



[www.monoequip.com](http://www.monoequip.com)

Enter **Serial No.** here. \_\_\_\_\_

In the event of an enquiry please quote this serial number.



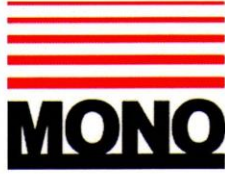
# **“OMEGA PLUS”**

## **INCLUDING WIRECUT VERSION DEPOSITOR (400, 450,)**

### **OPERATING AND MAINTENANCE MANUAL**

10-11-16  
Rev.B16


**The use of templates and/or accessories not produced or supplied by MONO  
Equipment will invalidate the machine's warranty**



## **DECLARATION OF CONFORMITY**

We hereby declare that this machine complies with the essential health and safety requirements of :-

- The Machinery Directive 2006 / 42 / EC
- The Low voltage Directive 2006 / 95 / EC
- The requirements of the Electromagnetic Compatibility Directive 2004 / 108EC, 91 / 263 / EEC, 92 / 31 / EEC  
Incorporating standards  
EN55014-1:2006+A1:2009+A2:2011  
EN55014-2:1997+A1:2001+A2:2008
- The General Safety of Machinery and food processing Standards applicable
- Materials and Articles intended to come into contact with food  
Regulation (EC) No. 1935 / 2004

<b>Signed</b>	
<b>G.A.Williams – Quality Manager</b>	

<b>Date</b>	
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<b>Machine FG Code.</b>		<b>Machine Serial No.</b>	
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A technical construction file for this machine is retained at the following address:

**MONO EQUIPMENT**  
Queensway,  
Swansea West Industrial Park,  
Swansea  
SA5 4EB  
UK

**MONO EQUIPMENT** is a business name of **AFE GROUP Ltd**  
Registered in England No.3872673 VAT registration No.923428136

Registered office: Unit 35,  
Bryggen Road, North Lynn Industrial Estate, Kings Lynn Norfolk, PE30 2HZ




**Failure to adhere to the cleaning and maintenance instructions detailed in this booklet could affect the warranty of this machine.**



**WIRECUT VERSION**

**FOR SAFE WORKING, PAY SPECIAL ATTENTION TO ITEMS MARKED **

**The use of templates and/or accessories not produced or supplied by MONO Equipment will invalidate the machine's warranty**

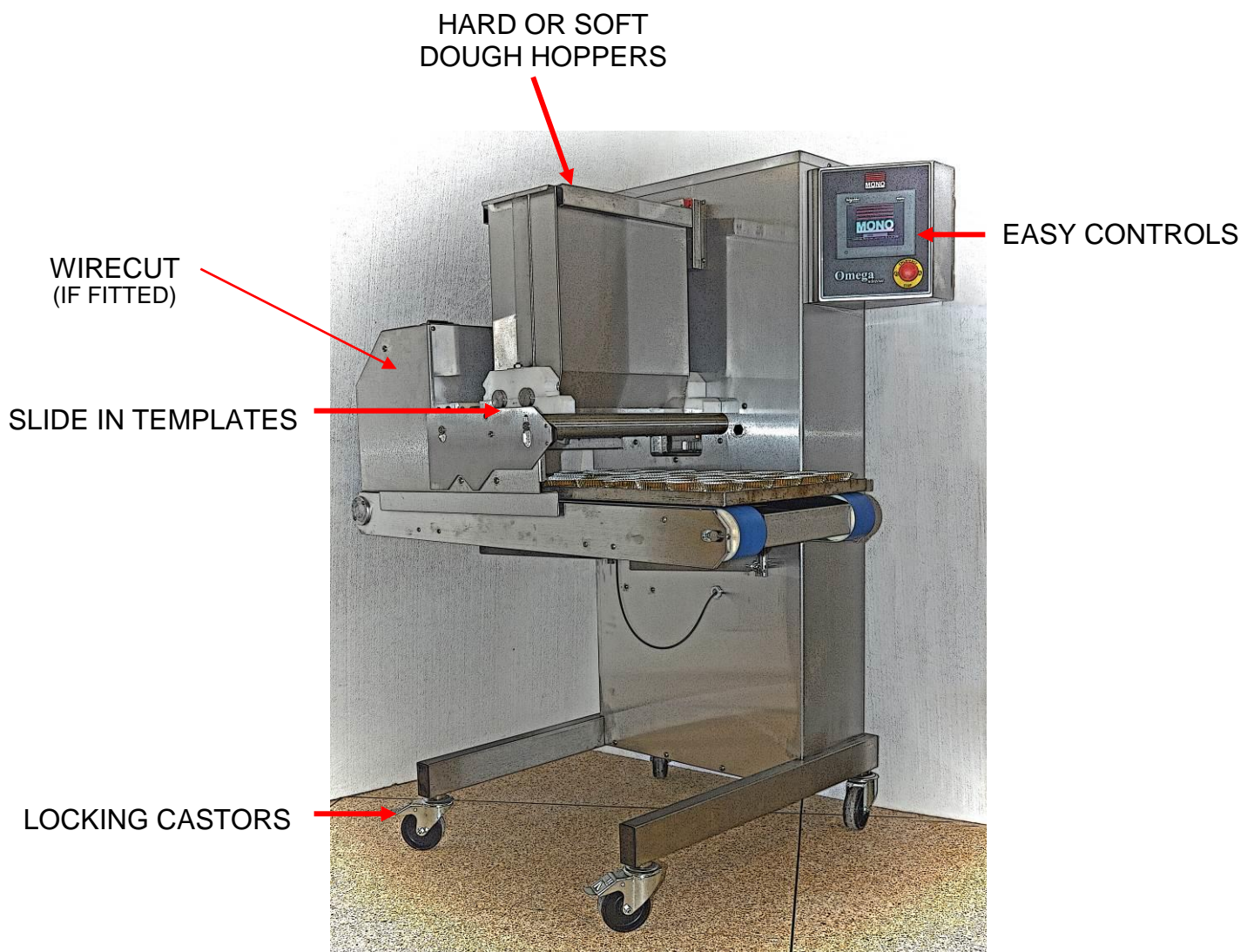
1.0	-	INTRODUCTION	
2.0	-	DIMENSIONS	
3.0	-	SPECIFICATIONS	
4.0	-	SAFETY	
5.0	-	INSTALLATION	
6.0	-	ISOLATION	
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# 1.0 INTRODUCTION

Omega  
PLUS

- The innovative “five axis deposit” design of MONO’s **“Omega PLUS”** and **“Omega PLUS with wirecut”** depositor allows it to recreate most of the hand movements of the Master confectioner. This makes the **“Omega PLUS”** capable of exceptional accuracy of product weight, size and shape.
- Maintenance is kept to a minimum and the smooth body design makes daily cleaning quick and easy.
- Easy to use computer software gives access to 550 programs, which are stored in the memory and easily recalled for use or modification. Control is via a colour touch screen with graphically represented products, already installed, that can be created or edited to the required product.
- It is available with soft and hard dough hoppers. There is also a large selection of templates and nozzles as well as various shape biscuit dies to use with the wirecut version.



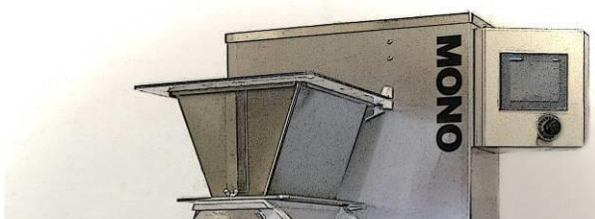
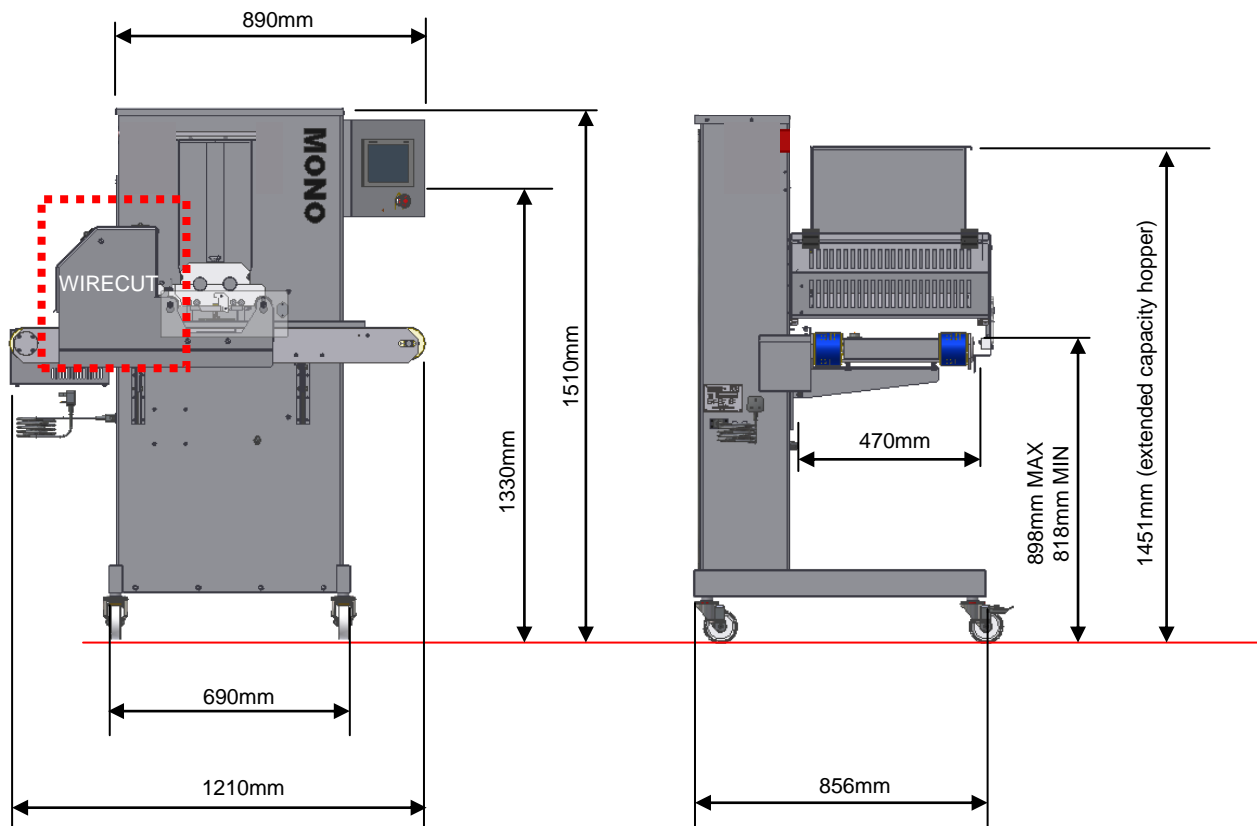
MODELS ARE AVAILABLE WITH OR WITHOUT WIRECUT OPTION



## 2.0 DIMENSIONS

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MODELS ARE AVAILABLE WITH OR WITHOUT WIRECUT OPTION



## 3.0 SPECIFICATIONS

**Omega  
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	<u>SOFT DOUGH</u>		<u>HARD DOUGH</u>	
<b>MODEL</b> (Nom. hopper width (mm))	<b>400</b>	<b>450</b>	<b>400</b>	<b>450</b>
<b>Weight</b> (with hopper fitted) (kg) :	<b>196</b>	<b>210</b>	<b>216</b>	<b>235</b>
<b>Standard hopper Capacity</b> (litre) :	<b>20</b>	<b>22.5</b>	<b>21</b>	<b>24</b>
<b>Extended hopper Capacity</b> (litre) :	<b>36</b>	<b>41</b>	<b>31</b>	<b>35</b>

**Power:** Single phase, 13A max load. Suitable for 200v, 220v, 230v, and 240v, 50-60 Hz supply.  
**MAX RATING** 2.5kW single phase fused at 13A

Cycles per minute = Up to 35  
 Min distance between trays = 50mm  
 Max vertical travel = 80mm  
 Max program storage = 650  
 Number of languages = 18 (additional in future)  
 Noise level = Less than 85dB  
 Electronics = All microprocessor controlled

### **NOTE:**

The minimum deposit that can be made depends on several factors - recipe, mixing method, template size, nozzle size and deposit speed.

As a guide the following is the minimum that should be attempted:

Macaroons	6g.
Meringues	3g.
Choux Paste	5g.
Viennese	4g.
Sponge Drops	4g.

However, consult **Mono Equipment** if intended product falls outside the above general machine specification to determine the exact capabilities of the "Omega" with any specific product.

*As it is our policy to improve our machines continuously, we reserve the right to change specifications without prior notice*

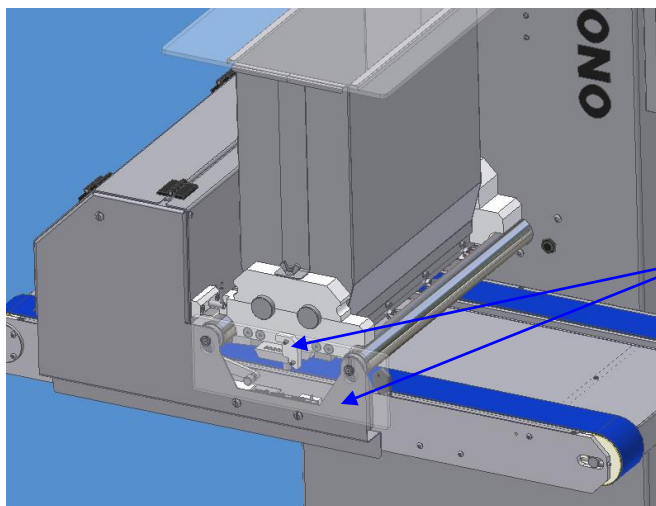




- 1 **Never use a machine in a faulty condition** and always report any damage.
- 2 **Only trained engineers** may remove parts that need a tool to remove them.
- 3 Always ensure hands are dry before touching any electrical appliance (including cable, switch and plug). **NEVER move machinery by pulling on the power cords or cables.**
- 4 **Ensure that the floor area around the OMEGA is clean to avoid slipping** – especially if carrying heavy hopper and template components to and from the machine.
- 5 **All operatives must be fully trained.**  
Use of the machine can prove dangerous if:
  - ❑ the machine is operated by **untrained or unskilled staff**
  - ❑ the machine is not used for its **intended purpose**
  - ❑ the machine is **not operated correctly**

**All safety devices applied to the machine during manufacture and the operating instructions in this manual are required to operate this machine safely. The owner and the operator are responsible for operating this machine safely.**
- 6 People undergoing training on the machine must be under **direct supervision**.
- 7 **Do not operate the machine with any panels or guards removed.**  
They are there to protect you.
- 8 **No loose clothing or jewellery** should be worn while operating the machine.
- 9 **Switch off power** at the mains isolator when machine is not in use and **before carrying out any cleaning or maintenance.**

- 10 The bakery manager or the bakery supervisor should carry out **daily safety checks** on the machine.
- 11 Do not operate machine without a hopper **template and the guard fitted correctly**.



**(11) HOPPER TEMPLATE AND  
GUARD FITTED**

**NOTE**

Guard can be plastic or metal depending  
on the machine model

- 12 Due to the essential requirement for handling heavy components during cleaning, it is recommended that **protective footwear** be worn when carrying out such procedures.

**ALL CLEANING AND MAINTENANCE OPERATIONS MUST  
BE MADE WITH THE MACHINE DISCONNECTED FROM  
THE POWER SUPPLY.**

## 5.0 INSTALLATION

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PLUS

- 1 Ensure that the depositor is connected to correct electric supply, as specified on the serial number plate on the side of the machine.
- 2 Ensure that the correct fuse rating is fitted in the electrical supply

## 6.0 ISOLATION



**IN AN EMERGENCY, SWITCH OFF AT THE ELECTRICAL MAINS WALL ISOLATOR, OR PUSH THE EMERGENCY STOP BUTTON.**

*To release the emergency stop button, turn clockwise.*



**STOP BUTTON**





## 7.0 CLEANING INSTRUCTIONS

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### NOTE:



- Cleaning must be carried out by fully trained personnel only.
- Isolate machine from mains supply before carrying out any cleaning.
- Do not steam clean or use a jet of water.

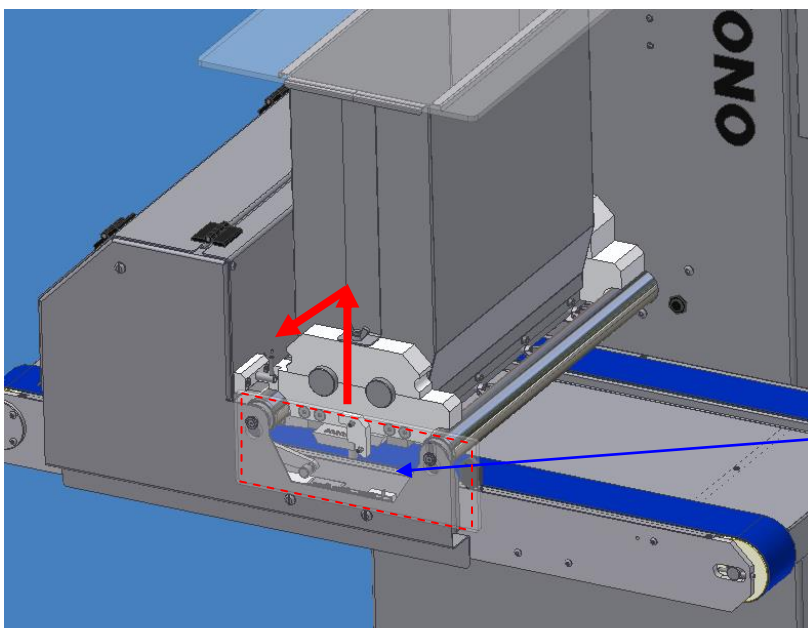
**-Do not use any form of caustic detergent or abrasive cleaners. -**

All the outer surfaces of the machine should be wiped over daily with warm soapy water.

### **HARD AND SOFT DOUGH HOPPERS** **BETWEEN PRODUCT MIX CHANGES**

*The feed hopper, pump assembly, template, nozzles etc. should be removed from the machine and dismantled for thorough cleaning between product mix changes.*

1. Open hopper and remove excess mixture remaining.
2. Lift off front safety cover.



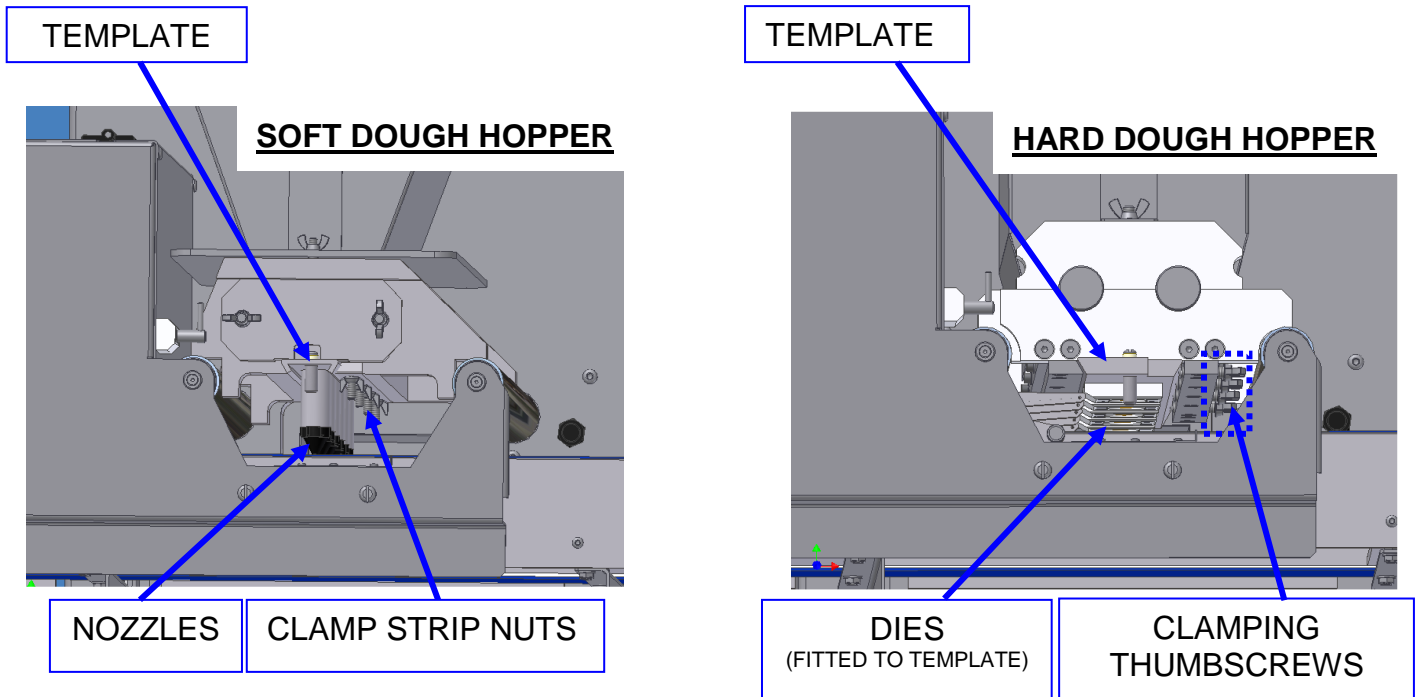
**SAFETY COVER**

**NOTE**  
Guard can be plastic or metal depending on the machine model

3. Slacken template clamp strip nuts or thumbscrews (depending on type of hopper)  
Remove fitted template from pump assembly by sliding out to avoid subsequent damage.

