

**GENERAL INSTRUCTIONS FOR THE
INSTALLATION, USE, APPLICATION AND
MAINTENANCE.**



BLAST CHILLER / SOCK FREEZER

**MODELS: ATM – 101
 ATM – 102**



We are grateful for the deference and the confidence that you had with our trademark by purchasing a professional use machine. We are completely sure that as the time pass you will get fully satisfied with your buying.

Read this manual for the installation, use and maintenance of the same, because it will be for a great help when you know in detail the function of the machine, to get the features that you need with optimum results.

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1. INSTALLATION

1.1. – FEATURES GENERAL CHART

BLAST CHILLER / SHOCK FREEZER



Made of stainless steel AISI – 304 18/10.
 Adjustable legs in stainless steel. AISI – 304 18/10.
 Sliding guides for Gastronorm trays and Euronorm trays 60*40 cm.
 Doors with automatic locking device.
 Blast chiller designed to reduce the temperature from + 70 C° to + 3 C°
 Shock freezer designed to reduce from +20 C° to –18 C°
 Chiller programmes HARD or SHOFT
 - chilling 90 minutes.
 - freezing 270 minutes
 Electronic timer and temperature probe standard

Blast chilling options controlled by TIMER or PROBE.
 If is working as blast chiller at end of cycle keep as chill or refrigerator of +2/+4 C°
 If is working as blast freezer at end of cycle keep as freezer –18 C°
 Removable, ventilated airtight compressor
 Cooling system by R – 404 A free CFC.
 Insulation injected polyurethane 60 mm thick. Density 40 kg/m3 no CFC.
 Copper evaporator with aluminium fins.
 Forced draught.
 Automatic evaporation of water during defrosting.
 Voltage 400 V 3+N 50/60 Hz.

Models	GN 1/1	GN 2/1	Capacity	Consumption	Dimensions		
			60*40	W	Large	Deep	Tall
ATM - 101	10		10	2830	790	815	1450
ATM - 102	20	10	10	4130	1095	890	1450

1.2. – PRODUCTIONS

Is not easy to give a piece of information because it depends on the type of product , the variation is very important. Depending on several factors and according to the dates elaborates by the competitors it consist to guide the user with a very homogeneous product and standard in the international cooking.

Select the product: Mashed potatoes putted in GN 1/1 tray with 40 mm of deepness. Fill it up with product 28 mm of thickness and we will reach the next information:

BLAST CHILLER: Reduce the temperature from 70° C to 3° C in 90 minutes.

Model	Capacity kg
ATM - 101	33
ATM - 102	70

SHOCK FREEZER: Designed to reduce from 70° C to –18° C in 240 minutes.

Model	Capacity kg
ATM - 101	23
ATM - 102	50

1.3. – EMPLACEMENT

It has four adjustable legs to level the machine according to the irregularities of the situation place.

1.4. – CONNECTIONS

Professionals would do the installation of the internal drainage of the chamber. This drainage drains to a Gastronorm tray on its lower part.

1.5. – ELECTRIC CONNECTION

Electric connection by means of a cable with euro connector.

It is advisable to connect a magneto thermic differential switch of high sensibility 30 m A.

All the Blast chiller / Shock freezers should be installed by professional technicians whit knowledge's of electric installations and freezing.

1.6. – RECOMMENDATIONS OF OTHER CONNECTIONS

The internal drainage of the chamber is collected by a GN tray above guides in the lower part.

If you want to place a fixed location and definitive it can be connected to a general drainage. This operation must be done by qualified staff.

IMPORTANT: Put the cap of the internal drainage.

2. USE

2.1. – AMBIENT CONDITIONS

Room temperature.-

The information about the production had been realized in a technical laboratory with the next conditions:

- 32° C in the local.
- 75% of relative humidity.

Noise level to a 1 metre of distance on maximum conditions of compressor and fan evaporators < 120 db on the starting.

Noise level to a 1 metre of distance only when the fan evaporators are working < 75 db.

2.2. – CONSTRUCTIVE FEATURES

- Chamber inside made of stainless steel AISI 304 18/10.
- Outer panels made of stainless steel AISI 304 18/10.
- Aluminium - cooper Evaporator with anticorrosive painting.
- Fans.
- Freeze liquid R – 404 A ECOLOGICAL free of CFC.

