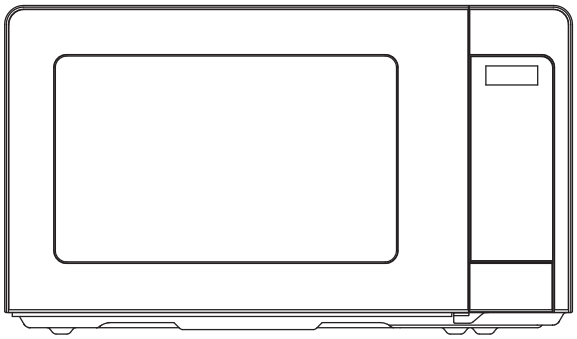
S/M No. : KOR6641800

DAEWOO

Service Manual

Microwave Oven

Model: KOR664BWTAE013AB00



✔ **Caution**

: In this Manual, some parts can be changed for improving, their performance without notice in the parts list. So, if you need the latest parts information, please refer to PPL(Parts Price List) in Service Information Center (http://webportal.dwe.co.kr/sic).

Daewoo Electronics Co.,Ltd.

Apr. 2018

PRECAUTIONS TO BE OBSERVED BEFORE AND DURING SERVICING TO AVOID POSSIBLE EXPOSURE TO EXCESSIVE MICROWAVE ENERGY

(a) Do not operate or allow the oven to be operated with the door open.

(b) Make the following safety checks on all ovens to be serviced before activating the magnetron or other micro-wave source, and make repairs as necessary: (1) Interlock operation, (2) Proper door closing, (3) Seal and sealing surfaces (arcing, wear, and other damage), (4) Damage to or loosening of hinges and latches, (5) Evidence of dropping or abuse.

(c) Before turning on microwave power for any service test or inspection within the microwave generating compartments, check the magnetron, wave guide or transmission line, and cavity for proper alignment, integrity, and connections.

(d) Any defective or misadjusted components in the interlock, monitor, door seal, and microwave generation and transmission systems shall be repaired, replaced, or adjusted by procedures described in this manual before the oven is released to the owner.

(e) A microwave leakage check to verify compliance with the Federal performance standard should be performed on each oven prior to release to the owner.

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PROPER USE AND SERVICE PRECAUTIONS

CAUTION

This device is to be Serviced only by Properly Qualified Service Personel. Consult the Service Manual for Proper Service Procedures to Assure Continued Safety Operation and for Precautions to be Taken to Avoid Possible Exposure to Excessive Microwave Energy.

1. FOR SAFE OPERATION

Damage that allows the microwave energy (that cooks or heats the food) to escape will result in poor cooking and may cause serious bodily injury to the operator.

IF ANY OF THE FOLLOWING CONDITIONS EXIST, OPERATOR MUST NOT USE THE APPLIANCE.

(Only a trained service personnel should make repairs.)

(1) A broken door hinge.
(2) A broken door viewing screen.
(3) A broken front panel, oven cavity.
(4) A loosened door lock.
(5) A broken door lock.

The door gasket plate and oven cavity surface should be kept clean.

No grease, soil or spatter should be allowed to build up on these surfaces or inside the oven.

DO NOT ATTEMPT TO OPERATE THIS APPLIANCE WITH THE DOOR OPEN.

The microwave oven has concealed switches to make sure the power is turned off when the door is opened.

Do not attempt to defeat them.

DO NOT ATTEMPT TO SERVICE THIS APPLIANCE UNTIL YOU HAVE READ THIS SERVICE MANUAL.

2. FOR SAFE SERVICE PROCEDURES

1. If the oven is operative prior to servicing, a microwave emission check should be performed prior to servicing the oven.
2. If any certified oven unit is found to have excessive emission level 5mW/cm², the service person should;
   (a) inform the manufacturer, importer or assembler,
   (b) repair the unit at no cost to the owner,
   (c) attempt to ascertain the cause of the excessive leakage,
   (d) tell the owner of the unit not to use the unit until the oven has been brought into compliance.
3. If the oven operates with the door open, the service person should tell the user not to operate the oven and contact the manufacturer and CDRH immediately.

CAUTION

MICROWAVE RADIATION

PERSONNEL SHOULD NOT BE EXPOSED TO THE MICROWAVE ENERGY WHICH MAY RADIATE FROM THE MAGNETRON OR OTHER MICROWAVE GENERATING DEVICE IF IT IS IMPROPERLY USED OR CONNECTED. ALL INPUT AND OUTPUT MICROWAVE CONNECTIONS. WAVEGUIDE FLANGES AND PASKETS MUST BE SECURE. NEVER OPERATE THE DEVICE WITHOUT A MICROWAVE ENERGY ABSORBING LOAD ATTACHED. NEVER LOOK INTO AN OPEN SAVEGUIDE OR ANTENNA WHILE THE DEVICE IS ENERGIZED.

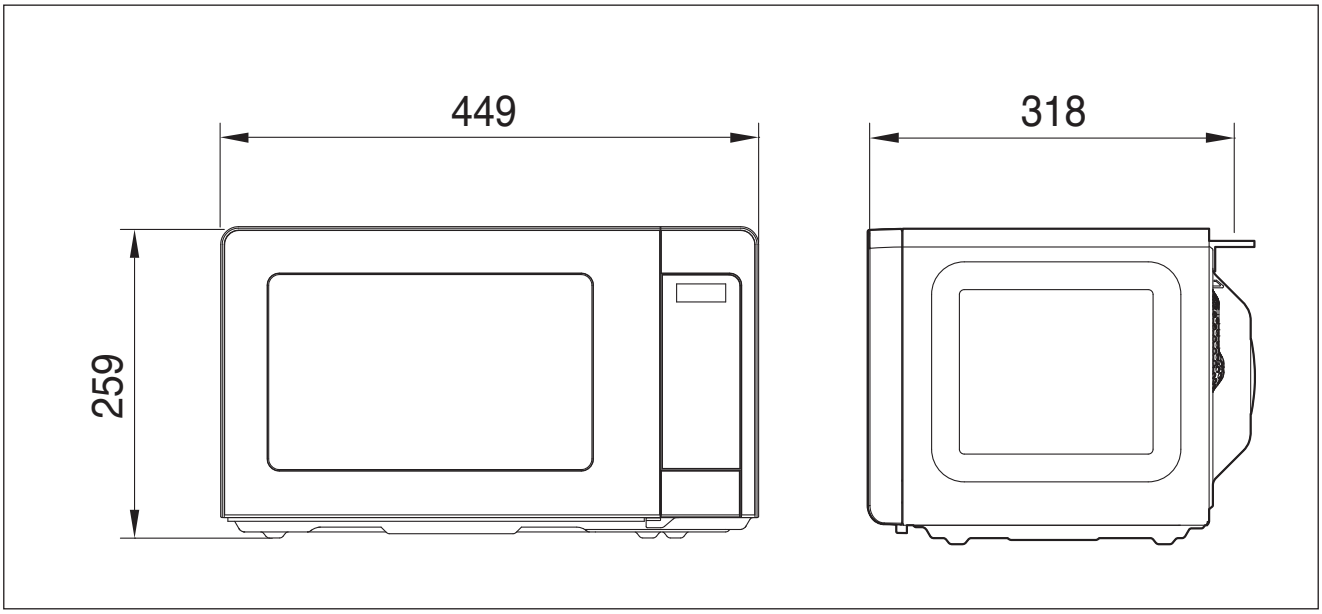
SPECIFICATIONS

POWER SUPPLY		120V AC, 60Hz SINGLE PHASE WITH GROUNDING
MICROWAVE	INPUT POWER	1150 W
	ENERGY OUTPUT	700 W
	FREQUENCY	2,450MHz
OUTSIDE DIMENSIONS (W x H x D)		449 X 259 X 318 mm
CAVITY DIMENSIONS (W x H x D)		307 X 210 X 304 mm
CAVITY VOLUME		0.7 cu.ft
NET WEIGHT		APPROX. 21.6lbs
TIMER		59 min. 99 sec.
POWER SELECTIONS		10 Levels

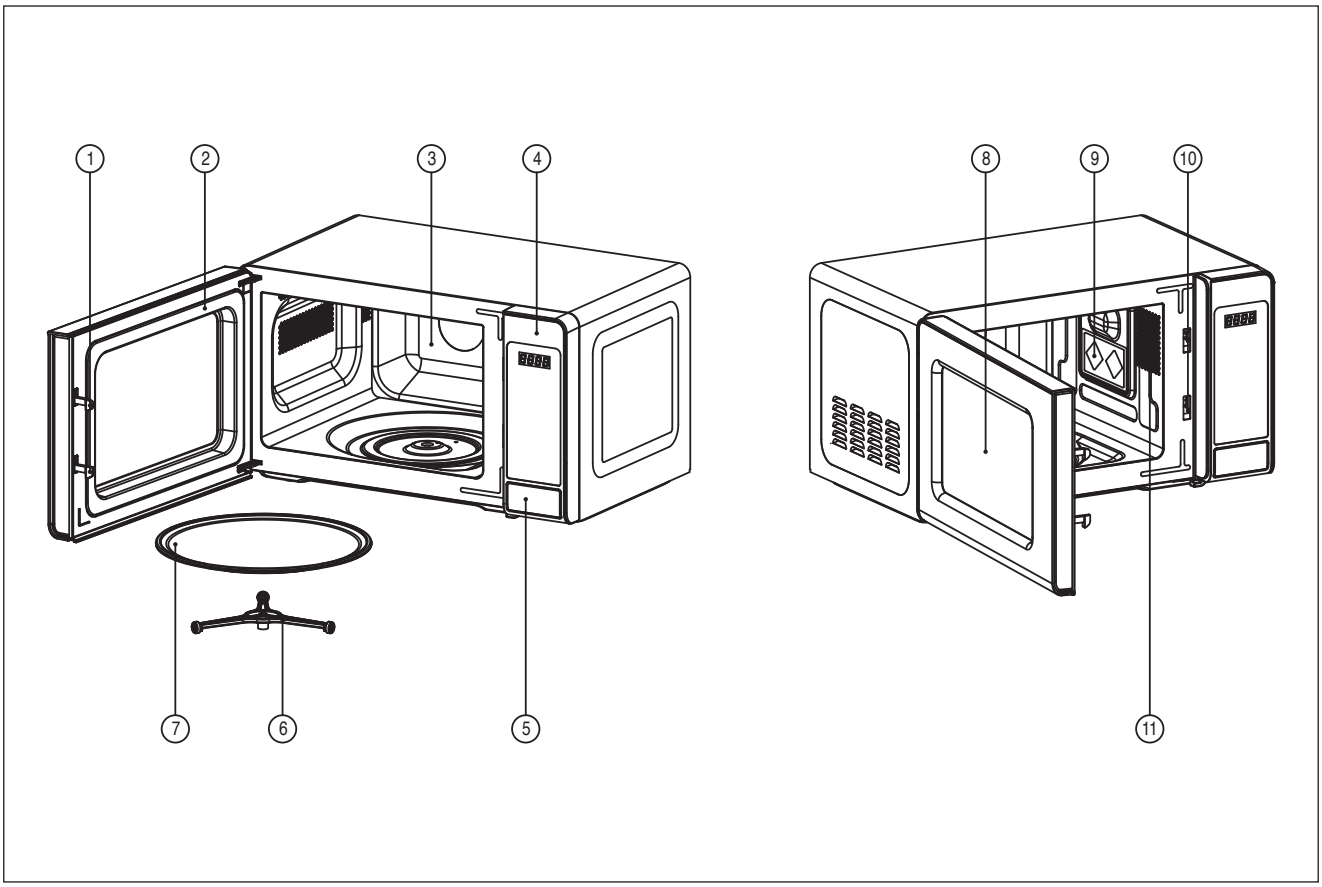
** Specifications are subject to change without notice.*

EXTERNAL VIEW

1. OUTER DIMENSION



2. FEATURES DIAGRAM



① **Door latch -** When the door is closed, it will automatically shut off. If the door is opened while the oven is operating, the magnetron will automatically shut off.

② **Door seal -** The door seal surfaces prevent microwaves escaping from the oven cavity.

③ **Oven cavity**

④ **Control panel**

⑤ **Door open button -** To open the door push the door open button.

⑥ **Roller guide -** This must always be used for cooking together with the glass cooking tray.

⑦ **Glass cooking tray -** Made of special heat resistant glass. The tray must always be in proper position before operating. Do not cook food directly on the tray.