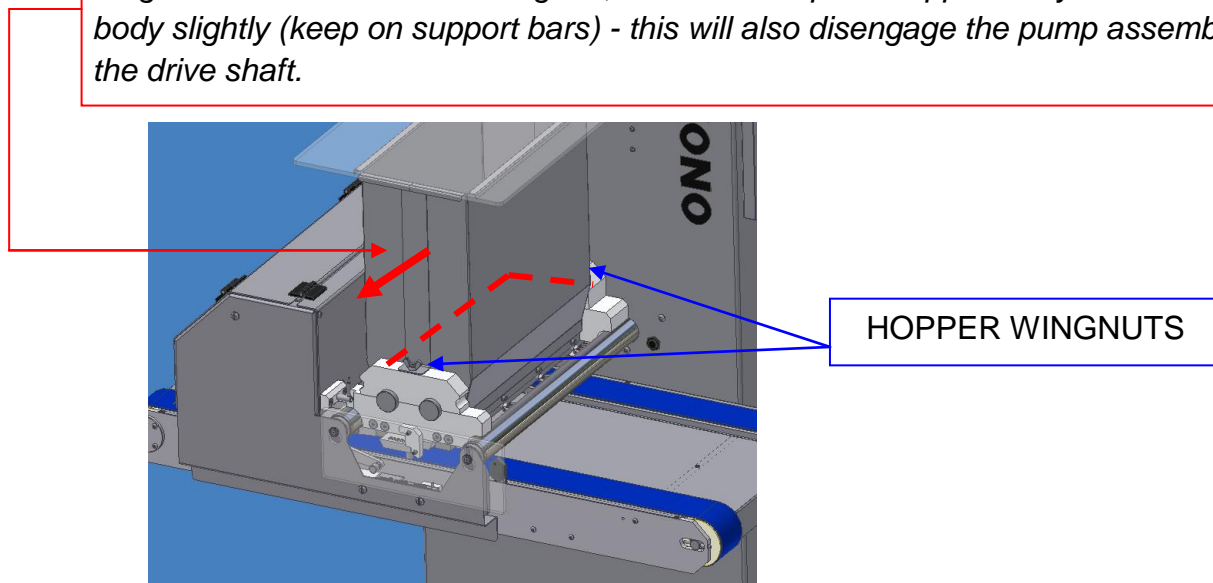
**NOTE.**

*Thumbscrews only need to be released slightly to allow the template to slide away from the pump assembly. If loosened too much, the template will have to be supported.*



- 4 To reduce weight and bulk, separate and remove empty feed hopper from pump assembly, whilst still on the machine, by unscrewing the wing nuts.

*To gain access to the inner wing nut, slide the complete hopper away from the machine body slightly (keep on support bars) - this will also disengage the pump assembly from the drive shaft.*



*any will not be lost.*



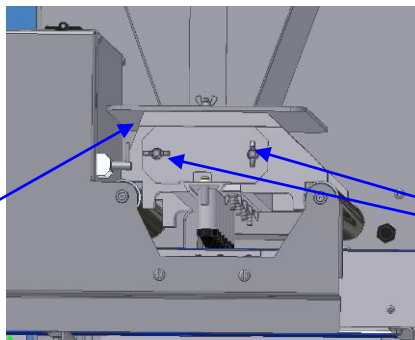
**CAUTION:**

**The feed hopper and pump assembly exceeds 25kg and will need to be lifted off by two people, or dismantled into smaller components while still on the machine.**

Take care to avoid damage to the sealing surface of the feed hopper during removal, cleaning, assembly and storage.

1. After removing the feed hopper, check condition of feed hopper seal.
2. Unscrew the end cap retaining nuts from the accessible side of the pump assembly.  
*[Ensure that the nuts are placed where they will not be lost.]*

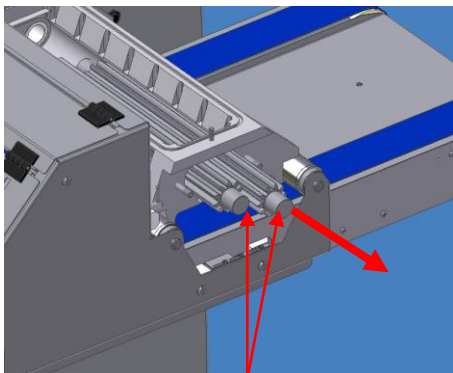
FEED HOPPER  
SEALING SURFACE



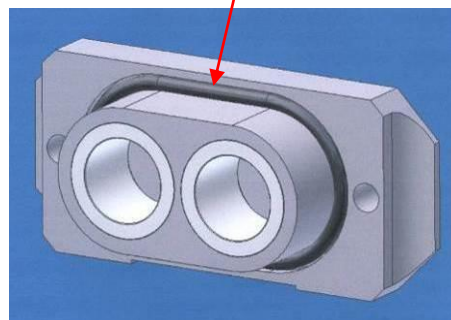
ENDCAP NUTS

3. Withdraw the end-cap \

*Ensure that the 'O' sealing ring on the inside of the end cap is not damaged during cleaning.*



PUMP GEARS  
REMOVE WITH END CAP  
(NOT SHOWN)



'O' RING IN GROOVE

END CAP

4. Remove remainder of pump assembly from the machine and remove remaining end-cap to fully dismantle pump assembly components for cleaning.



# HARD DOUGH HOPPER

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PLUS



## **CAUTION:**

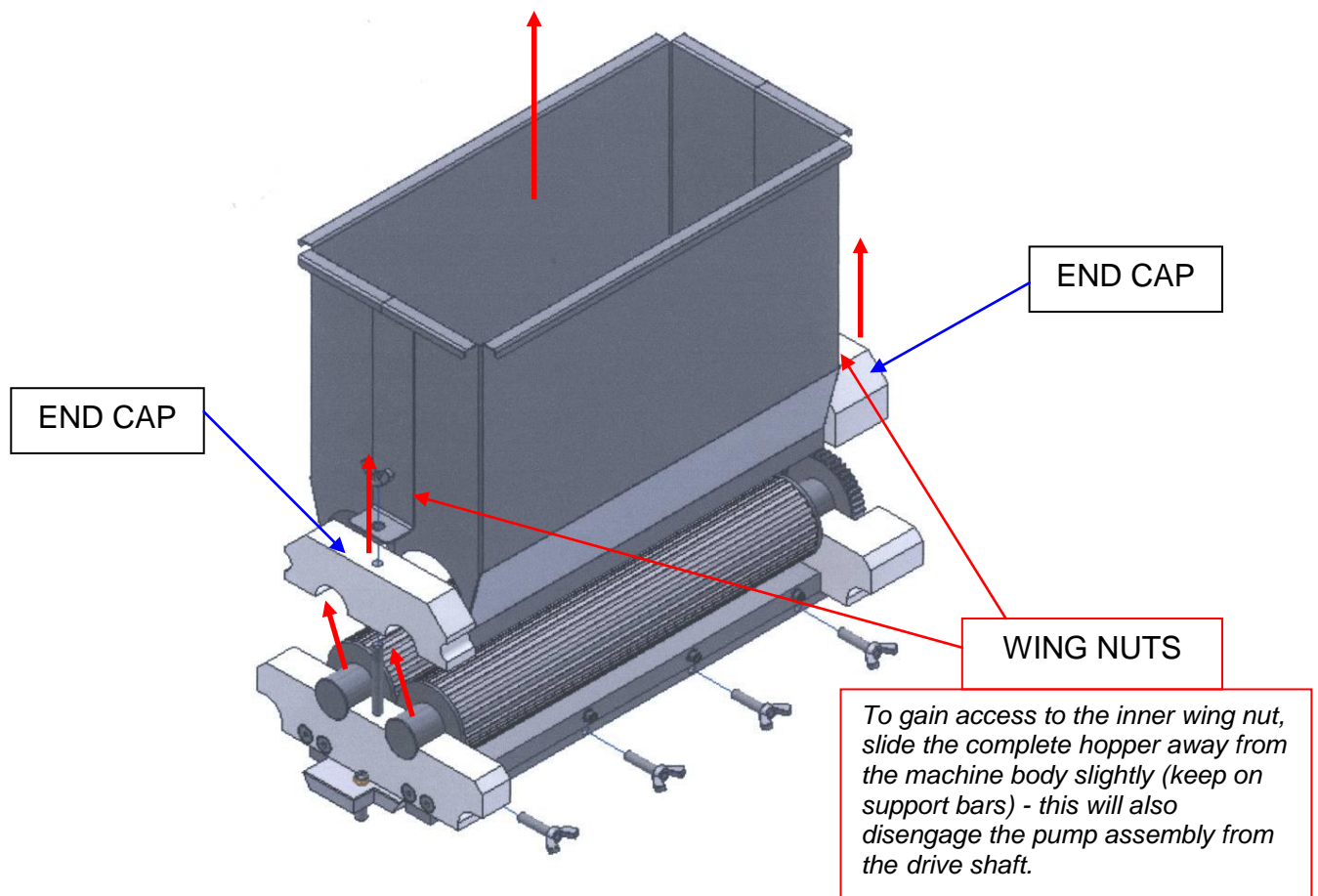
**The feed hopper and pump assembly exceeds 25kg and will need to be lifted off by two people, or dismantled into smaller components while still on the machine.**

To reduce weight and bulk, separate and remove empty feed hopper from pump assembly, whilst still on the machine, by unscrewing the wing nuts.

*(Ensure that the nuts are placed where they will not be lost.)*

The pump assembly will now be lighter and more easily removed.

1. Lift off both upper plastic end-caps.
2. Remove both gears from the assembly, one at a time, by lifting vertically.
3. Remove remainder of pump assembly from the machine for cleaning.



## **NOTE:**

**Use only warm soapy water to clean these parts. They should be rinsed and thoroughly dried before re-assembly.**

**The greatest care must be taken not to drop any parts.**



**Do not leave any components in the hopper.**



## 8.0 OPERATING CONDITIONS

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To obtain the best product results and consistent operation,

- ✓ Make sure the depositor is used on a **level floor**.
- ✓ Ensure **flat trays** of consistent length, width, material and edge dimensions are used.
- ✓ Ensure **undamaged nozzles and templates** are used.
- ✓ Keep the machine **clean**.



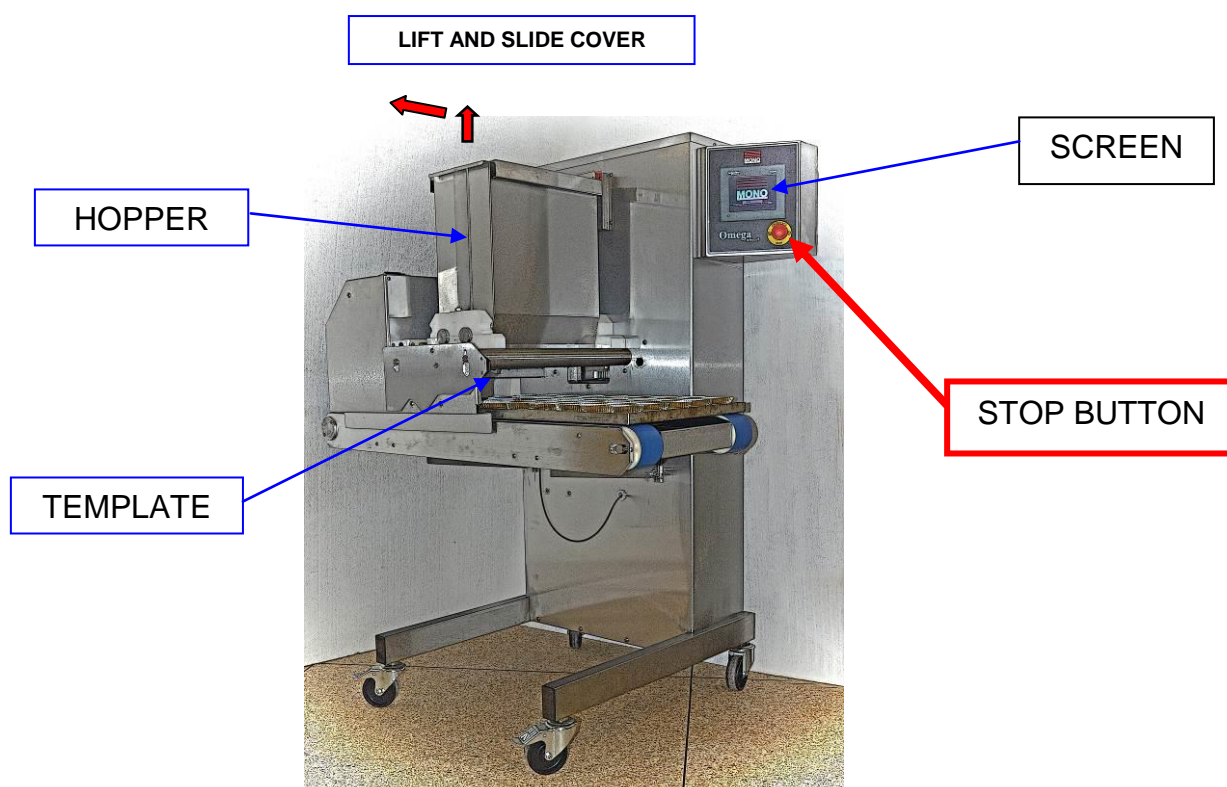
## 9.0 PREPARING FOR OPERATION

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PLUS

**The use of templates and/or accessories not produced or supplied by MONO Equipment will invalidate the machine's warranty**

- 1 Select template and nozzles (and finger frame, if wirecut is to be used) and fit as section 9a & 9b (following pages). Fill hopper with mix and close hopper cover.

*It is recommended that when heavy mixes are used, the inside of the hopper should be coated with vegetable oil; for lighter mixes such as meringue, dampen with water. The oil or water will help the mix to settle down the hopper walls and prevent air being sucked in.*



- 2 Connect power cable to electrical supply.  
*Make sure stop button is in released position (turn clockwise if required).*
- 3 Select an existing program or create a new program through the on-screen menus.  
(see section 10 operation)
- 4 The machine is now ready for operation.

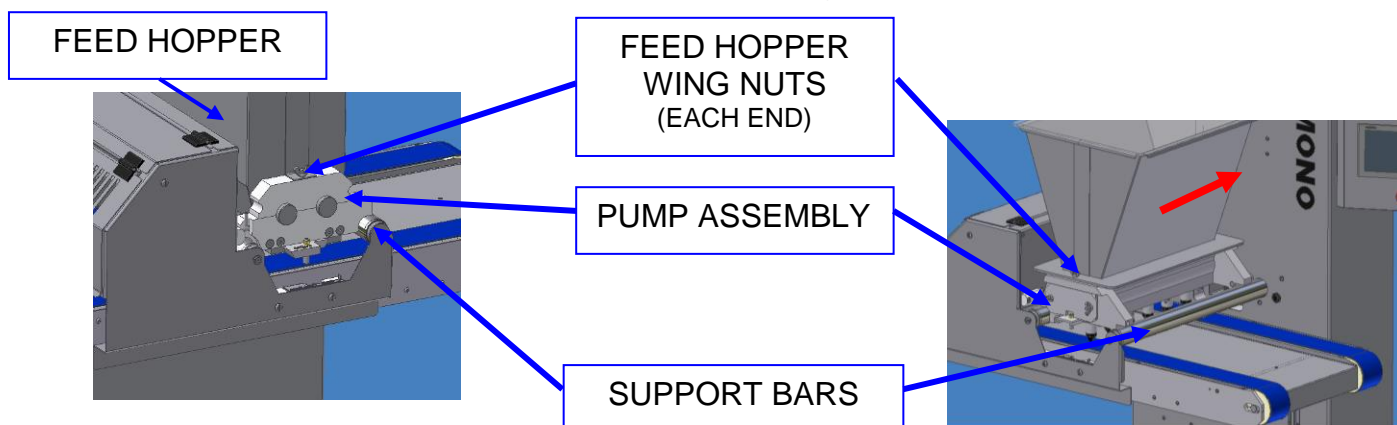


## 9a FITTING THE HOPPER

**CAUTION SHOULD BE TAKEN WHEN FITTING THE HOPPER AND PUMP ASSEMBLY, AS WEIGHT EXCEEDS 25kgs ON SOME MODELS**  
It will need to be lifted on by two people, or dismantled into smaller components before fitting on the machine.  
**MAKE SURE THE FLOOR AREA AROUND THE MACHINE IS CLEAN**

To reduce weight and bulk, fit the complete hopper assembly in two stages - first the pump assembly onto the support bars, then the feed hopper body onto the pump assembly.

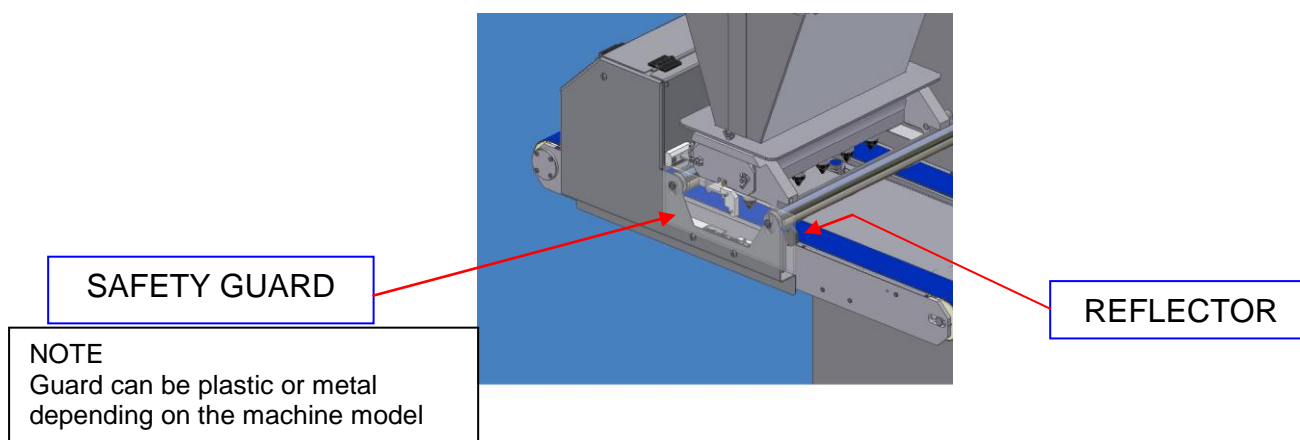
- 1 By hand, align pump assembly drive gear roller with drive shaft on machine.
- 2 Fit hopper to pump assembly and secure with wing nuts.
- 3 Slide hopper on support bars until fully up against machine.



### HARD DOUGH

### SOFT DOUGH

- 4 After the hopper is fitted, the safety guard **MUST BE** replaced with the reflector facing towards the machine body.



**DO NOT OPERATE MACHINE WITHOUT TEMPLATE FITTED**

## 9b FITTING A TEMPLATE

- **Soft dough**

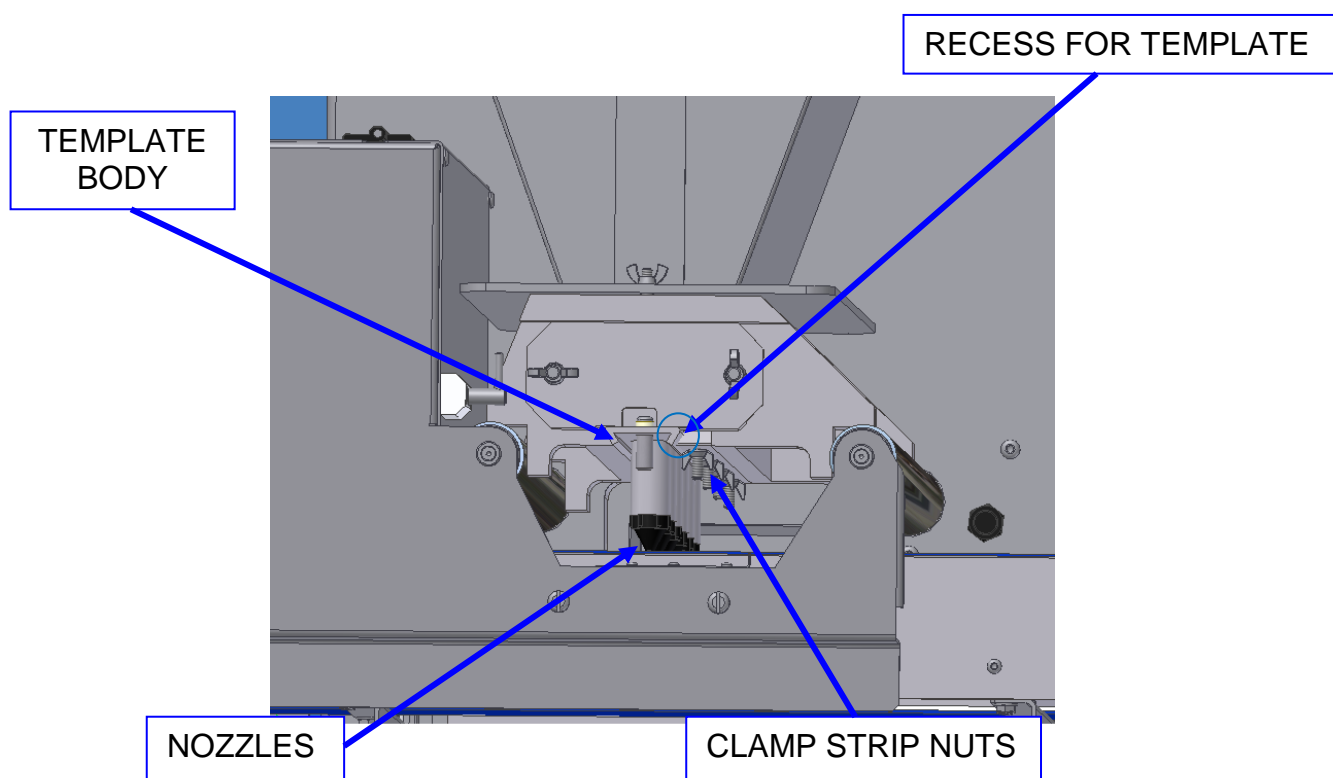
Non-rotary templates can be fitted with nozzles. This requires screwing the nozzles into the threaded holes provided.

