



GRAND RAPIDS, MICHIGAN, U.S.A. 49504-5298

USERS OPERATING AND INSTRUCTION MANUAL

MODEL 704

BUN SLICER

704 BUN SLICER OPERATORS MANUAL
1/60/115V

SAFETY STATEMENTS.....	2
INSTALLATION.....	4
MACHINE SPECIFICATIONS.....	4
PRODUCT CAPACITIES.....	5
OPERATION	
WARNINGS.....	5
ADJUSTMENTS.....	5
OPERATING INSTRUCTIONS.....	7
MAINTENANCE	
CLEANING.....	8
LUBRICATION.....	9
CHANGING BLADE.....	9
TROUBLE SHOOTING.....	11
PARTS SECTION	
ELECTRICAL PARTS LIST.....	13
WIRING DIAGRAM.....	.0704C12002
COMPONENT LAYOUT.....	.0704C12003
MECHANICAL PARTS LIST.....	14
ASSEMBLY DRAWING.....	.0704E10000
RECOMMENDED SPARE PARTS.....	16
CLEANING KIT.....	0704S20000
WARRANTY.....	GEN 890601

SAFETY STATEMENTS

The use of the words WARNING, CAUTION, and NOTE in the manual should be guided by the following:

WARNING

Operating procedures, techniques, etc. which may result in personal injury or loss of life if not carefully followed.

CAUTION

Operating procedures, techniques, etc. which may result in damage to equipment if not carefully followed.

NOTE

An operating procedure, technique, etc. which is considered essential to emphasize.

INSTALLATION

WARNING

THE SLICER IS HEAVY. USE PROPER LIFTING TECHNIQUES, KEEP BACK STRAIGHT, KNEES BENT, AND LIFT WITH YOUR LEGS. USE GLOVES TO PROTECT YOUR HANDS.

Lift the slicer from its resting surface with one person standing on each end of the slicer. Set the slicer onto the counter or sturdy table as close as possible to its desired location. If the machine is not in its desired location, carefully slide it to that position.

Your slicer is completely assembled at the factory, but, the following checks should be made before operation:

WARNING

NEVER ATTEMPT TO ADJUST, CLEAN, OR REPAIR THE SLICER UNTIL YOU FIRST DISCONNECT IT FROM THE POWER SUPPLY.

Remove the blade guard by loosening the three knobs which secure it, (these knobs should not be removed completely to prevent their loss), the guard can then be removed by lifting it upward.

WARNING

ALWAYS USE CARE WHEN WORKING NEAR THE BLADE

Check the blade for freedom of movement. In addition, make sure the chute is free of any obstructions such as packing material, etc. Replace the blade guard and check all hand knobs and fasteners for tightness.

WARNING

ALTHOUGH YOUR SLICER IS NOW READY FOR USE, IT IS IMPORTANT THAT ALL OPERATORS READ THE REST OF THIS MANUAL BEFORE ATTEMPTING TO OPERATE THE SLICER.

SPECIFICATIONS

The Model #704 Bun Slicer with its all stainless steel and aluminum construction and NSF (National Sanitation Foundation) approval is a durable slicer for counter-top use in slicing a variety of buns with speed and economy.

Weight-----110 lbs. approximately
Standard Electrical Service-----1/2 hp 1-60-115v.
Optional Electrical Service-----Consult Factory
Height-----31"
Length-----34"
Width-----17-3/4"

PRODUCT CAPACITIES

Complete Sever Cut

Max width & length	6"
Max height	3"

OPERATION

WARNINGS

Do not operate this machine without all guards in position or without reading this entire manual.

Never clean, service, or make adjustments to the machine until you are SURE that the blade has stopped.

Never clean, service, or make adjustments to the machine until it has been disconnected from the power supply, to prevent accidental start-ups.

Always unplug the slicer when it is not in use.

If a product should jam the machine NEVER clear it with your hands, instead, turn the machine off, disconnect it from the power supply and wait until you are sure that blade rotation has stopped. Then clear the machine by using some type of flat instrument (wood or plastic preferred).

Always make sure the blade is not rubbing or hitting any components before re-starting the machine.