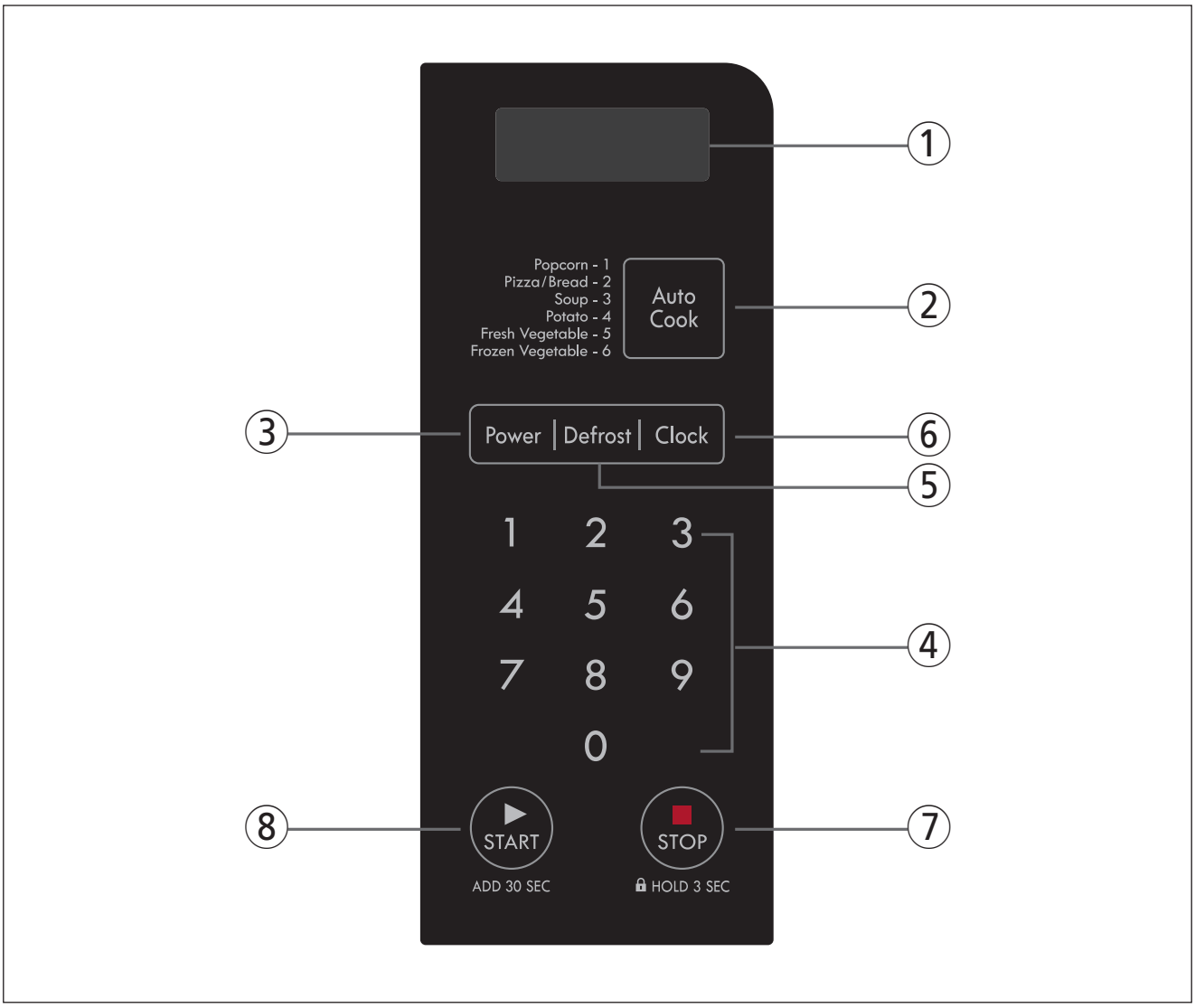
⑧ **Viewing screen -** Allows viewing of food.
The screen is designed so that light can pass through, but not the microwave.

⑨ **Waveguide cover -** Protects the microwave outlet from splashes of cooking foods.

⑩ **Safety interlock system**

⑪ **Oven lamp -** Automatically turns on during oven operating.

3. CONTROL PANEL



① **DISPLAY -** Cooking time, power level, indicators and current time are displayed.

② **AUTO COOK -** Used to cook some kind of popular food easily and automatically.

③ **POWER -** Used to set power level.

④ **TIME SET PAD -** Used to set the cooking time and the current time.

⑤ **DEFROST -** Used to defrost foods for weight and time.

⑥ **CLOCK -** Used to set clock.

⑦ **STOP / CLEAR -** Used to stop the oven operation or to delete the cooking data.

⑧ **START / +30 SEC -** Used to start the oven and also used to set a reheat time.

INSTALLATION

1. Steady, flat location

This microwave oven should be set on a steady, flat surface.

This microwave oven is designed for counter top use only.

2. Leave space behind and side

All air vents should be kept a clearance. If all vents are covered during operation, the oven may overheat and, eventually, cause failure.

3. Away from radio, and TV sets

Poor television reception and radio interference may result if the oven is located close to a TV, radio, antenna, or feeder and so on. Position the oven as far from them as possible.

4. Away from heating appliances and water taps

Keep the oven away from hot air, steam and splash when choosing a place to position it, or the insulation might be adversely affected and breakdowns occur.

5. Power supply

- Check your local power source.

  This microwave oven requires a current of approximately 10 amperes, 120 Volts, 60 Hz.
- Power supply cord is about 0.8 meters long.
- Used the voltage must be the same as specified on this oven. Using a higher voltage may result in a fire or other accident causing oven damage. Using low voltage will cause slow cooking. We are not responsible for damage resulting from use of this oven with a voltage of ampere fuse other than those specified.
- This appliance is supplied with cable of special type, which, if damaged, must be repaired with cable of same type.

  Such a cable can be purchased from DAEWOO and must be installed by a qualified person.

6. Examine the oven after unpacking for any damage such as:

A misaligned door, broken door or a dent in cavity.

If any of the above are visible, DO NOT INSTALL, and notify dealer immediately.

7. Do not operate the oven if it is colder than room temperature

(This may occur during delivery in cold weather.) Allow the oven to become room temperature before operating.

GROUNDING INSTRUCTIONS

This appliance must be grounded. In the event of an electrical short circuit, grounding reduces the risk of the electric shock by providing an escape wire for the electric current. This appliance is equipped with a cord having a grounding plug. The plug must be plugged into an outlet that is properly installed and grounded.

WARNING

Improper use of the grounding plug can result in a risk of electric shock. Consult a qualified electrician or serviceman if the grounding instructions are not completely understood, or if doubt exists as to whether the appliance is properly grounded, and either : If it is necessary to use an extension cord, use only a 3-wire extension cord that has a 3-blade grounding plug, and a 3-slot receptacle that will accept the plug on the appliance. The marked rating of the extension cord should be equal to or greater than the electrical rating of the appliance, or DO NOT USE an extension cord.

OPERATIONS AND FUNCTIONS

1. Connect the mains lead to an electrical outlet.
2. After placing the food in a suitable container, open the oven door and put it on the glass tray. The glass tray must always be in place during cooking.
3. Close the door securely.
4. The oven door can be opened at any time during operation by pushing the door release button on the control panel. The oven will automatically shut off. To restart the oven, close the door and then touch START pad.
5. Each time a pad is touched, a BEEP will sound to acknowledge the touch.
6. The oven automatically cook on full power unless set to a lower power level.
7. The display will show : 0 when the oven is plugged in.
8. Time clock returns to the present time when the cooking time ends.
9. When the STOP/CLEAR pad is touched during the oven operation, the oven stops cooking and all information retained.
   To erase all information (except the present time), touch the STOP/CLEAR pad once more. If the oven door is opened during the oven operation, all information is retained.
10. If the START pad is touched and the oven does not operate, check the area between the door and door seal for obstructions and make sure the door is closed securely. The oven will not start cooking under the door is completely closed or the program has been reset.

Make sure the oven is properly installed and plugged into the electrical outlet.

Wattage output chart

The power level is set by touching the POWER pad. The chart shows the display, the power level and the percentage of power.

Touch the POWER Pad	Power Level(Display)	Approximate Percentage of Power
Once	700	100% (700W)
Twice	630	90% (630W)
3 times	560	80% (560W)
4 times	490	70% (490W)
5 times	420	60% (420W)
6 times	350	50% (350W)
7 times	280	40% (280W)
8 times	210	30% (210W)
9 times	140	20% (140W)
10 times	70	10% (70W)
11 times	0	0% (0W)

DISASSEMBLY AND ASSEMBLY

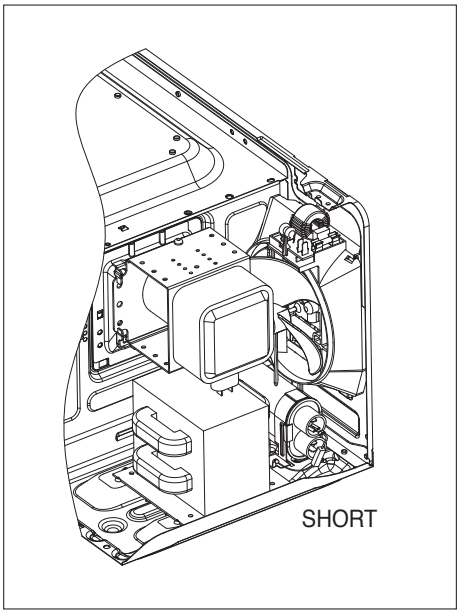
Cautions to be observed when trouble shooting.

Unlike many other appliances, the microwave oven is high-voltage, high-current equipment.
It is completely safe during normal operation.
However, carelessness in servicing the oven can result in an electric shock or possible danger from a short circuit.
You are asked to observe the following precautions carefully.

1. Always remove the power plug from the outlet before servicing.
2. Use an insulated screwdriver and wear rubber gloves when servicing the high voltage side.
3. Discharge the high voltage capacitor before touching any oven components or wiring.

(1) Check the grounding.
Do not operate on a two-wire extension cord.
The microwave oven is designed to be used while grounded.
It is imperative, therefore, to make sure it is grounded properly before beginning repair work.

(2) Warning about the electric charge in the high voltage capacitor.
For about 30 seconds after the operation has stopped, electric charge remains in the high voltage capacitor.
When replacing or checking parts, short between oven chassis and the negative high terminal of the high voltage capacitor by using a properly insulated screwdriver to discharge.



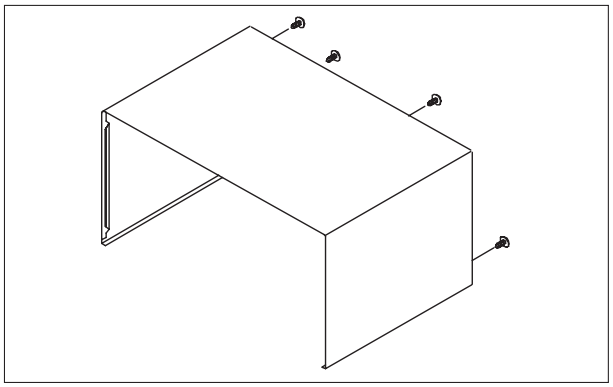
4. When the fuse is blown due to the operation of the monitor switch; replace primary interlock switch, secondary interlock switch and interlock monitor switch.
5. After repair or replacement of parts, make sure that the screws are properly tightened, and all electrical connections are tightened.
   Check continuity of the monitor circuit.
6. Do not operate without cabinet.

CAUTION : Service personnel should remove their watches whenever working close to or replacing the magnetron.

CAUTION : When servicing the appliance, take care when touching or replacing high potential parts because of electrical shock or exposing microwave. These parts are as follows - HV Transformer, Magnetron, HV Capacitor, HV Diode.

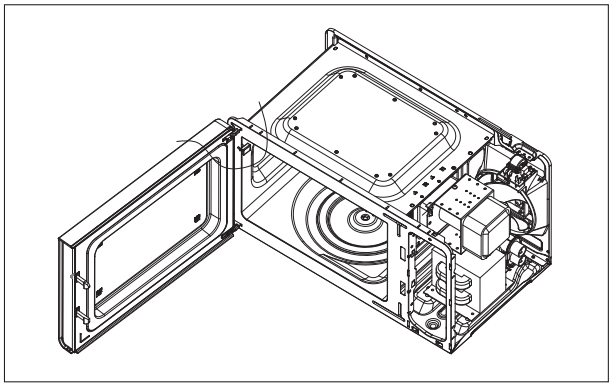
1. To remove cabinet

1) Remove four screws on cabinet back.
2) Pull the cabinet backward.

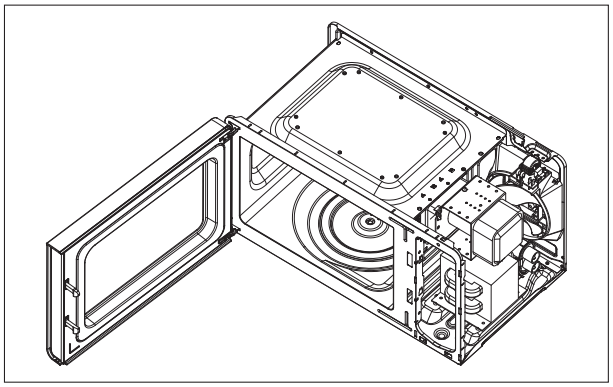


2. To remove door assembly

1) Remove the 'STOPPER DOOR' from the door assembly.

