



DRY AGER

BUILT FOR BEEF



Operating instructions
DRY AGER DX 1000®





DRY AGING



Dry Aging is no longer a mystery. You too can produce succulent and tasteful meat for yourself with the

DRY AGER DX 1000®

When this technique is used, the result is a quality piece of meat that brings out a natural, but a more intensive flavour. The texture of the matured meat is tender, yet firm and has a perfect bite.

You will notice that when the Dry Aged meat is grilled or pan fried, there are hardly any meat juices and that the fat surrounding it gives off a spicy aroma.



The founders of the DRY AGER Manufactur wish you lots of joy and pleasure at dryaging.

Christian, Aaron and Manfred Landig

MEAT QUALITY

The best meat recognised for Dry Aging is rib-eye on the bone. It is always best to purchase from a dealer who sources their meat from a good quality abattoir. The younger the animal the better the result. It is always recommended to buy a piece of meat that has a good fat content and a high rate of internal marbling.

It is advisable to mature the meat on the bone either hanging or in the largest possible joints. The reason for this is to minimise the pure meat exposed to the air, reducing weight loss.

The Dry Aging period is recommended for at least 21 days, then the maximum tenderness is reached. Thereafter, only the flavour becomes more intense.

Please note : A maturing period of up to 6 weeks is possible. The hygienic handling of food should always be addressed for best results.

When the process is complete, the thin crust is trimmed off ready to be de-boned or cut into steaks.

Disposal notes

The appliance contains reusable materials and should be disposed of properly - not simply with unsorted household refuse. Appliances which are no longer needed must be disposed of in a professional and appropriate way, in accordance with the current local regulations and laws.



When disposing of the appliance, ensure that the refrigerant circuit is not damaged to prevent uncontrolled escape of the refrigerant it contains (data on type plate) and oil.

- Disable the appliance.
- Pull out the mains plug.
- Cut through the connection cable.



WARNING

Danger of suffocation due to packing material and plastic film! Do not allow children to play with packaging material. Take the packaging material to an official collection point.

Saving Energy

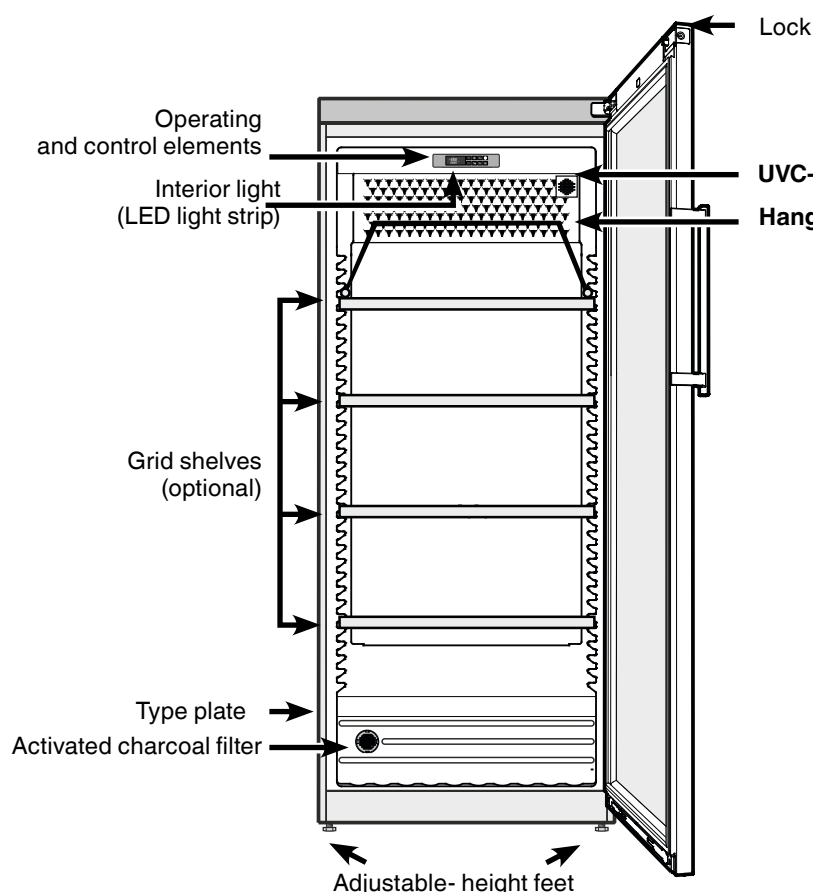
- Always ensure good ventilation. Do not cover ventilation openings or grill.
- Always keep fan louvres clear.
- Do not place appliance in areas of direct sunlight or next to a stove, heater or similar object.
- The energy consumption depends on the installation conditions, e.g. the ambient temperature.
- Keep the time the appliance is open to a minimum.
- Accumulated dust increases the energy consumption:
- Once a year, Hoover the refrigerating unit together with the metal grill of the heat exchanger at the back of the appliance.

Range of Appliance Use

The unit is only suitable for the cooling of meat or food in a home, commercial environment or similar.

All other types of use are not permitted. The unit is not suitable for the storing and cooling of medicines, blood plasma, laboratory preparations or similar - Medical Devices Directive 2007 / 47 / EC with regards to the underlying materials and products . Any misuse of the appliance may result in damage to the stored goods or spoilage . Furthermore, the appliance is not suitable for use in hazardous areas.

Description of the appliance



Integrated systems

HUMICONTROL®

electronic humidity controller from 60% to 90%
(no water connection necessary)

UVC-System

Hanging rail optional DX AIRREG®

optimal airflow, activated carbon filter & sterilization

LED LIGHTING DX

the light spectrum does not contain any ultraviolet radiation, the result is a minimum of heat generated and will not affect the core meat temperature.

DEFROST AUTOMATIC, AUTOMATIC CONDENSATION EVAPORATION

OPTIC AND ACUSTIC ALARM ALERT

LOCKABLE DOOR, REVERSIBLE DOOR

CAN BE INTEGRATED

MAGNETIC DOOR SEAL



DX 1000®

Dry aging hanging
entire saddle
(our tip!)



