

Operating manual

Rondomat 4000

SSO6404

SSO6405

SSO6407

SSO6405C

SSO6407C

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Technical specifications subject to change without notice

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EC Declaration of conformity for machinery

(Machinery Directive 2006/42/EC, Annex II., sub. A)

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Herewith we declare that the dough processing machine:

Dough sheeter	Rondomat
„A“ framed base model	SSO6404/05/07
„A“ framed base model Cutomat	SSO6405C/07C

- is in conformity with the relevant provisions of the Machinery Directive (2006/42/EC)
- is in conformity with the provisions of the following other EC-Directives:
 - Directive EMC 2004/108/EC.

And furthermore, we declare that

- the following (parts/clauses of) European harmonised standards have been used:
 - EN 1674: Food processing machines – Safety and Hygiene requirements
 - 1935/2004: Materials, intended to come into contact with food
 - EU 10/2011: Plastic materials and articles intended to come into contact with food
 - EN 60204-1: Safety of machinery – Electrical equipment – Part 1
 - EN 12100-1: Safety of machinery – General principles – Part 1

Burgdorf, 16.02.2015

Werner Mathis
Manager R&D

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**Hint for operating manual: The numbers of the illustrations
(Ex. — 1) are numbered chapterwise.**

1 Safety information

1.1 Explanation of symbols



All the sections in this operating manual containing safety instructions which absolutely must be observed are marked with this symbol and with a number.



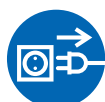
All the sections in this operating manual containing information which absolutely must be observed are marked with this symbol.

1.2 Explanation of warning signs



Sign indicating prohibited activity

Reaching under the closed safety guard is prohibited!



Instruction and information signs

Make sure to disconnect the mains plug before opening!



Danger warning sign

Danger warning



High-Voltage warning sign

Warning against electrical shock.
Disconnect mains plug before opening.

1.3 Safety elements

1.3.1 Safety guards



Operation

The safety guards fulfill a dual purpose:

1. The safety guards protect the operator against inadvertent contact with the rollers.
2. The machine is stopped by lifting up the safety guard. Raising the safety guard even just slightly will cause the machine to discontinue operation.
 - Lift the safety guard
Machine stops.
(In order to restart the machine, see 4.2 Starting/stopping the machine).

1.4 Safety instructions and information which must be followed

Before putting the machine into operation the operating manual must be read!



The machine of RONDO is exclusively built for sheeting, booking, final sheeting and cutting of dough or marzipan sheets for the food industry.

However, the machine is not suitable for the processing of other products (e.g. modelling clay or other types of mouldable masses which are not dough products).

Any other use of these units is not in accordance with the purpose for which they are built. Therefore, the manufacturer will not be liable for any accidents or damage resulting from unauthorized use; the risk in any such instance will be borne solely by the user.



Authorized use also means that the user must follow all instructions prescribed by the manufacturer in respect of operation, maintenance and service.



Any work on the electrical components of the machine, in particular the correct professional electrical connection, may only be carried out by qualified personnel who are familiar with the prescribed safety instructions.

The maximum permitted fuse of the mains is specified in the enclosed electro circuit diagram or on the sign "Electrical connected loads".

The machine may only be connected to the mains using the mains plug! No permanent electrical installation may be made using, for example, terminal screws. The mains plug is used as a disconnecting device, and must always be clearly visible and easily accessible.



Protective covers over the electrical controls and the mechanical moving parts may only be removed by professionally qualified personnel and must be remounted before the machine is put back into operation.



Any unauthorized changes made to the machine, and in particular, to the safety devices on the machine will automatically exclude any liability on the part of the manufacturer for accidents or damage sustained as a result of such changes.



Defective cables and mains plugs must be immediately replaced by qualified personnel.



The machine may only be connected to the mains using the plug once the machine has been fully assembled.



Before beginning any repairs, service or cleaning work on the machine, the electricity supply to the machine must be interrupted (pull out mains plug).



Safety devices on the machine may not be adjusted, shorted-out or expanded.



Operation of the machine when any of the safety devices is out of order is prohibited.



Defective safety devices must be immediately replaced with new original parts by RONDO.



Machine parts located in the area in which the dough is being processed, and whose surface coating becomes worn (e.g. chrome plate worn off) must be replaced.



The machine may not be lifted on the table sheet or on the bracket, when being moved. The machine should be fastened and transported on a pallet. The safety guard should be fastened in the upper position.



Reaching under the closed safety guard is prohibited!



The machine may only be operated with the machine tables mounted!



Do not deposit any loose objects such as knives, tools, articles of clothing, etc. in the area where the dough is located.



In order to guard against respiratory tract difficulties and flour dust allergies, the machine should be equipped with an automatic flour dust-er. Limit the use of flour to a minimum.

The use of compressed air for cleaning the machine is not permissible.

The use of a dust extraction system in the bakehouse is recommended.



Check to ensure that there are no loose screws in the area where the dough is located.



The machine may not be operated without the use of a scraper.



The safety guard must always be closed when the cutting rollers are let down.



Due to the risk of injury at the sharp edges the replacement of the cutting rollers must be carried out carefully and professionally. To prevent injury, always wear suitable protective gloves. Cutting rollers located outside the cutting area must be placed in the holding device located underneath the machine table.



Any disposal of the machine must be carried out in accordance with environmentally-accepted practices. The operators are fully responsible for ensuring that such practices are followed.



This machine is not designed to be used in explosive ambient.



Never reach in the delivery roller of a moving flour duster with either hands or any other object!



Defective parts must be replaced with new original parts by RONDO.



After every use, the machine has to be cleaned thoroughly. Not thoroughly cleaned machines can be a health-hazard for the consumer.



The machine must never be cleaned using spray water, high-pressure cleaners or a steam-cleaning machine!



All still existing protective foils on the machine must be removed.



Prior to the first starting-up, the complete machine must be thoroughly cleaned.



Non-ionising radiation is not intentionally produced but only given off for technical reasons by electric equipment (e.g by electric motors). In addition the machine has no strong permanent magnets. By keeping a safe distance (the distance from the source field to the implant) of 30 cm, interference with active implants (e.g. pacemakers, defibrillators) can be excluded with a high degree of probability.

RONDO will not accept liability when any of the above safety instructions / notes have not been complied with!

2 Transporting, setting up, connecting, dismantling, storing

2.1 Machine delivery

The machine is delivered in its original packaging.

- Report any claims for damage caused as a result of transportation directly to the freight handlers (see the packaging: The delivery documentation is found here)

2.2 Transportation

When transporting the machine must be packed in the original packaging or in accordance with the instructions of the manufacturer to guarantee stability.

When being transported, the machine must be fastened onto a pallet.

The machine tables must be dismantled and the safety guards fastened in the upper position.



The machine base must be dismantled when the machine is being transported. Lifting on the machine base is prohibited. Be careful when using a crane for moving the machine (danger of tipping).

The machine must not be tipped over (for machine weight, see 9.1 Technical data).

2.3 Unpacking the machine

The machine must be set up on a level, even floor surface. For further information regarding the ambient conditions required for the machine, see, 3.1 General information

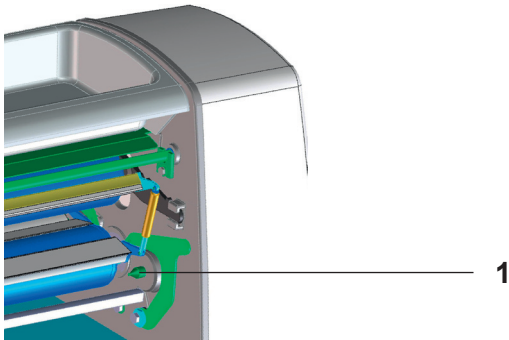
- Unpack tables and attachments
- Check all items received against the delivery slip to ensure completeness

2.4 Setting up the machine

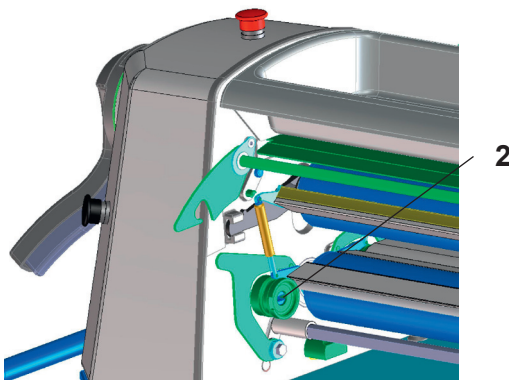
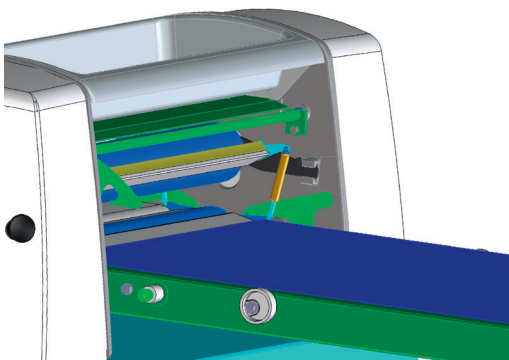


Two people are required to set up the machine!

