Electric Domestic Appliances Maintenance Manual. Your Guide to Essential Care and Troubleshooting.

This guide empowers you to maintain your domestic electric appliances by outlining essential care and basic troubleshooting steps you can perform yourself. It provides solutions for frequent issues such as a complete loss of power , strange vibrations or noises , bad odors , and poor cleaning or drying results.

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1. Before You Call the Service Engineer

1.1 What to Check: General Troubleshooting Tips

Before contacting a technician, perform these basic diagnostic checks and troubleshooting steps:

A. NO POWER/NOT TURNING ON:
• Is the appliance securely plugged into a working outlet?
• Has a circuit breaker tripped? Reset it if necessary.
• Is the door locking or starting correctly? Listen for a click.
• Is anything (e.g., a piece of clothing) caught in the drum (for washing machines/dryers)? • Is the water supply kinked, bent, or obstructed (for washing machines/dishwashers)? • Is the drain pipe or sink clear (for washing machines/dishwashers)?

B. VIBRATION/LOUD NOISES:
• Is the appliance level? Use a spirit level to check the feet. An 10 appliance can cause significant vibration, especially during spin cycles.
• Redistribute the load (for washing machines/dryers).
• Are the transit bolts (for new washing machines) completely removed?
• Are there any foreign objects in the drum (keys, coins, etc.)?

C. UNPLEASANT ODOUR:
• Run a tub clean cycle (for washing machines/dishwashers).
• Leave the door ajar after use (for washing machines/dishwashers).
• Ensure detergent/rinse aid caps are tightened and not leaking (for dishwashers). • Check for food buildup in the corners, around the control panel or dispenser (for dishwashers).

D. NOT DRYING/CLEANING EFFECTIVELY:
• Clean the lint screen after every load (for dryers).
• Check for kinks or obstructions in the dryer vent hose.
• Avoid overstuffing the dryer/dishwasher.
• Ensure you are using the correct detergent type and amount.
• Verify the water temperature setting (for dishwashers).
• Check spray arms for blockages (for dishwashers).

E. LONG CYCLE TIMES:
• Are you washing/drying large or heavily soiled loads?
• Are you using the appropriate cycle type (e.g., synthetics vs. heavy duty)?

F. UNUSUAL SOUNDS (SQUEALING, THUMPING, GRINDING):
• Could indicate worn rollers, an idler pulley, or a broken belt (for dryers).
• Could indicate an issue with the motor or pump (for washing machines/dishwashers).

G. SMELL OF OILY/BURNING HEAT:
• Immediately investigate and stop using the appliance. Do not use it until the issue is resolved. This could indicate an electrical problem. Taking proper care of your new electric appliance from the beginning is the best way to ensure it has a long and efficient life. When an error code appears, knowing how to troubleshoot and document the issue can save you time and money.

Long-Term Care for Your New Electric Appliance

- **Read the Manual (and Keep it!):** This cannot be stressed enough. Your appliance's manual is the definitive guide to its operation, maintenance, and troubleshooting. It contains specific cleaning instructions, information on error codes, and safety warnings unique to your model. Store it in a safe place or take a photo of the most important pages.
- **Follow the Manufacturer's Instructions:** Adhere to the recommended usage guidelines. Don't overload the machine, use the correct type of detergent or cleaning solution, and respect the appliance's capacity limits.
- **Regular Cleaning and Maintenance:**
    - **Refrigerators:** Regularly vacuum the condenser coils on the back or bottom to ensure proper cooling and energy efficiency. Clean the door seals with a damp cloth to maintain a good seal.
    - **Washing Machines:** Leave the door and detergent drawer ajar after each use to prevent mold and mildew. Run a cleaning cycle (if available) monthly to remove residue. Clean the drain pump filter periodically.
    - **Dishwashers:** Clean the filter at the bottom regularly to prevent clogs. Use a dishwasher-specific cleaner to remove grease and mineral buildup.
    - **Dryers:** Clean the lint screen after every single load. This is a crucial safety step to prevent fires and ensure efficient drying.
    - **Ovens:** Wipe up spills as soon as they cool to prevent them from baking on. Use the self-cleaning function only when necessary and with proper ventilation.
- **Use Surge Protectors:** Modern electric appliances have sensitive electronic control boards. A quality surge protector can shield them from damaging power fluctuations and lightning strikes.

How to Proceed with an Error Code Before Calling a Technician

When an error code appears on your appliance, don't panic. Follow these steps methodically before assuming you need a costly repair.

1. **Check the Manual:** Look up the exact error code in your user manual. This is the single most important action you can take. The manual will tell you what the code means and provide a step-by-step troubleshooting guide.
2. **Perform a Hard Reset:** Many error codes are caused by a temporary electronic glitch. Unplug the appliance from the wall for a few minutes (check the manual for the specific time, but 2-5 minutes is a good start), then plug it back in. This often clears the error and allows the machine to function normally.
3. **Check for Simple, Obvious Causes:** Before assuming a part is broken, check for common issues.
    - **Washing Machine/Dishwasher:** Is the water supply valve fully open? Is the door securely latched? Are the drain hoses kinked or blocked? Is the drain filter clogged?
    - **Dryer:** Is the lint filter clean? Is the exhaust vent to the outside clear and not crushed?
    - **Oven/Stove:** Are the wires and connections to the heating element secure and undamaged? (Only do this with the power off). Is the oven door fully closed?
4. **Listen and Look:** Pay attention to any unusual sounds or sights. Blinking lights, clicking noises, or the smell of burning plastic or ozone can provide valuable clues about the problem. A strange sound might indicate a foreign object is caught in a moving part, for instance.