DX 1000®

Dry aging of joints
on shelves
(more waste)



2 x DX 1000®

Integrated mounting solution
Ideal for a commercial display area



Starter-Tips

- I** Clean the inside of the Dry Ager with disinfectant, which shouldn't be aggressive. Tip: DRY AGER SPECIAL CLEANER, Art. Nr. Z33145
- II** If ordered: unpack the salt blocks and remove the foil. Put the salt blocks in the stainless steel tray and place the tray in the middle of the fridge. Please check every 2 -3 days if there is any remaining water on the salt blocks, if so, please remove the water.
- III** Plug in the device in a 220-240 V socket.
- IV** The temperature and humidity are already setted on 1,5 °C and 82% humidity which are the perfect settings for dry aging beef & pork.
- V** The meat for the dry aging must be fresh, perfect would be max. 5 days after slaughtering. Even vacuum matured meat can be used, but for a maximum of 14 days (please remove foil)
- VI** Our recommendation for the best dry aged beef: use meat from a young cow with an ordinary fat cover plus good marbling.
- VII** Hang the complete back on the hangers of your Dry Ager or put the individual cuts on the shelves.
- VIII** Load capacity: max. 2x half strip loins on the bone with a length of 0,5 m , therefore you will need 2 hangers.
- IX** Load capacity with shelves: max. 20 kg individual pieces or cuts will fit on our shelves.
- X** When maturing individual cuts on the shelves, pay attention on a protective fat layer which prevents too much wastage and if possible let it mature on the bone. Ideal size aprox. 2 – 4 kg / cut
- XX** Please wear protective gloves at each contact with the meat, no one should ever touch the meat without gloves!
- XII** The perfect maturing time is between 25 – 28 days, but more than 4 weeks is also possible.

Safety Instructions and warnings

- To prevent injury or damage to the unit, the appliance should be unpacked and set up by two people.
- In the event that the appliance is damaged on delivery, contact the supplier immediately before connecting to the mains.
- To guarantee safe operation, ensure that the appliance is set up and connected as described in these operating instructions.
- Disconnect the appliance from the mains if any fault occurs. Pull out the plug, switch off or remove the fuse.
- When disconnecting the appliance, pull on the plug, not on the cable.
- Any repairs and work on the appliance should only be carried out by the customer service department, as unauthorised work could prove highly dangerous for the user. The same applies to changing the mains power cable.
- Do not allow naked flames or ignition sources to enter the appliance. When transporting and cleaning the appliance, ensure that the refrigerant circuit is not damaged. In the event of damage, make sure that there are no ignition sources nearby and keep the room well ventilated.
- Do not stand on the plinth, drawers or doors or use them to support anything else.
- This appliance can be used by children of 8 years old and over, and also by persons with restricted physical, sensory or mental capacity or lack of experience and knowledge, if they are supervised or have been instructed on safe use of the appliance and understand the resulting risks. Children must not be allowed to play with the appliance. Cleaning and user maintenance must not be carried out by children without supervision.
- Avoid prolonged skin contact with cold surfaces or chilled/frozen food. This could cause pain, numbness and frostbite. In the case of prolonged skin contact, protective measures should be taken, e.g. gloves should be worn.
- Do not consume food which has been stored for too long, as it could cause food poisoning.
- Do not store explosives or sprays using combustible propellants such as butane, propane, pentane, etc. in the appliance. Electrical components might cause leaking gas to ignite. You may identify such sprays by the printed contents or a flame symbol.
- Do not use electrical appliances inside the appliance.
- If you have a lockable appliance, do not keep the key near the appliance or within reach of children.
- The appliance is designed for use in enclosed areas. Do not operate the appliance outdoors or in areas where it is exposed to water or damp conditions.
- The LED light strip illuminates the interior of the appliance. It is not suitable for lighting a room.
- When transporting or operating the appliance at an altitude of more than 1500 m above sea level, the glass pane in the door can break due to the reduction in air pressure. Broken fragments are sharp-edged and can cause serious injury.

Climate rating

The climate rating indicates the room temperature at which the appliance may be operated in order to achieve full refrigeration performance.

The climate rating is indicated on the type plate.

The position of the type plate is shown in the section entitled **Description of the appliance.**

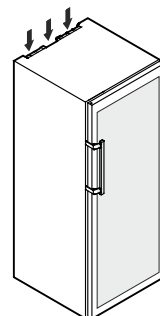
Climate rating	Room temperature
SN	+10 °C to +32 °C
N	+16 °C to +32 °C
ST	+16 °C to +38 °C
SN-ST	+10 °C to +38 °C
T	+16 °C to +43 °C
SN-T	+10 °C to +43 °C

Do not operate the appliance outside the specified room temperature range.

Setting up

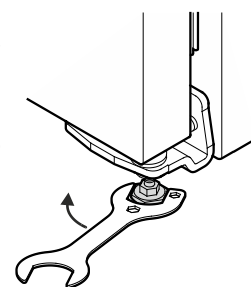
- Avoid positioning the appliance in direct sunlight or near cookers, radiators and similar sources of heat.
- The floor on which the appliance stands should be horizontal and level. Compensate for uneven floors with the adjustable feet.

