

# Product Training

## STEAM DISHWASHER

LDF9810ST





# No Solicitation

**LG Electronics in no way supports, condones, or will tolerate the solicitation of personnel while in attendance to this, or any LG event. Furthermore, there will be no communication of salary, benefits or job descriptions in general. Anyone found to be part of any such communication will immediately be dismissed from this class, and will not be allowed to attend future events.**

*LG supplies this training class for the benefit of all in attendance, we ask your assistance in keeping this a professional meeting and to remain focused only on the technical improvement and education of our service network.*

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# Preliminary

**IMPORTANT SAFETY NOTICE**

**DISCLAIMER**

**MODIFICATIONS**

**ESD ISSUE**

**REGULATORY INFORMATION**

**Slide Number**

**Page in Training Manual**

# Preliminary

## COMPLIANCE

The responsible party for this device's compliance is:

**LG Electronics Alabama, Inc.**  
**PO Box 240007**  
**Huntsville, AL, 35813**

# Safety Tips

- Unplug or disconnect the dishwasher before starting repairs.
- Steam is HOT! Use caution when dealing with live steam or hot parts.
- Do not stand on the open door.
- Do not allow children to play in the dishwasher.
- Do see the rest of the safety tips on page 4 in the training manual.

# Warranty



## LG ELECTRONICS, INC. LG Dishwasher Limited Warranty - USA

Your LG Dishwasher will be repaired or replaced, at LG's option, if it proves to be defective in material or workmanship under normal use, during the warranty period ("Warranty Period") set forth below, effective from the date ("Date of Purchase") of original consumer purchase of the product. This warranty is good only to the original purchaser of the product and effective only when used in the United States, including Alaska, Hawaii and U.S. Territories.

### WARRANTY PERIOD:

**LABOR:** One Year from the Date of Purchase.

**PARTS** (except as listed below): 2 Years from the Date of Purchase.

**Electronic Control Board:** 5 Years from the Date of Purchase.

**Dishwasher Rack:** 5 Years from the Date of Purchase.

**Stainless Steel Door Liner and Tub:** Lifetime (as long as owned by the original purchaser)

Replacement Units and Repair Parts may be new or factory remanufactured.

Replacement Units and Repair Parts are warranted for the remaining portion of the original unit's warranty period.

### HOW SERVICE IS HANDLED:

**In-Home Service:** Please retain dealer's dated bill of sale or delivery ticket as evidence of the Date of Purchase for proof of warranty, and submit a copy of the bill of sale to the service person at the time warranty service is provided.

**Please call 1-800-243-0000 and choose the appropriate option to locate your nearest LG Authorized Service Center.**

Or visit our website at : <http://www.lgservice.com>.

**THIS WARRANTY IS IN LIEU OF ANY OTHER WARRANTY, EXPRESS OR IMPLIED, INCLUDING WITHOUT LIMITATION, ANY WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. TO THE EXTENT ANY IMPLIED WARRANTY IS REQUIRED BY LAW, IT IS LIMITED IN DURATION TO THE EXPRESS WARRANTY PERIOD ABOVE. NEITHER THE MANUFACTURER NOR ITS U.S. DISTRIBUTOR SHALL BE LIABLE FOR ANY INCIDENTAL, CONSEQUENTIAL, INDIRECT, SPECIAL, OR PUNITIVE DAMAGES OF ANY NATURE, INCLUDING WITHOUT LIMITATION, LOST REVENUES OR PROFITS, OR ANY OTHER DAMAGE WHETHER BASED IN CONTRACT, TORT, OR OTHERWISE.** Some states do not allow the exclusion or limitation of incidental or consequential damages or limitations on how long an implied warranty lasts, so the above exclusion or limitation may not apply to you. This warranty gives you specific legal rights and you may also have other rights that vary from state to state.

### **THIS LIMITED WARRANTY DOES NOT APPLY TO:**

- Service trips to your home to deliver, pick up, and/or install the product, instruct, or replace house fuses or correct wiring, or correction of unauthorized repairs.
- Damages or operating problems that result from misuse, abuse, operation outside environmental specifications or contrary to the requirements of precautions in the Operating Guide, accident, vermin, fire, flood, improper installation, acts of God, unauthorized modification or alteration, incorrect electrical current or voltage, or commercial use, or use for other than intended purpose.

The cost of repair or replacement under these excluded circumstances shall be borne by the consumer.

### **CUSTOMER INTERACTIVE CENTER NUMBERS**

**To obtain Customer Assistance, Product Information, Or Dealer or Authorized Service Center location.**

**Call 1-800-243-0000** (24 hours a day, 365 days per year) and select the appropriate option from the menu. **Or visit our website at <http://www.lgservice.com>.**

### **TO CONTACT LG ELECTRONICS BY MAIL**

LG Customer Interactive Center  
P.O. Box 240007  
201 James Record Road  
Huntsville, Alabama 35813  
ATTN: CIC

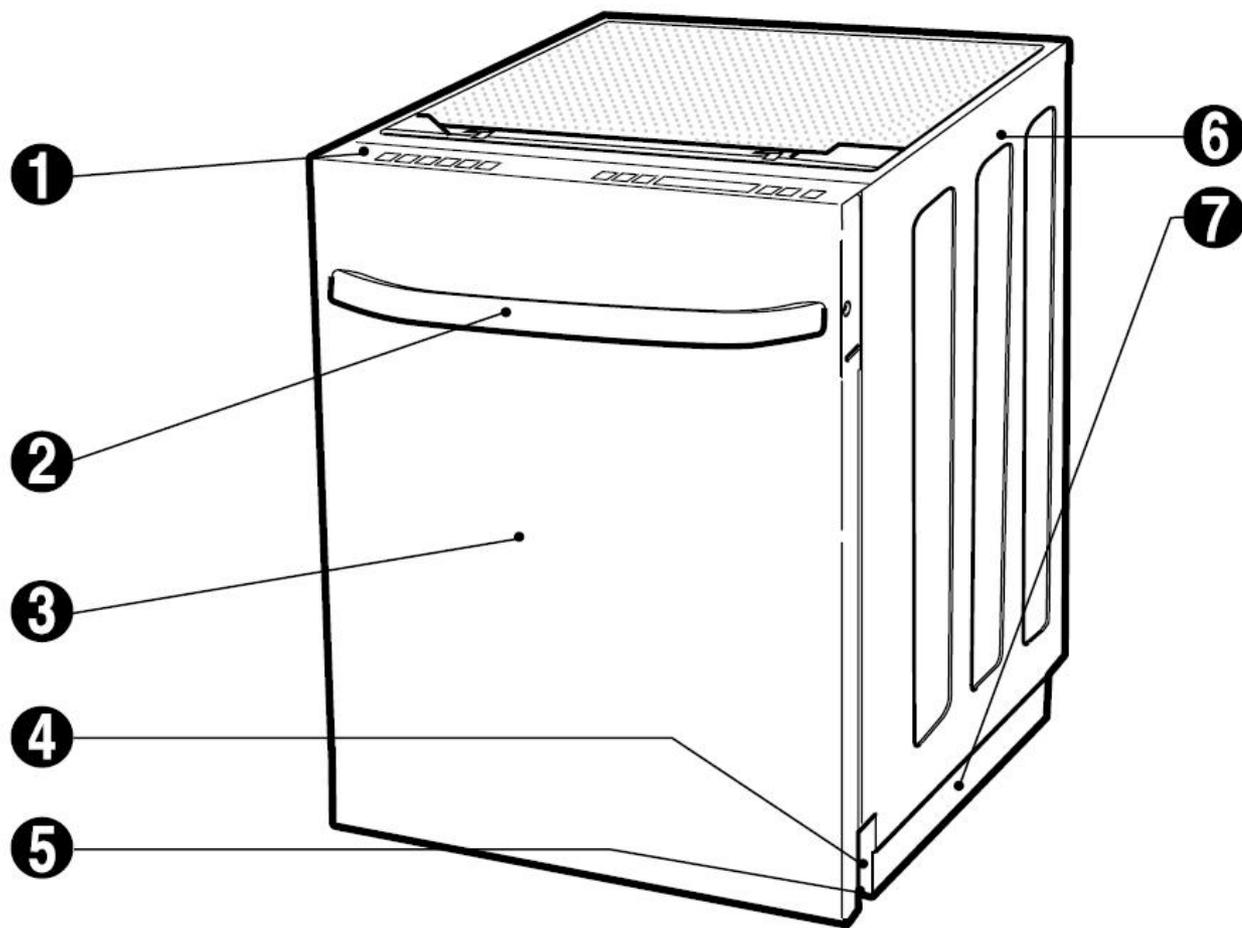
# Specifications

ITEM	SPECIFICATION
Rated Input	120 V <sub>AC</sub> , 60Ø
Installation	Built-in
Capacity	14 place settings
Dimensions (inches)	23 <sup>7</sup> / <sub>8</sub> X 25 X 33 <sup>7</sup> / <sub>8</sub>
Weight (pounds)	128
Door Color	Black, White, Stainless
Tub	Stainless Steel
Control	Electronic
Programs	6 Cycles

# Features

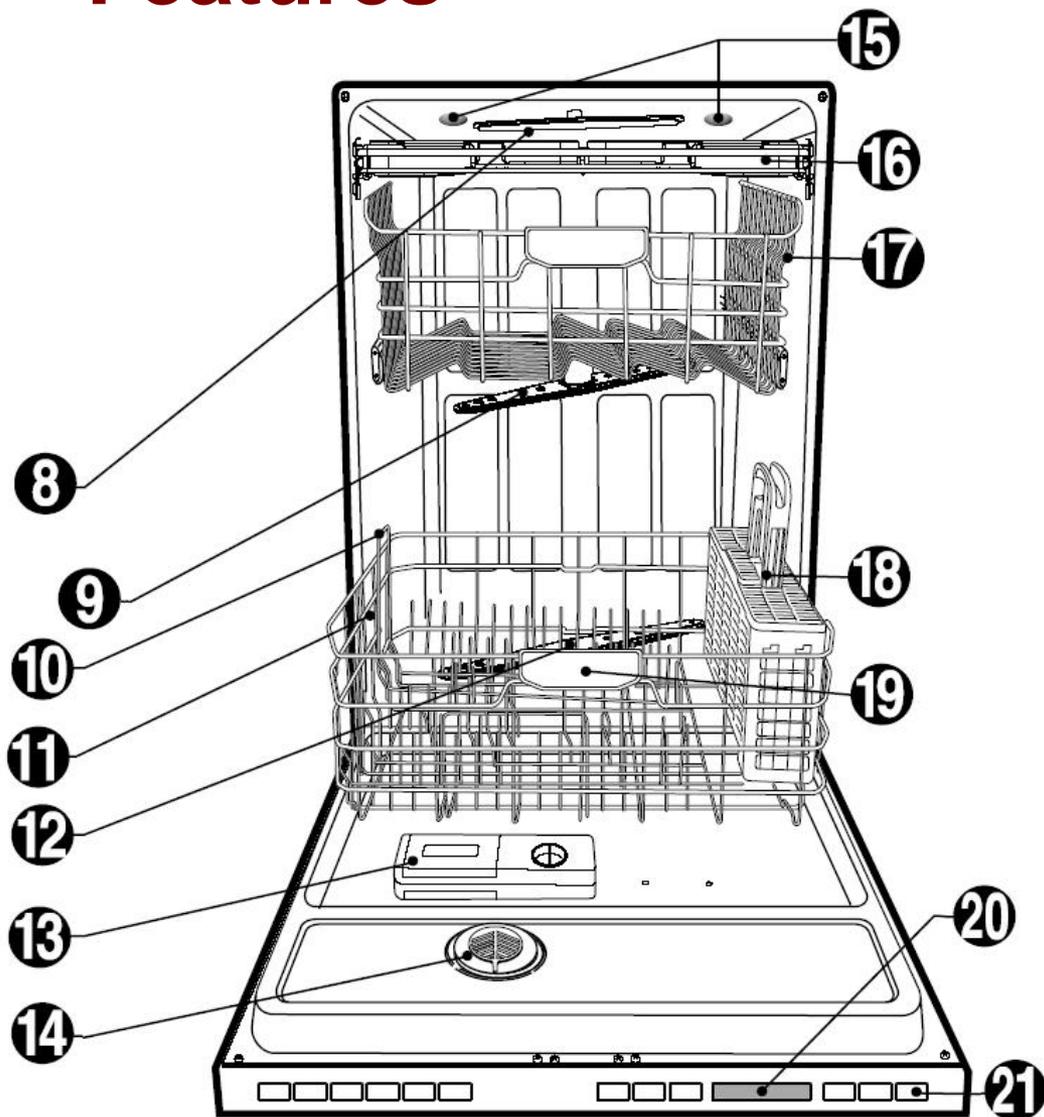
Ultra Large Capacity  
Removable Cutlery Rack  
Slim Direct-Drive Motor  
Hybrid Drying System  
Vario Spray System  
Self-Cleaning Filter  
Dual Intensity™ Wash Cycle  
Steam Washing and Steam Delicate™  
Light Tough Buttons and Blue LCD  
Auto-Off

# Features



1. Control Panel
2. Door Handle
3. Front Cover
4. Lower Cover
5. Leveling Foot
6. Side Cabinet
7. Base

# Features

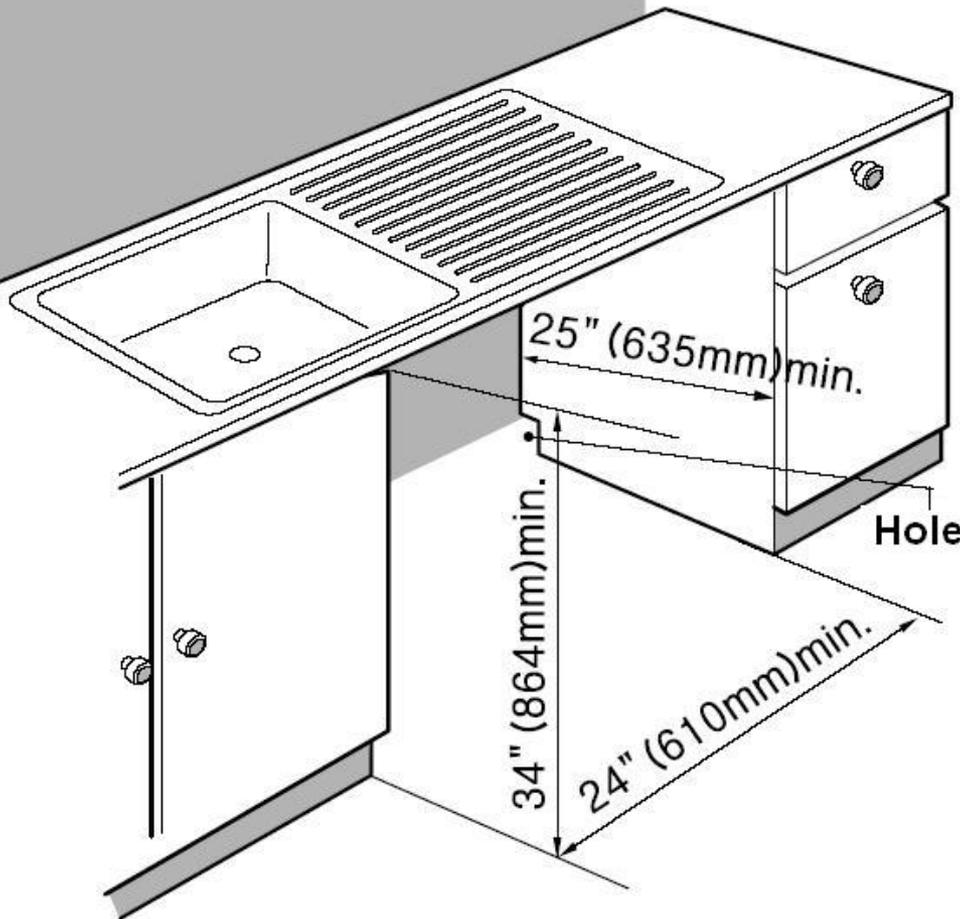


- 8. Top Spray Arm
- 9. Upper Spray Arm
- 10. Removable Tines
- 11. Steam Nozzle
- 12. Lower Spray Arm
- 13. Dispenser  
(Detergent / Rinse Aid)
- 14. Vapor Vent Cover
- 15. Tub Lamps  
(IllumiTub™)
- 16. Cutlery Rack
- 17. Upper Rack
- 18. Cutlery Basket
- 19. Lower Rack
- 20. Blue LCD Display
- 21. Power Button

# Installation

Installation is covered briefly for the servicer who may need to uninstall and reinstall the dishwasher for repairs. For new installations, please refer to the installation guide that was supplied with the dishwasher.

# Installation



Drill a 1½” hole on either side to allow for the drain hose, water supply hose, and electrical cable. The opening must be in an area within 4” (100 mm) of the back wall and 4” (100 mm) of the floor.

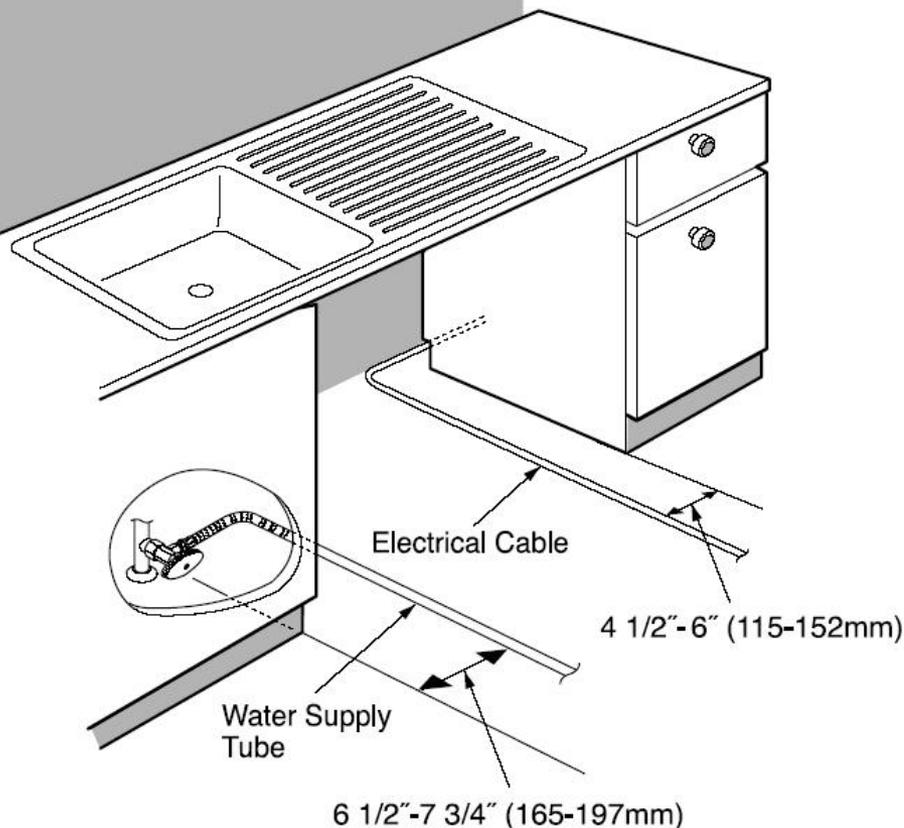
If there is a floor in the cabinet under the sink, it will be necessary to cut through it to connect the water, drain, and electrical cable under the sink.

# Installation

The dishwasher must be supplied with 120 VAC 60 Hz 1Ø current as indicated on the rating plate and connected to a properly fused and grounded dedicated 20-amp circuit.

The wire or water supply can be fed from either side, and both from the same side, depending upon source location.

They must be run in the channels under the dishwasher, as shown in the drawing.



# Electrical Installation

The dishwasher can be hardwired if necessary and if permitted by local code. We recommend the use of a dishwasher installation kit, available at most hardware and home supply stores. This kit includes a cordset, a flexible water supply line, and the elbow connector necessary to connect it.

Using a cordset requires an electric outlet under the sink accessible when the dishwasher is installed. The cordset makes it easier to disconnect the dishwasher from power while working on it and makes removal and replacement easier. As stated earlier, installation requires a properly fused and grounded dedicated circuit.

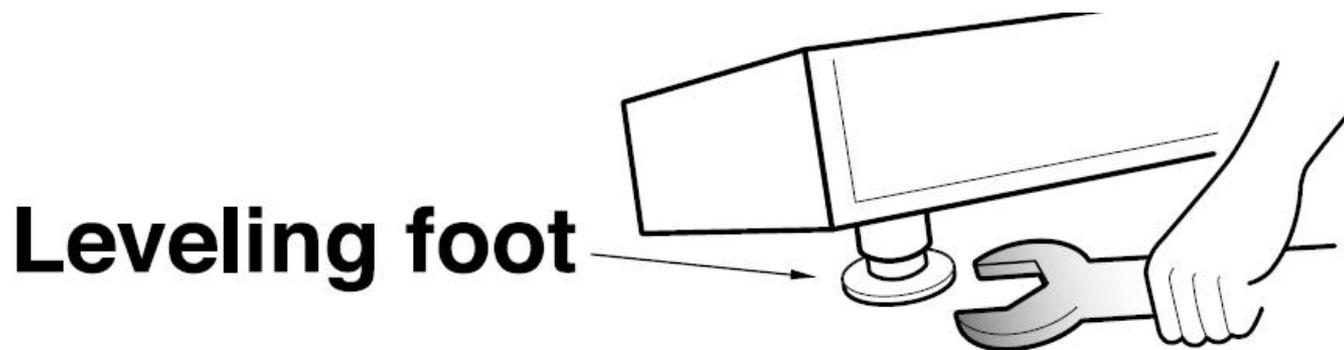
# Water Supply Preparation

The dishwasher may be connected to either **HOT** or **COLD** water. If the hot water can not maintained below 149° F, the dishwasher must be connected to the cold water supply.

Lay out the water supply line as indicated on page 14 of the training manual. Use sealing tape or joint compound to avoid leaks.

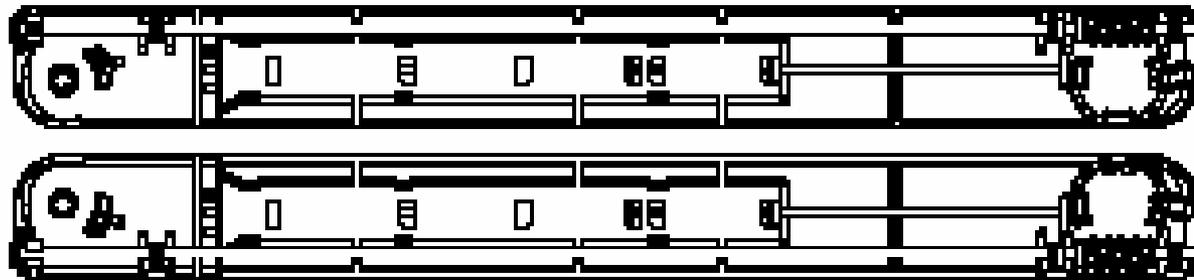
# Installation

Adjust the legs to the required height for the dishwasher to slide under the countertop and be level. Check the level using a spirit level.



