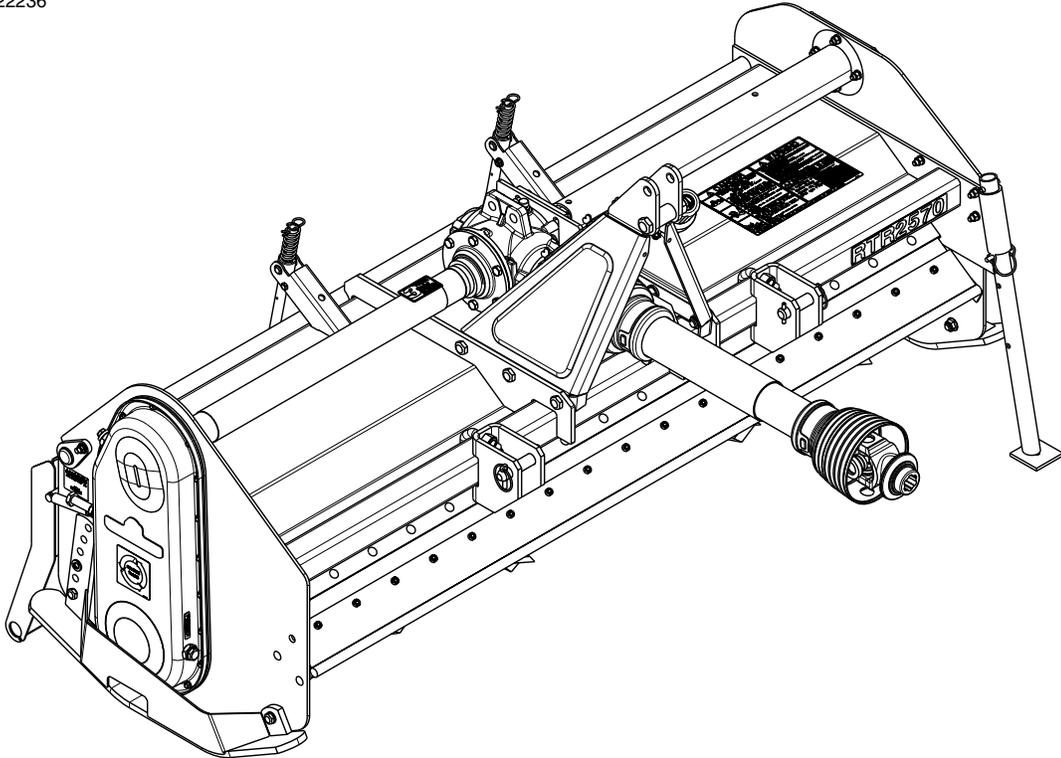


# Rotary Tillers

RTR2570

22236



## 311-251M Operator's Manual



Read the Operator's Manual entirely. When you see this symbol, the subsequent instructions and warnings are serious - follow without exception. Your life and the lives of others depend on it!

**Cover photo may show optional equipment not supplied with standard unit.**

**For an Operator's Manual and Decal Kit in French Language, please see your Land Pride dealer.**





## Machine Identification

Record your machine details in the log below. If you replace this manual, be sure to transfer this information to the new manual.

If you, or the dealer, have added Options not originally ordered with the machine, or removed Options that were originally ordered, the weights and measurements are no longer accurate for your machine. Update the record by adding the machine weight and measurements provided in the Specifications & Capacities Section of this manual with the Option(s) weight and measurements.

<b>Model Number</b>	
<b>Serial Number</b>	
<b>Machine Height</b>	
<b>Machine Length</b>	
<b>Machine Width</b>	
<b>Machine Weight</b>	
<b>Delivery Date</b>	
<b>First Operation</b>	
<b>Accessories</b>	<hr/> <hr/> <hr/>

## Dealer Contact Information

**Name:** \_\_\_\_\_

**Street:** \_\_\_\_\_

**City/State:** \_\_\_\_\_

**Telephone:** \_\_\_\_\_

**Email:** \_\_\_\_\_

### California Proposition 65

 **WARNING:** Handling passenger or off-highway motor vehicle parts can expose you to chemicals such as phthalates and lead, which can cause cancer and reproductive harm. To minimize exposure, service the vehicle in a well-ventilated area, wear gloves, and wash your hands. For more information see [www.P65Warnings.ca.gov/motor-vehicle-parts](http://www.P65Warnings.ca.gov/motor-vehicle-parts).



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Printed in the United States of America.



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See previous page for Table of contents.



### ***Parts Manual QR Locator***

The QR (Quick Reference) code on the left will take you to the Parts Manual for this equipment. Download the appropriate App on your smart phone, open the App, point your phone on the QR code and take a picture.



### ***Dealer QR Locator***

The QR code on the left will link you to available dealers for Land Pride products. Refer to Parts Manual QR Locator on this page for detailed instructions.

Listed below are common practices that may or may not be applicable to the products described in this manual.

### Safety at All Times

Careful operation is your best assurance against an accident.

All operators, no matter how much experience they may have, should carefully read this manual and other related manuals before operating the power machine and this implement.

- ▲ Thoroughly read and understand the "Safety Label" section. Read all instructions noted on them.
- ▲ Do not operate the equipment while under the influence of drugs or alcohol, as they impair your ability to safely and properly operate the equipment.
- ▲ The operator should be familiar with all functions of the tractor and attached implement, and be able to handle emergencies quickly.
- ▲ Make sure all guards and shields appropriate for the operation are in place and secured before operating the implement.
- ▲ Keep all bystanders away from equipment and work area.
- ▲ Start tractor from the driver's seat with hydraulic controls in neutral.
- ▲ Operate tractor and controls from the driver's seat only.
- ▲ Never dismount from a moving tractor or leave tractor unattended with engine running.
- ▲ Do not allow anyone to stand between the implement and tractor while backing up to the implement.
- ▲ Keep hands, feet, and clothing away from power-driven parts.
- ▲ While transporting and operating equipment, watch out for objects overhead and along the sides such as fences, trees, buildings, wires, etc.
- ▲ Do not turn tractor so tight as to cause hitched implement to ride up on the tractor's rear wheel.
- ▲ Store implement in a safe and secure area where children normally do not play. When needed, secure implement against falling with support blocks.



### Look for the Safety Alert Symbol

The SAFETY ALERT SYMBOL indicates there is a potential hazard to personal safety and extra precaution must be taken. When you see this symbol, be alert and carefully read the message that follows it. Hazard control, and accident prevention are dependent upon the awareness, concern, prudence, and proper training of personnel involved in the operation, transport, maintenance, and storage of equipment.

### Be Aware of Signal Words

A signal word designates a degree or level of hazard seriousness. They are:

- ▲ **DANGER:** Indicates a hazardous situation that, if not avoided, will result in death or serious injury.
- ▲ **WARNING:** Indicates a hazardous situation that, if not avoided, could result in death or serious injury.
- ▲ **CAUTION:** Indicates a hazardous situation that, if not avoided, may result in minor or moderate injury.

### Be Aware of Special Notices

Special notices are intended to point out important and helpful information that should be followed. They are usually placed inside a box. They are:

- ▲ **IMPORTANT:** Indicates that equipment or property damage could result if instructions are not followed.
- ▲ **NOTE:** Indicates supplementary explanations that will be helpful when using the equipment.

### Safety Precautions for Children

**Tragedy can occur if the operator is not alert to the presence of children, Children generally are attracted to implements and their work.**

- ▲ Never assume children will remain where you last saw them.
- ▲ Keep children out of the work area and under the watchful eye of a responsible adult.
- ▲ Be alert and shut the implement and tractor down if children enter the work area.
- ▲ Never carry children on the tractor or implement. There is not a safe place for them to ride. They may fall off and be run over or interfere with the control of the power machine.
- ▲ Never allow children to operate the power machine, even under adult supervision.
- ▲ Never allow children to play on the power machine or implement.
- ▲ Use extra caution when backing up. Before the tractor starts to move, look down and behind to make sure the area is clear.

### Tractor Shutdown & Storage

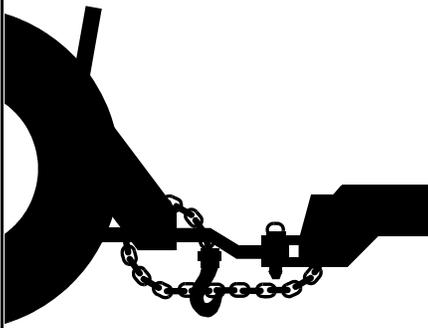
- ▲ If engaged, disengage power take-off.
- ▲ Park on solid, level ground and lower implement to ground or onto support blocks.
- ▲ Put tractor in park or set park brake.
- ▲ Turn off engine and remove ignition key to prevent unauthorized starting.
- ▲ Relieve all hydraulic pressure to auxiliary hydraulic lines.
- ▲ Wait for all components to stop before leaving operator's seat.
- ▲ Use steps, grab-handles and anti-slip surfaces when stepping on and off the tractor.



Listed below are common practices that may or may not be applicable to the products described in this manual.

### Use A Safety Chain

- ▲ A safety chain will help control drawn machinery should it separate from the tractor drawbar.
- ▲ Use a chain with the strength rating equal to or greater than the gross weight of the towed implement.
- ▲ Attach the chain to the tractor drawbar support or other specified anchor location. Allow only enough slack in the chain to permit turning.
- ▲ Always hitch the implement to the machine towing it. Do not use the safety chain to tow the implement.



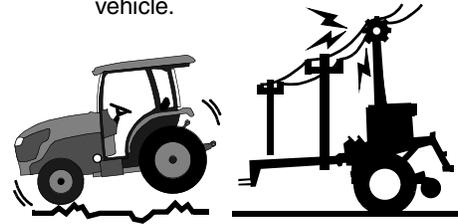
### Towing Safely

- ▲ Comply with federal, state, and local laws.
- ▲ Use towing vehicle and trailer of adequate size and capacity. Secure equipment towed on a trailer with chocks, tie downs, and chains.
- ▲ **IMPORTANT:** Do not tow a load that is more than double the weight of the vehicle towing the load.
- ▲ Sudden braking can cause a towed trailer to swerve unexpectedly. Reduce speed if trailer is not equipped with brakes.



### Transport Safely

- ▲ Comply with federal, state, and local laws.
- ▲ Avoid contact with any overhead utility lines or electrically charged conductors.
- ▲ Engage park brake when stopped on an incline.
- ▲ Maximum transport speed for an implement is 20 mph (32 km/h). **DO NOT EXCEED.**
- ▲ Never travel at a speed which does not allow adequate control of steering and stopping. Some rough terrains require a slower speed. Sudden braking can cause a towed load to swerve and upset.
- ▲ Do not tow an implement that, when fully loaded, weights more than 1.5 times the weight of towing vehicle.



### Tire Safety

- ▲ Tire changing can be dangerous and must be performed by trained personnel using the correct tools and equipment.
- ▲ Always properly match the wheel size to the properly sized tire.
- ▲ Always maintain correct tire pressure. Do not inflate tires above recommended pressures shown in the Operator's Manual.
- ▲ When inflating tires, use a clip-on chuck and extension hose long enough to allow you to stand to one side and NOT in front of or over the tire assembly. Use a safety cage if available.
- ▲ Securely support the implement when changing a wheel.
- ▲ When removing and installing wheels, use wheel handling equipment adequate for the weight involved.
- ▲ Make sure wheel bolts have been tightened to the specified torque.



### Practice Safe Maintenance

- ▲ Understand procedure before doing work. Refer to the Operator's Manual for additional information.
- ▲ Work on a level surface in a clean, dry area that is well-lit.
- ▲ Lower implement to the ground and follow all shutdown procedures before leaving the operator's seat to perform maintenance.
- ▲ Do not work under any hydraulically supported equipment. It can settle, suddenly leak down, or be lowered accidentally. If it is necessary to work under the equipment, securely support it with stands or suitable blocking beforehand.
- ▲ Use properly grounded electrical outlets and tools.
- ▲ Use correct tools and equipment for the job that are in good condition.
- ▲ Allow equipment to cool before working on it.

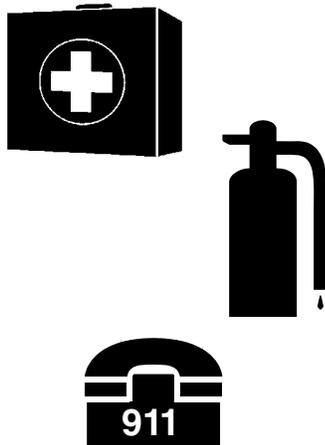
- ▲ Disconnect battery ground cable (-) before servicing or adjusting electrical systems or before welding on implement.
- ▲ Inspect all parts. Make certain parts are in good condition & installed properly.
- ▲ Replace parts on this implement with genuine Land Pride parts only. Do not alter this implement in a way which will adversely affect its performance.
- ▲ Do not grease or oil implement while it is in operation.
- ▲ Remove buildup of grease, oil, or debris.
- ▲ Always make sure any material and waste products from the repair and maintenance of the implement are properly collected and disposed of.
- ▲ Remove all tools and unused parts from equipment before operation.
- ▲ Do not weld or torch on galvanized metal as it will release toxic fumes.



