# **POWERMATIC**<sup>®</sup>

# Operating Instructions and Parts Manual 3-Roll Powered Stock Feeder

Model PF3-JR



Powermatic 427 New Sanford Road LaVergne, Tennessee 37086 Ph.: 800-274-6848 www.powermatic.com

Part No. M-1790818 Revision C1 11/2018 Copyright © 2017 Powermatic

# Warranty and service

Powermatic warrants every product it sells against manufacturers' defects. If one of our tools needs service or repair, please contact Technical Service by calling 1-800-274-6846, 8AM to 5PM CST, Monday through Friday.

#### Warranty Period

The general warranty lasts for the time period specified in the literature included with your product or on the official Powermatic branded website.

- Powermatic products carry a limited warranty which varies in duration based upon the product. (See chart below)
- Accessories carry a limited warranty of one year from the date of receipt.
- Consumable items are defined as expendable parts or accessories expected to become inoperable within a reasonable amount of use and are covered by a 90 day limited warranty against manufacturer's defects.

#### Who is Covered

This warranty covers only the initial purchaser of the product from the date of delivery.

#### What is Covered

This warranty covers any defects in workmanship or materials subject to the limitations stated below. This warranty does not cover failures due directly or indirectly to misuse, abuse, negligence or accidents, normal wear-and-tear, improper repair, alterations or lack of maintenance. Powermatic woodworking machinery is designed to be used with Wood. Use of these machines in the processing of metal, plastics, or other materials outside recommended guidelines may void the warranty. The exceptions are acrylics and other natural items that are made specifically for wood turning.

#### Warranty Limitations

Woodworking products with a Five Year Warranty that are used for commercial or industrial purposes default to a Two Year Warranty. Please contact Technical Service at 1-800-274-6846 for further clarification.

#### How to Get Technical Support

Please contact Technical Service by calling 1-800-274-6846. **Please note that you will be asked to provide proof of initial purchase when calling.** If a product requires further inspection, the Technical Service representative will explain and assist with any additional action needed. Powermatic has Authorized Service Centers located throughout the United States. For the name of an Authorized Service Center in your area call 1-800-274-6846 or use the Service Center Locator on the Powermatic website.

#### **More Information**

Powermatic is constantly adding new products. For complete, up-to-date product information, check with your local distributor or visit the Powermatic website.

#### How State Law Applies

This warranty gives you specific legal rights, subject to applicable state law.

#### Limitations on This Warranty

POWERMATIC LIMITS ALL IMPLIED WARRANTIES TO THE PERIOD OF THE LIMITED WARRANTY FOR EACH PRODUCT. EXCEPT AS STATED HEREIN, ANY IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE EXCLUDED. SOME STATES DO NOT ALLOW LIMITATIONS ON HOW LONG AN IMPLIED WARRANTY LASTS, SO THE ABOVE LIMITATION MAY NOT APPLY TO YOU. POWERMATIC 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 PRODUCTS. SOME STATES DO NOT ALLOW THE EXCLUSION OR LIMITATION OF INCIDENTAL OR CONSEQUENTIAL DAMAGES, SO THE ABOVE LIMITATION OR EXCLUSION MAY NOT APPLY TO YOU.

Powermatic sells through distributors only. The specifications listed in Powermatic printed materials and on the official Powermatic website are given as general information and are not binding. Powermatic reserves the right to effect at any time, without prior notice, those alterations to parts, fittings, and accessory equipment which they may deem necessary for any reason whatsoever.

#### **Product Listing with Warranty Period**

90 Days – Parts; Consumable items
1 Year – Motors, Machine Accessories
2 Year – Woodworking Machinery used for industrial or commercial purposes
5 Year – Woodworking Machinery

NOTE: Powermatic is a division of JPW Industries, Inc. References in this document to Powermatic also apply to JPW Industries, Inc., or any of its successors in interest to the Powermatic brand.