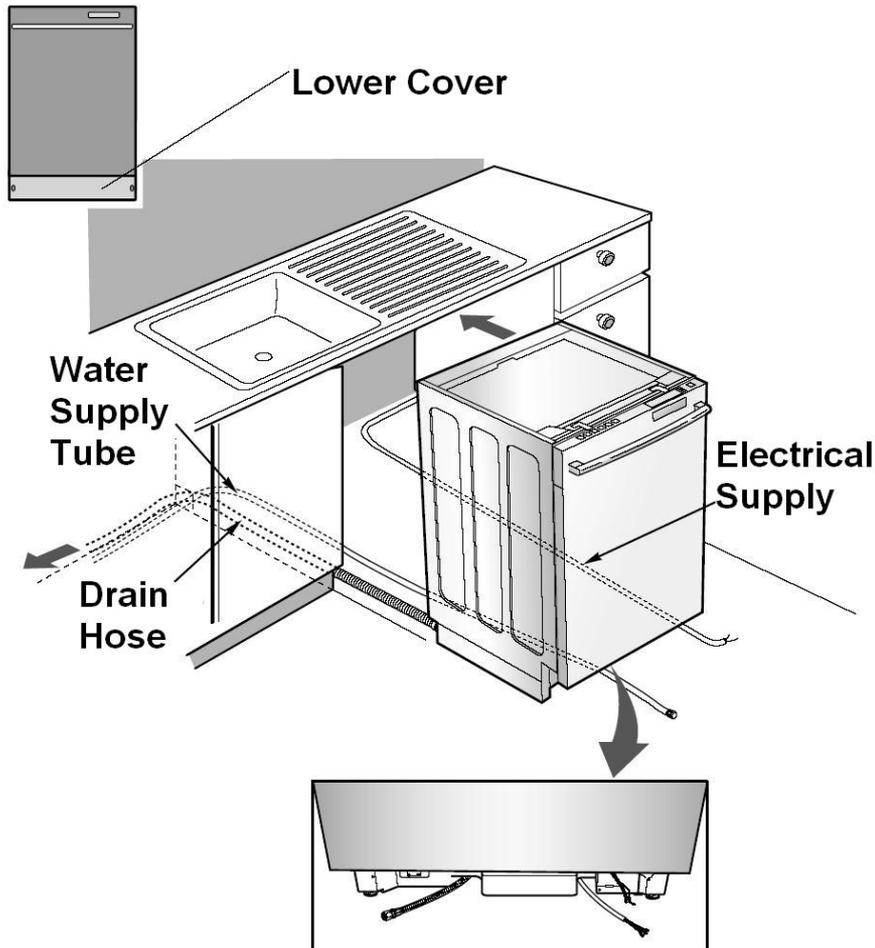
# Installation

Attach the leveling feet kit to allow for fine tuning when the dishwasher is pushed into place.



**LEVELING KIT**

# Installation



To complete the installation:

Remove the lower cover.

Make sure the legs are adjusted and the dishwasher is level.

Lay out the electrical cable, water supply tube, and drain hose as shown.

Slide the dishwasher carefully back into place.

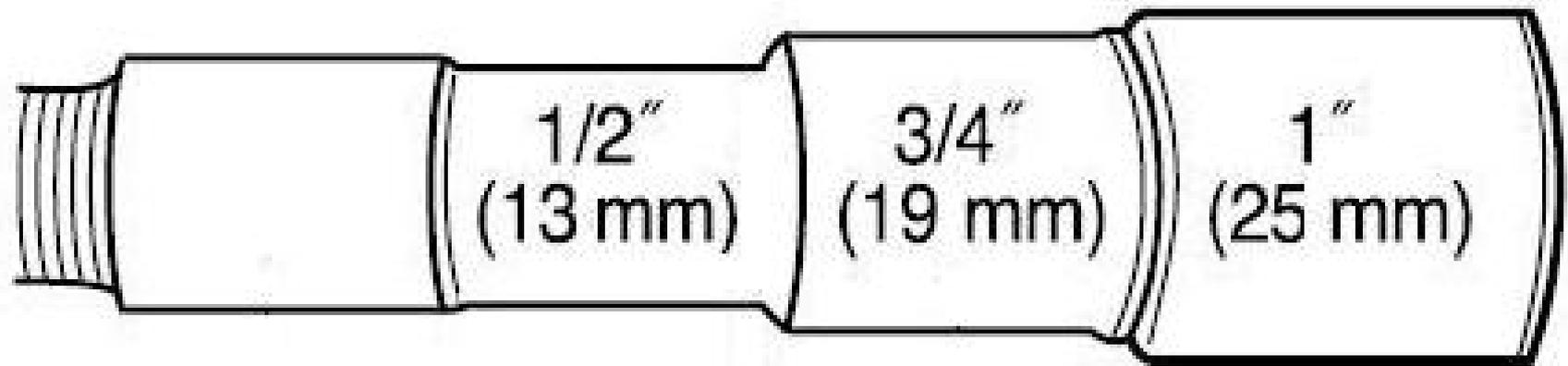
Make the appropriate connections, as directed on subsequent slides.

# Drain Connection

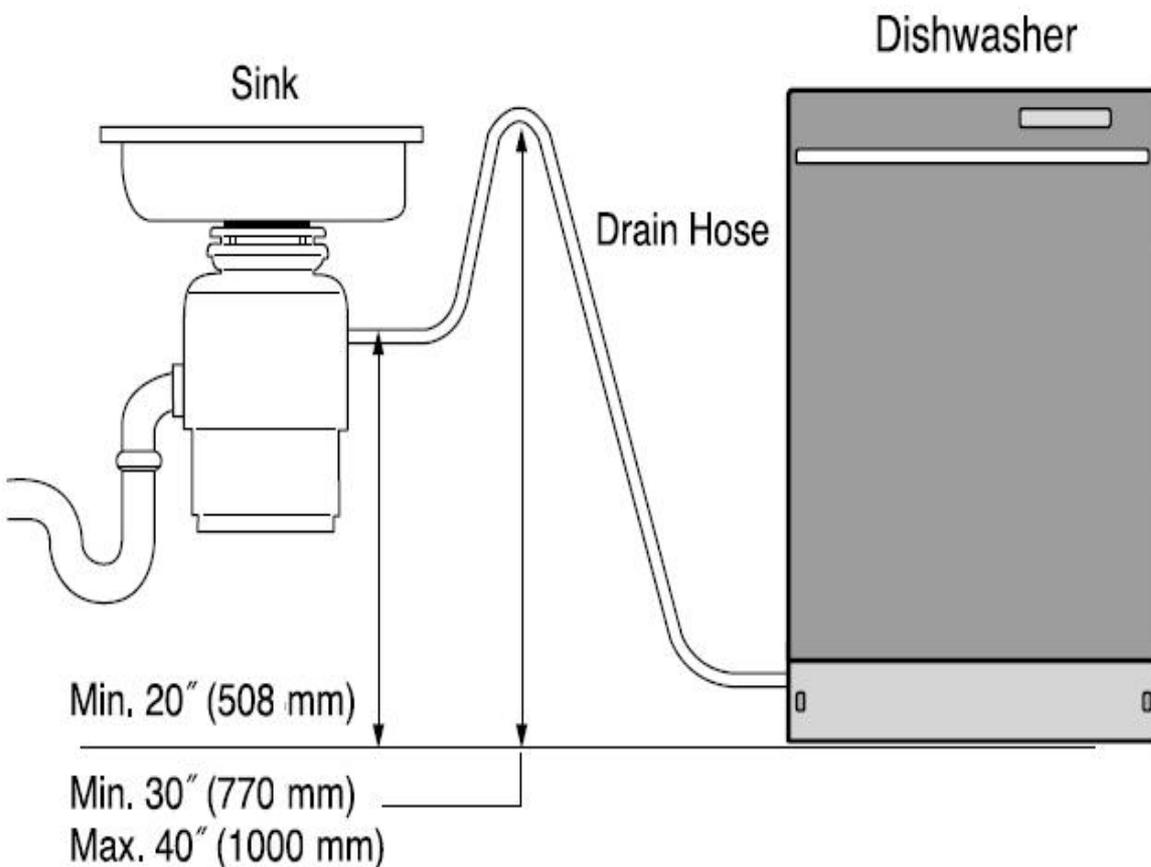
The drain hose must be connected in a manner that meets the local plumbing code. If the end of the drain hose does not fit the available connector, an adapter may be obtained from a local hardware or plumbing supplier.

# Drain Connection

The rubber end can be cut off for the correct size attachment.

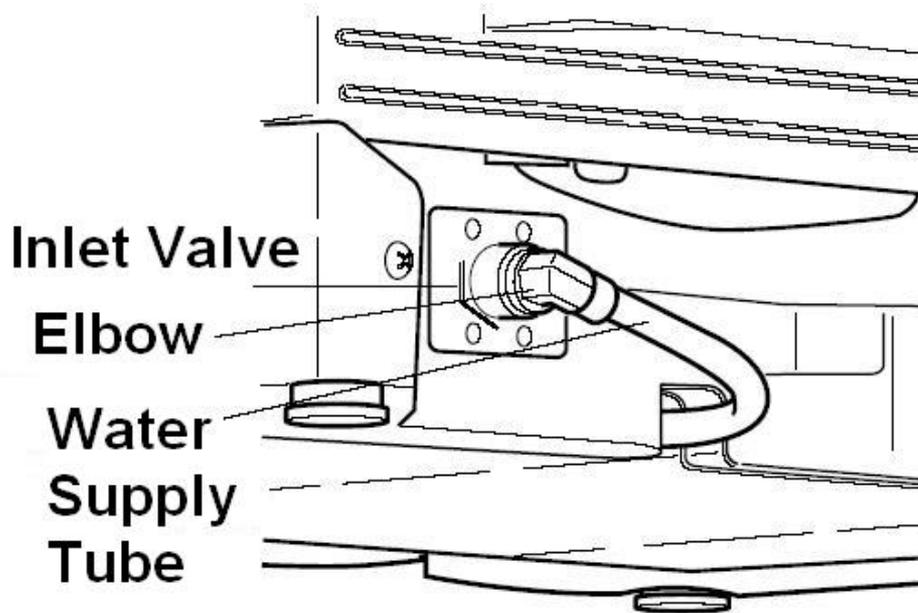


# Drain Connection



Most garbage disposers have a dishwasher drain fitting built in to them. If your installation does not include a disposer, you can use a special tail piece with a drain attachment available at most hardware and home supply stores.

# Water Connection



Turn off the water supply and connect the elbow to the inlet valve.

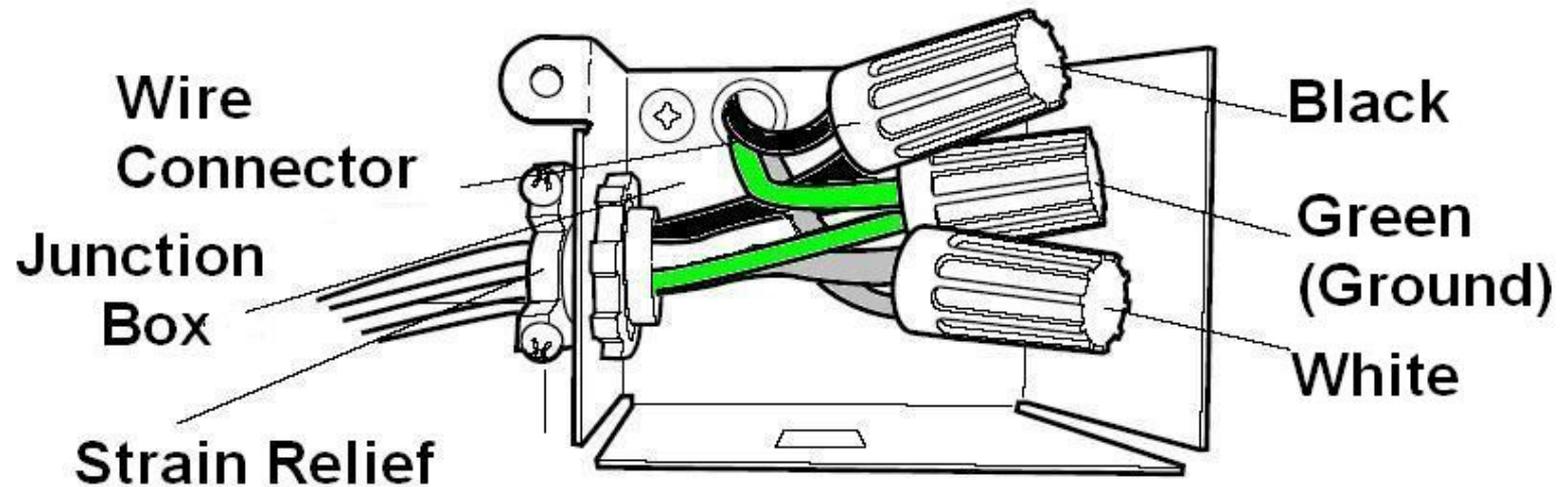
Connect the flexible supply tube to the elbow.

Use sealing tape to make all connections.

Make sure the supply line is not kinked.

# Electrical Connection

Use wire connectors and replace the cover on the junction box. (12/2 w/ ground, 20-amps)

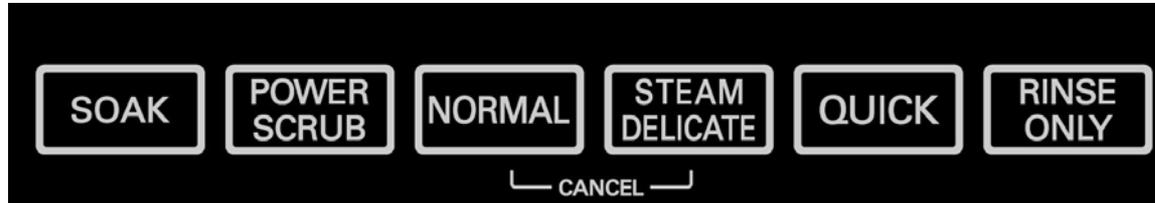


# Final Installation

1. Turn on the water at the valve under the sink.
2. Turn on the power at the fuse or breaker (or plug in the cordset at the outlet under the sink).
3. Run the dishwasher through one QUICK cycle to check the operation and to check for water leaks.
4. Replace the lower cover.

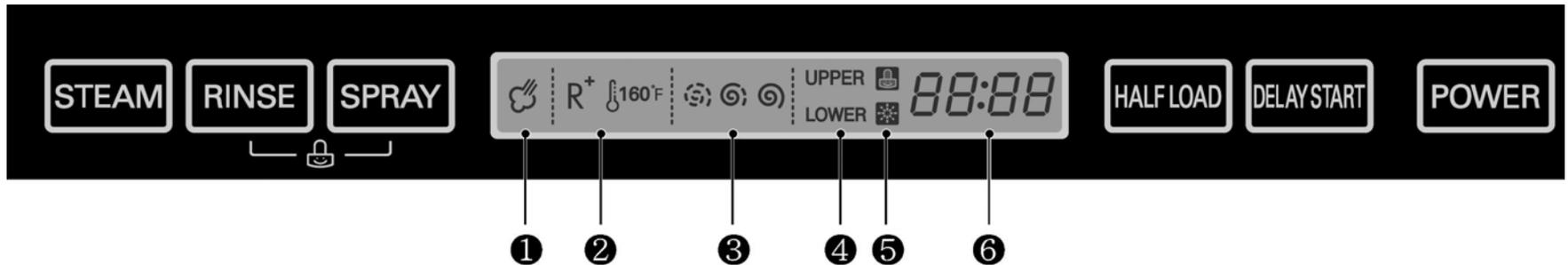
When the door is closed, the top edge with the controls should be under the countertop.

# Control Panel



<b>SOAK</b>	Heavily soiled loads, with cooked-on foods
<b>POWER SCRUB</b>	Normal soil level, everyday loads
<b>NORMAL</b>	Normal soil level, everyday loads
<b>STEAM DELICATE</b>	Washing delicate items, crystal, stemware
<b>QUICK</b>	Light soil level, recently used dishes and cutlery
<b>RINSE ONLY</b>	Rinses only, no washing

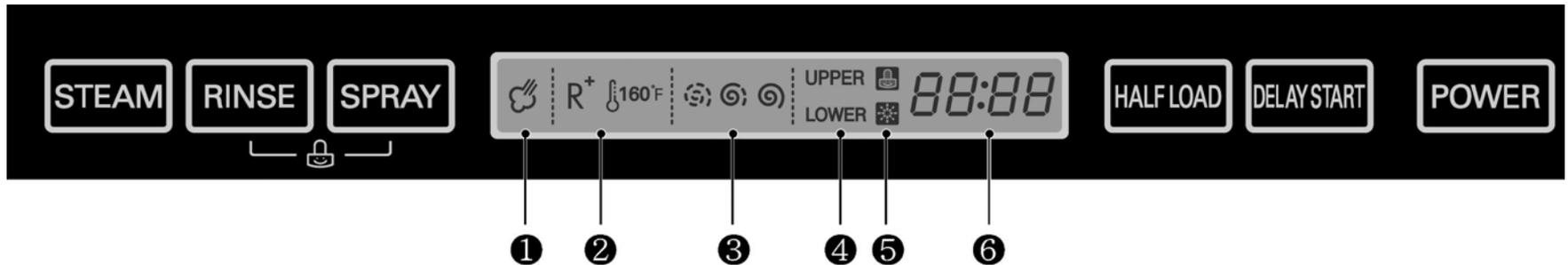
# Control Panel



- STEAM** Adds steam to SOAK, POWER SCRUB, and Normal cycles
- RINSE** Pressing cycles through Sanitary, Extra Rinse, or both
- SPRAY** Pressing cycles through Strong, Medium, or Soft spray
- HALF LOAD** Pressing chooses either upper or lower rack instead of both

continued

# Control Panel



## DELAY START

Each press delays the start by one hour up to 24 hours

## CHILD LOCK

Press and hold to engage/disengage

## CANCEL

Press and hold **STEAM DELICATE** and **NORMAL**

continued

# Control Panel

- 1**  Steam option indicator – blinks if selected
- 2** R<sup>+</sup>  160°F Rinse indicator – blinks if selected
- 3**    Spray indicator – blinks if selected
- 4** UPPER  
LOWER Half load indicator
- 5**  Child Lock – illuminated when engaged  
 Rinse Aid – illuminated when refill is required
- 6**  Time remaining before cycle ends

# Programs

Cycle	WASH		RINSE			DRY	Water (gal/L)	Time (min)	Option	
	Pre-Wash	Main Wash	Rinse 1	Rinse 2	Heating Rinse				Rinse	Steam
<b>SOAK</b>	120°F	140~149°F			162°F		5.5~9.2/ 21~35	143~191	Usable	Usable
	49°C	60~65°C			72°C					
<b>POWER SCRUB</b>		131~145°F			154°F		5.5~9.2/ 21~35	123~171	Usable	Usable
		55~63°C			68°C					
<b>NORMAL</b>		113~140°F			149°F		2.6~6.9/ 10~26	110~135	Usable	Usable
		45~60°C			65°C					
<b>STEAM DELICATE</b>		113~120°F			154°F		5.5~6.9/ 21~26	93	Usable	Usable
					68°C					
<b>QUICK</b>		115°F			140°F		5.5 / 21	74	Usable	Disable
		46°C			60°C					
<b>RINSE ONLY</b>							1.3 / 5	14	Disable	Disable

# Dual Intensity Spray Wash

The spray intensity for the upper lower racks is programmable by the customer. By selecting SOFT SPRAY for the upper rack and STRONG SPRAY for the lower rack, you can wash delicate items like stemware on top while washing pots and pans on the bottom.

# Dual Intensity Spray Wash

1. Press and hold **SPRAY** to illuminate the indicator.
2. Press **SPRAY** to set the intensity for the upper rack.  
(Strong/Medium/Soft/Off)
3. Press **HALF LOAD** to confirm the selection for the upper rack.
4. Press **SPRAY** to set the intensity for the lower rack.
5. Press **HALF LOAD** to confirm the selection for the lower rack.
6. Select other options.
7. Close the door.
8. The dishwasher will start.

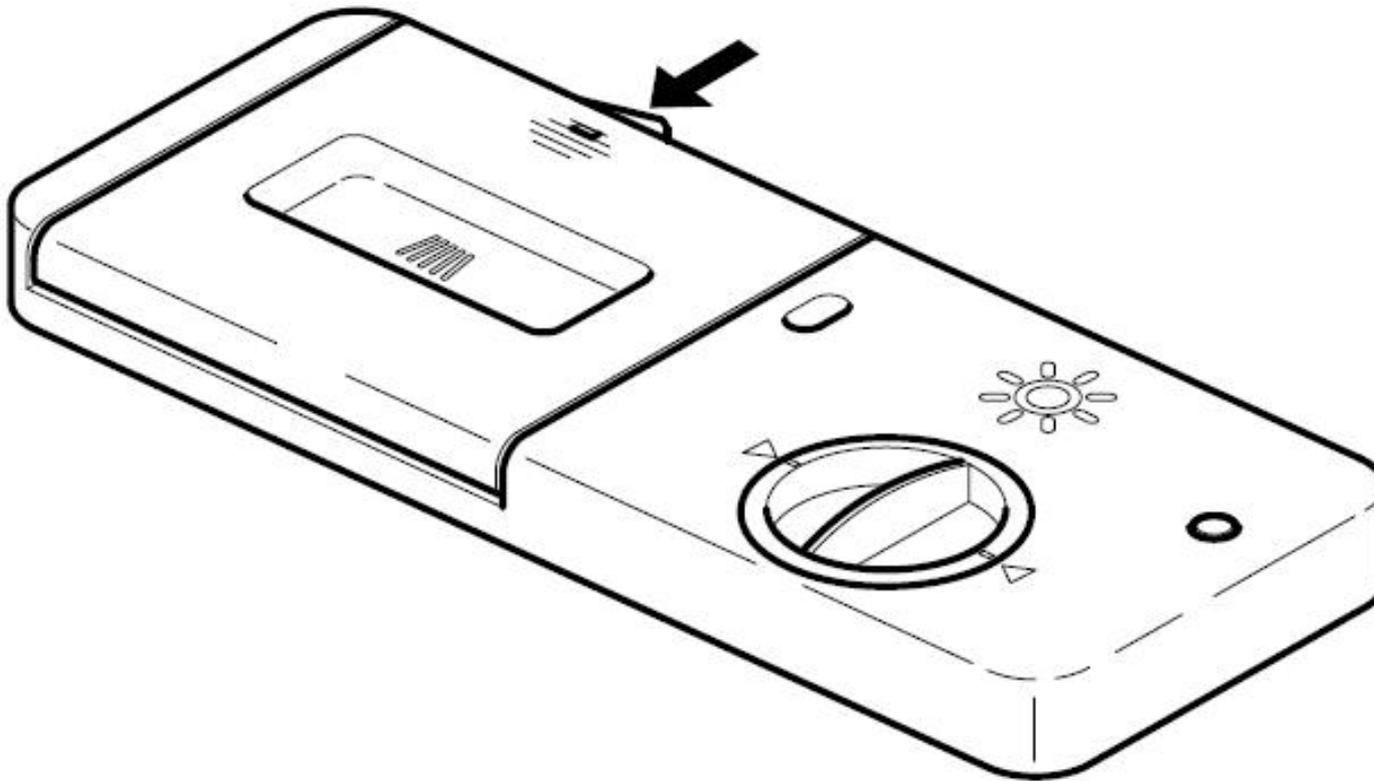
# Adding Detergent

Detergent must be added to the dispenser before the start of every cycle except RINSE ONLY. The detergent chamber holds 1.4 oz. (40 g) when full.

If the dishes are only moderately dirty, it might be possible to use less detergent.

