

# OWNER'S MANUAL LIGHTWAVE CONVECTION

Please read this owner's manual thoroughly before operating.

MJ3281BCS



www.lg.com

microwave energy.

#### How the Microwave Function Works

Microwaves are a form of energy similar to radio, television waves, and ordinary daylight. Normally, microwaves spread outwards as they travel through the atmosphere and disappear without effect. This oven, however, has a magnetron that is designed to make use of the energy in microwaves. Electricity, supplied to the magnetron tube, is used to create

These microwaves enter the cooking area through openings inside the oven. A tray is located inside the oven. Microwaves cannot pass through metal walls of the oven, but they can penetrate such materials as glass, porcelain and paper, the materials out of which microwave-safe cooking dishes are constructed.

Microwaves do not heat cookware, though cooking vessels will eventually get hot from the heat generated by the food.

## A very safe appliance

Your Microwave oven, is one of the safest of all home appliances. When the door is opened, the oven automatically stops producing microwaves. Microwave energy is converted completely to heat when it enters food, leaving no "left over" energy to harm you when you eat your food.



When the oven is not used, it is recommended to unplug it from the electrical socket.

## CONTENTS

## 3 IMPORTANT SAFETY INSTRUCTIONS

## 8 BEFORE USE

- 8 Unpacking & Installing
- 9 Method To Use Accessories As Per Mode
- 10 Microwaveable-Safe Utensils
- 11 Control Panel
- 12 Setting The Clock
- 12 Turn Table On / Off
- 12 Child Lock
- 12 Quick Start

## 13 how to use

- 13 Microwave Power Cooking
- 13 Microwave Power Level
- 14 Grill Cooking
- 14 Grill Combi Cooking
- 15 Convection Preheat
- 15 Convection Cooking
- 16 Convection Combi Cooking
- 16 More Or Less Cooking
- 17 Chef Recipe And Guide
- 20 Active Convection And Guide
- 22 Grill Temp Control And Guide
- 24 Crispy Reheat And Guide
- 25 Steam Chef And Guide
- 27 Auto Defrost And Defrosting Guide

## 29 FOOD CHARACTERISTICS & MICROWAVE COOKING

- 31 QUESTIONS & ANSWERS
- 32 TEST DISHES IN ACCORDANCE WITH EN 60705
- 32 TECHNICAL SPECIFICATIONS
- 33 MAFF REHEATING COOKED CHILLED FOODS
- 34 TECHNOLOGY WITH THE HUMAN TOUCH GUARANTEE

## IMPORTANT SAFETY INSTRUCTIONS

Please keep for future reference. Read and follow all instructions before using your oven to prevent the risk of fire, electric shock, personal injury, or damage when using the oven.

This guide does not cover all possible conditions that may occur. Always contact your service agent or manufacturer about problems that you do not understand.



## WARNING

This is the safety alert symbol. This symbol alerts you to potential hazards that can kill or hurt you and others. All safety messages will follow the safety alert symbol and either the word "WARNING" or "CAUTION". These word means:



## WARNING

This symbol will alert you to hazards or unsafe practices which could cause serious bodily harm or death.



## **CAUTION**

This symbol will alert you to hazards or unsafe practices which could cause bodily injury or property damage.



## WARNING

- 1 Do not attempt to tamper with, or make any adjustments or repairs to the door, door seals, control panel, safety interlock switches or any other part of the oven which would involve the removal of any cover protecting against exposure to of the microwave oven are faulty. Repairs should only be undertaken by a qualified service technician.
- Unlike other appliances, the microwave oven is a high-voltage and a high-electrical-current piece of equipment. Improper use or repair could result in harmful exposure to excessive microwave energy or in electric shock.
- 2 Do not use the oven for the purpose of dehumidification, (ex. Operating the microwave oven with wet newspapers, clothes, toys, electric devices, pet or child etc.)
- It can be the cause of serious damage to safety such as a fire, a burn or a sudden death due to an electric shock.
- 3 This appliance can be used by children aged from 8 years and above and persons with reduced physical, sensory or mental capabilities or lack of experience and knowledge if they have been given supervision or instruction concerning use of the appliance in a safe way and understand the hazards involved.
- Improper use may cause damage such as a fire, electric shock or burn.
- 4 Accessible parts may become hot during use. Young children should be kept away.
- They may get a burn.
- 5 Liquids or other foods must not be heated in sealed containers since they are liable to explode. Remove the plastic wrapping from food before cooking or defrosting. Note though that in some cases food should be covered with plastic film, for heating or cooking.
- · They could burst.
- 6 Be certain to use proper accessories on each operation mode, refer to the guide page 12.
- Improper use could result in damage to your oven and accessories, or could make spark and a fire.
- 7 The children should not allow to play with accessories or hang down from the door handle.
- They may get hurt.
- 8 If the door or door seals are damaged, the oven must not be operated until it has been repaired by a competent person.

- **9** It is hazardous for anyone other than a competent person to carry out any service or repair operation that involves the removal of a cover which gives protection against exposure to microwave energy.
- 10 When the appliance is operated in the combination mode, children should only use the oven under adult supervision due to the temperatures generated.
- 11 The appliance and its accessible parts become hot during use. Care should be taken to avoid touching heating elements. Children less than 8 years of age shall be kept away unless continuously supervised.

## **⚠** CAUTION

- 1 You cannot operate your oven with the door open due to the safety interlocks built into the door mechanism. It is important not to tamper with the safety interlocks.
- It could result in harmful exposure to excessive microwave energy. (Safety interlocks automatically switch off any cooking activity when the door is opened.)
- 2 Do not place any object (such as kitchen towels, napkins, etc.) between the oven front face and the door or allow food or cleaner residue to accumulate on sealing surfaces.
- It could result in harmful exposure to excessive microwave energy.
- 3 Do not operate your oven if it is damaged. It is particularly important that the oven door closes properly and that there is no damage to the: (1) door(bent), (2) hinges and latches (broken or loosened), (3) door seals and sealing surfaces.
- It could result in harmful exposure to excessive microwave energy.
- 4 Please ensure cooking times are correctly set, Small amounts of food require shorter cooking or heating time.

Over cooking may result in the food catching on fire and subsequent damage to your oven.

- 5 When heating liquids, e.g. soups, sauces and beverages in your microwave oven,
  - \* Avoid using straight sided containers with narrow necks.
  - \* Do not overheat.
  - \* Stir the liquid before placing the container in the oven and again halfway through the heating time.
  - \* After heating, let it stand in the oven for a short time; stir or shake it again carefully and check the temperature of it before consuming to avoid burns (especially, contents of feeding bottles and baby food jars).
  - \* Microwave heating of beverages can result in delayed eruptive boiling, therefore care has to be taken when handling the container.
- 6 An exhaust outlet is located on the top, bottom or side of the oven.

Don't block the outlet.

- It could result in damage to your oven and poor cooking results.
- 7 Do not operate the oven when empty. It is best to leave a glass of water in the oven when not in use. The water will safely absorb all microwave energy, if the oven is accidentally started.
- Improper use could result in damage to your oven.
- 8 Do not cook food wrapped in paper towels, unless your cook book contains instructions for the food you are cooking. And do not use newspaper in place of paper towels for cooking.

- Improper use can cause an explosion or a fire.
- 9 Do not use wooden containers and ceramic containers that have metallic (e.g. gold or silver) inlays. Always remove metal twist ties. Check that the utensils are suitable for use in microwave ovens before use.

Metallic containers for food and beverages are not allowed during microwave cooking.