Rotary templates can have plastic nozzles screwed into nozzle holders (straight or offset).

OR

Metal nozzles secured in place by a separate nut.

- 1 Select template and nozzles required.  
(Nozzles are not required for sheeting, staggered or stub templates)
- 2 Attach nozzles to template body:



- 3 Slide the template assembly until it reaches the stop.
- 4 Tighten the nuts on the clamp strip (on underside of pump assembly) to secure template.

**NOTE.** If the nuts are not securely tightened, leakage of mix will occur, affecting deposit weights.



**DO NOT OPERATE MACHINE WITHOUT TEMPLATE FITTED**

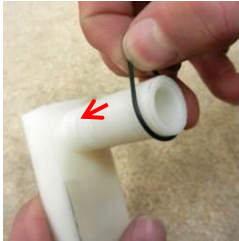


## **BEFORE USING STRAIGHT & OFFSET NOZZLE HOLDERS**

### **“O” RINGS MUST BE FITTED**

Nozzle holders provide the means of attaching standard plastic nozzles to the soft dough rotary templates and the sealing rings need to be fitted before using and may need replacing occasionally to ensure correct operation.

“O” RING PART NUMBER = A900-12-010 (SUPPLIED IN BAGS OF 20)



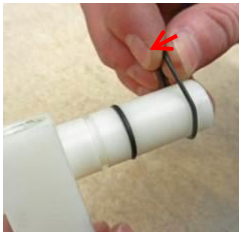
LOOP FIRST RING OVER END



SLIDE RING DOWN TO GROOVE



FIRST RING IN CORRECT POSITION



LOOP SECOND RING OVER END



SLIDE RING DOWN TO SECOND GROOVE,  
PASSING OVER FIRST RING



SECOND RING IN CORRECT POSITION

## • Hard dough

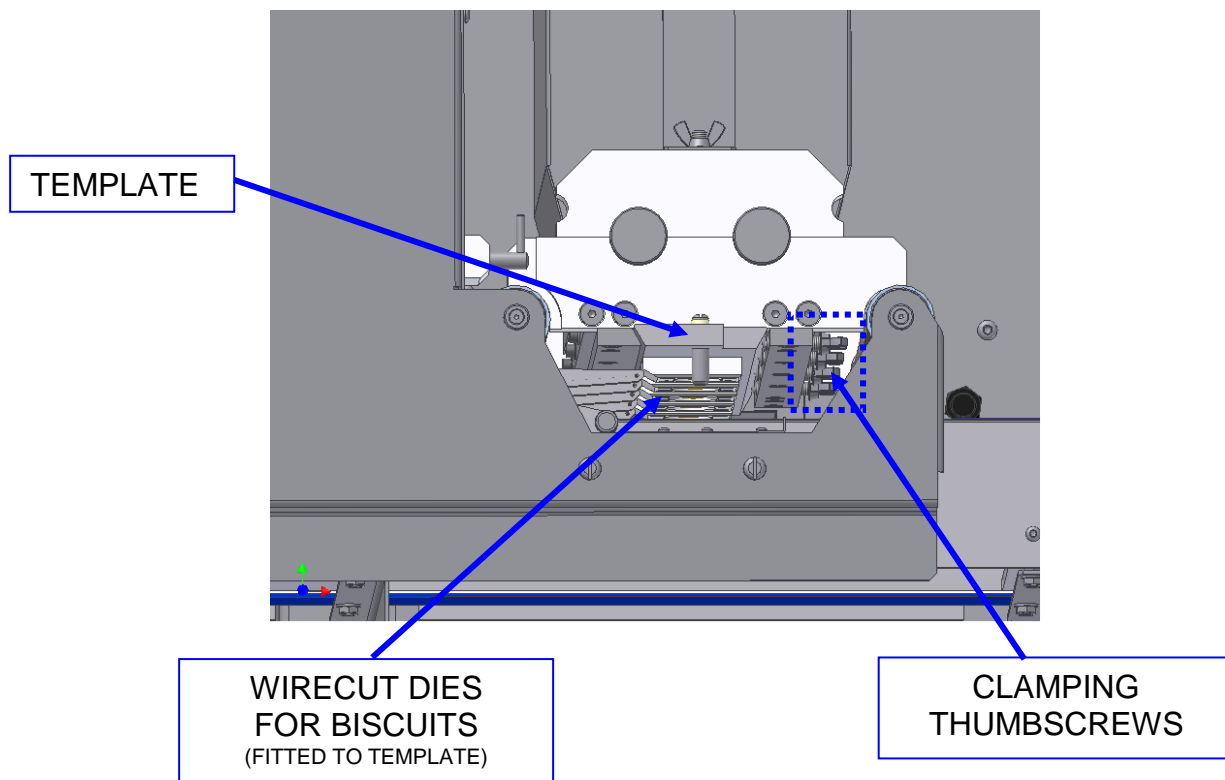
Non-rotary templates that can be fitted with nozzles require them to be secured in place with a separate nut. *Nozzles are not required for sheeting or wirecut templates.*

Rotary templates require nozzles to be secured in place with a separate nut.

- 1 Select wirecut template or template and nozzles required.
- 2 Attach nozzles (if required) to template body using special nut:
- 3 Slide template into position and hand-tighten thumbscrews.

### **NOTE.**

*Thumbscrews only need to be released slightly to allow the template to slide away from the pump assembly. If loosened too much, the template will have to be supported while the screws are tightened.*



**DO NOT OPERATE MACHINE WITHOUT TEMPLATE FITTED**

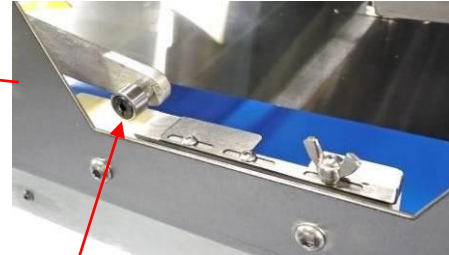
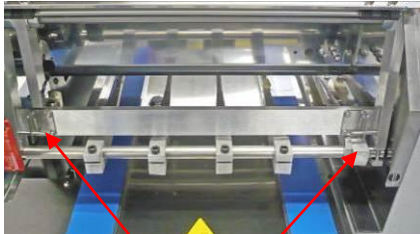




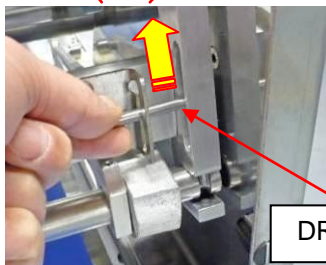
## IF WIRECUT FITTED

### FITTING WIRECUT FINGERS

1. Select wirecut fingers that suit the chosen template to be used.i.e. the correct number to match the number of dies across template.
2. Remove drop arm pins and insert finger frame into arms. Ensure that the follower arm roller is positioned on the cam track.



FOLLOWER ARM  
ROLLER

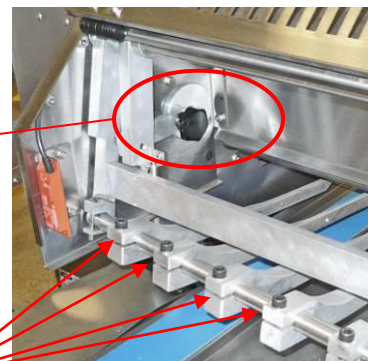


DROP ARM PINS

3. Replace drop arm pins.
4. Disconnect motor release knob and push fingers forward in order to line up the wire with the dies.



MOTOR RELEASE KNOB

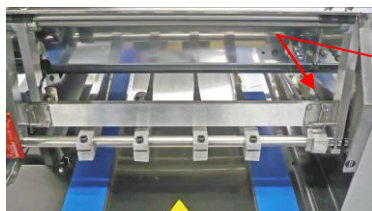


FINGER ADJUSTING BOLTS

5. Adjust individual finger bolts to raise the wire to touch the bottom surface of the dies used in the template.

OR

Adjust the spring loaded screw to raise or lower all fingers at the same time.



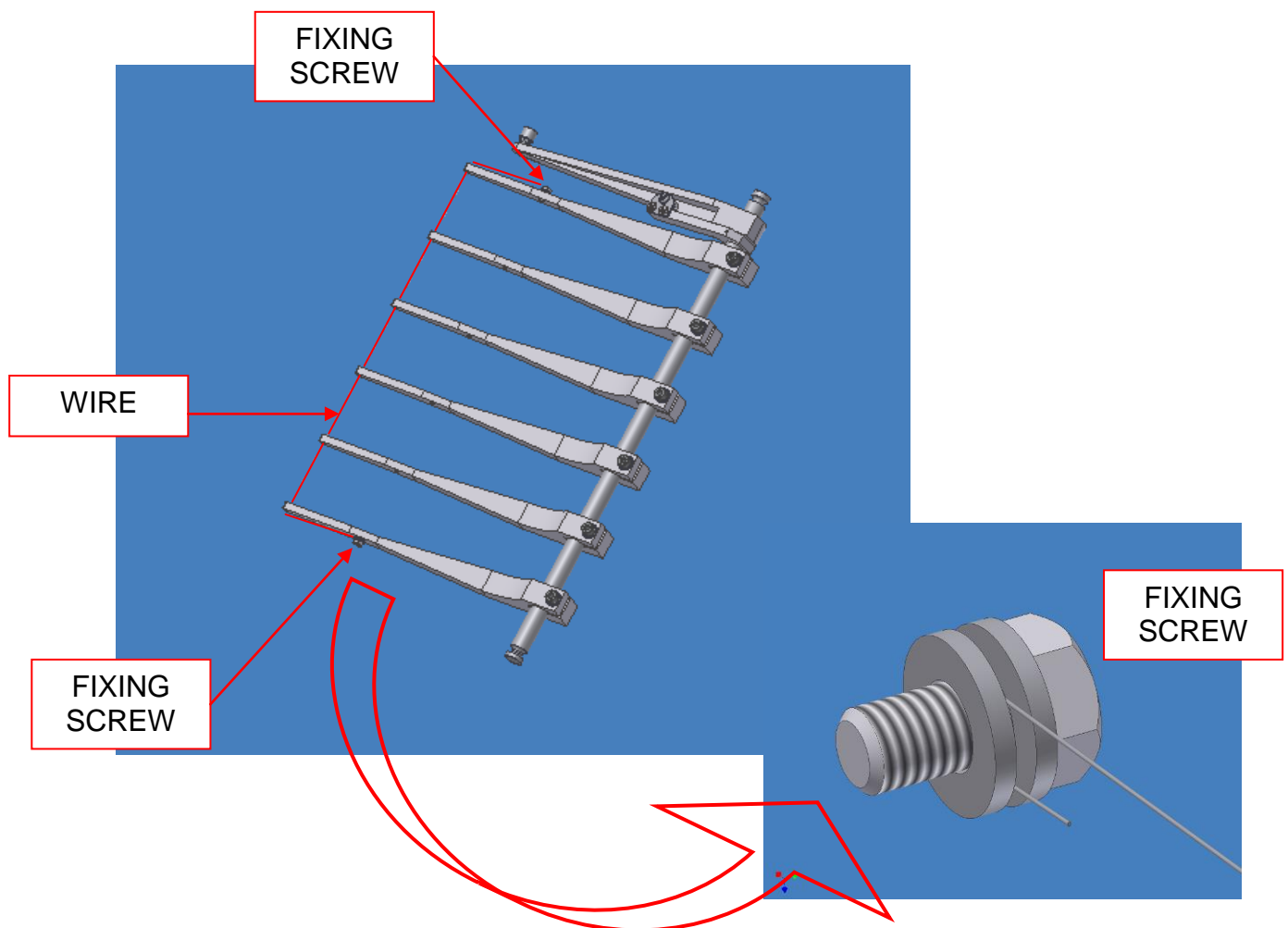
SPRING LOADED ADJUSTMENT SCREW

## IF WIRECUT FITTED

### REPLACING BROKEN WIRE

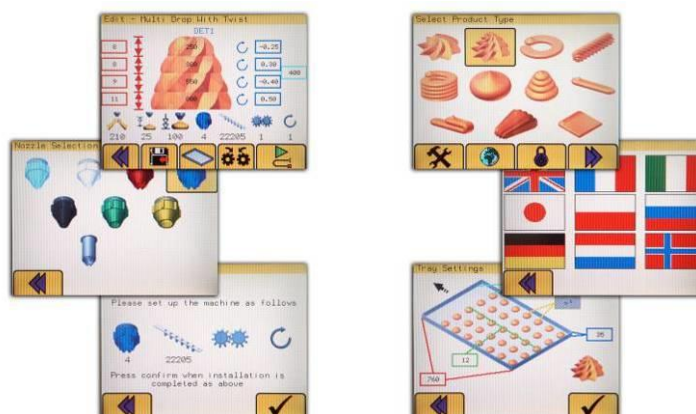
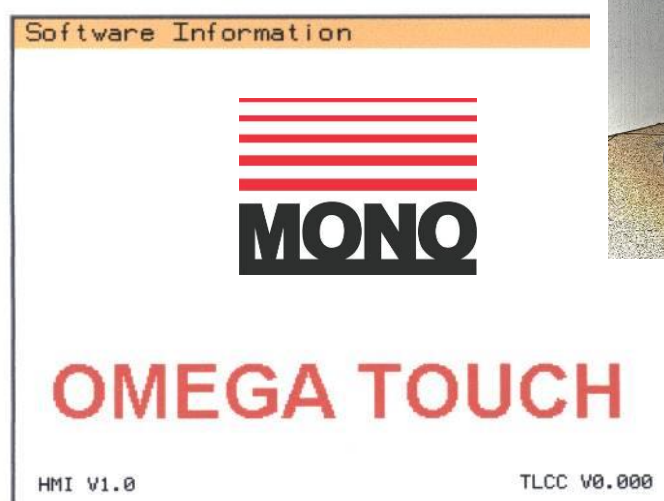
MAKE SURE THAT ALL PIECES OF WIRE HAVE BEEN FOUND BEFORE OPERATING MACHINE AFTER A WIRE REPLACEMENT.

1. Remove wirecut fingers from the machine.
2. Remove all parts of broken wire
3. Feed new wire round fixing screw, between washers and tighten screw.
4. Feed the wire through the eyehole in the end of each finger.
5. Feed new wire round other fixing screw, between washers. Pull wire tight and tighten screw. (wire should be like a guitar string).
6. Replace the fingers back in the machine and check set up and operation.



# 10.0 'OMEGA PLUS' OPERATION

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PLUS



ALL OPERATIONS ARE ACTIVATED BY TOUCHING AREAS ON THE SCREEN WITH A FINGER.  
DO NOT USE EXCESSIVE FORCE OR HARD OBJECTS AS THIS WILL INVALIDATE MACHINE WARRANTY.

# OPERATING KEY

## FOR FOLLOWING INSTRUCTIONS

**BLUE = OPERATION**

FOLLOW BLUE ARROWS AND BOXES TO OPERATE THE DEPOSITOR WITH ALREADY SAVED PROGRAMS

**RED = CHANGE SETTINGS**

FOLLOW RED ARROWS AND BOXES TO CHANGE SETTINGS AND CREATE NEW PROGRAMS

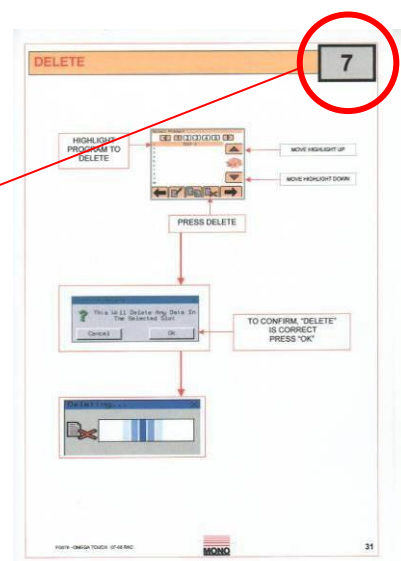
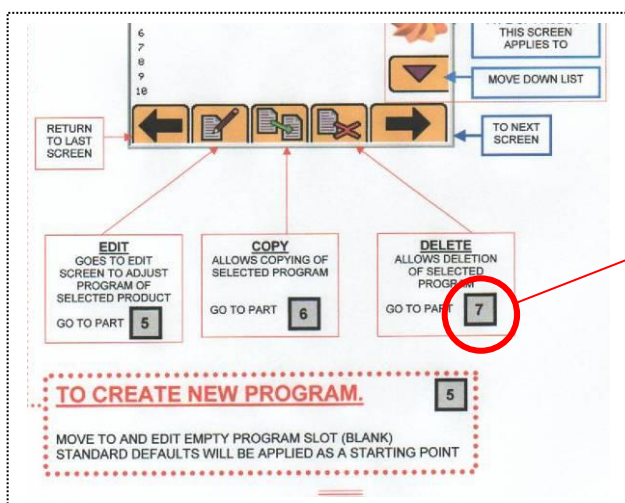


**= KEYBOARD ENTRY REQUIRED**

WHEN KEYBOARD APPEARS, A CODE MUST BE ENTERED BY TOUCHING THE NUMBERS IN THE CORRECT ORDER

IF A GREY BOX IS SHOWN IN THE BUTTON DESCRIPTION  
e.g. **7** GO TO THE CORRESPONDING PAGE FURTHER  
ON IN THE INSTRUCTIONS.

(MARKED IN TOP RIGHT HAND CORNER OF EACH PAGE)





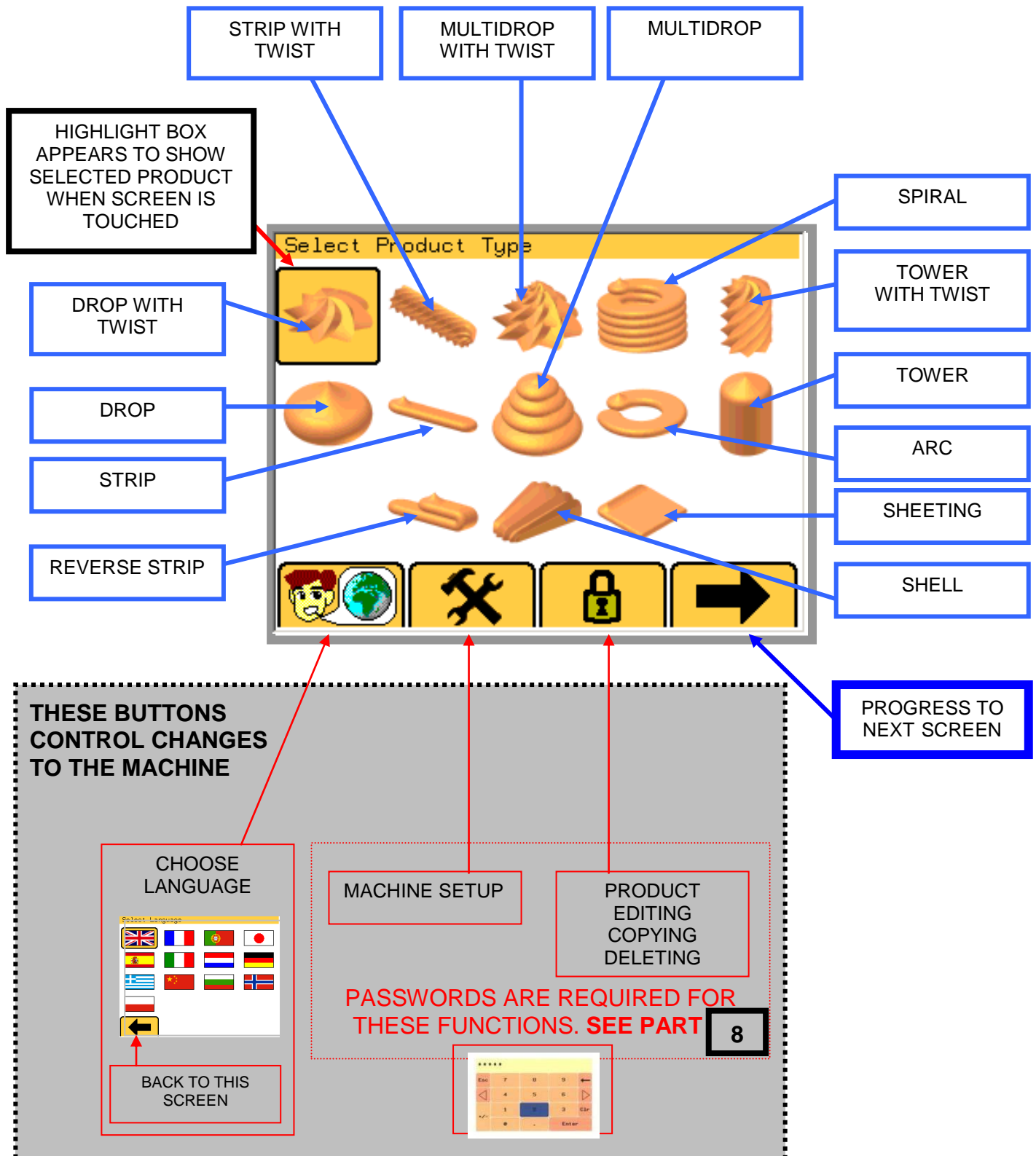
# SELECT PRODUCT TYPE

SELECT PRODUCT TO DEPOSIT OR TO CREATE A NEW PROGRAM

1

ALL OPERATIONS ARE ACTIVATED BY TOUCHING AREAS ON THE SCREEN WITH A FINGER.  
DO NOT USE EXCESSIVE FORCE OR HARD OBJECTS AS THIS WILL INVALIDATE MACHINE WARRANTY.