Evidence to Collect for a Technician or Warranty Claim

If the problem persists and you need to call a professional or make a warranty claim, having the right evidence can significantly streamline the process.

- **Proof of Purchase:** This is your most critical piece of evidence. Keep your original receipt, invoice, or a digital copy of it in a safe place. It proves you own the appliance and validates the purchase date, which is essential for warranty coverage.
- **Model and Serial Number:** Take a photo of the appliance's data plate, which is a sticker or

metal plate with the model number, serial number, and other technical information. This is often located inside the door, on the back, or under the appliance.

- **Documentation of the Problem:**
    - **Take Photos and Videos:** Capture the error code on the display. Take a video of the appliance while the error is occurring, showing any unusual sounds, flashing lights, or other symptoms.
    - **Create a Timeline:** Write down a chronological account of the events. Note the date and time the error first appeared, what you were doing when it happened, and what troubleshooting steps you took (e.g., "On [Date], the appliance showed code E1 while running a normal cycle. I unplugged it for 10 minutes, and the code was gone. It returned 3 days later.").
    - **Document All Communication:** Keep a log of every phone call, email, or text message you have with the manufacturer or repair service. Note the date, time, who you spoke with, and a summary of the conversation.

By following these steps, you not only increase the chance of resolving the issue yourself but also prepare all the necessary information for a technician, saving time and money in the event of a more complex problem.

2. General Instructions for Electric Domestic Appliances

2.1 Maintaining Front-Loading Washing Machines

DO NOT OVERLOAD! Read at page 14.

2.1.1 CLEAN THE GASKET/DOOR SEAL REGULARLY:

• **Frequency:** After every few washes or at least weekly.
• **Method:** This rubber seal is a prime spot for mildew and trapped debris (hair, lint, small items). Pull back the folds of the seal and wipe thoroughly with a damp cloth. For stubborn mould, use a solution of equal parts white vinegar and water, or a dedicated cleaner. Always dry the seal after your final load of laundry for the day.
• **Why it's important:** Prevents mold and odours, extends the life of the seal.

2.1.2 CLEAN THE DETERGENT DISPENSER:

• **Frequency:** At least once a month.
• **Method:** Pull the detergent drawer out completely (most are removable). Rinse it under warm water to wash away any caked-on detergent, fabric softener, or bleach residue. Use a brush or an old toothbrush to get into crevices. Also, clean inside the housing itself. • **Why it's important:** Ensures proper dispensing of products and avoids blockages.

2.1.3 RUN A TUB CLEAN CYCLE (OR HOT WATER/SANITISE/SELF-CLEAN CYCLE):

• **Frequency:** Monthly.
• **Method:** Consult your specific manual for instructions. Most machines have a dedicated "Tub Clean," "Sanitise," or "Self-Clean" cycle. If yours doesn't, run the hottest, longest available cycle (e.g., "Cottons," "Heavy Duty") with no laundry, and add a cup of white vinegar directly to the drum (or a specialised washing machine cleaner).
• **Why it's important:** Removes detergent buildup, bacteria, and odours.

2.1.4 CLEAN THE DRAIN HOSE/PUMP FILTER:

• **Frequency:** If you notice drainage issues or about every 3-6 months.
• **Method:** This is usually located behind a small access panel at the bottom front of the machine. Place a shallow pan and towels underneath to catch any water. Slowly unscrew the filter (counter-clockwise). Be prepared for water to drain out. Remove any lint, coins, or other foreign objects. Rinse the filter and the housing where it sits.
• **Why it's important:** Keeps the machine working efficiently and prevents errors.

2.1.5 LEAVE THE DOOR AJAR AFTER USE:

• **Frequency:** After every wash.
• **Method:** Simply leave the washing machine door slightly open. This allows air to circulate and helps prevent the growth of mold and the primary cause of musty odours. • **Why it's important:** Crucial for preventing mold and odours.

2.1.6 WIPE DOWN SURFACES AS NEEDED:

• **Frequency:** As needed.
• **Method:** Simply dust and wipe up any spills or gooey residue around the control panel and exterior.
• **Why it's important:** Maintains cleanliness and appearance.

2.2 Maintaining Electric Dryers

DO NOT OVERLOAD! Read at page 16.

2.2.1 CLEAN THE LINT FILTERS AFTER EVERY LOAD:

• **Frequency:** Every single load.

• **Method:** This is a critical task. Accumulated lint is a fire hazard and reduces drying efficiency. Simply pull out the filters and remove the lint.

• **Why it's important:** Prevents fires and ensures efficient drying.

2.2.2 CLEAN THE VENTING SYSTEM (DUCT) ANNUALLY:

• **Frequency:** Annually.

• **Method:** This involves moving the dryer away from the wall and disconnecting the flexible or rigid duct. Use a vacuum cleaner with a long hose attachment or a specialised dryer vent cleaning kit (available at hardware stores) to clean the entire length of the duct, both from the dryer side and from the exterior vent hood.

• **Why it's important:** Prevents fires and maintains drying efficiency.

2.2.3 CHECK THE EXTERIOR VENT HOOD:

• **Frequency:** Annually, or if you notice reduced airflow.

• **Method:** Go outside and check the exterior flap of the dryer vent. Ensure it's not blocked by lint, bird nests, or other debris.

• **Why it's important:** Ensures proper airflow and prevents blockages.

2.2.4 WIPE DOWN SURFACES:

• **Frequency:** As needed.

• **Method:** It's extremely easy for dust, lint, and dryer sheet residue to accumulate on and around the dryer. Use an all-purpose cleaner and a non-abrasive rag. For sticky residue from dryer sheets, rubbing alcohol on a rag works well.

