

Owner's Manual & Safety Instructions

Save This Manual Keep this manual for the safety warnings and precautions, assembly, operating, inspection, maintenance and cleaning procedures. Write the product's serial number in the back of the manual near the assembly diagram (or month and year of purchase if product has no number). Keep this manual and the receipt in a safe and dry place for future reference.

21e

PORTLAND™

ELECTRIC CHIPPER SHREDDER



69293

Visit our website at: <http://www.harborfreight.com>
Email our technical support at: productsupport@harborfreight.com

When unpacking, make sure that the product is intact and undamaged. If any parts are missing or broken, please call 1-888-866-5797 as soon as possible.

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No portion of this manual or any artwork contained herein may be reproduced in any shape or form without the express written consent of Harbor Freight Tools. Diagrams within this manual may not be drawn proportionally. Due to continuing improvements, actual product may differ slightly from the product described herein. Tools required for assembly and service may not be included.

⚠ WARNING





Read this material before using this product. Failure to do so can result in serious injury.
SAVE THIS MANUAL.

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WARNING SYMBOLS AND DEFINITIONS

	This is the safety alert symbol. It is used to alert you to potential personal injury hazards. Obey all safety messages that follow this symbol to avoid possible injury or death.
 DANGER	Indicates a hazardous situation which, if not avoided, will result in death or serious injury.
 WARNING	Indicates a hazardous situation which, if not avoided, could result in death or serious injury.
 CAUTION	Indicates a hazardous situation which, if not avoided, could result in minor or moderate injury.
NOTICE CAUTION	Addresses practices not related to personal injury.

IMPORTANT SAFETY INSTRUCTIONS

WARNING

When using electric gardening appliances, basic safety precautions should always be followed to reduce the risk of fire, electric shock, and personal injury, including the following:


READ ALL INSTRUCTIONS

Power Cord Safety



WARNING! - To reduce the risk of electric shock, use only with an extension cord intended for outdoor use, such as an extension cord of cord type

SW-A, SOW-A, STW-A, STOW-A, SJW-A, SJOW-A, SJTW-A. or SJTOW-A.

1. Ground Fault Circuit Interrupter (GFCI) protection should be provided on the circuit(s) or outlet(s) to be used for the gardening appliance. Receptacles are available having built-in GFCI protection and may be used for this measure of safety.
2. Do not Abuse Cord - Do not carry appliance by cord or yank it to disconnect from receptacle. Keep cord from heat, oil, and sharp edges.
3. To reduce the risk of electric shock, this appliance has a polarized plug (one blade is wider than the other) and will require the use of a polarized extension cord. The appliance plug will fit into a polarized extension cord only one way. If the plug does not fit fully into the extension cord, reverse the plug. If the plug still does not fit, obtain a correct polarized extension cord. A polarized extension cord will require the use of a polarized wall outlet. This plug will fit into the polarized wall outlet only one way. If the plug does not fit fully into the wall outlet, reverse the plug. If the plug still does not fit, contact a qualified electrician to install the proper wall outlet. Do not change the equipment plug, extension cord receptacle, or extension cord plug in any way. This design is referred to as double-insulated, indicated by .

Power Cord Safety (cont.)

4. **Extension Cord** - Make sure your extension cord is in good condition. When using an extension cord, be sure to use one heavy enough to carry the current your product will draw. An undersized extension cord will cause a drop in line voltage resulting in loss of power and overheating.

Extension Cord Size

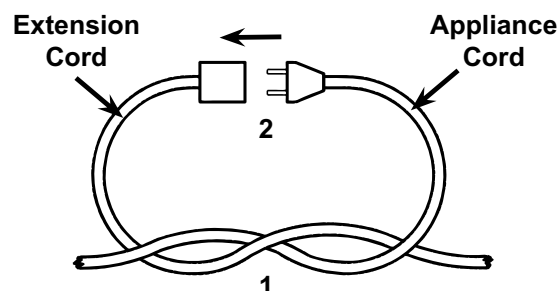
The following table shows the correct cord size to use depending on cord length and nameplate ampere rating. If in doubt, use the next heavier gauge. The smaller the gauge number, the heavier the cord.

TABLE A – MINIMUM WIRE GAUGE FOR EXTENSION CORDS (120 VOLT)				
Ampere Rating (at full load)	EXTENSION CORD LENGTH			
	25'	50'	100'	150'
0 – 6	18	16	16	14
6 – 10	18	16	14	12
10 – 12	16	16	14	12
12 – 16	14	12	Not recommended	

Connecting Cords


To reduce the risk of the cords pulling apart during operation, do one of the following:

- a. Make a knot as shown below then connect the cords:



- b. Or, use a plug-receptacle retaining strap or connector designed to hold extension cords to appliance cords.

