



MODEL W1857/W1858 8" DOVETAIL JOINTER W/MOBILE BASE



OWNER'S MANUAL

(FOR MODELS MANUFACTURED SINCE 01/21)

Phone: (360) 734-3482 • Online Technical Support: techsupport@woodstockint.com

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WARNING: NO PORTION OF THIS MANUAL MAY BE REPRODUCED IN ANY SHAPE OR FORM WITHOUT

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#19891ES Printed in Taiwan



WARNING!

This manual provides critical safety instructions on the proper setup, operation, maintenance, and service of this machine/tool. Save this document, refer to it often, and use it to instruct other operators.

Failure to read, understand and follow the instructions in this manual may result in fire or serious personal injury—including amputation, electrocution, or death.

The owner of this machine/tool is solely responsible for its safe use. This responsibility includes but is not limited to proper installation in a safe environment, personnel training and usage authorization, proper inspection and maintenance, manual availability and comprehension, application of safety devices, cutting/sanding/grinding tool integrity, and the usage of personal protective equipment.

The manufacturer will not be held liable for injury or property damage from negligence, improper training, machine modifications or misuse.



WARNING!

Some dust created by power sanding, sawing, grinding, drilling, and other construction activities contains chemicals known to the State of California to cause cancer, birth defects or other reproductive harm. Some examples of these chemicals are:

- Lead from lead-based paints.
- Crystalline silica from bricks, cement and other masonry products.
- Arsenic and chromium from chemically-treated lumber.

Your risk from these exposures varies, depending on how often you do this type of work. To reduce your exposure to these chemicals: Work in a well ventilated area, and work with approved safety equipment, such as those dust masks that are specially designed to filter out microscopic particles.

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INTRODUCTION

Machine Differences

Models W1857 and W1858 are 3 HP, 8" x 72" jointers with the following differences:

- **Model W1857** has a 4-knife cutterhead with high-speed steel knives.
- **Model W1858** has a helical cutterhead with 4 helicals and 36 indexable carbide inserts.

Woodstock Technical Support

This machine has been specially designed to provide many years of trouble-free service. Close attention to detail, ruggedly built parts and a rigid quality control program assure safe and reliable operation.

Woodstock International, Inc. is committed to customer satisfaction. Our intent with this manual is to include the basic information for safety, setup, operation, maintenance, and service of this product.

We stand behind our machines! In the event that questions arise about your machine, please contact Woodstock International Technical Support at (360) 734-3482 or send e-mail to: tech-support@shopfox.biz. Our knowledgeable staff will help you troubleshoot problems and process warranty claims.

If you need the latest edition of this manual, you can download it from <http://www.shopfox.biz>.
If you have comments about this manual, please contact us at:

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P.O. Box 2309
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MACHINE SPECIFICATIONS



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MODEL W1857 8" DOVETAIL JOINTER WITH MOBILE BASE

Product Dimensions

Weight..... 335 lbs.
 Width (side-to-side) x Depth (front-to-back) x Height..... 72-1/2 x 25-1/2 x 42 in.
 Footprint (Length x Width)..... 23-1/2 x 17 in.

Shipping Dimensions

Carton #1

Type..... Wood Crate
 Content..... Machine
 Weight..... 373 lbs.
 Length x Width x Height..... 74 x 25 x 15 in.
 Must Ship Upright..... Yes

Carton #2

Type..... Cardboard Box
 Content..... Stand
 Weight..... 115 lbs.
 Length x Width x Height..... 26 x 18 x 27 in.
 Must Ship Upright..... Yes

Electrical

Power Requirement..... 230V, Single-Phase, 60 Hz
 Motor Size..... 3 HP
 Full-Load Current Rating..... 12A
 Minimum Circuit Size..... 20A
 Connection Type..... Cord & Plug
 Power Cord Included..... Yes
 Power Cord Length..... 6 ft.
 Power Cord Gauge..... 14 AWG
 Plug Included..... Yes
 Included Plug Type..... 6-20
 Switch Type..... Push Button Magnetic w/Large Shut-Off Paddle

Motors

Main

Horsepower..... 3 HP
 Phase..... Single-Phase
 Amps..... 12A
 Speed..... 3450 RPM
 Type..... TEFC Capacitor-Start Induction
 Power Transfer Belt Drive
 Bearings..... Sealed & Permanently Lubricated
 Centrifugal Switch/Contacts Type..... External



Main Specifications

Main Specifications

Jointer Size.....	8 in.
Bevel Jointing.....	0 - 45 deg. L/R
Maximum Width of Cut.....	8 in.
Maximum Depth of Cut.....	1/8 in.
Minimum Workpiece Length.....	10 in.
Minimum Workpiece Thickness.....	1/2 in.
Maximum Rabbeting Depth.....	1/2 in.
Number of Cuts Per Minute.....	22,000

Fence Information

Fence Length.....	38 in.
Fence Width.....	1-1/4 in.
Fence Height.....	4-5/8 in.
Fence Stops.....	45, 90, 135 deg.

Cutterhead Information

Cutterhead Type.....	4 Knife
Cutterhead Diameter.....	3-1/16 in.
Cutterhead Speed.....	5500 RPM

Knife Information

Number of Knives.....	4
Knife Type.....	HSS, Single-Sided
Knife Length.....	8 in.
Knife Width.....	3/4 in.
Knife Thickness.....	1/8 in.
Knife Adjustment.....	Jack Screws or Springs

Table Information

Table Length.....	72 in.
Table Width.....	9 in.
Table Thickness.....	1-3/4 in.
Floor to Table Height.....	32 in.
Table Adjustment Type.....	Handwheels
Table Movement Type.....	Dovetailed Ways

Construction

Body Assembly.....	Cast Iron
Cabinet.....	Sheet Metal
Fence Assembly.....	Precision-Ground Cast Iron
Guard.....	Die-Cast Aluminum
Table.....	Precision-Ground Cast Iron
Paint Type/Finish.....	Powder Coated

Other Information

Number of Dust Ports.....	1
Dust Port Size.....	4 in.
Mobile Base.....	Built-In

MACHINE SPECIFICATIONS



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MODEL W1858 8" DOVETAIL JOINTER WITH HELICAL CUTTERHEAD & MOBILE BASE

Product Dimensions

Weight..... 335 lbs.
 Width (side-to-side) x Depth (front-to-back) x Height..... 72-1/2 x 25-1/2 x 42 in.
 Footprint (Length x Width)..... 23-1/2 x 17 in.

Shipping Dimensions

Carton #1

Type..... Wood Crate
 Content..... Machine
 Weight..... 373 lbs.
 Length x Width x Height..... 74 x 25 x 15 in.
 Must Ship Upright..... Yes

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 Content..... Stand
 Weight..... 115 lbs.
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Number of Cuts Per Minute.....	22,000

Fence Information

Fence Length.....	38 in.
Fence Width.....	1-1/4 in.
Fence Height.....	4-5/8 in.
Fence Stops.....	45, 90, 135 deg.

Cutterhead Information

Cutterhead Type.....	Helical
Cutterhead Diameter.....	3-1/16 in.
Number of Cutter Spirals.....	4
Number of Indexable Cutters.....	36
Cutterhead Speed.....	5500 RPM

Cutter Insert Information

Cutter Insert Type.....	Indexable Carbide
Cutter Insert Length.....	15 mm
Cutter Insert Width.....	15 mm
Cutter Insert Thickness.....	2.5 mm

Table Information

Table Length.....	72 in.
Table Width.....	9 in.
Table Thickness.....	1-3/4 in.
Floor to Table Height.....	32 in.
Table Adjustment Type.....	Handwheels
Table Movement Type.....	Dovetailed Ways

Construction

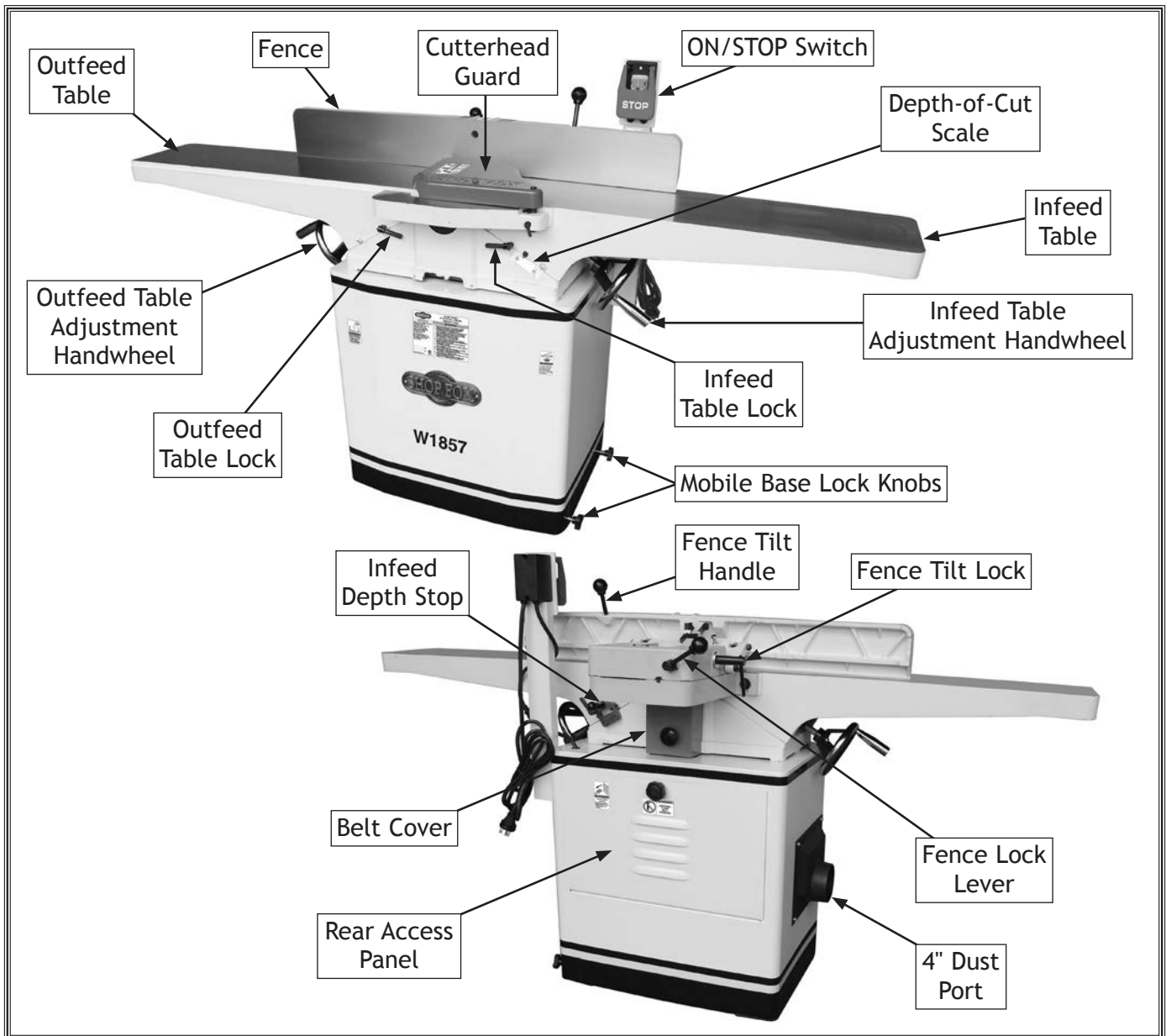
Body Assembly.....	Cast Iron
Cabinet.....	Sheet Metal
Fence Assembly.....	Precision-Ground Cast Iron
Guard.....	Die-Cast Aluminum
Table.....	Precision-Ground Cast Iron
Paint Type/Finish.....	Powder Coated

Other Information

Number of Dust Ports.....	1
Dust Port Size.....	4 in.
Mobile Base.....	Built-In

Identification

Become familiar with the names and locations of the controls and features shown below to better understand the instructions in this manual.



⚠️ WARNING

For Your Own Safety Read Instruction Manual Before Operating Jointer

- a) **Wear eye protection.**
- b) **Always keep cutterhead and drive guards in place and in proper operating condition. If removed, ALWAYS replace cutterhead guard immediately after rabbeting operations.**
- c) **Never make cuts deeper than $\frac{1}{8}$ " per pass.**
- d) **Always use hold-down or push blocks when jointing material narrower than 3" or planing material thinner than 3".**
- e) **Never perform jointing, planing, or rabbeting cuts on pieces shorter than 10" in length.**

Controls & Components

Refer to the **Figures 1-5** and the following descriptions to become familiar with the basic controls and components of this machine. Understanding these items and how they work will help you understand the rest of the manual and stay safe when operating this machine.

- A. **ON Button:** Push to start motor. Insert padlock through button to disable (padlock not included).
- B. **STOP Paddle:** Push to stop motor.
- C. **Outfeed Table:** Supports workpiece after it passes over cutterhead. For optimum results, outfeed table must be properly adjusted even with highest point of cutterhead knives/inserts.
- D. **Fence:** Supports workpiece laterally as it moves across cutterhead; determines angle of cut when edge or bevel jointing.
- E. **Infeed Table:** Supports workpiece before it reaches cutterhead. Position of infeed table relative to cutterhead knives/inserts determines depth of cut.
- F. **Infeed Table Adjustment Handwheel:** Rotate to adjust position of infeed table (when infeed table lock is loosened).
- G. **Mobile Base Lock Knobs:** Tighten to secure jointer in position; loosen to move jointer.
- H. **Outfeed Table Adjustment Handwheel:** Rotate to adjust position of outfeed table (when outfeed table lock is loosened). Only used when setting outfeed table even with cutterhead knives/inserts.

! WARNING



To reduce your risk of serious injury or damage to the machine, read this entire manual **BEFORE** using machine.

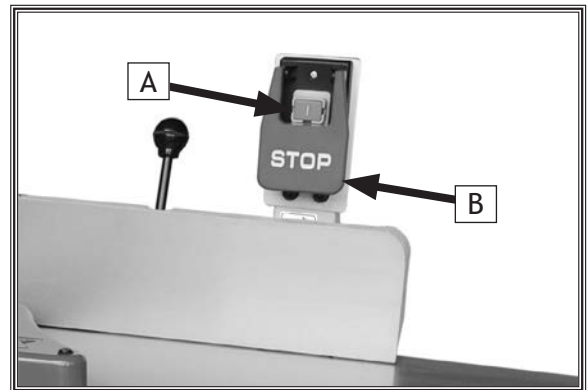


Figure 1. ON/STOP controls.

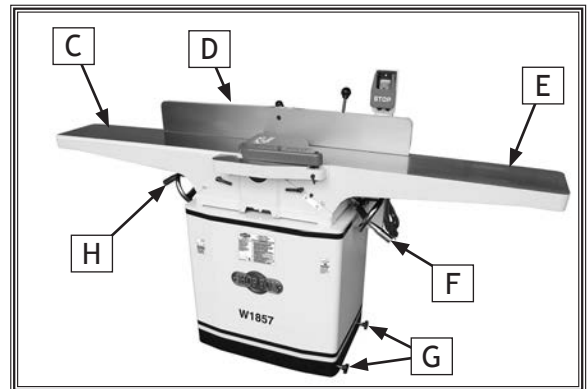


Figure 2. Table controls and components, fence, and mobile base lock knobs.

- I. **Outfeed Table Lock:** Tighten to secure outfeed table position; loosen for table adjustment.
- J. **Cutterhead Guard:** Covers cutterhead until workpiece pushes guard out of the way during operation. When workpiece leaves cutterhead, guard springs back to its starting position.
- K. **Infeed Table Lock:** Tighten to secure infeed table position; loosen for table adjustment.
- L. **Depth-of-Cut Scale:** Shows depth of cut (per pass).
- M. **1/8" Infeed Table Stop Release Knob:** Pull and hold knob out to lower infeed table more than 1/8". Infeed table stop automatically sets depth of cut stop at 1/8".
- N. **Infeed Depth Stop:** Use to adjust infeed table between finish/final cuts and shaping/heavy cuts. Also limits movement range of infeed table.
- O. **Fence Tilt Handle:** Use to tilt fence throughout its range of motion from 45° inward to 45° outward (135°). (Fence tilt lock must be loosened first.)
- P. **90° Stop Block:** Swivels to engage with 90° stop bolt. When engaged, stops fence at 90°. When disengaged, allows bevel cuts greater than 90°.
- Q. **45° Inward Fence Stop:** Stops fence at 45° inward.
- R. **90° Fence Stop:** Stops fence at 90°.
- S. **45° Outward Fence Stop:** Stops fence at 45° outward (135°).
- T. **Fence Tilt Lock:** Tighten to secure fence at any position in available tilt range.

IMPORTANT: Always tighten tilt lock before starting machine—even when fence is resting against stops.

- U. **Fence Lock Lever:** Secures fence position.

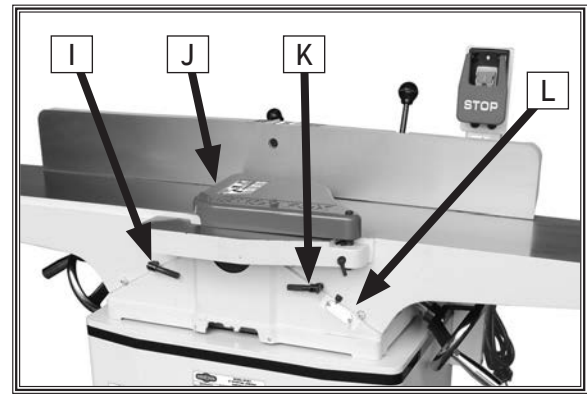


Figure 3. Table locks, cutterhead guard, and depth-of-cut scale.

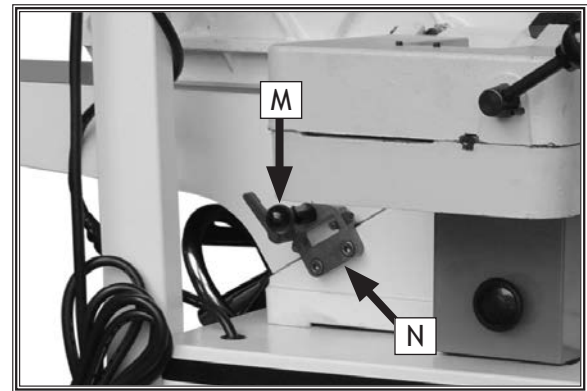


Figure 4. Infeed table stops.

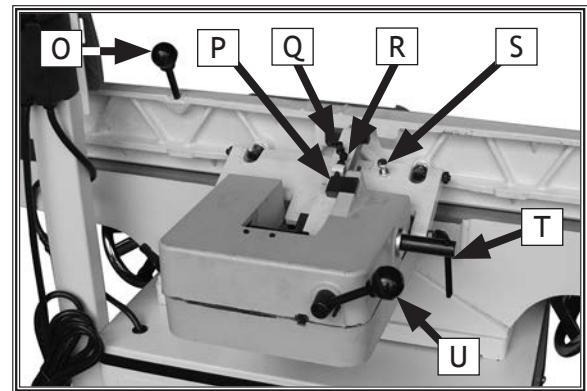


Figure 5. Fence controls and components.

SAFETY

For Your Own Safety, Read Manual Before Operating Machine

The purpose of safety symbols is to attract your attention to possible hazardous conditions. This manual uses a series of symbols and signal words intended to convey the level of importance of the safety messages. The progression of symbols is described below. Remember that safety messages by themselves do not eliminate danger and are not a substitute for proper accident prevention measures—this responsibility is ultimately up to the operator!



Indicates an imminently hazardous situation which, if not avoided, **WILL** result in death or serious injury.



Indicates a potentially hazardous situation which, if not avoided, **COULD** result in death or serious injury.



Indicates a potentially hazardous situation which, if not avoided, **MAY** result in minor or moderate injury.

NOTICE

This symbol is used to alert the user to useful information about proper operation of the equipment or a situation that may cause damage to the machinery.

Standard Machinery Safety Instructions

OWNER'S MANUAL. Read and understand this owner's manual **BEFORE** using machine.

TRAINED OPERATORS ONLY. Untrained operators have a higher risk of being hurt or killed. Only allow trained/supervised people to use this machine. When machine is not being used, disconnect power, remove switch keys, or lock-out machine to prevent unauthorized use—especially around children. Make workshop kid proof!

DANGEROUS ENVIRONMENTS. Do not use machinery in areas that are wet, cluttered, or have poor lighting. Operating machinery in these areas greatly increases the risk of accidents and injury.

MENTAL ALERTNESS REQUIRED. Full mental alertness is required for safe operation of machinery. Never operate under the influence of drugs or alcohol, when tired, or when distracted.

ELECTRICAL EQUIPMENT INJURY RISKS. You can be shocked, burned, or killed by touching live electrical components or improperly grounded machinery. To reduce this risk, only allow an electrician or qualified service personnel to do electrical installation or repair work, and always disconnect power before accessing or exposing electrical equipment.

DISCONNECT POWER FIRST. Always disconnect machine from power supply **BEFORE** making adjustments, changing tooling, or servicing machine. This eliminates the risk of injury from unintended startup or contact with live electrical components.

EYE PROTECTION. Always wear ANSI-approved safety glasses or a face shield when operating or observing machinery to reduce the risk of eye injury or blindness from flying particles. Everyday eyeglasses are not approved safety glasses.

WEARING PROPER APPAREL. Do not wear clothing, apparel, or jewelry that can become entangled in moving parts. Always tie back or cover long hair. Wear non-slip footwear to avoid accidental slips, which could cause loss of workpiece control.

HAZARDOUS DUST. Dust created while using machinery may cause cancer, birth defects, or long-term respiratory damage. Be aware of dust hazards associated with each workpiece material, and always wear a NIOSH-approved respirator to reduce your risk.

HEARING PROTECTION. Always wear hearing protection when operating or observing loud machinery. Extended exposure to this noise without hearing protection can cause permanent hearing loss.

REMOVE ADJUSTING TOOLS. Tools left on machinery can become dangerous projectiles upon startup. Never leave chuck keys, wrenches, or any other tools on machine. Always verify removal before starting!

INTENDED USAGE. Only use machine for its intended purpose—never make modifications without prior approval from Woodstock International. Modifying machine or using it differently than intended will void the warranty and may result in malfunction or mechanical failure that leads to serious personal injury or death!

AWKWARD POSITIONS. Keep proper footing and balance at all times when operating machine. Do not overreach! Avoid awkward hand positions that make workpiece control difficult or increase the risk of accidental injury.

CHILDREN & BYSTANDERS. Keep children and bystanders at a safe distance from the work area. Stop using machine if they become a distraction.

GUARDS & COVERS. Guards and covers reduce accidental contact with moving parts or flying debris—make sure they are properly installed, undamaged, and working correctly.

FORCING MACHINERY. Do not force machine. It will do the job safer and better at the rate for which it was designed.

NEVER STAND ON MACHINE. Serious injury may occur if machine is tipped or if the cutting tool is unintentionally contacted.

STABLE MACHINE. Unexpected movement during operation greatly increases risk of injury or loss of control. Before starting, verify machine is stable and mobile base (if used) is locked.

USE RECOMMENDED ACCESSORIES. Consult this owner's manual or the manufacturer for recommended accessories. Using improper accessories will increase risk of serious injury.

UNATTENDED OPERATION. To reduce the risk of accidental injury, turn machine **OFF** and ensure all moving parts completely stop before walking away. Never leave machine running while unattended.

MAINTAIN WITH CARE. Follow all maintenance instructions and lubrication schedules to keep machine in good working condition. A machine that is improperly maintained could malfunction, leading to serious personal injury or death.