- **Do not cover ventilation openings or grill.** →

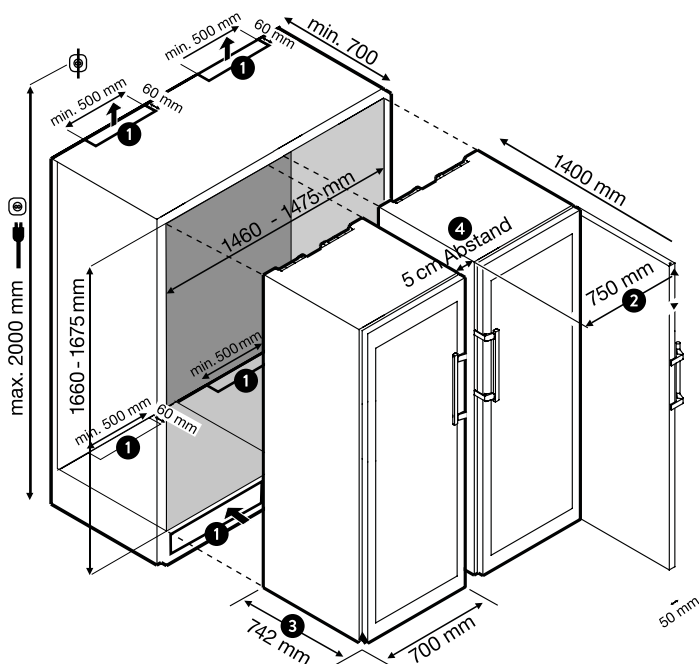
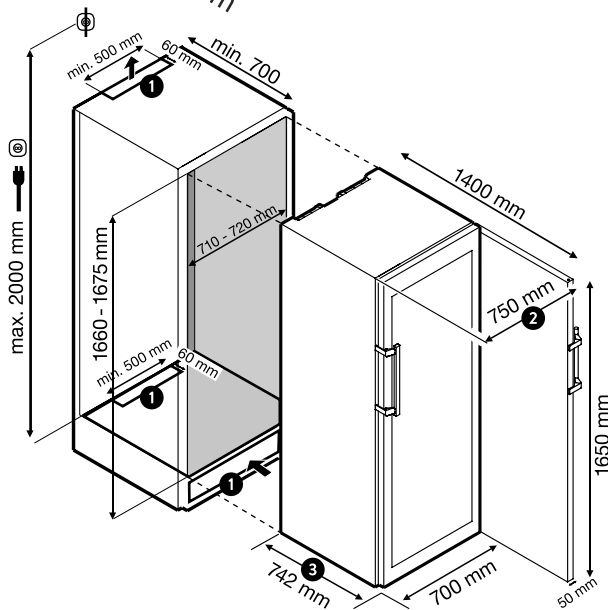
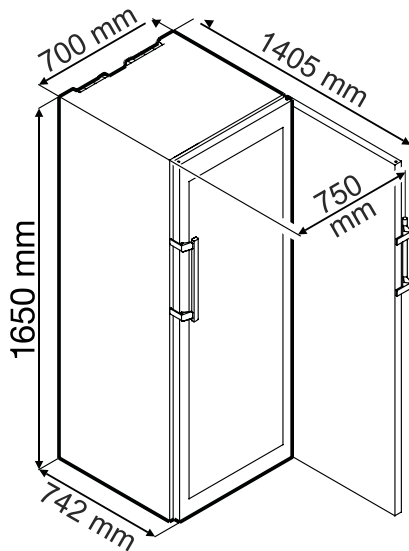


- Standard EN 378 specifies that the room in which you install your appliance must have a volume of 1 m³ per 8 g of R 600a refrigerant used in the appliance, so as to avoid the formation of inflammable gas/air mixtures in the room where the appliance is located in the event of a leak in the refrigerant circuit. The quantity of refrigerant used in your appliance is indicated on the type plate on the inside of the appliance.

- Always install the appliance directly against the wall.
- Place the appliance in its final position at the place of installation. Extend the adjustable foot at the bottom hinge bracket until it rests on the floor and then make a further 90° turn.



Dimensions DX 1000®



- ❶ Required ventilation shafts are absolutely necessary.
Minimum size: 300 cm². Possible on the side or at the back.
- ❷ Overall dimension with open door: **750 mm.**
- ❸ Overall dimension body + door (protruding): **742 mm.**
- ❹ Covering of distance possible by DRY AGER moulding
Available as an accessory in our shop: www.dry-ager.com/shop.

Electrical connection

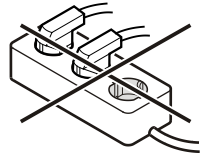
Only operate the appliance with alternating current (AC).
The permissible voltage and frequency are indicated on the type plate. The position of the type plate is shown in the section entitled **Description of the appliance.**

The socket must be properly earthed and protected by a fuse.
The tripping current of the fuse must be between 10 A and 16 A.

The socket must not be situated behind the appliance and must be easily accessible.

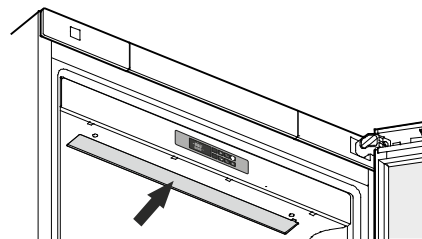
Do not connect the appliance using an extension cable or extension socket.

Do not use stand-alone inverters (conversion of direct current to alternating current/threephasecurrent) or energy-saving plugs. Risk of damage to the electronic control system!



Interior Light

The interior of the appliance is lit by an LED light strip at the top of the interior container.



The light intensity of the LED light corresponds to laser class 1/1M.



Important

If the cover is removed, do not look directly at the light through optical lenses from close distance. This can damage your eyes.

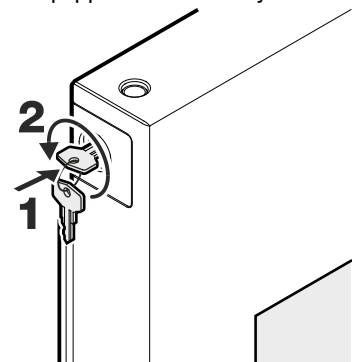
Safety lock

The lock in the appliance door is equipped with a safety mechanism.

Locking the appliance:

- Insert the key as shown by arrow 1.
- Turn the key 180°.

To unlock the appliance, the same procedure must be repeated.





Your DRY AGER DX 1000® is ready to use.
We recommend the following settings for dry aging beef

Temperature: 1,5°C

Humidity: 82 %



The activated carbon filter and UVC lamp should be replaced annually for optimum performance.

Before reaching the lifetime a maintenance message appears in the message display, see page 9.