Personal Safety

1. **Dress Properly** - Do not wear loose clothing or jewelry. They can be caught in moving parts. Use of rubber gloves and substantial footwear is recommended when working outdoors. Wear protective hair covering to contain long hair.
2.  Wear ANSI-approved safety goggles and heavy-duty work gloves. Use face or dust mask if operation is dusty.
3. **Avoid Unintentional Starting** - Do not carry plugged-in appliance with finger on switch. Be sure switch is off when plugging in.
4. **Do not Overreach** - Keep proper footing and balance at all times.
5. **Stay Alert** - Watch what you are doing. Use common sense. Do not operate appliance when you are tired.

Gardening Appliance Use and Care

1. **Avoid Dangerous Environment** - Do not use appliances in damp or wet locations.
2. **Do not Use In Rain.**
3. **Keep Children Away** - All visitors should be kept at a distance from work area.
4. When servicing use only identical replacement parts.
5. Before Starting the Chipper/Shredder, make sure that the hopper inlet is empty.
6. Keep your face and body away from the Hopper opening.
7. Stay clear of the discharge area. Keep body and hands away from the discharge chute.
8. Do not put your hands into the hopper opening while the unit is running. Use the paddle to push objects into the hopper.
9. Before feeding material into the shredder, remove any metal, rocks, bottles, cans or other foreign objects that may damage blades.
10. **Use Right Appliance** - Do not use appliance for any job except that for which it is intended.
11. **Do not Force Appliance** - It will do the job better and with less likelihood of injury at the rate for which it was designed.
12. **Store Idle Appliances Indoors** - When not in use, appliances should be stored indoors in dry, and high or locked-up place - out of reach of children.

13. **Maintain Appliance With Care** - Keep cutting edge sharp and clean for best performance and to reduce the risk of injury. Follow instructions for lubricating and changing accessories. Inspect appliance cord periodically, and if damaged, have it repaired by an authorized service facility. Inspect extension cords periodically and replace if damaged. Keep handles dry, clean, and free from oil and grease.
14. **Check Damaged Parts** - Before further use of the appliance, a guard or other part that is damaged should be carefully checked to determine that it will operate properly and perform its intended function. Check for alignment of moving parts, binding of moving parts, breakage of parts, mounting, and any other condition that may affect its operation. A guard or other part that is damaged should be properly repaired or replaced by a qualified technician unless indicated elsewhere in this manual.
15. **Disconnect Appliance** - **Disconnect the appliance from the power supply when not in use, before servicing, when changing accessories such as blades, and the like.**
16. **Keep guards in place and in working order.**
17. **Keep blades sharp.**
18. **Keep clear of intake and discharge chute. Use included push stick. Unplug unit and allow it to stop before unclogging.**

General Safety

1. Do not use appliance for other than intended use.
2. Maintain labels and nameplates on the appliance. These carry important safety information. If unreadable or missing, contact Harbor Freight Tools for a replacement.
3. The warnings, precautions, and instructions discussed in this instruction manual cannot cover all possible conditions and situations that may occur. It must be understood by the operator that common sense and caution are factors which cannot be built into this product, but must be supplied by the operator.



SAVE THESE INSTRUCTIONS.

Specifications

Electrical Rating	120VAC / 60Hz / 14A
Blade Speed	4,300 RPM
Blade Diameter	7"
Maximum Limb Capacity	1-1/2" Diameter

SAFETY

SETUP

OPERATION

MAINTENANCE

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Set Up Instructions



Read the **ENTIRE IMPORTANT SAFETY INSTRUCTIONS** section at the beginning of this manual including all text under subheadings therein before set up or use of this product.

⚠ WARNING

TO PREVENT SERIOUS INJURY FROM ACCIDENTAL OPERATION:

Turn the Power Switch of the appliance to its “OFF” position and unplug the appliance from its electrical outlet before assembling or making any adjustments.

Note: For additional information regarding the parts listed in the following pages, refer to the Assembly Diagram near the end of this manual.