# Adding Detergent

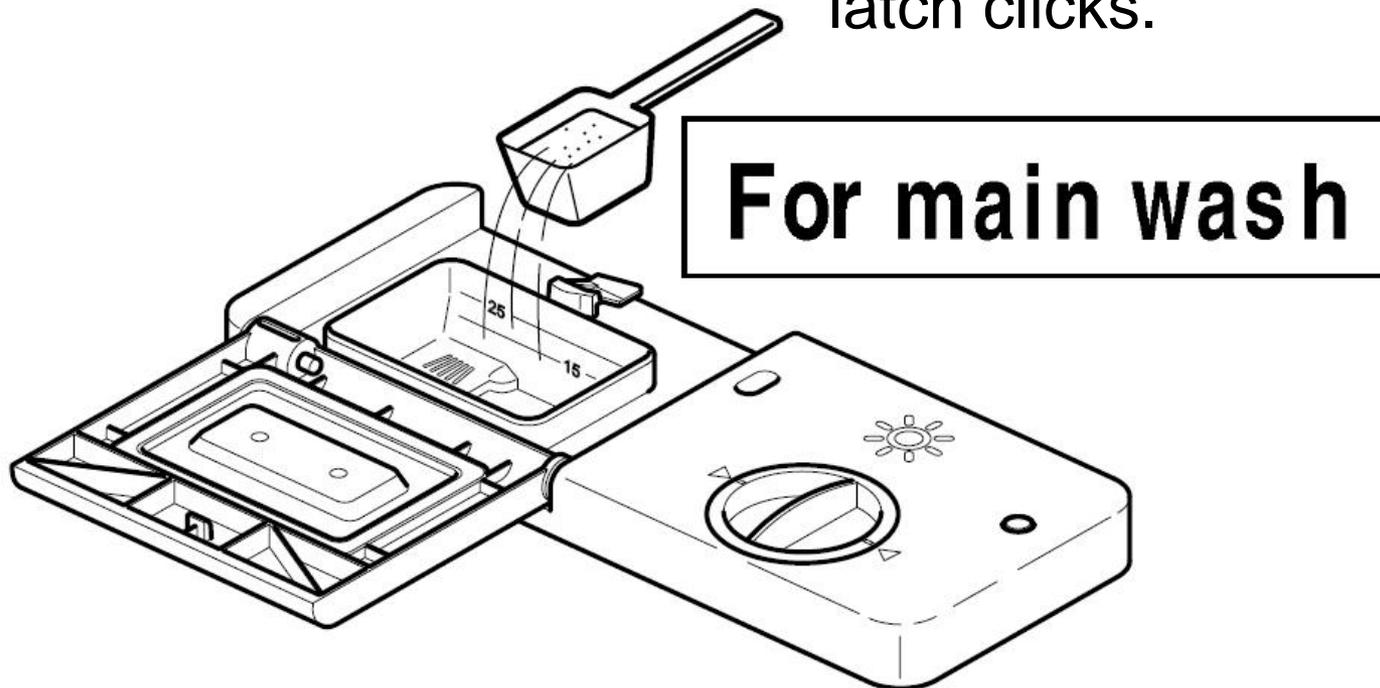
Press the latch button to open the detergent chamber.



# Adding Detergent

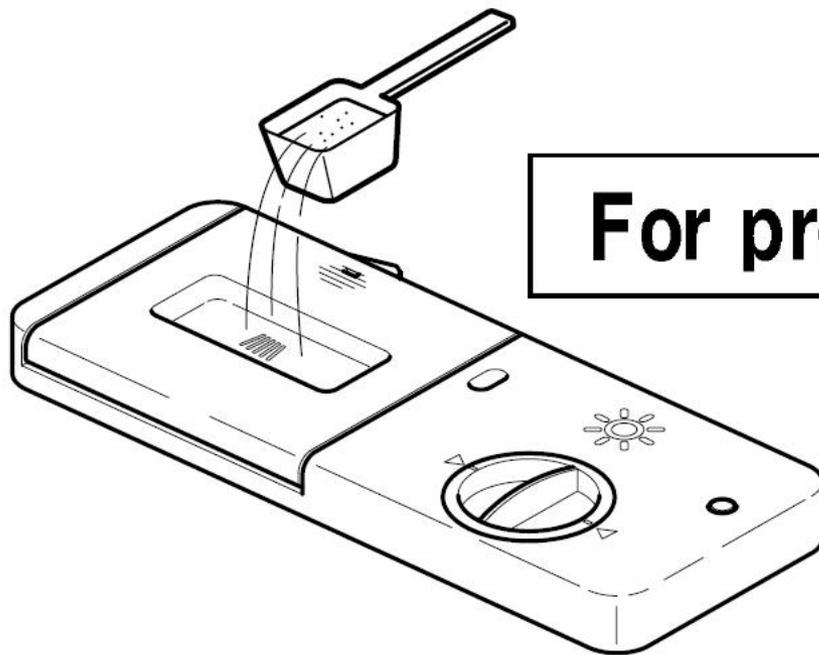
Add detergent in the proper amount.  
(See chart, later slide.)

Close the cover and be sure the  
latch clicks.



# Adding Detergent

If pre-wash cycle is selected (in SOAK or POWER SCRUB only), add the appropriate amount of pre-wash detergent in the recess on the door cover. When you close the dishwasher door, the detergent will fall into the tub.



**For pre-wash**

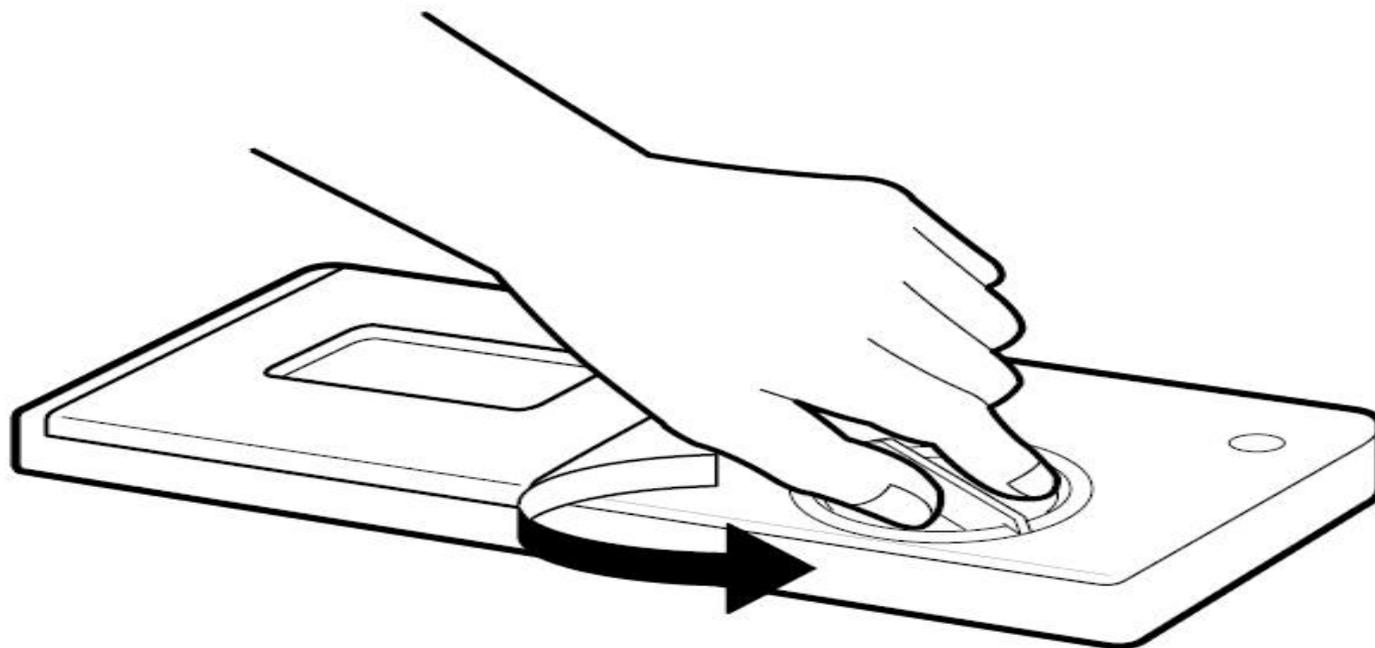
**NOTE:** Too much detergent can leave a film on the dishes.

# Detergent Chart

CYCLE	Amt. Detergent	
<b>Soak</b>	<b>Full (0.35 oz.)</b>	<b>¾ full (1.05 oz.)</b>
<b>Power Scrub</b>	<b>Full (0.35 oz.)</b>	<b>¾ full (1.05 oz.)</b>
<b>Normal</b>	<b>None</b>	<b>½ full (0.7 oz.)</b>
<b>Steam Delicate</b>	<b>None</b>	<b>½ full (0.7 oz.)</b>
<b>Quick</b>	<b>None</b>	<b>¼ full (0.3 oz.)</b>
<b>Rinse Only</b>	<b>None</b>	<b>½ full (0.7 oz.)</b>

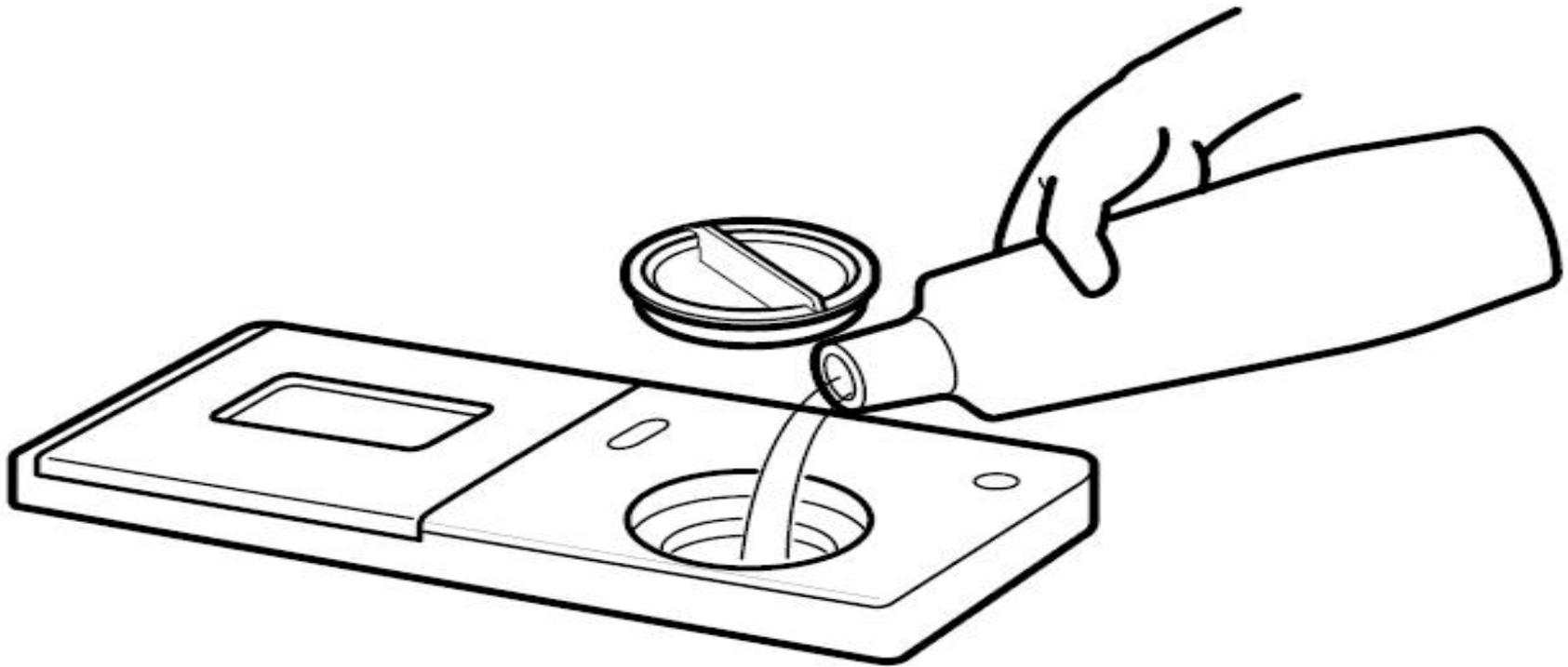
# Adding Rinse Aid

Turn the round cap counterclockwise and remove it.



# Adding Rinse Aid

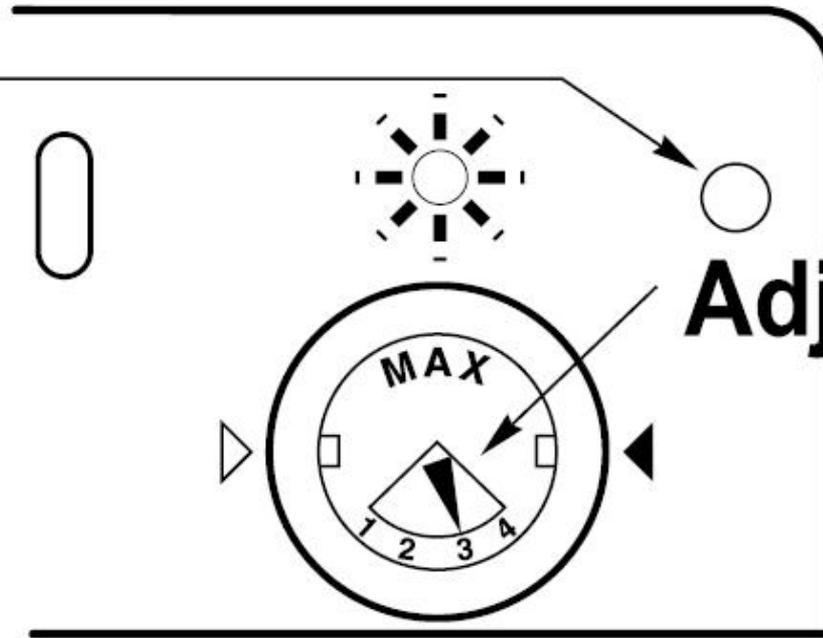
Fill the reservoir. It holds 4.8 oz. (145 ml)  
Replace the cap and lock it.



# Adding Rinse Aid

Adjust the rinse-aid setting as necessary.

**Rinse-Aid Indicator**



**Adjust Lever (Rinse)**

# Adding Rinse Aid

The factory setting for rinse aid dispensing is **3**.

Too little rinse aid contributes to spotting, streaking, and poor drying performance. Too much rinse aid causes foaming, which leads to poor washing performance.

How often you refill the dispenser depends upon your washing habits, including the rinse aid setting, the number of loads per month you wash, and other factors.

The indicator light will illuminate when the level is low at the start of a load.



# Test Mode

BUTTON	The number of pushing button	Top Display	Load and Checking points		Door open/closed
Rinse + Spray + Power	1 TIME	0n:3H / 0U:00	All LEDs are lit		Both
Soak	1 TIME	00:00	All LEDs are lit		Both
Power Scrub	1 TIME	11:11	All LEDs are lit		Both
Normal	1 TIME	22:22	All LEDs are lit		Both
Steam Delicate	1 TIME	33:33	All LEDs are lit		Both
Quick	1 TIME	44:44	All LEDs are lit		Both
Rinse Only	1 TIME	55:55	All LEDs are lit		Both
Steam	1 TIME	66:66	All LEDs are lit		Both
Rinse	1 TIME	77:77	All LEDs are lit		Both
Spray	1 TIME	88:88	All LEDs are lit		Both
Half Load	1 TIME	99:99	All LEDs are lit		Both
Delay start ↑ ↑ ↑	1 TIME	Steam generator Temp (°C)	Steam generator Thermistor	All LEDs	Both
	2 TIMES	0n:H1	Steam generator Heater (for 1.2 sec)	All LEDs	Closed
	3 TIMES	0n:33	Drain Pump	All LEDs	Both
	4 TIMES	① Frequency	Inlet Valve	All LEDs	Closed
	5 TIMES	0n:35	Dispenser	All LEDs	Closed
	6 TIMES	0n:36	Sump Heater (for 10 sec)	All LEDs	Closed
	7 TIMES	0n:37	Fan Motor	All LEDs	Closed
	8 TIMES	0n:38		All LEDs	Closed
	9 TIMES	Sump Temp (°C)	Sump Thermistor	All LEDs	Both
	10 TIMES	② Soil level	Soil sensor	All LEDs	Both
	11 TIMES	0n:3b / Motor RPM	Wash Pump	All LEDs	Closed
	12 TIMES	Steam generator Water level	③H <50↑ / L >200↑	All LEDs	Both
	13 TIMES	0n:3d	Lower Nozzle (Vario)	All LEDs	Closed
	14 TIMES	0n:3E	Upper Nozzle (Vario)	All LEDs	Closed
	15 TIMES	0n:3F (RPM, Frequency)	W/Pump+Vario+ Heater (for 1min)	All LEDs	Closed

① Normal water level: 270 ~ 275

② Pure water: more than 130

③ H: High water level / L: Low water level

※ Steam Demo mode: Steam + Power

# Error Codes

ERROR CODE	POSSIBLE CAUSE	SOLUTION
<div data-bbox="131 405 444 582" data-label="Image"> </div> <p data-bbox="123 668 452 714"><b>INLET ERROR</b></p> <p data-bbox="98 786 471 999">Water not to normal level after 10 minutes' fill time</p>	<ul style="list-style-type: none"> <li data-bbox="614 386 1031 482">•Water supply valve closed</li> <li data-bbox="614 501 1078 546">•Water supply shut off</li> <li data-bbox="614 558 987 604">•Inlet hose kinked</li> <li data-bbox="614 615 1039 718">•Water pressure low (below 10 psi)</li> <li data-bbox="614 729 1045 775">•Inlet valve defective</li>   <li data-bbox="614 901 1128 946">•Inlet valve filter clogged</li> <li data-bbox="614 958 1070 1003">•Hall sensor defective</li>   <li data-bbox="614 1129 1108 1175">•Input impeller is bound</li> </ul>	<ul style="list-style-type: none"> <li data-bbox="1296 386 1572 432">•Check valve</li>   <li data-bbox="1296 729 1746 832">•Check resistance of valve (950~1,300Ω)</li>   <li data-bbox="1296 901 1727 946">•Clean the inlet filter</li> <li data-bbox="1296 958 1818 1061">•Check frequency in test mode (page 13)</li>   <li data-bbox="1296 1129 1733 1175">•Replace air breaker</li> </ul>

# Error Codes

ERROR CODE	POSSIBLE CAUSE	SOLUTION
<div data-bbox="131 401 426 568" data-label="Image"> </div> <p data-bbox="117 701 459 743"><b>DRAIN ERROR</b></p> <p data-bbox="98 815 421 1029">Not completely drained after 5 minutes' drain time</p>	<ul data-bbox="614 386 1089 1115" style="list-style-type: none"> <li>• Drain hose kinked or blocked</li> <li>• Wiring connection defective</li>   <li>• Drain outlet of sump blocked</li> <li>• Drain pump, drain motor, or drain circuit is defective</li> </ul>	<ul data-bbox="1296 386 1818 1329" style="list-style-type: none"> <li>• Remove the kink or blockage</li> <li>• Check the wiring connection</li>   <li>• Check the sump for blockage</li> <li>• Measure the resistance of drain motor (20 ~ 40 Ω) Replace motor or repair circuit</li> </ul>

# Error Codes

ERROR CODE	POSSIBLE CAUSE	SOLUTION
 <p><b>LEAKAGE ERROR</b></p> <p>Excessive motor RPM due to water leakage</p>	<ul style="list-style-type: none"> <li>• Water leakage in hose connections</li> <li>• Water leak from damage</li> <li>• Sump seal leakage</li> <li>• Drain hose not high enough</li> <li>• Washing pump impeller is damaged or worn</li> </ul>	<ul style="list-style-type: none"> <li>• Replace hose connections</li> <li>• Repair damage</li> <li>• Reseat or replace seal</li> <li>• Adjust hose to meet installation requirements</li> <li>• Replace impeller of washing pump</li> </ul>

# Error Codes

ERROR CODE	POSSIBLE CAUSE	SOLUTION
 <p><b>FILL ERROR</b></p> <p>Excess water supplied and drain pump runs automatically</p>	<ul style="list-style-type: none"><li>• Inlet valve defective</li><li>• Main board defective</li></ul>	<ul style="list-style-type: none"><li>• Replace inlet valve</li><li>• Replace main board</li></ul>

# Error Codes

ERROR CODE	POSSIBLE CAUSE	SOLUTION
<div data-bbox="131 386 446 565" data-label="Image"> </div> <p data-bbox="170 615 407 715"><b>THERMAL ERROR</b></p> <p data-bbox="98 786 471 1001">Water not to normal level after 10 minutes' fill time</p>	<ul data-bbox="614 386 1147 1058" style="list-style-type: none"> <li>• Inlet water temperature too hot (over 194° F or 90 °C)</li> <li>• Wiring connection defective</li> <li>• Thermistor defective</li> </ul>	<ul data-bbox="1199 386 1792 1115" style="list-style-type: none"> <li>• Check water temperature using TEST MODE (See Page 13.)</li> <li>• If temperature is displayed, adjust water temp. to 120° F (40° C).</li> <li>• If temp. is not displayed, check wiring connections and resistance of the thermistor (11~14 KΩ @ 77° F or 25° C).</li> </ul>

# Error Codes

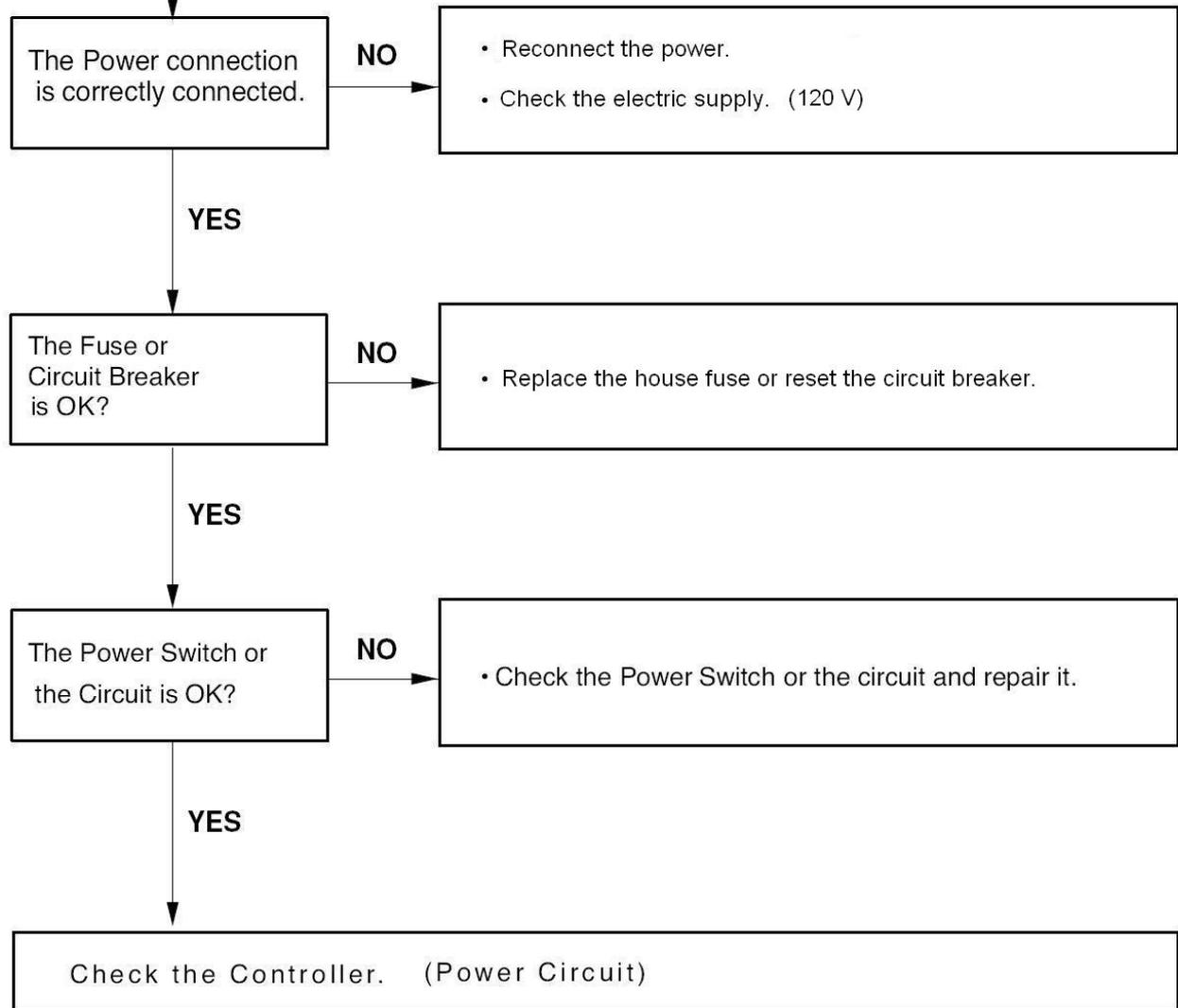
ERROR CODE	POSSIBLE CAUSE	SOLUTION
 <p><b>LOCK ERROR</b></p> <p>Motor is locked or hall sensor is defective.</p>	<ul style="list-style-type: none"> <li>• Wiring connection loose</li> <li>• Wash pump impeller locked</li>   <li>• Wash motor rotor is locked</li> <li>• Blade is locked</li> </ul>	<ul style="list-style-type: none"> <li>• Check wiring connections</li> <li>• Check wash pump for blockage</li>   <li>• Replace wash motor</li> <li>• Check the sump for blockage</li> <li>• Replace the main board</li> </ul>