2.4.1 Installation of the machine tables



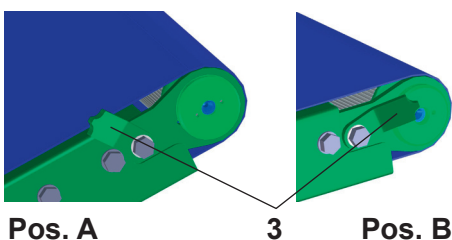
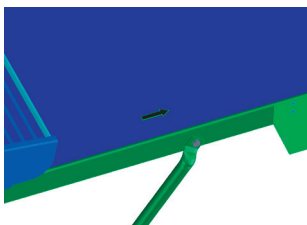
- Remove all protective foil on the stainless steel sections of the machine
- Lift the machine table with the aid of a second person
- Guide the center of the machine table's driving roller onto the spring bolt (1) at the rear of the housing
- Using heavy pressure, push the table towards the rear



- Center the catch of the machine table's driving roller in the receiver (2) in the front section of the housing

To snap the machine table into place, proceed as follows:

- Tug lightly on the conveyor belt until the catch snaps in place



- Hinge down the table bolt (3) (it is used to prevent the unintentional unhinge of the table)

A: Position by mounting/dismounting

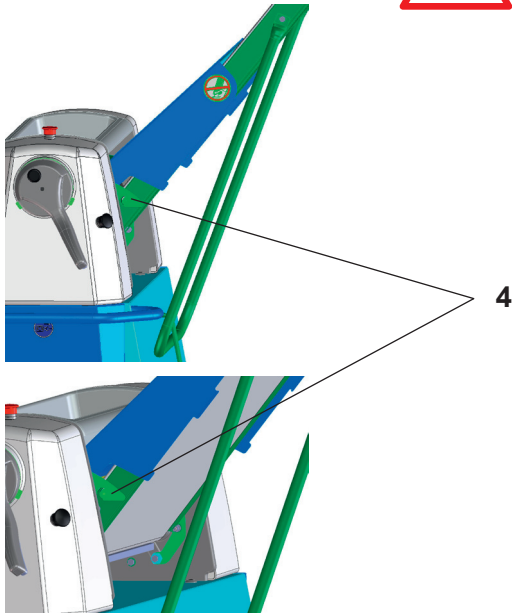
B: Position by operation

- Lift the table

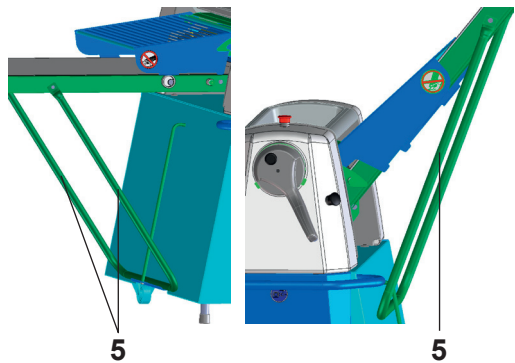
To lift the table, slip in or remove the dough catch pan



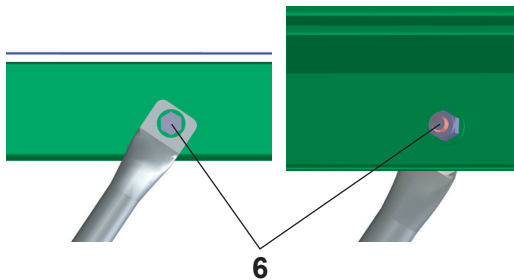
- Hing table hooks (4)
The machine table is now secured.



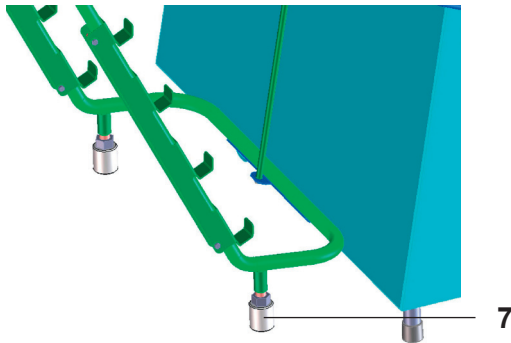
2.4.2 Mounting the forked supports



- Mount the forked supports (5)
- Tighten the screws (6) in such a way, that the forked support stand still in every position.



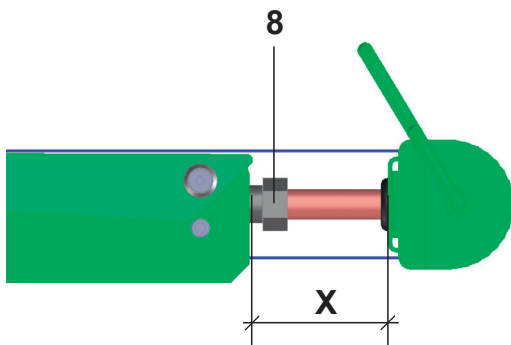
Position of the forked supports (5) when the machine tables is hinged down (working position) and hinged up.



What to watch out for when mounting the forked supports on machines equipped with the cutting device (Cutomat):

The foot (7) of the forked support must be set in such a manner that the table stands level. This is the only way to ensure optimal functioning of the safety guard.

2.4.3 Tensioning the conveyor belts



Tension the conveyor belts only enough that the heaviest pieces of dough can be moved.

Proceed as follows:

- Retighten the left and right tension nuts (8) evenly parallel
- Remeasure distance "X" on both sides, using a millimeter measuring instrument
The distance must be identical on both sides.
- Switch on the machine (see 4.2 Starting/stopping the machine)
- Observe the left and right movement of the conveyor belt

If the belt runs off towards one side, proceed as follows:

- Retighten the side where it runs off with a tension nut
- Observe the belt and correct it, if necessary, until it runs exactly in the middle of the table

If necessary, repeat this procedure several times. Routinely observe the belt during the initial hours that the machine is operational and retighten again, if necessary.

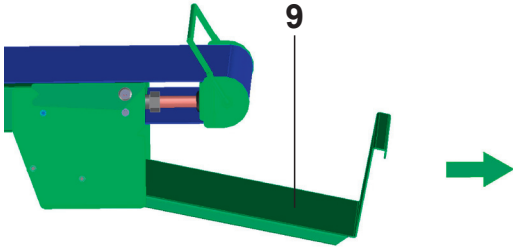


Tensioning and adjusting the conveyor belts demands patience!

Prior to carrying out each further correction, allow the machine to run for at least 30 seconds.

Before putting the machine into operation, the conveyor belts must be lightly rubbed with flour in order to prevent the dough from sticking to the belt.

2.4.4 Mounting the dough catch pans



- Remove the protective foil on the dough catch pan (9)
- Push in the dough catch pan on both sides

2.5 Conditions for initial operation of the machine



Power supply and frequency at the main circuit to which the machine is connected, must be in accordance with specifications contained on a plaque affixed to the machine. (This plaque is found on the cable lead-through on the machine base.)



Direct connection without a plug is prohibited! Ensure that the connection is made professionally and in accordance with local regulations. (An electrical schematic is delivered with every machine. It is to be found next to the electrical control in the machine base.)



Connect the machine plug to the power supply system.



The machine may only be operated with mounted machine tables!



All still existing protective foils on the machine must be removed.

2.5.1 Ground fault interrupter

The ground fault interrupter is actuated when frequency inverter is started!

Leakage current flows through the frequency inverter.

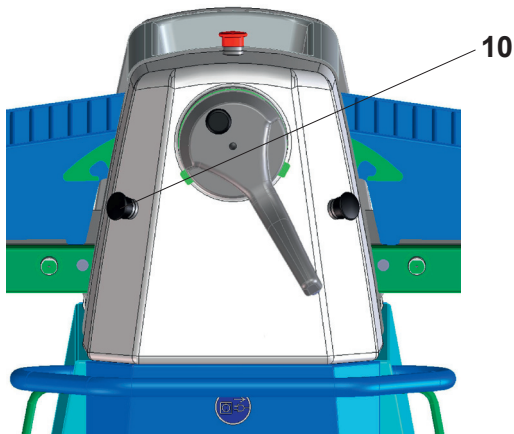
The inverter performs internal switching. Therefore, a leakage current flows through the inverter. This leakage current may actuate the ground fault interrupter, shutting the power off.

Reducing the carrier frequency value in n46 is effective. In addition, remember that a leakage current increases in proportion to the cable length. Normally, approximately 5 mA of leakage current is generated for each meter of cable.

2.6 Moving direction test



Observe to ensure that the belts are properly tensioned.

