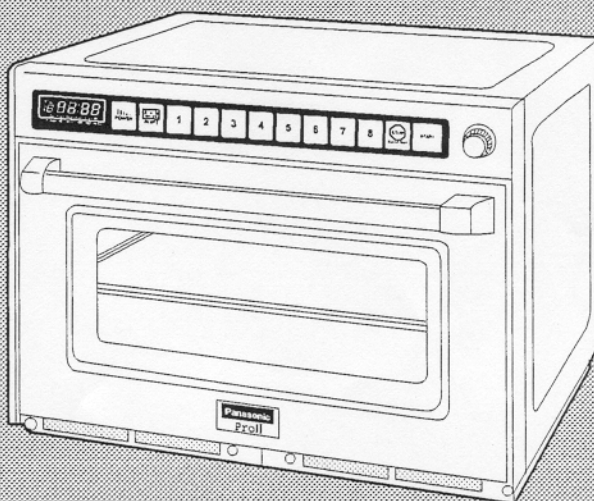


Panasonic®

Operating Instructions



Commercial Microwave Ovens NE-2180/NE-3280



Please read these instructions completely before operating this oven.

Before Calling for Service:

If failure code "F**" appears in the display, unplug oven and wait for 10 seconds before reconnecting. If normal operation does not resume, call the service agent with the information of failure code.

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Owner's Record

Model No. _____

Serial No. _____

The serial number of this products can be
found on the lower right hand side of the oven.

Dealer's Name _____

Dealer's Address _____

Date of Purchase _____

See page 13 before calling

Toll Free Service Information

To locate a convenient service agent call

1-888-350-9590

Chef Support: 201-348-7305

www.panasonic.com/cmo

Virtual Test Kitchens

PRECAUTIONS TO AVOID POSSIBLE EXPOSURE TO EXCESSIVE MICROWAVE ENERGY

- (a) Do not attempt to operate this oven with the door open since open-door operation can result in harmful exposure to microwave energy. It is important not to defeat or tamper with the safety interlocks. Under normal conditions, the oven will not operate with the door open.
- (b) Do not place any object between the oven front face and the door, or allow soil or cleaner residue to accumulate on sealing surfaces.
- (c) Do not operate the oven if it is damaged. It is particularly important that the oven door close properly and that there is no damage to the :
 - (1) door (bent)
 - (2) hinges and latches (broken or loose)
 - (3) door seals and sealing surfaces.
- (d) The oven should not be adjusted or repaired by anyone except properly qualified service personnel. (See page 2.)

IMPORTANT SAFETY INSTRUCTIONS

Your microwave oven is a cooking device and you should use as much care as you use with a stove or any other cooking device.

When using this electric appliance, basic safety precautions should be followed, including the following:

WARNING—To reduce the risk of burns, electric shock, fire, injury to persons or exposure to excessive microwave energy:

1. Read all instructions before using the appliance.
2. Read and follow "PRECAUTIONS TO AVOID POSSIBLE EXPOSURE TO EXCESSIVE MICROWAVE ENERGY," above on this page.
3. This appliance must be grounded. Connect only to a properly grounded outlet. See "Grounding Instructions" found on page 4.
4. Install or locate this appliance only in accordance with the provided installation instructions found on page 4.
5. Do not cover or block any openings on this appliance.
6. Do not store or use this appliance outdoors. Do not use this product near water for example, near a kitchen sink, in a wet basement, or near a swimming pool, and the like.
7. Use this appliance only for its intended use as described in this manual. Do not use corrosive chemicals or vapors in this appliance. This type of oven is specifically designed to heat, or cook food. It is not designed for industrial or laboratory use.
8. When cleaning surfaces of door and oven that come together on closing the door, use only mild, non-abrasive soaps or detergents applied with a sponge or soft cloth.
9. As with any appliance, close supervision is necessary when used by children.
10. Do not operate this appliance if it has a damaged cord or plug, if it is not working properly, or if it has been damaged or dropped.
11. Do not immerse cord or plug in water.
12. Keep cord away from heated surfaces.
13. Do not let cord hang over edge of table or counter.
14. This appliance should be serviced only by qualified service personnel. Contact the nearest authorized service facility for examination, repair or adjustment.
15. Some products such as whole eggs and sealed containers (for example, closed glass jars) may explode and should not be heated in this oven.
16. To reduce the risk of fire in the oven cavity:
 - (a) Do not overcook food. Carefully attend appliance if paper, plastic, or other combustible materials are placed inside the oven to facilitate cooking.
 - (b) Remove wire twist-ties from paper or plastic bags before placing bag in oven.
 - (c) If materials inside the oven should ignite, keep oven door closed, turn oven off, and disconnect the power cord, or shut off power at the fuse or circuit breaker panel.
 - (d) Do not use the cavity for storage purposes. Do not leave paper products, cooking utensils, or food in the cavity when not in use.

