# winterhalter<sup>®</sup>

# **GS 630**



## **Operating Manual**

Winterhalter GS 630 Utensil Washer (translation of the original German operating instructions)

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### 1 About this manual

This manual contains information and instructions for the safe operation and maintenance of your dishwasher. Keep the operating instructions accessible. You can find the operating instructions also on our homepage under www.winterhalter.biz/manuals.



Please note carefully the safety notes listed here.

#### The following symbols are used in these instructions:

Symbol	Meaning	
Warning against potential serious or fatal injuries to persons if the described precauti measures are not taken.		
Warning against potential minor injuries to persons or potential material damage if the described precautionary measures are not taken.		
Warning against defects in or destruction of the product if the described precautiona measures are not taken.		
	Carefully read through the safety notes and operating instructions in this manual before working with this machine.	
IMPORTANT	Important information is given here.	
INFO	Useful information is given here.	
$\succ$	This symbol indicates instructions.	
₽	This symbol indicates results of your actions.	
_	This symbol indicates itemizations.	
►	This symbol refers to a chapter with more detailed information.	

### 2 Safety notes

#### 2.1 Proper use

- Use the GS 630 Utensil Washer only for washing dishes and other equipment used for cooking and other related activities (butchery, bakery).
- The GS 630 Utensil Washer is a technical device for commercial use and is not intended for private use.
- Always use washing racks that are suitable for the dishes. Do not wash without a washing rack.

#### 2.2 Improper use

- This device may be used by children from the age of 8 upwards as well as by those with reduced physical, sensory or mental capabilities or a lack of experience and knowledge if they are supervised or have been instructed on how to safely use the device and understand the risks associated with it.
- Children must not play with the device.
- Cleaning and user maintenance should not be carried by children without supervision.
- Do not use the device to wash electrically heated devices or parts made of wood.
- Do not wash parts made of plastic if they are not heat and lye-resistant.
- Use a suitable detergent to wash parts made of aluminium such as jars, containers or plates in order to prevent black stains.
- Winterhalter Gastronom GmbH does not assume liability for any damage caused due to improper use of the device.

#### 2.3 Using chemicals (detergents, rinse aids, descalers...)

- When handling chemicals, observe the safety notes and dosing recommendations printed on the packing.
- Wear protective clothing, protective gloves and protective goggles when handling chemicals.
- Use only products that are suitable for industrial dish washers. Such products are appropriately marked. We recommend Winterhalter products. These are especially adapted to Winterhalter dish washers.
- Do not mix different detergents in order to prevent efflorescence which could destroy the detergent dosing device.
- Do not use products that can create foam, e.g. hand soap, soft soap, hand wash liquid.
   Ensure that these do not enter the dish washer even during the pre-treatment of the utensils.

### 2.4 Electrical Safety

The electrical safety of this machine is guaranteed only if it is connected to a correctly
installed protective circuit and a residual current circuit breaker. It is very important that
this basic safety requirement is tested and in case of doubt the house installation is
checked by a qualified electrician.

Winterhalter cannot be held responsible for damage caused by a missing or broken earthing system (e.g. electrical shock).

#### 2.5 Safety Instructions for Maintenance and Repairs

- Maintenance work and repairs may only be performed by service technicians authorised by Winterhalter. Improper maintenance or repairs may cause significant danger for the user, for which Winterhalter is not liable.
- When performing maintenance and repair work, unplug machine from the power network. Electricity consumers (heating element, frequency inverter, ...) are under voltage until the on-site mains disconnect switch has been operated.
- Only original Winterhalter spare parts may be used for maintenance and repairs. If original spare parts are not used, the warranty is invalidated.
- A damaged or leaking machine can endanger your safety. In case of defects, switch off the machine immediately. Switch off the on-site mains disconnector (main switch). Only then is the machine without power.
- Do not operate a damaged machine. In case of defects resulting from an unknown cause, switch off the machine, and do not switch it on until the defect has been rectified.

- Contact your installer or electrician if the on-site water or electricity supply is the cause of the malfunction.
- Notify an authorised service technician or your retailer if another fault has occurred.
- If the mains cable of this machine is damaged, it must be replaced by the Winterhalter or its Customer Service or another qualified person in order to prevent hazards. The mains cable must be H07 RN-F type or equivalent.

#### 2.6 General safety notes

- Read through the safety notes and operating instructions in this manual carefully.
   Winterhalter Gastronom GmbH does not assume liability or warranty in case of nonadherence to these safety notes.
- Use the dish washer only after you have read and understood the operating manual. Allow the Winterhalter Customer Service Department to provide information about the operation and functioning of the dish washer. Always operate the machine as described in this operating manual.
- Train the operating personnel as regards handling the machine and inform them about the safety notes. Repeat the training sessions at regular intervals to prevent accidents.
- Do not make changes, additions or reconstructions in the dish washer without the approval of the manufacturer.
- In case of danger and/or defects, switch off the machine immediately. Switch off the local mains separator (main switch). Only then is the machine without power.
- For your safety, test the local fault current circuit breaker (FI) regularly by pressing the test button.
- Keep the machine documents accessible. The service engineers authorised by Winterhalter require the circuit diagram for repairs.
- The dish washer may not be exposed to explosive or frost-endangered areas.
- Keep the dish washer away from children. The interior space of the dish washer contains lye-mixed hot water with a temperature of approx. 60°C. The water in the dish washer is not drinking water.
- Close the local water shut-off valve after the work is complete.
- Switch off the local mains disconnector after the work is complete.
- Do not open the machine door when the machine is in operation. There might be a risk of the lye-mixed hot water spilling out. Stop the washing programme before doing so (▶ 6.3).

### 2.7 Daily cleaning and maintenance

- Adhere to the servicing and maintenance instructions in this manual (▶ 7).
- Wear protective clothing and protective gloves before touching parts with detergent solution (filters,

wash arms, ...).