ADJUSTMENTS (SEE WARNINGS)

1. Adjusting Blade Height

Blade height can be adjusted from approximately 3/8 to 1-1/8 as measured between the center line of the blade and the top of the table on the standard machine. This adjustment is made by first loosening the table locking knob on the corner of the frame. The height can then be adjusted by turning the knob which is perpendicular to the bottom of the table clockwise to decrease the distance between the table and blade, counter-clockwise to increase that distance. There is a pointer and scale on the side of the frame to aid height selection.

2. Adjusting Outside Guide

Adjustment of the outside guide will allow you to control the depth of cut into the bun. By loosening the two adjustment knobs, those perpendicular to the bottom of the table, and sliding the guide in towards the blade as far as it will go, you should be able to achieve a complete sever of your product. Tighten the adjustment knobs when the guide is in the desired location.

CAUTION

ALWAYS MAKE SURE THERE IS NO INTERFERENCE BETWEEN METAL COMPONENTS I.E., BLADE AND OUTSIDE GUIDE BEFORE RE-STARTING THE MACHINE.

Movement of the guide away from the blade will generate a "hinge" of uncut product. A hinge of 3/4" or more can be achieved.

3. Adjusting Inside Guide

Generally it is best to leave the inside guide set to its maximum opening, as this will allow the product to pass through uninhibited for maximum slicing speed. However, some products will require its use to reduce jamming, product hop, and spin. If this seems necessary, loosen the two adjustment knobs, those perpendicular to the table, and slide the guide in to conform with product width. Make a liberal adjustment to allow for product variances. Retighten the knobs to secure the guide in this desired position.

4. Adjusting the Bun Stop

The primary function of the Bun Stop is to close off the side from which you DO NOT want to load the machine. By loosening the knob, the stop can be moved in or out to match the placement of the side guide, thus preventing jamming at the top of the chute. To change the side from which you are able to load the machine, remove the adjusting knob completely, remove the stop and reposition it on the opposite side of the chute in line with the side guide. Replace and tighten the knob to secure the stop in place.

5. Adjusting Discharge Door

On the discharge end of the chute you will find a small adjustable door used to slow the product as it exits the blade. Generally heavier products require a lower door setting while lighter products require less restriction. The door is raised by turning the knob in a clockwise direction. Turning the screw in the opposite direction will lower the door. Slicing a few buns is the best way to determine if this door is correctly set.

OPERATING INSTRUCTIONS (SEE WARNINGS)

Slicing Product

After the adjustments are made you are ready to begin slicing. Start the motor by turning the on-off switch to the "ON" position. Insert the product through the opening at the top of the chute and allow it to slide down the chute into the blade.

WARNING

IF THE BUNS RESIST SLIDING FREELY INTO THE BLADE NEVER STICK YOUR HAND INTO THE CHUTE TO AID THEM.

If the buns resist sliding down the chute (see warning) the following things could be done to aid them.

- A) Add additional buns to advance the first into slicing position.
- B) Add a little flour or corn meal to the top surface of the table to aid bun movement.

WARNING

IF A BUN SHOULD JAM IN THE MACHINE, NEVER ATTEMPT TO CLEAR IT WITH YOUR HANDS; INSTEAD USE A FLAT INSTRUMENT (WOOD OR PLASTIC PREFERRED).

Should the sliced bun stop under the discharge door, the second bun through the blade will generally dislodge it. If this does not happen, re-adjust the door (see adjustment section) to decrease its slow down effect.

MAINTENANCE

CLEANING

The Oliver Model #704 Bun Slicer is designed for ease of cleaning. All surfaces excluding the base and its components can be easily disassembled by hand for washing. Follow these steps to clean your machine:

WARNING

NEVER ATTEMPT TO CLEAN OR SERVICE THIS MACHINE UNTIL IT HAS BEEN DISCONNECTED FROM THE POWER SUPPLY AND YOU ARE SURE THE BLADE HAS STOPPED.