# Steam Generator Error Codes

<b>ERROR CODE</b>	<b>CONDITION</b>	<b>SOLUTION</b>
<b>00 : E0</b>	Normal	
<b>00 : E1</b>	Steam generator temperature is too high (over 239° F or 115° C)	Check water level sensor and thermistor
<b>00 : E2</b>	Water level sensor failure	Check water level sensor and connection
<b>00 : E3</b>	Water level too low	Check water level sensor and inlet valve
<b>00 : E4</b>	Steam generator temperature is too low (under 158° F or 70° C)	Check heater and thermistor
<b>00 : E5</b>	Normal	

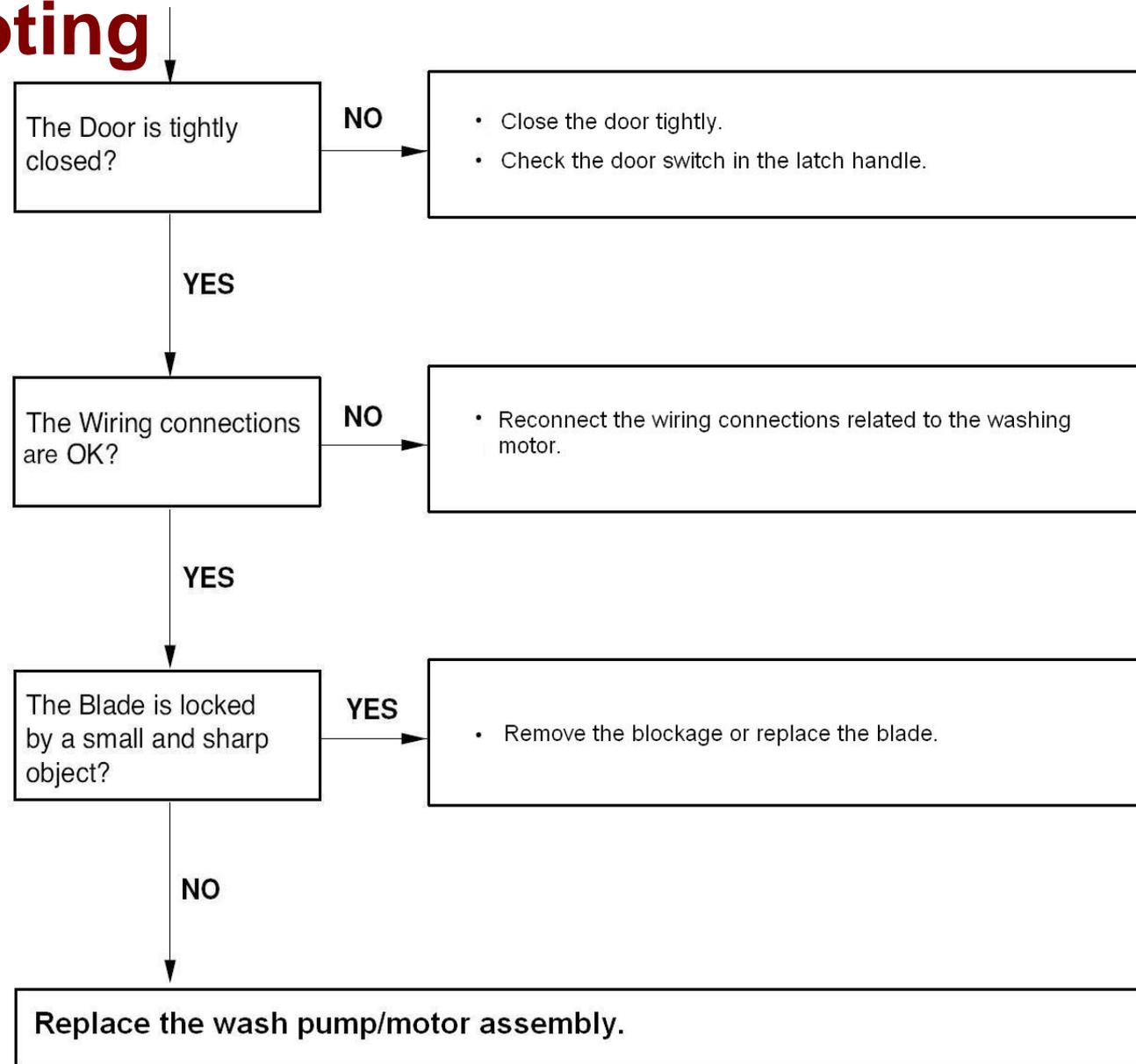
# Troubleshooting

## No Power



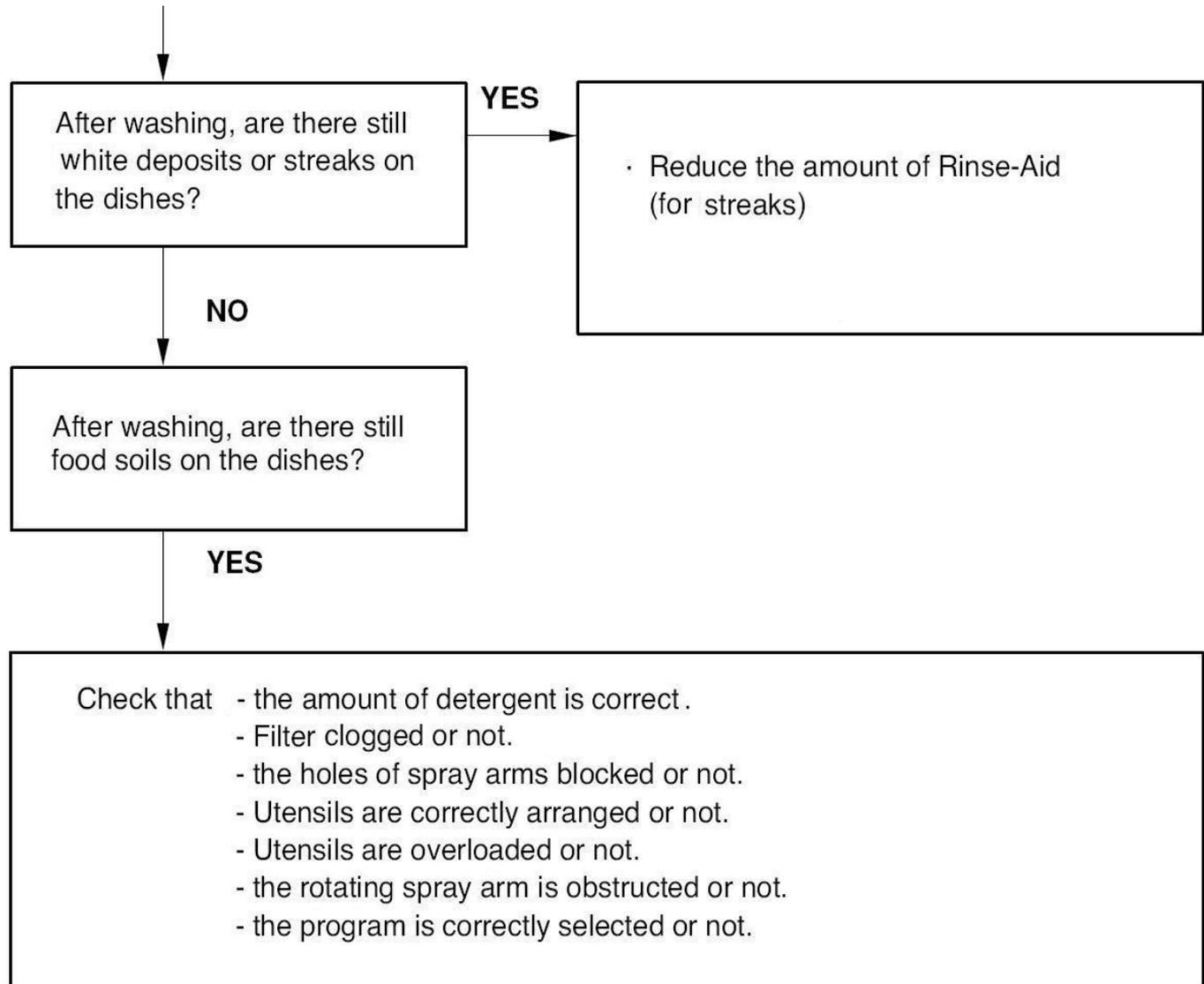
# Troubleshooting

## Wash Motor / Pump Motor Does Not Run



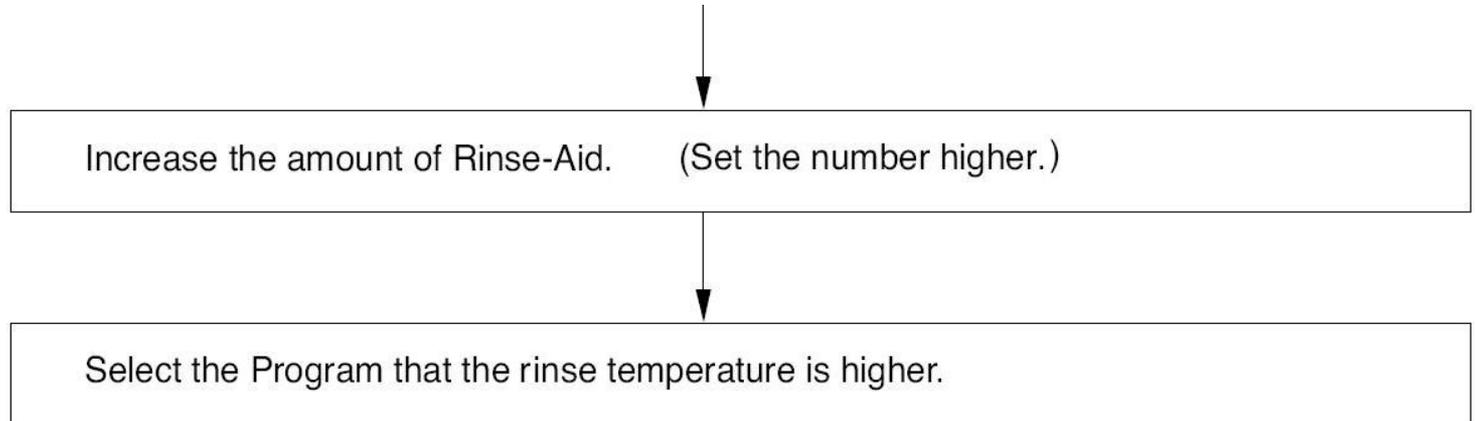
# Troubleshooting

## Poor Washing



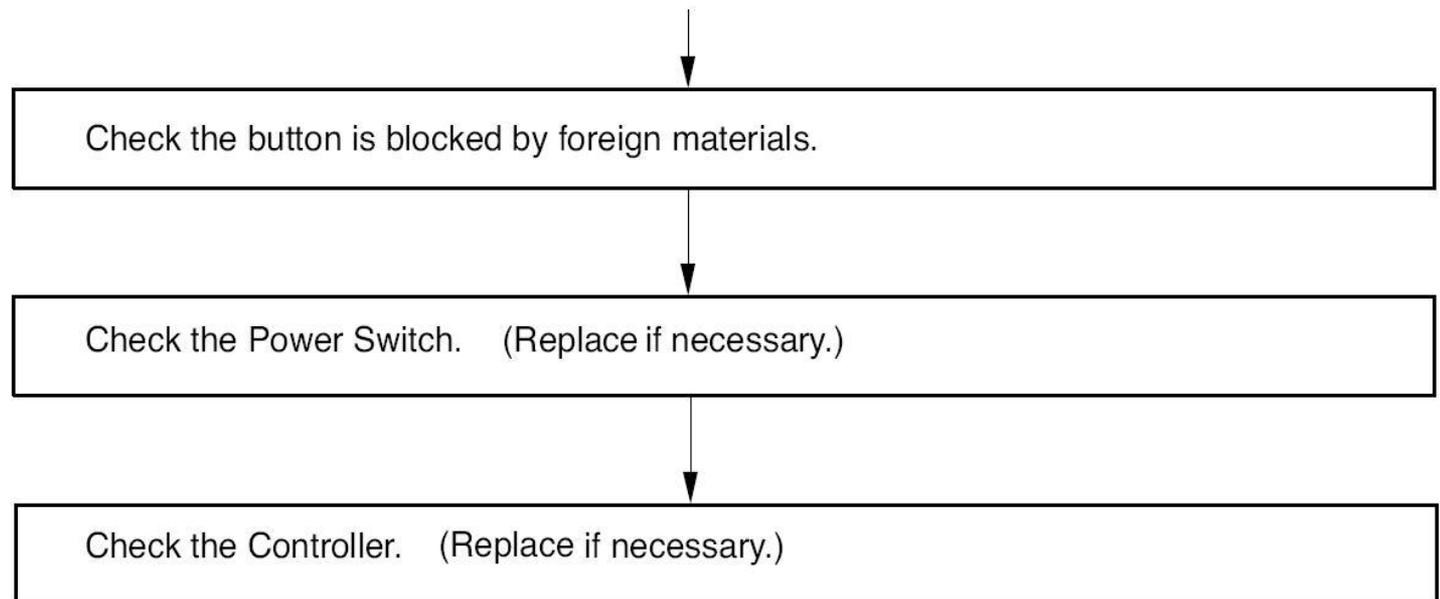
# Troubleshooting

Poor  
Drying



# Troubleshooting

## Power Does Not Turn Off Automatically At End Of Cycle

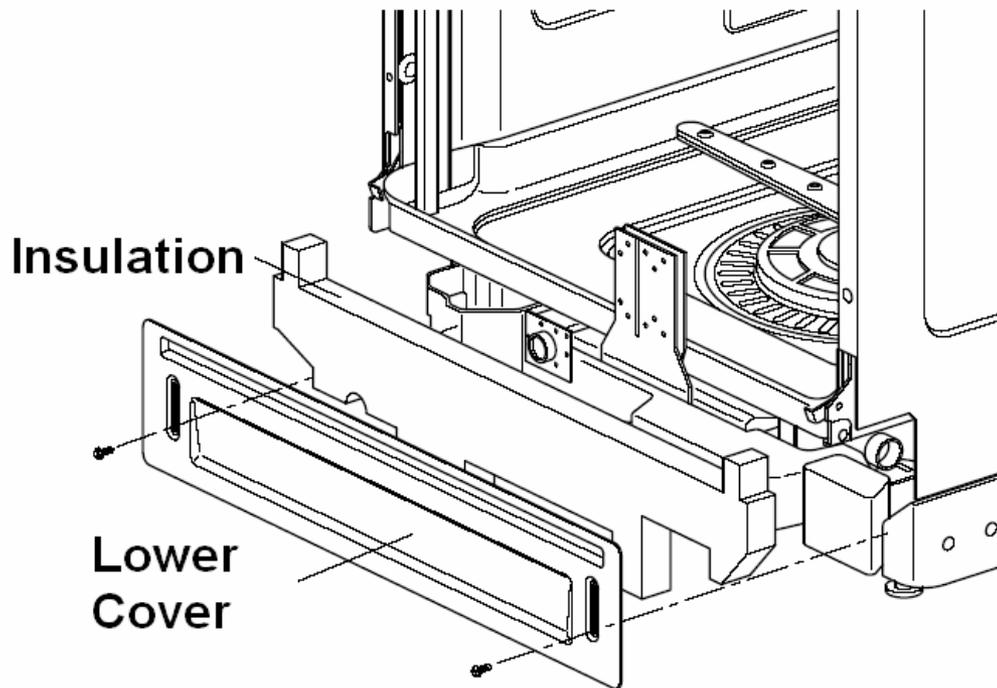


# Disassembly and Repair

Before disassembling the dishwasher:

- Unplug the dishwasher or turn off the breaker (or fuse)  
Disconnect the wire if the dishwasher is hard-wired.
- Turn of the water supply
- Remove all dishes and racks
- Disconnect the water supply line to avoid hose damage
- Have some towels ready to catch the spillage from water left in the dishwasher and to keep the floor safe.

# Lower Cover and Insulation

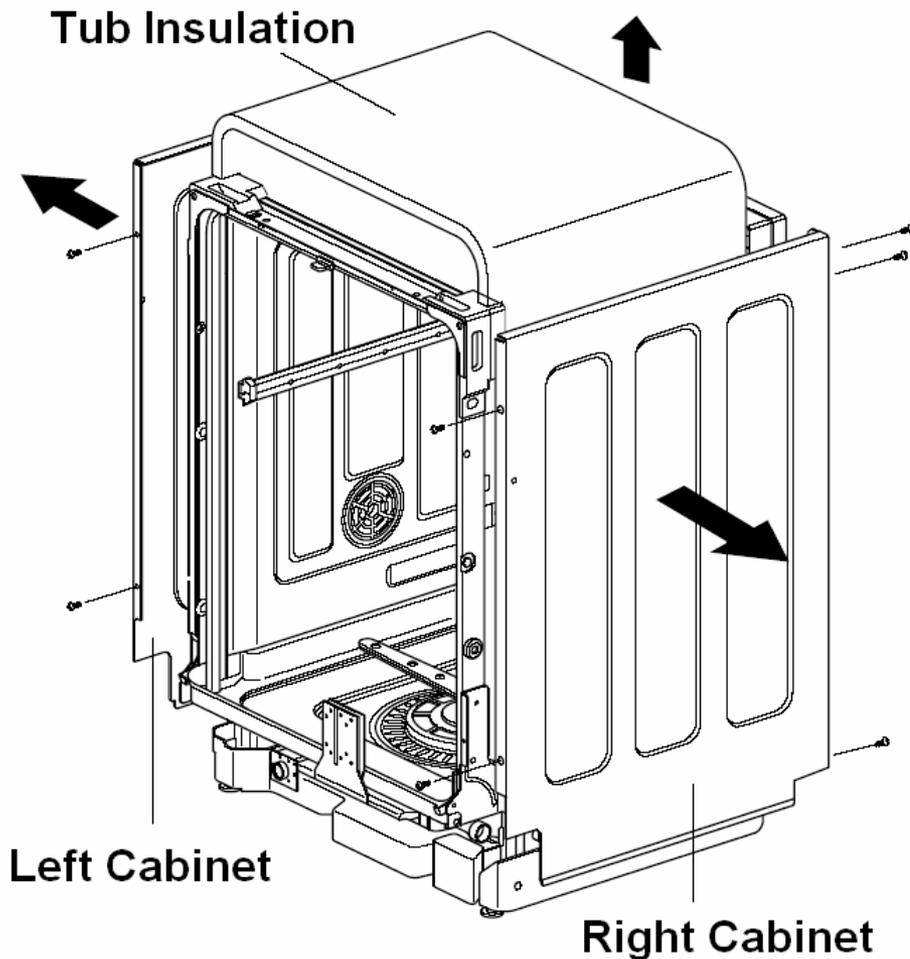


Remove the two screws in the lower cover.

Remove the insulation.

Disconnect the water supply hose and the electric cable if you are removing the dishwasher for service.

# Cabinet and Tub Insulation

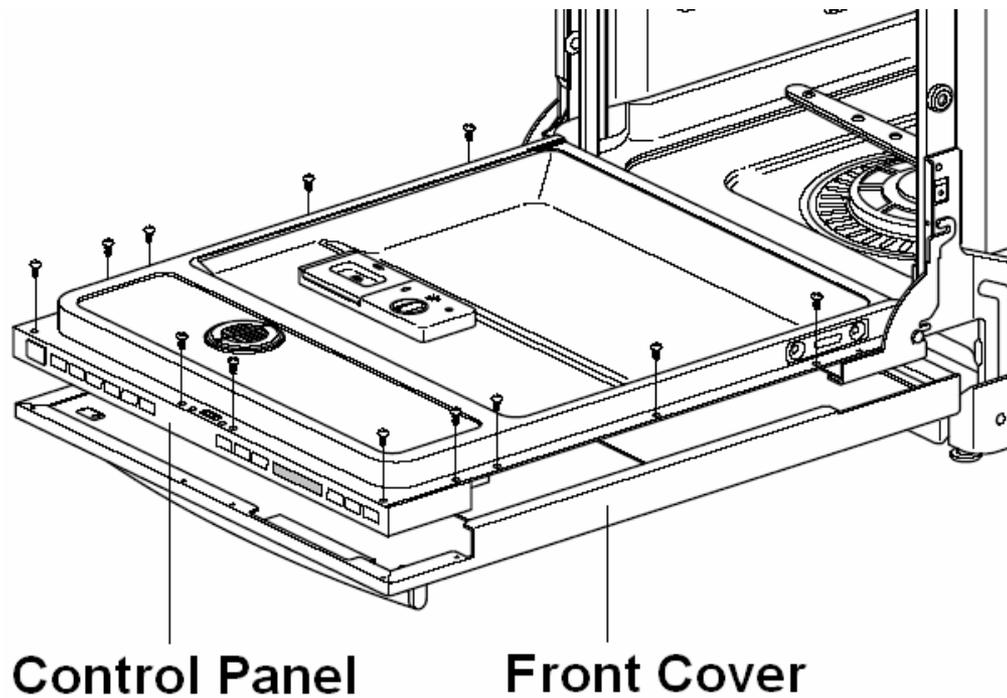


**Right Cabinet –**  
Remove two screws at the front and three screws at the rear.

**Left Cabinet –**  
Remove two screws at the front and three screws at the rear.

**Insulation –**  
Remove the insulation blanket carefully by lifting straight up.

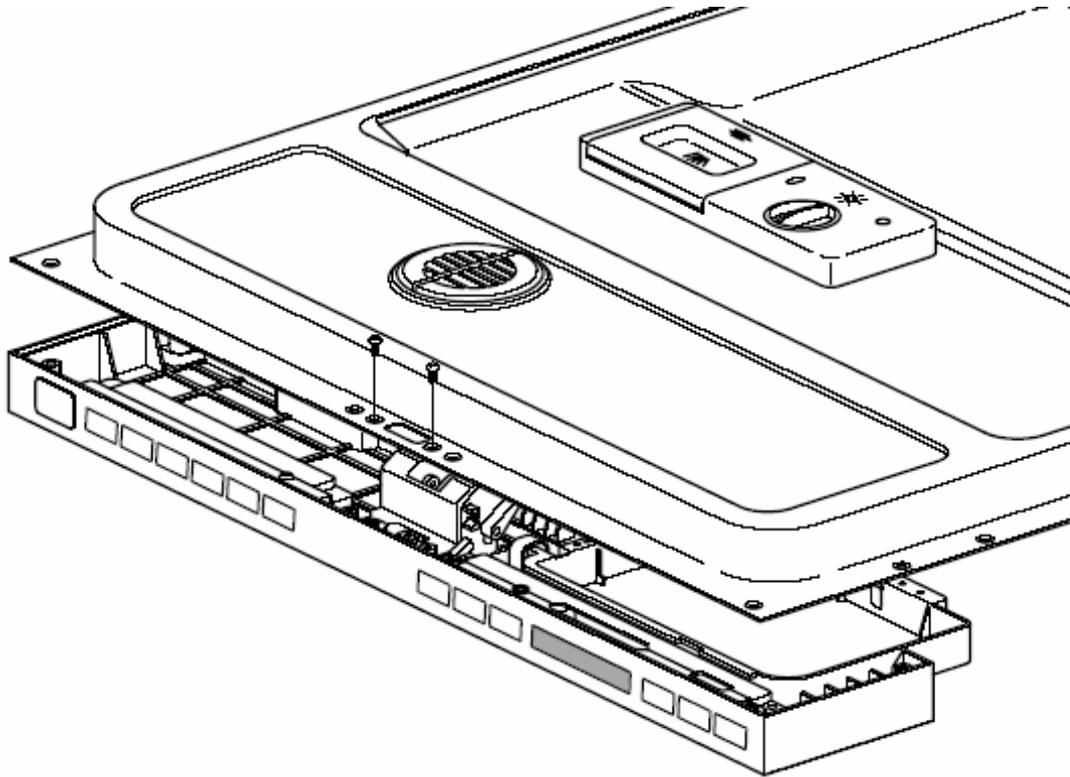
# Front Cover



Open the door.

