

# MODEL G0634Z JOINTER/PLANER MANUAL INSERT

For Machines Mfd. Since 05/20 and Owner's Manual Printed 02/20

The following changes were recently made to this machine since the owner's manual was printed:

Fence Lock Lever has been removed for shipping.

▲WARNING: To reduce the risk of injury or damage to machine, you MUST read and understand this insert—and the entire Model G0634Z manual—BEFORE assembling, installing, or operating this machine!

If you have any further questions about this manual insert, contact our Technical Support at **(570) 546-9663** or email **techsupport@grizzly.com**.

#### To install Fence Lock Lever:

1. Cut cable tie and remove lock lever (see Figure 1).

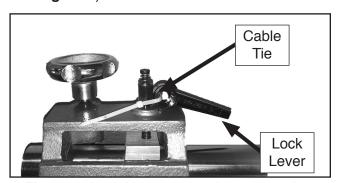


Figure 1. Lock lever removed for packaging.

**2.** Using #2 phillips screwdriver, remove shoulder screw and compression spring.

Place lever over hex bolt, followed by compression spring and shoulder screw (see Figure 2).

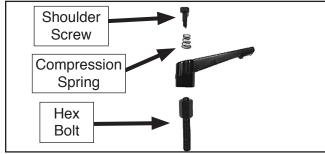


Figure 2. Installation order.

4. Tighten shoulder screw (see Figure 3).

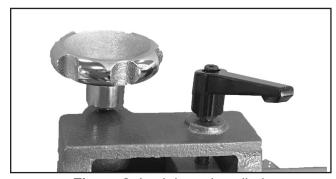


Figure 3. Lock lever installed.



# MODEL G0634Z/G0634XP JOINTER/PLANER COMBINATION MACHINE

**OWNER'S MANUAL** 

(For models manufactured since 01/20)



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#BL8977 PRINTED IN TAIWAN



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.



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

#### **Contact Info**

We stand behind our machines! If you have questions or need help, contact us with the information below. Before contacting, make sure you get the **serial number** and **manufacture date** from the machine ID label. This will help us help you faster.

Grizzly Technical Support 1815 W. Battlefield Springfield, MO 65807 Phone: (570) 546-9663 Email: techsupport@grizzly.com

We want your feedback on this manual. What did you like about it? Where could it be improved? Please take a few minutes to give us feedback.

Grizzly Documentation Manager P.O. Box 2069 Bellingham, WA 98227-2069 Email: manuals@grizzly.com

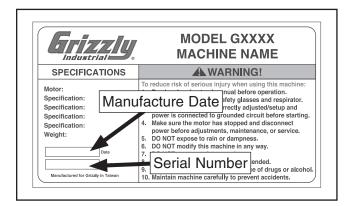
### **Manual Accuracy**

We are proud to provide a high-quality owner's manual with your new machine!

We made every effort to be exact with the instructions, specifications, drawings, and photographs in this manual. Sometimes we make mistakes, but our policy of continuous improvement also means that sometimes the machine you receive is slightly different than shown in the manual.

If you find this to be the case, and the difference between the manual and machine leaves you confused or unsure about something, check our website for an updated version. We post current manuals and manual updates for free on our website at www.grizzly.com.

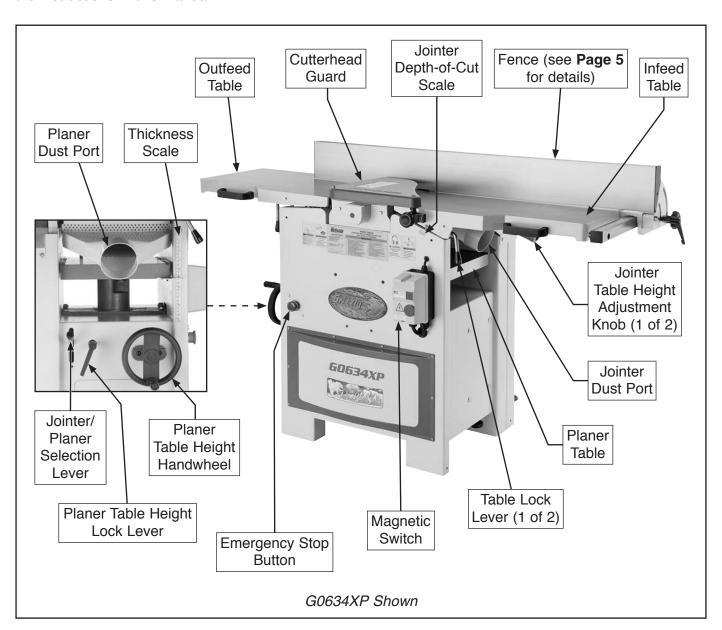
Alternatively, you can call our Technical Support for help. Before calling, make sure you write down the **Manufacture Date** and **Serial Number** from the machine ID label (see below). This information is required for us to provide proper tech support, and it helps us determine if updated documentation is available for your machine.

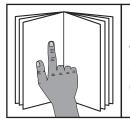




### **Main Identification**

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

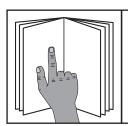




#### **AWARNING**

To reduce your risk of serious injury, read this entire manual BEFORE using machine.

# Controls & Components



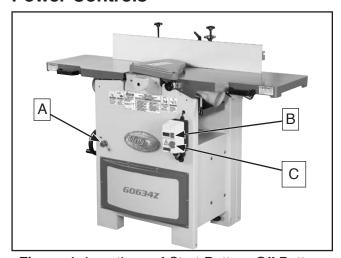
#### **AWARNING**

To reduce your risk of serious injury, read this entire manual BEFORE using machine.

Refer to the following figures and 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 minimize your risk of injury when operating this machine.

**Note:** The controls and components in this section are the same for both models G0634Z and G0634XP, unless otherwise noted.

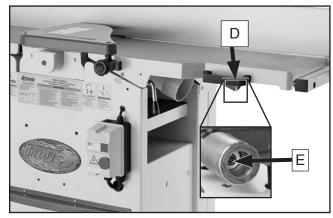
#### **Power Controls**



**Figure 1.** Locations of Start Button, Off Button, and Emergency Stop/Reset Button.

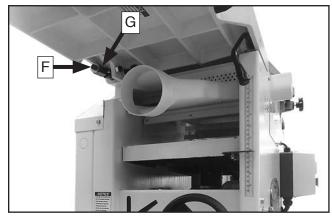
- **A.** Emergency Stop Button: Stops motor when pressed. Remains depressed until manually reset. Reset by twisting button clockwise until it springs outward.
- **B.** On Button: Starts motor. (Only if Emergency Stop button is not in depressed position).
- **C. Off Button:** Stops motor when pressed.

#### **Jointer Table Adjustment Controls**



**Figure 2.** Location of infeed jointer table adjustment controls (G0634XP shown).

- **D.** Infeed Table Height Adjustment Knob: Adjusts position of jointer infeed table (when infeed table height lock is loosened).
- E. Infeed Table Height Lock: Secures infeed table height adjustment (requires 6mm hex wrench).



**Figure 3.** Location of outfeed jointer table adjustment controls (G0634XP shown).

- F. Outfeed Table Height Adjustment Knob: Adjusts position of jointer outfeed table (when outfeed table height lock is loosened).
- G. Outfeed Table Height Lock: Secures outfeed table height adjustment (requires 6mm hex wrench).



#### **Jointer Fence Controls (G0634Z)**

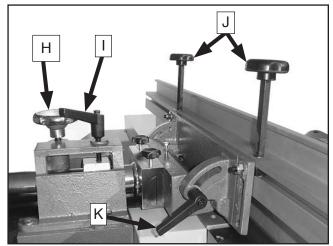


Figure 4. Locations of fence controls (G0634Z).

- H. Fence Adjustment Knob: Rotates to adjust lateral position of fence along width of jointer tables.
- I. Fence Lock Lever: Tightens to secure fence position along width of tables; loosens to allow adjustment.
- J. Fence Height Lock Knobs: Tighten to secure fence height after tilt adjustment; loosen to allow adjustment.
- K. Fence Tilt Lock: Tightens to secure fence tilt setting at desired angle; loosens to allow adjustment.

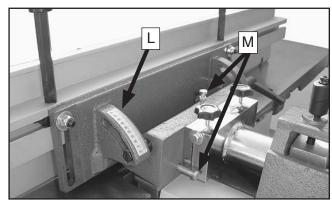
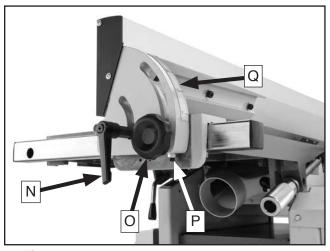


Figure 5. Location of fence tilt scale (G0634Z).

- L. Fence Tilt Scale: Indicates angle of fence tilt adjustment.
- **M.** Fence Stops: Allow fence to be quickly positioned at 45° or 90° when adjusting tilt setting.

#### **Jointer Fence Controls (G0634XP)**



**Figure 6.** Locations of jointer fence controls (G0634XP).

- N. Fence Lock Lever: Tightens to secure lateral fence position along width of tables; loosens to allow adjustment.
- O. Fence Tilt Lock: Tightens to secure fence tilt setting at desired angle; loosens to allow tilt adjustment.
- P. 90° Fence Stop: Allows fence to be quickly positioned at 90° when adjusting tilt setting.
- **Q.** Fence Tilt Scale: Indicates angle of fence tilt adjustment.

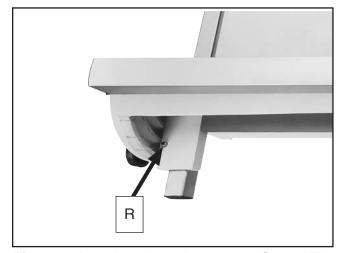
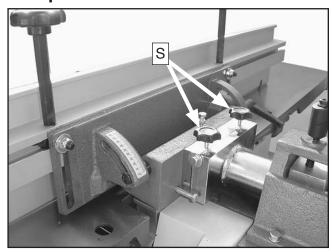


Figure 7. Location of 45° fence stop (G0634XP).

**R. 45° Fence Stop:** Allows fence to be quickly positioned at 45° when adjusting tilt setting.

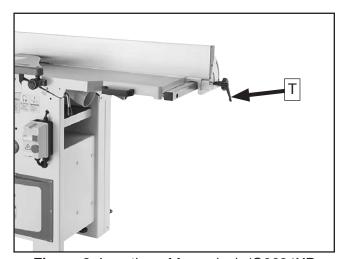


# Jointer/Planer Conversion Components



**Figure 8**. Location of fence release knobs (G0634Z only).

S. Fence Quick-Release Knobs (G0634Z Only): Loosen to allow removal of fence when converting jointer to planer.



**Figure 9**. Location of fence lock (G0634XP only).

T. Fence Lock Lever (G0634XP Only): Loosen to allow removal of fence when converting jointer to planer.

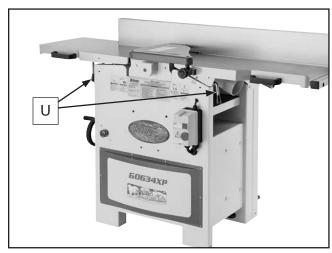


Figure 10. Locations of table lock levers (G0634XP shown).

**U.** Table Lock Levers: Loosen and pull out to swing jointer tables into UP position when converting jointer to planer.

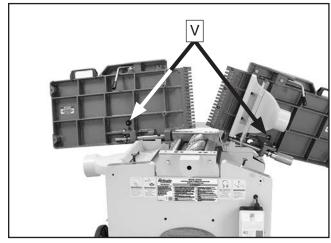
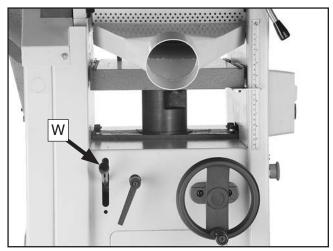


Figure 11. Location of jointer table lock knobs (G0634Z shown).

V. Jointer Table Lock Knobs: Secure jointer tables in UP position during planing.

### CAUTION

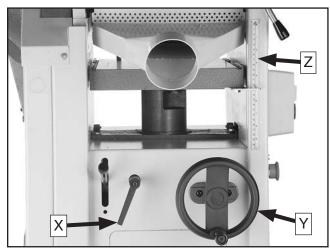
Serious personal injury could occur if you place your fingers between the tables and base or between pivot points. Your hands could be pinched or crushed!



**Figure 12**. Location of jointer/planer selection lever (G0634Z shown).

W. Jointer/Planer Selection Lever: Moves UP to engage feed rollers for planer operation. Moves DOWN to disengage feed rollers for jointer operation.

#### **Planer Controls**



**Figure 13.** Locations of planer controls (G0634Z shown).

- X. Table Height Lock Lever: Tightens to secure planer table height adjustment; loosens to allow adjustment.
- Y. Table Height Handwheel: Rotates to raise and lower planer table.
- **Z. Thickness Scale:** Indicates thickness of finished workpiece.





# MACHINE DATA SHEET

Customer Service #: (570) 546-9663 • To Order Call: (800) 523-4777 • Fax #: (800) 438-5901

# MODEL G0634Z JOINTER/PLANER COMBINATION MACHINE W/SPIRAL CUTTERHEAD

Product Dimensions:	
Weight	
Width (side-to-side)/Depth (front-to-back)/Height	
Foot Print (Length/Width)	
Shipping Dimensions:	
Type	Wood Crate
Content	Machine
Weight	750 lbs.
Length/Width/Height	64 x 36 x 48 in.
Electrical:	
Switch	
Switch Voltage	220V
Cord Length	
Cord Gauge	12 gauge
Recommended Breaker Size	30 amp
Plug	No
Motors:	
Main	
Туре	TEFC Capacitor Start Induction
Horsepower	5 HP
Voltage	220V
Phase	Single
Amps	25A
Speed	3450 RPM
Cycle	
Number Of Speeds	1
Power Transfer	
Bearings	Shielded and Lubricated
Main Specifications:	
Fence Information	
Fence Length	
Fence Height	5-7/8 in.
Fence Stops	45 and 90 deg.
Cutting Capacities (Jointer)	
Bevel Jointing	0-45 deg.
Maximum Width of Cut	•
Maximum Depth of Cut	
Number of Cuts Per Minute	
Minimum Stock Length	12 in.



#### **Cutting Capacities (Planer)**

Cutting Capacities (Planer)	
Maximum Width of Cut	12 in.
Maximum Depth of Cut Planing Full Width	
Maximum Depth of Cut Planing 6" Wide Board	
Number of Cuts Per Minute	
Number of Cuts Per Inch	
Feed Speeds	
Minimum Stock Length	
Minimum Stock Thickness	
Maximum Stock Thickness	
Cutterhead Information	
Cutterhead Type	Spiral
Cutterhead Diameter	
Number of Cutter Spirals	4
Number of Indexable Cutters	
Cutter Insert Type	
Cutter Insert Length	
Cutter Insert Width	
Cutter Insert Thickness	
Cutterhead Speed	9034 NFW
Table Information (Jointer)	
Table Length	59-1/2 in.
Table Width	14 in.
Floor To Table Height	
Table Information (Planer)	
Table Length	23-1/8 in
Table Width	
Table Thickness	
Floor To Table Height	
•	
Construction	
Body Assembly Construction	
Cutterhead Assembly Construction	Steel
Infeed Roller Construction	
Outfeed Roller Construction	Rubber
Stand Construction	Heavy Gauge Sheet Metal
Table Construction	
Paint	Powder Coated
Other Infomation	
Dust Port Size	4 in
Number of Dust Ports	
Measurement Scale (Jointer)	
Measurement Scale (Planer)	
Other Specifications:	
Country Of Origin	Taiwan
Warranty	
Serial Number Location	
Octiai Nutriber Location	D Label on Front of the Stand
Factoria	

#### Features:

Quick Release Fence
Flip Up Tables and Change Lever Simplify Jointer-Planer Conversion
Jointer Tables Lock Into Raised Position for Planer Operation; Hand Knobs Release Tables
Cast Iron Infeed and Outfeed Tables
Dual 4" Dust Ports





**Product Dimensions:** 

# MACHINE DATA SHEET

Customer Service #: (570) 546-9663 • To Order Call: (800) 523-4777 • Fax #: (800) 438-5901

# MODEL G0634XP POLAR BEAR SERIES JOINTER/PLANER W/HELICAL CUTTERHEAD

Weight	610 lbs
Width (side-to-side)/Depth (front-to-back)/Height	
Foot Print (Length/Width)	
Shipping Dimensions:	
Type	
Content	
Weight	
Length/Width/Height	
Electrical:	
Power Requirement	220V, Single-Phase, 60 Hz
Minimum Circuit Size	30 Amp
Switch	
Switch Voltage	•
Cord Length	
Cord Gauge	
Plug Included	
Recommened Plug Type	
Motors:	
Main	
Туре	TEEC Canacitor Start Induction
Horsepower	
Voltage	
Phase	
Amps	
Speed	
•	
Cycle	
Number Of Speeds	
Power Transfer	
Bearings	Snielded and Lubricated
Main Specifications:	
Fence Information	
Fence Lenath	51-1/4 in.
Fence Stops	
Cutting Capacities (Jointer)	
Bevel Jointing	0-45 den
· · · · · · · · · · · · · · · · · · ·	•
·	
	•
Fence Length	



#### **Cutting Capacities (Planer) Cutterhead Information** Cutterhead Type .......Helical Number of Cutter Spirals ......4 **Table Information (Jointer)** Floor To Table Height .......35-1/2 in. **Table Information (Planer)** Construction Paint Powder Coated **Other Infomation** Other Specifications:

#### Features:

White Powder Coated Paint
Quick Release Fence
Flip Up Tables and Change Lever Simplify Jointer-Planer Conversion
Jointer Tables Lock Into Raised Position for Planer Operation; Hand Knobs Release Tables
Cast Iron Infeed and Outfeed Tables
Dual 4" Dust Ports



# **SECTION 1: SAFETY**

# For Your Own Safety, Read Instruction Manual Before Operating This 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. Always use common sense and good judgment.

# **A**DANGER

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

# **AWARNING**

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

# **A**CAUTION

Indicates a potentially hazardous situation which, if not avoided, MAY result in minor or moderate injury. It may also be used to alert against unsafe practices.

#### **NOTICE**

Alerts the user to useful information about proper operation of the machine to avoid machine damage.

# **Safety Instructions for Machinery**

#### **AWARNING**

**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 your 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 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 prevents an injury risk 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.



# **AWARNING**

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 reduce risk of slipping and losing control or accidentally contacting cutting tool or moving parts.

**HAZARDOUS DUST.** Dust created by machinery operations may cause cancer, birth defects, or long-term respiratory damage. Be aware of dust hazards associated with each workpiece material. 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!

**USE CORRECT TOOL FOR THE JOB.** Only use this tool for its intended purpose—do not force it or an attachment to do a job for which it was not designed. Never make unapproved modifications—modifying tool or using it differently than intended may result in malfunction or mechanical failure that can lead to 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 BEFORE operating machine.