• **Why it's important:** Maintains cleanliness and appearance.

2.2.5 AVOID OVERSTUFFING THE DRYER:

• **Method:** Overstuffing prevents proper tumbling, increases drying time, and can lead to wrinkled clothes.

• **Why it's important:** Ensures efficient drying and reduces wrinkles.

2.3 Maintaining Refrigerators/Freezers

DO NOT OVERLOAD! Read at page 18.

2.3.1 CLEAN CONDENSER COILS:

• **Frequency:** Every 6-12 months.

• **Method:** Unplug the refrigerator first. The coils are usually located at the bottom (behind a grille) or at the back. Use a vacuum cleaner with a brush attachment to remove dust, pet hair, and debris. If there's an inch or more of dust, your refrigerator has to work harder, which shortens its life and increases energy consumption.

• **Why it's important:** Improves efficiency and extends the life of the appliance.

2.3.2 CHECK DOOR SEALS/GASKETS:

• **Frequency:** Every few months.

• **Method:** Close the door on a dollar bill or a piece of paper. If you can easily pull it out, the seal isn't tight enough. Clean the seals with warm, soapy water. If they are cracked or brittle, they may need replacing.

• **Why it's important:** Prevents cold air from escaping, saving energy and keeping food fresh.

2.3.3 MAINTAIN OPTIMAL TEMPERATURE:

• **Frequency:** Regularly monitor.

• **Method:** The ideal temperature for a refrigerator is between 2◦C and 4◦C (35◦F and 40◦F), and for a freezer, it's –18◦C (0◦F). Use an appliance thermometer to verify.

• **Why it's important:** Prevents food spoilage and optimises energy usage.

2.3.4 KEEP IT PACKED (BUT NOT OVERPACKED):

• **Method:** A full refrigerator runs more efficiently than an empty one, as the food items absorb cold and help maintain temperature. However, don't overpack it, as this can block air circulation.

• **Why it's important:** Optimises energy efficiency.

2.3.5 DEFROST REGULARLY FOR NON-AUTOMATIC DEFROST MODELS:

• **Frequency:** As needed, when ice buildup is about 0.6 cm (1/4 inch) thick. • **Method:** Unplug the unit, remove all food, and allow the ice to melt naturally. You can speed up the process with bowls of hot water. Never use sharp objects to chip away ice. • **Why it's important:** Ensures efficient operation and prevents damage.

NOTE: Even though "frost-free" or "auto-defrost" refrigerators are designed to prevent significant ice buildup, a manual defrost once a year is a great practice for several reasons: • **Clears Hidden Ice:** The auto-defrost system deals with the evaporator coils, but small amounts of ice can still build up in air ducts, vents, or other hidden areas over time. This can impede airflow and reduce efficiency.

• **Prevents Clogs:** The melted frost (water) drains away through a small tube. This tube can sometimes get clogged with food particles or ice. A full manual defrost ensures this drain line is completely clear, preventing future leaks or ice blockages.

• **Improves Efficiency:** Any ice buildup, even minor, makes your refrigerator's compressor work harder to maintain the set temperature, which uses more electricity. A full defrost and clean can restore it to peak efficiency.

• **Opportunity for a Deep Clean:** It's the perfect time to completely empty the appliance, properly clean all the shelves, drawers, and interior surfaces, and get rid of any forgotten food items. This is great for hygiene.

So, treating it as an annual maintenance task is a smart way to prolong the life of your appliance, save energy, and keep it hygienic.

2.3.6 CHECK THE DRAIN PAN/HOSE:

• **Frequency:** Annually.

• **Method:** The drain pan collects condensation. Check it for stagnant water or mold growth. The drain hole (usually at the back of the refrigerator compartment) can get clogged. Use a cotton swab or small pipe cleaner to clear it.

• **Why it's important:** Prevents water leaks and odours.

2.3.7 ENSURE PROPER AIR CIRCULATION:

• **Method:** Don't push the refrigerator too close to the wall. Leave a few inches of space behind and on the sides for air to circulate around the coils.

• **Why it's important:** Prevents overheating and improves efficiency.

2.3.8 LISTEN FOR GURGLING/BUBBLING NOISES:

• **Method:** These are normal sounds of refrigerant circulating. If you hear unusual or loud noises, it might indicate a problem.

• **Why it's important:** Helps identify potential issues early.

2.3.9 CHECK ICE MAKER/WATER DISPENSER:

• **Method:** Ensure the ice maker is "on" and the water line isn't frozen or kinked. Replace the water filter regularly if your model has one.

• **Why it's important:** Ensures proper function and water quality.

Step-by-Step Defrosting General Rules

1. Preparation and Safety

- **Plan Ahead:** Defrost when your frozen stock is minimal.
- **Pre-Cool:** About 12 hours before starting, set the freezer temperature to its coldest setting (e.g., use the **FastFreeze** function) to build up a cold reserve.
- **Power Off: Crucially, unplug the fridge freezer from the wall socket.** Do not rely solely on the 'Off' setting on the thermostat.
- **Empty Contents:** Remove all food, shelves, and drawers.
    - **Food Storage:** Place all frozen food in an **insulated cooler bag or box** with several **ice packs**. Food will remain safe for a few hours. The recommended safe storage temperature for frozen food is **–18◦C** or colder.

2. Protect the Area & Collect Water

- **Floor Protection:** Place **thick towels, newspaper, or plastic sheeting** on the floor around the base of the appliance to absorb the melting water.
- **Drainage (if available):** If your model has a **drain hole or drainage channel/hose**, ensure it is clear and position a shallow container or bucket to collect the meltwater. You may need to gently tilt the appliance slightly backwards (if safe to do so) to help water flow to the drain.