- Do not spray the machine and the surrounding area (panels, base) using a water hose, steam-jet air ejector or high-pressure cleaner.
   Ensure that the plinth of the machine is not flooded when washing it in order to prevent an uncontrolled inflow of water.
- Use a brush or a cloth and not a high-pressure cleaner when cleaning the inside of the machine.
- Do not use a scrubbing agent or an abrasive cleaner.
- During the daily cleaning process, ensure that there are no rusty external bodies in the machine which can cause the "stainless steel rust-free" material to start rusting. Rust particles can come from non-rust-free cleaners, damaged wire racks or non-rustprotected water lines.
- Clean and maintain the external areas using a suitable stainless steel cleaner and a soft cloth. We recommend Winterhalter Gastronom stainless steel cleaners and stainless steel supports.

### 3 Before working with the machine

- Get the machine installed by your service engineer or authorised Winterhalter dealer. More information is provided in chapter 0. If the install location is not frost-free, adhere to chapter 8.
- Get the machine connected as per the locally applicable standards and the regulations of the authorised mechanics (water, waste water, electrical system). More information is provided in chapters 14 and 15.
- Get the machine commissioned by a service engineer authorised by Winterhalter. Get yourself and your operating personnel trained in the operation of the machine.

#### 3.1 Checking the completeness

- > Check the delivery on the basis of the delivery note for completeness and transport damage.
- In case of any damage, inform the shipper, the insurance agency and the manufacturer about it.

### 3.2 Commissioning

After connecting the water and the current properly, contact the relevant Winterhalter dealer or your dealer for the commissioning of the machine and for providing training in its operation.

### 4 Rinse aid and detergent

#### 4.1 Safety notes



When handling chemicals, observe the safety notes and dosing recommendations printed on the packing.

Wear protective clothing, protective gloves and protective goggles when handling chemicals.



Use only products that are suitable for industrial dish washers. Such products are appropriately marked. We recommend Winterhalter products. These are especially adapted to Winterhalter dish washers.

Do not mix different detergents in order to prevent efflorescence which could destroy the detergent dosing device ( $\blacktriangleright$  4.4)

Do not fill rinse aids in the storage containers for detergents and vice versa.

Do not use products that can create foam, e.g. hand soap, soft soap, hand wash liquid. Ensure that these do not enter the machine even during the pre-treatment of the utensils.

#### 4.2 Rinse aid

A rinse aid is necessary to ensure that water on the dishes drains off after washing and dries off after a short while. Rinse aids are automatically supplied from a storage container outside the machine into the boiler of the machine. The rinse aid dosing device is an in-built component of the machine. The service engineer authorised by Winterhalter sets the dosing amount when commissioning the machine.

INFO: The rinse aid dosing device is not included in the scope of delivery of all machines.

The storage container for the rinse aid must be equipped with a suction tube with level monitoring if the level of the rinse aid in the machine is to be displayed.

#### 4.3 Detergent

A detergent is necessary to ensure that the leftovers and dirt on the dishes is cleaned. Detergents can be supplied as follows:

- Manually as detergent powder.
- Automatically from a storage container outside the machine via a detergent dosing device that is either built in the machine or is installed outside it.

**INFO:** The detergent dosing device is not included in the scope of delivery of all machines.

#### Dosing of the detergent powder

#### **Pre-dosing**

- Fill approx. 50 g detergent powder into the machine when the programme key (6) lights up in green.
- > Then start a wash cycle immediately in order to mix the detergent powder with the water.
- > Adhere to the dosing instructions on the packaging of the detergent.

#### **Post-dosing**

> Fill approx. 50 g detergent powder into the machine after 5 wash cycles.

#### Post-dosing for machines with manual or automatic cold water pre-wash

- > Note that the detergent concentration reduces more quickly in case of cold water pre-wash.
- > Thus, supply a greater quantity in case of constant use of cold water pre-wash.

#### **Dosing of liquid detergent**

The service engineer authorised by Winterhalter sets the dosing amount when commissioning the machine.

The storage container for the detergent must be equipped with a suction tube with level monitoring if the level of the detergent in the machine is to be displayed.

### 4.4 Changing the detergent (liquid detergent)

> When changing the detergent, adhere to the following:

- Mixing different detergents can lead to efflorescence that can lead to a failure of the detergent dosing device. This is applicable even if the new detergent is from the same manufacturer.
- A new detergent usually requires a new setting of the detergent dosing device.
- The dosing pipe and the detergent dosing device must be thoroughly rinsed with water before the new detergent is used.
- > Assign the required work to a service engineer authorised by Winterhalter to attain good results.

If this is not done, the warranty and product liability of Winterhalter Gastronom GmbH expires.

#### This is how you should rinse the dosing pipe and the detergent dosing device:



When handling chemicals, observe the safety notes and dosing recommendations printed on the packing.

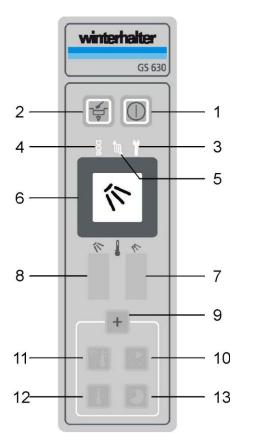
Wear protective clothing, protective gloves and protective goggles when handling chemicals. Do not mix different detergents.

- Remove the suction pipe from the storage container with the currently used detergent and place it in a container filled with water.
- Initiate several washing programmes till the water is supplied to the machine via the detergent dosing device. The suction and pressure pipes are rinsed here.
- > Place the suction pipe in the storage container with the new detergent.

### 5 Machine description

### 5.1 Operating panel

The operating panel is to the right of the machine door.



- 1 On-off switch
- 2 Tank draining / self-cleaning
- 3 Indicator light for defect
- 4 Indicator light for insufficient detergent or rinse aid<sup>1</sup>
- 5 Indicator light for exhausted water supply if this can be determined from the water consumption
- 6 Normal washing cycle
- 7 Temperature indicator for boiler (when the machine is warming up and if special programmes are activated)
- 8 Temperature indicator for tank (when the machine is warming up and if special programmes are activated)
- 9 Function key; activates special programmes (10-13)
- 10 Short washing cycle
- 11 Temperature switching for rinsing (optional)
- 12 Cold water pre-wash (optional)
- 13 Intensive washing cycle

### 5.2 Mode of operation

The boiler and the tank fill up and are warmed up to the operating temperature after the machine is switched on. The programme key (6) lights up in red during the warm-up phase.

