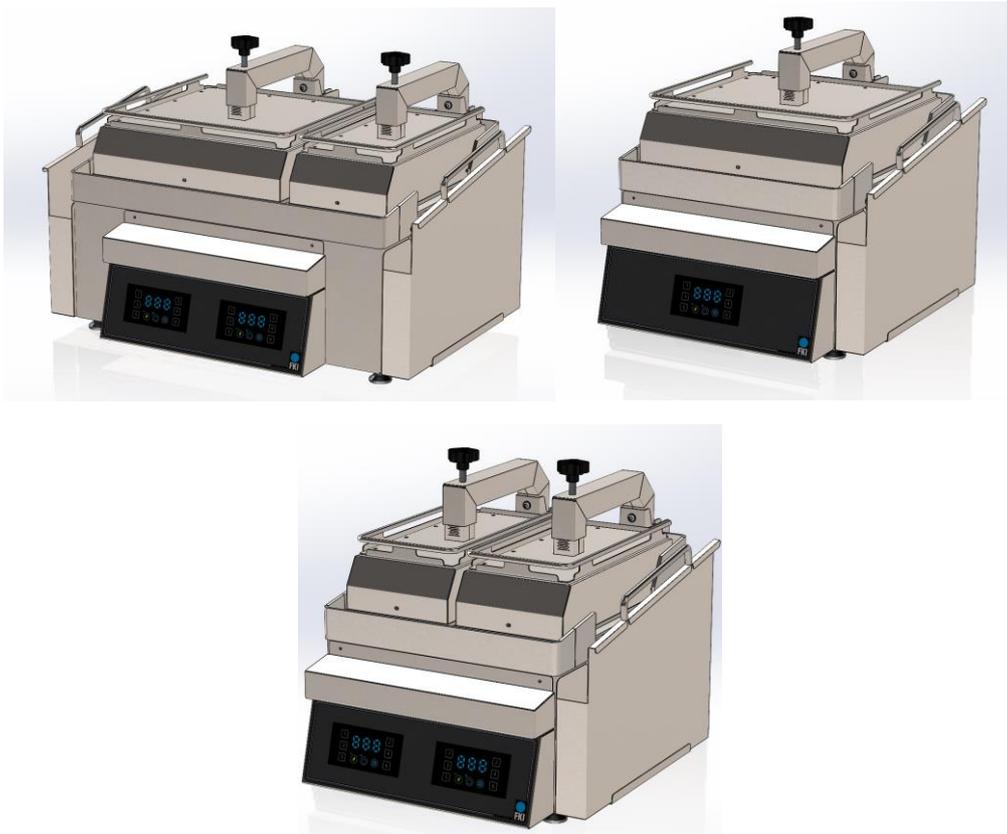


# Instructions for use

## FKI Clamshell Grill STD 9001/9002/9003

Type code: ACS-24



**FKI Fast Food Teknik a/s**

Version 3.0

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# 1 Introduction

## **Original user instructions**

These instructions are FKI Fast Food Teknik's original instructions for the appliance CLAMSHELL GRILL.

## **The purpose of these instructions**

These instructions are intended to ensure the correct installation, use, handling and maintenance of CLAMSHELL GRILL.



**Important! Read these instructions carefully before use and keep them safe for later use.**

## **Storage of these instructions**

You must retain these instructions and make sure that they are easily accessible to users and service technicians.

## **Understanding these instructions**

It is the responsibility of the CLAMSHELL GRILL's owner to ensure that anyone who will be operating, servicing, maintaining or repairing CLAMSHELL GRILL has read these instructions and, by way of minimum, the sections that are of relevance to the work they will perform.

Anyone who will be operating, servicing, maintaining or repairing CLAMSHELL GRILL is required to look up any relevant information in these instructions.

## 1.1 General

### 1.1.1 Appliance description

The CLAMSHELL GRILL is a fully-automatic contact grill for frying steaks and other foods. It is equipped with an alarm and separate heat control of top and bottom pans. It is a counter-top model. The appliance is equipped with electronic controls for each heating section, for easy operation and programming. CLAMSHELL GRILL makes it easy to achieve uniform high quality when fry your food. The appliance is equipped with a grease tray on each side of the 9002 and on one side of the 9001, 9003, so excess grease from frying can be disposed of safely and efficiently.

### 1.1.2 Manufacturer

FKI Fast Food Teknik a/s  
Byghøjvej 5, Verringe  
DK-5690 Tommerup  
[www.fki.dk](http://www.fki.dk)

### 1.1.3 Appliance label

#### 1.1.3.1 Type code: ACS-24



### 1.1.4 Technical specifications and power consumption

Explanation of the product name CLAMSHELL GRILL:

Clamshell Grill = contact grill with top pans that slide down so that the product is cooked on both sides at the same time.

9001 = Model number

900(1) = Size and configuration of top pans

#### 1.1.4.1 Dimensions and weight

Dimensions and weight of the CLAMSHELL GRILL:

Depth: 710 mm

Width: 570 mm

Height when closed: 530 mm

Height when open: 920 mm

Weight: 96 kg.

#### 1.1.4.2 Power

Product	Voltage	Fusion	Power	Theoretical consumption per phase*		
				L1	L2	L3
Clamshell Grill STD 9001	400V 3N~	32A	9kW	18	11	10
	230V 3~	40A		32	20	17
Clamshell Grill STD 9002	400V 3N~	32A	14kW	18	20	18
	230V 3~	40A		32	35	32
Clamshell Grill STD 9003	400V 3N~	20A	10kW	10	16	15
	230V 3~	32A		18	28	27

\*Actual measured result can be expected to be lower.



The appliance should be connected to its own circuit.

#### 1.1.4.3 Intended use

CLAMSHELL GRILL must only be used to fry food.

#### 1.1.5 Modification

CLAMSHELL GRILL must never be modified or serviced by unauthorised persons. In the event of non-compliance, FKI Fast Food Teknik a/s waives any and all liability.

#### 1.1.6 Dimensions

	Clamshell Grill STD 9001	Clamshell Grill STD 9002	Clamshell Grill STD 9003
Dimensions W x D x H [mm]	400 x 630 x 480	600 x 630 x 480	400 x 630 x 480
Weight	62 kg	85 kg	65 kg

## 2 Safety

### **General**

Read these safety instructions before using the appliance. Keep them near to the appliance for later reference. These instructions and the appliance itself are provided with important safety information that must always be read and observed at all times. FKI Fast Food Teknik a/s disclaims any and all liability for non-compliance with these safety instructions, for inappropriate use of the appliance or the use of incorrect settings.

CLAMSHELL GRILL is a fully-automatic contact grill which is primarily intended for continuous frying of steaks (frozen or fresh). The appliance can also be used for other foods that are suitable for frying. To determine optimum temperature, time and thickness setting, a test fry is always recommended before commencing series production. Note that the nature of the food (thickness, temperature, surface, etc.) will affect the frying result. It is equipped with a notification alarm which sounds when a program is finished and the top will tilt up. The appliance may only be used in a dry environment and at room temperatures between 0°C - 40°C.

### 2.1 Personal safety equipment



It is recommended that gloves and goggles are worn when working with the Clamshell Grill and when emptying the grease trays as the Clamshell Grill has hot surfaces and hot grease can be dangerous.

### 2.2 Potential hazards



The surfaces of the Clamshell Grill and especially the upper and lower frying pans, but also the cabinet on the upper frying pan are very hot and are labelled with this warning sign:



Therefore, be careful not to touch them while operating the Clamshell Grill.

During operation, only the hand grip and the buttons on the front may be touched. When cooking on the Clamshell Grill, put the food on/remove from the surfaces using a specially designed tool to avoid contact with the hot surfaces of the pan.



Regularly check that the handles on the grease trays are securely tightened to ensure safe handling of hot oil/grease. If a handle is loose, remove the screws, apply a food grade adhesive to the threads and then retighten, or contact a service technician.

### 2.3 Who may use the appliance



This appliance is not intended for use by children! Neither should it be used by persons with reduced physical or mental capacity, or who lack appropriate experience and knowledge unless they have been trained or instructed in the use of the appliance by someone with responsibility for their safety.

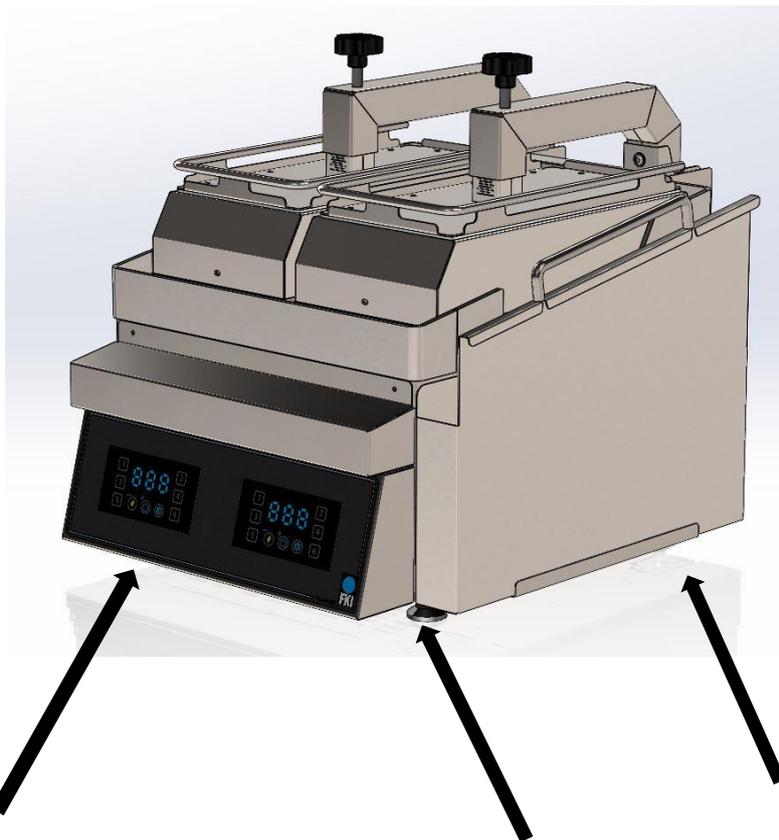
## 2.4 Transport/installation/fixation

### 2.4.1 Transport

The Clamshell Grill is delivered secured to a transport pallet and should only be transported in the same way if moved. During transportation both top pans must be lowered, as shown in the picture below.