More Informations info@dry-ager.com | Tel. 0049 75 81/4 89 59-0

Operating and Control Settings

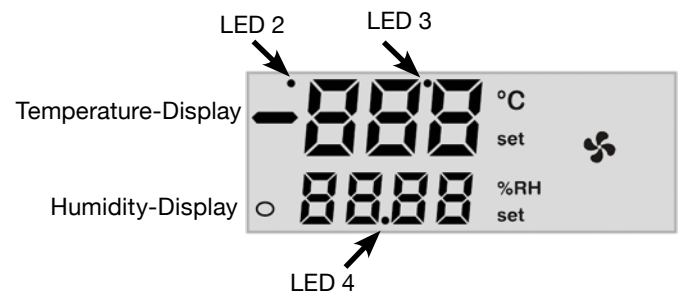


- set temp.** View / change the temperature setting (SET_TEMP)
- set %RH** View / change the humidity setting (SET_RH); Select or confirm a parameter during programming
- ▲** Increases the displayed value
On / Off Button for the UVC disinfection
Press the button for a minimum of 5 sec
- ▼** Decreases the display value
Press and hold button for 3 seconds:
Start manual defrost.
- 💡** On / Off Button interior lighting
- ⏻** Power On / Off switch

Key combination:

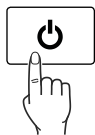
- ▼ + ▲** Lock and seal keyboard

Display and Symbols



LED / SYMBOL	MODE	FUNCTION
LED 4	ON	Standby
°C	ON	°C-Unit
°F	ON	°F-Unit
❄️	ON	Cooling
❄️	FLASHING	Delay cool
LED 3 ❄️	ON	defrost active
LED 3 ❄️	FLASHING	defrost
☀️	ON	Heating active
set	FLASHING	default level for the temperature setting (Temp.)
(!)	ON	Acoustic alarm
🌀	ON	Fans running
%RH	ON	RH% -Humidity
LED 2	ON	UVC-Desinfection active
set	FLASHING	default level for the humidity setting

Control ON and OFF

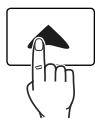


Press the button once for 5 seconds and the OFF symbol is displayed. The LED 4 (= standby) The compressor is turned off. All relays are deactivated. Press the button again and the compressor will restart.

Locking and unlocking Keypad



1. Press ▼ and ▲ and hold together, for a minimum of 3 seconds, POF appears for a few seconds (POF = OFF parameter)

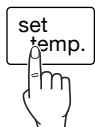


2. Thereafter, only displayed setting can not be changed. Furthermore, the MIN and MAX values can be viewed. The ON / OFF switch can be further activated.

UNLOCK

Press ▼ and ▲ hold the two keys for a minimum of 3 seconds.

Setting temperature



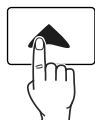
1. Press SET key: The set value is displayed and the LED's flash
2. Now to change the settings, within 10 seconds, use the ▼ and ▲ arrow keys
3. To confirm press SET button or wait 10 seconds

Start manual defrost



Hold down button for a min. 2 seconds
The manual defrosting starts.
Is indicated through LED3.

Turn On / Off UVC Desinfection



Press the button for at least 5 sec.
Is indicated through LED2.

Function check of UVC sterilization

Check the function of the UVC light source at regular intervals. When the interior lighting is switched off, a clear bluish light must be visible in the rear area of the UVC disinfection box. (Top right)

If this is not the case, switch off the UVC sterilization on the controller and switch it on again.

Error Messages

Message	Reasons for error messages	Outputs
"P1"	Room sensor error	Cooling and Heating OFF
"P2"	Evaporation temperature sensor Failure	Defrost by time
"P3"	Humidity Sensor error	moisture control OFF
"HA"	High temperature alarm	regulation unaffected
"LA"	Low temperature alarm	regulation unaffected
"HHA"	Moisture-HIGH alarm	regulation unaffected
"LHA"	Moisture-LOW alarm	regulation unaffected
"dA"	Door alarm	regulation unaffected

Displays the alarm message until the alarm conditions exist. All alarms are displayed alternately with the room temperature except for the P1. EE can be acknowledged by pressing any key "rSt" for 3 seconds in the display, then returns to normal operation.

Acknowledgement of the acoustic alarm

The audible alarm can be (optional) switched off by pressing any key.

Alarm acknowledgement

Message P1, P2 and P3 after about 30 seconds; after correction or troubleshooting, the error message disappears automatically. Check probe sensor before replacing. Check connections. Temperature alarms HA and LA will automatically reset once the normal temperature is reached or when the defrost starts. DA goes off when the door is closed. External alarms EAL and BAL are disabled after the digital input. PAL acoustic alarm: Through Device Turning off or standby ON / OFF. Humidity alarms HHA and LHA are acknowledged automatically when normal range has been reached.

Maintenance information

Information	Reason
"UCC"	Lifetime of UVC-bulb and active carbon filter cartridge are reached.

Please order the Dry Ager Service Kit and change the UVC bulb, Art. DX0010 and Active Carbon Filter Catridge, Art. DX00110. After exchanging you can reset the information:

1. Press ▼ and **SET % RH** and hold the keys for a minimum of 2 sec.
2. Select with button ▼ Parameter Uch.
3. Press button **SET % RH**. The set value is displayed and value is flashing.
4. With button ▼ set the value to „0“.
5. Confirm with button **SET % RH**.
6. After 1 minute the display switches automatically in standard display.

Air exchange with activated charcoal filter

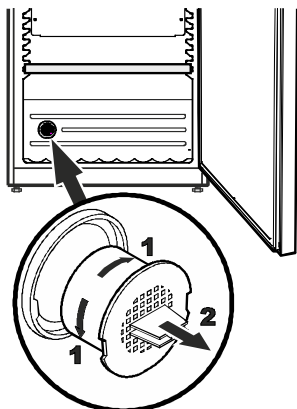
We recommend that you replace the filter once a year. Filters can be obtained from your dealer.

Changing the filter:

Take the filter by the handle. Turn it 90° to the left or right and remove.

Inserting the filter:

Insert with the handle in a vertical position. Turn it 90° to the left or right until it clicks into place.



Cleaning

Before cleaning always switch off the appliance. Pull out the mains plug or remove/unscrew the fuse.

- Clean the inside and outer walls with lukewarm water and a little detergent. Do not use abrasive or acid cleaners or chemical solvents.
- Use a glass cleaner to clean the glass surfaces and a commercially available stainless-steel cleaning agent for the stainless-steel surfaces.

Do not use steam cleaners because of the risk of injury and damage.

- Ensure that no cleaning water penetrates into the electrical components or ventilation grill.
- Do not damage or remove the type plate on the inside of the appliance. It is very important for servicing purposes.

Malfunctions

You may be able to rectify the following faults by checking the possible causes yourself.

• Appliance does not function:

- Is the appliance switched on?
- Is the plug correctly fitted in the mains socket?
- Is the fuse intact?