3. Melting the Ice (Speeding Up the Process)

Allowing the ice to melt naturally with the door open is the safest method, but you can accelerate it:

- **Hot Water Method (Recommended):**
    - Place a **bowl or pot of hot (not boiling) water** on a folded towel or trivet inside the freezer compartment.
    - **Close the door** for 15 to 30 minutes. The steam will quickly loosen the ice.
    - Replace the water with fresh hot water as it cools.
- **Air Circulation:** Place a **fan** outside the unit to blow room-temperature air directly into the open freezer compartment.
- **Critical Safety Warning:**
    - **NEVER** use sharp or metal objects (knives, screwdrivers, metal scrapers) to chip at the

ice. You risk puncturing the evaporator coils, causing an irreparable leak of refrigerant gas.
    - Use only a **plastic scraper, spatula, or wooden spoon** to gently remove large, loose chunks of ice that have already separated from the wall.
    - Do not use electrical appliances like hair dryers or heat guns inside the compartment due to the risk of electric shock from water.

4. Final Clean and Restart

- **Mop Up:** Use towels or a sponge to completely soak up all meltwater and ice residue.
- **Clean:** Wipe down the interior with a solution of **warm water and mild dish soap**, or a gentle mix of water and baking soda.
- **Dry: Wipe the entire interior thoroughly dry.** Any moisture left will immediately freeze when the unit restarts.
- **Restart:** Plug the appliance back in. Wait for the freezer temperature to drop to a safe level (ideally **–18◦C**) before returning the frozen food. This can take several hours depending on the ambient temperature and the appliance model.

2.4 Maintaining Electric Ovens/Cooktops

DO NOT OVERLOAD! Read at page 22 and 24.

2.4.1 CLEAN SPILLS IMMEDIATELY:
• **Frequency:** After every use.
• **Method:** Food spills, especially sugary ones, can bake onto the surface and become much harder to remove later. For electric cooktops, wait until the surface is cool. For ovens, wipe up messes as soon as they cool down.
• **Why it's important:** Prevents stubborn stains and smoke.

2.4.2 SELF-CLEAN CYCLE (IF AVAILABLE):
• **Frequency:** Every 3-6 months, or as needed for heavy buildup.
• **Method:** Remove all racks and foil before starting the cycle. The oven will heat to a very high temperature, turning food residue into ash. Wipe away the ash once the oven has cooled. Ensure good ventilation during this process.
• **Why it's important:** Deep cleans the oven effectively.

2.4.3 CLEAN OVEN RACKS:
• **Frequency**: As needed.
• **Method:** If your racks can't go through the self-clean cycle, soak them in hot, soapy water in a bathtub or large utility sink overnight. Then scrub them clean. You can also use specialised oven rack cleaners.
• **Why it's important:** Maintains cleanliness and prevents food buildup.

2.4.4 CLEAN GLASS OVEN DOORS:
• **Frequency**: As needed.
• **Method:** For stubborn baked-on grease, make a paste of baking soda and a little water. Spread it on the glass, let it sit for a few hours (or overnight), then scrub and wipe clean. • **Why it's important:** Improves visibility and aesthetics.

2.4.5 CLEAN CERAMIC/GLASS COOKTOPS:
• **Frequency:** After every use.
• **Method:** Use a specialised ceramic cooktop cleaner and a non-abrasive pad/scrubber. For burnt-on spots, hold a razor blade at a 45-degree angle and carefully scrape them off. • **Why it's important:** Maintains appearance and prevents scratches.

2.4.6 CLEAN ELECTRIC COIL COOKTOPS:
• **Frequency**: As needed.
• **Method:** Remove the coils and drip pans. Wash the drip pans with warm, soapy water. For stubborn stains, you might need to scrub with a non-abrasive cleaner. Clean the area underneath the coils.
• **Why it's important:** Maintains cleanliness and efficiency.

2.4.7 CHECK OVEN/COOKTOP CONTROLS:
• **Frequency:** Periodically.
• **Method:** Ensure knobs turn smoothly and digital controls respond correctly. If a knob is loose or a button is stuck, it might need attention.
• **Why it's important:** Ensures proper operation.

2.4.8 CHECK OVEN LIGHT BULB:
• **Method:** If the light isn't working, ensure it's screwed in firmly. If it's still out, replace the bulb (ensure it's a high-temperature appliance bulb).
• **Why it's important:** Provides visibility inside the oven.

2.5 Maintaining Dishwashers

DO NOT OVERLOAD! Read at page 20.

2.5.1 SCRAPE PLATES (NO PRE-RINSING NEEDED):
• **Method:** Modern dishwashers are designed to handle food particles. Simply scrape off large food scraps into the garbage disposal or bin. Pre-rinsing can actually make the detergent less effective.
• **Why it's important:** Ensures effective cleaning and saves water.

2.5.2 CLEAN THE FILTER:
• **Frequency:** Monthly or as needed if dishes aren't getting clean.
• **Method:** Most dishwashers have a removable filter at the bottom. Twist it out, rinse it under running water to remove food particles, and use a brush for stubborn bits.
• **Why it's important:** Prevents redepositing of food particles onto dishes.

2.5.3 CLEAN THE SPRAY ARMS:
• **Frequency:** Every few months.
• **Method:** Remove the upper and lower spray arms (they usually twist off). Check the small holes (jets) for blockages from food particles or mineral buildup. Use a toothpick or small wire to clear them.
• **Why it's important:** Ensures proper water distribution for effective cleaning.