Listed below are common practices that may or may not be applicable to the products described in this manual.

### Prepare for Emergencies

- ▲ Be prepared if a fire starts.
- ▲ Keep a first aid kit and fire extinguisher handy.
- ▲ Keep emergency numbers for doctor, ambulance, hospital, and fire department near the phone.



### Wear Personal Protective Equipment (PPE)

- ▲ Wear protective clothing and equipment appropriate for the job such as safety shoes, safety glasses, hard hat, dust mask, and ear plugs.
- ▲ Clothing should fit snug without fringes and pull strings to avoid entanglement with moving parts.
- ▲ Prolonged exposure to loud noise can cause hearing impairment or hearing loss. Wear suitable hearing protection such as earmuffs or earplugs.
- ▲ Operating a machine safely requires the operator's full attention. Avoid wearing headphones while operating equipment.



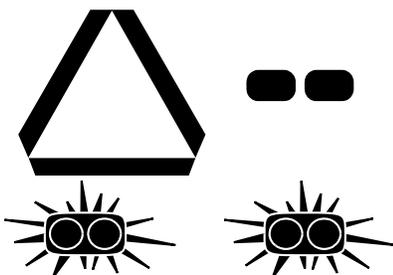
### Avoid High Pressure Fluids

- ▲ Escaping fluid under pressure will penetrate the skin or eyes causing serious injury.
- ▲ Relieve all residual pressure before disconnecting hydraulic lines or performing work on the hydraulic system.
- ▲ Make sure all hydraulic fluid connections are properly tightened/torqued and all hydraulic hoses and lines are in good condition before applying pressure to the system.
- ▲ Use a piece of paper or cardboard, NOT BODY PARTS, to check for suspected leaks.
- ▲ Wear protective gloves and safety glasses or goggles when working with hydraulic systems.
- ▲ **DO NOT DELAY.** If an accident occurs, seek immediate emergency medical care or gangrene may result.



### Use Safety Lights and Devices

- ▲ A slow moving power machine can create a hazard when driven on public roads. They are difficult to see, especially at night.
- ▲ Flashing warning lights and turn signals are recommended whenever driving on public roads.
- ▲ For tractors and other agriculture equipment, a Slow Moving Vehicle (SMV) sign is required when traveling on public roads.



### Use Seat Belt and ROPS

- ▲ Land Pride recommends the use of a CAB or roll-over-protective-structures (ROPS) and seat belt in almost all power machines. Combination of a CAB or ROPS and seat belt will reduce the risk of serious injury or death if the power machine should be upset.
- ▲ If ROPS is in the locked-up position, fasten seat belt snugly and securely to help protect the operator against serious injury or death from falling and/or machine overturn.



### Keep Riders Off Machinery

- ▲ Never carry riders on the tractor or implement.
- ▲ Riders obstruct operator's view and interfere with the control of the power machine.
- ▲ Riders can be struck by objects or thrown from the equipment.
- ▲ Never use the tractor or implement to lift or transport riders.



Listed below are common practices that may or may not be applicable to the products described in this manual.

### Avoid Crystalline Silica (Quartz) Dust

Because crystalline silica is a basic component of sand and granite, many activities at construction sites produce dust containing crystalline silica. Trenching, sawing, and boring of material containing crystalline silica can produce dust containing crystalline silica particles. This dust can cause serious injury to the lungs (silicosis).

There are guidelines which should be followed if crystalline silica (quartz) is present in the dust.



- ▲ Be aware of and follow OSHA (or other local, State, or Federal) guidelines for exposure to airborne crystalline silica.
- ▲ Know the work operations where exposure to crystalline silica may occur.
- ▲ Participate in air monitoring or training programs offered by the employer.
- ▲ Be aware of and use optional equipment controls such as water sprays, local exhaust ventilation, and enclosed cabs with positive pressure air conditioning if the machine has such equipment. Otherwise respirators shall be worn.
- ▲ Where respirators are required, wear a respirator approved for protection against crystalline silica containing dust. Do not alter respirator in any way. Workers who use tight-fitting respirators can not have beards/mustaches which interfere with the respirator seal to the face.
- ▲ If possible, change into disposable or washable work clothes at the work site; shower and change into clean clothing before leaving the work site.
- ▲ Do not eat, drink, use tobacco products, or apply cosmetics in areas where there is dust containing crystalline silica.
- ▲ Store food, drink, and personal belongings away from the work area.
- ▲ Wash hands and face before eating, drinking, smoking, or applying cosmetics after leaving the exposure area.

### Handle Chemicals Properly

- ▲ Protective clothing should be worn.
- ▲ Handle all chemicals with care.
- ▲ Follow instructions on container label.
- ▲ Agricultural chemicals can be dangerous. Improper use can seriously injure persons, animals, plants, soil, and property.
- ▲ Inhaling smoke from any type of chemical fire can be a serious health hazard.
- ▲ Store or dispose of unused chemicals as specified by the chemical manufacturer.



### Dig Safe - Avoid Underground Utilities

- ▲ USA: Call 811  
CAN:  
<http://www.clickbeforeyoudig.com>
- ▲ Always contact your local utility companies (electrical, telephone, gas, water, sewer, and others) before digging so that they may mark the location of any underground services in the area.
- ▲ Be sure to ask how close you can work to the marks they positioned.





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Important Safety Information

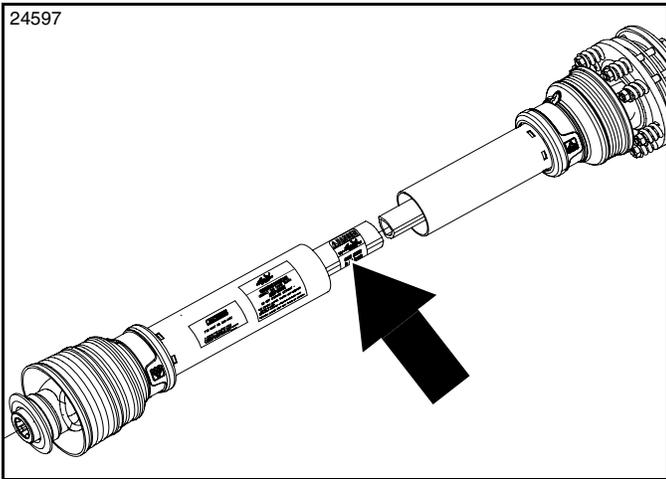
Safety Labels

Your Rotary Tiller comes equipped with all safety labels in place. They were designed to help you safely operate your implement. Read and follow their directions.

1. Keep all safety labels clean and legible.
2. Refer to this section for proper label placement. Replace all damaged or missing labels. Order new labels from your nearest Land Pride dealer. To find your nearest dealer, visit our dealer locator at [www.landpride.com](http://www.landpride.com).
3. Some new equipment installed during repair requires safety labels to be affixed to the replaced component as

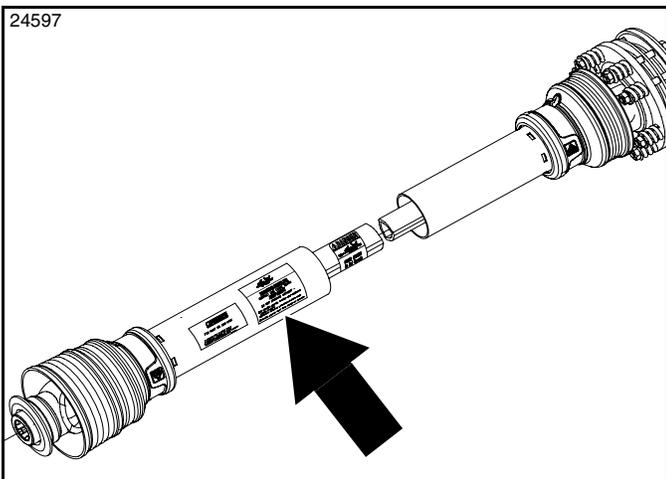
specified by Land Pride. When ordering new components make sure the correct safety labels are included in the request.

4. Refer to this section for proper label placement. To install new labels:
  - a. Clean the area the label is to be placed.
  - b. Spray soapy water on the surface where the label is to be placed.
  - c. Peel backing from label. Press firmly onto the surface.
  - d. Squeeze out air bubbles with the edge of a credit card or a similar type straight edge.



**818-540C**

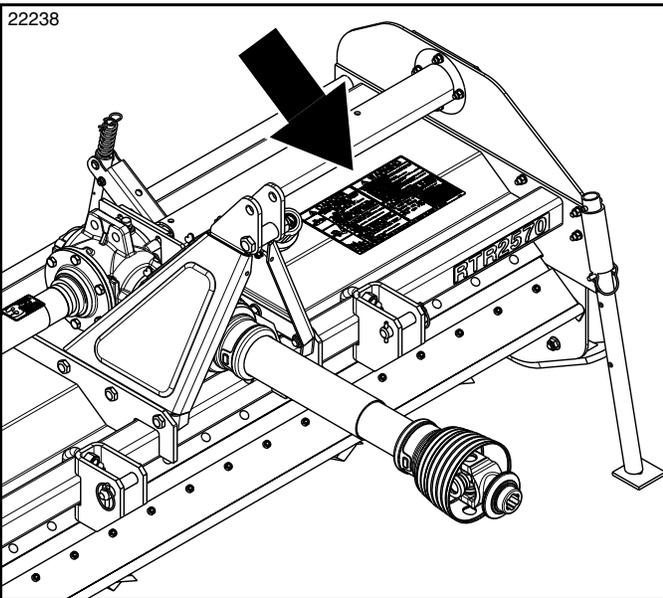
Danger: Guard Missing Hazard - DO NOT Operate  
1 Place: On the driveline outer profile



**818-552C**

Danger: Rotating Driveline - Keep Away  
1 Place: On the driveline outer shield

<b>⚠ DANGER</b>		<b>⚠ WARNING</b>	
	<p><b>ROTATING DRIVELINE HAZARD</b> CONTACT WILL CAUSE INJURY OR DEATH <b>KEEP AWAY!</b> DO NOT OPERATE WITHOUT -</p> <ul style="list-style-type: none"> <li>◦ All driveline guards, tractor and equipment shields in place.</li> <li>◦ Drivelines securely attached at both ends.</li> <li>◦ Driveline guards that turn freely on driveline.</li> </ul>		<p>To Prevent Serious Injury or Death:</p> <ul style="list-style-type: none"> <li>• Avoid unsafe operation or maintenance.</li> <li>• Do Not operate or work on this machine without reading and understanding the Operator's Manual.</li> <li>• If manual is lost, contact your nearest dealer for a new manual.</li> </ul>
	<p><b>ROTATING PARTS HAZARD</b> To prevent serious injury or death from rotating parts:</p> <ul style="list-style-type: none"> <li>◦ DO NOT go under frame when parts are turning or engine is running. Keep others away.</li> <li>◦ Disconnect &amp; lockout power source BEFORE adjusting or servicing.</li> <li>◦ Keep hands, feet, hair, and clothing away from moving parts.</li> </ul>	<p>⚠ <b>WARNING:</b> Cancer and reproductive harm - <a href="http://www.P65Warnings.ca.gov">www.P65Warnings.ca.gov</a></p>	
	<p><b>THROWN OBJECT HAZARD</b> <b>KEEP FRONT DEFLECTOR IN PLACE</b> To prevent serious injury or death:</p> <ul style="list-style-type: none"> <li>◦ Keep front deflector in place while operating.</li> <li>◦ Do Not point outlet toward people, animals, or buildings.</li> <li>◦ Stay away from outlet during operation.</li> <li>◦ Keep others away.</li> </ul>	<b>⚠ CAUTION</b>	
		<p>To avoid Injury or Machine Damage</p> <ul style="list-style-type: none"> <li>• Operate only with 540 rpm PTO</li> </ul>	
858-518C REV.D			



**858-518C**

Danger/Warning/Caution Combo: List of Safety Hazards  
1 Place



**This page left blank intentionally.**

## Introduction

Land Pride welcomes you to the growing family of new product owners. This Rotary Tiller has been designed with care and built by skilled workers using quality materials. Proper assembly, maintenance, and safe operating practices will help you get years of satisfactory use from this implement.

## Application

The Model RTR2570 Reverse-Till Rotary Tiller is designed and built by Land Pride to till the soil for seedbed or planting preparation. The Model RTR2570 is adapted for 540rpm power take-off and three-point hitch Category 1 mounting. The Model RTR2570 tiller is Quick Hitch adaptable and are compatible with 25-75 hp (19-56 kW) tractors. Reverse rotation tillers tend to achieve greater depth penetration, moving and pulverizing more soil in the process, while burying residue as opposed to leaving it on top. Model RTR2570 Land Pride Rotary Tiller has applications in landscaping, nurseries, gardens, and medium duty commercial use.

See “**Specifications & Capacities**” on page 31 and “**Features & Benefits**” on page 32 for additional information and performance enhancing options.

