INSTALLATION · OPERATION · MAINTENANCE · PARTS

BE&SCO MANUFACTURING®

BAKERY EQUIPMENT & SERVICE CO.

Wedge Press

Model 12 or Model 12A

Sales Department

Toll Free (USA & Canada only):
1.800.683.0928
Phone: 1.210.734.5124
Fax: 1.210.737.3925
Email: sales@bescomfg.com

Service Department

Phone: 1.210.547.4121
Email: service@bescomfg.com

Parts Department

Phone: 1.210.547.4135
Email: parts@bescomfg.com

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www.bescomfg.com

200 Lombrano St. San Antonio, Texas 78207 USA

Precautions

Model 12 Wedge Press

NEVER OPERATE MACHINE WITHOUT SAFETY COVER IN PLACE.

BE CAREFUL WHEN OPERATING OR CLEANING MACHINE AS SURFACES MAY BE HOT.

CHECK FINGER GUARD FLAP MAKES CONTACT WITH PROXIMITY SWITCH IF MACHINE FAILS TO START.

DISCONNECT ELECTRICAL POWER BEFORE TO MAINTENANCE AND CLEANING.

ALL MAINTENANCE AND CLEANING MUST BE DONE AS STATED IN THIS MANUAL.

NEVER USE ANY SHARP OBJECTS, CAUSTIC OVEN CLEANER, OR DEGREASER TO CLEAN MACHINE OR PRESS PLATES.

DO NOT CONNECT TO A CIRCUIT OPERATING AT MORE THAN 150 VOLTS TO GROUND.

Policy & Procedure for Returning BE&SCO Parts

Returning BE&SCO Parts:

To return any BE&SCO parts you must follow BE&SCO's procedure for returning. No returns will be accepted outside of this procedure. BE&SCO warrants parts for 1 year or 3000 hours, which ever comes first, for full credit. This does not include wear and tear items as stated in our manual.

This warranty does not cover any defect due to or resulting from handling, abuse, misuse, improper maintenance and cleaning, or harsh chemical action, nor shall it extend to any unit from which the serial number has been removed or altered, or acts of God. Adjustments such as calibrations, leveling, tightening of fasteners or plumbing connections normally associated with original installation are the responsibility of the dealer or installer and not of BAKERY EQUIPMENT & SERVICE CO., INC.

Procedure for Returning BE&SCO Parts:

1. Call BE&SCO Parts Department at 1-800-683-0928 or email parts@bescomfg.com. At this time you may request a repair and return, advance replacement or a credit of the component. The Parts Department will then issue you an RA (Return Authorization) number to return the BE&SCO part. After you are issued an RA number. You have 10 working days to return the old part for full credit or you will be invoiced for the new part.

2. Package the component and a detailed description of what is wrong with the component. Write the RA number on the outside of the package in a visible place and send the return to:

BE&SCO - Parts Department
RA#
200 Lombrano St.
San Antonio, TX 78207

To obtain warranty on return parts the customer or the end user will be responsible for that particular item to be shipped back to BE&SCO. Freight is not covered under warranty, going or coming. BE&SCO recommends that you insure any parts that are being returned to BE&SCO, as BE&SCO Inc. is not responsible for any damage or loss that occurs during shipping. If the part is damaged or lost during shipping, BE&SCO will not be responsible for repair or replacement of the parts.

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Warnings

For Emergency Shutdown push Master Switch.

In case of power failure, shutdown machine.

Storyboards

The laminated poster included in your shipment is called a Storyboard. A Storyboard shows how to operate or care for the machine. It should be posted on a wall close by the machine. Both front and back have the same information but in two different languages – Spanish and English.

Delivery & Damage

We firmly pack all our equipment and strap them on heavy wooden skids before giving them to the shipping company. After we give the merchandise to the shipping company, they are responsible for delivering your purchase; therefore, BE&SCO will not be responsible for the loss or damage of your shipment. ***If you find your purchase damaged, call the shipping company.***

Qualified Service Person

A **Qualified Service Person** is an employee of a firm, a corporation or a company that will:

1. Install, connect, repair, service, and replace parts of the Wedge Press either electrical or mechanical.

2. Follow rules and regulations of the *National Electrical Code, ANSI/NFPA 70 or* Canada's CSA STD. C22.1, or any other local codes.

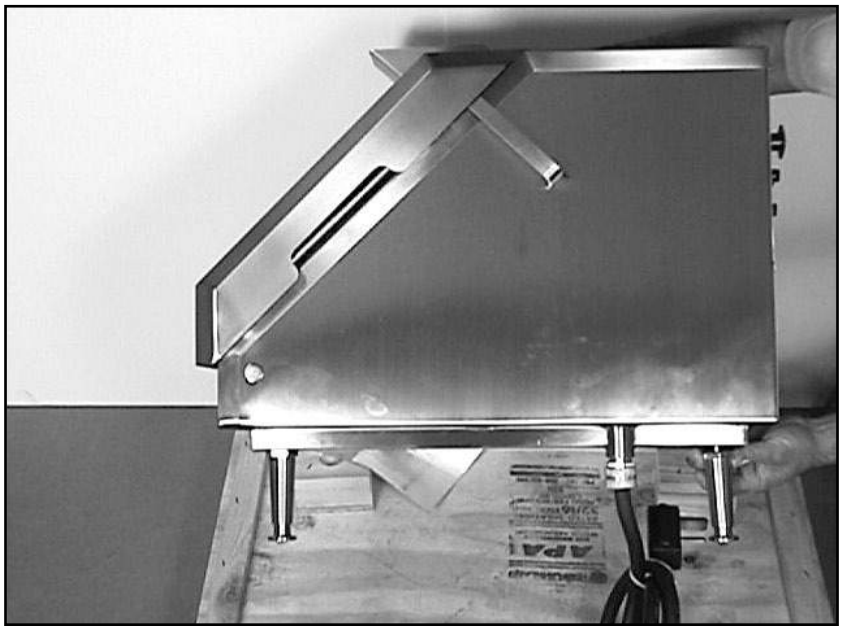
Adjustments

a) Unbolt the machine from the shipping pallet

b) Turn the legs left or right to tighten them.

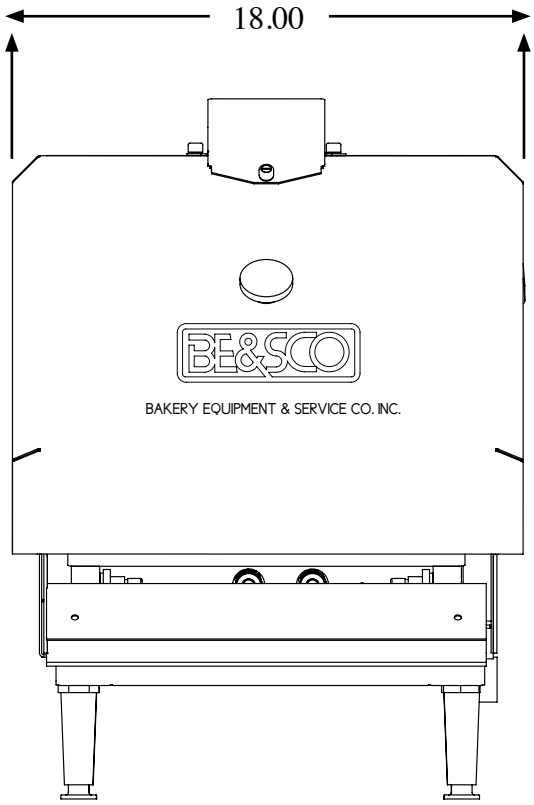
c) Adjust the legs' height. They can go up to 1 3/4" high.

Any further adjustments you think maybe needed must be done by a Qualified Service Person. If you do not have a Qualified Service Person, call BE&SCO at (210) 734-5124 for assistance in locating a Service Representative. Lastly, the warranty does not cover these adjustments.

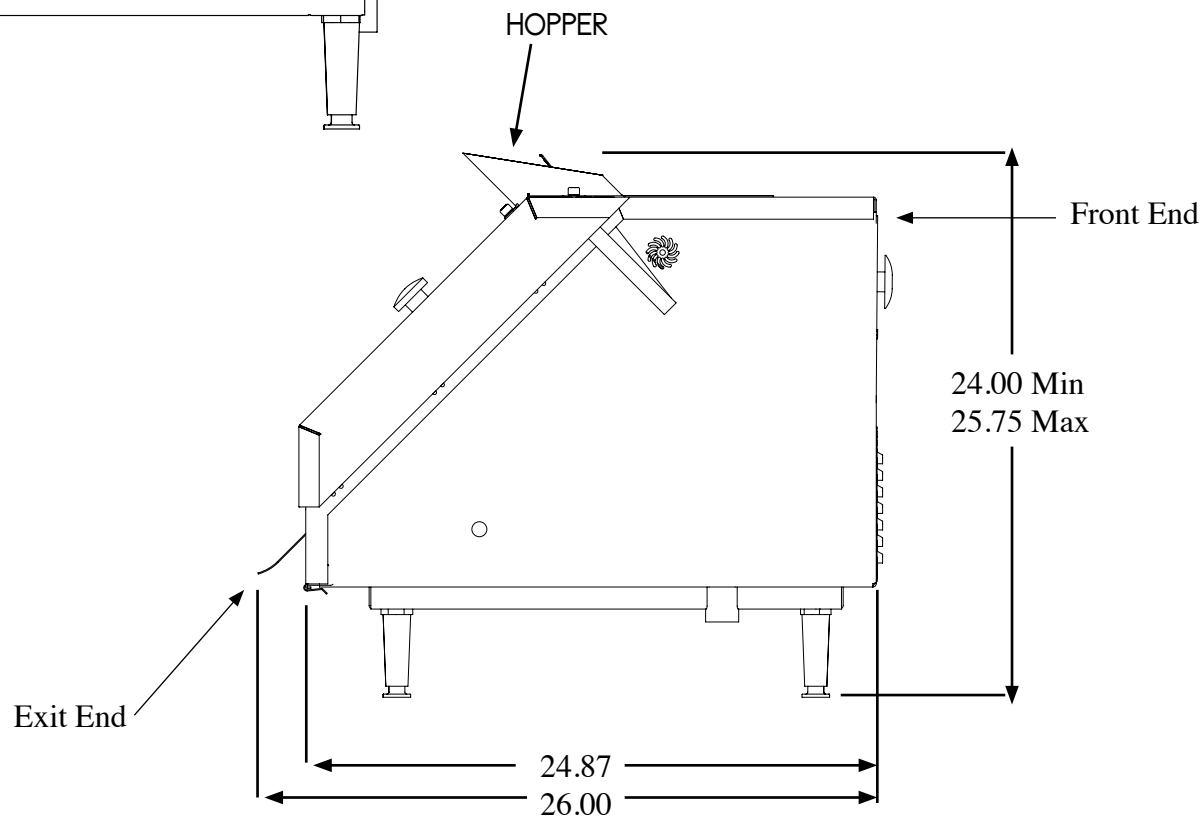


Specifications

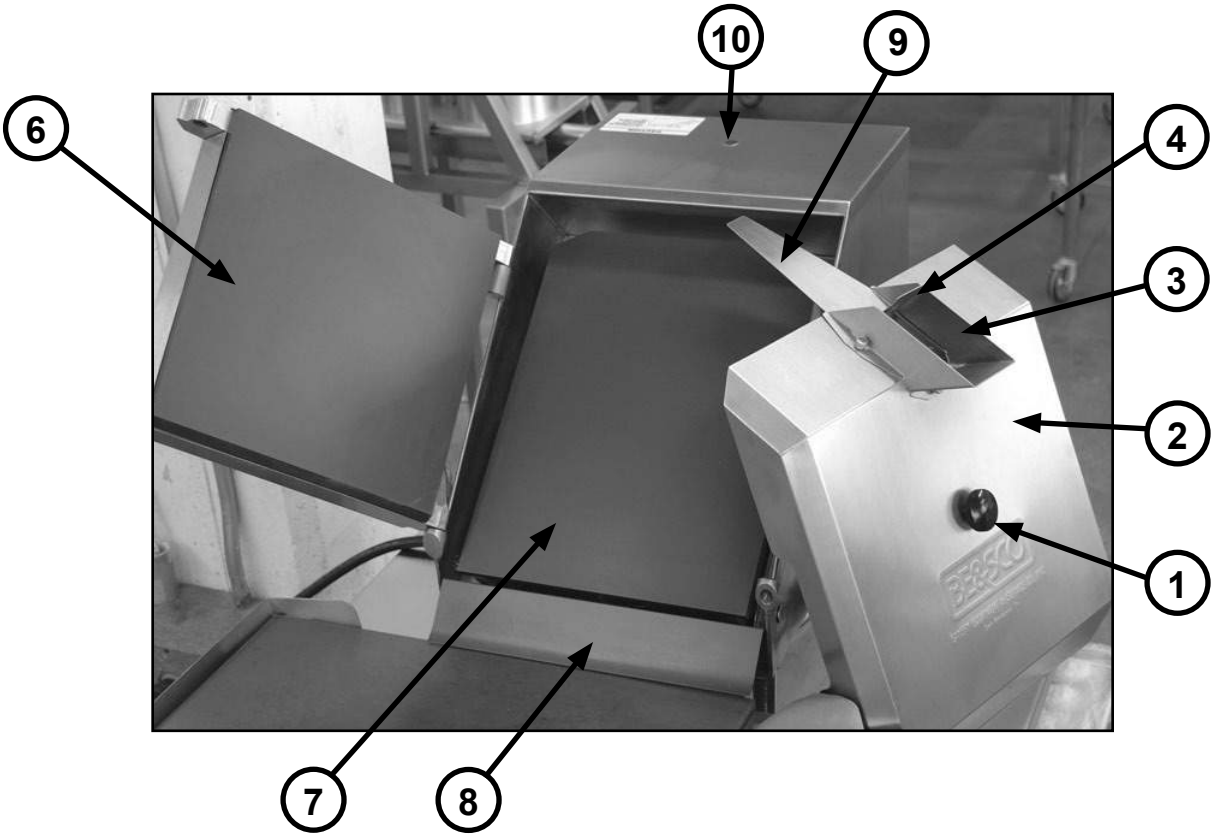
The Wedge Press works on 220/240 volt grounded circuits. The voltage and phase must be compatible with the power supply to safely operate. Any installation not matching the electrical specifications for the machine will void your warranty and may damage the unit. Machine installation must follow rules and regulations of the *National Electrical Code, ANSI/NFPA 70 or* Canada's CSA STD. C22.1, or any other local codes.



