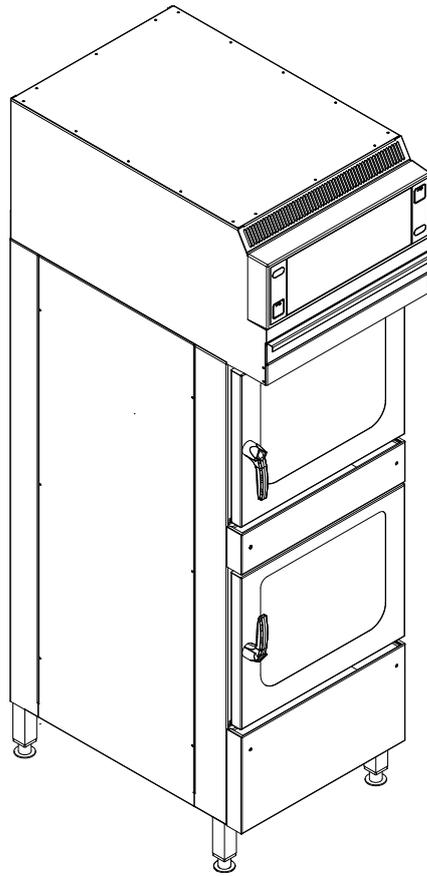


Read the operating instructions prior to commissioning

Installation instructions

Combisteamer



Translation from the original document • 4127002--0AIBE-C • 06/04/2020

| Unit | Type of energy | Unit type | Model |
|-----------------------|----------------|---------------------|------------|
| SpaceCombi Magic Team | Electric | Floor-standing unit | TKECOD610T |

4127002--0AIBE-C

en-GB

Manufacturer

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1 Introduction

1.1 About this manual

The instruction manual is part of the unit and contains information on safe installation of the unit.

Observe and adhere to the following instructions:

- Read the instruction manual in its entirety prior to installation.
- Make the instruction manual available to the installer at the operating site at all times.
- Preserve the installation manual throughout the service life of the unit.
- Insert any supplements from the manufacturer.
- Pass on the installation manual to any subsequent operator of the unit.

Target group The target group for the installation manual is trained technical personnel that is familiar with installing and operating the unit.

Figures All figures in this manual are intended as examples. Discrepancies between these and the actual unit can arise.

1.1.1 Explanation of signs



DANGER
Imminent threat of danger

Failure to comply will lead to death or very severe injuries.



WARNING
Possible threat of danger

Failure to comply can lead to death or very severe injuries.



CAUTION
Dangerous situation

Failure to comply can lead to slight or moderately severe injuries.

ATTENTION
Physical damage

Failure to comply can cause physical damage.



Notes for better understanding and operation of the unit.

| Symbol / sign | Meaning |
|---------------|---|
| • | Listing of information. |
| → | Action steps, which can be performed in any sequence. |
| 1. 2. | Action steps, which must be performed in the specified sequence. |
| ↳ | Result of an action performed or additional information about it. |

1.2 Staff qualification

Explanation of qualification

| | |
|---------------|---|
| Skilled staff | <ul style="list-style-type: none"> • Skilled staff are those, who due to their professional training, knowledge and experience as well as their knowledge of the relevant standards can assess the tasks given to them and recognize any possible dangers. |
|---------------|---|

| Type of activity | Qualification |
|-----------------------|---|
| Power connection | <ul style="list-style-type: none"> • Electrician • Specific professional training • Employee of the specialist company concerned |
| Water connection | <ul style="list-style-type: none"> • Plumber • Specific professional training • Employee of the specialist company concerned |
| Wastewater connection | <ul style="list-style-type: none"> • Wastewater specialist • Specific professional training • Employee of the specialist company concerned |

1.3 Use of the unit

This unit is intended to be used solely for commercial purposes, particularly in commercial kitchens.

The use of the unit is prohibited in the following countries:

- USA
- Canada

1.4 Warranty

The warranty is void and safety is no longer assured in the event of:

- Improper conversion or technical modifications of the unit,
- Improper use,
- Incorrect startup, operation or maintenance of the unit,
- Problems resulting from failure to observe these instructions.

2 Safety information

The unit complies with applicable safety standards. Residual risks associated with operation or risks resulting from incorrect operation cannot be ruled out and are mentioned specifically in the safety instructions and warnings.

The installer must be familiar with regional regulations and observe them.

The installer must observe the safety instructions in these mounting instructions and in the "Safety information" chapter of the operating instructions.

Ensuring conformity with standards Observe applicable international, European and national laws, regulations, standards and directives for the unit when transporting, setting up and connecting it.

Improper installation Risk of property damage and personal injury from improper installation

- Install the unit only as specified in these installation instructions.
- Do not add anything to the unit or modify the unit.
- Use only original spare parts.

Transportation and storage Risk of personal injury and property damage from improper transportation and improper storage

- Store the unit in a dry, frost-free environment.
- Observe the safety regulations for the lifting gear used.
- Attach the unit to the lifting gear securely during transport and setup, and prevent it from dropping.
- Transport the unit in an upright position, do not tilt or stack.
- Pay attention to protruding parts when transporting the unit without packaging.

Fire prevention Risk of fire from combustible surfaces

- Observe general fire prevention regulations.

Organisational measures Risk of property damage and personal injury from lack of organizational measures

- Identify hazard areas when transporting, setting up and connecting the unit.
- Prior to starting the installation work, notify any operators present about the procedure.
- Prior to starting the installation work, discuss how to behave in an emergency.
- Use equipment and protective gear suitable for the activity.
- Brace housing components to prevent them from falling over and dropping.

Setup Risk of property damage and personal injury from improper setup

- Ensure that the installation area has adequate load-bearing capacity.
- Wear safety shoes and protective gloves.

Electrical connection Risk of fire from improper connection

- Observe applicable regional regulations of the electrical utility.
- Ensure that only electricians licensed by the electric utility connect the unit.
- Ensure that the electrical system is earthed by a protective earthing conductor.
- Note the information on the nameplate.

Risk of electric shock from live components.

- Prior to working on the electrical system, switch off the unit, disconnect the electrical system from the mains and prevent power from being switched on again. Check to ensure absence of voltage.
- Use only insulated tools.

Commissioning Risk of property damage and personal injury from improper commissioning

- Read the operating instructions prior to commissioning. Observe the safety instructions in this installation manual and in the "Safety information" chapter of the operating instructions.
- Put the unit into service only after a successful function test following assembly.
- Put the unit into service only after it has reached room temperature.
- Observe the units during operation.

3 Description of the unit

3.1 Overview of the unit

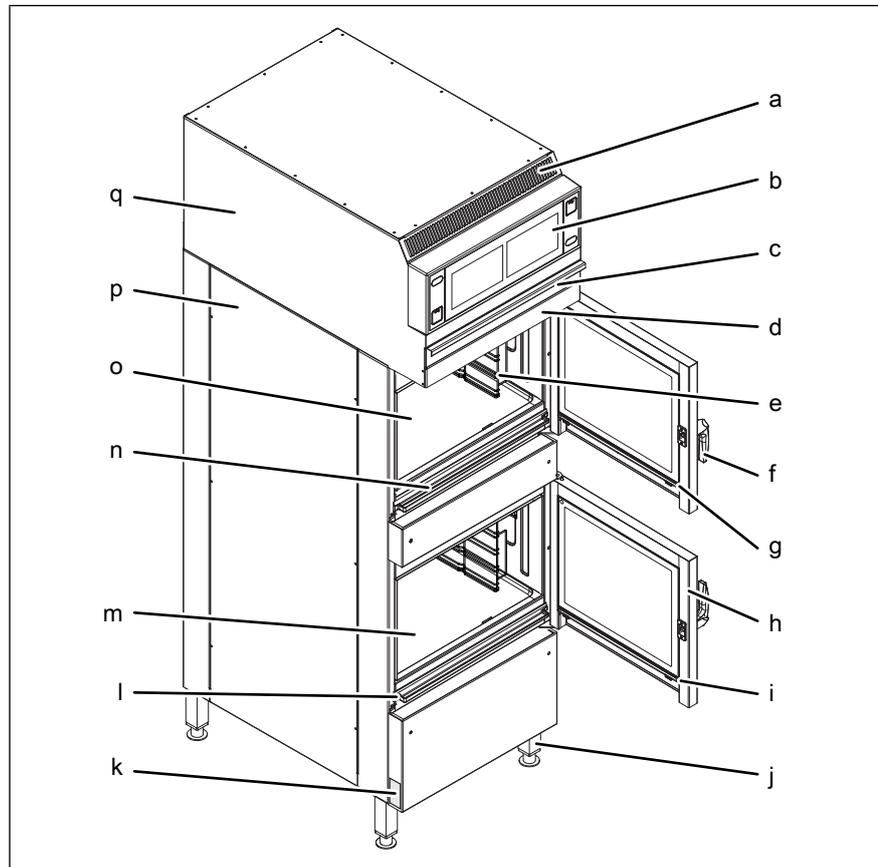


Image: Floor-standing unit

- | | | | |
|---|-----------------------------------|---|-----------------------------------|
| a | Air outlet | j | Equipment leg |
| b | Control unit | k | Nameplate |
| c | Filter drawer | l | Discharge channel for bottom unit |
| d | Condensate baffle | m | Cooking zone in bottom unit |
| e | Support rack | n | Discharge channel for top unit |
| f | Door handle | o | Cooking zone in top unit |
| g | Discharge channel for top door | p | Housing |
| h | Cooking zone door | q | Air recirculation hood |
| i | Discharge channel for bottom door | | |
| k | | | |

