

PARTS & SERVICE MANUAL for SG Series Hot Dog Grills



**Model SG-22 Hot Dog Grill
(Shown with SW-22 Food Warmer)**

THIS MANUAL SHOULD BE RETAINED FOR FUTURE USE

WARNING: DISCONNECT UNIT FROM POWER SOURCE BEFORE ATTEMPTING ANY SERVICE PROCEDURE

General Information: The units covered in this Parts and Service Manual, SG-18, SG-22 and SG-34, are engineered for efficient, dependable service throughout the years. Like any piece of fine equipment with moving parts and broad temperature ranges, physical wear takes its toll. When this happens, the information found in this manual will prove most helpful. Although the instructions are easy to follow, the work should be carried out by a qualified Service Technician.

General Instructions: The following instructions refer to all models in the SG Series hot dog grills. The SG-18 model will vary slightly due to having only one motor, but the parts replace instructions remain essentially the same. The right and left side of the unit is determined by facing the front (control switch) side of the grill. The left side switch controls the front 5 (#1 thru #5) rollers on the grill. The right side switch controls the rear 5 (#6 thru #10) rollers.

A Panel Removal:

1. All parts replacement procedures will require the removal of one or both side panels and/or the bottom panel.
2. To remove either side panel; remove the 8 sheet metal screws.
3. To remove the bottom panel; tilt the grill up from the front and rest on the back of the unit. Remove the 6 sheet metal screws. (SG-34 model has 10 screws)

B Control Switch Replacement:

(Figure 1, 4 & 5)

1. Remove bottom panel. (Section A)
2. Remove the 2 slotted screws and spacers securing the switch to the front panel. Note proper orientation of spacers.
3. Disconnect wire leads from switch terminals.
4. Remove switch from underside of unit.
5. Insert new switch from underside of unit and secure with the 2 slotted screws and spacers.
6. Re-attach wire leads to switch terminals. (Refer to appropriate wiring diagram)

C Power Indicator Light Replacement:

(Figure 1, 4 & 5)

1. Remove bottom panel. (Section A)
2. Disconnect the wire leads from back of light.

3. Press spring loaded tabs on back of light and push through front of panel.
4. Insert new light from front of unit and snap into place.
5. Re-attach wire leads to light terminals. (Refer to appropriate wiring diagram)

D Terminal Block Replacement:

(Figure 4 & 5)

1. Remove bottom panel and appropriate side panel. (Section A)
2. Remove the 2 screws and nuts securing the terminal block to the unit.
3. Disconnect wire leads from terminal block, noting proper orientation.
4. Secure new terminal block to unit with the 2 screws and nuts.
5. Re-attach wire leads to terminal block. (Refer to appropriate wiring diagram)

E Motor & Motor Sprocket Replacement:

(Figure 2, 3, 4 & 4)

1. Remove bottom panel and appropriate side panel. (Section A)
2. Loosen the 4 motor mounting nuts securing the motor to the unit and slide motor to loosen drive chain tension. Slip drive chain off motor sprocket (and idler sprocket on SG-18 models).
3. Disconnect wire leads from motor terminals.
4. Remove the loosened motor mounting nuts and remove motor.
5. Before installing new motor, transfer the motor fan and sprocket from the old motor to the new motor. **Note proper orientation of fan blades.** To remove the motor sprocket from the motor shaft, loosen the set screw in the sprocket with an Allen wrench, and slip sprocket off shaft. **Note proper orientation of set screws (on the flat portion of the motor shaft) and the sprocket.**
6. Secure new motor (with fan and sprocket in place) to unit with the 4 motor mounting nuts. Do **NOT** tighten nuts.
7. Place drive chain around motor sprocket (and over idler sprocket on SG-18 models).
8. Slide motor to tighten drive chain tension and tighten the 4 motor mounting nuts.
9. Re-attach wire leads to motor terminals. (Refer to appropriate wiring diagrams)