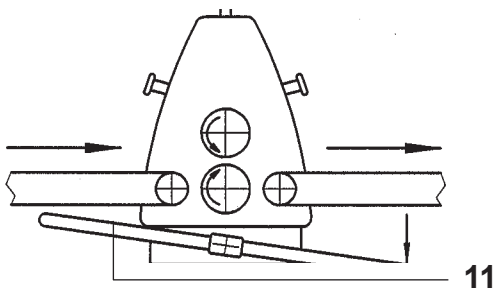


- Push the black push button (10) on the left (only impulse)
The conveyor belts must move to the right.



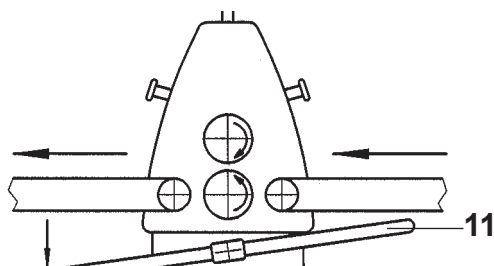
If the conveyor belts move in the wrong direction:

- Exchange two phases in the power plug



By using the main operating lever (option):

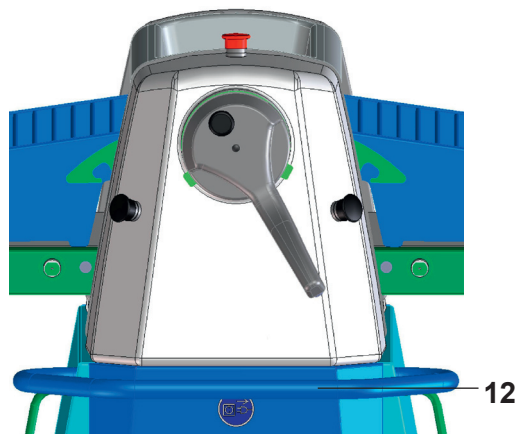
- Push the main operating lever (11) downwards to the right
The conveyor belts must move to the right.
- Push the main operating lever (11) downwards to the left
The conveyor belts must move to the left.



If the conveyor belts move in the wrong direction:

- Exchange 2 phases in the power plug

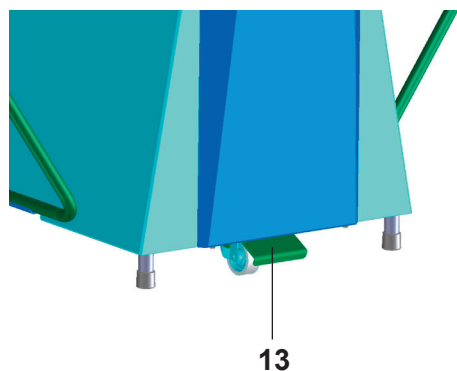
2.7 Moving the machine



- On the operator's side, lift up using the safety rail (12)

Front transport caster will snap down.

Once the machine's permanent location is selected:



- Hold the safety rail (12) tightly using both hands
- Gently lift up the machine
- Using one foot, push the pedal (13) for the front transport caster
- Gently ease the machine back down to the ground, do not let it "fall"!

3 General data about the machine

3.1 General information

3.1.1 Authorized use of the machine



The machine of RONDO is exclusively built for sheeting, booking, final sheeting and cutting (SSO6405C/SSO6407C) of dough or marzipan sheets for the food industry.

However, the machine is not suitable for the processing of other products (e.g. modelling clay or other types of mouldable masses which are not dough products).

This product is a technical working tool which is designated to be used exclusively for work.

Persons handling the product must be instructed accordingly and at least 16 years of age.

Booking

Booking in fat. Through sheeting to a thickness of approx. 6 – 11 mm and a subsequent folding of the dough there is a resulting formation of layers of fat and dough. A repetition of this process yields many thin layers.

Final sheeting

Includes sheeting the piece of dough to the necessary final thickness required for further processing.

Cutting

Cutting of the sheeted dough band by means of cutting rollers (by models SSO6405C/SSO6407C).

3.1.2 Noise Values

The emission value at place of operation is less than “70 dB(A)”.

The accuracy class of the acoustic emission measurement corresponds to class 2 (± 2.5 dB) according to:

DIN EN ISO 11201 / DIN EN ISO 11202 /
DIN EN ISO 11203 / DIN EN ISO 11204

3.1.3 Temperatures

The ambient temperatures permissible for the machine:
+ 5 °C to + 40 °C

Permissible temperatures for storage of the machine:
- 25 °C to + 55°C, for brief periods of time up to + 70°C

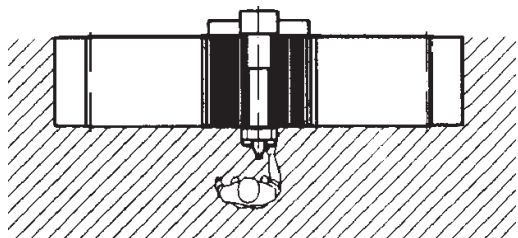
3.1.4 Ambient humidity

The ambient humidity permissible for the machine lies in the area of
30 % – 95 %, relative humidity, uncondensed

3.1.5 Machine weight

Total weight = 260 – 335 kg, according model (compare 9.1 Technical data)

3.1.6 Working area for the operating personnel



The hatched area shows the work area designated for the operating personnel.

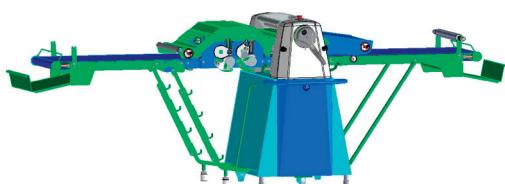
3.2 Machine models

3.2.1 SSO6404 / SSO6405 / SSO6407



Socle model
(see 9.1 Technical data)

3.2.2 SSO6405C / SSO6407C



Cutomat models are equipped with a cutting station Cutomat to cut the sheeted dough. The sheeting and cutting speed can be set continuously variable (see 9.1 Technical data).

3.3 Prerequisites

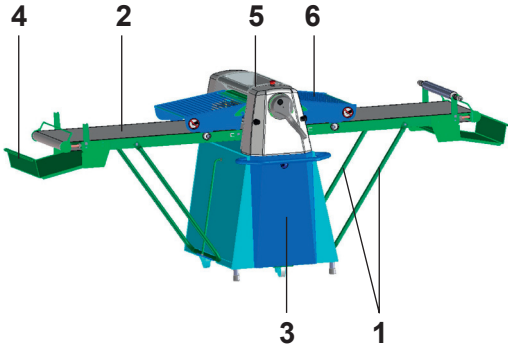


In order for the dough to be sheeted by the machine, the following prerequisites must be fulfilled:

- Max. dough piece weight 12 kg
- Flour the dough pieces
This will serve to prevent the dough from sticking to the rollers and scrapers.

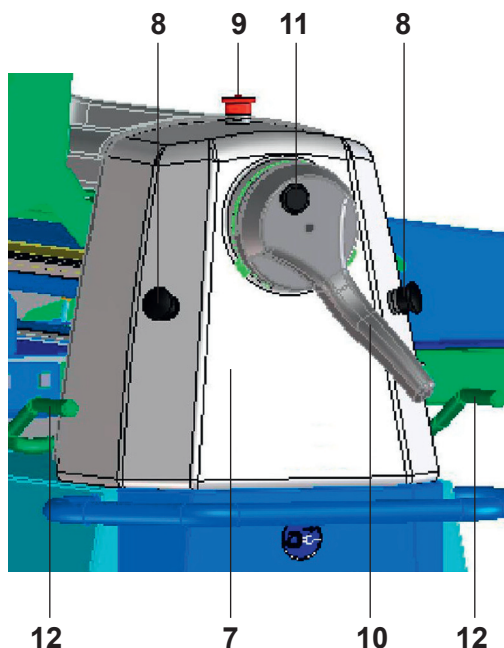
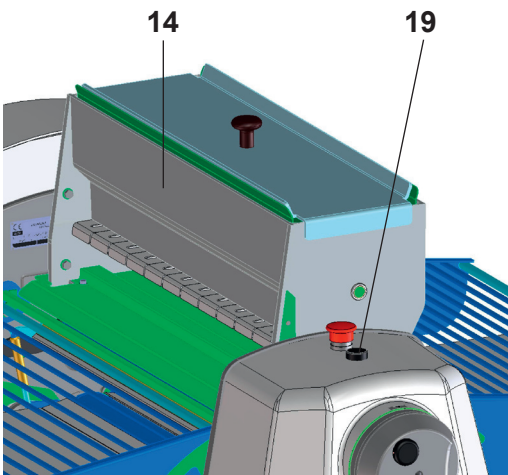
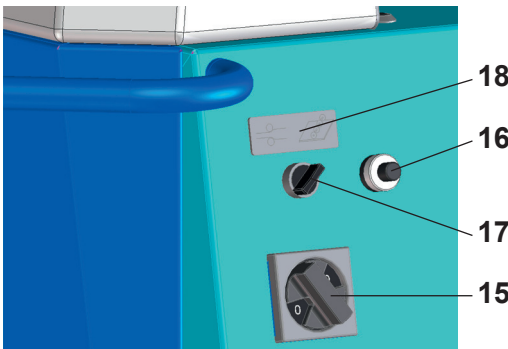
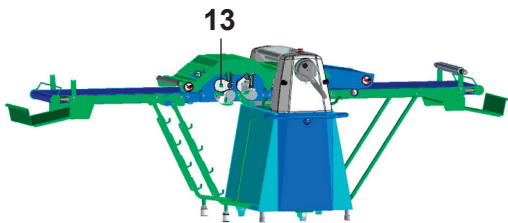
3.4 Full view of the machine