**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 the 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.

**DAMAGED PARTS.** Regularly inspect machine for damaged, loose, or mis-adjusted parts—or any condition that could affect safe operation. Immediately repair/replace BEFORE operating machine. For your own safety, DO NOT operate machine with damaged parts!

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. 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 our Technical Support at (570) 546-9663.



# **Additional Safety for Jointers**

### **AWARNING**

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 a high rate of speed. Kickback injuries occur from getting struck by workpiece or hands being pulled into cutterhead. To reduce the risk of kickback, only use proper workpieces, safe feeding techniques, and proper machine setup or maintenance.

**GUARD REMOVAL.** Operating jointer without guards unnecessarily 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 OR 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 of these results will increase risk of kickback. Always keep outfeed table even with knives/inserts at highest point during rotation.

**INSPECTING STOCK.** Impact injuries or kick-back 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. Always joint warped workpieces with cupped side facing down.

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

**GRAIN DIRECTION.** Jointing against the grain or end grain can increase 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 machine 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 tables 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 ½" (0.125") from cutterhead body.



# **Additional Safety for Planers**

#### WARNING

Amputation, serious cuts, entanglement, or death can occur from contact with rotating cutterhead or other moving parts! Flying chips can cause eye injuries or blindness. Workpieces or knives thrown by cutterhead can strike nearby operator or bystanders with deadly force. To reduce the risk of these hazards, operator and bystanders MUST completely heed hazards and warnings below.

KICKBACK. Know how to reduce the risk of kickback and kickback-related injuries. "Kickback" occurs during the operation when the workpiece is ejected from the machine at a high rate of speed. Kickback is commonly caused by poor workpiece selection, unsafe feeding techniques, or improper machine setup/maintenance. Kickback injuries typically occur as follows: (1) operator/bystanders are struck by the workpiece, resulting in impact injuries (i.e., blindness, broken bones, bruises, death); (2) operator's hands are pulled into blade, resulting in amputation or severe lacerations.

**AVOID CONTACT WITH MOVING PARTS.** Never remove guards/covers or reach inside the planer during operation or while connected to power. You could be seriously injured if you accidentally touch the spinning cutterhead or get entangled in moving parts. If a workpiece becomes stuck or sawdust removal is necessary, turn planer *OFF* and disconnect power before clearing.

**DULL/DAMAGED KNIVES/INSERTS.** Only use sharp, undamaged knives/inserts. Dull or damaged knives/inserts increase the risk of kickback.

**INSPECTING STOCK.** To reduce the risk of kickback injuries or machine damage, thoroughly inspect and prepare the workpiece before cutting. Verify workpiece is free of nails, staples, loose knots or foreign material. Workpieces with minor warping should be jointed first or planed with the cupped side facing the table.

**BODY PLACEMENT.** Stand to one side of planer during the entire operation to avoid getting hit if kickback occurs.

**GRAIN DIRECTION.** Planing across the grain is hard on the planer and may cause kickback. Plane in the same direction or at a slight angle with the wood grain.

**PLANING CORRECT MATERIAL.** Only plane natural wood stock with this planer. DO NOT plane MDF, OSB, plywood, laminates or other synthetic materials that can break up inside the planer and be ejected towards the operator.

**LOOKING INSIDE PLANER.** Wood chips fly around inside the planer at a high rate of speed during operation. To avoid injury from flying material, DO NOT look inside planer during operation.

**CUTTING LIMITATIONS.** To reduce the risk of kickback hazards or damage to the machine, do not exceed the maximum depth of cut or minimum board length and thickness found in the **Data Sheet**. Only feed one board at a time.

**INFEED ROLLER CLEARANCE.** The infeed roller is designed to pull material into the spinning cutterhead. To reduce the risk of entanglement, keep hands, clothing, jewelry, and long hair away from the infeed roller during operation.

**FEED WORKPIECE PROPERLY.** To reduce the risk of kickback, never start planer with workpiece touching cutterhead. Allow cutterhead to reach full speed before feeding, and do not change feed speed during cutting operation.

**WORKPIECE SUPPORT.** To reduce the risk of kickback, always make sure workpiece can move completely across table without rocking or tipping. Use auxiliary support stands for long stock.

**SECURE KNIVES/INSERTS.** Loose knives or improperly set inserts can become dangerous projectiles or cause machine damage. Always verify knives/inserts are secure and properly adjusted before operation.



# **SECTION 2: POWER SUPPLY**

#### **Availability**

Before installing the machine, consider the availability and proximity of the required power supply circuit. If an existing circuit does not meet the requirements for this machine, a new circuit must be installed. To minimize the risk of electrocution, fire, or equipment damage, installation work and electrical wiring must be done by an electrician or qualified service personnel in accordance with all applicable codes and standards.



# **AWARNING**

Electrocution, fire, shock, or equipment damage may occur if machine is not properly grounded and connected to power supply.

#### **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 220V ..... 25 Amps

The full-load current is not the maximum amount of amps that the machine will draw. If the machine is overloaded, it will draw additional amps beyond the full-load rating.

If the machine is overloaded for a sufficient length of time, damage, overheating, or fire may result—especially if connected to an undersized circuit. To reduce the risk of these hazards, avoid overloading the machine during operation and make sure it is connected to a power supply circuit that meets the specified circuit requirements.

#### Circuit Requirements for 220V

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

Nominal Voltage	.208V, 220V, 230V, 240V
Cycle	60 Hz
Phase	1-Phase
<b>Power Supply Circuit</b>	30 Amps
Plug/Receptacle	NEMA L6-30
Cord "S"-Type, 3-	Wire, 12 AWG, 300 VAC

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.)

# **A**CAUTION

For your own safety and protection of property, consult an electrician if you are unsure about wiring practices or electrical codes in your area.

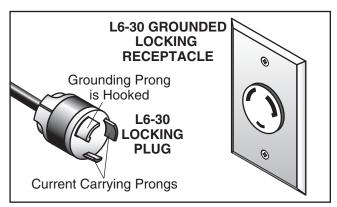
Note: Circuit requirements in this manual apply to a dedicated circuit—where only one machine will be running on the circuit at a time. If machine will be connected to a shared circuit where multiple machines may be running at the same time, consult an electrician or qualified service personnel to ensure circuit is properly sized for safe operation.



#### **Grounding Instructions**

This machine MUST be grounded. In the event of certain malfunctions or breakdowns, grounding reduces the risk of electric shock by providing a path of least resistance for electric current.

The power cord and plug specified under "Circuit Requirements for 220V" on the previous page has an equipment-grounding wire and a grounding prong. The plug must only be inserted into a matching receptacle (outlet) that is properly installed and grounded in accordance with all local codes and ordinances (see figure below).



**Figure 14.** Typical L6-30 plug and receptacle.

# **AWARNING**

Serious injury could occur if you connect machine to power before completing setup process. DO NOT connect to power until instructed later in this manual.



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

#### **AWARNING**

Serious injury could occur if you connect machine to power before completing setup process. DO NOT connect to power until instructed later in this manual.

Improper connection of the equipment-grounding wire can result in a risk of electric shock. The wire with green insulation (with or 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.

#### **Extension Cords**

We do not recommend using an extension cord with this machine. If you must use an extension cord, only use it if absolutely necessary and only on a temporary basis.

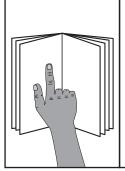
Extension cords cause voltage drop, which can damage electrical components and shorten motor life. Voltage drop increases as the extension cord size gets longer and the gauge size gets smaller (higher gauge numbers indicate smaller sizes).

Any extension cord used with this machine must be in good condition and contain a ground wire and matching plug/receptacle. Additionally, it must meet the following size requirements:

Minimum Gauge Size.....10 AWG Maximum Length (Shorter is Better)......50 ft.



# **SECTION 3: SETUP**



#### **AWARNING**

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!



#### **AWARNING**

Wear safety glasses during the entire setup process!



### **AWARNING**

**HEAVY LIFT!** 

Straining or crushing injury may occur from improperly lifting 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 this machine.

### **Needed for Setup**

The following items are needed, but not included, for the setup/assembly of this machine.

Des	scription Qty
•	Safety Glasses (per person)1
•	Heavy Leather Gloves (per person) 1 Pair
•	Lifting Equipment (Min. 800 lb. Capacity) 1
•	Lifting Sling (800 lb. Capacity, Optional) 1
•	Dust Collection System 1
•	Dust Hose 4" (length as needed)1
•	Hose Clamp 4" 1
•	Shop Rags for Cleaning As needed
•	Degreaser/Cleaner (Page 21) As needed

# **Unpacking**

This machine was carefully packaged for safe transport. When unpacking, separate all enclosed items from packaging materials and inspect them for shipping damage. *If items are damaged, please call us immediately at (570) 546-9663.* 

**IMPORTANT:** Save all packaging materials until you are completely satisfied with the machine and have resolved any issues between Grizzly or the shipping agent. You MUST have the original packaging to file a freight claim. It is also extremely helpful if you need to return your machine later.



### **AWARNING**

SUFFOCATION HAZARD! Keep children and pets away from plastic bags or packing materials shipped with this machine.



# **Inventory**

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

If any non-proprietary parts are missing (e.g. a nut or a washer), we will gladly replace them; or for the sake of expediency, replacements can be obtained at your local hardware store.

#### **NOTICE**

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.

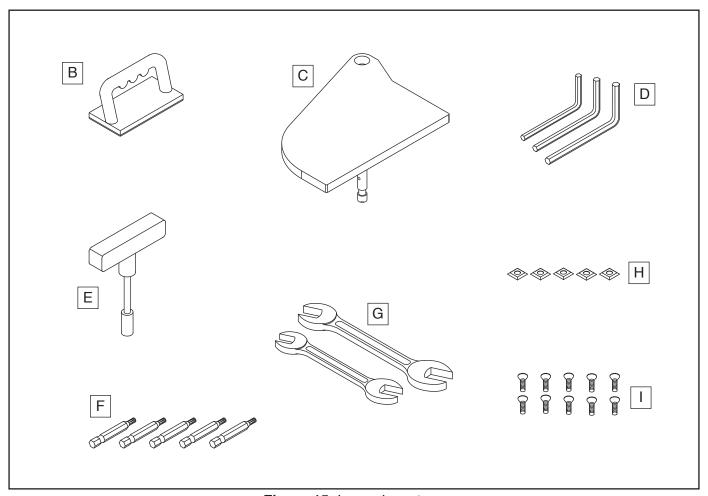
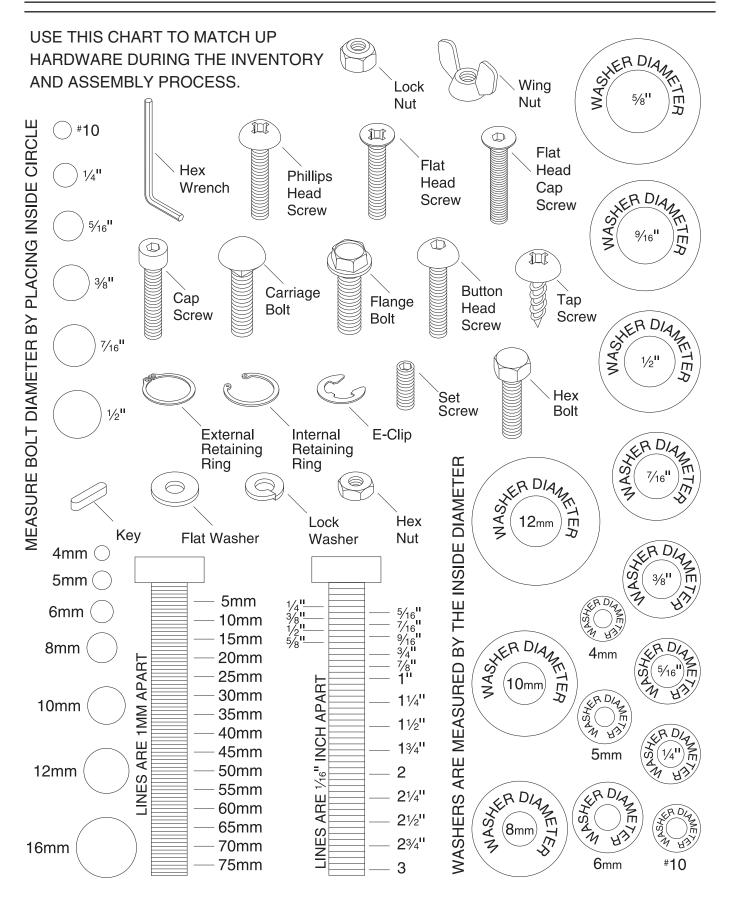


Figure 15. Loose inventory.

Вох	(1 (Figure 3)	Qtv	Box	( 1 (Figure 3)	Qtv
	Jointer/Planer Assembly (Not Shown)	1		Torx Drivers T25	•
	Push Blocks			Open-End Wrenches 8/10, 12/14mm	
C.	Cutterhead Guard Assembly	1	H.	Carbide Inserts 15 x 15 x 2.5mm	5
	Hex Wrenches 3, 4 mm, 3/32"1		I.	Flat Hd Torx Screws 10-32 x 1/2" T25	10
F	T-Handle Wrench 1/4"	1			

# **Hardware Recognition Chart**



### Cleanup

The unpainted surfaces of your machine are coated with a heavy-duty rust preventative that prevents corrosion during shipment and storage. This rust preventative works extremely well, but it will take a little time to clean.

Be patient and do a thorough job cleaning your machine. The time you spend doing this now will give you a better appreciation for the proper care of your machine's unpainted surfaces.

There are many ways to remove this rust preventative, but the following steps work well in a wide variety of situations. Always follow the manufacturer's instructions with any cleaning product you use and make sure you work in a well-ventilated area to minimize exposure to toxic fumes.

#### Before cleaning, gather the following:

- Disposable rags
- Cleaner/degreaser (WD•40 works well)
- Safety glasses & disposable gloves
- Plastic paint scraper (optional)

#### Basic steps for removing rust preventative:

- 1. Put on safety glasses.
- Coat the rust preventative with a liberal amount of cleaner/degreaser, then let it soak for 5–10 minutes.
- Wipe off the surfaces. If your cleaner/degreaser is effective, the rust preventative will wipe off easily. If you have a plastic paint scraper, scrape off as much as you can first, then wipe off the rest with the rag.
- **4.** Repeat **Steps 2–3** as necessary until clean, then coat all unpainted surfaces with a quality metal protectant to prevent rust.



#### AWARNING

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.



# **A**CAUTION

Many cleaning solvents are toxic if inhaled. Only work in a well-ventilated area.

#### NOTICE

Avoid harsh solvents like acetone or brake parts cleaner that may damage painted surfaces. Always test on a small, inconspicuous location first.

#### T23692—Orange Power Degreaser

A great product for removing the waxy shipping grease from the **non-painted** parts of the machine during clean up.



Figure 16. T23692 Orange Power Degreaser.



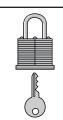
#### **Site Considerations**

#### Weight Load

Refer to the **Machine Data Sheet** 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.



# **ACAUTION**

Children or untrained people may be seriously injured by this machine. Only install in an access restricted location.

#### **Physical Environment**

The physical environment where the machine is operated is important for safe operation and longevity of machine 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 enough space around machine to disconnect power supply or apply a lockout/tagout device, if required.

#### 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.

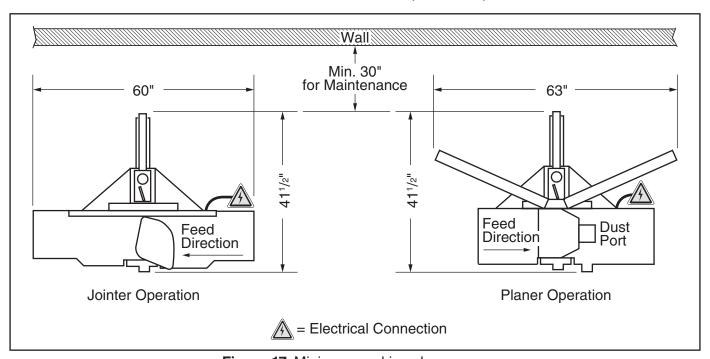


Figure 17. Minimum working clearances.



# **Lifting & Placing**

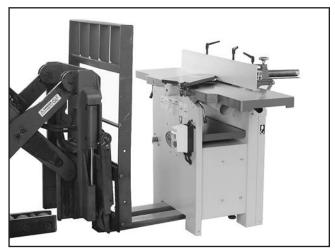


#### **AWARNING**

**HEAVY LIFT!** 

Straining or crushing injury may occur from improperly lifting 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 this machine.

Unbolt the jointer/planer from the pallet, and use a forklift to lift the machine off the pallet and onto a suitable location as shown in **Figure 18**. Only lift the machine enough to clear the floor.

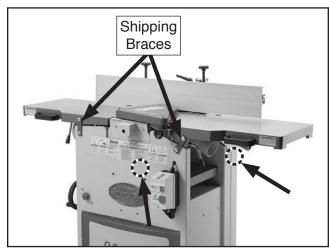


**Figure 18.** Example of lifting Model G0634Z/ G0634XP with forklift.

You can also attach hooks and lifting slings to the machine using the three lifting holes shown in **Figures 19 & 20** with a forklift, hoist, or boom crane. If you choose this alternative, you must punch out the lifting strap holes—this will permanently alter your machine.

If you are unsure how to lift this machine, consult a qualified professional.

After setting the machine in place, remove the shipping braces on both sides (see **Figure 19**).



**Figure 19**. Locations of front and right rear lifting holes and shipping braces.

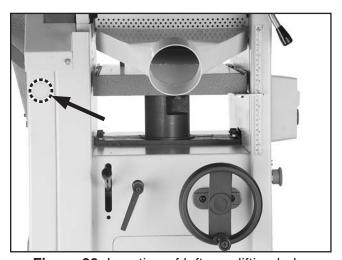


Figure 20. Location of left rear lifting hole.

#### **Assembly**

Models G0634Z and G0634XP come fully assembled except for installation of the cutterhead guard (see **Figure 21**). The cutterhead guard helps to protect hands and fingers from the rotating cutterhead during jointing operations. The cutterhead guard MUST be installed before operating this machine.

#### To install the cutterhead guard:

 Remove the shaft lock knob and insert the cutterhead guard shaft into the bracket hole as shown in Figure 21.

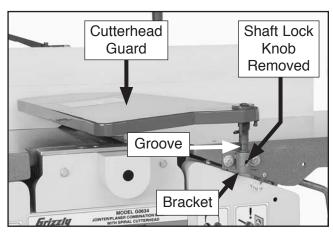


Figure 21. Installing cutterhead guard.

- 2. Move the fence forward until it touches the cutterhead guard.
- Thread the lock knob into the bracket so the threads fit into the shaft groove (see Figure 21), and secure the guard into place. Adjust the guard and lock knob as needed so the guard fully covers the cutterhead.
- **4.** Test the guard by pulling it back and letting go. The rubber bumper on the guard should hit the fence when the guard comes back.
  - Guard should snap back over cutterhead without dragging across table.
  - If guard drags across table, raise it until it won't drag, then tighten shaft lock.
  - If guard does not snap back, remove it and repeat Steps 1–3.

