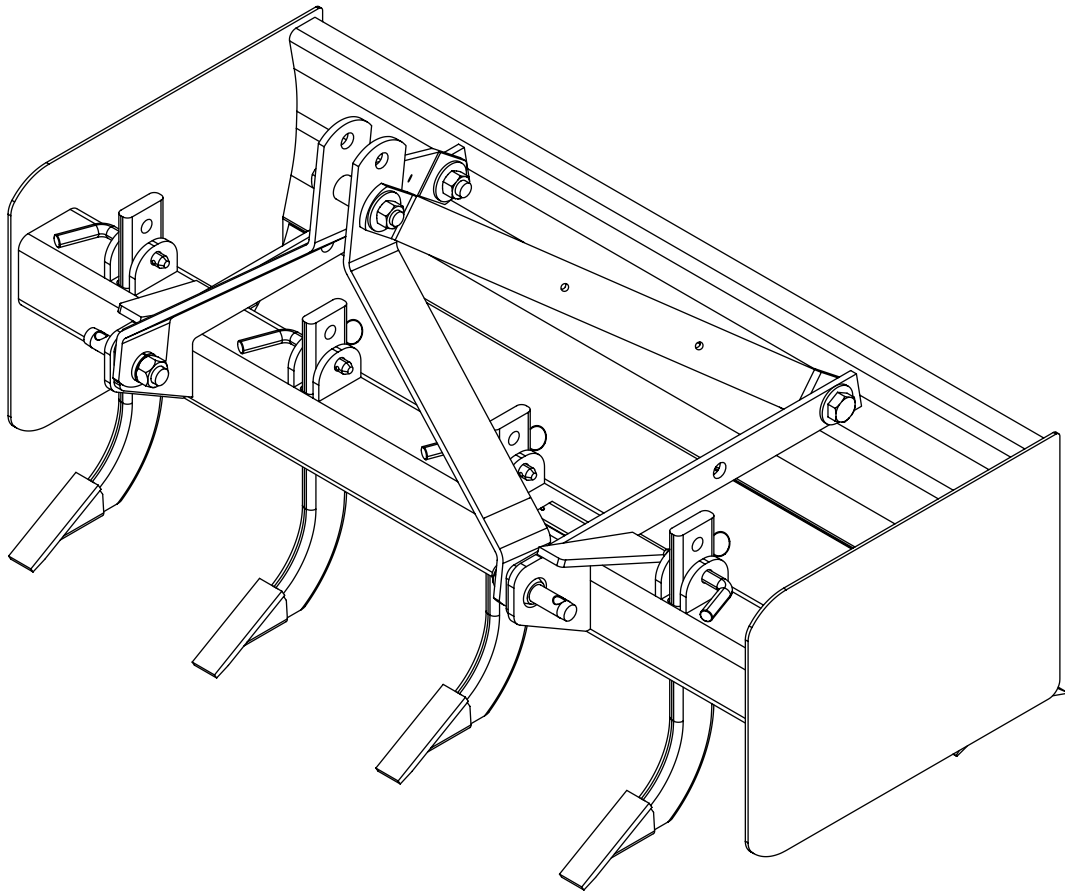


WOODS BOX SCRAPER

GBC48



MAN0179

Rev. 1/13/2006

WOODS[®]
Tested. Proven. Unbeatable.

OPERATOR'S MANUAL

TO THE DEALER:

Assembly and proper installation of this product is the responsibility of the Woods® dealer. Read manual instructions and safety rules. Make sure all items on the Dealer's Pre-Delivery and Delivery Check Lists in the Operator's Manual are completed before releasing equipment to the owner.

The dealer must complete the Product Registration included with the Operator's Manual. The customer must sign the registration which certifies that all Dealer Check List items have been completed. The dealer is to return the prepaid postage portion to Woods, give one copy to the customer, and retain one copy. **Failure to complete and return this card does not diminish customer's warranty rights.**

TO THE OWNER:

Read this manual before operating your Woods equipment. The information presented will prepare you to do a better and safer job. Keep this manual handy for ready reference. Require all operators to read this manual carefully and become acquainted with all adjustment and operating procedures before attempting to operate. Replacement manuals can be obtained from your dealer. To locate your nearest dealer, check the Dealer Locator at www.WoodsEquipment.com, or in the United States and Canada call 1-800-319-6637.

The equipment you have purchased has been carefully engineered and manufactured to provide dependable and satisfactory use. Like all mechanical products, it will require cleaning and upkeep. Lubricate the unit as specified. Observe all safety information in this manual and safety decals on the equipment.

For service, your authorized Woods dealer has trained mechanics, genuine Woods service parts, and the necessary tools and equipment to handle all your needs.

Use only genuine Woods service parts. Substitute parts will void the warranty and may not meet standards required for safe and satisfactory operation. Record the model number and serial number of your equipment in the spaces provided:

Model: _____ **Date of Purchase:** _____

Serial Number: (see Safety Decal section for location) _____

Provide this information to your dealer to obtain correct repair parts.

Throughout this manual, the term **IMPORTANT** is used to indicate that failure to observe can cause damage to equipment. The terms **CAUTION**, **WARNING**, and **DANGER** are used in conjunction with the Safety-Alert Symbol (a triangle with an exclamation mark) to indicate the degree of hazard for items of personal safety.



This Safety-Alert Symbol indicates a hazard and means **ATTENTION! BECOME ALERT! YOUR SAFETY IS INVOLVED!**



DANGER

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



WARNING

Indicates a potentially hazardous situation that, if not avoided, could result in death or serious injury, and includes hazards that are exposed when guards are removed.



CAUTION

Indicates a potentially hazardous situation that, if not avoided, may result in minor or moderate injury.

IMPORTANT

Indicates that failure to observe can cause damage to equipment.

NOTE

Indicates helpful information.

WOODS®

ALITEC™

BMP®

CENTRAL FABRICATORS®

GANNON®

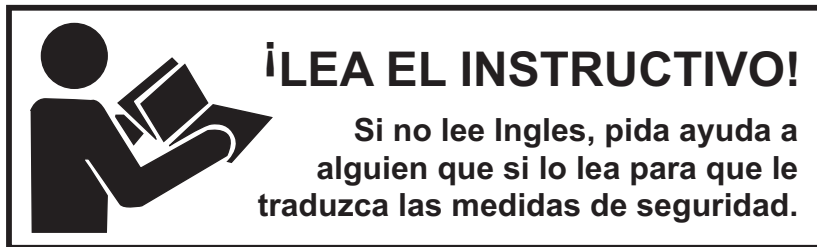
GILL®

WAIN-ROY®

WOODS®

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SPECIFICATIONS

GBC48

Overall Width	48"
Weight	285 lbs.
Cutting Edge	1/2" x 6" x 47" Reversible
Moldboard Thickness	7 - gauge
Side Plate Thickness	7 - gauge
Scarifier	Adjustable, 3 Position with replaceable wear points
Capacity	9 cu.ft.
Tractor Rating	Max. Engine 25 hp
Tractor 3-Point	Category 1 & Category 0
Quick Hitch	Category 1 Compatible

GENERAL INFORMATION

The purpose of this manual is to assist you in operating and maintaining your Box Scraper. Read it carefully. It furnishes information and instructions that will help you achieve years of dependable performance.

These instructions have been compiled from extensive field experience and engineering data. Some information may be general in nature, due to unknown and varying operating conditions. However, through experience and these instructions, you should be able to develop procedures suitable to your particular situation.

The illustrations and data used in this manual were current at the time of printing. However, due to possible inline production changes, your machine may vary slightly in detail. We reserve the right to redesign and change the machines as may be necessary without notification.

Throughout this manual, references are made to right and left direction. These are determined by standing behind the tractor facing the direction of forward travel.

NOTES



SAFETY RULES

ATTENTION! BECOME ALERT! YOUR SAFETY IS INVOLVED!



Safety is a primary concern in the design and manufacture of our products. Unfortunately, our efforts to provide safe equipment can be wiped out by an operator's single careless act.

In addition to the design and configuration of equipment, hazard control and accident prevention are dependent upon the awareness, concern, judgement, and proper training of personnel involved in the operation, transport, maintenance, and storage of equipment.

It has been said, "The best safety device is an informed, careful operator." We ask you to be that kind of operator.

TRAINING

- Safety instructions are important! Read all attachment and power unit manuals; follow all safety rules and safety decal information. (Replacement manuals and safety decals are available from your dealer.) Failure to follow instructions or safety rules can result in serious injury or death.
- If you do not understand any part of this manual and need assistance, see your dealer.
- Operators must be instructed in and be capable of the safe operation of the equipment, its attachments, and all controls. Do not allow anyone to operate this equipment without proper instructions.
- Never allow children or untrained persons to operate equipment.