SSO6404 / SSO6405 / SSO6407



- 1 Forked support
- 2 Machine table
- 3 Machine base
- 4 Dough catch pan
- 5 Flour container
- 6 Safety guard
- 7 Machine head
- 8 Black push button to switch on
- 9 Red push button to switch off
- 10 Roller gap adjusting mechanism
- 11 Push-button for dough thickness control stop
- 12 Main operating lever (option)
(standard on SSO6405C/SSO6407C)
- 13 Cutting station "Cutomat"
- 14 Flour duster
- 15 Main switch (only on UL models)
- 16 Potentiometer (Cutomat)
- 17 Interruptor "Cutting mode" (Cutomat)
- 18 Plate "sheeting/cutting"
- 19 Push button to start the flour duster

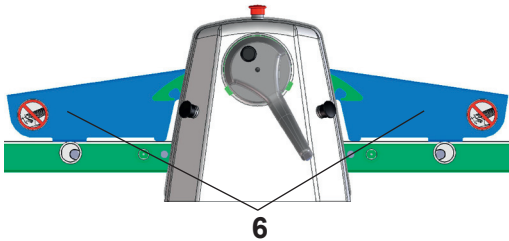
SSO6405C / SSO6407C



3.5 Operating elements



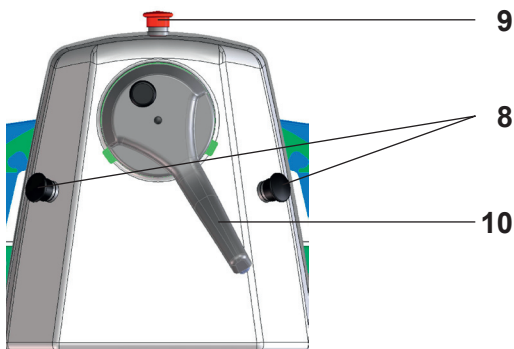
3.5.1 Safety guards



The safety guards (6) protect the operator against inadvertent contact with the rollers.

By raising the safety guards the machine can also be stopped.

3.5.2 Black push buttons



Both black push buttons (8) (two push buttons on the side of front housing) serve to start the machine (see also 4.2 Starting /stopping the machine).

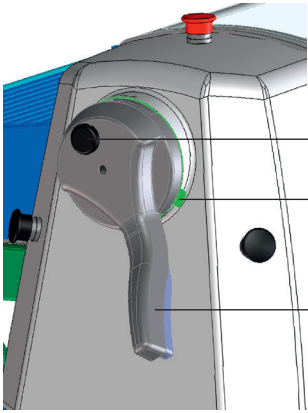
3.5.3 Red push button

The red push button (9) (push button at the top of front housing) serve to stop the machine (see also 4.2 Starting /stopping the machine).

3.5.4 Roller gap adjusting mechanism

The desired roller gap is set by using the roller gap adjusting mechanism (10) (see also 5.1.1 Sheeting).

3.5.5 Push-button for dough thickness control stop

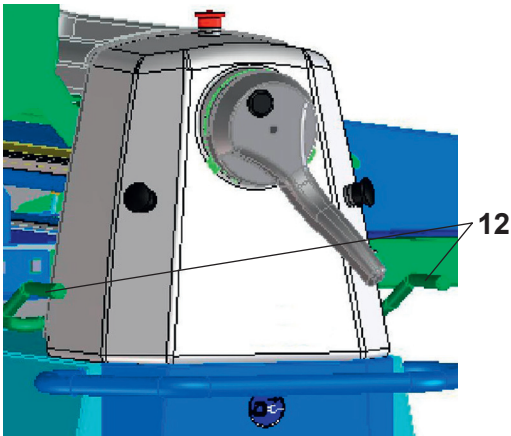


Using the roller gap adjusting mechanism, open the gap between the rollers to the maximum (45 mm).

Set the dough thickness control stop as follows:

- Set desired dough thickness by using the roller gap mechanism (10)
- Press the push-button (11)
- Set the dough thickness control stop (18) to desired value on the control head scale (e.g. final thickness 5)
- Release push-button (11)

3.5.6 Main operating lever (option)



The main operating lever (12) is used to start the machine and to select the running direction.

Procedure (see also 5.1.1 Sheeting)

- Push main operating lever down to the left
The conveyor belts move to the left.
- Push main operating lever down to the right
The conveyor belts move to the right.
- Bring the main operating lever into horizontal position
The conveyor belts stop.

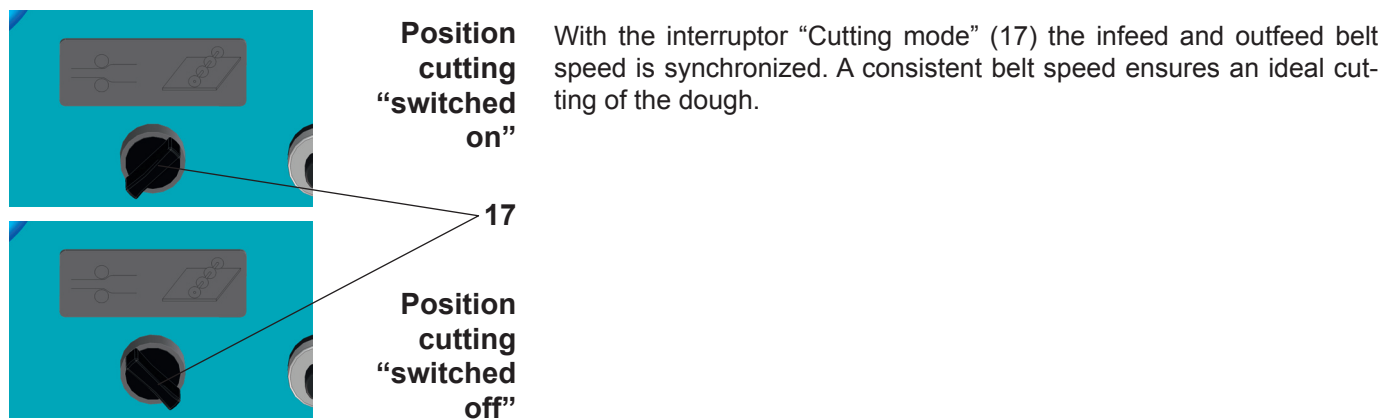
3.5.7 Potentiometer (SSO6405C / SSO6407C)



With the potentiometer (16) the speed of the conveyor belts is set continuously (3.5 – 48 m/min.).

Position 0 = minimal speed
Position 10 = maximum speed

3.5.8 Interruptor “Cutting mode” (SSO6405C/SSO6407C)



Remark:

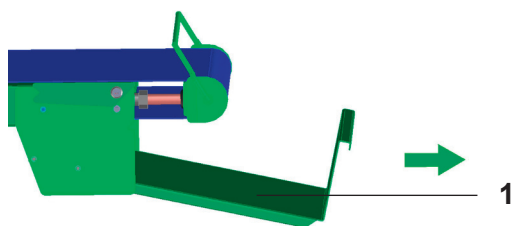
A muted noise occurs in the cutting mode by pushing off the gear wheel in the table drive. This procedure is necessary to achieve a consistent in- and outfeed belt speed!

4 Putting into operation

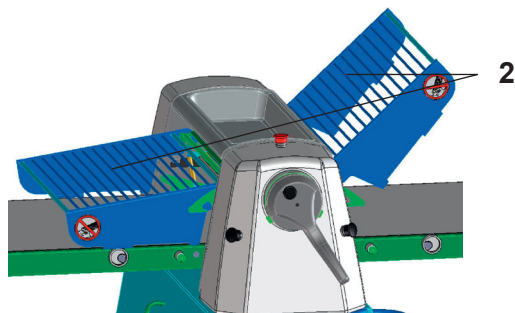


Prior to the first starting-up, the complete machine must be thoroughly cleaned.