# Setting Outfeed Table Height

The outfeed table height MUST be level with the carbide inserts when they are at top-dead-center. If the outfeed table is set too low, the workpiece will be tapered from front to back. 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.

#### To set the outfeed table height:

- DISCONNECT MACHINE FROM POWER!
- **2.** Place a straightedge on the outfeed table so it extends over the cutterhead.
- Open the motor access panel and rotate the cutterhead pulley until one of the carbide inserts is at top-dead-center (TDC), as illustrated in Figure 22.

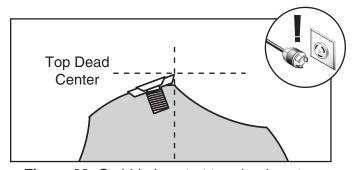
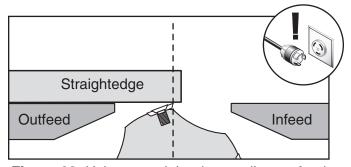


Figure 22. Carbide insert at top-dead-center.

**4.** Raise or lower the outfeed table until the carbide insert just touches the straightedge (**Figure 23**).



**Figure 23.** Using a straightedge to align outfeed table height with carbide insert at TDC.



#### **Dust Collection**

### **A**CAUTION

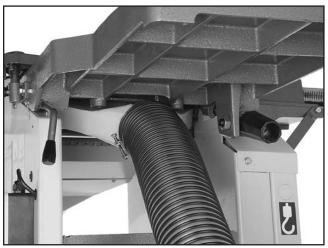
This machine creates a lot of wood chips/ dust during operation. Breathing airborne dust on a regular basis can result in permanent respiratory illness. Reduce your risk by wearing a respirator and capturing the dust with a dust-collection system.

#### Minimum CFM at Dust Port: 400 CFM

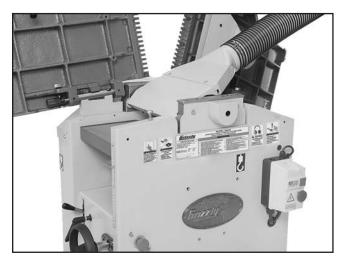
Do not confuse this CFM recommendation with the rating of the dust collector. To determine the CFM at the dust port, you must consider these variables: (1) CFM rating of the dust collector, (2) hose type and length between the dust collector and the machine, (3) number of branches or wyes, and (4) amount 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.

#### To connect a dust collection hose:

 Fit the 4" dust hose over the jointer dust port, (see Figure 24), or over the planer dust port (see Figure 25), depending upon operation mode, and secure in place with a hose clamp.



**Figure 24.** Example of dust hose attached to jointer dust port.



**Figure 25.** Example of dust hose attached to planer dust port.

2. Tug the hose to make sure it does not come off.

**Note:** A tight fit is necessary for proper performance.



#### **Test Run**

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

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.

The Test Run consists of verifying the following:

- 1) The motor powers up and runs correctly,
- 2) the OFF button works correctly, and
- 3) the Emergency Stop Button works correctly.

# **AWARNING**

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.

## **AWARNING**

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.

#### To test run machine:

- 1. Clear all setup tools away from machine.
- **2.** Press Emergency Stop button in.
- **3.** Make sure jointer tables are folded down and locked in place (see **Page 37**).
- **4.** Connect machine to power by inserting power cord plug into a matching receptacle.
- Twist Emergency Stop button clockwise until it springs out (see Figure 26). This resets the switch so the machine can start.



Figure 26. Resetting the switch.

- **6.** Press ON button to turn machine **ON**. Verify motor starts up and runs smoothly without any unusual problems or noises.
- **7.** Press Emergency Stop button to turn machine *OFF*.
- **8.** WITHOUT resetting Emergency Stop button, try to start machine by pressing the ON button. The machine should not start.
  - If the machine does not start, the safety feature of the Emergency Stop button is working correctly.
  - If the machine does start, immediately turn it OFF and disconnect power. The safety feature of the Emergency Stop button is NOT working properly and must be replaced before further using the machine.
- **9.** Press ON button, then immediately press the OFF button on the magnetic switch (see **Figure 1** on **Page 4**).
  - If the machine turns *OFF*, the OFF button is working correctly. The Test Run is complete.
  - If the machine does not stop, disconnect power to the machine. The OFF button is not working correctly. This feature must work properly and must be replaced before further using the machine.



# Recommended Adjustments

For your convenience, the adjustments listed below have been performed at the factory and no further setup is required to operate your machine.

However, because of the many variables involved with shipping and storage, some of these adjustments may need to be repeated to ensure optimum cutting results. Keep this in mind as you start to use your new jointer/planer.

Step-by-step instructions for these adjustments can be found in SECTION 7: SERVICE ADJUSTMENTS.

- 1. Jointer Table Parallelism (Page 51)
- 2. Depth Scale Calibration (Page 56)
- 3. Fence Stop Accuracy (Page 56)
- 4. Planer Table Parallelism (Page 54)
- 5. Feed Roller Spring Tension (Page 60)

# **Tighten V-Belts**

The final step in the setup process must be done after approximately 16 hours of operation. During this first 16 hours, the V-belts will stretch and seat into the pulley grooves. After this 16 hours, you must re-tension the V-belts to avoid slippage and burn out. Refer to **Page 48** when you are ready to perform this important adjustment.

**Note:** Pulleys and belts 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 premature belt failure is in progress.

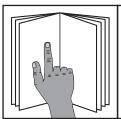


# **SECTION 4: OPERATIONS**

# **Operation Overview**

The purpose of this overview is to provide 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 the generic nature of this overview, it is **not** intended to be an instructional guide. To learn more about specific operations, read this entire manual, seek additional training from experienced machine operators, and do additional research outside of this manual by reading "how-to" books, trade magazines, or websites.



#### **AWARNING**

To reduce your risk of serious injury, read this entire manual BEFORE using machine.

#### WARNING

To reduce risk of eye injury from flying chips or lung damage from breathing dust, always wear safety glasses and a respirator when operating this machine.





#### NOTICE

If you are not experienced with this type of machine, WE STRONGLY RECOMMEND that you seek additional training outside of this manual. Read books/magazines or get formal training before beginning any projects. Regardless of the content in this section, Grizzly Industrial will not be held liable for accidents caused by lack of training.

#### **Typical Jointing Operation**

- 1. The operator examines workpiece to verify it is safe and suitable for jointing.
- **2.** Ensures jointer tables are secured in DOWN position, and jointer/planer selection lever is set for jointing operations.
- **3.** Adjusts fence for width of workpiece and locks it in place.
- 4. Adjusts fence tilt, if necessary.
- Adjusts infeed table height to set depth of cut per pass.
- **6.** Puts on safety glasses, respirator, and any other required protective equipment.
- 7. Starts jointer.
- 8. 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.
- Repeats cutting process described above until desired results are achieved.
- 10. Stops jointer.



#### **Typical Planing Operation**

- **1.** The operator examines workpiece to make sure it is safe and suitable for planing.
  - If workpiece is bowed, operator surface planes workpiece on jointer until one side is flat. Doing so ensures that it sits solidly on planer table during operation.
- **2.** Ensures machine is properly set up for planing operations.
- **3.** Puts on safety glasses or face shield, a respirator, and ear protection.
- 4. Places workpiece on table with flat side down and correctly adjusts table height for workpiece thickness and depth of cut.

Note: Any time you switch directions with the table height handwheel, there will be a small amount of backlash—so the first crank of the handwheel after switching directions will be slightly less than 1/16". However, as long as you move the handwheel in the same direction during operation, backlash will not be a factor.

- **5.** When all safety precautions have been taken, turns planer *ON*.
- **6.** Stands to one side of planer path to reduce risk of kickback injuries, then feeds workpiece into planer until infeed roller grabs it.

**Note:** Infeed and outfeed rollers control feed rate of workpiece as it passes through planer. Operator does not push or pull on workpiece.

- If cut is too deep and bogs down planer, operator immediately reduces depth of cut.
- 7. Once workpiece is clear of outfeed roller and stops moving, operator removes workpiece from outfeed table and measures workpiece thickness. If further planing is required, operator raises table slightly (approximately ½ to ½ turn of the handwheel), then feeds workpiece into front of planer again.
- Operator continues process until desired thickness is achieved, then turns machine OFF.

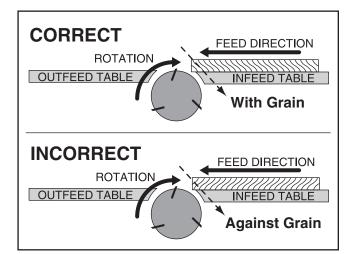


# Stock Inspection & Requirements

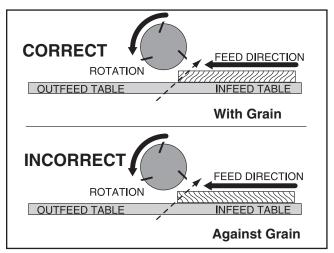
Basic rules to follow before milling stock on a jointer or thickness planer:

- Large/Loose Knots: Loose knots can become dislodged and kickback during operation, causing machine damage. Ensure workpieces that do not have large/loose knots.
- Excessive Warping: Workpieces with excessive cupping, bowing, or twisting are dangerous to cut because they are unstable and often unpredictable when being cut. DO NOT use workpieces with these characteristics!
- DO NOT joint or surface plane against the grain direction. Cutting against the grain increases the likelihood of stock 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 so the grain points down and toward you on the jointer (Figure 27) or away from you on the planer (Figure 28), as viewed from the edge.

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



**Figure 27.** Correct and incorrect grain alignment to cutterhead (jointer).



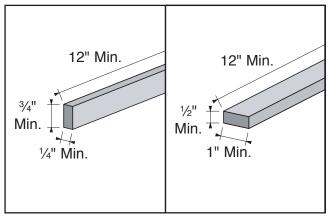
**Figure 28**. Correct and incorrect grain alignment to cutterhead (planer).

- Minor Cupping: Workpieces with slight cupping can be safely supported if the cupped side is facing the table. On the contrary, a workpiece supported on the bowed side will rock during operation and could cause severe injury from kickback.
- Remove foreign objects from the stock. Make sure that any stock you process with the jointer/planer is clean and free of any dirt, nails, staples, tiny rocks or any other foreign objects, which if they hit the knives and are drawn into the dust collector, may cause a fire hazard. The particles may also damage the knives. Wood stacked on a concrete floor can have small pieces of stone or concrete pressed into the surface.
- Only process natural wood fiber through your jointer/planer. Never joint or plane MDF, particle board, plywood, laminates or other synthetically made materials.
- Make sure all stock is sufficiently dried before jointing or planing. Wood with a moisture content over 20% will cause unnecessary wear on the knives and poor cutting results. Excess moisture can also hasten rust and corrosion.
- Scrape all glue off of boards before planing.
- Keep your work area clear.



#### Jointer-Specific Rules:

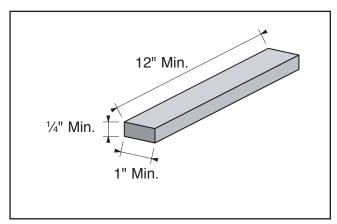
- Always joint with cupped side of workpiece facing down, otherwise workpiece could rock during cut, increasing likelihood of kickback.
- Make sure your workpiece exceeds the minimum dimension requirements (see Figures 29 & 30) before edge jointing or surface planing, or it may break or kick back during the operation!



**Figure 29.** Minimum dimensions for edge jointing and surface planing (jointer).

#### **Thickness Planer-Specific Rules:**

 Use the full width of the planer. Alternate between the left, the right, and the middle when feeding narrower lumber into the planer. Your knives will remain sharp much longer.



**Figure 30.** Minimum dimensions for surface planing (thickness planer).

### **Wood Types**

The species of wood, as well as its condition, greatly affects the depth of cut the jointer/planer can effectively take with each pass.

The chart in the figure below shows the Janka Hardness Rating for a number of commonly used species. The larger the number, the harder the workpiece, and the less material should be removed in any one pass for good results.

**Note:** The Janka Hardness Rating is expressed in pounds of force required to embed a 0.444" steel ball into the surface of the wood to a depth equal to half the ball's diameter.

Species	Janka Hardness
Ebony	3220
Red Mahogany	2697
Rosewood	1780
Red Pine	1630
Sugar Maple	1450
White Oak	1360
White Ash	1320
American Beech	1300
Red Oak	1290
Black Walnut	1010
Teak	1000
Black Cherry	950
Cedar	900
Sycamore	770
Douglas Fir	660
Chestnut	540
Hemlock	500
White Pine	420
Basswood	410
Eastern White Pine	380
Balsa	100

Figure 31. Janka Hardness Rating for some common wood species.



# Setting Jointer Depth of Cut

The depth of cut on a jointer is the amount of material removed from the bottom of the work-piece as it passes over the cutterhead.

The depth of cut is set by adjusting the height of the infeed table relative to the carbide inserts at TDC (top dead center).

The jointer depth-of-cut scale (see **Figure 32** on this page) goes up to  $^{3}/_{16}$ ", however the recommended depth of cut per pass is  $^{1}/_{16}$ "– $^{1}/_{8}$ " depending on the operation.

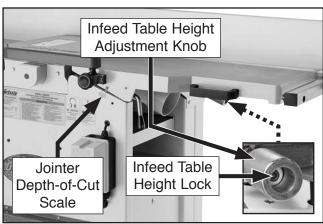
DO NOT exceed the recommended depth of cut per pass, or kickback and serious injury may occur.

#### Adjusting Infeed Table Height

Items Needed	Qty
Hex Wrench 6mm	

To adjust the infeed table height, use a 6mm hex wrench to loosen the infeed table height lock, rotate the infeed table height adjustment knob, then tighten the table height lock to secure the setting (see **Figure 32**).

- Rotate the infeed table height adjustment knob *clockwise* to *raise* the table.
- Rotate the knob counterclockwise to lower the table.



**Figure 32.** Location of jointer depth-of-cut scale and infeed table height adjustment controls.

#### Jointer Depth-of-Cut Scale

The depth of cut can be referenced directly from the depth scale located on the front of the jointer, as shown.

**Note:** The depth scale can be calibrated or "zeroed" if it is not correct. Refer to **Calibrating Depth Scale** for more information.

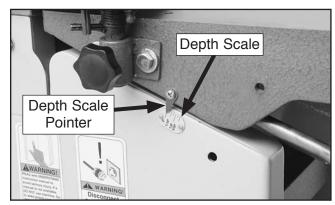


Figure 33. Location of jointer depth-of-cut scale.

# Squaring Stock For Jointing

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

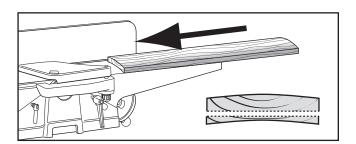
The purpose of squaring stock is to prepare it for accurate cuts and construction later on.

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.

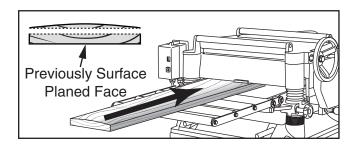
Items Needed	Qty
Jointer	
Planer	
Table Saw	1

# Squaring stock involves four steps performed in the order below:

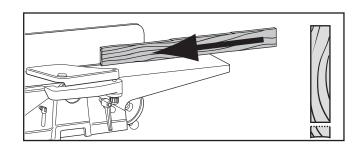
 Surface Plane on Jointer—Concave face of workpiece is surface planed flat with jointer.



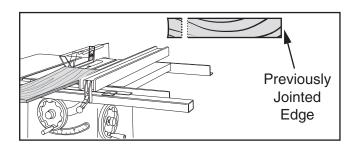
2. Surface Plane on a Thickness Planer— Opposite face of workpiece is surface planed flat with a thickness planer.



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



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



## Surface Planing On Jointer

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

## **AWARNING**

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!

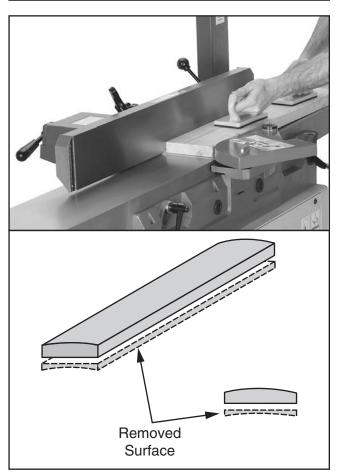


Figure 34. Example surface planing operation.

#### To surface plane on jointer:

- Inspect stock to ensure it is safe and suitable for the operation (see Stock Inspection & Requirements section).
- **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 ½16" per pass when surface planing.

- 3. Set fence to 90°.
- **4.** Start jointer.
- Place workpiece firmly against fence and infeed table.

**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.

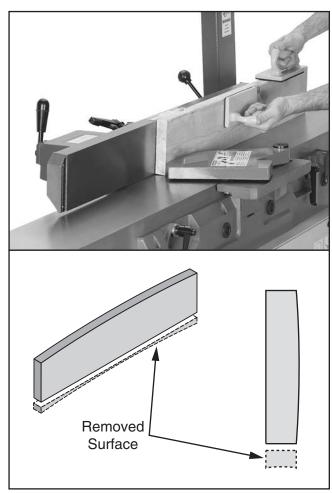
7. Repeat **Step 6** until entire surface is flat.

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



## **Edge Jointing**

Edge jointing (see example **Figures** below) 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.



**Figure 35.** Example photo of an edge jointing operation.

### **NOTICE**

If you are not experienced with a jointer, set depth of cut to 0", and practice feeding workpiece across tables as described. This will help you prepare for actual operations.

#### To edge joint on jointer:

- Inspect stock to ensure it is safe and suitable for the operation (see Stock Inspection & Requirements section).
- 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 ½" per pass.

- 3. Set fence to 90°.
- 4. Start jointer.
- Place workpiece firmly against fence and infeed table.

▲ 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.

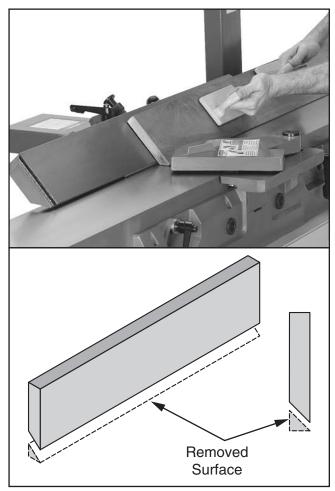
7. Repeat **Step 6** until the entire edge is flat.

**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.



## Bevel Cutting On Jointer

Bevel cuts (see example **Figures** below) 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.



**Figure 36.** Example photo of fence setup for a bevel cut of 45°.

### **NOTICE**

If you are not experienced with a jointer, set depth of cut to 0", and practice feeding workpiece across tables as described. This will help you prepare for actual operations.

#### To bevel cut on jointer:

- Inspect stock to ensure it is safe and suitable for the operation (see Stock Inspection & Requirements section).
- **2.** Set infeed table height to cutting depth desired for each pass.

▲ CAUTION: Cutting depth for bevel cuts is typically between ½ and ½, depending on hardness and width of stock.

- **3.** Set fence tilt to desired angle of cut.
- **4.** Place workpiece against fence and infeed table with concave side face down.
- **5.** Start jointer.
- 6. 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.

