

EN

OPERATING MANUAL
LOCAL AIR CONDITIONER



Table of contents

Notes regarding the operating manual..... 2

Safety 2

Information about the device..... 5

Transport and storage..... 6

Assembly and start-up..... 7

Operation 12

Errors and faults..... 15

Maintenance 18

Technical annex..... 21

Disposal 25

Notes regarding the operating manual

Symbols



Danger

This symbol indicates dangers to the life and health of persons due to extremely flammable gas.



Warning of electrical voltage

This symbol indicates dangers to the life and health of persons due to electrical voltage.



Warning

This signal word indicates a hazard with an average risk level which, if not avoided, can result in serious injury or death.



Caution

This signal word indicates a hazard with a low risk level which, if not avoided, can result in minor or moderate injury.

Note

This signal word indicates important information (e.g. material damage), but does not indicate hazards.



Info

Information marked with this symbol helps you to carry out your tasks quickly and safely.



Follow the manual

Information marked with this symbol indicates that the operating manual must be observed.

You can download the current version of the operating manual and the EU declaration of conformity via the following link:



PAC 4600



<https://hub.trotec.com/?id=43770>

Safety

Read this manual carefully before starting or using the device. Always store the manual in the immediate vicinity of the device or its site of use.



Warning

Read all safety warnings and all instructions.

Failure to follow the warnings and instructions may result in electric shock, fire and/or serious injury.

Save all warnings and instructions for future reference.

This appliance can be used by children aged from 8 years and above and persons with reduced physical, sensory or mental capabilities or lack of experience and knowledge if they have been given supervision or instruction concerning use of the appliance in a safe way and understand the hazards involved.

Children shall not play with the appliance. Cleaning and user maintenance shall not be made by children without supervision.

- Do not use the device in potentially explosive rooms or areas and do not install it there.
- Do not use the device in aggressive atmosphere.
- Only put up the device in an upright, stable position on firm ground.
- Let the device dry out after a wet clean. Do not operate it when wet.
- Do not use the device with wet or damp hands.
- Do not expose the device to directly squirting water.
- Never insert any objects or limbs into the device.
- Do not cover the device during operation.
- Do not sit on the device.
- This appliance is not a toy. Keep away from children and animals. Do not leave the device unattended during operation.
- Check accessories and connection parts for possible damage prior to every use of the device. Do not use any defective devices or device parts.

- Ensure that all electric cables outside of the device are protected from damage (e.g. caused by animals). Never use the device if electric cables or the power connection are damaged!
- The mains connection must correspond to the specifications in the Technical annex.
- Insert the mains plug into a properly fused mains socket.
- Observe the technical data when selecting extensions to the power cable. Completely unroll the extension cable. Avoid electrical overload.
- Before carrying out maintenance, care or repair work on the device, remove the mains plug from the mains socket. Hold onto the mains plug while doing so.
- Switch the device off and disconnect the power cable from the mains socket when the device is not in use.
- Do not under any circumstances use the device if you detect damages on the mains plug or power cable. If the power cable is damaged, it must be replaced by the manufacturer, its service agent or similarly qualified persons in order to avoid a hazard. Defective power cables pose a serious health risk!
- When positioning the device, observe the minimum distances from walls and other objects as well as the storage and operating conditions specified in the Technical annex.
- Make sure that the air inlet and outlet are not obstructed.
- Do not remove any safety signs, stickers or labels from the device. Keep all safety signs, stickers and labels in legible condition.
- Make sure that the suction side is kept free of dirt and loose objects.
- Only transport the device in an upright position with an emptied condensation tray or drain hose.
- Discharge the collected condensate before transport and storage. Do not drink it. Health hazard!
- Use batteries of type AAA.
- Never charge batteries that cannot be recharged.
- Different types of batteries and new and used batteries must not be used together.
- Insert the batteries into the battery compartment according to the correct polarity.
- Remove discharged batteries from the device. Batteries contain materials hazardous to the environment. Dispose of the batteries according to the national regulations.
- Remove the batteries from the remote control if you will not be using the device for a longer period of time.
- Remove the batteries from the device if you will not be using the device for a longer period of time.
- Never short-circuit the supply terminal in the battery compartment!
- Do not swallow batteries! If a battery is swallowed, it can cause severe internal burns within 2 hours! These burns can lead to death!
- If you think batteries might have been swallowed or otherwise entered the body, seek medical attention immediately!
- Keep new and used batteries and an open battery compartment away from children.
- If the battery compartment does not close securely, stop using the product via the remote control.



Safety warnings for devices containing flammable refrigerants

- Only position the device in rooms where potentially leaking refrigerant cannot accumulate. Unventilated rooms, in which the device is installed, operated or stored, must be built in a way to ensure that potentially leaking refrigerant cannot accumulate. This serves to avoid fire or explosion hazards resulting from an ignition of the refrigerant by an electric furnace, cooking stove or another ignition source.
- Only position the device in rooms where there is no source of ignition (e.g. open flames, an active gas appliance or an electric heater).
- Please note that the refrigerant is odourless.
- Only install the device in compliance with the national installation regulations.
- Please observe the local regulations.
- Observe the national gas regulations.
- Only install, operate and store the device PAC 4600 in a room measuring more than 4 m².
- Store the device in a way that no mechanical damage can occur.
- Please note that the connected pipelines must not contain any sources of ignition.
- Observe the maximum refrigerant capacity in the technical data.
- Do not drill through or burn.
- Do not use any means other than those recommended by the manufacturer for accelerating the defrosting process.
- Every person working with or at the refrigerant circuit must be able to provide a certificate of qualification issued by a body accredited by the industry, demonstrating their competence in the safe use of refrigerants based on a procedure well-known in the industry.

- Service work may only be carried out in accordance with the manufacturer's specifications. If maintenance and repair work require the support of additional persons, the person trained in handling flammable refrigerants shall continuously supervise the work carried out.
- The entire refrigerant circuit is a maintenance-free, hermetically sealed system and may only be maintained or repaired by specialist companies for cooling and air-conditioning or by Trotec.

Intended use

Only use the device for cooling, ventilating and dehumidifying indoor air whilst adhering to the technical data.

Foreseeable misuse

- Do not place the device on wet or flooded ground.
- Do not place any objects, e.g. clothing, on the device.
- Do not use the device out of doors.
- Do not make any unauthorised modifications, alterations or structural changes to the device.
- Any use other than the intended use is regarded as a reasonably foreseeable misuse.

Personnel qualifications

People who use this device must:

- be aware of the dangers that occur when working with electric devices in damp areas.
- have read and understood the operating manual, especially the Safety chapter.

Maintenance tasks which require the housing to be opened must only be carried out by specialist companies for cooling and air-conditioning or by Trotec.

Installation tasks which require the disconnection and connection of the connection lines between internal and external unit, thus constituting an interference with the refrigerant circuit, may only be carried out by specialist companies for cooling and air-conditioning.

Safety signs and labels on the device

Note

Do not remove any safety signs, stickers or labels from the device. Keep all safety signs, stickers and labels in legible condition.

The following safety signs and labels are attached to the device:



Follow the manual

This symbol indicates that the operating manual must be observed.



Follow the repair manual

Disposal, maintenance and repair work of the refrigerant circuit may only be carried out in accordance with the manufacturer's specifications and by persons having a certificate of qualification. A corresponding repair manual is available from the manufacturer upon request.

!!! ACHTUNG !!!

1. Vor Inbetriebnahme MIND. 12 STUNDEN aufrecht und still stehen lassen! Das schützt den Kompressor, verlängert die Lebensdauer erheblich und verhindert so einen Verlust der Kühlleistung.
2. Das Klimagerät muss immer BESONDERS VORSICHTIG auf den Boden gestellt werden! Ansonsten können Mikrorisse in der Bodenplatte und der Kondensatwanne entstehen, was dazu führt, dass Kondenswasser auf den Boden tropft.

Für Schäden, die durch unsachgemäßen Gebrauch entstehen, übernehmen wir KEINE GEWÄHRLEISTUNG!

!!! WARNING !!!

1. Before operation, stand upright and rest for MIN 12 HOURS! This protects the compressor, greatly extending its life and preventing loss of cooling performance.
2. The air conditioner must always be placed on the floor with CAUTION! Otherwise, microcracks may form in the bottom plate and the condensate pan, causing condensation to drip onto the floor.

For damages caused by improper use, WARRANTY WILL BE NULL AND VOID!

!!! ATTENTION !!!

1. Avant la mise en service, laissez immobile en position verticale PENDANT AU MOINS 12 HEURES ! Cela protège le compresseur, prolonge sensiblement la durée de vie et évite ainsi une diminution des performances de refroidissement.
2. Le climatiseur doit toujours être posé sur le sol AVEC LES PLUS GRANDES PRÉCAUTIONS ! Sinon, des micro-fissures risquent de se former dans le socle ou le bac de récupération de l'eau de condensation, ce qui entraînerait que cette dernière coule sur le sol.

Toute utilisation incorrecte ou non conforme entraîne L'EXTINCTION DE LA GARANTIE !

Residual risks



Danger

Difluoromethane refrigerant (R32)!

H220 – Extremely flammable gas.

H280 – Contains gas under pressure; may explode if heated.

P210 – Keep away from heat, sparks, open flames and other ignition sources. No smoking.

P377 – Leaking gas fire: Do not extinguish, unless leak can be stopped safely.

P403 – Store in a well-ventilated place.