• Loud running noise:

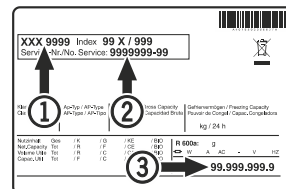
- Is the appliance set up firmly on the floor?
- Does the appliance cause nearby items of furniture or objects to vibrate? Please note that noises caused by the refrigerant circuit cannot be avoided.

• The temperature is not low enough:

- Is the temperature setting correct (see "Setting the temperature")?
- Does the separately installed thermometer show the correct reading?
- Is the ventilation system working properly?
- Is the appliance set up too close to a heat source?

If none of the above causes apply and you cannot rectify the fault yourself, contact the nearest customer service department stating the type designation ①, service number ② and appliance number ③ as indicated on the type plate.

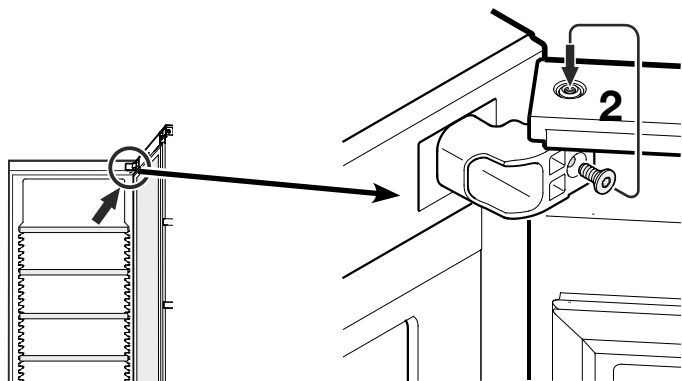
The position of the type plate is shown in the section entitled Description of the appliance.



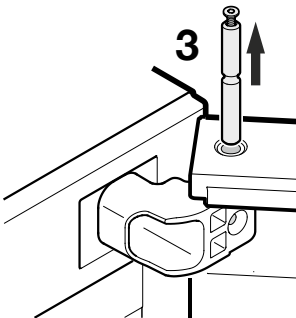
Please check regularly curing meat.
Tip: the lower the temperature set, the more dehydration / drying of meat occurs.
We recommend pre-curing ham and salami at 8°C and 75% RH.

Changing over door hinges

Door hinges should only be changed by a trained expert.
Changing the door hinges must be done by two people.



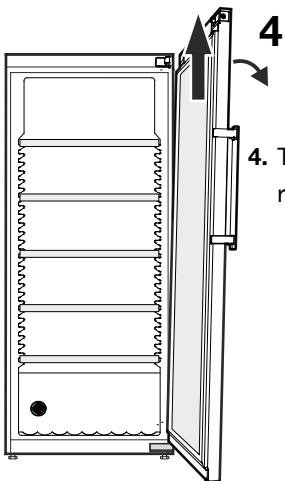
1. Open the door approx. 130°.
2. Remove screw from hinge bracket and screw 3 to 4 turns into the hinge pin.



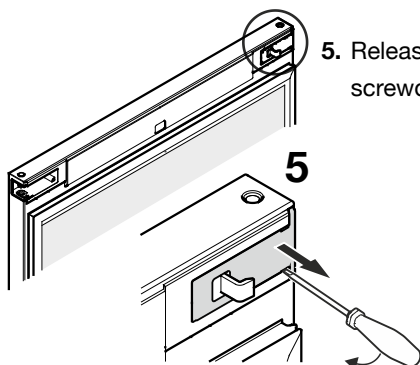
Important

The door must now be held secure by somebody.

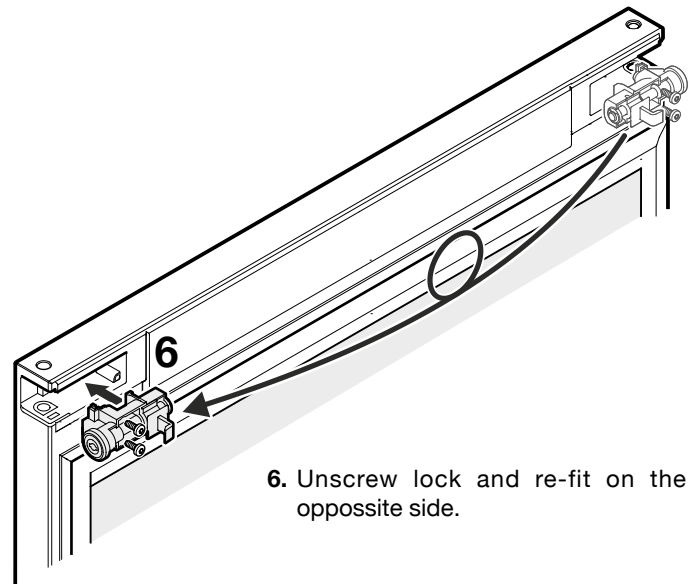
3. Pull out hinge pin.



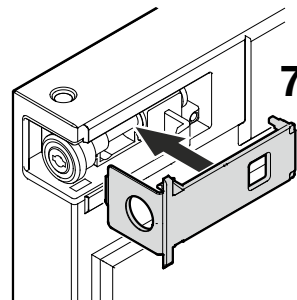
4. Tilt door slightly to the side and remove by lifting upwards.



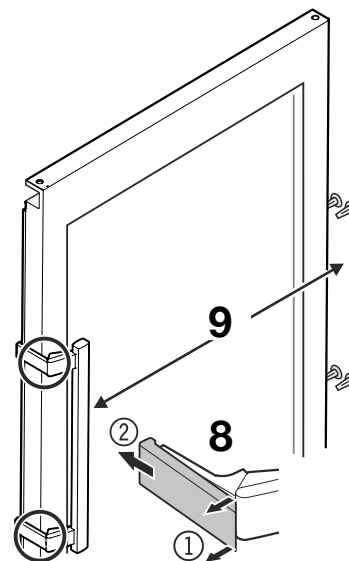
5. Release cover with a small screwdriver and remove.