# Table of Contents

Warranty and service	2
Warning	4
Introduction	6
Description	6
Specifications	6
Features	7
Unpacking	8
Contents of the Shipping Container	8
Assembly and Installation	9
Grounding Instructions	11
Extension Cords	12
Adjustments	12
Basic Feeder/Stand Movements	
Edgewise Stock Feeder Position	12
Speed Selection	13
Operating Controls	14
Operation	14
General Operating Instructions	14
When Used with a Shaper	15
When Used with a Table Saw	16
When Used with a Jointer	16
Roller Removal/Replacement	16
Maintenance	16
Lubrication	17
Troubleshooting	19
Replacement Parts	19
Parts List: PF3-JR Stand Assembly	20
Exploded View: PF3-JR Stand Assembly	21
Parts List: PF3-JR Stock Feeder	22
Exploded View: PF3-JR Stock Feeder	23
Electrical Connections for PF3-JR Stock Feeder	24
Boring Template	25



- 1. Read and understand the entire owner's manual before attempting assembly or operation.
- 2. Read and understand the warnings posted on the machine and in this manual. Failure to comply with all of these warnings may cause serious injury.
- 3. Replace the warning labels if they become obscured or removed.
- 4. This stock feeder is designed and intended for use by properly trained and experienced personnel only. If you are not familiar with the proper and safe operation of a stock feeder, do not use until proper training and knowledge have been obtained.
- 5. Do not use this stock feeder for other than its intended use. If used for other purposes, Powermatic disclaims any real or implied warranty and holds itself harmless from any injury that may result from that use.
- 6. Always wear approved safety glasses/face shields while using this stock feeder. Everyday eyeglasses only have impact resistant lenses; they are not safety glasses.
- 7. Before operating this stock feeder, remove tie, rings, watches and other jewelry, and roll sleeves up past the elbows. Remove all loose clothing and confine long hair. Non-slip footwear or anti-skid floor strips are recommended. Do **not** wear gloves.
- 8. Wear ear protectors (plugs or muffs) during extended periods of operation.
- 9. Do not operate this machine while tired or under the influence of drugs, alcohol or any medication.
- 10. Make certain the switch is in the OFF position before connecting the machine to the power supply.
- 11. Make certain the machine is properly grounded.
- 12. Make all machine adjustments or maintenance with the machine unplugged from the power source.
- 13. Remove adjusting keys and wrenches. Form a habit of checking to see that keys and adjusting wrenches are removed from the machine before turning it on.
- 14. Keep safety guards in place at all times when the machine is in use. If removed for maintenance purposes, use extreme caution and replace the guards immediately after maintenance is complete.
- 15. Make sure the stock feeder is firmly secured to the auxiliary machine before use.
- 16. Check damaged parts. Before further use of the machine, 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 conditions that may affect its operation. A guard or other part that is damaged should be properly repaired or replaced.
- 17. Provide for adequate space surrounding work area and non-glare, overhead lighting.
- 18. Keep the floor around the machine clean and free of scrap material, oil and grease.
- 19. Keep visitors a safe distance from the work area. Keep children away.
- 20. Make your workshop child proof with padlocks, master switches or by removing starter keys.
- 21. Give your work undivided attention. Looking around, carrying on a conversation and "horse-play" are careless acts that can result in serious injury.
- 22. Maintain a balanced stance at all times so that you do not fall or lean against moving parts. Do not overreach or use excessive force to perform any machine operation.
- 23. Use the right tool at the correct speed and feed rate. Do not force a tool or attachment to do a job for which it was not designed. The right tool will do the job better and more safely.
- 24. Use recommended accessories; improper accessories may be hazardous.
- 25. Maintain tools with care. Follow instructions for lubricating and changing accessories.
- 26. Turn off the stock feeder before cleaning. Use a brush or compressed air to remove chips or debris do not use your hands.

- 27. Do not stand on the machine. Serious injury could occur if the machine tips over.
- 28. Never leave the machine running unattended. Turn the power off and do not leave the machine until it comes to a complete stop.
- 29. Remove loose items and unnecessary work pieces from the area before starting the machine.
- 30. Check your stock for loose knots, nails or other aspects that may create a safety hazard or affect the machine's performance.

**WARNING:** This product can expose you to chemicals including lead and cadmium which are known to the State of California to cause cancer and birth defects or other reproductive harm, and mercury which is known to the State of California to cause birth defects or other reproductive harm. For more information go to http://www.p65warnings.ca.gov.

**WARNING:** Drilling, sawing, sanding or machining wood products generates wood dust and other substances known to the State of California to cause cancer. Avoid inhaling dust generated from wood products or use a dust mask or other safeguards for personal protection.

Wood products emit chemicals known to the State of California to cause birth defects or other reproductive harm. For more information go to http://www.p65warnings.ca.gov/wood.