4.1 Preparing for operational readiness

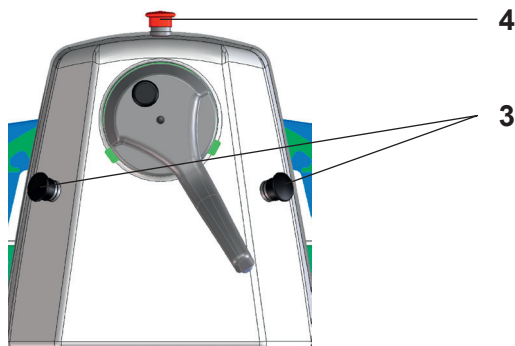


- Connect the machine to the mains
- Pull out the dough catch pan (1) on both sides



- Fold both safety guards (2) downwards

4.2 Starting/stopping the machine



4 In order to start up the machine:

- Briefly press the left start push button (3)
The conveyor belts begin to move from left to right.

or

- Briefly press the right start push button (3)
The conveyor belts begin to move from right to left.

In order to stop the machine:

- Press stop push button (4)

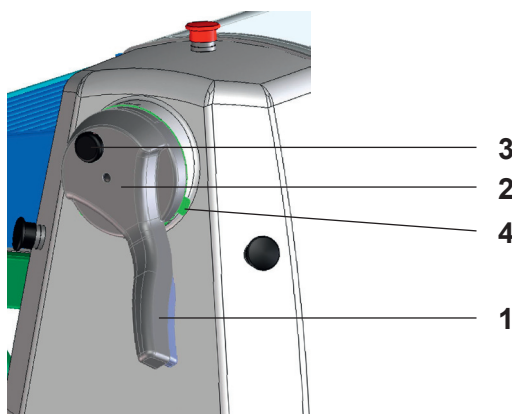
5 Operation

5.1 Operating instructions



Reaching under the safety guard when it is closed is prohibited!

5.1.1 Sheeting



The machine is designed to accommodate dough pieces with a maximum weight of 12 kg!

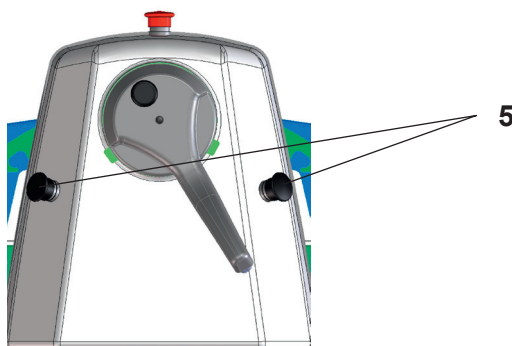
Never leave loose objects such as knives, tools, articles of clothing, etc. lying in the area where the dough is located.

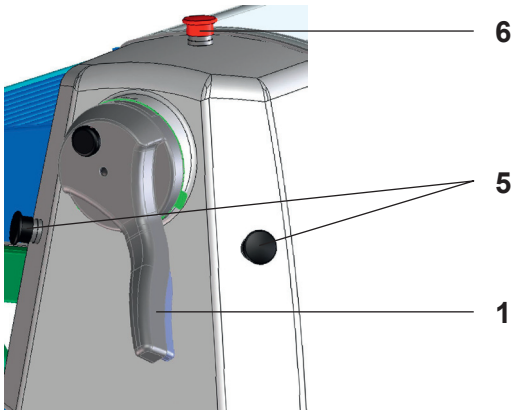
Set desired roller gap (maximum 45 mm / minimum 0,3 mm) as follows:

- Push adjustment lever (1) towards the roller gap adjusting mechanism (2), do not release
- Set the desired roller gap, by using the roller gap adjusting mechanism
- Release adjustment lever (1)
Adjustment lever must lock into place.
- Press the push-button (3)
- Turn the dough thickness control stop (4) to the limit stop
- Release the push-button
- Place the dough piece (max. 12 kg) on the machine table (do not "throw" dough piece on the table!)

Start up the machine as follows:

- Briefly press the black push button (5) on the dough's infeed side (see 4.2 Starting/stopping the machine)





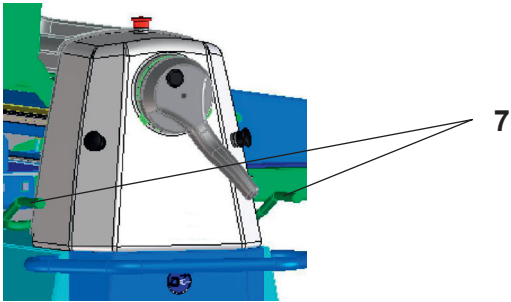
Once the dough piece has fully cleared the rollers:

- Press the red push button (6)
Machine stops.
- Manually set the next roller gap (depending on type of dough)
(see 5.1.1 Sheeting)
- Release adjustment lever (1)
Adjustment lever must lock into place.
- Briefly press black push button (5) on the dough's infeed side (see
4.2 Starting/stopping the machine)

Once the dough piece has fully cleared the rollers:

- Press the red push button (6)
Machine stops.
- Repeat this procedure until the desired final thickness of the
dough has been obtained.

5.1.2 Main operating lever (option) (standard on SSO6405C/SSO6407C)

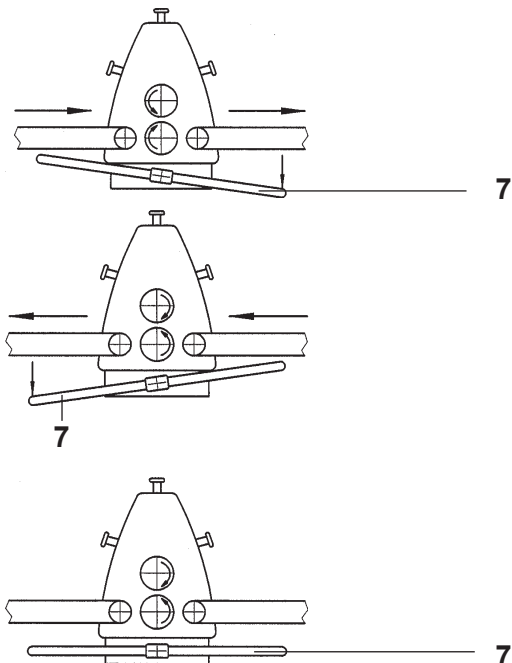


- Set dough thickness control stop (see 3.5.4 Roller gap adjusting
mechanism)
- Lay the dough pieces on the left or right machine table (do not
“throw” them on the table)
- Press one of the black push buttons (5)
- Push main operating lever (7) to the desired side

Once the dough piece has cleared the rollers:

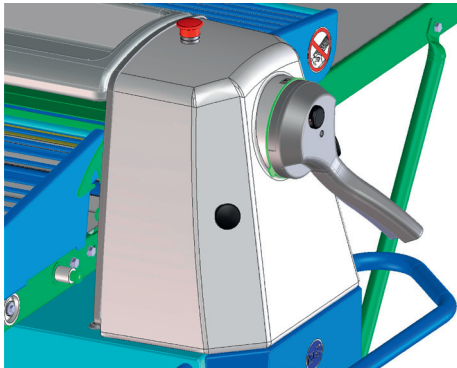
- Put the main operating lever in the neutral position
Machine stops

or

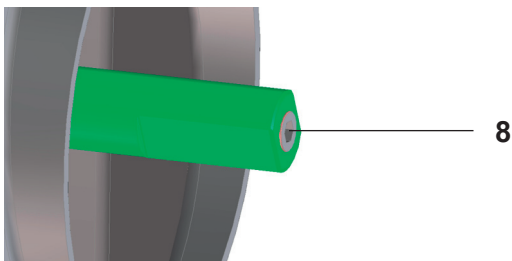


- Lift safety guard
Machine stops
- Before starting another sheeting process, one of the black start
push buttons must be pressed
- Manually set the roller gap depending on the type of dough (see
3.5.4 Roller gap adjusting mechanism)
- Once again, change the main operating lever
- Repeat this procedure until the final thickness has been attained.

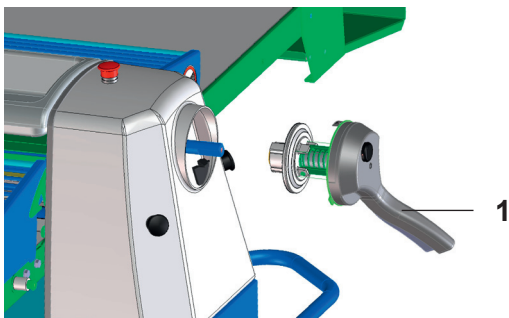
5.2 Adjustment level



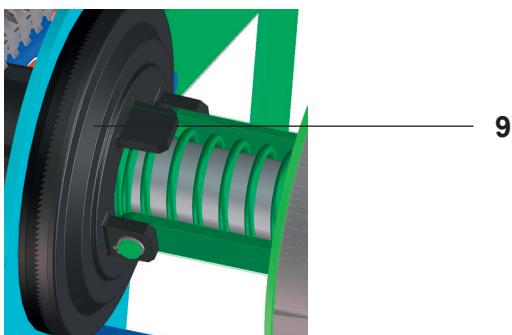
Starting point: machine body completely assembled and set screw (8) screwed home in the adjusting shaft



5.2.1 Assembly

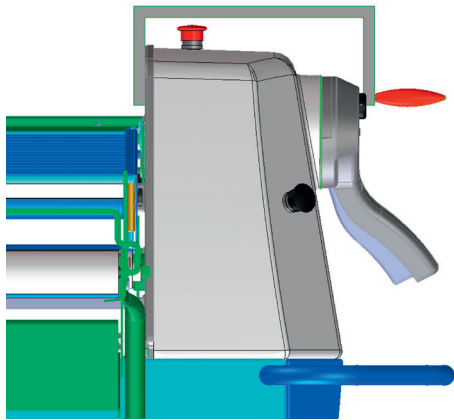


- Slide the pre-assembled adjustment lever (1) over the adjusting shaft up to the lid and press down



Check that the teeth are correctly engaged in the serrated segment (9)!