- They may heat-up and char. Metal objects in particular may arc in the oven, which can cause serious damage.
- 10 Do not use recycled paper products.
  - They may contain impurities which may cause sparks and/or fires when used in cooking.
- 11 Do not rinse the tray and rack by placing it in water just after cooking. This may cause breakage or damage.
  - Improper use could result in damage to your oven.
- 12 Be certain to place the oven so the front of the door is 8 cm or more behind the edge of the surface on which it is placed, to avoid accidental tipping of the appliance.
  - Improper use could result in bodily injury and oven damage.
- 13 Before cooking, pierce the skin of potatoes, apples or any such fruit or vegetable.
  - They could burst.
- 14 Do not cook eggs in their shell. Eggs in their shell and whole hardboiled eggs should not be heated in microwave ovens since they may explode, even after microwave heating has ended.
  - Pressure will build up inside the egg which will burst.
- 15 Do not attempt deep fat frying in your oven.
  - This could result in a sudden boil over of the hot liquid.
- 16 If smoke is observed (or emitted), switch off or unplug the appliance and keep the door closed in order to stifle any flame.
  - It can cause serious damage such as a fire or electric shock.
- 17 When food is heated or cooked in disposable containers made of plastic, paper or other combustible materials, keep an eye on the oven and check it frequently.
  - Your food may be poured due to the possibility of container deterioration, which also can cause a fire.
- 18 The temperature of accessible surfaces may be high when the appliance is operating. Do not touch the oven door, outer cabinet, rear cabinet, oven cavity, accessories and dishes during grill mode, convection mode and auto cook operations, before clearing make sure they are not hot.
  - As they will become hot, there is the danger of a burn unless wearing thick culinary gloves .
- 19 The oven should be cleaned regularly and any food deposits should be removed.
  - Failure to maintain the oven in a clean condition could lead to deterioration of the surface that could adversely affect the life of the appliance and possibly result in a hazardous situation.
- 20 Only use the temperature probe recommended for this oven.
  - You can not ascertain that the temperature is accurate with an unsuitable temperature probe.
- 21 If there are heating elements, the appliance becomes hot during use. Care should be taken to avoid touching the heating elements inside the oven.
  - There is danger of a burn.
- 22 Follow exact directions given by each manufacturer for their popcorn product. Do not leave the

oven unattended while the corn is being popped. If corn fails to pop after the suggested times, discontinue cooking. Never use a brown paper bag for popping corn. Never attempt to pop leftover kernels.

- Overcooking could result in the corn catching a fire.
- 23 This appliance must be earthed.

The wires in the mains lead are colored in accordance with the

following codes

BLUE - Neutral

**BROWN** - Live

GREEN & YELLOW - Earth

As the colours of the wires in the mains lead of this appliance may not correspond with the coloured markings identifying the terminals in your plug proceed as follows:

The wire which is colored BLUE must be connected to the terminal which is marked with the letter N or Colored BLACK. The wire which is colored BROWN must be connected to the terminal which is marked with the letter L or colored RED. The wire which is colored GREEN & YELLOW or GREEN must be connected to the terminal which is marked with the letter E or  $\frac{1}{2}$ .

If the supply cord is damaged, it must be replaced by the manufacturer, a service agent or a similarly qualified person in order to avoid potential hazards.

- Improper use may cause serious electric damage.
- 24 Do not use harsh abrasive cleaners or sharp metal scrapers to clean the oven door glass.
  - They can scratch the surface, which may result in the glass shattering.
- 25 This oven should not be used for commercial catering purposes.
  - Improper use could result in damage to your oven.
- 26 The connection may be achieved by having the plug accessible or by incorporating a switch in the fixed wiring in accordance with the wiring rules.
  - Using improper plug or switch can cause an electric shock or a fire.
- 27 Children shall not play with the appliance. Cleaning and user maintenance shall not be made by children without supervision.
- 28 The devices are not intended to be operated by an external timer or by a separate control.
- 29 Only use utensils that are suitable for use in microwave ovens.
- 30 This microwave oven must not be placed in a cabinet.
- 31 The microwave oven is intended to be used freestanding.
- 32 This appliance is intended to be used in household and similar applications such as
  - staff kitchen areas in shops, offices and other working environments
  - farm houses
  - by clients in hotels, motels and other residential environments
  - bed and breakfast type environments
- 33 The microwave oven is intended for heating food and beverages.

Drying of food or clothing and heating of warming pads, slippers, sponges, damp cloth and similar may lead to risk of injury, ignition or fire.

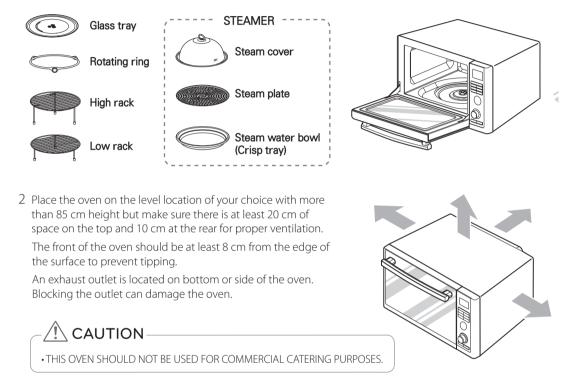
- 34 The contents of feeding bottles and baby food jars are to be stirred or shaken and the temperature is to be checked before consumption, in order to avoid burns.
- 35 The appliance must not be installed behind a decorative door in order to avoid overheating.
- 36 According to the installation requirements set, otherwise the impact of heat, prone to danger.
- 37 If the supplied flexible mains cord of this appliance is damaged, it must be replaced using the special mains cord part number: 6411W1A017Y This appliance is supplied with BS 1363 approved 13 Amp fused mains plug. When replacing the fuse always use a 13 Amp BS 1362 approved type. Never use this plug with the fuse cover omitted. To obtain a replacement fuse cover contact your supplying dealer or LG Electronics U.K. LTD.
  - If the mains sockets in your home differ, or are not suitable for the type of plug supplied then the plug should be removed and a suitable type fitted.
  - If the mains plug becomes severed from the mains lead it must be destroyed. A mains plug with bar ed wires is hazardous if engaged in a mains output line socket.
  - If a 13 Amp BS 1363 plug is not suitable or any other type of plug used, then this appliance must be protected by a 13 Amp fuse.
  - Improper use may cause serious damage of safety such as a fire, an electric shock.

## **BEFORE USE**

## **Unpacking & Installing**

By following the basic steps on these two pages you will be able to quickly check that your oven is operating correctly. Please pay particular attention to the guidelines on where to install your oven. When unpacking your oven make sure you remove all accessories and packing materials. Check to make sure that your oven has not been damaged during shipping.

1 Unpack your oven and place it on a flat level surface.



- 3 Plug your oven into a standard household socket. Make sure your oven is the only appliance connected to the socket. **If your oven does not operate properly, unplug it from the electrical socket and then plug it back in.**
- 4 Open your oven door by pulling the door handle. Place the rotating ring inside the oven and place the glass tray on top.
- 5 Fill a microwaveable-safe container with 300 ml (1/2 pint) of water. Place on the glass tray and close the oven door. If you have any doubts about what type of container to use please refer to Page 10.



6 Press the **STOP/CLEAR** button, and press the **START/QUICK START** button once to set 30 seconds of cooking time.



7 The DISPLAY will count down from 30 seconds. When it reaches 0 it will sound BEEPS. Open the oven door and test the temperature of the water. If your oven is operating the water should be warm. Be careful when removing the container it may be hot.



## YOUR OVEN IS NOW INSTALLED

8 The contents of feeding bottles and baby food jars shall be stirred or shaken and the temperature checked before consumption in order to avoid burns.

## Method To Use Accessories As Per Mode

	Microwave	Grill	Convection	Grill combi	Conv combi
Steamer	0	_	_	_	_
High rack	_	0	0	0	0
Low rack	_	0	0	0	0
Glass tray	0	0	0	0	0
Crisp tray	0	0	0	0	0

Caution: Use accessories in accordance with cooking guides!

O Acceptable

Not Acceptable

## Microwaveable-Safe Utensils

## Never use metal or metal trimmed utensils when using microwave function

Microwaves cannot penetrate metal. They will bounce off any metal object in the oven and cause arcing, an alarming phenomenon that resembles lightning. Most heat resistant non metallic cooking utensils are safe for use in your oven. However, some may contain materials that render them unsuitable as microwave cookware. If you have any doubts about a particular utensil, there's a simple way to find out if it can be used in the microwave. Place the utensil in question next to a glass bowl filled with water when using microwave function. Microwave at power HIGH for 1 minute. If the water heats up but the utensil remains cool to the touch, the utensil is microwave-safe. However, if the water does not change temperature but the utensil becomes warm, microwaves are being absorbed by the utensil and it is not safe for use when using microwave function. You probably have many items on hand in your kitchen right now that can be used as cooking equipment in the microwave. Just read through the following checklist.

#### Dinner plates

Many kinds of dinnerware are microwave-safe. If in doubt consult the manufacturer's literature or perform the microwave test

## Glassware

Glassware that is heat-resistant is microwave-safe. This would include all brands of oven tempered glass cookware. However, do not use delicate glassware, such as tumblers or wine glasses, as these might shatter as the food warms.