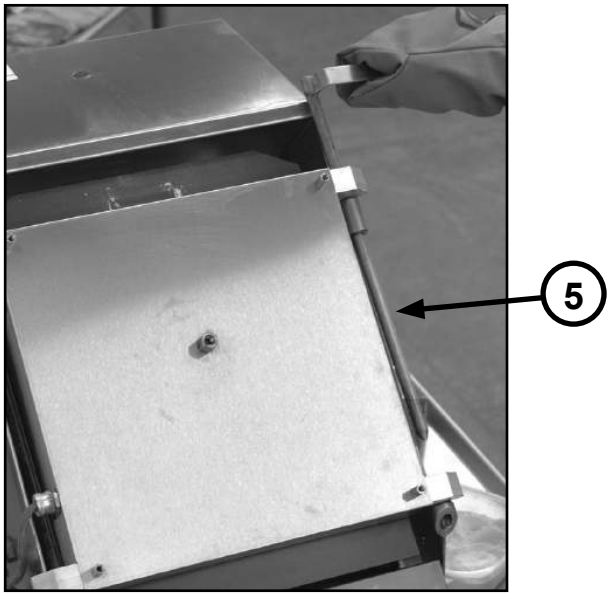
Voltage	220/240 AC
Cycles	60Hz
Phase	Single
Amperage	23.4



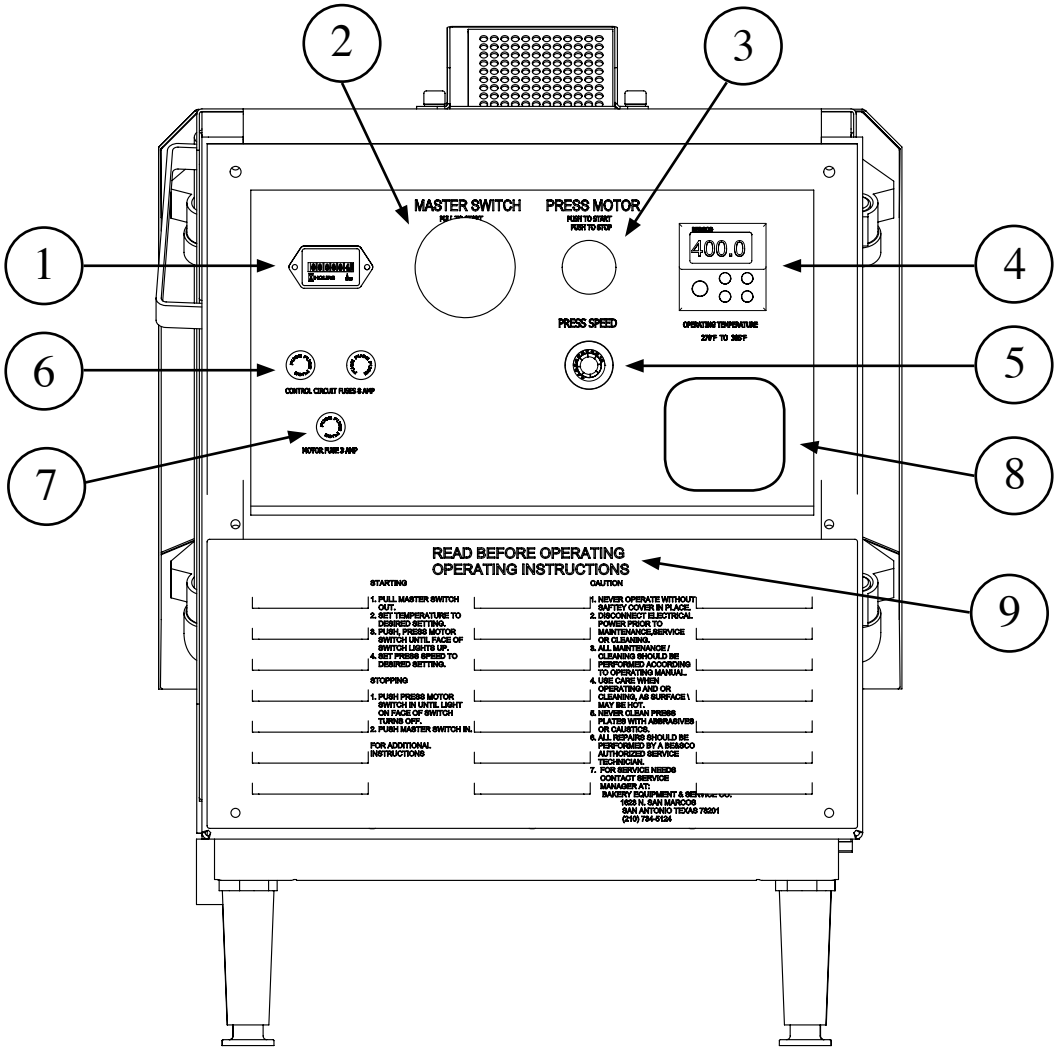
Components



1. Locking Knob
2. Safety Cover
3. Hopper
4. Gate
5. Locking Pin
6. Top Plate
7. Bottom Plate
8. Exit Slide
9. Finger Guard Flap
10. Proximity Switch



Control Panel



1. The **HOUR METER** tracks the operation time in hours.
2. The **MASTER SWITCH** is a red mushroom head button that turns power ON and OFF. It also acts as an emergency shutdown switch.
3. **PRESS MOTOR SWITCH** turns Press Plates ON & OFF.
4. **TEMPERATURE INDICATOR/CONTROLLER** controls the temperature of the Press Plates.
5. **PRESS SPEED** knob changes the speed the Bottom Press Plate rises and falls, and the rate the Hopper Gate opens and closes.
6. **CONTROL CIRCUIT FUSES** protects machine from power supply overload.
7. **PRESS MOTOR FUSE** protects the oven motor from a power overload.
8. **DATA PLATE** is for servicing purposes.
9. **INSTRUCTION & CAUTION PLATE** explains basic care and machine operation.

Adjusting the Temperature

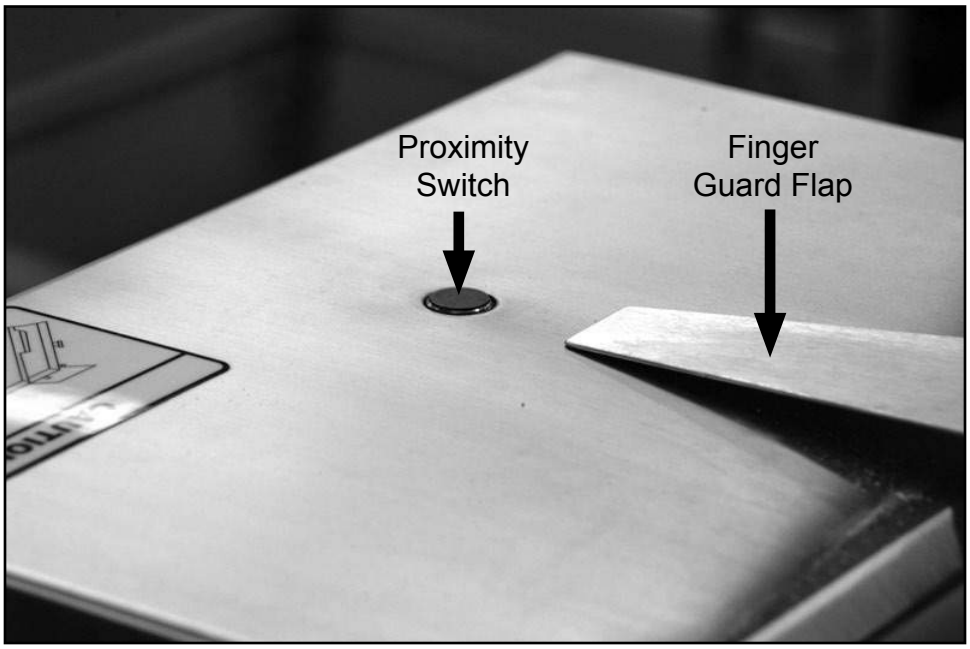
On the Temperature Controller:

Press FUNC key. The letters SP appear in lower display window. **Press Up or Down** to change temperature to the desired setting. **Press FUNC** key twice and wait until the new numbers display. You have set a new temperature. Allow the machine to heat for several minutes before making tortillas. The machine will rise above the new setting, and settle at set temperature.

Pressing the function key repeatedly will display different of pre-settings. The factory preset and locked the other settings. You can only change the SP mode. If you encounter any problems, call your Qualified Service Person.

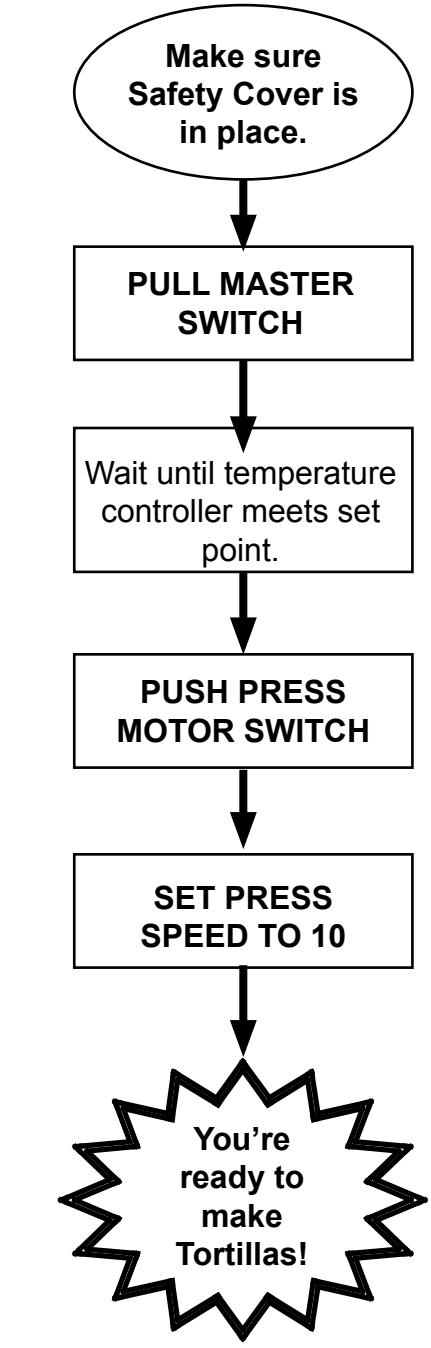
Safety Cover

If the machine could be operated without the Safety Cover, those who use it could be injured by the moving parts or burned by the heat from the machine. Therefore, for safety purposes, if the Safety Cover is not secure, the Finger Guard Flap will not make contact with the Proximity Switch and the whole machine will not start at all. If you have problems with the Start-up, check the Safety Cover, the Finger Guard Flap and Proximity Switch.

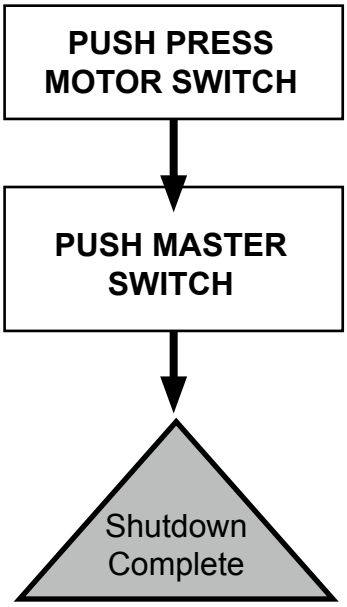


For “Emergency shutdown” PUSH the MASTER SWITCH.

Startup



Shutdown



Operation Troubleshooting

Problem 1: Temperature Indicator won't light up, press motor won't come on.

Cause	Solution
No power to machine.	Check branch line circuit breaker.
Control fuses blown.	Check F2 and F3 fuses.
Machine not plugged in.	Plug into outlet.
Safety Cover not in place.	Check Safety Cover & Dough Ball Hopper are in place.
Interlock switch not plugged in.	Check if Interlock plug under bottom plate.

Problem 2: Temperature Indicator lights up, press plates heat up, press motor won't run.

Cause	Solution
Speed set at zero.	Check speed setting.
Press motor not plugged in.	Check plug under bottom plate.
Motor fuse blown.	Check F4 fuse.

Operation Troubleshooting

Problem 3: Temperature indicator lights up and setting is correct, but temperature incorrect.

Cause	Solution
Temperature controller in wrong mode.	Check mode.
Temperature thermocouple not plugged in.	Plug in temperature thermocouple.

Problem 4: Top Press Plate won't heat.

Cause	Solution
Top Press Plate Relay not working.	Call Qualified Service Person

Problem 5: Bottom Press Plate won't heat.

Cause	Solution
Bottom Press Plate power harness not plugged in.	Check bottom press plate harness.
Bottom Press Plate Relay not working.	Call Qualified Service Person.

Removing a stuck tortilla during production

Introduction:

Sometimes when the dough ball passes through the Press Plates, the dough ball sticks itself to the plate instead of coming out of the Exit Slide. This section will show you how to remove a stuck tortilla during production.

Cleaning Materials:

A.Cleaning Stick
B.Oven Mitt

Item	Description	QTY	Part Number
A	Cleaning Stick	1	949912005
B	Oven Mitt	1	949952010

If you do not have these cleaning materials you can order them through the BE&SCO's Parts Department @ 210-734-5124.

Precautions:

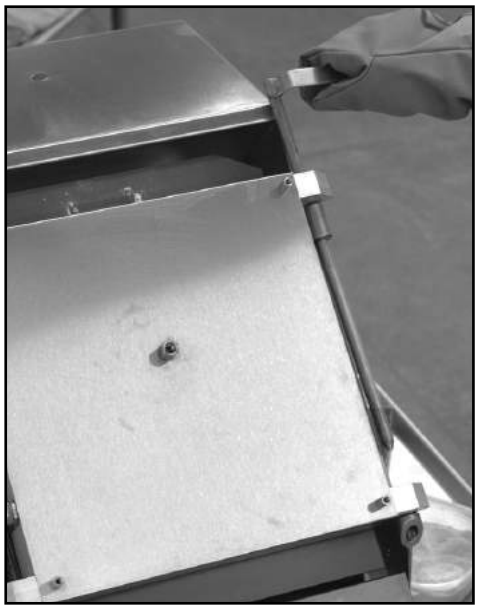
- Do not wash Press Plates in water.
- Wear oven mitts for protection.
- Do not clean press plates with any brand name cleaners, degreasers, and/or sharp objects, such as:

Removing a stuck tortilla during production

KEEP OVEN MITT ON AT ALL TIMES, EXTREMELY HOT.

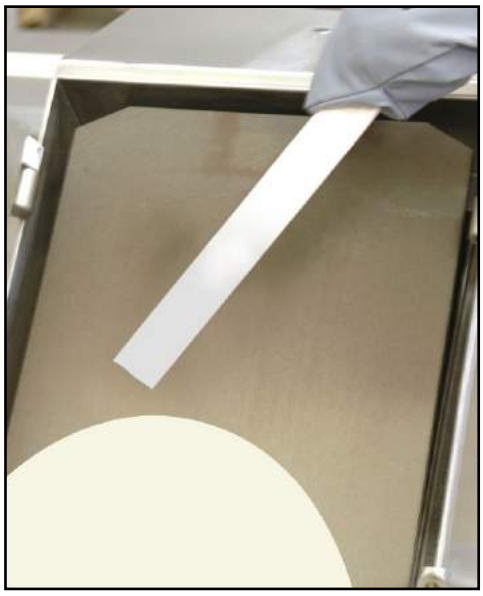
1. Turn OFF Press Motor, unscrew the Locking Knob, and remove the safety cover. Wipe down Finger Guard and Gate with a dry cloth.

2. Pull upward and remove Locking Pin and put it under the machine. (Caution: Locking pin is extremely hot)



3. Open Top Plate.

4. With the cleaning stick remove the stuck tortilla.



Cleaning the Wedge Press

Introduction:

Cleaning keeps the inside and outside of the Wedge Press free from dust, flour, or any other build-up. If the machine remains unclean for along period of time, the oil and build-up clog the moving parts and could slow or halt production and damage the unit. This section will show you how to clean the Wedge Press.