#### Familiarize yourself with the following safety notices used in this manual:

**ACAUTION** This means that if precautions are not heeded, it may result in minor injury and/or possible machine damage.

**AWARNING** This means that if precautions are not heeded, it may result in serious injury or possibly even death.

## -- SAVE THESE INSTRUCTIONS --

# Introduction

This manual is provided by Powermatic covering the safe operation and maintenance procedures for a Model PF3-JR Stock Feeder. This manual contains instructions on installation, safety precautions, general operating procedures, maintenance instructions and parts breakdown. This machine has been designed and constructed to provide consistent, long-term operation if used in accordance with instructions set forth in this manual. If there are any questions or comments, please contact either your local supplier or Powermatic. Powermatic can also be reached at our web site: www.powermatic.com.

# **Description**

The PF3-JR Stock Feeder can be mounted to a table saw, shaper, jointer, etc., and will act as a "third hand" for the operator to smoothly feed workpieces through the auxiliary machine. The Stock Feeder has a continuous-duty motor and lubricated gearbox that transmit power through roller chain and sprockets to the feed rollers, providing superior positive feeding for all types of materials. The stand is fully adjustable with universal joints, and heavy locking mechanisms secure the feeder in horizontal, vertical or angled positions. The roller system is "maintenance-friendly" allowing you to replace a single roller if necessary, instead of a complete set.

# **Specifications**

Model Number	PF3-JR
Stock Number	
Approx. Length, with arm fully extended and handle installed (in.)	
Width (in.)	
Approx. Height, with handle installed (in.)	
Column Diameter (in.)	
Rollers	
Roller Size (Diameter x Length) (in.)	
Motor	.TEFC, 0.25HP, 1Ph only, 115V, 60Hz
Rotation	Forward/Reverse
Number of Speeds	
Speed Range (FPM)	
Distance between Rollers (center to center) (in.)	
Swing (deg.)	
Vertical Movement (in.)	
Horizontal Movement (in.)	
Maximum Height of Rollers Parallel to Tabletop (in.)	
Approximate Net Weight (lbs.)	71
Approximate Shipping Weight (lbs.)	75

The above specifications were current at the time this manual was published, but because of our policy of continuous improvement, Powermatic reserves the right to change specifications at any time and without prior notice, without incurring obligations.

# Features



# Unpacking

Open shipping container and check for shipping damage. Report any damage immediately to your distributor and shipping agent. Do not discard any shipping material until the Stock Feeder is assembled and running properly.

Compare the contents of your container with the following parts list to make sure all parts are intact. Missing parts, if any, should be reported to your distributor. Read the instruction manual thoroughly for assembly, maintenance and safety instructions.

#### **Contents of the Shipping Container**

- 1 Stock Feeder
- 1 Stand Assembly
- 2 Handles
- 1 26-Tooth Gear
- 1 24-Tooth Gear
- 1 Boring Template
- 1 Owner's Manual
- 1 Warranty Card





#### 

Read and understand the entire contents of this manual before attempting set-up or operation! Failure to comply may cause serious injury.

# **Assembly and Installation**

#### Tools needed for assembly:

5mm hex wrench 12mm and 14mm open end wrenches

Remove the clear plastic from around the feeder and stand.

Exposed metal surfaces have been given a protective coating at the factory. This should be removed with a soft cloth moistened with a good commercial solvent, such as kerosene or mineral spirits. Do not use acetone, gasoline, or lacquer thinner for this purpose. Do not get solvents near plastic or rubber parts, and do not use an abrasive pad because it may scratch metal surfaces.

The Stock Feeder should be mounted to an auxiliary machine in a well-lit area. Leave enough space around the work area for loading and off-loading stock and general maintenance.

AWARNING The stock feeder and the auxiliary machine to which you are mounting it should both be disconnected from power during installation.

1. Determine the mounting location for the stand. Keep in mind the overall length of the horizontal arm on the stand (27-1/2") so that there will be enough adjustment when the Stock Feeder is mounted.

**IMPORTANT:** Locate the stand so that you will not drill through any ribs or supports beneath the table surface.

2. Use the provided boring template to find the centerline spacing for the holes in the feeder's base. Clean the mounting surface, then remove the backing from the boring template and stick the template carefully into place on the mounting surface.

