CONFIDENTIAL

DISHWASHER
SERVICE MANUAL

NOTE

READ THIS MANUAL CAREFULLY BEFORE SERVICING THE PRODUCT. FOLLOW THE MANUAL'S INSTRUCTIONS WHEN SERVICING THE PRODUCT.

For Authorized Service Technicians

MODEL : LDPH7972*, LDTH7972*, SDWB24*3,
LDPM6762*, LDPS6762*, LDPH5554*, LDPH6762*
LDTH5554*

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1. Important Safety Notice

⚠ CAUTION

- DISCONNECT POWER SUPPLY LINE BEFORE SERVICING
- RECONNECT ALL GROUNDING DEVICES

IMPORTANT SAFETY NOTICE

This service information is intended for individuals possessing adequate backgrounds of electrical, electronic and mechanical experience.
Any attempt to repair this appliance may result in personal injury and property damage.
The manufacturer or seller cannot be responsible for the interpretation of this information, nor can it assume any liability in connection with its use.

2. Specifications

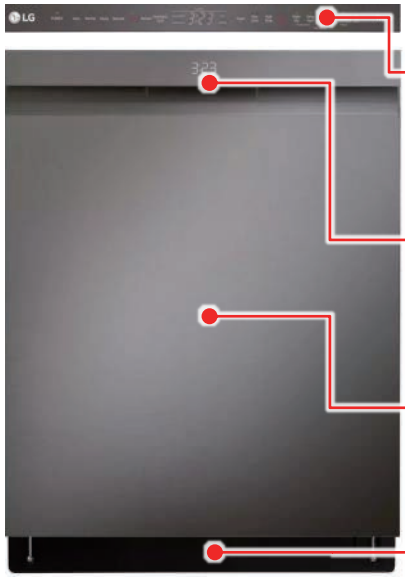
ITEM	SPECIFICATION
Rated Voltage / Frequency	AC 120V/60Hz
Installation	Built-In
Place Settings	15
Product Dimension (in.)	$23^{3}/_{4}$(W) x $33^{5}/_{8}$ x (H) x $24^{5}/_{8}$ (D)
Product Weight (lb.)	72-89 (LDPM6762*, LDPS6762*) 90-99 (LDPH7972*, LDTH7972*, SDWB24*3) 80-90 (LDPH5554*, LDTH5554*) 88 (LDPH6762*)
Door Color	Stainless Steel, Black(White) STS
Tub Material	Stainless Steel
Control Type	Touch Type
Rated Power(Watt)	1,380
Heater Power(Watt)	1,200
Programs	7 (Non Steam : 6)
Upper Rack Position	Adjustable
Lower Rack	Fold Down
Water Consumption(L)	9.2 ~ 29.2 (Steam) 9.2 ~ 22.8 (Non Steam)
Power Consumption (kWh/year)	238
Operating Time (min)	109 - 220 (Steam) 109 - 170 (Non Steam)
Heat Air Dry System	Yes (Steam) No (Non Steam)
Fan Dry System	Yes
Delay Start Function	Yes
Auto-Off Power Switch	Yes
Process Monitor	Yes
Rack Material	Nylon Coating
Operating Water Pressure (psi)	20 - 120 (140 - 830kPa)

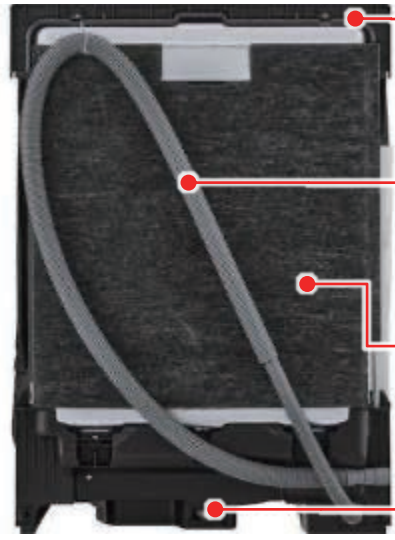
3. Product Overview

■ Exterior Parts

1. For Models : LDPH7972*, LDPM6762*, LDPS6762*, LDPH5554*, LDPH6762*

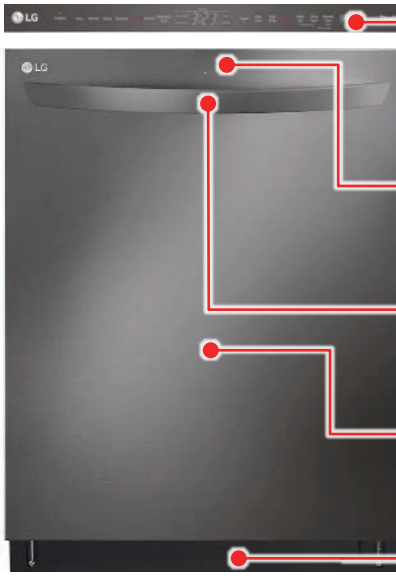
(Semi type)





2. For Models : LDTH7972*, LDTH5554*

(Fully type)

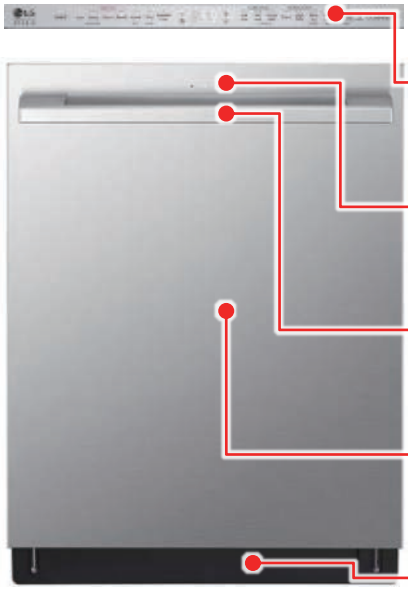


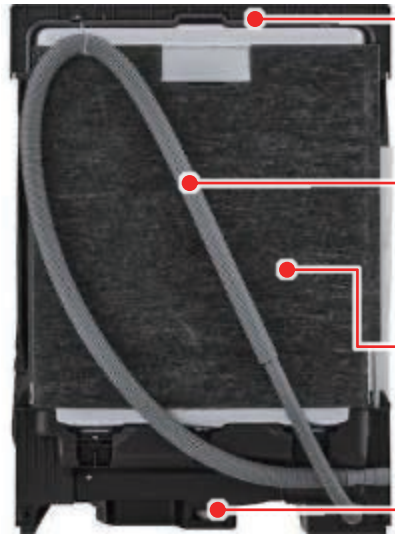


■ Exterior Parts

3. For Models : SDWB24*3

(Fully type)





■ Internal Parts (1)

(Some Model will vary)



■ Internal Parts (2)

(Some Model will vary)

Cutlery /Upper Rack Rail



Upper Rack Rail

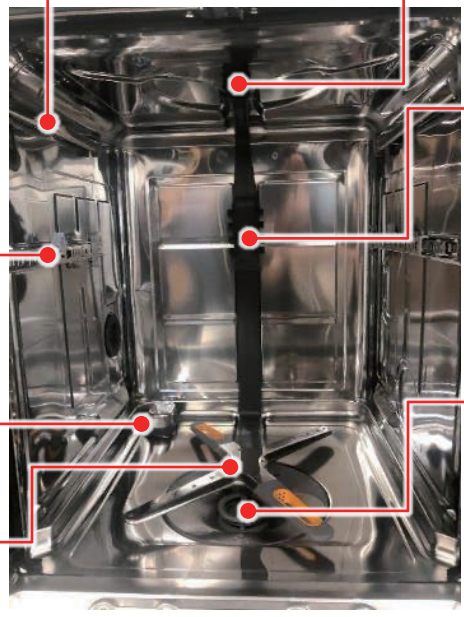


Heat Dry Blower



Lower Spray Arm

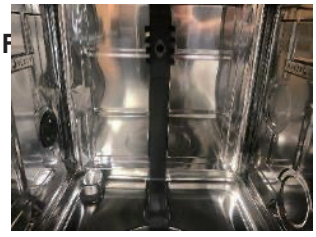




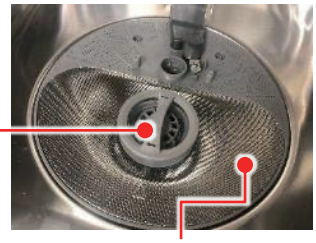
Top Wash Impeller



Water Guide



Filtration System



Inner Filter



Stainless Steel Filter



■ Accessory

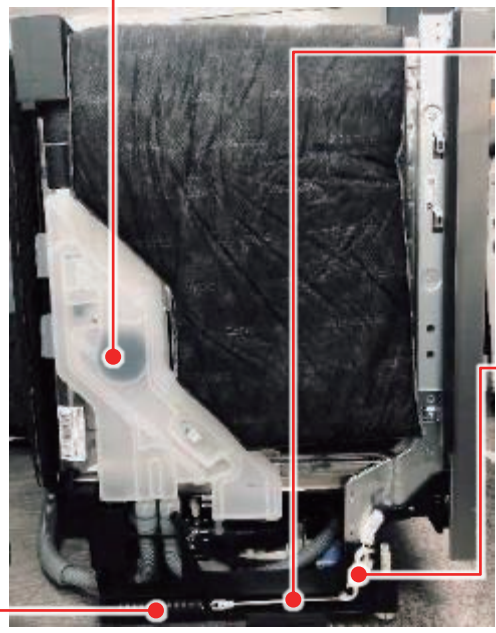


① Installation Brackets (2ea)
② Wood Screws (4ea)
③ Hose Clamp

■ Tub Assembly (Side)

Air Guide





Connector



Door Spring



Roller



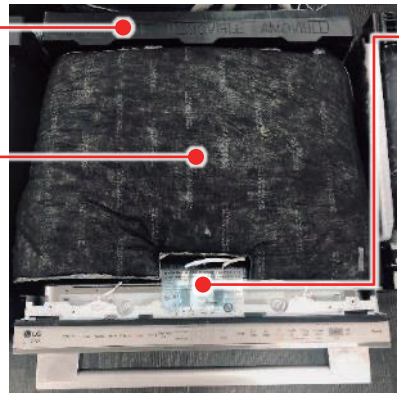
■ Tub Assembly (Top)

Shipping Brace

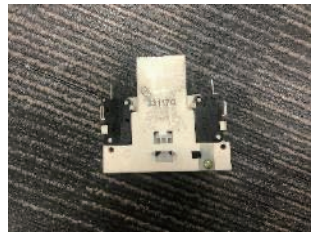


Main Felt





Door Latch



■ Base Assembly

(Some Model will vary)

Heat Dry Blower

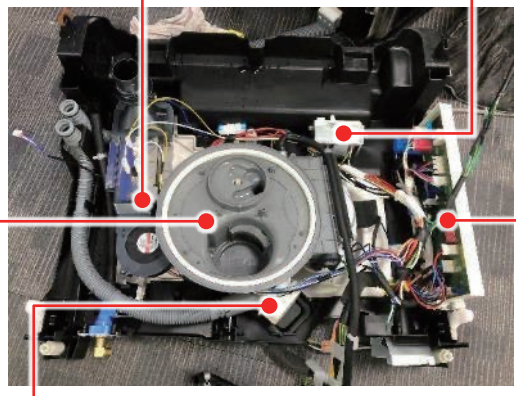


Sump



Drain Motor

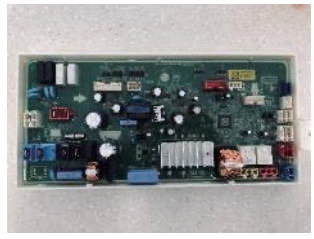




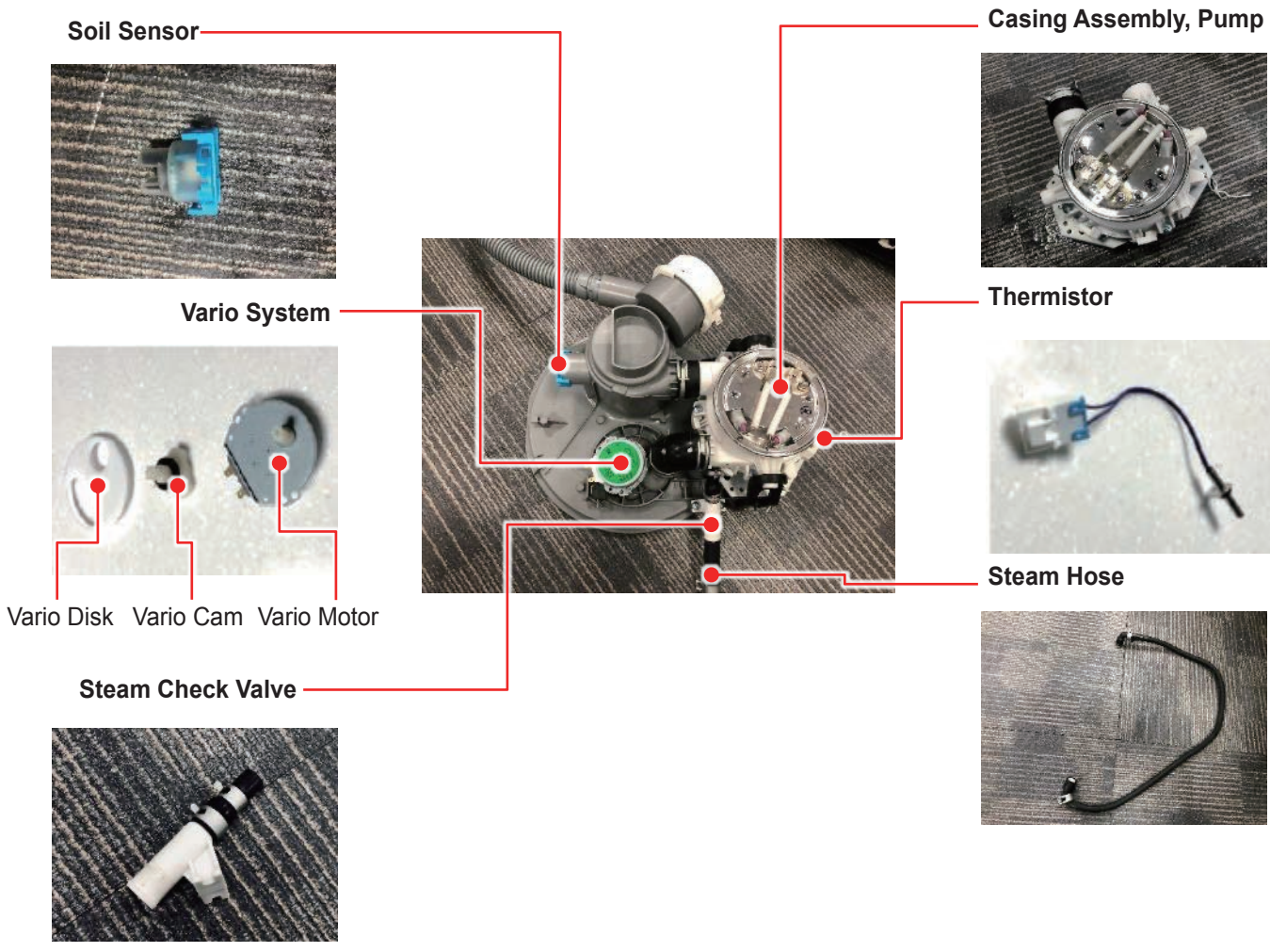
Noise Filter



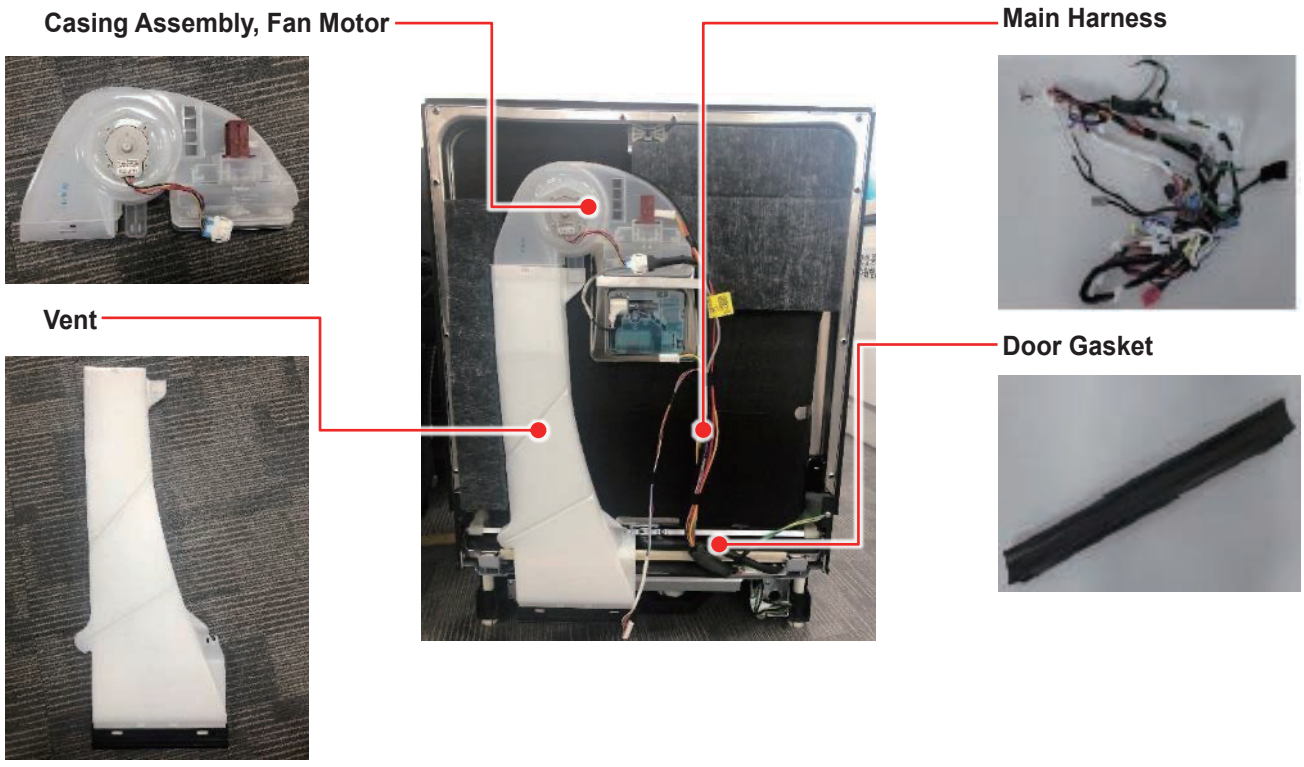
Main PCB



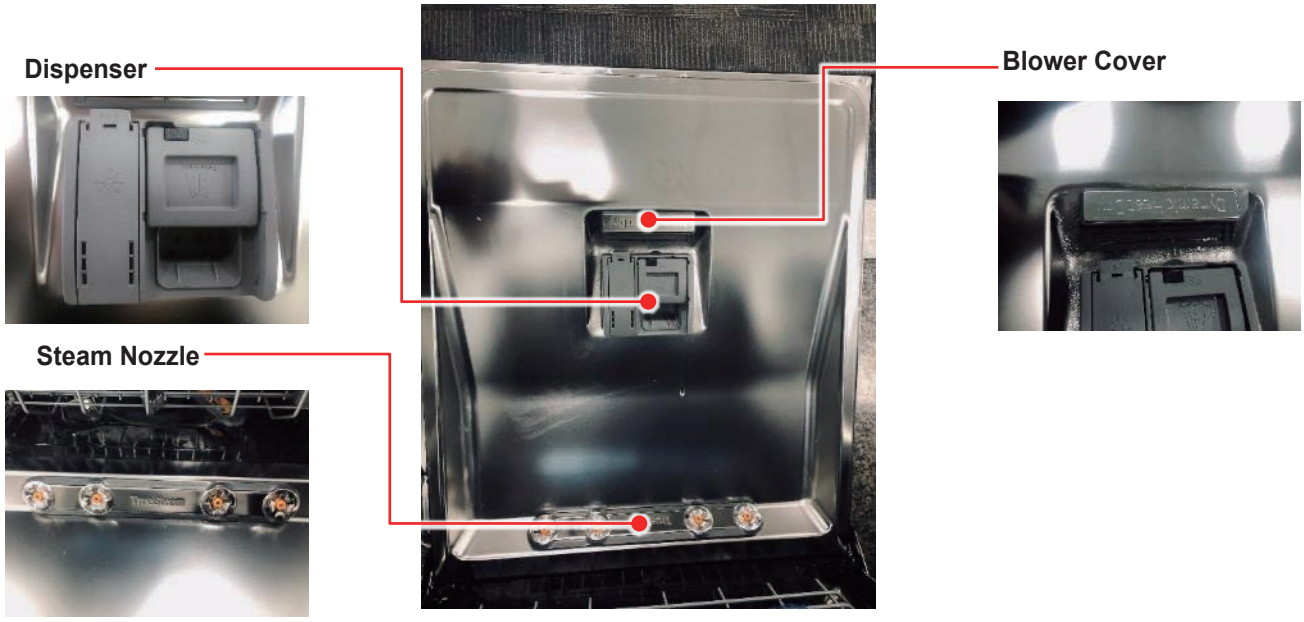
■ Sump Assembly



■ Doorliner Assembly (External)



■ Doorliner Assembly (internal)



4. Principle of Operation

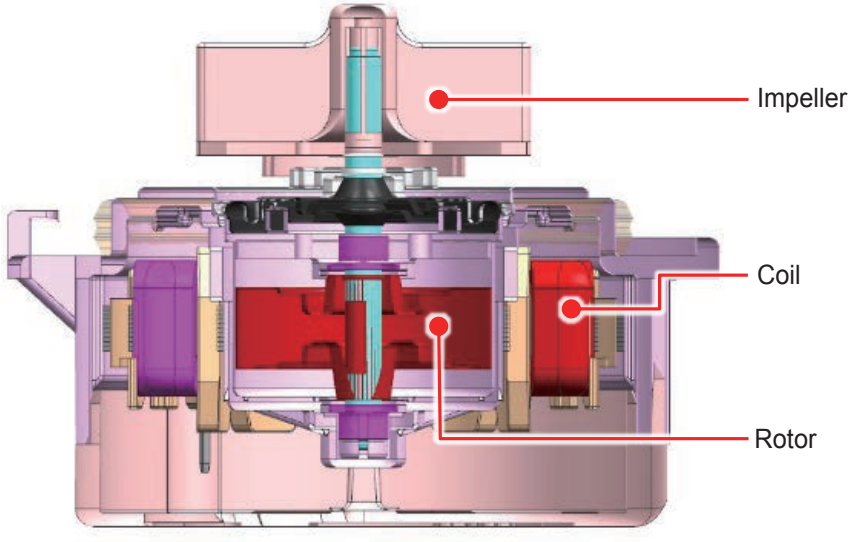
■ Major Components

1) Drain Motor



- Name: Drain Motor (Loc No.: M050)
- Function: Drain water to the outside
- Operating voltage: DC 310V
- Resistance: 4.6Ω (measured between each terminal)
- Symptoms of failure
  - OE : Not drain
  - Noise: The motor is stuck with the debris or damaged.

Operation and Structure

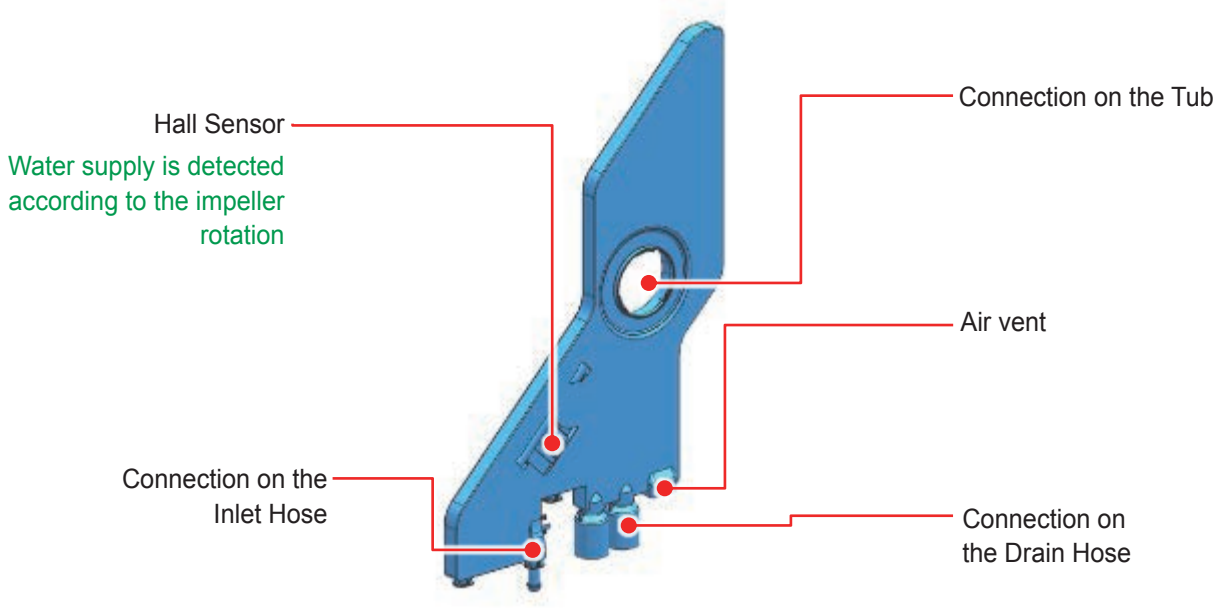


2) Air Guide



- Name: Air Guide (Loc No.: F040)
- Function: Detect the water supply
- Operating voltage: DC 5V
- Resistance: 9.8kΩ
- Symptoms of failure
  - IE : The Hall Sensor is defective so it can't detect the water supply.
  - AE : The leakage by wrong assembly

Operation and Structure

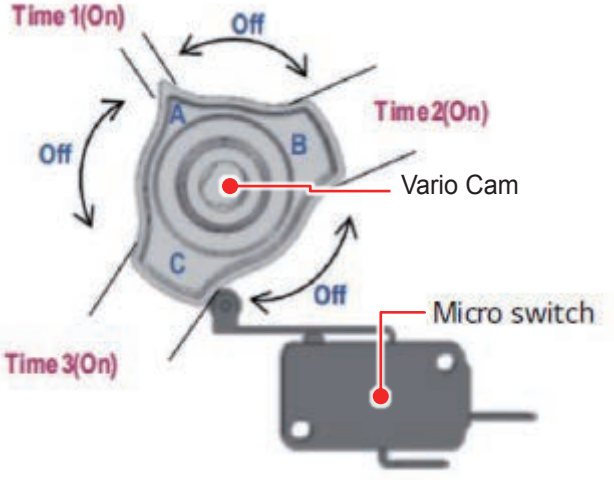


3) Vario Motor



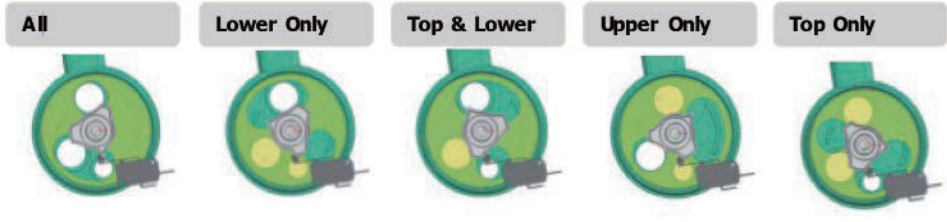
- Name: Vario Motor (Loc No.: M050)
- Function: Adjust the water injecting position (Top Wash Impeller, Upper Spray Arm, Lower Spray Arm)
- Operating voltage: AC 120V
- Resistance: 3.9kΩ (measured between each terminal)
- Symptoms of failure
  - nE : The Vario Motor is stuck with the debris.
    The Micro Switch is defective so it doesn't properly detect the rotation of the Vario Cam.

Operation and Structure

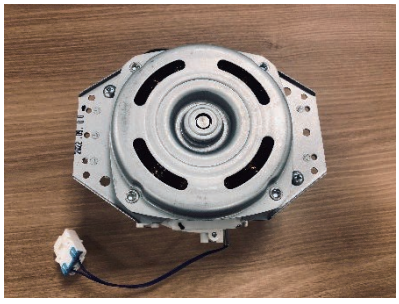


1. When the Vario Motor operates, the Vario Cam rotates and operates the micro switch.
2. The position of the water injection is determined according to the operating time of the micro switch.
3. As the Vario Disk rotates, Adjust the water injecting position

※ Check the Vario Motor when an nE error occurs. (See the Trouble Shooting page)

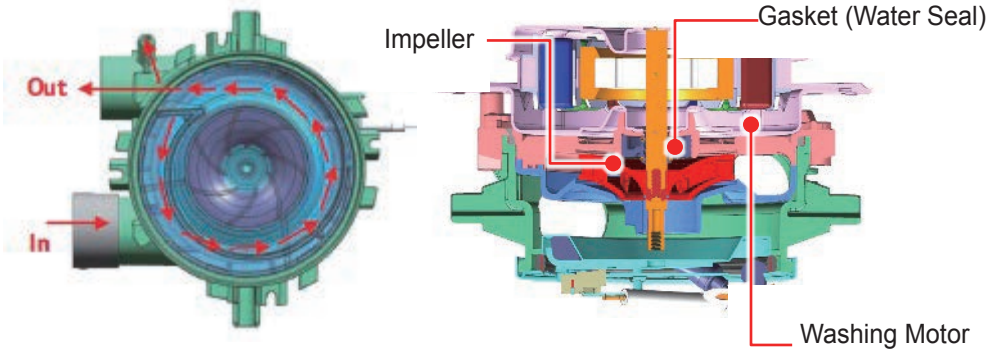


4) Casing Assembly, Pump (Washing Motor)

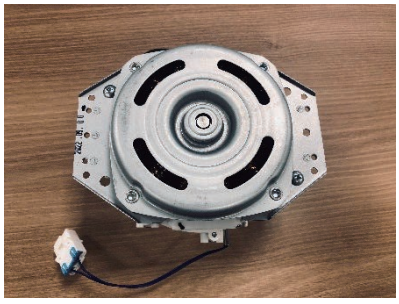


- Name: Casing Assembly, Pump (Loc No.: M030)
- Function: The Washing Motor rotate the impeller to pump the water to spray arms.
- Operating voltage: DC 310V
- Resistance: 23.7Ω (Measured between each terminal)
- Symptoms of failure
  - LE : The washing motor is not working.
  - Noise : The bearing/magnet of washing motor is damaged
    The impeller is stuck by debris.

Operation and Structure

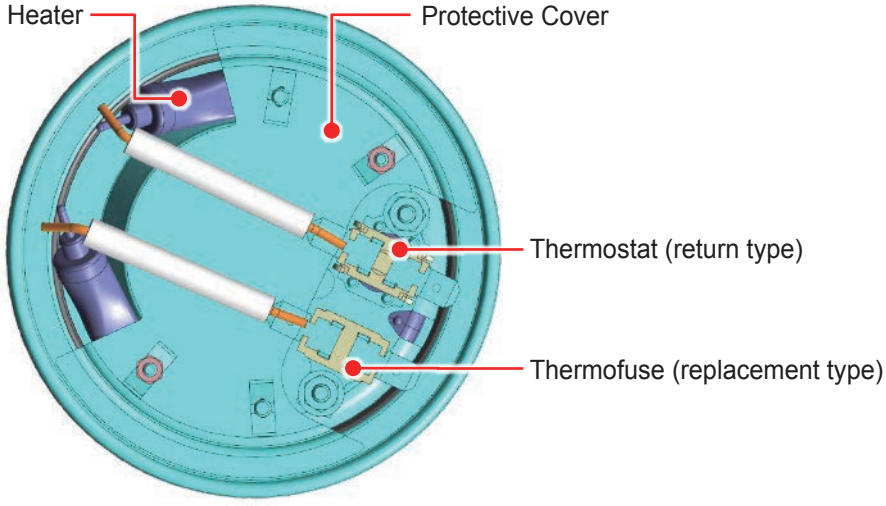


5) Heater (Include in Casing Assembly, Pump)



- Name: Heater (Include in Casing Assembly, Pump)
- Function: Heat the water.
- Operating voltage: AC 120V, 1200W
- Resistance: 11.54Ω (Measured between each terminal)
- Symptoms of failure
  - HE : The heater is defective so it doesn't heat the water properly or overheats.

Operation and Structure



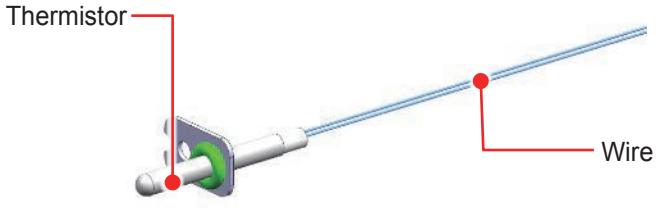
If the heater is overheated, thermostat and thermofuse work to prevent overheating.

6) Thermistor



- Name: Thermistor (Loc No. : M137)
- Function: Measure the water temperature inside the pump
- Operating voltage: DC 5V
- Resistance: 10kΩ (measured in 77°F at room temperature)
- Symptoms of failure
  - tE : Thermistor is mis-sensing the temperature of the water.

Operation and Structure



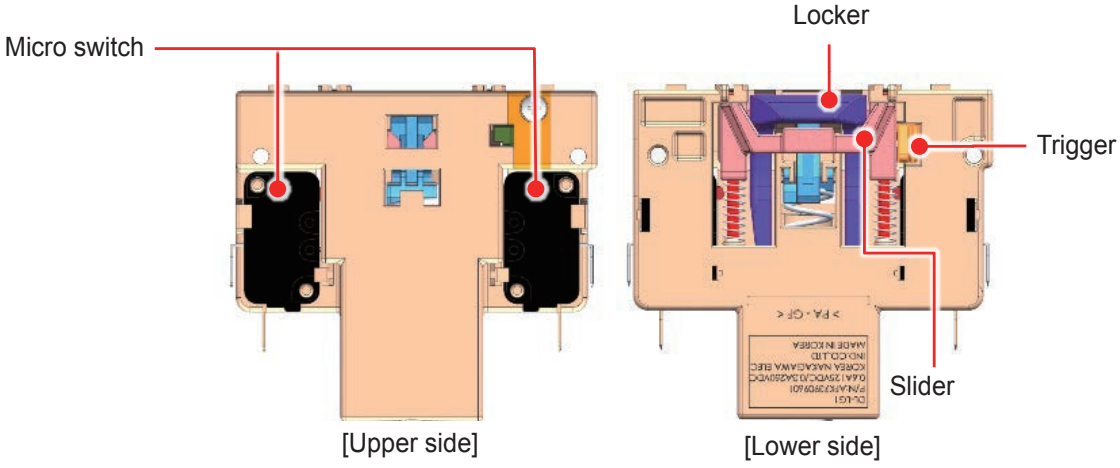
Thermistors measure temperature by using the property that their resistance changes with temperature.

7) Door Latch



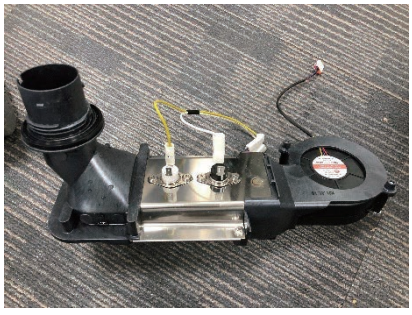
- Name: Door Latch (Loc No. : F171)
- Function: The Micro Switch detects the door's closing or not
- Symptoms of failure
  - No power /Not working
    - → The latch doesn't recognize the door closing and the product stops operating and powers off.
    - → The door doesn't close properly.

Operation and Structure



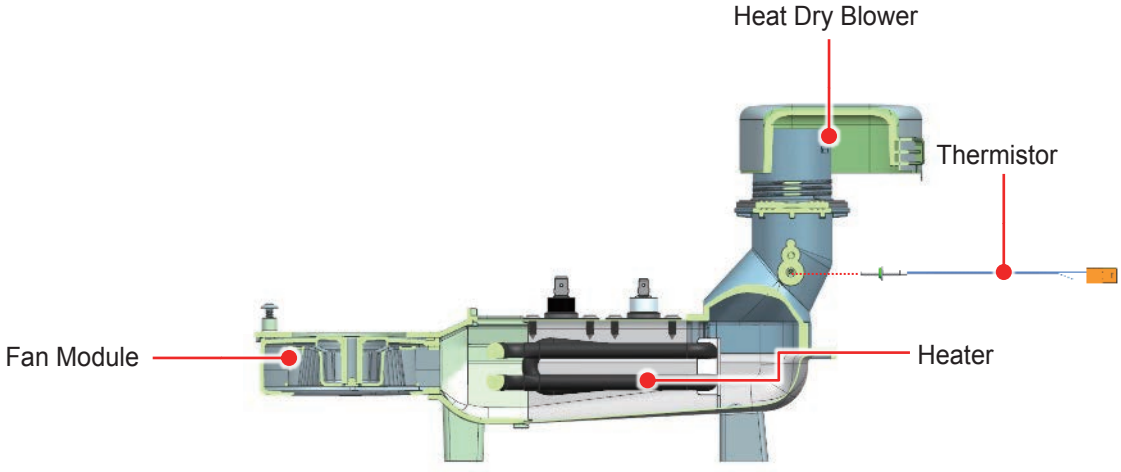
When the door is closed, the slide operates and the two micro switches detect the door is closed.

8) Heat Dry Blower (Fan module & Heater)



- Name: Heat Dry Blower (Loc No. : M280)
- Function: Spray hot air into the Tub.
- Operating voltage : Fan module (DC 12V), Heater (AC 120V)
- Symptoms of failure
  - F31 : The Fan Module is not working
  - F35 : The thermistor of heat dry module is not working

Operation and Structure
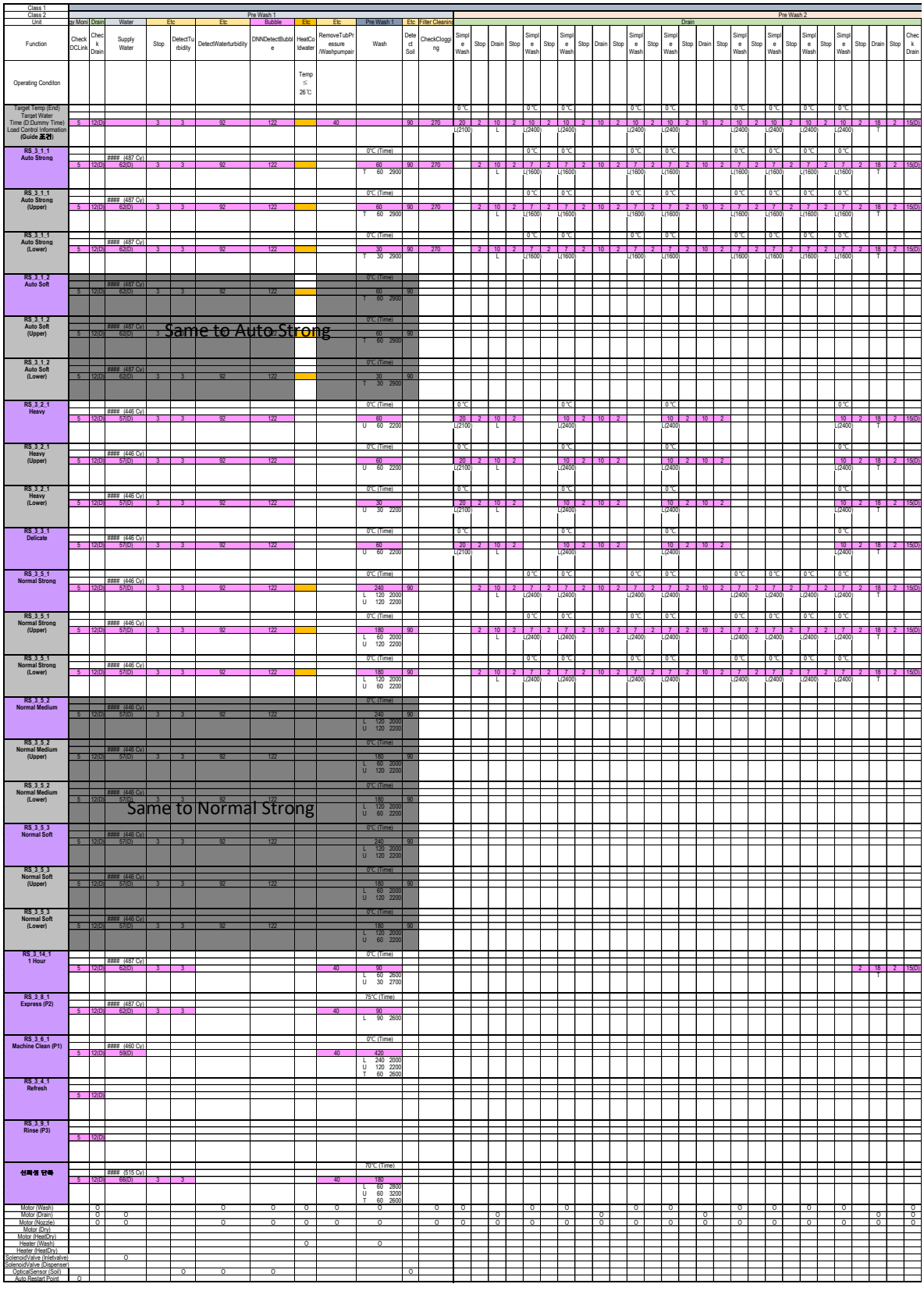


After washing, The Heater and Fan Module operate to blow hot air inside the Tub through the Heat Dry Blower.

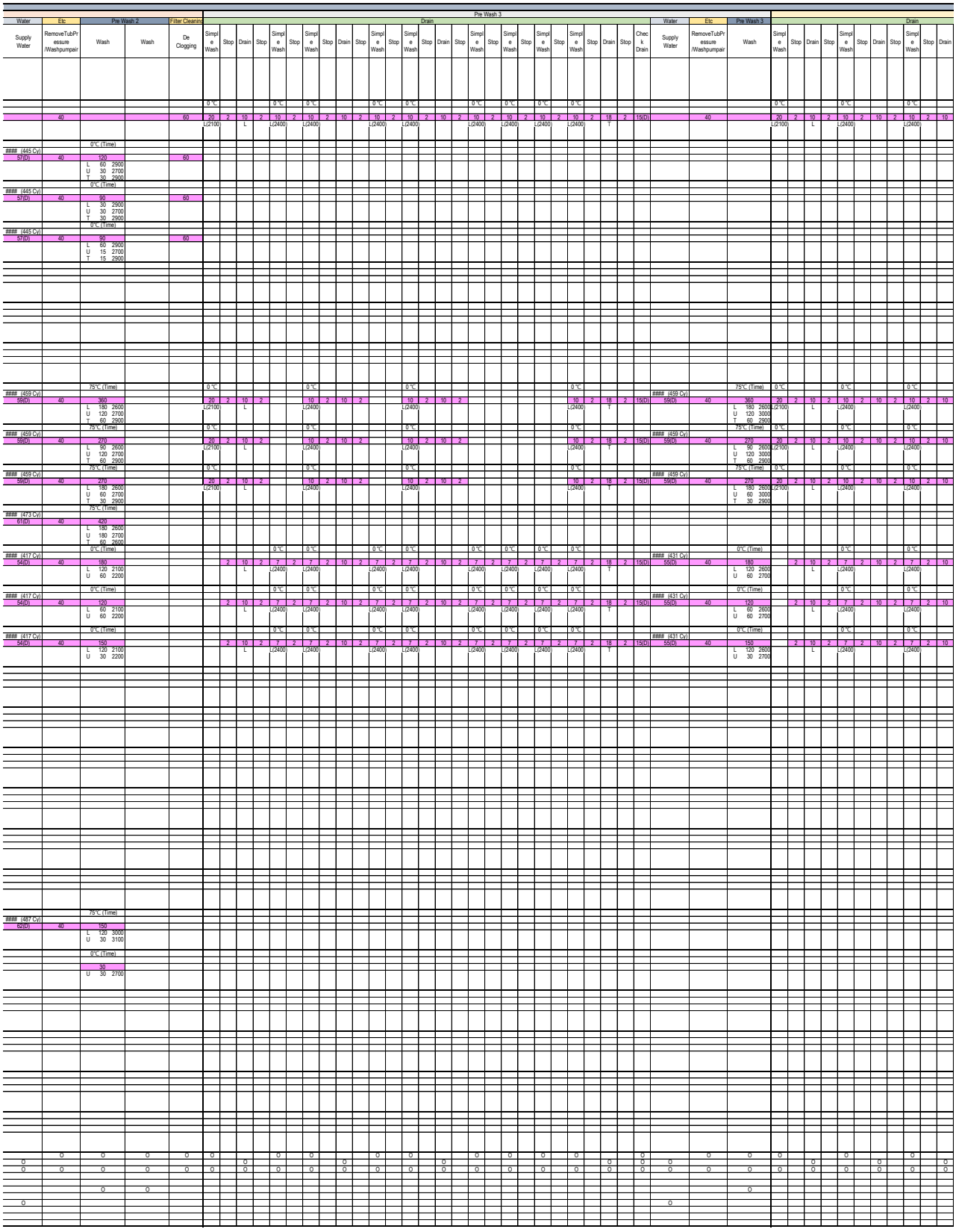
■ Washing Process

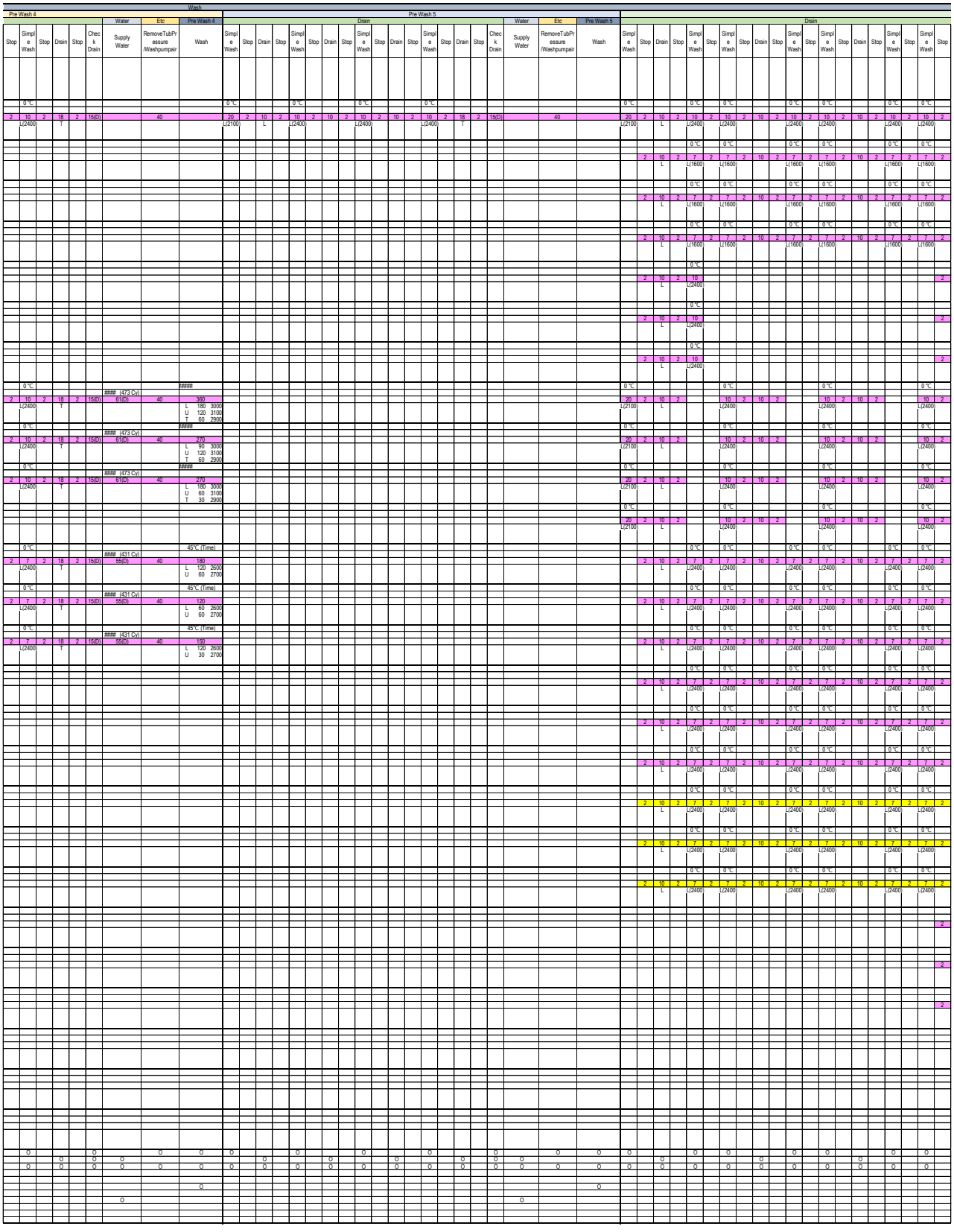
Cycle	Details Process
Pre Wash	Remove the large food particles before entering the Main Wash. Drain → Water Supply → Wash
Main Wash	Add detergent and clean the dishes. Drain → Steam → Water Supply → Add Detergent → Wash
Rinse	Rinse off any detergent and food debris from the dishes. Drain → Water Supply → Rinse
Heating Rinse	Reduce the water marks on dishes and maximizes drying performance by insert the rinse aid. Drain → Water Supply → Rinse → Steam The process of sterilizing with hot steam.
Dry	Dry the dishes through fan dry method and hot air dry. Drain → Dry → Drain Fan Dry Method + Hot air dry