Remove 12 screws  
(stainless steel).

# Control Panel Assembly

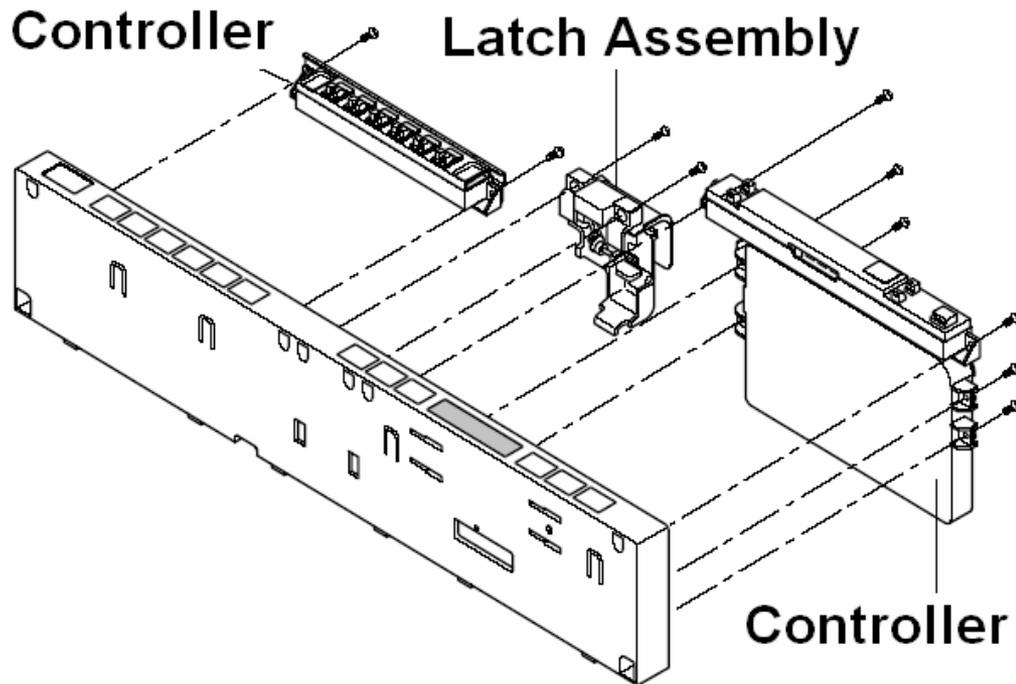


Remove 2 screws  
(stainless steel).

Remove the wire  
connections.  
(Do not reverse at  
reassembly!)

Remove the latch  
assembly.

# Control Panel Assembly

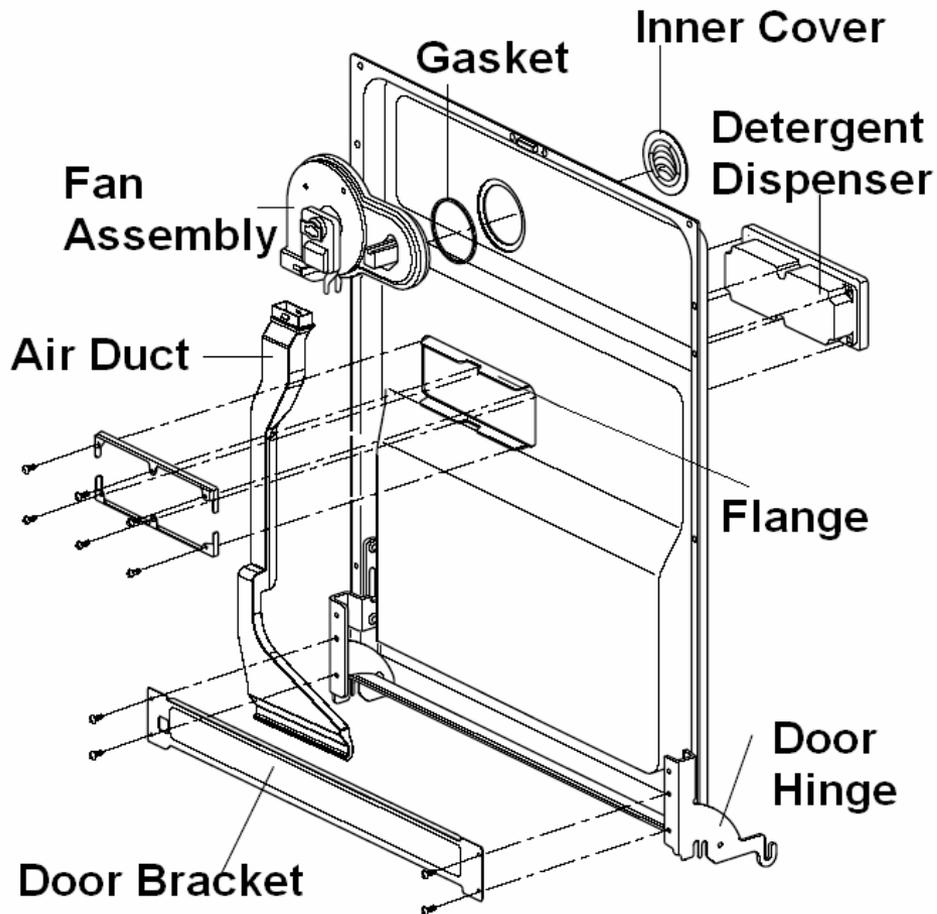


Remove the front display.

Remove 8 screws to take out the controller (main board).

Reassembly is the reverse order of disassembly. Be careful to avoid reversing the connectors.

# Fan Assembly



Remove the front cover.  
(See page 25.)

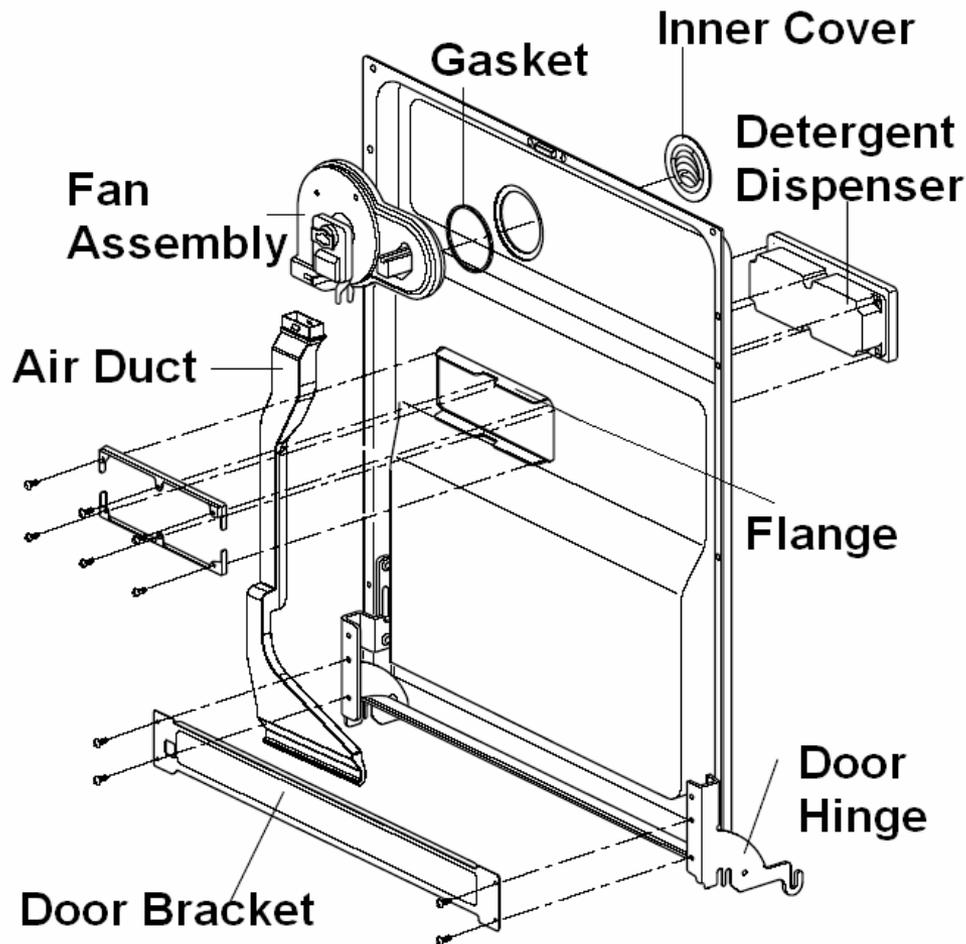
Remove 4 screws and a  
ground screw for the door  
bracket.

Remove the wire connections  
from the fan.

Remove the air duct.

Unscrew the inner cover to  
remove the fan assembly.

# Detergent Dispenser

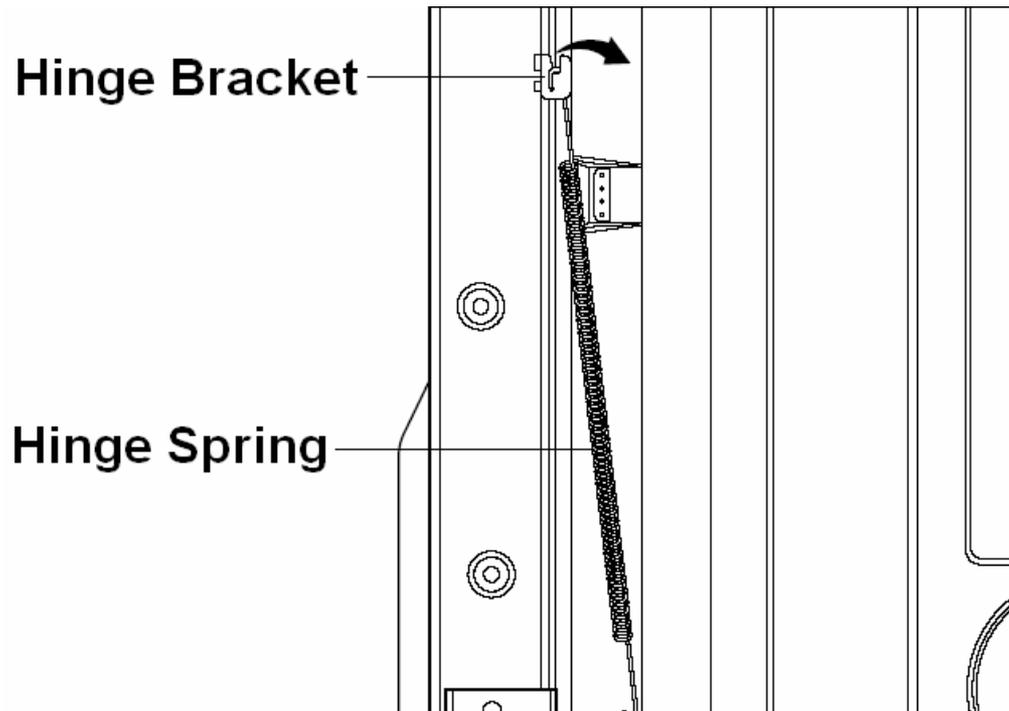


Remove the wire connections.

Remove the 2 brackets (6 screws).

Use a screwdriver to pry the flange up to release the dispenser.

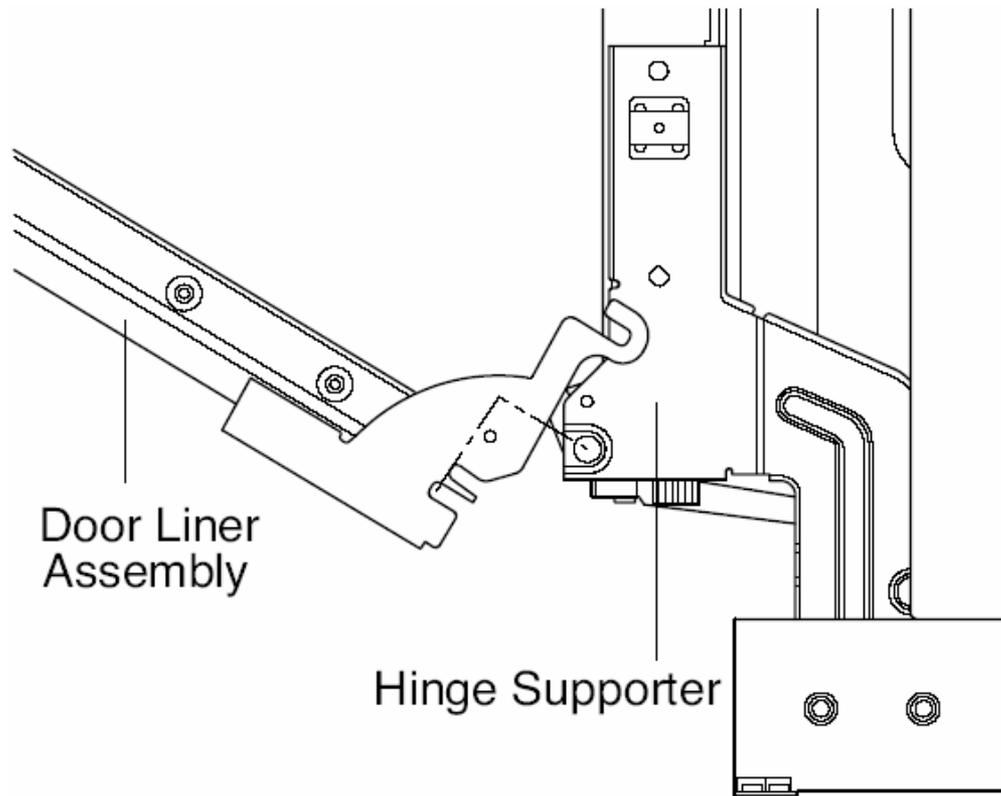
# Door Spring (Right and Left)



Pull the spring upward and take it off the hinge bracket.

Take the spring off the hinge.

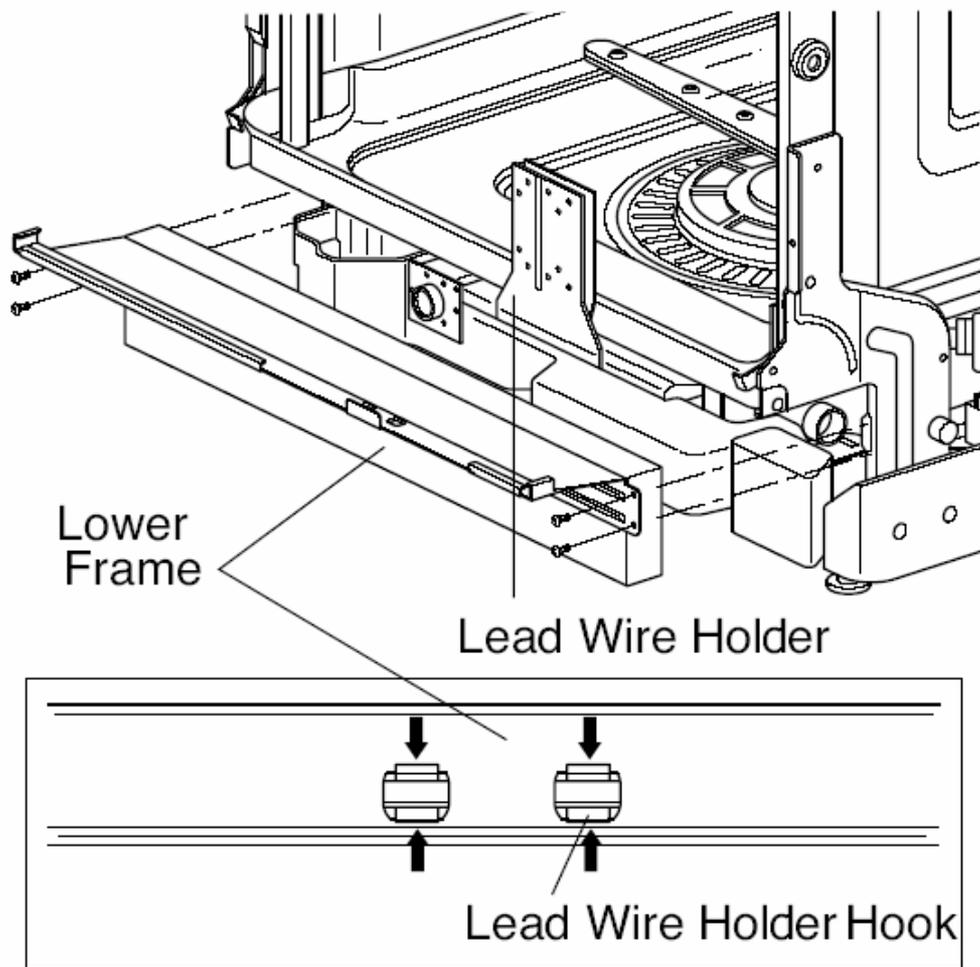
# Door Liner



Open the door.

Pull the door liner upward  
off the hinge supporter.

# Lower Frame

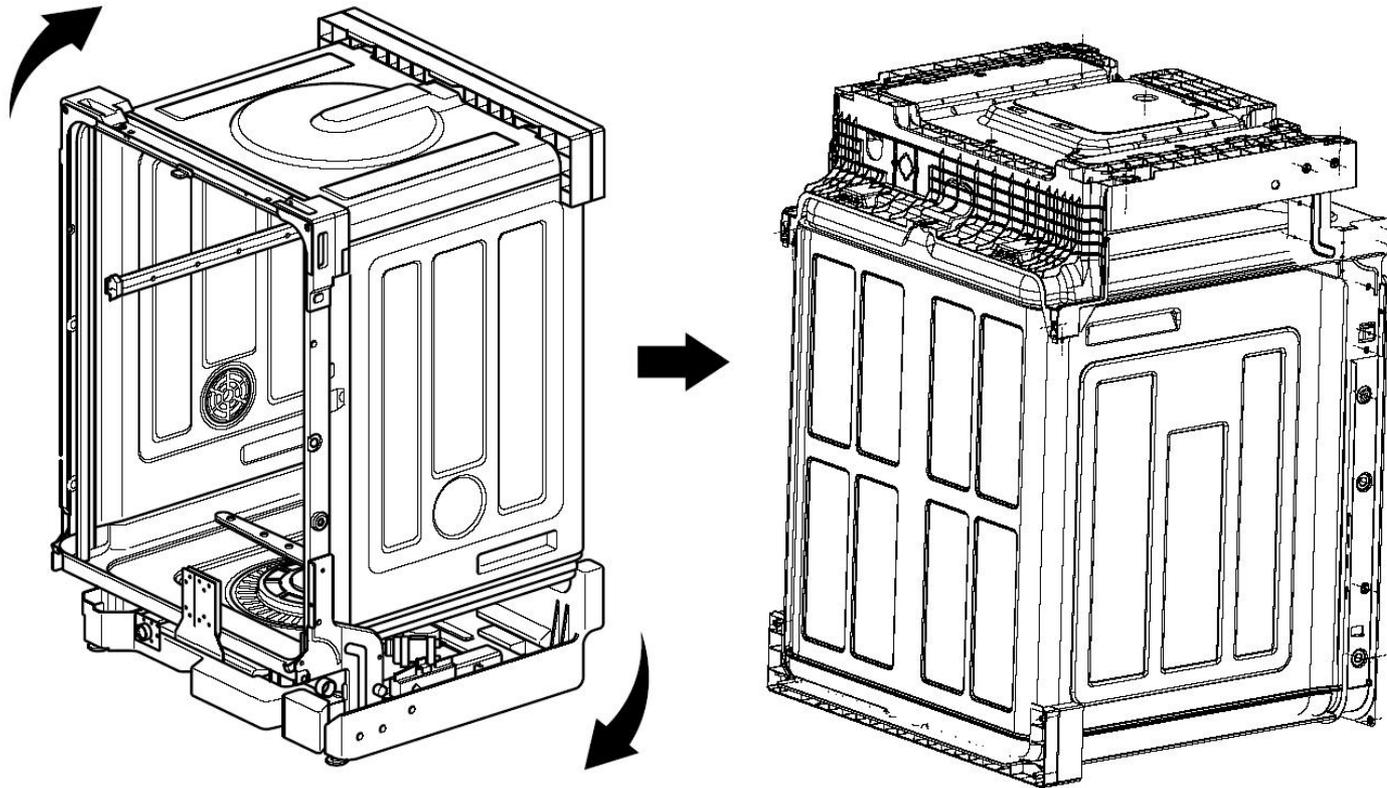


Press the holder hooks as shown.

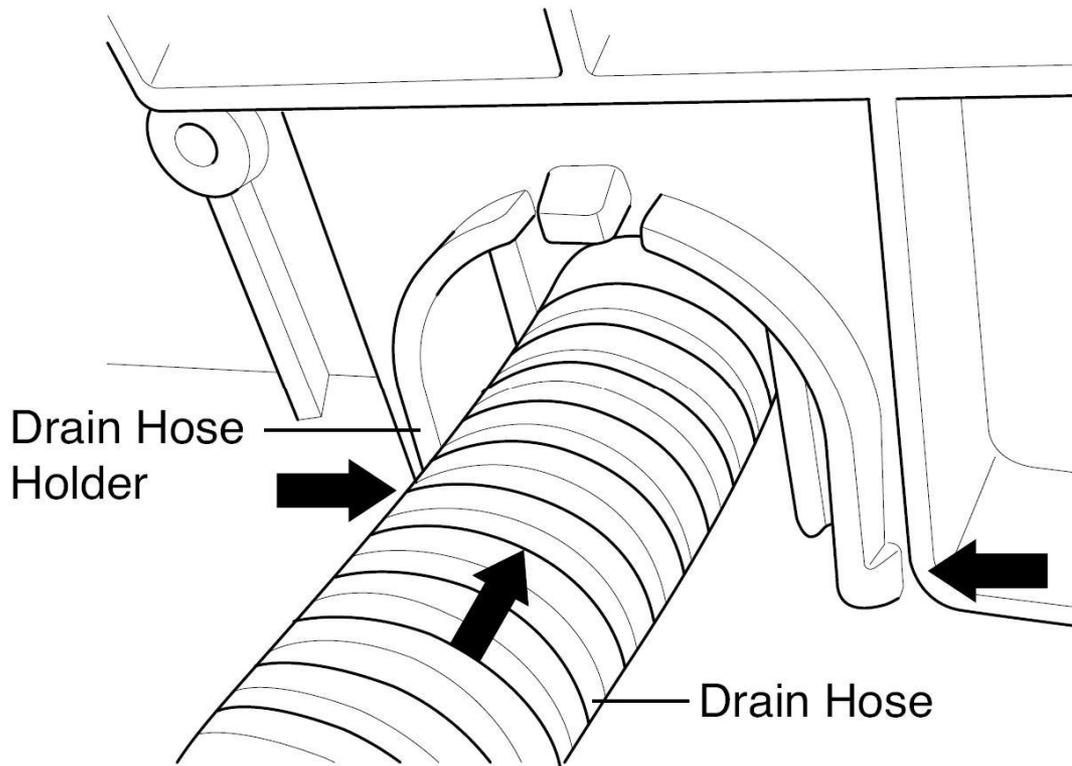
Remove the 4 screws.

# Lower Frame

Turn the dishwasher upside-down.