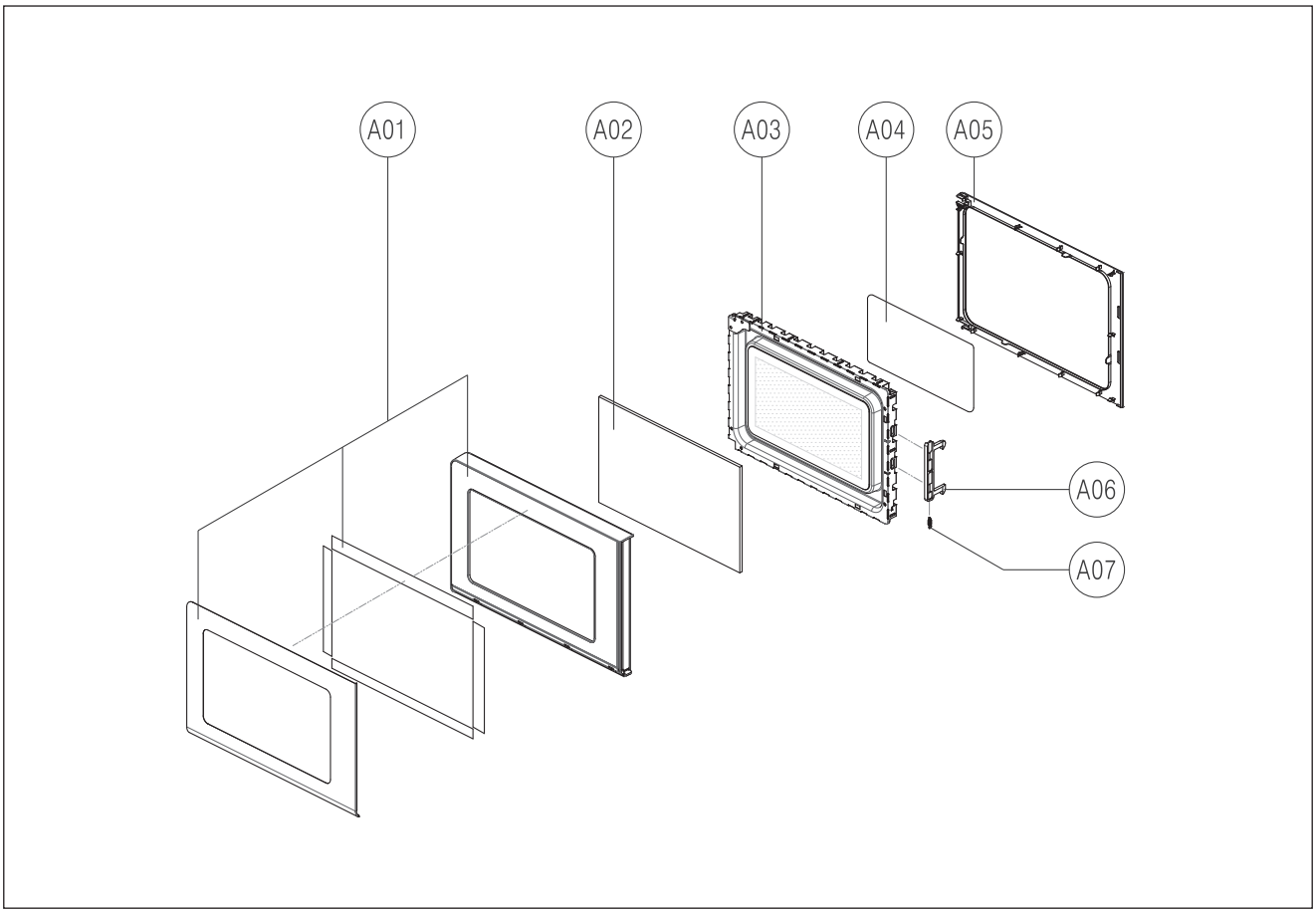


2) Open the door assembly at a right angle.
3) Reverse the above for reassembly.



NOTE : After replacing the door assembly, perform a check of correct alignment with the hinge and cavity front plate.

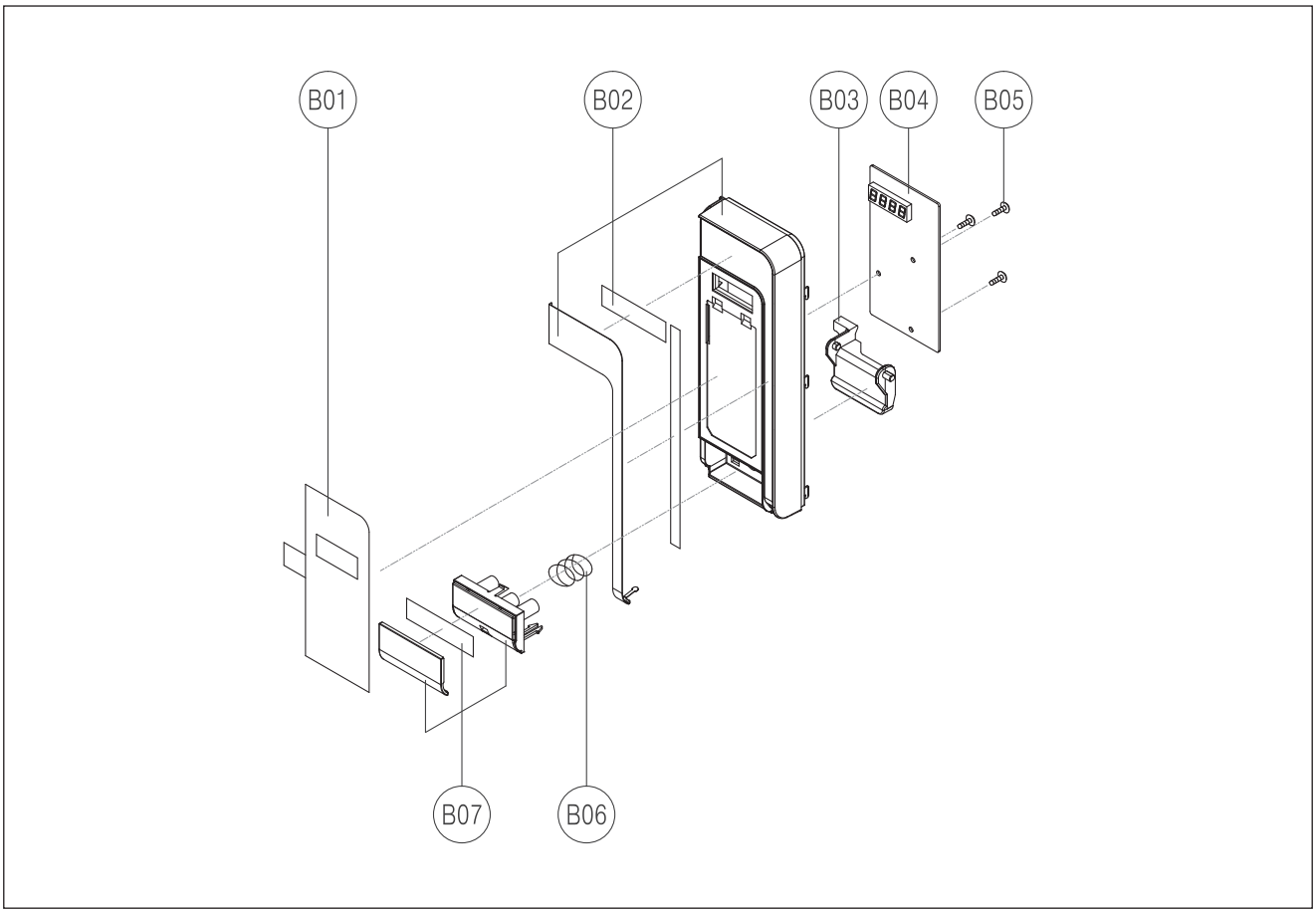
3. To remove door parts.



NO	PART CODE	PART NAME	PART DESC.	Q'TY
A01	35117-0046000-00	DOOR SUB AS	KOR664B SUS(BLACK)	1
A02	3517011010	BARRIER-SCREEN *O	TEMP GLASS T3.2	1
A03	35117-0043700-00	DOOR PAINTING AS	KOR660B BLACK	1
A04	35170-0021000-00	BARRIER-SCREEN *I	PETP T0.1 KOR660B	1
A05	35123-0002600-00	GASKET DOOR	PP J-640A, BLACK, KOR660B	1
A06	35131-0001001-00	HOOK	POM F20-03 BLACK KOR4A07 BUTTON TYPE	1
A07	3515101300	SPRING HOOK	PW1	1

(1) Remove the gasket door from the door painting assembly.
(2) Remove the barrier screen inner from the door painting assembly.
(3) Remove the frame door from the door painting assembly.
(4) Remove the spring hook and the hook from the door painting assembly.
(5) Remove the barrier screen outer from the frame door.
(6) Reverse the above steps for reassembly.

4. To remove control panel parts.

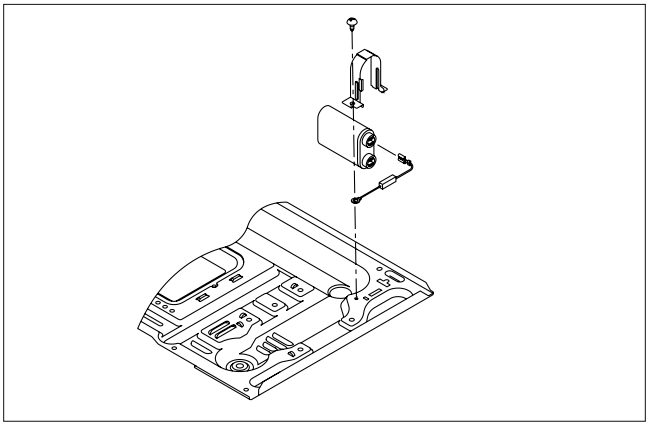


NO	PART CODE	PART NAME	PART DESC.	Q'TY
B01	65192-0028300-00	SWITCH MEMBRANE	KOR664BWTAE013AB00 PET BLACK	1
B02	35167-0111000-00	CONTROL-PANEL SUB AS	KOR664B SUS(BLACK)	1
B03	35137-0002600-00	LEVER DOOR OPEN	PP 5113MF6, KOR660B	1
B04	40303-0113400-00	MWO PCB MAIN ASSY	KOR661BWBAE023AB00	1
B05	7122401211	SCREW TAPPING	T2S TRS 4*12 MFZN	3
B06	441G430171	SPRING DOOR BUTTON	SWP DIA. 0.7	1
B07	35169-0025900-00	BUTTON SUB AS	KOR664B SUS(BLACK)	1

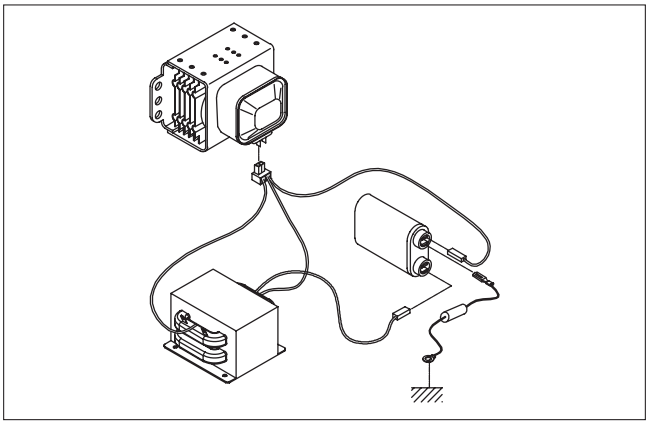
1) Remove the screw which secure the control panel, push up four snap fits and draw forward the control panel assembly.
2) Remove three screws which secure the PCB assembly to control panel.
3) Disconnect wire flat from the connector of the PCB assembly.
4) Remove the PCB from the control panel.
5) Remove the membrane, lever door open, spring button and button door open from the control panel.
6) Reverse the above steps for reassembly.

5. To remove high voltage capacitor.

1) Remove the screw which secure the grounding ring terminal of the H.V. diode and the capacitor holder.
2) Remove the H.V. diode from the capacitor holder.
3) Reverse the above steps for reassembly.