2.5.4 LOAD CORRECTLY:
• **Method:** Don't overcrowd the dishwasher. Ensure dishes aren't blocking the spray arms or detergent dispenser. Place bowls and cups face down.
• **Why it's important:** Allows water and detergent to reach all surfaces.

2.5.5 USE RINSE AID:
• **Method:** Rinse aid helps water sheet of dishes, preventing spots and streaks, especially in hard water areas.
• **Why it's important:** Improves drying and prevents water spots.

2.5.6 ADDRESS HARD WATER/FILM BUILDUP:
• **Frequency**: As needed.
• **Method:** If you notice a white film on your dishes or the dishwasher interior, run an empty cycle with a cup of white vinegar in a top-rack safe bowl, or use a specialised dishwasher cleaner.
• **Why it's important:** Maintains cleaning effectiveness and appearance.

2.5.7 CLEAN THE EXTERIOR AND CONTROL PANEL:
• **Frequency**: As needed.
• **Method:** Wipe down the exterior with a damp cloth. For stainless steel, use a stainless steel cleaner.
• **Why it's important:** Maintains cleanliness and appearance.

2.5.8 RUN AN EMPTY CYCLE WITH DISHWASHER CLEANER:
• **Frequency:** Every 1-3 months.
• **Method:** Use a commercial dishwasher cleaner or run an empty cycle with a cup of white vinegar in the top rack.
• **Why it's important:** Deep cleans the interior and removes odours.

2.5.9 CHECK FOR LOW WATER PRESSURE:

- **Method:** If dishes aren't getting clean, ensure your home's water pressure is adequate.
- **Why it's important:** Essential for effective washing.

2.5.10 CHECK GARBAGE DISPOSAL (IF CONNECTED):

- **Method:** If your dishwasher drains into a garbage disposal, ensure the disposal is clear and running well. A clogged disposal can cause dishwasher drainage issues.
- **Why it's important:** Prevents drainage problems.

3. GENERAL GUIDE ON HOW TO LOAD MY APPLIANCES

3.1 GENERAL GUIDE ON HOW TO LOAD MY APPLIANCES. GENERAL GUIDE ON HOW TO LOAD MY APPLIANCES. HOW TO LOAD MY WASHING MACHINE / WASHER DRYER

This guide provides general instructions for loading two common types of laundry appliances: a washing machine and a washer-dryer combination unit. Following these steps will help you achieve clean, well-cared-for clothes while preventing damage to your appliances.

Step 1: Check Garment Care Labels

Before loading, always check the care labels on your clothes. This will give you important information on washing and drying instructions, such as:

- **Washing temperature:** Hot, warm, or cold water.
- **Cycle type:** Normal, permanent press, or delicate.
- **Drying instructions:** Tumble dry (high, medium, low heat), or hang dry.

Step 2: Sort the Laundry

Sorting is crucial for a successful wash. Separate your laundry into piles based on:

- **Colors:** Divide clothes into whites, lights, and darks to prevent color bleeding.
- **Fabric Type:** Separate heavy, sturdy fabrics (like towels and jeans) from delicate items (like lingerie and silk) to prevent damage from abrasion.

Step 3: Prepare Clothes

- **Empty all pockets** to prevent items like coins, keys, or tissues from damaging the machine or your clothes.
- **Close all zippers and hooks** to prevent them from snagging on other items.
- **Unroll socks and sleeves** to ensure a thorough wash.
- **Place small or delicate items** in a mesh laundry bag for added protection.
- **Turn dark clothes inside out** to help prevent fading.

Step 4: Add Detergent

Refer to your detergent's instructions and your machine's manual to determine the correct amount. Add the detergent to the designated dispenser drawer or directly into the drum, depending on your machine's model.

Step 5: Load the Machine and Avoid Overloading

For Washing Machines (Washing Only) An overloaded washing machine will not clean clothes effectively and can cause damage to the appliance. As a general guideline:

- **Front-load washers:** Fill the drum no more than three-quarters full. Clothes need room to tumble and circulate properly for a good clean.
- **Top-load washers:** Do not load clothes above the top of the agitator (the central column) if your machine has one. If it doesn't, do not fill the drum to the very top.
- **The "Hand's Width" Rule:** A simple way to check if you have overloaded a front-load machine is to place your hand vertically into the top of the drum after loading. You should be able to comfortably fit your hand in the space above the clothes. If you can't, remove some items.

For Washer-Dryer Combination Units

- **The drying capacity is always less than the washing capacity.** This is a critical difference to understand. Clothes need more space to tumble and dry effectively.
- **Do not load the machine to its full washing capacity if you intend to run a continuous wash-and-dry cycle.**
- **Consult your machine's manual for specific capacity limits.** For example, a machine with a 9 kg washing capacity might only have a 6 kg drying capacity. If you load it with a full 9 kg for a wash-and-dry cycle, the clothes will not dry properly and may come out wrinkled and damp.
- **If you have a full wash load, you must remove some items before beginning the drying cycle.**

Step 6: Select the Cycle and Start

Close the door firmly. Choose the appropriate wash cycle, temperature, and spin speed for your laundry. If you are using a washer-dryer combination, you may select a continuous wash-and-dry cycle or separate cycles for washing and drying. Press the "Start" button to begin the cycle.

3.2 HOW TO LOAD MY DRYER

This guide provides general instructions for loading a clothes dryer and preventing overloading. Following these steps will help you achieve dry, well-cared-for clothes and prevent damage to your appliance.

Step 1: Check Garment Care Labels

Before loading, always check the care labels on your clothes. This will give you important information on drying instructions, such as:

- **Drying temperature:** High, medium, low, or no heat.
- **Tumble drying instructions:** Some items may be "Tumble dry low" or "Do not tumble dry."
- **Special instructions:** Air-dry, lay flat to dry, or other specific methods.