# Drain Hose Holder



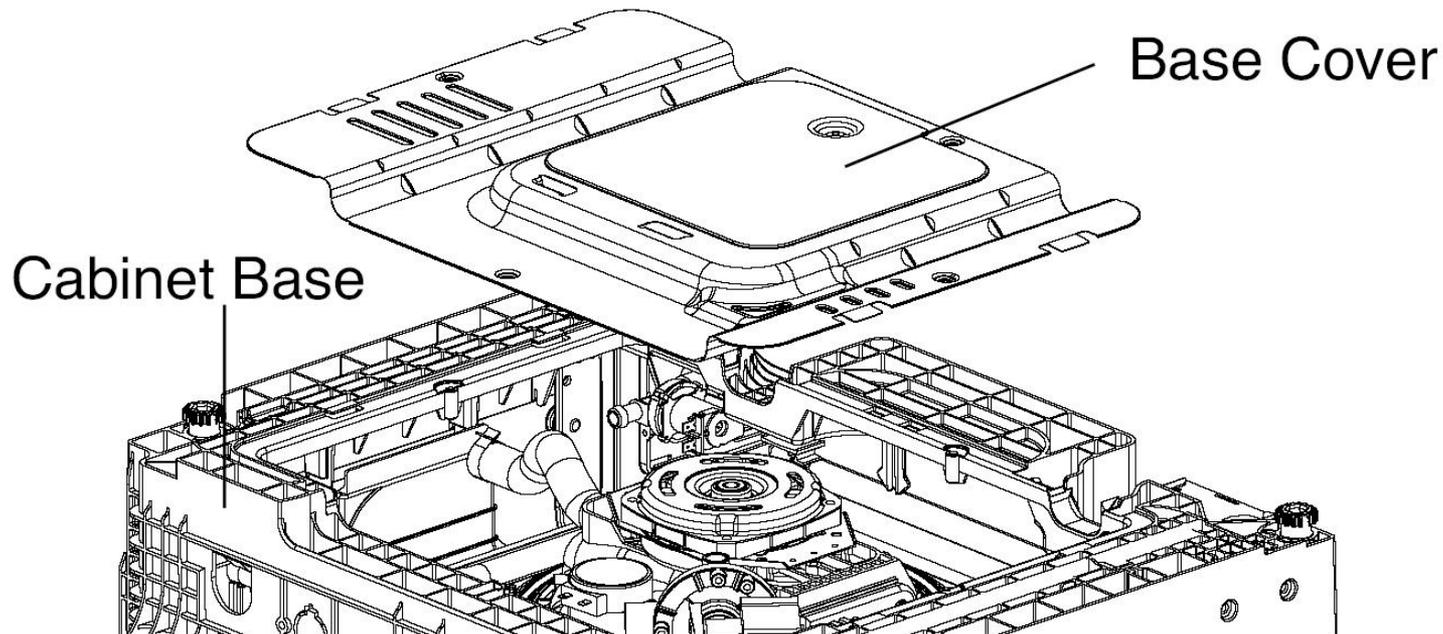
Press the holder hook as shown.

Pull the drain hose and remove the drain hose holder.

# Base Cover

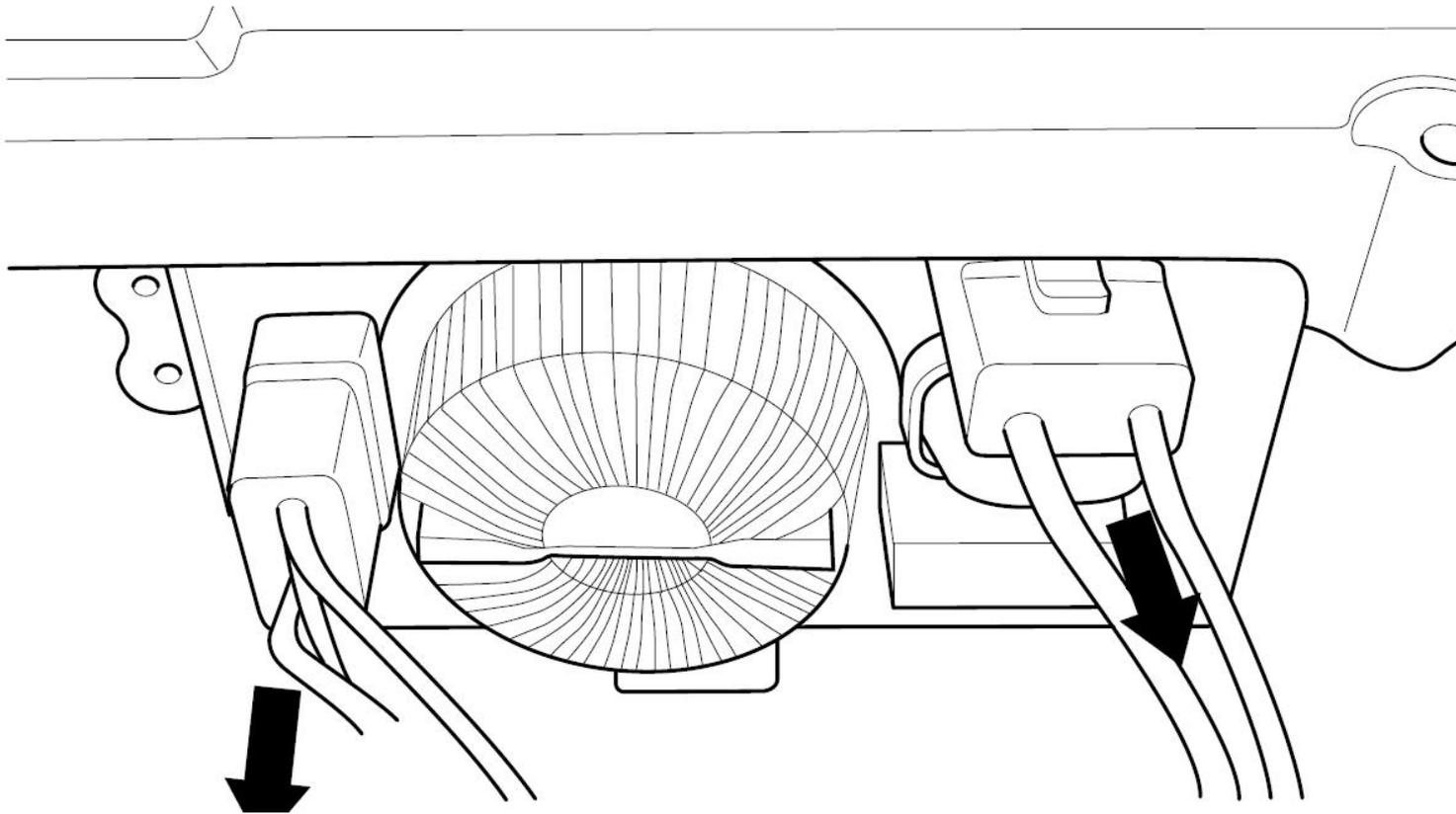
Remove 2 screws.

Lift the base cover out of the base.



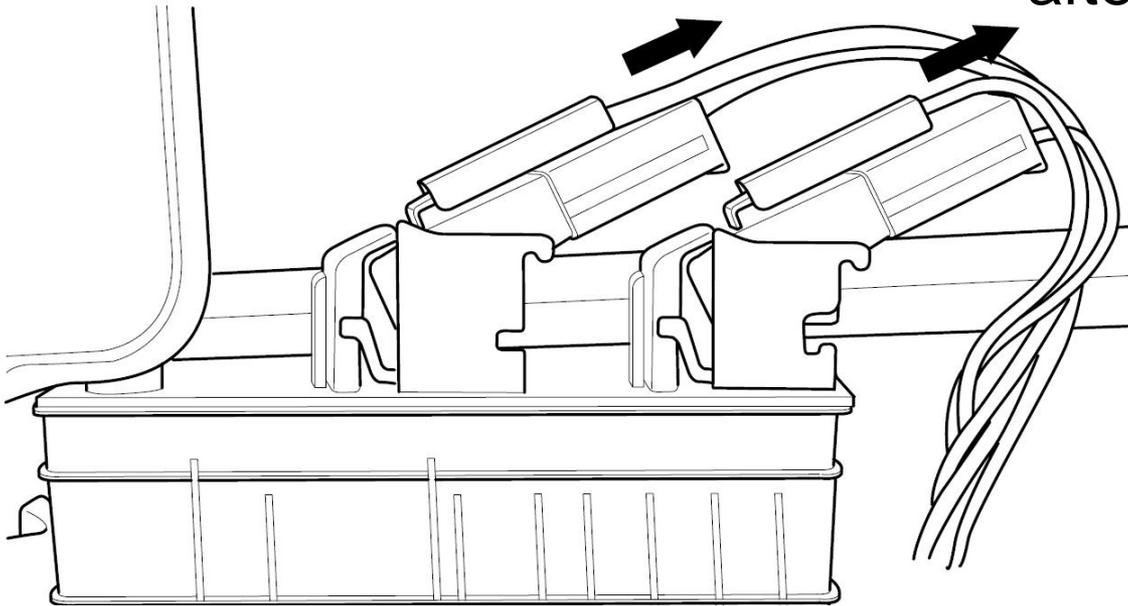
# Line Noise Filter

Disconnect both connectors of the line noise filter.



# Float Switch Assembly

Remove the connections from the float assembly micro switches. Mark them to ensure you can reconnect them correctly after repairs



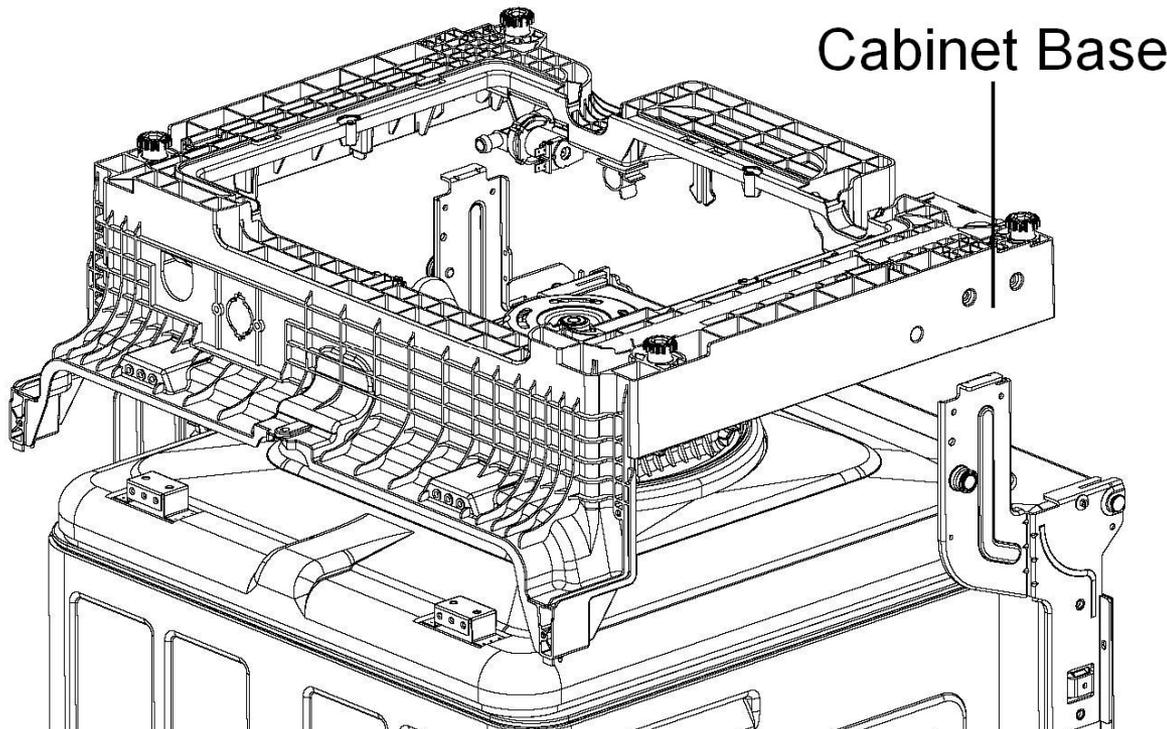
# Wiring Diagram

The wiring diagram is attached to the back of the lower cover.

# Cabinet Base

Remove 8 screws around the base.

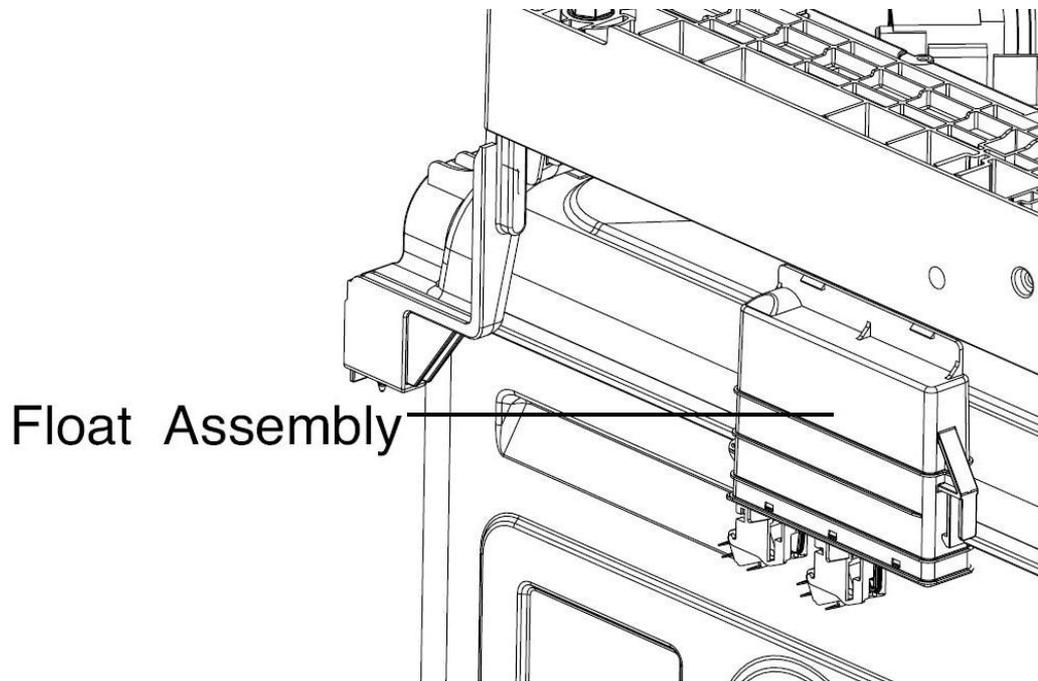
Lift the base upward off the dishwasher.



# Float Assembly

Press the hook to separate the float assembly.

Pull the float assembly free.

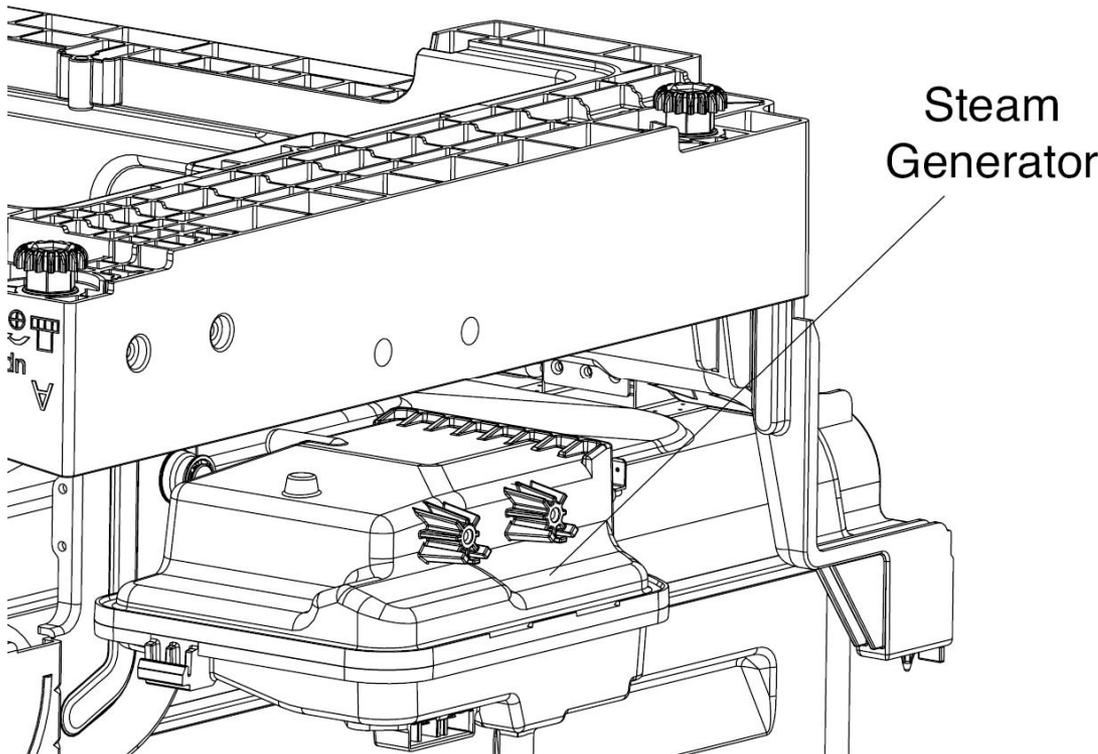


# Steam Generator

Squeeze the hose clamps and remove the 3 hoses from the steam generator.

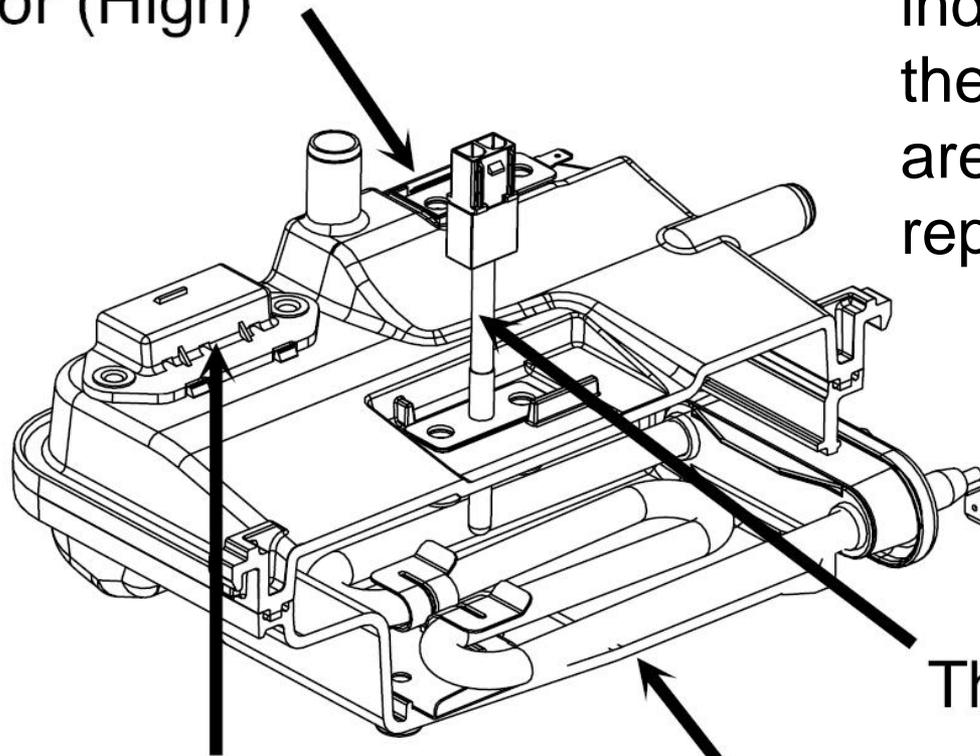
Remove 2 screws to take out the steam generator.

**NOTE:** Be careful in case the steam generator is still hot or has hot water in it.



# Steam Generator

WaterLevel  
Sensor (High)



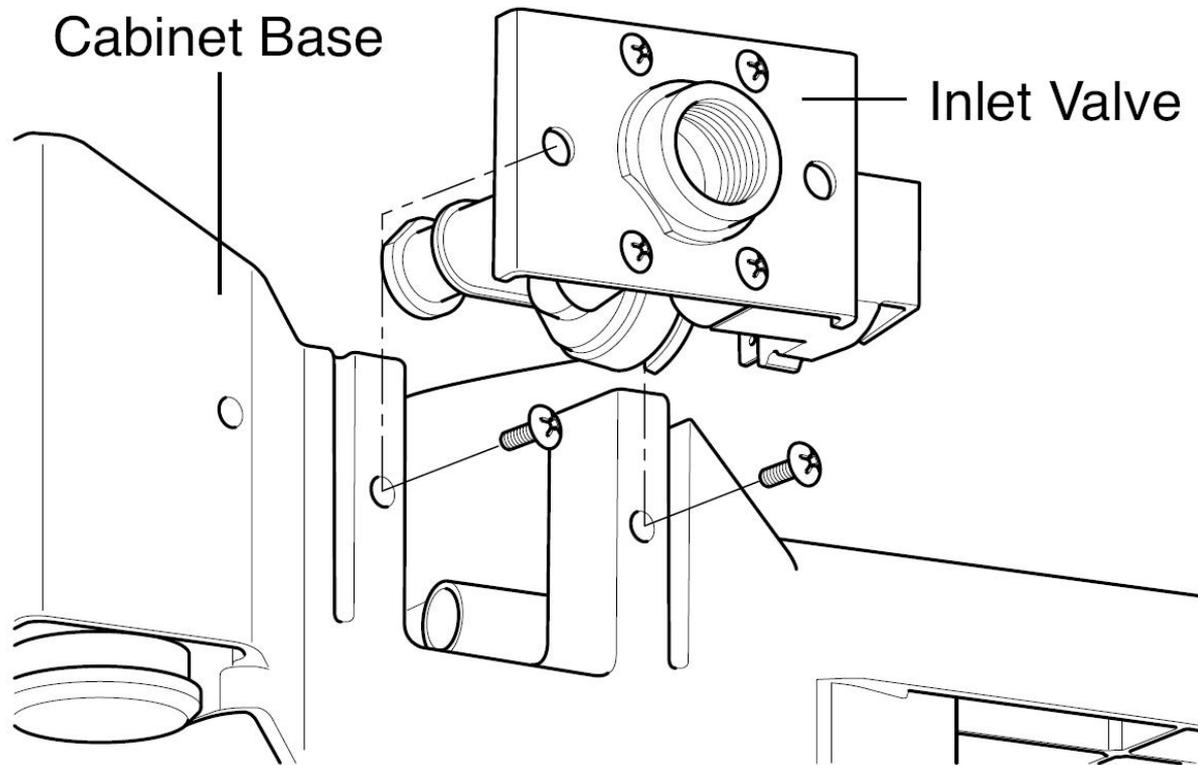
Water Level  
Sensor (Low)

Heater

The steam generator is sold as an assembly. The individual parts (heater, thermistor, and sensor) are not repairable or replaceable.