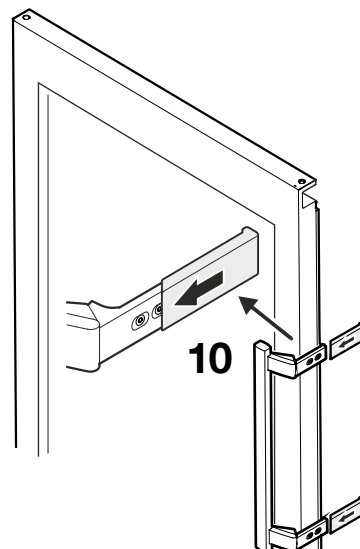
6. Unscrew lock and re-fit on the opposite side.



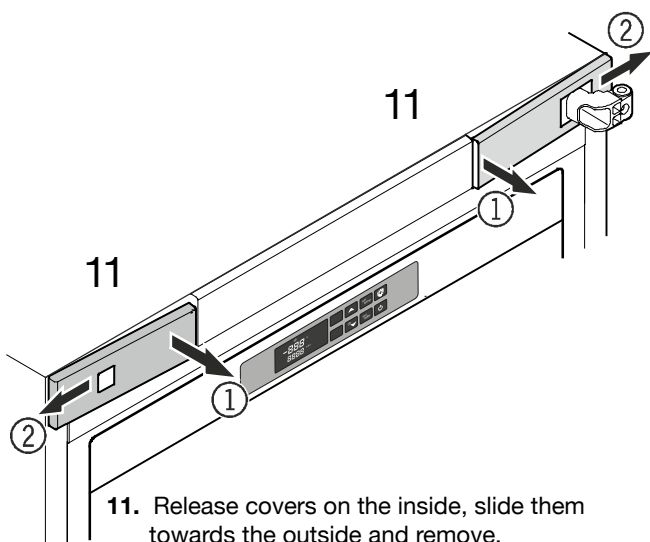
7. Click cover into place.



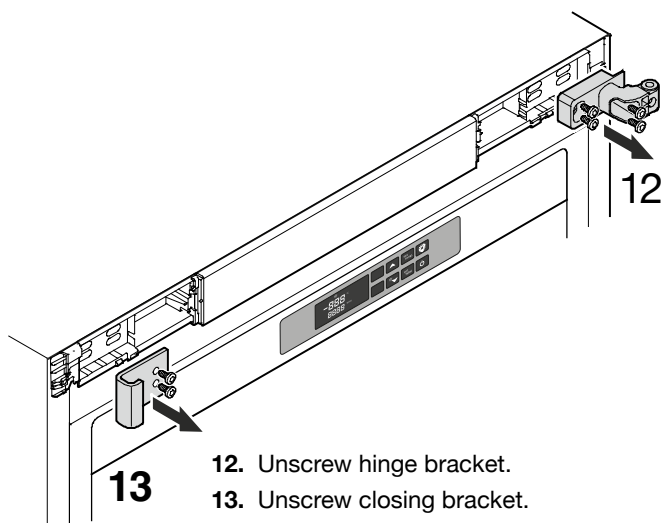
8. Release pressure plates at the front ① and pull them backwards to remove ②.
9. Transfer door handle and plugs to the opposite side.



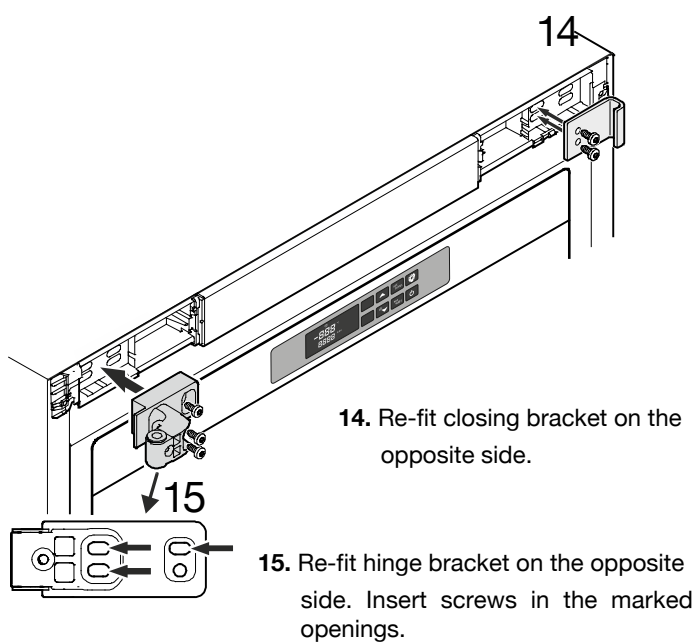
10. Push on pressure plates until they engage.



- 11.** Release covers on the inside, slide them towards the outside and remove.

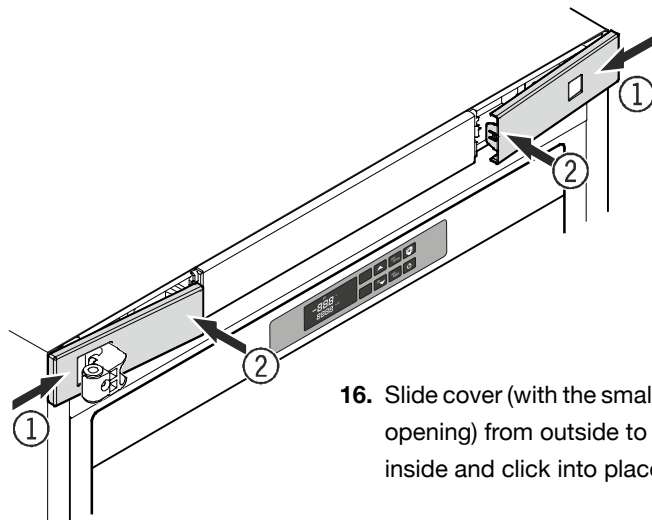


- 12.** Unscrew hinge bracket.
13. Unscrew closing bracket.



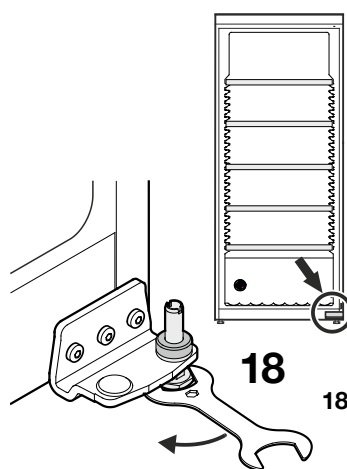
- 14.** Re-fit closing bracket on the opposite side.