ELECTRICAL SPECIFICATIONS

MODEL	VOLTAGE	AMPS	KW
SG-18	120V	8.3	1.0
SG-22	120V	10.0	1.2
SG-34	120V	14.1	1.7

F Idler Sprocket/Idler Sprocket Screw Replacement: (For SG-18 models only)

(Figure 3 & 4)

1. Remove bottom panel and side panel. (Section A)
2. Remove nut and lock washer and screw securing idler sprocket to unit. **Note location of spacer behind idler sprocket.**
3. When installing new idler sprocket insert screw from underside of unit. Replace spacer, sprocket, lock washer and nut from motor side.
4. **NOTE:** When replacing idler sprocket on idler sprocket screw, be sure that the sprocket teeth are properly seated in drive chain.
5. Tighten idler sprocket screw and nut.

G Power Cord Replacement:

(Figure 4 & 5)

1. Remove bottom panel. (Section A)
2. Disconnect the green ground wire from the unit.
3. Disconnect the 2 wire nuts.
4. Remove the strain relief bushing with pliers. **Note proper orientation of flat and round sides of the strain relief bushing.**
5. Reverse this procedure to install new power cord. (Refer to appropriate wiring diagram)

H Individual Heating Element Replacement:

(Figure 2 & 3)

1. Remove both side panels. (Section A)
2. **ON SG-18 MODELS:** When replacing elements on this unit, remove the appropriate 5-way jumper weldment.
ON SG-22/SG-34 MODELS: When replacing element #1, 3, 5, 6, 8 or 10, remove the appropriate 3-way jumper.

ON SG-22/SG-34 MODELS: When replacing element #2, 4, 7 or 9, remove the appropriate 2-way jumper.

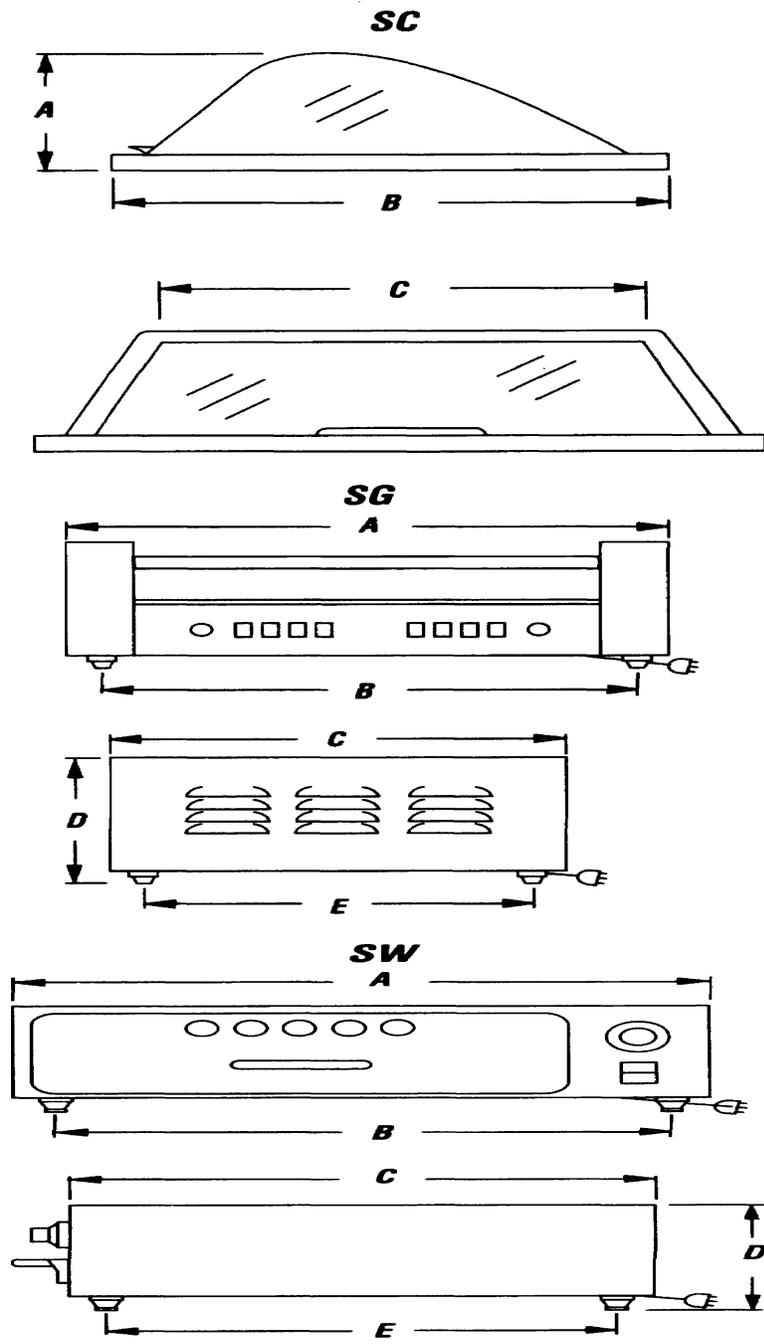
IMPORTANT: NOTE PROPER ORIENTATION OF WIRE LEADS AND POSITION OF JUMPERS.