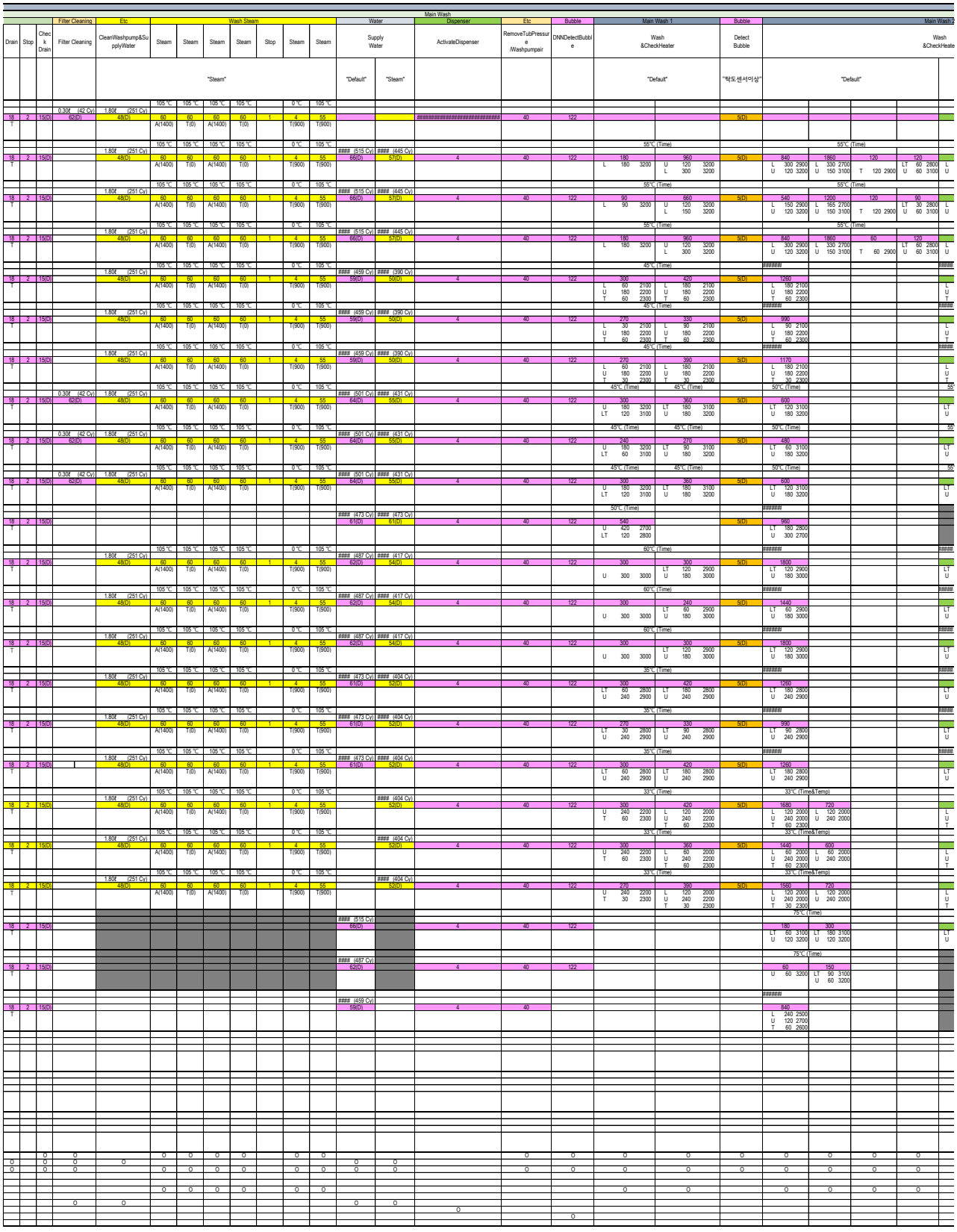
5. Program Charts

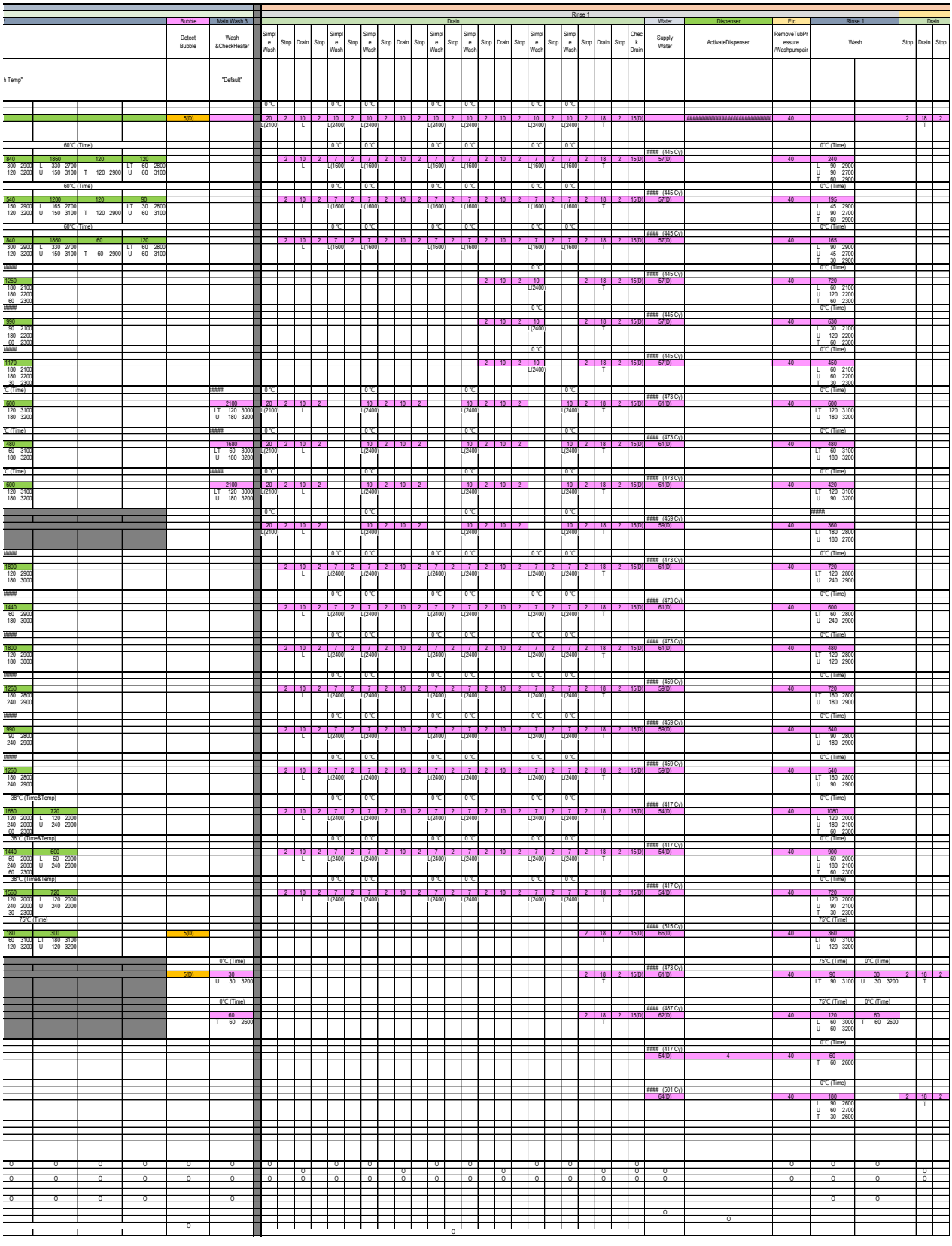
■ Program Charts



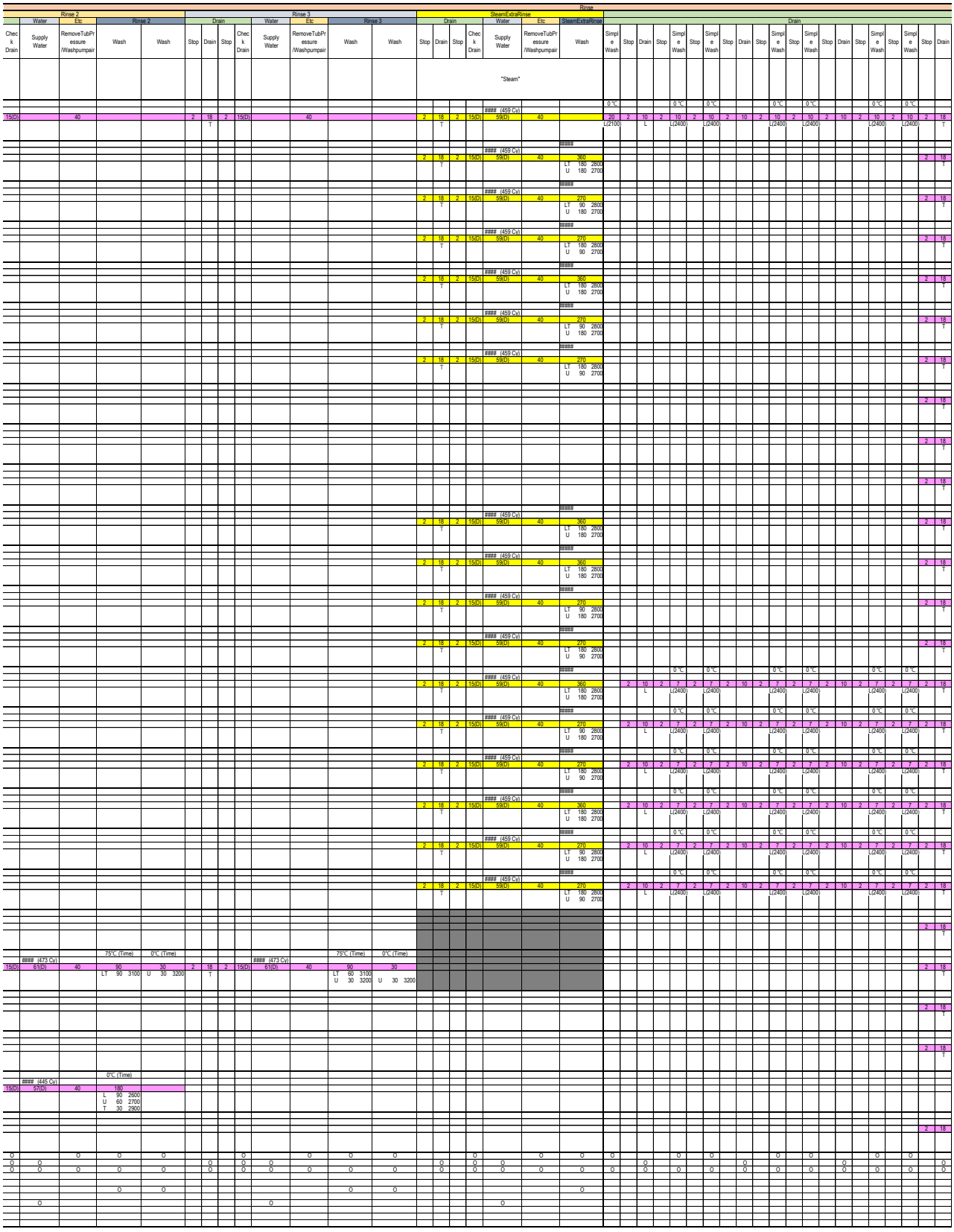




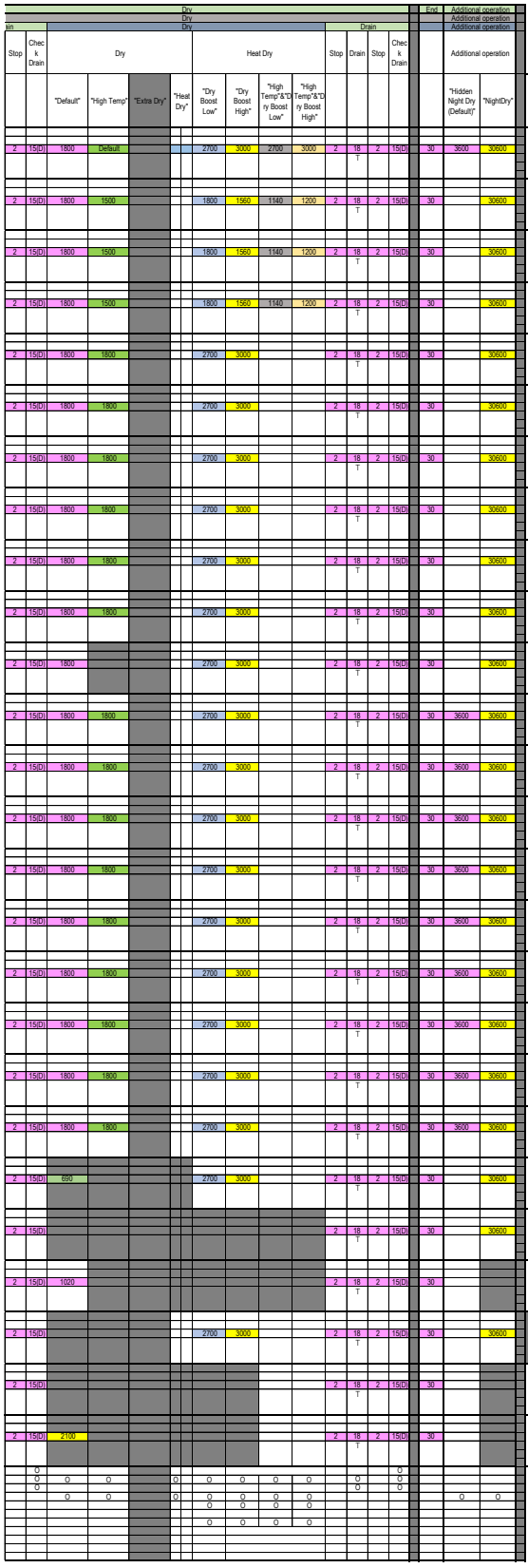




Program Charts



		Water	Etc	Etc	Heating Rinse 1	Heating Rinse 2	Heating Rinse 3				Heating Rinse 4	Dry Steam																Etc	Dr	
Stop	Check Drain	Supply Water	RemoveTubPressure /Washpumpair	Verify Heater	Wash	Wash	Wash&AddRinse&DuctPreheat				Wash	Stop	Drain	Stop	Check Drain	CleanWashpump&SupplyWater	Steam	Steam	Steam	Steam	Stop	Steam	Stop	Drain	Stop	Check Drain	SteamDuctPreheat	Reminder Count	Stop	Drain
				Not Reached Main Temp			"Default" or "Dry Boost Low"	"High Temp."	"Dry Boost High"	"High Temp." & "Dry Boost High" or "high Temp" & "Dry Boost Low"		"Steam"																		
2	15(D)		40	125			70 ℃	75 ℃	75 ℃	75 ℃		2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (515 Cy) 66(D)	40	125	65℃ (Time) 420 L 90 3200 U 90 3200 T 30 2900		70℃ (Temp) 660 L 210 3200 U 90 3200 T 30 2900	75℃ (Temp) 960 L 210 3200 U 90 3200 T 30 2900	75℃ (Temp) 960 L 210 3200 U 90 3200 T 30 2900	77℃ (Time&Temp) 1320 L 210 3200 U 90 3200 T 30 2900	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (515 Cy) 66(D)	40	125	65℃ (Time) 420 L 90 3200 U 90 3200 T 30 2900		70℃ (Temp) 660 L 210 3200 U 90 3200 T 30 2900	75℃ (Temp) 960 L 210 3200 U 90 3200 T 30 2900	75℃ (Temp) 960 L 210 3200 U 90 3200 T 30 2900	77℃ (Time&Temp) 1320 L 210 3200 U 90 3200 T 30 2900	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (515 Cy) 66(D)	40	125	65℃ (Time) 420 L 90 3200 U 90 3200 T 30 2900		70℃ (Temp) 660 L 210 3200 U 90 3200 T 30 2900	75℃ (Temp) 960 L 210 3200 U 90 3200 T 30 2900	75℃ (Temp) 960 L 210 3200 U 90 3200 T 30 2900	77℃ (Time&Temp) 1320 L 210 3200 U 90 3200 T 30 2900	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (445 Cy) 57(D)	40	125			70℃ (Temp) 1200 L 60 2100 U 120 2200 T 60 2300	75℃ (Temp) 1500 L 60 2100 U 120 2200 T 60 2300	75℃ (Temp) 1500 L 60 2100 U 120 2200 T 60 2300	75℃ (Temp) 1500 L 60 2100 U 120 2200 T 60 2300	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (445 Cy) 57(D)	40	125			70℃ (Temp) 1200 L 60 2100 U 120 2200 T 60 2300	75℃ (Temp) 1500 L 60 2100 U 120 2200 T 60 2300	75℃ (Temp) 1500 L 60 2100 U 120 2200 T 60 2300	75℃ (Temp) 1500 L 60 2100 U 120 2200 T 60 2300	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (445 Cy) 57(D)	40	125			70℃ (Temp) 1200 L 60 2100 U 120 2200 T 60 2300	75℃ (Temp) 1500 L 60 2100 U 120 2200 T 60 2300	75℃ (Temp) 1500 L 60 2100 U 120 2200 T 60 2300	75℃ (Temp) 1500 L 60 2100 U 120 2200 T 60 2300	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (473 Cy) 61(D)	40	125			70℃ (Temp) 1170 LT 120 3000 U 180 3200	72℃ (Temp) 1290 LT 120 3000 U 180 3200	72℃ (Temp) 1290 LT 120 3000 U 180 3200	72℃ (Temp) 1290 LT 120 3000 U 180 3200	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 650 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (473 Cy) 61(D)	40	125			70℃ (Temp) 1170 LT 120 3000 U 180 3200	72℃ (Temp) 1290 LT 120 3000 U 180 3200	72℃ (Temp) 1290 LT 120 3000 U 180 3200	72℃ (Temp) 1290 LT 120 3000 U 180 3200	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 650 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (473 Cy) 61(D)	40	125			70℃ (Temp) 1170 LT 120 3000 U 180 3200	72℃ (Temp) 1290 LT 120 3000 U 180 3200	72℃ (Temp) 1290 LT 120 3000 U 180 3200	72℃ (Temp) 1290 LT 120 3000 U 180 3200	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 650 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (459 Cy) 59(D)	40	125			70℃ (Temp) 1080 LT 120 2800 U 150 2700		70℃ (Temp) 1080 LT 120 2800 U 150 2700		0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (487 Cy) 62(D)	40	125			70℃ (Temp) 1080 LT 120 2900 U 240 3000	75℃ (Temp) 1380 LT 120 2900 U 240 3000	75℃ (Temp) 1380 LT 120 2900 U 240 3000	75℃ (Temp) 1380 LT 120 2900 U 240 3000	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (487 Cy) 62(D)	40	125			70℃ (Temp) 1080 LT 120 2900 U 240 3000	75℃ (Temp) 1380 LT 120 2900 U 240 3000	75℃ (Temp) 1380 LT 120 2900 U 240 3000	75℃ (Temp) 1380 LT 120 2900 U 240 3000	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (487 Cy) 62(D)	40	125			70℃ (Temp) 1080 LT 120 2900 U 240 3000	75℃ (Temp) 1380 LT 120 2900 U 240 3000	75℃ (Temp) 1380 LT 120 2900 U 240 3000	75℃ (Temp) 1380 LT 120 2900 U 240 3000	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (459 Cy) 59(D)	40	125			70℃ (Temp) 1080 LT 120 2800 U 240 2900	75℃ (Temp) 1380 LT 120 2800 U 240 2900	75℃ (Temp) 1380 LT 120 2800 U 240 2900	75℃ (Temp) 1380 LT 120 2800 U 240 2900	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (459 Cy) 59(D)	40	125			70℃ (Temp) 1080 LT 120 2800 U 240 2900	75℃ (Temp) 1380 LT 120 2800 U 240 2900	75℃ (Temp) 1380 LT 120 2800 U 240 2900	75℃ (Temp) 1380 LT 120 2800 U 240 2900	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (459 Cy) 59(D)	40	125			70℃ (Temp) 1080 LT 120 2800 U 240 2900	75℃ (Temp) 1380 LT 120 2800 U 240 2900	75℃ (Temp) 1380 LT 120 2800 U 240 2900	75℃ (Temp) 1380 LT 120 2800 U 240 2900	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (417 Cy) 54(D)	40	125			65℃ (Temp) 720 L 60 2000 U 240 2100 T 60 2300	75℃ (Temp) 1320 L 60 2000 U 240 2100 T 60 2300	75℃ (Temp) 1320 L 60 2000 U 240 2100 T 60 2300	75℃ (Temp) 1320 L 60 2000 U 240 2100 T 60 2300	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (417 Cy) 54(D)	40	125			65℃ (Temp) 720 L 60 2000 U 240 2100 T 60 2300	75℃ (Temp) 1320 L 60 2000 U 240 2100 T 60 2300	75℃ (Temp) 1320 L 60 2000 U 240 2100 T 60 2300	75℃ (Temp) 1320 L 60 2000 U 240 2100 T 60 2300	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (417 Cy) 54(D)	40	125			65℃ (Temp) 720 L 60 2000 U 240 2100 T 60 2300	75℃ (Temp) 1320 L 60 2000 U 240 2100 T 60 2300	75℃ (Temp) 1320 L 60 2000 U 240 2100 T 60 2300	75℃ (Temp) 1320 L 60 2000 U 240 2100 T 60 2300	0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 590 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
2	15(D)	#### (515 Cy) 66(D)	40				70℃ (Temp) 870 LT 60 3100 U 180 3200	75℃ (Temp) 1170 LT 60 3100 U 180 3200	75℃ (Temp) 1170 LT 60 3100 U 180 3200	75℃ (Temp) 1170 LT 60 3100 U 180 3200	0℃ (Time) 30 T 30 2900																		2	18 T
2	15(D)	#### (473 Cy) 61(D)	40				##### 360 LT 60 3100 U 120 3200				0℃ (Time) 30 T 30 2900																		2	18 T
2	15(D)	#### (417 Cy) 54(D)	40	125			70℃ (Temp) 1260 L 240 2000 U 120 2200 T 60 2600				0℃ (Time) 60 T 60 2900																		2	18 T
2	15(D)	#### (445 Cy) 57(D)	40				49℃ (Temp) 480 L 60 2600 U 60 2700		49℃ (Temp) 480 L 60 2600 U 60 2700		0℃ (Time) 60 T 60 2900	2	18 T	2	15(D)	1.80ℓ (251 Cy) 48(D)	105 ℃ 60 A(1400)	105 ℃ 60 T(0)	105 ℃ 60 A(1400)	105 ℃ 890 T(0)	10	0 ℃ 60 T(900)	2	18 T	2	15(D)	1200		2	18 T
																													2	18 T
2	15(D)	#### (515 Cy) 66(D)	40			65℃ (Time) 1080 L 120 2000 U 120 2100 T 120 2300	75℃ (Temp) 1080 L 120 3200 U 120 3200 T 120 3200				0℃ (Time) 60 T 60 2900																		2	18 T
	O		O	O	O	O	O	O	O	O	O						O	O	O	O		O								
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물 사용량	물 사용량	표기 시간	"Default"	"High Temp"	"Extra Dry"	"Steam"	"High Temp" & "Extra Dry"	"High Temp" & "Steam"	"Extra Dry" & "Steam"	"High Temp" & "Extra Dry" & "Steam"	"Heat Dry Low"	"High Temp" & "Heat Dry Low"
Non Steam	Steam											
17.30ℓ	23.70ℓ	Sec Min	9201 2:34	9201 2:34		12198 3:24		12198 3:24			9201 2:34	9201 2:34
17.30ℓ	23.70ℓ	Sec Min	7746 2:10	7746 2:10		10653 2:58		10653 2:58			7746 2:10	7746 2:10
17.30ℓ	23.70ℓ	Sec Min	9006 2:31	9006 2:31		11913 3:19		11913 3:19			9006 2:31	9006 2:31
13.20ℓ	19.60ℓ	Sec Min	6861 1:55	7161 2:00		9858 2:45		10158 2:50			7761 2:10	8061 2:15
13.20ℓ	19.60ℓ	Sec Min	6381 1:47	6681 1:52		9288 2:35		9588 2:40			7281 2:02	7581 2:07
13.20ℓ	19.60ℓ	Sec Min	6411 1:47	6711 1:52		9318 2:36		9618 2:41			7311 2:02	7611 2:07
23.90ℓ	27.00ℓ	Sec Min	9973 2:47	10093 2:49		12534 3:29		12654 3:31			10873 3:02	10993 3:04
23.90ℓ	27.00ℓ	Sec Min	8893 2:29	9013 2:31		11454 3:11		11574 3:13			9793 2:44	9913 2:46
23.90ℓ	27.00ℓ	Sec Min	9493 2:39	9613 2:41		12054 3:21		12174 3:23			10393 2:54	10513 2:56
16.60ℓ	21.70ℓ	Sec Min	6598 1:50			9256 2:35					7498 2:05	
22.80ℓ	29.20ℓ	Sec Min	8694 2:25	8994 2:30		11692 3:15		11992 3:20			9594 2:40	9894 2:45
22.80ℓ	29.20ℓ	Sec Min	7914 2:12	8214 2:17		10822 3:01		11122 3:06			8814 2:27	9114 2:32
22.80ℓ	29.20ℓ	Sec Min	8304 2:19	8604 2:24		11212 3:07		11512 3:12			9204 2:34	9504 2:39
13.20ℓ	19.60ℓ	Sec Min	7144 2:00	7444 2:05		10141 2:50		10441 2:55			8044 2:15	8344 2:20
13.20ℓ	19.60ℓ	Sec Min	6514 1:49	6814 1:54		9421 2:38		9721 2:43			7414 2:04	7714 2:09
13.20ℓ	19.60ℓ	Sec Min	6904 1:56	7204 2:01		9811 2:44		10111 2:49			7804 2:11	8104 2:16
9.20ℓ	18.80ℓ	Sec Min	8086 2:15	8686 2:25		11271 3:08		11871 3:18			8986 2:30	9586 2:40
9.20ℓ	18.80ℓ	Sec Min	7426 2:04	8026 2:14		10521 2:56		11121 3:06			8326 2:19	8926 2:29
9.20ℓ	18.80ℓ	Sec Min	7486 2:05	8086 2:15		10581 2:57		11181 3:07			8386 2:20	8986 2:30
18.10ℓ		Sec Min	3563 1:00	3863 1:05							5573 1:33	5873 1:38
20.60ℓ		Sec Min	2126 0:36									
13.10ℓ		Sec Min	4440 1:14									
	8.00ℓ	Sec Min				3385 0:57						
6.80ℓ		Sec Min	689 0:12									
7.40ℓ		Sec Min	4846 1:21									

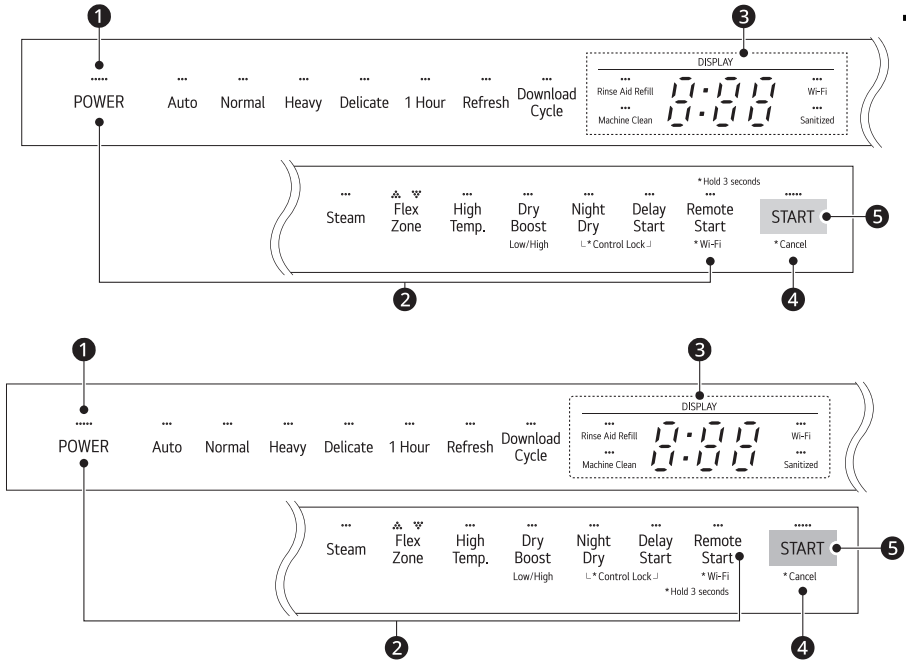
Program Charts

"Steam" & "Heat Dry Low"	"High Temp" & "Steam" & "Heat Dry Low"	"Heat Dry High"	"High Temp" & "Heat Dry High"	"Steam" & "Heat Dry High"	"High Temp" & "Steam" & "Heat Dry High"
12198 3:24	12198 3:24	9261 2:35	9261 2:35	12258 3:25	12258 3:25
10653 2:58	10653 2:58	7806 2:11	7806 2:11	10713 2:59	10713 2:59
11913 3:19	11913 3:19	9066 2:32	9066 2:32	11973 3:20	11973 3:20
10758 3:00	11058 3:05	8361 2:20	8361 2:20	11358 3:10	11358 3:10
10188 2:50	10488 2:55	7881 2:12	7881 2:12	10788 3:00	10788 3:00
10218 2:51	10518 2:56	7911 2:12	7911 2:12	10818 3:01	10818 3:01
13434 3:44	13554 3:46	11293 3:09	11293 3:09	13854 3:51	13854 3:51
12354 3:26	12474 3:28	10213 2:51	10213 2:51	12774 3:33	12774 3:33
12954 3:36	13074 3:38	10813 3:01	10813 3:01	13374 3:43	13374 3:43
10156 2:50		7798 2:10		10456 2:55	
12592 3:30	12892 3:35	10194 2:50	10194 2:50	13192 3:40	13192 3:40
11722 3:16	12022 3:21	9414 2:37	9414 2:37	12322 3:26	12322 3:26
12112 3:22	12412 3:27	9804 2:44	9804 2:44	12712 3:32	12712 3:32
11041 3:05	11341 3:10	8644 2:25	8644 2:25	11641 3:15	11641 3:15
10321 2:53	10621 2:58	8014 2:14	8014 2:14	10921 3:03	10921 3:03
10711 2:59	11011 3:04	8404 2:21	8404 2:21	11311 3:09	11311 3:09
12171 3:23	12771 3:33	9886 2:45	9886 2:45	13071 3:38	13071 3:38
11421 3:11	12021 3:21	9226 2:34	9226 2:34	12321 3:26	12321 3:26
11481 3:12	12081 3:22	9286 2:35	9286 2:35	12381 3:27	12381 3:27
		6173 1:43	6173 1:43		
6085 1:42				6385 1:47	

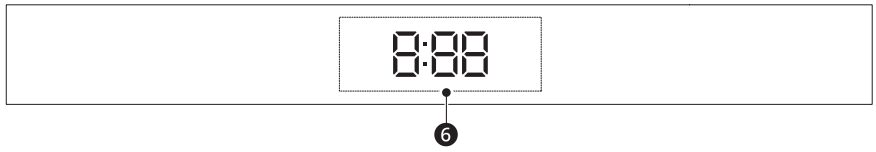


■ Control Panel

Top view



Front view



❶ Power On/Off Button

- Press this button to turn the washer on or off.
- After the cycle is complete, the power automatically turns off for purposes of safety and economy.
- If there is a power surge, power outage, or disruption of any kind, power is automatically turned off for safety.
- When power is connected again, the dishwasher will turn on automatically and resume the cycle.

❷ Option Setting Mode

- You can set various options by using the **Option Setting Mode**.
- While a appliance is off, press **Power** and **Remote Start** simultaneously to enter the **Option Setting Mode**.
- Refer to the **Using a Option Setting Mode** topic for each function of the **Option Setting Mode**.

❸ Display

- **Rinse Aid Refill**
  - This LED illuminates when the rinse aid level is low. The LED automatically shuts off when the rinse aid is refilled or the level is set to 0.
  - To adjust the rinse aid level, refer to the **Using the Option Setting Mode** topic.

- **Machine Clean**
  - The **Machine Clean** LED flashes every 30 cycles. To activate or deactivate the LED, refer to the **Using the Option Setting Mode** topic.
- 8:88 : **Digital Display**
  - The digital display on the control panel shows the ESTIMATED cycle time. When the cycle and options are selected, the display shows the total estimated time to complete those selections. During operation, the display shows the remaining estimated operating time.

NOTE

- The estimated time shown on the display does not include delay times for heating water, etc.
- If **Delay Start** is selected, the display shows the delay time in hours.
- Cycle time may vary depending on the soil level of your load.

- CL : **Control Lock**
  - The **Control Lock** feature helps prevent settings from being changed during a cycle. Selecting this feature locks all of the buttons, except for the **Power** button, on the control panel. This feature does not lock the door.
  - While a cycle is running, press and hold **Night Dry** and **Delay Start** simultaneously for three seconds to activate or deactivate **Control Lock**.
  - To start a new cycle, deactivate **Control Lock**.
- **Sanitized**
  - If the **Steam** option is added to a cycle, the Sanitized indicator stays lit at the end of the cycle if the dishes were properly sanitized (except the **Refresh** cycle).
- **Wi-Fi**
  - When the appliance is connected to the internet through a home Wi-Fi network, this LED illuminates.
  - Press and hold **Remote Start** for approximately three seconds to connect to the network.

❹ **Cancel Button**

- The drain pump activates and the cycle cancels. Once the dishwasher finishes draining, the power turns off.
- Press and hold **Start** for three seconds to activate.

❺ **Start Button**

- To operate the machine, either press **Start** and close the door within four seconds or close the door and press **Start**.
- An alert will sound when the door is not closed within 4 seconds after you press **Start**.

❻ **Front Time Indicator**

- This feature is only available on some models.
- The front time indicator feature shows the remaining cycle time while the cycle is running.

Wash Cycles

Select your desired cycle.

Auto

This cycle senses the soil amount and soil toughness and is optimized to achieve the best cleaning.

Normal

This cycle is for daily, regular, or typical use to completely wash a full load of normally soiled dishes. The **Dry Boost Low** option is recommended for optimal energy efficiency. Select the **Night Dry** option if leaving dishes overnight.

- After the cycle ends, the fan runs for an hour to help vent the warm, moist air in the tub. You can

stop the fan by opening the door after the cycle ends.

Heavy

This cycle is for heavily soiled dishes and dishes with hardened on soil. This cycle defaults to the strongest spray intensity and uses it to wash heavily soiled dishes.

Delicate

Use this cycle to clean delicate items such as fine china and stemware.

1 Hour

This cycle will clean and dry lightly soiled dishes in 1 hour.

- This cycle offers heated drying. To improve drying results, add heated dry time by selecting the **Dry Boost** option.

Refresh

This cycle freshens up and warms dishes that have been unused for a long time.

- Do not use detergent when using this cycle.
- The steam option cannot be turned off on this cycle.

Download Cycle

Use a dedicated cycle downloadable via Wi-Fi or NFC. You must install the LG ThinQ smartphone app to download cycles other than the default **Machine Clean** cycle.

NOTE

- Only the cycle code for the current Download Cycle appears on the appliance. See the smartphone app for cycle codes, names, and more information about the available cycles.
  - Default Cycle : P1-**Machine Clean**
- **Machine Clean** (P1)

  This cycle is for cleaning the inside of the dishwasher. Use the cycle without dishes in the machine. It eliminates residual soils, odor, white spots, and other dirt. Add citric acid or another cleaning agent for more effective results.
- **Express** (P2)

  This cycle will quickly clean lightly soiled dishes.
  - This cycle does not have drying.
- **Rinse** (P3)

  This cycle is a quick rinse for dishes that will not be washed immediately. The cycle rinses dishes that have excess soil to soften dried on residue. Rinsing the dishes helps prevent odors in the dishwasher. No detergent should be used.
  - This cycle does not have drying.
- **Pots & Pans** (P4)

  Cleans heavily soiled cookware. No more hand scrubbing frying pans and pots.
- **Casseroles** (P5)

  Cleans greasy and heavily soiled dishes. Casseroles come out clean.
- **Glassware** (P6)

  Safely washes delicate glassware, leaving it sparkling.
- **Night Care** (P7)

  Quietly washes dishes overnight. Sleep soundly knowing dishes will be clean in the morning.

Options and Extra Functions

Select the desired cycle and then select the options for that cycle.

Steam

This option adds steam at the start of the cycle to improve wash performance.

If the **Steam** option is added to a cycle, the **Sanitized** indicator stays lit at the end of the cycle if the dishes were properly sanitized (except the **Refresh** cycle). If the dishwasher could not properly sanitize the dishes because the **Steam** option was not selected, the cycle was interrupted or the water could not be heated to the required temperature, the indicator will not light up at the end of the cycle. Open and close the door or press **POWER** to turn the indicator off.

NOTE

- This high temperature rinse sanitizes dishes and glassware in accordance with the NSF/ANSI Standard 184 for residential dishwashers. Certified residential dishwashers are not intended for use in licensed food establishments. Only sanitizing cycles have been designed to meet the requirements for soil removal and sanitization efficacy. There is no intention, either directly or indirectly, that all

cycles on a certified machine have passed the sanitization performance test.

Using the Flexible Zone

This option adjusts the wash intensity to target different zones inside the dishwasher. Set it to wash just the upper rack or lower rack, or set the intensity to soft for the upper spray arm and strong for the lower spray arm.

The **Flex Zone** is off by default. Press the **Flex Zone** button to customize settings.

- Press the **Flex Zone** button repeatedly to select one of the three modes.

Mode	Description
Flex Zone	Various conditions • Place heavily soiled dishes like plates and bowls in the lower rack and lightly soiled dishes like cups and small plates in the upper rack to get the best results.
Flex Zone	Small loads & light soil • Use just the upper rack to save energy and time.
Flex Zone	Small loads & heavy soil • Use just the lower rack to save energy and time.

High Temp.

Raises the main wash temperature to improve cleaning.

Dry Boost

Select the **Dry Boost** option for better drying performance. This option adds heated drying time to the cycle for better drying results.

Mode	Description
Dry Boost Low	Press the **Dry Boost** button once, for optimal energy efficiency.
Dry Boost High	Press the **Dry Boost** button twice, for better drying results.
Dry Boost Off	Press the **Dry Boost** button three times to turn off the **Dry Boost** option.

- If the rinse aid dispenser is empty, the **Dry Boost Low** option is automatically added to all cycles (except the **Normal**, **1 Hour** cycle), unless you set the rinse aid dispenser to L0.

Night Dry

Dishes are often left in the dishwasher overnight after the cycle ends. This can result in the steam inside the tub condensing on dishes, leaving them wet. This option runs the ventilation fan periodically to help vent the steam from the tub.

- The **Night Dry** option is selected by default for all cycles for which it is available, except the **Normal** cycle.

Delay Start

This feature delays the start of a selected cycle. Each time the **Delay Start** button is pressed, the delay time increases by an hour. The delay time can be set from 1 to 12 hours, in one-hour increments.

Remote Start

Use a smartphone to control your appliance remotely. You can also monitor your cycle operation so you know how much time is left in the cycle. Once this function is enabled, you can start a cycle from the smartphone application. If the door is not closed within 4 seconds after pressing **Remote Start**, **Remote Start** is canceled.

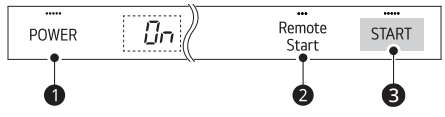
Cycle/Option Guide

The cycle guide shows the available options for each cycle.

To see the Cycle/Option Guide, refer to the online owner's manual.

Using the Option Setting Mode

You can set various options by using the **Option Setting Mode**.



1 Ensure the appliance is off.

2 Press **Power** ❶ and **Remote Start** ❷ simultaneously to enter the **Option Setting Mode**.

3 Refer to the table to set up each function.

4 Press **Start** ❸ to save.

Function	Button	Display
Machine Clean Reminder	**Night Dry**	Off ↔ On
Rinse Aid Level	**Dry Boost**	L2 ⟶ L3 ⟶ L4 ⟶ L0 ⟶ L1 ⟶ L2 ⟶
Clean Light	**High Temp.**	On ↔ Off
Chime Sound	**1 Hour**	On ↔ Off
Auto Setting	**Delicate**	On ↔ Off
End Sound	**Heavy**	On ↔ Off

NOTE

- Machine Clean Reminder
  - The **Machine Clean** LED flashes every 30 cycles. You can activate or deactivate the LED.
- Rinse Aid Level
  - You can adjust the level of rinse aid from L0 to L4.
  - For more information, refer to the **Rinse Aid Dispenser Adjustment** section.
- Clean Light
  - The default ON setting keeps the green light on (on some models) and End display until the door is opened. If the setting is changed to OFF, the lights turn off after 90 seconds.
- Chime Sound
  - You can turn on/off the volume of the button sound or notification sound.
  - The error alert sound cannot be turned off.
- Auto Setting
  - The default ON setting selects options automatically for better washing and drying performance.
  - If the setting is changed to OFF, the options are not selected.
- End Sound
  - You can turn on/off the End sound.

■ Before Using

Before Using

⚠ WARNING

- To reduce the risk of fire, electric shock, or injury to persons, read the **SAFETY INSTRUCTIONS** before operating this appliance.

NOTE

- Connect to the hot water supply only. The water supply temperature should be a minimum of 120 °F (49 °C) for better washing performance and shorter cycle time.
- Follow the instructions for loading the dishwasher to ensure effective cleaning.
- Remove insoluble items such as bones, toothpicks, and pieces of paper while loading the dishwasher.

Quick Start

1) Load the dishes.
2) Add the detergent.
3) Turn on the dishwasher.
4) Check the rinse aid.
5) Select the cycle and options.
6) Operate the dishwasher.
   - **Method 1**
     - Press the **Start** button and then close the door in less than four seconds to operate the dishwasher. If the door is not closed within four seconds, the white LED (on some models) flashes, an audible tone is heard, and the cycle does not start.
   - **Method 2**
     - Close the door first and then press the **Start** button to operate the dishwasher.

NOTE

- If the door is opened during the cycle, the dishwasher will stop. To resume the cycle, see methods 1 and 2 above.
- If the door is opened during the cycle and is not closed within four seconds after selecting the **Start** button, or if the door is closed without pressing the **Start** button, the white LED (on some models) with time flashes, an audible tone is heard, and the cycle does not start.

7) End of cycle.
   - When the cycle is complete, a chime will sound and the display will show End until the door is opened or **Power** is pressed. To activate or deactivate End display, refer to the **Using the Option Setting Mode** topic.
   - It is normal for the dishwasher to chime continuously if you open it during operation or just after the cycle ends. The dishwasher is letting you know that the interior temperatures of the unit are hot and to use caution when reaching inside. Once the unit has cooled down, the chiming will stop.

For more details, refer to the online owner's manual.

⚠ CAUTION

- Do not open the door during operation or immediately after it has completed the wash cycle as the escaping steam may cause scalding as the door is opened.

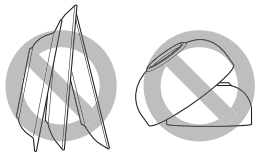
Auto-Off

The dishwasher automatically turns off after four minutes of inactivity if paused or if no cycle is started.

Loading the Dishwasher

The extra tall tub allows loading of dishes, pans, or other utensils up to 14" high. For effective washing performance, always follow these instructions.

- Remove large particles of food debris from plates including bones before loading.
- Items with burnt on food should be soaked prior to loading in the dishwasher.
- Deep pots or dishes should be placed upside down.
- Make sure that all items do not touch each other.



Non-Dishwasher Safe Items

The combination of high water temperature and dishwasher detergents may damage certain items. Do not wash the following items in the dishwasher.

- Copper or anodized aluminum
- Hand painted silver or gold leaf china
- Wood or bone handled utensils
- Iron or non-rustproof utensils
- Plastic items which are not dishwasher safe
- Sterling silver or gold-plated flatware or delicate or metal-rimmed china
- Fragile items such as crystal glasses

⚠ CAUTION

- Do not place pots or pans with plastic handles in the appliance as the handles may deteriorate due to the heat and detergent.
- Waterproof or long-lasting lipstick smudges on glasses may not be removed during the wash.

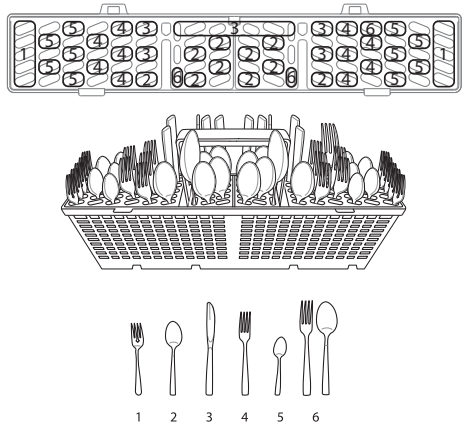
Loading the Silverware Basket

The silverware basket has separators to avoid scratching and tarnishing of delicate silverware.

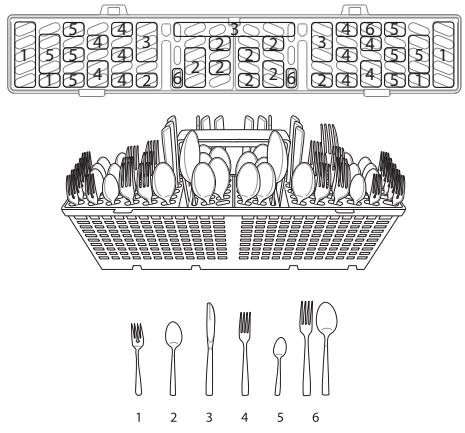
Loading Silverware into the Basket



Loading 10 Place Settings



Loading 12 Place Settings



Silverware Loading Tips:

- For best cleaning results, use the top separators in the basket when loading silverware. The separators will prevent nesting of silverware.
- Load sharp items, such as knives, pointing down.
- When unloading the dishwasher, it is best to start with the silverware basket. Doing so will prevent water droplets from falling on your silverware from the upper rack.

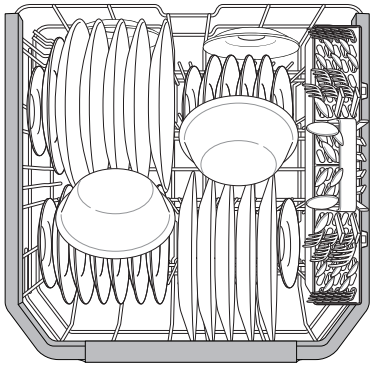
⚠ WARNING

- Be careful when loading and unloading sharp items. Load sharp knives with the handles up to reduce the risk of personal injury.

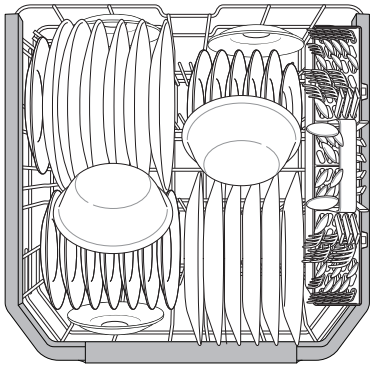
Loading the Lower Rack

Loading Dishes into the Lower Rack

Loading 10 Place Settings



Loading 12 Place Settings



Lower Rack Loading Tips:

For details, refer to the online owner's manual.

Folding Down the Lower Tines

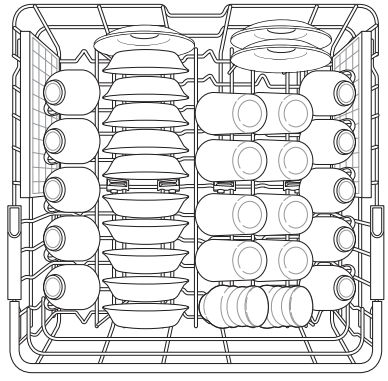
Fold tines down to fit larger dishes; pull tines back up to fit smaller dishes.

For more details, refer to the online owner's manual.

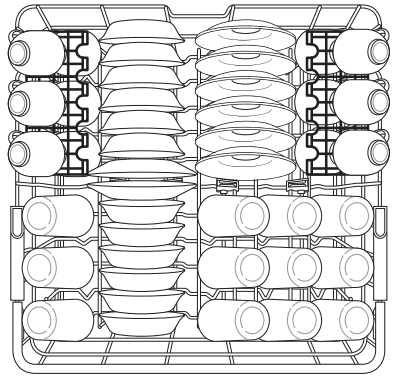
Loading the Upper Rack

Loading Dishes into the Upper Rack

Loading 10 Place Settings



Loading 12 Place Settings



Upper Rack Loading Tips:

For details, refer to the online owner's manual.

Loading the Cup Rack

This feature is only available on some models.

Extra cups or cooking utensils can be laid on the fold down cup racks, which also provide support for long-stemmed glasses.

For more details, refer to the online owner's manual.

Removing and Replacing Cup Rack

This feature is only available on some models.

The left and right cup racks are interchangeable and can be removed.

For more details, refer to the online owner's manual.

Folding Down the Upper Tines

Fold tines down to fit larger dishes; pull tines back up to fit smaller dishes.

For more details, refer to the online owner's manual.

Height Adjustable Upper Rack

The upper rack adjusts up and down. Raise the upper rack to allow items up to 14" tall in the lower rack. Lower the upper rack to allow dishes up to 12" tall in the upper rack. The dishwasher ships with the upper rack raised.

For more details, refer to the online owner's manual.

⚠ WARNING

- Before adjusting, ensure the rack is empty of all dishes. Otherwise dishes may get damaged or you may get injured.

Removing the Snap-In Gliding Upper Rack

This feature is only available on some models.

The instructions in the online owner's manual are for models with snap-in rack supports rather than wheeled rack supports.

⚠ CAUTION

- The snap-in upper rack should only be removed for servicing. If you need to remove the rack, wear gloves and handle the screwdriver carefully to avoid personal injury or damage to the dishwasher.

Loading the Cutlery Rack

The cutlery rack is best suited for flatware. The separators on the cutlery racks help keep flatware separated to avoid damage and improve cleaning.

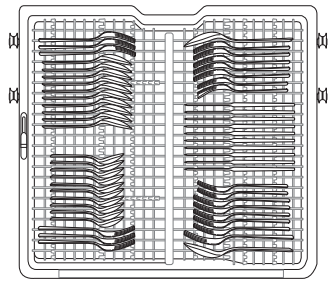
NOTE

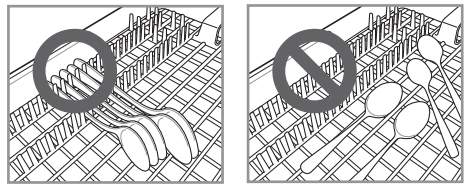
- For best cleaning performance, place flatware in the silverware baskets. Heavily soiled utensils or items with baked on foods should be placed in the middle rack or spoon basket for best performance.

Loading Silverware into the Cutlery Rack

This feature is only available on some models.

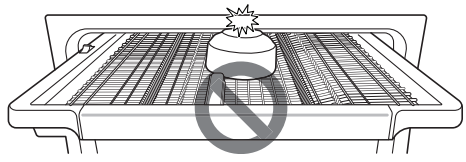
Loading 10 Place Settings





⚠ CAUTION

- Do not place bowls in the center of the cutlery rack. The door may not close properly, resulting in leakage.



Height Adjustable Tray

This feature is only available on some models.

For details, refer to the online owner's manual.

Removing the Cutlery Rack

The entire cutlery rack can be removed if more space is needed on the upper rack for larger items.

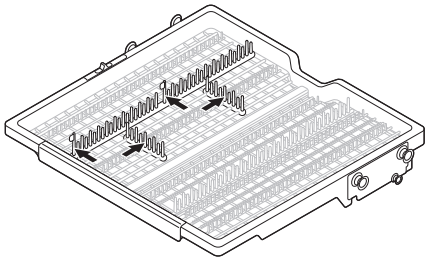
For more details, refer to the online owner's manual.

⚠ WARNING

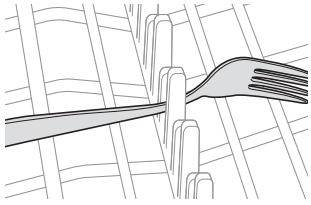
- Be careful when loading and unloading items with sharp edges. Load sharp knives with the blade down to reduce the risk of injury.

Folding Down the Cutlery Tines

Fold tines to fit flatware.



Pull tines back up to fit smaller dishes.



Adding Cleaning Products

Adding Detergent to the Dispenser

- Remove the label on the dispenser prior to running the dishwasher for the first time.
- The amount of detergent needed depends on the cycle, load size, and soil level of dishes.
- Put detergent into the detergent compartment before starting any cycle, except the **Rinse** (**Download Cycle**: P3) cycle.

⚠ WARNING

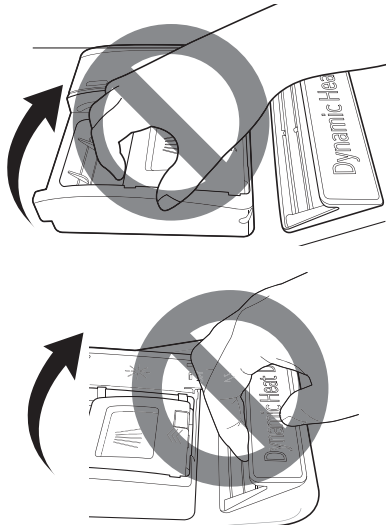
- Dishwasher detergent and rinse aid contain chemical components, like all other household detergent. So, they must be kept out of the reach of children.

⚠ CAUTION

- Use only detergent intended for dishwashers. Incorrect detergent may cause the dishwasher to fill with suds during operation. Excess suds may reduce wash performance and may cause the dishwasher to leak.

⚠ CAUTION

- To avoid damaging the dispenser and blower cover, do not use them to pull up and close the dishwasher door.



For more details, refer to the online owner's manual.

Adding Rinse Aid to the Dispenser

The **Rinse Aid Refill** LED appears in the display when more rinse aid is needed.

The use of rinse aid is recommended to prevent water spots on dishes and to enhance drying performance.

For more details, refer to the online owner's manual.

Rinse Aid Dispenser Adjustment

The dispenser has five adjustment levels. The dishwasher is programmed at the factory for a rinse aid dispenser level of 2. This can be checked and adjusted from the control panel.

NOTE

- Adjust the setting higher if you have hard water and notice calcium buildup on your dishes.
- Setting the rinse aid control too low will contribute to spotting and streaking on dishes and poor drying performance.
- Setting the control too high can cause foaming, which will cause poor wash performance.

1 Ensure the appliance is off.

2 Press **Power** and **Remote Start** simultaneously to enter the **Option Setting Mode**.

3 Press **Dry Boost** to change the rinse aid dispenser setting. Each press of the button changes the setting one step from L0 to L4.

4 Once the desired rinse aid dispenser setting is selected, press **Start** to save.

Refilling the Rinse Aid

How often the dispenser needs to be refilled depends on how often dishes are washed and the rinse aid setting used.

- The **Rinse Aid Refill** LED flashes when more rinse aid is needed, unless the rinse aid dispenser setting is set to L0.

■ Maintenance

To maintain performance and prevent trouble, it is important to check the outside and inside of the dishwasher, including filters and spray arms, at regular intervals.

⚠ WARNING

- When cleaning the outside and inside of the dishwasher, do not use benzene or thinner. Otherwise, it may cause fire or explosion.
- To prevent injury during care and maintenance or cleaning, wear gloves and/or protective clothing.

Cleaning and Care

Cleaning the Exterior

- Do not use scrub pads or abrasive cleaners on the exterior of the dishwasher.
- Most soil can be removed using a soft, damp cloth or sponge. A mild soap can be used to help release stubborn soil. Rinse and wipe dry with a soft cloth after cleaning.
- Stainless steel surfaces can be polished using a stainless steel cleaner. Follow the instructions on the cleaner, and wipe in the direction of the grain.

⚠ CAUTION

- If cooking oil is spilled on the exterior of the product, wipe it off immediately. Do not clean the exterior of the product with cleaners which contain alcohol, thinners, bleach, benzene, flammable liquids, or abrasives. These substances may discolor or damage the appliance.

Cleaning the Interior

- Clean the interior of the dishwasher periodically with a soft, damp cloth or sponge to remove food and dirt particles.
- To remove white spots and odor from inside the dishwasher, run an empty cycle, without detergent, with one cup of white vinegar in a dishwasher safe glass or bowl placed on the upper rack. (Vinegar is an acid and with constant use it could damage the appliance.)
- Using **Machine Clean**
  - Run the **Machine Clean** (**Download Cycle**: P1) cycle once a month or after every 30 cycles to eliminate residual soil, odor, white spots and other dirt inside the appliance. The **Machine Clean** (P1) cycle is the default **Download Cycle**.

1. Remove all dishes from the appliance.
2. Add 3 tbsp. (40 g) of citric acid to the detergent dispenser or follow the manufacturer's instructions if using a dishwasher cleaning agent. Do not use dishwasher detergent.
3. Run the **Machine Clean** (**Download Cycle**: P1) cycle.
4. Press **Start**.

NOTE

- Run the **Machine Clean** (**Download Cycle**: P1) cycle once a month, or more often if needed, to remove detergent buildup and other residue.
- If you have not used the dishwasher for a long time, refresh the inside by running the **Machine Clean** (**Download Cycle**: P1) cycle without detergent. When the cycle is finished, clean the inside and outside of the dishwasher according to the **MAINTENANCE** instructions.

Clogged Drain Air Gap or In-Sink Disposal

Check the drain air gap or in-sink disposal if the dishwasher is not draining well.

NOTE

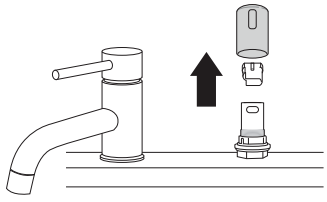
- The drain air gap and disposal are external plumbing devices that are not part of the dishwasher.
- The warranty provided with the dishwasher does not cover service costs directly associated with

the cleaning or repair of the external drain air gap and disposal.

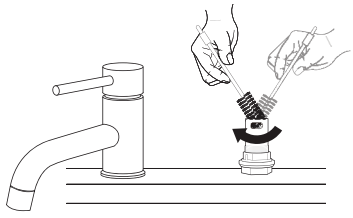
Cleaning the Air Gap

1 Turn off the dishwasher.

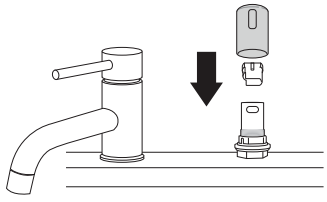
2 Remove the air gap cover and the plastic cap underneath it.



3 Clean out any debris with a toothpick or brush.



4 Replace the plastic cap and air gap cover.



Cleaning the Filters

⚠ WARNING

- Be cautious of sharp edges when handling the stainless steel filter.

⚠ CAUTION

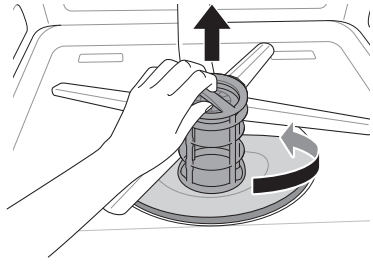
- Remove food residue caught in filters to prevent the buildup of odor-causing bacteria and possible drainage problems.

NOTE

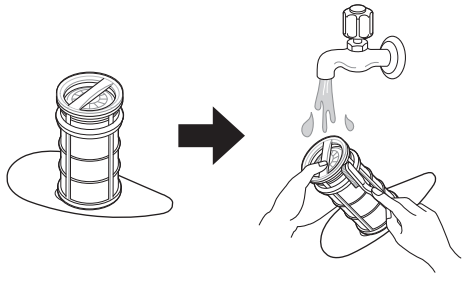
- For best wash performance, clean the filter after each load. If food debris remains in the filter, it may cause an odor.
- In areas with hard water, clean the filter at least once a month with a soft brush.
- Clean the filters using non-abrasive materials and warm running water.

1 Remove the lower rack and position the bottom spray arm so a wider vee is open to the front.

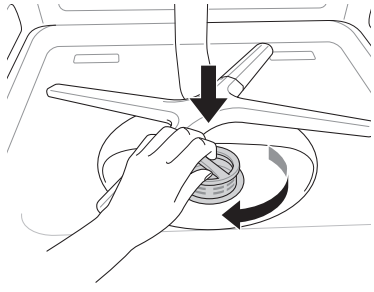
2 Turn the inner filter counter-clockwise and take out the assembled inner filter and stainless steel filter.
With the filters removed, check the sump opening and remove any foreign materials, if needed.



3 Clean the filters with a soft brush under running water. Reassemble the filters before reinstalling them.

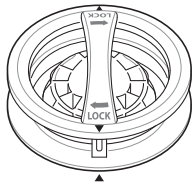


4 To replace the assembled filters, position the spray arm so the wider vee is toward the front. Fit the filters back into the filter holder and secure them by turning the inner filter clockwise until it clicks into place.



NOTE

- Make sure the filter is assembled correctly before starting a cycle. When assembling, rotate the filter firmly until it clicks.



Recommended Filter Cleaning Schedule

Number of Loads Per Week	If you wash dishes before loading	If you scrape and rinse dishes before loading
1 - 3	Every 6 months	Once a year
4 - 7		
8 - 12		Every 6 months
13 - 14		

Number of Loads Per Week	If you only scrape dishes before loading	If you do not scrape or rinse dishes before loading
1 - 3	Four times a year	Once a month
4 - 7		Twice a month(every 15 days)
8 - 12	Every 1.5 months	Every week
13 - 14		Twice a week

Cleaning the Spray Arm

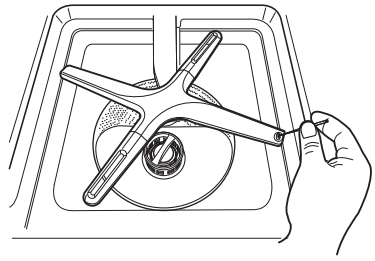
If the spray arm holes are blocked by any food residue, dishes may not be cleaned well due to improper water spray.

It is recommended that the spray arms be cleaned once every two weeks.

Cleaning the Lower Spray Arm

1 Make sure that the water jet holes are not blocked by food particles.

2 If any food residue blocks the spray arm holes, remove it with a pin or piece of stiff wire.



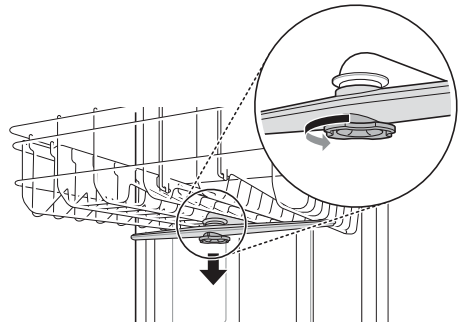
⚠ CAUTION

- To avoid breaking the rolling spray arm sections, do not pull or manually rotate them.

Cleaning the Upper Spray Arm

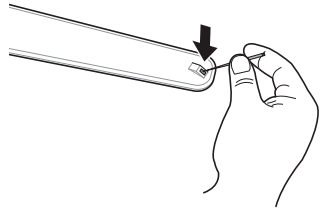
1 Pull the upper rack forward. Make sure that the water jet holes are not blocked by food particles.

2 When cleaning is necessary, remove the upper spray arm by turning the nut on the bottom of the spray arm 1/8 turn counter-clockwise and pulling down.



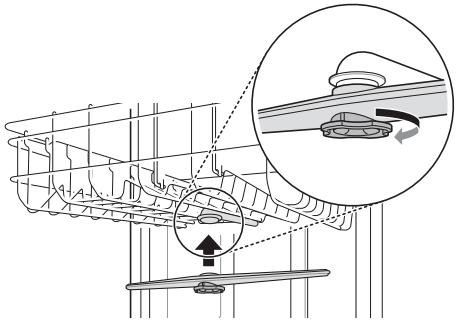
3 Remove food particles by rinsing or shaking the spray arm.

4 If any food residue blocks the spray arm holes, remove it with a pin or any sharp tool.



5 After removing the food residue, clean the spray arms under running water.

6 After cleaning the upper spray arm, press it up into place. Turn the nut 1/8 turn clockwise to make sure that the nut locks back into place.



7 After assembly, make sure that the spray arms rotate freely.

Seasonal Maintenance and Storage

- If you will be absent for an extended period of time during warmer months, close the water valve and disconnect the power supply line, or turn off the circuit breaker. Clean the filter, tub and dispenser to prevent odor.
- If you will be absent for an extended period of time during colder months and there is a possibility of freezing temperatures, winterize the water supply lines and the dishwasher itself. Winterization must be performed by qualified service personnel.

Cleaning the Heat Dry Blower

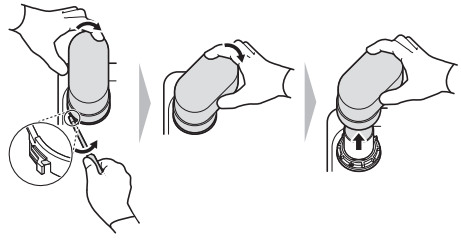
⚠ CAUTION

- To prevent the possibility of odors coming from the heat vent, remove food residue caught in the gap below the cover periodically (every 4 months).
- To prevent injury during cleaning, wear gloves and/or protective clothing.
- Wait for the blower to cool sufficiently before cleaning. If you touch it while it is hot, you may get injured.
- When cleaning the heat dry blower, do not allow water, detergents, or other foreign substances inside the tube. Doing so may cause the product to malfunction.
- To avoid electric shock, do not put your hand inside the heat dry blower tube.
- Never disassemble the nut at the base of the blower tube. Doing so may cause leakage.
- If the cover is not properly assembled, water leakage, electric shock, fire or product malfunction may occur.

1 Remove the lower rack. Locate the heat dry blower cover in the back left corner at the bottom of the tub.

2 There is a tab at the base of the cover. Insert a flat-head screwdriver between the tab and the cover and gently push it away from the cover. (Be careful not to break the tab or scratch the tub.)

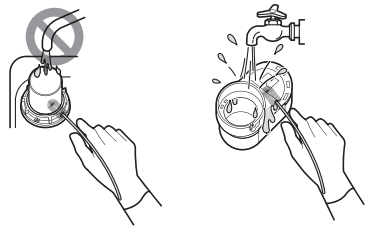
3 While the tab is pulled out, turn the cover clockwise to about 2 o'clock. Lift the cover up to remove it.



4 Remove any debris with a brush, if needed. The cover can be cleaned under running water. Allow it to dry before reassembling it to prevent water from entering the blower tube.

⚠ CAUTION

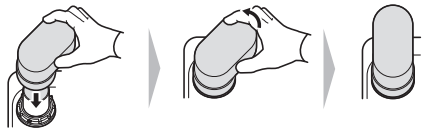
- Do not allow water, detergents, or other foreign substances inside the tube. Doing so may cause the product to malfunction.



5 To reassemble the vent cover, place it over the supply tube in the same orientation as it was removed (about 2 o'clock). Turn the cover counterclockwise until it clicks into place.

⚠ CAUTION

- Do not use the dishwasher without the cover in place. If the cover is not properly assembled, water leakage, electric shock, fire or product malfunction may occur.



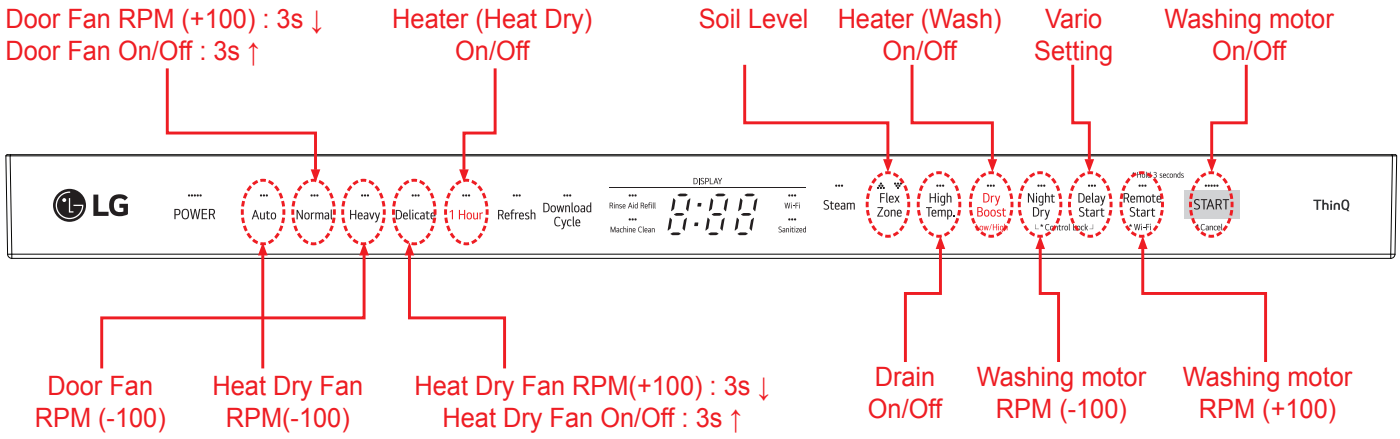
■ Control Mode

1) LQC Control Mode

BUTTON	Times button is pushed	Top Display	Load and Checking points		Door open/ closed	Remark
			Load	LED lighting		
POWER + AUTO +START	1 TIME	n**/U** /D** (version)		All LED are lit	Either	"nC" will be displayed when Wifi Module fails.
Start	1 TIME	Sump Temp(*C)	Dispenser	Power Button is lit Rinse aid Refill LED flashes (if rinse aid needs refilling) other LED are turned Off	Closed	"EE" will be displayed when EEPROM is fails.
	2 TIME	NO2	Drying Fan Motor Drying Actuator		Closed	
	3 TIME	Soil Level	Soil Sensor		Closed	
	4 TIME	Drain Motor RPM	Drain Motor		Either	
	5 TIME	Frequency	Inlet Valve		Closed	
	6 TIME	Heat Air Temperture(˚C)	-		Closed	
	7 TIME	Washing/ Heat Dry Motor RPM	Washing Motor Heat Dry Motor		Closed	
	8 TIME	C**/1Un→ C**/1Lo	Washing Heater Washing Motor Vario Valve Heat Dry Motor Heat Dry Heater		Closed	Un : Detecting Washing Position Lo : Detecting Complete "nE" will be displayed when Vario Valve fails.
	9 TIME	-	Power Off	All LEDs are Turned Off	Closed	

2) Manual Control Mode

Test Mode Start : **POWER + 1 Hour + Download Cycle press for 3 seconds**



※ When the door is closed or the door is opened, the Test mode operates when the latch slide is retracted

- If the latch slide is retracted and the door is forced to close, it will return to its original position

※ When setting up the Vario, Un(Undefined) is detected as initial position detection and then the position is displayed

※ 3s↓ : Release within 3 seconds, 3s↑ : Press more than 3 seconds

Explanation of Values on Display

Motor RPM's:

During the Wash Motor and Dry Fan operation the readout will show 3 digits, normally in the 200 range at start up.