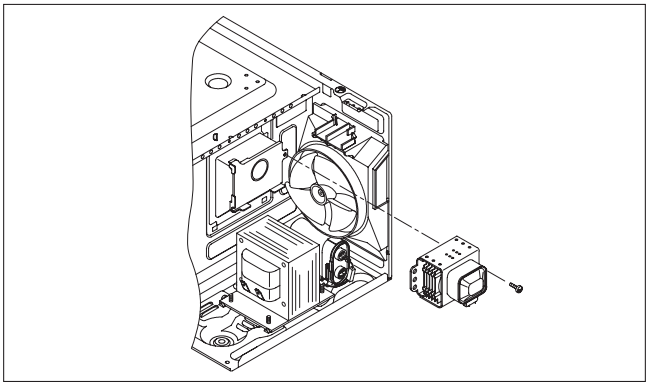


◆ High voltage circuit wiring

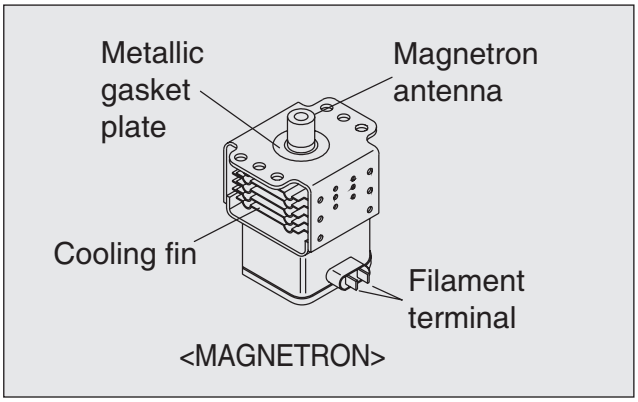


6. To remove magnetron.

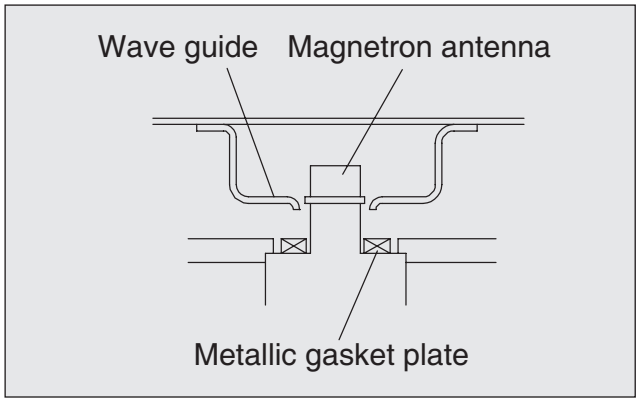
1) Remove the screw which secure the magnetron.
2) Remove the magnetron.
3) Reverse the above steps for reassembly.



NOTE : Never install the magnetron without the metallic gasket plate which is packed with each magnetron to prevent microwave leakage. Whenever repair work is carried out on magnetron, check the microwave leakage. It shall not exceed 4mW/cm² for a fully assembled oven with door normally closed.

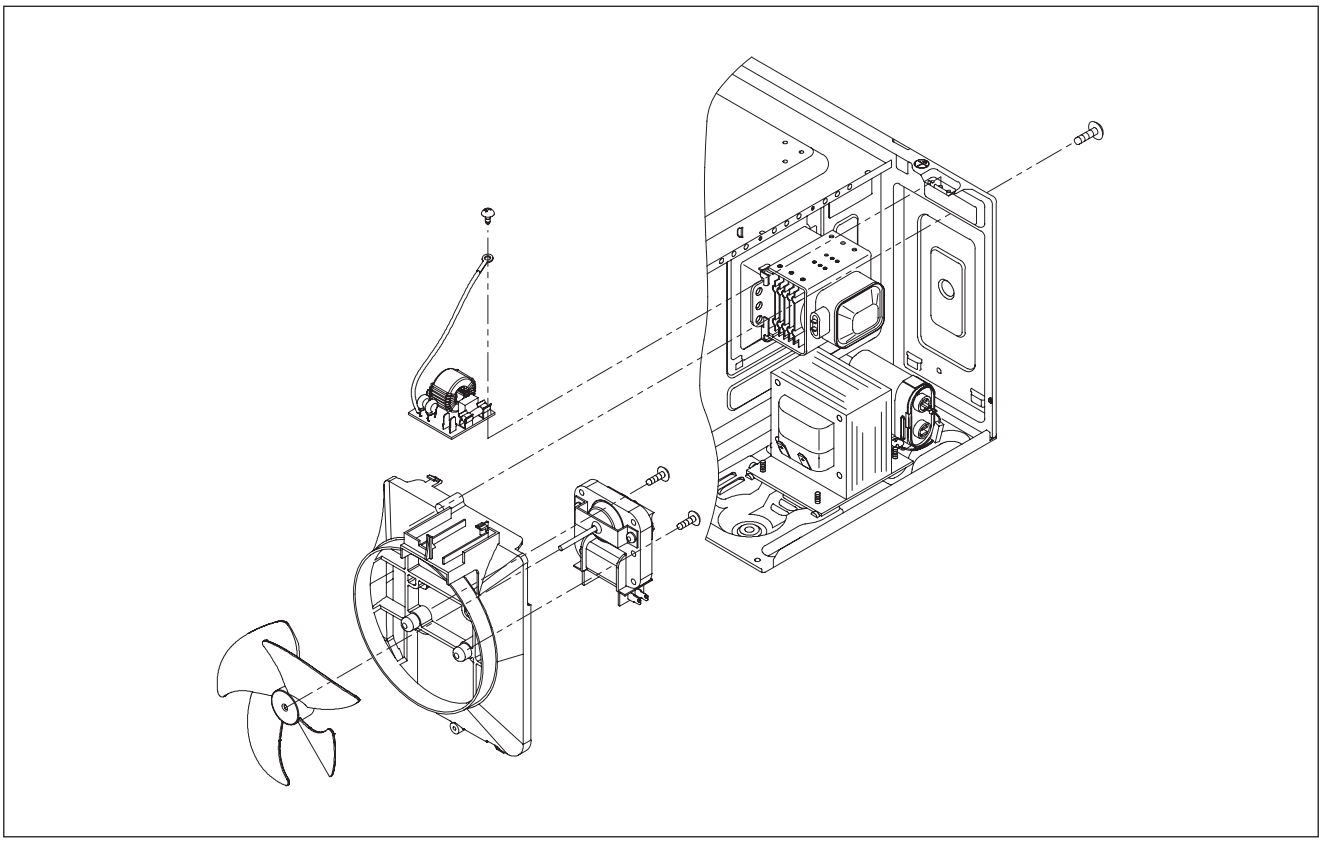


<MAGNETRON>



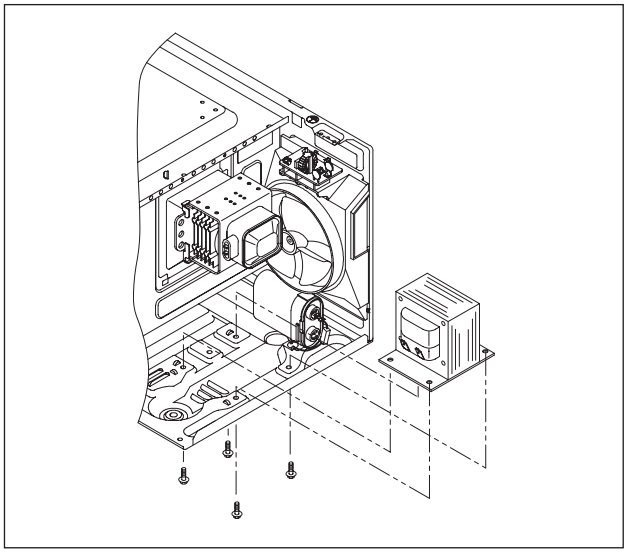
7. To remove wind guide assembly.

1) Remove the screw for grounding.
2) Remove the noise filter from the wind guide.
3) Remove the screw which secure the wind guide assembly.
4) Draw forward the wind guide assembly.
5) Pull the fan from the motor shaft.
6) Remove two screws which secure the motor shaded pole.
7) Remove the motor shaded pole.
8) Reverse the above steps for reassembly.



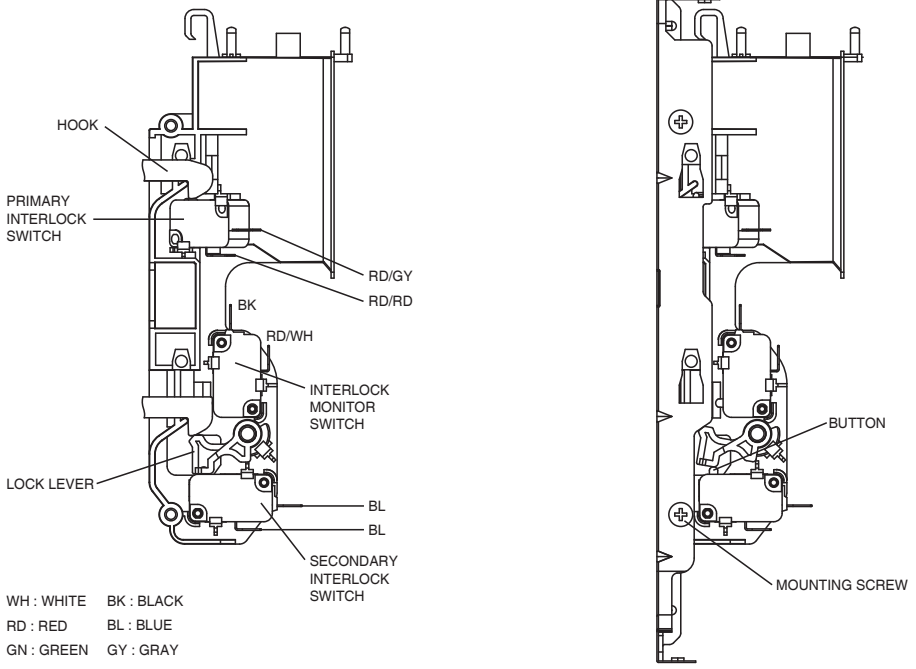
8. To remove H.V.transformer.

1) Remove four screws holding the H.V.transformer.
2) Remove the H.V.transformer.
3) Reverse the above steps for reassembly.



INTERLOCK MECHANISM AND ADJUSTMENT

The door lock mechanism is a device which has been specially designed to completely eliminate microwave radiation when the door is opened during operation, and thus to perfectly prevent the danger resulting from the leakage of microwave.



CONDITION : DOOR CLOSED CONDITION : DOOR OPEN

(1) Primary interlock switch

When the door is closed, the hook locks the oven door. If the door is not closed properly, the oven will not operate.
When the door is closed, the hook pushes the button of the microswitch. Then the button of the primary interlock switch bring it under “ON” condition.

(2) DOM switch and interlock monitor switch

When the door is closed, the hook pushes the lock lever downward. The lock lever presses the button of the interlock monitor switch to bring it under “OFF” condition and presses the button of the DOM switch to bring it under ON condition.

ADJUSTMENT :

Interlock monitor switch

When the door is closed, the interlock monitor switch should be “OFF” condition before other switches are “ON” condition.
When the door is opened, the interlock monitor switch should be “ON” condition after other switches are “OFF” condition.

(3) Adjustment steps

a) Loosen the one mounting screw.
b) Adjust interlock switch assembly position.
Actuation distance of primary and secondary interlock switch shall be adjusted almost 0.7mm.
c) Make sure that lock lever moves smoothly after adjustment is completed.
d) Tighten completely a mounting screws.

NOTE :

1) Service personnel have to reconnect and check continuity of Monitor Circuit.
2) Service personnel have to replace all monitored safety interlocks after monitored interlock failure.
3) Microwave emission test should be performed after adjusting interlock mechanism or replacing of all monitored safety interlocks after monitored interlock failure.
If the microwave emission exceed 4mW/cm², readjust interlock mechanism.