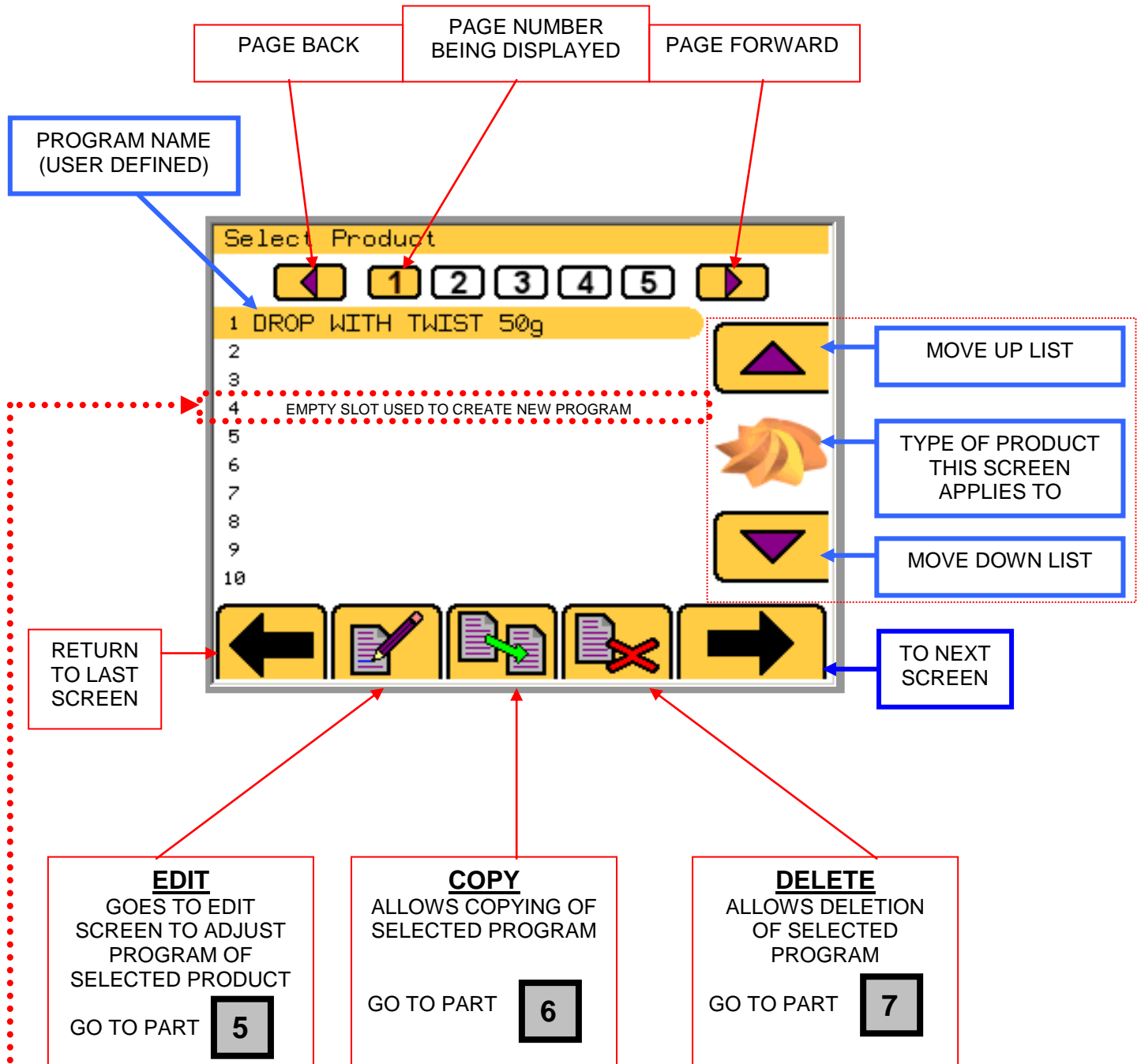
**TOUCH THE SCREEN FOR THE TYPE OF PRODUCT REQUIRED  
THEN → TO MOVE TO THE NEXT SCREEN**



# SELECT SAVED PRODUCT TYPE

OR CHOOSE EMPTY SLOT TO CREATE A NEW PROGRAM

2



## TO CREATE A NEW PROGRAM.

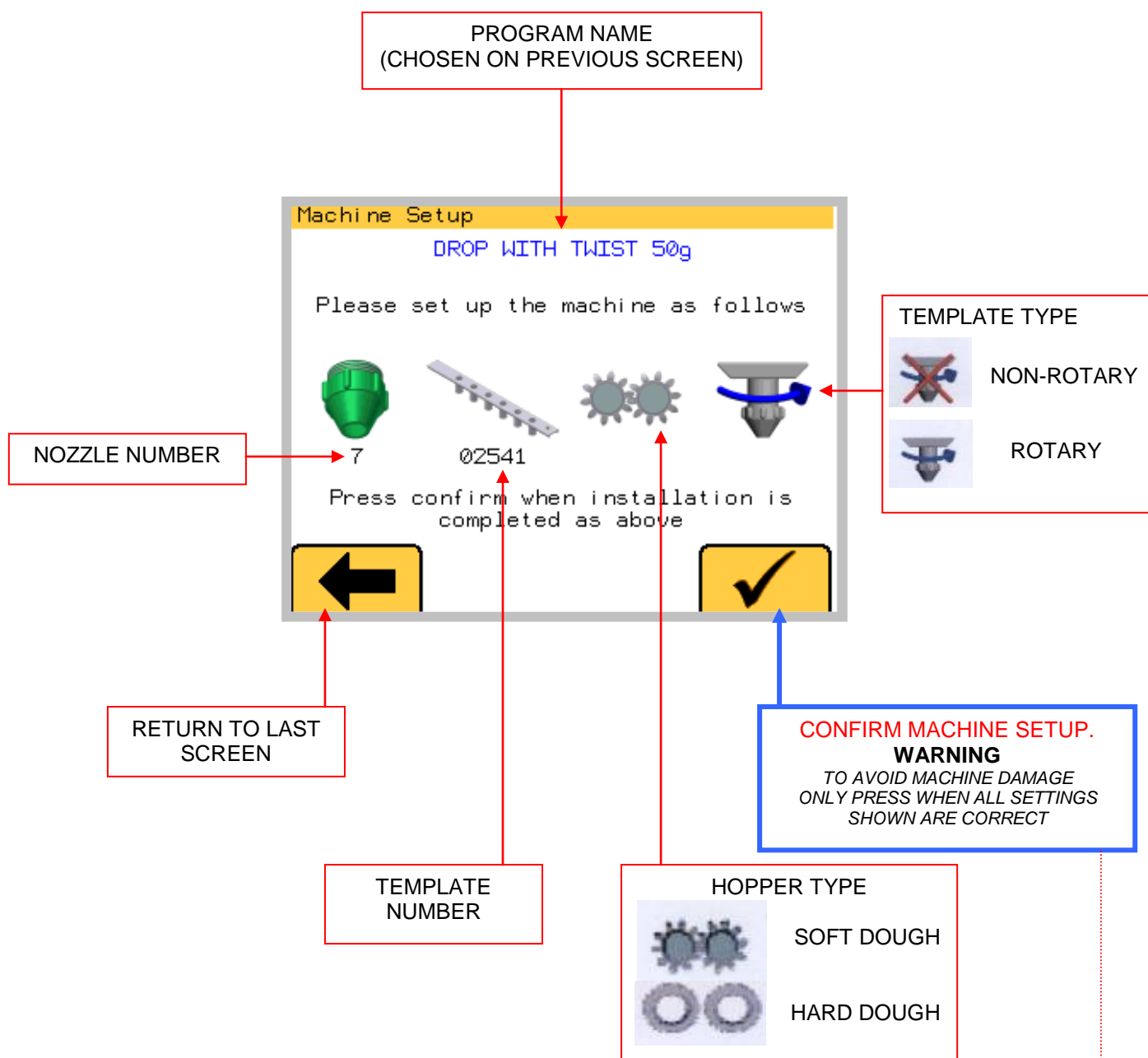
5

MOVE TO AND EDIT EMPTY PROGRAM SLOT (BLANK)  
STANDARD DEFAULTS WILL BE APPLIED AS A STARTING POINT

# CONFIRM SETUP OF MACHINE

3

MACHINE MUST BE SET AS SHOWN ON THE SCREEN.  
THEN PRESS CONFIRM BUTTON.

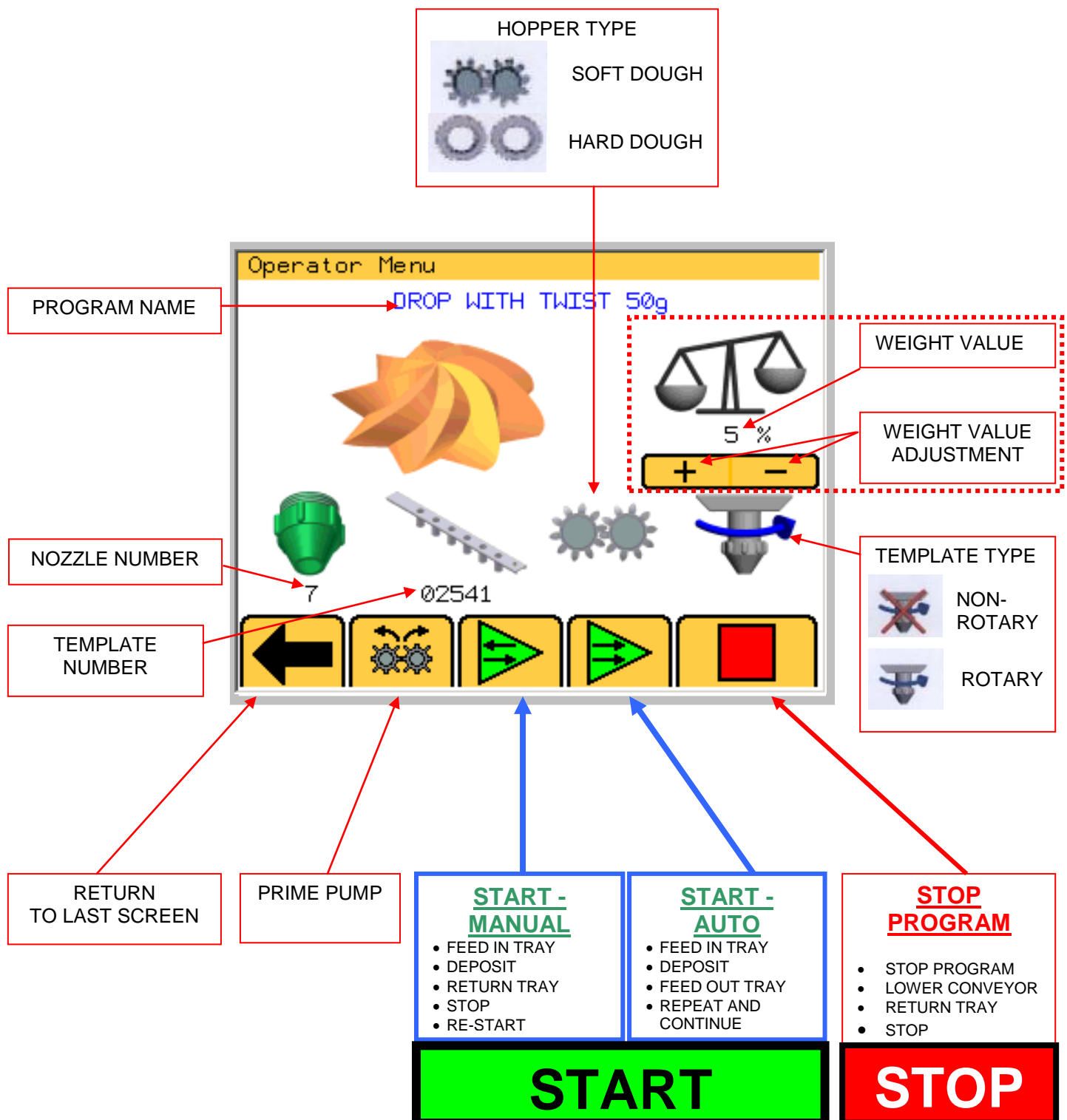


**TO AVOID MACHINE DAMAGE**  
**ONLY PRESS CONFIRM BUTTON WHEN ALL PARTS ATTACHED TO THE MACHINE**  
**ARE AS SHOWN ON THE SCREEN**

# OPERATOR SCREEN

4

MACHINE SHOULD BE SET AS SHOWN ON THE SCREEN.  
THIS SCREEN CONTROLS THE ACTIONS REQUIRED BY THE OPERATOR.





# EDIT AND SAVE SCREEN

5

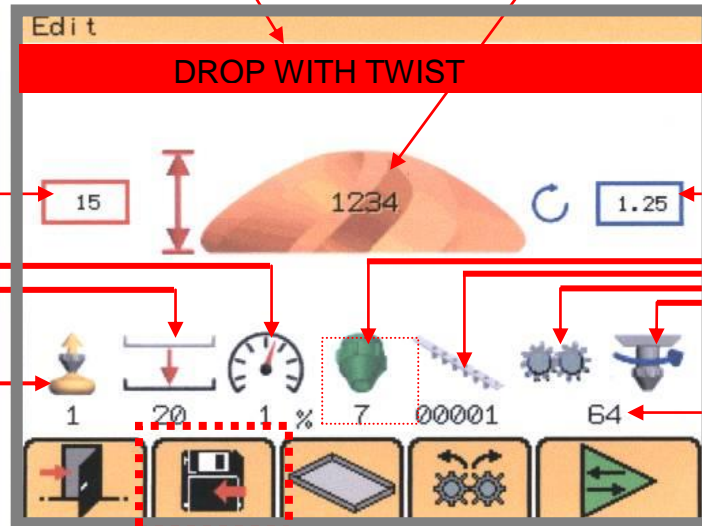
## EXAMPLE: DROP WITH TWIST

PROGRAM NAME  
MUST BE ENTERED TO  
ALLOW PROGRAM TO SAVE

PRODUCT QUANTITY  
THIS IS A SETTING NUMBER AND  
DOES NOT INDICATE A MEASURE OF  
ACTUAL VOLUME

NOZZLE HEIGHT (mm)  
ABOVE TRAY SURFACE

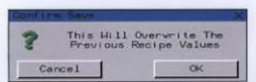
NOZZLE ROTATIONS  
NUMBER OF TURNS  
DURING A DEPOSIT CYCLE



EXIT THIS SCREEN



**SAVE EDITS**



SUCK BACK  
QUANTITY

TABLE  
JOG DISTANCE (mm)

OVERALL  
MACHINE SPEED  
(% OF MAXIMUM)

ENTER TRAY  
SETUP  
SCREEN

GO TO PART  
5A

MAX HEIGHT FOR  
HOPPER/TEMPLATE  
COMBINATION

START  
MANUAL MODE

PRIME PUMP  
(SOFT DOUGH SHOWN)

TEMPLATE TYPE  
ROTARY  
NON-ROTARY

SELECT HOPPER  
HARD DOUGH  
SOFT DOUGH

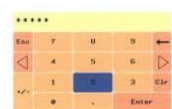
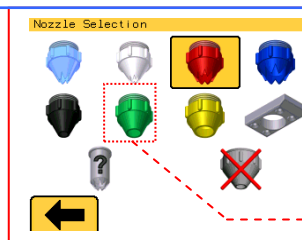
TEMPLATE NUMBER  
ENTER VIA KEYPAD  
THAT APPEARS WHEN  
PRESSED



## NOTE

A RED BACKGROUND TO  
ANY SETTING MEANS THAT  
THE VALUE MUST BE  
CORRECTED  
BEFORE STARTING

CHOOSE NOZZLE TYPE



**EXAMPLE:  
MULTIDROP WITH  
TWIST**

DEPOSIT QUANTITY FOR EACH LAYER

SETTING ERROR INDICATOR  
BOXES TURN RED WHEN INCORRECT SETTING MADE

NOZZLE HEIGHT (mm) FOR EACH LAYER

NOZZLE HEIGHT (mm) FROM TRAY SURFACE

NUMBER OF TURNS FOR EACH LAYER (-VE VALUES POSSIBLE)

OTHER SETTING BUTTONS ARE THE SAME AS LAST PAGE

PRIME PUMP (HARD DOUGH SHOWN)

**EXAMPLE:  
SHEETING / STRIP**

DEPOSIT QUANTITY FOR BEGINNING OF PRODUCT

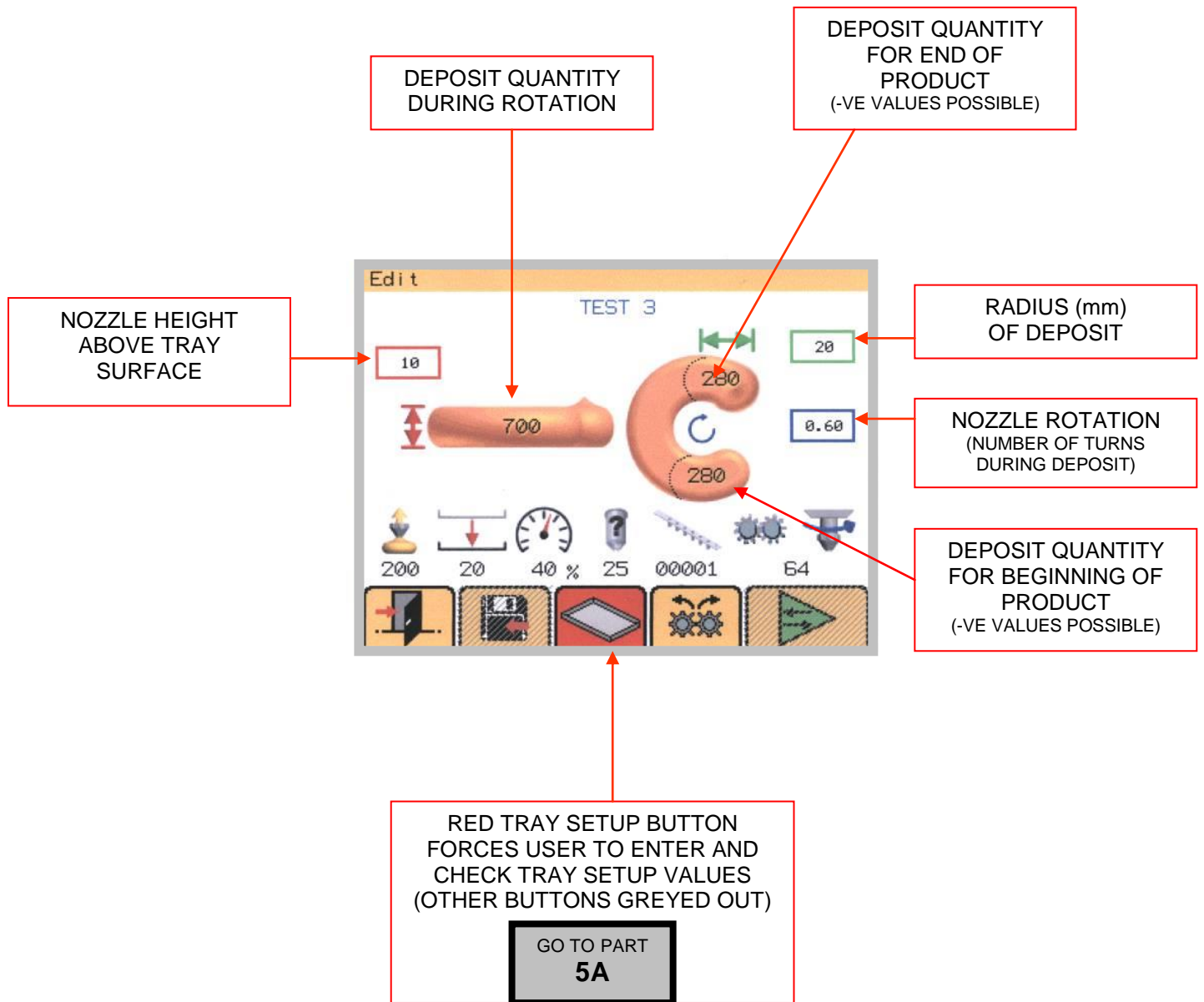
DEPOSIT QUANTITY FOR LENGTH

DEPOSIT QUANTITY FOR END OF PRODUCT (-VE VALUES POSSIBLE)