#### Plastic storage containers

These can be used to hold foods that are to be quickly reheated. However, they should not be used to hold foods that will need considerable time in the oven as hot foods will eventually warp or melt plastic containers.

## Paper

Paper plates and containers are convenient and safe to use when using microwave function, provided that the cooking time is short and foods to be cooked are low in fat and moisture. Paper towels are also very useful for wrapping foods and for lining baking trays in which greasy foods such as bacon are cooked. In general, avoid coloured paper products as the colour may run. Some recycled paper products may contain impurities which could cause arcing or fires when used in the microwave.

#### Plastic cooking bags

Provided they are made specially for cooking, cooking bags are microwave safe. However, be sure to make a slit in the bag so that steam can escape. Never use ordinary plastic bags for cooking in using microwave function, as they will melt and rupture.

#### Plastic microwave cookware

A variety of shapes and sizes of microwave cookware are available. For the most part, you can probably use items you already have on hand rather than investing in new kitchen equipment.

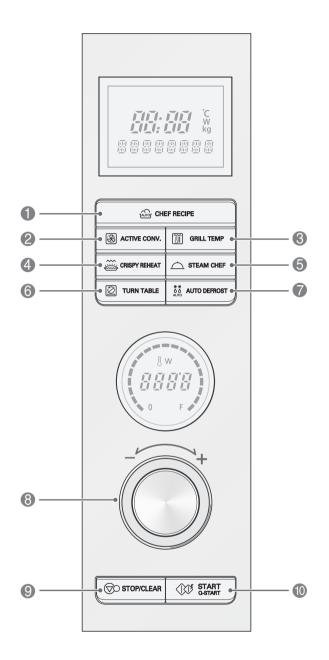
#### Pottery, stoneware and ceramic

Containers made of these materials are usually fine for use when using microwave function, but they should be tested to be sure.



- Some items with high lead or iron content are not suitable as cooking utensils.
- Utensils should be checked to ensure that they are suitable for use in the microwave.

## Control Panel



## Part

## **1** CHEF RECIPE

Chef Recipe allows you to cook most of your favourite food by selecting the food type and the weight of the food. See page 17 "Chef recipe"

## ACTIVE CONVECTION

See page 20 "Active convection"

## GRILL TEMP CONTROL

See page 22 "Grill temp control"

## CRISPY REHEAT

See page 24 "Crispy reheat"

## STEAM CHEF

See page 25 "Steam chef"

## **(6)** TURN TABLE ON/OFF

You can select turn table on or off.

## **7** AUTO DEFROST

See page 27 "Auto defrost"

## COOK MODE

- · Determine the selected cooking category.
- Set cooking times, temperature and power level.
- While cooking with auto and manual function, you can increase or decrease the cooking time at any point by turning the dial (except defrost mode).

## STOP/CLEAR

• Stop over and clear all entries except time of day.

#### **10** START/QUICK START

- In order to start cooking what is selected, press button once.
- The guick start feature allows you to set 30 second intervals of HIGH power cooking with a touch of the quick start button.

## **Setting The Clock**

You can set either 12 hour clock or 24 hour clock. The following example will show you how to set the time for 14:35 when using the 24 clock.

1 Plug your oven for the first time.

"24H "appears on the display.

Press START/QUICK START for 24 clock confirmation.

(If you want to change a different option after setting clock, you have to unplug and plug it back in.)



2 Turn **COOK MODE** until display shows "14:00". Press START/QUICK START for confirmation.





3 Turn COOK MODE until display shows "14:35". Press START/QUICK START.

The clock starts counting.







## NOTE

- · When your oven is plugged in for the first time you will have to reset the clock.
- If the clock (or display) shows any strange looking symbols, unplug your oven from the electrical socket and plug it back in and reset the clock.

## Turn Table On/Off

For best cooking results, leave the turn table be on. It can be turned off for large dishes. Press " (2) " to turn the turn table on or off.



## NOTE-

- Sometimes the turn table can become hot to touch. Be careful touching the turn table during and after
- · Do not run an empty microwave.

## Child Lock

The following example will show you how to set the child lock.

1 Press **STOP/CLEAR**.



2 Press and hold **STOP/CLEAR** until "CHILD LOCKED" and " appears on the display and BEEP sounds.

The **CHILD LOCK** is now set.

If any button is pressed, "CHILD LOCKED" and "" will appear on the display.



3 To cancel **CHILD LOCK** press and hold STOP/CLEAR until "CHILD LOCKED" disappears.

You will hear BEEP when it's unlocked.





## NOTE

Your oven has a safety feature that prevents accidental running of the oven.

Once the child lock is set, you will be unable to use any functions and no cooking can take place.

## **Quick Start**

The following example will show you how to set 2 minutes of cooking on high power (900W).

1 Press **STOP/CLEAR**.



2 Press **START/QUICK START** four times to select 2 minutes on high power (900W).

Your oven will start before you have finished the fourth press.



3 During **START/QUICK START** cooking, you can extend the cooking time up to 99 minutes 59 second by turning the COOK MODE dial.





## NOTE

The **START/QUICK START** feature allows you to set 30 second intervals of HIGH power (900W) cooking by pressing the **START/QUICK START** button.

## **HOW TO USE**

## Microwave Power Cooking

The following example will show you how to cook some food on 720W power for 5 minutes.

1 Press **STOP/CLEAR**.



2 Turn COOK MODE to select Microwave. Press **START/QUICK START** for mode confirmation.





3 Turn **COOK MODE** until display shows "720 W". Press START/QUICK START for power confirmation.





4 Turn **COOK MODE** until display shows "5:00". Press START/QUICK START.







- Your oven has 5 microwave power settings. High power is automatically selected and turning off **COOK MODE** will select a different power level.
- Food to be cooked should be placed in a microwaveable-safe utensil.
- Please do not use the following accessories.





High rack

Low rack

## Microwave Power Level

This oven is equipped with 5 power levels to give you maximum flexibility and control over cooking. The table below shows some examples of food and their recommended cooking power levels for use with this oven.

POWER LEVEL	OUTPUT	USE	ACCESSORY
• Boil water • Brown minced beef • Cook poultry pieces, fish, vegetables • Cook tender cuts of meat			
MED-HIGH 720 W :		All reheating     Roast meat and poultry     Cook mushrooms and shellfish     Cook foods containing cheese and eggs	
MED  • Bake cakes and scones • Prepare eggs • Cook custard • Prepare rice, soup		Prepare eggs     Cook custard	Microwaveable-safe plate
MHD-I ()VV   360 W		Melt butter and chocolate     Cook less tender cuts of meat	
LOW	180 W	Soften butter & cheese     Soften ice cream     Raise yeast-based dough     All thawing	

The following example will show you how to use the grill to cook food for 12 minutes.

1 Press STOP/CLEAR.



2 Turn COOK MODE to select Grill.

The following indication is displayed: " \*\*\* ".

Press **START/QUICK START** for grill confirmation.





3 Turn **COOK MODE** until display shows "12:00".



4 Press **START/QUICK START.** 





## **CAUTION**

Always use gloves when removing food and accessories after cooking as the oven & accessories will be very hot.



## NOTE-

- This feature will allow you to brown and get food crisper more quickly.
- For the best result, use the following accessory.

the following accessory.

• Please do not use





Steamer

## **Grill Combi Cooking**

The following example will show you how to programme your oven with microwave power 360W and grill for a cooking time of 25 minutes.

1 Press **STOP/CLEAR**.



2 Turn COOK MODE to select Grill Combi.

The following indications are displayed: "\$\sim "" \times ". Press START/QUICK START for grill combi confirmation.





3 Turn **COOK MODE** until display shows "360 W". Press START/QUICK START for power confirmation.





4 Turn **COOK MODE** until display shows "25:00".



5 Press **START/QUICK START.** 





## NOTE

· Your oven has a combination cooking feature which allows you to cook food with **Heater** and

## Microwave.

This generally means it takes less time to cook your food.

- You can set three kinds of microwave power level (180W, 270W, and 360W) in grill combi mode.
- This feature will allow you to brown and get food crisper more quickly.
- For the best result use the following accessory.



 Please do not use the following accessory.



Steamer

## Convection Preheat

The following example shows you how to preheat the oven to a temperature of 200° C.

1 Press STOP/CLEAR.



2 Turn COOK MODE to select Conv. The following indication is displayed: " 🏖 ". Press START/QUICK START for convection confirmation.