Step 2: Prepare Clothes for Drying

- **Shake out each item** before placing it in the dryer. This helps to separate clothes, reduce wrinkles, and speed up the drying process.
- **Check pockets again** for any forgotten items.
- **Separate heavy items** (like towels and jeans) from lighter items to ensure a more even and efficient drying process. Heavy items can retain moisture and cause the cycle to run longer than necessary for the rest of the load.

Step 3: Clean the Lint Filter

This is a critical safety step. A clogged lint filter is a fire hazard and can also reduce the efficiency of your dryer.

- Locate the lint filter, which is typically found inside the dryer door or on top of the machine.
- Remove the filter and wipe away all accumulated lint with your hand.
- Place the clean filter back in its proper position.

Step 4: Load the Dryer Without Overloading

This is one of the most important steps for effective drying and appliance longevity. An overloaded dryer will not dry clothes effectively and can strain the motor.

- **Fill the drum no more than one-half to two-thirds full.** Clothes need plenty of space to tumble and circulate freely.
- **The "Hand's Width" Rule:** A simple way to check if you have overloaded the machine is to place your hand into the top of the drum after loading. You should be able to comfortably fit your hand in the space above the clothes. If you can't, remove some items.
- **Add a dryer sheet (optional):** If you use dryer sheets for static cling and scent, add one or two sheets to the drum with your clothes.

Step 5: Select the Cycle and Start

- **Close the door firmly.**

- **Select the appropriate drying cycle and temperature** based on the items in your load (e.g., "Normal/Cottons" for heavy items, "Delicates/Low Heat" for sensitive fabrics).
- **Set the desired dryness level,** if your machine has this feature (e.g., "Damp," "Less Dry," "Dry").
- **Press the "Start" button** to begin the cycle.

3.3 HOW TO LOAD MY FRIDGE / FREEZER

This guide provides general instructions for loading a refrigerator and freezer to ensure food safety, maximize freshness, and maintain appliance efficiency. It addresses the risks of both overloading and leaving the appliance too empty. Always consult the manufacturer's user manual for your specific model, as it may have unique features, temperature zones, or loading recommendations.

1. Consult Your Manufacturer's User Manual

Before you begin, review the manual that came with your appliance. It contains vital information tailored to your model, including:

- **Recommended Temperature Settings:** The manual will tell you the optimal temperature settings for both the fridge and freezer.
- **Location of Vents and Sensors:** Knowing where the cooling vents and temperature sensors are located is critical for proper air circulation.
- **Specialized Compartments:** Your fridge may have special drawers for different food types (e.g., a "crisper" for vegetables or a "chiller" for meat). The manual will explain how to use these correctly.

2. Set the Correct Temperatures

Maintaining the correct temperatures is the single most important factor for food safety and freshness.

- **Refrigerator:** The ideal temperature is **4°C or below**. This temperature range slows the growth of most bacteria.
- **Freezer:** The ideal temperature is **-18°C or below**. At this temperature, bacteria become inactive, and food can be stored indefinitely from a safety standpoint, though quality may decline over time.

3. Loading the Refrigerator: The "Full, but Not Too Full" Rule

A refrigerator works most efficiently when it is full, but not overstuffed. Food items act as a thermal mass, helping to absorb and hold cold air, which means the compressor doesn't have to work as hard to maintain a consistent temperature every time the door is opened.

- **Do Not Overload:** Overloading blocks air circulation, leading to uneven cooling. This can cause some food to spoil faster and put a strain on the compressor. Aim to keep the refrigerator about **75% full**, leaving enough space for air to circulate freely around every item.
- **Do Not Leave it Empty:** An empty fridge requires more energy to cool down every time the door is opened, as there is nothing inside to help retain the cold. If your fridge is consistently empty, consider filling empty spaces with pitchers of water or empty bottles. These will act as a thermal mass to help hold the cold.

4. Refrigerator Organization: By Temperature Zone

A refrigerator does not have a uniform temperature throughout. The door is the warmest, while the bottom shelf is the coldest. Load your food strategically based on these zones.

- **Top and Middle Shelves:** Best for ready-to-eat foods that don't require the coldest temperature. This includes leftovers, deli meats, cooked foods, and herbs.
- **Bottom Shelf:** This is the coldest part of the fridge. It's the safest place to store raw meat, poultry, and seafood. Place them in sealed containers to prevent any drips from contaminating other foods below.
- **Crisper Drawers:** Designed to control humidity levels for different types of produce.
    - **High-Humidity Drawer:** Ideal for leafy greens (lettuce, spinach), herbs, and vegetables that wilt easily.
    - **Low-Humidity Drawer:** Best for fruits and vegetables that release ethylene gas (such as apples, pears, and avocados), which can cause other produce to ripen and spoil faster.
- **Door Shelves:** This is the warmest area. Use it for condiments, juices, salad dressings, and other items with natural preservatives that can handle temperature fluctuations. Avoid storing milk and eggs here.

5. Loading the Freezer: The "More is Better" Rule

A full freezer is more efficient than an empty one because the frozen items act as a thermal mass, helping to maintain the cold temperature. This reduces the energy needed to keep the freezer cold.