NOZZLE HEIGHT ABOVE TRAY SURFACE

LENGTH (mm) OF TRAY MOVEMENT

**EXAMPLE:  
“C” SHAPE  
(ARC)**

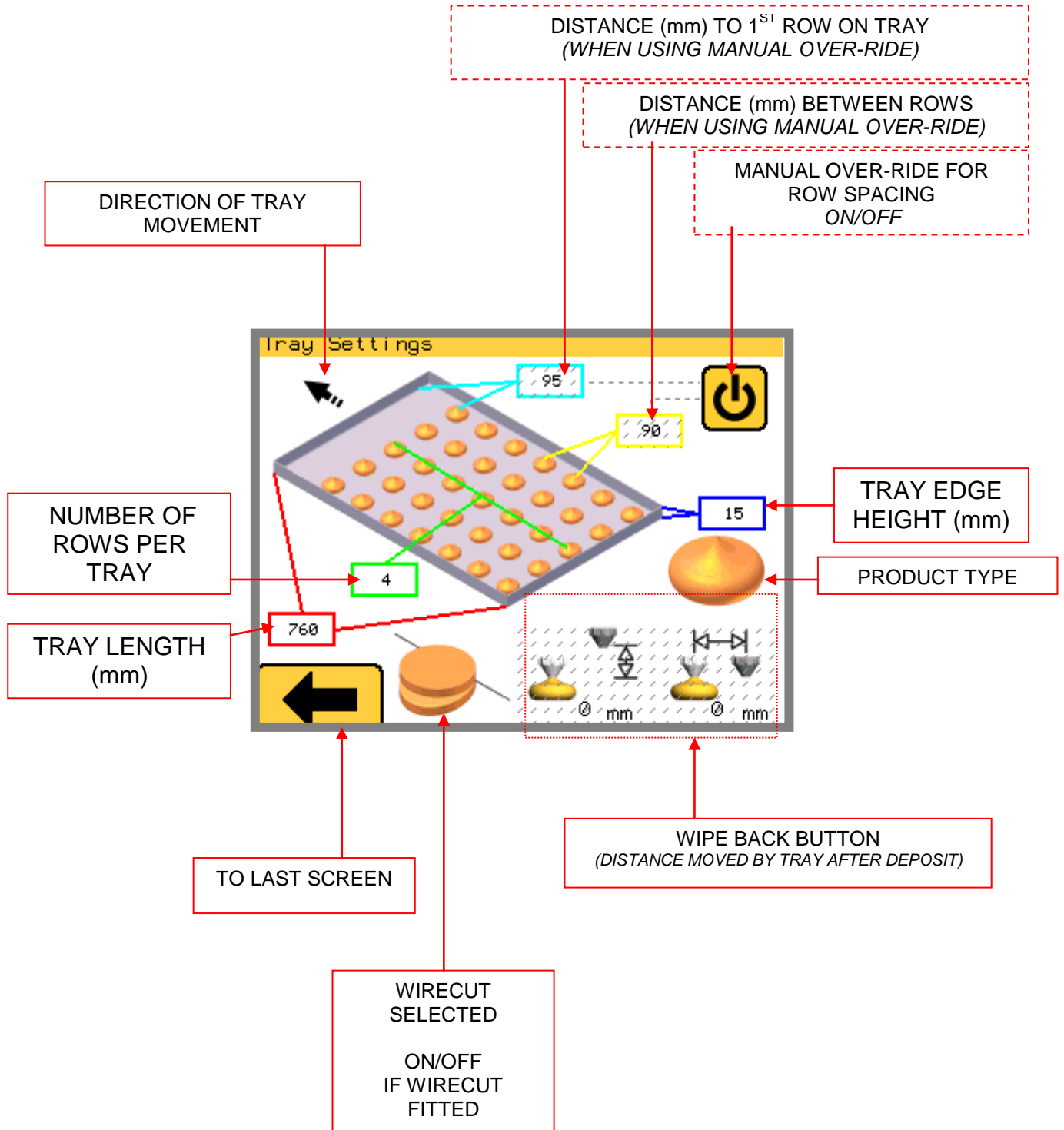


# TRAY SETUP

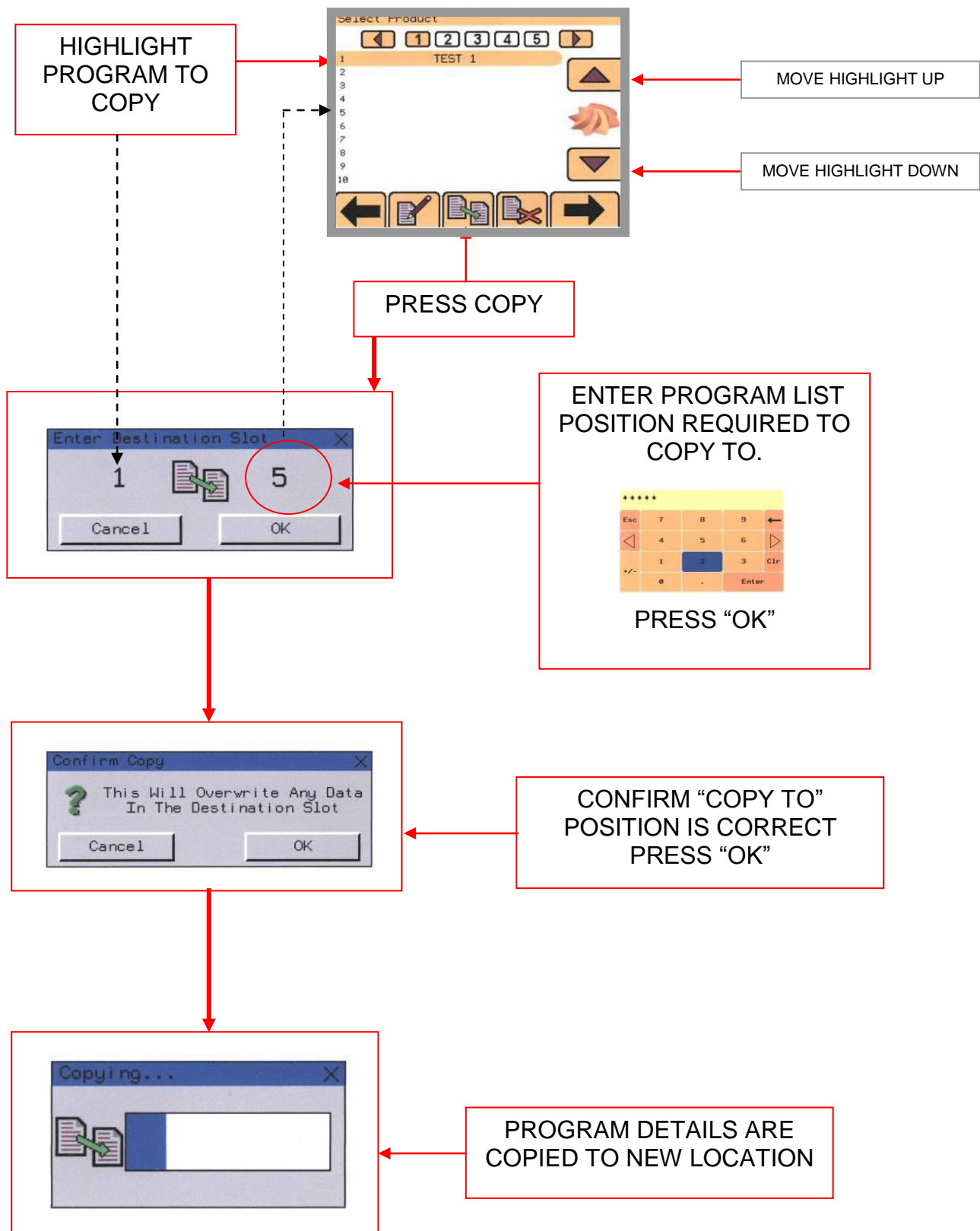
5A

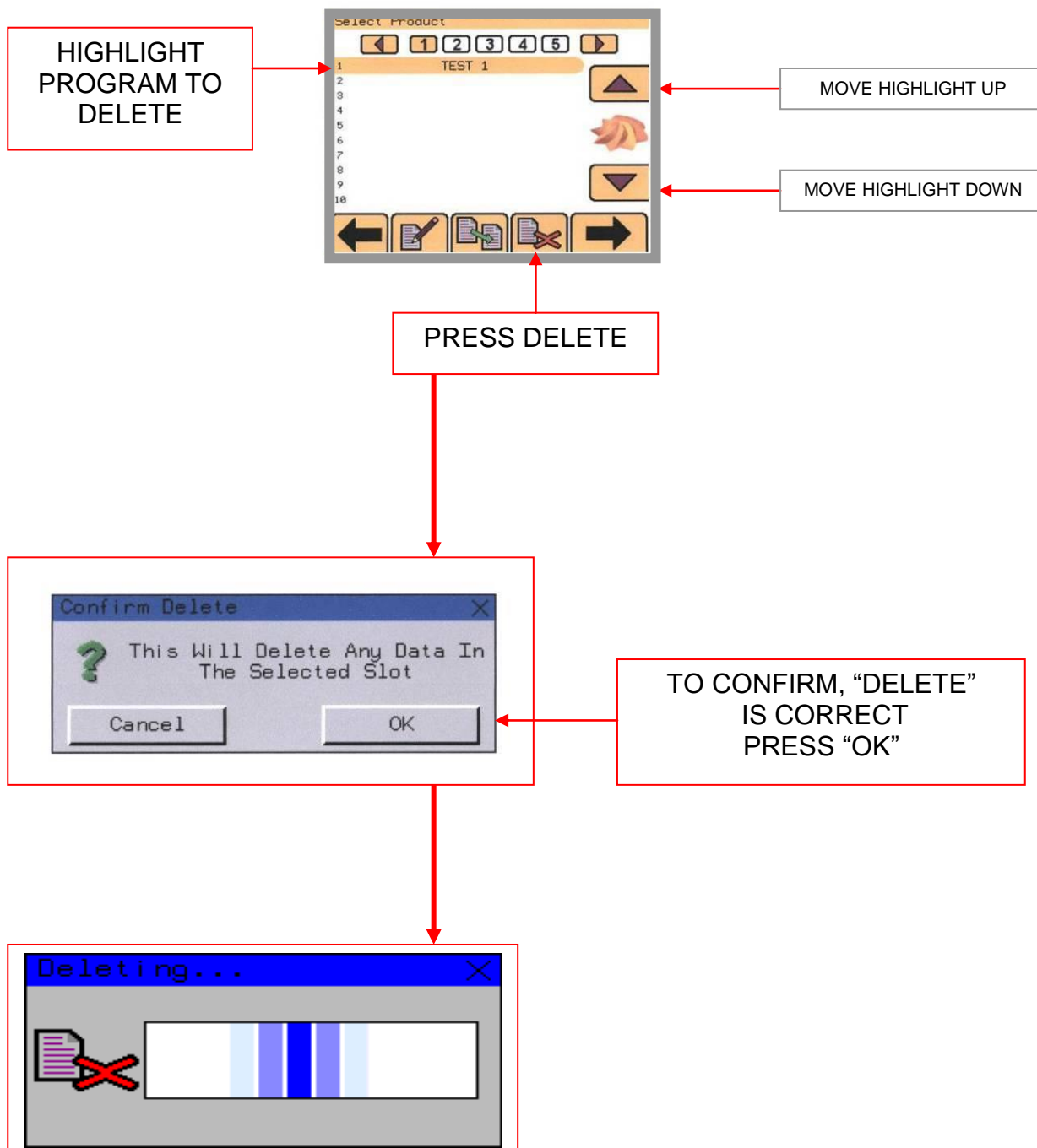


PRESS WINDOWS AND ENTER  
VALUES VIA KEYPAD



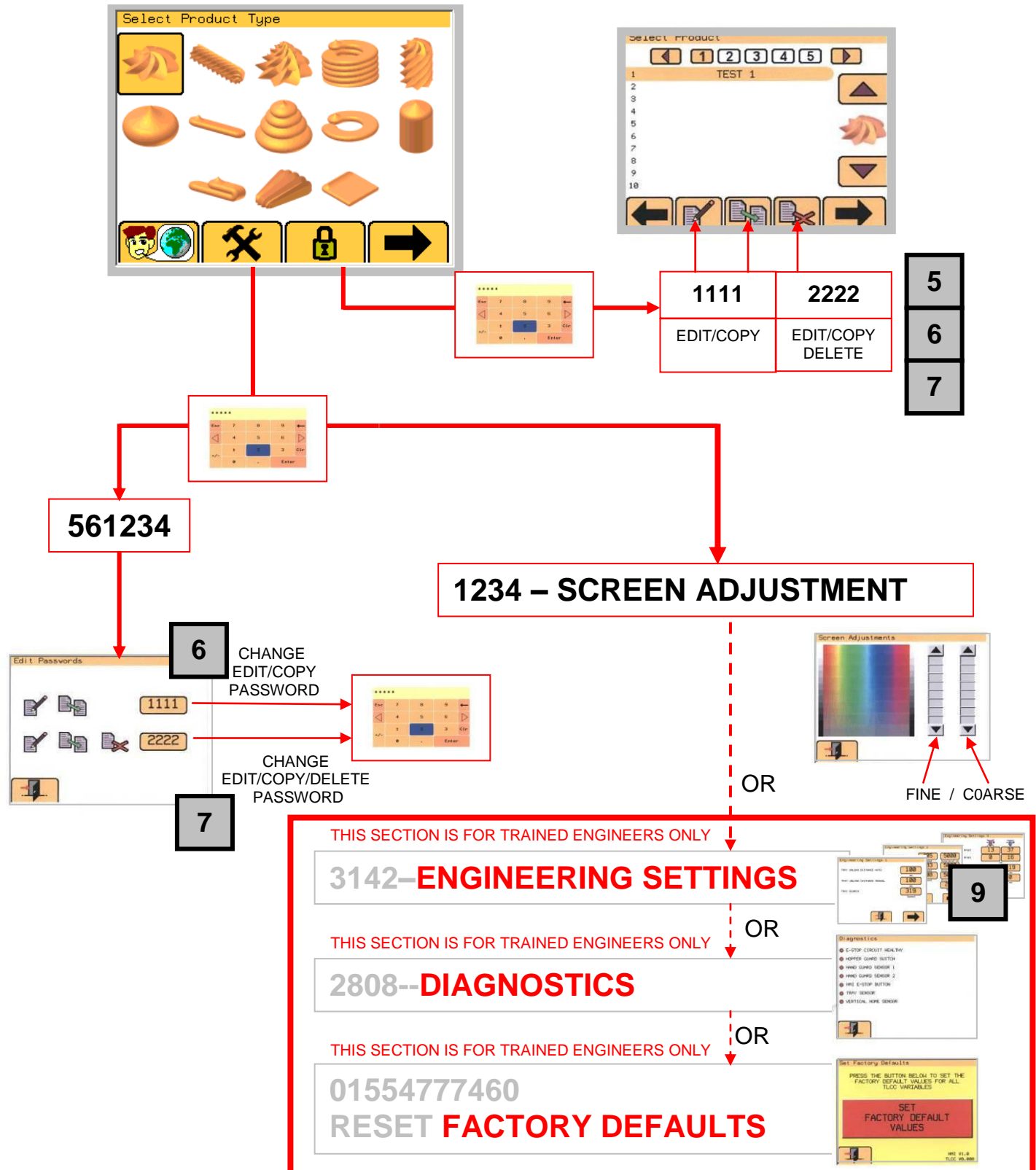






## CAUTION

DO NOT ATTEMPT TO MAKE ADJUSTMENTS UNLESS YOU ARE FULLY AWARE OF THE RESULTS



# ENGINEERING SETTINGS (1)

9<sub>1</sub>

THIS SECTION IS FOR TRAINED ENGINEERS ONLY

The screenshot shows the 'Engineering Settings 1' screen. It contains two text labels on the left: 'TRAY UNLOAD DISTANCE MANUAL' and 'TRAY SEARCH'. On the right, there are two numerical displays. The top display shows '100' with 'MM' above it. The bottom display shows '319' with 'Speed' below it. At the bottom of the screen, there are two buttons: one with a left-pointing arrow and a tray icon, and another with a right-pointing arrow. Two callout boxes with red arrows point to the numerical displays. The top callout box points to the '100' display and contains the text: 'IN MANUAL MODE: DISTANCE THE LEADING EDGE OF THE TRAY IS BROUGHT BACK PASSED THE TRAY SENSOR, WHEN RETURNING TO OPERATOR'. The bottom callout box points to the '319' display and contains the text: 'SPEED VALUE THAT TRAY IS FED UP TO TRAY SENSOR'. Two small inset images of a numeric keypad are shown, one above each callout box. Below the screen, two callout boxes with red arrows point to the bottom buttons. The left callout box contains the text: 'EXIT THIS SCREEN'. The right callout box contains the text: 'GO TO NEXT SCREEN ENGINEERING SETTING 2 (NEXT PAGE)'.

Engineering Settings 1

TRAY UNLOAD DISTANCE MANUAL

TRAY SEARCH

100 MM

319 Speed

EXIT THIS SCREEN

GO TO NEXT SCREEN  
ENGINEERING SETTING 2  
(NEXT PAGE)

IN MANUAL MODE:  
DISTANCE THE LEADING EDGE  
OF THE TRAY IS BROUGHT BACK  
PASSED THE TRAY SENSOR, WHEN  
RETURNING TO OPERATOR

SPEED VALUE THAT TRAY IS  
FED UP TO TRAY SENSOR

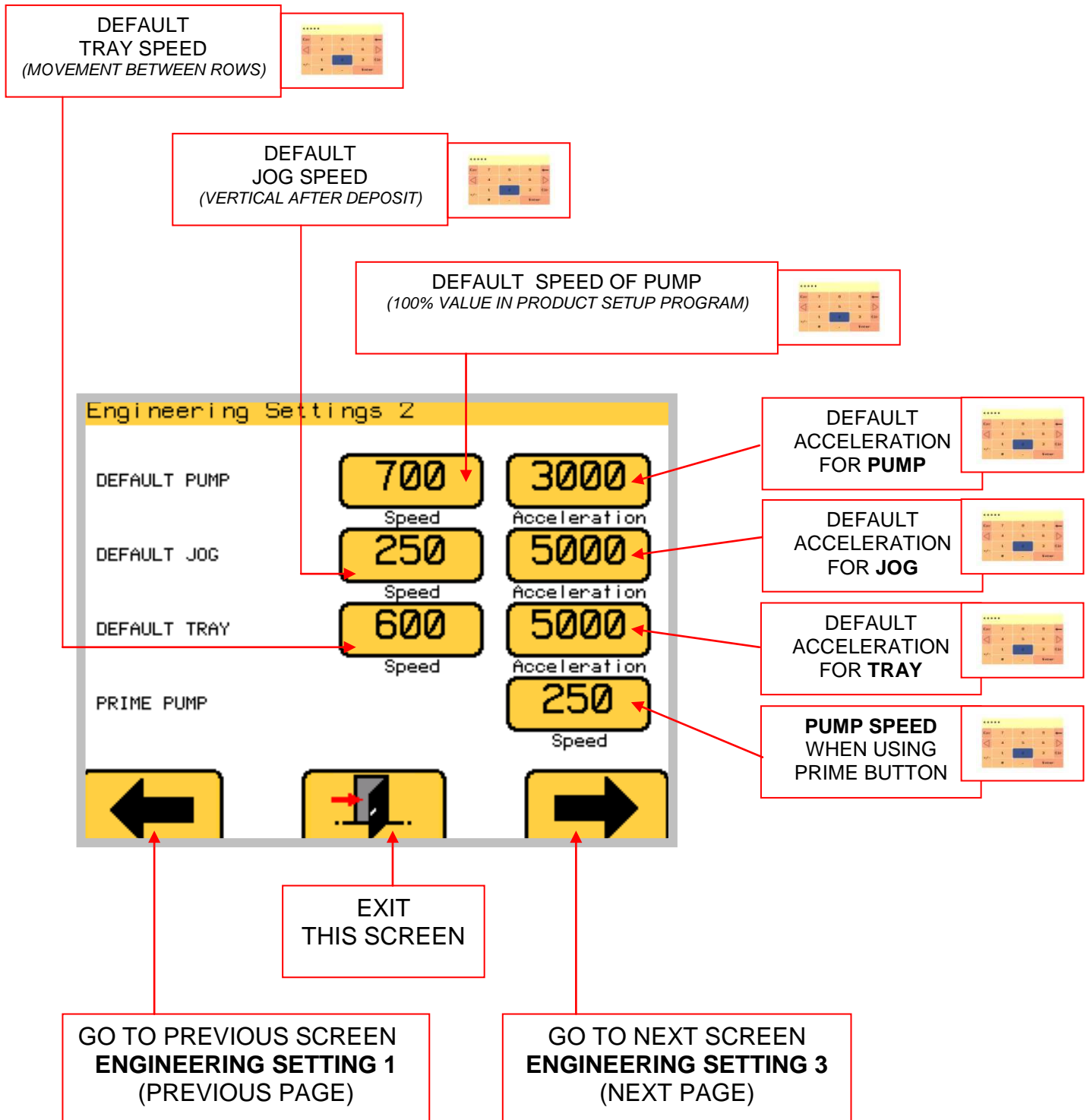
## CAUTION

**DO NOT ATTEMPT TO MAKE ADJUSTMENTS UNLESS YOU ARE FULLY AWARE OF THE RESULTS**

# ENGINEERING SETTINGS (2)

9/2

THIS SECTION IS FOR TRAINED ENGINEERS ONLY



## CAUTION

**DO NOT ATTEMPT TO MAKE ADJUSTMENTS UNLESS YOU ARE FULLY AWARE OF THE RESULTS**



# ENGINEERING SETTINGS (3)

9/3

THIS SECTION IS FOR TRAINED ENGINEERS ONLY

OFFSET HEIGHT VALUE (mm)  
**HARD DOUGH HOPPER  
NON-ROTARY TEMPLATE**

OFFSET HEIGHT VALUE IS  
FACTORY SET AND SHOULD NOT  
BE CHANGED UNLESS  
INSTRUCTED TO DO SO.  
**DAMAGE TO THE MACHINE  
COULD OCCUR**