## Using This Manual

- This Operator’s Manual is designed to help familiarize you with safety, assembly, operation, adjustments, troubleshooting, and maintenance. Read this manual and follow the recommendations to help ensure safe and efficient operation.
- The information contained within this manual was current at the time of printing. Some parts may change slightly to assure you of the best performance.
- To order a new Operator’s or Parts Manual, contact your authorized dealer. Manuals can also be downloaded, free-of-charge, from our website at [www.landpride.com](http://www.landpride.com)

## Terminology

“Right” or “Left” as used in this manual is determined by the direction the operator faces while sitting in the operator’s seat looking forward unless otherwise stated.

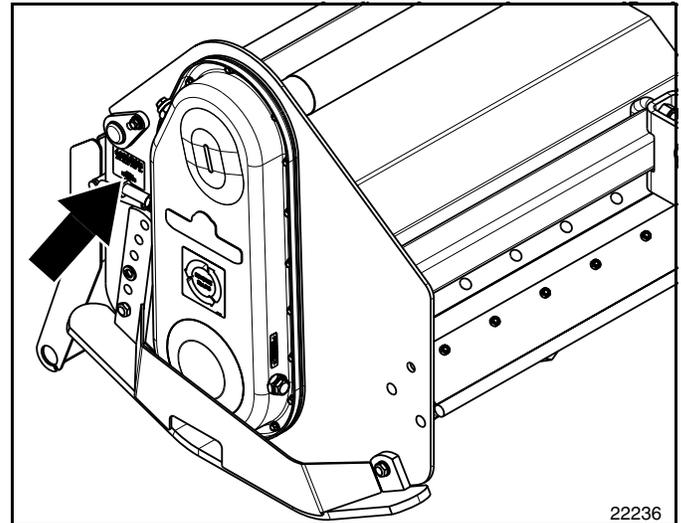
## Owner Assistance

The dealer should complete the Online Warranty Registration at the time of purchase. This information is necessary to provide you with quality customer service.

The parts on your Rotary Tiller have been specially designed by Land Pride and should only be replaced with genuine Land Pride parts. Contact a Land Pride dealer if customer service or repair parts are required. Your Land Pride dealer has trained personnel, repair parts, and equipment needed to service the implement.

## Serial Number

For quick reference and prompt service, record model and serial number on the inside cover page and again on the warranty page. Always provide model number and serial number when ordering parts and in all correspondence with your Land Pride dealer. For location of your serial number plate, see Figure 1.



**Serial Number Plate Location**  
Figure 1

## Further Assistance

Your dealer wants you to be satisfied with your new Rotary Tiller. If for any reason you do not understand any part of this manual or are not satisfied with the service received, the following actions are suggested:

1. Discuss any problems you have with your implement with your dealership service personnel so they can address the problem.
2. If you are still not satisfied, seek out the owner or general manager of the dealership, explain the question/problem, and request assistance.
3. For further assistance write to:

**Land Pride Service Department**  
1525 East North Street  
P.O. Box 5060  
Salina, Ks. 67402-5060

E-mail address  
[lpSERVICE@landpride.com](mailto:lpSERVICE@landpride.com)



Section 1: Assembly & Set-up

Dealer Preparations

**WARNING**

To prevent serious injury or death:

An unsupported parked tiller can tip over easily. Always use its park stand and when needed, non-concrete support blocks to keep the tiller from tipping onto a person.

This unit is shipped almost completely assembled. Carefully follow instructions for final assembly.

Before attempting assembly, go through the “Pre-Assembly Checklist” below. Having all the needed parts and equipment readily at hand will speed up your assembly task and will make the job as safe as possible.

**Pre-Assembly Checklist**

✓	Check	Page
<input type="checkbox"/>	Have a forklift or hoist with properly sized chains and safety stands capable of lifting and supporting the equipment on hand.	
<input type="checkbox"/>	Have a minimum of 2 people on hand while assembling.	
<input type="checkbox"/>	Make sure all major components and loose parts are shipped with the machine. Refer to this manual if unsure.	
<input type="checkbox"/>	Make sure working parts move freely, bolts are tight and cotter pins are spread. Refer to this Operator’s Manual.	
<input type="checkbox"/>	Double check to make sure all fasteners and pins are installed correctly. Use the Parts Manual if unsure.  <b>NOTE:</b> Small hardware shipped loose from the factory is contained in a bag. Larger parts are attached to the shipping crate. All factory assembled hardware should be installed in their correct location. Remember their location if removed. Keep removed parts separated.	
<input type="checkbox"/>	Make sure all safety labels are correctly located and legible. Replace if damaged.	Page 6
<input type="checkbox"/>	Make sure all grease fittings are in place and lubricated. Refer Lubrication Points.	Page 29
<input type="checkbox"/>	Check fluid level in the gearbox and chain cases. Refer Lubrication Points.	Page 30 Page 30

**Torque Requirements**

Refer to “Torque Values Chart” on page 34 to determine the correct torque value when tightening hardware during assembly.

**Tractor Requirements**

Tractor horsepower should be within the range noted below. Tractors outside the horsepower range must not be used

- Maximum power take-off horsepower . . .75 hp (56 kW)
- Hitch type . . . . . 3 - Point Cat. 1

**WARNING**

To prevent serious injury or death:

Lightweight tractors with rear attached implements may need weights added to the front to maintain steering control. Consult your tractor Operator’s Manual to determine weight requirements and maximum limitations.

**Tractor Shutdown Procedure**

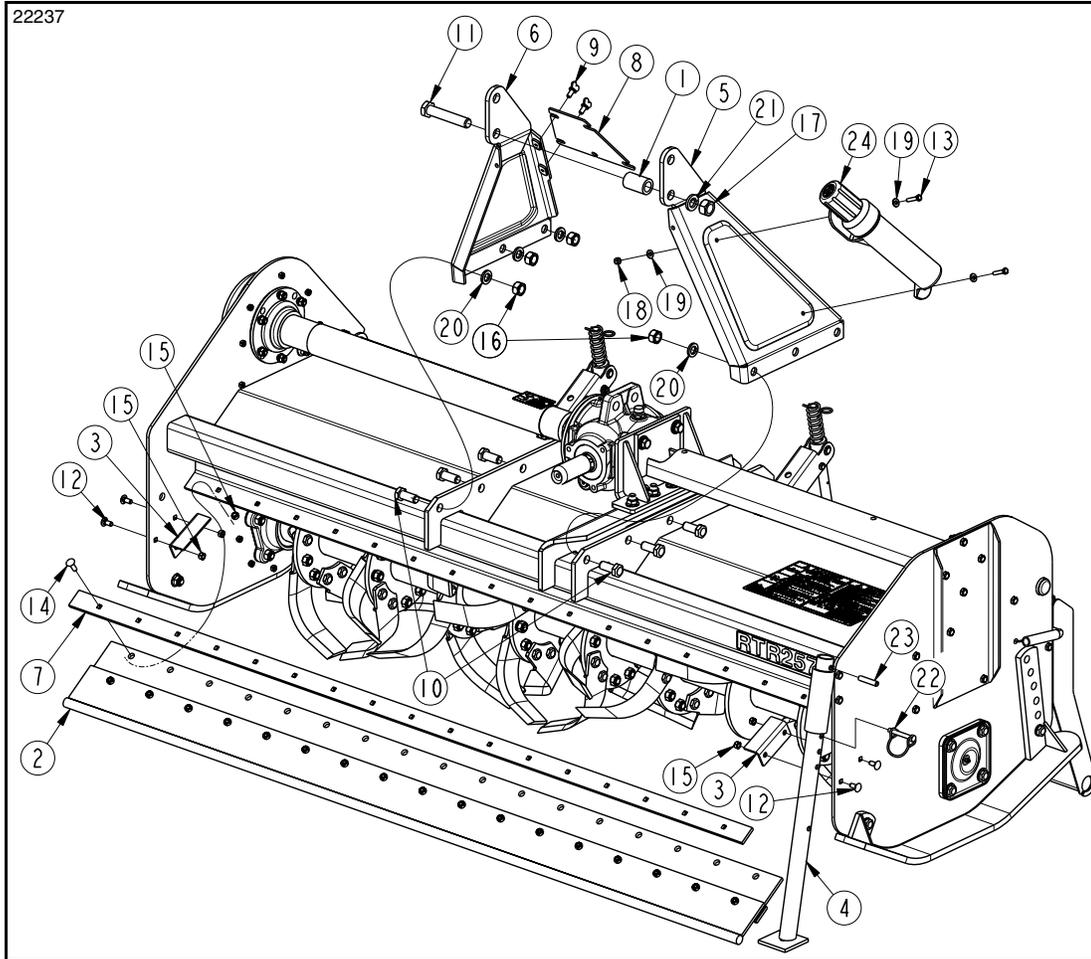
The following are basic tractor shutdown procedures. Follow these procedures and any additional shutdown procedures provided in your tractor Operator’s Manual before leaving the operator’s seat.

1. Reduce engine speed and disengage power take-off if engaged.
2. Park tractor and implement on level, solid ground.
3. Lower implement to ground or onto non-concrete support blocks.
4. Put tractor in park or set park brake, turn off engine, and remove switch key to prevent unauthorized starting.
5. Relieve all hydraulic pressure to auxiliary hydraulic lines.
6. Wait for all components to come to a complete stop before leaving the operator’s seat.
7. Use steps, grab-handles and anti-slip surfaces when stepping on and off the tractor.

**Upper Hitch Assembly**

Refer to Figure 1-1 on page 11:

1. Install left and right-hand top hitch plates (#5 & #6) to the inside of hitch mounting bars with 5/8"-11 x 1 1/2" GR5 bolts (#10), lock washers (#20), and nuts (#16). Do not tighten bolts at this time.
2. Insert 1 1/4" x 2" long spacer (#1) between hitch plates (#5 & #6) and secure with 3/4"-10 x 4" GR5 bolt (#11), lock washer (#21), and nut (#17).
3. Tighten bolts (#10 & #11) to the correct torque.
4. Fasten driveline guard (#8) to hitch plates (#5 & #6) with four wing bolts (#9).
5. Attach manual storage container (#24) to left-hand hitch plate (#5) with 1/4"-20 x 1 1/4" GR5 bolt (#13), flat washers (#19), and nylock nuts (#18) as shown. Tighten nylock nuts to the correct torque.



Upper Hitch, Front Deflector, & Park Stand Assembly

Figure 1-1

### Front Deflector Assembly

Refer to Figure 1-1 on page 11:

**IMPORTANT:** Not installing front deflector guides will cause damage to the front deflector.

Refer to Figure 1-1 on page 11:

1. Install front deflector guides (#3) on each end of the tiller frame with 5/16"-18 x 3/4" carriage bolts (#12), and locknuts (#15).
2. Assemble front deflector (#2) to the frame with clamp bar (#7) on top. Insert 5/16"-18 x 1" GR5 carriage bolts (#14) from the top side and secure with locknuts (#15).

### Park Stand Assembly

Refer to Figure 1-1:

#### **WARNING**

To avoid serious injury or death:

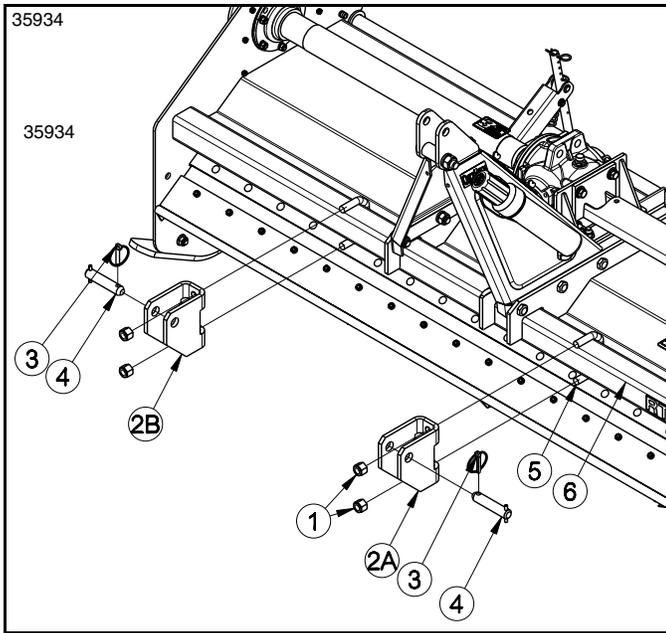
An unsupported parked tiller can tip over easily. Always use its park stand and when needed, non-concrete support blocks to keep the tiller from tipping onto a person.

1. Insert park stand (#4) up through stand mount.
2. Drive 3/8" x 1 3/4" long roll pin (#23) in upper hole and adjust stand to the desired height.