3. On opposite end of element you are replacing, remove the screw securing it to the 5-way jumper.
DO NOT REMOVE THE 5-WAY JUMPER.
4. Slide element out of roller from the motor side of the unit.
5. Insert new element, making sure that the element terminal ends are in proper position.
6. Secure opposite end of element to 5-way jumper.
7. Replace appropriate jumper on motor side of unit.

I DRIVE CHAIN REPLACEMENT

(Figure 2 & 3)

1. Remove appropriate side panel. (Section A)
2. Loosen (but do not remove) the 4 motor mounting nuts.
3. Slide motor to loosen drive chain tension and slip chain off motor sprocket (and idler sprocket on SG-18 models).
4. Remove all jumpers on motor side of unit. (Note orientation of wire leads and proper positioning of jumpers).
5. Remove the 2 nuts and washers from the weld studs that secure the drive chain guide to the unit and remove the guide. (There are 2 chain guides on the SG-18 models).
6. Remove the drive chain.
7. When placing the new drive chain over the roller sprockets, make sure it lies flat and rests on each tooth of the roller sprockets.
8. Replace the drive chain guide(s), making sure element terminal ends are positioned properly and guide is properly seated.
9. Re-position drive chain around motor sprocket (and idler sprocket on SG-18 models). Slide motor to tighten drive chain tension and tighten the 4 motor mounting nuts.



	SG-18	SG-22	SG-34	SW-18	SW-22	SW-34
A	18/45.7	22.5/57.2	34.5/87.6	18/45.7	22.5/57.2	34.5/87.6
B	15.5/39.4	20/50.8	32/81.3	15.5/39.4	20/50.8	32/81.3
C	17/43.2	17/43.2	17/43.2	19/48.3	19/48.3	19/48.3
D	10/25.4	10/25.4	10/25.4	8.5/21.6	8.5/21.6	8.5/21.6
E	14.5/36.8	14.5/36.8	14.5/36.8	16.5/41.9	16.5/41.9	16.5/41.9
Roller length	13/33	17.5/44.5	29.5/74.9	—	—	—

J Roller Replacement

(Figure 1, 2 & 3)

1. Remove the appropriate side panel. (Section A)
2. Remove appropriate drive chain. (Section I)
3. Remove the appropriate roller retainer bar (IMPORTANT: Note proper positioning on the 4 washers (2 on each stud) located between the roller retainer bar and the wall of the unit. These washers MUST be installed in this position to achieve proper roller rotation).
4. While holding element terminal upwards to achieve clearance, slide out roller.
5. NOTE: At this stage of replacement, it is suggested that the teflon bushings be inspected for possible wear and replaced if necessary. (section K)
6. Insert new roller, holding element terminal end upwards to achieve clearance.
7. Replace roller retainer bar making sure to place the 2 washers on each weld stud before replacing retainer bar.
8. Replace drive chain. (Section I)