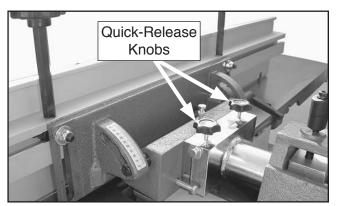


## Jointer/Planer Conversion

The Model G0634Z/G0634XP is ready for jointer operations after it is first setup. To use the machine as a planer, you must convert it from a jointer to a planer.

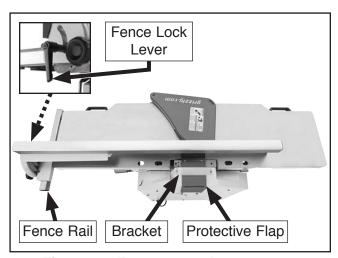
#### To convert the machine for planer operations:

- 1. DISCONNECT MACHINE FROM POWER!
- **2. G0634Z:** Loosen quick release knobs (see **Figure 37**) and slide fence off of machine.



**Figure 37**. Location of quick-release knobs (G0634Z).

**3. G0634ZXP:** Loosen fence lock lever, slide fence toward front of machine, carefully slide protective flap through bracket, and lift fence off of fence rail (see **Figure 38**).



**Figure 38**. Fence removal components (G0634XP).

- **4.** Remove dust hose from jointer dust port.
- 5. Rotate infeed table lock lever (Figure 39) clockwise, pull it out, and pivot table upward. The table will lock into place when raised to its highest position, as shown in Figure 40.

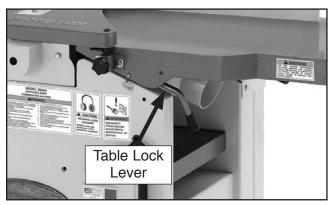


Figure 39. Example of infeed table lock lever.

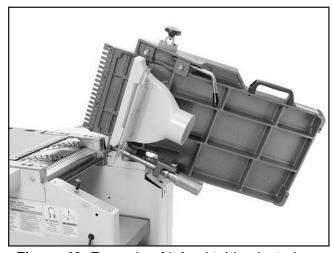
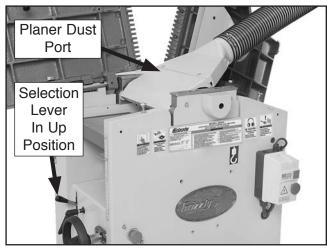


Figure 40. Example of infeed table pivoted up.

**6.** Raise outfeed table in same manner as you did with infeed table.



- 7. Swing planer dust port clockwise over cutterhead and connect dust collection hose, as shown in **Figure 41**.
- **8.** Move jointer/planer selection lever to up position (see **Figure 41**).



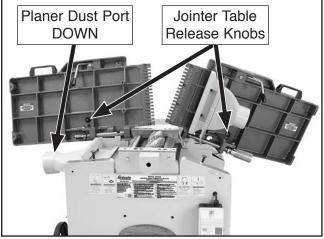
**Figure 41**. Example of machine converted to planer.

#### To convert the machine for jointer operations:

- 1. Lower planer table to below 4" mark on thickness scale.
- **2.** Reverse **Steps 2–8** in previous subsection, beginning on **Page 37**.

**Note:** Make sure to lower the planer dust port to the DOWN position, as shown in **Figure 42**.

**Note:** In order to lower jointer tables for jointer operations, you must pull the jointer table release knobs up to release tables (see **Figure 42**).



**Figure 42**. Example of planer dust port in DOWN position and location of jointer table release knobs.

### CAUTION

Serious personal injury could occur if you place your fingers between the tables and base or between pivot points. Your hands could be pinched or crushed!



## **Planing Tips**

- Inspect your lumber for twisting or cupping, and surface one face on a jointer if necessary before planing workpiece.
- Scrape off all glue when planing glued-up panels. Dried glue can quickly dull knives/ inserts.
- DO NOT plane more than one piece at a time.
   Never plane multiple pieces side by side.
- Never remove more than the recommended amount of material on each pass. Only remove a small amount of material on each pass when planing wide or dense stock.
- Support the workpiece on both ends. Get assistance from another person if you are planing long lumber, or use roller stands to support the workpiece.
- Measure the workpiece thickness with calipers to get exact results.
- Carefully inspect all stock to make sure it is free of large knots or foreign objects that may damage your knives/inserts, cause kickback, or be ejected from the planer.
- When possible, plane equal amounts on each side of the board to reduce the chance of twisting or cupping.
- Use the entire width of the planer to wear knives/inserts evenly. With narrow workpieces, alternate between far left, far right, and the middle of the table. Your knives/inserts will remain sharp much longer.
- To avoid "chip marks," always plane WITH the grain direction of the wood. Never plane cross-grain or end-grain.
- Plane ONLY natural wood fiber. Do not plane wood composites or other materials that could break up in the planer and cause operator injury or damage to planer.
- Always true cupped or warped stock on a jointer before planing.

## Common Planing Problems

Below is a list of wood characteristics you may encounter when planing. The following descriptions of defects will give you some possible answers to problems you may encounter while planing different materials. Possible solutions follow the descriptions.

#### **Chipped Grain**

**Problem:** Usually a result of cutting against the grain, planing lumber with knots or excessive amount of cross grain, or using dull knives/inserts.

**Note:** Some amount of chipping is normal with highly figured wood.

**Solution:** Decrease the depth of cut. Reduce the feed rate. Inspect your lumber and determine if its grain pattern is causing the problem. If the lumber does not show substantial crossgrain, inspect your knives/inserts.

#### Fuzzy Grain

**Problem:** Usually caused by surfacing lumber with too high of a moisture content. Sometimes fuzzy grain is an unavoidable characteristic of some woods, such as basswood. Fuzzy grain can also be caused by dull knives/inserts.

**Solution:** Check the lumber with a moisture meter. If moisture is greater than 20%, sticker the lumber and allow it to dry. Otherwise, inspect the knife/insert condition.

#### **Snipe**

**Problem:** Occurs when board ends have more material removed than the rest of the board. Usually caused when the workpiece is not properly supported as it goes through the machine. In many cases, however, a small amount of snipe is inevitable.

**Solution:** Hold workpiece up slightly as it leaves the outfeed end of the planer. The best way to deal with snipe is by planing lumber longer than your intended work length and then cutting off the excess after planing is completed.



#### Pitch & Glue Build-up

**Problem:** Glue and resin buildup on the rollers and cutterhead will cause overheating by decreasing cutting sharpness while increasing drag in the feed mechanism. The result can include scorched lumber, uneven knife/insert marks, and chatter.

Solution: Clean the rollers and cutterhead.

#### **Chip Marks or Indentations**

**Problem:** Chip indentation or chip bruising is the result of wood chips not being thrown away from the cutterhead and out of the machine. Instead they are carried around the cutterhead, deposited on the planed surface and crushed by the outfeed roller. Some of the causes of chip indentation are:

- Wood chips/sawdust not being properly expelled from the cutterhead.
- The type of lumber being planed. Certain species have a tendency to chip bruise.
- A high moisture content (over 20%) or surface moisture (refer to Workpiece Inspection).
- Dull knives/inserts.
- Excessive depth of cut.

#### Solution:

- Use a proper dust-collection system; adjust chip deflector in or out as necessary.
- Lumber must be completely dry, preferably kiln-dried (KD). Air-dried (AD) lumber must be seasoned properly and have no surface moisture. DO NOT surface partially-air-dried (PAD) lumber.
- Make sure planer knives/inserts are sharp.
- Reduce depth of cut.

## Setting Planer Depth of Cut

#### **Material Thickness Range**

Minimum—Maximum Stock Thickness .....1/4"-8"

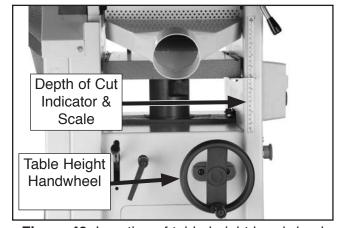
The depth of cut on a planer means the amount of material that is removed from the top of the workpiece as it passes underneath the cutterhead.

The depth of cut is set by adjusting the distance of the table below the cutterhead. This distance is the thickness of the workpiece minus the depth of cut. The planing depth of cut is controlled by using the table height handwheel on the right side of the machine. Rotating the handwheel clockwise raises the table.

Although the correct depth of cut varies according to wood hardness and workpiece width, we recommend the maximum depth of cut (per pass) be no more than ½6. A series of light cuts will give better end results and put less stress on the planer than trying to take off too much material in a single pass.

The depth of cut can be referenced directly from the inch/millimeter scale on the front of the planer, as shown.

**Note:** The scale functions as a general guide only, and is not intended for low-tolerance, precision results.



**Figure 43.** Location of table height handwheel and thickness scale.



## **SECTION 5: ACCESSORIES**

### WARNING

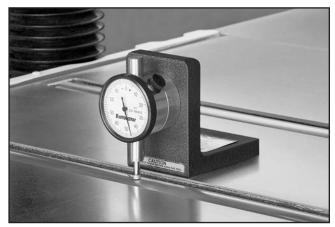
Installing unapproved accessories may cause machine to malfunction, resulting in serious personal injury or machine damage. To reduce this risk, only install accessories recommended for this machine by Grizzly.

### **NOTICE**

Refer to our website or latest catalog for additional recommended accessories.

#### W1218A—Rotacator™ Precision Planer Tool

The Rotacator is a dial indicator on a magnetic base, designed for quickly and accurately setting the critical tolerances needed when making planer adjustments. Perfect for adjusting infeed/outfeed rollers, pressure bars, chip breakers, and bed rollers. Accurate to 0.001". Indicator rotates 360° Also a great setup tool for other machines!



**Figure 44.** W1218A Rotacator™ Precision Planer Tool.

#### H9816—Power Twist® V-Belt - 3/8" x 60"

Smooth running with less vibration and noise than solid belts. The Power Twist® V-belts can be customized in minutes to any size—just add or remove sections to fit your needs. Requires two Power Twist® V-belts to replace the stock V-belts on your Model G0634Z/G0634XP.

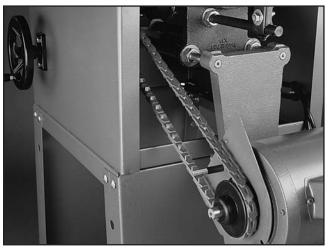


Figure 45. H9816 Power Twist® V-Belt.

G5562—SLIPIT® 1 Qt. Gel G5563—SLIPIT® 12 Oz. Spray G2871—Boeshield® T-9 12 Oz. Spray G2870—Boeshield® T-9 4 Oz. Spray H3788—G96® Gun Treatment 12 Oz. Spray H3789—G96® Gun Treatment 4.5 Oz. Spray



**Figure 46.** Recommended products for protecting unpainted cast iron/steel parts on machinery.

order online at www.grizzly.com or call 1-800-523-4777



#### G9256—6" Dial Caliper G9257—8" Dial Caliper G9258—12" Dial Caliper

Essential for planing, jointing, or sanding to critical tolerances. These traditional dial calipers are accurate to 0.001" and can measure outside surfaces, inside surfaces, and heights/depths. Features stainless steel, shock resistant construction and a dust proof display. An absolute treat for the perfectionist!

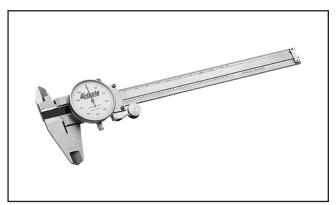


Figure 47. Grizzly Dial Caliper.

#### T24736—Carbide Inserts (10 Pack)

These indexable carbide inserts can be rotated to provide four factory sharp edges before replacement. Inserts measure 15 x 15 x 2.5mm.



Figure 48. T24736 Carbide Inserts.

T20501—Face Shield Crown Protector 4"
T20502—Face Shield Crown Protector 7"
T20503—Face Shield Window
T20452—"Kirova" Anti-Reflective S. Glasses
T20451—"Kirova" Clear Safety Glasses
T20456—"Dakura" Clear Safety Glasses



Figure 49. Eye protection assortment.

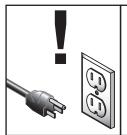
#### H4978—Deluxe Earmuffs - 27dB H4979—Twin Cup Hearing Protector - 29dB T20446—Ear Plugs 200 Pair - 31dB

Protect your hearing before its too late. Especially important if you or employees operate for hours at a time.



Figure 50. Hearing protection assortment.

## **SECTION 6: MAINTENANCE**



### **AWARNING**

To reduce risk of shock or accidental startup, always disconnect machine from power before adjustments, maintenance, or service.

### **Schedule**

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:

- Vacuum all dust on and around the machine.
- Wipe down tables and all other unpainted cast-iron with a metal protectant.
- Check for/repair worn or damaged wires.
- Check/resolve any other unsafe condition.
- · Check/tighten loose mounting hardware.
- Check/replace damaged cutterhead knives/ inserts.

#### Weekly

Clean cutterhead.

#### Monthly

- Check belt for proper tension, damage, or wear/replace belt.
- Clean/vacuum dust buildup from inside cabinet and off motor.
- Lubricate worm gear
- Lubricate roller chains
- Lubricate elevation lead screw
- · Lubricate worm shaft

## Cleaning & Protecting

Cleaning the Model G0634Z/G0634XP 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 unpainted cast-iron tables by wiping them clean after every use—this ensures moisture from wood dust does not remain on bare metal surfaces. Keep the tables rust-free with regular applications of products like G96® Gun Treatment, SLIPIT®, or Boeshield® T-9 (see **Page 41** for more details).

### Lubrication

### NOTICE

Failure to follow reasonable lubrication practices as instructed in this manual for your machine could lead to premature failure of components and void the warranty.

This machine features bearings that are lubricated and sealed at the factory. These bearings do not require any further attention unless they need to be replaced. If a bearing fails, your machine will probably develop a noticeable rumble or vibration, which will increase when the machine is under a load. The bearings are standard sizes and can be replaced through Grizzly.

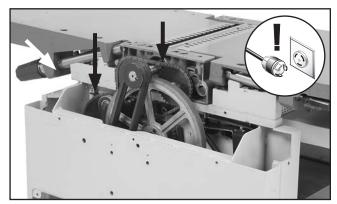
Follow the procedures in this section to properly lubricate the other components, essential for long life and trouble-free operation of your machine.



#### **Drive Chains & Sprockets**

Grease Type	NLGI#2 Equivalent
Frequency Every	/ 160 Hours of Operation

The infeed and outfeed rollers receive the transferred power from the cutterhead through the drive chain system, as shown in **Figure 51**. Remove the fence assembly and cutterhead pulley cover to access these parts. Use shop rags and mineral spirits to clean away any debris and grime, then brush on a light coat of multi-purpose grease to the chain and sprockets.



**Figure 51**. Location of drive chains and sprockets.

#### **Elevation Shaft Bushing**

Oil Type	SB1365 or ISO 6	88 Equivalent
Oil Amount		Thin Coat

The elevation shaft transfers motion from the planer table height handwheel to the leadscrew. The elevation shaft rotates in a bushing that must be well lubricated. Remove the leadscrew access panel to access these parts. Use a small amount of ISO 68 machine oil or spray lubricant to lubricate the bushing (see **Figure 52**).

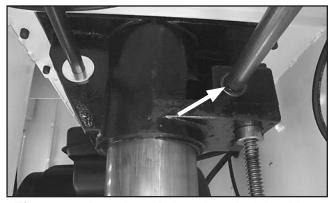
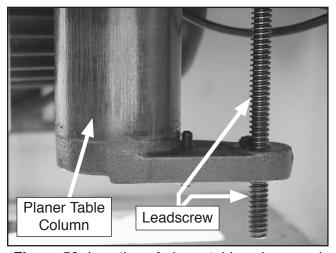


Figure 52. Location of elevation shaft bushing.

#### Column & Leadscrew

Oil Type	SB1365 or ISO 68 Equivalent
Oil Amount	Thin Coat
Grease Type	NLGI#2 Equivalent
Frequency	Every 40 Hours of Operation

The planer table rides on the column and is moved by the rotation of the leadscrew (see **Figure 53**). Remove the leadscrew access panel (see **Figure 54**) to access these parts. Clean and apply a thin coat of ISO 68 machine oil to the outside surface of the column and brush on a light application of multi-purpose grease to the leadscrew threads. Move the table up and down to distribute the lubricant.



**Figure 53**. Location of planer table column and leadscrew.

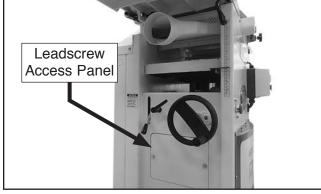


Figure 54. Location of leadscrew access panel.

#### **Fence**

Oil Type	SB1365 or	ISO 68 E	quivalent
Oil Amount		1	-2 Drops
Lubrication Fred	iuencv	As	Needed

Place one or two drops of ISO 68 machine oil on fence pivot points and other lubrication locations as needed (refer to **Figure 55** or **56** for your specific machine model number).

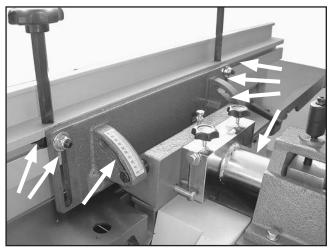


Figure 55. G0634Z fence lubrication locations.

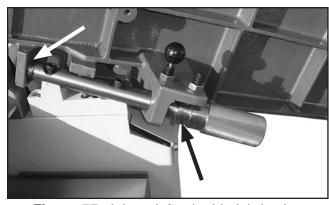


Figure 56. G0634XP fence lubrication locations.

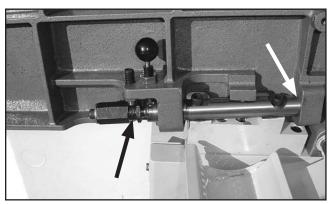
#### **Jointer Tables**

Oil Type	SB1365 or ISC	0 68 Equivalent
Oil Amount		1–2 Drops
Frequency		As Needed

The jointer infeed and outfeed table elevation knobs and pivot points require periodic lubrication. Raise and secure tables in up position and lubricate with ISO 68 machine oil as needed (see **Figures 57–58**). Wipe off excess oil and sawdust with a cloth.