PREPARATION

- Always wear relatively tight and belted clothing to avoid getting caught in moving parts. Wear sturdy, rough-soled work shoes and protective equipment for eyes, hair, hands, hearing, and head; and respirator or filter mask where appropriate.
- Make sure attachment is properly secured, adjusted, and in good operating condition.
- Power unit must be equipped with ROPS or ROPS cab and seat belt. Keep seat belt securely fastened. Falling off power unit can result in death from being run over or crushed. Keep foldable ROPS system in "locked up" position at all times.
- A minimum 20% of tractor and equipment weight must be on the tractor front wheels when attachments are in transport position. Without this weight, tractor could tip over, causing personal

injury or death. The weight may be attained with a loader, front wheel weights, ballast in tires or front tractor weights. Weigh the tractor and equipment. Do not estimate.

TRANSPORTATION

- Always comply with all state and local lighting and marking requirements.
- Never allow riders on power unit or attachment.
- Do not operate or transport on steep slopes.
- Use extreme care and reduce ground speed on slopes and rough terrain.
- Do not operate or transport equipment while under the influence of alcohol or drugs.
- Before transporting, make sure the unit is pivoted to position the red reflectors to the rear and the amber reflector(s) to the front.

OPERATION

- Never go underneath equipment (lowered to the ground or raised) unless it is properly blocked and secured. Never place any part of the body underneath equipment or between moveable parts even when the engine has been turned off. Hydraulic system leak down, hydraulic system failures, mechanical failures, or movement of control levers can cause equipment to drop or rotate unexpectedly and cause severe injury or death.
- Always comply with all state and local lighting and marking requirements.
- Operate only in daylight or good artificial light.
- Keep bystanders away from equipment.
- Keep hands, feet, hair, and clothing away from equipment while engine is running. Stay clear of all moving parts.
- Power unit must be equipped with ROPS or ROPS cab and seat belt. Keep seat belt securely fastened. Falling off power unit can result in death from being run over or crushed. Keep foldable ROPS system in "locked up" position at all times.
- Never allow riders on power unit or attachment.
- Always sit in power unit seat when operating controls or starting engine. Securely fasten seat belt, place transmission in neutral, engage brake, and ensure all other controls are disengaged before starting power unit engine.

(Safety Rules continued on next page)

SAFETY RULES



ATTENTION! BECOME ALERT! YOUR SAFETY IS INVOLVED!



(Safety Rules continued from previous page)

- Look down and to the rear and make sure area is clear before operating in reverse.
- Use extreme care when working close to fences, ditches, other obstructions, or on hillsides.
- Do not operate or transport on steep slopes.
- Do not stop, start, or change directions suddenly on slopes.
- Use extreme care and reduce ground speed on slopes and rough terrain.
- Stop power unit and equipment immediately upon striking an obstruction. Turn off engine, remove key, inspect, and repair any damage before resuming operation.
- Watch for hidden hazards on the terrain during operation.

MAINTENANCE

- Before dismounting tractor or performing any service or maintenance, lower attachment to ground, turn off engine, set parking brake, operate valve levers to release any hydraulic pressure, and remove key.
- Always wear relatively tight and belted clothing to avoid getting caught in moving parts. Wear sturdy, rough-soled work shoes and protective equipment for eyes, hair, hands, hearing, and head; and respirator or filter mask where appropriate.

- Never go underneath equipment (lowered to the ground or raised) unless it is properly blocked and secured. Never place any part of the body underneath equipment or between moveable parts even when the engine has been turned off. Hydraulic system leak down, hydraulic system failures, mechanical failures, or movement of control levers can cause equipment to drop or rotate unexpectedly and cause severe injury or death.
- Make sure attachment is properly secured, adjusted, and in good operating condition.
- Never perform service or maintenance with engine running.
- Keep all persons away from operator control area while performing adjustments, service, or maintenance.
- Tighten all bolts, nuts, and screws to torque chart specifications. Check that all cotter pins are installed securely to ensure equipment is in a safe condition before putting unit into service.

STORAGE

- To help prevent injury caused by a falling implement, always detach on a hard level surface.
- Block equipment securely for storage.
- Keep children and bystanders away from storage area.
- Follow manual instructions for storage.



SAFETY & INSTRUCTIONAL DECALS



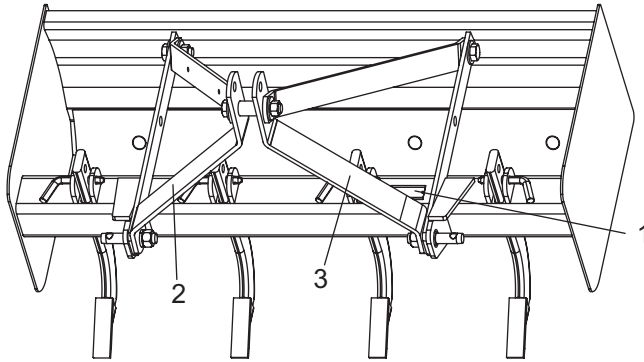
ATTENTION! BECOME ALERT! YOUR SAFETY IS INVOLVED!



Replace Immediately If Damaged!



1 - Serial Number Plate



CD6164B

BE CAREFUL!

Use a clean, damp cloth to clean safety decals.

Avoid spraying too close to decals when using a pressure washer; high-pressure water can enter through very small scratches or under edges of decals causing them to peel or come off.

Replacement safety decals can be ordered free from your Woods dealer. To locate your nearest dealer, check the Dealer Locator at www.WoodsEquipment.com, or in the United States and Canada call 1-800-319-6637.

2 - 1004622

WARNING



CRUSHING AND PINCHING HAZARD

- Handle machine parts carefully. Body parts could be crushed or pinched between tractor and implement.
- Operate tractor controls from tractor seat only.
- Do not stand between tractor and implement when tractor is in gear.
- Make sure parking brake is engaged before going between tractor and implement.
- Stand clear of machine while in operation or when it is being raised or lowered.

FAILURE TO FOLLOW THESE INSTRUCTIONS CAN RESULT IN INJURY OR DEATH.

WARNING



RAISED IMPLEMENT CAN DROP AND CRUSH

- Never go underneath raised implement which can drop from equipment or tractor 3-point hitch hydraulic leak down, hydraulic system failures, movement of control levers, or mechanical linkage failures.
- Service work does not require going underneath implement. Read manual instructions.

GOING UNDERNEATH IMPLEMENT CAN RESULT IN SERIOUS INJURY OR DEATH.

1004622

WARNING



CRUSHING AND PINCHING HAZARD

- Handle machine parts carefully. Body parts could be crushed or pinched between tractor and implement.
- Operate tractor controls from tractor seat only.
- Do not stand between tractor and implement when tractor is in gear.
- Make sure parking brake is engaged before going between tractor and implement.
- Stand clear of machine while in operation or when it is being raised or lowered.

WARNING

TO AVOID SERIOUS INJURY OR DEATH:

- Read Operator's Manual before operating, servicing, or repairing equipment. Follow all safety rules and instructions. (Manuals are available from dealer or call 1-800-319-6637.)
- Lower equipment to ground, stop engine, remove key, and set brake before dismounting tractor.
- Never allow children or untrained persons to operate equipment.
- Never allow riders.
- Keep bystanders away from equipment during operation.
- Keep all shields in place and in good condition.

WARNING



FALLING OFF CAN RESULT IN BEING RUN OVER.

- Tractor must be equipped with ROPS (or ROPS CAB) and seat belt. Keep foldable ROPS systems in "locked up" position at all times.
- Buckle Up! Keep seat belt securely fastened.

FAILURE TO FOLLOW THESE INSTRUCTIONS CAN RESULT IN SERIOUS INJURY OR DEATH.

1004620

3 - 1004620

OPERATION

The operator is responsible for the safe operation of this equipment. The operator must be properly trained. Operators should be familiar with the equipment, the tractor, and all safety practices before starting operation. Read the safety rules and safety decals, page 3 through page 5.

The box scrapers are designed for a wide range of applications: scarifying, scraping, leveling, grading, and backfilling.

WARNING

■ Power unit must be equipped with ROPS or ROPS cab and seat belt. Keep seat belt securely fastened. Falling off power unit can result in death from being run over or crushed. Keep foldable ROPS system in “locked up” position at all times.

■ Never allow children or untrained persons to operate equipment.

■ Keep bystanders away from equipment.

■ NEVER GO UNDERNEATH EQUIPMENT. Never place any part of the body underneath equipment or between moveable parts even when the engine has been turned off. Hydraulic system leak-down, hydraulic system failures, mechanical failures, or movement of control levers can cause equipment to drop or rotate unexpectedly and cause severe injury or death.

- Service work does not require going underneath.
- Read Operator's Manual for service instructions or have service performed by a qualified dealer.

■ Keep hands, feet, hair, and clothing away from equipment while engine is running. Stay clear of all moving parts.