5.2.2 Adjustment

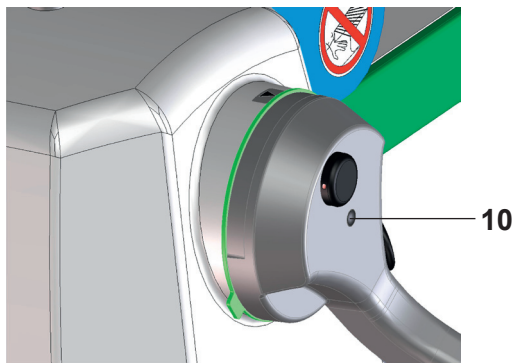
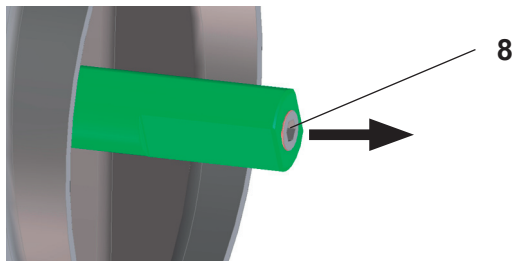


With screw clamp:

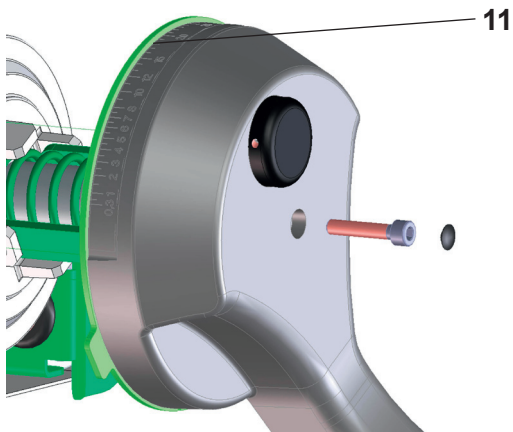
- Lightly tighten the screw clamp and unscrew the set screw (8) with the aid of an Allen key (through the drill hole (10)) until it projects
- Remove the screw clamp and unscrew the set screw (8) by a further approx. 1/8 turn
- Secure the set screw (8) with adhesive (Ergo 4401)!

If no screw clamp is available:

- Press down the adjustment lever (1) by hand and unscrew the set screw (8) until it projects
- Then take out the adjustment lever (1) by a further approx. 1/8 turn



5.2.3 Fixing



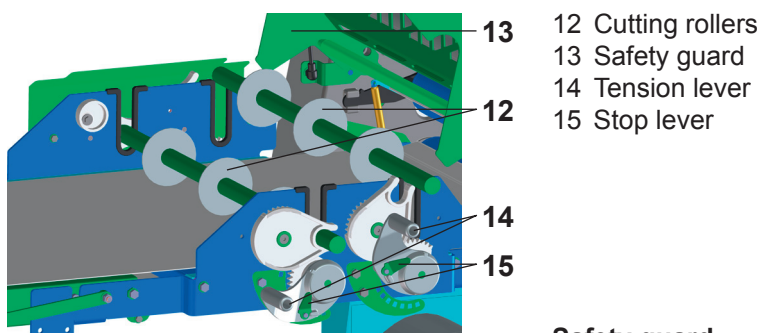
- Tighten the Allen screw and check that stop plate (11) runs smoothly
- If the stop plate (11) has too much play, screw the set screw (8) in or out until the optimum adjustment is obtained

5.3 Sources of error in the sheeting process

Fault finding	Cause/defect	Remedy/to remove
1. Dough piece sticks, tears underneath.	Dough too moist. Dough piece rubs against scraper bar.	Put more flour on the dough piece. Mount scraper properly (see 6.1.1 General information).
2. Dough piece piles up (ripples).	Reduction steps too big.	Select smaller reduction steps: Let down the roller in smaller steps (see 5.1.1 Sheeting).
3. Dough sheet tapers.	Reduction steps too small.	Select bigger reduction steps: Let down the roller in bigger steps (see 5.1.1 Sheeting).

5.4 Machine type “Cutomat” with cutting station (SSO6405C / SSO6407C)

5.4.1 General information

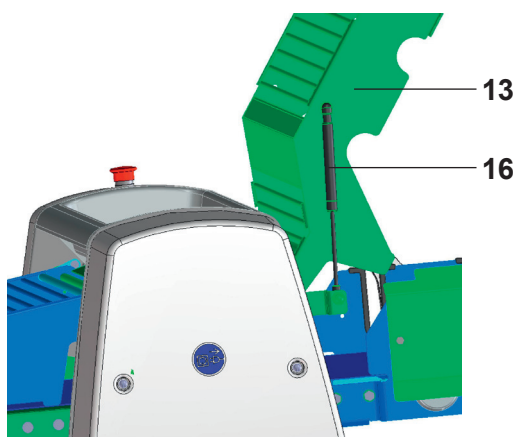


Safety guard

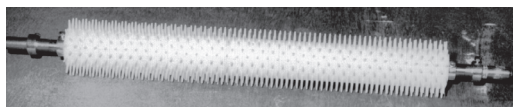
The cutting station is covered with a safety guard (13).



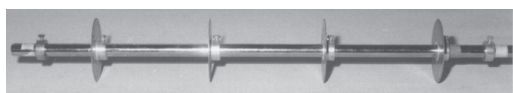
A defective pneumatic spring (16) on the safety guard (13) must be replaced immediately! Reason: In order to avoid danger of injury should the safety guard fall down!



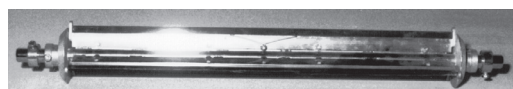
5.4.2 Types of cutting rollers



Docking Roller



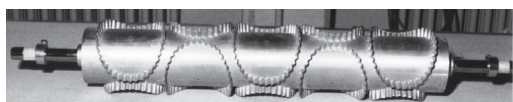
Length Cutter



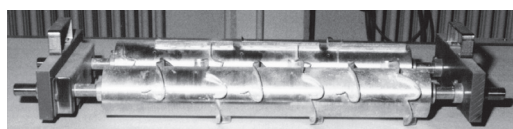
Cross Cutter



Zig-zag Cutter

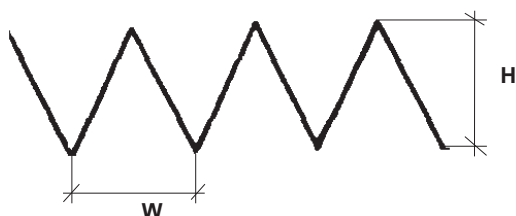


Form Cutting Roller



Tandem Cutter

Standard dimensions for zig-zag cutters in stainless steel version for triangles.

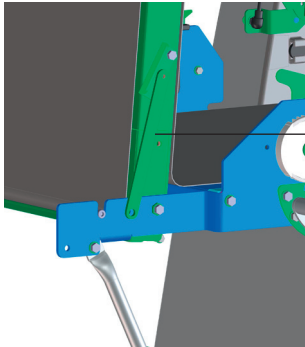


W	H	Number of rows
120	105	5
140	180	3
180	140	4
180	100	5

5.4.3 Lifting the table with cutting station



A defective stopping lever (17) must always be replaced immediately! Reason: In order to avoid danger of injury should the table fall down!

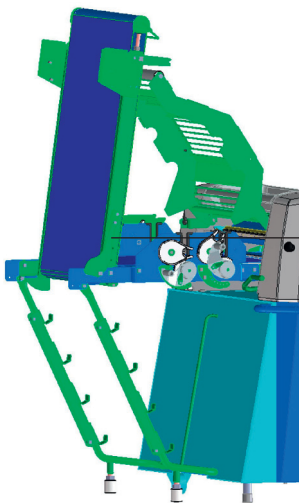


17

- Lift the table by hand up till the stopping lever (17) blocks up

Table in set-up-position.