Lifting points on the appliance are shown below and are for use when lifting it into place. Lift the appliance at the points under the appliance where machine feet are mounted. Always remove the grease trays before moving the appliance.

**WARNING: Never lift using the arms of the top pans. This applies during both installation and operation.**



Moving and setting up the appliance must be performed by two or more people  
RISK of injury!  
Wear protective gloves and safety footwear during unpacking and installation.  
Cut hazard.

## 2.4.2 Installation

Set up the Clamshell Grill on a counter or similar at a suitable working height (We recommend a counter height of 65 cm to achieve a working height of 90 cm).

The counter on which the Clamshell Grill is set up must be approved for the appliance's weight plus 25% and must not be able to tip over when using the appliance. The Clamshell Grill must be supported under all four legs.

Operation takes place from the front of the Clamshell Grill. For correct ventilation there must be free passage of air underneath and behind the appliance. The Clamshell Grill must be placed under an extraction hood or some other form of cooking fumes extraction. We do not recommend placing the CLAMSHELL GRILL next to a fryer.

The Clamshell Grill is supplied without a plug and must be connected by an authorised electrician. It is important that the cable is not bent or compressed during installation. Bend radius must not exceed 52mm when fitted.



The Clamshell Grill must be connected by an authorised electrician and connected to an RCCB circuit breaker.

See diagram for correct connection:



**WARNING: This appliance must be properly earthed. Failure to do so may cause electric shock and serious injury.**



The appliance must be acclimatised before use. It should therefore not be started up until eight hours have elapsed.



The power supply must be able to be disconnected, either by unplugging or by means of a freely accessible multi-pole switch located before the power outlet in accordance with applicable electricity regulations. The appliance must be grounded in accordance with national safety standards for electrical appliances.



Do not use extension cords or multi-socket outlets. After installation is completed there must be no direct access to the electrical components. Never touch the appliance if you are wet or have bare feet. Do not use this appliance if the power cord or plug is damaged, if the appliance is not working properly if it is damaged or if it has been dropped on the floor.



Any replacement of the power cord must be performed by an authorised technician to avoid the risk of personal injury – RISK of electric shock. Only use oil-resistant cables!

### 2.4.3 Fixation



The appliance does not need to be secured. It is equipped with adjustable legs to ensure stable and easy installation.

## 2.5 Operation



When the top pan closes, there is a risk of getting your hand trapped. Therefore, do not hold your hands above the frying surface when the top pans are lowered!

The appliance must be supervised during use and must be switched off at its main switch if left.



CLAMSHELL GRILL is intended for food preparation only. Do not apply liquids or other substances that have an ignition point below 300°C.

## 2.6 Cleaning/maintenance



**CLEANING AND MAINTENANCE WARNING:**

Do not use products that contain acid as they may damage the surface of the appliance.



Never use steam/foam cleaners due to RISK of electric shock.

## 2.7 Servicing



The appliance must always be switched off and disconnected from the power source before commencing repair work.

When removing the back plate/guard at the actuator and servicing the mechanical parts, there may be a risk of trapping, be careful with the moving parts.

## 2.8 Accessories



Teflon film: Only original FKI Fast Food Teknik a/s Teflon foil may be used on the CLAMSHELL GRILL. This foil must not be used on other appliances.

Teflon foil part number:

01-10104 – small top pan 9002/9003

01-10105 – large top pan 9001/9002

01-10103 – bottom 9001/9003

01-10102 – bottom 9002

## 3 Operation

### 3.1 Before first use



Before start-up, remove all packaging and protective plastic from the Clamshell Grill and dispose of it in accordance with currently applicable regulations (see section 8.1). Carefully read section 2 about safety before connecting the Clamshell Grill.



Before start-up, clean the appliance as shown in section 6.

### 3.2 Quick start instructions

Before start-up, read section 6.1 under “cleaning”. If you intend to use Teflon film, this should be fitted before start-up. (see section 2.8) To achieve the best frying results, we recommend that Teflon is used on the top pan. This will also make cleaning easier. Place the grease trays on either side of the Clamshell Grill.

The appliance must not be operated unattended.



Remember to use personal safety equipment, see 2.1

### 3.3 Start-up

The machine is switched on at the main switch located at the back of the machine.

### 3.4 Adjustment

The distance between the upper and lower pan should be adjusted to suit the thickness of the meat.

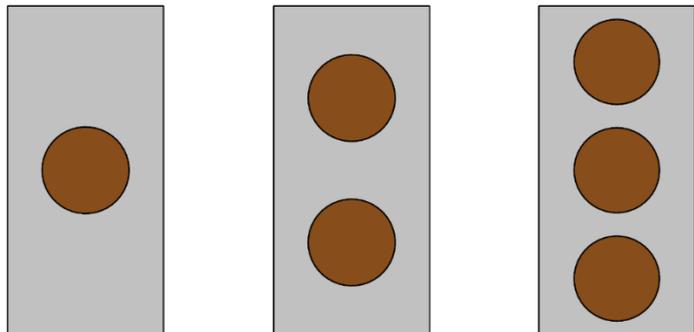
The distance is infinitely adjustable between 5 and 25 mm by turning the adjustment lever on top of the support arm at the top pan.

### 3.5 Frying

When frying, place the meat as far as possible in the centre of the top pan. If there is more than one piece of meat, place it "symmetrically" around the centre. This is to prevent the top pan from "tilting" and thus not making full contact with the upper side of the meat.

### 3.6 Steak positioning

For optimal steak frying, we recommend that they are positioned as shown in the pictures. If a different quantity of steaks is used, position them symmetrically starting from the centre of the frying zone.



## 4 Quick guide

### 4.1 Introduction

This quick guide describes how the user interface works.

### 4.2 Standby

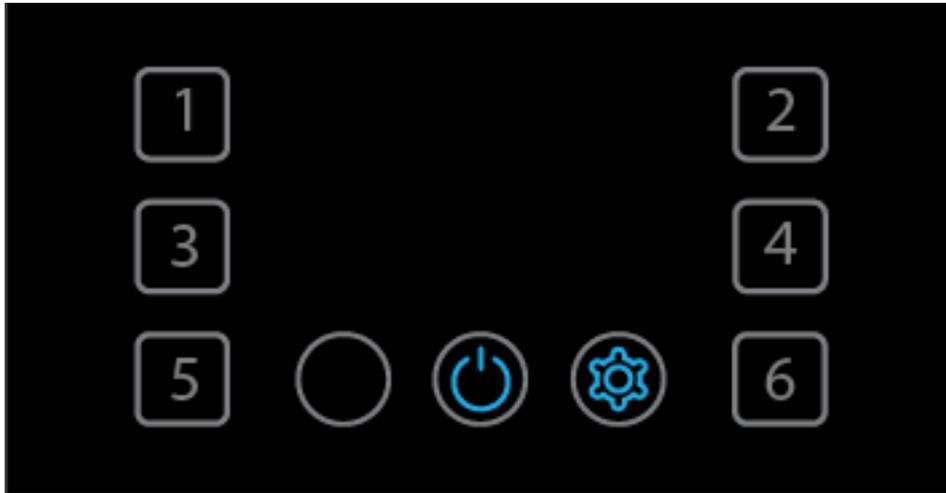


Figure 1, standby mode

When the appliance is switched on at the main switch, it is possible to

- start it by pressing , see section Active.
- Set up the appliance by pressing , see section Settings.

As long as the appliance is in standby, the heat is off and the pan is up.

### 4.3 Active

To start the appliance, press  when the appliance is in standby, see section Standby.

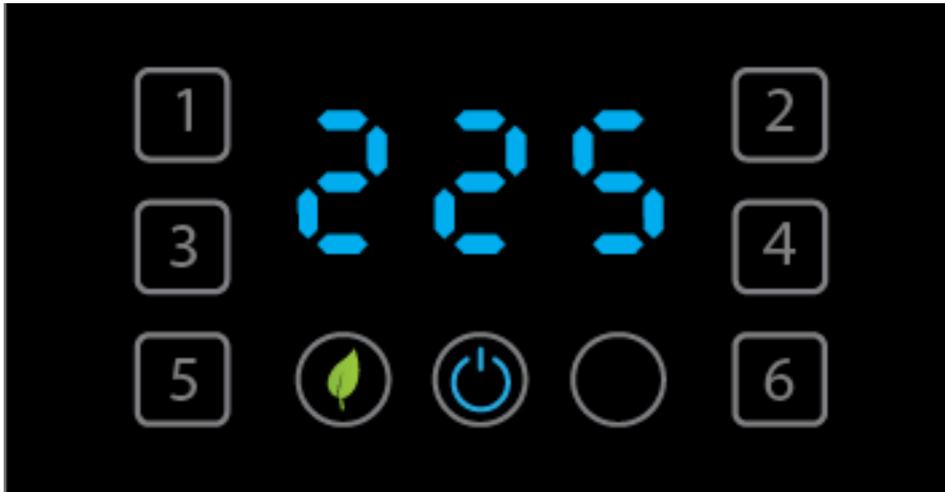


Figure 2, active mode showing the temperature setpoint for the bottom pan at 225°C.

When the appliance is active, the appliance will heat up and the temperature setpoint for the bottom pan will be displayed. For a brief display of the current temperature on the top and bottom pan, press . The appliance will then display a sequence with the current temperatures ("top," "top temperature," "bot," "bottom temperature"). This button will always show the current temperature as long as the appliance is active.

### 4.4 Select programme

When the appliance is active, it is possible to choose between programmes from one to six. When a programme is selected, the pan will go down at the same time as the countdown starts, see Figure 3.