CAUTION

■ Stop power unit and equipment immediately upon striking an obstruction. Turn off engine, remove key, inspect, and repair any damage before resuming operation.

■ Always wear relatively tight and belted clothing to avoid getting caught in moving parts. Wear sturdy, rough-soled work shoes and protective

equipment for eyes, hair, hands, hearing, and head; and respirator or filter mask where appropriate.

PRE-OPERATION CHECK LIST

(Owner's Responsibility)

- ___ Review and follow all safety rules and safety decal instructions, page 3 through page 5.
- ___ Check that equipment is properly and securely attached to tractor.
- ___ Check that all safety decals are installed and in good condition. Replace if damaged.
- ___ Check that all hardware is properly installed and secured.
- ___ Do not allow riders.
- ___ Make sure tractor ROPS or ROPS cab and seat belt are in good condition. Keep seat belt securely fastened during operation.

CONNECT BOX SCRAPER TO TRACTOR

This box scraper should be mounted on tractors with a maximum engine rating of 25 hp and not to exceed 2000 lbs.

This box scraper is compatible with Category 1 and Category 0, 3-point tractors equipped with side swing type lower lift arms.

Adjust or remove tractor drawbar to eliminate interference with box scraper.

Category 1

IMPORTANT

■ The 3/4" bolt and sleeve in the lower hole provide the attachment point for a Category 1 quick coupler. Do not remove this bolt and sleeve when operating the box scraper.

1. Place tractor 3-point lower lift arms over outer hitch pins.
2. Secure with klik pin (not provided) as shown in Figure 1.
3. Attach the tractor's top link to the top of the box scraper's A-frame bars.
4. Secure with the heavy-duty top link pin and retaining pin supplied with the top link as shown in Figure 2.



Figure 1. 3-Point Lower Lift Arms Connected

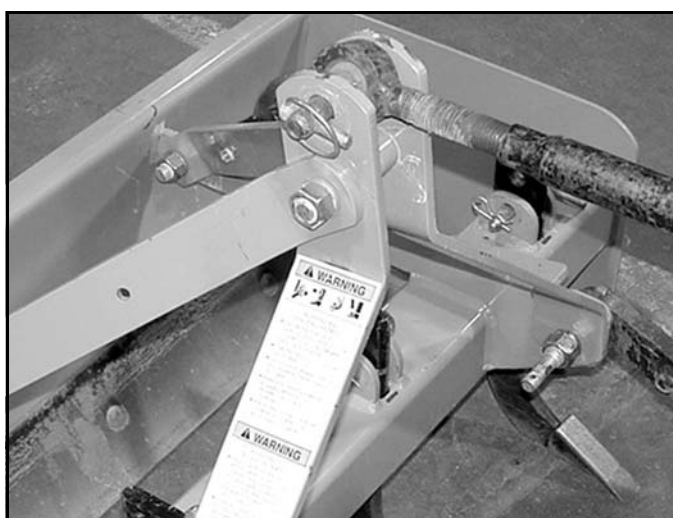


Figure 2. Top Link Connected

Category 0

1. Remove cap screw (29), sleeve (7), lock washer (27), and hex nut (26) from lower hole on A-frame bars as shown in Figure 3.
2. Replace cap screw, sleeve, lock washer, and hex nut into top hole on A-frame bars.
3. Place tractor 3-point lower lift arms over inner hitch pins.
4. Secure with safety pins (not provided).
5. Connect tractor top link by inserting tractor clevis pin into lower hitch point on A-frame bars and secure.

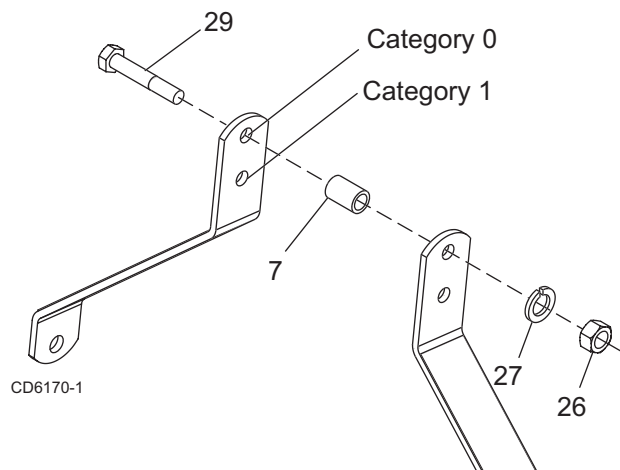


Figure 3. Sleeve Locations

Quick Hitch (Category 1 Only)

The GBC48 will attach to a Category 1 quick hitch.

1. Use Bushing Kit 1004653 when using a quick coupler. See parts section for a list of parts.
2. Place bushings over mounting pin and secure into position.
3. Align quick hitch with mounting pins and sleeve in lower hole on box scraper's A-frame bars.

ADJUSTING TOP LINK

The box scraper is leveled by adjusting the length of the tractor's top link.

- Shortening the top link will deepen the scarifier tooth penetration.
- Lengthening the top link will provide better scraping and leveling action.

Experience will allow the operator to determine the best setting for each application.

BACKFILLING

1. Raise or remove scarifier shanks (see page 9).
2. Lower the blade to the ground and back up into the fill material.
3. Shorten the top link to raise the cutting blade and control how much the blade digs in.

SCARIFYING

1. Place the scarifier shanks in position with the points facing toward the tractor.
2. Lock into position with the pins provided. The lower shank position provides the greatest ground penetration.
3. Lower the box scraper and drive the tractor ahead to begin the scarifying operation.
4. Adjust the depth of the scarifier by tilting the unit with the tractor top link. Shortening the top link will provide deeper and more aggressive operation.

SCRAPING

1. Raise or remove the scarifier shanks (see page 9). Lower the box scraper and drive forward to move material.
2. Adjust the depth of the blade by tilting the unit with the tractor top link.

NOTE: Shortening the top link when scraping will transfer more weight on the front of the scraper and will raise the cutting blade to provide a more shallow cut.

NOTE: When the top link is adjusted properly, the bowl of the blade should fill easily and material can be pulled to a desired location.

LEVELING

1. Raise or remove scarifier shanks.
2. Shorten the top link so the cutting edge clears the ground.
3. Drive forward with the box scraper in this position and loose material will be leveled.

STORAGE

- To help prevent injury caused by a falling implement, always detach on a hard level surface.
- Block equipment securely for storage (see Figure 4).
- Do not climb or lean on equipment stored on stand.

OWNER SERVICE

The information in this section is written for operators who possess basic mechanical skills. If you need help, your dealer has trained service technicians available. For your protection, read and follow the safety information in this manual.

WARNING

■ **NEVER GO UNDERNEATH EQUIPMENT.** Never place any part of the body underneath equipment or between moveable parts even when the engine has been turned off. Hydraulic system leak down, hydraulic system failures, mechanical failures, or movement of control levers can cause equipment to drop or rotate unexpectedly and cause severe injury or death.

- Service work does not require going underneath.
- Read Operator's Manual for service instructions or have service performed by a qualified dealer.

■ **Keep all persons away from operator control area while performing adjustments, service, or maintenance.**

CAUTION

■ **Always wear relatively tight and belted clothing to avoid entanglement in moving parts. Wear sturdy, rough-soled work shoes and protective equipment for eyes, hair, hands, hearing, and head.**

BLOCKING UP BOX SCRAPER

NOTE: To service the box scraper when attached to the tractor, it must be blocked up off the ground.

1. Place two 4" x 4" (10 x 10 cm) blocks under each side frame of the box scraper as shown in Figure 4.
2. Lower the box scraper to rest securely on the blocks.

NOTE: Do not block the machine any higher than needed for removing the shanks or cutting edge.

REPLACING CUTTING EDGE

To service the box scraper when attached to the tractor, it must be blocked up off the ground.

1. Place two 4" x 4" (10 x 10 cm) blocks under each side-frame of the box scraper (see Figure 4).

2. Lower the box scraper to rest securely on the blocks.

NOTE: Do not block the machine any higher than necessary to remove the shanks or cutting edge.

3. Refer to parts drawing, page 14. Remove nuts (24) and plow bolts (25) from blade. Turn cutting edge over and use new edge, or replace it if both edges have been used.
4. Attach cutting edge to box scraper and secure with plow bolts and hex nuts previously removed.
5. Torque plow bolts to 170 lbs-ft (N-m 230).

REMOVING SCARIFIER SHANKS

Scarifier shanks have three operating positions in the scraper. They may be removed if scarifying action is not needed.

1. Block up machine by placing two 4" x 4" (10 x 10 cm) blocks under each side-frame of the box scraper (see Figure 4).
2. Lower the box scraper to rest securely on the blocks.
NOTE: Do not block the machine any higher than necessary to remove the shanks or cutting edge.
3. Remove safety pin (20) and lock pin (3). Adjust scarifier (2) to desired position (see Figure 5).
4. Replace safety and lock pins.