NOTE: The same template can be found on page 25.

- 3. Center punch and drill four 8.5 millimeter diameter holes in the surface, then tap the holes with M10 x P1.5 threads. Alternatively, if you plan to secure the stand with hex nuts from below the mounting surface, drill clearance holes of 7/16" diameter without tapping.
- 4. Peel off the boring template and discard.
- 5. Loosen the lock handle and remove the base from the stand assembly, shown in Figure 1.



Figure 1

- 6. Place the base over the hole pattern. Align the four holes of the base with the holes in the mounting surface. Make sure the lock handle is positioned in a convenient place before tightening the base to the mounting surface.
- Insert four M10 screws (not provided) through the holes of the base and into the holes on the mounting surface. See Figure 2. Tighten screws securely.
- 8. The stand assembly can be oriented with either of the columns in horizontal or vertical position. It is recommended, however, that the longer lead screw be placed in the horizontal position, as shown in Figure 3; this will allow maximum adjustment for the stock feeder across the surface of the workpiece. Slide the vertical column down into the base and tighten the lock handle (Figure 3).
- 9. Attach a handle (Figure 4) to each elevating handle, by screwing the threads of the handle into the hole on the elevating handle.
- 10. The handle (Figure 4) should be adjusted so that it can move freely. Loosen the hex nut with a 14mm (9/16") wrench, and turn the socket head cap screw with a 5mm hex wrench until the handle is just loose enough to turn freely. Then tighten the hex nut against the elevating handle.
- 11. Rest the Stock Feeder on the mounting surface, as shown in Figure 5. Lower the horizontal arm by rotating the top hand wheel until the arm is at a convenient height for mounting the Stock Feeder. (See "Basic Feeder/Stand Movements" for detailed explanation of stand movements.)
- 12. Make sure the hex cap screw (A, Figure 5) is loosened on the sleeve of the Stock Feeder. Use a 14mm wrench.
- Slide the arm cone of the Stock Feeder onto the horizontal arm as far as it will go, then tighten the hex cap screw (A, Figure 5).



Figure 2



Figure 3







Figure 5

#### **Grounding Instructions**

#### **AWARNING** Electrical connections must be made by a qualified electrician in compliance with all relevant codes. This machine must be properly grounded to help prevent electrical shock and possible fatal injury.

This Stock Feeder must be grounded. In the event of a malfunction or breakdown, grounding provides a path of least resistance for electric current to reduce the risk of electric shock. This tool is equipped with an electric cord having an equipment-grounding conductor and a grounding plug similar to the one shown in Figure 6. The plug must be plugged into a matching outlet that is properly installed and grounded in accordance with all local codes and ordinances.

Do not modify the plug provided. If it will not fit the outlet, have the proper outlet installed by a qualified electrician.

Improper connection of the equipmentgrounding conductor can result in a risk of electric shock. The conductor, with insulation having an outer surface that is green with or without yellow stripes, is the equipmentgrounding conductor. If repair or replacement of the electric cord or plug is necessary, do not connect the equipment-grounding conductor to a live terminal.

Check with a qualified electrician or service personnel if the grounding instructions are not completely understood, or if in doubt as to whether the tool is properly grounded. Use only three wire extension cords that have three-prong grounding plugs and three-pole receptacles that accept the tool's plug.

Repair or replace a damaged or worn cord immediately.

#### **115 Volt Operation**

As received from the factory, your Stock Feeder is ready to run at 115 volt operation. It is intended for use on a circuit that has an outlet and a plug that looks similar to the one illustrated in Figure 6.

A temporary adapter, which looks like the adapter as illustrated in Figure 7, may be used to connect this plug to a two-pole receptacle, as shown in Figure 7, if a properly grounded outlet is not available. The temporary adapter should only be used until a properly grounded outlet can be installed by a qualified electrician. **This adapter is not applicable in Canada**.



Figure 6



Figure 7

The green colored rigid ear, lug, or tab, extending from the adapter, must be connected to a permanent ground such as a properly grounded outlet box, as shown in Figure 7.

Make sure the voltage of your power supply matches the specifications on the motor plate of the machine.

#### **Extension Cords**

If an extension cord is necessary make sure the cord rating is suitable for the amperage listed on the machine's motor plate. An undersize cord will cause a drop in line voltage resulting in loss of power and overheating.