Warning of electrical voltage

Work on the electrical components must only be carried out by an authorised specialist company!



Warning of electrical voltage

Before any work on the device, remove the mains plug from the mains socket!

Do not touch the mains plug with wet or damp hands.

Hold onto the mains plug while pulling the power cable out of the mains socket.



Warning

Dangers can occur at the device when it is used by untrained people in an unprofessional or improper way! Observe the personnel qualifications!



Warning

A falling device can cause injuries! Always transport and assemble the device with the help of other persons. Never stand below the device when it is suspended. Ensure adequate stability of the device's wall fixing.



Warning

The device is not a toy and does not belong in the hands of children.



Warning

Risk of suffocation!

Do not leave the packaging lying around. Children may use it as a dangerous toy.

Note

Do not operate the device without an inserted air filter! Without the air filter, the inside of the device will be heavily contaminated. This could reduce the performance and result in damage to the device.

Behaviour in the event of an emergency

1. Switch the device off.
2. In an emergency, disconnect the device from the mains feed-in: Hold onto the mains plug while pulling the power cable out of the mains socket.
3. Do not reconnect a defective device to the mains.

Information about the device

Device description

The device serves the purpose of cooling the room air. It further filters and dehumidifies the air thus creating an agreeable room climate.

The local air conditioner comes with an internal unit to be positioned on the floor in interior spaces and with an external unit for wall mounting or floor installation out of doors. In *cooling* mode the produced compressor performance adapts itself precisely to the demand and so regulates the target temperature with minimal temperature fluctuations. In contrast to conventional split systems this "inverter technique" saves energy and reduces the noise emission to a particularly low level.

The heat is transported to the external unit through a flexible connection line. The external unit emits the absorbed warmth to the outside air via another heat exchanger (condenser). By means of a condensate pump located in the internal unit the condensate accumulating during cooling operation is conveyed to the external unit and there it evaporates on the heat exchanger.

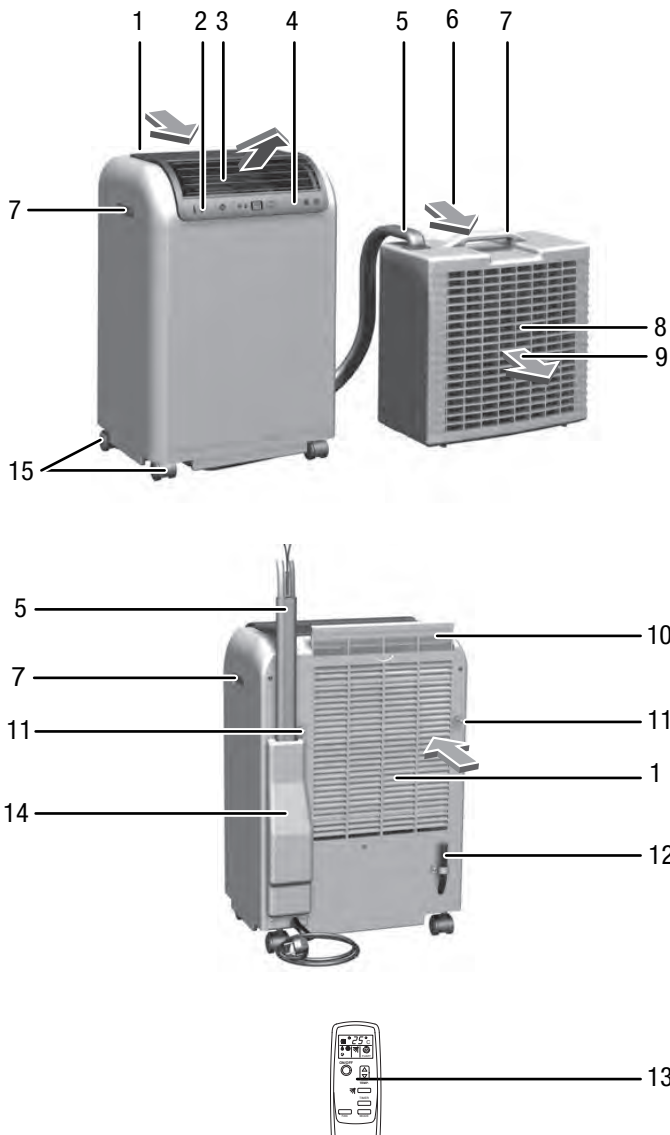
In *ventilation* mode the device provides the opportunity of air circulation without cooling effect.

In *dehumidification* mode moisture is withdrawn from the air.

The device operates fully automatically and features a variety of further options. The device can, for instance, be switched on or off automatically with time delay via the timer function.

Operation of the device is possible either via the control panel at the internal unit or via the supplied infrared remote control.

Device depiction



No.	Designation
1	Internal unit
2	Remote control receiver
3	Air outlet with adjustable ventilation flaps
4	Control panel
5	Connecting line
6	Air inlet
7	Transport handle
8	External unit
9	Air outlet
10	Air filter
11	Suspension bracket for the external unit
12	Condensation drain
13	Remote control
14	Cover
15	Wheels

Transport and storage

Note

If you store or transport the device improperly, the device may be damaged. Note the information regarding transport and storage of the device.

Transport

Please note that additional transport regulations might apply to devices containing flammable refrigerants. The equipment's arrangement and the maximum number of components to be transported together can be gathered from the applicable transport regulations.

To make the device easier to transport, it is fitted with wheels. To make the device easier to transport, it is fitted with a carry handle.

Before transporting the device, observe the following:

- Switch the device off.
- Hold onto the mains plug while pulling the power cable out of the mains socket.
- Drain the remaining condensate from the device.
- Do not use the power cable to drag the device.
- Only wheel the device on a level and smooth surface.

After transporting the device, proceed as follows:

- Set up the device in an upright position after transport.
- Leave the device to rest for at least 12 hours, so the refrigerant can accumulate within the compressor. Wait 12 hours before switching the device back on! Acting contrary might lead to compressor damage and a malfunctioning device. Any warranty claims will be voided in this case.

Storage

Before storing the device, proceed as follows:

- Drain the remaining condensate from the device.
- Hold onto the mains plug while pulling the power cable out of the mains socket.
- Store the external and internal device together with the connection line being attached.

When the device is not being used, observe the following storage conditions:

- Only position the device in rooms where there is no source of ignition (e.g. open flames, an active gas appliance or an electric heater).
- Store the device in a dry location and protected from frost and heat.
- Store the device in an upright position where it is protected from dust and direct sunlight.

- If required, use a cover to protect the device from invasive dust.
- Place no further devices or objects on top of the device to prevent it from being damaged.
- Remove batteries from the remote control.

Assembly and start-up

Scope of delivery

- 1 x device
- 2 x Fastening set
- 2 x Fastening strap
- 2 x Wrench for disconnecting the quick couplings
- 4 x Wall plug and screw
- 1 x Remote control
- 1 x Manual

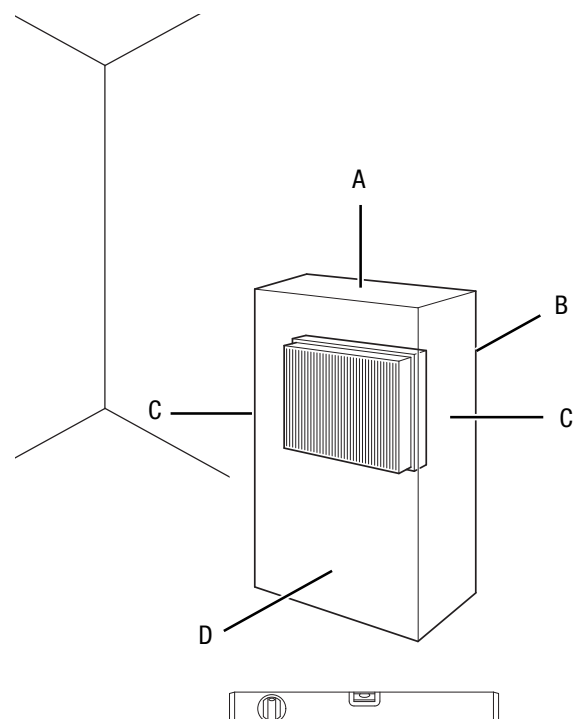
Unpacking the device

1. Open the cardboard box and take the device out.
2. Completely remove the packaging.
3. Fully unwind the power cable. Make sure that the power cable is not damaged and that you do not damage it during unwinding.

Start-up

As standard, the device comes equipped with a connection line (5) of 3.0 m length (effective length: 2.3 m) between internal and external unit.

When positioning the device, observe the minimum distance from walls or other objects as described in the Technical data chapter.



- Before restarting the device, check the condition of the power cable. If there are doubts as to the sound condition, contact the customer service.
- Only put up the device in an upright, stable position on firm ground.
- Do not create tripping hazards when laying the power cable or other electric cables, especially when positioning the device in the middle of the room. Use cable bridges.
- Only position the device in rooms where potentially leaking refrigerant cannot accumulate.
- Only position the device in rooms where there is no source of ignition (e.g. open flames, an active gas appliance or an electric heater).
- Make sure that extension cables are completely unrolled.
- Make sure that the air inlet and outlet are not obstructed.
- Make sure that no curtains or other objects interfere with the air flow.

Prior to initial start-up, insert batteries in the remote control.

Internal unit

The internal unit will be installed at the desired location with the air outlet facing the room whilst observing the minimum distances.

Connection line



Danger

Flammable difluoromethane refrigerant (R32)!