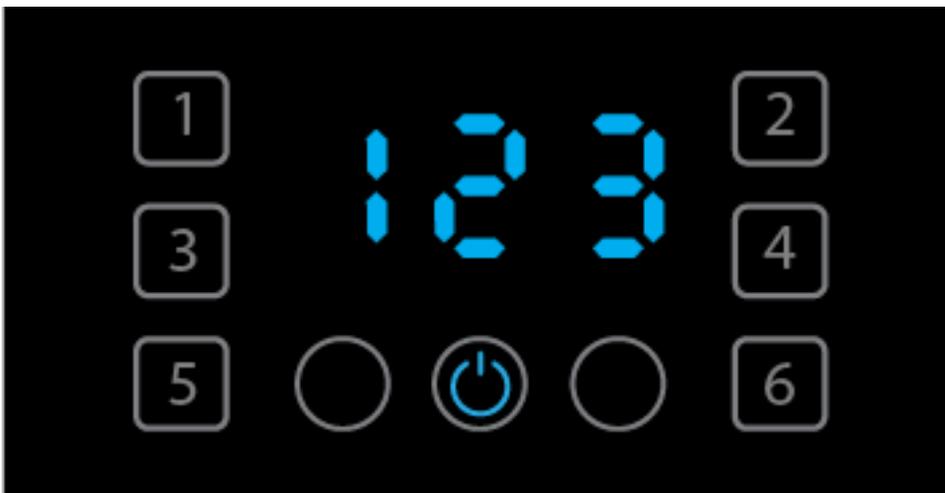


Figure 3, programme active. This shows the number of seconds left in the currently selected programme.

To interrupt a programme early, press any programme between one and six and the pan will open, and the appliance will return to active mode.

It is possible to put the appliance in standby mode while a programme is selected by pressing . This will cause the pan to rise and the heat to turn off.

If the programme is set to anything other than zero seconds, the programme will count down to zero. Then the pan will rise, and a buzzer will sound according to the settings. If the programme is set to zero, the programme will count up. It is important to note that the appliance does not monitor when a product is finished. This is up to the operator! To interrupt the programme, press any programme key from one to six.

#### 4.5 Select Eco mode

When the appliance is active, it is possible to choose between three different Eco programmes. 100%, 75% or 50% heat in relation to the temperature setpoint. To do this, press  until the desired mode appears, see Figure 4.

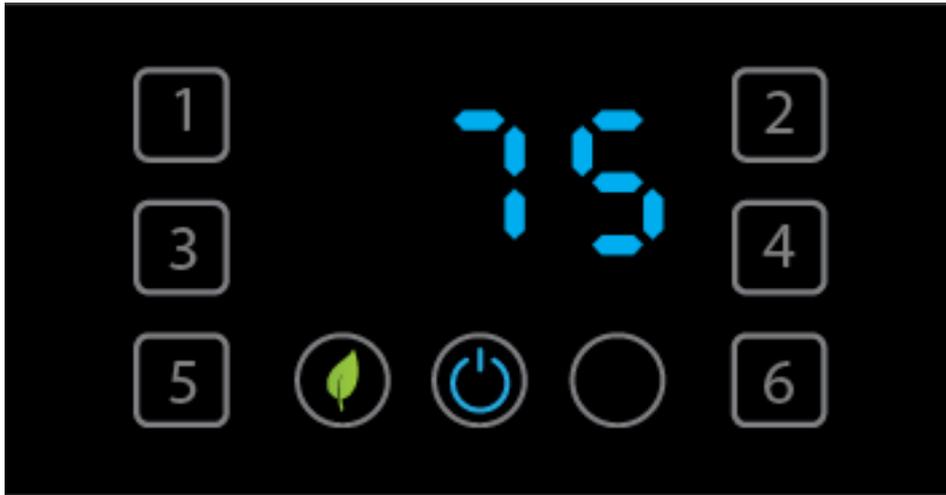


Figure 4, activation of eco mode by 75% relative to temperature setpoint.

As long as the button  is pressed repeatedly, the mode selector will switch between 100%, 75% and 50%. When you stop the pressures, the appliance will change to Eco mode, see Figure 5.

#### 4.6 Eco mode

After selecting Eco mode, see section Select Eco mode, the appliance will lower the temperature to the desired temperature setpoint by either 100%, 75% or 50%. Furthermore, the pan will drop down to minimise heat loss.



Figure 5, indicating that the appliance is in Eco mode.

When the appliance is in Eco mode, it is possible to cancel the mode by pressing , and the appliance will return to active mode. It is possible to put the appliance in standby mode by pressing . This will cause the pan to rise and the heat to turn off.

#### 4.7 Settings

Set the appliance by pressing  when the appliance is in standby, see section Standby.

Each time you press , it will be possible to change a new setting. Sequence of setting options are:

-  "toP" – Temperature of the top pan.
-  "bot" – Temperature of the bottom pan.
-  "vol" – Volume of the buzzer.
-  "dur" – Duration of how long the buzzer should sound after the end of the programme.
-  "Pro" – Duration of the programme time
-  "ver" – Software version
-  "rSt" – Return to factory settings

To exit the mode again, press , until the appliance has returned to standby, i.e. press one last time when "rSt" is displayed and the appliance will return to standby mode.

#### 4.8 Top pan

To see the current setting of the top pan, press either  or . Pressing more than once will change the temperature by five degrees. When pressing , the temperature will change downwards, but pressing  will change upwards. It is possible to set the top pan to a set point between 50 and 250°C.

Press , to move on to the next setting. If numbers are flashing, settings have been changed and saved in the appliance. If they are not flashing, the appliance has not registered any changes.

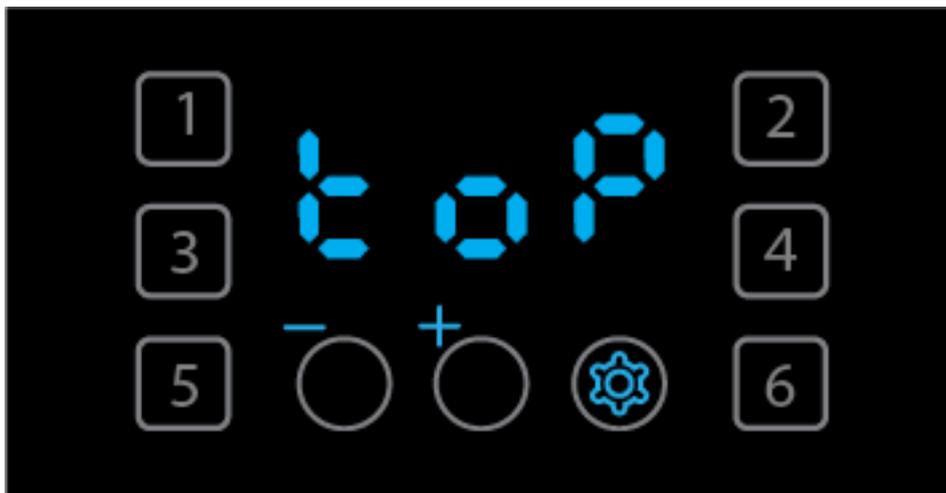


Figure 6, setting the top pan.

#### 4.9 Bottom pan

To see the current setting of the bottom pan, press either  or . Pressing more than once will change the temperature by five degrees. When pressing , the temperature will change downwards. Pressing  will change upwards. It is possible to set the bottom pan to a set point between 50 and 250°C.

Press , to move on to the next setting. If numbers are flashing, settings have been changed and saved in the appliance. If they are not flashing, the appliance has not registered any changes.

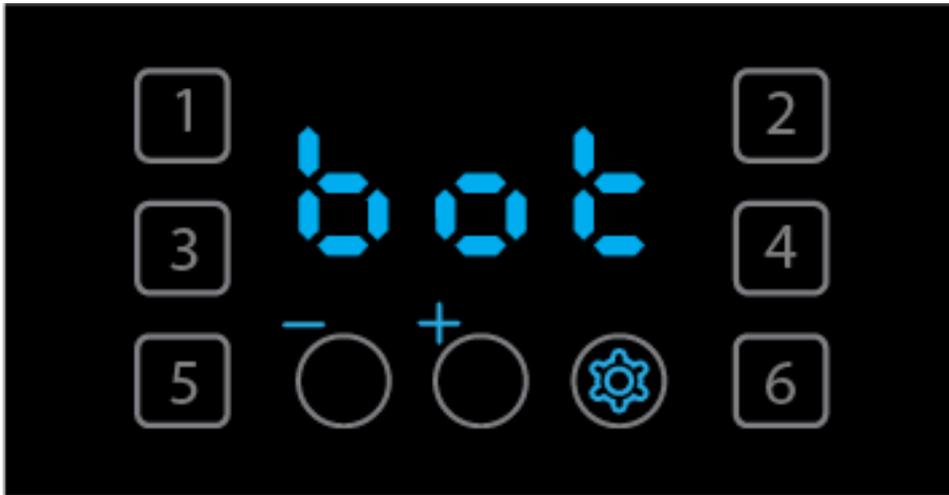


Figure 7, setting the bottom pan.

#### 4.10 Volume

To see the current setting of the volume, press either  or . Pressing more than once will change the volume by 10%. When pressing , the volume will change downwards. Pressing  will change upwards. It is possible to set the volume between 0% and 100%.

Press , to move on to the next setting. If numbers are flashing, settings have been changed and saved in the appliance. If they are not flashing, the appliance has not registered any changes.

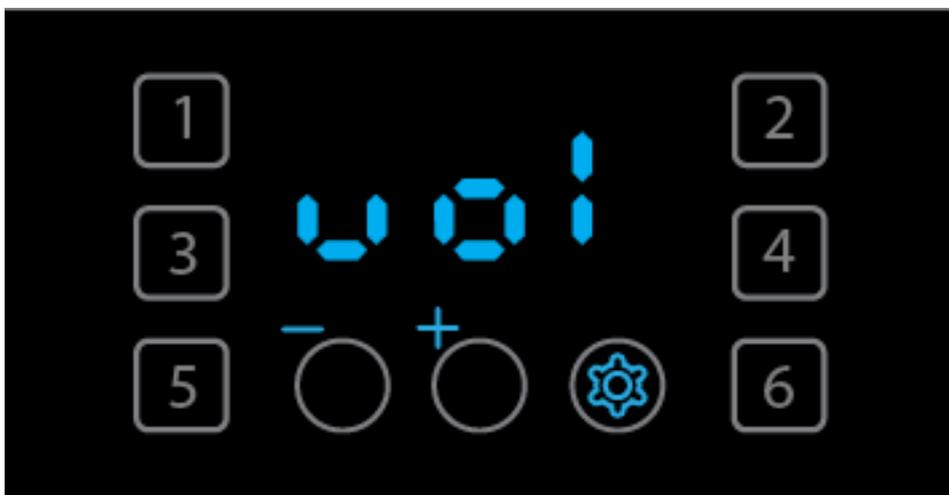


Figure 8, setting the buzzer volume.