The chart in Figure 8 shows the correct size cord to use based on cord length and motor plate amp rating. If in doubt, use the next heavier gauge. The smaller the gauge number the heavier the cord.

# Adjustments

#### **Basic Feeder/Stand Movements**

To move the vertical column up or down, loosen the lock handle (A, Figure 9) and rotate the handle (B, Figure 9). When adjustment is complete, re-tighten lock handle (A, Figure 9).

To move the horizontal arm forward or back, loosen the lock handle (C, Figure 9) and rotate the handle (D, Figure 9). When adjustment is complete, re-tighten lock handle (C, Figure 9).

The vertical column and horizontal arm have stop screws (E, Figure 9) which prevent them from being moved too far.

To rotate the entire stand assembly, loosen the lock handle (F, Figure 9) and push the assembly into desired position. Tighten lock handle before operating the stock feeder.

To rotate the stock feeder alone, loosen lock handle (G, Figure 9). Tighten lock handle before operating the stock feeder.

#### **Edgewise Stock Feeder Position**

The stock feeder can be turned "edgewise" so that the feed is along the side of the workpiece. See Figure 10.

To create this position:

- Loosen the screw on the arm cone (A, Figure 10) with a 14mm wrench, and slide the Stock Feeder off the horizontal arm.
- 2. Place the Stock Feeder edgewise with the rollers toward the bottom, as shown in Figure 10.

**Recommended Gauges (AWG) of Extension Cords** 

	Extension Cord Length *					
Amps	25 feet	50 feet	75 feet	100 feet	150 feet	200 feet
< 5	16	16	16	14	12	12
5 to 8	16	16	14	12	10	NR
8 to 12	14	14	12	10	NR	NR
12 to 15	12	12	10	10	NR	NR
15 to 20	10	10	10	NR	NR	NR
21 to 30	10	NR	NR	NR	NR	NR

\*based on limiting the line voltage drop to 5V at 150% of the rated amperes.

NR: Not Recommended.

Figure 8



Figure 9



Figure 10

- 3. Loosen lock handle (B, Figure 10) and rotate the swivel cone (C, Figure 10) 180degrees, as shown in Figure 10.
- 4. Re-tighten lock handle (B, Figure 10).
- 5. Loosen lock handle (D, Figure 10) and rotate the arm cone as needed until it can slide back onto the horizontal arm. Tighten locking handle (D, Figure 10).
- 6. Mount the Stock Feeder to the horizontal arm and tighten the screw (A, Figure 10).

#### **Speed Selection**

The PF3-JR has four speeds: 13, 26, 33 and 62 feet per minute (or 4, 8, 10 and 19 meters per minute, respectively). Achieving these four speeds is dependent upon the choice and proper position of the gears.

#### AWARNING Unplug the stock feeder from power source before changing gears.

To change the position of the gears:

- 1. Unscrew the knob (Figure 11) and pull off the back cover to expose the gear system, shown in Figure 12.
- 2. Remove hex nuts and flat washers (A, Figure 12) with a 14mm wrench.
- 3. Figure 13 shows the relationship of gear position to create each of the four speeds. A similiar chart is affixed to the inside of the back cover on the Stock Feeder.
- 4. Install new gear configuration, making sure the notch in each gear slides into the keyway of the shaft. Push the gear as far as it will go onto the shaft.
- 5. Install hex nut and flat washer (A, Figure 12) on each shaft, and tighten.
- 6. Re-install back cover and tighten knob (Figure 11).



Figure 11



Figure 12



Figure 13

# **Operating Controls**

The control switch (Figure 14) turns the motor on, and also determines its direction – forward or reverse.

# **AWARNING** If a jam should occur while feeding a workpiece, DO NOT turn the stock feeder to reverse while the auxiliary machine is still running in forward direction.

If a workpiece becomes jammed, turn off both the auxiliary machine and the stock feeder. Raise the feeder in order to clear the workpiece. Then reset the feeder height and begin the feed over again.



Figure 14

# Operation

**IMPORTANT:** Before attempting operation of this stock feeder in conjunction with an auxiliary machine, you should be thoroughly familiar with the operating and safety instructions that were included with the auxiliary machine.