OFFSET HEIGHT VALUE (mm)  
**HARD DOUGH HOPPER  
ROTARY TEMPLATE**

OFFSET HEIGHT VALUE (mm)  
**SOFT DOUGH HOPPER  
ROTARY TEMPLATE**

OFFSET HEIGHT VALUE (mm)  
**SOFT DOUGH HOPPER  
NON-ROTARY TEMPLATE**

DISTANCE (mm) FROM **HARD**  
DOUGH HOPPER DEPOSITING  
CENTRELINE TO TRAY EDGE  
DETECTION POINT  
(USED IN ROW SPACING CALCULATIONS)

DISTANCE (mm) FROM **SOFT**  
DOUGH HOPPER DEPOSITING  
CENTRELINE TO TRAY EDGE  
DETECTION POINT  
(USED IN ROW SPACING CALCULATIONS)

EXIT  
THIS SCREEN

GO TO PREVIOUS SCREEN  
**ENGINEERING SETTING 2**  
(PREVIOUS PAGE)

GO TO NEXT SCREEN  
**ENGINEERING SETTING 4**  
(NEXT PAGE)

Engineering Settings 3

HARD DOUGH OFFSET	13	37
SOFT DOUGH OFFSET	0	16
HARD DOUGH CENTRE LINE OFFSET	-19	
SOFT DOUGH CENTRE LINE OFFSET	0	

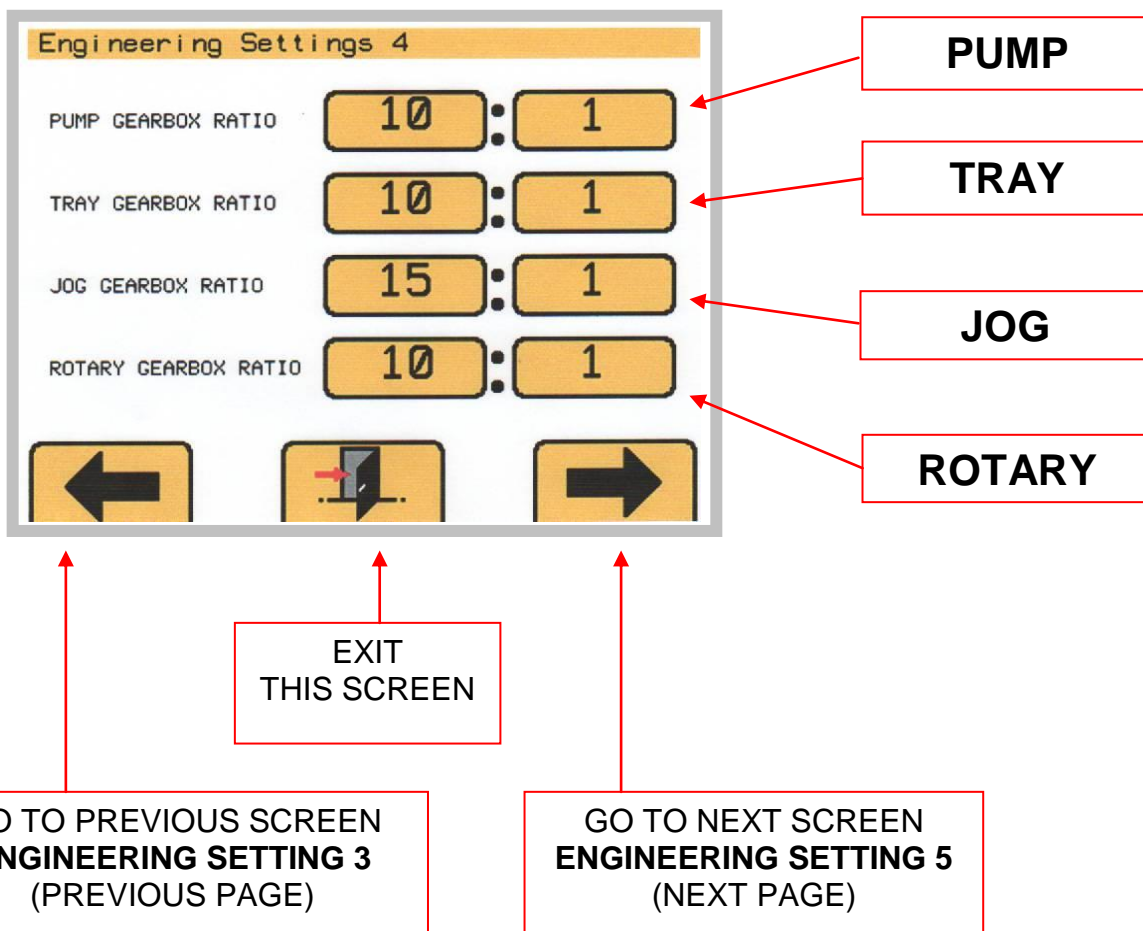
Navigation buttons: Left Arrow, Hopper Icon, Right Arrow

## CAUTION

**DO NOT ATTEMPT TO MAKE ADJUSTMENTS UNLESS YOU ARE  
FULLY AWARE OF THE RESULTS**

THIS SECTION IS FOR TRAINED ENGINEERS ONLY

## GEARBOX RATIOS

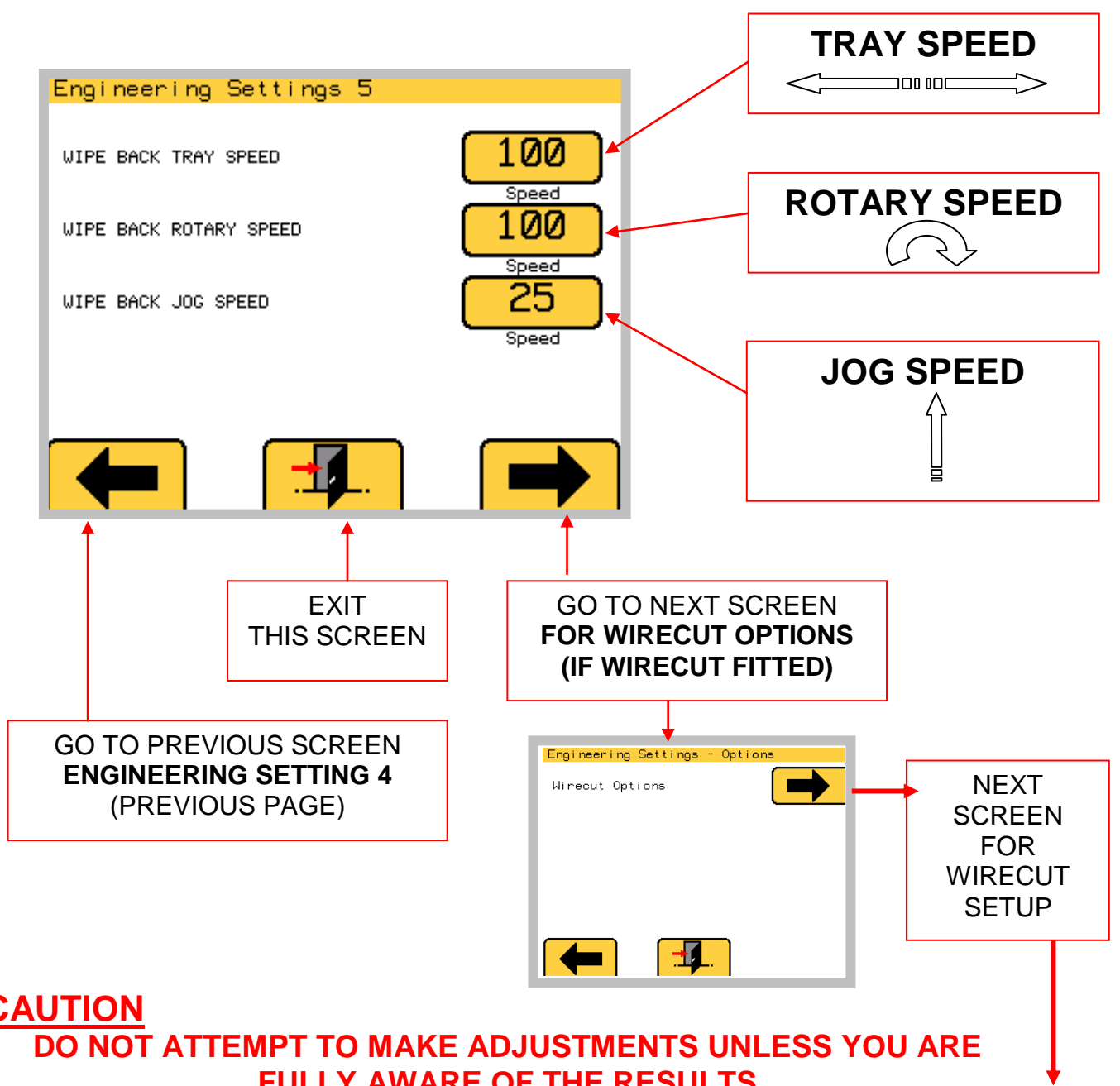


### CAUTION

**DO NOT ATTEMPT TO MAKE ADJUSTMENTS UNLESS YOU ARE FULLY AWARE OF THE RESULTS**

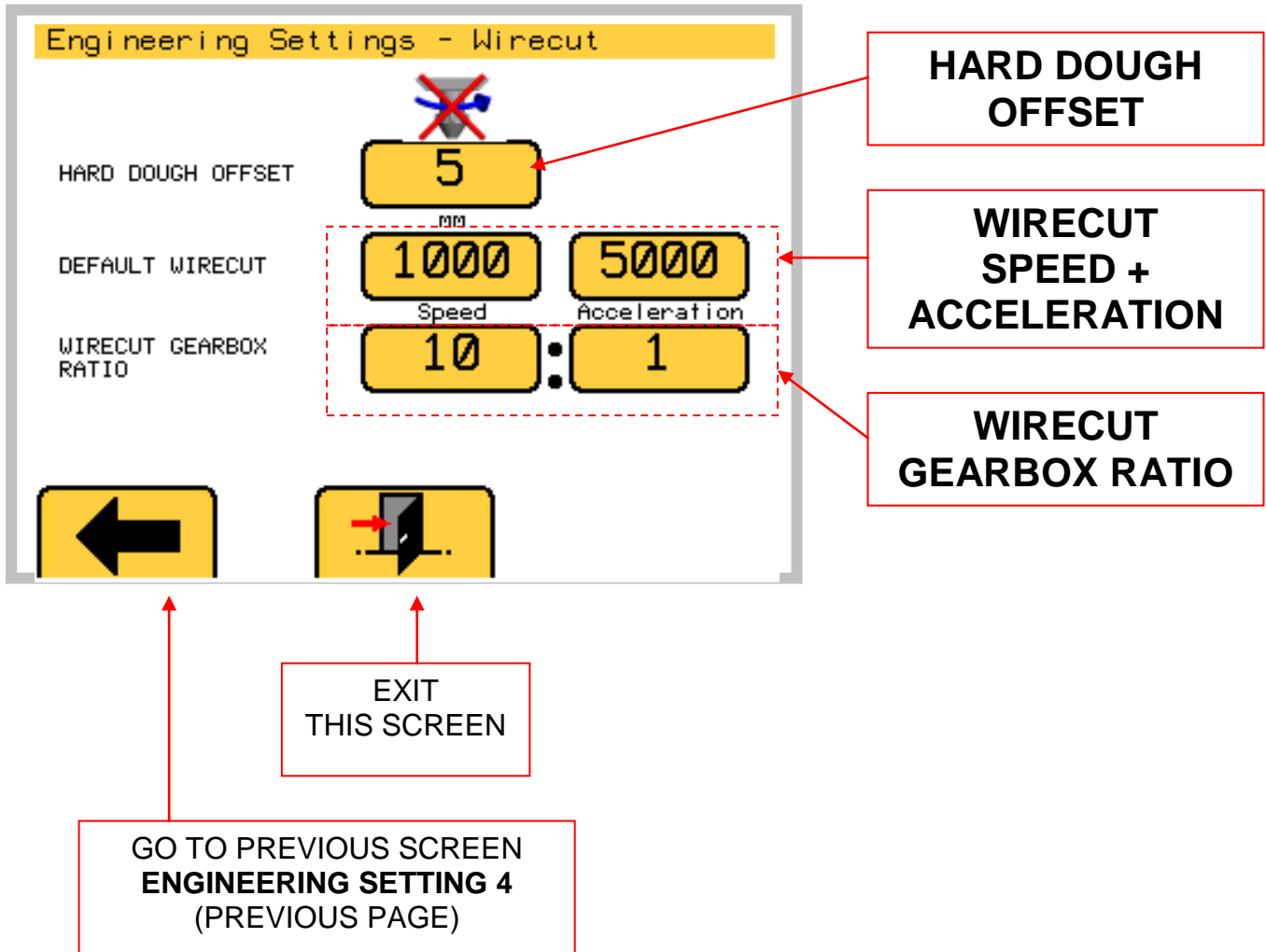
THIS SECTION IS FOR TRAINED ENGINEERS ONLY

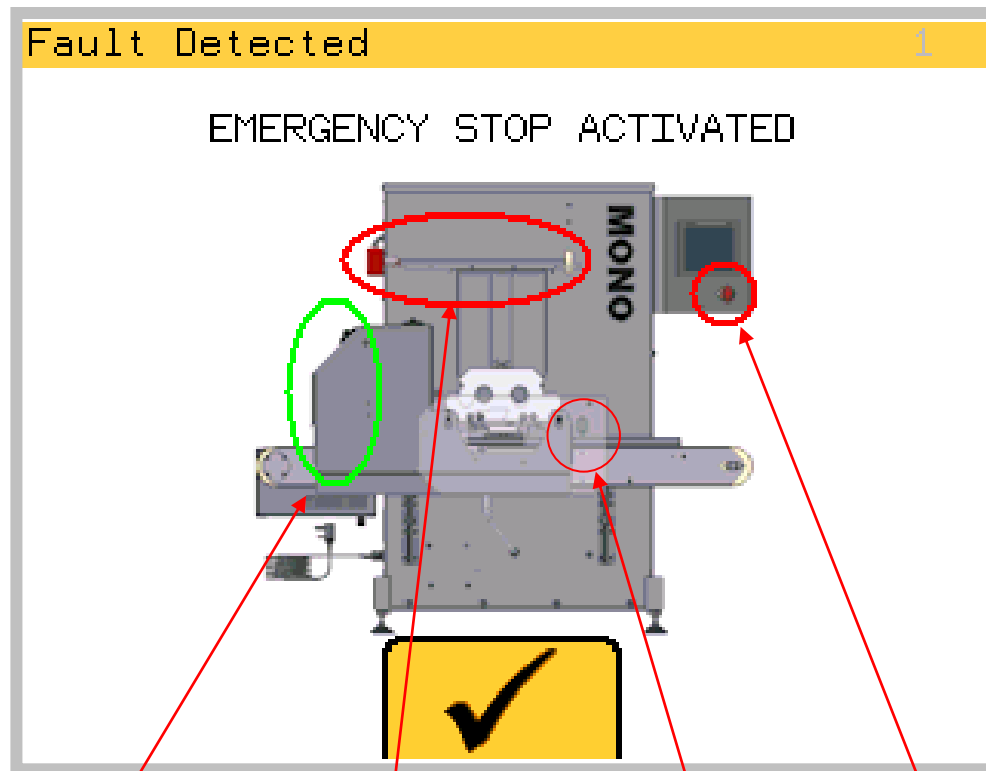
## WIPE BACK DEFAULT SETTINGS (SEE **5A** )



NEXT PAGE

## WIRECUT SETTINGS





WIRECUT COVER  
(IF FITTED)

HOPPER COVER

SAFETY BEAM

STOP BUTTON

THIS SCREEN INDICATES A FAULT CONDITION IN THE SAFETY AREAS.


WHEN **RED**, CLOSE COVER OR CLEAR OBSTRUCTIONS TO CLEAR FAULT.  
WHEN INDICATOR GOES **GREEN**, FAULT HAS BEEN CORRECTED AT THAT POSITION.

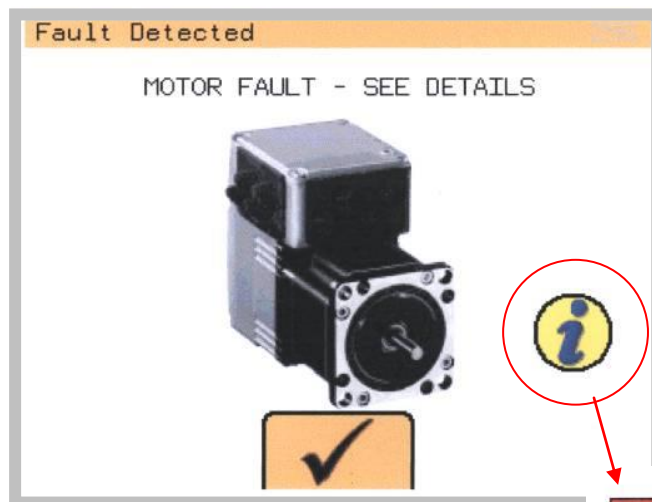
PRESS  BUTTON TO CLEAR SCREEN

## **CAUTION**

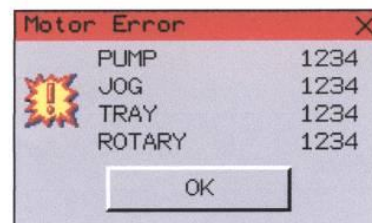
**DO NOT ATTEMPT TO MAKE ADJUSTMENTS UNLESS YOU ARE FULLY AWARE OF THE RESULTS**



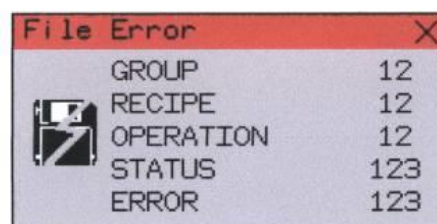
IF THE FOLLOWING SCREEN APPEARS, CHECK THAT THE TABLE MOVEMENT ETC. IS NOT JAMMED WITH SOMETHING. IF IT IS, CLEAR THE OBSTRUCTION AND PRESS  TO PROCEED.



PRESS THIS BUTTON IF MORE INFORMATION IS REQUIRED AS TO WHICH MOTOR IS AT FAULT



**IF THE FAULT IS NOT OBVIOUS AND NOT ABLE TO BE CLEARED SAFELY, A SUITABLY TRAINED ENGINEER SHOULD BE CALLED**



ERROR WHEN LOADING/SAVING RECIPE DATA TO HMI STORAGE CARD  
PLEASE CONTACT SERVICE DEPT. / ENGINEER IF PROBLEM PERSISTS

## 11.0 MAINTENANCE

Omega PLUS

Under most conditions the machine only needs to be kept clean and used as instructed in this manual.