This number means 2000RPM. As the Wash Motor button is pressed it will decrease or increase the speed of the motor in increments of 100 RPM depending on which button is pressed.

The display will show a decrease or increase of "10" which represents a change of 100 RPM.

Example of RPM

200 is 2000 RPM



7. How to Disassemble

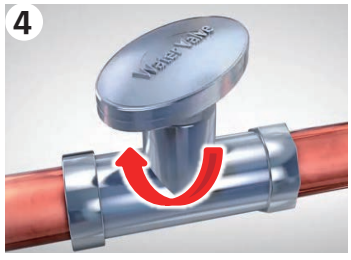
■ Before disassembling the product

Follow the steps below before disassembling the product.











① Remove all the dishes stored in the product.

② Use control mode to remove residual water in the product.

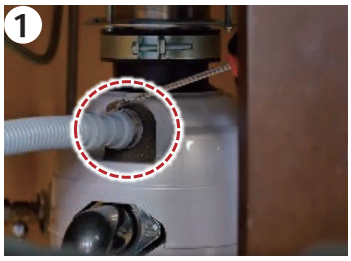
③ Disconnect the power plug.

④ Turn off the water valve.

⑤ Remove the fixing bracket on the sink.

■ Hose and Power

1. Drain Hose & Inlet Hose









① Remove the clamp fixing the Drain Hose, and pull the Drain Hose to disconnect it.

② Disconnect the Inlet Hose.

③ Remove the 2 screws and remove the Lower Cover.

④ Use the tool to disconnect the Inlet Hose.

Assembly Assemble in the reverse order of disassembly.

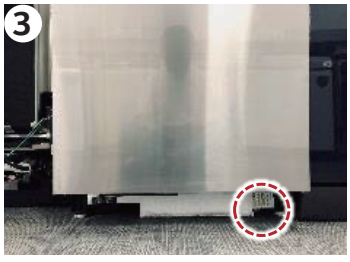
Tip Place a towel below because residual water may flow out



2. Power











① Disconnect the power cord.

② Disassemble the lower cover by remove the 2screws

③ The junction box is located right hand side.

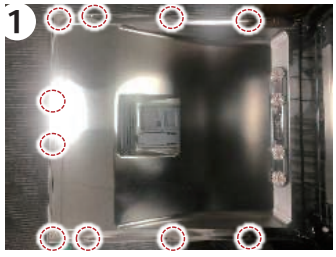
④ Remove a screw and remove the junction box.

⑤ Disconnect the power wires.

Assembly Assemble in the reverse order of disassembly.

■ Exterior Parts

1. Front Cover



(Semi type)



(Fully type)

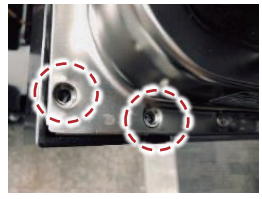




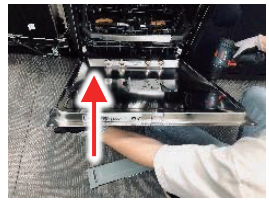
① Open the door, remove the 10 screws, and remove the Front Cover. (Semi type)

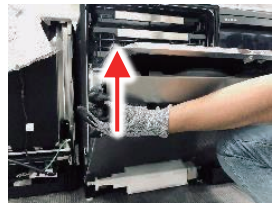
② Open the door, remove the 12 screws, and remove the Front Cover. (Fully type)

Assembly When Assembling, Align the holes on the Doorliner and Front Cover.



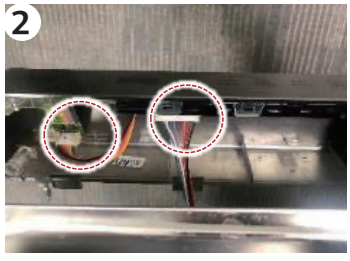
Caution Remove the screws while holding the Front Cover to prevent it fall off.





2. Control Panel (Only Semi type)



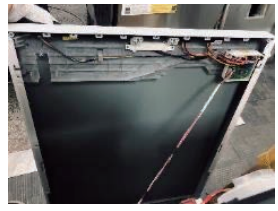


① Open the door, remove the 6 screws, and remove the Control Panel.

② Disconnect the connector.

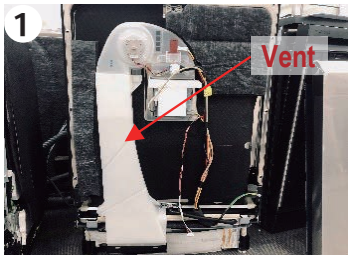
Assembly Assemble in the reverse order of disassembly.

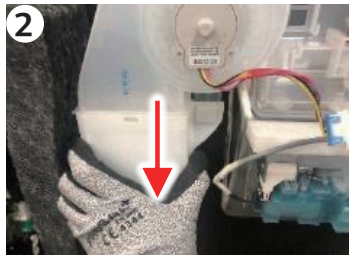
Tip The fully type has the Control Panel Attached to the front Cover.

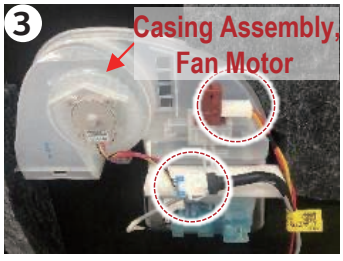


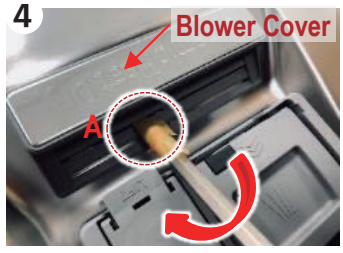
■ Doorliner

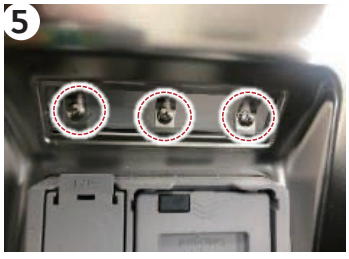
1. Vent and Casing Assembly, Fan Motor













① Remove a screw of duct.
② Pull the Vent down to remove it.
③ Disconnect the 2 connectors.
④ Remove the Blower Cover.
- Insert Flathead screwdriver in hole (A).
- Rotate Flathead screwdriver carefully.
⑤ Remove the 3 screws.
⑥ Remove the Casing Assembly, Fan Motor.

Assembly Assemble in the reverse order of disassembly.

Caution Make sure the gasket is properly seated when assembling the Casing Assembly, Fan Motor .



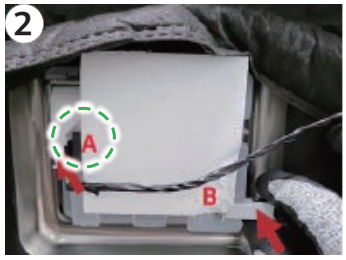


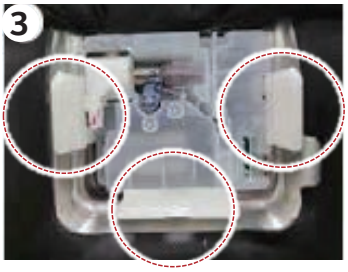
Using a flathead screwdriver can damage the parts, so use it carefully and tape it to prevent damage.



2. Disassembling the Dispenser









① After removing the Front Cover, remove the white EPS packing attached to the dispenser.

② Disconnect the 2 connectors of dispenser.

③ Insert the JIGs on 3 sides as shown in the photo3.

④ Open the door and remove the dispenser by pull off.

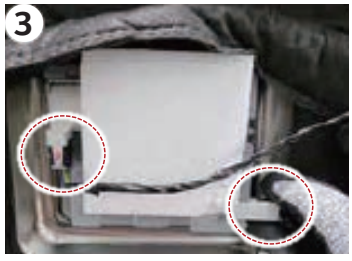
Caution Be careful not to damage the dispenser when inserting the JIG.

Tip Connector A has a hook, so it's easier to remove with a flathead screwdriver .

3. Assembling the Dispenser







① Set the JIG on the back of the doorliner

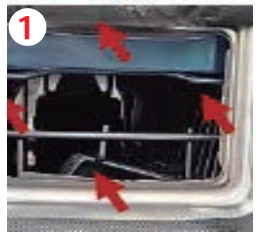
② Assemble the dispenser from the bottom and push until you hear a "click" sound to fully assemble.

③ Connect the 2connectors and Attach the white EPS packing.

Caution

1) Make sure that the doorliner is not damaged.

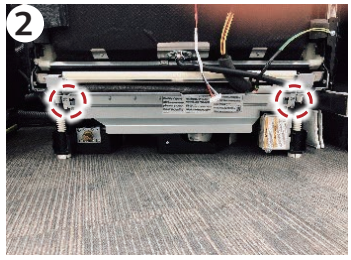
2) Make sure the hooks are assembled properly.
(It can cause leakage.)

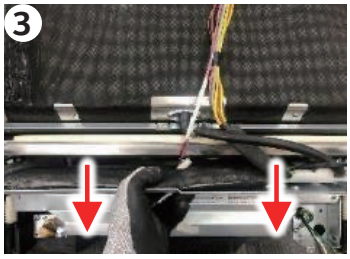


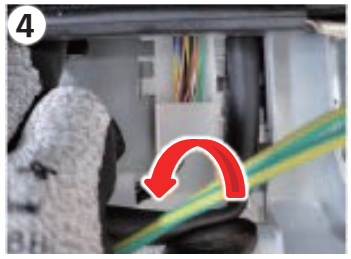


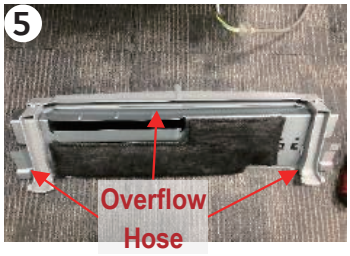
4. Lower Frame





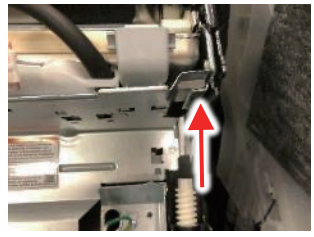




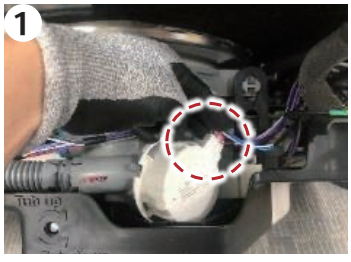


① First of all, remove the front cover and vent
② Remove the 2 screws.
③ Remove the lower frame.
④ Remove the main harness hooks.
⑤ Remove the overflow hose from the lower frame.

Assembly When assembling, assemble the lower frame to the Tub as shown.



5. Drain Pump



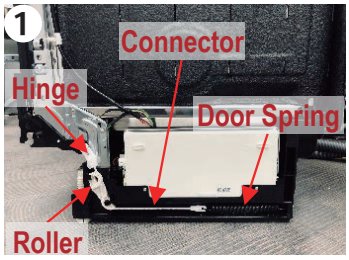


① After removing the lower frame, disconnect the connector of drain pump.
② Remove the drain pump by turning it counter-clockwise.

Assembly Assemble in the reverse order of disassembly.

Caution Place a towel below because residual water may flow out

6. Door Spring









① The Door Spring is connected with a Connector from the back of the Base to the Doorliner Hinge.

② With the door closed, lift the connector up to remove it.

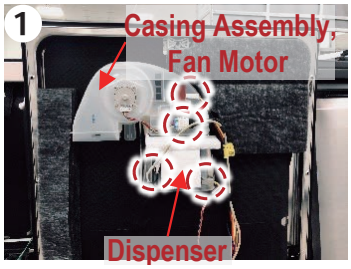
③ Disconnect the Connector from Door Spring.

④ Remove the Door Spring from the Base.

Assembly Assemble in the reverse order of disassembly.

Tip Open and close the door to make sure the rollers are assembled properly.

7. Doorliner





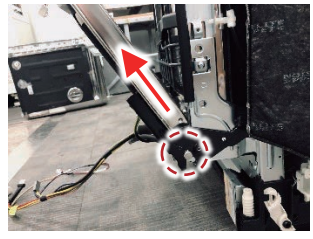


① Disconnect the connector connected to the Casing Assembly, Fan Motor and Dispenser.

② Remove the clamp and disconnect the Steam Hose.

③ Open the door about 45 degrees and lift it up.

Assembly Align the Doorliner with the hinge as shown in the photo and assemble.



■ Air Guide

1. Hall Sensor



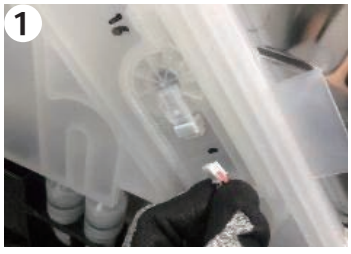


① Press the hook inside the hall sensor and remove the Hall Sensor.

② Disconnect the connector.

Assembly Assemble in the reverse order of disassembly.

2. Air Guide









① Remove the hall sensor.

② Use a tool to disconnect the inlet hose.

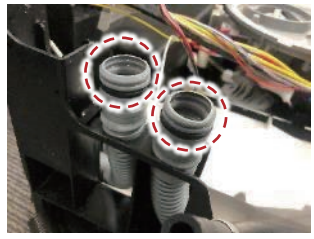
Caution Disconnect the inlet hose carefully.

③ Open the door and remove the gasket by turning it counter-clockwise.

④ Lift the airr guide to remove it.

Assembly Assemble in the reverse order of disassembly.

Caution Replace the O-ring on the Drain Hose when reassembling. (O-ring - Loc No : A131)



Caution If the Air Guide is not assembled properly, it will leak. So make sure the gasket and hoses are properly connected.

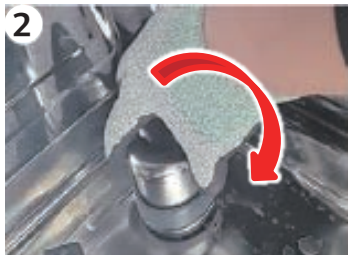




■ Tub

1. Heat Dry Blower







① Lift the hook using a flathead screwdriver as shown in the image

② Turn the Heat Dry Blower clockwise by 30 degrees and lift it up.

③ Using a tool, turn the nut counter-clockwise to remove it.

Assembly Assemble in the reverse order of disassembly.

2. Lower Spray Arm





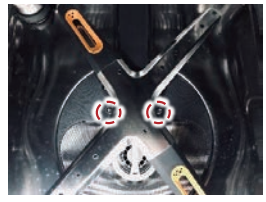


① Remove the Lower Rack.

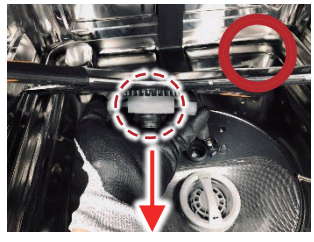
② Turn the Main Filter counter-clockwise to remove it.

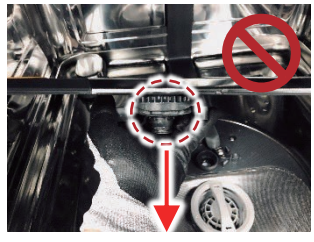
③ Remove the 2 screws and remove the Lower Spray Arm.

Tip Turn the nozzle to make the screw visible and remove 2 screws



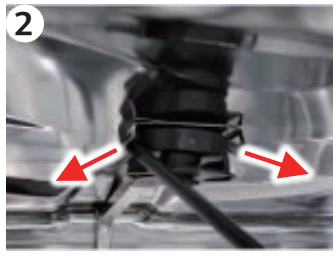
Assembly When assembling the Lower Spray Arm, Assemble with the rib facing the outside of the Tub.





3. Top Wash Impeller and Water Guide









① With the Lower Spray Arm removed, remove the bottom clip of the Water Guide by removing a screw.

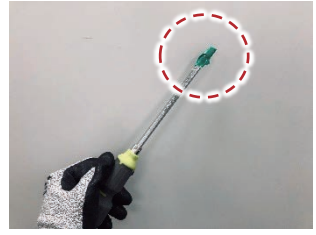
② Use a flathead screwdriver to open the 2 brackets connecting the Top Wash Impeller.

③ Open the bracket holding the Water Guide in the middle of the Tub with the same method.

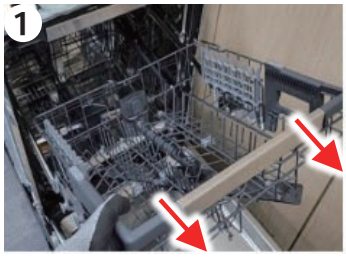
④ Lift the Water Guide to remove it.

Assembly When assembling, make sure the brackets are assembled properly.

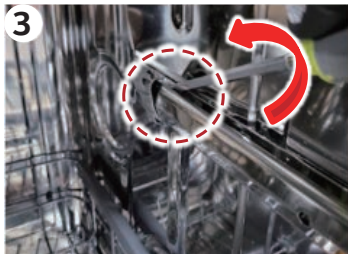
Caution Using a flathead screwdriver can damage the parts, so use it carefully and tape it to prevent damage.

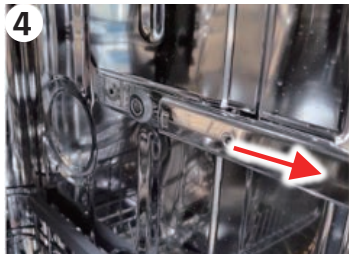


4-1. Upper Rack & Rail (Roller type)









① Remove the Upper Rack.

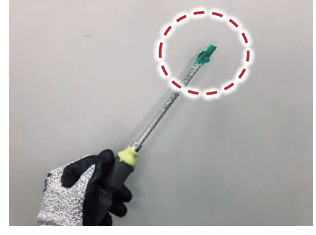
② Pull the rack rails forward.

③ Using a flathead screwdriver, Open the hook by inserting the flathead screwdriver.

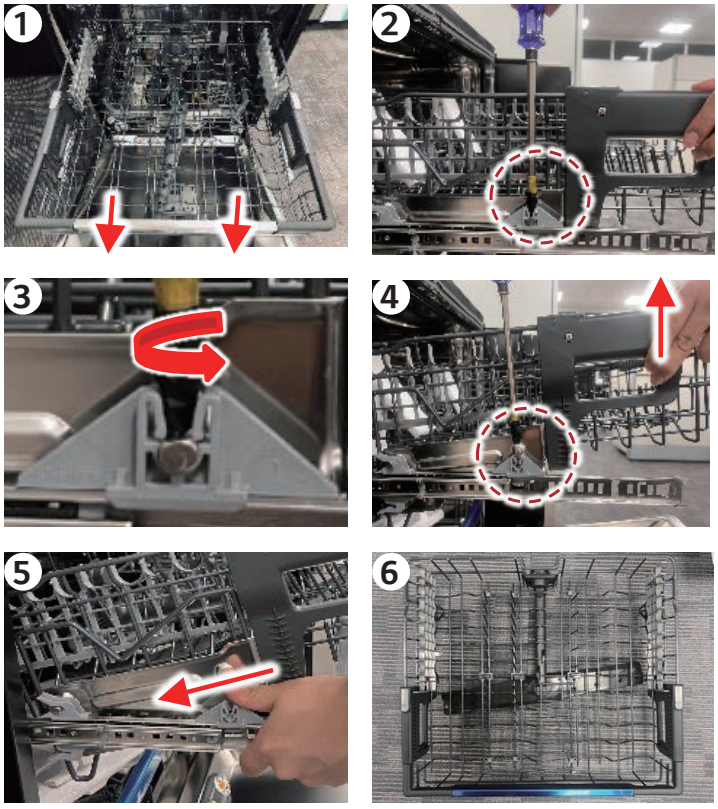
④ Pull the Rack Rail to remove it.

Assembly Assemble in the reverse order of disassembly.

Caution Using a flathead screwdriver can damage the parts, so use it carefully and tape it to prevent damage.



4-2. Upper Rack (Glide rail type)



① Pull out the Upper Rack.

② Place a flathead screwdriver into the hooks on the front of the rack.

③ Spin a flathead screwdriver to open the front hooks.

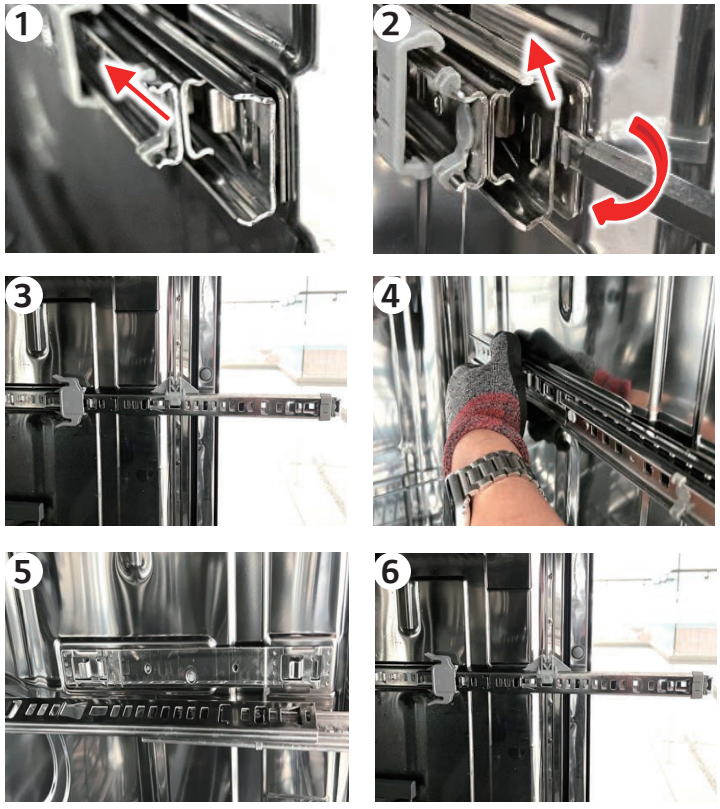
④ With the front hooks open, pull the rack upward. (Repeat steps ② and ③ on the other side.)

⑤ Slide the Rack in the direction of the arrow to disassemble the Rack from Rail.

⑥ Remove the upper rack

Assembly Assemble in the reverse order of disassembly.

4-3. Rail (Glide rail type)



① After the remove the upper rack, Push the rail to backward.

② Spread the space between the Glide Rail and the Tub with a flathead screwdriver, then rail hook remove from tub bracket.

③ Gently pull the Glide Rail forward.

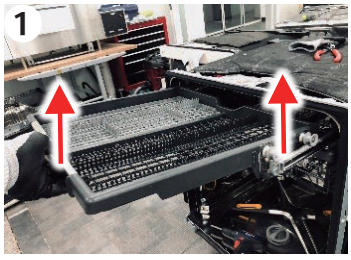
④ Hold the fixing rail by hand, Slide the Glide Rail toward the inside of the Tub.

⑤ When the assemble the rail, Position the hole in the rail on the hook of the bracket

⑥ Pull the rail forward and assemble it



5. Cutlery Rack and Rail





① Lift the Cutlery Rack to remove it.

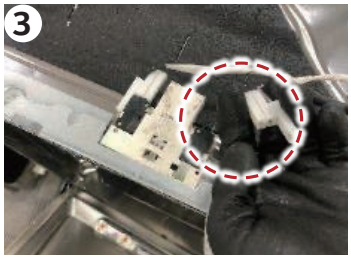
② Remove the Rack Rails.
(The rail removal method is the same as the upper rack normal rail removal method.)

Assembly Assemble in the reverse order of disassembly.

6. Door Latch







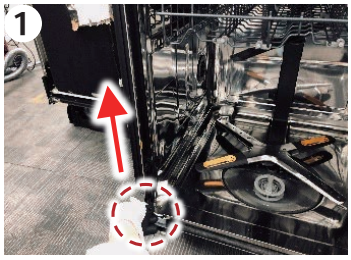
① Remove the protecting film.

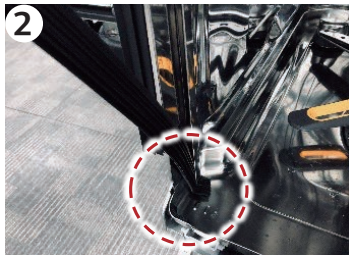
② Remove the two screws.

③ Disconnect the 2 connector and remove the Door Latch

Assembly When assembling, Make sure the door opens and closes properly

7. Tub Packing



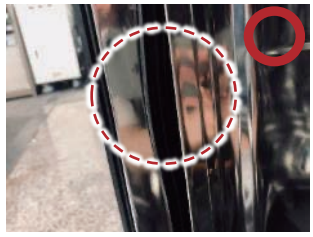


① Pull and remove the tub packing

② When assembling Tub packing, the starting point is locate between the two forming shapes located at the bottom of the Tub.

Caution Make sure the Tub Packing is seated properly on the Tub.

Tip Operate the product to make a final check for door leak.

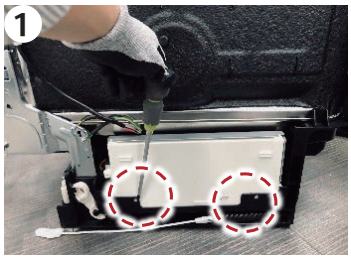


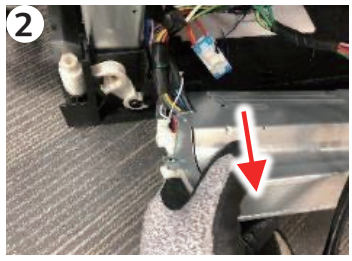


■ Base

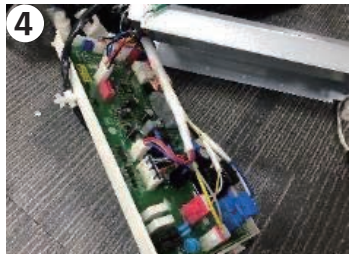
1-1. Main PCB (For Models : LDPH7972*, LDPM6762*, LDPS6762*, LDTH7972*, SDWB24*3)

※ LDPH7972*, LDTH7972*, SDWB24*3 : Before Serial no. 407XX







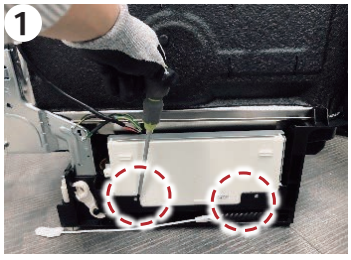


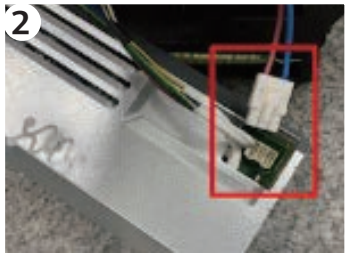
① Remove from the hook using a flat-blade screwdriver.
② Carefully remove the main PCB from the base
③ Remove a screw.
④ Disconnect all connector.

Assembly Assemble in the reverse order of disassembly.

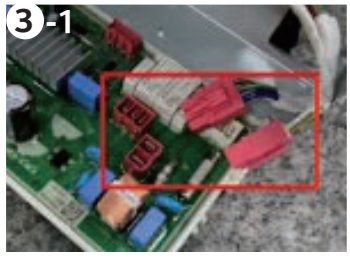
1-2. Main PCB (For Models : LDPH5554*, LDTH5554*, LDPH6762*,LDPH7972*, LDTH7972*, SDWB24*3)

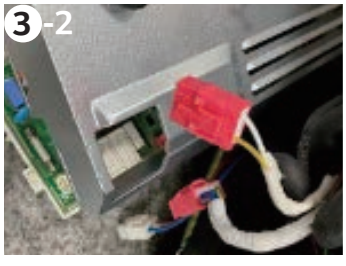
※ LDPH7972*, LDTH7972*, SDWB24*3 : After Serial no. 407XX

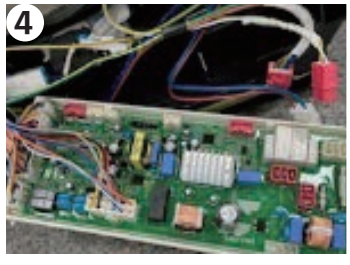






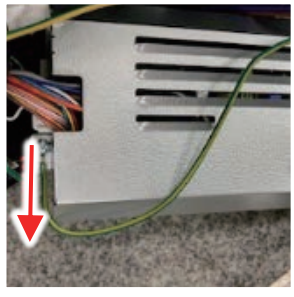




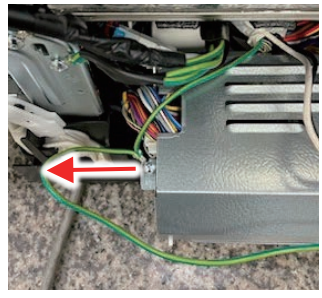


① Remove from the hook using a flat-blade screwdriver.
② Disconnect the power cord.
③ Remove a screw.
③-1 Remove the 2connector connected to the heater.
③-2 Remove the cover from the Main PCB.
④ Disconnect all connectors.

Caution When assembling, make sure the earth wire located to the screw is facing downward (6 o'clock direction).



O



X

2. Sump Cover







① Remove the Lower Spray Arm.
② Remove the clip and lift the Water Guide.
③ Remove the 7 screws and remove the Sump Cover.

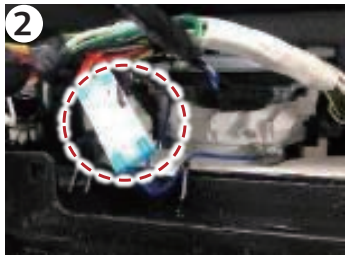
Assembly Assemble in the reverse order of disassembly.

Tip Removing the Sump Cover allows you to check the debris on the Vario Disk.



3. Thermistor







① Remove the Lower Frame.
② Disconnect the connector.
③ Remove a screw and remove the Thermistor.

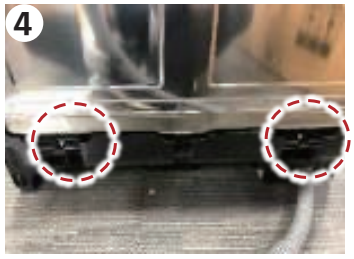
Assembly Assemble in the reverse order of disassembly.

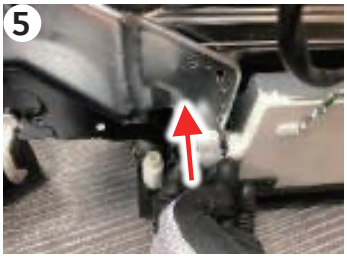
4. Base

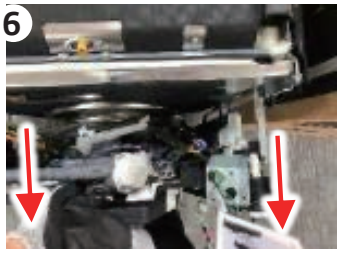












① Remove the Lower Frame and disconnect all connectors.

② Remove the Heat Dry Blower and nut.

③ Remove the Sump Cover.

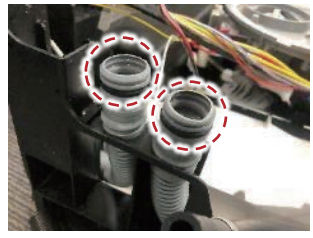
④ Remove the 2 screws on the back of the product.

⑤ lift the Roller up to remove it .

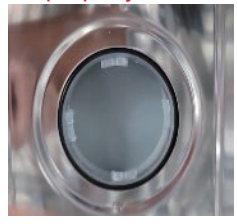
⑥ Lay down the product and pull the Base away from the Tub.

Assembly Assemble in the reverse order of disassembly.

Caution Replace the O-ring on the Drain Hose when reassembling. (O-ring - Loc No : A131)



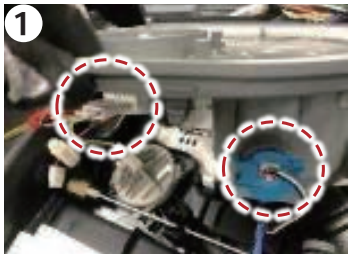
Caution If the Air Guide is not assembled properly, it will leak. So make sure the gasket and hoses are properly connected.

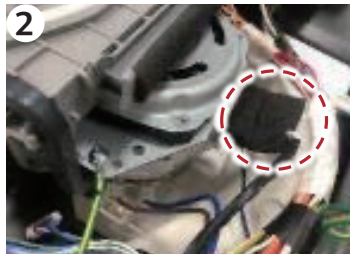


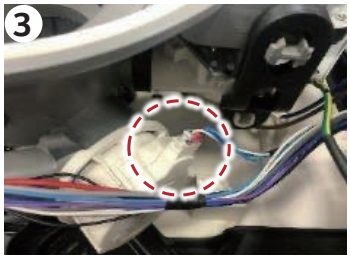


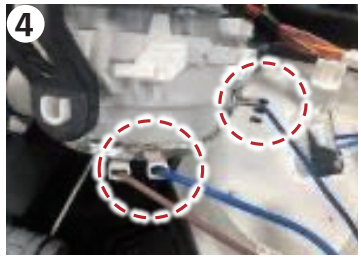
Tip Some parts can be replaced without completely removing the base.

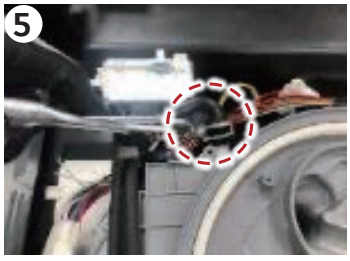
5. Sump

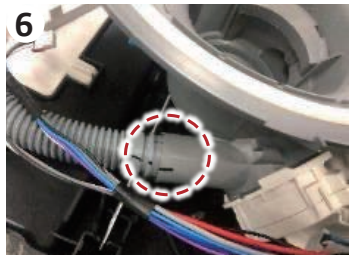












① With the base separated, disconnect the connectors connected to the Vario Motor and Micro Switch.

② Remove the housing and disconnect a connector connected to the Casing Assembly, Pump

③ Disconnect the connector connected to the Drain Pump.

④ Disconnect the connector connected to the Heater and remove the Thermistor.

⑤ Use the tools to disconnect the Steam Hose.

⑥ Disconnect the Drain Hose and remove the Sump from the Base.

Assembly Assemble in the reverse order of disassembly.

Caution Replace the O-ring on the Drain Hose when reassembling. (O-ring - Loc No : A131)



6. Vario Motor and Soil Sensor









① When replacing the Vario motor and the soil sensor, it is not necessary to separate the sump from the base. (For better understanding, remove the Sump and start)

② Remove the 2 screws and remove the Vario Motor.

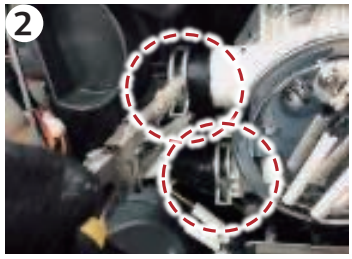
③ Use a flathead screwdriver to open the hooks on the Soil Sensor.

④ Remove the Soil Sensor.

Assembly Assemble in the reverse order of disassembly.

7. Casing Assembly, Pump











① Lay down the product and open the hooks to remove the right base cabinet.

② Remove the 2 clamps connected to the Sump.

③ Remove a clamp connected to the Steam Hose.

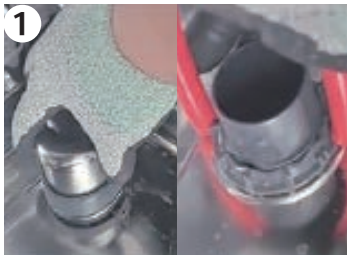
④ Remove the 2 holders that secure the Casing Assembly, Pump.

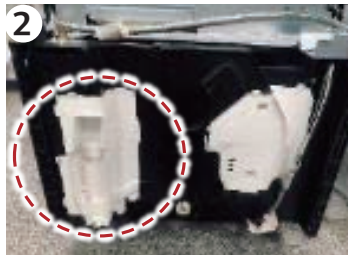
⑤ Disconnect the connector connected to the Casing Assembly, Pump and Remove it.

Assembly Assemble in the reverse order of disassembly.

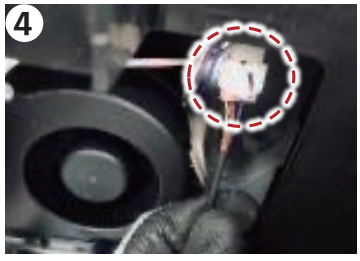
Caution When assembling, Make sure the hoses are properly connected. Leaks can occur.

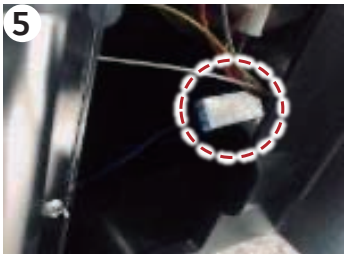
8. Heat Dry Module













① Remove the Heat Dry Blower and nut.

② Lay down the product and open the hooks to remove the left base cabinet.

③ Put your hand behind the Heat Dry Module and Disconnect the connectors connected to the Fan Module.

④ Disconnect a connector connected to the Heater.

⑤ After disconnecting a connector connected to the Thermistor, remove the Heat Dry Module.

Assembly Assemble in the reverse order of disassembly.

8. Troubleshooting Methods

■ Error Message

Error massage	Detecting zone	Detecting condition	Operation	Cause	Solution
LEAKAGE ERROR  displayed Condition Internal Leakage Condition Internal Leakage	Anytime (Power On/Off)	When the Float Switch is operated	repeat for 30 seconds of drain and 20 seconds of pause.	1. The Door gasket came loose or fell off. 2. The Float assembly is stuck. 3. The Controller is damaged. 4. The seal assembly is not connected properly to the Sump. 5. The unit is not leveled. 6. Using wrong detergent.	1. Replace the Doorliner assembly. 2. Replace the floater assembly. 3. Replace the Controller. 4. Reassemble the seal on the Sump. 5. Make a Level. Should install properly. 6. Use dishwasher detergent. ※ in case of AE, Should remove underneath of Floater switch (Safety switch)
EXCESS ERROR  displayed Condition Water fills above normal level (Automatically drainPump operated.)	Water supply	When the Water supply frequency is detected above 600 Hz	repeats for 30 seconds of drain and 20 seconds of pause.	1. The Inlet Valve is damaged. 2. The Controller is damaged. 3. After Replace the PCB, still same Error code is displaying.	1. Replace the Inlet Valve. 2. Replace the Controller. 3. Replace the Hole Sensor.
	All processes except Water supply	When detected 50 Hz above the set value	repeats for 30 seconds of drain and 20 seconds of pause.		
INLET ERROR  displayed Condition Doesn't reach the normal water level	Water supply	1. When the time for the impeller to rotate 30 times is more than 30 seconds. 2. When the frequency does not reach the set value within 10 minutes 3. When the washing motor doesn't detect the water	repeats for 30 seconds of drain and 4 times of pause.	1. The Water Supply Tap is Closed. 2. Wiring connections is OK? 3. The Inlet Hose is kinked. 4. The Water Pressure is very low (below 10 psi) or high (above 120 psi). 5. The filter of Inlet Valve is clogged by dirty water. 6. Inlet Valve is OK? 7. Wiring connection is OK? 8. The Impeller of Air breaker is stuck. 9. The Hall sensor is OK? 10. The Controller is damaged.	1. Open the water supply tap. 2. Check and reconnect the wire. 3. Repair the Inlet Hose. 4. Call plumber for service. 5. Clean the filter of Inlet Valve. 6. Check the electric resistance of Inlet Valve. (23~27Ω) 7. Check and reconnect the wire. 8. Replace the Air breaker. 9. Check the electric resistance of Hall Sensor. 10. Replace the Controller.
DARIN ERROR  displayed Condition Doesn't reach the normal water level	Drain	When the drain motor and washing motor do not detect that drainage is complete	All loads are turned off.	1. The Filter assembly blocked. 2. The Drain Hose kinked or blocked. 3. The inner hole of drain case is blocked. 4. The Air gap is clogged. 5. The Knock out plug of garbage disposal not removed. 6. The Washing Motor locked or defective. 7. Wiring connection is OK? 8. The impeller of Drain Pump is stuck. 9. The Controller is damaged.	1. Clean the filter assembly. 2. Remove the cause of kink or block. 3. Repair or Replace the Drain Pump. 4. Clean the Air Gap. 5. Remove knock out plug. 6. Replace the Casing Assembly, Pump assembly. 7. Check and reconnect the wire. 8. Clean the Drain Pump. 9. Replace the Controller.
BUBBLE ERROR  displayed	Main Wash	When the Soil Sensor detects bubbles	All loads are turned off.	1. Caused by improper detergent. 2. Failure to level dishwasher	1. Only use detergents which are designed for use in dishwashers. 2. Make a level. Should install properly.

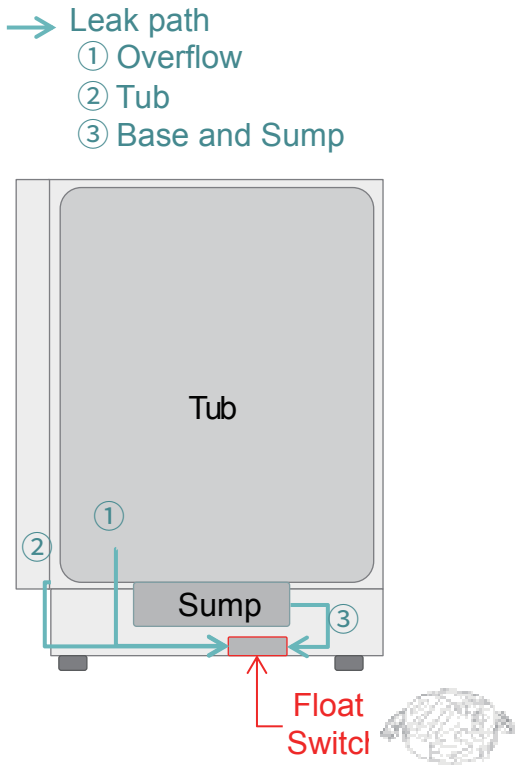
Error Message

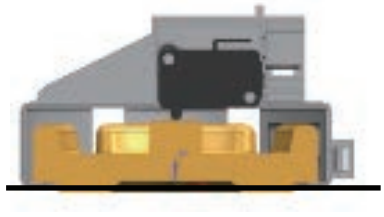
Error massage	Detecting zone	Detecting condition	Operation	Cause	Solution
THERMAL ERROR  displayed Condition Thermistor resistance output abnormal	Power On	When the Thermistor is defective	All loads are turned off.	1. Wiring connection is OK? 2. The Thermistor is OK?	1. Check and reconnect the wire. 2. Check the electric resistance of Thermistor
HEATER ERROR  displayed Condition The water is not heated or the termperature in the Tub overheated to over 194˚F	Main Wash /Heating Rinse	When the temperature before or after the heater check process is less than 50°F.	The process proceeds with the heater not operating.	1. Wiring connection is OK? 2. The Inlet Water Temperature is very high. 3. The Thermistor is damaged. 4. Heater is OK? 5. The Controller is damaged. 6. The Relay Circuit is OK?	1. Check and reconnect the wire. 2. Check the temperature. ① If the temperature is displayed, adjust the Inlet Water Temperature to 120°F. 3. Check the electric resistance of Thermistor. 4. Check the electric resistance of Heater. Replace the Casing Assembly, Pump assembly. 5. Replace the Controller. 6. Replace the Relay Circuit.
	Main Wash	When the temperature is above 194°F for 30 seconds	All loads are turned off.		
	Power On	221°F ≤ temperature ≥ 239°F	All loads are turned off.		
MOTOR ERROR  displayed Condition THE Motor is workingabnormally	When the Washing Motor is Operating	the washing motor is defective.	All loads are turned off.	1. Wiring connection is OK? 2. The Impeller of Washing Pump is locked. 3. Is the Washing Motor is OK? 4. The Controller is damaged.	1. Check and reconnect the wire 2. Replace the Casing Assembly, Pump assembly. 3. Check the electric resistance of Washing Motor. 4. Replace the Controller.
VARIO ERROR  displayed Condition The heat air dry motor is working abnormally.	LQC Control Mode	When the Vario location fails to reset within 1 minute of entering Control Mode	All loads are turned off.	1. Wiring connection is OK? 2. Does the vario S/W assembled properly? 3. Is the vario motor operated properly? (range is 12-15)	1. Check and reconnect the wire. 2. Reassemble vario S/W. 3. Replace the vario motor.
	When all courses begin to operate	When the Vario location fails to reset within 2 minutes of starting the process	After the Washing Motor operate at 1700 RPM, all loads are turned off.		
HEAT AIR DRY FAN MOTOR ERROR  displayed Condition The heat air dry motor is working abnormally.	Hot air drying	the Fan Motor is defective.	The Heater and Fan Motor are not operating.	1. Wiring connection is OK? (Fan Motor and Controller) 2. The Impeller of heat air dry Fan is locked. 3. Is the Controller damaged?	1. Check and reconnect the wire. 2. Replace the heat air dry assembly. 3. Replace the Controller.
HEAT AIR TEMPERATURE SENSOR ERROR  displayed Condition Heated air th	Hot air drying	the Thermistor is defective.	The Heater is not operating.	1. Wiring connection is OK? 2. The Thermistor is OK?	1. Check and reconnect the wire. 2. Check the electric resistance of Thermistor.

■ Troubleshooting Methods

1. AE error

If a leak occurs inside the product, an 'AE' error is caused by the float switch to prevent safety and additional damage. When a leak occurs within the product, it falls into the Base and the water collects into the float switch. And the float switch detects a water leak in the Base, stops the product, and repeats drain operation. If it is not properly installed or leaks from the door, it may leak to the outside of the product, and no error occurs at this time. When repairing leaks and AE errors, the leak point must be accurately identified and tested.



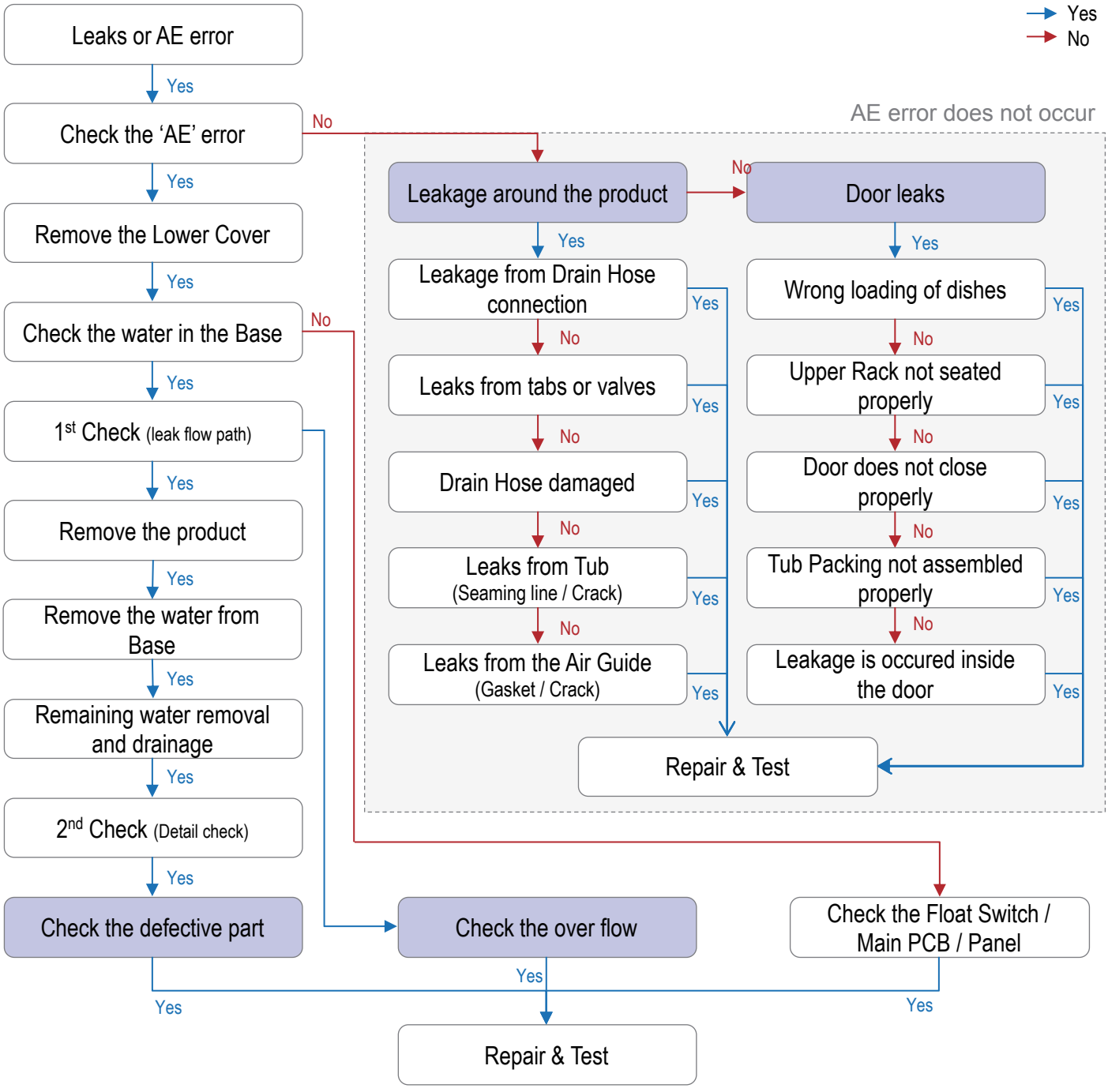


[Normal]



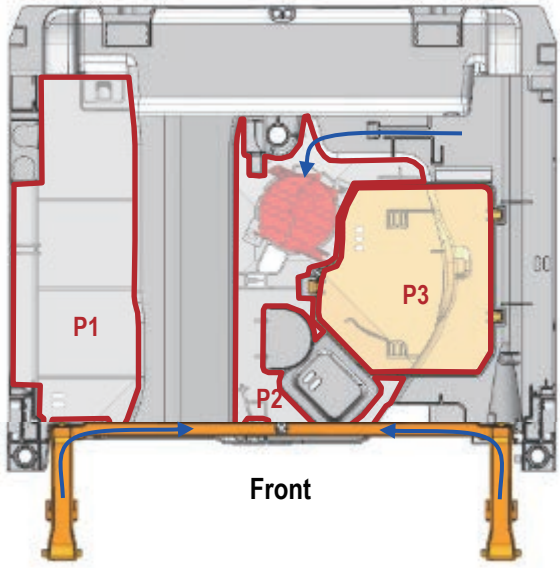
[AE error]

1) Inspection and repair flow chart



2) Base flooding position by leaks point

- Check the location of the flooding in the Base during the first diagnosis, and then check the expected defective parts.



Flooding position	Flow path	Defective symptoms	Defective part & Cause
P1	left barrier	Leakage on the floor	• Air Guide • Inlet Valve • Drain Hose • Casing Assembly, Heater
P2	Middle barrier	AE error	• Overflow • Vario Motor • Drain Hose (Sump & Air Guide) • Sump gasket
P3	Right barrier	Leakage on the floor	• Casing Assembly, Pump (Washing motor) • Casing Assembly, Pump (Hose) • Steam Hose
Etc	Outside	Leakage on the floor	• Inlet/Drain Hoses • Tap or T-valve • Drain pipe

*P1,P3 has holes in the Base to prevent flooding for the safety of parts and products in the event of a water leaks.
So water flows out of the product without being completely flooded. During the first inspection, check the leak path by looking at the traces of water in the Base.

3) ‘AE’ error Inspection process

Check the ‘AE’ error



Make sure the display shows an ‘AE' error.

Remove the product



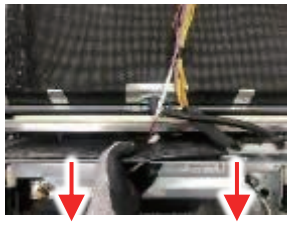
Remove the Power Cord for product testing.

Remove the Lower Cover



Remove the 2 screws and remove the Lower Cover.

Remove the Lower Frame



Refer to 7. **How to Disasamble** to remove the Lower Frame.

Check the water in the base



Check if there is a leakage inside the product by using a flashlight.

1st Check (leak flow path)



Use a flashlight to check the location of the Base inundation.

Remove the water from Base



Remove water from the Base of the product.

2nd Check (Detail inspection)



Reconnect the Power Cord and operate the product.

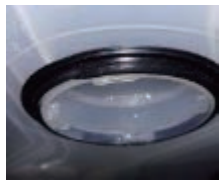
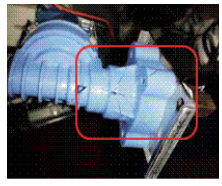
Check the location of the leakage based on the location of the first checked.

Repair & Test



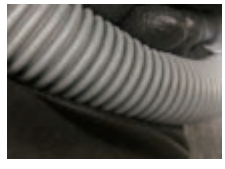
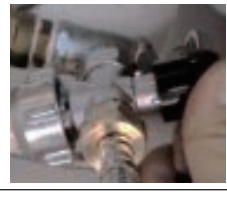
Repair the product and test the product by run a course.

4) Defect cause and Solution

Place of leakage	part	Reason	Flooding Position	Normal	Abnormal	Solution
Tub	Air Guide	The cap was not properly assembled.	P1			Reassemble it If the gasket is damaged, replace the parts.
		The Drain Hose was not properly assembled.	P1 or Outside			If the Drain Hose is reassembled, a leakage may occur due to deformation of the O-ring. When reassembling, the O-ring of the Drain Hose must be replaced with a new one.
	Tub	The seaming weld line damaged.	Outside			Replace the product.
Base	Inlet Valve	The connector was cracked.	Outside			Replace the part.
		The O-ring was damaged.	P1			Replace the part.
		The body of valve was cracked.	P1			Replace the part.

Place of leakage	part	Reason	Flooding Position	Normal	Abnormal	Solution
Base	Sump	The Sump gasket was damaged	P1, P2, P3			Replace the part.
		The hose was not properly assembled (Sump & Casing Assembly, Pump)	P3			Reassemble it.
		The connector was cracked	P3			Replace the part.
		The O-ring was damaged	P1			Replace the part.
		The body of valve was cracked	P1			Reassemble it.
	Drain Pump	The Sump gasket was damaged	Outside			Reassemble it If the part is damaged, replace it.
	Heat Drying	The nut was not properly assembled or damaged	P1			Reassemble it If the part is damaged, replace it.

Place of leakage	part	Reason	Flooding Position	Normal	Abnormal	Solution
Door	Doorliner	Blower Cover was not properly assembled, Gasket damaged	P1, P2, P3			Reassemble it, If the part is damaged, replace it
		Duct assembled not properly	P3			Reassemble it
		Dispenser assembled not properly	P3			Reassemble it If the part is damaged, replace it
	Tub	The sponge was detached from the Tub lower	Outside			Reassemble it
		The door gasket was disassembled or torn from the door	P2 Outside			Reassemble it If the part is damaged, replace it
		The Tub gasket damaged or disassembled	Outside			Reassemble it If the part is damaged, replace it

Place of leakage	part	Reason	Flooding Position	Normal	Abnormal	Solution
Overflow	Misuse	Upper spray arm does not spray water normally due to the blockage of the wrong dish loading.	P2			Explain the correct way to load the plates.
	Misuse	The wrong loading of the tableware interferes with the door and does not seal the door	P2			Explain the correct way to load the plates.
	Water Guide	The connecter has damaged	P2			Replace the part
	Nozzle	Nozzle detached from the rolling part of lower spray armTub packing does not seal the door properly	P2			Replace the part
	Leveling	Tub packing does not seal the door properly	Outside			Re-level the dishwasher
Etc	Drain Hose	Drain Hose damaged	Outside			Replace the part
		Drain Hose was removed from drainage	P2 Outside			Reassemble it
	Inlet Hose	The water supply hose was not properly connected	Outside			Reassemble it

2. FE error

→ Yes
→ No

FE error is displayed

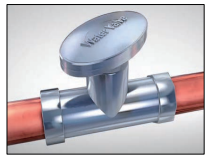
Yes

Check the water supply

Is the water supply still working if the product is not working?

Yes

Replace the Inlet Hose

The valve is closed, but the debris is causing leakage. Replace the Inlet Hose.

No

Check the frequency

Does the frequency increase when water is supplied?

Yes

Check the Hall Sensor




1) Check the wire connection

2) Check the Resistance

- The Resistance is 9KΩ ± 5%.
  (If is not, replace the Hall Sensor)

No

Check the Main PCB

No

Replace the Main PCB

Replace the Main PCB.

Check the Voltage from the Main PCB to the Hall Sensor.
(The Voltage is DC 5V±15%)

3. IE error

Yes
No

Check the water tap

Is the water tap opened?

No

Open the water tap

1) Open the water tap





Yes

Check the Inlet Hose

Is the Inlet Hose kinked?

Yes

Repair the Inlet Hose

1) Repair or straighten the Inlet Hose



No

Check the water supply

Is water supplied to the unit?

Check the Valve and Main PCB

Is housing connected?

No

Reconnect the wire and check the Inlet Valve resistance

1) Reconnect the wire

2) Check the Inlet Valve Resistance

- The resistance is 25Ω ± 5%







Yes

Yes

Check the inside of Valve

Is housing connected?

Yes → **Clean the filter of inlet value**

1) Clean the filter of inlet valve

(1) Close the water tap
(2) Unscrew the Inlet Hose.(Inlet valve side)
(3) Clean the filter of inlet valve



No ↓

Check the water pressure

Is the water pressure very low or high? (20~80 psi is the proper pressure)

Yes → **Adjust the water pressure**

1) Call the plumber and adjust the water pressure (20~80 psi)

No → **Check the Main PCB Assembly**

1) WH6 Pin5 ~ Pin6

- The voltage is 8V DC ± 15% (If not, Replace the Hall Sensor)

2) WH5 Pin4 ~ NA8 Pin1

- The Voltage is 5V DC ± 15%(If not, Replace the Main PCB Assembly)



Yes ↓

Check the frequency

Does the frequency increase when water is supplied?

No ↓

Check the Hall Sensor

Is Hall Sensor OK?

No → **Check the Hall Sensor**

1) Check the wire connection

2) Check the Resistance

- The Resistance is 9KΩ ± 5%

(If is not, Replace the Hall Sensor)





Yes ↓

Check the Air Guide

Is the impeller of air breaker spinning properlyt?

No → **Replace the air breaker**

1) Replace the air breaker

Yes → **Check and replace the Main PCB assembly**



4. OE error

Yes
No

Check the Filter, Air Gap & Disposal

Is the Filter, Air Gap & Disposal clogged?

Yes

Filter

Is the Filter clogged?

Yes

Clean the Filter

1) Clean the filter



No

Air Gap

Is the Air gap clogged?

Yes

Clean the Air Gap

1) Clean the air gap



No

Disposal

Is the Disposal clogged? or Is there knock out Plug in the disposal?

Yes

Clean the Disposal or Remove the knock out plug

1) Clean the disposal
2) Remove the Knock out Plug



No

Check the Drain Hose

Is the Drain Hose Kinked? Twisted? Stressed?