3 Turn **COOK MODE** until display shows "200° C". Press START/QUICK START for temperature confirmation.





4 Press START/QUICK START.

Preheating will be started with the display "PREHEAT".





- The convection oven has a temperature range of 40° C and 100~230° C.
- The oven has a ferment function at the oven temperature of 40° C. You should wait until the oven is cool because you cannot use a ferment function if the oven temperature is over 40° C.
- · Your oven will take a few minutes to reach the selected temperature.
- · Once it has reached correct temperature, your oven will BEEP to let you know that it has reached the correct temperature.
- Then place your food in your oven and to start cooking.

## **Convection Cooking**

The following example shows you how to cook some food at a temperature of 230° C for 50 minutes.

1 Press **STOP/CLEAR**.



2 Turn COOK MODE to select Conv. The following indication is displayed: " \& ". Press START/QUICK START for convection confirmation.





3 Turn **COOK MODE** until display shows "230° C". Press **START/QUICK START** for temperature confirmation.





4 Turn COOK MODE until display shows "50:00".



5 Press **START/QUICK START.** 





## **CAUTION**

Always use gloves when removing food and accessories after cooking as the oven & accessories will be very hot.



## NOTE

If you do not set a temperature your oven will automatically select 180° C, the cooking temperature can be changed by turning **COOK** MODE.

For the best result please use the following accessory.



## **Convection Combi Cooking**

The following example shows you how to programme your oven with the microwave power 270W and at a convection temperature of 200° C for a cooking time of 25 minutes.

1 Press **STOP/CLEAR**.



2 Turn COOK MODE to select Conv. Combi.

The following indications are displayed: " $\lesssim$ ", " $\otimes$ ".

Press START/QUICK START for Convection Combi confirmation





3 Turn COOK MODE until display shows "270 W". Press START/QUICK START for power confirmation.





4 Turn **COOK MODE** until display shows "200° C". Press START/QUICK START for temperature confirmation.





5 Turn **COOK MODE** until display shows "25:00".



6 Press START/QUICK START.





## **CAUTION**

Always use gloves when removing food and accessories after cooking as the oven & accessories will be very hot.



#### NOTE-

You can set three kinds of microwave power level (180W, 270W and 360W).

• For the best result use the following accessory.



• Please do not use the following accessory.



## Steamer

## More Or Less Cooking

The following example shows you how to change the COOK programmes for a longer or shorter cooking time.

1 Press **STOP/CLEAR**.



2 Set the required preset **COOK** programme. Select weight of food.



3 Press START/QUICK START.

Turn COOK MODE.

The cooking time will increase or decrease.







## NOTE

- If you find that your food is over or undercooked when using the preset COOK programme, you can increase or decrease cooking time by turning the COOK MODE.
- · You can lengthen or shorten the cooking time (except defrost mode) at any point by turning the COOK MODE.

## Chef Recipe

The following example will show you how to cook 0.6 kg of roast beef.

1 Press **STOP/CLEAR**.



2 Press CHFF RECIPE.

The following indication is displayed: "auto".



3 Turn **COOK MODE** until display shows "4 ROAST BEEF".

Press **START/QUICK START** for category confirmation.





4 Turn **COOK MODE** until display shows "0.6 kg". Press START/QUICK START.

When cooking you can increase or decrease cooking time by turning COOK MODE.









- · Chef Recipe menus are programmed.
- Chef Recipe allows you to cook most of your favourite food by selecting the food type and the weight of the food.

## Chef Recipe Guide

## Category Instructions 1. Quiche lorraine Ingredients 1 shortcrust pastry dough \ 125 q smoked slab bacon, grated - Food Temp.: Room 1 tablespoons oil \ 2 eags, lightly beaten \ 125 a milk - Utensil: Crisp tray on the low rack 125 g cream \ Nutmeg, salt and pepper to taste 100 g grated cheese 1. On lightly floured surface, roll out pastry into circle and put in the crisp tray. Trim edges, leaving little overhang. Prick with fork and set aside. 2. Cook bacon in lightly oiled frying pan until lightly browned and drain away excess fat. 3. Mix eggs, milk, cream, nutmeg, salt and pepper. 4. Spread grated cheese evenly onto dough. 5. Pour egg-cream mixture on top then place the crisp tray on the low rack. Choose the menu, press start.

## Chef Recipe Guide

Category	Instructions				
2. Rice/Pasta	Ingredients for rice				
- Weight Limit : 0.1~0.3 kg	Rice	100 g	200 g	300 g	
- Food Temp. : Room	Butter, melted	30 g	40 g	50 g	
- Utensil : Microwaveable-safe bowl	Onion,grated	50 g	75 g	100 g	
(deep glass pot)	Chicken stock or wat	er 250 ml	500 ml	750 ml	
	Bouquet garni and s	alt	To taste		
	Add rice and melted be Pour boiling chicken s Cover and vent with w	tock or wate			
	Place the bowl in the o				
	Ingredients for pasta				
	-	00 g 200	) g 30	) g	
	Water 40	10 ml 800	ml 120	) ml	
	Salt	To to	iste		
	Place pasta and boiling water with salt in a deep and large bowl(3 L). Place the bowl in the oven. Choose the menu and weight, press start. After cooking, stand for 1~2 minutes. Rinse pasta with cold water.				
<ul><li>3. Chocolate cake</li><li>- Food Temp.: Room</li><li>- Utensil: 23 x 13 cm Loaf pan on the low rack</li></ul>	Ingredients 70 g yoghurt \ 50 g raisin seed oil \ 170 g sugar 110 g Maïzena \ 50 g cocoa powder 1 teaspoon baking powder \ 3 eggs, lightly beaten 1/4 teaspoon salt				
	Mix yoghurt and sugar in a large mixing bowl. Add Maïzena, cocoa powder, baking powder, salt and mix.  Then add eggs and oil and mix until moistened.  Pour batter into a greased loaf pan. Place loaf pan on the low rack.  Choose the menu, press start.  After cooking, remove from the oven and let them cool.				
4. Roast beef  - Weight Limit: 0.5~2.0 kg  - Food Temp.: Refrigerated  - Utensil: Low rack on a drip dish	Brush beef with melted butter or oil and season as desired. Place food on the low rack on a drip dish. Choose the menu and weight, press start. When BEEP sound occurs, turn food over and then press start to continue cooking. After cooking, stand covered with foil for 10 minutes.				
5. Stuffed zucchini	Ingredients				
- Food Temp. : Room - Utensil : Crisp tray on the low rack	4 round zucchini (cou 2 tablespoons olive oi				round beef
	Cut tops off zucchini to form hats and seed them, taking care not to pierce flesh or skin. Stuff zucchinis with ground beef and replace hat.				
	Place stuffed zucchini olive oil. Choose the m			e low rack	and drizzle with

## Chef Recipe Guide

## Category Instructions 6. Gratin dauphinois Inaredients 1 kg potatoes \ 1 clove garlic - Food Temp.: Room 20 g butter \ 300 g cream - Utensil: 20 x 20 cm Baking dish on 100 g grated cheese \ Nutmeg, salt and pepper to taste the low rack Peel and wash potatoes then cut into 5 mm slices. Rub inside of a baking dish with garlic clove and butter. Place half of potatoes in the baking dish and season. Fill with remaining potatoes and season then pour cream and cheese over the top. Place the baking dish on the low rack. Choose the menu, press start. 7. Lasagna Inaredients for meat sauce 9 uncooked lasagna noodles \ 2 kg meat and tomato sauce - Food Temp.: Room 40 g grated cheese \ 4 tablespoons olive oil - Utensil: 26 x 17 cm Baking dish on Salt and pepper to taste the low rack Place 3 lasagna noodles side by side on bottom of a baking dish, covering bottom. Spread 1/3 of meat and tomato sauce on top. Continue with 3 lasagna noodles and another 1/3 of meat and tomato sauce then finish with last 3 lasagna noodles and remaining meat and tomato sauce. Sprinkle grated cheese on top. Place baking dish on the low rack. Choose the menu, press start. X Meat and tomato sauce 1 celery stalk \ 2 onions 1 clove garlic \ 1.4 kg well-ripe tomatoes 1 sprig thyme \ 1 bay leaf 500 g ground beef \ Salt and pepper to taste Finely chop celery, onions, garlic and tomatoes. Cook celery, onions and garlic in a lightly oiled frying pan until soft. Add tomatoes, thyme, bay leaf, salt and pepper. Stir and simmer for 30 Cook ground meat in another lightly oiled frying pan for 5 minutes while stirring constantly. Pour tomato sauce into meat and cook for 5 minutes. 8. Apple tart Ingredients 1 shortcrust pastry dough \ 5 apples - Food Temp.: Room 20 grams sugar \ 2 tablespoons liquid honey - Utensil: Crisp tray on the low rack 1. On lightly floured surface, roll out pastry into circle and put in the crisp tray. Trim edges, leaving little overhang. Prick with fork and set aside. 2. Chop 2 1/2 apples and place in a frying pan with sugar. Simmer until apple is soft. Cut remaining apples into 5mm slices. Spread cooked apples onto bottom of dough and arrange sliced apples in spiraling rosettes over entire surface. Finally spread honey on top. 3. Place the crisp tray on the low rack. Choose the menu, press start. After cooking, remove from the oven and let them cool.