**Figure 57**. Jointer infeed table lubrication locations.



**Figure 58**. Jointer outfeed table lubrication locations.

## **SECTION 7: SERVICE**

Review the troubleshooting procedures in this section if a problem develops with your machine. If you need replacement parts or additional help with a procedure, call our Technical Support. **Note:** *Please gather the serial number and manufacture date of your machine before calling.* 

## **Troubleshooting**

#### **Motor & Electrical**

Symptom	Possible Cause	Possible Solution
Motor will not start or fuses or circuit breakers	<ol> <li>Emergency off button depressed.</li> <li>Short circuit in line cord or plug.</li> </ol>	<ol> <li>Rotate clockwise until it pops out/replace.</li> <li>Repair or replace cord or plug for damaged insulation and shorted wires.</li> </ol>
blow.	<ul><li>3. Start capacitor is at fault.</li><li>4. Thermal protection circuit breaker amperage is set too low or motor is at fault.</li></ul>	<ol> <li>Replace start capacitor.</li> <li>Unplug machine, open magnetic switch cover, turn amperage dial on Thermal Protection Circuit Breaker to a higher amperage setting. If dial cannot be set any higher, replace motor.</li> </ol>
	5. Open circuit in motor or loose connections.	<ol><li>Inspect all lead connections on motor for loose or open connections.</li></ol>
Motor fails to develop full power or motor decreases rapidly with load, overheats, or stalls.	<ol> <li>Motor run capacitor at fault.</li> <li>Motor overloaded during operation.</li> <li>Air circulation through the motor restricted.</li> <li>Motor overloaded during operation.</li> <li>Thermal protection circuit breaker amperage is set too low or motor is at fault.</li> <li>Short circuit in motor or loose connections.</li> <li>Circuit breaker tripped.</li> </ol>	<ol> <li>Replace run capacitor.</li> <li>Reduce cutting load; take lighter cuts.</li> <li>Clean out motor to provide normal air circulation.</li> <li>Reduce cutting load; take lighter cuts.</li> <li>Unplug machine, open magnetic switch cover, turn amperage dial on Thermal Protection Circuit Breaker to a higher amperage setting. If dial cannot be set any higher, replace motor.</li> <li>Repair or replace connections on motor for loose or shorted terminals or worn insulation.</li> <li>Install correct circuit breaker; reduce number of machines running on that circuit.</li> </ol>
Cutterhead slows or squeals when cutting, especially on start-up.	V-belt loose.     V-belt worn out.	<ol> <li>Tension V-belt (Page 48).</li> <li>Replace V-belt (Page 48).</li> </ol>
Loud repetitious noise coming from machine.	<ol> <li>Pulley set screws or keys are missing or loose.</li> <li>V-belts are damaged.</li> <li>Motor fan is hitting the cover.</li> </ol>	<ol> <li>Inspect keys and set screws. Replace or tighten if necessary.</li> <li>Replace V-belts (Page 48).</li> <li>Adjust fan cover mounting position, tighten fan, or shim fan cover.</li> </ol>

### Table (Jointer)

Symptom	Possible Cause	Possible Solution
Tables are hard to adjust.	Table gibs are too tight.	Adjust table gibs (Page 59).
Tables do not lock.	Table lock levers too high or too low.	Adjust lock nuts and bolts.

### **Cutting (Jointer and Planer)**

Symptom	Possible Cause	Possible Solution
Excessive snipe (gouge in the end of the board that is uneven with the rest of the cut).	<ol> <li>Outfeed table is set too low.</li> <li>Operator pushing down on trailing end of workpiece.</li> <li>Workpiece is not supported as it leaves the planer.</li> </ol>	<ol> <li>Align outfeed table with inserts at top dead center (Page 24).</li> <li>Reduce/eliminate downward pressure on trailing end of workpiece.</li> <li>Support the workpiece as it leaves the outfeed end of the planer.</li> </ol>
Workpiece stops/slows in the middle of the cut.	<ol> <li>Taking too heavy of a cut.</li> <li>Table not parallel with head casting.</li> <li>Pitch and glue build up on planer components.</li> </ol>	<ol> <li>Take a lighter cut.</li> <li>Adjust the table so it is parallel to the head casting (Page 54).</li> <li>Clean the internal cutterhead components with a pitch/resin dissolving solvent.</li> </ol>
Chipping (consistent pattern).	<ol> <li>Knots or conflicting grain direction in wood.</li> <li>Nicked or chipped carbide insert.</li> <li>Taking too deep of a cut.</li> </ol>	<ol> <li>Inspect workpiece for knots and grain direction; only use clean stock.</li> <li>Rotate/replace affected insert (Page 55).</li> <li>Take a smaller depth of cut. (Always reduce cutting depth when surface planing or working with hardwoods.)</li> </ol>
Fuzzy grain.	Wood may have high moisture content or surface wetness.     Dull inserts.	<ol> <li>Check moisture content and allow to dry if moisture is too high.</li> <li>Rotate/replace inserts (Page 55).</li> </ol>
Long lines or ridges that run along the length of the board.	Nicked or chipped inserts(s).	Rotate/replace inserts (Page 55).
Uneven insert marks, wavy surface, or chatter marks across the face of the board.	<ol> <li>Carbide inserts not installed evenly.</li> <li>Worn cutterhead bearings.</li> </ol>	<ol> <li>Make sure carbide inserts do not have debris under them; make sure inserts are torqued down evenly (Page 55).</li> <li>Replace cutterhead bearings.</li> </ol>
Glossy surface. (Planer)	Carbide inserts are dull.     Cutting depth too shallow.	<ol> <li>Rotate/replace inserts (Page 55).</li> <li>Increase the depth of cut.</li> </ol>
Chip Marks (inconsistent pattern). (Planer)	Chips aren't being properly expelled from the cutterhead.	Use a dust-collection system
Board edge is concave or convex after jointing. (Jointer)	<ol> <li>Board not held with even pressure on infeed and outfeed table during cut.</li> <li>Board started too uneven.</li> <li>Board has excessive bow or twist along its length.</li> <li>Insufficient number of passes.</li> </ol>	<ol> <li>Hold board with even pressure as it moves over the cutterhead.</li> <li>Take partial cuts to remove the extreme high spots before doing a full pass.</li> <li>Surface plane one face so there is a good surface to position against the fence.</li> <li>It may take 3 to 5 passes to achieve a perfect edge, depending on condition of board and depth of cut.</li> </ol>





### **AWARNING**

To reduce risk of shock or accidental startup, always disconnect machine from power before adjustments, maintenance, or service.

## Tensioning/ Replacing V-Belts

Two V-belts transfer power from the motor to the cutterhead. To ensure efficient transfer of power to this system, make sure the V-belts are always properly tensioned and in good condition.

**Note**: After the first 16 hours of belt life, re-tension the belts, as they will stretch and seat during this time.

If the V-belts are worn, cracked, or damaged, replace them. Always replace the V-belts with a matched set of two, or belt tension may not be equal among the belts, causing premature belt failure.

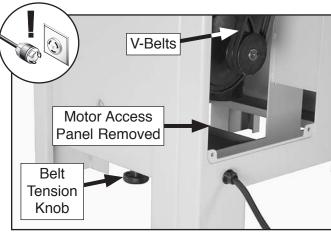
Consider replacing stock belts with Power Twist V-belts (see **Page 41**) to reduce vibration and noise, and increase belt lifespan.

Items Needed	Qty
Wrench or Socket 10, 12, 14mm1	Ea.
2 x 4 (Length as Needed)	1

#### **Tensioning V-Belts**

- DISCONNECT MACHINE FROM POWER!
- Remove motor access panel on back of machine (see Figure 59).

**Note:** A collection of black belt dust inside the motor compartment is normal during the life of the belts.



**Figure 59**. Location of V-belts and belt tension knob.

3. Press each belt with moderate pressure in center to check belt tension. Belt is correctly tensioned when there is approximately 1/4"-1/2" deflection when pushed, as shown in Figure 60.

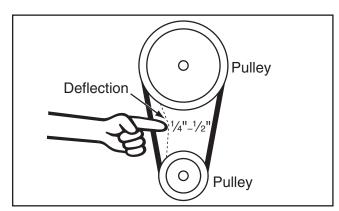


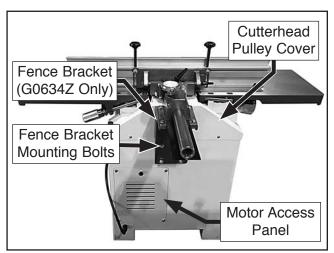
Figure 60. Checking V-belt tension.

- 4. Use belt tension knob (see **Figure 59**) to adjust V-belt tension until there is approximately ½"-½" deflection when V-belts are pushed with moderate pressure, as shown in **Figure 60**.
- 5. Reinstall motor access panel.

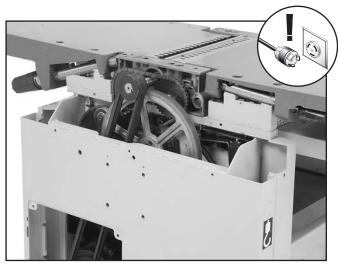


#### **Replacing V-Belts**

- 1. DISCONNECT MACHINE FROM POWER!
- G0634Z only: Remove four bolts that secure fence bracket to machine body, then remove fence and fence bracket assembly (see Figure 61).
- 3. Remove cutterhead pulley cover and motor access panel (see Figures 61–62).



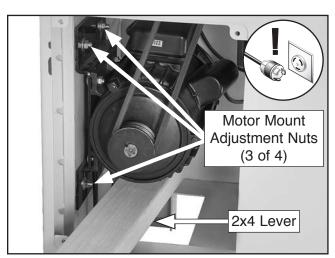
**Figure 61**. Location of fence bracket, cutterhead pulley cover, and motor access panel (G0634Z shown).



**Figure 62**. Fence, fence bracket, cutterhead pulley cover, and motor access panel removed (G0634Z shown).

**4.** Remove belt tension knob (see **Figure 59**).

5. Loosen four motor mount adjustment nuts and raise motor (see **Figure 63**) to completely remove V-belt tension. It may help to use a 2x4 as a lever to lift motor.



**Figure 63**. Removing V-belt tension for belt removal/replacement.

- **6.** Remove both belts and replace them with a new matched set.
- **7.** Lower motor, retighten motor mount adjustment nuts.
- **8.** Rotate pulleys by hand to ensure V-belts are properly seated in pulleys.
- Reinstall cutterhead pulley cover and belt tension knob from Steps 3–4 on Page 48.
- **10. G0634Z only:** Reinstall fence and fence bracket assembly from **Step 2** on **Page 48**.
- **11.** Properly tension V-belts according to **Tensioning V-Belts** on **Page 48**.
- **12.** Reinstall motor access panel from **Step 3** on **Page 48**.

**Note**: After the first 16 hours of belt life, retension the belts, as they will stretch and seat during this time.



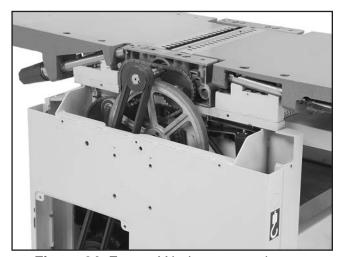
## Adjusting Pulley Alignment

Items Needed:	Qty
Wrench 10mm, 12mm	1 Ea
Straightedge	1
Hex Wrench 3mm	1
C-Clamps	2

Proper motor and cutterhead pulley alignment prevents premature belt wear. The pulleys are properly aligned when they are parallel and in the same plane as each other.

#### To align the pulleys:

- 1. DISCONNECT MACHINE FROM POWER!
- 2. Remove the fence, fence bracket assembly (G0634Z only), cutterhead pulley cover, and motor access panel (see **Figure 64**).



**Figure 64**. Fence, V-belt cover, and motor access panel removed.

3. Place identical 2" C-clamps on each pulley with adjustment shafts facing out. Place a straightedge on the clamps, as shown in **Figure 65**, and visually check pulley alignment.

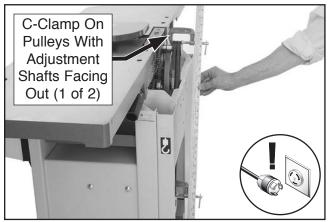


Figure 65. Checking belt alignment.

- If the pulleys are aligned, then no adjustments are necessary.
- If the pulleys are NOT aligned, perform
   Steps 3 & 4.
- 4. Remove the V-belts (see Page 48).
- 5. Loosen the set screws on the end of the cutterhead pulley, align the cutterhead pulley with the motor pulley (see Figure 66), then retighten the set screws.
- **6.** Repeat **Step 2** and, if necessary, repeat **Step 4** until pulleys are aligned.
- 7. Reinstall all components removed during Step 1.

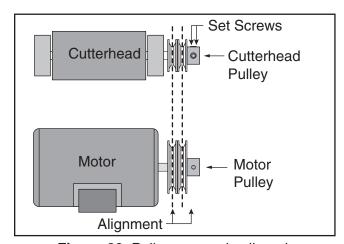


Figure 66. Pulleys properly aligned.



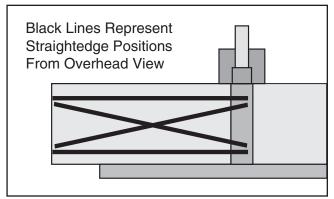
## Checking/Adjusting Jointer Table Parallelism

The outfeed table is preset by the factory parallel with the cutterhead. However, it is critical to check this setting. If the tables are not parallel with the cutterhead or each other, then poor cutting results and kickback can occur.

Items Needed	Qty
Straightedge	1
Adjustable Wrench	
Heavy Leather Gloves (Pair)	1
Feeler Gauge Set	1

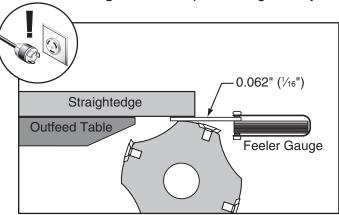
#### **Checking Outfeed Table Parallelism**

- DISCONNECT MACHINE FROM POWER!
- **2.** Put on heavy leather gloves, then remove the cutterhead guard and fence.
- Place the straightedge on the outfeed table so it hangs over the cutterhead in one of the positions shown in Figure 67.



**Figure 67.** Straightedge positions for verifying if outfeed table is parallel with cutterhead.

- **4.** Try to fit a feeler gauge or combination of feeler gauges 0.062" to 0.069" between the bottom of the ruler and the cutterhead body as shown in **Figure 68**.
  - If the feeler gauge slides with slight resistance between the ruler and cutterhead and no gaps appear, go to Step 5.
  - If the feeler gauge does not slide with slight resistance between the ruler and cutterhead, or if gaps appear, go to Correcting Outfeed Table Parallelism on Page 52 before proceeding to Step 5.



**Figure 68.** Using feeler gauge to check outfeed table cutterhead height.

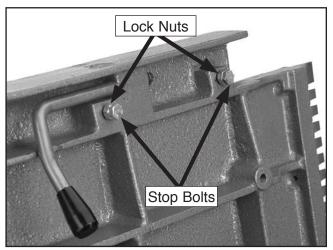
- **5.** Continue placing the straightedge in the remaining positions shown in **Figure 67**. In each position, the feeler gauge measurement should be nearly identical.
  - If the outfeed table height above the cutterhead is equal across the table in each position, then the outfeed table is already parallel with the cutterhead. Go to Checking Infeed Table Parallelism, on Page 52.
  - If the outfeed table height is not equal across the table in any of the positions, then the outfeed table is not parallel with the cutterhead. Correct the outfeed table parallelism, then correct the infeed table parallelism.

#### **Correcting Outfeed Table Parallelism**

This procedure involves turning the table stop bolts to raise or lower the front of the tables until they are parallel with the cutterhead.

#### To correct outfeed table parallelism:

1. Loosen the lock nuts on both stop bolts shown in **Figure 69** at the front of the table.



**Figure 69**. Location of outfeed table stop bolts and lock nuts.

- 2. Raise the stop bolts just enough so the front edge of the table is higher than the cutterhead, then adjust each stop bolt 1/6-turn clockwise to gradually lower the table.
- 3. Check the outfeed table height again (see Steps 3-5 on Page 51).
- **4.** Continue lowering the bolts and checking until the outfeed table height above the cutterhead is equal across the table.

#### **Checking Infeed Table Parallelism**

- Follow all the steps for checking the outfeed table parallelism to first make sure that the outfeed table is parallel with the cutterhead.
- 2. Place the straightedge halfway across the infeed table and halfway over the outfeed table, and adjust the infeed table even with the outfeed table, as shown in **Figure 70**.

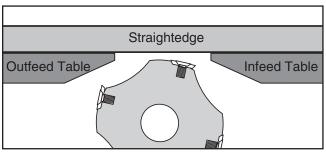
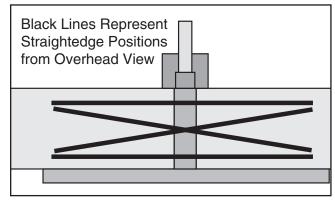


Figure 70. Infeed and outfeed tables set parallel.

- If an insert touches the straightedge, turn the cutterhead so the inserts do not interfere.
- If the cutterhead touches the straightedge, raise the outfeed table higher than the cutterhead.
- Place the straightedge in the positions shown in Figure 71. In each position, the straightedge should sit flat against both the outfeed table and the infeed table.



**Figure 71.** Straightedge positions for checking infeed/outfeed table parallelism.

- If the straightedge sits flat against both the infeed and outfeed table, then the tables are parallel. Set the outfeed table height and replace the cutterhead guard (Page 24).
- If the straightedge does not sit flat against both the infeed and outfeed table in any of the positions, then follow the **Adjusting Table Parallelism** instructions.



#### **Adjusting Infeed Table Parallelism**

For safe and proper cutting results, both jointer tables must be parallel to the cutterhead. The correct order for adjusting table parallelism is to first adjust the outfeed table parallel with the cutterhead, then adjust the infeed table parallel with the outfeed table.

#### To adjust infeed table parallelism:

- Check the outfeed table parallelism (see Page 51), and make any necessary adjustments so the cutterhead and outfeed table are parallel.
- 2. Place the straightedge halfway across the infeed table and halfway over the outfeed table, and adjust the infeed table even with the outfeed table, as shown in **Figure 72**.

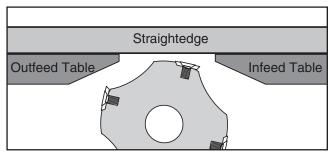
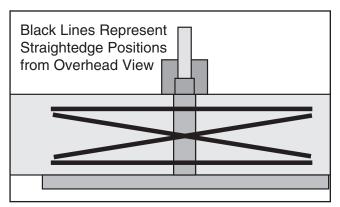


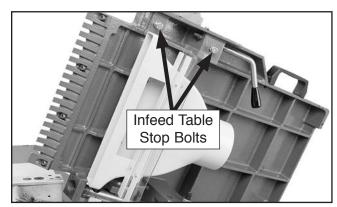
Figure 72. Straightedge placed on jointer tables.

**3.** Place the straightedge in one of the positions shown in **Figure 73**.



**Figure 73.** Straightedge positions for checking jointer table parallelism.

- —If the front of the infeed table is higher or lower than the outfeed table, adjust the infeed table stop bolts (see Figure 74).
- —If the rear of the infeed table is higher or lower than the outfeed table, shim the infeed table to adjust it parallel with the outfeed table. Follow Steps 4-6.



**Figure 74**. Location of infeed table stop bolts for adjusting infeed table parallelism.

4. Loosen the cap screws shown in **Figure 75**.

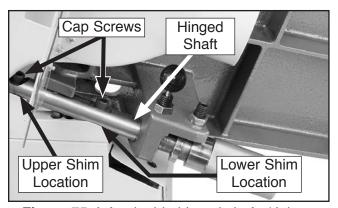


Figure 75. Infeed table hinged shaft. (Jointer table raised for clarity.)