3.2 Equipment and connection data

| | | |
|---|-----------------------------------|---|
| Size | 610 | |
| Dimensions | | |
| Unit Length x Width x Height (mm) | 550 x 880 x 1908 | |
| Due to construction minimum distance between unit and wall (mm) | 70 | |
| Weight | | |
| Unit ≈ (kg) | 220 | |
| Emissions | | |
| Sound level (db(A)) | < 65 | |
| Steam output (g/h) | 1240 | |
| Steam output (m ³ /h) | 2,1 | |
| Latent heat (W) * | 842 | |
| Sensible heat (W) * | 1872 | |
| The sensible and latent heat amounts are determined in Germany on the basis of VDI 2052 at a connection voltage of 400 V. Regulations applying in other regions may vary from this. | | |
| Operating environment | | |
| Temperature (°C) | 5 — 40 | |
| Relative humidity (%) non-condensing | 95 | |
| Power connection | | |
| Protection class | IPX5 | |
| Connection terminal (mm ²) | 6 | |
| Connection line | One connection line | Two connection lines Information per connection line |
| Type of connection | 3PE AC 50/60 Hz, 3NPE AC 50/60 Hz | |
| Voltage (V) | 200 | |
| Connected load (kW) | 14 | 7 |
| Fuse (A) | 50 | 25 |
| Voltage (V) | 208 | |
| Connected load (kW) | 14.8 | 7.4 |
| Fuse (A) | 50 | 25 |
| Voltage (V) | 220 | |
| Connected load (kW) | 16.8 | 8.4 |
| Fuse (A) | 50 | 25 |
| Voltage (V) | 230 | |
| Connected load (kW) | 18.2 | 9.1 |
| Fuse (A) | 50 | 25 |
| Voltage (V) | 240 | |

Description of the unit

| | | |
|---|--------------------------|-----|
| Size | 610 | |
| Connected load (kW) | 19.6 | 9.8 |
| Fuse (A) | 50 | 25 |
| Voltage (V) | 380 | |
| Connected load (kW) | 14.8 | 7.4 |
| Fuse (A) | 25 | 16 |
| Voltage (V) | 400 | |
| Connected load (kW) | 15.6 | 7.8 |
| Fuse (A) | 25 | 16 |
| Voltage (V) | 415 | |
| Connected load (kW) | 16.2 | 8.1 |
| Fuse (A) | 25 | 16 |
| Voltage (V) | 440 | |
| Connected load (kW) | 15.8 | 7.9 |
| Fuse (A) | 25 | 16 |
| Type of connection | 2PE AC 50/60 Hz | |
| Voltage (V) | 208 | |
| Connected load (kW) | 10.6 | 5.3 |
| Fuse (A) | 63 | 35 |
| Voltage (V) | 240 | |
| Connected load (kW) | 13.8 | 6.9 |
| Fuse (A) | 63 | 35 |
| Type of connection | 1NPE AC 50/60 Hz | |
| Voltage (V) | 220 | |
| Connected load (kW) | 11.6 | 5.8 |
| Fuse (A) | 63 | 35 |
| Voltage (V) | 230 | |
| Connected load (kW) | 12.8 | 6.4 |
| Fuse (A) | 63 | 35 |
| Voltage (V) | 240 | |
| Connected load (kW) | 13.8 | 6.9 |
| Fuse (A) | 63 | 35 |
| Power optimizing system | | |
| Connection terminal (mm ²) | 2,5 | |
| Softened tap water connection | | |
| Water type | Softened tap water, cold | |
| Carbonate hardness CaCO ₃ (mmol/l (°dH)) | < 0,9 (5) | |
| Chloride Cl (mg/l) | < 100 | |

| | |
|---|------------------------------------|
| Size | 610 |
| Iron FE (mg/l) | < 0.2 |
| Connection pressure (kPa (bar)) | 200 (2) — 600 (6) |
| Connection (") | R 3/4 male thread |
| Tap water connection | |
| Water type | Tap water, cold |
| Carbonate hardness CaCO ₃ (mmol/l (°dH)) | < 4 (22,2) |
| Connection pressure (kPa (bar)) | 200 (2) — 600 (6) |
| Connection (") | R 3/4 male thread |
| Water consumption for steaming * | |
| Softened tap water (l/h) | 20 |
| Water consumption for Combisteaming * | |
| Softened tap water (l/h) | 4,4 |
| Water consumption for WaveClean cleaning program * | |
| Softened tap water (l) | 2,5 |
| Tap water (l) | 35 |
| Wastewater connection | |
| Wastewater type | Dirty water, maximum 80 °C |
| Maximum length (m) | 1 with a drop of at least 5% or 3° |
| Temperature resistance (°C) | 95 |
| Connection (mm) | 50 |
| Maximum volume flow (l/min) | 10 |
| * Applies to both cooking zones together | |

Floor fastening

| | |
|--|----------------------------|
| Mandatory for the following types of unit | |
| TKECOD610 | Only for unit with castors |

Description of the unit

Basic control setting

| Basic setting | Parameters | Standard value | Adjustment range | Explanation |
|---------------------------|------------|-------------------|----------------------------|---|
| Actual voltage | 14 | 400 | 100 — 500 V | Set the local, mean voltage between the line conductors. |
| Date/time | | | yyyy - mm - dd | Year - Month - Day |
| | | | hh : mm | Hour : Minute |
| Altitude | 2 | 0 — 999 | 0 — 999 m | Request the altitude above sea level from the closest weather station. If the altitude is unknown, set 0 — 999 m. |
| | | | 1000 m — 1999 m | |
| | | | 2000 m — 2499 m | |
| | | | 2500 m or higher | |
| Volume of audible signal | | Medium | Individual | Sets the volume. |
| Temperature unit setting | 1 | °C | °C | Celsius (°C) |
| | | | °F | Fahrenheit (°F) |
| Unit of volume | 34 | ml | (ml) | Millilitre (ml) |
| | | | (fl.oz.) | Fluid ounce (fl.oz.) |
| | 35 | Imperial (fl.oz.) | Imperial (fl.oz.) | Imperial fluid ounce |
| | | | U.S. (fl.oz.) | U.S. fluid ounce |
| Water filter maintenance | 44 | 0 | 0 — 99900 l | Water quantity up to the maintenance message. |
| | | | 0 = No maintenance message | |
| Network | | DHCP | Network address and DHCP | Select and set interface. |
| Kitchen control system | 652 | Disabled | 0 = Disabled 1 = Active | Indicates whether the Kitchen management system is being used. |
| | 659 | Ethernet | 0 = Ethernet 1 = Serial | Type of signal transmission (interface) |
| | 653 | 1188 | 0 — 65535 | TCP port setting |
| | 654 | 254 | 0 — 254 | Unit address |
| 80 % power | 3 | 100 | 80 % | Power can be limited to 80 % (for special applications). |
| | | | 100 % | |
| Power optimisation system | 42 | Off | On | If a power optimisation system is connected, "On" must be selected for the unit to heat. |
| | | | Off | |
| Settings parameters | | | | <ol style="list-style-type: none"> Set parameters via the roller. Tap the "Read" button to display the set value. Specify another value via the button panel. Press the "Write" button to save the new value. |

Basic control setting (Advanced)

| Basic setting | Parameters | Standard value | Adjustment range | Explanation |
|----------------------------------|------------|----------------|---|--|
| Generator operation | 45 | 0 | 0 = No | If a generator is used to supply electricity |
| | | | 1 = Yes | |
| Vapour elimination | 48 | 1 | 0 = Low | Sets the vapour elimination level |
| | | | 1 = Normal | |
| | | | 2 = High | |
| Time format | 675 | 0 | 0 = 24 h | Sets the 12 h or 24 h time format |
| | | | 1 = 12 h | |
| Format for cooking program times | 676 | 0 | 0 = hh:mm 1 = mm:ss 2 = Automatic | Display format for cooking program times |

4 Transporting the unit



CAUTION

Risk of property damage and personnel injury from tipping equipment

- Do not linger next to or behind raised equipment.
 - Move raised equipment carefully.
-

ATTENTION

Risk of physical damage from improper transport

- Transport the unit upright.
 - Do not tilt or stack the unit.
 - Pay attention to protruding parts when transporting the unpacked unit.
-

Prior to transporting the unit to the installation site, ensure that:

- The roadway has adequate load-bearing capacity.
- Wall openings are large enough.