During installation or maintenance, keep ignition sources such as open flames, an active gas appliance or an electric heater away from the working environment.



Warning

The device must be disconnected from the mains during the entire procedure! It may only be taken back into operation, when all connections have been re-established and checked. The fastenings and all covers must have been reattached beforehand.

Note

Leaking refrigerant contributes to climate change. Refrigerants with a lower global warming potential have a smaller impact in the event of leakage. This device contains a refrigerant with a global warming potential of 675. What this means is that should 1 kg of this refrigerant escape, its effect on global warming will be 675 times greater than that of 1 kg of CO₂ – referring to a period of 100 years. Do not perform any work on the refrigerant circuit and do not disassemble the device – always consult specialist staff.

Note

Do not leave external and internal units disconnected from each other any longer than absolutely necessary. Refrigerant may escape by means of the disconnected connection line. Only store the external and internal device together and with connected connection line.

The connection line (5) can be guided outside through a door or window left ajar. The connection line can be disconnected from the external unit, permitting you to install it through a wall opening (Ø min. 60 mm). Observe the following information when installing the connection line:

- The connection line must never be jammed or kinked.
- The connection line must not be subjected to tension or other mechanical stress.
- The pipe insulation and the protective cover must not be damaged.

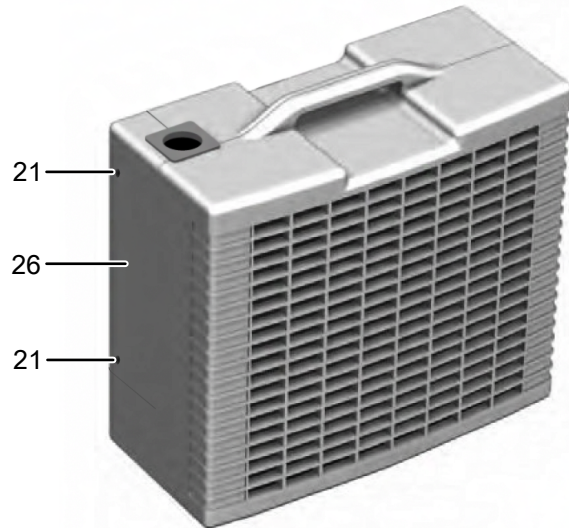
The connection line (5) is connected to the external unit by means of quick couplings. These allow you to disconnect the connection line from the external unit for assembly purposes without the risk of losing refrigerant.

Notes regarding the disconnection of the connection line:

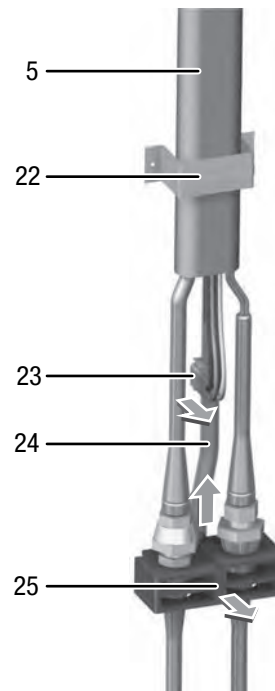
- The lines may only be disconnected and connected by a certified specialist company for cooling and air-conditioning.
- Only disconnect the devices immediately before assembly and reconnect them as soon as possible.
- Before connecting the lines once more, it must be ensured that there is no dirt, moisture or any other foreign objects which could impair the proper functioning of the quick couplings.
- Make sure to attach the fastening clip once the lines have been connected.
- Provided all tasks are performed properly, the device may be disconnected and reconnected approx. 7 times without experiencing any noteworthy loss of cooling capacity.

Please proceed as follows to disconnect the connection lines:

- ✓ The device is switched off.
 - ✓ The device is disconnected from the mains.
 - ✓ The open-end wrenches SW 21 and SW 24 are ready for use.
1. Remove the screws (21) at the rear of the external unit.
 2. Remove the cover (26) from the device.



3. Press the lateral link of the plug connection (23) and pull the plug out of the socket. The plug connection is located beneath the black bag next to the hose connections.
4. Remove the upper part of the holder (25) by unscrewing the two screws.
5. Disconnect the condensation drain hose (24) on the hose connection.



6. Unscrew the left-hand union nut by means of the supplied open-end wrench (SW 24). Apply the other open-end wrench (SW 21) to the bottom part of the coupling to counter it.

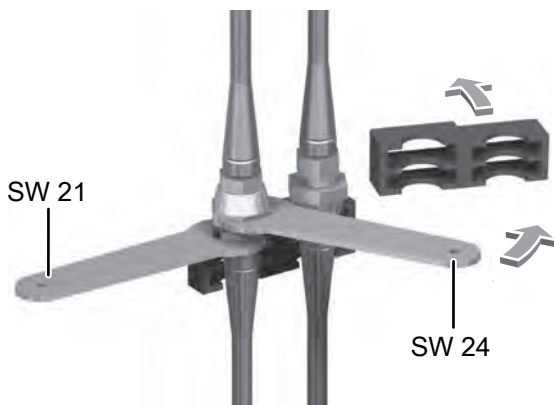
⇒ Screw constantly until disconnected.



Danger

Flammable difluoromethane refrigerant (R32)!

There is a danger of refrigerant leaking out while hissing sounds occur, and there is the danger of the refrigerating exploding under the influence of heat. Make sure that no refrigerant leaks out; if it does, make sure the amount is restricted to a minimum. Keep ignition sources such as open flames, an active gas appliance or an electric heater away from the working environment.



After the positioning or assembly of internal and external unit, the connection line can be connected to the external unit. To do so, please proceed as follows:

- ✓ The device is switched off.
 - ✓ The device is disconnected from the mains.
 - ✓ The open-end wrenches SW 21 and SW 24 are ready for use.
1. Pass the connection lines into the external unit and fasten them by means of the fastening clip. In doing so, make sure that the lines to be connected have a sufficient length.
 2. Connect the plug connection and position it beneath the black bag.
 3. Connect the condensation hose on the hose connection.
 4. Insert the part of the coupling into the union nut.
 5. Unscrew the left and right-hand union nut by means of the supplied open-end wrench (SW 24). Apply the other open-end wrench (SW 21) to the part of the coupling to counter it.
- ⇒ Screw constantly until the connection is firm.

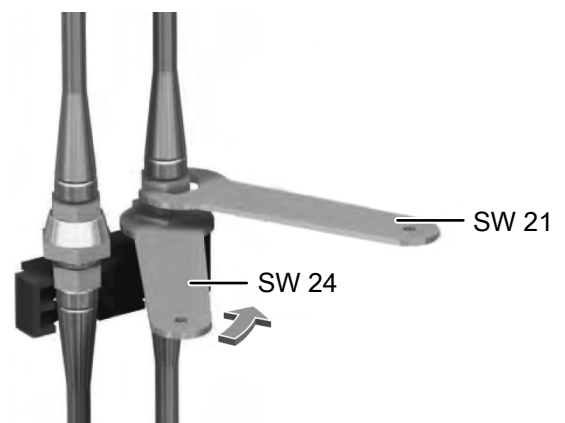
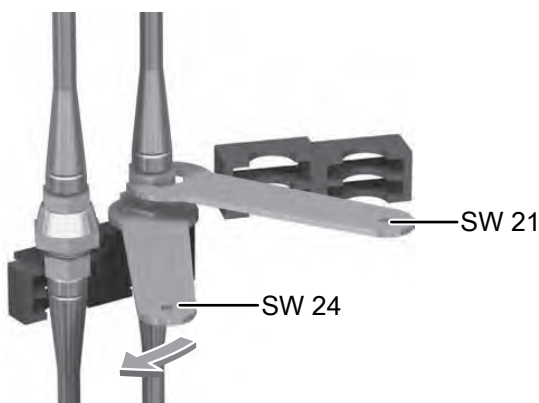


Danger

Flammable difluoromethane refrigerant (R32)!

There is a danger of refrigerant leaking out while hissing sounds occur, and there is the danger of the refrigerating exploding under the influence of heat. Make sure that no refrigerant leaks out; if it does, make sure the amount is restricted to a minimum. Keep ignition sources such as open flames, an active gas appliance or an electric heater away from the working environment.

7. Unscrew the right-hand union nut by means of the supplied open-end wrench (SW 24). Apply the other open-end wrench (SW 21) to the top part of the coupling to counter it.



8. Unscrew the fastening clip (22) and remove the disconnected connection lines.

If you want to feed the connection line through a wall opening, it must have a minimum diameter of 60 mm.

6. Fasten the upper part of the holder (25) by means of both screws.
7. Having connected the connection lines, check the screw connections for tightness by gently shaking the lines.
 - ⇒ The screw connections must not be loose, and no hissing sounds must occur.
8. Attach the cover and front wall to the external unit and fasten them with the screws.