- 5. While an assistant raises the infeed table, slip shims between the hinged shaft and the jointer base, then retighten the cap screw. Shimming the top position will raise the rear cutterhead side of the table, shimming the lower position will raise the rear infeed side.
- 6. Repeat Step 3 with each of the remaining straightedge positions and adjust the table front to back using the shims as many times as necessary until the infeed table is parallel with the outfeed table.
- Reinstall the cutterhead guard.

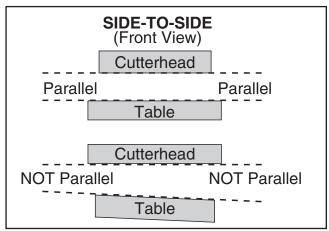


## Checking/Adjusting Planer Table Parallelism

Table parallelism is critical to the operation of the planer. As such, it is essential that the planer table is parallel with the cutterhead (within 0.002") from side-to-side, as illustrated in **Figure 76.** 

#### **Maximum Allowable Tolerances:**

Cutterhead/Table Side-to-Side	0.002"
Head Casting/Table Front/Back	0.020"



**Figure 76.** Side-to-side parallelism of table and cutterhead.

How the planer table sits in relation to the head casting from front-to-back is also important (see **Figure 77**). The tolerances on the front-to-back positioning are not as critical as the cutterhead/table side-to-side positioning. Therefore, the maximum allowable tolerance for the front-to-back parallelism is not more than 0.020".

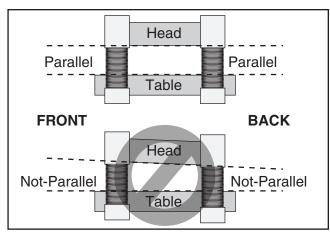


Figure 77. Front-to-back parallelism.

#### **Table Parallelism Inspection**

The easiest way to check that your planer table is parallel with the headstock is to plane a workpiece and then measure its thickness in multiple locations. Extra care must be taken to ensure accuracy. If the workpiece is tapered from left-to-right or from front-to-back, then parallelism may be a problem. If the table is not within the maximum allowable tolerances, it must be adjusted.

#### **Table Parallelism Adjustments**

Items Needed:	Qty
Rotacator	1
Wrench 12mm	1
Hex Wrench 4, 8mm	1 Ea.

#### To adjust the table parallelism:

- DISCONNECT MACHINE FROM POWER!
- 2. Raise planer table as far as possible.
- **3.** Loosen (4) cap screws on cylinder liner, as shown in **Figure 78**.

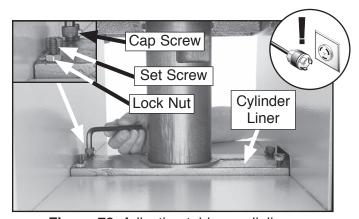


Figure 78. Adjusting table parallelism.

- If table is not parallel to cutterhead sideto-side (Figure 76), loosen (2) lock nuts on right or left side of cylinder liner. Adjust set screws to raise or lower table so it is parallel to cutterhead.
- If table is not parallel to cutterhead frontto-back (Figure 77), loosen (2) lock nuts at front or back of cylinder liner. Adjust set screws to raise or lower front or back of table so it is parallel to cutterhead.
- 4. Tighten (4) cap screws on cylinder liner.



## Replacing Carbide Inserts

The cutterhead is equipped with 56 indexable carbide inserts. Each insert can be rotated to reveal any one of its four cutting edges. Therefore, if one cutting edge becomes dull or damaged, simply rotate it 90° to reveal a fresh cutting edge (**Figure 79**).

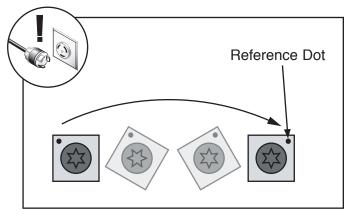


Figure 79. Insert rotating sequence.

In addition, each insert has a reference dot on one corner. As the insert is rotated, the reference dot location can be used as an indicator of which edges are used and which are new. When the reference dot revolves back around to its starting position, the insert should be replaced.

#### To rotate or change a carbide insert:

- DISCONNECT MACHINE FROM POWER!
- **2.** Remove any sawdust from the head of the carbide insert Torx screw.
- 3. Remove the Torx screw and carbide insert.
- **4.** Clean all dust and dirt off the insert and the cutterhead pocket from which the insert was removed, and replace the insert so a fresh, sharp edge is facing outward.

**Note:** Proper cleaning is critical to achieving a smooth finish. Dirt or dust trapped between the insert and cutterhead will slightly raise the insert, and make noticeable marks on your workpieces the next time you plane.

 Lubricate the Torx screw threads with a light machine oil, wipe the excess oil off the threads, and torque the Torx screw to 48-50 inch/pounds.

**Note:** Excess oil may squeeze between the insert and cutterhead, thereby lifting the insert slightly and affecting workpiece finishes.



## Calibrating Depth Scale

The depth scale on the infeed table can be calibrated or "zeroed" if it is not correct.

Items Needed	Qty
Straightedge	1
Phillips Screwdriver	1

#### To calibrate the depth scale:

- 1. DISCONNECT MACHINE FROM POWER!
- Set the outfeed table height as described in Setting Outfeed Table Height on Page 24.
- Use the straightedge to help adjust the infeed table exactly even with the outfeed table, as shown in Figure 80.

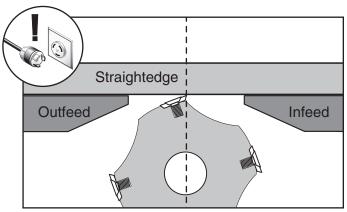


Figure 80. Infeed table even with outfeed table.

**4.** Using a screwdriver, adjust the scale pointer to zero (see **Figure 81**).

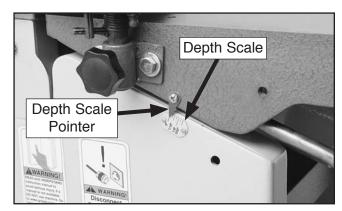


Figure 81. Depth scale adjusted to "0" position.

## Setting Fence Stops (G0634Z)

The fence stops simplify the task of adjusting the fence to 45° and 90°.

Items Needed	Qty
45° Square	1
90° Square	1
Sliding Bevel	1
Wrench 10mm	1

#### To set the 90° fence stop:

 Loosen the lock nut on the 90° fence stop bolt shown in Figure 82, and loosen the fence tilt lock.

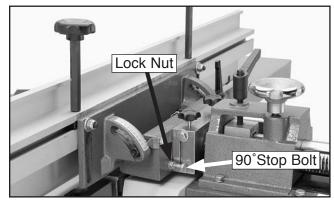


Figure 82. Adjusting fence to 90°.

- 2. Place a 90° square against the table and fence, and adjust the stop bolt, so the fence is set exactly at 90°.
- **3.** Tighten the lock nut.
- **4.** Adjust the indicator (if necessary) to 0° to calibrate the fence tilt scale.



#### To set the 45° fence stop:

- 1. Loosen the fence tilt lock, and position the fence against the 45° stop bolt.
- 2. Loosen the lock nut on the 45° fence stop bolt (**Figure 83**).

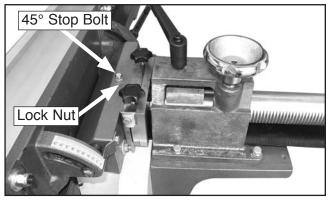


Figure 83. Adjusting fence 45° outward.

- **3.** Adjust the 45° stop bolt until the fence is exactly 45° outward while resting on the bolt (check the angle with a sliding bevel set to 135° or with a 45° square.
- 4. Retighten the lock nut loosened in Step 2.

## Setting Fence Stops (G0634XP)

The fence stops simplify the task of adjusting the fence to 45° and 90°.

Items Needed	Qty
45° Square	1
90° Square	1
Sliding Bevel	1
Wrench 10mm	1
Wrench 12mm	1
Hex Wrench 3mm	1
Hex Wrench 4mm	1

#### To set the 90° fence stop:

 Loosen the lock nut on the 90° fence stop screw shown in Figure 84, and loosen the fence tilt knob.

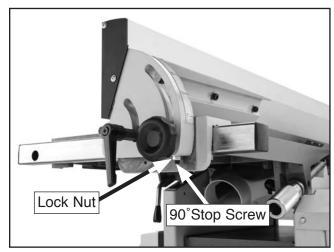


Figure 84. Adjusting fence to 90°.

- **2.** Place a 90° square against the table and fence, and adjust the stop screw so the fence is set exactly at 90°.
- **3.** Tighten the lock nut.



#### To set the 45° fence stop:

- 1. Loosen the fence tilt knob and position the fence against the 45° stop bolt.
- 2. Loosen the lock nut on the 45° fence stop screw (see **Figure 85**).

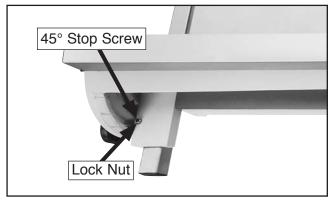


Figure 85. Adjusting fence 45° outward.

- **3.** Adjust the 45° stop screw until the fence is exactly 45° outward while resting on the bolt (check the angle with a sliding bevel set to 135° or with a 45° square).
- 4. Re-tighten the lock nut loosened in **Step 2**.

## Adjusting Table Lock Levers

The table lock levers can be adjusted if they do not lock.

Items Needed	Qty
Wrench 14 mm	1

#### To adjust the table lock levers:

- DISCONNECT MACHINE FROM POWER!
- 2. Remove the cutterhead guard.
- Raise the table on the side of the lock lever that does not lock.
- **4.** Loosen the lock nut on the special bolt under the table, as shown in **Figure 86**.

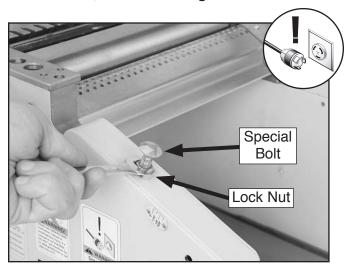


Figure 86. Table lock lever bolt.

- 5. Adjust the bolt height a few turns, lower the table, and try engaging the lock lever.
- **6.** Repeat **Steps 3-5** until the lever engages, then secure the lock nut.



## **Adjusting Gibs**

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

<b>Tools Needed</b>	Qty
Adjustable Wrench	
Hex Wrench 8mm	

#### To adjust the table gibs:

 Using an adjustable wrench, loosen the infeed table gib nut under the rear of the table (Figure 87).

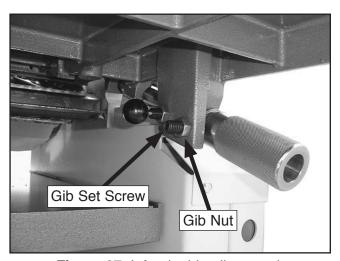


Figure 87. Infeed table gib control.

2. Using an 8mm hex wrench, tighten the gib set screw a small amount, then check the table by moving it up and down. Adjust the set screw as needed until the friction of the table movement is balanced between minimal play and ease of movement, then secure the gib nut.

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

3. Repeat **Steps 1-2** with the outfeed table gib control (**Figure 88**).

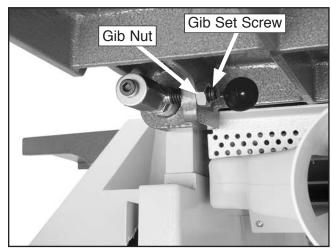


Figure 88. Outfeed table gib control.

4. Set the outfeed table height as described in Setting Outfeed Table Height on Page 24.



## Adjusting Roller Spring Tension

Roller spring tension must be adjusted so that feed roller pressure is uniform. Roller spring tension will vary, depending on the type of wood you plane.

Less spring tension is generally more forgiving on workpieces. Therefore, if you plane milled lumber with consistent surface heights, less spring tension is required. Likewise, if you plane rough lumber with inconsistent surface heights, more spring tension is required to keep the workpiece feeding through the planer without stopping.

Items Needed:		
Hex Wrench 6mm	1	

#### To adjust feed roller spring tension:

- 1. DISCONNECT MACHINE FROM POWER!
- Adjust tension screws shown in Figure 89 counterclockwise so that they are five to seven turns below top of head casting.
  - If workpiece slips when you feed it, turn screws ½ to 1 turn counterclockwise to increase spring tension.
  - If workpiece is abruptly grabbed when initially fed into planer, turn screws ½ to 1 turn clockwise to decrease spring tension.

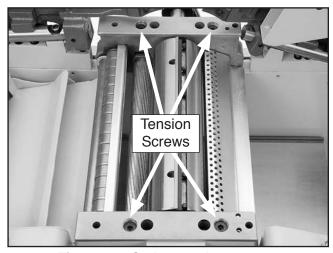


Figure 89. Spring tension screws.

## Anti-Kickback Fingers

The anti-kickback fingers are an important safety feature of your planer. The fingers hang from a rod suspended across the head casting and in front of the infeed roller, as shown. This design allows the workpiece to easily enter the planer but reduces the risk of kickback by digging into the workpiece if it moves backward.

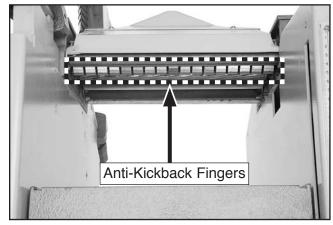


Figure 90. Location of anti-kickback fingers.

Check the anti-kickback fingers regularly to ensure they swing freely and easily. If the fingers do not swing freely and easily, first clean them with a wood-resin solvent, then inspect them for damage. If any of the fingers are damaged, the device must be replaced before using the machine.

Do not apply oil or other lubricants to the anti-kick-back fingers that will attract dust and restrict free movement of the fingers.

### **▲**WARNING

Proper operation of anti-kickback fingers is critical for safe operation of this planer. DO NOT operate planer if anti-kickback fingers are not operating correctly. Failure to heed this warning could result in serious personal injury.



## **SECTION 8: WIRING**

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 (570) 546-9663 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 Wiring Safety Instructions

**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!

**MODIFICATIONS.** Modifying the wiring beyond what is shown in the diagram may lead to unpredictable results, including serious injury or fire. This includes the installation of unapproved aftermarket parts.

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.

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

**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.

**MOTOR WIRING.** The motor wiring shown in these diagrams is current at the time of printing but may not match your machine. If you find this to be the case, 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.

**EXPERIENCING DIFFICULTIES.** If you are experiencing difficulties understanding the information included in this section, contact our Technical Support at (570) 546-9663.

#### **NOTICE COLOR KEY** BLACK I **BLUE** YELLOW LIGHT The photos and diagrams included in this section are YELLOW WHITE = **BROWN** BLUE **GREEN** best viewed in color. You GREEN GRAY **PURPLE** can view these pages in TUR-QUOISE color at www.grizzly.com. RED **ORANGE PINK**



## **Electrical Components**



Figure 91. Magnetic switch.

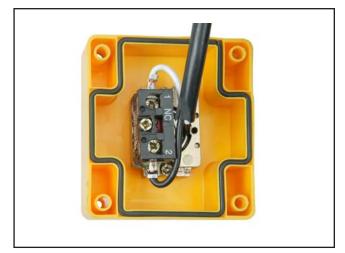


Figure 92. Emergency Stop switch.



Figure 93. Start capacitor.



Figure 94. Run capacitor.

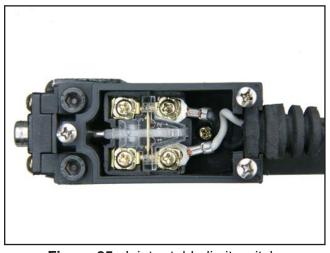
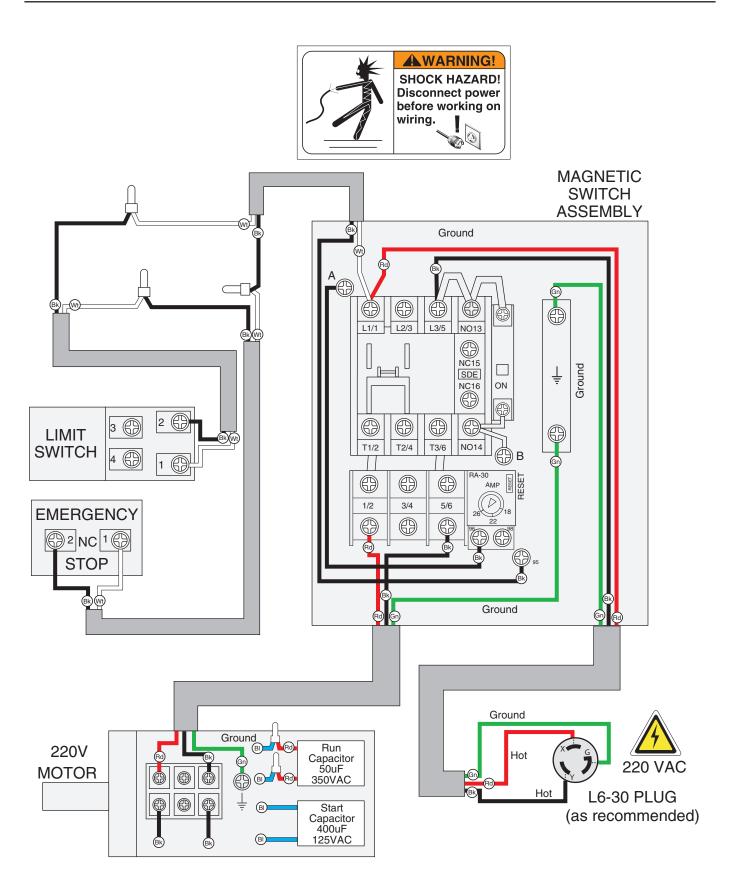


Figure 95. Jointer table limit switch.

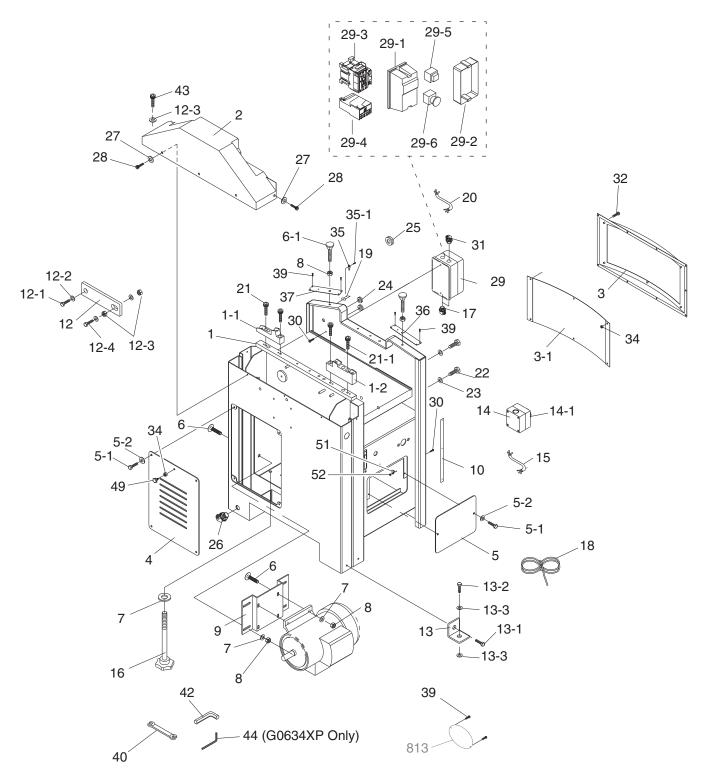
## **Wiring Diagram**



## **SECTION 9: PARTS**

We do our best to stock replacement parts when possible, but we cannot guarantee that all parts shown are available for purchase. Call (800) 523-4777 or visit www.grizzly.com/parts to check for availability.