## **Active Convection**

The following example will show you how to cook 0.3kg of chicken pieces.

1 Press STOP/CLEAR.



2 Press **ACTIVE CONVECTION**.

The following indication is displayed: " \& ".



3 Turn **COOK MODE** until display shows "2 CHICKEN PIECES".

Press **START/QUICK START** for category confirmation.





4 Turn **COOK MODE** until display shows "0.3 kg". Press **START/QUICK START**.

When cooking you can increase or decrease cooking time by turning **COOK MODE.** 







## NOTE

- Active Convection menus are programmed.
- Active Convection allows you to cook most of your favourite food by selecting the food type and the weight of the food.

## **Active Convection Guide**

Category	Instructions
1. Roast chicken	Brush whole chicken with melted butter or oil and season as desired.
- Weight Limit : 0.8~1.8 kg - Food Temp. : Refrigerated - Utensil : Low rack on a drip dish	Place whole chicken breast-side down on the low rack on a drip dish. Choose the menu and weight, press start. When BEEP sound occurs, drain juices and turn food over immediately and then press start to continue cooking. After cooking, stand covered with foil for 10 minutes.
2. Chicken pieces	Brush chicken pieces with melted butter or oil and season as desired.
- Weight Limit : 0.2~0.8 kg - Food Temp. : Refrigerated - Utensil : Crisp tray on the high rack	Place food on the crisp tray on the high rack. Choose the menu and weight, press start. When BEEP sound occurs, turn food over and press start to continue cooking.
3. Roast pork	Brush pork with melted butter or oil and season as desired.
- Weight Limit : 0.5~2.0 kg - Food Temp. : Refrigerated - Utensil : Low rack on a drip dish	Place food on the low rack on drip dish. Choose the menu and weight, press start. After cooking, stand covered with foil for 10 minutes.

## **Active Convection Guide**

Category	Instructions
4. Fresh pizza - Food Temp.: Room - Utensil: Crisp tray on the low rack	Ingredients Dough: 120 g all-purpose or bread flour \ 1 teaspoon active dry yeast 1/3 teaspoon salt \ 1 teaspoon sugar \ 70 ml warm water 1 teaspoon extra-virgin olive oil, plus little for coating
	Topping: 3 tablespoons tomato sauce \ 30 g sausage, sliced 1/2 onion, sliced \ 2 fresh mushrooms, sliced 1/2 fresh pepper \ 100 g shredded Mozzarella cheese
	Combine all ingredients in a large mixing bowl.
	Knead with an electric mixer to make smooth and elastic dough.
	Roll dough out and place dough on the crisp tray.
	Spread pizza sauce. Top with toppings and cheese.
	Place the crisp tray on the low rack. Choose the menu, press start.
5. Cookies - Food Temp.: Room - Utensil: High rack + Low rack	Ingredients 80 g brown sugar \ 80 g butter, softened 1 egg, lightly beaten \ 180 g all-purpose flour, sifted 1/2 teaspoon baking powder \ 1/2 teaspoon baking soda 100 g mini chocolate chips
	Mix brown sugar and softened butter. Gradually add egg and stir until light and fluffy. Add flour, baking powder, baking soda and chocolate chips and mix well.
	Drop dough by tablespoon onto the high rack and low rack covered with aluminum foil. Cookies should be spaced 2 cm apart.
	Place high rack and low rack in the oven. Choose the menu, press start. After cooking, remove from the oven and let them cool.
6. Baked potatoes - Weight Limit : 0.2~1.0 kg - Food Temp. : Room - Utensil : Low rack	Choose medium sized potatoes (200~220 g per each). Wash and dry potatoes. Pierce potatoes several times with a fork. Place food on the low rack. Choose the menu and weight, press start. After cooking, stand covered with foil for 10 minutes.
7. Small cakes - Food Temp. : Room - Utensil : Paper muffin cups on the crisp tray on the low rack	Ingredients 60 g sugar \ 100 g butter, softened 2 eggs, lightly beaten \ 150 g all-purpose flour, sifted 1/2 teaspoon baking powder 10~13 ea paper muffin cups (50 mm base x 30 mm height)
	Mix sugar and softened butter. Gradually add eggs and stir until light and fluffy. Add flour and baking powder and mix well.
	Evenly fill paper muffin cups with butter (25~30 g per each). Place muffin cups on the crisp tray on the low rack. Choose the menu, press start. After cooking, remove from the oven and let them cool.

## **Grill Temp control**

The following example will show you how to use keep warm at a temperature of 80° C for 30 minutes.

1 Press **STOP/CLEAR**.



2 Press GRILL TEMP CONTROL.

The following indication is displayed: " \*\*\* ".



3 Turn **COOK MODE** until display shows "2 KFFP WARM".

Press **START/QUICK START** for category confirmation.





4 Turn **COOK MODE** until display shows "80° C". Press **START/QUICK START**.

Turn **COOK MODE** until display shows "30:00".







5 Press START/QUICK START.





## NOTE

For the best results with the grill temp control function, be sure to check that the oven cavity has cooled before use.

## **Grill Temp Control Guide**

#### **Function**

#### 1. Slow cook

- Range: 110° C (High) / 90° C (Low)
- Utensil : Heatproof glass dish with cover on turntable

## Instruction

This function maintains a relatively low temperature compared to other cooking methods (such as baking, boiling, and frying), for many hours allowing unattended cooking of pot roast, stew, and other suitable dishes.

#### 90° C (Low) Setting

The low setting gently simmers food for an extended period of time without overcooking or burning. No stirring is required when using this setting.

#### 110°C (High) Setting

The high setting will cook food in approximately half the time required for the low setting. Some foods may boil when cooked on the high setting, so it may be necessary to add extra liquid.

Occasional stirring of stews and casseroles will improve flavour distribution.

Searing and browning before slow cooking is not necessary, but this will help to seal in the juices and flavours, and keeps the meat tender.

## Slow cook guide

Slow cooker cooking time		Slow cooker cooking time	
(without searing)		(with searing)	
90° C(Low)	110° C(High)	90° C(Low)	110° C(High)
6 to 10 hrs	3 to 4 hrs	4 to 6 hrs	2 to 3 hrs
8 to 10 hrs	4 to 6 hrs	5 to 6 hrs	3 to 4 hrs
	(without sear 90° C(Low) 6 to 10 hrs	(without searing) 90° C(Low) 110° C(High) 6 to 10 hrs 3 to 4 hrs	90°C(Low) 110°C(High) 90°C(Low) 6 to 10 hrs 3 to 4 hrs 4 to 6 hrs

## 2. Keep warm

- Range: 60° C~80° C
- Utensil : Heatproof glass dish with cover on turntable

Heat from the top and bottom elements are used to maintain set temperature.

You can use this function to keep food warm until ready to serve.

## **Grill Temp Control Guide**

#### **Function** Instruction

## 3. Food dry

- Range: 40° C ~ 90° C
- Utensil: Crisp tray on the low rack

With this function, you can dry fruit, veggies, and beef into healthy and nutritional snacks and tasty jerky without chemicals and preservatives. Place baking paper on tray and spread food into a single layer.

