

## 8. PROCEDURE FOR MEASURING MICROWAVE ENERGY LEAKAGE

### A. CAUTIONS

- (1) Be sure to check a microwave emission prior to servicing the oven if the oven is operative prior to servicing.
  - (2) The service personnel should inform the manufacturer, importer, or assembler of any certified oven unit found to have a microwave emission level in excess of 5mW/cm.sq. and should repair any unit found to have excessive emission levels at no cost to the owner and should ascertain the cause of the excessive leakage. The service personnel should instruct the owner not to use the unit until the oven has been brought into compliance.
  - (3) If the oven operates with the door open, the service personnel should;
    - Tell the user not to operate the oven
    - Contact the manufacturer and CDRH (Center for Devices and Radiological Health) immediately.

**NOTE:** Address on CDRH  
Office of Compliance (HFZ-312)  
Center for Devices and Radiological Health  
1390 Piccard Drive Rockville, Maryland 20850
  - (4) The service personnel should check all surface and vent openings for microwave emission testing.
  - (5) Check for microwave energy leakage after every servicing. The power density of the microwave radiation leakage emitted by the microwave oven should not exceed 1mW/cm.sq. And always start measuring of an unknown field to assure safety for operating personnel from radiation leakage.
- NOTE:** The standard is 5mW/cm.sq. while in the customer's home. 1mW/cm.sq. stated here is manufacturer's own voluntary standard for units in customer's home.

### EQUIPMENT

- Electromagnetic energy leakage monitor (NARDA 8100B, HOLADAY HI 1501)
- 600cc glass beaker
- Glass thermometer 100°C

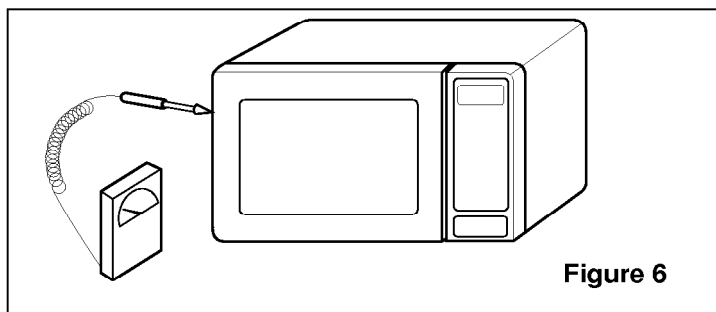


Figure 6

### B. MEASURING MICROWAVE ENERGY LEAKAGE

- (1) Pour 275 ±15cc of 20 ±5 °C water in a beaker which is graduated to 600 cc, and place the beaker in the center of the oven.
- (2) Set the energy leakage monitor to 2,450 MHz and use it following the manufacturer's recommended test procedure to assure correct result.
- (3) When measuring the leakage, always use the 2 inch (5 cm) spacer supplied with the probe.
- (4) Operate the oven at its maximum output.
- (5) Measure the microwave radiation using and electromagnetic radiation monitor by holding the probe perpendicular to the surface being measured. (See Figure 7)

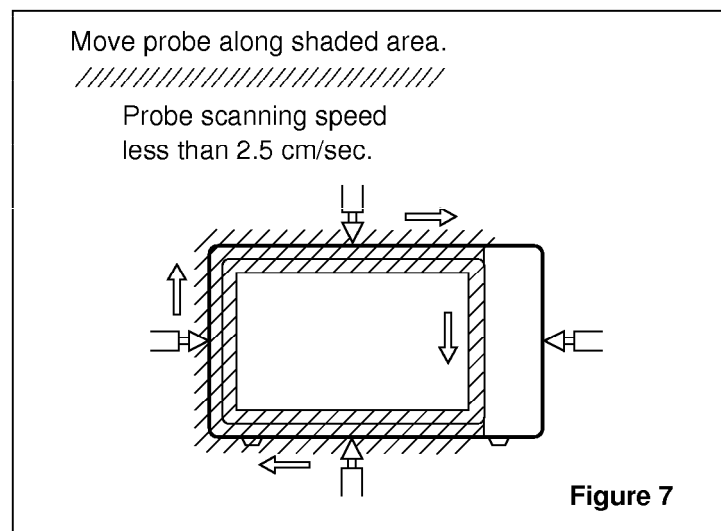


Figure 7

### C. MEASUREMENT WITH THE OUTER CASE REMOVED

- (1) When you replace the magnetron, measure for microwave energy leakage before the outer case is installed and after all necessary components are replaced or adjusted. Special care should be taken in measuring the following parts.
  - Around the magnetron
  - The waveguide

**WARNING:** AVOID CONTACTING ANY HIGH VOLTAGE PARTS.

#### D. MEASUREMENT WITH A FULLY ASSEMBLED OVEN

- (1) After all components, including the outer panels, are fully assembled, measure for microwave energy leakage around the door viewing window, the exhaust opening and air inlet openings.
- (2) Microwave energy leakage must not exceed the values prescribed below.

**NOTES:**

Leakage with the outer panels removed - less than 5mW/cm.sq. Leakage for a fully assembled oven (Before the latch switch (primary) is interrupted) with the door in a slightly opened position - less than 1 mW/cm .sq.

#### E. NOTE WHEN MEASURING

- (1) Do not exceed meter full scale deflection.
- (2) The test probe must be removed no faster than 1 inch/sec (2.5cm/sec) along the shaded area, otherwise a false reading may result.
- (3) The test probe must be held with the grip portion of the handle. A false reading may result if the operator's hand is between the handle and the probe.
- (4) When testing near a corner of the door, keep the probe perpendicular to the surface making sure the probe horizontally along the oven surface, this may possibly cause probe damage.

#### F. RECORD KEEPING AND NOTIFICATION AFTER MEASUREMENT

- (1) After adjustment and repair of any microwave energy interruption or microwave energy blocking device, record the measured values for future reference. Also enter the information on the service invoice.
- (2) Should the microwave energy leakage not be more than 1mW/cm.sq. after determining that all parts are in good condition, functioning properly and genuine replacement parts which are listed in this manual have been used.
- (3) At least once a year, have the electromagnetic energy leakage monitor checked for calibration by its manufacturer.

#### G. POWER OUTPUT MEASUREMENT

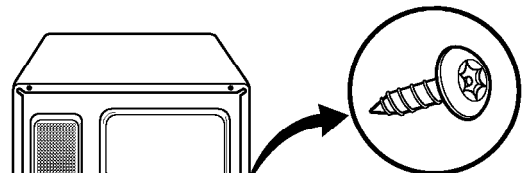
- (1) Fill the test beaker with 59 °F(15 °C) ~ 75 °F(24 °C) 1 liter tap water.
- (2) Stir the water in the beaker with thermometer (°F or °C) and measure temperature as T1.
- (3) Place the beaker on the center of turntable.
- (4) Set for one (1) minute and three (3) seconds and operate the oven at high power.  
NOTE: The additional three (3) seconds is to allow the magnetron to begin generating power.
- (5) When the heating is finished, stir the water again with thermometer and measure the temperature of water as T2.
- (6) Subtract T1 from T2, this will give you the temperature rise.
- (7) The microwave power output is within specification, if the temperature rise is as shown below:

Line Voltage	Temperature Rise	
	Degrees °F	Degrees °C
120 V	11.7 ~ 17.1	6.5 ~ 9.5
108 V	Min. 10.6	Min. 5.9

- (8) Power output will be influenced by line voltage of power supply. Consequently, correct power output must be measured within 120V AC ± 1 Volt while unit is operating.

#### **SPECIAL TIP**

- This oven used the button head screws.



**Button Head  
(Torx style 2)**

- When you remove the screws, using the tamper-resistant Torx driver have a pin-in-head.

## 9. DISASSEMBLY INSTRUCTIONS

### IMPORTANT NOTES:

UNIT MUST BE DISCONNECTED FROM ELECTRICAL OUTLET WHEN MAKING REPAIRS, RE-PLACEMENTS, ADJUSTMENTS AND CONTINUITY CHECKS. WAIT AT LEAST ONE MINUTE, UNTIL THE HIGH VOLTAGE CAPACITOR IN THE HIGH VOLTAGE POWER SUPPLY HAS FULLY DISCHARGED.