#### 

**A WARNING** Keep hands away from rollers during operation. Failure to comply may cause injury.

#### **General Operating Instructions**

- 1. Make sure all lock handles are tight before operating the Stock Feeder.
- 2. The Stock Feeder should be used in conjunction with a fence on your auxiliary machine.
- 3. The rollers must grip the offcut, as well as the part of the workpiece still being fed.
- 4. On some machines, such as a shaper, the stock feeder can be mounted so that the rollers exert pressure from the top; or mounted edgewise so that the rollers exert pressure from the side, or mounted at an intermediate angle for beveled workpieces.
- 5. The feed rollers have a spring suspension with approximately 12mm lift, which will exert the necessary pressure against the workpiece. This pressure increases automatically with feed resistance, so that a workpiece of varying thickness can be fed through the stock feeder without adjustments.

6. When used in normal horizontal position, the stock feeder should be adjusted for height so that the distance between the table and the feed rollers is approximately 1/8" to 3/16" (3 to 5mm) less than the thickness of the workpiece. See Figure 15.

Although the stock feeder when properly used will greatly reduce the chance of workpiece kickback, there is still a potential for kickback. Never stand directly in the path of the workpiece as it passes under the Stock Feeder rollers.

#### When Used with a Shaper

- 1. The gap between the fences for the cutter should be as small as possible.
- 2. To ensure that the workpiece is held firmly against the fence, set the stock feeder at a slight angle toward the fence in the direction of feed. In other words, the outfeed roller should be approximately 3/16" (5mm) closer to the fence than the infeed roller. See Figure 16.
- 3. When the Stock Feeder is in edgewise position, it must be inclined slightly towards the work table in the direction of feed, to ensure the workpiece remains forced down against the table. In other words, the outfeed roller should be approximately 3/16" closer to the work table than the infeed roller. See Figure 17.
- 4. When the Stock Feeder is in the edgewise position, or angled for a beveled workpiece, the axis of the cutter should be between the outfeed roller and the center roller. See Figure 17. The center roller should NOT be directed toward the opening between the fences, but should act directly against the fence.
- 5. When mounting the Stock Feeder in edgewise position, keep in mind the spring tension of the rollers. The distance between the shaper fence and the feed rollers should be approximately 1/8" to 3/16" (3 to 5mm) less than the thickness of the workpiece (refer to Figure 15).
- Shaping hardwood with the Stock Feeder may increase the friction between workpiece and table. Keep the work table rust-free and smooth, by using paste wax or other necessary means.



Figure 15



Figure 16 (Stock Feeder in horizontal position)



Figure 17 (Stock Feeder in edgewise position)

#### When Used with a Table Saw

- 1. Position the Stock Feeder so that the axis of the saw blade lines up between the center roller and infeed roller. See Figure 18. This will allow the Stock Feeder to grip the offcut of the workpiece as it leaves the blade.
- 2. Rotate the Stock Feeder so that the direction of feed is angled slightly toward the fence by approximately 3/16" (5mm); that is, the outfeed roller should be slightly closer to the fence than the infeed roller. See Figure 18.

#### When Used with a Jointer

- 1. Mount the stock feeder on a jointer so that all rollers are over the outfeed table, as shown in Figure 19.
- 2. The infeed roller should be approximately 3/16" away from the lip of the outfeed table at the cutter area. See Figure 19.
- 3. Rotate the Stock Feeder so that the direction of feed is angled slightly toward the fence by approximately 3/16" (5mm); that is, the outfeed roller should be slightly closer to the fence than the infeed roller. See Figure 19.

#### **Roller Removal/Replacement**

If more space is needed between rollers, for example when feeding a curved workpiece, the center roller can be removed from the Stock Feeder. To remove the roller. loosen and remove the two socket head cap screws (Figure 20) with a 5mm hex wrench and pull the roller off the shaft.

# Maintenance

Before performing Stock maintenance on the Feeder. disconnect its plug from the electrical supply. Also disconnect the auxiliary machine from the electrical supply. Failure to comply may cause serious injury.

If the power cord is worn, cut, or damaged in any way, have it replaced immediately.

The rubber rollers should be kept clean of grease, sawdust and other debris. Use a soft cloth with soap and water to wipe down the rollers. DO NOT use a solvent on the rubber rollers.