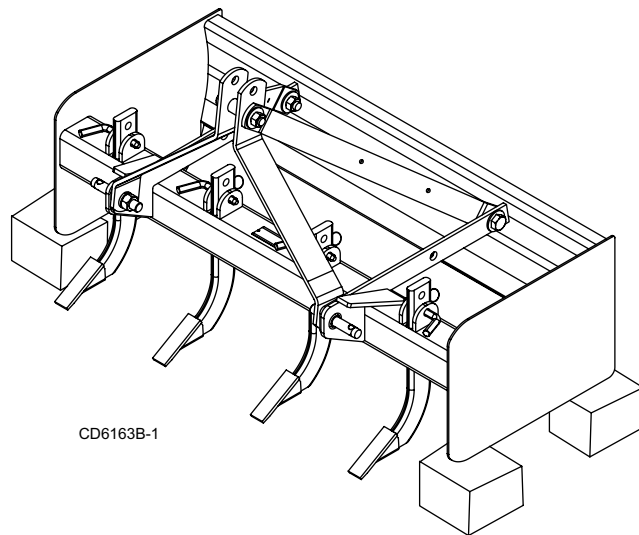


Figure 4. Box Scraper Blocked Up

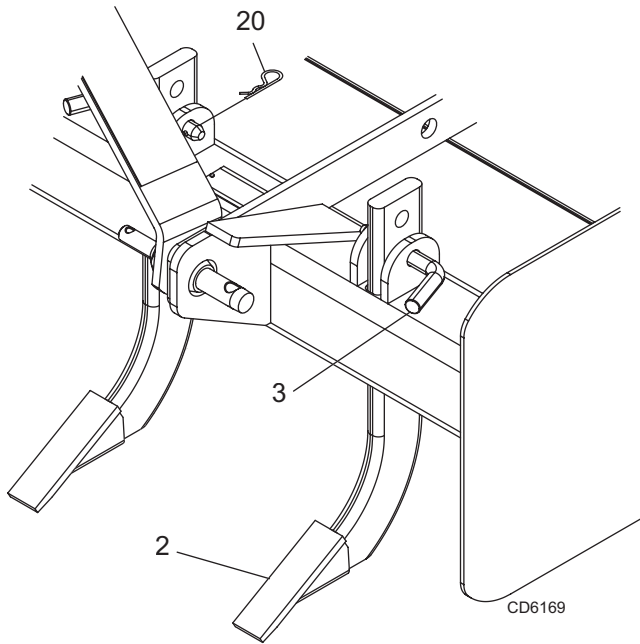


Figure 5. Scarifier Shanks Installed

REPLACING SCARIFIER TOOTH

1. Remove scarifier shank (1) from the scarifier bar.
2. Remove the worn tooth by driving a chisel between the shank (1) and tooth (2) .
3. Install replacement tooth and use a punch (3) to bend the locking tab (4) into the retaining hole on both sides of the shank (see Figure 6).
4. Reinstall the shank (1) in the scarifier bar.

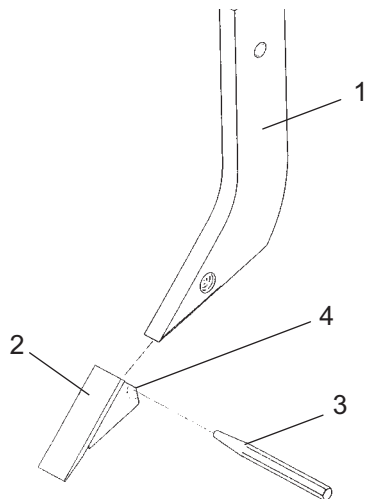


Figure 6. Scarifier Point Replacement

CLEANING

After Each Use

- Remove large debris such as clumps of dirt, grass, crop residue, etc. from machine.
- Inspect machine and replace worn or damaged parts.
- Replace any safety decals that are missing or not readable.

Periodically or Before Extended Storage

- Clean large debris such as clumps of dirt, grass, crop residue, etc. from machine.
- Remove the remainder using a low-pressure water spray.
 1. Be careful when spraying near scratched or torn safety decals or near edges of decals as water spray can peel decal off surface.
 2. Be careful when spraying near chipped or scratched paint as water spray can lift paint.
 3. If a pressure washer is used, follow the advice of the pressure washer manufacturer.
- Inspect machine and replace worn or damaged parts.
- Sand down scratches and the edges of areas missing paint and coat with Woods spray paint of matching color (purchase from your Woods dealer).
- Replace any safety decals that are missing or not readable (supplied free by your Woods dealer). See Safety Decals section for location drawing.

ASSEMBLY INSTRUCTIONS

DEALER SET-UP INSTRUCTIONS

Assembly of this Box Scraper is the responsibility of the WOODS dealer. It should be delivered to the owner completely assembled, lubricated and adjusted for normal conditions.

The Box Scraper is shipped partially assembled. Assembly will be easier if components are aligned and loosely assembled before tightening hardware. Recommended torque values for hardware are located on page 17.

WARNING

■ **Before dismounting power unit or performing any service or maintenance, follow these steps: disengage power to equipment, lower the 3-point hitch and all raised components to the ground, operate valve levers to release any hydraulic pressure, set parking brake, stop engine, remove key, and unfasten seat belt.**

■ **NEVER GO UNDERNEATH EQUIPMENT.** Never place any part of the body underneath equipment or between moveable parts even when the engine has been turned off. Hydraulic system leak-down, hydraulic system failures, mechanical failures, or movement of control levers can cause equipment to drop or rotate unexpectedly and cause severe injury or death.

- Service work does not require going underneath.
- Read Operator's Manual for service instructions or have service performed by a qualified dealer.

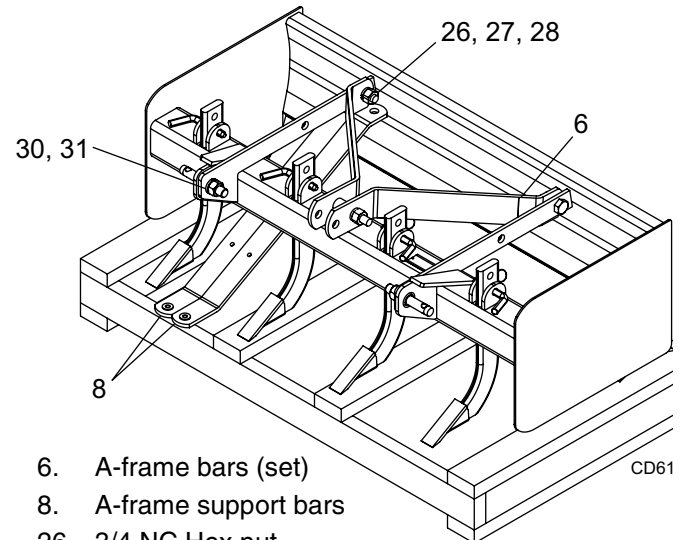
■ **Keep all persons away from operator control area while performing adjustments, service, or maintenance.**

CAUTION

■ **Always wear relatively tight and belted clothing to avoid entanglement in moving parts. Wear sturdy, rough-soled work shoes and protective equipment for eyes, hair, hands, hearing, and head; and respirator or filter mask where appropriate.**

Remove Components

1. Remove banding that holds box scraper to pallet.
2. Remove lag bolts securing A-frame support bars (8) to the pallet.
3. Remove cap screws (28), lock washers (27), and hex nuts (26) that secure A-frame bars (6) to the rear of scraper frame.
4. Remove hex nuts (31) and lock washers (30) from mounting pins.



