

ECO 700L GN210



700820

ENGLISH

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Read this instruction manual before using and keep them available at all times!

This instruction manual contains information about the installation, operation and maintenance of the device and should be consulted as an important source of information and reference guide.

Awareness of the safety instructions and instructions for use in this manual will ensure the safe and correct use of the device.

In addition to the information given here, you should comply with any local Health and safety Controls and generally applicable safety regulations.

The instruction manual forms part of the product and should be kept near the device and easily accessible for anyone carrying out the installation, servicing, maintenance or cleaning.

Please keep these instructions and give them to future owners of the device.

1. Safety

This device is designed in accordance with the presently applicable technological standards. However, the device can pose a danger if handled improperly and inappropriately.

All persons using the device must follow the recommendations and instructions in this instruction manual.

1.1 Key to symbols

In this manual, symbols are used to highlight important safety instructions and any advice relating to the device. The instructions should be followed very carefully to avoid any risk of accident, personal injury or material damage.



WARNING!

This symbol highlights hazards which could lead to injury.



WARNING!

This symbol highlights dangerous situations which could lead to injury or death.



FIRE HAZARD / FLAMMABLE MATERIALS HAZARD / EXPLOSION HAZARD!

This symbol highlights potentially dangerous situations which could lead to injury or death.



CAUTION!

This symbol highlights dangerous situations which could lead to light injuries, or damage, malfunction, and/or destruction of the device.



NOTE!

This symbol highlights recommendations and information aimed for effective and trouble-free device operation.

1.2 Safety instructions

- The device is not intended for use by individuals (including children) with physical or mental disabilities, insufficient experience, and/or insufficient knowledge unless such persons are under the care of a person responsible for their safety or have received instructions regarding appropriate use of the device.
- Children should be observed to ensure that they are not playing with or starting the device.
- Prevent access of children to the package materials like plastic bags and foamed polystyrene elements. **Suffocation hazard!**
- Keep the key to the control cabinet away from the reach of children.
- The device is for indoor use only.

- The device must be operated in correct and safe technical condition only. In case of operational problems disconnect the device from the power supply (pull the plug from the socket) and contact the service company.
- Only a qualified technician and using original spare parts and accessories should carry out repairs and maintenance of the device. **Do not attempt to repair the device yourself.**
- Do not use any accessory or spare parts that have not been recommended by the manufacturer. These can be dangerous for the user or lead to damages of the device or personal injury, and further, the warranty expires.
- To prevent hazards and to ensure optimum efficiency, no modifications or alterations to the device that are not explicitly approved by the manufacturer may be undertaken.



DANGER! Electric shock hazard!

To avoid the hazard results please follow the safety instructions below.

- Never allow the power cable to come into contact with heat sources or sharp edges. The power cable should not hang over the side of the working surface. Ensure that no one can step on or trip over the cable.
- The power cable must not be folded, bent or tangled, and must always remain fully unrolled. Never place the device or other objects on the power cable.
- Do not cover the cable. Keep away the cable from operating range and do not immerse it into water.
- Check the power cord regularly for damage. Do not use the device if the power cord is damaged. If this cable is damaged, it must be replaced by customer service or a qualified electrician in order to avoid dangers.

- The supply cable must be disconnected from the socket only by pulling the plug.
- Never carry or lift the device by the supply cable.
- In any case do not open the device housing. In case of electrical or mechanical modifications the **electric shock hazard** will occur.
- Do not use any acid agents and make sure no water ingresses the device.
- **Never** operate the device with moist hands or standing on wet floor.
- Remove the plug from its socket:
 - when the device is not used,
 - in case of anomalies during operation,
 - before cleaning.



FIRE HAZARD / FLAMMABLE MATERIALS HAZARD / EXPLOSION HAZARD!

Incorrect operation of the device may cause fire or explosion hazard due to ignition of its content.

To avoid the hazard please follow the safety instructions below:

- Do not use any electric devices in the device.
- Never use any flammable liquids for cleaning the device or its parts. Gases releasing during above activities may cause fire or explosion hazard.
- Do not store or use petrol or other flammable liquids and gases in the vicinity of this or any other device. Those gases may cause fire or explosion hazard.