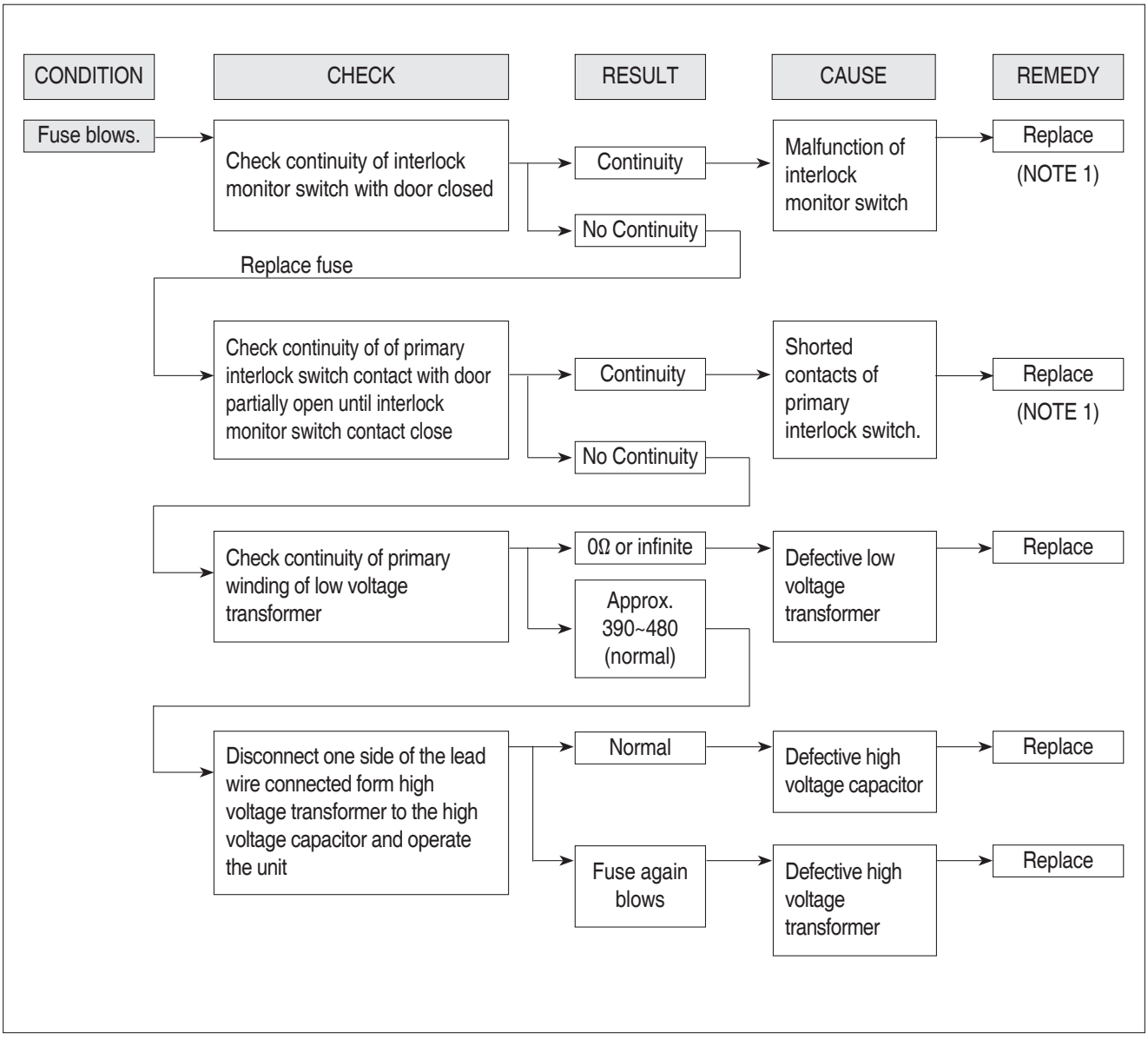
TROUBLESHOOTING GUIDE

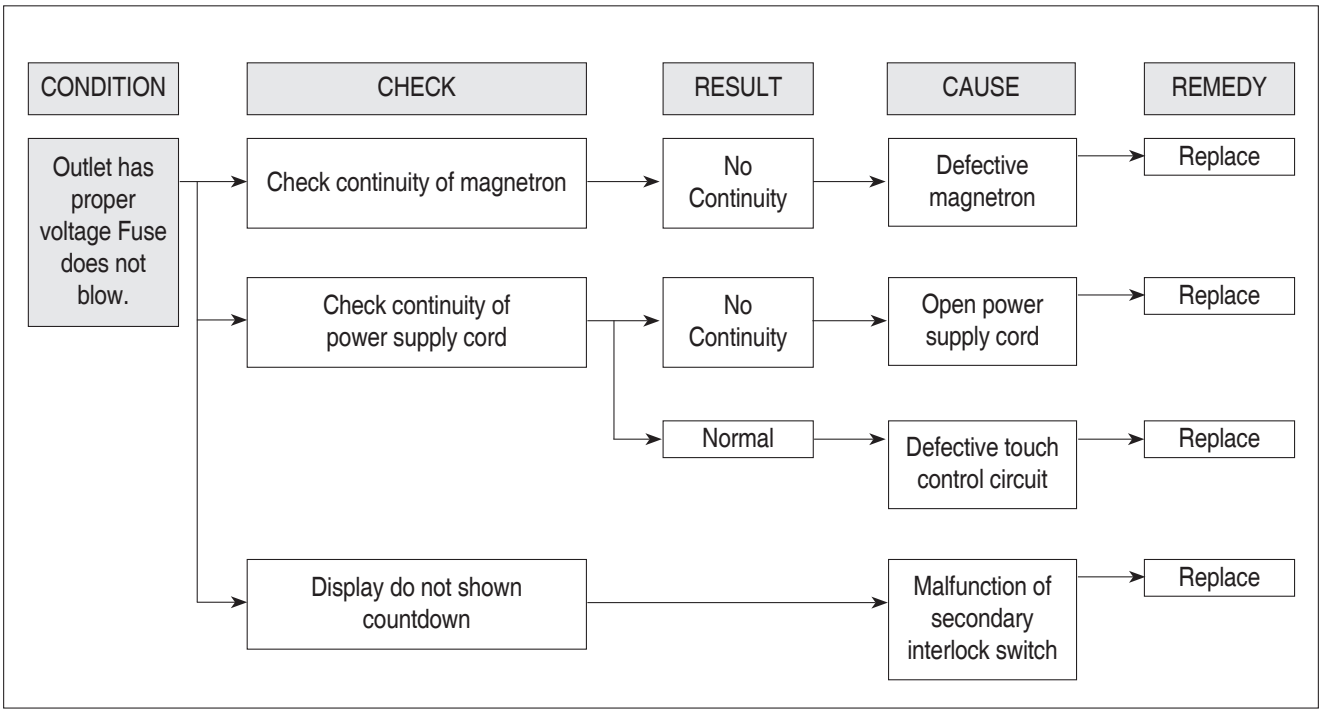
Following the procedure below to check if the oven is defective or not.

1. Check grounding before trouble checking.
2. Be careful of the high voltage circuit.
3. Discharge the high voltage capacitor.
4. When checking the continuity of the switches, fuse or high voltage transformer, disconnect one lead wire from these parts and check continuity with the AC plug removed. To do otherwise may result in a false reading or damage to your meter.

NOTE : When electric parts are checked, be sure the power cord is not inserted the wall outlet.
Check wire harness, wiring and connected of the terminals and power cord before check the parts listed below.

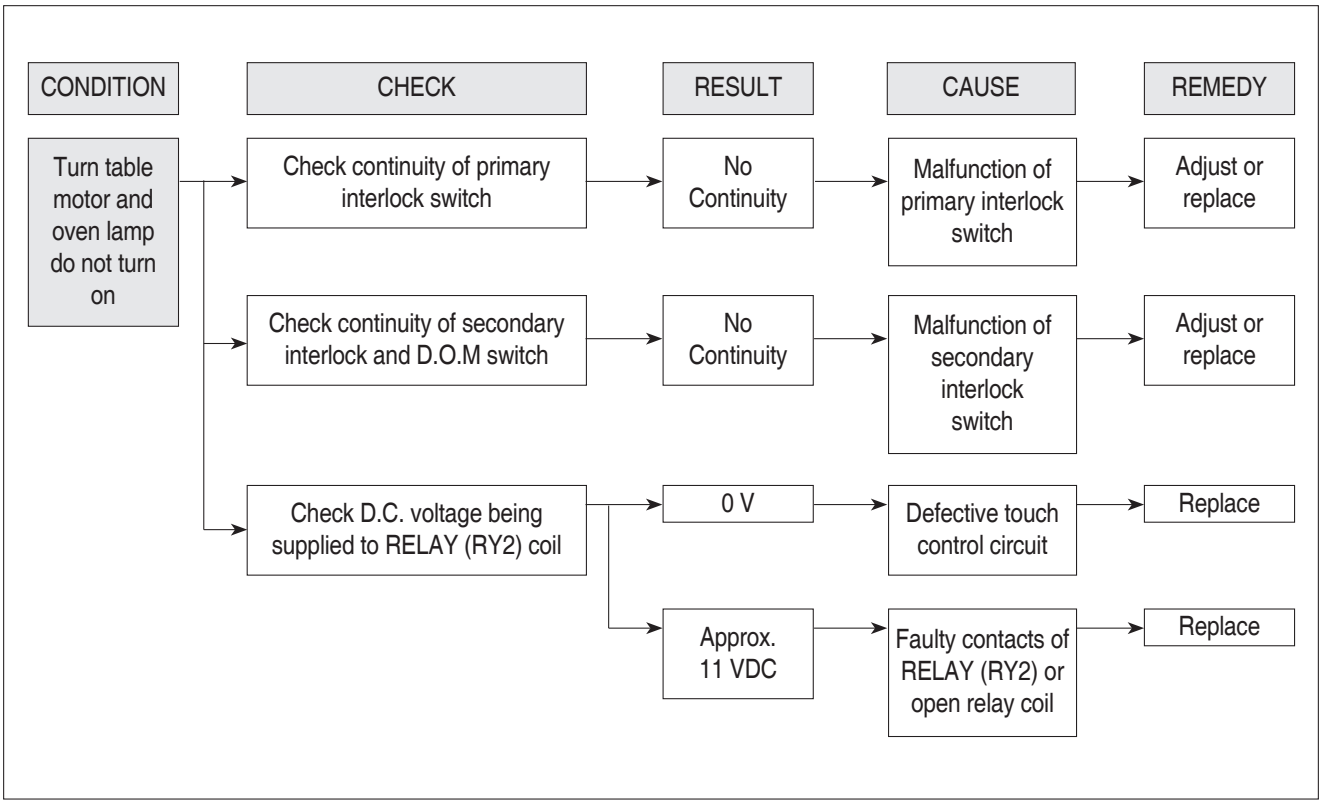
(TROUBLE 1) Oven does not operate at all ; any inputs can not be accepted.



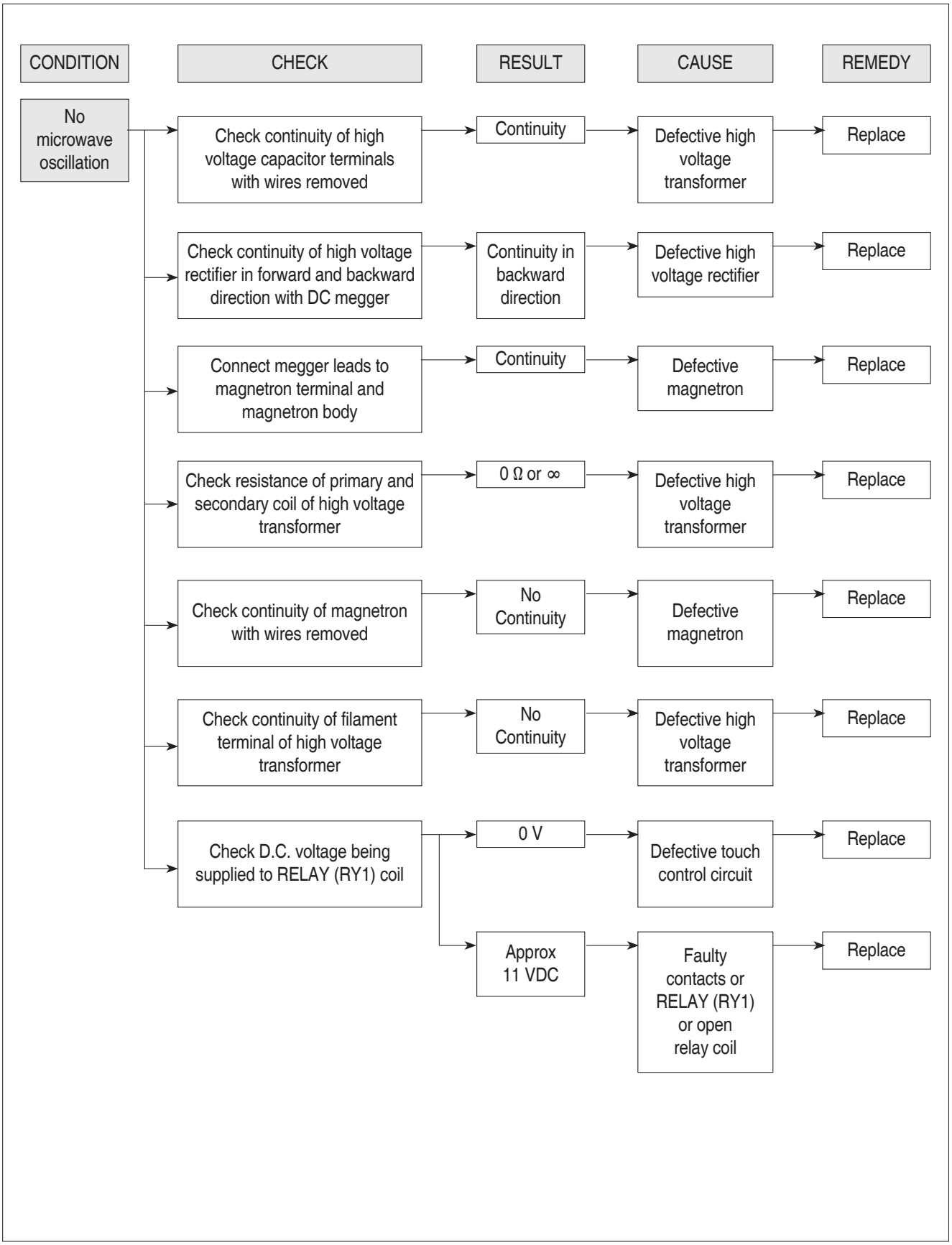


NOTE 1
All these switches must be replaced at the same time, please refer to “Interlock Mechanism And Adjustment”. Whenever safety interlock switches are replaced: check the wiring color, the connection of monitor switch, and perform the electrical continuity of interlock switches and microwave radiation emission test.