Assembly

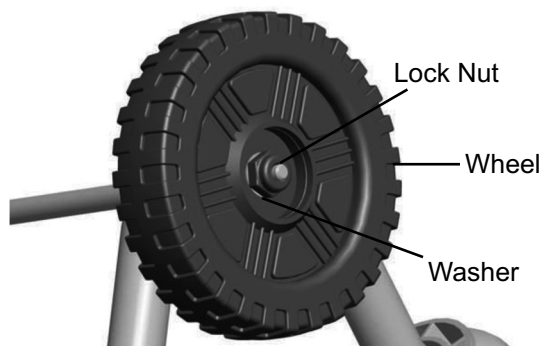
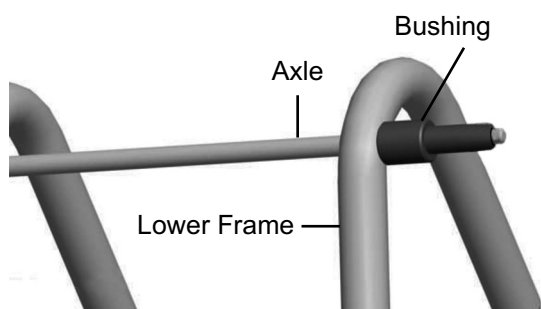


Figure A:

1. Slide the Axle through the holes in the Lower Frame.
2. Slide a Bearing, a Bushing, a Wheel and a Washer onto one end of the Axle.
3. Tighten in place with a Lock Nut.
4. Repeat steps 2 and 3 on the other end of the Axle.



Figure B:

5. Press the Wheel Covers onto the Wheels, over the Lock Nuts, using a rubber mallet (sold separately) to lightly tap them in place if needed.

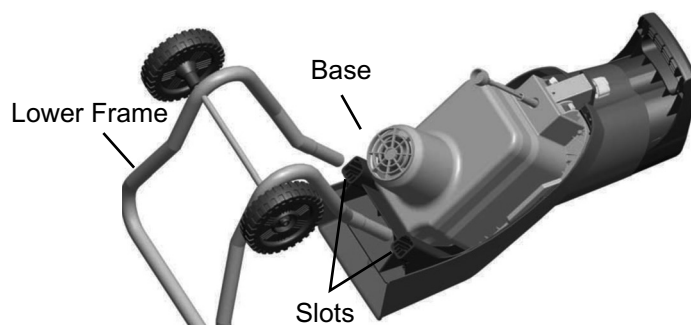


Figure C:

6. Turn the Chipper/Shredder upside down and slide the Lower Frame ends into the slots on the Base.

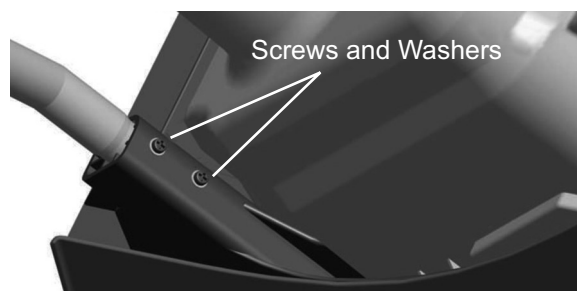


Figure D:

7. Align the holes and secure in place with four Washers and Screws.

Functions

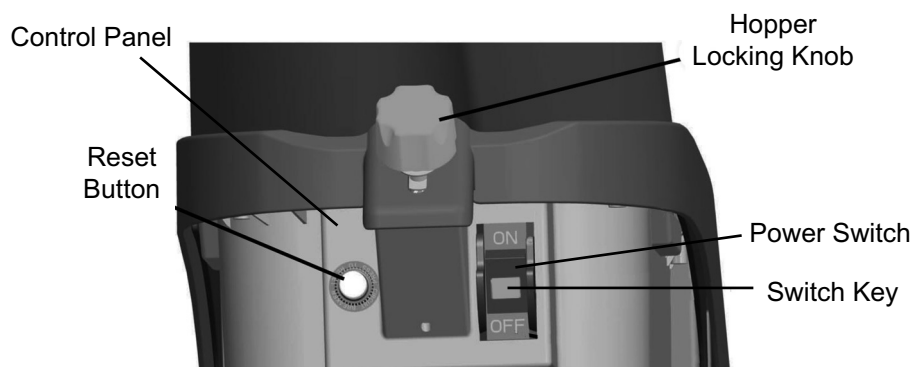


Figure E:

SAFETY

SETUP

OPERATION

MAINTENANCE

Operating Instructions



Read the **ENTIRE IMPORTANT SAFETY INFORMATION** section at the beginning of this manual including all text under subheadings therein before set up or use of this product.