K Teflon Bushing Replacement

(Figure 1, 2 & 3)

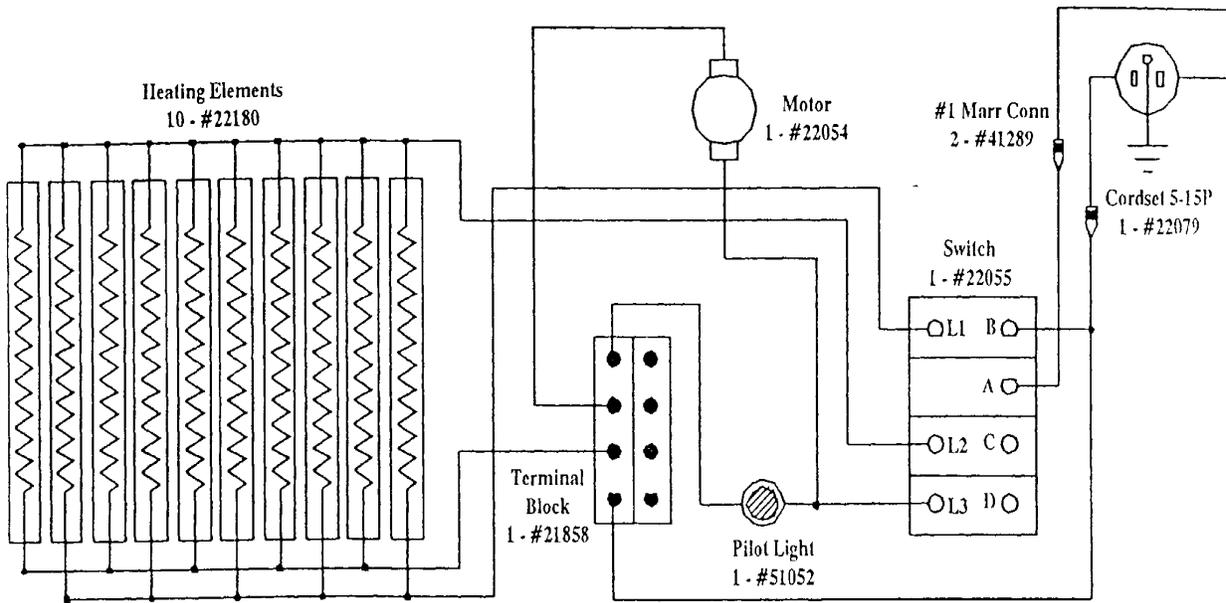
1. Remove appropriate side panel. (Section A)
2. Remove appropriate heating element. (Section H)
3. Remove appropriate drive chain. (Section I)
4. Remove appropriate roller. (Section J)
5. Working from inside (Motor) side of unit, push out bushing (Towards cooking surface of rollers) with a screw driver.
6. New bushings MUST be installed from the cooking surface side, towards the inside of the side panel. Be sure the flattened slot on the bushing is correctly positioned in opening.
7. Replace roller. (Section J)
8. Replace drive chain. (Section I)
9. Replace heating element. (Section H)

ELECTRONIC SPECIFICATIONS FOR 208V/240V MODELS

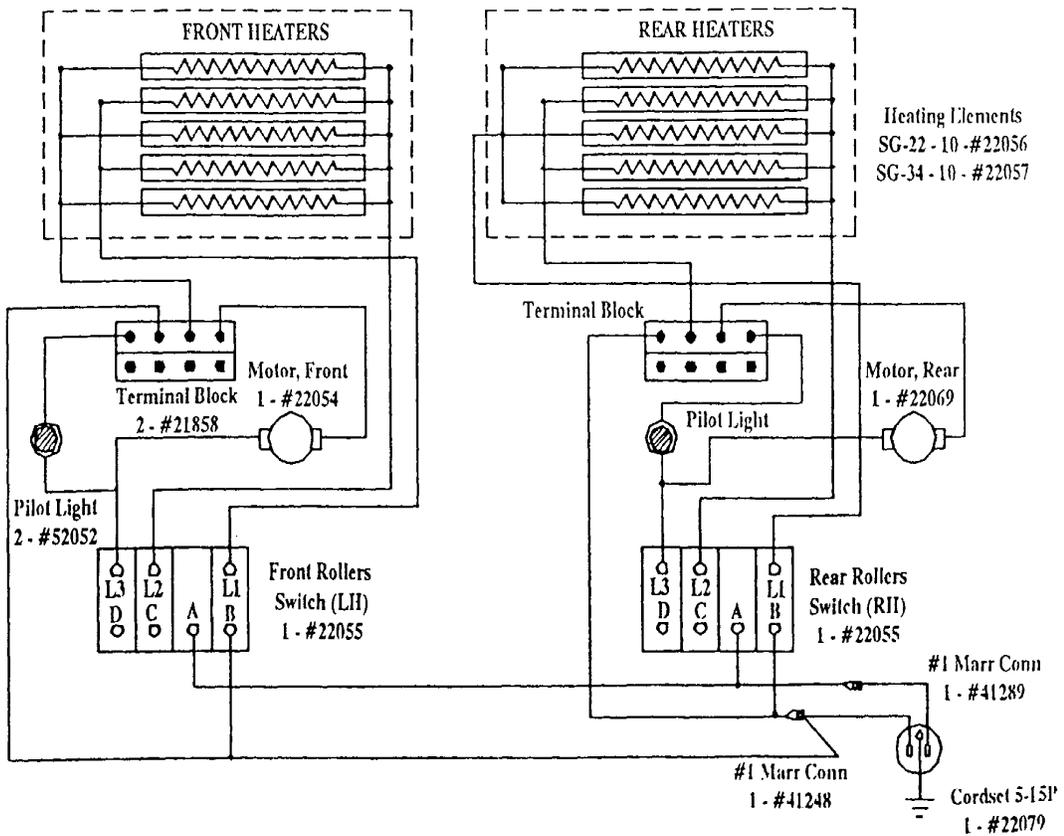
MODEL #	PRODUCT #	VOLTAGE/AMPS			KW	NET WT. * lbs/kg	SHIP WT. * lbs/kg	SHIP VOL. * cu ft/cu m
		208	208	240				
SG-18S	722009	8.3	—	—	1.0	39/17.7	45/20.4	2.6/0.07
SG-18C	722012	8.3	—	—	1.0	39/17.7	45/20.4	2.6/0.07
SG-22S	722000	10.0	—	—	1.2	47/21.3	54/24.5	3.2/0.09
SG-22C	722001	10.0	—	—	1.2	47/21.3	54/24.5	3.2/0.09
SG-34S	722003	14.1	—	—	1.7	59/26.8	70/31.4	4.8/0.14
SG-34C	722004	14.1	—	—	1.7	59/26.8	70/31.4	4.8/0.14
SW-18	722507	2.0	—	—	0.22	47/21.3	55/25.0	2.6/0.07
SW-22	722505	2.1	—	—	0.25	53/24.1	63/28.6	3.1/0.09
SW-34	722506	3.8	—	—	0.45	80/36.3	92/41.8	4.7/0.13

*Measurements are approximate

SG-18 WIRING DIAGRAM



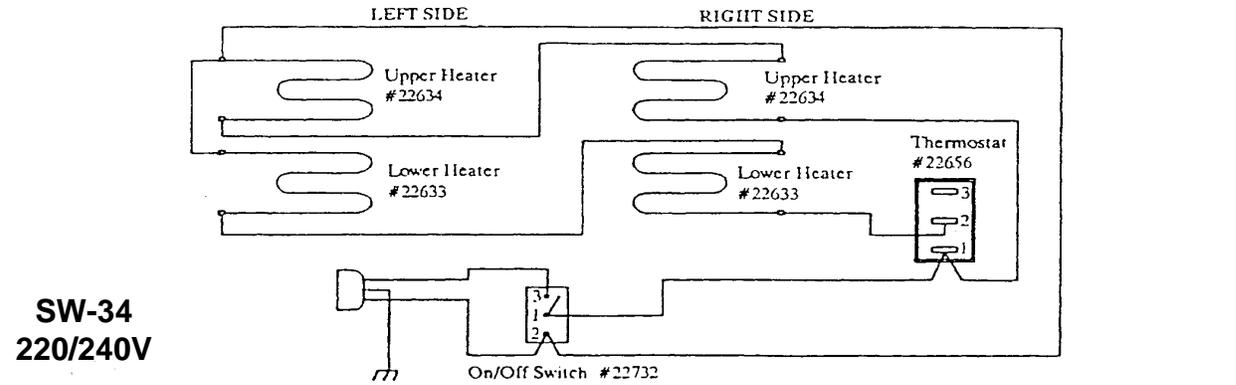
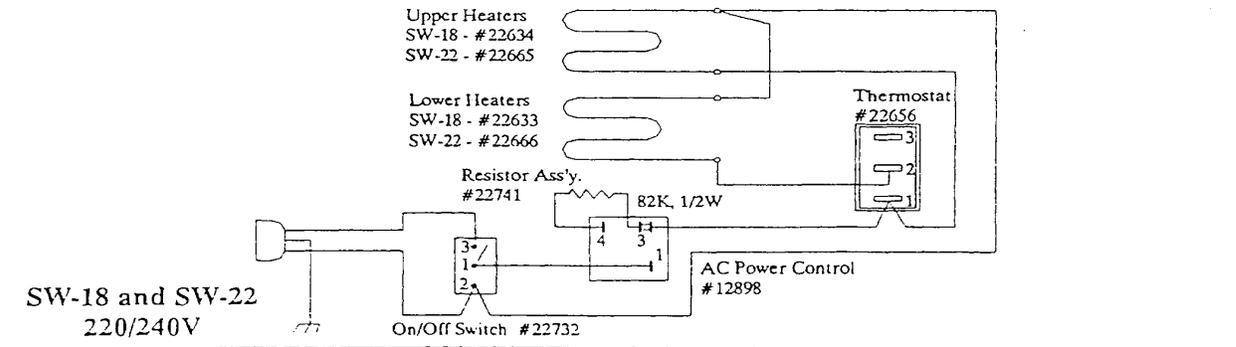
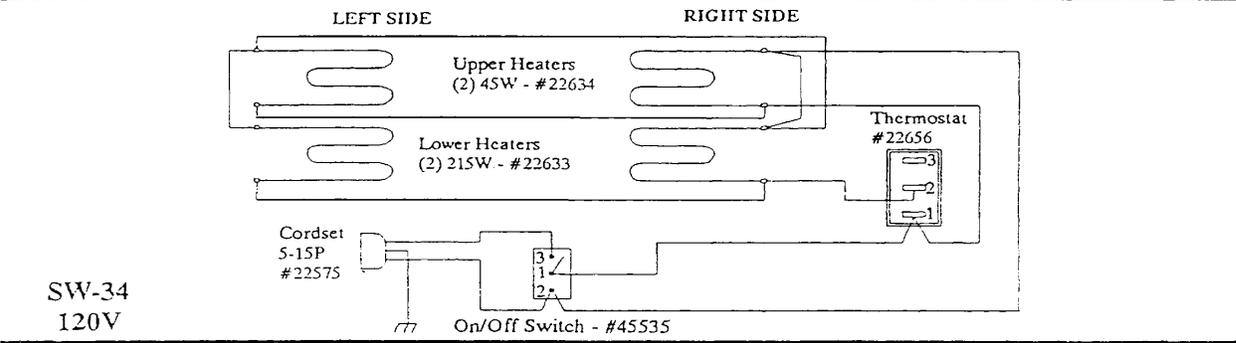
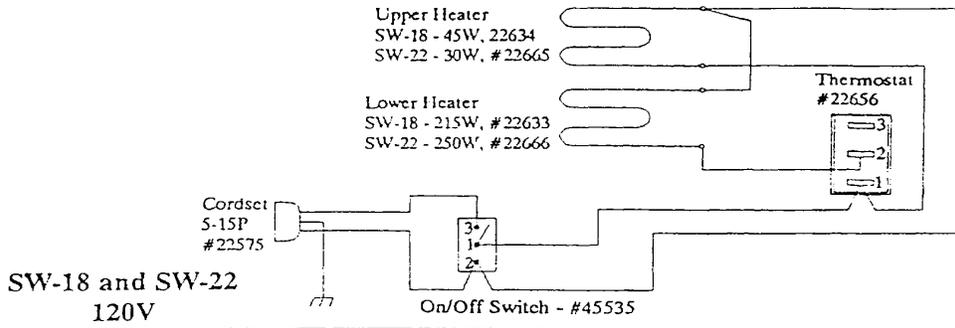
SG-22 and SG-34 WIRING DIAGRAM



TROUBLE SHOOTING

Problem	Possible Causes	Suggested Remedies
Individual roller rotates but does not get hot.	<ol style="list-style-type: none"> 1. Defective heating element. 2. Loose, defective, or improper wiring at terminal ends. 	<ol style="list-style-type: none"> 1. Replace heating element. (Section H) 2. Check for proper connection. Refer to wiring diagram.
None of the rollers rotate or get hot.	<ol style="list-style-type: none"> 1. Defective power outlet/unit not plugged in. 2. Improper wire nut connection. 3. Defective power cord. 4. Defective control switch. 5. Defective terminal block. 	<ol style="list-style-type: none"> 1. Check that unit is plugged in. Check for proper voltage at outlet. 2. Check for loose wire nut connection. 3. Replace power cord. (Section G) 4. Replace control switch. (Section B) 5. Replace terminal block. (Section D)
Rollers get hot, but do not rotate.	<ol style="list-style-type: none"> 1. Roller retainer bar improperly installed, or excessively tight. 2. Defective motor. 	<ol style="list-style-type: none"> 1. Check for proper orientation of washers on retainer bar. (Section J) 2. Replace motor. (Section E)
<p>Front 5 rollers get hot, but only #1 and #5 rotate.</p> <p style="text-align: center;">or</p> <p>Rear 5 rollers get hot, but only #6 and #10 rotate.</p>	<ol style="list-style-type: none"> 1. Drive chain improperly engaged. 2. Chain guide improperly positioned. 3. Roller retainer bar improperly installed or excessively tight. 	<ol style="list-style-type: none"> 1. Check for proper orientation of washers on retainer bar. (Section I) 2. Check for proper chain guide installation. (Section I) 3. Check for proper orientation of washers on retainer bar. (Section J)
Power indicator light does not illuminate.	<ol style="list-style-type: none"> 1. Loose or improper wiring connections. 2. Defective light. 	<ol style="list-style-type: none"> 1. Check for loose or improperly wired connections. Refer to wiring diagram. 2. Replace light. (Section C)
All components controlling either front or rear rollers not functioning.	<ol style="list-style-type: none"> 1. Defective power outlet. 2. Defective power cord. 3. Improper wire nut connection. 4. Defective control switch. 5. Defective terminal block. 	<ol style="list-style-type: none"> 1. Check for proper voltage at outlet. 2. Replace power cord. (Section G) 3. Check for loose wire nut connection. 4. Replace control switch. (Section B) 5. Replace terminal block. (Section D)

WIRING DIAGRAMS



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