## Food dry auide

rood dry g	uiue			
Food type	Preparation	Set temp	Time	Use
Bananas	Slice into 5~6 mm thick	60°C	5~8hrs	Snacks, baby food, gra- nola, cookies and banana bread
Figs	Remove stems and halve	60° C	8~10hrs	Fillings, cakes, puddings, breads and cookies
Kiwi	Peel, slice into 8~12 mm thick	60° €	5~8 hrs	Snacks
Mangos	Remove skin, slice into 6~10 mm thick	60° €	6~10 hrs	Snacks, cereals, baked goods
Pineapple	Peel, core, slice into 8~12 mm thick	60°€	6~10 hrs	Snacks, baked goods, baked granola
Tomatoes	Wash and slice 6mm circles	60° €	6~10 hrs	Soups, stews, paste or sauce
Mushroom	Clean with soft brush or cloth. Don't wash	50° €	4~8 hrs	Rehydrate for soups, meat dishes, omelettes or frying
Beef jerky	Marinate sliced meats (5~6 mm thick)in store- bought or your own recipe for 6 to 8hours in the refrigerator	70°C	6~10 hrs	Snack

#### 4. Proof

- Range : 40° C
- Utensil: Heatproof glass dish on the low rack

## How to make yogurt

- Pour a 1000 ml milk into a proper heat-resistant bowl with cover.
- Boil it to proper temperature (up to 60~70° C) and then cool down to about 40° C
- Add 150 ml natural yogurt into a bowl and stir well.
- Place covered bowl in the oven.
- Choose the menu, and set cook time 5~8 hours.

## How to raise yeast dough

- Place the dough in a proper heat-resistant bowl and cover with baking wrap or damp cloth.
- Place the bowl in the oven.
- Choose the menu, and set cook time to about 40 minutes until the dough has doubled in volume.

## 5. Plate warming

- Range :40° C ~100° C
- Utensil: On the low rack

Use this function to warm plates to a hot and comfortable temperature.

The following example will show you how to cook 0.5kg of lasagna.

1 Press **STOP/CLEAR**.



2 Press CRISPY REHEAT.

The following indication is displayed: "auto".



3 Turn COOK MODE until display shows "2 LASAGNA". Press START/QUICK START for category confirmation.





4 Turn **COOK MODE** until display shows "0.5 kg". Press **START/QUICK START**.

When cooking you can increase or decrease cooking time by turning **COOK MODE.** 









## NOTE-

- · Crispy Reheat menus are programmed.
- Crispy Reheat allows you to cook most of your favourite food by selecting the food type and the weight of the food.

## Crispy Reheat Guide

Category	Instructions
1. Cordon bleu - Weight Limit: 0.2~0.8 kg - Food Temp.: Refrigerated - Utensil: Crisp tray on the low rack	Place leftover cordon bleu (100~150 g/piece) on the crisp tray on the low rack. Choose the menu and weight, press start.
2. Lasagna - Weight Limit: 0.2~0.8 kg - Food Temp.: Refrigerated - Utensil: Crisp tray on the low rack	Cut leftover lasagna into pieces (200~250 g/piece). Place food on the crisp tray on the low rack. Choose the menu and weight, press start.
3. Bread  - Weight Limit: 0.1~0.3 kg  - Food Temp.: Frozen  - Utensil: Low rack	Place frozen bread (50~100 g/piece) on the low rack. Choose the menu and weight, press start.
4. Pie/Tart  - Weight Limit: 0.2~0.8 kg  - Food Temp.: Refrigerated  - Utensil: Crisp tray on the low rack	Cut leftover pie/tart into pieces (200~250 g/piece). Place food on the crisp tray on the low rack. Choose the menu and weight, press start.

## Steam Chef

The following example will show you how to cook 0.6kg of fish fillet.

1 Press STOP/CLEAR.



2 Press **STEAM CHEF.** 

The following indication is displayed: "auto".



3 Turn **COOK MODE** until display shows "3 FISH FILLET".

Press START/QUICK START for category confirmation.





4 Turn COOK MODE until display shows "0.6 kg".



5 Press **START/QUICK START.** 

When cooking you can increase or decrease cooking time by turning COOK MODE.







## **CAUTION**

- 1. Always use oven gloves when removing a STEAMER from the oven. It's very hot.
- 2. Do not put a hot STEAMER on a glass table or a place that may melt after cooking. Always make sure a pad or tray is used.
- 3. When you use this Steamer, pour at least 300ml water before use. If the amount of water is less than 300ml, it may cause incomplete cooking, or may cause a fire or fatal damage to the product.
- 4. Be careful when you move the STEAMER with water.
- 5. When you use the STEAMER, the steam cover and Steam water bowl should be set perfectly right. Eggs or chestnuts will explode if the steam cover and steam water bowl are not set.
- 6. Never use this STEAMER with a product from a different model. It may cause fire or fatal damage to the product.



## Steam Chef Guide

Category	Instructions
1. Crustacea - Weight Limit: 0.2~0.8 kg - Food Temp.: Refrigerated - Utensil: Steam cover / Steam plate / Steam water bowl	Clean the food such as shrimp, crab. (Make sure it is under 25 cm length) Pour 300 ml tap water into the steam water bowl. Place the steam plate on the steam water bowl. Place the prepared food on the steam plate in a single layer. Cover with the steam cover. Place the steam water bowl in the centre of the glass tray. After cooking, stand for 3~5 minutes in the oven.
2. Shell fish - Weight Limit: 0.1~0.6 kg - Food Temp.: Refrigerated - Utensil: Steam cover / Steam plate / Steam water bowl	Clean the food, such as clam, scallops and cuttlefish. (Make sure it is under 25 cm length).  Pour 300ml tap water into the steam water bowl. Place the steam plate on the steam water bowl. Place the prepared food on the steam plate in a single layer. Cover with the steam cover.  Place the steam water bowl in the centre of the glass tray.  After cooking, stand for 3~5 minutes in the oven.
3. Fish fillet - Weight Limit: 0.2~0.6 kg - Food Temp.: Refrigerated - Utensil: Steam cover / Steam plate / Steam water bowl	Clean the food. Make sure it is under 2.5 cm thick. Pour 300ml tap water into the steam water bowl. Place the steam plate on the steam water bowl. Place the prepared food on the steam plate in a single layer. Cover with the steam cover. Place the steam water bowl in the centre of the glass tray. After cooking, stand for 3~5 minutes in the oven.
4. Carrot  - Weight Limit: 0.2~0.8 kg  - Food Temp.: Room  - Utensil: Steam cover / Steam plate / Steam water bowl	Clean the vegetables and cut into similar sized pieces. Pour 300ml tap water into the steam water bowl. Place the steam plate on the steam water bowl. Place the prepared food on the steam plate in a single layer. Cover with the steam cover. Place the steam water bowl in the centre of the glass tray. After cooking, stand for 3~5 minutes in the oven.
5. Broccoli / Cauliflower  - Weight Limit: 0.2~0.6 kg  - Food Temp.: Room  - Utensil: Steam cover / Steam plate / Steam water bowl	Same as above.
6. Green beans - Weight Limit: 0.1~0.3 kg - Food Temp.: Room - Utensil: Steam cover / Steam plate / Steam water bowl	Pour 300ml tap water into the steam water bowl. Place the steam plate on the steam water bowl. Place the green bean on the steam plate in a single layer. Cover with the steam cover. Place the steam water bowl in the centre of the glass tray. After cooking, stand for 3~5 minutes in the oven.
7. Potatoes  - Weight Limit: 0.2~0.8 kg  - Food Temp.: Room  - Utensil: Steam cover / Steam plate / Steam water bowl	Same as above Cut into 4 pieces.
8. Eggs - Weight Limit: 2~9 eggs - Food Temp.: Refrigerated - Utensil: Steam cover / Steam plate / Steam water bowl	Pour 300 ml tap water into the steam water bowl. Place the steam plate on the steam water bowl. Place the eggs on the steam plate in a single layer. Cover with the steam cover. Place the steam water bowl in the centre of the glass tray. After cooking, stand for 3~5 minutes in the oven.

## **Auto Defrost**

The temperature and density of food varies, it is recommended that the food be checked before cooking begins. Pay particular attention to large joints of meat and chicken, some foods should not be completely thawed before cooking.

For example: Fish cooks so quickly that it is sometimes better to begin cooking while still slightly frozen. This will require a standing time to allow the centre to thaw.

Weigh the food that you are about to defrost. Be certain to remove any metallic ties or wraps; then place the food onto the microwaveable-safe dish on the glass tray in your oven and close the oven door.



Microwaveable-safe dish



Glass trav

The following example will show you how to defrost 0.8kg of frozen poultry.