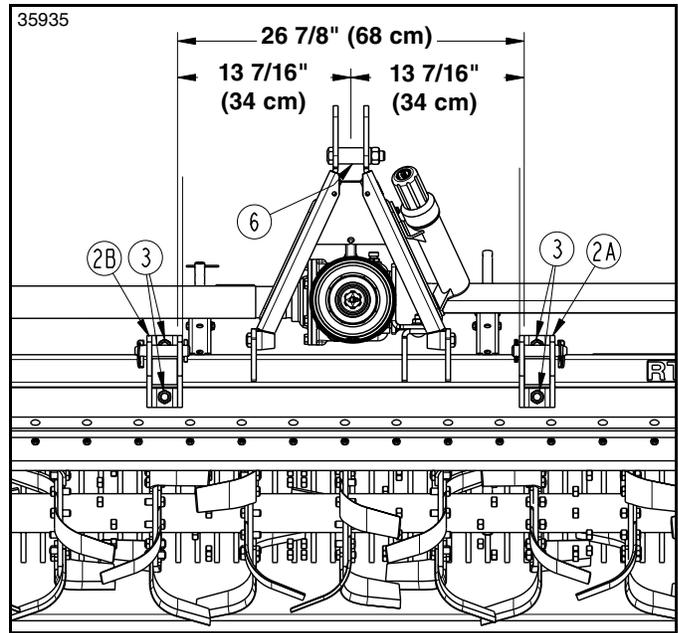
**NOTE:** When parking the tiller, insert wire retaining pin in one of the three upper holes below the stand mount. When tiller is hitched to a tractor, insert wire lock pin in the bottom hole above the stand mount.

3. Pin park stand at this height with 5/16" x 2 1/2" long wire retaining pin (#22).

Section 1: Assembly & Set-up



Lower Hitch Assembly  
Figure 1-2



Lower Clevis Positioning  
Figure 1-3

### Lower 3-Point Clevis Assembly

Refer to Figure 1-2:

1. Attach lower left-hand clevis (#2A) to tube (#6) with 5/8"-11 u-bolt (#5) and nylock nuts (#1). Draw nylock nuts up loose, do not tighten at this time.
2. Repeat step 1 above for the right-hand clevis (#2B).

Refer to Figure 1-3:

3. Adjust clevises (#2A & #2B) horizontally on tube (#6) until the inside face of clevis plates (#2A & #2B) are 13 7/16" (34 cm) from center of upper hitch bushing (#7).
4. Tighten hex nylock nuts (#1) to the correct torque.

Refer to Figure 1-2:

5. Insert lower hitch pins (#4) in clevises (#2A & #2B). Secure hitch pins with linchpins (#3).

## Section 1: Assembly & Set-up

### Driveline Installation

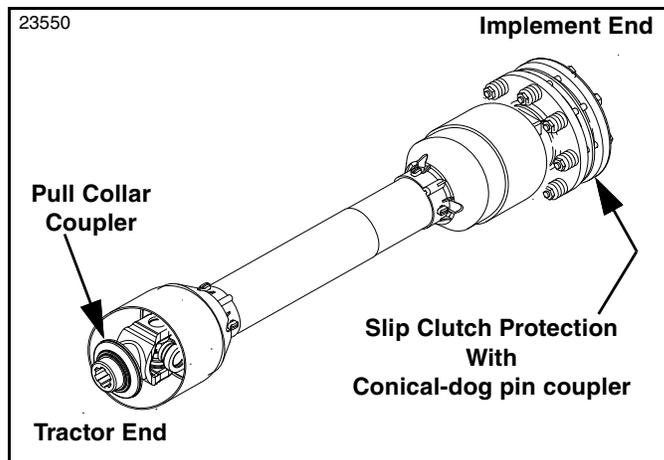
Refer to Figure 1-4:

The driveline supplied with the tiller has a friction slip clutch with a pull collar coupler on the tractor end and a conical-dog pin coupler on the implement end. Always engage power take-off at low engine rpm to minimize start-up torque loads.

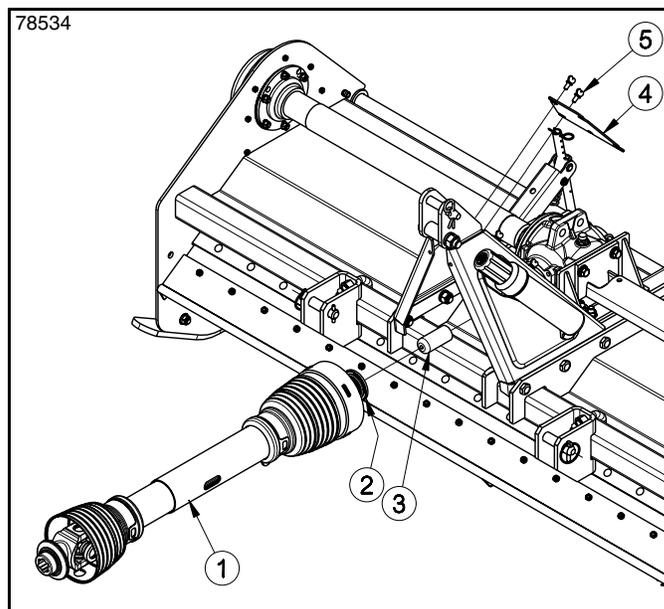
**IMPORTANT:** The driveline must be lubricated before putting it into service. Refer to “**Lubrication Points**” on page 29.

Refer to Figure 1-5:

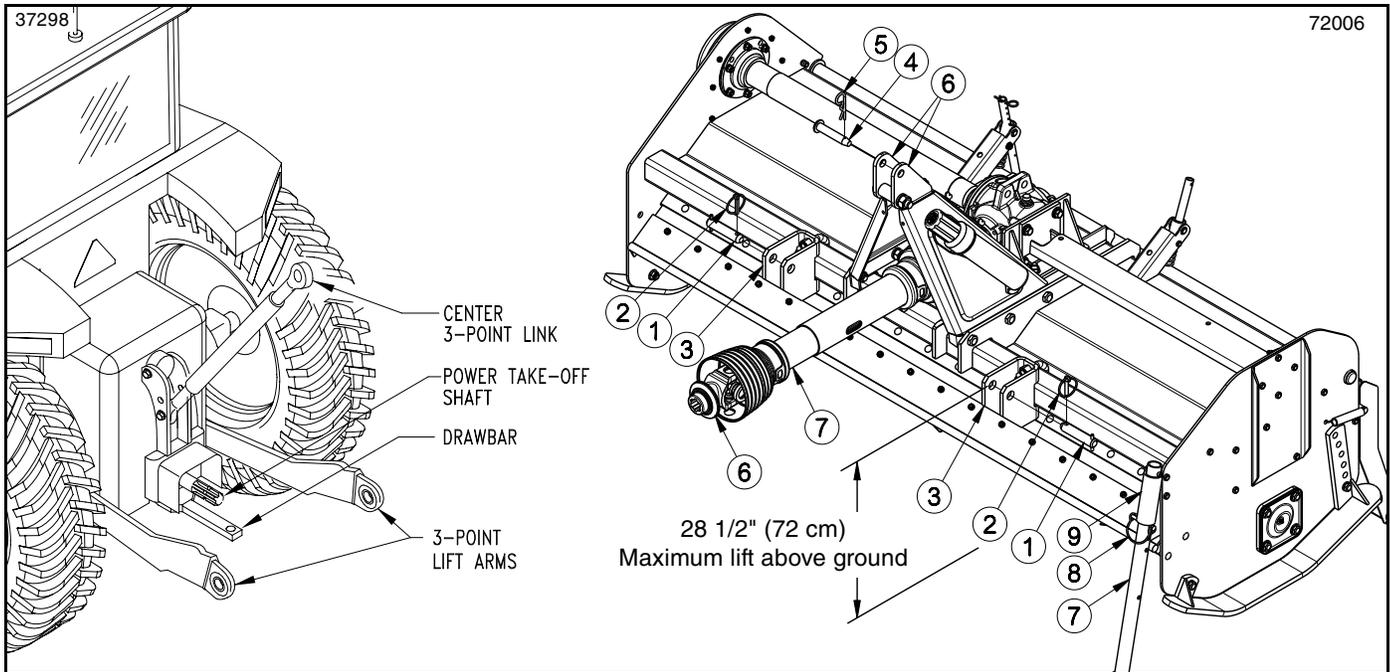
1. Remove wing bolts (#5) and gearbox cover (#4).
2. Remove gearbox shaft protector (#3) and discard.
3. Remove existing nut, flat washer, and conical-dog pin from driveline coupler (#2).
4. Slide coupler (#2) onto the gearbox input shaft. Align the conical-dog pin hole in the coupler with the groove around the gearbox input shaft.
5. Attach coupler (#2) to the gearbox input shaft with removed conical-dog pin, flat washer, and nut. Tighten nut to the correct torque.
6. Push/pull on the coupler to ensure it is securely fastened to the gearbox input shaft.
7. Secure gearbox protection cover (#4) to the 3-point hitch frame with removed wing bolts (#5). Tighten bolts to the correct torque.
8. Collapse driveline (#1) by pushing the tractor end of the driveline toward the implement.



Slip Clutch Protection With Conical-dog Pin Coupler  
Figure 1-4



Driveline Installation  
Figure 1-5



**Tractor Hook-up**  
Figure 1-6

### Tractor Hook-Up

#### **⚠ DANGER**

To prevent serious injury or death:

A crushing hazard exists while connecting and disconnecting the implement. Keep people and animals away while backing-up to the implement or pulling away from the implement. Do not operate hydraulic controls while a person or animal is directly behind the power machine or near the implement.

#### **⚠ WARNING**

To prevent serious injury or death:

- Always follow “Tractor Shutdown Procedure” provided in this manual before dismounting the tractor.
- Lightweight tractors with rear attached implements may need weights added to the front to maintain steering control. Consult your tractor Operator’s Manual to determine weight requirements and maximum limitations.
- Do not raise center of lower 3-point hitch pins more than 28 1/2" (72 cm) above ground with power take-off engaged. Do not engage power take-off if hitch pins are too high. A rotating driveline must not exceed an angle of 25 degrees up or down. If it does, it can break and throw off projectiles.
- An unsupported parked tiller can tip over easily. Always use its park stand and when needed, non-concrete support blocks to keep the tiller from tipping onto a person.

**NOTE:** Land Pride’s Quick Hitch can be attached to the tractor to provide quick and easy 3-point hook-up and detachment. An additional driveline may be required if a Quick Hitch is used. See your nearest Land Pride dealer to purchase a Quick Hitch.

#### Refer to Figure 1-6:

1. Slowly back tractor up to tiller until lower 3-point lift arms are aligned with lower clevises (#3).
2. Secure tractor’s 3-point lower lift arms to lower clevises (#3) using 7/8" diameter hitch pins (#1). Secure hitch pins with linchpins (#2).
3. Secure tractor’s top center link to plates (#6) with 3/4" diameter hitch pin (#4) and hitch pin keeper (#5). (Hitch pin (#4) and hitch pin keeper (#5) are supplied by the customer).
4. Place a level on the tiller and adjust tractor’s top center link to level tiller from front to back.
5. Turn level 90° and adjust one of the two tractor’s lower 3-point arms up or down to level tiller from left to right.
6. Raise tiller up several inches to remove weight of tiller off of park stand (#7).
7. Remove park stand wire lock pin (#8) and slide park stand up until the lower hole in the park stand is above stand mount (#9). Reinsert wire lock pin in the hole just above the stand mount and secure lock pin with wire lock.
8. Start tractor and raise tiller fully up. Measure vertical distance from center of 3-point hitch pins (#1) to the ground. If distance exceeds 28 1/2" (72 cm), adjust tractor’s 3-point lift height limiter to set maximum hitch pin lift height at 28 1/2" (72 cm). If the lever does not have a lift height limiter, make a mark with tape or other means to indicate maximum lift height.



## Section 1: Assembly & Set-up

### Driveline Hook-up

Refer to Figure 1-6 on page 14:

#### DANGER

To avoid serious injury or death:

- Tractor power take-off shaft shield, driveline shields, and gearbox shaft shields must be installed and in good working condition to avoid driveline entanglement and projectiles flying off of the driveline.
- Do not engage power take-off while connecting or disconnecting the driveline, or while someone is standing near the driveline. A person's body and/or clothing can become entangled in the driveline.
- Do not use a power take-off adapter. The adapter will increase strain on the tractor's power take-off shaft causing possible damage to shaft and driveline. It will also defeat the purpose of the tractor's power take-off shield.
- Make certain driveline yokes are securely fastened at each end. A loose yoke can work free allowing the driveline to rotate uncontrollably.

#### WARNING

To avoid serious injury or death:

- Always follow "Tractor Shutdown Procedure" provided in this manual before dismantling the tractor.
- Some tractors are equipped with two power take-off speeds. Be certain your tractor's power take-off shaft is set-up to operate at 540 rpm. Do not exceed 540 rpm power take-off speed. Excessive speed can damage drive/driven components and increase the risk of a thrown object hazard.
- Check driveline when lowering implement to make sure it does not interfere with the tractor drawbar at maximum depth. If needed, shut tractor off and move or remove drawbar to prevent driveline damage.

**IMPORTANT:** An additional driveline may be required if implement will be attached to more than one tractor or if a Quick-Hitch is attached.