6. A-frame bars (set)
8. A-frame support bars
26. 3/4 NC Hex nut
27. 3/4 Lock washer
28. 3/4 NC x 2 Cap screw
30. 7/8 Lock washer
31. 7/8 Hex nut

Figure 7. Shipping Configuration

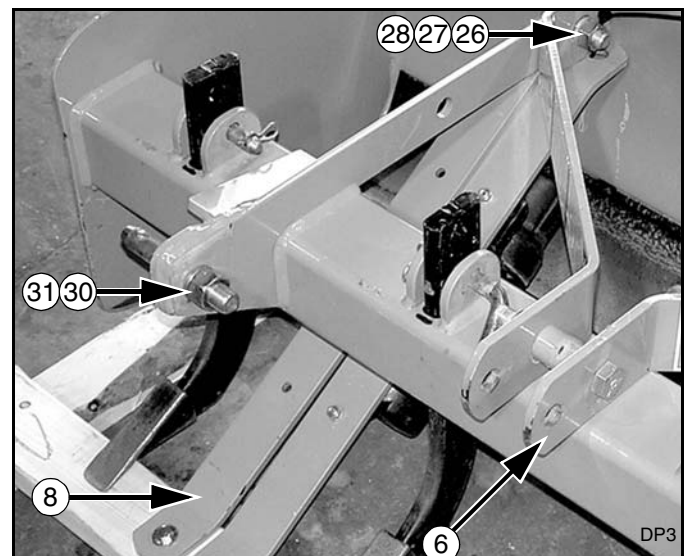
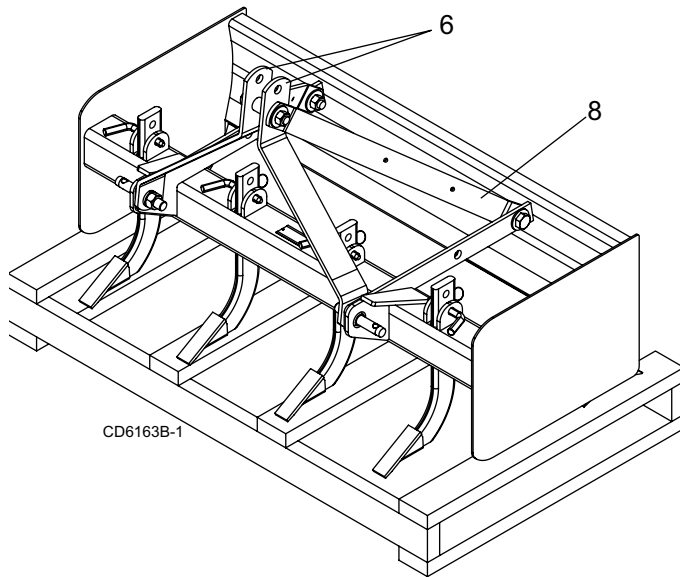


Figure 8. Remove Components

ASSEMBLE BOX SCRAPER

1. Place A-frame bars (6) over mounting pins on the inside of scraper frame.
2. Secure with lock washers (30) and hex nuts (31) previously removed from mounting pins.
3. Attach A-frame support bars (8) to the scraper frame and secure with cap screws (28), lock washers (27), and hex nuts (26) previously removed.
4. Remove cap screw (29), sleeve (7), lock washer (27), and hex nut (26) that secure the A-frame bars together.
5. Align A-frame support bars with the lower hole on A-frame bars and secure with cap screw, sleeve, lock washer, and hex nut previously removed.

NOTE: A-frame support bars must be on the outside of the A-frame bars as show in Figure 11.



6. A-frame bars (set)
7. Sleeve, .88 x 1.88 x 1.25
8. A-frame support bars
26. 3/4 NC Hex nut
27. 3/4 Lock washer
28. 3/4 NC x 2 Cap screw
29. 3/4 NC x 4-1/2 Cap screw
30. 7/8 Lock washer
31. 7/8 Hex nut

Figure 9. Box Scraper Assembly

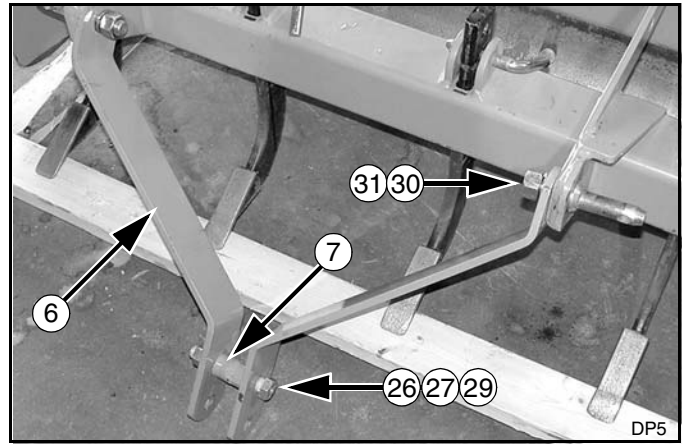


Figure 10. A-frame Bars Assembled

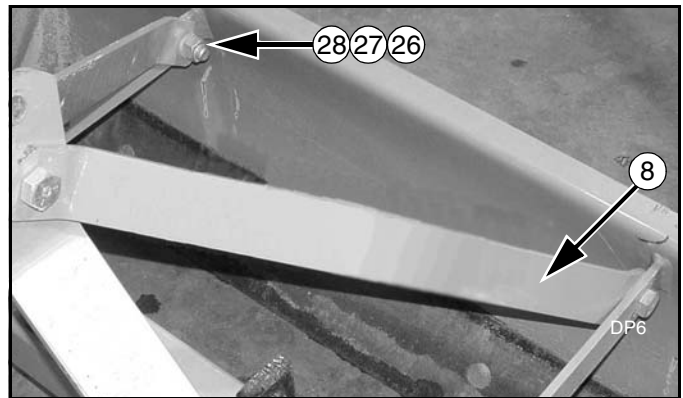


Figure 11. A-frame Support Bars Assembled to A-frame Bars

OPTIONAL QUICK HITCH PIN KIT 1004653

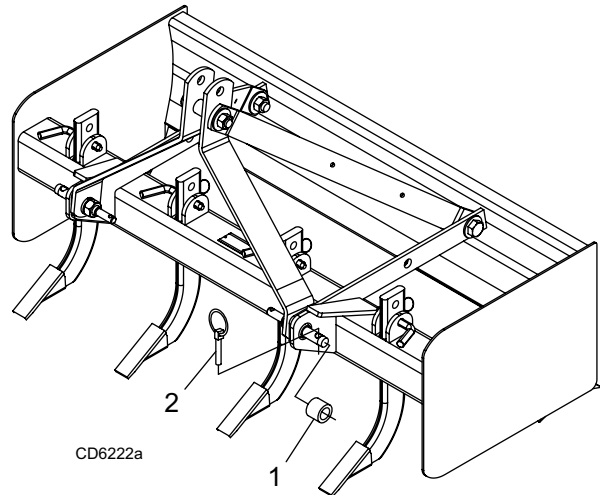


Figure 12. Optional Quick Hitch Pin Kit

Install sleeve (1) over lower 3-point pin and secure with klik pin (2).

DEALER CHECK LISTS

PRE-DELIVERY CHECK LIST

Inspect the equipment thoroughly after assembly to ensure it is set up properly before delivering it to the customer.

The following check lists are a reminder of points to inspect. Check off each item as it is found satisfactory or after proper adjustment is made.

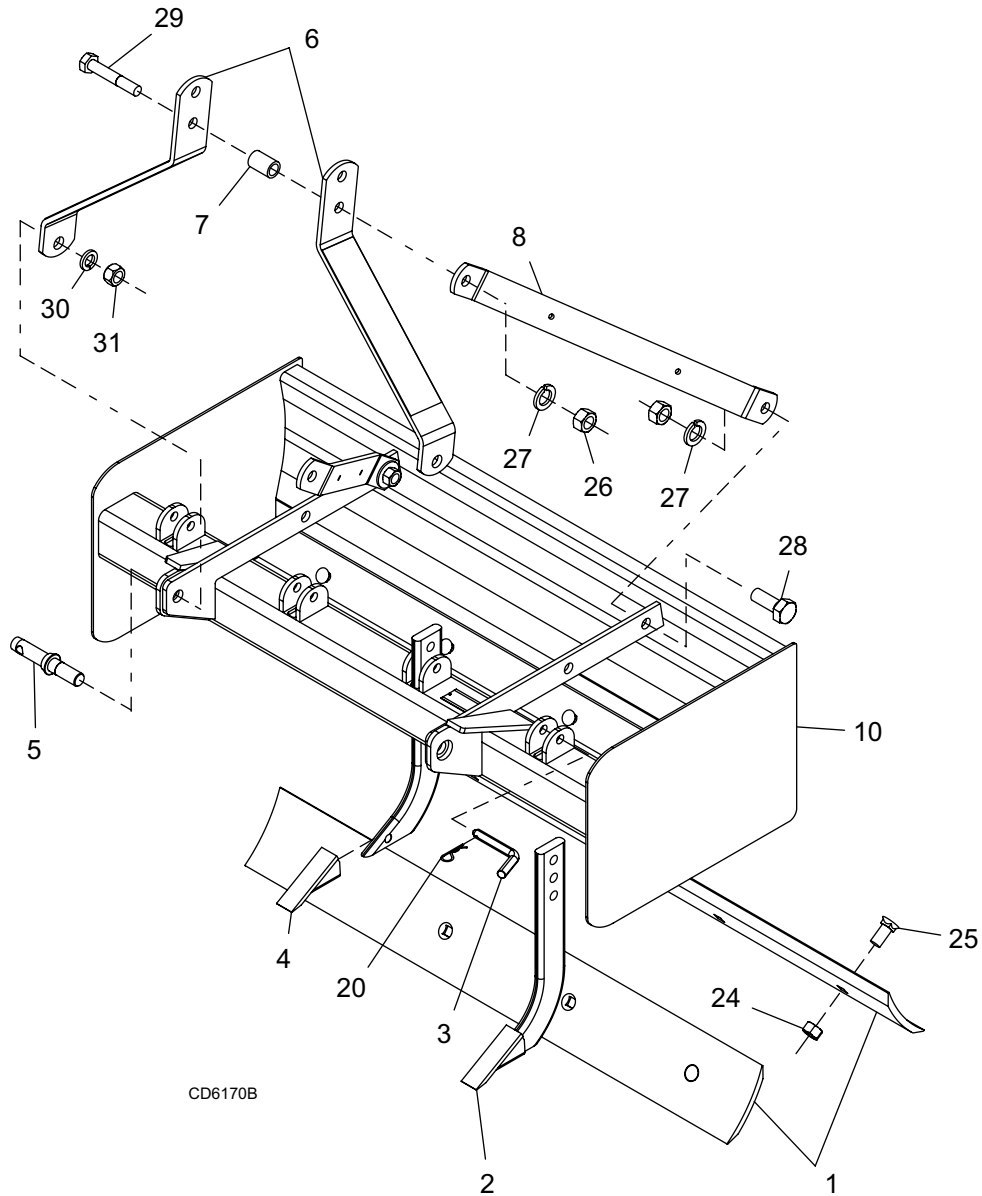
- ___ Check that all safety decals are installed and in good condition. Replace if damaged.
- ___ Properly attach implement to tractor and make all necessary adjustments.
- ___ Check all bolts to be sure they are properly torqued.
- ___ Check that all cotter pins and safety pins are properly installed. Replace if damaged.

