed to adjust the consumption by user. Follow the below steps.

- 1. Power on the dishwasher by plugging in;
- **2.** Within 60 seconds after step 1, press the Start/Pause button more than 5 seconds, and then press the Delay Button to enter the set mode, the rinse aid indicator blinks as 1Hz frequency.
- **3.** Press the Start/Pause button to select the proper set according to your using habits, the sets will change in the following sequence: D1->D2->D3->D4->D5->D1, Dispenser drops more rinse aid in D5 level than in another, the manufactory setting is D3.
- **4.** Without operation in 5 seconds or press the power button to exit the set mode, the set success.

Selector position	Amount of rinse aid (ml)
D1	1.2
D2	2.4
D3	3.6
D4	4.8
D5	6.0

# Filling The Detergent Dispenser



Please choose an open way according to the actual situation.

**1.** Open the cap by sliding the release catch.

**2.** Open the cap by pressing down the release catch.



Add detergent into the larger cavity
(A) for the main wash cycle .
For better cleaning result, especially if you have very dirt items, pour a small amount of detergent onto the door.
The additional detergent will activate during the pre-wash phase.



Close the flap by sliding it to the front and then pressing it down.

## 🕷 NOTE:

- Be aware that depending on the soiling of water, setting may be different.
- Please observe the manufacturer's recommendations on the detergent packaging.

# **PROGRAMMING THE DISHWASHER**

# 、Wash Cycle Table

The table below shows which programs are best for the levels of food residue on them and how much detergent is needed. It also show various information about the programs.

( )Means: need to fill rinse into the Rinse-Aid Dispenser.

Program	Description Of Cycle	Detergent Pre/Main	Running Time(min)	Energy ( <b>kWh</b> )	Water (L)	Rinse Aid
A) Auto	Pre-wash(45℃) Autowash (45-55℃) Rinse Rinse(65℃) Drying	5/30g (Or 3 in 1)	150	0.9~1.3	9.5~13	•
<b>Intensive</b>	Prewash(50°C) Wash(60°C) Rinse Rinse Rinse(70°C) Drying	5/30g (Or 3 in 1)	170	1.4	15.5	•
U Normal	Prewash(45℃) Wash(55℃) Rinse Rinse(65℃) Drying	5/30g (Or 3 in 1)	180	1.1	12	•
ECO	Prewash Wash(45℃) Rinse(65℃) Drying	5/30g (Or 3 in 1)	195	0.74	8	٠
다. Glass	Pre-wash wash(40℃) Rinse Rinse(60℃) Drying	5/30g (Or 3 in 1)	125	0.75	12	•
() 90' 90 Min	Wash(65℃) Rinse Rinse(65℃) Drying	259 (Or 3 in 1)	90	1.15	11.5	•

Program	Description Of Cycle	Detergent Pre/Main	Running Time(min)	Energy ( <b>kWh</b> )	Water (L)	Rinse Aid
Q □ Rapid	Wash(45℃) Rinse(50℃) Rinse(55℃)	20g	30	0.7	10	0
Soak	Prewash		15	0.02	3.5	0

.

# • Starting a cycle wash

- **1.** Draw out the lower and upper basket, load the dishes and push them back. It is recommended to load the lower basket first, then the upper one.
- 2. Pour in the detergent.
- **3.** Insert the plug into the socket. The power supply refer to last page "Product fiche". Make sure that the water supply is turned on to full pressure.
- 4. Close the door, press the Power button, to switch on the machine.
- **5.** Choose a program, the response light will turn on. Then press the Start/Pause button, the dishwasher will start its cycle.

# Changing The Program Mid-cycle

A wash cycle can only be changed if it has been running for a short time otherwise, the detergent may have already been released and the dishwasher may have already drained the wash water. If this is the case, the dishwasher needs to be reset and the detergent dispenser must be refilled. To reset the dishwasher, follow the instructions below:

- 1. Press the Start/Pause button to pause the washing.
- 2. Press Program button for more than 3 seconds the program will cancel.
- **3.** Press the Program button to select the desired program.
- 4. Press the Start/Pause button, after 10 seconds, the dishwasher will resume.



# • Forget To Add A Dish?

A forgotten dish can be added any time before the detergent dispenser opens. If this is the case, follow the instructions below:

- 1. Press the Start/Pause button to pause the washing.
- 2. Wait 5 seconds then open the door.
- 3. Add the forgotten dishes.
- 4. Close the door.
- 5. Press the Start/Pause button after 10 seconds, the dishwasher will resume.



How to judge whether the detergent dispenser is open? As shown in the figure below:



Closed



Opened



It is dangerous to open the door mid-cycle, as hot steam and water may scald you.