2.3. - USE

These machines had been built according to the CE guidelines relating to the foods treatment and conservation.

The use of the blast chiller / shock freezer consist in reduce the temperature sharply from one level (cooking or fresh products) to another level that guarantee us the maintenance of the nutritional properties, physical and chemistries optimum of the foods.

It is advisable to mention that the critic strip of temperature between 10° C y 85° C must stop in the minimum possible time.

With the objective of guarantee this, the blast chiller must be realized in a cooking food of 70° C and we must achieve in 90 minutes reach 3° C. These FOOD can be keep in a fridge for a period of 5 days.

The shock freezer consist on achieve -18° C in a period of 240 minutes, setting from a cooking temperature of 70° C and we can keep it for two months..

If we have a fresh product and we apply the blast period, we could keep that food for 12 months.

Conservation cycle:

When the blast chiller / shock freezer cycle has been finished the machine can pass to a conservation cycle, if this has been selected, and the machine will work as a normal fridge. The user can adjust the temperature of this cycle.

2.4. – STORE PROCESS

During the blast chiller / shock freezer cycle :

- Do not open the door until it has finish.
- Do not wrap the product or close the trays.
- Do not use trays or pans of more height than 65 mm .
- Do not put the product one over one, it is advisable to do portions.
- It is advisable to use recipients of stainless steel or aluminium.

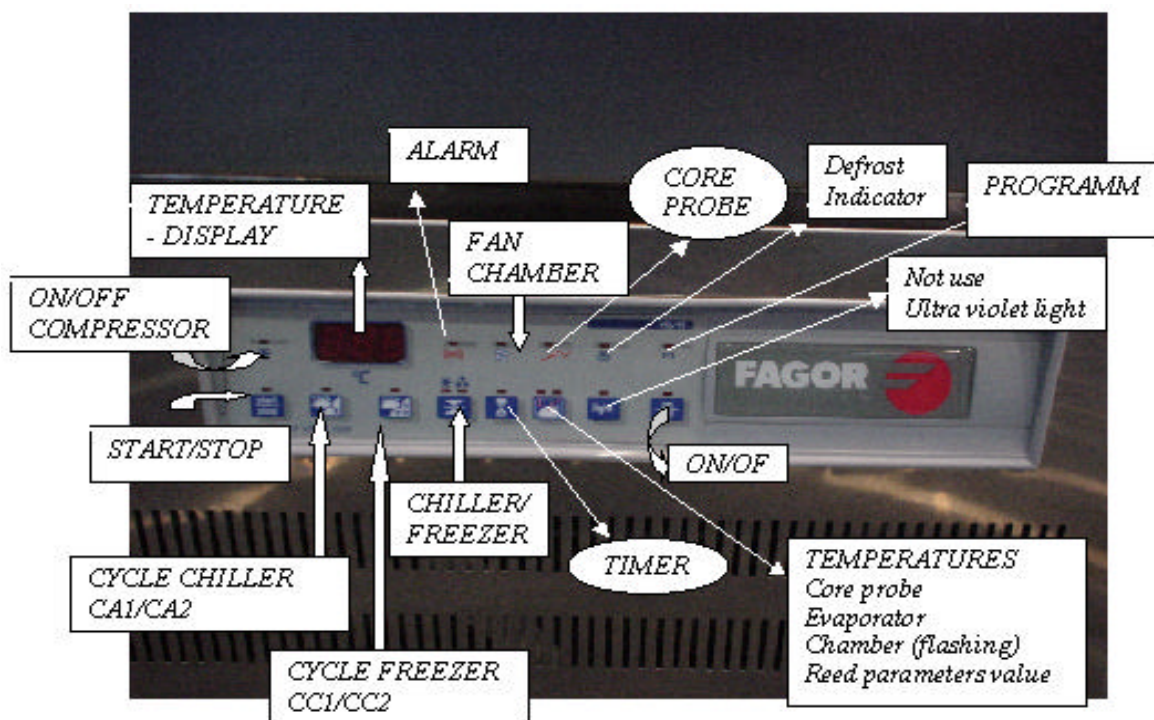
During the conservation cycle:

- It is advisable to do not put hot products.
- The product should go on portions cooked on vacuum packed to maintain aromas, freshness... and make easier its regeneration.
- Put the product where the air can run.
- Do not put on the grills elements that block the air running.
- Minimize the door openings and handling times.