4.1 Transporting the unit to the installation site

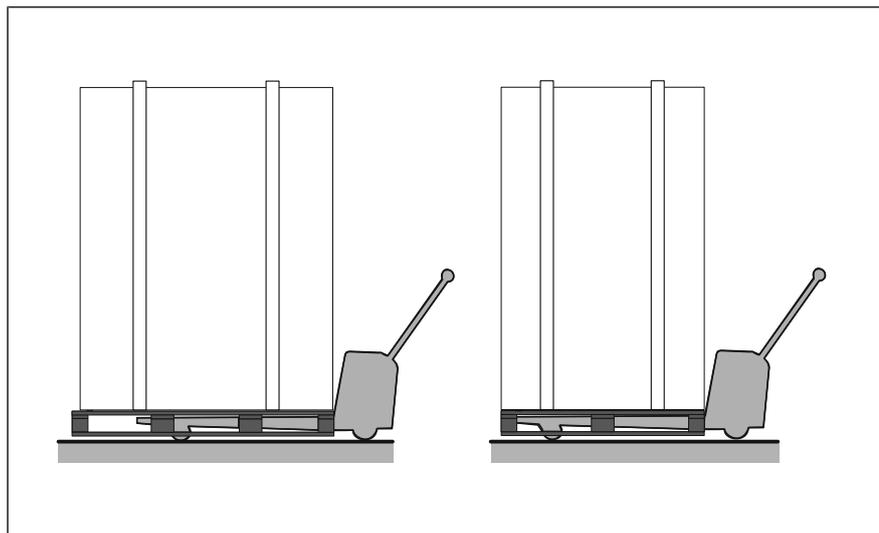


Image: Lengthwise and crosswise transport on pallet

→ Use suitable transport means to move the unit to the installation site.

4.2 Unpacking the unit



CAUTION
Risk of injury from sharp edges

- Wear protective gloves.
-



When unpacking the unit, inspect it for transport damage.

Do not install damaged units or put into service.

1. Remove the packaging.
2. Pull the protective film off the unit.
3. Remove the packaging material from the cooking zone completely.
4. Clean the unit (See Operating instructions).
5. Enter the information from the nameplate into the Commissioning report.
6. Enter the information from the nameplate into the Operating instructions.

5 Setting up the unit



CAUTION

Risk of crushing from improper setup

- Protect the unit and work area during setup and alignment.
-



CAUTION

Risk of fire from failure to observe applicable regional fire prevention regulations

- Observe applicable regional fire prevention regulations.
-

ATTENTION

Risk of physical damage from overheating of the unit

- Do not set up the unit close to heat sources.
-

ATTENTION

Risk of physical damage from lifting the unit by the discharge channels

The discharge channels may become deformed

- Do not lift or support the unit by the discharge channels.
-

5.1 Minimum clearances

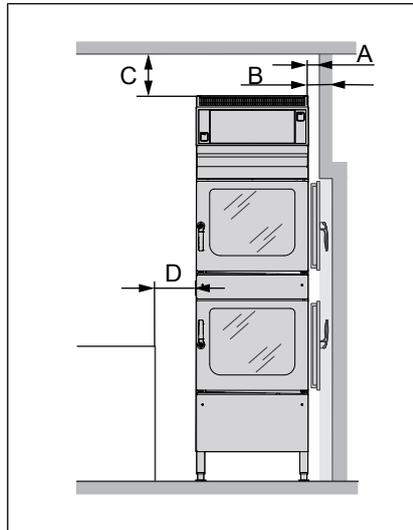


Image: Minimum clearances to walls, ceiling or units

| A | B | C * | D |
|---|-----|-----|-----|
| --- | 100 | 50 | --- |
| All dimensions in mm | | | |
| * Depending on the kitchen ventilation system and the material composition of the ceiling | | | |

The following clearances from walls, ceilings or other equipment must be maintained when installing the unit:

- Clearance to deep-fat fryers, at least one length of the hand shower on the left and right.

5.2 Lifting the unit off the pallet



CAUTION

Risk of property damage and personnel injury from tipping equipment

- Do not linger next to or behind raised equipment.
- Move raised equipment carefully.

Requirements Unit unpacked
Protective film removed
Unit cleaned

1. Slide the forks of the pallet truck under the unit.
2. Lift the unit carefully off the pallet.

5.3 Placing the unit on the equipment legs

Requirement The floor must support the weight of the unit

1. Use appropriate lifting gear to lift the unit.
2. Set up the unit in accordance with the planning drawing.
3. Align the unit lengthwise and crosswise (see "Aligning the unit").

5.4 Aligning the unit

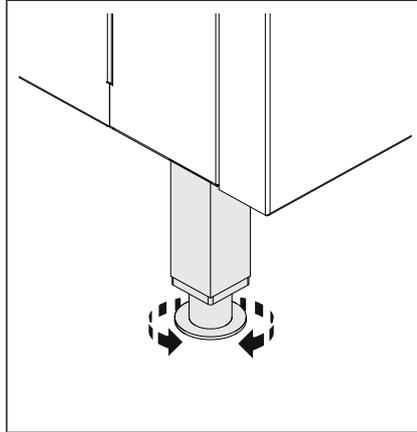


Image: Aligning the unit on the equipment legs

1. Place a spirit level on the unit.
2. Align the unit horizontally by screwing the equipment legs in or out.
3. Fill out the Commissioning report.

5.5 Checking the filter on the air recirculation hood

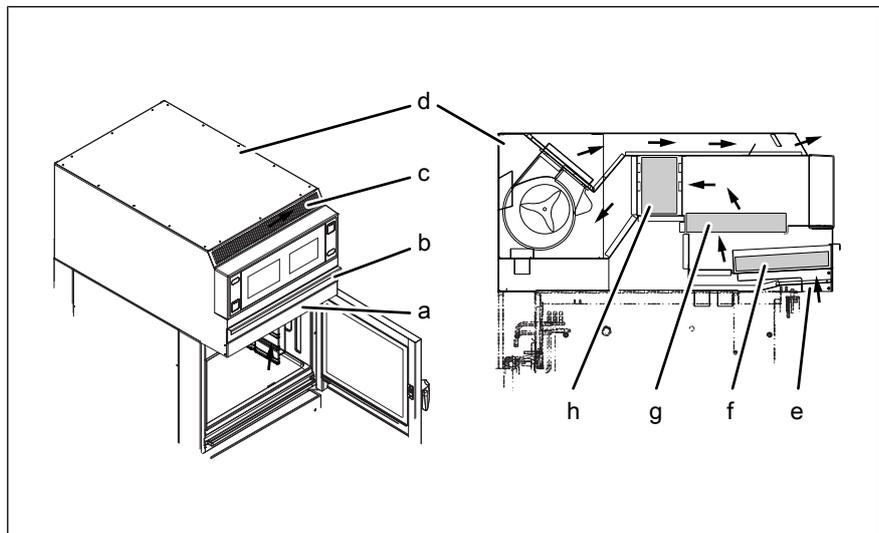


Image: Filter for air recirculation hood

- | | | | |
|---|------------------------|---|----------------------|
| a | Condensation baffle | e | Vapour inlet |
| b | Filter drawer | f | Filter pad, yellow |
| c | Air outlet | g | Air filter |
| d | Air recirculation hood | h | Active carbon filter |

Requirements Unit not live

Step ladder set up securely

1. Pull out the filter drawer.
2. Unhook the condensation baffle.
3. Check that the air filter is located correctly in the holder.
 - ↳ Make sure that the filter is supported correctly.
 - ↳ The air filter lies on the holders.
4. Hook the condensation baffle back in.
5. Check that the yellow filter pad is firmly located in the filter drawer.
6. Push the filter drawer in completely.
7. Fill out the Commissioning report.

5.6 Fastening the unit to the floor

5.6.1 Securing the unit against tilting



WARNING

Risk of accidents from inadequate fastening

The unit may tip over

- The unit must be fastened to the floor by suitable methods depending on the type of unit.
- Observe the requirements for the condition of the floor.
- Observe the requirements for the type of fastening.
- Note the instructions from the manufacturer of the fastenings.

Depending on the size, it is mandatory that certain types of Combisteamers are secured against tilting, and this also applies to Combisteamers in conjunction with a stacking kit, air recirculation hood, base frame or base cabinet.

Types of units, which must be secured against tilting (see "Unit and connection data").