1. Remove the overhead guard and outside guide assembly by loosening the two adjustment knobs, (those perpendicular to the bottom of the table). The assembly can then be totally removed from the machine.
2. The overhead guard assembly can be further disassembled by removing the two remaining hand knobs which allow separation of the outside guide, overhead guard and mounting brackets. The overhead guard and discharge door can be separated by removing the hair pin which will then allow removal of the hinge pin and thus disassembly. At this point all components can be washed in a mild soap solution.
3. By loosening (do not toally remove) the three hand knobs securing the blade guard and then lifting upward on the guard, it also can be removed for washing.

WARNING

USE CARE WHEN EVER WORKING AROUND THE BLADE.

4. The inside guide can be removed by loosening the adjustment knobs, (those perpendicular to the top of the table), and carefully sliding the guide out away from the blade until it is free of the mounting brackets, and can be removed. By removing the two remaining knobs it also can be disassembled for washing.

CAUTION

THE BASE, BECAUSE OF ITS ELECTRICAL COMPONENTS, SHOULD **NEVER** BE DISASSEMBLED OR IMMERSSED IN LIQUIDS FOR CLEANING.

5. The base's surfaces should be cleaned with a mild soap solution and wiped dry. For your convenience a cleaning kit has been provided: The first component is a disk which should be installed over the blade to protect you against inadvertent injury while cleaning in that area. The second component is a bottle brush to be used for cleaning beneath the blade.
6. After washing and drying, the machine can be reassembled.

WARNING

NEVER ATTEMPT TO USE THE MACHINE WITHOUT REPLACING ALL GUARDS TO THEIR PROPER POSITION.

LUBRICATION

CAUTION

NEVER OIL OR GREASE THE MOTOR.

No lubrication is required on your Model #704 Bun Slicer. The motor is equipped with pre-lubricated sealed bearings which require NO lubrication, (See Caution). All other moveable components, because of their low frequency and speed of movement, also do NOT require greasing or oiling.

CHANGING BLADE

WARNING

NEVER ATTEMPT TO CLEAN OR SERVICE THIS MACHINE UNTIL IT HAS BEEN DISCONNECTED FROM THE POWER SUPPLY AND YOU ARE SURE THE BLADE HAS STOPPED.

1. Remove the overhead guard assembly as described under the cleaning instructions, by loosening the two adjustment knobs and sliding the assembly out and free of the machine.
2. Remove the blade guard by loosening the three hand knobs securing it and lifting it off the machine.

WARNING

USE CARE WHENEVER WORKING AROUND THE BLADE.

3. Remove the inside guide by loosening its adjustment knobs and sliding it free of the machine as described under cleaning.
4. At this point the three screws securing the blade can be removed allowing removal of the blade. Replacement of the blade can be done by reversing the preceding steps.
5. When re-installing the blade, make sure that the points on the teeth are pointed in the opposite direction as the rotation of the blade, which is clockwise when looking at the shaft end of the motor.

TROUBLE SHOOTING

WARNING

TROUBLE SHOOTING OF ELECTRICAL COMPONENTS SHOULD BE PERFORMED BY QUALIFIED PERSONNEL ONLY. ELECTRICAL POTENTIAL IS GREAT ENOUGH TO CAUSE INJURY OR DEATH.

PROBLEM #1

Motor does not run and the pilot light is not on.

Possible Causes:

1. Is the machine plugged in to an appropriate outlet?
2. Is the outlet working? Test with another working, small appliance such as a lamp.
3. Check the pilot light for a bad neon lamp. Replace if necessary.
4. If power is available, check the rocker switch contacts for continuation of power. Replace if necessary.
5. If power is present at the switch, check the timer module for continuity through the normally closed contacts (between pins 1 and 2). Replace if necessary.

PROBLEM #2

Motor does not run and the pilot light is on.

Possible Causes:

1. Your slicer is furnished with a manual reset thermal overload. Should the motor become overheated and stop, turn the switch "OFF" and allow the motor to cool for approximately five minutes, then reset the overload by pressing the red button on the case of the motor.
2. Turn the slicer "ON", then "OFF". Listen for the hum of the electronic brake engaging the motor, (for approximately 3 seconds), then a click as the relays de-energize. If this is heard, continue with cause 5. If nothing is heard, continue with causes 3, 4, & 5, in that order.
3. Check for voltage on the motor leads: If there is voltage to the motor, repair or replace the motor. If there is no voltage present at the motor, continue with cause 4.
4. Check the "1CR" relay to see if its coil is getting voltage. (check the contacts to see if they are closed).