DELIVERY CHECK LIST

(Dealer's Responsibility)

- ___ Show customer how to make adjustments.
- ___ Point out the safety decals. Explain their meaning and the need to keep them in place and in good condition. Emphasize the increased safety hazards when instructions are not followed.
- ___ Present Operator's Manual and request that customer and all operators read it before operating equipment. Point out the manual safety rules, explain their meanings and emphasize the increased safety hazards that exist when safety rules are not followed.
- ___ Explain to customer the potential crushing hazards of going underneath raised equipment. Instruct customer that service work does not require going underneath unit and never to do so.
- ___ Show customer the safe, proper procedures to be used when mounting, dismounting, and storing equipment.
- ___ For mounted units, add wheel weights, ballast in front tires, and/or front tractor weight to enhance front end stability. A minimum 20% of tractor and equipment gross weight must be on front tractor wheels. When adding weight to attain 20% of tractor and equipment weight on front tractor wheels, you must not exceed the ROPS weight certification. Weigh the tractor and equipment. Do not estimate!
- ___ Make customer aware of optional equipment available so that customer can make proper choices as required.

GBC48 BOX SCRAPER

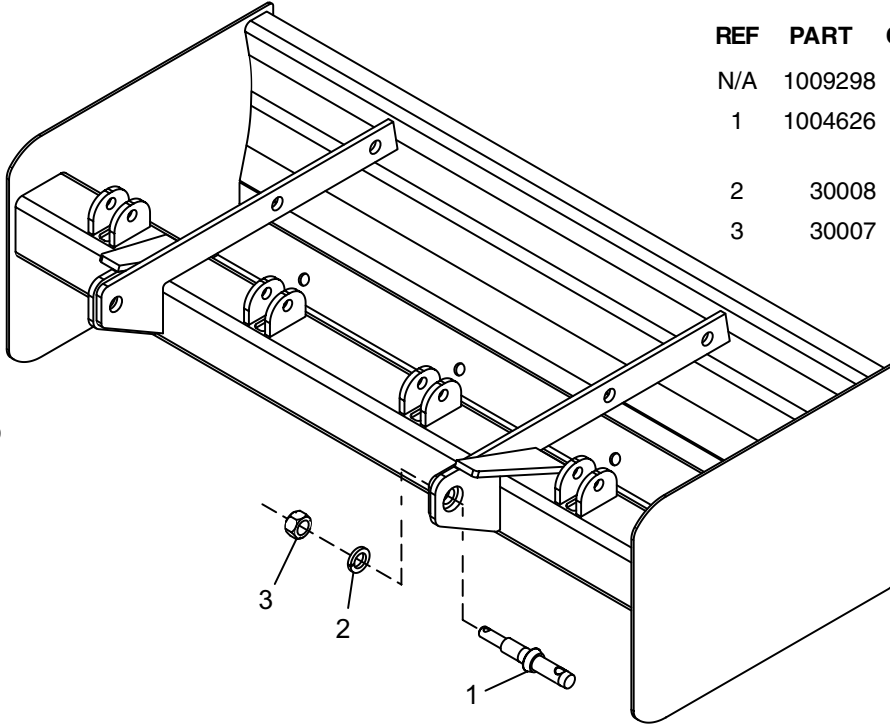


REF	PART	QTY	DESCRIPTION	REF	PART	QTY	DESCRIPTION
1	32295	2	Cutting edge, 1/2 x 6 x 47	25	25265	8	5/8 NC x 1-1/2 Plow bolt
2	1004635	4	Scarifier & tip assembly (includes item 4)	26	1450	3	3/4 NC Hex nut
3	1005338	4	Bent pin, .62 x 3.0 w/clip	27	2522	3	3/4 Lock washer
4	1004636	4	Scarifier tip	28	735	2	3/4 NC x 2 Cap screw GR5
5	33661	2	Hitch pin, Cat 1 w/nut & lock washer	29	12558	1	3/4 NC x 4-1/2 Cap screw GR5
6	1004652	1	A-frame bars set (includes both bars & decals)	30	30008	2	7/8 Lock washer
7	1003876	1	Sleeve, .88 x 1.88 x 1.25	31	30007	2	7/8 NF Hex nut
8	1003872	2	A-frame support	N/S	1004654	1	Decal set, GBC complete
10	N/A	1	Scraper frame	N/S	1004655	1	Decal set, Safety complete
20	2688	4	Hair pin cotter, 5/32				N/S Not Shown
24	230	8	5/8 NC Hex nut				N/A Not Available

14 Parts

MAN0179 (Rev. 4/29/2005)

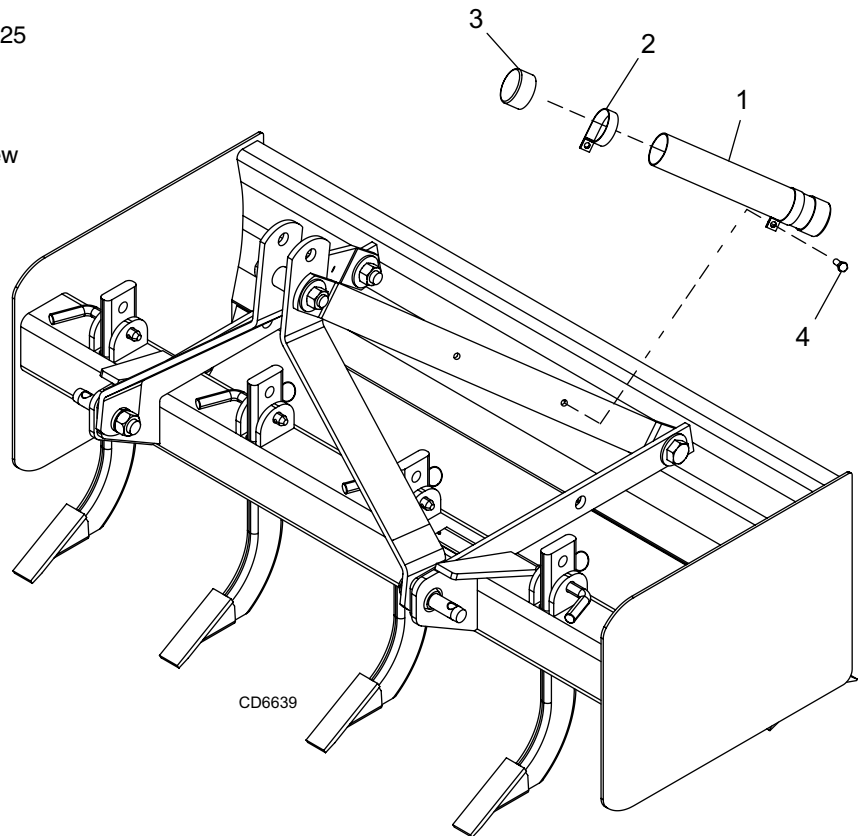
1009298 HITCH PIN KIT (OPTIONAL)