Order these materials as needed through the BE&SCO's Parts Department @ **210-734-5124.**

Description	QTY	Part Number
BE&SCO Manuals	1	Machine Manual
BE&SCO Storyboards	1	Machine Storyboard
Cleaning Stick 20"	1	949912005
Cleaning Stick 26"	1	949912006
Scotch Brite Cleaning Pad #48	4	949952002
Scotch Brite Cleaning Pad #72	6	949952001
Scotch Brite #82 Brown Scrub Pad	2	949911003
BE&SCO Oven Mitt	1	949952010
Grade Slick'em Gallon	1	911522101
Grade Slick'em Qt.	1	911522100
Stainless Steel Cleaner & Polish	1	911512016
Grease, Ultra Hi Temp	1	911211003
Vacuum Cleaner with Hose Attachment	n/a	n/a
Soft Dry & Damp Cloth	n/a	n/a

Cleaning the Wedge Press

Precautions:

- Unplug electrical power before cleaning the machine.
- Allow press to cool down for 30 minutes before cleaning.
- Wear oven mitts for protection.
- Never use any sharp objects, caustic oven cleaner, and/or degreaser on Press Plates.
- Do not clean press plates with any brand name cleaners, degreasers, and/or sharp objects, such as:

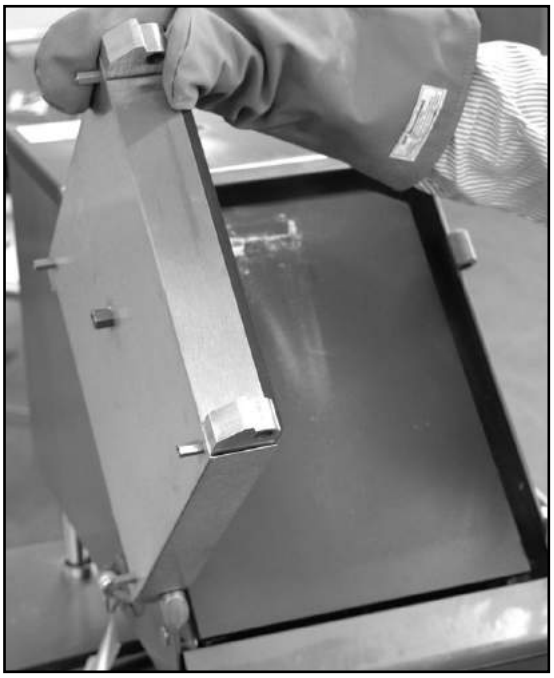
Cleaning the Wedge Press

1. Clean Exit Slide with the damp cloth and pull to remove.

2. Unscrew locking knob and remove safety cover. Wipe down finger guard and gate with a dry cloth.

3. Pull upward and remove Locking Pin and put it under the press.

4. Open Press Plates.
Allow unit to cool for 30 minutes.



5. Using the green pad, scrub the plates in a circular motion. For heavy build-up use the approved Brown Pad.Never use any cleaning solutions, abrasive materials or sharp metal objects to clean the machine.

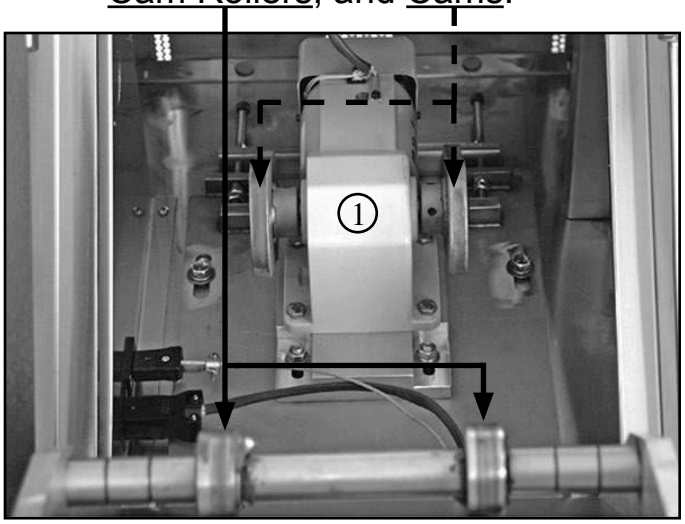
6. Spray Slickem on a soft cloth and apply to plates.

7. Secure safety cover back on the machine with locking pin.

8. Clean the exterior with Stainless Steal Cleaner.

8. Open bottom plate. Place your hand at the top of the plate and pull away from the machine.

9. Observe the Gearmotor ①, Cam Rollers, and Cams.



10. Vacuum inside the machine. Wipe down exterior with Stainless Steel Cleaner and a soft cloth.

Introduction:

Greasing and replacing parts in your Wedge Press are easy to do. Grease keeps the parts in the Wedge Press moving smoothly and reduces the causes of premature wear. When parts wear down, they need to be replaced in order for the machine to operate in top condition or at all. Ignoring maintenance like greasing or part replacement will eventually ruin your machine and void your warranty. This section will tell you how to care for your Wedge Press.

Maintenance Materials:

1. Grease Gun
2. Hi Temp Grease

Item	Description	QTY	Part Number
1	Grease Gun	1	911213016
2	Hi Temp Grease	1	911211003

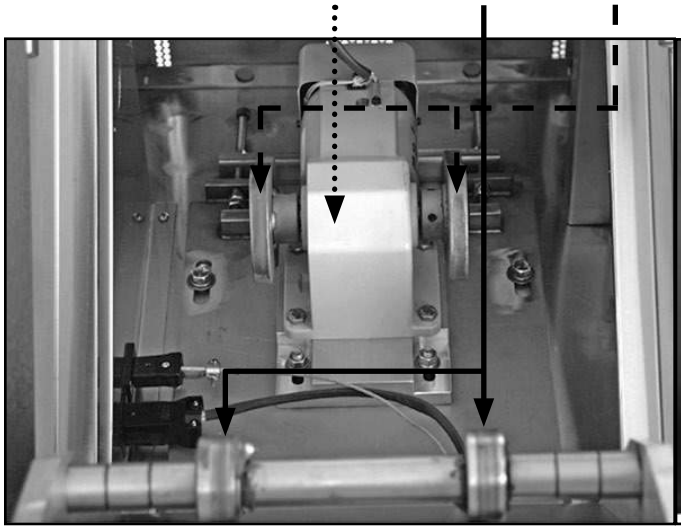
Precautions:

- Unplug electrical power before any repair.
- Allow press to cool down for 30 minutes before repairing.

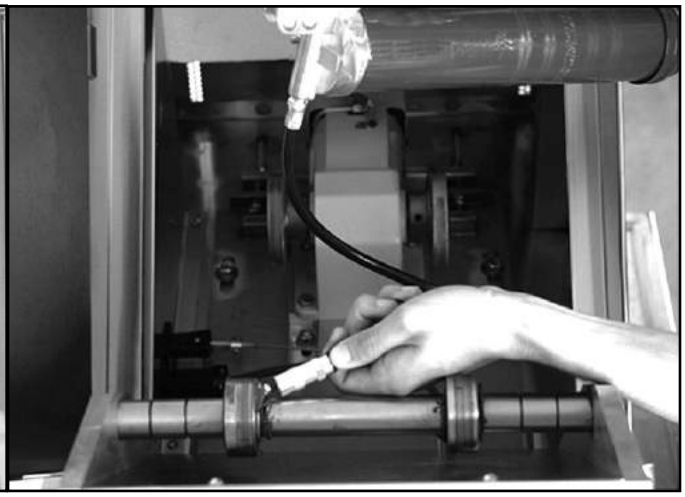
Part Replacement:

- Replace the Cam Rollers every 1500 hours of machine operation if grooves appear on wheel surface.
- Replace Bottom Plate Bronze Bushings every 1500 hours of machine operation time.

1. Grease the Cam and Cam Rollers wheel surface weekly. Open bottom plate. Inside are the Gearmotor, Cam Rollers, and Cams.



2. Through the Cam Rollers Grease Point, Grease the Cam Rollers twice a week.



Dough Making

Introduction:

Without good dough you can't make good tortillas. This section will give you some information about dough making.

The best way to make dough easily is to use a premix. Each brand tells you exactly how to make their dough, so by following their instructions you won't have to guess about ingredient amounts.

Properly mixed dough looks smooth and won't stick to the sides of the mixing bowl. Overmixed dough will feel warm and sticky and undermixed dough looks grainy and lumpy. When you find a brand and directions that makes good dough, do it that way everytime. Know, however, the environment can seriously effect the dough.

Dough is sensitive to temperature. Anymore than a **10 deg. F (-12 deg.C) change in room temperature** will change how the dough turns out. In cold temperatures, add less water to the dough. In warmer temperatures, we suggest adding more water to the dough than usual. Know, however, the amount of water to add to the dough or withhold from the dough is not an exact science, so if your work area is subject to major temperature changes, experiment with your water amounts in dough making.

Dividing & Rounding:

When using the Divider/Rounder points in mind:

1. First, **do not let a "crust" form on the dough mix.** Otherwise, dough will not divide or round well.
2. Second, **10% difference from desired dough ball weight will change tortilla size.**
3. Lastly, **rough dough ball surface will bring about a tortilla with a lumpy look.**

In these instances, the dough batch might be unusable. If anything, these signs will most likely produce tortillas that look unappetizing.

Proofing Dough Balls:

Without proofing, the dough will not be fit to use. Proofing allows the dough balls to rise and set. Dough balls should be proofed for 30 minutes or more at 80 to 90 deg.F (26 to 32 deg. C) in a 80% relative humidity environment. Rightly proofed dough balls should not stick to the finger when pinched and will not spring back when poked. If you have trouble proofing, consider using a Proofing Box. A Proofing Box is a climate controlled space for dough balls to proof. Or, create your own proofing space. Tightly cover the dough balls in plastic bag or sheet to keep in moisture and place them where they will not be bothered. If you want to refrigerate or freeze the dough balls, do it after proofing.

Thawing Dough Balls:

Set the dough balls out to thaw at a time that will smoothly coordinate with your daily tortilla making. To thaw:

- Line a 17" by 26" pan with parchment.
- Place frozen dough balls 7 rows by 11 columns making sure dough balls do not touch one another.
- Use a bun bag to cover the pan.
- Be sure no air gets into the covering or the dough will dry out.
- Let thaw for 2 - 3 hours.
- Remove any moisture by lightly dusting the dough balls with flour.

Dough Making Troubleshooting

Problem 1: Dough ball is sticky to the touch.

Cause	Solution
Dough is too soft.	Dust dough balls with flour used in dough making.
Dough batch was mixed too long.	Make new batch and correct dough mixing.
Dough batch was mixed at too high a speed.	Make new batch and shorten proofing time.
Interlock switch not plugged in.	Reduce amount of water used.
	Flip them over onto another pan. Then, lightly dust them with flour to help dry them.

Problem 2: Dough balls stick to pan.

Cause	Solution
Dough proofs too long.	Shorten proofing time.
	Dust the pan with some flour used in mixing the dough.

Dough Making Troubleshooting

Problem 3: Dough proofs too soon.

Cause	Solution
Dough mix too soft.	Dust dough balls with flour used in dough making.
Dough batch was mixed too long.	Make new batch and correct dough mixing.
Dough batch was mixed at high speed.	Make new batch and use less water.
Dough proofing is not being controlled.	Correct proofing environment, or use proofing box.

Problem 4: Dough takes too long to proof.

Cause	Solution
Dough mix too stiff.	Add some water to soften dough.
Dough batch has been over mixed.	Shorten dough-mixing time. Make new batch.
Dough proofing is not being controlled.	Make new batch and use less water.
Dough proofing is not being controlled.	Correct proofing environment.

Problem 5: Dough is too soft near end of run.

Cause	Solution
Dough batch size is too large and overproofs before it can be used.	Make a new batch with smaller batch size.

Changing Tortilla Sizes

Introduction:

Unless the Press Plates were set otherwise, the standard Wedge Press makes only 7” tortillas. When changing the tortilla size the dough ball size must change as well. To produce around a 7” tortilla, use a 1 1/2 oz. dough ball. To make about a 12” tortilla, use a 4 1/2 oz. dough ball. You may want to experiment with different dough ball weights to make different tortilla sizes. This section will tell you how to adjust the Press Plates in order to change the tortilla sizes from 7” up to 12”.

ANY FURTHER ADJUSTMENTS OTHER THAN WHAT IS EXPLAINED BELOW MUST BE DONE BY A QUALIFIED SERVICE PERSON.

These models can change the size of tortilla from 7” to 12” without a mechanical adjustment. By changing temperature, dough ball size, and speed setting you can make tortillas many different sizes.

For 7” Tortillas

Dough ball size: 1 1/2 oz.

Press Speed: 10

Temperature: 385 deg. F.

For 12” Tortillas

Dough ball size: 4 1/2 oz.

Press Speed: 8

Temperature: 400 deg. F.

Tortilla Making

Introduction:

If you have read the other sections, Tortilla Making ought to be a easy. This section offers some suggestions about tortilla making, and then goes onto explain exactly how to make tortillas.

Overproofing is a common problem in tortilla making. **If you find running dough hard to do, check to see if the dough has overproofed.** Run your dough balls when they have been proofed, or refrigerate or freeze them, or they will overproof.

Ideal tortilla making happens when the dough mixing and proofing come together in such a way that the proofed batch goes through the machine with a very little waiting time, you make tortillas for long periods of time without ever stopping the machine, and you make extra tortillas. This way everything goes smoothly and you will have two-to-three days worth of tortillas to help out against unplanned "downtime".

To make around a 7" tortilla, use a 1 1/2 oz. dough ball. To make about a 12" tortilla, use a 4 1/2 oz. dough ball. You may want to experiment with different dough ball weights to produce various sized tortillas.

Procedure:

1. Dust dough ball with flour.
2. When Gate is open, drop in one dough ball.
3. Dough ball is shaped between Press Plates.
4. Tortilla slides out of Exit Slide.
5. Repeat (1) - (4).

Tortilla Making Troubleshooting

Problem 1: Tortilla has broken edges, grainy appearance and some holes.

Cause	Solution
Dough not proofed long enough.	Allow longer proof time.
Poor proofing environment.	Better proofing environment or use proofing box.
Not enough water in mix.	Add more water to mix.

Problem 2: Tortilla size changes from same dough batch.

Cause	Solution
Dough balls are not the same weight or shape.	Dough divider needs adjusting.
	Dough divided unevenly by operator.

Problem 3: Tortilla size changes, dough ball from different batch.

Cause	Solution
Dough not controlled from batch to batch.	Check if dough-mixing was done correctly.
	Fix proofing environment, or use proofing box.
	Measure ingredients more carefully.

Problem 4: Tortilla not round in shape.

Cause	Solution
Dough balls are not round.	Adjust rounding machine.
	Correctly operate rounding machine.
Dough is too sticky.	Check and correct dough-mixing.
	Line pan with parchment paper.
Press Plates need adjusting.	Contact a Qualified Service Person.

Problem 5: Tortilla size too large.

Cause	Solution
Dough has been overproofed.	Reduce proofing time.
Wrong dough ball weight.	Check and correct dough-mixing.
Speed too slow for temperature setting.	Increase press speed or decrease temperature setting.
Press plates too close together.	Check Press Plate adjustment.

Problem 6: Tortilla crumbles under Press Plates.

Cause	Solution
Dough is too soft.	Check dough-mix and cut back on the amount of water used.
Press plates are too hot.	Lower Press Plate temperature.
Press plates too close together.	Check Press Plates adjustment.

Problem 7: Tortilla folds coming off Press Plate.

Cause	Solution
Dough is too soft.	Check dough-mix and use less water.
Press plate temperature is too low.	Raise Press Plate temperature by 10 deg. F (-12 deg. C) until problem is corrected.
Build-up on bottom Press Plate.	Clean Press Plates.

Problem 8: Tortilla sticks to Top Press Plate.

Cause	Solution
Flour build-up.	Clean.

Problem 9: Major sticking problem when machine is first used after being stopped a while.

Cause	Solution
Start-up done wrong.	Read Start-up section in manual.
Cleaning was not done correctly, or at all.	Read Cleaning section of manual.

Problem 10: Part of tortilla is pressed.

Cause	Solution
Press plate temperature is too hot.	Decrease Press Plate temperature by 5 deg. F (-16 deg. C) until problem is corrected.

Problem 11: Heavy dark build-up on Press Plates.

Cause	Solution
Press Plates out of adjustment.	Check Press Plate adjustment.
Press Plates not cleaned often enough.	Clean Press Plates more often.
Press Plates not clean.	Clean Press Plates.