5.4.4 Letting down the table with cutting station



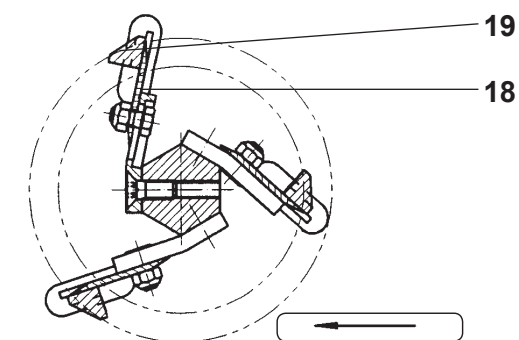
17

- Hold the table
- Push towards the rear the stopping lever (17) and let down the table at the same time

5.4.5 Inserting the Cutting Rollers



Danger of injury on the sharp cutting edges of the cutting rollers!



19 The cutting rollers must be inserted in the following sequence:

18

a) For squares/rectangles

First Length cutter, than Cross cutter

In order to ensure uninterrupted operation of the cross cutter, the cutter must be positioned in the cutting direction in such a way that the dough sheet is first cut by the cutting knife (18) and then afterwards ejected by the ejector (19).

b) For triangles

First zig-zag cutter, then length cutter

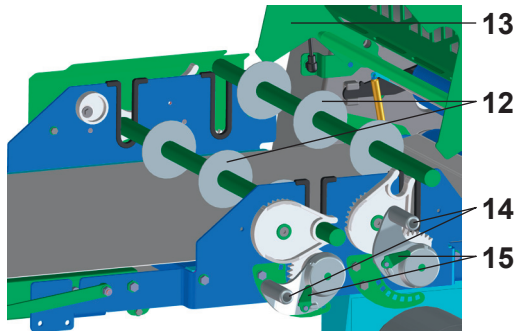


Cutting rollers not in use must be stored in the location provided for this purpose. Reason: In order to avoid damage to the cutting knives. In order to avoid injury to operators.

5.4.6 Letting down the cutting rollers



Close the safety guard (13)



- Lift up the tension lever (14) lightly and turn the locking lever (11) anti-clockwise up to the limit stop
- Let down the tension lever (14) at stages up till the cutting roller (12) is on the conveyor belt

The deeper the tension lever (14) is let down, the more the cutting pressure is applied.



When using length cutters remark the following:

As soon as the length cutter touches the conveyor belt, let down the tension lever max. two stages, otherwise the conveyor belt can be cut.

5.4.7 Lifting up the cutting rollers

- Push the tension lever (14) lightly down
- Turn the locking lever (15) clockwise up to the limit stop
- Discharge tension lever (14) and lift it up to the limit stop

5.4.8 Cutting

The width of the dough sheet must correspond to the length of the cutting roller to be used plus approx. 1 – 2 cm on either side. The sheeting rollers have to be completely opened.

Thereby a stuffing of the dough is prohibited.

Running direction

It can be cut in both directions. We recommend to cut from left to right. The dough sheet is placed before cutting on the machine table with the cutting station.

See 4.2 Starting/stopping the machine.

6 Cleaning

6.1 Cleaning



Before cleaning the machine, pull out the mains plug.

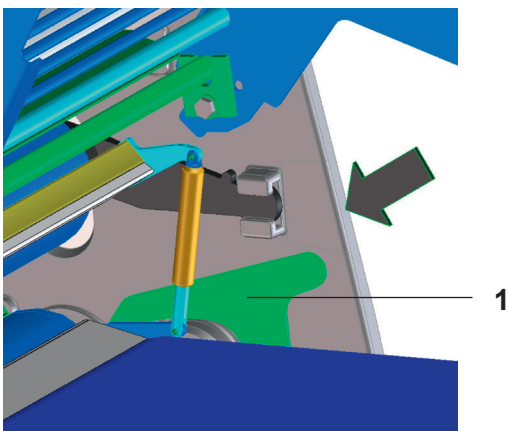


The machine must never be cleaned using spray water, high-pressure cleaners or a steam-cleaning machine!

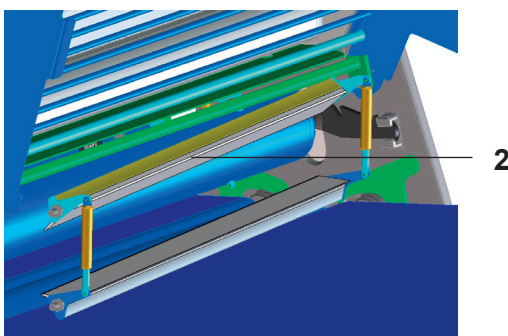
6.1.1 General information



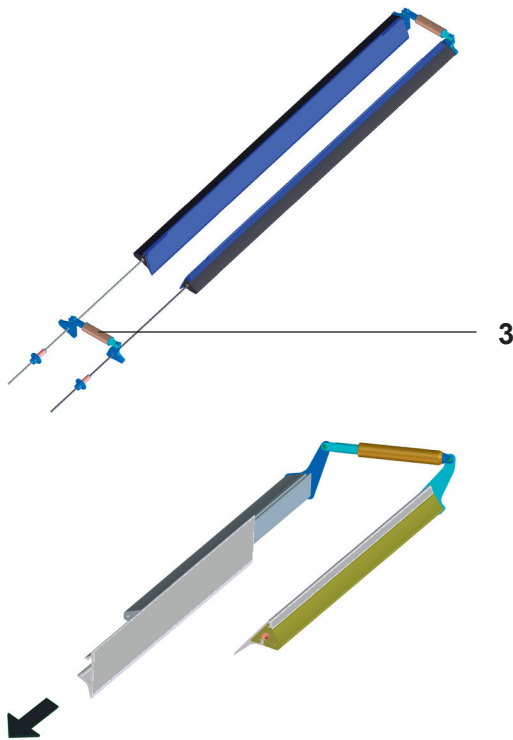
Dismounting the scraper



- Open rollers fully
- Lock the safety guard into the upper position
- Using the thumb, push the front and rear scraper lever (1) downwards



- Lift the scraper (2) out of the scraper mounting
- Pull out the scraper (2)
- Clean the scraper (see 6.1.2 Care)



Exchange of scraper blades

Required tool: Allen key No. 4

Exchange of scraper blades:

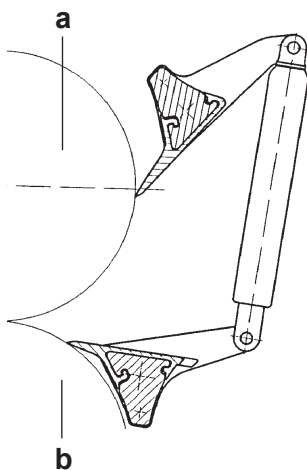
- disassemble the spring clamp (3) on the left or right side

- slide the old scraper blade off

Attention

For protection of the fingers, please use a cloth. The edges of the blades are sharp and there is danger of cutting oneself.

- Assemble the new scraper blades in reverse order
- Assemble the spring clamp in reverse order



Mounting the scraper

- To remount the scraper, carry out the dismounting instructions in reverse order

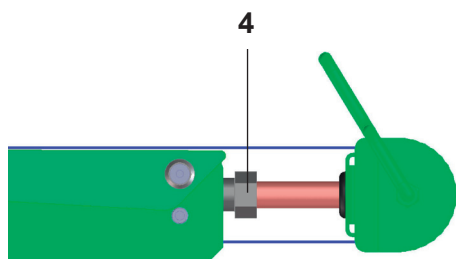
a upper roller

b lower roller

Dismounting machine tables/conveyor belts



In order to dismount the machine tables and conveyor belts, proceed as follows:



- Pull out the mains plug
- Lift up the safety guards
- Loosen the tension nuts (4) parallel, in order to retighten the conveyor belt
- Dismount tables (in reverse order to installation of the machine tables, see 2.4.1 Installation of the machine tables)
- Dismount forked supports (in reverse order to mounting the forket supports, see 2.4.2 Mounting the forked supports)



In order to dismount the conveyor belts, proceed as follows:

- Place table sideways
- Remove the conveyor belt
- The conveyor belt can now be cleaned (see 6.1.2 Care)

Mount machine tables and conveyor belts

- Remount machine tables and conveyor belts by proceeding in reverse order of the instructions for dismounting them.

6.1.2 Care

Part	see	daily see legend	weekly see legend
Machine head and socle	3.4 Full view of the machine	B	A
Scraper	6.1.1 General information	A	
Cotton belt	6.1.1 General information	B	(E)
Synthetic belt	6.1.1 General information	B	C
Dough catch pan	2.4.4 Mounting the dough catch pans	A	
Driving roller	2.4.1 Installation of the machine tables		D
Idle roller	2.4.3 Tensioning the conveyor belts		D
Cutting rollers	5.4.2 Types of cutting rollers	A	
Flour container	3.4 Full view of the machine	B	

Legend

- A Wet clean using a cloth and soapy water
- B Dry clean using a brush
- C Wet clean using a brush
- D Using a brush and plastic scraper, remove any remaining pieces of dough
- E Wash cotton belt monthly as follows:
 - Water temperature must not exceed 40 °C
 - Once belt has been washed, hang it over a rod and weight it down with a weight of approx. 10 kg



Alcohol, solvents or cleaning materials which exceed a ph value of 8 must not be used for cleaning purposes! Only those cleaning materials which are approved for use in the food industry may be used.