SAVE THESE INSTRUCTIONS

For proper use of your oven read remaining safety cautions and operating instructions.

Installation and GROUNDING INSTRUCTIONS

Placement of the Oven

Locate the oven on a smooth, flat and stable surface. There should be no gap between the table surface and the bottom of the oven. Do not place the oven in a hot or damp area, ie. near a stove, sink or directly above heat lamps on a serving line. Free airflow around the oven is important. There is a possibility of a small amount of interference with weak broadcast signals if the microwave oven is too close to a radio or TV.

Grounding Instructions

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

WARNING = improper use of the grounding plug can result in a risk of electric shock.

Consult a qualified electrician or service person if the grounding instructions are not completely understood, or if doubt exists as to whether the appliance is properly connected.

Do not use an extension cord. If the power supply cord is too short, have a qualified electrician or serviceman install an outlet near the appliance.

Removal of Protective Film

A blue protective film is used to prevent scratching of the outer case during transportation. Peel the film from the exterior of the oven before installation or use.

Wiring Requirements

1. No other appliance should share the circuit with the microwave oven. If it does, the branch circuit fuse may overload and either cause the oven to produce lower power output or blow the fuse.
2. The microwave ovens are built to operate on 2 different voltages (220-240 V or 208 V). Be sure that the voltage selector connector (on the back of the oven) is set for your power supply (see page 5). Using a higher voltage setting is dangerous and may result in overheating of the electrical components thus shortening their life expectancy or possibly causing a fire or other accident. Using a lower voltage will lower the power output of the oven, resulting in slower heating of the food. Panasonic is NOT responsible for damage resulting from the use of the oven with other than the specified voltage.

For Model NE-3280/NE-2180

This oven must be on a separate 60 Hz
GROUNDED CIRCUIT - minimum 30 amps.

NEMA#
6-30P



NEMA# 6-30R
Grounded Outlet



Caution

1. Do not attempt to tamper with or make any adjustments or repairs to the door, control panel housing, safety interlock switches or any other part of the oven. Do NOT remove the outer panel of the oven. Repairs should only be done by a qualified service person.
2. Do NOT operate the oven empty.
The microwave energy will reflect continuously throughout the oven if no food or water is present to absorb energy, this could damage the oven and result in the danger of a fire.
3. If a fire occurs in the oven, press the Stop/Clear time Pad and LEAVE THE DOOR CLOSED.
Disconnect the power cord, or shut off the power at the fuse or circuit breaker panel.
4. Do NOT attempt to dry clothes, newspapers or other materials in the oven, as they may catch on fire.
5. Do NOT use recycled paper products, as they may contain impurities which may cause sparks and/or fires.
6. Do NOT use newspapers or paper bags for cooking.
7. Do NOT hit or strike the control panel. Damage to controls may occur.
8. POT HOLDERS may be needed when removing food from the oven. Heat is transferred from the hot food to the container.
9. Do NOT store flammable materials next to, on top of, or in the oven. It is a fire hazard.
10. Do NOT slide the removable middle shelf in or out when placing or removing food. This action could cause damage to the shelf or cause hot food to tip towards the operator.
11. Do NOT use this oven to heat chemicals or any other non - food products. Do NOT clean this oven with any product that is labeled as containing corrosive chemicals. Heating of corrosive chemicals in this oven can cause microwave radiation leaks.

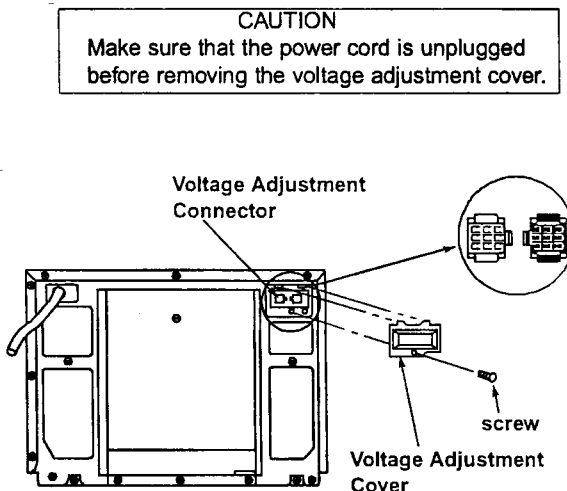
Power Source Voltage Adjustment

Your microwave oven is factory set for 208 V operation. For 220 V - 240 V operation, the following adjustment **MUST** be made.