- Do not put any explosive materials, like sprays filled with flammable propellants, into the device.
- The cooling system in the device may be damaged.

1.3 Proper use

The operational safety of the device is assured only in case of proper use, according to the operation manual.

All technical activities like installation and maintenance must be performed by the qualified service personnel only.

The refrigerator is designed only for cooling and storing of relevant beverages and food.

The refrigerator may not be used for:

- storing of flammable or explosive materials or fluids, like ether, alcohol, kerosene, or glues;
- storing of pharmaceutical products or preserved blood.



CAUTION!

Any use going beyond the intended purpose and/or any different use of the device is forbidden and is not considered as conventional.

Any claims against the manufacturer or his authorized representative as a consequence of experiencing damages resulting from unconventional use are impossible.

The operator is liable for all damages resulting from inappropriate use.

2. General information

2.1 Liability and Warrantees

All the information and instructions in this manual take into account standard safety regulations, current levels of technical engineering as well as the expertise and experience we have developed over the years.

The instruction manual was translated with all due care and attention. However, we do not accept liability for any translation errors. The German version of this instruction manual is definitive.

If the delivery consists of a special model, the actual scope of delivery may differ from the descriptions and illustrations in this manual. This is also the case for special orders or when the device has been modified in line with new technology.



CAUTION!

Read this manual carefully and thoroughly before any operation of the device, and especially before turning it on!

Manufacturer **is not liable** for any damages or faults caused by:

- violation of advice concerning operation and cleaning;
- use other than designed;
- alterations made by user;
- use of inadequate spare parts.

We reserve the right to make technical changes for purposes of developing and improving the useful properties.

2.2 Copyright protection

The instruction manual including any texts, drawings, images or other illustrations is copyright. No part of this publication may be reproduced, transmitted or used in any form or by any means without permission in writing from the manufacturer. Any person who commits any unauthorized act in relation to this publication shall be liable to claims for damages. All rights reserved.



NOTE!

The contents, texts, drawings, pictures and any other illustrations are copyright and subject to other protection rights. Any person unlawfully using this publication is liable to criminal prosecution.

2.3 Declaration of conformity



The device complies with the current standards and directives of the EU. We certify this in the EC declaration of conformity. If required we will be glad to send you the according declaration of conformity.

3. Transport, package, storage

3.1 Delivery check

Please check the delivery upon completeness and transport damage immediately after receipt. In case of visible damage do not accept or accept the delivery with reservation only.

Note the extent of damage on the carrier's bill of delivery. Trigger off the complaint.

Hidden damages should be reclaimed immediately after notice, as claims for damages can only be asserted within the effective period for complaints.

3.2 Packaging

Please do not throw away the covering carton of your device as it might be useful for storage purposes, when moving or, in case of damages, when the device must be sent back to a repair center. The outer and inner packing material should be removed completely from the device before installation.



Durante la recuperación del embalaje hay que cumplir los reglamentos vigentes del país dado. Los materiales de empaque con propiedades de reuso hay que reciclarlos.

Please inspect the device upon completeness. In case any part is missing please contact our customer service center immediately.