Yes

Straighten the Drain Hose

1) Straighten the Drain Hose
- Be careful not to kink, pinch, crush or stress the Drain Hose



2) Gradually slide the dishwasher into the opening
- As you slide the dishwasher into the opening, slowly pull on the Drain Hose from inside the cabinet to take up some slack.



No

Check the Drain pump & Main PCB

Has Drain pump RPM increased?

No

Drain pump

Is Housing connection intact?

No

Make sure the housing connection is intact

1) Housing connection
- If housing is not connected, please connect the housing



Yes

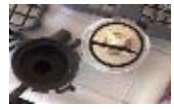
Drain pump

Is it stuck by debris?

Yes

Remove the debris

1) Rotation constrained by debris
- Remove the debris



No

Drain pump

Is Resistance 4 ~ 5Ω?

No

Replace the drain motor

1) Operating
- The Drain pump Resistance is 4 ~ 5Ω



Yes

Main PCB

Is Housing connection intact?

No

Make sure the housing connection is intact

1) Housing connection
- If housing is not connected, please connect the housing



Yes

Main PCB

Is voltage 12V AC ± 15%?

No

Replace the Main PCB

1) Operating
- Main PCB Voltage is 12V AC ± 15% (YL3 Pin 1~2~3)



Yes

Check the Casing ASM, Pump

Is it working properly?



No

Yes

Replace the Casing ASM, Pump

Replace the Main PCB

5. bE error

→ Yes
→ No

Check the detergent

Is the detergent for dishwasher only?

Yes

No → **Make sure customers use proper detergent**

1) Only use detergents which are designed for dishwashers
2) Remove suds and soap residue
- Pour milk in a bowl and place on the upper rack. Run a cycle



Check the initial water level

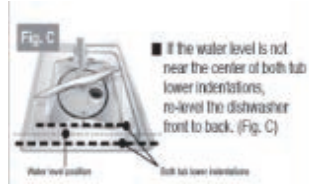
Is the water level not near the center of Tub lower indentations?

Yes

No → **Level the appliance**

1) Level the appliance

2) Check water level again after initial filling on Normal cycle
- Please refer to the right picture



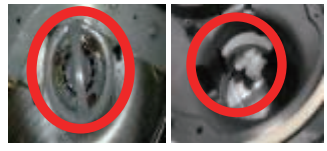
Check the Filter / Pump clogging

Is the Filter / Pump clogged?

No

Yes → **Clean the filter / pump**

1) Clean the filter / pump and remove any debris



Check the Top Wash Impeller

Is it damaged or assembled impropelry?

No

Yes → **Reassemble or Replace the Top Wash Impeller**

1) When the Top Wash Impeller assembled improperly
- Reassemble the Top Wash Impeller

2) When the Top Wash Impeller is damaged
- Replace the Top Wash Impeller



Check the lower Spray Arm and Water guide

Is it damaged or assembled improperly?

No

Yes → **Reassemble or Replace the Lower Spray Arm and Water Guide**

1) When the Lower Spray Arm ~ Water Guide assembled improperly
- Reassemble the Lower Spray Arm and Water Guide

2) When the Lower Spray Arm and Water Guide are damaged
- Replace the Lower Spray Arm and Water Guide

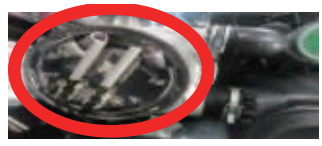


Check the Casing Assembly, Pump

Is the Casing Assembly Pump(Washing motor) defected?

Yes → **Replace the Casing Assembly, Pump**

1) Replace the Casing Assembly, Pump



6. tE error

Yes
No

Check the Thermistor

Is it working properly?

No → **Reconnect the wire and replace the Thermistor**

1) Reconnect the wire

2) Replace the Thermistor

- The Resistance is 8~44KΩ.
  (If is not, replace the Hall Sensor)



You can measure and replace the Thermistor after the Main PCB has been removed from the Base.

Yes

Check the Main PCB

The Thermistor is working properly, but tE error occurs.

Yes → **Reconnect the wire and replace the Main PCB**

1) Reconnect the wire

2) Replace the Main PCB

- If the Voltage is poor, replace it.



RD6 Pin3 & NA8 Pin3
Voltage : DC 1~3V

7. HE error

→ Yes
→ No

Check Heater operation

Is the heater not operating during course or Control Mode?

No

Yes

Heater (Casing assembly, Pump)

Heater does not operate normally

No

Yes

Check the heater of Casing Assembly, Pump

1) Reassemble the Heater Connector
- Reassemble the Heater Connector when the Heater connector is removed or not connected properly.



2) Replace the Casing Pump(Heater)
- Replace the Casing Pump when heater, fuse or thermostat is shorted.
- If the fuse and thermostat are not connected properly, replace the Casing Pump

Main PCB

Main PCB does not operate normally.

No

Yes

Check the Main PCB

1) Reassemble the Main PCB connector
- Reassemble the Main PCB connector when the Main PCB connector is removed or not connected properly.



2) Main PCB replacement
- If the measured value of the output voltage of the Main PCB is bad, replace the Main PCB .
(output voltage : AC110~120V)

Check the temperature of the water supplied

The temperature of the supplied water is higher than 85˚C.

Yes

Replacement of water supply pipes (hot water → cold water)

1) Replacement of water supply pipes
- After entering the Control Mode, supply water and check the temperature of the Sump.
- If hot water is supplied when the temperature of the Sump is measured, replace the water supply pipe.

8. LE error

→ Yes
→ No

Check the operation of the Washing Motor

Is the Washing Motor not operating during course or Motor Control Mode?

No

Yes

Washing Motor

The Washing Motor is not running.

Yes

Check the Washing Motor of Casing Assembly, Pump

1) Reassemble the Washing Motor connector
- Reassemble the Washing Motor connector when the Main PCB connector is removed or not connected properly.

2) Replace the Casing Assembly, Pump
- If the measured value of the Washing Motor's resistance is not within the range, replace the Washing motor. (resistance : 22.5~24.9Ω / Based on room temperature 20˚C)

No

Main PCB

Main PCB does not operate normally.

Yes

Check the Main PCB

1) Reassemble the Main PCB connector
- Reassemble the Main PCB connector when the Main PCB connector is removed or not connected properly.

2) Replace the Main PCB
- If the measured value of the connector's resistance value is defective, replace the Main PCB.





No

Check the Washing Motor is restrained

The Washing Motor is restrained by debris and does not operate.

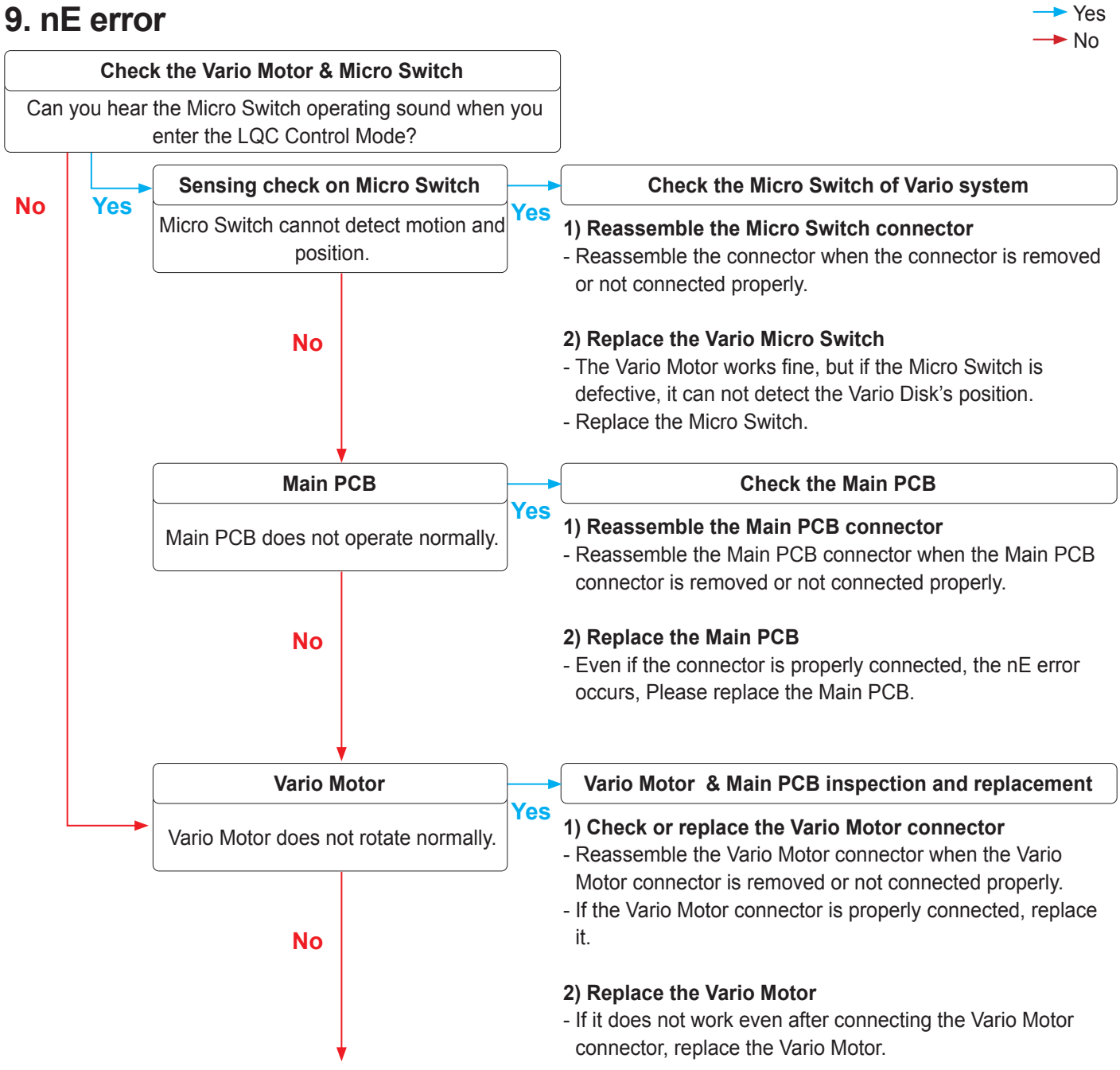
Yes

Replace the Casing Assembly, Pump

1) Replace the Casing Assembly, Pump
- If there is no abnormality in the resistance value of the Washing Motor and the Main PCB,
- the casing pump may not operate due to debris. If so, replace the casing pump.

* Abnormal noise or IE, bE, LE, and OE errors may occur if debris are stuck in the Washing Motor

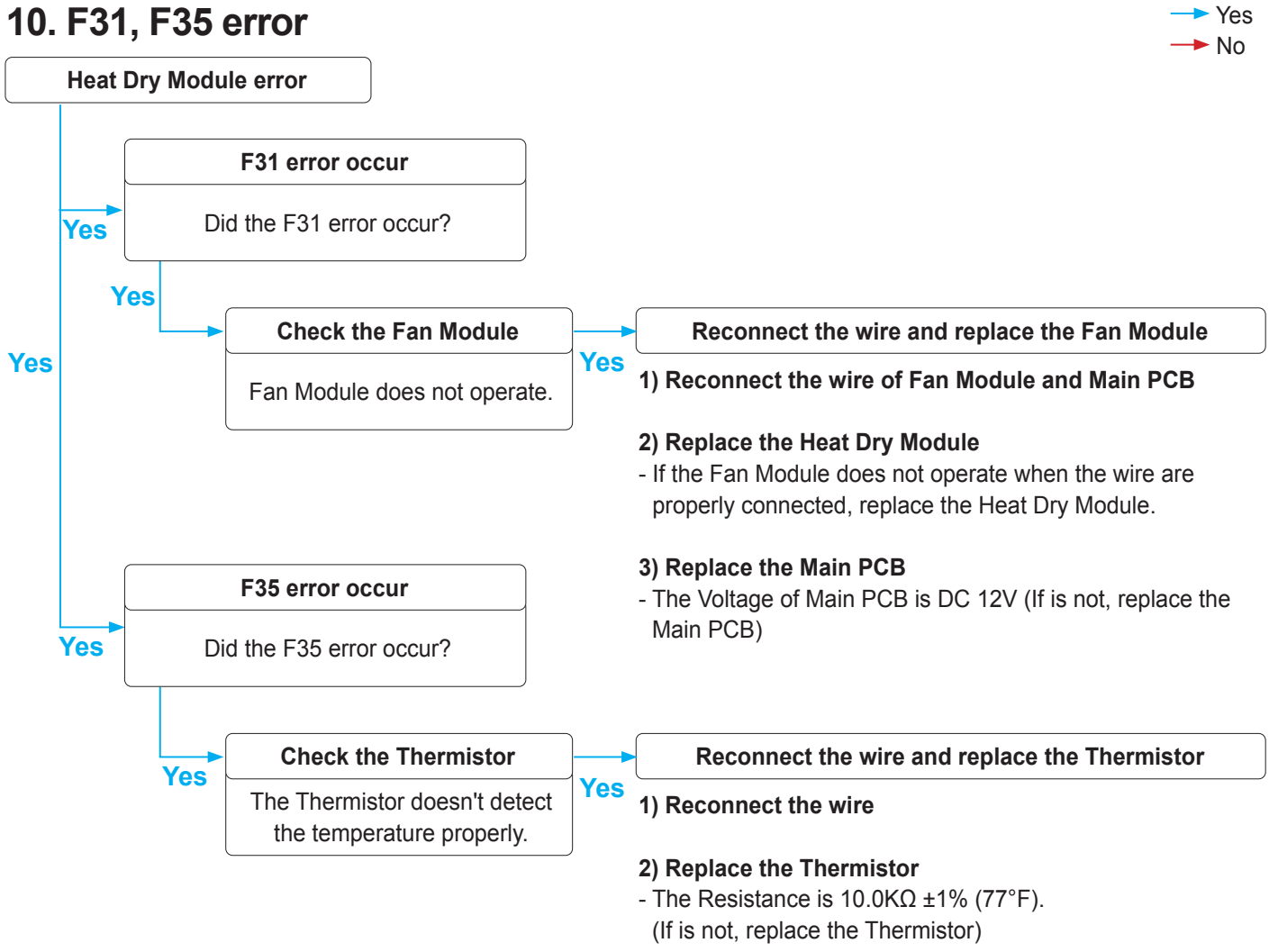
9. nE error



How to check the operation of Vario Motor and Micro Switch

- When entering the LQC Control mode, the Vario Motor operates and the position of the Vario is automatically initialized (initial position: Lo).
- Check the sound of the Micro Switch operating at the back of the product

10. F31, F35 error



11. No power & Not working

No error codes for power or non-functional faults. There are many intermittent defects, so it is difficult to check the defect during the test. Various defective symptoms appear and various parts are related, so accurate symptom confirmation is required. There are various fault symptoms and various parts are associated, so accurate symptom check is required.

1) Failure symptoms by part

Part	Failure symptoms	Solution
Control Panel (Display PCB)	• The Display is lights up and makes a beep sound, but the button does not recognize it	Replace the part.
	• After completing the operation, the power will not turn on when the product is restarted	
	• It turns off intermittently during operation	
	• Button not recognized properly	
	• Beep or display blinks even when not in use	
Main PCB	• The product will not power on	Replace the part.
Door Latch	• It turns off intermittently during operation	Replace the part.
	• Power is turned off at a certain point in operation	
Environment	• The product will not power on	Check and guide the power supply environment.
	• Power is turned off at a certain point in operation	
Etc (Misuse)	• Display shows "CL" and button not pressed	Describe the control lock function.
	• Display shows “- - -" and the drain pump works	Describe the cancel function.

2) Repair methods by defect symptom

► The power button is not recognized

Check point	Solution
Is the cause of the defect an environmental factor? **Yes**	• Blackout • Circuit breaker • Outlet voltage instability, wiring problem • Power strip problem
No ↓	
Isn't the connector connected properly? **Yes**	• Power Cap • Display PCB connector • Main PCB connector • Noise Filter connector
No ↓	
Does the LED lamp on the Main PCB light up when the power cord is connected? **Yes**	**[LED On : Main PCB & Noise Filter OK]** If the LED lamp is on the Main PCB, there is no problem in supplying power to the Main PCB. **Replace the Control Panel.** If the panel has been replaced and still there is no power, there is a problem with the Main Harness. Replace the Main Harness
No ↓	
Replace the Main PCB or Noise Filter **Yes**	**[LED Off : Need to check the Main PCB & Noise Filter]** First, **replace the Main PCB and check if the LED lamp is illuminated.** If the LED lamp does not illuminate after replacing the Main PCB, replace the Noise Filter



[Circuit breaker]



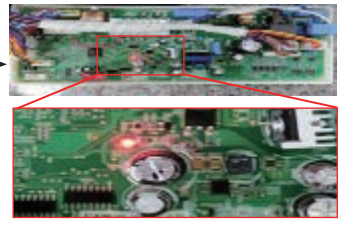
[Outlet]



[Power strip]







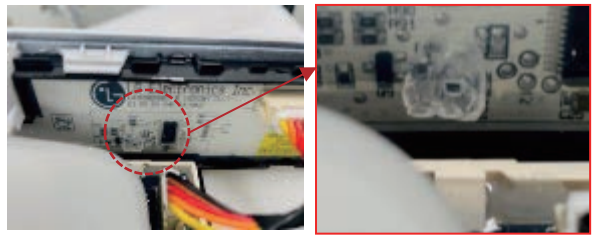


► After the operation of the product is completed, the power will not turn on when the product is restarted

Check point	Solution
Does it power on aftering disconnecting and reconnecting the power cord? → Yes	• Control panel
No → See the no power description.	

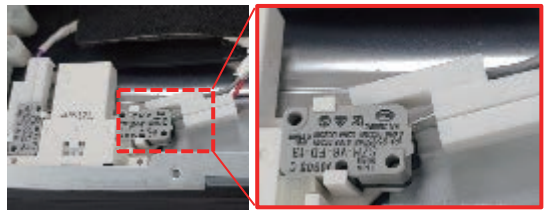
Replace the Control Panel assembly

Display PCB internal damage causes no power on



Part	Loc No.
Panel Assembly, Control	**K200**

► Dishwasher turns off intermittently

Check point	Solution
Does the Display show "- - -" and and the drain pump work Yes	• Cancel feature
	Explain the cancel feature to customers The display shows --- when the cancel function is operated by pressing the start button for 3seconds
	
No	
Does the door interfere with the Upper Rack or tableware? Yes	• Upper Rack height position (Left/Right) • Tableware loading status
	Adjust the Upper Rack so that it is horizontal If the left and right heights are different, the Upper Rack may not be seated properly in the Water Guide and may interfere with the door **Explain how to load the dishes**
 	
No	
Is it not recognized that the door is closed when it is closed? Yes	• Latch
	Adjust the connector or Replace the Latch assembly Replace the latch if the door closing is not detected even if the connector is properly assembled.
	
	※ If the top of the Tub is lifted and deformed, the door may not be recognized as closed.
No	
• Control Panel	**Replace the Control Panel** Display PCB internal moisture penetration causes key malfunction to power off

► Turns off at a certain points during operation

Check point	Solution
Did the cancel function work? **Yes**	• Press the start button for more than 3 seconds to check if the cancel function has been activated.
No	
Is it not recognized that the door is closed when it is closed? **Yes**	• Latch ※ If the top of the tub is lifted and deformed, the door may not be recognized as closed.
No	
Are there any signs of a short in the Heater? **Yes**	• Casing assembly,Pump (With heater)
No	
	• Control Panel

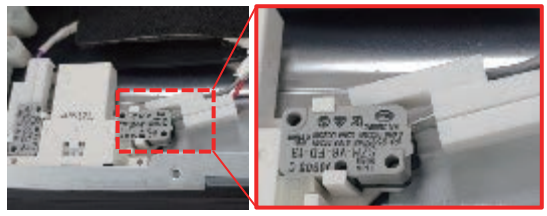
Explain the cancel feature to customers



The display shows --- when the cancel function is operated by pressing the start button for 3seconds

Replace the Latch assembly

Replace the Latch if the door closing is not detected even if the connector is properly assembled.



Replace the Casing Assembly, Pump

1) If the protective cover of the casing assembly is removed, causing a short circuit.
2) If the Washing Motor is damaged due to a leak in the Casing Assembly, pump



In order to improve the removal of the protective cover,
it was changed to a bolt fastening type in sep-2020

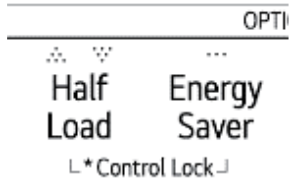
Replace the Control Panel assembly

Display PCB is damaged due to moisture inflow through the silicone coating gap

► ‘CL’ is displayed on the display window and the button is not working.

Check point	Solution
Control lock is set — Yes →	• Option settings

Explain the control lock feature to customers



Explain the control lock feature to customers

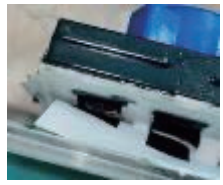
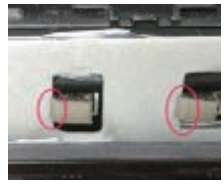
► Touch button is not recognized Beeps or display flickers whether or not it is in use

Check point	Solution
Check the detailed symptoms from the customer → Yes	• Control panel

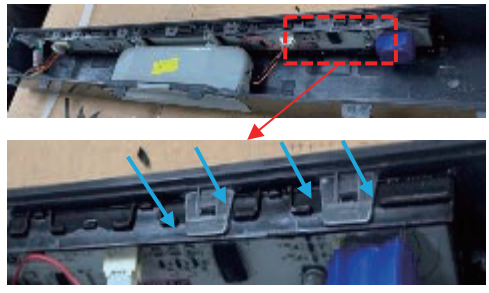
Difficult to check easily in the field due to intermittent defects

Replace the Control Panel assembly

1) When attaching the Display PCB to the panel, the touch pad does not transmit signals properly due to poor assembly

2) In case the Display PCB is damaged due to moisture inflow through the silicone coating gap



12. Not Clean

No error codes for Not Clean problem.

Various parts are related, so accurate type of not cleaning confirmation is required.

This SVC bulletin summarizes the not clean caused by each reason. Check and replace the affected parts and explain customer how to use the dishwasher

1) Type of Not cleaning

Type of Not Cleaning	Failure Cases	Solution
Food particles remains	• Nozzle or Casing ASM, pump has problem	Replace the parts
	• Loading dishes improperly	Explain customer how to load dishes properly
	• Filter clogged	Clean the filter
	• Customer doesn't scrap	Recommend customer to scrap
White stain	• Hard water	Give some tips for customers
	• Too much detergents	Make customer not use too much detergents
Detergents remains	• Put detergents with wet hands	Make customer put detergents without wet hands
	• Dispenser problem	Replace the parts
Bubble remains	• Using dish soap or too much detergnets	Make customer not use dish soap or too much detergents

※ Before or After SVC, Give some tips to all the customers

1) Change detergents

- If Customer is using Liquid or Powder type detergent, Guide them to use Tablet or Gel type detergent

2) Change the cycles

- If customer typically uses “Normal“ cycles, recommend “Auto”, “Heavy” and also recommend “High Temp” options
- If customer typically uses “Turbo”, “Express”, “Delicate”, “1 Hour”, “Refresh” cycles, recommend “Normal” or “Auto” cycles
- Guide customer that they don’t use some options like “Dual Zone”, “Half load”, “Flex Zone”, “Energy Saver” as possible

3) Using the Rinse Aid

- A rinse aid helps instead of water forming droplets, clinging to surfaces and leaving behind spots, it just rolls right off your dishes leaving them nice and clean.

4) Run a Hot Water

5) Use the Machine Clean

- Use the Machine Clean with dishwasher cleaner



Dishwasher cleaner

2) Food particles remains

► Cause

1. Nozzle has problem

- Lower Spray Arm disassembled by dishes constraint





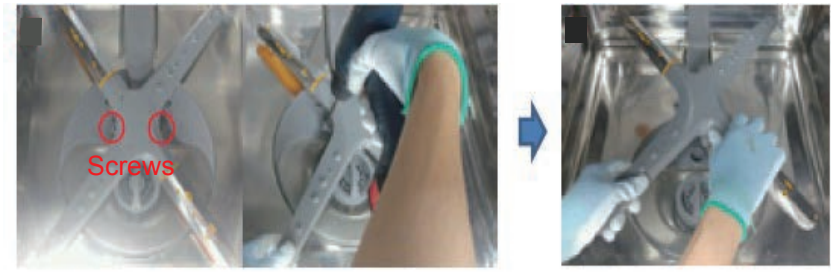
► Solution

1. How to check the nozzle

- Check the Lower Spray Arm is broken or doesn't rotate well

2. How to replace the part

- SVC Loc no. : A050
- How to disasssemble



(1) Remove the 2 screws on the Lower Spray Arm.

(2) Pull up the Lower Spray Arm and remove.

(3) When assembling, assemble in the reverse order of disassembly.

Failure Cases

1. Nozzle has problem

• Upper Spray Arm disassembled or interfere with rack







Solution

1. How to check the nozzle and replace the part

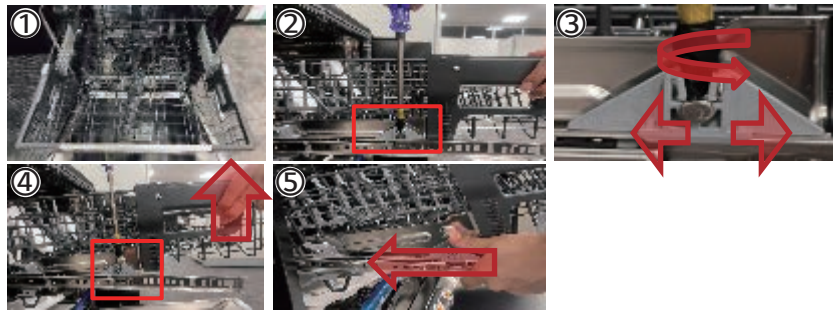
1) Check the Upper Spray Arm is broken or doesn't rotate well

2. How to replace the part

1) SVC Loc no. : A150(Upper Rack Assembly)

2) How to disassemble

■ **Glide Rack**



(1) Pull out the Upper Rack.

(2) Place a flathead screwdriver into the hooks on the front of the rack.

(3) Spin a flathead screwdriver to open the front hooks.

(4) With the front hooks open, pull the rack upward.

(Repeat steps ② and ③ on the other side.)

(5) Slide the Rack in the direction of the arrow to disassemble the Rack from Rail.

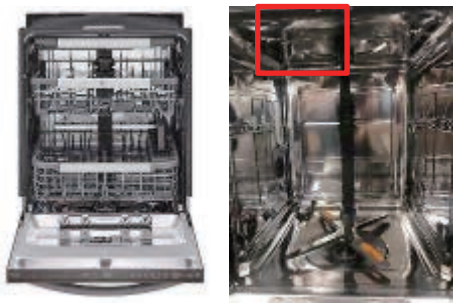
■ **General Rack**

(1) Pull out the Upper Rack until it get off from the rail

Failure Cases

1. Nozzle has problem

- Top Wash Impeller was broken





Solution

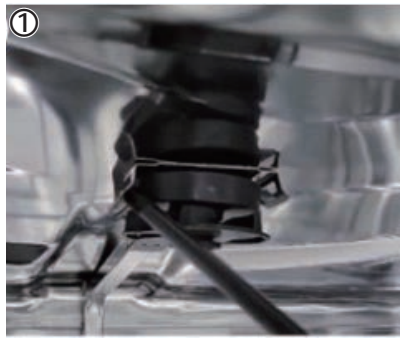
1. How to check the nozzle

1) Check the Top Wash Impeller is broken

2. How to replace the part

1) SVC Loc no. : F192

2) How to disassemble



(1) Use a tool to loosen the brackets on the left and right sides of the Top Wash Impeller.

(2) When assembling, assemble in the reverse order of disassembly.

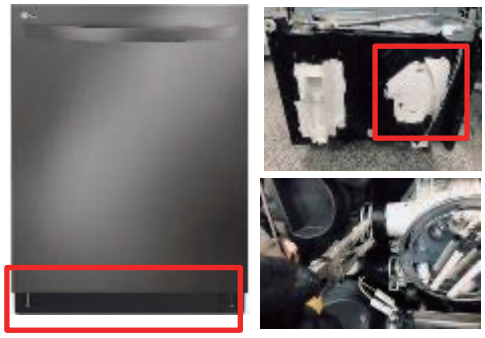
Type of Not Cleaning

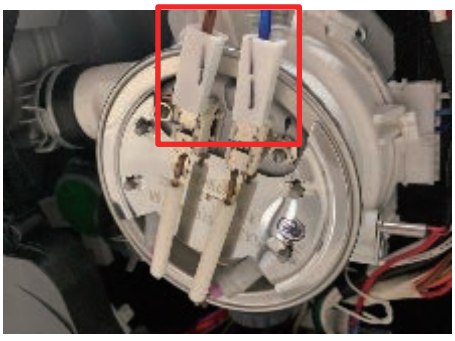
- **Food Particles remains**
  - Nozzle or Casing ASM, Pump has problem
  - Load dishes improperly
  - Filter clogged
  - Customer doesn't scrap
- **Detergents remains**
  - Dispenser problem
  - Put detergent with wet hands
- **Bubble remains**
  - Use dish soap, too much detergents
- **White stain**
  - Hard water
  - Too much detergents

Failure Cases

1. Casing ASM, Pump has problem

- Casing ASM, Pump does not work





Solution

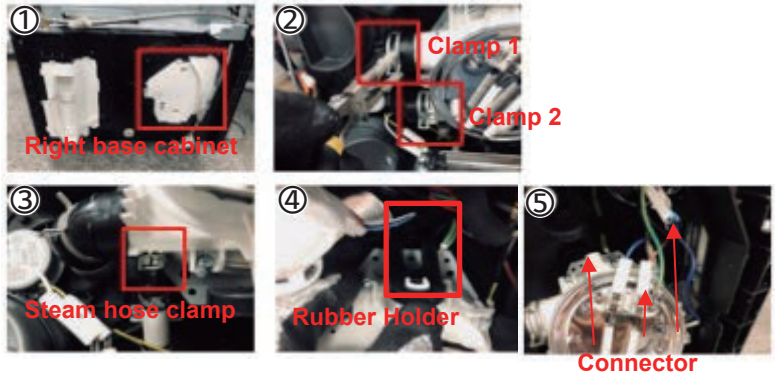
1. How to check the Casing ASM, Pump

1) Turn on the unit, then start “Normal” cycle

2) Wait for a moment, then check the water spray sound

2. How to replace the Casing ASM, Pump

1) Refer to the below for the replacement(SVC Loc no. : M030)



(1) Lay the unit back and open the hooks to remove the right base cabinet.

(2) Remove the clamp on the hose connecting the Casing Assembly, Pump to the Sump.

(3) Remove the steam hose clamp.

(4) Remove the rubber holder that the Casing Assembly, Pump.

(5) Remove all wires connected to the Casing Assembly, Pump, then remove the Casing Assembly, Pump.

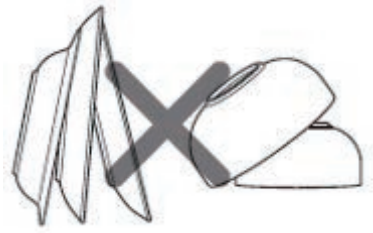
(6) When assembling, assemble in the reverse order of disassembly.

Type of Not Cleaning

- **Food Particles remains**
  - Nozzle or Casing ASM, Pump has problem
  - Load dishes improperly
  - Filter clogged
  - Customer doesn’t scrap
- **Detergents remains**
  - Dispenser problem
  - Put detergent with wet hands
- **Bubble remains**
  - Use dish soap, too much detergents
- **White stain**
  - Hard water
  - Too much detergents

Failure Cases

1. Packed dishes together

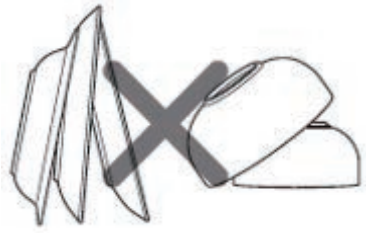


2. Utensils interfere the nozzle

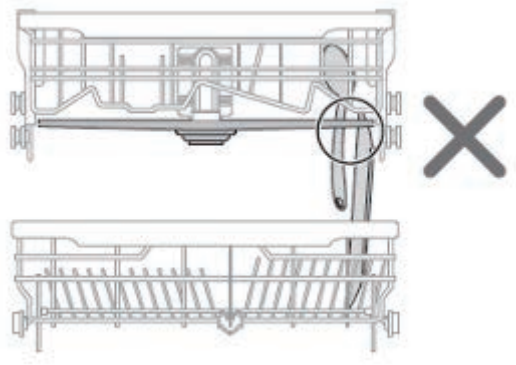


Solution

1. Make customer does not packed dishes together



2. Make customer load dishes does not interfere the nozzle



Type of Not Cleaning

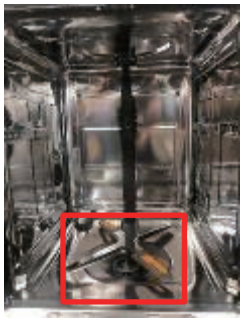
- **Food Particles remains**
  - Nozzle or Casing ASM, Pump has problem
  - Load dishes improperly
  - Filter clogged
  - Customer doesn't scrap
- **Detergents remains**
  - Dispenser problem
  - Put detergent with wet hands
- **Bubble remains**
  - Use dish soap, too much detergents
- **White stain**
  - Hard water
  - Too much detergents

Failure Cases

1. Filter clogged

- For best wash performance, clean the filter after each load.







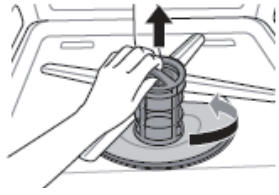
Solution

1. How to clean the filter / Run Machine clean cycle

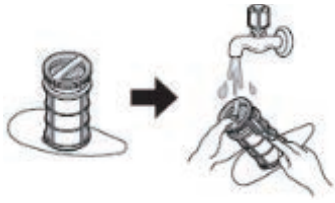
1) Remove the lower rack and position the bottom spray arm so a wider vee is open to the front.



2) Turn the inner filter counter-clockwise and take out the assembled inner filter and stainless steel filter.
With the filters removed, check the sump opening and remove any foreign materials, if needed



3) Clean the filters with a soft brush under running water. Reassemble the filters before reinstalling them.



Type of Not Cleaning

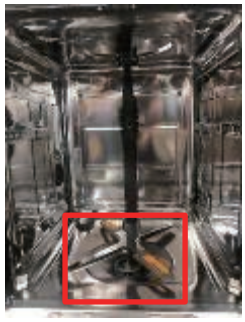
Food Particles remains	**Detergents remains**
Nozzle or Casing ASM, Pump has problem	Dispenser problem
Load dishes improperly	Put detergent with wet hands
Filter clogged	**Bubble remains**
Customer doesn't scrap	Use dish soap, too much detergents
White stain	
Hard water	
Too much detergents	

Failure Cases

1. Filter clogged

- For best wash performance, clean the filter after each load.



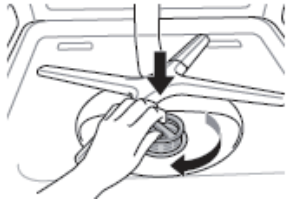




Solution

1. How to clean the filter / Run Machine clean cycle

4) To replace the assembled filters, position the spray arm so the wider vee is toward the front. Fit the filters back into the filter holder and secure them by turning the inner filter clockwise unitl it clicks into place.



5) Run Machine clean cycle using dishwasher cleaner. Refer to the photos below for recommended cleaner.







Type of Not Cleaning

- **Food Particles remains**
  - Nozzle or Casing ASM, Pump has problem
  - Load dishes improperly
  - Filter clogged
  - Customer doesn't scrap
- **Detergents remains**
  - Dispenser problem
  - Put detergent with wet hands
- **Bubble remains**
  - Use dish soap, too much detergents
- **White stain**
  - Hard water
  - Too much detergents

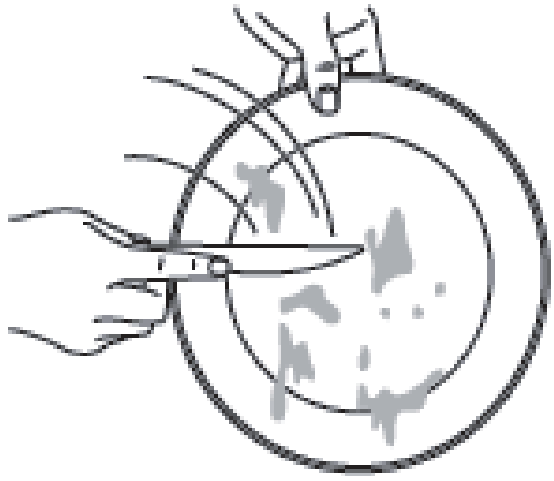
Failure Cases

1. Customer doesn't scrap

- If large food particles are not removed, it can lead to a decrease in washing performance and clogging of the drain.

Solution

1. Recommend customer to scrap before running cycle



Type of Not Cleaning

- **Food Particles remains**
  - Nozzle or Casing ASM, Pump has problem
  - Load dishes improperly
  - Filter clogged
  - Customer doesn't scrap
- **Detergents remains**
  - Dispenser problem
  - Put detergent with wet hands
- **Bubble remains**
  - Use dish soap, too much detergents
- **White stain**
  - Hard water
  - Too much detergents

Failure Cases

1. Hard water

- Hard water means water that contains a lot of calcium or magnesium ions. When Hard water evaporates, minerals remain on the surface causing white stains.(If you need more information. Refer to the next page)





Type of Not Cleaning

Food Particles remains	**Detergents remains**
Nozzle or Casing ASM, Pump has problem	Dispenser problem
Load dishes improperly	Put detergent with wet hands
Filter clogged	**Bubble remains**
Customer doesn't scrap	Use dish soap, too much detergents
White stain	
Hard water	
Too much detergents	

Solution

1. Give some tips to the customer

1) Use detergent tablets with water softening ingredients or use a water softening device.
2) If you are not using rinse aid, we recommend using rinse aid for better performance.
3) If you prefer not to use a tablet type of detergent, use a wash booster like Lemi Shine, Glisten, or Finish Magic. For powder detergent, it is recommended to use the appropriate amount of 15g. Additionally, using gel detergent is recommended.
4) What we need to do is get a dishwasher cleaner and run basically a cleaning cycle in the dishwasher.
5) If customer ask about white stain, Explain them refer to next page



detergent tablets with water softening ingredients



Detergent Booster for hard water

Failure Cases

1. Too much detergents

- Too much detergents may cause white stains remaining problem

Solution

1. Guide the customer appropriate amount of detergent

1) Guide the customer that the amount of detergent does not exceed the Recommended Limit Line below (Refer to the below photo)



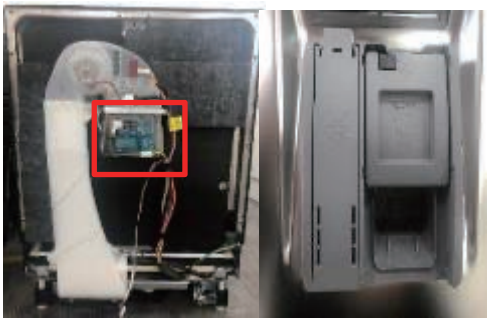
Type of Not Cleaning

Food Particles remains	**Detergents remains**
Nozzle or Casing ASM, Pump has problem	Dispenser problem
Load dishes improperly	Put detergent with wet hands
Filter clogged	**Bubble remains**
Customer doesn't scrap	Use dish soap, too much detergents
White stain	
Hard water	
Too much detergents	

Failure Cases

1. Dispenser does not work

- If the dispenser lid is not opened, Detergent will remain





Solution

1. How to check the Dispenser

※ Before Serial no. 106XX

Models	Enter the LQC Control Mode	Dispenser working
LDF5678**, LDT5678**, LDTS555**	Power + Auto + Start	Press Start 1 Time
LDFN343**	Power + Extra dry + Start	
Others	Power + Start	

Models	Enter the LQC Control Mode	Dispenser working
LUDP8908**	Power + Start	Press Start 1 Time
LDFN343**	Power + Extra dry + Start	
LDFC242**	Power + Night dry + Start	
Others	Power + Auto + Start	

1) Check the dispenser working

(1) Close the Dispenser Lid and Close the door

(2) Enter the LQC Control Mode(Refer to the upper table) and press Start button 1 Time

(3) Open the door and check the dispenser Lid is open



Type of Not Cleaning

- **Food Particles remains**
  - Nozzle or Casing ASM, Pump has problem
  - Load dishes improperly
  - Filter clogged
  - Customer doesn't scrap
- **White stain**
  - Hard water
  - Too much detergents
- **Detergents remains**
  - Dispenser problem
  - Put detergent with wet hands
- **Bubble remains**
  - Use dish soap, too much detergents

Failure Cases

1. Dispenser does not work

- If the Dispenser lid is not opened, Detergent will remain





Type of Not Cleaning

Food Particles remains	**Detergents remains**
Nozzle or Casing ASM, Pump has problem	Dispenser problem
Load dishes improperly	Put detergent with wet hands
Filter clogged	**Bubble remains**
Customer doesn't scrap	Use dish soap, too much detergents
White stain	
Hard water	
Too much detergents	

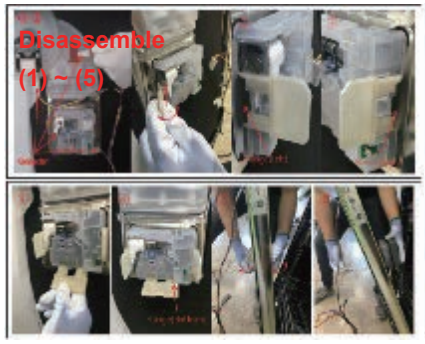
Solution

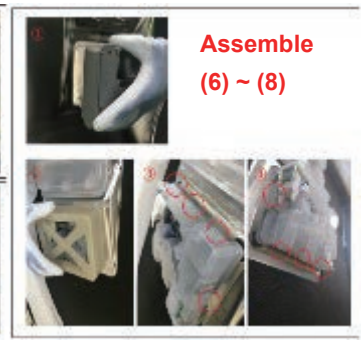
2. Check the connector / How to replace the parts

1) If Dispenser does not working.(lid not opened)
Check the Connector connection and connect



2) If connection is right, Replace the dispenser





Using Dispenser Service Jig
(1) Close the Door.
(2) Disconnect Electrical wire connectorsfrom dispenser.
(3) Insert the two side pieces into the inside of the dispenser.
(4) Insert the bottom piece.
(5) After all three pieces have been inserted, open the door and pull the dispenser from the bottom up and pull out.
When pulling the dispenser out from the door, lift the bottom of the dispenser slightly from the inside, then remove the bottom jig
(6) Verify the status of the flanges on the inner door.
(7) Place the support jig then insert the new dispenser.
(8) Make sure that all flanges fit properly into the dispenser hooks.
※ Keep fingers and hands away from pinch points to avoid injury.

Failure Cases

1. Put the detergents with wet hands

- Putting the detergent with wet hands may cause detergents remains in the dispenser (Only Tablet type detergent)



Solution

1. Make customer do not put the detergents with wet hands

1) Do not put detergent with wet hands. And remove any moisture from the detergent dispenser before put the detergent



Type of Not Cleaning

- **Food Particles remains**
  - Nozzle or Casing ASM, Pump has problem
  - Load dishes improperly
  - Filter clogged
  - Customer doesn't scrap
- **Detergents remains**
  - Dispenser problem
  - Put detergent with wet hands
- **Bubble remains**
  - Use dish soap, too much detergents
- **White stain**
  - Hard water
  - Too much detergents

Failure Cases

1. Using dish soap

- If customer use dish soap, too much bubble remain and also cause bE error

1. Use too much detergents

- Too much detergents make too much bubble

Solution

1. Make customer to do not use hand dishwashing liquids. Only use detergents which are designed for use in automatic dishwashers.

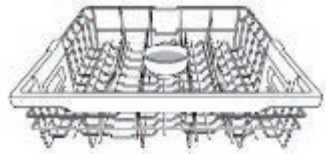
2. Guide the customer appropriate amount of detergent

1) Guide the customer that the amount of detergent does not exceed the Recommended Limit Line below (Refer to the below photo)



※ How to remove bubbles from the inside of a product

1. Set the rinse revel to L0.
2. 200~300ml Milk into shallow bowl and place in Upper Rack.
3. Run Auto cycle. Do not use detergent
4. Depending on the detergent and rinse aid, bubbles may remain after washing. If bubbles remain, repeat the above procedure



Type of Not Cleaning

Food Particles remains	**Detergents remains**
Nozzle or Casing ASM, Pump has problem	Dispenser problem
Load dishes improperly	Put detergent with wet hands
Filter clogged	**Bubble remains**
Customer doesn't scrap	Use dish soap, too much detergents
White stain	
Hard water	
Too much detergents	

13. Not Drying

No error codes for Not Drying problem.

Various parts and various reasons are related, so accurate symptom confirmation is required.

This SVC bulletin summarized the symptoms caused by each reasons. Check and replace the affected parts or Explain customer how to use the dishwasher

1) Failure symptoms by type of not drying

Type of Not Cleaning	Failure Cases	Solution
Totally Wet (Dishes, Racks, Walls)	• Parts problem	Replace the parts
	• Customers do not use the Rinse aid	Recommend customers to use Risne aid
	• Loading dishes improperly	Explain customers how to load dishes
Wall only or Plastic dishes only	• Unit is normal	Give some tips for customers

※ Before or After SVC, Give some tips to all the customers

1) If the model has “High Temp, Extra Dry” functions, add this options to the cycle.

2) If running the dishwasher all night long, add the “Night Dry” option to the cycle.

3) If customers are not using the rinse aid, we recommend using them. The use of rinse aid is recommended to prevent water spots on dishes and to enhance drying performance.

4) Open the door at the end of the cycle (but not before the drying process is complete), It enhance drying performance

5) If the customer uses “Turbo” or “Express” cycles, use other cycles as there are no dry process

6) If the model has “Dry Boost” function, add this option to the cycle.
(For models SKSDW2411, SDWB24S3, LDTH7972, LDPH7972, LDPH5554*, LDTH5554*, LDPH6762*)
- Dry Boost Low : Press the Dry Boost button once,for optimal energy efficiency.
- Dry Boost High : Press the Dry Boost button twice, for better drying results.
- Dry Boost Off : Press the Dry Boost button three times to turn off the Dry Boost option.

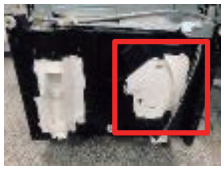
7) If customers ask about white stains, Refer to next page, explain to customer

Failure Cases

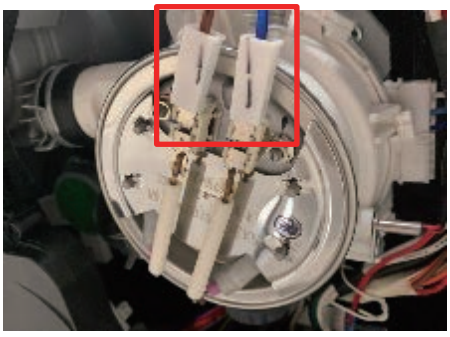
1. Heater does not work

- Heater does not work. Because of the connection problem or Electrical Short or Damage









Type of Not Drying

Totally Wet (Dishes, Racks and Walls)	Heated air dry module does not work(only XN)
Heater does not work	Rinse aid not used
Blower does not work(XD)	Load dishes improperly
Blower does not work(XN)	**Walls only wet or Plastic dishes wet**
Dispenser does not work	Unit is normal

Solution

1. How to check the Heater

Models	Enter the LQC Control Mode	Water Inlet On/ Off	Heater On/Off
LDF5545, LDF5678, LDFN343, LDFN454, LDP6797, LDP6809, LDP6810, LDP7708,LDT5665, LDT5678, LDT6809, LDT7797, LDT7808, LDTS5552, LSDT9908, LSDTS9882, LUDP8908, LUDP8997, SDWD24P, SKSDW2401, SKSDW2402	Power + Extra Drypress for 3 seconds	Half Load	Energy Saver
LDTH7972, LDPS6762, LDPM6762, SKSDW2411, SDWB24, LDPH5554*, LDTH5554*, LDPH6762*	Power + 1Hour + Download cycle press for 3 seconds	Download Cycle	Dry Boost
LDFN343**	Power + Extra Dry press for 3 seconds	Machine Clean	Cycles
LDFC242**	Power + Night Dry press for 3 seconds	Flex Zone	Cycles

1) How to Check the Heater

(1) First, Enter the Motor Control Mode(Refer to upper table)



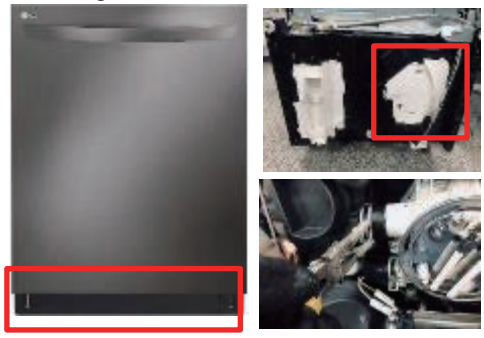
(2) Touch the Water Inlet Key(Refer to the upper table)

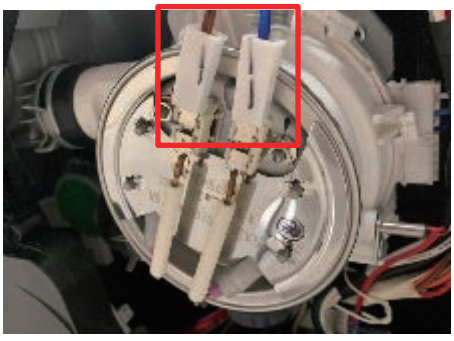
→ Number on the panel increase. Water Inlet Off around 390

Failure Cases

1. Heater does not work

- Heater does not work. Because of the connection problem or Electrical Short or Damage





Solution

1. How to check the Heater

(3) Refer to the Page 5 table and turn on the Heater On Key



(4) Check the number on the digital display, If Heater is normal, It will increase within minutes



(5) If it's hard to check previous method, Check the Heater resistance or connection
→ 11.54Ω ± 10% is normal



Type of Not Drying

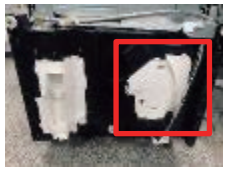
Totally Wet (Dishes, Racks and Walls)	Heated air dry module does not work(only XN)
Heater does not work	Rinse aid not used
Blower does not work(XD)	Load dishes improperly
Blower does not work(XN)	**Walls only wet or Plastic dishes wet**
Dispenser does not work	Unit is normal

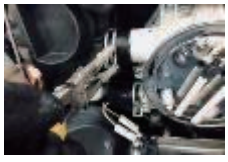
Failure Cases

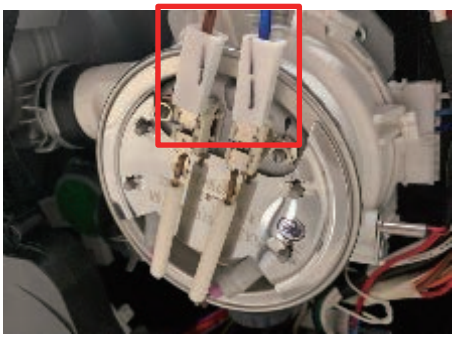
1. Heater does not work

- Heater does not work. Because of the connection problem or Electrical Short or Damage





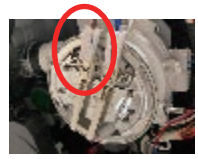




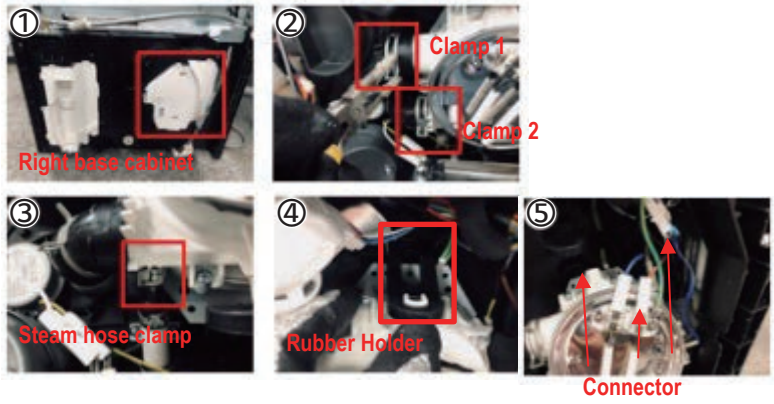
Solution

2. Check the connector / How to replace the parts.

1) If housing is disconnected, Connect connector



2) Replace the Casing ASM, Pump(SVC Loc. No : M030)



(1) Lay the unit back and open the hooks to remove the right base cabinet.

(2) Remove the clamp on the hose connecting the Casing Assembly, Pump to the Sump.

(3) Remove the steam hose clamp.

(4) Remove the rubber holder that the Casing Assembly, Pump.

(5) Remove all wires connected to the Casing Assembly, Pump, then remove the Casing Assembly, Pump.

(6) When assembling, assemble in the reverse order of disassembly.

Type of Not Drying

Totally Wet (Dishes, Racks and Walls)	Heated air dry module does not work(only XN)
Heater does not work	Rinse aid not used
Blower does not work(XD)	Load dishes improperly
Blower does not work(XN)	**Walls only wet or Plastic dishes wet**
Dispenser does not work	Unit is normal

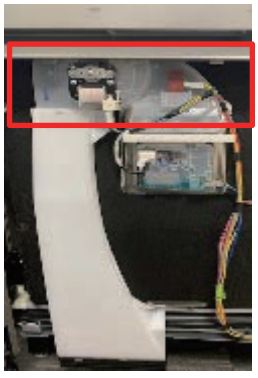
Failure Cases

1. Blower does not work(XD)

• Blower does not work Because of Acutator problem, Fan motor problem, Vent Problem

Models
LDF5545**, LDF5678**, LDFN343**, LDFN454**, LDP6797**, LDP6809**, LDP6810**, LDP7708**, LDT5665**, LDT5678**, LDT6809**, LDT7797**, LDT7808**, LDTS5552*, LSDT9908**, LSDTS9882*, LUDP8908**, LUDP8997**, SDWD24P*, SKSDW2401*, LDFC242*

※ SKSDW2402, ADFD5448** models don't have Blower**





Solution

1. How to check the Blower

※ Before Serial no. 106XX

Models	Enter the LQC Control Mode	Fan motor and actuator working
LDF5678**, LDT5678**, LDTS555**	Power + Auto + Start	Press Start 2 Time
LDFN343**	Power + Extra dry + Start	
Others	Power + Start	

※ After Serial no. 106XX

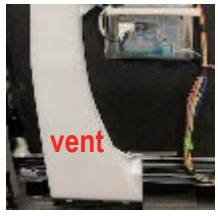
Models	Enter the LQC Control Mode	Fan motor and actuator working
LUDP8908**	Power + Start	Press Start 2 Time
LDFN343**	Power + Extra dry + Start	
LDFC242**	Power + Night dry + Start	
Others	Power + Auto + Start	

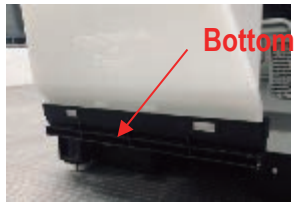
1) Check the Blower is working

(1) Enter the LQC Control Mode(Refer to the Upper Table)

(2) Press Start button 2 times and check the blower

(3) It is normal that wind occur near bottom side of the vent





Type of Not Drying

Totally Wet (Dishes, Racks and Walls)	Heated air dry module does not work(only XN)
Heater does not work	Rinse aid not used
Blower does not work(XD)	Load dishes improperly
Blower does not work(XN)	**Walls only wet or Plastic dishes wet**
Dispenser does not work	Unit is normal

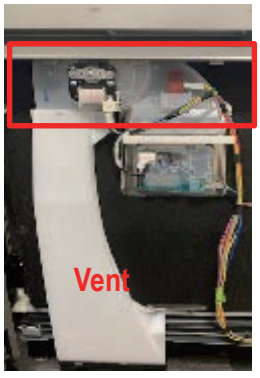
Failure Cases

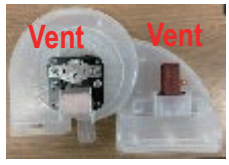
1. Blower does not work(XD)

• Blower does not work Because of Acutator problem, Fan motor problem, Vent Problem

Models
LDF5545**, LDF5678**, LDFN343**, LDFN454**, LDP6797**, LDP6809**, LDP6810**, LDP7708**, LDT5665**, LDT5678**, LDT6809**, LDT7797**, LDT7808**, LDTS5552*, LSDT9908**, LSDTS9882*, LUDP8908**, LUDP8997**, SDWD24P*, SKSDW2401*, LDFC242*

※ SKSDW2402, ADFD5448** models don't have Blower**





Solution

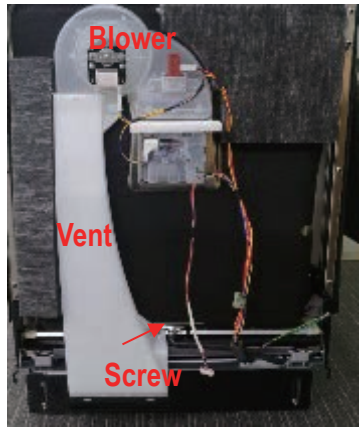
2. Check the Connector / How to replace the parts

1) If connector is disconnected, connect(refer below photo)

2) Replace the Blower

(1) SVC Loc no. : K110(Blower), K124(Vent)

(2) Refer below picture for replace



① Remove the screw.

② Remove the vent from Blower.

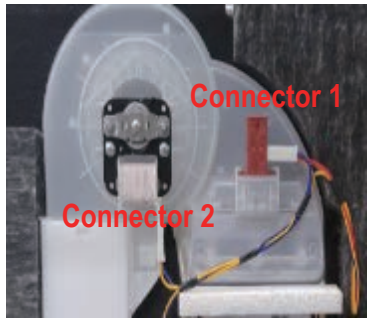
③ Disconnect the connector.

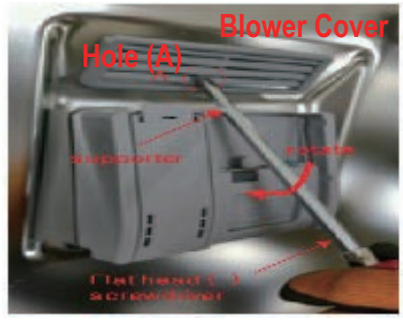
④ Open the Door.

⑤ Disassmeble the Blower cover
- Insert flat head screwdriver in hole (A)
- Rotate flat head screwdriver slowly.

⑥ Remove the screws shown.

※ Caution : Be Careful not to damage the blower cover





Type of Not Drying

Totally Wet (Dishes, Racks and Walls)	Heated air dry module does not work(only XN)
Heater does not work	Rinse aid not used
Blower does not work(XD)	Load dishes improperly
Blower does not work(XN)	**Walls only wet or Plastic dishes wet**
Dispenser does not work	Unit is normal

Failure Cases

1. Blower does not work(XN)

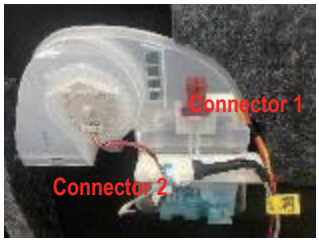
• Blower does not work Because of Acutator problem, Fan motor problem, Vent Problem

Models
SKSDW2411**, SDWB24S3**, LDTH7972**, LDPH7972**, LDPH5554*, LDTH5554*, LDPH6762*

※ SKSDW2402, ADFD5448** models don't have Blower**







Solution

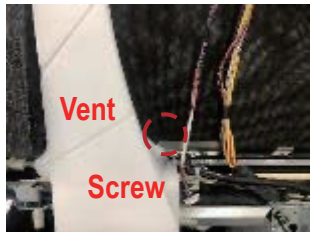
1. How to check the Blower

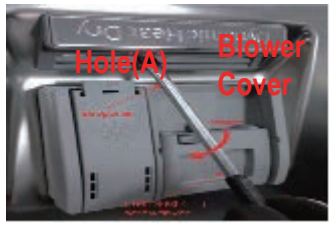
Models	Enter the LQC Control Mode	Fan motor and actuator working
All Heated air dry models	Power + Auto + Start	Press Start 2 Time

1) Check the Blower is working
   (1) Enter the LQC Control Mode(Refer to the upper table)
   (2) Press Start button 2 times and check the wind occur from vent

2. Check the Connector / How to replace the parts

1) If connector is disconnected, connect(refer to the left photo)
2) Replace the blower
   (1) SVC Loc no. : K110(Blower), K124(Vent)
   (2) Refer below picture for replace





① Remove the screw.
② Remove the vent from Blower.
③ Disconnect the connector.
④ Open the Door.
⑤ Remove the Blower cover
- Insert flat head screwdriver in hole (A).
- Rotate flat head screwdriver slowly.