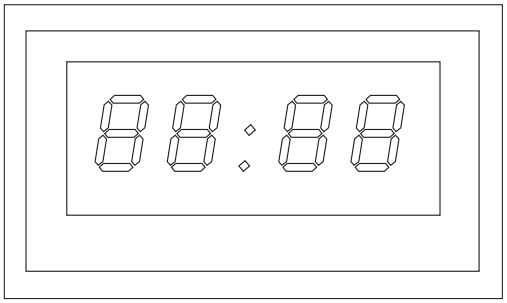
(TROUBLE 2) Display shows all figures selected, but oven does not start cooking, even though desired program and time are set and the START pad is touched.



(TROUBLE 3) No microwave oscillation even though fan motor rotates.



(TROUBLE 4) The following visual conditions indicate a probable defective touch control circuit



1. Incomplete segments,
   1) Segments missing.
   2) Partical segments missing.
   3) Digit flickering other than normal display slight flickering.
   4) " :0" does not display when power is on.

2. A distinct change in the display are not on when it should be.

3. One or more digits in the display are not on when they should be.

4. Display indicates a number different from one touched.

5. Specific numbers (for example 2 or 3) will not display when the panel is touched.

6. Display does not count down or up with time cooking or clock operation.

7. Oven is programmable and cooks normally but no display shows.

8. Display obviously jumps in time while counting down.

9. Display counts down noticeable too fast while cooking.

10. Display does not show the time of day when the STOP/CLEAR pad is touched. (in case of setting the present time)

11. Oven lamp and turntable motor do not stop although cooking is finished. Check if the RELAY 2 contacts close.
    If they are close, replace P.C.B assembly.

CONDITION	CHECK	RESULT	CAUSE	REMEDY
Display does not show programming at all, even if keyboard is pressed.	Check rach pad for continuity of the membrane keyboard for the following keyboard check procedure	Normal	Malfunction of the control circuit board	Replace control circuit board
		Abnormal	Malfunction of the membrane keyboard	Replace the membrane keyboard

NOTE
Before following the particular steps listed above in the trouble shooting guide for the membrane keyboard, please check for the continuity of each wire-harness between the membrane keyboard and P.C.B. assembly.

MEASUREMENT AND TEST

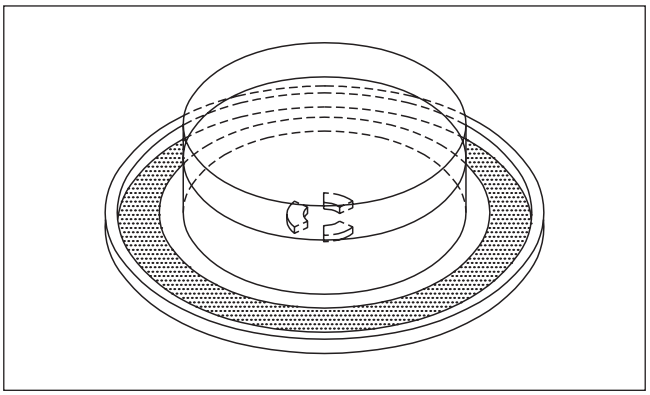
1. MEASUREMENT OF THE MICROWAVE POWER OUTPUT

Microwave output power can be checked by indirectly measuring the temperature rise of a certain amount of water exposed to the microwave as directed below.

PROCEDURE

1. A cylindrical container of borosilicate glass is used for the test. It has a maximum thickness of 3mm, an external diameter of approximately 190mm and a height of approximately 90mm.
   The mass of the container is determined.
2. At the start of the test, the oven and the empty container are at ambient temperature. Water having an initial temperature of 10˚C ± 1˚C is used for the test. The water temperature is measured immediately before it is poured into the container.
3. A quantity of 1000g ± 5g of water is added to the container and its actual mass obtained.
   The container is then immediately placed in the centre of the oven shelf, which is in its lowest normal position.
   The oven is operated and the time for the water temperature to attain 20˚C ± 2˚C is measured. The oven is then switched off and the final water temperature is measured within 60s.

   NOTE 1 - The water stirred is before its temperature is measured.
   NOTE 2 - Stirring and measuring devices are to have a low heat capacity.



4. The microwave power output is calculated from the formula

$$P = \{4.187 \bullet m_w(T_2-T_1) + 0.55 \bullet m_c (T_2-T_0)\}/t$$

where
P is the microwave power output, in watts ;
m_w is the mass of the water, in grams ;
m_c is the mass of the container, in grams ;
T_0 is ambient temperature, in degrees Celsius ;
T_1 is the initial temperature of the water, in degree Celsius ;
T_2 is the final temperature of the water, in degrees Celsius ;
t is the heating time, in seconds, excluding the magnetron filament heating-up time.

CAUTION
1. Water load should be measured exactly to 1 liter.
2. Input power voltage should be exactly specified voltage (Refer to SPECIFICATIONS).
3. Ambient temperature should be 20 ± 2°C (68 ± 3.6°F)

⁎ Heating time for power output: ($T_2 = T_0$)

A (second)	70	64	60	56	52	49	47	44	42	40	38	36	35
B (W)	600	650	700	750	800	850	900	950	1000	1050	1100	1150	1200

2. MICROWAVE RADIATION TEST

CAUTION
1. Make sure to check the microwave leakage before and after repair of adjustment.
2. Always start measuring of an unknown field to assure safety for operating personnel from microwave energy.
3. Do not place your hands into any suspected microwave radiation field unless the safe density level is known.
4. Care should be taken not to place the eyes in direct line with the source of microwave energy.
5. Slowly approach the unit under test until the radiometer reads an appreciable microwave leakage from the unit under the test.

PROCEDURE

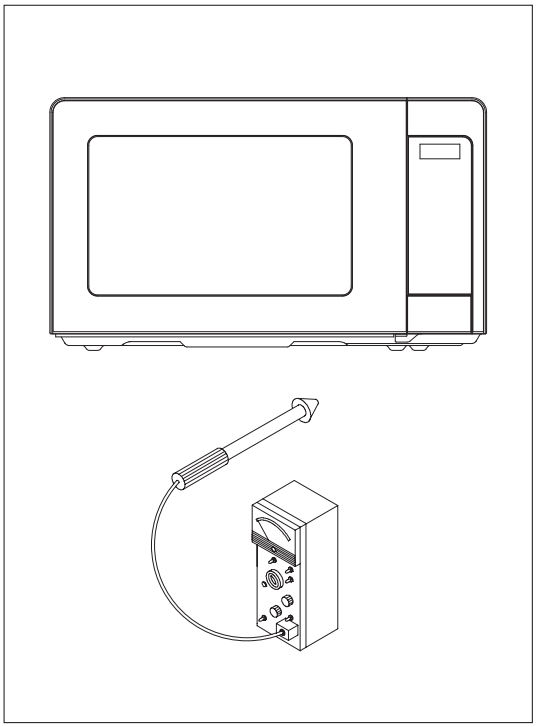
1. Prepare Microwave Energy Survey Meter, 600cc glass beaker, and glass thermometer 100°C (212°F).

2. Pour 275cc ± 15cc of tap water initially at 20 ± 5°C (68 ± 9°F) in the 600 cc glass beaker with an inside diameter of approx. 85mm (3.35in.)

3. Place it at the center of the tray and set it in a cavity.

4. Close the door and operate the oven.

5. Measure the leakage by using Microwave Energy Survey Meter with dual ranges, set to 2450MHz.
   1) Measured radiation leakage must not exceed the value prescribed below. Leakage for a fully assembled oven with door normally closed must be less than 4mW/cm².
   2) When measuring the leakage, always use the 5 cm (2 in.) space cone with probe. Hold the probe perpendicular to the cabinet and door. Place the space cone of the probe on the door, cabinet, door seem, door viewing screen, the exhaust air vents and the suction air vents.
   3) Measuring should be in a counter-clockwise direction at a rate of 1 in./sec. If the leakage of the cabinet door seem is unknown, move the probe more slowly.
   4) When measuring near a corner of the door, keep the probe perpendicular to the areas making sure the probe end at the base of the cone does not get closer than 2 in. from any metal. If it does not, erroneous reading may result.
   5) After servicing, record data on service invoice and/or microwave leakage report.



3. COMPONENT TEST PROCEDURE

- High voltage is present at the high voltage terminal of the high voltage transformer during any cooking cycle.
- It is neither necessary nor advisable to attempt measurement of the high voltage.
- Before touching any oven components or wiring, always unplug the oven from its power source and discharge the capacitor.

1. High voltage transformer

1) Remove connections from the transformer terminals and check continuity.
2) Normal readings should be as follows :
   Secondary winding ... Approx. 210 Ω ±10%
   Filament winding ... Approx. 0 Ω
   Primary winding ... Approx. 0.7 Ω

2. High voltage capacitor

1) Check continuity of capacitor with meter on the highest OHM scale.
2) A normal capacitor will show continuity for a short time, and then indicate 10MΩ once the capacitor charged.
3) A shorted capacitor will show continuous continuity.
4) An open capacitor will show constant 10MΩ.
5) Resistance between each terminal and chassis should be infinite.

3. High voltage diode

1) Isolate the diode from the circuit by disconnecting the leads.
2) With the ohmmeter set on the highest resistance scale measure the resistance across the diode terminals. Reverse the meter leads and again observe the resistance reading. Meter with 6V, 9V or higher voltage batteries should be used to check the front-back resistance of the diode, otherwise an infinite resistance may be read in both directions. A normal diode's resistance will be infinite in one direction and several hundred k Ω in the other direction.

4. Magnetron

For complete magnetron diagnosis, refer to "Measurement of the Microwave Power Output." Continuity checks can only indicate and open filament or a shorted magnetron. To diagnose for an open filament or a shorted magnetron,
1) Isolate magnetron from the circuit by disconnecting the leads.
2) A continuity check across magnetron filament terminals should indicate 0.1 Ω or less.
3) A continuity check between each filament terminal and magnetron case should read open.

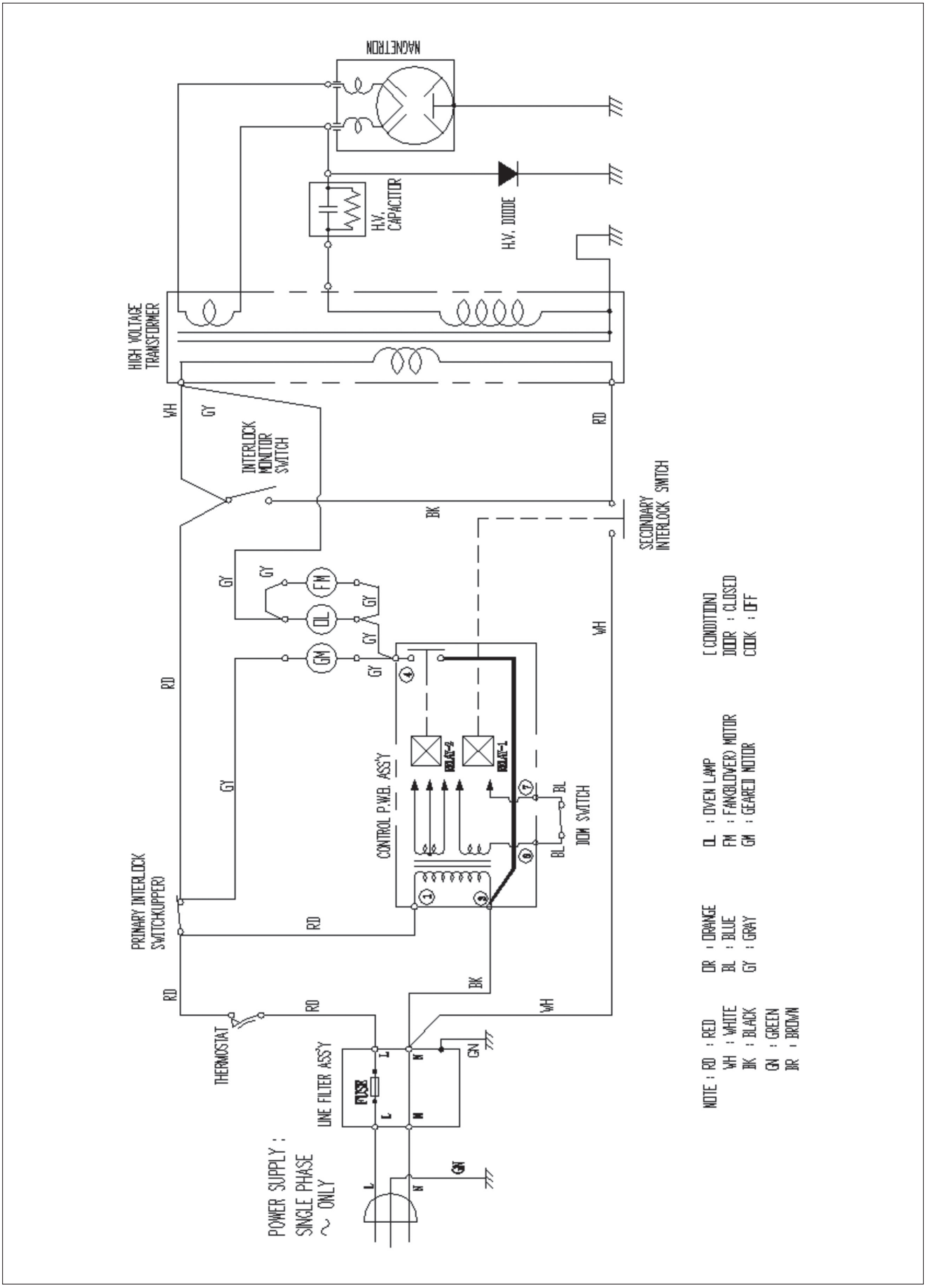
5. Fuse

If the fuse in the primary and monitor switch circuit is blown when the door is opened, check the primary and monitor switch before replacing the blown fuse. In case the fuse is blown by an improper switch operation, replace the defective switch and fuse at the same time. Replace just the fuse if the switches operate normally.