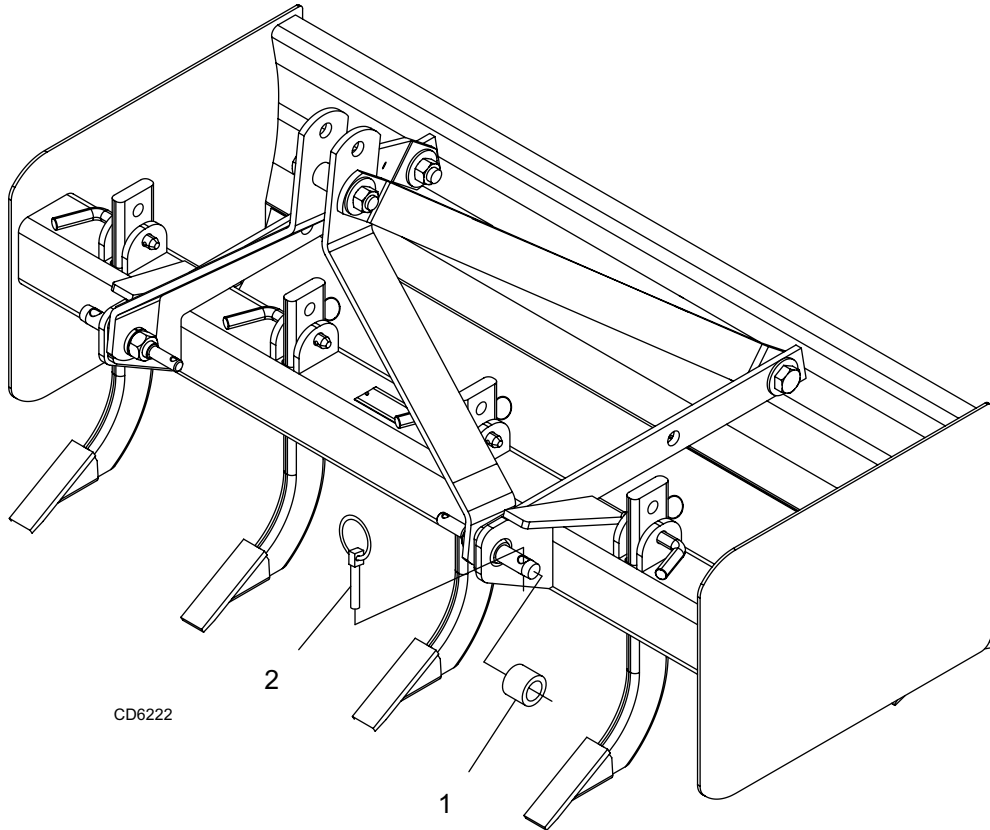
REF	PART	QTY	DESCRIPTION
N/A	1009298	1	Kit, Cat 0/1 hitch pin
1	1004626	2	Hitch pin Cat 0/1 (includes items 2 & 3)
2	30008	2	7/8 Lock washer
3	30007	2	7/8 Hex nut NF

1009297 MANUAL TUBE KIT (OPTIONAL)

REF	PART	QTY	DESCRIPTION
1	1004656	1	Manual tube PVC 2.0 x 11.25
2	1004695	2	Clamp 1.94 diameter pipe
3	1004657	2	Caplug 2.00 ID x 1.00
4	30036	2	5/16 NC x 3/4 Self tap screw



1004653 QUICK HITCH BUSHING KIT (OPTIONAL)



REF	PART	QTY	DESCRIPTION
1	1004660	2	Sleeve .938 x 1.438 x 1.19
2	27542	2	7/16 x 11/32 Klik pin

BOLT TORQUE CHART

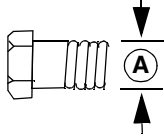
Always tighten hardware to these values unless a different torque value or tightening procedure is listed for a specific application.

Fasteners must always be replaced with the same grade as specified in the manual parts list.

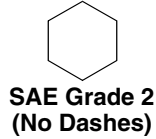
Always use the proper tool for tightening hardware: SAE for SAE hardware and Metric for metric hardware.

Make sure fastener threads are clean and you start thread engagement properly.

All torque values are given to specifications used on hardware defined by SAE J1701 MAR99 & J1701M JUL96.



SAE SERIES TORQUE CHART



SAE Bolt Head Identification

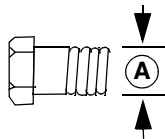


SAE Grade 5
(3 Radial Dashes)

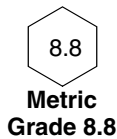


SAE Grade 8
(6 Radial Dashes)

A Diameter (Inches)	Wrench Size	MARKING ON HEAD					
		SAE 2		SAE 5		SAE 8	
		lbs-ft	N-m	lbs-ft	N-m	lbs-ft	N-m
1/4"	7/16"	6	8	10	13	14	18
5/16"	1/2"	12	17	19	26	27	37
3/8"	9/16"	23	31	35	47	49	67
7/16"	5/8"	36	48	55	75	78	106
1/2"	3/4"	55	75	85	115	120	163
9/16"	13/16"	78	106	121	164	171	232
5/8"	15/16"	110	149	170	230	240	325
3/4"	1-1/8"	192	261	297	403	420	569
7/8"	1-5/16"	306	416	474	642	669	907
1"	1-1/2"	467	634	722	979	1020	1383



METRIC SERIES TORQUE CHART



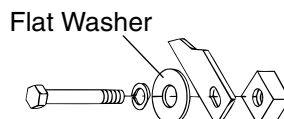
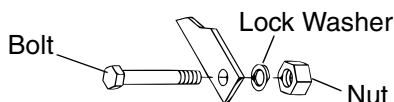
Metric Bolt Head Identification



10.9
Metric
Grade 10.9

A Diameter & Thread Pitch (Millimeters)	Wrench Size	COARSE THREAD				FINE THREAD				A Diameter & Thread Pitch (Millimeters)
		MARKING ON HEAD								
		Metric 8.8		Metric 10.9		Metric 8.8		Metric 10.9		
		N-m	lbs-ft	N-m	lbs-ft	N-m	lbs-ft	N-m	lbs-ft	
6 x 1.0	10 mm	8	6	11	8	8	6	11	8	6 x 1.0
8 x 1.25	13 mm	20	15	27	20	21	16	29	22	8 x 1.0
10 x 1.5	16 mm	39	29	54	40	41	30	57	42	10 x 1.25
12 x 1.75	18 mm	68	50	94	70	75	55	103	76	12 x 1.25
14 x 2.0	21 mm	109	80	151	111	118	87	163	120	14 x 1.5
16 x 2.0	24 mm	169	125	234	173	181	133	250	184	16 x 1.5
18 x 2.5	27 mm	234	172	323	239	263	194	363	268	18 x 1.5
20 x 2.5	30 mm	330	244	457	337	367	270	507	374	20 x 1.5
22 x 2.5	34 mm	451	332	623	460	495	365	684	505	22 x 1.5
24 x 3.0	36 mm	571	421	790	583	623	459	861	635	24 x 2.0
30 x 3.0	46 mm	1175	867	1626	1199	1258	928	1740	1283	30 x 2.0