- (Step 1) Unplug the oven.
- (Step 2) Unscrew the voltage adjustment cover which is located on the back of the oven. Do not remove any other parts from the oven.
- (Step 3) Remove the connector from the white socket and rotate it 180 degrees and plug it into black socket. (see sketch)
- (Step 4) Reattach the voltage adjustment cover to the cabinet.

For 220 V - 240 V = Plug the connector into black socket.

For 208 V = Plug the connector into white socket.



How Does The Microwave Work?

Microwaves are a form of high frequency radio waves similar to those used by a radio including AM, FM, and CB. They are, however, much shorter than radio waves; approximately five inches in length. Electricity is converted into microwave energy by the magnetron tube. From the magnetron tube, microwave energy is transmitted to the oven cavity where it is: reflected, transmitted and absorbed.

Reflection

Microwave are reflected by metal just as a ball is bounced off a wall. A combination of stationary (interior walls) and rotating antenna, located underneath the bottom shelf and above the ceiling cover assure that the microwaves are well distributed within the oven cavity to produce even heating or cooking of foods.

Transmission

Microwave pass through some materials such as paper, glass and plastic much like sunlight shining through a window. Because these substances do not absorb or reflect the microwave energy, they are ideal materials for microwave oven heating containers when covered.

Absorption

During heating, microwaves will be absorbed by food. They penetrate to a depth of about $\frac{3}{4}$ to $1\frac{1}{2}$ inches. Microwave energy excites the molecules in the food (especially water, fat and sugar molecules), and causes them to vibrate at a rate of 2,450,000,000 times per second. This vibration causes friction, and heat is produced just as you will feel heat produced if you vigorously rub your hands together. The internal heating of larger foods is done by conduction. The heat which is produced by friction is conducted to the center of the food. Foods also continue to heat by conduction during standing time. ("carry-over" cooking)
Because microwave energy dissipates, It is not stored in food.

Radio Interference

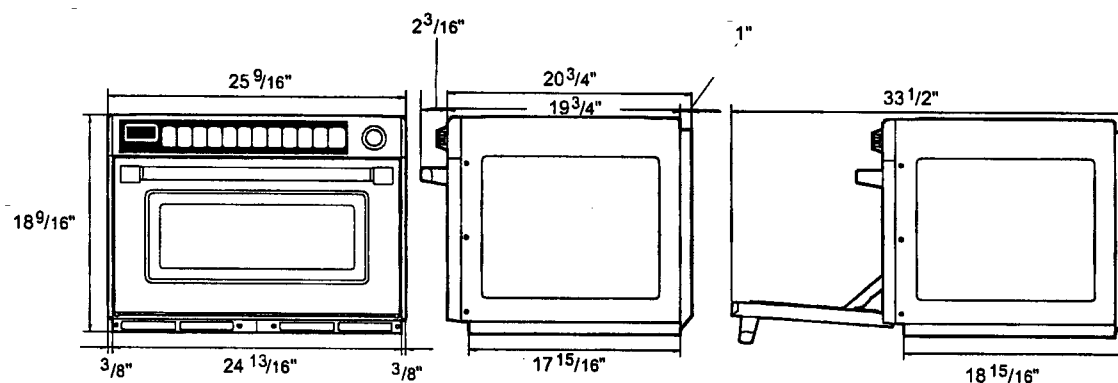
1. Operation of the microwave oven may cause interference to your radio, TV or similar equipment.
2. When there is interference, it may be reduced or eliminated by taking the following measures:
 - a. Clean door and sealing surfaces of the oven. (See Care of Your Microwave Oven found on page 14.)
 - b. Place the radio, TV, etc. away from the microwave oven as far as possible.
 - c. Use a properly installed antenna, to obtain stronger signal reception.

Technical Specifications

	NE-3280	NE-2180
Power Source	208/230 V, 60 Hz., single phase	
Required Power (Voltage)	28.0 A (208 V) 25.3 A (230 V)	20.0 A (208 V) 18.0 A (230 V)
Receptacle Required	30 AMP NEMA #6-30R	
Output	HI: 3200 W* MED: 1600 W LOW: 340 W DEF: 170 W HOLD: 0 W	HI: 2100 W* MED: 1050 W LOW: 340 W DEF: 170 W HOLD: 0 W
Frequency	2450 MHz	
Outer dimensions (W x D x H)	25 ⁹ / ₁₆ " x 20 ³ / ₄ " x 18 ⁹ / ₁₆ " (650 mm x 526 mm x 471 mm)	
Cavity dimensions (W x D x H)	21 ¹ / ₁₆ " x 13" x 9 ⁷ / ₈ " (535 mm x 330 mm x 250 mm)	
Net weight (approx.)	136.4 lbs. (62 kg)	116.7 lbs. (53 kg)
Timer	Maximum programmable time for single stage heating HI and MED power = 15 min. LOW, DEF and HOLD = 60 min.	
Memory Capability	16 programs	

*IEC 705-88 Test Procedure

Specifications subject to change without notice.