5. Check "2CR" contacts to see if the normally closed contacts are closed.

NOTE: Before proceeding you must check for 12VDC power on the motor leads. There should be 12VDC present for about 3 seconds only after turning the rocker switch to the "OFF" position.

PROBLEM #3

Motor runs, but there is little or no braking, and there is 6VDC (or less) at the motor leads.

Possible Cause:

1. Check for defective bridge rectifier. Replace if necessary.

PROBLEM #4

Motor runs, but there is little or no braking, and no 12VDC voltage at the motor leads. (See note before Problem #3).

Possible Causes:

1. Check relay 2CR for proper operation. Replace if necessary.
2. Check for 12VDC on the secondary side of the transformer. Replace if necessary.

PROBLEM #5

Motor stops after switch is turned "OFF", but humming continues and pilot light does not go off.

CAUTION

DO NOT ALLOW MOTOR TO CONTINUE HUMMING AS THE MOTOR COULD BE DAMAGED THROUGH OVERHEATING. DISCONNECT FROM POWER SUPPLY.

Possible Cause:

1. Check the timing module for proper function. Replace if required.

ELECTRICAL PARTS BREAKDOWN
 STD. 1/2HP 1-60-115
 MODEL #704 BUN SLICER

ITEM NO.	QTY/MACHINE	ITEM DESCRIPTION	PART NO.
1	1	COVER BOX	0704-0019
2	1	BOX-CONTROL	0704-0018-1
3	1	RELAY-POWER SPDT	5749-8045
4	1	RELAY-POWER DPDT	5749-8046
5	1	TRANSFORMER	5760-3070
6	2	STRAIN RELIEF BUSHING	5765-1070
7	1	BLOCK-TERMINAL	5770-7335
8	1	MARKER	5770-7325
9	1	TIME DELAY RELAY	5749-6077
10	1	RECTIFIER	5749-0011
11	1	CORD/PLUG	0704-0021
12	1	RESISTOR-TIMING (5.5 SECONDS)	0704-0023-002