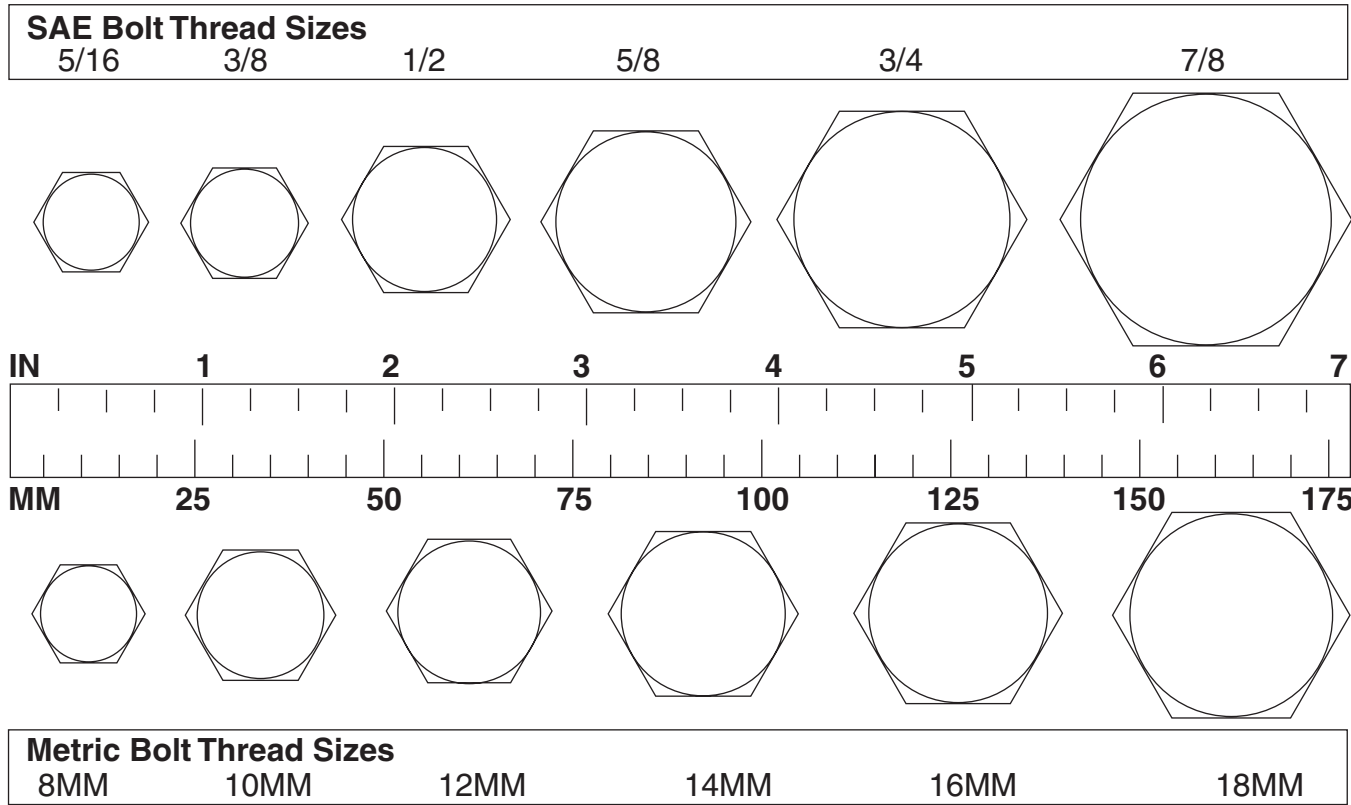
Typical Washer Installations



8/9/00

BOLT SIZE CHART

NOTE: Chart shows bolt thread sizes and corresponding head (wrench) sizes for standard SAE and metric bolts.



ABBREVIATIONS

AG..... Agriculture
 ATF Automatic Transmission Fluid
 BSPP British Standard Pipe Parallel
 BSPTM British Standard Pipe Tapered Male
 CV..... Constant Velocity
 CCW Counter-Clockwise
 CW..... Clockwise
 F Female
 GA Gauge
 GR (5, etc.) Grade (5, etc.)
 HHCS Hex Head Cap Screw
 HT Heat-Treated
 JIC Joint Industry Council 37° Degree Flare
 LH Left Hand
 LT Left
 m..... Meter
 mm..... Millimeter
 M..... Male
 MPa Mega Pascal
 N Newton

NC National Coarse
 NF..... National Fine
 NPSM National Pipe Straight Mechanical
 NPT National Pipe Tapered
 NPT SWF National Pipe Tapered Swivel Female
 ORBM O-Ring Boss - Male
 P Pitch
 PBY Power-Beyond
 psi Pounds per Square Inch
 PTO Power Take Off
 QD Quick Disconnect
 RH Right Hand
 ROPS..... Roll-Over Protective Structure
 RPM..... Revolutions Per Minute
 RT Right
 SAE Society of Automotive Engineers
 UNC..... Unified Coarse
 UNF Unified Fine
 UNS Unified Special



WARRANTY

(All Models Except Mow'n Machine™ Zero-Turn Mowers and Woods Boundary™ Utility Vehicles)

Please Enter Information Below and Save for Future Reference.

Date Purchased: _____

From (Dealer): _____

Model Number: _____

Serial Number: _____

Woods Equipment Company ("WOODS") warrants this product to be free from defect in material and workmanship. Except as otherwise set forth below, the duration of this Warranty shall be for TWELVE (12) MONTHS COMMENCING ON THE DATE OF DELIVERY OF THE PRODUCT TO THE ORIGINAL PURCHASER.

The warranty periods for certain gearboxes are listed below:

Model No.	Part Warranted	Duration
PHD25, PHD35, PHD65, PHD95, 1260, 2120, 2162, 3180, 3240, BB48, BB60, BB72, BB84, BB600, BB720, BB840, BB6000, BB7200, BB8400, BW180, DS96, DS120, RCC42, RM550-2, RM660-2, RM990-3, PRD6000, PRD7200, PRD8400, 7144RD-2, 9180RD-2, 9204RD-2	Gearbox components	5 years from the date of delivery to the original purchaser.
RDC54, RD60, RD72	Gearbox components	3 years from the date of delivery to the original purchaser.
BW180, DS96, DS120, RDC54, RD60, RD72	Gearbox components	1 year from the date of delivery to the original purchaser if used in rental or commercial applications.

Under no circumstances will this Warranty apply in the event that the product, in the good faith opinion of WOODS, has been subjected to improper operation, improper maintenance, misuse, or an accident. This Warranty does not apply in the event that the product has been materially modified or repaired by someone other than WOODS, a WOODS authorized dealer or distributor, and/or a WOODS authorized service center. This Warranty does not cover normal wear or tear, or normal maintenance items. This Warranty also does not cover repairs made with parts other than those obtainable through WOODS.

This Warranty is extended solely to the original purchaser of the product. Should the original purchaser sell or otherwise transfer this product to a third party, this Warranty does not transfer to the third party purchaser in any way. There are no third party beneficiaries of this Warranty.

WOODS makes no warranty, express or implied, with respect to engines, batteries, tires or other parts or accessories not manufactured by WOODS. Warranties for these items, if any, are provided separately by their respective manufacturers.

WOODS' obligation under this Warranty is limited to, at WOODS' option, the repair or replacement, free of charge, of the product if WOODS, in its sole discretion, deems it to be defective or in noncompliance with this Warranty. **The product must be returned to WOODS with proof of purchase within thirty (30) days after such defect or noncompliance is discovered or should have been discovered, routed through the dealer and distributor from whom the purchase was made, transportation charges prepaid.** WOODS shall complete such repair or replacement within a reasonable time after WOODS receives the product. THERE ARE NO OTHER REMEDIES UNDER THIS WARRANTY. THE REMEDY OF REPAIR OR REPLACEMENT IS THE SOLE AND EXCLUSIVE REMEDY UNDER THIS WARRANTY.

THERE ARE NO WARRANTIES WHICH EXTEND BEYOND THE DESCRIPTION ON THE FACE OF THIS WARRANTY. WOODS MAKES NO OTHER WARRANTY, EXPRESS OR IMPLIED, AND WOODS SPECIFICALLY DISCLAIMS ANY IMPLIED WARRANTY OF MERCHANTABILITY AND/OR ANY IMPLIED WARRANTY OF FITNESS FOR A PARTICULAR PURPOSE.

WOODS shall not be liable for any incidental or consequential losses, damages or expenses, arising directly or indirectly from the product, whether such claim is based upon breach of contract, breach of warranty, negligence, strict liability in tort or any other legal theory. Without limiting the generality of the foregoing, Woods specifically disclaims any damages relating to (i) lost profits, business, revenues or goodwill; (ii) loss of crops; (iii) loss because of delay in harvesting; (iv) any expense or loss incurred for labor, supplies, substitute machinery or rental; or (v) any other type of damage to property or economic loss.

This Warranty is subject to any existing conditions of supply which may directly affect WOODS' ability to obtain materials or manufacture replacement parts.

No agent, representative, dealer, distributor, serviceperson, salesperson, or employee of any company, including without limitation, WOODS, its authorized dealers, distributors, and service centers, is authorized to alter, modify, or enlarge this Warranty.

Answers to any questions regarding warranty service and locations may be obtained by contacting:

Woods Equipment Company

2606 South Illinois Route 2
Post Office Box 1000
Oregon, Illinois 61061

815-732-2141 tel
815-732-7580 fax
www.WoodsEquipment.com



ALITEC™

BMP®

CENTRAL FABRICATORS®

GANNON®

GILL®

WAIN-ROY®

WOODS®



WARRANTY

(Replacement Parts For All Models Except Mow'n Machine™
Zero-Turn Mowers and Woods Boundary™ Utility Vehicles)

Woods Equipment Company ("WOODS") warrants this product to be free from defect in material and workmanship for a period of ninety (90) days from the date of delivery of the product to the original purchaser with the exception of V-belts, which will be free of defect in material and workmanship for a period of 12 months.

Under no circumstances will this Warranty apply in the event that the product, in the good faith opinion of WOODS, has been subjected to improper operation, improper maintenance, misuse, or an accident. This Warranty does not cover normal wear or tear, or normal maintenance items.

This Warranty is extended solely to the original purchaser of the product. Should the original purchaser sell or otherwise transfer this product to a third party, this Warranty does not transfer to the third party purchaser in any way. There are no third party beneficiaries of this Warranty.

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WOODS shall not be liable for any incidental or consequential losses, damages or expenses, arising directly or indirectly from the product, whether such claim is based upon breach of contract, breach of warranty, negligence, strict liability in tort or any other legal theory. Without limiting the generality of the foregoing, Woods specifically disclaims any damages relating to (i) lost profits, business, revenues or goodwill; (ii) loss of crops; (iii) loss because of delay in harvesting; (iv) any expense or loss incurred for labor, supplies, substitute machinery or rental; or (v) any other type of damage to property or economic loss.

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