Figure 18



Figure 19



Figure 20

anv

The mating parts of the arm cone and swivel cone should be kept clean. See Figure 21. When disassembling any of the cones from the stock feeder, wipe off both mating parts with a clean rag before re-assembling. NOTE: These cones are subject to high torques and it may be necessary to periodically re-tighten the lock handles until the cone surfaces become securely seated.

# Wipe clean

Figure 21



Figure 22



Figure 23

#### Lubrication

#### Gearbox

The Stock Feeder is shipped with oil installed in the gearbox. Occasionally check the oil level and add oil if necessary. The oil level should be approximately 1-1/2" deep; that is, about 1" from the rim of the hole. Completely drain and refill the oil every 1,000 working hours, or every 6 months, with a good quality gear oil.

To change the oil:

- 1. Loosen the screw (A, Figure 5) which holds the feeder body to the horizontal arm.
- 2. Carefully remove the feeder body from the horizontal arm.
- 3. Unscrew and remove the oil cap (identified in Figure 22) and turn the feeder body upside down to completely drain the oil. (NOTE: Always dispose of used oil properly.)
- 4. Turn feeder body right side up, and pour new oil into the fill hole, until it is about 1" from the rim.
- 5. Re-install the oil cap (Figure 22).

#### Rollers

Each of the three rollers has a grease fitting (Figure 23) located in the hub center. Use a grease gun to insert a good quality, all-purpose grease into these fittings every 200 working hours, or every 30 days.

#### Chains

Lubricate the drive chains (Figure 24) with good quality all-purpose grease every 3 months, or more frequently if needed.



Figure 24

## Lead Screws

Occasionally apply a light coat of grease to the lead screw of the vertical column, and to the lead screw of the horizontal arm. See Figure 25.



Figure 25

# Troubleshooting

Trouble	Probable Cause	Remedy	
	Not connected to power source.	Check plug connection.	
Feeder will not start.	Fuse blown, or circuit breaker tripped. Replace fuse, or reset circu		
	Cord damaged.	Replace cord.	
	Starting capacitor bad.	Replace starting capacitor.	
Feed speed is not	Wrong gears installed for the desired feed rate.	Install correct gears in proper positions. [page 13]	
sufficient; machine has low power.	Extension cord too light or too long. Replace with adequate size length cord. [page 12]		
	Low current from electrical supply.	Contact a qualified electrician.	
Workpiece jams while feeding it beneath rollers.	Rollers too low.	Raise feeder.	
Workpiece slips while passing under rollers.	Rollers too high, no traction.	Lower feeder.	
Rollers slip on workpiece.	Grease or debris on rollers.	Clean rollers.	

# **Replacement Parts**

Replacement parts are listed on the following pages. To order parts or reach our service department, call 1-800-274-6848 Monday through Friday, 8:00 a.m. to 5:00 p.m. CST. Having the Model Number and Serial Number of your machine available when you call will allow us to serve you quickly and accurately.

Some parts are shown for reference only, and may not be available individually.

Non-proprietary parts, such as fasteners, can usually be found at local hardware stores or may be ordered from Powwermatic.

# Parts List: PF3-JR Stand Assembly

Index No.	Part No.	Description	Size	Qty
1	.PF3JR-101	.Base		1
2	.TS-1550061	.Flat Washer	. M8	1
3	.PF3JR-103	.Lock Handle		1
4	.TS-1540061	.Hex Nut	. M8	1
5	.PF3JR-105	.Elevating Bracket		1
6	.TS-1550061	.Flat Washer	. M8	2
7	.PF3JR-107	.Lock Handle		2
8	.TS-1540061	.Hex Nut	. M8	4
9	.PF3JR-109	.Mod. Screw		2
10	.TS-2361081	.Lock Washer	. M8	2
11	.PF3JR-111	.Arm Cone		1
12	.TS-2310162	.Hex Nut	. M16x1.5P	1
13	.PF3JR-113	.Lock Handle		1
14	.TS-1550071	.Flat Washer	. M10	1
15	.TS-1491081	.Hex Cap Screw	. M10x50	1
16	.PF3JR-116	.Handle		2
17	.PF3JR-117A	.Vertical Column (s/n 17020030001 and higher)		1
18	.PF3JR-118A	.Horizontal Arm (s/n 17020030001 and higher)		1
19	.PF3JR-119	.Elevating Screw		1
20	.PF3JR-120	.Horizontal Screw		1
21	.PF3JR-121A	.Column Cap (s/n 17020030001 and higher)		2
23	.PF3JR-123A	.Elevating Handle		2
24	.PF3JR-124	.Pin	. 4x30 mm	2
25	.PF3JR-125	.Swivel Cone		1
26	.TS-2310162	.Hex Nut	. M16x1.5P	1
27	.PF3JR-127	.Lock Handle		1
28	.PF3JR-128	.Socket Hd Cap Screw (s/n 17020030001 and hig	<i>gher</i> )M8x20 mm	າ2