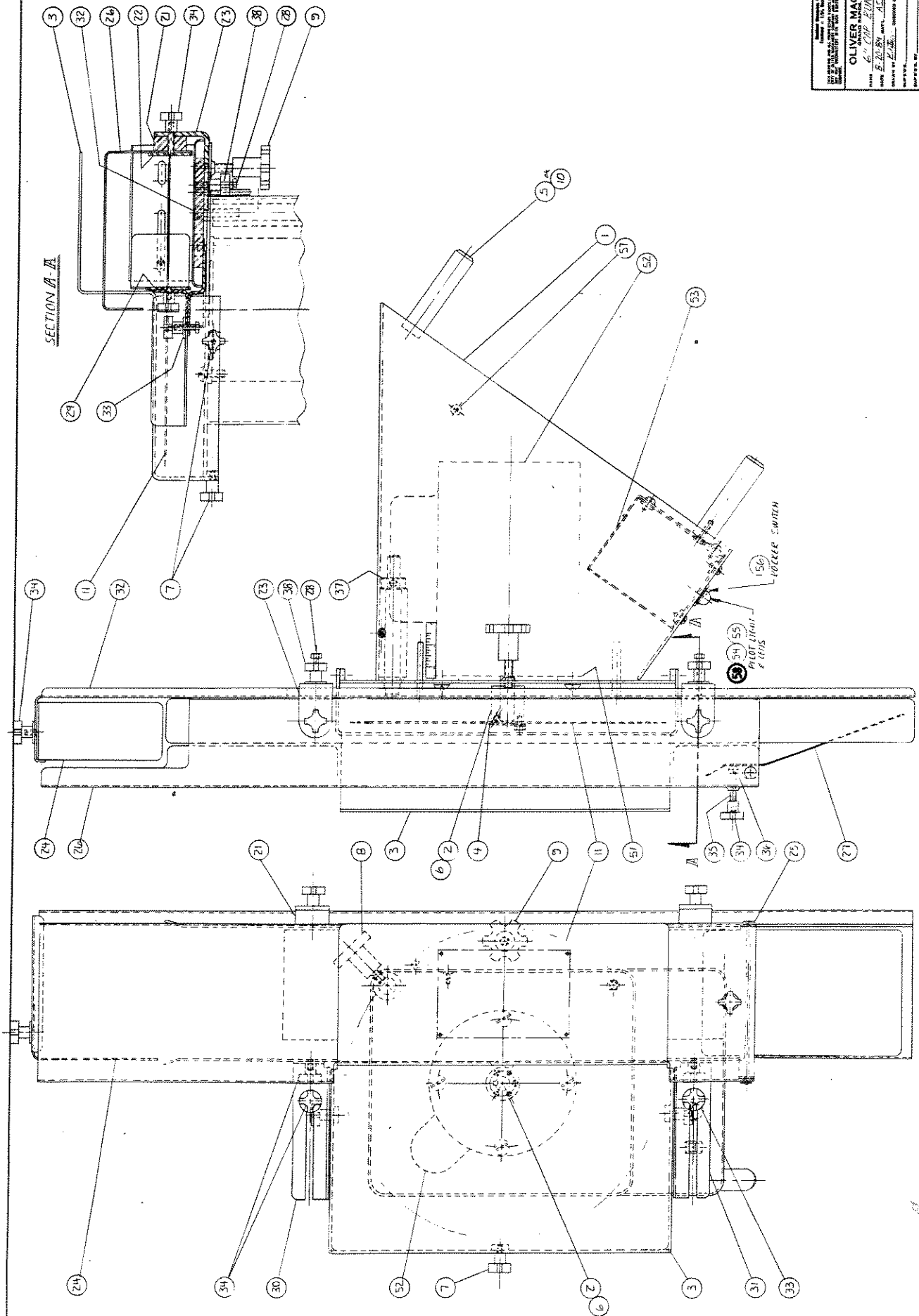
MECHANICAL PARTS LIST
 STD. 1/2 HP 1-60-115
 MODEL 704 BUN SLICER

<u>ITEM NO.</u>	<u>QTY/MACHINE</u>	<u>ITEM DESCRIPTION</u>	<u>PART NO.</u>
1	1	FRAME	0704-0001
2	1	ADAPTER-BLADE	0704-0002
3	1	GUARD-TOP	0704-0003
4	1	COVER-ARBOR HOLE	0704-0004
5	4	LEG	0704-0005
6	1	KEY 3/16SQ X 1-1/2	4384-0606-15
7	3	SCREW-CLAMP	4560-2508-1107
8	1	SCREW-CLAMP	4560-2512-1111
9	1	SCREW-CLAMP	4560-2512-1112
11	1	BLADE-72 TOOTH	7107-7051
21	2	SPACER-SIDE GUIDE	0700-0006
22	1	GUIDE-OUTSIDE	0704-0006
22	1	GUIDE-OUTSIDE (END LOAD)	0704-0006-001
23	2	BRACKET-OUTSIDE GUIDE	0704-0007
24	1	STOP-BREAD	0704-0008
25	1	PIN-CLEVIS	0704-0009
26	1	GUARD-OVERHEAD	0704-0010
26	1	GUARD-OVERHEAD (END LOAD)	0704-0010-001
27	1	PLATE-STOP	0704-0011
28	2	SCREW-SPECIAL	0704-0012
29	1	GUIDE INSIDE	0704-0013
29	1	GUIDE INSIDE (END LOAD)	0704-0013-001
30	1	BRACKET-SIDE GUIDE RH	0704-0014-0001
31	1	BRACKET-SIDE GUIDE LH	0704-0014-0002
32	1	TABLE	0704-0015
32	1	TABLE - (END LOAD)	0704-005-001
33	2	WASHER-SPECIAL	0704-0016
34	8	KNOB-STAR NUT	4460-1808-1101
35	1	STUD 1/4-20X2	4625-3608-02
36	1	CAP-NEOPRENE	5106-8920
37	1	5/8 SET COLLAR	5806-7056
38	2	KNOB-STAR NUT	5911-7043