**WARNING: DO NOT UNDER ANY CIRCUMSTANCES  
USE A WATER HOSE OR PRESSURE WASHER TO  
CLEAN THIS MACHINE.**

# Mono Omega Touch

## Check and Maintenance Schedule

Operation	Daily	weekly	3 monthly	Yearly
Clean depositor as per instructions in manual	*			
Check condition of supply lead and plug	*			
check fit of guards	*			
Clean under conveyor belts		*		
Check hopper seals		*		
Check end cap seals		*		
Check condition and tension of conveyor, adjust / replace as required			*	
Check end cap bearings			*	
check alignment of sensors on guards			*	
Check tray sensor is secure			*	
Check condition of idle roller bearings				*
Check condition of drive shaft bearings				*
Check condition and tension of chain and grease as required				*
Grease slides as required				*
adjust eccentric guide rollers as required				*
adjust concentric guide rollers as required				*
Check and grease all slide plates as required				*
Check all motor mounts are tight				*
inspect electrical connections and tighten as required				*

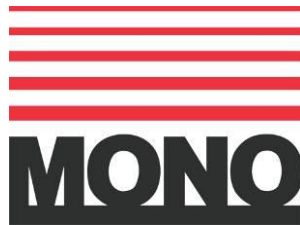
**Under no circumstances should maintenance or cleaning of this machine be done with the power connected**

## 12.0 SPARES AND SERVICE

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If a fault arises, please do not hesitate to contact the  
Customer Service Department, quoting the **machine serial number**  
on the silver information plate of the machine and on the front cover of this manual

### UK SERVICE, SPARES and OVERSEAS SUPPORT:



Queensway  
Swansea West Industrial Estate  
Swansea.  
SA5 4EB  
UK

**email: [spares@monoequip.com](mailto:spares@monoequip.com)**  
**Spares Tel. +44(0)1792 564039**  
**Web site: [www.monoequip.com](http://www.monoequip.com)**

**Main Tel. 01792 561234**  
**Fax. 01792 561016**

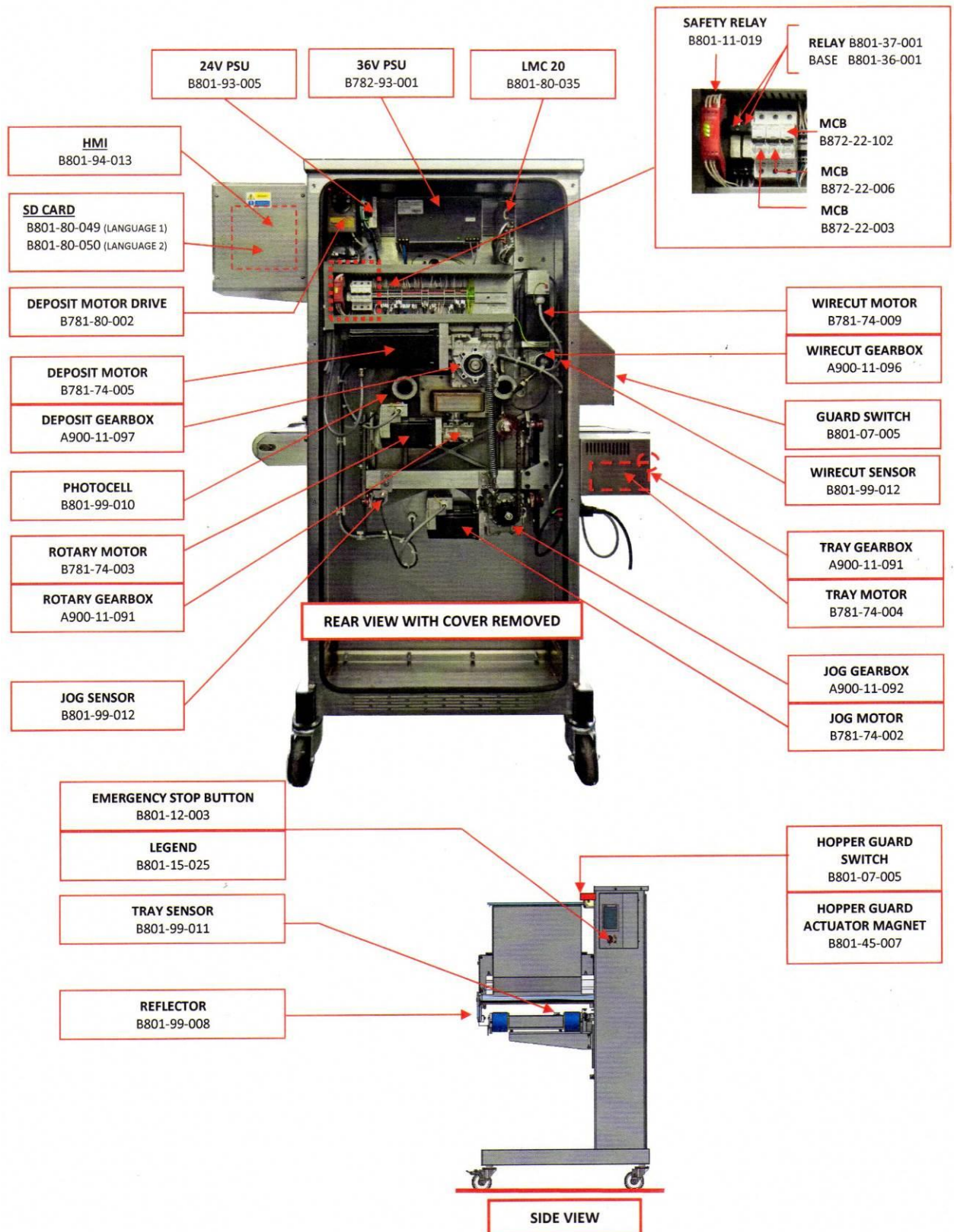
**BASE MACHINE SPARES LIST****Omega PLUS -- WIRECUT VERSION**

Spares Item Description	Mono Part No.	Qty Req. per M/C
Deposit Gearbox	A900-11-097	1
Jog Gearbox	A900-11-092	1
Rotary Gearbox	A900-11-091	1
Tray Gearbox	A900-11-091	1
Concentric Guide Roller	A900-06-274	2
Eccentric Guide Roller	A900-06-273	2
V Slide	078-03-00016	1
Slide Plate	078-03-00027	1
Jog Drive Chain	A900-08-066	1
Simplex Sprocket 16T 1/2" Pitch	A900-07-071	1
Idler Sprocket 16T 1/2" Pitch	A900-07-072	1
Circlip-Ext Metric 14mm Dia	A900-01-280	1
Circlip-Ext Metric 24mm Dia	A900-01-193	1
Drive Shaft – Hopper	078-03-00015	1
Rotary Drive Shaft	078-03-00011	1
Drive Gear - Rotary Template	078-03-00010	1
Lip Seal (Rotary Drive Shaft)	A900-12-075	1
Lip Seal (Deposit Drive Shaft)	A900-12-079	1
End Guard	078-11-00036	1
End Guard (wirecut version)	078-11-00057	1
Retainer – End Guard	078-11-00035	2
Seal-Rear Cover	A900-25-309	1



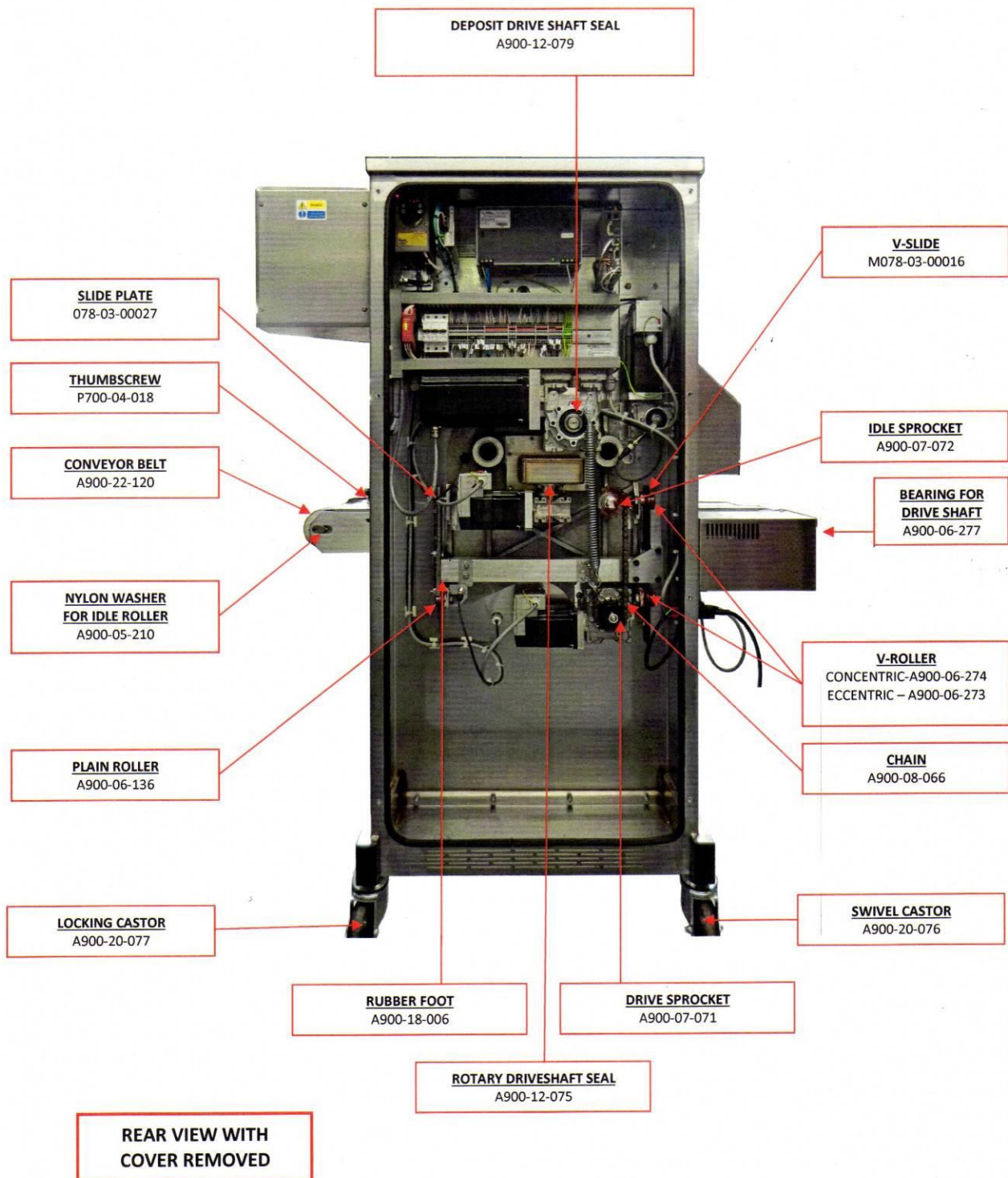
## ELECTRICAL COMPONENT LAYOUT PARTS

Omega PLUS -- WIRECUT VERSION



## MECHANICAL COMPONENT LAYOUT PARTS

Omega PLUS -- WIRECUT VERSION



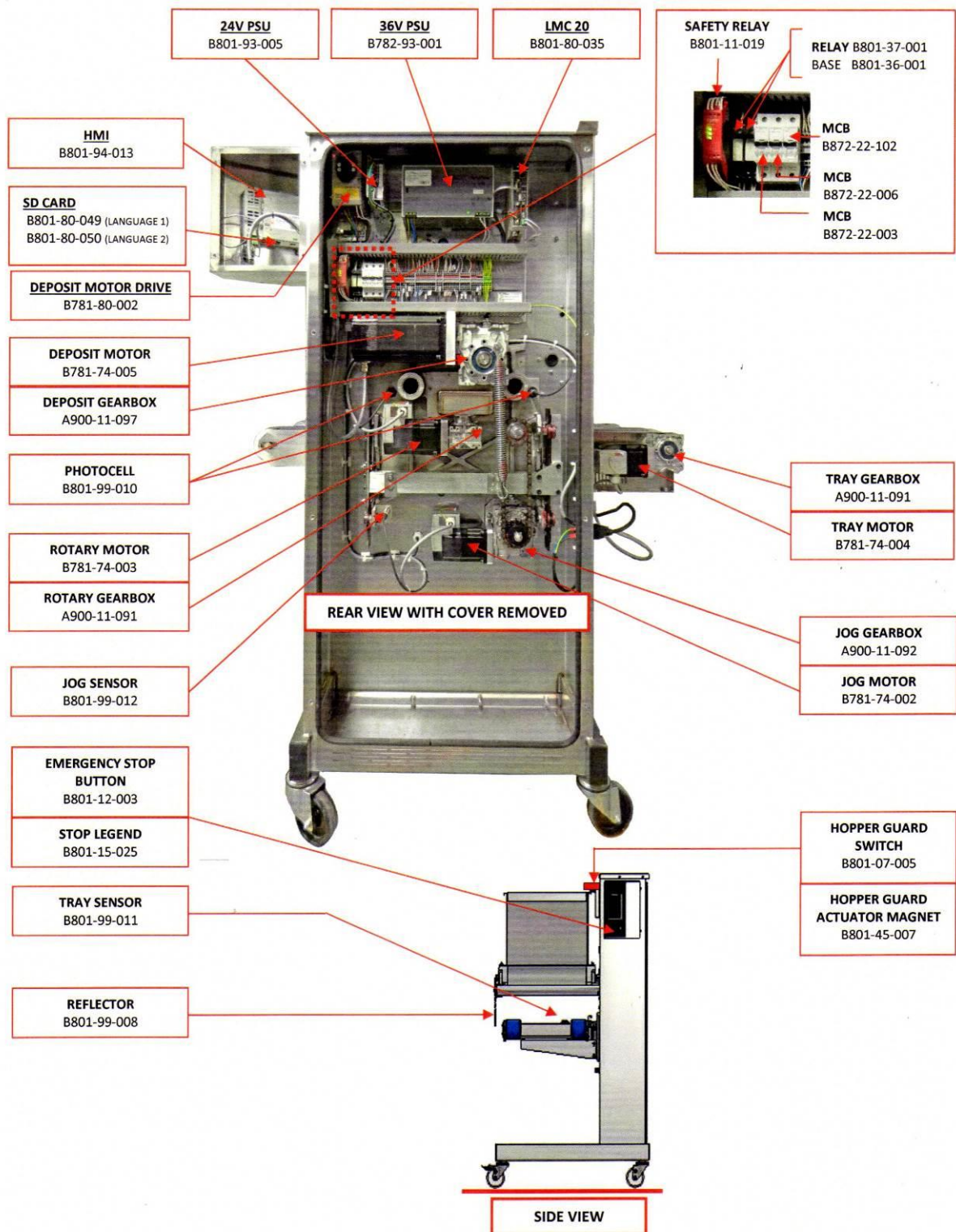
**BASE MACHINE SPARES LIST****Omega PLUS -- NO WIRECUT VERSION**

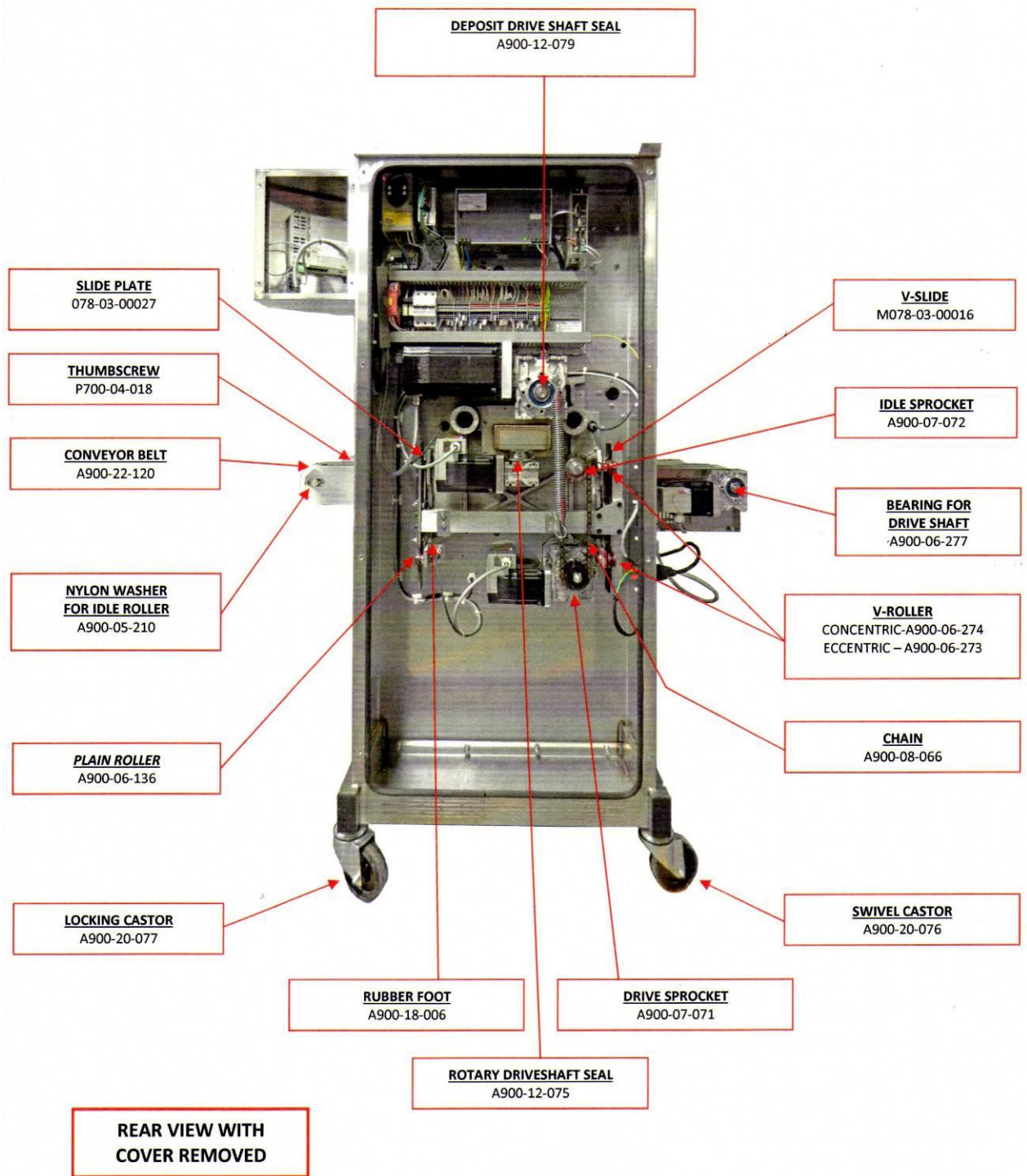
Spares Item Description	Mono Part No.	Qty Req. per Machine
Deposit Gearbox	A900-11-097	1
Jog Gearbox	A900-11-092	1
Rotary Gearbox	A900-11-091	1
Tray Gearbox	A900-11-091	1
Concentric Guide Roller	A900-06-274	2
Eccentric Guide Roller	A900-06-273	2
V Slide	078-03-00016	1
Slide Plate	078-03-00027	1
Jog Drive Chain	A900-08-066	1
Simplex Sprocket 16T 1/2" Pitch	A900-07-071	1
Idler Sprocket 16T 1/2" Pitch	A900-07-072	1
Circlip-Ext Metric 14mm Dia	A900-01-280	1
Circlip-Ext Metric 24mm Dia	A900-01-193	1
Drive Shaft – Hopper	078-03-00015	1
Rotary Drive Shaft	078-03-00011	1
Drive Gear - Rotary Template	078-03-00010	1
Lip Seal (Rotary Drive Shaft)	A900-12-075	1
Lip Seal (Deposit Drive Shaft)	A900-12-079	1
End Guard	078-11-00036	1
End Guard (wirecut version)	078-11-00057	1
Retainer – End Guard	078-11-00035	2
Seal-Rear Cover	A900-25-309	1