THE CAPACITOR SHOULD BE DISCHARGED BY USING INSULATED WIRE - I.E. TEST PROBE CONNECTED TO 10K-OHM RESISTOR IN SERIES TO GROUND.

WHEN RECONNECTING THE WIRE LEADS TO ANY PART, MAKE SURE THE WIRING CONNECTIONS AND LEAD COLORS ARE CORRECTLY MATCHED ACCORDING TO THE OVERALL CIRCUIT DIAGRAM. (ESPECIALLY SWITCHES AND HIGH VOLTAGE CIRCUIT.)

### A. REMOVING OUTER CASE (Figures 8)

- (1) Remove four screws from the rear section.
- (2) Remove one screw from the side section.
- (3) Push the outer case back about 1 inch (3cm).
- (4) Lift the case from the set.

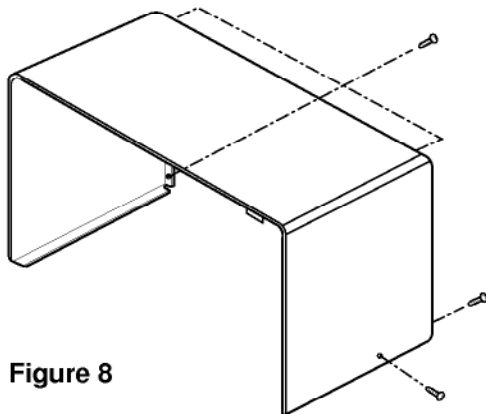


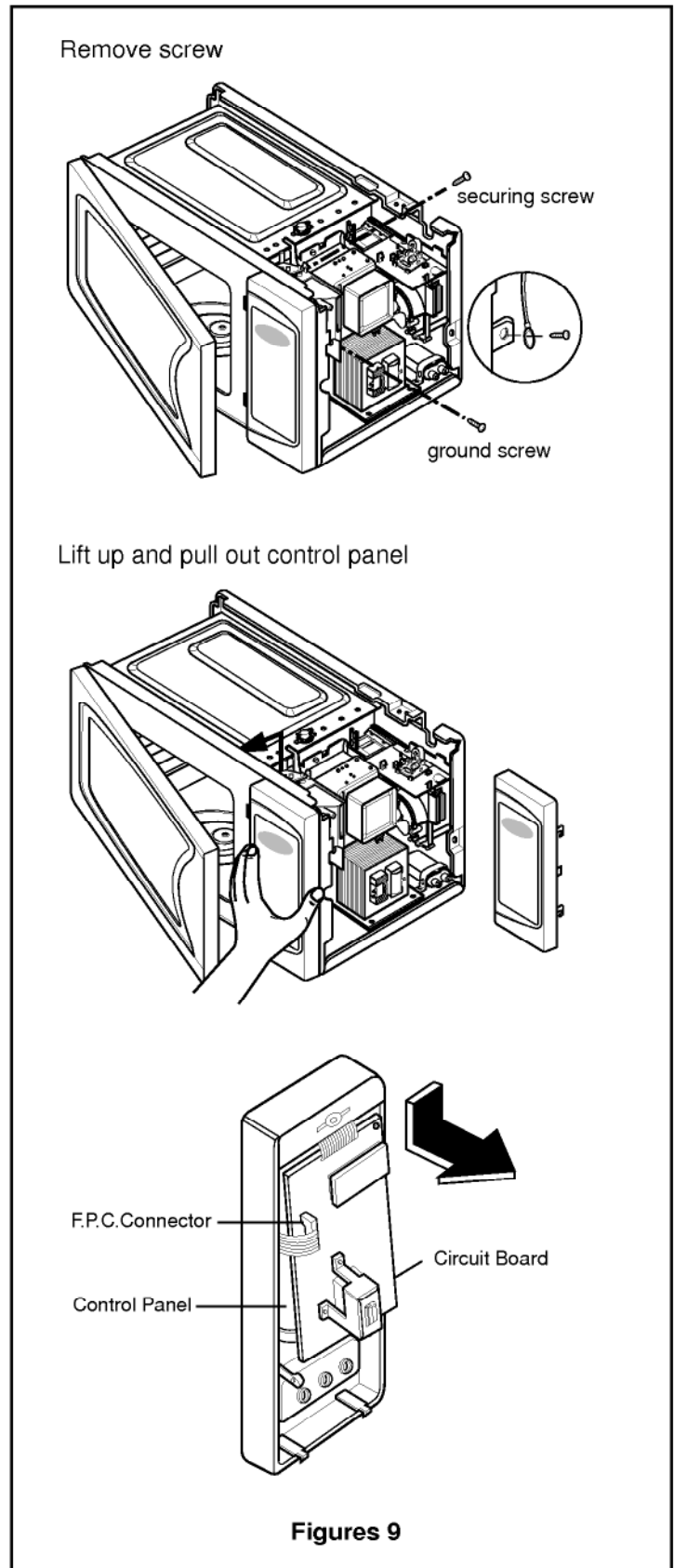
Figure 8

### B. REMOVING POWER AND CONTROL CIRCUIT BOARD (Figure 9)

- (1) Open the door.
- (2) Remove two screws, securing the circuit board.
- (3) Disconnect the lead wire from RELAY (RY2) on the circuit board.
- (4) Lift up and pull out control panel assembly carefully from the cavity.
- (5) Disconnect the lead wire from connector (CN1) on the circuit board.

CAUTION: DISCHARGE THE HIGH VOLTAGE CAPACITOR BEFORE SERVICING.

- (6) Pull down and remove the circuit board from the control panel.
- (7) Remove the F.P.C connector from the terminal socket.



Figures 9

### C. DOOR GROSS ASSEMBLY REMOVAL

- (1) Open the door.
- (2) Remove the choke cover very carefully with a flat-blade screwdriver.

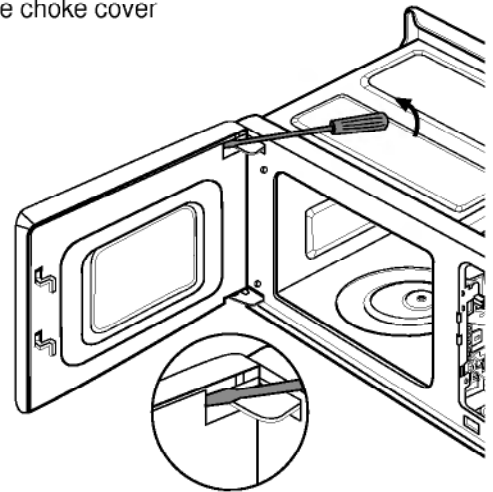
**CAUTION : Be careful not to damage door seal plate with the screwdriver.**

- (3) Lift up and pull out the door.

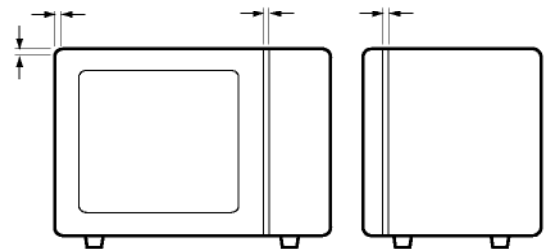
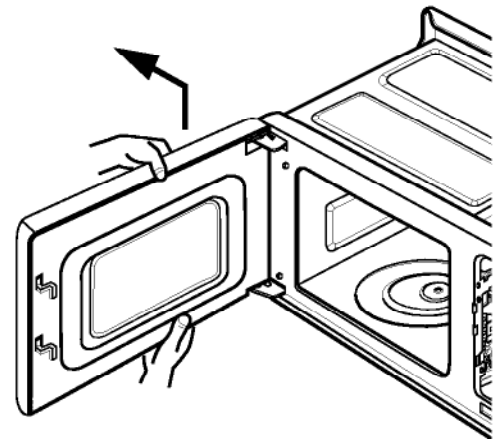
**NOTE:**

1. After replacing the door, be sure to check that the primary switch, monitor switch, and secondary switch operate normally.
2. After replacing the door, check for microwave energy leakage with a survey meter. Microwave energy must be below the limit of 5 mW/cm.sq. (with a 275 ml water load)
3. When mounting the door assembly to the oven assembly, be sure to adjust the door assembly parallel to the chassis. Also adjust so the door has no play between the inner door surface and oven frame assembly. If the door assembly is not mounted properly, microwaves may leak from the clearance between the door and the oven.