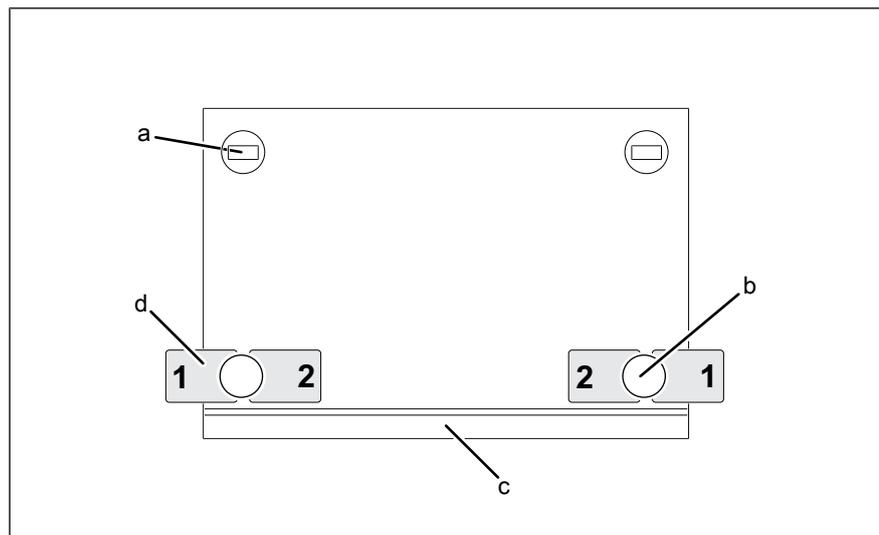


Image: Arrangement of the floor plates (view from above)

- | | |
|------------------------------|---------------------|
| a Equipment leg with castors | c Cooking zone door |
| b Equipment leg | d Floor plate |

A special fastening set, which secures the unit against tilting, is supplied by the manufacturer or is available as an accessory.

The fastening set comprises two floor fastenings and all the necessary components for screwing or bonding them to the floor.

The unit or base frame is fastened with two floor fastenings as shown in the drawing.

Floor without steam barrier

In the case of floors without a steam barrier, the floor plates are screwed to the floor with the enclosed screws.

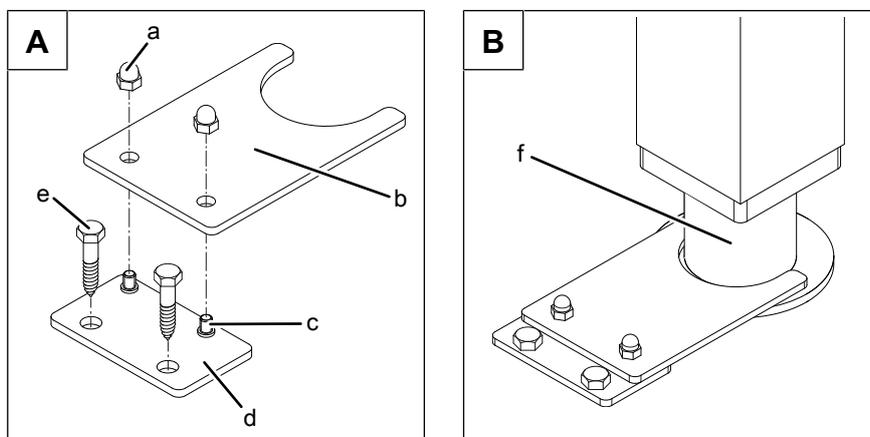


Image: A: Position of the floor plate; B: Floor plate screwed to the floor

- | | | | |
|---|---------------|---|---------------|
| a | Cap nut | d | Floor plate |
| b | Holding plate | e | Wood screw |
| c | Stud bolt | f | Equipment leg |

Requirement The floor must be capable of taking the weight of the unit
 The floor must be clean and suitable for the type of fastening
 The unit is set up and levelled in accordance with the planning drawing

1. Insert the base plate of the fastening set into the holding plate in accordance with the drawing.
2. Screw the cap nuts on hand-tight.
3. Align the floor fastening in accordance with the drawing in position 1-1 or 2-2 on the equipment leg or base frame and then mark the fastening holes on the floor.
4. Mark the position of all the equipment legs or base frame on the floor.
5. Using suitable lifting equipment, move the unit away until the drill holes can be made in the floor.
6. Drill the holes in the diameter of the dowel sufficiently deep into the floor.
7. Carefully move the unit to the installation position.
8. Unscrew the cap nuts and remove the holding plate from the base plate.
9. Screw the base plate to the floor using the enclosed dowels and fastening screws.
10. Ensure that, after the fastening screws have been inserted, the floor seal is restored again.
11. Put the holding plate onto the base plate and fasten it with the cap nuts.
12. Fill out the Commissioning report.

Floor with steam barrier

In the case of floors with a steam barrier, the floor plates are not screwed to the floor but glued with the enclosed adhesive.

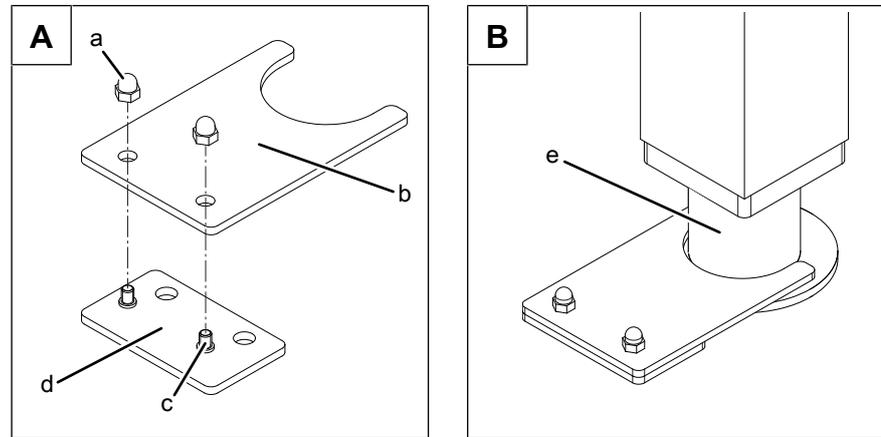


Image: A: Position of the floor plate; B: Floor plate glued to the floor

- | | | | |
|---|---------------|---|---------------|
| a | Cap nut | d | Floor plate |
| b | Holding plate | e | Equipment leg |
| c | Stud bolt | | |

Requirement The floor must be capable of taking the weight of the unit
The floor must be clean and suitable for the type of fastening
The unit is set up and levelled in accordance with the planning drawing

1. Insert the base plate of the fastening set into the holding plate in accordance with the drawing.
2. Screw the cap nuts on hand-tight.
3. Align the floor fastening in accordance with the drawing in position 1-1 or 2-2 on the equipment leg or base frame and then mark it on the floor.
4. Unscrew the cap nuts and remove the holding plate from the base plate.
5. Fasten the base plates to the floor with the enclosed adhesive.
 - ↳ Note the manufacturer's instructions for the adhesive.
 - ↳ Apply the adhesive in accordance with the manufacturer's instructions.
 - ↳ Observe the drying time in accordance with the manufacturer's instructions.
6. Put the holding plate onto the base plates and fasten with the cap nuts.
7. Fill out the Commissioning report.

6 Connecting the unit

**DANGER**

Risk of personal injury and physical damage from electric shock

- Prior to working on the unit, ensure that the unit has been disconnected from the mains.
- Do not operate the unit with the housing open.

**CAUTION**

Risk of injury from sharp edges

- Wear protective gloves.

ATTENTION

Risk of physical damage from damage to the lines

- Remove and attach housing components carefully.

6.1 Opening and closing the housing

6.1.1 Removing and attaching the rear panel

Removing the rear panel

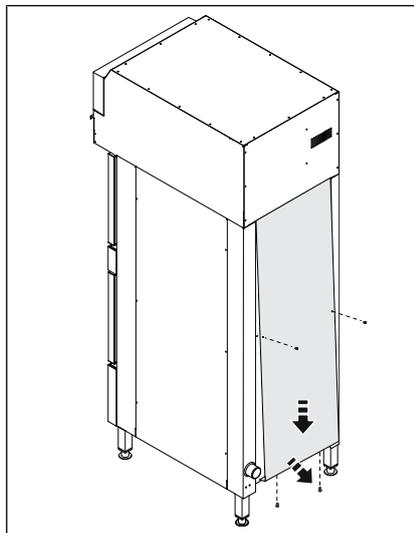


Image: Removing the rear panel

1. Unscrew the screws on the rear panel.
2. Remove the rear panel.

Attaching the rear panel

ATTENTION

Risk of physical damage from leaky housing

- Check seals when attaching the housing parts.
- Replace damaged gaskets.

1. Carefully press in the rear panel.
2. Screw in the screws on the rear panel.

↳ The rear panel must be in contact with the unit on all sides.

6.2 Making the electrical connection

Electrical installation work

Electrical installation work on the electric system and the unit may only be performed by a specialist company, which is approved by the electric utility company in the particular region. The applicable regional regulations, standards and guidelines must be observed, as well as the connection conditions imposed by the electric utility company responsible.

Professional qualification for electrical installation work

Electrical installation work on the electrical system and the unit may only be carried out by an electrician from the specialist company assigned to the work.

The unit must be connected on the basis of the information on the nameplate and this manual.

Wiring diagram

The wiring diagram is included with the unit.

The wiring diagram and additional documents are available on the manufacturer's Internet page by entering the serial number of the unit (see Impressum).

Power connection cable

Minimum requirements for the unit's power connection cable to the electric mains:

| Connection | Power connection cable |
|--|--|
| Permanent connection for fixed installation with a cable from the unit to a separate connection box. | Rubber sheath cable, oil-resistant, shrouded and flexible in accordance with IEC 60245-57 (for example H05RN-F). |
| Connection of the unit with a plug. | |
| Permanent connection for fixed installation with a permanently laid cable and direct connection to the unit. | PVC sheathed cable for permanent ducting in buildings or damp and wet rooms. |



Permanent connection



CAUTION

Risk of property damage and personal injury from improper installation

- In the case of a permanent electrical connection, install an all-phase disconnect switch before the unit.