#### Parts List: PF3-JR Stock Feeder

Index No.	Part No.	Description	Size	Qty
1	.PF3JR-201	Oil Cap		1
2	.PF3JR-202	"O" Ring		1
3	.PF3JR-203	Sprocket Case		
4	.PF3JR-204	Spring		
5	.PF3JR-205	Case Cover		
6	.PF3JR-206	Roller Supporter		
7	.PF3JR-207	Sprocket		
8	.PF3JR-208	Shap Ring	Ø 22 mm	
9	.TS-1551041	Lock Washer	M6	6
10	.TS-1503061	Socket Head Cap Screw	M6x25	6
12	.PF3JR-212	Chain (18S)	18S	
13	.PF3JR-213	Tube		
14	.PF3JR-214	Snap Ring	Ø 26 mm	
15	PF3JR-215	Sprocket Shaft Assembly		2
16	PF3JR-216	Snap Ring	Ø 15 mm	2
17	PF3.JR-217	Sprocket Shaft Assembly		1
18	TS-1550071	Flat Washer	M10	1
19	TS-1540071	Hex Nut	M10	1
20	PF3.JR-220	Grease Fitting		
21	PF3.IR-221	Shaft		
27	TS-2361081	Lock Washer	M8	
23	TS-1540061	Hex Nut	M8	
20	PF3 IR-224	Frame		0
25	PF3 IR-225	Bushing		1
26	PF3 IR-226	Sprocket		
20	PF3 IR-227	Sprocket	•••••	2 2
28	PF3.IR-228	Bushing		1
20	PF3 IR-220	Chain (30S)	305	1
30	PF3 IR-230	Chain (22S)	225	1
31	PF3 IR-231	Worm Gear Shaft	220	1
32	TS-1550071	Flat Washer	M10	1
33	TS-1540071	Hex Nut	M10	1
34	PF3.IR-234	Oil Seal	W TO	1
35	PF3 IR-235	Bushing		1
36	PF3 IR-236	Worm Gear Cover	•••••	1
37	PF3 IR-237	Oil Seal	•••••	1
38	TS-1502031	Socket Head Can Screw	M5v12	۲۲ ۸
39	PF3.IR-239	Gear (16T)	16T	+1
40	PF3 IR-240	Gear (34T)	34T	1
40 41	PF3 IR-241	Gear (26T)	26T	1
41 12	DF3 IR-247	Gear (24T)	201 2/IT	1
42	PF3 IR-243	"O" Ring	271	1
40 <i>AA</i>	DF3 IR-240	Motor	1//HP 1Ph 115\	/ 1
····	PF3 IR-244C	Canacitor (Not shown)	250\/ 20uf	11
 45	PF3 IR-245	Switch Box		1
46	PF3 IR-246	Switch	•••••	1
40 47	PF3 IR_2/17	Knoh	•••••	۱۱ ۱
48	PF3.IR-248	Back Cover	•••••	۱۱ 1
40 40	PF3 IR-240	Roller (30 x 80 Dia)	30x80 dia mm	ייייי 2
50	TS-1482041	Hex Can Screw	30,00 αια. ΠΠΠ Μ6χ20	ວ າ
51	TS-15500/1	Flat Washer	M6A20	
52	PF3 IR_252	Powermatic Namenlate (not shown)	ivio 1"v∕a"	ے۲
52 53	DE3 IR-252	Warning Label - Main Switch (not shown)	^7	۱۱ ۱
	.1 1 3517-233	warning Laber – wain Switch (not shown)	•••••	

Exploded View: PF3-JR Stock Feeder



# **Electrical Connections for PF3-JR Stock Feeder**



# **Boring Template**

#### SCALE 1:1

Cut out and tape into place on mounting surface.



## NOTES



427 New Sanford Road LaVergne, Tennessee 37086 Phone: 800-274-6848 www.powermatic.com