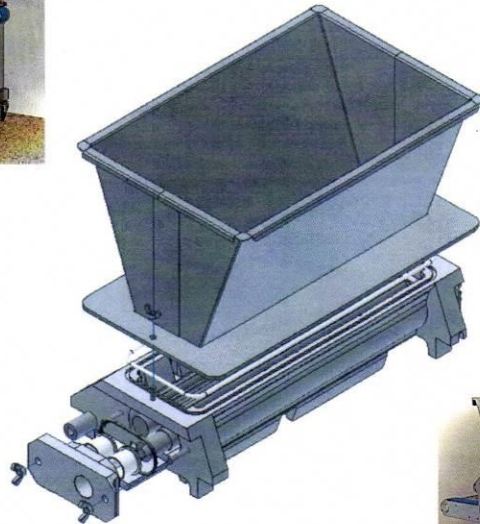
# ELECTRICAL COMPONENT LAYOUT PARTS

Omega PLUS -- NO WIRECUT VERSION





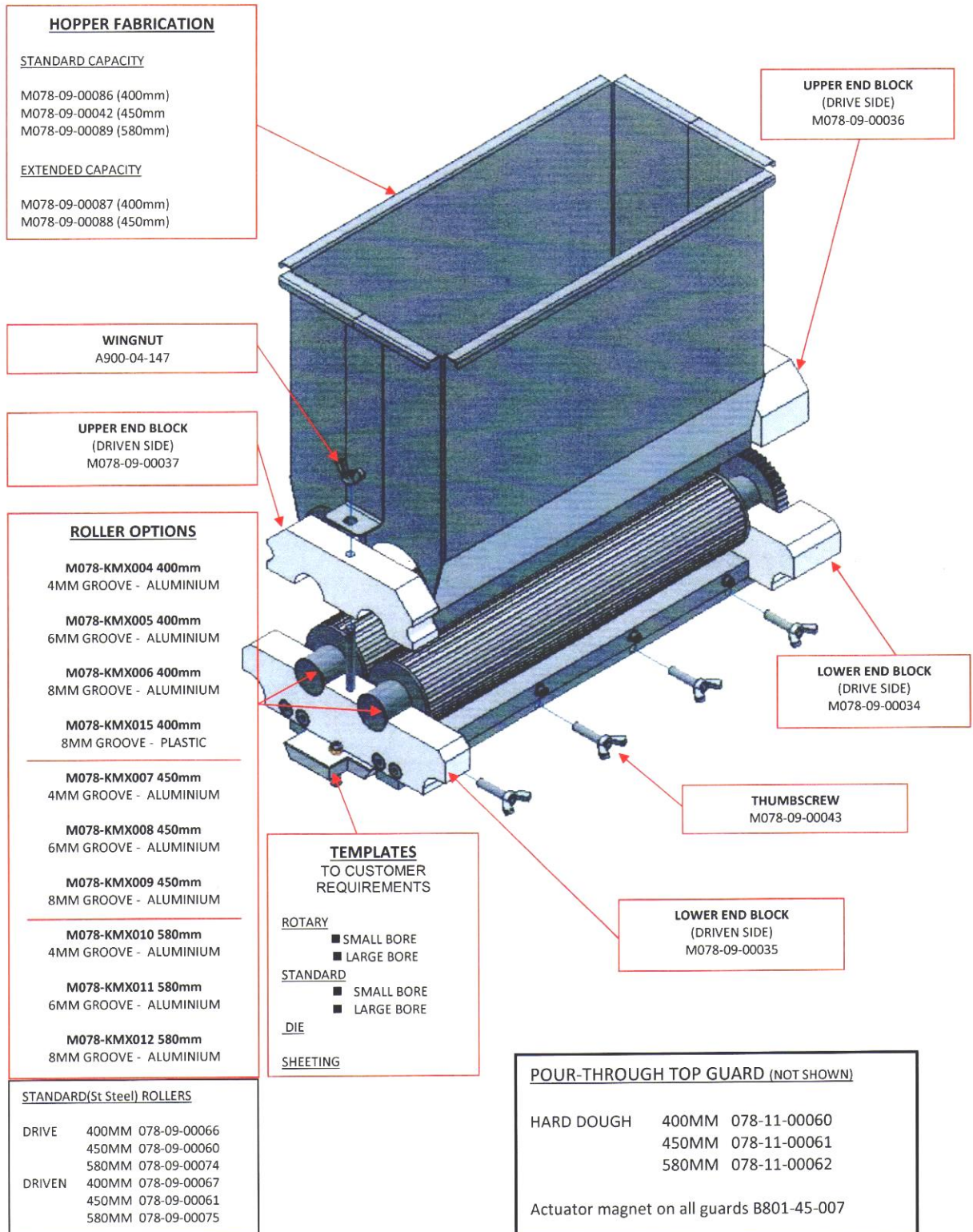




# — Omega — HOPPER PARTS

## HARD DOUGH HOPPER PARTS

Omega PLUS ONLY



## SOFT DOUGH HOPPER PARTS

Omega and Omega PLUS

### HOPPER FABRICATION

#### STANDARD CAPACITY

M078-09-00008 (400mm)  
M078-09-00001 (450mm)  
M078-09-00046 (580mm)

#### EXTENDED CAPACITY

M073-09-00200 (400mm)  
M073-09-00202 (450mm)  
M073-09-00203 (580mm)

END CAP (NON-DRIVE  
SIDE)  
M073-09-03200

END CAP ASSEMBLY  
(NON-DRIVE SIDE)  
M073-KMX002  
(END CAP AND BUSHES  
FITTED)

END CAP BUSH  
M073-09-00600

WINGNUT  
A900-04-043

#### HOPPER SEAL

A900-12-083 (400mm)  
A900-12-084 (450mm)  
A900-12-085 (580mm)

#### DRIVEN GEAR

M073-09-00702 (400mm)  
M073-09-01602 (450mm)  
M073-09-01702 (580mm)

WINGNUT  
A900-04-147

END CAP (DRIVE SIDE)  
M073-09-00500

END CAP ASSEMBLY (DRIVE SIDE)  
M073-KMX001  
(END CAP AND BUSHES FITTED)

END CAP BUSH  
M073-09-00600

#### DRIVE GEAR

M073-09-00700 (400mm)  
M073-09-01600 (450mm)  
M073-09-01700 (580mm)

END CAP SEAL  
A900-12-074

#### TEMPLATES TO CUSTOMER REQUIREMENTS

ROTARY

STANDARD

DIE

STAGGERED

SHEETING

■ NON-DRIP  
■ MULTI SHEETING

INJECTION

#### POUR-THROUGH TOP GUARD (NOT SHOWN)

STANDARD	400MM	078-11-00066
	450MM	078-11-00067
	580MM	078-11-00068

EXTENDED	400MM	078-11-00063
	450MM	078-11-00064
	580MM	078-11-00065

Actuator magnet on all guards B801-45-007

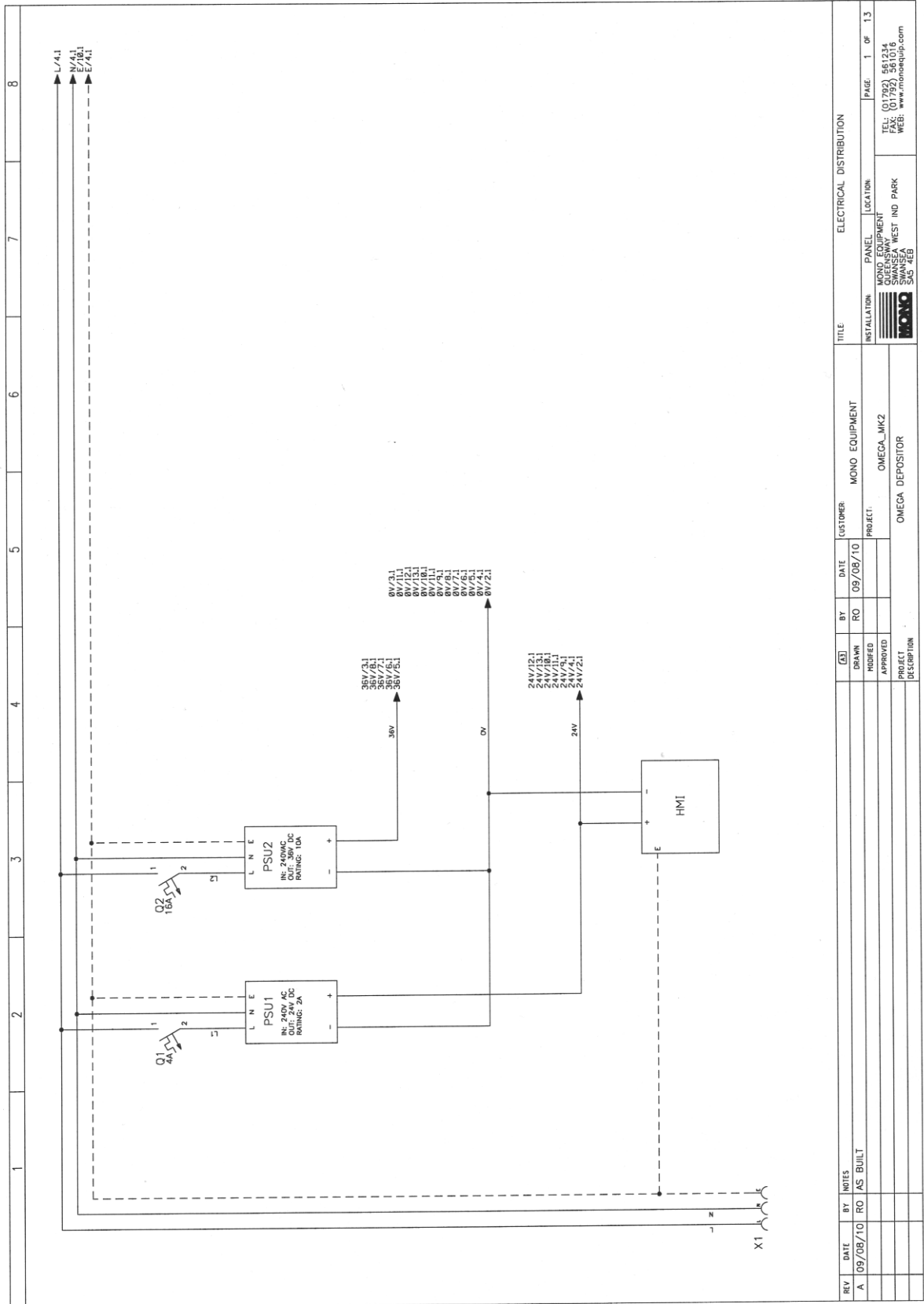




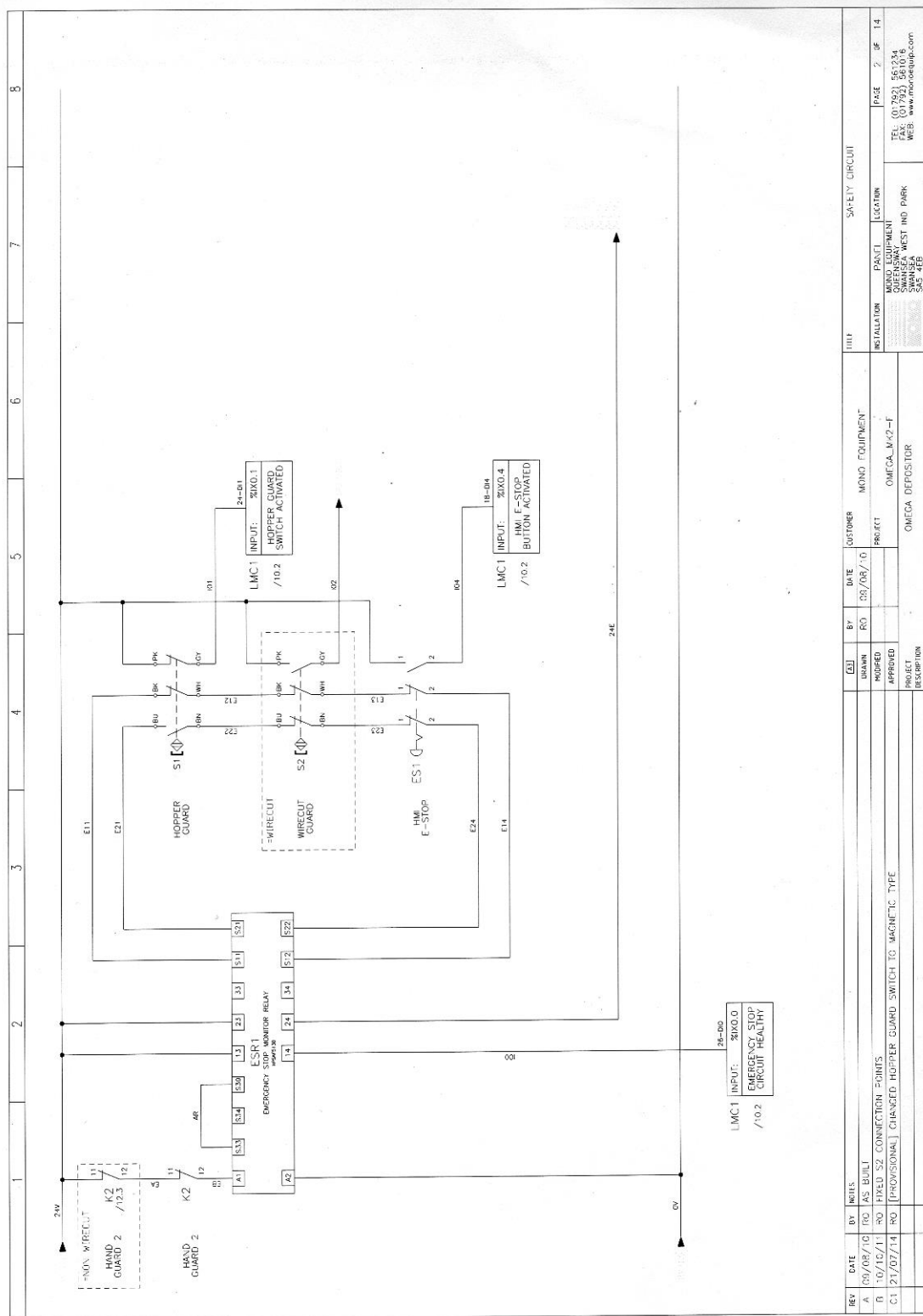
13.0 E



ATION



REV				DATE				BY				NOTES				TITLE																							
A				09/08/10				RO				AS BUILT				BY				DATE				CUSTOMER				MONO EQUIPMENT				ELECTRICAL DISTRIBUTION							
																[X]				DRAWN				RO				09/08/10											















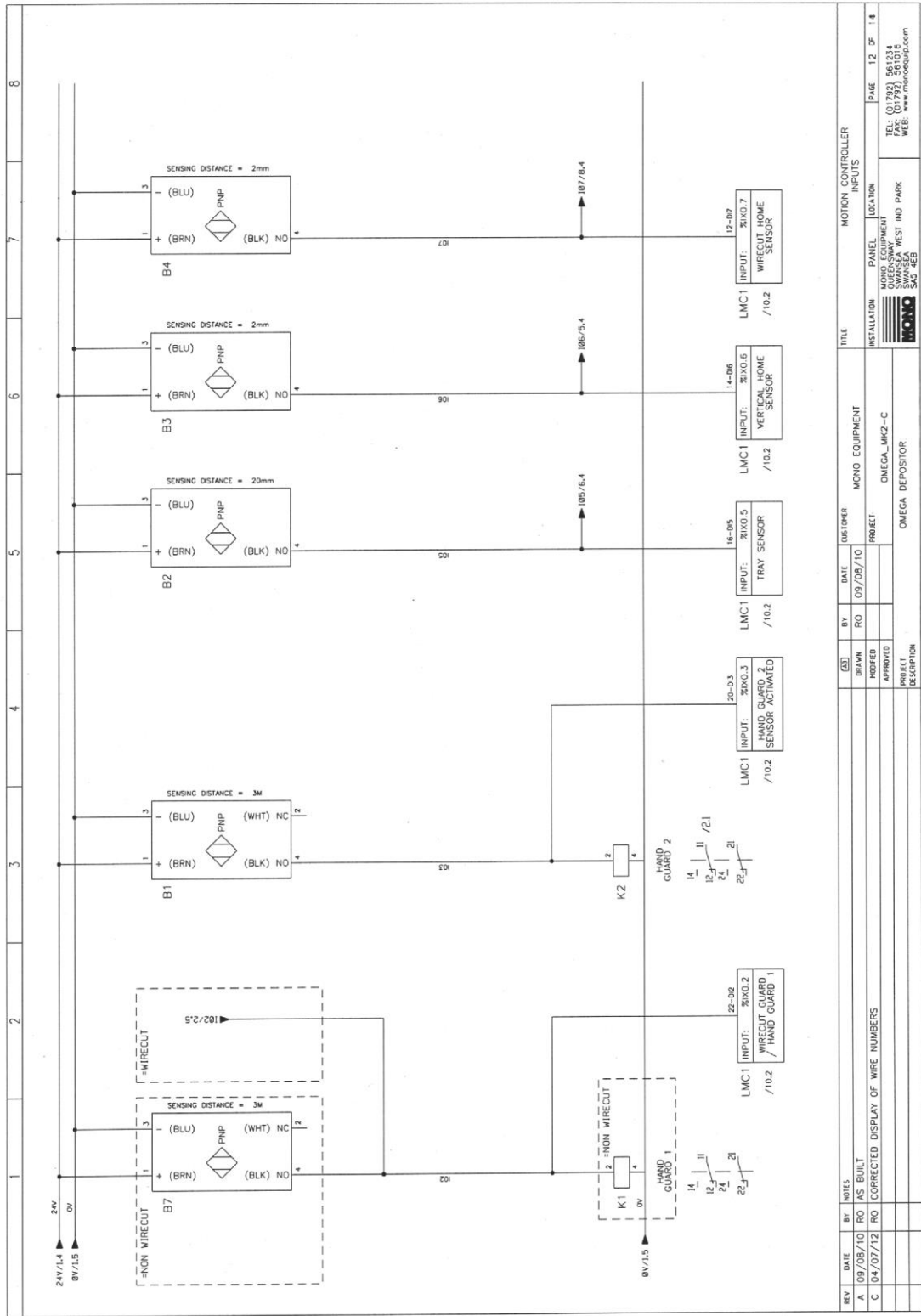


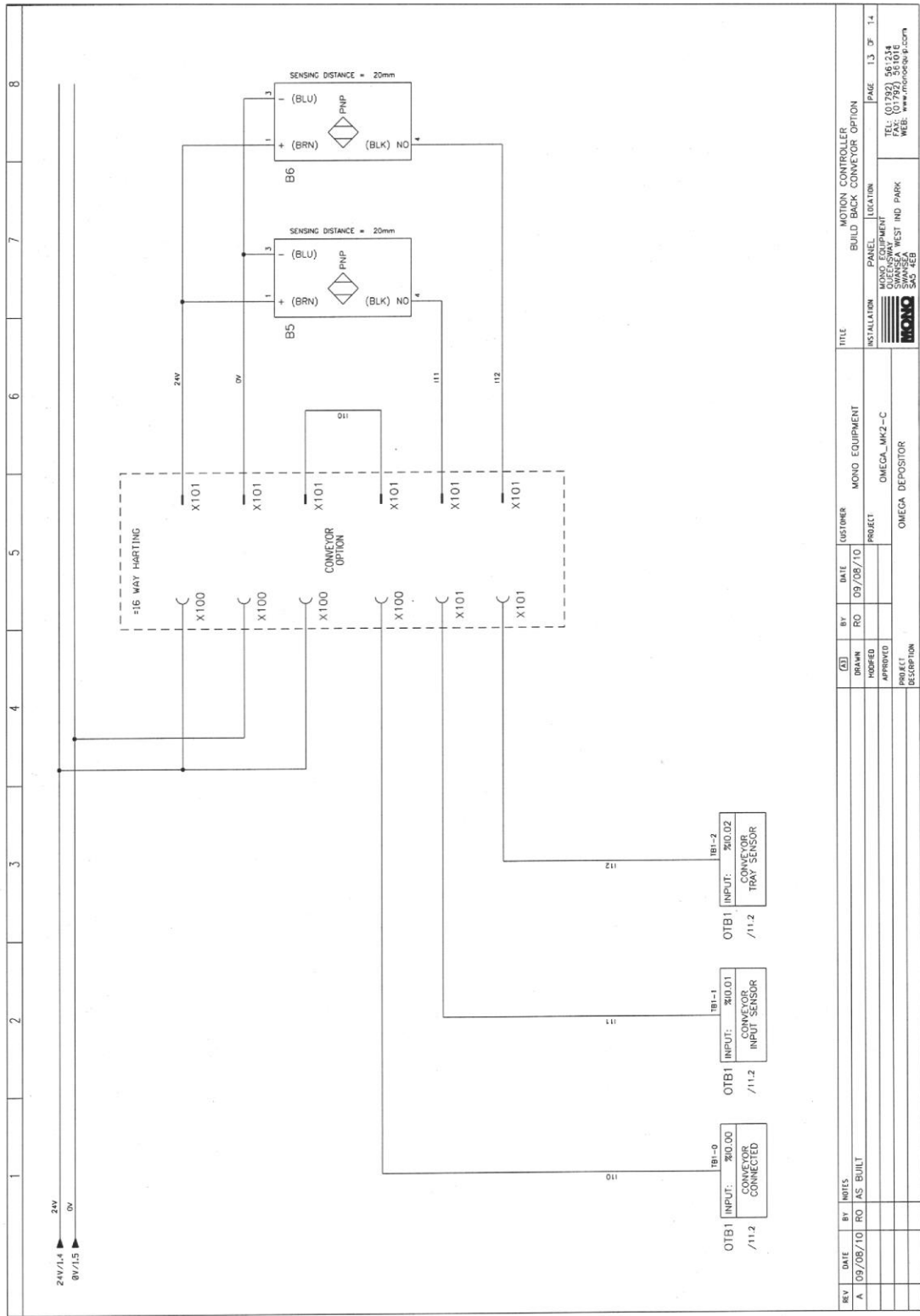
















The equipment mentioned in this manual has CE accreditation.

As it is our policy to improve our machines continuously, we reserve the right to change specifications without prior notice



**Omega PLUS**



**Omega PLUS  
And WIRECUT**



Queensway,  
Swansea West Industrial Estate,  
Swansea.  
SA5 4EB  
UK

**Tel. +44(0)1792 561234**

**Spares Tel. +44(0)1792 564039**

**Fax. 01792 561016**

**Email: [marketing@monoequip.com](mailto:marketing@monoequip.com)**

**Web site: [www.monoequip.com](http://www.monoequip.com)**

#### ▪ **DISPOSAL**

Care should be taken when the machine comes to the end of its working life. All parts should be disposed of in the appropriate place, either recycling or other means as the law permits at the time.