Panasonic®

www.panasonic.com/cmo

PANASONIC HOME AND COMMERCIAL
PRODUCTS COMPANY, DIVISION OF
MATSUSHITA ELECTRIC CORPORATION
OF AMERICA

One Panasonic Way 4A-4
Secaucus, NJ 07094
Or Call (201) 348-5377

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Printed in Japan

PANASONIC HOME & COMMERCIAL PRODUCTS COMPANY
DIVISION OF MATSUSHITA ELECTRIC CORPORATION OF AMERICA

One Panasonic Way 4A-4

Secaucus, NJ 07094

PANASONIC COMMERCIAL MICROWAVE OVEN WARRANTY

PANASONIC HOME & COMMERCIAL PRODUCTS COMPANY Division of Matsushita Electric Corporation of America, ("The Warrantor") warrants this Product to the original purchaser against defects in material or workmanship as follows:

1. What is covered by this warranty:

Parts (Except magnetron tube) — New or refurbished parts in exchange for defective parts.
Magnetron Tube — New magnetron tube in exchange for defective magnetron tube.
Labor — On site service.

Model	NE-2180
Warranty	
Parts	1 year
Magnetron	3 years
Labor	1 year

NOTE: From Date of Original Purchase

On site service in the Continental U.S.A. can be obtained during the warranty period from a Panasonic Services Company (PASC) Factory Servicenter or an authorized PASC Servicenter. Call 1-800-211-PANA, toll free, to locate an authorized PASC Servicenter.

Defects must be communicated to The Warrantor by the Purchaser in writing no later than thirty (30) days from the date the defect appears. If the Product shall prove, in the sole judgement of The Warrantor, to be defective in materials or workmanship during the warranty period, The Warrantor shall repair the Product within a reasonable time after notification from the Purchaser to The Warrantor. If the Product cannot be repaired after a reasonable number of attempts, The Warrantor shall provide, at The Warrantor's sole discretion, either a refund of the purchase price or a replacement unit.

2. What is not covered by this warranty:

This warranty only covers failures due to defects in materials or workmanship which occur during normal use and does not cover normal maintenance, light bulbs, plastic parts, ceramic shelves, ceiling plates and air filters. Also not covered are damages which occur in shipment of failures which are caused by products not supplied by Panasonic. It does not cover failures which result

from alteration, accident, misuse, abuse, neglect, mishandling, misapplication, service or modification by anyone other than an PASC authorized factory Servicenter, or damage that is attributable to acts of God.

3. Exclusion of other Warranties:

THIS WARRANTY IS EXCLUSIVE AND IN LIEU OF ALL OTHER WARRANTIES, WHETHER ORAL OR WRITTEN, EXPRESSED OR IMPLIED, INCLUDING THE WARRANTIES OF MERCHANTABILITY AND OF FITNESS FOR A PARTICULAR PURPOSE. The employees, dealers and agents of The Warrantor are not authorized to make modifications to this warranty, or additional warranties binding on The Warrantor; accordingly additional statements, whether oral or written, do not constitute warranties and should not be relied upon by Purchaser. The Warrantor's liability under this warranty shall be limited solely to the cost of any necessary repairs or replacements of the product, and The Warrantor assumes no risk, and shall not in any case be liable, for any special, incidental or consequential damages, or any other indirect damages, arising from breach of warranty or contract, negligence, or any other legal theory, including, without limitation, loss of good will profits or revenue, cost of capital, cost of any substitute equipment, facilities or services or downtime costs, or claims of any party dealing with purchaser for such damages.

4. Statute of Limitations:

No suit shall be brought on an alleged breach of The Warrantor warranty more than one (1) year following expiration of the relevant warranty period.

5. Allocation of Risks:

This warranty allocates the risks of Product failure between The Warrantor and the Purchaser, as authorized by the Uniform Commercial Code and other applicable law.

If a problem with this product develops during or after the warranty period, you may contact your authorized PASC Servicenter. If the problem is not handled to your satisfaction, you may contact Panasonic Home and Commercial Products Company at the address shown above.

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