⑥ Remove the screws shown.

※ Caution : Be Careful not to damage the blower cover

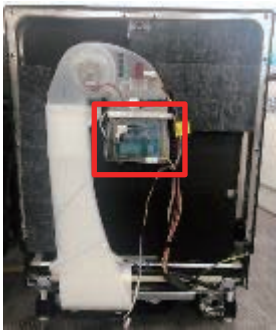
Type of Not Drying

Totally Wet (Dishes, Racks and Walls)	Heated air dry module does not work(only XN)
Heater does not work	Rinse aid not used
Blower does not work(XD)	Load dishes improperly
Blower does not work(XN)	**Walls only wet or Plastic dishes wet**
Dispenser does not work	Unit is normal

Failure Cases

1. Dispenser does not work

• Dispenser does not work. So, Rinse may not put in the unit.





Solution

1. How to check the Dispenser

1) Check the dispenser working

(1) Close the Dispenser Lid and Open the door wide

(2) Close the door

(3) Enter the LQC Control Mode (Refer to the Page 8) and press Start button 1 Time

(4) Then, You can hear the dispesnser lid opening noise

(5) Turn off the unit and Enter the LQC Control Mode again and press Start button 1 Time again

→ Don't open the Door this time. Remain door closing.

(6) Then, Check the rinse aid poured to the unit (Refer to the below photo)



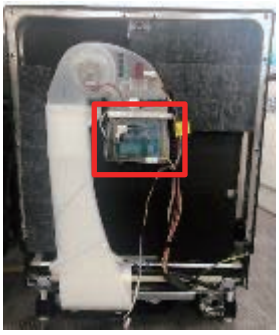
Type of Not Drying

Totally Wet (Dishes, Racks and Walls)	Heated air dry module does not work(only XN)
Heater does not work	Rinse aid not used
Blower does not work(XD)	Load dishes improperly
Blower does not work(XN)	**Walls only wet or Plastic dishes wet**
Dispenser does not work	Unit is normal

Failure Cases

1. Dispenser does not work

• Dispenser does not work. So, Rinse may not put in the unit.





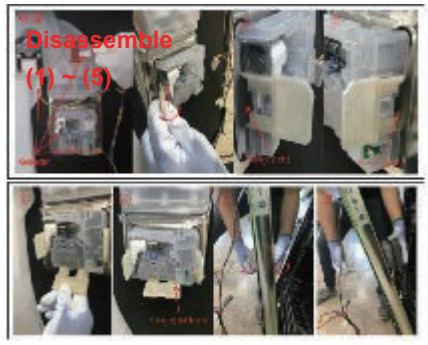
Solution

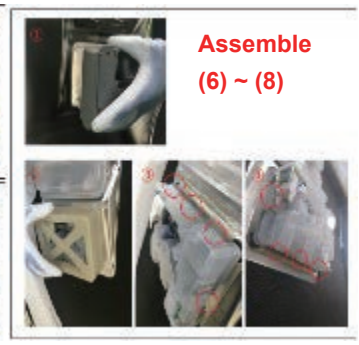
2. Check the connector / How to replace the parts

1) If Dispenser does not working.(lid not opened or rinse not poured) Check the Connector connection and connect



2) If connection is right, Replace the dispenser





Using Dispenser Service Jig

(1) Close the Door.

(2) Disconnect Electrical wire connectorsfrom dispenser.

(3) Insert the two side pieces into the inside of the dispenser.

(4) Insert the bottom piece.

(5) After all three pieces have been inserted, open the door and pull the dispenser from the bottom up and pull out.
When pulling the dispenser out from the door, lift the bottom of the dispenser slightly from the inside, then remove the bottom jig

(6) Verify the status of the flanges on the inner door.

(7) Place the support jig then insert the new dispenser.

(8) Make sure that all flanges fit properly into the dispenser hooks.

※ Keep fingers and hands away from pinch points to avoid injury.

Type of Not Drying

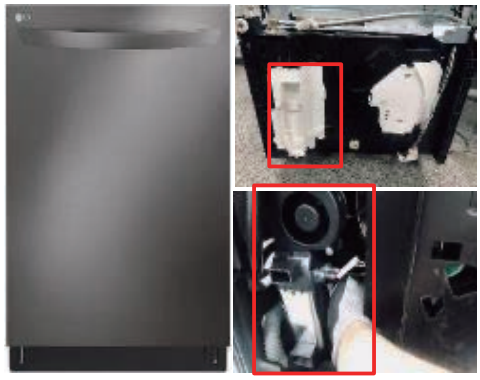
Totally Wet (Dishes, Racks and Walls)	Heated air dry module does not work(only XN)
Heater does not work	Rinse aid not used
Blower does not work(XD)	Load dishes improperly
Blower does not work(XN)	**Walls only wet or Plastic dishes wet**
Dispenser does not work	Unit is normal

Failure Cases

1. Heated air dry module does not work

• If Heated air dry module does not work, It reduces Drying performance

Models
SKSDW2411**, SDWB24S3**, LDTH7972**, LDPH7972**, LDPH5554*, LDTH5554*, LDPH6762*





Type of Not Drying

Totally Wet (Dishes, Racks and Walls)	Heated air dry module does not work(only XN)
Heater does not work	Rinse aid not used
Blower does not work(XD)	Load dishes improperly
Blower does not work(XN)	**Walls only wet or Plastic dishes wet**
Dispenser does not work	Unit is normal

Solution

1. How to check the Heated air dry module

Models	Enter the LQC Control Mode	Heater(Heat dry) On/Off
Heated air dry model	Power + 1 Hour + Download cyclepress for 3 seconds	1 Hour

1) Enter the Motor Control Mode and check the Heater working (Refer to the upper table)

2) Put your hand close to the distributor and judge by the heated dry air blowing

2. How to replace the part

1) Replace the part (SVC Loc No. : M280)



(1) Disassemble the Distributor and nut inside the Tub.

(2) Lay the product back and open the hooks to remove the left base cabinet.

(3) Put your hand behind the Heat Dry Module and Remove the connector connected to the Fan Module.

(4) Remove the connector connected to the Heater.

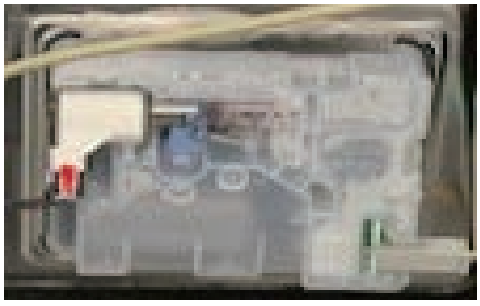
(5) After disassembling the thermistor connections, pull the Heat Dry Module away from the base.

(6) When assembling, assemble in the reverse order of disassembly.

Failure Cases

1. Cusotmer doesn't use Rinse aid

• The use of rinse aid is recommended to prevent water spots on dishes and to enhance drying performance.



Solution

1. Recommend customer to use Rinse aid and Set Rinse level

1) Recommend customer to use Rinse aid

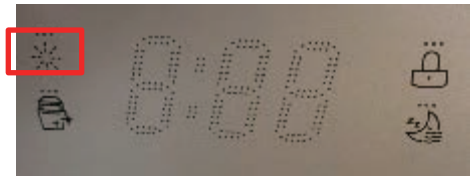


2) Check the Rinse level, If level is L0 change it to L2

Check Rinse Level	Chage Level
Power + Delay Start	Delay Start

3) When Rinse aid refill icon flashes, refill the Rinse aid



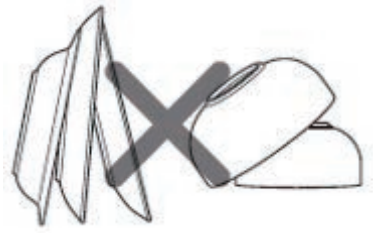


Type of Not Drying

Totally Wet (Dishes, Racks and Walls)	Heated air dry module does not work(only XN)
Heater does not work	Rinse aid not used
Blower does not work(XD)	Load dishes improperly
Blower does not work(XN)	**Walls only wet or Plastic dishes wet**
Dispenser does not work	Unit is normal

Failure Cases

1. Packed dishes together

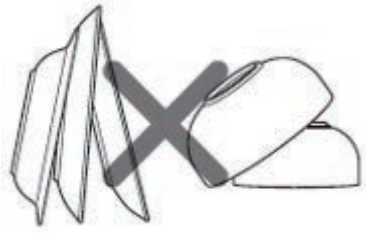


2. Utensils interfere the nozzle

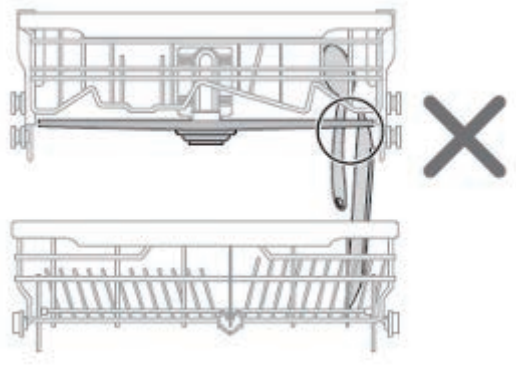


Solution

1. Make customer does not packed dishes together



2. Make customer load dishes does not interfere the nozzle



Type of Not Drying

Totally Wet (Dishes, Racks and Walls)	Heated air dry module does not work(only XN)
Heater does not work	Rinse aid not used
Blower does not work(XD)	Load dishes improperly
Blower does not work(XN)	**Walls only wet or Plastic dishes wet**
Dispenser does not work	Unit is normal

Failure Cases

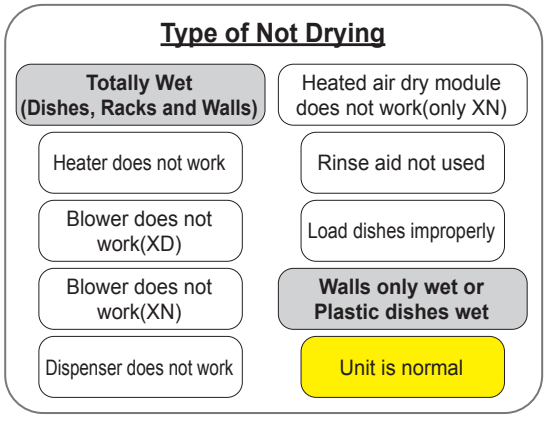
1. Walls only wet or Plastic dishes wet

- It is not totally wet, just walls only wet or plastic dishes wet

Solution

1. Unit is normal, Please give some tips for customer

1) If the model has “High Temp, Extra Dry” functions, add this options to the cycle.
2) If running the dishwasher all night long, add the “Night Dry” option to the cycle.
3) If customers are not using the rinse aid, we recommend using them. The use of rinse aid is recommended to prevent water spots on dishes and to enhance drying performance.
4) Open the door at the end of the cycle (but not before the drying process is complete), It enhance drying performance
5) If the customer uses “Turbo” or “Express” cycles, use other cycles as there are no dry process
6) If the model has “Dry Boost” function, add this option to the cycle. (For models SKSDW2411, SDWB24S3, LDTH7972, LDPH7972, LDPH5554*, LDTH5554*, LDPH6762*)
   - Dry Boost Low : Press the Dry Boost button once,for optimal energy efficiency.
   - Dry Boost High : Press the Dry Boost button twice, for better drying results.
   - Dry Boost Off : Press the Dry Boost button three times to turn off the Dry Boost option.
7) If customers ask about white stains, Refer to next page, explain to customer



14. Noise Problem

No error codes for noise problem.

Various noise appear and various parts are related, so accurate type of noise confirmation is required.

This SVC bulletin summarizes the noise caused by each parts. Check and replace the affected parts

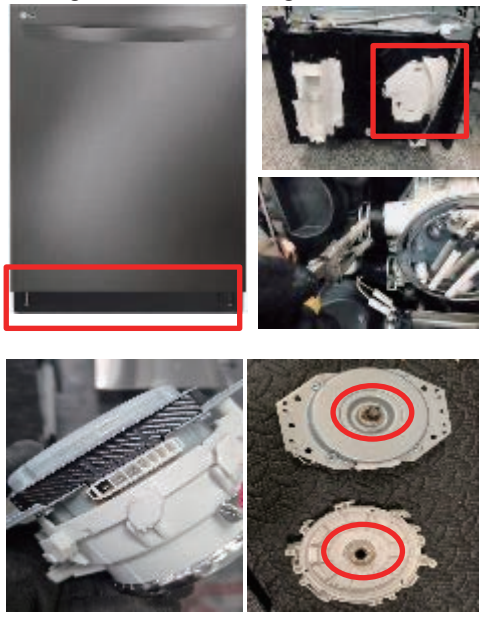
1) Failure by type of noise

Type of noise	Failure Cases	Solution
Grinding	• Casing ASM, Pump has problem	Replace the parts
Vibration	• Vario motor and disk has problem	
High Pitch	• Inlet Valve has problem	Clean the inlet valve
Hammering	• Valve has problem	Explain customer
Rattling	• Blower(Door Casing ASM) has problem	Replace the parts
	• Drain pump constraint	
	• Drain hose is not secured	Tighten the drain hose
	• Dishes Interfere	Explain customer how to load the dishes
	• Filter out of appliance	Reasssembled the filter
Growling	• Using Liquid detergent	Recommend customer to do not use liquid detergent
	• Load the bowls or pots facing upwards	Explain customer how to load the dishes

Failure Cases

1. Casing ASM, Pump has problem

• Grinding noise may occur due to water leakage from the washing motor water seal.



Solution

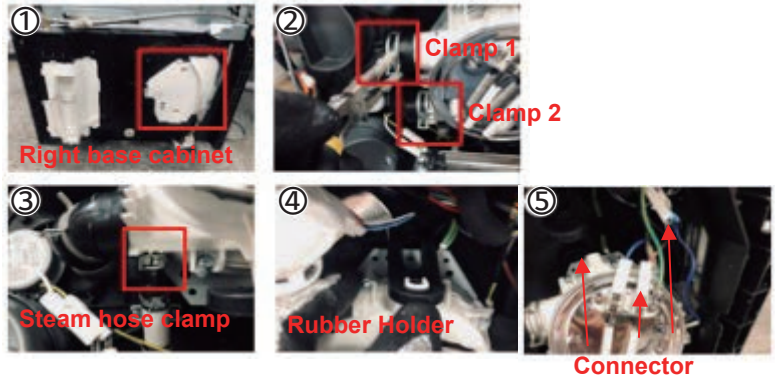
1. How to check the Casing ASM, Pump

1) Turn on the unit, than start “Normal” cycle

2) Wait for a moment, then Check the abnormal noise from the Casing ASM, Pump

2. How to replace the Casing ASM, Pump

1) Refer to the below for the replacement(SVC Loc no. : M030)



(1) Lay the unit back and open the hooks to remove the right base cabinet.

(2) Remove the clamp on the hose connecting the Casing Assembly, Pump to the Sump.

(3) Remove the steam hose clamp.

(4) Remove the rubber holder that the Casing Assembly, Pump.

(5) Remove all wires connected to the Casing Assembly, Pump, then remove the Casing Assembly, Pump.

(6) When assembling, assemble in the reverse order of disassembly.

Type of Not Drying

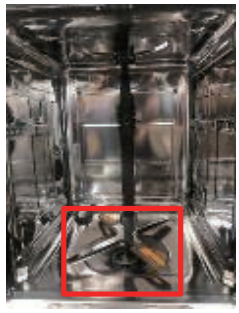
Grinding	Hammering
Vibration	Rattling
High Pitch	Growling

Failure Cases

1. Vario disk has problem

• If vibration occurs during washing, replace the Vario disk as it is deformed







Solution

1. How to check the Vario disk

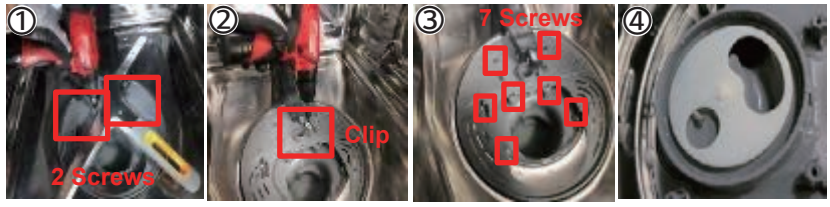
1) Turn on the unit, start “Normal” cycle

2) Then Check the vibration noise

2. How to replace the Vario disk

1) SVC Loc. No : M025

2) Refer to the below for the replacement.



(1) Rotate the Lower Spray Arm to expose the screws, then remove the two screws to remove the Lower Spray Arm.

(2) Remove the bottom clip of the Water Guide by removing the screws.

(3) Remove the Water Guide, remove seven screws, and lift the Sump Cover to separate it from the Tub.

(4) When assembling, assemble in the reverse order of disassembly.

Type of Not Drying

Grinding	Hammering
Vibration	Rattling
High Pitch	Growling

Failure Cases

1. Inlet valve has problem

• If Inlet valve filter is clogged, High pitch noise occur





Solution

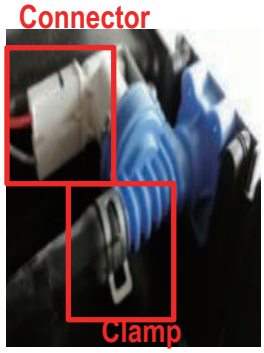
1. How to check the Inlet Valve

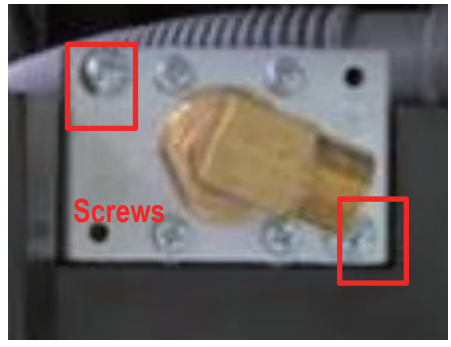
1) Turn on the unit, start “Normal” cycle

2) During water supply, check the high-pitch noise

2. How to replace the Inlet valve

1) Refer to the photo below for replacement(SVC Loc no. : M210)





(1) Close the water supply tap

(2) Disassemble the water supply hose

(3) Disconnect Inlet valve connector and remove clamp

(4) Remove two screws

(5) When assembling, assemble in the reverse order of disassembly.

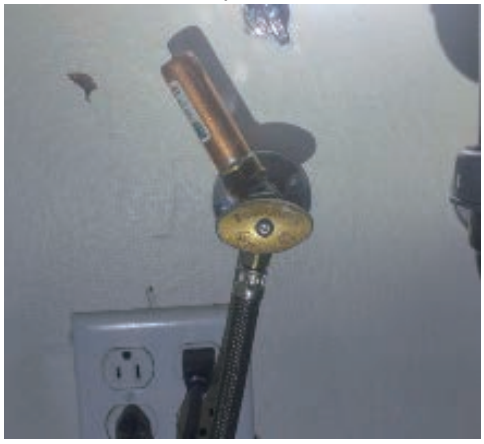
Type of Not Drying

Grinding	Hammering
Vibration	Rattling
High Pitch	Growling

Failure Cases

1. Valve problem

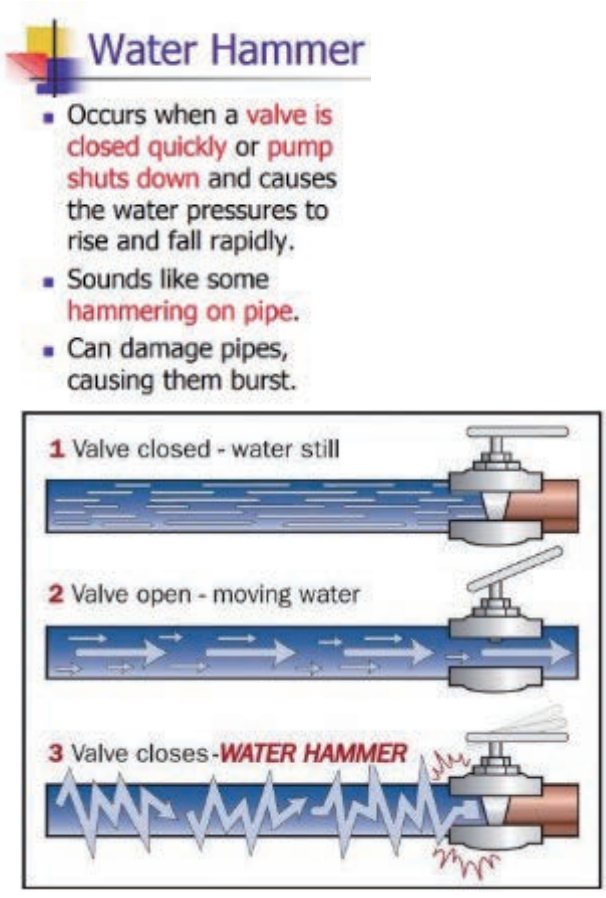
• If there is a valve as below, water will not supply properly and make water hammer noise due to water pressure



Solution

1. Explain customer about Valve problem

1) Explain customer that Unit is normal and Valve has problem. Refer to the below photos



Type of Not Drying

Grinding	Hammering
Vibration	Rattling
High Pitch	Growling

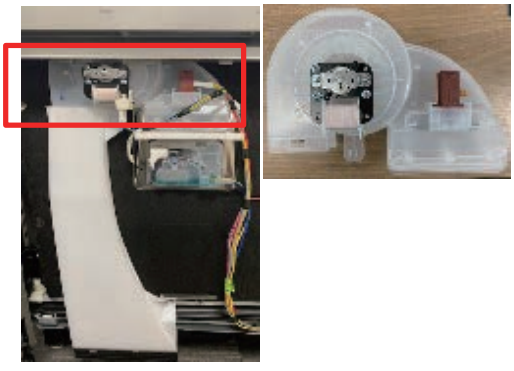
Failure Cases

1. Blower(Door casing ASM) has problem(XD)

• Impeller that in the Door casing ASM may interfere with Casing. It can make rattling noise

Models
LDF5545**, LDF5678**, LDFN343**, LDFN454**, LDP6797**, LDP6809**, LDP6810**, LDP7708**, LDT5665**, LDT5678**, LDT6809**, LDT7797**, LDT7808**, LDTS5552*, LSDT9908**, LSDTS9882*, LUDP8908**, LUDP8997**, SDWD24P*, SKSDW2401*, LDFC242*

※ SKSDW2402, ADFD5448** models don't have Blower**



Solution

1. How to check the Blower

※ Before Serial no. 106XX

Models	Enter the LQC Control Mode	Fan motor and actuator working
LDF5678**, LDT5678**, LDTS555**	Power + Auto + Start	Press Start 2 Time
LDFN343**	Power + Extra dry + Start	
Others	Power + Start	

※ After Serial no. 106XX

Models	Enter the LQC Control Mode	Fan motor and actuator working
LUDP8908**	Power + Start	Press Start 2 Time
LDFN343**	Power + Extra dry + Start	
LDFC242**	Power + Night dry + Start	
Others	Power + Auto + Start	

1) Check the Blower is working

(1) Enter the LQC Control Mode (Refer to the Upper Table)

(2) Press Start button 2 times and check the noise

Type of Not Drying

Grinding	Hammering
Vibration	Rattling
High Pitch	Growling

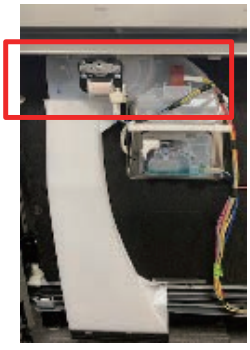
Failure Cases

1. Blower(Door casing ASM) has problem(XD)

• Impeller that in the Door casing ASM may interfere with Casing. It can make rattling noise

Models
LDF5545**, LDF5678**, LDFN343**, LDFN454**, LDP6797**, LDP6809**, LDP6810**, LDP7708**, LDT5665**, LDT5678**, LDT6809**, LDT7797**, LDT7808**, LDTS5552*, LSDT9908**, LSDTS9882*, LUDP8908**, LUDP8997**, SDWD24P*, SKSDW2401*, LDFC242*

※ SKSDW2402, ADFD5448** models don't have Blower**





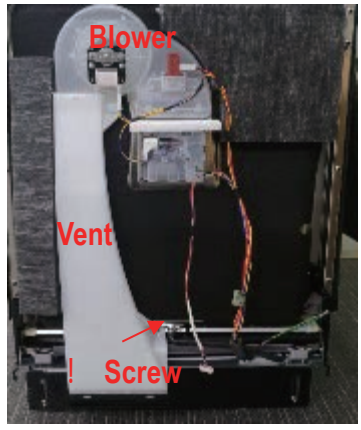
Solution

2. How to replace the parts

1) Replace the Blower

(1) SVC Loc no. : K110(Blower)

(2) Refer below picture for replace



① Remove the screw.

② Remove the vent from Blower.

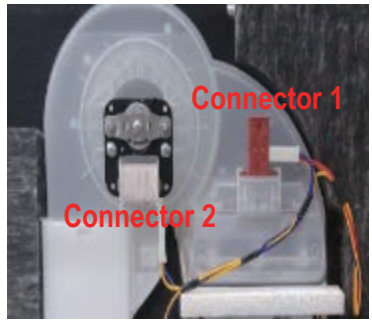
③ Disconnect the connector.

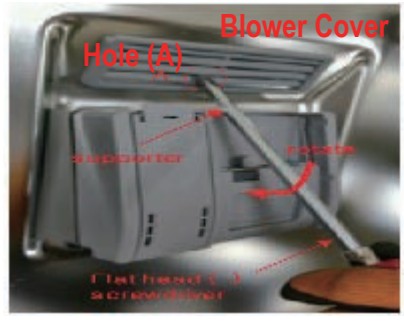
④ Open the Door.

⑤ Disassmeble the Blower cover
- Insert flat head screwdriver in hole (A)
- Rotate flat head screwdriver slowly.

⑥ Remove the screws shown.

※ Caution : Be Careful not to damage the blower cover





Type of Not Drying

Grinding	Hammering
Vibration	**Rattling**
High Pitch	Growling

Failure Cases

2. Blower(Door casing ASM) has problem(XN)

- Impeller that in the Door casing ASM may interfere with Casing. It can make rattling noise

Models
SKSDW2411**, SDWB24S3**, LDTH7972**, LDPH7972**, LDPH5554*, LDTH5554*, LDPH6762*

※ SKSDW2402, ADFD5448** models don't have Blower**



Solution

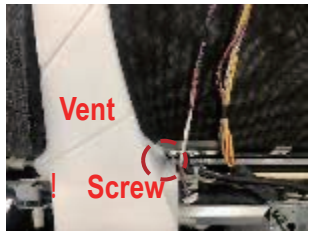
1. How to check the Blower

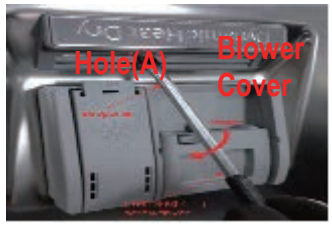
Models	Enter the LQC Control Mode	Fan motor and actuator working
All Heated air dry models	Power + Auto + Start	Press Start 2 Time

1) Enter the LQC Control Mode (Refer to the upper table)
2) Press Start button 2 times and check the noise

2 How to replace the parts

1) SVC Loc no. : K110(Blower)
2) Refer below picture for replace





(1) Remove the screw.
(2) Remove the vent from Blower.
(3) Disconnect the connector.
(4) Open the Door.
(5) Remove the Blower cover
- Insert flat head screwdriver in hole (A).
- Rotate flat head screwdriver slowly.

(6) Remove the screws shown.

※ Caution : Be Careful not to damage the blower cover

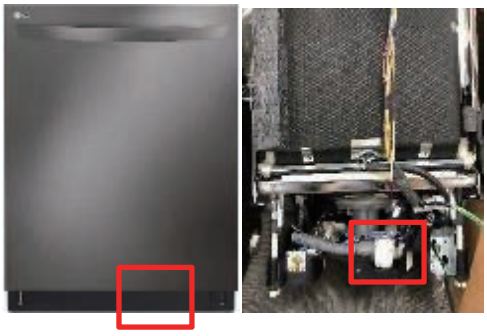
Type of Not Drying

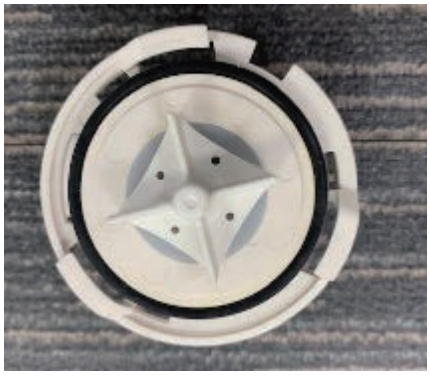
Grinding	Hammering
Vibration	Rattling
High Pitch	Growling

Failure Cases

3. Drian pump constraint

• Some debris are stuck inside of Drain pump. It can make rattling noise





Solution

1. How to Check the Drain pump

1) Check the Drain Pump

(1) First, Start “Normal” cycle

(2) Then, Check the rattling noise when drain pump working

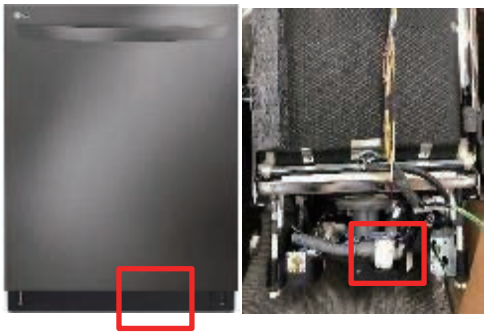
Type of Not Drying

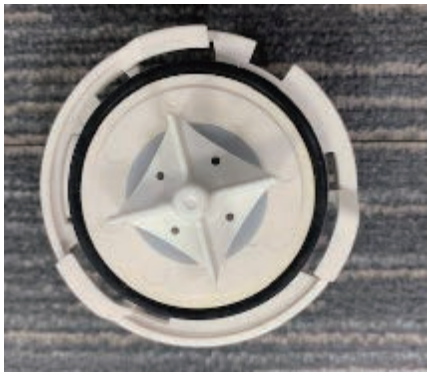
Grinding	Hammering
Vibration	Rattling
High Pitch	Growling

Failure Cases

3. Drian pump constraint

• Some debris are stuck inside of Drain pump. It can make rattling noise





Solution

2. Remove the debris from the drain pump

1) SVC Loc. No : M050

2) Refer to the below for the disassemble

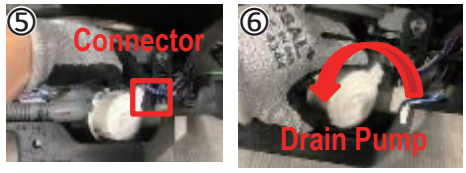


(1) First, Disassmeble Front Cover and Vent

(2) Remove the two screws on both sides of the Lower Frame.

(3) Pull the Lower Frame to the front direction to remove it.

(4) Push the main harness holder hooks away from the Lower Frame.



(5) After disassemble the Lower Frame, disconnect the connector from the Drain Pump.

(6) Disassemble the drain Pump by turning it counter-clockwise.

(7) When assembling, assemble in the reverse order of disassembly.

Type of Not Drying

Grinding	Hammering
Vibration	**Rattling**
High Pitch	Growling

Failure Cases

4. Drian Hose is not secured

- If Drain Hose is not secured, It can make noies

Solution

4. Check the Drain Hose and Tighten the hose

1) Tighten the hose



Type of Not Drying

Grinding	Hammering
Vibration	Rattling
High Pitch	Growling

Failure Cases

5. Dishes interfere

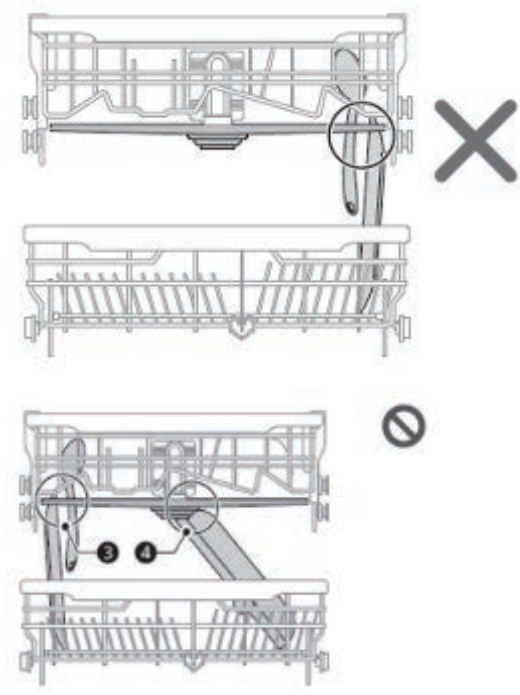
• Utensils interfere with nozzle



Solution

5. Guide customer how to load dishes

1) Make customer does not intere the nozzle



Type of Not Drying

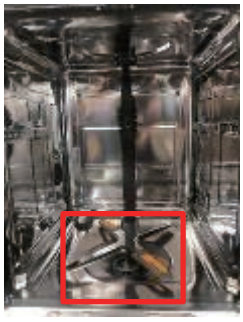
Grinding	Hammering
Vibration	Rattling
High Pitch	Growling

Failure Cases

6. Filter out of the unit

• If Filter is not secured properly, It may cause interfere with Lower Spray Arm





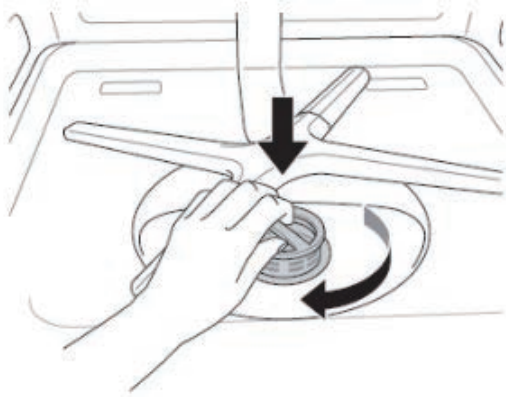


Solution

6. Reassemble the Filter

1) Reassemble the Filter and Guide customer how to assemble the Filter

※ To replace the assembled filters, position the spray arm so the wider vee is toward the front. Fit the filters back into the filter holder and secure them by turning the inner filter clockwise unitl it clicks into place.



Type of Not Drying

Grinding	Hammering
Vibration	Rattling
High Pitch	Growling

Failure Cases

1. Using Liquid Detergent

- Liquid dishwashing soap, like what is used in a sink. This is much more strongly concentrated and will resut in oversudsing. Due to the presence of bubble, there may be shortage of water inside the product Resulting in a sound of water being sucked in



Solution

1. Guide customers to do not use liquid detergent

1) Guide customers to do not use liquid detergent
(Tablet type or Gel type are recommended)



<Tablet>



<Gel>

Type of Not Drying

Grinding	Hammering
Vibration	Rattling
High Pitch	Growling

Failure Cases

2. Load the bowl or pots facing upwards

• If the large pots or bowls are stored facing upwards, most of the washing water will end up in the pots during the washing process, there may be a shortage of water requied for the product, resulting in a sound of water being sucked out



Solution

2. Explain customer how to load the dishes

1) Large bowls or pots need to store facing downwards



Type of Not Drying

Grinding	Hammering
Vibration	Rattling
High Pitch	Growling

15. Oder Problem

No error codes for odor problem.

Various odor appear and various parts are related, so accurate type of odor confirmation is required.

This SVC bulletin summarizes the odor caused by each reason. Check and replace the affected parts and explain customer how to use the dishwasher

1) Failure by type of odor

Type of noise	Failure Cases	Solution
Burning	• Power cord is burnt	Replace the parts
	• Casing ASM, pump is burnt	
	• Drain pump is burnt	
	• Main PCB is burnt	
	• Vario motor is burnt	
Burning, Plastic, Rubber, Fishy	• Machine is newly installed (It also smell Plastic, Rubber, Fishy odor)	Make customer use the unit more than 20 fully cycles
Rotten	• Food debris in the unit	Remove the food debris
	• Filter is not cleaned regularly	Clean the filter
	• Long term unused	Run machine clean
Musty water	• Some detergents may cause a musty water odor	Recommend customers to change the detergents
Sewer	• Drain hose is installed improperly	Install Drain Hose properly

Failure Cases

1. Power cord is burnt

• Improper connection of connector(wire nut) can cause burnt odor

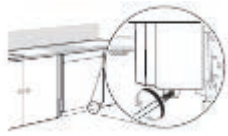


Solution

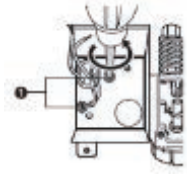
1. Replace the power cord

1) Turn off electrical power to the unit at the circuit breaker.

2) Use a Phillips screwdriver to remove the screw from the junction box cover and remove the cover



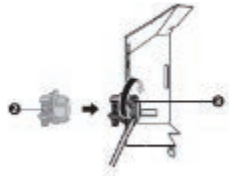
3) Use a Phillips screwdriver to remove 2 screws ①.



4) Remove the junction box from the appliance.



5) Insert a strain relief ② through the hole in the junction box.
Tighten the ring nut ③ to secure it in place.



6) Insert the electrical cable through the hole in the strain relief.
Trighten 2 screws to secure the cable.



Type of Not Drying

Burning	Musty Water
Parts problem	Detergents
Burning, Plastic, Rubber, Fishy	Sewer
Newly installed	Drain Hose connection
Rotten	
Food debris	
Filter is not cleaned	
Long term unused	

Failure Cases

1. Power cord is burnt

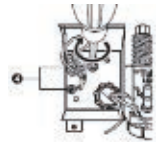
• Improper connection of connector(wire nut) can cause burnt odor



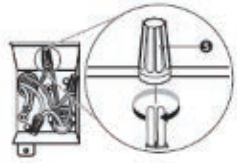
Solution

1. Replace the power cord

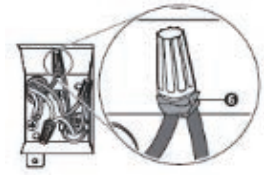
7) Pull the existing wires through the openings in the junction box. Tighten 2 screws ④ to reassemble the junction box in the appliance.



8) Pair the white, black, and green wires to the matching colored wires from the dishwasher. Then twist on the provided wire nuts ⑤ tightly to connect the corresponding wires.



9) Wrap electrical tape ⑥ around each connection.



10) Fold the connected wires back into the junction box and screw on the junction box cover.

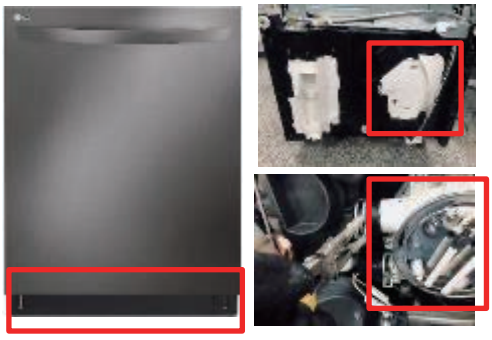
Type of Not Drying

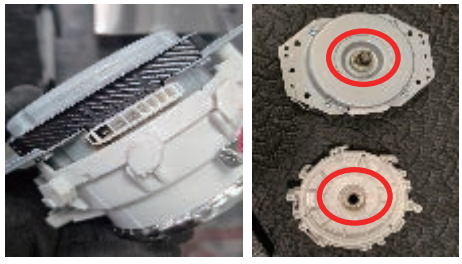
Burning	Musty Water
Parts problem	Detergents
Burning, Plastic, Rubber, Fishy	Sewer
Newly installed	Drain Hose connection
Rotten	
Food debris	
Filter is not cleaned	
Long term unused	

Failure Cases

2. Casing ASM, Pump defcet

• Defect of the Casing ASM Pump may occur due to water leakage from the washing motor water seal.





Type of Not Drying

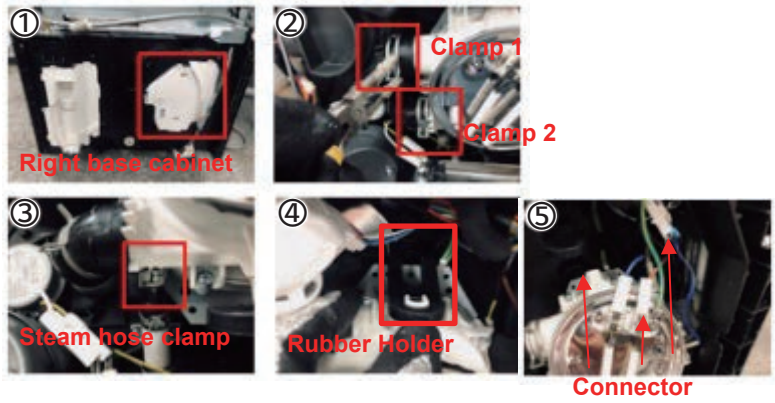
Burning	Musty Water
Parts problem	Detergents
Burning, Plastic, Rubber, Fishy	Sewer
Newly installed	Drain Hose connection
Rotten	
Food debris	
Filter is not cleaned	
Long term unused	

Solution

2. Replace the Casing ASM, Pump

1) SVC Loc. No : M030

2) Refer to the below for the replacement



(1) Lay the unit back and open the hooks to remove the right base cabinet.

(2) Remove the clamp on the hose connecting the Casing Assembly, Pump to the Sump.

(3) Remove the steam hose clamp.

(4) Remove the rubber holder that the Casing Assembly, Pump.

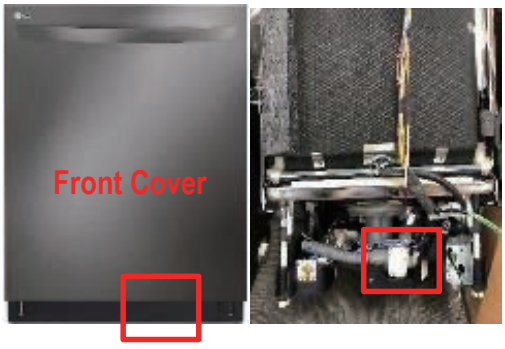
(5) Remove all wires connected to the Casing Assembly, Pump, then remove the Casing Assembly, Pump.

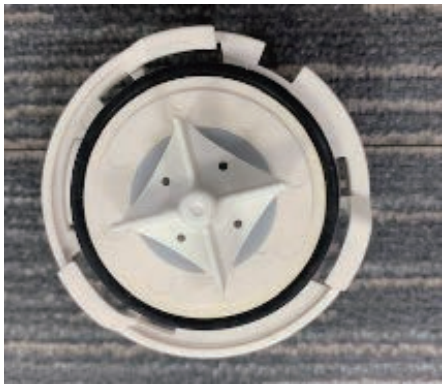
(6) When assembling, assemble in the reverse order of disassembly.

Failure Cases

3. Drain Pump defect

• Defect of the Drain Pump may occur due to water leakage from the seal





Type of Not Drying

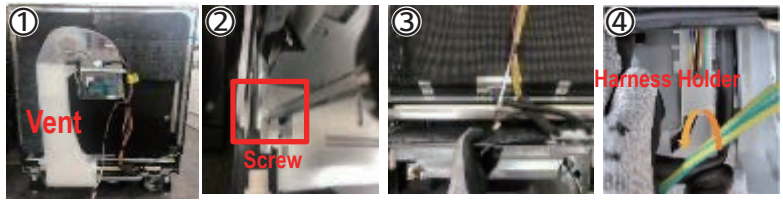
Burning	Musty Water
Parts problem	Detergents
Burning, Plastic, Rubber, Fishy	Sewer
Newly installed	Drain Hose connection
Rotten	
Food debris	
Filter is not cleaned	
Long term unused	

Solution

3. Replace the Drain Pump

1) SVC Loc. No : M050

2) Refer to the below for the replacement

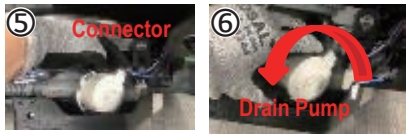


(1) First, Disassmeble Front Cover and Vent

(2) Remove the two screws on both sides of the Lower Frame.

(3) Pull the Lower Frame to the front direction to remove it.

(4) Push the main harness holder hooks away from the Lower Frame.



(5) After disassemble the Lower Frame, disconnect the connector from the Drain Pump.

(6) Disassemble the drain Pump by turning it counter-clockwise.

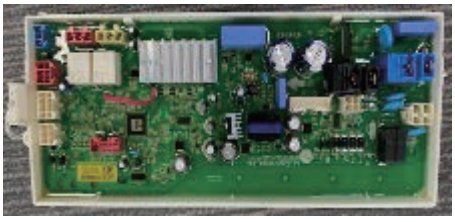
(7) When assembling, assemble in the reverse order of disassembly.

Failure Cases

4. Main PCB defect

• Defect of the Main PCB may occur due to Overcurrent



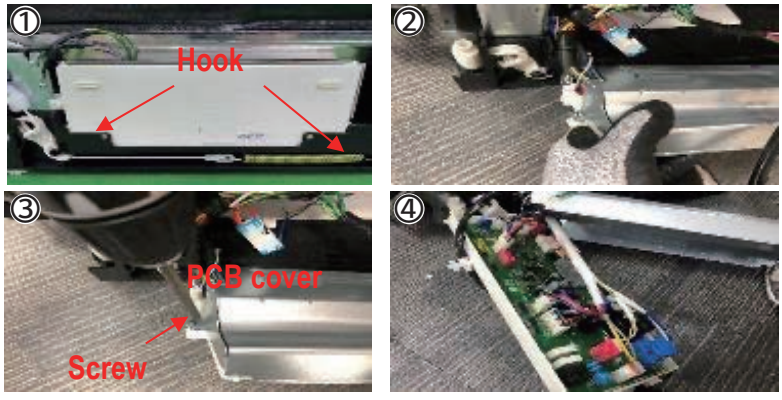


Solution

4. Replace the Main PCB

1) SVC Loc. No : K254

2) Refer to the below for the replacement



(1) Using a flathead screwdriver, lift the base hooks on each end of the Main PCB.

(2) Lift the Main PCB.

(3) Remove the one screw securing the PCB cover, and then disassmeble the Main PCB and the cover.

(4) Disconnect the connector attached to the Main PCB.

(5) When assembling, assemble in the reverse order of disassembly.

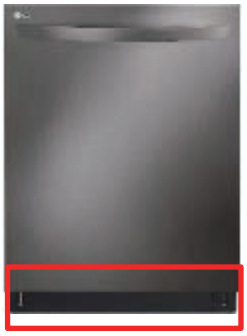
Type of Not Drying

Burning	Musty Water
Parts problem	Detergents
Burning, Plastic, Rubber, Fishy	Sewer
Newly installed	Drain Hose connection
Rotten	
Food debris	
Filter is not cleaned	
Long term unused	

Failure Cases

5. Vario motor is burnt

• Vario motor burnt may occur due to due to water leakage from the seal.







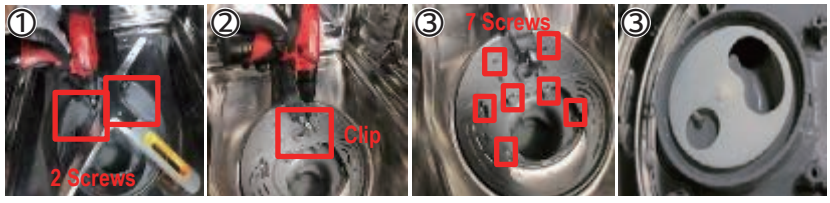


Solution

5. Replace the Vario motor

1) SVC Loc. No : M026

2) Refer to the below for the replacement



(1) Rotate the Lower Spray Arm to expose the screws, then remove the two screws to remove the Lower Spray Arm.

(2) Remove the bottom clip of the Water Guide by removing the screws.

(3) Remove the Water Guide, remove seven screws, and lift the Sump Cover to separate it from the Tub, Then disassemble the Vario Disk



(4) Lay the unit and remove Front cover and Door liner hinge

(5) Remove two screws in the base, then upwards base from tub

(6) Remove the two screws on the Vario motor, and then remove the Vario motor.

(7) When assembling, assemble in the reverse order of disassembly.

Caution : Be careful when connecting vario connector

Type of Not Drying

Burning	Musty Water
Parts problem	Detergents
Burning, Plastic, Rubber, Fishy	Sewer
Newly installed	Drain Hose connection
Rotten	
Food debris	
Filter is not cleaned	
Long term unused	

Failure Cases

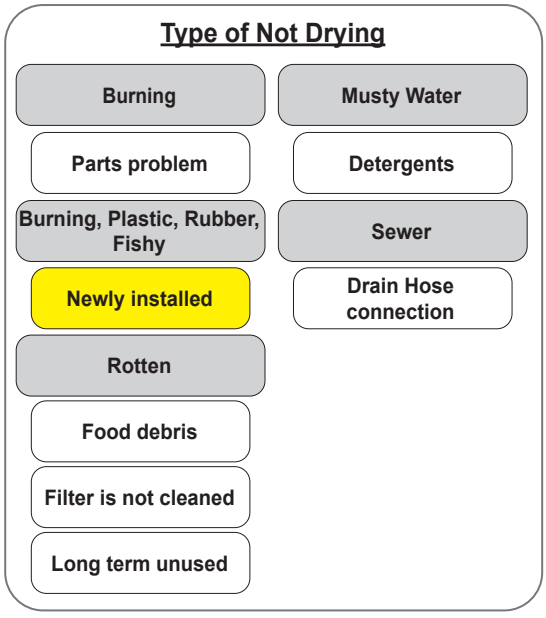
1. Machine is newly installed

- It is normal for a new unit to have odors for the first few times they are operated. This may be sensed as a burning, plastic, rubber, a fishy odor. This can be caused when the new motor coils and insulation material around the motor are heated in first few cycles.

Solution

1. Explain customer that newly installed machine have odor

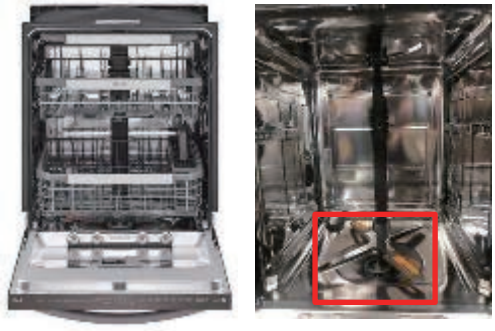
1) Recommend customers to use the unit more than 20 fully cycles. Odor should go away



Failure Cases

1. Food debris in the unit

• Food debris may cause an odor







Type of Not Drying

Burning	Musty Water
Parts problem	Detergents
Burning, Plastic, Rubber, Fishy	Sewer
Newly installed	Drain Hose connection
Rotten	
Food debris	
Filter is not cleaned	
Long term unused	

Solution

1. Remove the debris in the unit. Run Machine clean cycle

1) Remove the debris in the unit. Then, Run Machine clean cycle using dishwasher cleaner. Refer to the photos below for recommended cleaner.





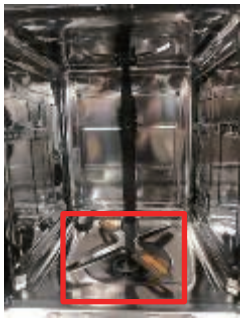


Failure Cases

1. Food debris in the unit

• For best wash performance, clean the filter after each load. If food debris remains in the filter, it may cause an odor







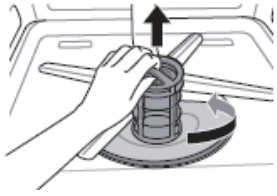
Solution

1. Clean the filter and Run Machine clean cycle

1) Remove the lower rack and position the bottom spray arm so a wider vee is open to the front.



2) Turn the inner filter counter-clockwise and take out the assembled inner filter and stainless steel filter. With the filters removed, check the sump opening and remove any foreign materials, if needed



3) Clean the filters with a soft brush under running water. Reassemble the filters before reinstalling them.



Type of Not Drying

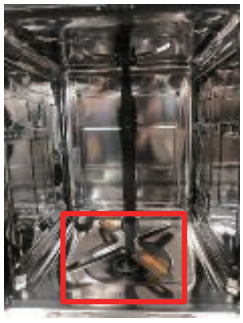
Burning	Musty Water
Parts problem	Detergents
Burning, Plastic, Rubber, Fishy	Sewer
Newly installed	Drain Hose connection
Rotten	
Food debris	
Filter is not cleaned	
Long term unused	

Failure Cases

1. Food debris in the unit

• For best wash performance, clean the filter after each load. If food debris remains in the filter, it may cause an odor



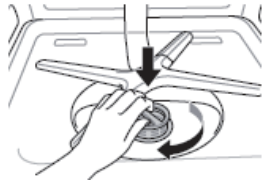




Solution

1. Clean the filter and Run Machine clean cycle

4) To replace the assembled filters, position the spray arm so the wider vee is toward the front. Fit the filters back into the filter holder and secure them by turning the inner filter clockwise Until it clicks into place.



5) Run Machine clean cycle using dishwasher cleaner. Refer to the photos below for recommended cleaner.







Type of Not Drying

Burning	Musty Water
Parts problem	Detergents
Burning, Plastic, Rubber, Fishy	Sewer
Newly installed	Drain Hose connection
Rotten	
Food debris	
Filter is not cleaned	
Long term unused	

Failure Cases

1. Long term unused

- If the unit is unused for a long time, odor can occur from the food residue, particles, and the residual water

Solution

1. Run Machine Clean Cycle

1) Run Machine clean cycle using dishwasher cleaner. Refer to the photos below for recommended cleaner. If customer wants to use the unit after not using it for a long time, Recommend to Run Machine clean cycle before using







Type of Not Drying

- Burning
- Musty Water
- Parts problem
- Detergents
- Burning, Plastic, Rubber, Fishy
- Sewer
- Newly installed
- Drain Hose connection
- Rotten
- Food debris
- Filter is not cleaned
- Long term unused

Failure Cases

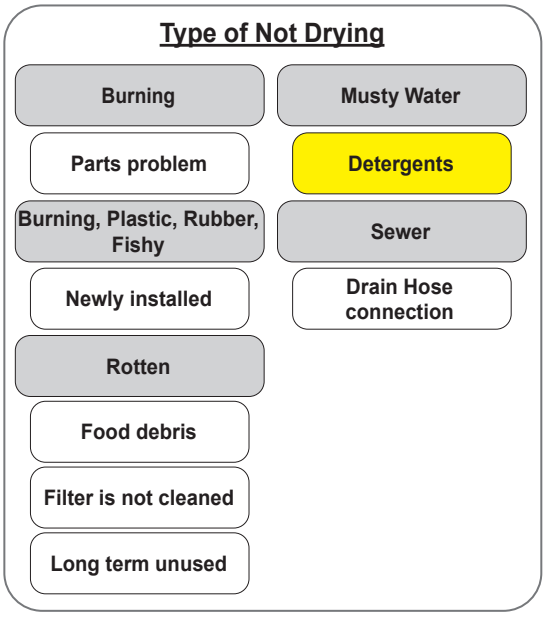
1. Detergents

- Some of detergents may cause a musty water odor

Solution

1. Recommend customers to change the detergents.

1) Recommend customer to change the detergents



Failure Cases

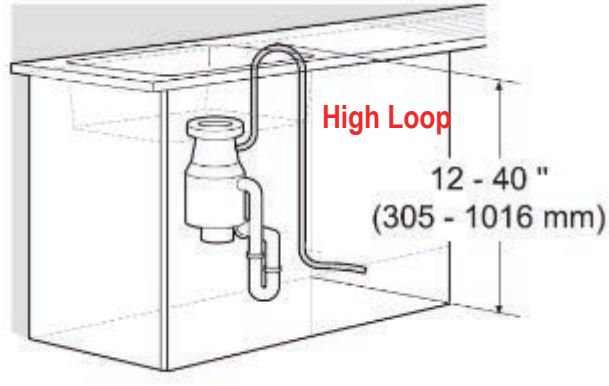
1. Drain hose is installed improperly

• Drain hose needs to be installed in a High Loop. Because the water in the drain hose prevents odors from the Sewer flowing back to the unit. But if drain hose is not installed in a High Loop. All water will be drained. So, It may cause odors from the Sewer flowing back to the unit.

Solution

1. Install the drain hose properly

1) Install the drain hose properly. Please refer to the bleow photo.



Type of Not Drying

- Burning
- Musty Water
- Parts problem
- Detergents
- Burning, Plastic, Rubber, Fishy
- Sewer
- Newly installed
- Drain Hose connection
- Rotten
- Food debris
- Filter is not cleaned
- Long term unused

9. Customer Guide

Why do white stains occur on dishes after washing?

1. Why do white stains occur on dishes after washing?

Customer Guide

As the water evaporates, nutrients that were dissolved in the water and invisible become visible on the surface of the dishes, appearing as white stains.
For example, you can see white stains on the kitchen sink and bathroom mirror after the water dries.
Don't worry, the stain that remains on dishes is the same component of the water.



[White Stain Cases]

Details information

1. What is hard water?

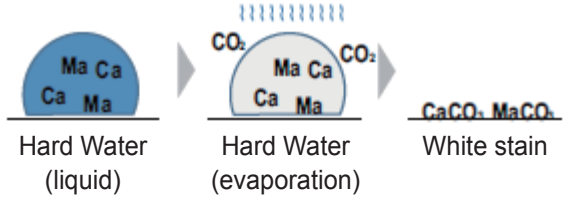
Water contains minerals such as calcium and magnesium.
The amount of calcium and magnesium in the water, converted to calcium carbonate, is called hardness.
Water is called Soft Water if its hardness is between 0 and 50, and Hard Water if it's between 100 and 250.



Hard Water Soft Water

2. Why white stains remain?

When hard water evaporates, the minerals it contains, such as calcium and magnesium, remain on the surface, causing white stains.



Hard Water (liquid) | Hard Water (evaporation) | White stain

2. Why are there water stains on the cups or glassware after washing?

Customer Guide

As the water dries, nutrients that were not visible remain on the surface of the bowl and are shown as water marks. Water has the property of clumping together, so when clumped water remains in the bowl and dries, it looks stained.

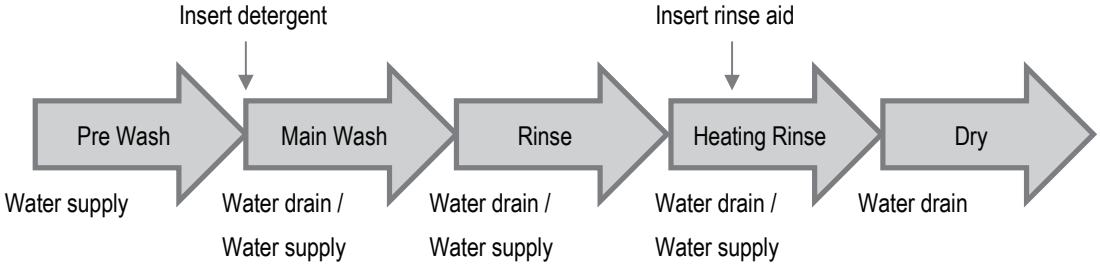
The rinse aid reduces the stain on the bowl because it spreads the water without clumping. Another way to reduce water stains is to tilt the tableware properly.