External unit

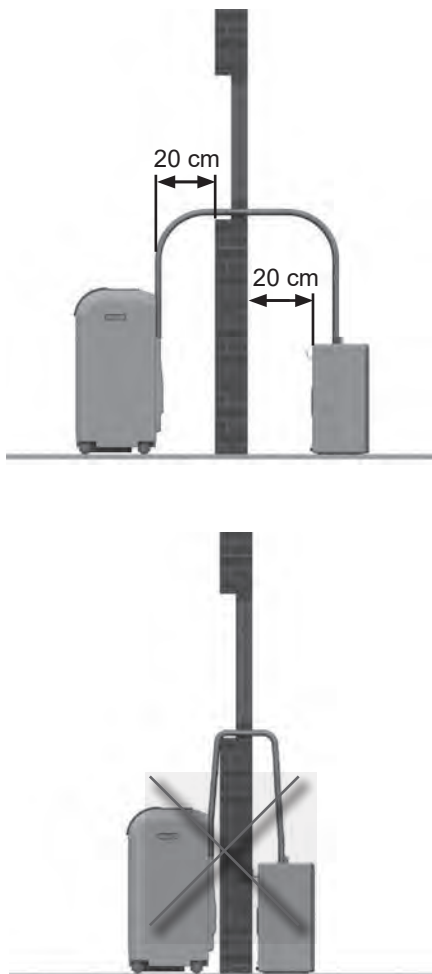
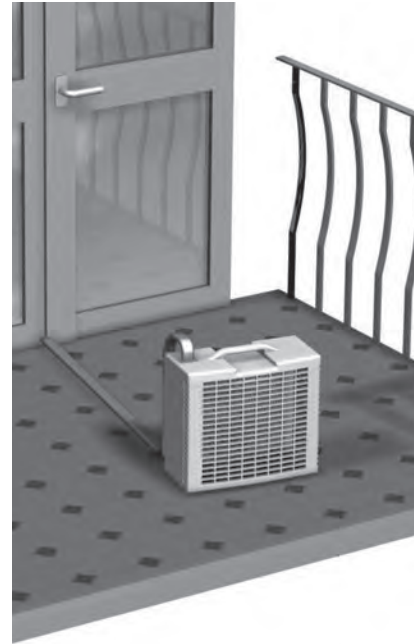
The external unit emits the warmth from the room to the outside air. For this purpose, the external unit can either be positioned on the floor or mounted to an outer wall.

Note

Depending on the weather, there might be condensate leaking out from the condensate drain at the rear of the external unit. This is a perfectly normal process. Select an appropriate installation site for the external unit so that no damages are caused by the leaking water or connect it to a drain.

Positioning on the floor

The fastening jigs are not required to position the external unit on a terrace or balcony. Put the external unit up in a horizontal position protected from direct sunlight. The ground must be level and stable. Observe a minimum distance of 20 cm between the air inlet side and a wall. The air outlet must not be obstructed in any way (at least 50 cm to obstacles). The connection line is fed through the gap between frame and door or window.



Mounting on the outer wall using wall holder



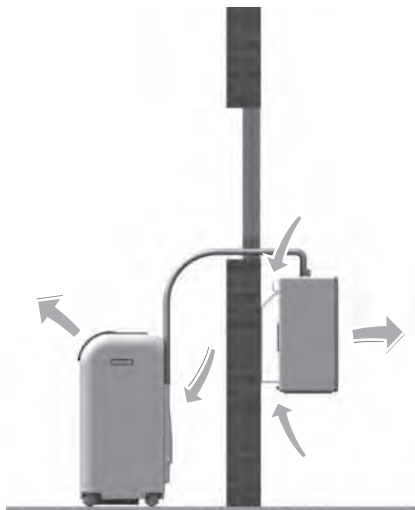
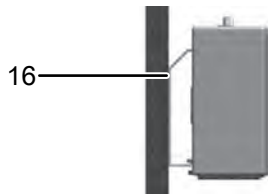
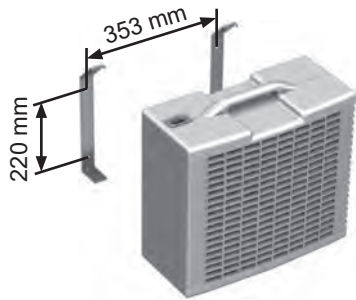
Warning

A falling device can cause injuries! Always transport and assemble the device with the help of other persons. Never stand below the device when it is suspended. Ensure adequate stability of the device's wall fixing.

- Affix the supplied wall holders from the fastening set at the wall.
- Hook the external unit into the wall holders and secure it by means of the supplied M4 safety screws (16).

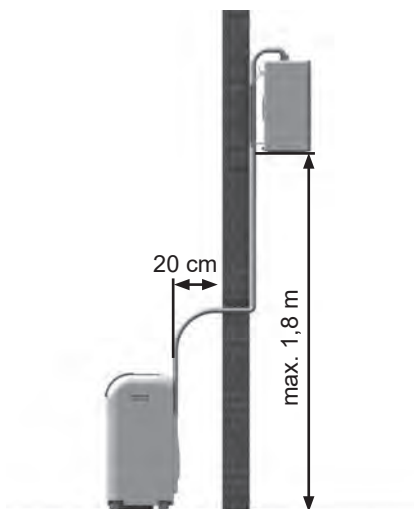
The wall holders can be fastened using the supplied fastening elements (6 mm wall plugs and screws).

Should they be inadequate for the composition and condition of the wall, appropriate fastening elements of sufficient carrying capacity shall be provided on site. During assembly make sure that the supply line is not subjected to load and the insulation remains intact. Observe the minimum distances. The air outlet of the internal and external unit must not be obstructed.



Installation height

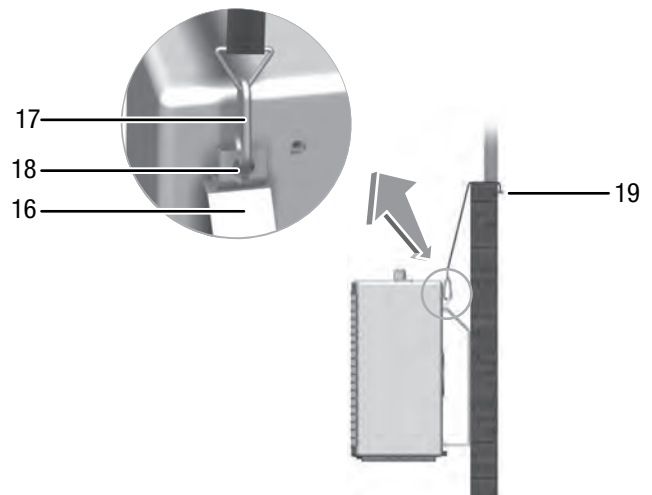
The height difference between the bottom edge of the external unit and the internal unit's installation surface must not exceed 1.8 m. If the external unit is mounted at a lower level than the internal unit, the height difference shall amount to max. 1.5 m.



Mounting on the outer wall using fastening straps

The fastening straps provide another option of mounting the external unit to a wall or parapet outside.

1. Hook the external unit into the wall holders and affix them using the M4 safety screws (16).
2. Use the carabiner (17) to hook one end of the respective fastening strap into the mounting eyes (18) at the external unit.
3. Attach the other end of the fastening straps to the on-site eyebolts (19) to be fixed to the wall or parapet. Ensure a sufficient stability!



Inserting the air filter

Note

Do not operate the device without an inserted air filter! Without the air filter, the inside of the device will be heavily contaminated. This could reduce the performance and result in damage to the device.

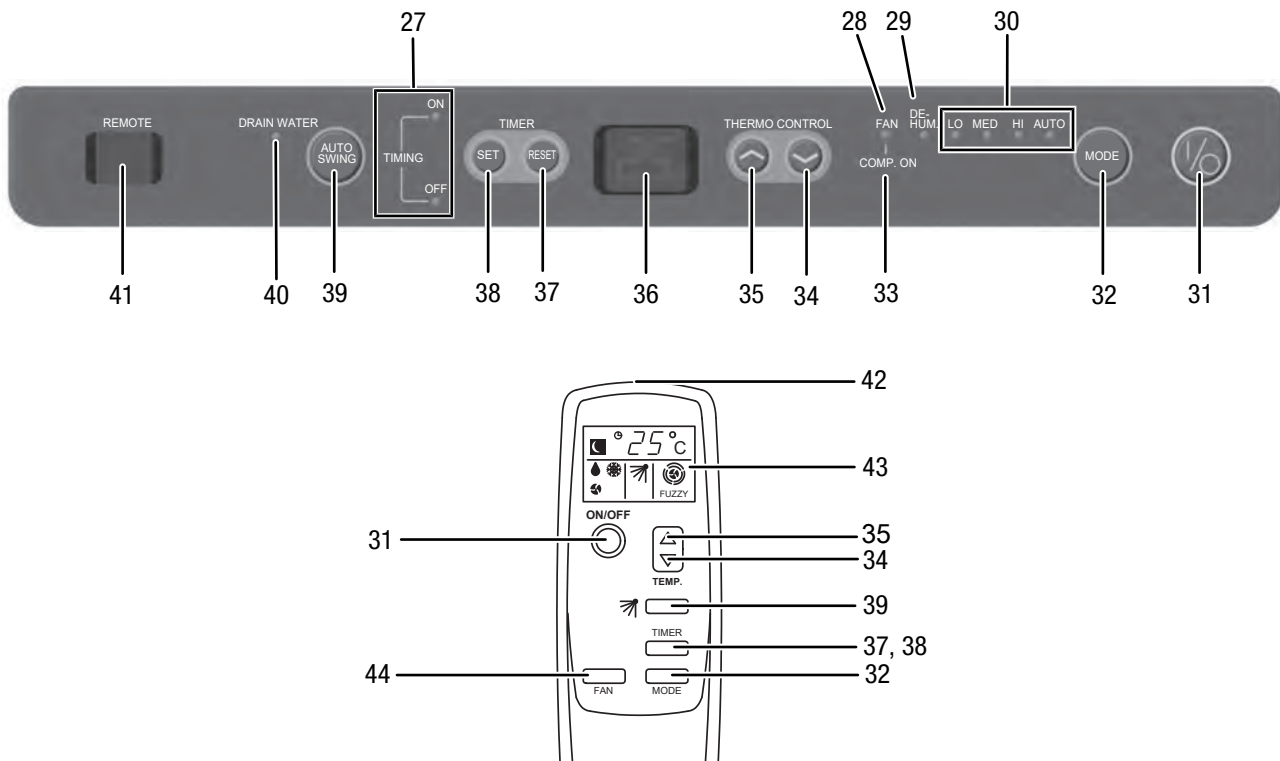


Connecting the power cable

- Insert the mains plug into a properly fused mains socket.