1 Press **STOP/CLEAR**.



2 Press AUTO DEFROST.

The following indication is displayed: " \* \* ...



3 Turn **COOK MODE** until display shows "2 POULTRY". Press START/QUICK START for category confirmation.





4 Turn **COOK MODE** until display shows "0.8 kg" for the weight of frozen food.

Press START/QUICK START.





5 During defrosting your oven will "BEEP", at which point you should open the oven door, turn food over and separate it to ensure even thawing. Remove any portions that have thawed or shield them to help slow down thawing. After checking, close the oven door and press **START/QUICK START** to resume defrosting.

Your oven will not stop defrosting (even when the BEEP sounds) unless the door is opened.



## NOTE

- Your oven has 4 microwave defrost settings:
- Meat, Poultry, Fish and Bread; each defrost category has different power settings.
- Food to be cooked should be placed in a microwaveable-safe utensil
- Please do not use the following accessories.





High rack

Low rack

## **Defrosting Guide**

- \* Food to be defrosted should be placed in a suitable microwave proof container and placed uncovered on the glass tray.
- \* If necessary, shield small areas of meat or poultry with flat pieces of aluminum foil. This will prevent thin areas from becoming warm during defrosting. Ensure the foil does not touch the oven walls.
- \* Separate items like minced meat, chops, sausages and bacon as soon as possible. When BEEP sounds, turn food over. Remove defrosted portions. Continue to defrost remaining pieces. After defrosting, allow to stand until completely thawed.

Category	Instructions
1. Meat - Weight Limit: 0.1~4.0 kg - Utensil: Microwaveable-safe plate	<ul> <li>- Minced beef, Fillet steak, Cubes for stew, Sirloin steak, Pot roast, Rump roast, Beef burger, Pork chops, Lamb chops, Rolled roast, Sausage, Cutlets(2 cm).</li> <li>- Turn food over at BEEP.</li> <li>- After defrosting, cover with aluminum foil and let stand for 5~15 minutes.</li> </ul>
2. Poultry - Weight Limit : 0.1~4.0 kg - Utensil : Microwaveable-safe plate	<ul> <li>- Whole chicken, Legs, Breasts, Turkey breasts (under 2.0 kg).</li> <li>- Turn food over at BEEP.</li> <li>- After defrosting, let stand for 20~30 minutes.</li> </ul>
3. Fish - Weight Limit: 0.1~4.0 kg - Utensil: Microwaveable-safe plate	<ul> <li>Fillets, Steaks, Whole fish, Seafood.</li> <li>Turn food over at BEEP.</li> <li>After defrosting, let stand for 10~20 minutes.</li> </ul>
4. Bread - Weight Limit: 0.1~0.5 kg - Utensil: Paper towel	- Sliced bread, Buns, Baguette, etc. - After defrosting, let stand for 1 minute.

## FOOD CHARACTERISTICS & MICROWAVE COOKING

## Keeping an eye on things

The recipes in this book have been formulated with great care, but your success in preparing them depends on how much attention you pay to the food as it cooks. Always watch your food while it cooks. Your microwave function is equipped with a light that turns on automatically when the oven is in operation so that you can see inside and check the progress of your food. Directions given in recipes to elevate, stir, and the like should be thought of as the minimum steps recommended. If the food seems to be cooking unevenly, simply make the necessary adjustments you think are appropriate to correct the problem.

## Factors affecting microwave cooking times

Many factors affect cooking times. The temperature of ingredients used in a recipe makes a big difference in cooking times. For example, a cake made with ice-cold butter, milk, and eggs will take considerably longer to bake than one made with ingredients that are at room temperature. All of the recipes in this book give a range of cooking times. In general, you will find that the food remains under-cooked at the lower end of the time range, and you may sometimes want to cook your food beyond the maximum time given, according to personal preference. The governing philosophy of this book is that it is best for a recipe to be conservative in giving cooking times because overcooked food is ruined for good. Some of the recipes, particularly those for bread, cake, and custards, recommend that food be removed from the oven when they are slightly undercooked. This is not a mistake. When allowed to stand, usually covered, these foods will continue to cook outside of the oven as the heat trapped within the outer portions of the food gradually travels inward. If the food is left in the oven until it is cooked all the way through, the outer portions will become overcooked or even burnt. You will become increasingly skillful in estimating both cooking and standing times for various foods.

## Density of food

Light, porous food such as cakes and breads cook more quickly than heavy, dense foods such as roasts and casseroles. You must take care when microwaving porous food so that the outer edges do not become dry and brittle.

#### Height of food

The upper portion of tall foods, particularly roasts, will cook more quickly than the lower portion. Therefore, it is wise to turn tall food several times, during cooking.

#### Moisture content of food

Since the heat generated from microwaves causes moisture to evaporate, relatively dry food such as roasts and some vegetables should either be sprinkled with water prior to cooking or covered to retain moisture.

#### Bone and fat content of food

Bones conduct heat and fat cooks more quickly than meat. Care must be taken when cooking bony or fatty cuts of meat in order to prevent unevenly or overcooked meat.

#### Quantity of food

The number of microwaves in your oven remains constant regardless of how much food is being cooked. Therefore, the more food you place in the oven, the longer the cooking time. Remember to decrease cooking times by at least one third when halving a recipe.

#### Shape of food

Microwaves penetrate only about 2 cm into food, the interior portion of thick foods are cooked as the heat generated on the outside travels inward. Only the outer edge of food is cooked by microwave energy; the rest is cooked by conduction. The worst possible shape for a food that is to be microwaved is a thick square. The corners will burn long before the centre is even warm. Round thin foods and ring shaped foods cook most successfully in the microwave.

#### Covering

A cover traps heat and steam which causes food to cook more quickly. Use a lid or microwave cling film with a corner folded back to prevent spitting.

## FOOD CHARACTERISTICS & MICROWAVE COOKING

## **Browning**

Meats and poultry that are cooked fifteen minutes or longer will brown lightly in their own fat. Foods that are cooked for a shorter period of time may be brushed with a browning sauce such as worcestershire sauce, soy sauce or barbecue sauce to achieve an appetising colour. Since relatively small amounts of browning sauces are added to food, the original flavour of the recipe is not altered.

## Covering with greaseproof paper

It provides a looser cover than a lid or cling film, which may dry food out slightly. But because it makes a looser cover than a lid or cling film, it allows the food to dry out slightly.

## Arranging and spacing

Individual foods such as baked potatoes, small cakes and hors d'oeuvres will heat more evenly if placed in the oven at an equal distance apart, preferably in a circular pattern. Never stack foods on top of one another.

## Stirring

Stirring is one of the most important of all microwaving techniques. In conventional cooking, food is stirred for the purpose of blending. Microwaved food, however, is stirred in order to spread and redistribute heat. Always stir from the outside towards the centre as the outside of the food heats first.

#### Turning over

Large, tall foods such as roasts and whole chickens should be turned so that the top and bottom will cook evenly. It is also a good idea to turn cut up chicken and chops.

## Placing thicker portions facing outwards

Since microwaves are attracted to the outside portion of food, it makes sense to place thicker portions of meat, poultry and fish to the outer edge of the baking dish. This way, thicker portions will receive the most microwave energy and the food will cook evenly.

#### Shielding

Strips of aluminium foil (which block microwaves) can be placed over the corners or edges of square and rectangular foods to prevent those portions from overcooking. Never use too much foil and make sure the foil is secured to the dish or it may cause'arcing' in the oven.

## Elevating

Thick or dense foods can be elevated so that microwaves can be absorbed by the underside and centre of the foods.

## Piercing

Foods enclosed in a shell, skin or membrane are likely to burst in the oven unless they are pierced prior to cooking. Such foods include yolks and whites of eggs, clams and oysters and whole vegetables and fruits.

#### Testing if cooked

Food cooks so quickly in a oven, it is necessary to test it frequently. Some foods are left in the microwave until completely cooked, but most foods, including meats and poultry, are removed from the oven while still slightly undercooked and allowed to finish cooking during standing time. The internal temperature of foods will rise between 5° F (3° C) and 15° F (8° C) during standing time.

#### Standing time

Foods are often allowed to stand for 3 to 10 minutes after being removed from the oven. Usually the foods are covered during standing time to retain heat unless they are supposed to be dry in texture (some cakes and biscuits, for example). Standing allows foods to finish cooking and also helps flavour blend and develop.