Remove choke cover



Remove door



Figures 10

## D. MAGNETRON REMOVAL

- 1) Disconnect the leadwire from the magnetron.
- 2) Carefully remove the mounting screws holding the magnetron and the waveguide.
- 3) Remove the magnetron ASSEMBLY until the tube is clear from the waveguide.

### NOTE:

1. When removing the magnetron, make sure its dome does not hit any adjacent parts, or it may be damaged.
2. When replacing the magnetron, be sure to install the magnetron gasket in the correct position and be sure that the gasket is in good condition.
3. After replacing the magnetron, check for microwave leakage with a survey meter around the magnetron. Microwave energy must be below the limit of 5 mW/cm<sup>2</sup>. (With a 275 ml. water load).

**Make sure that gasket is rigidly attached to the magnetron.** To prevent microwave leakage, tighten the mounting screws properly, making sure there is no gap between the waveguide and the magnetron.

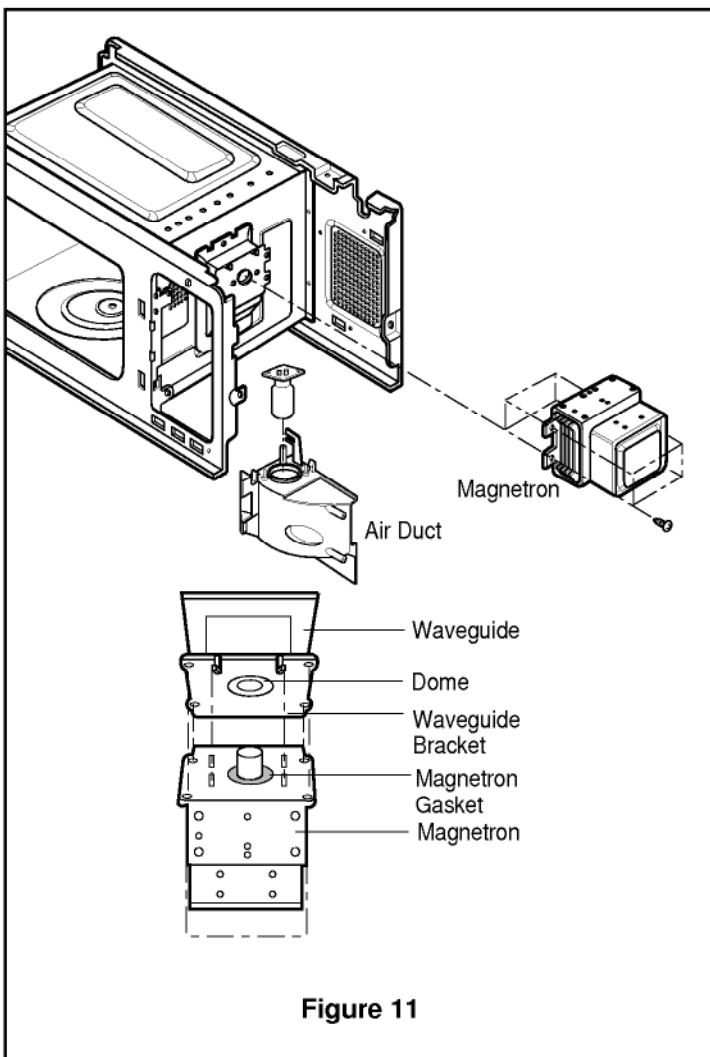


Figure 11

## E. REMOVING THE TURNTABLE MOTOR

- 1) Remove the turntable and rotating ring.
- 2) Lay the unit down on its back.
- 3) Remove the turntable motor cover. The turntable base cover is easily removed by pinching the eight parts with a wire cutting.
- 4) Disconnect the leadwire from the turntable motor terminals.
- 5) Remove the screw securing the turntable motor to the oven cavity ASSEMBLY.
- 6) After repairing the motor, rotate the removed turntable motor cover.
- 7) Fit the turntable motor cover's projecting part to the base plate slit.

### NOTE:

1. Remove the wire lead from the turntable motor VERY CAREFULLY.
2. Be sure to grasp the connector, not the wires, when removing.

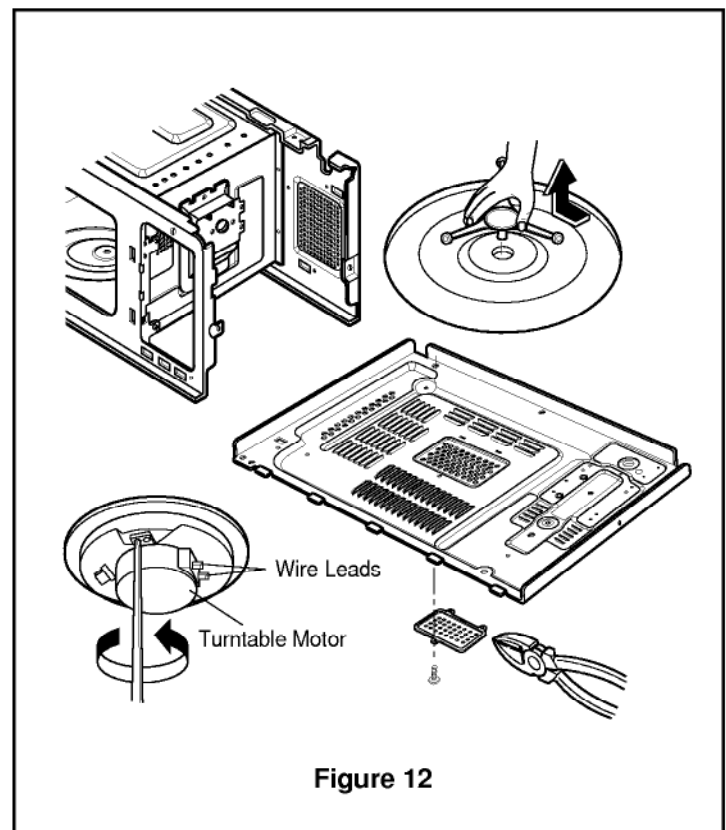


Figure 12

## F. HIGH VOLTAGE TRANSFORMER REMOVAL

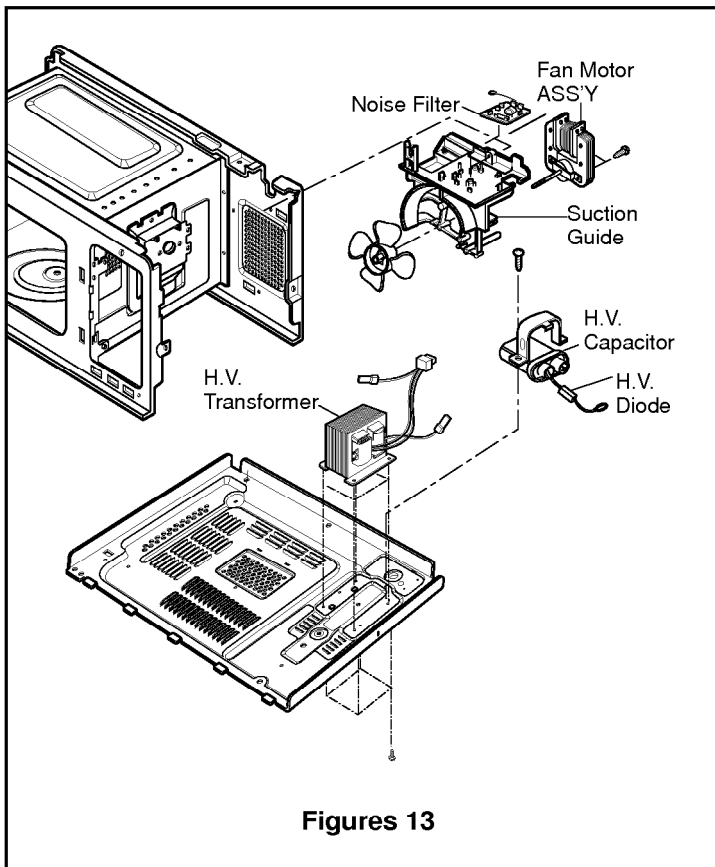
- 1) Discharge the high voltage capacitor.
- 2) Disconnect the leadwire from magnetron, high voltage transformer, and capacitor.
- 3) Remove the screw holding the high voltage transformer to the baseplate.