Operation

1. Before operating the Chipper/Shredder, put on ANSI-approved safety goggles and other safety gear. Safety goggles and other safety gear are sold separately.
2. If an extension cord is used, ensure that it is an outdoor type extension cord and that it is the correct design to accept this appliance's plug.



WARNING!
TO PREVENT ELECTRIC SHOCK AND SERIOUS PERSONAL INJURY:
The extension cord must remain secured to the appliance's plug.

Secure the extension cord by either using the knot method explained in the safety warning section, or by using a device designed specifically for retaining the extension cord (sold separately).

3. Check that the Power Switch is OFF.
4. Check that the feed inlet is empty.
5. Check that the Hopper is securely closed and that the Hopper Locking Knob is turned fully clockwise.

Note: The Chipper/Shredder will not run if the Hopper is open, not fitted well, or the Hopper Locking Knob is loose.

6. Insert the Switch Key.
7. Plug the Power Cord into a 120VAC/60Hz outlet.
8. Turn on the Power Switch.



9. Hold branches and feed them into the hopper. Release the branches when they begin to pull into the hopper.

WARNING! Keep a safe distance from the Hopper opening. Longer material can lash out when being pulled in by the blades.

WARNING! Keep clear of intake and discharge chute. Use included push stick. Unplug unit and allow it to stop before unclogging.

CAUTION! Keep the ventilation slots clear while working to avoid overheating.

10. Do not shred soft, damp material such as kitchen waste as it may clog the Chipper/Shredder. Let damp garden waste dry for a few days before shredding.
11. Remove soil and rocks from roots before inserting them into the Chipper/Shredder.



12. Use the Push Stick to feed leaves and other small material into the Hopper.
13. Feed material into the Chipper/Shredder at the rate that the machine pulls the material. Do not force material into the machine.
14. Set aside a few dry branches, then feed them into the machine when finished, to help clean the unit.
15. Wait for all material to pass through the Chipper/Shredder before turning the unit off.
16. To prevent accidents, turn the power off, remove the Switch Key and disconnect the power supply after use. Clean, then store the appliance indoors out of children's reach.

Overload Protection

This Chipper/Shredder is equipped with an overload protection system. If the unit clogs while running, the overload protection system will shut the power off. Wait at least one minute before restarting. Press the Reset Button then turn the Power Switch on.

Maintenance and Servicing



Procedures not specifically explained in this manual must be performed only by a qualified technician.

⚠ WARNING

TO PREVENT SERIOUS INJURY FROM ACCIDENTAL OPERATION OR ELECTRIC SHOCK:

Turn the Power Switch of the appliance to its “OFF” position and unplug the appliance from its electrical outlet before performing any inspection, maintenance, or cleaning procedures.

TO PREVENT SERIOUS INJURY FROM TOOL FAILURE:

Do not use damaged equipment. If abnormal noise or vibration occurs, have the problem corrected before further use.

Cleaning, Maintenance

1. **BEFORE EACH USE**, inspect the general condition of the tool. Check for:
 - loose hardware,
 - misalignment or binding of moving parts,
 - cracked or broken parts,
 - damaged electrical wiring, and
 - any other condition that may affect its safe operation.
2. **AFTER USE**, clean external surfaces of the appliance with clean, moist cloth.
3. Replace or sharpen the Blades as needed. (See below.)
4. If the motor turns but the appliance does not function, the belt may be broken. Have the belt replaced by a qualified technician.
5. **⚠ WARNING! If the supply cord of this appliance is damaged, it must be replaced only by a qualified service technician.**

Cleaning the Chipper/Shredder

1. Turn the Hopper Locking Knob counterclockwise and open the Hopper.
2. Clean the cutting Blades and discharge area and remove wood sticks or objects that may clog the Blades.
3. Check the Blades for damage and replace if needed.
4. Return the Hopper to its upright position and tighten in place with the Locking Knob after cleaning the interior.
5. Use a warm damp cloth and a soft brush to clean the exterior of the Chipper/Shredder. Do not spray water or use detergents on the Chipper/Shredder.
6. Check that the ventilation slots are clean.

Replacing the Blades

The reversible Blades are attached to the Cutter Head with two screws.