- **Aim for Full Capacity (Without Overloading):** A freezer that is at least **70-85% full** will run most efficiently. The dense, frozen items will hold the cold better and reduce the workload on the appliance's motor.
- **Avoid Overstuffing:** While a full freezer is good, overstuffing can still be a problem. Ensure you leave enough space for cold air to circulate around the vents. If you can't easily slide items around, it's too full.
- **Do Not Leave it Empty:** If your freezer is consistently empty, fill empty spaces with plastic bags or empty boxes. If you're freezing a liquid, like soup, place it in a freezer bag, seal it, lay it flat to freeze, and then store it vertically to save space.
- **Organize for Efficiency:** Group similar items together using bins or baskets (e.g., one for vegetables, one for meat). For chest freezers, store items vertically to make it easier to find what you need without letting all the cold air escape.
- **Label and Date Everything:** Always label the contents and the date on homemade items and repackaged foods. This prevents "freezer burn" and ensures you use older items first.

3.4 HOW TO LOAD MY DISHWASHER

This guide provides general instructions for loading a dishwasher to ensure everything gets washed properly, while avoiding the pitfalls of both overloading and running an empty cycle.

1. Scrape, Don't Rinse

Contrary to popular belief, you don't need to pre-rinse your dishes. Dishwashers and modern detergents are designed to clean dishes with some food residue on them.

- **Scrape off large food particles:** Scrape leftover food into the trash or compost.
- **Do not pre-rinse:** A small amount of food helps activate the enzymes in the detergent, which are designed to break down food particles.

2. Arrange Items for Proper Water and Detergent Circulation

The key to a successful wash is ensuring that water and detergent can reach every surface.

- **Don't overcrowd:** Overloading is a common mistake. It blocks water jets from reaching all items, leaving them dirty.
- **Keep similar items together:** Place all glasses on the top rack, and all plates on the bottom rack. This makes loading and unloading more efficient.
- **Face items toward the center:** Angle the dirtiest parts of your dishes toward the water jets, which are usually located in the center of the dishwasher.
- **Avoid "nesting":** Don't stack or overlap items. This is especially true for bowls and spoons, which can "nest" together, preventing water from reaching their inner surfaces.
- **Keep plastics on the top rack:** The heating element is typically at the bottom of the dishwasher, and the high heat can melt or warp plastic items.

3. Load the Racks Correctly

- **Bottom Rack (Plates, Pots, Pans):**
    - Place large plates, platters, and baking dishes along the sides and back.
    - Face the dirty side of bowls toward the center.
    - Ensure no large items are blocking the detergent dispenser or the spray arms.
- **Top Rack (Glasses, Mugs, Small Bowls):**
    - Place glasses and mugs upside down and between the tines to prevent water from pooling.
    - Secure wine glasses and other tall items to prevent them from tipping over.
    - Load small bowls and lightweight plastics.
- **Cutlery Rack/Basket:**
    - **If using a basket:** Mix spoons, forks, and knives to prevent them from nesting together. Place sharp knives handle-up for safety. For forks and spoons, place some handle-up and some handle-down for a better clean.
    - **If using a cutlery rack (top tray):** Place each item individually in its designated slot. This ensures maximum water exposure for each piece.

4. The "Full, but Not Too Full" Rule

A dishwasher runs most efficiently when it's full, but not overstuffed.

- **When it's Too Empty:** Running a cycle with only a few items is a waste of water and energy. Wait until you have enough dishes to fill the machine properly.
- **When it's Too Full (Overloaded):** When the dishwasher is packed, water jets cannot reach all the surfaces. This results in dirty dishes and the need to re-wash items. A good rule of thumb is to ensure there is space between each item for water and air to circulate.

5. Add Detergent, Rinse Aid, and Salt

The type of detergent you use will determine what you need to add.

- **3-in-1 Tablets:** If you are using a 3-in-1 tablet, it contains detergent, salt, and rinse aid all in one. Simply place one tablet in the detergent dispenser. **Note:** For areas with very hard water, you may still need to add extra salt or rinse aid for optimal performance.
- **Powder or Gel Detergent:**
    - **Detergent:** Add the correct amount of powder or gel to the dispenser. Refer to the packaging for guidance.
    - **Rinse Aid:** Fill the rinse aid dispenser with rinse aid. This helps to prevent water spots and streaking, and also aids in drying.
    - **Dishwasher Salt:** Many dishwashers have a separate compartment for special dishwasher salt. This is used to soften hard water, which prevents limescale buildup on your dishes and inside the machine. Check the salt indicator light on your dishwasher and refill the compartment when needed.

By following these simple steps, you can ensure that your dishes come out sparkling clean every time, saving you time, water, and energy.

3.5 HOW TO LOAD MY OVEN

This guide provides general instructions for loading an oven to ensure proper cooking, maximize efficiency, and achieve the best results.

1. Preheat the Oven

Always preheat the oven to the specified temperature before placing food inside. Placing food in a cold oven can affect the cooking time, result in uneven cooking, and fail to create the desired texture, such as a crisp crust on bread or a golden-brown finish on roasted vegetables.

2. Select the Proper Rack Position

The oven's heat is not uniform. Hot air rises, so the top of the oven is generally the hottest, while the bottom is slightly cooler.

- **Top Rack:** Best for foods that need a deep golden brown finish or crisp top, such as casseroles, pizza, or some baked goods.
- **Middle Rack:** This is the most versatile position and provides the most even heat distribution. It is the go-to position for most dishes, including roasted meats, cookies, and cakes.
- **Bottom Rack:** Ideal for dishes that need a crisp bottom or for delicate items that may burn on the top. This is a good spot for pies and bread. It's also a good place for catching drips from a dish on a higher rack.

3. Use the Correct Bakeware and Cookware

Using the right bakeware is essential for proper heat transfer.