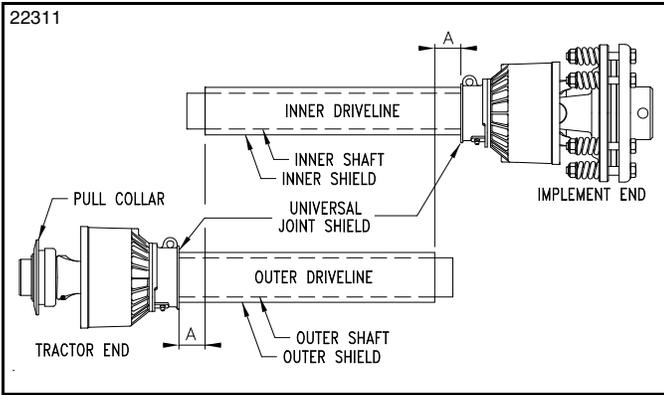
**IMPORTANT:** Drivelines with friction clutches must go through a "run-in" prior to initial use and after long periods of inactivity. For detailed instructions, see "**Driveline Maintenance**" on page 26.

**IMPORTANT:** Check driveline minimum collapsible length before completing "**Driveline Hook-up**". Structural damage to the tractor and implement can occur if this check is not made. Refer to "**Check Driveline Collapsible Length**" on page 16.

1. If the collapsible length of driveline (#7) has not been checked, go to "**Check Driveline Collapsible Length**" on page 16. Otherwise, continue with step 2 below.
2. Park tractor and implement on a level surface.
3. Shut tractor down before dismantling. Refer to "**Tractor Shutdown Procedure**" on page 10.
4. If tractor drawbar interferes with the driveline during hook-up, disconnect driveline and move drawbar forward, to the side, or remove.
5. Collapse driveline (#7) by pushing tractor end of driveline toward the implement's gearbox.
6. Pull back on driveline pull collar (#6) and push yoke coupler onto the tractor power take-off shaft.
7. Release pull collar (#6) and continue to push driveline coupler forward until the pull collar pops out and locks in place.
8. Pull on driveline yokes at the tractor and implement end to make sure they are secured to the tractor power take-off shaft and implement's gearbox shaft.
9. The tractor's lower 3-point arms should be adjusted for lateral float. Please consult your tractor's manual.
10. Continue with "**Check Driveline Interference**" on page 17.



## Section 1: Assembly & Set-up



**Check Driveline Minimum Length**  
Figure 1-7

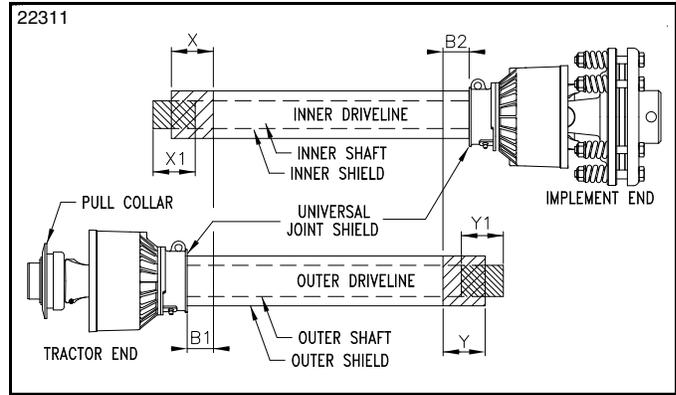
### Check Driveline Collapsible Length

Refer to Figure 1-7:

**IMPORTANT:** A driveline that is too long can bottom out causing structural damage to the tractor and implement. Always check driveline minimum length during initial setup, when connecting to a different tractor, and when alternating between using a quick hitch and a standard 3-point hitch. More than one driveline may be required to fit all applications.

**IMPORTANT:** The power take-off shaft and gearbox input shaft must be aligned and level with each other when checking driveline minimum length. A driveline that is too long can damage tractor and implement.

1. With driveline attached only to the 3-point implement, remove outer driveline (tractor end) from inner driveline to separate the two profiles.
2. Park tractor and implement on a level surface.
3. Raise implement until gearbox input shaft is level with tractor power take-off shaft. Securely block implement at this height to keep unit from lowering.
4. Shut tractor down without removing support blocks. Refer to “**Tractor Shutdown Procedure**” on page 10.
5. Attach outer driveline to the tractor’s power take-off shaft. Refer to steps 2-8 under “**Driveline Hook-up**” on page 15.
6. Hold inner and outer drivelines parallel to each other. If dimension “A” is greater than or equal to 1" (2.5 cm), then skip to “**Check Driveline Maximum Length**” on page 17. Otherwise continue with step 7.

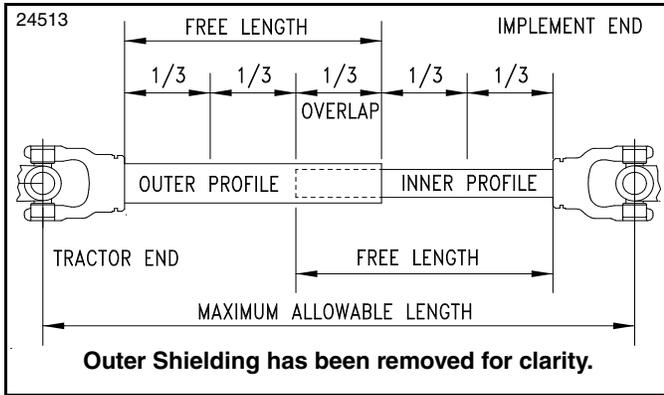


**Driveline Shortening**  
Figure 1-8

Refer to Figure 1-8:

7. If dimension “A” was less than 1" (2.5 cm), shorten driveline as follows:
  - a. Measure 1" (2.5 cm) (“**B1**” dimension) back from outer driveline shield and make a mark at this location on the inner driveline shield.
  - b. Measure 1" (2.5 cm) (“**B2**” dimension) back from the inner driveline shield and make a mark at this location on the outer driveline shield.
8. Remove outer driveline from the tractor power take-off shaft and inner driveline from the implement’s gearbox shaft.
9. Cut off non-yoke end of inner driveline as follows:
  - a. Measure from end of inner shield to scribed mark (“**X**” dimension) and record.
  - b. Cut off inner shield at the mark. Cut same amount off the inner shaft (“**X1**” dimension).
10. Cut off non-yoke end of outer driveline as follows:
  - a. Measure from end of outer shield to scribed mark (“**Y**” dimension) and record.
  - b. Cut off outer shield at the mark. Cut same amount off the outer shaft (“**Y1**” dimension).
11. Remove all burrs and cuttings.
12. Continue with “**Check Driveline Maximum Length**” on page 17.

Section 1: Assembly & Set-up



Driveline Maximum Extended Length  
Figure 1-9

Check Driveline Maximum Length

Refer to Figure 1-9:

The driveline maximum allowable length must, when fully extended, have a minimum overlap of profile tubes by not less than 1/3 the free length with both inner and outer profile tubes being of equal length.

1. Apply multi-purpose grease to the inside of the outer shaft and reassemble the driveline.
2. Assemble the two driveline profiles together with just 1/2 overlapping of the profile tubes as shown. Once assembled, measure and record maximum allowable length here. \_\_\_\_\_
3. Reattach driveline to the tractor power take-off shaft and gearbox input shaft. Refer to “**Driveline Installation**” on page 13 and “**Driveline Hook-up**” on page 15.
4. Continue with “**Check Driveline Interference**” below.

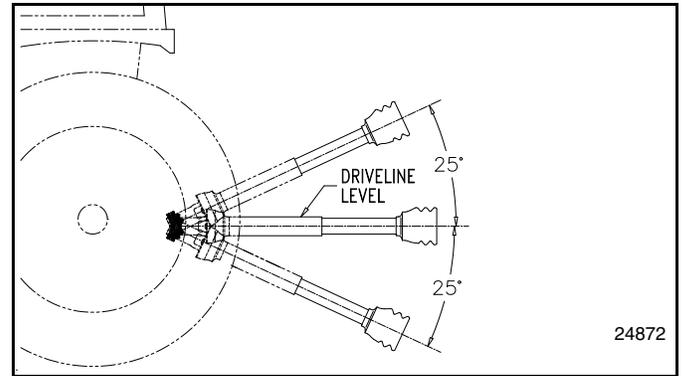
Check Driveline Interference

Refer to Figure 1-10:

**WARNING**

To avoid serious injury or death:

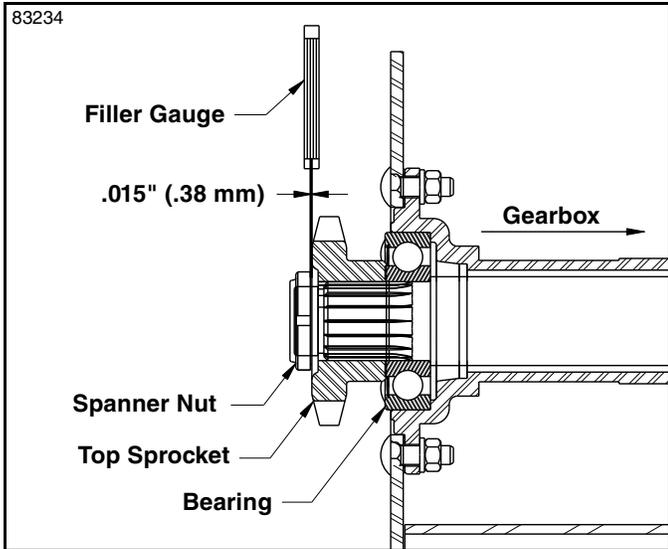
- Do not raise center of lower 3-point hitch pins more than 28 1/2" (72 cm) above ground with power take-off engaged. Do not engage power take-off if hitch pins are too high. A rotating driveline must not exceed an angle of 25 degrees up or down. If it does, it can break and throw off projectiles.



Maximum Driveline Movement During Operation  
Figure 1-10

1. Start tractor and raise cutter up just enough to remove support blocks.
2. Without changing 3-point lift height, shutdown tractor properly before dismounting. Refer to “**Tractor Shutdown Procedure**” on page 10.
3. Remove support blocks.
4. Return to the tractor seat and start tractor. Slowly engage 3-point control lever to lower the implement while checking for sufficient drawbar clearance.
5. Skip to step #7 if drawbar does not need adjusting. If adjustment is required, shutdown tractor properly before dismounting. Move drawbar ahead, aside, or remove if needed.
6. Return to the tractor seat and start tractor.
7. Raise and lower implement to find maximum extended driveline length.
8. Without changing 3-point lift height, shutdown tractor properly before dismounting to check driveline maximum length and angle.
9. Block implement up before checking driveline length and angle.
10. Check driveline length to make certain it does not exceed the maximum allowable length recorded in step 2 under “**Check Driveline Maximum Length**” on this page.
11. Check driveline angle to verify it does not exceed the maximum angle of 25° up or down.
12. Check center of lower 3-point hitch pins to make sure they do not exceed 28 1/2" (72 cm) above ground level.
13. Set tractor 3-point lift limiter at the height that will keep the driveline within the maximum allowable length and maximum 25° angle.
14. If needed, repeat steps 6-12 except this time find the maximum height the 3-point lift can be operated at without exceeding driveline maximum length and angle.

Section 1: Assembly & Set-up



Tighten Top Drive Sprocket  
Figure 1-11

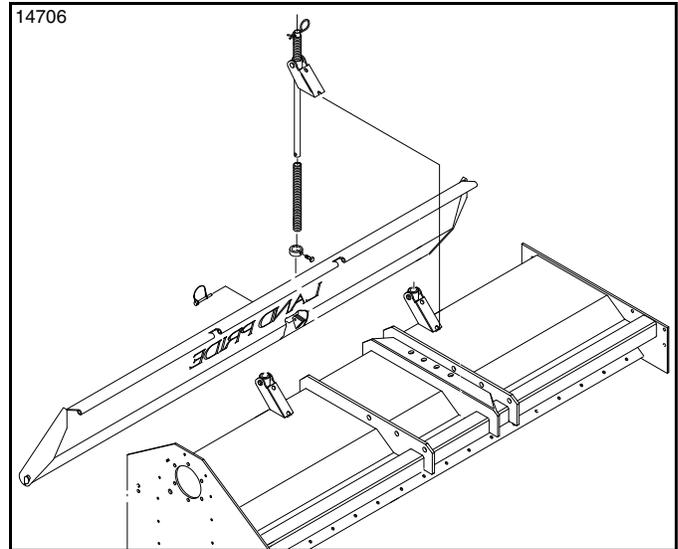
### Tighten Top Drive Sprocket

**Refer to Figure 1-11:**

Tighten spanner nut all the way down until sprocket is bottomed out on bearing, refer to Figure 1-11. Back spanner nut out until you can install .015" (.38 mm) feeler gauge between sprocket and spanner nut. Tighten spanner nut against feeler gauge until it is snug. Pull feeler gauge out and tighten spanner nut 1/6 of a turn.

**NOTE:** The input shaft on gearbox should turn using hand pressure.

**IMPORTANT:** Over-tightening the spanner nut will cause damage to the bearing.



Down Pressure Kit  
Figure 1-12

### Down Pressure Kit

**Refer to Figure 1-12:**

Spring loaded rear deflector deflects flying debris and levels the freshly tilled soil.