### **Stand**

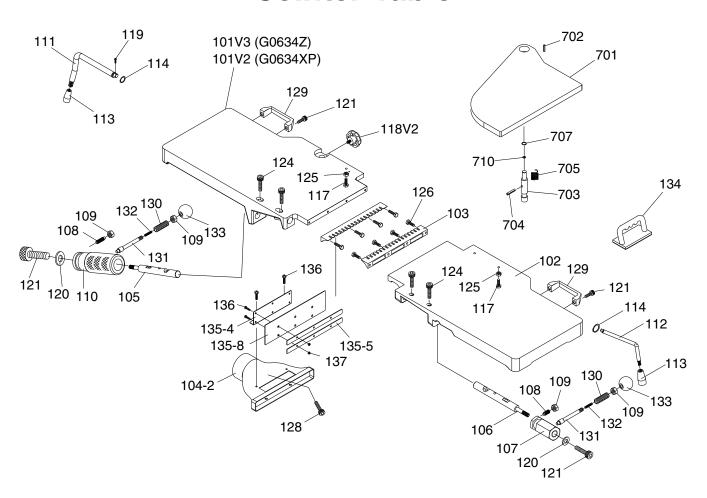


## **Stand Parts List**

REF	PART #	DESCRIPTION
1	P0634Z001	FRAME (G0634Z)
1	P0634XP001	FRAME (G0634XP)
1-1	P0634Z001-1	HINGE SHAFT BRACKET RIGHT (G0634Z)
1-1	P0634XP001-1	HINGE SHAFT BRACKET RIGHT (G0634XP)
1-2	P0634Z001-2	HINGE SHAFT BRACKET LEFT (G0634Z)
1-2	P0634XP001-2	HINGE SHAFT BRACKET LEFT (G0634XP)
2	P0634Z002	DRIVE SHAFT COVER (G0634Z)
2	P0634XP002	DRIVE SHAFT COVER (G0634XP)
3	P0634Z003	COVER FRAME
3-1	P0634Z003-1	COVER (G0634Z)
3-1	P0634XP003-1	COVER (G0634XP)
4	P0634Z004	DOOR (G0634Z)
4	P0634XP004	DOOR (G0634XP)
5	P0634Z005	SIDE OPENING COVER (G0634Z)
5	P0634XP005	SIDE OPENING COVER (G0634XP)
5-1	P0634Z005-1	HEX BOLT 5/16-18 X 1/2
5-2	P0634Z005-2	FLAT WASHER 5/16
6	P0634Z006	CARRIAGE BOLT 3/8-16 X 1
6-1	P0634Z006-1	PLATE SCREW 3/8-16 X 2
7	P0634Z007	FLAT WASHER 3/8
8	P0634Z008	HEX NUT 3/8-16
9	P0634Z009	MOTOR BRACKET
10	P0634Z010	PLANER SCALE
12	P0634Z012	REINFORCEMENT PLATE
12-1	P0634Z012-1	HEX BOLT 5/16-18 X 5/8
12-2	P0634Z012-2	FLAT WASHER 5/16
12-3	P0634Z012-3	HEX NUT 5/16-18
12-4	P0634Z012-4	HEX BOLT 5/16-18 X 2-3/4
13	P0634Z013	SQUARE SUPPORT
13-1	P0634Z013-1	HEX BOLT 5/16-18 X 1/2
13-2	P0634Z013-2	TAP SCREW 1/4 X 1
13-3	P0634Z013-3	FLAT WASHER 1/4
14	P0634Z014	SWITCH BOX W/O SWITCH
14-1	P0634Z014-1	SWITCH KNOB
15	P0634Z015	EMERGENCY STOP SWITCH CORD
16	P0634Z016	KNOB BOLT 3/8-16

17		
	P0634Z017	STRAIN RELIEF TYPE-3 M22-1.5
18	P0634Z018	POWER CORD
19	P0634Z019	DEPTH SCALE
20	P0634Z020	LIMIT SWITCH CORD
21	P0634Z021	CAP SCREW 3/8-16 X 1
21-1	P0634Z021-1	CAP SCREW 3/8-16 X 1-1/2
22	P0634Z022	HEX BOLT 1/4-20 X 5/8
23	P0634Z023	FLAT WASHER 1/4
24	P0634Z024	GROMMET
25	P0634Z025	GROMMET
26	P0634Z026	STRAIN RELIEF TYPE-3 M22-1.5
27	P0634Z027	FLAT WASHER 1/4
28	P0634Z028	HEX BOLT 1/4-20 X 3/8
29	P0634Z029	MAGNETIC SWITCH ASSY SDE MP-18
29-1	P0634Z029-1	MAG SWITCH FRONT COVER
29-2	P0634Z029-2	MAG SWITCH BACK COVER
29-3	P0634Z029-3	CONTACTOR SDE MA-18 220V
29-4	P0634Z029-4	OL RELAY SDE RA-30 18-26A
29-5	P0634Z029-5	ON BUTTON
29-6	P0634Z029-6	OFF BUTTON
30	P0634Z030	PHLP HD SCR 10-24 X 5/8
31	P0634Z031	STRAIN RELIEF TYPE-3 M16-1.5
32	P0634Z032	PHLP HD SCR 1/4-20 X 5/16
34	P0634Z034	HEX NUT 1/4-20
35	P0634Z035	POINTER
35-1	P0634Z035-1	PHLP HD SCR 10-24 X 1/4
36	P0634Z036	PROTECTION PLATE (LEFT)
37	P0634Z037	PROTECTION PLATE (RIGHT)
39	P0634Z039	TAP SCREW #5 X 3/8
40	P0634Z040	WRENCH 12 X 14MM OPEN-ENDS
42	P0634Z042	HEX WRENCH 3MM
43	P0634Z043	COVER SCREW 5/16-18 X 1-1/2
44	P0634XP044	HEX WRENCH 3/32 (G0634XP)
49	P0634Z049	KNOB 1/4-20 X 1/2
51	P0634Z051	CABLE CLAMP
52	P0634Z052	HEX NUT 10-24

## **Jointer Table**



REF	PART #	DESCRIPTION
-----	--------	-------------

101V3	P0634Z101V3	INFEED TABLE V3.09.18 (G0634Z)
101V2	P0634XP101V2	INFEED TABLE V2.09.18 (G0634XP)
102	P0634Z102	OUTFEED TABLE (G0634Z)
102	P0634XP102	OUTFEED TABLE (G0634XP)
103	P0634Z103	TABLE LIP
104-2	P0634Z104-2	JOINTER DUST PORT 4" (G0634Z)
104-2	P0634XP104-2	JOINTER DUST PORT 4" (G0634XP)
105	P0634Z105	HINGE SHAFT A
106	P0634Z106	HINGE SHAFT B
107	P0634Z107	OUTFEED TABLE ADJ. KNOB
108	P0634Z108	GUIDE SCREW
109	P0634Z109	HEX NUT 1/2-12
110	P0634Z110	INFEED HANDGRIP
111	P0634Z111	INFEED LOCK LEVER
112	P0634Z112	OUTFEED LOCK LEVER
113	P0634Z113	PLASTIC KNOB
114	P0634Z114	EXT RETAINING RING 12MM
117	P0634Z117	HEX BOLT 5/16-18 X 3/4
118V2	P0634Z118V2	KNOB SCREW 5/16-18 X 3/4 V2.11.16
119	P0634Z119	PHLP HD SCR 10-24 X 1/4
120	P0634Z120	FLAT WASHER 5/16
121	P0634Z121	CAP SCREW 5/16-18 X 3/4
124	P0634Z124	CAP SCREW 3/8-16 X 1-1/4

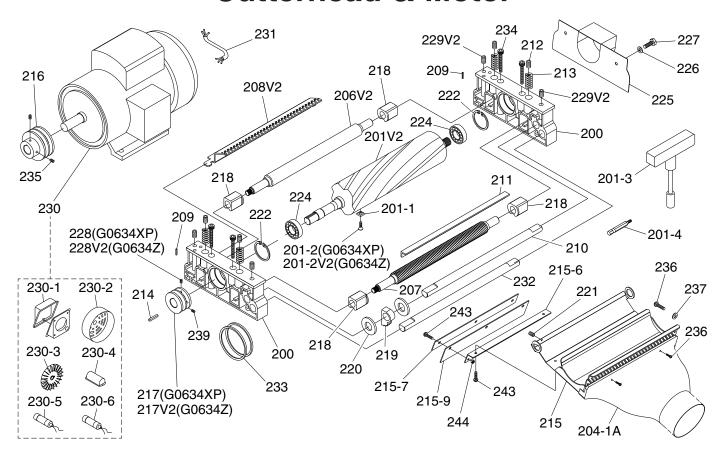
#### REF PART # DESCRIPTION

125	P0634Z125	HEX NUT 5/16-18
126	P0634Z126	CAP SCREW 1/4-20 X 1/2
128	P0634Z128	CAP SCREW 5/16-18 X 3/8
129	P0634Z129	HANDLE
130	P0634Z130	HOLLOW STUD 1/2-12 X 1-9/16, 5/16 ID
131	P0634Z131	PLUNGER
132	P0634Z132	COMPRESSION SPRING
133	P0634Z133	KNOB
134	P0634Z134	PUSH BLOCK-SMALL (PAIR)
135-4	P0634Z135-4	JOINTER DUST PORT L-BRACKET (G0634Z)
135-4	P0634XP135-4	JOINTER DUST PORT L-BRACKET (G0634XP)
135-5	P0634Z135-5	JOINTER DUST PORT PLATE (G0634Z)
135-5	P0634XP135-5	JOINTER DUST PORT PLATE (G0634XP)
135-8	P0634Z135-8	JOINTER DUST PORT PLATE (PLASTIC)
136	P0634Z136	PHLP HD SCR 10-24 X 1/2
137	P0634Z137	HEX NUT 10-24
701	P0634Z701	CUTTERHEAD GUARD
702	P0634Z702	ROLL PIN 6 X 36
703	P0634Z703	GUARD TORSION PIN
704	P0634Z704	ROLL PIN 5 X 30
705	P0634Z705	TORSION SPRING
707	P0634Z707	EXT RETAINING RING 11MM
710	P0634Z710	WAVY WASHER 12MM





### **Cutterhead & Motor**

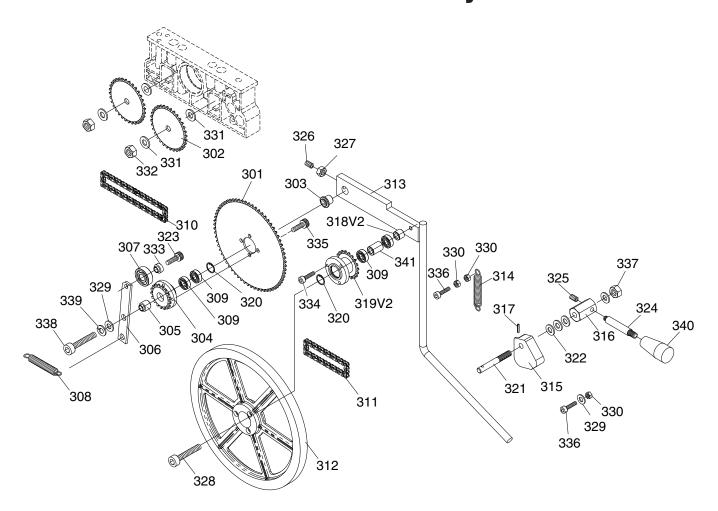


REF	PART#	DESCRIPTION
200	P0634Z200	CUTTERHEAD MOUNTING BLOCK
201V2	P0634Z201V2	SPIRAL CUTTERHEAD 12" 10-32 V2.09.09
201-1	P0634Z201-1	INDEXABLE INSERTS 15 X 15 X 2.5 (10 PK)
201-2	P0634XP201-2	T-HEAD TORX T25 10-32 X 1/2
201-2V2	P0634Z201-2V2	T-HEAD TORX T25 10-32 X 1/2 V2.01.11
201-3	P0634Z201-3	T-HANDLE TORX DRIVER 1/4
201-4	P0634Z201-4	TORX BIT T-25
204-1A	P0634Z204-1A	PLANER DUST PORT 4" V2.09.07 (G0634Z)
204-1A	P0634XP204-1A	PLANER DUST PORT 4" (G0634XP)
206V2	P0634Z206V2	OUTFEED ROLLER V2.01.20
207	P0634Z207	INFEED ROLLER
208V2	P0634Z208V2	COVER V2.04.16 (G0634Z)
208V2	P0634XP208V2	COVER V2.04.16 (G0634XP)
209	P0634Z209	ALIGNMENT PIN
210	P0634Z210	PIVOT PIN
211	P0634Z211	SQUARE SUPPORT
212	P0634Z212	DOWEL
213	P0634Z213	COMPRESSION SPRING
214	P0634Z214	KEY 5 X 5 X 30
215	P0634Z215	DUST CHUTE (G0634Z)
215	P0634XP215	DUST CHUTE (G0634XP)
215-6	P0634Z215-6	PLANER DUST PORT L-BRACKET (G0634Z)
215-6	P0634XP215-6	PLANER DUST PORT L-BRACKET (G0634XP)
215-7	P0634Z215-7	PLANER DUST PORT PLATE (G0634Z)
215-7	P0634XP215-7	PLANER DUST PORT PLATE (G0634XP)
215-9	P0634Z215-9	PLANER DUST PORT PLATE (PLASTIC)
216	P0634Z216	MOTOR PULLEY
217V2	P0634Z217V2	CUTTERHEAD PULLEY V2.01.08 (G0634Z)
217	P0634XP217	CUTTERHEAD PULLEY (G0634XP)
218	P0634Z218	ROLLER SUPPORT BLOCK

REF	PART #	DESCRIPTION
219	P0634Z219	ANTIKICKBACK FINGER
220	P0634Z220	SPACER
221	P0634Z221	SET SCREW 1/4-20 X 1/2
222	P0634Z222	INT RETAINING RING 52MM
224	P0634Z224	BALL BEARING 6205-2RS
225	P0634Z225	GUARD (G0634Z)
225	P0634XP225	GUARD (G0634XP)
226	P0634Z226	FLAT WASHER 1/4
227	P0634Z227	HEX BOLT 1/4-20 X 3/8
228	P0634XP228	SET SCREW M58 X 4 (G0634XP)
228V2	P0634Z228V2	SET SCREW M58 X 4 V2.01.08 (G0634Z)
229V2	P0634Z229V2	SET SCREW 1/4-20 X 3/4 CONE-PT V2.04.16
230	P0634Z230	MOTOR 5HP 220V 1-PH
230-1	P0634Z230-1	JUNCTION BOX
230-2	P0634Z230-2	FAN COVER
230-3	P0634Z230-3	MOTOR FAN
230-4	P0634Z230-4	CAPACITOR COVER
230-5	P0634Z230-5	S CAPACITOR 400M 125V 1-3/8 X 3-1/8
230-6	P0634Z230-6	R CAPACITOR 50M 350V 2 X 3-1/2
231	P0634Z231	MOTOR CORD
232	P0634Z232	PIVOT PIN
233	P0634Z233	V-BELT M52 3L520
234	P0634Z234	CAP SCREW 5/16-18 X 3-1/4
235	P0634Z235	SET SCREW 1/4-20 X 3/8
236	P0634Z236	PHLP HD SCR 10-24 X 3/8
237	P0634Z237	FLAT WASHER #10
239	P0634Z239	SET SCREW M58 X 6
243	P0634Z243	FLANGE SCREW 10-24 X 1/2
244	P0634Z244	HEX NUT 10-24



## **Drive Assembly**

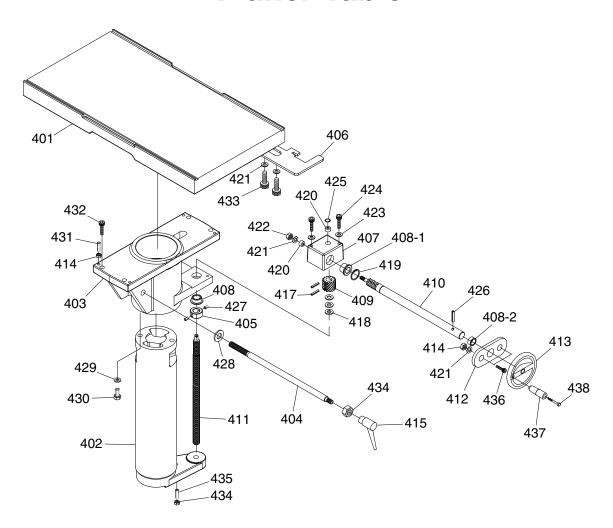


REF	PART#	DESCRIPTION
301	P0634Z301	SPROCKET 66T
302	P0634Z302	SPROCKET 34T
303	P0634Z303	BUSHING
304	P0634Z304	SPROCKET 18T
305	P0634Z305	SPACER
306	P0634Z306	ARM
307	P0634Z307	BALL BEARING 6204-2RS
308	P0634Z308	TENSION SPRING
309	P0634Z309	BALL BEARING 608-2RS
310	P0634Z310	ROLLER CHAIN
311	P0634Z311	ROLLER CHAIN
312	P0634Z312	CONTACT WHEEL
313	P0634Z313	LEVER
314	P0634Z314	TENSION SPRING
315	P0634Z315	CAM
316	P0634Z316	CAM SHAFT
317	P0634Z317	ROLL PIN
318V2	P0634Z318V2	SPACER 8 X 15 X 8MM V2.03.15
319V2	P0634Z319V2	SPROCKET 19T, 17 X 32.5 X 17MM V2.10.14
320	P0634Z320	INT RETAINING RING 22MM
321	P0634Z321	SPRING STUD

REF	PART #	DESCRIPTION
322	P0634Z322	FLAT WASHER 3/8
323	P0634Z323	CAP SCREW 3/8-16 X 1/2
324	P0634Z324	LEVER
325	P0634Z325	SET SCREW 5/16-18 X 3/8
326	P0634Z326	SET SCREW 1/4-20 X 1
327	P0634Z327	HEX NUT 1/4-20
328	P0634Z328	CAP SCREW 5/16-18 X 2
329	P0634Z329	FLAT WASHER 5/16
330	P0634Z330	HEX NUT 5/16-18
331	P0634Z331	FLAT WASHER 1/2
332	P0634Z332	HEX NUT 1/2-20
333	P0634Z333	BUSHING
334	P0634Z334	CAP SCREW 1/4-20 X 3/4
335	P0634Z335	CAP SCREW 1/4-20 X 3/8
336	P0634Z336	CAP SCREW 5/16-18 X 3/4
337	P0634Z337	LOCK NUT 3/8-16
338	P0634Z338	CAP SCREW 5/16-18 X 2-1/2
339	P0634Z339	LOCK WASHER 5/16
340	P0634Z340	PLASTIC KNOB
341	P0634Z341	SPACER 8.6 X 15 X 18.6MM