6. Interlock switches

(1) You can test continuity of safety interlock and monitor switch by using ohmmeter.
(2) The switch operation is checked by zero/unlimited.
   The meter should indicate zero resistance.
(3) The sequence of check is interlock monitor switch, primary and secondary interlock switches check.

WIRING DIAGRAM



PRINTED CIRCUIT BOARD

1. CIRCUIT CHECK PROCEDURE

1. Low voltage transformer check

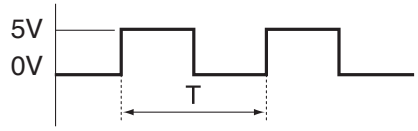
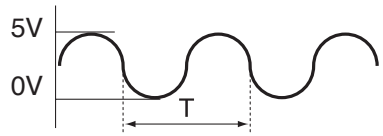
The low voltage transformer is located on the P.C.B.
Measuring condition: Input voltage: 120V / Frequency: 60Hz

Terminal Voltage	LOAD	NO LOAD
(4,5)-6 or (7,8)-6	DC 11V	AC 30V

NOTE
1. Refer to Circuit Diagram.
2. Secondary side voltage of the low voltage transformer changes in proportion to fluctuation of power source voltage.
3. The allowable tolerance of the secondary voltage is within ± 5% of nominal voltage.

2. Voltage Check

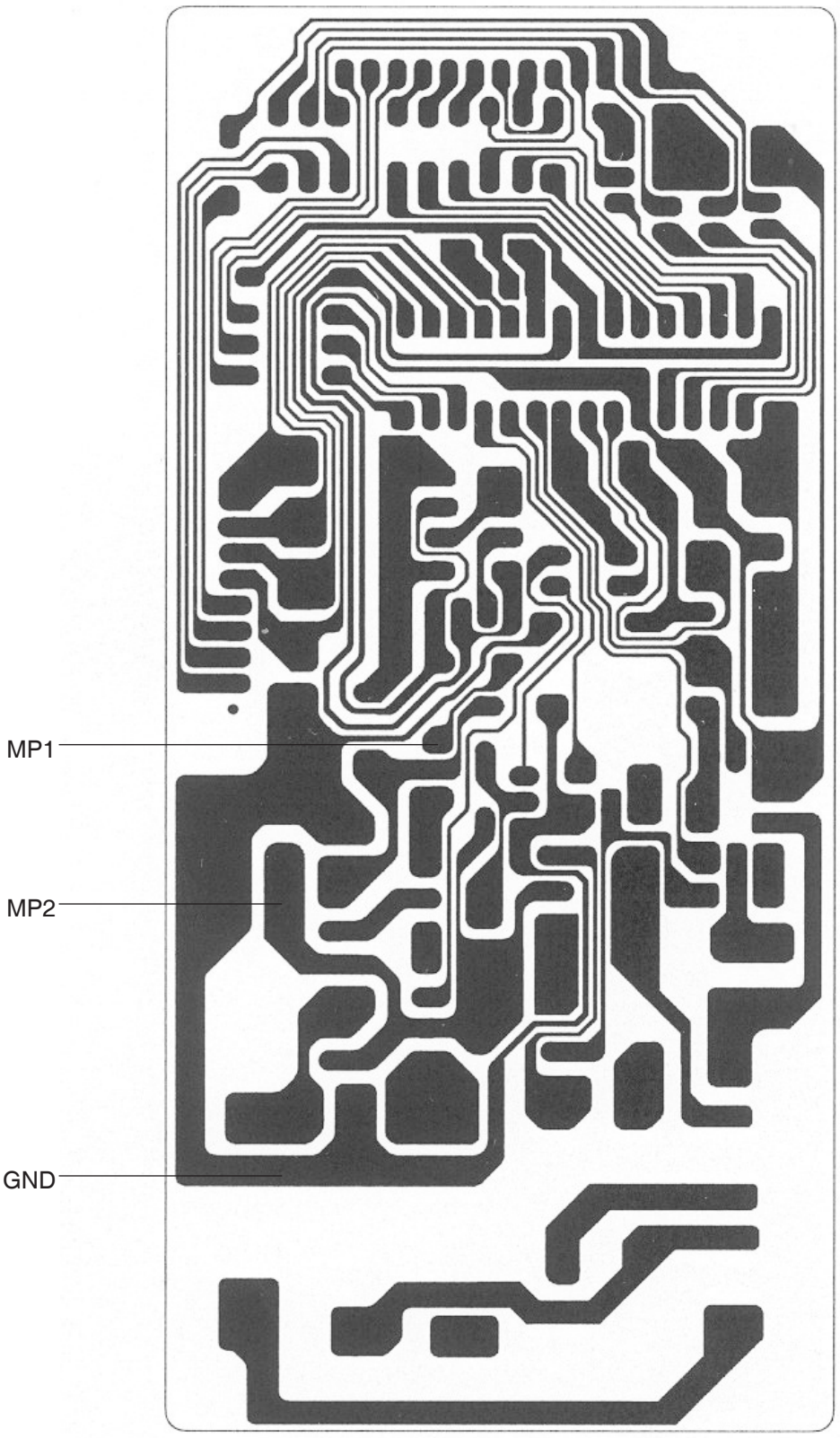
- Key check point

NO	CHECK POINT	REMARK
1	IC1 PIN 5	5VDC
2	IC1 PIN 8	 T : 16.67ms(60Hz)
3	IC 1 PIN 19 OR PIN 20	 T : 250 ns(4MHz)

- Check method

NO	MEASURE POINT	WAVE FORM	REMEDY	REMARK
1	MP1	DC 5V±0.25V	Replace Q8, R28, ZD3, C2, EC1	NO LOAD
2	MP2	DC 11V±3.0V	Replace EC3, D11, D12, D13	NO LOAD

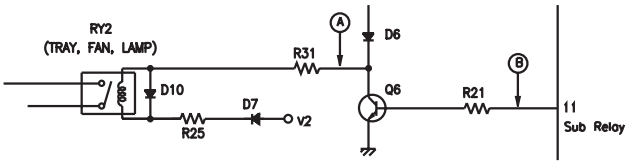
NOTE
Each measure point must be measured with GND points.



Measure Point

3. When there is no microwave oscillation

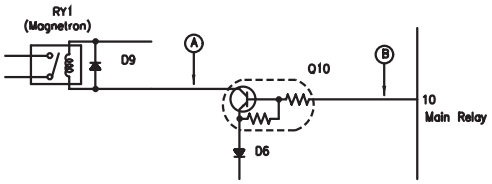
1) When touching **START** pad, oven lamp does not turn on.
Fan motor do not rotate, but cook indicator in display comes on.



-Check method

STATE \ POINT	A	B
RELAY 2 ON	5VDC	GND
RELAY 2 OFF	GND	11VDC

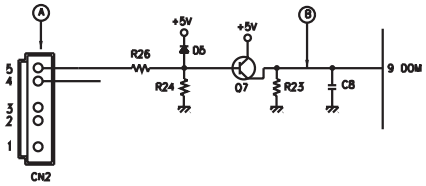
2) When touching **START** pad, oven lamp turns on.
Fan motor and turntable rotate and cook indicator in display comes on.



-Check method

STATE \ POINT	A	B
RELAY 1 ON	5VDC	GND
RELAY 1 OFF	GND	11VDC

4. When the door is opened during operation, the count down timer does not stop.

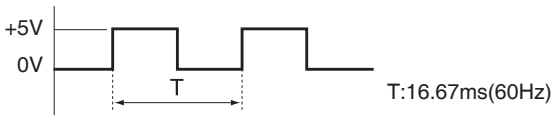


-Check method

STATE \ POINT	A	B
1) DOOR OPEN	OPEN	5VDC
2) DOOR CLOSED	CLOSE	GND

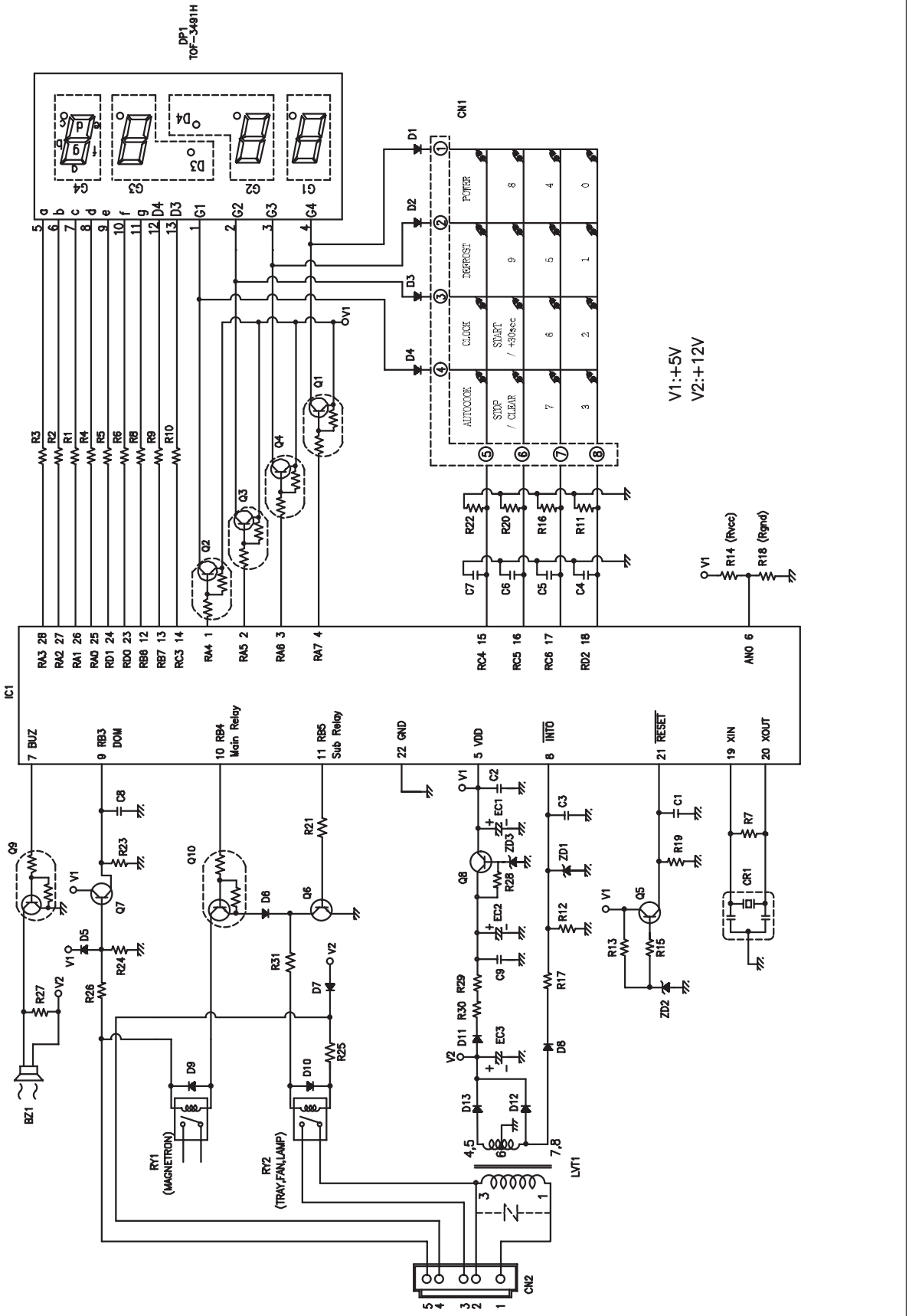
CHECK NO	METHOD	REMEDY
1	Check the stage(ON, OFF) of the door open monitor switch by resistance measurement.	Replace door open monitor switch.

5. When the digital clock does not operate properly.
→ refer to Circuit Diagram

POINT	WAVE FORM
IC 1 PIN 8	

* If clock does not keep exact time, you must check resistor R12, R17, D8, C3 and zener diode ZD1.