3.3 Storage

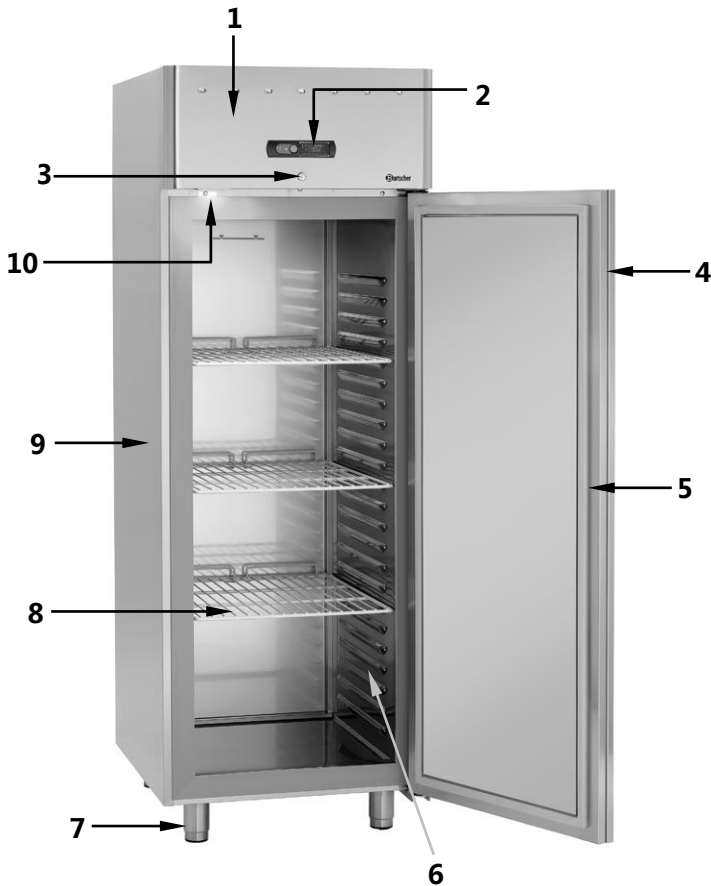
Keep the package closed until installation and under consideration of the outside indicated positioning- and storage markings.

Packages should be stored under consideration of the following:

- Do not store outdoors.
- Keep it dry and dust-free.
- Do not expose it to aggressive media.
- Do not expose it to direct sunlight.
- Avoid mechanical shocks and vibration.
- In case of longer storage (> 3 months) make sure you check the state of the packaging and the parts regularly.
If required refresh or renew.

4. Technical data

4.1 Overview of parts



- | | |
|----------------------------------|-------------------------------|
| 1 Electronics module | 6 Pre-formed bearing rails |
| 2 Digital temperature controller | 7 Height-adjustable feet (4x) |
| 3 Electronics module lock | 8 Grid (3x) |
| 4 Door | 9 Housing |
| 5 Door seal | 10 LED lighting |

4.2 Technical specification

Name	Refrigerator ECO 700L GN210
Code-No.:	700820
Material:	inside and outside: stainless steel
Realization:	<ul style="list-style-type: none">▪ Insulation: Polyurethane foam, 87.5 mm▪ Number of doors: 1, Type of door: leaf right side, door hinge side cannot be changed▪ Cooling: Circulating air▪ Thermostat▪ Automatic defrost function▪ Drip water evaporation▪ Control: electronic▪ LED lighting▪ Digital display▪ ON/OFF switch▪ Lockable▪ Height-adjustable feet (4x)▪ Control light: on/off, ready, temperature, fan, compressor, defrost, condenser filter cleaning
Capacity:	700 litres
Shelves:	<ul style="list-style-type: none">▪ Type: grille, plastic-coated▪ Number 3▪ Gastronorm size: 2/1 GN, Size: W 530 x D 650 mm▪ Height-adjustable▪ Pre-formed bearing rails
Temperature control:	Electronic in 0.1°C steps
Temperature range:	- 2 °C to 8 °C
Coolant:	R134a
Climate class:	5
Ambient temperature:	10 °C to 40 °C
Energy efficiency class:	A
Energy consumption:	337 kWh/year
Power:	0.12 kW / 230 V 50 Hz
Dimensions:	W 700 x D 830 x H 2020 mm
Weight:	130 kg

We reserve the right to implement the technical modifications!

5. Installation and operation

5.1 Installation



CAUTION!

The installation and connection of the device should be made only by qualified specialist establishment.

To avoid personal injury or damage to the device, we recommend two people unpack and install the device.

Location

- Unpack the device and remove and dispose of all package materials according to the environmental protection regulations.
- Leave the device on the palette.
- Move the device only by lifting up (e.g. using a fork lift) to avoid damage to feet or other accessories.
- You can remove the palette when the device is placed in the installation location. Pay attention not to hit the device.
- Place the device on a sturdy, dry, flat and water and heat-resistant surface that will support the weight of the fully loaded device.
- **Never** place the device on a flammable surface.
- You must **not** position the device near open fire, electric furnaces, heaters or other heat sources such as direct sunlight. High temperature may damage the surface of the device as well as impair cooling performance and increase energy consumption.
- To avoid damage to the compressor, do not tilt the device more than 45° during transport and installation.
- Place the device so that sufficient air circulation is ensured. Leave a 10 cm clearance before walls and other objects.
- Do not place the device in places of high air humidity. Excessive humidity may damage the device. The device reaches its optimal operational conditions at an ambient temperature from 10 °C to 40 °C and relative air humidity from 40% in the installation place.
- Place the device so that the plug is easily accessible so as to quickly disconnect the device if the need arises.
- Adjust the device using height-adjustable feet. Use a level, if needed. All feet must stand on the floor. Only in this way the correct door opening and closing may be ensured.