7 Maintenance

7.1 General information on maintenance of the machine



Any defects on the machine must be repaired by an authorized customer service representative!

7.2 Maintenance list

What/ part	Activity	daily working time less than 4 h	daily working time 4–8 h	daily working time more than 8 h
Conveyor belts	check, replace if necessary	M	W	W
Scraper blade (Dough sheeter)	check, replace if necessary	M	W	W
Table drive and roller adjustment mechanism in the front housing	grease according to the service manual	3 J	2 J	J
Roller gap adjusting mechanism	general functional control	3 J	2 J	J

Legend

W weekly

M monthly

J annually

2 J every 2 years

3 J every 3 years

7.3 Replacement parts list



The use of conveyor belts not supplied by the original manufacturer can lead to premature wear or destruction on machine parts (coupling, drive rollers).

Item-no.	Description	Dimensions	Application
122954T01	Scraper	–	SSO6405/SSO6407 SSO6405C/SSO6407C/SSO6404
120750	Cotton conveyor belt	3210 x 635 mm	SSO6407/SSO6407C
120750T02	Cotton conveyor belt	2630 x 635 mm	SSO6405/SSO6405C
120750T08	Cotton conveyor belt	2210 x 635 mm	SSO6404
105467	Synthetic conveyor belt	3280 x 640 mm	SSO6407/SSO6407C
121344	Synthetic conveyor belt	3570 x 640 mm	SSO6405C/SSO6407C
121344T02	Synthetic conveyor belt	2680 x 640 mm	SSO6405/SSO6405C
121344T38	Synthetic conveyor belt	2260 x 640 mm	SSO6404
8934	Fuse 1AT	1,0 A slow Ø 5 x 20 mm	SSO6405/SSO6407 SSO6405C/SSO6407C/SSO6404

8 Trouble shooting

Fault finding	Cause/defect	Remedy/to remove
1. Machine stands still after assembly.	Mains plug is not/not correctly plugged in.	Plug in (correctly) mains plug.
	Safety guard not closed.	Close safety guard.
	Right or left start push button not pressed.	Press the desired start push button.
	Machine tables not level.	Put the machine tables in a even level position.
	Fuse F1 o.k.?	Check Fuse F1, replace if necessary.
2. When the main operating lever is pressed down to the right, the belts run to the left.	Moving direction reverse (mains).	Moving direction test (see 2.6 Moving direction test).
3. Machine runs intermittently, stops, rattles.	Safety guard limit switch incorrect.	Readjusting by an specialist.
	Supporting eccentric (for safety guard) on machine table out of place.	Adjust supporting eccentric.
	Loose wires (loose connection).	Secure all cables and wires.
4. Main drive motor runs, rollers and conveyor belts stand still.	V-belt drive (2-steps) defective.	Call after-sales service! Remove rear cover of machine base and roller head replace v-belt if necessary.
5. Conveyor belts loop up, motor and rollers run.	Belt tension too weak.	Tighten conveyor belt equally (see 2.4.3 Tensioning the conveyor belts).
	Dirty driving roller.	Clean driving roller (see 6.1.2 Care).
6. Rollers can not by reduced to the required dough thickness anymore.	Dough thickness limit stop is set incorrectly.	Alter limit stop to the required position.

Fault finding	Cause/defect	Remedy/to remove
7. Machine only runs on one side.	Contactor defective.	Call a specialist (electrician).
	Limit switch rocker defective.	Replace limit switch.
8. Dough piles up before the roller or passes under the roller between scraper and infeed conveyor.	Scraper: control right assembly.	Close the scraper levers properly (see 6.1 Cleaning). Check, and if necessary adjust scraper levers by means of eccentric (center of motion).
	Control abrasion of the scraper blades.	Maybe replace scraper blades. Maybe change complete scraper.
9. Conveyor belt runs over to one side, tearing at the edges.	Belt tension incorrect.	Tighten conveyor belt (see 2.4.3 Tensioning the conveyor belts).
	Dirty driving roller.	Clean driving roller (see 6.1.2 Care).
10. Cotton conveyor belts are too short after washing.	Washing temperature too high.	Washing temperature maximum 40 °C. Hang the cleaned band over a bar and weight it with approx. 10 kg bellow.
11. All other errors/failures.		Contact the next "RONDO" after-sales service giving them as much informations as possible.

9 Technical data

9.1 Technical data

Technical data	SSO6404	SSO6405
Machine base	Socket	Socket
Flour duster	Option	Option
Width of conveyor belts	640 mm	640 mm
Usable width	600 mm	600 mm
Total table length	2300 mm	2720 mm
Roller length	660 mm	660 mm
Roller gap	0.3–45 mm	0.3–45 mm
Speed of outfeed belt	80 cm/s	80 cm/s
Rated power	2.0 kVA/ 1.1 kW	2.0 kVA/ 1.1 kW
Supply voltage	3 x 200 – 460 V, 50/60 Hz	3 x 200 – 460 V, 50/60 Hz
Required floor-space in working position (dough catch pans extended)	1330 x 3190 mm	1330 x 3100 mm
Required floor-space in resting position	1330 x 1550 mm	1330 x 1815 mm
Machine weight:		
• without flour duster	260 kg	270 kg
• with flour duster	280 kg	290 kg

Technical specifications subject to change without notice.

Technical data	SSO6407
Machine base	Socket
Flour duster	Option
Width of conveyor belts	640 mm
Usable width	600 mm
Total table length	3320 mm
Roller length	660 mm
Roller gap	0.3–45 mm
Speed of outfeed belt	80 cm/s
Rated power	2.0 kVA/ 1.1 kW
Supply voltage	3 x 200 – 460 V, 50/60 Hz
Required floor-space in working position (dough catch pans extended)	1330 x 3620 mm
Required floor-space in resting position	1330 x 2180 mm
Machine weight	
• without flour duster	275 kg
• with flour duster	295 kg

Technical specifications subject to change without notice.

Technical data	SSO6405C	SSO6407C
Machine base	Socket	Socket
Flour duster	Option	Option
Width of conveyor belts	640 mm	640 mm
Usable width	600 mm	600 mm
Total table length	3170 mm	3470 mm
Roller length	660 mm	660 mm
Roller gap	0.3–45 mm	0.3–45 mm
Speed of outfeed belt	80 cm/s	80 cm/s
Rated power	2.0 kVA/ 1.1 kW	2.0 kVA/ 1.1 kW
Supply voltage	3 x 200 – 460 V, 50/60 Hz	3 x 200 – 460 V, 50/60 Hz
Required floor-space in working position (dough catch pans extended)	1235 x 3540 mm	1330 x 3840 mm
Required floor-space in resting position	1330 x 1885 mm	1330 x 2065 mm
Machine weight:		
• without flour duster	310 kg	315 kg
• with flour duster	330 kg	335 kg

Technical specifications subject to change without notice.

9.2 Additional information

All sheeters from RONDO have the following quality features:

- The conveyor belts made of plastic material:
All plastic coated conveyor belts used on our machines are approved for coming into contact with food stuff and correspond with the requirements of the FDA (Food and Drug Administration, USA).
- The conveyor belts made of cotton:
The fabric consists of 100 % cotton and has a non-toxic finish.
- The rollers are hard-chrome plated. This coating is approved for coming into contact with food stuff.
- The scraper blades are made of POM-C plastic material. This material is approved for coming into contact with food stuff and corresponds with the requirements of the "Bundesgesundheitsamt BGA,,", Germany.
- The dough catch pans are made of stainless steel (chromium nickel steel, DIN Mat. no. 1.4301, 1.4016) which is approved for coming into contact with food stuff.
- The rollers of the manual and the automatic dough reeler that are touching the dough are made of aluminium, anodised colourless and are approved for coming into contact with food stuff.
- The knives of the cutting rollers that are touching the dough (Cuto-mat-types) are made of stainless steel (chromium-nickel steel, DIN Mat. no. 1.4301). This material is approved for coming into contact with food stuff.
- Flour duster with Inox container:
The container is made of stainless steel (chromium nickel steel, DIN Mat. no. 1.4301, 1.4016), the delivery roller is made of aluminium, anodised colourless, the bristles of the brush are made of plastic material (PA). These materials are approved for coming into contact with food stuff.
- Flour duster with plastic container:
The container is made of plastic material (PS-TSG), the delivery roller is made of aluminium, anodised colourless, the bristles of the brush are made of plastic material (PA). These materials are approved for coming into contact with food stuff.
- Flour container:
The flour container is made of plastic material (ABS). This material is approved for coming into contact with food stuff.