## G. FAN MOTOR ASSEMBLY REMOVAL

- 1) Discharge the high voltage capacitor.
- 2) Disconnect the leadwire from fan motor, noise filter and high voltage capacitor.
- 3) Remove the two screws holding the the suction guide ASSEMBLY to the oven cavity and remove the high voltage diode earth screw.
- 4) Remove the two screws holding the fan motor ASSEMBLY to the suction guide ASSEMBLY.

## H. HIGH VOLTAGE CAPACITOR AND DIODE REMOVAL

- 1) Discharge the high voltage capacitor.
- 2) Disconnect the leadwire from high voltage capacitor.
- 3) Remove the screw holding the high voltage capacitor bracket.



## I. INTERLOCK SYSTEM

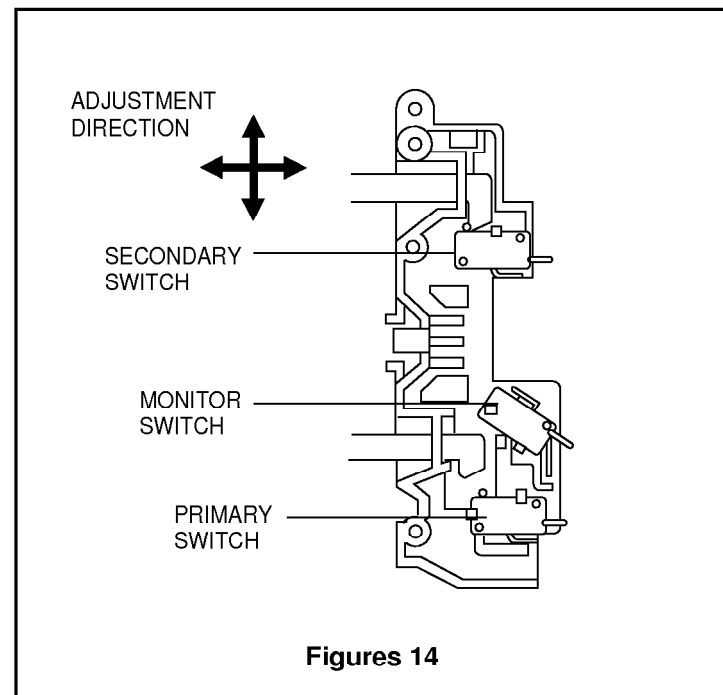
### 1) INTERLOCK MECHANISM

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

- 2) MOUNTING OF THE PRIMARY/MONITOR/SECONDARY SWITCHES TO THE LATCH BOARD
- 3) INSTALLATION AND ADJUSTMENT OF THE LATCH BOARD TO THE OVEN ASSEMBLY

- Mount the latch board to the oven assembly.
- Adjust the latch board in the arrow direction so that oven door will not have any play in it when the door is closed.
- Tighten the mounting screw.
- **Check for play in the door by pushing the door release button. Door movement should be less than 0.5 mm. (1/64 inch)**

Don't push the door release button while making this adjustment. Make sure that the latch moves smoothly after adjustment is completed and that the screws are tight. Make sure the primary, monitor, and secondary switches operate properly by following the continuity test procedure.



## 10. INTERLOCK CONTINUITY TEST

**WARNING : FOR CONTINUED PROTECTION AGAINST EXCESSIVE RADIATION EMISSION, REPLACE ONLY WITH IDENTICAL REPLACEMENT PARTS.**

TYPE NO. SZM-V 16-FA-63 OR VP-533A-OF FOR PRIMARY SWITCH  
TYPE NO. SZM-V 16-FA-62 OR VP-532A-OF FOR MONITOR SWITCH  
TYPE NO. SZM-V 16-FA-63 OR VP-533A-OF FOR SECONDARY SWITCH

### A. PRIMARY INTERLOCK SWITCH TEST

When the door release button is depressed slowly with the door closed, an audible **click** should be heard at the same time or successively at intervals. When the button is released slowly, the latches should activate the switches with an audible **click**.

If the latches do not activate the switches when the door is closed, the switches should be adjusted in accordance with the adjustment procedure. Disconnect the wire lead from the primary switch. Connect the ohmmeter leads to the common (COM) and normally open (NO) terminal of the switch. The meter should indicate an open circuit in the door open condition. When the door is closed, the meter should indicate a closed circuit.

When the primary switch operation is abnormal, make the necessary adjustment or replace the switch only with the same type of switch.

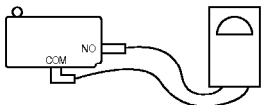


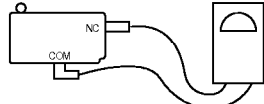


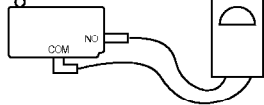


### B. SECONDARY INTERLOCK SWITCH TEST

Disconnect the wire lead from the secondary switch. Connect the ohmmeter leads to the common (COM) and normally open (NO) terminals of the switch. The meter should indicate a open circuit in the door open condition. When the door is closed, meter should indicate an closed circuit. When the secondary switch operation is abnormal, make the necessary adjustment or replace the switch only with the same type of switch.

### C. MONITOR SWITCH TEST

Disconnect the wire lead from the monitor switch. Connect the ohmmeter leads to the common (COM) and normally closed (NC) terminals of the switch. The meter should indicate closed circuit in the door open condition. When the door is closed, meter should indicate an open circuit. When the monitor switch operation is abnormal, replace with the same type of switch.

**NOTE:** After repairing the door or the interlock system, it is necessary to do this continuity test before operating the oven.

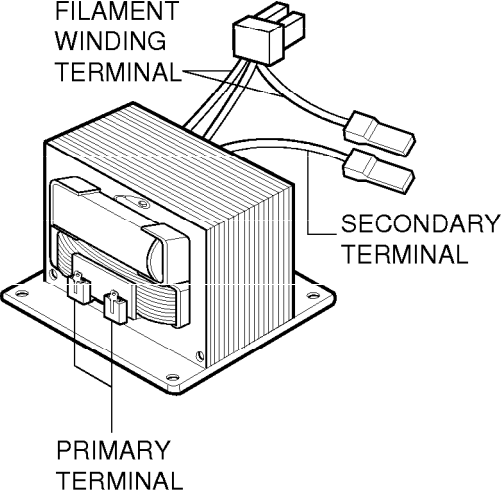
COMPONENTS	TEST PROCEDURE		RESULTS	
SWITCHES (Wire leads removed)	Check for continuity of the switch with an Ohm-meter		Door open	Door closed
	Primary Switch			
	Monitor Switch			
	Secondary Switch			
<p><b>NOTE :</b> After checking for the continuity of switches, make sure that they are connected correctly.</p>				

## 11. TEST AND CHECKOUT PROCEDURES, AND TROUBLESHOOTING

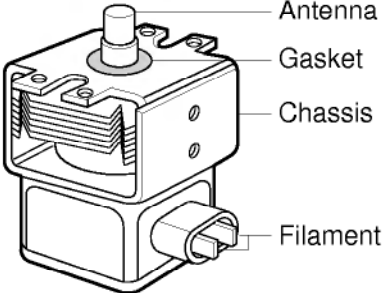
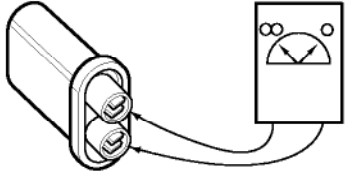
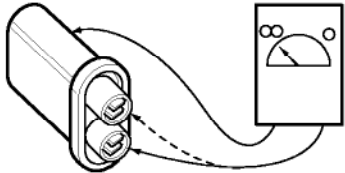
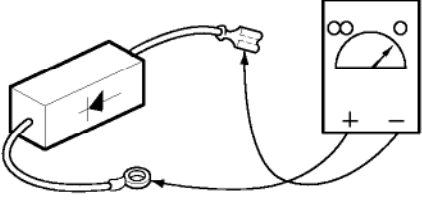
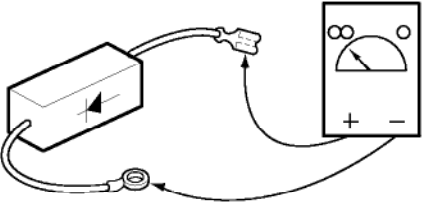
### CAUTIONS