When the desired temperatures (tank: approx. 60°C, boiler: approx. 85°C) are attained, the machine is ready for operation. The start key (6) lights up in green.

The machine is operated with fully automatic programmes consisting of the programme steps Wash, Drain and Rinse. The programme key (6) lights up in blue during the programme.

The rinse aid is usually supplied via an in-built dosing device. The storage container for the rinse aid is placed outside the machine.

Depending on the design of the machine, the rinse aid is supplied either manually (powder) or via an in-built or external dosing device (liquid detergent). The storage container for the detergent is placed outside the machine.

<sup>&</sup>lt;sup>1</sup> Shows a defect in the detergent or the rinse aid if external drums with suction pipe and level monitoring are used.

The indicator light flashes as soon as an empty drum is detected. If the drum has not been re-filled or replaced after 20 washing processes, the indicator light lights up and the installed dosing device (if any) is switched off.

#### Programme steps

**Wash:** The circulating pump supplies the detergent solution from the tank to the dishes via the wash arms and nozzles. Here, the wash arms move which ensures powerful and effective cleaning of the dishes. During rotation, detergent solution is constantly supplied via a filter system and the patented Mediamat Cyclo (separator for suspended parts).

Drain: After washing, there is a short break which allows the detergent solution to drain off from the dishes.

**Rinse:** In the last programme step, the washed dishes are rinsed with fresh hot water to remove lye remains and to warm up the dishes for optimum drying outside the machine. The rinsing water also replaces the detergent solution.

**Cold water pre-wash:** The dishes are also optionally rinsed with cold water before the first programme step in order to prevent coagulation of albuminous dirt. Depending on the structure of the machine, this is done automatically either before every wash cycle or after the activation of this function.



Do not open the doors during the washing programme. There is the risk of hot water spilling out of the device.

Do not keep the doors open.

#### 5.3 Washing programmes

The dish washer can be operated in several modes. The mode is selected via the operating panel.

Mode	Explanation	
Normal programme (6)	for medium dirty dishes medium drying time	
Short programme (10)	for slightly dirty dishes short / no drying time	
Option: Programmes with reduced rinsing temperature (11)	For washing glasses nsing Programme duration: Depending on the selected washing programme	
Intensive programme (13)	for heavily dirty dishes Long drying time	
Option: Normal programme with cold water pre-wash (12)	For dishes with albuminous dirt Coagulation is prevented by rinsing with cold water	
Tank draining / self-cleaning (2)	<ul> <li>Cleaning the machine:</li> <li>Circulation of the detergent solution within the washing compartment</li> <li>Pumping the detergent solution</li> <li>Rinsing the washing compartment with hot fresh water</li> <li>Pumping out the used fresh water.</li> <li>The washer switches off automatically after the washing cycle is complete</li> </ul>	

### 6 Operation

#### 6.1 Switching on

#### 6.1.1 Before switching on the machine

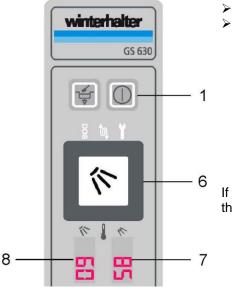
- Open the local water shut-off valve.
- Switch on the local mains disconnector.
- > For your safety, test the local fault current circuit breaker (FI) by pressing the test button.
- Open the machine door and check whether the wash arms (3 above, 3 below) and the filters (3 strainers, 1 filter cassette) have been installed.
- Check whether the lower rinse pipes are folded downward.
- Close the machine door.



When handling chemicals, observe the safety notes and dosing recommendations printed on the packing. Wear protective clothing, protective gloves and protective goggles when handling chemicals. Do not mix different detergents.

Check whether detergent and rinse aid are present in the storage containers. Refill on time or replace the storage containers so that the washing result is not affected.

#### 6.1.2 Switching on the machine and making it ready for operation



Close the machine door

- Press the on-off switch (1)
  ⇒ The programme key (6) lights up in red
  ⇒ The tank of the machine is automatically filled and heated.
  ⇒ Detergent is supplied to the tank of the machine (provided a dosing device is connected).
- The temperatures in the boiler (indicator 7) and tank (indicator 8) are displayed till the desired temperatures are reached. After that, the display switches off.

If the programme key (6) lights up in green, it means that the machine is ready for operation.

#### 6.1.3 Supplying detergent manually

> Follow the chapter 4.

**INFO:** If the washer is equipped with an installed or an external detergent dosing device, detergent does not need to be supplied manually.

In case of an external detergent dosing device, adhere to the relevant operating manual.

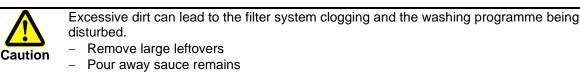
#### 6.2 Washing

#### 6.2.1 Sorting the dishes



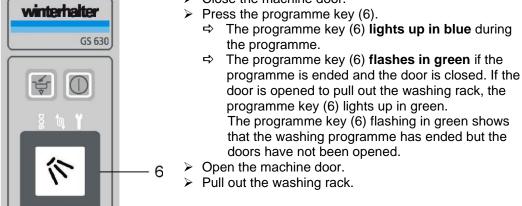
Adhere to the following:

- Soak the dried residues
- Soak the cutlery till it is rinsed
- Position knives and other sharp and pointed cutlery in the cutlery stand with the handle outside in order to prevent injuries
- Position plate racks and other racks with the outer dimension 500 x 500 mm on the utensil rack for washing
- Light plastic parts may slip or turn when washing. Place a plastic rack on these light parts



#### 6.2.2 Washing with the normal washing cycle

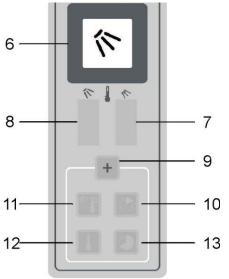
Close the machine door.



#### 6.2.3 Break

- Check the filter cassette for dirt and clean it if required. The filter cassette can be removed without draining the tank.
- Check the tank water for dirt. If required, drain it and refill the machine.
- Close the doors.