Install an all-phase disconnect switch if the unit will be connected permanently to the electric mains.

Plug-in connection



CAUTION

Risk of property damage and personal injury from improper installation

- The plug-in connection must be readily accessible.

If the unit is connected with a plug to the power-supply mains, use plugs and sockets according to IEC60309.

The socket must be readily accessible so that the unit can be disconnected from the electric mains at any time.

Insulation monitoring

If there is an unearthed network (IT network), the unit can be incorporated into the insulation monitoring.

Fault current device

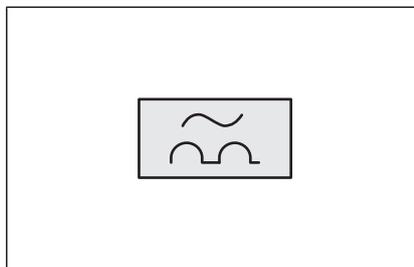


Image: RCD switch type A, circuit symbol

The unit can be connected to a fault current device.

If a fault current device is used, a fault current device type A (RCD type A) must be installed, to ensure that AC fault currents and pulsating DC currents are detected.

If the unit is connected to an electric mains system without a neutral conductor, a type B fault current circuit breaker (RCD type B), which is sensitive to all types of current, must be installed.

Due to special electronic components, the unit generates a small fault current. To ensure that the residual current device does not trip during normal operation, each unit must have its own residual current device.

Potential equalisation

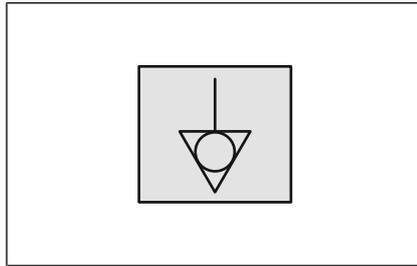


Image: Symbol for potential equalisation

The unit can be included in a potential equalisation system by means of appropriately sized wiring.

6.2.1 Connecting the power connection cable



DANGER

Risk of personal injury and physical damage from electric shock

- Before working on the unit, ensure that the unit has been disconnected from the power supply.



DANGER

Risk of personal injury and physical damage from electric shock

- Before connecting, ensure that the power connection cable has been disconnected from the power supply.
- Ensure that the power connection cable is undamaged.

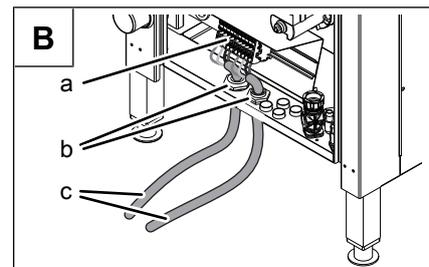
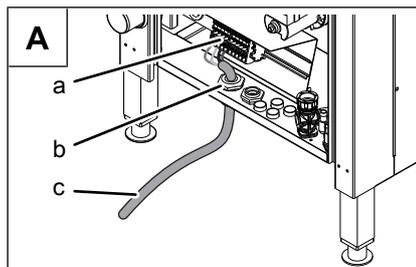


Image: A: Unit with one electrical connection; B: Unit with two electrical connections

- a Connection terminals
- b Cable gland

- c Power connection cable

Requirements Unit not live

Power connection cable not live

Rear panel opened

1. Route the power connection cable into the unit through the cable gland.
2. Connect the power connection cable in accordance with the wiring diagram.

3. Secure the power connection cable with cable ties.
4. Tighten the cable gland securely to provide strain relief.
5. Close the housing (see "Opening and closing the housing").
6. Fill out the Commissioning report.

6.2.2 Connecting the power optimizing system



DANGER

Risk of personal injury and physical damage from electric shock

- Before working on the unit, ensure that the unit has been disconnected from the power supply.



DANGER

Risk of personal injury and physical damage from electric shock

- Before connecting, ensure that the power connection cable has been disconnected from the power supply.
- Ensure that the power connection cable is undamaged.

The unit can be connected to a power optimisation system with a dry contact, which is designed in accordance with DIN 18875. The dry contact is used for logging the unit onto the control system.

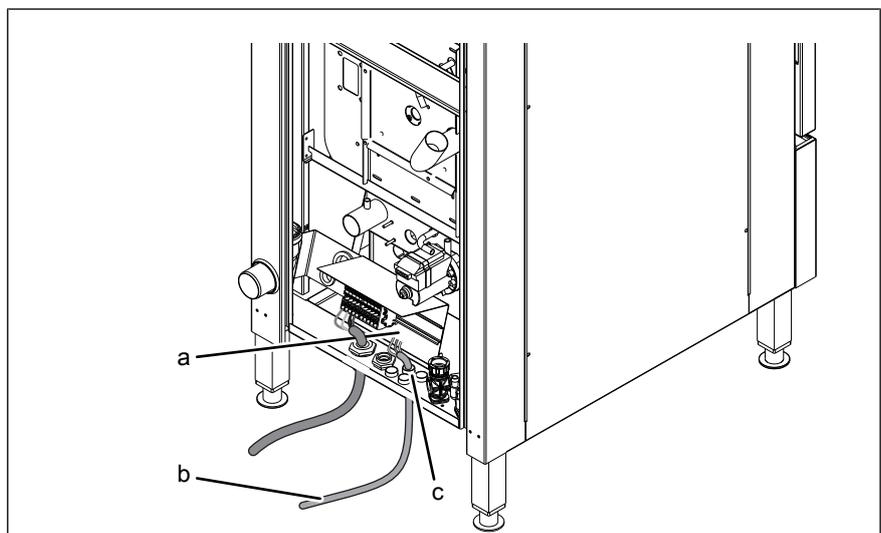


Image: Connecting the power optimisation system

- | | | | |
|---|--|---|-------------|
| a | Connection terminals for power optimisation system | c | Cable gland |
| b | Power connection cable for power optimisation system | | |

Requirement Unit not live

Power connection cable not live

Housing opened

1. Pull the power connection cable into the unit through the cable gland.
2. Bring the power connection cable to the connection terminals.
3. Connect the power connection cable in accordance with the wiring diagram.
4. Secure the power connection cable with cable ties.
5. Register the power optimisation system in the basic control settings (see "Making the basic control settings").
6. Fill out the Commissioning report.

6.2.3 Connecting to the potential equalisation circuit

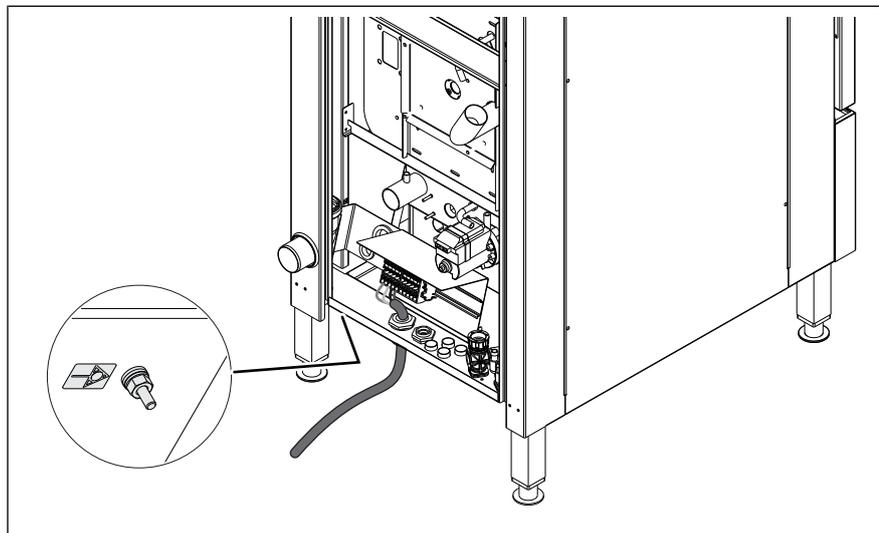


Image: Connecting to the potential equalisation circuit

1. Run and attach potential equalisation line to the identified terminal.
2. Fill out the commissioning report.

6.3 Connecting the kitchen management system

The units can be connected with a RJ45 plug to a kitchen management system.



DANGER

Risk of personal injury and physical damage from electric shock

- Prior to working on the unit, ensure that the unit has been disconnected from the mains.
- Do not operate the unit with the housing open.