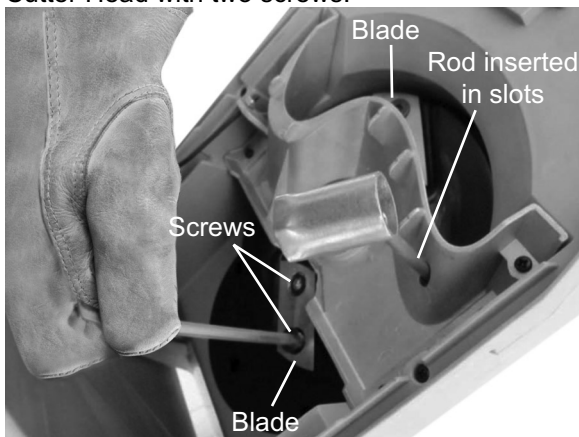


Figure F:

1. Access the Blades by opening the Hopper.
2. Align the slots on the Cutter Head and main body and insert a screwdriver or other metal rod (sold separately) to prevent the unit from rotating while changing the Blades.
3. Unthread the two screws holding a Blade and carefully remove the Blade.
4. Either reverse the Blade with the sharp edge in the cutting position, have the blade professionally sharpened/honed, or insert a new Blade.
5. Secure in place with the screws. Repeat with the other Blade at the same time.

PLEASE READ THE FOLLOWING CAREFULLY

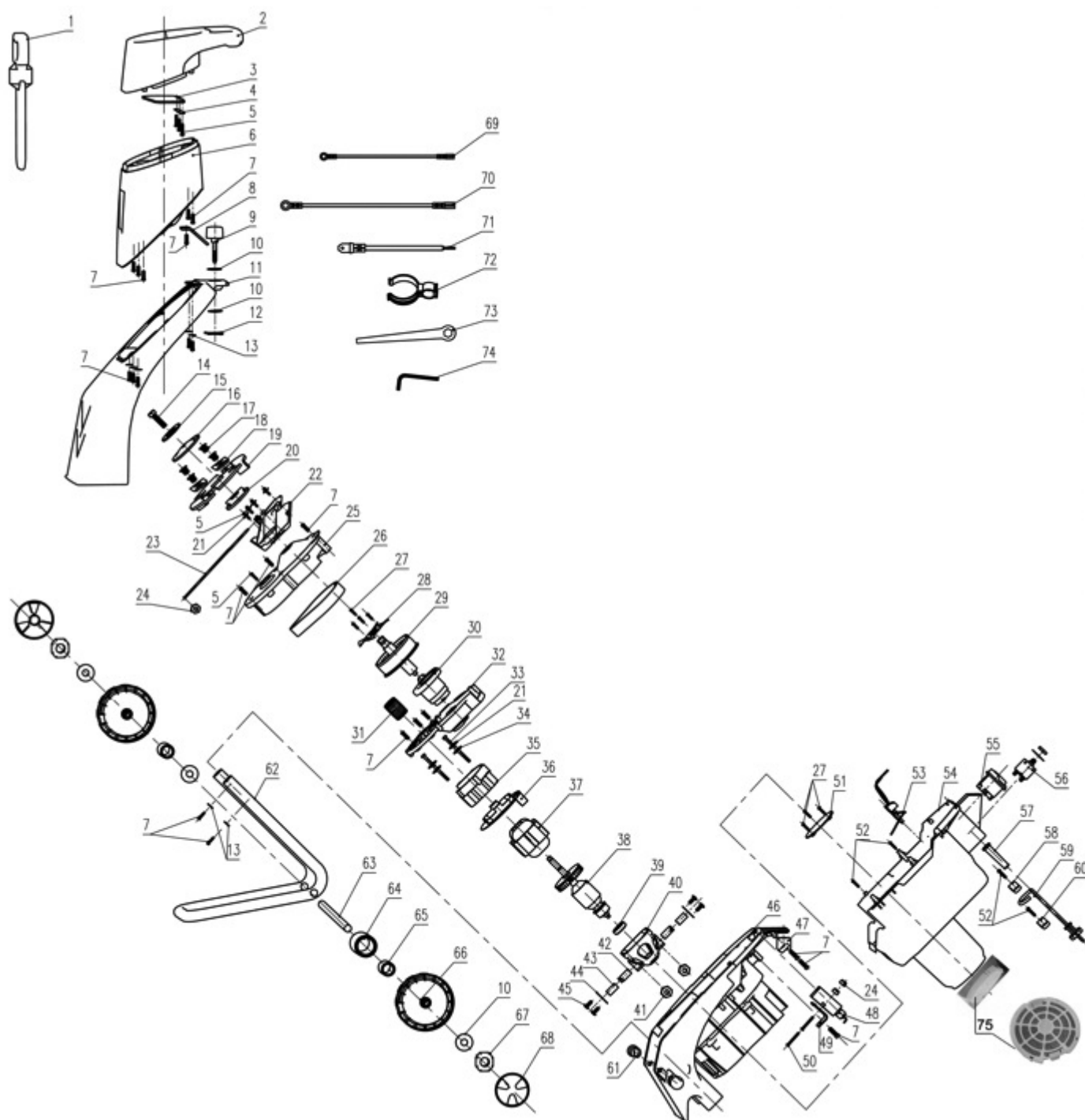
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Parts List