Details information

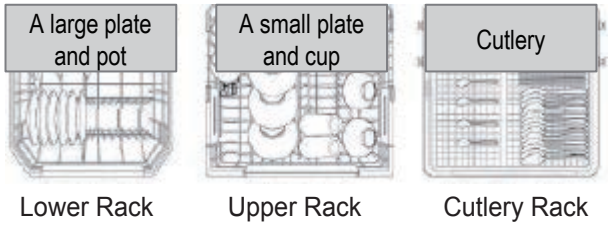
1. What is the function of the rinse aid?

Dishwashers are designed to use rinse aid by default. Rinse aid weakens the surface tension of water, preventing water from clumping and improving drying performance.

2 Dishwasher operating process (Insertion time of detergent/rinse aid)



3. Tableware storage method (properly tilt when storing tableware, 45 degrees)



3. There are food debris on the dishes (1/2)

Customer Guide

If there is a lot of food on the bowl, you can rinse them with water first. When you put the dishes in the dishwasher, tilt them about 45 degrees. And then, It is better to rotate the upper and lower spray arm by hand before closing the door because it help the bowl is not scratched or touched with dishes. Moreover if you clean the filter regularly to prevent food debris from getting caught, it will greatly help improve washing power.

Details information

1. Tableware Storage Guide

When storing dishes in the dishwasher, The dishes should be stored without overlapping so that the water reaches
the dishes evenly. If you don't store your dishes properly, some dishes may not clean properly. Depending on the type of dishes, you'll need to store them appropriately in each rack. Because dishwasher operates at high temperature, Wooden, aluminum, and other types of dishes can damage the dishes or not clean properly.

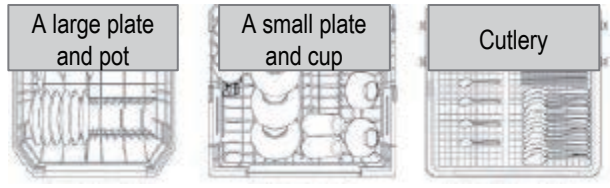
2. Remove the large food particles.

- Remove large food particles, such as bones and fruit seeds from the dishes before storing on the dishwasher.
- For dishes with food stuck to them, soak them in the water for a while.



3. Store the Tableware Properly

- Store in the dishwasher according to the type of tableware.

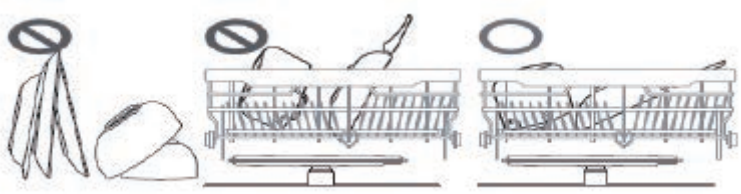


3. There are food debris on the dishes (2/2)

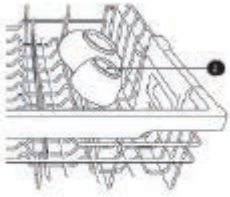
Details information

※ Tableware Storage Method

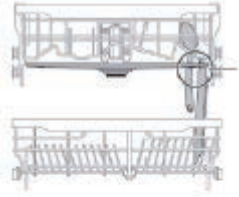
- Store the dishes without stacking them together.
- Deep pots or dishes should be placed upside down.
- Store the large pots and pans flat.



※ Cautions for storage



- Place the dishes at a tilt.



- Be careful not to get the dishes caught in the spray arms.
- Spray arms are not rotated and dishes cannot be washed.



- Do not place bowls in the cutlery rack. The door may not close properly, resulting in leakage

4. Detergent is still in the dispenser

Customer Guide

The package of the solid detergent's can become sticky like glue when it meets water, and may not be inserted properly and remain in the dispenser. If you are using the solid detergent, put it in with dry hands or remove the moisture from the dispenser before using it.

Details information

1. There's detergent left in the dispenser or detergent powder left in the bowl.

The package of some detergents is made of a material that dissolves in water.

If there is water inside the dispenser, some of the detergent may stick to the inner side of the dispenser, so that the detergent may not be properly inserted into the product. If the package of detergent is made of water-insoluble material, it may be stuck inside the dispenser if the package is inserted without removing it.In addition, if the spray arms interfere with the dishes and cannot rotate properly, detergent may remain in the dispenser.





2. Simple Guide for Use (Information on how to insert the detergent)

- Dry out the dispenser and insert the detergent. Don't insert the detergent with your wet hands.
- If the spray arms are stuck with the dishes, the detergent may remain in the dispenser after washing because water does not reach the dispenser.

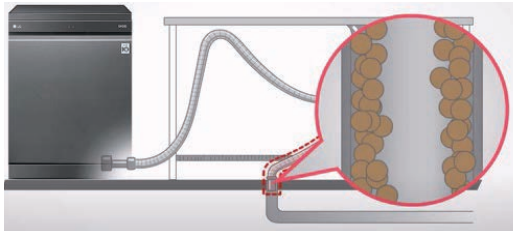
5. Noise during water supply and drainage

• **Noise while supplying water** (whistling sound)

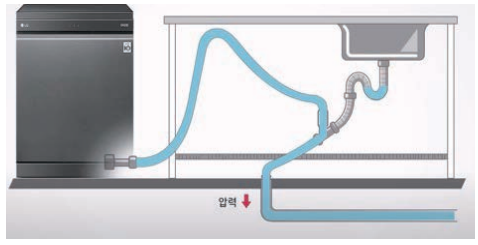
When the speed of the water flowing through the pipe changes suddenly, a water sound is created due to the pressure change. This is the sound mainly generated when supplying water This is the natural sound that occurs when water enters the dishwasher. so high water pressure can cause noise (whistling) when water enters.

• **Noise while draining water**

This is a natural sound that occurs as the water drains out. It's similar to the sound when you drain a sink of standing water all at once.It gets louder as the hole where the water exits narrows.





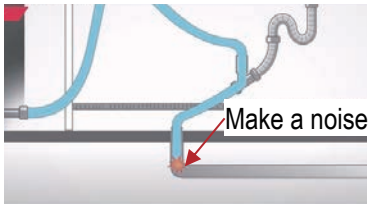


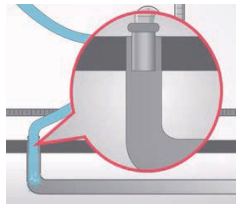
- Guide customers to use a plumbing cleaner or cleaning tool to clean their pipes or let them contact a plumber.

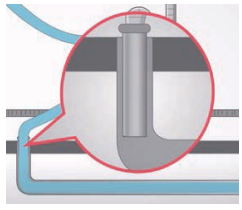
Details information

• **How to respond to noise due to water drop**

- Guide customers to lengthen sink drain pipes and let contractor repairs.





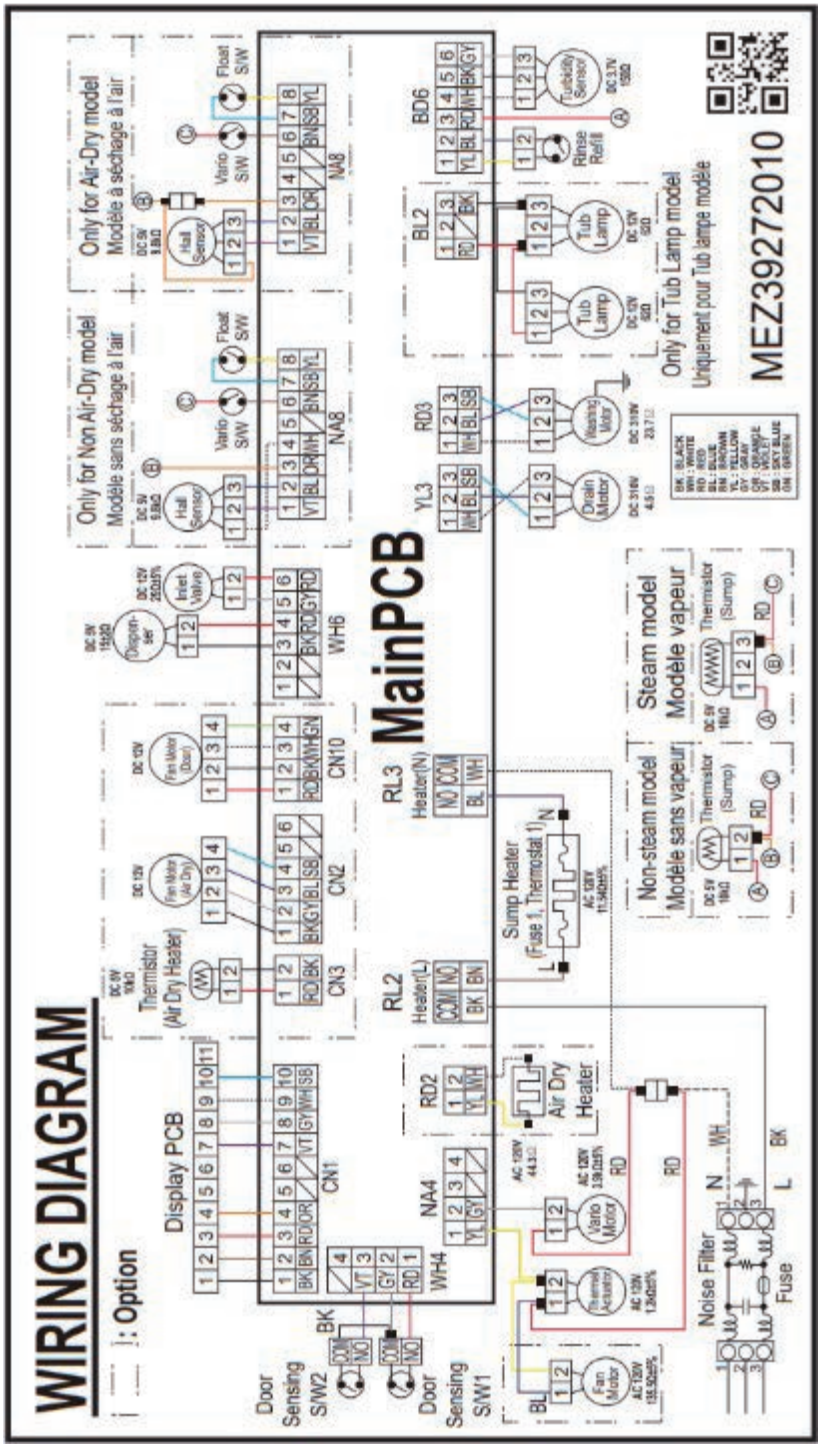


10. WIRING DIAGRAM

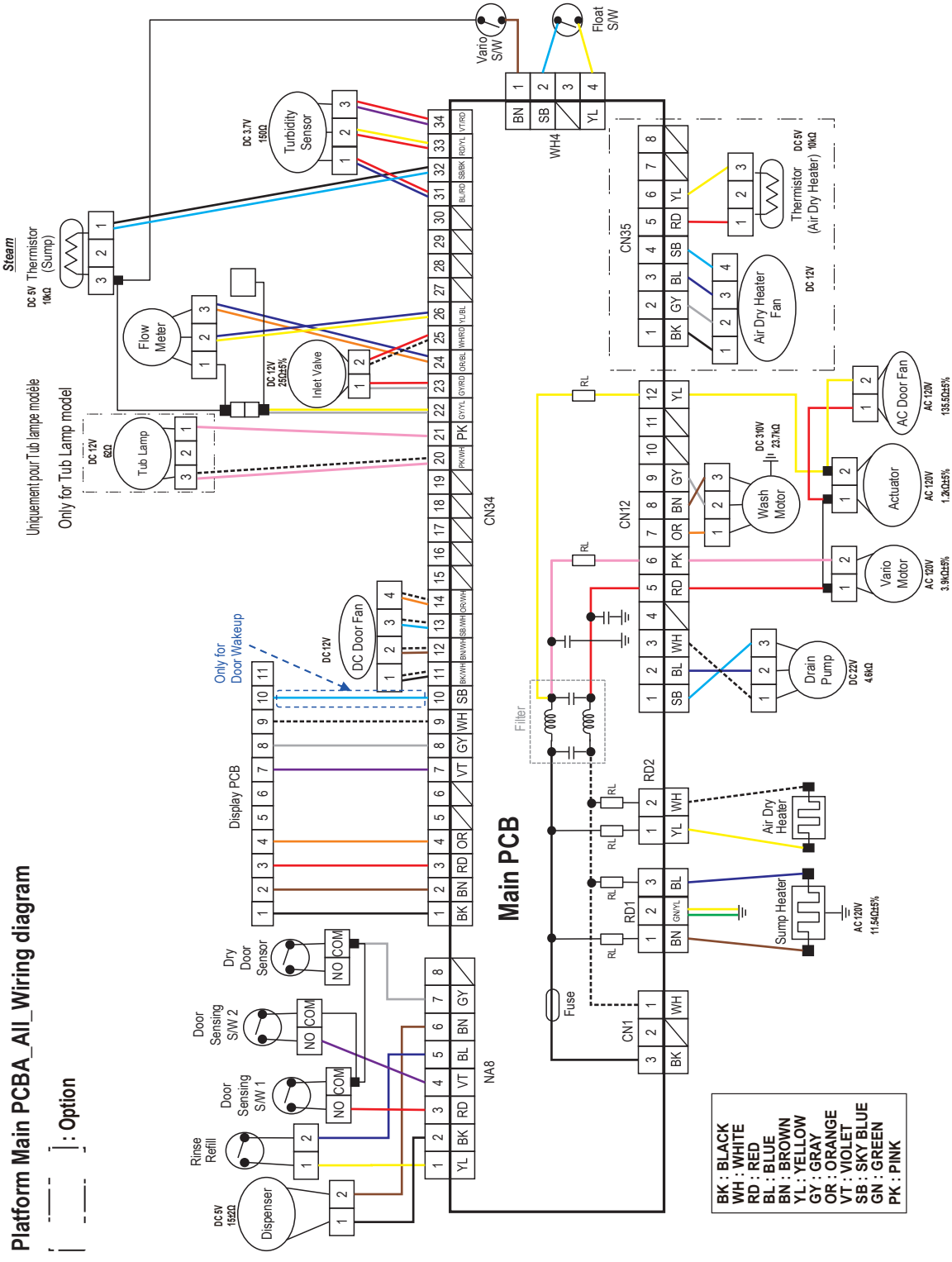
■ WIRING DIAGRAM

1) For Models : LDPH7972*, LDPM6762*, LDPS6762*, LDTH7972*, SDWB24*3

※ LDPH7972*, LDTH7972*, SDWB24*3 : Before Serial no. 407XX



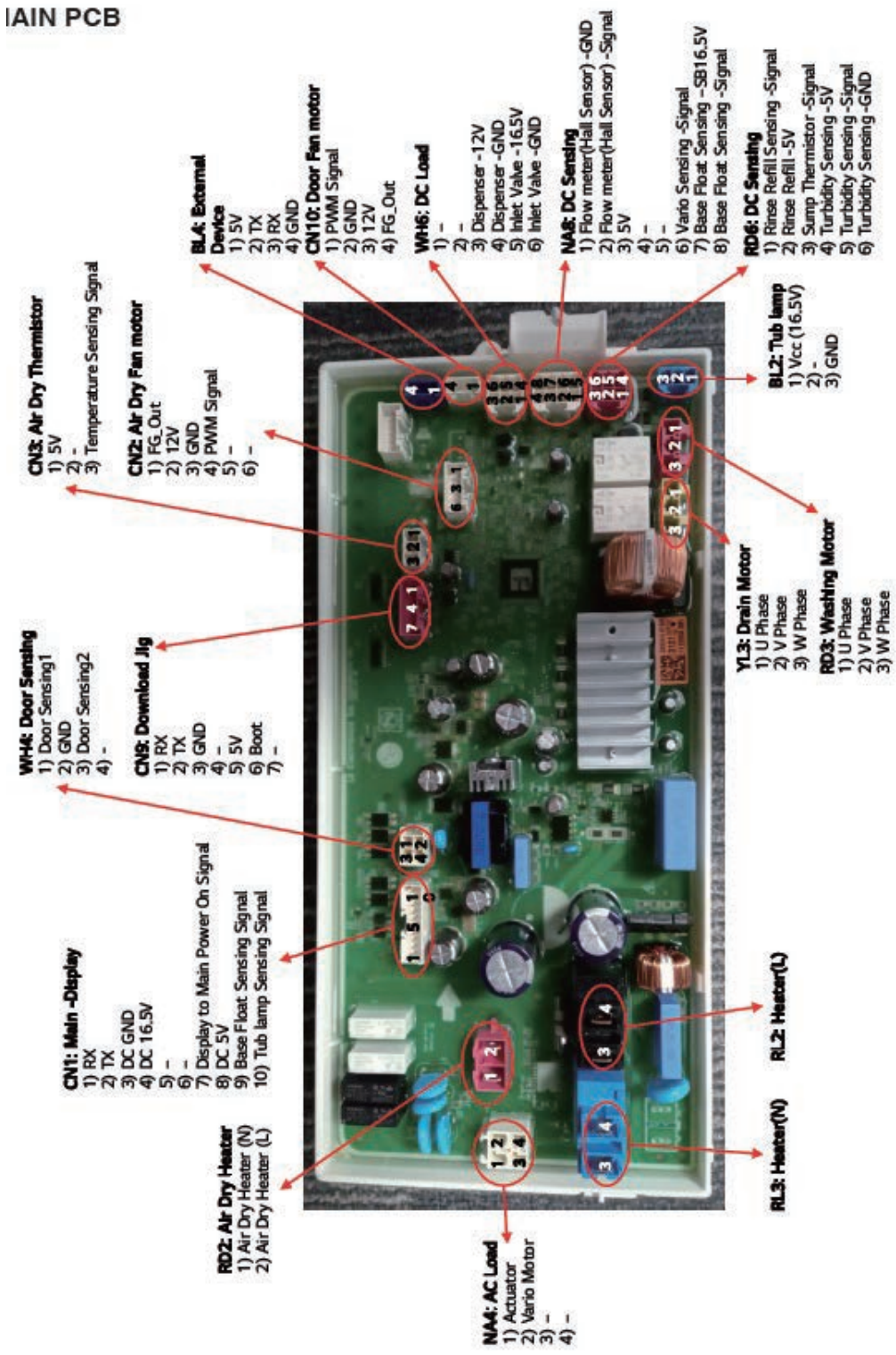
2) For Models : LDPH5554*, LDTH5554*, LDPH6762*, LDPH7972*, LDTH7972*, SDWB24*3
※ LDPH7972*, LDTH7972*, SDWB24*3 : After Serial no. 407XX



■ MAIN PCB

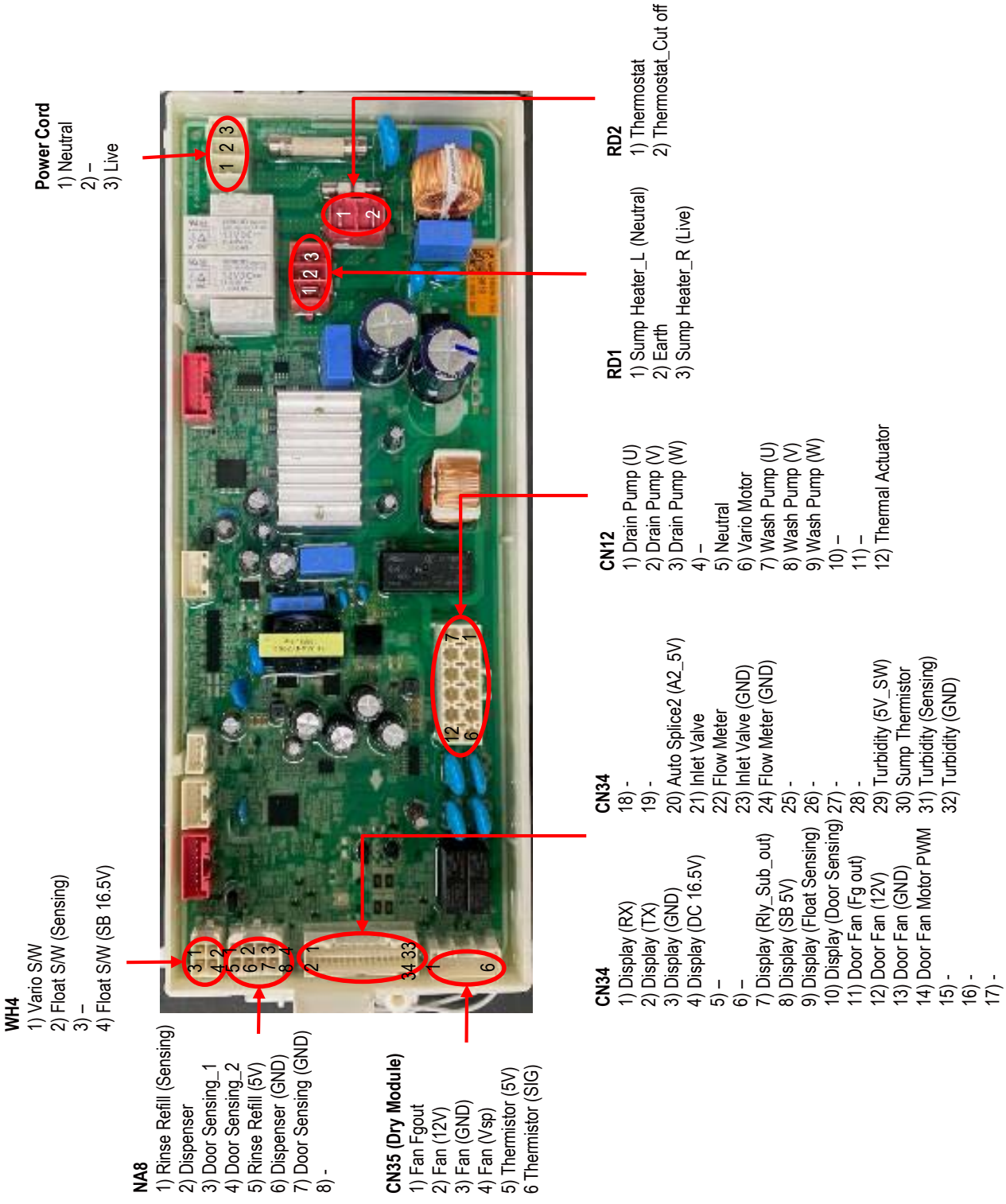
1) For Models : LDPH7972*, LDPM6762*, LDPS6762*, LDTH7972*, SDWB24*3

※ LDPH7972*, LDTH7972*, SDWB24*3 : After Serial no. 407XX

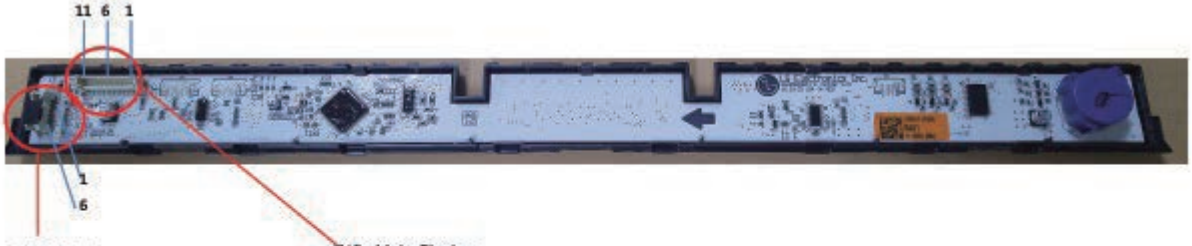


2) For Models : LDPH5554*, LDTH5554*, LDPH6762*, LDPH7972*, LDTH7972*, SDWB24*3

※ LDPH7972*, LDTH7972*, LDTH7972*, SDWB24*3 : After Serial no. 407XX



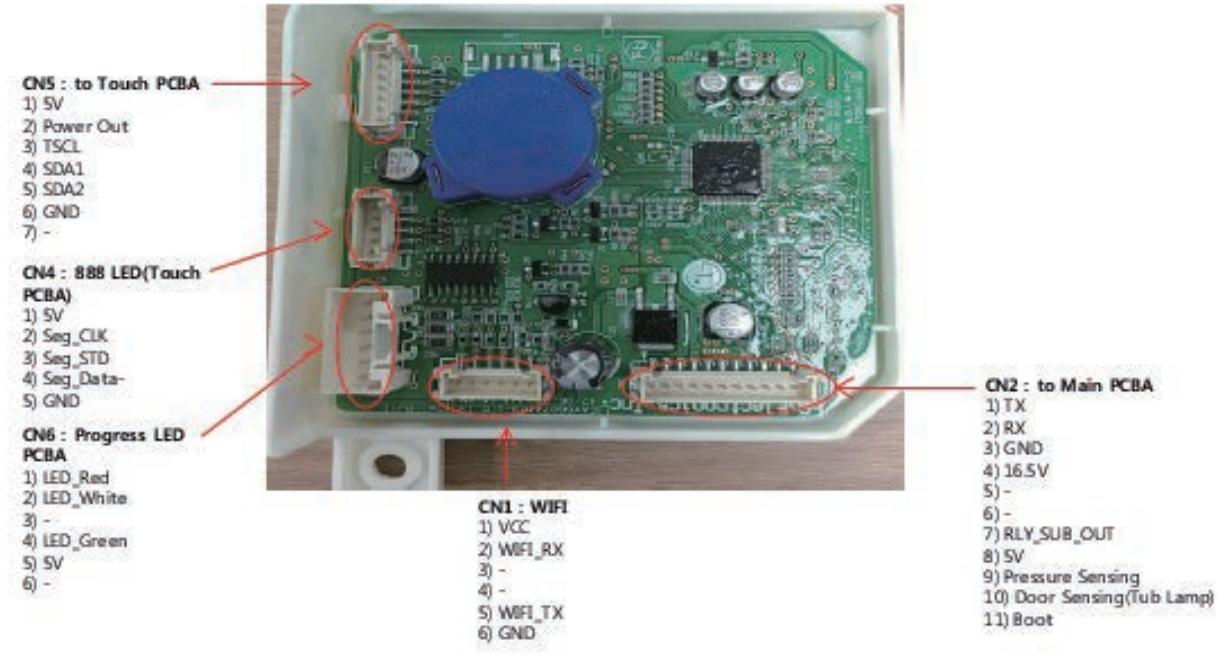
■ DISPLAY PCB



CN1 : NFC
1) VCC
2) NFC-MOSI
3) NFC-CLOCK
4) NFC-IRQ
5) NFC-MISO
6) GND

CN5 : Main-Display
1) RX-Main
2) TX-Main
3) GND
4) DC16.5V
5) -
6) -
7) Display to Main Relay On Signal
8) DC5V
9) Base Float Sensing -Signal
10) -
11) Boot

■ MCU PCB


CN5 : to Touch PCBA
1) 5V
2) Power Out
3) TSCL
4) SDA1
5) SDA2
6) GND
7) -
CN4 : 888 LED(Touch PCBA)
1) 5V
2) Seg_CLK
3) Seg_STD
4) Seg_Data-
5) GND
CN6 : Progress LED PCBA
1) LED_Red
2) LED_White
3) -
4) LED_Green
5) 5V
6) -
CN1 : WIFI
1) VCC
2) WIFI_RX
3) -
4) -
5) WIFI_TX
6) GND
CN2 : to Main PCBA
1) TX
2) RX
3) GND
4) 16.5V
5) -
6) -
7) RLY_SUB_OUT
8) 5V
9) Pressure Sensing
10) Door Sensing(Tub Lamp)
11) Boot

11. Installation

Before Installing

Online Installation Guide

This QR code is for reference only. For complete installation instructions, see the owner's manual supplied with each dishwasher.

English

https://www.lg.com/us/support/video-tutorials/lg-dishwasher-installation-CT10000009-1366643457088

French

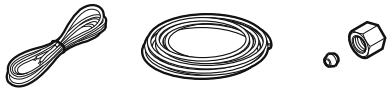
https://www.lg.com/ca_fr/soutien/aide-produit/CT20100059-20152463332979

⚠ WARNING

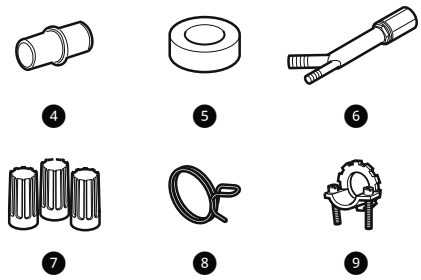
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  The Guide may contain inaccuracies and/or typographical errors and may be changed or updated at any time by LGE without notice.

Parts not Provided



❶ ❷ ❸



❹ ❺ ❻ ❼ ❽ ❾

❶ Electrical Cable
- 16 AWG, with 2 conductors and 1 ground

❷ Water Supply Tube
- Minimum 3/8″ O.D. copper tubing or stainless steel braided water supply line

❸ Fittings for Tube

❹ Coupler

❺ Electrical Tape

❻ Air Gap

❼ Wire Nuts for 16-Gauge Wiring

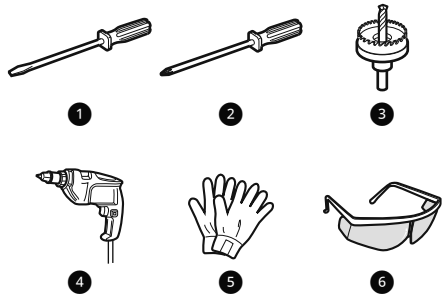
❽ Hose Clamp

❾ 3/8″ UL Approved Strain Relief

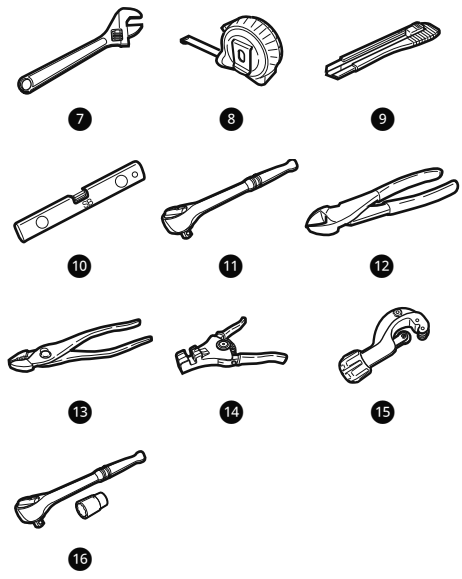
NOTE

- Power cord installation kit is available on LG.com, part number AEM75698901 (Model name : D-PC1)
- Inlet hose installation kit is available on LG.co part number AEM75698902.
- Drain extension hose installation kit is availab on LG.com, part number AEM75698903.

Tools Needed



❶ ❷ ❸ ❹ ❺ ❻



❶ Flat-Blade Screwdriver

❷ Phillips Screwdriver

❸ Hole Saw min. 2 1/2” bit

❹ Electric Drill

❺ Gloves

❻ Safety Glasses

❼ Adjustable Wrench

❽ Tape Measure

❾ Utility Knife

❿ Level

⓫ 1/4” Square Drive Wrench

⓬ Nipper

⓭ Pliers

⓮ Wire Stripper

⓯ Tubing Cutter

⓰ 3/8” Square Drive Wrench + 1/2” Socket

Installation Overview

Please read the following installation instructions first after purchasing this dishwasher or transporting it to another location.

❶ Preparing Cabinet Opening

❷ Preparing Water and Electrical Connections

❸ Preparing Dishwasher

❹ Sliding Dishwasher into Cabinet Opening

❺ Connecting Water Supply Line and Power

❻ Connecting the Drain Hose

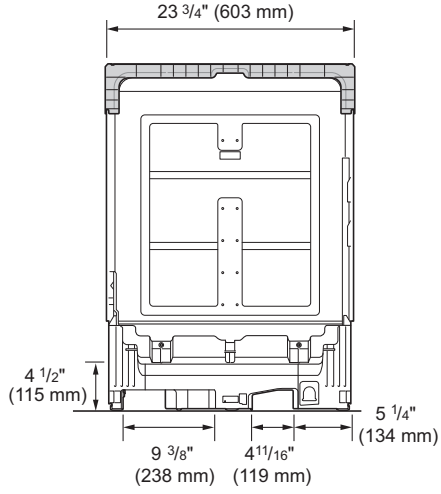
❼ Leveling Dishwasher

❽ Securing Dishwasher in Cabinet Opening

❾ Final Installation Check

Product Dimensions

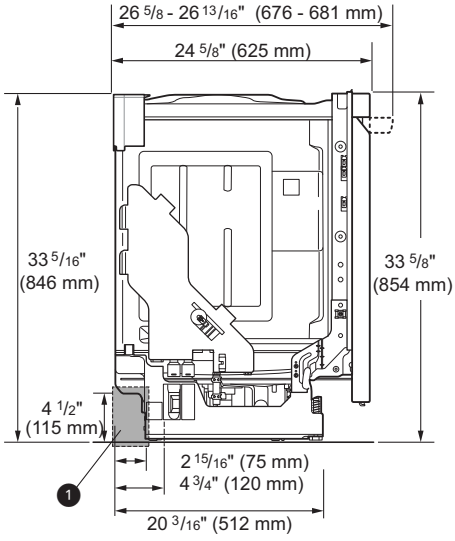
Back View



Side View

For easiest installation, see marked areas ❶ for water and electrical clearances in base of

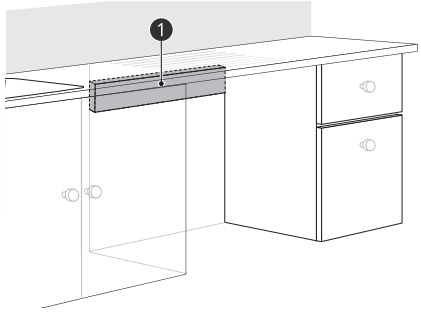
dishwasher. Water supply hose, drain hose and electric cable should be passed through this area.



Preparing Cabinet Opening

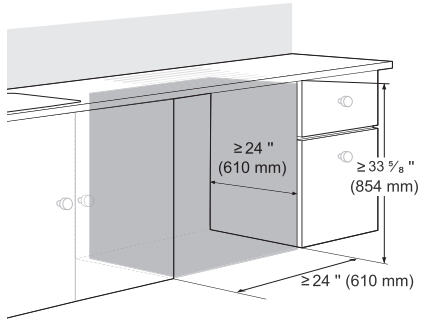
This dishwasher is designed to fit a standard dishwasher opening. An opening may be needed on both sides to route plumbing and electrical connections.

- To ensure proper drainage, install the dishwasher no more than 12 ft. (3.65 m) from the sink.
- The location must have sufficient space for the dishwasher door to open easily and provide at least 0.1” (2 mm) between the dishwasher and the cabinet sides.
- If installing the dishwasher in a corner, leave a minimum of 2” (50 mm) between the dishwasher and the adjacent wall.
- The adjacent wall must be free of obstructions.
- For flush installations only, you may remove the cabinet brace ❶ inside the cabinet.

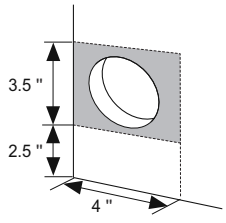


Choosing the Proper Location

1 Select a location as close to the sink as possible for easy connections to water supply line, drain hose and electrical connection.

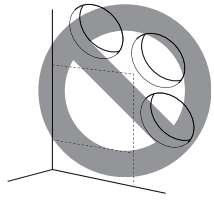


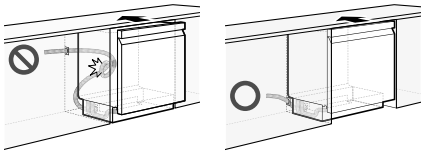
2 To allow for proper clearance of plumbing and electrical, use the template included with the literature to determine the clearance on the side of the cabinet where the cabinet meets the back wall. Using a 2 1/2” diameter hole saw, drill a hole in the target area as shown on the template.



⚠ WARNING

- The opening must be at least 2 1/2" (63.5 mm) in diameter to prevent damage to the cables and hoses during installation.
- Installation damage is not covered by the warranty, and leaks caused by improper installation may result in property damage.
- Do not use existing holes unless they are in the target area.
- Failure to properly locate the hole for the water and drain lines may prevent the dishwasher from installing flush with the cabinets and could result in kinked, pinched, crushed, stressed or damaged lines.





Preparing Water and Electrical Connections

⚠ WARNING

- Water Connection
  - Do not reuse an old hose. Use only a new hose when installing the dishwasher. The old hose could leak or burst causing flooding and property damage. Contact an LG Customer Information Center for assistance in buying a new hose.
- Electrical Connection
  - Use a time-delay fuse or circuit breaker.
  - Operate this appliance with the correct voltage as shown in this manual and on the rating plate.
  - The wiring must be grounded properly. If in doubt, have it checked by a qualified electrician.
  - Connect the appliance using 3-wires, including a ground wire.
  - The appliance and outlet must be positioned so that the plug is easily accessible.
  - Do not use an extension cable or adapter with this dishwasher.
  - Do not overload the outlet with more than one appliance.
  - The included 16AWG wire nuts should be used.
  - It is the personal responsibility and obligation of the product owner to have a proper outlet installed by a qualified electrician.

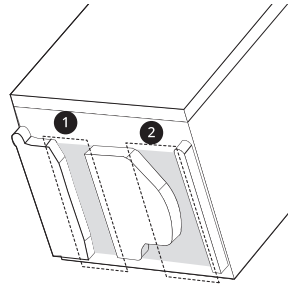
⚠ CAUTION

- When connecting the dishwasher water supply line to the house water supply, sealing tape or compound should be used on pipe threads to avoid leaks. Tape or compound should not be used on compression fittings.
- Connect the dishwasher to a hot water supply with a temperature range between 120 °F (49 °C) and 149 °F (65 °C). This temperature range provides the best washing results and shortest cycle time. To prevent damage to dishes, the temperature should not exceed 149 °F (65 °C).
- Water supply pressure must be between 20 psi and 80 psi (140–550 kPa). If the water supply pressure exceeds 80 psi, a pressure reducing valve must be installed. Otherwise premature failure of the inlet valve may occur.

Routing Water Supply Line and Electrical Wiring

There are 2 channels in the bottom of the dishwasher for routing the water and electrical connections.

- As shown in the bottom view below, channel ❶ is for the water supply line, and channel ❷ is for the electrical cable.



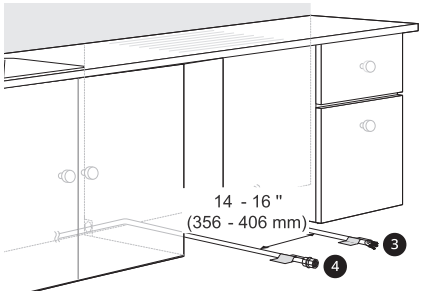
1 Turn off the house water supply and the circuit breaker or dedicated power before connecting the dishwasher.

2 Run the water supply line along the floor 6 1/2" – 7 3/4" (165 mm – 197 mm) from the left side of the opening and tape it in place in front of the opening.

3 Run the electrical cable ❸ along the floor 14" – 16" (356 mm – 406 mm) from the water supply line ❹ and tape it in place.

- The electrical outlet must be within 4 ft. (1.22 m) of either side of the dishwasher.
- The best location for the electrical conduit is on the right side of the back wall. Re-route the electrical cable before installation if the

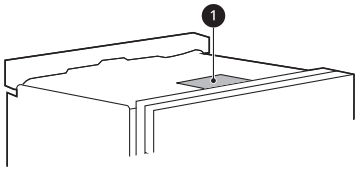
electrical conduit pipe is longer than 3" (76 mm) and is centered on the back wall.



Preparing Dishwasher

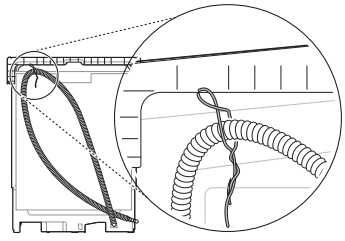
⚠ WARNING

- Do not remove safety cover ❶. Removal can result in fire, electric shock or death.



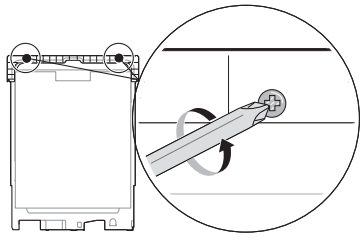
Releasing Drain Hose

Remove the twist tie holding the drain hose to the back of the shipping brace.



Removable Shipping Brace

The rear shipping brace can be removed if additional clearance is needed when installing the dishwasher under a low countertop.

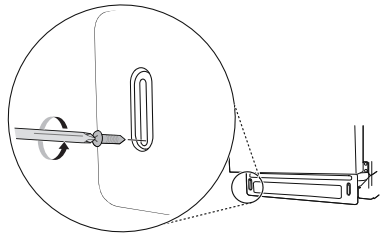


Removing Lower Cover

⚠ CAUTION

- If you lay the dishwasher on its back, do so carefully to avoid damaging the drain hose and the tub.

1 Remove the screws at either side which attach the lower cover to the dishwasher.



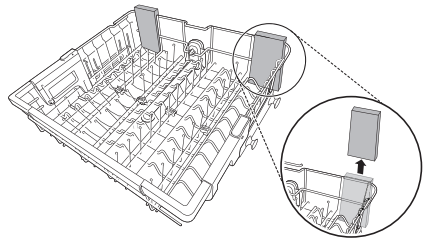
2 Remove the lower cover.

3 If there is insulation padding behind the lower cover, remove it.

4 Set the parts aside until the installation is complete.

Removing Packing Materials from the Interior

Remove all packing materials from the interior of the dishwasher before installing the appliance.



Attaching Installation Brackets

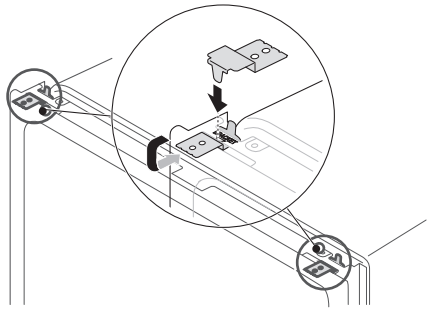
For countertops made of wood or other materials that will not be damaged by drilling, use the metal installation brackets provided.

For countertops made of granite, marble, or other materials that could be damaged by drilling, use the wood screws to attach the dishwasher to the cabinet. See installation instructions in **Securing Dishwasher to Cabinet Opening**.

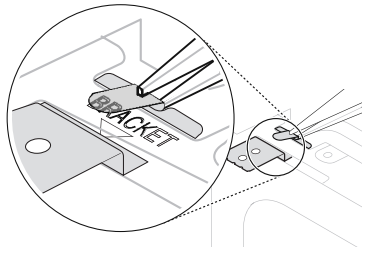
NOTE

- Installation brackets and screws can be found in the silverware basket.

1 Insert the tabbed end of the installation brackets into the slots in the upper frame. Rotate the brackets until the tabbed ends are facing up.



2 Bend the tabs on the brackets to secure them to the frame using a pair of needle nose pliers.

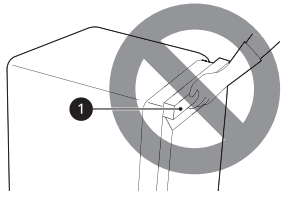


Sliding Dishwasher into Cabinet Opening

How to Slide Dishwasher

⚠ CAUTION

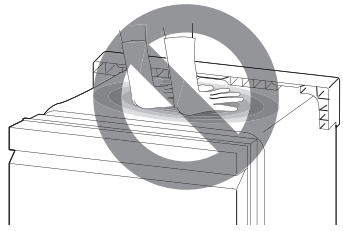
- Do not pull or lift the dishwasher using the handle ❶. Doing so can damage the door and hinges.



- Do not push the door of the dishwasher with knees when sliding the dishwasher into position. Doing so can damage the front cover.

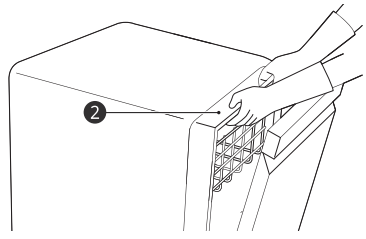


- Do not push the top of the dishwasher. Doing so can damage the interior of the dishwasher.

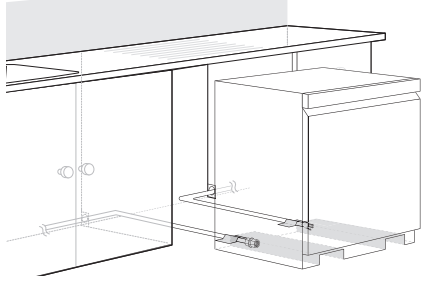


NOTE

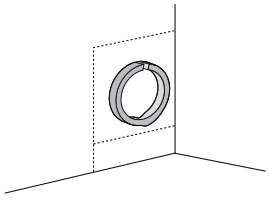
- Open the door and grab the body frame and the top front opening ❷ of the tub to move or lift the dishwasher.



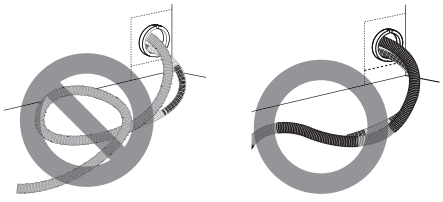
1 Align the dishwasher with the opening. Make sure the water supply line and electrical cable are in the correct positions to slide into their channels properly.



2 Smooth out or pad the edges of the hole drilled for the water supply to avoid damaging the drain hose.



3 Make sure the drain hose is straight before feeding the end of it through the hole for the water supply. As you slide the dishwasher into the opening, you will want to slowly pull on the drain hose from inside the cabinet to take up some slack. Be careful not to kink, pinch, crush or stress the drain hose during installation to avoid leaking and water damage.

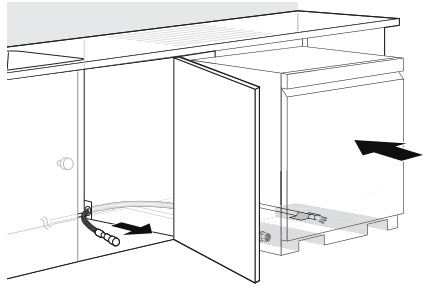


4 Gradually slide the dishwasher into the opening, making sure that the water supply line and electrical cable are passing freely through the channels and do not get caught under the dishwasher.

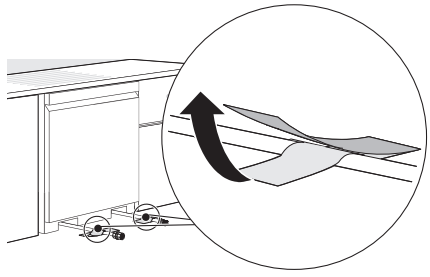
⚠ CAUTION

- To avoid malfunctions or leakage, it is important that the drain hose not get kinked, pinched, stressed or crushed behind or under the dishwasher or inside the neighboring cabinet.
- Damage resulting from improper installation is not covered under the warranty.

  - As you slide the dishwasher into the opening, stop periodically (or have an assistant help) to take up the slack by pulling the drain hose farther into the cabinet.



5 Remove the tape from the water supply line and the electrical cable.



Connecting Water Supply Line and Power

⚠ CAUTION

- Do not turn the dishwasher upside down to connect the water supply line or electrical supply. Doing so can damage the product.

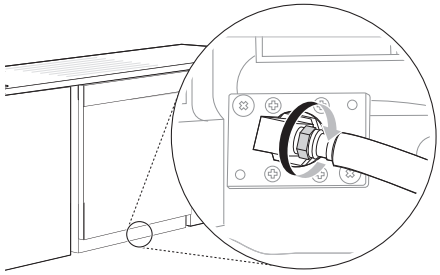
Connecting Water Supply Line

1 With the home water supply turned off, connect the water supply line to the inlet valve on the left front of the dishwasher.

⚠ CAUTION

- Tape or compound should not be used on dishwasher inlet valve.

2 Tighten the compression nut.

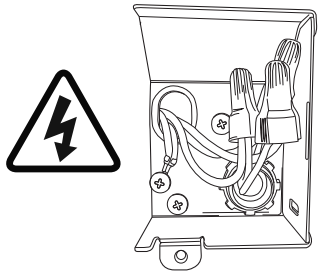


3 Slide the water supply line back through the channel, pulling gently from inside the cabinet to make sure the line is not kinked, pinched, stressed or crushed.

Connecting Power

The dishwasher should have a dedicated properly grounded branch circuit to connect the 3 wire setup which includes the ground wire.

If a 3-prong power supply is used, it should be in an accessible location adjacent to the dishwasher within 4 ft. (1.22 m) of the dishwasher side and not behind the dishwasher.

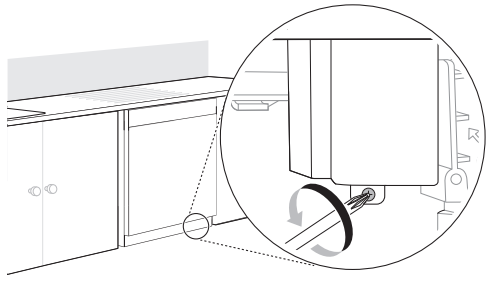


NOTE

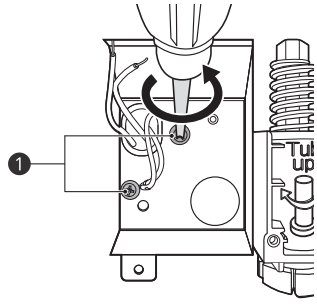
- The best location for the electrical conduit is on the right side of the back wall. Re-route the electrical cable before installation if the electrical conduit pipe is longer than 3” (76 mm) and is centered on the back wall.

1 Turn off electrical power to the unit at the circuit breaker.

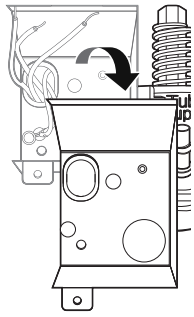
2 Use a Phillips screwdriver to remove the screw from the junction box cover and remove the cover.



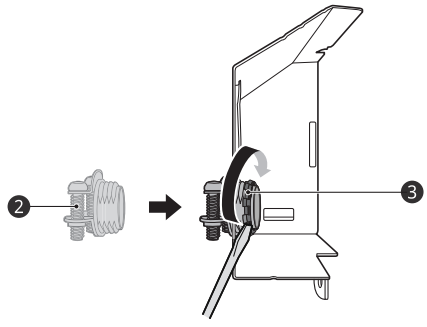
3 Use a Phillips screwdriver to remove 2 screws ❶.



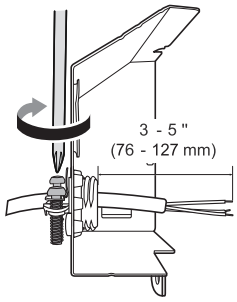
4 Remove the junction box from the appliance.



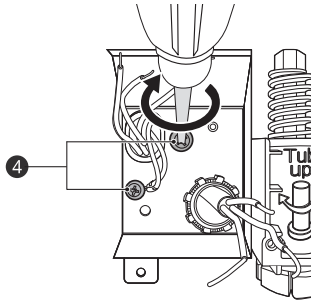
5 Insert a 3/8” strain relief ❷ through the hole in the junction box. Tighten the ring nut ❸ to secure it in place.



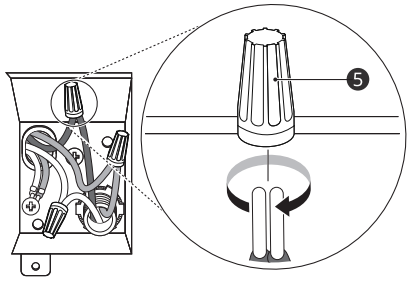
6 Insert the electrical cable through the hole in the strain relief. Tighten 2 screws to secure the cable.



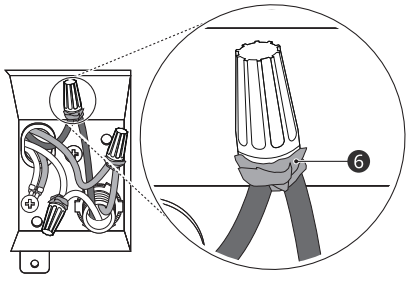
7 Pull the existing wires through the openings in the junction box. Tighten 2 screws ❹ to reassemble the junction box in the appliance.



8 Pair the white, black, and green wires to the matching colored wires from the dishwasher. Then twist on the provided wire nuts ❺ tightly to connect the corresponding wires.



9 Wrap electrical tape ❻ around each connection.



10 Fold the connected wires back into the junction box and screw on the junction box cover.

⚠ WARNING

- Verify that the black wire is hot (120 V). If not, or if you are unsure of the power supply, have it checked by a licensed electrician.

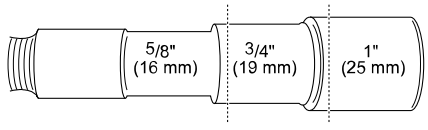
⚠ CAUTION

- Do not leave stripped wire exposed. Trim stripped wire to fit completely inside wire nuts.

Connecting the Drain Hose

If the end of the drain hose does not fit the drain line, use a heat and detergent resistant adapter (not supplied). These may be obtained from a local plumbing supply store.

- Cut the adapter to match the size of the drain connection as shown. Cutting just beyond the flare helps to keep the band clamp in place.

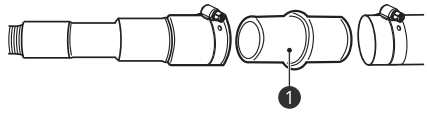


NOTE

- For drain hose installation, use the screw style hose clamp provided with this dishwasher in the silverware basket.
- If connecting the dishwasher's drain hose to the garbage disposal, be sure to follow your garbage disposal's manual for proper installation instructions.

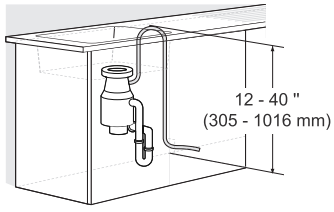
Drain Hose Requirements

- Follow local codes and ordinances.
- Do not exceed 12 ft. (3.65 m) distance to drain.
- Do not connect drain hoses from other appliances to the dishwasher's drain hose.
- If an extension drain hose is required, use a 5/8" or 7/8" inside diameter, 2-3 ft. length hose and a coupler ❶ for connecting the two hose ends.



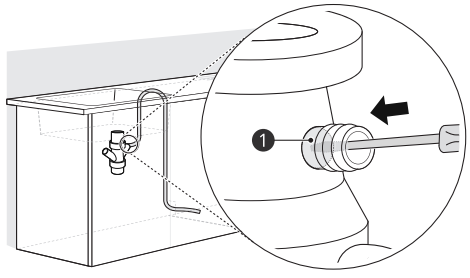
Height of the Drain Hose

The height of the drain hose end must be at least 12" (305 mm) and within 40" (1016 mm) from the base of the dishwasher to avoid water being siphoned from the tub.



Connecting to Disposal without Air Gap

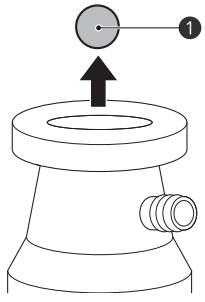
1 Remove the knockout plug on the disposal with a hammer and screwdriver.



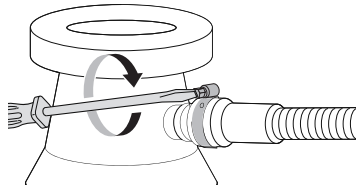
2 Remove the knockout plug ❶ from the disposal.

⚠ CAUTION

- If the knockout plug has not been removed, the dishwasher will not be able to drain properly.



3 Attach the drain hose to the disposal with the hose clamp provided. Move the hose clamp into position and tighten it with a flat-blade screwdriver.



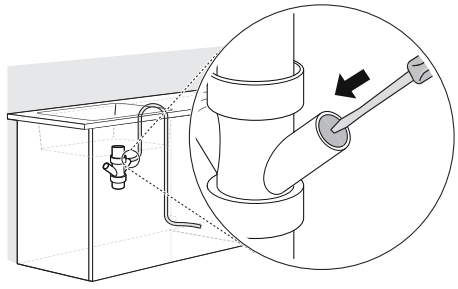
Connecting Waste Tee without Air Gap

The height of the drain hose end must be at least 12” (305 mm) and within 40” (1016 mm) from the base of the dishwasher to avoid water being siphoned from the tub.

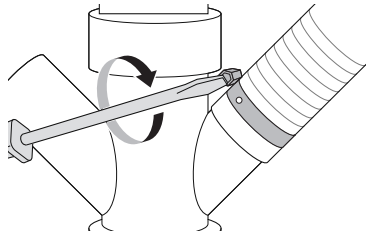
1 Remove the knockout plug with a hammer and screwdriver.

⚠ CAUTION

- If the knockout plug has not been removed, the dishwasher will not be able to drain properly.



2 Attach the drain hose to the waste tee with the hose clamp provided. Move the clamp into position and tighten it with a flat-blade screwdriver.

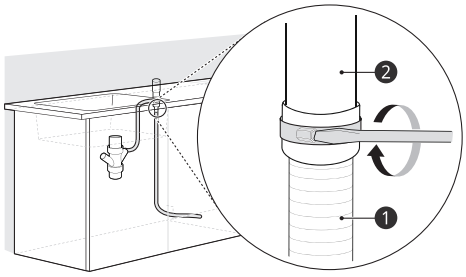


Connecting to Disposal or Waste Tee with Air Gap

1 Remove the knockout plug with a hammer and screwdriver.

2 Connect the end of the drain hose ❶ to the air gap ❷ with the hose clamp provided. Move the clamp into position and tighten it with a flat-blade screwdriver.

- This avoids water being siphoned from the tub.



3 If it is not connected, attach the rubber hose connector to the disposal or waste tee with a hose clamp (not provided).

Leveling Dishwasher

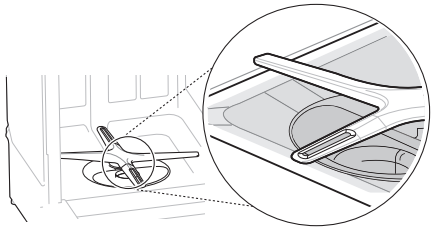
Check that the dishwasher is level and adjust the leveling feet if necessary.

⚠ CAUTION

- Failure to level the dishwasher may result in leakage, problems closing the door, or noise.
- Where the cabinet opening is narrower than recommended (see **Preparing Cabinet Opening**), the dishwasher must be carefully leveled and aligned so that the dishwasher is supported fully by the 3 leveling feet and is not hanging from the installation brackets. Failure to do so can result in leaks from the front of the dishwasher, AE errors, difficulty in closing the door, or failure to operate.

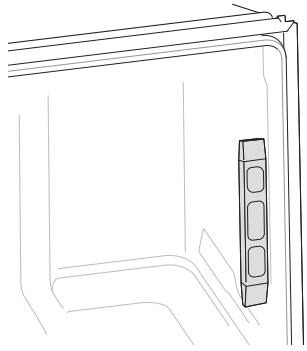
Checking Leveling

To check that the tub is level from front to back, remove the lower rack and pour 169 oz. (5 L) of water into the bottom of the tub. The water level should be near the center of both tub lower indentations at the front.

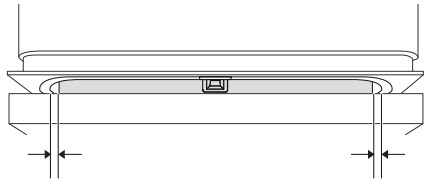


With the lower rack removed, place a level on the inside wall of the tub to check that the dishwasher is level from side to side.

- If you do not have a level, try using a smartphone level application instead.



Make sure that the gap between the tub walls and the door liner is the same on either side.



Adjusting Leveling Feet

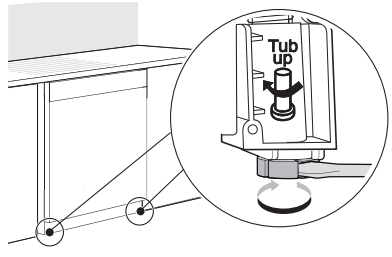
Adjust as needed until the dishwasher is completely leveled.