<u>ITEM NO.</u>	<u>QTY/MACHINE</u>	<u>ITEM DESCRIPTION</u>	<u>PART NO.</u>
51	1	PLATE-MOTOR SPACER	0704-0017
*52	1	MOTOR ASSY 1/2 HP 1-60-115	0704-0020
*53	1	MODULE-ELECTRICAL CONTROL	0704-25004
54	1	LIGHT-INDICATOR	5709-0179
55	1	CAP-LENS	5709-0185
56	1	SWITCH-ROCKER	5757-3301
57	1	CLAMP-CORD	5765-4232
58	1	BULB	5737-1040

NOTES:

1. (*) THESE COMPONENTS ARE PARTIALLY WIRED SUB-ASSEMBLIES. IN SOME CASES COMPONENTS OF THESE SUB-ASSEMBLES CAN BE FOUND IN THE ELECTRICAL PARTS BREAKDOWN PRECEDING THIS PAGE.
2. ITEMS NOT IDENTIFIED ON THIS SHEET OR DRAWING ARE STANDARD HARDWARE ITEMS WHICH MAY BE PURCHASED LOCALLY.



RECOMMENDED SPARE PARTS

<u>PART NO.</u>	<u>PART DESCRIPTION</u>	<u>NO REQ'D</u>
4560-2508-1107	SCREW-CLAMP (TOP GUARD)	3
4560-2512-1111	SCREW-CLAMP (TABLE LOCKING)	1
4560-2512-1112	SCREW-CLAMP (TABLE ADJ.)	1
7107-7051	BLADE-72 TOOTH	1
0704-0009	PIN-CLEVIS	1
4460-1808-1101	KNOB-STAR	6
5106-8920	CAP-NEOPRENE	1
5749-8045	RELAY-POWER SPDT (115V)	1
5749-8046	RELAY-POWER DPDT (115V)	1
5749-6077	RELAY-TIME DELAY (115V)	1
0704-0021	CORD-PLUG (115V)	1
5709-0180	LIGHT INDICATOR (115V)	1
5749-8047	RELAY-POWER SPDT (230V)	1
5749-8048	RELAY-POWER DPDT (230V)	1
5749-6078	RELAY-TIME DELAY (230V)	1
0704-0021-001	CORD-PLUG (230V)	1
5709-0181	LIGHT-INDICATOR (230V)	1
5709-0185	CAP-LENS	1
5757-1030	LAMP-NEON	1
5737-3301	SWITCH-ROCKER	1
5760-3070	TRANSFORMER	1
5749-0011	RECTIFIER	1

OPTIONAL:

6301-3635	MOTOR 1/2 HP 1-60-115/230	1
-----------	---------------------------	---

CLEANING KIT

WARNING

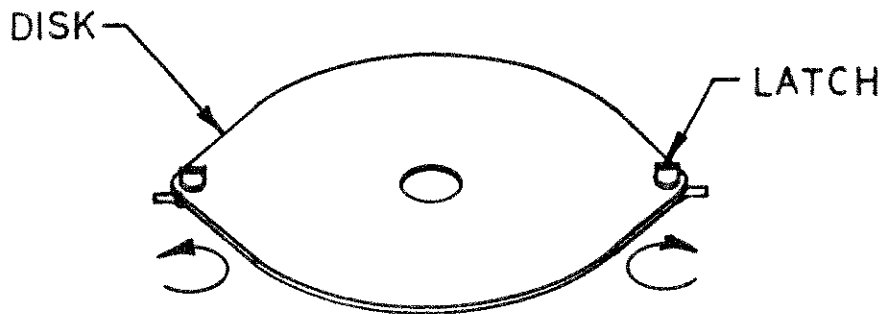
ALWAYS DISCONNECT THIS MACHINE FROM THE POWER SUPPLY BEFORE SERVICING OR CLEANING. READ YOUR OPERATION MANUAL BEFORE ATTEMPTING TO CLEAN OR OPERATE THIS MACHINE.