Section 2: Operating

**Operating Checklist**

Hazard control and accident prevention are dependent upon the awareness, concern, prudence, and proper training involved in the operation, transport, storage, and maintenance of the Rotary Tiller. Therefore, it is absolutely essential that no one operates the Rotary Tiller without first having read, fully understood, and become totally familiar with the Operator’s Manual. Make sure the operator has paid particular attention to:

- **Important Safety Information**, page 1
- **Section 1: Assembly & Set-up**, page 10
- **Section 3: Adjustments**, page 24
- **Section 2: Operating**, page 19
- **Section 4: Maintenance & Lubrication**, page 25

**Inspections**

Perform the following inspections before using your Rotary tiller with tiller attached to a tractor, power take-off disengaged and completely stopped.

**Operating Checklist**

✓	Check	Ref.
	Inspect tractor safety equipment to make sure it is in good working condition.	Tractor Manual
	Check all guards and shields to make certain they are in good working condition, in place, and secured.	
	Carefully raise and lower implement to ensure drawbar, tires, etc. do not contact tiller frame or driveline.	
	Check driveline. Make sure it is secured at both ends. Refer to “Driveline Hook-up”.	Page 15
	Check drive chain tension. Refer to “Drive Chain”.	Page 24
	Check tiller depth setting. Refer to “Skid Shoe”.	Page 24
	Check driveline slip clutch to make sure disks will slip. Refer to “Driveline Maintenance”	Page 26
	Check for worn, bent, broken, loose, and/or missing tines. Refer to “Tine Replacement”	Page 25
	Grease driveline shaft and all other grease fittings Refer to “Lubrication Points”.	Page 29
	Check oil level in gearbox. Make sure all plugs have been replaced when completed. Refer to “Gearbox Lubrication”.	Page 30
	Check oil level in chaincase. Make sure all plugs have been replaced when completed. Refer to “Chaincase Lubrication”.	Page 30
	Check tiller initially and periodically for loose bolts and pins. Refer to “Torque Values Chart”.	Page 34

**Safety Information**



To prevent serious injury or death:

- Do not engage power take-off while connecting or disconnecting the driveline, or while someone is standing near the driveline. A person’s body and/or clothing can become entangled in the driveline.
- Keep away from rotating hex drive shaft located between gearbox and drive end of tiller. A person can become entangled in the shaft.
- Keep yourself and all others away from rotating tines and drive train. Always disengage power take-off and lockout power source before making adjustments or servicing the tiller. A person’s body, hair, or clothing can become entangled in rotating components.
- Make all 3-point hydraulic adjustments from the tractor seat. Never make hydraulic adjustments while standing behind the tractor.
- All guards and shields must be installed and in good working condition while operating the implement.
- Tractor power take-off shaft shield, driveline shields, and gearbox shaft shields must be installed and in good working condition to avoid driveline entanglement and projectiles flying off of the driveline.
- Make certain driveline yokes are securely fastened at each end. A loose yoke can work free allowing the driveline to rotate uncontrollably.
- Tine impact on objects can throw projectiles resulting in bodily injury or death. Do not point discharge toward people, animals, or buildings and keep people and animals away from tiller during operation.
- Keep front rubber dirt deflector on reverse tine tillers in place while operating the unit. Objects in a reverse tine tiller can be thrown forward toward the operator.
- Do not use a power take-off adapter. The adapter will increase strain on the tractor’s power take-off shaft causing possible damage to shaft and driveline. It will also defeat the purpose of the tractor’s power take-off shield.
- Never make contact with underground utilities such as electrical power lines, gas lines, phone lines, etc. They can cause serious injury or death from electrocution, explosion, or fire. Always call 811 (USA) or local utility companies before digging so that they can mark the location of underground services in the area. For contact information, see Dig Safe in the “Important Safety Information” starting on page 1.

## Section 2: Operating

 **WARNING**

To prevent serious injury or death:

- Allow only persons to operate this implement who have fully read and comprehended this manual, and who are properly trained in the safe operation of this implement.
- Always follow “Tractor Shutdown Procedure” provided in this manual before dismounting the tractor.
- Never carry riders on the equipment or power machine. Riders can obstruct the operator’s view, interfere with controls, be pinched by moving components, become entangled in rotating components, struck by objects, thrown about, fall off and be run over, etc.
- Make certain driveline yokes are securely fastened at each end. A loose yoke can work free allowing the driveline to rotate uncontrollably.
- Some tractors are equipped with two power take-off speeds. Be certain your tractor’s power take-off shaft is set-up to operate at 540 rpm. Do not exceed 540 rpm power take-off speed. Excessive speed can damage drive/driven components and increase the risk of a thrown object hazard.
- Always disengage power take-off immediately after lifting tiller above ground level. Never operate tiller in the raised position. The tiller can discharge objects at high speeds resulting in injury or death.
- Check driveline when lowering tiller into the ground to make sure it does not interfere with the tractor drawbar at maximum depth. If needed, shut tractor off and move or remove drawbar to prevent damage to the driveline.
- A rotating driveline must not exceed an angle of 25 degrees up or down, and never engage a driveline while at an angle exceeding 25 degrees up or down. The driveline can break and send flying projectiles.
- Do not operate a broken or bent driveline. Such a driveline will break apart while rotating at high speeds. Always remove the implement from use until the damaged driveline can be repaired or replaced.
- Perform scheduled maintenance. Check for loose hardware, missing parts, broken parts, structural cracks, and excessive wear. Make repairs before putting the implement back into service.
- Do not till across steep inclines that are subject to rollover. The action of the tines being forced down into the ground can cause the tractor to roll-over resulting in serious injury or death. Consult your tractor’s manual for acceptable inclines the tractor is capable of traveling across.
- Be careful when working areas where obstructions can be hidden. Always mark potential hazards with a visible flag. Travel slowly through high risk areas and be prepared to stop immediately should implement make contact with a solid object.
- Do not use implement for a purpose other than the work it is designed to do as defined in this manual.

- Do not use implement as a man lift, work platform, or as a wagon to carry objects. It is not properly designed or guarded for this use.
- Do not use implement to lift objects; to pull objects such as fence posts, stumps, etc; or to push objects. The unit is not designed or guarded for these uses.
- Do not use implement to tow other equipment unless it is designed with a tow hitch. Doing so can result in loss of control and damage the equipment.
- Do not alter implement or replace parts on the implement with other brands. Other brands may not fit properly or meet OEM (Original Equipment Manufacturer) specifications. They can weaken the integrity and impair the safety, function, performance, and life of the implement. Replace parts only with genuine OEM parts.
- Avoid exposure to dust containing crystalline silica particles. This dust can cause serious injury to the lungs (silicosis). Because crystalline silica is a basic component of sand and granite, many activities at construction sites produce dust containing crystalline silica. Trenching, sawing, and boring of material containing crystalline silica can produce dust containing crystalline silica.

**IMPORTANT:** Make sure all safety labels are in their proper location and in good condition before operation. Follow all directions on the safety labels.

**IMPORTANT:** To prevent damaging the park stand, always store the stand in its transport position before moving the tiller.

## Section 2: Operating

### Transporting

#### **WARNING**

*To prevent serious injury or death:*

*When traveling on public roadways, travel in such a way that faster moving vehicles may pass safely. Use hazard lights, clean reflectors, and a slow moving vehicle sign that is visible from the back to warn operators in other vehicles of your presence. Always comply with all federal, state, and local laws.*

**IMPORTANT:** Always disengage power take-off and wait for the driveline to stop rotating before raising the implement to the transport position.

1. Raise tiller slightly off the ground. Without changing the tiller height, shut tractor down according to “**Tractor Shutdown Procedure**” on page 10.
2. Remove wire retaining pin from park stand and raise park stand up to the bottom hole. Reinsert wire retaining pin. Make certain wire retainer is caught over end of pin.
3. When raising the tiller for transport, make sure the driveline does not make contact with the tractor or tiller. Adjust tractor’s 3-point lift height limiter to set the maximum lift height of the lower hitch pins at 28 1/2" (72 cm) above ground. If the lift mechanism does not have a height limiter, make a mark with tape or other means to indicate maximum lift height.
4. Be sure to reduce tractor ground speed when turning. Leave enough clearance so that the tiller does not come in contact other obstacles such as buildings, trees, or fences.
5. Select a safe ground travel speed when transporting from one area to another. When traveling on roadways, transport in such a way that faster moving vehicles may pass you safely.
6. When traveling over rough or hilly terrain, shift tractor to a lower gear.

### Unhook Rotary Tiller

The following steps should be done when preparing to store tiller or unhitching it from a tractor.

1. Park tiller on a level, solid area.
2. Shut off tractor engine and engage park brake.
3. Lower park stand to desired height to maintain proper tiller height for re-hook-up. Install wire lock pin and lock in place.
4. Unhitch tiller from the tractor.

#### **WARNING**

*To prevent serious injury or death:*

*An unsupported parked tiller can tip over easily. Always use its park stand and when needed, non-concrete support blocks to keep the tiller from tipping onto a person.*

5. Check tiller for stability by physically applying pressure at the hitch plates to see if it will tip forward or backward. If the tiller moves in either direction, then block under the tiller as needed to prevent that movement.
6. See “**Long-Term Storage**” on page 28 for additional information on long term storage of your tiller.



## Section 2: Operating

### General Operating Notes

Make the following inspection before operating the tiller:

1. Check oil level in gearbox and chaincase. Refer to “**Lubrication Points**” on page 29.
2. Check that all plugs have been replaced properly in the gearbox and chaincase.
3. Be sure all tiller tines, bolts, and nuts are tight.
4. Be certain all guards, shields, and dirt deflectors are in place and secure.
5. Grease driveline shaft and all other grease fittings. Refer to “**Lubrication Points**” on page 29.
6. Clear area to be tilled of rocks, branches, and other foreign objects.
7. Tall grass and weeds should be mowed before tilling.
8. Do not engage power take-off at full throttle. Once engaged, increase throttle to 540 power take-off speed. Tiller tines will cut better at 540 power take-off speed than at reduced throttle.
9. Tilling should not be done in wet conditions as soil will stick to tines.
10. At first begin tilling at a slow forward speed and shift up as ground conditions warrant.
11. Operated tiller with deck level to the ground.
12. Tiller should be operated with the tiller deck level to the ground.
13. Tiller tines will cut better when operating the tractor at full 540 rpm power take-off speed than at reduced throttle.
14. After tilling the first 50 ft (15 m), stop and check to see that the tiller is adjusted properly.
15. Do not make turns or attempt to back up while tiller is in the ground. See important note below.

**IMPORTANT:** Turning or backing up with rotary tines in the ground will damage the tiller.

16. Do not engage power take-off with machine in the fully raised or lowered position.
17. Periodically check for foreign objects wrapped around the rotor shaft and remove them after disengaging power take-off, turning off tractor engine, and removing ignition key.

### General Operating Instructions

Please complete any of the above missed steps before operating the equipment as outlined below.

Having properly prepared yourself and the tiller, it is now time to do some tilling. Clear the tilling site of all large limbs, rocks, trash, metal, or extraneous debris. Carefully drive the your tractor with tiller to the site. Position the tiller offset to the left just far enough to cover the left tractor wheel tread for best results. Your tiller cannot be offset if an optional Quick Hitch is used.

Line the tractor up just to the right of center on your tillage plot. You will be working from the center out and turning to the left to line up for your next pass. Lower the tiller half way to the ground and reduce your tractor engine speed to idle. Engage the power take-off and gradually increase the engine speed until you reach full power take-off speed of 540 rpm. Lower Rotary Tiller to the ground and simultaneously commence forward travel of approximately 2 mph (3.2 km/h). Do not make turns or attempt to back up while tiller is in the ground. See important note below.

**IMPORTANT:** Turning or backing up with rotary tines in the ground will damage the tiller.

Travel about 50 ft (15 m) and then stop to check your results. When stopping, remember to lift the tiller out of the ground, stop the tractor, reduce engine speed, disengage the power take-off, set the park brake, shut off the tractor, and remove the keys. If you are tilling too shallow or too deep, adjust the skid shoes accordingly. If the soil texture is too coarse, lower the leveling door, and reduce your ground speed. If the soil texture is too fine, you will need to raise your leveling door and increase your ground speed. For any other problem conditions the may arise, you will want to refer to the Troubleshooting section of your Operator’s Manual.

When you are done tilling for the day, make sure you use proper tractor shutdown procedures before getting off of the tractor. If you are detaching your tiller, make sure you park it on a dry and level surface leaving it clean and ready for next use. When you put your tiller up for the season, make sure you refer to the Storage Directions in this Operator’s Manual on 28.

With a little practice and a few adjustments, you will soon be achieving the results you want with your Land Pride Rotary Tiller.



**Section 2: Operating**

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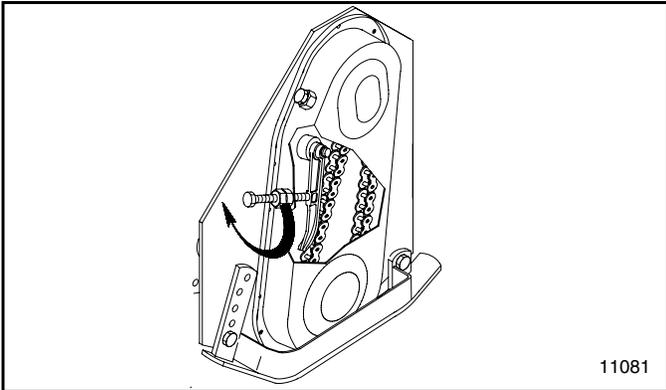
Section 3: Adjustments

**Drive Chain**

Refer to Figure 3-1:

The tension on the drive chain can be easily adjusted by using the chain tightener stud.