Minimum requirements for the network cable

| | |
|--------------------|---|
| Type of network | Ethernet |
| Cable quality | 4-pair, shrouded patch cable Cat-5 S/FTP |
| Connection to unit | Shrouded RJ45 plug |

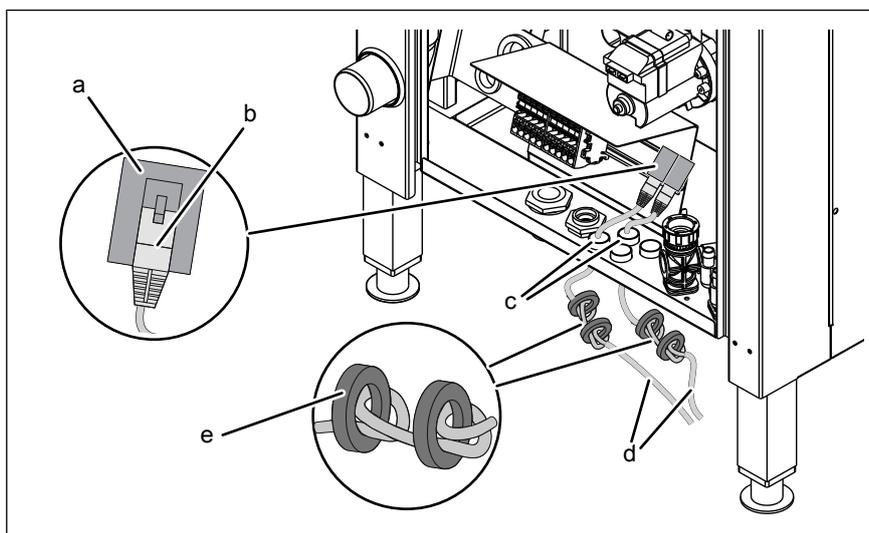


Image: Connecting the kitchen management system

- | | |
|---------------|-----------------|
| a RJ45 socket | d Network cable |
| b RJ45 plug | e Ferrite ring |
| c Cable gland | |

Requirement Unit not live
Housing opened

1. Pull the network cable into the unit through the cable gland.
2. Lead the network cable through the two ferrite rings, with one winding through each.
3. Connect the network cable to the unit with the RJ45 plug.
4. Register the network in the basic control setting (see "Making the basic control setting").
5. Fill out the Commissioning report.

6.4 Making the basic control setting

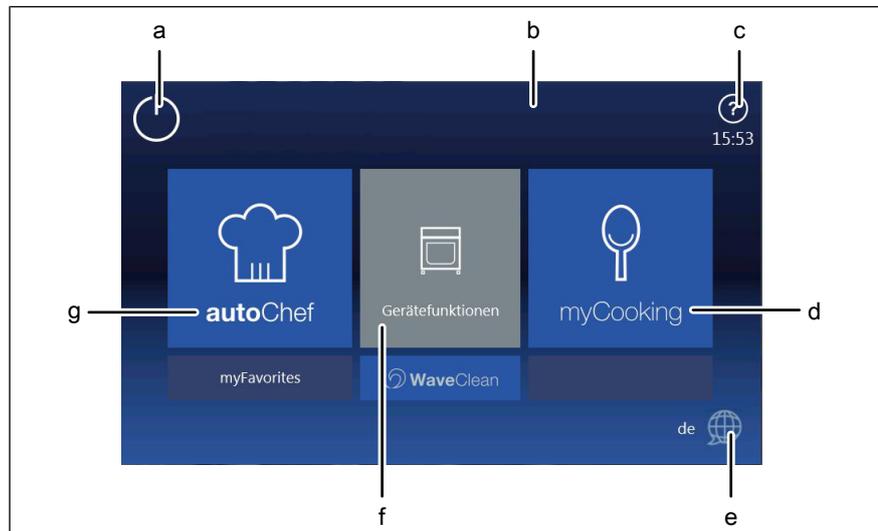


Image: Main menu

- | | |
|---------------------------|------------------------------------|
| a <i>Stand-by</i> button | e <i>Language selection</i> button |
| b Information bar | f "Equipment functions" button |
| c <i>FlexiHelp</i> button | g "autoChef" button |
| d "myCooking" button | |

6.4.1 Changing the basic control setting

By entering the password "2100", the basic settings for the installation can be displayed and changed.



The basic settings are made in the dialogue.

Advanced settings are made via the parameters for the settings.

Requirement The unit is switched on
The Main menu is displayed

1. Tap the "Equipment functions" button.
↳ The *Equipment functions* menu is displayed.
2. Tap the "Equipment settings" field.
↳ The *PIN* window opens.
3. Enter the password.
4. Tap the *Confirm* button.
↳ The *Equipment settings* menu is displayed.
↳ The basic settings can be changed (see "Equipment and connection data").
5. Fill out the Commissioning report.

6.5 Making the water connection

Installation work with tap water

Installation work on tap water lines and the unit may only be performed by a specialist company, which is approved by the water utility company in the particular region. The applicable regional regulations, standards and guidelines must be observed, as well as the connection conditions imposed by the water utility company responsible.

Professional qualification for tap water installation work

Installation work on the tap water lines and the unit may only be carried out by a plumber from the specialist company assigned to the work.

The unit has a connection for permanent attachment the drinking water system.

The unit is equipped with a permanent connection for:

- Softened drinking water for steam generation
- Drinking water for cooling, rinsing and cleaning



CAUTION

Hygiene risk from contaminated drinking water

- The connection to the drinking water supply must be equipped with a backflow preventer.

ATTENTION

Risk of physical damage from the wrong water quality

- Ensure that the water quality complies with the equipment and connection data.



Always connect both water connections to the unit.

6.5.1 Connecting the tap water connection line

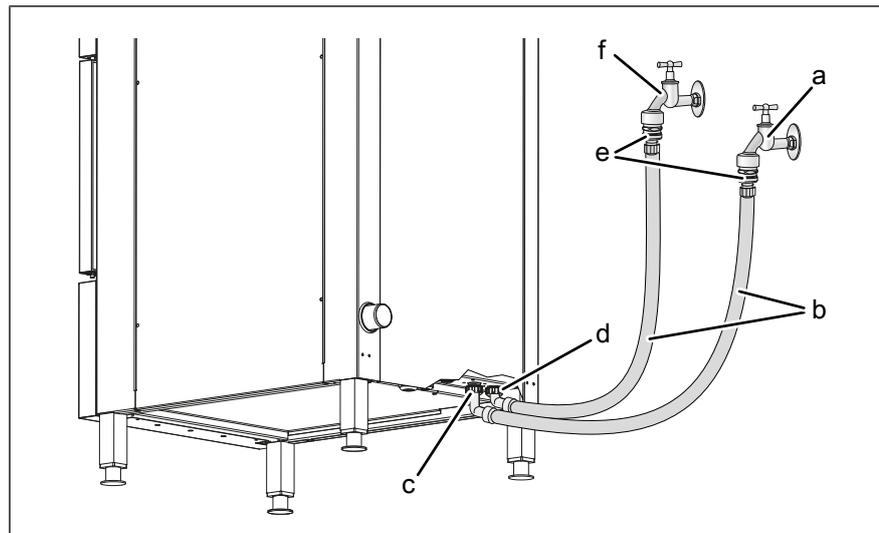


Image: Water connection

- | | |
|-------------------------|------------------------|
| a Softened tap water | d Tap water connection |
| b Connection line | e Backflow preventer |
| c Soft water connection | f Tap water |

Requirement Water pressure complies with the specified range (see "Equipment and connection data")

Backflow preventer installed

The connection lines are pressure-tight and suitable for tap water

1. Connect the connection lines to the tap water valves using seals.
2. Flush the connection lines thoroughly.
3. Insert dirt filters into the water connections on the unit.
4. Connect the tap water connection line to the unit.
5. Connect the soft water connection line to the unit.
6. Open the tap water valves and check the threaded connectors for leaks.
7. Fill out the Commissioning report.

6.5.2 Connecting softened tap water to both connections

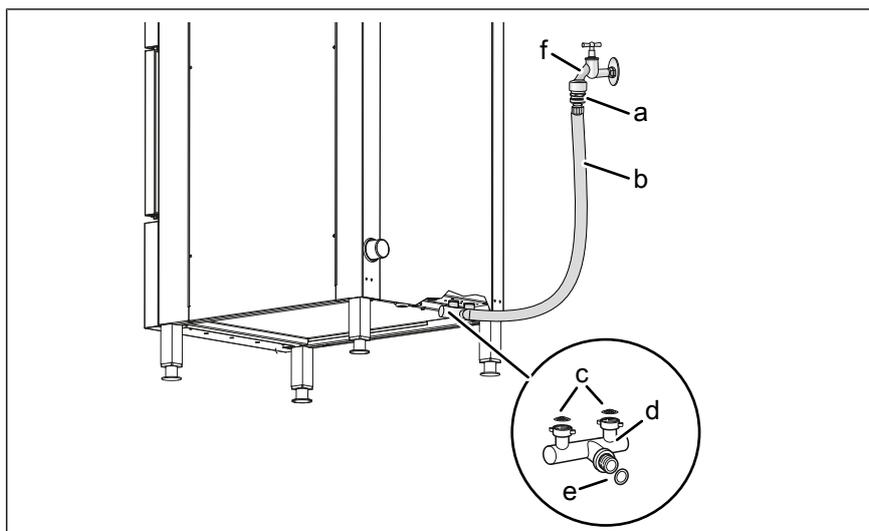


Image: Connecting softened tap water to both connections

- | | |
|----------------------|----------------------|
| a Backflow preventer | d T-piece |
| b Connection line | e Seal |
| c Dirt filter | f Softened tap water |

If only softened tap water is available at the installation site, use a T-piece to connect both water connections on the unit to each other.