#### 6.2.4 Washing with special programmes



- Press the function key (9).
  - ⇒ The special programmes (10, 11, 12, 13) are also available in addition to the normal programmes (6).
  - ⇒ The number depends on the design of the machine. All lit keys can be selected.
  - ➡ Temperatures in the tank (8) and boiler (7) are displayed (but not during the washing).
- Press the function key (9) to deactivate the special programmes.

#### 6.2.5 Special programmes Key 10 Short programme for slightly dirty dishes short / no drying time Activate mode: Press button 10 Start mode: Press button 6 The special programme remains saved till another special programme is selected or key 9 is pressed.

#### Key 11

#### Programmes with reduced rinsing temperature (optional equipment) For washing glasses

Activate mode: Press button 11 The rinsing temperature is displayed in display 7. The first wash cycle is carried out with high rinsing temperature.

#### Start mode:

Short programme: Press key 10 and then key 6 Intensive programme: Press key 13 and then key 6

Normal programme: Press button 6

➡ Key 11 flashes till the washing is carried out with reduced rinsing temperature.

#### At the end of the mode:

Press key 11 or key 9 again to deactivate the reduction in the rinsing temperature.

#### Kev 13

Intensive programme for heavily dirty dishes Long drying time Activate mode: Press button 13 Start mode: Press button 6 The special programme remains saved till another special programme is selected or key 9 is pressed.

#### Key 12

# Mode with manual cold water pre-wash (optional equipment)

For washing cutlery with albuminous dirt (meat and blood remains).

The cutlery is first rinsed with cold water and then cleaned in the normal programme. This prevents the coagulation of the albuminous dirt.

#### Activate mode: Press button 12

Keys 10 and 13 are no longer lit and cannot be selected.

#### Start mode: Press button 6

➡ Key 12 flashes till the cold water pre-wash is on.

#### At the end of the mode:

Press key 9 again to deactivate the cold water pre-wash.

#### 6.2.6 Routine checks

Check whether the dishes are clean.



Check whether the indicator light for defects has lit up on the operating panel.

If yes:

- Switch off the machine and note the error code
- Using the error table in chapter 9.1, check whether the error can be rectified by you
- > If no, forward the error message to the Winterhalter service engineer
- > Switch on the machine only after the error has been rectified



DOS > Check whether the indicator light for insufficient detergent or rinse aid has lit up on the operating panel

If yes:



When handling chemicals, observe the safety notes and dosing recommendations printed on the packing. Wear protective clothing, protective gloves and protective goggles when handling chemicals.

Do not mix different detergents

- > Check whether detergent and rinse aid are present in the storage containers. Refill or replace the storage containers on time so that the results of washing are not affected.
- Check the interior of the machine



Wear protective clothing and protective gloves before touching parts with detergent solution (filters, wash arms, ...)



Open the machine door

Fold the lower rinsing pipes upward

Mount the filter

strainers

cassette and the

0

Remove the lower wash arms and if necessary, clean them

Remove the filter cassette and the strainers



Clean the filter cassette



Clean the strainers



Mount the lower wash arms

Fold the lower rinsing pipes downward

Close the machine door

### 6.3 Switch off the machine

- Press the on/off key (1).
  - ➡ The keys are no longer lit and the machine is switched off. The tank remains filled but the temperature is not maintained.



The machine is without power only if the local mains disconnector has been actuated.

If at the end of a working day, you drain the tank and want to clean the machine, proceed as described in chapter 7.1.

### 7 Servicing and maintenance



Do not spray the machine and the surrounding area (panels, base) using a water hose, steam-jet air ejector or high-pressure cleaner. Ensure that the base of the machine is not flooded when washing it in order to prevent an uncontrolled inflow of water.

### 7.1 Daily

A self-cleaning programme is helpful in cleaning the machine.

#### 7.1.1 Starting the self-cleaning programme

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- Open the machine door.
- > Take the dishes out of the machine.
- Close the machine door.
- Press key 2 for approx 2 seconds and then release it.
  - Sey 2 flashes
  - Sey 6 is not lit
  - ➡ The self-cleaning programme clean the machine from the inside.

When the self-cleaning programme is complete, the washer switches off automatically. The operating panel is no longer lit.

#### 7.1.2 Manual cleaning of the machine interior



Open the machine door





Fold the lower

rinsing pipes

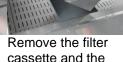
upward

Clean the filter cassette

Clean the strainers

and upper wash arms

Remove the lower



cassette and the strainers



Clean the wash arms

If the interior of the machine is dirty: Clean the interior with a sponge and a brush. If necessary, spray it using a hose.

Clean the sieves from the pump suction openings using a brush. The sieves can be removed if required.



Mount the filter cassette and the strainers

Mount the lower and upper wash arms



Close the machine door

- Press the on/off key (1) to switch on the machine
- Press key 2 for approx 2 seconds and then release it
   The water in the tank is pumped out and the machine then switches off
- Close the local shut-off valve for the water supply
- Switch off the local mains disconnector

#### 7.1.3 Cleaning the exterior of the machine

- > Clean the external surfaces using a stainless steel cleaner and stainless steel support.
- Open the machine door a little so that the interior can dry. This is important for long-term corrosion protection even in case of stainless steel.

#### 7.1.4 Checking the external water preparation

> Check whether sufficient regenerating salt has been filled

### 7.2 Monthly

#### 7.2.1 Descaler

If the machine is operated with hard water without the relevant water preparation, the boiler, the machine interior and all water lines can scale.

Grease residues and the dirt and grease remains in them are a great risk as regards hygiene and scaling can lead to failure of heating elements. Regular removal of these layers is absolutely essential.

In order to be able to descale all water lines and the boiler properly, assign this work to a Winterhalter service engineer.

You can descale parts of the interior of the machine yourself with the help of the following notes.

- > Drain the machine ( $\triangleright$  7.1)
- Stop the detergent dosing (e.g. remove the suction pipe or switch off the detergent dosing device) in order to prevent formation of chlorine if detergents containing active chlorine and descalers get mixed.
- > Fill the machine ( $\blacktriangleright$  6.1)
- > Wait till the machine is ready for operation



When handling chemicals, observe the safety notes and dosing recommendations printed on the packing.

