TRENTO
ELEVATING CULINARY EXCELLENCE

INSTRUCTION MANUAL

Bowl Cutters

Item	47834	47835	47836
Model	FP-ES-0055	FP-ES-0095	FP-ES-0135

Warning!

Before you begin using your appliance, **PLEASE READ AND UNDERSTAND THIS DOCUMENT CAREFULLY** before installing, operating, maintaining, or servicing.

There are many important safety messages in this manual and on your appliance. Always read all safety messages.

Failure to do so can result in appliance failure, property damage, serious injury or death. Appliance failure, injury or property damage due to improper installation is not covered by warranty.

Stop!

DO NOT RETURN THIS PRODUCT TO THE STORE!

For questions or assistance with this product, call TRENTO Toll free: **1-833-487-3686** or visit the support section from our website, **www.trentoequipment.com**

Version: Revised - 10/28/2025

MADE IN SPAIN

1 YEAR WARRANTY
PARTS & LABOUR

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GENERAL INFORMATION

Omcan Manufacturing and Distributing Company Inc., Food Machinery of America, Inc. dba Omcan and Omcan Inc. are not responsible for any harm or injury caused due to any person's improper or negligent use of this equipment. The product shall only be operated by someone over the age of 18, of sound mind, and not under the influence of any drugs or alcohol, who has been trained in the correct operation of this machine, and is wearing authorized, proper safety clothing. Any modification to the machine voids any warranty, and may cause harm to individuals using the machine or in the vicinity of the machine while in operation.

CHECK PACKAGE UPON ARRIVAL

Upon receipt of an Omcan shipment please inspect for external damage. If no damage is evident on the external packaging, open carton to ensure all ordered items are within the box, and there is no concealed damage to the machine. If the package has suffered rough handling, bumps or damage (visible or concealed), please note it on the bill of lading before accepting the delivery and contact Omcan within 24 hours, so we may initiate a claim with the carrier. A detailed report on the extent of the damage caused to the machine must be filled out within three days, from the delivery date shown in the shipping documents. Omcan has no recourse for damaged products that were shipped collect or third party.

Before operating any equipment, always read and familiarize yourself with all operation and safety instructions.

Omcan would like to thank you for purchasing this machine. It's of the utmost importance to save these instructions for future reference. Also save the original box and packaging for shipping the equipment if servicing or returning of the machine is required.

Omcan Fabrication et distribution Companie Limité et Food Machinery d'Amerique, dba Omcan et Omcan Inc. ne sont pas responsables de tout dommage ou blessure causé du fait que toute personne ait utilisé cet équipement de façon irrégulière. Le produit ne doit être exploité que par quelqu'un de plus de 18 ans, saine d'esprit, et pas sous l'influence d'une drogue ou d'acohol, qui a été formé pour utiliser cette machine correctement, et est vêtu de vêtements de sécurité approprié. Toute modification de la machine annule toute garantie, et peut causer un préjudice à des personnes utilisant la machine ou des personnes à proximité de la machine pendant son fonctionnement.

VÉRIFIEZ LE COLIS DÈS RÉCEPTION

Dès réception d'une expédition d'Omcan veuillez inspecter pour dommages externes. Si aucun dommage n'est visible sur l'emballage externe, ouvrez le carton afin de s'assurer que tous les éléments commandés sont dans la boîte, et il n'y a aucun dommage dissimulé à la machine. Si le colis n'a subi aucune mauvaises manipulations, de bosses ou de dommages (visible ou cachée), notez-le sur le bond de livraison avant d'accepter la livraison et contactez Omcan dans les 24 heures qui suivent, pour que nous puissions engager une réclamation auprès du transporteur. Un rapport détaillé sur l'étendue des dommages causés à la machine doit être rempli dans un délai de trois jours, à compter de la date de livraison indiquée dans les documents d'expédition. Omcan n'a aucun droit de recours pour les produits endommagés qui ont été expédiées ou cueilli par un tiers transporteur.

Avant d'utiliser n'importe quel équipement, toujours lire et vous familiariser avec toutes les opérations et les

GENERAL INFORMATION

consignes de sécurité.

Omcan voudrais vous remercier d'avoir choisi cette machine. Il est primordial de conserver ces instructions pour une référence ultérieure. Également conservez la boîte originale et l'emballage pour l'expédition de l'équipement si l'entretien ou le retour de la machine est nécessaire.

Omcan Empresa De Fabricacion Y Distribucion Inc. Y Maquinaria De Alimentos De America, Inc. dba Omcan y Omcan Inc. no son responsables de ningun daño o perjuicío causado por cualquier persona inadecuada o el uso descuidado de este equipo. El producto solo podra ser operado por una persona mayor de 18 años, en su sano juicio y no bajo alguna influencia de droga o alcohol, y que este ha sido entrenado en el correcto funcionamiento de esta máquina, y ésta usando ropa apropiada y autorizada. Cualquier modificación a la máquina anúla la garantía y puede causar daños a las personas usando la máquina mientras esta en el funcionamiento.

REVISE EL PAQUETE A SU LLEGADA

Tras la recepcion de un envio Omcan favor inspeccionar daños externos. Si no hay daños evidentes en el empaque exterior, Habra el carton para asegurararse que todos los articulos solicitados ésten dentro de la caja y no encuentre daños ocultos en la máquina. Si el paquete ha sufrido un manejo de poco cuidado, golpes o daños (visible o oculto) por favor anote en la factura antes de aceptar la entrega y contacte Omcan dentro de las 24 horas, de modo que podamos iniciar una reclamación con la compañia. Un informe detallado sobre los daños causados a la máquina debe ser llenado en el plazo de tres días, desde la fecha de entrega que se muestra en los documentos de envío. Omcan no tiene ningun recurso por productos dañados que se enviaron a recoger por terceros.

Antes de utilizar cualquier equipo, siempre lea y familiarizarse con todas las instrucciones de funcionamiento y seguridad.

Omcan le gustaría darle las gracias por la compra de esta máquina. Es de la mayor importancia para salvar estas instrucciones para futuras consultas. Además, guarda la caja original y el embalaje para el envío del equipo si servicio técnico o devolución de la máquina que se requiere.

SAFETY AND WARRANTY

FOR YOUR SAFETY

The following instructions limit the responsibility of the vendor and his representatives.

DEFINITION OF WARNINGS AND SIGNAL WORDS

SAFETY WARNINGS AND SIGNAL WORDS USED IN THIS MANUAL

The safety instructions serve as indications and precautionary measures that must be taken into account or

adopted to avoid a dangerous situation.

Warnings can be classified according to the severity of the hazardous situation. The classification is based on an assumption of probability of being exposed to a dangerous situation and what could happen in such a case. There are four kinds of warnings:

Danger: indicates a hazardous situation, which, if not avoided, will result in death or serious injury.
Warning: indicates a hazardous situation, which, if not avoided, could result in death or serious injury.
Caution: indicates a hazardous situation, which, if not avoided, could result in minor or moderate injury.
Notice: is used to address practices not related to personal injury.

Important information:
NOTE: provides additional information to clarify or simplify a procedure.

SAFETY WARNINGS ATTACHED TO THE MACHINES

The safety symbols warn of special hazards and are placed in the relevant places on the machine. Check warning symbols daily:
- Are all safety symbols present?
- Are all safety symbols recognizable and readable?

Ensure that the safety plaques / adhesives are firmly attached to the machine, are easily readable and are not erased during the cleaning process. Disconnect the machine and secure the main switch against reconnection if a warning symbol is missing or no longer recognizable. Do not reconnect the machine until they are in place and all safety symbols are recognizable. If they become damaged or lost, contact your authorized dealer. The warning symbols placed on the machine are described below:
- Warning symbol danger of crushing or amputation.
- Warning symbol electric shock hazard.
- Warning symbol hygienic hazard.

INTENDED USE OF THE MACHINE
Talsa Suprem Bowl Cutter / Chopper serve to mix and emulsify different kind of fresh or frozen food products according to the desired degree of fineness, introducing the raw material to be worked through a rotating bowl to reach the cutting knives to be crushed. At the same time, it is possible to add water, ice or additives. Possible applications are:

MEAT PRODUCTS
- Raw sausage.
- Cooked sausage.
- Emulsion of bark.
- Hot meat grain.
- Canned meat.
- Poultry.

SAFETY AND WARRANTY

OTHER FIELDS OF APPLICATION
- Precooked dishes.
- Fish products.
- Soups and sauces.
- Processed cheese.
- Fruits and vegetables.
- Plant based & alternative proteins.
- Sweet pastries.

Any other type of use is not observed according to the usage regulations. The use according to its destination also includes the use of the accessories supplied and recommended by the manufacturer as well as compliance with inspection and maintenance intervals. The machine shall only be used in the industrial or professional craft sector. It is a stationary machine.

UNAPPROVED USES
- It is not allowed to use the machine in a private setting.
- It should not be used to crush materials with a high proportion of bones or other hard substances.
- It is not recommended to process frozen product blocks with diameters bigger than 80mm and colder than -15°C (59° F) or non-food products.
- It is forbidden to process live animals.
- It is prohibited to process substances or materials that do not conform to the relevant food regulations.
- The processing of dangerous or harmful substances, especially toxic, corrosive, easily or extremely flammable substances, does not conform to the intended use.

POTENTIAL HAZARDS
If the machine is operated in a manner that is not in accordance with the intended use or by untrained personnel, the following hazards and damages may occur:
- Dangers to the life and physical integrity of the operator or others.
- Material damage.
- Inefficient work on and/or with the machine.

RESPONSIBILITY
In case of violations against what is set forth herein, all rights to guarantee against Talsa shall be extinguished.

ELECTROMAGNETIC COMPATIBILITY (EMC)
The machine is designed for use in industrial environments. For use in light or residential industry environments, additional interference suppression measures are required. Please contact your authorized dealer.

MODIFICATIONS

DISCLAIMER OF LIABILITY
It is not allowed to modify the machine without the prior express authorization of Talsa, neither in its design nor in its safety systems. Talsa will not be liable for damages caused by arbitrary changes. When a user makes essential modifications to the machine, he assumes the manufacturer status. In such a case, he shall be

obliged to take all the measures incumbent on it legally as a manufacturer. The original manufacturer is therefore released from its responsibility.

ORIGINAL PARTS
The machine is only allowed to be used with original Talsa accessories and spare parts. Talsa will not be liable for damages caused by using tools, accessories or spare parts from other manufacturers.

IMPORTANT WARNINGS

Since the WARNINGS, CAUTIONS and INSTRUCTIONS in this manual cannot address all possible conditions and situations that may arise, the operator MUST ALWAYS exercise common sense and due caution when using this machine!

- DO NOT DISCARD THIS MANUAL; KEEP IT FOR FUTURE REFERENCE BY ALL USERS AND MAINTENANCE PERSONNEL. PLEASE THOROUGHLY READ AND FULLY UNDERSTAND ALL THE INSTRUCTIONS BEFORE SERVICING OR USING THE MACHINE.
- THIS MACHINE HAS MOVING PARTS AND USES VOLTAGES THAT ARE POTENTIALLY HAZARDOUS. FAILURE TO FOLLOW THE INSTRUCTIONS CONTAINED IN THIS MANUAL COULD RESULT IN SEVERE, POSSIBLY LIFE-THREATENING, PERSONAL INJURY.
- THIS MACHINE HAS BEEN DESIGNED EXCLUSIVELY FOR FOOD PROCESSING. USE OF THIS MACHINE FOR ANYTHING OTHER THAN FOOD PROCESSING DOES NOT CONFORM TO ITS INTENDED FUNCTION, IS STRICTLY PROHIBITED AND SHALL VOID Talsa's WARRANTY. Talsa ASSUMES NO RESPONSIBILITY FOR ANY DAMAGE OR INJURY RESULTING FROM IMPROPER USE OF THIS MACHINE.
- DO NOT ALTER OR MODIFY THE MACHINE'S ORIGINAL DESIGN IN ANY WAY; DOING SO WILL VOID Talsa's WARRANTY AND MAY RESULT IN PERSONAL INJURY OR DAMAGE TO THE MACHINE.
- This machine MUST be installed ONLY by a qualified electrician in accordance with the instructions in this manual and in compliance with all applicable national, regional and local electrical, safety and hygiene standards and codes. Compliance with said standards and codes is the sole responsibility of the owner and installer.
- DO NOT open the machine or tamper with its internal parts; none of the internal components requires adjustment or maintenance by the user.
- DO NOT tamper with the machine's mechanical or electrical safeguards.
- NEVER attempt to repair the machine on your own. Should the machine require service, contact the authorized dealer from whom you purchased the machine.
- Use ONLY genuine Talsa parts or accessories and have them installed only by a qualified technician. Use of unapproved parts and accessories voids Talsa's warranty and may result in personal injury or damage to the machine.
- Modifications to the machine that raise noise emission levels above 89 dB(A) may result in hearing damage. ALWAYS wear appropriate hearing protection.

OPERATING HAZARDS

- PLEASE READ THIS MANUAL CAREFULLY AND FULLY UNDERSTAND ALL THE INSTRUCTIONS BEFORE USING THE MACHINE.
- DO NOT OPERATE THE MACHINE WITHOUT HAVING FIRST BEEN INSTRUCTED ON ITS USE,

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MAINTENANCE AND SAFEGUARDS FROM AN EXPERIENCED OPERATOR.
- DO NOT use the machine without wearing the protective gear required by law. While operating the machine, NEVER wear loose clothing or jewelry that could become caught in moving parts.
- DO NOT operate in the cutting area before the knives are at rest and the main switch has been switched off to secure it against reconnection.
- DO NOT leave the machine unattended while it is powered on or in operation. Keep children and bystanders safely away from the machine.
- ALWAYS keep hands safely away from the machine's moving parts. NEVER insert hands or other objects under the knife lid while the machine is in operation as there are sharp rotating knives under the lid.
- ALWAYS keep your work area well-lit and free of obstacles.
- ALWAYS unplug the machine from the electrical outlet when it is not in use.
- Should the machine malfunction, turn it off immediately and notify the appropriate personnel.
- The knives may jam or break, if the machine is fed with raw materials not allowed for processing or quantities exceeding the specified bowl capacity. The machine may stop running and the motor might overheat.

ELECTRICAL HAZARDS

- DO NOT TAMPER WITH THE MACHINE'S ELECTRIC SYSTEM. THIS MACHINE SHOULD ONLY BE INSTALLED BY A QUALIFIED ELECTRICIAN AND IN COMPLIANCE WITH ALL APPLICABLE ELECTRICAL STANDARDS AND CODES.
- Before operating the machine, make sure that all phases are connected properly and that the machine is properly grounded and/or connected to a circuit leakage breaker and thermal switch. Failure to do so could result in electric shock!
- DO NOT tamper with the machine's electrical wiring or components after it has been installed.
- ONLY a qualified electrician may perform modifications to the electrical configuration of the machine.
- DO NOT pull on the power cord to disconnect the plug from the electrical outlet; always pull on the plug.
- DO NOT operate the machine with a damaged power cord or damaged plug. To avoid damaging the power cord and possible injury, keep it away from areas where it may be stepped on or tripped over.
- ALWAYS disconnect the machine from the electrical outlet before proceeding with cleaning, maintenance, or repairs.

SAFETY DEVICES

PROTECTORS
Protectors in/on the machine are intended to prevent access to hazardous areas and possible injury. The protectors are different depending on the danger zone. The protectors used in the machine are described below.

USE OF THE PROTECTORS
To ensure the effectiveness of the protectors, pay attention to the following points:
- Use the protectors correctly.
- Do not use damaged guards.
- Do not tamper with the guards.
- Use only the protectors that belong to the machine.

- Check the functions of the protectors on a regular basis.
- Once all maintenance, lubrication or repair work is complete, always reassemble all guards.

CHECK THE PROTECTORS DAILY
- Are all guards mounted?
- Are all the protectors electrically secured?
- Are there damaged guards?

Disconnect the machine and secure the main switch against reconnection if a protector is missing, damaged or damaged. Do not reconnect the machine until all guards are installed and ready to operate.

- Knife lid (A): the knife lid blocks access to the danger zone below it. While the knife motor is switched on, the lid cannot be opened.
- Noise protection cover (B): the noise protection cover reduces the noise pollution at high cutting speeds. A sensor interrogates the status of the noise protection cover. If opened at higher cutting speeds, the speed will automatically be reduced to 1000 rpm and resume the previous speed when the cover is closed.
- Front safety guard (C): the bowl is protected by a front safety guard to avoid contact with the rotating bowl.
- Emergency stop push button (D).
- Main Switch (E).

Overview of Safety Devices

EMERGENCY STOP FUNCTION

DANGER - RISK OF ELECTRIC SHOCK!

Danger of death by electric shock in case of contact with live components of the machine. Even if the emergency stop function is activated, certain components will still remain in tension. The DC link capacitors of the frequency converters need some time to discharge.

- Only qualified personnel with specific training for this purpose are authorized to carry out work on the electrical circuit of the machine.

SAFETY AND WARRANTY

- When working on the electrical circuit of the machine, turn off the main switch and secure it with a padlock to prevent it from being reconnected.
- Do not touch any electrically active part of the machine.
- After disconnecting the mains voltage, always wait for the capacitors of the intermediate circuits to be discharged. Check the operation of the emergency stop button.
- Frequently check the function of the emergency stop button.
- If the emergency stop button does not work, switch off the machine and secure the main switch.
- Do not reconnect the machine until the emergency stop button operate again.

DANGER
Switching off the machine with the main switch deactivates the emergency break.

The emergency stop function serves to quickly put the machine in a safe state in case of danger or to prevent a hazard. The emergency stop function of the machine and the use of the emergency stop button are described below:

Pressing the emergency stop push button has the following effects:
- All functions that are running are disabled.
- Power is interrupted to the following components:
  - Actuation of the knives.
  - Bowl drive.
  - Hydraulic group.

With the emergency stop function activated some components and functions of the machine are still live. These include, for example:
- The control circuit and the load circuit.
- Signals from external sources.

The knife lid cannot be opened while the knife and bowl motors are operating. During this time the OPEN LID button will not respond. If the lid opens for any reason while the knife motor is operating, the machine´s build in safety system will perform an emergency stop and the knives will be stopped by the emergency break. A notification will be shown in the Multi Purpose Context Panel indicating the lid is open.

EMERGENCY BREAK
If you use the emergency stop button, all motors will be turned off and the knife shaft will be stopped by an electronic brake within 4 seconds. For restarting the cutter, the emergency stop button must be unlocked. The purpose of the emergency brake is to be used in dangerous situations. It will wear quickly if used frequently.

LOCK TIME
If the emergency stop function is activated, the knife drive and bowl drive remain locked during the locking time. Even if the emergency stop is deactivated, neither drive can be started until the lockout time has elapsed. The lockout time starts automatically with the deactivation of the emergency stop function by disengaging the red mushroom-shaped emergency stop button turning it slightly to the left. The duration of the blocking time is 30 seconds. If the emergency stop button is activated again within the following 5 minutes, the blocking time after releasing the emergency stop button is increased by 30 additional seconds each time the emergency stop

button is pressed.

Notice: do not use the emergency stop function improperly. When the emergency stop function is used, the machine stops with emergency braking. This type of machine stop involves a considerable load on the machine and its components. Do not use the emergency stop function to stop the machine in normal operation. Use the emergency stop function only in emergencies.

Press the emergency stop button.
- All functions that were running are disabled.
- The icon for the emergency stop and an alarm message are displayed on the Multi Purpose Context Panel.

Release the emergency stop push button to confirm the alarm message and deactivate the emergency stop.
- Disengage the red mushroom-shaped emergency stop push button by turning it slightly to the left.
- The lockout time begins and remaining lock time is displayed.
- The knife and bowl drives remain locked until the lockout time has elapsed.

MAIN MACHINE SWITCH

DANGER - RISK OF ELECTRIC SHOCK!
Danger of death by electric shock in case of contact with live components of the machine. Even if the main switch is turned off, certain components will still remain in tension. The DC link capacitors of the frequency converters need some time to discharge.
- Only qualified personnel with specific training for this purpose are authorized to carry out work on the electrical circuit of the machine.
- When working on the electrical circuit of the machine, turn off the main switch and secure it with a padlock to prevent it from being reconnected.
- Do not touch any electrically active part of the machine.
- After disconnecting the mains voltage, always wait for the capacitors of the intermediate circuits to be discharged.

MAIN SWITCH FUNCTION
If the main switch is turned off, the machine voltage is switched off. Even with the main switch off, some components and functions of the machine are still live. Among them is, for example:
- The DC link capacitors of the frequency converters need some time to discharge.

SWITCH OFF MAIN SWITCH
Turn the main switch to the “0” Off position: the power supply to the machine is switched off.

SECURE MAIN SWITCH WITH PADLOCK
- Open the safety closure.
- Hook a padlock in the hole.
- Close the lock: the main switch is secured.
- Store the key in a safe place.
- Do not remove the padlock until there is no dangerous situation and all protective devices are assembled again.

SAFETY AND WARRANTY

SWITCH ON THE MAIN SWITCH
- Remove the padlock if it is in place.
- Turn the main switch to the “I” On position: the power supply to the machine is switched on.

The main switch is located on the right side of the machine.

SAFETY MEASURES

RESIDUAL HAZARDS
The machine has been designed and constructed in such a way that avoidable hazardous areas have been eliminated or access to them has been prevented by appropriate design measures. In order to carry out activities in the machine, the dangerous areas that remain on the machine must be known. You must know how to operate in dangerous areas of the machine, in order to minimize the risk of injury, the risk of material damage and hygiene risks. The safety and warning information contained in the instruction manual indicates these hazardous areas and the behavior that must be observed by the personnel in order to minimize the risks resulting from such hazardous areas.

LIST OF RESIDUAL HAZARDS

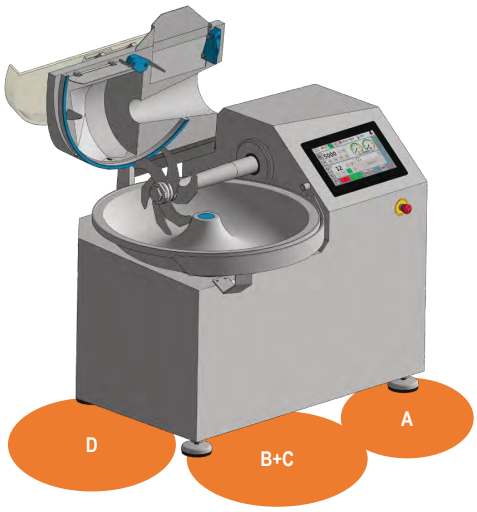
Danger zone	Danger	Measure / Behavior
Between the lid and the cutter bowl.	Crush hazard.	When opening and closing covers or doors, do not put your hands into dangerous areas.
Doors and closures.		
Rotating range of the charging device.		Make sure that no unauthorized person is within range. Do not remain in the rotating range.
Rotating range of the discharging device.	Danger of cutting or sectioning.	
Cutting knives.		When working in the area of the knives wear protective gloves and anti-skid. Always use anti-cut gloves according to standard EN 388 level 5.
Power supply of electric heating device.	Dangerous, life threatening electrical accidents.	Do not touch any electrically active part of the machine. The voltage does not switch off when the emergency stop button is pressed or the main switch is set to “0”.
Control and the charging circuits.		
Increased noise when the noise reduction cover is open during certain phases of operation.	Hearing trauma.	Wear hearing protection equipment.

EXPLOSION PROTECTION
This machine is not suitable for use in explosive atmospheres.

WORK AREAS
This section describes which work zones are provided around the machine for the various activities. During

normal operation, always remain in the marked work areas for the tasks to be performed. This will ensure the effective operation of the machine and reduce potential hazards. This machine has been designed for one-man operation. The operator usually works at the front of the machine, at the control panel. Never let the machine run unattended.

A	Control console.	Stay mainly in this area for the control and monitoring of the machine.
B	Fill the cutter bowl.	Enter this area only briefly to fit the transport cart into the loading device or retain it.
C	Empty the cutter bowl.	Enter this area only briefly to enter the transport cart under the unloader or to remove it from underneath.
D	Replace knives.	Stay in this area only to replace the knives.



HYGIENE AREAS

The machine is divided into different areas of hygiene:

FOOD AREA (RED):
- Machine surfaces that are exposed to the product and can eventually give up other substances by dripping, diffusion or absorption. Take care that there are good hygienic conditions; that is to say: no condensation, foreign particles / substances, lubricants or the like on or near the surface of contact with the product (by joints, piping, installation of air conditioning, motors, etc.).

SPLASH AREA (YELLOW):
- Areas formed by surfaces with which the product can come into contact.

FOOD FREE AREA (GREEN):
- Machine surfaces with which the product under normal operating conditions does not come into contact.

SAFETY AND WARRANTY

STAFF

NECESSARY STAFF AND COMPETENCE LEVELS

For trouble-free and reliable operation of the machine, the following personnel are recommended per shift:

Work	Competences
Handling, filling, emptying the machine.	Operator of the machine: • Training by the technical service of the authorized distributor in the client's premises. • Training and instruction by the user. • Read instruction manual.
Cleaning the machine.	Cleaning staff: • Training and instruction by the user. • Read instruction manual.
Maintenance of the machine.	Instructed qualified personnel: • Training by the technical service of the authorized distributor in the client's premises. • Training and instruction by the user. • Read instruction manual.

OPERATOR / CLEANING STAFF

The operator belongs to the client's personnel and has been instructed in the following activities:

- Start and stop the machine.
- Supervise the machine or process (handling of different devices).
- Perform simple cleaning and regreasing operations.

Following specific instructions, the operator will be able to make simple modifications in the conduction of the process. Operation of the machine by untrained personnel is only permitted under the supervision of a qualified person. The machine is only suitable for operators who are at least 14 years of age. The national provisions relating to the protection of occupational safety and health should be observed.

INSTRUCTED QUALIFIED PERSON

The instructed qualified person generally belongs to the client's staff and has been instructed in the following activities:

- Perform simple assembly work.
- Perform routine maintenance / inspections.

The instructed qualified person has basic technical knowledge. Basic knowledge is equivalent to that of a technical training (e.g. vocational training in mechanics or electricity). The instructed qualified person is selected and appointed by the employer (user). The authorized distributor will only take care of the instruction in specific technical peculiarities and directly related to the scope of the supply and warn about the possible dangers. This instruction is not substitute for the training necessary to be a so-called competent person.

QUALIFIED PERSON

The qualified person is usually a member of the authorized distributor's technical support staff. In exceptional cases, trained professionals of the client can obtain the corresponding qualification by participating in training courses given by Talsa or an authorized distributor. Qualification is presumed to be an 'Instructed qualified

person'. In addition, the following techniques are taught:
- Minimize safety hazards in all processes.
- Conduct installation, inspection and repair in a responsible manner.
- Identify damages that affect safety.

In order to evaluate damages in safety-related components, a qualified person should always consult a Talsa expert.

DISPOSAL

DANGER OF INJURY TO PERSONS AND ENVIRONMENTAL HAZARDS
The machine is composed of different materials. Observe local regulations on waste disposal. Instruct an authorized waste disposal company to dispose of waste correctly.

TIPS AND USEFUL INFORMATION
For any questions or concerns, please contact your authorized dealer.

RESIDENTIAL USERS: vendor assumes no liability for parts or labor coverage for component failure or other damages resulting from installation in non-commercial or residential applications. The right is reserved to deny shipment for residential usage; if this occurs, you will be notified as soon as possible.

1 YEAR PARTS AND LABOUR WARRANTY

Within the warranty period, contact Omcan Inc. at 1-833-487-3686 to schedule an Omcan authorized service technician to repair the equipment locally.

Unauthorized maintenance will void the warranty. Warranty covers electrical and part failures not improper use.

Please see https://omcan.com/disclaimer for complete info.

WARNING:

The packaging components are classified as normal solid urban waste and can therefore be disposed of without difficulty.

In any case, for suitable recycling, we suggest disposing of the products separately (differentiated waste) according to the current norms.

DO NOT DISCARD ANY PACKAGING MATERIALS IN THE ENVIRONMENT!

TECHNICAL SPECIFICATIONS

Item Number	47834	47835	47836
Model	FP-ES-0055	FP-ES-0095	FP-ES-0135
Bowl Volume	55 L / 58.1 QT	95 L / 100.4 QT	135 L / 142.7 QT
Mixture Bowl Capacity Approx.	88.2 lbs. / 40 kgs.	110.2 lbs. / 50 kgs.	154.3 lbs. / 70 kgs.
Machine Power	22.5 HP / 16.5 kW	34 HP / 25 kW	48 HP / 35 kW
Knife Motor Power	20.5 HP / 15 kW	30 HP / 22 kW	41 HP / 30 kW
Knife Speed (Variable)	500 - 5000 RPM		
Bowl Speed	4 - 20 RPM		
Electrical	220V / 60Hz / 3		
Current	63A	100A	125A
Net Weight	1984.2 lbs. / 900 kgs.	3086.5 lbs. / 1400 kgs.	4409.2 lbs. / 2000 kgs.
Net Dimensions (WDH)	61.5" x 47" x 65.5" 1562 x 1194 x 1664mm	66.1" x 55.9" x 71.7" 1680 x 1420 x 1820mm	100" x 68.1" x 78.7" 2540 x 1730 x 2000mm
Packaging Weight	2204.6 lbs. / 1000 kgs.	3306.9 lbs. / 1500 kgs.	4623.1 lbs. / 2097 kgs.
Packaging Dimensions	55.9" x 54.7" x 66.1" 1420 x 1390 x 1680mm	84.6" x 70.9" x 63" 2150 x 1800 x 1600mm	

INSTALLATION

STORAGE, TRANSPORT AND DELIVERY

WARNING

- ALWAYS keep the machine upright.
- DO NOT rest heavy objects on the machine.
- NEVER lift the cutter by the knife head shaft holder since this could result in serious damage to both the holder and the shaft.
- Due to the high weight of the bowl, the machine tends to tip over in the area where the bowl / loader protrudes.
- IMPORTANT: always place protective corners between the slings and the machine frame.