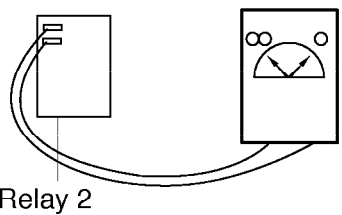
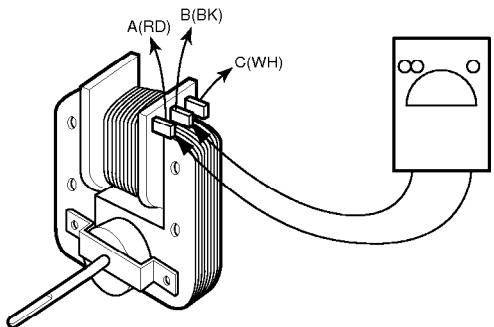
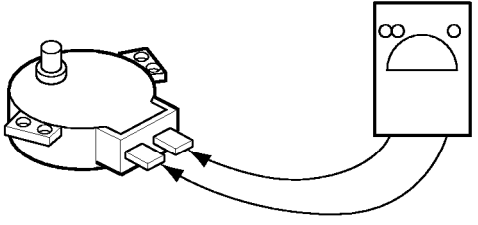
1. DISCONNECT THE POWER SUPPLY CORD FROM THE OUTLET WHENEVER REMOVING THE OUTER CASE FROM THE UNIT. PROCEED WITH THE TEST ONLY AFTER DISCHARGING THE HIGH VOLTAGE CAPACITOR AND REMOVING THE WIRE LEADS FROM THE PRIMARY WINDING OF THE HIGH VOLTAGE TRANSFORMER.
2. ALL OPERATIONAL CHECKS WITH MICROWAVE ENERGY MUST BE DONE WITH A LOAD (1 LITER OF WATER IN CONTAINER) IN THE OVEN.

### A. TEST PROCEDURES

COMPONENTS	TEST PROCEDURE	RESULTS
<p>HIGH VOLTAGE TRANSFORMER (Wire leads removed)</p>	 <p>1. Measure the resistance. (Ohm-meter scale: Rx1 and Rx100)</p> <ul style="list-style-type: none"> <li>• Primary winding</li> <li>• Secondary winding</li> <li>• Filament winding</li> </ul> <p>2. Measure the resistance. (Ohm-meter scale: Rx1000)</p> <ul style="list-style-type: none"> <li>• Primary winding to ground</li> <li>• Filament winding to ground</li> </ul>	<p>Approx.: 0.5 ~ 1.0 ohm Approx.: 100 ~ 200 ohm Less than: 1 ohm</p> <p>Normal: Infinite Normal: Infinite</p>
<p>MAGNETRON (Wire leads removed)</p>	<p>1. Measure the resistance. (Ohm-meter scale: Rx1)</p> <ul style="list-style-type: none"> <li>• Filament terminal</li> </ul> <p>2. Measure the resistance. (Ohm-meter scale: Rx1000)</p> <ul style="list-style-type: none"> <li>• Filament to chassis</li> </ul>	<p>Normal: Less than 1 ohm</p> <p>Normal: Infinite</p>



COMPONENTS	TEST PROCEDURE	RESULTS
	 <p>NOTE: When testing the magnetron, be sure to install the magnetron gasket in the correct position and be sure that the gasket is in good condition.</p>	
HIGH VOLTAGE CAPACITOR	<p>Measure the resistance. (Ohm-meter scale: Rx1000)</p> <ul style="list-style-type: none"> <li>Terminal to terminal.</li> </ul> 	Normal: Momentarily indicates several ohms, and then gradually returns to infinite.
	<p>Measure the resistance. (Ohm-meter scale: Rx1000)</p> <ul style="list-style-type: none"> <li>Terminal to case.</li> </ul> 	Normal: Infinite.
HIGH VOLTAGE DIODE	<p>Measure the continuity (Forward). (Ohm-meter scale: Rx10000)</p> 	Normal: Continuity. Abnormal: Infinite.
NOTE : Some inexpensive meters may indicate infinite resistance in both direction.	<p>Measure the continuity (Reverse). (Ohm-meter scale: Rx10000)</p> 	Normal: Infinite. Abnormal: Continuity.

COMPONENTS	TEST PROCEDURE	RESULTS																																
		POWER LEVEL																																
RELAY 2	<p>Check for continuity of relay 2 with an ohm-meter. (Remove wire leads from relay 2 and operate the unit.)</p>  <p>Relay 2</p>	<table border="1"> <tr><td>1</td><td>4 sec</td><td>18 sec</td></tr> <tr><td>2</td><td>6 sec</td><td>16 sec</td></tr> <tr><td>3</td><td>8 sec</td><td>14 sec</td></tr> <tr><td>4</td><td>10 sec</td><td>12 sec</td></tr> <tr><td>5</td><td>12 sec</td><td>10 sec</td></tr> <tr><td>6</td><td>14 sec</td><td>8 sec</td></tr> <tr><td>7</td><td>16 sec</td><td>6 sec</td></tr> <tr><td>8</td><td>18 sec</td><td>4 sec</td></tr> <tr><td>9</td><td>20 sec</td><td>2 sec</td></tr> <tr><td>10</td><td>22 sec</td><td>0 sec</td></tr> </table>	1	4 sec	18 sec	2	6 sec	16 sec	3	8 sec	14 sec	4	10 sec	12 sec	5	12 sec	10 sec	6	14 sec	8 sec	7	16 sec	6 sec	8	18 sec	4 sec	9	20 sec	2 sec	10	22 sec	0 sec		
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FAN MOTOR (Wire leads removed)	<p>Measure the resistance. (Ohm-meter scale: R x 100)</p> 	<p>Normal: Approx. 50 ~ 150 ohm Abnormal: Infinite or several ohm.</p>																																
TURNTABLE MOTOR (Wire leads removed)	<p>Measure the resistance. (Ohm-meter scale: R x 1000)</p> 	<p>Normal: Approx. 2 ~ 4K ohm Abnormal: Infinite or several ohm.</p>																																
<p>NOTE : • A MICROWAVE LEAKAGE TEST MUST ALWAYS BE PERFORMED WHEN THE UNIT IS SERVICED FOR ANY REASON.</p> <ul style="list-style-type: none"> <li>• MAKE SURE THE WIRE LEADS ARE IN THE CORRECT POSITION.</li> <li>• WHEN REMOVING THE WIRE LEADS FROM THE PARTS, BE SURE TO GRASP THE CONNECTOR, NOT THE WIRES.</li> </ul>																																		