Thermistor

# Inlet Valve

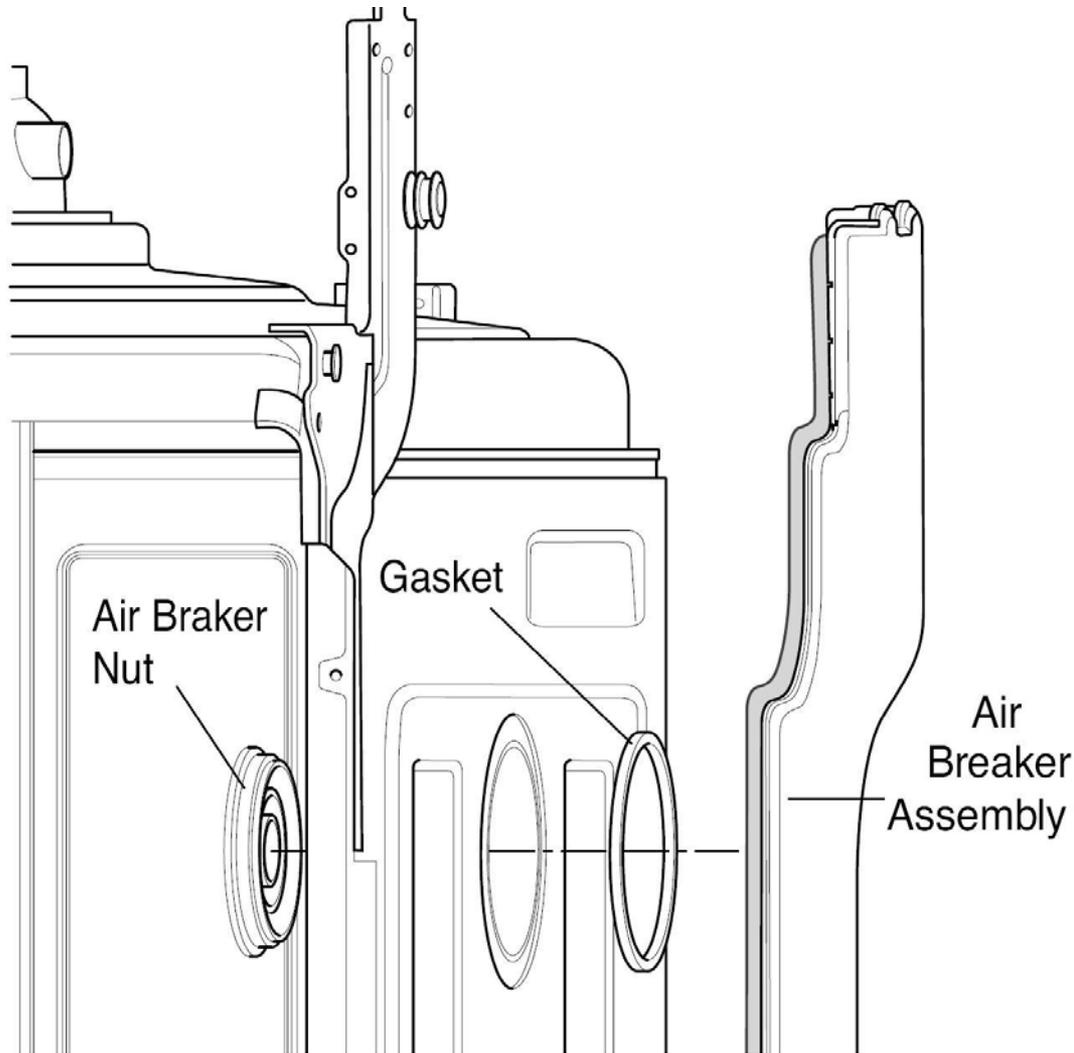


Disconnect the water supply line.

Remove the electrical ground wire.

Remove 2 screws that hold the valve to the base and take out the valve.

# Air Breaker Assembly

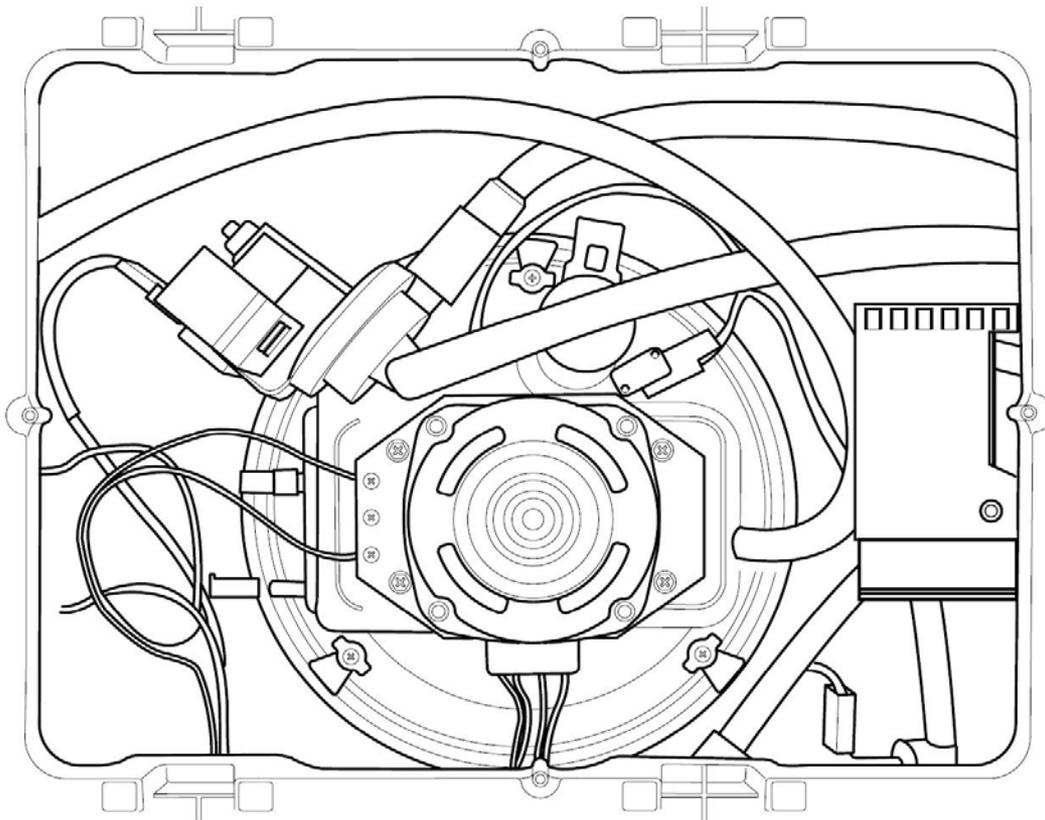


Disconnect three hoses from the air breaker assembly.

Unscrew the cover on the inside of the dishwasher.

Be sure not to lose the gasket (O-ring) that fits between the outside of the tub and the air breaker assembly.

# Sump Assembly



Remove the wiring connections, including the ground wires attached by screws.

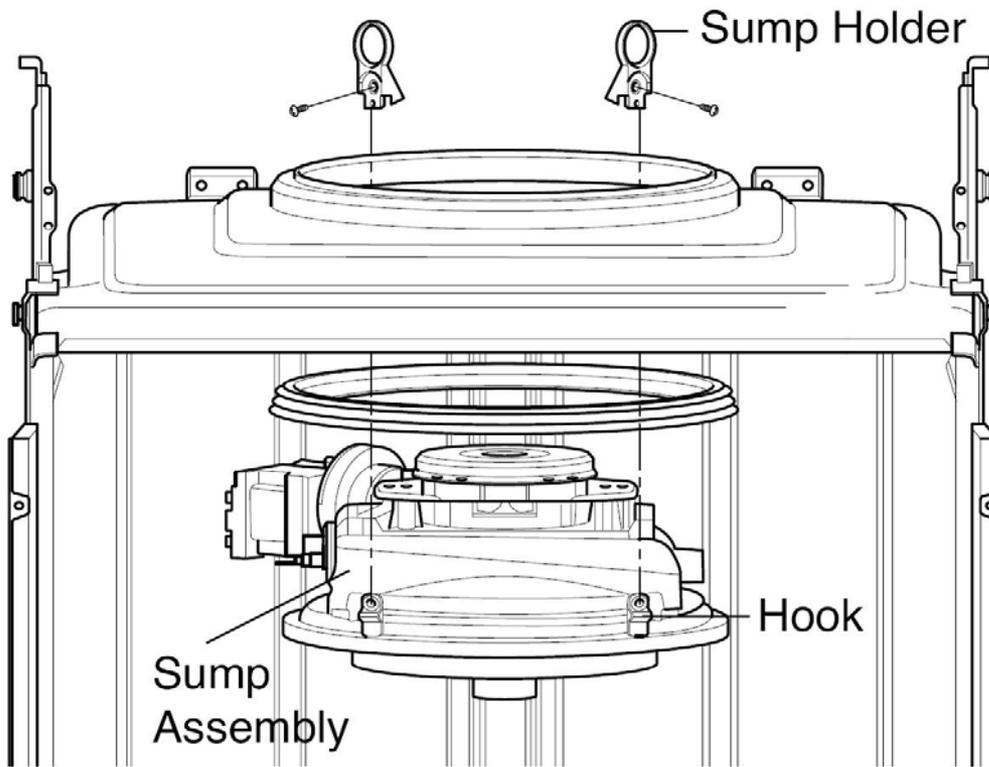
Remove the hose connections.

Lift the sump assembly out of the base of the dishwasher.

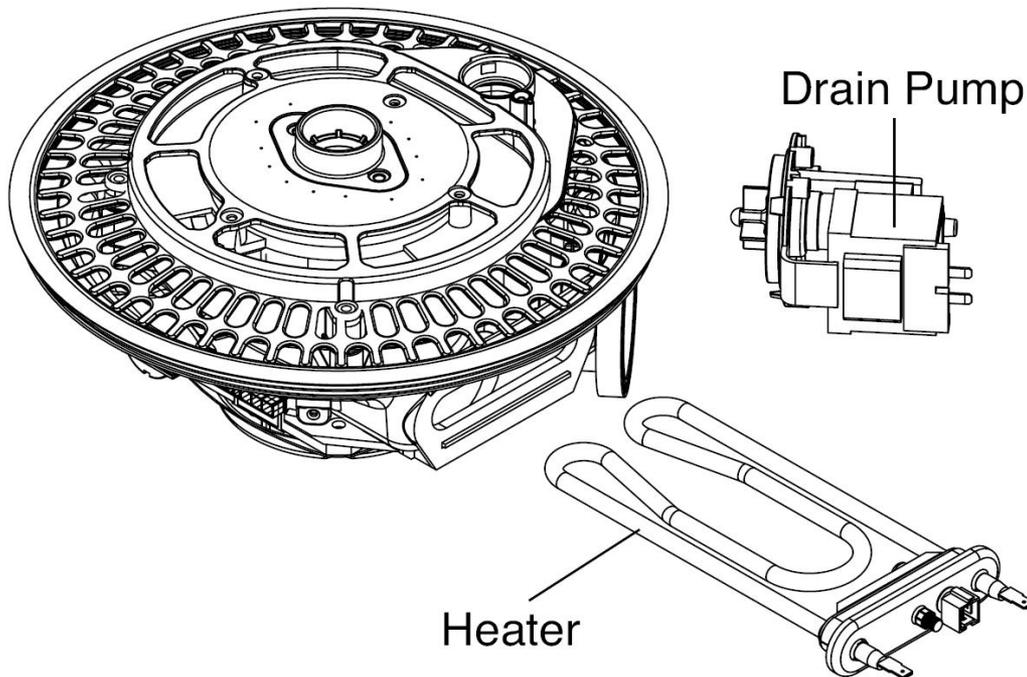
# Preliminary

Remove the 2 screws and sump holder clips. Be careful not to let the sump assembly fall into the tub.

Press the hooks gently toward the center of the sump assembly and lower the sump assembly into the tub while supporting it with one hand.



# Heater and Drain Motor



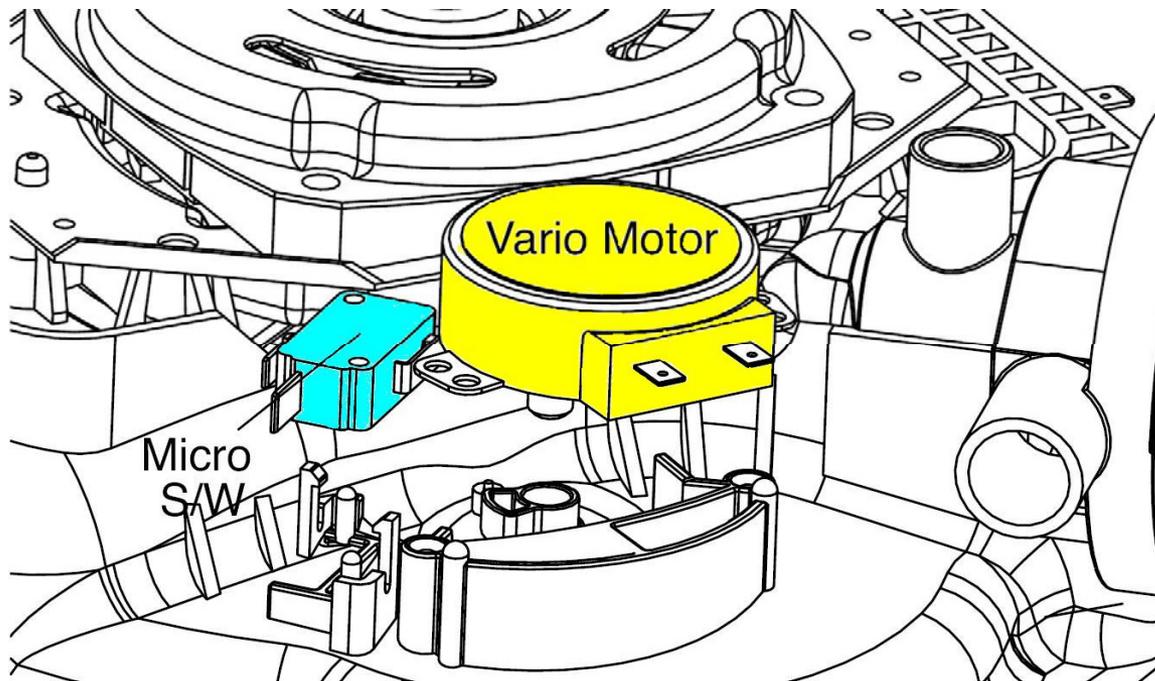
Loosen the nut on the heater retainer to the end of the shaft and wiggle the heater out of the sump.

Remove 3 screws and detach the drain pump from the sump.

# Vario Motor

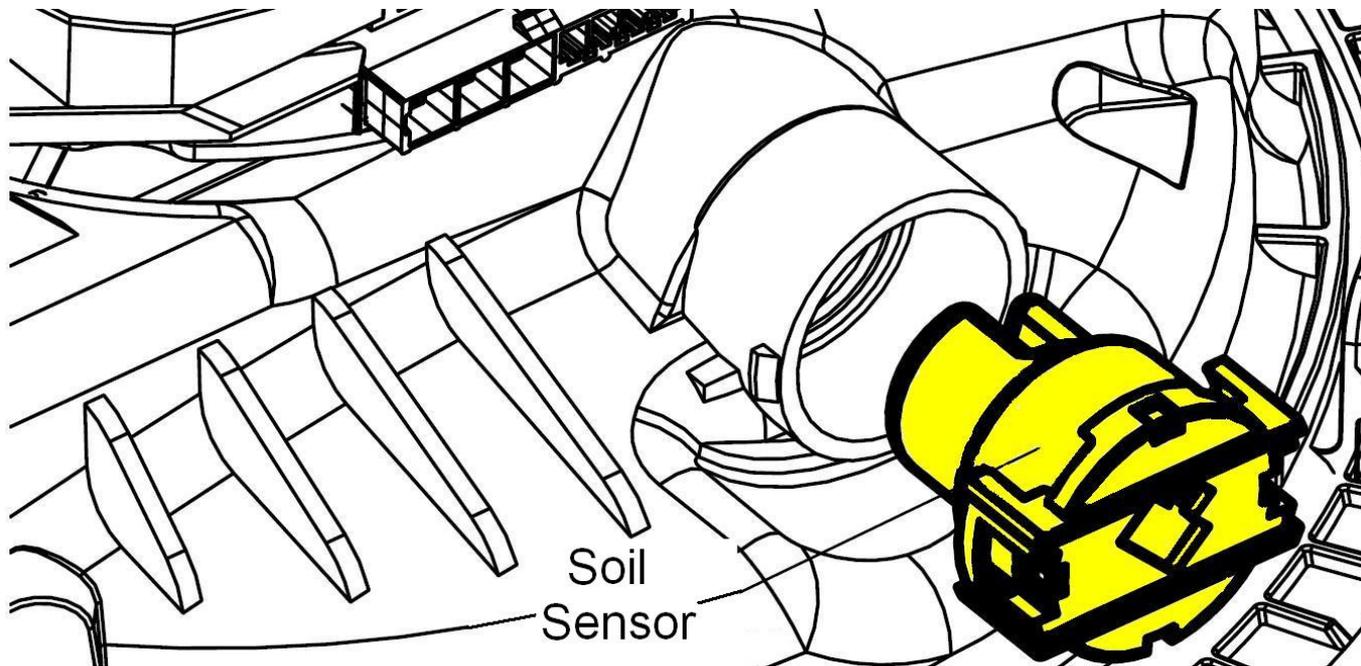
Remove 2 screws that attach the vario motor to the sump.

Remove the vario motor and the micro switch.



# Soil (Turbidity) Sensor

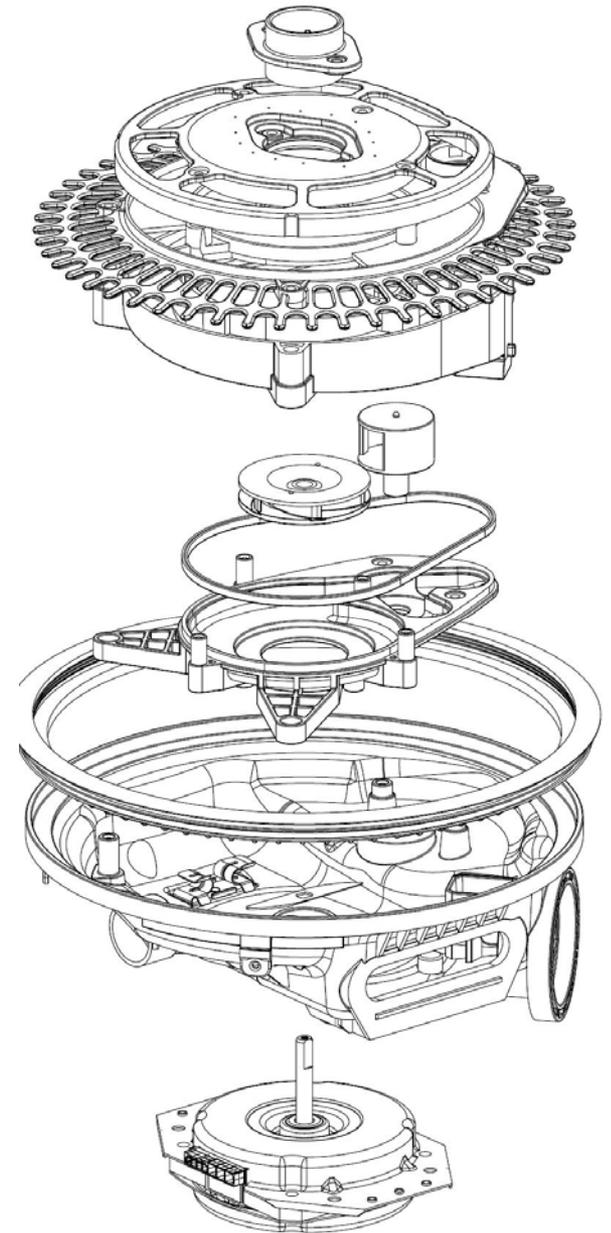
Lift the retaining clips and pull the soil sensor (turbidity sensor) from the sump.



# Preliminary

When reassembling the sump, be careful to avoid kinking or damaging the small seals and gaskets inside it.

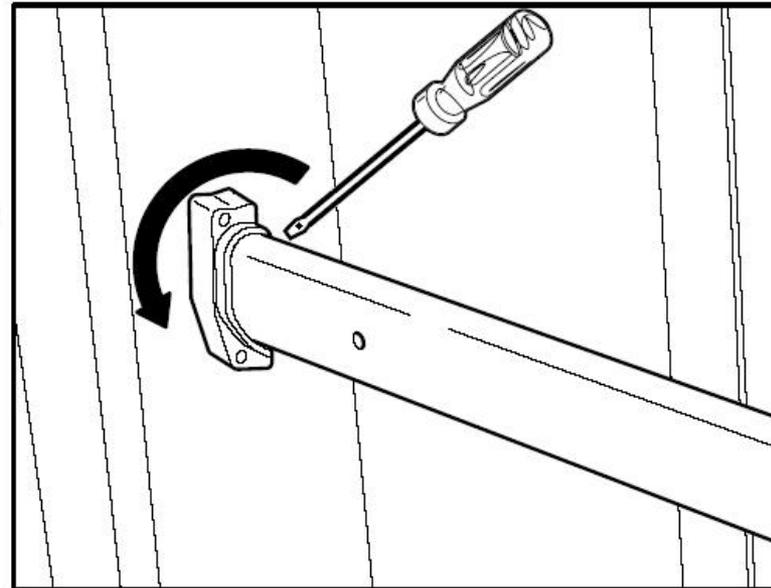
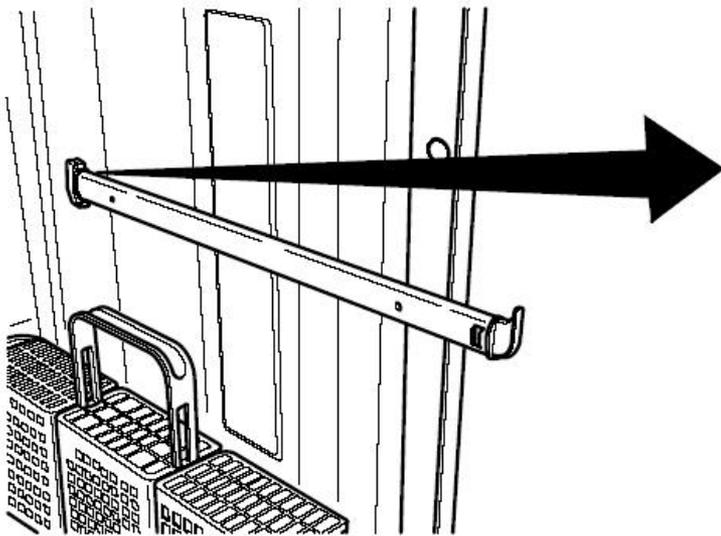
(See page 39 in the exploded view.)



# Cutlery Rack Rail

Insert a screwdriver in the gap behind the rail at the back end and pry the end cap off.

It is easily broken, so have a replacement available.

