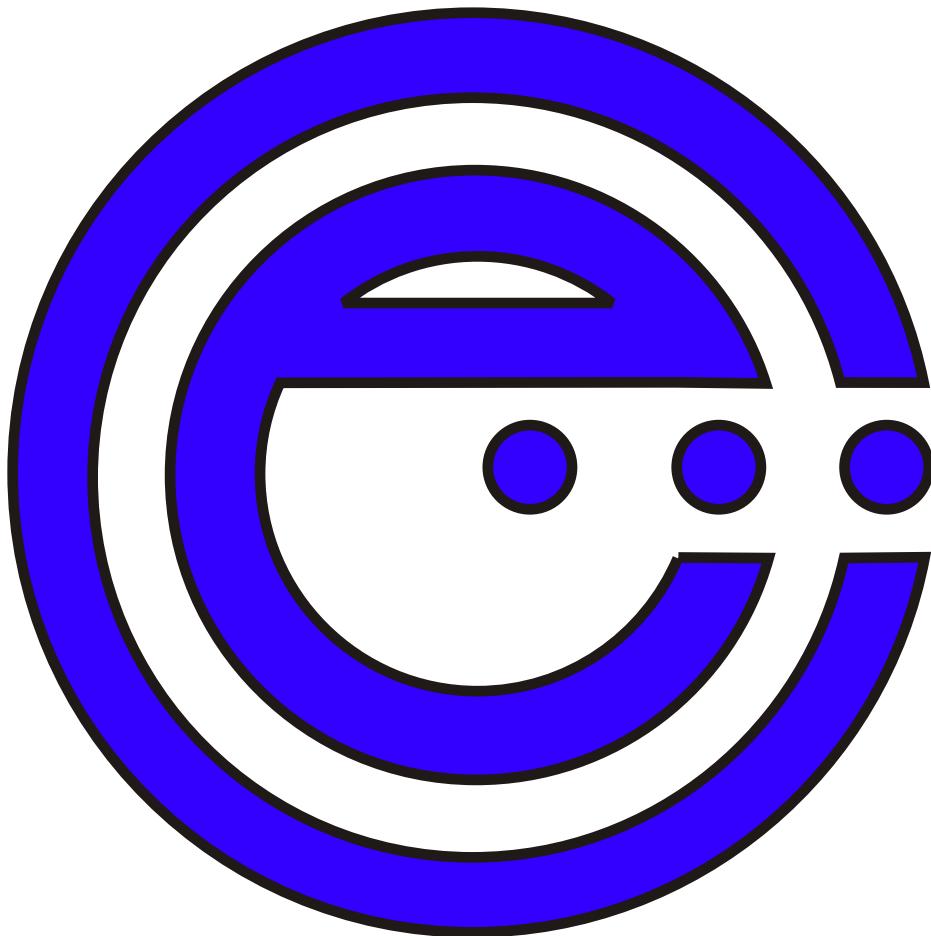


GAMA Electronics, Inc.

Dual Steri-Sealer

Heat Sealing Machine



**Installation, Operation,
And Maintenance Manual**

INSTALLATION, OPERATION, AND MAINTENANCE MANUAL

DUAL STERI-SEALER
HEAT SEALING MACHINE

Model 87052

SERIAL NUMBER _____

Congratulations on the purchase of your new electromagnetic Steri-Sealer.

GAMA Electronics, Inc. is committed to being the best supplier of electromagnetic sealers in the world. We are dedicated to providing TOTAL CUSTOMER SATISFACTION through continuous quality improvement and quick response to changing customer needs.

We welcome your comments and suggestions on our products and literature.

Please Note:

This machine is equipped with a tamper evident seal. Breaking the seal could void your warranty.

Repairs and/or adjustments to your Steri-Sealer must be referred to qualified service personnel.

The adjustments referred to in this manual should only be attempted by a qualified electrical or mechanical technician who is knowledgeable in the service of this type of equipment.

Please have the machine's serial number available when requesting service and/or replacement parts.

Safety First

Carefully read this manual before operating the Steri-Sealer.

Always remove the power cord plug from the AC service outlet prior to removing the top cover of the Steri-Sealer.

Allow machine to cool sufficiently before attempting to service.

Do not put fingers or hard objects into opening.

For Service & Repair Parts Contact:

GAMA Electronics, Inc. / Concord Division
1240 Cobblestone Way
Woodstock, Illinois 60098

GAMA Electronics, Inc.
P.O. Box 1488 Crystal Lake, IL 60039
Phone (815) 356-9600 Fax (815) 356-9603
www.steri-sealer.com

UNPACKING

Your new Steri-Sealer is fully assembled and ready to use. Upon receipt, carefully inspect the teflon cloth for apparent shipping damage. Make sure it is making good contact with the heat bar. Claims for damages should be reported immediately to United Parcel Service.

STERI-SEALER PRE-PROGRAMMED SETTINGS

The Steri-Sealer has been factory set and programmed to the following sealing temperatures and dwell times:

| | Temperature | Cycle Time |
|----------------|------------------------|-------------|
| Paper/ Plastic | 460 Degrees Fahrenheit | 3.7 Seconds |
| Polyethylene | 275 Degrees Fahrenheit | 1.2 Seconds |

BEFORE YOU BEGIN....

The sealer has two operating modes as selected by the toggle switch mounted on the top panel. Select the mode for sealing the desired pouch material. The sealer is supplied with two rubber pads, one for each type of pouch material. The 3/16" wide rubber pad should be used when sealing polyethylene or Tyvek. The 3/4" wide pad is used to seal the paper/plastic pouch material. Prior to energizing the sealer install the appropriate pad for the pouch material being used. Your machine is supplied with the wide (paper/plastic) pad already installed.

RUBBER PAD INSTALLATION (REFER TO FIGURE 1)

1. Loosen the two black retaining knobs at the front of the machine until the rest bar is loose.
2. Insert the desired rubber pad (with the raised area on top) above the rest bar with the back edge against the backrest. Lift the pouch rest bar onto the rubber pad so that the bar is seated against the raised area of the rubber pad. Make sure the pad is resting flat on the surface.
3. Tighten the two black knobs loosened in step 1.

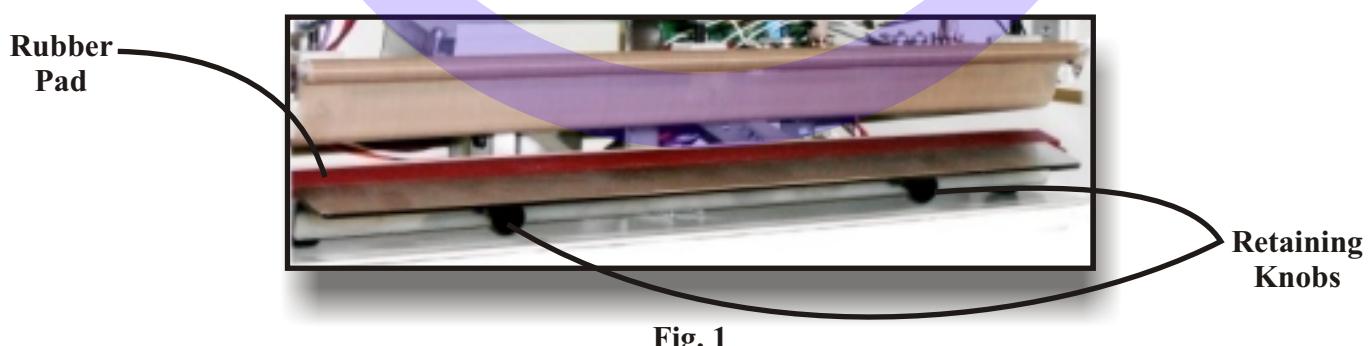


Fig. 1

STARTUP PROCEDURE

The Steri-Sealer should be placed on a flat level surface with adequate ventilation. Perform the following steps to turn on and operate the Steri-Sealer. (Refer to Figure 2)

1. Install the power cord plug into a 120VAC grounded outlet.
2. Select either the paper/plastic or the polyethylene operating mode (for the desired pouch material) with the toggle switch on the top of the panel.
3. Place the power ON/OFF switch in the ON position, the switch will illuminate. The sealer requires approximately four minutes to energize and reach the appropriate temperature. Monitor the heat indicator light. During warm up the heat indicator light will be illuminated. When the sealer reaches the preset temperature the light will extinguish.
Note: The heat indicator light will cycle on and off during operation. This is normal and indicates that the temperature setting is monitored and maintained. It is recommended to seal pouches at the optimal temperature when the indicator is off.

SEALING PROCEDURE

Paper/Plastic: Be sure that the wide (3/4") silicone rubber pad is installed. Grip the pouch on both sides (clear side up paper side down). Insert the pouch into the opening between the silicone rubber pad and the Teflon cloth. With your fingertips, lift the pouch rest bar. The bar will automatically lock into place and hold the bag for the predetermined sealing time. The sound you hear is the magnet gripping plate striking the face of the magnet. Upon the completion of the timed cycle, the pouch rest bar will drop and release the sealed pouch. Your seal width is 1/2" wide. Generally the timed cycle is about 3 3/4 seconds.

Polyethylene/Tyvek: You have the option of using either the wide (3/4") or narrow (3/16") silicone rubber pad. The sealing sequence is similar to the above. Note: Printed Polyethylene pouches should be sealed with the printed side down while Tyvek pouches should be sealed with the clear side up. Generally the timed cycle is 1.2 seconds for these materials. Polyethylene pouches will have a tendency to stick slightly to the lower silicon rubber pad. When this occurs, let the seal cool for a second or two. Starting at one side, gently peel the pouch from the pad. Pouches will stick to the upper Teflon cloth if the cloth is sticky or if printed materials are sealed with the printed side up. Your seal width is 3/16" using the narrow pad and 1/2" using the wide pad.

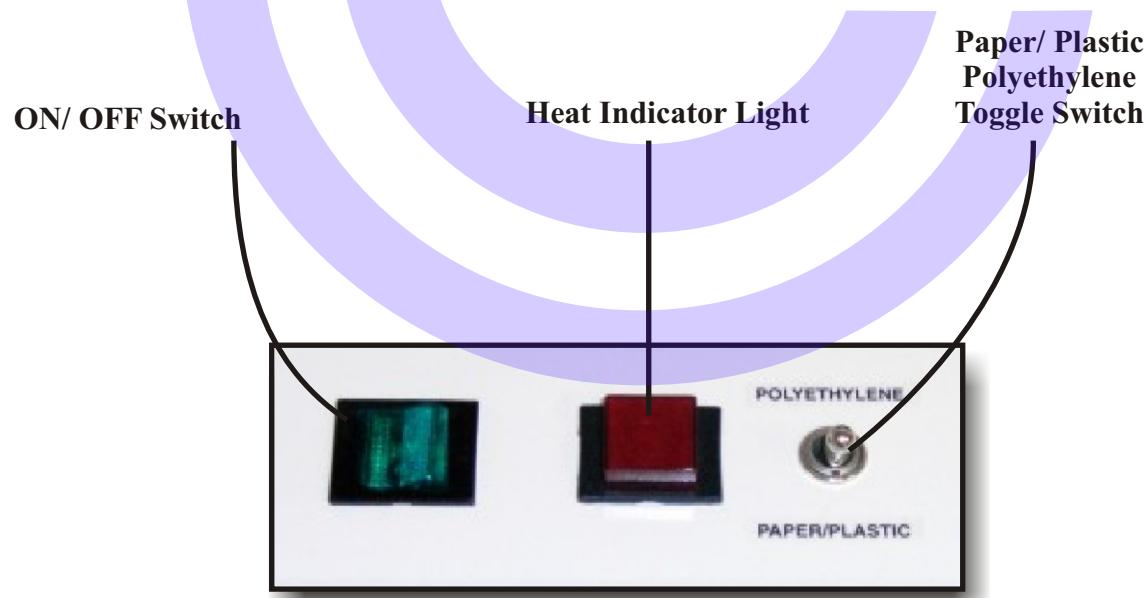


Fig. 2

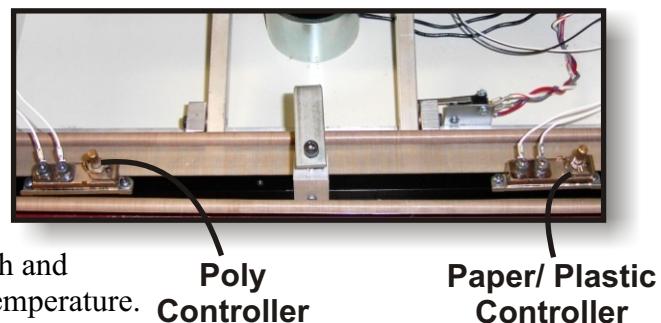
WARNING: THE FOLLOWING ADJUSTMENTS SHOULD ONLY BE ATTEMPTED BY A QUALIFIED ELECTRICAL OR MECHANICAL TECHNICIAN AND WILL VOID YOUR WARRANTY

THERMAL SWITCH TEMPERATURE ADJUSTMENTS

Refer to Figure 3 to locate the thermal switch you want to adjust and proceed as follows:

1. Disconnect the power supply cord.
2. Wait for the unit to cool down and remove the top cover.
3. With long nose pliers grip the knurled adjusting shaft on the switch and turn clockwise to increase and counterclockwise to decrease the temperature.
Note: For best results, make only very slight adjustments.
4. Replace and secure the top cover.
5. Connect the power supply plug and allow the machine to warm up; then test the seals.

Fig. 3



TIMER CIRCUIT ADJUSTMENTS

The adjustable timers are located on the printed circuit board.

Refer to Figure 4 to help in locating the timer you wish to adjust. Once you locate the proper timer, proceed as follows:

1. Disconnect the power supply cord.
2. Wait for the unit to cool down and remove the top cover.
3. Note that the timer has a small tab extending from the adjustment wheel. A slight movement of this timer wheel upward will increase the time and downward will decrease the time. The total range is 0 to 7 seconds.
For best results, make only very slight adjustments.
4. Replace and secure the top cover.
5. Connect the power supply plug and allow machine to warm up; then test the seals.

REPLACEMENT OF TEFLON CLOTH ASSEMBLY

1. Disconnect the power supply cord.
2. Wait for the unit to cool down and remove the top cover.
3. Remove both black knobs located on the left side of the machine. When loosening the knobs it may be necessary to grip the rod from the inside of the machine with a pair of pliers.
4. Unsnap the rear rod from its retaining clip and pass this rod forward under the heat bar.
5. Unsnap and remove the front rod.
6. Slowly slide the threaded portion of the rods towards the inside of the machine to remove the assembly.

Note: To install the new Teflon rod assembly, reverse the above procedure making sure that the supply is on the front rod and wound tightly. If rods are loose, use pliers to squeeze the clips together prior to installation of the new assembly.

7. Replace and secure the top cover.

Fig. 4



REPLACEMENT OF A THERMAL SWITCHES AND/OR A HEATING ELEMENT

The field replacement of a thermal switch or a heating element can *ONLY* be made by a qualified technician! Upon request, replacement parts and detailed instructions will be provided to qualified service personnel or service outlets. Otherwise machines should be returned to the factory for repair.

ADJUSTING MICRO SENSOR ARM

1. Disconnect the power supply cord.
2. Wait for the unit to cool down and remove the top cover.
3. With one hand, hold down the steel magnet gripping plate to the face of the magnet, with the other hand adjust the sensor so that the arm is fully activated.
4. Hold the sensor in position and tighten the mounting nuts.
5. Replace and secure the top cover and test operation.

SEALING PRESSURE ADJUSTMENT

Sealing pressure is obtained through the force of the electro magnet pulling down the steel magnet gripping plate, thereby lifting the lower silicone rubber pad up to the mating heat bar assembly. The heat bar assembly has been factory aligned and is held in place by the three (3) adjusting screws. **Important:** If the seals appear spotty or weak, first check the condition of the silicon rubber pad and the Teflon cloth roll. Replace either or both as condition warrants. If seals are still spotty or weak and it is apparent that the sealing pressure requires adjustment, proceed as follows:

1. Disconnect the power supply cord.
2. Wait for the unit to cool down and remove the top cover. Tools required: 3/16 hex key and 7/16 open-end wrench.

There are 3 adjusting points; left, right, and center. To increase sealing pressure in any given area:

1. Hold the adjusting screw firmly with the hex key (to prevent turning) and loosen the lock nut under the support arm.
2. Turn the adjusting screw $\frac{1}{4}$ turn counter clockwise to lower the heat bar and tighten the nut. You have lowered this portion of the heat bar $.009"$.
3. Connect your power supply plug and allow the machine warm up; then test the seals.

Note:

- a) To decrease sealing pressure in an area, turn the adjusting screw clockwise to raise the heat bar.
- b) Do not loosen the hex head screws on the outside of either end of the cabinet. These should only be loosened to tilt and realign the heat bar to the silicone rubber pad.
- c) Always tighten the nuts before testing seals.

RETURNED GOODS

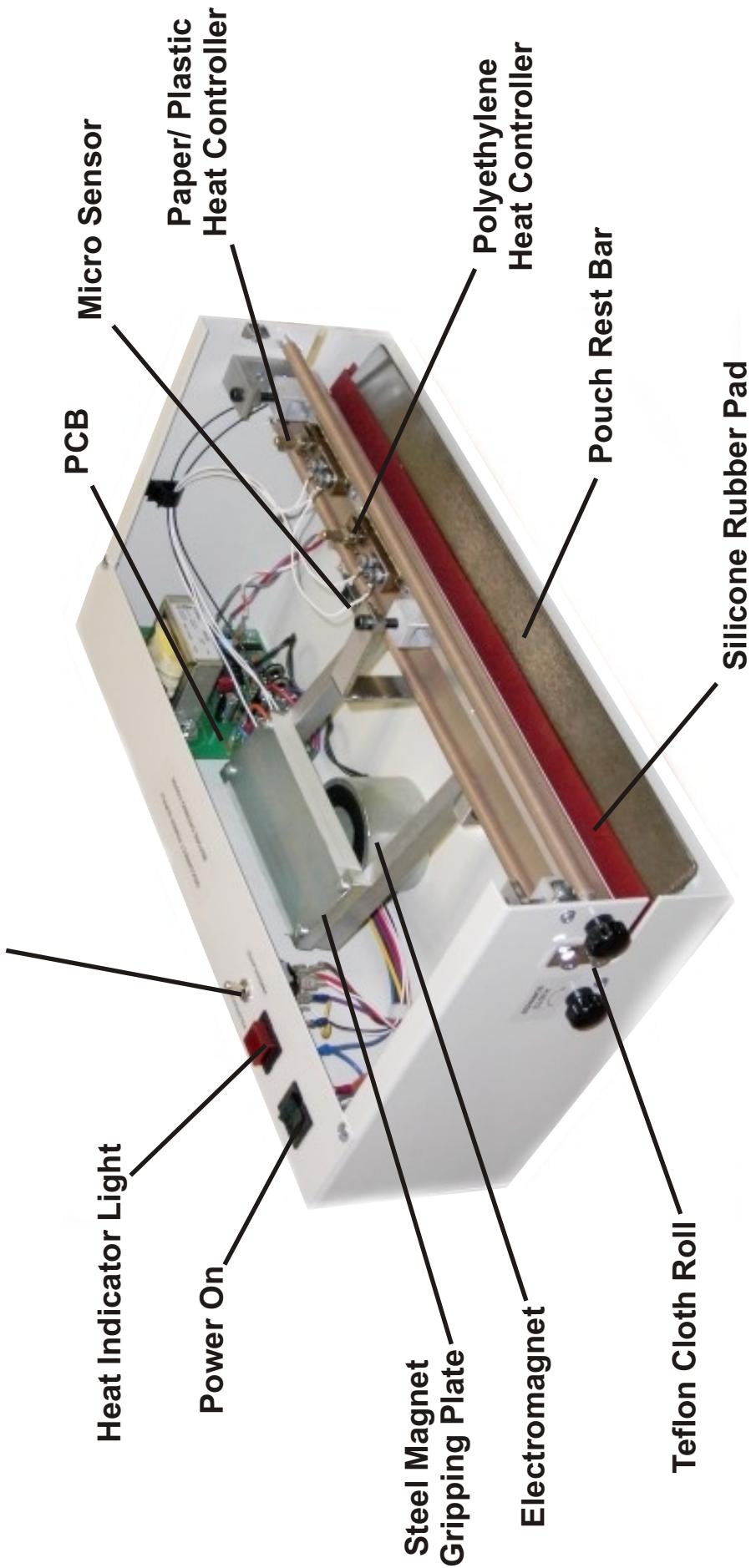
Merchandise may not be returned without authorization. A return authorization number may be obtained through the Customer Service Department at GAMA. Return authorization numbers are good for 30 days. All returned merchandise is subject to inspection. All machines returned for warranty repairs must be shipped prepaid and insured. Any shipping damages to machines being returned for warranty repairs are the purchaser's responsibility.

WARRANTY

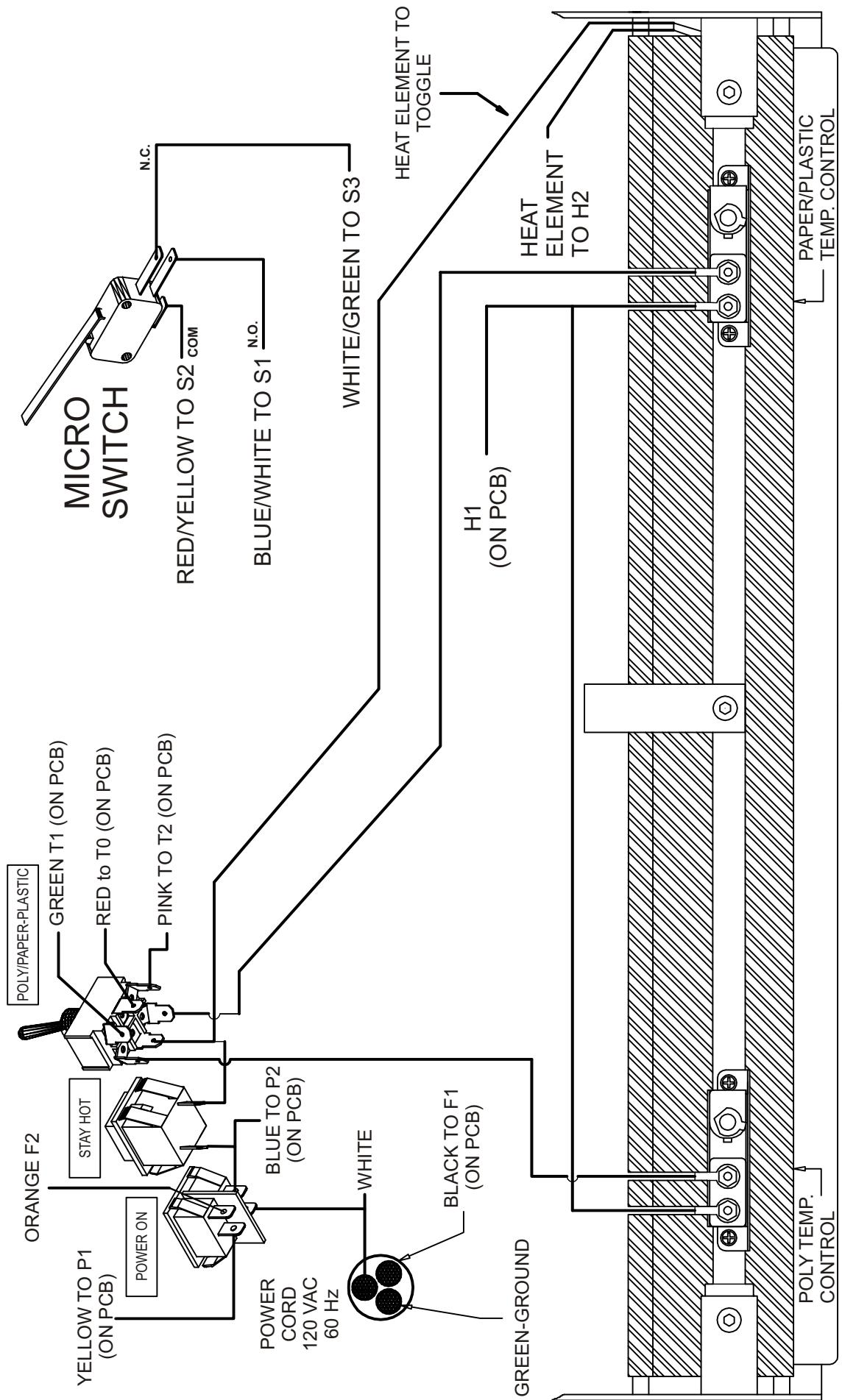
The basic warranty of your Steri-Sealer is for a period of one (1) year from the date of shipment, excluding: Teflon cloth roll assembly and silicone rubber pads.

The above items are considered consumables and as such, are not included in the basic warranty. The goods at the time of shipment will be free from defects of material and workmanship and will be in accordance with specifications, which are made a part of the sales contract by reference thereto. GAMA Electronics Inc.'s sole obligation under the foregoing warranties will be limited to replacing or repairing defective goods. The customer's exclusive remedy for breach of any such warranties will be enforcement of such obligation of GAMA Electronics, Inc. This warranty, however, (a) extends only to, and is intended for the benefit only of the customer (original Purchaser), and does not obligate, and shall not be construed to obligate, GAMA Electronics Inc. to any person or organization other than the customer, (b) is effective only when the customer returns such defective part or parts to GAMA Electronics Inc.'s factory, transportation prepaid and insured, immediately upon customer's discovery of the defect in question; (c) is not effective when the part or product in question, is or has been, operated beyond rated capacity, used or applied improperly, or used with parts which are not made or recommended by GAMA Electronics Inc.; and (d) does not render GAMA Electronics, Inc. liable for any claim or claims for damages which may result, directly or indirectly, from any defect in any part or parts manufactured by GAMA Electronics, Inc.; except to replace the part or parts in question.

Toggle Switch For Dual Purpose Units



STERI-SEALER WIRING PICTORIAL



GAMA Electronics, Inc.

P. O. Box 1488

Crystal Lake, IL 60039

Phone (815) 356-9600 Fax (815)356-9603

www.steri-sealer.com

Order online at

www.steri-sealer.com

or fax your order to:

(815) 356-9603

PARTS LIST ELECTROMAGNETIC STERI-SEALER

| Description | Price | Part Number |
|---|-----------|-------------|
| Teflon Cloth Roll Assembly | \$50.00 | RTC-01 |
| Silicone Rubber Pad - Wide for Paper/ Plastic Use | \$50.00 | SPW-02 |
| Silicone Rubber Pad - Narrow for Poly Use | \$50.00 | SPN-03 |
| Heavy Duty Heating Element | \$180.00 | HHE-04 |
| Thermoswitch | \$130.00 | TSF-05 |
| Micro-Sensor | \$35.00 | MSM-06 |
| Printed Circuit Board | \$195.00 | PCB301-A |
| ON/OFF Switch | \$28.00 | POW-08 |
| Pilot Light | \$20.00 | SHP-09 |
| Heavy Duty Power Magnet | \$250.00 | HPM-10 |
| Heat Bar Assembly | \$150.00 | HBP-11 |
| Dual Steri-Sealer | \$1495.00 | 87052 |
| Polyethylene / Paper Plastic Toggle Switch | \$28.00 | 7565K1 |

* These Items are Recommended Spare Parts for All Sealers:

Two (2) each Teflon Cloth Roll Assembly

One (1) Silicone Pad (note: one of each wide and narrow)

Note: When ordering parts, please give us the serial number of the sealer. Please order parts by description & part number.

Shipping and Handling Fees: Add \$8.00 for first item; \$3.00 for each additional item.

Terms: Credit Card or Net 15 Days upon credit approval

Troubleshooting Guide

| Problem | Possible Cause | Solution |
|---|---|--|
| The seals are weak or not holding. | The lift bar is not engaged long enough. | Adjust the timing wheels on the printed circuit board (see manual). Increase the hold time in small increments until the seal is adequate. If the full hold time is not long enough then the thermo switch needs adjusting (see thermo switch adjust below). |
| The bags are burnt or melted | Wrong Sealer Setting | Check the toggle switch setting. The polyethylene setting is for plastic only. The paper/plastic setting is for half plastic half paper. |
| | Wrong Type of Bag | The sealer is factory calibrated for Allegiance "Tower" brand polyethylene and paper/plastic pouches. Other brands may require custom time and temperature settings. |
| | The lift bar is engaged too long. | The timing wheels may need to be adjusted. (see manual) |
| | Thermo switches are damaged or out of adjustment. | The thermo switches should be adjusted or replaced by qualified personnel. |
| | The bags are too sensitive to heat. | If the bags are small (less than 6 inches wide) try sealing them in different positions across the lift bar. One side may work better for certain types of bags. |
| The bags are partially sealed. | The rubber pad is not aligned. | Make sure the rubber pad is securely held in the front and back brackets. |
| | The rubber pad is worn. | Replace the rubber pad. |
| | The teflon cloth is dirty or worn | Advance the cloth using the side adjustment knobs. If the cloth shows excessive damage, or it is at the end of its adjustment, a new teflon cloth roll assembly is necessary. |
| | The heat bar is out of alignment | The heat bar should be aligned by qualified personnel using the instructions in the manual. |
| | The heating element is failing. | A replacement element should be installed by a qualified technician. |
| The lift bar will not engage. | The micro switch is damaged or out of adjustment. | The switch should be tested by a qualified service technician and either adjusted or replaced. |
| | Toggle switch failure | The switch should be tested by a qualified service technician and replaced if necessary. |
| | The circuit board has damaged components. | The circuit board should be replaced by a qualified technician. |
| | Damaged wiring | Check the wiring from the micro switch to the circuit board. Check the wiring between the circuit board and the toggle switch. |
| The unit blows a fuse | Shorted heating element | Qualified personnel should check the wiring to and from the heating element for shorts. Repair the wiring or replace the heating element as necessary. |
| | Damaged wiring | All wiring should be inspected by qualified personnel and repaired or replaced as necessary. |
| The lift bar releases and re-engages or "Hops" | The heat bar needs adjustment. | The heat bar clearance must be adjusted by qualified personnel (see manual). |