**B. CHECKOUT PROCEDURES**

(1) CHECKOUT PROCEDURES FOR FUSE BLOWING

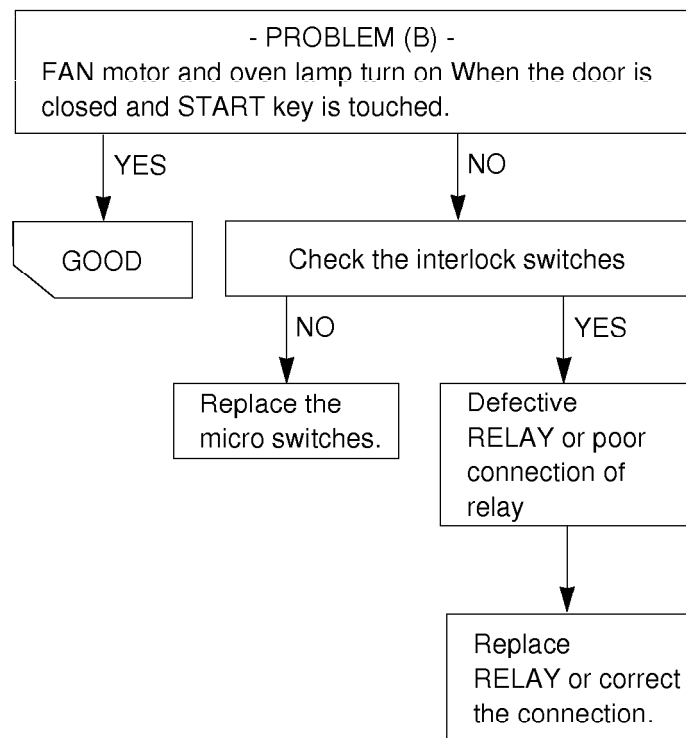
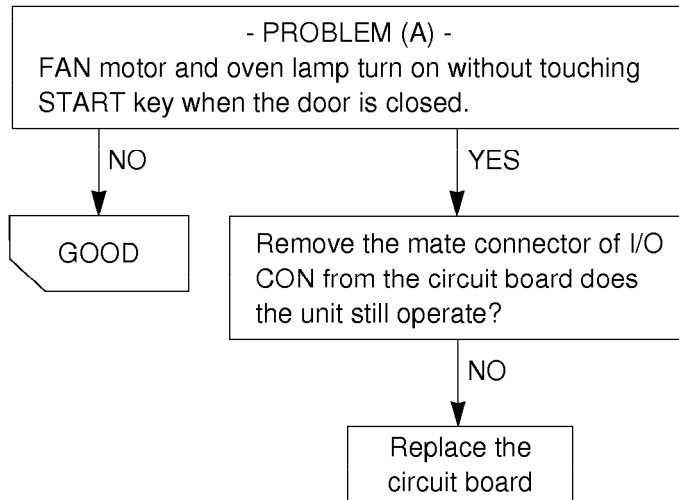
**CAUTION:** REPLACE BLOWN FUSE WITH 15 AMPERE FUSE.

PROBLEMS	CAUSES
Fuse blows immediately after the door is closed.	Improper operation of the primary interlock, secondary interlock switches and/or the interlock monitor switch.
Fuse blows immediately after the door is opened.	
Fuse blows when the door is closed and START key is touched.	Malfunction of the high voltage transformer; the high voltage capacitor including the diode, the magnetron, the blower motor or the circuit board.

**NOTES:**

- If the fuse is blown by an improper switch operation, replace the defective switches and the fuse at the same time. After replacing the defective switches with new ones, make sure that they are correctly connected.
- Check for microwave energy leakage according to "1. ADJUSTMENT PROCEDURES" on page 3, when the primary interlock, secondary interlock switches and/or the interlock monitor switches are adjusted or replaced.

(2) CHECKOUT PROCEDURES FOR RELAY



### (3) CHECKOUT PROCEDURES FOR CIRCUIT BOARD

The following symptoms indicate a defective circuit board.

- (1) The start function fails to operate but the high voltage Systems, the interlock switches, the door sensing and the relay check good.
- (2) The unit with a normal relay continuously operates.
- (3) The buzzer does not sound or continues to sound.
- (4) Some segments of one or more digits do not light up, or they continue to light up, or segments light when they should not.
- (6) Wrong figures appear.
- (7) The figures of all digits flicker.
- (8) Some of the indicators do no light up.
- (9) The clock does not keep time properly.

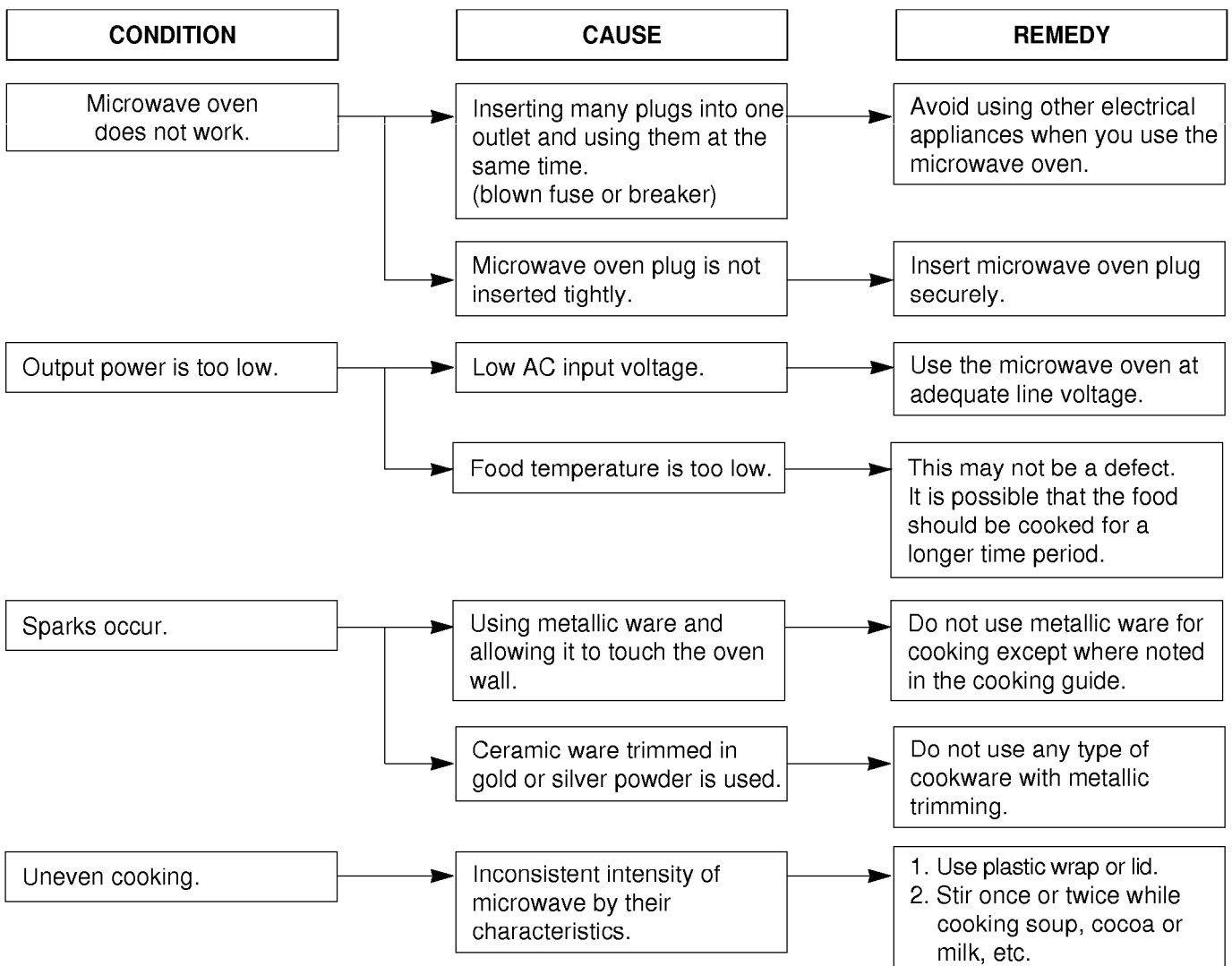
**NOTE:** A MICROWAVE ENERGY LEAKAGE TEST MUST ALWAYS BE PERFORMED WHEN THE UNIT IS SERVICED FOR ANY REASON.

### C. TROUBLE SHOOTING

WHEN YOU GET A COMPLAINT FROM YOUR CUSTOMER, EVALUATE THE COMPLAINT CAREFULLY. IF THE FOLLOWING SYMPTOMS APPLY, PLEASE INSTRUCT THE CUSTOMER IN THE PROPER USE OF THE MICROWAVE OVEN. THIS CAN ELIMINATE AN UNNECESSARY SERVICE CALL.