- **Glass or Ceramic:** These materials heat up slowly and hold heat well. They are great for casseroles and dishes that need to cook evenly for a long time. They can produce a darker, crispier bottom on some foods.
- **Metal:** Metal pans heat up quickly and transfer heat efficiently. They are excellent for baking cookies, pastries, and roasted vegetables. Dark metal pans can absorb more heat, leading to a darker crust, so adjust your temperature or time accordingly.
- **Avoid covering vents:** Never place aluminum foil or a large baking sheet on the bottom of the oven. This blocks the air vents and can lead to uneven cooking and a buildup of heat that can damage the oven.

4. Load the Oven with Proper Spacing

Overcrowding the oven is a common mistake that prevents proper air circulation and leads to uneven cooking.

- **Leave Space Around Items:** Ensure there is at least an inch or two of space between each item and the oven walls to allow for air to circulate freely.
- **Use a Single Rack When Possible:** If you are baking multiple trays of cookies or cakes, it's best to use a single rack on the middle level to ensure even cooking.
- **If Using Multiple Racks:** If you must use two racks, ensure there is plenty of space between the items on each rack. To promote even cooking, you may need to rotate the items halfway through the cooking time. For example, switch the trays from the top rack to the bottom and vice versa.

5. Rotate Items for Uniform Cooking

Many recipes recommend rotating a dish halfway through the cooking time. This is especially important for large items, such as roasts or turkeys, to ensure all sides cook evenly. Simply turn the pan 180 degrees.

6. Avoid Opening the Door Unnecessarily

Every time you open the oven door, the temperature inside can drop by as much as 25°C (75°F). This can significantly increase cooking time and affect the final result, particularly for delicate baked goods like cakes or soufflés. Use the oven light and the glass door to check on your food whenever possible.

By following these simple guidelines, you can ensure that your food cooks perfectly every time you use your oven.

3.6 HOW TO LOAD MY HOB

This guide provides general instructions for using an electric hob to ensure proper cooking, safety, and efficiency. This guide focuses on the three main types of electric hobs—ceramic (radiant), solid plate, and induction—and the different types of controls you may encounter.

General Safety Precautions (All Electric Hob Types)

- **Never leave a hob unattended while in use.** The heat can quickly cause food to burn or oil to catch fire.
- **Keep a fire extinguisher and a box of baking soda handy** in case of a grease fire. Never use water on a grease fire.
- **Keep flammable materials away** from the hob, including dish towels, paper, and curtains.
- **Use the correct cookware.** The pan's base should be flat and the same size as the cooking zone for maximum efficiency.
- **Keep children away** from the hob, as the surface can remain hot long after it's been turned off. Look for the residual heat indicator light.

Hob Types and Operation

1. Electric Hobs (Ceramic and Radiant)

These hobs have a smooth, easy-to-clean glass surface with a heating element (coil) underneath. The element heats up and transfers that heat to the pan.

- **How to Use:**
    1. Place your pan on the desired cooking zone before turning the hob on.
    2. Use the controls to select the zone and set the power level.
    3. The hob will gradually heat up, and you may see the element glow red. The surface will also become hot.
    4. Unlike gas, these hobs do not offer instant heat changes. The surface will take time to heat up and cool down. To stop cooking quickly, you may need to move the pan off the heat.
    5. Once you are finished, turn the hob off. A residual heat indicator light ("H") will stay on until the surface is cool enough to touch.

2. Electric Hobs (Solid Plate)

These hobs feature solid metal plates that sit on the surface. These are a less common, older style of electric hob.

- **How to Use:**
    1. Place your pan on the desired plate.
    2. Use the control knob to set the power level. The plate will gradually heat up, often becoming visibly red hot.
    3. Like ceramic hobs, these plates take a long time to heat up and cool down. You will need to anticipate this when cooking.
    4. Due to the slow cooling time, you can often turn the hob off a few minutes before the dish is finished and let the residual heat complete the cooking.

3. Induction Hobs

Induction hobs use electromagnetic energy to heat the cookware directly, while the hob surface itself remains cool (with some residual heat from the hot pan). They offer the precision of gas with the easy-to-clean surface of an electric hob.

- **How to Use:**
    1. Ensure you have **induction-compatible cookware.** You can check this by placing a magnet on the bottom of your pan; if it sticks, the pan will work.
    2. Place the compatible pan on the cooking zone.
    3. Use the controls to turn on the hob, select the zone, and set the power level.
    4. Induction hobs offer instant heat control, much like a gas hob, but with greater precision.
    5. The hob will only activate when it detects a compatible pan on the surface, making it safer than other hob types.

Hob Controls and How to Use Them

Electric hobs can have various control types. Here's how to operate them:

1. Rotary Knobs

This is the most traditional control type, common on all types of electric hobs.

- **How to use:** Twist the knob clockwise to increase the power and counter-clockwise to decrease it. The knob is often marked with numbers from 1 (low heat) to 9 (high heat) or a similar scale.

2. Touch Controls

These are a flat, glass surface with electronic controls. They are common on ceramic and induction hobs.

- **How to use:**
    - **Power On:** Press the power button to turn the hob on.
    - **Select Zone:** Tap the symbol for the cooking zone you want to use.
    - **Set Power Level:** Use "+" and "-" buttons, or a sliding bar, to set the desired power level. The level will be shown on a digital display.
    - **Lock Function:** Many touch-control hobs have a child safety lock. Press and hold the lock button to prevent accidental changes to the settings.
    - **Timer Function:** Many models have a built-in timer. You can set a timer for a specific cooking zone, and the hob will turn off automatically when the time is up.

3. Digital Display

Many hobs, especially induction models, have digital displays that show the power level, timer, and other functions.

- **How to use:** The digital display works in conjunction with touch controls or knobs to give you precise visual feedback on your settings. It's often used to show the power level (e.g., P1 to P9), a timer countdown, or a residual heat warning.