Requirement Water pressure complies with the specified range (see "Equipment and connection data")

Backflow preventer installed

The connection line is pressure-tight and suitable for tap water

1. Connect the connection line to the tap water valve for soft water using a seal.
2. Flush the connection line thoroughly.
3. Insert dirt filters into the water connections on the unit.
4. Connect the T-piece to the unit.
5. Connect the connection line for soft water to the T-piece using a seal.
6. Open the tap water valve and check the threaded connectors for leaks.
7. Fill out the Commissioning report.

6.6 Making the wastewater connection

Installation work with wastewater

Installation work on wastewater lines and the unit may only be performed by a specialist company, which is responsible for wastewater systems. The applicable regional regulations, standards and guidelines must be observed, as well as the connection conditions imposed by the wastewater system operator responsible.

Professional qualification for wastewater specialist

Installation work on wastewater lines and the unit may only be carried out by a wastewater specialist from the specialist company assigned to the work.

6.6.1 Connecting the wastewater line to a permanent connection

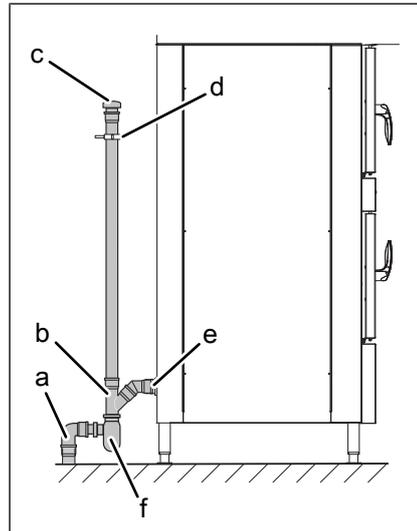


Image: Wastewater line with vacuum breaker to a permanent connection

- | | |
|-------------------|---------------------------|
| a Sewer system | d Pipe clamp |
| b Wastewater line | e Wastewater connection |
| c Vacuum breaker | f Sewer system waste trap |



A vacuum breaker must be installed in the wastewater line.

Requirement Wastewater line complies with the specifications (see "Equipment and connection data")

1. Install the wastewater line up to the connection at the sewer system.
2. Secure the wastewater line with pipe clamps.
3. Fill the waste trap on the unit with tap water.
4. Fill out the Commissioning report.

6.6.2 Connecting wastewater line to collection basin (optional)

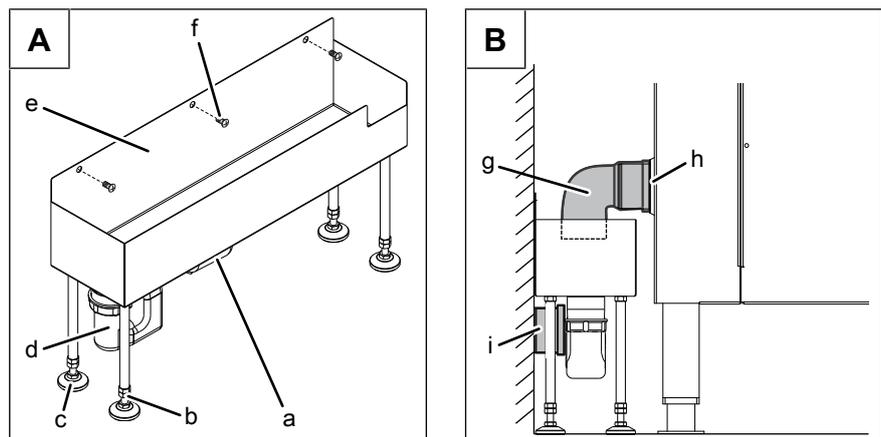


Image: A: Collection basin; B: Wastewater connection

- | | | | |
|---|------------------|---|--------------------------------------|
| a | Wastewater line | f | Fastening screw (fitted to building) |
| b | Locknut | g | Wastewater line (in building) |
| c | Adjustable foot | h | Wastewater connection |
| d | Waste trap | i | Sewer system |
| e | Collection basin | | |

Requirements Wastewater line complies with the specifications (see "Equipment and connection data")

1. Put a 90° wastewater pipe onto the unit's wastewater connection.
2. Release the locknuts on the adjustable feet.
3. Using the adjustable feet, set the height of the collection basin and align it horizontally.
 - ↳ When pushing the Combisteamer, make sure that the 90° bend does not bump against the collection basin.
4. Push the Combisteamer, until the wastewater line projects over the middle of the collection basin.
5. Fasten the adjustable feet with the locknuts.
6. Attach the collection basin to the wall with the fastening screws.
7. Install the wastewater line up to the connection at the sewer system.
8. Fill the waste trap with water.
9. Fill out the commissioning report.

7 Checking operation



DANGER

Risk of personal injury and physical damage from unsuccessful operational check

- Do not put the unit into service.
 - Contact customer service.
-

Requirement Power connection made
Water connection made
Wastewater connection made
Unit cleaned

7.1 Checking the air recirculation hood

Requirements Cooking zone door closed

1. Switch on the unit.
 - ↳ The fan for the air recirculation hood runs continuously.
2. Open the cooking zone door.
 - ↳ The fan for the air recirculation hood runs faster.
 - ↳ The air recirculation hood is connected correctly.
3. Switch off the unit.
4. Fill out the Commissioning report.

7.2 Checking the controls

1. Switch on the unit and start any cooking program (see Operating instructions).
 - ↳ Set the cooking zone temperature to a higher temperature than the current cooking zone temperature.
 - ↳ The unit heats up.
 - ↳ Once the set temperature is reached, heating switches off.
 - ↳ The temperature no longer increases.
 - ↳ The controls are functioning.
2. Switch off the unit.
3. Fill out the Commissioning report.

7.3 Checking the monitoring of the cooking zone door

1. Switch on the unit and start any cooking program (see operating instructions).
 - ↳ The unit starts to heat.
 - ↳ The fan wheel is turning.
2. Open the cooking zone door during operation.
 - ↳ The unit shuts off the heating function.
 - ↳ The fan wheel comes to a stop.
 - ↳ The monitoring of the cooking zone door is functioning.
3. Close the cooking zone door.
4. Switch off the unit.
5. Fill out the commissioning report.

7.4 Heating the unit up and rinsing it out

1. Switch on the unit.
2. Tap the "Manual cooking" button.
 - ↳ The Manual cooking menu is displayed.
3. Run the Steaming cooking mode for 15 minutes at 100 °C.
4. Rinse out the cooking zone thoroughly with clear water.
5. Run the Hot air cooking mode for 5 minutes at 180 °C.
6. Open the cooking zone door and leave it open with a slight gap until the unit is used again.
7. Fill out the Commissioning report.

8 Putting the unit into service



If the unit is not put into service immediately after being connected and the function check, all inspections must be repeated.

- Requirements**
- Power connection made
 - Water connection made
 - Wastewater connection made
 - Function successfully tested
 - Housing closed

1. Instruct operator.
2. Fill out the Commissioning report.

8.1 Nameplate

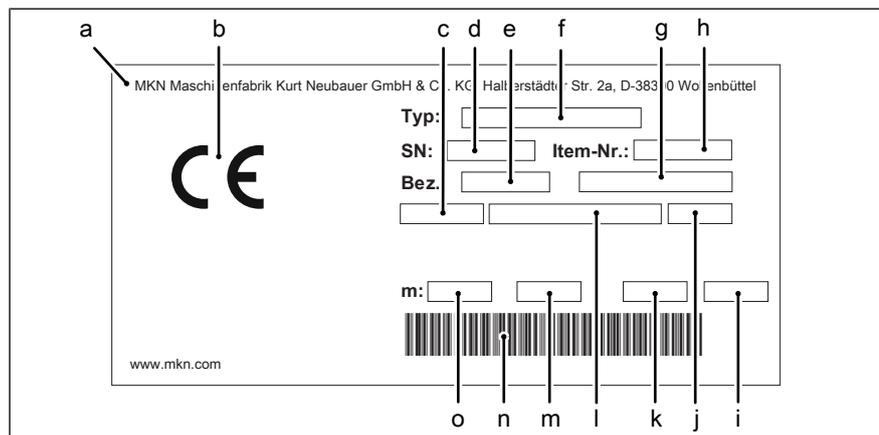


Image: Nameplate information

- | | |
|-----------------------------|--------------------------|
| a Manufacturer | i Frequency |
| b CE mark | j Barcode |
| c Electrical connected load | k Country of destination |
| d Serial number | l Type of connection |
| e Equipment abbreviation | m Protection class |
| f Type number | n Barcode |
| g Equipment designation | o Weight |
| h Item number | |