Flour Tortilla Recipe using the Vertical Cutter Mixer

Ingredients:

- **25 lbs. All Purpose Flour**
- **1 (2 lb.) bag of Minom premix**
- **3 lbs. of shortening**
- **6 quarts of water**
- **Sheet pan 7x11 with pan-liner**
- **Plastic Bun Pan bag**

Instructions:

1. Place the following ingredients into a Vertical Cutter Mixer: All Purpose Flour, Minom premix, and shortening.
2. Mix for two - one minute cycles while turning the baffle. — **2** MINUTES
3. Remove baffle.
4. Add the water.
5. Mix for 30 seconds.
6. Rotate/turn/flip dough & scrape sides of bowl. — **1** MINUTE
7. Mix for 30 seconds.
8. Rotate/turn/flip dough & scrape sides of bowl.
9. Mix for *30 seconds.
10. Rotate/turn/flip dough & scrape sides of bowl. — **1** MINUTE
11. Mix for *30 seconds.
12. Remove dough from Mixer bowl.

*For a better mixing results rotate the dough for 4 x 15 sec. intervals instead of 2 x 30 sec. intervals for the last minute.

4 MINUTES mixing time total

- Weigh out 3 1/2 lbs of dough. Place enough dough on a sheet pan and cover with plastic bun pan bag. Then, let proof for 5 minutes.
- Select dough batch and place on Divider/Rounder tray. Evenly spread dough on tray and put it into Divider/Rounder. When finished, remove tray and place dough balls on sheet pan.
- Cover them with plastic bun pan bag. Place pans on rack. Allow dough balls 30 or more minutes for proofing.
- When ready, dust dough balls with flour and you're ready to make tortillas.

Flour Tortilla Recipe using a Hobart Mixer

Mixing Instructions using a Hobart Mixer
(Masa para tortillas de harina hechas en la maquina Hobart)

STEP #1

Place in mixer:
(Necesita que poner en la maquina Hobart)

25 lbs. of flour-All Purpose Flour
(25 lbs. de harina-all purpose flour)

1 (2 lbs.) bag of Minom Tortilla Base
(Una bolsa de 2 libras de base para tortilla (Minom)

3 lbs. Quality All-Vegetable Shortening
(3 libras de manteca de vegetal)

Mix on speed one for 15 minutes
(Mezcle bien en velocida una por 15 minutos)

To reduce mixing time use flat beater
(Para reducer tiempo de mezcla use un batidor plano)

Cut shortening into the flour where there are no visible lumps
(Agregue la manteca y mezcle hasta que se incorpore bien la mezcla)

STEP #2

Add six quarts of water
(Agregue seis cuartos de agua)

Use dough hook only
(Use solo el gancho)

Mix on speed one for one minute
(Mezcle bien en velocida una por un minuto)

Scrape sides of bowl
(Raspe los lados adentro de la holla)

Mix on speed two for 15 minutes
(Mezcle bien en velocida dos por 15 minutos)

ONCE DOUGH HAS BEEN DEVELOPED DIVIDE IT INTO 1 ½ OZ.
OR TO YOUR DESIRED DOUGH BALLS, COVER AND LET REST FOR 30 MINUTES.
(Desques de que esta la masa, forme bolas de 42.5 gr.
O del tamano deseado, cubra y deje reposar por media hora.)

Closing Statement

In this manual we have covered a lot of information. You should now know how to care, operate and repair the machine, prepare dough, and make tortillas. Use the troubleshooting sections if you encounter any problems If anyone else operates this machine, we suggest they read through whole manual as well.

The following pages show schematics and list replacement parts to help you service your machine. When you order parts, **please know the machine model, the machine serial number, operation hours, and the BESCO part number.** If no part number is provided, know the part numbers of items from the area you need to order the part.

Thank you and happy tortilla making!

BE&SCO MANUFACTURING®

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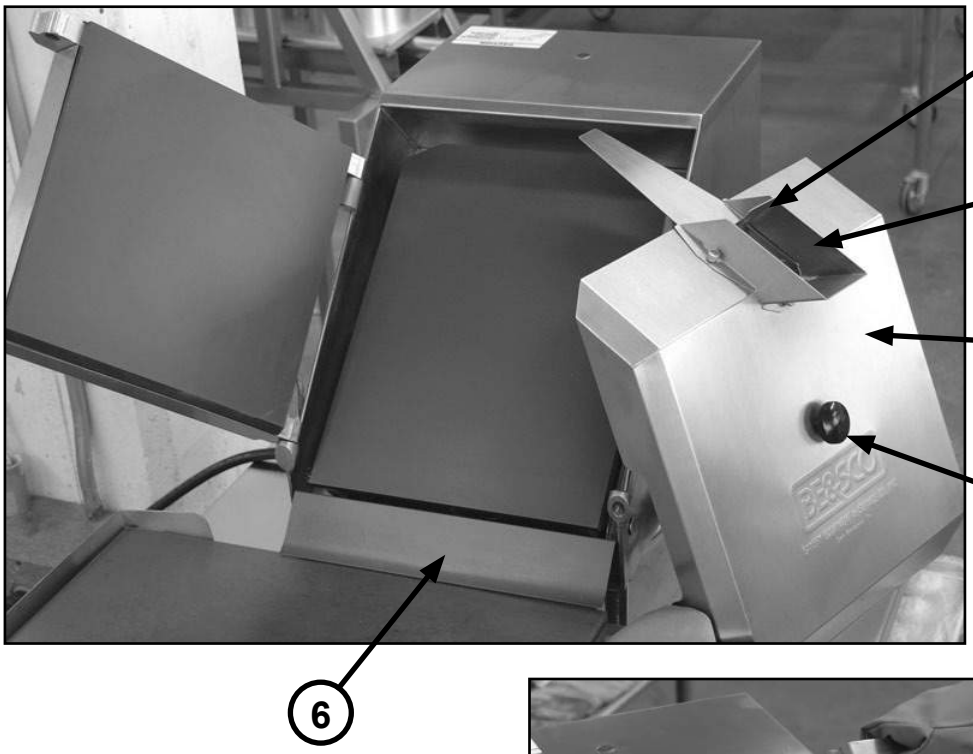
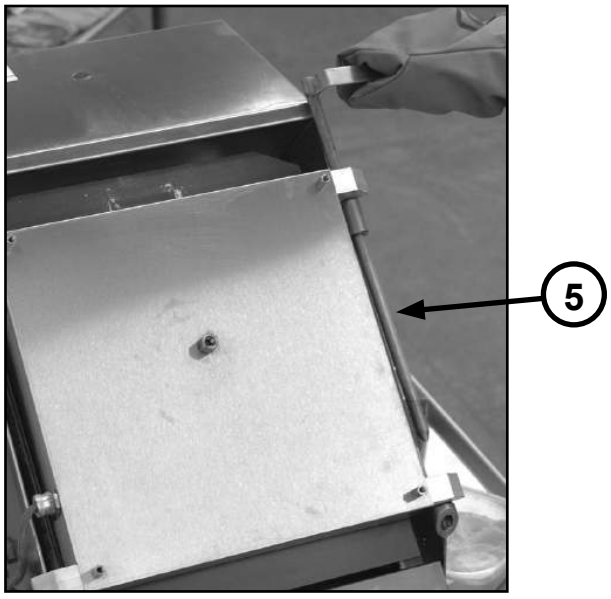
Service Department Email: service@bescomfg.com
Parts Department Email: parts@bescomfg.com
Website: www.bescomfg.com

Disconnect power before maintenance.

Install BE&SCO parts only.

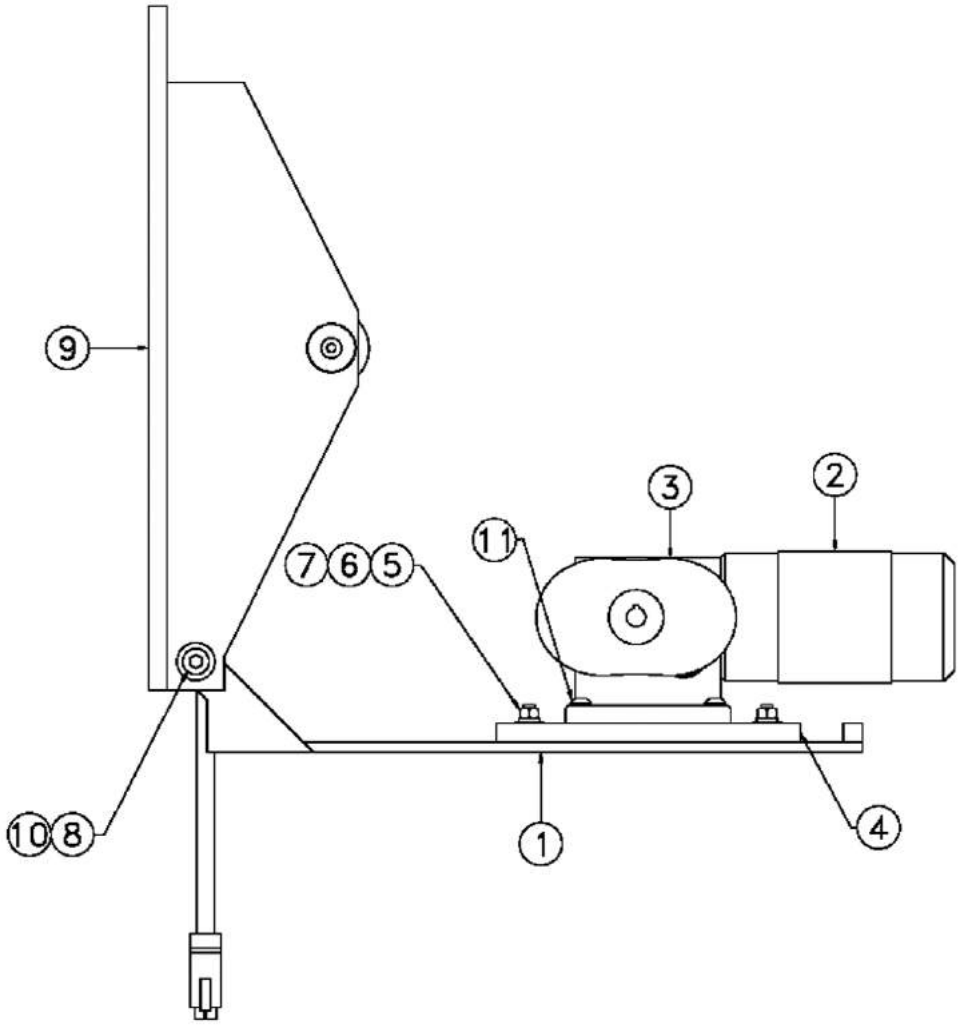
When ordering parts know: machine model, machine serial number, operation hours, and BE&SCO part number (if no part number, know the parts and number nearby the desired part).





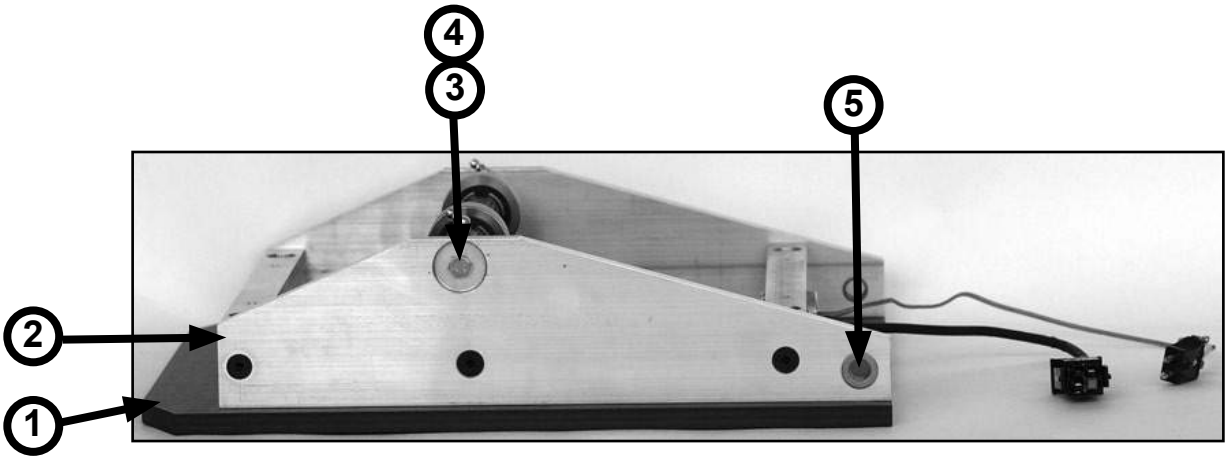
Item	Description	QTY	Part Number
1	Locking Knob	1	B-12-015
2	Safety Cover	1	D-12-025
3	Finger Guard Assy	1	C-12-034
4	Gate Assy	1	C-12-036
5	Hinge Pin Assy	1	C-12-019
6	Coated Exit Chute	1	C-12-033

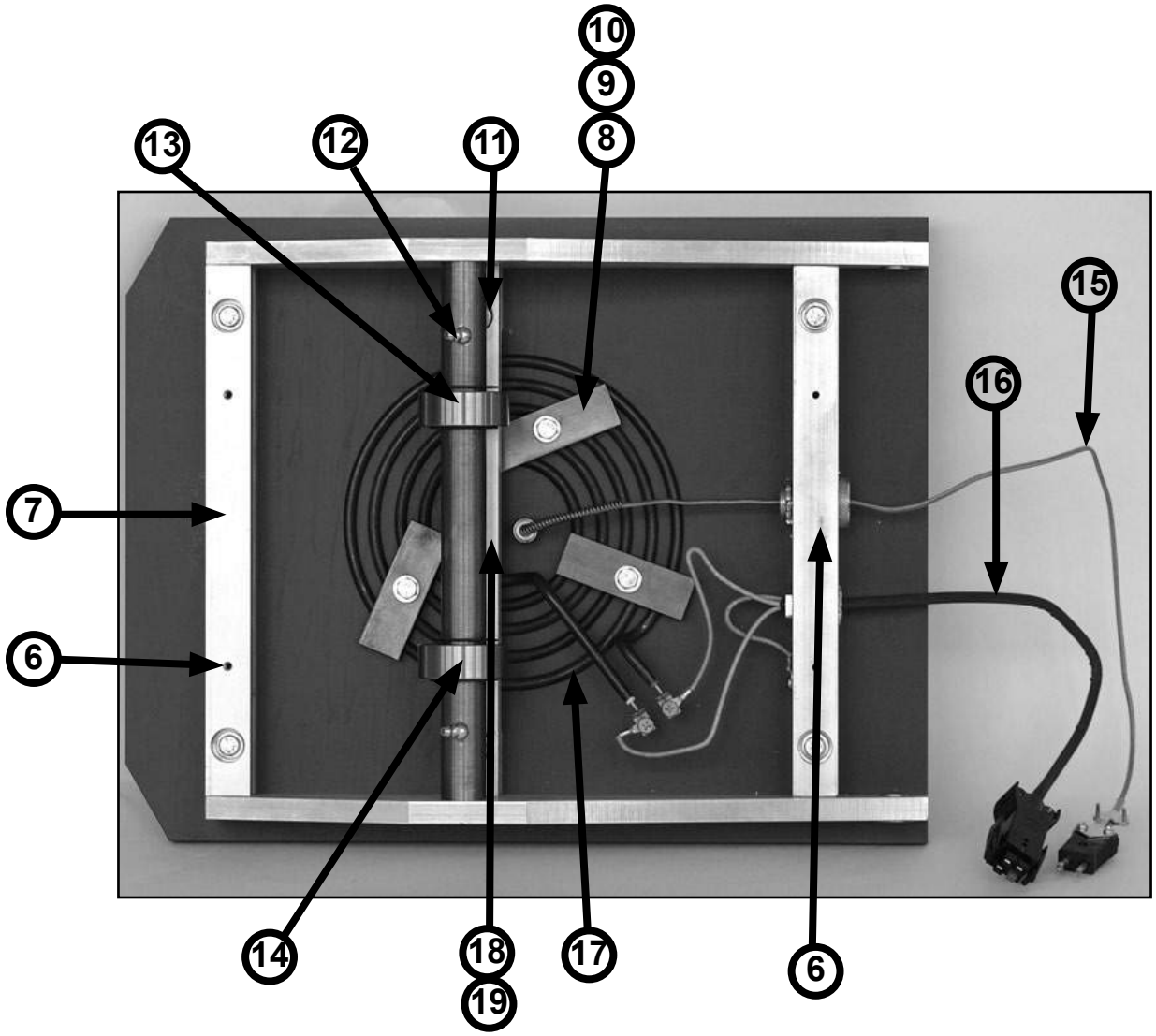
Bottom Plate Drive Assembly



Item	Description	QTY	Part Number
1	Base Plate Assembly	1	D-12-016
2	Brother Motor, 220V	1	C-12-058
3	Brother Cam Assembly	2	C-12-061
4	Brother Motor Mount Plate	1	C-12-062
5	Nut, 5/16-18 SST HEX	4	731622016
6	Washer, 5/16 SST Flat	4	741300007
7	Washer, 5/16 SST Lock	4	741200008
8	Bolt, 1/2 x 3/4 Shoulder	2	711322014
9	Bottom Plate Assembly	1	D-12-021
10	Bushing, 1/2 x 5/8 x 5/8 Bronze	2	531113015
11	Screw, 5/16-18 x 3/4 Button Head	4	721922010