# ERROR CODES

If there is a malfunction, the dishwasher will display error codes to identify these:

Codes	Meanings	Possible Causes
E1	Excess water inlet time.	Faucets is not opened, or water intake is blocked, or water pressure is too low.
E3	Not reaching required temperature.	Malfunction of heating element.
E4	Overflow.	Some element of dishwasher leaks.
E8	Failure of orientation of distributary valve.	Open circuit or break of distributary valve.
Ed	Failure of communication between main PCB with display PCB.	Open circuit or break wiring for the communication.

### 

- If overflow occurs, turn off the main water supply before calling a service.
- If there is water in the base pan because of an overfill or small leak, the water should be removed before restarting the dishwasher.

# **TECHNICAL INFORMATION**



Height (H)	845mm	
Width (W)	448mm	
Depth (D1)	610mm (with the door closed)	
Depth (D2)	1175mm (with the door opened 90 $^\circ$ )	

### **Product fiche**

Type / Description	RDW-M450
Standard place settings	10 sets
Program duration of the ECO cleaning cycle	195 min
Noise level	44 dB(A)
Mounting	Free standing
Power consumption	1760-2100W
Rated voltage / frequency	220-240V/50Hz
Water pressure (flow pressure)	0.04-1.0MPa=0.4-10 bar

#### SpecialAvowal

1. The content in the manual has been checked. Our company reserves the hermeneutic power to any printing errors or misunderstanding on the content.

2. If there are technical improvements on the appliance, the operation manual will be updated in new version without prior notice. The product appearance and specification are subject to the manufacturer information.

3. In case there is any inconsistency or conflict between the English versions and Chinese versions of the terms, The Chinese versions shall prevail.

#### After Sales Service

1. For any defect, in the judgment of technician from Shun Hing Electric Service Centre Limited, caused under normal use, our company is responsible for repairing or replacing parts of the said electrical appliance free of charge within one year guarantee period commencing from the date of purchase. Any defective part which has been replaced shall became our property. Warranty service does not cover the repair or replacement of consumable parts such as power cord, drain hose, door, spray arm, dishwasher basket, cutlery basket, filters and enclosure, etc. If the appliance is used improperly, for commercial or semi-commercial use, or not following the instructions in the operation manual, the warranty becomes invalid and our company will refuse any liability and repairing cost for the damage caused.

2. User must present the official invoice/ redemption voucher and the warranty registration card with the chop from sales point/ redemption center for maintenance. For enquiries, please call Shun Hing Electric Service Centre Limited hotline at 2406 5666.

### **灯Rasonic** 樂信牌



信興電工工程有限公司

### SHUN HING ELECTRIC WORKS & ENGINEERING CO., LTD 辦公室:香港九龍尖沙咀東部麼地道 67 號半島中心 9 樓

OFFICE: 9/F, PENINSULA CENTRE, 67 MODY ROAD, TSIMSHATSUI EAST, KOWLOON, HONG KONG

電話 TEL: (852) 2861 2767 傳真 FAX: (852) 2865 6706 網址 WEBSITE: www.rasonic.com 電郵 EMAIL: shew@shunhinggroup.com

### 保養及維修 MAINTENANCE AND REPAIR SERVICE 信興電器服務中心有限公司 SHUN HING ELECTRIC SERVICE CENTRE LTD. 辦公室: 香港新界葵涌勝耀街2號信興中心11樓 OFFICE: 11TH FLOOR, SHUN HING CENTRE, 2 SHING YIU STREET, KWAI CHUNG, NEW TERRITORIES, HONG KONG

電話 TEL: (852) 2406 5666 傳真 FAX: (852) 2408 0316

網址 WEBSITE: www.shesc.com

消耗品/附件銷售熱線 CONSUMABLES/ ACCESSORIES SALES HOTLINE 電話 TEL: (852) 2406 5666

#### 客戶服務中心 CUSTOMER SERVICE CENTRES

香港新界葵涌勝耀街2號信興中心1樓

1ST FLOOR, SHUN HING CENTRE, 2 SHING YIU STREET, KWAI CHUNG, NEW TERRITORIES, HONG KONG

電話 TEL: (852) 2406 5439 傳真 FAX: (852) 2408 1389

澳門慕拉士大馬路193-199號南嶺工業大廈5樓I座 AVENIDA DE VENCESLAU DE MORAIS, NO. 193-199, 5 ANDAR-I, EDF. INDUSTRIAL NAM LENG, MACAU 電話 TEL: (853) 2836 2928 傳真 FAX: (853) 2833 6405

#### 有關最新之客戶服務中心資訊, 請參閱信興服務中心網址: www.shesc.com或致電維修 服務熱線查詢。

For the latest information of customer service centres, please visit www.shesc.com or call us at our hotline.

RDW/M/2209