#### 4.11 Duration of buzzer sound

To see the current setting of the duration of the buzzer sound, press either  or . Pressing more than once will change the volume by 1 second. When pressing , the duration will change downwards. Pressing  will change upwards. It is possible to set the duration between 0 and 10 seconds.

Press , to move on to the next setting. If numbers are flashing, settings have been changed and saved in the appliance. If they are not flashing, the appliance has not registered any changes.



Figure 9, setting the duration of the buzzer sound.

#### 4.12 The programmes

To see the current setting for a given programme, press the desired programme, 1 to 6. The time will be displayed in seconds, see Figure 11.

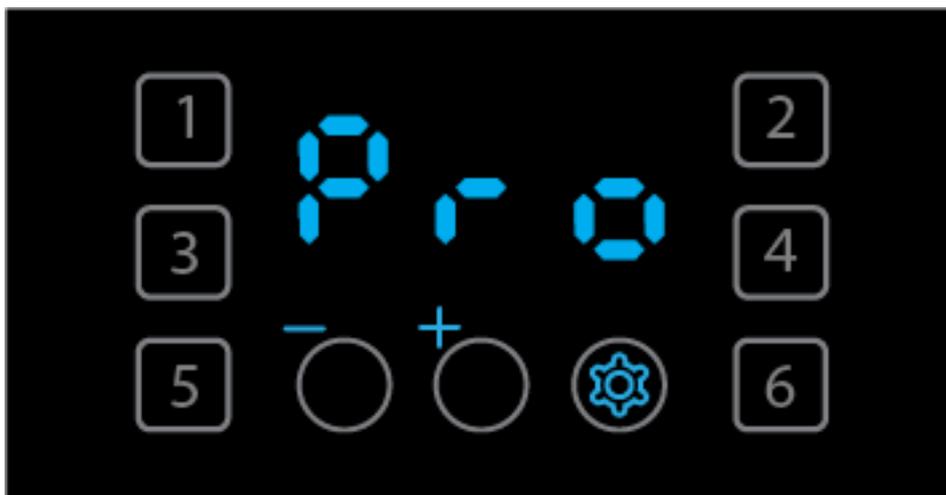


Figure 10, start view for programme settings.

When pressing , the duration will change downwards. Pressing  will change upwards. It is possible to set the duration between 0 and 700 seconds. The duration jumps by five seconds each time either up or down is pressed.

The changes only take effect when the setting is saved in a programme. This is achieved by holding down the relevant programme button for two seconds, after which the numbers will flash.

It is thus possible to copy a programme time from one programme button to another by pressing one programme button and then holding down another programme button for two seconds to save it in a new location. This will not have a practical application, but it can make work easier if, for example, you want a 160 seconds programme on one button and two other programmes of 150 and 170 seconds respectively. By

recalling the 160 seconds programme, you only need to press , twice to change the programme to 150 seconds. The same applies to 170, but with the use of .

If a programme is set to zero seconds, the programme will count up in active mode. This can be useful if new products are introduced and the optimal time is unknown. It can also be used if cooking products that do not always fit into the normal programmes.

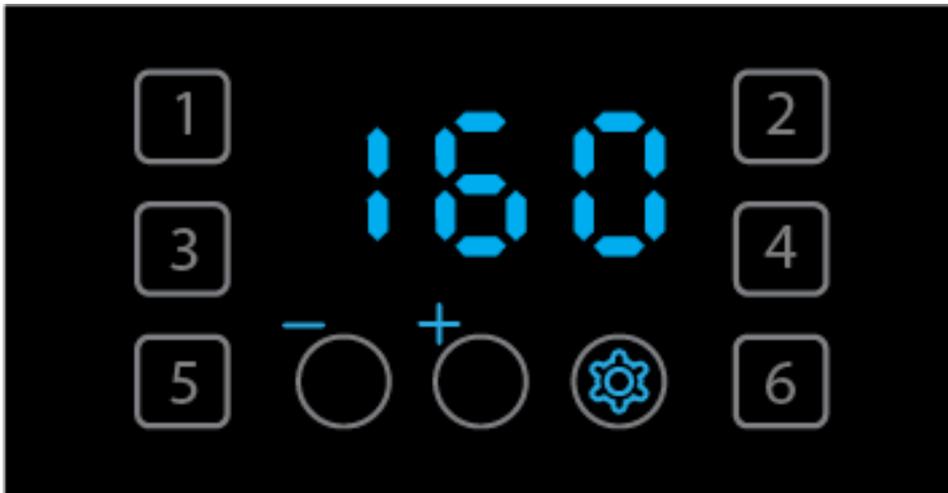


Figure 11, current setting in seconds.

Press , to move on to the next setting.

#### 4.13 Software version

This setting option is only for reading out the software version in connection with possible servicing. By pressing , the software version will be displayed. It consists of three numbers that can be written down and given to a technician on demand. The numbers will be repeated if pressed more than three times.



Figure 12, reading out the software version.

Press , to move on to the next setting.

#### 4.14 Factory settings

To restore factory settings, press  for five seconds. Now all settings will have reset.

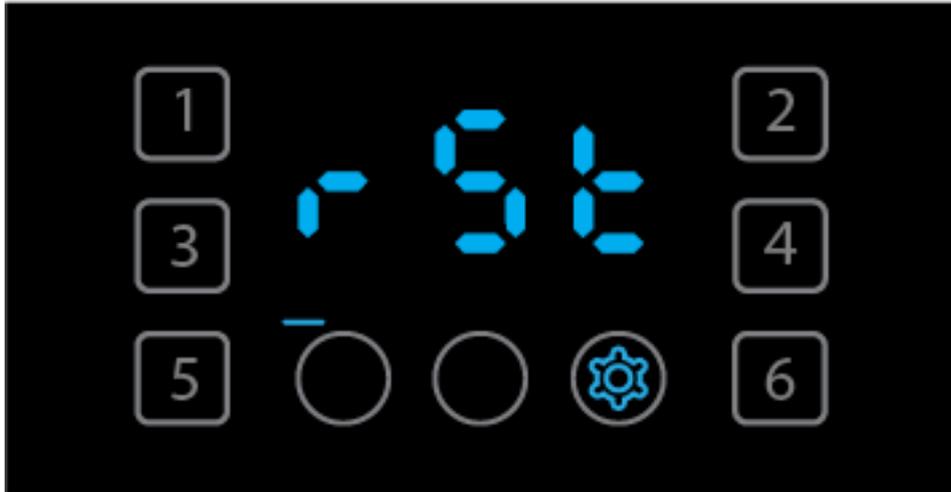


Figure 13, restoring factory settings.

Press  to exit the setting mode and return to standby mode.

## 4.15 Error codes

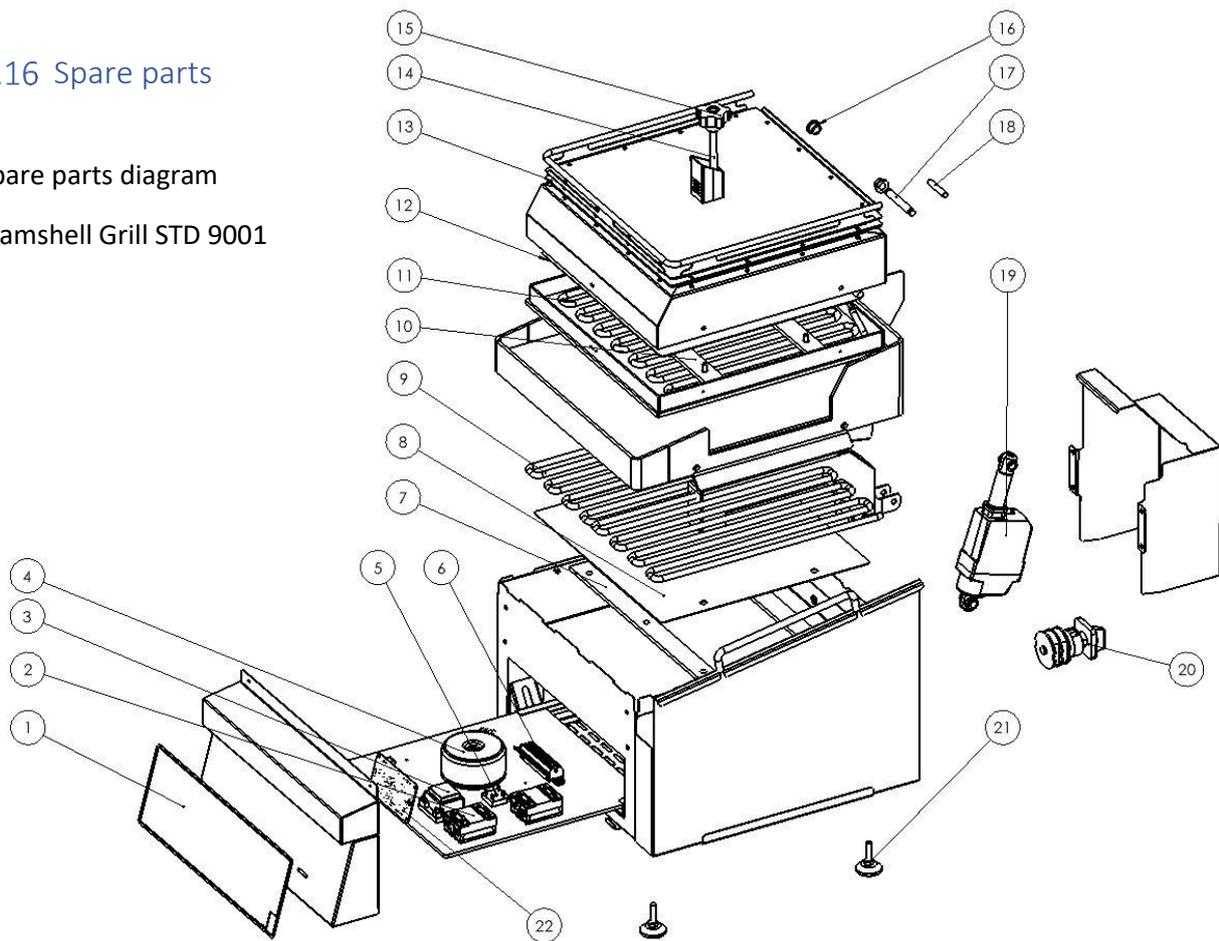
### Error code chart

<b>ERROR CODE</b>	<b>ERROR</b>	<b>CAUSE</b>	<b>REMEDY</b>
<b>E00</b>	Undefined error	Unknown	Contact service.
<b>E12</b>	Temperature sensor fault on top pan	The measured values are too low compared to those expected.	The surroundings are either too cold or the sensor is short-circuited. In the latter case, service must be contacted
<b>E13</b>	Temperature sensor fault on bottom pan	The measured values are too low compared to those expected.	The surroundings are either too cold or the sensor is short-circuited. In the latter case, service must be contacted
<b>E14</b>	Temperature sensor fault on top pan	The measured values are too high compared to those expected.	Sensor is not connected or is defective. Contact service.
<b>E15</b>	Temperature sensor fault on bottom pan	The measured values are too high compared to those expected.	Sensor is not connected or is defective. Contact service.
<b>E40</b>	Calibration errors	The calibration routine for temperature measurements has not been completed as expected.	Try restarting the appliance. If the error persists, contact service.
<b>E88</b>	Pan overheated	The solid state relay may have short-circuited.	Contact service.

## 4.16 Spare parts

Spare parts diagram

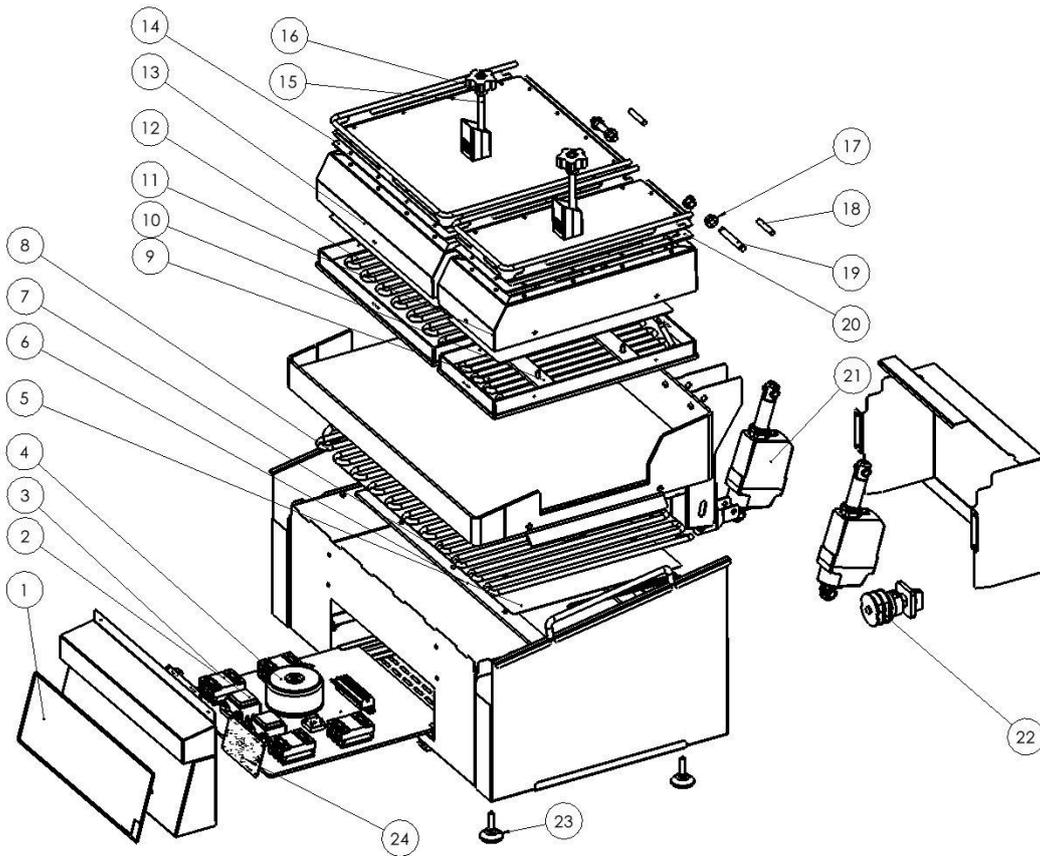
Clamshell Grill STD 9001



POS	ITEM NUMBER	QTY	DESCRIPTION
1	72-05529	1	FOIL FOR CLAMSHELL STD 9001
2	83-10316	2	SOLID STATE RELAY 50A
3	83-09056	1	TRANSFORMER 240V/12V 3VA
4	83-10016	1	TRAFO,RING-2x24/230V 120VA
5	83-07563	1	RECTIFIER GBPC25005-E4
6	83-07681	2	TERMINAL 12-POLET
7	83-09312	2	BRACKET GL9001 LOWER
8	83-09119	1	HEAT SHIELD GL8001/-2/9001/3 BOTTUM/BIG
9	Heat element and PT100 sensor	2	see component list under electrical diagram
10	83-09313	2	BRACKET GL9001 UPPER
11	Heat element and PT100 sensor	1	see component list under electrical diagram
12	83-10194	1	HEAT SHIELD GL9001/2 TOP
13	83-06091	1	BRACKET
14	83-10095	1	THREADED PIN M10X140
15	82-06540	1	HANDLE for Adjustment
16	83-08762	2	BEARING, bronce Ø10/15x10
17	78-00285	2	Ø10X70 BLANK
18	78-00284	1	Ø8X45 DIN 7 BLANK

19	83-10803	1	AKTUATOR LA23 SLAGL 110MM 1200N 24VDC
20	Switch	1	see component list under electrical diagram
21	82-06510	4	ADJUSTABLE LEG M8
22	72-07032	1	PRINT CLAMSHELL STD

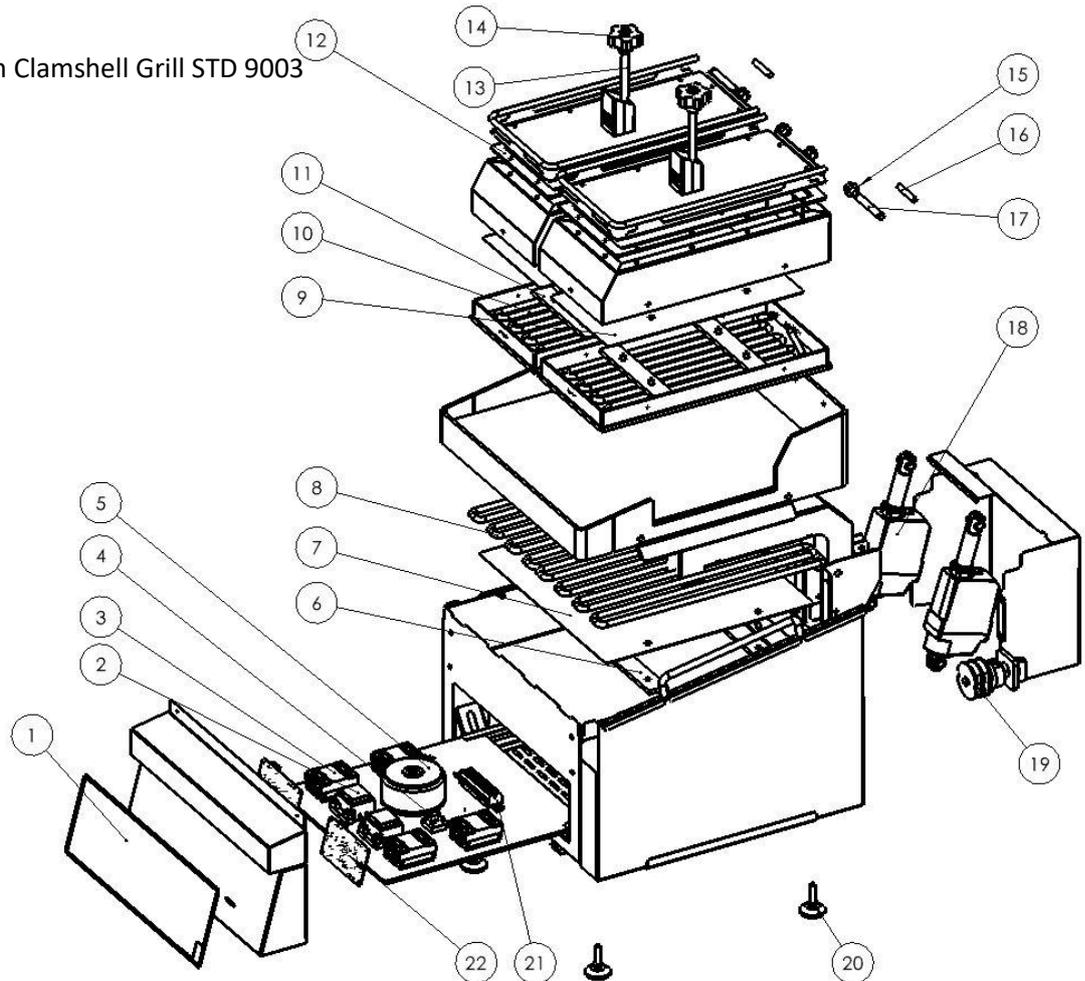
Spare parts diagram Clamshell Grill STD 9002



POS	ITEM NUMBER	QTY	DESCRIPTION
1	72-05528	1	FOIL FOR CLAMSHELL STD 9002/9003
2	83-09056	2	TRANSFORMER 240V/12V 3VA
3	83-10316	4	SOLID STATE RELAY 50A
4	83-10016	1	TRAFO,RING-2x24/230V 120VA
5	83-09210	1	HEAT SHIELD GL9002 BUTTOM
6	83-03499	2	BRACKET GL6036 / 6046 / 3060
7	Heat element and PT100 sensor	1	see component list under electrical diagram
8	Heat element and PT100 sensor	1	see component list under electrical diagram
9	Heat element and PT100 sensor	1	see component list under electrical diagram
10	83-09329	2	BRACKET GL8002 TOP/LITTLE
11	83-10195	1	HEAT SHIELD GL9002/3
12	Heat element and PT100 sensor	1	see component list under electrical diagram
13	83-10194	1	HEAT SHIELD GL9001/2 TOP
14	83-06091	1	BRACKET TOP, BIG PAN
15	83-10095	2	THREADED PIN M10X140
16	82-06540	2	HANDLE
17	83-08762	4	BEARING, bronze Ø10/15x10

18	78-00284	2	Ø8X45 DIN 7 BLANK
19	78-00285	4	Ø10X70 BLANK
20	83-06059	1	BRACKET LITTLE PAN
21	83-10803	2	AKTUATOR LA23 SLAGL 110MM 1200N 24VDC
22	Switch	1	see component list under electrical diagram
23	82-06510	4	ADJUSTABLE LEG M8
24	72-07032	2	PRINT CLAMSHELL STD

Spare parts diagram Clamshell Grill STD 9003



POS	ITEM NUMBER	QTY	DESCRIPTION
1	72-05528	1	FOIL FOR CLAMSHELL STD 9002/9003
2	83-09056	2	TRANSFORMER 240V/12V 3VA
3	83-10316	4	SOLID STATE RELAY 50A
4	83-07563	1	RECTIFIER GBPC25005-E4
5	83-10016	1	TRAFO,RING-2x24/230V 120VA
6	83-09312	2	BRACKET GL9001 LOWER/BIG
7	83-09119	1	HEAT SHIELD GL8001/-2/9001/3 LOWER/BIG
8	Heat element and PT100 sensor	2	see component list under electrical diagram
9	83-10195	2	HEAT SHIELD GL9002/3

10	Heat element and PT100 sensor	2	see component list under electrical diagram
11	83-09329	4	BRACKET GL8002 UPPER/LITLE
12	83-06059	2	BRACKET for SMALL PAN
13	83-10095	2	THREADED PIN M10X140
14	82-06540	2	HANDLE
15	83-08762	4	BEARING, bronze Ø10/15x10
16	78-00284	2	Ø8X45 DIN 7 BLANK
17	78-00285	4	Ø10X70 BLANK
18	83-10803	2	AKTUATOR LA23 SLAGL 110MM 1200N 24VDC
19	Switch	1	see component list under electrical diagram
20	82-06510	4	ADJUSTABLE LEG M8
21	83-07681	2	TERMINAL 12-POL
22	72-07032	2	PRINT CLAMSHELL STD

# 5 Wiring diagram

## 5.1 Component list

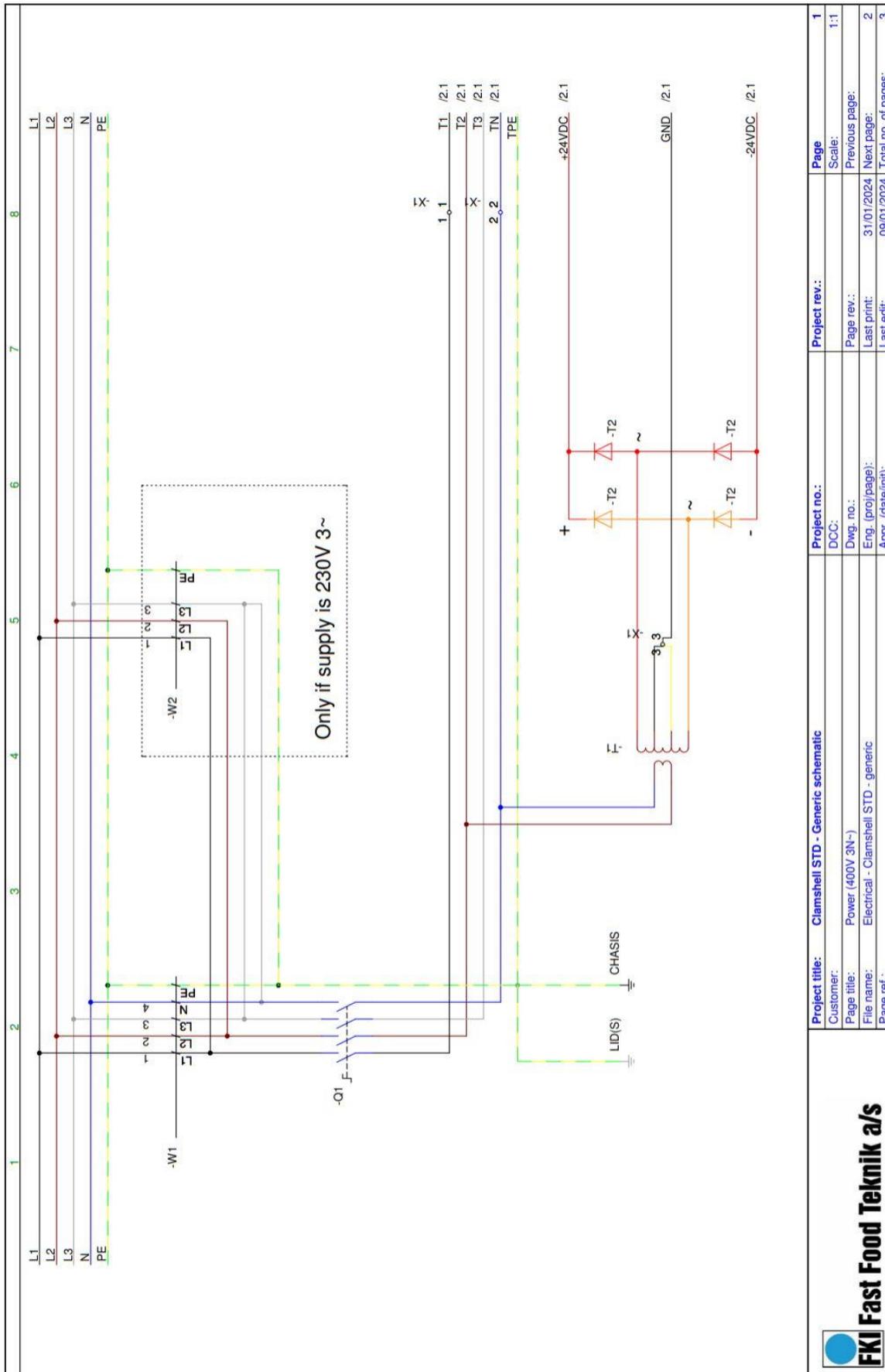
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### Clamshell STD

Function	9001 400V 3N~	9001 230V 3~	9002 400V 3N~	9002 230V 3~	9003 400V 3N~	9003 230V 3~
Control card	72-08011	72-08011	72-08011	72-08011	72-08011	72-08011
Control card	A1	A1	A1	A1	A1	A1
Heating Element	4,1kW (400V)	4,1kW (230V)	4,1kW (400V)	4,1kW (230V)	2,3kW (400V)	2,3kW (230V)
Heating Element	85-09220	85-09294	85-09320	85-09294	85-09321	85-09295
Heating Element	4,7kW (400V)	4,7kW (230V)	4,7kW (400V)	4,7kW (230V)	2,6kW (400V)	2,6kW (230V)
Heating Element	85-09322	85-09296	85-09322	85-09296	85-09323	85-09297
Heating Element	E3	E3	E3	E3	E3	E3
Heating Element	2,3kW (400V)	2,3kW (230V)	2,3kW (400V)	2,3kW (230V)	2,3kW (400V)	2,3kW (230V)
Heating Element	85-09321	85-09295	85-09321	85-09295	85-09321	85-09295
Heating Element	E4	E4	E4	E4	E4	E4
Heating Element	2,6kW (400V)	2,6kW (230V)	2,6kW (400V)	2,6kW (230V)	2,6kW (400V)	2,6kW (230V)
Heating Element	85-09323	85-09297	85-09323	85-09297	85-09323	85-09297
Motor	M1	M1	M1	M1	M1	M1
Motor	LA23 50MM	LA23 50MM	LA23 50MM	LA23 50MM	LA23 50MM	LA23 50MM
Motor	85-10365	85-10365	85-10365	85-10365	85-10365	85-10365
Motor	M2	M2	M2	M2	M2	M2
Motor	LA23 50MM	LA23 50MM	LA23 50MM	LA23 50MM	LA23 50MM	LA23 50MM
Motor	85-10365	85-10365	85-10365	85-10365	85-10365	85-10365
Main Switch	Q1	Q1	Q1	Q1	Q1	Q1
Main Switch	32A	50A	32A	50A	32A	50A
Main Switch	85-41012	85-41013	85-41012	85-41013	85-41012	85-41013
Latch contactor	Q2	Q2	Q2	Q2	Q2	Q2
Latch contactor	20-265V 50A	20-265V 50A	20-265V 50A	20-265V 50A	20-265V 50A	20-265V 50A
Latch contactor	85-10316	85-10316	85-10316	85-10316	85-10316	85-10316
Latch contactor	Q3	Q3	Q3	Q3	Q3	Q3
Latch contactor	20-265V 50A	20-265V 50A	20-265V 50A	20-265V 50A	20-265V 50A	20-265V 50A
Latch contactor	85-10316	85-10316	85-10316	85-10316	85-10316	85-10316
Latch contactor	Q4	Q4	Q4	Q4	Q4	Q4
Latch contactor	20-265V 50A	20-265V 50A	20-265V 50A	20-265V 50A	20-265V 50A	20-265V 50A
Latch contactor	85-10316	85-10316	85-10316	85-10316	85-10316	85-10316
Latch contactor	Q5	Q5	Q5	Q5	Q5	Q5
Latch contactor	20-265V 50A	20-265V 50A	20-265V 50A	20-265V 50A	20-265V 50A	20-265V 50A
Latch contactor	85-10316	85-10316	85-10316	85-10316	85-10316	85-10316
PT100 sensor	R1	R1	R1	R1	R1	R1
PT100 sensor	Ø6 x 60 mm	Ø6 x 60 mm	Ø6 x 60 mm	Ø6 x 60 mm	Ø6 x 60 mm	Ø6 x 60 mm
PT100 sensor	83-09057	83-09057	83-09057	83-09057	83-09057	83-09057
PT100 sensor	R2	R2	R2	R2	R2	R2
PT100 sensor	Ø6 x 220 mm	Ø6 x 220 mm	Ø6 x 220 mm	Ø6 x 220 mm	Ø6 x 220 mm	Ø6 x 220 mm
PT100 sensor	85-09057	85-09057	85-09057	85-09057	85-09057	85-09057
PT100 sensor	R3	R3	R3	R3	R3	R3
PT100 sensor	Ø6 x 60 mm	Ø6 x 60 mm	Ø6 x 60 mm	Ø6 x 60 mm	Ø6 x 60 mm	Ø6 x 60 mm
PT100 sensor	83-09057	83-09057	83-09057	83-09057	83-09057	83-09057
PT100 sensor	R4	R4	R4	R4	R4	R4
PT100 sensor	Ø6 x 220 mm	Ø6 x 220 mm	Ø6 x 220 mm	Ø6 x 220 mm	Ø6 x 220 mm	Ø6 x 220 mm
PT100 sensor	85-09998	85-09998	85-09998	85-09998	85-09998	85-09998
Transformer	T1	T1	T1	T1	T1	T1
Transformer	230V -> 2x24V	230V -> 2x24V	230V -> 2x24V	230V -> 2x24V	230V -> 2x24V	230V -> 2x24V
Transformer	83-10016	83-10016	83-10016	83-10016	83-10016	83-10016
Rectifier	T2	T2	T2	T2	T2	T2
Rectifier	83-07563	83-07563	83-07563	83-07563	83-07563	83-07563
Transformer	T3	T3	T3	T3	T3	T3
Transformer	230V -> 1x12V	230V -> 1x12V	230V -> 1x12V	230V -> 1x12V	230V -> 1x12V	230V -> 1x12V
Transformer	85-09056	85-09056	85-09056	85-09056	85-09056	85-09056
Transformer	T4	T4	T4	T4	T4	T4
Transformer	230V -> 1x12V	230V -> 1x12V	230V -> 1x12V	230V -> 1x12V	230V -> 1x12V	230V -> 1x12V
Transformer	85-09056	85-09056	85-09056	85-09056	85-09056	85-09056
Supply cable	W1	W1	W1	W1	W1	W1
Supply cable	5G2.5 / 2.2m	5G2.5 / 2.2m	5G2.5 / 2.2m	5G2.5 / 2.2m	5G2.5 / 2.2m	5G2.5 / 2.2m
Supply cable	72-03674	72-03674	72-03674	72-03674	72-03674	72-03674
Supply cable	W2	W2	W2	W2	W2	W2
Supply cable	4G4.0 / 2.2m	4G4.0 / 2.2m	4G4.0 / 2.2m	4G4.0 / 2.2m	4G4.0 / 2.2m	4G4.0 / 2.2m
Supply cable	72-03526	72-03526	72-03526	72-03526	72-03526	72-03526
Terminal	X1	X1	X1	X1	X1	X1
Terminal	4 pole	4 pole	4 pole	4 pole	4 pole	4 pole
Terminal	85-07680	85-07680	85-07680	85-07680	85-07680	85-07680
Terminal	X2	X2	X2	X2	X2	X2
Terminal	12 pole	12 pole	12 pole	12 pole	12 pole	12 pole
Terminal	85-07681	85-07681	85-07681	85-07681	85-07681	85-07681

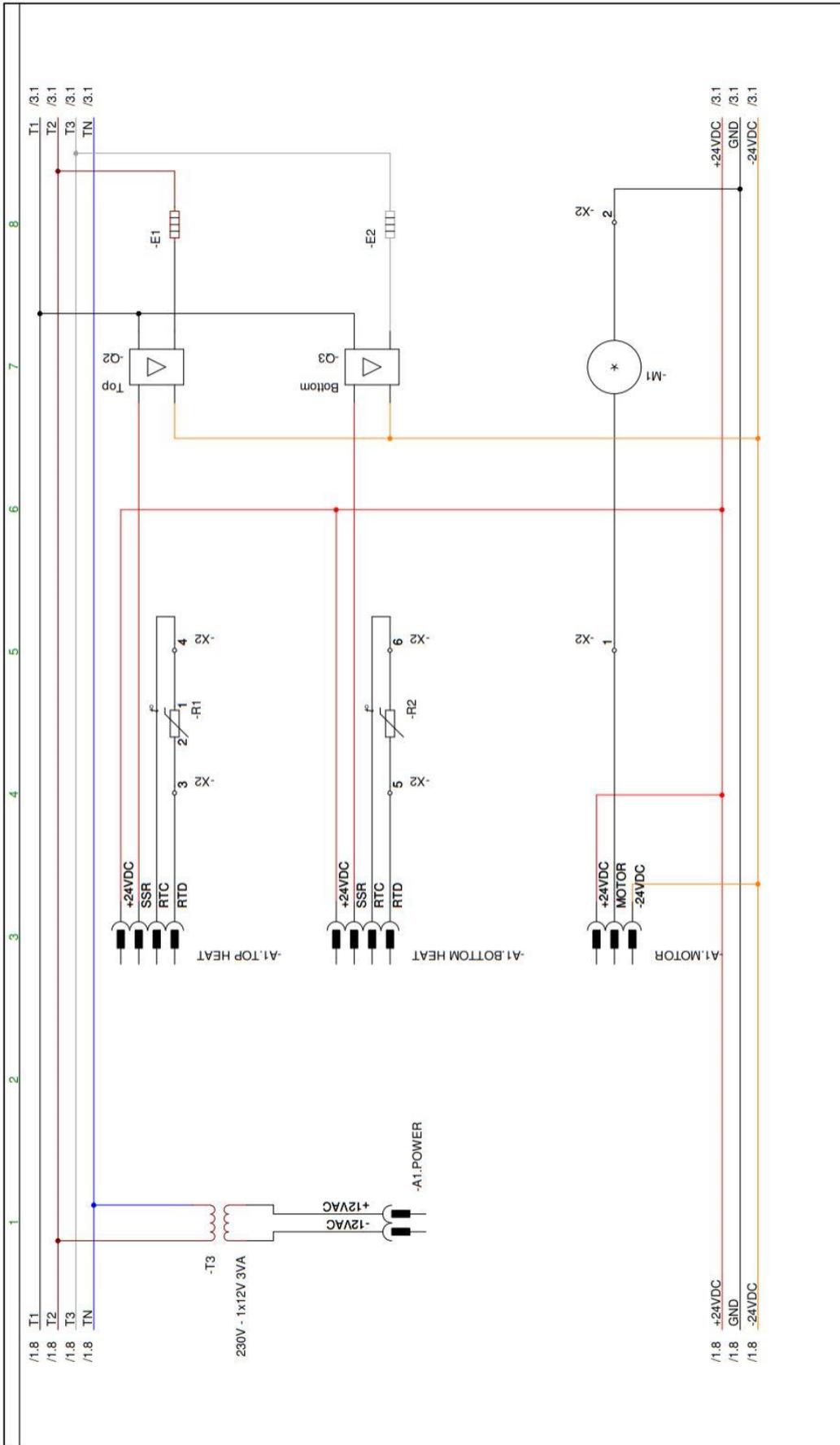
Plugs per Control Card	Component	Part no.
Power Supply	POWER	72-07039
SSR and PT100	..BOTTOM HEAT	72-07038
SSR and PT100	..TOP HEAT	72-07038
Motor	..MOTOR	72-07037

## 5.2 Electrical diagram



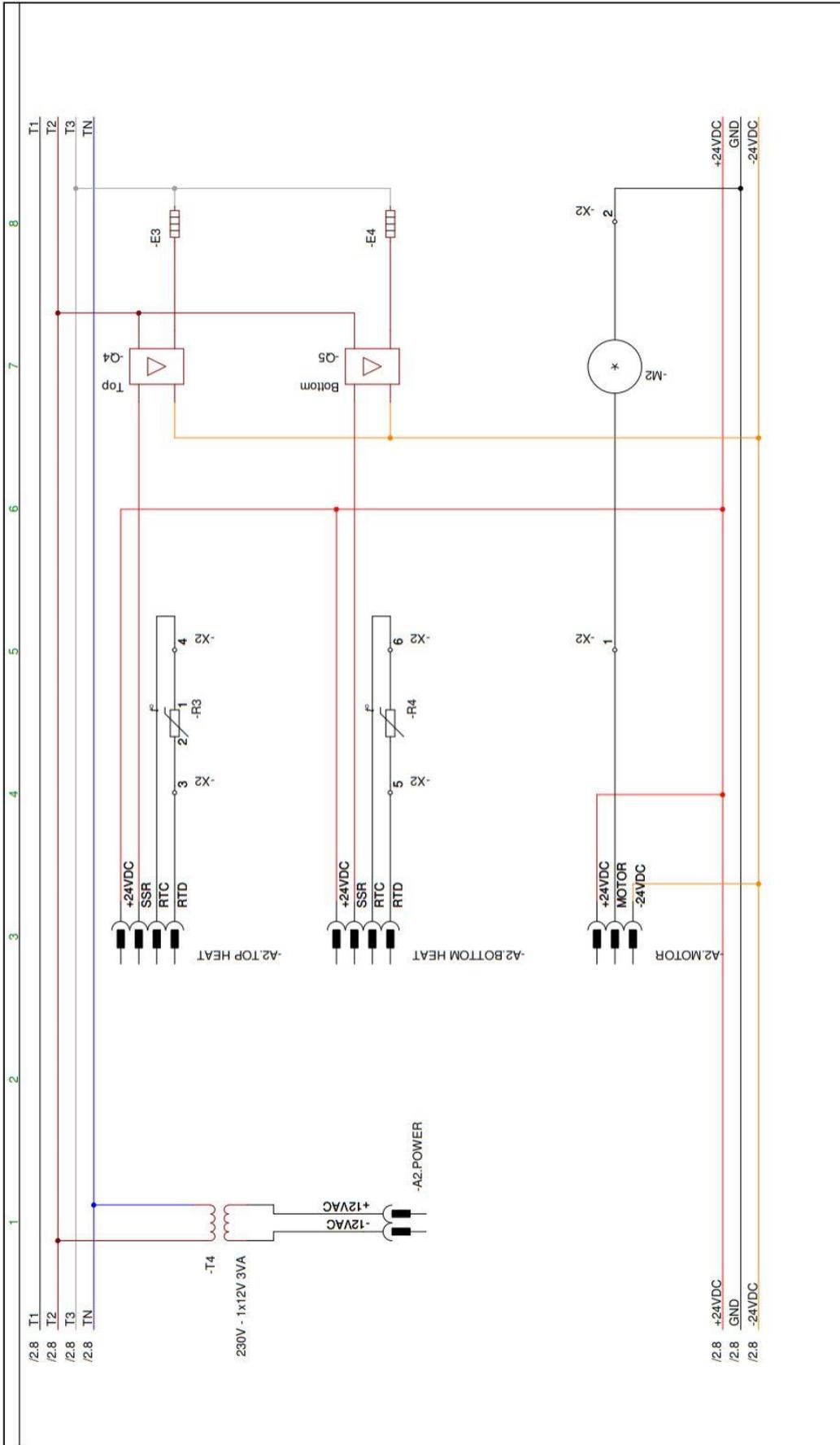
<b>Project title:</b> Clamshell STD - Generic schematic	<b>Project no.:</b>	<b>Project rev.:</b>	<b>Page</b>
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<b>Page title:</b> Electrical - Clamshell STD - generic	<b>Dwg. no.:</b>	<b>Page rev.:</b>	<b>1:1</b>
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<b>Project title:</b> Clamshell STD - Generic schematic		<b>Project no.:</b>	<b>Page</b>
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<b>Page title:</b> Left / Single		Dwg. no.:	1:1
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<b>Project title:</b> Clamshell STD - Generic schematic	<b>Project no.:</b>	<b>Project rev.:</b>	<b>Page</b>
Customer:	DCC:		Scale:
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File name: Electrical - Clamshell STD - generic	Eng. (proj/page):	Last print:	Previous page:
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			31/01/2024
			Total no. of pages:
			3



## 6 Cleaning

### 6.1 General

Before using the appliance for the first time, wipe all surfaces that will be in contact with food with a damp cloth. Do not use cleaning products that contain acid.

### 6.2 Cleaning during operation

After each fry, first scrape the top pans and then scrap all grease from the bottom pan into the grease trays. Empty grease trays as required. NB! Remember that the oil/grease you are emptying during this operation is very hot!

NB! Remember to use the correct scraper, depending on whether the pans are coated with Teflon foil or the Clamshell Grill is used without Teflon.



Remember to use personal safety equipment, see 2.1

### 6.3 Daily cleaning



Remember to use safety equipment.

1. If the Clamshell Grill is fitted with Teflon, disassemble it (see section 3.3) and wash with a mild acid-free cleaner.
2. First, clean the pans with a scraper to remove all loose particles.
3. After cleaning the pan, turn off the appliance. After it has cooled down, wipe it with a damp cloth and mild acid-free cleaner.
4. Empty the grease tray and wash it.
5. The Teflon foil can then be put back into place.

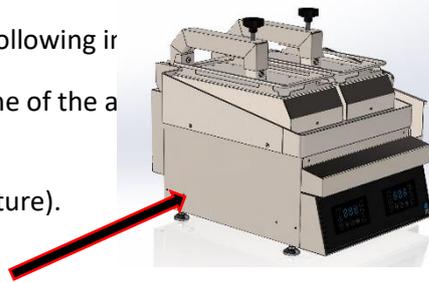
## 7 Service

Find out if it is possible to correct the fault by following the instructions in the troubleshooting chart. If not, contact your dealer or [www.fki.dk](http://www.fki.dk) for assistance.

When contacting service for assistance, please have the following information:

- Sequential serial number located on the side of the appliance
- Type and model name are in the same position.

The machine plate is on the side of the appliance (see picture).

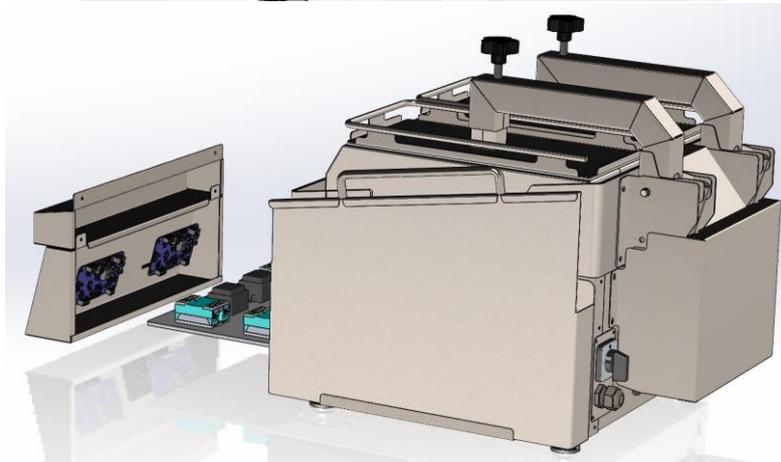
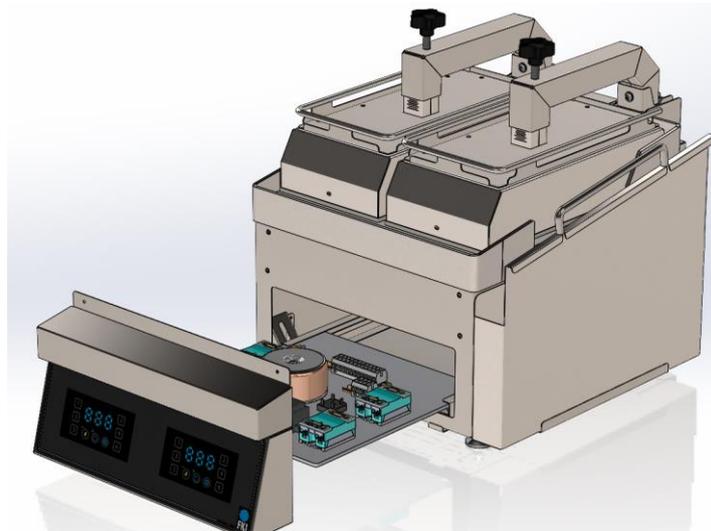


The appliance must always be switched off and disconnected from the power source before commencing repair work.

To make it easy to service a CLAMSHELL GRILL, most electrical parts are mounted in a drawer system that can be pulled out at the front. For access, remove two screws under the front section, which will allow the drawer to be pulled out.



When removing the back plate/guard at the actuator and servicing the mechanical parts, there may be a risk of trapping, be careful with the moving parts.



After completing service work on CLAMSHELL GRILL, check and reattach all cables, making sure that they are are secured and will not be trapped by the moving parts. Similarly, the wires attached to the electrical component plate are secured when the plate is gently pushed back into place and the front cabinet is reinstalled.

## 8 Disposal

### 8.1 Packaging

The packaging should not be left in the environment but should be disposed of in accordance with local regulations.

### 8.2 When the appliance is no longer required

CLAMSHELL GRILL is labelled with a recycling symbol in accordance with Executive Order 148 of 8 February 2018 (Electronic Waste Executive Order/Elektronikaffaldsbekendtgørelsen). WEEE2 directive 2012/19/EU

This means that you must dispose of it in accordance with your municipality's regulations, e.g. in a container set up for this purpose at the municipality's recycling centre when the appliance is worn out.



## 9 EU DECLARATION OF CONFORMITY



EU DoC ID: FKI 001  
Verninge, 5. februar 2024

# EU DECLARATION OF CONFORMITY

We FKI Fast Food Teknik a/s declares under our sole responsibility that the product Clamshell Grill STD with

Type Code.:  
**SCS-24**

are in conformity with the following directive(s), standard(s) or other normative document(s), provided that the products are used in accordance with our instructions.

Directives	Standards
Machine Directive 2006/42/EC	EN/ISO 12100:2010 EN 60335-1:2012 + AC:2014 + A11:2014 EN 60335-2-38:2003 + A1:2008 EN/IEC 60204-1:2005 (partly) EN/IEC 60204-1:2005/A1:2008 (partly)
Electromagnetic Compatibility Directive 2014/30/EU	EN 55014-1:2006 + A1:2009 + A2:2011 EN 55014-2:1997 + A1:2001 + A2:2008
WEEE Directive 2012/19/EU RoHS Directive 2011/65/EU	
Regulations	Standards
Food Contact Materials 1935/2004 Good Manufacturing Practice 2023/2006	N/A

Date 5/2-2024	Issued by  Søren Poulsen - Managing Director
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FKI Fast Food Teknik a/s only vouches for the correctness of the English version of this declaration. In the event of the declaration being translated into any other language, the translator concerned shall be liable for the correctness of the translation.

Byghøjvej 5 · Verninge · DK-5690 Tommerup  
Tel. +45 64 75 10 66 · Fax +45 64 75 10 88 · CVR no. 1472 8287 · www.fki.dk



**FKI Fast Food Teknik a/s**

Byghøjvej 5 · Verringe · DK-5690 Tommerup · Denmark · Tel. +45 6475 1066 · [info@fki.dk](mailto:info@fki.dk) ·