- 15.** Re-fit hinge bracket on the opposite side. Insert screws in the marked openings.

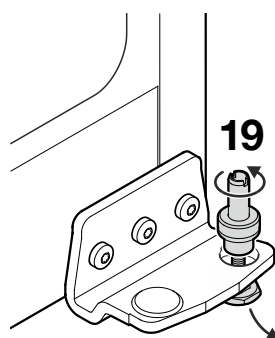


- 16.** Slide cover (with the smaller opening) from outside to inside and click into place.

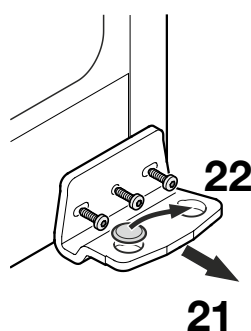
- 17.** Guide cover with the larger opening over the hinge bracket, slide it from outside to inside and click into place.



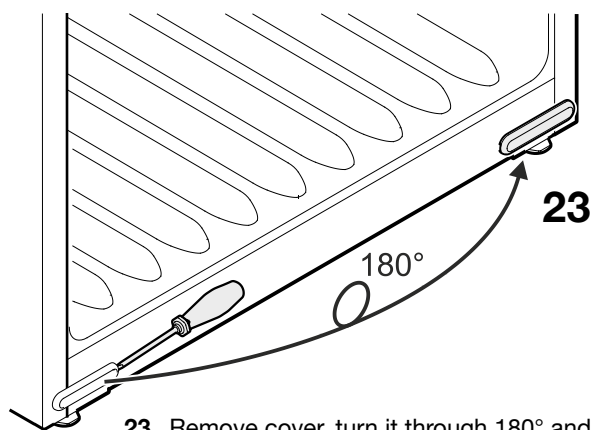
- 18.** Undo adjustable foot with the spanner provided.



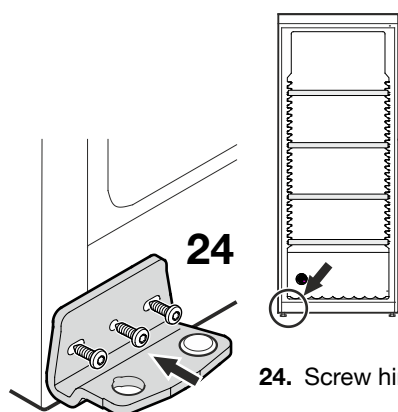
- 19.** Pull hinge pin upwards and unscrew it from the adjustable foot.
20. Pull adjustable foot downwards to remove.



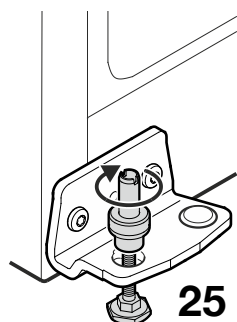
- 21.** Unscrew hinge bracket.
22. Transfer cover to the opposite side.



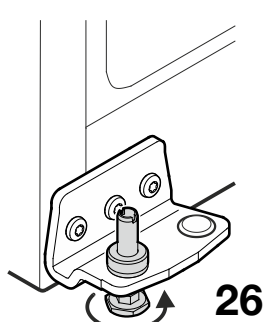
23. Remove cover, turn it through 180° and re-fit on the opposite side.



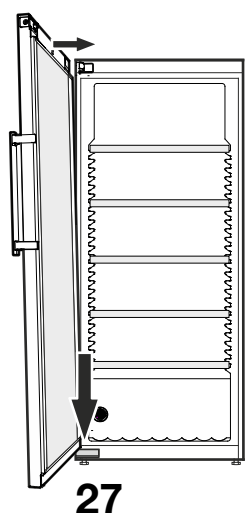
24. Screw hinge bracket into place.



25. Fit adjustable foot from underneath and attach hinge pin to it.



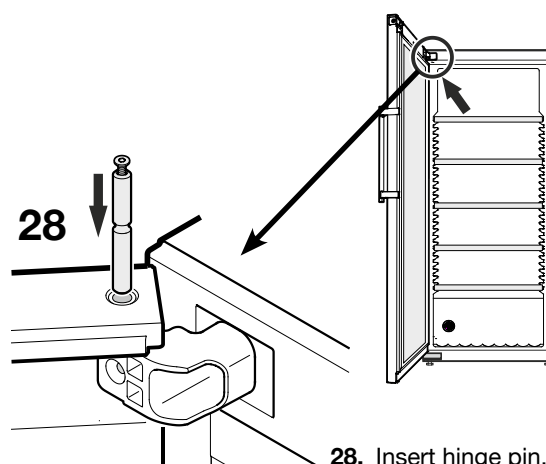
26. Insert pin fully into hinge bracket and tighten adjustable foot by hand.



27. Place door on pin and move the top of it to the hinge bracket.

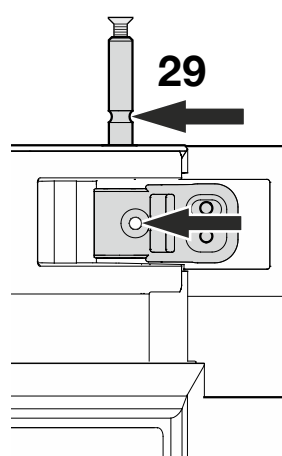
Important

The door must now be held secure by somebody.