Should excessive backlash occur, unscrew locknut, turn bolt clockwise as indicated by the arrow, until idler arm is firm against chain, then back bolt off counterclockwise 1/4 turn. Re-locknut while holding head of bolt in place. Refer to “Torque Values Chart” on page 34.



**Chain Tightener**  
Figure 3-1

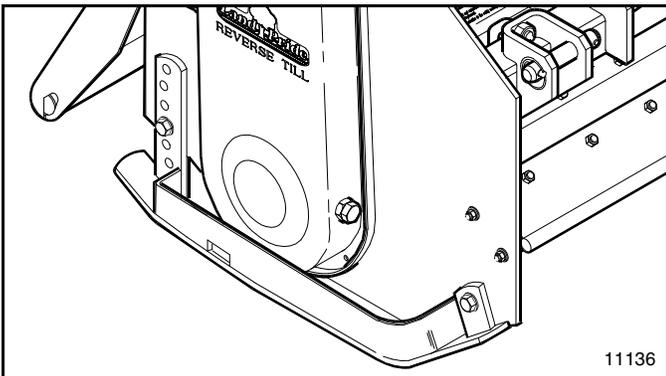
**Skid Shoe**

Refer to Figure 3-2:

The skid shoes can be raised or lowered for the desired tilling depth by:

**NOTE:** Tilling depth is the vertical distance from bottom of skid shoes to bottom of lowest tine. Be certain both skid shoes are adjusted the same.

1. Raise tiller off the ground and properly support.
2. Loosen pivot bolt on front of shoe.
3. Remove adjusting bolt on rear of shoe.
4. Adjust skid shoe to desired location.
5. Install adjusting bolt. Tighten both adjusting bolt and pivot bolt.

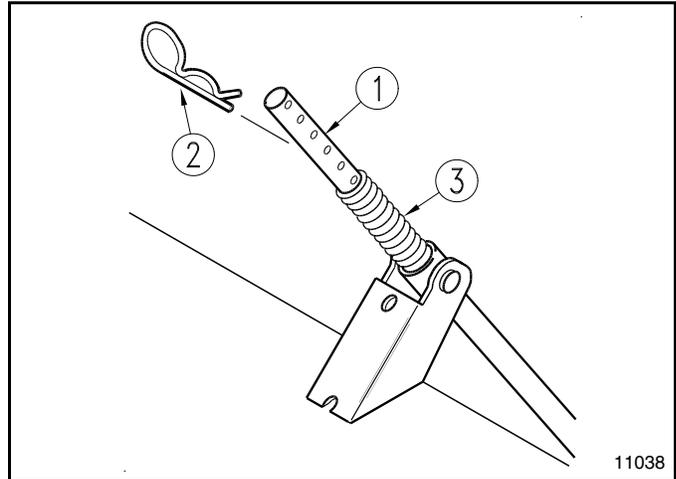


**Skid Shoe Adjustment**  
Figure 3-2

**Rear Deflector & Down Pressure Kit**

Refer to Figure 3-3:

The rear deflector can be adjusted closer to the ground to produce a fine soil texture or raised to produce a coarse soil texture. Adjust spring rods (#1) and rear deflector to the desired height and then reinstall hairpin cotters (#2) in one of the top six spring rods holes above cushion springs (#3).



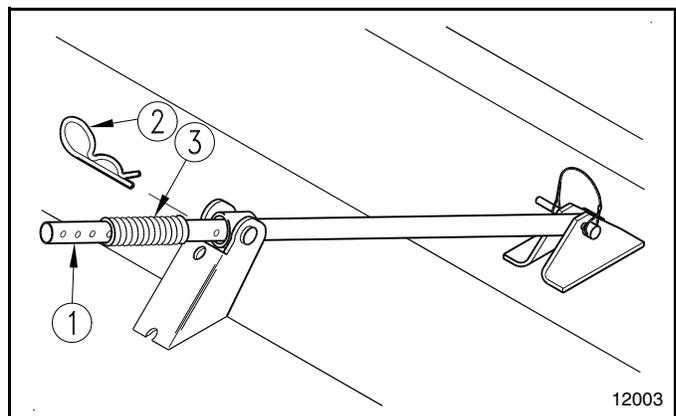
**Lowered Position**  
Figure 3-3

Refer to Figure 3-4:

The rear deflector can be secured in the raised position for replacing spring tines. Remove hairpin cotters (#2) and raise deflector enough to reinstall hairpin cotters in 7th hole located below the cushion springs.

An optional spring kit, part no. 311-162A, is offered to allow you to apply down pressure on the rear deflector for leveling. Adjust locking collars up to compress springs to desired pressure.

**NOTE:** Too much pressure will cause premature wear on the rear deflector.



**Raised Position**  
Figure 3-4

## Section 4: Maintenance & Lubrication

### Maintenance

Proper servicing and adjustments are key to the long life of any implement. With careful inspection and routine maintenance, you can avoid costly downtime and repair.

Check all hardware after several hours of operation and regularly thereafter to ensure they are tight and secured. Replace worn, damaged, or illegible safety labels by obtaining new labels from your Land Pride dealer.

#### DANGER

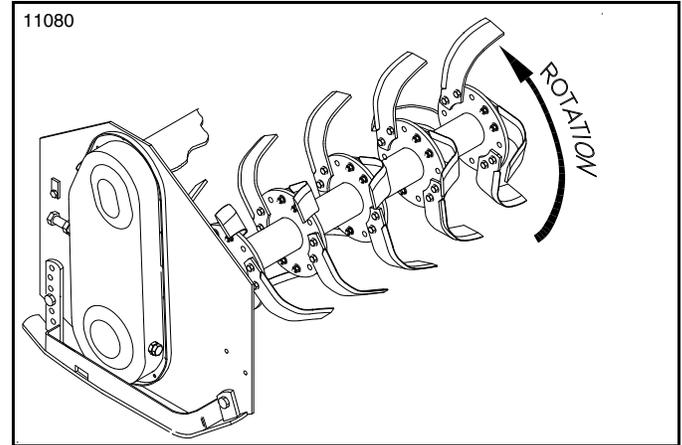
To avoid serious injury or death:

- Always disconnect driveline from the tractor before servicing the drivetrain and components powered by the drivetrain. A person can become entangled in the drivetrain if the tractor is started and the power take-off is engaged.
- Always secure equipment with solid, non-concrete supports before working under it. Never go under equipment supported by concrete blocks or hydraulics. Concrete can break, hydraulic lines can burst, and/or hydraulic controls can be actuated even when power to the hydraulics is off.

#### WARNING

To avoid serious injury or death:

- Make sure controls are all in the neutral position or park before starting the power machine.
- Allow only persons to perform maintenance on this implement who have been properly trained in its safe operation.
- Always follow “Tractor Shutdown Procedure” provided in this manual before dismounting the tractor.
- An unsupported parked tiller can tip over easily. Always use tiller park stand and when needed, non-concrete support blocks to prevent the tiller from tipping onto a person when disconnected from the tractor.
- Perform scheduled maintenance. Check for loose hardware, missing parts, broken parts, structural cracks, and excessive wear. Make repairs before putting the implement back into service.
- Do not alter implement or replace parts on the implement with other brands. Other brands may not fit properly or meet OEM (Original Equipment Manufacturer) specifications. They can weaken the integrity and impair the safety, function, performance, and life of the implement. Replace parts only with genuine OEM parts.



Tine Replacement  
Figure 4-1

### Tine Replacement

Refer to Figure 4-1:

#### WARNING

To prevent serious injury or death:

Used tines can be very sharp. Always wear gloves when handling tines to protect against cuts.

**IMPORTANT:** When ordering tines, be sure to order only genuine OEM tines and to order both right- and left-hand tines. Always install tines with cutting edge facing the direction of rotation.

**IMPORTANT:** Remove and install one tine at a time to ensure they are oriented correctly when installed.

1. Remove the two nuts, lock washers, and bolts from the tine to be replaced and then remove the tine.
2. Attach new tine to the mounting flange making sure its cutting edge crosses over the mounting flange and leads in rotation.
3. Reinstall removed hardware and tighten the two nuts to the correct torque for a 1/2"-13 GR5 bolt. Refer to “Torque Values Chart for Common Bolt Sizes” on page 34.
4. Repeat steps 1 to 3 until all tines have been replaced.

## Section 4: Maintenance & Lubrication

### Driveline Maintenance

Before each use, check that the driveline is securely fastened and that all driveline shields are in place, undamaged and in working order. Replace driveline and shields as needed. Order only genuine Land Pride parts from your local Land Pride dealer.

#### DANGER

To prevent serious injury or death:

- Tractor power take-off shaft shield, driveline shields, and gearbox shaft shields must be installed and in good working condition to avoid driveline entanglement and projectiles flying off of the driveline.
- Always disconnect driveline from the tractor before servicing the drivetrain and components powered by the drivetrain. A person can become entangled in the drivetrain if the tractor is started and the power take-off is engaged.

#### WARNING

To prevent serious injury or death:

- A slip clutch that has been in use or has slipped for as little as only two or three seconds during run-in may be too hot to touch. Allow a hot clutch to cool before working on it.
- Do not operate a broken or bent driveline. Such a driveline will break apart while rotating at high speeds. Always remove the implement from use until the damaged driveline can be repaired or replaced.

### Slip Clutch Protected Driveline

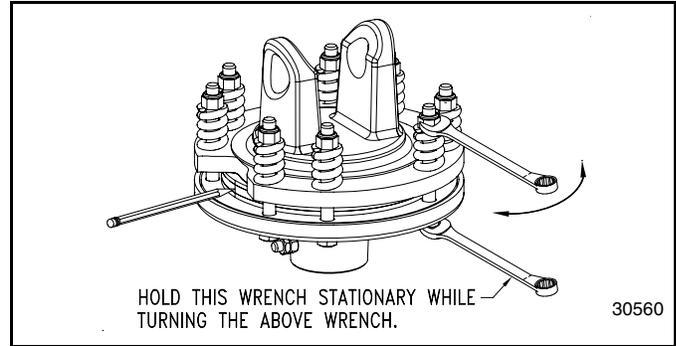
The purpose of the slip clutch is to protect the drivetrain from shock loads. To do this, the clutch must be capable of slippage during operation. To verify the clutch will slip, a “Clutch Run-in” operation must be completed.

#### WARNING

To avoid serious injury or death:

A slip clutch that has been in use or has slipped for as little as only two or three seconds during run-in may be too hot to touch. Allow a hot clutch to cool before working on it.

**IMPORTANT:** Prior to initial operation and after 30 days of inactivity, slip friction disks to remove oxidation and moisture. Moisture allows disks to slip easily. Oxidation can prevent disk from slipping causing driveline damage. This damage is NOT covered under the warranty.



**Clutch Run-In**  
**Figure 4-2**

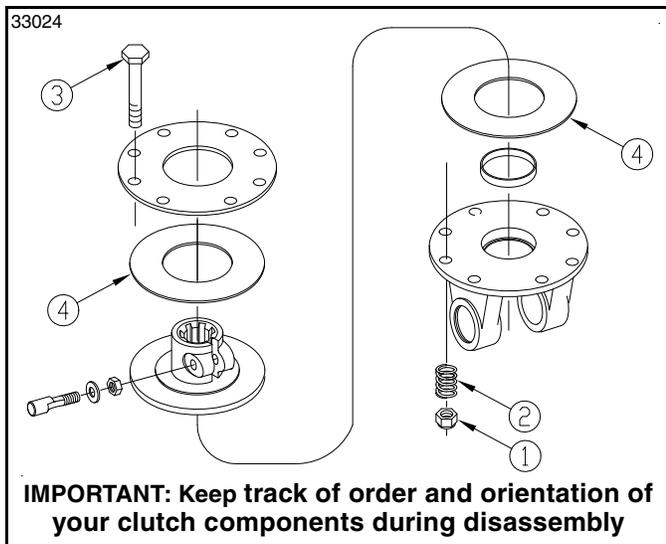
### Clutch Run-In

Refer to Figure 4-2:

Friction clutches should be “run-in” prior to initial operation and after long periods of inactivity to remove any oxidation that may have accumulated on friction surfaces. To prevent driveline and gearbox damage, repeat “run-in” instructions at beginning of each season and when moisture and/or condensation seizes inner friction disks.