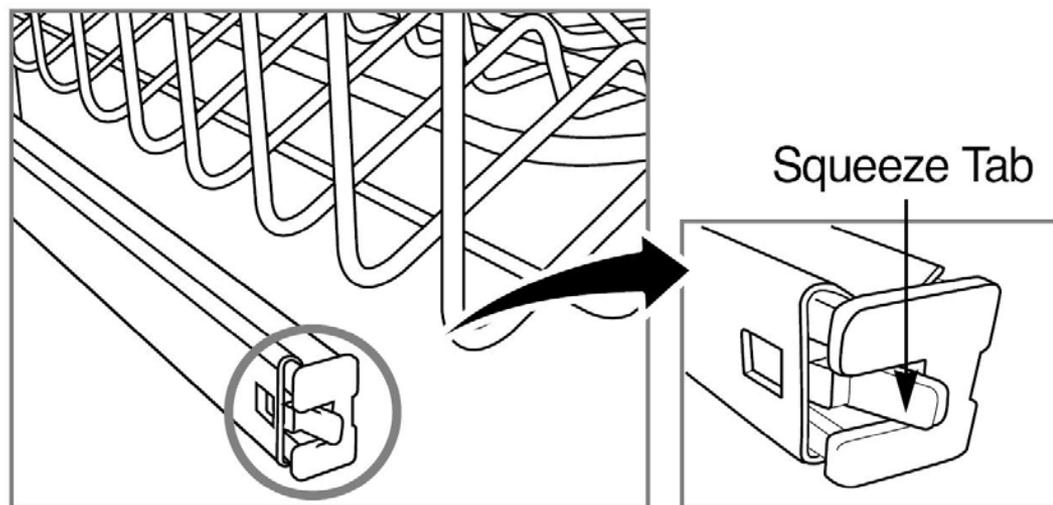


# Upper Rack Rail

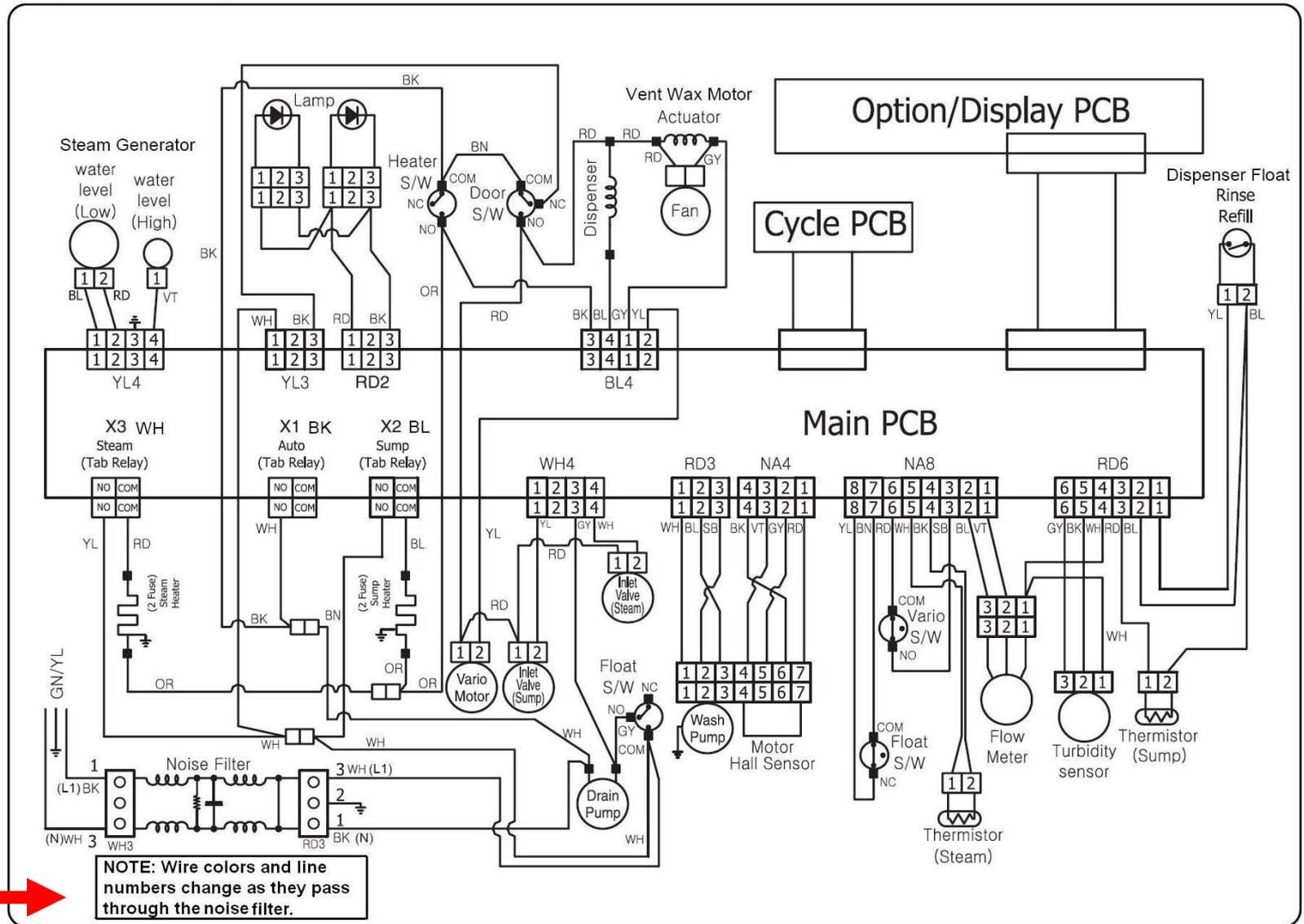
Pull the upper rack out until it stops.

Squeeze the tab of the stopper and pull the stopper out. Be careful the upper rack does not fall out of the rail while you do this.

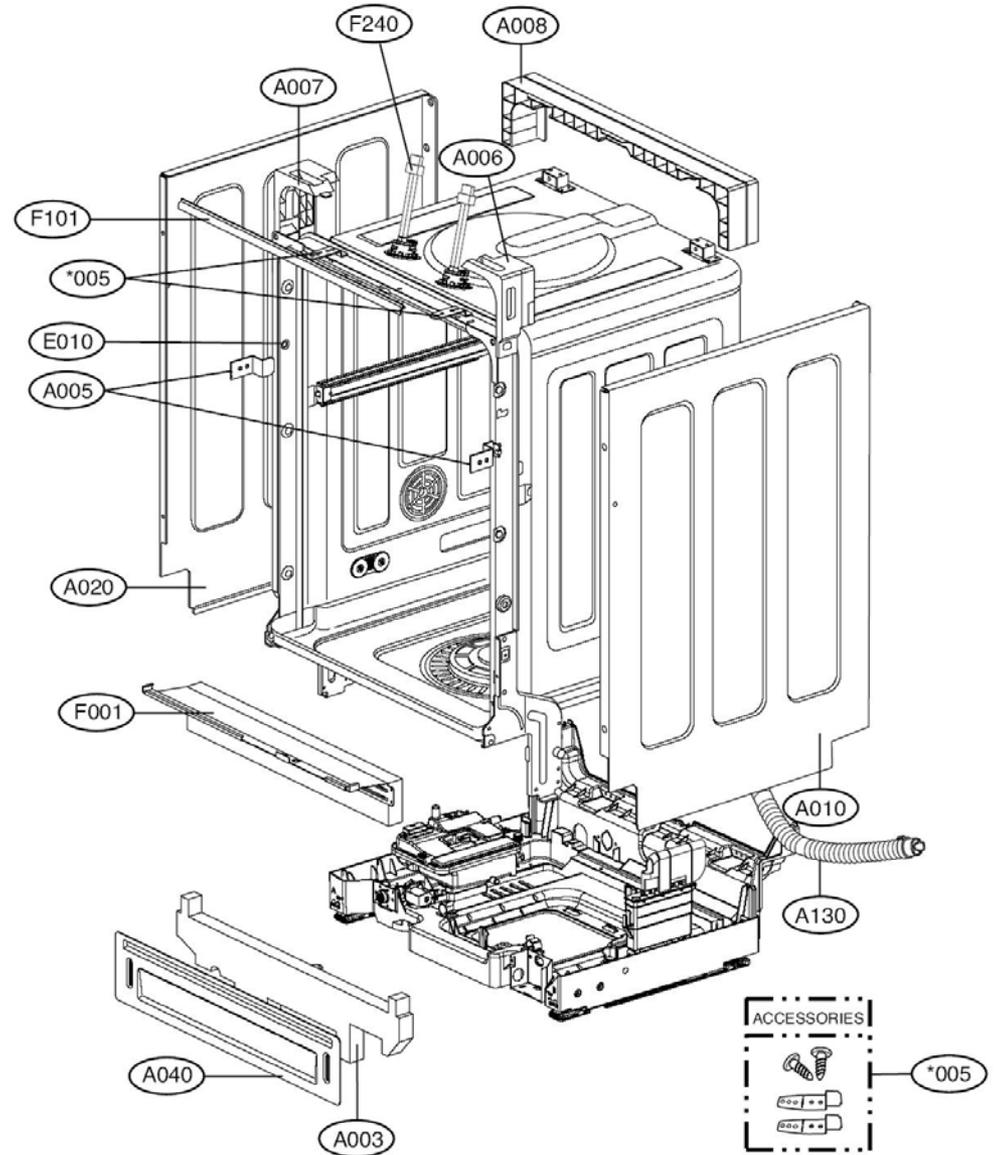
Pull the upper rack out of the slides.



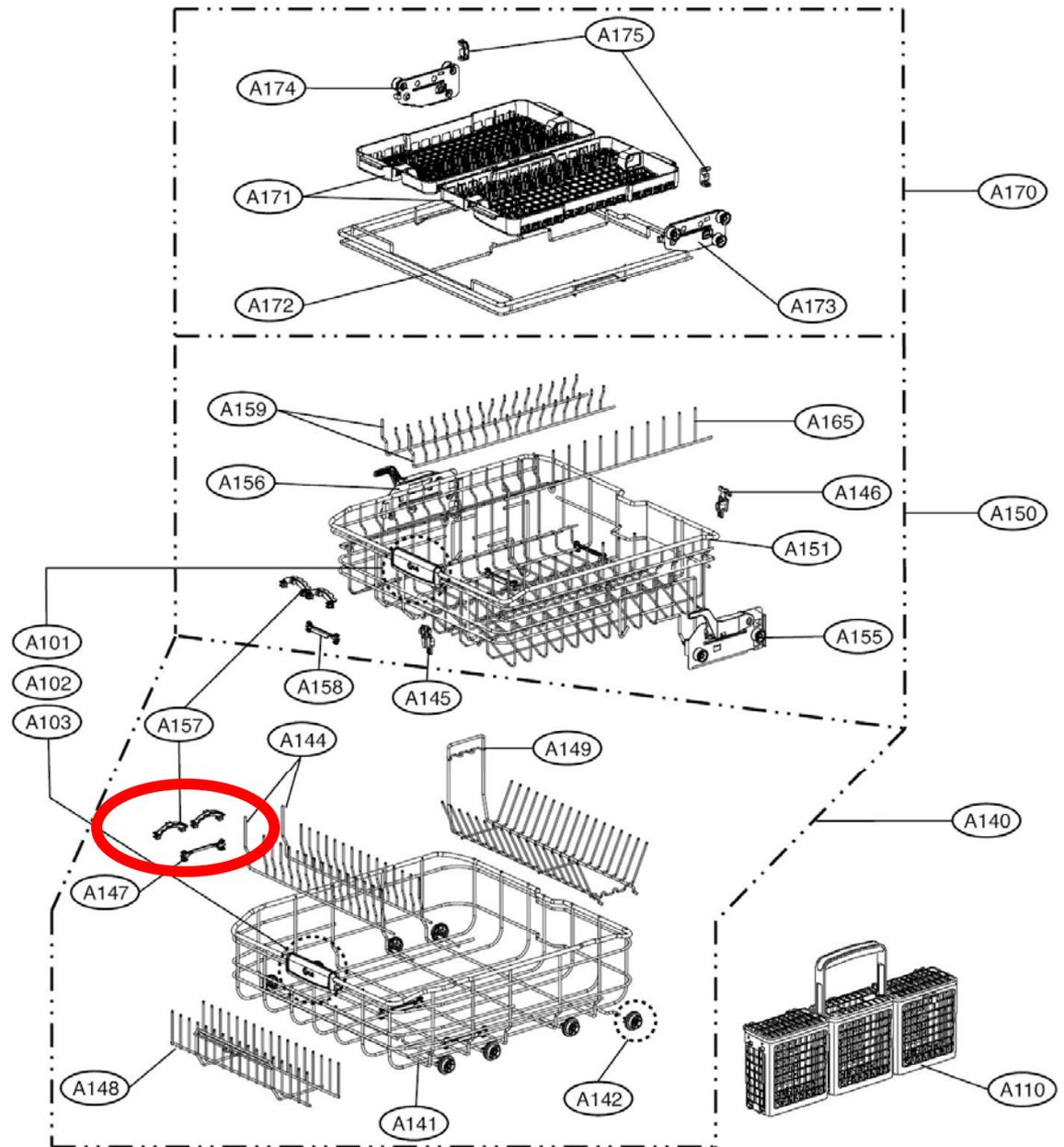
# Wiring Diagram



# Exploded View



# Exploded View



# Serial Number (Old Style)

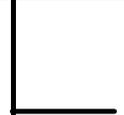
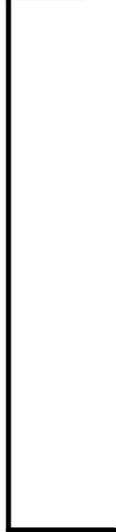
**[Example] 801KW3400251**

8 0 1

K W

3 4

0 0 2 5 1



Manufactured January 2008

Made in Korea

*[Internal code]*

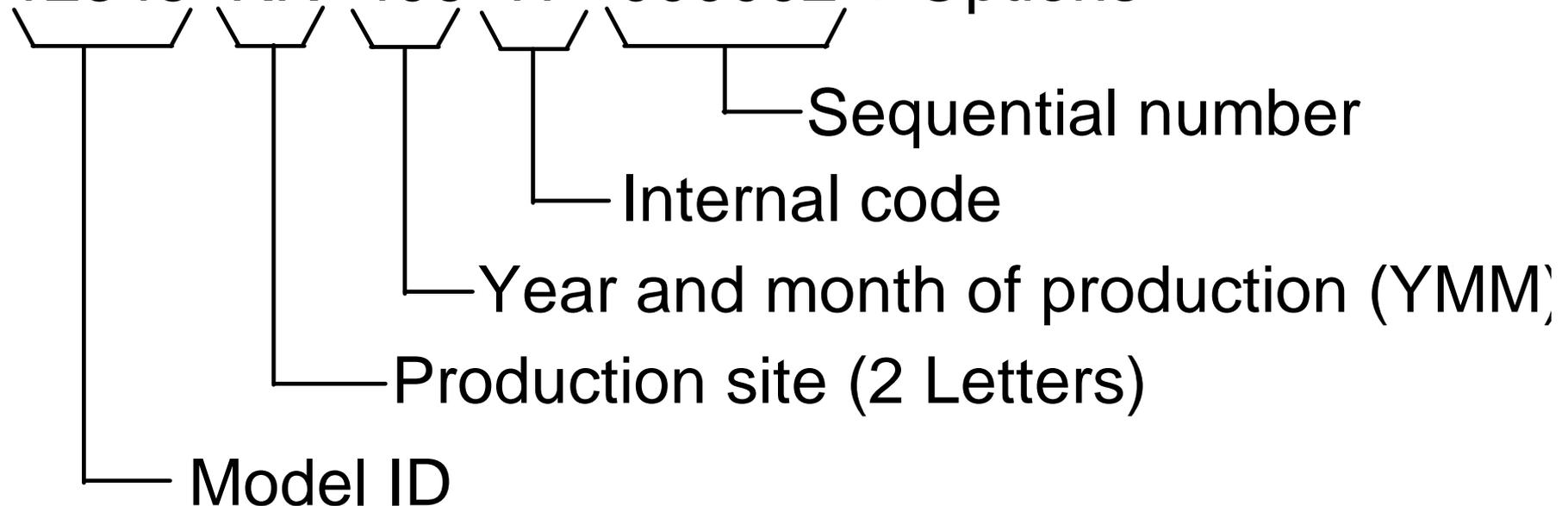
Production Number

# Serial Number (New Style)



## New Serial Code (ETA Mid 2008)

12345 KR 406 YP 000002 + Options



# Parts List

Loc.	Part Number	Description	Qty.
*001	AFN31666719	Owner's Manual	1
*002	3890DZ3015A	Box, Carton	1
*003	MFL37554802	Manual, Service	0
*005	5001DD4001A	Accessory Assembly	1
A003	ACV34326901	Damper (Insulation)	1
A005	4810DD4002B	Bracket, Top	2
A006	4980ED2015A	Supporter, Holder	1
A007	4980ED2014A	Supporter, Holder	1
A008	4980ED2018B	Supporter, Holder	1
A010	3090ED1001F	Cabinet	1
A020	3091DD1001F	Cabinet Assembly	1
A040	3551DD2001E	Cover Assembly, Lower	1

# Ohm's Law and Watt's Law

## P = WATTS

$$\text{Watts} = \text{Volts}^2 \times \text{Ohms}$$

$$\text{Watts} = \text{Amperes}^2 \times \text{Ohms}$$

$$\text{Watts} = \text{Volts} \times \text{Amperes}$$

## E = VOLTS

$$\text{Volts} = \sqrt{\text{Watts} \times \text{Ohms}}$$

$$\text{Volts} = \text{Watts} / \text{Amperes}$$

$$\text{Volts} = \text{Amperes} \times \text{Ohms}$$

## I = AMPERES

$$\text{Amperes} = \text{Volts} / \text{Ohms}$$

$$\text{Amperes} = \text{Watts} / \text{Volts}$$

$$\text{Amperes} = \sqrt{\text{Watts} / \text{Ohms}}$$

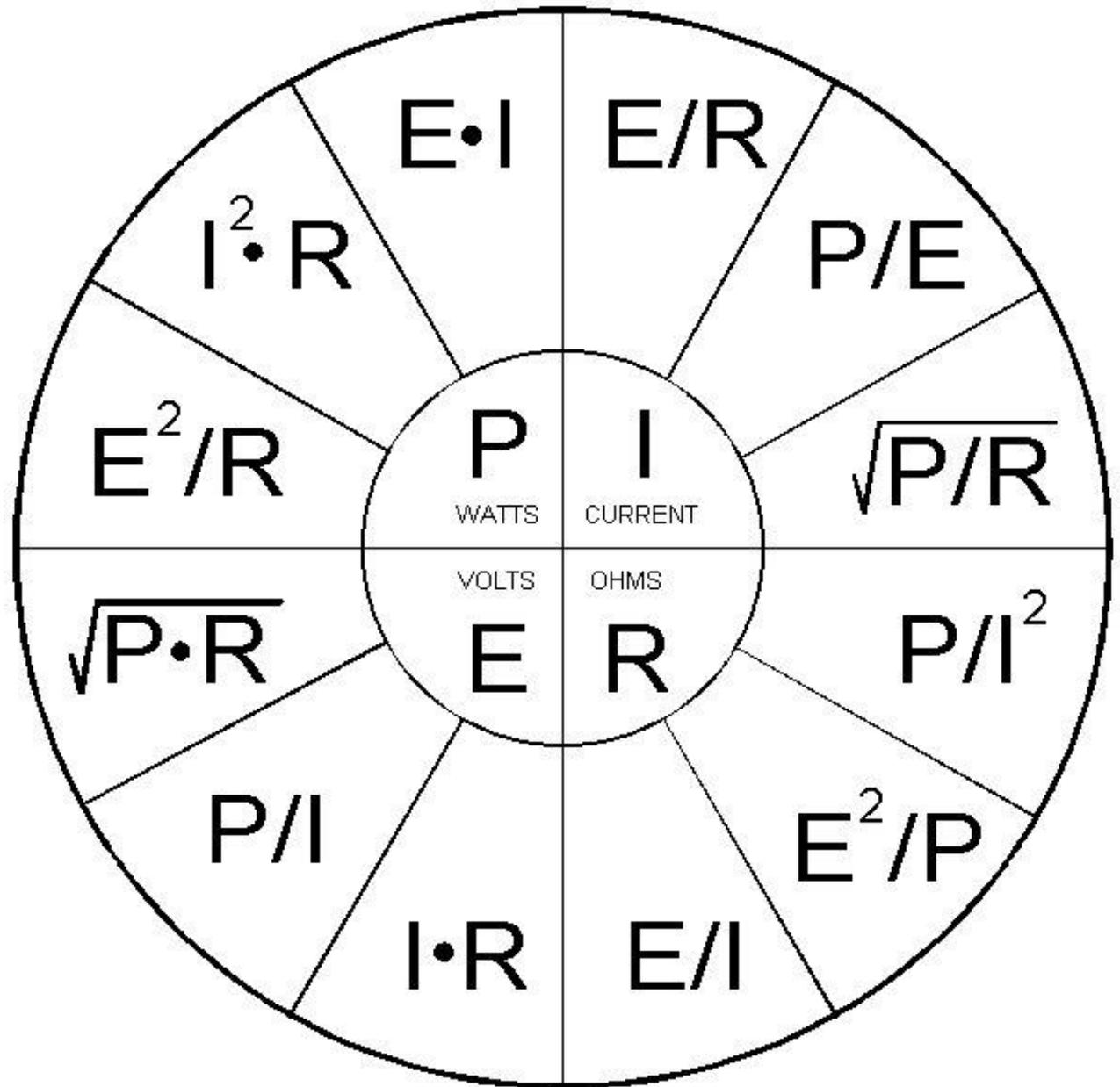
## R = OHMS

$$\text{Ohms} = \text{Volts} / \text{Amperes}$$

$$\text{Ohms} = \text{Volts}^2 / \text{Watts}$$

$$\text{Ohms} = \text{Watts} / \text{Amperes}^2$$

# Ohm's Law

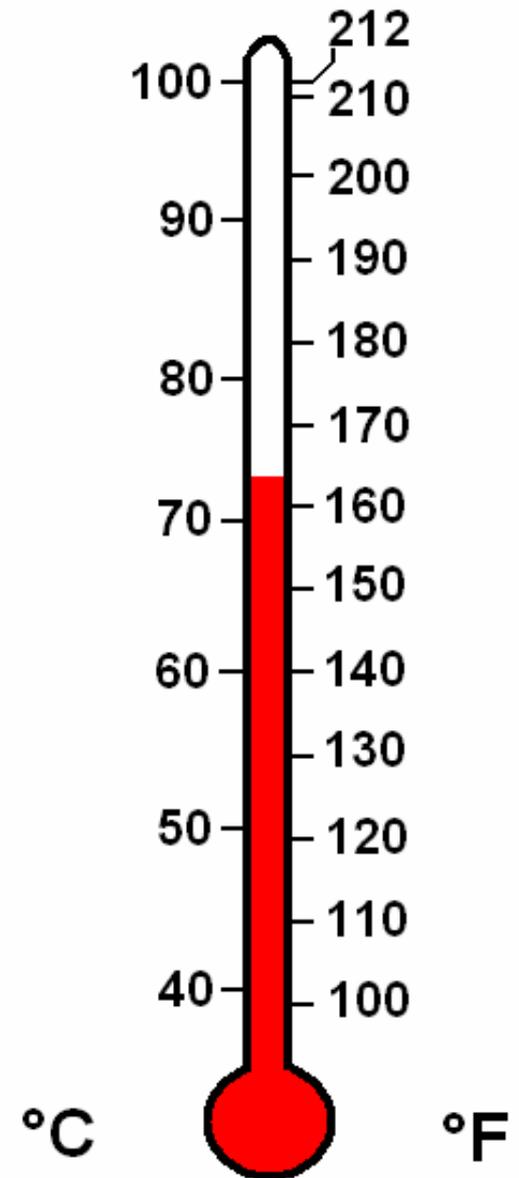


# Conversion Information

$$^{\circ}\text{F} = (9/5) ^{\circ}\text{C} + 32$$

$$^{\circ}\text{C} = (5/9) \times (^{\circ}\text{F} - 32)$$

$$\text{ml} \times 30 = \text{ounces}$$



# Service Bulletins

## SERVICE BULLETIN

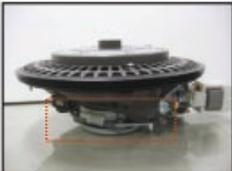
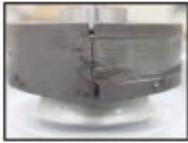
Service Bulletin  
IDSW20070069

WM

WM

LG Electronics Inc.

Date of issue: 28 May. 2007

Buyer Model: LDS5811, LDF7811, LDF7810, LDF6810, LDF8812	
LGE Model: LD-6090, LD-6100, LD-6105, LD-6300, LD-6310	
Buyer Name: LGEAI, LGECI	Effective Date: 15 March. 2007
Applicable Serial No: 703KWXXXXX ~	
Subject: BLDC Motor Magnet Crack	
<p><b>1. Phenomenon</b> : LE Error or Motor shaft locked (Won't Turn)</p> <p><b>2. Reason</b> : BLDC Motor Magnet is cracking. It was caused by chemical attack by the oils used in the manufacturing of the motor.</p> <p><b>3. Improvement</b></p>	
<p><b>- Sump Assembly</b></p>  <p>P/No: AJH31248602(New) 3485ED1002B(Old)</p>	<p><b>- BLDC Motor</b></p>   <p>Rotor Assy</p> <p>P/No: 4681ED1004A</p>
<p>There are two Sump Assemblies Energy consumption &amp; wash performance was improved Jan. 2007. (Refer to the SVC Bulletin No. IDSW20070074 )</p>	<p><b>15 March 2007~</b> -Core Press Oil improvement -Injection Method Optimization</p>

	Alphabetic Code	Numeral Code
* Interchangeability Code	<b>A</b> <b>Interchangeable</b> : Old and new parts can be used in products as the bulletin regardless of manufacturing date.	1 To improve performance
	<b>B</b> <b>Old parts can be substituted for new parts</b> : Old parts can be used in products regardless of manufacture date. New parts can be used in new products only.	2 To improve productivity
	<b>C</b> <b>New parts can be substituted for old parts</b> : Only new parts can be used in products regardless of manufacture date.	3 To improve reliability
	<b>D</b> <b>Not interchangeable</b> : New parts can be used in new products only.	4 Change of material or dimension
		5 Addition
		6 Deletion
		7 Correction

**Y. H. KIM**  
Y. H. KIM  
Dish Washer Engineering  
Design Department.