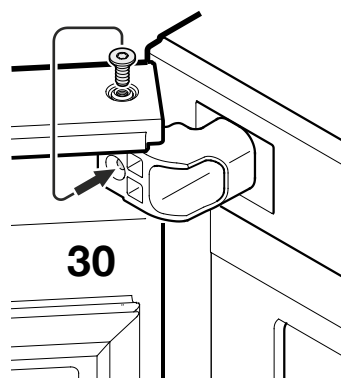


28. Insert hinge pin.

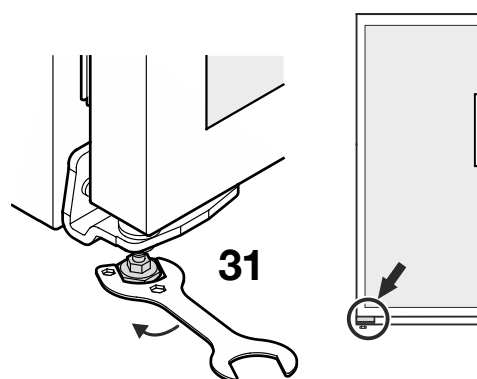
Front view of top hinge bracket



29. Push in hinge pin until groove in the pin lines up with bore hole in the hinge bracket.



30. Undo screw in hinge pin and screw into bore hole in hinge bracket.

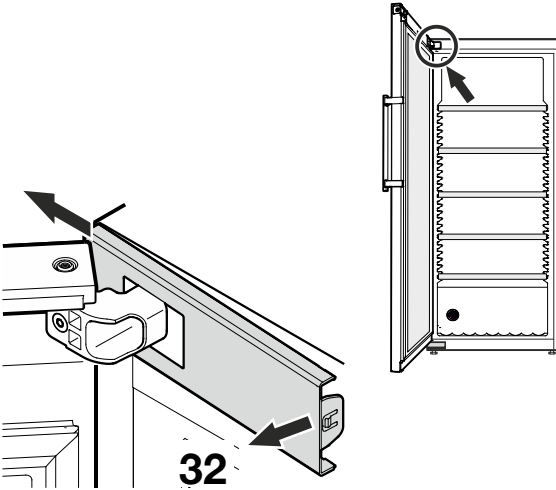


31. Place the appliance in its final position at the place of installation.

Extend the adjustable foot at the bottom hinge bracket until it rests on the floor and then make a further 90° turn.

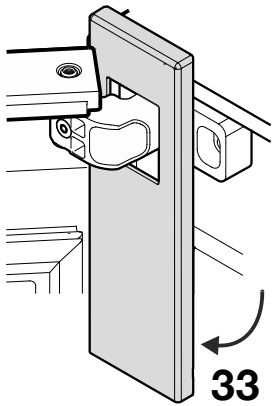
Adjusting the lateral tilt of the door

If the door is at an angle, adjust the angle.



32

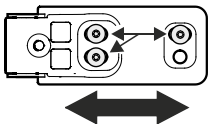
- 32.** Release cover on the inside and slide to the outside.



33

- 33.** Turn cover downwards.

Front view of top hinge bracket



34

- 34.** Undo screws and slide hinge bracket to the right or left. Tighten screws. Re-fit cover following the instructions above in reverse order. Close door and check that it is aligned with the side walls of the appliance.

Shutting your appliance down

If your appliance is to be shut down for any length of time, switch it off and disconnect the plug or switch off or unscrew the fuse.

Clean the appliance and leave the door open in order to prevent unpleasant smells.

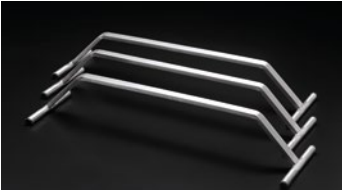
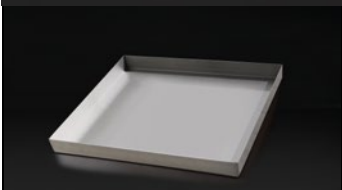
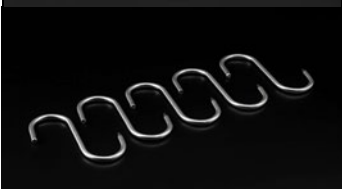
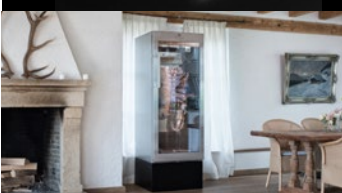
The appliance complies with the relevant safety regulations and EC Directives 2004/108/EC and 2006/95/EC.

Disclaimer

The manufacturer accepts no liability for any spoilage to the refrigerators content, not even when the device is within the warranty period. Similarly, the manufacturer accepts no liability for personal injury due to incorrectly stored goods, which are for personal consumption or re-sale.

OPTIONAL ACCESSORIES - THOUGHT THROUGH TO THE END

Our accessories for the dry aging of
complete beef saddles and joints.

	DX0010 STAINLESS STEEL HANGER (for up to 80 kg) Per hanger up to 2 saddles possible Can be adjusted in height and position in the refrigerator Per height position upto 2 hangers possible
	DX0020 SHELVES FOR INDIVIDUAL JOINTS (max. weight 40 kg) DX0015 HALF SIZE SHELF (max. weight 25 kg)
	DX0040 LABELS FOR THE MEAT (set of 20) Including a nylon tie
	DX0050 SALTAIR® HIMALAYAN SALT BLOCK For a more intensive flavour
	DX0070 SALTAIR® TRAY (STAINLESS STEEL) FOR THE BOTTOM For max.4 salt blocks (DX0050)
	DX0090 S-HOOK STAINLESS STEEL Holds up to 100 kg (160 x 8mm)
	DX0095 SWIVEL HOOK STAINLESS STEEL Holds up to 100 kg (180 x 8mm)
	DX0100 UVC REPLACEMENT BULB DX0110 ACTIVE CARBON FILTER CARTRIDGE
	DX0080 DISPLAY PODIUM SATIN BLACK For a perfect presentation at eye level: The sturdy metal base (40 cm height) for your DRY AGER® DX 1000®.



Additional accessories, meat processing equipment
and vacuum packing at: www.dry-ager.com

You like the quality of your DRY AGER DX 1000®?

Ask for more high-quality products and accessories from Landig & Lava – here a small overview:



Meat-Mincers



Sausage-Fillers



Electric Band
Bone Saws



Sous-Vide
Stirrers



Knife
Sharpeners



Bone Saws



Slicing Machines



Sous-Vide Waterbaths



Cutting Board



Vacuum-Machines



Cleavers



Magnetic-Knife Holders



Knife Sharpeners



Gloves



Special Cleaner



Work Apron



Knife Sets



Landig + Lava GmbH & Co. KG

DRY AGER Manufaktur

Valentinstraße 35-1

D-88348 Bad Saulgau

Tel. (0049) 075 81/4 89 59-0

Fax (0049) 075 81/4 89 59-29

info@dry.ager.com | www.dry-ager.com

Version 10/2015