The bowl chopper / cutter is delivered on a truck or container (K205). Carefully inspect the machine upon delivery. Should you note any damage to the machine, promptly notify the carrier. The transport company is solely responsible for any damage to the machine during transit. If the machine is found to be in satisfactory condition, unload the crate from the truck and convey it to a suitable work area with a flat, level floor. Because of its weight (see technical specifications), the machine must always be moved with a with a truck crane and the hosting slings (K205) or a forklift with sufficient lifting power. Observe the mark on the crate to slide the forklift's blades underneath in the right position. Use care when sliding the blades underneath the machine. You will find two marks on the lower back side of the cutter indicating the best position for the blades.

PLACEMENT OF THE MACHINE

Set the machine on a level, flat and anti-slip surface. If necessary, adjust the machine feet to compensate floor unevenness and level the cutter. If you the machines is equipped with the optional hydraulic loader, make sure the transport trolley fits into the holder of the elevator by adjusting the machine feed. The work area should be uncluttered, well-lit and have adequate ventilation. Leave space of at least 1 meter all around the machine to permit safe use, cleaning and maintenance. Respect a minimum ceiling clearance for bowl cutter with loader / unloader option of 2,4 m (2,0 m for machines w/o loader / unloader option). Position the machine so that the power cord plug is easily accessible.

Notice: the machine may become unstable if the machine feet are unscrewed too far. Ensure that the maximum distance between the floor and the machine does not exceed 100 mm.

CONNECTING TO THE POWER SOURCE

DANGER - ELECTRICAL HAZARD!

- The machine should only be installed by a qualified technician and in compliance with all applicable national, regional and local electrical and safety codes.
- The electrical installation of the workplace should be equipped with power surge full protection (common trip breaker or thermal magnetic circuit breakers) and leakage (residual current device), which must be adjusted to the technical specifications of your particular machine (see Technical Specifications).

- Confirm that the electrical requirements listed in technical specifications and on the machine's specifications plate (voltage, frequency, etc.) are compatible with your electrical service. There is a tolerance of ±10% for voltage and of ±2% for frequency. If the machine's specifications are compatible with your electrical service, have a qualified electrician attach the machine directly to the power outlet.
- The K95/K135/K205 Supremcutter is a single voltage three-phase machine; it is not possible to change the motor's voltage. The machine is designed for use in industrial environments.

The electrical power cord/plug typically has 4 wires:

- 1 ground (bi-colored yellow and green)
- 3 phases (3 black, numbered wires or 1 black, 1 brown and 1 grey wire)

The color-coding of the wires may vary depending on your country's electrical standards

- Plug the machine into the electrical outlet and turn on the MAIN POWER SWITCH; the control panel's display will power up and perform a self-test. After a few seconds, the production screen is displayed.
- VERY IMPORTANT! Verify the correct connection of the 3 phases! Open the transparent noise reduction cover. On the PRODUCTION screen press the button to raise the knife lid. It should open when the UP button is pressed or closes when the CLOSE button is pressed. If this is not the case, switch off the machine immediately and have two of the three phases in the power source/plug exchanged by a qualified electrician.

NOTE: it is possible to place a padlock on the main switch to prevent accidental or unscheduled start-up.

Notice: if the installation standards required the use of a residual current device (RCD/RCCD), a Class A-Si

INSTALLATION

type or Class B type device must be used to avoid untimely disconnections by the variable speed drive (VDF).

VERIFICATION DISTANCE OF KNIVES TO BOWL

WARNING
- Always use the wrenches supplied with the machine to disassemble / mount the knife head or knives.
- When handling the knives always wear cut protection gloves and sleeves.

Before using the bowl chopper the first time, make sure the knives are well fixed and DO NOT make contact with either the bowl or knife lid as the knife head turns.
- With the knife lid open, press the red mushroom-shaped EMERGENCY STOP button.
- Turn the knives using a plastic bar that is long enough to reach the knives while keeping you safely away from the knives. There must be a clearance of at least 2 to 3 mm between the knives edges and the bowl.
- Use the provided wrenches to ensure that the knife grouping is properly tightened. Use extreme caution and wear protective gear (cut-protection gloves) when tightening the knife grouping; avoid injury against the knife head or knives. (see dismantling the knife head).
- Disengage the red mushroom-shaped emergency stop button by turning it slightly to the right.
- Close the knife lid and again turn the knife head with the plastic bar to verify that the knives DO NOT make contact with the knife lid.

NOTICE
- The maximum permitted speed for the knife head is 5000 rpm. Prerequisite is perfect sharpening and adjustment of the knives as well as balancing and assembly of the knife head.
- When using 3 knives assembly, maximum recommended cutting speed should not exceed 2500 rpm to avoid strong vibrations.

OPERATION

Notice: this unit is designed exclusively for food processing; any use other than food processing is not in accordance with the machine's intended application, is strictly prohibited and shall void our warranty. Talsa assumes no responsibility for any damage or injury resulting from improper use of this machine.

CAUTION
- Before first use, clean the cutter carefully as outlined in CLEANING.

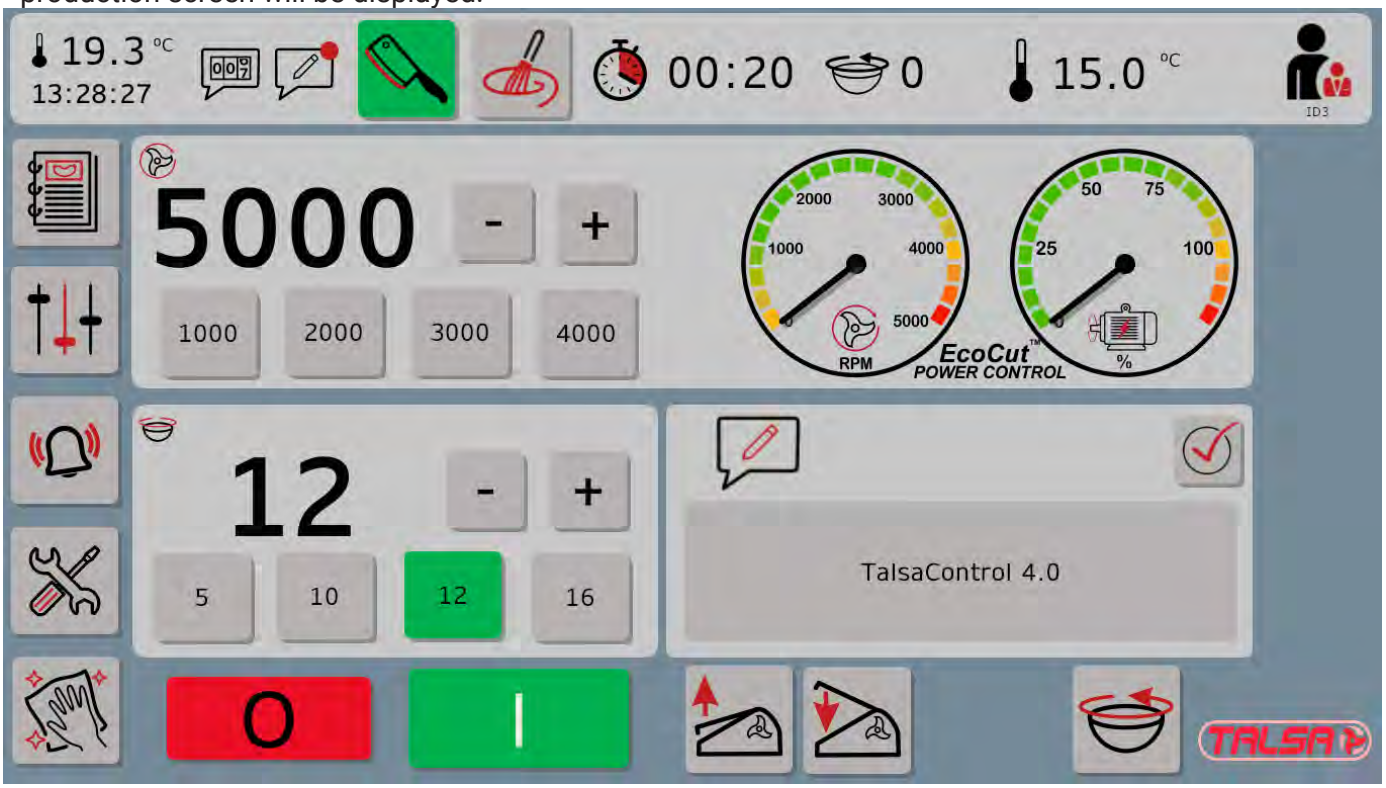
WARNING
- Before starting work, carefully read and fully understand this operating and safety manual.
- Do not operate the machine without prior instruction by an advanced user.
- Practice with empty machine before loading.
- NEVER reach into the bowl while the cutter is running. NEVER put your hands under the stainless-steel knife lid. Avoid any possibility that your hands, clothing, jewelry or other accoutrement may become caught on a moving part or dragged into the bowl or under the knife lid.

WARNING

- Observe all required hygiene precautions when handling food. Use the necessary protective equipment (gloves, cap, apron, etc.) and follow appropriate procedures.
- In the case of handling frozen product wear suitable protective gloves.

START UP PROCEDURE

- Make sure the emergency stop button is released by turning it a few degrees to the right.
- To start the cutter turn on the main switch located at the right side of the machine frame to position ON [I]. The display on the control panel will light up the controller will perform a self-test. After a few seconds, the production screen will be displayed.



- Select CUTTING from the working mode options.
- Open the transparent noise reduction cover and introduce the pre-cut food product into the bowl. If you have purchased the hydraulic loader option, you can lift the trolley using the LOADER buttons on the right side of control panel. DO NOT overfill the bowl; the mixture should not rise above the bowl's rim. If necessary, use ice chips to reduce the mixture's temperature. DO NOT use big cubes, chunks of ice as these can damage the knives' edges.
- Important: do not overload the bowl in excess and especially do not close the lid pressing on the product, it could damage the closure mechanism.
- Select the desired knife and bowl speed. To begin the production process press the green START button [I]. When the noise reduction cover is raised while cutting at high speeds, the cutting speed automatically decreases to 1000 rpm in order to reduce noise levels which might otherwise be harmful to the user. When

the noise reduction cover is closed, the machine resumes the user-programmed speed. The knives and bowl turn simultaneously when the machine is powered on; it is impossible for one to function without the other. During the process you can adjust the knife and bowl speed by pressing the programmable speed buttons or the + / - buttons on the display.
- You may use the options displayed at the top of the production screen to program a warning message or automatically stop the process after an elapsed time, bowl turns or temperature limits. Refer to automatic stop options for more detailed information.
- To stop the process, press the red STOP button [O] on the lower left side of control panel.
- For cleaning the cutter once the production cycle is finished, select the CLEANING button from the menu on the left side of the screen. Refer to cleaning for more detailed information.
- When finished using the machine, shut it off completely by turning the main power switch to the OFF position.

USEFUL TIPS
- It is not recommended to start processing frozen food blocks with a diameter bigger than 80 mm and colder than -15°C (59°F). Indeed, you could damage the knives' edges or overcharge the knife shaft bearing. Cut the meat previously to reduce it to a reasonable size.
- The meat should be deboned and precut before being introduced into the bowl for chopping. Use only prime ingredients suitable for the intended application.
- If working with the maximum bowl capacity, adding the product gradually with the knives already running is recommended.
- When the bowl is heavily loaded, or the cutting process is just beginning (the meat pieces are still relatively large, ice chips have been introduced, etc.), minimum cutting speed between 2000 to 3000 rpm and a slow bowl speed is recommended.
- Improper use such as overloading the bowl can cause the cutting process to be interrupted. Bowl and knife motor will automatically stop to prevent overheating. In this case open the knife lid and then switch off the cutter using the main switch. Remove (part of) the exceeding product and clear possible jam at the knife head. You may use the closed wrench to move blocked knives.
- The temperature display measures only the critical knives rotation area to control that with the high rubbing from the same the fat does not turn into oil. Temperature may vary a few degrees with the average temperature of the mixture.

Notice: when filling the bowl, do not use the motorized knife lid to flatten the protruding product. This could damage the lid lifter. Always disperse the product manually.

SLOW SPEED MIXING

To use the slow mixing function proceed as follows:
- While the knives are completely stopped, select MIXING from the working mode options in the part of the production screen.
- Choose the cutting and bowl speed with the programmable buttons or the + / - buttons on the display.
- Select the mixing direction depending on which direction (clockwise or counterclockwise) you want the knife head to rotate by pressing the mixing direction select button located in the center of the control panel. Each time you press the button the turning direction of the knives changes. You may use the options displayed in the mixing screen to program a warning message or automatically stop the process after an

elapsed time, bowl turns or temperature limits. Refer to section automatic stop options for more detailed information.
- Press the START button on the lower left side of control panel; the knives will start rotating slowly and the bowl will start turning.
- To stop the mixing function, press the red STOP button on the lower left side of control panel.

Notice: use the mixing function only when the product is chopped (chunks with a maximum size of 15 mm), do not use this function with unchopped product. It could damage the machine.

NOISE REDUCTION COVER

The transparent noise reduction cover features an automatic CE safety clearance of the cutting speed to 1000 rpm when opened and returning to the previous speed when closed. This feature significantly reduces the noise exposure of the operator during the production process. A small icon on the left side of the cutting speed area indicates if the noise reduction cover is open and the specified reduced speed. You may change the specified reduced speed in the technical service setup screen.

KNIFE LID

Generally, the knife lid should only be opened for cleaning and maintenance tasks. If you plan to charge big portions of meat with the hydraulic loader, it may be advised to open the knife lid before tilting the trolley to avoid meat piling up on the lid. Disperse the product manually, do not use the motorized knife lid to flatten protruding product.
- To open the knife lid press the open button.
- If you hold the button for more than 2 seconds, a yellow dot will appear and the lid will automatically open until the final point is reached.
- A notification will be displayed in the multi purpose context panel indicating the lid is open.
- To close the knife lid, tab the close button. For safety reasons you need to hold the button until the final position is reached.
- Once the lid has reached the final position and is fully closed, the notification will disappear.

NOTICE
- To open the knife lid, the noise reduction cover has to be opened first.
- Do not overload the bowl and close the knife lid pressing on the product, it could damage the closure mechanism.
- The knives can only start turning when the knife lid is fully closed and the lid open notification has disappeared.
- After pressing the stop button, the knives need some time to fully stop. It is not possible to open the knife lid while the knives are turning.

RETAINING PLATE

The removable retaining plate creates a smaller cutting space, in which fine meat emulsions are produced quickly and particularly fine. Without a retaining plate, the large cutting area is ideal for the production of raw sausage with a clean cut and less warming of the product.

OPERATION

To install the retaining plate:
- Remove the blue plastic plug on top of the knife lid.
- Fully open the knife lid.
- Insert the retaining plate with both hands from the cutting space inside of the knife lid.
- Tighten the stainless-steel fastening nut supplied with the retaining plate on top of the knife lid.

Notice: when operating the machine without the retaining plate, make sure the supplied blue plastic plug is installed in the knife lid to close the hole.

CONTROL SYSTEM

The control panel (HMI) has a 15” touch screen to control al functions of the cutter/chopper. It is connected to the control unit (PLC) and other vital parts of the cutter´s control system (such as speed drives) via internal, digital high-speed connections. It is also connected to an external, waterproof Ethernet port (RJ45) on the back of the machine. This allows to easily connect external devices, integrate the cutter/chopper in an existing network or provide remote service & support access to the machine. For more information, please see the chapter for connectivity options.

All data is stored in the control unit (PLC). In case of a malfunction of the control panel (e.g., broken display), it can be easily replaced with a new one.

Notice: to avoid damaging the touch screen’s plastic surface, use only the pads of your fingertips to press the buttons and the screen; never use your fingernails or any sharp-edged/pointed object.

TALSA CONTROL 4.0 SOFTWARE DESCRIPTION

HOME SCREEN

After switching on the main machine switch, the control system of the bowl cutter / chopper will power up and perform a self-test. After a few seconds, the home screen is displayed. You may select the operating language on this screen. In default mode, no login is required and the PRODUCTION screen will be displayed after a few seconds. If user authentication is enforced, the user needs to enter his user name and password in order to proceed to the next screen. Every user should have an own user name and password with the appropriate access level. To enter the user name tab on the field and introduce your user name with the display keypad, press enter to confirm. Repeat the same for the password, then press login. The PRODUCTION screen will be displayed with the options depending on your access rights. Please note, users with access level 1 (cleaning) will only see the CLEANING screen.

USER ADMINISTRATION AND PASSWORDS

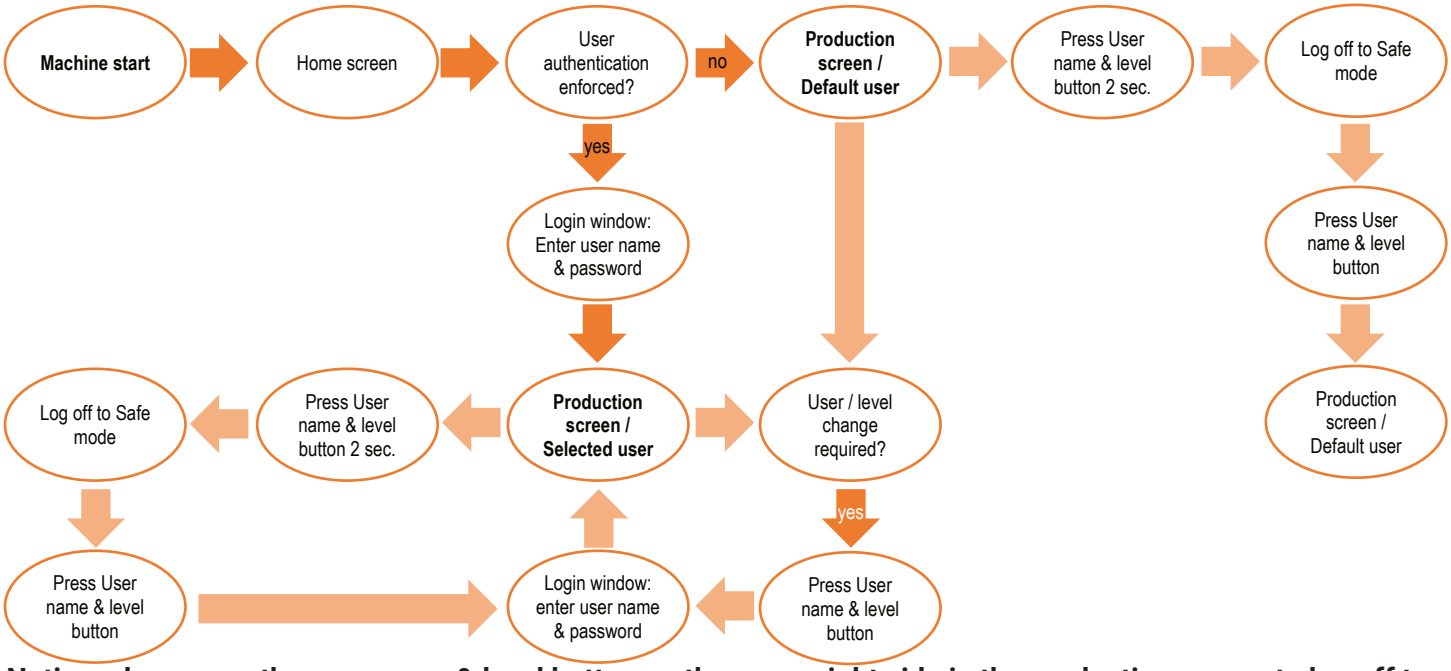
It is only possible to access certain functions in the control panel if the required level of operation has been activated. To enable the corresponding level of operation, it is necessary to enter a user name and password. The password guarantees that those modifications that have an effect on the behavior of the machine can only be made by people with sufficient knowledge. The cutter/chopper is set up to differentiate 4 levels (groups) of users:

User level (group)	Safe mode (0)	Cleaning (1)	Operator (2)	Administrator (3)- default-	Technical Service (4)
Description	Screen in safe mode, all control buttons disabled. User login required.	Operator / cleaning staff instructed to perform daily cleaning of the machine.	Operator instructed to operate the machine using production functionalities.	Responsible person instructed to operate the machine and perform routine maintenance tasks.	Instructed qualified person instructed to perform routine maintenance tasks and inspections.
Accessible screens	• Production: read only!	• Cleaning.	• Production. • Cleaning.	• Production. • Cleaning. • Setup. • Counters. • User administration.	• Production. • Cleaning. • Setup. • Counters. • Diagnostics.
Default user-ID & password		User name: ID1 Password: 1111	User name: ID2 Password: 2222	User name: ID3 Password: 3333	User name: ID4 Password: 4444

The machine is delivered with one default user for each level (group). The administrator can add and modify up to 5 users per group. Each user is identified by a unique user name (must start with an alphanumeric character) and the password (numeral). The default user names and passwords are shown in the table above. To add and modify users, user authentication enforcement in the technical service setup screen must be switched on.

Notice: for safety reasons, all default passwords should be personalized during the installation process!

User login/change using default user mode or enforced user authentication mode:
The cutter / chopper is delivered from factory in default user mode. To use enforced user authentication please mark the option on the Technical Service setup screen (administrator level or higher required).



Notice: always use the user name & level button on the upper right side in the production screen to log off to

OPERATION

the safe mode when you abandon the machine.

PRODUCTION SCREEN
When powered on, the cutter/chopper will start by default showing the PRODUCTION screen. This screen displays all controls to operate the machine. Depending on the machine model and purchased options, some control buttons might not be visible, e.g., the hydraulic loader/unloader buttons are only visible for machines including this option.

- The multi purpose context panel displays different information depending on the current process.
- Tab on the selection buttons on the left side of the screen, to enter the corresponding sub screens for recipes, user settings, notifications, technical service or cleaning screen. Access to information or adjustments in parts of the software not accessible with the ADMINISTRATOR (default) level may require login to a different user level with the required username and password.

The production screen incorporates all controls to perform the daily production tasks:

- Status bar displays date and time as well as current temperature.
- Red dot in the message indicator for counters or user messages indicates a new message. Tab on the icon to display message in multi purpose context panel.
- To select desired working mode CUTTING or MIXING press button in status bar. The selected working mode will light up green.
- Automatic stop options can be programmed/selected using corresponding controls in status bar.
- Current user level and name is shown on right side of status bar.
- STOP/START buttons: use green START button to confirm and start cutting or mixing process. Use red STOP button to stop or pause cutting or mixing process.
- Knife lid: use buttons to open (raise) and close (lower) knife lid. Green arrow indicates lid can be moved in desired direction, turns red when lid has reached final position (fully open or closed). Hold button >2 s.: yellow dot indicates lid automatically continues until its final point (only available to open lid).
- Bowl: use this button to move bowl slowly clockwise to distribute product evenly when loading bowl. Can be switched on in User settings screen.
- Hydraulic loader: use buttons to raise and lower loader. Green arrow indicates loader can be moved in desired direction, turns red when loader has reached final position (fully up or down).
- Hydraulic unloading arm: use buttons to lower and raise unloader arm. Green arrow indicates arm can be moved in desired direction, turns red when the arm has reached final position (fully up or down). Hold button >2 s.: yellow dot indicates unloader arm automatically continues until final upright position.
- Manual unloading arm: tab unloader disc speed button to access unloader disc speed adjustment controls in multi purpose context panel.
- Use pre-programmed fast selection buttons or [+] and [-] buttons to modify knife and bowl speed at any time. The selected speed will be highlighted green.
- The exclusive EcoCut power control system enables control of the machine power necessary to achieve the desired cutting results at any time of the process.
- The multi purpose context panel displays different information without the need to switch between various screens. Automatically displays relevant information depending on current operation.
- Selection buttons provide access to subscreens for recipes, user settings, notifications, technical service or cleaning screen.

CUTTING AND MIXING MODE

Talsa Suprem bowl cutters/choppers offer variable speeds for cutting and bowl in high speed CUTTING mode as well as slow MIXING mode. Select the desired working mode by pressing the CUTTING button or MIXING button. The selected working mode is light up green. The cutting and bowl speed control panels display the selected speeds.

Each panel has 4 programmable buttons for fast selection, which can be programmed in the user settings screen. The speed can be adjusted exactly to the desired value pressing the [+] and [-] buttons:
- Cutting speed in CUTTING mode: adjust speed in 100 rpm steps from 500 to 5000 rpm.
- Bowl speed in CUTTING mode: adjust speed in 1 rpm steps from 4 to 20 rpm.
- Cutting speed in MIXING mode: adjust speed in 10 rpm steps from 50 to 500 rpm.
- Bowl speed in MIXING mode: adjust speed in 1 rpm steps from 4 to 20 rpm.

When MIXING is selected, the default rotation direction of the knives is backwards (no cutting). Change the rotation direction of the knives (backward-mixing / forward-slow cutting) with the button located between cutting speed control panel and the EcoCut power control panel.

Once the desired cutting speed and bowl speed have been adjusted, press the START button to confirm and start the cutting or mixing process. The control system first starts the knives and after a short delay the bowl starts turning. The electronic motor control drive gradually ramps up the cutting speed to the selected value.

NOTE
- While the noise reduction cover is open, cutting speed will automatically reduce to 1000 rpm. After closing the cover, the cutting speed will return to the previous speed.
- Talsa Suprem bowl cutter/chopper have a build in efficiency function that will automatically reduce cutting speeds over 4000 rpm to 4000 rpm after 60 seconds. If necessary, the timer can be adjusted between 30 and 180 seconds in the technical service setup screen.

AUTOMATIC STOP OPTIONS

The automatic stop option controls are located in the upper right side of the production screen. It is possible to program the cutter to stop automatically after:
- Elapsed time.
- Turns of the bowl.
- Temperature limit (automatic stop or warning).

In order to program the desired value tab on the respective icon to enable the stop option. The icon will turn red. Then tab on the value field and introduce the desired value using the display keypad. The counter will start once you activate the process by pressing the green START button. The elapsed time and/or bowl turns will be displayed. The bowl cutter will automatically stop the process when the programmed value is accomplished. If various stop options are enabled, the bowl cutter will stop when the first programmed value is accomplished. The temperature counter offers the possibility to choose between automatic stop and a warning message. If you select the warning message, the bowl cutter will not stop when the programmed temperature limit is reached, but show a warning message in the multi purpose context panel. If you press the red STOP button

before the programmed parameters are accomplished, the process will be paused. In the multi purpose context panel you have the option to continue or exit the process. If you don´t want to use a programmed stop option, just tab on the icon. It will turn black to indicate that the option is disabled.

ECOCUT POWER CONTROL PANEL

The Talsa EcoCut power control system is an exclusive feature introduced with the Suprem bowl cutter/chopper series. It enables the user to control the machine power necessary to achieve the desired cutting results at any time of the process. The left display shows the current knives velocity (rpm). The color scale is indicating the most efficient rotational speed depending on the cutter model and chosen motor option. The right display shows the percentage of the total available knife motor power used at this moment. The lower this value, the less is the actual power consumption of the machine, i.e. higher efficiency is achieved. Generally it is recommended to work with cutting speeds between 2000 and 3500 rpm. The cutter's knife motor reaches its highest torque already at 3000 rpm. Cutting speed over 4000 rpm should only be used for a short period, as high speeds cause higher consumption and heating of the cutting system. Talsa Suprem bowl cutter/chopper have a build in efficiency function that will automatically reduce cutting speeds over 4000 rpm after 60 seconds. If necessary, this timer can be adjusted between 30 and 180 seconds in the technical service setup screen. The motor power display also gives a good indication for the maximum load of the bowl in dependence of the consistency of the product. Generally, a soft product mix allows bigger batches, while tough/stiff product mixes reduce the maximum batch capacity. Depending on the actual load and consistency of the mixture, the motor power display will show the current workload of the motor. The workload should not exceed 100% over a longer period. The build in motor workload control system allows the cutter to work at up to 125% of its nominal power for short periods (marked yellow/red in the scale of the motor power display). However the control system will automatically reduce the bowl speed if the motor is exceeding the nominal power for more than approx. 30 seconds to relieve pressure from the knives and reduce the overall workload. This protection may be switched off in the technical service setup screen. If the workload continues over 100% for more than approx. 60 seconds, the control system will stop the motor to prevent overheating and damages of the drive/motor system. In this case, the knives and bowl will be stopped and a warning message is displayed on the screen. Once the drive/motor system has cooled down, the cutter will be operational again.

NOTICE

- The workload of the cutter/chopper should not exceed 100% over a longer period as this may harm/damage the drive/motor system.
- The highest efficiency of the cutter/chopper is at cutting speeds between 2000 and 3500 rpm.

MULTI PURPOSE CONTEXT PANEL

The multi purpose context panel is used to show different information without the need to switch between various screens. The display will automatically show the relevant information depending on the current operation. Several subscreens are available:

- Status messages: knife lid open/close status, process status messages.
- Text messages: user messages, service messages.
- Control areas: recipe and programmed stop options controls, discharger disc speed selection.
- Machine diagnostic information: power consumption graph.
- Notifications: error messages.

RECIPES

To enter the recipes selection screen press the RECIPES button on the top left side of the production screen. The recipes function included as standard in TalsaControl 4.0 allows the user to standardize recurring processes in 5 recipes with up to 20 steps each. To create, store and delete a recipe you need to be logged in at administrator level. Stored recipes can be easily activated by any operator selecting the desired recipe from the recipe selection screen. If more than 5 recipes are needed, a more comprehensive program version can be purchased optionally. Please contact your dealer for further information.

CREATE & STORE RECIPES


Edit recipes


Erase recipes (press >1s)


Save & exit


Add step


Last step


Next step


Previous step


Automatic start: the following step will automatically start upon completition of the previous step.


Manual start: the operator has to confirm the start of the following step.


Noise reduction cover: the following step will automaticall execute once the cover is closed.


Cutting. Introduce desired knife and bowl speed.


Mixing. Introduce desired knife and bowl speed. Select knife rotation direction.


Ingredients list. You may introduce up to 5 ingredients in one step in the correspondig fields.


Stop by time. Introduce desired time (mm:ss).


Stop by bowl turns. Introduce desired bowl turns.


Stop by temperature. Introduce max. temperature.

OPERATION

The following shows the control buttons to create, edit and store recipes:

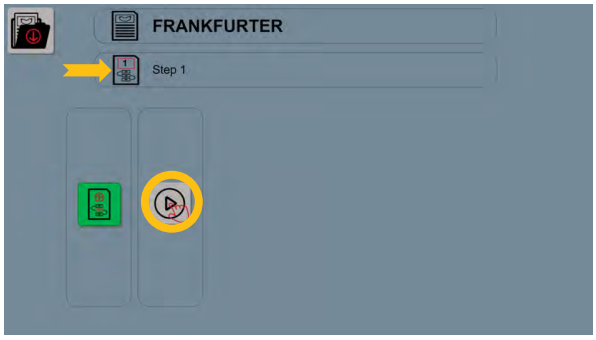
1

On the recipe selection screen, press the EDIT RECIPES button on the right side of the desired recipe.

2

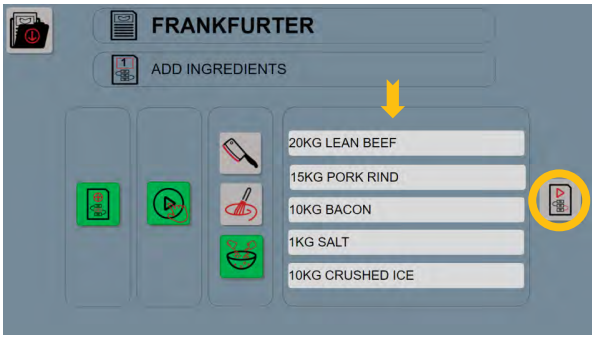
Introduce the desired recipe name in the corresponding field.
Then press ADD STEP button to create step 1.

3



Introduce a name for step 1 and select the execution mode.
Note: the first step always has to be executed manually.

4



Select the desired step action, e.g.: ingredients list.
You may introduce up to 5 ingredients in the corresponding fields.
Press NEXT STEP button.

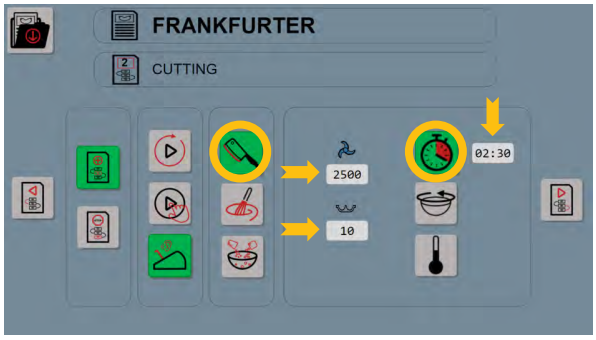
5

Press ADD STEP button to create step 2.

6

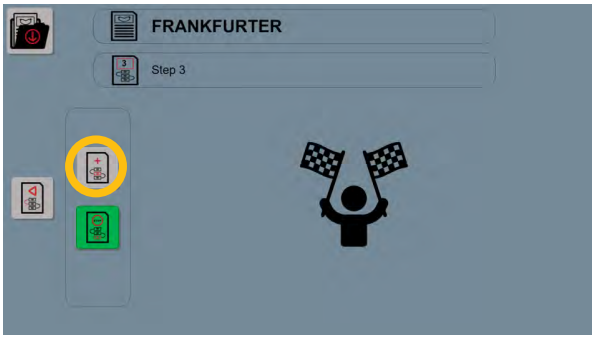
Introduce a name for step 2 and select the execution mode, e.g.: noise reduction cover. The step will automatically execute once the cover has been closed.

7



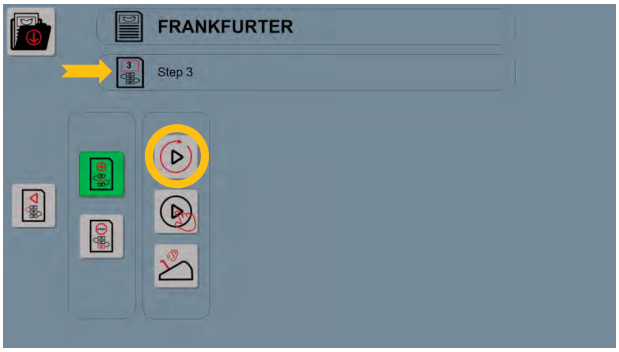
Select the step action, e.g.: cutting. Introduce the desired knife and bowl speed, activate a stop option: e.g.: by time. Introduce the desired time. Press NEXT STEP button.

8



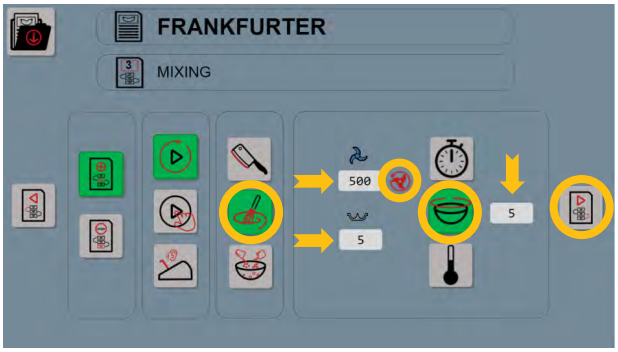
Press ADD STEP button to create step 3.

9



Introduce a name for step 3 and select the execution mode, e.g.: automatic. The step will automatically start upon completition of the previous step.

10

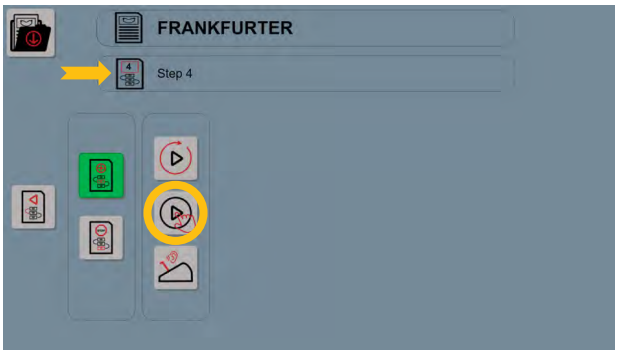


Select the step action, e.g.: mixing. Introduce desired knife and bowl speed & knife rotation direction, activate stop option: e.g.: by bowl turn. Introduce the desired turns. Press NEXT STEP button.

11

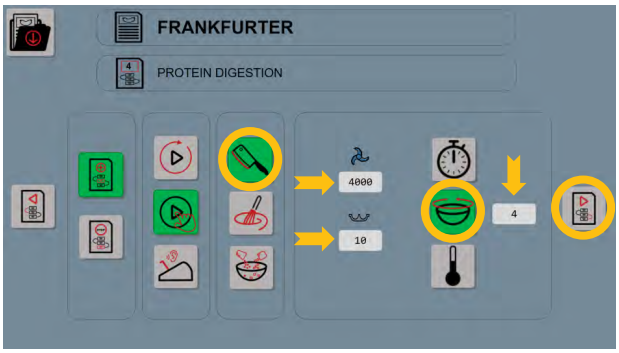
Press ADD STEP button to create step 4.

12



Introduce a name for step 4 and select the execution mode, e.g.: manual. The operator has to confirm the start of the following step.

13



Select the step action, e.g.: cutting. Introduce the desired knife and bowl speed, activate a stop option: e.g.: by bowl turns. Introduce the desired turns. Press NEXT STEP button.

14

Press LAST STEP button. To finalize the recipe, press SAVE & EXIT button on the top left. (>1s.)

15

The recipe has been created and can now be selected from the recipe selection screen. To edit the recipe press EDIT RECIPES button. To delete press ERASE RECIPES button. (>1s.)

OPERATION

SELECT & EXECUTE RECIPES

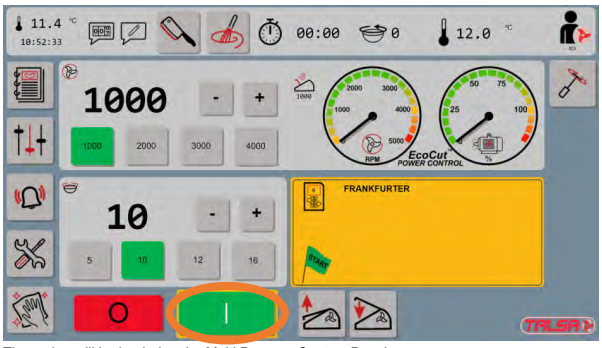
1

Press RECIPES button on the left side of the production screen.

2

Select the desired recipe from the list by pushing the named button.

3

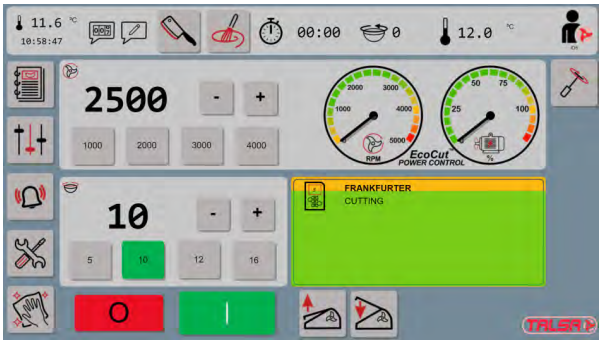


The recipe will be loaded to the Multi Purpose Context Panel.
Press green START button to initiate the recipe.

4

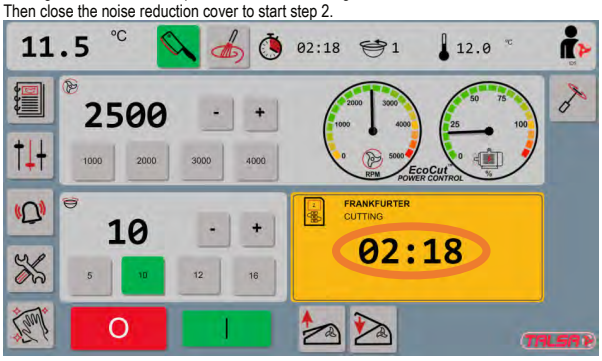
Follow the instructions given in the Multi Purpose Context Panel.
Add ingredients to the bowl, press confirm when all ingredients are added.
Then close the noise reduction cover to start step 2.

5



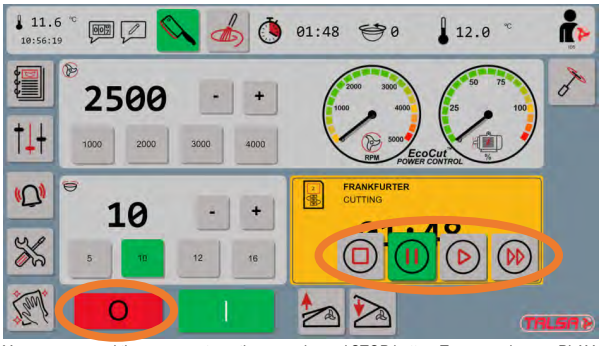
The configured parameters will be loaded to the screen and the cutter will start the process.

6



During execution of a programmed step, all configured parameters are displayed on the production screen. Additionally the remaining time/bowl turns until the end of the step are displayed.

7

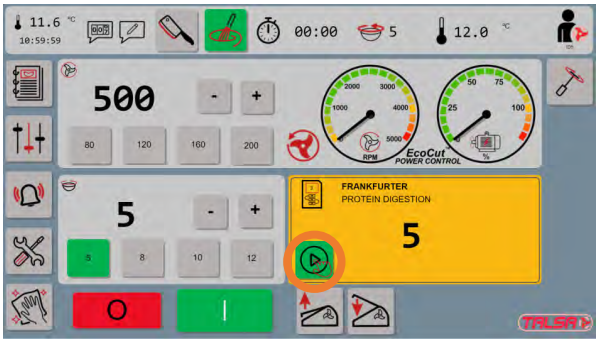


You may suspend the process at any time pressing red STOP button. To proceed, press PLAY, to abandon the current recipe press STOP. To go to the next step, press FORWARD.

8

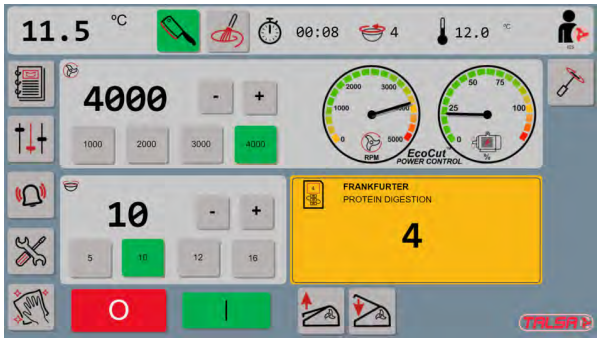
If a step is programmed with automatic start, it will be executed automatically after finalization of the previous step.

9



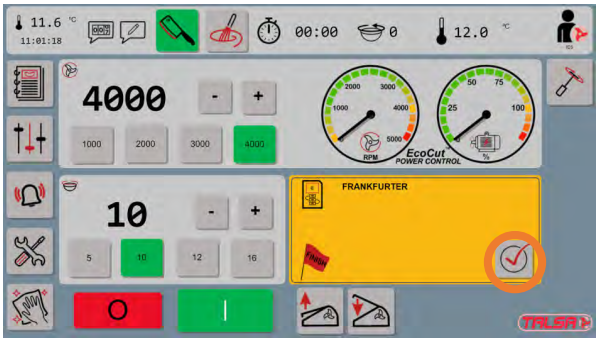
If a step is programmed with manual start, it will be executed when the operator confirms pressing MANUAL START button.

10



The cutter will continue with the next step.

11



When all steps have been executed, the cutter will stop.
Confirm the end of process pressing CONFIRMATION button.

RECIPES CONTROL BUTTONS

 Enter the recipe selection screen.

I Press START button to initiate execution of a recipe.

O Press STOP button to suspend the execution of a recipe.

 [flashing] Proceeding to automatically start next step.

 [flashing] Press MANUAL START button to proceed to next step.

 [flashing] Close noise reduction cover to proceed to next step.

 Press the PLAY to continue suspended step.

 Press the STOP to abandon suspended recipe.

 Press the FORWARD to go to the next step.

 Step suspended.

 CONFIRM (Ingredients added, recipe complete).

USER SETTINGS

The user settings screen allows you to adjust the following settings:

PROGRAMMABLE FAST SELECTION BUTTONS

- Programmable fast selection buttons for cutting and bowl speed in CUTTING mode.
- Programmable fast selection buttons for cutting and bowl speed in MIXING mode.
- Programmable fast selection buttons for the unloader disc speed. (optional)

To program the buttons just tab on the button and enter the desired value using the display keypad. Please observe the allowed minimum and maximum values for each function.

OPERATION

DISPLAY LANGUAGE
To select the desired display language simply tab on the flag representing the available languages.

DISPLAY BRIGHTNESS
Use the + / - buttons to adjust the display brightness.

SET TIME
Tab on the time field to open the display keyboard and set the time.

SET DATE
Tab on the date field to open the display keyboard and set the date. Date format is DD/MM/YYYY.

MANUAL BOWL TURN
Mark the box to display the manual bowl turn button on the production screen. This allows you to slowly turn the bowl counterclockwise while filling it to distribute the product more evenly. Please note that the knives are not turning using this button.

REMOTE SUPPORT BUTTON
Pressing the remote support button enables the cutter/chopper to connect to the Talsa remote support cloud. (Provided the cutter is connected to the internet – more information please see connectivity options.) While the cutter is connected to the Talsa remote support cloud, the remote support button is shown on the production screen with a flashing red/green border. A service technician can now access the cutter's control system for remote support and trouble shooting. While the service technician is connected to the cutter, the remote support button turns yellow with a flashing green/red border to remind the user, that the machine is operated remotely. To disconnect the remote support function, uncheck the box for remote support in the user settings screen.

DANGER
- While connected to the Talsa remote support cloud, the machine can be operated entirely from remote. Stay away from the loader/unloader device and any other movable parts of the machine.
- ALWAYS keep hands safely away from the machine's moving parts. NEVER insert hands or other objects under the knife lid while the machine is connected to the Talsa remote support cloud.
- NEVER leave the machine unattended while connected to the Talsa remote support cloud.

Notice: it is strongly recommended to maintain a telephone connection to the remote support technician as long as the machine is connected to the Talsa remote support cloud.

NOTIFICATIONS

The notifications screen provides the user and service personal with information about incidents occurred during operation of the machine. It displays date, time and the incident message, as well as an indication if the notification has been acknowledged or is still active. A maximum of 20 notifications will be displayed on the screen, preferentially the ones not acknowledge/active. All notifications are stored in the notifications log which can be download as a file.

TECHNICAL SERVICE SCREENS

This screen displays an overview of all available technical service screens.
- Technical service machine configuration screen.
- Technical service setup screen.
- Technical service counters screen.
- Technical service diagnostics screen.

To access a particular screen simply tab on the corresponding tile. To return to the overview screen tab on the screen icon on the top left corner of the screen. To return directly to the production screen tab on the exit icon on the upper right corner.

NOTE: information in these screens cannot be modified by the user. Login with technical service user ID is required to access/modify data. See user administration for more information.

SETUP SCREEN

The technical service setup screen allows the service personal to configure/modify the machine's setup to the needs of the user. The following parameters can be configured:
- Temperature scale: mark the box to display temperature values in Celsius or Fahrenheit.
- Temperature offset: allows calibration of the temperature probe to adjust minor deviations.
- Ventilation: the cutter has a built-in ventilation system to protect the electronic components and motors from overheating and condensation. The temperature limit can be set so that the ventilation starts at temperatures between 10-35°C (50-95°F). The ventilation is automatically stopped as soon as the internal temperature drops by 5° below the set value. It is therefore possible that the fan runs for some time even when the motors are switched off. The ventilation is stopped as soon as the cutter is switched off at the main switch.
- The build in motor workload control system allows the cutter to work at up to 125% of its nominal power for short periods (marked yellow/red in the scale of the motor power display).
- The control system will automatically reduce the bowl speed if the motor is exceeding the nominal power for more than approx. 20 seconds to relieve pressure from the knives and reduce the overall workload. Uncheck the box to switch off this protection.
- Max. time for cutting speed > 4000 rpm: the Suprem bowl cutters/choppers a designed to operate at cutting speeds up to 5000 rpm. Nevertheless, it is not recommended to operate the machine at high cutting speeds over 4000 rpm for prolonged time, as high speeds cause increased consumption and heating of the cutting system. The machines have a build in efficiency function that will automatically reduce cutting speeds over 4000 rpm to 4000 rpm after 60 seconds (default parameter). This timer can be adjusted between 30 and 180 seconds.
- Max. cutting speed with open noise protection cover: as a health & safety measure, the bowl cutter/chopper should not operated at cutting speeds over 1000 rpm (increased noise pollution). Therefore, the machine will automatically reduce the cutting speed to the parameter when the noise protection cover is opened. The previous speed will automatically resume when closing the noise protection cover. The default setting is 1000 rpm, it can be modified to values between 500 - 2000 rpm depending on the customers needs.
- User authentication enforcement: in default mode, no login is required when starting up the machine and

the PRODUCTION screen will be displayed after a few seconds.
- If user authentication is enforced, the user needs to enter user name and password when starting the machine in order to proceed to the next screen. In this case, the user will have access to the screens depending on the security level assigned to his user ID. For more information please see user administration.
- User administration: if authentication enforcement is selected, use the add user and delete user buttons to manage users.

DIAGNOSTICS SCREEN

The diagnostics screen provides the service personal with information about the state of vital parts of the machine without having to open the machine body or access the electrical cabinet. It even allows to reset some parts of the control system in case of a failure. Status information is displayed for the following parts:
- Temperature sensor located in the cavity of the knife lid: sensor and connection status.
- 24VDC Electronic fuse (-EF1): status, possibility to reset fuse from panel.
- Hydraulic group protection (-5Q1) (optional).
- Knife lid.
  -Motor protection (-4Q1).
  -Safety sensor: open/closed.
- Knife drive.
  -Knife motor protection (-1Q1).
  -Internal temperature.
  -General status, possibility to reset drive from panel.
- Bowl drive.
  -Bowl motor protection (-2Q1).
  -General status, possibility to reset drive from panel.
- Unloader disc drive (optional).
  -Unloader disc motor protection (-3Q1).
  -General status, possibility to reset drive from panel.

Tap on any drive image to access detailed drive status view. Scan QR code with smartphone to access technical information.

- PLC: general and I/O status, internal battery level. Tap on PLC image to access detailed PLC status view. Scan QR code with smartphone to access technical information.
- Emergency stop button: locked/unlocked status.

DANGER - RISK OF ELECTRIC SHOCK!
Danger of death by electric shock in case of contact with live components of the machine.
Even if the main switch is turned off, certain components will still remain in tension. The DC link capacitors of the frequency converters need some time to discharge.
- Only qualified personnel with specific training for this purpose are authorized to carry out work on the electrical circuit of the machine.
- When working on the electrical circuit of the machine, turn off the main switch and secure it with a padlock to prevent it from being reconnected.

- Do not touch any electrically active part of the machine.
- After disconnecting the mains voltage, always wait for the capacitors of the intermediate circuits to be discharged.

COUNTERS SCREEN

The counters screen allows the service personal to configure custom service messages based on the operating hours of the knife motor.

- Use the slider to enable/disable a counter.
- Set the desired knife motor uptime (hours) to trigger the message.
- The counter field indicates the hours elapsed since the counter has been set/reseted.
- Pressing the reset button restarts the counter. (Set elapsed time to 0.)
- Tab on the message field to enter your custom service message using the display keypad.

NOTE: you can always check the elapsed time since a counter was set in the counters screen. The overall knife motor uptime is displayed in the machine drawing.

Please refer to maintenance for recommended service intervals.

- When the configured hours have elapsed, a red dot in the service message icon will indicate a new message.
- Press the service messages icon to display the message in the multi purpose context panel.
- To close the message, tab again on the service message icon.
- The message will be displayed in the multi purpose context panel until the counter has been reset or disabled in the counters screen.

MACHINE CONFIGURATION SCREEN

The configuration screen contains information about the machine's configuration:

- Machine model.
- Voltage.
- Maximum current draw.
- Machine serial number.
- Purchased options:
  -Hydraulic group (hydraulic loader and unloader device).
  -Manual unloader device with motorized disc.
  -PowerPlus option (stronger knife motor).
  -Recipes.
- Control panel (HMI) settings.

Note: information in this screen cannot be modified by the user, only by Talsa technical service.

CLEANING SCREEN

The cleaning screen incorporates all controls to perform the daily cleaning. To activate this screen press the

cleaning screen button on the left side of the production screen for more than 2 seconds. In the cleaning screen, all other screen access buttons are disabled. No controls for the knives are displayed to avoid accidental power up of the knives.

- Use the knife lid up and down buttons to open/close the knife lid.
- Use the bowl turn buttons to turn the bowl slowly in both directions. Pressing the button longer than 2 seconds will lock the bowl turning. A yellow dot indicates the bowl is locked turning until the button is pressed again.
- Press the CENTER button automatically position the bowl drain plug in the front part of the bowl cutter. Use an open ended wrench to loosen the plug.

Depending on the purchased options, the control buttons for unloader disc, hydraulic loader and unloader will be shown on the screen.

- Use the unloader disc button to switch on/off slowly rotating of the unloader disc.
- Use the unloader arm buttons to lower or raise the hydraulic unloader arm. The unloader device can only be moved when the loader has reached its initial (down) position. The red arrow in the up button indicates that the unloader arm has reached the mechanical end stop.
- Use the loader trolley buttons to raise or lower the hydraulic loading device. The loader device can only be moved when the unloader has reached its initial position. The red arrow in the down button indicates that the device has reached the mechanical end stop.

To exit the cleaning screen press the cleaning screen button.

WARNING

- DO NOT place your hands near the cutting edges of the knives without wearing adequate protection such as gloves made of metal mesh or other cut-resistant material.
- USE EXTREME CARE when handling the knife assembly. Be careful that you do not cut yourself or drop it on your feet or on the floor.

CAUTION

- ALWAYS use appropriate protection (latex gloves, plastic apron, etc.) when manually cleaning the machine.

NOTICE

- The knife lid, loader and unloader device can only be moved when the noise reduction cover is open.
- Please refer to cleaning for more detailed information about cleaning the bowl cutter/chopper.
- Talsa control 4.0 software offers the possibility to create users with access limited to the cleaning screen only. Please refer to user administration for more information.
- Do not clean the machine, especially the touch panel and its surrounding area with high pressure jet cleaners. It is recommended to use damp cloth and a soft brush to clean the touch panel.

CONNECTIVITY OPTIONS

The Talsa Suprem bowl cutter/chopper series offers the possibility for technical service personnel to connect to the machine's control system using an internet connection facilitating remote service and support tasks as well as the integration of the machine in a local/remote monitoring systems.

SETTING UP THE REMOTE SERVICE & SUPPORT ACCESS VIA TALSA REMOTE SUPPORT CLOUD (GATEMANAGER)

- Connect the standard ethernet plug on the back side of the bowl cutter/chopper with a standard ethernet cable (Cat. 5 or higher) to any ethernet LAN port on your internet router.
- Make sure your router is switched on, connected to the internet and DHCP is enabled on the router providing a local IP to the bowl cutter/chopper (only IP v.4 addresses are supported).
- Allow the machine to establish a remote connection pressing the remote support button on the user settings screen.
- The Talsa control system will automatically establish a secure VPN connection to the Talsa remote support cloud (GateManager).
- The remote technical service operator can now establish a connection to the control panel and take over the control of the machine.

SETTING UP THE REMOTE SERVICE & SUPPORT ACCESS IN A LOCAL NETWORK (LAN)

- Connect the standard ethernet plug on the back side of the bowl cutter/chopper with a standard ethernet cable (Cat. 5 or higher) to any ethernet LAN switch in your network.
- Make sure a DHCP server is enabled in your local network providing a local IP to the bowl cutter/chopper (only IP v.4 addresses are supported).
- Allow the machine to establish a remote connection pressing the remote support button on the user settings screen.
- Enter the local IP of the bowl cutter/chopper in any browser of a PC connected to the same local network (IP address range). Your browser will establish a secure https connection to the bowl cutter/chopper using the web viewer interface.
- A technical service operator can now access the control panel and take over the control of the machine.

DANGER

- While connected to the Talsa remote support cloud, the machine can be operated entirely from remote. Stay away from the loader/unloader device and any other movable parts of the machine.
- ALWAYS keep hands safely away from the machine's moving parts. NEVER insert hands or other objects under the knife lid while the machine is connected to the Talsa remote support cloud.
- NEVER leave the machine unattended while connected to the Talsa remote support cloud.

NOTICE

- Remote service & support access is not designed to remotely operate the bowl cutter/chopper. Only for service & support tasks!
- It is strongly recommended to maintain a telephone connection between the remote support technician and the operator in front of the machine as long as it is connected to the Talsa remote support cloud.

USER MESSAGES

Talsa control 4.0 software offers the possibility to create/edit short custom user messages that will be displayed in the multi purpose context panel.

- To create a new message, tab on the user message icon in the status bar.
- The user message field is displayed in the multi purpose context panel. Tab on the message field to open

OPERATION

the display keyboard and write the desired message.
- The maximum length of a message is 140 characters.
- Hit ENTER to safe the new message and close the message field.
- A red dot on the user message icon indicates a new message.
- To read a new message, tab on the user message icon. The message is displayed in the user message field.
- To close the user message field, tab again on the user message icon. They message will continue active.
- To acknowledge the message and close the user message field tab on the confirmation button. The red dot in the user message icon will disappear.

NOTE: only one message can be created at a time. The message will remain visible in the user message field until it is overwritten by a new message.

MAINTENANCE

CLEANING INSTRUCTIONS

The machine must be cleaned daily, both before and after use. Since all its components are easily accessible, the Talsa cutter is easy to clean with warm water and a mild detergent. Never use bleach or any abrasive cleaners which might damage the stainless steel or other materials.

For proper cleaning, proceed as follows:
- Press the CLEANING button to enter the cleaning screen. Only manipulate the knife lid and other accessories from the CLEANING screen to avoid accidentally turn on of the knives. For more information about the available functions in the CLEANING screen, please see cleaning screen.
- After every operating session, carefully clean the knife-head assembly, the knife shaft and bushing gasket, the bowl, the safety guard, the interior part of the knife lid and the transparent noise reduction cover, the hinge of the cover and if necessary the cover holding screws with a brush.
- The knife head assembly (knives and spacer rings) should be removed, inspected and cleaned thoroughly under running water after every operating session. See dismantling the knife head.
- To remove the lid/bowl friction band, pull the knobs and take out the friction band. Thoroughly clean and reassemble.
- The bowl has a drain plug for liquids. Use bowl center button in the cleaning screen to position the drain outside the bench area. Remove the plug with an open wrench to easily drain cleaning products and water from the bowl. Don’t forget to tighten it when finished with the cleaning.
- After cleaning, the machine, its components as well as the tools must be dried and greased with oil or food grease, storing them separately without mounting them.

DANGER - ELECTRICAL HAZARD!
- NEVER wet or dampen the electrical components (switches, cables, etc.).

MAINTENANCE

WARNING
- DO NOT place your hands near the cutting edges of the knives without wearing adequate protection such as gloves made of metal mesh or other cut-resistant material.
- USE EXTREME CARE when handling the knife assembly. Be careful that you do not cut yourself or drop it on your feet or on the floor.

CAUTION
- ALWAYS use appropriate protection (latex gloves, plastic apron, etc.) when manually cleaning the machine.
- ALWAYS rinse the machine thoroughly after using any detergent or disinfectant in order to prevent contamination of the food.

NOTICE
- It is extremely important to keep clean the surfaces holding the knives and separating rings. A buildup of food residue on these surfaces creates stress points that may result in micro fissures that can damage or break knives.
- DO NOT wash the knives in water hotter than 60°C (140°F) or colder than 10°C (34°F). DO NOT wash the knives immediately after using the machine since abrupt temperature changes could result in internal micro fissures or deformations.
- NEVER use a jet cleaner with high water pressure to clean or rinse any part of the machine, especially around ventilation holes or near the bowl bearings.
- DO NOT use any abrasive products, especially those that could damage the stainless steel, scratch the plastic bowl cover or deface the warning stickers and markings.
- When using detergents, disinfectants or maintenance oils, follow the manufacturers' special instructions.

We recommend the use of the following HENKEL brand cleaning and disinfecting products:

Product	Name	Observations
Neutral degreaser with pH 7.	TOPAX 10	Due to its neutral pH, no special precautions are necessary. Rinse thoroughly.
Degreaser for manual cleaning.	RIK	Use appropriate precautions and safety gear. Rinse thoroughly.
Alkaline degreaser combined with a disinfectant.	TOPAX 68	Contains corrosion inhibitors. Use appropriate precautions and safety gear. Rinse thoroughly.
Disinfectant based on quaternary ammonium salts.	TOPAX 91	Use appropriate precautions and safety gear. Rinse thoroughly.

ALWAYS follow the manufacturer's instructions carefully when using these or any other products.

GENERAL CLEANING RECOMMENDATIONS

Steps	Products	Tools	Observations
Superficial cleaning.		Spatula.	Remove large pieces of residue, dismantling smaller parts if necessary.

MAINTENANCE

Steps	Products	Tools	Observations
Extensive cleaning.	Mild detergent.	Brush, soaking tub.	Let the product work approximately 15 minutes.
Rinsing.	Warm water.	Sponge, tub.	Warm water 40/50ºC (100/120º F).
Inspection.			Visually examine all accessible parts, especially vital components and those subject to stress and wear.
Disinfecting.	Disinfectants.	Sponge, cloth.	Perform after completing all other cleaning operations.
Rinsing.	Fresh water.	Sponge, tub.	ALWAYS rinse the machine thoroughly after using any kind of detergent or disinfectant.
Drying.		Cloth.	Be sure to thoroughly dry all cleaned components.
Maintenance.	Lubricating oil.	Cloth.	External machine parts.

RECOMMENDED CLEANING INTERVALS

Interval	Cleaning area	Product	Tools
Daily.	Bowl, safety guard, knife shaft, inside of knife lid, transparent noise reduction cover, knives and knife head.	Mild detergent, warm water.	Sponge, cloth.
Every two weeks.	Bowl holder and surrounding area.	Mild detergent, warm water.	Sponge, cloth.

NOTE: the above cleaning intervals are suggested for companies with just one work shift. The cutter should be cleaned more frequently if it is used for multiple shifts each day.

STAINLESS STEEL CARE

Notice: never use aggressive cleaners with stainless steel such as bleach or similar chlorine derivatives products. If you have used it, never leave acting, rinse immediately with plenty of water and dry thoroughly.

It is uncommon, but possible, that small traces of rust or oxidation points may be observed on the machine. This may be due to:

- Welding impurities.
- Food fragments adhering to the surface.
- Pits resulting from use of aggressive cleaners such as bleach or similar chlorine derivatives products.
- Moisture that remains after cleaning with water. ALWAYS wipe dry all components that have been cleaned.

To remove these rust spots simply use a liquid stripper with a cloth, or clean with Scotch Brite.

HARD STEEL KNIVES CARE

Cutter knives in general, as well as the BE Maschinenmesser brand installed on Talsa cutters, are made of highly durable, tempered cutlery steel made in Germany. It is not recommended to use stainless steel, which is weaker, become blunt and wear. To prevent pitting (corrosion) it is important to:

- Clean knives with warm water 40 - 50°C / 100 - 120°F.
- Do not use aggressive cleaners such as bleach or similar chlorine derivative products, only detergent/soap and/or a mild disinfectant.
- Rinse and thoroughly dry all wet parts.
- Moisten knives lightly with food oil.

In this way, the knives will be preserved in perfect condition and without rust particles.

MAINTENANCE

Failures caused by insufficient or inadequate maintenance can lead to costly repairs, prolonged work stoppage, as well as invalidation of warranty. For this reason it is essential that the maintenance of the machine is adequate and carried out regularly. The correct operation and duration of the machine depend on many factors, but also on a correct maintenance. It is very important to monitor the knives for proper sharpness. Worn or damaged knives should be sharpened or replaced per the instructions in the section for sharpening the knives. All electrical and mechanical repairs must be carried out by a qualified specialist with proper training for the work required.

TRANSMISSION BELT

Check the transmission belt regularly once a month, observing correct positioning, tension and wear, and if necessary, make the adjustment. Alignment: pay attention that the pulley, after tensioning, has an alignment exactly parallel to the axis and that the channels are located in a single line (do not tension the elements on one side only). Changing the belt: open the access cover on back of the bowl cutter. Loosen the nuts on the inner thread rods Use an Allen wrench to screw in the rod and raise the motor fixation plate to release the tension of the belt. Now it can be easily assembled and disassembled. The pulley channels should be smooth, clean and free of oils and grease. Always mount the belt on the pulley with care, without violence, to avoid any damage. To tension the belt, unscrew the inner thread rods, then tighten the nuts on the outer thread rods to adjust the tension. New belts should be checked after 15 - 30 hours of service whether they require adjustments.

WARNING
- ALWAYS unplug the machine before proceeding with maintenance and inspection.
- ALWAYS follow the safety instructions in this manual during maintenance and inspection operations.

WARNING
- Before you begin any maintenance or repair work in the machine's interior, be sure to open the knife lid in order to release the pressure on the pneumatic springs.

NOTICE
- Use a pressure gauge to adjust the tension of the belt to the correct value. Insufficient belt tension will lead to increased vibrations, while excessive belt tension will damage the motor and knife shaft bearings.
- It is recommended to substitute the belt after approximately 25000 hours of service.

MAINTENANCE

ELECTRIC SYSTEM

Electrical installations must be checked once every six months. After 1 month after the installation of the machine, check that the terminals of all the electrical connections are tight. Regularly check the seals of the gaskets in the control cabinet and the electrical elements of the machine. Make sure that delicate parts (switch cabinet, pushbutton plate, switches, etc.) do not receive any direct water jet or high pressure detergent.

DANGER - ELECTRICAL HAZARD!

- Even if the main switch is turned off, certain components will still remain in tension.
- Only qualified personnel with specific training for this purpose are authorized to carry out work on the electrical circuit of the machine.
- If the electric cord becomes damaged, have it replaced immediately with a cord of identical specifications; your local distributor can supply you with one.

MAINTENANCE AND INSPECTION INTERVALS

NOTICE

- The following maintenance and inspection intervals are suggested for a cutter under normal use.
- The cutter should be inspected and maintained more frequently if it is used heavily.

Although it is difficult to give specific advice on inspection, maintenance or periodicity for spare parts, as it depends on many factors relating to the use of the machine, we can only make some recommendations. The user, however, is solely responsible for formulating and monitoring the inspection and maintenance routine that should reflect the actual use of the machine. Our authorized distributor will be able to extend the information on this subject.

Maintenance and inspection intervals	Installation	Daily	Weekly	Monthly	Biannually	Annually
After pressing the EMERGENCY STOP button, the drive elements must be in a non-voltage state.		X				
Loader: tipping point, end switch and lowering speed. With the noise reduction cover closed, the loader can only be lifted up to the point of overturning (effective overturning is not possible). Tilt function is only activated when the noise reduction cover and the knife lid are open and the unloader is turned outwards (dual charger lock control).		X				
Loader: transport carriage locking, plastic slats for the entrance of the transport trolley.		X				
Unloader: end switch.		X				
The unloader only turns inwards when the acoustic or vacuum insulation cover is open and the charger is below the tipping point.		X				
Knife head: tightening.	X	X				
Cutter knives: wear - re-sharpen.		X				
Lid movement: travel, closing times.		X				

MAINTENANCE

Maintenance and inspection intervals	Installation	Daily	Weekly	Monthly	Biannually	Annually
Driving axles: stopping times.		X				
Proper tightening of all outer machine covers.		X				
Discharger disc: seal ring.			X			
Condition of all sealing sheets.				X		
Check entire hydraulic system for leaks, hydraulic cylinder: final position damping.				X		
Main motor: collector, carbon brushes, humidity, dirt.				X		
Circuit breakers: contacts.				X		
Control of the ventilation system - machine cooling, filter mat.				X		
Operational control of end switches + sensors.				X		
Knife shaft: bearings and gaskets.					X	
Bowl shaft: bearings and gaskets.					X	
Knife motor: belt tension and condition.	X				X	
Electric distribution cabinets: cleanliness, cover closing, sealing.					X	
Check terminals electric cabinet: tighten if necessary.	X				X	
Control panel cabinet: cover closing, sealing, humidity.					X	
Cable breakage and insulation damage.					X	
Check all ground connections.	X				X	
Hydraulic system: change oil.						X

DISMANTLING THE KNIFE HEAD

REMOVING THE COMPLETE KNIFE HEAD

To remove the complete knife head for cleaning or replacement by a spare knife head, proceed as follows:

- Turn the MAIN POWER SWITCH to the OFF position; for added safety, we recommend to turn off the isolating switch in the main fuse board or unplug the machine from the electrical outlet.
- Secure the knife head from turning placing the big single open-end wrench on the nut of the knife holder. Then unscrew the locking screw at the end of knife head in CLOCKWISE direction using the small open ended size 19 wrench. (Fig.1).
- Make sure the locking screw is fully loosened, but do not remove it from the clamping nut. (Fig. 2).
- Place the second big open-end wrench on the two faces of the knife shaft sealing disc and turn it CLOCKWISE to loosen the complete knife head, while the first wrench rests on the bowl center securing the knife shaft from turning. (Fig. 3).
- Once the knife head has become loose, remove the wrenches and carefully unscrew it with your hands (Fig. 4). Finally detach it from the knife shaft. Be extremely careful while removing the knife head. Always use wear cut-protection gloves and sleeves when handling the knives.
- To reassemble the knife head repeat the disassembly operations in reverse order.

MAINTENANCE

- Finally, turn knife head and cutter bowl by hand one revolution each. The knives must not contact the bowl.

WARNING
- Never touch the knives' edges without hand protection.
- Always use the tools supplied with the machine to disassemble/mount the knife head or knives.
- When handling the knives always wear cut protection gloves and sleeves.

CAUTION
- Remove all remains of sausage meat mix not only from the knives, but also from the knife head clamping surface. Even the most insignificant defect in the surface of the polished knives, due to a mechanical or chemical influence can cause "corrosion", which in turn causes the knife to fracture.

DISASSEMBLING THE KNIVES

To remove the knives one by one for replacement or cleaning, proceed as follows:
- Turn the MAIN POWER SWITCH to the OFF position; for added safety, we recommend to turn off the isolating switch in the main fuse board or unplug the machine from the electrical outlet.
- Secure the knife head from turning placing the big single open-end wrench on the nut of the knife holder. Then unscrew the locking screw at the end of knife head in CLOCKWISE direction using the small open ended size 19 wrench. (Fig.1).
- Make sure the locking screw is fully loosened, but do not remove it from the clamping nut. (Fig. 2).
- Use the box wrench to loosen the clamping nut turning it CLOCKWISE, while the first wrench rests on the bowl center securing the knife shaft from turning. (Fig. 3).
- Remove each of the rings and knives noting down their order and position. Keep in mind that the knives are numbered and must be assembled in the same order.(Fig. 4).
- To reassemble the knives and rings repeat the disassembly operations in reverse order.

WARNING
- Never touch the knives' edges without hand protection.
- Always use the tools supplied with the machine to disassemble / mount the knife head or knives.
- When handling the knives always wear cut protection gloves and sleeves.

CAUTION
- Remove all remains of sausage meat mix not only from the knives, but also from the knife head clamping surface. Even the most insignificant defect in the surface of the polished knives, due to a mechanical or chemical influence can cause "corrosion", which in turn causes the knife to fracture.

KNIFE SHAFT SEALING DISK AND LABYRINTH INSPECTION

To remove the knife shaft sealing disc for inspection or cleaning, proceed as follows:
- Turn the MAIN POWER SWITCH to the OFF position; for added safety, we recommend to turn off the isolating switch in the main fuse board or unplug the machine from the electrical outlet.
- Remove the complete knife head.
- Remove the knife shaft sealing disc by gently pulling it off the knife shaft.
- Remove any dirt from the labyrinth on the back of the knife shaft sealing disc and the inside of the shaft holder. Rinse well with fresh water.
- Before mounting the knife shaft sealing disc make sure to fit in the o-ring into the groove.

- Gently turn the knife shaft sealing disc until the notch slides into the shaft pin.

WARNING
- Never touch the knives' edges without hand protection.
- Always use the tools supplied with the machine to disassemble / mount the knife head or knives.
- When handling the knives always wear cut protection gloves and sleeves.

CAUTION
- Remove all remains of sausage meat mix not only from the knives, but also from the knife head clamping surface. Even the most insignificant defect in the surface of the polished knives, due to a mechanical or chemical influence can cause "corrosion", which in turn causes the knife to fracture.

ASSEMBLING THE KNIVES

Before installing the knives, spray the knife holder and shaft with a suitable maintenance spray for the food industry.
- The knives are equipped with a flange which functions as a knife stop. During installation, this flange should stay in contact with the knife holder (Fig. 1).
- Adjust each knife so that there is a 2 to 3 mm clearance between its edge and the bowl (Fig. 1). To adjust a knife, carefully hone down the stop flange (located in the hexagonal hole of the knife) and use a gauge made of plastic, or some other pliant material, to verify that the gap between knife edge and bowl is as specified.
- The marked point on the balancing ring must be made to coincide with the point marked on the hexagonal holder. (Fig. 2).
- It must be verified that the assembly order is the same as the factory. (Fig. 3).
- Screw the clamping nut by hand, turning it COUNTERCLOCKWISE. Do not completely tighten the nut until you've confirmed that the knives do not make contact with either the bowl or lid. To check this, turn the knife head using bar made of pliant plastic material.
- Once tightened the clamping nut by hand and verified the free movement of the knives, use the box wrench to tighten the

Fig. 1

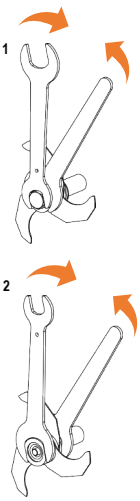


Fig. 2

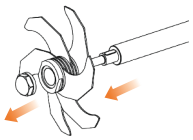
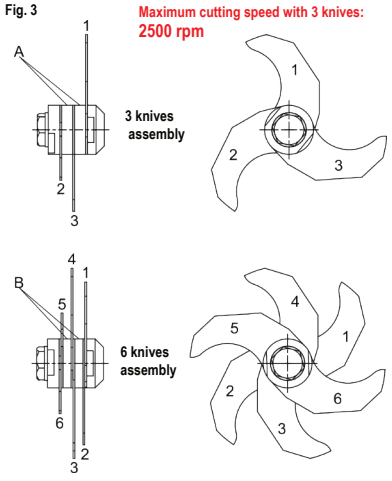


Fig. 3

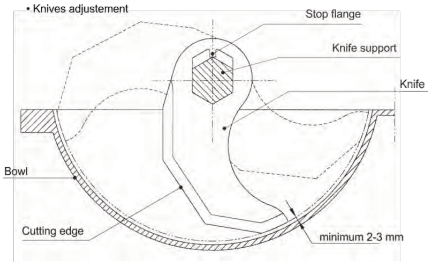


Maximum cutting speed with 3 knives:
2500 rpm

Knives spacer rings K55s

A 17.0 mm
B 12.5 mm

FIG. 4
• Knives adjustement



MAINTENANCE

clamping nut turning it COUNTERCLOCKWISE, while the single open-end wrench is placed on the nut of the knife holder securing it from turning. (Fig. 4).
- Then tighten the locking screw at the end of knife head turning it in COUNTERCLOCKWISE direction using the small open ended size 19 wrench.

CAUTION
- For safety reasons, do not adjust the clearance between the knives edges and bowl to less than 2 mm since under certain operating conditions strong vibrations could cause one or more knives to make contact with the bowl.

NOTICE
- The knives must be mounted in strict accordance with the order indicated in Fig. 3.
- When using 3 knives assembly, maximum recommended cutting speed should not exceed 2500 rpm to avoid strong vibrations.

KNIFE CALIBRATION
In each unit of the knife head only use cutting knives in pairs that have the same shape and length, as well as an approximate weight (a maximum difference of +/- 2 grams). All the imbalances cause a superior load of the knives, oscillations and a noisy operation of the machine, being able to result in the fault of the same one.

KNIFE MAINTENANCE
Clean the cutting knives, the knife head and the clamping surface at least once a day and each time the knives are sharpened. If necessary, remove rust from these parts and spray with a suitable protective spray for the food industry. It is important to dry the knives well after daily cleaning. If you want to accelerate the drying, you can start the machine at full speed for 30 seconds to spin-dry.

KNIFE HEAD CALIBRATION
Part of the knife head assembly is a plastic ring with 16 holes threaded to metric M8. The function of this ring is to balance the knife head if necessary. If excessive vibrations are observed on the machine, the knife head can be balanced by inserting M8 counterweights into the holes in the ring, and testing at different points until the vibration disappears. To find the optimal counterweight position we recommend to proceed as follows:
- Step 1: insert the counterweight into the hole closest to the marked point of the ring. Assemble the knives and measure the vibrations with a vibration meter at the speed at which the vibrations were observed. (usually between 3000 - 4000 rpm). Take note of the value. Repeat in the procedure 3 times by twisting the counterweight in holes number 4, 8 and 12, taking note of all values.
- Step 2: at the hole with the least vibration repeat the measurement in the previous and subsequent holes. (e.g. hole 3 and 5).
- Step 3: finally repeat the measurement in the hole closest to the hole with the best value from the previous step. (e.g. hole 6).
- Fix the counterweight in the hole where less vibration is observed.

SHARPENING THE KNIVES

If you notice a decrease in the quality of the chopped meat, or an increase in the consumption of amperes of the machine, it is necessary to proceed to the sharpening of the knives. They should always be sharpened by a

qualified expert in sharpening tempered knives. The length and weight of each knife in a given group or head must be kept identical after sharpening. Before sharpening the knives, consider whether the ensuing reduction of the cutting edge will be substantial enough to warrant the installation of completely new knives. Ideally the knife-edge should not be reduced by more than 10 mm from its original size. Please compare with the drawing provided in this manual. Only sharpen the cutting edges maintaining the correct radius (see next page). Do not resharpen the knife point as this would increase the distance between knives and bowl. We recommend that you thoroughly clean and dry each knife after sharpening. Use only products with anti-corrosive properties to clean the knife surfaces. It is strongly recommended to always store and transport the knives in a suitable packaging; not only will this protect you from potential injury, but it will protect the knives from accidental knocks and scrapes that could impair the cutting edge.

CAUTION
- For best performance and to avoid damaging the cutter, you must keep the edges of the knives in excellent condition.
- Use of the cutter with knives that are in poor condition could result in unwanted vibrations, harm the machine and may void the warranty.

WARNING
- When handling the knives always wear cut protection gloves and sleeves complying with level F of EN388:2016+A1:2018 or level ANSI A5 / A6.
- ALWAYS transport and store the knives always in a suitable protective packaging.

NOTICE
- To keep the knife head as balanced as possible, the knives must be installed in pairs of the same weight positioned at 180° to each other.
- The knives should only be sharpened by an expert skilled in the sharpening of tempered knives.

The cutter knife is a precision tool and the essence of every cutter, its maintenance and correct treatment is essential in order to obtain the desired result with regard to the processed food, better machine operation, longer bearing life, noise and vibration reduction, etc. Therefore, please pay close attention to the following points:

1. Sharpening of the knives must be carried out exclusively by specialized personnel.
2. Cutter knives are sharpened only on the sliding side with a water-cooled whetstone. The original angle of 27 ° must be maintained.
3. It must be verified that both the shape and the weight of each knife is identical. The deviation in weight between the knives should not exceed 1 (K95) / 2 (K135) grams.
4. Then they should be sanded with endless belts of 3 to 3.5 meters in length, always along to avoid cracks. First, 150 grain tape will be applied and then 240 grain tape.
5. Polish the cutting edges to high-gloss with a polishing brush (sisal cord brush) and the aid of polishing paste until they are free of grooves.
6. During the process of sharpening the knives should not be overheated, otherwise tensions could occur in the material and lead to deformations and / or cracks, which may cause them to break. You can tell if there has been an excess of temperature due to the color acquired by the knives. This color can range from yellow-brown to blue, indicating for example the yellow-brown color that the area warmed to about 200° C.
7. Deburr and clean cutter knives with a whetstone. Then examine for cracks.

MAINTENANCE

8. It is very important to clean and dry the clamping / tightening zone, as corrosion points may appear and, in areas affected by vibrations, cause knife breakage. It is also important to clean the remains of salt, water or debris that may remain after use, as they can cause holes eaten by chloride. On the other hand, the pressure exerted by the meat mix on the knives can produce microcracks, so they must be inspected from time to time. Each time the cutter is to be used, the knives must be perfectly clean.
9. The limit for the use of a knife depends on the type of work and the raw material to work.
10. We recommend having two sets of knives, one in the machine and one in perfect cutting condition to alternate between sharp.

TROUBLESHOOTING

Talsa bowl choppers / cutters are manufactured with the highest grade materials and components and subjected to rigorous quality controls. In the unlikely event of some difficulty, please refer to the following table:

Problem	Possible Causes	Solution
Machine does not power on.	Machine is not connected to the power source.	Plug the machine to the electrical outlet.
	The MAIN POWER SWITCH is in the OFF position.	Turn the MAIN POWER SWITCH to the ON position.
	There is no voltage in one or more phases.	Have a qualified electrician check the fuses, plugs and switches.
	The stainless steel knife lid is not closed.	Close the stainless steel knife lid.
Machine is connected to power source but knives do not turn.	The red mushroom-shaped EMERGENCY STOP button is engaged (pressed down).	Disengage the EMERGENCY STOP button by turning it slightly to the right.
	One of the thermal relays has tripped.	Let the machine cool down for a few minutes, then switch it back on.
Cutting speed does not exceed 1000 rpm.	The transparent noise reduction cover is open.	Close the cover and select a higher cutting speed.
	The transparent noise reduction cover is closed.	Open the cover and press the LID UP button on the control panel.
The knife lid will not open.	Machine is not connected to the power source.	Plug the machine to the electrical outlet.

WARNING

- ALWAYS power off and unplug the machine from the electrical outlet before proceeding with cleaning, maintenance, or repairs.
- If you are unable to resolve the difficulty, DO NOT CONTINUE TO USE THE MACHINE and contact your authorized Talsa dealer for service.

TROUBLESHOOTING

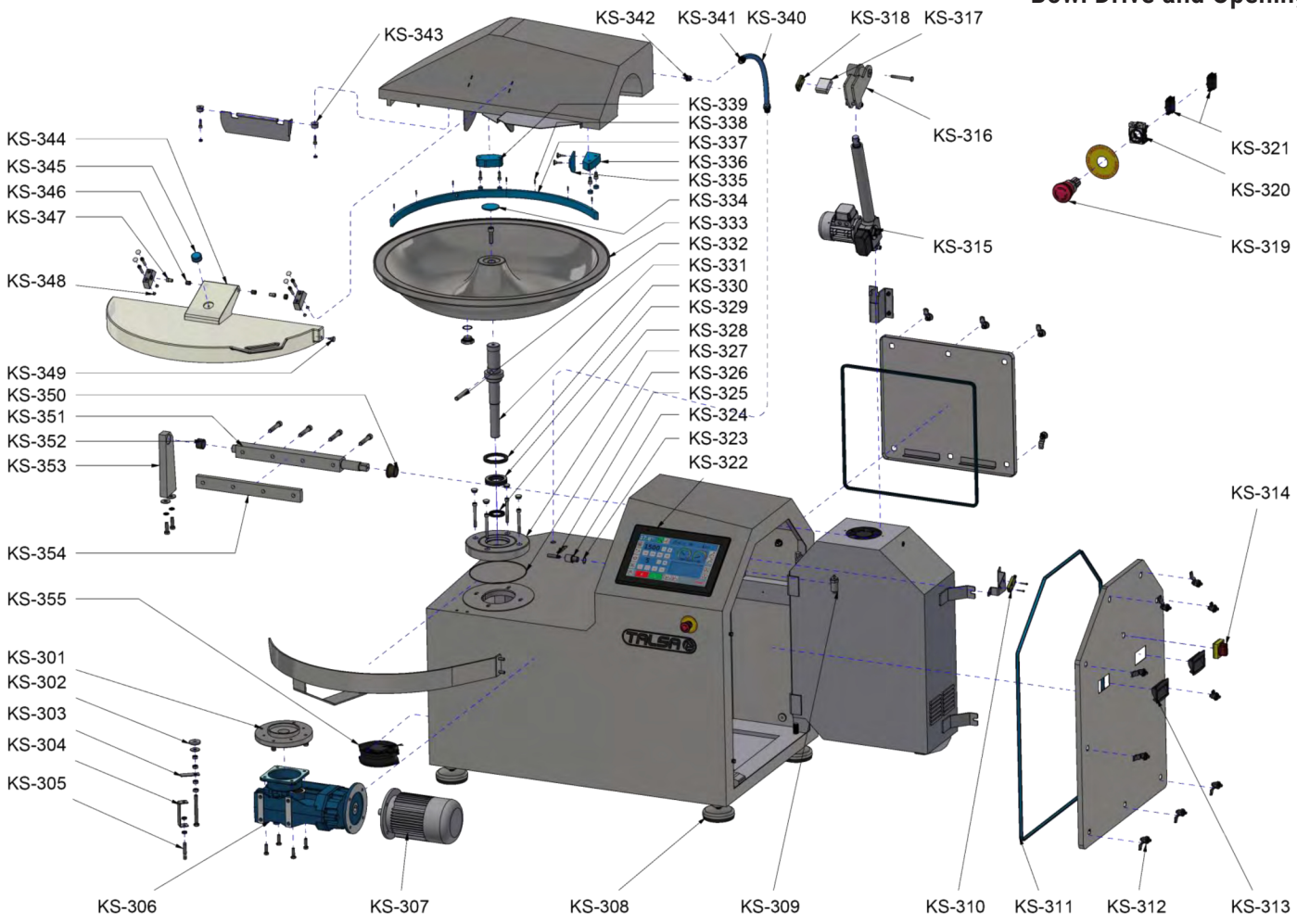
NOTICE
If the time between switching the bowl cutter off and on with the main switch or at the power source of the machine is very short, the drives have not enough time to shut down. Therefore, they will not start up correctly and an error message is shown on the multi-purpose context panel (“GDF0x General Drive Fault” and “CE Modbus Communication Error”). Please make sure there is at least 1-2 minutes between switching off and on again.

The machine has a built-in safety check system, which will shut it down in case of failure and display an error message. In this case, contact your technical support / authorized dealer to solve the problem.

PARTS BREAKDOWN

ITEM	MODEL
47834	FP-ES-0055

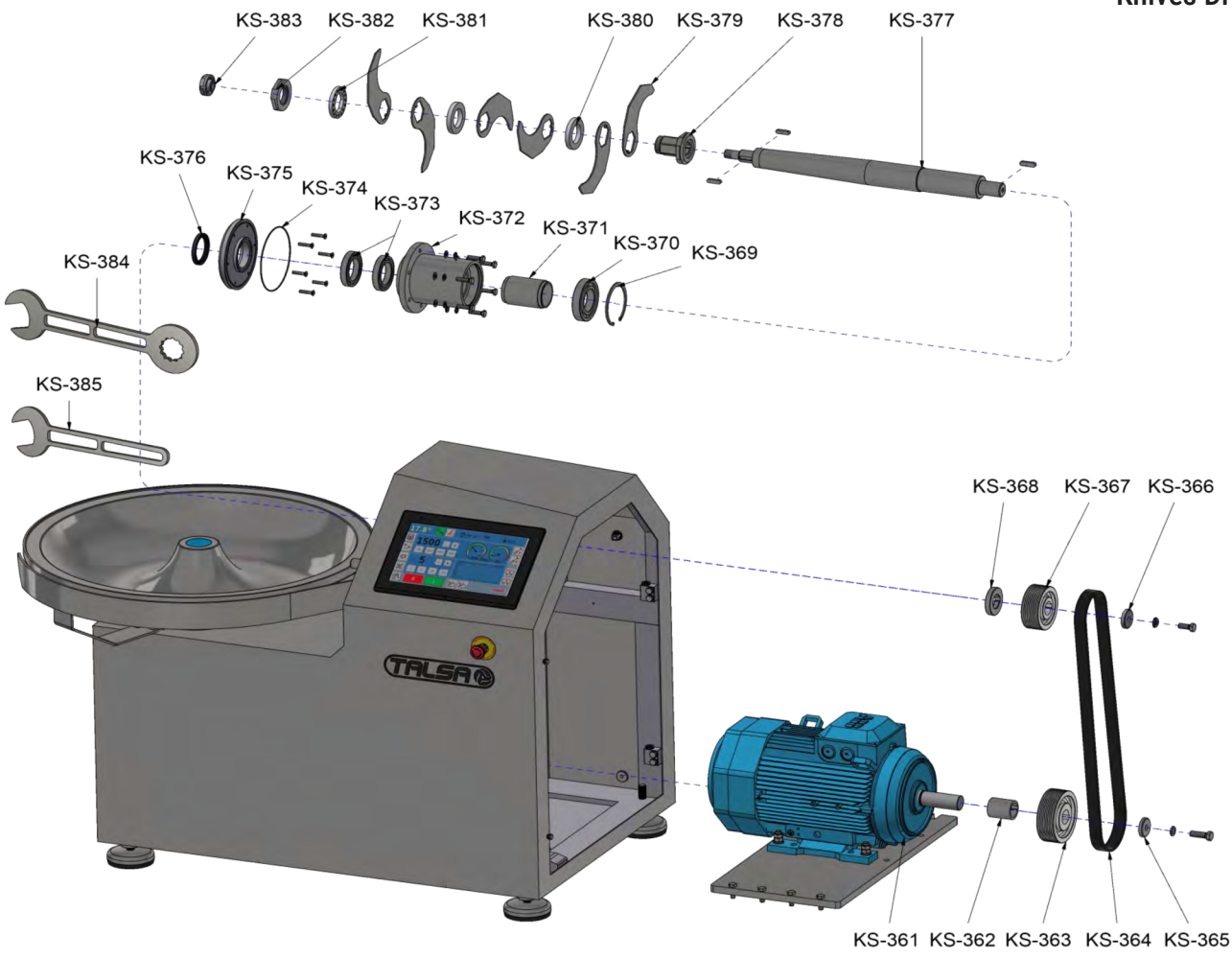
Bowl Drive and Openings



PARTS BREAKDOWN

ITEM	MODEL
47834	FP-ES-0055

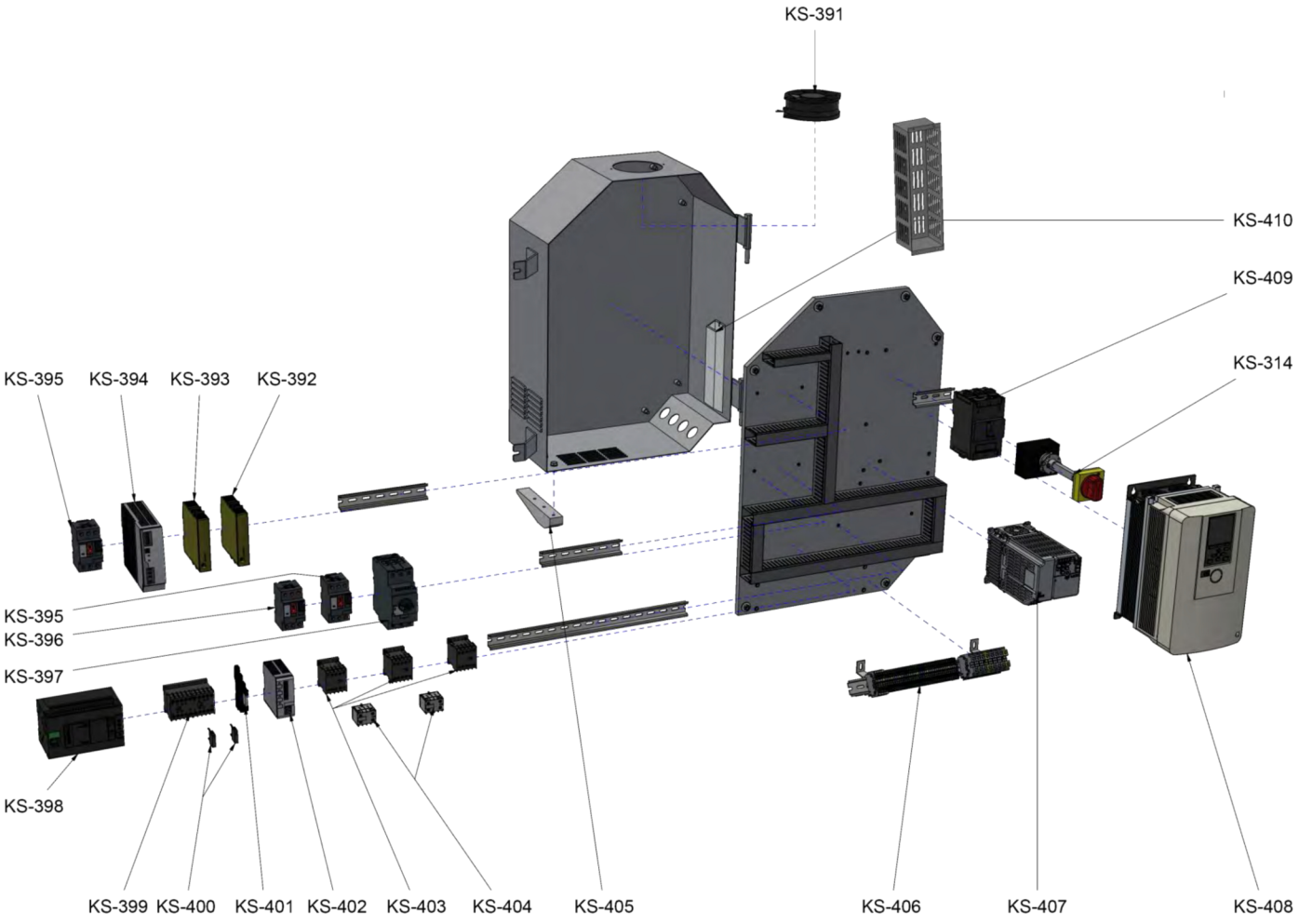
Knives Drive



PARTS BREAKDOWN

ITEM	MODEL
47834	FP-ES-0055

Electric Cabinet



PARTS BREAKDOWN

ITEM	MODEL
47834	FP-ES-0055

Item No.	Description	Position
AT041	ARTESA REDUCER DISC, AISI304 MACHINED, NOT CAST, Ø225MM FOR 47834	KS-301
AT042	REDUCER-ARTESA SHAFT WASHER Ø45XØ12.5X8MM, STAINLESS STEEL AISI303 FOR 47834	KS-302
AT043	ARTESA AISI304 INDUCTIVE PLATE FOR 47834	KS-303
AT044	ARTESA AISI304 INDUCTIVE SUPPORT PLATE FOR 47834	KS-304
AT045	INDUCTIVE DETECTOR M12 AM1/AP-4H FOR 47834	KS-305
AT046	REDUCER SITI MBHF-63/80.52, PAM 24X200, TAPERED BEARINGS, V5 MOUNTING POSITION, ORTHOGONAL AXLES, HELICAL GEARS FOR 47834	KS-306
AT047	ELECTR ARTESA MOTOR VARIABLE SPEED, ANTIGUA ABB M3AA-90LD-4, 1.5KW, 400/230V-50HZ, 1439 RPM, IE3 IP55, 24MM SHAFT FOR 47834	KS-307
AT048	MATT STAINLESS STEEL FOOT TGB THREADED ROD M20X150MM (CHARGER-S/N, ANTIGUA) FOR 47834	KS-308
AT049	HS-429 COMPACT VIBRATION SWITCH FOR 47834	KS-309
AT050	ABB ADAM OSSD M12 IP69K DETECTOR REF: 2TLA020051R5400 FOR 47834	KS-310
AT051	U PROFILE GATE GASKET 11X14MM BLUE SILICONE RAL5017 (CHARGER-S/N) FOR 47834	KS-311
AT052	STAINLESS STEEL ROTARY LOCK GN 115-VH8-28-NI HYGIENIC (LOADER-S/N) FOR 47834	KS-312
AT053	EPR GATES HANDLE. 110-PF-IP-C1 BLACK COLOR REF: 261161-C1 (CHARGER-N) FOR 47834	KS-313
AT054	SCHNEL EXTENDED ROTARY CONTROL LV426933 RED/ YELLOW HANDLE, IP54, FOR NSXM-P SWITCHES (GATE) FOR 47834	KS-314
AT055	LINEAR SCREW ACTUATOR FOR 47834	KS-315
AT056	CAM STOP WELDED COVER FOR 47834	KS-316
AT057	APM500 MAGNETIC DETECTOR SUPPLEMENT BLUE5017 FOR 47834	KS-317
AT058	ABB EVA OSSD DETECTOR IP69K REF: 2TLA020046R0800 FOR 47834	KS-318
AT059	RED MUSHROOM PUSHBUTTON HEAD FOR 47834	KS-319
AT060	SIEMENS SIRIUS METAL SUPPORT FOR 47834	KS-320
AT061	CAMERA CONTACT LOOSE N.C FOR 47834	KS-321
AT062	HMI TERMINAL SCREEN 15"W SCHNEL REF: HMIST6700 FOR 47834	KS-322
AT063	RING ØINT.22X2MM, NBR70 (INDUCTIVE DETECTOR BUSHING) FOR 47834	KS-323
AT064	INDUCTIVE DETECTOR BUSHING FOR 47834	KS-324
AT065	INDUCTIVE DETECTOR M12 PNP/N0 AM1/AP-3A84 3 M CABLE FOR 47834	KS-325
AT066	O-RING ØINT.220X3MM, NBR70 (UPPER DISC ARTESA) FOR 47834	KS-326
AT067	UPPER DISC WELDING SET FOR 47834	KS-327
AT068	"ASL" SEAL ØINT.40XØEXT.62X7MM DIN3760-ASL DOUBLE LIP, MATERIAL 103 FOR 47834	KS-328
AT069	SKF 51112 AXIAL BALL BEARING (1XARTESA SUPPORT) FOR 47834	KS-329
AT070	SKF VITON-75FPM585 "ASL" SEAL ØINT.75XØEXT.95X10MM DIN3760-ASL DOUBLE LIP MATERIAL FOR 47834	KS-330
AT071	ARTESA K55 AISI303 DRIVE REDUCER SHAFT FOR 47834	KS-331
AT072	VERTICAL AXIS PIN REDUCER AISI303 ARTESA K55 Ø15X100MM FOR 47834	KS-332
AT073	CRAFTSMAN CUTTER, STAINLESS STEEL CF8, MACHINED, FINISHED FOR 47834	KS-333
AT074	CENTER CONE PLUG ARTESA POLYETHYLENE APM/PE1000 UHMW BLUE RAL5017 FOR 47834	KS-334
AT075	REMOVABLE SCRAPER COVER, POLYETHYLENE APM/PE1000 UHMW BLUE RAL5017 FOR 47834	KS-335
AT076	RIGHT SCRAPER COVER, POLYETHYLENE APM/PE1000 UHMW BLUE RAL5017 FOR 47834	KS-336
AT077	FRICTION BAND COVER POLYETHYLENE APM/PE1000 UHMW 1130X30X10MM, MACHINED BLUE COLOR RAL5017 FOR 47834	KS-337
AT078	SPRING POSITIONER GN 614.4-4-KU TECHNOPOLYMERO (BAND) FOR 47834	KS-338
AT079	ARTESA CENTRAL SCRAPER, POLYETHYLENE APM/PE1000 UHMW BLUE RAL5017 FOR 47834	KS-339

PARTS BREAKDOWN

ITEM	MODEL
47834	FP-ES-0055

Item No.	Description	Position
AT080	REINFORCED CORRUGATED TUBE Ø16X21, 1 SILVYN FG NM 1/2 (PROBE) GOES WITH M20X1.5 FITTING (#4340) FOR 47834	KS-340
AT081	CABLE GLAND FOR TUBE M20X1.5MM, SILVYN HYGIENIC FOR 47834	KS-341
AT082	STAINLESS STEEL PROBE PT-100 Ø7X10MM, R1/2 GAS, 5M SILICONE CABLE, 3 WIRE REF: PFH18254/5 FOR 47834	KS-342
AT083	BLADE COVER TRAP HOLDER FOR 47834	KS-343
AT084	POLYCARBONATE METHACRYLATE COVER (PLEXI) TRANSPARENT SOUNDPROOF 10MM, COLORLESS, POLISHED EDGES FOR 47834	KS-344
AT085	POLYCARBONATE METHACRYLATE COVER STOPPER (PLEXI) Ø40/18MM M8 BLUE RUBBER RAL5017 FOR 47834	KS-345
AT086	SELF-LUBRICATED BEARING B11 A-12-15-16MM (POLYCARBONATE METHACRYLATE (PLEXI) COVER) FOR 47834	KS-346
AT087	ANTI-NOISE COVER HINGE PIN FOR 47834	KS-347
AT088	RING ØINT.8X2MM, NBR70 (POLYCARBONATE METHACRYLATE COVER HINGE (PLEXI) FOR 47834	KS-348
AT089	METAL FOR INDUCTIVE DETECTOR, AISI303 Ø22MM (POLYCARBONATE METHACRYLATE COVER (PLEXI)) FOR 47834	KS-349
AT090	SELF-LUBRICATED BEARING B11 B-35-45-30/55-5 WITH FLANGE (TURN AXLE COVER) FOR 47834	KS-350
AT091	SQUARE SHAFT TURN COVER AISI304 50X50MM FOR 47834	KS-351
AT092	SELF-LUBRICATED BEARING B11 A-30-38-25MM (BLADE COVER SUPPORT) FOR 47834	KS-352
AT093	AISI304 COLUMN COVER SUPPORT FOR 47834	KS-353
AT094	PLATE SUPPLEMENT ROTATION AXIS COVER K55 AISI304 450X50X20MM FOR 47834	KS-354
AT095	CUTTERS "S" FAN, 26W 24V DC 1.1A, 3700 RPM FOR 47834	KS-355
AT096	ABB ELECTRIC MOTOR FOR 47834	KS-361
AT097	15KW ENGINE SEPARATOR BUSHING FOR 47834	KS-362
AT098	MOTOR PULLEY 15KW MOTOR BLADES FOR 47834	KS-363
AT099	POLY-V MULTI-RIB BELT 1715 PL7 MEGADYNE FOR 47834	KS-364
AT100	MOTOR PULLEY WASHER 15KW MOTOR BLADES FOR 47834	KS-365
AT101	BLADE SHAFT PULLEY WASHER FOR 47834	KS-366
AT102	POLY-V BLADE SHAFT PULLEY Ø125XØ40X49.6MM, 2030 ALUMINUM FOR 47834	KS-367
AT103	BLADE SHAFT PULLEY STOP BUSHING FOR 47834	KS-368
AT104	SAFETY RING A2-AISI304 DIN472 HOLE Ø120X4MM (BLADES HOLDER (TORPEDO)) FOR 47834	KS-369
AT105	SKF 6213 2Z BALL BEARING FOR 47834	KS-370
AT106	BEARING SEPARATOR BUSH, AISI304 Ø80XØ65X116.1MM FOR 47834	KS-371
AT107	INTERIOR BLADE SUPPORT (MINI-TORPEDO) AISI304, MACHINED, WITHOUT ACCESSORIES FOR 47834	KS-372
AT108	SKF 6013 2Z BALL BEARING FOR 47834	KS-373
AT109	O-RING ØINT.180X3MM, NBR70 (BLADES SHAFT COVER) FOR 47834	KS-374
AT110	BLADES SHAFT COVER, AISI304 FOR 47834	KS-375
AT111	SKF VITON-75FPM585 "ASL" SEAL ØINT.70XØEXT.90X10MM DIN3760-ASL DOUBLE LIP MATERIAL (BLADES SHAFT) FOR 47834	KS-376
AT112	AISI303 MACHINED BLADE SHAFT, Ø70MM FOR 47834	KS-377
AT113	HEXAGONAL BLADE SUPPORT M50X2MM, LEFT THREAD FOR 47834	KS-378
AT114	CUTTER BLADE 4 CUT, BE-KUT STEEL, R184, -50, 55 /11, THICKNESS 3.5 FOR 47834	KS-379
AT115	SEPARATION RINGS FOR 6 BLADES REEL FOR 47834	KS-380
AT116	3 BLADES REEL SEPARATION RINGS FOR 47834	KS-380
AT117	BALANCED RING FOR BLADES ARNITE (PET) WHITE Ø90MM, THICKNESS 10MM FOR 47834	KS-381
AT118	BLADE FIXING NUT, LEFT THREAD, 4 FLATS, AISI303 FOR 47834	KS-382

PARTS BREAKDOWN

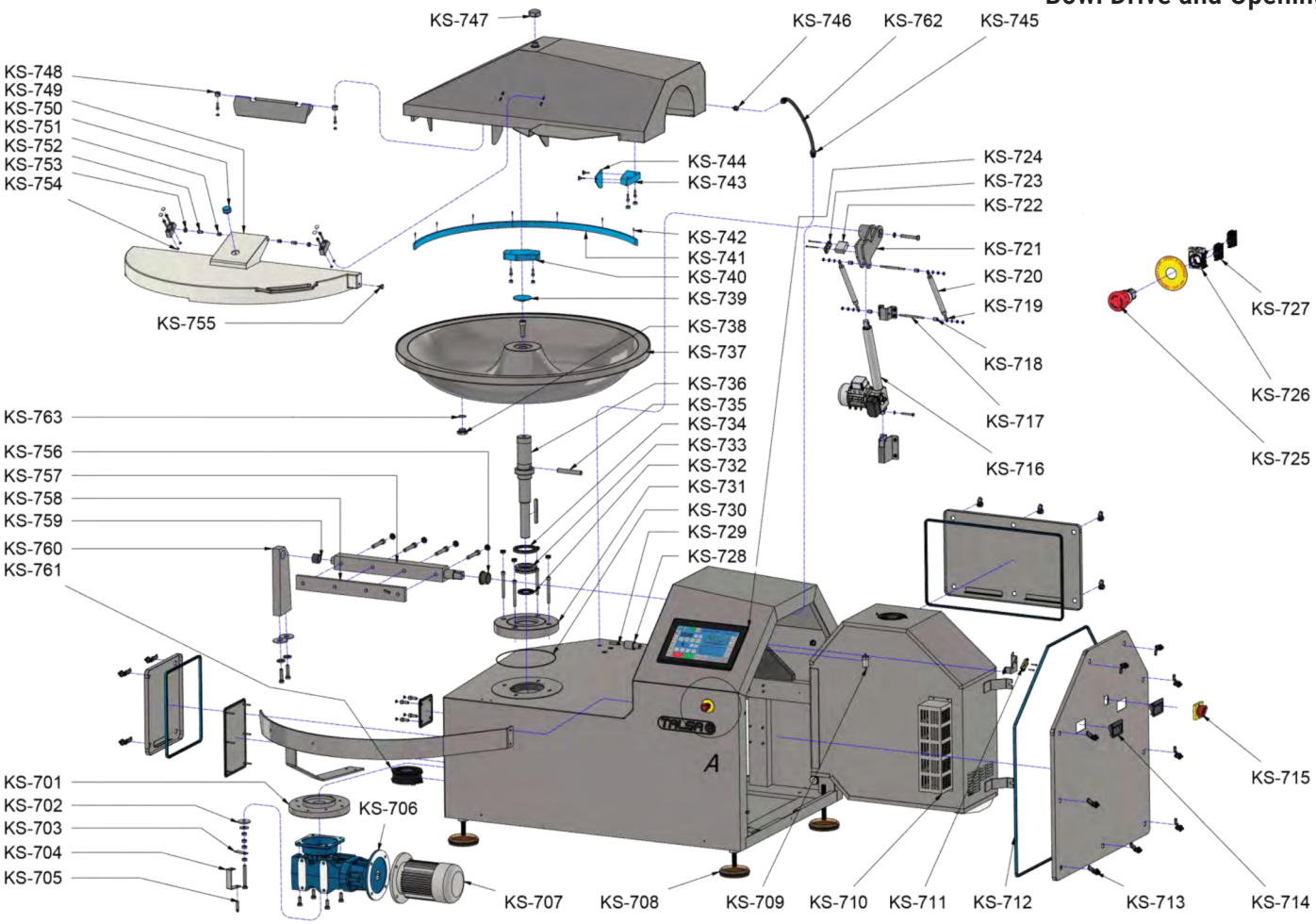
ITEM	MODEL
47834	FP-ES-0055

Item No.	Description	Position	Item No.	Description	Position	Item No.	Description	Position
AT119	BLADE FIXING BLADE NUT AISI303 FOR 47834	KS-383	AT126	SCHNEL GV3P40 3P 30/40A 50KA MAGNETOTHERMAL CIRCUIT BREAKER-MOTOR GUARD FOR 47834	KS-397	AT133	BLOCK 2 AUXILIARY CONTACTS SCHNEL LA1KN11PKX PACK, 1NO+1NC FOR 47834	KS-404
AT120	CUTTERS "S" FAN, 17W 24V DC 0.71A, 3300 RPM FOR 47834	KS-391	AT127	MODICON M241 CPU/PLC - SCHNEL TM241CE24T CONTROLLER, 14 INPUTS, 10 OUTPUTS, PNP ETHERNET TRANSISTOR. PROGRAM FOR MACHINE FOR 47834	KS-398	AT134	POM WHITE ELECTRIC FRAME SKATE FOR 47834	KS-405
AT121	ABB SENTRY SSR42 SAFETY RELAY MODULE 24VDC 2NO/ 2NO WITH 1.5 SEC DELAY FOR 47834	KS-392	AT128	SCHNEL INVERTER MINI-CONTACTOR LP2K0601BD 3P 6A DC24V FOR 47834	KS-399	AT135	ARTESA VARIATOR FOR 47834	KS-407
AT122	ABB SENTRY SSR10 24VDC 3NO/1NC SAFETY RELAY MODULE FOR 47834	KS-393	AT129	SCHNEL DIODE SUPPRESSOR MODULE TESYS K REF. LA4KC1B LED 12/24V DC ONLY FOR 47834	KS-400	AT136	BLADE VARIATOR FOR 47834	KS-408
AT123	PHOENIX POWER SUPPLY FOR 47834	KS-394	AT130	SCHNEL SSL1D03BD-PV SOLID STATE RELAY AND SCREW SOCKET, 16-30VDC, 1NO OUTPUT 3.5A 1-24VDC FOR 47834	KS-401	AT137	MAIN SWITCH FOR 47834	KS-409
AT124	SCHNEL MAGNETOTHERMAL MOTOR GUARD-CIRCUIT BREAKER GV2ME06 1-1.6A FOR 47834	KS-395	AT131	SCHNEL SSL1D03BD-PV SOLID STATE RELAY AND SCREW SOCKET, 16-30VDC, 1NO OUTPUT 3.5A 1-24VDC FOR 47834	KS-402	AT138	BRAKING RESISTANCE FOR 47834	KS-410
AT125	SCHNEL GV2ME10 MAGNETOTHERMAL CIRCUIT BREAKER-MOTOR GUARD 4-6.3A FOR 47834	KS-396	AT132	SCHNEL CONTACTOR LP1K0610BD 6A, TESY K, DC 24V (CHARGER) FOR 47834	KS-403			

PARTS BREAKDOWN

ITEM	MODEL
47835	FP-ES-0095
47836	FP-ES-0135

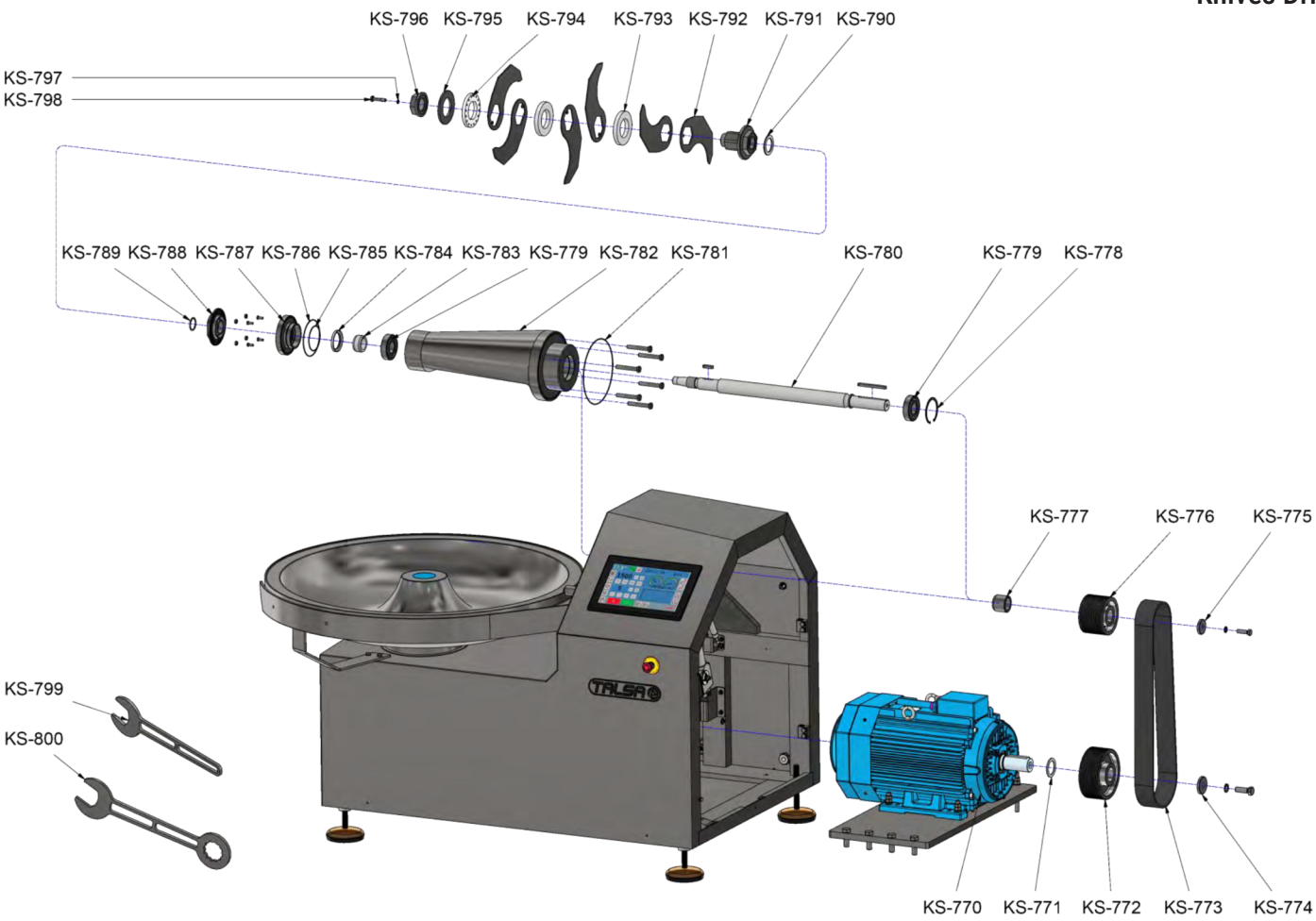
Bowl Drive and Openings



PARTS BREAKDOWN

ITEM	MODEL
47835	FP-ES-0095
47836	FP-ES-0135

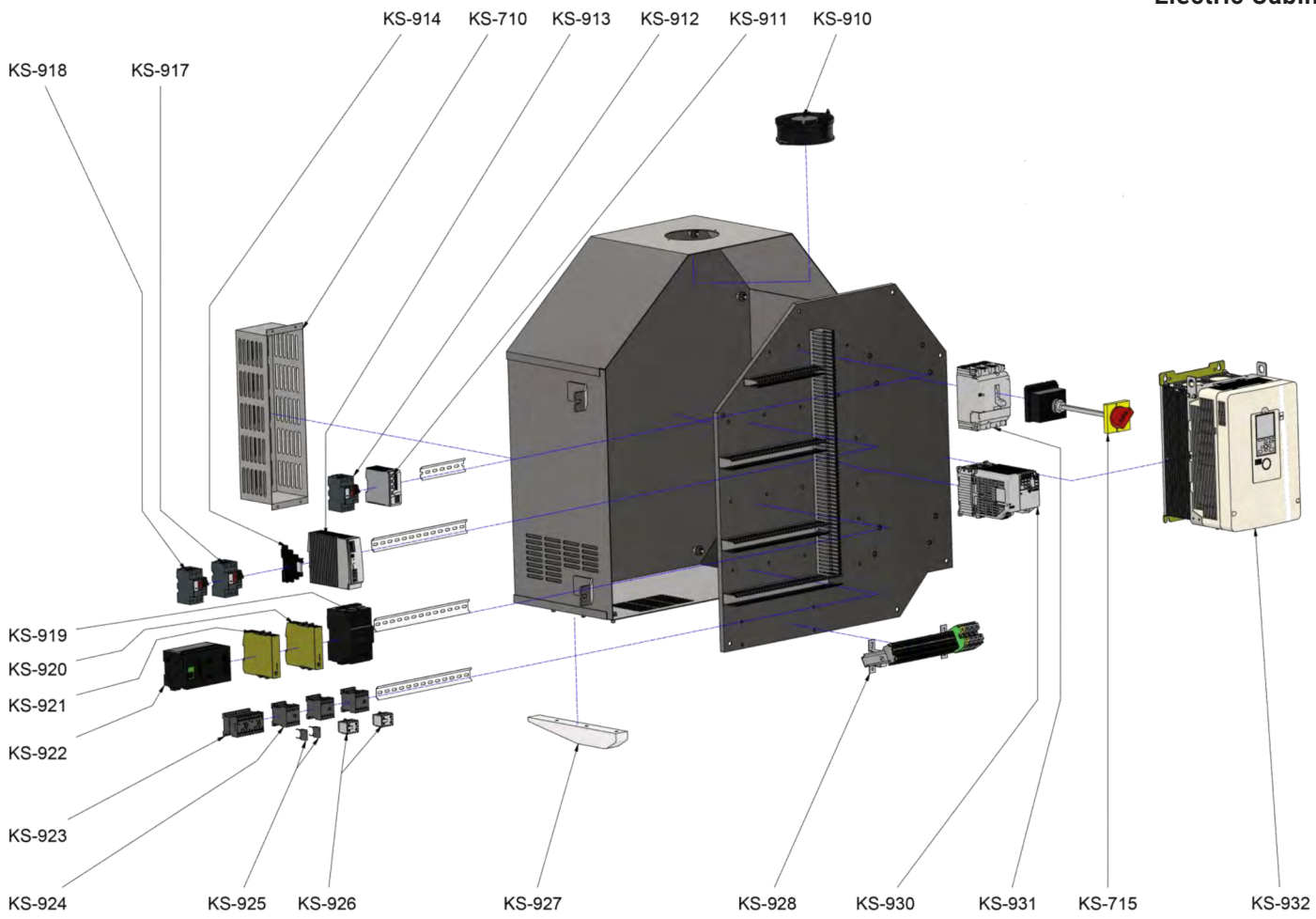
Knives Drive



PARTS BREAKDOWN

ITEM	MODEL
47835	FP-ES-0095
47836	FP-ES-0135

Electric Cabinet



PARTS BREAKDOWN

ITEM	MODEL
47835	FP-ES-0095

Item No.	Description	Position
AT139	ARTESA REDUCER DISC FOR 47835	KS-701
AT042	REDUCER-ARTESA SHAFT WASHER Ø45XØ12.5X8MM, STAINLESS STEEL AISI303 FOR 47835	KS-702
AT043	ARTESA AISI304 INDUCTIVE PLATE FOR 47835	KS-703
AT044	ARTESA AISI304 INDUCTIVE SUPPORT PLATE FOR 47835	KS-704
AT045	INDUCTIVE DETECTOR M12 AM1/AP-4H FOR 47835	KS-705
AT046	REDUCER SITI MBHF-63/80.52, PAM 24X200, TAPERED BEARINGS, V5 MOUNTING POSITION, ORTHOGONAL AXLES, HELICAL GEARS (ARTESA CUTTER) FOR 47835	KS-706
AT047	ELECTR ARTESA MOTOR VARIABLE SPEED, ANTIGUA ABB M3AA-90LD-4, 1.5KW, 400/230V-50HZ, 1439 RPM, IE3 IP55, 24MM SHAFT FOR 47835	KS-707
AT048	MATT STAINLESS STEEL FOOT TGB THREADED ROD M20X150MM (CHARGER, ANTIGUA) FOR 47835	KS-708
AT049	HS-429 COMPACT VIBRATION SWITCH FOR 47835	KS-709
AT138	BRAKING RESITANCE FOR 47835	KS-710
AT050	ABB ADAM OSSD M12 IP69K DETECTOR REF: 2TLA020051R5400 FOR 47835	KS-711
AT051	U PROFILE GATE GASKET 11X14MM BLUE SILICONE RAL5017 (CHARGER) FOR 47835	KS-712
AT052	STAINLESS STEEL ROTARY LOCK GN 115-VH8-28-NI HYGIENIC (CUTTERS, LOADER) FOR 47835	KS-713
AT053	EPR GATES HANDLE. 110-PF-IP-C1 BLACK COLOR REF: 261161-C1 FOR 47835	KS-714
AT054	SCHNEL EXTENDED ROTARY CONTROL LV426933 RED/ YELLOW HANDLE, IP54, FOR NSXM-P SWITCHES (GATE) FOR 47835	KS-715
AT055	LINEAR SCREW ACTUATOR FOR 47835	KS-716
AT140	CAM SHAFT STOP COVER FOR 47835	KS-717
AT141	CAM SHAFT BUSHING STOP COVER FOR 47835	KS-718
AT142	PROP ANCHORAGE FOR 47835	KS-719
AT143	PNEUMATIC STRAP FOR 47835	KS-720
AT144	CAM STOP WELDED COVER FOR 47835	KS-721
AT057	APM500 MAGNETIC DETECTOR SUPPLEMENT BLUE5017 FOR 47835	KS-722
AT058	ABB EVA OSSD DETECTOR IP69K REF: 2TLA020046R0800 FOR 47835	KS-723
AT062	HMI TERMINAL SCREEN 15"W SCHNEL REF: HMIST6700 FOR 47835	KS-724
AT059	RED MUSHROOM PUSHBUTTON HEAD FOR 47835	KS-725
AT060	SIEMENS SIRIUS METAL SUPPORT FOR 47835	KS-726
AT061	CAMERA CONTACT LOOSE N.C FOR 47835	KS-727
AT145	DETECTOR BUSH FOR 47835	KS-728
AT065	INDUCTIVE DETECTOR M12 PNP/N0 AM1/AP-3A84 3 M CABLE FOR 47835	KS-729
AT146	ORING (UPPER DISC) FOR 47835	KS-730
AT147	UPPER DISC SOLDIER SET FOR 47835	KS-731
AT148	LOWER PART RETENTION OF ARTESA DISC FOR 47835	KS-732
AT149	REDUCER VERTICAL AXIS PIN FOR 47835	KS-735
AT150	ARTESA DRIVE REDUCER SHAFT FOR 47835	KS-736
AT151	TROUGH FOR 47835	KS-737
AT152	ARTESA EMPTYING CAP FOR 47835	KS-738
AT153	ARTESA CONE CENTER CAP FOR 47835	KS-739
AT154	ARTESA CENTRAL SCRAPER FOR 47835	KS-740
AT155	FRICTION BAND FOR 47835	KS-741
AT078	SPRING POSITIONER GN 614.4-4-KU TECHNOPOLYMERO FOR 47835	KS-742
AT156	RIGHT SCRAPER COVER FOR 47835	KS-743
AT157	REMOVABLE COVER SCRAPER FOR 47835	KS-744
AT081	CABLE GLAND FOR TUBE M20X1.5MM, SILVYN HYGIENIC FOR 47835	KS-745
AT082	STAINLESS STEEL PROBE PT-100 Ø7X10MM, R1/2 GAS, 5M SILICONE CABLE, 3 WIRE REF: PFH18254/5 FOR 47835	KS-746
AT158	BLADE COVER DEFLECTOR NUT FOR 47835	KS-747

PARTS BREAKDOWN

ITEM	MODEL
47835	FP-ES-0095

Item No.	Description	Position
AT083	BLADE COVER TRAP HOLDER FOR 47835	KS-748
AT159	TRANSPARENT NON-SOUND METHACRYLATE COVER FOR 47835	KS-749
AT085	POLYCARBONATE METHACRYLATE COVER STOPPER (PLEXI) Ø40/18MM M8 BLUE RUBBER RAL5017 FOR 47835	KS-750
AT086	SELF-LUBRICATED BEARING B11 A-12-15-16MM (POLYCARBONATE METHACRYLATE (PLEXI) COVER) FOR 47835	KS-751
AT087	ANTI-NOISE COVER HINGE PIN FOR 47835	KS-752
AT160	SELF-LUBRICATED BEARING FOR 47835	KS-753
AT088	RING ØINT.8X2MM, NBR70 (POLYCARBONATE METHACRYLATE COVER HINGE (PLEXI)) FOR 47835	KS-754
AT089	METAL FOR INDUCTIVE DETECTOR, AISI303 Ø22MM (POLYCARBONATE METHACRYLATE COVER (PLEXI)) FOR 47835	KS-755
AT161	SELF-LUBRICATED BEARING FOR 47835	KS-756
AT162	SQUARE AXIS ROTATION COVER FOR 47835	KS-757
AT163	PLATE SUPPLEMENT ROTATION AXIS COVER FOR 47835	KS-758
AT164	BEARING FOR 47835	KS-759
AT165	COLUMN COVER SUPPORT FOR 47835	KS-760
AT095	CUTTERS "S" FAN, 26W 24V DC 1.1A, 3700 RPM FOR 47835	KS-761
AT166	BLADE MOTOR FOR 47835	KS-770
AT167	AISI303 MOTOR PULLEY SEPARATOR BUSH FOR 47835	KS-771
AT168	MOTOR PULLEY FOR 47835	KS-772
AT169	POLY-V BELT FOR 47835	KS-773
AT170	ENGINE PULLEY WASHER FOR 47835	KS-774, KS-782
AT171	BLADE SHAFT PULLEY WASHER FOR 47835	KS-775
AT172	POLY-V BLADE SHAFT PULLEY FOR 47835	KS-776
AT173	SAFETY RING A2-AISI304 DIN472 HOLE Ø100X3 FOR 47835	KS-778
AT174	SKF BEARING 6309 2Z BALLS FOR 47835	KS-779
AT175	BLADES AXIS FOR 47835	KS-780
AT176	BLADE SHAFT SUPPORT O-RING FOR 47835	KS-781
AT177	BLADE SUPPORT STOP BUSH FOR 47835	KS-783
AT178	BLADE HEAD RETAINER FOR 47835	KS-784
AT179	O-RING Ø92X3 FIXED PART LABYRINTH FOR 47835	KS-785
AT180	TORIC FIXED PART LABYRINTH FOR 47835	KS-786
AT181	FIXED PART LABYRINTH BLADES HEAD FOR 47835	KS-787
AT182	ARTESA EMPTYING CAP FOR 47835	KS-788
AT183	LABYRINTH COVER O-RING FOR 47835	KS-789
AT184	FRICTION RING HEXAGONAL BLADES SUPPORT FOR 47835	KS-790
AT185	HEXAGONAL BLADES SUPPORT FOR 47835	KS-791
AT186	BLADE FOR 47835	KS-792
AT187	BLADES SEPARATOR RING 6 KNIVES FOR 47835	KS-793
AT188	BLADES SEPARATOR RING 3 KNIVES FOR 47835	KS-793
AT189	BALANCED RING ARNITE BLADES FOR 47835	KS-794
AT190	BLADES CLOSING RING FOR 47835	KS-795
AT191	BLADE FIXING BLADE NUT FOR 47835	KS-796
AT192	O-RING SCREW NUT BLADES FOR 47835	KS-797
AT193	BLADE CLOSING NUT SCREW FOR 47835	KS-798
AT194	BIG BLADE KET FOR 47835	KS-799
AT195	COMBINED BLADE KEY FOR 47835	KS-800
AT120	CUTTERS "S" FAN, 17W 24V DC 0.71A, 3300 RPM FOR 47835	KS-910
AT131	SCHNEL SSL1D03BD-PV SOLID STATE RELAY AND SCREW SOCKET, 16-30VDC, 1NO OUTPUT 3.5A 1-24VDC FOR 47835	KS-911
AT196	SCHNEL MAGNETOTHERMAL CIRCUIT BREAKER-GUARDAMO GV2ME05 0.63-1A FOR 47835	KS-912
AT130	SCHNEL SSL1D03BD-PV SOLID STATE RELAY AND SCREW SOCKET, 16-30VDC, 1NO OUTPUT 3.5A 1-24VDC FOR 47835	KS-914

PARTS BREAKDOWN

ITEM	MODEL
47835	FP-ES-0095

Item No.	Description	Position	Item No.	Description	Position	Item No.	Description	Position
AT197	SCHNEL MAGNETOTHERMAL CIRCUIT BREAKER-MOTOR GUARD GV2ME07 1.6-2.5A FOR 47835	KS-917	AT127	MODICON M241 CPU/PLC - SCHNEL TM241CE24T CONTROLLER, 14 INPUTS, 10 OUTPUTS, PNP ETHERNET TRANSISTOR. PROGRAM FOR MACHINE FOR 47835	KS-922	AT198	BLUE POM ELECTRIC FRAME SKATE FOR 47835	KS-927
AT125	SCHNEL GV2ME10 MAGNETOTHERMAL CIRCUIT BREAKER-MOTOR GUARD 4-6.3A FOR 47835	KS-918	AT128	SCHNEL INVERTER MINI-CONTACTOR LP2K0601BD 3P 6A DC24V FOR 47835	KS-923	AT135	ARTESA VARIATOR FOR 47835	KS-928
AT137	MAIN SWITCH FOR 47835	KS-919	AT132	SCHNEL CONTACTOR LP1K0610BD 6A, TESY K, DC 24V FOR 47835	KS-924	AT137	MAIN SWITCH FOR 47835	KS-931
AT121	ABB SENTRY SSR42 SAFETY RELAY MODULE 24VDC 2NO/ 2NO WITH 1.5 SEC DELAY FOR 47835	KS-920	AT129	SCHNEL DIODE SUPPRESSOR MODULE TESYS K REF. LA4KC1B LED 12/24V DC ONLY FOR 47835	KS-925	AT199	YAS GA700 GA70C4140BBA INVERTER, 380>480V, EMC C3 FILTER, ND:140A/75KW, HD:112A/55KW FOR 47835	KS-932
AT122	ABB SENTRY SSR10 24VDC 3NO/1NC SAFETY RELAY MODULE FOR 47835	KS-921	AT133	BLOCK 2 AUXILIARY CONTACTS SCHNEL LA1KN11PKX PACK, 1NO+1NC FOR 47835	KS-926			

PARTS BREAKDOWN

ITEM	MODEL
47836	FP-ES-0135

Item No.	Description	Position
AT200	ARTESA REDUCER DISC FOR 47836	KS-701
AT201	REDUCER-ARTESA SHAFT WASHER Ø45XØ12.5X8MM, STAINLESS STEEL AISI303 FOR 47836	KS-702
AT043	ARTESA AISI304 INDUCTIVE PLATE FOR 47836	KS-703
AT202	ARTESA AISI304 INDUCTIVE SUPPORT PLATE FOR 47836	KS-704
AT045	INDUCTIVE DETECTOR M12 AM1/AP-4H FOR 47836	KS-705
AT203	REDUCER SITI MBHF-63/80.52, PAM 24X200, TAPERED BEARINGS, V5 MOUNTING POSITION, ORTHOGONAL AXLES, HELICAL GEARS (ARTESA CUTTER) FOR 47836	KS-706
AT204	ELECTR ARTESA MOTOR VARIABLE SPEED, ANTIGUA ABB M3AA-90LD-4, 1.5KW, 400/230V-50HZ, 1439 RPM, IE3 IP55, 24MM SHAFT FOR 47836	KS-707
AT048	MATT STAINLESS STEEL FOOT TGB THREADED ROD M20X150MM (CHARGER, ANTIGUA) FOR 47836	KS-708
AT049	HS-429 COMPACT VIBRATION SWITCH FOR 47836	KS-709
AT138	BRAKING RESISTANCE FOR 47836	KS-710
AT050	ABB ADAM OSSD M12 IP69K DETECTOR REF: 2TLA020051R5400 FOR 47836	KS-711
AT051	U PROFILE GATE GASKET 11X14MM BLUE SILICONE RAL5017 (CHARGER) FOR 47836	KS-712
AT052	STAINLESS STEEL ROTARY LOCK GN 115-VH8-28-NI HYGIENIC (CUTTERS, LOADER) FOR 47836	KS-713
AT053	EPR GATES HANDLE. 110-PF-IP-C1 BLACK COLOR REF: 261161-C1 (CHARGER) FOR 47836	KS-714
AT205	SCHNEL EXTENDED ROTARY CONTROL LV426933 RED/ YELLOW HANDLE, IP54, FOR NSXM-P SWITCHES (GATE) FOR 47836	KS-715
AT055	LINEAR SCREW ACTUATOR FOR 47836	KS-716
AT140	CAM SHAFT STOP COVER FOR 47836	KS-717
AT141	CAM SHAFT BUSHING STOP COVER FOR 47836	KS-718
AT142	PROP ANCHORAGE FOR 47836	KS-719
AT143	PNEUMATIC STRAP FOR 47836	KS-720
AT144	CAM STOP WELDED COVER FOR 47836	KS-721
AT057	APM500 MAGNETIC DETECTOR SUPPLEMENT BLUE5017 FOR 47836	KS-722
AT058	ABB EVA OSSD DETECTOR IP69K REF: 2TLA020046R0800 FOR 47836	KS-723
AT062	HMI TERMINAL SCREEN 15"W SCHNEL REF: HMIST6700 FOR 47836	KS-724
AT059	RED MUSHROOM PUSHBUTTON HEAD FOR 47836	KS-725
AT060	SIEMENS SIRIUS METAL SUPPORT FOR 47836	KS-726
AT061	CAMERA CONTACT LOOSE N.C FOR 47836	KS-727
AT206	DETECTOR BUSH FOR 47836	KS-728
AT065	INDUCTIVE DETECTOR M12 PNP/N0 AM1/AP-3A84 3 M CABLE FOR 47836	KS-729
AT207	ORING (UPPER DISC) FOR 47836	KS-730
AT208	UPPER DISC SOLDIER SET FOR 47836	KS-731
AT209	LOWER PART RETENTION OF ARTESA DISC FOR 47836	KS-732
AT210	ARTESA AXLE SUPPORT BEARING FOR 47836	KS-733
AT211	ARTESA DISC UPPER PART RETAINER FOR 47836	KS-734
AT212	REDUCER VERICAL AXIS PIN FOR 47836	KS-735
AT213	ARTESA DRIVE REDUCER SHAFT FOR 47836	KS-736
AT214	TROUGH FOR 47836	KS-737
AT152	ARTESA EMPTYING CAP FOR 47836	KS-738, KS-788
AT215	ARTESA CONE CENTER CAP FOR 47836	KS-739
AT216	ARTESA CENTRAL SCRAPER FOR 47836	KS-740
AT217	FRICTION BAND FOR 47836	KS-741
AT078	SPRING POSITIONER GN 614.4-4-KU TECHNOPOLYMERO (BAND) FOR 47836	KS-742
AT218	RIGHT SCRAPER COVER FOR 47836	KS-743
AT219	REMOVABLE COVER SCRAPER FOR 47836	KS-744
AT081	CABLE GLAND FOR TUBE M20X1.5MM, SILVYN HYGENIC FOR 47836	KS-745

PARTS BREAKDOWN

ITEM	MODEL
47836	FP-ES-0135

Item No.	Description	Position	Item No.	Description	Position	Item No.	Description	Position
AT082	STAINLESS STEEL PROBE PT-100 Ø7X10MM, R1/2 GAS, 5M SILICONE CABLE, 3 WIRE REF: PFH18254/5 FOR 47836	KS-746	AT224	BLADE MOTOR FOR 47836	KS-770	AT234	FIXED PART LABYRINTH BLADES HEAD FOR 47836	KS-787
AT158	BLADE COVER DEFLECTOR NUT FOR 47836	KS-747	AT225	AISI303 MOTOR PULLEY SEPARATOR BUSH FOR 47836	KS-771	AT183	LABYRINTH COVER O-RING FOR 47836	KS-789
AT083	BLADE COVER TRAP HOLDER (CUTTER) FOR 47836	KS-748	AT226	MOTOR PULLEY FOR 47836	KS-772	AT184	FRICTION RING HEXAGONAL BLADES SUPPORT FOR 47836	KS-790
AT220	TRANSPARENT NON-SOUND METHACRYLATE COVER FOR 47836	KS-749	AT227	POLY-V BELT FOR 47836	KS-773	AT235	HEXAGONAL BLADES SUPPORT FOR 47836	KS-791
AT085	POLYCARBONATE METHACRYLATE COVER STOPPER (PLEXI) Ø40/18MM M8 BLUE RUBBER RAL5017 FOR 47836	KS-750	AT228	ENGINE PULLEY WASHER FOR 47836	KS-774, KS-782	AT236	BLADE FOR 47836	KS-792
AT086	SELF-LUBRICATED BEARING B11 A-12-15-16MM (POLYCARBONATE METHACRYLATE (PLEXI) COVER) FOR 47836	KS-751	AT171	BLADE SHAFT PULLEY WASHER FOR 47836	KS-775	AT237	BLADES SEPARATOR RING 6 KNIVES FOR 47836	KS-793
AT087	ANTI-NOISE COVER HINGE PIN FOR 47836	KS-752	AT229	POLY-V BLADE SHAFT PULLEY FOR 47836	KS-776	AT238	BLADES SEPARATOR RING 3 KNIVES FOR 47836	KS-793
AT160	SELF-LUBRICATED BEARING FOR 47836	KS-753	AT230	BLADE SHAFT PULLEY STOP BUSHING FOR 47836	KS-777	AT239	BALANCED RING ARNITE BLADES FOR 47836	KS-794
AT088	RING ØINT.8X2MM, NBR70 (POLYCARBONATE METHACRYLATE COVER HINGE (PLEXI)) FOR 47836	KS-754	AT173	SAFETY RING A2-AISI304 DIN472 HOLE Ø100X3 FOR 47836	KS-778	AT240	BLADES CLOSING RING FOR 47836	KS-795
AT089	METAL FOR INDUCTIVE DETECTOR, AISI303 Ø22MM (POLYCARBONATE METHACRYLATE COVER (PLEXI)) FOR 47836	KS-755	AT174	SKF BEARING 6309 2Z BALLS FOR 47836	KS-779	AT241	BLADE FIXING BLADE NUT FOR 47836	KS-796
AT161	SELF-LUBRICATED BEARING FOR 47836	KS-756	AT231	BLADES AXIS FOR 47836	KS-780	AT192	O-RING SCREW NUT BLADES FOR 47836	KS-797
AT221	SQUARE AXIS ROTATION COVER FOR 47836	KS-757	AT232	BLADE SHAFT SUPPORT O-RING FOR 47836	KS-781	AT242	BLADE CLOSING NUT SCREW FOR 47836	KS-798
AT222	PLATE SUPPLEMENT ROTATION AXIS COVER FOR 47836	KS-758	AT177	BLADE SUPPORT STOP BUSH FOR 47836	KS-783	AT195	COMBINED BLADE KEY FOR 47836	KS-800
AT164	BEARING FOR 47836	KS-759	AT178	BLADE HEAD RETAINER FOR 47836	KS-784	AT120	CUTTERS "S" FAN, 17W 24V DC 0.71A, 3300 RPM FOR 47836	KS-910
AT223	COLUMN COVER SUPPORT FOR 47836	KS-760	AT179	O-RING Ø92X3 FIXED PART LABYRINTH FOR 47836	KS-785	AT131	SCHNEL SSL1D03BD-PV SOLID STATE RELAY AND SCREW SOCKET, 16-30VDC, 1NO OUTPUT 3.5A 1-24VDC FOR 47836	KS-911
AT095	CUTTERS "S" FAN, 26W 24V DC 1.1A, 3700 RPM FOR 47836	KS-761	AT233	TORIC FIXED PART LABYRINTH FOR 47836	KS-786	AT196	SCHNEL MAGNETOTHERMAL CIRCUIT BREAKER-GUARDAMO GV2ME05 0.63-1A FOR 47836	KS-912

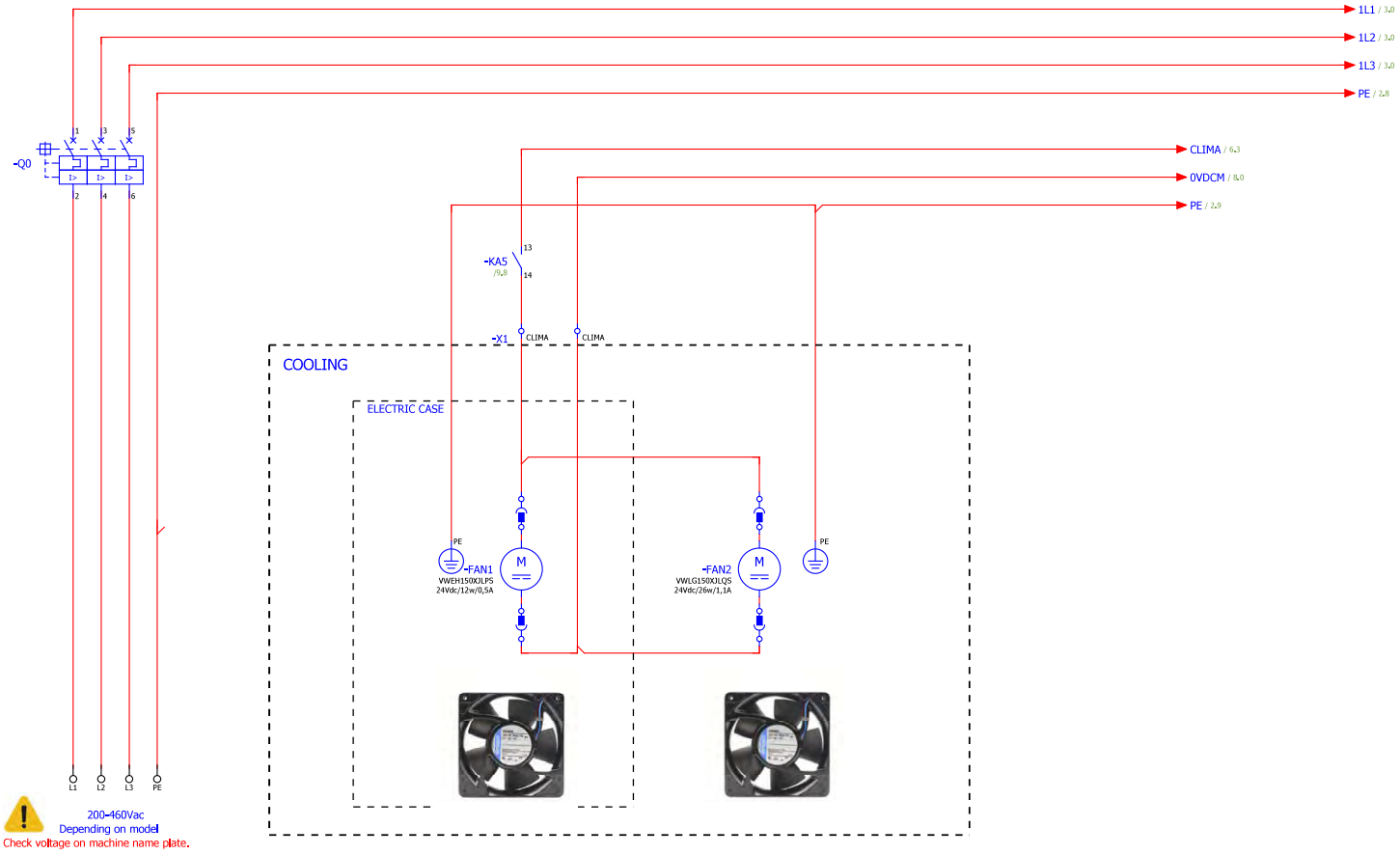
PARTS BREAKDOWN

ITEM	MODEL
47836	FP-ES-0135

Item No.	Description	Position	Item No.	Description	Position	Item No.	Description	Position
AT130	SCHNEL SSL1D03BD-PV SOLID STATE RELAY AND SCREW SOCKET, 16-30VDC, 1NO OUTPUT 3.5A 1-24VDC FOR 47836	KS-914	AT127	MODICON M241 CPU/PLC - SCHNEL TM241CE24T CONTROLLER, 14 INPUTS, 10 OUTPUTS, PNP ETHERNET TRANSISTOR. PROGRAM FOR MACHINE FOR 47836	KS-922	AT245	ARTESA VARIATOR FOR 47836	KS-928
AT197	SCHNEL MAGNETOTHERMAL CIRCUIT BREAKER-MOTOR GUARD GV2ME07 1.6-2.5A FOR 47836	KS-917	AT128	SCHNEL INVERTER MINI-CONTACTOR LP2K0601BD 3P 6A DC24V FOR 47836	KS-923	AT246	YAS GA500 GA50C4009EBA INVERTER, 380>480V ND:8.8A/ 3.7KW IP20 FOR 47836	KS-930
AT243	SCHNEL GV2ME10 MAGNETOTHERMAL CIRCUIT BREAKER-MOTOR GUARD 4-6.3A FOR 47836	KS-918	AT132	SCHNEL CONTACTOR LP1K0610BD 6A, TESY K, DC 24V (CHARGER) FOR 47836	KS-924	AT247	MAIN SWITCH FOR 47836	KS-931
AT244	MAIN SWITCH FOR 47836	KS-919	AT129	SCHNEL DIODE SUPPRESSOR MODULE TESYS K REF. LA4KC1B LED 12/24V DC ONLY FOR 47836	KS-925	AT248	YAS GA700 GA70C4140BBA INVERTER, 380>480V, EMC C3 FILTER, ND:140A/75KW, HD:112A/55KW FOR 47836	KS-932
AT121	ABB SENTRY SSR42 SAFETY RELAY MODULE 24VDC 2NO/ 2NO WITH 1.5 SEC DELAY FOR 47836	KS-920	AT133	BLOCK 2 AUXILIARY CONTACTS SCHNEL LA1KN11PKX PACK, 1NO+1NC FOR 47836	KS-926			
AT122	ABB SENTRY SSR10 24VDC 3NO/1NC SAFETY RELAY MODULE FOR 47836	KS-921	AT198	BLUE POM ELECTRIC FRAME SKATE FOR 47836	KS-927			

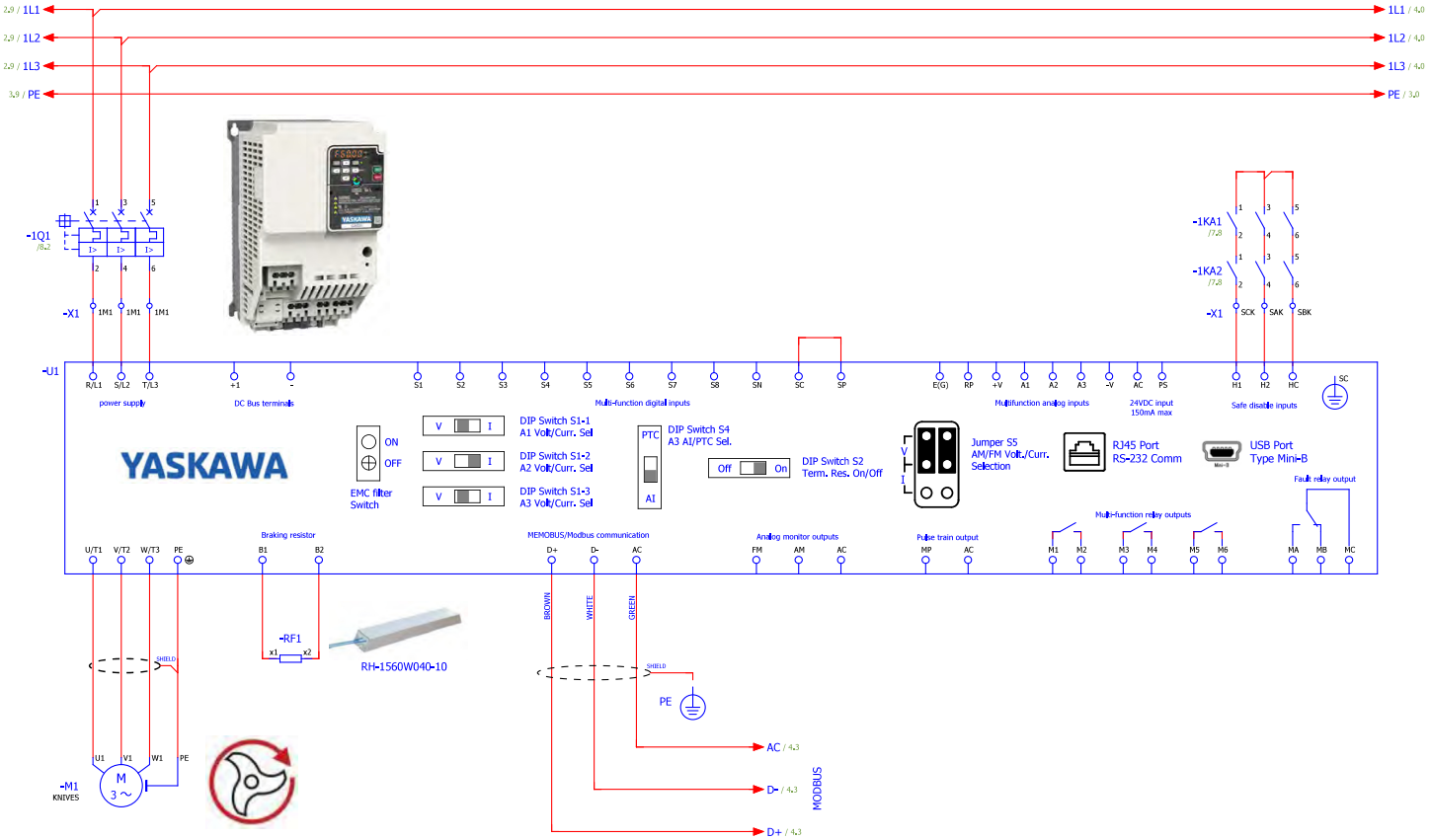
ELECTRICAL SCHEMATICS

ITEM	MODEL
47834	FP-ES-0055



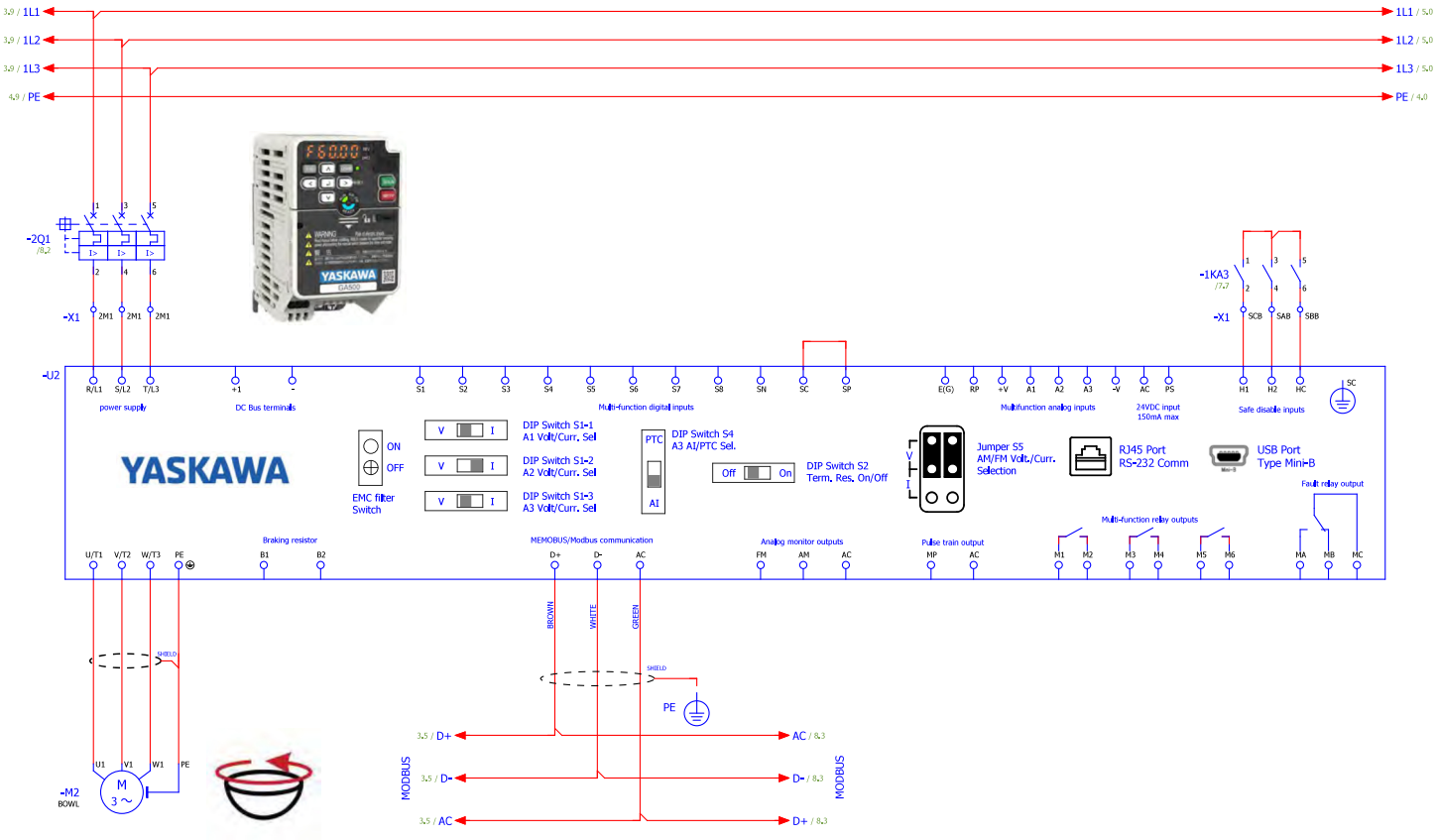
ELECTRICAL SCHEMATICS

ITEM	MODEL
47834	FP-ES-0055



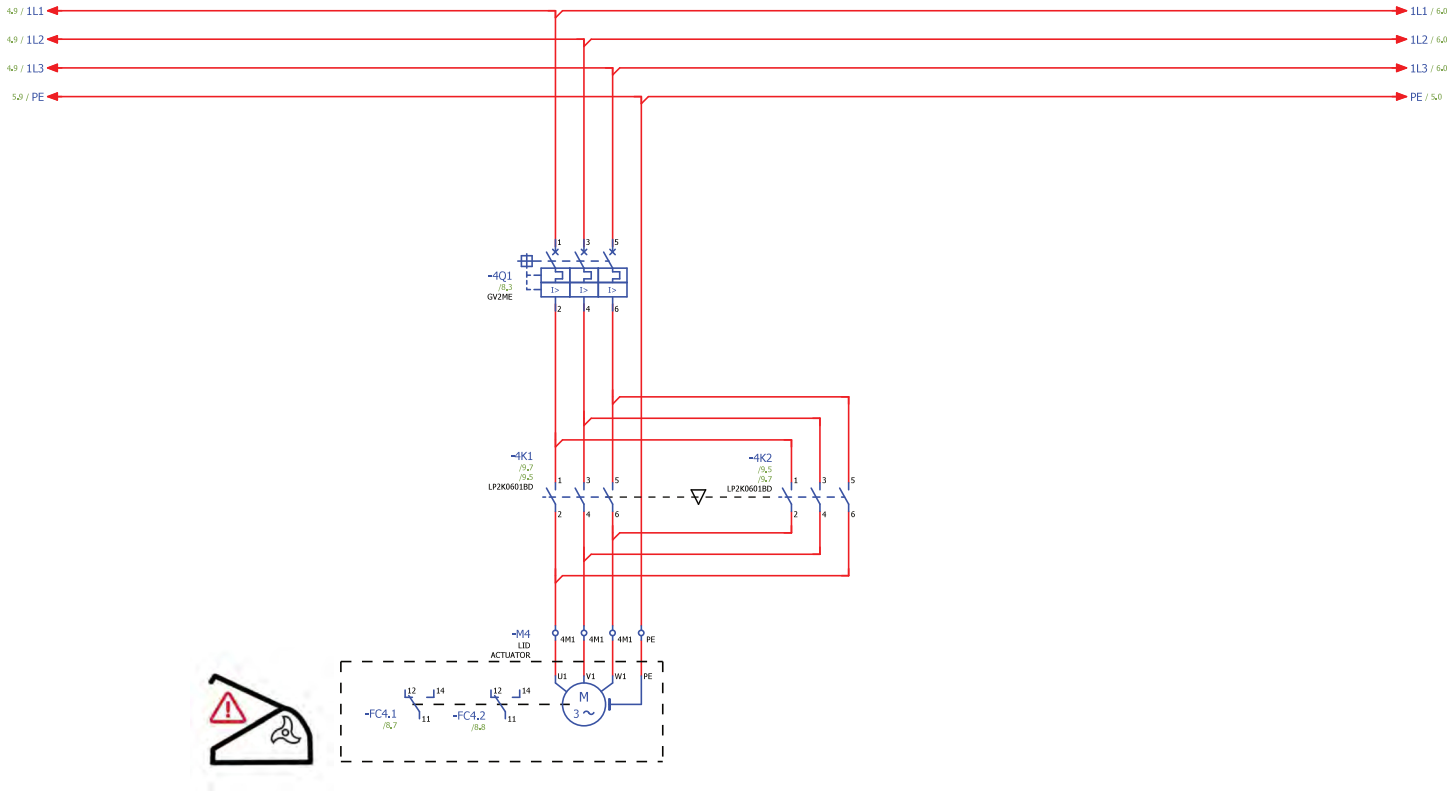
ELECTRICAL SCHEMATICS

ITEM	MODEL
47834	FP-ES-0055



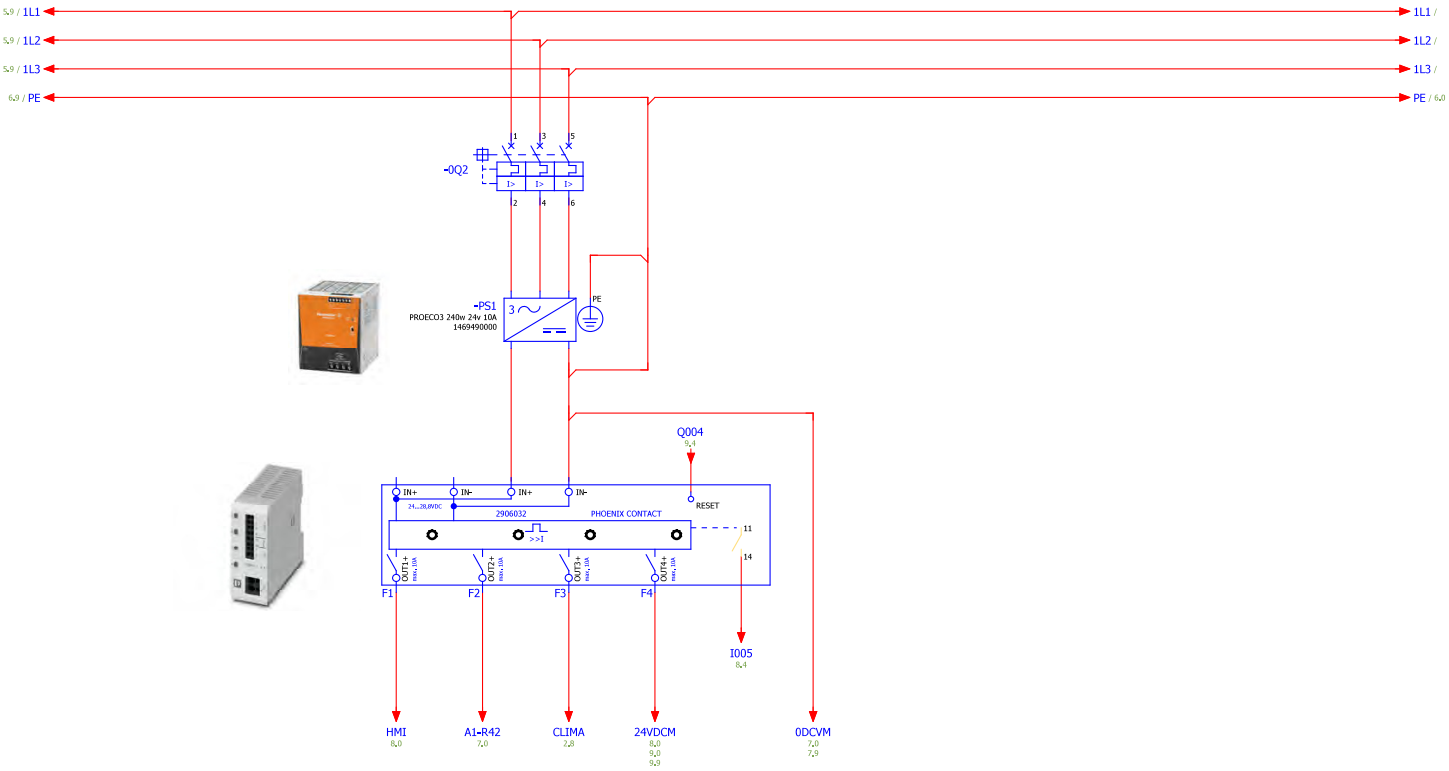
ELECTRICAL SCHEMATICS

ITEM	MODEL
47834	FP-ES-0055



ELECTRICAL SCHEMATICS

ITEM	MODEL
47834	FP-ES-0055



ELECTRICAL SCHEMATICS

ITEM	MODEL
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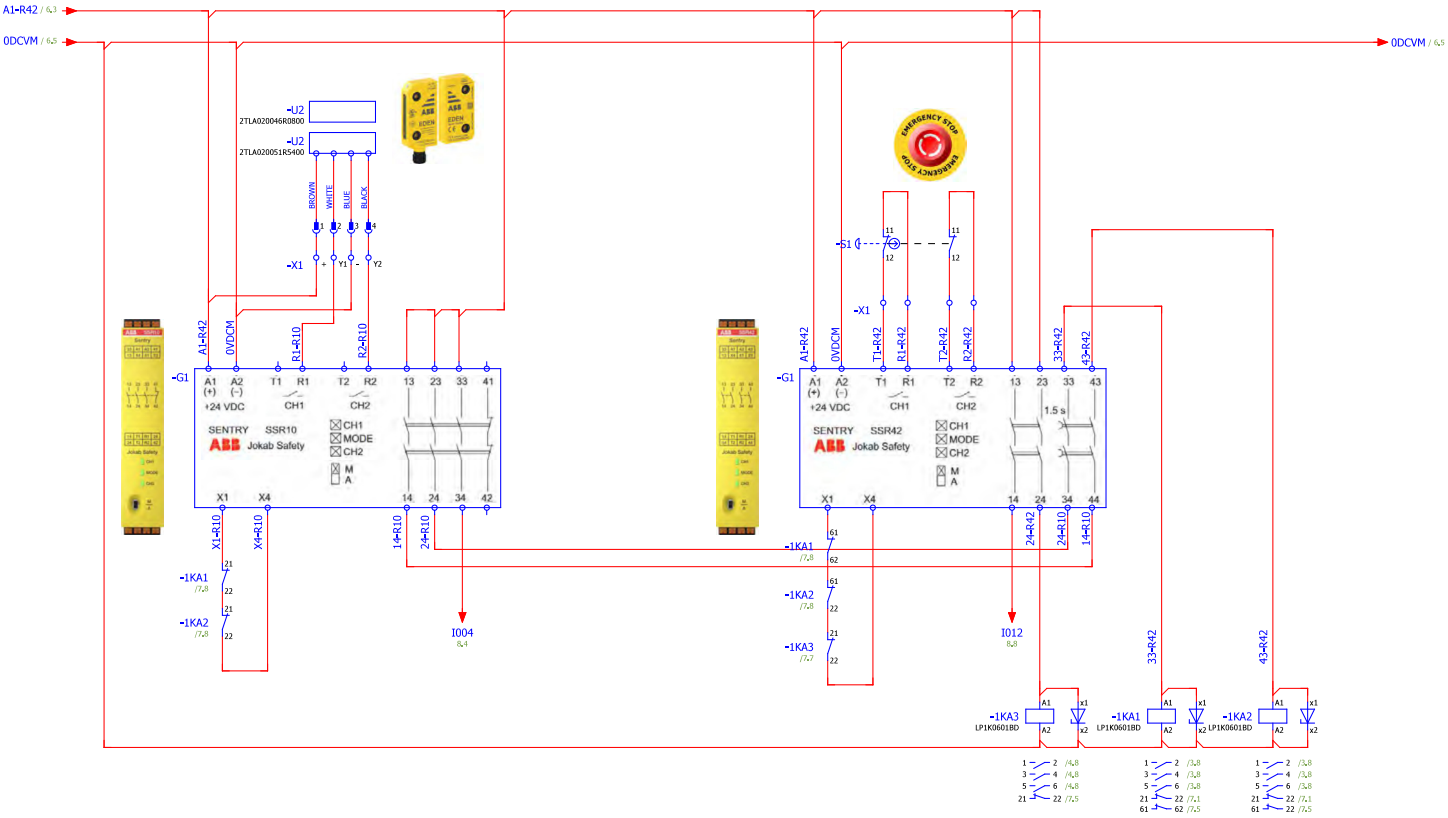

ELECTRICAL SCHEMATICS

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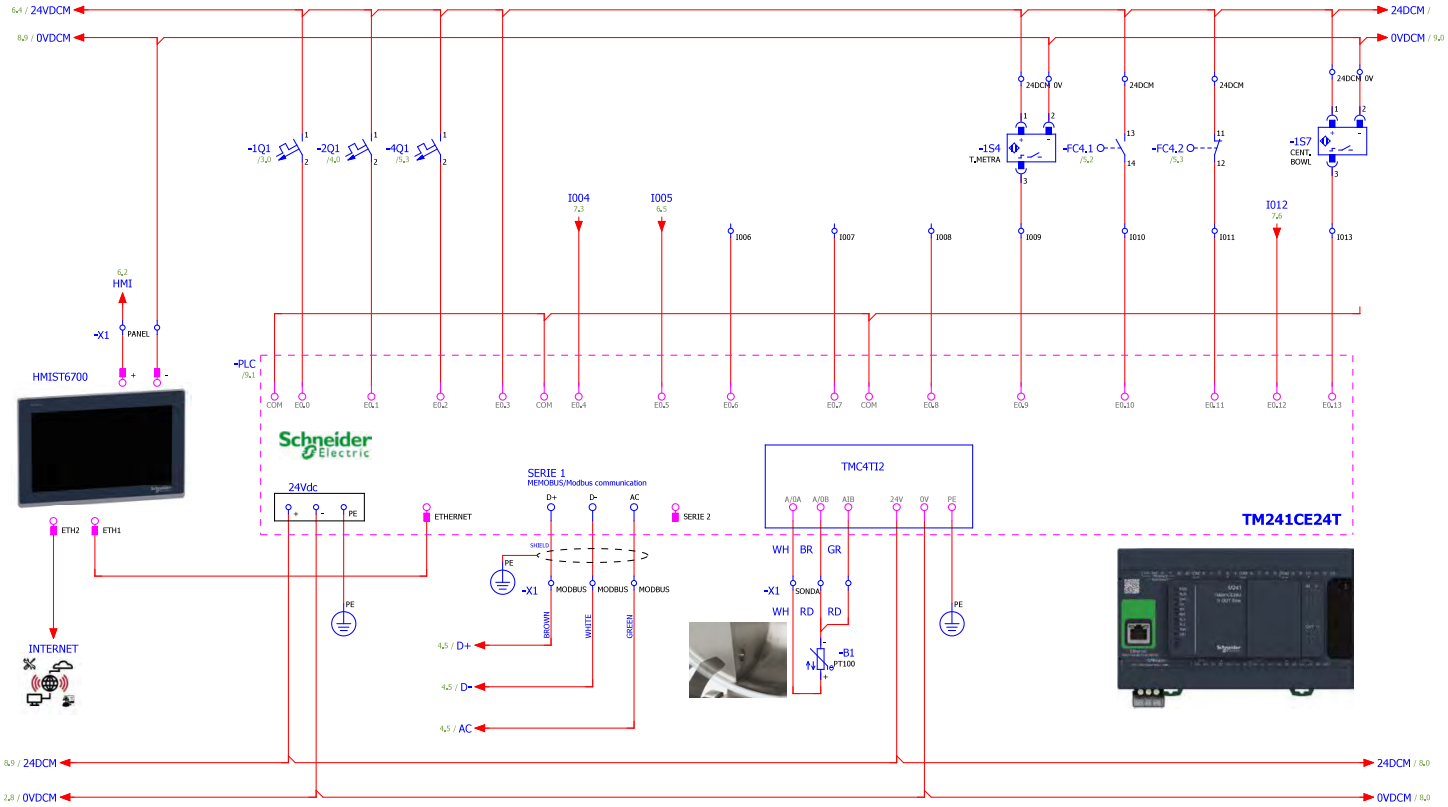

ELECTRICAL SCHEMATICS

ITEM	MODEL
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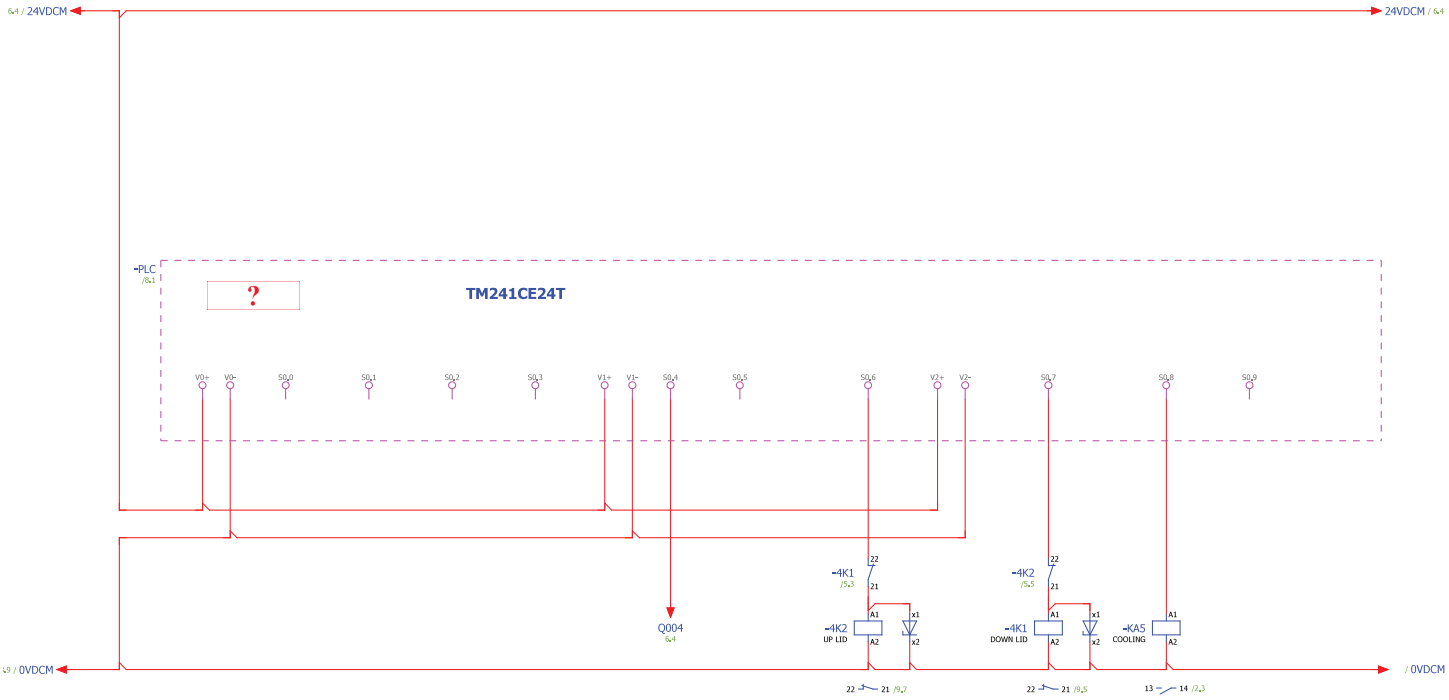

ELECTRICAL SCHEMATICS

ITEM	MODEL
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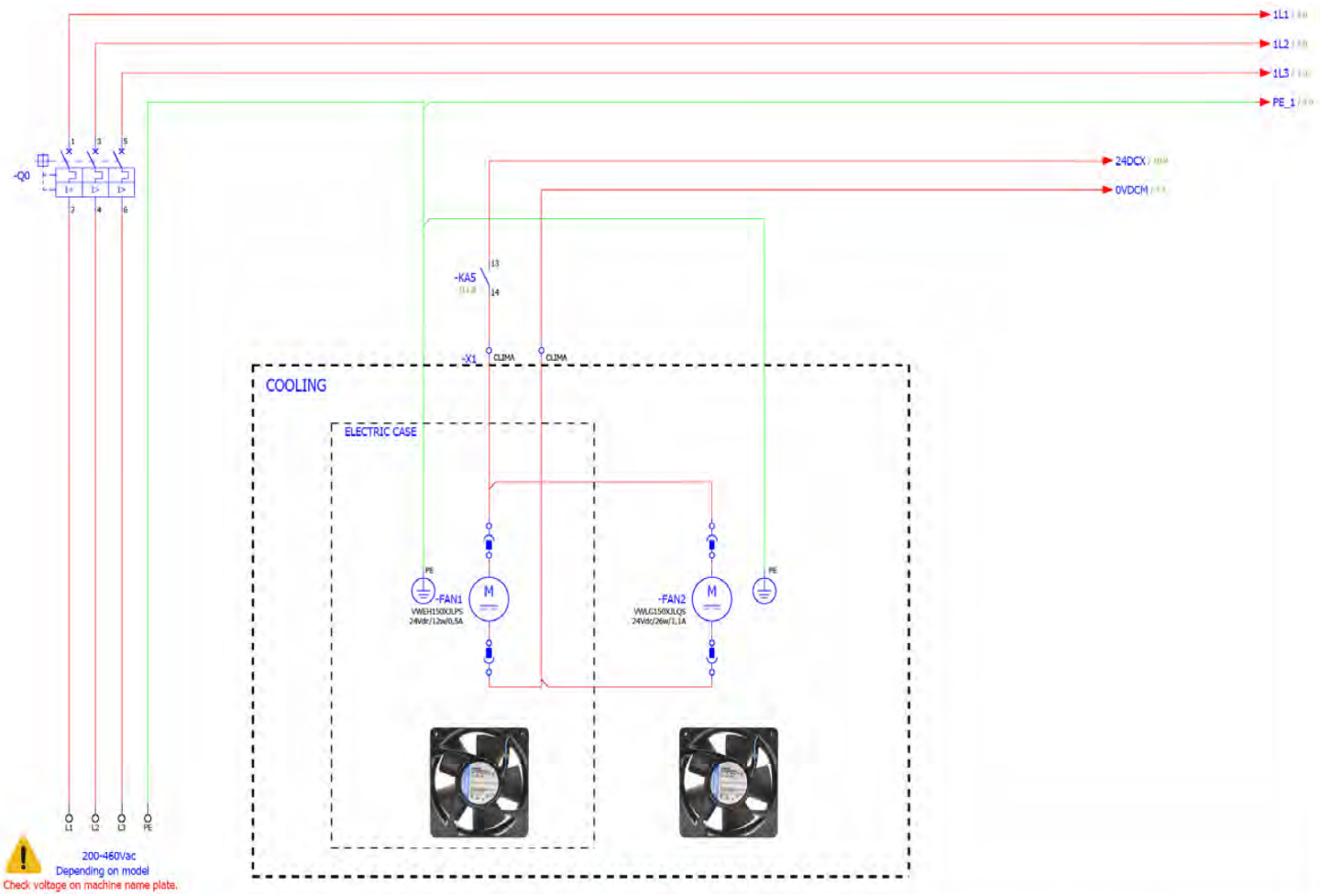
47836	FP-ES-0135



ELECTRICAL SCHEMATICS

ITEM	MODEL
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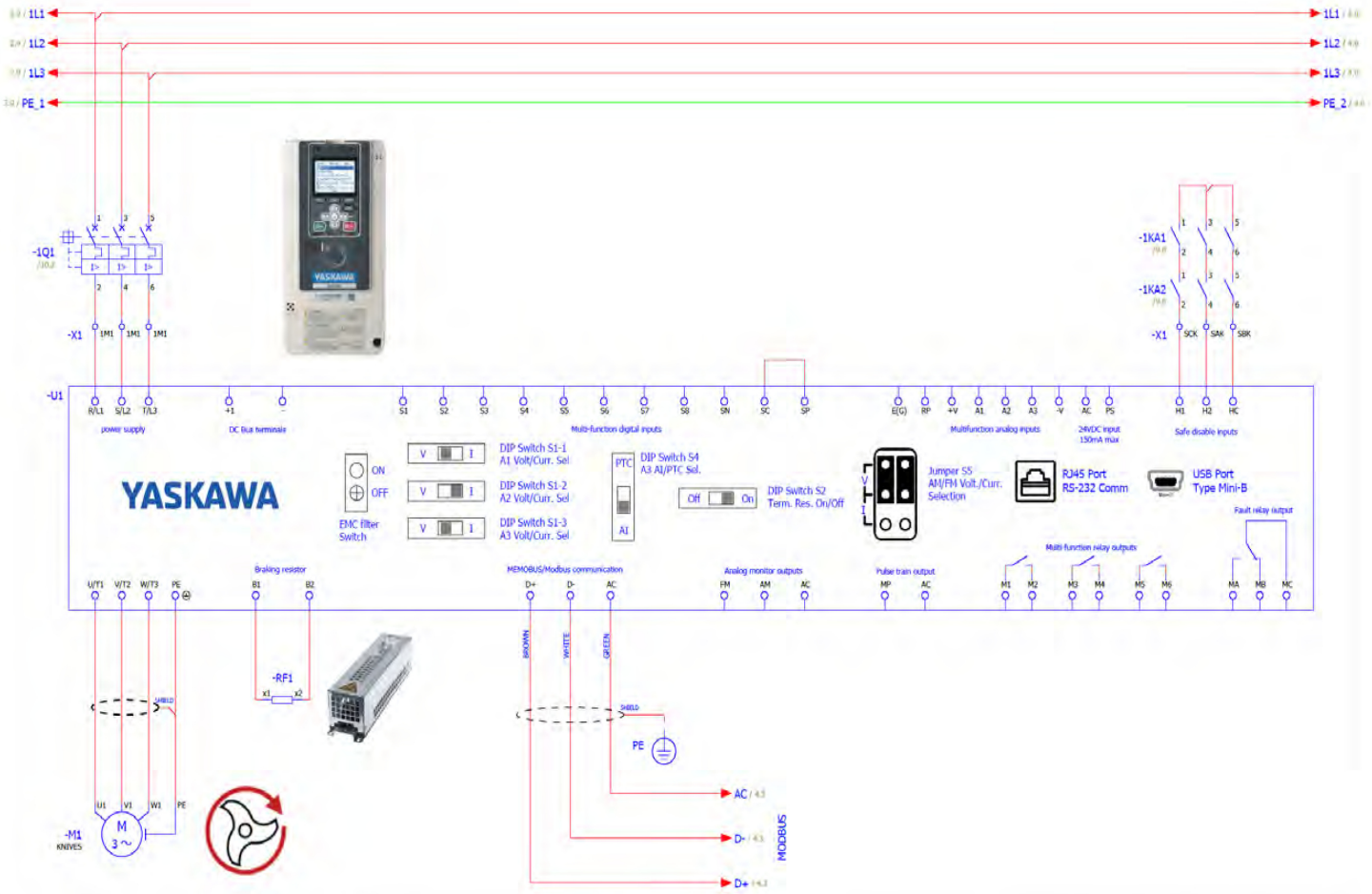

ELECTRICAL SCHEMATICS

ITEM	MODEL
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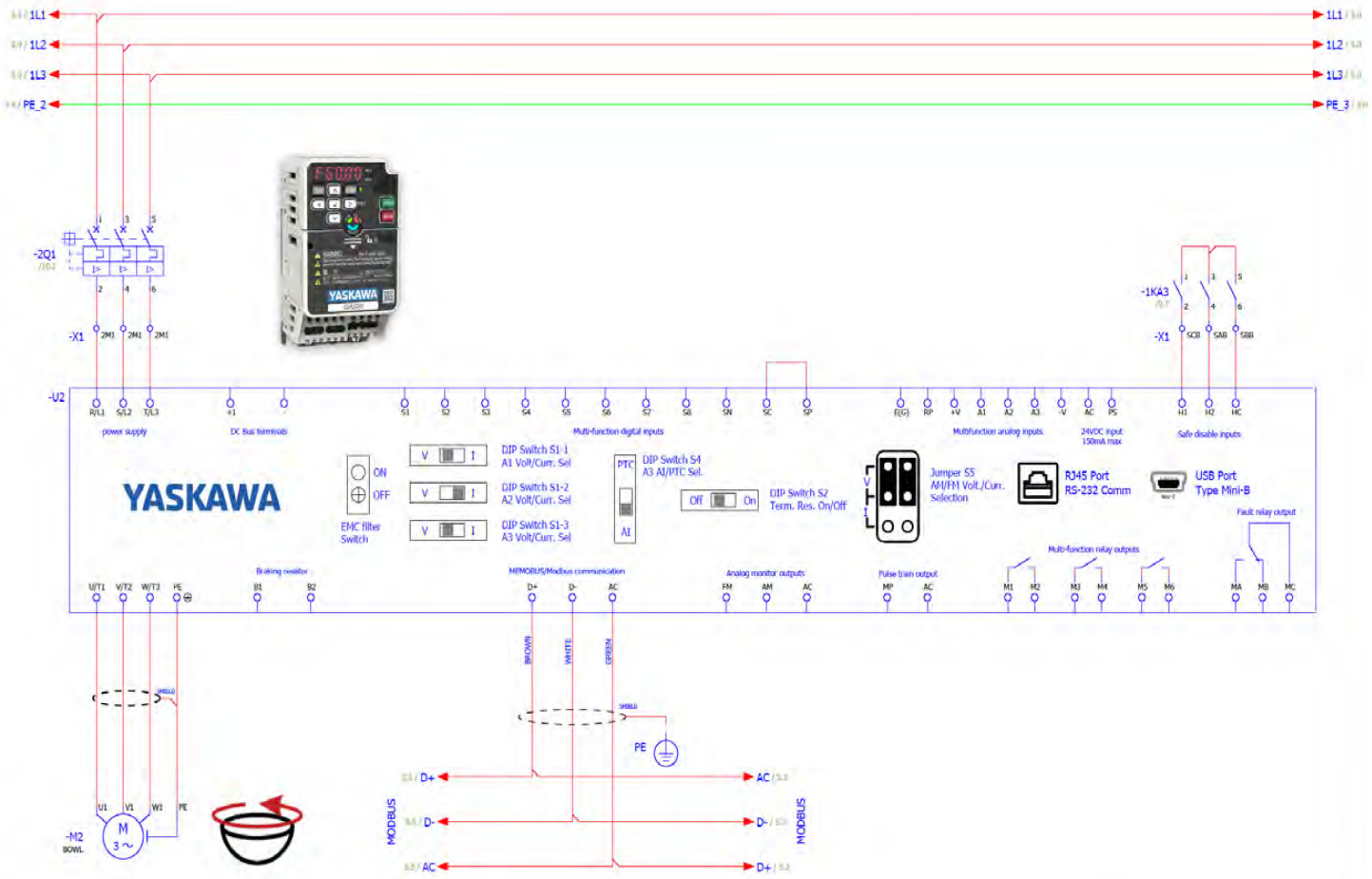

ELECTRICAL SCHEMATICS

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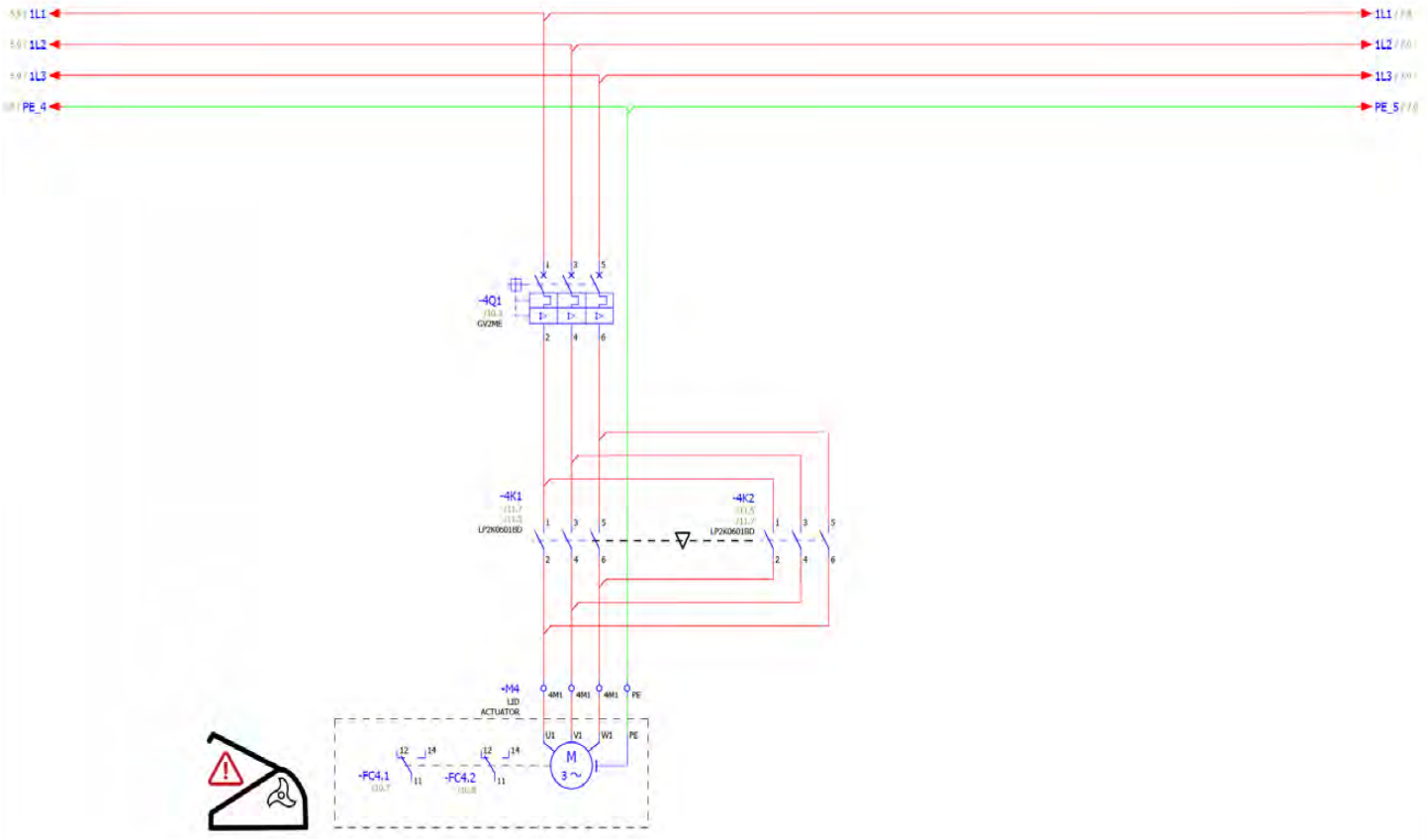

ELECTRICAL SCHEMATICS

ITEM	MODEL
47835	FP-ES-0095
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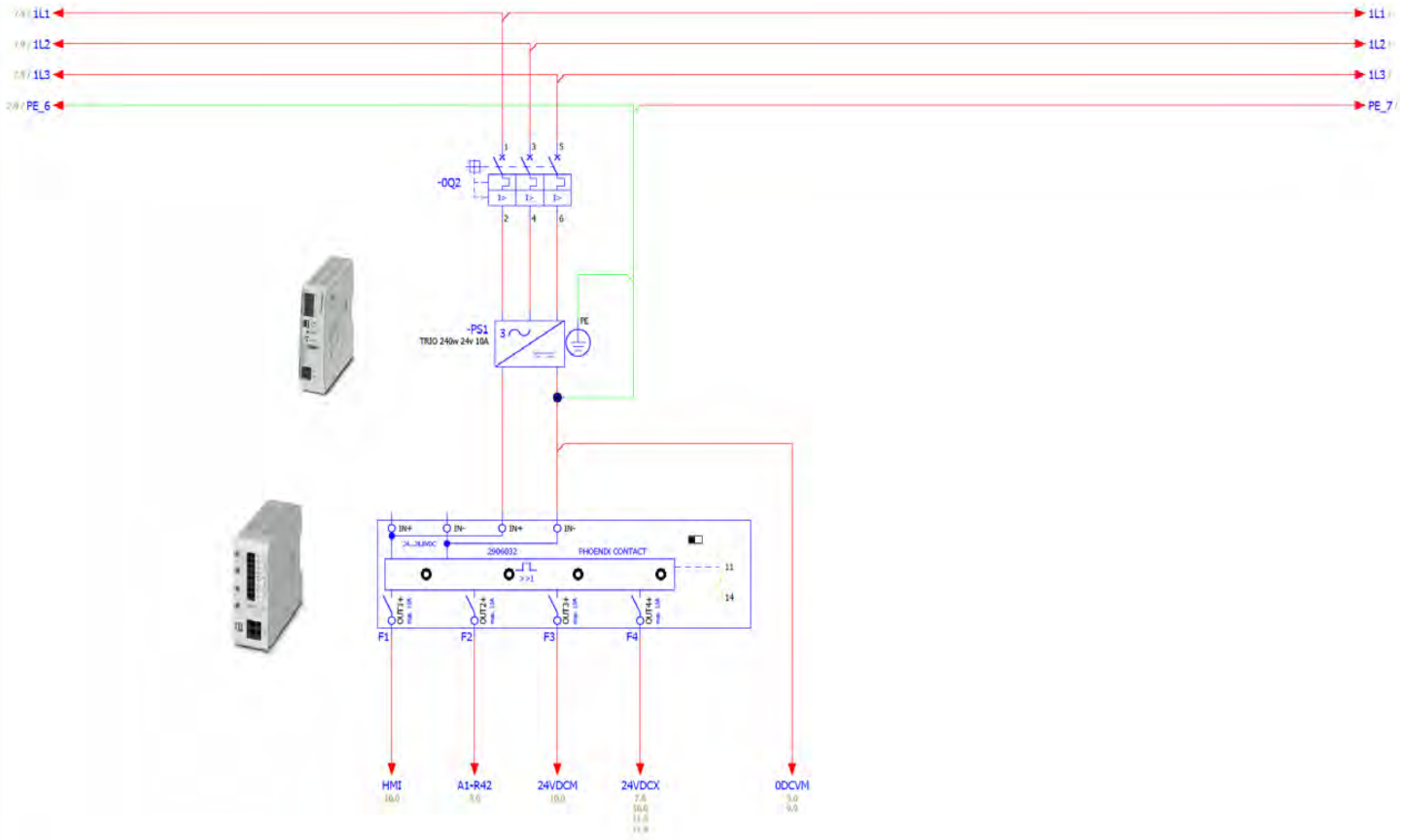

ELECTRICAL SCHEMATICS

ITEM	MODEL
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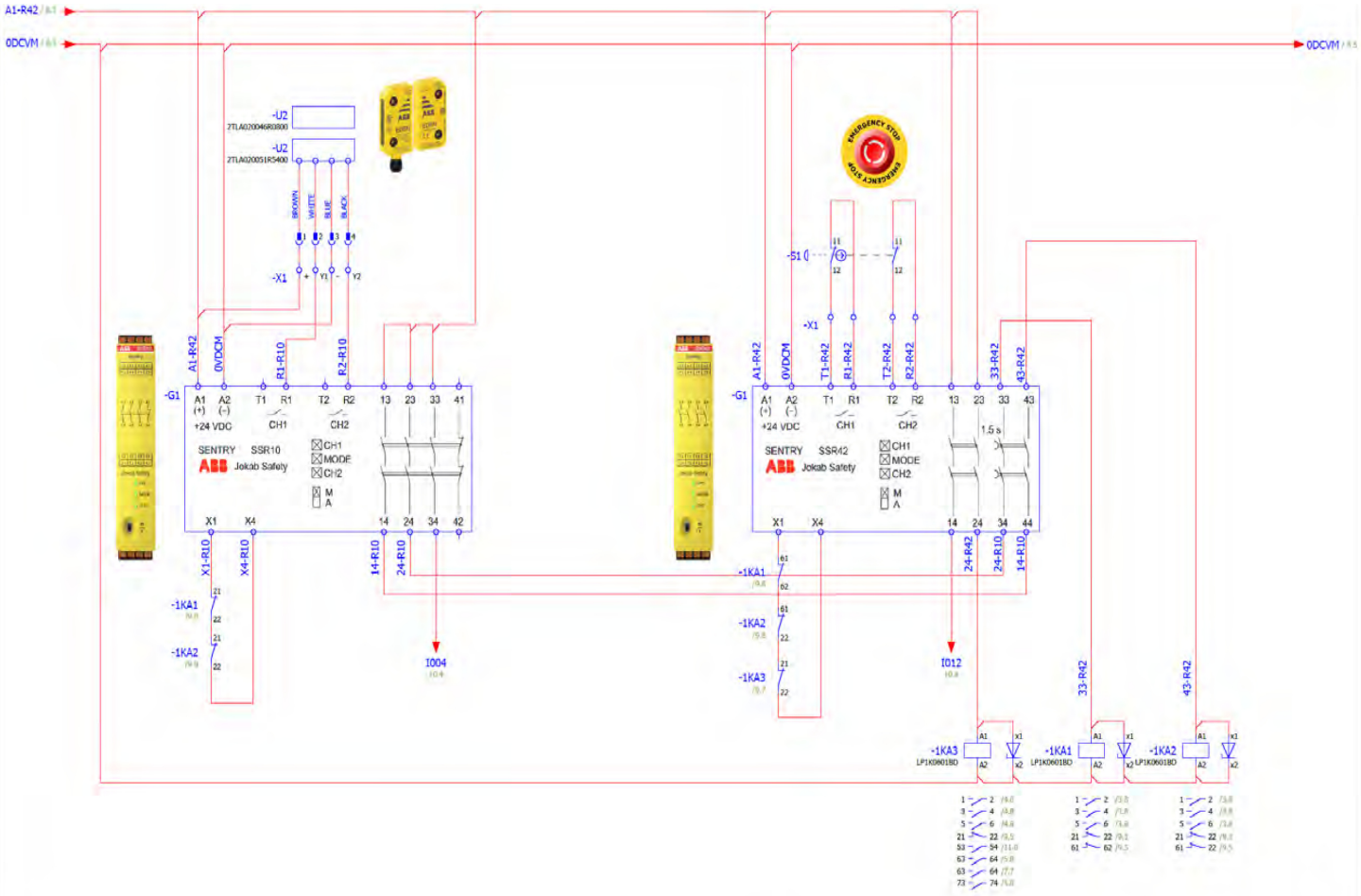

ELECTRICAL SCHEMATICS

ITEM	MODEL
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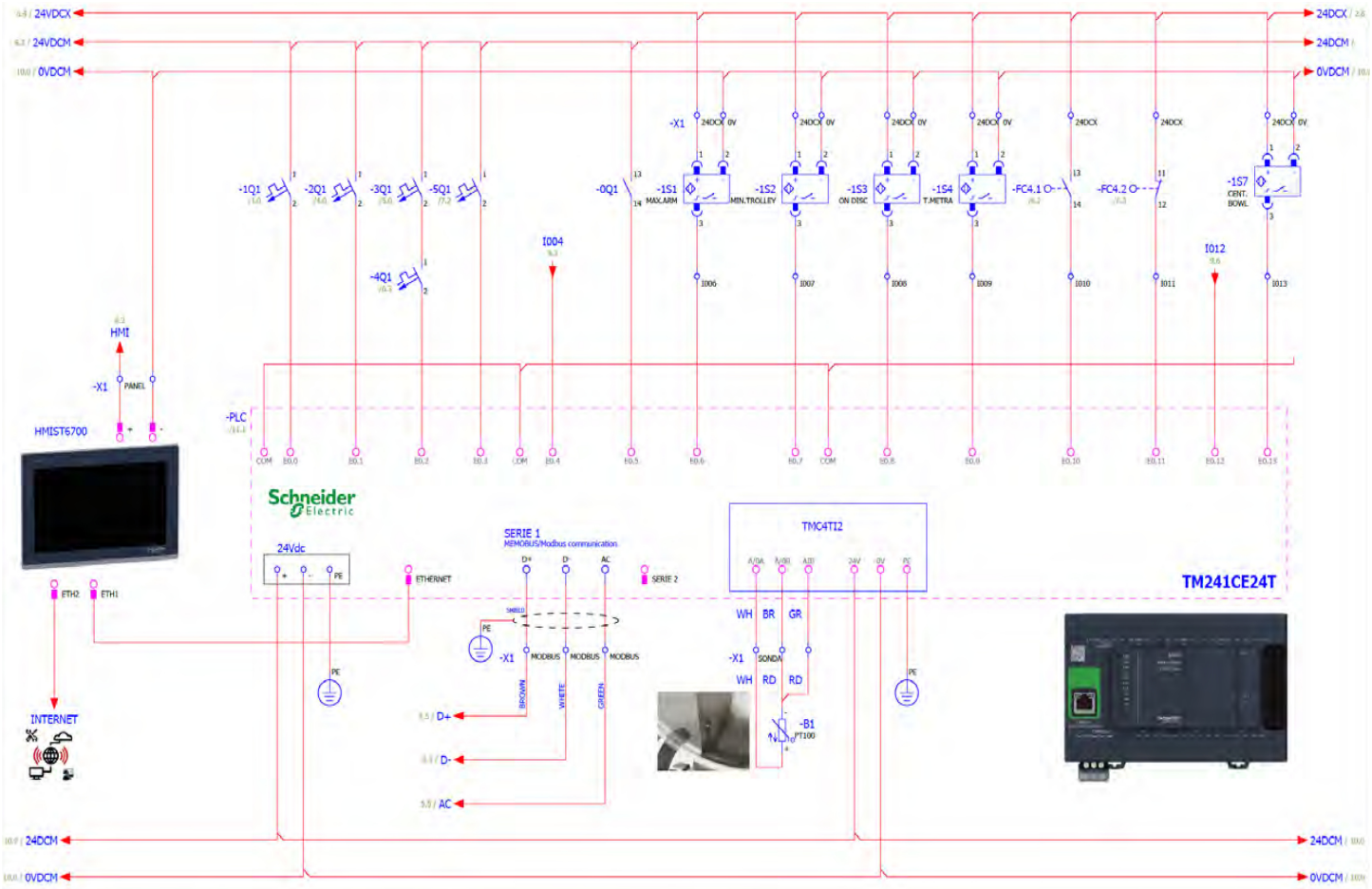

ELECTRICAL SCHEMATICS

ITEM	MODEL
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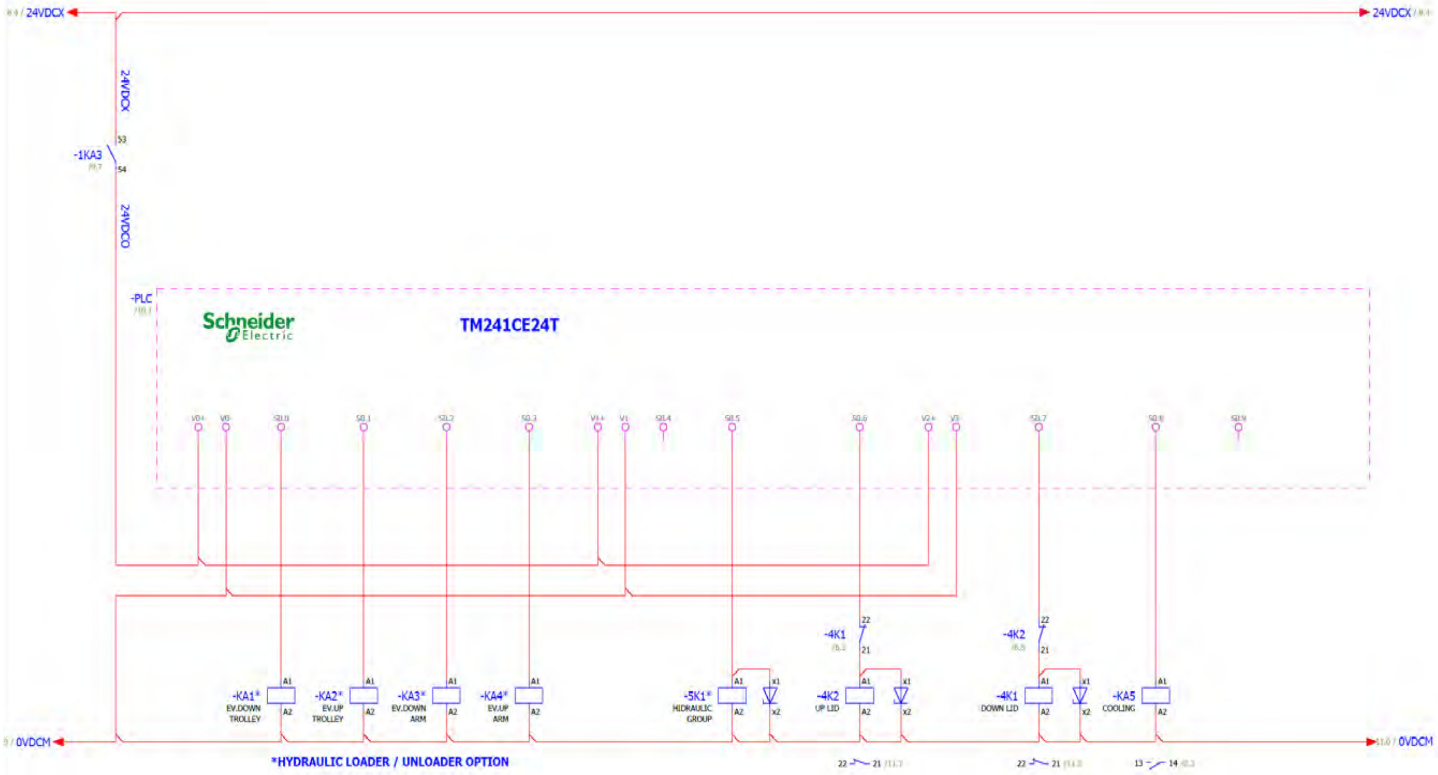

NOTES

NOTES

WARRANTY REGISTRATION

Thank you for purchasing an Trento product. To register your warranty for this product, complete the information below, tear off the card at the perforation and then send to the address specified below. You can also register online by visiting:

Merci d'avoir acheté un produit Trento. Pour enregistrer votre garantie pour ce produit, complétez les informations ci-dessous, détachez la carte au niveau de la perforation, puis l'envoyer à l'adresse spécifié ci-dessous. Vous pouvez également vous inscrire en ligne en visitant:

Gracias por comprar un producto Trento usted. Para registrar su garantía para este producto, complete la información a continuación, cortar la tarjeta en la perforación y luego enviarlo a la dirección indicada a continuación. También puede registrarse en línea en:

https://omcan.com/warranty-registration/

For mailing in Canada

Pour postale au Canada

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TRENTO
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3115 Pepper Mill Court,
Mississauga, Ontario
Canada, L5L 4X5

For mailing in the US

Pour diffusion aux États-Unis

Por correo en los EE.UU.

TRENTO
PRODUCT WARRANTY REGISTRATION
4450 Witmer Industrial Estates, Unit 4,
Niagara Falls, New York
USA, 14305

or email to: trentoservice@trentoequipment.com

Purchaser's Information

Name: _____ Company Name: _____

Address: _____

Telephone: _____

City: _____ Province or State: _____ Postal or Zip: _____ Email Address: _____

Country: _____ Type of Company:

☐ Restaurant ☐ Bakery ☐ Deli

Dealer from which Purchased: _____ ☐ Butcher ☐ Supermarket ☐ Caterer

Dealer City: _____ Dealer Province or State: _____ ☐ Institution *(specify)*: _____

Invoice: _____ ☐ Other *(specify)*: _____

Model Name: _____ Model Number: _____ Serial Number: _____

Machine Description: _____

Date of Purchase (MM/DD/YYYY): _____ Date of Installation (MM/DD/YYYY): _____

Would you like to extend the warranty? ☐ Yes ☐ No

Thank you for choosing Trento | Merci d'avoir choisi Trento | Gracias por elegir Trento

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