Part	Description	Qty
1	Push Stick	1
2	Hopper	1
3	Safety Guard Board	1
4	Batten	1
5	Self Tapping Screw 4*18	15
6	Upper Fuselage	1
7	Self Tapping Screw 5*20	31
8	Switch Bolt	1
9	Hopper Locking Knob	1
10	Washer	4
11	Base Fuselage	1
12	Split Pin	1
13	Washer	9
14	Hex Screw M8	1
15	Internal Washer	1
16	Press Board	1
17	Countersunk Hex Screw M10	4
18	Blade	2
19	Cutter Head	1
20	Driving Block	1
21	Spring Washer	10
22	Splash Guard	1
23	Pull Pole	1
24	Self Lock Nut	4
25	Slowdown Upper Cover Box	1
26	Belt	1
27	Self Tapping Screw 4*14	7
28	Impeller	1
29	Big Pulley	1
30	Eccentric Wheel	1
31	Small Pulley	1
32	Slowdown Base Cover Box	1
33	Stator Screw M4	2
34	Flat Washer	2
35	Motor Front Frame	1
36	Cover	1
37	Stator	1
38	Rotor	1

Part	Description	Qty
39	Bearing 627Z	0
40	Motor Backward Frame	1
41	nut M4	2
42	Brush	2
43	Brush Holder	2
44	Brush Holder Press Board	2
45	Self Tapping Screw 3*8	4
46	Machine Plate	1
47	Fix Nut	1
48	Safety Switch	1
49	Switch Fix Board	1
50	Machine Screw M4*40	2
51	Dust Shield	1
52	Self Tapping Screw 4*16	12
53	Soft Startup	1
54	Motor Box	1
55	Power Switch	1
56	Reset Button	1
57	Cable Cover	1
58	Cable Press Board	1
59	Power Cord	1
60	Cable Press Board	1
61	Pin	2
62	Lower Frame	1
63	Axle	1
64	Bearing	2
65	Bushing	2
66	Wheel	2
67	Self Lock Nut	2
68	Wheel Cover	2
69	Wire	1
70	Wire	1
71	Wire	1
72	Push Stick Clip	1
73	Wrench	1
74	Hex Key	1
75	Screen	1

Assembly Diagram



Record Product's Serial Number Here: _____

Note: If product has no serial number, record month and year of purchase instead.

Note: Some parts are listed and shown for illustration purposes only, and are not available individually as replacement parts. Specify UPC 792363692939 when ordering parts.

Limited 90 Day Warranty

Harbor Freight Tools Co. makes every effort to assure that its products meet high quality and durability standards, and warrants to the original purchaser that this product is free from defects in materials and workmanship for the period of 90 days from the date of purchase. This warranty does not apply to damage due directly or indirectly, to misuse, abuse, negligence or accidents, repairs or alterations outside our facilities, criminal activity, improper installation, normal wear and tear, or to lack of maintenance. We shall in no event be liable for death, injuries to persons or property, or for incidental, contingent, special or consequential damages arising from the use of our product. Some states do not allow the exclusion or limitation of incidental or consequential damages, so the above limitation of exclusion may not apply to you. THIS WARRANTY IS EXPRESSLY IN LIEU OF ALL OTHER WARRANTIES, EXPRESS OR IMPLIED, INCLUDING THE WARRANTIES OF MERCHANTABILITY AND FITNESS.

To take advantage of this warranty, the product or part must be returned to us with transportation charges prepaid. Proof of purchase date and an explanation of the complaint must accompany the merchandise. If our inspection verifies the defect, we will either repair or replace the product at our election or we may elect to refund the purchase price if we cannot readily and quickly provide you with a replacement. We will return repaired products at our expense, but if we determine there is no defect, or that the defect resulted from causes not within the scope of our warranty, then you must bear the cost of returning the product.

This warranty gives you specific legal rights and you may also have other rights which vary from state to state.

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