## To Clean Your Oven

#### 1 Keep the inside of the oven clean

Food spatters or spilled liquids stick to oven walls and between the seal and door surfaces. It is best to wipe up spillovers with a damp cloth right away. Crumbs and spillovers will absorb microwave energy and lengthen cooking times. Use a damp cloth to wipe out crumbs that fall between the door and the frame. It is important to keep this area clean to assure a tight seal. Remove greasy spatters with a soapy cloth then rinse and dry. Do not use harsh detergent or abrasive cleaners. The metal tray can be washed by hand or in the dishwasher.

## 2 Keep the outside of the oven clean

Clean the outside of your oven with soap and water then with clean water and dry with a soft cloth or paper towel. To prevent damage to the operating parts inside the oven, the water should not be allowed to seep into the ventilation openings. To clean control panel, open the door to prevent the oven from accidentally starting, and wipe with a damp cloth, followed immediately by a dry cloth. Press Stop/Clear after cleaning.

- 3 If steam accumulates inside or around the outside of the oven door, wipe the panels with a soft cloth. This may occur when the oven is operated under high humidity conditions and in no way indicates a malfunction of the unit.
- 4 The door and door seals should be kept clean. Use only warm, soapy water, rinse then dry thoroughly. DO NOT USE ABRASIVE MATERIALS, SUCH AS CLEANING POWDERS OR STEEL AND PLASTIC PADS. Metal parts will be easier to maintain if wiped frequently with a damp cloth.
- 5 Do not use steam cleaners.
- 6 Unplug your oven from the electrical socket when you clean the control panel with a wet cloth or spray water on control glass to clean. If it is not unplugged, this product can be operated by touching the Quick Start button.

## **QUESTIONS & ANSWERS**

FAQ	Answer
What's wrong when the oven light does not glow?	There may be several reasons why the oven light does not glow. Either the light bulb has blown or the electric circuit has failed.
Does microwave energy pass through the viewing screen in the door?	No. The holes, or ports, are made to allow light to pass; they do not let microwave energy through.
Why does the BEEP tone sound when a button on the control panel is touched?	The BEEP tone sounds to assure that the setting is being properly entered.
Will the microwave function be damaged if it operates empty?	Yes. Never run it empty.
Why do eggs sometimes pop?	When baking, frying, or poaching eggs, the yolk may pop due to steam build up inside the yolk membrane. To prevent this, simply pierce the yolk before cooking. Never microwave eggs in the shell.
Why is standing time recommended after microwave cooking is over?	After microwave cooking is finished, food keeps on cooking during standing time. This standing time finishes evenly cooking throughout the food. The amount of standing time depends on the density of the food.
Why doesn't my oven always cook as fast as the cooking guide says?	Check your cooking guide again to make sure you've followed directions correctly, and to see what might cause variations in cooking time. Cooking guide times and heat settings are suggestions, chosen to help prevent overcooking, the most common problem in getting used to this oven. Variations in the size, shape, weight and dimensions of the food require longer cooking time. Use your own judgement along with the cooking guide suggestions to test food conditions, just as you would do with a conventional cooker.

## **TEST DISHES IN ACCORDANCE WITH EN 60705**

Function	Meal	Microwave Wattage Setting	Heating Temperature	Notes
Microwave defrosting	Meat	Auto key function	-	Place a flat plate on the center of the glass tray. Use the "Auto defrost 1" function and select appropriate weight. When BEEP sound occurs, turn food over and press start to continue cooking.
Microwave cooking	Custard	360 W, 28~35 min	-	Place a Pyrex dish on the center of the glass tray.
	Sponge cake	900 W, 4~5 min	-	Place a ø22 cm Pyrex dish on the center of the glass tray.
	Meat loaf	540 W, 13~25 min	-	Place a Pyrex dish on the center of the glass tray.
	Potato gratin	360 W, 25~29 min	200° C	Place a ø22 cm Pyrex dish on low rack.
Combination	Cake	-	170° C	Place a ø22 cm Pyrex dish on low rack.
cooking with the microwave	Chicken	Auto key function	-	Place chicken breast-side down on the low rack on a drip dish. Use the "Active convection 1" function and select appropriate weight. When BEEP sound occurs, turn food over and press start to continue cooking.

## **TECHNICAL SPECIFICATIONS**

MJ3281BCS						
Power Input		230 V~ 50 Hz				
Output		900 Watt (IEC60705 rating standard)				
Microwave Frequency		2450 MHz +/- 50MHz(Group 2/Class B)				
Outside Dimension		530 mm(W) X 322 mm(H) X 533 mm(D)				
	Max.	2600 watt				
	Microwave	1400 Watt				
Power Consumption	Grill	1250 Watt				
	Convection	1250 Watt (Max. 2450 Watt)				
	Combination	Max. 2600 Watt				

Group 2 equipment: group 2 contains all ISM RF equipment in which radio-frequency energy in the frequency range 9 kHz to 400GHz is intentionally generated and used or only used, in the form of electromagnetic radiation, inductive and / or capacitive coupling, for the treatment of material or inspection/analysis purposes.

Class B equipment is equipment suitable for use in domestic establishments and in establishments directly connected to a low voltage power supply network which supplies buildings used for domestic purposes.

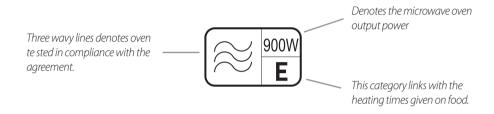
## **MAFF**

## REHEATING COOKED CHILLED FOODS

This microwave oven has been tested and labelled to the Ministry of Agriculture Fisheries and Food (MAFF) agreement, concerning the reheating of cooked chilled food.

The heating category represents the oven's ability to heat small quantities of food (approx. 350 g), it does not represent the oven's general performance. The category (from the letter A to E) will help you to reheat small quantities of food such as microwavable ready meals. The greater the heating category of the oven, the less heating time that is required.

Displayed on the food packages will be the cooking times for each of the BAND categories. For example A may be 10 minutes. B may be 9 minutes etc depending on the food type.



# LG ELECTRONICS U.K. LTD. WILL PROVIDE THE FOLLOWING SERVICES INORDER TO EXPEDITE THIS GUARANTEE.

- 1. All faulty components which fail due to defective manufacturing will be replaced free of charge for a period of 12 months from the original date of purchase.
- 2. The dealer (or his Service Agent) who sold the product will be reimbursed for any labour provided in the repair of this LG electronics equipment, for a period of 12 months from the original date of purchase. These claims must be made in accordance with the published scale of service charges and relevant claims procedure.

#### PLEASE NOTE:

- A. The dealer may restrict the guarantee to the original purchaser.
- B. The dealer is not obliged to carry out service under guarantee if unauthorised modifications are made to the apparatus, or if non standard components are used or if the serial number of the apparatus is removed, defaced, misused, or altered.
- C. Any claims made under guarantee must be directed to the dealer from whom the equipment was originally purchased. The dealer may, before carrying out service under guarantee, require a receipted account as evidence of the date of purchase.
- D. We respectfully point out that your dealer is not obligated to replace batteries if they become exhausted or worn in use. E. Aerial alignment and consumer control adjustments are not covered by this guarantee.

This guarantee does not affect your statutory rights.

#### REQUIREMENTS TO MAINTAIN WARRANTY COVERAGE:

RETAIN YOUR RECEIPT TO PROVE DATE OF PURCHASE. A COPY OFYOUR RECEIPT MUST BE SURRENDERED AT THE TIME GUARANTEE SERVICE IS PROVED.

#### PRODUCT REGISTRATION CARD:

It is helpful to complete at least, your name, address, phone, model & serial numbers and return it. This will enable LG Electronics to assist you in the future should you lose your receipt, your units stolen, or should modification be necessary.

#### To obtain information or assistance:

Call 01753 500470 Monday-Friday 9:00 am ~ 4:30 pm

MODEL	SERIAL #*	DATE OF PURCHASE		

<sup>\*</sup> Please complete for your own record.

In all cases of difficulty - consult your LG dealer from whom the product was purchased.



## Disposal of your old appliance



- 1. All electrical and electronic products should be disposed of separately from the municipal waste stream via designated collection facilities appointed by the government or the local authorities.
- 2. The correct disposal of your old appliance will help prevent potential negative consequences for the environment and human health.
- 3. For more detailed information about disposal of your old appliance, please contact your city office, waste disposal service or the shop where you purchased the product.