2.5. – WARNINGS

- Do not hang form the door, the machines stability is guaranteed with the door opened.
- Do not put sharp elements trough the protecting shelf of the chamber fans.
- Do not remove the frontal and rear panel if the machine has not been disconnected.
- On the blast chiller circuit, can be areas of high temperature, be careful with the freezing circuit.
- The installation must be done with a differential magneto on the entrance of the electric connection.
- The liquids from the foods or from the cleaning products, to avoid then go out, it has been putted a water receiver on the bottom of the machine
- IS VERY IMPORTANT TO PUT THE CAP OF THE INTERNAL DRAINAGE.

2.6. – CONTROL PANEL



▶ **ON/OFF PUSH BUTTON OR DOWN (bi function):**

It connects electrically the CONTROL. It will be a delay of a second between the pushing and the display when it turns off: the timer will get on zero and the alarms will turn off.

The DOWN function is used to adjust the parameters in the programming.

It has a light switch LED, and it indicates that the control has tension.

▶ **ULTRA VIOLET LIGHT PUSH BUTTON (optional) OR UP (bi functional):**

It is a OPTIONAL light that is used to eliminate germs or to the sterilization. The key is activated if the machine is on STOP position.

The UP function is used to adjust the parameters.

▶ **CHAMBER / CORE PUSH BUTTON:**

Pushing it we can see the temperature inside the chamber or the temperature of the core. If we push it for more than three seconds, we could see the temperature of the evaporator. When we let go of the button, it will indicate the temperature each ten seconds depending on the positioning LED. On PROGRAMMING it will visualize the parameter of its value. On programming usually this operation is not incorporated to the blast chiller / shock freezer.

▶ **TIME PUSH BUTTON (CLOCK):**

It is selected by pushing that the blast chiller / shock freezer works by time. It is activated AUTOMATICALLY if it recognizes that the core probe is not localized on the product.

If it is working on TIME function, the digital display shows the TIME REMAINING to the end of the phase.

When it is working on time it shows us the time remaining to the end of the phase. If we push it again it will indicate us the time that has pass since the beginning.

We can see that:

- Blast chiller: time remaining + pass time = 90 minutes.
- Shock freezer: time remaining+ pass time = 240 minutes.

▶ **TYPE OF CYCLE SWITCH PUSH BUTTON:**

When we push it we pass from the blast chiller / shock freezer select: CHILLING and FREEZING.

With the START / STOP command we can visualize if the phase is on STOP.

If it is on START it indicates the selected cycle that is carrying out.

▶ **SHOCK FREEZER PUSH BUTTON: * * ***

On STOP, if it is pushed more than two seconds it is possible to select the shock freezer cycle and when we let go of we could visualize the cycle.

On START, pushing it, we could visualize the active working cycle that can be the shock freezer HARD or SOFT.

▶ **BLAST CHILLER PUSH BUTTON: ***

On STOP, pushing it during more than two seconds, we can pass from the predicted blast chiller cycle list.

On START, maintaining the key pressed it allows to visualize the active working cycle, blast chiller HARD or SOFT.

▶ **START / STOP PUSH BUTTON**

Pushing it we will put on working the working cycle that we have select previously. If the blast chiller / shock freezer is working and we push the STOP button, we will be in the next situation:

- All the devices let working
- All the timers get on cero
- Remain the selection LED (lights) state in the same situation that was before the STOP.

▶ **PROGRAMMING PUSH BUTTON:**

Whit the blast chiller / shock freezer ON, pushing PRG during 5 seconds, we will get in the programming phase of parameters for the user..

We can get out of this programming pushing PRG again or also if we do not push it again.