CHECK DAMAGED PARTS. Regularly inspect machine for any condition that may affect safe operation. Immediately repair or replace damaged or mis-adjusted parts before operating machine.

MAINTAIN POWER CORDS. When disconnecting cord-connected machines from power, grab and pull the plug—NOT the cord. Pulling the cord may damage the wires inside, resulting in a short. Do not handle cord/plug with wet hands. Avoid cord damage by keeping it away from heated surfaces, high traffic areas, harsh chemicals, and wet/damp locations.

EXPERIENCING DIFFICULTIES. If at any time you experience difficulties performing the intended operation, stop using the machine! Contact Technical Support at (360) 734-3482.

Additional Safety for Jointers

Serious cuts, amputation, entanglement, or death can occur from contact with rotating cutterhead or other moving components! Flying chips from cutting operations can cause eye injuries or blindness. Workpieces or inserts/knives thrown by cutterhead (kickback) can strike nearby operator or bystanders with deadly force. To reduce the risk of serious personal injury from these hazards, operator and bystanders **MUST** completely heed the hazards and warnings below.

KICKBACK. Occurs when workpiece is ejected from machine at high rate of speed. Kickback injuries occur from getting struck by workpiece or hands being pulled into cutterhead. To reduce risk of kickback, only use proper workpieces, safe feeding techniques, and proper machine setup.

GUARD REMOVAL. Operating jointer without guards exposes operator to knives/inserts and other hazardous moving parts. Except when rabbeting, never operate jointer or allow it to be connected to power if any guards are removed. Turn jointer **OFF** and disconnect power before clearing any shavings or sawdust from around cutterhead. After rabbeting or maintenance is complete, immediately replace all guards and ensure they are properly installed/adjusted before resuming regular operations.

DULL/DAMAGED KNIVES/INSERTS. Dull or damaged knives/inserts increase risk of kickback and cause poor workpiece finish. Only use sharp, undamaged knives/inserts.

OUTFEED TABLE ALIGNMENT. Setting outfeed table too high can cause workpiece to hit table or get stuck while feeding. Setting outfeed table too low may cause workpiece to rock or shift while feeding. Both results will increase risk of kickback. Always keep outfeed table even with knives/inserts at highest point during rotation.

INSPECTING STOCK. Impact injuries or kickback may result from using improper workpieces. Thoroughly inspect and prepare workpiece before cutting. Verify workpiece is free of nails, staples, loose knots or other foreign material.

MAXIMUM CUTTING DEPTH. To reduce risk of kickback, never cut deeper than $\frac{1}{8}$ ".

GRAIN DIRECTION. Jointing against the grain or end grain can increase the risk of kickback. It also requires more cutting force, which produces chatter or excessive chip out. Always joint or surface plane with the grain.

CUTTING LIMITATIONS. Cutting workpieces that do not meet minimum dimension requirements can result in kickback or accidental contact with cutterhead. Never perform jointing, planing, or rabbeting cuts on pieces smaller than specified in data sheet.

PUSH BLOCKS. Push blocks reduce risk of accidental cutterhead contact with hands. Always use push blocks when planing materials less than 3" high or wide. Never pass your hands directly over cutterhead without a push block.

WORKPIECE SUPPORT. Poor workpiece support or loss of workpiece control while feeding will increase risk of kickback or accidental contact with cutterhead. Support workpiece with fence continuously during operation. Support long stock with auxiliary table if necessary.

FEED WORKPIECE PROPERLY. Kickback or accidental cutterhead contact may result if workpiece is fed into cutterhead the wrong way. Allow cutterhead to reach full speed before feeding. Never start jointer with workpiece touching cutterhead. Always feed workpiece from infeed side to outfeed side without stopping until cut is complete. Never move workpiece backwards while feeding.

SECURE KNIVES/INSERTS. Loose knives or improperly set inserts can be thrown from cutterhead with dangerous force. Always verify knives/inserts are secure and properly adjusted before operation. Straight knives should never project more than $\frac{1}{8}$ " (0.125") from cutterhead body.

ELECTRICAL

Circuit Requirements

This machine must be connected to the correct size and type of power supply circuit, or fire or electrical damage may occur. Read through this section to determine if an adequate power supply circuit is available. If a correct circuit is not available, a qualified electrician **MUST** install one before you can connect the machine to power.

A power supply circuit includes all electrical equipment between the breaker box or fuse panel in the building and the machine. The power supply circuit used for this machine must be sized to safely handle the full-load current drawn from the machine for an extended period of time. (If this machine is connected to a circuit protected by fuses, use a time delay fuse marked D.)

Full-Load Current Rating

The full-load current rating is the amperage a machine draws at 100% of the rated output power. On machines with multiple motors, this is the amperage drawn by the largest motor or sum of all motors and electrical devices that might operate at one time during normal operations.

Full-Load Current Rating at 230V 12 Amps

Circuit Requirements


This machine is prewired to operate on a power supply circuit that has a verified ground and meets the following requirements:

Circuit Type 220V/240V, 60 Hz, Single-Phase
Circuit Size 20 Amps
Plug/Receptacle NEMA 6-20

⚠ WARNING

The machine must be properly set up before it is safe to operate. **DO NOT** connect this machine to the power source until instructed to do so later in this manual.

⚠ WARNING



Incorrectly wiring or grounding this machine can cause electrocution, fire, or machine damage. To reduce this risk, only an electrician or qualified service personnel should do any required electrical work on this machine.

NOTICE

The circuit requirements listed in this manual apply to a dedicated circuit—where only one machine will be running at a time. If this machine will be connected to a shared circuit where multiple machines will be running at the same time, consult with an electrician to ensure that the circuit is properly sized for safe operation.

ELECTRICAL

Grounding Requirements

This machine **MUST** be grounded. In the event of certain types of malfunctions or breakdowns, grounding provides a path of least resistance for electric current to travel—in order to reduce the risk of electric shock.

Improper connection of the equipment-grounding wire will increase the risk of electric shock. The wire with green insulation (with/without yellow stripes) is the equipment-grounding wire. If repair or replacement of the power cord or plug is necessary, do not connect the equipment-grounding wire to a live (current carrying) terminal.

Check with a qualified electrician or service personnel if you do not understand these grounding requirements, or if you are in doubt about whether the tool is properly grounded. If you ever notice that a cord or plug is damaged or worn, disconnect it from power, and immediately replace it with a new one.

For 220V Connection

This machine is equipped with a power cord that has an equipment-grounding wire and NEMA 6-20 grounding plug (see figure). The plug must only be inserted into a matching receptacle that is properly installed and grounded in accordance with local codes and ordinances.

Extension Cords

We do not recommend using an extension cord with this machine. Extension cords cause voltage drop, which may damage electrical components and shorten motor life. Voltage drop increases with longer extension cords and smaller gauge sizes (higher gauge numbers indicate smaller sizes).

Any extension cord used with this machine must contain a ground wire, match the required plug and receptacle, and meet the following requirements:

- Minimum Gauge Size at 220V 12 AWG
- Maximum Length (Shorter is Better) 50 ft.

ELECTRICAL

⚠ WARNING

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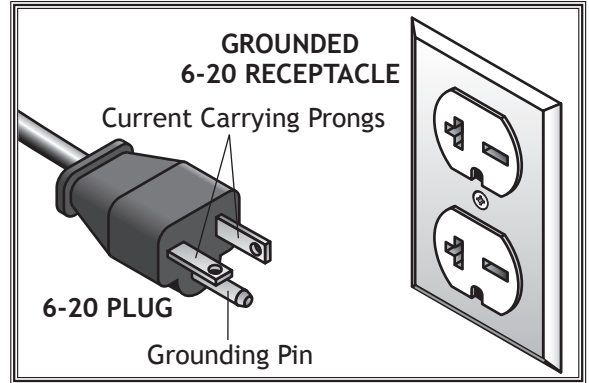


Figure 6. NEMA 6-20 plug & receptacle.

⚠ CAUTION

No adapter should be used with the required plug. If the plug does not fit the available receptacle or the machine must be reconnected to a different type of circuit, the reconnection must be made by an electrician or qualified service personnel and it must comply with all local codes and ordinances.

SETUP


Unpacking

This machine has been carefully packaged for safe transportation. If you notice the machine has been damaged during shipping, please contact your authorized Shop Fox dealer immediately.

Items Needed for Setup

The following items are needed, but not included, to set up your machine.


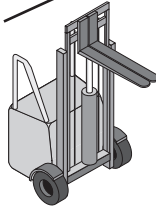
Description	Qty
• Additional People.....	1-3
• Safety Glasses.....	1 ea.
• Leather Gloves.....	1 Pair ea.
• Cleaner/Degreaser	As Needed
• Disposable Rags	As Needed
• Lifting Equipment (Min. 600-lb Rating):	
—Forklift or Hoist	1
—Lifting Slings.....	2
• Precision Straightedge 3'	1
• Phillips Screwdriver #2	1
• Dust-Collection System	1
• 4" Dust Hose (length as needed).....	1
• 4" Hose Clamp.....	1



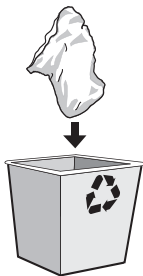
!WARNING
This machine presents serious injury hazards to untrained users. Read through this entire manual to become familiar with the controls and operations before starting the machine!



!WARNING
Wear safety glasses during entire setup process!

!WARNING
HEAVY LIFT!
Straining or crushing injury may occur from improperly lifting the machine or some of its parts. To reduce this risk, get help from other people and use a forklift (or other lifting equipment) rated for weight of machine.



!WARNING
SUFFOCATION HAZARD!
Immediately discard all plastic bags and packing materials to eliminate choking/suffocation hazards for children and animals.

SETUP

Inventory

The following is a list of items shipped with your machine. Before beginning setup, lay these items out and inventory them.

Note: If you cannot find an item on this list, carefully check around/inside the machine and packaging materials. Often, these items get lost in packaging materials while unpacking or they are pre-installed at the factory.

Wood Crate (Figure 7) Qty
 A. Table Assembly.....1

Cardboard Box (Figure 8) Qty
 B. Stand1

Loose Items (Figure 9) Qty

- C. Switch Pedestal Assembly1
- D. Lock Washers 8mm (Pedestal).....2
- E. Cap Screws M8-1.25 x 70 (Pedestal).....2
- F. Handwheels.....2
- G. Lock Washers 10mm (Table)3
- H. Hex Standoffs $3/8$ "-16 x $3/4$ " x $3 5/16$ " (Table).....3
- I. 4" Dust Port.....1
- J. Flat Washers $1/4$ " (Dust Port).....4
- K. Phillips Head Screws $1/4$ "-20 x $1/2$ " (Dust Port)4
- L. Cutterhead Guard Assembly1
- M. Rear Access Panel1
- N. Push Blocks2
- O. Belt1
- P. Hex Wrenches 3, 4, 5, 6mm 1 Ea.
- Q. Open-End Wrenches 8/10, 11/13, 12/14mm..... 1 Ea.
- R. Knife-Setting Jig (W1857)
 - E-Clips.....4
 - Knife Jig Feet2
 - Knife Jig Rod1
- S. Cutterhead Tools and Hardware (W1858)
 - T-Handle Torx Driver T-252
 - Torx Screws T-25 #10-32 x $1/2$ "..... 10
 - Indexable Inserts 15 x 15 x 2.5mm5

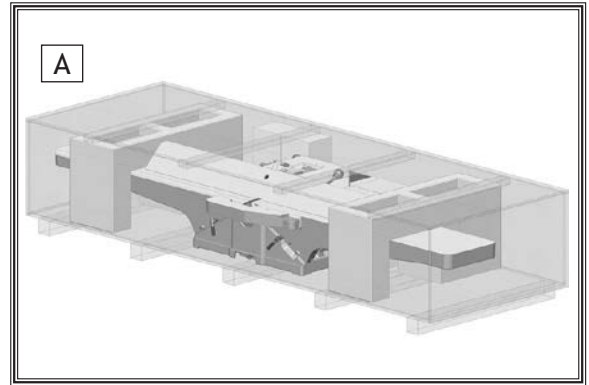


Figure 7. Inventory—wood crate.

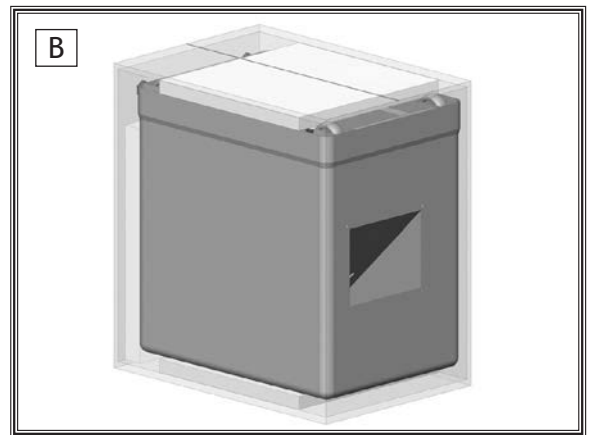


Figure 8. Inventory—cardboard box.

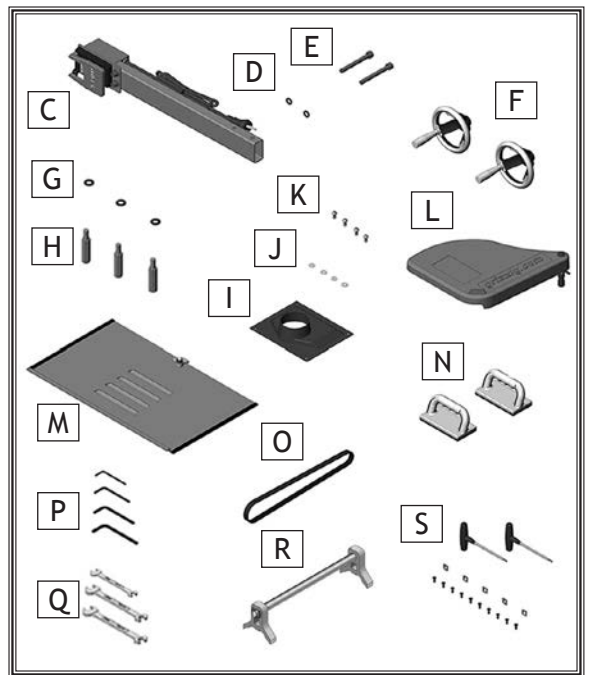


Figure 9. Inventory—loose items.

SETUP

Cleaning Machine

To prevent corrosion during shipment and storage of your machine, the factory has coated the bare metal surfaces of your machine with a heavy-duty rust prevention compound.

If you are unprepared or impatient, this compound can be difficult to remove. To ensure that the removal of this coating is as easy as possible, please gather the correct cleaner, lubricant, and tools listed below:

- Cleaner/degreaser designed to remove storage wax and grease
- Safety glasses & disposable gloves
- Solvent brush or paint brush
- Disposable Rags

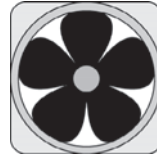
To remove rust preventative coating, do these steps:

1. DISCONNECT MACHINE FROM POWER!
2. Put on safety glasses and disposable gloves.
3. Coat the rust preventative with a liberal amount of cleaner/degreaser, then let it soak for 5-10 minutes.
4. Wipe off surfaces. If your cleaner/degreaser is effective, the coating will wipe off easily.

Tip: *An easier way to clean off thick coats of rust preventative from flat surfaces is to use a PLASTIC paint scraper to scrape off the majority of the coating before wiping it off with your rag. (Do not use a metal scraper or you may scratch your machine.)*

5. Repeat cleaning steps as necessary until all of the compound is removed.
6. To prevent rust on freshly cleaned surfaces, immediately coat with a quality metal protectant.

WARNING



Gasoline and petroleum products have low flash points and can explode or cause fire if used to clean machinery. Avoid using these products to clean machinery. Many cleaning solvents are toxic if inhaled. Minimize your risk by only using these products in a well ventilated area.

NOTICE

In a pinch, automotive degreasers, mineral spirits or WD•40 can be used to remove rust preventative coating. Before using these products, though, test them on an inconspicuous area of your paint to make sure they will not damage it.

Machine Placement

Weight Load

Refer to the **Machine Specifications** for the weight of your machine. Make sure that the surface upon which the machine is placed will bear the weight of the machine, additional equipment that may be installed on the machine, and the heaviest workpiece that will be used. Additionally, consider the weight of the operator and any dynamic loading that may occur when operating the machine.

Space Allocation

Consider the largest size of workpiece that will be processed through this machine and provide enough space around the machine for adequate operator material handling or the installation of auxiliary equipment. With permanent installations, leave enough space around the machine to open or remove doors/covers as required by the maintenance and service described in this manual. **See below for required space allocation.**

Physical Environment

The physical environment where your machine is operated is important for safe operation and the longevity of its components. For best results, operate this machine in a dry environment that is free from excessive moisture, hazardous chemicals, airborne abrasives, or extreme conditions. Extreme conditions for this type of machinery are generally those where the ambient temperature range exceeds 41°-104°F; the relative humidity range exceeds 20-95% (non-condensing); or the environment is subject to vibration, shocks, or bumps.

Electrical Installation

Place this machine near an existing power source. Make sure all power cords are protected from traffic, material handling, moisture, chemicals, or other hazards. Make sure to leave access to a means of disconnecting the power source or engaging a lockout/tagout device.

Lighting

Lighting around the machine must be adequate enough that operations can be performed safely. Shadows, glare, or strobe effects that may distract or impede the operator must be eliminated.

SETUP

	<p>⚠ CAUTION</p> <p>Children or untrained people may be seriously injured by this machine. Only install in an access restricted location.</p>
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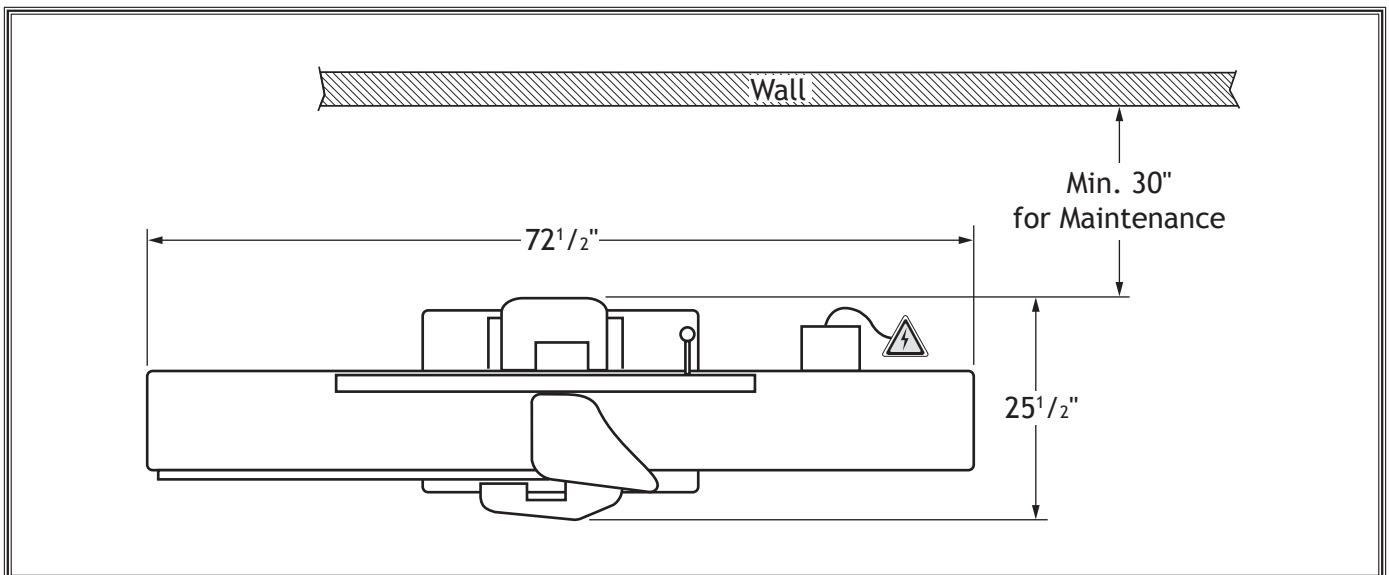


Figure 10. Working clearances.

Assembly

Before beginning the assembly process, refer to **Items Needed for Setup** and gather everything you need. Ensure all parts have been properly cleaned of any heavy-duty rust-preventative applied at the factory (if applicable). Be sure to complete all steps in the assembly procedure prior to performing the **Test Run** or connecting

This jointer is equipped with a mobile base to allow moving and placing of machine without power lifting equipment. **DO NOT** attempt to lift or move jointer without necessary assistance from other people. If using power lifting equipment (such as a forklift or crane), each piece of lifting equipment must be rated for **at least 600 lbs.** to support dynamic loads that may be applied while lifting.

Review the **Electrical** section (see **Page 13**), then prepare a permanent location for the jointer.

Note: Do not destroy cardboard box or wood shipping crate and packaging until after Test Run.

To assemble machine, do these steps:

1. Open cardboard box and place stand upright.
2. Tighten mobile base lock knobs (see **Figure 2** on **Page 8**) to secure stand in position.
3. Remove top and sides of wood shipping crate, then place small items aside in safe location.
4. With help from another person, remove fence assembly, including belt cover, from table assembly and set aside in safe location.
5. If lifting table assembly without power lifting equipment, lift table assembly off shipping pallet with help of three people and carefully place it on top of stand. Proceed to **Step 7**.

IMPORTANT: Tighten table locks to prevent damaging tables.

6. If lifting table assembly with power lifting equipment, attach lifting slings to table assembly, as shown in **Figure 11**, and carefully place it on top of stand.

	<p>! WARNING HEAVY LIFT! Straining or crushing injury may occur from improperly lifting the machine or some of its parts. To reduce this risk, get help from other people and use a forklift (or other lifting equipment) rated for weight of machine.</p>
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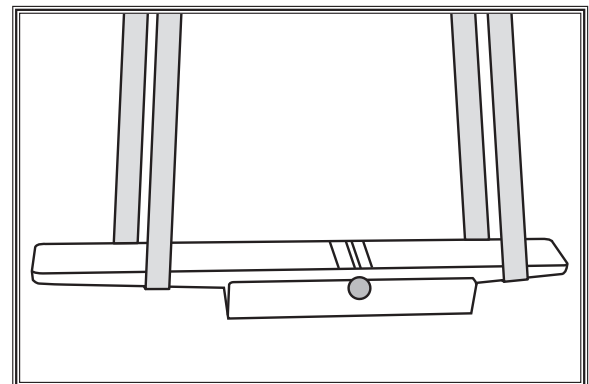


Figure 11. Lifting slings properly positioned.

SETUP

- Adjust position of table assembly so cutterhead pulley and motor pulley are aligned, and then secure table assembly to stand with (3) hex standoffs $\frac{3}{8}$ "-16 x $\frac{3}{4}$ " x $3 \frac{5}{16}$ " and (3) 10mm lock washers (see Figure 12).



Figure 12. Table assembly secured to stand.

- Adjust feet (see Figure 13) as necessary until jointer is stable without any rocking or wobbling.

IMPORTANT: Ensure jointer is stable and unable to accidentally move prior to operations.