- Adjust the front and rear leveling feet until they are all in firm contact with the floor. Failure to level the dishwasher may prevent the door from closing properly and the dishwasher will not turn on.

Adjusting Front Leveling Feet

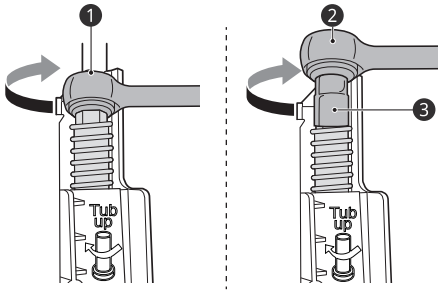
Use a flat-blade screwdriver to turn the front leveling feet and adjust the front of the tub.

- Turn the front leveling feet clockwise to raise the front of the tub and counterclockwise to lower it.



- The adjustments work identically for both front leveling feet.
- When a flat-blade screwdriver is unavailable, use a 1/4" square drive wrench ❶ or 3/8" square

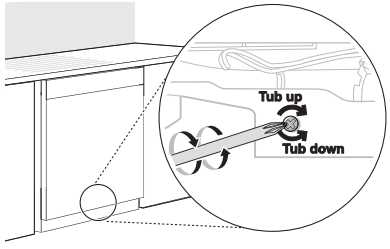
drive wrench ❷ with 1/2" socket ❸ to turn the front leveling feet and adjust the front of the tub.



Adjusting Rear Leveling Foot

Use a Phillips screwdriver to adjust the rear leveling foot and the rear of the tub using the center screw at the base of the appliance in the front.

- Turn the center screw clockwise to raise the rear of the tub and counterclockwise to lower it.



NOTE

- To avoid damaging the screw, do not use an electric screwdriver.

Securing Dishwasher in Cabinet Opening

There are 2 options for securing the dishwasher. If the countertop is made of wood or a material that can safely be drilled into, secure the dishwasher to the countertop with the provided brackets. If the countertop is granite, marble, or a material that cannot be drilled into, secure the dishwasher to the cabinet frame with the provided wood screws.

⚠ CAUTION

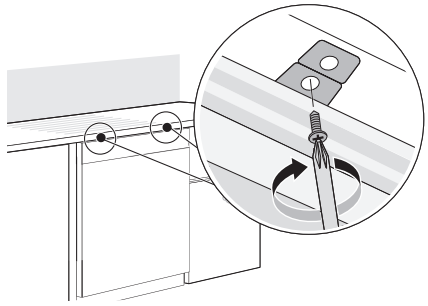
- Ensure the dishwasher is level and all leveling feet are in firm contact with the floor before attaching the dishwasher to the countertop or cabinet. If the dishwasher is not leveled properly, the door may not close properly or water may leak.

NOTE

- Installation brackets and screws can be found in the silverware basket.
- Use a magnetic screwdriver.
- Cover the filter hole with towels to prevent screws from falling down into the pump.

Securing Dishwasher to Countertop

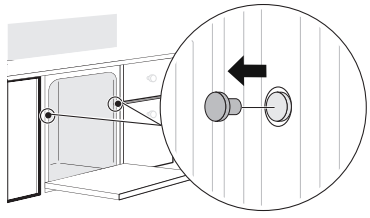
Use the bracket screws provided to secure the brackets at the top of the dishwasher to the underside of the wood countertop.



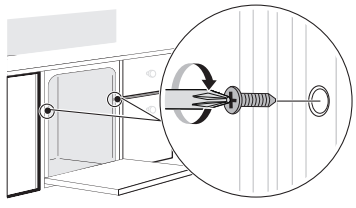
Securing Dishwasher to Cabinet Frame

If desired, the dishwasher can also be secured to the cabinet frame using the instructions which follow.

1 Remove the 2 plastic caps from the mounting bracket access holes.



2 Drive a wood screw through the mounting bracket and into the cabinet frame.



3 Reinstall the plastic caps.

Sound Insulation Sheet
If your model shipped with a sound insulation sheet, follow the instructions provided to install the sheet now. But wait to install the insulation pad and lower cover until after the final installation check.

Final Installation Check

Testing the Dishwasher

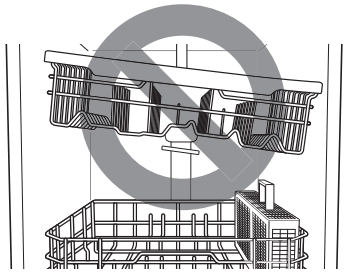
Check if the dishwasher is properly installed.

1 Turn on the circuit breaker.

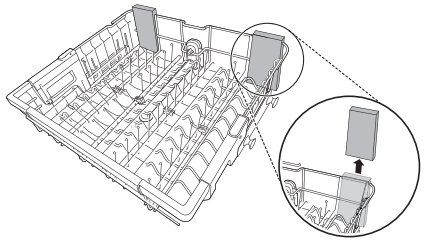
2 Turn on the house water supply.

3 Make sure that the door opens and closes smoothly.

- If necessary, level the dishwasher again.
- If the door will not close, make sure the rack is level.



- Make sure that all packaging materials have been removed.



4 Power on the dishwasher and run a **1 Hour** cycle to verify proper operation.

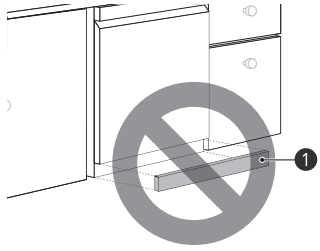
5 Check for leaks at the drain hose and water supply connection.

6 If a water leak is detected, press and hold the **START** button for 3 seconds to cancel the wash cycle and automatically drain the water from the dishwasher. Tighten all water connections and run another cycle. Repeat until no leaks are detected.

7 Replace the lower cover.

⚠ CAUTION

- Only install the lower cover provided with the dishwasher. Do not install cabinet baseboard ❶ as it may cause noise and leakage.



8 Remove the protective film from the door, if present. Leaving the film on may cause discoloration or condensation on the door.

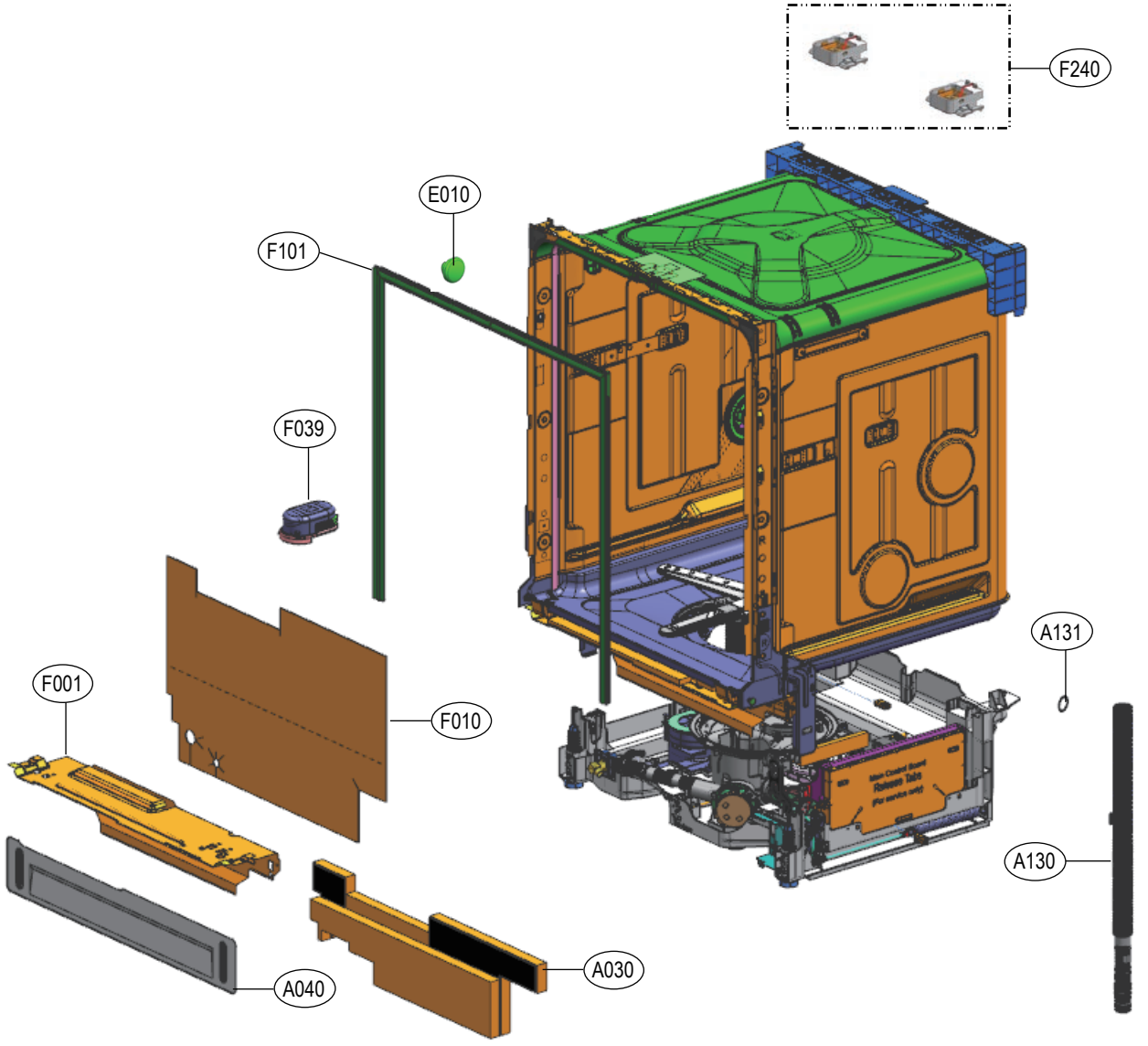
Installation Check Error Codes

Refer to the chart below before calling for service.

Error Code	Possible Cause and Solution
OE	**Drain hose is kinked or pinched.** • Feed the drain and water supply hoses through the hole under the sink. Then gradually slide the dishwasher into the cabinet while pulling on the hoses under the sink to take up any slack. This helps avoid kinking the hoses or trapping them beneath the dishwasher. **Drain hose is connected to the disposal without removing the knockout plug.** • Remove the knockout plug from the disposal. **Waste tee or disposal is clogged.** • Remove knockout plug on the waste tee or disposal.

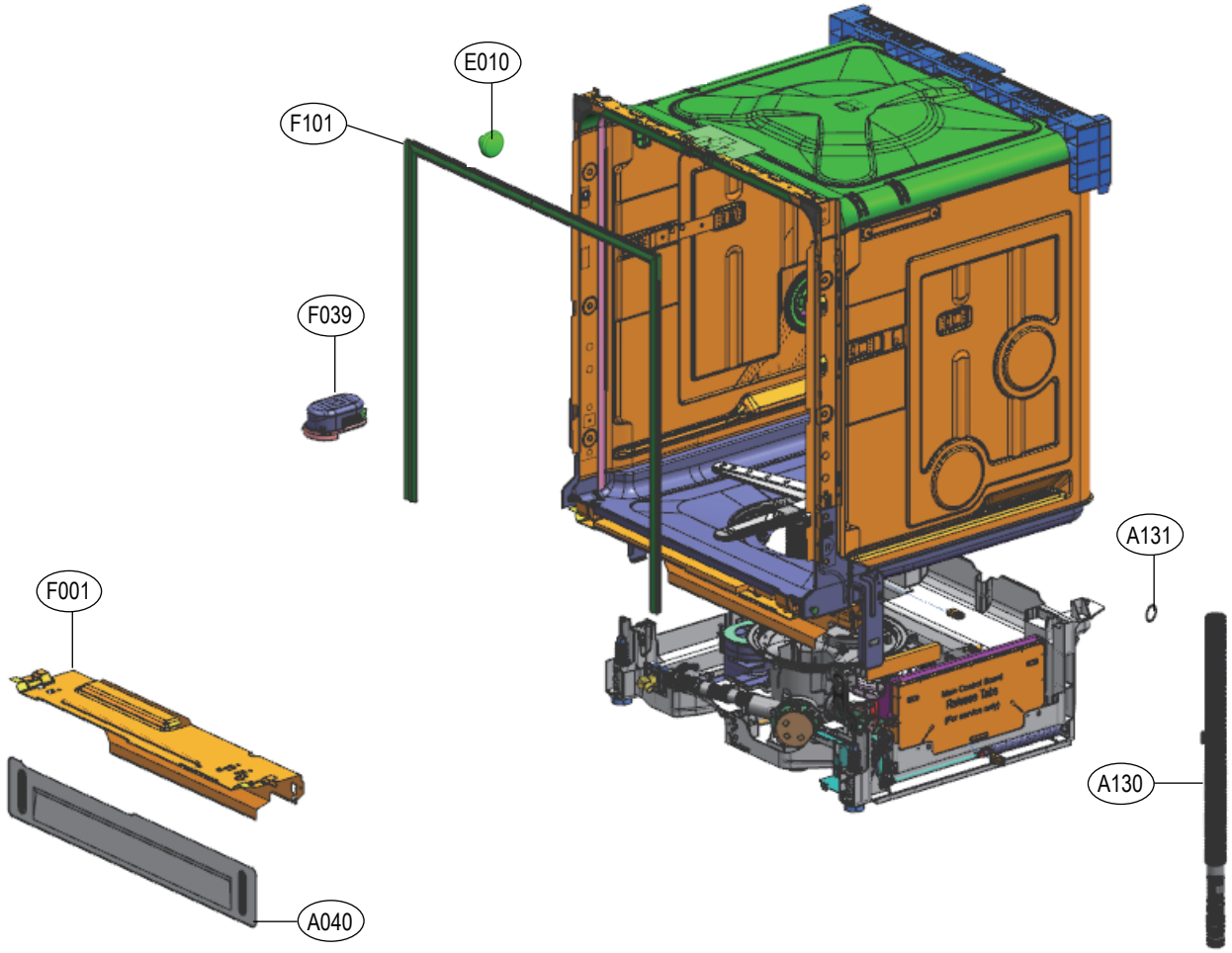
Error Code	Possible Cause and Solution
IE	**Water supply line is kinked under dishwasher.** • Feed the drain and water supply hoses through the hole under the sink. Then gradually slide the dishwasher into the cabinet while pulling on the hoses under the sink to take up any slack. This helps avoid kinking the hoses or trapping them beneath the dishwasher. **House water supply is not turned on.** • Turn the water faucet on.

12. Exploded View



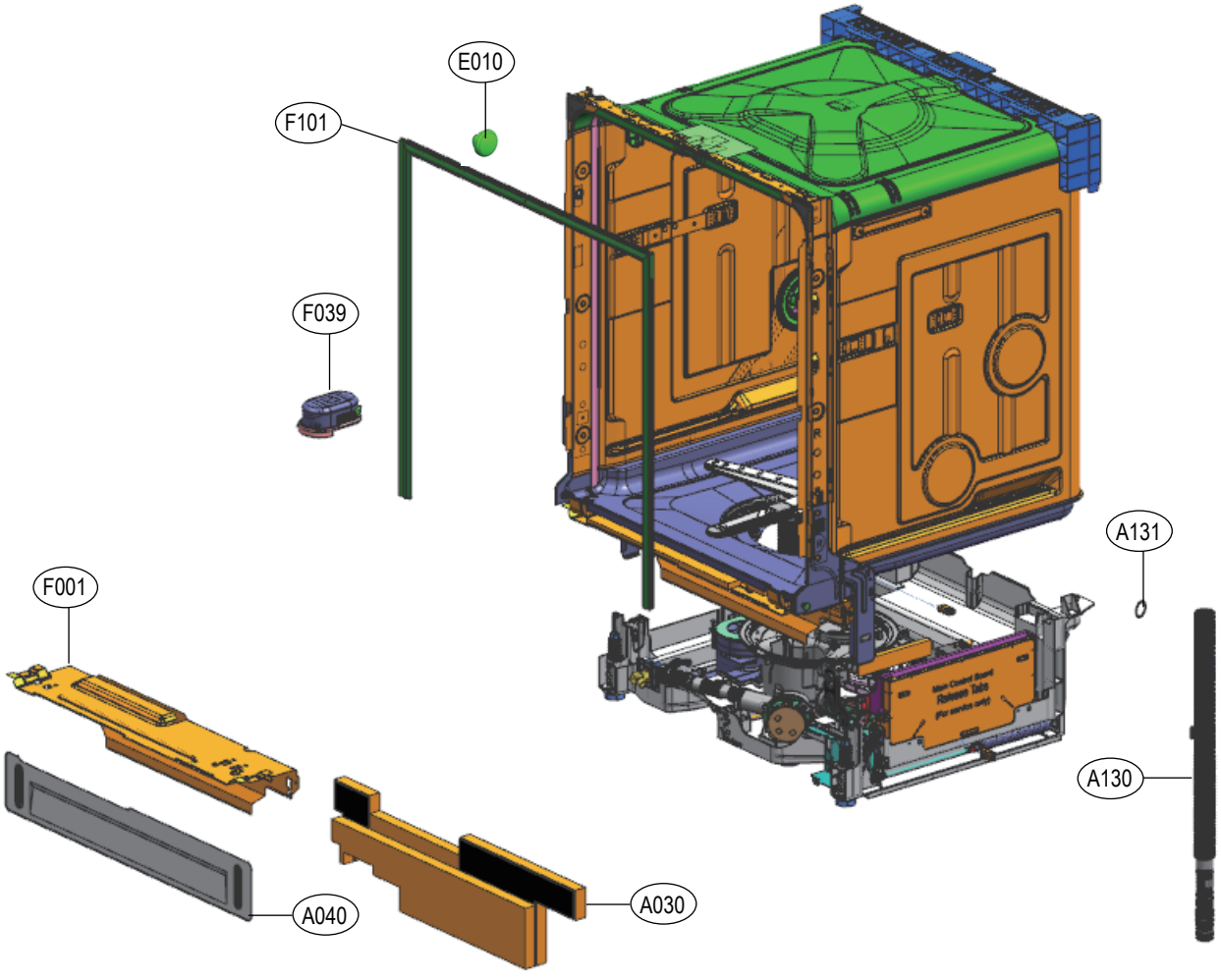
SVC Part	Part	P/No
Accessory Assembly (5001DD4001C) E005	Bracket,Top	4810DD4002B
	Screw,Customized	1SZZED3007A
	Bag	3Z90501G
	Clamp	MBU61844902





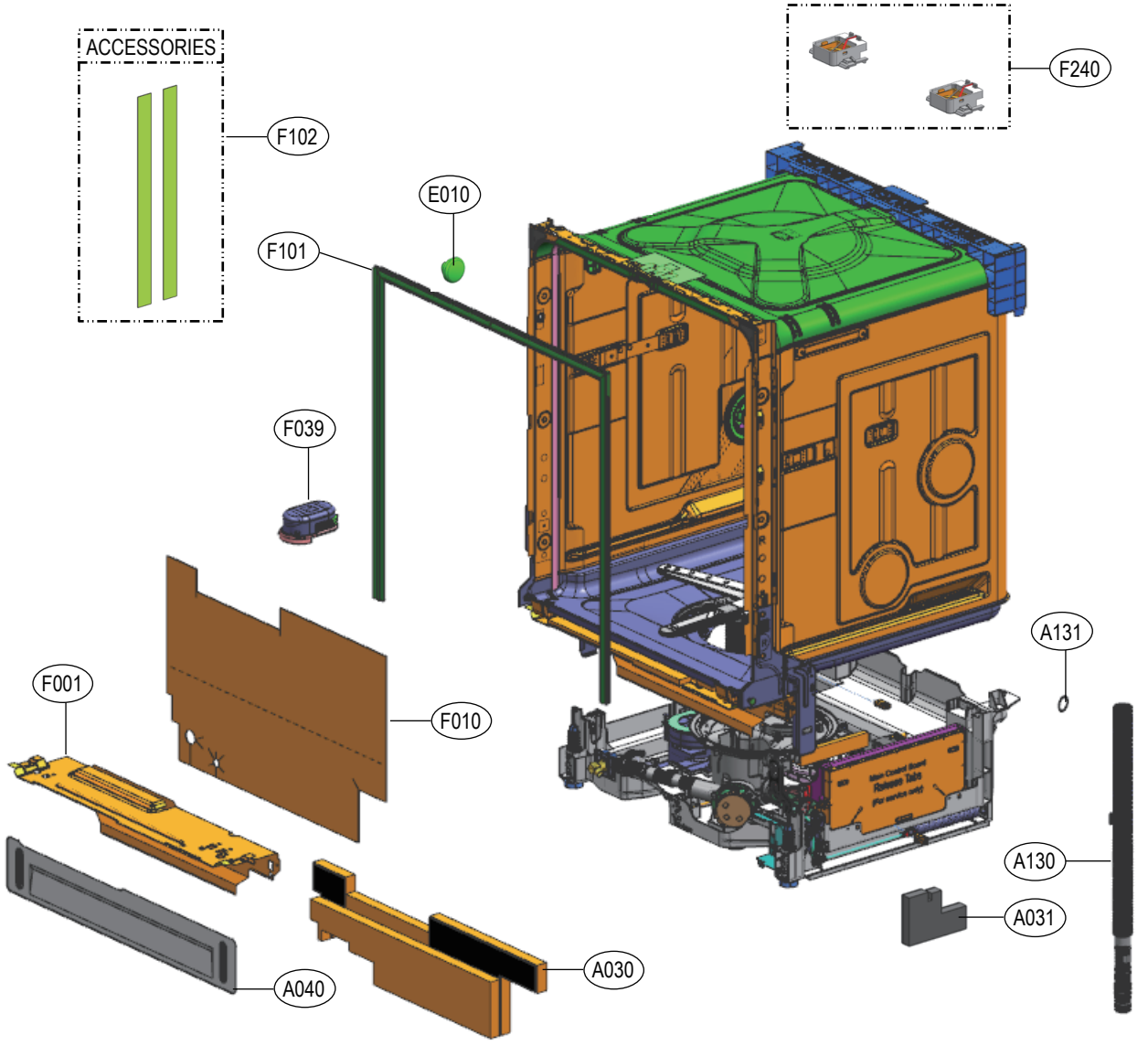
SVC Part	Part	P/No
Accessory Assembly (5001DD4001C) E005	Bracket,Top	4810DD4002B
	Screw,Customized	1SZZED3007A
	Bag	3Z90501G
	Clamp	MBU61844902





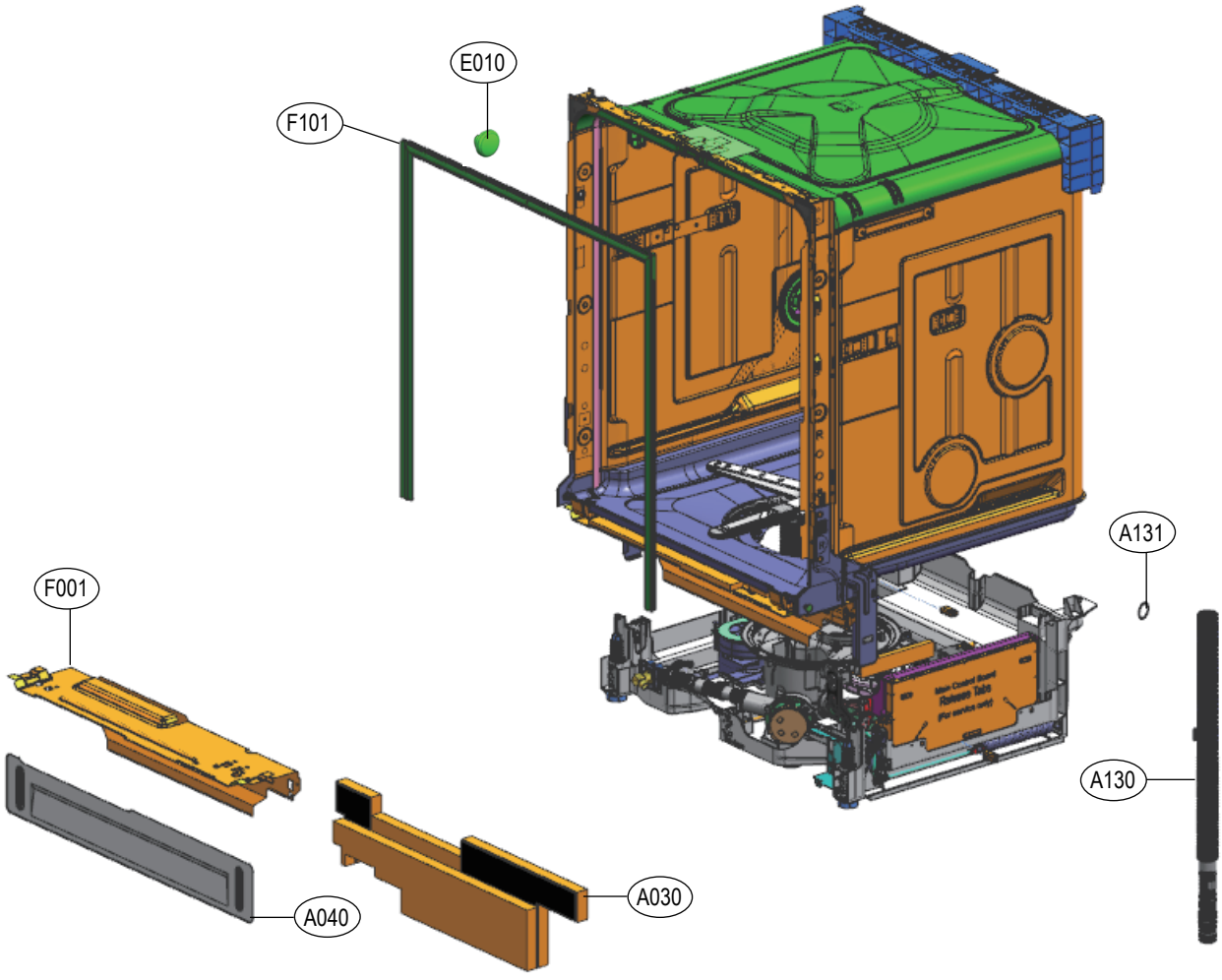
SVC Part	Part	P/No
Accessory Assembly (5001DD4001C) E005	Bracket,Top	4810DD4002B
	Screw,Customized	1SZZED3007A
	Bag	3Z90501G
	Clamp	MBU61844902





SVC Part	Part	P/No
Accessory Assembly (5001DD4001C) E005	Bracket,Top	4810DD4002B
	Screw,Customized	1SZZED3007A
	Bag	3Z90501G
	Clamp	MBU61844902





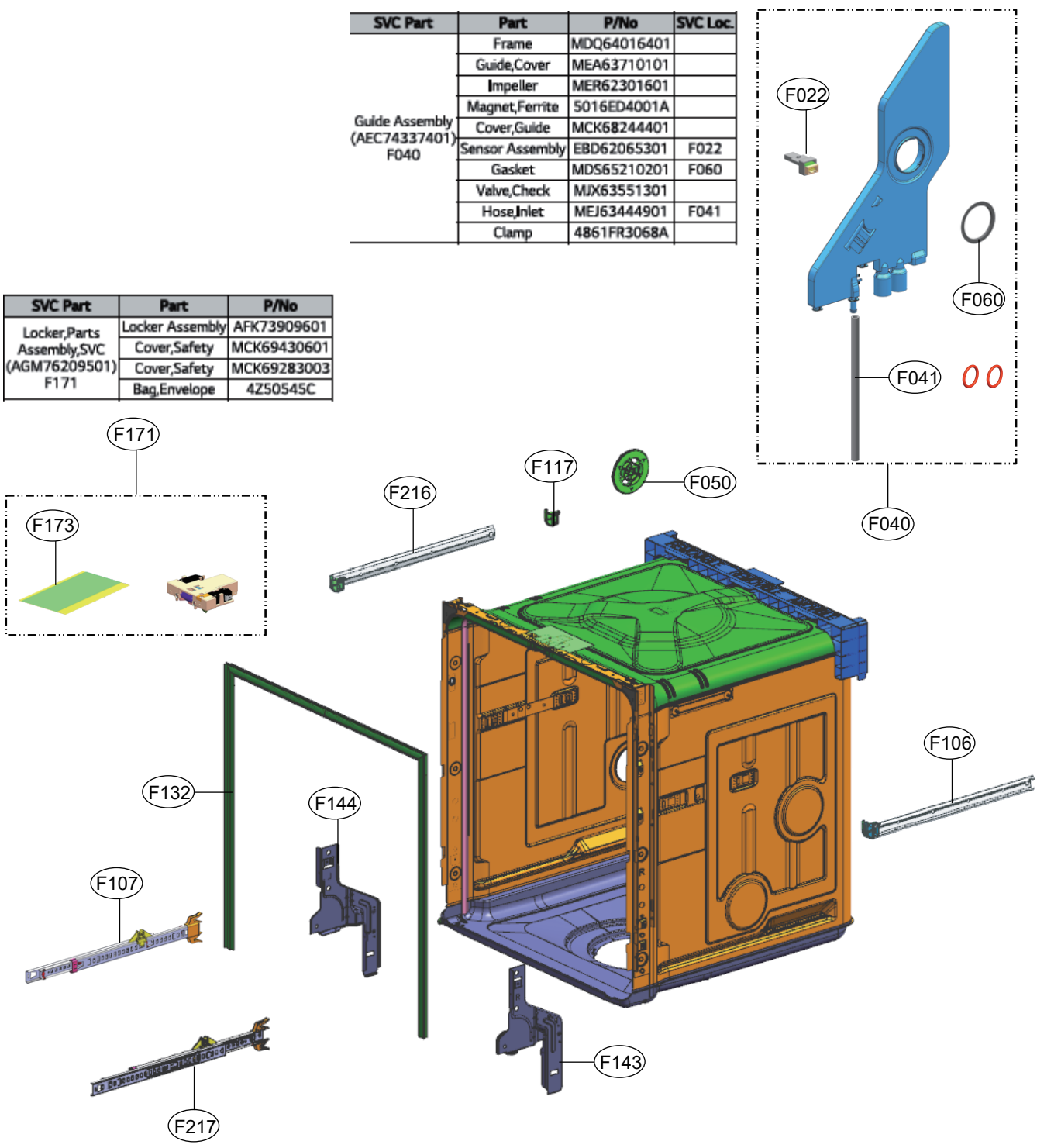
SVC Part	Part	P/No
Accessory Assembly (5001DD4001C) E005	Bracket,Top	4810DD4002B
	Screw,Customized	1SZZED3007A
	Bag	3Z90501G
	Clamp	MBU61844902



■ Tub Assembly

SVC Part	Part	P/No	SVC Loc.
Guide Assembly (AEC74337401) F040	Frame	MDQ64016401	
	Guide,Cover	MEA63710101	
	Impeller	MER62301601	
	Magnet,Ferrite	5016ED4001A	
	Cover,Guide	MCK68244401	
	Sensor Assembly	EBD62065301	F022
	Gasket	MDS65210201	F060
	Valve,Check	MJX63551301	
	Hose,Inlet	MEJ63444901	F041
	Clamp	4861FR3068A	

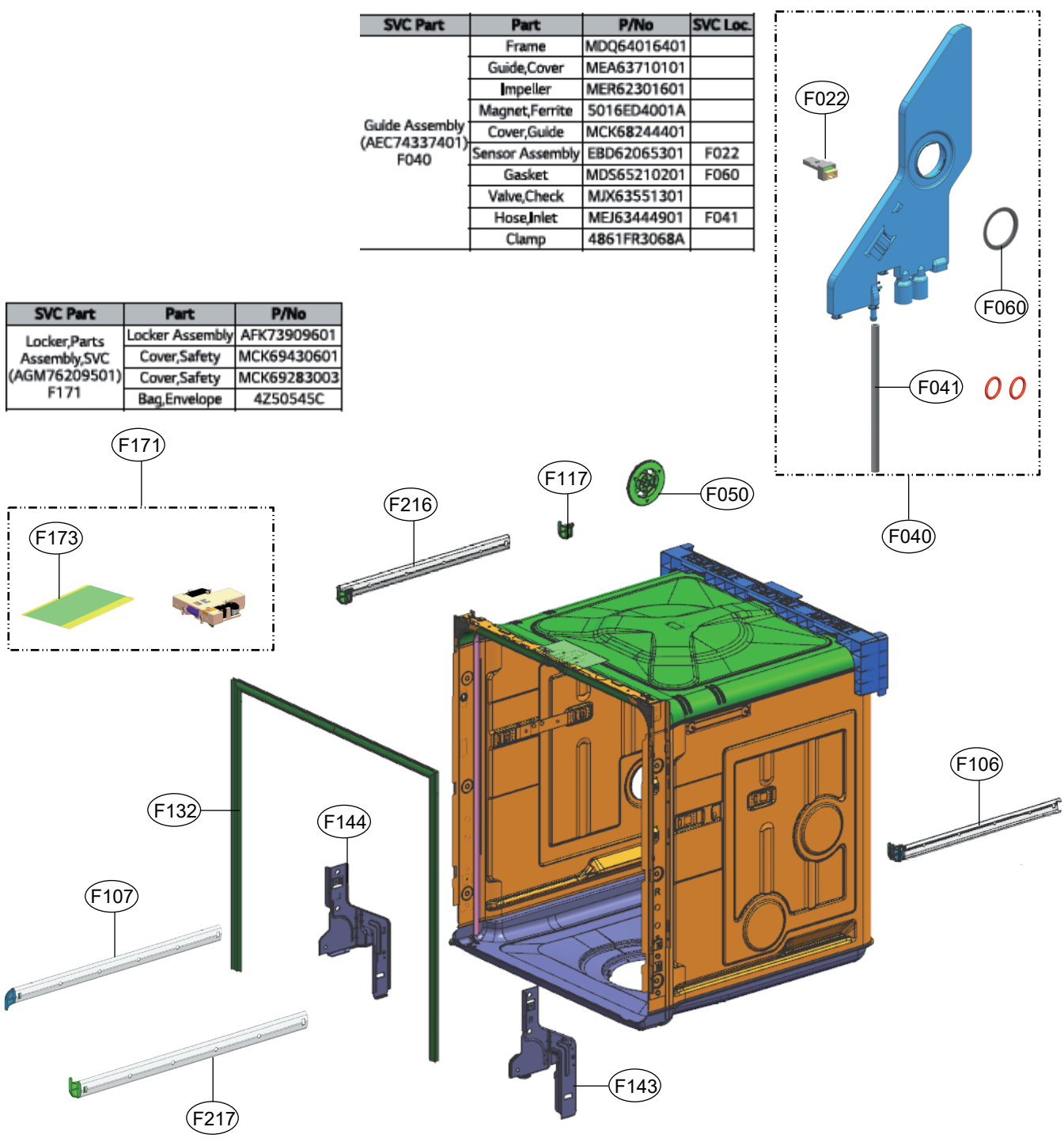
SVC Part	Part	P/No
Locker,Parts Assembly,SVC (AGM76209501) F171	Locker Assembly	AFK73909601
	Cover,Safety	MCK69430601
	Cover,Safety	MCK69283003
	Bag,Envelope	4Z50545C



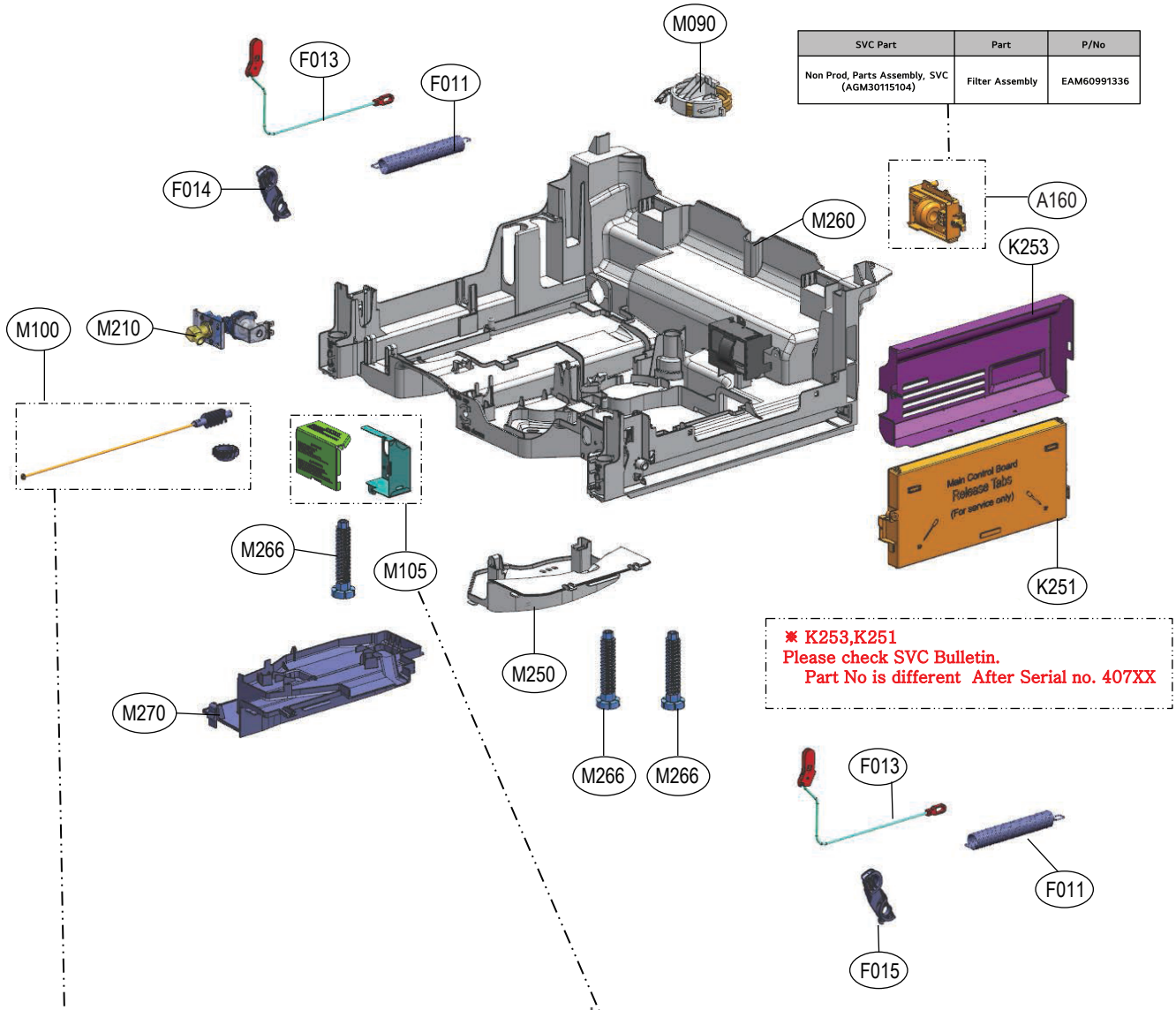
■ Tub Assembly

SVC Part	Part	P/No	SVC Loc.
Guide Assembly (AEC74337401) F040	Frame	MDQ64016401	
	Guide,Cover	MEA63710101	
	Impeller	MER62301601	
	Magnet,Ferrite	5016ED4001A	
	Cover,Guide	MCK68244401	
	Sensor Assembly	EBD62065301	F022
	Gasket	MDS65210201	F060
	Valve,Check	MJX63551301	
	Hose,Inlet	MEJ63444901	F041
	Clamp	4861FR3068A	

SVC Part	Part	P/No
Locker,Parts Assembly,SVC (AGM76209501) F171	Locker Assembly	AFK73909601
	Cover,Safety	MCK69430601
	Cover,Safety	MCK69283003
	Bag,Envelope	4Z50545C



■ Base Assembly



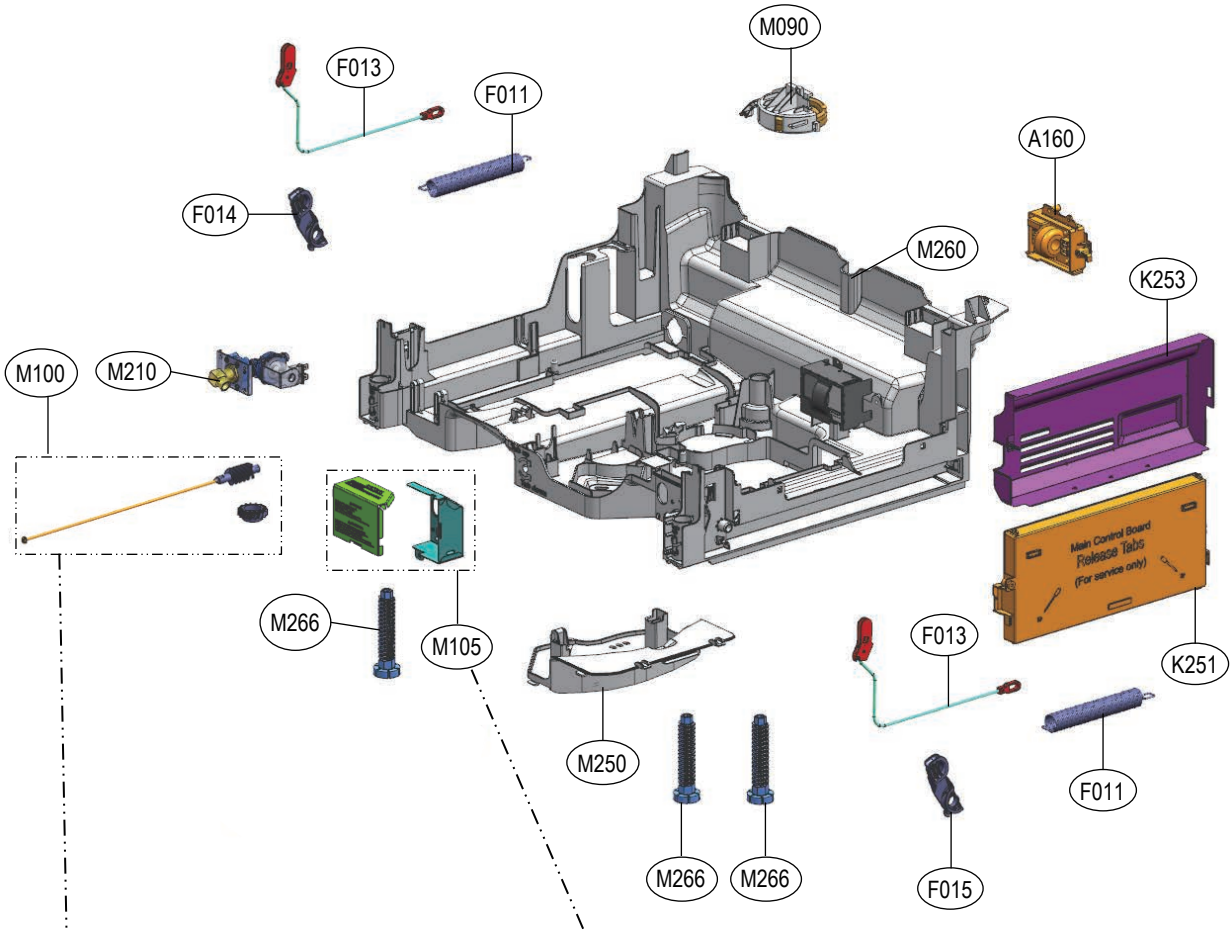
SVC Part	Part	P/No
Non Prod, Parts Assembly, SVC (AGM30115104)	Filter Assembly	EAM60991336

※ K253,K251
Please check SVC Bulletin.
Part No is different After Serial no. 407XX

SVC Part	Part	P/No
Shaft Assy,Parts Assembly,SVC (AGM75510001) M100	Gear,Unit	MDT63267301
	Shaft Assembly	AHR73429701

SVC Part	Part	P/No
Cover,Parts Assembly,SVC (AGM72573101) M105	Case	3110DD3002A
	Cover Assembly,Safety	3551DD3001A

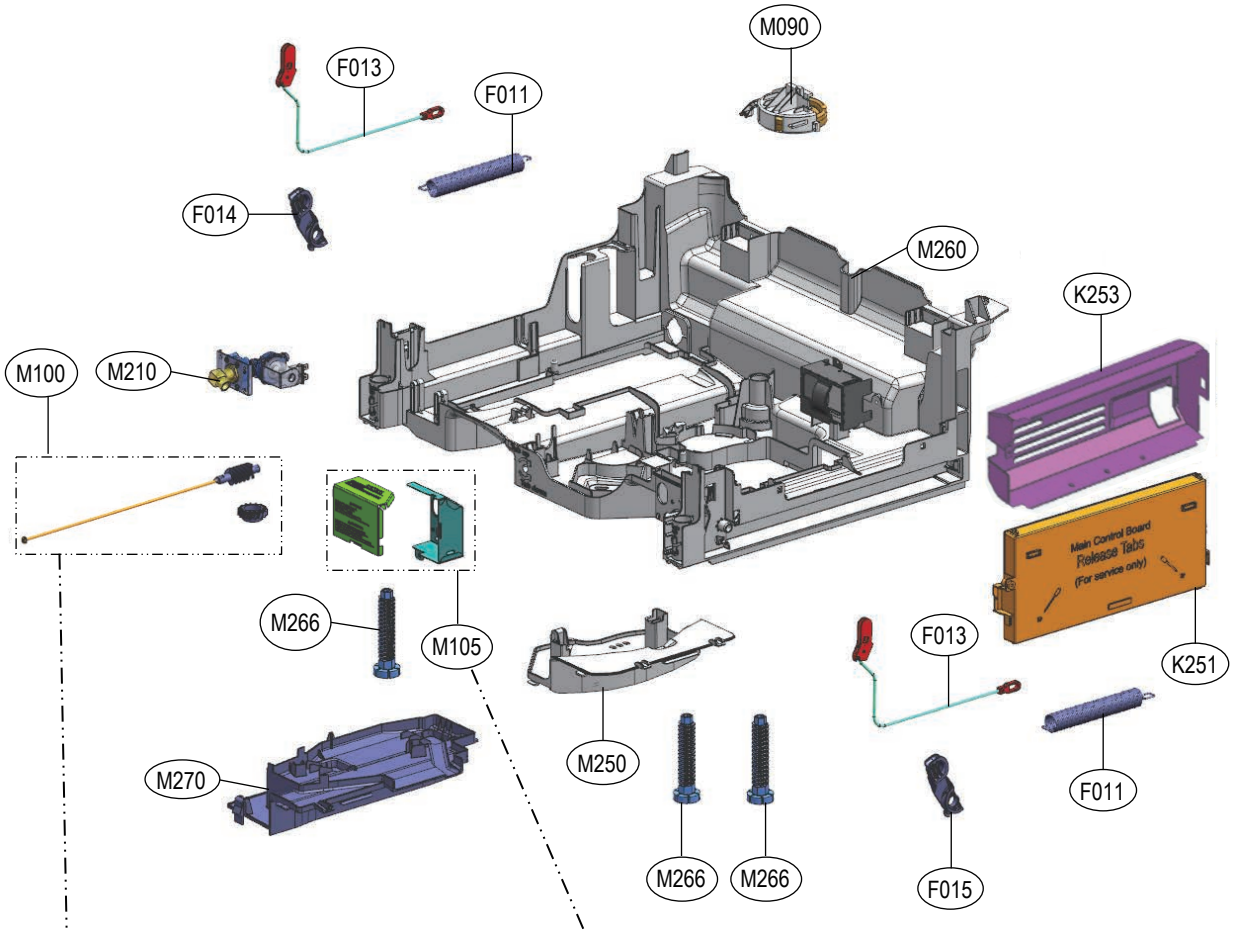
■ Base Assembly



SVC Part	Part	P/No
Shaft Assy,Parts Assembly,SVC (AGM75510001) M100	Gear,Unit	MDT63267301
	Shaft Assembly	AHR73429701

SVC Part	Part	P/No
Cover,Parts Assembly,SVC (AGM72573101) M105	Case	3110DD3002A
	Cover Assembly,Safety	3551DD3001A

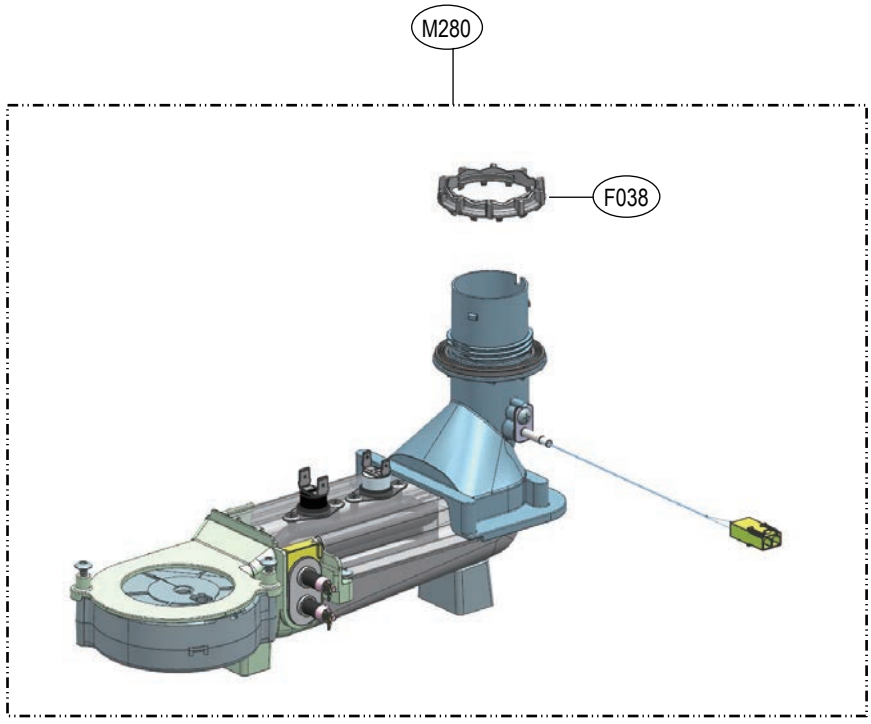
■ Base Assembly



SVC Part	Part	P/No
Shaft Assy,Parts Assembly,SVC (AGM75510001) M100	Gear,Unit	MDT63267301
	Shaft Assembly	AHR73429701

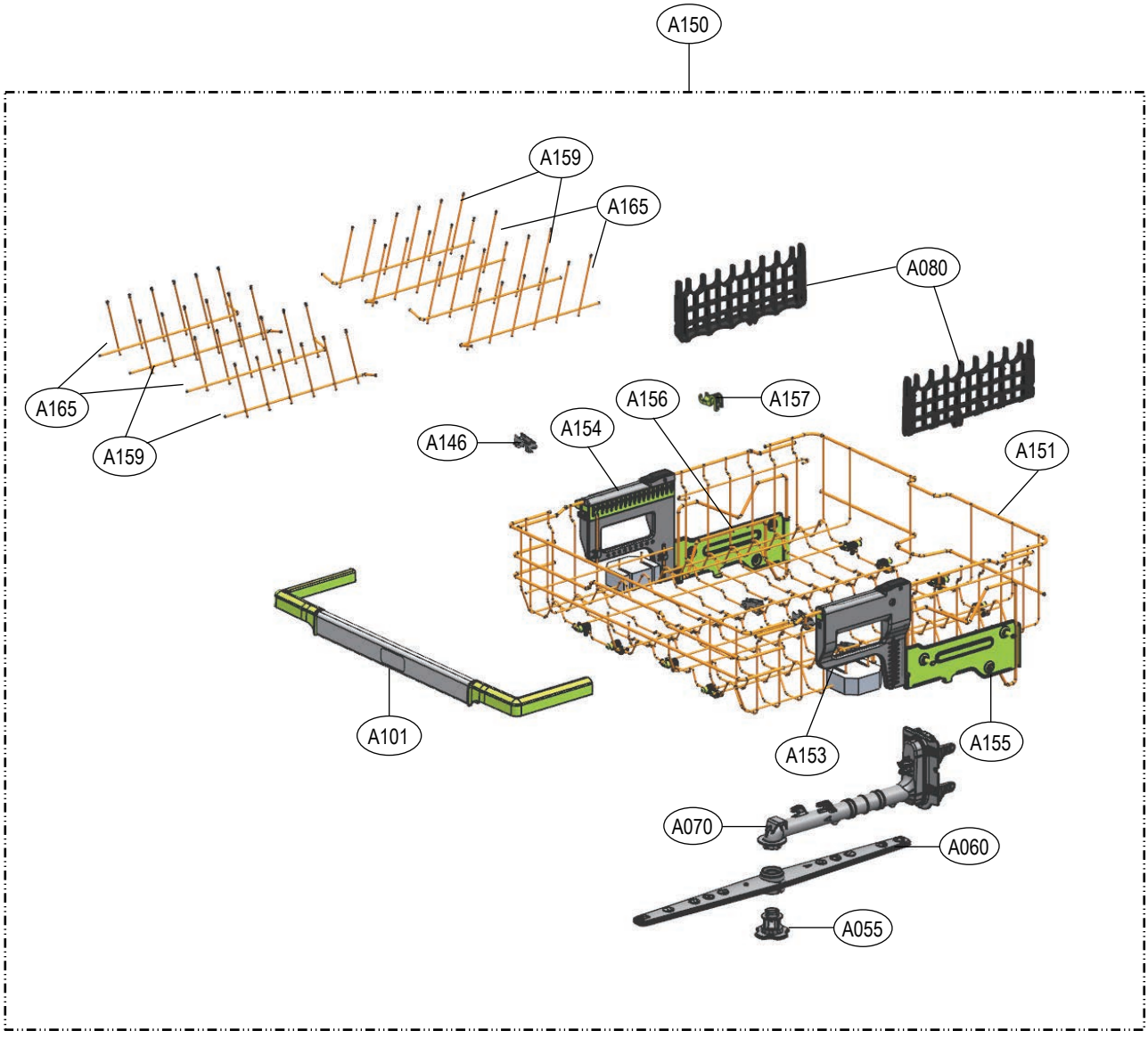
SVC Part	Part	P/No
Cover,Parts Assembly,SVC (AGM72573101) M105	Case	3110DD3002A
	Cover Assembly,Safety	3551DD3001A

■ Case Assembly (Heat Dry Blower)

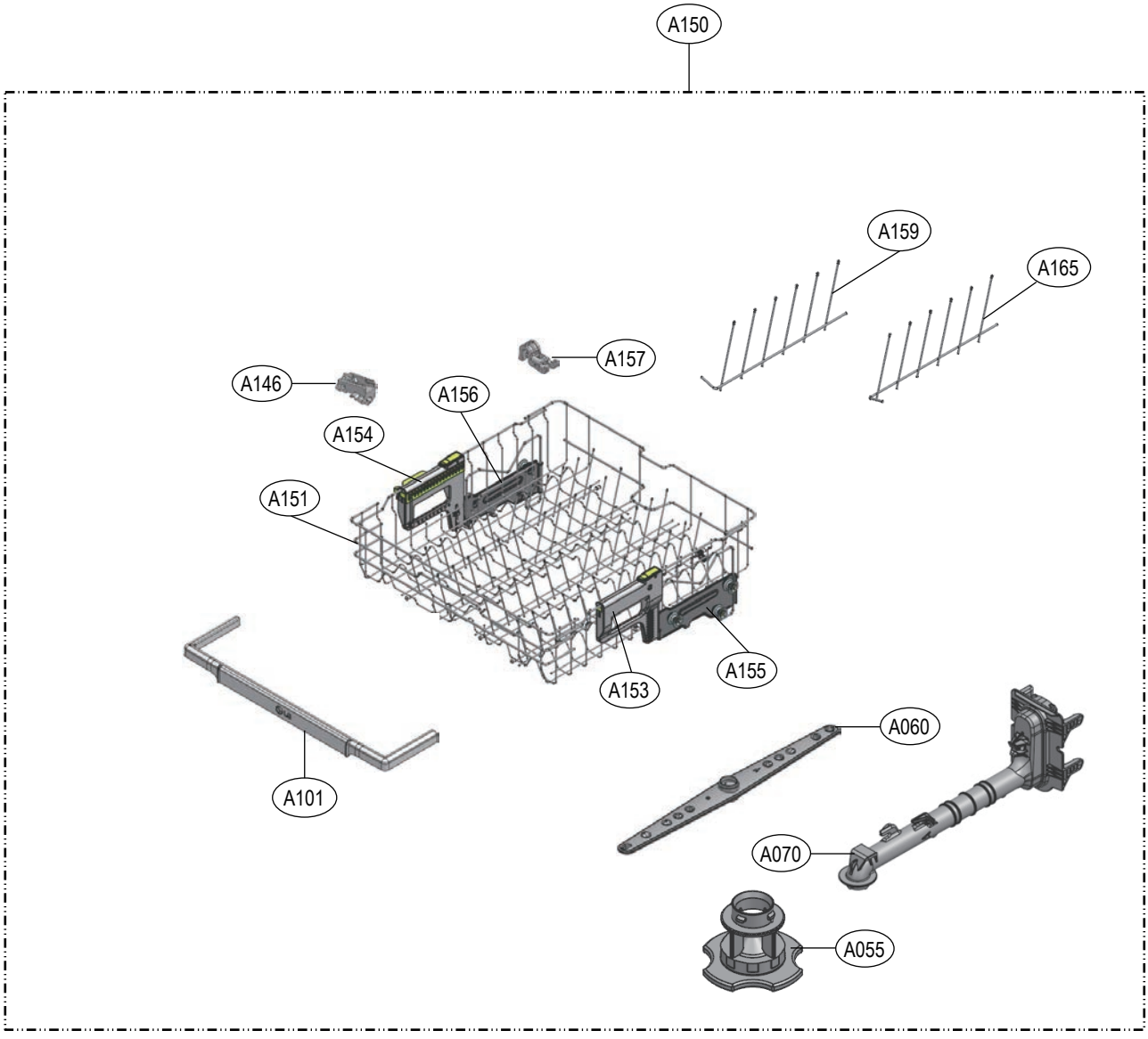


SVC Part	Part	P/No	SVC Loc.
Case,Parts Assembly,SVC (AGM30073201) M280	Case Assembly	ABQ30148502	
	Nut,Common	FAD33760801	F038