▶ **LIGHT SWITCH:**

The control is make up by a DIGITAL DISPLAY or NUMERIC DIGIT were we can read:

- Temperatures
- Times
- Alarms
- SELF – DETERMINATION signals

At the same time we have LED indicators that indicate us the choosen function or process:

- Compressor march
- Alarm ((o))
- Fan and chamber – evaporators working
- Core probe
- Defrost cycle
- PRG programming
- START / STOP
- BLAST CHILLER indicator *
- SHOCK FREEZER indicator * * *
- CONSERVATION cycle indicator (blast chiller / shock freezer)
- TIME working indicator
- TEMPERATURES indicators (chamber and product – core)
- Light indicator UV – NOT USED
- ON / OFF indicator

2.7. – PROGRAMMING

Push PRG during 5 seconds and if we want to program the conservation or blast chilling, it will appear a intermittent LED and the visualizing unity will show us the established temperature. With UP and DOWN we will move the signal to increase or reduce the established number. If we do not push any key, the programming will finish automatically. If we push again PRG, the programming will also get finish.

PARAMETERS FIXING:

Whit the machine ON and in STOP position, pushing PRG during more than 5 seconds, we will have available the parameters menu and the light ■ will turn on and it will present on the display the first code, diF. If we do not push it for some seconds, it will leave automatically from the program. To go to another parameters it will be enough to push UP o DOWN.

PROGRAMMABLE CYCLES:

Push PRG on STOP position. The conservation LED respective to the cycle will turn on. To modification it push UP or DOWN depending on what you want.

Para confirmar el dato, o bien se pulsa PRG o no se toca ningún pulsador durante unos segundos.

POSSIBILITY TO CREATE TWO NEW CYCLES:

Can be:

- 2 of blast chiller and they would be CA3 y CA4

Or:

- 2 of shock freezer and they would be CC3 y CC4

Or:

- 1 of blast chiller CA3
- 1 of shock freezer CC3

Then, we could arrange of:

- 2 cycles of blast chiller programmed by the factory
- 2 cycles of shock freezer programmed by the factory
- 2 OPTIONAL cycles: This cycles should be programmed depending on the application by a professional technical.

CREATION OF THE OPTIONAL CYCLES:

- Push ON
- Push PRG during more than 5 seconds
- Digital display 3CA
- Push temperatures
- Appears in the digital display when it is changed
- Push UP or DOWN
- Push temperature to confirm the date
- In the display digital it will appear 3CA
- Push UP or DOWN to continue with the programming
- Visualize 3 SA
- Push temperatures
- Appears in the digital display the value to be changed
- Change with UP and DOWN
- Push temperature to confirm the date
- Visualize 3 SA

Repetir el proceso para completar resto de parámetros:

INDICATION	DESCRIPTION	VALUES			
		Lim -	Lim +	Construction Value	Unity
3CA	Set chamber 1st phase	- 15	25	-12	° C
3SA	Set core 1st phase	- 15	25	15	° C
3iA	Time minutes 1st phase	1	240	60	Min.
3Cb	Set chamber 2nd phase	- 15	25	0	° C
3Sb	Set core 2ª phase	- 15	25	3	° C
3ib	Time minutes 2ª phase	0	240	30	Min.

If we want to add a new program of SHOCK FREEZER:

INDICATION	DESCRIPTION	VALUES			
		Lim -	Lim +	Construction Value	Unity
6CA	Set chamber 1st phase	- 40	25	- 10	° C
6SA	Set core 1st phase	- 40	25	10	° C
6iA	Time minutes 1st phase	1	240	60	Min.
6Cb	Set chamber 2nd phase	- 40	25	- 40	° C
6Sb	Set core 2nd phase	- 40	25	- 18	° C
6ib	Time minutes 2nd phase	0	240	180	Min.
dSr	Select time automatic control cycle time core to pass on automatic	1	10	3	Min.

OPTIONAL: UV STERILIZES CYCLE

- The machine must be on STOP.
- Push UVC

The cycle last approximately 20 minutes. It must be done with the door closed and the temperature inside must be more than 4° C.

2.8. – ALARMS

► FEATURES:

The electric circuit has a buzzer that works acoustically to indicate us the next:

- Pressure switch alarm
- Chamber probe alarm
- Finishing alarm of the blast chiller / shock freezer correct cycle
- Finishing alarm of the blast chiller / shock freezer incorrect phase

It is possible to select the sonority getting in the parameters programming (bEn, bPa, bCP, Bfc). There are eight selection able sounds to each indicator. It is possible to silence the buzzer by letting pass the time or pushing any button.

► ALARM OF LOW OR HIGH TEMPERATURE IN THE CHAMBER

This alarm is activated only in conservation:

- Higher to the value obtained in the blast chiller / shock freezer
- Lower than the obtained value

It is activated showing in the LED ((o)) and the code is visualized in the digital display.

- Hi Alarm of high temperature
- Li Alarm of low temperature

If the temperatures are returned the alarm signals will disappear automatically.

► CORE ALARM

In case of open probe or a short-circuit it will be activated if it is in this conditions more than six seconds. The LED ((o)) will turn on and some code will appear in the digital display:

CP. – Chamber probe alarm

This alarm create the next actions:

- It finished immediately the cycle that is working.
- It finished instantly the defrost process if it is working.
- Stops the machine
- The alarm starts to sound
- The sterilizer alarm turn off, if this cycle is working.

EP. – EVAPORATOR probe alarm

This alarm create the next actions:

- The working cycles finish normally
- The defrost will be interrupt if it is on working process.
- Once that the problems are solved they will reinstate automatically.

IP. – Core probe alarm

This alarm create the next actions:

- Blast chiller / shock freezer cycles on working will finish by time phase
- The defrost will finish as it is programmed
- Once that the problems are solved they will reinstate automatically.

▶ **BLAST CHILLER PHASE END ALARM/ WRONG SHOCK FREEZER**

This happen when the core and the time parameters do not reach the established parameters.

This happen on the next conditions:

- Machine on START position.
- Blast chiller / shock freezer cycle.
- The regulation is done by core probe – NOT BY TIME -

The alarm will sound and we could see on the digital display, tEr.

If you want to see the time push TIME (clock). If the correct cycle is finihsed (according to the parameters) you could see on the digital display END and the alarm will sound (according to the established time). You could see the core probe temperature and cycles during time alternately.

When the machine is on START, if we push TIME we could see the time from the beginning.

▶ **VOLTAGE FAILURE ALARM OR ELECTRIC CURRENT**

If the blast chiller / shock freezer cycle is interrupt, if the voltage is interrupt for more than 10 minutes and is higher than the established parameters PFT, you could see on the digital display the signal PF. When the voltage returns the working cycle will continue.

▶ **OPEN DOOR ALARM**

Must carry out the next conditions:

- Machine on START
- The digital entrance signal reflects that when the door is opened the cycles will be interrupted and if the time is higher than the established one, a alarm signal will be generated, OD.

If we open the door when the defrost cycle is working the fans, the defrost account time and the shock freezing interval account will STOP and they will be reactivated when we close the door.

If the door opening is done while the destirilization is working, automatically the lamp will turn off. To reactivate the lamp close the door and push UV again.

▶ ALARMS STOP

The interruption by manual way allows to cancel the alarms that produces acoustic signals:

- ✘ CYCLE ENDING
- ✘ PRESSURE SWITCH ALARM
- ✘ CORES (evaporator, chamber and probe)
- ✘ WRONG CYCLE ENDING

You can stop the acoustic signal by pushing any button.

The alarm signal:

The signal alarm respecting to the sound will finish by a automatic way according to the bring up time. The alarm is indicated on the digital display.

If the alarm that is ringing is important, it will be permanently on the digital display until the problem that cause the alarm is solved. This happen when:

- Security pressure switch alarm
- Core probe alarm

On the digital display we can see the alarm signals, temperatures and times to the different cycles. This alarms are:

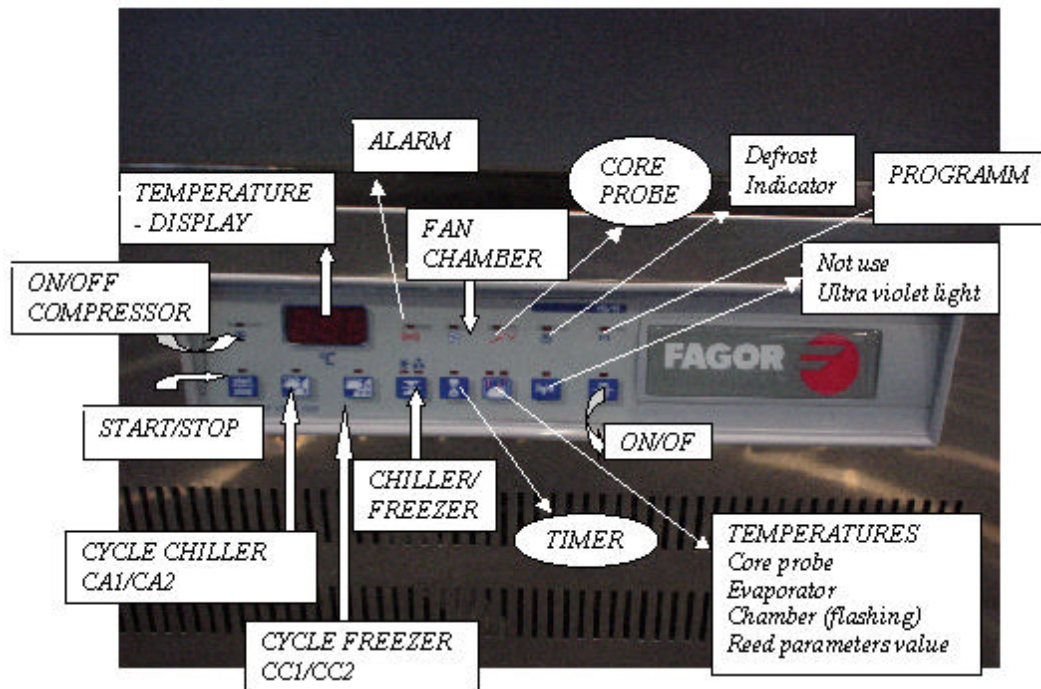
- ✘ Cycle end
- ✘ End of wrong cycle
- ✘ Lengthy open door
- ✘ Long failure on the electric current
- ✘ Excess temperature on the chamber. High or low.
- ✘ Error on the core probe

Some of this alarms will disappear when the problem is solved..

▶ DIGITAL DISPLAYS VISUALIZATION

Code	Type of alarm
CP	Damaged chamber probe
IP	Damaged core probe
EP	Damaged evaporator probe
Li	Low temperature on the chamber
Hi	High temperature on the chamber
FA	Fans out of service
Od	Open door
PF	Electric current cut
tEr	Time on excess
AL	Security pressure switch

2.9. – WORKING PROCESS



Push ON / OFF

It flash the last working cycle, that in turn flash the selection LED of BLAST CHILLING or SHOCK FREEZING

Select the desired one:

CA1	----	BLAST CHILLER HARD
CA2	----	BLAST CHILLER soft
CC1	----	SHOCK FREEZER HARD
CC2	----	SHOCK FREEZER soft

Pushing CONSERVATION:

LED*	----	Deactivate intermittent	----	FIXED selected
LED***	----	Deactivate intermittent	----	FIXED selected

- * Blast chilling.
- * * * Shock freezing.

- Push time (clock) to do it by means of fixed time.
- Push START / stop to start.
- On the digital display we can see in minutes the time remaining to the end.
- Pushing conservation we can visualize the adjust conservation temperature.
- If we push TIEMPO (clock) we can see the time in minutes since the beginning.
- Pushing TEMPERATURES we can visualize:

- Chamber temperature
- Core probe temperature
- Evaporators temperature

If the time(clock) does not been pushed after pushing START / stop, automatically the LED of the core probe will turn on.

If the core is not introduced in the product, the computer will detect it for two minutes and AUTOMATICALLY it will pass to realize the blast chiller / shock freezer by TIME turning on the LED. It will flash the LED of the core probe.

It will finish with a signal on the digital display, END, and the alarm will be activated for some seconds. Next, it will do a defrost and it will pass to the CONSERVATION cycle if this one has been select before.

If you push TIME (clock) when it is doing the defrost, it will indicate DEF.

3. APPLICATION

3.1. – HARD BLAST CHILLER

Achieve to reduce the temperature of a pre-cooking product from + 70° C to + 3° C in 90 minutes with cold draughty air.

Ideal system for big pieces or for products with high amount of fats, that are very difficult to chill by means of the traditional systems, by gravity.

- The products with a thickness higher than 20 mm.
- Vacuum packed products

The temperature on the chamber area will be between - 15° C y - 20° C to reach 5° C in the middle of the product.

If it work by CORE PROBE, it will be working until it reaches 5° C in the middle of the product. If the core probe is not situated in he middle of the product, it will work by time, specifically 90 minutes.

After finishing the blast chiller / shock freezer, if the conservation cycle is selected, it works like a normal fridge. If it is not selected the CONSERVATION cycle, the blast chiller / shock freezer will finish.

THE CAPACITY BY CYCLE depending to the pre-cooking product time is a very difficult parameter to specify. For example, mashed potatoes put in a G/ N 1/1 tray with 40mm of deepness. Thickness of the product 28 mm, we have achieved to blast 33 kg of product, from 70° C to 3° C in 90 minutes.

3.2. – SOFT BLAST CHILLER

Cycle for very delicate products as confectionery, fish, vegetables and fried snacks.

- Products with a size lower than 20 mm of thickness.
- Temperature of the higher chamber to 0° C until the temperature on the core probe reach 3° C.

By the difficulty of put the core probe on the product the cycle will be done by TIME to 90 minutes. When the blast chiller / shock freezer cycle finish it will pass to a CONSERVATION cycle if this one has been select before.

3.3. – HARD SHOCK FREEZER

This cycle is used to preserve pre-cooking products or fresh products for some weeks or also for months in a - 18° C temperature.

- The products with a thickness higher than 20 mm.
- Is used for vacuum packed products

The temperature in the chamber is - 30° C y - 35° C until the product reach - 18° C in the core probe.

If the core probe is not in touch with product the cycle will be done by TIME (clock) and it has a limit 240 minutes. If the CONSERVATION cycle has been select for the product, and the chamber works like a normal fridge. The capacity of the blast chiller / shock freezer depends on the product. We have done a proof with mashed potatoes in a ban G / N 1/1 tray with a deepness of 40 mm. The thickness of the product has been of 28 mm and we achieve to pass from 70° C to -18°C in 240 minutes a totality of 23 kg of product.

3.4. – SOFT SHOCK FREEZER

The process of shock freezing when the product has a high percentage of liquids, a micro crystallization will be created to do not damage the texture and structure of the product.

- Products with a size lower than 20 mm of thickness.
- During the first phase the temperature in the chamber must not been lower than 0° C until the temperature in the core the product is 20° C.
- In the second phase the chambers temperature will be of - 35° C until the temperature in the core of the product reach - 18° C.

If you can not use the core probe after the first phase that has been realized in a time, it will pass to the second phase, that is determinate with a concrete time and the total of both must add 240 minutes.

Once that the cycle is finished, if we have select the CONSERVATION cycle, the blast chiller / shock freezer will continue working as a FREEZER.

3.5. – WORKING CYCLE WITH CORE PROBE

- The core must be cleaned before and after of each cycle.
- It must be put in the core of the product an in the biggest one
- To quit the core, move it alternately and turning to make easier its retreat .
- Do not push from the cable, always from the solid part of the core
- To make easier your work the core probe must be put on its place

3.6. – WORKING CYCLE WITHOUT CORE PROBE

When the core probe is not inside the product, the cycles program recognize that situation and AUTOMATICALLY makes a cycle by TIME.

The TIMES are programmed to do the blast chiller / shock freezer function as:

- BLAST CHILLING. Cooling from 70° C to 3° C in 90 minutes.
- BLAST FREEZING. freezing from 70° C to - 18° C in 240 minutes.

4. MAINTENANCE

4.1. – DAILY CLEANING

- Clean it with water and Ph neutral soap
- Clarify it with abundant water
- Do not use cleaning products with content of chlorine
- Do not use abrasive products
- In case of scales of foods, soften them with a damp cloth, remove them with a wood or plastic putty knife to avoid this way grate the stainless steel.
- Do not use a stream hose for the cleaning, as much internal as external, because you can damage the electric components that are sensitive to the humidity.

-IMPORTANT-

Is basic to disconnect the machine if we are going to realize a cleaning with water. Do not remove the panels to access to the electric components except by a professional technician, authorized to realize cleaning and repairing operations.

Do the internal cleaning of the blast chiller / shock freezer with many care, put attention to the quantity of water that we use for that because the drainage is connected to a GN recipient of limited capacity.

The internal drainage has a cap that must be putted again when the cleaning is finished.

4.2. – ALARM ADVICES

If the system does not work according to the established parameters some acoustic alarms are generated or some graphic indicators will appear on the digital display.

Indication	Description
CP	Chamber probe out of service
IP	Damaged core probe
EP	Damaged evaporator probe
Li	Low temperature in the chamber
Hi	High temperature in the chamber
FA	Fans out of service
Od	Open door
PF	Current failure
tEr	Exceeded time
AL	Pressure switch alarm

AS SOON AS THE PROBLEM IS REPAIRED OR RESTORED THE ALARM ADVICES WILL DISAPPEAR.

4.3. – CORE PROBE

It is a component of regular use, so we must take care where we put it and clean it to avoid germens and bacterial transmissions from some food to another's.

We must take care the incision over the product and at the same time in the disconnection: It always has to be taken from the grossest part and never from the cable.

4.4. – REGULAR SERVICE

- Is advisable not to put the machine near a hot spring.
- The machine must to be good levelled to avoid excessive vibrations.
- The doors joint is on good conditions and it closes hermetically with the body.
- The plug of the electric current is good connected to the switch.
- Test that the water receiver tray is on good conditions to realize its function.
- Check that the drainage pipe in the chamber is not obstructed.
- Check that the condensate circuit is not obstructed by dust. In case of dirtiness call to the attention service to carry out the cleaning.

4.5. – NOT USING FOR A LONG PERIOD OF TIME

- Disconnect the machine with the ON / OFF push button.
- Disconnect the connection cable.
- Empty and clean its interior.
- Let the door a bit opened to make possible the airs running inside the machine and to avoid this way the rust formation.

4.6. – EXTRAORDINARY SERVICE

Qualified professionals must do it:

- Keep the condensator clean from dust.
- Keep the doors joint on good state.
- Check that the cold cycle is carried out correctly
- Check the resistances of the door and the defrost.

5. – TEST & GUARANTEE

The blast chiller / shock freezer has been check by means of different tests established for the production and the results have been satisfactory on the electric and functional subjects.

FAGOR INDUSTRIAL guarantees the product and as consequence its components for a period of a year since the date of invoicing and it consists on the free supply of the pieces after contacting with the supplier and have receive his approval by writing.

The supplier can require the return of the defective piece for its analysis and statistic.

FAGOR INDUSTRIAL will correct possible mistakes or defects always that the machine has been used as the user's manual indicates.

During the guarantee period the customer will pay the cost originated in concept of hand working, displacement and another costs originated by consequence of the repair.

The supplied materials are property of the supplier when they are supplied free of charge.

6. – SECURITY & RULES

Read carefully the instructions manual because there are some points of security de that we must have on account:

FAGOR INDUSTRIAL declines any responsibility in case of possible manipulations in the machine that are not indicated in the manual or if a professional technician does not do it.

PAY ATTENTION:

Before the unpacking make sure that the voltage and the frequency correspond to the switch that we want to connect it.

PAY ATTENTION:

Have a differential magneto thermic switch of 30 m A before the connection to the machine.

PAY ATTENTION:

If you are going to manipulate the machine for its repair, cleaning, or place moving DISCONNECT the machine from the switch.

PAY ATTENTION:

DO NOT USE sharp tools around the refrigerating circuit, around the EVAPORATOR, CONDENSATOR and entrance and exit lines.

PAY ATTENTION:

In certain areas of the blast chiller / shock freezer circuit, can be high temperatures in the CONDENSATOR and its entrance and exit lines. When you manipulate it for the cleaning remember to use gloves to protect you.

PAY ATTENTION:

Is not advisable to manipulate the electric components controls and its rounds when you have damp hands.

PAY ATTENTION:

For a good working of the blast chiller / shock freezer we must clean the dust, fluff and another dirtiness that can be accumulated in the condensator. The cleaning must be done with air pressure and a brush to make easier the cleaning in the wings. It is advisable that the compressor and evaporator group air inlets are free of any obstructions.

➔ IMPORTANT

With the object of guarantee the blast chiller / shock freezers good working:

- A) The installation must be done by qualified and authorized professionals, with knowledge on refrigeration and electric installations.
- B) The extraordinary cleaning maintenance must be done by professional staffs that know about refrigeration.

4.7. – ELECTRIC DIAGRAM