- Before the first use, remove the protective foil from the device. Remove the foil slowly not to leave glue residues. Remove possible glue residues with appropriate solvent.



CAUTION!

Never remove the rating plate and any warning signs from the device.

Electric connection



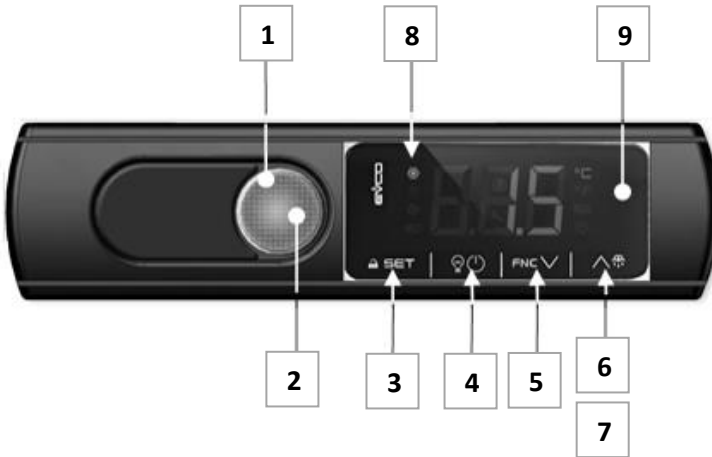
DANGER! Electric shock hazard!

**The device can cause injuries due to improper installation!
Before installation and connecting the local power grid specification should be compared with that of the device (see rating plate).**

Connect the device only in case of compliance!

- Before first connection to the electric power supply, the device should be left for at least 2 hours to let the refrigerant circulation calm down and avoid any malfunctions.
- If the device was not stored or transported in a vertical position, it should stand in a vertical position for about 12 hours before start-up.
- In case of loss of power supply or when the plug has been pulled out of the socket, do not connect the device to electric power supply for at least 5 minutes.
- The power supply circuit with the socket must be protected by the fuse of at least 16A. Connect the device only directly to a single grounded socket, do not use any splitters or multisockets.

5.2 Control panel elements








- 1 Main switch
- 2 Main switch control light
- 3 “SET” function key
- 4 Telethermostat ON/OFF key
ON /OFF control light
- 5 Temperature decrease button
- 6 Manual defrost button
- 7 Temperature increase button
- 8 LED light, ready
- 9 Digital telethermostat

5.3 Control panel functions







Device switch on / off

- Connect the device to a single grounded socket.
- Switch the device on with the main switch on the control panel The green on/off control light at the main switch comes on.

Thermostat switch on / off

- Press and hold the button  for a few seconds. LED light  starts flashing and the device switches on. LED light  is on when the device is on and is off then the devices switches off.
- Press the button  and hold for 3 seconds to turn the device off. LED light  flashes and then the device switches off.

Operating temperature setting

- When the device is operating the digital display shows the temperature in the cooling area.
- The user may set the - 2 °C to 8 °C temperature
- When you press the button  **SET** the digital display shows the set temperature. LED light  flashes.
- The digital display shows the temperature for 5 seconds. During that time you can increase or decrease the temperature using the button   and .
- Press the button  **SET** to confirm the setting.

Defrosting

- The digital telethermostat automatically controls the evaporator defrosting. The defrosting process is indicated by a relevant LED light.
- In this phase you must not place in or remove anything from the refrigerator.
- A relevant probe controls the end of the defrosting process. In particularly difficult operating conditions (high temperature and humidity in the room or when high moisture release products are added) a few additional defrosting processes should be performed manually. To do so, press and hold the button for a few seconds.