Operation

Control panel



No.	Designation	Function
27	ON/OFF LEDs	Illuminated when the timer function is activated or deactivated.
28	FAN LED	Indication of the operating mode ventilation
29	DE-HUM LED	Indication of the operating mode dehumidification
30	Fan stage LEDs	Indicate the current fan stage.
31	ON/OFF button	Switching the device on or off
32	MODE button	For selecting the operating mode: <i>cooling</i> <i>dehumidification</i> <i>ventilation</i>
33	COMP. LED ON	Indication of compressor operation in cooling mode
34	Decrease value button	For reducing the target temperature (16 °C to 30 °C) for cooling
35	Increase value button	For increasing the target temperature (16 °C to 30 °C) for cooling
36	Segment display	Indication of the target temperature in cooling mode Indication of the remaining time on the timer Indication of the error code, see chapter Errors and faults
37	RESET button	For resetting the timer function
38	SET button	<i>Automatic switch-on</i> timer function in increments of 1 hour (1 h to 24 h) <i>Automatic switch-off</i> timer function in increments of 1 hour (1 h to 24 h)
39	AUTO SWING button	For switching the swing function on or off
40	DRAIN WATER LED	Empty condensation tray indication
41	Remote control receiver	Receives the infrared signal from the remote control.
42	Remote control transmitter / receiver	Communication between device and remote control via infrared signal
43	Display	Indication of different device functions
44	FAN button	For setting the fan speed

Switching the device on

1. Once you have completely installed the device as described in the Start-up chapter, you can switch it on.
2. Press the *ON/OFF* button (31).
⇒ The device switches on.
3. Select the desired operating mode.

The device switches off automatically when the condensation tray is full. The *DRAIN WATER* LED (40) flashes and an acoustic signal is emitted.

Setting the operating mode

The device has the following operating modes:

- cooling
- ventilation
- dehumidification

Cooling

In *cooling* mode the room will be cooled down to a desired target temperature.

Default settings in *cooling* mode:

1. Repeatedly press the *MODE* button (32) until the *FAN* LED (28) or the *DE-HUM* LED (29) goes out.
2. Use the buttons *decrease value* (34) or *increase value* (35) to adjust the desired room temperature.
⇒ The compressor possibly switches on and the *COMP. ON* (33) LED is illuminated.
3. Select the desired fan speed by use of *FAN* button (44): *AUTO* (remote control *FUZZY*), *HI*, *MED* or *LO*.

Ventilation

In *ventilation* mode the room air is circulated, it will neither be cooled nor dehumidified.

1. Press the *MODE* button (32) until the *FAN* LED (28) lights up.
2. Select the desired fan speed by use of *FAN* button (44): *AUTO* (remote control *FUZZY*), *HI*, *MED* or *LO*.

Dehumidification

In *dehumidification* mode the humidity level in the room is reduced.

✓ The device is switched off.

1. Set both the internal and the external unit up in the room to be dehumidified. Make sure that the internal unit does not suck in any warm air emitted by the external unit.

Do not attach the external unit mechanically to the internal unit.

2. Take the condensation drain hose out of its holder at the rear of the internal unit and remove the stopper.
3. Discharge the condensate with a decline into a drain or a sufficiently dimensioned container.
⇒ The produced condensate will not be pumped to the external unit.
4. Press the *ON/OFF* button (31).
5. Use the *decrease value* button (34) to set the smallest possible target temperature.
6. Press the *MODE* button (32) until the *DE-HUM* LED (29) is illuminated.



Info

If the device is operated in a very humid environment, the accumulating condensate must be discharged at regular intervals.

Setting the timer

The timer has two modes of operation:

- automatic switch-on upon expiry of a preset number of hours.
- automatic switch-off upon expiry of a preset number of hours.

The function can be set in all operating modes and also during stand-by.

The number of hours can be between 1 and 24 and can be adjusted in increments of 1 h.

Note

The device must not be left unattended in a freely accessible room with an activated timer.

Automatic switch-on

- ✓ The device is switched off.
- 1. Press the *SET* button (38) until the desired number of hours is indicated on the segment display (36).
 - ⇒ The desired number of hours flashes.
- 2. Use the buttons *decrease value* (34) or *increase value* (35) to adjust the desired room temperature.
- 3. Press the *MODE* button (32) to select the desired operating mode.
 - ⇒ The LED for the desired operating mode will be illuminated.
 - ⇒ The *ON* LED (27) is illuminated.
 - ⇒ The timer setting equals the desired number of hours.
 - ⇒ The device starts in the selected operating mode after the set time has elapsed.
- 4. Press the *RESET* button (37) to deactivate the timer function.
 - ⇒ The *OFF* LED (27) is illuminated.

Notes regarding automatic switch-on:

- If the device is disconnected from the power supply, all settings for automatic switch-on are deleted.
- Manually switching the device on disables the automatic switch-on function.

Automatic switch-off

- ✓ The device is switched on.
- 1. Press the *SET* button (38) until the desired number of hours is indicated on the segment display.
 - ⇒ The *ON* LED (27) is illuminated.
 - ⇒ The timer setting equals the desired number of hours.
 - ⇒ The device keeps running until the given switch-off time has expired.
- 2. Press the *RESET* button (37) to deactivate the timer function.
 - ⇒ The *OFF* LED (27) is illuminated.

Notes regarding automatic switch-off:

- Pressing the *ON/OFF* button (31) deactivates the automatic switch-off function.

Swing function

The swing function can be switched on in any operating mode if required.

By means of the swing function, the air outlet (3) is moved automatically and thus ensures continuous air circulation.

1. Press the *AUTO SWING* button (39).
 - ⇒ The ventilation flaps move up and down continuously.
2. Press the *AUTO SWING* button (39) again to stop the ventilation flaps in a certain position and to switch off the swing function.

Shutdown



Warning of electrical voltage

Do not touch the mains plug with wet or damp hands. Never switch the running device off by pulling out the power cable.

Let the device run in ventilation mode for 2-3 hours if you put it out of operation for a longer period of time, e.g. during winter. This has the effect that any residual moisture is transported out of the device. For shutdown, please proceed as follows:

1. Switch the device off.
2. Hold onto the mains plug while pulling the power cable out of the mains socket.
3. Empty the condensation tank by means of the condensation drain hose (12) at the rear of the internal device and the plug on the external device.
4. Clean the device according to the Maintenance chapter.
5. Store the device according to the Storage chapter.

Errors and faults

The device has been checked for proper functioning several times during production. If malfunctions occur nonetheless, check the device according to the following list.

The device does not start:

- Check the power connection.
- Check the power cable and mains plug for damage. If you notice damages, do not try to take the device back into operation.

If the supply cord is damaged, it must be replaced by the manufacturer, its service agent or similarly qualified persons in order to avoid a hazard.

- Check the on-site fusing.
- Observe the operating temperature according to the chapter Technical annex.
- The condensation tray may be full. Empty the condensation tray if necessary. The *DRAIN WATER* LED (40) must not light up.
- Wait for 10 minutes before restarting the device. If the device is not starting, have the electricians checked by a specialist company or by Trotec.

The device works with reduced or no cooling capacity:

- Check whether *cooling* mode is selected.
- Check the position of the ventilation flaps. They must be opened to the maximum.
- Check the air filter(s) for dirt. If necessary, clean or replace the air filter(s).
- Check the minimum distance to walls or other objects. Position the device a little more in the room's centre if required.
- Check the temperature setting at the device. Reduce the set temperature if it is higher than the room temperature.
- Check the external unit for dirt. If necessary, clean the fins on the inside of the external unit.

The device is loud or vibrates:

- Check whether the device is set up in a stable and upright position.
- Check whether the suspension bracket and wall holder of the external unit are positioned horizontally and whether all screws have been tightened properly.

Condensate is leaking:

- Check the device for leaks.

The compressor does not start:

- Check whether the overheating protection of the compressor has tripped. Disconnect the device from the mains and let it cool down for approx. 10 minutes before reconnecting it.
- Check whether the ambient temperature equals the target temperature (in *cooling* mode). The compressor will not switch on unless the respective temperature is reached.
- The compressor may start up with a delay of 3 minutes, as it is provided with an internal protection against direct restart.

The device gets very warm, is loud or is losing performance:

- Check the air inlets and air filters for dirt. Remove external dirt.
- From the outside, check the device for dirt (see chapter Maintenance). If the inside of the device is dirty, have it cleaned by a specialist company for cooling and air-conditioning or by Trotec.

The device does not respond to the infrared remote control:

- Check whether the distance between remote control and device is too large and reduce it if necessary.
- Make sure there are no obstacles, such as furniture or walls, between the device and the remote control. Ensure visual contact between device and remote control.
- Check the charging status of the batteries and change them if required.
- If the batteries have just been changed, check them for correct polarity.

Note

Wait for at least 3 minutes after maintenance and repair work. Only then switch the device back on.

The device still does not operate correctly after these checks:

Please contact the customer service. If necessary, bring the device to a specialist company for cooling and air-conditioning or to Trotec for repair.

Error codes

In case of a fault, an error code is indicated on the segment display (36). Contact the customer service in case of the following faults. If necessary, bring the device to a specialist company for cooling and air-conditioning or to Trotec for repair.

Error code	Fault description	Possible cause / troubleshooting
01	Communication error between board on internal and external unit	<ul style="list-style-type: none"> Check the 6-core connection and the plug contacts CN202 (PCB 2) – CN109 (PCB 3). Replace the connection cable, if necessary. Replace the mainboard (PCB 3).
02	Sensor for room temperature defective	<ul style="list-style-type: none"> Replace the sensor THRA (PCB 2).
03	Evaporator sensor defective	<ul style="list-style-type: none"> Replace the sensor THEP (PCB 2).
32	Liquid line sensor defective Overtemperature of liquid line	<ul style="list-style-type: none"> The sensor THOP (PCB 3) is defective if the error appears within one minute after switching the device on. In this case, replace the sensor. If the error appears after some operating time, the following causes are possible: <ul style="list-style-type: none"> Lack of refrigerant Defective fan motor on external unit <p>Note: If the temperature exceeds 58 °C at the sensor THOP, the device switches off and the error code 32 appears on the segment display.</p>
33	Compressor sensor defective	<ul style="list-style-type: none"> Check the sensor THCT (PCB 3) and replace it, if required. Check the temperature at the compressor. There might be an overtemperature. Check whether the outdoor temperature is too high (see Technical Data). Check whether the fan on the external unit runs properly.
35	Faulty rotational speed of compressor	<ul style="list-style-type: none"> The compressor might be defective. Replace the IPM mainboard (PCB 4).
36	Hot gas temperature on compressor too high	<ul style="list-style-type: none"> The compressor might be defective. Check the temperature at the compressor. There might be an overtemperature. Check whether the outdoor temperature is too high (see Technical Data). Check whether the fan on the external unit runs properly.
37	Temperature liquid line too high	<ul style="list-style-type: none"> See error code 32
38	AC voltage on mainboard (PCB 3) too low. Transformer on board NOK	<ul style="list-style-type: none"> Replace the mainboard (PCB 3).
39	AC voltage on mainboard (PCB 3) too high. Transformer on board NOK	<ul style="list-style-type: none"> Replace the mainboard (PCB 3).
40	Faulty current consumption on mainboard	<ul style="list-style-type: none"> Replace the mainboard (PCB 3).
41	IPM board communication error	<ul style="list-style-type: none"> Check the 5-core connection and the contacts: CN1 (PCB 4) – CN111 (PCB 3) and CN2 (PCB 4) – CN110 (PCB 3).
42	IPM board defective	<ul style="list-style-type: none"> Replace the IPM board.

Error code	Fault description	Possible cause / troubleshooting
43	IPM board DC overvoltage	<ul style="list-style-type: none">• Replace the IPM board.
44	IPM module faulty current consumption	<ul style="list-style-type: none">• Replace the IPM board.
45	Power cable over- or undersupply	<ul style="list-style-type: none">• Check the power cable.
46	IPM general error	<ul style="list-style-type: none">• Replace the IPM board.
47	Defective PFC module on IPM board	<ul style="list-style-type: none">• Replace the IPM board.

Maintenance

Maintenance intervals

Maintenance and care interval	before every start-up	as needed	at least every 2 weeks	at least every 4 weeks	at least every 6 months	at least annually
Check air inlets and outlets for dirt and foreign objects and clean if necessary	X			X		
Clean the exterior		X				X
Visually check the inside of the device for dirt		X				X
Check the air filter for dirt and foreign objects and clean or replace if necessary	X		X			
Replace the air filter		X				
Check for damage	X					
Check the attachment screws		X				X
Test run						X
Empty the condensation tray and drain hose		X				

Maintenance and care log

Device type:

Device number:

Maintenance and care interval	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Check air inlets and outlets for dirt and foreign objects and clean if necessary																
Check air inlets and outlets for dirt and foreign objects and clean if necessary																
Clean the exterior																
Visually check the inside of the device for dirt																
Replace the air filter																
Check the attachment screws																
Test run																
Empty the condensation tray and drain hose																
Comments																

1. Date: Signature:	2. Date: Signature:	3. Date: Signature:	4. Date: Signature:
5. Date: Signature:	6. Date: Signature:	7. Date: Signature:	8. Date: Signature:
9. Date: Signature:	10. Date: Signature:	11. Date: Signature:	12. Date: Signature:
13. Date: Signature:	14. Date: Signature:	15. Date: Signature:	16. Date: Signature:

Activities required before starting maintenance



Warning of electrical voltage

Do not touch the mains plug with wet or damp hands.

- Switch the device off.
- Hold onto the mains plug while pulling the power cable out of the mains socket.



Warning of electrical voltage

Tasks which require the device to be opened must only be carried out by authorised specialist companies or by Trotec.

Refrigerant circuit



Danger

Flammable difluoromethane refrigerant (R32)!

During installation or maintenance, keep ignition sources such as open flames, an active gas appliance or an electric heater away from the working environment.

- The entire refrigerant circuit is a maintenance-free, hermetically sealed system and may only be maintained or repaired by specialist companies for cooling and air-conditioning or by Trotec.

Safety signs and labels on the device

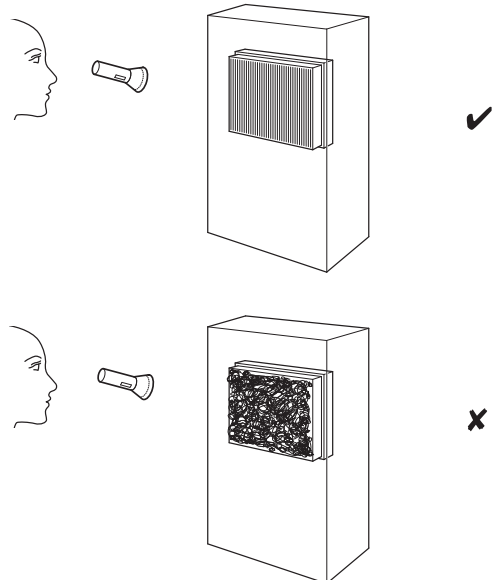
Check the safety signs and labels attached to the device at regular intervals. Replace illegible safety signs!

Cleaning the housing

Clean the housing with a soft, damp and lint-free cloth. Make sure that no moisture enters the housing. Protect electrical components from moisture. Do not use any aggressive cleaning agents such as cleaning sprays, solvents, alcohol-based or abrasive cleaners to dampen the cloth.

Visual inspection of the inside of the device for dirt

1. Remove the air filter.
2. Use a torch to illuminate the openings of the device.
3. Check the inside of the device for dirt.
4. If you see a thick layer of dust, have the inside of the device cleaned by a specialist company for cooling and air-conditioning or by Trotec.
5. Put the air filter back in.



Cleaning the air filter

The air filter has to be cleaned as soon as it is dirty. This is brought to light e.g. by a reduced capacity (see chapter Errors and faults).



Warning

Ensure that the air filter is not worn or damaged. The corners and edges of the air filter must not be deformed or rounded. Before reinserting the air filter, make sure that it is undamaged and dry!

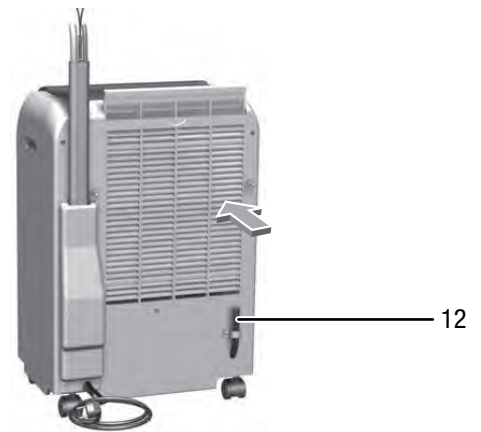
1. Remove the air filter from the device.



2. Clean the filter using a slightly damp, soft, lint-free cloth. If the filter is heavily contaminated, clean it with warm water mixed with a neutral cleaning agent.
3. Allow the filter to dry completely. Do not insert a wet filter into the device!
4. Reinsert the air filter into the device.



2. Pull the condensate outlet (12) out of the retaining clip.



3. Remove the rubber stopper from the condensation drain hose.
4. Drain the condensate.
 - ⇒ The *DRAIN WATER* LED (40) will go out as soon as the condensate has been drained.
5. Reattach the rubber stopper to the condensate outlet. Ensure the tight fit of the rubber stopper, for otherwise there might be uncontrolled water leakage.
6. Reattach the condensate outlet (12) to the retaining clip.

Activities required after maintenance

If you want to continue using the device:

- Leave the device to rest for at least 12 hours, so the refrigerant can accumulate within the compressor. Wait 12 hours before switching the device back on! Acting contrary might lead to compressor damage and a malfunctioning device. Any warranty claims will be voided in this case.
- Reconnect the device to the mains.

If you do not intend to use the device for a considerable time:

- Store the device according to the Transport and storage chapter.

Condensate discharge (manual draining)

In *cooling* and *dehumidification* mode condensate is formed, which is mostly discharged via the exhaust air.

The remaining condensate is collected in a container within the housing. The condensate ought to be drained regularly.


If too much condensate accumulates, the device switches off and indicates this via the *DRAIN WATER* LED (40). In addition, a brief acoustic signal is emitted 8 times.

1. Carefully transport or wheel the internal unit to a suitable location for discharging the condensate (e.g. a drain) or position a suitable collection container under the condensate outlet.

Technical annex

Technical data

Parameter	Value
Model	PAC 4600
Nominal cooling capacity ¹⁾	4.30 kW (1.80 kW to 4.60 kW)
Energy efficiency category ¹⁾	B
Energy efficiency ratio EER ¹⁾	4.7
Annual energy consumption, Q _{CE}	318 kWh
Application area (room volume), approx.	120 m ³
Setting range of the internal unit	+16 °C to +30 °C / 35 % RH to 80 % RH
Operating range of the external unit	+21 °C to +43 °C / 35 % RH to 80 % RH
Refrigerant	R32 ³⁾
Refrigerant capacity	0.97 kg
GWP factor	675
CO ₂ equivalent	0.66 t
Pressure suction side	1.16 MPa
Pressure outlet side	4.2 MPa
Max. permissible pressure	4.2 MPa
Condensate pump, max. conveying capacity	1800 mm WS
Air volume flow per stage, internal unit	350 / 450 / 550 m ³ /h
Air volume flow per stage, external unit	750 / 930 m ³ /h
Sound pressure level per stage, internal unit ²⁾	47 / 50 / 54 dB(A)
Max. sound power, internal unit / external unit	57 / 62 dB(A)
Power supply	230 V / 1~ / 50 Hz
Protection type internal unit / external unit	IP24 / IPX4

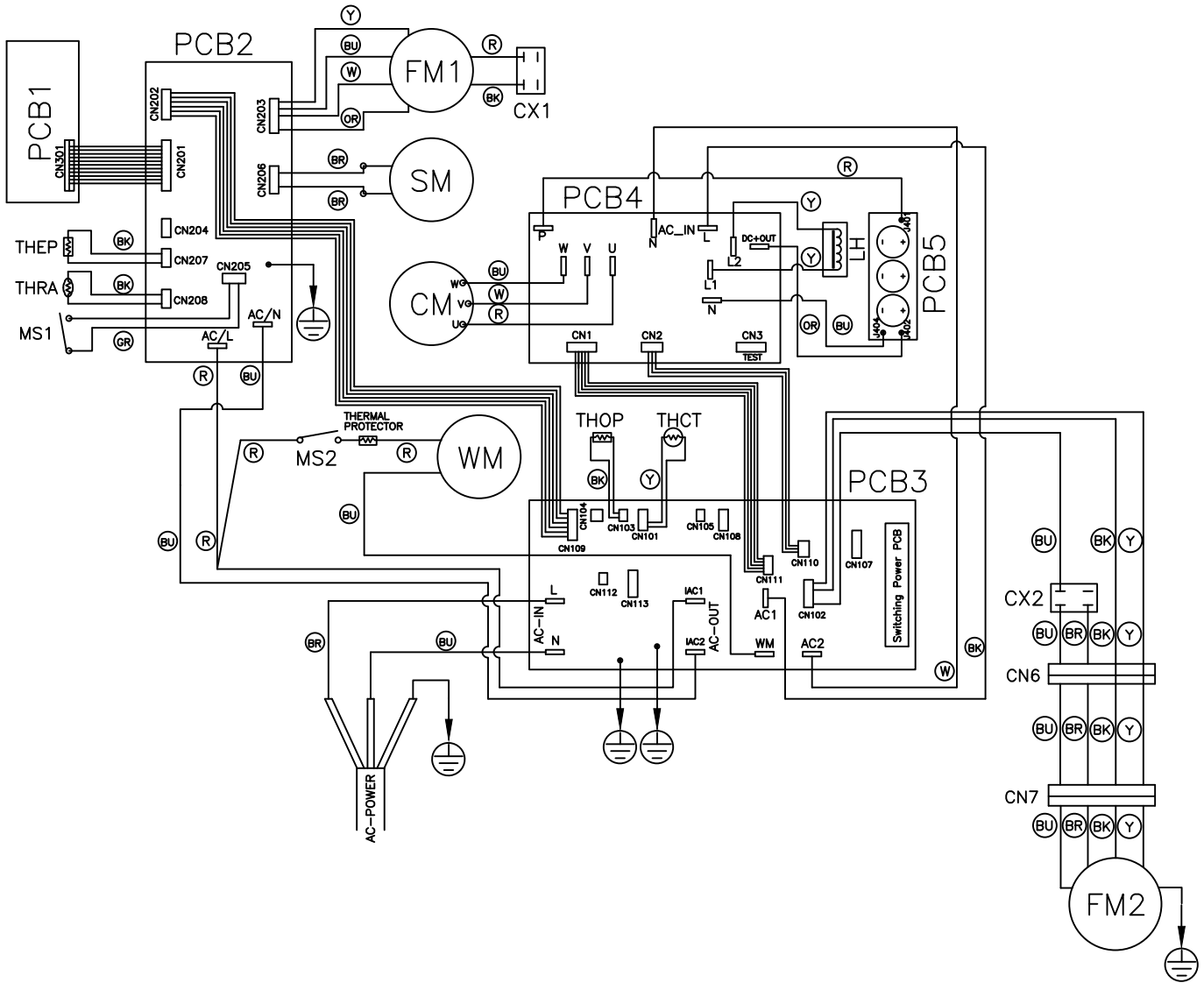
Parameter	Value
Nominal power consumption ¹⁾	1.37 kW
Nominal current consumption ¹⁾	5.82 A
Starting current, LRA	8.00 A
Fusing 	16 A (slow-blowing)
Condensate pump, conveying capacity	50–200 ml/h
Refrigerant line, length	3000 mm, usable: 2300 mm
Dimensions of the internal unit (length x width x height)	335 x 470 x 695 mm
Dimensions of the external unit (length x width x height)	230 x 510 x 490 mm
Minimum distance to walls and other objects:	
	top (A): 20 cm
	rear (B): 20 cm
	sides (C): 20 cm
	front (D): 20 cm
Weight of the internal unit	38 kg
Weight of the external unit	12 kg
Battery for the remote control	Type LR03 / AAA – 1.5 V

¹⁾ air inlet temperature: dry-bulb 27 °C / wet-bulb 19 °C, outside temperature: dry-bulb 35 °C / wet-bulb 24 °C, max. air volume flow

²⁾ at a distance of 1 m in free-field conditions

³⁾ contains greenhouse gas as per Kyoto Protocol (see note in chapter "Connection line")

Circuit diagram



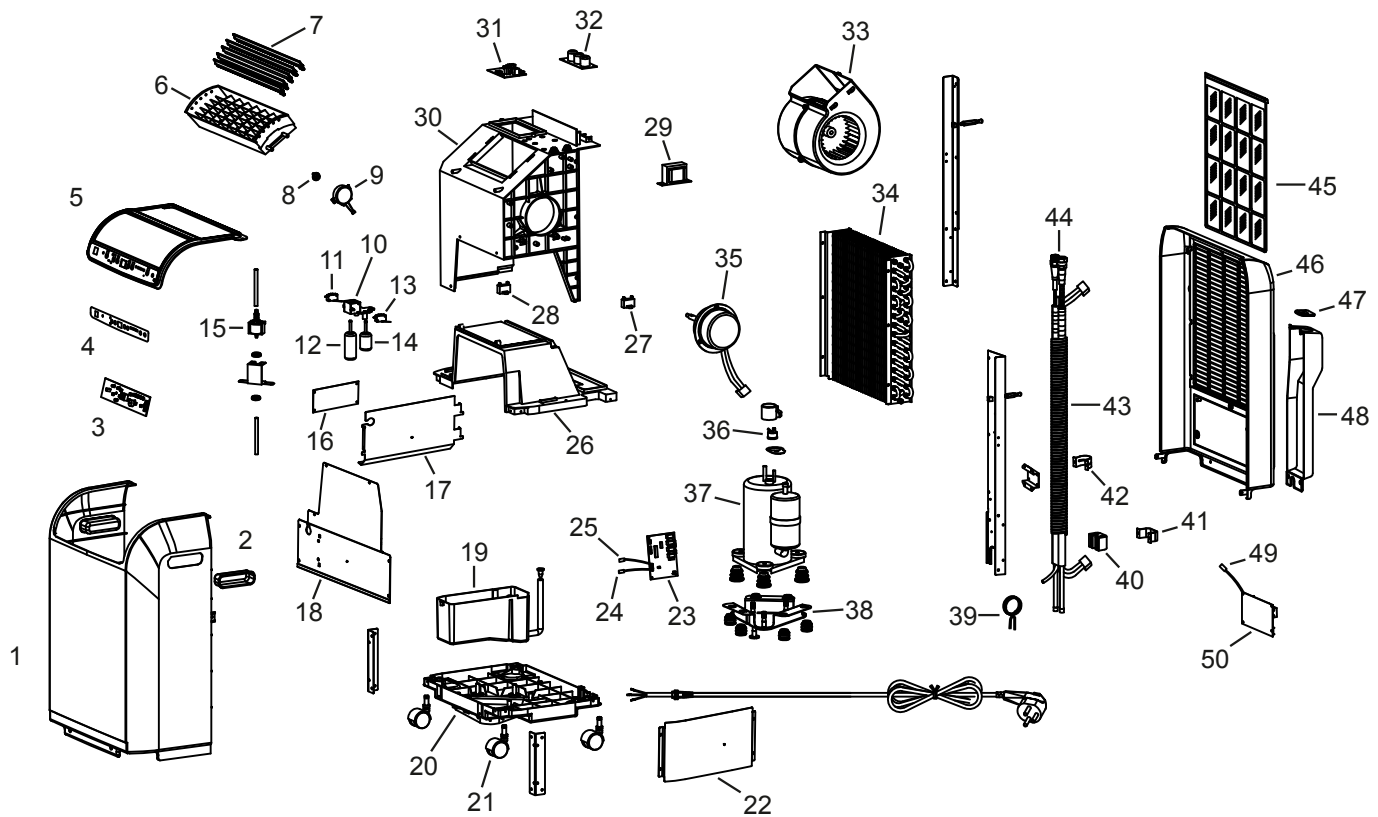
PCB1:	Keypad circuit board	THCT:	Sensor for compressor discharge temperature
PCB2:	Control circuit board	THEP:	Sensor for evaporator
PCB3:	Mainboard	THOP:	Sensor for compressor discharge temperature
PCB4:	IPM protective circuit board	THRA:	Sensor for room temperature
PCB5:	Condenser circuit board	WM:	Condensate pump
CM:	Compressor	Colour code:	
CX1:	Condenser (evaporator fan)	BK:	black
CX2:	Condenser (condenser fan)	BR:	brown
FM1:	Evaporator fan	BU:	blue
FM2:	Condenser fan	GR:	grey
LH:	Reactor	OR:	orange
MS1:	Microswitch error code (water tank full)	R:	red
MS2:	Microswitch condensate pump	W:	white
SM:	Swing motor	Y:	yellow

Overview and list of spare parts – internal unit:



Info

The position numbers of the spare parts differ from those describing the positions of other parts mentioned in this operating manual.



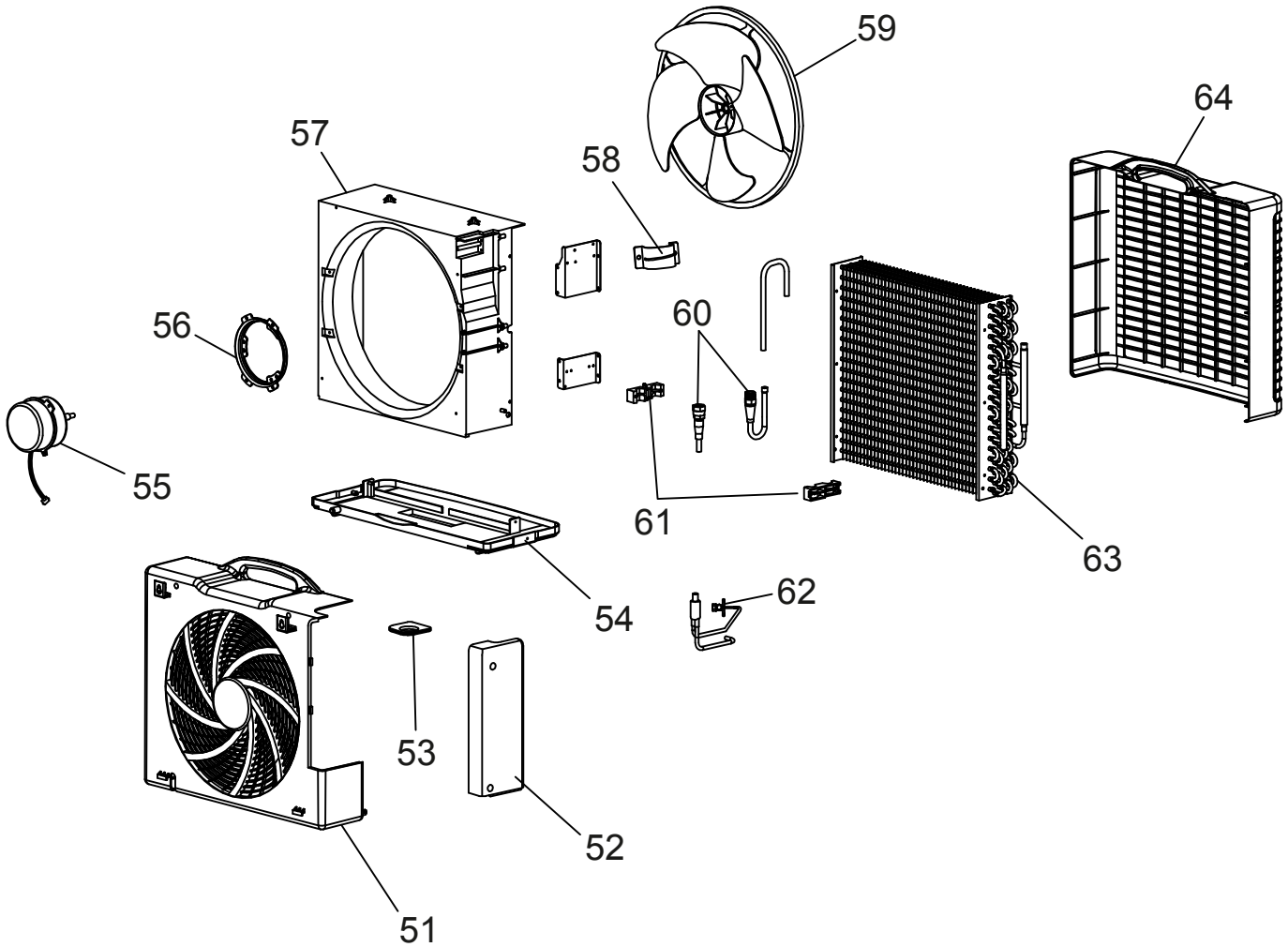
No.	Part Name	No.	Part Name	No.	Part Name
1	Front wall	18	Front sound absorption sheet metal	35	Fan motor, evaporator
2	Recessed handle	19	Condensation tank	36	Overheating protection for compressor
3	Keypad circuit board	20	Device base	37	Compressor (compl.)
4	Keypad film	21	Wheel	38	Bottom plates (compl.)
5	Upper cover	22	Right sound absorption sheet metal	39	Capillary tube
6	Discharge grille	23	Mainboard	40	Seal for fastening clip
7	Air-guide lamellae	24	Sensor for room temperature	41	Fastening clip for pipe
8	Coupling for swing motor	25	Sensor for evaporator	42	Sheathing for fastening clip
9	Swing motor for lamellae	26	Separating wall	43	Connection line
10	Holder for microswitch	27	Condenser (condenser fan)	44	Coupling set
11	Microswitch for pump	28	Condenser (evaporator fan)	45	Air circulation filter
12	Float for pump	29	Choking coil	46	Rear wall
13	Microswitch (water tank full)	30	Fan casing	47	Feed-through for connecting line
14	Float (water tank full)	31	IPM protective circuit board	48	Cover for connecting line
15	Condensate pump	32	Condenser circuit board	49	Sensor for compressor discharge temperature
16	Sound absorption mat	33	Evaporator fan (compl.)	50	Control circuit board
17	Inner sound absorption sheet metal	34	Evaporator		

Overview and list of spare parts – external unit:



Info

The position numbers of the spare parts differ from those describing the positions of other parts mentioned in this operating manual.



No.	Part Name	No.	Part Name	Spare parts (without figure)
51	Rear wall	58	Sheathing for fastening clip	Remote control
52	Cover for screwing connection	59	Condenser fan	Fastening set for external unit (compl.)
53	Feed-through for connecting line	60	Coupling set	Wall holder
54	Device base	61	Fastening clip for coupling	
55	Fan motor (condenser)	62	Service connection	
56	Fan motor attachment	63	Condenser	
57	Fan casing	64	Front wall	

Disposal

Always dispose of packing materials in an environmentally friendly manner and in accordance with the applicable local disposal regulations.



The icon with the crossed-out waste bin on waste electrical or electronic equipment stipulates that this equipment must not be disposed of with the household waste at the end of its life. You will find collection points for free return of waste electrical and electronic equipment in your vicinity. The addresses can be obtained from your municipality or local administration. You can also find out about other return options that apply for many EU countries on the website <https://hub.trotec.com/?id=45090>. Otherwise, please contact an official recycling centre for electronic and electrical equipment authorised for your country.

The separate collection of waste electrical and electronic equipment aims to enable the re-use, recycling and other forms of recovery of waste equipment as well as to prevent negative effects for the environment and human health caused by the disposal of hazardous substances potentially contained in the equipment.

The device is operated with fluorinated greenhouse gas, which can be dangerous for the environment and contribute to global warming when emitted to the atmosphere.

Further information is provided on the nameplate.

Dispose of the refrigerant appropriately and according to the national regulations.



In the European Union, batteries and accumulators must not be treated as domestic waste, but must be disposed of professionally in accordance with Directive 2006/66/EC of the European Parliament and of the Council of 6 September 2006 on batteries and accumulators. Please dispose of batteries and accumulators according to the relevant legal requirements.

Only for United Kingdom

According to Waste Electrical and Electronic Equipment Regulations 2013 (2013/3113) and the Waste Batteries and Accumulators Regulations 2009 (2009/890), devices that are no longer usable must be collected separately and disposed of in an environmentally friendly manner.

Trotec GmbH

Grebener Str. 7
D-52525 Heinsberg

☎ +49 2452 962-400

☎ +49 2452 962-200

✉ info@trotec.com

www.trotec.com