INSTALLATION OF PROTECTIVE DISK

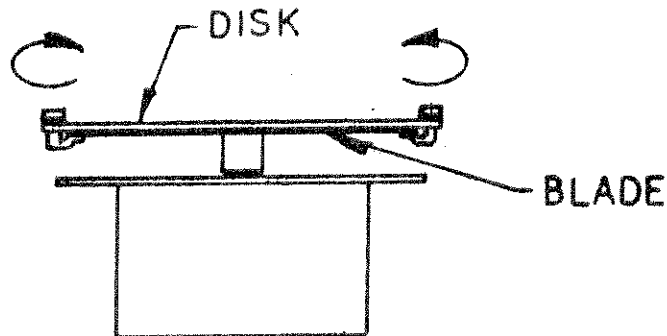
NOTE

SEE CLEANING SECTION IN YOUR MANUAL.

To avoid inadvertent injury while cleaning beneath the blade with the bottle brush, provided, install the protective disk over the blade as shown.



Twist latches open as shown, then place over blade.



Twist latches closed to hold the protective disk in place while cleaning around the blade.

WARRANTY

PARTS

Oliver Products warrants that if any part of the equipment (other than a part not manufactured by Oliver) proves to be defective (as defined below) within one year after shipment, and if Buyer returns the defective part to Oliver within one year, Freight Prepaid Oliver's plant in Grand Rapids, MI, then Oliver shall, at Oliver's option, either repair or replace the defective part, at Oliver's expense.

LABOR

Oliver Products further warrants that equipment properly installed in accordance with our special instructions, which proves to be defective in material or workmanship under normal use within ninety (90) days from installation or six (6) months from actual shipment date, whichever date comes first, will be repaired by Oliver Products Company or an Oliver Authorized Service Dealer, in accordance with Oliver's published Service Schedule.

For purposes of this warranty, a defective part or defective equipment is a part or equipment which is found by Oliver to have been defective in materials or workmanship, if the defect materially impairs the value of the equipment to Buyer. Oliver has no obligation as to parts or components not manufactured by Oliver, but Oliver assigns to Buyer any warranties made to Oliver by the manufacturer thereof.

This warranty **does not** apply to:

1. Damage caused by shipping or accident.
2. Damage resulting from improper installation or alteration.
3. Equipment misused, abused, altered, not maintained on a regular basis, operated carelessly, or used in abnormal conditions.
4. Equipment used in conjunction with products of other manufacturers unless such use is approved by Oliver Products Company in writing.
5. Periodic maintenance of equipment, including but not limited to lubrication, blade replacement, worn blades and other adjustments required due to installation, set up, or normal wear.
6. Losses or damage resulting from malfunction.

THIS WARRANTY IS NOT EFFECTIVE UNLESS THE INSTALLATION /WARRANTY REGISTRATION HAS BEEN COMPLETED, SIGNED AND RETURNED TO OLIVER PRODUCTS COMPANY WITHIN 15 DAYS FROM DATE OF INSTALLATION.

The foregoing warranty is in lieu of all other warranties expressed or implied AND OLIVER PRODUCTS MAKES NO WARRANTY OF MERCHANTABILITY OR FITNESS FOR PURPOSE REGARDING THE EQUIPMENT COVERED BY THIS WARRANTY. Oliver Products neither assumes nor authorizes any person to assume for it any other obligations or liability in connection with said equipment. OLIVER PRODUCTS SHALL NOT BE LIABLE FOR LOSS OF TIME, INCONVENIENCE, COMMERCIAL LOSS, INCIDENTAL OR CONSEQUENTIAL DAMAGES.

SLICER WARRANTY PROCEDURE

1. The warranty card must be sent to Oliver Products Company by either the dealer or the end user, within 15 days of installation.
2. If a problem should occur, either the dealer or the end user should call the Customer Service Department and explain the problem.
3. The Customer Service Manager will determine over the phone if the warranty will apply to this particular problem.
4. If the Customer Service Manager approves, he will have the appropriate service agency perform the service.
5. The service dealer will then have to fill out the "Oliver Products Warranty Invoice" and send it to the Customer Service Department.
6. The "Oliver Products Warranty Invoice" will be reviewed and approved for payment by the Customer Service Manager and the Product Marketing Manager for Slicers. They will also analyze the returned parts.