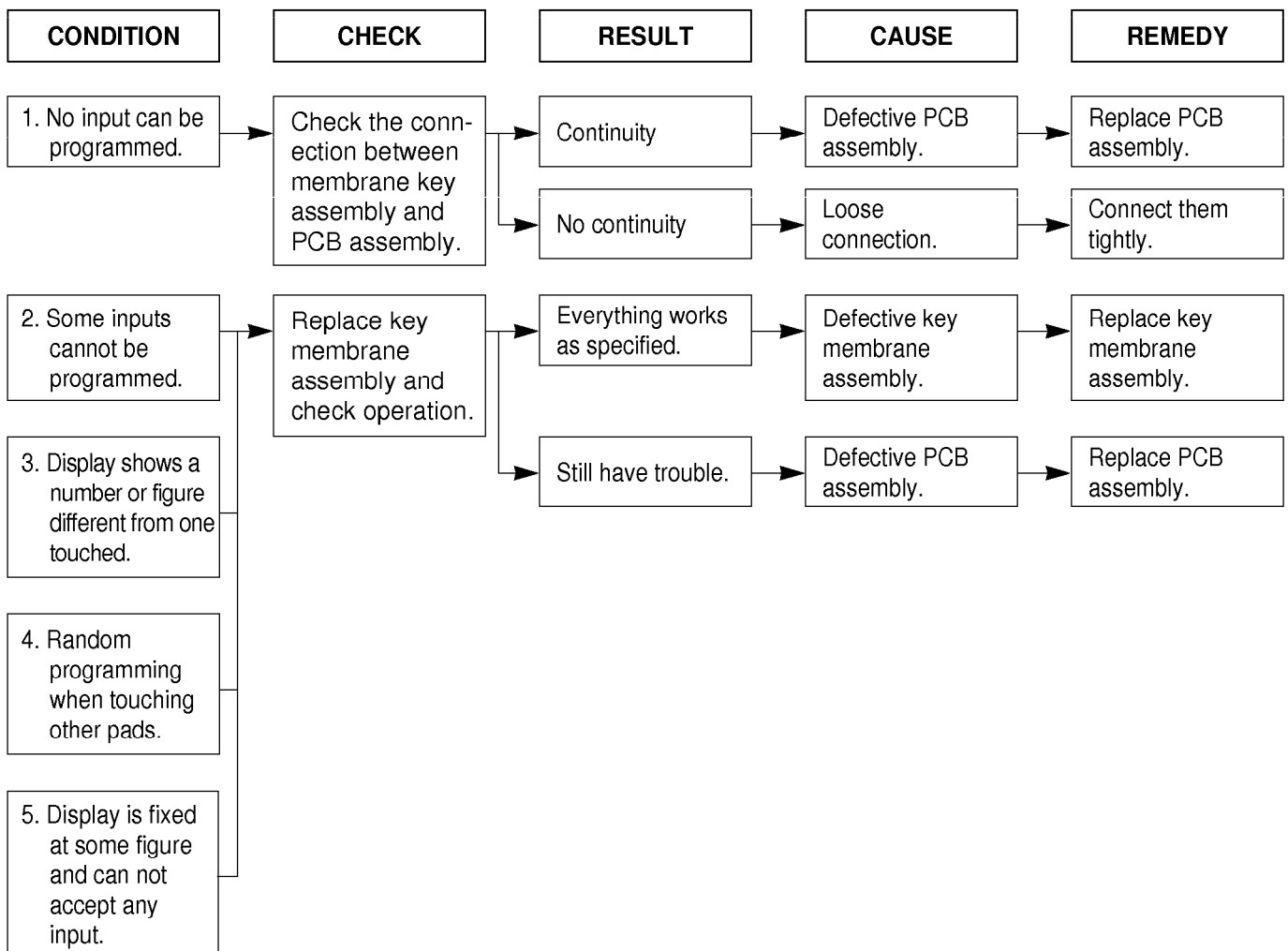
#### CAUTIONS

1. Check grounding before checking for trouble.
2. Be careful of the high voltage circuit.
3. Discharge the high voltage capacitor.
4. When checking the continuity of the switches or of the high voltage transformer, disconnect one lead wire from these parts and then check continuity with the AC plug removed. To do otherwise may result in a false reading or damage to your meter.
5. Do not touch any part of the circuit on the PCB since static electric discharge may damage this control panel.  
Always touch yourself to ground while working on this panel to discharge any static charge built up in your body. (Micom model only)