1. Using a pencil or other marker scribe a line across the exposed edges of the clutch plates and friction disks.
2. Carefully loosen each of the 8 spring retainer nuts by exactly 2 revolutions. It will be necessary to hold the hex end of the retainer bolt in order to count the exact number of revolutions.
3. Start the tractor and engage the driveline drive for 2-3 seconds to permit slippage of the clutch surfaces. Disengage the driveline, then re-engage a second time for 2-3 seconds. Disengage driveline, shut off tractor, and remove key. Wait for all components to stop before dismounting from tractor.
4. Inspect the clutch and ensure that the scribed markings made on the clutch plates have changed position. Slippage has not occurred if any two marks on the friction disk and plate are still aligned. A clutch that has not slipped must be disassembled to separate the friction disk plates. See “Clutch Disassembly” to disassemble clutch.
5. Tighten each of the 8 spring retainer nuts on the clutch housing exactly 2 revolutions to restore the clutch to the original setting pressure.
6. The clutch should be checked during the first hour of operation and periodically each week. An additional set of scribe marks can be added to check for slippage. See “Clutch Assembly” to adjust for proper spring length.

Section 4: Maintenance & Lubrication



Clutch Disassembly  
Figure 4-3

**Clutch Disassembly**

If the clutch run-in procedure, (See “Clutch Run-In” on page 26), indicated that one or more of the friction disks did not slip, the clutch must be disassembled to separate the friction discs.

**IMPORTANT: Refer to Figure 4-4. Be sure to measure and record length (“A”) of each spring before disassembling the clutch.**

**Refer to Figure 4-3:**

See **IMPORTANT NOTE** above before disassembling clutch. After measuring and recording each spring length, remove spring retainer nuts (#1), springs (#2), and bolts (#3). Each friction disc (#4) must then be separated from the metal surface adjacent to it.

**Inspection**

Inspect all parts for excessive wear and condition. Clean all parts that do not require replacement. The original friction disc thickness is 1/8" (3.2 mm) and should be replaced if thickness falls below 3/64" (1.1 mm). If clutches have been slipped to the point of “smoking”, the friction discs may be damaged and should be replaced. Heat build-up may also affect the yoke joints.

**Clutch Assembly**

**Refer to Figure 4-3:**

Reassemble each friction disk (#4) next to the metal plate it was separated from. Make certain all bushing are replaced in the same location as when removed. Install bolts (#3) through end plates and intermediate plates as shown. Place springs (#2) over the bolts and secure with nuts (#1).

**Refer to Figure 4-4:**

Progressively tighten each spring retainer bolt until correct spring height (“A” dimension) is reached.

Driveline No.	PTO Speed	A (inches) Spring Height
311-132A	540	1.25" (32 mm)

Clutch Adjustment  
Figure 4-4



Section 4: Maintenance & Lubrication

**Long-Term Storage**

Clean, inspect, service, and make necessary repairs to the implement when storing it for long periods and at the end of the season. This will help to ensure the unit is ready for field use the next time you hook-up to it.

**! WARNING**

*To prevent serious injury or death:*

*Always disconnect driveline from the tractor and secure the implement in the up position with solid, non-concrete supports before servicing the underside. A person can become entangled in the drivetrain if the tractor is started and power take-off is engaged or crushed by an unsupported implement.*

1. Clean off any dirt and grease that may have accumulated on the Rotary Tiller. Scrape off compacted dirt and then wash surfaces thoroughly with a garden hose.
2. Check tines and tine bolts for wear. Replace if necessary. Refer to **“Tine Replacement”** on page 25.
3. Inspect the tiller for loose, damaged, or worn parts and adjust or replace if needed.

Repaint parts where paint is worn or scratched to prevent rust. Ask your Land Pride dealer for Aerosol touch-up paint. Paint is also available in touch-up bottles with brush, quarts, and gallon sizes by adding TU, QT or GL to the end of the Aerosol part number.

Land Pride Touch-up Paint	
Part No.	Part Description
821-011C	PAINT LP BEIGE SPRAY CAN
821-066C	PAINT ORANGE SPRAY CAN
821-070C	PAINT GP GLOSS BLACK SPRAY CAN

4. A coating of oil may be applied to worn surfaces in lieu of painting to minimize oxidation.
5. Replace all damaged or missing decals.
6. Lubricate as noted under **“Lubrication Points”** on page 29.
7. Drain and refill gearbox and chaincase oil. Be sure to replace all oil plugs.
  - Drain oil in gearbox by removing the bottom drain plug or right-hand cap.
  - Drain oil in chaincase by removing the bottom plug and tipping tiller backwards.
8. Store tiller on a level surface in a clean, dry place. Inside storage will reduce maintenance and make for a longer tiller life.
9. Follow all parking instructions on page 21 when disconnecting tractor from tiller.

**Ordering Replacement Parts**

Land Pride offers equipment in factory standard Beige with black highlights. This implement is also available in Orange.

When ordering an optional color, the suffix number corresponding to the color must be added at the end of the part number. Parts ordered without the suffix number will be supplied in factory standard colors.

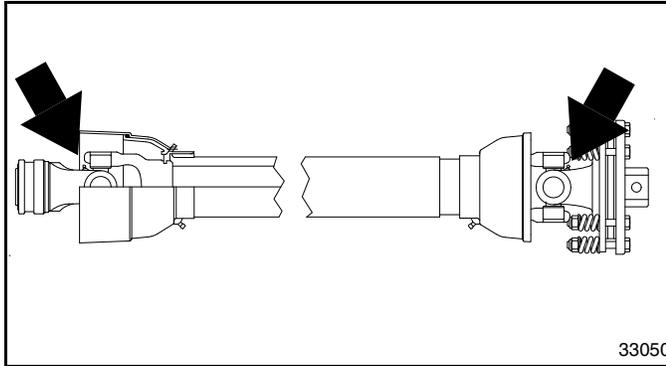
**82 . . . . . Orange      85 . . . . . Black**

For example, if you are ordering a replacement part with part number 555-555C and the existing part is orange, then add the suffix 82 to the end of the number to make the part number read 555-555C82.

## Section 4: Maintenance & Lubrication

### Lubrication Points

<b>Lubrication Legend</b>	Multi-purpose spray lube	Multi-purpose grease lube	Multi-purpose oil lube	50 Hrs	Intervals in hours at which lubrication is required



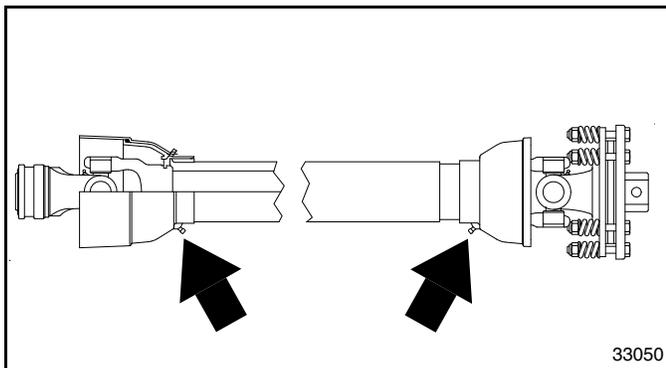
	8 Hours
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#### Driveline U-Joints

Add grease to the driveline u-joint every 8 hours of operation.

Type of grease = Multi-Purpose

Quantity = Coat Generously



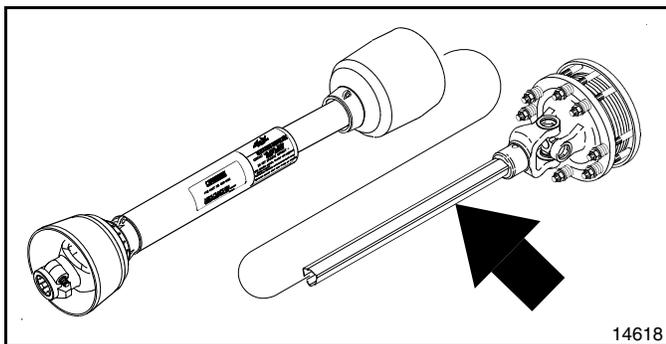
	8 Hours
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#### Driveline Shield Bearings

Add grease to the driveline shields every 8 hours of operation.

Type of Lubrication: Multi-Purpose

Quantity = 6 pumps



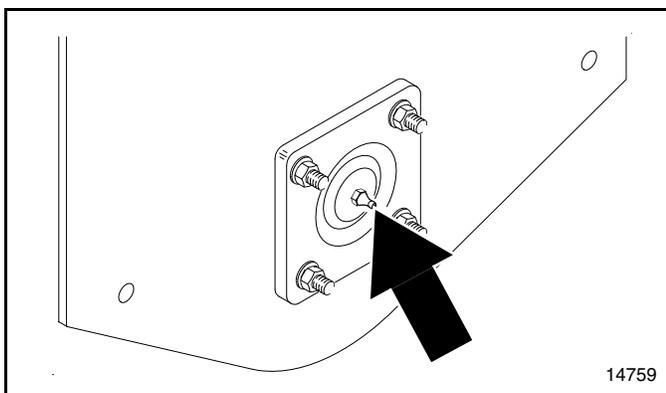
	20 Hours
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#### Driveline Profiles

Disconnect driveline from the tractor and slide apart. Clean and coat the inner tube of the driveline with a light film of grease and then reassemble.

Type of grease = Multi-Purpose

Quantity = Coat Generously



	8 Hours
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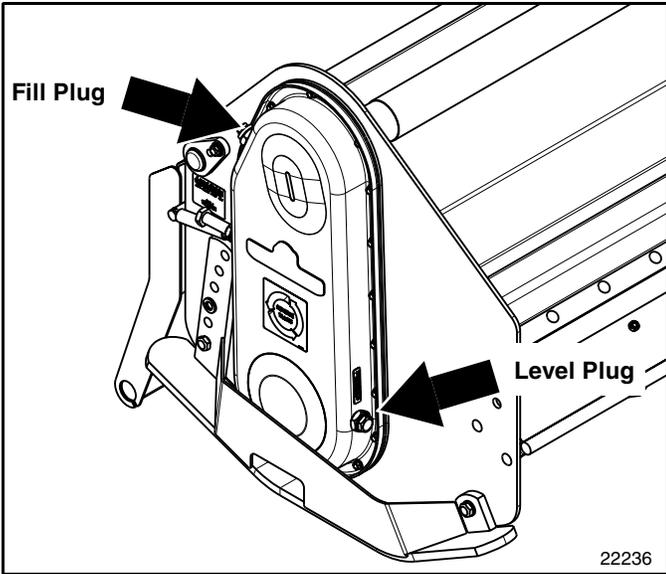
#### Bearing on Left End of Rotor Shaft

Grease bearing on right end of tines until grease starts to purge from the relief hole in the bearing mount casting on the inside of the tiller end plate.

Type of grease = Multi-Purpose

Quantity = Coat Generously

Section 4: Maintenance & Lubrication



	<b>As Required</b>
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**Chaincase**

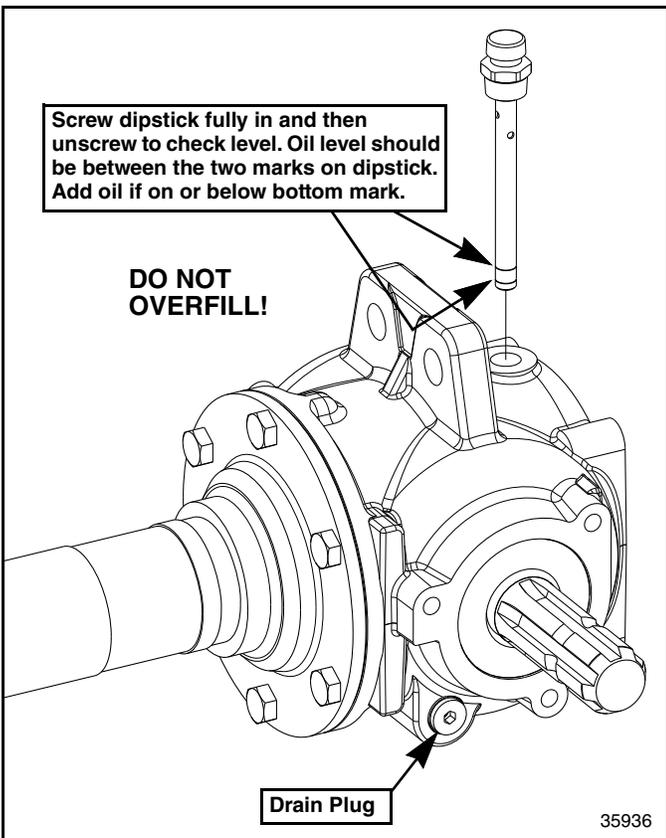
**IMPORTANT:** Check lubricant level in the chaincase after the machine has run long enough to heat the lubricant to a fluid state. Level the machine and remove lower level plug. Heated lubricant should reach the bottom of the plug hole. If needed, add recommended lubricant through the level hole or fill hole. Tighten all removed plugs when done.

Type of Lubrication:

Shell Gadus S2 V220 00 flowable grease or equivalent Land Pride #821-086C, 32oz. (.95 L) bottle

Quantity when empty: 32 oz (0,95L)

Quantity when low: Flowable grease should reach bottom of level plug hole when in the liquid state.



	<b>50 Hours</b>
--	-----------------

**Gearbox**

Check oil level in gearbox by unscrewing top vented dipstick. Wipe oil from dipstick and screw dipstick in without tightening. Unscrew dipstick and check oil on dipstick. If on or below bottom level mark, add recommended gear lube through dipstick hole until oil reaches top mark on dipstick. