

# **AESUS**

Packaging Systems

## ***Owner's Manual***

### ***Delta Cap 2***

***Inline Capping Machine***



**NOTE: Machine image may not be the same as what was purchased.**

Edition date: 2017-06-05

## NOTICE REGARDING OSHA REGULATIONS

Sellers shall not be responsible for any failure of compliance which results from the location, operation, use or maintenance of the equipment or from alterations of the equipment by persons other than the Seller, or from an option or accessory to the equipment which was available to the Buyer but omitted at the Buyer's direction. Sellers shall not be responsible for design or instructions furnished by the Buyer or his Agents. Seller makes no warranties with respect to noise and will not be responsible for any fines or penalties, or consequential damages.

**Aesus Packaging Systems**  
Pointe-Claire (Montréal), Québec  
Canada

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## 1 Warranty & Terms and Conditions of Sale

AESUS refers to Aesus Labelling Systems, Aesus Packaging Systems Inc, and DL Tech Inc.

**GUARDING:** Guarding provided may not suit your local requirements. Additional guarding is available at extra cost and can be provided to meet your requirements. Please examine the guarding included and advise us immediately should you require any changes.

**PERFORMANCE GUARANTEES:** The performance of Aesus machinery to do a particular task, at a particular speed, with a customer's products (caps, containers, labels, shrink sleeves, etc.) depends on many variables. These variables may also include the ambient temperatures, the environment, the quality of the components, the quality of the film or the labels, the backing paper, the design of the container, and possibly many other considerations. Aesus in the light of their experience attempt to provide what Aesus deems is an acceptable and/or affordable solution. Therefore, due to so many possible variables, Aesus cannot positively guarantee all aspects of performance. Customers are expected to perform a final acceptance test at Aesus's facility with as many of their components as possible, and Aesus will do their absolute best to help the customer find a solution to any challenging issues, only charging the customer at Aesus's cost for the work done in the attempt to find an acceptable solution.

**TESTING:** Quotations are always subject to final testing of bulk samples. Changes and additional costs incurred in order to achieve proper operation, or to reach estimated speeds of the machinery, after testing of bulk samples, will be charged at cost, when not otherwise agreed to in advance. In those cases where bulk samples are not supplied, equipment will be tested for normal functioning only. Performance on products not submitted whether expressed or implied cannot be guaranteed.

**OTHER MANUFACTURERS:** It should be understood that although Aesus will do their best to ensure that coders, vision systems, barcode readers, UV detection systems, etc., that are manufactured by others but integrated by Aesus, perform appropriately at installations and during FATs (should the customer have purchased FAT tests at Aesus, or with Aesus in attendance at the customer's facility), Aesus does not guarantee these items, nor will Aesus be held responsible to delivery delays caused by deficiencies of such systems. The customer should do their due diligence in the choice of coding and checking systems that are appropriate. Aesus may facilitate the process by purchasing these items on behalf of the customer, but it is understood that Aesus passes the warranty (ies) of these items to the customer upon delivery of the machine. If any of these systems fail to perform, the customer should deal directly with the supplier in question, although Aesus will do their best to help facilitate this process.

An "Aesus in attendance" run is a test of a duration that is acceptable to both Aesus and the customer (at suitable charges) at an Aesus facility or at the customer's facility, with qualified Aesus engineer(s) in attendance for the purpose of qualifying and accepting the machine (FAT).

**SAMPLES AND TEST MATERIAL:** In order to confirm the order and the estimated time for machine manufactures, representative samples of all materials and containers to be used on the machine must be available at the factory. Samples, as requested are to be forwarded free of charge, freight prepaid to the factory by the customer, indicating minimum values for customs purposes where applicable. All samples will be returned with all the tested machinery. In the case where returning product will significantly increase the freight costs, the Buyer will have the option of paying for proper disposal of their samples.

Normally a 15 minute "production run" of samples of each size bottle (or more), and adequate samples of products, band, or other consumables are required in order to ensure the proper operation of the machine. Samples must be sent free of charge, freight and duties prepaid to arrive within 30 days of order date. Late delivery of the samples will result in late delivery of the machine.

**MATERIALS AND CONSUMABLES:** Aesus assumes no responsibility for materials and consumables purchased by the buyer regardless of testing performed and recommendations made. Aesus recommends that the customer does not buy considerable quantities of consumables such as film, band, sleeving, caps, labels, etc. until final satisfactory tests have been conducted to prove suitability of such.

**MACHINE ACCEPTANCE:** When machinery is complete, the customer will be requested to visit the Factory for machine Acceptance Testing (FAT). All features will be demonstrated, as well as a five-minute continuous production run on all sizes of samples supplied. Additional charges apply for longer acceptance tests or when more than 3 product sizes are to be tested. The machine will be deemed to be complete and accepted by the customer when the manufacturer has demonstrated the machinery operating at the required speeds and quality specified.

**ON-SITE ACCEPTANCE TESTING:** Customers have the option of having the acceptance tests repeated at their facilities, by contracting for a representative of the original equipment manufacturer or Aesus to carry out the test on-site, at prevailing rates.

**INSTALLATION LABOUR AND TRAINING:** Installation of and training on equipment and accessories is not included and can be done by Aesus or by those of Aesus's agents and representatives on request at prevailing rates. Note that some equipment such as coders, vision systems, barcode readers, UV detection systems, etc., that are manufactured by others (OEMs) but integrated by Aesus, can be complicated and Aesus technicians may not be familiar with many aspects of these items. Customers should also consider engaging OEM trained technicians for these complicated systems. When equipment is not installed by us, Warranties shall be limited to replacement of defective parts, FOB supplier factories, supplied prepaid and credited on return of defective parts.

**DAMAGE CLAIMS:** Great care is taken in packing all machines, parts and accessories. All claims for breakage or damage whether concealed or obvious must be made to the carrier as soon as possible after receipt of the shipment.

**WARRANTEE:** Equipment and Component warranties are in accordance with those of the original equipment supplier, but for Aesus manufactured components shall be 12 months, based on single shift usage. Wear parts, and those parts found not to be installed according to the equipment manufacturers or Aesus instructions, abused, not used in accordance with the application originally intended, or modified without prior approval of the original equipment manufacturer or Aesus are excluded. Labour or travel to replace defective parts is not included.



The foregoing is the only warrantee made by the seller, and the seller specifically disclaim all other warranties, express or implied, including but not limited to, the implied warranties of marketability and fitness for a particular purpose.

**LIMITS OF LIABILITY:** Liability of the original Equipment supplier, Aesus's, its agents, distributors, and representatives, for any damages suffered by the buyer or its customers, whether in contract or otherwise, shall be limited to the amount paid to the seller by the buyer in reference to the equipment supplied, and in no case shall a seller be liable for any special, indirect, or consequential damages (including loss of goods, loss of profits, loss of opportunity, replacement costs or other) of buyers, any customer, or of any third party, even if sellers have been previously advised of the possibility of such damages.

**RETURN OF GOODS:** In no case can any material or equipment be returned to us without our prior written acceptance.

**FORCE MAJEURE:** Under no circumstances can Aesus or their representatives be responsible for delays caused by Force Majeure. Force Majeure includes strikes, wars, riots, floods, fires, earthquakes, and other such eventualities out of the control of Aesus or their representatives.

**WAIVER:** Our failure to insist upon any of these terms and conditions shall not be deemed a waiver of any rights that Aesus may have, and shall not be deemed a waiver of any subsequent breach or default in these terms and conditions.

**PERMITS:** Permits and inspections, when not specified, required for the installation and/or use of the equipment furnished, must be applied for by the Buyer at their own expense.

**TAXES,** excises, or other charges imposed by any local, state, or federal authority, which have to do with or affect the goods herein ordered, shall be assumed and paid by Buyer. Bank charges and fees for legalization or certification of documents are not included.

**SPECIFICATIONS:** Specifications, machine designs, and features are subject to change without notice, unless specifically agreed to in advance.

**COPYRIGHT:** This proposal, specifications, literature material, and all technical details are the property of Aesus and are supplied for the sole purpose of evaluating equipment to be supplied by Aesus. Any reproduction or redistribution without our prior written consent is strictly prohibited.

**CLAIMS:** Any claim for consequential or incidental damages and any claims, right of action and demands, regardless of how they are described, whether in law or equity, shall be interpreted according to the laws of the Province of Quebec, Canada and they shall be pursued solely in the Province of Quebec, Canada.

**ACCEPTANCE AND USE OF MACHINERY:**

Acceptance and/or use of this packaging machine include acceptance of all terms and conditions included herein.

## **1.1 Disclaimer and Limitation of Liability**

IT IS UNDERSTOOD AND AGREED THAT SELLER'S LIABILITY FOR ANY DAMAGES SUFFERED BY BUYERS OR ITS CUSTOMERS, WHETHER IN CONTRACT, IN TORT, UNDER ANY WARRANTY THEORY, IN NEGLIGENCE OR OTHERWISE, SHALL BE LIMITED TO THE AMOUNT PAID TO SELLERS BY BUYER PURSUANT TO THE CONTRACT. UNDER NO CIRCUMSTANCES SHALL A SELLER BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES (INCLUDING LOST PROFITS) OF BUYERS, ANY CUSTOMER, OR ANY OTHER THIRD PARTY, EVEN IF SELLERS HAS BEEN PREVIOUSLY ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

## 2 Installation

### 2.1 Unpacking the Machine

- ✓ Remove the top and sides of the crate.
- ✓ Immediately check the machine for any damage.
- ✓ If damage is found, immediately notify your carrier/transport company.
- ✓ Remove the accessories and any change parts and put them in a safe place.

### 2.2 Installing the Machine

1. Remove the machine from the skid and place it at the desired position on the work floor.
2. Adjust the feet or casters supporting the machine to ensure it is level and at the same height as the rest of the line.
3. Installation of upstream or downstream conveyors and transfer accessories must permit free travel of the product from one conveyor to the next without allowing the bottles to jam.
4. Supply power to the machine as per the specifications noted on its rating plate.
5. Supply compressed air to the Main Air Pressure Regulator as per the specifications noted on the rating plate (*Figure 2-1*). Refer to the rating plate affixed on your machine.
6. Special attachments can be mounted according to any special instructions provided.



**Figure 2-1: Rating Plate—Example**



**Figure 2-2: Delta Cap Typical Machine Overview**

### 3 General Description & Operation

The Aesus Delta Cap 2 machine consists of a push through cap placement system with a gating bottle indexer to transport containers under the first chuck capping station. The container is first capped and the container is then indexed to the pressure station where the cap is firmly secure on the container with an electrically driven motorized adjustable chuck (or magnetic chuck optional). A pneumatic container clamping system is used in order to hold the container while tightening the enclosure. Capping and Pressing Height adjustments are done through a motorized lift for varying bottle heights.

Bottles enter the machine from the conveyor infeed that transports the bottles to the cap placement station. The caps are placed onto the bottles at the first capping station using an air motor with vacuum at cap pushers. The pre-capped bottle is then moved to be capped tightened to the correct pressure at the second station with a pneumatic chuck. Photo sensors are positioned so that cap is not pushed when bottle isn't present or cap not correctly in position.

The feeding system is a fully automatic cap sorting elevator (standard) or can use optionally vibratory bowl or centrifugal bowl (option) depending on the cap characteristics. Feeding caps into the adjustable Cap Chute is automated via a low level sensor.

Other options available may include transportation of the caps from the cap elevator to the dedicated cap trap, enclosed frame and sensor wires, Lexan and interlocking safety guards, LED controls, snap-in change parts, etc. A bottle start sensor (optional) and a bottle backup sensor (optional) may be situated upstream and downstream of the machine to control the starting and stopping the machine in normal lines running conditions.

The machine main control is a Human-Machine Interface (HMI) colour touch screen mounted on the side of the capper machine. Recipe management eases the quick repeatability in setup.

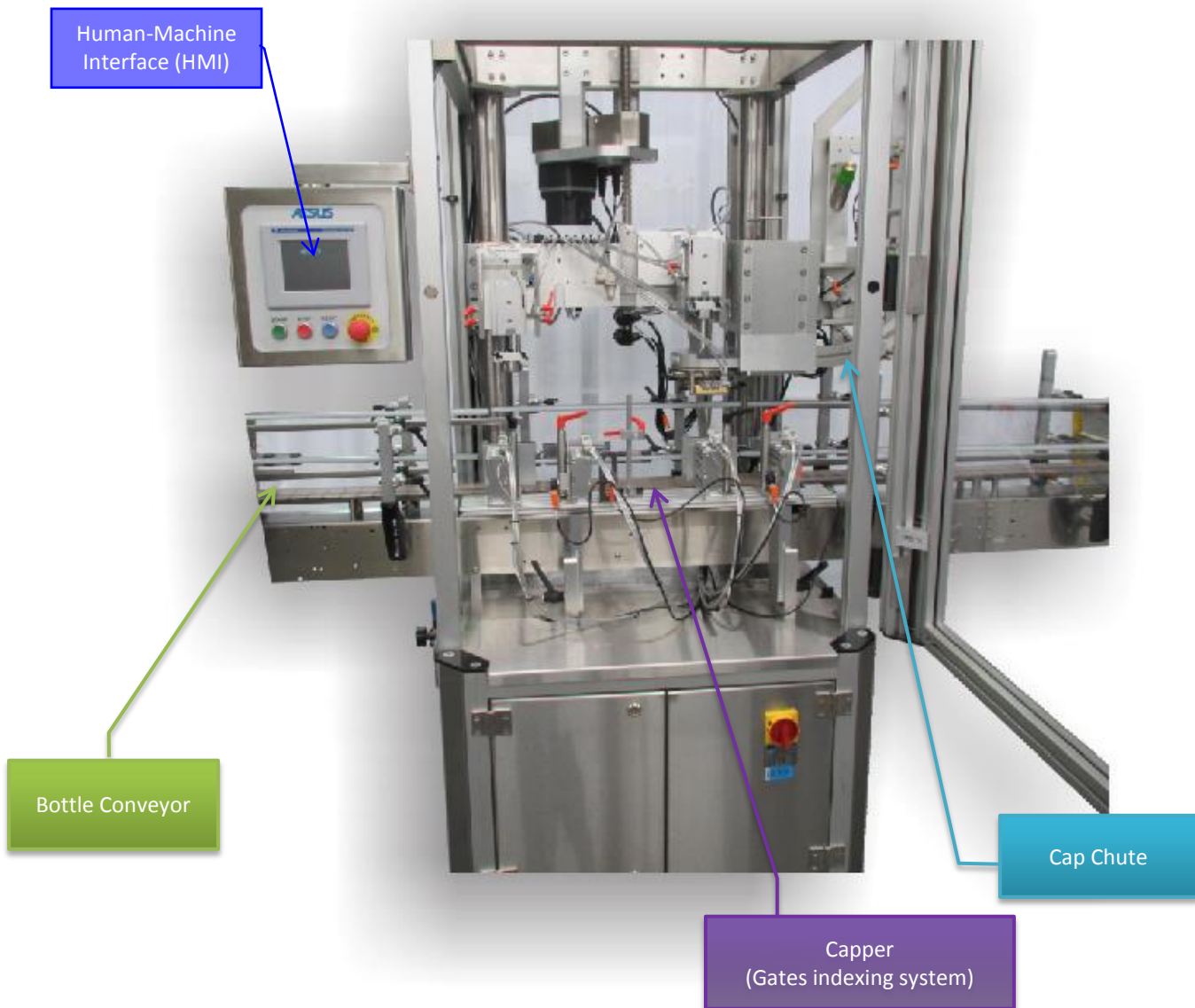
The machine is supported at each corner with threaded rod footpads for levelling and stability or optionally threaded rod castors to enable the equipment to be easily moved.

Recirculation devices can be supplied in options so that in the unlikely event a cap is not applied, the container can be re-circulated for an additional attempt. If a cap is misapplied, misaligned and/or missing, sensors are available to reject the container to a reject bin station (optional).

The Aesus Delta Capping machine uses the most current methods of mechanical and electronic technology. They are of rugged construction and reliable in operation, requiring only a minimum of maintenance. All processes comply with current Good Manufacturing Practices.

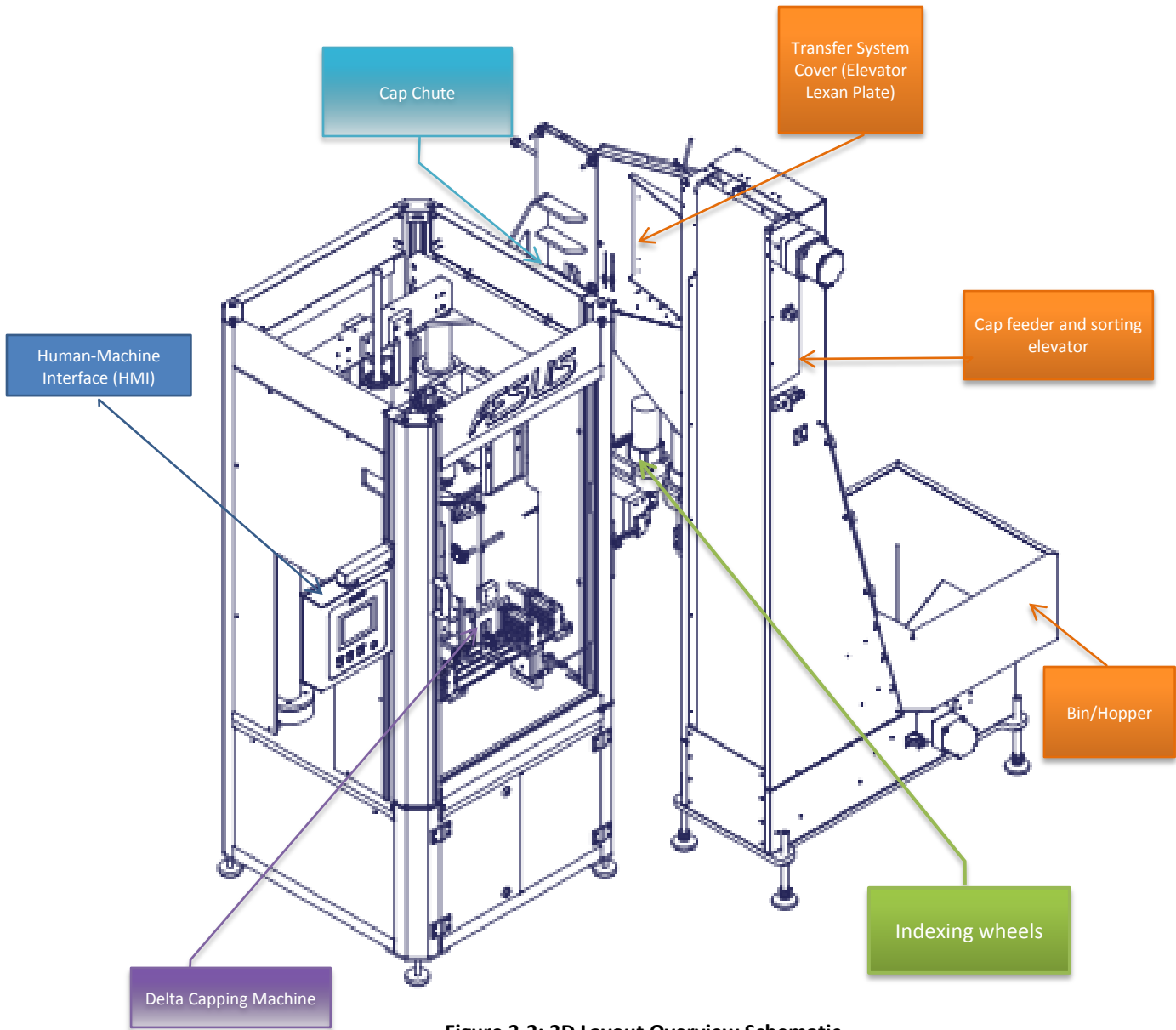
To ease visualization of the principal systems, the Capper is subdivided into principal components: Cap Feeder and Sorting Elevator (**orange callout**), Cap Chute (**blue callout**), StarWheel Capper and Torquer (**purple callout**) and the indexing system (**green callout**).

Refer to the following figures.



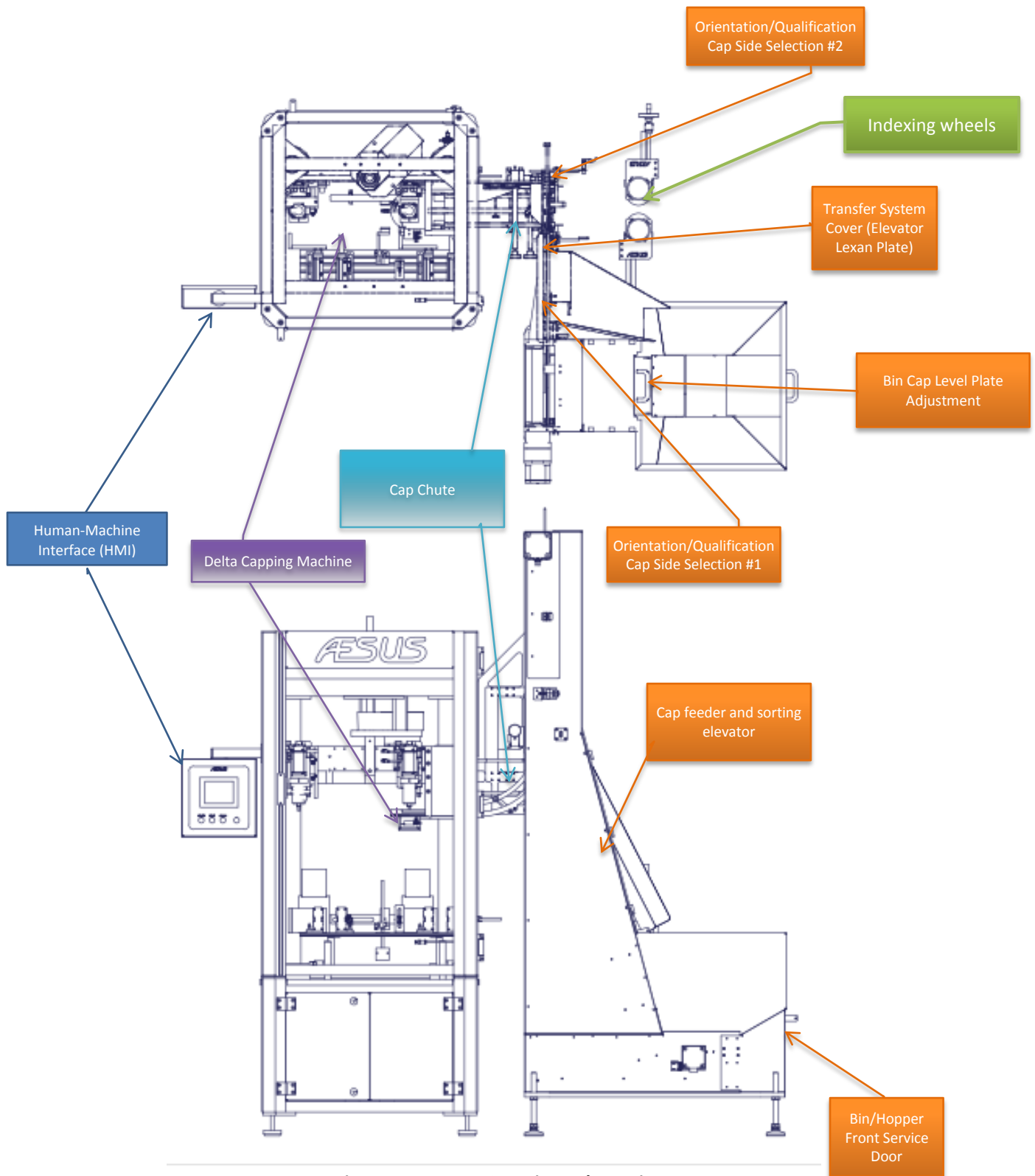
**Figure 3-1: Delta Capper 2 Machine Overview**

**NOTE:** The pictures included in this document may not be exactly the same as your machine depending on your configuration/options.



**Figure 3-2: 3D Layout Overview Schematic**

**NOTE:** The schematics included in this document may not be exactly the same as your machine depending on your configuration/options.



**Figure 3-3: Layout Overview Schematic**

**NOTE:** The schematics included in this document may not be exactly the same as your machine depending on your configuration/options.

## 4 Safety Features

As is the case with all automated equipment, machinery can present safety hazards if safety guidelines are not followed. The guidelines which follow are for operator and maintenance personnel safety. Before proceeding with this manual make sure to read and understand the safety features outlined in this section.

### 4.1 Emergency Stop Push Button

The Emergency Stop (E-Stop) Push button cuts the control power supplied to the Delta Capper and stops the machine operation instantly once pressed no matter where the current cycle is (hard stop). It should only be pressed in case of an emergency where the machine operation must be stopped immediately. It should not be used as a normal cycle stop function. In order to restart the system, the cause of the emergency stop must be identified and rectified, the E-Stop button on the control panel enabled, and the alarm acknowledged on the Alarm screen before restarting production.

This machine has an Emergency Stop push button located on the control panel.

### 4.2 Safety Guarding

The moving components of the Delta Capper are guarded by interlocked guard doors. The system cannot operate with the doors open and must be closed, alarm acknowledged, and systems reset in order to resume operations.

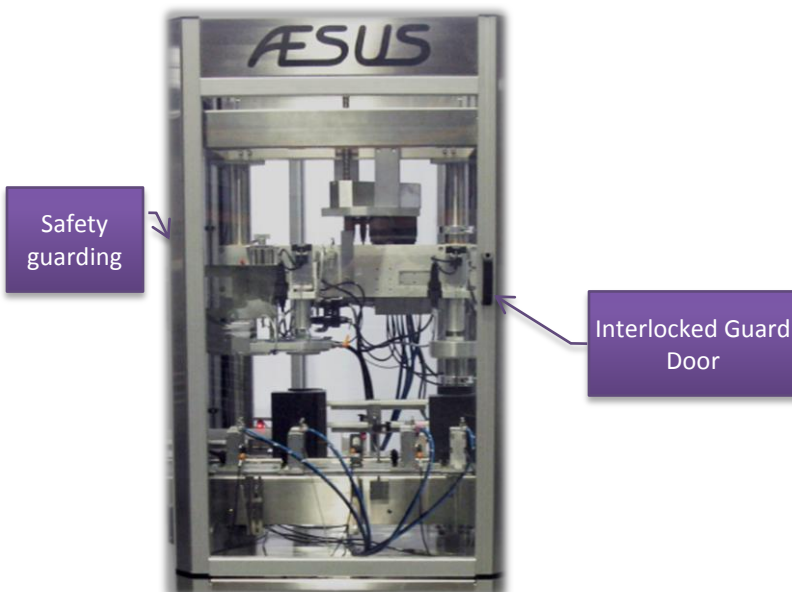


Figure 4-1: Safety Guarding

### 4.3 Main Power Disconnect Switch

The Aesus Delta Capper is equipped with a MAIN POWER disconnect switch which is used to power-up the system when the switch is turned to its ON position (*Figure 4-2*). The switch is located on the main cabinet located on rear of the system. When the switch is turned to its OFF position all power to the system is removed. Unless stated otherwise in this manual, the MAIN POWER disconnect switch should always be in the OFF position when servicing or executing preventive maintenance procedures on the system.



Figure 4-2: Main Power Disconnect Switch

## 5 Setup

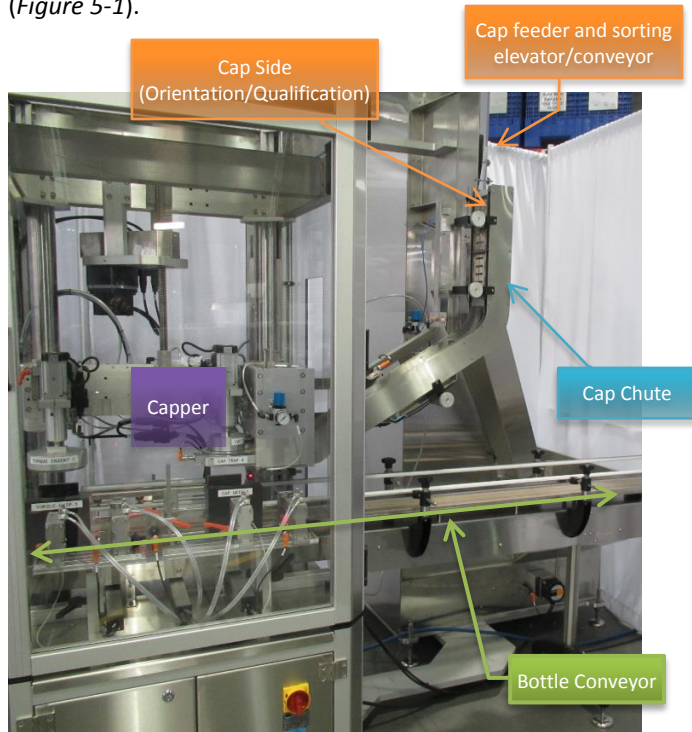
**Always engage the Emergency Stop or turn off Main Power when working on the Capper.**

**NOTE:** The pictures included in this section may not be exactly the same as your machine depending on your configuration.

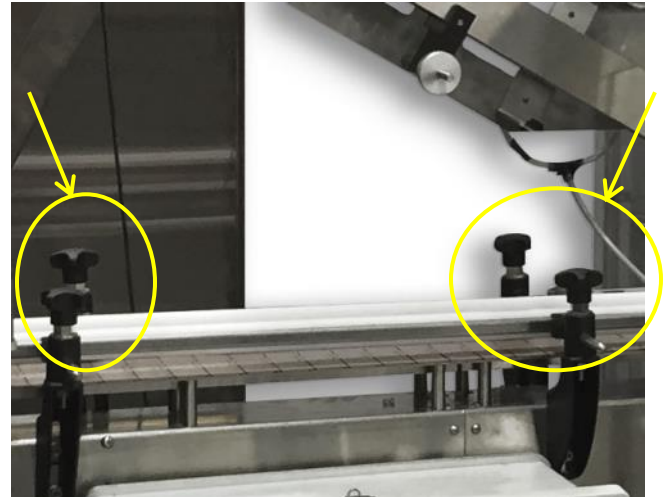
### 5.1 Machine Levelling

**NOTE:** Before making adjustments on any components of the Capper, the entire machine requires a levelled installation.

Align and level the entire machine which includes Cap Elevator, Cap Trap, Cap Chute and the bottle conveyor (Figure 5-1).



**Figure 5-1: Cap Feeder, Chute and Conveyor Levelling**



**Figure 5-2: Guide Rail mounting**

Adjust the Guide Rails as follows:

- Undo the black knobs holding the Guide Rails in place.
- Place 2–3 containers on the conveyor between the Guide Rails.
- Slide the rails inward and leave about 3 mm (1/8") of space so they are close to the containers but not tight against them.
- Tighten the black knobs firmly.
- Run the Conveyor to ensure the containers can move freely.
- Repeat for each section of rails.

### 5.2 Guide Rail Setup

The machine may be equipped with a simple or a double guide rails to help steer and prevent product from falling off the conveyor (Figure 5-2).



## 5.3 Cap Feeder and Sorting Elevator Setup

This section treats of the adjustments needed on each system of the Cap Feeder and the Sorting Elevator/Conveyor as illustrated in *Figure 5-3*.



**Figure 5-3: Cap Feeder and Sorting Elevator Overview**

### 5.3.1 From Bowl to Elevator

This bowl or Hopper is designed to constantly feed the elevator with caps. It is equipped with a conveyor belt at the bottom and a low cap sensor to avoid running out of caps.

When the bin is full of cap (Better not to over load the bin otherwise it may prevent the smooth running of the elevator) the elevator is supplied with caps by the sheer quantity of caps. When the quantity of cap start to get low, the low cap sensor will activate the conveyor or the blue belt at the bottom of the bin to bring the remaining cap to the elevator.



**Figure 5-4: Bin conveyor**

#### 5.3.1.1 Adjust In/Out Rollers Cap Side Selection

1. Adjust the In/Out rollers position according to the Setup Sheet "Cap Side Selection" (*Figure 5-5*).



**Figure 5-5: Cap Side Selection #1—In/Out Rollers Handle**



Figure 5-6: Free Movement of the Caps

## 5.4 Lexan Adjustments

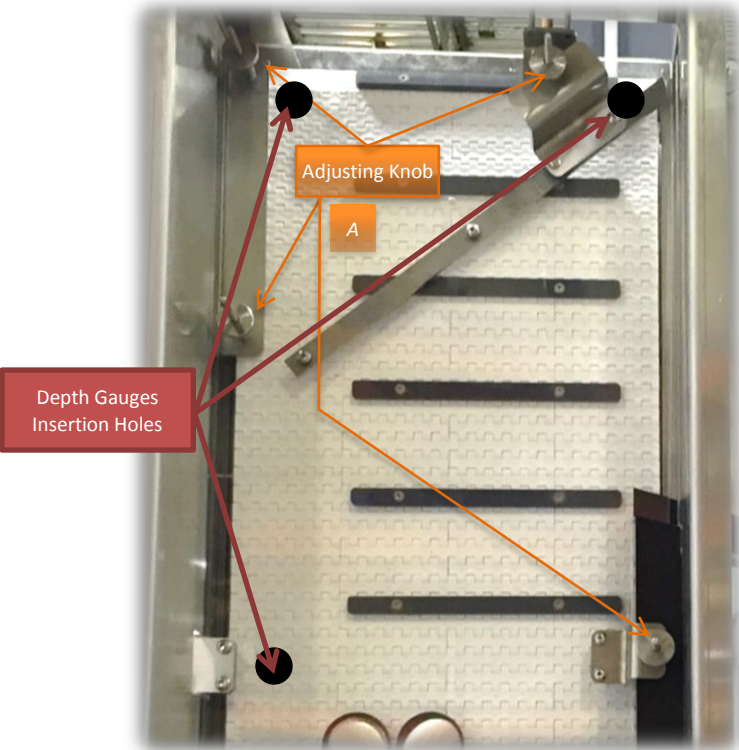


Figure 5-7: Elevator Lexan Adjustment

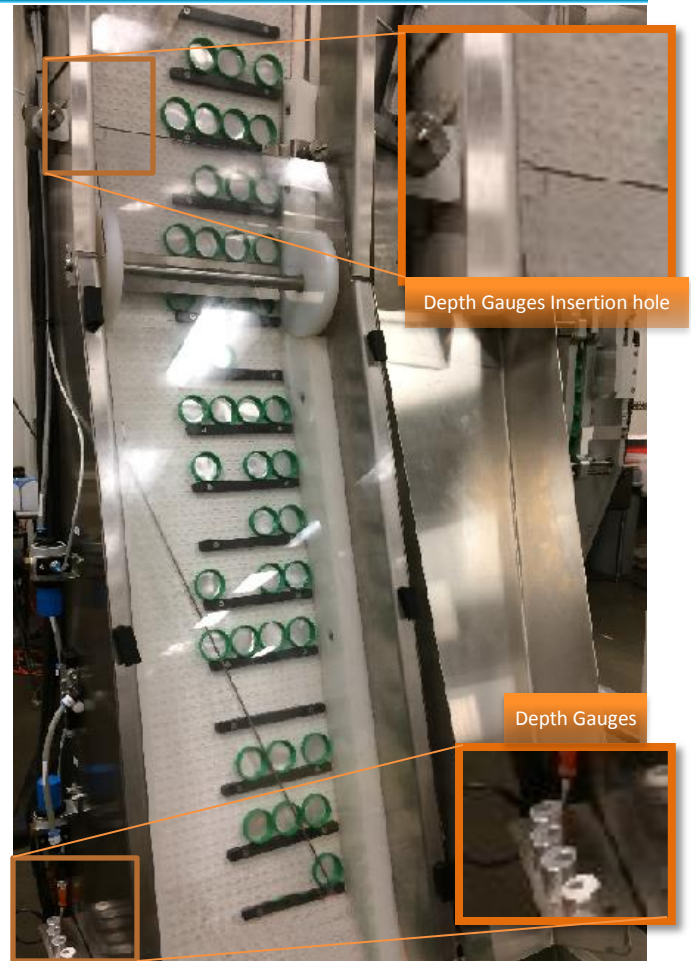


Figure 5-8: Chute with Depth Gauges

### 5.4.1 Lexan Elevator Setup

Adjust the Elevator Lexan Cover (Figure 5-7 and Figure 5-8).

- Unscrew the adjusting knob holding Lexan.
- Take the Depth Gauges indicates for the cap to be used, and insert them in the three Insertion holes. (Figure 5-8)
- Put the lexan flush against the depth gauges and screw the adjusting knob back in place.

### 5.4.2 Lexan Cap Transfer System Setup

Adjust the Cap Transfer System (Figure 5-9):

- Unscrew the adjusting knob holding Lexan.
- Take the Depth Gauges indicates for the cap to be used, and insert them in the three Insertion holes. (Figure 5-9Figure 5-8)
- Put the lexan flush against the depth gauges and screw the adjusting knob back in place.

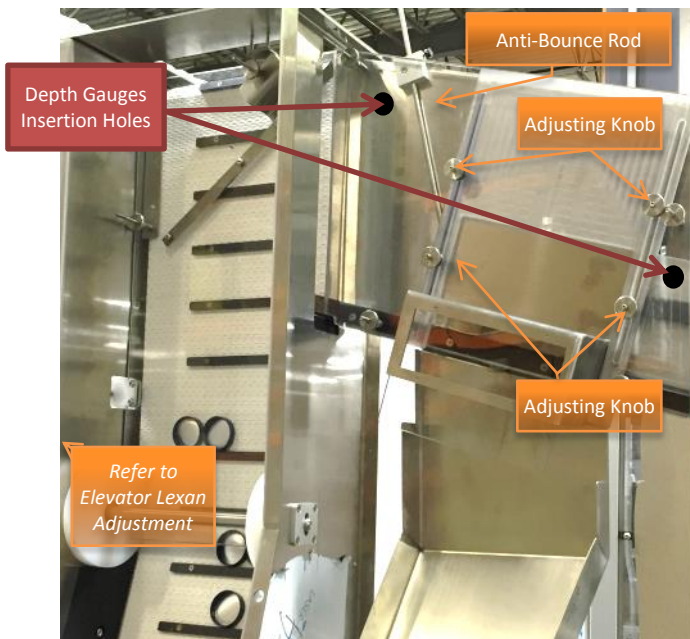


Figure 5-9: Cap Transfer Lexan Adjustment

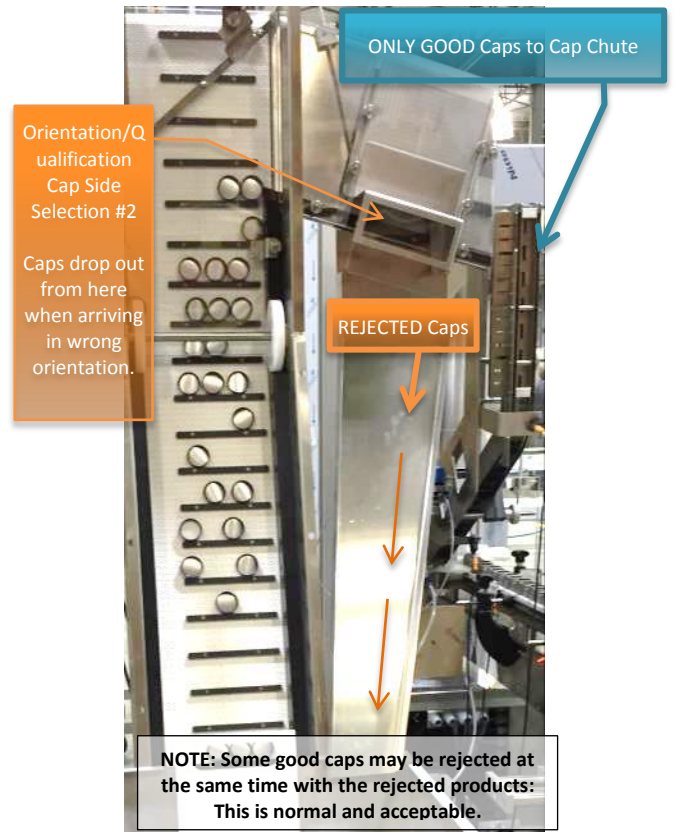


Figure 5-10: Sorter and Elevator to Cap Side Selection #2

NOTE: The pictures included in this document may not be exactly the same as your machine depending on your configuration/options.



Figure 5-11: Orientation of Cap in the Cap Side Selection #2

## 5.5 Cap Transfer System and Sorting Setup

At the top of the Elevator, there shouldn't be any caps in the wrong orientation because the Capper must mandatory have all caps ready to cap (Figure 5-11).

Anyhow, if for any reason there should be wrong oriented caps at the top of the Elevator (cap top forward) after passing through the Cap Side Selection #1, they would now have to pass through a second Orientation/Qualification Cap Side Selection #2 where all remaining wrong oriented caps will be rejected (refer to Figure 5-10).

## 5.5.1 Cap Transfer System—How does it work?

At the top of the Elevator, an air jet is blowing in the direction of the Cap Transfer System to facilitate and direct the cap in the Cap Transfer System/Cap Side Selection #2 (Figure 5-12).

### Air Jets Adjustment

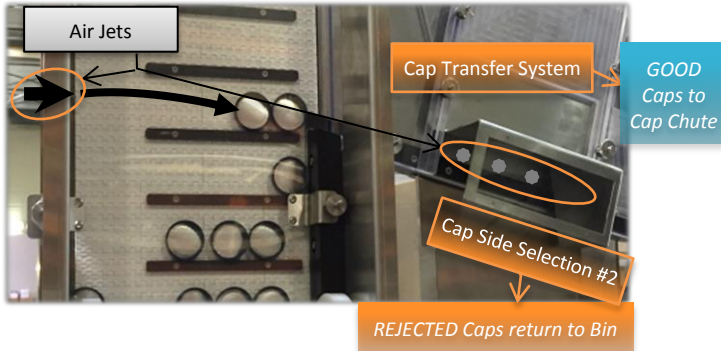


Figure 5-12: Air Jet to Cap Side Selection #2

NOTE: The pictures included in this document may not be exactly the same as your machine depending on your configuration/options.

Once a cap is entering into the Cap Side Selection #2, there is an air jet blowing in the front direction:

If the cap is in the good orientation—top cap backwards—the cap centre of gravity closer to the back of the Cap Transfer, the air jet will not be strong enough to push the cap in the reject chute. **Result:** the cap will continue towards the Cap Chute (Figure 5-13).



Figure 5-13: Cap Side Selection #2 (Good Orientation Cap Goes to Cap Chute)

Accordingly, if the cap is in the wrong orientation—top cap forward—the cap centre of gravity is on the side far from the back of the Cap Transfer thus close to the Reject Chute, the same air jet will now create turbulence on the “cap pocket” with the centre of gravity now located closer to the Reject Chute. **Result:** the cap will be pushed into the Reject Chute to return to the Bin (Figure 5-14).

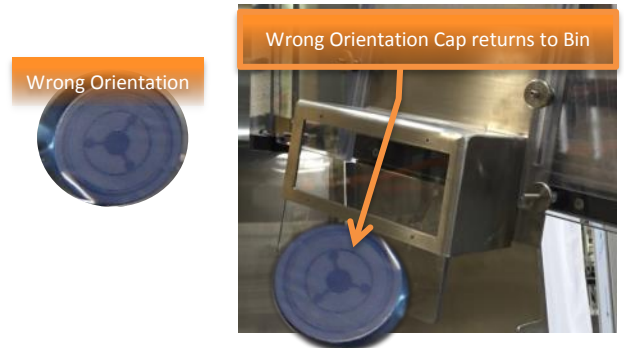


Figure 5-14: Cap Side Selection #2 (Wrongly Oriented Cap Returns to Bin)

Note that good caps may be rejected at the same time with the rejected products but as long as the speed of your machine (BPM/PPM) is reached, the reject of good products is normal and acceptable.

## 5.5.2 Orientation/Qualification Cap Side Selection #2 Setup—From Cap Transfer System to Cap Chute

To Setup the Orientation/Qualification Cap Side Selection #2, follow the instructions hereafter.

**Always engage the Emergency Stop or turn off Main Power when working on the Capper.**

Located at the top of the elevator, the second Orientation/Qualification Cap Side Selection transfer system (Figure 5-10) allows not only the transfer of the good caps from the Elevator to the Cap Chute but ensures that every cap that reaches the Cap Chute is correctly oriented (top backwards in the Cap Side Selection #2 and top down in the Cap Chute) otherwise rejected and transferred back into the hopper/bin.

## 5.5.3 Sorting Air Jets Setup

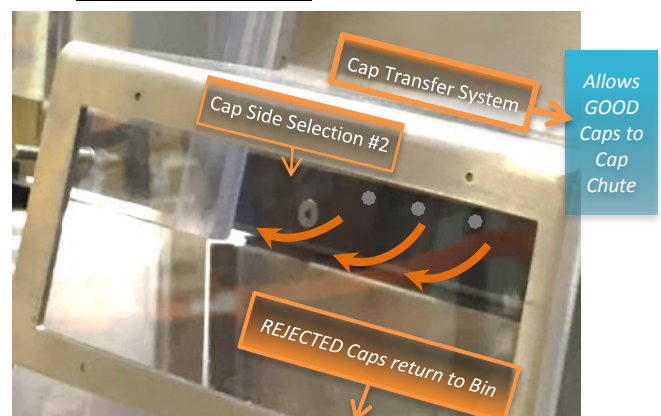


Figure 5-15: Cap Transfer Sorting Air Jets

Sorting Air Jets used for the second Orientation/Qualification Cap Side Selection reject any leftover caps that would have passed the first Orientation/Qualification Cap Side Selection #1.

Adjust the air jet pressure according to the Setup Sheet so that good oriented caps are not affected by the air but reject any left wrong oriented caps.

**Note:** All these adjustments don't have to be precise. A free passage and a visual aligning to the chute will be functional. The critical one is the passage from the Cap Transfer System to the Cap Chute.

1. Connect the air at the back of the Cap Transfer Sorting System (Figure 5-16).



**Figure 5-16: Back Side Sorting Air Jets Connections**

2. Manually, verify the Cap Side Selection #2 (Figure 5-17):

- a. Take one cap at a time.
- b. Place one good oriented cap in the Cap Transfer System.



- i. Result expected: This cap must continue to the Cap Chute.
- ii. If not, adjust the air jets so that good caps continue to the Cap Chute: If mostly no good caps or too many good oriented caps go to the reject chute, decrease the air jet pressure.

- c. Place a wrong oriented cap in the Cap Transfer System.



- i. Result expected: This wrong orientated cap must be rejected at the Cap Side Selection #2 and returned to the Hopper/Bin.
- ii. If not, adjust the air jets by increasing the pressure so that all, not correctly oriented caps fall into the Cap Side #2.



**Figure 5-17: Verification of Cap Side Selection #2**

### 5.5.4 Rebound Breaker Rod



**Figure 5-18: Anti-Bounce Rod Setting**

The Rebound Breaker rod is used to control and avoid any cap rebound when they are passing over the rejection system (Figure 5-18). It also ensures that any cap passes through the calibration.

The height of the Rebound Breaker Rod must be adjusted (Figure 5-18):

1. Loosen the screws holding the Anti-Bounce Rod as illustrated.
2. Adjust the height of the Rod so as to provide about 1½ cap diameter between the bottom of the Rod and the top of the caps passing underneath it.
3. Tighten the screws.

### 5.6 Cap Chute Setup

If the current Cap Chute is not the correct one for the products to be used, unscrew it and replace it with the one appropriate for the caps to be used.

1. Remove the cap trap receiving station, by unscrewing the two screws (Figure 5-19).
2. Unscrew the three silver knurled knobs at the top of the chute (Figure 5-20).
3. Remove the chute.
4. Adjust the three Roof chute height positioners according to the setup sheet of the cap to be used.
5. Slide the chute relevant for the cap to be used; making sure everything is properly aligned with the proper Roof chute height positioner (Figure 5-22).
6. Tighten all the knobs.



Figure 5-19: Cap Trap receiving Station

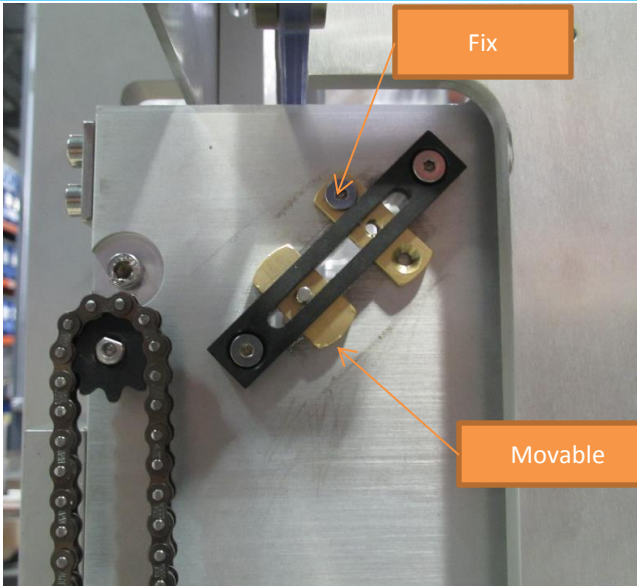


Figure 5-21: Roof chute height Positioners



Figure 5-20: Installation of the chute—Silver Knurled Knobs



Figure 5-22: Proper positioning of the chute

## 5.7 Capping Station Adjustments

**Always engage the Emergency Stop or turn off Main Power when working on the Capper.**

**NOTE:** The pictures included in this section may not be exactly the same as your machine depending on your configuration.

### 5.7.1 Cap Trap Receiving Station Setup

The Cap Trap Sensor detects when there is a cap present in the Cap Trap so the machine can avoid attempting to install a cap when there is not one present.

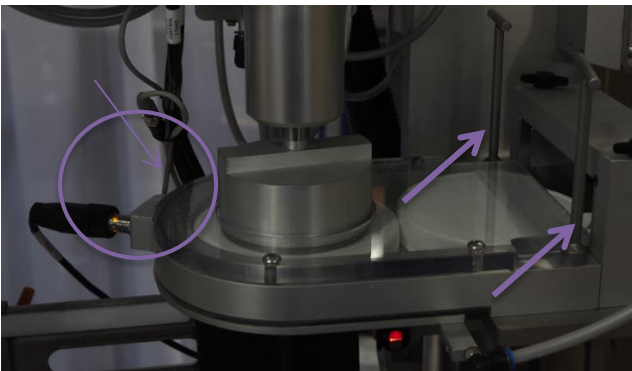


Figure 5-23: Cap Trap Receiving Station

**NOTE:** There is a Cap Trap Receiving Station for each product to be run.

If the installed Cap Trap Receiving Station is not the correct one for the products to be capped, the Cap Trap currently in place (Figure 5-23) needs to be removed and replaced with the appropriate one for the caps to be used:

1. Loosen the thumbscrew holding the proximity sensor in the Cap Trap and disconnect the proximity sensor (Figure 5-23). With the special tool, see Figure 5-24.



Figure 5-24: Hand T Special Tool

2. Disconnect the air jet (Figure 5-23).
3. Loosen the two (2) screws holding on the Cap Trap and remove it (Figure 5-23).
4. Put in place the appropriate Cap Trap Receiving Station for the caps to be used into position and tighten the screws to hold it in place.
5. Insert the proximity sensor into the Cap Trap and tighten the screw to hold it in.
6. Supply the Cap Trap with air.



Figure 5-25: Air Removal

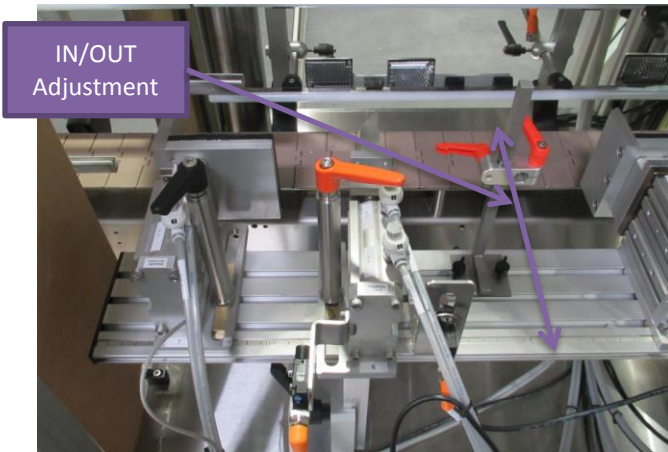
### 5.7.2 Gating Plate Setup

The entire gating plate needs to be adjusted before the individual capping and torquing gates can be adjusted. When moving the gating plate the two gate and the two gripper will move together.

The plate can be adjusted in height, IN/OUT position and in sideway position.



**Figure 5-26: Gating Plate Adjustments**

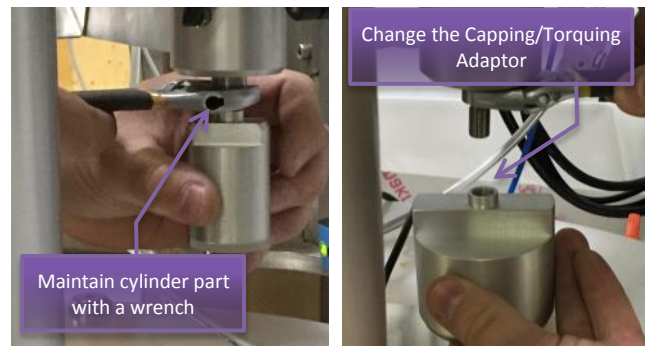


**Figure 5-27: Gating Plate Adjustments 2**

### Figure 5-28: Capping and Torquing Assembly

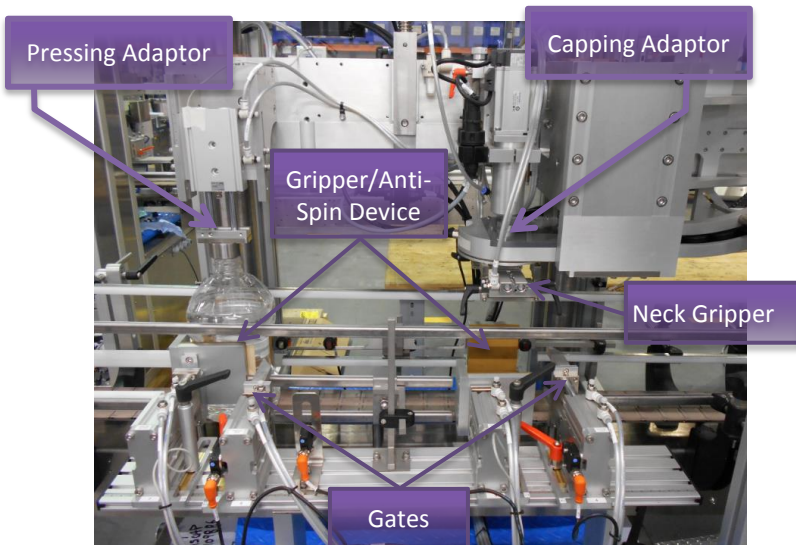
If the current Capping and Torquing Stations are not the correct ones for the products to be used, unscrew them and replace them with the correct one's appropriate for the caps to be used:

1. Shut off the Main Air Pressure supply on the machine (Figure 5-30) and disconnect the vacuum on the Capping station.
2. To unscrew the adaptors: Use a wrench to maintain the cylinder part (Figure 5-31) of the Capping and Torquing Stations.
3. Unscrew and remove the Torquing adaptor (Figure 5-31).
4. Unscrew and remove the Capping adaptor (Figure 5-31).
5. Install the appropriate Capping and Torquing adaptors for the product to be capped.
6. Store the non-used Capping and Torquing Adaptors in a safe location for future use.



**Figure 5-29: Capping and Torquing Adaptor Change**

### 5.7.3 Capping and Torquing Stations Setup





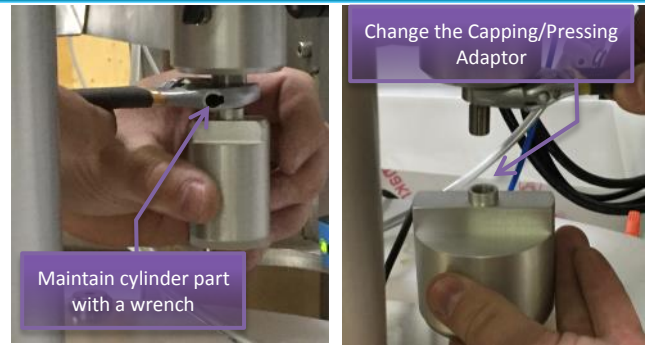
## 5.7.4 Capping and Pressing Stations Setup



**Figure 5-30: Capping and Pressing Assembly**

If the current Capping and Pressing Stations are not the correct ones for the products to be used, unscrew them and replace them with the correct one's appropriate for the caps to be used:

7. Shut off the Main Air Pressure supply on the machine (*Figure 5-30*) and disconnect the vacuum on the Capping station.
8. To unscrew the adaptors: Use a wrench to maintain the cylinder part (*Figure 5-31*) of the Capping and Pressing Stations.
9. Unscrew and remove the Pressing adaptor (*Figure 5-31*).
10. Unscrew and remove the Capping adaptor (*Figure 5-31*).
11. Install the appropriate Capping and Pressing adaptors for the product to be capped.
12. Store the non-used Capping and Pressing Adaptors in a safe location for future use.



**Figure 5-31: Capping and Pressing Adaptor Change**

## 5.8 Gates and Gripper Adjustment Setup

**NOTE:** For this step, the Emergency Stop must be disengaged.

On this machine there are two types of gripper: the gripper to keep the bottle in place (*Figure 5-32*) and the neck gripper to prevent the bottle from collapsing under the force of the cap applicator (*Figure 5-35*).

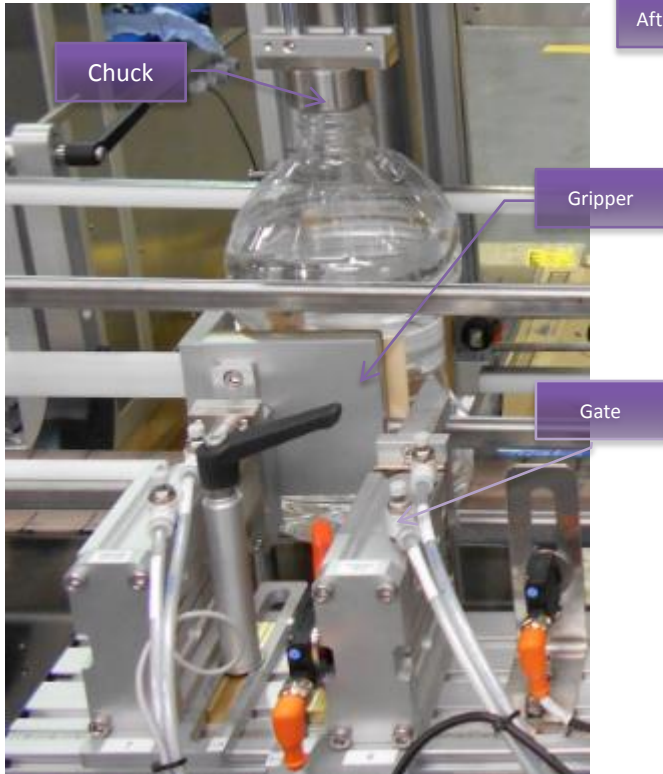
Adjust the Gripper Assembly (*Figure 5-32*):

- a. Set the upstream position of the Gripper according to the values in the Setup Sheet for the product to be labelled by sliding the Gripper along the Mounting Rail and moving the Gripper sideways. The point in the centre should be in line with the centre of the cap station.
- b. Force the Gripper and the Gate out using the HMI controls.



**Figure 5-32: Gripper Adjustments**

- c. Place one container in front of the Gripper and one just downstream from the Gate (*Figure 5-33*):
  - i. Move the Gripper inward until they apply light pressure to the container.
  - ii. Move The Gate inward far enough so it blocks the container from passing.
  - iii. Move the Gate slightly in the downstream direction to create a gap between the two containers.



**Figure 5-33: Gripper and Gate Adjustments**

- d. Check to make sure the sensor on the side of the piston that drives the Gripper is lit when it is extended and unlit when it is retracted. Adjust its position if necessary. See running product Setup for better visualization (*Figure 5-34*).

**Important:** Make sure the container rolls on the side of the conveyor.



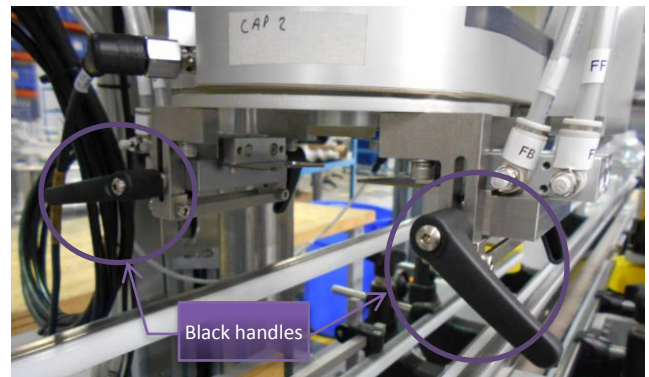
**Figure 5-34: Running Product Setup Example**

Adjust the next gripper at cap station (*Figure 5-35*):

1. Place a product under the capping station.
2. Unscrew the black handles.
3. Adjust the height of the plate according to the setup sheet the product to be capped.
4. Tighten the black handles to fix the position of the plate.

### 5.8.1 Neck Gripper Adjustment

The Neck gripper is a device that grips the bottle right underneath the collar of the neck. That prevents the bottle from crush and spilling all its content when the cap is presses on it.



**Figure 5-35: Neck gripper**

## 5.8.2 Chuck Height Adjustment



Figure 5-36: Chuck Height Adjustment

**NOTE:** For this step, the Emergency Stop must be disengaged.

1. To adjust the height (Figure 5-36) of the Chuck (Torquer Station): Refer to Section 6.2.6.2.
  - a. Place a sample of products beneath the Cap Adaptor.
  - b. Loosen the holding of the Chuck Assembly with an Allen key.
    - i. In the HMI Torque Station page 4, hold down the button to force the Chuck downward (Figure 5-37).
  - c. Move the Chuck to the height specified on the Setup Sheet for the product being used.
  - d. Tighten the holding of the Chuck Assembly with an Allen key in place.
    - i. In the HMI, release the button forcing the Chuck downward.
2. Repeat the same steps to adjust the height of the Chuck (Capper Station):
  - a. Place a sample of products beneath the Cap Adaptor at the Cap Trap.
  - b. Loosen the holding of the Chuck Assembly with an Allen key.

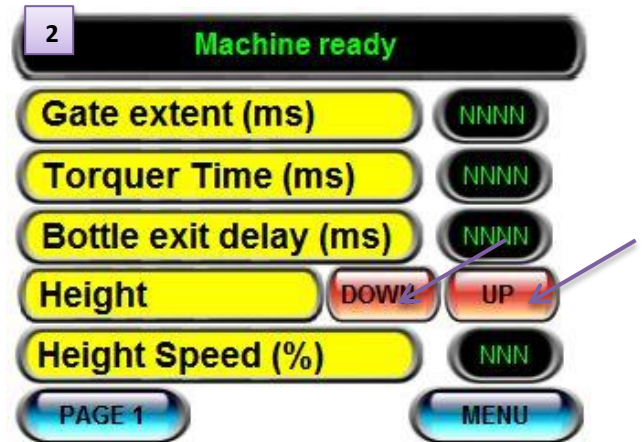


Figure 5-37: Chuck Height Setup

## 5.8.3 Backup Sensor Setup (optional)

This machine has two Backup Sensors (Figure 5-38), those sensors halt the feeding system if it detects a product blocking its path for too long. The first sensor detects if there is an accumulation after the cap chuck and the second if there is an accumulation after the torque chuck.

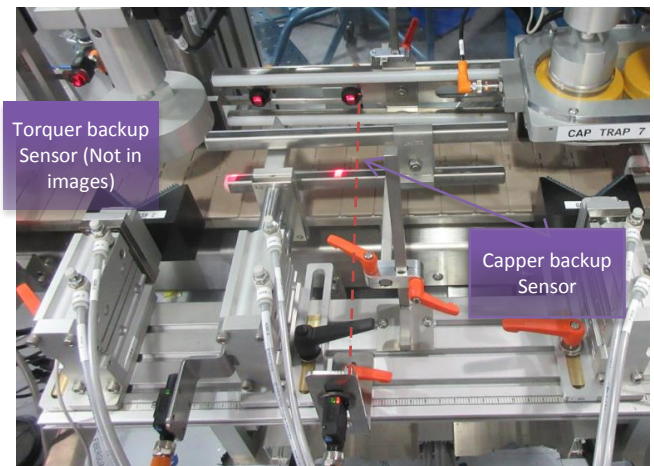


Figure 5-38: Backup Sensor


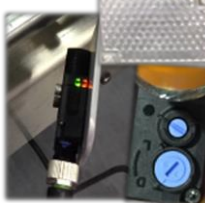

It is very important that the capper backup sensor is placed as close as possible to the torque gate. The

distance between the capper and the capper backup needs to be big enough to allow the bottle time to go to the torque station. If not, it will be very easy to have a backup between the cap and torque chucks and this will generate many Backup alarms.

If the machine is equipped with clear bottle sensors, they have to be adjusted Light ON/Dark ON as described in Table 1: Start & Backup Sensors Adjustments. If that is not the case, adjust the sensor with the following steps:

- Verify and select the applicable Light ON/Dark ON blue switch position on the sensor (Table 1: Start & Backup Sensors Adjustments).
- Ensure the path between the sensor and reflector is unobstructed.
- Test the sensor by placing a sample of products in its path. If the light does not turn off or it does not turn on again when the product is removed, repeat the procedure.

**Table 1: Start & Backup Sensors Adjustments**

STANDARD SENSOR	CLEAR BOTTLE SENSOR	CLEAR BOTTLE SENSOR (POWDER ONLY)
		
Transparent sensor and Reflector	Black sensor and Reflector	Black transmitter and Black receiver
No Adjustments	Adjustments (Light ON/Dark ON)	Adjustments (Light ON/Dark ON)
Start Sensor: <ul style="list-style-type: none"> <li>Extinguished when product</li> </ul>	Start Sensor: <ul style="list-style-type: none"> <li>Lit when product (Dark ON)</li> </ul>	Start Sensor: <ul style="list-style-type: none"> <li>Lit when product (Dark ON)</li> </ul>
Backup Sensor: <ul style="list-style-type: none"> <li>Extinguished when product</li> </ul>	Backup Sensor: <ul style="list-style-type: none"> <li>Extinguished when NO product (Light ON)</li> </ul>	Backup Sensor: <ul style="list-style-type: none"> <li>Extinguished when NO product (Light ON)</li> </ul>

## 5.9 Air Pressure Adjustment

### 5.9.1 Main Air Pressure Regulator

Ensure the machine is supplied with compressed air according to the specifications on the rating plate. Adjust the Main Air Pressure regulator (Figure 5-39) to the correct values for the product to be run according to the Setup Sheet.



Figure 5-39: Main Air Pressure Regulator

### 5.9.2 Cap Air Conveyor and Elevator Pressure Regulators

Ensure the cap sorting and elevator is supplied with air according to the specification on the rating plate. Adjust the Cap Air Conveyor regulator and the Elevator regulator (Figure 5-40) to the correct values for the product to be run according to the Setup Sheet.



Figure 5-40: Cap Conveyor and Elevator Regulators

## 5.9.3 Low Air Pressure Switch Setup (optional)



**Figure 5-41: Low Air Pressure Switch**

If the machine is equipped with a Low Pressure Switch (*Figure 5-41*) (optional), it will set off an alarm if the pressure drops below functional levels. To calibrate the switch:

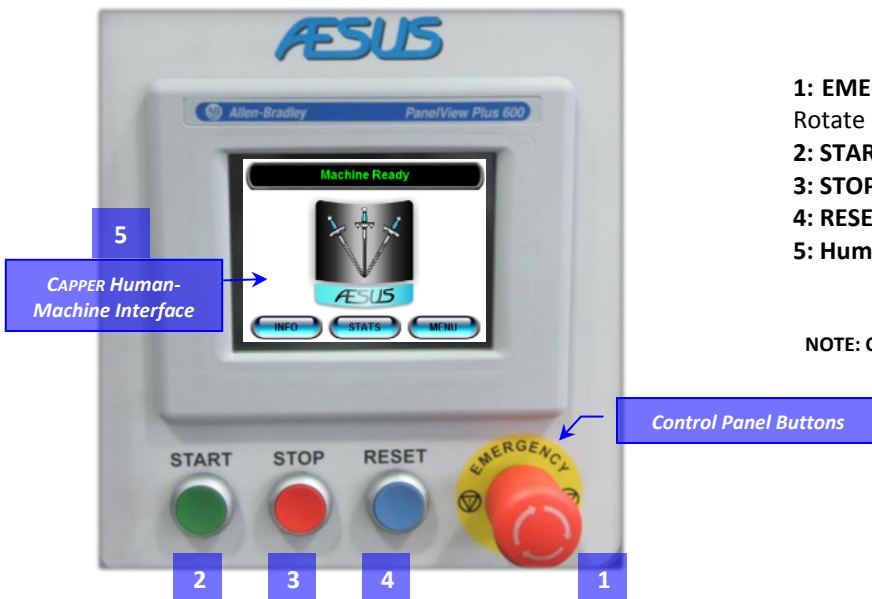
1. Regulate the main air pressure to a pressure of 20 psi below what is indicated on the Setup Sheet.
2. Hold down the “Edit” button on the front of the switch for about 2 seconds until the LED flashes and then release it.
3. Regulate the main air pressure back to normal operating levels.

## 6 Machine Controls

Basic operator control functions are performed through four hardwired push buttons located on the main control panel housing the HMI touch screen. The HMI touch screen controls all functions of the Capping machine.

**NOTE:** Depending on the user currently logged in, some of the options displayed below will not be present. If you need to change a particular setting but do not have sufficient privileges, you need to contact an Administrator.

### 6.1 Control Panel Buttons



- 1: EMERGENCY STOP:** Immediately shuts down the machine. Rotate clockwise to disengage.
- 2: START:** Begins the production sequence.
- 3: STOP:** Ends the production sequence.
- 4: RESET:** Resets the machine after an alarm.
- 5: Human-Machine Interface—Touch Screen.**

**NOTE:** Control Panel may differ depending on the machine configuration.

Figure 6-1: Control Panel

## 6.2 Capper HMI Controls

This machine is equipped with an HMI (Human-Machine Interface) which uses a touch screen to provide easy control of the unit with excellent versatility. The screen displayed when the HMI is first activated is shown in *Figure 6-2*.

### 6.2.1 HMI Main Screen

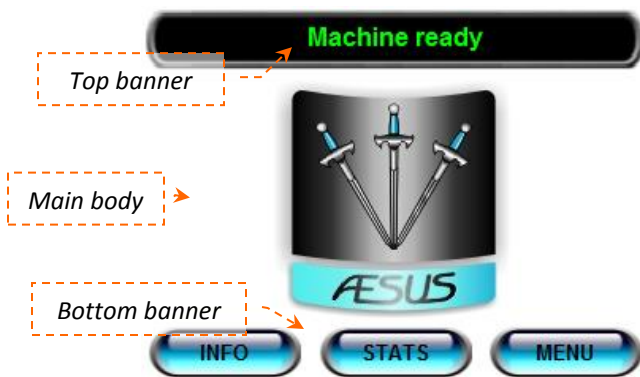


Figure 6-2: HMI Main Screen (No Alarms)

**NOTE:** Depending on the user currently logged in, some of the options displayed below will not be present. If you need to change a particular setting but do not have sufficient privileges, you need to contact an Administrator.

#### 6.2.1.1 Top Banner

The black area at the top will show one of the following messages about the machine's current state. See *Figure 6-2* and *Figure 6-3* (pg.31).

#### 6.2.1.2 Centre Banner

When there are active alarms, the Aesus logo in the centre of the screen will be replaced with a list of active alarms. Refer to *Figure 6-3* for the screen shown and to *Section 7* (page 39) for the list of the alarms.

#### 6.2.1.3 Bottom Banner

At the bottom of the Main Screen, there are buttons to access the Info screen, the Stats screen and the Main Menu screen.

Table 2: List of Machine's Current State

TOP MESSAGES
• Machine Ready
• Machine Running
• Cycle Stop
• Machine Paused
• Powering up
• Powering down
• Alarm(s) present
• Press RESET
• Reject teaching in progress
• Starwheel index in progress



Figure 6-3: HMI Main Screen (Active Alarms)

### 6.2.2 Info Button

From the Main Screen, press the INFO button to access this screen (*Figure 6-4*). On the left, the Aesus contact information is displayed. The username that is currently logged in, is shown in the black box in the upper-right corner.

**SHUTDOWN:** Exits the HMI application and returns to the touch screen settings menu. **NOTE:** Only to be used by an operator familiar with the Allen-Bradley HMI or with assistance from Aesus.

**MAIN:** Returns to the Main Menu.



Figure 6-4: Info Screen

### 6.2.2.1 Login Menu

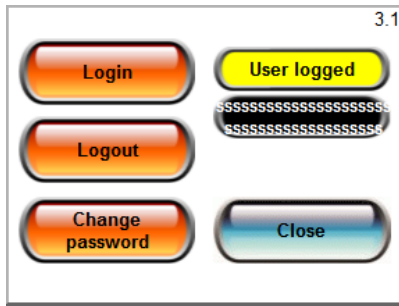


Figure 6-5: Login Menu

From the Info Screen, press the User Logged text in the upper-right corner to access this screen. This menu allows you to switch between user accounts and change account passwords. The username that is currently logged in, is displayed in the black box at the top.

- Login:** Log into the machine with one of the user accounts.
- Logout:** Log out of the current user account.
- Change password:** Change the password of the user account that is currently logged in.
- Close:** Return to the Info screen.

The HMI is equipped with several different accounts, each of which has a different set of permissions. The basic accounts and privileges are listed below (user account permissions can optionally be configured specifically based on the customer’s requirements):

**Default:** The Default account does not require a login. By default, this account has full access to machine settings, but does not have access to the SHUTDOWN button on the Info Screen. If the machine is configured with added security, this account will not have access to any of the setup menus, and in the Recipe Management Menu (*Section 6.2.10*) it will only have access to the **Send** button.

**Setup/Maint:** By default, this account has the same permissions as Default. The default password for this account is 111. For proper security, this password must be changed. If the machine is configured with added security, this account will be able to access the setup menus, but in the Recipe Management Menu (*Section 6.2.10*) it will only have access to the **Save as** and **Send** buttons.

**Admin:** By default, this account has full access to machine settings and to the SHUTDOWN button on the Info Screen. The default password for this account is 222. For proper security, this password must be changed.

**NOTE:** If the password for an account is changed and then forgotten, it cannot be reset without overwriting the entire HMI program, which will also erase any stored settings and recipes.

**NOTE:** The accounts and permission on your machine may be different depending on its particular configuration.

Table 3: Summary of HMI permissions

Access	Default Op	Setup/Maint	Admin
Password Code	None	111	222
Screen Navigation	X	X	X
Clearing Alarms	X	X	X
Shutdown			X
Recipe Management:			
Send	X	X	X
Save as		X	X
Save/Rename/Delete			X

### 6.2.3 Statistics Button

This screen (*Figure 6-6*) is shown when the STATS button is activated from the HMI Main Screen. STATS show the information on the machine time in production and present output speed.

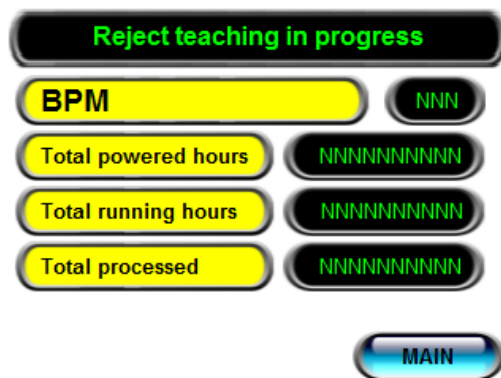


Figure 6-6: Stats Screen

**BPM :** Displays indicated BPM (Bottles per Minute) level the machine is currently operating at.

**Total powered hours:** Total machine powered on time.

**Total running hours:** Production running time of the machine.

**Total processed:** Counts the number of bottles processed during life of machines.

### 6.2.4 Main Menu Screen

From the Main Screen, press the MENU button to access this screen. The Main Menu provides access to the various sub-menus used to control the machine settings and functions. Some submenus may not be present depending on the machine options.

**Station Setup:** Opens the Station Setup pages (*§6.2.6 p.33*).

**Feeder:** Opens Feeder pages (*Section 6.2.7 pg.35*).

**Recipe:** Opens the Recipe Management Menu (*§6.2.10 p.37*).



**Test:** Opens a test function page (§6.2.8 pg.36).  
**Conveyor:** Opens the conveyor setup page (§6.2.5 pg 33).  
**Conveyor:** Accesses to the Conveyor Menu.  
**MAIN Screen:** Returns to the Main Screen.

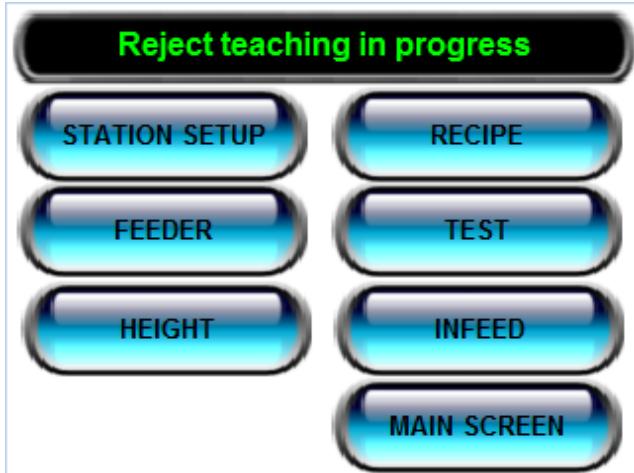


Figure 6-7: Main Menu Screen

### 6.2.5 Conveyor Setup Screens

From the Main Menu, press the Conveyor Setup button to access this menu (Figure 6-8).

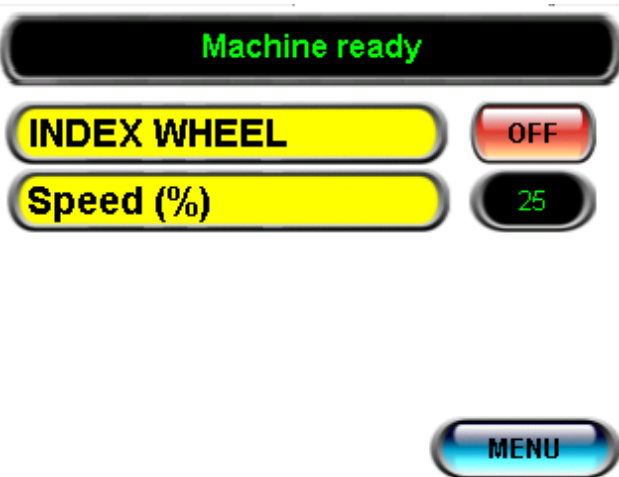


Figure 6-8: Conveyor Setup Screen

**Indexing Wheel:** Enables or disables the indexing wheel (ON/OFF).  
**Speed (%):** Sets the speed of the Conveyor.  
**MENU:** Returns to the Main Menu.

### 6.2.6 Station Setup Screens page 1

There are many screens controlling the STATION SETUP depending on the machine's options. The page 1 (Figure 6-9)

allows turning ON and OFF the capping station as well as setting other functions such as time, speed, etc.

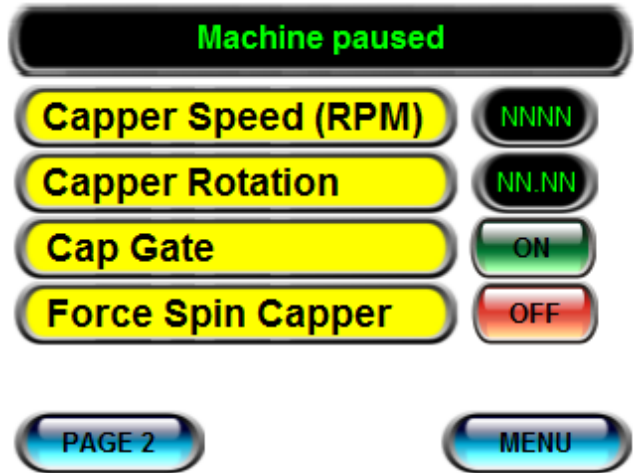


Figure 6-9: Station Setup Screen (page 1)

**Capper Speed (RPM):** Sets the capper speed in RPM.  
**Capper Rotation:** Sets the spinning rotation of the Capping chuck (number of spinning rounds from top).  
**Cap Gate:** Enables ON or OFF the capper gate activation only if the caps need separation in the cap chute because of overlapping.  
**Force Spin Capper:** Enables ON/OFF of the spinning capper all the time until torque limit is reached in run mode.  
**Page 2:** Returns to Page 2 of the Station Setup Screen.  
**MENU:** Returns to the Main Menu.

#### 6.2.6.1 Station Setup Screen Page 2

From the Main Menu, press the Station Setup button then press Page 2 to access this menu (Figure 6-10). This page 2 allows Torquing actions.

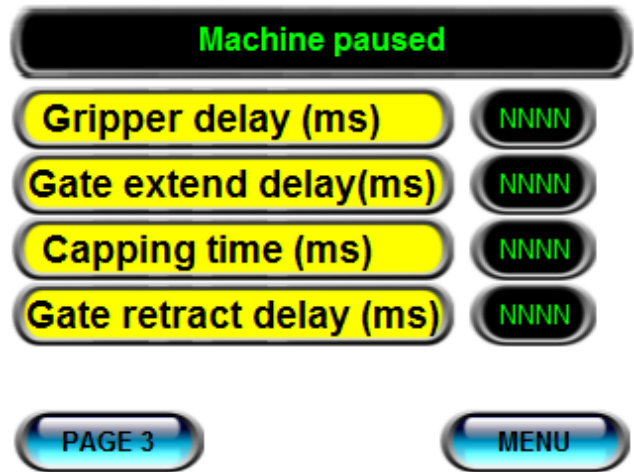


Figure 6-10: Station Setup Screen (page 2)

**Gripper delay (ms):** Delay before the extension of the gripper.

**Gate extent delay (ms):** The amount of time the gate will stay extent.

**Capping Time (ms):** Setup the time for the cap placement station, the higher ms set will allow the spin motor to stay in the bottom position longer.

**Gate retract delay (ms):** The amounts of time before the gate retract.

**Page 3:** Returns to Page 3 of the Station Setup Screen page.

**MENU:** Returns to the Main Menu.

### 6.2.6.2 Station Setup Screen Page 3

From the Main Menu, press the Station Setup button then press Page 2 then Page 3 to access this menu. This third screen allows activation of other functions related to the capper and torque stations i.e. vacuum cut, force spin, stations height and height speed (Figure 6-11).

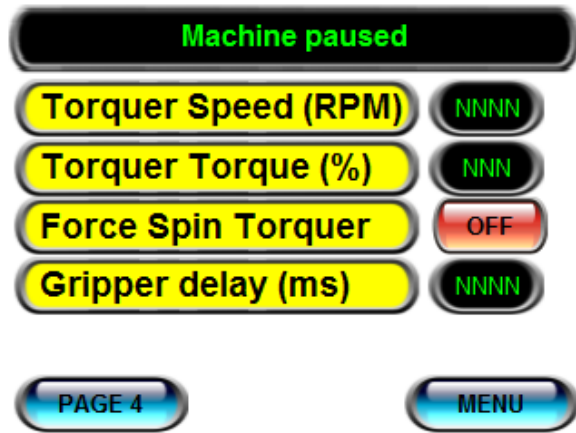


Figure 6-11: Station Setup Screen (page 3)

**Torquer Speed (RPM):** Sets the torque speed in RPM.

**Torquer Torque (%):** Sets the torque on the Torquer station. Do not put excessive force: If the torque is too high, you will see debris; if slipping, decrease pressure.

**Force Spin Torquer:** Enables ON/OFF of the spinning torquer all the time until torque limit is reached in run mode.

**Gripper delay (ms):** Delay before the extension of the gripper.

**Page 4:** Returns to Page 4 of the Station Setup Screen.

**MENU:** Returns to the Main Menu.

### 6.2.6.3 Station Setup Screen Page 4

From the Main Menu, press the Station Setup button then press Page 2 then Page 3 then Page 4 to access this menu. This screen allows activation of other functions related to the capper and torque stations i.e. vacuum cut, force spin, stations height and height speed (Figure 6-11).

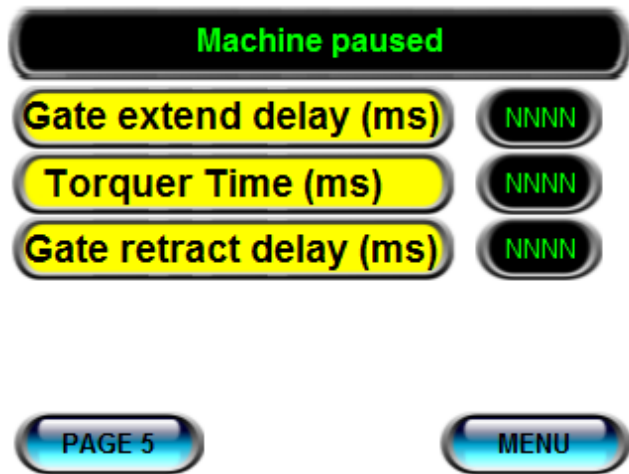


Figure 6-12: Station Setup Screen (page 4)

**Gate extent delay (ms):** The amount of time the gate will stay extent.

**Torquer Time (ms):** Sets the time for the Torquing station to perform the action.

**Gate retract delay (ms):** The amounts of time before the gate retract.

**Page 5:** Returns to Page 5 of the Station Setup Screen.

**MENU:** Returns to the Main Menu.

### 6.2.6.4 Station Setup Screen Page 5

From the Main Menu, press the Station Setup button then press Page 2 then Page 3 then Page 4 then Page 5 to access this menu. This screen allows activation of other functions related to the capper and torque stations i.e. vacuum cut, force spin, stations height and height speed (Figure 6-11).

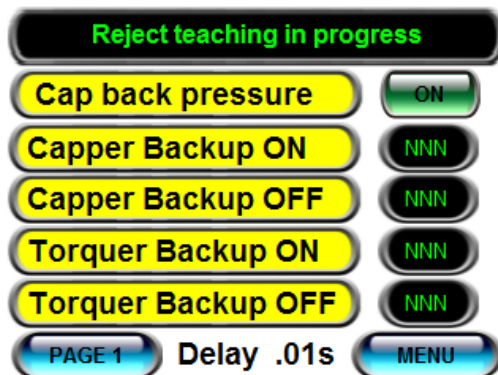


Figure 6-13: Station Setup Screen (page 5)

**Cap back pressure:** Enables ON and OFF the Cap back Pressure.

**Capper Backup ON:** Define the amount of time a bottle needs to stay in front of the Capper Backup sensor before the Backup accumulation at capper alarm is triggered.

**Capper Backup OFF:** Define the amount of time once the Capper Backup sensor doesn't detect anything anymore,

before the Backup accumulation at Capper alarm is turned OFF.

**Torquer Backup ON:** Define the amount of time a bottle needs to stay in front of the Torquer Backup sensor before the Backup accumulation at Torquer alarm is triggered.

**Torquer Backup OFF:** Define the amount of time once the Torquer Backup sensor doesn't detect anything anymore, before the Backup accumulation at Torquer alarm is turned OFF.

**Page 1:** Returns to Page 1 of the Station Setup Screen page.

**MENU:** Returns to the Main Menu.

### 6.2.6.5 Station Setup Screen Page 6

From the Main Menu, press the Station Setup button then press Page 2 then Page 3 then Page 4 then Page 5 then page 6 to access this menu. This screen allows activation of other functions related to the capper and torque stations i.e. vacuum cut, force spin, stations height and height speed (Figure 6-14).

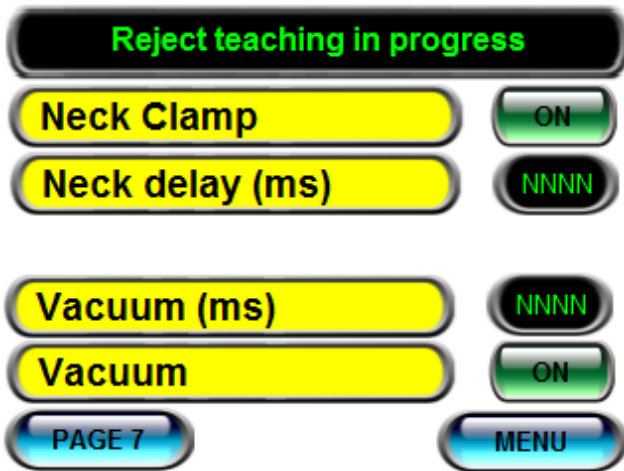


Figure 6-14: Station Setup Screen (page 6)

**Neck Clamp ON\OFF:** Enable or disable the neck clamp.

**Neck delay (ms):** The amount of time the neck clamp will stay clamped.

**Vacuum cut (ms):** Delay time to stop the vacuum on the first station before the chuck goes up. For example:

**Vacuum ON/OFF:** Enable or disable the vacuum.

**Page 7:** Returns to Page 7 of the Station Setup Screen page.

**MENU:** Returns to the Main Menu.

### 6.2.6.6 Station Setup Screen Page 7

From the Main Menu, press the Station Setup button then press Page 2 then Page 3 then Page 4 then Page 5 then page 6 then page 7 to access this menu. This screen allows activation of other functions related to the capper and torque stations i.e. vacuum cut, force spin, stations height and height speed (Figure 6-15).

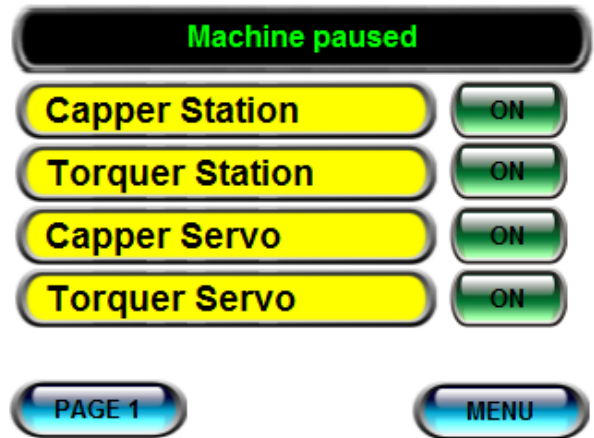


Figure 6-15: Station Setup Screen (page 7)

**Capper Station ON\OFF:** Enables or disable the capper station.

**Torquer Station ON\OFF:** Enables or disable the torquer station.

**Capper Servo ON\OFF:** Enables or disable the capper servo.

**Torquer Servo ON\OFF:** Enables or disable the torque servo.

**Page 1:** Returns to Page 1 of the Station Setup Screen page.

**MENU:** Returns to the Main Menu.

### 6.2.7 Feeder Screens page 1

From the Main Menu, press the Feeder button then press Page 2 to access this menu (Figure 6-16). There are 2 screens controlling the Feeder system. They allow accessing to the elevator functions which comprise lifting, speed, vibration, bowl enabling, etc. Page 1 is for the elevator settings.

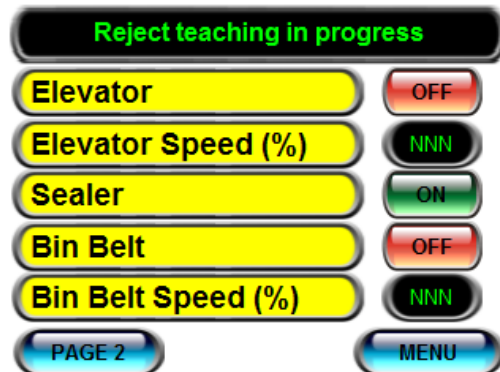


Figure 6-16: Feeder & Bin Belt Setup Screen (page 1) (with Bin Belt Option)

**Elevator:** Enables or disables ON/OFF the elevator.

**Elevator Speed (%):** Sets the speed for the elevator chariot that brings the caps to the feeding chute.

**Sealer:** Enables ON/OFF the induction Sealer station.

**Bin Belt:** Enables or disables ON/OFF the bottom Bin Belt.

**Bin Belt Speed (%):** Sets the speed for the bottom Bin Belt that brings the caps to the elevator.

**Page 2:** Returns to Page 2 of the Feeder Screen page.

**MENU:** Returns to the Main Menu.

### 6.2.7.1 Feeder Screen Page 2

Optionally, you may have a Vibration system instead of a Bin Belt. For this option, the page 1 is different.

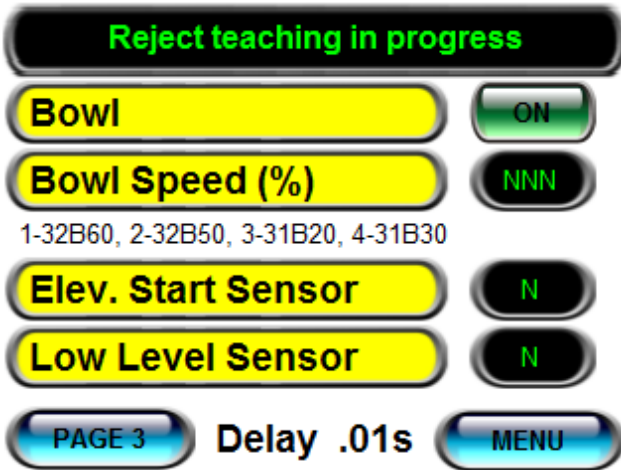


Figure 6-17: Bin Setup Screen (page 2)

**Bowl ON/OFF:** Enables or disables feeding from the Bowl.

**Bowl Speed (%):** Sets the speed of the blue ribbon band at the bottom of the bowl.

**Elev. Start Sensor:** Allow to choose which sensor among the four listed above, to be the sensor that will start the elevator.

**Low Level Sensor:** Allow to choose which sensor among the four listed above, to be the sensor that will pause the machine when there is a low cap level.

**NOTE:** neither sensor can be the same.

**Page 3:** Returns to Page 3 of the Feeder Screen page.

**MENU:** Returns to the Main Menu.

### 6.2.7.2 Feeder Screen Page 3

From the Main Menu, press the Feeder button then press Page 2 to access this menu (Figure 6-18). This Page 2 allows activation and adjustments of the bowl feeding systems (optional).

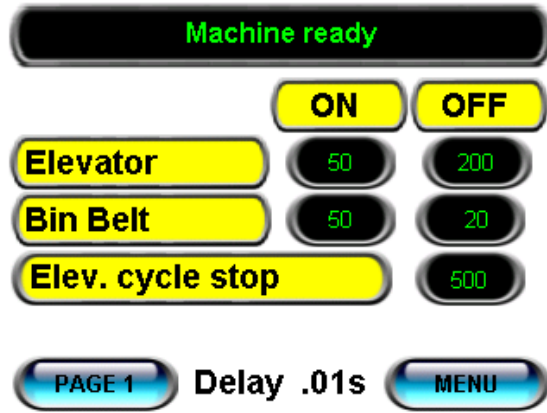


Figure 6-18: Feeder Setup Screen (page 3)

**Bowl:** Enables or disables ON/OFF the sensor delay in the chute and sets the value.

**Elevator:** Enables or disables ON/OFF the sensor delay in the elevator and sets the value

**Bin Belt:** Enables or disables ON/OFF the sensor delay in the bin belt and sets the value

**Page 1:** Returns to Page 1 of the Feeder Screen page.

**MENU:** Returns to the Main Menu.

### 6.2.8 Test Screen page 1

From the Main Menu, press the TEST button to access this menu which allows testing of different aspects and functions as needed. Test options are only available when the machine is in STOP mode with no level 1 alarms activated (Figure 6-19).

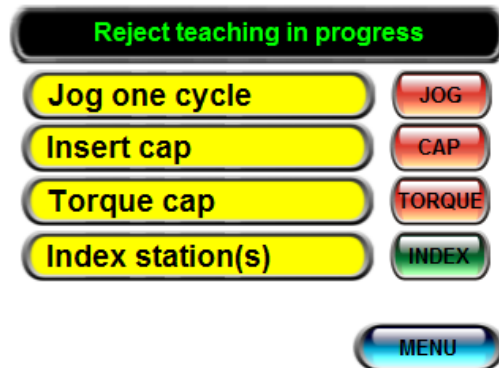


Figure 6-19: Test Menu page 1

**Jog one cycle:** Allows the machine to perform a complete capping cycle but all conditions must be met as if the machine was in run mode.

**Insert cap:** Moves only the cap. This can be used when setting up a new bottle to determine the location under each station and adjusting the cap offset.

**Torque cap:** Cycles the first station to place a cap on the desired bottle.

**Index station(s):** Cycles the first station to place a cap on the desired bottle.

**Page 2:** Returns to Page 2 of the Station Setup Screen page.

**MENU:** Returns to the Main Menu.

6.2.8.1 Test Screen page 2

From the Main Menu, press the TEST button then page 2 to access this menu which allows testing of different aspects and functions as needed. Test options are only available when the machine is in STOP mode with no level 1 alarms activated (Figure 6-20).

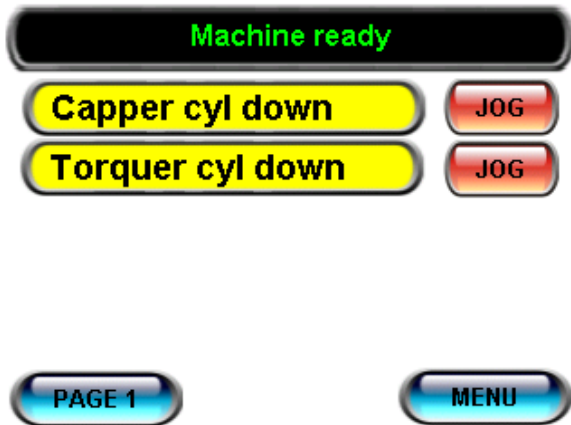


Figure 6-20: Test Menu page 2.

**Capper cyl down JOG:** Manually jog the capper down.

**Torquer cyl down JOG:** Manually jog torquer down.

**Page 1:** Returns to Page 1 of the Station Setup Screen page.

**MENU:** Returns to the Main Menu.

6.2.9 Height Screen

From the Main Menu, press the HEIGHT button to access this menu (Figure 6-21).

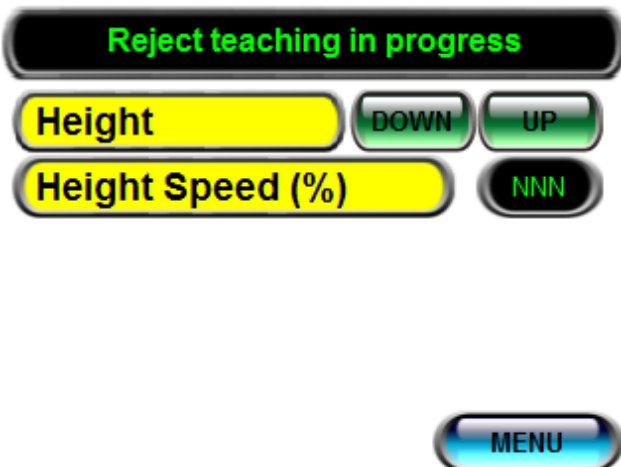


Figure 6-21: Height Setup Screen

**Height DOWN/UP:** Sets the housing height (capper and torquer) when setting up the machine to run a product.

**Height Speed (%):** Sets the speed when raising the machine.

**MENU:** Returns to the Main Menu

6.2.10 Recipe Management Menu

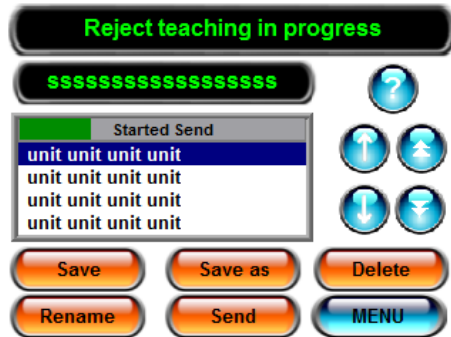


Figure 6-22: Recipe Management Menu

From the Main Menu, press the RECIPE button to access this menu (Figure 6-22). A Recipe is a collection of settings that can be saved and recalled at a later date. This allows the machine operator to quickly perform changeovers between different products without needing to reconfigure the HMI. In conjunction with the User Accounts feature, it also allows the machine to be limited to selecting one of the existing recipes, preventing production errors resulting from improper settings.

6.2.10.1 Navigation controls:

**Up Arrow:** Highlight the recipe above.

**Down Arrow:** Highlight the recipe below.

**Double Up Arrow:** Highlight the first recipe.

**Double Down Arrow:** Highlight the last recipe.

**? Button:** Open the Recipe Help screen (Figure 6-23).

**MENU:** Return to the Main Menu.

6.2.10.2 Recipe controls:

**NOTE:** When Saving, Sending, Renaming, or Deleting a recipe (1<sup>st</sup>) always highlights that recipe with the arrow buttons before performing the operation (2<sup>nd</sup>).

**Save:** Save the current machine settings to the highlighted recipe.

**Save as:** Save the current machine settings to a new recipe.

**Rename:** Change the name of the highlighted recipe.

**Send:** Load the highlighted recipe into the PLC.

**Delete:** Delete the highlighted recipe.

**NOTE:** Some of these functions will not be present when a user with lower privileges is logged in.

To use the "Save as" function to save a recipe with a new name:






1. Press the Save As button.

2. Enter the name for the new recipe.
3. Load the recipe by pressing the Send button.
4. Press the black box above the Recipe List and enter the new name again.
5. Press the Save button.

To properly rename a recipe, its name must be changed in two locations:

1. Highlight the desired recipe
2. Press the Rename button and enter the new name.
3. Load the recipe by pressing the Send button
4. Press the black box above the Recipe List and enter the new name again.
5. Press the Save button.

### 6.2.10.3 Recipe Help

	Upload PLC data in selected recipe.
	Save PLC data in new a recipe.
	Rename the selected recipe.
	Delete selected recipe.
	Send selected recipe to PLC.

NOTE: To name a recipe, you must use the Rename button, re-type the name in the Black Box and then press Save Button.



**Figure 6-23: Recipe Help screen**

To access this screen (*Figure 6-23*), press the round “?” button in the Recipe Management Menu. It contains explanations of the functions of the buttons in the Recipe Management Menu.

## 7 Alarm List

When the machine detects a problem, an alarm will be triggered to notify the operator, and the machine will produce a response depending on the severity of the problem and the alarm condition. Below is a list of all possible alarms and their causes.

### 7.1 Level 1 Alarms—Immediate Stop

A Level 1 alarm will stop the machine immediately (hard stop) and display a message to notify the operator. To recover from a Level 1 alarm the alarm condition must be rectified, the alarm acknowledged on the Alarm screen, and the blue reset button pressed on the control panel.

**Table 4: List of Alarms Level 1**

Alarm Level 1	HMI Message	Links
1	EMERGENCY STOP CAPPER	7.1.1
2	FRONT GUARD OPEN	7.1.2
3	AIR PRESSURE LOW	7.1.3
4	EMERGENCY STOP ELEVATOR	7.1.4
5	CAPPER GATE ALARM	7.1.5
6	TORQUER GATE ALARM	7.1.6
7	CAP JAM AT CHUCK	7.1.7
8	TORQUER GRIPPER ALARM	7.1.8
9	SERVO CAPPER NOT READY	7.1.9
10	SERVO TORQUER NOT READY	7.1.10
11	BACK GUARD OPEN	7.1.11
12	CAPPER CHUCK FAULT	7.1.12
13	TORQUER CHUCK FAULT	7.1.13
14	RETORQUER CHUCK FAULT	7.1.14
15	CAPPER GRIPPER ALARM	7.1.15
16	EMERGENCY STOP FEEDER	7.1.16
17	EMERGENCY STOP LINE	7.1.17

#### 7.1.1 EMERGENCY STOP CAPPER

The Emergency Stop Capper (E-Stop) is active, the capper stop working. Disengage the Emergency Stop (*section 4.1 pg.15*) and press the RESET button on the control box to clear the alarm.

#### 7.1.2 FRONT GUARD OPEN

This alarm is only present if the machine is equipped with a guard (optional). The machine front guard is open. Close the guard and press the RESET button on the HMI Main Screen (*Section 6.2.1*).

#### 7.1.3 AIR PRESSURE LOW

Verify that the machine is being supplied with at least the amount of air pressure specified on the rating plate. Check all the air hoses and ensure there are no leaks. Once the correct pressure has been re-established, press the RESET button on the HMI Main Screen (*Section 6.2.1*).

#### 7.1.4 EMERGENCY STOP ELEVATOR

The Emergency Stop line (E-Stop) is active, the entire elevator stop working.

#### 7.1.5 CAPPER GATE ALARM

This alarm is only present if the machine is equipped with a capper gate. They were no confirmation that the gate is out. It could be caused by the fact that there was an object in the capper gate path that did not allow him to finish its movement. It could also be caused by not enough air or by the fact that the reed switch is not good.

#### 7.1.6 TORQUER GATE ALARM

This alarm is only present if the machine is equipped with a torquer gate. They were no confirmation that the gate is out. It could be caused by the fact that there was an object in the torquer gate path that did not allow him to

finish its movement. It could also be caused by not enough air or by the fact that the reed switch is not good.

#### **7.1.7 CAP JAM AT CHUCK**

One of the sensors detecting the cylinders driving the Grippers at their fully extended positions detected the presence of a cylinder for too long. Ensure the machine is being supplied with compressed air according to the specifications on the rating plate and that the pressure regulators are set to the levels specified on the Setup Sheet. Check to make sure there is nothing blocking the movement of the Grippers. Check the sensors on the Gripper cylinder casings and ensure they detect the cylinders only when they are fully extended. Press the RESET button on the HMI Main Screen (*Section 6.2.1*) after correcting the situation.

#### **7.1.8 TORQUER GRIPPER ALARM**

This alarm is only present if the machine is equipped with a torquer gripper. They were no confirmation that the gripper is out. It could be caused by the fact that there was an object in the torquer gripper path that did not allow him to finish its movement. It could also be caused by not enough air or by the fact that the reed switch is not good.

#### **7.1.9 SERVO CAPPER NOT READY**

This usually occurs when too much load is placed on the motor, when a component or cable is damaged, or when the machine is not supplied with the correct voltage. Adjust the machine settings and the mechanical adjustments to reduce the load on the motor. Check all the components and cables connected to the drive unit for the capper and ensure they are in working order. Ensure the power source meets the specifications listed on the machine rating plate. If the alarm is still present, engage and disengage the Emergency Stop and press the RESET button on the control panel. If the problem persists, contact Aesus.

#### **7.1.10 SERVO TORQUER NOT READY**

This usually occurs when too much load is placed on the motor, when a component or cable is damaged, or when the machine is not supplied with the correct voltage. Adjust the machine settings and the mechanical

adjustments to reduce the load on the motor. Check all the components and cables connected to the drive unit for the torquer and ensure they are in working order. Ensure the power source meets the specifications listed on the machine rating plate. If the alarm is still present, engage and disengage the Emergency Stop and press the RESET button on the control panel. If the problem persists, contact Aesus.

#### **7.1.11 BACK GUARD OPEN**

This alarm is only present if the machine is equipped with a guard (optional). The machine back guard is open. Close the guard and press the RESET button on the HMI Main Screen (*Section 6.2.1*).

#### **7.1.12 CAPPER CHUCK FAULT**

If the capper chuck need to go down, but is not confirmed by the REED switch, the alarm will be triggered.

#### **7.1.13 TORQUER CHUCK FAULT**

If the torquer chuck need to go down, but is not confirmed by the REED switch, the alarm will be triggered.

#### **7.1.14 RETORQUER CHUCK FAULT**

If the retorquer chuck needs to go down, but is not confirmed by the REED switch, the alarm will be triggered.

#### **7.1.15 CAPPER GRIPPER ALARM**

This alarm is only present if the machine is equipped with a capper gripper. They were no confirmation that the gripper is out. It could be caused by the fact that there was an object in the capper gripper path that did not allow him to finish its movement. It could also be caused by not enough air or by the fact that the reed switch is not good.

#### **7.1.16 EMERGENCY STOP FEEDER**

The Emergency Stop line (E-Stop) is active, the feeder stop working.

#### **7.1.17 EMERGENCY STOP LINE**

The Emergency Stop line (E-Stop) is active, the entire line stop working.



## 7.2 Level 2 Alarms—Cycle Stop

A Level 2 alarm will initiate a cycle stop and pop up a message to notify the operator.

**Table 5: List of Alarms Level 2**

Alarm Level 2	HMI Message	Links
1	JAM INFEED CAPPER STATION	7.2.1
2	RESYNCH SENSOR BLOCKED	7.2.2
3	RESYNCH SENSOR FAULT	7.2.3
4	UNEXPECTED BOTTLE AT RESYNCH	7.2.4
5	REJECT BIN FULL	7.2.5
6	REJECT NOT CONFIRMED	7.2.6
7	REJECT CYLINDER FAILURE	7.2.7
8	PRODUCT NOT REJECTED	7.2.8
9	TEACH ISSUE—PERFORM ANOTHER	7.2.9
10	BOTTLE SPACE TOO SMALL	7.2.10
11	GOOD SENSOR FAIL	7.2.11
12	REJECT TRACKING HAS BEEN RESET	7.2.12
13	GOOD SENSOR BLOCKED	7.2.13
14	CONSECUTIVE INSPECTION REJECT	7.2.14
15	REJECT TRIG SENSOR BLOCKED	7.2.15
16	CONVEYOR INSPECTION OVERRUN	7.2.16
17	INSPECTION SENSOR BLOCKED	7.2.17
18	CONSECUTIVE TORQUE REJECT	7.2.18
19	TRACKING VALUES OUT OF RANGE	7.2.19

### 7.2.1 JAM INFEED CAPPER STATION

They is a jam at the entry of the machine. The start sensor is blocked for a couple of seconds. This could cause by products in the way of the gates or the sensor is not correctly placed.

### 7.2.2 RESYNCH SENSOR BLOCKED

The Reject Resynch sensor was blocked during a fixed amount of conveyor encoder pulses. Remove any obstructions from the Resynch sensor. Verify the setup, the state of the sensor, the sensor cable, and the PLC Input. Press the RESET button on the control panel after correcting the situation.

### 7.2.3 RESYNCH SENSOR FAULT

The UV Reject Resynch sensor was expected to detect a product but did not detect anything within 10 pulses of the expected position. Verify the state of the sensor, the reflector, the sensor wire, and the PLC Input. Press the RESET button on the control panel after correcting the situation.

### 7.2.4 UNEXPECTED BOTTLE AT RESYNCH

The UV Reject Resynch sensor was not expected to detect a product but did detect anything within 10 pulses of the expected position. Verify the state of the sensor, the reflector, the sensor wire, and the PLC Input. Press the Delta Cap 2 Manual

RESET button on the control panel after correcting the situation.

### 7.2.5 REJECT BIN FULL

The reject confirm sensor is blocked, indicating a blocked sensor or a full reject bin. If the optional reject bin full sensor is installed, that sensor will trigger the alarm.

### 7.2.6 REJECT NOT CONFIRMED

A bad product passed the reject gate and the gate was activated but not product was seen by the reject confirm sensors.

### 7.2.7 REJECT CYLINDER FAILURE

Fault of the cylinder at the reject station while it was IN or OUT.

### 7.2.8 PRODUCT NOT REJECTED

The Reject Confirmation Sensor was not confirmed. Therefore a product has passed the reject station and is still on the conveyor. Remove the bad product from the conveyor before restarting the machine.

### 7.2.9 TEACH ISSUE/PERFORM ANOTHER

The tracking system teaching procedure did not work. Perform a new auto teaches and press the RESET button on the control panel.

#### **7.2.10 BOTTLE SPACE TOO SMALL**

This fault happens when the spacing between the containers is smaller than the minimum value as displayed on the HMI. The spacing is verified by the resynch sensor.

#### **7.2.11 GOOD SENSOR FAIL**

The good sensor did not detect a container when a container was expected. Verify the state of the sensor, the reflector, the sensor wire, and the PLC Input. Press the RESET button on the control panel after correcting the situation.

#### **7.2.12 REJECT TRACKING HAS BEEN RESET**

A fault occurred that has reset the conveyor tracking. All bottles currently on the conveyor are considered bad. When this message appears, press the empty the conveyor button to clear the conveyor. Press the RESET button on the control panel to clear the alarm.

#### **7.2.13 GOOD SENSOR BLOCKED**

The good sensor which detects the products at the good inspection station is blocked during a fixed amount of conveyor encoder pulses. Once corrected, press the RESET button on the control panel.

#### **7.2.14 CONSECUTIVE INSPECTION REJECT**

There has been "X" consecutive failures at the inspection station. The "X" number of consecutive failures comes from the HMI Reject Menu page 3. Check that Consecutive Reject is setup properly. Once corrected, press the RESET button on the control panel to clear the alarm.

#### **7.2.15 REJECT TRIG SENSOR BLOCKED**

The Reject Trigger sensor has been blocked for too long. Remove any obstructions from the reject trig sensor. Verify the state of the sensor, the sensor cable, and the PLC Input. Press the RESET button on the control panel after correcting the situation.

#### **7.2.16 CONVEYOR INSPECTION OVERRUN**

A product entered the conveyor inspection window before the previous inspection was finished. Once corrected, clear the alarm by pressing the RESET button on the control panel.

#### **7.2.17 INSPECTION SENSOR BLOCKED**

The inspection sensor is blocked for too long. Remove any obstructions from the inspection sensor. Verify the state of the sensor, the sensor cable, and the PLC Input. Press the RESET button on the control panel after correcting the situation.

#### **7.2.18 CONSECUTIVE TORQUE REJECT**

There has been "X" consecutive failures at the torque station. The "X" number of consecutive failures comes from the HMI Reject Menu page 3. Check that Consecutive Reject is setup properly. Once corrected, press the RESET button on the control panel to clear the alarm.

#### **7.2.19 TRACKING VALUES OUT OF RANGE**

One or more of the tracking windows are greater than the array limit.

## 7.3 Warnings

A Level 1 warning will pause the machine while a Level 2 warning message will indicate/notify the operator although allowing the machine to continue running.

**Table 6: List of Warnings**

Warning list	Description	
Warning Level 1	HMI Message	Links
1	Waiting for product	7.3.1
2	Outlet accumulation	7.3.2
3	Cap level low	7.3.3
4	No cap at chuck	7.3.4
5	Chuck(s) down	7.3.5
6	Grippers(s) not in position	7.3.6
7	Conveyor Speeding Up	7.3.7
8	Sealer Remote Stop	7.3.8
Warning Level 2	HMI Message	
9	Backup accumulation at capper	7.3.9
10	Backup accumulation at exit	7.3.10
11	Elevator high level	7.3.11
12	Cap not torqued	7.3.12

### 7.3.1 Waiting for product

The Start Sensor does not detect an accumulation of incoming products. Ensure the conveyor is functioning and that the machine is being supplied with products. Check the sensor and ensure it is calibrated for the product being run.

### 7.3.2 Outlet Accumulation

The Backup Sensor (optional) has detected an accumulation of products at the outlet of the machine. Ensure the conveyor is functioning and that there are no blockages further down the production line that prevents products from exiting the conveyor. Check the Backup Sensor and ensure it is calibrated for the product being run and that it is properly aligned with the reflector.

A Warning will pop up a message to notify the operator while allowing the machine to continue running.

### 7.3.3 Cap level low

The Elevator is low on caps. Fill the Elevator Bowl with caps.

### 7.3.4 No cap at chuck

There is no cap at the capping station.

### 7.3.5 Chuck(s) down

One of the chucks is in the down position, so the machine cannot start. This could be caused by a low air pressure.

### 7.3.6 Gripper Not in Position

The gripper is not in the proper position, so the machine cannot start. This could be caused by a low air pressure.

### 7.3.7 Conveyor Speeding Up

The conveyor is accelerating up to speed before the machine can start running. Wait until it is finished.

### 7.3.8 Sealer Remote Stop

This message appears only if the machine is equipped with a sealer. If the sealer is not ready, this warning will appear.

### 7.3.9 Backup Accumulation at Capper

The Backup Sensor has detected an accumulation of products at the outlet of the capper station. Ensure the conveyor is functioning and that there are no blockages further down the production line that prevents products from exiting the conveyor. Check the Backup Sensor and ensure it is calibrated for the product being run and that it is properly aligned with the reflector.

### 7.3.10 Backup Accumulation at Exit

The Backup Sensor has detected an accumulation of products at the outlet of the machine. Ensure the conveyor is functioning and that there are no blockages further down the production line that prevents products from exiting the conveyor. Check the Backup Sensor and

ensure it is calibrated for the product being run and that it is properly aligned with the reflector.

#### **7.3.11 ELEVATOR HIGH LEVEL**

There is an accumulation of cap at the exit of the elevator right before the chute. It could be caused by the fact that two caps are trying to enter the chute at the same time.

#### **7.3.12 Cap Not torqued**

If the good torquing pressure is not achieved, during a limited amount of time this message will appear. Then the sequence will continue, it is only to advise the user that the pressure was not achieved on this bottle.

## 8 Troubleshooting

**Table 7: Quick Troubleshooting & Solution**

Problem	Solution
Machine Will Not Start	Check power. Switch on power. Press the Start button.
	Check that bottles and caps are sufficient in quantity and all of the start sens properly detect the presence of the Bottle and cap.
	Check that the machine bottle backup sensor is not obstructed.
	Check that the E-Stop is not pressed. Release E-Stop button and press reset.
	Check all cylinders are in the home position.
Cap chucks will not cycle/Spin	Check that the reed switch on vertical cylinder is properly adjusted.
	Check that air pressure is supplied at 80 psi.
	Check that solenoid valve function correctly—replace if necessary.
Caps insufficiently torqued	Check condition of rubber bottle clamp. Replace as necessary.
	Check supplied air pressure conforms to set up sheet.
Caps tendency to cross thread	Verify that caps are placed properly on containers.
	Check chuck for wear and proper height.
	Check torque clutch setting.
	Check height of cap trap to bottle neck top is correct.
	Check condition of push through rubber insert. Replace as necessary.
	Check that vacuum is properly applied at push through. Check and replace solenoid valve if necessary.
	Check that caps feed smoothly into the cap trap.
	Check that the cap trap to bottle in starwheel is perfectly aligned.
	Check to see that the cap trap sensor does not activate too early.
CPM is reduced	Check that there are sufficient caps in the bowl and that the cap feed speeds are correct.
	Check that the bottles are being fed to the capper at the appropriate BPM.
	Check that the machine settings are in accordance to the set up sheet.
<b>Sensors</b>	
The Elevator does not stop feeding caps to the Cap Chute.	Verify the connections of the sensors in the Cap Chute and ensure they are functioning correctly.
<b>Motors</b>	
A motor is not running.	Verify the circuit breaker or look for loose wires; also verify the SCR speed control board and SCR lift control board as well as the motor brushes.
<b>Elevator (option)</b>	
Upside down caps coming out from the elevator chute.	Verify the elevator tilt angle and increase or decrease if necessary. Adjust the chute gap to allow the upside down caps to fall down through the rejection slot.
An insufficient number of caps is being fed to the Cap Chute.	Increase the elevator speed. Increase the elevator tilt angle.
<b>Vibrator Bowl (option)</b>	
Upside down caps coming out from the bowl	Verify that the proper change parts were used.
Insufficient number of caps.	Increase the vibrator speed and adjust the bowl flow controls (wipers, air jets) to ensure proper cap sorting.

## 9 General Maintenance

### 9.1 Daily Maintenance

- ✓ Perform a visual inspection to check for broken components or evident problems.
- ✓ Check condition of push through insert.
- ✓ Clean sensors for dust, lint, debris, etc.
- ✓ Keep all change part components together to avoid misplacing them.
- ✓ Tighten all thumbscrews used for adjustments or changeovers.
- ✓ Check for any unusual sound and noise.
- ✓ Check the compressed air source and ensure it conforms to the requirements on the rating plate of the machine.
- ✓ Empty any moisture accumulated in the filter bowl that is part of the main air regulator assembly.

### 9.2 Weekly Maintenance

- ✓ Perform Daily maintenance.
- ✓ Assure that all moving parts are tightly secured and moving freely (with air locked out from the machine i.e. reject cylinder should be easy to move back/forth smoothly and not feel like it's sticking anywhere along its stroke).

### 9.3 Monthly Maintenance

- ✓ Perform daily and weekly maintenance.
- ✓ Empty any moisture that may accumulate in the filter bowl.
- ✓ Thoroughly clean all machine surfaces using only a mild detergent. Avoid solvents, especially on plastic surfaces.
- ✓ Verify and tighten any loose cylinder mounts.
- ✓ Verify PPM (Products per Minute) settings and adjust if required; ex: do not increase the speed of the machine past original specifications.
- ✓ Verify any drive belts and/or drive rollers for excessive wear. Replace if necessary.
- ✓ Check the brushes in all DC motors, change if necessary.

### 9.4 Yearly Maintenance

- ✓ Perform daily, weekly and monthly maintenance.
- ✓ Replace worn Belts or Fingers in the gating system (if applicable).
- ✓ Check the brushes in all DC motors, change if necessary.
- ✓ Check the condition of all mechanical assemblies, e.g. bushing/bearings OK.
- ✓ Verify tightness of adjustable assemblies.
- ✓ Check oil in motor gearboxes.

For all third party components, please refer to their manuals for maintenance.

### 9.5 Cleaning Procedure

The Delta Cap machine does not require a lot of cleaning, but rather a general regular dusting.

- Always make sure the machine is clean, with no dust or parts of caps.
- Clean regularly with a duster or slightly humid cloth

## 9.6 Battery Change

**WARNING: If you cut the power off before changing the battery of your PLC, you will lose everything that is stocked in it, including the program and the Ethernet setup.**

**\*\*The battery of the PLC and the Screen should be changed every 5 years. Part number ELE84566 or ELE113571.**



Figure 9-1: Normal PLC with batteries at full capacity

When the low battery sign is lighting up it indicates that it is time to change the battery. Follow the next couple of steps to do so:



Figure 9-2: Low battery warning

**NOTE: The new PLC Compact logix doesn't have a battery.**

**WARNING: The machine needs to be powered ON**

1. Remove the battery cap.

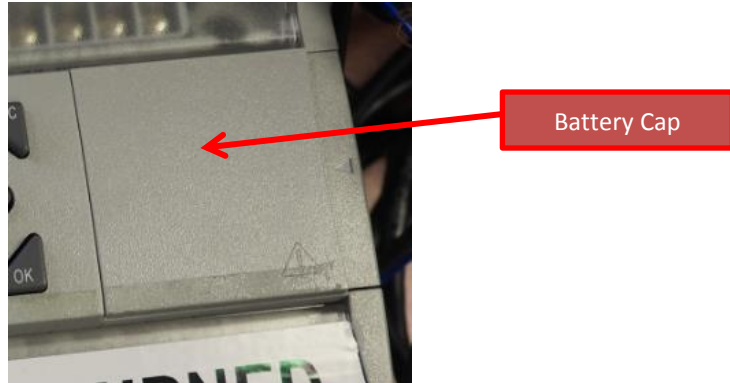


Figure 9-3: Battery cap

2. Unplug the battery.
3. Remove the battery.
4. Put a new battery.
5. Plug the new battery with the red wire inwards.
6. Replace the battery cap.

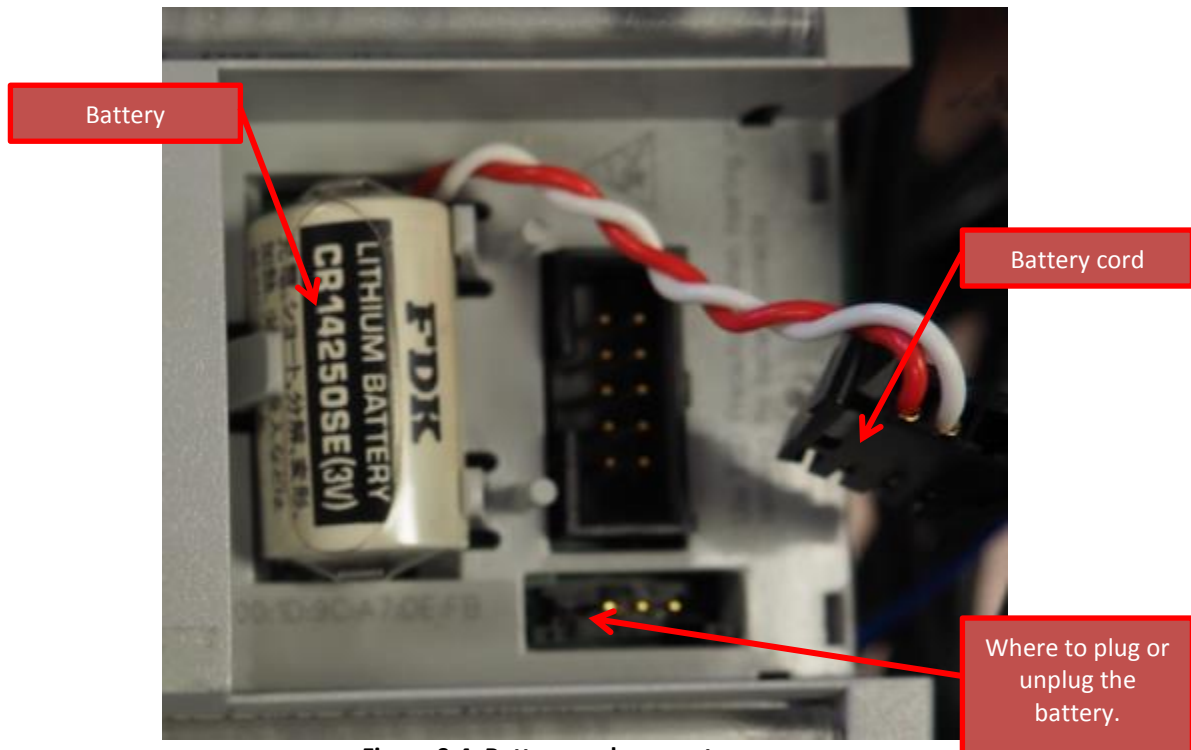


Figure 9-4: Battery replacement

The battery of the Screen also needs to be changed when the low battery warning appears on it. There is no problem whatsoever to change this battery, nothing to be lost. Part number ELE73305.

1. Open the latch.
2. Remove old batteries.
3. Place new battery positive side up and push lightly until you hear a click.
4. Close the latch.



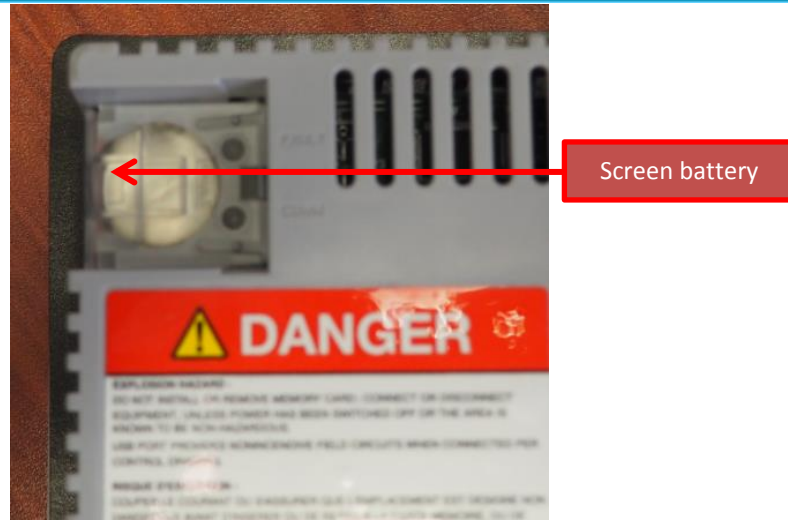


Figure 9-5: Screen battery

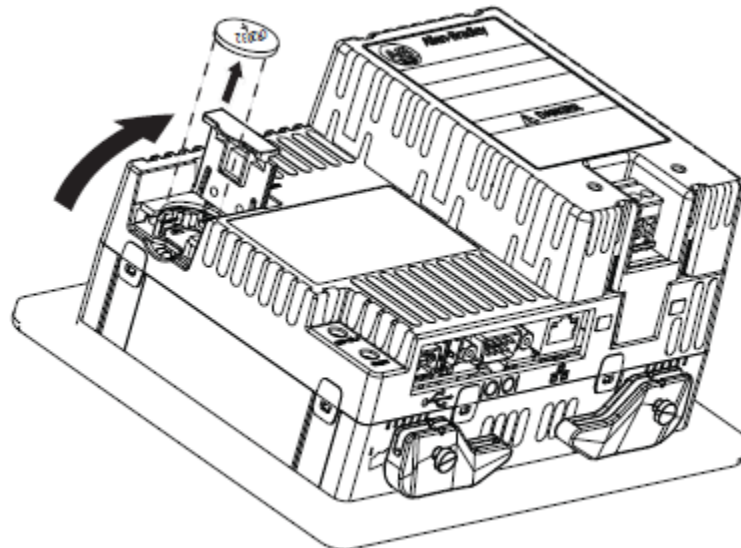


Figure 9-6: How to replace the battery

## 10 Recommended Spare Parts List

Please contact our spare parts department for an exact list of recommended spare parts for your specific machine. (Note: the list below is only a guideline and may not represent your exact machine.)

Tel: (514)-694-3439  
E-mail: [parts@aesus.com](mailto:parts@aesus.com)

**Table 8: List of Spare Parts Recommended**

Item #	Part Description	Qty
<b>Torque Station</b>		
26131	Chuck Insert white rubber #5 cone	5
26138	Push through insert flat #1 1\2	5
26129	Push through insert flat #0	5
<b>Cap Trap Gaskets</b>		
Cap110667	Tunnel Gasket for cap 1.609 Dia	5
Cap110676	Tunnel Gasket for cap 1.765 Dia	5
Cap110683	Tunnel Gasket for cap 1.329 Dia	5
<b>Electrical</b>		
Ele1074	3 AMP Fuse ATMR	2
Ele895	4 AMP FUSE ATMR	2
Ele1230	6 AMP Fuse ATMR	4
Ele66222	12 AMP FUSE ATMR	2

*\*Recommended spare parts for Delta Cap 2 + elevator P54967 as of 2017-05-02.*

## 11 Contact Information

For Spare Parts or Technical Help, please contact us:

### **Aesus Packaging Systems Inc.**

188 Oneida Drive  
Pointe-Claire, Québec  
H9R 1A8  
Canada

514-694-3439  
Fax: 514-694-4107

[contactus@aesus.com](mailto:contactus@aesus.com)  
[www.aesus.com](http://www.aesus.com)



## 12 Some of the other Machinery Manufactured by Aesus Packaging Systems

Some other Machines Manufactured by Aesus

See the rest at [www.aesus.com](http://www.aesus.com)



Wrap and Panel Labellers



Top and Bottom Labellers



Single Spindle Cappers



Retorquers



Print and Apply Labellers



Neck Banders



Body Banders



Shrink Tunnels



Bottle Blowers



Conveyors



Pack of Tables



Auger Fillers



Label Heads



Feed Tanks

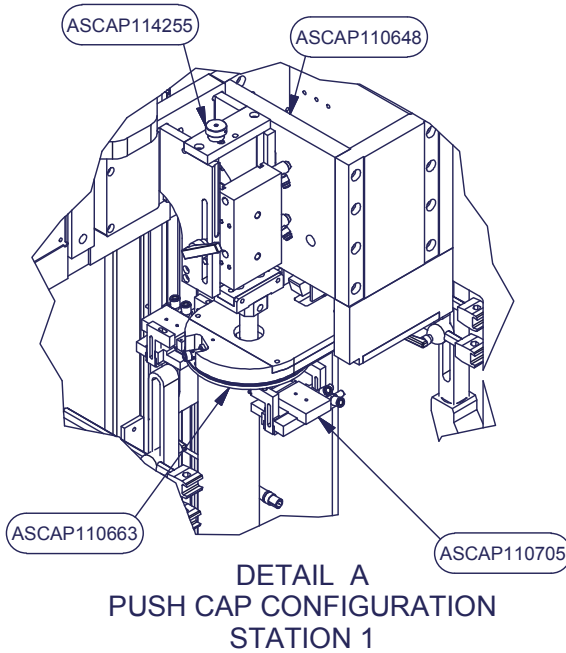
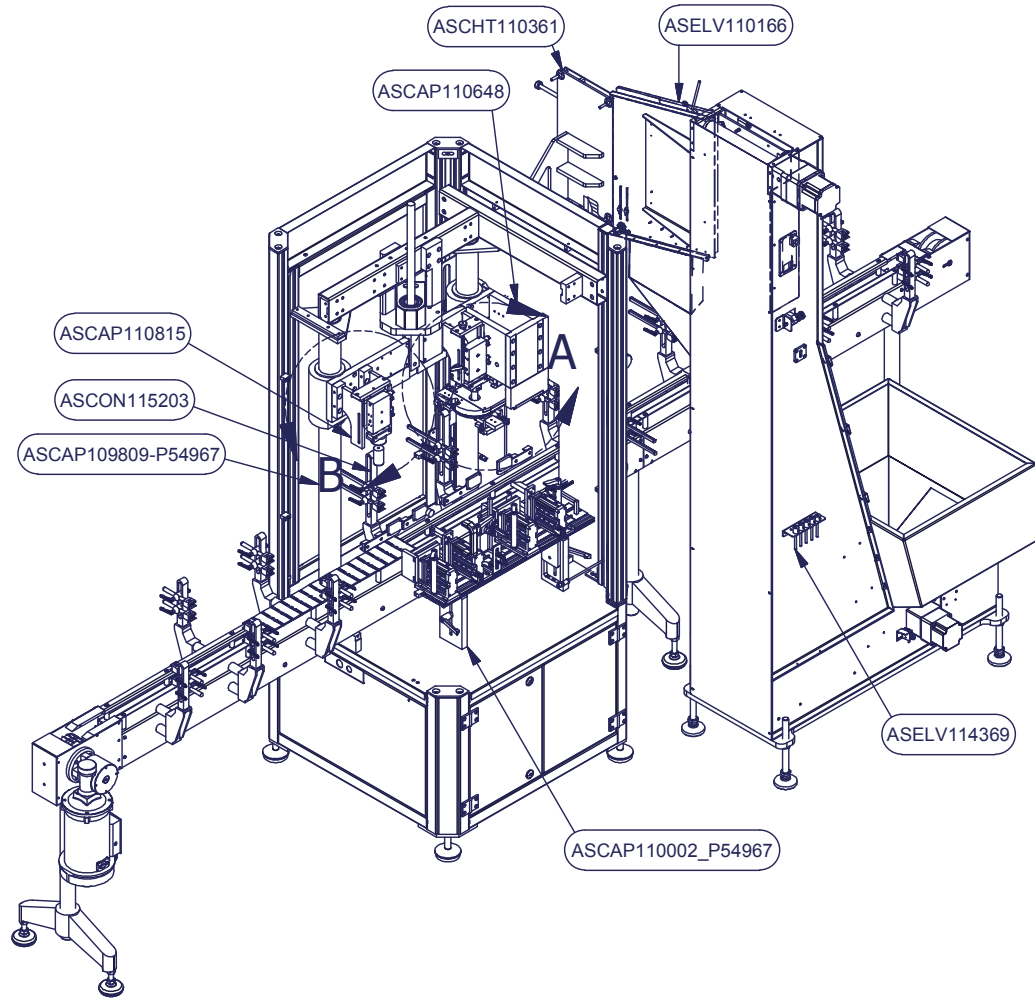


Automatic Fillers

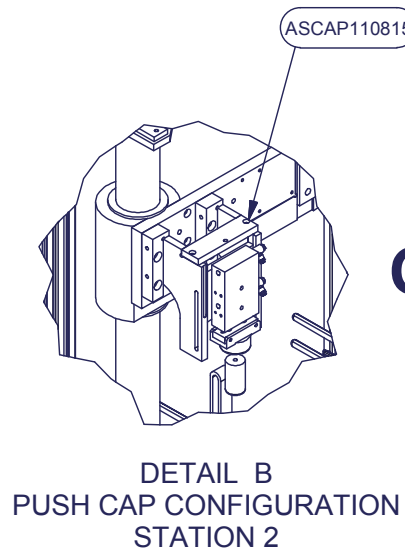
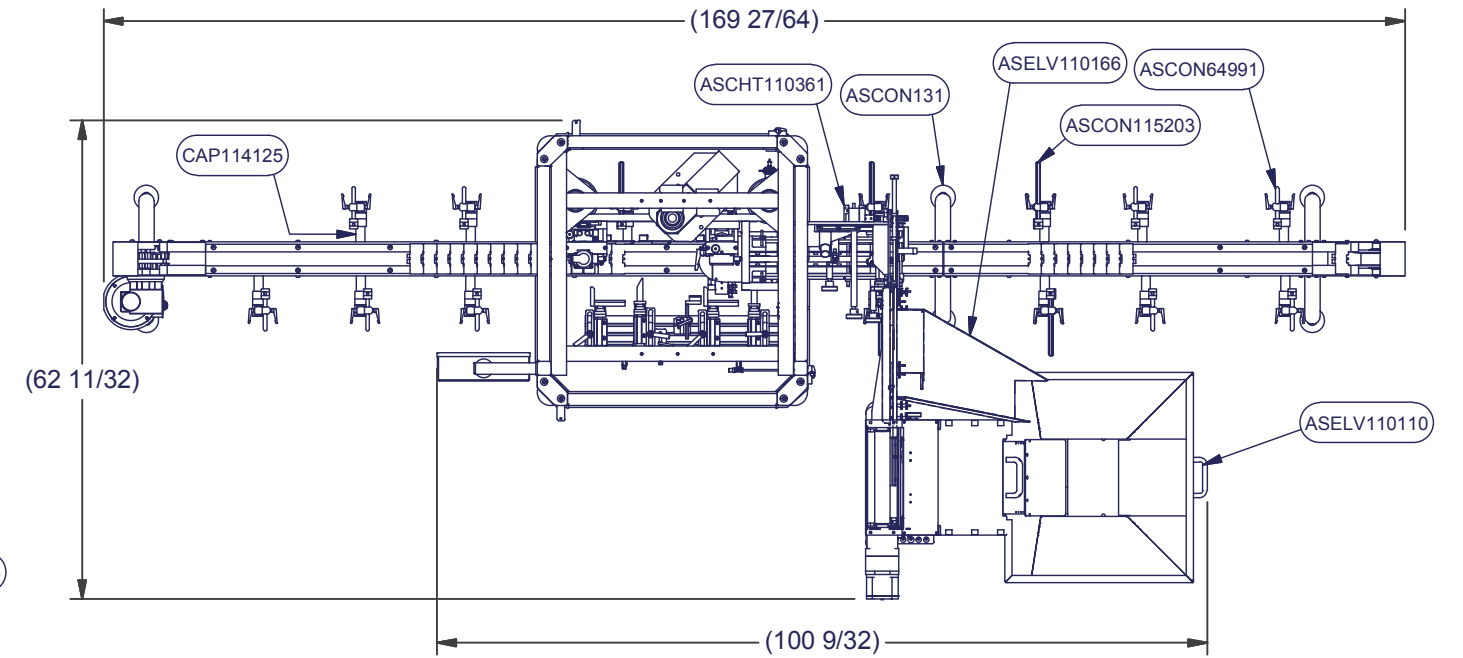
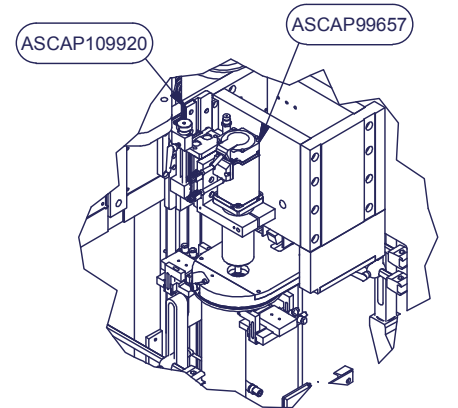


Turntables

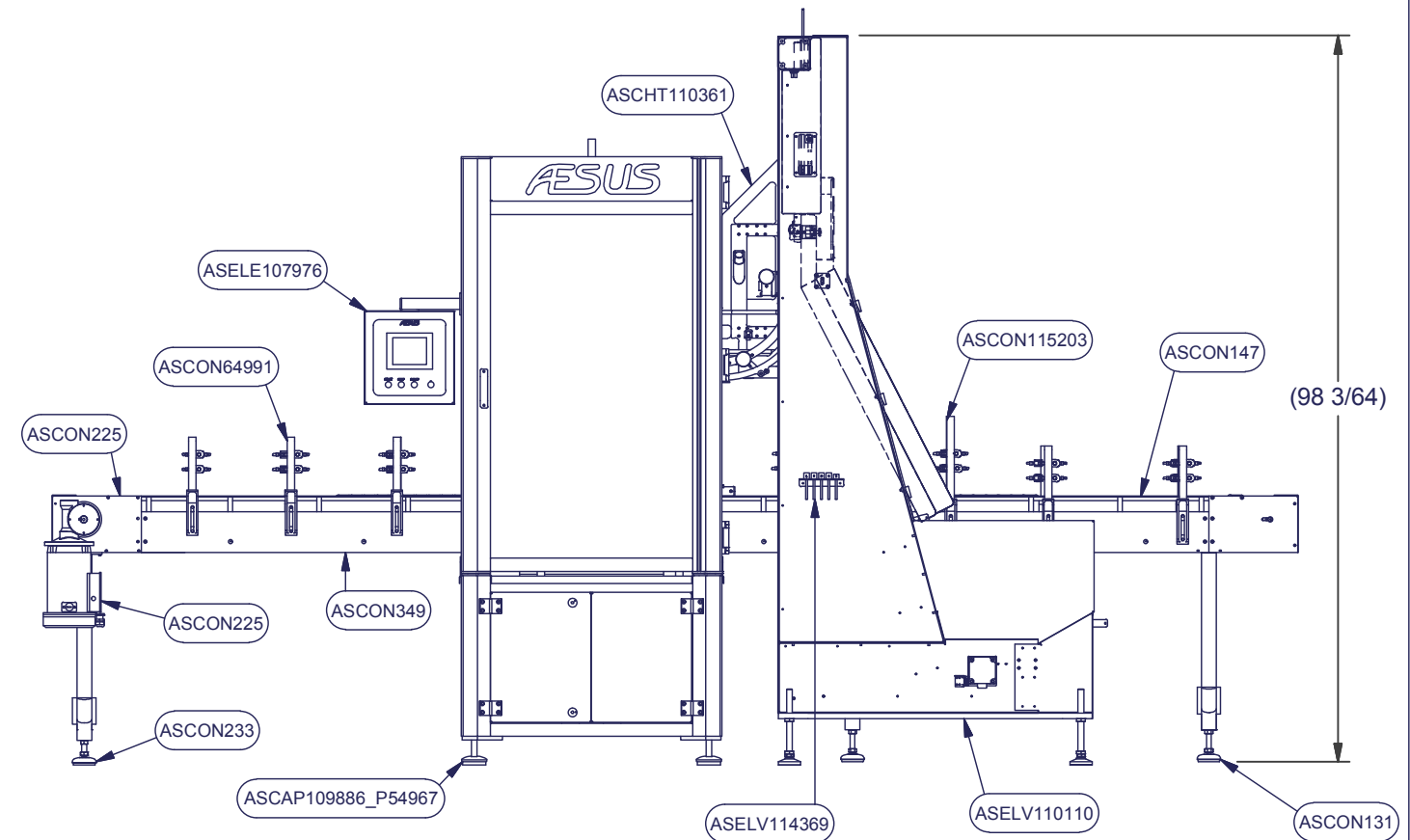
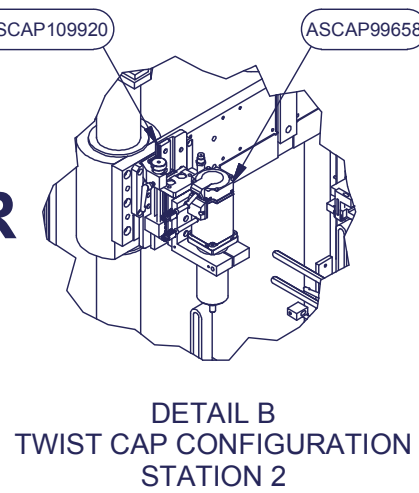
## Appendix 1: Assembly Drawings



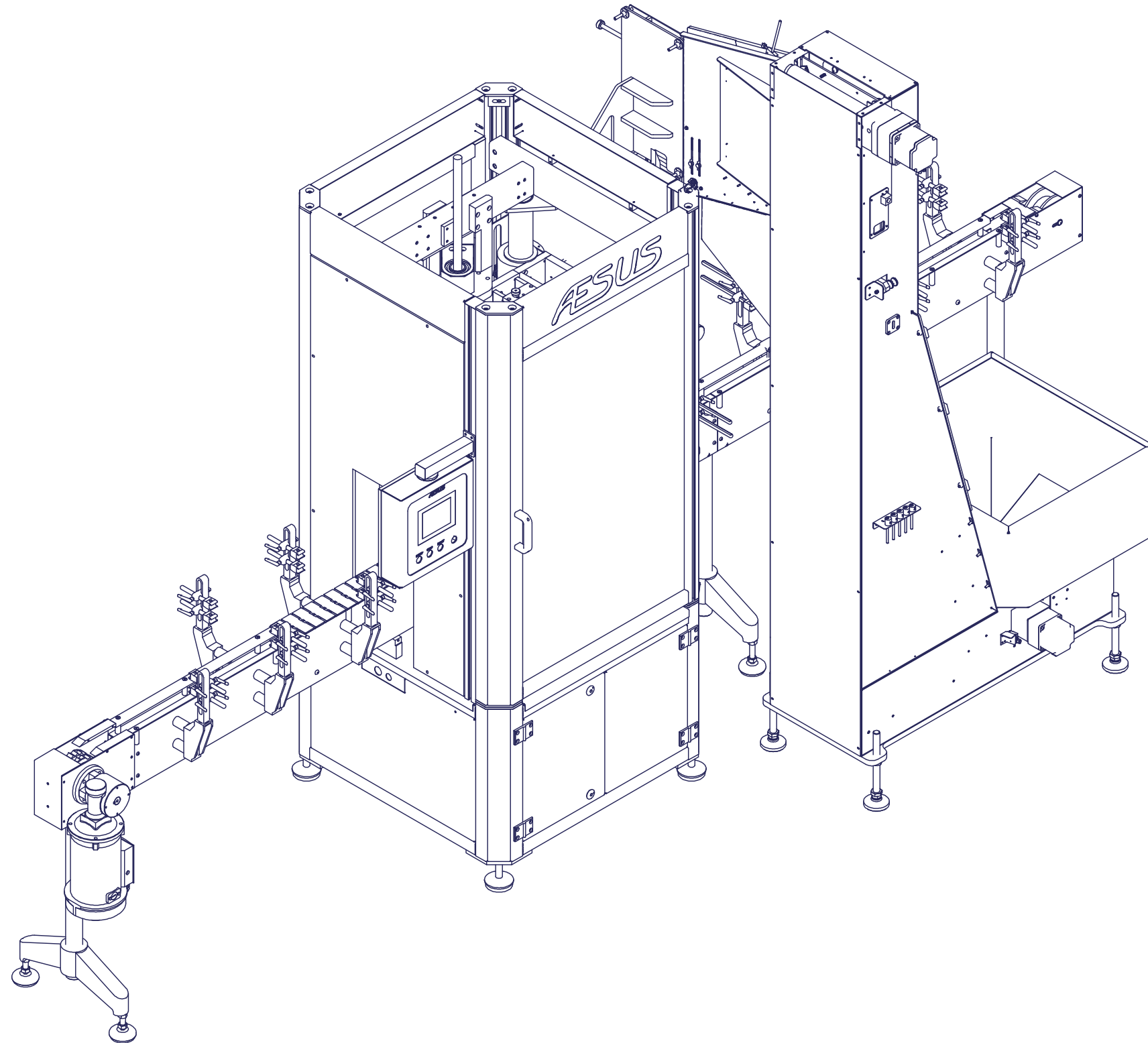
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					DWG NO: P54967_3DLayout		



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188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8 EMAIL: contactus@aesus.com					TEL: (514) 694-3439 FAX: (514) 694-4107		



# Customer Assemblies

P#	Customer	Order Description
54967	SAGER Foods Products Inc.	Delta Cap 2 + Elevator

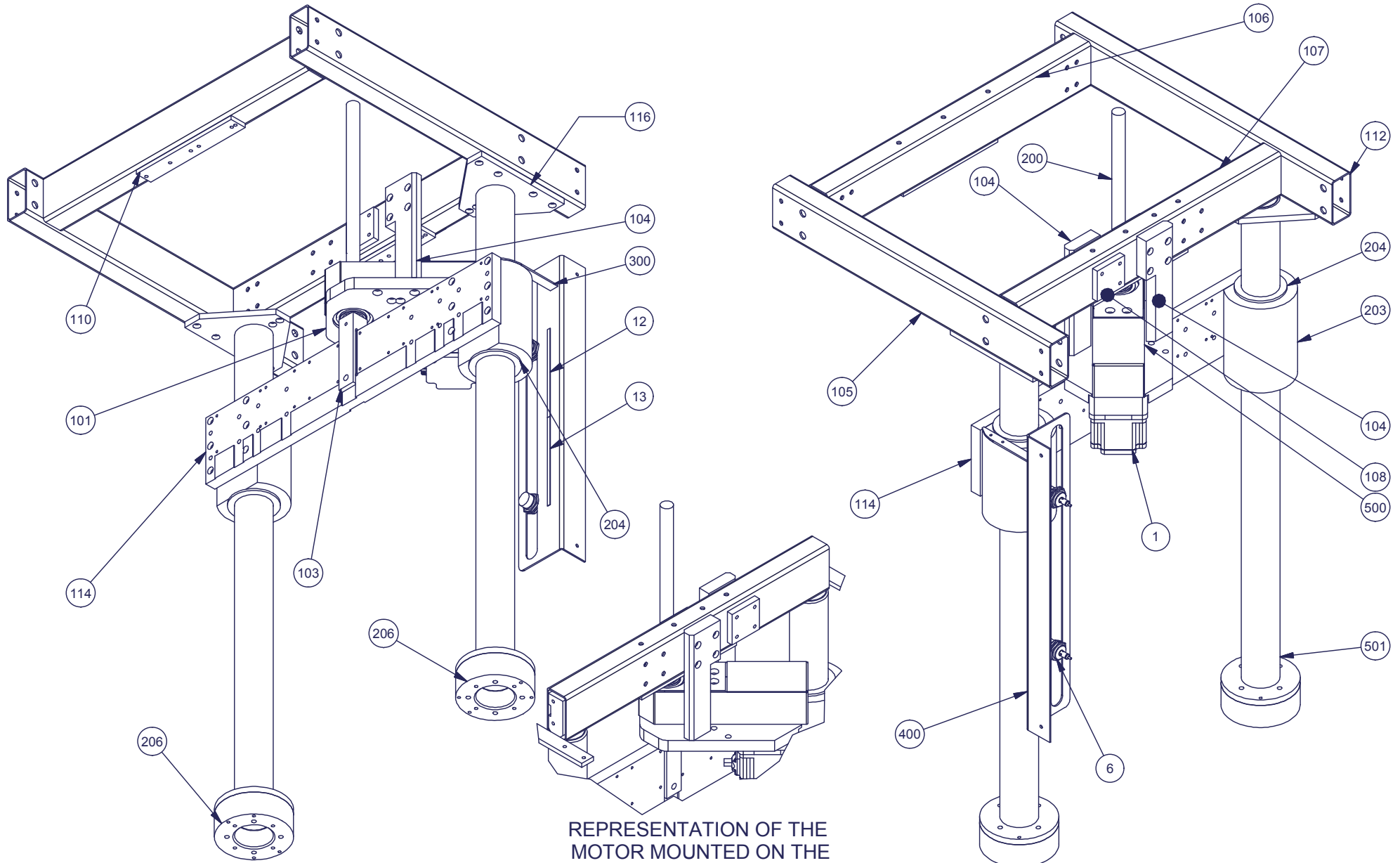
## Assembly List

Assembly No.	Qty	Assembly Name
<b>ASCAP109809-P54967</b>	<b>1</b>	<b>UNIVERSAL MOTORIZED UP/DOW SAGER</b>

<u>Item #</u>	<u>Qty</u>	<u>Part Number</u>	<u>Part Name</u>
1	1	ELE85418	ORIENTAL Motor, 100:1, 200VAC, 200W
2	1	CAP99234	DRIVE SLEEVE
3	2	CAP89234	ST.S. BALL BEARING 90mm OD x 50mm ID x 20mm THK
5	1	CAP99240	BELT 1 1/2 W TYPE L
6	2	ELE105201	Prox Induct PNP NC M30, 20mm Distance, 24Vdc, Sick
7	1	ELE69473	Bulgin -Male 4 pin screw connector (Buccaneer)
8	1	ELE91398	Cablek, Oriental Power Cable, Bulgin 4 pin, 3m BLA
9	1	ELE69475	Bulgin -Male 6 pin screw connector (Buccaneer)
10	1	ELE69476	Bulgin -Female 6 pin screw connector (Buccaneer)
11	4	28093	End cap for tubing 2" x 4" x 1/8" th
12	1	29075	Graduated Ruler 0-80
13	1	29083	Graduated ruler indicator plate 80-160
100	1	CAP99235	BOTTOM HOUSING
101	1	CAP103077	MOTOR SUPPORT
102	1	CAP99238	LINK BLOCK
103	1	CAP109810	ELEVATOR FORK
104	2	CAP103079	SUPPORT BRACKET
105	1	CAP103081	HORIZONTAL BEAM
106	1	CAP103083	SEPERATING BEAM
107	1	CAP103082	SEPERATING BEAM
108	2	CAP103084	FIXING PLATE
109	2	CAP103086	FIXING BLOCK
110	2	CAP103085	FIXING PLATE
111	1	CAP109812	RH FIXING BLOCK
112	1	CAP103080	HORIZONTAL BEAM
113	2	CAP103092	FIXING PLATE
114	1	CAP112937	UP/DOWN BRIDGE PLATE SPECIAL SAGER
115	1	CAP109813	LH FIXING BLOCK
116	2	CAP110079	LINK PLATE
200	1	CAP99304	LED SCREW
201	1	CAP89233	BRONZE ACME 1-5 BUSHING
202	1	CAP99232	CAP104972 MOD.
203	2	CAP103089	BUSHING
204	4	CAP40048	Flange oilite bush. 2 3/4" id (Mod) 22019
205	1	CAP112234	CAP99233 MOD.
206	2	CAP110654	SPACER FOR UP/DOWN
300	1	CON112847	RULER INDICATOR
400	1	CAP103716	UP/DOWN SENSOR BRACKET
500	1	CAP99241	GUARD
501	2	CAP109814	UP/DOWN LEG

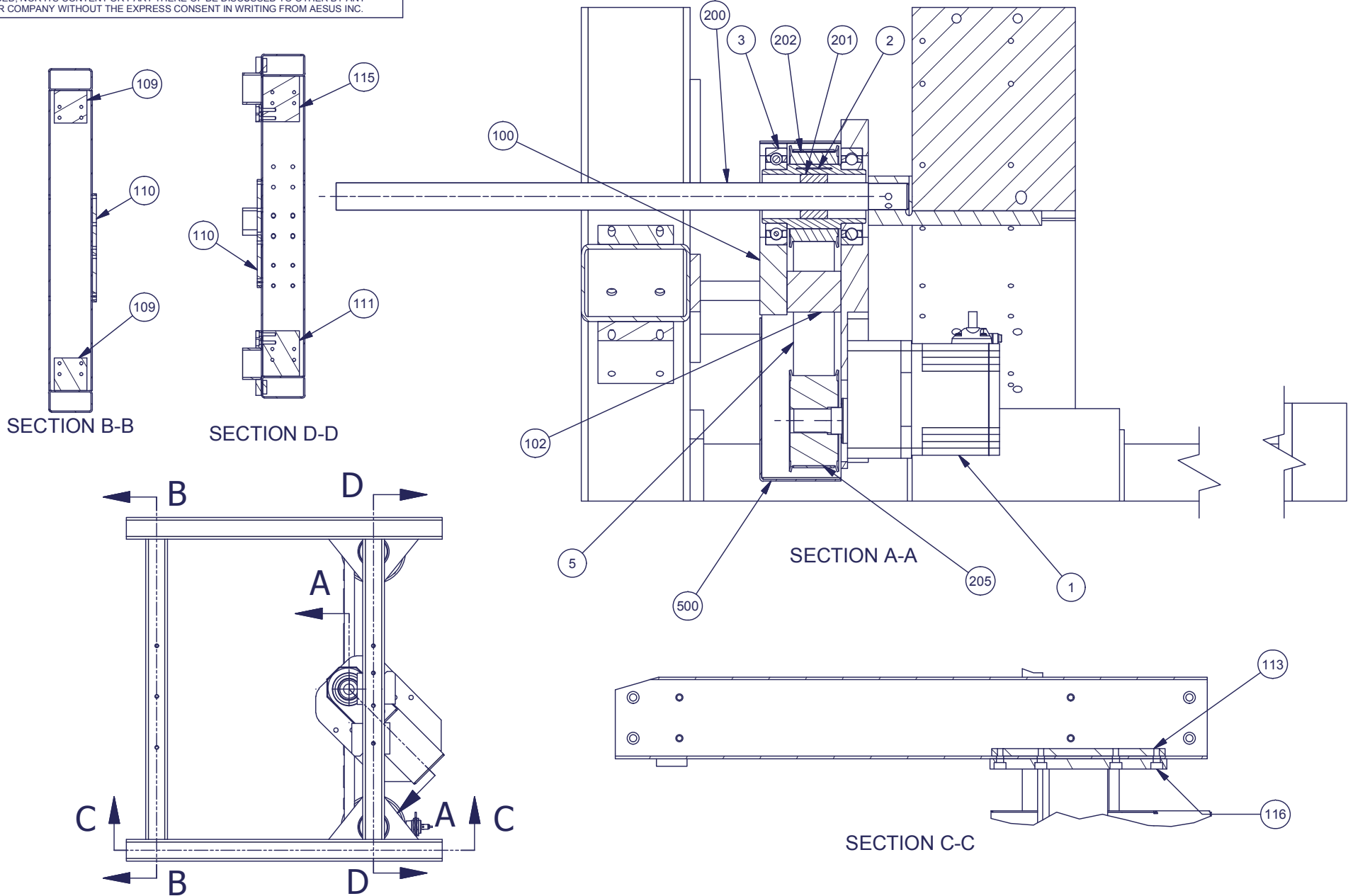





REPRESENTATION OF THE MOTOR MOUNTED ON THE OTHERSIDE FOR RtoL APPLICATION

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					188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8 EMAIL: contactus@aesus.com	TEL: (514) 694-3439 FAX: (514) 694-4107	DWG NO: <b>ASCAP109809-P54967</b>

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188 ONEIDA DRIVE TEL: (514) 694-3439  
 POINTE CLAIRE, QUEBEC FAX: (514) 694-4107  
 CANADA H9R 1A8 EMAIL: contactus@aesus.com



# Customer Assemblies

P# 54967 Customer SAGER Foods Products Inc. Order Description Delta Cap 2 + Elevator

## Assembly List

Assembly No.	Qty	Assembly Name
<b>ASCAP109886</b>	<b>1</b>	<b>UNIVERSAL DELTA INLINE FRAME</b>

<u>Item #</u>	<u>Qty</u>	<u>Part Number</u>	<u>Part Name</u>
1	4	27534	MACHINE FEET S/STEEL M20 X 185MM
2	8	LAB67764	SS. HINGE
3	4	26113	Keylockable 1/4 turn 7/8 grip range, lock 880 SCQ4
4	3	SLV99040	HINGE
5	2	SLV99037	Hinges with built-in safety switch, Elesa
6	6	LAB70874	END CAP FOR 45MM X 45MM EXTRUSION
7	2	LAB70860	HANDLE
8	1	CAP105077	MAGNET 25mm DIA x 13mm HT - 44LBS
9	1	CAP105429	BALL-NOSE SPRING PLUNGER M10x1.5 x 19mm LG
100	13	SLV103757	EXTRUSION VERTICAL SUPPORT
101	8	CAP87749	EXTRUSION CAP
102	2	CAP109893	SIDE EXTRUSION
103	14	CAP87748	RETAINING PLATE
104	1	CAP103113	DOOR PANEL
105	4	CAP89156	PANEL HOLDER
106	16	SLV87444	LEXAN SUPPORT 2
107	1	CAP109889	EXTRUSION MODIF
108	1	CAP106148	SIDE LEXAN
109	1	CAP109890	CAP ENTRY SIDE LEXAN
110	1	CAP105168	DOOR MAGNET HOLDER
111	1	CAP109891	DOOR PANEL
112	1	CAP109892	EXTRUSION WITH HOLES FOR HINGES
113	1	CAP105428	DOOR BALL PLUNGER HOLDER
200	2	LAB73940	STOPPER FOR DOOR
201	1	SLV107850	HOLE CAP
300	4	CAP87739	FEET SUPPORT
301	1	CAP109888	TOP TABLE
302	2	CAP89380	BACK PLATE
303	5	SLV99038	HINGE
304	2	CAP105650	DOOR STOPPER
400	2	SLV87431	CORNER
401	1	CAP109887	TOP CLADDING
402	2	SLV103031	CORNER
403	2	SLV103032	CORNER 1
404	2	CAP103029	HEAD PLATE
405	1	CAP103030	FRONT COVER
406	1	SLV95218	ENTRY SIDE BRACKET
407	1	SLV95219	EXIT SIDE BRACKET
408	4	CON112763AA	CONVEYOR ATTACHMENT
500	1	SLV78755	TAG PLATE
501	2	CAP89147	ELECTRIC BOX 27 x 20 x 10
502	2	CAP89148	DOOR 1
503	2	CAP89149	DOOR 2
504	2	SLV102347	STIFFNER 3



# Customer Assemblies

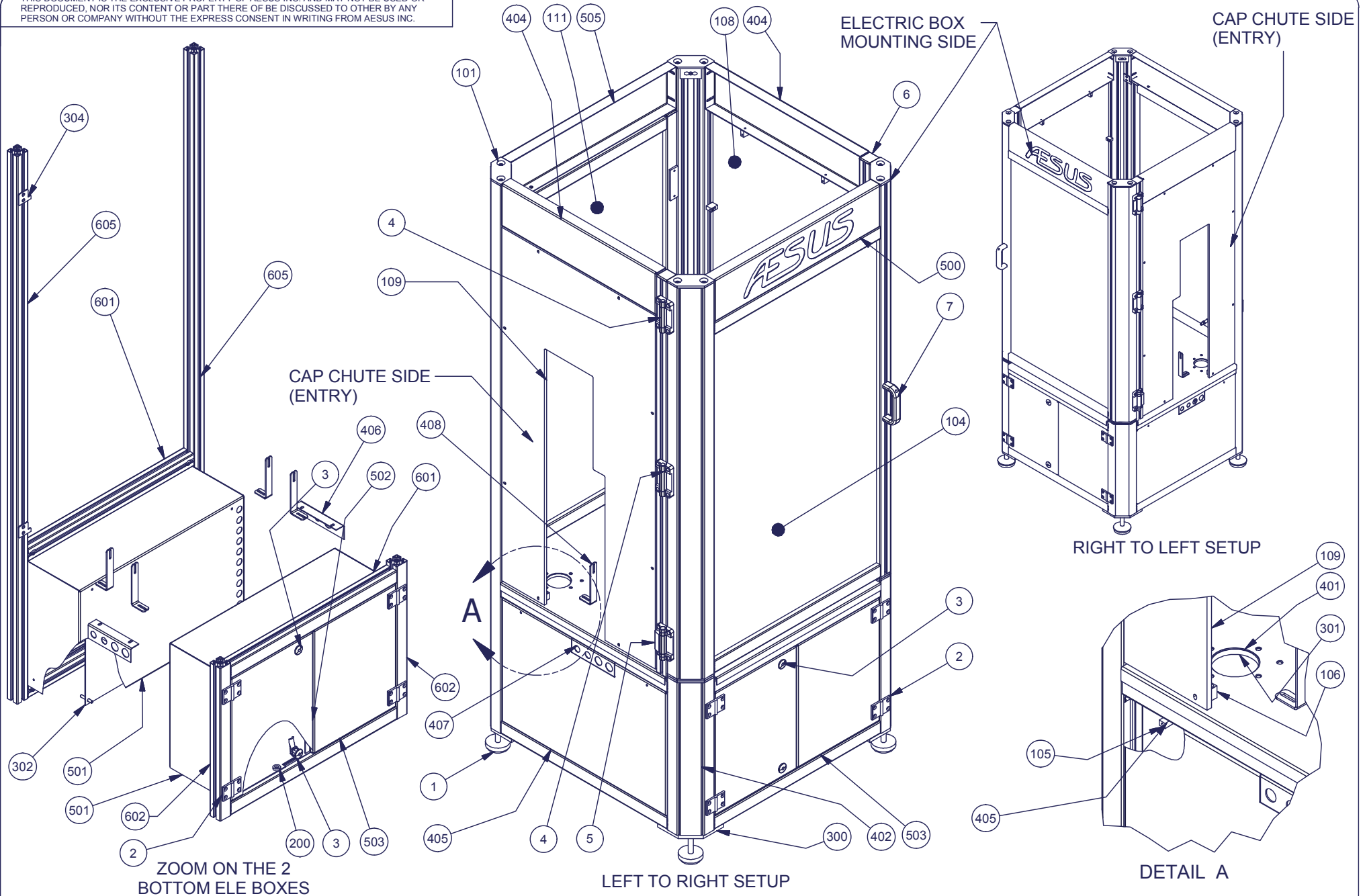
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<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCAP109886</b>	<b>1</b>	<b>UNIVERSAL DELTA INLINE FRAME</b>

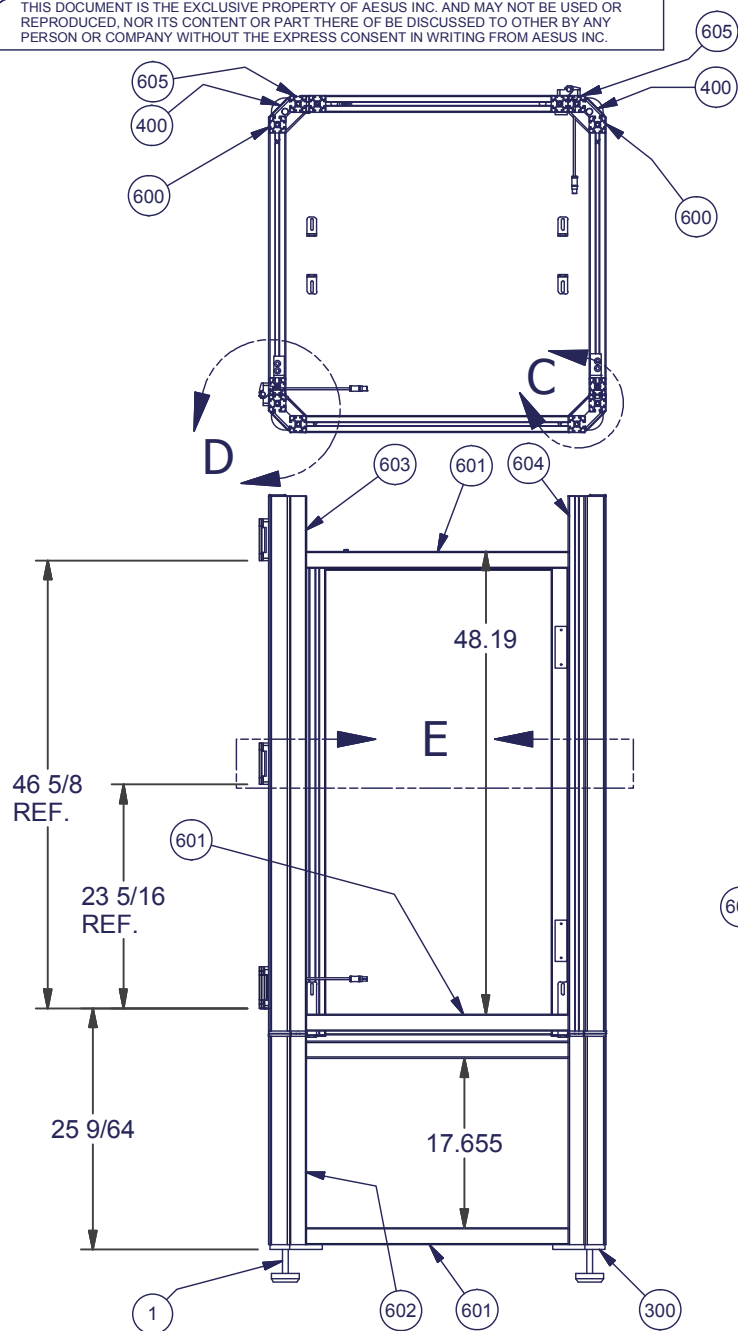
<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
505	1	CAP103112	TAG PLATE
506	1	CAP112173	FRONT COVER
600	1	LIST109886	PRINT THE PDF AND CUT THE MATERIAL

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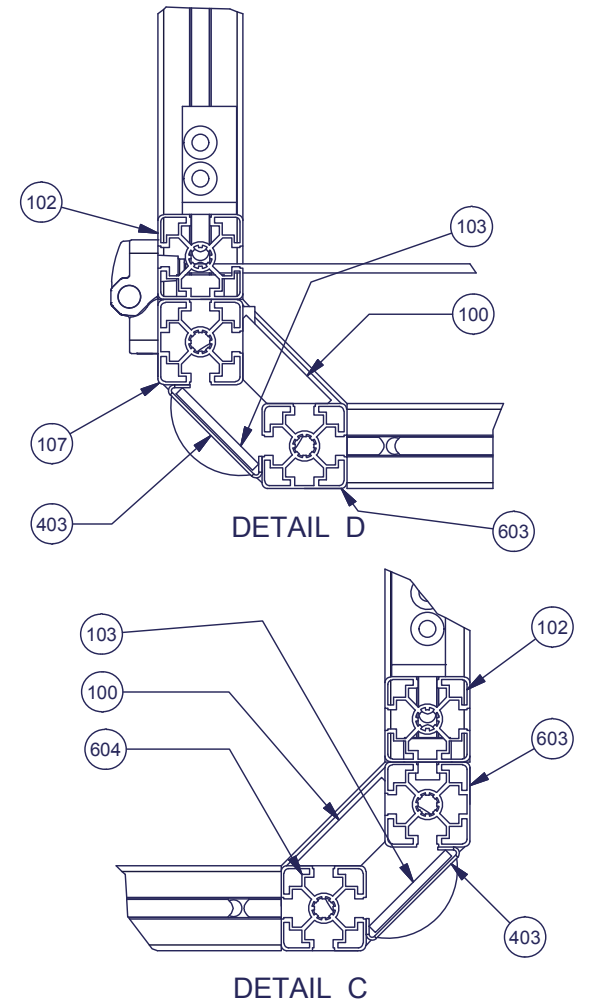
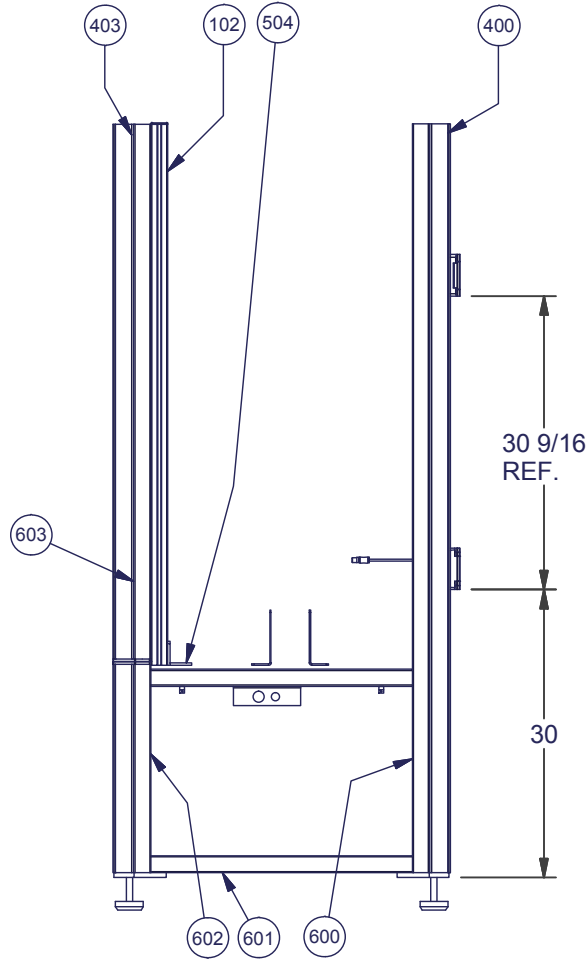
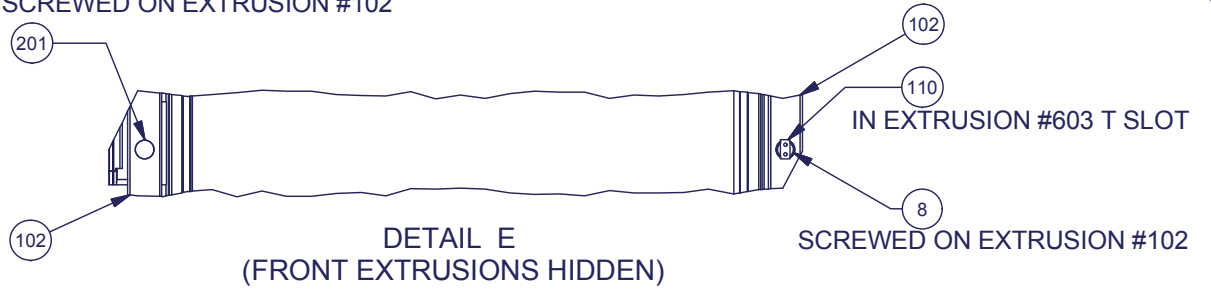


DRAWN BY: Guillaume M.G.	DATE: 21/06/2016	CHECKED BY:	MATERIAL:	MACHINE:	SHEET: 1 OF 3
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				188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8	TEL: (514) 694-3439 FAX: (514) 694-4107 EMAIL: contactus@aesus.com
				DWG NO: ASCAP109886	

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SCREWED ON EXTRUSION #102



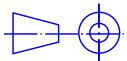
DRAWN BY: Guillaume M.G. DATE: 21/06/2016

CHECKED BY:

MATERIAL:

MACHINE:

SHEET: 2 OF 3



DECIMALS / DECIMAUX: .xx ± .01  
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 FRACTIONS / FRACTIONS: ± 1/64  
 ANGULAR / ANGULAIRE: ± 0.5°  
 BREAK ALL SHARP EDGES /  
 BRISER TOUTES LES ARRETES

MAT'L TREATMENT:



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 POINTE CLAIRE, QUEBEC FAX: (514) 694-4107  
 CANADA H9R 1A8 EMAIL: contactus@aesus.com

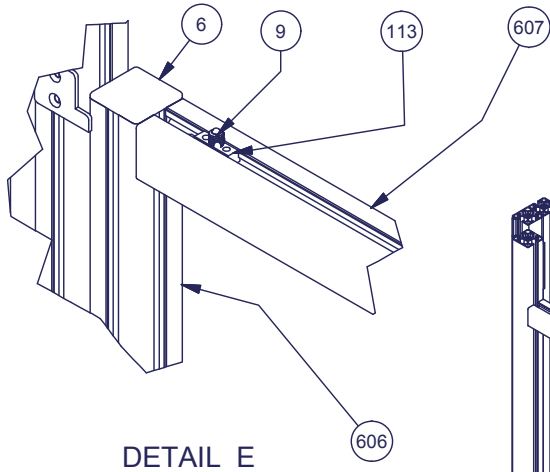
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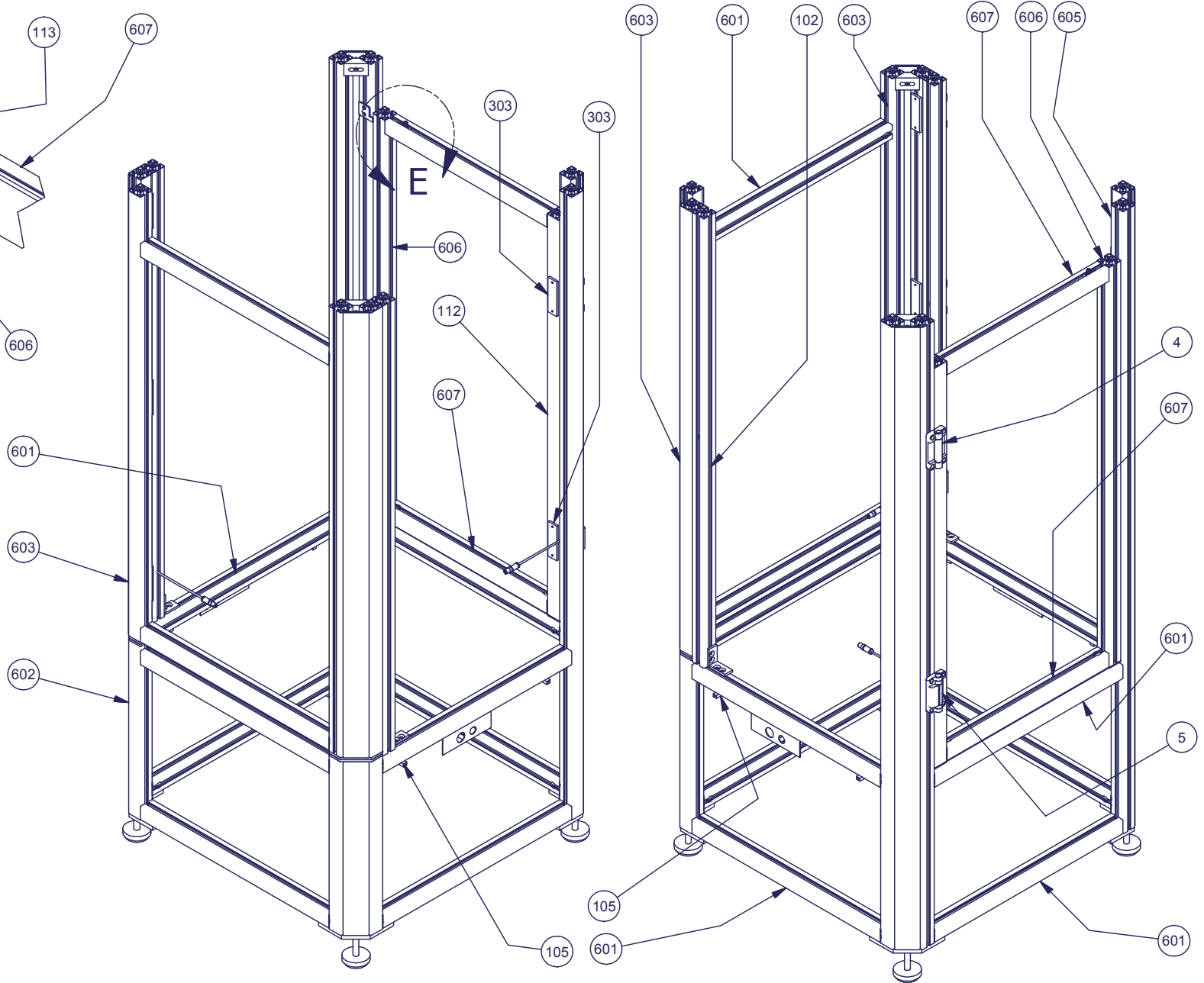
ASCAP109886

REV: 0

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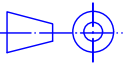


DETAIL E



DRAWN BY: Guillaume M.G.    DATE: 21/06/2016    CHECKED BY:

DECIMALS / DECIMAUX: .xx ± .01  
 DECIMALS / DECIMAUX: .xxx ± .005  
 FRACTIONS / FRACTIONS: ± 1/64  
 ANGULAR / ANGULAIRE: ± 0.5°  
 BREAK ALL SHARP EDGES /  
 BRISER TOUTES LES ARRETES



MATERIAL:  
  
 MAT'L TREATMENT:

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 CANADA H9R 1A8    EMAIL: contactus@aesus.com

MACHINE:  
 SHEET: 3 OF 3

TITLE: UNIVERSAL DELTA INLINE FRAME  
 DWG NO: ASCAP109886    REV: 0



# Customer Assemblies

<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

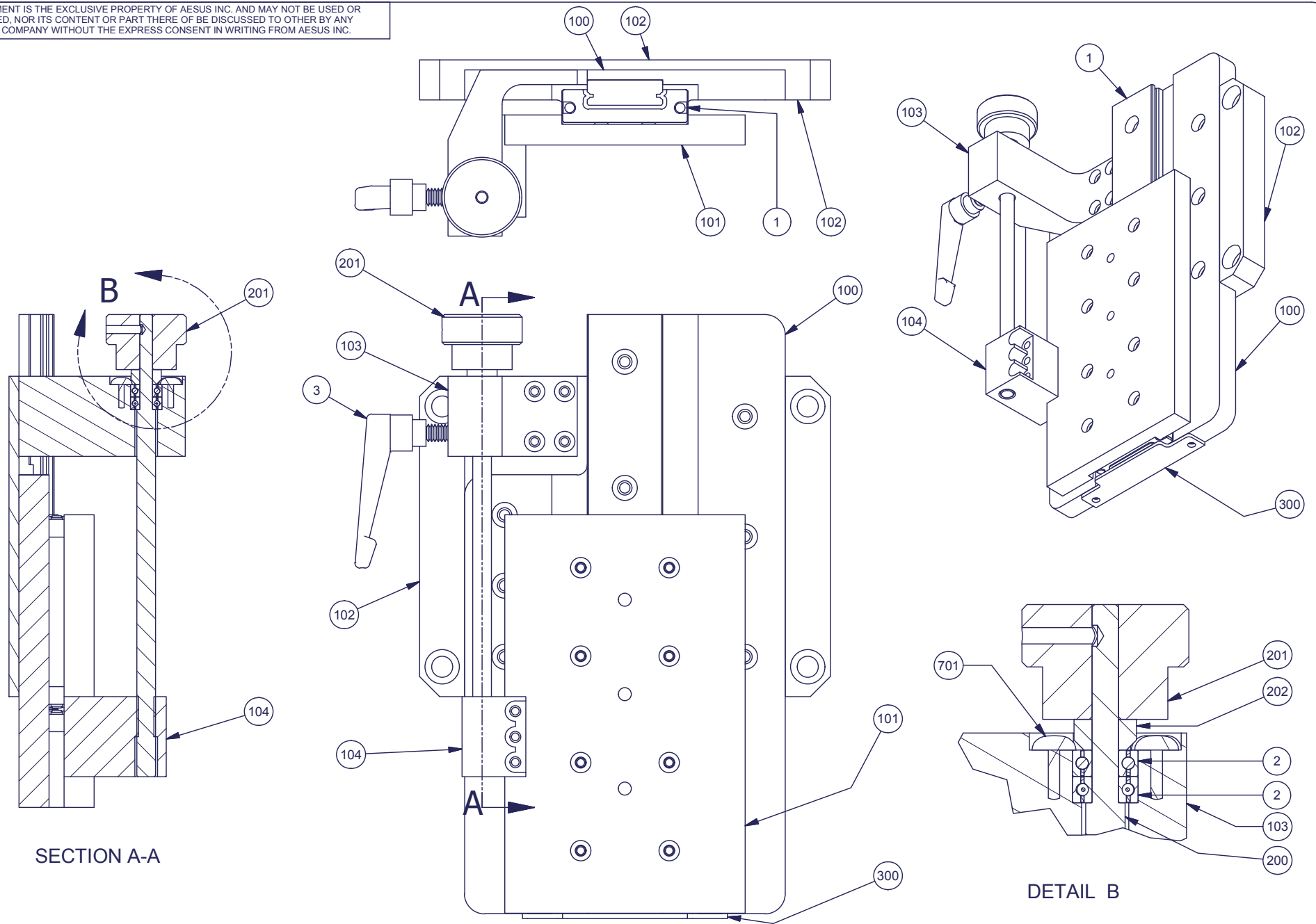
## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCAP109920</b>	<b>2</b>	<b>PUSH THRU ADJUSTMENT FROM SIDE</b>

<u>Item #</u>	<u>Qty</u>	<u>Part Number</u>	<u>Part Name</u>
1	1	CAP109925	MINIATURE LINEAR GUIDE 190mm LG. W/ 2 BLOCKS
2	2	CAP109927	SST ROLLER BEARING 4mm ID 10mm OD
3	1	93122	Handle M6 x 20 blue button
100	1	CAP109921	UP/DOWN SUPPORT PLATE
101	1	CAP109923	LIFT LINK PLATE
102	1	CAP109924	LIFT MOUNTING PLATE
103	1	CAP109928	BEARING HOUSING
104	1	CAP109929	LIFT THREADED BLOCK
200	1	CAP109922	LIFT SCREW
201	1	CAP109937	LIFT KNOB
202	1	CAP109934	BEARING SPACER
300	1	CAP109935	GUIDE STOPPER
701	2	BOU6001	Button socket cap screw ISO 7380



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SECTION A-A

DETAIL B

DRAWN BY: A. LALIBERTE	DATE: 22/06/2016	CHECKED BY:	MATERIAL:		MACHINE:	SHEET: 1 OF 1
DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .005 FRACTIONS / FRACTIONS: ± 1/64 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES			MAT'L TREATMENT:		TITLE: PUSH THRU ADJUSTMENT FROM SIDE	REV: 0
188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8				TEL: (514) 694-3439 FAX: (514) 694-4107 EMAIL: contactus@aesus.com	DWG NO:	ASCAP109920



# Customer Assemblies

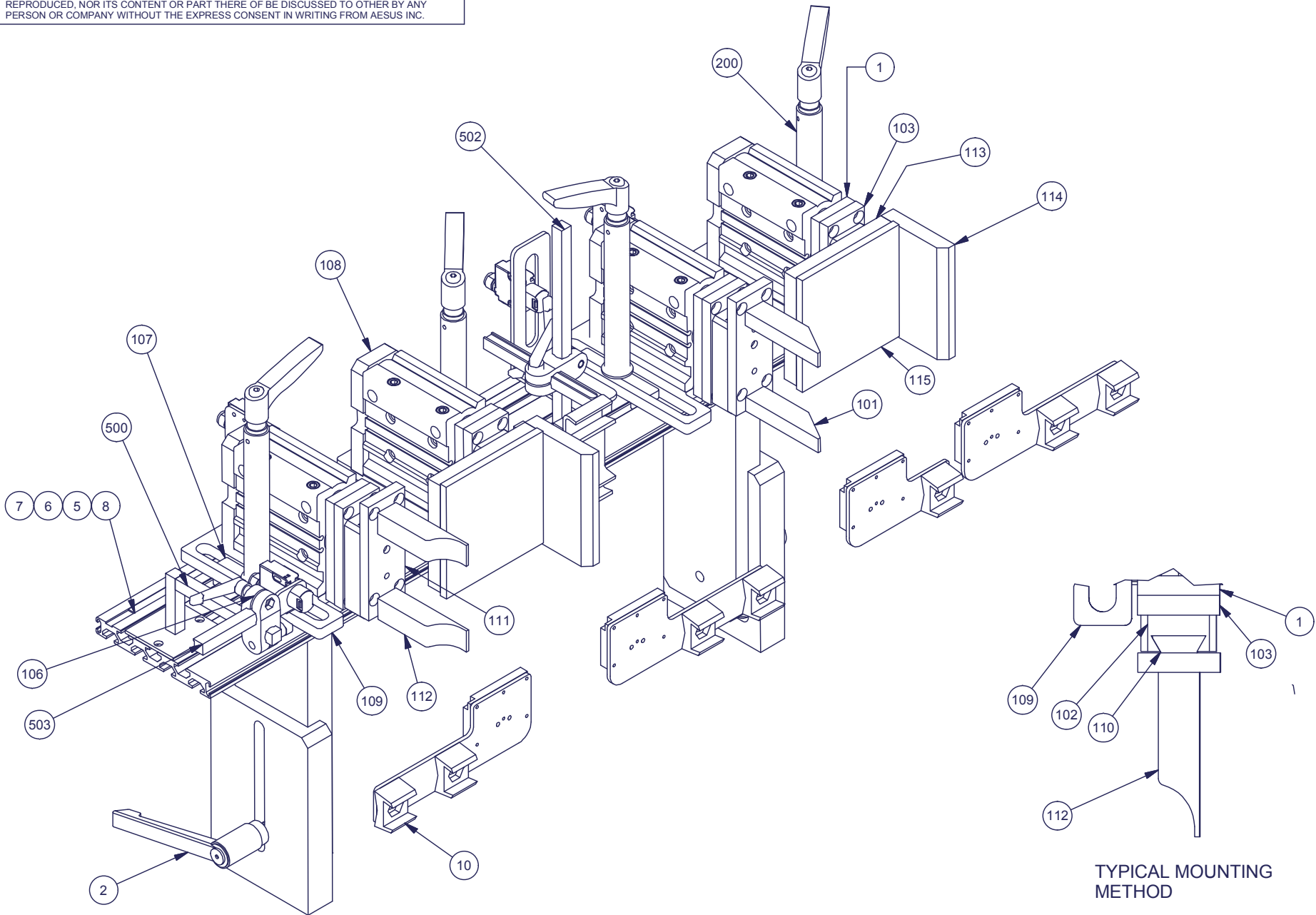
P# 54967 Customer SAGER Foods Products Inc. Order Description Delta Cap 2 + Elevator

## Assembly List

<u>Assembly No.</u>	<u>Qty</u>	<u>Assembly Name</u>
<b>ASCAP110002_P54967</b>	<b>1</b>	<b>ECO MED.DUTY INLINE CAPPER GATING</b>

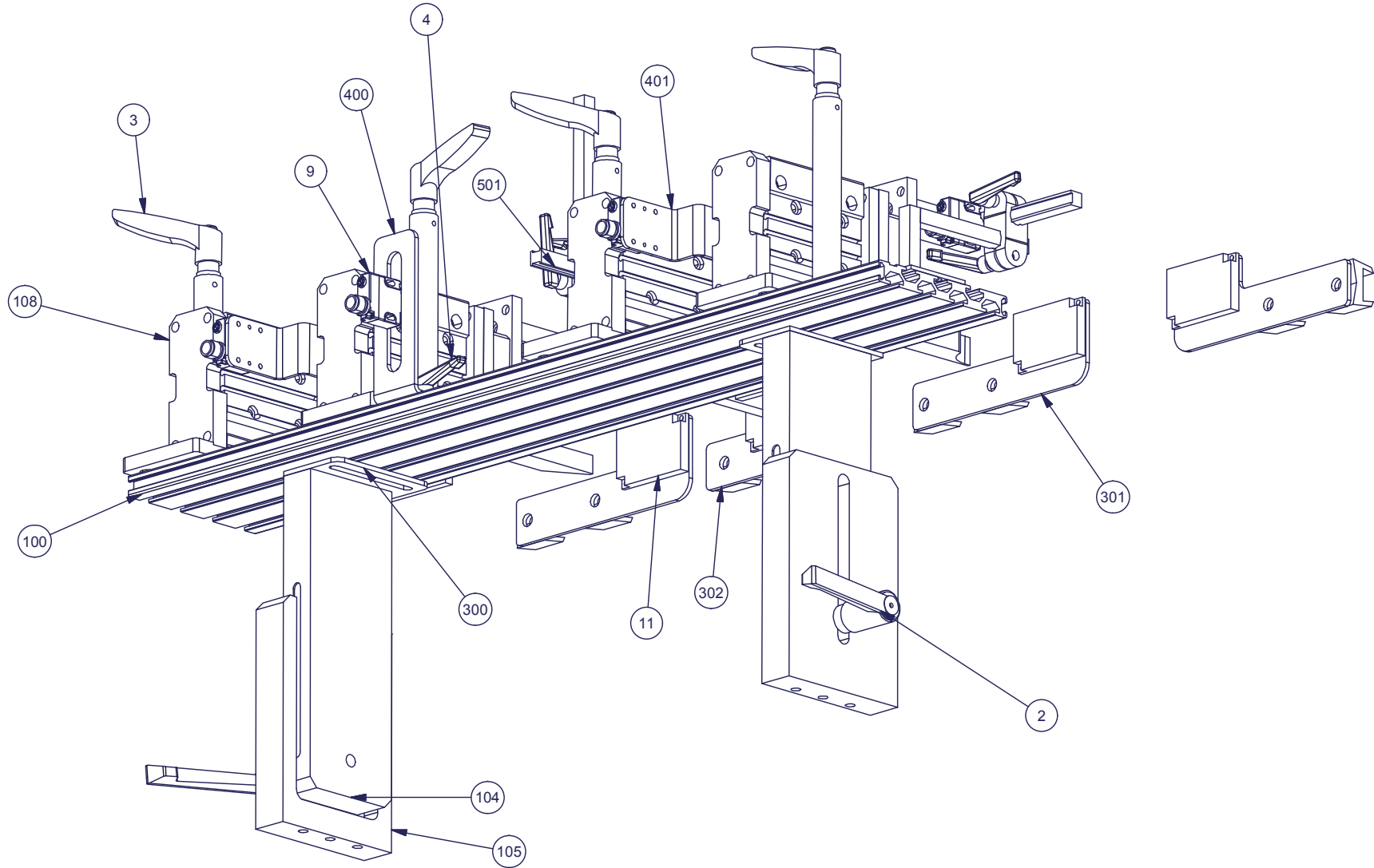
  


<u>Item #</u>	<u>Qty</u>	<u>Part Number</u>	<u>Part Name</u>
1	4	CAP103893	AIR CYLINDER
2	2	EDT-20912	RATCHET HANDLE M10 X 30
3	4	SLV83122	RATCHET HANDLE M8 X 20
4	5	93122	Handle M6 x 20 blue button
5	1	29075	Graduated Ruler 0-80
6	1	29083	Graduated ruler indicator plate 80-160
7	1	29083A	Graduated ruler indicator plate 160-240
8	1	29083B	Graduated ruler indicator plate 240-320
9	4	ELE107652	Thrubeam M12-4p 20m Distance, Keyence
10	7	EDT-88017	RAIL CLIP
11	4	33030	Reflector Omron (Black)
12	4	ELE93318	M12-3P, female cable 90deg, PVC, 5M, IFM
100	1	CAP110003	CYLINDER TABLE
101	2	FIL64625	STOP FINGER
102	4	FIL64624	FINGER HOLDER
103	4	CAP103937	DOVE TAIL SUPPORT BAR
104	2	CAP110006AA	GUIDE BLOCK
105	2	CAP110005	SLIDE BLOCK
106	2	SLV109306	ALUMINIUM Cross block modif.for 10mm square
107	4	SLV114305	EXTENDED "T" SLIDE BAR
108	4	CAP103935AA	CYLINDER SUPPORT PLATE
109	4	CAP103894AA	CYLINDER SUPPORT
110	4	FIL64623	DOVETAIL MOUNT
111	2	CAP103936-AB	FINGER SUPPORT BAR
112	2	CAP114829	P54967 CAP 3 PROFILED FINGER
113	2	CAP110730AA	STOPPER PLATE FOR FINGER USE
114	2	CAP110731AA	STOPPER PLATE 2
115	2	CAP115210	RUBBER BACK PLATE 4" X 4"
200	4	CAP114846	M8 HANDLE EXTENSION 5.5" HEIGHT
300	2	CAP110007	GUIDE BLOCK LINK
301	3	EDT-99-30-002	bracket (reflector & photocell)
302	1	EDT-99-30-002C	BRACKET (REFLECTOR&PHOTOCELL)
400	1	CAP108326	SENSOR BRACKET
401	2	CAP115205	DEPORTED SENSOR BRACKET
500	1	LAB111AD	FIXED SUPPORT FOR SENSOR
501	1	CAP103939AA	GUIDE RAIL SUPPORT 2 WITH RULLER
502	1	CAP110004	SUPPORT FOR GUIDE RAIL
503	1	LAB847B_AA	PHOTOCELL SUPPORT 4.25" LG.



DRAWN BY: A.CHENIER	DATE: 26/04/2017	CHECKED BY:	MATERIAL:	MACHINE:	SHEET: 1 OF 2
DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .005 FRACTIONS / FRACTIONS: ± 1/64 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES			MAT'L TREATMENT:	TITLE: ECO MED. DUTY INLINE CAPPER GATING	REV: 0
				DWG NO: ASCAP110002_P54967	
188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8 EMAIL: contactus@aesus.com				TEL: (514) 694-3439 FAX: (514) 694-4107	

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<p>DECIMALS / DECIMAUX: .xx ± .01          DECIMALS / DECIMAUX: .xxx ± .005          FRACTIONS / FRACTIONS: ± 1/64          ANGULAR / ANGULAIRE: ± 0.5°          BREAK ALL SHARP EDGES /          BRISER TOUTES LES ARRETES</p>			MAT'L TREATMENT:		TITLE: ECO MED. DUTY INLINE CAPPER GATING DWG NO: ASCAP110002_P54967	REV: 0



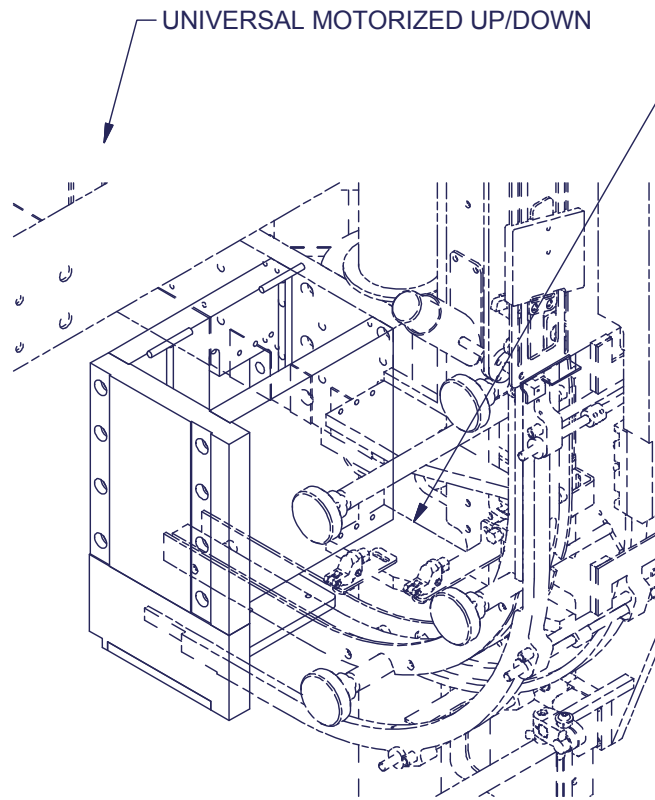
# Customer Assemblies

<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

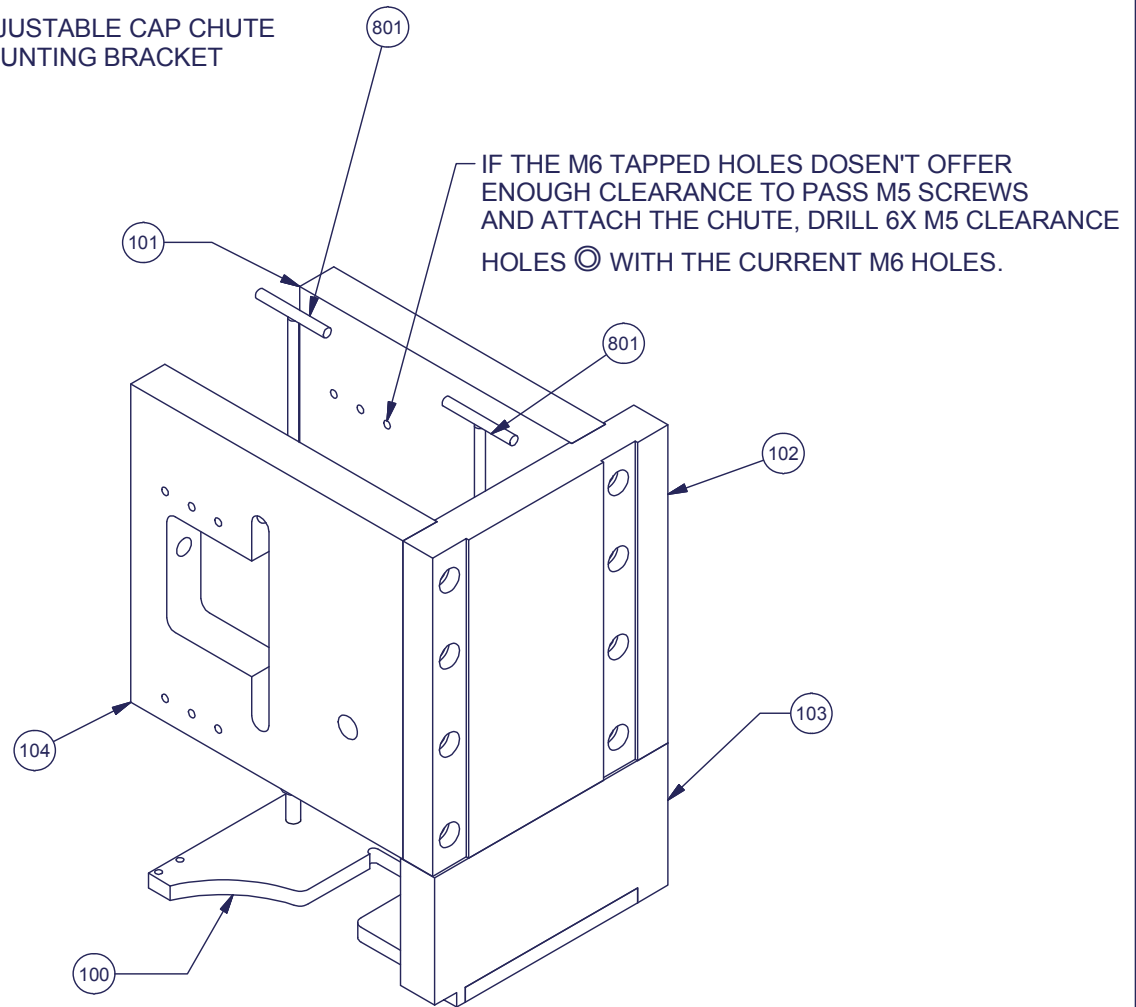
## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCAP110648</b>	<b>1</b>	<b>MOUNTING BRACKET FOR ADJUSTABLE CHUTE</b>

<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
100	1	CAP109908	CAP TRAP SUPPORT
101	2	CAP109906	STIFFENER
102	1	CAP109907	STIFFENER SUPPORT PLATE
103	1	CAP112489	PUSH TRUE SUPPORT PLATE
104	1	CAP112411AA	STIFFNER
500	2	CAP112870	SCREW HANDLE



ADJUSTABLE CAP CHUTE MOUNTING BRACKET



IF THE M6 TAPPED HOLES DOESN'T OFFER ENOUGH CLEARANCE TO PASS M5 SCREWS AND ATTACH THE CHUTE, DRILL 6X M5 CLEARANCE HOLES ☉ WITH THE CURRENT M6 HOLES.

REFERENCE FOR ASSEMBLING

DRAWN BY: A. LALIBERTE		DATE: 28/07/2016		CHECKED BY:		MATERIAL:		MACHINE:		SHEET: 1 OF 1	
 DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .005 FRACTIONS / FRACTIONS: ± 1/64 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES		MAT'L TREATMENT:						TITLE: MOUNTING BRACKET FOR ADJUSTABLE CHUTE		REV: 0	
				188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8 EMAIL: contactus@aesus.com				DWG NO: ASCAP110648			



# Customer Assemblies

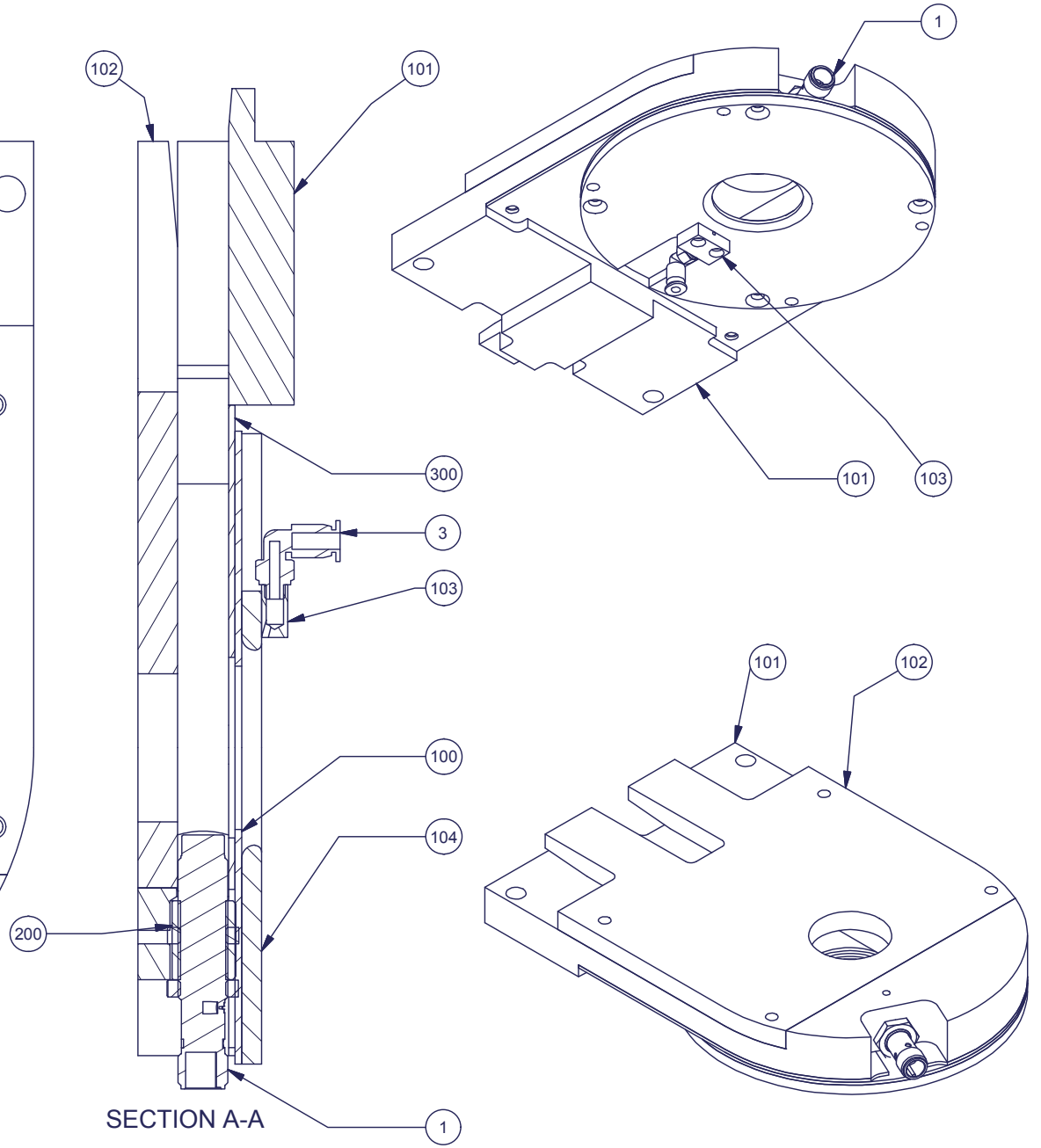
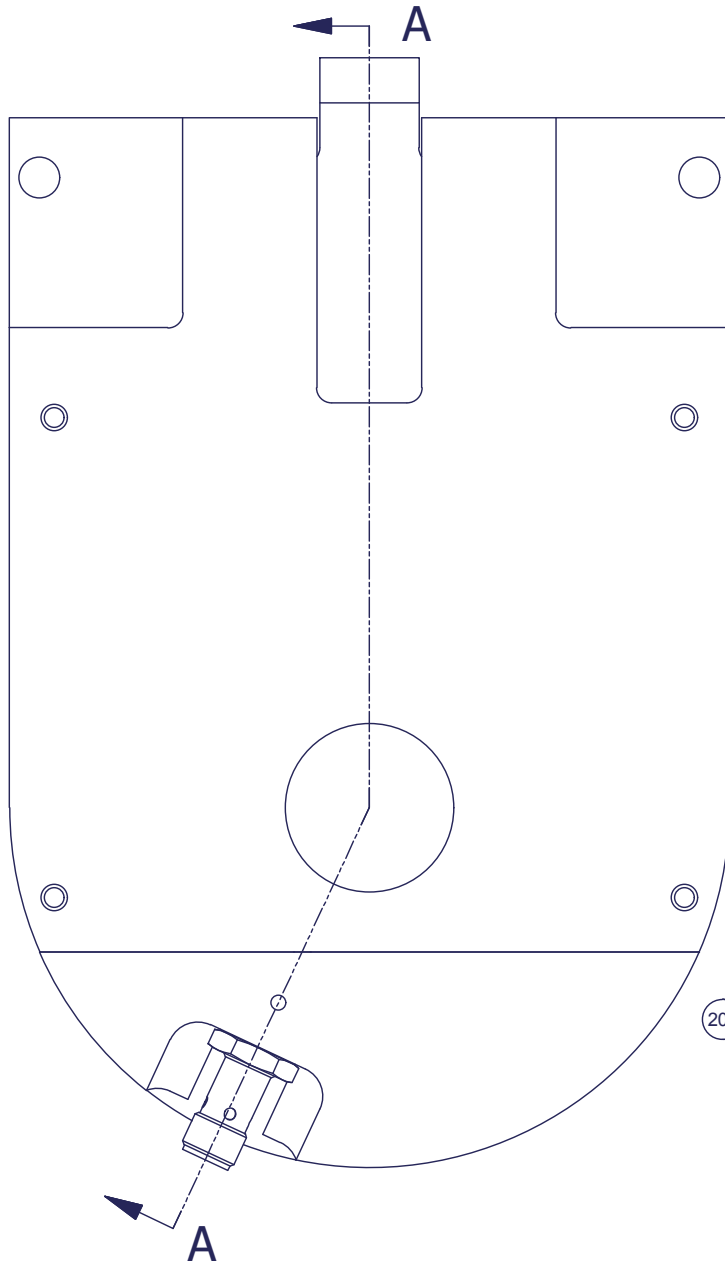
<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCAP110663</b>	<b>1</b>	<b>CAP TRAP ASS'Y FOR CAP DIA 1.609 X 0.454 H</b>

<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
1	1	ELE1455	Prox, Capacitive, M12, 8mm, QuickC, PNP, IFM
2	1	ELE93319	M12-3P female cable straight, PVC, 5M, IFM
3	1	EDT-75306	Elbow 5-4
100	3	CAP110667	TUNNEL GASKET FOR CAP 1.609 DIA
101	1	CAP110665	CAP TRAP BODY FOR CAP 1.609 DIA X .454 H
102	1	CAP110664	CAP TRAP COVER FOR CAP DIA 1.609
103	1	CAP88051	CAP AIR MANIFOLD
104	1	CAP110668	TUNNEL GASKET CLAMP FOR CAP 1.609 DIA
200	1	CAP87149	M12 PROX SLEEVE
300	1	CAP110666	TUNNEL BOTTOM PLATE FOR CAP 1.609 DIA

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 ANGULAR / ANGULAIRE: ± 0.5°  
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 CANADA H9R 1A8

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 FAX: (514) 694-4107  
 EMAIL: [contactus@aesus.com](mailto:contactus@aesus.com)

MACHINE:  
 SHEET: 1 OF 1

TITLE: CAP TRAP ASS'Y FOR CAP DIA 1.609 X 0.454 H

DWG NO: ASCAP110663  
 REV: 0





# Customer Assemblies

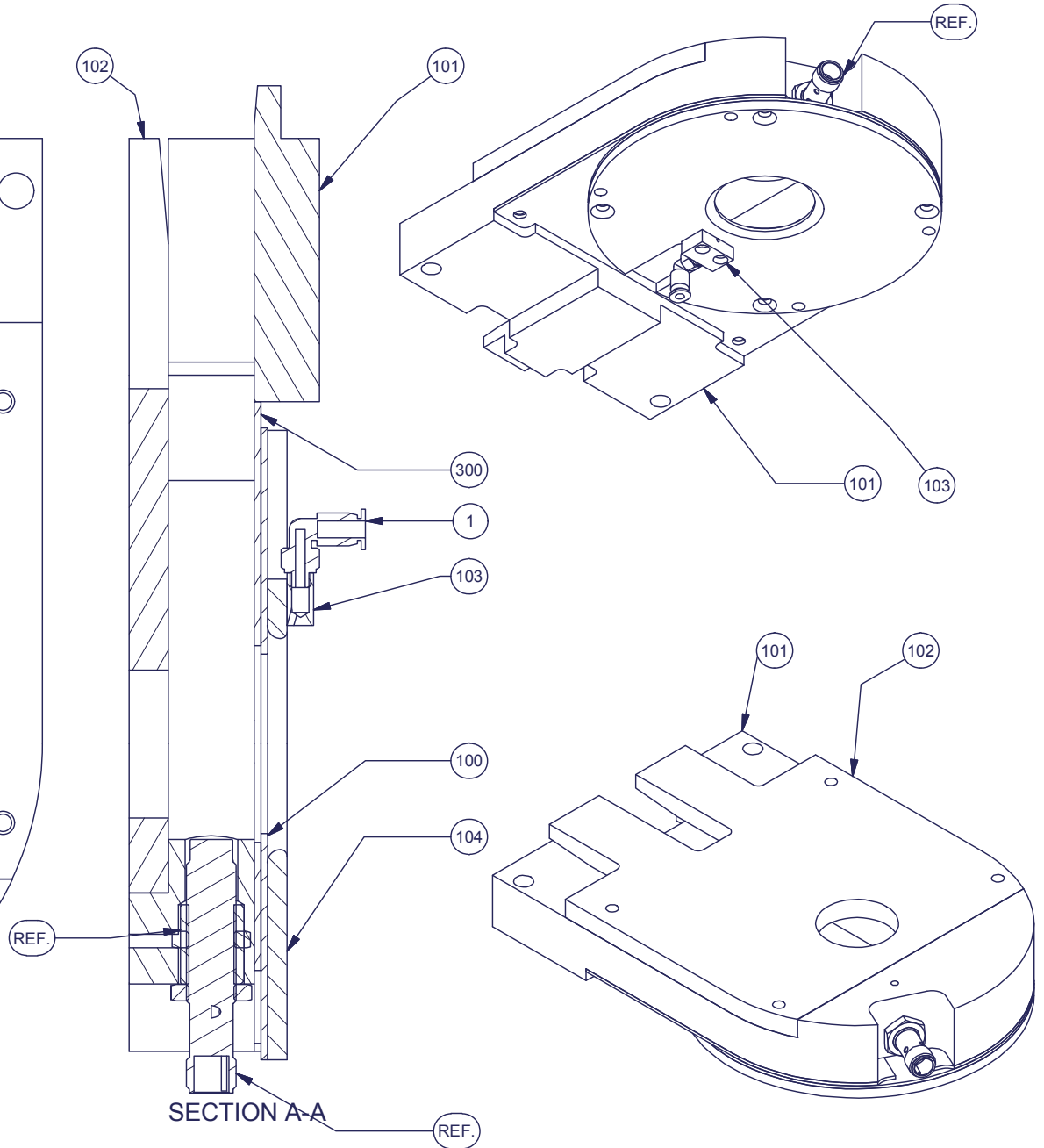
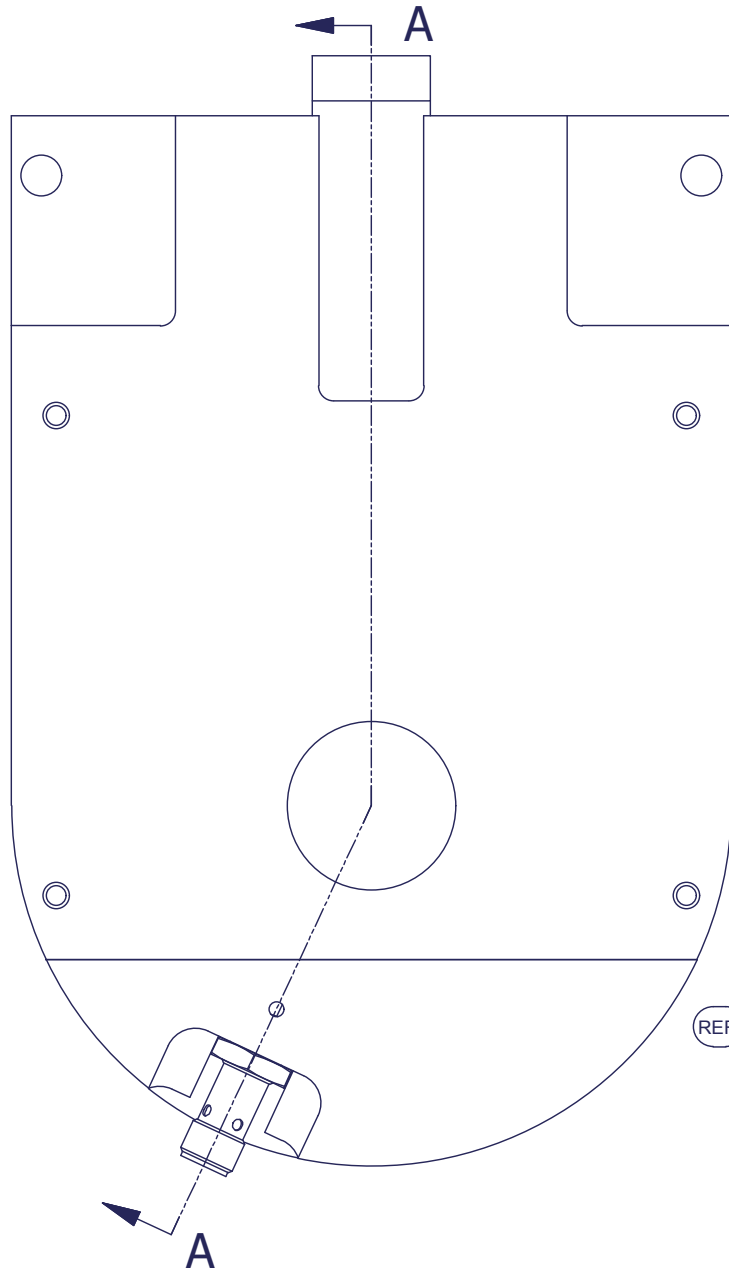
<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCAP110673</b>	<b>1</b>	<b>CAP TRAP ASS'Y FOR CAP DIA 1.765 X 0.786 H</b>

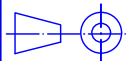
<u>Item #</u>	<u>Qty</u>	<u>Part Number</u>	<u>Part Name</u>
1	1	EDT-75306	Elbow 5-4
100	3	CAP110676	TUNNEL GASKET FOR CAP 1.765 DIA
101	1	CAP110678	CAP TRAP BODY FOR CAP 1.765 DIA X .786 H
102	1	CAP110675	CAP TRAP COVER FOR CAP DIA 1.765
103	1	CAP88051	CAP AIR MANIFOLD
104	1	CAP110674	TUNNEL GASKET CLAMP FOR CAP 1.765 DIA
300	1	CAP110677	TUNNEL BOTTOM PLATE FOR CAP 1.765 DIA

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 DATE: 01/08/2016  
 CHECKED BY:

MATERIAL:



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 DECIMALS / DECIMAUX: .xxx ± .005  
 FRACTIONS / FRACTIONS: ± 1/64  
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MAT'L TREATMENT:



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MACHINE: SHEET: 1 OF 1

TITLE: CAP TRAP ASS'Y FOR CAP DIA 1.765 X 0.786 H

DWG NO: ASCAP110673 REV: 0



# Customer Assemblies

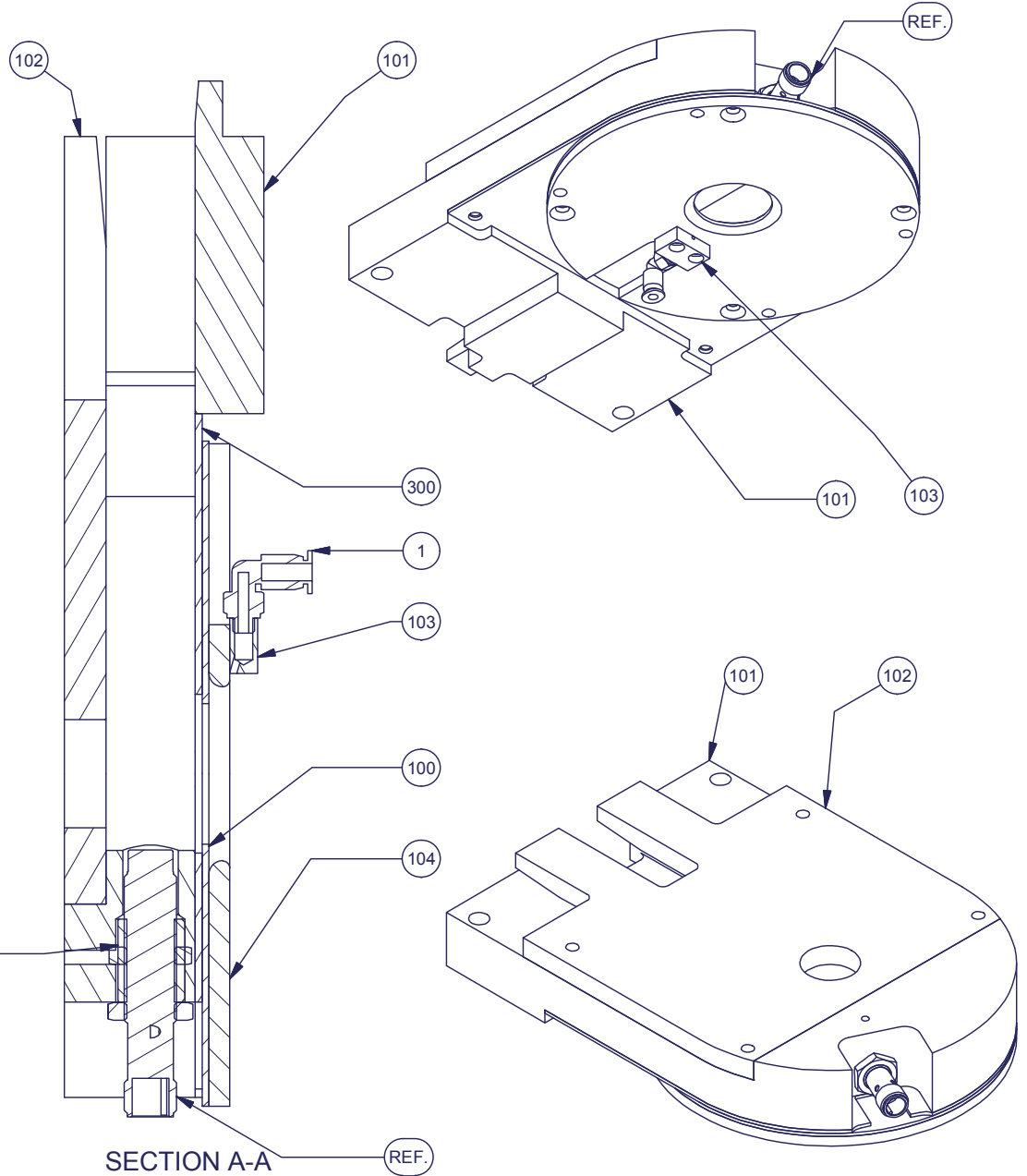
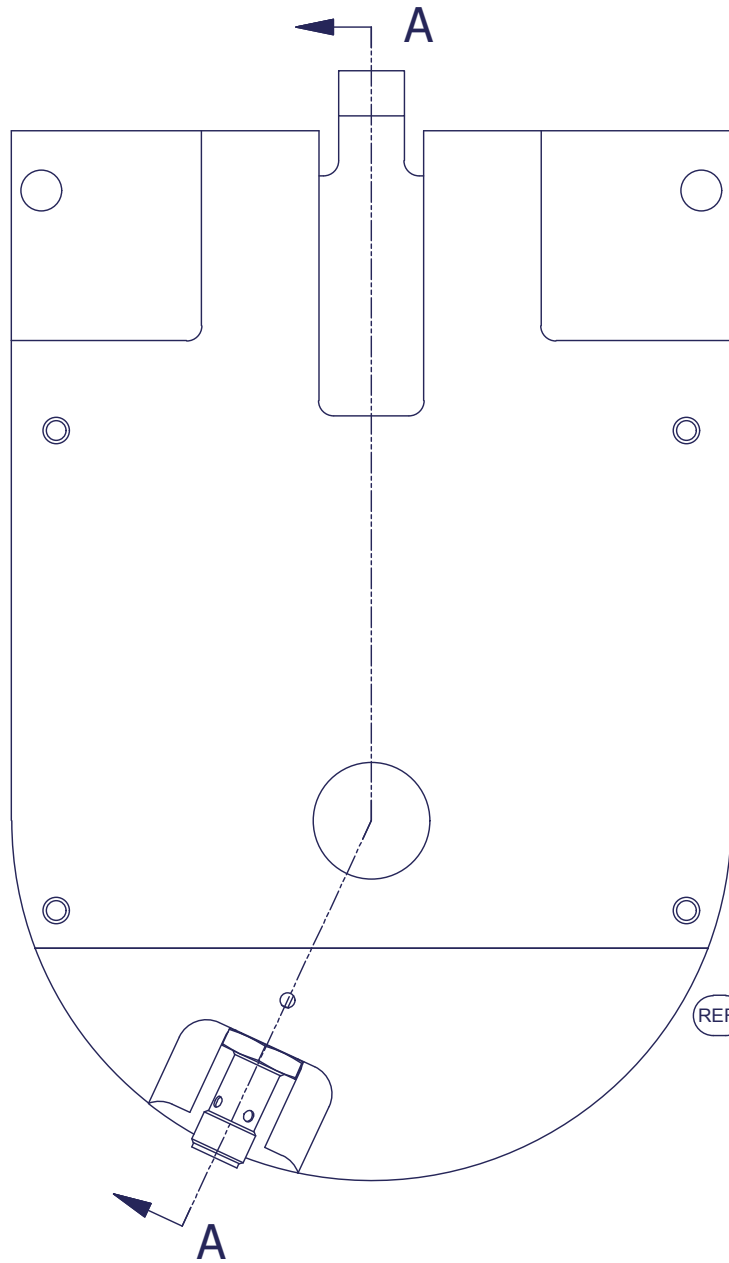
<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCAP110680</b>	<b>1</b>	<b>CAP TRAP ASS'Y FOR CAP DIA 1.329 X 0.775 H</b>

<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
1	1	EDT-75306	Elbow 5-4
100	3	CAP110683	TUNNEL GASKET FOR CAP 1.329 DIA
101	1	CAP110685	CAP TRAP BODY FOR CAP 1.329 DIA X .775 H
102	1	CAP110682	CAP TRAP COVER FOR CAP DIA 1.329
103	1	CAP88051	CAP AIR MANIFOLD
104	1	CAP110681	TUNNEL GASKET CLAMP FOR CAP 1.329 DIA
300	1	CAP110684	TUNNEL BOTTOM PLATE FOR CAP 1.329 DIA

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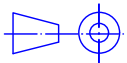


DRAWN BY: A. LALIBERTE  
 DATE: 01/08/2016  
 CHECKED BY:

MATERIAL:

MAT'L TREATMENT:

DECIMALS / DECIMAUX: .xx ± .01  
 DECIMALS / DECIMAUX: .xxx ± .005  
 FRACTIONS / FRACTIONS: ± 1/64  
 ANGULAR / ANGULAIRE: ± 0.5°  
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 CANADA H9R 1A8 EMAIL: contactus@aesus.com

MACHINE:

TITLE: CAP TRAP ASS'Y FOR CAP DIA 1.329  
 X 0.775 H

DWG NO:

ASCAP110680

SHEET:  
 1 OF 1

REV:  
 0



# Customer Assemblies

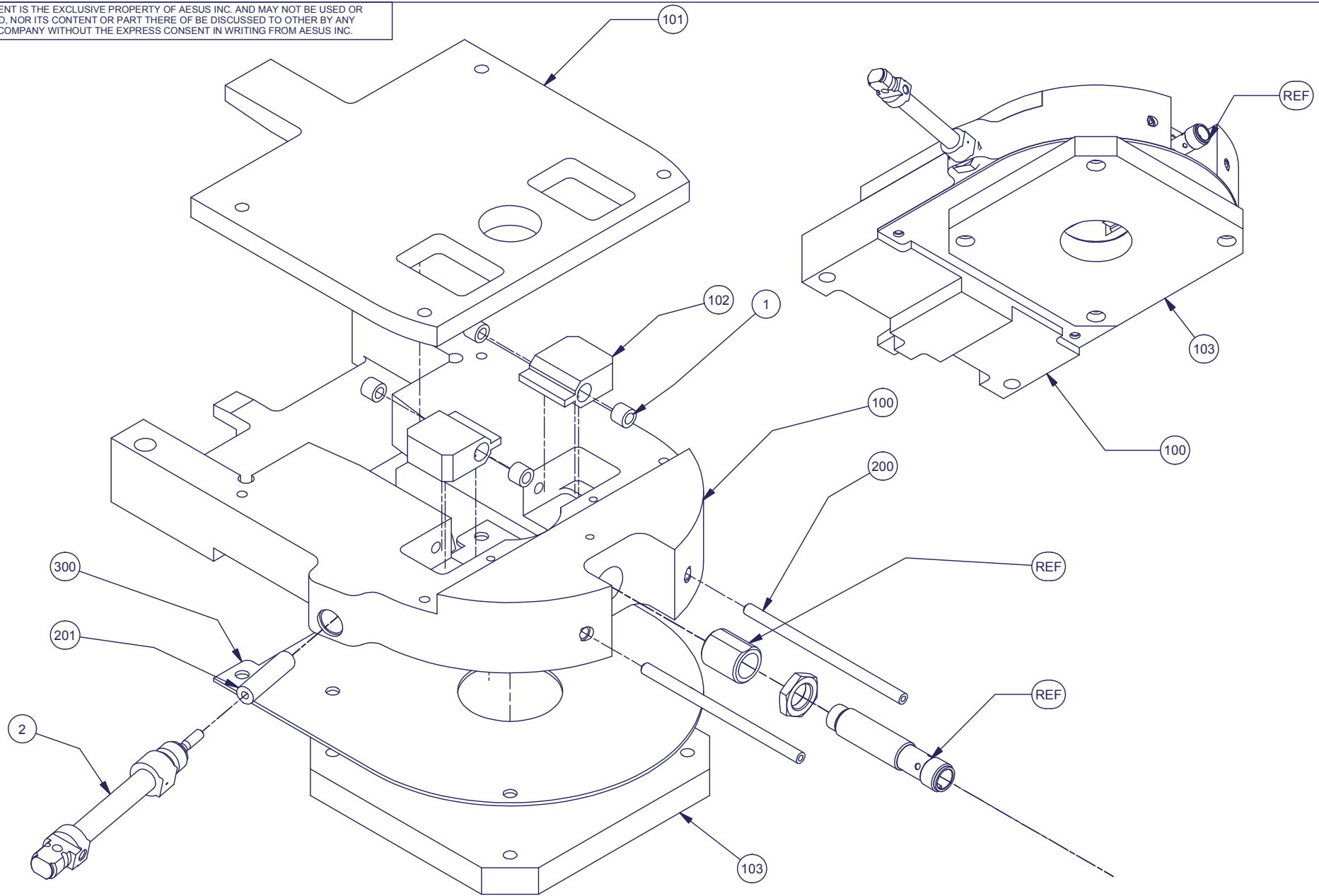
<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCAP110693</b>	<b>1</b>	<b>CAP TRAP ASS'Y FOR SPECIAL CAP</b>

<u>Item #</u>	<u>Qty</u>	<u>Part Number</u>	<u>Part Name</u>
1	4	28332	Igilde A200 3/16 I.D. x 5/16 O.D. x 1/4LG
2	1	CAP83506	CYLINDER SINGLE ACTING 8mm X 25mm
3	1	ELE1455	Prox, Capacitive, M12, 8mm, QuickC, PNP, IFM
100	1	CAP110698	CAP TRAP BODY FOR SPECIAL CAP
101	1	CAP110695	CAP TRAP COVER FOR CAP DIA 1.525
102	2	CAP110842	CAP FINGER
103	1	CAP114699	CAPTRAP EXTENSION
200	2	CAP110843	FINGER AXLE
201	1	CAP97813	PUSH PIN
300	1	CAP110697	TUNNEL BOTTOM PLATE FOR CAP 1.525 DIA.

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DRAWN BY: A. LALIBERTE	DATE: 01/08/2016	CHECKED BY:	MATERIAL:		MACHINE:	SHEET: 1 OF 1
DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .005 FRACTIONS / FRACTIONS: ± 1/64 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES			MAT'L TREATMENT:		TITLE: CAP TRAP ASS'Y FOR SPECIAL CAP	REV: 0
				188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8 EMAIL: contactus@aesus.com	DWG NO:	ASCAP110693

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 FAX: (514) 694-4107



## Customer Assemblies

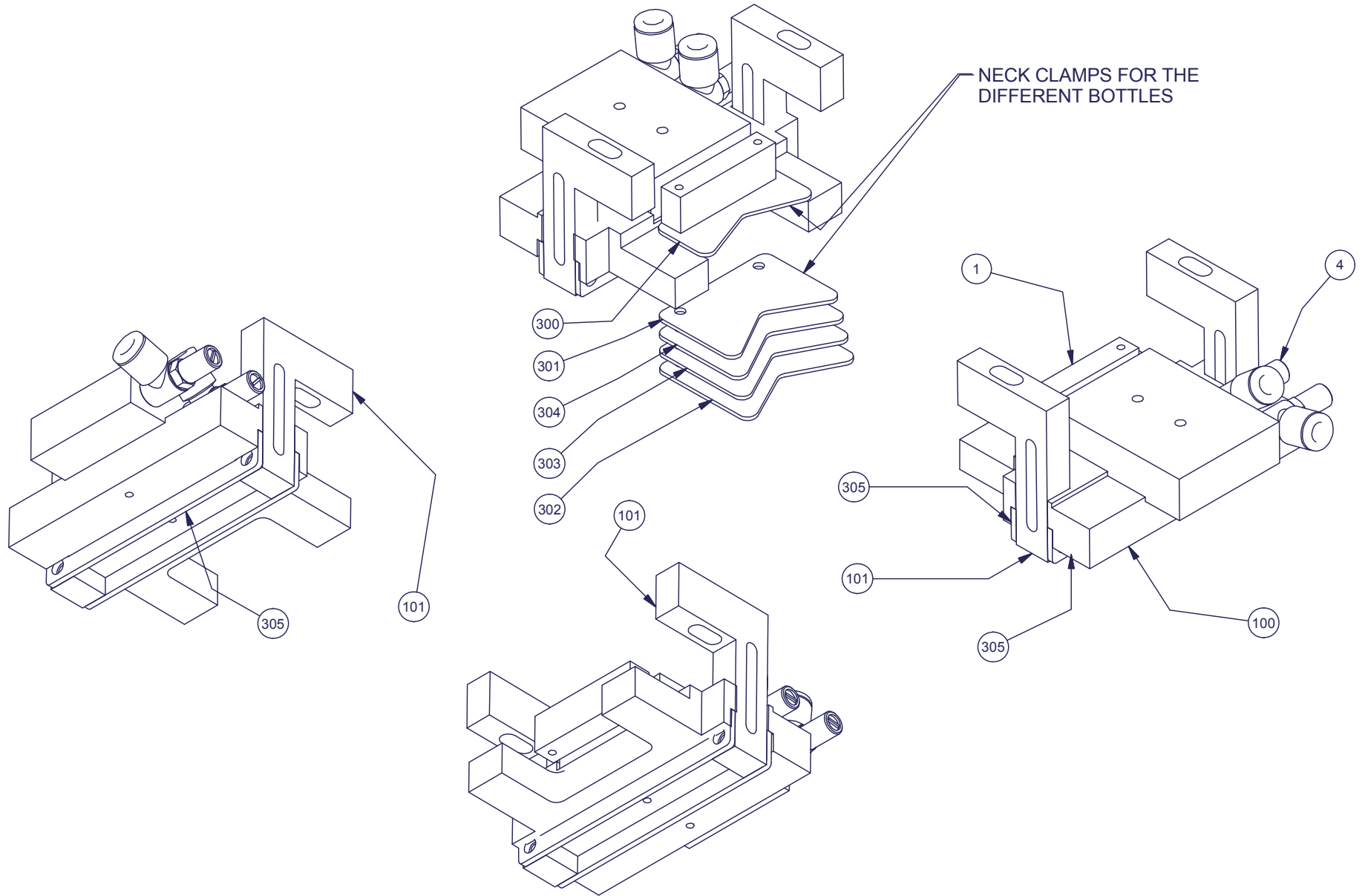
**P#**                      **Customer**                      **Order Description**  
**54967**                      **SAGER Foods Products Inc.**                      **Delta Cap 2 + Elevator**

### Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCAP110705</b>	<b>2</b>	<b>NECK CLAMP FOR CAPPER</b>

<u>Item #</u>	<u>Qty</u>	<u>Part Number</u>	<u>Part Name</u>
1	2	CAP61602	AIR CYLINDER
2	1	EDT-86003	Solenoid valve
3	1	EDT-86005	SOLENOID CABLE for EDT-86003
4	4	41098	Flow control M5 x 6MM (meter out)
5	4	FIL86567	RATCHET HANDLE M4 X 16mm LG
6	2	41106	Muffler 1/8 npt
7	2	EDT-75319	Fitting QSTL-1/8-6
8	1	EDT-75307	Elbow QSL-1/8-8
100	2	CAP110711AB	CYLINDER HOLDER
101	4	CAP110713	UP/DOWN BRACKET
300	2	CAP110706	NECK CLAMP FOR BOTTLE 1 & 2
301	2	CAP110707	NECK CLAMP FOR BOTTLE 8 & 3
302	2	CAP110708	NECK CLAMP FOR BOTTLE 4
303	2	CAP110709	NECK CLAMP FOR BOTTLE 7
304	2	CAP110710	NECK CLAMP FOR BOTTLE 5 & 9
305	4	CAP110714	STIFFNER



DRAWN BY: A. LALIBERTE	DATE: 02/08/2016	CHECKED BY:	MATERIAL:		MACHINE:	SHEET: 1 OF 1
DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .005 FRACTIONS / FRACTIONS: ± 1/64 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES			MAT'L TREATMENT:		TITLE: NECK CLAMP FOR CAPPER	
				188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8	TEL: (514) 694-3439 FAX: (514) 694-4107 EMAIL: <a href="mailto:contactus@aesus.com">contactus@aesus.com</a>	DWG NO: <b>ASCAP110705</b> REV: 0





# Customer Assemblies

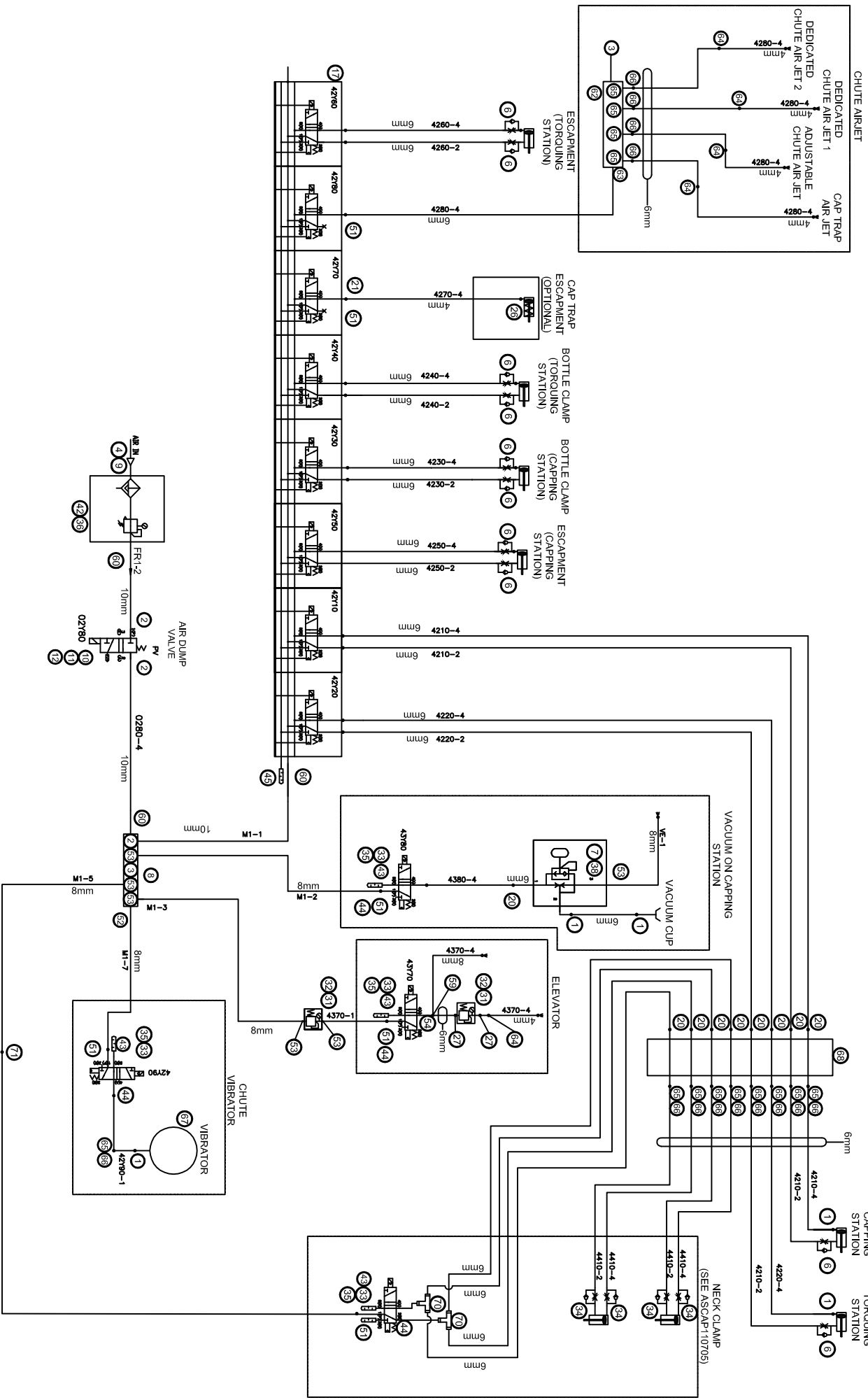
P# 54967 Customer SAGER Foods Products Inc. Order Description Delta Cap 2 + Elevator

## Assembly List

Assembly No.	Qty	Assembly Name
<b>ASCAP110742</b>	<b>1</b>	<b>P54967 SAGER PNEUMATIC ASSEMBLY</b>

Item #	Qty	Part Number	Part Name
1	5	41020	Elbow 1/8 to 6mm tube
2	3	LAB74438	STRAIGHT FITTING 1/4 10MM TUBE
3	2	41109	Brass plug hex countersunk 1/4NPT
4	1	41073	Quick coupler, 1/4" male
5	2	EDT-75206	Straight QSM-M5-6-I
6	10	41099	Flow control 1/8 Uni fit x 6mm (meter out)
7	1	CAP65169	SUCTION FILTER
8	1	CAP77920	MANIFOLDS
9	1	CAP66332	REDUCING NIPPLE
10	1	EDT-86001	Air Dump Solenoid
11	1	LAB60294	PREWIRED PLUG kmeb-1-24-2,5-led
12	1	BAIL72354	MUFFLER UC-1/4
17	1	CAP89790	VALVE TERMINAL 8 VALVES
20	10	CAP89797	PUSH-IN FITTING 6mm G1/8
21	1	CAP89798	PUSH-IN FITTING 4mm G1/8
26	1	EDT-75306	Elbow 5-4
27	2	EDT-75314	Fitting QSL - 1/4 - 6
31	2	EDT-76101	AIR REGULATOR
32	2	EDT-76104	Bracket support
33	4	EDT-86003	Solenoid valve
34	4	CAP69869	FLOW CONTROL m5 thread to 6mm od
35	4	ELE72846	SOLENOID CABLE
36	1	LAB60468	BRACKET
38	1	LAB80766	VACUUM GENERATOR
42	1	SLV83306	FILTER REGULATOR MIDI 3/8 PORT
43	7	EDT-75605	Muffler 1/8
44	9	EDT-75307	Elbow QSL-1/8-8
45	1	SLV66030	1/2" NPT MUFFLER
47	1	BAIL72352	PUSH-IN FITTING
51	7	SLV66029	BLANKING PLUG G1/8
52	1	LAB87903	ELBOW FITTING 3/8R X 8mm
53	6	EDT-75310	Elbow QSL-1/4-8
59	1	EDT-75101	FITTING QST-8-6
60	3	CAP66326	ELBOW 3/8R TO 10MM TUBE
62	1	FIL71083	4 PORT AIR MANIFOLD
63	1	LAB74450	STRAIGHT FITTING G1/4 6MM
64	5	CHT114590	6mm to 4mm STRAIGHT FITTING PUSH IN CONNECTOR
65	13	EDT-75630	Quik Connect 1/8 NPT / 1/4 tube
66	13	EDT-75631	Air Coupling Insert 1/4" / Quick connect
67	1	CAP114477	AIR POWERED VIBRATOR
68	1	CAP113627	MANIFOLD 8 OUTLETS 5091K72
70	2	EDT-75408	"Y" fitting 6mm
71	1	LAB83522	MANUAL SHUT OFF VALVE 8-8



DRAWN BY: A. LAUBERTE  
 DATE: 2016/08/04  
 CHECKED BY:

QTY / MACHINE:

MACHINE: P54967 SAGER PNEUMATIC ASSEMBLY  
 SHEET: 1 OF 1

**AESUS**  
 188 ONEIDA DRIVE  
 POINTE CLAIRE, QUEBEC  
 CANADA H9R 1A8 EMAIL: contactus@aesus.com  
 TEL: (514) 694-3439  
 FAX: (514) 694-4107

TITLE: P54967 SAGER PNEUMATIC ASSEMBLY  
 DWG NO: ASCAP110742  
 REV: 0



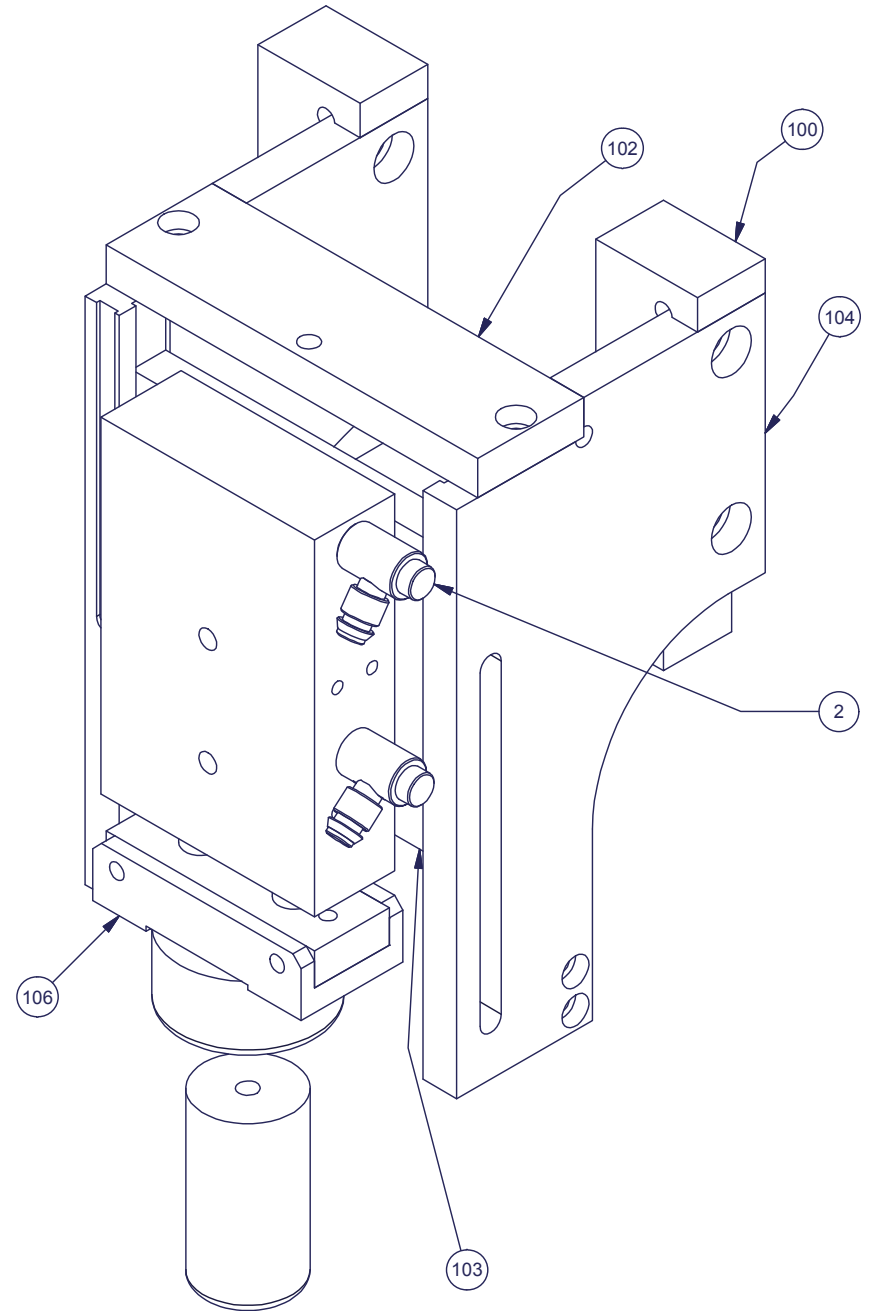
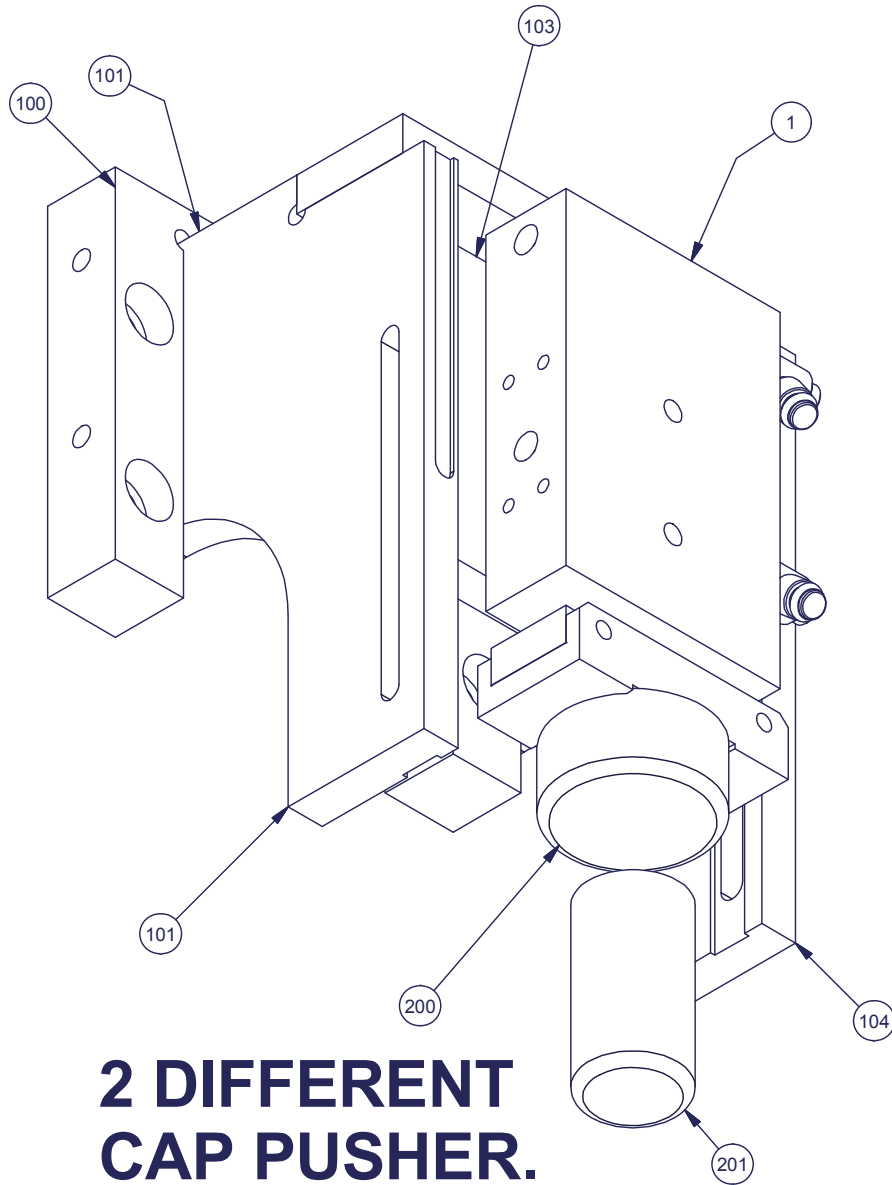
# Customer Assemblies

<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCAP110815</b>	<b>1</b>	<b>CAP PUSHER W/ HIEGHT ADJUSTMENT</b>

<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
1	1	FIL64622	Air Cylinder Dual Rod 50mm STK
2	2	41049	Flow control 1/8 Uni fit x 6mm (meter in)
100	2	CAP110816	TRANSFER BAR
101	1	CAP110817	LH UP/DOWN BRACKET
102	1	CAP110818	STIFFNER W/ STOPPER
103	1	CAP110819	LINK SUPPORT FOR CYLINDER
104	1	CAP110820	RH UP/DOWN BRACKET
105	1	CAP110821	CAP PUSHER BRACKET
106	1	CAP114261	CAP PUSHER HOLDER
200	1	CAP110739	CAP PUSHER
201	1	CAP110739AA	CAP PUSHER



## 2 DIFFERENT CAP PUSHER.

DRAWN BY:  
A Laliberte

DATE:  
08/08/2016

CHECKED BY:

MATERIAL:

MAT'L TREATMENT:

**AESUS**

188 ONEIDA DRIVE TEL: (514) 694-3439  
POINTE CLAIRE, QUEBEC FAX: (514) 694-4107  
CANADA H9R 1A8 EMAIL: [contactus@aesus.com](mailto:contactus@aesus.com)

MACHINE:

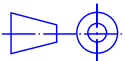
SHEET:  
1 OF 1

TITLE: CAP PUSHER W/ HEIGHT  
ADJUSTMENT

DWG NO:

ASCAP110815

REV:  
0



DECIMALS / DECIMAUX: .xx ± .01  
DECIMALS / DECIMAUX: .xxx ± .005  
FRACTIONS / FRACTIONS: ± 1/64  
ANGULAR / ANGULAIRE: ± 0.5°  
BREAK ALL SHARP EDGES /  
BRISER TOUTES LES ARRETES



# Customer Assemblies

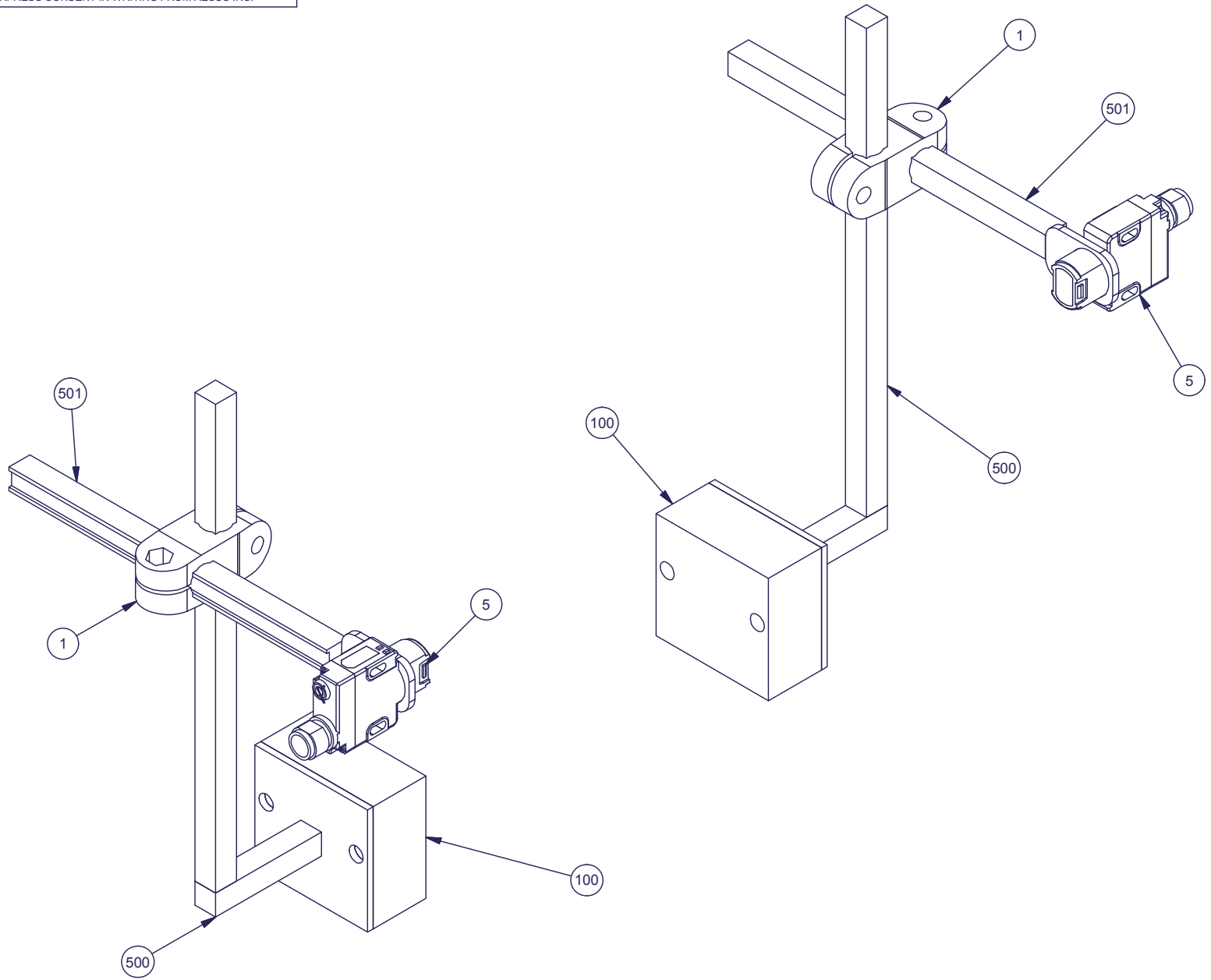
<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCAP112861</b>	<b>1</b>	<b>BACK-UP SENSOR FOR CAPPER</b>

<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
1	2	611638	Cross block 12mm
2	2	ELE107652	Thrubeam M12-4p 20m Distance, Keyence
3	2	ELE93319	M12-3P female cable straight, PVC, 5M, IFM
100	2	CAP103940	GUIDE RAIL SPACER
500	2	LAB111	Support long for fixed wiper
501	2	LAB847B	PHOTOCELL SUPPORT 6" LG.

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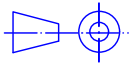
DRAWN BY: Guillaume M.G.    DATE: 05/01/2017    CHECKED BY:

MATERIAL:

MACHINE:

TITLE: BACK-UP SENSOR FOR CAPPER

SHEET: 1 OF 1



DECIMALS / DECIMAUX: .xx ± .01  
 DECIMALS / DECIMAUX: .xxx ± .005  
 FRACTIONS / FRACTIONS: ± 1/64  
 ANGULAR / ANGULAIRE: ± 0.5°  
 BREAK ALL SHARP EDGES /  
 BRISER TOUTES LES ARRETES

MAT'L TREATMENT:

**AESUS**  
 188 ONEIDA DRIVE    TEL: (514) 694-3439  
 POINTE CLAIRE, QUEBEC    FAX: (514) 694-4107  
 CANADA H9R 1A8    EMAIL: contactus@aesus.com

DWG NO: ASCAP112861    REV: 0



# Customer Assemblies

**P#**                      **Customer**                      **Order Description**  
**54967**                      **SAGER Foods Products Inc.**                      **Delta Cap 2 + Elevator**

## Assembly List

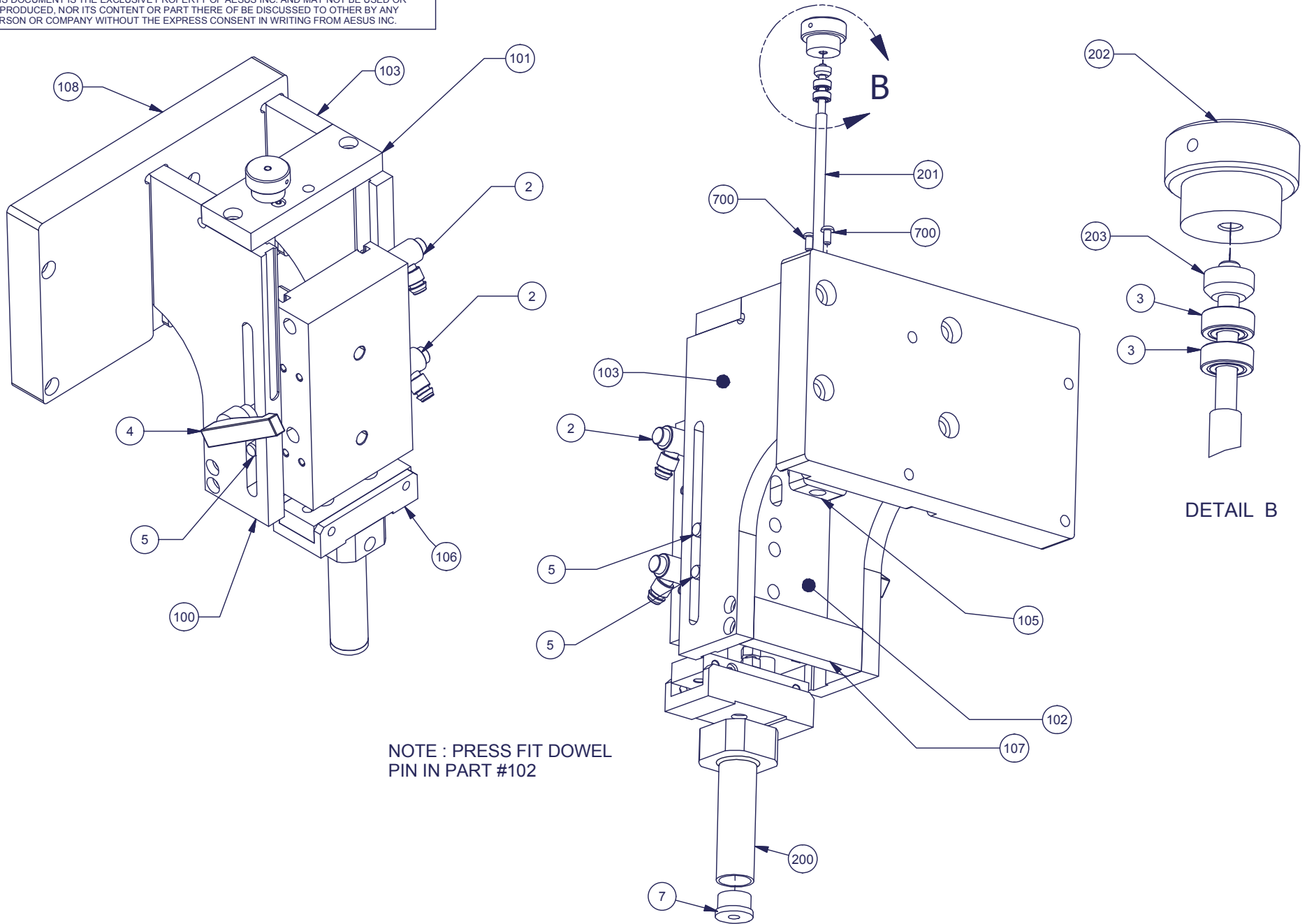
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<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCAP114255</b>	<b>1</b>	<b>CAP PUSHER W/ HEIGHT ADJUSTMENT</b>


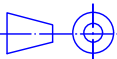
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<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
1	1	CAP114848	DUAL ROD CYLINDER 25mm BORE 60mm STROKE
2	2	41049	Flow control 1/8 Uni fit x 6mm (meter in)
3	2	CAP109927	SST ROLLER BEARING 4mm ID 10mm OD
4	1	93130	Handle M8 x 30mm BLUE BUTTON
5	3	CAP114262	DOWEL 8mm DIA 24mm LG. SS 316
7	1	26129	Push through insert flat #0
100	1	CAP110817AA	LH UP/DOWN BRACKET
101	1	CAP110818AA	STIFFNER W/ STOPPER
102	1	CAP110819AA	LINK SUPPORT FOR CYLINDER
103	1	CAP110820AA	RH UP/DOWN BRACKET
105	1	CAP114260	CREW ADJUSTMENT BLOCK
106	2	CAP114261	CAP PUSHER HOLDER
107	1	CAP114299	BOTTOM CAP PLUNGER LINK BAR
108	1	CAP114531	CAP PLUNGER REAR HOLDING PLATE
200	1	CAP114788	VACUUM HOLDER AND PUSHER
201	1	CAP109922	LIFT SCREW
202	1	CAP109937	LIFT KNOB
203	1	CAP109934	BEARING SPACER
700	2	BOU6001	Button socket cap screw ISO 7380

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NOTE : PRESS FIT DOWEL PIN IN PART #102

DRAWN BY: MAXIME C.	DATE: 10/03/2017	CHECKED BY:	MATERIAL:	 188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8 TEL: (514) 694-3439 FAX: (514) 694-4107 EMAIL: <a href="mailto:contactus@aesus.com">contactus@aesus.com</a>	MACHINE:	SHEET: 1 OF 1
 DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .005 FRACTIONS / FRACTIONS: ± 1/64 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES			MAT'L TREATMENT:		TITLE: CAP PUSHER W/ HEIGHT ADJUSTMENT DWG NO: ASCAP114255	REV: 0





# Customer Assemblies

P# 54967 Customer SAGER Foods Products Inc. Order Description Delta Cap 2 + Elevator

## Assembly List

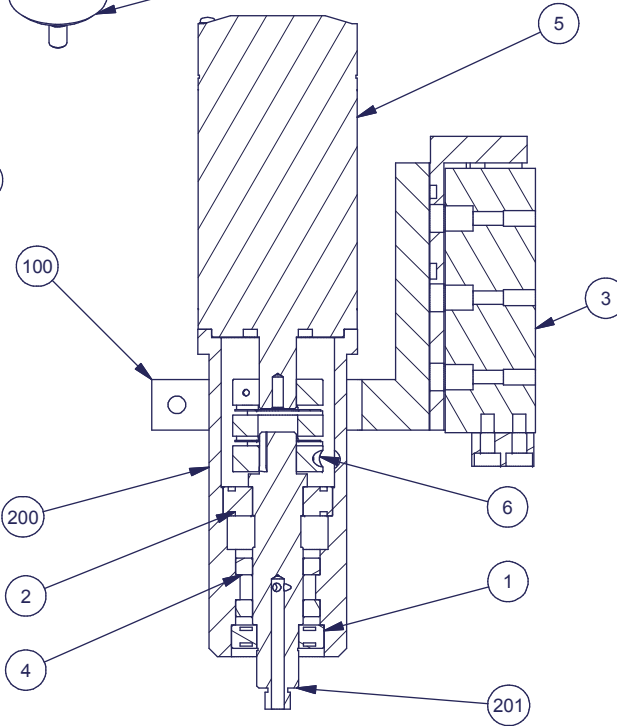
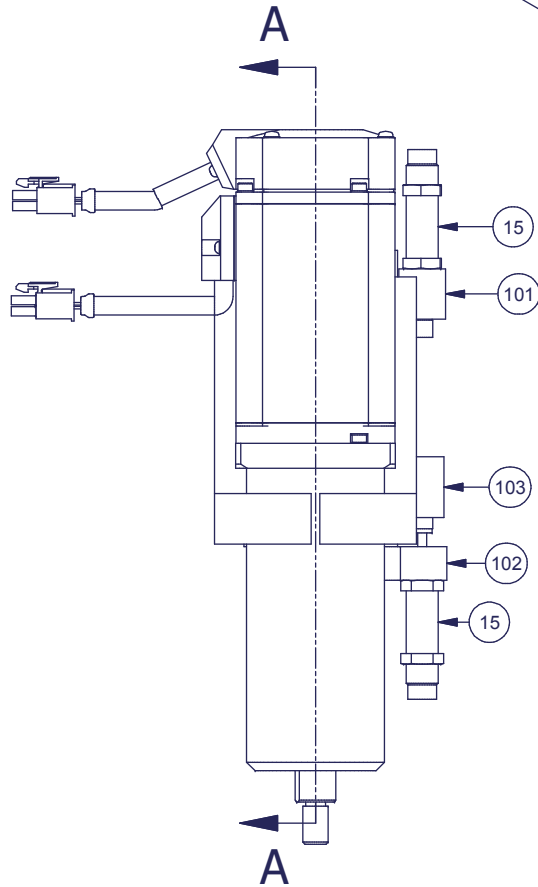
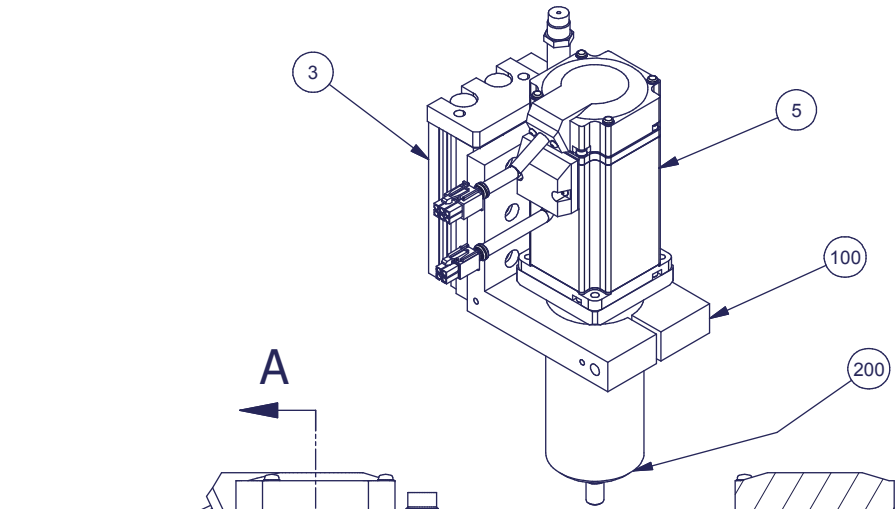
Assembly No.	Qty	Assembly Name
<b>ASCAP99657</b>	<b>1</b>	<b>CAPPING STATION</b>

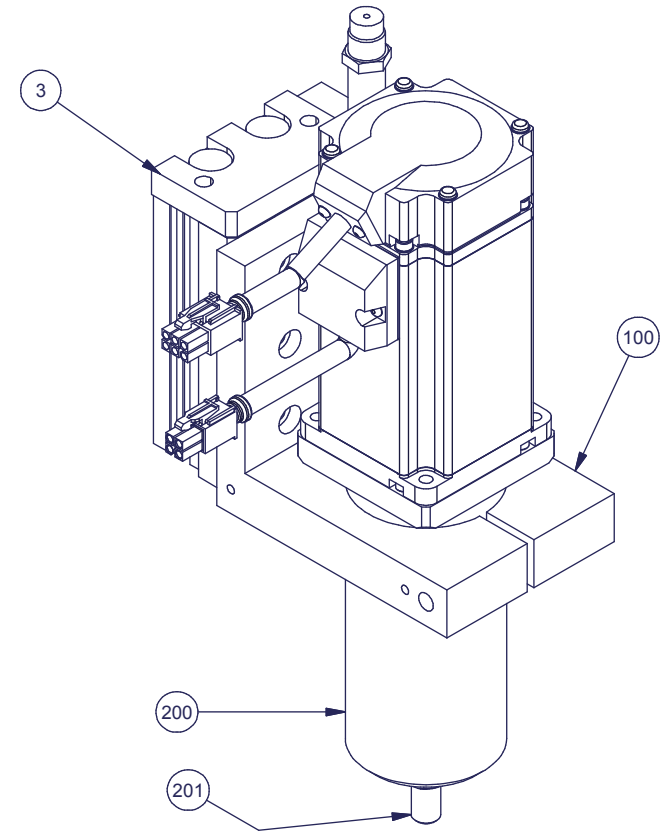
<u>Item #</u>	<u>Qty</u>	<u>Part Number</u>	<u>Part Name</u>
1	1	21003	Roller bearing SHIELDED
2	1	21004	Roller Bearing
3	1	CAP70721	PRECISION SLIDE TABLE
4	2	CAP40695	Oil seal 3/4" ID X 1 1/4" OD X 3/8"THK
5	1	ELE84549	Servo Motor High Inertia A5 208V 400W Panasonic
6	1	CAP96406	SERVO COUPLING 14mm X 14mm WITH KW
7	1	ELE83076	Encoder Cable, 5m, A4 Servo Series, Panasonic
8	4	ELE69473	Bulgin -Male 4 pin screw connector (Buccaneer)
9	4	ELE69474	Bulgin -female 4 pin screw connector (Buccaneer)
10	4	ELE69475	Bulgin -Male 6 pin screw connector (Buccaneer)
11	4	ELE69476	Bulgin -Female 6 pin screw connector (Buccaneer)
12	1	ELE91397	Cablek, I/O Cable, Panasonic A4, 25 wire, 50 pin
13	1	ELE84534	Servo Drive, A5 Series, 208V, 400W, Panasonic
14	2	ELE87151	Reed SWITCH, M8 3Pin, PNP, 24Vdc, SMC
15	2	CAP99661	SHOCK ABSORBER M12
16	1	97209	Sensor cable, M8, 3p, Straight, 5m
100	1	CAP96546	CYLINDER BRACKET
101	1	CAP99660	SHOCK ABSORBER BRACKET 1
102	1	CAP99659	SHOCK ABSORBER BRACKET 2
103	1	CAP99662	BUMPER BLOCK
200	1	CAP96404	BEARING HOUSING
201	1	CAP96405	CAPPING SHAFT

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Parts List			
ITEM	QTY	PART NUMBER	TITLE
1	1	21003	ROLLER BEARING 5/8" ID x 1 3/8" OD x 11/32" THK
2	1	21004	ROLLER BEARING 3/4" x 1-5/8" od
3	1	CAP70721	PRECISION SLIDE TABLE WITH SOCK ABSORBERS
4	2	CAP40695	OIL SEAL 3/4" ID x 1 1/4" OD x 1/4" THK
5	1	ELE84549	
6	1	CAP96406	SCPW34-14-14
15	2	CAP99661	MAKC1210L
100	1	CAP96546	CYLINDER BRACKET
101	1	CAP99660	SHOCK ABSORBER BRACKET 1
102	1	CAP99659	SHOCK ABSORBER BRACKET 2
103	1	CAP99662	BUMPER BLOCK
200	1	CAP96404	BEARING HOUSING
201	1	CAP96405	CAPPING SHAFT



SECTION A-A



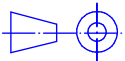
DRAWN BY: M.A.LEONARD  
 DATE: 05/01/2015  
 CHECKED BY:

MATERIAL:  
 QTY / MACHINE:

**AESUS**

188 ONEIDA DRIVE TEL: (514) 694-3439  
 POINTE CLAIRE, QUEBEC FAX: (514) 694-4107  
 CANADA H9R 1A8 EMAIL: contactus@aesus.com

MACHINE: ECOCAP  
 SHEET: 1 OF 1



DECIMALS / DECIMAUX: .xx ± .01  
 DECIMALS / DECIMAUX: .xxx ± .002  
 FRACTIONS / FRACTIONS: ± 1/32  
 ANGULAR / ANGULAIRE: ± 0.5°  
 BREAK ALL SHARP EDGES /  
 BRISER TOUTES LES ARRETES

MAT'L TREATMENT: MAT'L #:

TITLE: CAPPING STATION

DWG NO: ASCAP99657  
 REV: 0



# Customer Assemblies

**P#**                      **Customer**                      **Order Description**  
**54967**                      **SAGER Foods Products Inc.**                      **Delta Cap 2 + Elevator**

## Assembly List

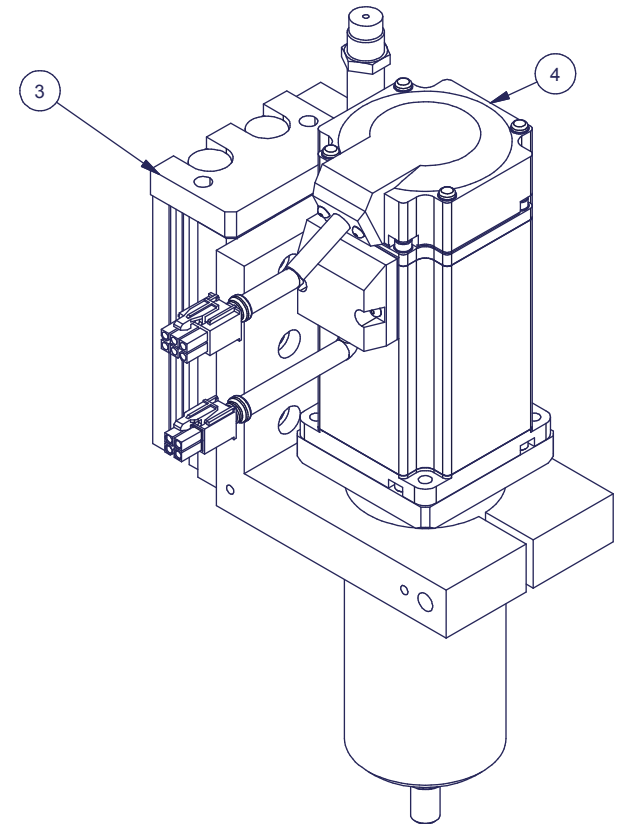
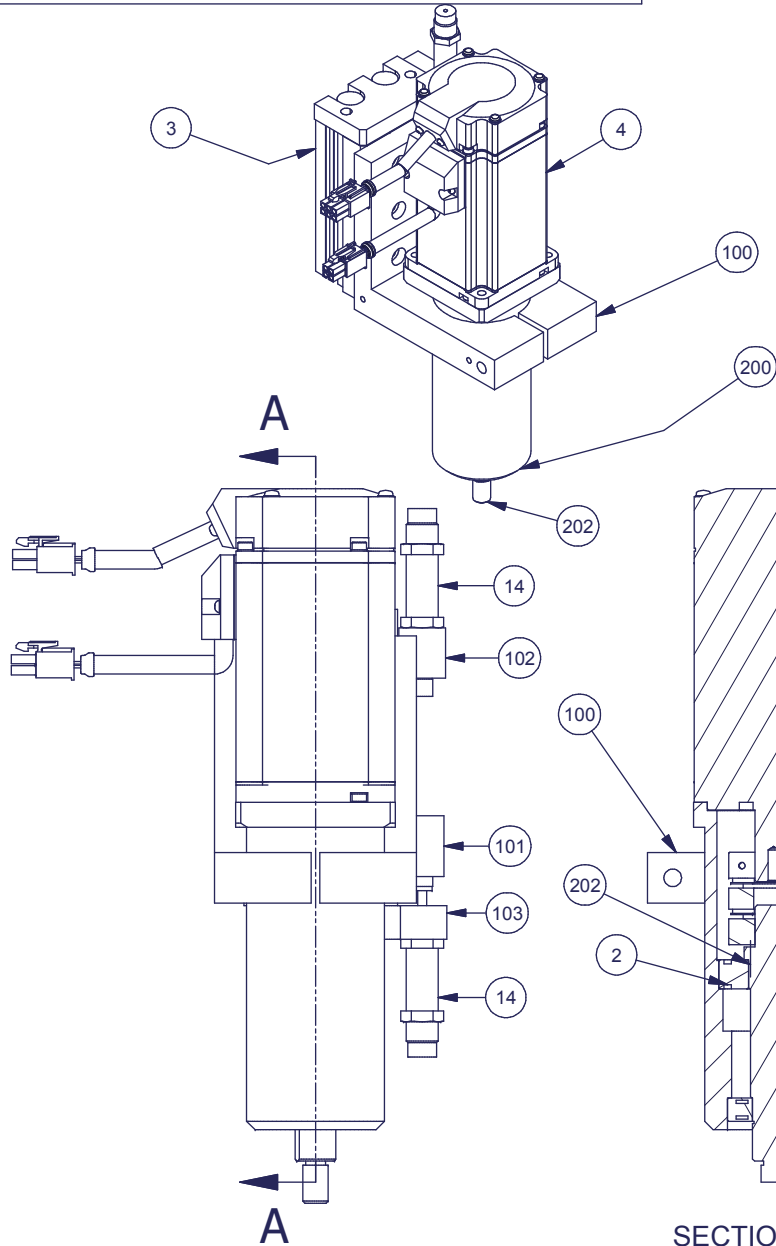
<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCAP99658</b>	<b>1</b>	<b>TORQUING STATION</b>

<u>Item #</u>	<u>Qty</u>	<u>Part Number</u>	<u>Part Name</u>
1	1	21003	Roller bearing SHIELDED
2	1	21004	Roller Bearing
3	1	CAP70721	PRECISION SLIDE TABLE
4	1	ELE84549	Servo Motor High Inertia A5 208V 400W Panasonic
5	1	CAP96406	SERVO COUPLING 14mm X 14mm WITH KW
6	1	ELE83076	Encoder Cable, 5m, A4 Servo Series, Panasonic
7	4	ELE69473	Bulgin -Male 4 pin screw connector (Buccaneer)
8	4	ELE69474	Bulgin -female 4 pin screw connector (Buccaneer)
9	4	ELE69475	Bulgin -Male 6 pin screw connector (Buccaneer)
10	4	ELE69476	Bulgin -Female 6 pin screw connector (Buccaneer)
11	1	ELE91397	Cablek, I/O Cable, Panasonic A4, 25 wire, 50 pin
12	1	ELE84554	Servo Drive, Full A5 Series, 208V, 400W, Panasonic
13	2	ELE87151	Reed SWITCH, M8 3Pin, PNP, 24Vdc, SMC
14	2	CAP99661	SHOCK ABSORBER M12
15	1	97209	Sensor cable, M8, 3p, Straight, 5m
100	1	CAP96546	CYLINDER BRACKET
101	1	CAP99662	BUMPER BLOCK
102	1	CAP99660	SHOCK ABSORBER BRACKET 1
103	1	CAP99659	SHOCK ABSORBER BRACKET 2
200	1	CAP96518	BEARING HOUSE
202	1	CAP96519	CAPPING SHAFT

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Parts List			
ITEM	QTY	PART NUMBER	TITLE
1	1	21003	ROLLER BEARING 5/8" ID x 1 3/8" OD x 11/32" THK
2	1	21004	ROLLER BEARING 3/4" x 1-5/8" od
3	1	CAP70721	PRECISION SLIDE TABLE WITH SOCK ABSORBERS
4	1	ELE84549	Servo Motor High Inertia A5 208V 400W Panasonic
5	1	CAP96406	SCPW34-14-14
14	2	CAP99661	MAKC1210L
100	1	CAP96546	CYLINDER BRACKET
101	1	CAP99662	BUMPER BLOCK
102	1	CAP99660	SHOCK ABSORBER BRACKET 1
103	1	CAP99659	SHOCK ABSORBER BRACKET 2
200	1	CAP96518	BEARING HOUSING
202	1	CAP96519	CAPPING SHAFT



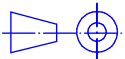
DRAWN BY: M.A.LEONARD  
 DATE: 06/01/2015  
 CHECKED BY:

MATERIAL:  
 QTY / MACHINE:

**AESUS**

188 ONEIDA DRIVE TEL: (514) 694-3439  
 POINTE CLAIRE, QUEBEC FAX: (514) 694-4107  
 CANADA H9R 1A8 EMAIL: contactus@aesus.com

MACHINE: ECOCAP  
 SHEET: 1 OF 1



DECIMALS / DECIMAUX: .xx ± .01  
 DECIMALS / DECIMAUX: .xxx ± .002  
 FRACTIONS / FRACTIONS: ± 1/32  
 ANGULAR / ANGULAIRE: ± 0.5°  
 BREAK ALL SHARP EDGES /  
 BRISER TOUTES LES ARRETES

MAT'L TREATMENT: MAT'L #:

TITLE: TORQUING STATION

DWG NO: ASCAP99658  
 REV: 0



# Customer Assemblies

P# **54967** Customer **SAGER Foods Products Inc.** Order Description **Delta Cap 2 + Elevator**

## Assembly List

Assembly No.	Qty	Assembly Name
<b>ASCHT110361</b>	<b>1</b>	<b>VERTICAL CAP CHUTE PRE-CHUCK</b>

<u>Item #</u>	<u>Qty</u>	<u>Part Number</u>	<u>Part Name</u>
1	1	612822	Siko dial counter
2	2	ELE615	Reflector 2" X 3/4" Carlo Gavazzi
3	2	27049	Tee Thumbscrew knob M5 ( 100/box )
4	1	611638	Cross block 12mm
5	1	29075	Graduated Ruler 0-80
6	4	27048	THUMBSCREW KNOB M4
7	2	CHT107849	LOW PROFILE S.ST. SHOULDER SCREW 4mmX10mm
8	4	ELE80601	Reflective sensor PNP dark on Sick M12 24Vdc
9	8	22009	Flange oilite
10	2	CAP109925	MINIATURE LINEAR GUIDE 190mm LG. W/ 2 BLOCKS
11	4	CHT110378	Flanged Linear Bushings
12	1	CAP89449	GEAR BOX 60:1
13	10	23024	Stainless steel chain # 25 x 1 FEET
14	3	CAP40717	Chain Conn Link S/S no 25
15	3	LAB94844	BRONZE WASHER 1/4"X1/2"
16	4	ELE93318	M12-3P, female cable 90deg, PVC, 5M, IFM
100	3	CHT20013	Junction hub
101	1	ELV76469	UP TRANSFER GUIDE
102	1	CHT107871	SLIDING SIDE GUIDE
103	1	CHT107873	CHUTE FLOOR SUPPORT
104	1	CHT107874	CHUTE FLOOR LINK BAR
105	2	CHT107870	TRANSFER FINGER
106	1	CHT110362	SIDE GUIDE RIGHT
107	1	CHT110363	SIDE GUIDE LEFT
108	1	CHT110364	TOP GUIDE (FOR PUSH TRU.)
109	1	CHT110371	BACK PLATE FOR CHUTE
110	1	CHT110372	TRANSFER SLAT FOR CHUTE EXTENSION
111	1	CHT110373	EXTENSION BAR
112	1	CHT110376	TOP LEXAN
113	1	CHT110380	MAIN PLATE
114	1	CHT110381	STIFFENER 01
115	2	CHT110382	STIFFENER 02
116	1	CHT110383	STIFFENER 03
117	1	CHT114339	FAST TRAVEL NUT HOLDER
118	1	CHT110652	GEARBOX HOLDER
119	1	CHT114170	SLIDING ADJUSTMENT GAP FILLER
120	3	CHT113785	NUT RETAINER
121	1	CHT112823	SIKO SPACER
122	14	CHT113387	SPACER FOR CHUTE ADD-ON
123	3	CHT114379AA	ADJUSTABLE CHUTE SLIDE NUT FOR DEDICATED CHUTE
200	3	CHT20083	Shaft for guide
201	6	24005	Sprocket 25B10 (Mod)
202	1	CAP40440	Square rod 10mm for quick setup system
203	1	CAP40441	Rod for quick setup system



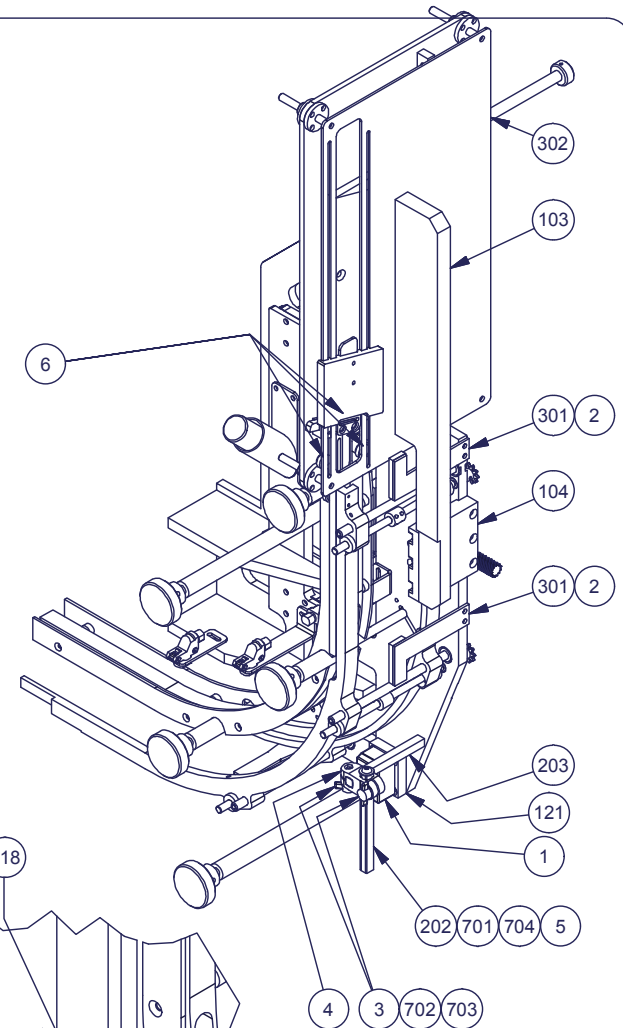
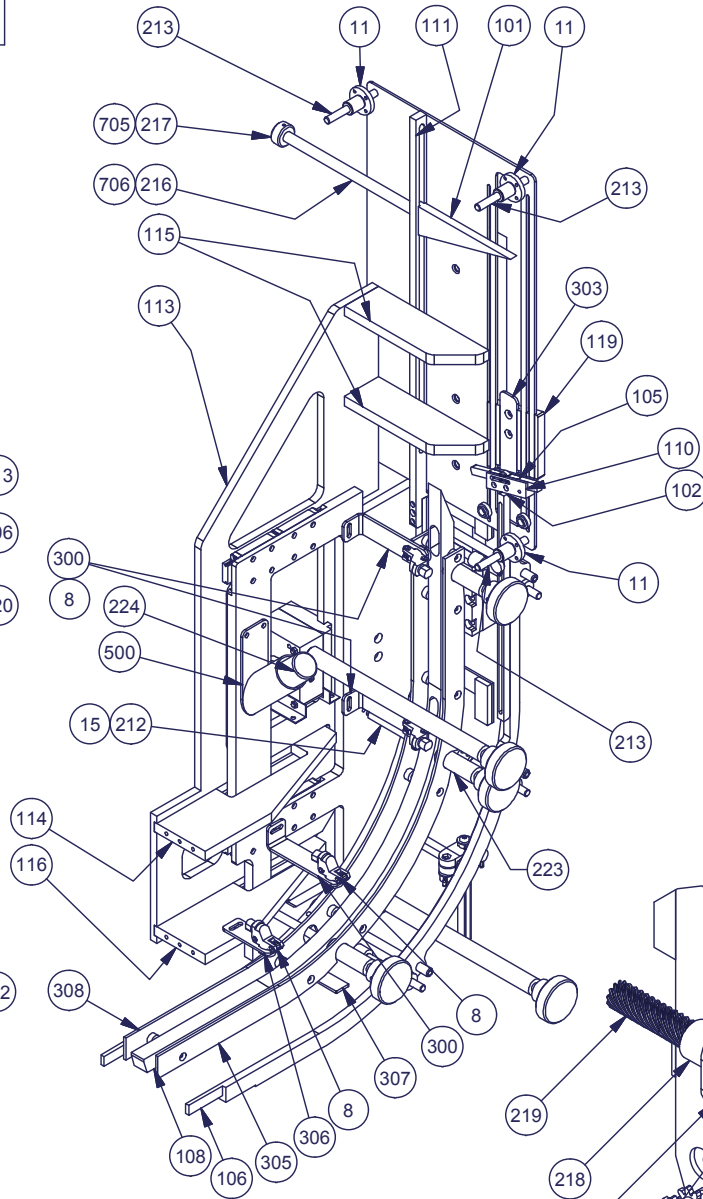
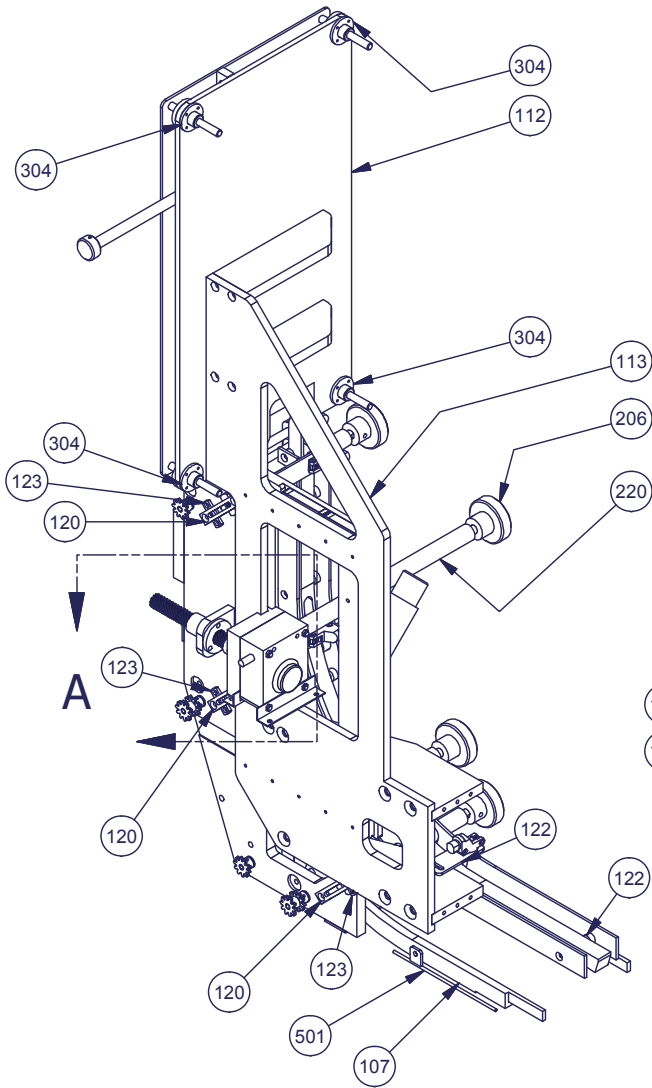
# Customer Assemblies

**P#** 54967      **Customer** SAGER Foods Products Inc.      **Order Description** Delta Cap 2 + Elevator

## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>	
<b>ASCHT110361</b>	<b>1</b>	<b>VERTICAL CAP CHUTE PRE-CHUCK</b>	
<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
204	1	CHT60246AA	ADJUST SHAFT FOR CHUTE DIAL
205	1	LAB79698	EXTENSION SHAFT
206	5	26104	Adj. Handle for tightening disk
207	3	CHT110365	NUT RIGHT 1 PCE LH
208	3	CHT110366	RIGHT ADJUSTMENT SCREW FOR CHUTE
209	2	CHT110367	LEFT LONG ADJUSTMENT SCREW FOR CHUTE
210	3	CHT110368	NUT RIGHT 1 PCE RH
211	1	CHT110369	LEFT ADJUSTMENT SCREW SHORT FOR CHUTE
212	3	CHT110370AA	ADJUSTMENT ROD
213	4	CHT110377	SLIDE SHAFT
214	3	CHT114379	ADJUSTABLE CHUTE SLIDE NUT
216	1	CHT110475	TRANSFER GUIDE ADJUSTMENT ROD
217	1	28073	ADJUSTMENT BUTTON
218	1	CHT114338	5/8-6, 12:1 SPEED RATIO NUT
219	1	CHT114337	5/8-6, 12:1 SPEED RATIO ADJUSTMENT SCREW
220	1	CHT110651	HANDLE EXTENSION SHAFT
221	1	CHT114340	FAST TRAVEL SCREW COUPLING
222	2	CHT110370	ADJUSTMENT ROD
223	3	CHT110651AA	HANDLE EXTENSION SHAFT
224	1	CHT114519	CHT CLAMP HAMMER TOOL
300	3	CHT20051	Photocell support DLCAP-4E
301	2	CHT20121	Reflector support
302	1	CHT110374	VERTICAL BACK PLATE
303	1	CHT114171	SLIDING PLATE
304	4	CHT110379	FISHPLATE
305	1	CHT113385	GUIDE FOR CHUTE
306	1	CHT114515	ADJUSTABLE CHUTE SENSOR BRACKET 1
307	1	CHT114516	ADJUSTABLE CHUTE SENSOR 2
308	1	CHT113388	GUIDE FOR CHUTE MIRROR
400	2	CHT113234	CHUTE ADD-ON FOR SMALL CAP
500	1	CHT114520	CHT CLAMP HAMMER TOOL HOLDER
501	1	CHT114522	ADJUSTABLE CHUTE AIRJET
700	4	BOU9022	Flat fiber washer 1/4 id x 3/8" od x 1/16 thick
701	3	BOU5000	Flat washer (.625 x .281 x .040)
702	2	BOU1029	Socket cap screw DIN 912 / M5 X 20
703	2	BOU4002	Finish hex nut DIN 934
704	1	BOU6021	Button socket cap screw M6 x 10 ISO 7380
705	1	BOU78730	M4 x 6mm setscrew (100 pcs)
706	1	BOU1140	M5 X 40 SS SET SCREWS

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DETAIL A

REMOVE ANGLE PLATES FROM GEARBOX (#12) AND SCREW IT ON IT'S HOLDER (#118) VIA THE 4X M5 TAPPED HOLES.

DRAWN BY: F.S  
DATE: 12/07/2016  
CHECKED BY:

MATERIAL:

MAT'L TREATMENT:

DECIMALS / DECIMAUX: .xx ± .01  
DECIMALS / DECIMAUX: .xxx ± .005  
FRACTIONS / FRACTIONS: ± 1/64  
ANGULAR / ANGULAIRE: ± 0.5°  
BREAK ALL SHARP EDGES /  
BRISER TOUTES LES ARRETES

**AESUS**

188 ONEIDA DRIVE TEL: (514) 694-3439  
POINTE CLAIRE, QUEBEC FAX: (514) 694-4107  
CANADA H9R 1A8 EMAIL: contactus@aesus.com

MACHINE:

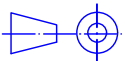
TITLE: VERTICAL CAP CHUTE PRE-CHUCK

DWG NO:

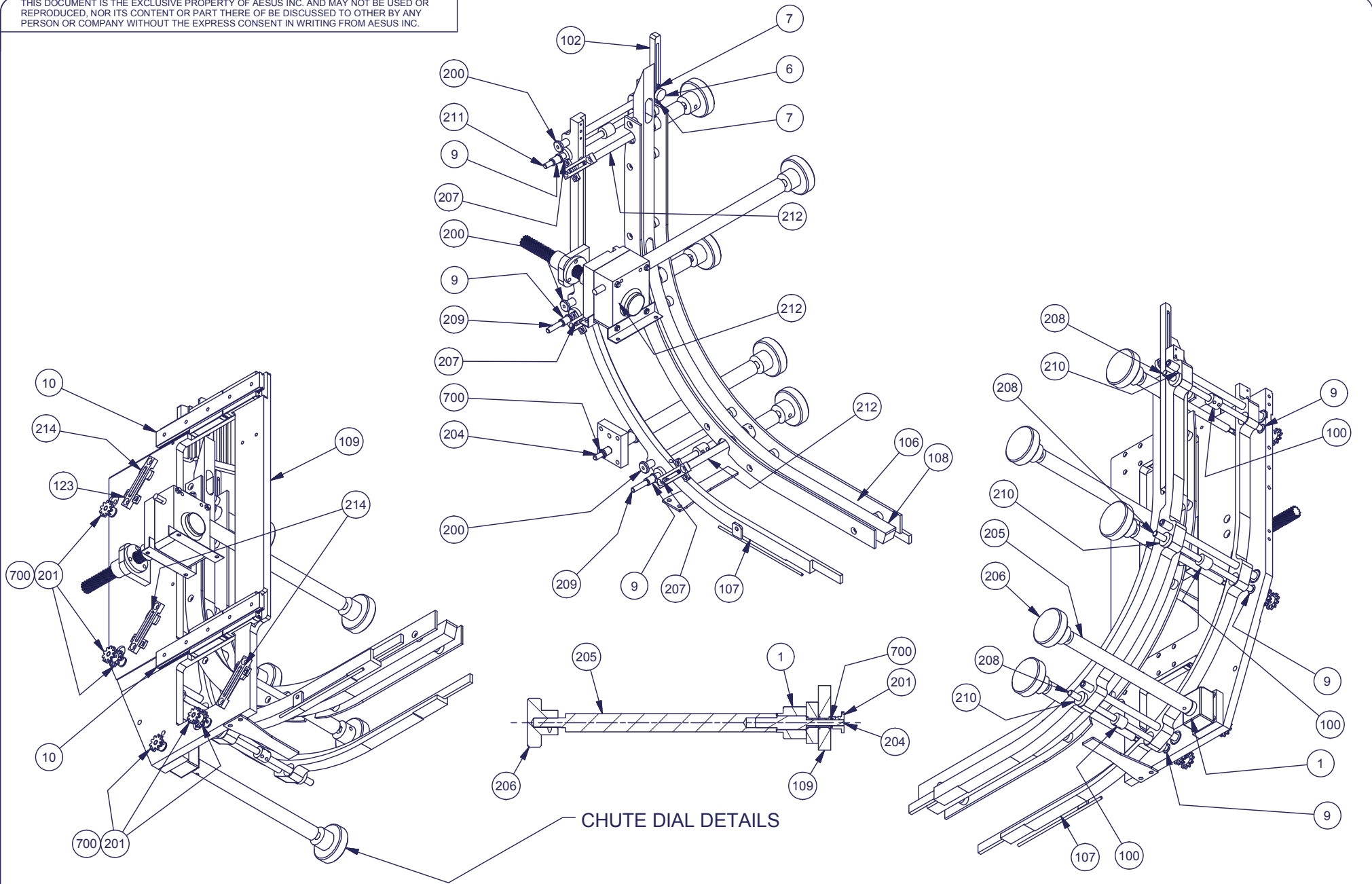
ASCHT110361

SHEET:  
1 OF 3

REV:  
0



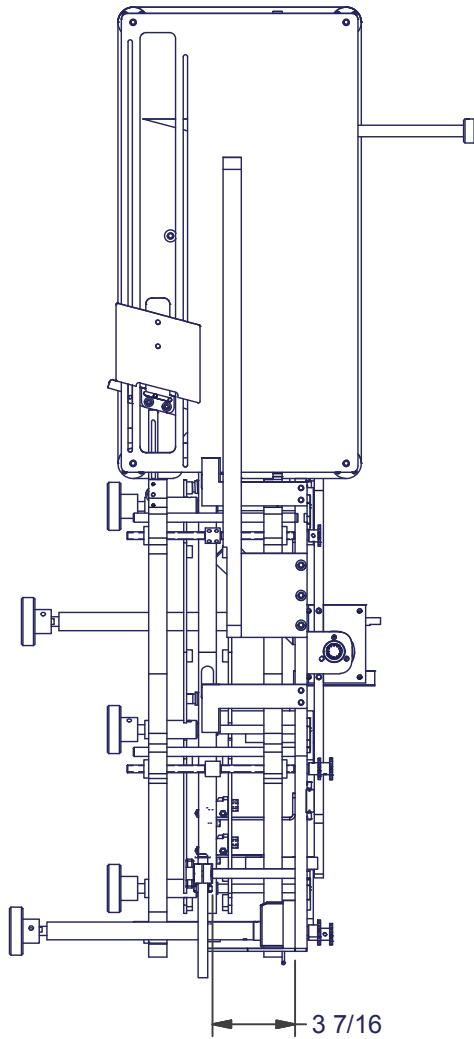
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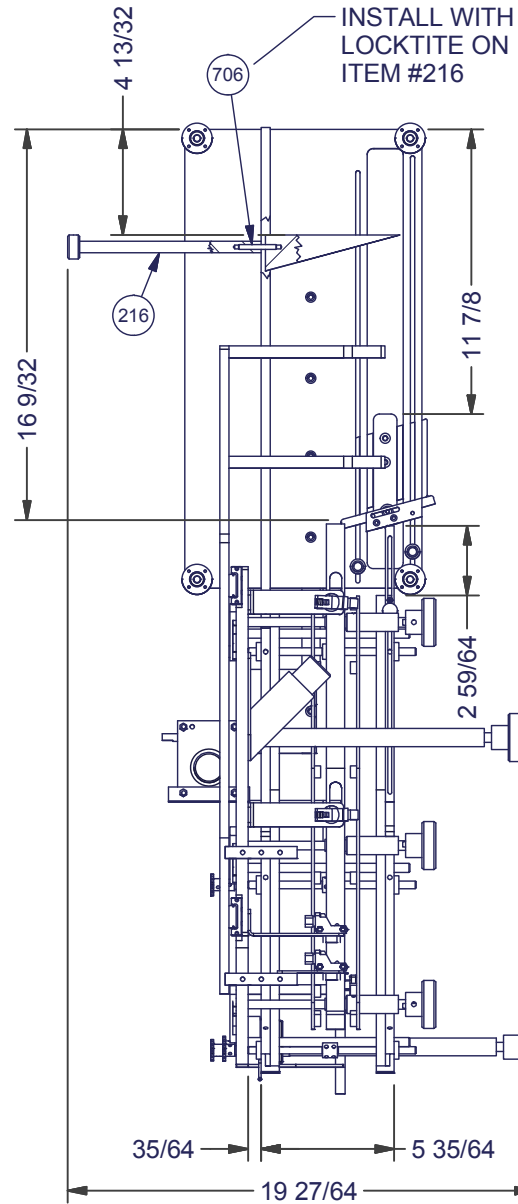
DRAWN BY: F.S	DATE: 12/07/2016	CHECKED BY:	MATERIAL:	MACHINE:	SHEET: 2 OF 3
			MAT'L TREATMENT:	TITLE: VERTICAL CAP CHUTE PRE-CHUCK	REV: 0
DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .005 FRACTIONS / FRACTIONS: ± 1/64 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES					DWG NO: ASCHT110361
188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8 EMAIL: contactus@aesus.com				TEL: (514) 694-3439 FAX: (514) 694-4107	



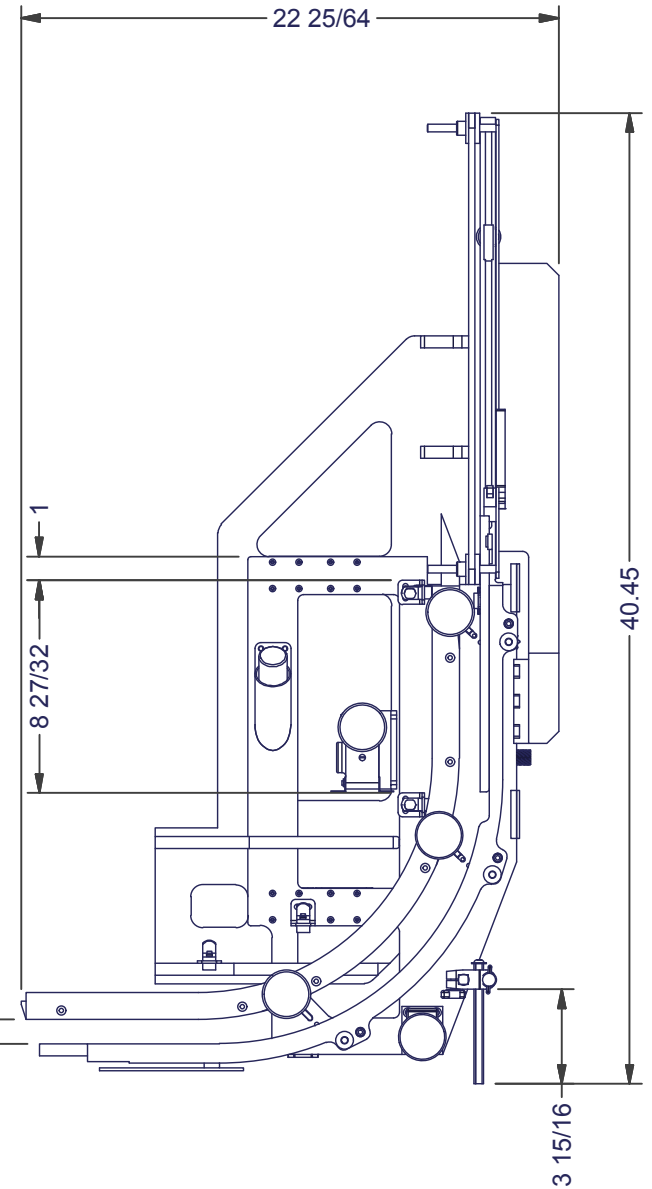
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BACK VIEW

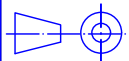


FRONT VIEW



DRAWN BY: F.S  
DATE: 12/07/2016  
CHECKED BY:

MATERIAL:



DECIMALS / DECIMAUX: .xx ± .01  
DECIMALS / DECIMAUX: .xxx ± .005  
FRACTIONS / FRACTIONS: ± 1/64  
ANGULAR / ANGULAIRE: ± 0.5°  
BREAK ALL SHARP EDGES /  
BRISER TOUTES LES ARRETES

MAT'L TREATMENT:

**AESUS**

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POINTE CLAIRE, QUEBEC FAX: (514) 694-4107  
CANADA H9R 1A8 EMAIL: contactus@aesus.com

MACHINE:

SHEET:  
3 OF 3

TITLE: VERTICAL CAP CHUTE PRE-CHUCK

DWG NO:

ASCHT110361

REV:  
0



# Customer Assemblies

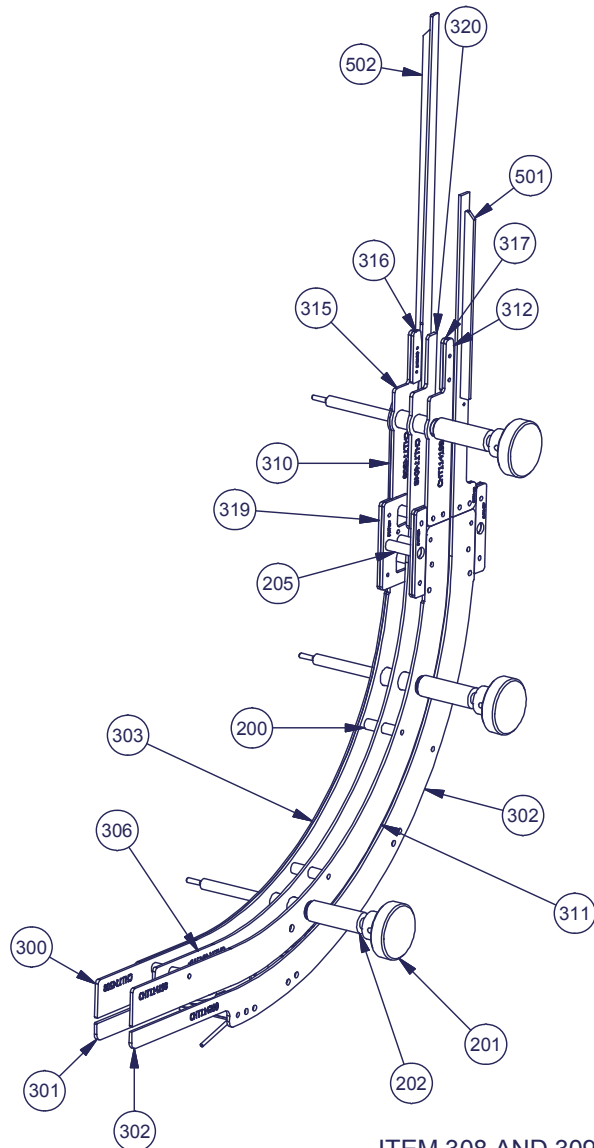
**P#** 54967      **Customer** SAGER Foods Products Inc.      **Order Description** Delta Cap 2 + Elevator

## Assembly List

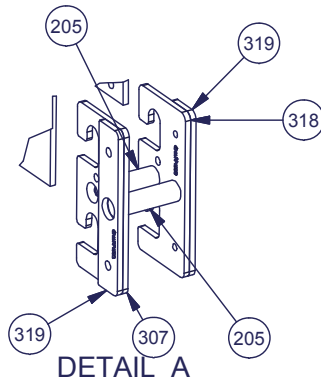
<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCHT113765</b>	<b>1</b>	<b>PUSH CAP DIA 1.531 X .795 CHUTE</b>

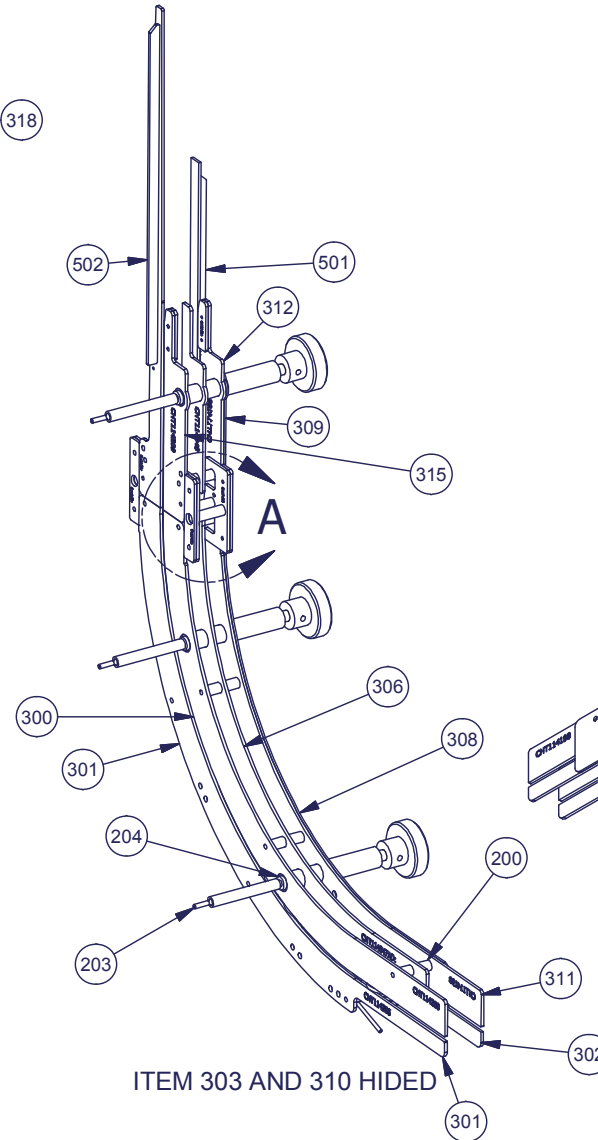
<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
200	10	CHT99751-AD	MIDDLE SPACER
201	3	26104	Adj. Handle for tightening disk
202	3	CHT110651AA	HANDLE EXTENSION SHAFT
203	3	CHT110370AB	ADJUSTMENT ROD
204	3	CHT113769	MOUNTING SHAFT BUSHING
205	4	CHT99751-AF	MIDDLE SPACER
300	1	CHT114208	TOP GUIDE BOTTOM 2
301	1	CHT114206	BOTTOM GUIDE BOTTOM 2
302	1	CHT114200	BOTTOM GUIDE BOTTOM 1
303	1	CHT114197	OUTSIDE GUIDE BOTTOM 1
306	1	CHT114047AD	TOP GUIDE
307	2	CHT114224	CHUTE CLAMP 1
308	1	CHT114194	OUTSIDE GUIDE BOTTOM 1
309	1	CHT114195	OUTSIDE GUIDE TOP 1
310	1	CHT114196	OUTSIDE GUIDE TOP 2
311	1	CHT114198	TOP GUIDE BOTTOM 1
312	1	CHT114199	TOP GUIDE TOP 1
313	1	CHT114201	TOP GUIDE BOTTOM 1
314	1	CHT114207	TOP GUIDE BOTTOM 2
315	1	CHT114209	TOP GUIDE TOP 2
316	1	CHT114213	TOP GUIDE 2
317	1	CHT114214	TOP GUIDE
318	1	CHT114225	CHT CLAMP 2
319	1	CHT114227	CHT CLAMP STOPPER 2
320	1	CHT114048	TOP GUIDE
500	2	CHT114523	DEDICATED CHUTE AIRJET 1
501	1	CHT115161	DEDICATED CHUTE CAP PICKUP SF
502	1	CHT115162	DEDICATED CHUTE CAP PICKUP SR



ITEM 308 AND 309 HIDDEN



DETAIL A



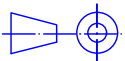
ITEM 303 AND 310 HIDDEN

DRAWN BY:  
M.A.LEONARD

DATE:  
13/02/2017

CHECKED BY:

MATERIAL:



DECIMALS / DECIMAUX: .xx ± .01  
 DECIMALS / DECIMAUX: .xxx ± .005  
 FRACTIONS / FRACTIONS: ± 1/64  
 ANGULAR / ANGULAIRE: ± 0.5°  
 BREAK ALL SHARP EDGES /  
 BRISER TOUTES LES ARRETES

MAT'L TREATMENT:

**AESUS**

188 ONEIDA DRIVE TEL: (514) 694-3439  
 POINTE CLAIRE, QUEBEC FAX: (514) 694-4107  
 CANADA H9R 1A8 EMAIL: contactus@aesus.com

MACHINE:

SHEET:  
1 OF 1

TITLE: PUSH CAP DIA 1.531 X .795 CHUTE

DWG NO:

ASCHT113765

REV:  
0



## Customer Assemblies

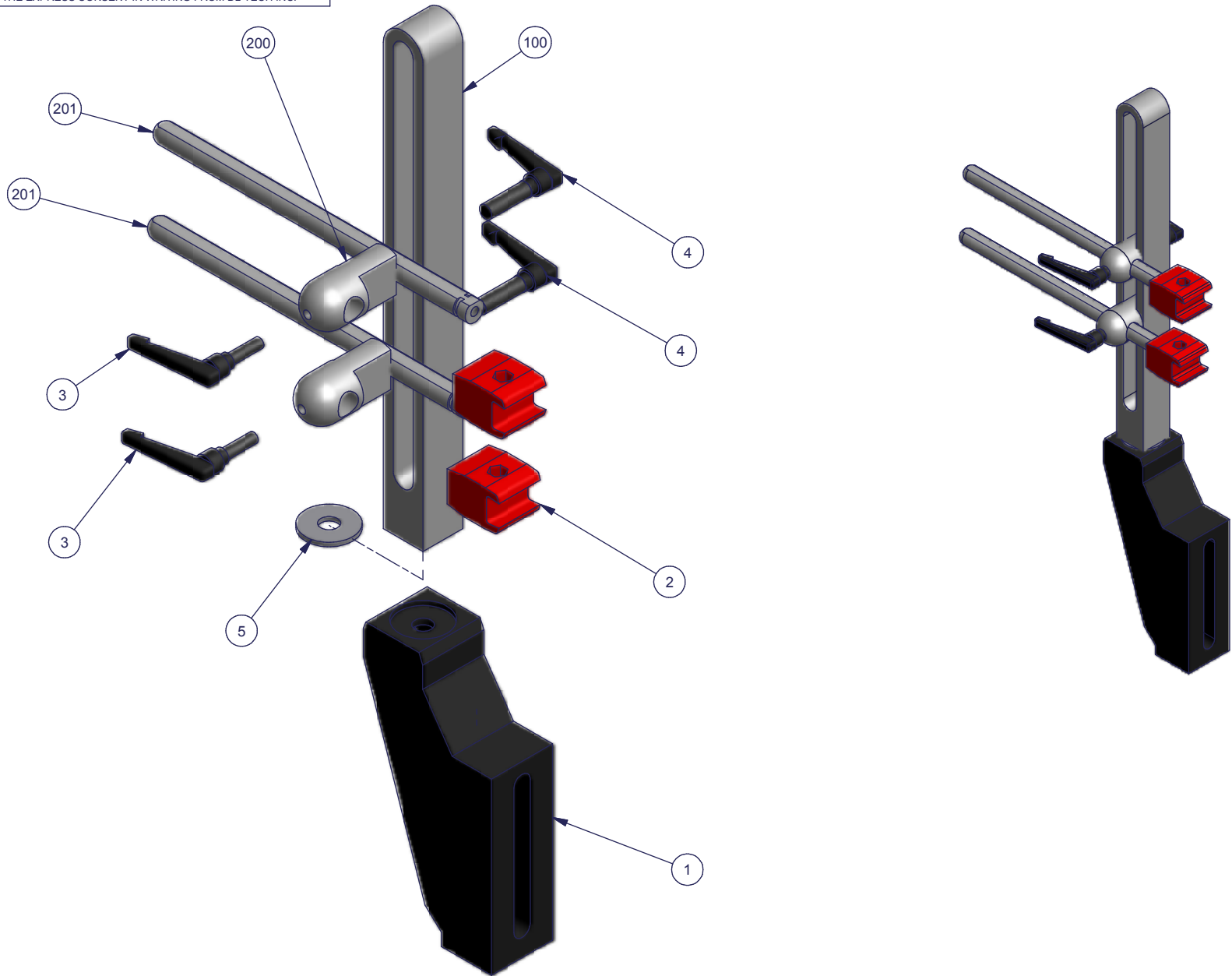
<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

### Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCON115203</b>	<b>6</b>	<b>DOUBLE INDEPENDENT GUIDERAIL WITH RULLER</b>

<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
1	1	27051	Guide support standard 1/2" ASSEMBLY
2	2	611639	Rod end plastic 12mm
3	2	EDT-20910	RATCHET HANDLE M6 X 20MM
4	2	EDT-20911	RATCHET HANDLE M8 X 25MM LG. BLUE BUTTON
5	1	27051D	WASHER M10ID X 30MM OD 2.5 TH
100	1	CON73470	9.25" SLOT BAR
200	2	EDT-40-30-015	ROD HOLDER
201	2	CON597	Shaft 12mm x 175mm long with scale

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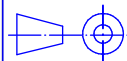


DRAWN BY: C.CHAMBERLAND  
 DATE: 25/04/2017  
 CHECKED BY:

MATERIAL:  
 QTY / MACHINE:

MAT'L TREATMENT:  
 MAT'L #:

DECIMALS / DECIMAUX: .xx ± .01  
 DECIMALS / DECIMAUX: .xxx ± .002  
 FRACTIONS / FRACTIONS: ± 1/32  
 ANGULAR / ANGULAIRE: ± 0.5°  
 BREAK ALL SHARP EDGES /  
 BRISER TOUTES LES ARRETES



**AESUS**  
 188 ONEIDA DRIVE TEL: (514) 694-3439  
 POINTE CLAIRE, QUEBEC FAX: (514) 694-4107  
 CANADA H9R 1A8 EMAIL: contactus@aesus.com

REV #	ECN #	DESCRIPTION	DATE	INIT
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MACHINE:  
 SHEET: 1 OF 1

TITLE: DOUBLE INDEPENDENT GUIDERAIL WITH ROLLER

DWG NO: ASCON115203  
 REV: 0



# Customer Assemblies

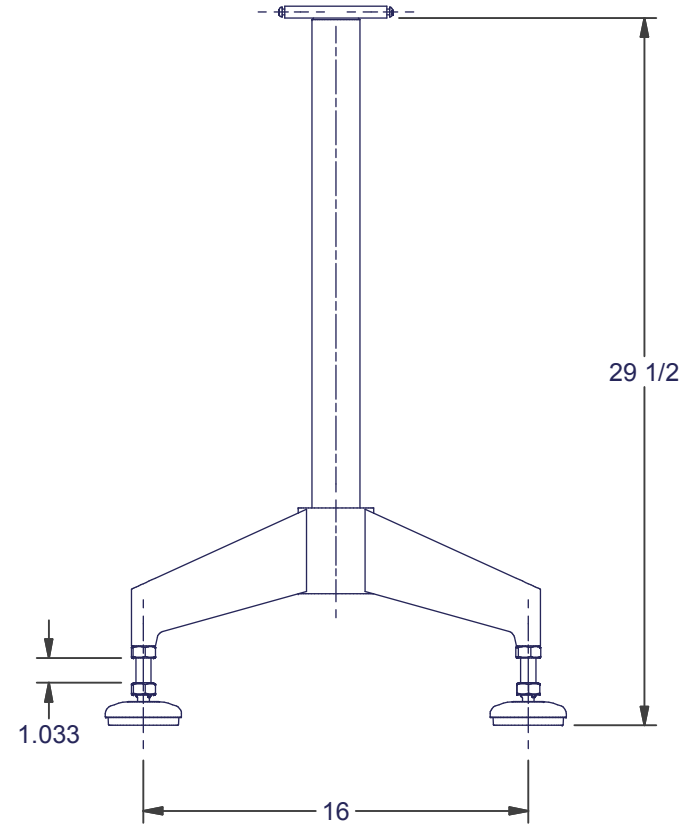
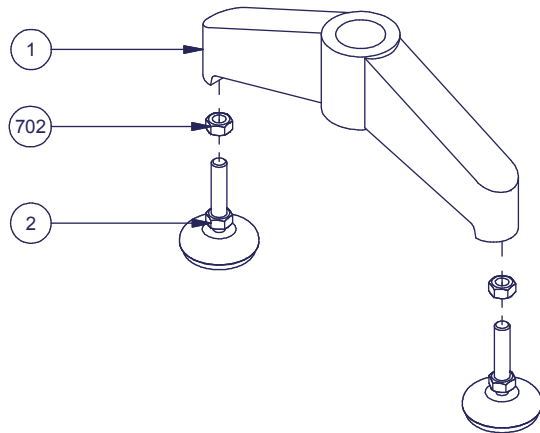
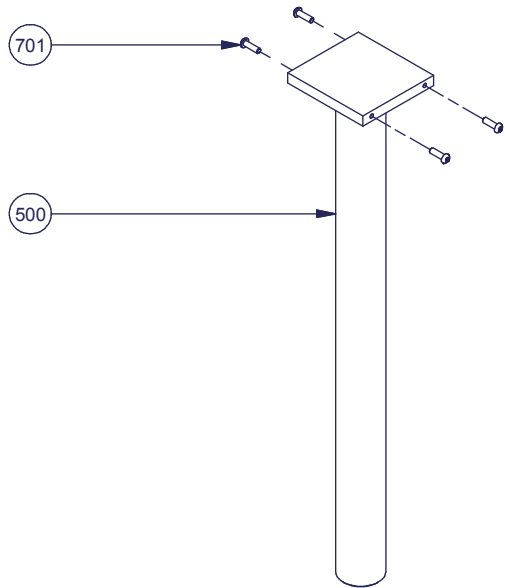
<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCON131</b>	<b>2</b>	<b>Support Assy, Channel 4", Feet</b>

<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
1	1	27046	BIPOD
2	2	27046-A	Pied stabilisateur s/s pour 27046
500	1	CON017	Conv. Support plate & tube 24" lg
701	4	BOU6026	Button socket cap screw ISO 7380
702	2	BOU4010	Finish hex nut DIN 934 M16

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DRAWN BY: Anderson		DATE: 28/09/2010	CHECKED BY:	MATERIAL:	QTY / MACHINE:		MACHINE:	DATE	INIT
 DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .002 FRACTIONS / FRACTIONS: ± 1/32 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES			MAT'L TREATMENT:	MAT'L #:	188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8		TEL: (514) 694-3439 FAX: (514) 694-4107 EMAIL: contactus@aesus.com	TITLE: FOOT FOR CHANNEL MOUTING ASSEMBLY	
						DWG NO: ASCON131	REV: 0		



# Customer Assemblies

<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

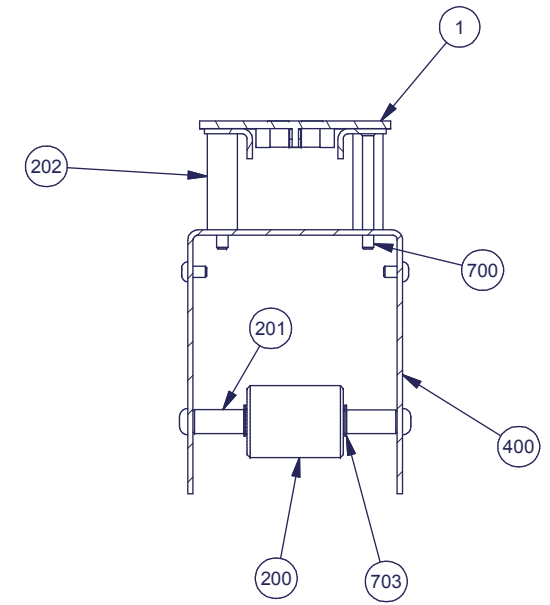
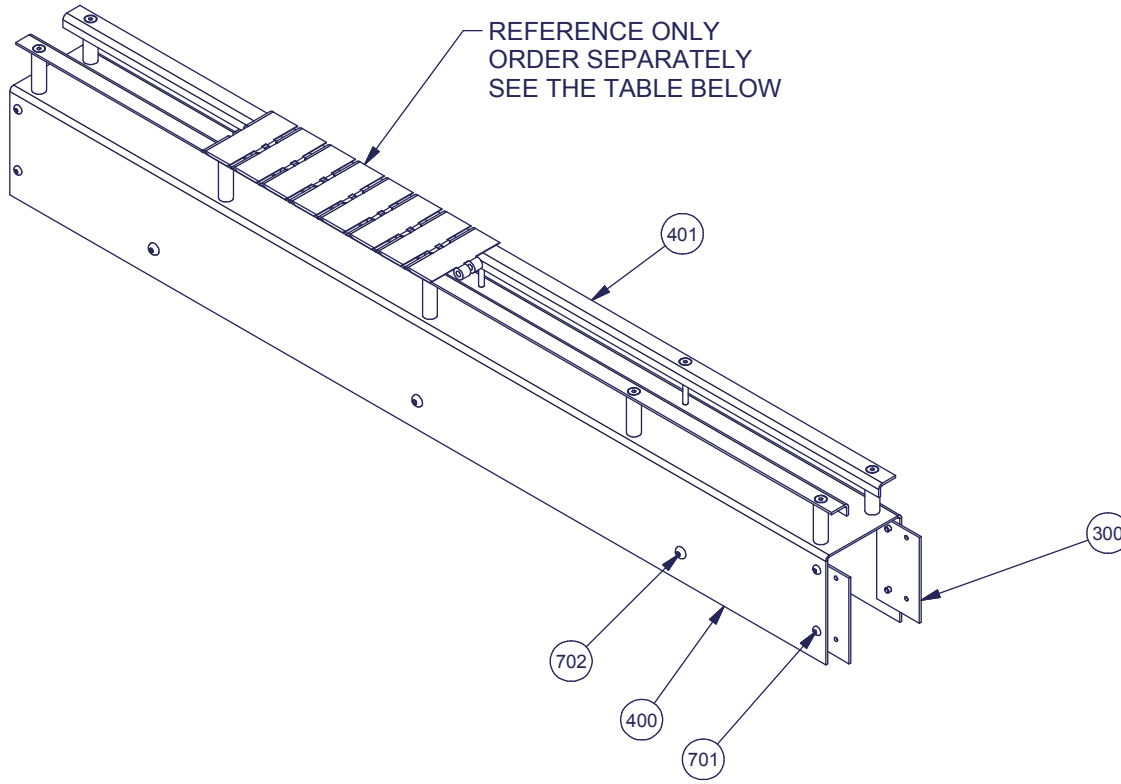
## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCON147</b>	<b>1</b>	<b>RAISE BED CONVEYOR EXTENSION, 4" W. X 48" LG.</b>

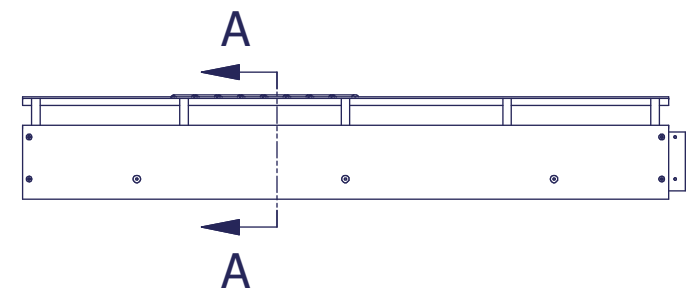
<u>Item #</u>	<u>Qty</u>	<u>Part Number</u>	<u>Part Name</u>
200	2	27055	Roller for conveyor
201	2	27056	INTERIOR SHAFT WITH CIRCLIPS
202	8	27505	SS DELTA VEYOR spacers 2"x 5/8" OD
300	2	27507	Joint plate
400	1	CON001E	Sanitary channel 48" with holes
401	2	CON002Q	Sliding angle 48" with holes
700	8	BOU2050	Flat socket cap screw DIN 7991
701	8	BOU6021	Button socket cap screw M6 x 10 ISO 7380
702	4	BOU6044	Button socket cap screw ISO 7380
703	4	BOU9017	External C-clip 1/2 stainless steel



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SECTION A-A



ONLY FOR 4" W	SELECT TABLE TOP CHAIN
BROWN T. TOP CHAIN	27027
WHITE T. TOP CHAIN	27120

DRAWN BY: Martin	DATE: 28/01/2010	CHECKED BY:	MATERIAL:	QTY / MACHINE:		MACHINE:	SHEET: 1 OF 1
		MAT'L TREATMENT:	MAT'L #:	TITLE: RAISE BED CONVEYOR EXTENSION, 4" W. X 48" LG.		DWG NO:	REV: 0

188 ONEIDA DRIVE TEL: (514) 694-3439  
 POINTE CLAIRE, QUEBEC FAX: (514) 694-4107  
 CANADA H9R 1A8 EMAIL: contactus@aesus.com

ASCN147



# Customer Assemblies

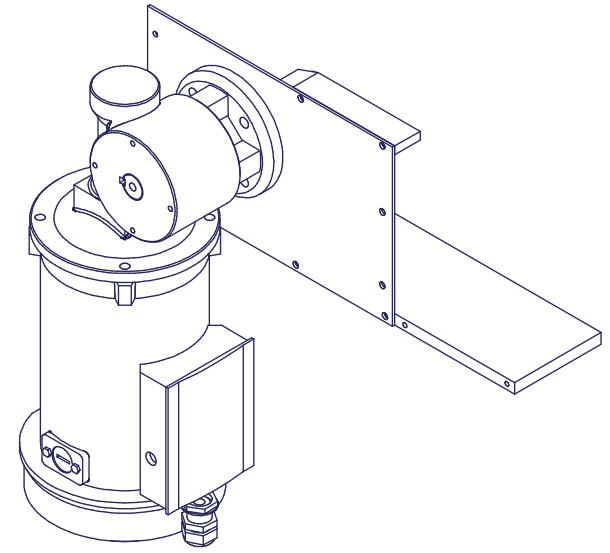
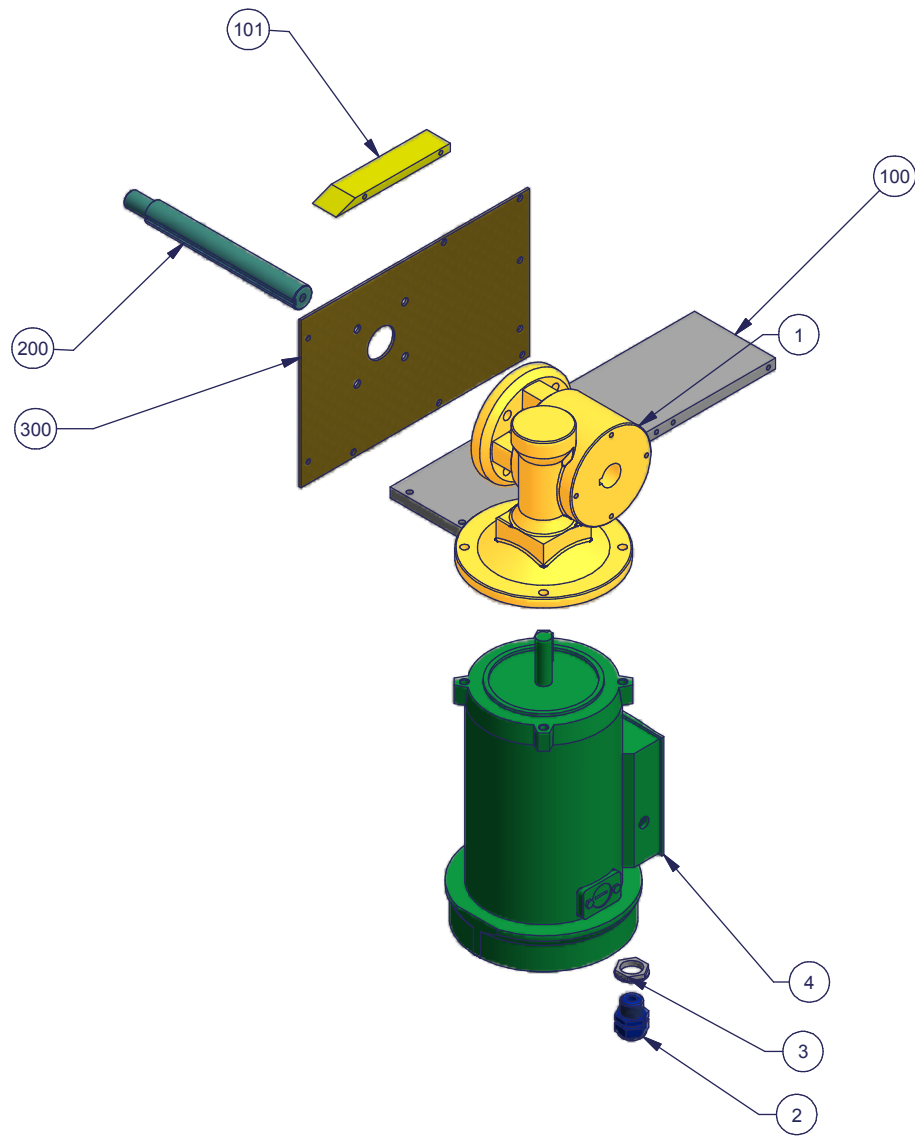
<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCON225</b>	<b>1</b>	<b>Motor Assy, 1/2HP, 90V, LH, DLCS4, Leeson</b>

<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
1	1	25020	Gear box flange mount 25:1 56C Hollow shaft**
2	1	31000	1/2" NPT liquid tight connector ( 100/PK ) grey
3	1	31002	1/2 lock nut ( 100/PK)
4	1	32000	Motor 1/2 hp 90Vdc rpm:1800 **
100	1	27530	Drive bottom plate for Leeson
101	1	CON1232	Slide for curve end 4" conveyor
200	1	27529	Gearbox drive shaft 1" dia x 9.25 " long
300	1	27531	Side end plate drive, 1/2 HP Leeson (LH)

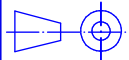
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DRAWN BY: K.K  
 DATE: 27/06/2006  
 CHECKED BY:

MATERIAL:

QTY / MACHINE:



DECIMALS / DECIMAUX: .xx ± .01  
 DECIMALS / DECIMAUX: .xxx ± .002  
 FRACTIONS / FRACTIONS: ± 1/32  
 ANGULAR / ANGULAIRE: ± 0.5°  
 BREAK ALL SHARP EDGES /  
 BRISER TOUTES LES ARRETES

MAT'L TREATMENT:

MAT'L #:

**AESUS**  
 188 ONEIDA DRIVE TEL: (514) 694-3439  
 POINTE CLAIRE, QUEBEC FAX: (514) 694-4107  
 CANADA H9R 1A8 EMAIL: contactus@aesus.com

REV #	ECN #	DESCRIPTION	DATE	INIT
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MACHINE: SHEET: 1 OF 1

TITLE: MOTOR ASSY, 1/2HP, 90V, LH, DLCS4, LEESON

DWG NO: ASCON225 REV: 0



# Customer Assemblies

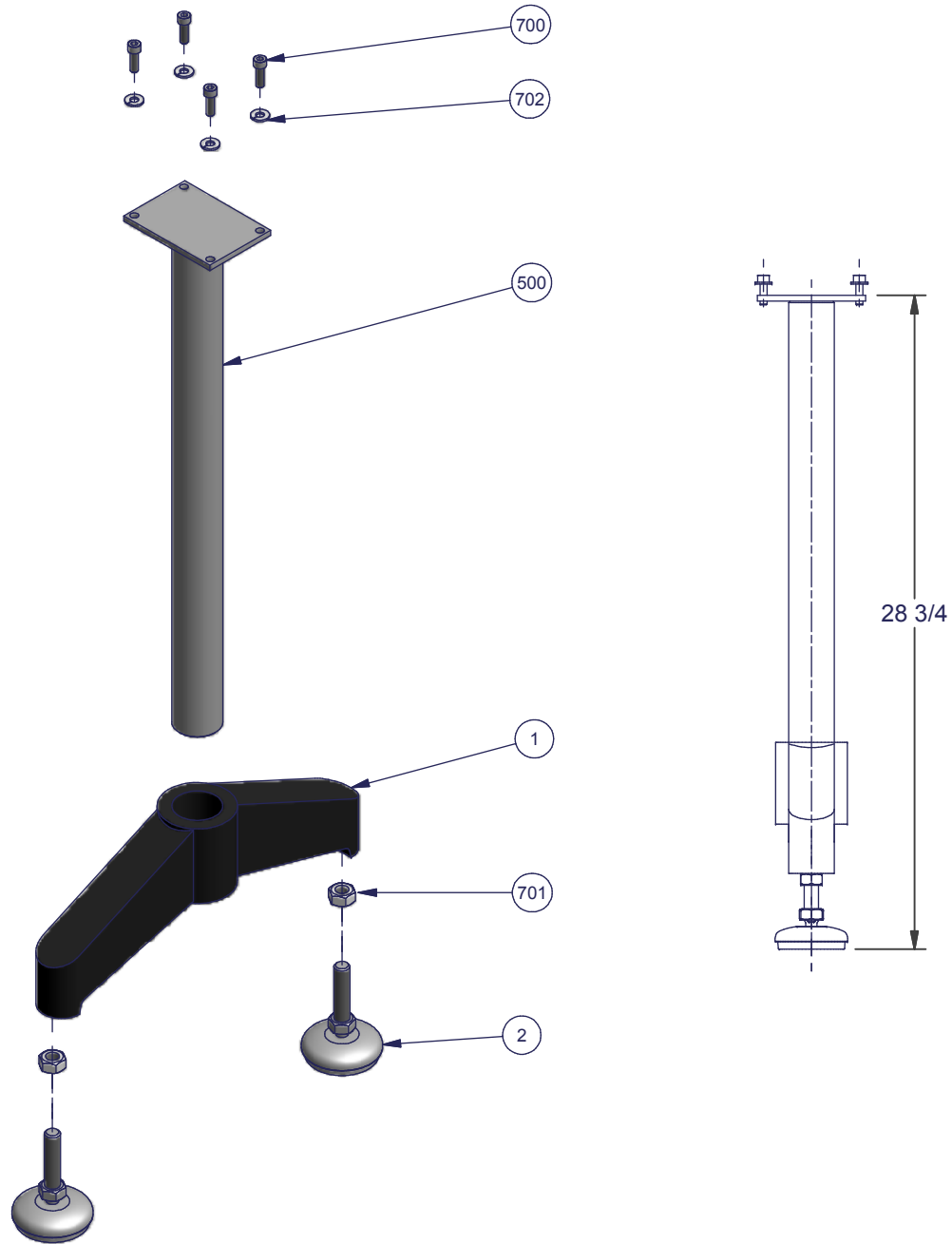
<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCON233</b>	<b>1</b>	<b>Support Assy, Under Gear Box, Leeson, Feet</b>

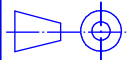
<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
1	1	27046	BIPOD
2	2	27046-A	Pied stabilisateur s/s pour 27046
500	1	CON1247	Footplate & tube 23.75 (gearbox LEESON)
700	4	BOU1075	Socket cap screw DIN 912
701	2	BOU4010	Finish hex nut DIN 934 M16
702	4	BOU5051	Lock washer

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DRAWN BY: ANDERSON  
 DATE: 15/09/2008  
 CHECKED BY:

MATERIAL:  
 QTY / MACHINE:



DECIMALS / DECIMAUX: .xx ± .01  
 DECIMALS / DECIMAUX: .xxx ± .002  
 FRACTIONS / FRACTIONS: ± 1/32  
 ANGULAR / ANGULAIRE: ± 0.5°  
 BREAK ALL SHARP EDGES /  
 BRISER TOUTES LES ARRETES

MAT'L TREATMENT:  
 MAT'L #:

**AESUS**

188 ONEIDA DRIVE TEL: (514) 694-3439  
 POINTE CLAIRE, QUEBEC FAX: (514) 694-4107  
 CANADA H9R 1A8 EMAIL: [contactus@aesus.com](mailto:contactus@aesus.com)

REV #	ECN #	DESCRIPTION	DATE	INIT
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MACHINE:  
 SHEET: 1 OF 1

TITLE: FOOT AND TUBE UNDER GEAR BOX

DWG NO: **ASCON233**  
 REV: 0



# Customer Assemblies

**P#**                      **Customer**                      **Order Description**  
**54967**                      **SAGER Foods Products Inc.**                      **Delta Cap 2 + Elevator**

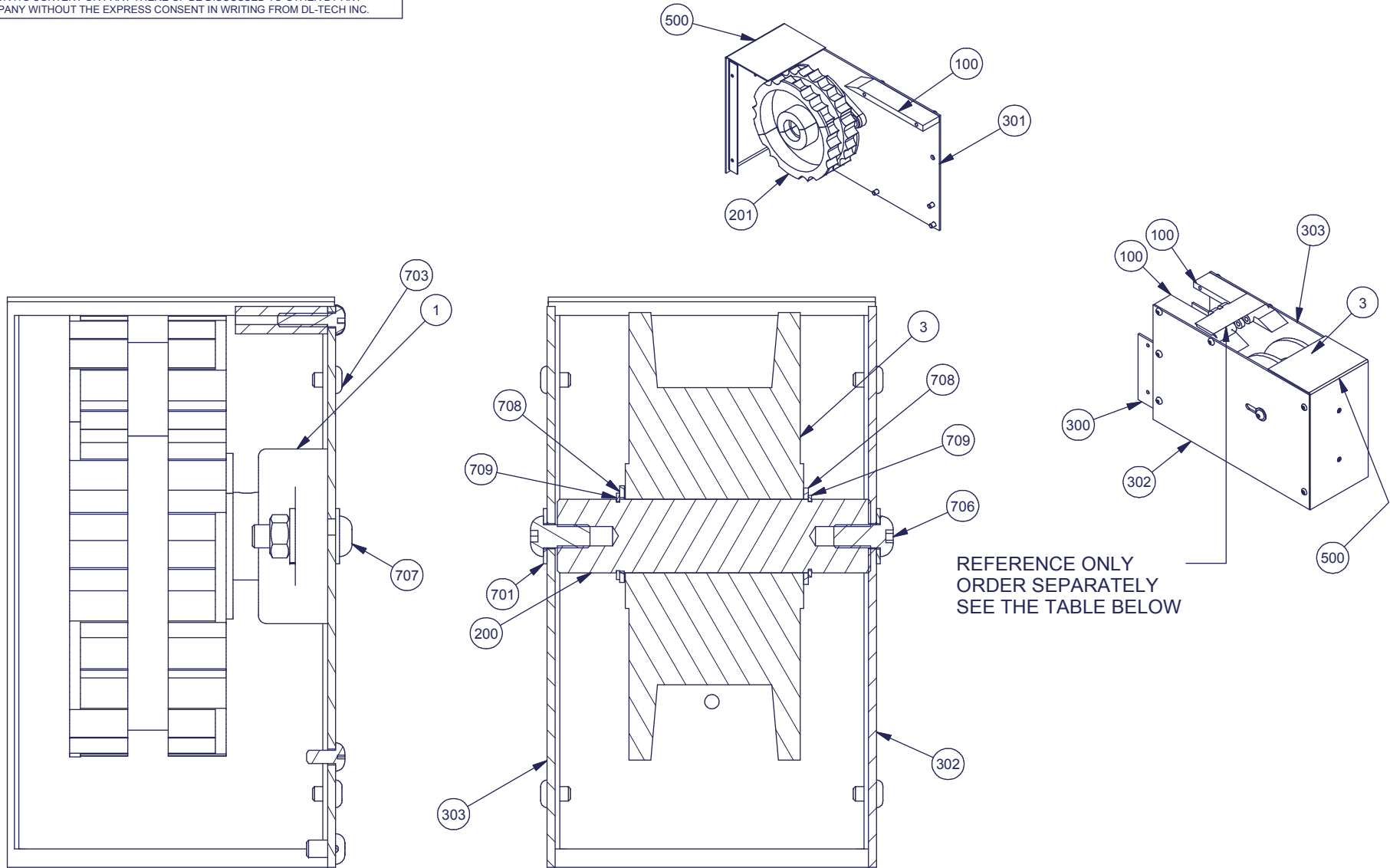
## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCON344</b>	<b>1</b>	<b>Idler &amp; Drive End Assy, DLCS4, LH Motor</b>

<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
1	1	21010	Flange Bearing 3/4"ID 2 HOLES
3	1	27028	Idler wheel 25 teeth #820
100	3	CON1232	Slide for curve end 4" conveyor
200	1	27521	Idler shaft with c-clip 4"
201	1	CON075	DRIVE SPROCKET # 820 25 teeth (MOD)
300	2	27507	Joint plate
301	1	27508	Drive end plate (left)
302	1	27510LH	Side end plate LEFT IDLER ss304 finish #4
303	1	27510RH	SIDE END PLATE IDLER RH
500	2	CON012	Conveyor end plate kit 4"
700	2	BOU4005	Finish hex nut M8 DIN 934
701	4	BOU5001	Flat washer
702	2	BOU5051	Lock washer
703	6	BOU6010	Button socket cap screw ISO 7380
704	8	BOU6021	Button socket cap screw M6 x 10 ISO 7380
705	6	BOU6026	Button socket cap screw ISO 7380
706	2	BOU6044	Button socket cap screw ISO 7380
707	2	BOU6048	Button socket cap screw ISO 7380
708	2	BOU9025	Flat fiber washer 1" ID x 1-5/16"x 1/116 th.
709	2	BOU65137	1" EXTERNAL CIRCLIP STAINLESS/STEEL

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ONLY FOR 4" W	SELECT TABLE TOP CHAIN
BROWN T. TOP CHAIN	27027
WHITE T. TOP CHAIN	27120

DRAWN BY: K.K	DATE: 27/06/2006	CHECKED BY:	MATERIAL:	QTY / MACHINE:		MACHINE: CONVEYOR	SHEET: 1 OF 1
DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .002 FRACTIONS / FRACTIONS: ± 1/32 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES		MAT'L TREATMENT:	MAT'L #:	TITLE: IDLER & DRIVE END ASS'Y, DLCS4, LH MOTOR		REV: 0	
				188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8 EMAIL: contactus@aesus.com	TEL: (514) 694-3439 FAX: (514) 694-4107	DWG NO:	ASCON344



# Customer Assemblies

*P#*                      *Customer*                      *Order Description*  
**54967**                      **SAGER Foods Products Inc.**                      **Delta Cap 2 + Elevator**

## Assembly List

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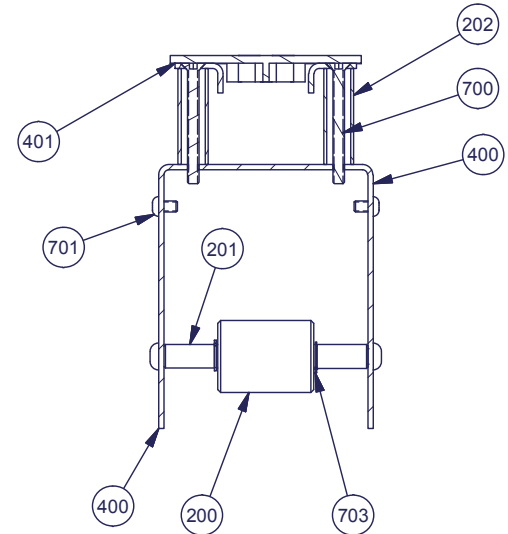
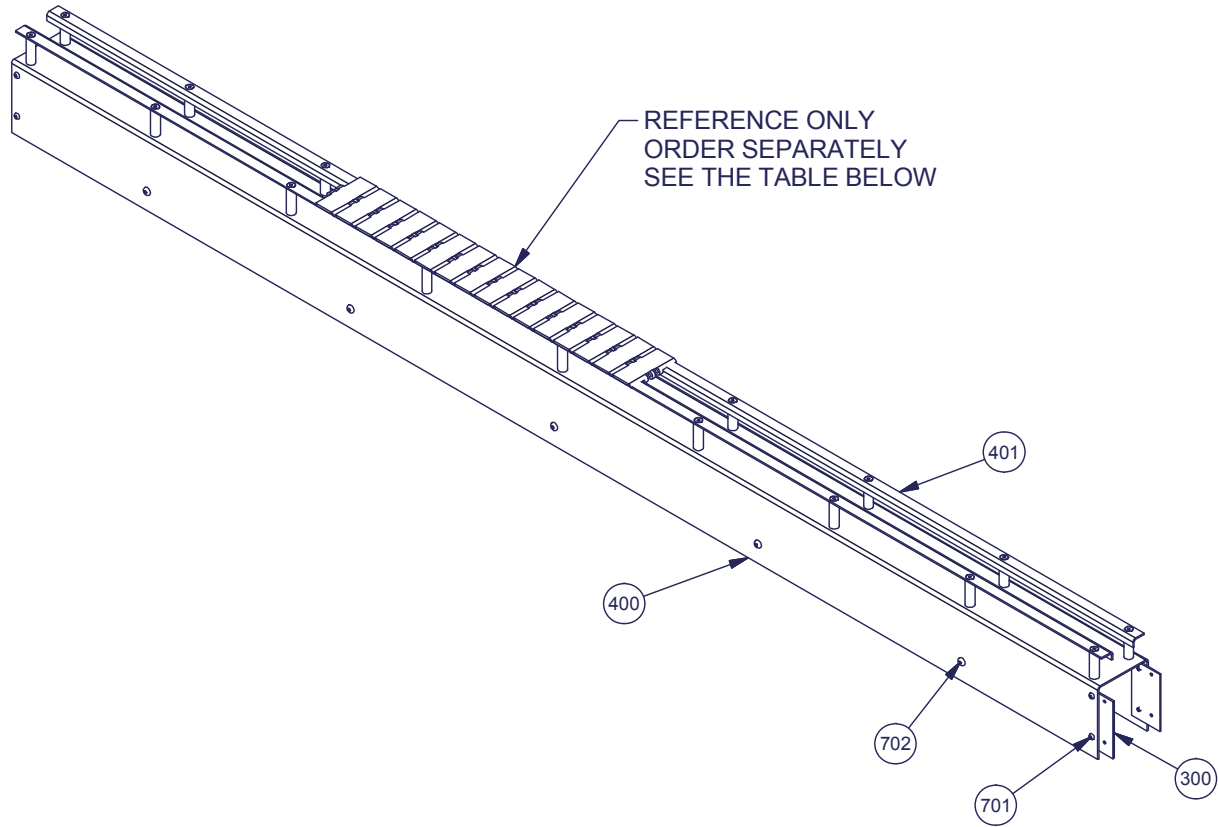
<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCON349</b>	<b>1</b>	<b>RAISE BED CONVEYOR EXTENSION, 4" W. X 96" LG.</b>

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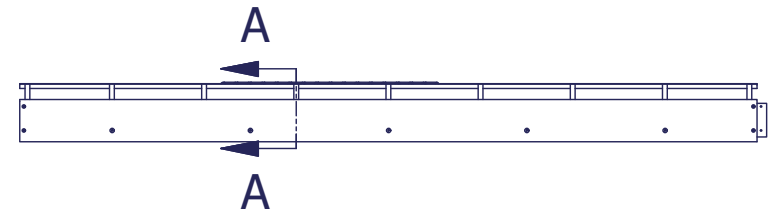
<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
200	5	27055	Roller for conveyor
201	5	27056	INTERIOR SHAFT WITH CIRCLIPS
202	18	27505	SS DELTAVEYOR spacers 2"x 5/8" OD
300	2	27507	Joint plate
400	1	CON001B	Sanitary channel 96" with holes
401	2	CON002K	SLIDING ANGLE 96 " LONG
700	18	BOU2050	Flat socket cap screw DIN 7991
701	8	BOU6021	Button socket cap screw M6 x 10 ISO 7380
702	10	BOU6044	Button socket cap screw ISO 7380
703	10	BOU9017	External C-clip 1/2 stainless steel



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SECTION A-A



ONLY FOR 4" W	SELECT TABLE TOP CHAIN
BROWN T. TOP CHAIN	27027
WHITE T. TOP CHAIN	27120

DRAWN BY: LOISELLE	DATE: 02/07/2013	CHECKED BY:	MATERIAL:	QTY / MACHINE:		MACHINE:	SHEET: 1 OF 1
 DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .002 FRACTIONS / FRACTIONS: ± 1/32 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES		MAT'L TREATMENT:	MAT'L #:	188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8		TEL: (514) 694-3439 FAX: (514) 694-4107 EMAIL: contactus@aesus.com	TITLE: RAISE BED CONVEYOR EXTENSION, 4" W. X 96" LG.
						DWG NO: ASCON349	



# Customer Assemblies

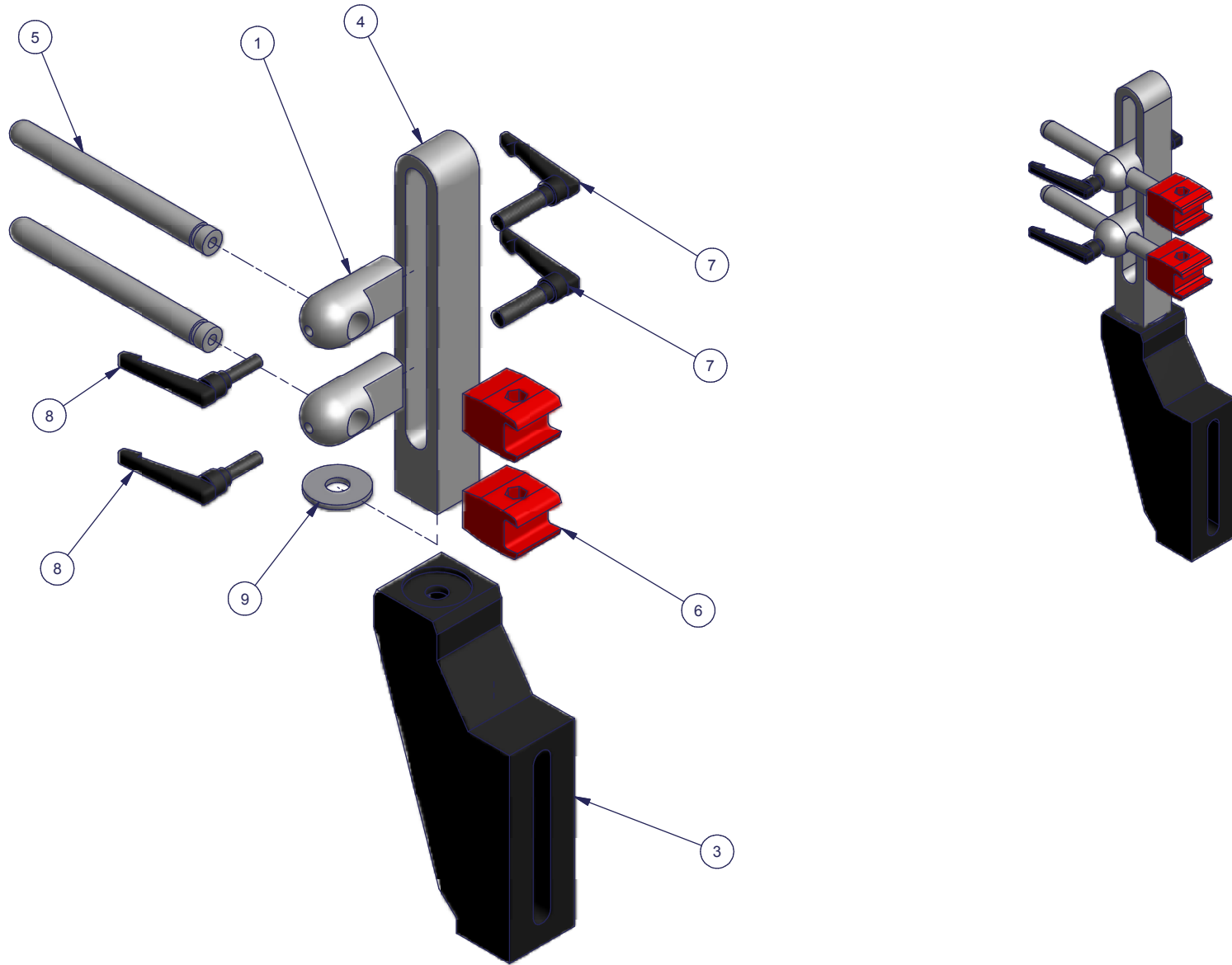
<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASCON64991</b>	<b>9</b>	<b>Dual independent guide rails</b>

<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
1	2	EDT-40-30-015	ROD HOLDER
3	1	27051A	BASE ONLY FOR GUIDE SUPPORT
4	1	EDT-41-20-011	SLOT BAR
5	2	654050	S/S SHAFT 12MM X 135.80MM
6	2	611639	Rod end plastic 12mm
7	2	EDT-20911	RATCHET HANDLE M8 X 25MM LG. BLUE BUTTON
8	2	EDT-20910	RATCHET HANDLE M6 X 20MM
9	1	27051D	WASHER M10ID X 30MM OD 2.5 TH

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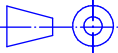
REV #	ECN #	DESCRIPTION	DATE	INIT
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DRAWN BY: Yuan	DATE: 04/08/2014	CHECKED BY:
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MATERIAL:	QTY / MACHINE:
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MACHINE:	SHEET: 1 OF 1
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 DECIMALS / DECIMAUX: .xx ± .01  
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 FRACTIONS / FRACTIONS: ± 1/32  
 ANGULAR / ANGULAIRE: ± 0.5°  
 BREAK ALL SHARP EDGES /  
 BRISER TOUTES LES ARRETES

MAT'L TREATMENT:	MAT'L #:
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 CANADA H9R 1A8 EMAIL: contactus@aesus.com

TITLE: DUAL INDEPENDENT GUIDE RAIL	REV: 1
DWG NO: ASCON64991	



# Customer Assemblies

*P#*                      *Customer*                      *Order Description*  
**54967**                      **SAGER Foods Products Inc.**                      **Delta Cap 2 + Elevator**

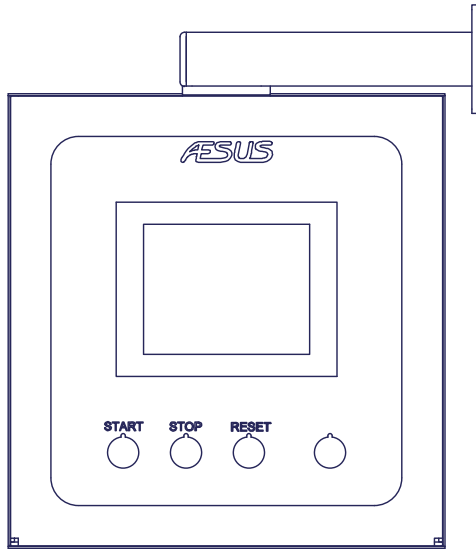
## Assembly List

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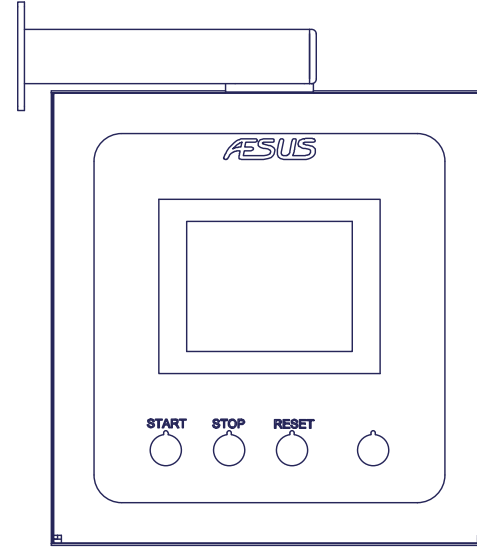
<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASELE107976</b>	<b>1</b>	<b>TOUCH PANEL CONTROL 6.5 ASSY SWIVEL</b>

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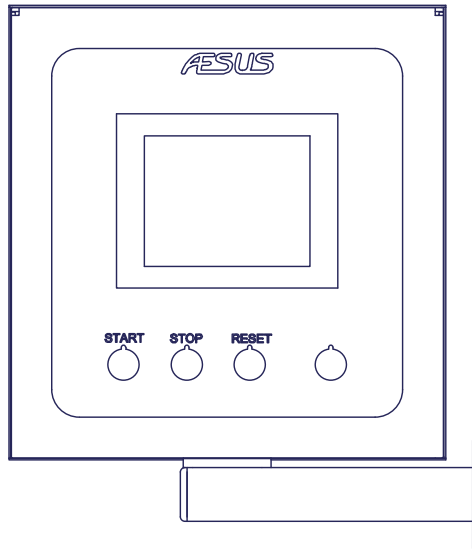
<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
1	1	ELE103362	FACE PLATE
2	1	ELE102814	1 1/2x1 1/2" Sq. Rib Insert, 10-14g
100	1	ELE103359	TEFLON WASHER
101	4	ELE106207	STANDOFF
200	1	ELE105419	FLANGE FOR CONTROL HMI POST
300	1	ELE103364	UNDER FACE PLATE
400	1	ELE103353	COVER FOR TOUCH PANEL
500	1	ELE106206	ELECTRIC BOX HOUSING
501	1	ELE107977	TOUCH PANEL SUPPORT



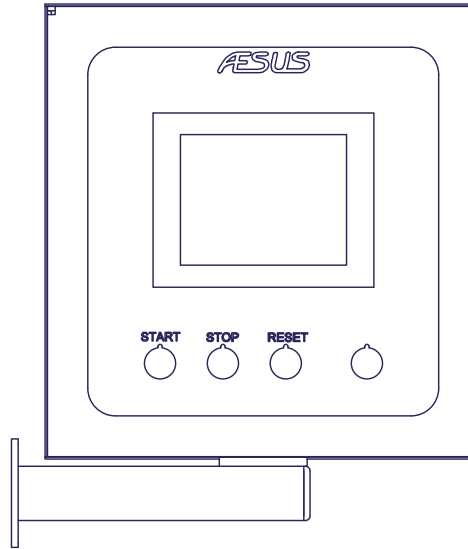
TOP LEFT CONFIGURATION



TOP RIGHT CONFIGURATION

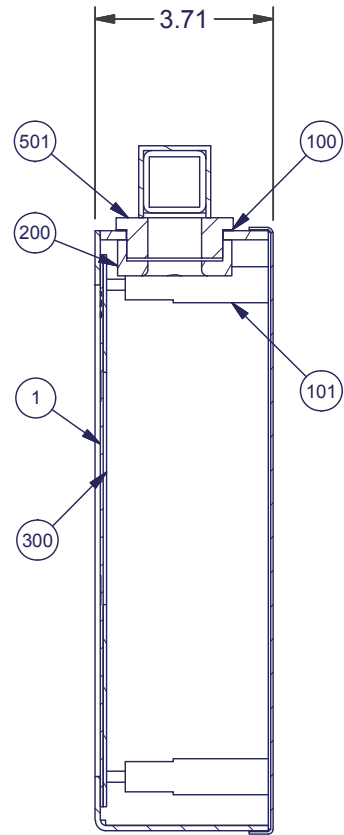
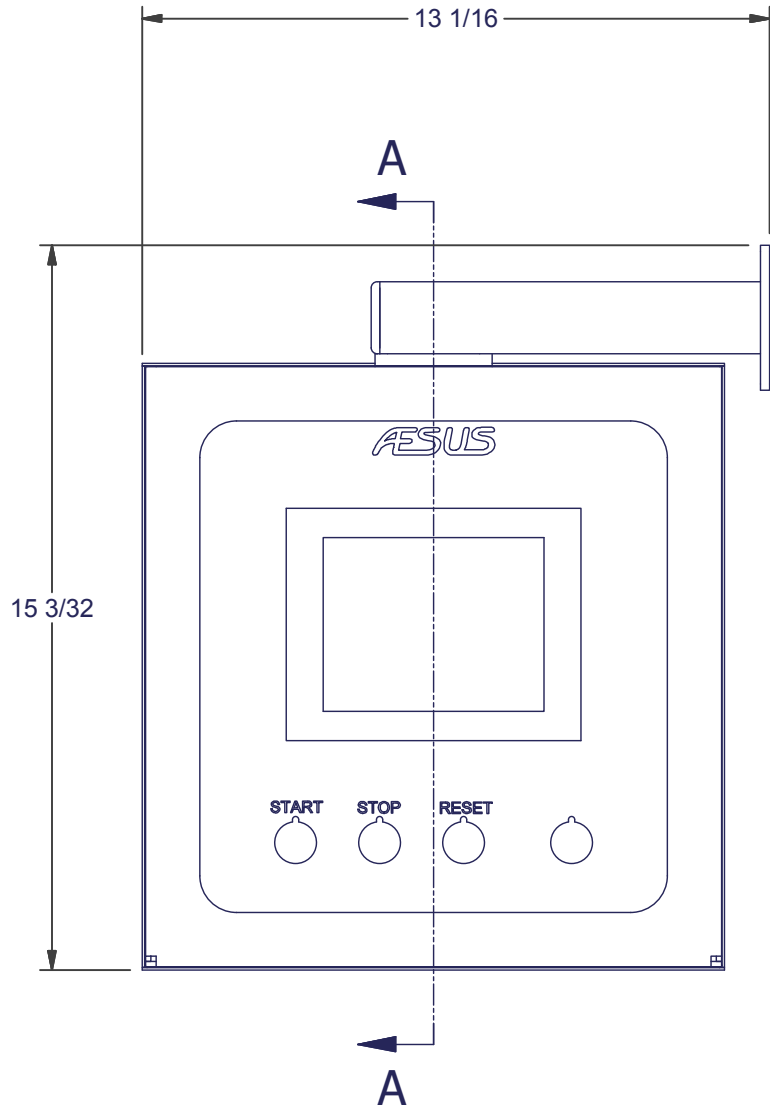


BOTTOM LEFT CONFIGURATION



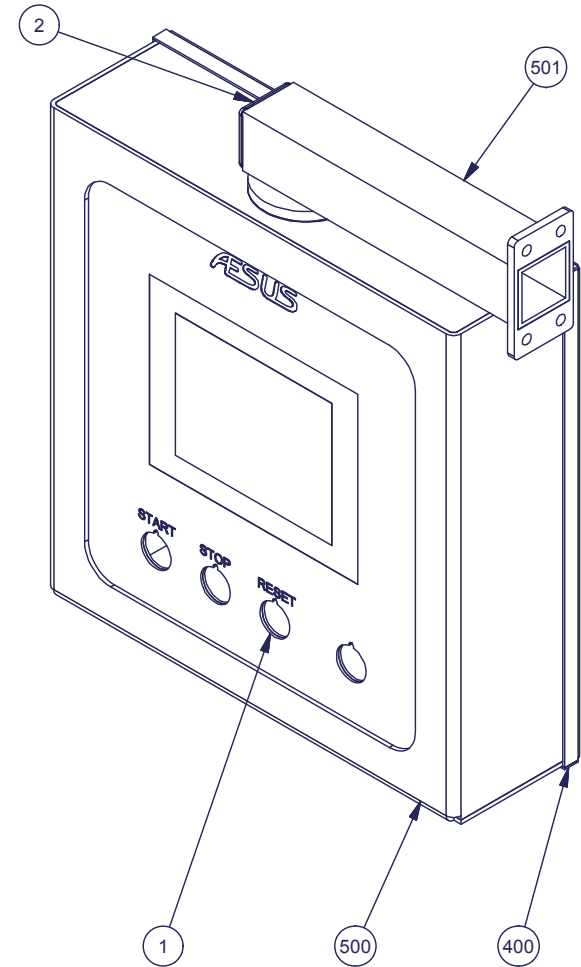
BOTTOM RIGHT CONFIGURATION

DRAWN BY: Martin	DATE: 05/04/2016	CHECKED BY:	MATERIAL:	 188 ONEIDA DRIVE TEL: (514) 694-3439 POINTE CLAIRE, QUEBEC FAX: (514) 694-4107 CANADA H9R 1A8 EMAIL: <a href="mailto:contactus@aesus.com">contactus@aesus.com</a>	MACHINE:	SHEET: 1 OF 5
 DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .005 FRACTIONS / FRACTIONS: ± 1/64 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES		MAT'L TREATMENT:	TITLE: TOUCH PANEL CONTROL 6.5 ASS'Y SWIVEL		REV: 0	
					DWG NO: ASELE107976	



SECTION A-A

TOP LEFT CONFIGURATION

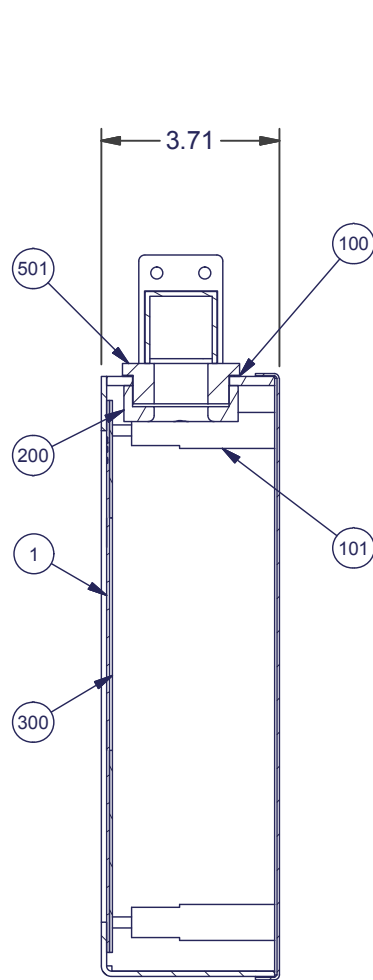
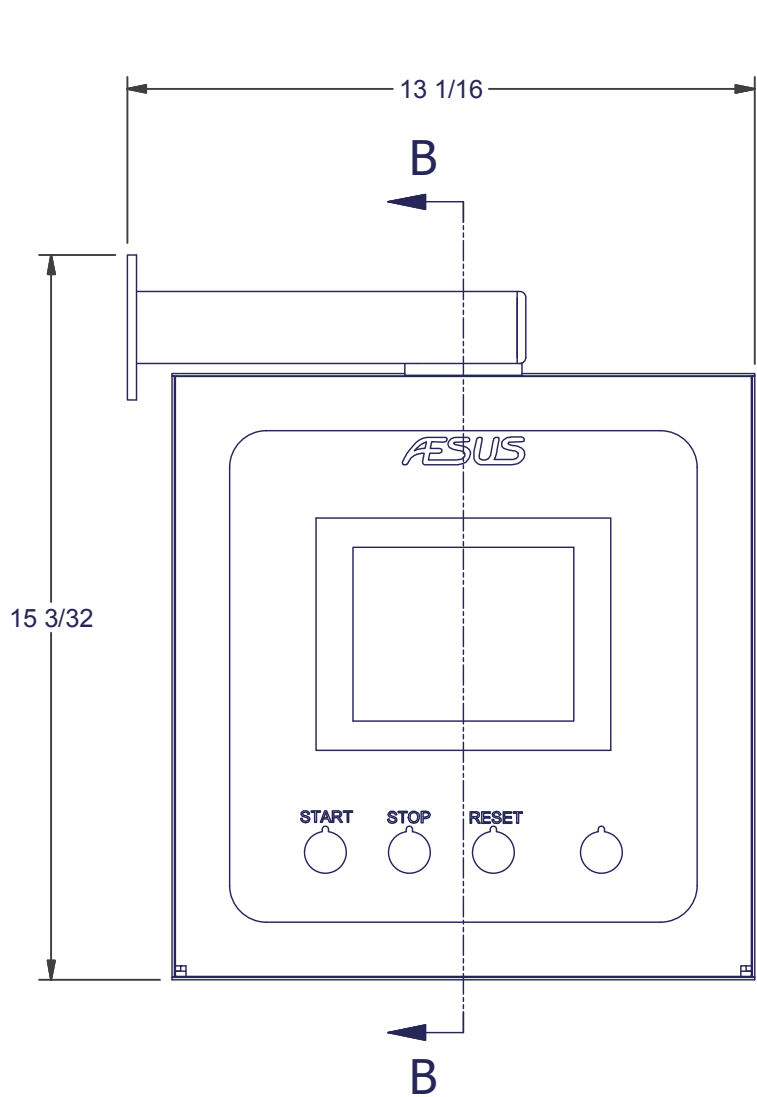


DRAWN BY: Martin	DATE: 05/04/2016	CHECKED BY:	MATERIAL:
DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .005 FRACTIONS / FRACTIONS: ± 1/64 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES			MAT'L TREATMENT:

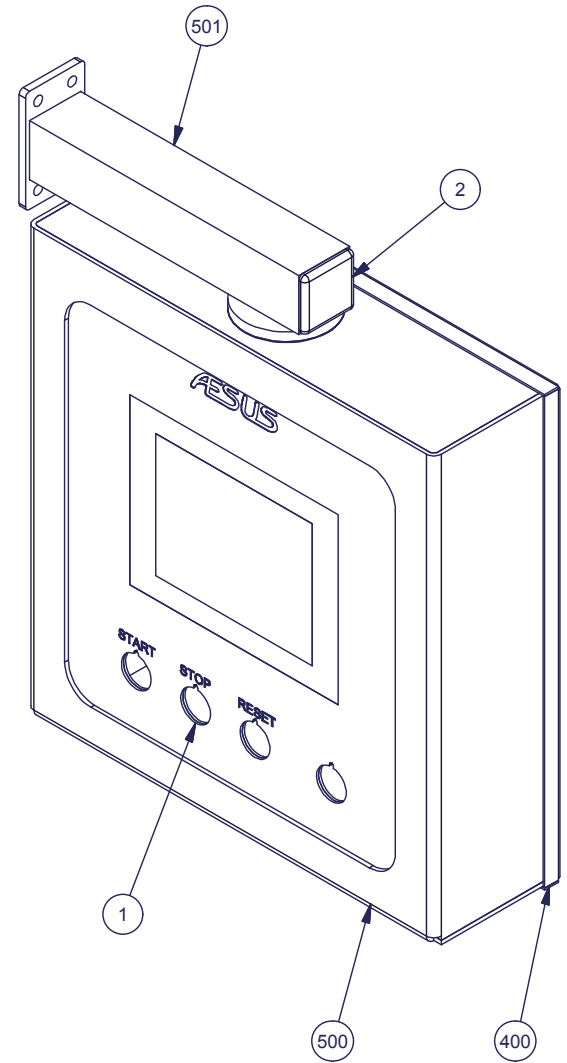
**AESUS**

188 ONEIDA DRIVE      TEL: (514) 694-3439  
 POINTE CLAIRE, QUEBEC      FAX: (514) 694-4107  
 CANADA H9R 1A8      EMAIL: [contactus@aesus.com](mailto:contactus@aesus.com)

MACHINE:	SHEET: 2 OF 5
TITLE: TOUCH PANEL CONTROL 6.5 ASS'Y SWIVEL	
DWG NO: <b>ASELE107976</b>	REV: 0

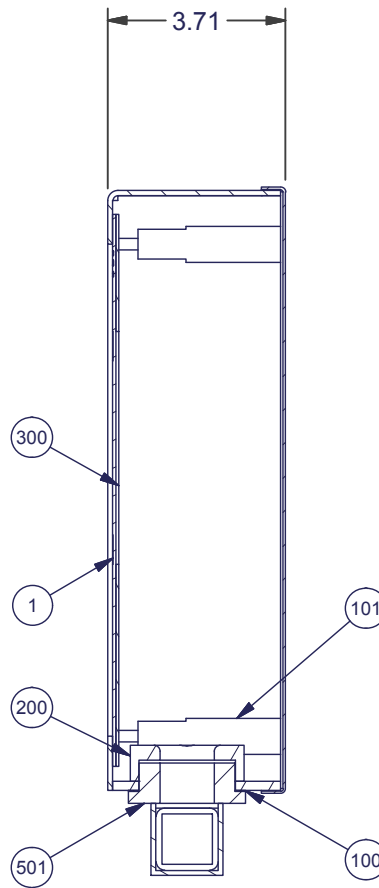
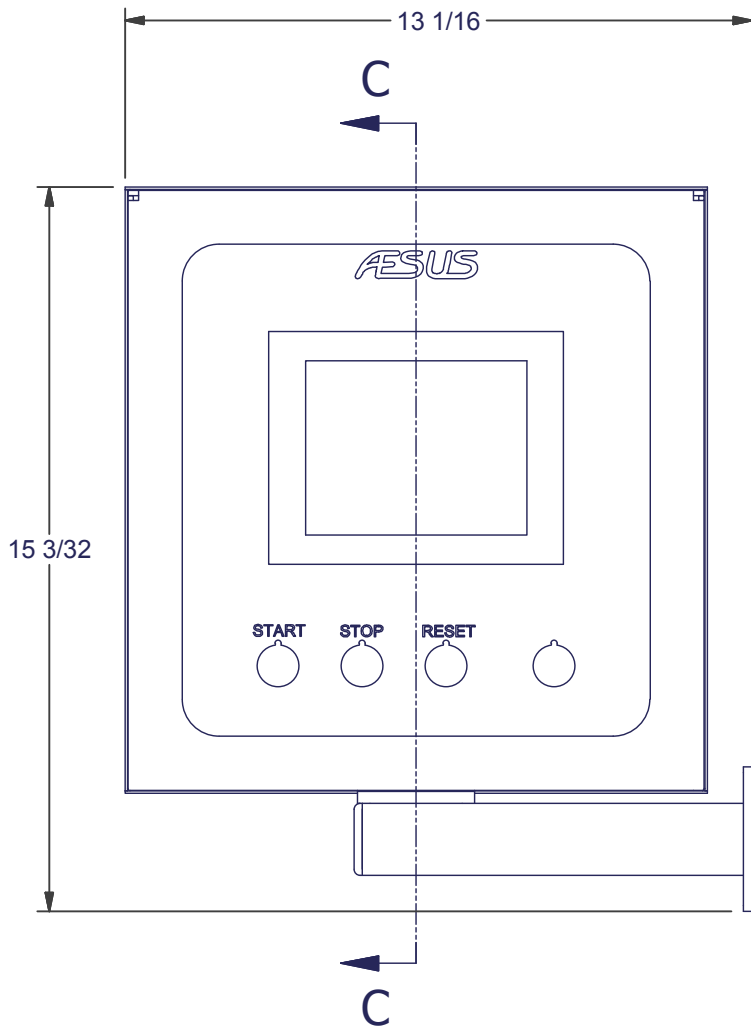


SECTION B-B

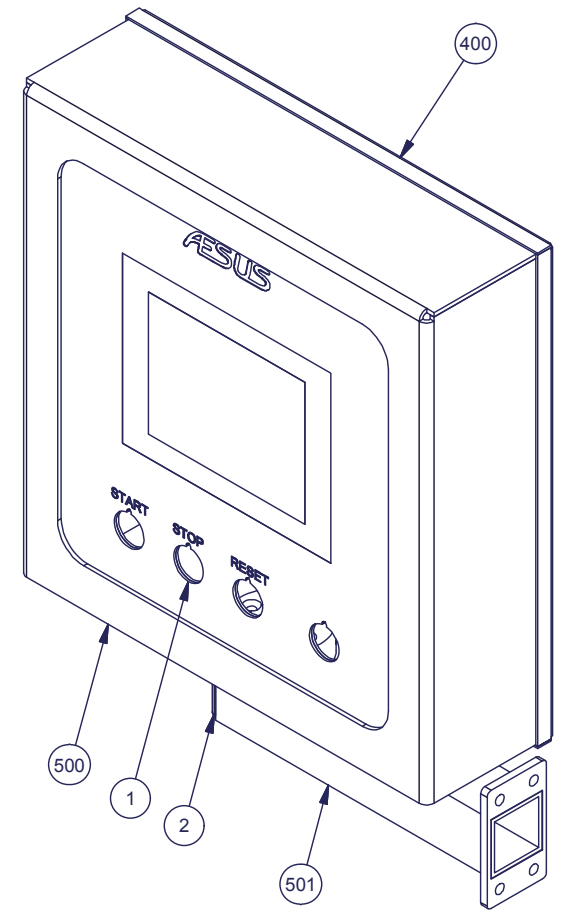


TOP RIGHT CONFIGURATION

DRAWN BY: Martin	DATE: 05/04/2016	CHECKED BY:	MATERIAL:		MACHINE:	SHEET: 3 OF 5
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					DWG NO: ASELE107976	



SECTION C-C



BOTTOM LEFT CONFIGURATION

DRAWN BY: Martin  
 DATE: 05/04/2016  
 CHECKED BY:  
 MATERIAL:

DECIMALS / DECIMAUX: .xx ± .01  
 DECIMALS / DECIMAUX: .xxx ± .005  
 FRACTIONS / FRACTIONS: ± 1/64  
 ANGULAR / ANGULAIRE: ± 0.5°  
 BREAK ALL SHARP EDGES /  
 BRISER TOUTES LES ARRETES

MAT'L TREATMENT:

**AESUS**

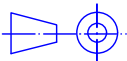
188 ONEIDA DRIVE TEL: (514) 694-3439  
 POINTE CLAIRE, QUEBEC FAX: (514) 694-4107  
 CANADA H9R 1A8 EMAIL: contactus@aesus.com

MACHINE: SHEET: 4 OF 5

TITLE: TOUCH PANEL CONTROL 6.5 ASS'Y SWIVEL

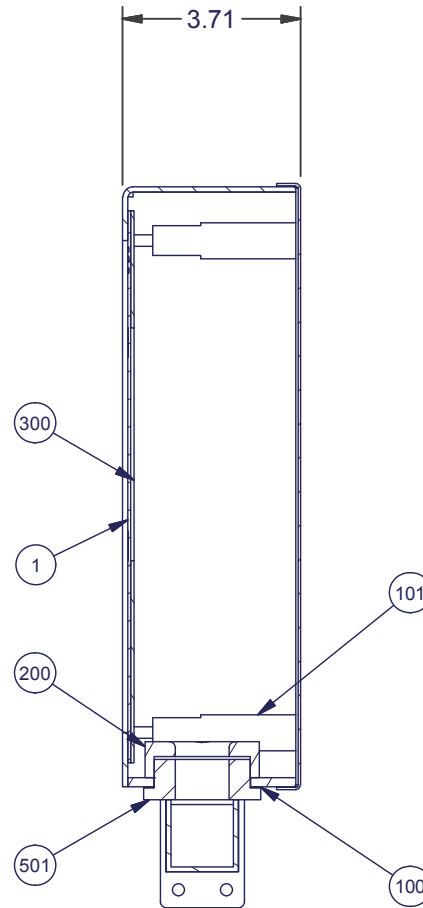
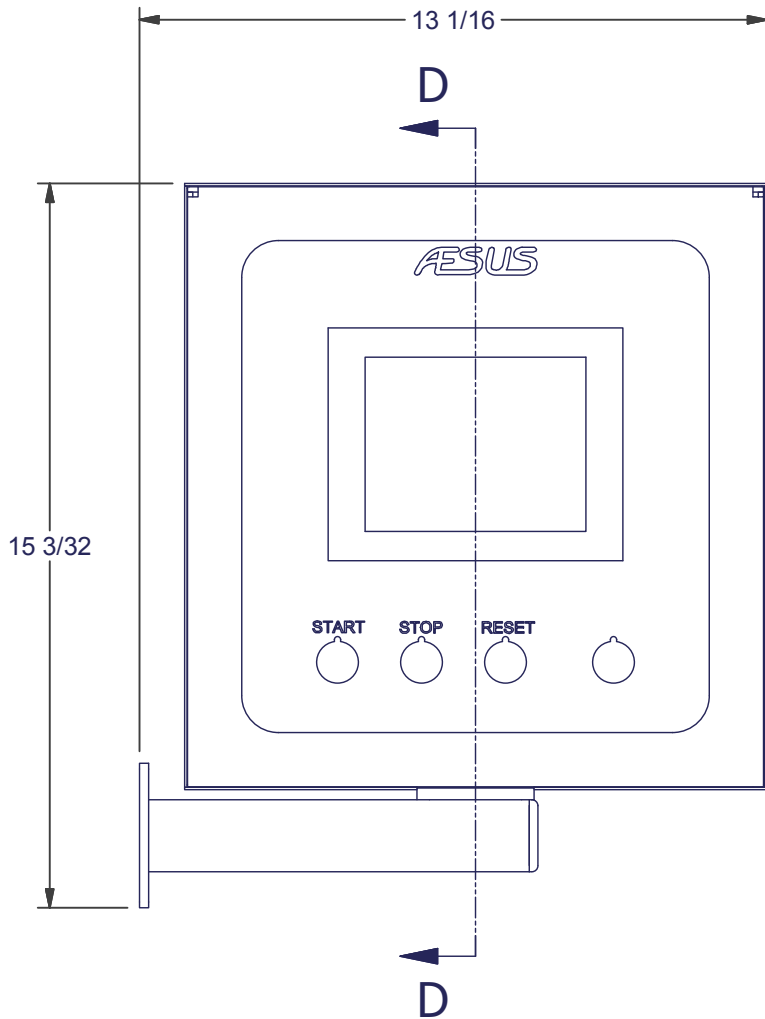
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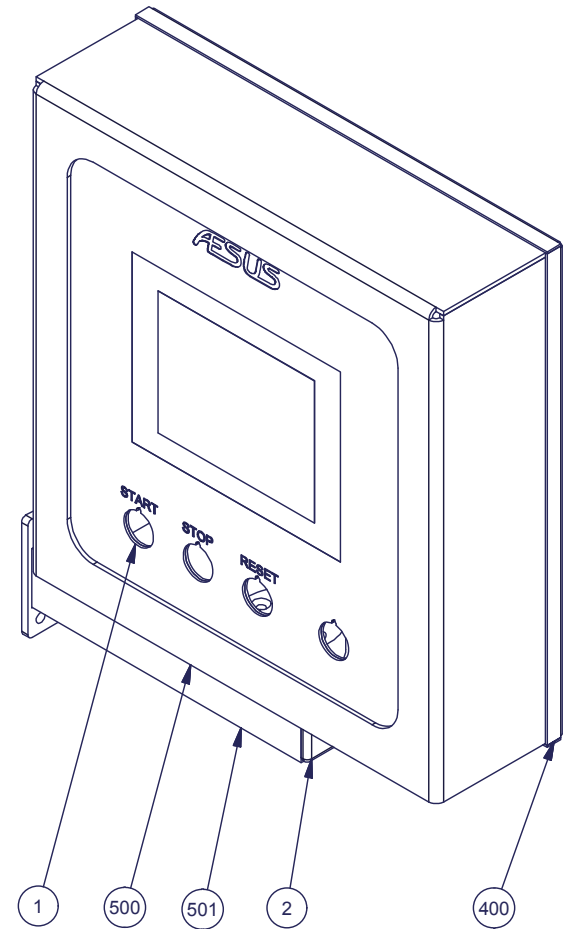




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SECTION D-D



BOTTOM RIGHT CONFIGURATION

DRAWN BY: Martin	DATE: 05/04/2016	CHECKED BY:	MATERIAL:	 188 ONEIDA DRIVE TEL: (514) 694-3439 POINTE CLAIRE, QUEBEC FAX: (514) 694-4107 CANADA H9R 1A8 EMAIL: contactus@aesus.com	MACHINE:	SHEET: 5 OF 5
 DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .005 FRACTIONS / FRACTIONS: ± 1/64 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES		MAT'L TREATMENT:	TITLE: TOUCH PANEL CONTROL 6.5 ASS'Y SWIVEL		REV: 0	
					DWG NO: ASELE107976	



# Customer Assemblies

P# **54967** Customer **SAGER Foods Products Inc.** Order Description **Delta Cap 2 + Elevator**

## Assembly List

Assembly No.	Qty	Assembly Name	
<b>ASELV110110</b>	<b>1</b>	<b>CAP SORTING ELEVATOR 12"</b>	
Item #	Qty	Part Number	Part Name
1	2	ALI83608	BEVEL GEAR
2	3	21005	Roller bearing 10mm x 30mm od x 9mm thk
3	3	ALI83609	mINTERNAL RETAINING RING 30mm
4	6	21003	Roller bearing SHIELDED
5	1	654111	Conveyor drive roller pin
6	16	613041	Clamp for conveyor (1 Hole)
7	3	21018	Roller bearing 12mm x 32mm x 10mm thk
8	1	21004	Roller Bearing
9	1	ELV104386	COUPLING - OLDHAM SET SCREW TYPE
10	1	ELV104354	BELT 32-7/32' X 11-3/4" WIDE
11	1	ELE68090	Oriental Motor 120W + DRIVE 220V, 15:1
12	2	ALI89325	ALUM. CARRIAGE FULL CLEARANCE ADJUSTABLE
13	3	ELV104335	Steel Extension Spring 5.812" LG.547" OD, .080" W.
14	3	ELV104398	SST EXTENSION SPRING ANCHOR STUD
15	1	612821	Siko dial counter DA04-0160
16	1	LAB67436	KNOB
17	2	LAB70860	HANDLE
18	6	CON76210	EXPANDABLE CAPTIVE FASTENER
19	17	28154	Knob ss for ribbo28154n advancement
20	9	29017	Compression spring (capper)
21	24	ELV104326	FLANGED BALL BEARING 12mm ID X 18mm OD X 4mm
22	4	ELV104416	KEYLESS BUSHING 12mm ID X 20mm OD
23	19	ELV110111	STRAIGHT RUNNING BELT 12" (QTY=FT)
24	1	ALI83634	Oriental Motor, 20:1, 200VAC, 200W
25	3	27049	Tee Thumbscrew knob M5 ( 100/box )
26	1	ELV104317	SHAFT COUPLING 12mm
27	1	ELV104318	SHAFT COUPLING 22mm
28	1	ELV104319	SHAFT COUPLING SPYDER
29	4	ELV110215	Metric Swivel Leveling Mount with Threaded Hole
30	8	LAB103464	M20 x 2,5mm THIN HEX NUT
31	4	ELV107201	KNOMB SST
32	2	ELV109763	ONEWAY BEARING 12mm BORE
33	1	ELE107652	Thrubeam M12-4p 20m Distance, Keyence
34	2	ELE69473	Bulgin -Male 4 pin screw connector (Buccaneer)
35	2	ELE69475	Bulgin -Male 6 pin screw connector (Buccaneer)
36	2	ELE69476	Bulgin -Female 6 pin screw connector (Buccaneer)
37	2	ELE91398	Cablek, Oriental Power Cable, Bulgin 4 pin, 3m BLA
100	1	ELV104392	PUSHER RIB
101	2	ELV104383	PUSHER LINK 2
102	1	ELV104346	BASE PLATE
103	1	ELV104393	BACK RIB
104	1	ELV104384	PUSHER LINK
105	2	ELV104368	PUSHER HOLDER
106	2	ELV104377	LINK BAR



# Customer Assemblies

P# 54967 Customer SAGER Foods Products Inc. Order Description Delta Cap 2 + Elevator

## Assembly List

Assembly No.	Qty	Assembly Name
<b>ASELV110110</b>	<b>1</b>	<b>CAP SORTING ELEVATOR 12"</b>

<u>Item #</u>	<u>Qty</u>	<u>Part Number</u>	<u>Part Name</u>
107	2	ELV104378	LINK BAR
108	3	ELV104395	SLIDE 38 in
109	1	654107DL	CONVEYOR END HERMA
110	2	654107	Conveyor end idler
111	2	CON74291	EXTRUSION
112	1	ELV104333	HABASIT CONVEYOR SIDE PLATE
113	1	ELV104387	MOTOR SPACER MOUNT
114	1	ELV104381	SPRING LINK PLATE
115	2	ELV104380	LINK BAR
116	2	ELV104356	LINK PLATE
117	3	ELV104396	SLIDE
118	1	ELV104371	LEXAN PANEL
119	2	ELV104407	TOP GUIDE
120	1	ELV104375	LEXAN SUPPORT BLOCK
121	4	ELV104322	WHEEL
122	1	ELV104323	BOTTOM PLATE
123	3	ELV104324	SLIDE
124	3	ELV104325	SLIDE
125	2	ELV104328	SPROCKET PUSHER
126	1	ELV104415	DRIVEN SPROCKET PUSHER
127	1	ELV104329	PUSHER SPACER PLATE
128	2	ELV104379	AXLE SUPPORT PLATE
129	95	ELV110113	ELEVATOR GREY PVC CLEAT
130	2	ELV104337	LAB91395 MOD
131	1	ELV109950	RETAINING WALL
132	1	ELV109967	RETAINING WALL
133	1	ELV104413	UPPER GUIDE
134	1	ELV104408	TOP OUTFEED GUIDE
135	2	ELV104410	WHEEL
136	1	ELV109960	MOTOR SUPPORT
137	1	ELV109959	EXIT GUIDE
138	1	ELV109958	OUTFEED GUIDE
139	1	ELV109969	SUPPORT FOR ANTI REBOUND ROD
140	1	ELV109966	BOTTOM CAP DEFLECTOR
141	1	ELV109807	CAP PIVOTING BLOCKER
142	1	ELV109808	CAP PIVOTING BLOCKER
143	2	ELV107345	TIGNER
144	2	ELV107344	LINK
147	1	ELV110119	SLIDING DOOR
148	1	ELV110120	TOP LEXAN
149	1	ELV110526	COUNTER REBOUND ROD
150	2	ELV113737	UMHW DEFLECTOR
200	1	ELV104336	ADJUSTEMENT ROD
201	2	ELV104394	PUSHER SHAFT



# Customer Assemblies

P# 54967 Customer SAGER Foods Products Inc. Order Description Delta Cap 2 + Elevator

## Assembly List

Assembly No.	Qty	Assembly Name
<b>ASELV110110</b>	<b>1</b>	<b>CAP SORTING ELEVATOR 12"</b>

Item #	Qty	Part Number	Part Name
202	1	ELV104353	DRIVER ROLLER
203	1	ELV104351	IDLER ROOLER
204	1	ELV104369	IDLER SHAFT
205	1	CON447	In between support CONV 12"
206	1	ELV104339	AXLE2
207	1	ELV104342	IDLER
208	1	623461DL	Extension for dial
209	12	ELV104352	IDLER SPROCKET
210	4	ELV104385	IDLER SPROCKET
211	1	ELV104327	SPROCKET AXLE 12mm
212	1	ELV104330	PUSHER THREADED ROD
213	2	ELV104382	SPACER FOR BEARING
214	1	ELV104350	IDLER SHAFT
215	2	ELV109737	BEARING HOUSING
216	4	ELV107341	AXLE
218	2	ELV104397	SPACER
219	4	ELV110216	THREADED ROD M20x2.5
220	2	ELV109816	SPACER
221	1	ELV110112	BELT DRIVE SHAFT
300	2	ELV104402	STIFFNER PLATE
301	1	ELV104405	LEFT SIDE STIFFNER
302	1	ELV104406	RIGHT SIDE STIFFNER
303	1	ELV104357	COVER
304	1	ELV104370	LATERAL STIFFNER
305	1	ELV104345	BACK BOTTOM STIFFNER PLATE
306	1	ELV104355	12" SLIDE PLATE
307	2	CON448	In/between plate
308	2	ELV104365	AXLE SUPPORT PLATE 1
309	2	ELV104359	FLANGE
310	1	ELV104360	BACK DOOR
311	1	ELV110114	TOP STIFFNER
312	2	ELV110602	DEFLECTOR PLATE
313	1	ELV107204AA	BACK COVER
314	1	ELV109978AA	FISH PLATE
315	1	ELV114220	ELV CAP BLOCKER
316	1	ELV113095	HOLE COVER PLATE
400	1	ELV104403	SHEET LEFT SIDE STIFFNER
401	1	ELV104404	SHEET RIGHT SIDE STIFFNER
402	1	ELV104366	SUPPORT PLATE
403	1	ELV104401	SUPPORT
404	1	ELV104376	SPRING PLATE LINK
405	1	ELV104367	UPPER FLOOR
406	1	ELV104373	LEXAN SUPPORT BRACKET
407	2	ELV110122	SENSOR SUPPORT



# Customer Assemblies

**P#**                      **Customer**                      **Order Description**  
**54967**                      **SAGER Foods Products Inc.**                      **Delta Cap 2 + Elevator**

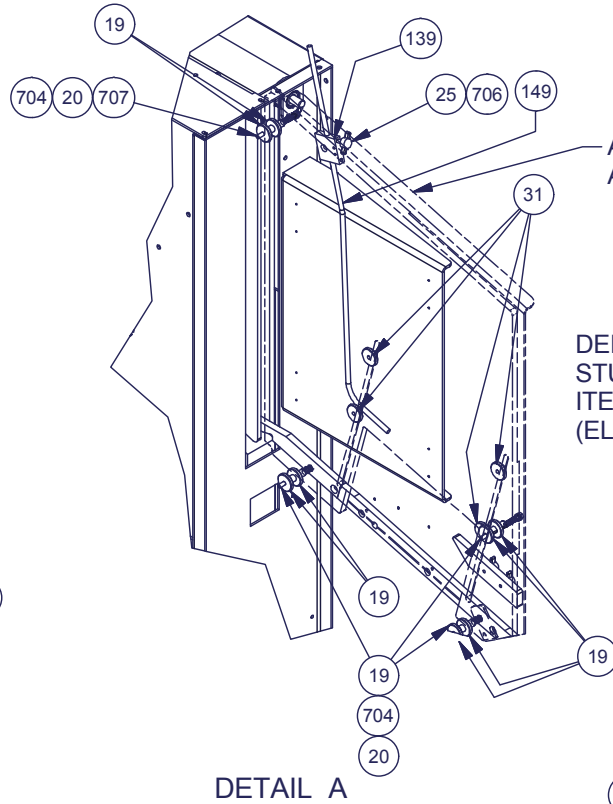
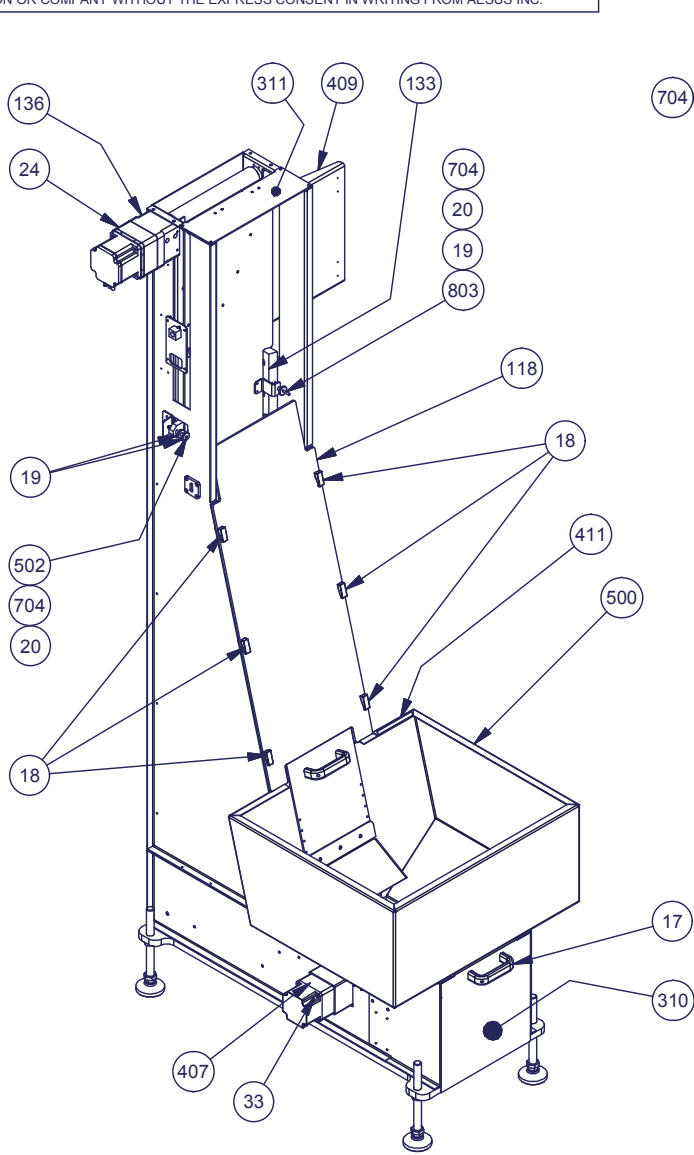
## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASELV110110</b>	<b>1</b>	<b>CAP SORTING ELEVATOR 12"</b>

<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
408	1	SLV105554	ADJUSTMENT STOPPER
409	1	ELV109751	MAIN EXIT PLATE HOLDER
410	1	ELV105648	LEXAN SUPPORT BRACKET
411	1	ELV107967	CHUTE ATTACH
412	1	ELV110117	BRUSH HOLDER
413	1	ELV110118	SLIDING DOOR DEFLECTOR
414	1	ELV110124	BELT DEFLECTOR
415	1	ELV110603	CAP PLATE LH
416	1	ELV110604	CAP PLATE RH
417	1	ELV109977AA	DEFLECTOR
500	1	ELV110074	CAP HOPPER
501	1	ELV110125	SLIDE ROD
502	1	ELV034	Non standard screw 3 1/4"
503	1	ELV109738	LEXAN ANGLE SUPPORT
504	2	ELV104374	LEXAN ANGLE SUPPORT
505	1	ELV109948	RH SIDE PANEL
506	1	ELV109949	LH MOTOR SIDE PANEL
507	1	ELV109968	RIGHT SIDE PANEL
508	1	ELV109975	RIGHT SIDE PANEL
509	1	ELV109940	LEXAN SUPPORT BRACKET
510	1	ELV110123	AIR RAMP
700	8	BOU6024	Button socket cap screw M6 x 16 ISO 7380
701	12	BOU3100	Dowell pin M5 x12
702	2	BOU3026	Socket set screw DIN 916
703	1	BOU6021	Button socket cap screw M6 x 10 ISO 7380
704	20	BOU5020	Flat washer (.375 x .177 x .032)
705	3	ELV104400	THREADED STUD
706	1	BOU1031	Socket cap screw DIN 912 M5 x 30
707	4	ELV033	Hex head M5 x 70mm full thread

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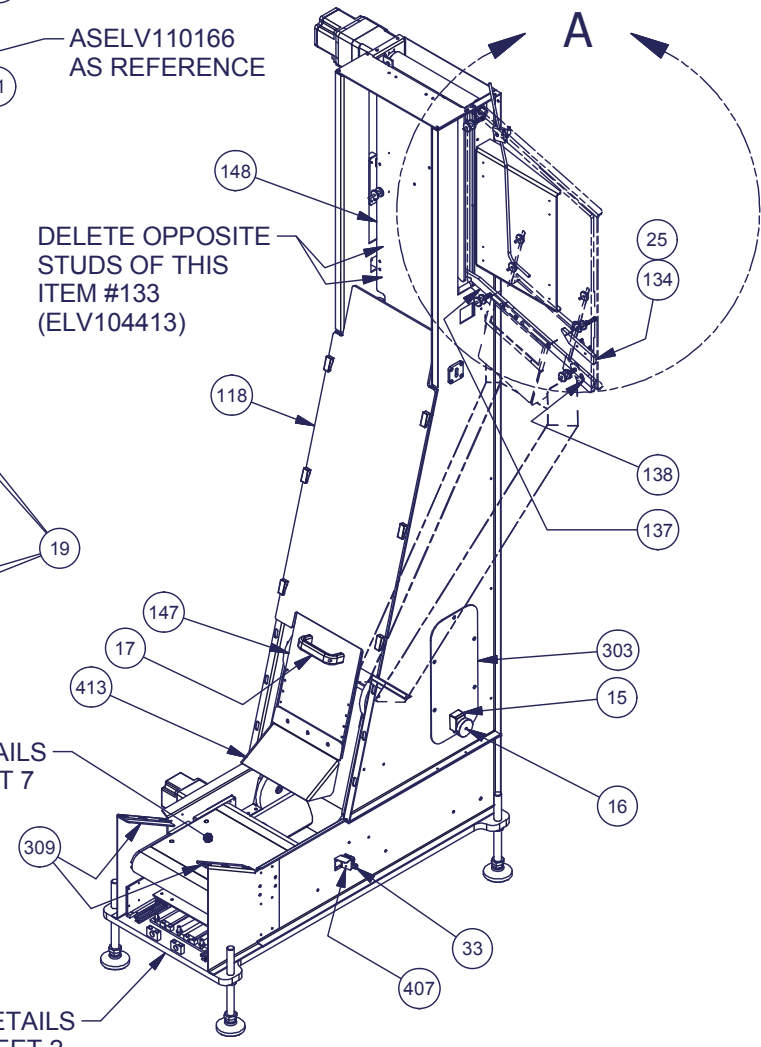


ASELV110166  
AS REFERENCE

DELETE OPPOSITE  
STUDS OF THIS  
ITEM #133  
(ELV104413)

SEE DETAILS  
ON SHEET 7

SEE DETAILS  
ON SHEET 2

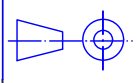


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**AESUS**

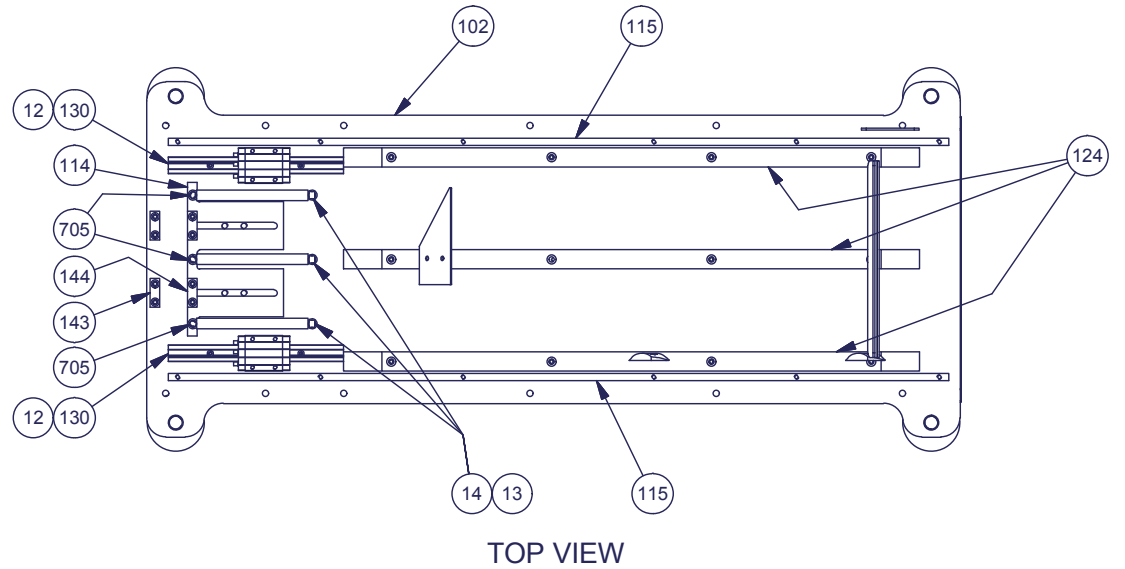
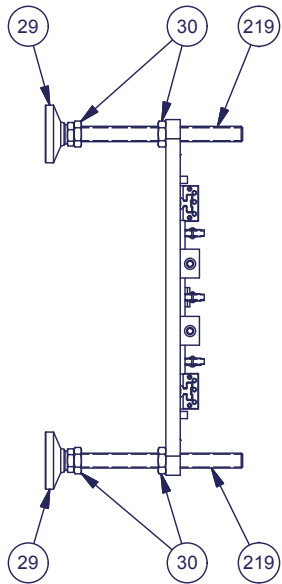
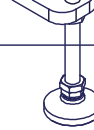
188 ONEIDA DRIVE      TEL: (514) 694-3439  
 POINTE CLAIRE, QUEBEC      FAX: (514) 694-4107  
 CANADA H9R 1A8      EMAIL: contactus@aesus.com

MACHINE:	SHEET: 1 OF 7
TITLE: CAP SORTING ELEVATOR 12"	
DWG NO: <b>ASELV110110</b>	REV: 0



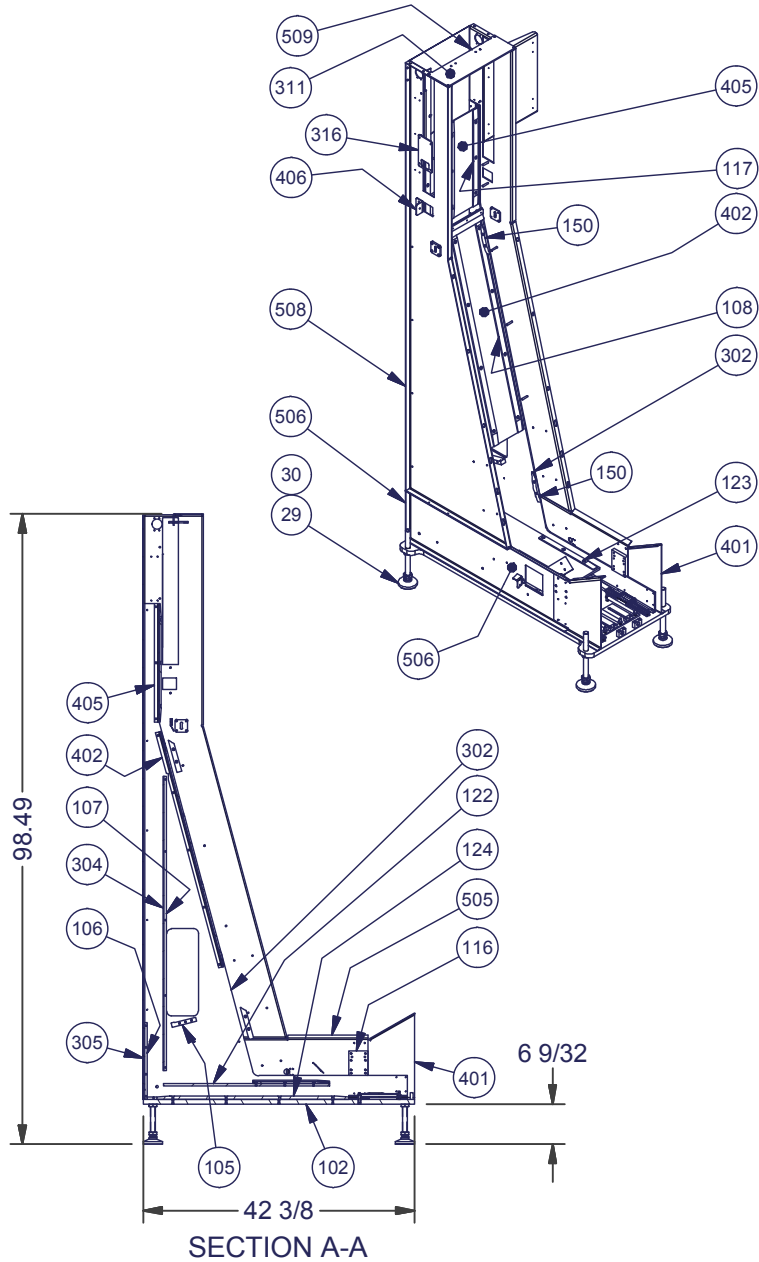
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ISO VIEW

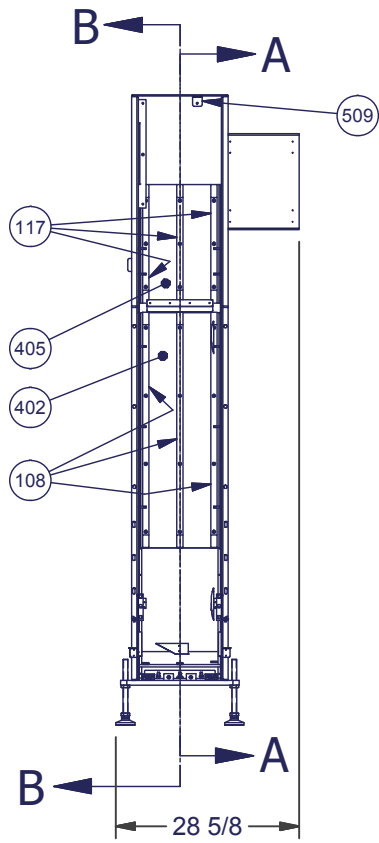


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			MAT'L TREATMENT:		TITLE: CAP SORTING ELEVATOR 12"	REV: 0
DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .005 FRACTIONS / FRACTIONS: ± 1/64 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES				188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8	TEL: (514) 694-3439 FAX: (514) 694-4107 EMAIL: contactus@aesus.com	DWG NO: ASELV110110

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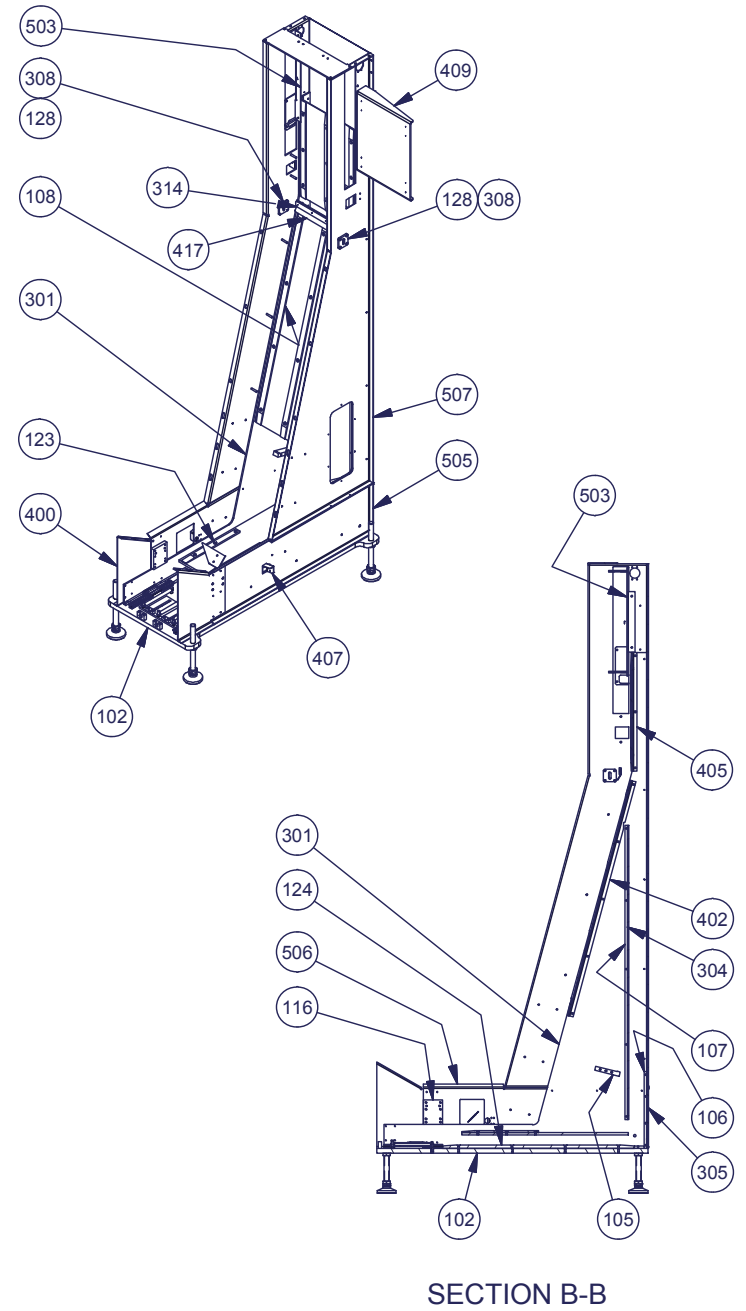


SECTION A-A



B

SECTION B-B

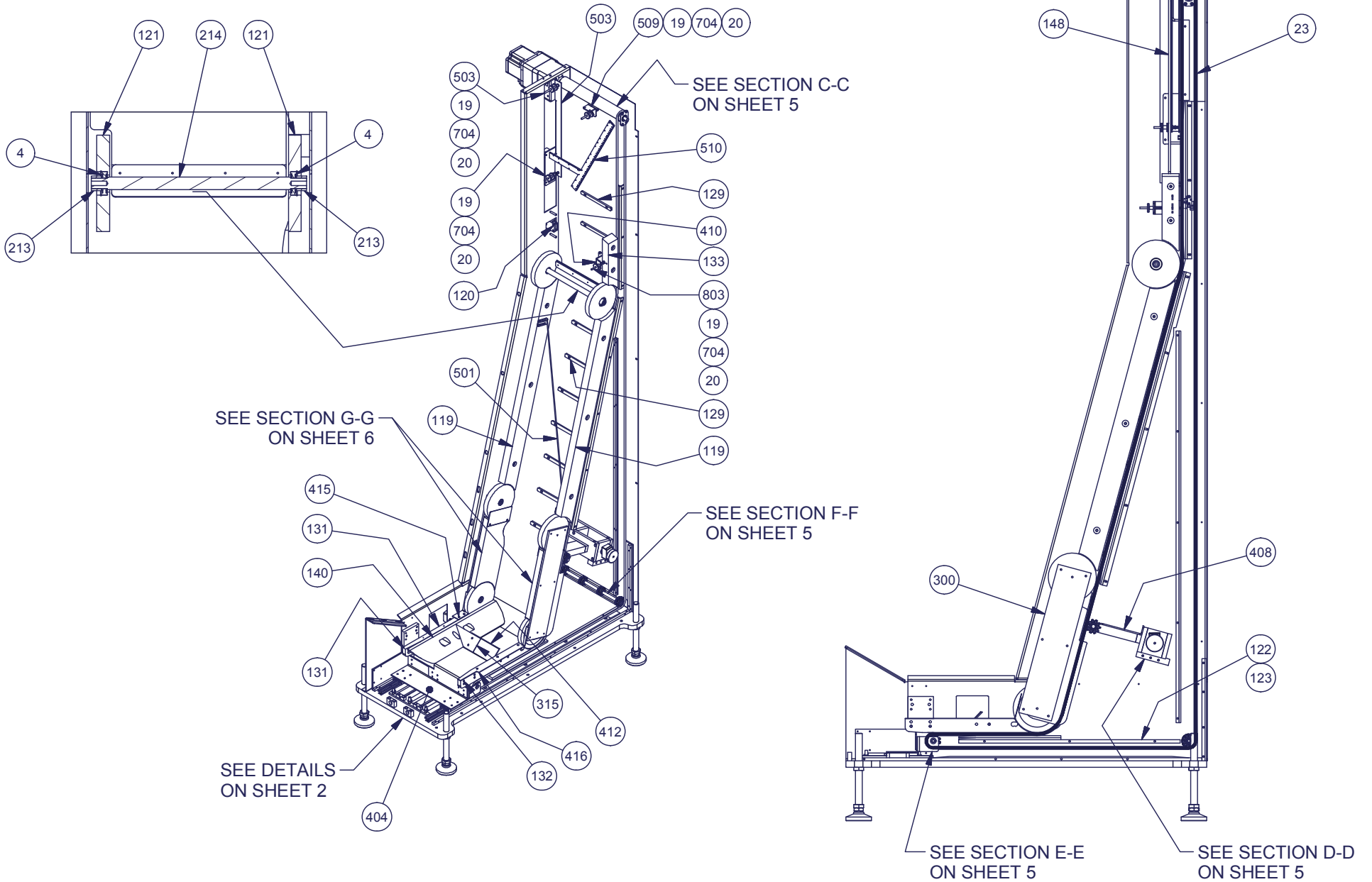



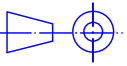
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DRAWN BY: F.S.	DATE: 04/07/2016	CHECKED BY:	MATERIAL:		MACHINE:	SHEET: 3 OF 7
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188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8				TEL: (514) 694-3439 FAX: (514) 694-4107 EMAIL: contactus@aesus.com	DWG NO: ASELV110110	

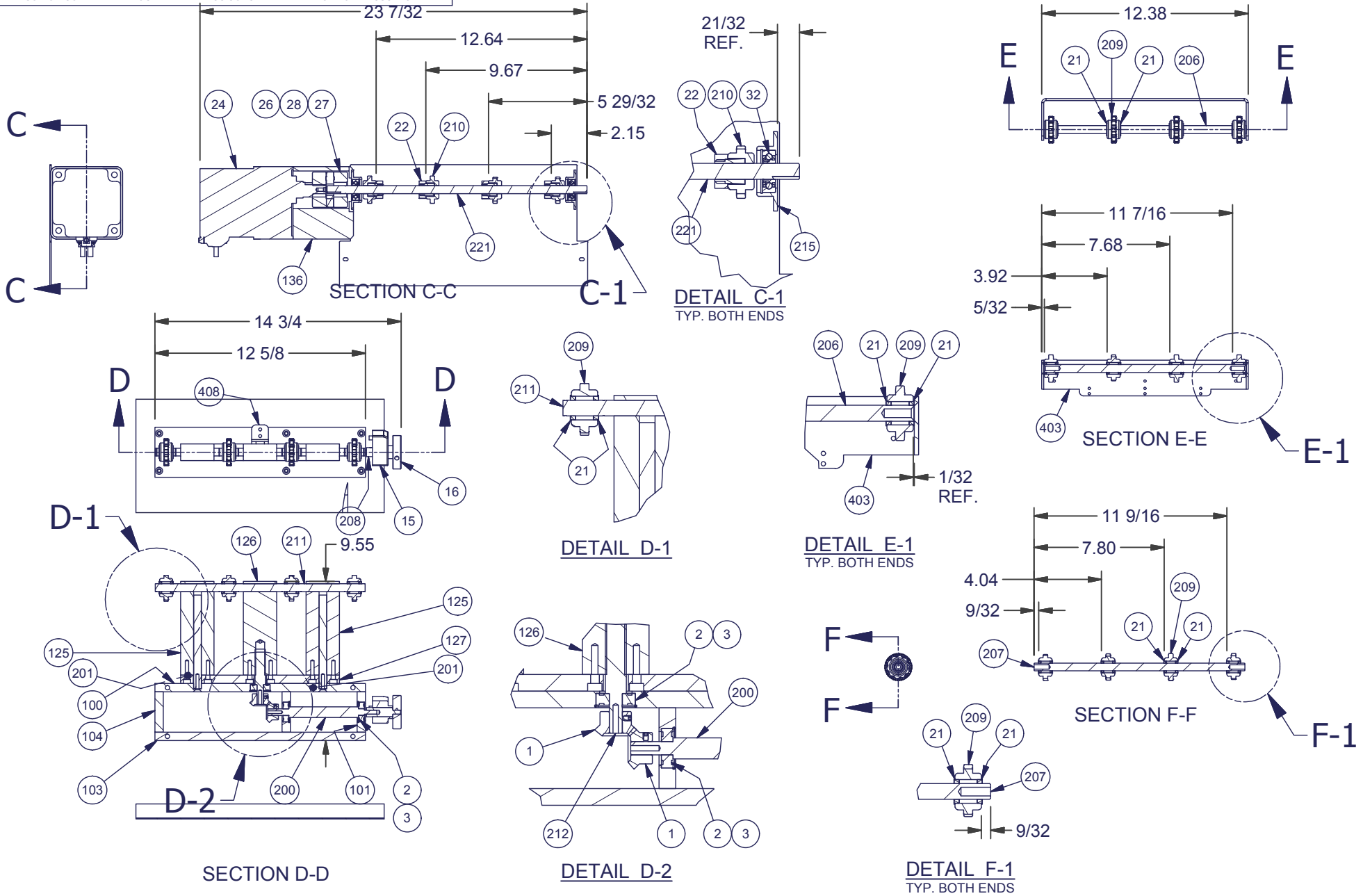


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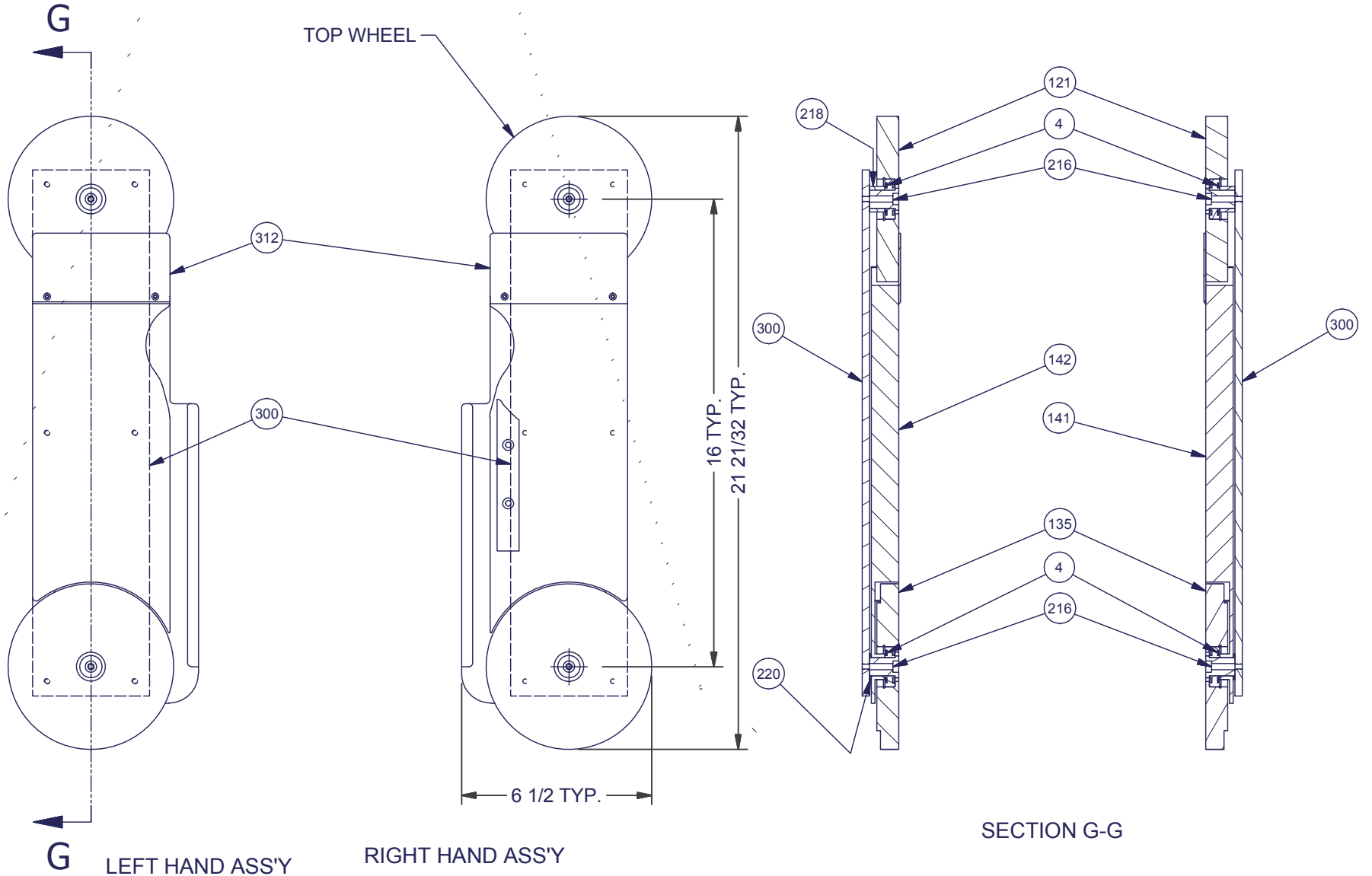


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				188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8 EMAIL: <a href="mailto:contactus@aesus.com">contactus@aesus.com</a>	TEL: (514) 694-3439 FAX: (514) 694-4107	DWG NO: ASELV110110

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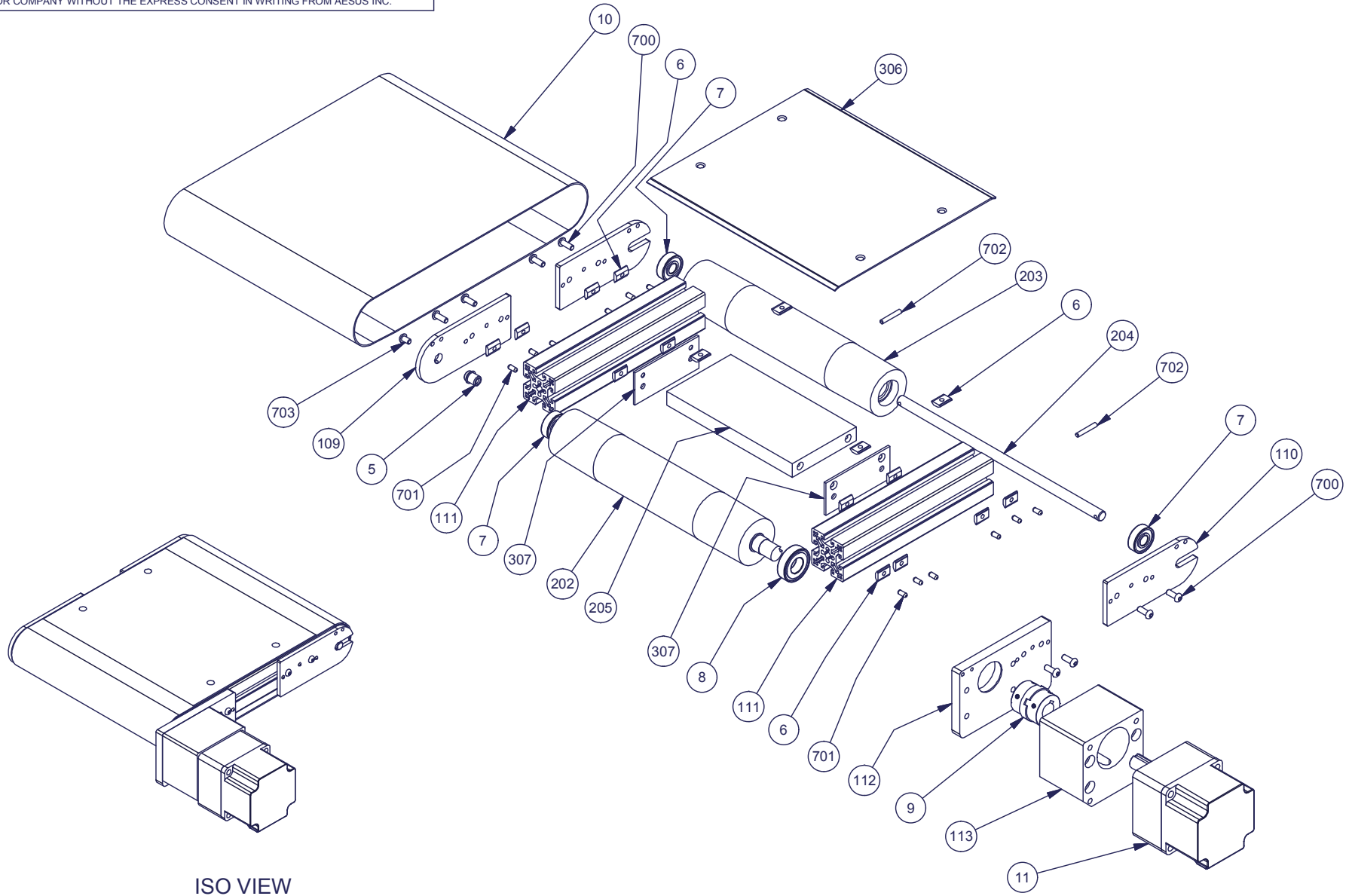


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188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8				TEL: (514) 694-3439 FAX: (514) 694-4107 EMAIL: contactus@aesus.com	DWG NO: ASELV110110	




DRAWN BY: F.S	DATE: 04/07/2016	CHECKED BY:	MATERIAL:	MACHINE:	SHEET: 6 OF 7
DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .005 FRACTIONS / FRACTIONS: ± 1/64 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES			MAT'L TREATMENT:	TITLE: CAP SORTING ELEVATOR 12"	REV: 0
				DWG NO: ASELV110110	
188 ONEIDA DRIVE      TEL: (514) 694-3439 POINTE CLAIRE, QUEBEC      FAX: (514) 694-4107 CANADA H9R 1A8      EMAIL: contactus@aesus.com					

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ISO VIEW

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DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .005 FRACTIONS / FRACTIONS: ± 1/64 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES			MAT'L TREATMENT:	TITLE: CAP SORTING ELEVATOR 12"	REV: 0
				DWG NO:	ASELV110110
188 ONEIDA DRIVE POINTE CLAIRE, QUEBEC CANADA H9R 1A8 EMAIL: contactus@aesus.com				TEL: (514) 694-3439 FAX: (514) 694-4107	



# Customer Assemblies

<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

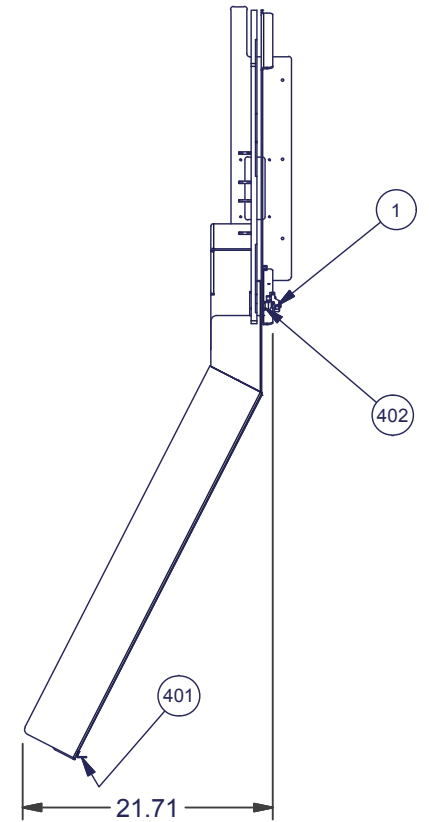
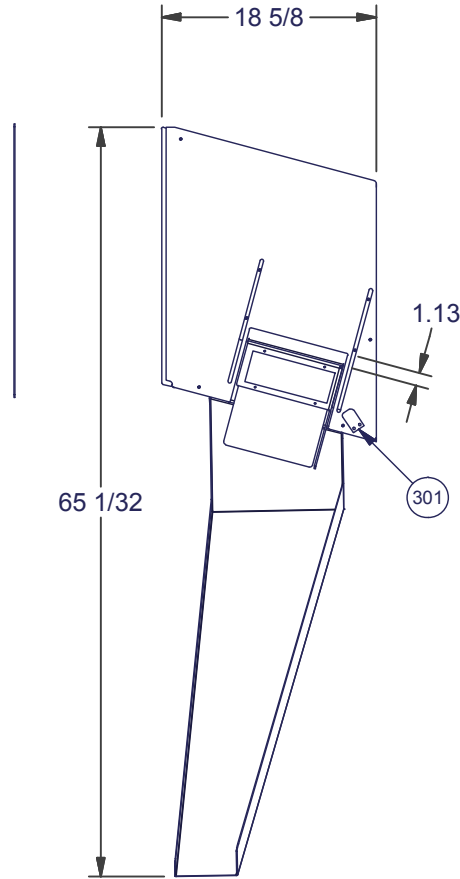
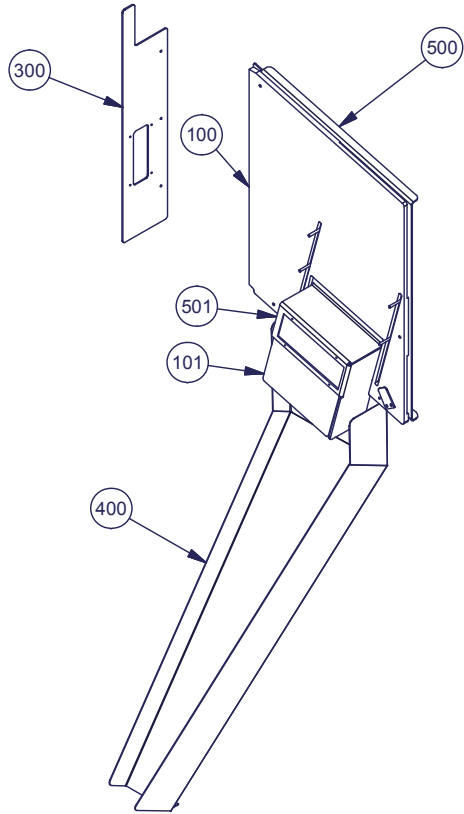
## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASELV110166</b>	<b>1</b>	<b>RH-CAP SORTING ELEVATOR EXIT</b>

<u>Item #</u>	<u>Qty</u>	<u>Part Number</u>	<u>Part Name</u>
1	1	ELE80601	Reflective sensor PNP dark on Sick M12 24Vdc
2	1	ELE93318	M12-3P, female cable 90deg, PVC, 5M, IFM
100	1	ELV109765	OUTFEED LEXAN
101	1	ELV106128	WINDOW
300	1	ELV110121	COVER PLATE
301	1	ELV114534	ELEVATOR REFLECTOR HOLDING BRACKET
400	1	ELV104349	REJECT CHUTE
401	1	ELV107967	CHUTE ATTACH
402	1	ELV114533	ELEVATOR SENSOR HOLDING BRACKET
500	1	ELV109745	MAIN EXIT PLATE
501	1	ELV107200	TRAP

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F.S

DATE:  
04/07/2016

CHECKED BY:

MATERIAL:

MACHINE:

SHEET:  
1 OF 1

DECIMALS / DECIMAUX: .xx ± .01  
 DECIMALS / DECIMAUX: .xxx ± .005  
 FRACTIONS / FRACTIONS: ± 1/64  
 ANGULAR / ANGULAIRE: ± 0.5°  
 BREAK ALL SHARP EDGES /  
 BRISER TOUTES LES ARRETES

MAT'L TREATMENT:

**AESUS**

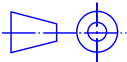
188 ONEIDA DRIVE TEL: (514) 694-3439  
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 CANADA H9R 1A8 EMAIL: contactus@aesus.com

TITLE: RH-CAP SORTING ELEVATOR EXIT

DWG NO:

**ASELV110166**

REV:  
0





# Customer Assemblies

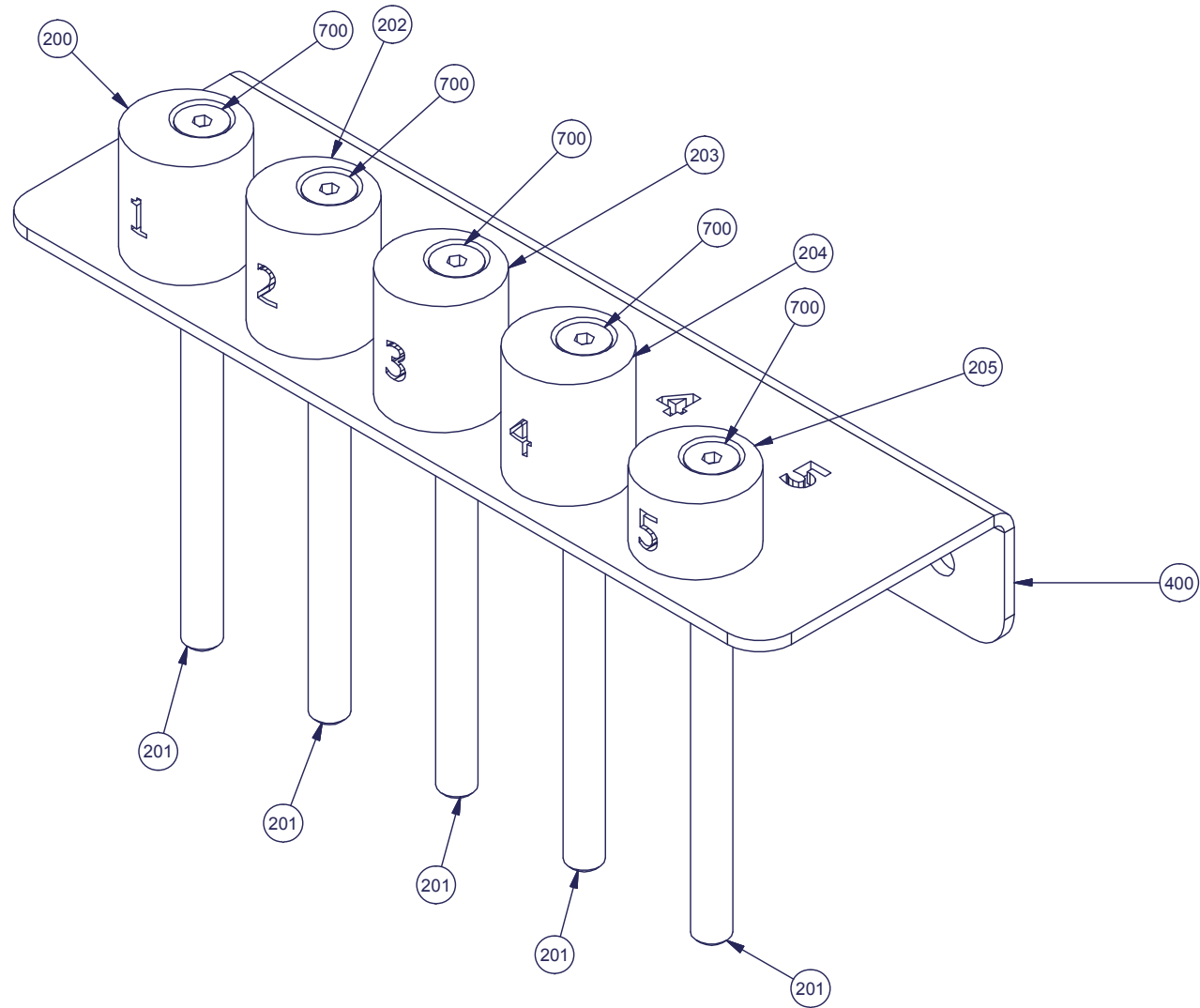
<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>

## Assembly List

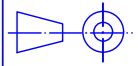
<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASELV114369</b>	<b>1</b>	<b>ELEVATOR CAP SPACER TOOLING</b>

<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
200	1	ELV114344	ELEVATOR CAP SPACER TOOLING FOR CAP 1
201	5	ELV114349	ELEVATOR CAP SPACER TOOLING EXTENSION
202	1	ELV114345	ELEVATOR CAP SPACER TOOLING FOR CAP 2
203	1	ELV114346	ELEVATOR CAP SPACER TOOLING FOR CAP 3
204	1	ELV114347	ELEVATOR CAP SPACER TOOLING FOR CAP 4
205	1	ELV114348	ELEVATOR CAP SPACER TOOLING FOR CAP 5
400	1	ELV114370	CAP SPACER TOOLING HOLDER
700	5	BOU2013	Flat socket cap screw DIN 7991

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**AESUS**

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 CANADA H9R 1A8 EMAIL: [contactus@aesus.com](mailto:contactus@aesus.com)

MACHINE:	SHEET: 1 OF 1
TITLE: ELEVATOR CAP SPACER TOOLING	
DWG NO: <b>ASELV114369</b>	REV: 0





# Customer Assemblies

*P#*                      *Customer*                      *Order Description*  
**54967**                      **SAGER Foods Products Inc.**                      **Delta Cap 2 + Elevator**

## Assembly List

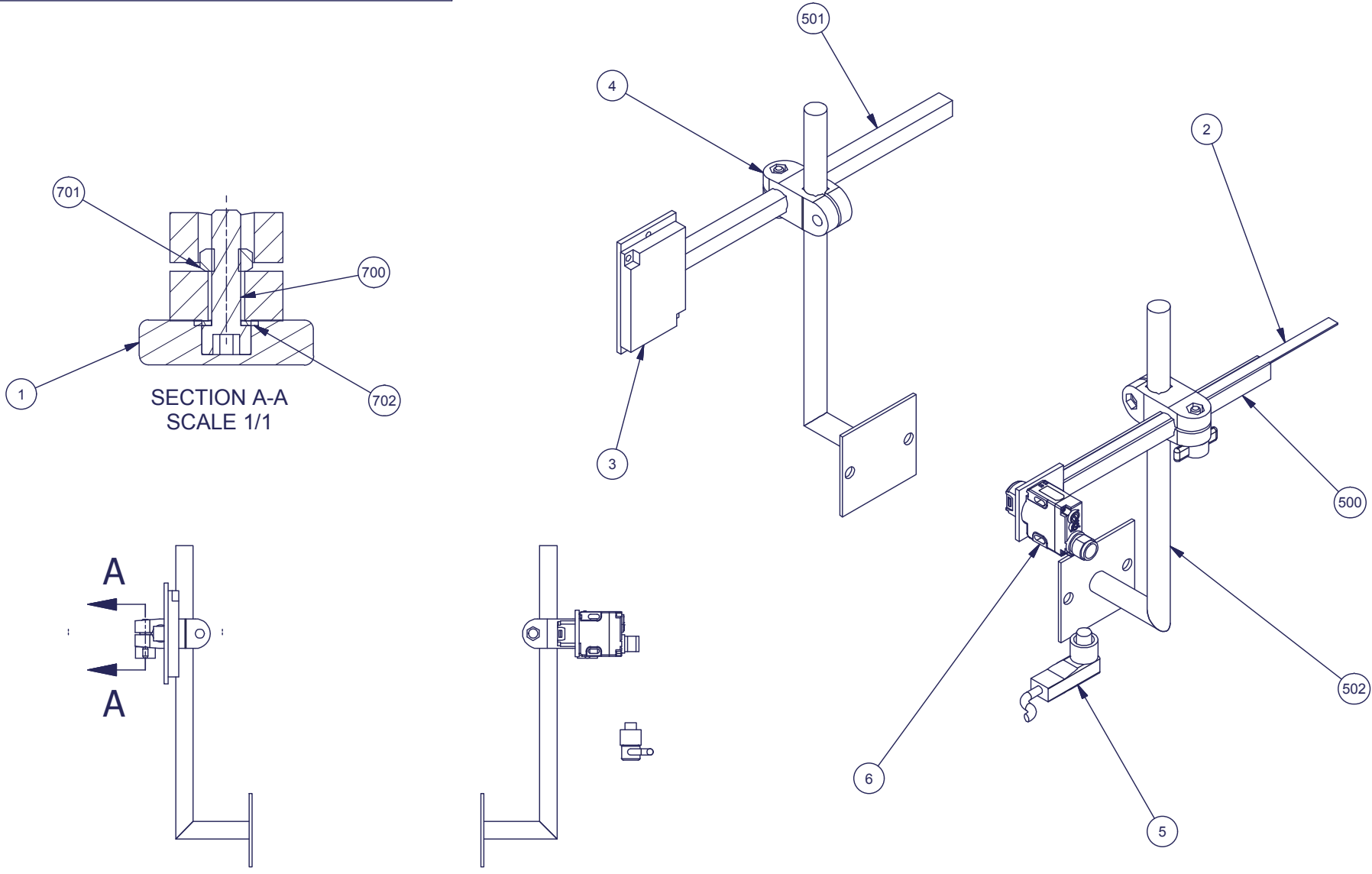
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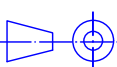
<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASLAB110155</b>	<b>1</b>	<b>PRODUCT CLEAR SENSOR FOR CAPPER AND LABELLER</b>

---

<u>Item #</u>	<u>Qty</u>	<u>Part Number</u>	<u>Part Name</u>
1	2	27049	Tee Thumbscrew knob M5 ( 100/box )
2	2	29075	Graduated Ruler 0-80
3	1	33030	Reflector Omron (Black)
4	2	611638	Cross block 12mm
5	1	97323	Female M12 Cable 90 deg., 4pin, 5m, IFM
6	1	ELE106459	Reflect Clear Sensor, M12-4P, KEYENCE
500	1	LAB847	Photocell support 6" Lg
501	1	MIS1373	REFLECTOR SUPPORT FOR 33030
502	2	PAP366	Bracket support photocell 8"
700	2	BOU1029	Socket cap screw DIN 912 / M5 X 20
701	2	BOU4002	Finish hex nut DIN 934
702	2	BOU5021	Flat washer (.437 x .203 x .032)

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DRAWN BY: O.Leblanc	DATE: 04/07/2016	CHECKED BY:	MATERIAL:	 188 ONEIDA DRIVE TEL: (514) 694-3439 POINTE CLAIRE, QUEBEC FAX: (514) 694-4107 CANADA H9R 1A8 EMAIL: contactus@aesus.com	MACHINE:	SHEET: 1 OF 1
 DECIMALS / DECIMAUX: .xx ± .01 DECIMALS / DECIMAUX: .xxx ± .005 FRACTIONS / FRACTIONS: ± 1/64 ANGULAR / ANGULAIRE: ± 0.5° BREAK ALL SHARP EDGES / BRISER TOUTES LES ARRETES			MAT'L TREATMENT:		TITLE: PRODUCT CLEAR SENSOR FOR CAPPER AND LABELLER	REV: 0
				DWG NO:	ASLAB110155	



# Customer Assemblies

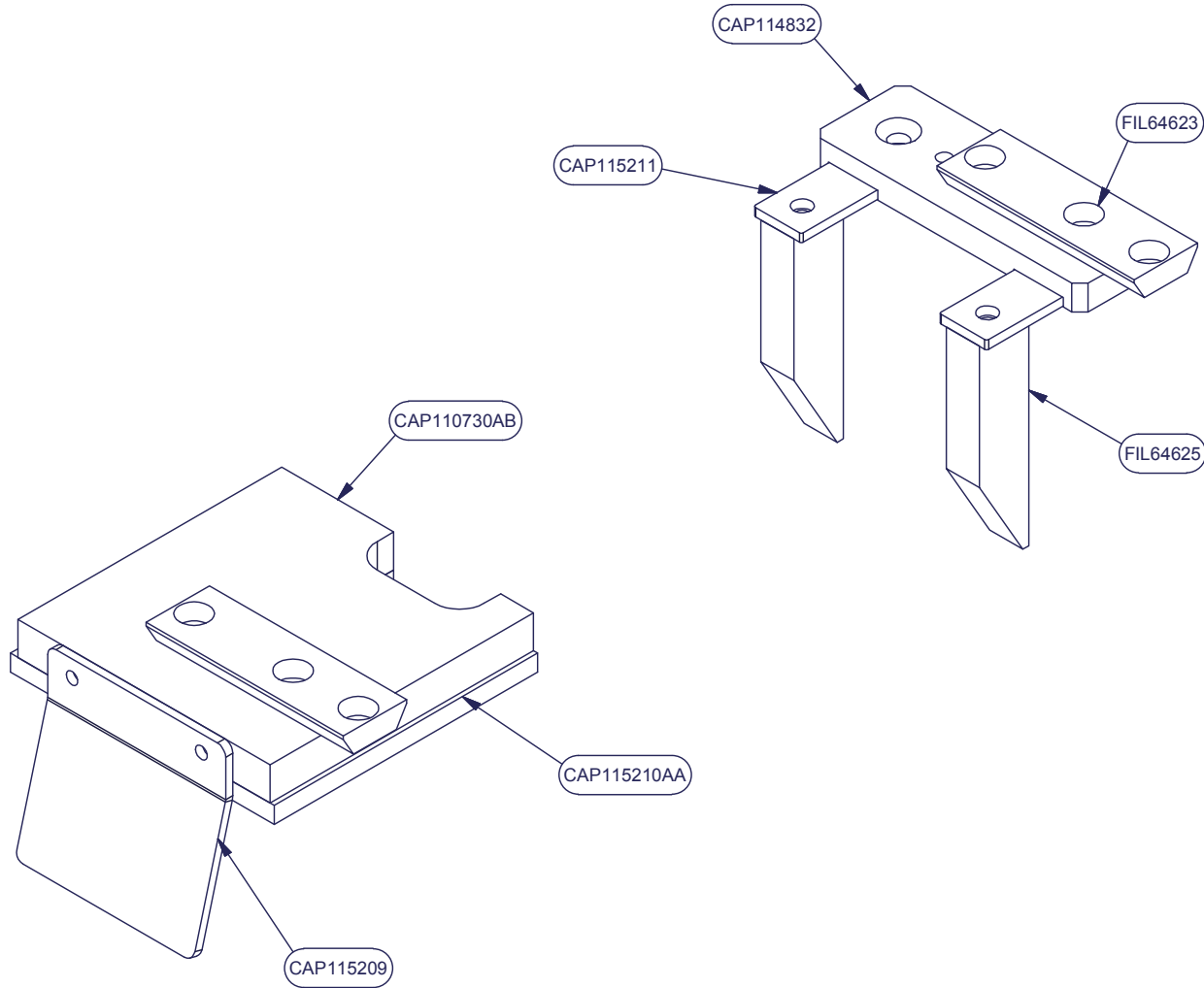
<i>P#</i>	<i>Customer</i>	<i>Order Description</i>
<b>54967</b>	<b>SAGER Foods Products Inc.</b>	<b>Delta Cap 2 + Elevator</b>


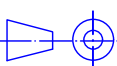
## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ASTOOL54967-2</b>	<b>1</b>	<b>P54967 TOOLING</b>

<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
1	1	CAP115210AA	RUBBER BACKPLATE 4"X4"
100	1	CAP110730AB	STOPPER PLATE FOR FINGER
101	2	FIL64623	DOVETAIL MOUNT
102	1	CAP114832	DOVETAIL MOUNT FINGER PLATE
103	2	FIL64625	STOP FINGER
300	2	CAP115211	FINGER HOLDER
400	1	CAP115209	STOPPING FINGER

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DRAWN BY: A.CHENIER	DATE: 26/04/2017	CHECKED BY:	MATERIAL:	 <p>188 ONEIDA DRIVE TEL: (514) 694-3439          POINTE CLAIRE, QUEBEC FAX: (514) 694-4107          CANADA H9R 1A8 EMAIL: <a href="mailto:contactus@aesus.com">contactus@aesus.com</a></p>	MACHINE:	SHEET: 1 OF 1
 <p>DECIMALS / DECIMAUX: .xx ± .01          DECIMALS / DECIMAUX: .xxx ± .005          FRACTIONS / FRACTIONS: ± 1/64          ANGULAR / ANGULAIRE: ± 0.5°          BREAK ALL SHARP EDGES /          BRISER TOUTES LES ARRETES</p>			MAT'L TREATMENT:		TITLE: P54967 TOOLING	
					DWG NO: <b>ASTOOL54967</b>	REV: 0



# Customer Assemblies

**P#**                      **Customer**                      **Order Description**  
**54967**                      **SAGER Foods Products Inc.**                      **Delta Cap 2 + Elevator**

## Assembly List

<i>Assembly No.</i>	<i>Qty</i>	<i>Assembly Name</i>
<b>ELCAP203</b>	<b>1</b>	<b>DeltaCap1, Servo Inline, 208V, AB + Servo Chuck</b>

<i>Item #</i>	<i>Qty</i>	<i>Part Number</i>	<i>Part Name</i>
1	1	ELE66131	Main Switch 3 pole - 25A l th, Kraus
2	1	35084	Plug 250V-15A black & yellow Pass & Seymour
3	1	35093B	Contactora 3P FVNR 9A Frame B 1NC 24VDC Coil
4	7	ELE1436	FUSE HOLDER DOUBLE CC TYPE
5	2	ELE66222	12 AMP FUSE ATMR
5	6	ELE895	4 AMP FUSE ATMR
6	4	ELE1230	6 AMP Fuse ATMR
7	4	ELE1074	3 AMP Fuse ATMR
8	1	35009	Green Pushbutton Cutler Hammer
9	1	35029	Red Pushbutton Cutler-Hammer
10	1	ELE598	Blue Pushbutton Cuttler Hammer
11	1	35008	EMERGENCY STOP
12	2	35014	Contact NO = base Cutler-Hammer
13	3	35015	Contact NC = base Cutler-Hammer
14	4	ELE85477	Slim Relay, SPDT, 24Vdc, 6A, Phoenix Contact
15	2	ELE85479	Slim Relay, DPDT, 24Vdc, 6A, Phoenix Contact
16	1	ELE101831	Safety Relay, Dual Channel Inputs, 24Vdc, AB
17	10	35085	Grey 4 cond. Terminals Wago
18	6	35086	Blue 4 cond. Terminal Wago
19	6	35087	Orange 4 cond. Terminal Wago
20	4	35088	Ground 4 cond Terminal Wago
21	2	35089	Lock block terminal Wago
22	16	35090	Jumper for wago
23	1	ELE70227	Omron Power Supply 24VDC 60W
23	10	35094	Side Plate For WAGO 4 Cond Terminals
24	1	ELE78729	Micro Logix 1400, 32 PT, DC IO, 24Vdc
25	1	ELE1282	Micrologix 1100-1200-1400, 16 output card
26	1	ELE1281	Micrologix Expansion Module, 16 Input Connectio
27	1	ELE1015	4 output analog for Micrologix 1200
28	1	ELE90203	Panelview Plus 6 Compact, Ethernet, 5.5 in, 24Vdc
29	1	ELE90942	Ethernet Switch, 5 port, 24Vdc, Advantech
30	1	ELE81826	Ethernet Cable Cat 5e RJ45 Shielded 16.5ft
31	1	EDT-41038	5E PATCH CORD, 1Ft, Black
32	1	ELE88541	RJ45 Inline Coupler (Female to female)
33	1	ELE74742	Wago 3 pin connector male
34	1	ELE74743	Wago 3 pin connector female
35	1	ELE78067	Wago 6 pin connector Female
36	1	ELE78068	Wago 6 pin connector Male
43	3	97450	Cable M8 4p straight 5m Lg for sensopart
46	3	ELE93319	M12-3P female cable straight, PVC, 5M, IFM
47	1	97304	Plug (adaptor) M12 black / Male

---

## Appendix 2: Electrical Drawings

PAGE #	DRAWING DESCRIPTION
00	INDEX OF DRAWING NUMBERS
01	POWER DIAGRAM - DISTRIBUTION
02	POWER DIAGRAM - SAFETY
03	
04	POWER DIAGRAM - FRONT INDEXING WHEEL
05	POWER DIAGRAM - REAR INDEXING WHEEL
06	
07	
08	
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10	POWER DIAGRAM - CAP ELEVATOR
11	
12	
13	POWER DIAGRAM - HOUSE LIFT UP/DOWN
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15	
16	POWER DIAGRAM - BIN BELT
17	POWER DIAGRAM - CAPPER CHUCK
18	
19	POWER DIAGRAM - TORQUER CHUCK (POWER)
20	POWER DIAGRAM - TORQUER CHUCK (I/O)
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28	POWER DIAGRAM - PLC/HMI
29	

PAGE #	DRAWING DESCRIPTION
30	PLC BUILT-IN INPUT
31	PLC BUILT-IN INPUT
32	PLC EXPANSION INPUT
33	PLC EXPANSION INPUT
34	
35	
36	
37	
38	
39	
40	PLC BUILT-IN OUTPUT
41	PLC BUILT-IN OUTPUT
42	PLC EXPANSION OUTPUT
43	PLC EXPANSION OUTPUT
44	PLC EXPANSION OUTPUT
45	PLC EXPANSION OUTPUT
46	
47	
48	
49	
50	PLC EXPANSION ANALOG OUTPUT
51	PLC EXPANSION ANALOG OUTPUT
52	
53	
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56	
57	
58	
59	

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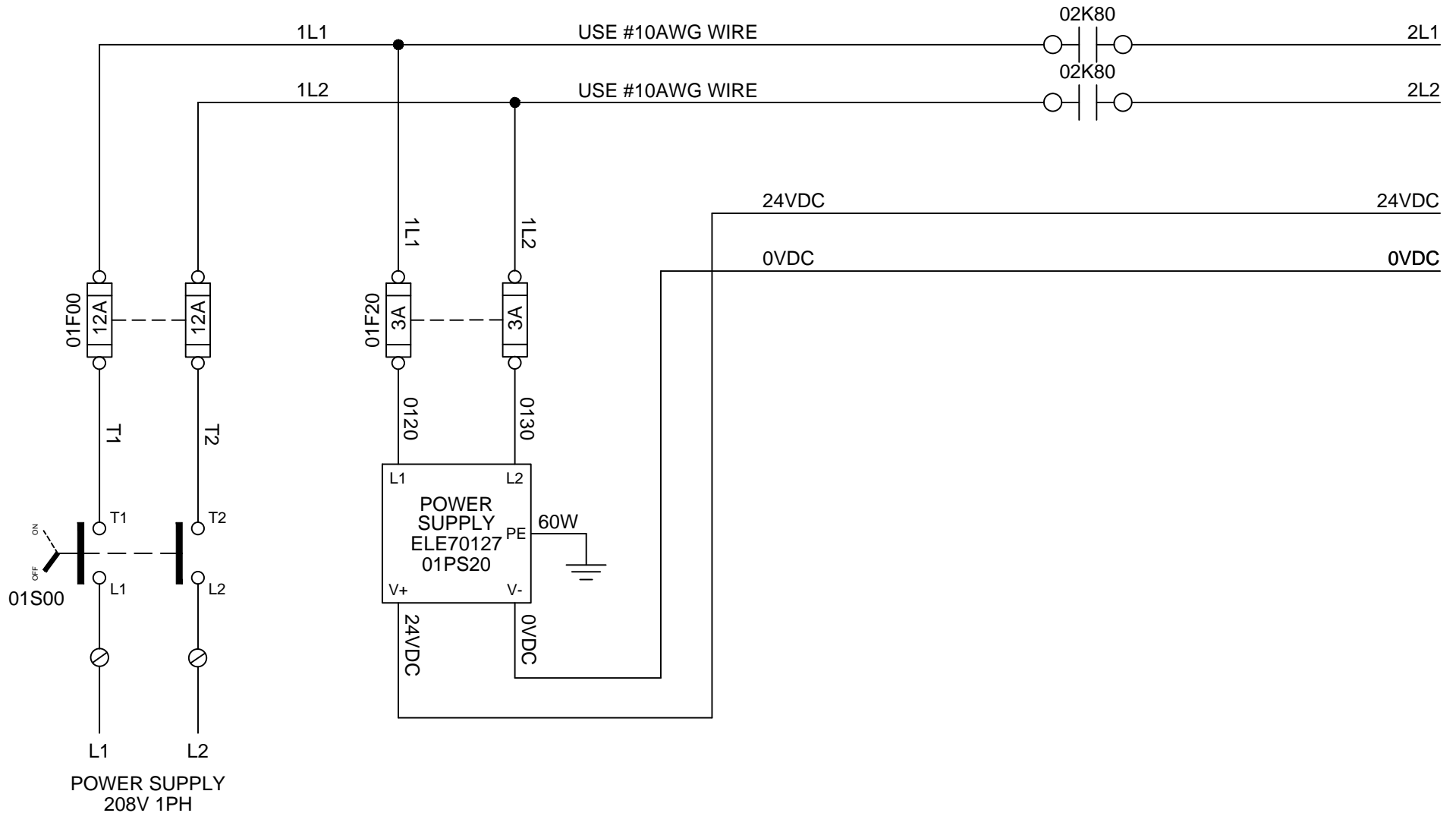


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TITLE: **INLINE GATING DELTA CAP 2  
 ELECTRICAL DRAWING**

DRAWN BY:  
**Paul Matthew Benavides**

DRAWING INFORMATION: V0.3: Update Panasonic X4 cable (V10 to V11) - PMB 2016-12-06  
 V1.0: As Built - RL 2016-12-15  
 V1.1: Change Sensors/Added Infeed Sensor - RL 2017-04-18



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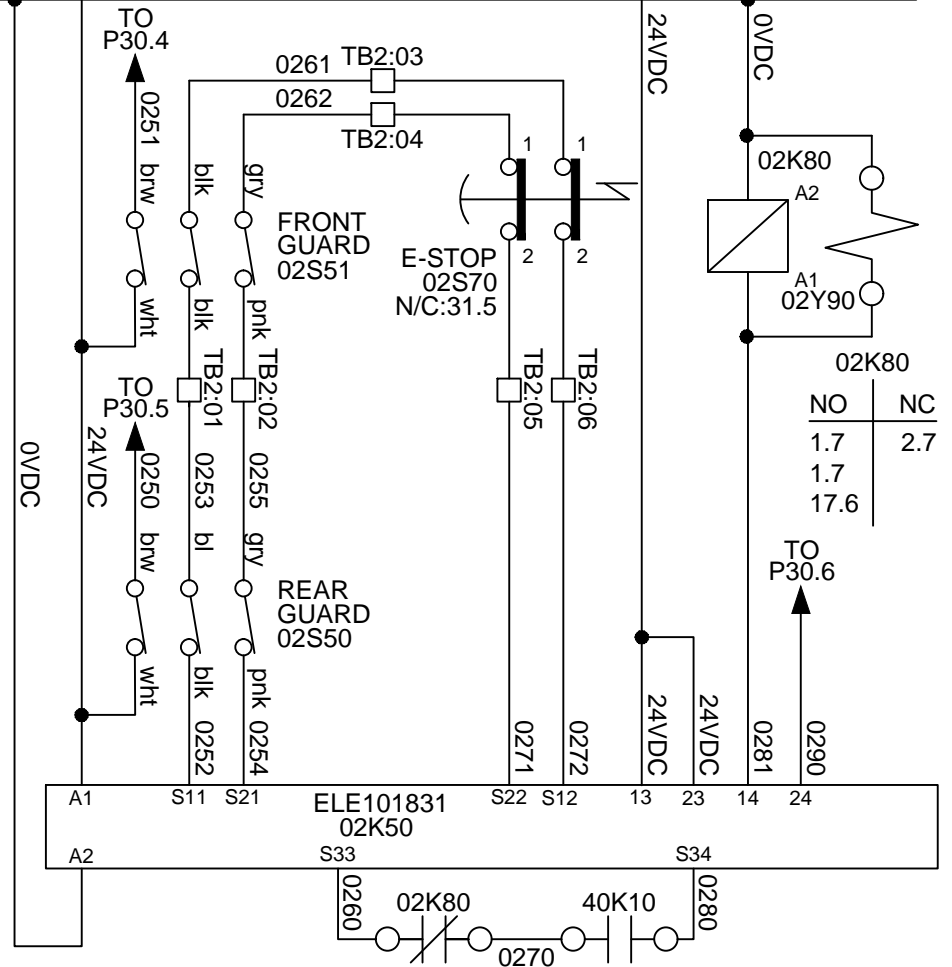
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24VDC  
0VDC

DOOR PINOUT	
#	ELESA
1	RED
2	PNK
3	BRN
4	GRY
5	YEL
6	BLU
7	GRN
8	WHT



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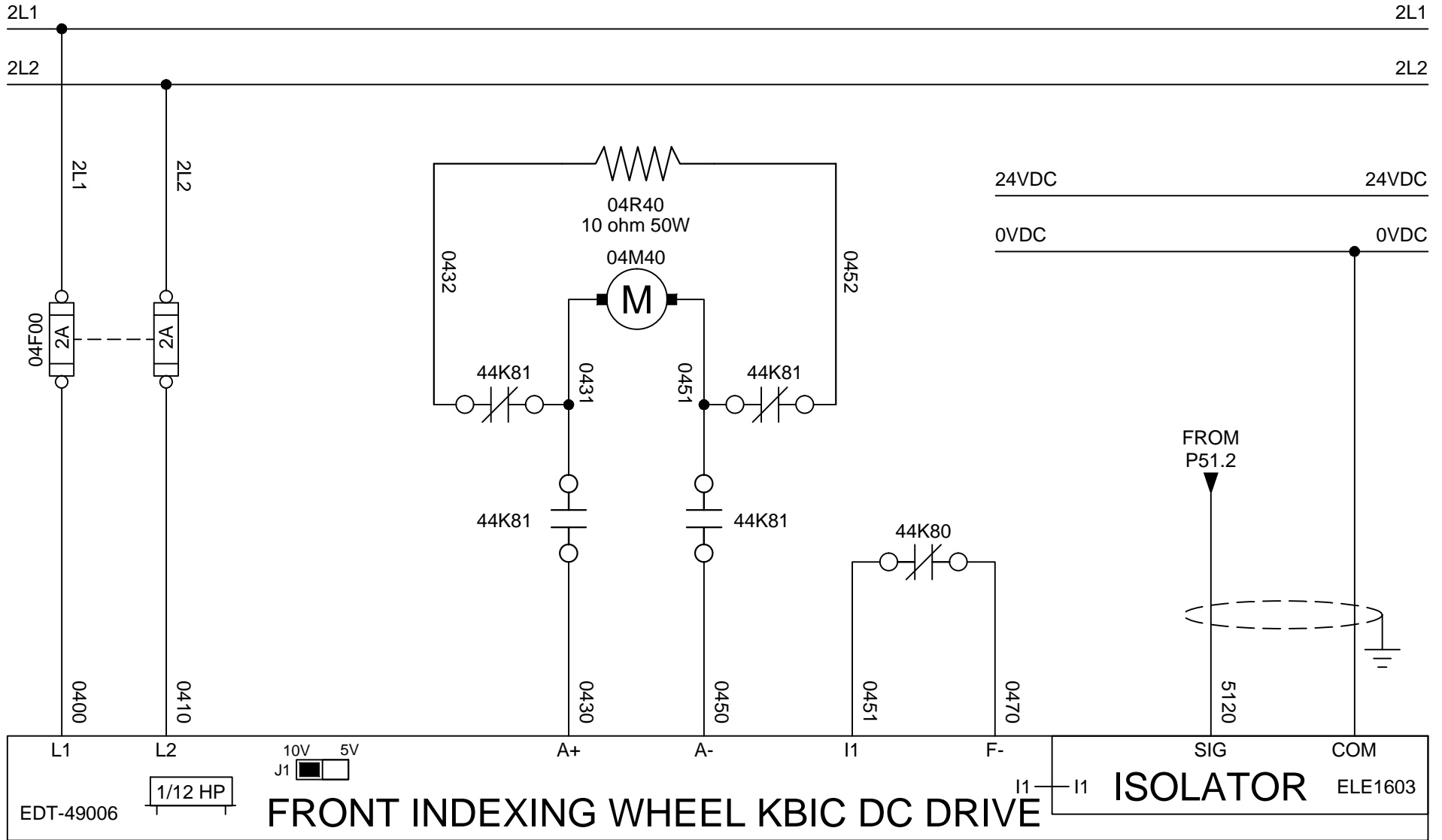


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**FRONT INDEXING WHEEL KBIC DC DRIVE**

**ISOLATOR**

04A00

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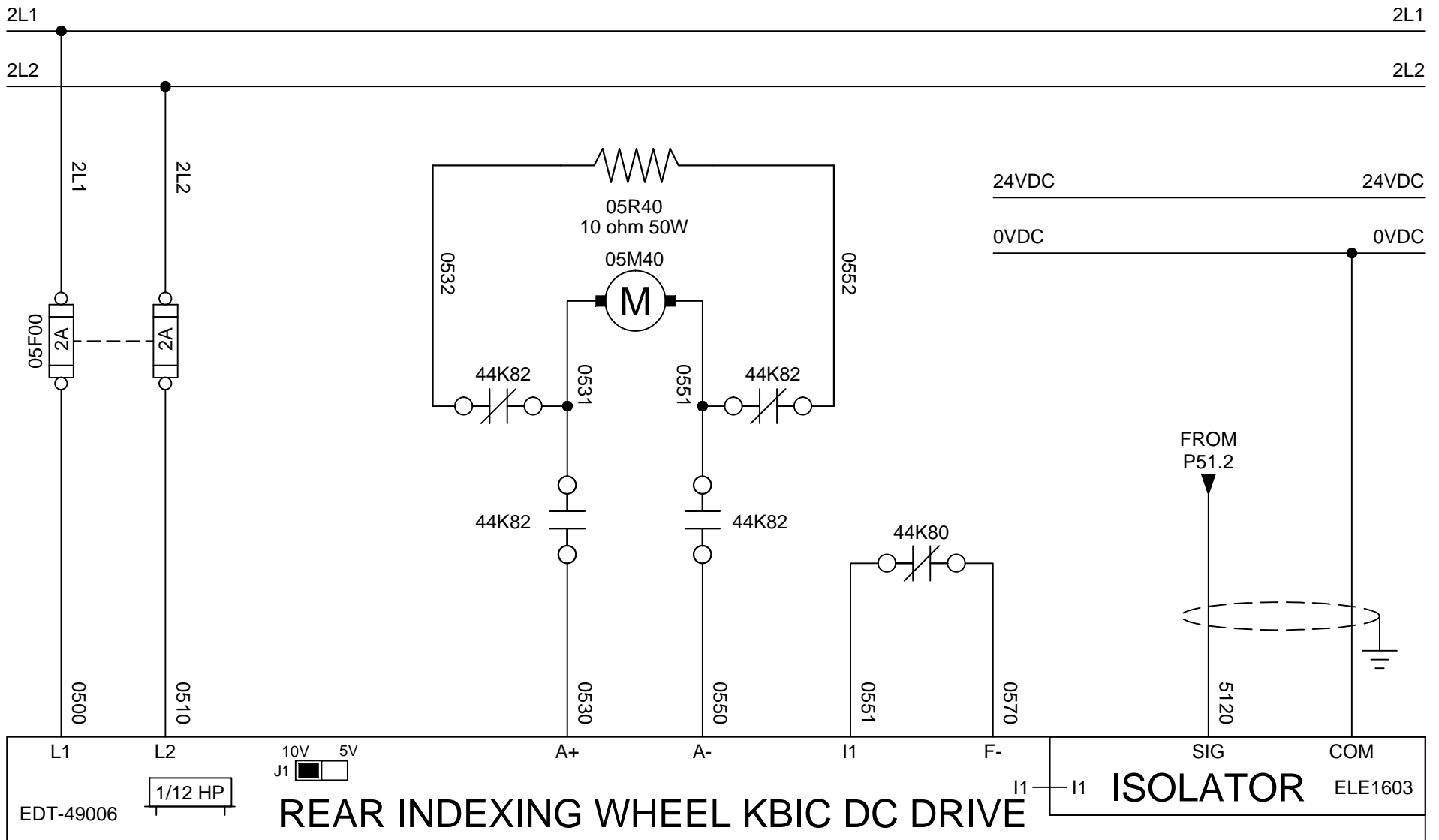


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05A00

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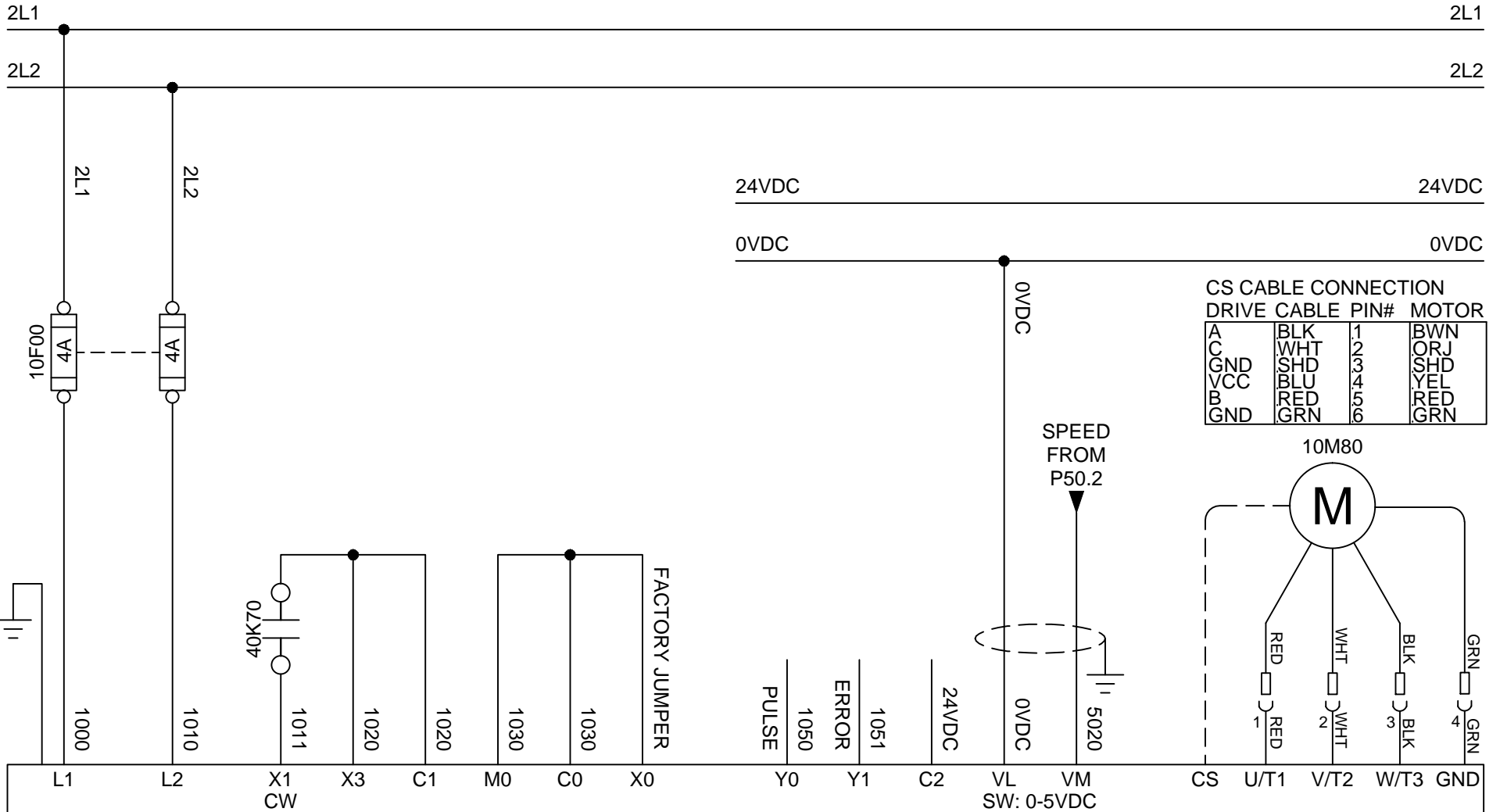
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0 1 2 3 4 5 6 7 8 9



**CAP ELEVATOR ORIENTAL BRUSHLESS DC DRIVE 220V (200W)**

10A00

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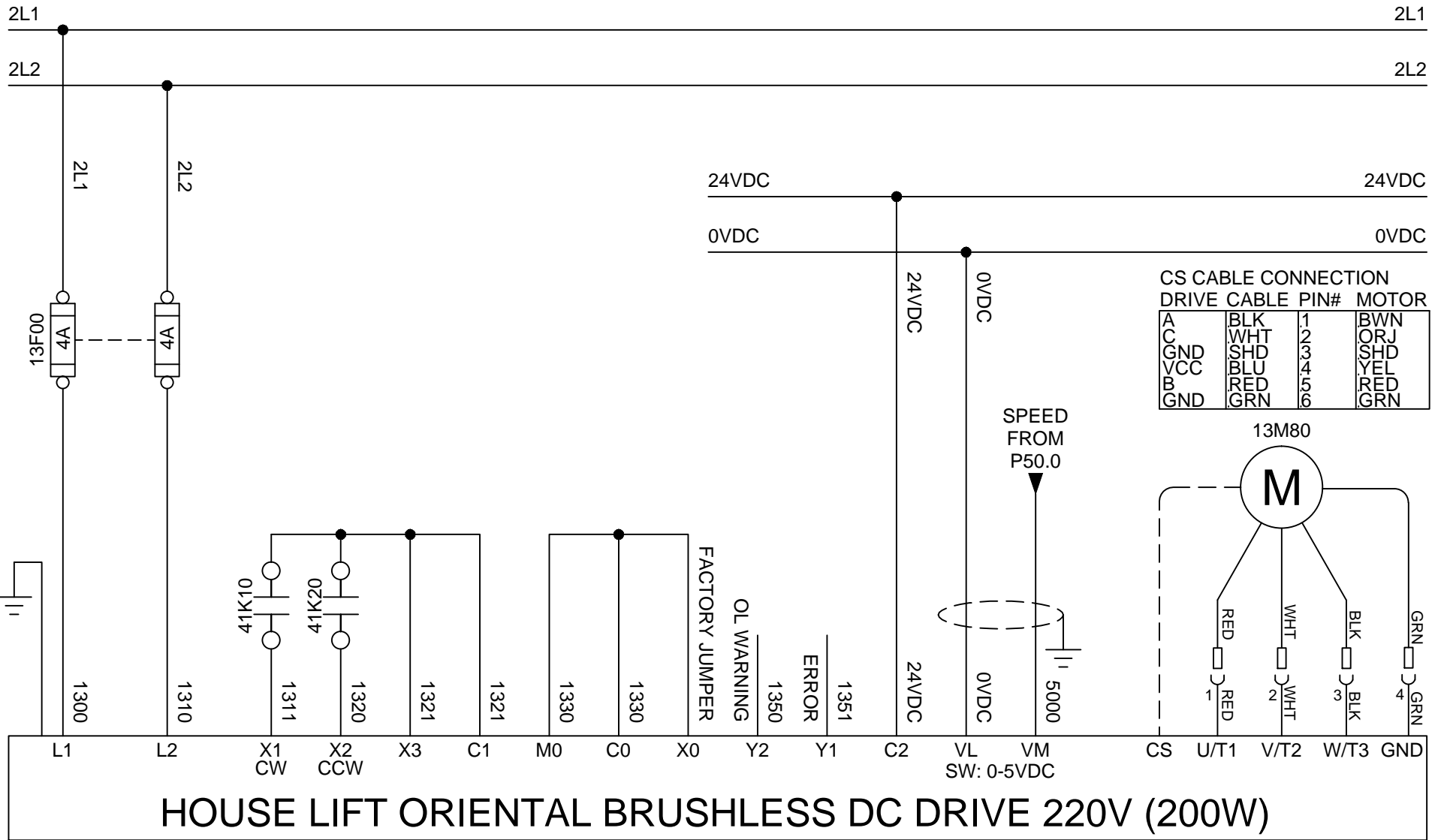


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13A00

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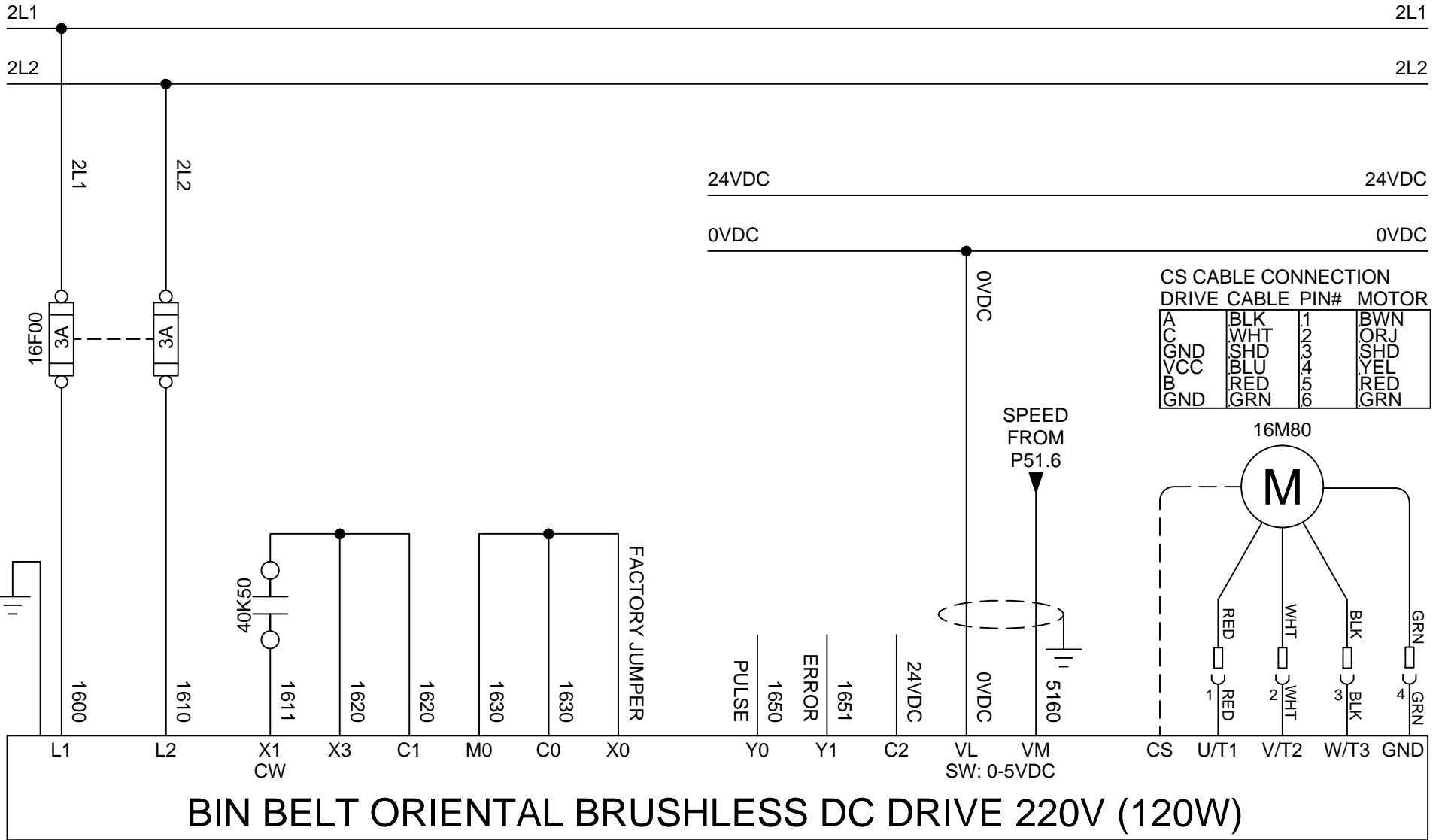
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0 1 2 3 4 5 6 7 8 9



**BIN BELT ORIENTAL BRUSHLESS DC DRIVE 220V (120W)**

16A00

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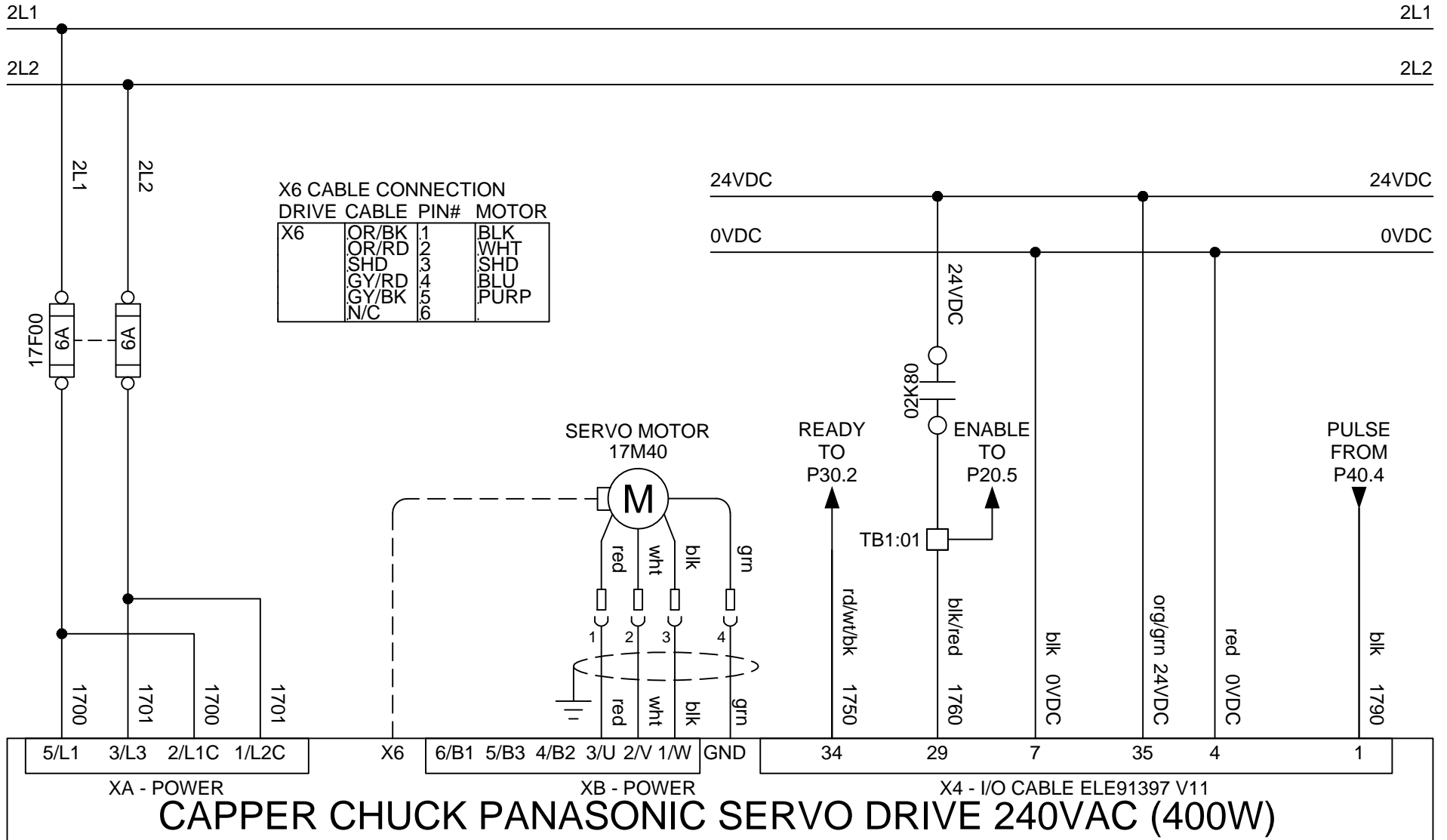
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0 1 2 3 4 5 6 7 8 9



# CAPPER CHUCK PANASONIC SERVO DRIVE 240VAC (400W)

17A00

ELE91397 V.11 Cable Detail:  
 Internal Jumper#1: Pin7, 15, and 17.  
 Internal Jumper#2: Pin11, 37, 39, and 40.

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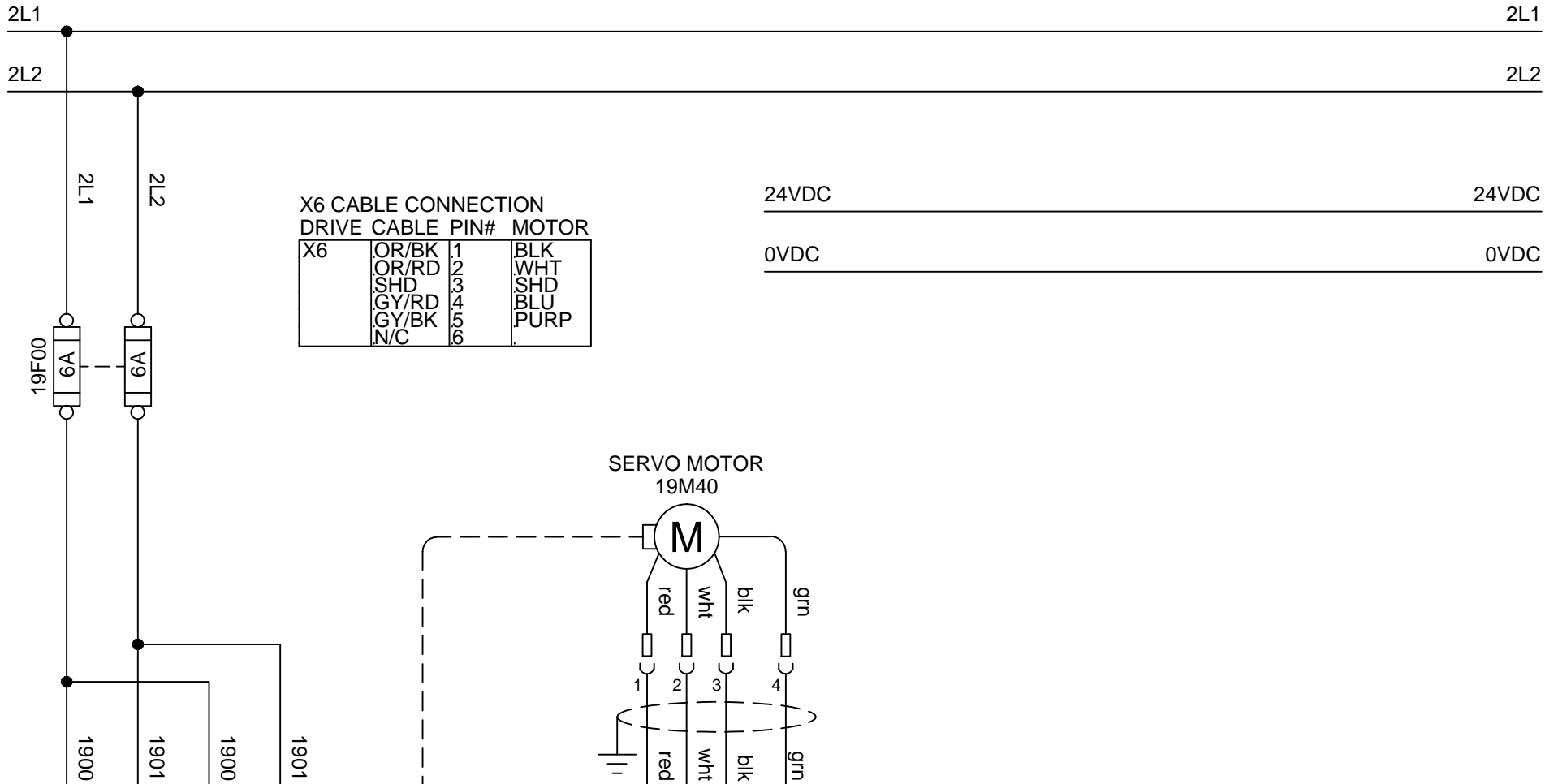


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**X6 CABLE CONNECTION**

DRIVE CABLE	PIN#	MOTOR
X6	OR/BK	1 BLK
	OR/RD	2 WHT
	SHD	3 SHD
	GY/RD	4 BLU
	GY/BK	5 PURP
	N/C	6

24VDC 24VDC  
 0VDC 0VDC

5/L1 3/L3 2/L1C 1/L2C X6 6/B1 5/B3 4/B2 3/U 2/V 1/W GND

XA - POWER

XB - POWER

**TORQUER CHUCK PANASONIC SERVO DRIVE 240VAC (400W)**

19A00

I/O ON NEXT PAGE

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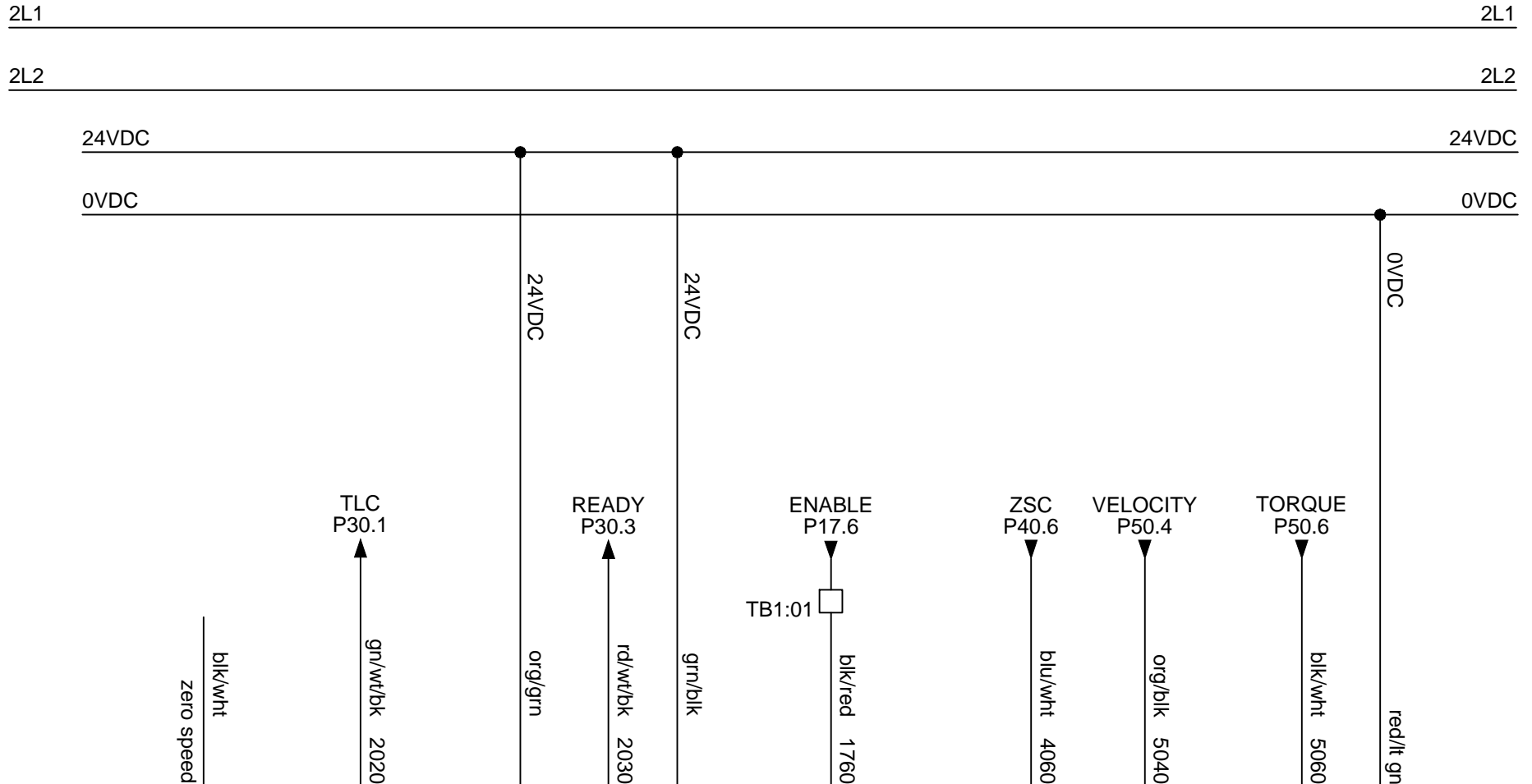
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0 1 2 3 4 5 6 7 8 9



X4 - I/O CABLE ELE91397 V11

# TORQUER CHUCK PANASONIC SERVO DRIVE 240VAC (400W)

POWER ON PREVIOUS PAGE

19A50

ELE91397 V.11 Cable Detail:  
Internal Jumper#1: Pin7, 15, and 17.  
Internal Jumper#2: Pin11, 37, 39, and 40.

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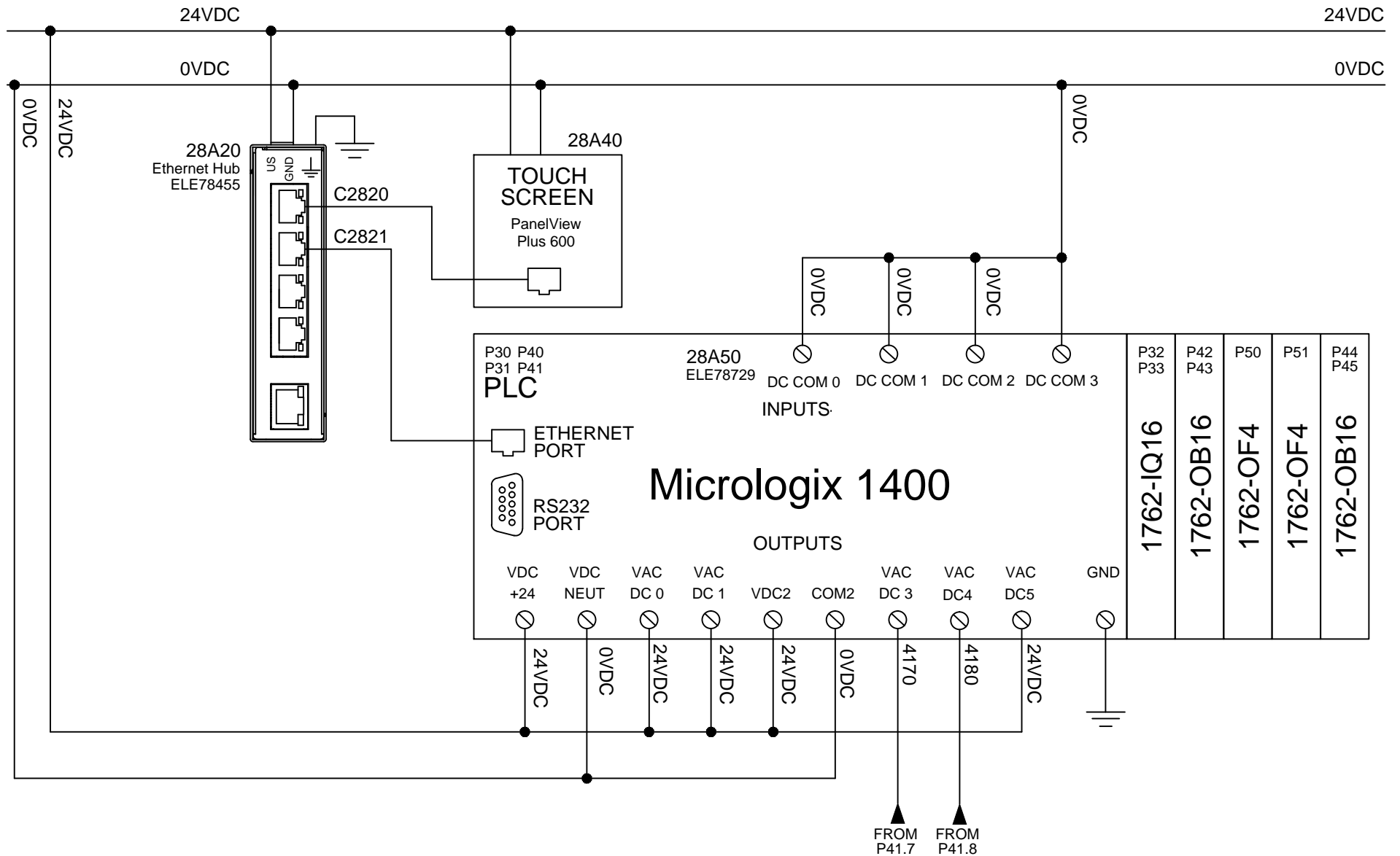


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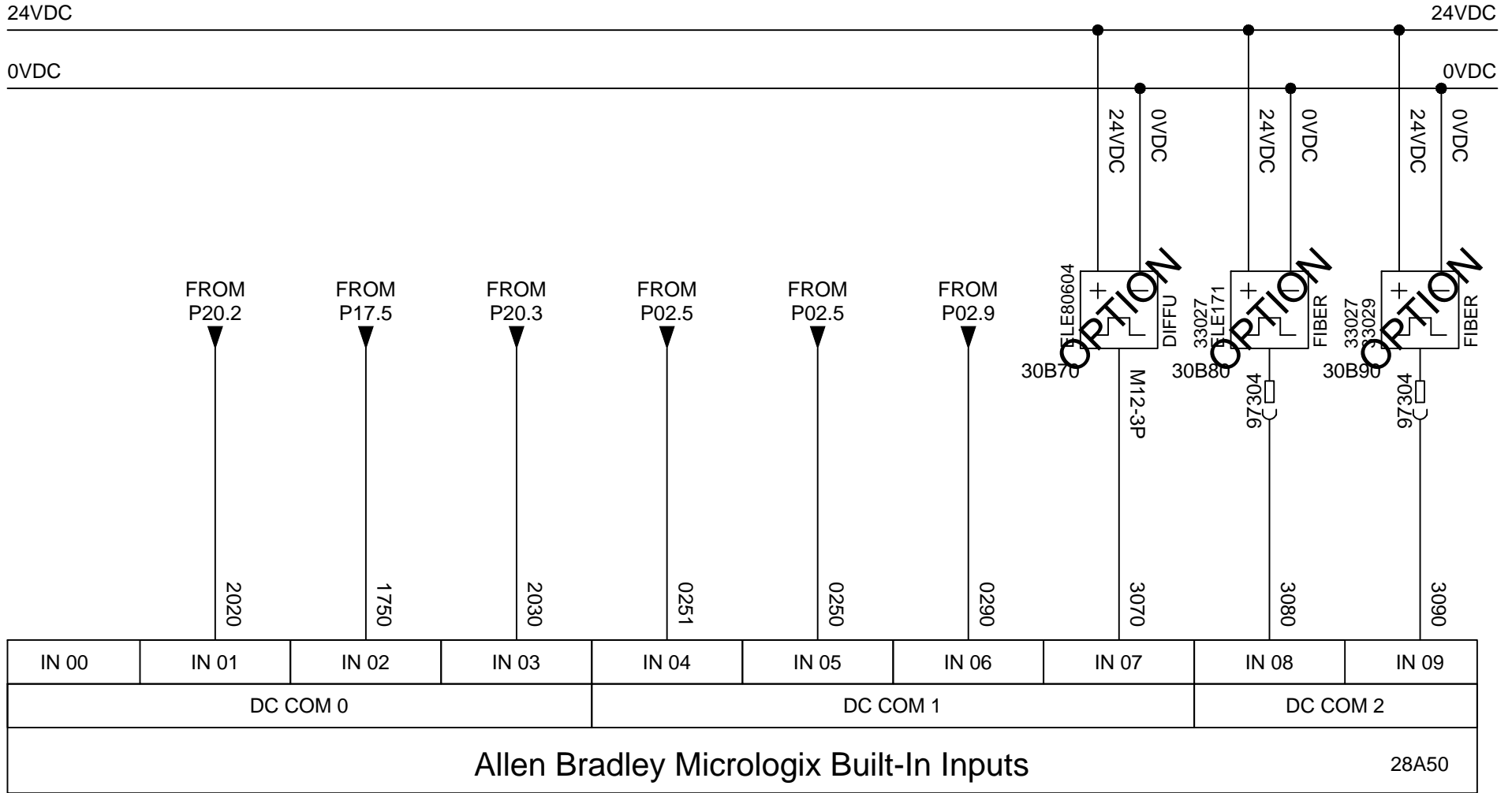
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Not To Scale

0 1 2 3 4 5 6 7 8 9



TORQUER ZERO SPEED	TORQUER TORQUE LIMIT	SERVO CAPPER READY	SERVO TORQUER READY	FRONT DOOR OPEN	REAR DOOR OPEN	SAFETY RELAY ENGAGED	PRODUCT INSPECTION SENSOR	CAP PRESENCE SENSOR	HIGH CAP SENSOR
--------------------------	----------------------------	--------------------------	---------------------------	-----------------------	----------------------	----------------------------	---------------------------------	---------------------------	-----------------------

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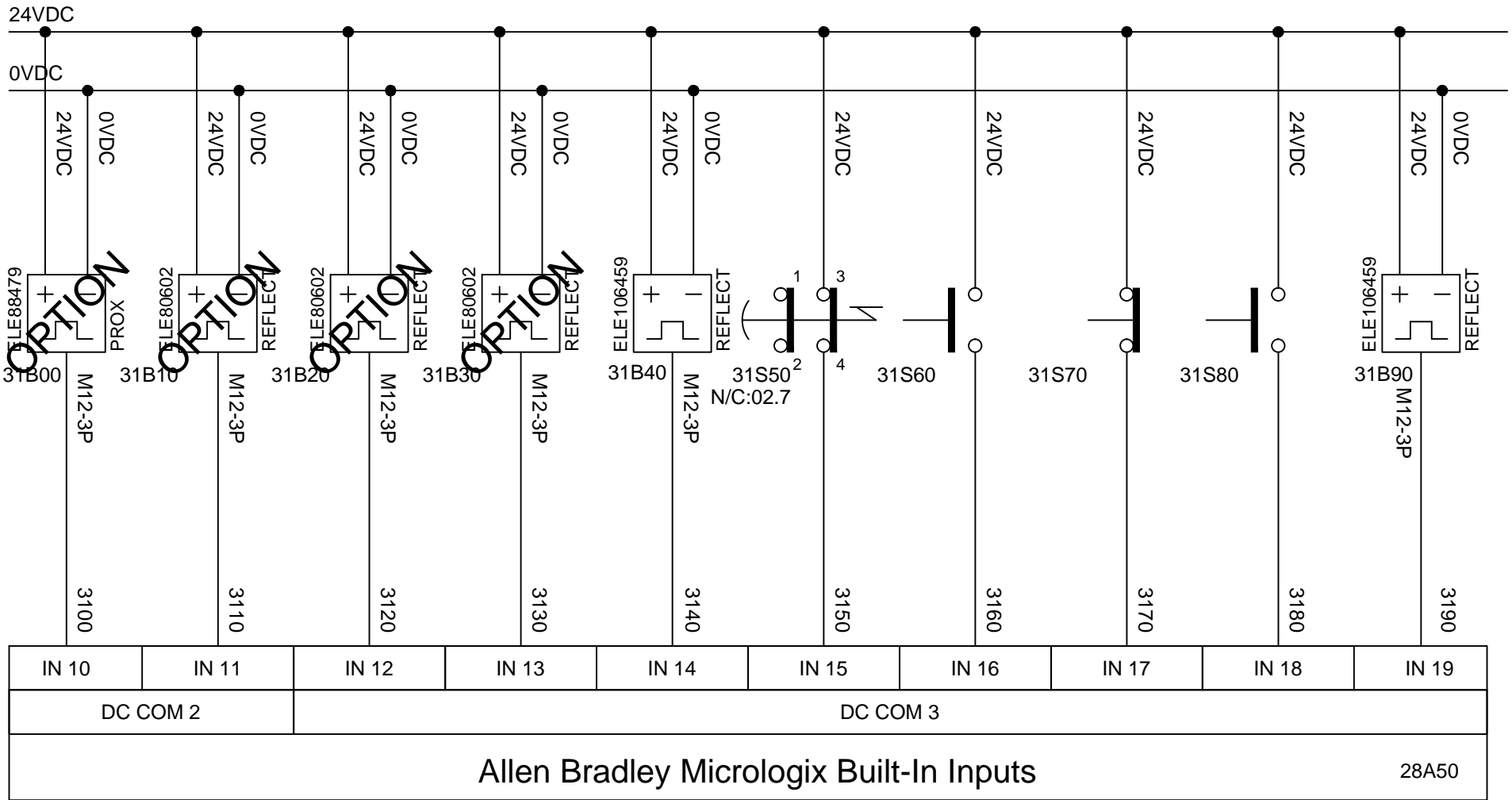
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0 1 2 3 4 5 6 7 8 9



FOIL PRESENCE SENSOR	REJECT CONFIRM SENSOR	GOOD BOTTLE SENSOR	RESYNCH SENSOR	PRODUCT BACK-UP at CAPPING STATION	EMERGENCY STOP BUTTON	START BUTTON	STOP BUTTON	RESET BUTTON	PRODUCT BACK-UP at EXIT
----------------------	-----------------------	--------------------	----------------	------------------------------------	-----------------------	--------------	-------------	--------------	-------------------------

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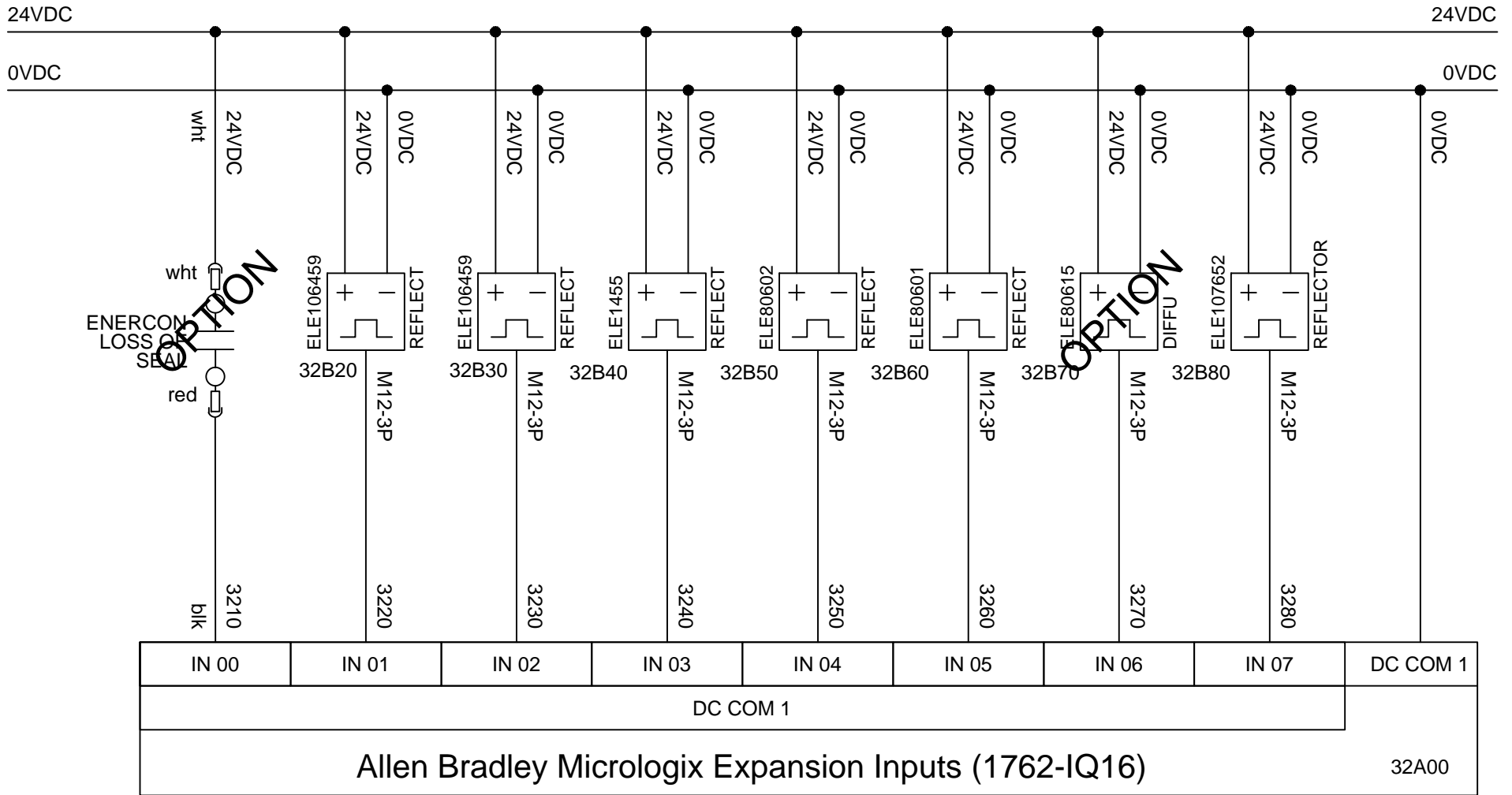
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 EMAIL: contactus@aesus.com

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DRAWN BY: **Paul Matthew Benavides**

DRAWING INFORMATION: V0.3: Update Panasonic X4 cable (V10 to V11) - PMB 2016-12-06  
 V1.0: As Built - RL 2016-12-15  
 V1.1: Change Sensors/Added Infeed Sensor - RL 2017-04-18

0 1 2 3 4 5 6 7 8 9



ENERCON  
LOSS OF  
SEAL

PRODUCT  
UNDER  
CAPPING  
STATION

PRODUCT  
UNDER  
TORQUING  
STATION

CAP  
at CHUCK  
CAPPING  
STATION

CAP FEEDER  
TRIGGER  
IN CHUTE  
SENSOR

LOW CAP  
in CHUTE  
SENSOR

ELEVATOR  
OUTFEED JAM  
in CHUTE  
SENSOR

PRODUCT  
CAPPER  
INFEED

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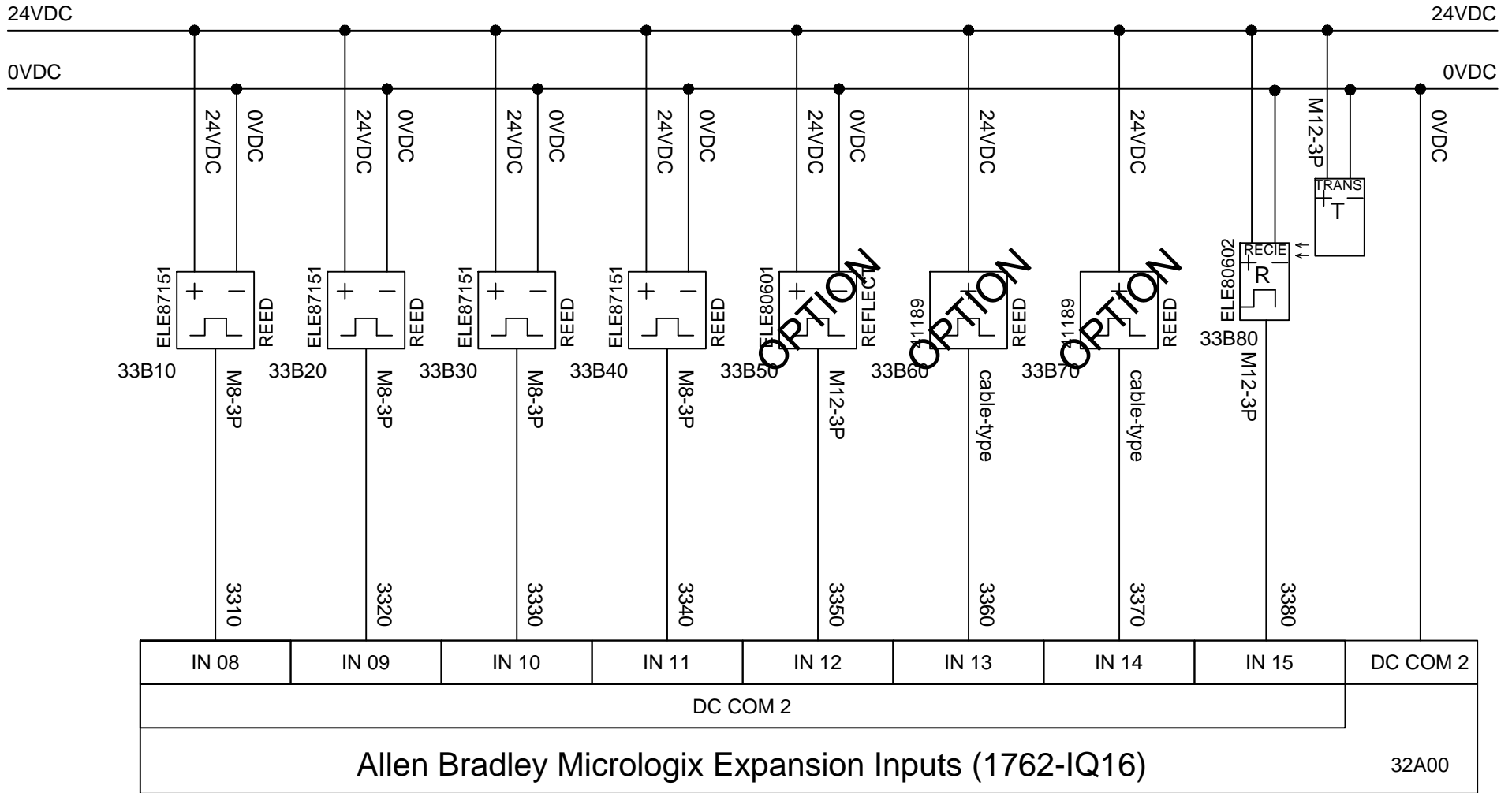
188 ONEIDA DRIVE  
POINTE CLAIRE, QUEBEC  
CANADA H9R 1A8  
TEL: (514) 694-3439  
FAX: (514) 694-4107  
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0 1 2 3 4 5 6 7 8 9



CHUCK  
at TOP  
CAPPING  
STATION

CHUCK  
at TOP  
TORQUING  
STATION

GRIPPER  
EXTEND  
CAPPING  
STATION

GRIPPER  
EXTEND  
TORQUING  
STATION

LEVEL  
PADDLE  
at BOWL  
SENSOR

REJECT  
CYLINDER  
EXTENDED

REJECT  
CYLINDER  
RETRACTED

BIN BELT  
TRIGGER

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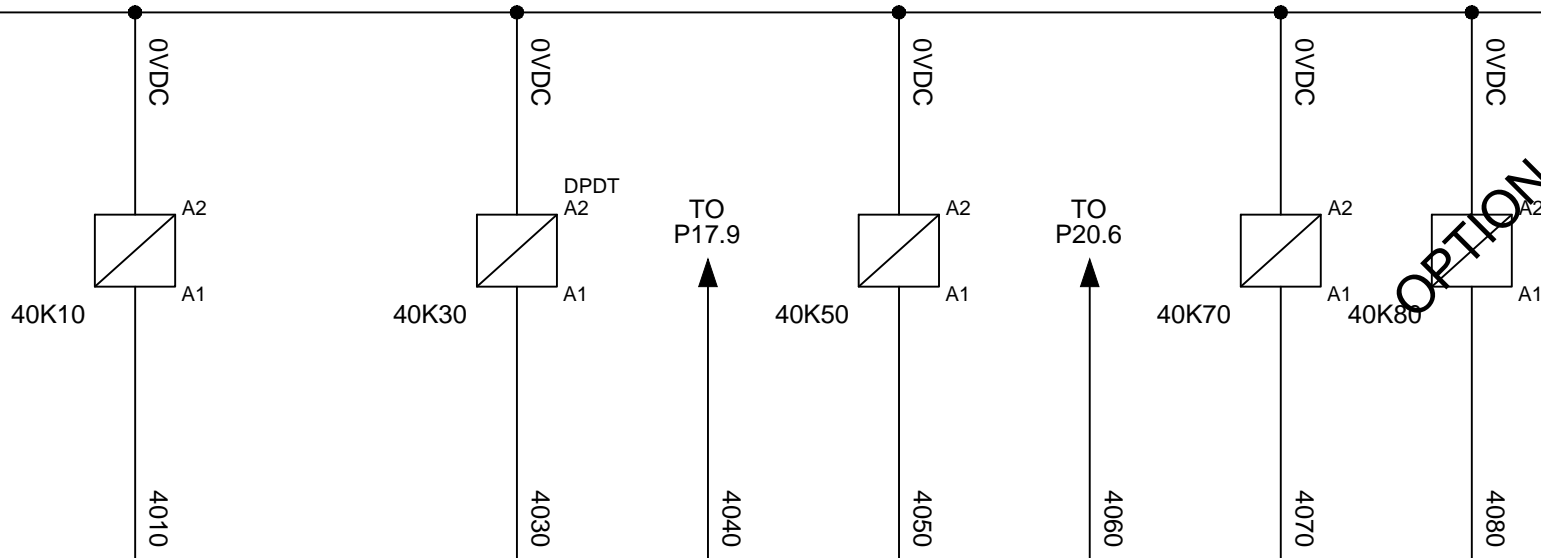
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0 1 2 3 4 5 6 7 8 9

24VDC 24VDC  
 0VDC 0VDC



OUT 00	OUT 01	OUT 02	OUT 03	OUT 04	OUT 05	OUT 06	OUT 07
RELAY	RELAY	PTO / FET			FET		
VAC / DC 0	VAC / DC 1	VAC / DC 2					
Allen Bradley Micrologix Built-in Outputs							28A50

POWER RESET	SPARE SPARE	MACHINE RUNNING	CAPPING STATION PULSE	BIN BELT INHIBIT	TORQUER ZERO SPEED	ELEVATOR INHIBIT	ELEVATOR for BOWL CAP FEEDER INHIBIT
40K20		40K30		40K50		40K70	40K80
NO   NC		NO   NC		NO   NC		NO   NC	NO   NC
2.8		**		16.2		10.2	12.5

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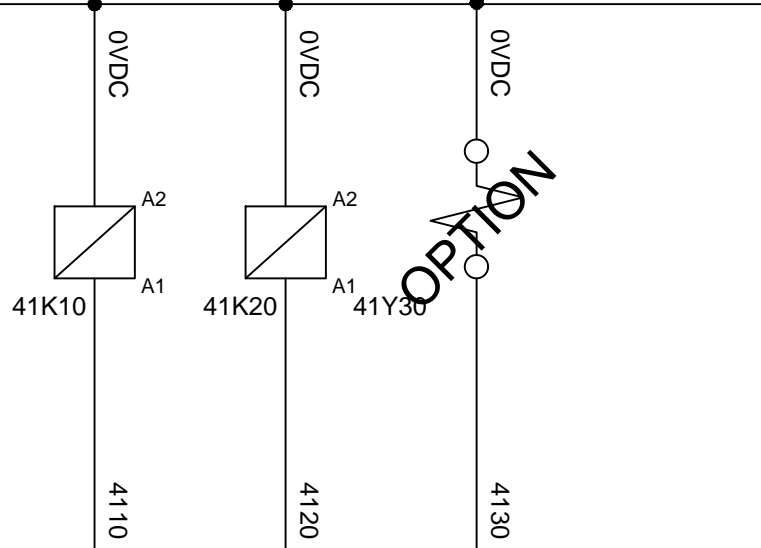
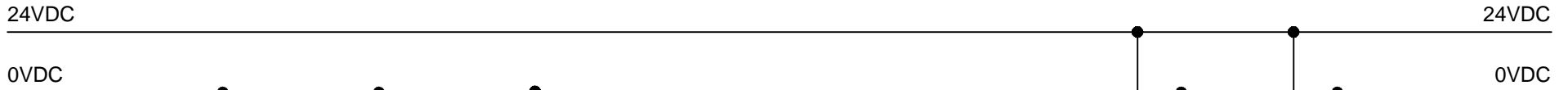


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OPTION

OUT 08	OUT 09	OUT 10	OUT 11
RELAY	RELAY	RELAY	
VAC / DC 3	VAC / DC 4	VAC / DC 5	
<b>Allen Bradley Micrologix Built-in Outputs</b>			

HOUSE  
LIFT UP  
INHIBIT

HOUSE  
LIFT DOWN  
INHIBIT

CENTRIFUGAL  
BOWL  
AIR JET  
SOLENOID

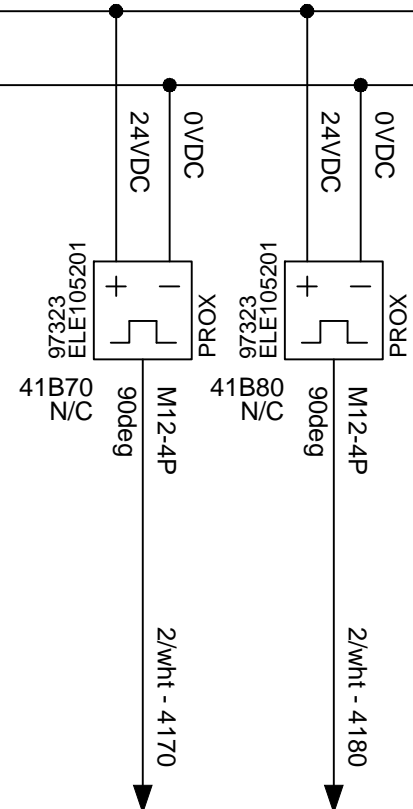
SPARE  
SPARE

41K10

NO	NC
13.1	

41K20

NO	NC
13.2	



TO PLC  
VAC / DC 3  
P28.6  
HOUSE  
LIFT UP  
INHIBIT

TO PLC  
VAC / DC 4  
P28.7  
HOUSE  
LIFT DOWN  
INHIBIT

28A50

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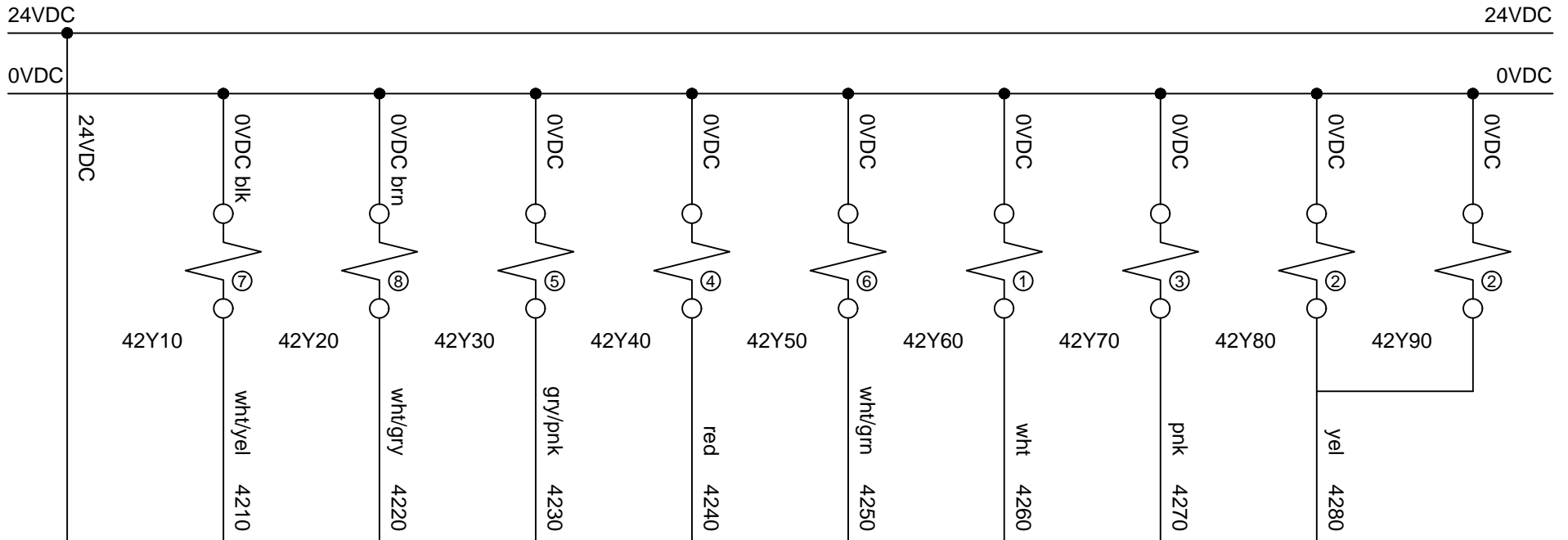
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0 1 2 3 4 5 6 7 8 9



+VDC	OUT 00	OUT 01	OUT 02	OUT 03	OUT 04	OUT 05	OUT 06	OUT 07
TRANSISTOR								
Allen Bradley Micrologix Expansion Output (1762-OB16)								42A00

CAPPER  
DOWN  
SOLENOID

TORQUER  
DOWN  
SOLENOID

CAPPER  
CLAMP  
SOLENOID

TORQUER  
CLAMP  
SOLENOID

CAPPER  
GATE  
SOLENOID

TORQUER  
GATE  
SOLENOID

CAPPING  
STATION  
CAP GATE

CAPPING  
STATION  
CAP AIR  
jet

VIBRATOR

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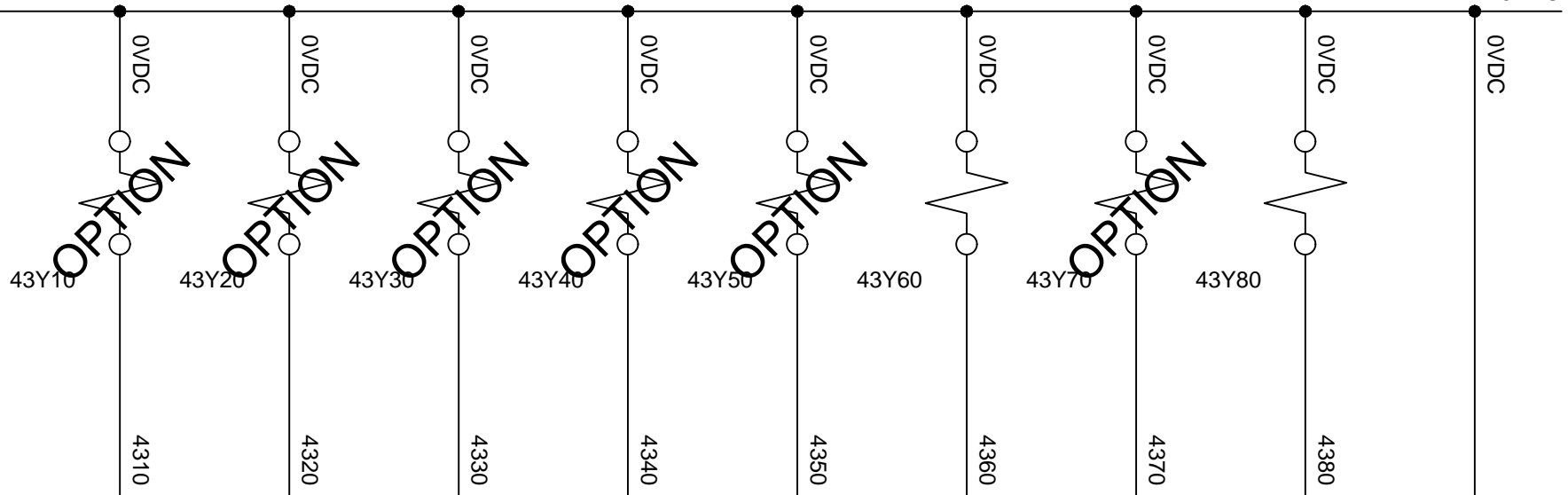
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0 1 2 3 4 5 6 7 8 9

24VDC 24VDC

0VDC 0VDC



OUT 08	OUT 09	OUT 10	OUT 11	OUT 12	OUT 13	OUT 14	OUT 15	DC COM
TRANSISTOR								
Allen Bradley Micrologix Expansion Output (1762-OB16)								42A00

ELEVATOR VIBRATION SOLENOID    RETORQUER DOWN SOLENOID    RETORQUER CLAMP SOLENOID    RETORQUER GATE    REJECT GATE SOLENOID    CAP RECIRCULATION at ELEVATOR SOLENOID    CAP TRACK AIR JET SOLENOID    CAPPER VACUUM SOLENOID

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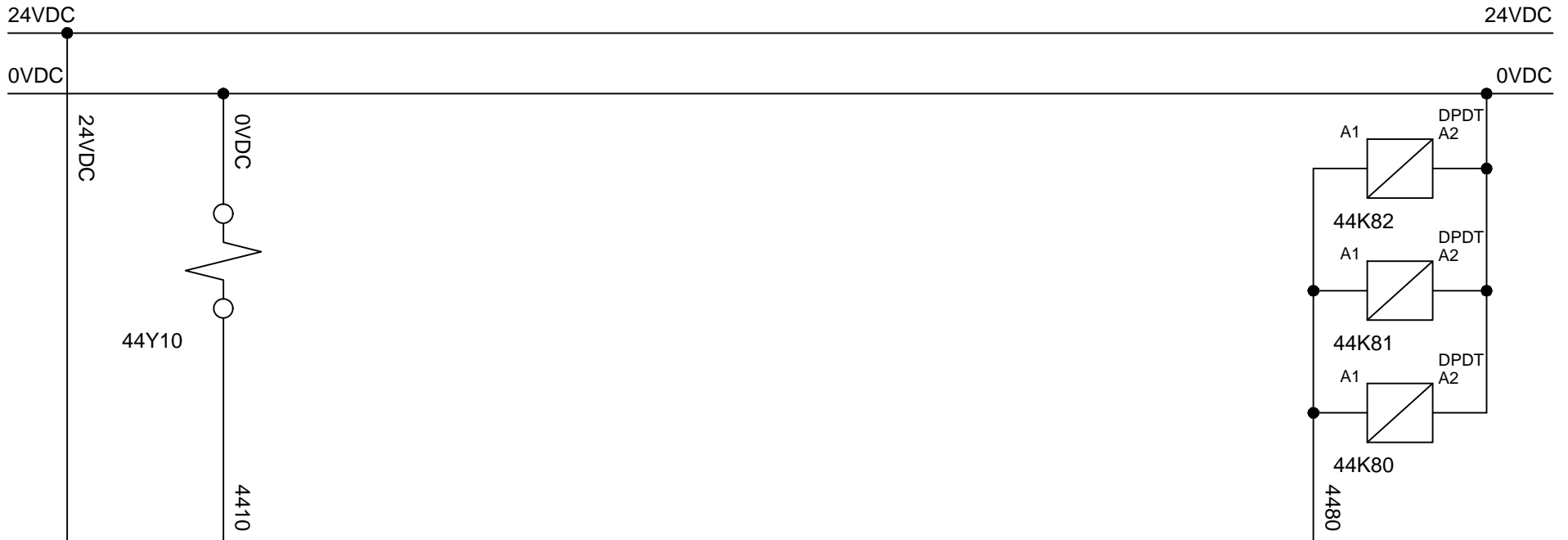
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0 1 2 3 4 5 6 7 8 9



+VDC	OUT 00	OUT 01	OUT 02	OUT 03	OUT 04	OUT 05	OUT 06	OUT 07
TRANSISTOR								
Allen Bradley Micrologix Expansion Output (1762-OB16)								44A00

BOTTLE  
NECK CLAMP  
SOLENOID

SPARE  
SPARE

SPARE  
SPARE

SPARE  
SPARE

SPARE  
SPARE

SPARE  
SPARE

SPARE  
SPARE

DUAL  
INDEXING  
WHEEL  
INHIBIT

DUAL  
INDEXING  
WHEEL  
BREAKS

44K80		44K81		44K82	
NO	NC	NO	NC	NO	NC
	4.6	4.3	4.3	5.3	5.3
	5.6	4.5	4.5	5.5	5.5

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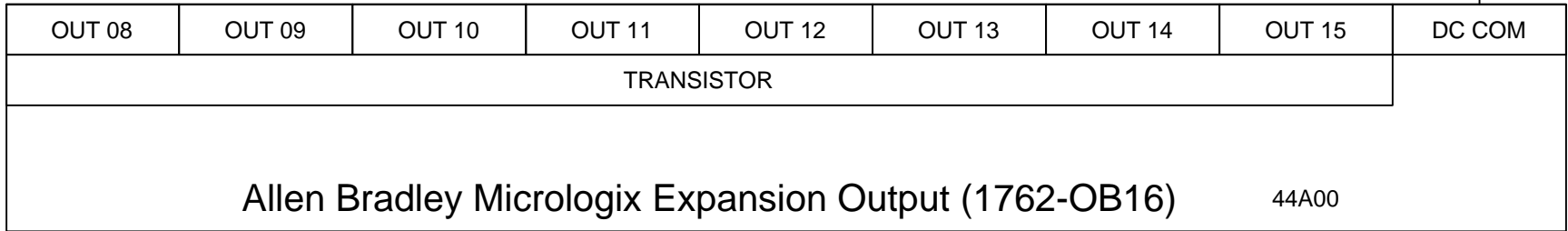
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0 1 2 3 4 5 6 7 8 9

24VDC 24VDC

0VDC 0VDC

0VDC



SPARE SPARE SPARE SPARE SPARE SPARE SPARE SPARE  
 SPARE SPARE SPARE SPARE SPARE SPARE SPARE SPARE

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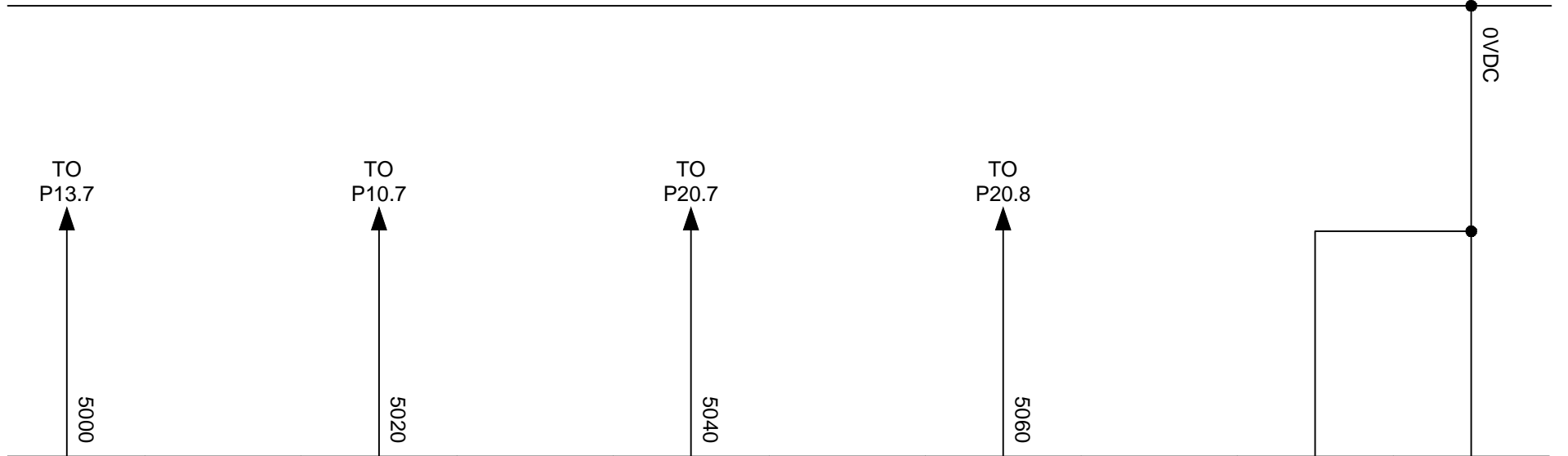
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0 1 2 3 4 5 6 7 8 9

24VDC 24VDC  
 0VDC 0VDC



V 0	I 0	V 1	I 1	V 2	I 2	V 3	I 3	COM	COM
-----	-----	-----	-----	-----	-----	-----	-----	-----	-----

Allen Bradley Micrologix Expansion Analog Output (1762-OF4) 50A00

HOUSE LIFT SPEED NOT USED ELEVATOR SPEED BOWL VIBRATION SPEED TORQUER VELOCITY NOT USED TORQUER TORQUE NOT USED

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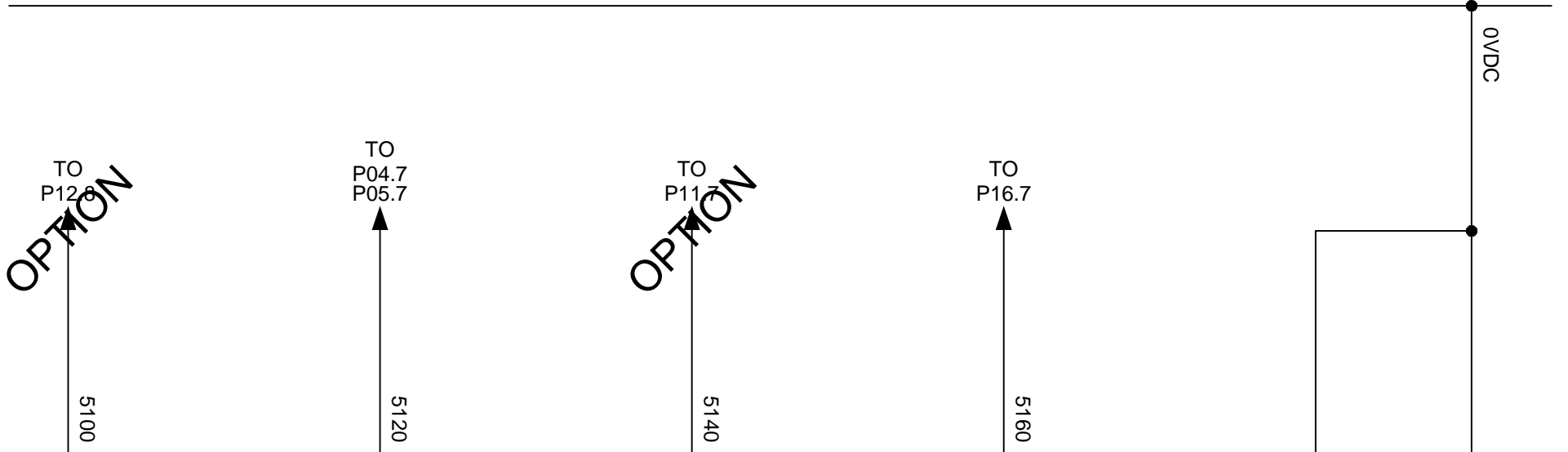
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0 1 2 3 4 5 6 7 8 9

24VDC 24VDC  
 0VDC 0VDC



V 0	I 0	V 1	I 1	V 2	I 2	V 3	I 3	COM	COM
-----	-----	-----	-----	-----	-----	-----	-----	-----	-----

Allen Bradley Micrologix Expansion Analog Output (1762-OF4) 51A00

ELEVATOR for BOWL FEEDER SPEED    NOT USED    INDEXING WHEEL SPEED    NOT USED    ELEVATOR UP/DOWN SPEED    NOT USED    BIN BELT SPEED    NOT USED

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## Appendix 3: Setup Sheets

SET-UP SHEET		
Conveyor Speed		24,8 f/min
Main Air Pressure		80 psi

TOUCH SCREEN		
Capper Station Set-up		
Capper Spd		500
Capper Rotation		0,10
Cap Gate On/Off		OFF
Force Spin Capper		OFF
Gripper Delay (ms)		650
Gate Extend Delay (ms)		800
Capping Time (ms)		300
Gate Retract delay (ms)		400
Torquer Spd (rpm)		10
Torquer Torque (%)		0
Force Spin Torquer On/Off		OFF
Gripper Delay (ms)		700
Gate Extend Delay(ms)		750
Torquer Time (ms)		300
Gate retract delay (ms)		200
Height Down/Up		
Height Speed (%)		
Capper Back Pressure On/Off		ON
Capper Backup On		200
Capper Backup Off		0
Torquer Backup On		300
Torquer Backup Off		50
Neck Clamp On/Off		ON
Neck Clamp Delay		1100
Vaccum (ms)		600
Vaccum ON/OFF		ON
Capper Station On/Off		ON
Torquer Station On/Off		ON
Capper Servo On/Off		OFF
Torquer Servo On/Off		OFF
ELEVATOR SET-UP		
Elevator On/Off		ON
Elevator Spd. (%)		20
Sealer On/Off		OFF
Bin Belt On/Off		ON
Bin Belt Speed (%)		10
Bowl On/Off		OFF
Bowl Speed (%)		0
Elev Start Sensor		4
Low Level Sensor		3
Elevator On Delay		20
Elevator Off Delay		5
Bin Belt On Delay		200
Bin Belt Off Delay		0
Elevator Cycle Stop		300

Machine #	549671216
Bottle/Cap	
Recipe #	Great Value 3L

MECANICAL SET-UP				
1	Head Height			77,5
2	Elevator Cap Exit Thickness			2,5
3	Capper Chute wide			054,7
4	Capping Gate Extend			89
5	Capping Gripper			68,5
6	Torquing Gate Extend			75,5
7	Torquing Gripper			104
8	Cap Trap (mm)			33,76 MM
9	Neck Clamp Plate #			N/A
10	Elevator Tilt			016,8
11	Elevator Trap			9
12	Back-up Cap Station Receiver			8
13	Center Rail Support			41
14	Cap Sorting Airjet			0,1 BAR
15	Air Ramp Pressure			1 BAR
16	Roof chute height			11,5
17	Capping Plunger height			MOINS 0,5
18	Neck Clamp height front			N/A
19	Neck Clamp height rear			N/A
20	Capping Gate in/out			20,5
21	Capping gripper in/out			6,5
22	Torquing gate in/out			14,5
23	Torquing gripper in/out			6,5
24	Air flow control capper gating		3 3/4 -4	9 3/4
25	Air flow control capper gripper	-2	3 1/4 -4	7 1/2
26	Air flow control torquer gating	-2	4 -4	6
27	Air flow control torquer gripper	-2	3 3/4 -4	7 1/2
28	Plunger dimension			
29	Torquing Plunger height			25
30	Capping Plunger height			
	Capping Station Servo/ Plunger			PLUNGER
	Torquing Station Servo/ Plunger			PLUNGER





SET-UP SHEET		
Conveyor Speed	24,8 f/min	
Main Air Pressure	80 psi	

TOUCH SCREEN		
<b>Capper Station Set-up</b>		
Capper Spd	500	
Capper Rotation	0,10	
Cap Gate On/Off	OFF	
Force Spin Capper	OFF	
Gripper Delay (ms)	650	
Gate Extend Delay (ms)	1000	
Capping Time (ms)	300	
Gate Retract delay (ms)	400	
Torquer Spd (rpm)	10	
Torquer Torque (%)	0	
Force Spin Torquer On/Off	OFF	
Gripper Delay (ms)	600	
Gate Extend Delay(ms)	750	
Torquer Time (ms)	300	
Gate retract delay (ms)	200	
Height Down/Up		
Height Speed (%)		
Capper Back Pressure On/Off	ON	
Capper Backup On	200	
Capper Backup Off	0	
Torquer Backup On	300	
Torquer Backup Off	50	
Neck Clamp On/Off	ON	
Neck Clamp Delay	1100	
Vaccum (ms)	600	
Vaccum ON/OFF	ON	
Capper Station On/Off	ON	
Torquer Station On/Off	ON	
Capper Servo On/Off	OFF	
Torquer Servo On/Off	OFF	
<b>ELEVATOR SET-UP</b>		
Elevator On/Off	ON	
Elevator Spd. (%)	20	
Sealer On/Off	OFF	
Bin Belt On/Off	ON	
Bin Belt Speed (%)	10	
Bowl On/Off	OFF	
Bowl Speed (%)	0	
Elev Start Sensor	4	
Low Level Sensor	3	
Elevator On Delay	20	
Elevator Off Delay	5	
Bin Belt On Delay	200	
Bin Belt Off Delay	0	
Elevator Cycle Stop	300	

Machine #	549671216
Bottle/Cap	
Recipe #	Rooster 2,84 L

MECHANICAL SET-UP					
1	Head Height	87,5			
2	Elevator Cap Exit Thickness	3			
3	Capper Chute wide	054,7			
4	Capping Gate Extend	88,5			
5	Capping Gripper	74,5			
6	Torquing Gate Extend	75,5			
7	Torquing Gripper	89			
8	Cap Trap (mm)	33,76 MM			
9	Neck Clamp Plate #	#4			
10	Elevator Tilt	016,8			
11	Elevator Trap	9			
12	Back-up Cap Station Receiver	8			
13	Center Rail Support	41			
14	Cap Sorting Airjet	0,1 BAR			
15	Air Ramp Pressure	20			
16	Roof chute height	12			
17	Capping Plunger height	ALLWAY UP			
18	Neck Clamp height front	11			
19	Neck Clamp height rear	11			
20	Capping Gate in/out	19,5			
21	Capping gripper in/out	4,5			
22	Torquing gate in/out	13			
23	Torquing gripper in/out	4,5			
24	Air flow control capper gating	-2	3 3/4	-4	9 1/4
25	Air flow control capper gripper	-2	3 1/4	-4	7 1/2
26	Air flow control torquer gating	-2	4	-4	6
27	Air flow control torquer gripper	-2	3 1/4	-4	7 1/2
28	Plunger dimension				
29	Torquing Plunger height				
30	Capping Plunger height				
	Capping Station Servo/ Plunger	PLUNGER			
	Torquing Station Servo/ Plunger	PLUNGER			

SET-UP SHEET		
Conveyor Speed		24,8 f/min
Main Air Pressure		80 psi

Machine #	549671216
Bottle/Cap	
Recipe #	Selection 3L

TOUCH SCREEN		
Capper Station Set-up		
Capper Spd		500
Capper Rotation		0,10
Cap Gate On/Off		OFF
Force Spin Capper		OFF
Gripper Delay (ms)		650
Gate Extend Delay (ms)		1000
Capping Time (ms)		300
Gate Retract delay (ms)		400
Torquer Spd (rpm)		10
Torquer Torque (%)		0
Force Spin Torquer On/Off		OFF
Gripper Delay (ms)		700
Gate Extend Delay(ms)		750
Torquer Time (ms)		300
Gate retract delay (ms)		200
Height Down/Up		
Height Speed (%)		
Capper Back Pressure On/Off		ON
Capper Backup On		200
Capper Backup Off		0
Torquer Backup On		300
Torquer Backup Off		50
Neck Clamp On/Off		OFF
Neck Clamp Delay		1100
Vaccum (ms)		600
Vaccum ON/OFF		ON
Capper Station On/Off		ON
Torquer Station On/Off		ON
Capper Servo On/Off		OFF
Torquer Servo On/Off		OFF
ELEVATOR SET-UP		
Elevator On/Off		ON
Elevator Spd. (%)		20
Sealer On/Off		OFF
Bin Belt On/Off		ON
Bin Belt Speed (%)		10
Bowl On/Off		OFF
Bowl Speed (%)		0
Elev Start Sensor		4
Low Level Sensor		3
Elevator On Delay		20
Elevator Off Delay		5
Bin Belt On Delay		200
Bin Belt Off Delay		0
Elevator Cycle Stop		300

MECANICAL SET-UP				
1	Head Height			75,5
2	Elevator Cap Exit Thickness			2,5
3	Capper Chute wide			054,7
4	Capping Gate Extend			92,5
5	Capping Gripper			70,0
6	Torquing Gate Extend			75,5
7	Torquing Gripper			104,5
8	Cap Trap (mm)			33,76 MM
9	Neck Clamp Plate #			N/A
10	Elevator Tilt			016,8
11	Elevator Trap			9
12	Back-up Cap Station Receiver			8
13	Center Rail Support			41
14	Cap Sorting Airjet			0,1BAR
15	Air Ramp Pressure			1 BAR
16	Roof chute height			11,5
17	Capping Plunger height			MOINS 0,5
18	Neck Clamp height front			N/A
19	Neck Clamp height rear			N/A
20	Capping Gate in/out			20,5
21	Capping gripper in/out			6,5
22	Torquing gate in/out			14,5
23	Torquing gripper in/out			6,5
24	Air flow control capper gating	-2	3 3/4	-4 9 1/4
25	Air flow control capper gripper	-2	3 1/4	-4 7 1/2
26	Air flow control torquer gating	-2	4	-4 6
27	Air flow control torquer gripper	-2	3 3/4	-4 7 1/2
28	Plunger dimension			
29	Torquing Plunger height			
30	Capping Plunger height			
	Capping Station Servo/ Plunger			PLUNGER
	Torquing Station Servo/ Plunger			PLUNGER

SET-UP SHEET		
Conveyor Speed		24,8 f/min
Main Air Pressure		80 psi

TOUCH SCREEN		
Capper Station Set-up		
Capper Spd		400
Capper Rotation		5,00
Cap Gate On/Off		OFF
Force Spin Capper		OFF
Gripper Delay (ms)		550
Gate Extend Delay (ms)		1300
Capping Time (ms)		300
Gate Retract delay (ms)		450
Torquer Spd (rpm)		400
Torquer Torque (%)		50
Force Spin Torquer On/Off		OFF
Gripper Delay (ms)		800
Gate Extend Delay(ms)		650
Torquer Time (ms)		250
Gate retract delay (ms)		100
Height Down/Up		
Height Speed (%)		
Capper Back Pressure On/Off		OFF
Capper Backup On		200
Capper Backup Off		0
Torquer Backup On		300
Torquer Backup Off		50
Neck Clamp On/Off		ON
Neck Clamp Delay		400
Vaccum (ms)		100
Vaccum ON/OFF		ON
Capper Station On/Off		ON
Torquer Station On/Off		ON
Capper Servo On/Off		ON
Torquer Servo On/Off		ON
ELEVATOR SET-UP		
Elevator On/Off		ON
Elevator Spd. (%)		15
Sealer On/Off		OFF
Bin Belt On/Off		ON
Bin Belt Speed (%)		50
Bowl On/Off		OFF
Bowl Speed (%)		0
Elev Start Sensor		4
Low Level Sensor		1
Elevator On Delay		50
Elevator Off Delay		100
Bin Belt On Delay		200
Bin Belt Off Delay		0
Elevator Cycle Stop		300

Machine #	549671216
Bottle/Cap	
Recipe #	Slim Yellow

MECANICAL SET-UP				
1	Head Height			70,5
2	Elevator Cap Exit Thickness			1,5
3	Capper Chute wide			050,9
4	Capping Gate Extend			75
5	Capping Gripper			57,5
6	Torquing Gate Extend			81,5
7	Torquing Gripper			114
8	Cap Trap (mm)			41 MM
9	Neck Clamp Plate #			N/A
10	Elevator Tilt			022,2
11	Elevator Trap			9
12	Back-up Cap Station Receiver			26
13	Center Rail Support			41
14	Cap Sorting Airjet			0,1 BAR
15	Air Ramp Pressure			1 BAR
16	Roof chute height			14
17	Capping Plunger height			
18	Neck Clamp height front			N/A
19	Neck Clamp height rear			N/A
20	Capping Gate in/out			16
21	Capping gripper in/out			4,5
22	Torquing gate in/out			13
23	Torquing gripper in/out			4,5
24	Air flow control capper gating	-2	3 1/4	-4 9
25	Air flow control capper gripper	-2	7 1/2	-4 3 5/8
26	Air flow control torquer gating	-2	4 1/2	-4 6
27	Air flow control torquer gripper	-2	3 5/8	-4 7 1/2
28	Plunger dimension			
29	Torquing Plunger height			
30	Capping Plunger height			
	Capping Station Servo/ Plunger			SERVO
	Torquing Station Servo/ Plunger			SERVO

MESURE ENTRE CONVOYEUR ET MACHINE EST DE 1 7/8 POUCES

SET-UP SHEET		
Conveyor Speed		21.4 f/min
Main Air Pressure		80 psi

TOUCH SCREEN		
Capper Station Set-up		
Capper Spd		500
Capper Rotation		0,10
Cap Gate On/Off		ON
Force Spin Capper		OFF
Gripper Delay (ms)		685
Gate Extend Delay (ms)		1100
Capping Time (ms)		420
Gate Retract delay (ms)		350
Torquer Spd (rpm)		10
Torquer Torque (%)		0
Force Spin Torquer On/Off		OFF
Gripper Delay (ms)		600
Gate Extend Delay(ms)		750
Torquer Time (ms)		400
Gate retract delay (ms)		200
Height Down/Up		
Height Speed (%)		
Capper Back Pressure On/Off		ON
Capper Backup On		200
Capper Backup Off		0
Torquer Backup On		300
Torquer Backup Off		50
Neck Clamp On/Off		OFF
Neck Clamp Delay		400
Vaccum (ms)		800
Vaccum ON/OFF		ON
Capper Station On/Off		ON
Torquer Station On/Off		ON
Capper Servo On/Off		OFF
Torquer Servo On/Off		OFF
ELEVATOR SET-UP		
Elevator On/Off		ON
Elevator Spd. (%)		20
Sealer On/Off		OFF
Bin Belt On/Off		ON
Bin Belt Speed (%)		15
Bowl On/Off		OFF
Bowl Speed (%)		0
Elev Start Sensor		2
Low Level Sensor		1
Elevator On Delay		20
Elevator Off Delay		
Bin Belt On Delay		5
Bin Belt Off Delay		200
Elevator Cycle Stop		0

Machine #	549671216
Bottle/Cap	
Recipe #	Thin can 3 L

MECANICAL SET-UP				
1	Head Height			84,5
2	Elevator Cap Exit Thickness			3,0
3	Capper Chute wide			122
4	Capping Gate Extend			90,5
5	Capping Gripper			75,0
6	Torquing Gate Extend			77,5
7	Torquing Gripper			95,5
8	Cap Trap (mm)			#3
9	Neck Clamp Plate #			N/A
10	Elevator Tilt			0
11	Elevator Trap			9
12	Back-up Cap Station Receiver			
13	Center Rail Support			
14	Cap Sorting Airjet			1,0
15	Air Ramp Pressure			10
16	Roof chute height			
17	Capping Plunger height			MAX
18	Neck Clamp height front			N/A
19	Neck Clamp height rear			N/A
20	Capping Gate in/out			11,5
21	Capping gripper in/out			41,0
22	Torquing gate in/out			3,0
23	Torquing gripper in/out			41,0
24	Air flow control capper gating	-2	3 1/2	-4 9
25	Air flow control capper gripper	-2	3	-4 7
26	Air flow control torquer gating	-2	4	-4 6
27	Air flow control torquer gripper	-2	3	-4 7
28	Plunger dimension			
29	Torquing Plunger height			26,0
30	Capping Plunger height			
	Capping Station Servo/ Plunger			PLUNGER
	Torquing Station Servo/ Plunger			PLUNGER

SET-UP SHEET		
Conveyor Speed		f/min
Main Air Pressure		80 psi

Machine #	549671216
Bottle/Cap	
Recipe #	

TOUCH SCREEN		
Capper Station Set-up		
Capper Spd		
Capper Rotation		
Cap Gate On/Off		
Force Spin Capper		
Gripper Delay (ms)		
Gate Extend Delay (ms)		
Capping Time (ms)		
Gate Retract delay (ms)		
Torquer Spd (rpm)		
Torquer Torque (%)		
Force Spin Torquer On/Off		
Gripper Delay (ms)		
Gate Extend Delay(ms)		
Torquer Time (ms)		
Gate retract delay (ms)		
Height Down/Up		
Height Speed (%)		
Capper Back Pressure On/Off		
Capper Backup On		
Capper Backup Off		
Torquer Backup On		
Torquer Backup Off		
Neck Clamp On/Off		
Neck Clamp Delay		
Vaccum (ms)		
Vaccum ON/OFF		
Capper Station On/Off		
Torquer Station On/Off		
Capper Servo On/Off		
Torquer Servo On/Off		
ELEVATOR SET-UP		
Elevator On/Off		
Elevator Spd. (%)		
Sealer On/Off		
Bin Belt On/Off		
Bin Belt Speed (%)		
Bowl On/Off		
Bowl Speed (%)		
Elev Start Sensor		
Low Level Sensor		
Elevator On Delay		
Elevator Off Delay		
Bin Belt On Delay		
Bin Belt Off Delay		
Elevator Cycle Stop		

MECANICAL SET-UP				
1	Head Height			
2	Elevator Cap Exit Thickness			
3	Capper Chute wide			
4	Capping Gate Extend			
5	Capping Gripper			
6	Torquing Gate Extend			
7	Torquing Gripper			
8	Cap Trap (mm)			
9	Neck Clamp Plate #			
10	Elevator Tilt			
11	Elevator Trap			
12	Back-up Cap Station Receiver			
13	Center Rail Support			
14	Cap Sorting Airjet			
15	Air Ramp Pressure			
16	Roof chute height			
17	Capping Plunger height			
18	Neck Clamp height front			
19	Neck Clamp height rear			
20	Capping Gate in/out			
21	Capping gripper in/out			
22	Torquing gate in/out			
23	Torquing gripper in/out			
24	Air flow control capper gating	-2		-4
25	Air flow control capper gripper	-2		-4
26	Air flow control torquer gating	-2		-4
27	Air flow control torquer gripper	-2		-4
28	Plunger dimension			
29	Torquing Plunger height			
30	Capping Plunger height			
	Capping Station Servo/ Plunger			
	Torquing Station Servo/ Plunger			