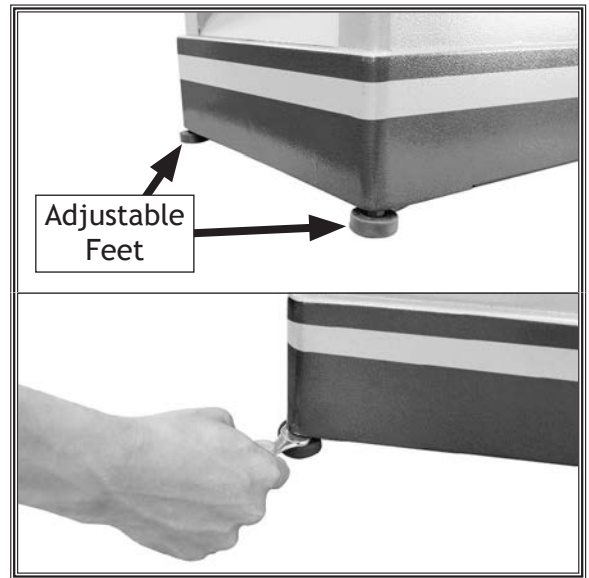


Figure 13. Stabilizing jointer.

- Loosen motor mount fasteners shown in Figure 14. DO NOT completely remove fasteners.
- Slide motor upward, place poly-V belt around cutterhead pulley and motor pulley, then slide motor down to rest on belt (see Figure 14).

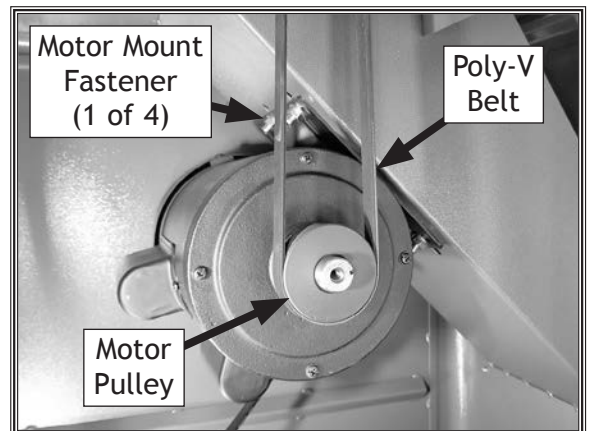


Figure 14. V-belt installed.

SETUP

11. Look down length of belt and pulley faces to check pulley alignment (see **Figures 15-16**). If available use a narrow straightedge against pulley faces to check alignment.
 - If pulleys are aligned, proceed to **Step 14**.
 - If pulleys are not aligned, perform **Steps 12-13**.
12. Loosen motor pulley set screw and cutterhead pulley set screw and align both pulleys. (Use straightedge if needed.)

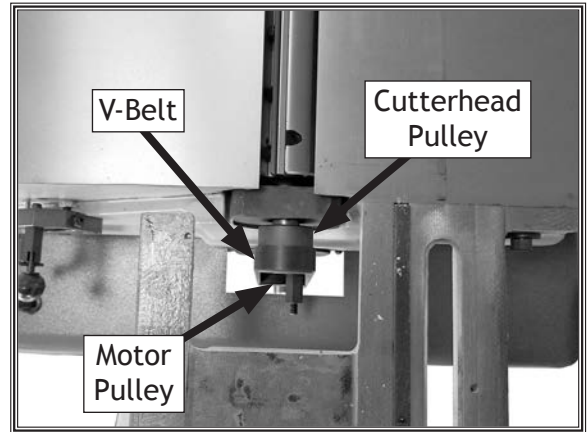


Figure 15. Checking pulley alignment (viewed from above).

13. Tighten set screws and repeat **Step 10** to verify proper pulley alignment. Pulleys should be aligned, as shown in **Figure 16**, when belt is properly tensioned.

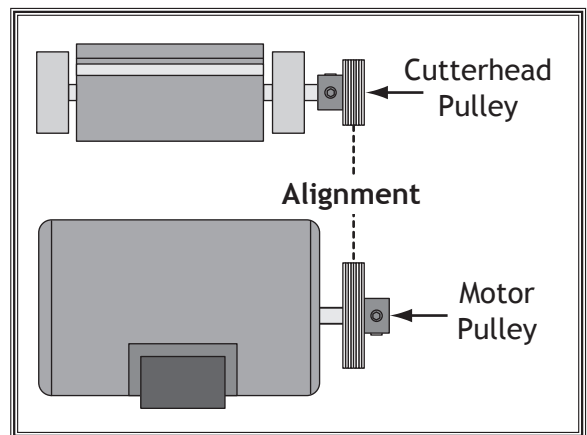


Figure 16. Proper pulley alignment.

14. Adjust belt tension by applying downward pressure on motor until there is approximately $\frac{1}{4}$ " deflection when belt is pushed with moderate force, as shown in **Figure 17**.

Note: After the first 16 hours of operation, re-tension the belt, as it will stretch and seat during this time, which causes it to lose the initial tension you set.

15. Tighten motor mount fasteners (see **Figure 14** on **Page 20**).
16. Re-install fence assembly, including belt cover.

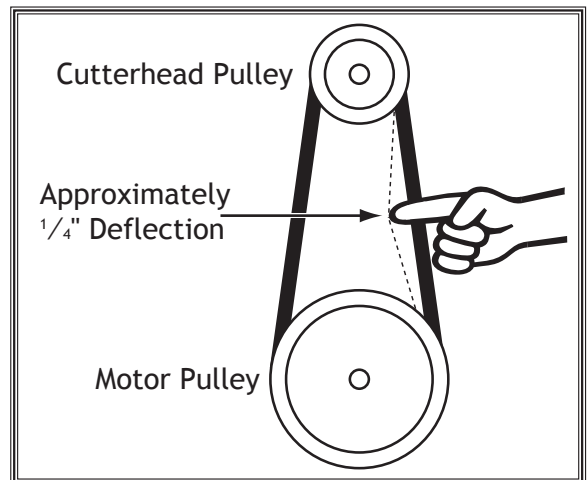


Figure 17. Checking for proper belt tension.

SETUP

17. Attach switch pedestal to stand with (2) M8-1.25 x 70 cap screws and (2) 8mm lock washers (see **Figure 18**).
18. Connect switch cord to motor cord (see **Figure 18**).

Note: The switch cord and motor cord have matching plugs for easy connection.

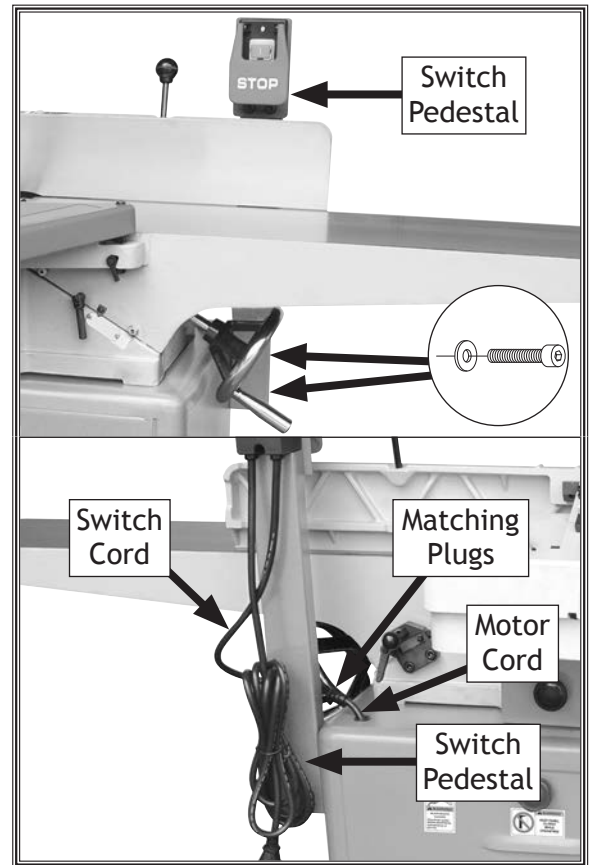


Figure 18. Switch pedestal attached to stand and cords connected.

19. Install dust port with (4) 1/4"-20 x 1/2" Phillips head screws and (4) 1/4" flat washers (see **Figure 19**).

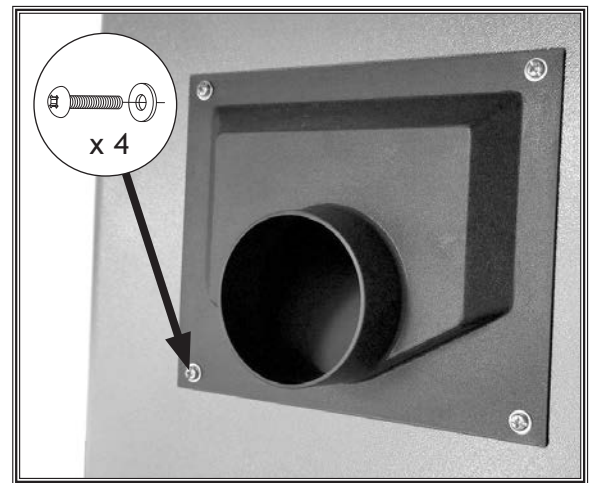


Figure 19. Dust port installed.

20. Slide handwheels onto leadscrews, and secure with pre-installed $\frac{5}{16}$ "-18 x $\frac{1}{2}$ " Phillips head screws and 8.5 x 23 x 2mm fender washers (see **Figure 20**).
21. Verify outfeed table height is set correctly with knives/inserts at top dead center (TDC) (refer to **Setting Outfeed Table Height on Page 50**) and all knives/inserts are securely tightened in cutterhead.

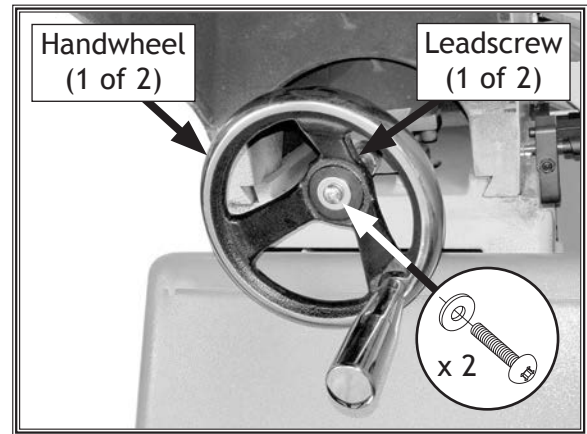


Figure 20. Handwheel secured to leadscrew (1 of 2).

22. Set fence to 90° and move it all the way back.
23. Remove pre-installed button head cap screw and fender washer from bottom of cutterhead guard shaft; then loosen shaft lock and insert shaft into mounting hole, positioned so guard rests against fence.
24. Tighten shaft lock to secure setting, then install button head cap screw and fender washer.
25. Verify proper operation of cutterhead guard by setting fence to 90°, moving fence to rear of table, then pulling cutterhead guard back and letting it go. It should spring back over cutterhead and contact fence without dragging across outfeed table.
 - If cutterhead guard does not spring back over cutterhead and contact fence, or if it drags across outfeed table, then it must be adjusted (refer to **Checking/Adjusting Cutterhead Guard on Page 57** for instructions).

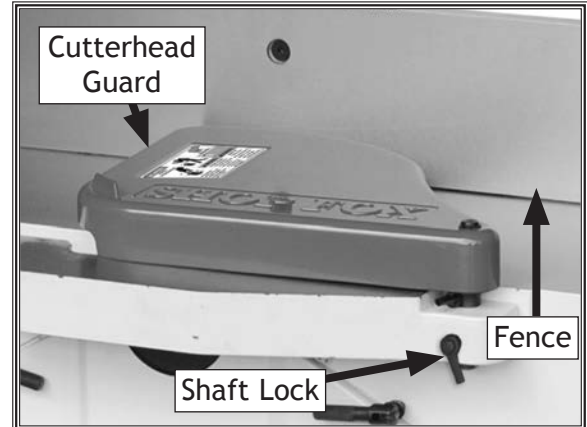


Figure 21. Cutterhead guard contacting fence.

SETUP

Knife-Setting Jig (W1857)

Assemble the knife-setting jig (see **Figure 22**) using the knife-setting jig rod, feet, and E-clips.



Figure 22. Knife-setting jig assembly (W1857 only).

Dust Collection

Recommended CFM at Dust Port: 400 CFM

Do not confuse this CFM recommendation with the rating of the dust collector. To determine the CFM at the dust port, you must consider these variables: (1) CFM rating of the dust collector, (2) hose type and length between the dust collector and the machine, (3) number of branches or wyes, and (4) amount of other open lines throughout the system. Explaining how to calculate these variables is beyond the scope of this manual. Consult an expert or purchase a good dust collection “how-to” book.

CAUTION

This machine creates substantial amounts of dust during operation. Breathing airborne dust on a regular basis can result in permanent respiratory illness. Reduce your risk by wearing a respirator and capturing the dust with a dust collection system.

Item(s) Needed	Qty
Dust-Collection System	1
Dust Hose 4"	1
Hose Clamps 4"	2

To connect a dust-collection hose, do these steps:

1. Fit a 4" dust hose over the dust port, as shown in **Figure 23**, and secure it in place with a hose clamp.
2. Tug the hose to make sure it does not come off.

Note: A tight fit is necessary for proper performance.

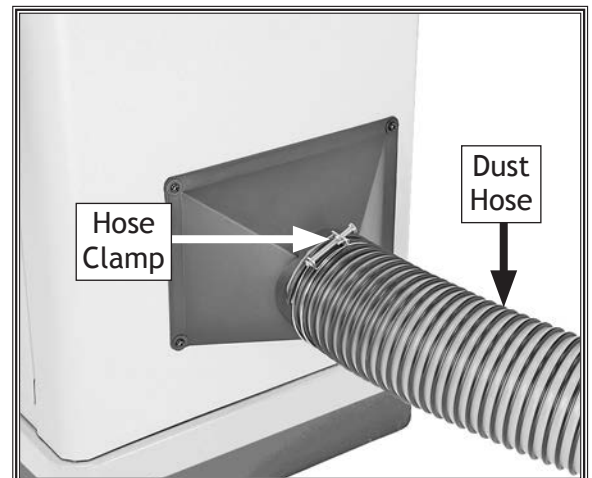


Figure 23. Example of dust hose connected to dust port.

SETUP

Test Run

Once assembly is complete, test run the machine to ensure it is properly connected to power and safety components are functioning properly.

If you find an unusual problem during the test run, immediately stop the machine, disconnect it from power, and fix the problem BEFORE operating the machine again. The **Troubleshooting** table in the **SERVICE** section of this manual can help.

To test run the machine, do these steps:

1. Clear all setup tools away from machine.
2. Connect machine to power supply.
3. Push ON button to start machine. A correctly operating machine runs smoothly with little or no vibration or rubbing noises.
4. Push STOP paddle to stop machine. Congratulations! The Test Run is complete.

Tensioning Belt

The final step in the setup process must be done after approximately 16 hours of operation. During this first 16 hours, the belt will stretch and seat into the pulley groove. After this time, you must re-tension the belt to avoid slippage and burn out. Refer to **Page 55** when you are ready to perform this important adjustment.

Note: *Pulleys and belt can get hot. This is a normal condition. Allow them to cool before making adjustments.*

A small amount of black belt dust at the bottom of the belt housing is normal during the life of the machine and does not indicate a problem with the machine or belt.

WARNING

Serious injury or death can result from using this machine BEFORE understanding its controls and related safety information. DO NOT operate, or allow others to operate, machine until the information is understood.

WARNING

DO NOT start machine until all preceding setup instructions have been performed. Operating an improperly set up machine may result in malfunction or unexpected results that can lead to serious injury, death, or machine/property damage.

Disabling & Locking Switch

!WARNING

Children or untrained people can be killed or seriously injured by this machine. This risk increases with unsupervised operation. To help prevent unsupervised operation, disable and lock the switch before leaving machine unattended! Place key in a well-hidden or secure location.

The switch can be disabled and locked by inserting a padlock through the ON/START button, as shown. Locking the switch in this manner can prevent unauthorized operation of the machine, which is especially important if the machine is not stored inside an access-restricted building.

IMPORTANT: Locking the switch with a padlock only restricts its function. It is not a substitute for disconnecting power from the machine when adjusting or servicing.

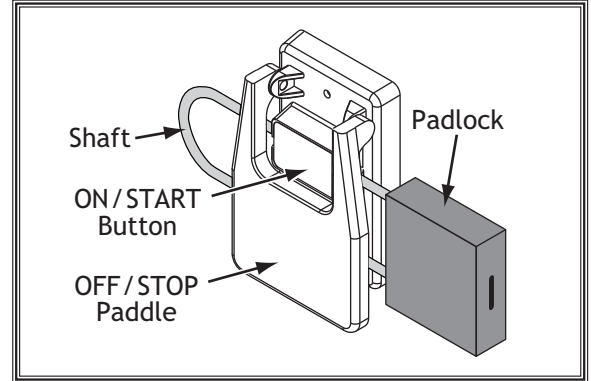


Figure 24. Switch disabled by padlock.

!WARNING

The padlock shaft diameter is important to the disabling function of the switch. Use padlocks with a maximum shaft diameter of 4mm. With any padlock used to lock the switch, test the switch after installation to ensure that it is properly disabled.

OPERATIONS

General

This machine will perform many types of operations that are beyond the scope of this manual. Many of these operations can be dangerous or deadly if performed incorrectly.

The instructions in this section are written with the understanding that the operator has the necessary knowledge and skills to operate this machine. If at any time you are experiencing difficulties performing any operation, stop using the machine!

The overview below provides the novice machine operator with a basic understanding of how the machine is used during operation, so the machine controls/components discussed later in this manual are easier to understand. Due to its generic nature, this overview is **NOT** intended to be an instructional guide.

To complete a typical operation with the jointer, the operator does the following:

1. Examines workpiece to verify it is safe and suitable for cutting.
2. Adjusts fence for width of workpiece and locks it in place.
3. Adjusts fence tilt, if necessary.
4. Adjusts infeed table height to set depth of cut per pass.
5. Puts on safety glasses, respirator, and any other required protective equipment.
6. Starts jointer.
7. Using push blocks as needed, holds workpiece firmly against infeed table and fence, and feeds workpiece into cutterhead at a steady and controlled rate until entire length of workpiece has been cut and it clears the cutterhead on the outfeed table side.
8. Repeats cutting process described above until desired results are achieved.
9. Stops jointer.

! WARNING

To reduce your risk of serious injury or damage to the machine, read this entire manual **BEFORE** using machine.

! WARNING

To reduce the risk of eye injury and long-term respiratory damage, always wear safety glasses and a respirator while operating this machine.

NOTICE

If you are an inexperienced operator, we strongly recommend that you read books or trade articles, or seek training from an experienced operator of this type of machinery before performing unfamiliar operations. Above all, safety must come first!

Stock Inspection

Follow these rules when choosing and jointing stock:

- **DO NOT joint or surface plane stock that contains large or loose knots.** Injury to the operator or damage to the workpiece can occur if a knot becomes dislodged during the cutting operation.
- **DO NOT joint or surface plane against the grain direction.** Cutting against the grain increases the likelihood of kickback, as well as tear-out on the workpiece.
- **Jointing and surface planing with the grain produces a better finish and is safer for the operator.** Cutting with the grain is described as feeding the stock on the jointer so the grain points down and toward you as viewed on the edge of the stock (see Figure below).

Note: If the grain changes direction along the edge of the board, decrease the cutting depth and make additional passes.

- **Scrape all glue off the workpiece before jointing.** Glue deposits on the workpiece, hard or soft, will gum up the cutterhead and produce poor results.
- **Remove foreign objects from the workpiece.** Make sure that any stock you process with the jointer is clean and free of dirt, nails, staples, tiny rocks or any other foreign objects that could damage the cutterhead. These particles could also cause a spark as they strike the cutterhead and create a fire hazard.

IMPORTANT: Wood stacked on a concrete or dirt surface can have small pieces of concrete or stone pressed into the surface.

- **Make sure all stock is sufficiently dried before jointing.** Wood with a moisture content over 20% will cause unnecessary wear on the cutters and poor cutting results. Excess moisture can also hasten rust and corrosion.

OPERATIONS

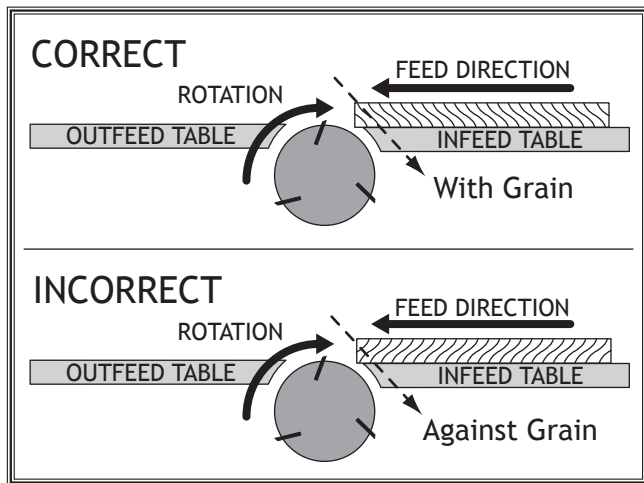


Figure 25. Proper grain alignment with cutterhead.

- **Only cut natural wood.** This jointer is only designed for cutting natural wood stock. Never use it to cut MDF, particle board, plywood, laminates, drywall, backer board, metals, glass, stone, tile, products with lead-based paint, or products that contain asbestos. Cutting these may lead to injury or machine damage.

⚠ WARNING

Make sure your workpiece exceeds the minimum dimension requirement shown below, before processing it through the jointer, or the workpiece may break or kick back during the operation.

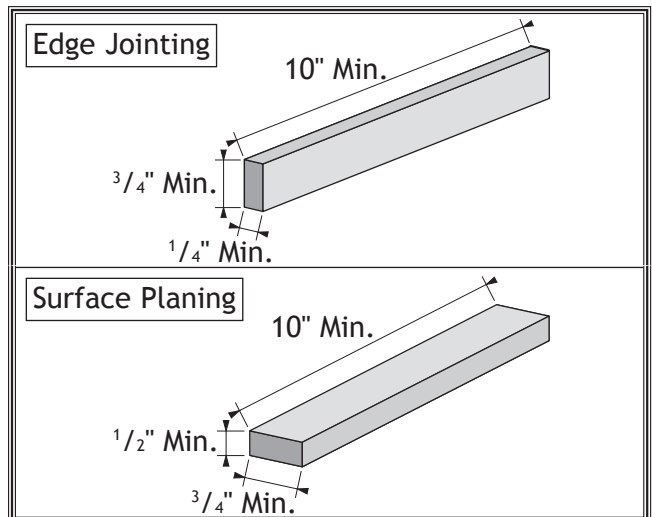


Figure 26. Minimum stock dimensions for jointer.

Squaring Stock

Squaring stock means making it flat and parallel along both length and width, and making the length and width perpendicular to one another.

The purpose of squaring stock is to prepare it for accurate cuts and construction later on.

A properly "squared up" workpiece is essential for tasks such as accurate table saw cuts, glue-ups/laminations, cutting accurate bevels on a bandsaw, and many other applications where one surface of a workpiece is used to reference another.

Item(s) Needed	Qty
Jointer	1
Planer	1
Table Saw	1

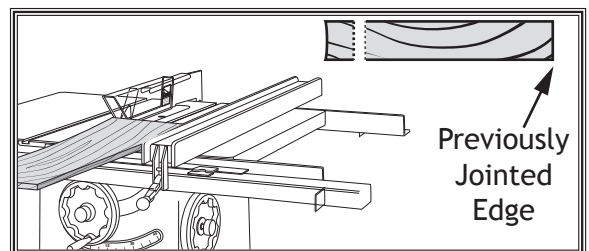
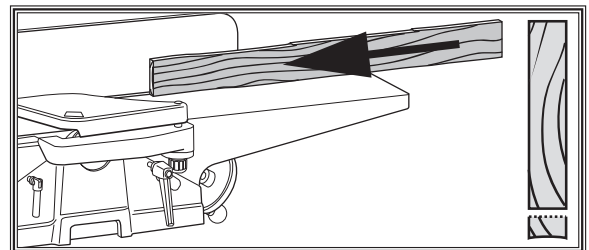
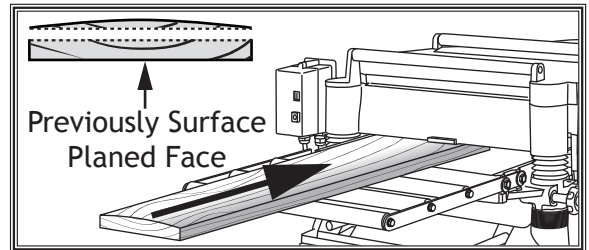
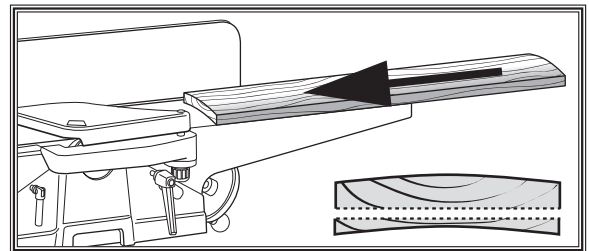
Squaring stock involves four steps performed in the order below:

1. **Surface Plane on Jointer**—Concave face of workpiece is surface planed flat with jointer.

2. **Surface Plane on a Thickness Planer**—Opposite face of workpiece is surface planed flat with a thickness planer.

3. **Edge Joint on Jointer**—Concave edge of workpiece is jointed flat with jointer.

4. **Rip Cut on a Table Saw**—Jointed edge of workpiece is placed against a table saw fence and opposite edge cut off.



Surface Planing

The purpose of surface planing (see **Figure 27**) on the jointer is to make one flat face on a piece of stock to prepare it for thickness planing on a planer.

To surface plane on jointer, do these steps:

1. Inspect stock to ensure it is safe and suitable for the operation (refer to **Stock Inspection** on **Page 28**).
2. Set infeed table height to desired cutting depth for each pass.
 - ▲ **CAUTION:** To minimize risk of kickback, do not exceed a cutting depth of $\frac{1}{16}$ " per pass when surface planing.
3. Set fence to 90° .
4. Start jointer.
5. Place workpiece firmly against fence and infeed table with concave side facing down, as shown in **Figure 27**.

▲ **CAUTION:** To ensure workpiece remains stable during cut, concave sides of workpiece must face toward table and fence.

6. Feed workpiece completely across cutterhead while keeping it firmly against fence and tables during the entire cut.

▲ **CAUTION:** Keep hands at least 4" away from cutterhead during the entire cut. Instead of allowing a hand to pass directly over cutterhead, lift it up and over cutterhead, and safely reposition it on the outfeed side to continue supporting workpiece. Use push blocks whenever practical to further reduce risk of accidental hand contact with cutterhead.

7. Repeat **Step 6** until entire surface is flat.

Tip: When squaring up stock, cut opposite side of workpiece with a planer instead of the jointer to ensure both sides are parallel.

⚠ WARNING

Failure to use push blocks when surface planing could result in your hands contacting rotating cutterhead, which will cause serious personal injury. **ALWAYS** use push blocks when surface planing on jointer!

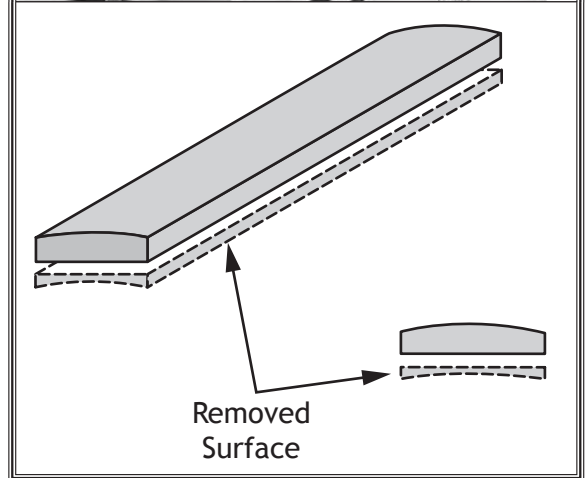


Figure 27. Example of a typical surface planing operation.

Edge Jointing

Edge jointing (see **Figure 28**) produces a flat and true surface along the side of a workpiece by removing uneven areas. It is an essential step for squaring up warped or rough stock and when preparing a workpiece for joinery or finishing.

To edge joint on jointer, do these steps:

1. Inspect stock to ensure it is safe and suitable for the operation (refer to **Stock Inspection** on **Page 28**).
2. Surface plane workpiece (refer to **Surface Planing** on **Page 30**).
3. Set infeed table height to desired cutting depth for each pass.
 - ▲ **CAUTION:** To minimize risk of kickback, do not exceed a cutting depth of $\frac{1}{8}$ " per pass.
4. Set fence to 90° .
5. Start jointer.
6. Place workpiece firmly against fence and infeed table with concave side facing down, as shown in **Figure 28**.

▲ **CAUTION:** To ensure workpiece remains stable during cut, concave sides of workpiece must face toward table and fence.

7. Feed workpiece completely across cutterhead while keeping it firmly against fence and tables during the entire cut.

▲ **CAUTION:** Keep hands at least 4" away from cutterhead during the entire cut. Instead of allowing a hand to pass directly over cutterhead, lift it up and over cutterhead, and safely reposition it on the outfeed side to continue supporting workpiece. Use push blocks whenever practical to further reduce risk of accidental hand contact with cutterhead.

8. Repeat **Step 6** until the entire edge is flat.

Tip: When squaring up stock, cut opposite edge of workpiece with a table saw instead of the jointer—otherwise, both edges of workpiece will not be parallel with each other.

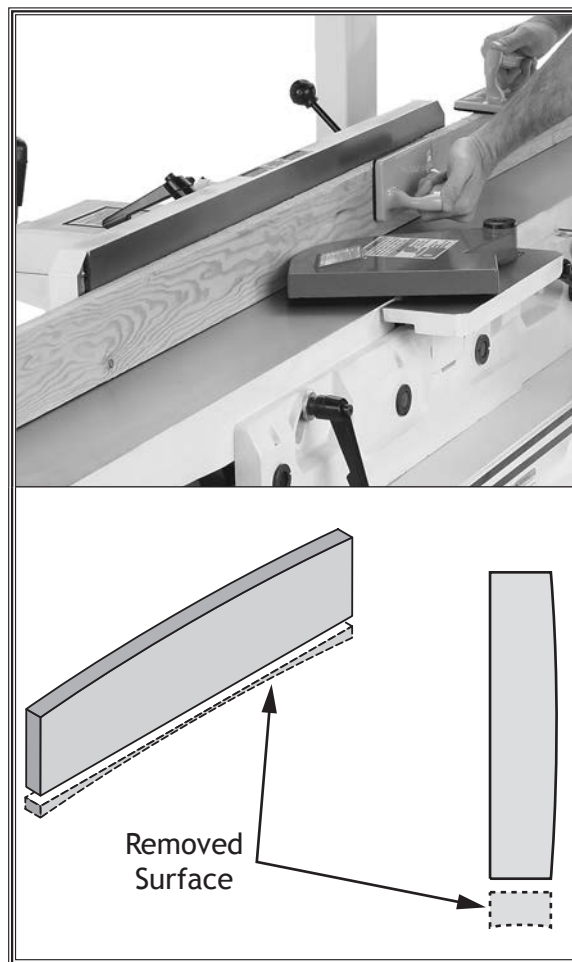


Figure 28. Example of a typical edge jointing operation.

Bevel Cutting

Bevel cuts (see **Figure 29**) can be made by setting the fence at the desired angle and feeding the workpiece firmly along the fence face, with the bottom inside corner firmly against the table. The cutting process typically requires multiple passes or cuts to bevel the entire edge of a workpiece.

To bevel cut on jointer, do these steps:

1. Inspect stock to ensure it is safe and suitable for the operation (refer to **Stock Inspection** on **Page 28**).
2. Surface plane workpiece (refer to **Surface Planing** on **Page 30**).
3. Edge joint workpiece (refer to **Edge Jointing** on **Page 31**).
4. Set infeed table height to cutting depth desired for each pass.

⚠ CAUTION: Cutting depth for bevel cuts is typically between $\frac{1}{16}$ " and $\frac{1}{8}$ ", depending on hardness and width of stock.

5. Set fence tilt to desired angle of cut.
6. Place workpiece against fence and infeed table.
7. Start jointer.
8. With a push block in your leading hand, press workpiece against table and fence with firm pressure, and feed workpiece over cutterhead with a push block in your trailing hand.

⚠ CAUTION: When your leading hand gets within 4" of the cutterhead, lift it up and over cutterhead, and place push block on portion of the workpiece once it is 4" past cutterhead. Now, focus your pressure on outfeed end of the workpiece while feeding, and repeat same action with your trailing hand when it gets within 4" of cutterhead. To help keep your hands safe, **DO NOT** let them get closer than 4" from moving cutterhead at any time during operation!

7. Repeat cutting process, as necessary, until you are satisfied with the results.

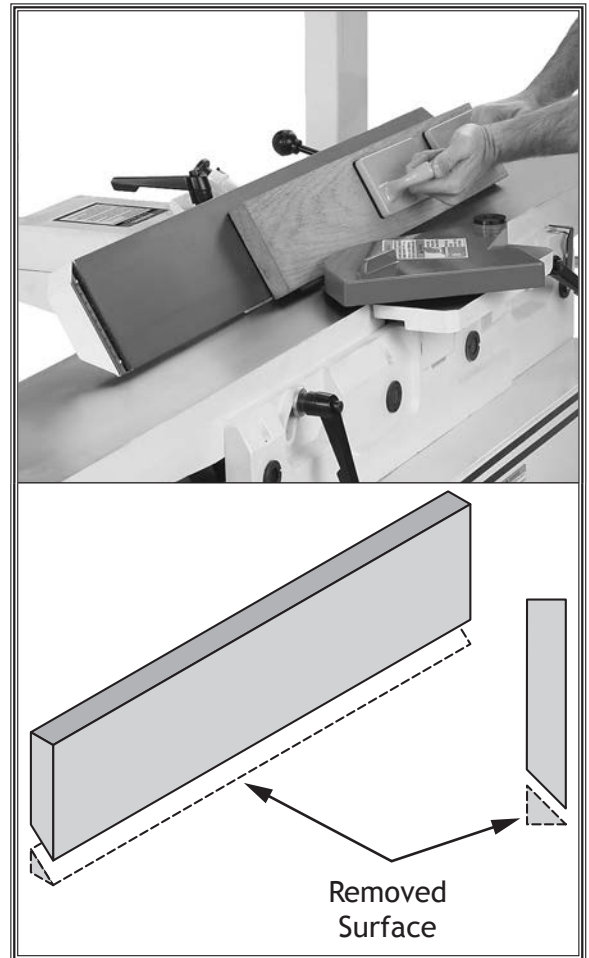


Figure 29. Example of a 45° bevel cutting operation.

Rabbet Cutting

A rabbet cut removes a portion of a workpiece edge, so it fits together with an opposing, equally sized rabbet cut on another workpiece (see **Figures 30–31**). This is a classic method of joining two workpieces that is simple, yet strong.

This jointer can be used to make high-quality rabbet cuts, but there are some situations—whether it is due to an excessively large/small workpiece size or rabbet cutting width/depth—when it will not be safe or appropriate for making the rabbet cut on this jointer. In these cases, you need to use another tool or method for rabbet cutting that will be a safer alternative.

A rabbet cut can alternatively be made using a table saw, router, or even a hand saw. As with any type of cutting operation, always consider your safety first and use good judgement!

Typically, rabbet cutting with a jointer requires the cutterhead guard to be removed first, so the workpiece can slide along the rabbeting ledge during the cut. However, it is possible to make rabbet cuts with workpieces up to 1" thick without removing the cutterhead guard. This is done by performing the rabbet cut with the workpiece on end (similar to when you are edge jointing).

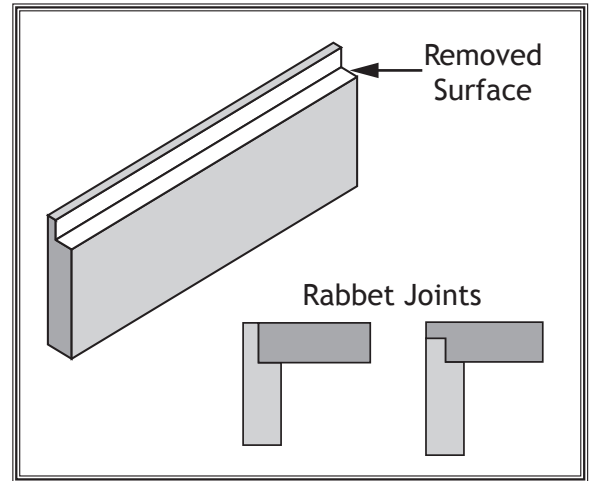


Figure 30. Rabbet joints.

To rabbet cut on jointer, do these steps:

1. Inspect stock to ensure it is safe and suitable for the operation (refer to **Stock Inspection** on **Page 28**).
2. Surface plane workpiece (refer to **Surface Planing** on **Page 30**).
3. Edge joint workpiece (refer to **Edge Jointing** on **Page 31**).
4. Set infeed table height to desired cutting depth for each pass.

⚠ CAUTION: For safety reasons, cutting depth should never exceed $\frac{1}{8}$ " per pass.

5. Remove cutterhead guard if necessary to perform operation (see **Figure 30**).
6. Set fence to 90° and near front of jointer, so amount of exposed cutterhead in front of fence matches size of desired rabbet.
7. Start jointer.
8. Place workpiece firmly against fence and infeed table.
9. Feed workpiece completely across cutterhead while keeping it firmly against fence and tables during entire cut.

⚠ CAUTION: Keep hands at least 4" away from cutterhead during the entire cut. Instead of allowing a hand to pass directly over cutterhead, lift it up and over cutterhead, and safely reposition it on the outfeed side to continue supporting workpiece. Use push blocks whenever practical to further reduce risk of accidental hand contact with cutterhead.

10. Repeat **Step 7** until rabbet is cut to depth.
11. Re-install cutterhead guard if removed in **Step 3**.

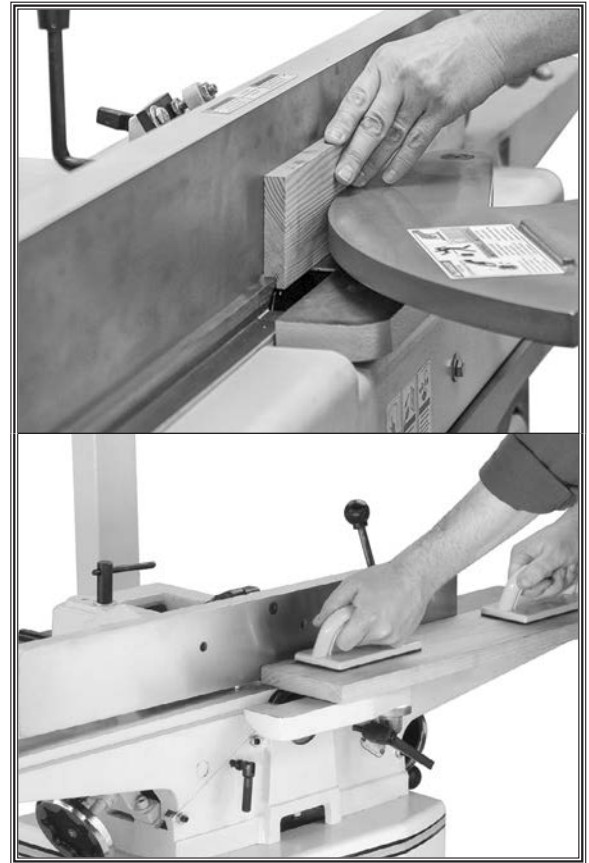


Figure 31. Examples of typical rabbet cutting operations.

Setting Depth of Cut

The depth of cut on a jointer affects the amount of material removed from the bottom of the workpiece as it passes over the cutterhead.

The depth of cut is set by adjusting the height of the infeed table relative to the outfeed table and cutterhead knives/inserts at top dead center (TDC).

This jointer is equipped with a $\frac{1}{8}$ " infeed table stop. This prevents the table from accidentally being lowered below $\frac{1}{8}$ ", which is the maximum depth of cut for surface planing and edge jointing.

Adjusting Infeed Table Height

To adjust the infeed table height, loosen the infeed table lock (see **Figure 32**), rotate the infeed table handwheel to raise or lower the table, and then tighten the lock to secure the setting.

To lower the infeed table below the $\frac{1}{8}$ " stop, pull the release knob (see **Figure 33**), adjust the table height, and then tighten the lock to secure the setting.

⚠ WARNING
DO NOT exceed $\frac{1}{8}$ " depth of cut per pass when edge jointing and $\frac{1}{16}$ " depth of cut per pass when surface planing on this machine or kickback and serious injury may occur!

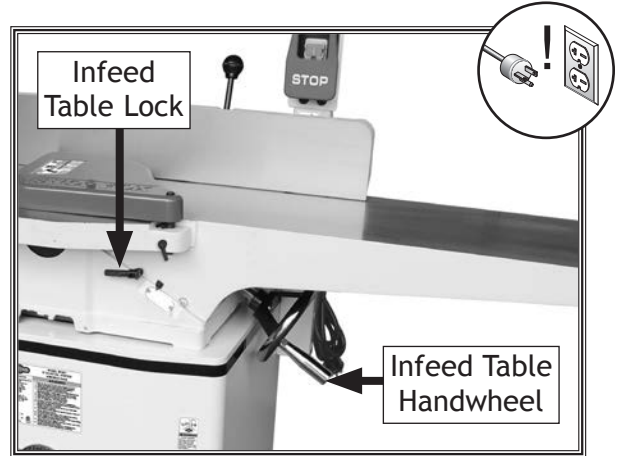


Figure 32. Infeed table height controls.



Figure 33. Infeed table height controls.

Depth-of-Cut Scale

The depth of cut can be referenced directly from the depth scale located on the front of the jointer (see **Figure 34**).

Note: The depth scale can be calibrated or "zeroed" if it is not correct. (Refer to *Calibrating Depth-of-Cut Scale* on **Page 54**.)

Infeed Positive Stops

The infeed table has positive-stop screws (see **Figure 35**) that allow you to quickly adjust the infeed table between finish/final cuts and shaping/heavy cuts and the maximum depth of cut of 1/2" when rabbeting.

The lower positive stop sets the bottom range of table movement (maximum depth of cut); the upper positive stop sets the top range of table movement (minimum depth of cut). Jam nuts lock positive-stop screws in position so they will not move during operation.

We recommend setting the lower stop screw at 1/2". The upper stop screw can be set anywhere between 0" and 1/16". The 1/8" infeed table stop is factory set and cannot be adjusted.

Item(s) Needed	Qty
Wrench 13mm	1
Hex Wrench 4mm	1

To adjust infeed positive-stop screws, do these steps:

1. DISCONNECT MACHINE FROM POWER!
2. Loosen jam nuts on both stop screws (see **Figure 35**).
3. Raise table to minimum desired depth of cut, then tighten upper stop screw (see **Figure 35**) until it contacts table. Tighten jam nut to secure stop screw in position.
4. Lower table to maximum desired depth of cut, then tighten lower stop screw until it contacts table. Tighten jam nut to secure stop screw in position.

Note: If you need to lower the infeed table more than 1/8", then pull and hold the 1/8" depth stop release knob (see **Figure 35**) while lowering infeed table.

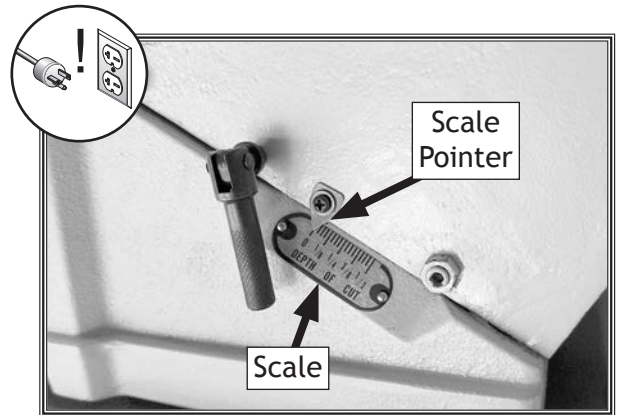


Figure 34. Depth-of-cut scale components.

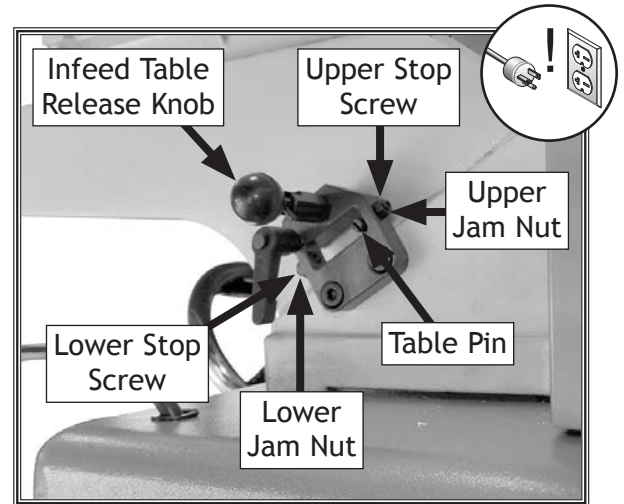


Figure 35. Positive-stop components for infeed table.

ACCESSORIES

Jointer Accessories

The following jointer accessories may be available through your local Woodstock International Inc. Dealer. If you do not have a dealer in your area, these products are also available through online dealers. Please call or e-mail Woodstock International Inc. Customer Service to get a current listing of dealers at: 1-800-840-8420 or at sales@woodstockint.com.

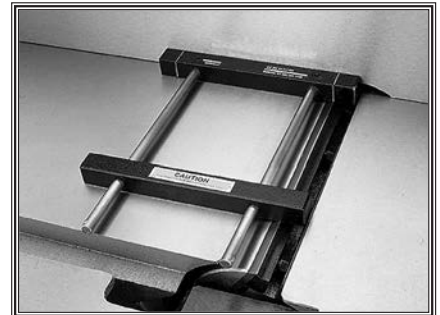
D1123—Jointer/Planer Knife Hone

This handy tool sharpens flat and beveled surfaces quickly and easily. Great for touch-ups.



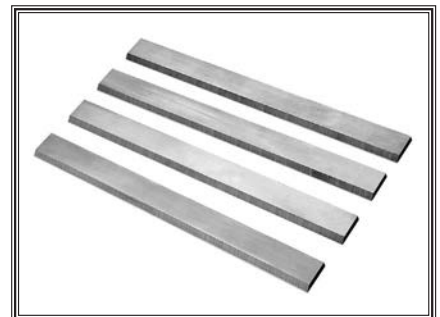
W1211A—Jointer Pal® Magnetic Knife Gauge (For HSS & Cobalt Knives)

This magnetic knife-setting system lets you set jointer knives in perfect alignment every time!



D3634—HSS Jointer Knives, 4 Pk.

8" x 3/4" x 1/8" replacement HSS jointer knives for Model W1857.



D4297—Indexable Carbide Inserts, 10-Pk.

15 x 15 x 2.5mm replacement indexable carbide inserts for Model W1858.



D4501—8" Indexable Spiral Cutterhead

Spiral cutterhead upgrade for Model W1857. Spiral cutterheads with indexable carbide inserts provide a number of advantages over traditional straight-knife cutterheads. Carbide inserts stay sharp up to 10 times longer than regular HSS knives and each insert features four separate sharpened edges, so there's far less overall down time from changing/adjusting knives. When the inserts do finally get dull, simply rotate each one 90° to expose another set of factory-sharp cutting edges. And since the inserts are indexable, they are automatically set to the perfect height when installed—meaning no more time spent fussing with a knife-setting jig. Best of all, spiral cutterheads leave a smoother surface, especially when surfacing wood with figured grain.



D4206—Clear Flexible Hose 4" x 10'

D4256—45° Elbow 4"

W1007—Plastic Blast Gate 4"

W1017—90° Elbow 4"

D4216—Black Flexible Hose 4" x 10'

W1053—Anti-Static Grounding Kit

W1317—Wire Hose Clamp 4"

We've handpicked a selection of commonly used dust-collection components for machines with 4" dust ports.



W1727—1 HP Dust Collector

Specifications: • 1 HP, 120V/240V, single-phase motor • 800 CFM air suction capacity • 5.67" static pressure • One 4" intake hole • 9" balanced steel, radial fin impeller • 2.1 cubic feet of bag capacity • 15³/₄" x 39³/₄" base on casters for portability • 2.5-micron bag filtration • Power-coated finish for durability • 54¹/₂" height with bag inflated.



OPERATIONS

MAINTENANCE

General

For optimum performance from this machine, this maintenance schedule must be strictly followed.

Ongoing

To maintain a low risk of injury and proper machine operation, if you ever observe any of the items below, shut down the machine immediately and fix the problem before continuing operations:

- Loose mounting bolts.
- Dust or debris on and around machine.
- Dull or damaged cutterhead knives/inserts.
- Unprotected cast-iron surfaces.
- Worn or damaged wires.
- Any other unsafe condition.

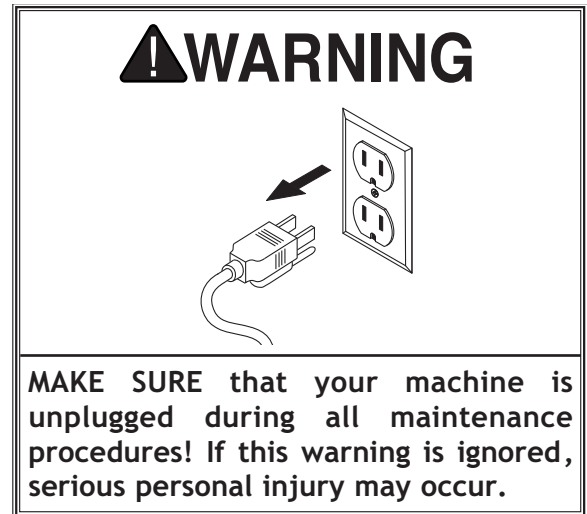
Monthly Check

- Clean and lubricate table ways, leadscrews, and fence pivot points (**Page 40**).
- V-belt tension, damage, or wear.
- Clean/vacuum dust buildup from inside stand and off of motor.

Cleaning & Protecting

Cleaning the Model W1857/W1858 is relatively easy. Vacuum excess wood chips and sawdust, and wipe off the remaining dust with a dry cloth. If any resin has built up, use a resin dissolving cleaner to remove it.

Protect the unpainted cast iron table by wiping it clean after every use—this ensures moisture from wood dust does not remain on bare metal surfaces. Keep your table rust-free with regular applications of quality lubricants.



Lubrication

Since all bearings are sealed and permanently lubricated, simply leave them alone until they need to be replaced. DO NOT lubricate them.

It is essential to clean components before lubricating them because dust and chips build up on lubricated components and make them hard to move. Simply adding more grease to them will not yield smooth moving components.

Item(s) Needed	Qty
Pump-Type Oil Can	1
Mineral Spirits	As Needed
Clean Shop Rags.....	As Needed

Fence & Carriage

Oil Type.....	ISO 68 Equivalent
Oil Amount	1-2 Drops
Lubrication Frequency	Monthly, or As Needed

Clean fence pivot points and carriage ways (see **Figure 36**) with mineral spirits and shop rags, allow to dry, then lubricate with light machine oil. Wipe off excess oil.

Leadscrews

Oil Type.....	ISO 68 Equivalent
Oil Amount	1-2 Drops
Frequency	Monthly, or As Needed

Clean leadscrews (see **Figure 37**) with mineral spirits and shop rags, allow to dry, then lubricate with light machine oil. Wipe off excess oil.

Table Ways

Oil Type.....	ISO 68 Equivalent
Oil Amount	1-2 Drops
Lubrication Frequency	Monthly, or As Needed

Lower infeed and outfeed tables to access ways. Clean ways with mineral spirits and shop rags, allow to dry, then lubricate with light machine oil at top of each way (see **Figure 38**). Move tables up and down to distribute oil. Wipe off excess oil.

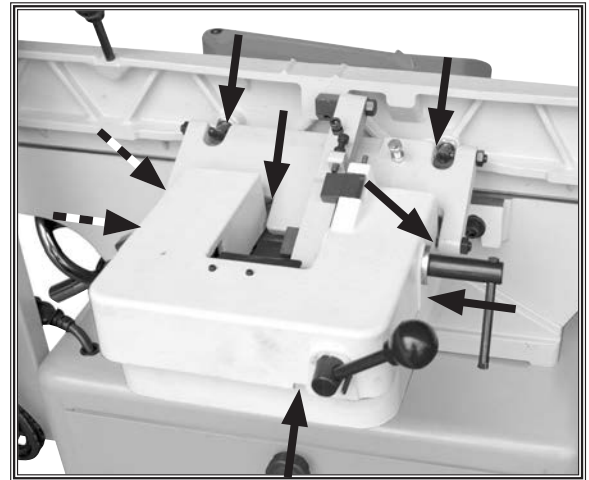


Figure 36. Fence and carriage lubrication locations.

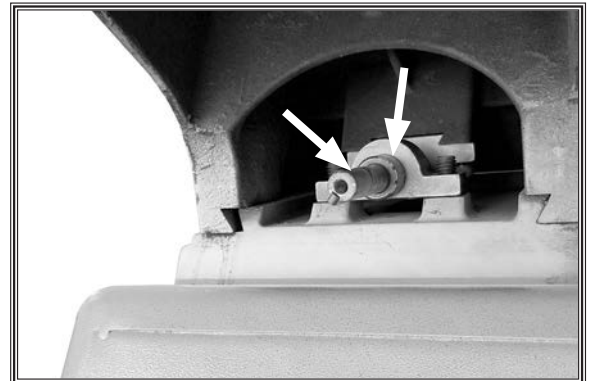


Figure 37. Leadscrew lubrication locations (handwheel removed for clarity).



Figure 38. Location to lubricate table ways.

SERVICE

General

This section covers the most common service adjustments or procedures that may need to be made during the life of your machine.

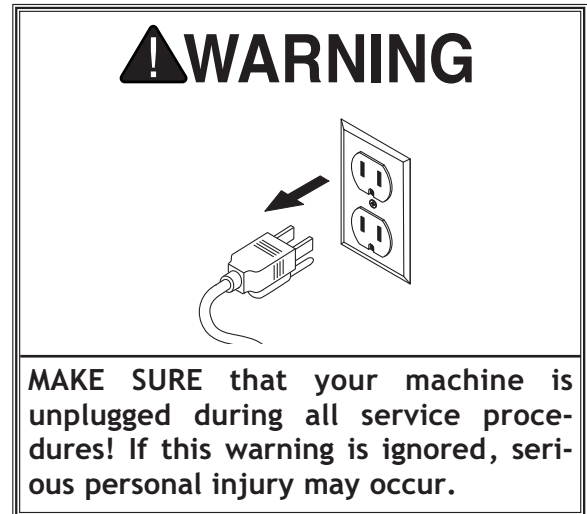
If you require additional machine service not included in this section, please contact Woodstock International Technical Support at (360) 734-3482 or send e-mail to: techsupport@woodstockint.com.

Setting/Replacing Knives (W1857)

Setting the knives correctly is crucial to the proper operation of the jointer and it plays an important role in keeping the knives sharp. If one knife is higher than the others, it will do the majority of the work, and thus, become dull much faster.

The cutterhead on this jointer comes with both jack screws and springs for setting knife height. Which one you choose is a matter of personal preference. However, *only one of these options is needed to set the knives.* The advantage of using springs is that springs maintain a constant upward pressure on the knives while using the knife-setting jig. The advantage of using jack screws is that once you set the proper height of the screws, they should require little to no adjustment when replacing knives.

There are two options for setting the knives—the straightedge method and the knife-setting jig method. Each option has advantages and disadvantages; the correct one for you will be a matter of personal preference. For best results, the tables must be parallel with each other (refer to **Checking/Adjusting Table Parallelism**) and the outfeed table height must be properly set (refer to **Setting Outfeed Table Height**).



Straightedge Method

A high quality straightedge (or Jointer Pal) is held flat against the outfeed table and the knife heights are set to the bottom of the straightedge, as shown. Because the knife projection height from the cutterhead is dependent on the outfeed table height, the outfeed table must be set as described in **Setting Outfeed Table Height** on **Page 50** for this method to work correctly.

When using the straightedge method to set the knives, you will not need to move the outfeed table once it is set and you will always be assured that the knives are even with the outfeed table in their highest point of rotation (TDC)—even if the cutterhead is not perfectly parallel with the outfeed table.

Item(s) Needed	Qty
Precision Straightedge or Knife-Setting Jig	1
Hex Wrench 3mm	1
Open-End Wrench 10mm.....	1

To check knife height with a straightedge, do these steps:

1. DISCONNECT MACHINE FROM POWER!
2. Remove cutterhead guard or block it open.
3. Using a straightedge on outfeed table, check height of each knife at positions as shown in **Figure 39**.
 - Knives are set correctly when they just touch bottom of straightedge at TDC in each of straightedge positions.
 - If knives do not touch straightedge or they lift up at any position, then those knives need to be adjusted (refer to **Setting/Replacing Knives** on **Page 44**).

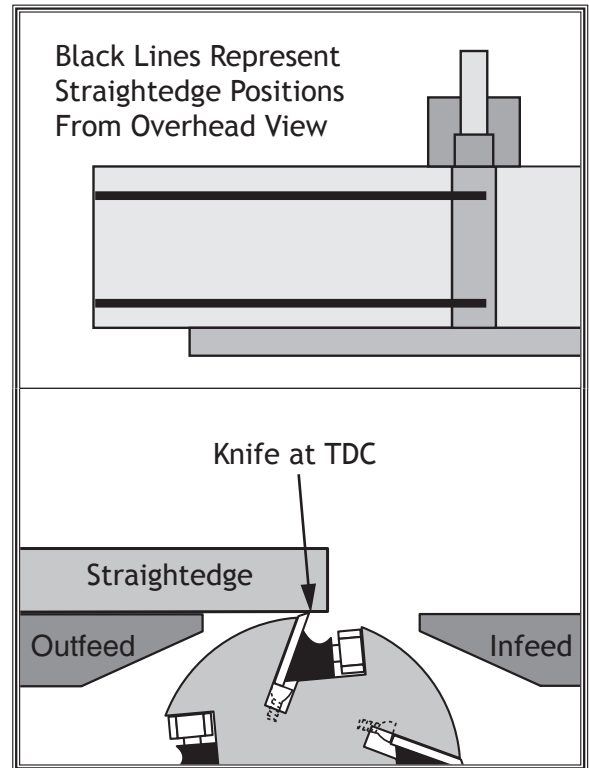


Figure 39. Setting knife height with a straightedge.



Figure 40. Setting knife height with a Jointer Pal®.

Knife-Setting Jig Method

The infeed table is lowered to fit the jig on the cutterhead, as shown, and the knife heights are set to just touch the middle pad of the jig. The knife-setting jig included with the jointer is designed to set all the knives evenly and at the correct height in the cutterhead.

To check knife height with a knife-setting jig, do these steps:

1. DISCONNECT MACHINE FROM POWER!
2. Remove cutterhead guard or block it open.
3. Lower infeed table to $\frac{1}{2}$ " scale mark.
4. Place knife-setting jig on cutterhead, directly over a knife.
5. Closely examine how jig touches cutterhead and knife. Knife is set correctly when, on each side of cutterhead, both legs of jig sit firmly on cutterhead body and middle pad of jig just touches top edge of knife.
 - If jig does not sit as described, then that knife must be reset. Repeat this inspection with other knives before resetting. (Refer to **Setting/Replacing Knives** on Page 44.)

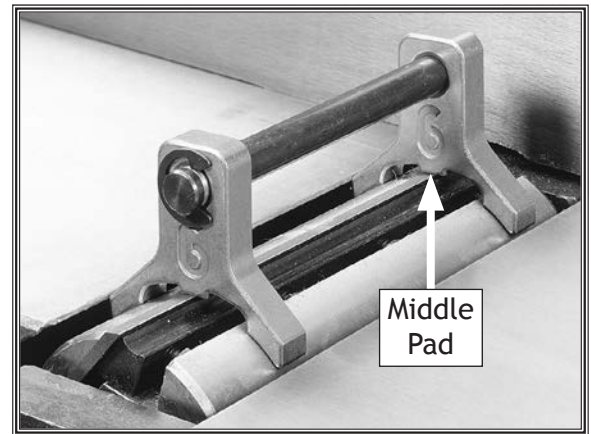


Figure 41. Example of knife-setting jig positioned over cutterhead knife.

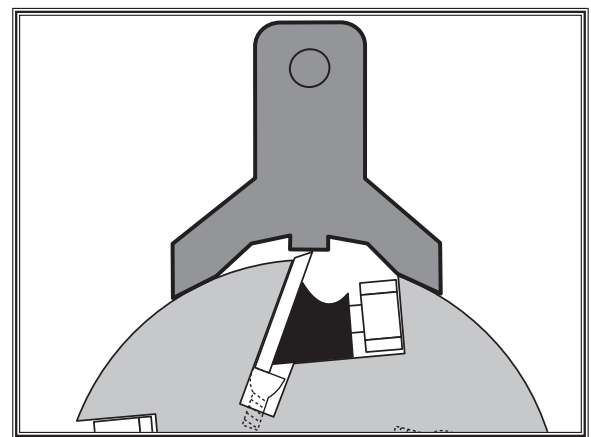


Figure 42. Using knife-setting jig to set knife height.

Setting/Replacing Knives

1. DISCONNECT MACHINE FROM POWER!
2. Remove cutterhead guard from table and lower infeed table to $\frac{1}{2}$ " on depth-of-cut scale. This will provide unrestricted access to cutterhead.
3. Remove cabinet rear access panel to expose cutterhead pulley.
4. Rotate cutterhead pulley to provide good access to cutterhead knives.
5. Loosen cutterhead gib bolts, starting in the middle, and alternating back and forth until all gib bolts are loose, but not falling out.

The first time you set or replace a knife, remove the gib and knife from cutterhead. Clean gib and clean inside cutterhead slot to remove all pitch or sawdust. Coat knife and gib with a metal protectant.

6. Position knife jig over knife. Loosen gib bolts until knife is completely loose.
7. **Jack Screws**—Access jack screws through holes in cutterhead (see **Figure 44**). Using a hex wrench, rotate jack screws to raise or lower knife. When knife is set correctly, it will barely touch the bottom of the straightedge or the middle pad of the knife jig. Snug gib bolts just tight enough to hold knife in place. Repeat with remaining knives.

Springs—Push knife down with straightedge or middle pad of knife-setting jig (see **Figure 45**). Keep straightedge flat against outfeed table. If using jig, keep feet pressed evenly against cutterhead. Tighten gib bolts just enough to hold knife in place. Repeat with remaining knives.

8. Rotate cutterhead to reveal the first knife you started with. Lightly snug all gib bolts, alternating from one side to the other, and working from the ends to the middle. Repeat with remaining knives.
9. Tighten each gib bolt in the same alternating manner as you did in the previous step.
10. Make sure outfeed table is set even with the new knives at top dead center.
11. Replace cutterhead guard and cabinet rear access panel.

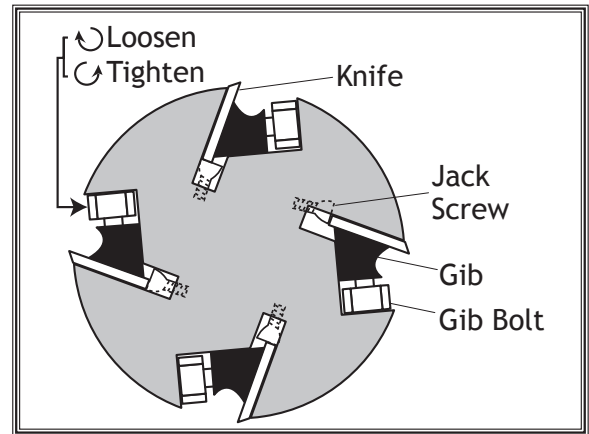


Figure 43. Cutterhead profile diagram.

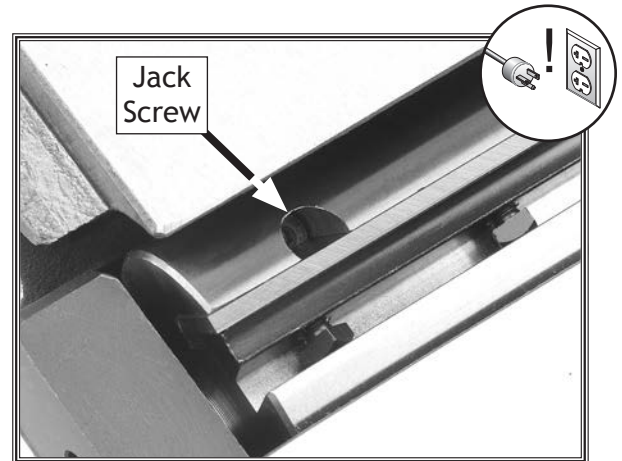


Figure 44. Location of jack screw access hole.

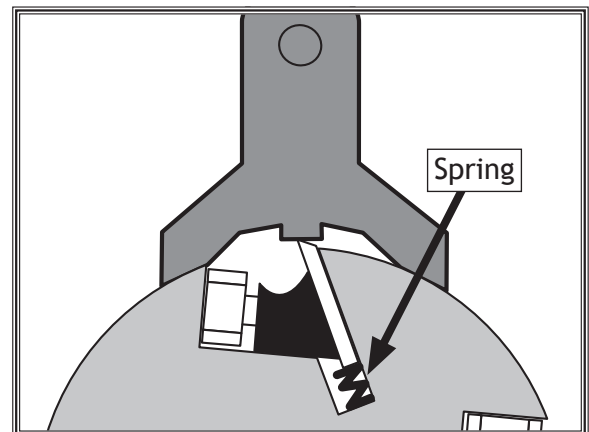


Figure 45. Location of spring.

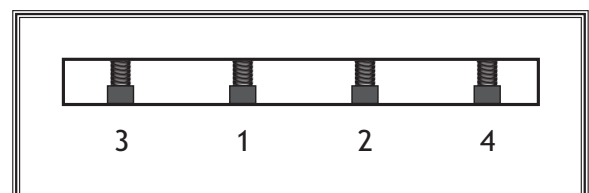


Figure 46. Gib bolt tightening sequence.

Rotating/Replacing Helical Cutterhead Inserts (W1858)

The helical cutterhead is equipped with 4-sided indexable carbide inserts. Each insert can be removed, rotated, and re-installed to use any one of its four cutting edges. Therefore, if one cutting edge becomes dull or damaged, simply rotate it 90° (see Figure 47) to use a sharp cutting edge.

The inserts have a reference dot on one corner. The position of the reference dot on installed inserts can be used to track which edges are sharp/unused and which edges are dull or damaged. Replace inserts once the reference dot has been rotated back to its original position.

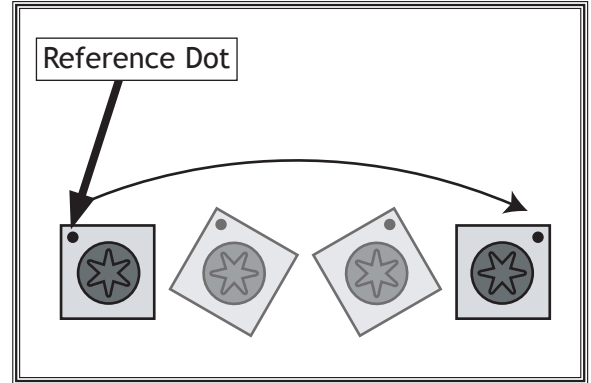


Figure 47. Insert rotating sequence.

Item(s) Needed	Qty
Carbide Inserts 15 x 15 x 2.5mm.....	As Needed
Torx Head Screws T-25 #10-32 x 1/2".....	As Needed
Torque Wrench	1
T-25 Torx Bit	1

To rotate or replace helical cutterhead insert, do these steps:

1. DISCONNECT MACHINE FROM POWER!
2. Remove cutterhead guard from table, and lower infeed table as far down as it will go.
3. Remove cover to get access to cutterhead pulley.
4. Taking care not to pinch your hand between belt and pulley, rotate pulley as needed to make inserts accessible for removal.
5. Put on heavy leather gloves to protect fingers and hands.

6. Carefully clean away all sawdust or debris from top of insert, Torx screw, and surrounding area (see Figure 48).
7. Remove Torx screw and insert, then carefully clean away all dust and debris from insert and insert pocket in cutterhead.

IMPORTANT: This step is critical for achieving a smooth finish with cutting operations. Dirt or dust trapped under insert during installation will slightly raise insert in cutterhead, which will leave marks on workpiece after jointing.

Tip: Use low-pressure compressed air or a vacuum nozzle to clean cutterhead pocket.

8. Re-install insert with a sharp cutting edge facing outward. Make sure insert is properly seated in cutterhead pocket before securing.
 - If all four insert cutting edges have been used, replace insert with a new one. Always position reference dot in same position when installing a new insert to aid in rotational sequencing.
9. Lubricate Torx screw threads with a small amount of light machine oil, wipe excess off, and torque screw to 48-50 inch/pounds.

IMPORTANT: If too much oil is applied to the threads, excess will attempt to squeeze out of threaded hole as you install insert and force it to raise slightly, making it out of alignment.

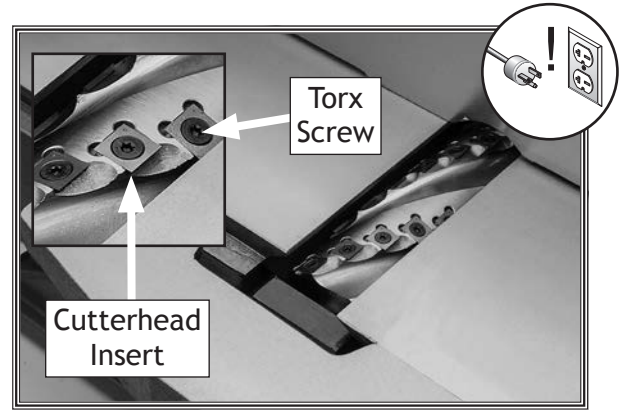


Figure 48. Example of cutterhead inserts and Torx screws.

Adjusting Gibs

The function of the table gibs is to eliminate excessive play in the table movement. The gibs also control how easy it will be to move the tables up and down.

Item(s) Needed	Qty
Open-End Wrench 13mm.....	1
Hex Wrench 4mm	1

To adjust table gibs, do these steps:

1. Loosen (4) infeed table gib jam nuts on front of table/fence assembly (see **Figure 49**).
2. Oil table ways if needed (refer to **Lubrication on Page 40**).
3. Evenly tighten gib set screws a small amount, then check tables by moving them up and down. Adjust set screws as needed until friction of table movement is balanced between minimal play and ease of movement.

Note: *Tighter gibs reduce play but make it harder to adjust tables.*

4. Tighten jam nuts to secure setting.
5. Set outfeed table height (refer to **Setting Outfeed Table Height on Page 50**).

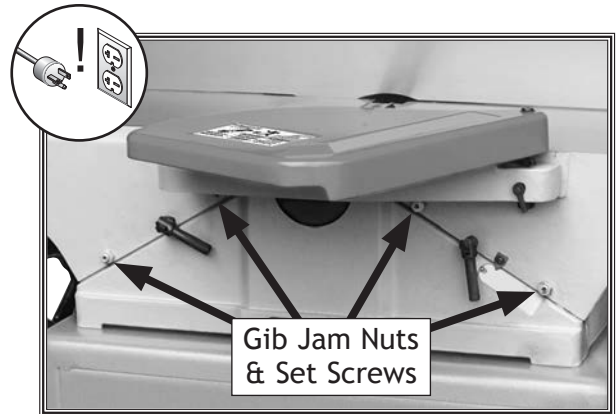


Figure 49. Infeed table gib controls.

Checking/Adjusting Table Parallelism

The infeed and outfeed tables must be parallel with each other in order to produce a straight, jointed edge. When the tables are not parallel with each other, the jointer will produce workpieces that are cupped (concave) or bowed (convex) along their length.

Table parallelism is factory-set and should not normally need to be adjusted when the machine is new. However, after prolonged use, or if the machine has been jarred during lifting or transportation, it may become necessary to adjust the table parallelism.

Table parallelism is adjusted by inserting shims between the dovetailed ways of the outfeed table to make it parallel with the infeed table. Once this adjustment is made, the outfeed table height should not need to be adjusted again.

Item(s) Needed	Qty
Precision Straightedge 3'.....	1
Feeler Gauge Set	1
Metal Shims	As Needed

To check/adjust table parallelism, do these steps:

1. DISCONNECT MACHINE FROM POWER!
2. Set outfeed table height (refer to **Setting Outfeed Table Height** on Page 50).
3. Move cutterhead guard out of the way and slide fence all the way back.
4. Rotate cutterhead until knife/insert is not at TDC, extend straightedge over both tables, raise infeed table until it contacts straightedge (see **Figure 50**), then lock infeed table.

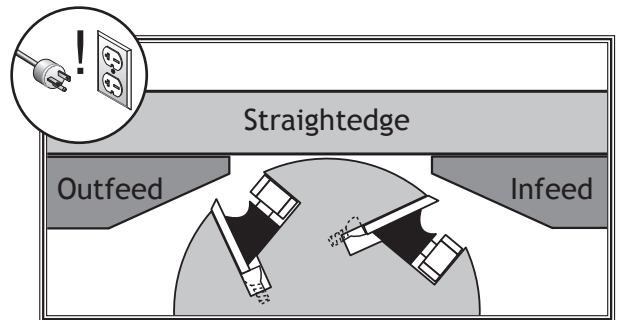


Figure 50. Checking table parallelism.

5. Look down length of straightedge on outfeed side to see if there are any noticeable gaps between straightedge and outfeed table. Do this at both front and rear of table.
 - If there are no gaps, and the straightedge makes full contact with both tables at front and rear, the tables are parallel with each other and no adjustments are necessary.
 - If there are gaps anywhere between one of the tables and the straightedge, the tables are not parallel to each other and must be adjusted. Proceed to **Step 6**.
6. Insert feeler gauge between table and straightedge where gap is greatest (see **Figure 51**). Maximum allowable tolerance is 0.003".
7. Loosen outfeed table locks. Place shims between dovetailed ways (see **Figure 52**) until outfeed table is within 0.003" of parallel with infeed table at front and rear of tables.
8. Re-check outfeed table height (refer to **Setting Outfeed Table Height** on **Page 50**), and re-adjust if necessary.

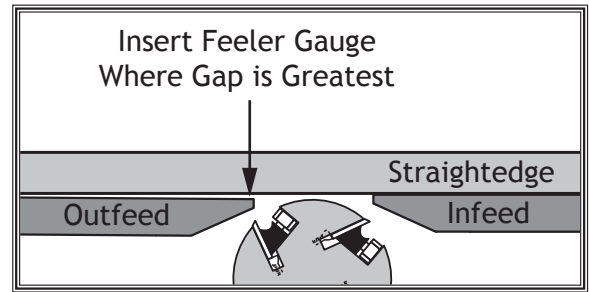


Figure 51. Example of feeler gauge location for checking table parallelism.



Figure 52. Locations to place shims when adjusting table parallelism.

Setting Outfeed Table Height

To help ensure safe operation and best cutting results, set the outfeed table height level with the knives/inserts when they are at top-dead-center (TDC). If the outfeed table is set too low, the workpiece will be tapered from front to back or there will be snipe (a gouge in end of board that is uneven with rest of cut). If the outfeed table is set too high, the workpiece will hit the edge of the outfeed table during operation, increasing the chance of kickback.

Item(s) Needed	Qty
Precision Straightedge 4'.....	1
Open-End Wrench 16mm.....	1

To set outfeed table height, do these steps:

1. DISCONNECT MACHINE FROM POWER!
2. Remove cutterhead guard and fence, then open belt cover.
3. **W1857 Only:** Make sure knife heights are set correctly (refer to **Setting/Replacing Knives** on Page 44).
4. Loosen outfeed table lock (see Figure 53).
5. Place straightedge on outfeed table so it extends over cutterhead.
6. Use motor pulley to rotate cutterhead until one knife or insert is at TDC (its highest point during rotation), as shown in Figure 54.
7. Use outfeed table lever to set outfeed table so knife or insert barely touches straightedge, as shown in Figure 55.
8. Tighten outfeed table lock so outfeed table will not move during operation.
9. Re-install cutterhead guard and fence, then close belt cover.
10. Verify proper operation of cutterhead guard (refer to **Checking/Adjusting Cutterhead Guard** on Page 57).



Figure 53. Location of outfeed table lock.

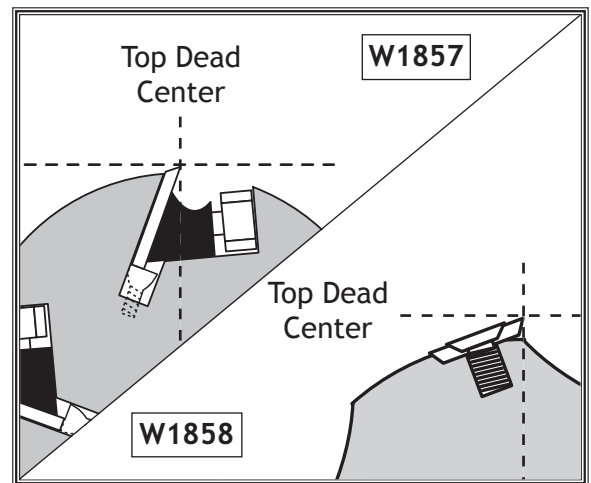


Figure 54. Knife or insert at TDC.

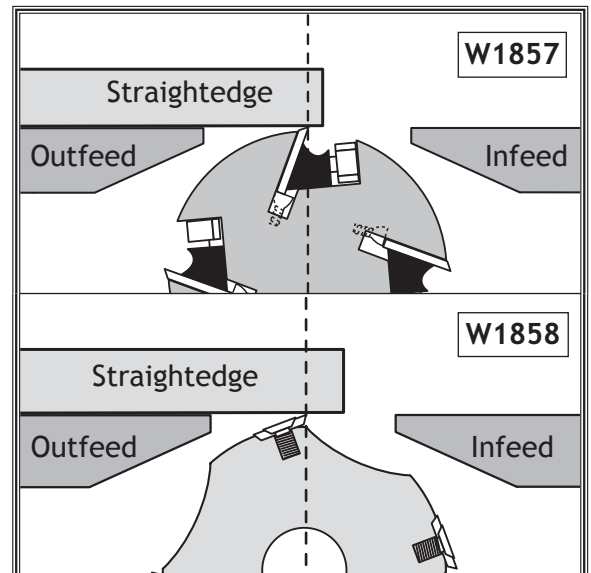


Figure 55. Using straightedge to check outfeed table height.

Setting Fence Stops

The fence stops simplify the task of adjusting the fence to 45° inward, 90°, and 45° outward (135°).

Item(s) Needed	Qty
Open-End Wrench 14mm.....	1
Sliding Bevel	1

Setting 45° Inward Stop

1. DISCONNECT MACHINE FROM POWER!
2. Loosen fence tilt lock, rotate stop block up, then tilt fence approximately 45° inward onto stop bolt (see **Figure 56**).
3. Place sliding bevel set to 45° against fence and table, as shown in **Figure 57**.
4. Loosen jam nut on 45° inward stop bolt and adjust stop bolt until fence is exactly 45° inward while resting on stop bolt (see **Figure 56**). Verify angle, then retighten jam nut.

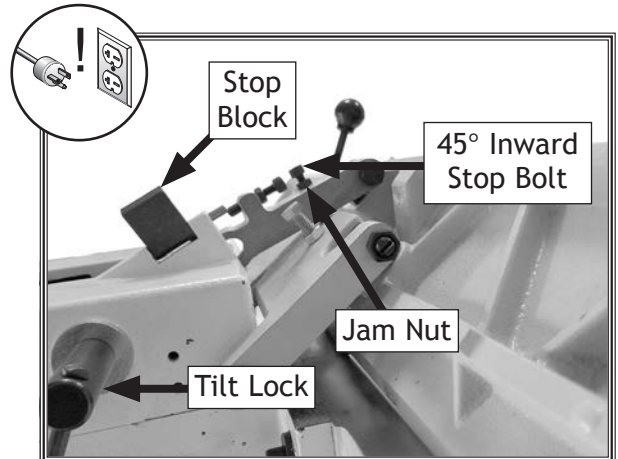


Figure 56. Fence set to 45° inward.

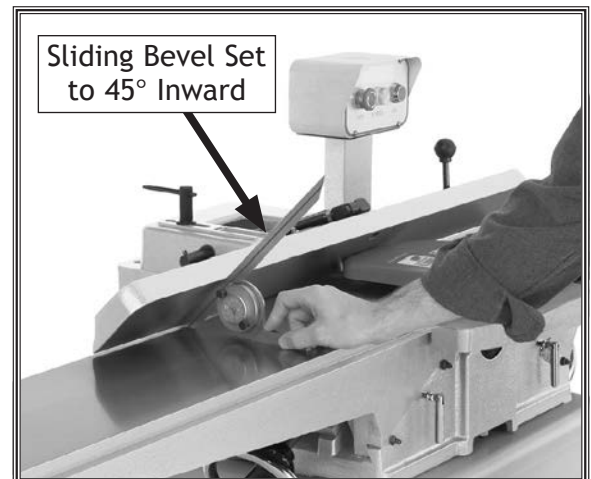


Figure 57. Example of adjusting fence to 45° inward.

Setting 90° Stop

1. DISCONNECT MACHINE FROM POWER!
2. Loosen fence tilt lock, rotate stop block down, and position fence approximately 90° onto stop cap screw (see Figure 58).

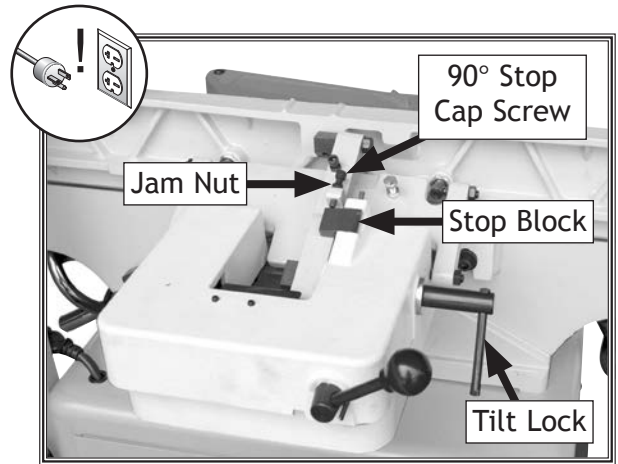


Figure 58. Fence set to 90°.

3. Place sliding bevel set to 90° against fence and table, as shown in Figure 59.
4. Loosen jam nut on 90° stop cap screw and adjust cap screw until fence is exactly 90° while cap screw is resting on stop block (see Figure 58). Verify angle, then retighten jam nut.

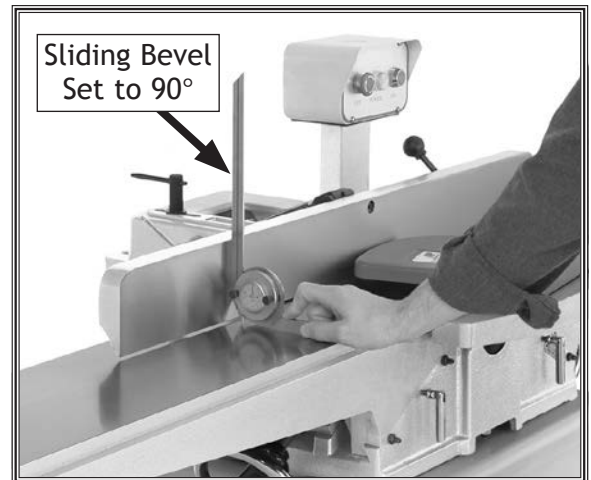


Figure 59. Example of adjusting fence to 90°.

Setting 45° Outward (135°) Stop

1. DISCONNECT MACHINE FROM POWER!
2. Loosen fence tilt lock, rotate stop block up, then tilt fence approximately 45° outward (135°) onto stop bolt (see **Figure 60**).

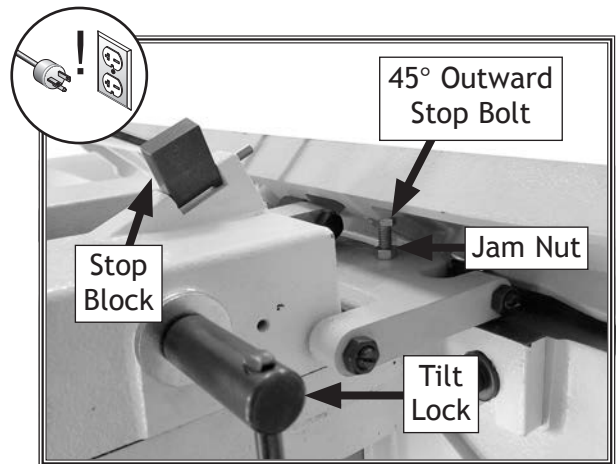


Figure 60. Fence set to 45° outward (135°).

3. Place sliding bevel set to 135° against fence and table, as shown in **Figure 61**.
4. Loosen jam nut on 45° outward stop bolt and adjust stop bolt until fence is exactly 45° outward (135°) outward while resting on stop bolt (see **Figure 60**). Verify angle, then retighten jam nut.

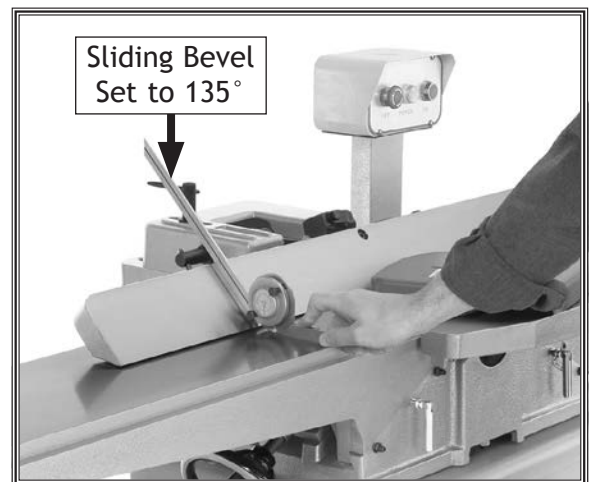


Figure 61. Example of adjusting fence to 45° outward (135°).

Calibrating Depth-of-Cut Scale

For best cutting results, calibrate or "zero" the depth-of-cut scale so cutting depth shown on the scale matches the actual cutting depth (per pass).

Item(s) Needed	Qty
Precision Straightedge 4'.....	1
Phillips Screwdriver #2.....	1

To calibrate the depth-of-cut scale, do these steps:

1. DISCONNECT MACHINE FROM POWER!
2. Make sure outfeed table height is set correctly (refer to **Setting Outfeed Table Height** on Page 50).
3. Move cutterhead guard out of the way and slide fence all the way back, then place straightedge across infeed and outfeed tables.
4. Adjust the infeed table until it is even with the outfeed table (see **Figure 62**).
5. Loosen Phillips head screw, adjust scale pointer to "0," then re-tighten screw (see **Figure 63**).

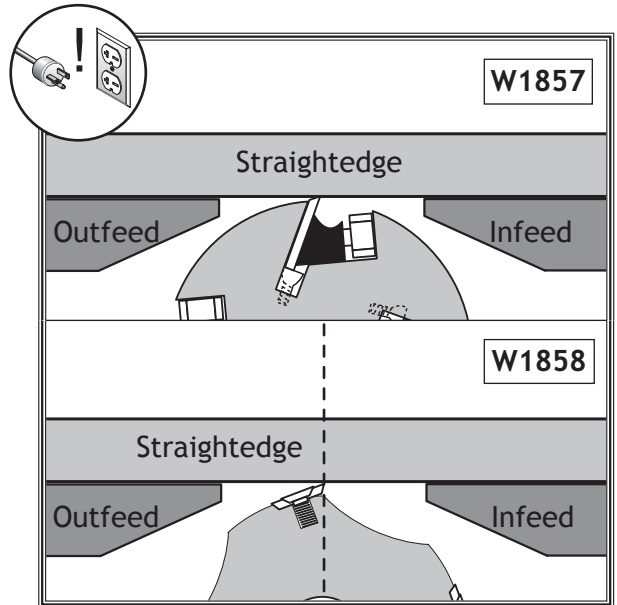


Figure 62. Infeed table even with outfeed table.

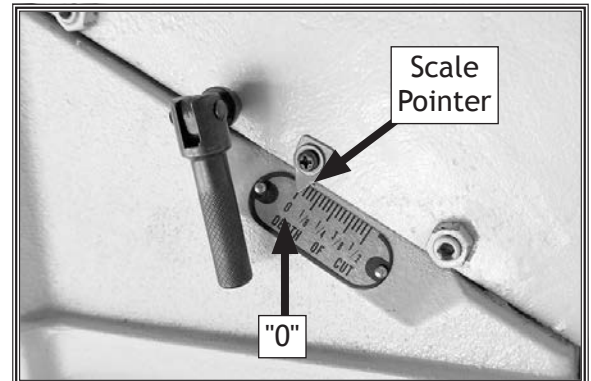


Figure 63. Depth-of-cut scale set to "0".

Tensioning/Replacing Belt

To ensure optimum power transmission from the motor to the cutterhead, the belt must be in good condition (free from cracks, fraying and wear) and properly tensioned.

Item(s) Needed	Qty
Replacement Belt (X1857083)	1
Phillips Screwdriver #2	1
Open-End or Socket Wrench 13mm	1

Tensioning Belt

1. DISCONNECT MACHINE FROM POWER!
2. Remove rear access panel on stand.
3. Loosen motor mount fasteners shown in **Figure 64**. DO NOT completely remove motor mount fasteners.
4. Press down on motor to keep tension on belt, and then tighten motor mount bracket fasteners (see **Figure 64**).
5. Press belt with moderate pressure in center to check belt tension. Belt is correctly tensioned when there is approximately 1/4" deflection when pushed, as shown in **Figure 65**.
 - If there is more than 1/4" deflection when you check belt tension, repeat the tensioning procedure until it is correct.
6. Replace rear access panel.

Replacing Belt

1. DISCONNECT MACHINE FROM POWER!
2. Remove fence, belt cover and rear access panel on stand.
3. Loosen motor mount bracket fasteners shown in **Figure 64**.
4. Use a 2x4 as leverage to lift motor as you remove belt and replace it with a new one. Make sure belt is seated in pulley groove.
5. Follow **Steps 4-5** in **Tensioning Belt** procedure to set correct belt tension.
6. Replace rear access panel.

⚠ WARNING

Belts and pulleys will be hot after operation. Allow them to cool before handling.

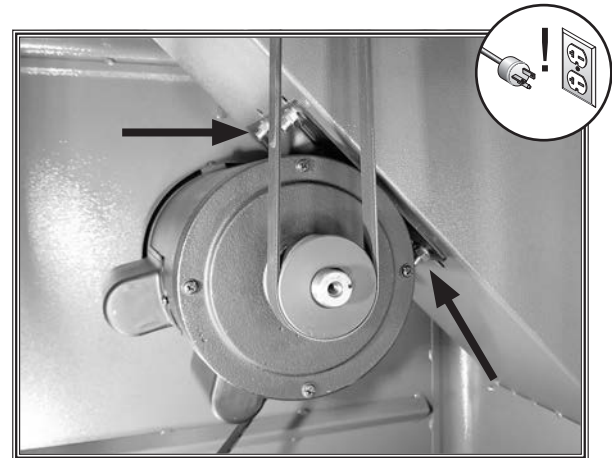


Figure 64. Location of motor mount fasteners (3 of 4 shown).

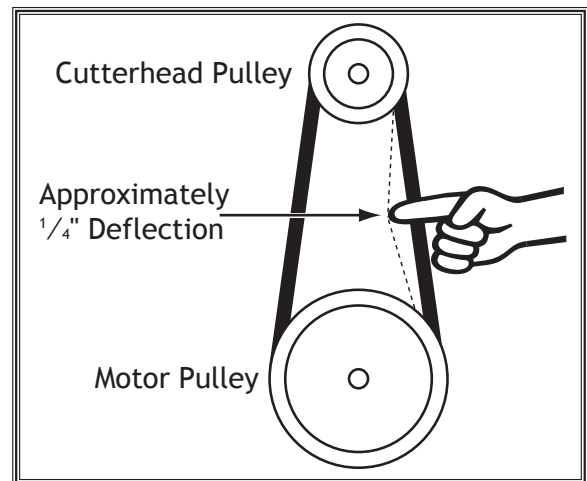


Figure 65. Checking belt deflection.

NOTICE

After approximately 16 hours of operation, belts will stretch and seat into pulley grooves. The belts need to be re-tensioned after this initial break-in period to ensure optimum power transfer and maximum overall life of the belts.

SERVICE

Checking/Aligning Pulleys

Pulley alignment is an important factor in power transmission and belt life. The pulleys should be parallel to each other and in the same plane (coplaner) for optimum performance.

Each pulley can be adjusted by loosening the set screw that secures the pulley to the shaft, sliding the pulley in/out, and retightening the set screw to lock the pulley in place.

Item(s) Needed	Qty
Precision Straightedge (Optional)	1
Hex Wrench 3mm	1
Phillips Screwdriver #2	1

To align pulleys, do these steps:

1. DISCONNECT MACHINE FROM POWER!
2. Remove fence, belt cover, and rear access panel on stand.
3. Look down length of belt and pulley faces to check pulley alignment (see **Figures 66-67**). If available use a narrow straightedge against pulley faces to check alignment.
 - If pulleys are aligned, proceed to **Step 7**.
 - If pulleys are not aligned, perform **Steps 4-6**.
4. Remove belt (refer to **Tensioning/Replacing Belt** on **Page 55**).
5. Loosen motor pulley set screw and cutterhead pulley set screw, and then align both pulleys. (Use straightedge if needed.)
6. Tighten set screws, replace belt, and repeat **Step 3** to verify proper pulley alignment. Pulleys should be aligned, as shown in **Figure 67**, when belt is properly tensioned.
7. Re-install fence, belt cover, and rear access panel.

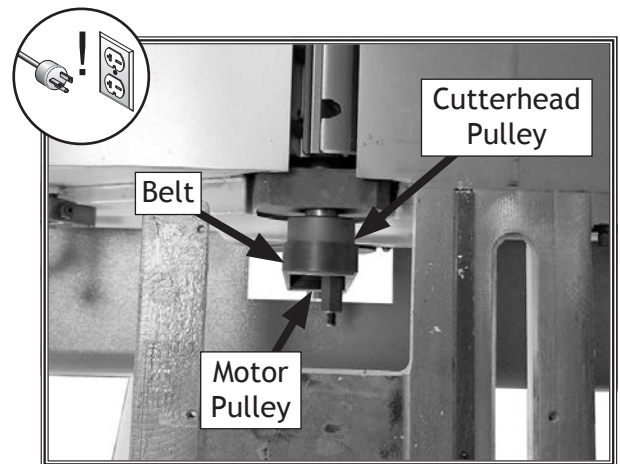


Figure 66. Checking pulley alignment (viewed from above).

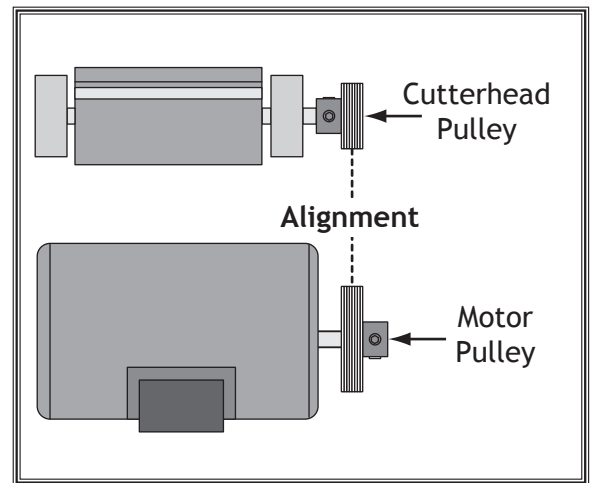


Figure 67. Proper pulley alignment.

Checking/Adjusting Cutterhead Guard

The cutterhead guard is designed to reduce the risk of accidental contact with hands or fingers with the spinning cutterhead. When properly installed and functioning correctly, the guard automatically rotates clear of the cutterhead during the cutting operation and then springs back over the cutterhead as soon as the operation is complete.

In order to function as intended, the guard must be installed as low as possible over the infeed table without actually touching it, and it must have enough spring tension at the mounting shaft to quickly reposition itself against the fence after it is rotated away from the cutterhead and released. Before performing rabbeting operation, adjust guard height to just clear outfeed table.

To check/adjust cutterhead guard for proper operation, do these steps:

1. DISCONNECT MACHINE FROM POWER!
2. Set fence to 90° and move it all the way back, then pull cutterhead guard (see **Figure 68**) back and let it go.
 - If cutterhead guard *springs* back over cutterhead, *contacts* fence, and *does not* drag across infeed table, then it is properly adjusted.
 - If cutterhead guard *does not* spring back over cutterhead, *does not* contact fence, or *drags* across infeed table, then proceed to **Step 3**.
3. Loosen shaft lock (see **Figure 68**) that secures cutterhead guard shaft to machine.
4. Lift cutterhead guard so shaft (see **Figure 68**) clears hole, rotate guard clockwise, re-install guard so it is resting against fence, then tighten shaft lock (see **Figure 68**).
5. Re-test, and if necessary, repeat **Steps 3-4** until cutterhead guard is properly adjusted.

⚠ WARNING

The cutterhead guard is a critical safety feature of this jointer. You **MUST** install and verify its operation before using the jointer! Failure to properly install this guard will greatly increase the risk of serious personal injury.

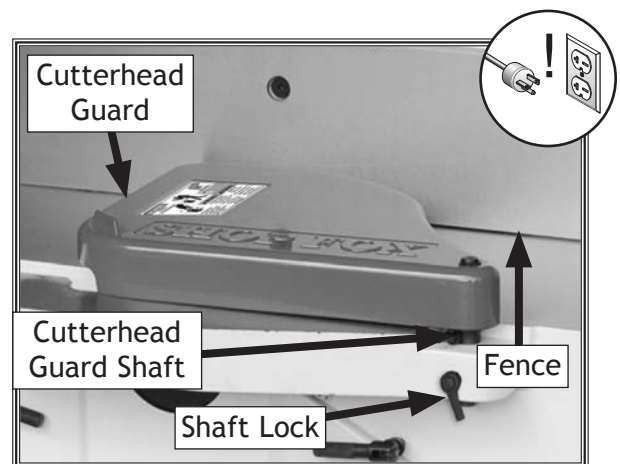
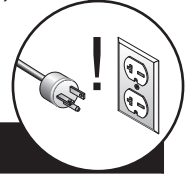


Figure 68. Cutterhead guard components.

Troubleshooting

The following troubleshooting tables cover common problems that may occur with this machine. If you need replacement parts or additional troubleshooting help, contact our Technical Support.

Note: Before contacting Tech Support, find the machine serial number and manufacture date, and if available, your original purchase receipt. This information is required to properly assist you.



Motor and Electrical

PROBLEM	POSSIBLE CAUSE	CORRECTIVE ACTION
Machine does not start or a breaker trips immediately after startup.	<ol style="list-style-type: none"> 1. Incorrect power supply voltage/circuit size. 2. Power supply circuit breaker tripped/fuse blown. 3. Motor wires connected incorrectly. 4. Wiring open/has high resistance. 5. ON button at fault. 6. Start capacitor at fault. 7. Centrifugal switch at fault. 8. Motor at fault. 	<ol style="list-style-type: none"> 1. Ensure correct power supply voltage/circuit size. 2. Ensure circuit is sized correctly and free of shorts. Reset circuit breaker or replace fuse. 3. Correct motor wiring connections (Page 61). 4. Check/fix broken, disconnected, or corroded wires. 5. Test/replace switch. 6. Test/replace capacitor. 7. Adjust/replace centrifugal switch if available. 8. Test/repair/replace.
Machine stalls or is underpowered.	<ol style="list-style-type: none"> 1. Workpiece material not suitable. 2. Excessive feed rate. 3. Excessive depth of cut. 4. Dull knives/inserts. 5. Belt slipping or pulleys misaligned. 6. Dust collection blockage. 7. Motor overheated. 8. Pulley slipping on shaft. 9. Run capacitor at fault. 10. Centrifugal switch at fault. 11. Motor bearings at fault. 12. Motor at fault. 	<ol style="list-style-type: none"> 1. Ensure workpiece is suitable for jointing (Page 28). 2. Reduce feed rate. 3. Reduce depth of cut (Page 35). 4. Sharpen/replace knives (Page 44); rotate/replace inserts (Page 45). 5. Tension/replace belt (Page 55); ensure pulleys are aligned (Page 56). 6. Clear blockages, seal leaks, use smooth wall duct, eliminate bends, close other branches. 7. Clean motor, let cool, and reduce workload. 8. Tighten/replace loose pulley/shaft, replace shaft key; tighten pulley set screw (Page 56). 9. Test/repair/replace. 10. Adjust/replace centrifugal switch if available. 11. Test/repair/replace. 12. Test/repair/replace.
Machine has vibration or noisy operation.	<ol style="list-style-type: none"> 1. Mobile base lock knobs loose or stand feet not adjusted properly. 2. Motor or other component loose. 3. Belt worn or loose. 4. Motor fan rubbing on fan cover. 5. Pulley loose or misaligned. 6. Dull knives/inserts. 7. Cutterhead bearings at fault. 8. Centrifugal switch at fault. 9. Motor bearings at fault. 	<ol style="list-style-type: none"> 1. Tighten mobile base lock knobs or adjust stand feet to stabilize machine. 2. Replace missing bolts/nuts, or tighten if loose. 3. Inspect/tension or replace belt (Page 55). 4. Fix/replace fan cover; replace loose/damaged fan. 5. Secure pulley on shaft or realign (Page 56). 6. Sharpen/replace knives (Page 44); rotate/replace inserts (Page 45). 7. Replace bearing(s). 8. Adjust/replace centrifugal switch if available. 9. Test/repair/replace.

Machine Operation

PROBLEM	POSSIBLE CAUSE	CORRECTIVE ACTION
Table is hard to adjust.	<ol style="list-style-type: none"> 1. Table lock engaged/partially engaged. 2. Table stop blocking movement. 3. Table gibs out of adjustment. 	<ol style="list-style-type: none"> 1. Completely loosen table lock (Page 9). 2. Loosen/reset table stop (Page 36). 3. Adjust table gibs (Page 47).
Excessive snipe (gouge in end of board that is uneven with rest of cut).	<ol style="list-style-type: none"> 1. Outfeed table set too low. 2. Knives set too high (W1857). 3. Operator pushing down on trailing end of workpiece as it leaves cutterhead. 	<ol style="list-style-type: none"> 1. Align outfeed table with cutterhead knife/insert at top dead center (Page 50). 2. Adjust height of knives evenly with outfeed table (Page 44). 3. Reduce/eliminate downward pressure on trailing end of workpiece as it leaves cutterhead.
Workpiece stops in middle of cut.	<ol style="list-style-type: none"> 1. Outfeed table set too high. 	<ol style="list-style-type: none"> 1. Align outfeed table with cutterhead knife/insert at top dead center (Page 50).
Workpiece chipping, tear-out, indentations, or overall rough cuts.	<ol style="list-style-type: none"> 1. Workpiece not suitable for jointing. 2. Operator not feeding workpiece to cut "with" the grain. 3. Feed rate too fast. 4. Excessive depth of cut. 5. Dull knives/inserts. 6. Dust collection problems. 	<ol style="list-style-type: none"> 1. Ensure workpiece is suitable for jointing (Page 28). 2. Turn workpiece 180° before feeding again. 3. Reduce feed rate. 4. Reduce depth of cut (Page 35). 5. Sharpen/replace knives (Page 44); rotate/replace inserts (Page 45). 6. Clear blockages, seal leaks, move machine closer to dust collector, upgrade dust collector.
Fuzzy grain left in workpiece.	<ol style="list-style-type: none"> 1. Wood has high moisture content. 2. Dull knives/inserts. 	<ol style="list-style-type: none"> 1. Ensure wood moisture content is less than 20%. Allow to dry if necessary. 2. Sharpen/replace knives (Page 44); rotate/replace inserts (Page 45).
Long lines or ridges that run along length of workpiece.	<ol style="list-style-type: none"> 1. Nicked or chipped knives/inserts. 2. Inserts not consistently tightened/torqued (W1858). 3. Dirt or debris under inserts (W1858). 	<ol style="list-style-type: none"> 1. Replace knives (Page 44); rotate/replace inserts (Page 45). 2. Tighten/torque all inserts consistently when rotating/replacing (Page 45). 3. Remove inserts, properly clean mounting pocket and re-install (Page 45).
Uneven cutter marks, wavy surface, or chatter marks across face of workpiece.	<ol style="list-style-type: none"> 1. Feeding workpiece too fast. 2. Knives not properly adjusted (W1857). 3. Dirt or debris under inserts (W1857). 	<ol style="list-style-type: none"> 1. Reduce feed rate. 2. Properly adjust knives (Page 44). 3. Remove inserts, properly clean mounting pocket, and re-install (Page 45).
Glossy surface; scorching or burn marks on workpiece.	<ol style="list-style-type: none"> 1. Feed rate too slow. 2. Dull knives/inserts. 	<ol style="list-style-type: none"> 1. Increase feed rate. 2. Sharpen/replace knives (Page 44); rotate/replace inserts (Page 45).
Workpiece is concave or convex along its length after jointing.	<ol style="list-style-type: none"> 1. Workpiece not held with even pressure against outfeed table during cut. 2. Workpiece excessively bowed or warped, not suitable for jointing. 3. Tables are not parallel with cutterhead and each other. 	<ol style="list-style-type: none"> 1. Apply even downward pressure against workpiece through entire travel along outfeed side during cut. 2. Ensure workpiece is suitable for jointing (Page 28). 3. Check/Adjust table parallelism (Page 48).
Workpiece edges not square; tapered cut produced.	<ol style="list-style-type: none"> 1. Fence not square to table(s); fence tilt unlocked. 2. Inserts not consistently tightened/torqued. 3. Warped infeed or outfeed table. 	<ol style="list-style-type: none"> 1. Square fence to table(s) (Page 51); lock fence. 2. Tighten/torque all inserts consistently when rotating/replacing (Page 45). 3. Re grind/replace table.

Electrical Safety Instructions

These pages are current at the time of printing. However, in the spirit of improvement, we may make changes to the electrical systems of future machines. Compare the manufacture date of your machine to the one stated in this manual, and study this section carefully.

If there are differences between your machine and what is shown in this section, call Technical Support at (360) 734-3482 for assistance BEFORE making any changes to the wiring on your machine. An updated wiring diagram may be available. **Note:** Please gather the serial number and manufacture date of your machine before calling. This information can be found on the main machine label.

WARNING

SHOCK HAZARD. Working on wiring that is connected to a power source is extremely dangerous. Touching electrified parts will result in personal injury including but not limited to severe burns, electrocution, or death. Disconnect the power from the machine before servicing electrical components!

QUALIFIED ELECTRICIAN. Due to the inherent hazards of electricity, only a qualified electrician should perform wiring tasks on this machine. If you are not a qualified electrician, get help from one before attempting any kind of wiring job.

WIRE CONNECTIONS. All connections must be tight to prevent wires from loosening during machine operation. Double-check all wires disconnected or connected during any wiring task to ensure tight connections.

WIRE/COMPONENT DAMAGE. Damaged wires or components increase the risk of serious personal injury, fire, or machine damage. If you notice that any wires or components are damaged while performing a wiring task, replace those wires or components before completing the task.

MODIFICATIONS. Using aftermarket parts or modifying the wiring beyond what is shown in the diagram may lead to unpredictable results, including serious injury or fire.

MOTOR WIRING. The motor wiring shown in these diagrams is current at the time of printing, but it may not match your machine. Always use the wiring diagram inside the motor junction box.

CAPACITORS/INVERTERS. Some capacitors and power inverters store an electrical charge for up to 10 minutes after being disconnected from the power source. To reduce the risk of being shocked, wait at least this long before working on capacitors.

CIRCUIT REQUIREMENTS. You MUST follow the requirements at the beginning of this manual when connecting your machine to a power source.

EXPERIENCING DIFFICULTIES. If you are experiencing difficulties understanding the information included in this section, contact our Technical Support at (360) 734-3482.

NOTICE

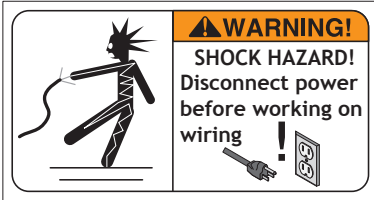
The photos and diagrams included in this section are best viewed in color. You can view these pages in color at www.shopfox.biz.

WIRING DIAGRAM COLOR KEY

BLACK	BLUE	YELLOW	LIGHT BLUE
WHITE	BROWN	YELLOW GREEN	BLUE WHITE
GREEN	GRAY	PURPLE	TUR-QUOISE
RED	ORANGE	PINK	

Wiring Diagram

Paddle Switch
(viewed from behind)



NOTICE
The motor wiring shown here is current at the time of printing, but it may not match your machine. Always use the wiring diagram inside the motor junction box.

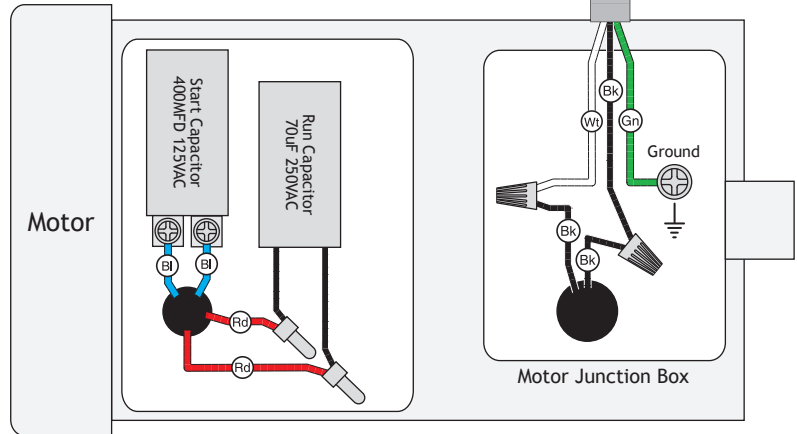
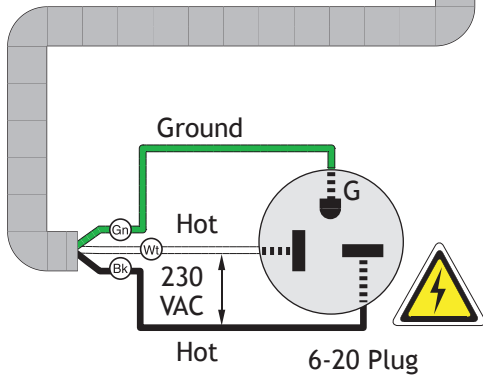
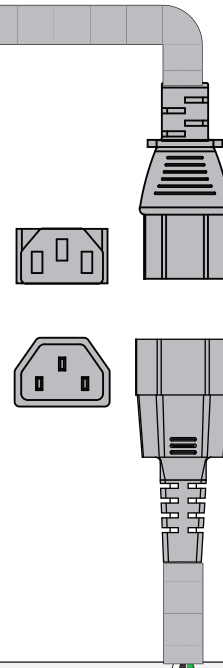
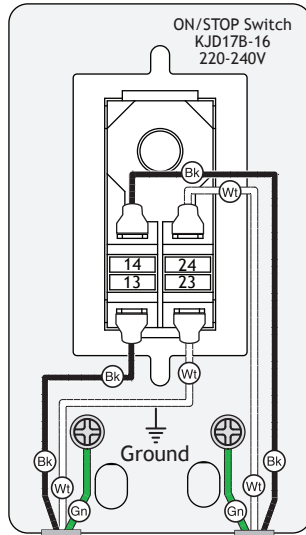


Figure 69. On/Off switch connections.

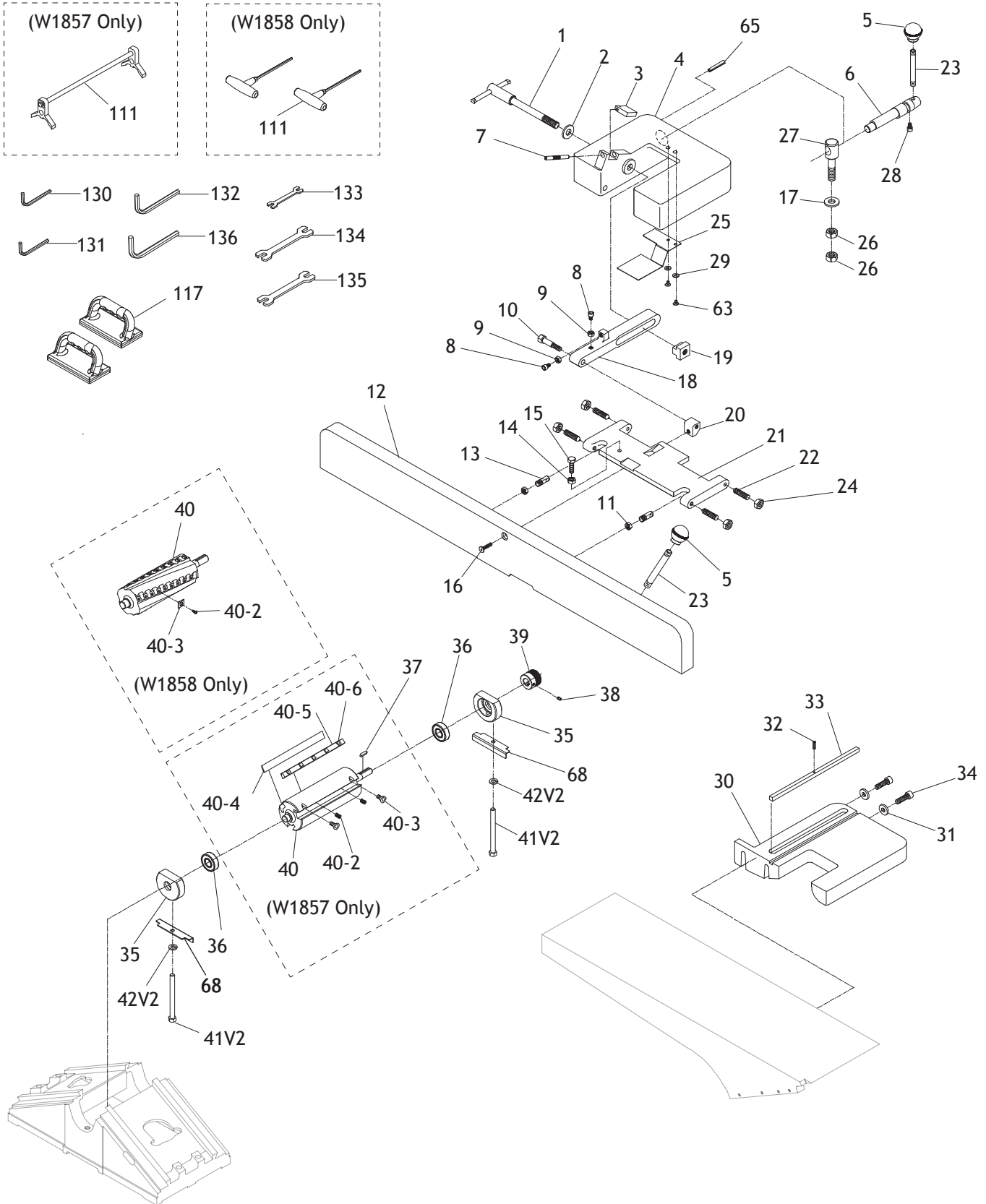


Figure 70. Motor junction box connections.

SERVICE

PARTS

Fence & Cutterhead

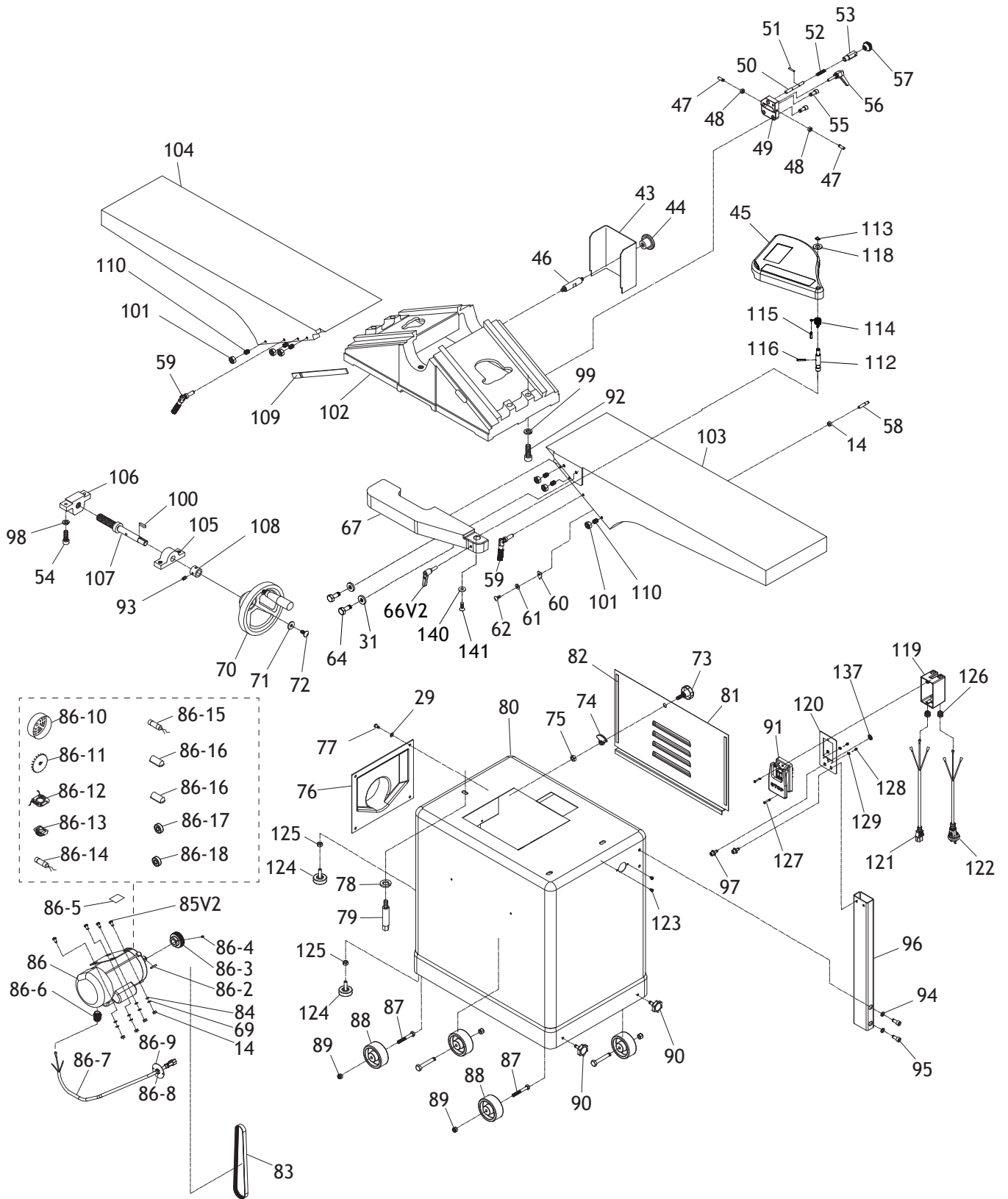


Fence & Cutterhead Parts List

REF	PART #	DESCRIPTION
1	X1857001	FENCE TILT LOCK LEVER 1/2-12
2	X1857002	FLAT WASHER 13MM
3	X1857003	STOP BLOCK
4	X1857004	FENCE CARRIAGE
5	X1857005	BALL KNOB 3/8-16, D1-5/16
6	X1857006	ECCENTRIC SHAFT 3/8-16, 5-1/4L
7	X1857007	DOWEL PIN 5 X 50
8	X1857008	CAP SCREW 1/4-20 X 1-1/4
9	X1857009	HEX NUT 1/4-20
10	X1857010	SHOULDER BOLT 5/16-18 X 11/16, 3/8 X 1
11	X1857011	HEX NUT 1/2-20 THIN
12	X1857012	FENCE
13	X1857013	STUD-SE 1/2-20, 1-3/8, 11/16
14	X1857014	HEX NUT 5/16-18
15	X1857015	HEX BOLT 5/16-18 X 1-1/4
16	X1857016	FLAT HD CAP SCR 5/16-18 X 1-1/2
17	X1857017	FENDER WASHER 1/2
18	X1857018	FENCE LINK
19	X1857019	T-NUT 1/2-12
20	X1857020	FENCE BLOCK
21	X1857021	FENCE SWIVEL BASE
22	X1857022	SET SCREW 3/8-16 X 1-1/2 CONE-PT
23	X1857023	STUD-DE 3/8-16 X 3-1/8, 3/8
24	X1857024	HEX NUT 3/8-16 THIN
25	X1857025	SAFETY PLATE
26	X1857026	HEX NUT 1/2-12
27	X1857027	CAMLOCK STUD 1/2-12 X 1-1/2, 3-1/2L
28	X1857028	CAP SCREW 1/4-20 X 1/2
29	X1857029	FLAT WASHER 1/4
30	X1857030	FENCE BASE
31	X1857031	FLAT WASHER 3/8
32	X1857032	ROLL PIN 4 X 20

REF	PART #	DESCRIPTION
33	X1857033	KEY 9.5 X 9.5 X 268
34	X1857034	CAP SCREW 3/8-16 X 1-1/2
35	X1857035	BEARING BLOCK
36	X1857036	BALL BEARING 6204-2NSE
37	X1857037	KEY 5 X 5 X 30
38	X1857038	SET SCREW M6-1 X 8
39	X1857039	CUTTERHEAD PULLEY
40	X1857040	CUTTERHEAD 8" 4-KNIFE (W1857)
40-2	X1857040-2	COMPRESSION SPRING (W1857)
40-3	X1857040-3	FLAT HD CAP SCR M5-.8 X 12 (W1857)
40-4	X1857040-4	KNIFE 8 X 3/4 X 1/8 HSS (W1857)
40-5	X1857040-5	KNIFE GIB (W1857)
40-6	X1857040-6	KNIFE GIB BOLT 1/4-28 X 1/4 (W1857)
40	X1858040	HELICAL CUTTERHEAD 8" (W1858)
40-2	X1858040-2	FLAT HD TORX SCR T-25 10-32 X 1/2 (W1858)
40-3	X1858040-3	CARBIDE INSERT 15 X 15 X 2.5MM (W1858)
41V2	X1857041V2	HEX BOLT 3/8-24 X 4-1/4 V2.01.21
42V2	X1857042V2	LOCK WASHER 9MM V2.01.21
63	X1857063	PHLP HD SCR 1/4-20 X 1/2
65	X1857065	ROLL PIN 4 X 25
68	X1857068	BEARING BLOCK PLATE
111	X1857111	KNIFE-SETTING JIG (W1857)
111	X1858111	TORX DRIVER T-25 (W1858)
117	X1857117	PUSH BLOCK
130	X1857130	HEX WRENCH 3MM
131	X1857131	HEX WRENCH 4MM
132	X1857132	HEX WRENCH 5MM
133	X1857133	WRENCH 8 X 10 OPEN-ENDS
134	X1857134	WRENCH 12 X 14 OPEN-ENDS
135	X1857135	WRENCH 11 X 13 OPEN-ENDS
136	X1857136	HEX WRENCH 6MM

Tables, Base, Stand & Motor

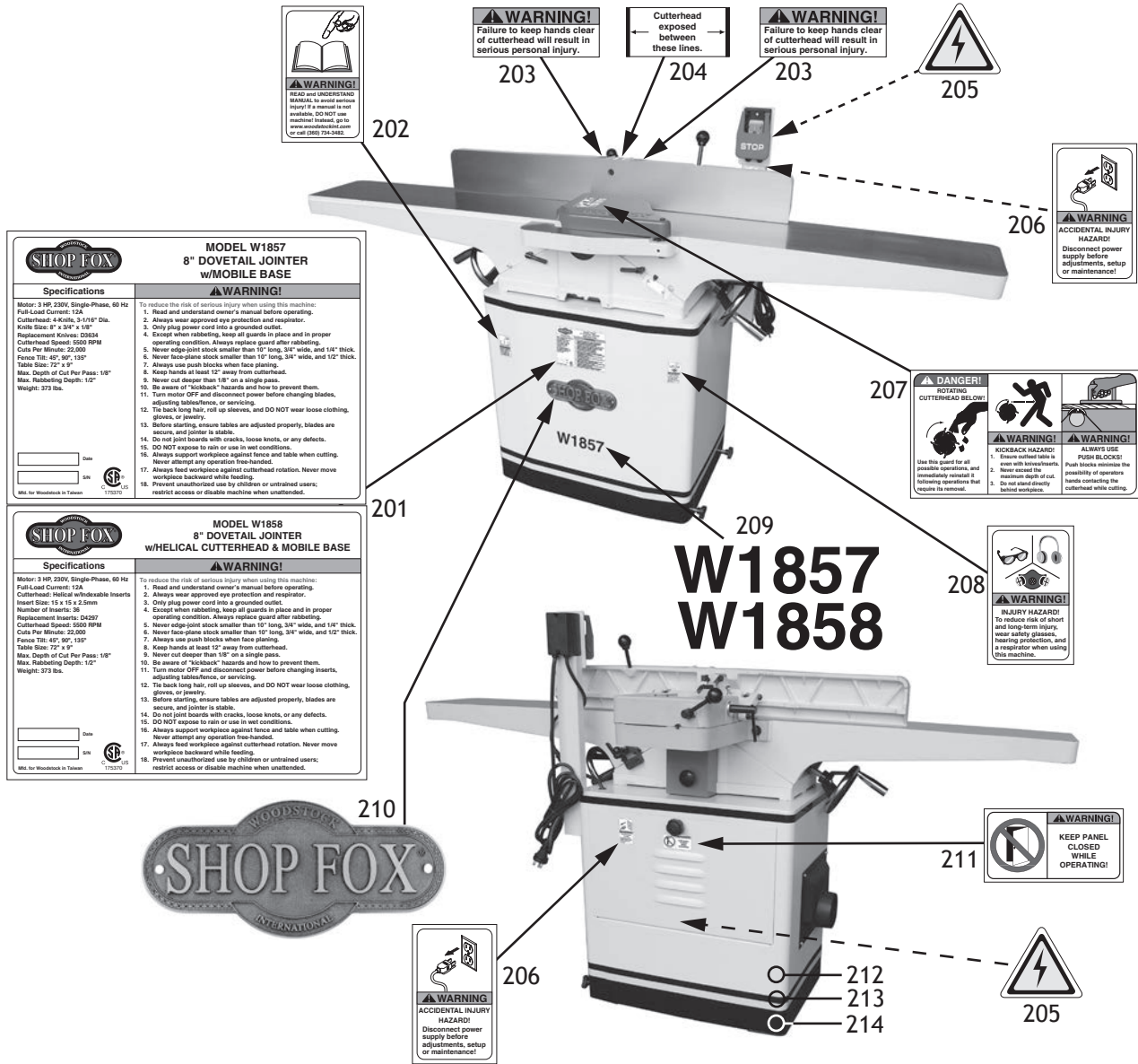


Tables, Base, Stand & Motor Parts List

REF	PART #	DESCRIPTION
14	X1857014	HEX NUT 5/16-18
29	X1857029	FLAT WASHER 1/4
31	X1857031	FLAT WASHER 3/8
43	X1857043	BELT COVER
44	X1857044	KNOB 5/16-18, D1-3/4, ROUND
45	X1857045	CUTTERHEAD GUARD
46	X1857046	STANDOFF-HEX MM 5/16-18 X 3/8, 3
47	X1857047	SET SCREW 1/4-20 X 3/4
48	X1857048	HEX NUT 1/4-20
49	X1857049	DEPTH STOP BLOCK
50	X1857050	SHAFT W/HOLE 2-3/4L
51	X1857051	ROLL PIN 3 X 20
52	X1857052	COMPRESSION SPRING
53	X1857053	SPRING SLEEVE
54	X1857054	CAP SCREW 3/8-16 X 1-1/4
55	X1857055	CAP SCREW 5/16-18 X 3/4
56	X1857056	ADJUSTABLE HANDLE 2L, 1/4-20 X 1
57	X1857057	BALL KNOB 1/4-20, D7/8
58	X1857058	SET SCREW 5/16-18 X 3/4, 1-5/16, SLOTTED
59	X1857059	FOLDING HANDLE 2-1/4L, 5/16-18 X 1-3/16
60	X1857060	SCALE POINTER
61	X1857061	FLAT WASHER 4MM
62	X1857062	PHLP HD SCR 8/32 X 1/4
64	X1857064	HEX BOLT 3/8-16 X 1
66V2	X1857066V2	GUARD LOCK HANDLE V2.07.19
67	X1857067	RABBETING TABLE
69	X1857069	LOCK WASHER 5/16
70	X1857070	TABLE HANDWHEEL W/HANDLE
71	X1857071	FENDER WASHER 8MM
72	X1857072	PHLP HD SCR 5/16-18 X 1/2
73	X1857073	KNOB BOLT 5-LOBE 3/8-16 X 1, D1-3/4
74	X1857074	LATCH
75	X1857075	HEX NUT 3/8-16
76	X1857076	DUST PORT 4"
77	X1857077	PHLP HD SCR 1/4-20 X 1/2
78	X1857078	LOCK WASHER 10MM
79	X1857079	STANDOFF HEX 3/8-16 X 3/4, 3-5/16L
80	X1857080	CABINET STAND
81	X1857081	REAR ACCESS PANEL
82	X1857082	FOAM PAD
83	X1857083	POLY-V BELT 350J7
84	X1857084	FLAT WASHER 5/16
85V2	X1857085V2	CARRIAGE BOLT 5/16-18 X 3/4
86	X1857086	MOTOR 3HP 230V 1-PH
86-2	X1857086-2	KEY 5 X 5 X 30
86-3	X1857086-3	MOTOR PULLEY
86-4	X1857086-4	SET SCREW M6-1 X 8
86-5	X1857086-5	MOTOR LABEL
86-6	X1857086-6	STRAIN RELIEF TYPE-3 PG13.5
86-7	X1857086-7	MOTOR CORD 14G 3W 32"
86-8	X1857086-8	STRAIN RELIEF TYPE-1 3/4"
86-9	X1857086-9	BACKING BOARD
86-10	X1857086-10	MOTOR FAN COVER

REF	PART #	DESCRIPTION
86-11	X1857086-11	MOTOR FAN
86-12	X1857086-12	CONTACT PLATE
86-13	X1857086-13	CENTRIFUGAL SWITCH
86-14	X1857086-14	S CAPACITOR 400M 125V 1-1/2 X 3-1/2
86-15	X1857086-15	R CAPACITOR 70M 250V 1-1/2 X 3-1/2
86-16	X1857086-16	CAPACITOR COVER
86-17	X1857086-17	BALL BEARING 6205ZZ (FRONT)
86-18	X1857086-18	BALL BEARING 6203ZZ (REAR)
87	X1857087	WHEEL AXLE 3/8-16 X 1-3/16, 2-1/2L
88	X1857088	WHEEL
89	X1857089	LOCK NUT 3/8-16
90	X1857090	KNOB BOLT 6-LOBE 5/16-18 X 3/4
91	X1857091	ON/OFF BUTTON KEDU KJD17B-230V-S
92	X1857092	CAP SCREW 1/2-12 X 1-3/4
93	X1857093	SET SCREW 1/4-20 X 1/4
94	X1857094	LOCK WASHER 8MM
95	X1857095	CAP SCREW M8-1.25 X 70
96	X1857096	SWITCH PEDESTAL
97	X1857097	CAP SCREW M8-1.25 X 20 W/WASHERS
98	X1857098	LOCK WASHER 3/8
99	X1857099	LOCK WASHER 1/2
100	X1857100	KEY 5 X 5 X 22
101	X1857101	HEX NUT 5/16-18
102	X1857102	TABLE BASE
103	X1857103	INFEED TABLE
104	X1857104	OUTFEED TABLE
105	X1857105	LEADSCREW SUPPORT
106	X1857106	LEADSCREW BRACKET
107	X1857107	LEADSCREW
108	X1857108	LEADSCREW COLLAR
109	X1857109	TABLE GIB
110	X1857110	SET SCREW 5/16-18 X 1-1/4 CONE-PT
112	X1857112	GUARD PIVOT SHAFT
113	X1857113	EXT RETAINING RING 11MM
114	X1857114	TORSION SPRING
115	X1857115	ROLL PIN 6 X 28
116	X1857116	ROLL PIN 5 X 28
118	X1857118	FLAT WASHER 12MM
119	X1857119	SWITCH BOX
120	X1857120	SWITCH PLATE
121	X1857121	SWITCH CORD 14G 3W 20"
122	X1857122	POWER CORD 14G 3W 10' 6-20P
123	X1857123	TAP SCREW M6 X 8
124	X1857124	ADJUSTABLE FOOT M8-1.25
125	X1857125	HEX NUT M8-1.25
126	X1857126	STRAIN RELIEF TYPE-1 5/8"
127	X1857127	PHLP HD SCR M4-.7 X 25
128	X1857128	PHLP HD SCR M4-.7 X 6
129	X1857129	EXT TOOTH WASHER 4MM
137	X1857137	GROUND LABEL
140	X1857140	FENDER WASHER 6.7 X 19 X 2MM
141	X1857141	BUTTON HD CAP SCR M6-1 X 12

Labels & Cosmetics



SHOP FOX INTERNATIONAL	
MODEL W1857 8" DOVETAIL JOINTER W/MOBILE BASE	
Specifications	WARNING!
Motor: 3 HP, 230V, Single-Phase, 60 Hz Full-Load Current: 12A Cutterhead: 8-Kills, 3.125" Dia. Knife Size: 8" x 3/4" x 1/8" Replacement Inserts: D2824 Cutterhead Speed: 5500 RPM Cut Per Minute: 32,000 Fence Tilt: 45°, 50°, 15° Table Size: 72" x 9" Max. Depth of Cut Per Pass: 1/8" Max. Rabbeting Depth: 1/2" Weight: 373 lbs.	To reduce the risk of serious injury when using this machine: 1. Read and understand owner's manual before operating. 2. Always wear approved eye protection and respirator. 3. Only plug power cord into a grounded outlet. 4. Except when rabbeting, keep all guards in place and in proper operating condition. Always replace guard after rabbeting. 5. Never edge-joint stock smaller than 10" long, 3/4" wide, and 1/4" thick. 6. Never face-plane stock smaller than 10" long, 3/4" wide, and 1/2" thick. 7. Always use push blocks when face planing. 8. Keep hands at least 12" away from cutterhead. 9. Never cut deeper than 1/8" on a single pass. 10. Be aware of "kickback" hazards and how to prevent them. 11. Turn motor OFF and disconnect power before changing blades, adjusting table/fence, or servicing. 12. Tie back long hair, roll up sleeves, and DO NOT wear loose clothing, gloves, or jewelry. 13. Before starting, ensure tables are adjusted properly, blades are secure, and fence is stable. 14. Do not joint boards with cracks, loose knots, or any defects. 15. DO NOT expose to rain or use in wet conditions. 16. Always support workpiece against fence and table when cutting. Never attempt any operation free-handed. 17. Always feed workpiece against cutterhead rotation. Never move workpiece backward while feeding. 18. Prevent unauthorized use by children or untrained users; restrict access or disable machine when unattended.

SHOP FOX INTERNATIONAL	
MODEL W1858 8" DOVETAIL JOINTER W/HELICAL CUTTERHEAD & MOBILE BASE	
Specifications	WARNING!
Motor: 3 HP, 230V, Single-Phase, 60 Hz Full-Load Current: 12A Cutterhead: Helical, replaceable inserts Insert Size: 15 x 15 x 2.5mm Number of Inserts: 36 Replacement Inserts: D4287 Cutterhead Speed: 5500 RPM Cut Per Minute: 32,000 Fence Tilt: 45°, 50°, 15° Table Size: 72" x 9" Max. Depth of Cut Per Pass: 1/8" Max. Rabbeting Depth: 1/2" Weight: 373 lbs.	To reduce the risk of serious injury when using this machine: 1. Read and understand owner's manual before operating. 2. Always wear approved eye protection and respirator. 3. Only plug power cord into a grounded outlet. 4. Except when rabbeting, keep all guards in place and in proper operating condition. Always replace guard after rabbeting. 5. Never edge-joint stock smaller than 10" long, 3/4" wide, and 1/4" thick. 6. Never face-plane stock smaller than 10" long, 3/4" wide, and 1/2" thick. 7. Always use push blocks when face planing. 8. Keep hands at least 12" away from cutterhead. 9. Never cut deeper than 1/8" on a single pass. 10. Be aware of "kickback" hazards and how to prevent them. 11. Turn motor OFF and disconnect power before changing inserts, adjusting table/fence, or servicing. 12. Tie back long hair, roll up sleeves, and DO NOT wear loose clothing, gloves, or jewelry. 13. Before starting, ensure tables are adjusted properly, blades are secure, and fence is stable. 14. Do not joint boards with cracks, loose knots, or any defects. 15. DO NOT expose to rain or use in wet conditions. 16. Always support workpiece against fence and table when cutting. Never attempt any operation free-handed. 17. Always feed workpiece against cutterhead rotation. Never move workpiece backward while feeding. 18. Prevent unauthorized use by children or untrained users; restrict access or disable machine when unattended.

REF	PART #	DESCRIPTION
201	XP1857201	MACHINE ID LABEL (W1857)
201	XP1858201	MACHINE ID LABEL (W1858)
202	XP1857202	READ MANUAL LABEL
203	XP1857203	CUTTERHEAD WARNING LABEL
204	XP1857204	CUTTERHEAD EXPOSED LABEL
205	XP1857205	ELECTRICITY LABEL
206	XP1857206	DISCONNECT POWER LABEL
207	XP1857207	CUTTERHEAD GUARD LABEL

REF	PART #	DESCRIPTION
208	XP1857208	EYES EARS LUNGS WARNING LABEL
209	XP1857209	MODEL NUMBER LABEL (W1857)
209	XP1858209	MODEL NUMBER LABEL (W1858)
210	XP1857210	SHOPFOX NAMEPLATE-LARGE
211	XP1857211	PANEL CLOSED WARNING LABEL
212	XP1857212	TOUCH-UP PAINT, SHOP FOX WHITE
213	XP1857213	BLACK TRIM TAPE
214	XP1857214	TOUCH-UP PAINT, SHOP FOX BLACK

WARNING

Safety labels warn about machine hazards and how to prevent serious personal injury. The owner of this machine **MUST** maintain the original location and readability of all labels on this machine. If any label is removed or becomes unreadable, **REPLACE** that label before allowing machine to be operated again. Contact us at (360) 734-3482 or www.woodstockint.com to order new labels.

WARRANTY

Woodstock International, Inc. warrants all Shop Fox machinery to be free of defects from workmanship and materials for a period of two years from the date of original purchase by the original owner. This warranty does not apply to defects due directly or indirectly to misuse, abuse, negligence or accidents, lack of maintenance, or reimbursement of third party expenses incurred.

Woodstock International, Inc. will repair, replace, or arrange for a dealer refund, at its expense and option, the Shop Fox machine or machine part proven to be defective for its designed and intended use, provided that the original owner returns the product prepaid to an authorized warranty or repair facility as designated by our Bellingham, Washington office with proof of their purchase of the product within two years, and provides Woodstock International, Inc. reasonable opportunity to verify the alleged defect through inspection. If it is determined there is no defect, or that the defect resulted from causes not within the scope of Woodstock International Inc.'s warranty, then the original owner must bear the cost of storing and returning the product.

This is Woodstock International, Inc.'s sole written warranty and any and all warranties that may be implied by law, including any merchantability or fitness, for any particular purpose, are hereby limited to the duration of this written warranty. We do not warrant that Shop Fox machinery complies with the provisions of any law, acts or electrical codes. We do not reimburse for third party repairs. In no event shall Woodstock International, Inc.'s liability under this limited warranty exceed the purchase price paid for the product, and any legal actions brought against Woodstock International, Inc. shall be tried in the State of Washington, County of Whatcom. 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 products.

Every effort has been made to ensure that all Shop Fox machinery meets high quality and durability standards. We are committed to continuously improving the quality of our products, and reserve the right to change specifications at any time.

To register the warranty, go to <https://www.woodstockint.com/warranty>, or scan the QR code below. You will be directed to the Warranty Registration page on www.woodstockint.com. Enter all applicable production information.





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