Button lock / unlock

Keypad lock:

1. Make sure no procedure is in progress.
2. Do not key in anything for 30 seconds; the display shows “**Loc**” message for 1 second and the keypad will be locked automatically.

To unblock the keypad:

1. Press and hold the button for 1 second: the display shows “**UnL**” message for 1 second.

LED light indications



This LED light shows the status (on or off) of the COMPRESSOR



This LED light shows that defrosting is in progress



This LED light shows the status (on or off) of the BLOWER



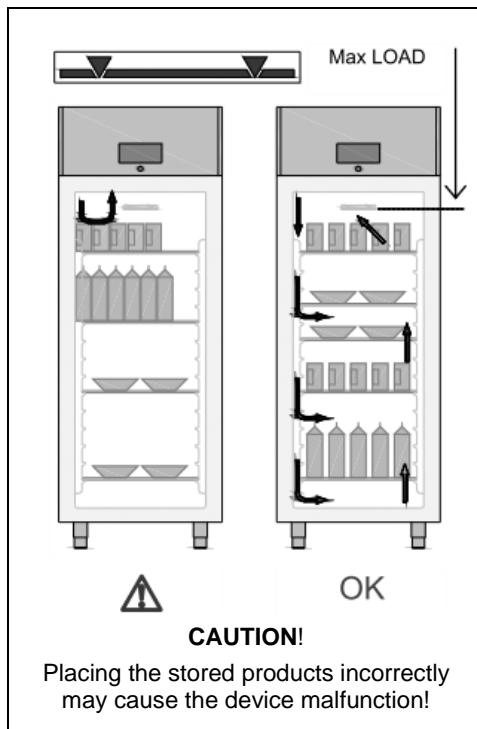
When this LED light is on, it is necessary to clean the condenser filter

5.4 Tips for the user

Placing items for cooling

To ensure that the device is correctly operated and to obtain the best results, follow the tips below:

- When placing items inside the refrigerator, make sure there is sufficient air circulation.
- Pay attention to the maximum height when placing food on the top shelf of the refrigerator (fig. on the right).
- More items in the refrigerator, longer the door kept open, higher energy consumption.
- To limit the loss in the device efficiency, reduce the door opening time to the minimum. Also, do not open the door too frequently.
- Do not place warm or hot foods in the refrigerator counter. Placing of still uncooled foods may impair the device efficiency and cause the already cooled articles to spoil faster.



- Store only packaged foods or food in relevant packaging in the refrigerator.
- Do not store bananas in the refrigerator because this type of fruit is low temperature sensitive.
- Store food products with distinctive odour, such as fresh fish, foie gras, cheese in air-tight containers.
- In case of power failure keep the door closed to avoid cold air loss.
- The refrigerator should not be without power supply for longer than 10 minutes.

Unused for longer time

When the device is not be used for a longer time, follow the instructions below:

- Switch the device off with the main switch and disconnect from the power supply.
- Clean the device and the surrounding area according to the instructions in **section 6 “Cleaning and maintenance”** .
- Perform all maintenance works.
- Leave the refrigerator door open to avoid mould and/or unpleasant odour formation.

6. Cleaning and maintenance



WARNING!

When cleaning, disconnect the device from the socket (pull the plug).

The device is not suited for direct washing via water jets!

Protect the device from water penetration.



CAUTION!

Never use hot water to clean the device!

Never use aggressive cleaning agents, such as scouring powders, alcohol or solvent based, which may damage the surface of the device.

To clean the stainless steel, do not use iron wool or iron brush as they may leave iron particles on the surface that form rust in result of oxidation.

- Clean the device regularly.
- Remove all food and beverages from the device and temporarily place them in a cool place.
- Remove the grids from the device and clean with a soft cloth and a mild cleaning agent.

- Thoroughly wipe the external and internal surfaces of the device. Use warm water, soft cloth and mild cleaning agent for cleaning.
- Clean the door seal with a soft cloth soaked in warm water **without using a cleaning agent**.
- Finally, thoroughly dry the cleaned surfaces and grids.
- Regularly remove dust and lint from the rear wall of the device with a soft brush or dust brush.

Maintenance



CAUTION!