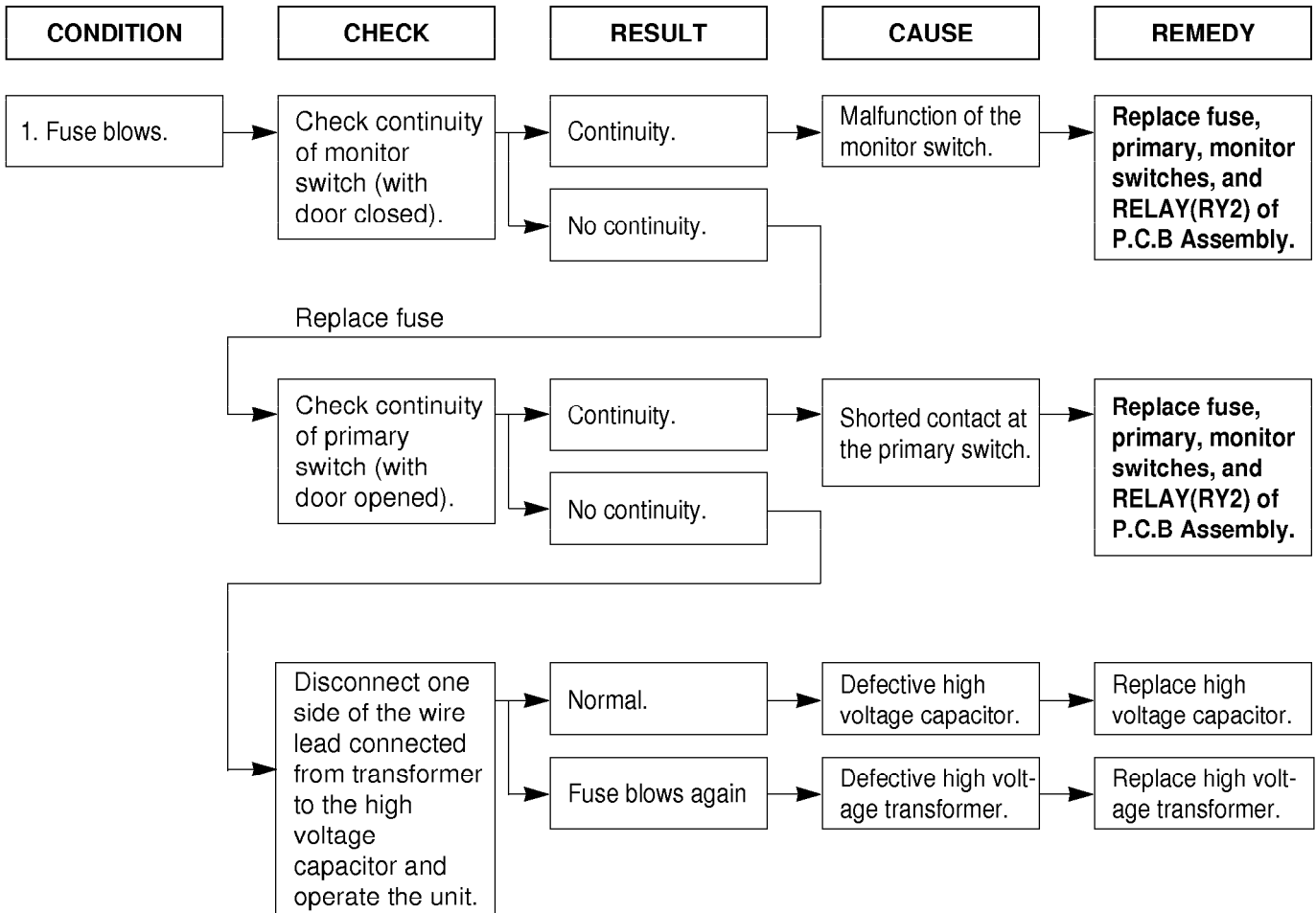


**(TROUBLE 1) The following visual conditions indicate a probable defective control circuit.**

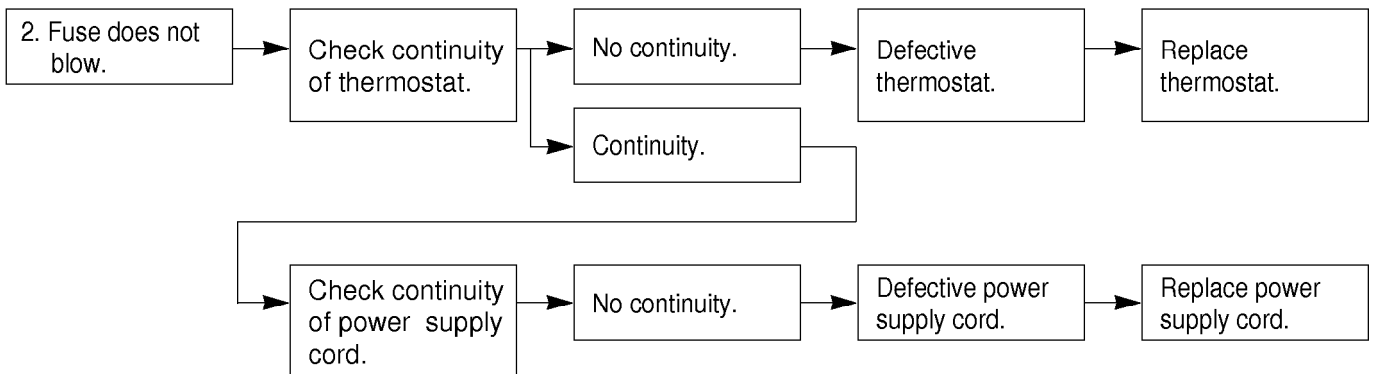
1. Incomplete segments.
  - Segment missing.
  - Partial segment missing.
  - Digit flickering (NOTE: Slight flickering is normal.)
2. Colon does not turn on or blink.
3. A distinct change in the brightness of one or more numbers in display.
4. One or more digits in the display are not lighting.
5. Display indicates a number different from one touched, for example, key in **5** and **3** appears in the display.
6. Specific numbers (for example 7 or 9) will not display when key pad is touched.
7. Display does not count down with time blinking or up with clock operation.
8. Display obviously jumps in time while counting down.
9. Display counts down too fast while cooking.
10. Each indicator light does not turn on after setting cooking cycle.
11. Display time of day does not reappear when cooking is finished.



**(TROUBLE 2) Oven does not operate at all, Display window does not display any figures, and no input is accepted.**



**NOTE :** All these switches must be replaced at the same time. Refer to page 17, 18





**(TROUBLE 3) Display shows all figures set, but oven does not start cooking while desired program times are set and START pad is touched.**

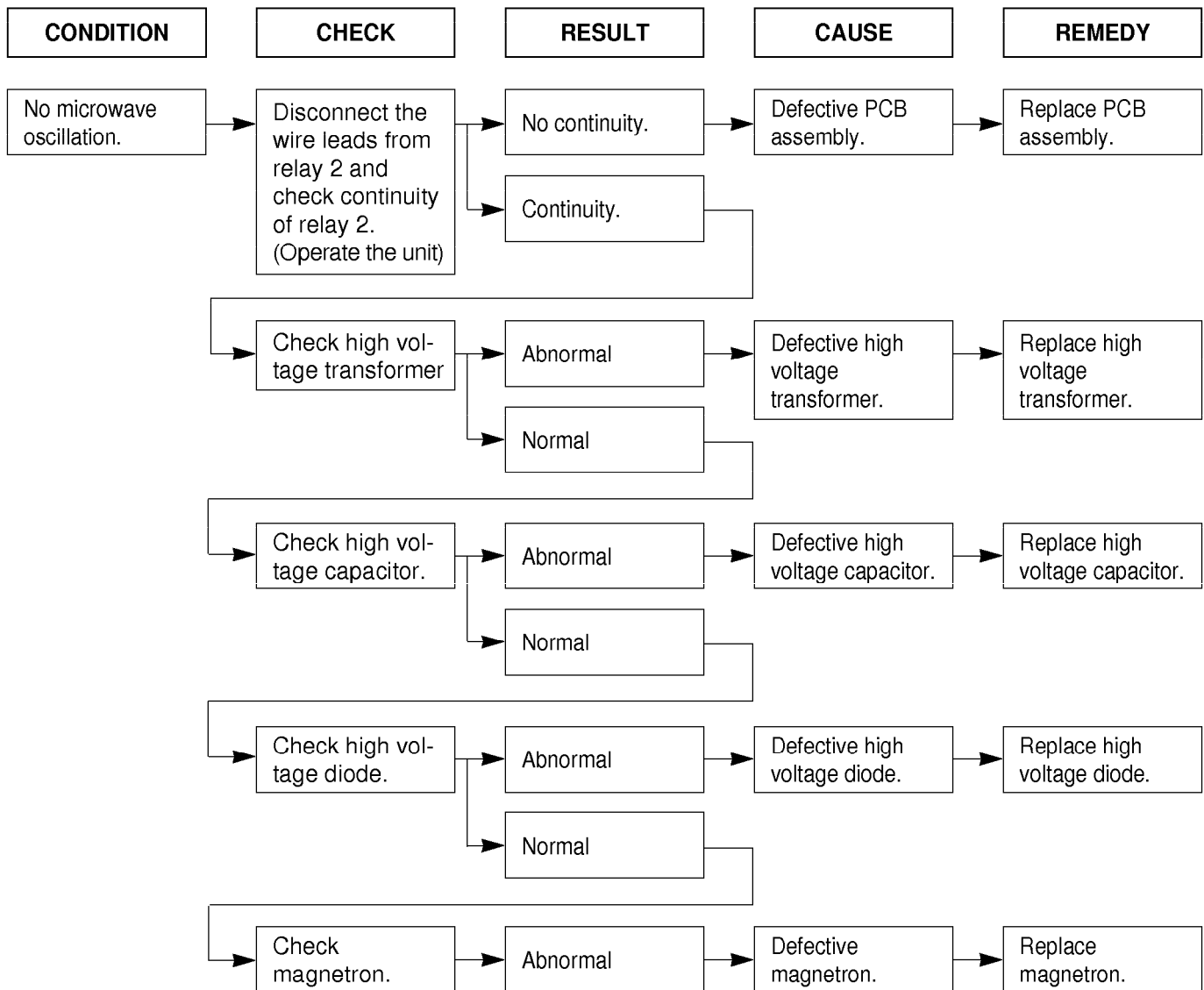
CONDITION	CHECK	RESULT	CAUSE	REMEDY
1. Setting time does not count down when touching START pad.	Check continuity of secondary switch (with door closed).	No continuity.	Defective secondary switch.	Replace secondary switch.
		Continuity.		
	Check the connection between CN1 connector and PCB assembly.	Continuity	Defective PCB assembly.	Replace PCB assembly.
		No continuity	Loose connection.	Connect them tightly.
2. Fan motor or oven lamp do not turn on.	Check fan motor.	Abnormal	Defective fan motor.	Replace fan motor.
	Check oven lamp.	Abnormal	Defective oven lamp.	Replace oven lamp.
		Normal		

**(TROUBLE 4) Oven seems to be operating but little heat is produced in oven load.**

CONDITION	CHECK	RESULT	CAUSE	REMEDY
Output is low	Check the power source voltage.	Lower than 90% of rating voltage.	Decrease in power source voltage with load.	Suggest customer contact local electric power utility co. or qualified electrician.
		Normal		
	Disconnect the wire leads from relay 2 and check on and off time with multimeter.	Abnormal	Defective PCB assembly.	Replace PCB assembly.
		Normal		
	Measure the output power.	Abnormal	Defective magnetron.	Replace magnetron.

**NOTE :** Simple test of power output-conducted by heating one liter water for one min. if available. Minimum 8.5°C temperature rise is normal condition.

**(TROUBLE 5) No microwave oscillation even though oven lamp and fan motor run.  
(Display operates properly)**



- NOTE :**
- Make sure the wire leads correct position.
  - When Removing the wire leads from the parts, be sure to grasp the connector, not the wires.
  - When removing the magnetron, be sure to install the magnetron gasket in the correct position and in good condition.