Bottom Plate Assembly

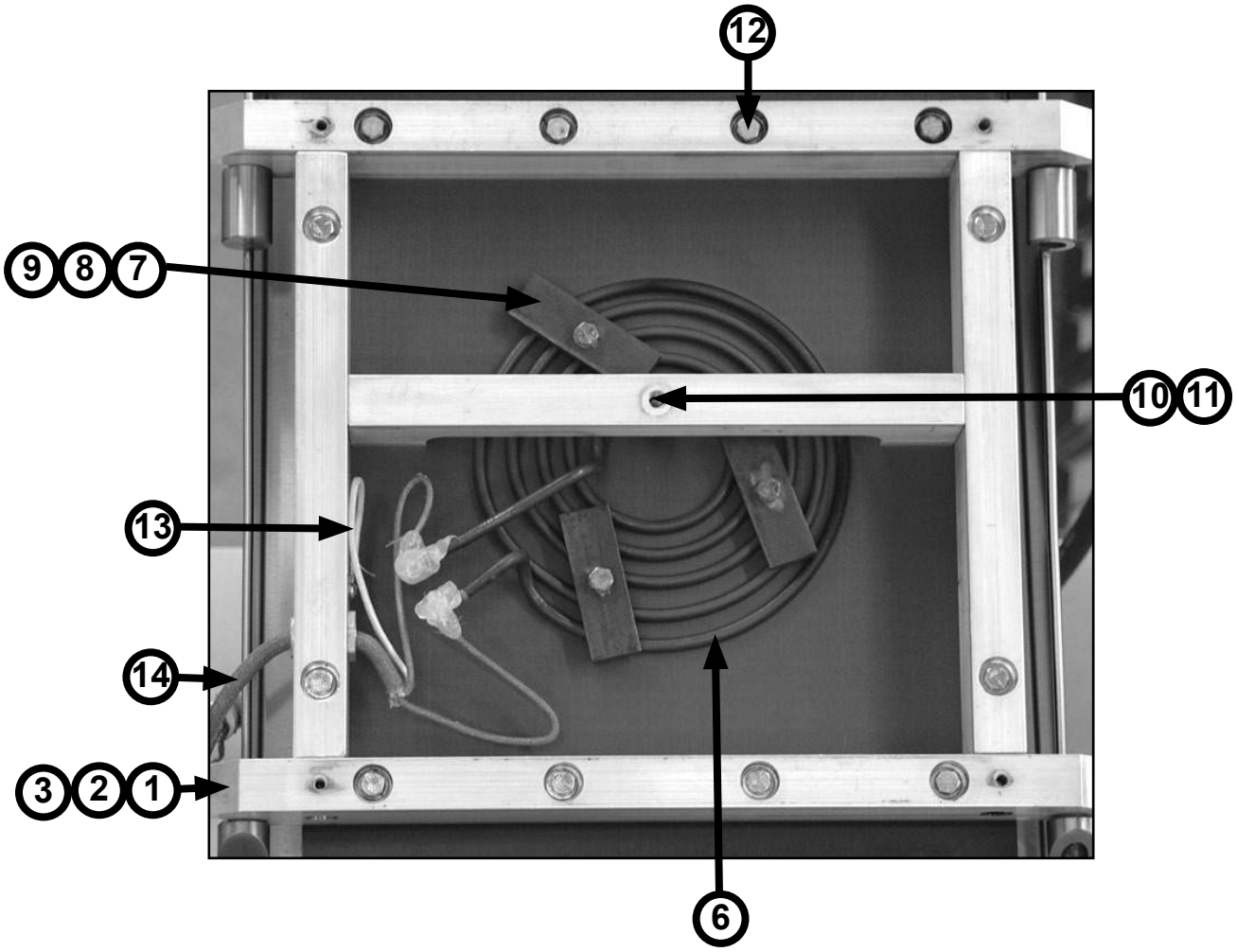




Bottom Plate Assembly

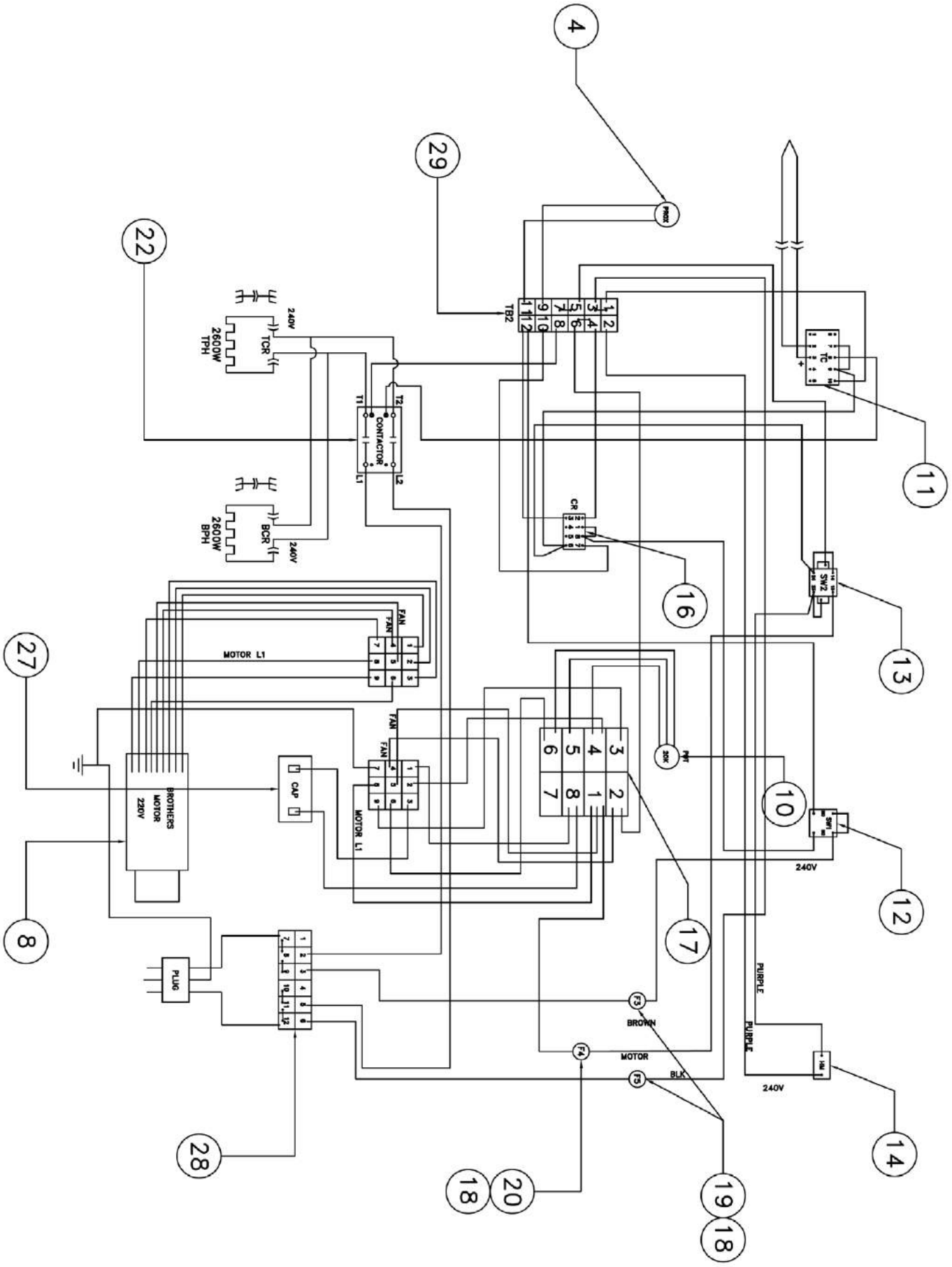
Item	Description	QTY	Part Number
1	Bottom Press Plate	1	C-12-013
2	Bottom Plate Frame	1	D-12-030
3	Bolt, 5/16-18 x 3/4 SST Hex Head	2	711122008
4	Washer, 5/16 x 1/4 Fender	2	741000010
5	Bushing, 5/8 x 1/2 Bronze	2	531113015
6	Screw, 10-32 x 1/4 Rd Head SST	1	721323047
7	Bottom Plate Cover	1	C-12-017
8	Clamp, Heater	3	A-09-027
9	Bolt, 1/4-20 x 3/4 Hex Head PLT	3	711522084
10	Washer, 1/4 Flat	3	741600139
11	Bolt, 1/4 - 20 x 2 Hex Head	6	711522088
12	Cam Roller Shaft	1	C-12-012
13	Ring, 1” Retaining	4	751000006
14	Cam Roller Assembly	2	B-12-008
15	Thermocouple Harness	1	C-12-006
16	Bottom Heater Plug Harness	1	C-12-007
17	Element, 8” Heater	1	413100003
18	Bolt, 3/8 - 16 x 1 1/4 Hex Head	1	711522196
19	Nut, 3/8 - 16 Hex Jam	1	731222107

Top Plate Assembly



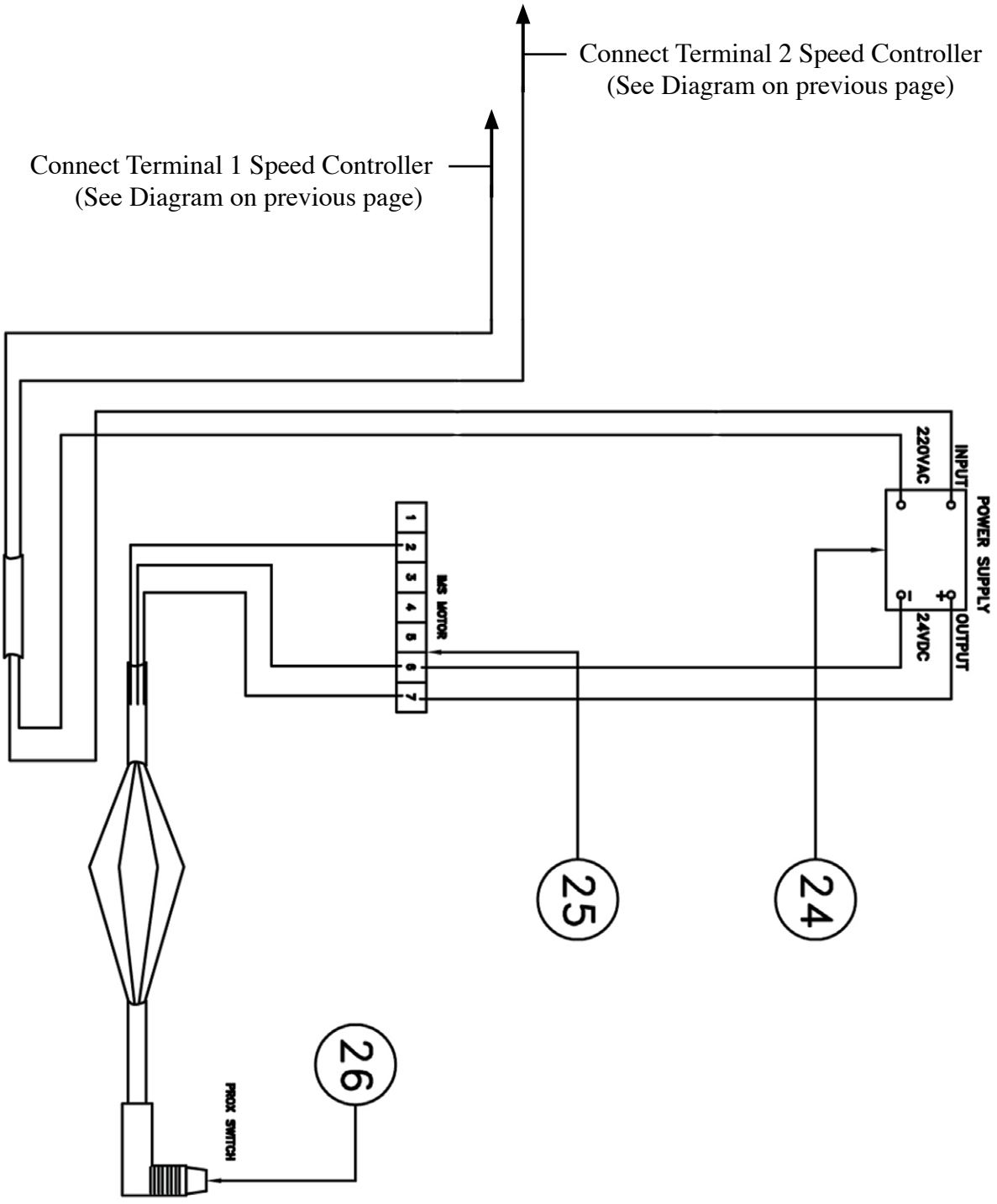
Item	Description	QTY	Part Numbers - Right Opening	Part Numbers - Left Opening
1	Top Plate Frame	1	D-12-031	D-12-041
2	Top Press Plate	1	C-12-014	C-12-014
3	.525 x .625 x 1” Bronze Bushing	4	531200011	531200011
4	Standoff, 1/4 - 20 M-F Hex Set	4	791522004	791522004
5	Top Plate Cover	1	C-12-016	C-12-065
6	Element, 8” Heater	1	413100003	413100003
7	Clamp, Heater	3	A-09-027	A-09-027
8	Bolt, 1-20 x 3/4 Hex Head PLT	3	711522084	711522084
9	Washer, 1/4 Flat	3	741600139	741600139
10	Bolt, 3/8 - 16 Hex Jam	1	711522196	711522196
11	Nut, 3/8 - 16 Hex Jam	1	731222107	731222107
12	Bolt, 1/4 - 20 x 2 Hex Head	12	711522088	711522088
13	Screw, 10-32 x 1/4 Rd. Head SST	1	721323047	721323047
14	Top Plate Harness Assembly	1	B-12-002	B-12-033

Wire Diagram Without Dough Trolley Loader



Wire Diagram for Optional Dough Trolley Loader

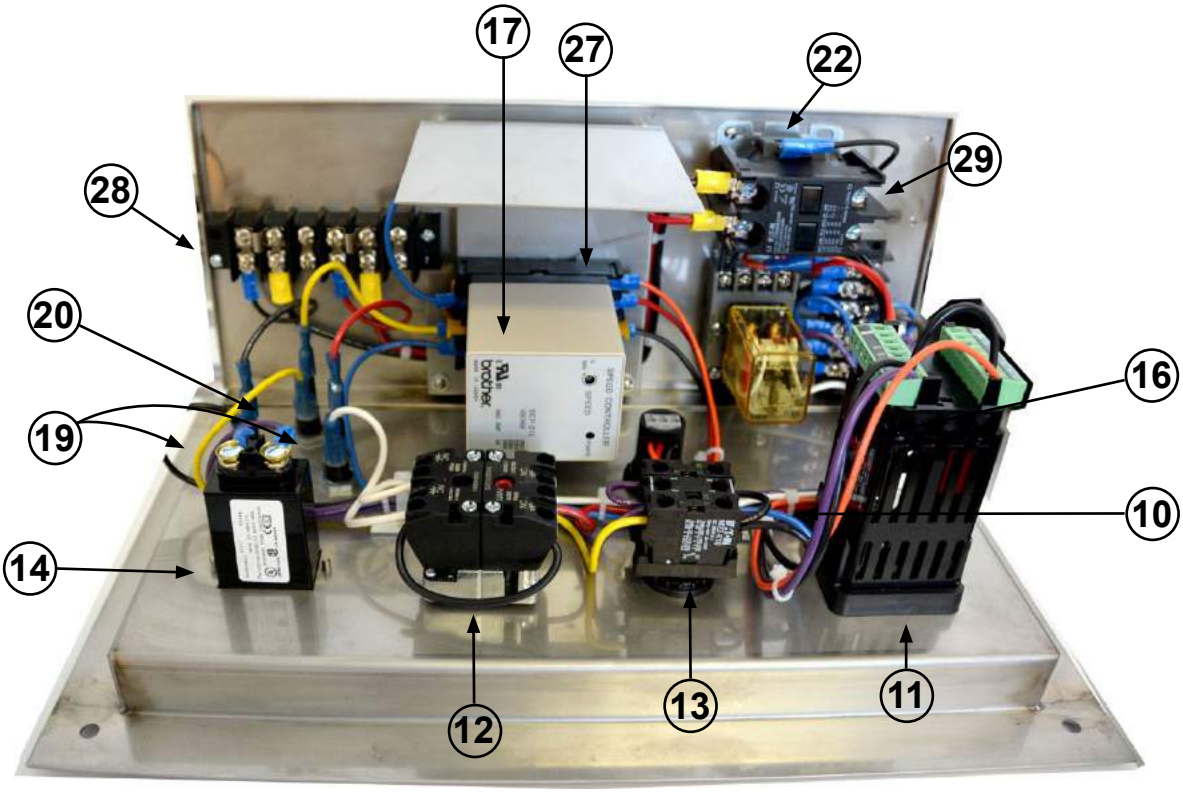
Item	Description	QTY	Part Number
24	Power Supply, 24 Volts	1	331212101
25	Stepper Motor	1	331010103
26	Proximity Switch for DTL	1	311600005



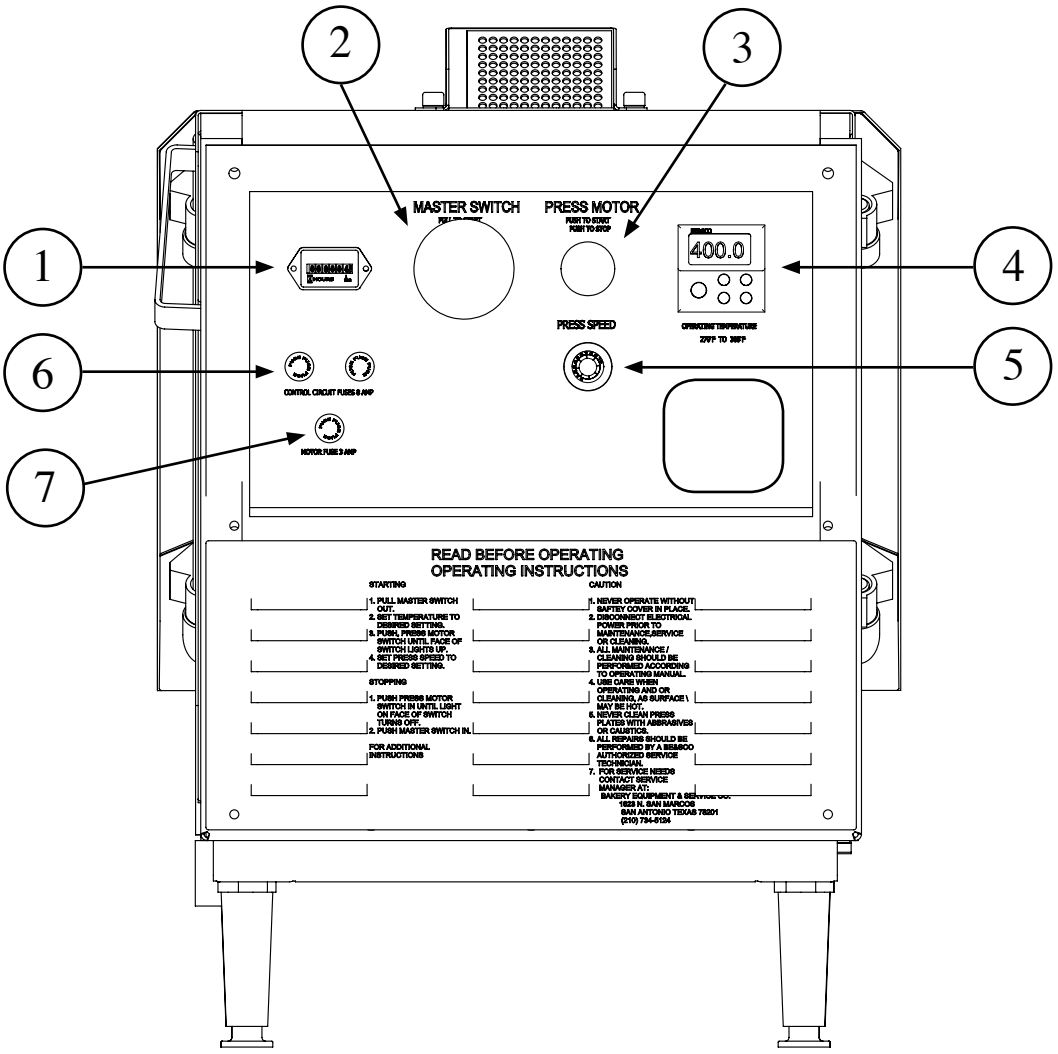
Control Panel Part List

Item	Description	QTY	Part Number
*2	Thermocouple Receptacle Harness	1	B-12-005
*4	Proximity Switch Harness	1	C-12-008
*7	BTM. Heater Receptacle Harness	1	B-12-006
*8	Brother Motor 220V	1	331009144
10	Potentiometer Assembly	1	392300138
11	Controller, Temperature	1	371116127
12	Switch, Push/Pull Red Head Momentary	1	312242021
13	Switch, Lighted Push Button	1	B-12-011
14	Hour Meter, 220V	1	381411132
16	Relay, Control 12 Amp 240V 8 Pin	1	321122002
17	Brothers Speed Controller 220-240V	1	12-2001-00
18	Fuse Holder, Panel	1	361121107
19	Fuse, 8 Amp Glass	2	361400103
20	Fuse, 3 Amp Glass	1	361300099
22	Contactor, 25A Heater Element	1	321100200
*24	Power Supply, 24 Volts	1	331212101
*25	Stepper Motor	1	331010103
*26	Proximity Switch for DTL	1	311600005
27	Capacitor	1	392112004
28	Terminal 6 lug 8-32 screw	1	352700119
29	Terminal 6 lug 6-32 screw	1	352700115

(*not shown in diagrams or pictures)



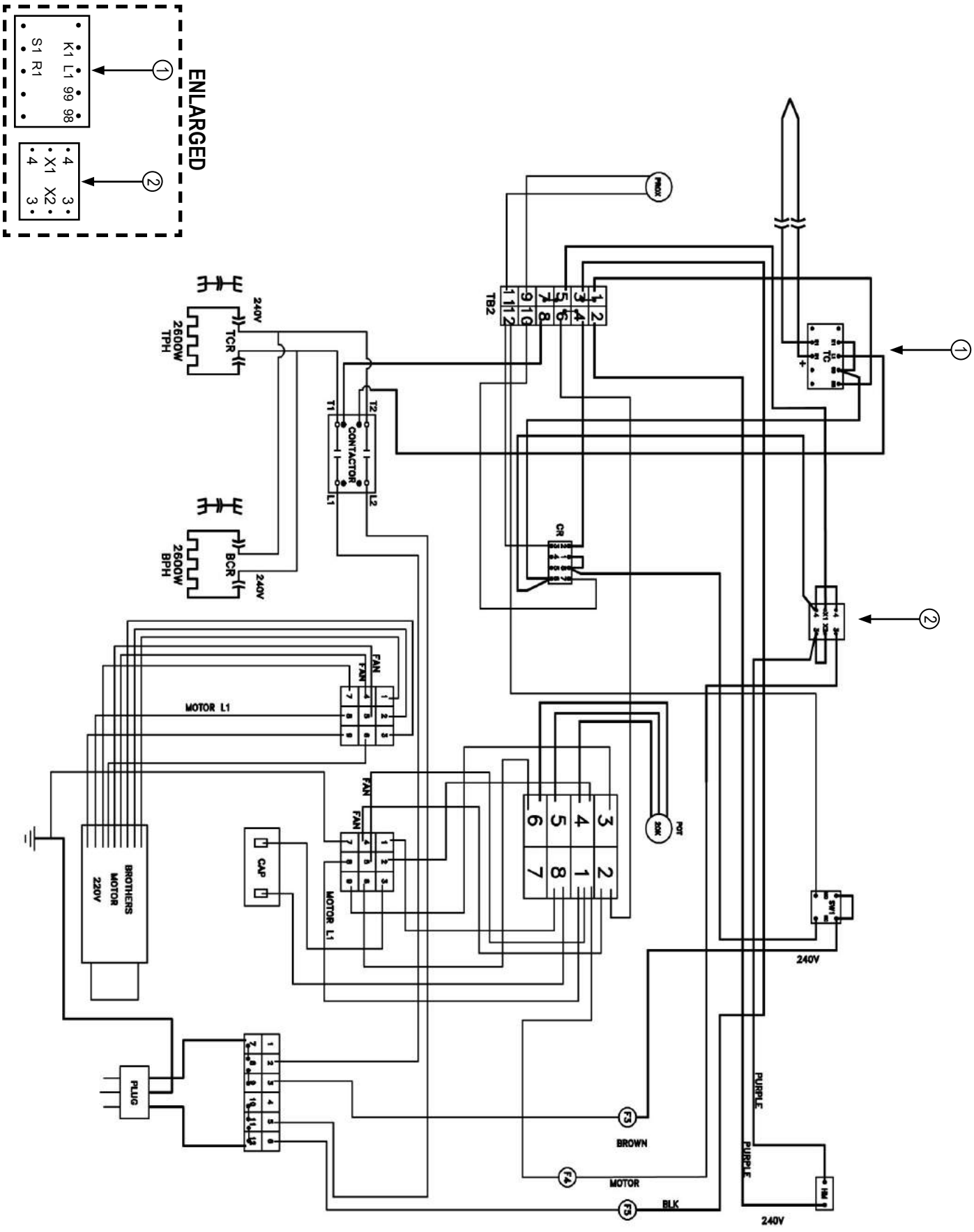
Control Panel Part List (from picture)



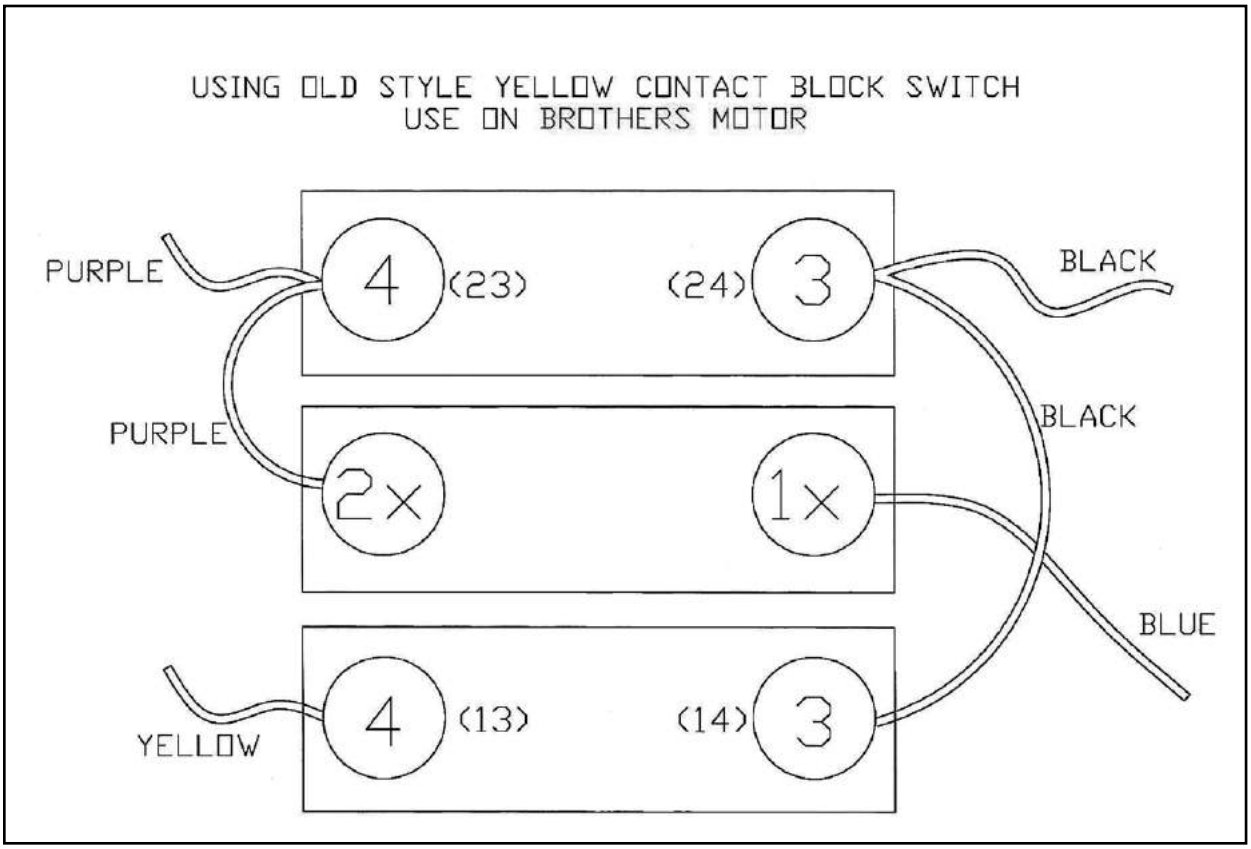
Item	Description	QTY	Part Number
1	Hour Meter, 220V	1	381411132
2	Switch, Push/Pull Red Head Momentary	1	312242021
3	Switch, Lighted Push Button	1	B-12-011
4	Controller, Temperature	1	371116127
5	Potentiometer Assembly	1	392300138
6 & 7	Fuse Holder, Panel	1	361121107
6 & 7	Nut, Fuse Holder Steel Lock	3	361113001
6	Fuse, 8 Amp Glass	2	361400103
7	Fuse, 3 Amp Glass	1	361300099

Wedge Wiring Diagram Brothers Motor

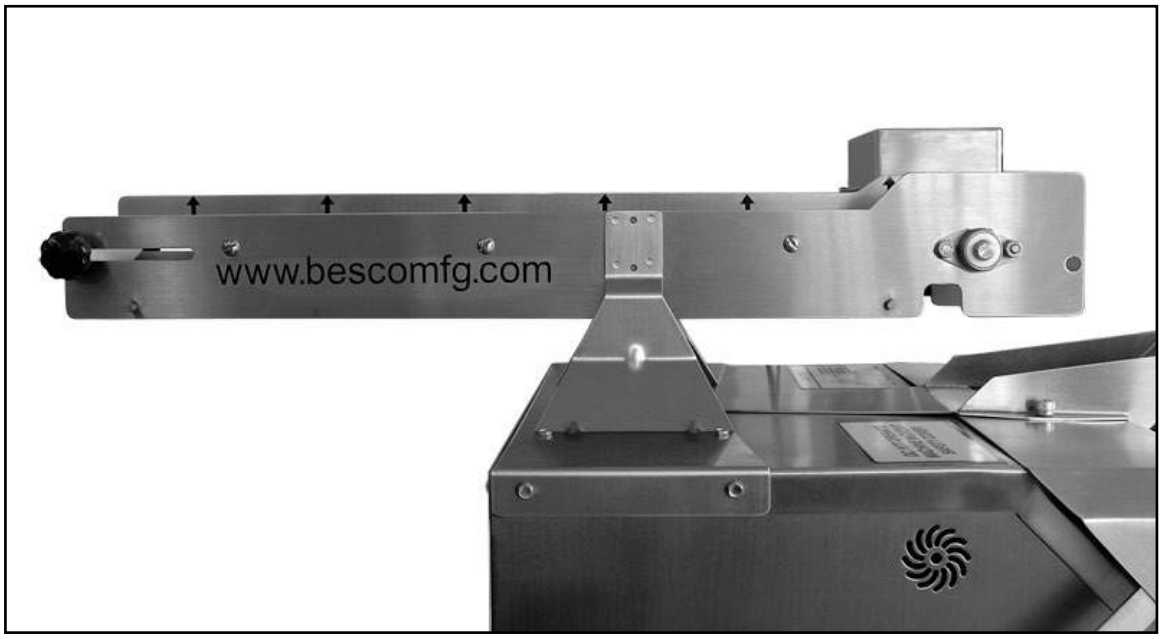
Using new Watlow Temperature Controller, #1 and new Press Motor Switch, #2



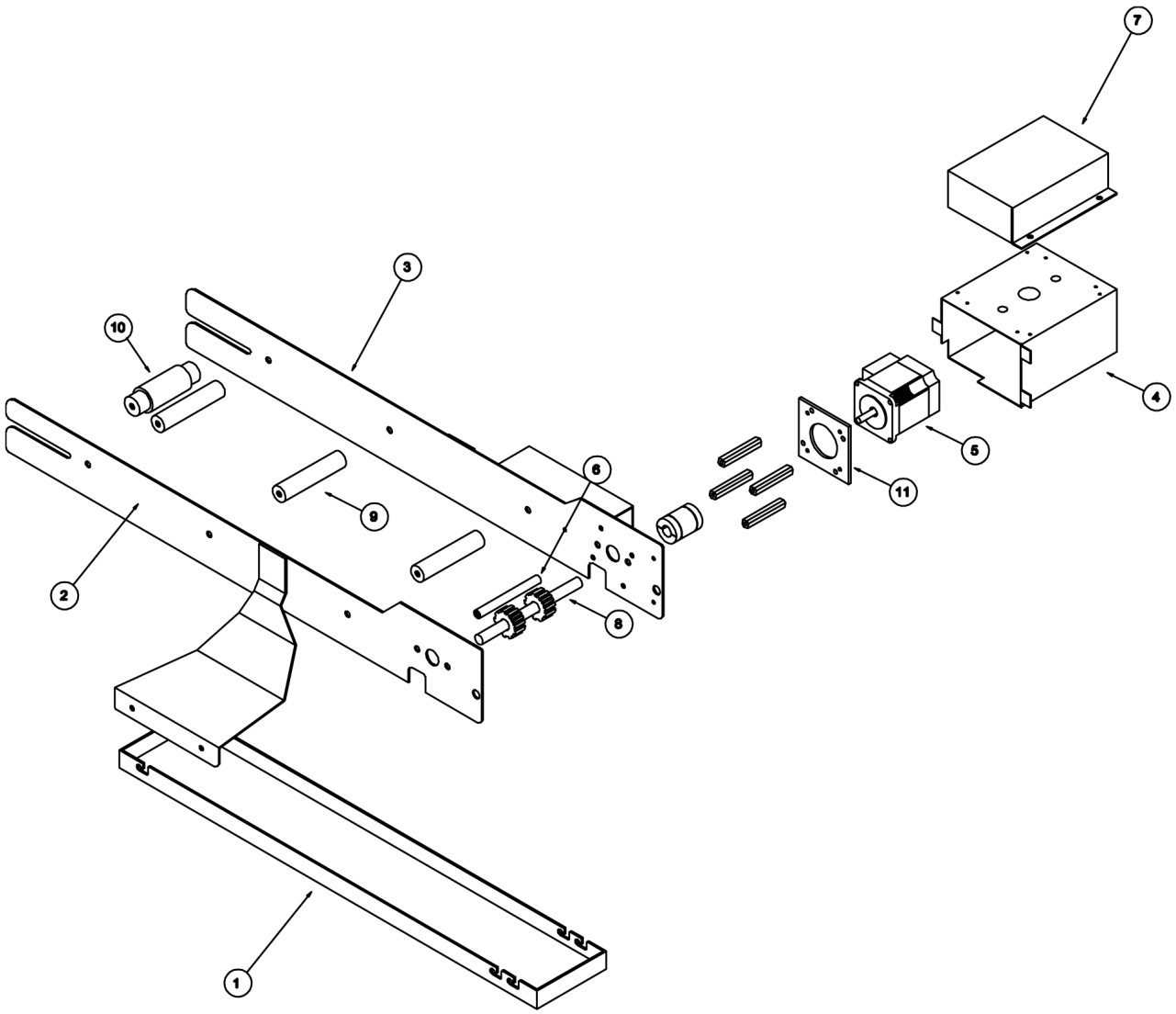
Contact Block Switch



Optional Dough Trolley Loader



Optional Dough Trolley Loader (Model 77)

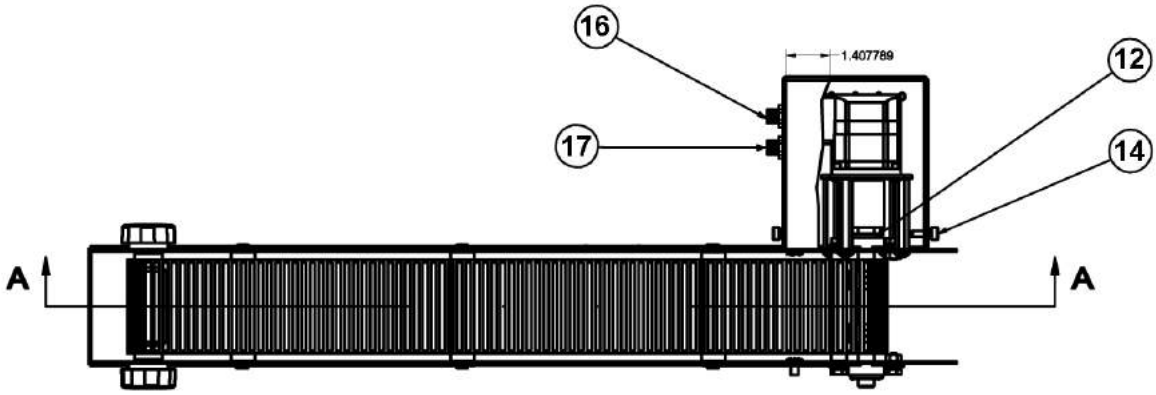


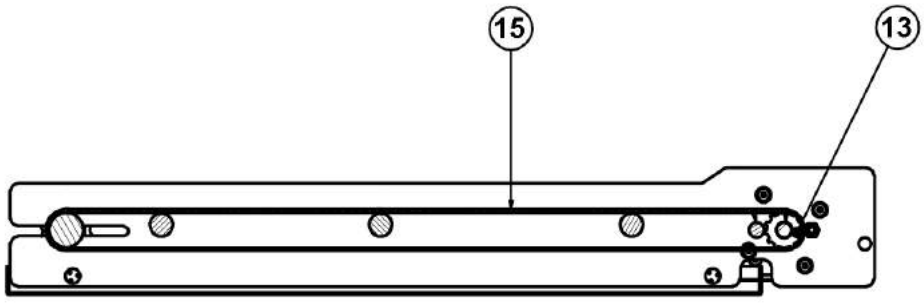
ITEM	QT	PART NUMBER	TITLE
11	1	A-75-005	MOTOR MOUNTING PLATE
10	1	A-75-003	LOADER, SPREADER END
9	3	A-75-002	SPACER, SPREADER
8	1	A-75-001	SHAFT
7	1	B-75-012	POWER SUPPLY COVER
6	1	A-75-004	LOADER, SHAFT END
5	1	331010103	MOTOR DRIVE AND CTONROLLER FOR DTL
4	1	C-75-005	MOTOR COVER
3	1	B-77-002	LOADER, LEFT SIDE PANEL ASSY
2	1	B-77-001	LOADER, RIGHT SIDE PANEL ASSY
1	1	B-75-003	LOADER, FLOUR PAN

BILL OF MATERIALS

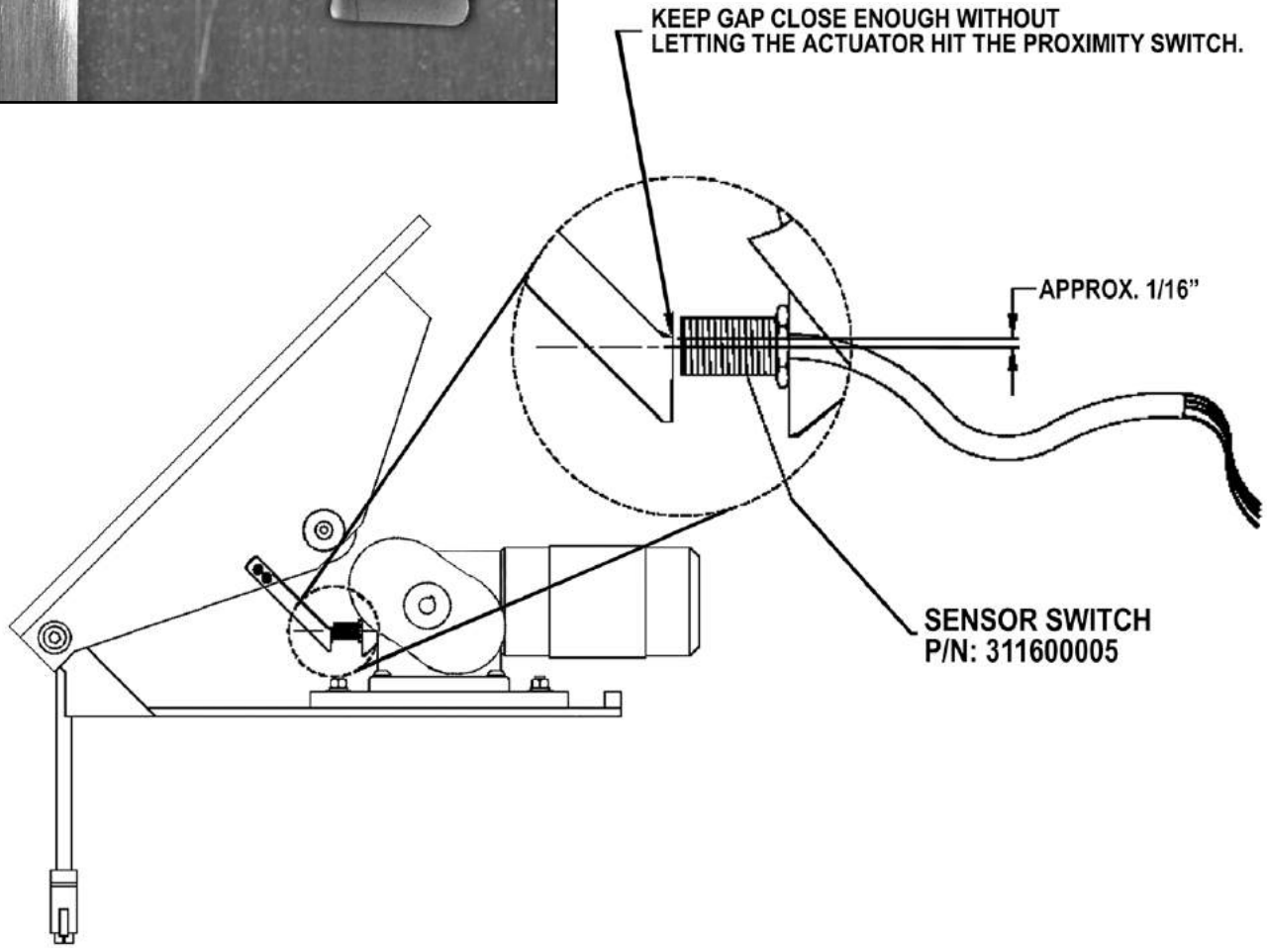
Optional Dough Trolley Loader (Model 77) - Parts List

ITEM	DESCRIPTION	PART NO.	QTY
1	Loader, Flour Pan	B-75-003	1
2	Loader, Right Side Panel Assy	B-77-001	1
3	Loader, Left Side Panel Assy	B-77-002	1
4	Motor Cover	C-75-005	1
5	Motor Drive and Controller for DTL	331010103	1
6	Loader, Shaft End	A-75-004	1
7	Cover, Motor Plate	C-75-005	1
8	Shaft	A-75-001	1
9	Spacer, Spreader	A-75-002	3
10	Loader, Spreader End	A-75-003	1
11	Motor Mounting Plate	A-75-005	1
12	1/2 Flange SST Bearing	532200013	2
13	1/2 SST 13T Sprocket	551412100	2
14	10-32 x 1/2 Knurl Thumb Screw	721823160	3
15	Belt - 3” x 52”	581312200	1
16	Connector 8 Pin Mini Male	352800100	1
17	Connector 4 Pin Mini Male	352410004	1

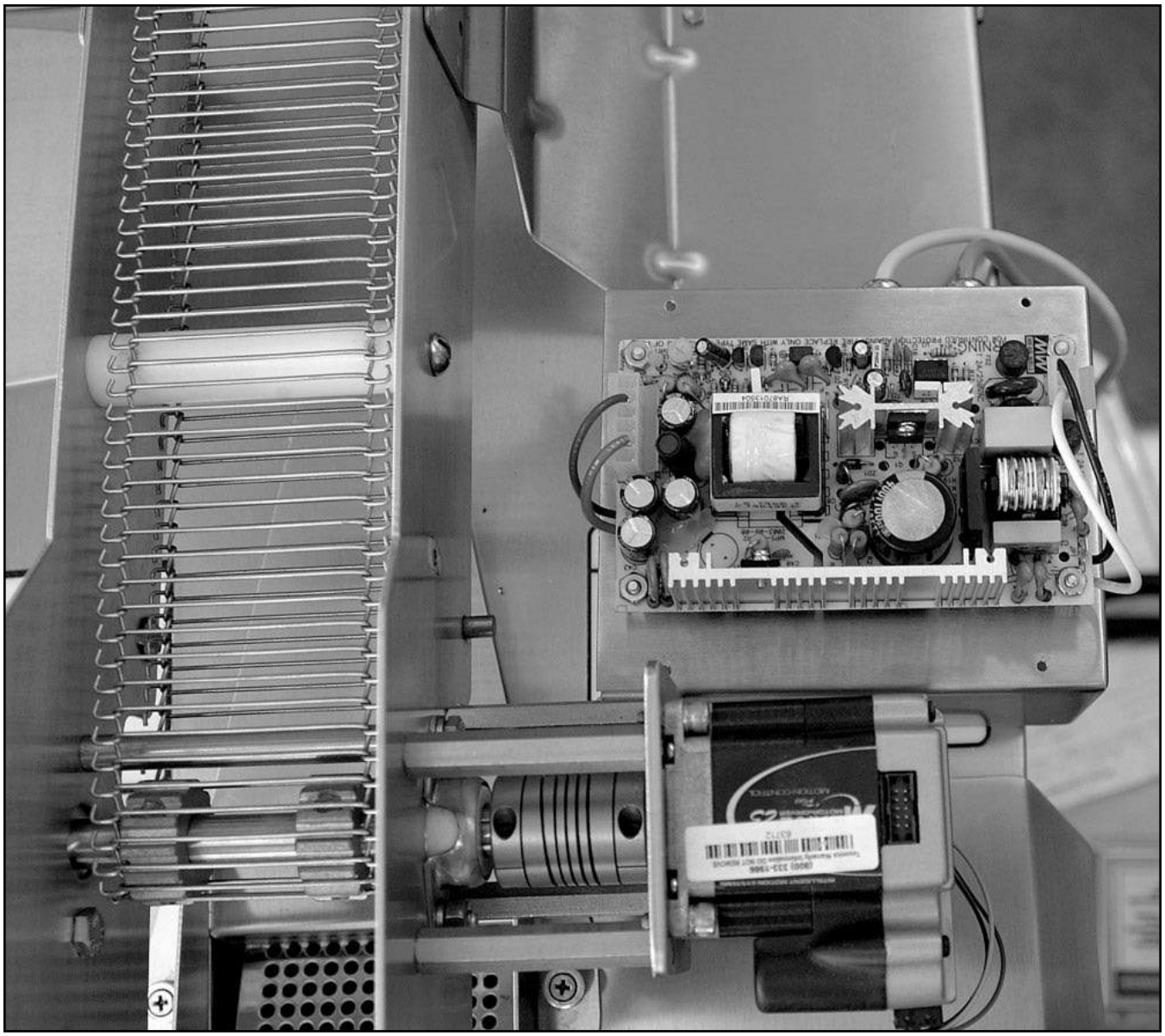




Proximity Switch

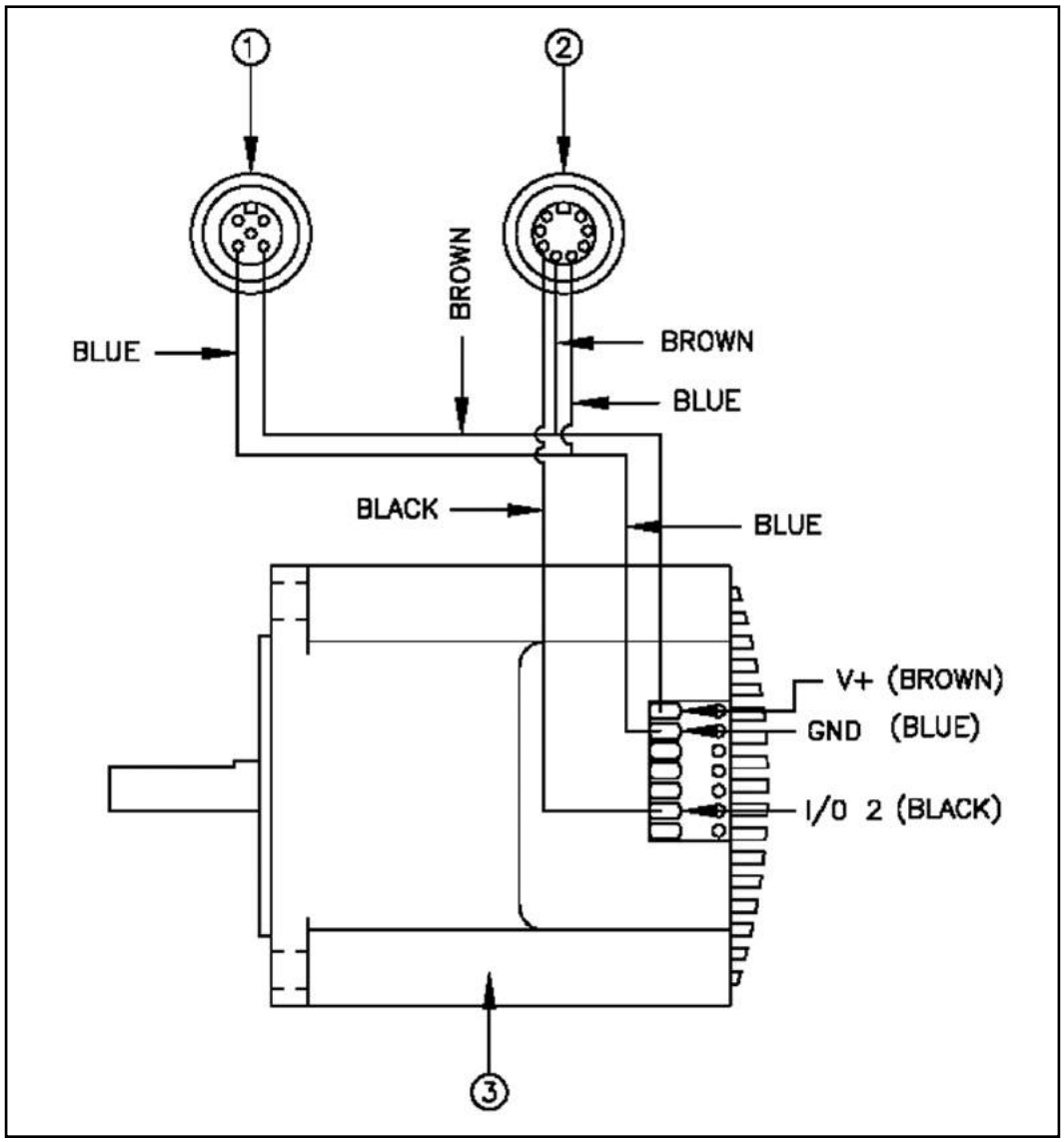


Optional Dough Trolley Loader - Motor Drive and Controller



Dough Trolley Loader Stepper Motor

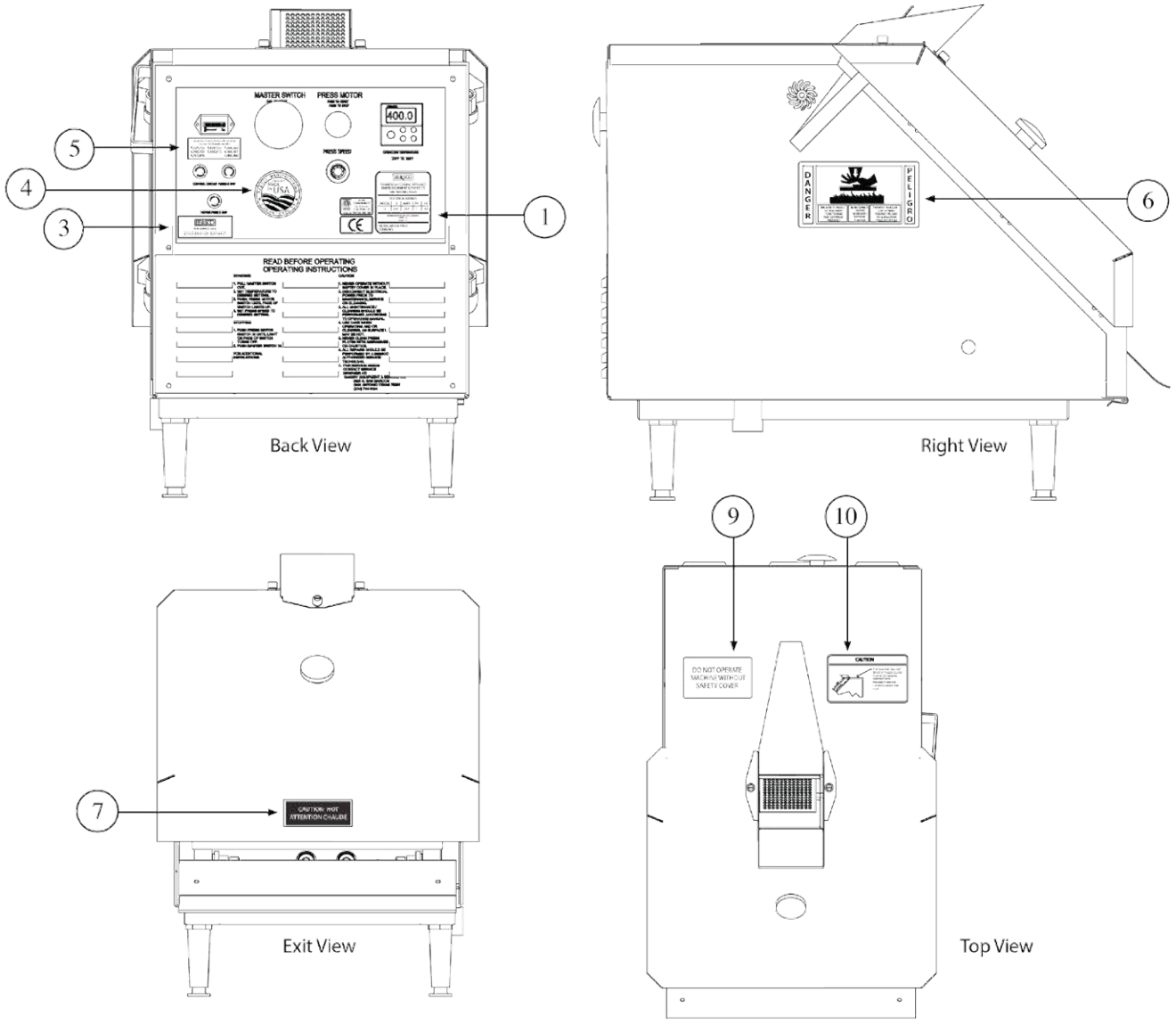
wiring diagram (optional feature)



ITEM	DESCRIPTION	PART NUMBER	QTY
1	CONNECTOR, 4 PIN MINI MALE	352410004	1
2	CONNECTOR, 8 PIN MINI MALE	352800100	1
3	MOTOR, STEPPING/ENCODER	331010103	1

Decal Locator Assembly for the Wedge Press Model 12

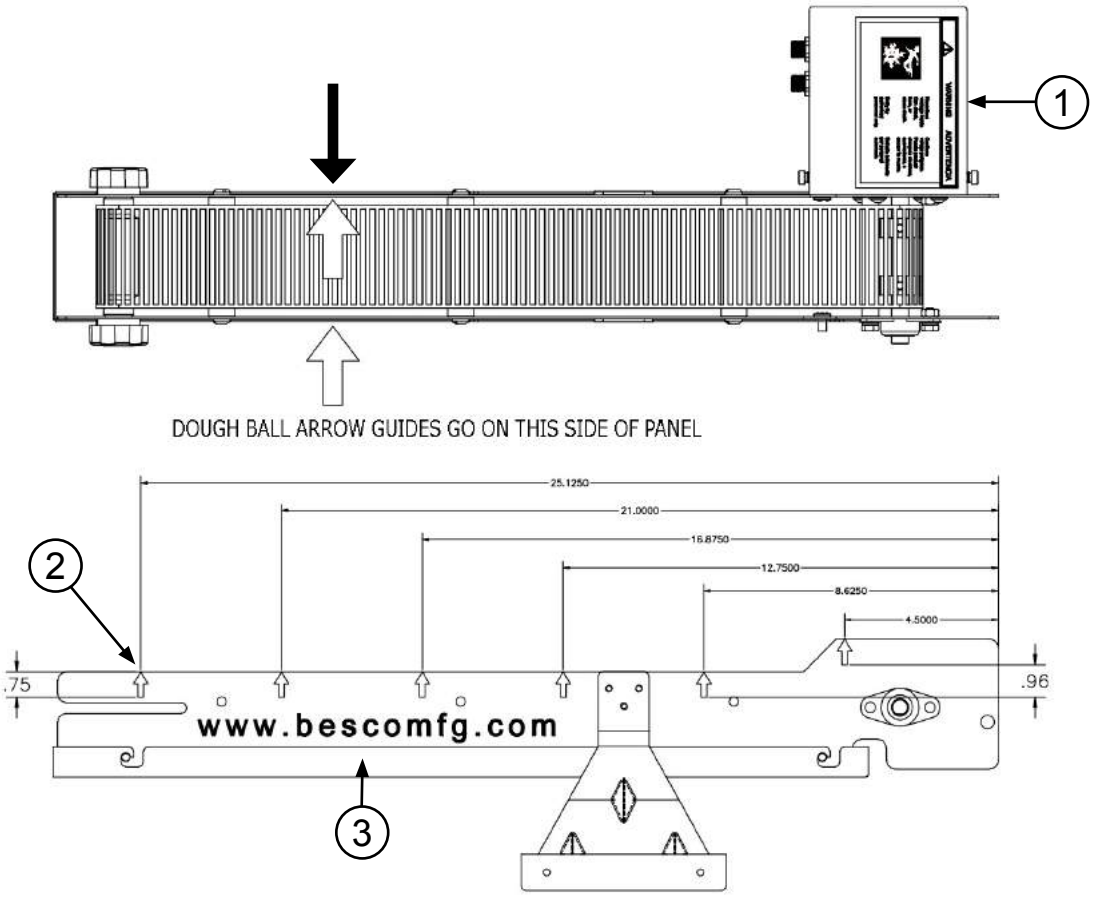
WARNING: BE&SCO Decals are placed on every machine for customer safety. If a BE&SCO Decal is removed or damaged another Decal can be ordered through the BE&SCO Parts Department.



Item	Description	Reference #
1	Wedge Press Name Plate Decal	082007020
3	Service Decal	981300200
4	Made in USA Decal	082007001
5	Patents Numbers Decal	082007002
6	Danger Pinch Lexan Decal	981300102
7	Sm. Caution Hot Decal	981300110
8	Proximity Switch Caution Decal	082007011
9	Safety Cover Decal	082007023

Decal Locator Assembly for the Dough Trolly Loader Model 77 optional feature

WARNING: BE&SCO Decals are placed on every machine for customer safety. If a BE&SCO Decal is removed or damaged another Decal can be ordered through the BE&SCO Parts Department.



WEBSITE DECAL TO BE PLACED ON BOTH SIDES.

Item	Description	Reference #	Qty.
1	Lg. Warning Hazardous Voltage Decal	082007005	1
2	DTL Dough Ball Arrow Guides	082007024	18
3	Sm Website	082007004	2

Original Equipment Warranty

BAKERY EQUIPMENT & SERVICE CO., INC. warrants that its products, as supplied to the original user, is free from defects in material and workmanship, and is suitable for the use for which it is sold. The Company's obligation under this warranty shall be limited to replacing, or at the option of BAKERY EQUIPMENT & SERVICE CO., INC. repairing, without charge any part found to be defective and expense incurred (labor and material) for its installation for a period of ninety (90) days or 750 hours of operation, whichever occurs first, from date of shipment from the factory, or upon special written request to the factory and acknowledged by the factory from the date of installation when there is a long installation delay. After said ninety (90) days or 750 hours of operation and for (1) year or 3,000 hours of operation, whichever comes first from warranty initiation date, this warranty shall apply to defective parts replacement at no charge to original user.

This warranty does not cover any defect due to or resulting from handling, abuse, misuse, improper maintenance and cleaning, or harsh chemical action, nor shall it extend to any unit from which the serial number has been removed or altered, or acts of God. BE&SCO equipment is solely intended for use in a commercial facility. The warranty will not be supported and may be voided if BE&SCO equipment is used in a non-commercial or household setting. Adjustments such as calibrations, leveling, tightening of fasteners or plumbing connections normally associated with original installation are the responsibility of the dealer or installer and not of BAKERY EQUIPMENT & SERVICE CO., INC.

BAKERY EQUIPMENT & SERVICE CO., INC. shall not be liable, directly or indirectly, under any circumstances for consequential or incidental damages, including, but not limited to: (i) any loss of business or profits; and (ii) labor, material or other charges, claims, losses or damages incurred or suffered from, in connection with or in consequences of the working upon, alteration, or repair of any such defective products or parts by persons or firms other than BAKERY EQUIPMENT & SERVICE CO., INC.

This warranty applies only to products shipped to and used with the Continental United States and Canada. All other customers will be provided a spare parts kit in lieu of the above warranty. These kits will be provided with delivery of your purchased equipment. The kit shall consist of parts identified, at the sole discretion of Bakery Equipment & Service Co., INC.

At Bakery Equipment & Service Co., INC., we continuously strive to provide the highest quality products and services. This warranty serves to exhibit our commitment to this endeavor.

BE&SCO MANUFACTURING®

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