Unclean condenser impairs the device operation and increases energy consumption!

The listed maintenance works must be performed by a qualified professional.





- Cleaning the condenser with relevant tools (vacuum cleaner or soft brush);
- checking the electric installation;
- Check of thermostats and sensors;
- check the door seal for tightness and replace if damaged;
- regularly clean the condensation water tray.
- check the telethermostat or control board and probes.

7. Possible Malfunctions

In case of malfunction, immediately disconnect the device from the power supply. Before contacting the customer service department or vendor check the troubleshooting table below.

Problem	Possible reason	Solution
Refrigeration unit does not start	Defrosting terminated	The device will start after 3 minutes
	The device has been switched off with the main switch	Switch the device on again, a new start after 3 minutes
	No power	Check the plugs, sockets, fuses and power supply
Refrigeration unit works continuously, but does not cool sufficiently	Ambient temperature too high.	Make sure there is sufficient ventilation in the place of installation
	Soiled condenser	Condenser cleaning
	The door is not closing properly.	Check the door seal, clean if necessary
	Not enough coolant	✗ Contact the service company.
	Hot gas valve partly open	✗ Contact the service company.
	Condenser blower is not working	✗ Contact the service company.
	Evaporator blower is not working	✗ Contact the service company.
Ice formation inside the evaporator	The device is not levelled.	Level with adjustable feet
	Condensation water drain pipe clogged / blocked	✗ Contact the service company.
Refrigeration unit does not turn off	Probe broken	✗ Contact the service company.
	Thermostat broken.	✗ Contact the service company.
Intense noise made by the device	Continuous vibrations	Check if there is contact between the device and other objects, both internal and external.

8. Error messages

Problem	Cause	Solution
Message " AL " flashes and a throbbing signal is heard. (Alarm: evaporator high temperature)	Recorded evaporator probe temperature exceeds the set value.	 Contact the service company. - Check evaporator blower performance.
Message " AL " flashes and a throbbing signal is heard. (Alarm: high temperature of the cooling area)	Recorded probe temperature in the cooling area exceeds the set value.	- Check the unit temperature. - Check if the device operates correctly.
Message " id " flashes and a throbbing signal is heard. (Alarm: door micro-switch input)	Door micro-switch input remains open.	- Close the door.  Contact the service company. - Check door micro-switch. - Check if the door is in a correct position.
Message " COH " flashes and a throbbing signal is heard.	Condenser temperature too high.	 Contact the service company. - Ventilate the room. - Clean the condenser.
Message " CSd " flashes and a throbbing signal is heard.	Condenser blower blocked	 Contact the service company. - Clean the condenser. - Check if the condenser blower work properly.

Problem		Cause	Solution
Pr1	Message "Pr1" flashes and a throbbing signal is heard.	<ul style="list-style-type: none"> - Wrong probe type. - Probe damaged. - Incorrect connection between the probe and electronics board. - Temperature recorded by the probe exceeds allowed thresholds for the unit probe in use. 	<ul style="list-style-type: none"> ✖ Contact the service company - Check if the cooling area probe is in order. - Check connection between the system and probe.
	Unit probe error		
Pr2	Message "Pr2" flashes and a throbbing signal is heard.		
	Evaporator probe error (parameter P4=1)		
Pr3	Message "Pr3" flashes and a throbbing signal is heard.		
	Condenser probe error (parameter P4=3)		

9. Discarding old devices



The electric and electronic devices often contain valuable materials. They also contain harmful plastics, necessary for their operation and safety. In case of disposing as a common waste material or incorrect utilization they may pose threat for human health and environment.

Therefore in any case the device should be disposed as a common waste.

After the operational period old device should be utilized according to valid regulations. Use the list of collection points for your location to return the electric and electronic devices. We recommend contacting the professional company of proper unit of the local authorities.



CAUTION!

To exclude any abuse and the dangers involved make the waste device unfit for use before disposal. For that purpose disconnect device from mains supply and remove mains connection cable from the device.

Make sure that old device is stored beyond the reach of children until its removal: remove the door and leave grids inside so children are not able to enter the device.

The propellant used in the device is flammable. Its utilization should be realized according to the valid regulations.

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