## **Planer Table**



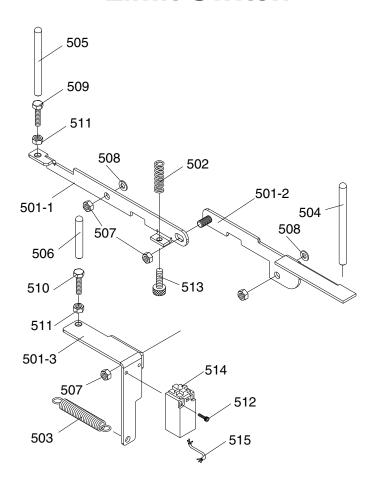
REF	PART #	DESCRIPTION
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401	P0634Z401	PLANER TABLE
402	P0634Z402	COLUMN
403	P0634Z403	CYLINDER LINER
404	P0634Z404	LOCK SCREW
405	P0634Z405	COLLAR
406	P0634Z406	THICKNESS POINTER
407	P0634Z407	GEAR BOX
408	P0634Z408	BUSHING
408-1	P0634Z408-1	SELF-LUBRICATING SHLDR BUSHING
408-2	P0634Z408-2	SELF-LUBRICATION BUSHING
409	P0634Z409	GEAR
410	P0634Z410	WORM SHAFT
411	P0634Z411	ELEVATION LEAD SCREW
412	P0634Z412	SHIELD PLATE
413	P0634Z413	HANDWHEEL
414	P0634Z414	HEX NUT 5/16-18
415	P0634Z415	UNIVERSAL LOCK LEVER
417	P0634Z417	ROLL PIN
418	P0634Z418	THRUST BEARING NTB1528 +2AS
419	P0634Z419	INT RETAINING RING 19MM

#### REF PART # DESCRIPTION

420     P0634Z420     BUSHING       421     P0634Z421     FLAT WASHER 5/16       422     P0634Z422     LOCK NUT 5/16-18       423     P0634Z423     LOCK WASHER 1/4       424     P0634Z424     CAP SCREW 1/4-20 X 2-1/4       425     P0634Z425     INT RETAINING RING 8MM       426     P0634Z426     ROLL PIN 5 X 30	
422       P0634Z422       LOCK NUT 5/16-18         423       P0634Z423       LOCK WASHER 1/4         424       P0634Z424       CAP SCREW 1/4-20 X 2-1/4         425       P0634Z425       INT RETAINING RING 8MM	
423         P0634Z423         LOCK WASHER 1/4           424         P0634Z424         CAP SCREW 1/4-20 X 2-1/4           425         P0634Z425         INT RETAINING RING 8MM	
424 P0634Z424 CAP SCREW 1/4-20 X 2-1/4 425 P0634Z425 INT RETAINING RING 8MM	
425 P0634Z425 INT RETAINING RING 8MM	
426 P0634Z426 ROLL PIN 5 X 30	
427 P0634Z427 SET SCREW 5/16-18 X 1/4	
428 P0634Z428 FENDER WASHER 13.5 X 34 X 4MM	
429 P0634Z429 LOCK WASHER 3/8	
430 P0634Z430 HEX BOLT 3/8-16 X 1-1/2	
431 P0634Z431 SET SCREW 5/16-18 X 1	
432 P0634Z432 CAP SCREW 3/8-16 X 1-1/4	
433 P0634Z433 HEX BOLT 5/16-18 X 1/2	
434 P0634Z434 HEX NUT 3/8-16	
435 P0634Z435 SET SCREW 3/8-16 X 2	
436 P0634Z436 PHLP HD SCR 5/16-18 X 3/4	
437 P0634Z437 HANDLE	
438 P0634Z438 SHOULDER SCREW 3/8-16 X 5/8, 3/8 >	( ) 1/)

## **Limit Switch**

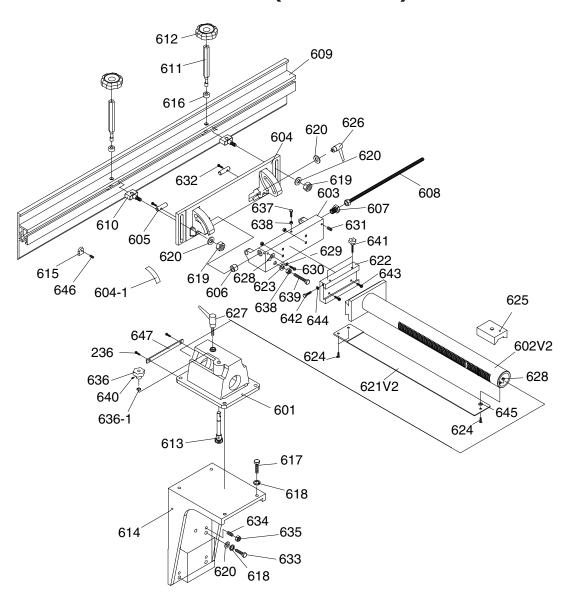


KEF	PARI#	DESCRIPTION
501-1	P0634Z501-1	SWING LEVER (F)
501-2	P0634Z501-2	SWING LEVER (M)
501-3	P0634Z501-3	LIMIT SWITCH BRACKET
502	P0634Z502	COMPRESSION SPRING
503	P0634Z503	EXTENSION SPRING
504	P0634Z504	SWITCH ACTIVATION ROD #1
505	P0634Z505	SWITCH ACTIVATION ROD #2
506	P0634Z506	SWITCH ACTIVATION ROD #3
507	P0634Z507	LOCK NUT 5/16-18

REF	PART #	DESCRIPTION
508	P0634Z508	FLAT WASHER 5/16
509	P0634Z509	HEX BOLT 5/16-18 X 1
510	P0634Z510	HEX BOLT 5/16-18 X 1/2
511	P0634Z511	HEX NUT 5/16-18
512	P0634Z512	CAP SCREW 10-24 X 1-1/4
513	P0634Z513	CAP SCREW 1/4-20 X 1
514	P0634Z514	LIMIT SWITCH
515	P0634Z515	LIMIT SWITCH CONTROL CORD



## **Fence (G0634Z)**

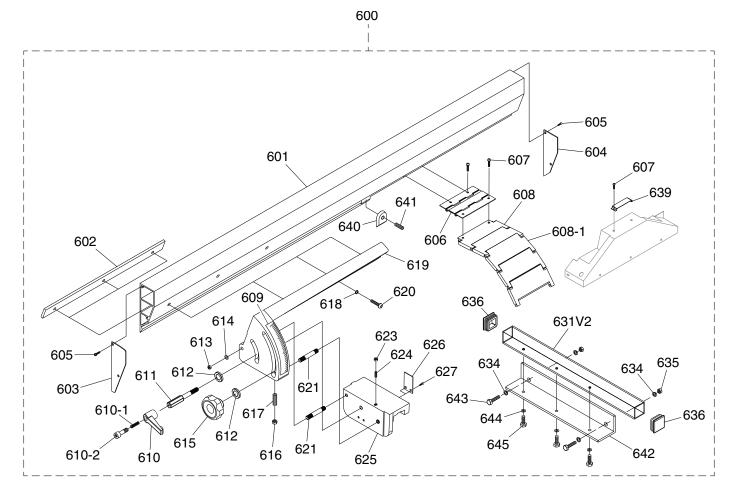


## Fence Parts List (G0634Z)

REF	PART#	DESCRIPTION
601	P0634Z601	FENCE BASE
602V2	P0634Z602V2	ADJUSTMENT TUBE W/RACK V2.08.16
603	P0634Z603	TRUNNION BRACKET
604	P0634Z604	TRUNNION
604-1	P0634Z604-1	FENCE ANGLE SCALE
605	P0634Z605	PIVOT STUD
606	P0634Z606	SPACER
607	P0634Z607	ADJUSTMENT SCREW
608	P0634Z608	ADJUSTMENT ROD
609	P0634Z609	FENCE
610	P0634Z610	SLIDING BOLT
611	P0634Z611	ECCENTRIC SHAFT
612	P0634Z612	LOCK KNOB 3/8-16
613	P0634Z613	PINION SHAFT
614	P0634Z614	FENCE SUPPORT
615	P0634Z615	PLASTIC PROTECTION SHOE
616	P0634Z616	BUSHING
617	P0634Z617	HEX BOLT 5/16-18 X 1
619	P0634Z619	LOCK NUT 5/16-18
620	P0634Z620	FLAT WASHER 5/16
621V2	P0634Z621V2	CUTTER KNIFE GUARD V2.06.18
622	P0634Z622	DOVETAIL BRACKET FOR QUICK RELEASE
623	P0634Z623	FLAT WASHER 1/4
624	P0634Z624	FLAT HD SCR 1/4-20 X 3/8

REF	PART #	DESCRIPTION
625	P0634Z625	TUBE LOCKING SHOE
626	P0634Z626	UNIVERSAL LOCK LEVER
627	P0634Z627	UNIVERSAL LOCK LEVER
628	P0634Z628	POINTER
629	P0634Z629	FLAT WASHER 1/4
630	P0634Z630	PHLP HD SCR 1/4-20 X 3/8
631	P0634Z631	SET SCREW 1/4-20 X 3/8
632	P0634Z632	PHLP HD SCR 10-24 X 5/8
633	P0634Z633	HEX BOLT 5/16-18 X 1-1/4
634	P0634Z634	SET SCREW 5/16-18 X 1
635	P0634Z635	HEX NUT 5/16-18
636	P0634Z636	CONTROL KNOB
636-1	P0634Z636-1	EXT RETAINING RING 10MM
637	P0634Z637	HEX BOLT 1/4-20 X 3/4
638	P0634Z638	HEX NUT 1/4-20
639	P0634Z639	HEX BOLT 1/4-20 X 3-1/4
640	P0634Z640	SET SCREW 1/4-20 X 1/4
641	P0634Z641	KNOB SCREW 1/4
642	P0634Z642	HEX BOLT 1/4-20 X 1/2
643	P0634Z643	CAP SCREW 1/4-20 X 1
644	P0634Z644	FLAT WASHER 1/4
645	P0634Z645	FLAT WASHER 1/4 (PLASTIC)
646	P0634Z646	SET SCREW 10-24 X 1/4
647	P0634Z647	FENCE BASE PLATE

## Fence (G0634XP)

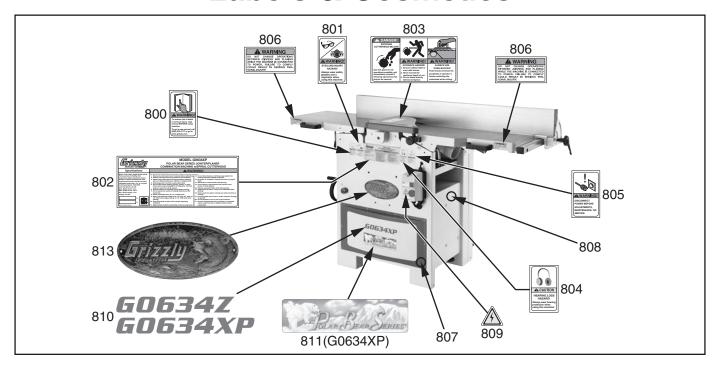


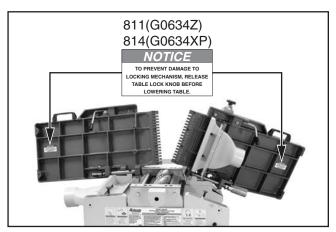
REF	PART #	DESCRIPTION
600	P0634XP600	COMPLETE FENCE ASSEMBLY
601	P0634XP601	FENCE
602	P0634XP602	FENCE FIXED PLATE
603	P0634XP603	LEFT FENCE CAP
604	P0634XP604	RIGHT FENCE CAP
605	P0634XP605	TAP SCREW #10 X 1/2
606	P0634XP606	REAR GUARD HINGE
607	P0634XP607	PHLP HD SCR M47 X 6
608	P0634XP608	REAR GUARD CONNECTOR
608-1	P0634XP608-1	REAR GUARD LINK
609	P0634XP609	FENCE ANGLE SCALE
610	P0634XP610	FENCE LOCK LEVER
610-1	P0634XP610-1	COMPRESSION SPRING
610-2	P0634XP610-2	PHLP SHOULDER SCR M58 X 15
611	P0634XP611	FENCE LOCK LEVER SCREW
612	P0634XP612	FLAT WASHER 3/8
613	P0634XP613	LOCK NUT 3/8-16
614	P0634XP614	FLAT WASHER 3/8
615	P0634XP615	ANGLE ADJUSTMENT KNOB 3/8
616	P0634XP616	HEX NUT 5/16-18
617	P0634XP617	SET SCREW 5/16-18 X 1
618	P0634XP618	FLAT WASHER 5/16

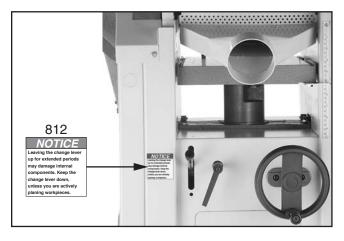
REF	PART #	DESCRIPTION
619	P0634XP619	FENCE ANGLE SUPPORT
620	P0634XP620	CAP SCREW 5/16-18 X 1
621	P0634XP621	STUD-UDE 3/8-16 X 2-1/2 1/2, 3/4 RH
623	P0634XP623	HEX NUT 1/4-20
624	P0634XP624	SET SCREW 1/4-20 X 5/8
625	P0634XP625	FENCE SUPPORT
626	P0634XP626	FENCE SUPPORT PLATE
627	P0634XP627	FLAT HD SCR 10-24 X 3/8
631V2	P0634XP631V2	FENCE RAIL W/HOLES V2.04.11
632	P0634XP632	CAP SCREW 3/8-16 X 2-1/4
633	P0634XP633	BUSHING
634	P0634XP634	LOCK WASHER 3/8
635	P0634XP635	HEX NUT 3/8-16
636	P0634XP636	FENCE RAIL END CAP
639	P0634XP639	FIXED PLATE
640	P0634XP640	PLASTIC PROTECTION SHOE
641	P0634XP641	SET SCREW 10-24 X 1/4
642	P0634XP642	FENCE RAIL BRACE
643	P0634XP643	HEX BOLT 3/8-16 X 1-1/2
644	P0634XP644	FLAT WASHER 1/4
645	P0634XP645	HEX BOLT 1/4-20 X 1/2



### **Labels & Cosmetics**







#### **REF PART# DESCRIPTION**

800	P0634Z800	READ MANUAL LABEL
801	P0634Z801	RESPIRATOR/GLASSES LABEL
802	P0634Z802	MACHINE ID LABEL (G0634Z)
802	P0634XP802	MACHINE ID LABEL (G0634XP)
803	P0634Z803	CUTTERHEAD WARNING LABEL
804	P0634Z804	EAR PROTECTION LABEL
805	P0634Z805	DISCONNECT POWER LABEL
806	P0634Z806	CHANGING OPERATIONS WARNING LABEL
807	P0634Z807	TOUCH UP PAINT, GRIZZLY GREEN
808	P0634Z808	TOUCH UP PAINT, GREY PUTTY (G0634Z)

#### **REF PART# DESCRIPTION**

808	P0634XP808	TOUCH-UP PAINT, PB WHITE (G0634XP)
809	P0634Z809	ELECTRICITY LABEL
810	P0634Z810	MODEL NUMBER LABEL (G0634Z)
810	P0634XP810	MODEL NUMBER LABEL (G0634XP)
811	P0634Z811	TABLE LOCK KNOB NOTICE (G0634Z)
811	P0634XP811	POLAR BEAR LOGO 2-1/2 X 9-1/2 (G0634XP)
812	P0634Z812	CHANGE LEVER LABEL
813	P0634Z813	GRIZZLY NAMEPLATE-SMALL
814	P0634XP814	TABLE LOCK KNOB NOTICE (G0634XP)

## **A**WARNING

Safety labels help reduce the risk of serious injury caused by machine hazards. If any label comes off or becomes unreadable, the owner of this machine MUST replace it in the original location before resuming operations. For replacements, contact (800) 523-4777 or www.grizzly.com.





# CUT ALONG DOTTED LINE

## Grizzia WARRANTY CARD

Street City		_ State	Zip
		_ Email	
			Serial #
		n a voluntary basis. It will be used fourse, all information is strictly con	r marketing purposes to help us develo
1.	How did you learn about us' Advertisement Card Deck	? Friend Website	Catalog Other:
2.	Which of the following maga	zines do you subscribe to?	
	Cabinetmaker & FDM Family Handyman Hand Loader Handy Home Shop Machinist Journal of Light Cont. Live Steam Model Airplane News Old House Journal Popular Mechanics	Popular Science Popular Woodworking Precision Shooter Projects in Metal RC Modeler Rifle Shop Notes Shotgun News Today's Homeowner Wood	<ul> <li>Wooden Boat</li> <li>Woodshop News</li> <li>Woodsmith</li> <li>Woodwork</li> <li>Woodworker West</li> <li>Woodworker's Journal</li> <li>Other:</li> </ul>
3.	What is your annual househ \$20,000-\$29,000 \$50,000-\$59,000	old income?\$30,000-\$39,000\$60,000-\$69,000	\$40,000-\$49,000 \$70,000+
4.	What is your age group? 20-29 50-59	30-39 60-69	40-49 70+
5.	How long have you been a v		Years20+ Years
6.	How many of your machines	or tools are Grizzly?6-9	10+
7.	Do you think your machine r	epresents a good value?	YesNo
8.	Would you recommend Griz	zly Industrial to a friend?	YesNo
9.	Would you allow us to use y <b>Note:</b> We never use names	our name as a reference for Griza	zly customers in your area? YesNo
10.	Comments:		

Place Stamp Here



GRIZZLY INDUSTRIAL, INC. P.O. BOX 2069 BELLINGHAM, WA 98227-2069

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## **WARRANTY & RETURNS**

Grizzly Industrial, Inc. warrants every product it sells for a period of **1 year** to the original purchaser from the date of purchase. This warranty does not apply to defects due directly or indirectly to misuse, abuse, negligence, accidents, repairs or alterations or lack of maintenance. This is Grizzly'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 or represent that the merchandise complies with the provisions of any law or acts unless the manufacturer so warrants. In no event shall Grizzly's liability under this warranty exceed the purchase price paid for the product and any legal actions brought against Grizzly 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.

To take advantage of this warranty, contact us by mail or phone and give us all the details. We will then issue you a "Return Number," which must be clearly posted on the outside as well as the inside of the carton. We will not accept any item back without this number. Proof of purchase must accompany the merchandise.

The manufacturers reserve the right to change specifications at any time because they constantly strive to achieve better quality equipment. We make every effort to ensure that our products meet high quality and durability standards and we hope you never need to use this warranty.

Please feel free to write or call us if you have any questions about the machine or the manual.

Thank you again for your business and continued support. We hope to serve you again soon.



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