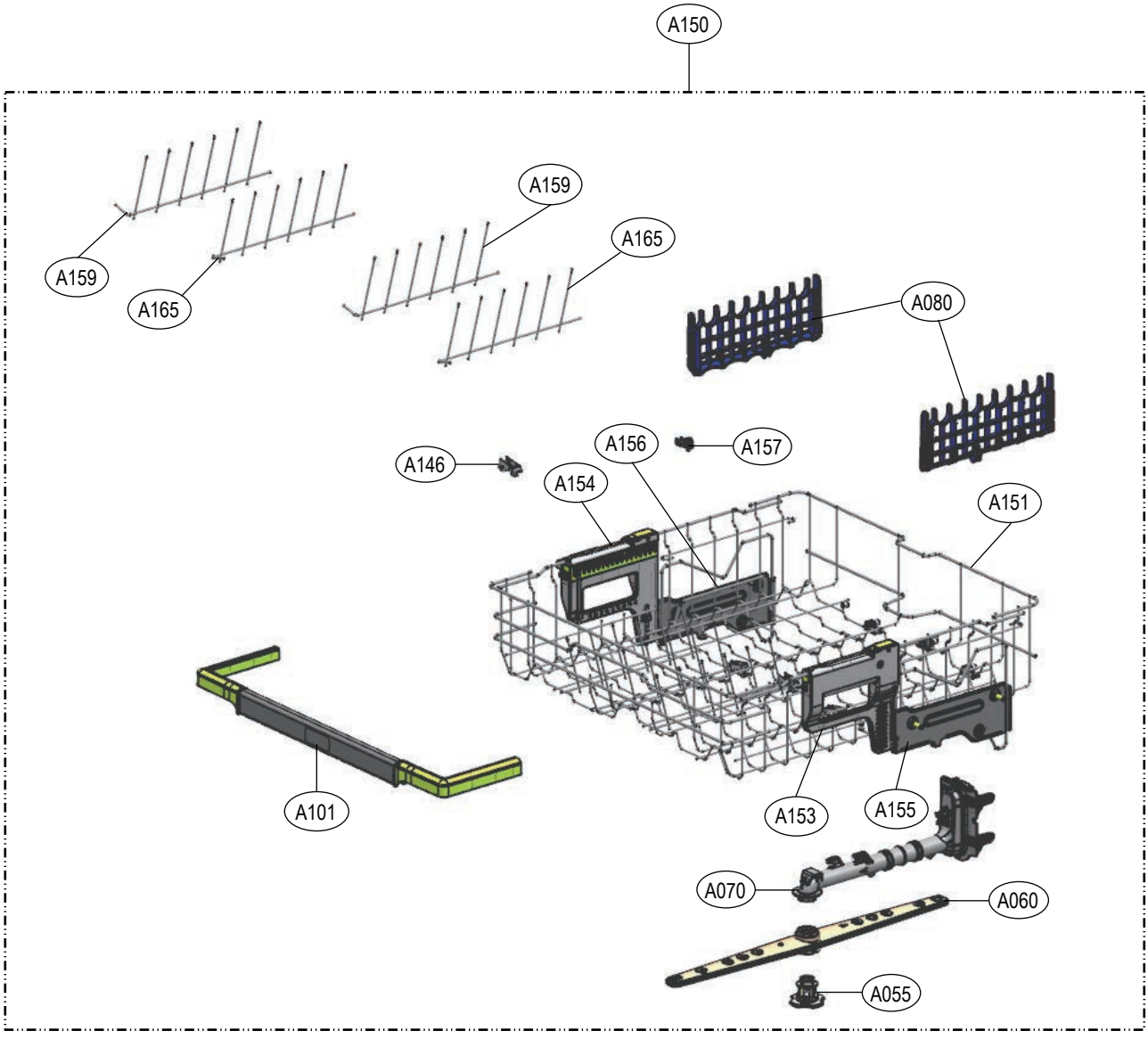
■ Upper Rack Assembly



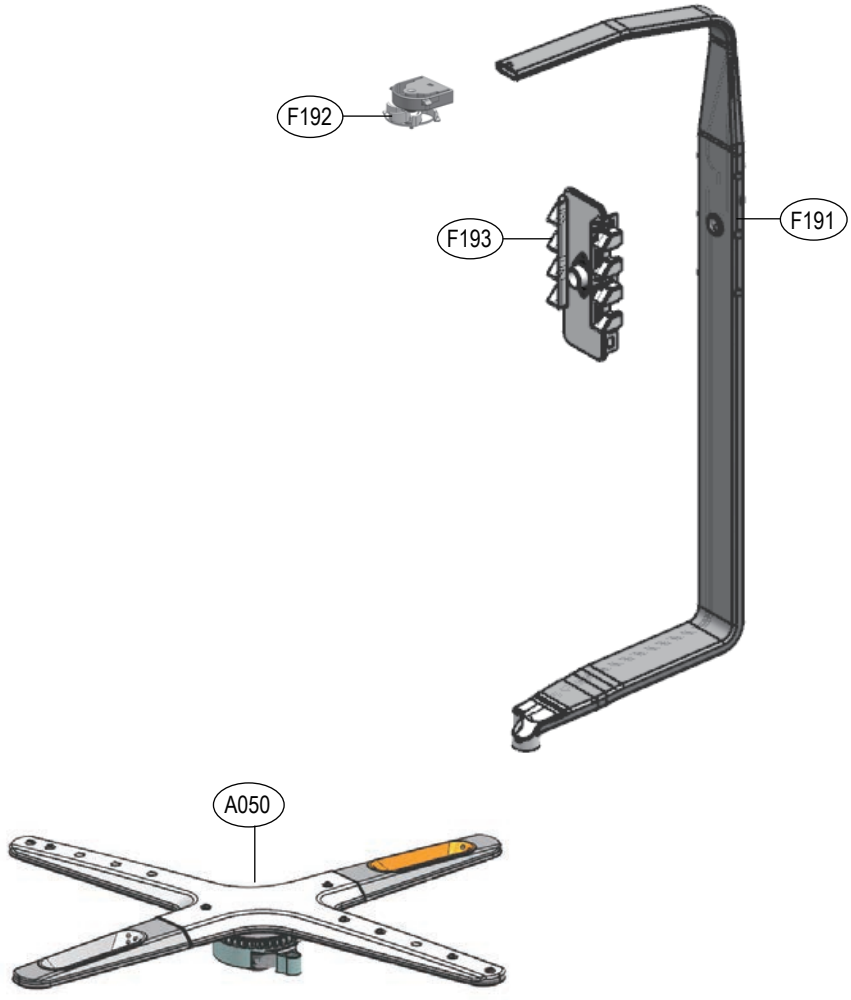
■ Upper Rack Assembly



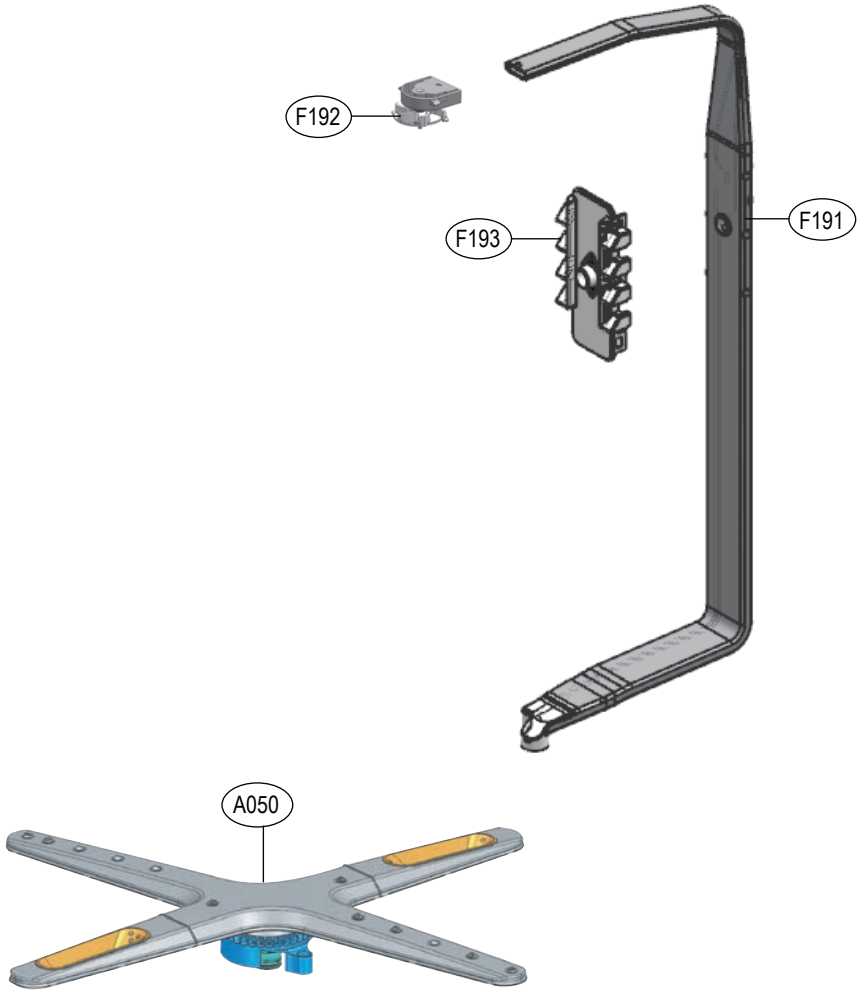
■ Upper Rack Assembly



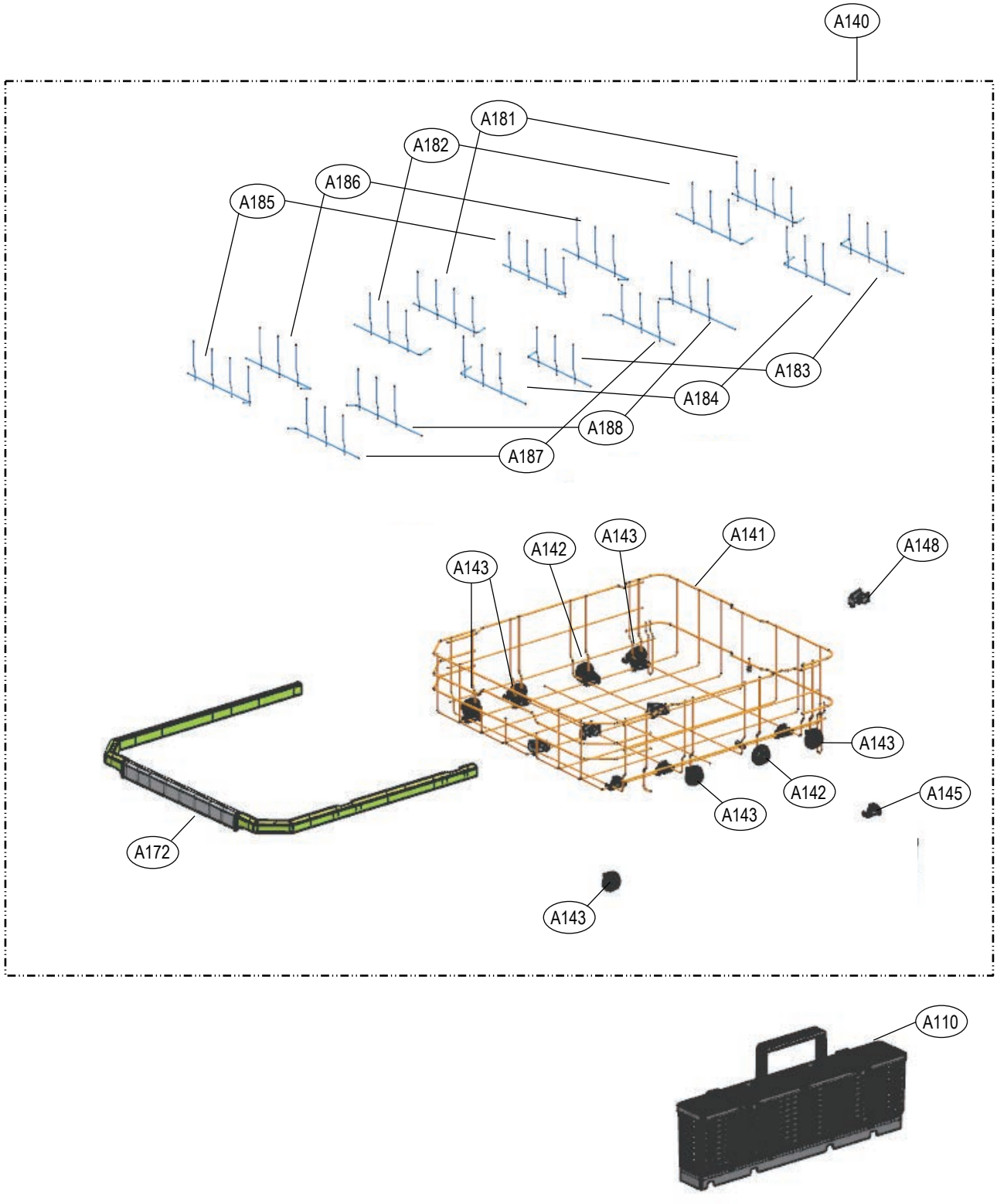
■ Water Guide Assembly



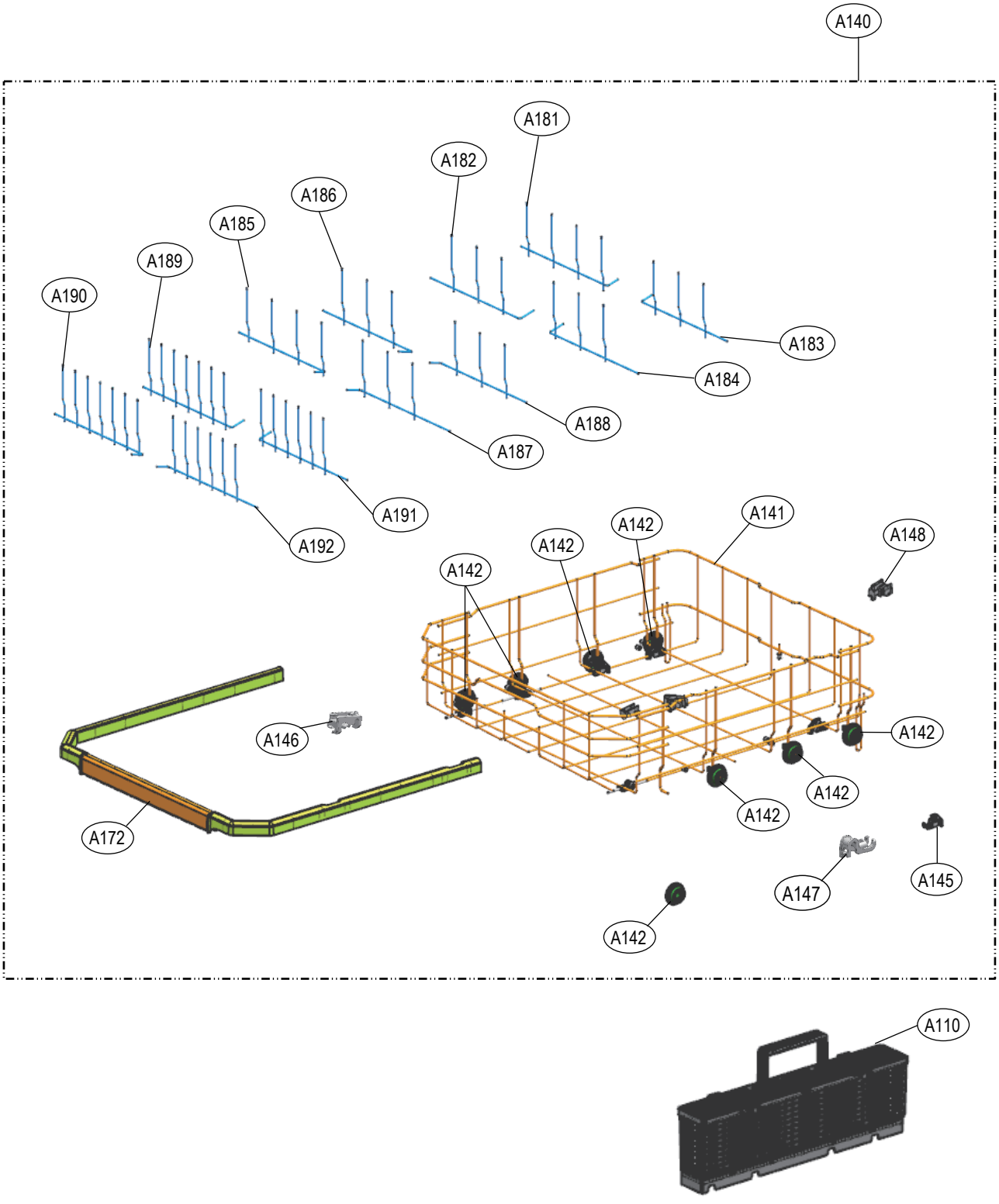
■ Water Guide Assembly



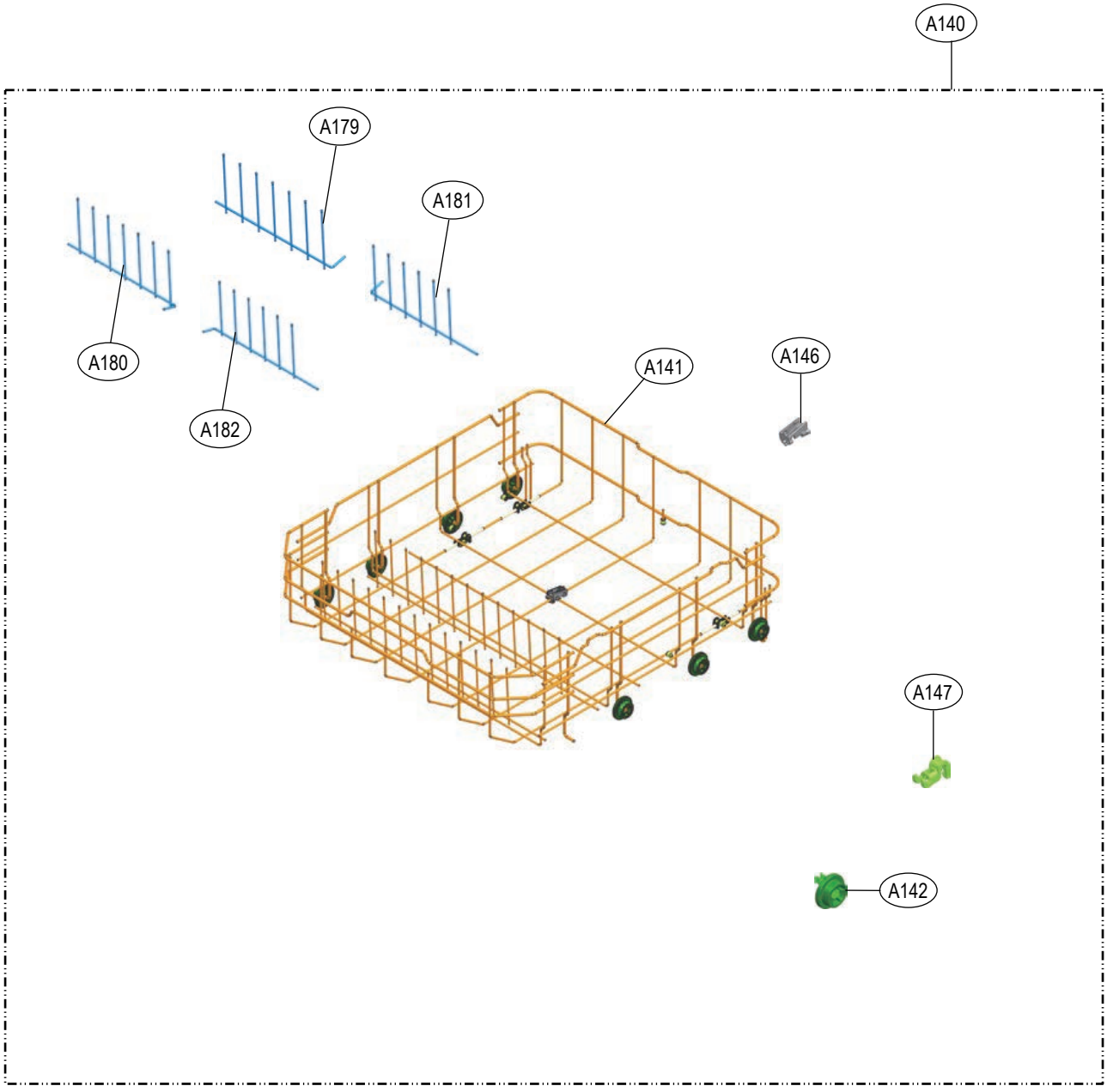
■ Lower Rack Assembly

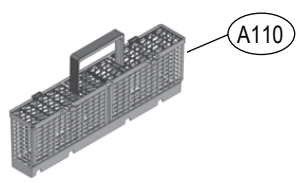


■ Lower Rack Assembly

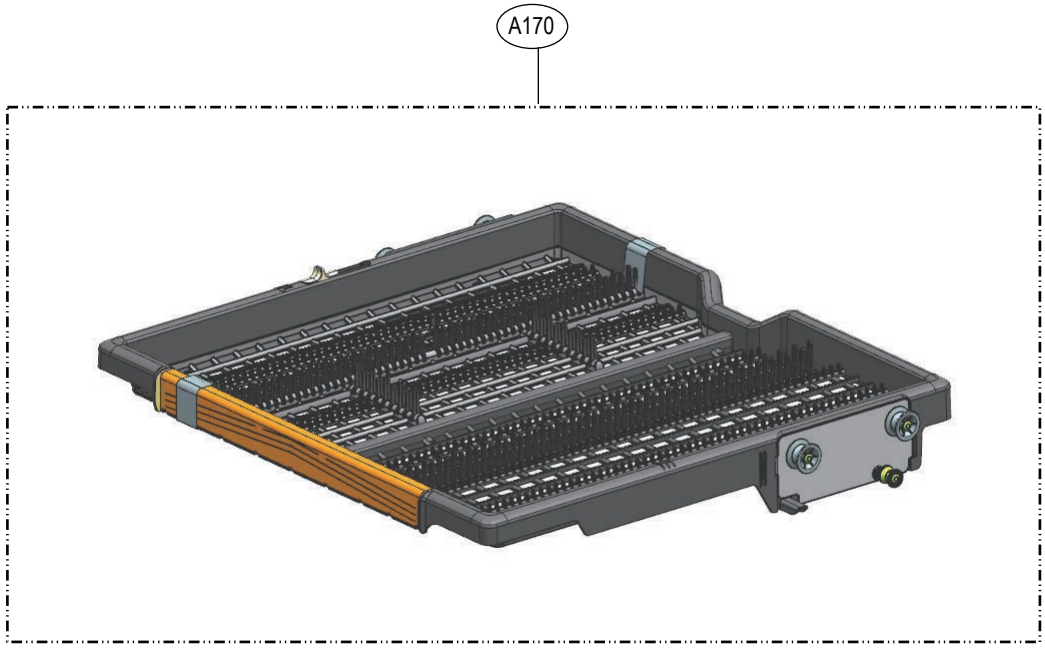


■ Lower Rack Assembly

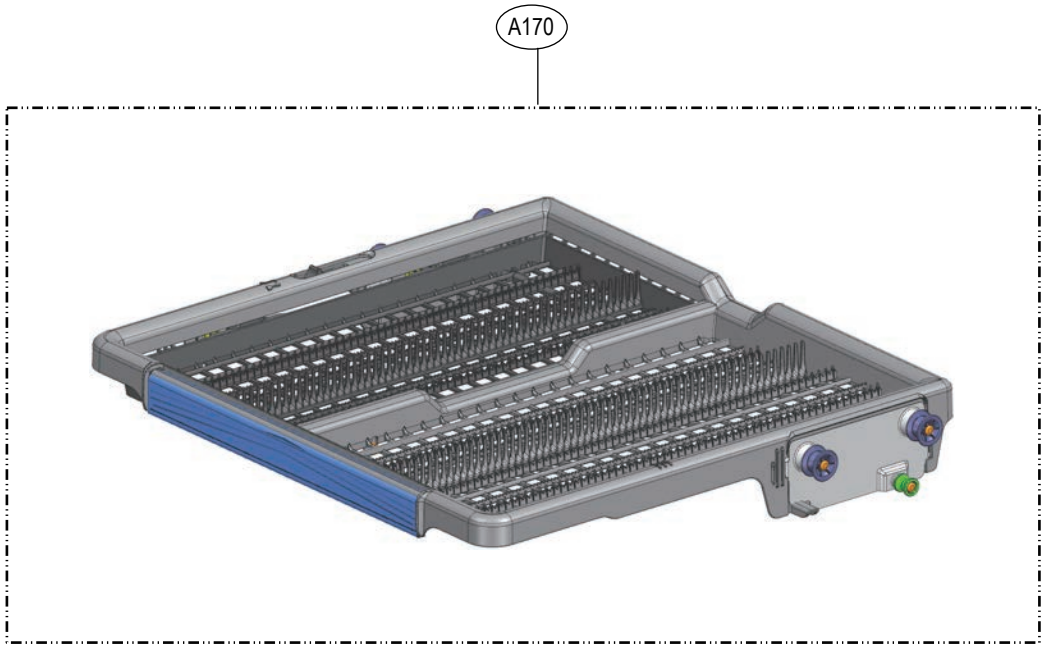




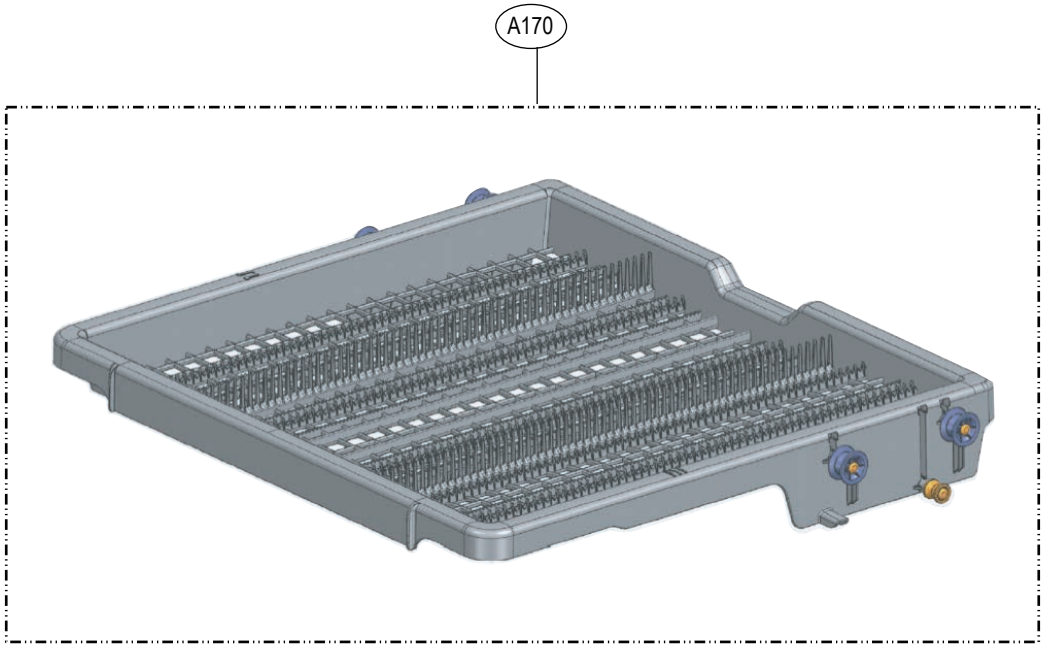
■ 3rd Rack Assembly



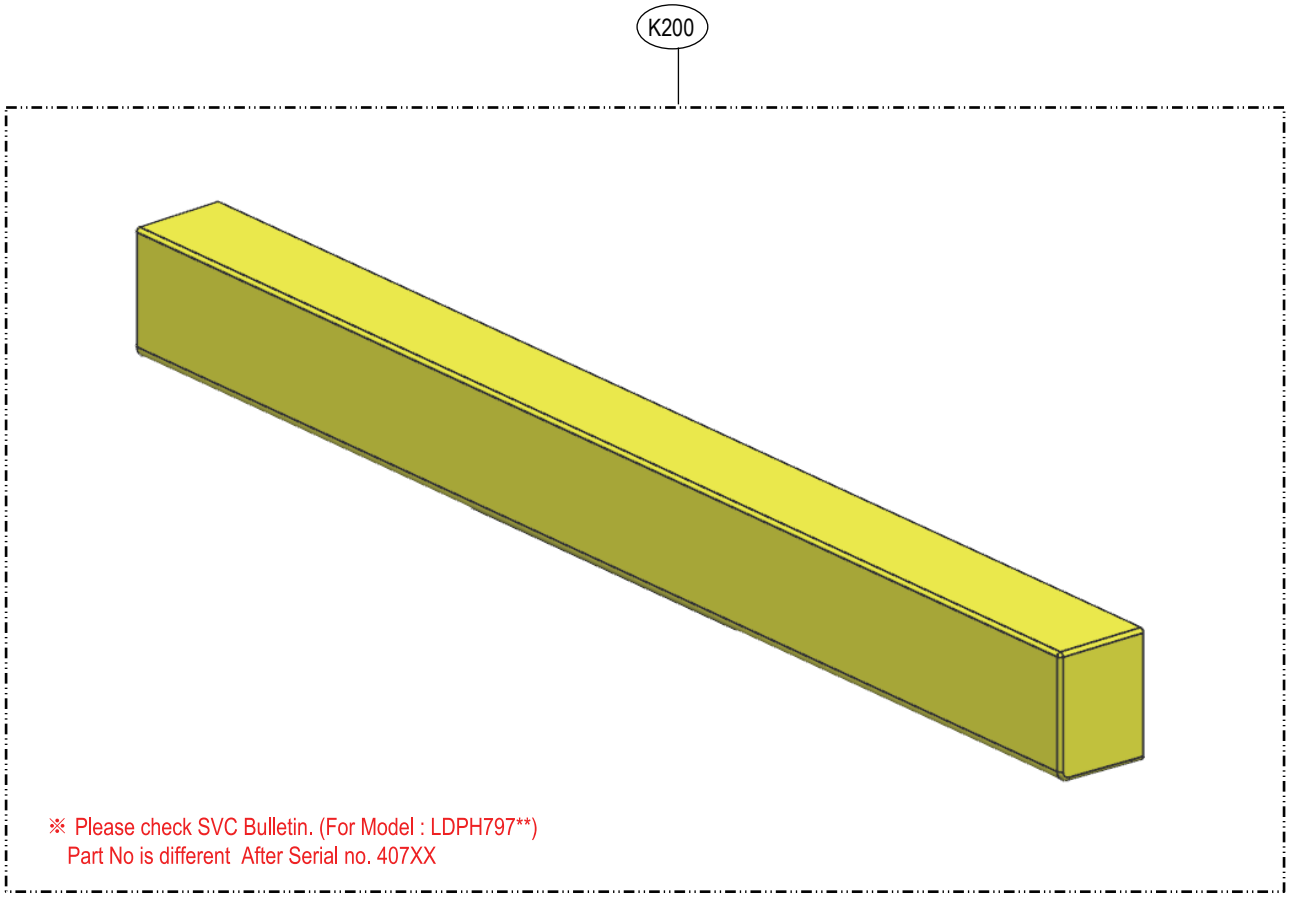
■ 3rd Rack Assembly



■ 3rd Rack Assembly

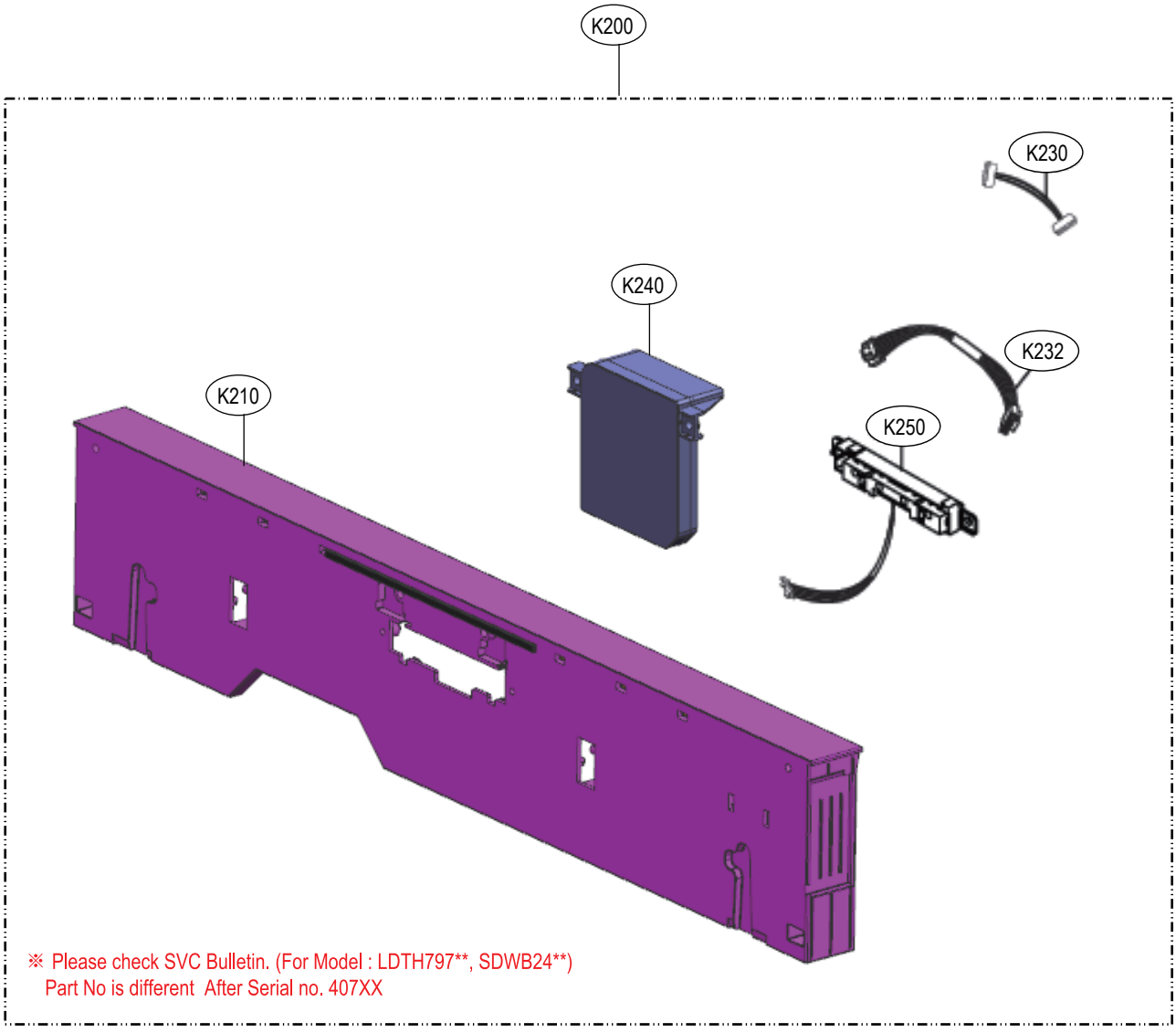


■ Panel Assembly



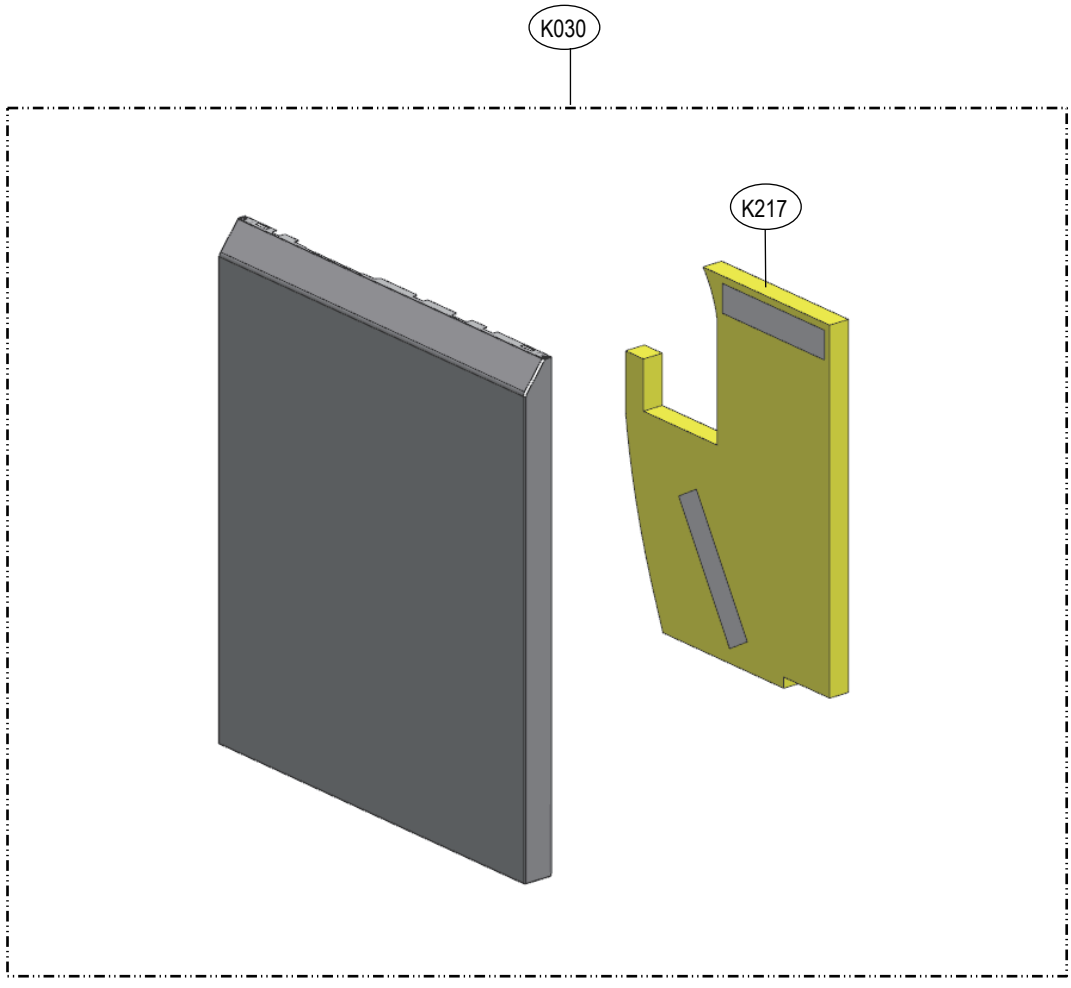
※ Please check SVC Bulletin. (For Model : LDPH797**)
Part No is different After Serial no. 407XX

■ Panel Assembly

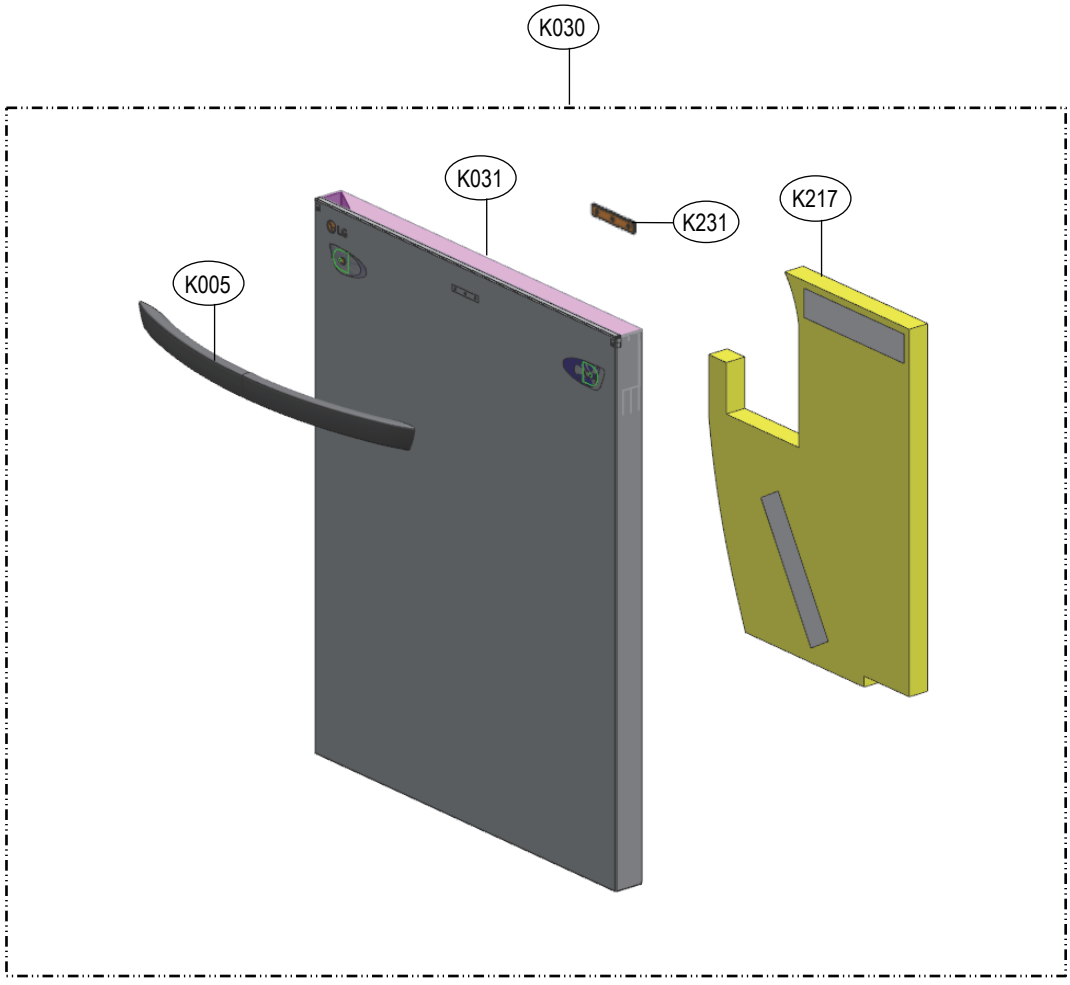


※ Please check SVC Bulletin. (For Model : LDTH797**, SDWB24**)
Part No is different After Serial no. 407XX

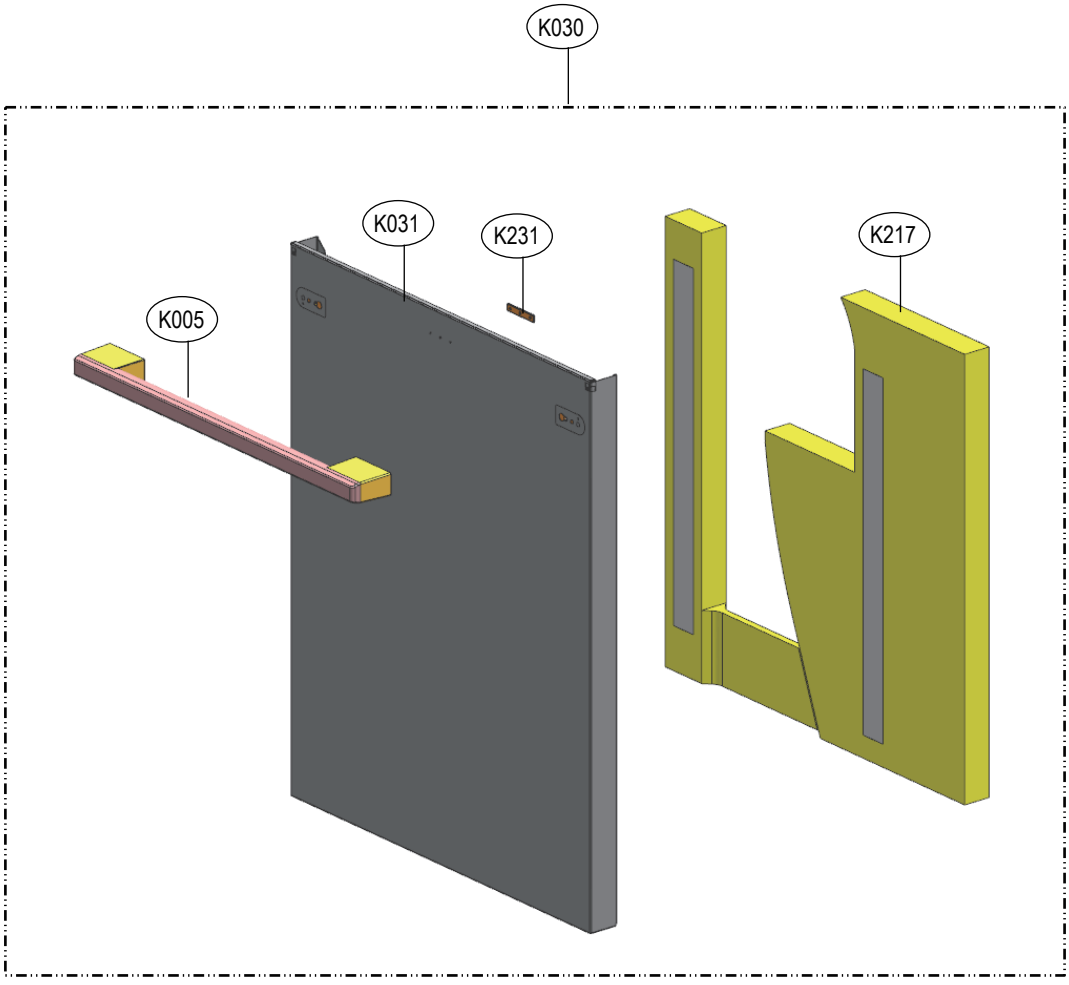
■ Front Cover Assembly



■ Front Cover Assembly

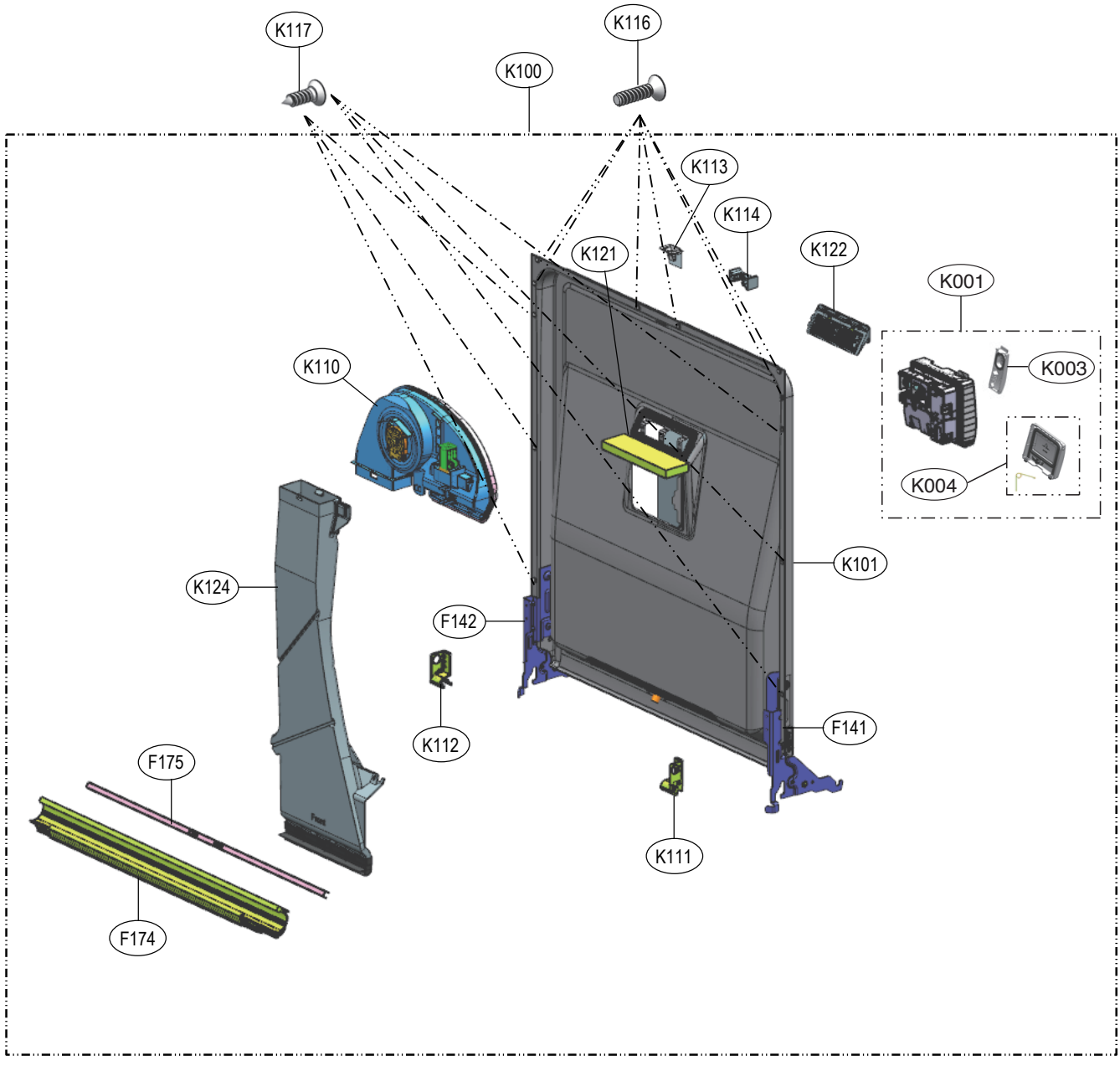


■ Front Cover Assembly

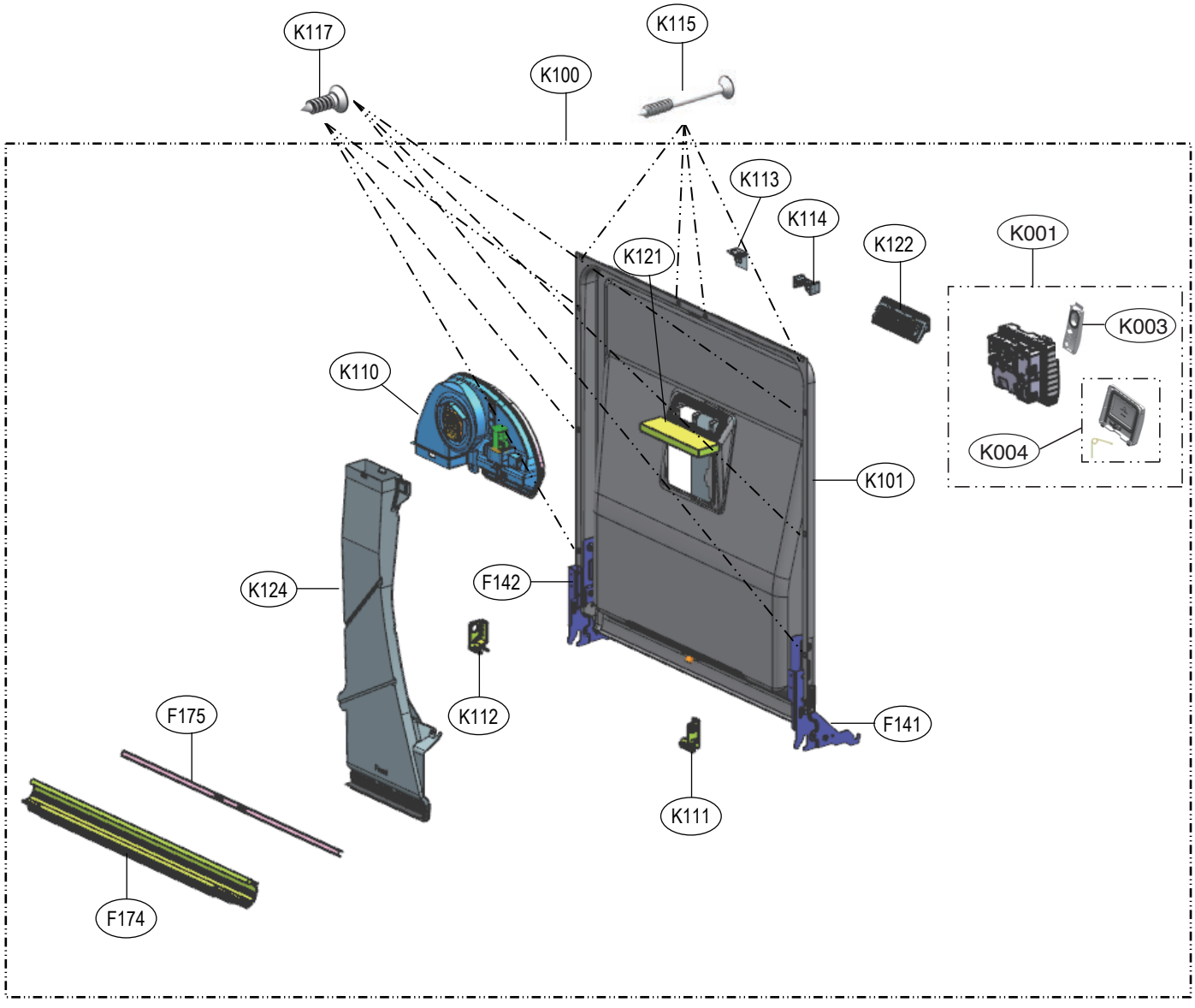


LDPH797**, LDPM676**, LDPS676**, LDPH5554*, LDTH5554*, LDPH6762*

■ Door Liner Assembly

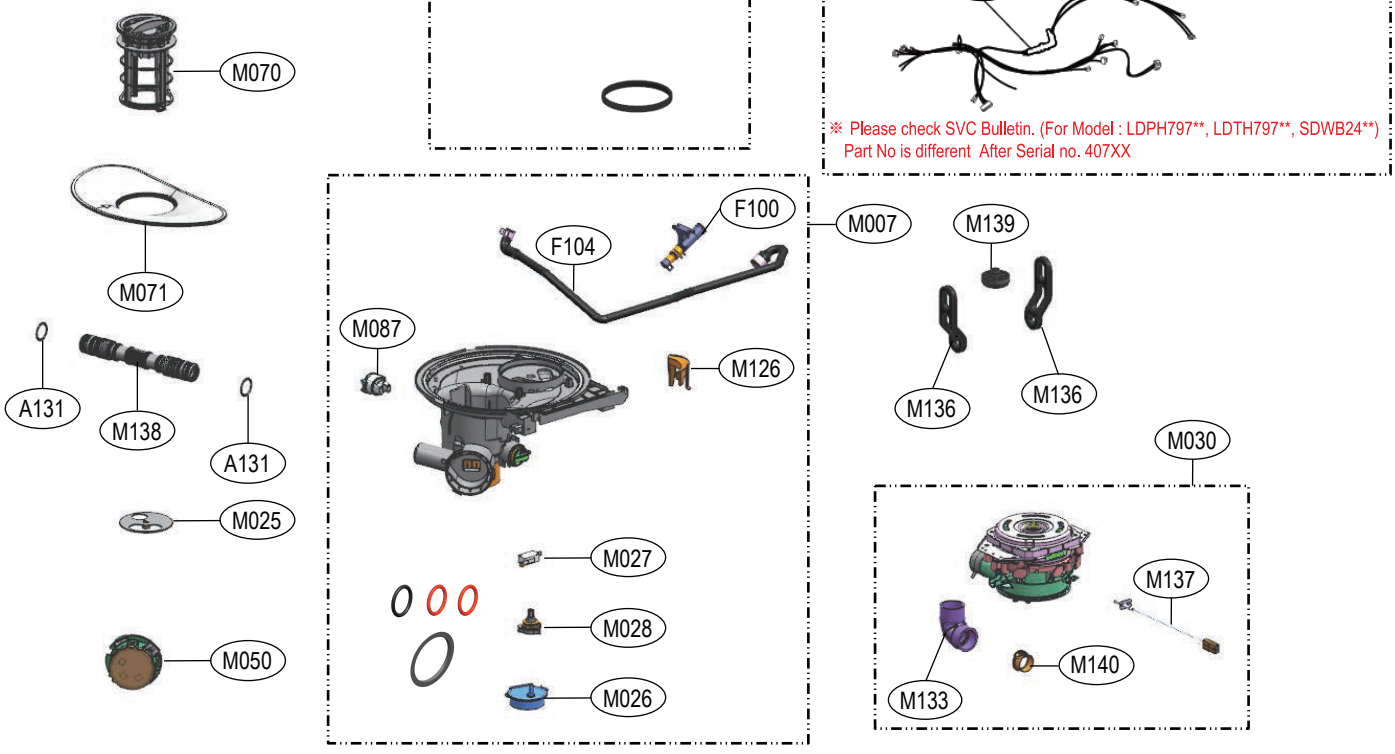


■ Door Liner Assembly



■ Sump Assembly

SVC Part	Part	P/No
Cover Assembly,Lower (ACQ88920602) M120	Cover,Guide	MCK68764402
	Ring,O	MGZ61927301

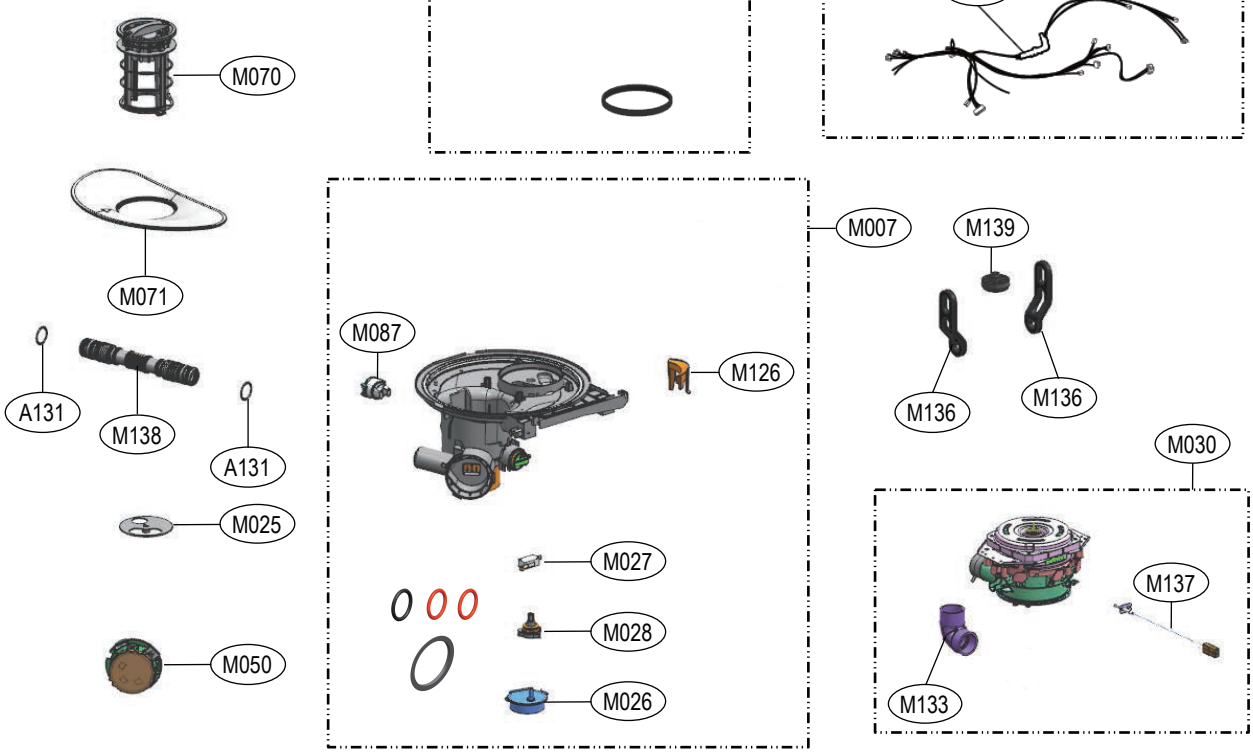


SVC Part	Part	P/No
Sump,Parts Assembly,SVC (AGM75469201) M007	Sump	MJG61861201
	Hose,Connector	MEJ63424701
	Clamp,Hose	MBU62225401
	Shaft Assembly	AHR73669802
	Switch,Micro	EBF64375202
	Motor Assembly, AC,Stepping	4681ED3001D
	Screw,Tapping	1TPL0403018
	Case Assembly	ABQ75742401
	Damper	MEA64230001
	Valve,Check	MJX63531301
	Damper	MCQ40370314

SVC Part	Part	P/No
Pump,Parts Assembly,SVC (AGM30016301) M030	Bush	MBF65424601
	Casing Assembly,Pump	ABT72989205
	Hose,Connector	MEJ63424703
	Connector Assembly	ACJ74110102
	Valve,Check	MJX64171301
	Holder	MEG65198601
	Clamp,Hose	MBU62225401

■ Sump Assembly

SVC Part	Part	P/No
Cover Assembly,Lower (ACQ88920602) M120	Cover,Guide	MCK68764402
	Ring,O	MGZ61927301



SVC Part	Part	P/No
Sump,Parts Assembly,SVC (AGM75469201) M007	Sump	MJG61861201
	Hose,Connector	MEJ63424701
	Clamp,Hose	MBU62225401
	Shaft Assembly	AHR73669802
	Switch,Micro	EBF64375202
	Motor Assembly, AC,Stepping	4681ED3001D
	Screw,Tapping	1TPL0403018
	Case Assembly	ABQ75742401
	Damper	MEA64230001
	Valve,Check	MJX63531301
	Damper	MCQ40370314

SVC Part	Part	P/No
Pump,Parts Assembly,SVC (AGM30016301) M030	Bush	MBF65424601
	Casing Assembly,Pump	ABT72989205
	Hose,Connector	MEJ63424703
	Connector Assembly	ACJ74110102
	Valve,Check	MJX64171301
	Holder	MEG65198601
	Clamp,Hose	MBU62225401



LG Electronics Inc.

P/No. : MFL37554846