8.2 Filling out the commissioning report

| General information | Yes | No |
|---|--------------------------|--------------------------|
| Information from the nameplate entered? SN: _____ Type: _____ E: _____ Desig.: _____ Item no.: _____ (if present) | <input type="checkbox"/> | <input type="checkbox"/> |
| Obvious damage to the unit? What and where?: _____ | <input type="checkbox"/> | <input type="checkbox"/> |
| Unit levelled? | <input type="checkbox"/> | <input type="checkbox"/> |

| General information | Yes | No | | |
|--|--|--|--|--|
| Unit fastened to the floor? | <input type="checkbox"/> | <input type="checkbox"/> | | |
| <table border="0"> <tr> <td style="vertical-align: top;"> Secured against tilting <input type="checkbox"/> Floor screw fitting <input type="checkbox"/> Floor bonding </td> <td style="vertical-align: top;"> Secured against sliding <input type="checkbox"/> Floor screw fitting <input type="checkbox"/> Floor bonding </td> </tr> </table> | Secured against tilting <input type="checkbox"/> Floor screw fitting <input type="checkbox"/> Floor bonding | Secured against sliding <input type="checkbox"/> Floor screw fitting <input type="checkbox"/> Floor bonding | | |
| Secured against tilting <input type="checkbox"/> Floor screw fitting <input type="checkbox"/> Floor bonding | Secured against sliding <input type="checkbox"/> Floor screw fitting <input type="checkbox"/> Floor bonding | | | |

| Power connection | Yes | No | | | | |
|--|--|--|---|------------------------------|--|--|
| Power connection made properly? | <input type="checkbox"/> | <input type="checkbox"/> | | | | |
| <table border="0"> <tr> <td><input type="checkbox"/> Equipotential bonding</td> <td><input type="checkbox"/> Power optimizing system</td> </tr> <tr> <td><input type="checkbox"/> Floating contact</td> <td>... <input type="checkbox"/></td> </tr> </table> | <input type="checkbox"/> Equipotential bonding | <input type="checkbox"/> Power optimizing system | <input type="checkbox"/> Floating contact | ... <input type="checkbox"/> | | |
| <input type="checkbox"/> Equipotential bonding | <input type="checkbox"/> Power optimizing system | | | | | |
| <input type="checkbox"/> Floating contact | ... <input type="checkbox"/> | | | | | |
| Electrical connections made properly? | <input type="checkbox"/> | <input type="checkbox"/> | | | | |
| Residual-current protective device connected immediately before this unit? | <input type="checkbox"/> | <input type="checkbox"/> | | | | |
| Residual-current protective device connected before this and other units? | <input type="checkbox"/> | <input type="checkbox"/> | | | | |

| Kitchen management system | Yes | No |
|--|--------------------------|--------------------------|
| Has the kitchen management system been connected properly? | <input type="checkbox"/> | <input type="checkbox"/> |

| Basic control setting | Yes | No | | | | |
|--|---|--|--|---|--|--|
| Unit of temperature set? | <input type="checkbox"/> | <input type="checkbox"/> | | | | |
| <table border="0"> <tr> <td><input type="checkbox"/> °C</td> <td><input type="checkbox"/> °F</td> </tr> </table> | <input type="checkbox"/> °C | <input type="checkbox"/> °F | | | | |
| <input type="checkbox"/> °C | <input type="checkbox"/> °F | | | | | |
| Have date and time been set? | <input type="checkbox"/> | <input type="checkbox"/> | | | | |
| Has software version been identified? | <input type="checkbox"/> | <input type="checkbox"/> | | | | |
| Version: _____ | | | | | | |
| Altitude set? | <input type="checkbox"/> | <input type="checkbox"/> | | | | |
| <table border="0"> <tr> <td><input type="checkbox"/> 0 — 999 m</td> <td><input type="checkbox"/> 1000 m — 1999 m</td> </tr> <tr> <td><input type="checkbox"/> 2000 m — 2499 m</td> <td><input type="checkbox"/> 2500 m or higher</td> </tr> </table> | <input type="checkbox"/> 0 — 999 m | <input type="checkbox"/> 1000 m — 1999 m | <input type="checkbox"/> 2000 m — 2499 m | <input type="checkbox"/> 2500 m or higher | | |
| <input type="checkbox"/> 0 — 999 m | <input type="checkbox"/> 1000 m — 1999 m | | | | | |
| <input type="checkbox"/> 2000 m — 2499 m | <input type="checkbox"/> 2500 m or higher | | | | | |

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Putting the unit into service

| Basic control setting | | Yes | No |
|---|--|--------------------------|--------------------------|
| 80 % power set? | | <input type="checkbox"/> | <input type="checkbox"/> |
| <input type="checkbox"/> 100 % | <input type="checkbox"/> 80 % | | |
| Current voltage set? | | <input type="checkbox"/> | <input type="checkbox"/> |
| Voltage: _____ V | | | |
| Audible signal volume set? | | <input type="checkbox"/> | <input type="checkbox"/> |
| <input type="checkbox"/> Quiet | <input type="checkbox"/> Loud | | |
| Signal tone selected? | | <input type="checkbox"/> | <input type="checkbox"/> |
| Volume unit set? | | <input type="checkbox"/> | <input type="checkbox"/> |
| <input type="checkbox"/> ml | <input type="checkbox"/> fl.oz. (Imperial) | | |
| <input type="checkbox"/> fl.oz. (U.S.) | | | |
| Power optimisation system set? | | <input type="checkbox"/> | <input type="checkbox"/> |
| <input type="checkbox"/> On | <input type="checkbox"/> Off | | |
| Water filter maintenance set? | | <input type="checkbox"/> | <input type="checkbox"/> |
| <input type="checkbox"/> No maintenance message | <input type="checkbox"/> Maintenance message at: _____ | | |
| Has network configuration been set? | | <input type="checkbox"/> | <input type="checkbox"/> |
| <input type="checkbox"/> DHCP | IP address: _____ | | |
| Subnet mask: _____ | Gateway: _____ | | |
| Has kitchen management system been set? | | <input type="checkbox"/> | <input type="checkbox"/> |
| <input type="checkbox"/> Active | <input type="checkbox"/> Disabled | | |
| <input type="checkbox"/> Ethernet | <input type="checkbox"/> Serial | | |
| TCP port: _____ | Unit address: _____ | | |
| Unit address: _____ | | | |
| Water connection | | Yes | No |
| Connection pressure within indicated range? | | <input type="checkbox"/> | <input type="checkbox"/> |
| Connection pressure: _____ (_____) kPa (bar) | | | |
| Water connection made properly? | | <input type="checkbox"/> | <input type="checkbox"/> |
| Lines and connections leak-tight? | | <input type="checkbox"/> | <input type="checkbox"/> |
| Water connections connected with T-piece? | | <input type="checkbox"/> | <input type="checkbox"/> |
| <input type="checkbox"/> Only connect to softened tap water | <input type="checkbox"/> Only connect to tap water | | |
| Wastewater connection | | Yes | No |
| Wastewater connection made in a technically correct manner? | | <input type="checkbox"/> | <input type="checkbox"/> |
| <input type="checkbox"/> On-site waste trap | <input type="checkbox"/> Vacuum breaker | | |
| <input type="checkbox"/> Funnel drain | <input type="checkbox"/> Floor gutter | | |
| Connection dimension of wastewater line: _____ mm | | | |
| <input type="checkbox"/> collection basin | | | |



| Air recirculation hood | Yes | No |
|--|--------------------------|--------------------------|
| Checked that the filter is located firmly and correctly? | <input type="checkbox"/> | <input type="checkbox"/> |

| Function check | Yes | No |
|---|--------------------------|--------------------------|
| Controls are functioning? | <input type="checkbox"/> | <input type="checkbox"/> |
| Do both fan speeds function for the air recirculation hood? | <input type="checkbox"/> | <input type="checkbox"/> |
| Monitoring of the cooking zone door is functioning? | <input type="checkbox"/> | <input type="checkbox"/> |
| Unit heated up and rinsed out? | <input type="checkbox"/> | <input type="checkbox"/> |

| Final notes | Yes | No |
|--------------------------------|--------------------------|--------------------------|
| Was the unit put into service? | <input type="checkbox"/> | <input type="checkbox"/> |
| Comments: | | |
| Operator trained? | <input type="checkbox"/> | <input type="checkbox"/> |

| | | | |
|--|-----------|------------|-----------|
| Electrical installation was provided by: | | | |
| | | | |
| Company | Installer | City, date | Signature |

| | | | |
|--|-----------|------------|-----------|
| The connection to a kitchen management system was made by: | | | |
| | | | |
| Company | Installer | City, date | Signature |

| | | | |
|-------------------------------------|-----------|------------|-----------|
| Water installation was provided by: | | | |
| | | | |
| Company | Installer | City, date | Signature |

| | | | |
|--|-----------|------------|-----------|
| Wastewater installation was provided by: | | | |
| | | | |
| Company | Installer | City, date | Signature |

| | | | |
|--------------------------------------|-----------|------------|-----------|
| The function check was performed by: | | | |
| | | | |
| Company | Installer | City, date | Signature |

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Putting the unit into service

| | | | |
|------------------------------------|-----------|------------|-----------|
| Operator training was provided by: | | | |
| Company | Installer | City, date | Signature |



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