Wear protective clothing, protective gloves and protective goggles when handling chemicals.

- > Supply the recommended dose of the descaler in the machine tank
- Trigger the intensive mode once or twice
- Drain the machine (► 7.1)



The descaler may not remain in the machine for hours.

- > Fill the machine ( $\triangleright$  6.1)
- Trigger the intensive mode once or twice to remove the remaining descaler from the washing system
- > Drain the machine again ( $\triangleright$  7.1)
- Restart the detergent dosing

### 7.3 Maintenance by the Customer Service

We recommend that you have a Winterhalter service engineer carry out the maintenance of the machine at least twice a year so that venerable parts can be checked and replaced accordingly. Such components include:

- Water supply pipes
- Dosing pipes

Winterhalter has a maintenance contract that includes these services.

### 8 Decommissioning for long durations

Follow the notes if the machine needs to be out of operation for a long duration (holidays, seasonal business).

- ➢ Drain the machine (▶ 7.1)
- Clean the machine as described in chapter 7
- Keep the machine door open
- Close the local shut-off valve of the water supply line
- Switch off the local mains disconnector

If the machine is in a place that is not frost-free:

- > Assign a Winterhalter service engineer with the task of making it frost-resistant:
  - The engineer must drain the boiler, the rinsing pump and the drain pump.

#### **Re-commissioning**

After the break, the machine must be in a completely assembled condition (at a temperature of 25°C for at least 24 hours) before it is put into operation again.

- > Open the local shut-off valve of the water supply line
- Switch on the local mains disconnector
- > Switch on the machine

### 9 Malfunctions

This chapter explains the remedies in case of malfunctions. The causes and remedies have been specified in the tables. Contact the Winterhalter service engineer if you cannot eliminate the error yourself.



#### DANGER! Danger of life due to components that are energised!

Do not open any machine covers or machine parts if it requires tools. There is danger of shock. Let a Winterhalter service engineer carry out work on the electrical system. The machine must first be disconnected from the mains.

#### 9.1 Malfunctions; display on the operating panel

Display Meaning		Remedy	
DOS	Insufficient detergent or rinse aid	Refill the detergent or rinse aid	
Error message		<ul> <li>&gt; Switch off the machine</li> <li>An error code is displayed on the operating panel</li> <li>If Err 4, Err 5, Err 7-Err 10, Err 15 or Err 17-Err 18 is displayed:</li> <li>&gt; Check whether the water shut-off valve is open</li> <li>&gt; Switch on the machine again</li> <li>If there is an error message:</li> <li>&gt; Disconnect the machine from the mains and close the water shut-off valve</li> <li>&gt; Forward the error message to the Winterhalter service engineer</li> <li>If another error code is displayed:</li> <li>&gt; In this table, check what the error code means then follow the notes</li> </ul>	
Err 1 Err 12 Err 13	Err 12 machine malfunction due to which the		
Err 6	Machine-internal error or water supply blocked	<ul> <li>Inform the Winterhalter Customer Service or get the blockage rectified.</li> </ul>	
Err 21	If the error code <b>Err 21</b> is displayed when the machine is switched off, it means that the water level in the machine was too high. Water was thus pumped off.	<ul> <li>Close the water shut-off valve so that water no longer flows into the machine</li> <li>Forward the error message to the Winterhalter service engineer</li> </ul>	
Err 23	Machine-internal error	<ul> <li>Forward the error message to the Winterhalter service engineer</li> </ul>	

Display	Meaning	Remedy	
Flashes in red	<ul> <li>The temperature in the boiler or the tank is above 95°C.</li> <li>Switch off the machine immediately. The error code Err 2 or Err 3 is displayed.</li> </ul>	Forward the error message to the Winterhalter service engineer	
Flashes in blueIn case of inadequate pre-cleaning of the dish, dirt can get accumulated on the strainer and in the filter cassette such that the washing programme is disturbed. The circulating pumps switch off and the programme key (6) flashes in blue.		<ul> <li>Switch off the machine; the programme key continues to flash.</li> <li>Remove, clean and re-position the filters.</li> <li>The flashing stops after 1 minute. Switch on the machine again and operate it.</li> <li>Ensure better pre-cleaning to prevent any more malfunctions.</li> </ul>	

### 9.2 Malfunctions

Error	Possible cause	Remedy
Machine cannot be	The local mains disconnector is not switched on	Switch on the local mains disconnector
switched on	Local fuses defective	Repair the local fuses
Machine does not get	Machine door not closed completely	Close the machine door
filled	Water shut-off valve closed	Open the water shut-off valve
	No or excessively low detergent dosing	Set the dosing amount as per the manufacturer's specifications Check the dosing lines (for kinks, breakage,) Replace the storage container Check the dosing device
The dishes do not get	Dishes incorrectly sorted	Do not stack dishes one over the other
clean	Nozzles of the wash arms blocked	Remove the wash arms and clean the nozzles
	Incorrect mode selected	Use the intensive mode
	Excessively low temperatures	Check the temperatures and if the desired values have not been attained, inform the Customer Service
There is formation of	In case of grease residues: The water is too hard	Check the external water preparation / set it correctly Clean thoroughly
There is formation of layers on the dishes	In case of starch residues: Excessively high temperatures during manual pre-cleaning (fizzy liquid)	Maximum temperature may be 30°C
The dishes do not dry on their own dosing		Set the dosing amount as per the manufacturer's specifications Check the dosing lines (for kinks, breakage,) Replace the storage container Check the dosing device

### 9.3 Malfunctions in machines with special equipment

Error Possible cause		Remedy	
Acoustic signal	Insufficient detergent or rinse aid	Refill the detergent or rinse aid	
	Water treatment device requires regeneration	Regenerate the external water preparation system. Follow the notes in the relevant device documents.	

### **10** Technical Information

Voltage	
Total connected load	see rating plate
Fuse protection	
Minimum flow pressure	
Maximum inlet pressure	▶ 19
Inlet water temperature	

Operating temperature	0 – 40 °C
Relative air humidity	< 95 %
Storage temperature	> -25 °C
Maximum height above sea level of installation site	3000 m

### 11 Emission values

#### Noise

Workplace-related emission sound pressure level Leq < 70 dB(A) Measurement uncertainty: K(pA): 4 dB

#### Exhaust air

Adhere to the VDI Guideline 2052 when designing the ventilation system.

### 12 Disposal



Incorrect or negligent disposal can cause considerable environmental pollution and/or damage.

- For hazardous substances, please observe the disposal regulations listed in the safety data sheets.
- Disposal according to national regulations.

### 13 Installation

Notes for the service engineer or dealer authorised by Winterhalter:

- Observe the connection diagram on page 50.
- The installation site must be frost-resistant so that the water supply systems do not freeze.
- Install the machine horizontally with the help of water-level.
- Adjust the base unevenness with the help of the height-adjustable machine feet.
- Water vapour escapes when opening the machine door which can cause the wood to get wet. If the
  furniture adjacent to the machine is made of wood, a vapour protection set must be installed. The same is
  applicable if the machine is installed under a worktop made of wood.

### 14 Water connection

Notes for the installer:

- Adhere to the connection diagram on page 50 along with the specifications for water supply temperature and water pressure.
- Connect the machine to the drinking water.
- Install a main shut-off valve in the water supply line near the machine such that it is easily accessible. It
  may not be behind the machine.

- The water-related safety should be as per DIN EN 61770. Thus, the machine can be connected to a fresh water line without an intermediate connection to another safety equipment.
- Use the supply pipe and the fine filter in the washer for water supply. The fine filter prevents particles from the water supply line entering the machine thus preventing extraneous rust on the cutlery and in the machine.
- The supply hose may not be shortened or damaged. Old existing hoses may not be re-used.
- Check whether the connections are tight.
- Use the drain pipe in the washer for draining water. The drain pipe may not be shortened or damaged.
- The washer is equipped with a drain pump. Refer to the connection diagram for the maximum pumping height.
- In case of water hardness of more than 3°d total hardness (GH), we recommend that you connect a water preparation system upstream so that the machine is not scaled and an optimum washing and drying result can be attained. The service engineer authorised by Winterhalter is always at your service.

#### 15 **Electrical connection**

Notes for the electrician:



DANGER! Danger of life due to components that are energised! Disconnect the machine from the mains during all electrical work and check if it is without power.

The machine and the relevant additional devices must be connected by an electrical company authorised by the relevant electricity supplier as per the locally applicable standards and regulations.

- Observe the connection diagram on page 50.
- Adhere to the rating plate and the circuit diagram.
- Check the effectiveness of all electrical protection systems.
- Connect the machine to a properly installed and checked protective conductor system.
- The electrical connection of the machine must correspond with the data of the rating plate.
- Secure the electrical connection of the machine as a separately secured circuit locally using inactive fuses or circuit breakers as per the total connecting loads on the rating plate.
- Mount a mains disconnector and a fault current circuit breaker (FI) in the electrical supply line. These switches must switch off from all poles and must have the prescribed contact distance. The installation site must be near the machine and easily accessible.

#### 15.1 Mains connection cable



DANGER! Danger of life due to components that are energised! If the mains connecting line of this device is damaged, it must be replaced by the manufacturer or his Customer Service or another gualified person in order to prevent hazards.

Use a cable of the type H07 RN-F or a similar one.

#### Requirements for the mains connection cable

- Use of a cable of the type H07 RN-F or equivalent
- Cross-section and number of wires appropriate for voltage, fusing and overall connection value

#### 15.2 Equipotential bonding

Integrate the machine and the relevant accessories and table systems into the local equipotential bonding system.

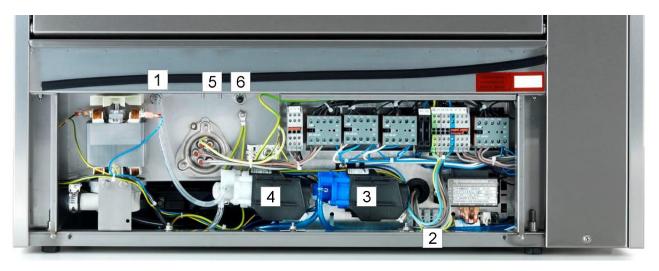
A connection screw marked with  $\heartsuit$  is present behind the machine for equipotential bonding connection **(▶** 16).

### 16 Position of the dosing points (detergent, rinse aid, defoamer)



DANGER! Danger of life due to components that are energised! Get the dosing device installed and commissioned by a service engineer authorised by Winterhalter.

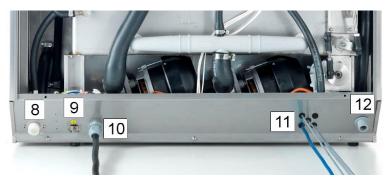
Disconnect the machine during all electrical work from the mains and check if it is without power.



- 1 Dosing point of detergent; transparent hose
- 2 Take-over strip for the connection of external dosing devices (also see chapter 17)
- 3 Rinse aid dosing device
- 4 Detergent dosing device
- 5 Position for the defoamer dosing device (optional)
- 6 Dosing point of the defoamer

INFO: The dosing devices (no. 3 and 4) are not included in the scope of delivery of all machines.





- 7 Dosing point of rinse aid; blue hose
- 8 Water connection
- 9 Connection screw for equipotential bonding
- 10 Electrical connection cable
- 11 Entry for detergent and rinse aid hoses
- 12 Water drain

### 17 Connecting external dosing devices

The terminal strip X3 for connecting external dosing devices is located in the plinth of the machine (position 2 in chapter 16). A maximum current drain of 0.5 A is permissible at the terminal strip.



#### Assignment of terminals (from left to right)

WASH Permanent signal if the circulating pump is active

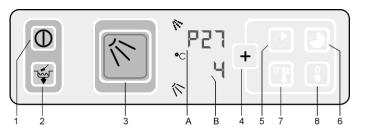
- FILL Signal depending on parameter P27
- N\* Neutral conductor
- L1\* Control phase
- PE Protective conductor

\* secured with 4 ampere (medium inactive)

#### Setting parameter P27

P27=4: Permanent signal when filling the machine (after attaining the drying protection) P27=5: Permanent signal when the supply solenoid valve is open

- > Switch off the machine and the local mains disconnector
- > Connect the external dosing device to the terminal strip
- Switch on the local mains disconnector



- > Keep the keys 6 and 8 pressed and switch on the machine (press key 1). Release the key.
  - ⇒ P 27 is displayed on Display A
  - ⇒ Value 4 is displayed on Display B

#### If P27=4 is required:

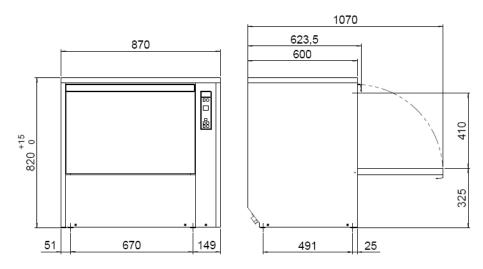
- Press key 4 to save the value
  - $\Rightarrow$  Key 3 lights up in red when saving

If P27=5 is required:

- $\blacktriangleright$  Press key 8 to change the value from 4 to 5
- Press key 4 to save the changed value
  - ⇒ Key 3 lights up in red when saving
- Switch off the machine and switch it on again (key 1)
- Put the external dosing device into operation

### 18 Connection diagram GS 630

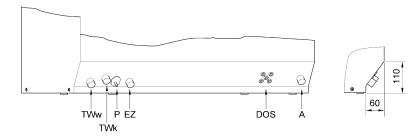
#### Dimensions



The machine height decreases by 4 mm when the feet are turned in completely. For niche dimensions for the installation of the machine into a counter, see page 52.

#### Position of the connections (rear view)

Side view



DOS	Port for hoses	detergent / rinse aid / defoar	mer) and cables

TWw	Drinking water connection (G ¾", external thread)
TWk	Drinking water connection (G ¾", external thread) (only in case of machines with cold water pre- wash (optional)
EZ	Electrical connection cable
Р	Connection for local equipotential bonding system ( $\stackrel{\bigtriangledown}{\bigtriangledown}$ )
А	Waste water connection; drain pump installed

#### Accessories

Flexible supply hose; Connect to point TWw / TWk Flexible drain pipe; connect to point A

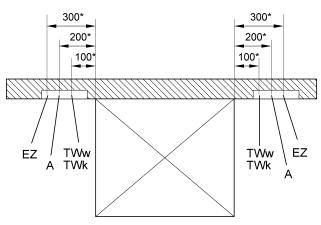


Dirt trap; Install it between the water shut-off valve and the supply hose



Local requirements See page 51

### 19 Installation plan GS 630



\* Considering the local conditions, the exact dimensions must be determined.

For the dimensions of the machine, see page 50.

	Important!
	Provide the local connections on the left or
	the right beside the machine.
	Observe both the local and country-specific
	regulations when conducting electrical and
	hydraulic connection work.
	Only when the local mains disconnector is
	switched off, the machine is without power.
	Now bond the machine equipotentially.
	Electrical supply pipe (Type H07 RN-F)
	If the mains connecting line of this device is
	damaged, it must be replaced by the
	manufacturer or his Customer Service or
	another qualified person in order to prevent
	hazards.
	Oursels have
ns	Supply hose
	Old existing hoses may not be re-used.
	The supply hose may not be shortened or
	damaged.

TWw / TWk Water con	nection (G ¾", external thread)				
Position:	appr. 400 mm above finished floor				
Water quality	Drinking water in accordance with the Drinking Water Ordinance				
Water inlet temperature:	TWw: max. 60°C				
·	TWk: Cold water in machines with cold water pre-wash				
Water hardness:	≤ 3 °dH / 3.8 °e / 0.54 mmol/l				
Flow pressure:	TWw: 100-1000 kPa; (1.0-10.0 bar)				
	TWk: 250-1000 kPa; (2.5-10.0 bar) in machines with cold water pre-wash				
	measured after a possibly upstream water treatment unit				
Flow rate:	TWw: min. 4 l/min				
	TWk: min. 15 I/min in machines with cold water pre-wash				
Supply hose:	included in delivery of the machine				
	The direct connection without protection fitting is allowed				
A Waste water conr					
Position:	max. 600 mm above finished floor				
Construction:	with siphon				
Drain pipe:	1500 mm long (standard)				
EZ Electrical connec	tion				
Construction:	appr. 300 mm above finished floor				
Construction.	Wall outlet for machines without power cord				
	Mains socket for machines with power cord				
	Mains disconnector with all-pole mains disconnection				
	and min. 3 mm contact opening width				
	Residual-current circuit breaker				
Protection:	depends on the total connected load of the machine (see page 52)				
Electrical supply pipe:	3000 mm long; cross-section: 5 x 2.5 mm <sup>2</sup> (16A; 3 N~)				
	3000 mm long with power cord (Option); cross-section: 5 x 2.5 mm <sup>2</sup> (16A; 3 N~)				
	3000 mm long; cross-section: 4 x 4.0 mm <sup>2</sup> (20A, 25A; 3~)				

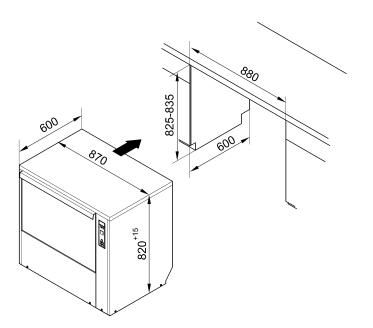
Voltage		Fuse	Tank heating	Boiler heating	Pumps + Control unit	Total connected load
380 – 415 V	3 N~	16 A	5.3 kW	5.3 kW	1.8 kW	7.1 kW
230 V	3~	20 A	4.9 kW	4.9 kW	1.7 kW	6.6 kW
380 – 415 V Australia	3 N~	16 A	6.5 kW	6.5 kW	1.8 kW	8.7 kW
200 V	3 ~	25 A	4.9 kW	4.9 kW	1.7 kW	6.6 kW

### 20 Total connected loads GS 630

### 21 Niche dimensions GS 630

If the machine is to be installed into a counter, the following niche dimensions must be adhered to. It is not necessary to secure the machine in the counter.

In the vicinity of the machine, use furniture that is appropriate for commercial areas in order to prevent damage to the machine due to steam.



Dimensions in mm For further machine dimensions, see page 50

89012959-01/2022-01; Subject to technical alterations

### EG-KONFORMITÄTSERKLÄRUNG **EC-DECLARATION OF CONFORMITY**

Wir, We, Nous, Noi, Wij, Nosotros, Nós, My, My, Podjetje, Εμείς η, Mi a, Biz

Hersteller / Manufacturer: Winterhalter Gastronom GmbH Winterhalterstraße 2-12

DE-88074 Meckenbeuren

erklären in alleiniger Verantwortung, dass das Produkt "Gewerbliche elektrische Spülmaschine", declare under our sole responsibility that the product "Commercial electric dishwashing machines", déclarons sous notre seule responsabilité que le produit « Lave-vaisselle professionnelle électrique» dichiariamo sotto la nostra piena responsabilità che il prodotto "Sistema di lavaggio elettronico industriale", verklaren als enig verantwoordelijke dat het product "professionele vaatwasmachine", declaramos bajo nuestra absoluta responsabilidad que el producto "lavavajillas eléctrico industrial". Declaramos sob nossa única responsabilidade, que o produto "Máguina de lavar loiça comercial eléctrica", oświadczamy na własną odpowiedzialność, że produkt "elektryczna zmywarka przemysłowa", prohlašujeme na vlastní zodpovědnost, že produkt "profesionální elektrická mycka", na lastno odgovornostjo izjavlja, da je izdelek "Profesionalni električni pomivalni stroj" δηλώνουμε αποκλειστικά με δική μας ευθύνη, ότι το προϊόν "Επαγγελματικό ηλεκτρικό πλυντήριο πίατων", felelősségünk teljes tudatában kijelentjük, hogy a termék "Professzionális elektromos mosogatógép", olarak yegane sorumlugumuz dahilinde beyan ederiz ki Sanayi bulasik Makinesi

> Typenbezeichnung / Model: GS 630 Warenzeichen / Trademark: Winterhalter

auf das sich diese Erklärung bezieht, mit den folgenden Normen übereinstimmt: to which this declaration relates is in conformity with the following standards: auquel se réfère cette déclaration est conforme aux normes : al quale fa riferimento la presente dichiarazione, è conforme alle seguenti norme : waarop deze verklaring betrekking heeft, met de volgende normen in overeenstemming is: al que se refiere esta declaración, cumple las siguientes normas ao qual esta declaração diz respeito, está em conformidade com as seguintes normas: do którego odnosi się to oświadczenie, jest zgodny z następującymi normami: na kterou se vztahuje toto prohlášení, odpovídá níže uvedeným normám: na katerega se nanaša ta izjava, skladen z naslednjimi standardi: στο οποίο αναφέρεται αυτή η δήλωση, συμφωνεί με τα ακόλουθα πρότυπα: amihez kapcsolódóan ezen nyilatkozat megfelel a következő szabványoknak: aşadaki standartlara uygundur:

EN 60335-2-58:05 + A1:08 + A11:10 EN 60335-1:12 + A11:14/AC:14 EN 55014-1:06 + A1:09 + A2:11 EN 55014-2:15

EN 61000-3-2:14 EN 61000-3-3:13 EN 61000-3-11:00 EN 61000-3-12:11 EN 62233:08

gemäß den Bestimmungen folgender Richtlinien: following the provisions of Directives: selon les conditions des directives suivantes : Ai sensi alle disposizioni previste dalle seguenti direttive : volgens de bepalingen van de volgende richtlijnen: conforme a las disposiciones de las siguientes directivas:

de acordo com as disposições das seguintes directivas:

2006/42/EC/MD (Machinery Directive); 2014/30/EC/EMC (Electromagnetic Compatibility) zgodnie z postanowieniami następujących dyrektyw: na základě ustanovení následujících směrnic: in je skladen z določili naslednjih direktiv σύμφωνα με τους κανονισμούς των ακόλουθων Οδηγιών: enligt följande riktlinjers bestämmelser: a következő Irányelvek rendelkezéseinek: aşadaki Direktif hükümlerine uygundur:

Hinsichtlich der elektrischen Gefahren wurden gemäß Anhang I Nr. 1.5.1 der Maschinenrichtlinie 2006/42/EC die Schutzziele der Niederspannungsrichtlinie 2014/35/EC eingehalten.

With respect to potential electrical hazards as stated in appendix I No. 1.5.1 of the machine guide lines 2006/42/EC all safety protection goals are met according to the low voltage guide lines 2014/35/EC.

Conformément à l'annexe I N° 1.5.1 de la Directive "Machines" (2006/42/EC) les objectifs de sécurité relatifs au matériel électrique de la Directive "Basse Tension" 2014/35/EC ont été respectés.

Con respecto al potencial peligro eléctrico como se indica en el apéndice I No. 1.5.1 del manual de la máquina

2006/42/EC, todos los medios de protección de seguridad se encuentran según la guía de bajo voltaje 2014/35/EC Güvenlik hedefleri uyarınca Makine Direktifi 2006/42 / EC deki EK No. 1.5.1 ile ilgili olarak, Düşük voltaj Direktifi 2014/35 / EC

uvaundur

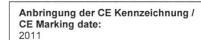
#### Name und Anschrift der Person, die bevollmächtigt ist, die technischen Unterlagen zusammenzustellen:

Name and address of the person authorised to compile the technical file: Nom et adresse de la personne autorisée à constituer le dossier technique : Nome e indirizzo della persona autorizzata a costituire il fascicolo tecnico: Naam en adres van degene die gemachtigd is het technisch dossier samen te stellen: Nombre y dirección de la persona facultada para elaborar el expediente técnico: Yetkili kişinin İsmi/Ünvanı:

Bernhard Graeff Technicat M

Meckenbeuren, 20.04.2016

**Bernhard Graeff** Winterhalter Gastronom GmbH Winterhalterstraße 2-12 DE-88074 Meckenbeuren



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