2. PCB CIRCUIT DIAGRAM



3. PCB LOCATION NO.

NO	NAME	SYMBOL	SPECIFICATION	PART CODE	Q'TY
1	BUZZER	BZ1	BM-20K	3515600100	1
2	CAPACITOR CERAMIC	C1,2,3,8,9	50V 0.1UF Z AXIAL	CCZF1H104Z	5
3	CAPACITOR CERAMIC	C4,5,6,7	50V 1000PF Z AXIAL	CCZB1H102K	4
4	CAPACITOR ELECTRO	EC1	50V RS 10UF(5X11)	CEXE1H100A	1
5	CAPACITOR ELECTRO	EC2	50V RSS 220UF(10X16)	CEXF1H221V	1
6	CAPACITOR ELECTRO	EC3	25V RSS 1000UF(13X20)	CEXF1E102V	1
7	CONNECTOR WAFER	CN1	FCZ254-8	441M367130	1
8	CONNECTOR WAFER	CN2	YW396-725V	3519150550	1
9	DIODE SWITCHING	D1~10	1N4148	DZN4148---	10
10	DIODE RECTIFYING	D11~13	1N4004A AUTO 52MM	DZN4004A--	3
11	DIODE ZENER	ZD1	UZ -5.1BSB	DZUZ5R1BSB	1
12	DIODE ZENER	ZD2	UZ -3.3BSB	DZUZ3R3BSB	1
13	DIODE ZENER	ZD3	UZ -5.6BSB	DZUZ5R6BSB	1
14	FOAM	-	CR 8TX35X10	3517307000	1
15	LED DISPLAY	DP1	E40393-I JOW	DHLBW439G-	1
16	IC MICOM	IC1	HMS87C1408B(OTP)	150LC1408B	1
17	PCB MAIN	M325-2	65X139	40303-0004301-00	1
18	RESISTOR	R13	1/6W 200 OHM 5%	RD-AZ201J-	1
19	RESISTOR	R1~6,8~10	1/6W 560 OHM 5%	RD-AZ561J-	9
20	RESISTOR	R15,27,28	1/6W 1K OHM 5%	RD-AZ102J-	3
21	RESISTOR	R21,26	1/6W 4.7K OHM 5%	RD-AZ472J-	2
22	RESISTOR	R12,17,19,23	1/6W 10K OHM 5%	RD-AZ103J-	4
23	RESISTOR	R24	1/6W 47K OHM 5%	RD-AZ473J-	1
24	RESISTOR	R11,16,20,22	1/6W 100K OHM 5%	RD-AZ104J-	4
25	RESISTOR	R7	1/6W 1M OHM 5%	RD-AZ105J-	1
26	RESISTOR	R25	1/4W 51 OHM 5%	RD-4Z510J-	1
27	RESISTOR	R31	1/4W 100 OHM 5%	RD-4Z101J-	1
28	RESISTOR	R29,30	1/2W 27 OHM 5%	RD-2Z270JS	2
29	RESONATOR CERAMIC	CR1	CRT-4.00MS	5P4R00MTS-	1
30	SW RELAY	RY1	GS5-1A-12DT	5SC0101123	1
31	SW RELAY	RY2	HF32F 012-HSL3	5SC0101128	1
32	TRANSISTOR	Q5,7	KTA1266Y AUTO	TZTA1266Y-	2
33	TRANSISTOR	Q6,8	KTC3198GR AUTO	TZTC3198GR	2
34	TRANSISTOR	Q1~4	KRA106M AUTO	TZRA106M--	4
35	TRANSISTOR	Q9,10	KRC106M AUTO	TZRC106M--	2
36	TRANS POWER	LVT1	DMR-63KP US	40512-0016500	1
37	WIRE COPPER 7.5MM	J1,2,4,5,7,8	1/0.52 TIN COATING	85801052GY	6
38	WIRE COPPER 10MM	J3,6,	1/0.52 TIN COATING	85801052GY	2
39	RESISTOR	R14	1/6W 20K OHM J	RD-AZ203J-	1
40	RESISTOR	R18	1/6W 4.7K OHM J	RD-AZ472J-	1

EXPLODED VIEW AND PARTS LIST

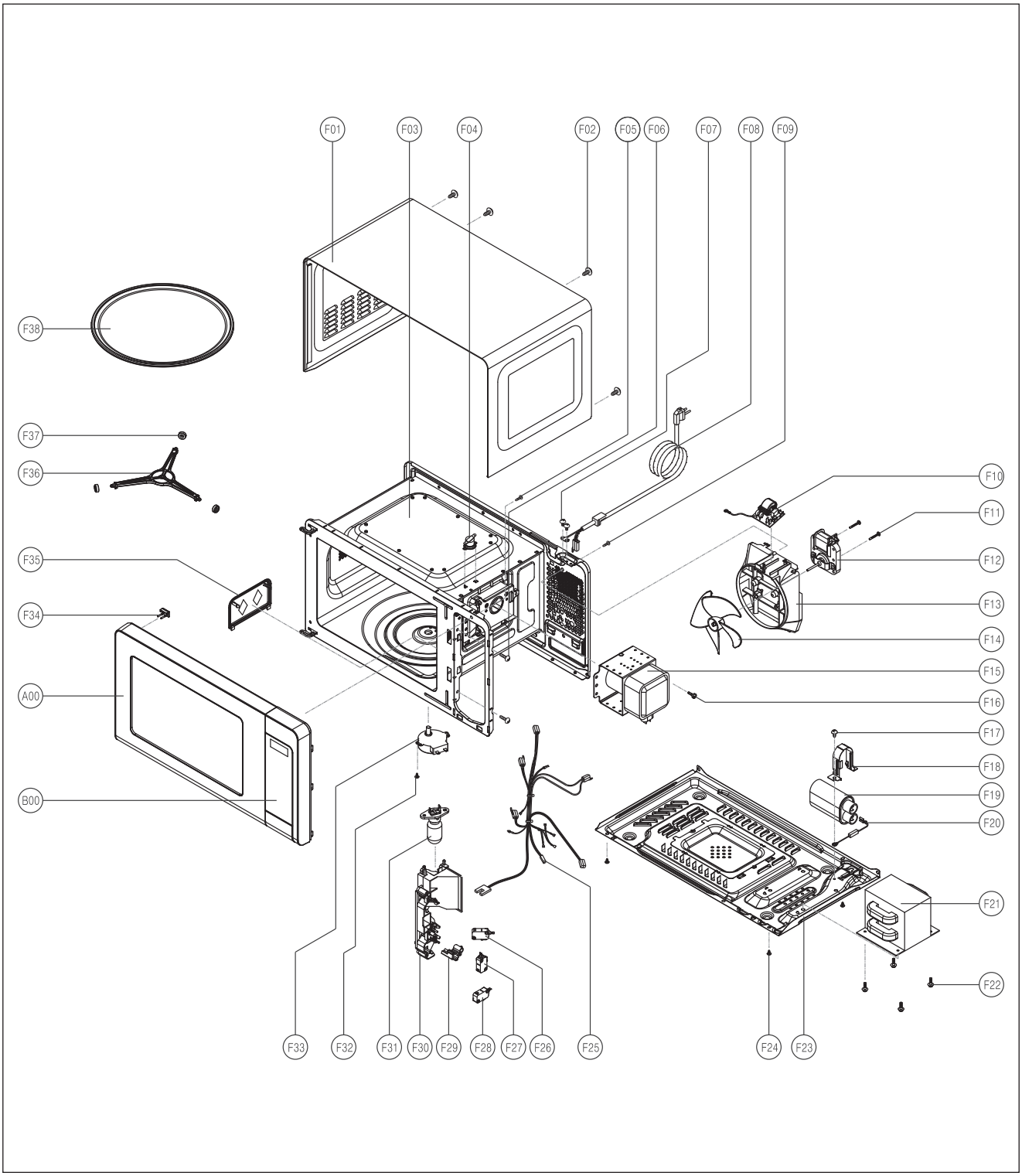
1. DOOR ASSEMBLY

Refer to Disassembly and assembly.

2. CONTROL PANEL ASSEMBLY

Refer to Disassembly and assembly.

3. TOTAL ASSEMBLY



NO	PART CODE	PART NAME	PART DESC.	Q'TY	REMARK	SVC
A00	35117-0045900-00	DOOR AS	KOR664B SUS(BLACK) BLACK(P)	1		Y
B00	35167-0110900-00	CONTROL-PANEL AS	KOR664BWTAE013AB00 Kenmore	1		Y
F01	35108-0013801-00	CABINET AS	KOR660B, BLACK	1		Y
F02	7S312X40A1	SCREW SPECIAL	T1 TRS 4X10 SE MFZN	4		Y
F03	35161-0024100-00	CAVITY AS	KOR660B WHITE	1		N
F04	3518902600	THERMOSTAT	OFF:90 ON:60 H #187	1		Y
F05	7122401211	SCREW TAPPING	T2S TRS 4*12 MFZN	1		Y
F06	7122401211	SCREW TAPPING	T2S TRS 4*12 MFZN	2		Y
F07	3516008100	SPECIAL SCREW	TT3 TRS 4X10 SE MFZN	2		Y
F08	35113T5W0H	CORD POWER AS	3X18AWG 60X60 120-RTML	1		Y
F09	7122401211	SCREW TAPPING	T2S TRS 4*12 MFZN	1		Y
F10	3518608820	NOISE-FILTER	DWLF-M12 F-1	1		Y
F11	7121402511	SCREW TAPPING	T2S PAN 4X25 MFZN	2		Y
F12	3963821640	MOTOR SHADED POLE	120V 60HZ OEM-10DWX1-A07 (A)	1		Y
F13	35125-0022100-00	GUIDE WIND	PP J640A WHITE KQG661Z	1		Y
F14	3511800300	FAN	PP+30%GLASS	1		Y
F15	3518002410	MAGNETRON	2M218J(F) 6CF	1		Y
F16	3516004000	SCREW SPECIAL	T2 BOLT FLANGE 5X12 DACRO	1		Y
F17	7071400811	SCREW MACHINE	PAN 4X8 SW MFZN+STAR WASHER	1		Y
F18	35130-0000802-00	HOLDER HV CAPACITOR	GI T0.5 KOR-6L	1		Y
F19	3518301801	CAPACITOR HV	2100VAC 0.98UF #187 75MM	1		Y
F20	3518400800	DIODE HV AS	ESJC13-12BX (CL01-12)	1		Y
F21	65181-0014500-00	TRANS HV	DJAS70A0-66B A 120V/60HZ 700W JENPENG	1		Y
F22	3516003700	SCREW SPECIAL	TT3 HEX 4X8 FLG MFZN	4		Y
F23	35103-0014902-00	BASE	GI T0.6 KOR660B	1		Y
F24	7S312X40A1	SCREW SPECIAL	T1 TRS 4X10 SE MFZN	4		Y
F25	65127-0021000-00	HARNESS MAIN	KOR660BWWAE013AW00	1		Y
F26	4415A17352	SW MICRO	SZM-V16-FA-63	1		Y
F27	4415A66600	SW MICRO	SZM-V16-FA-62	1		Y
F28	3518571000	SWITCH PUSH	V0303A2 / MP101C	1		Y
F29	3513703800	LEVER LOCK	PP 5113MF6	1		Y
F30	35138-0023900-00	LOCK	PP FH44N V0 KOR660B BUTTON TYPE	1		Y
F31	3513601500	LAMP	BL 125V 25W T25 C5A H187	1		Y
F32	7121400611	SCREW TAPPING	T2S PAN 4X6 MFZN	1		Y
F33	65159-0009500-00	MOTOR SYNCRO	49TYD-16A1 E 3R.P.M. AC120V 60HZ	1		Y
F34	35152-0003900-00	STOPPER DOOR	PP J-640A, BLACK, KOR660B	1		Y
F35	3511415700	COVER WAVE GUIDE	PP 5113MF6	1		Y
F36	35125-0020900-00	GUIDE ROLLER	SPS HR 401-7821, KOR660B, XAREC	1		Y
F37	35147-0001200-00	ROLLER	PTFE DIA14.5 KOR660B	3		Y
F38	35172-0012000-00	TRAY GLASS	GLASS DIA245 KOR660B	1		Y

DAEWOO

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ABOUT THIS MANUAL

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광주광역시 서구 하남대로
502번길 14

담 당	김지수 님
M O D E L	KOR664BWTAE013AB00
	Kenmore (S/M)
접 수	2018.03.29
M E M O	총 32p (A4)

18.03.29–13p (표지, 표지뒤, 3p, 4p, 6p, 7p, 11p, 12p, 14p, 21p, 22p, 29p, 30p)
총 32p (① 원본없음 복구 작업, ② 신규 작업, ③ 일러스트 호환 작업 5 cut)
18.04.02–4p (표지, 표지뒤, 6p, 30p)
18.04.04–3p (3p, 15p, 30p)
18.04.05–1p (30p)
18.04.09–23p (표지, 표지뒤, 15p _ 회사명 변경)

NO NEED PRINT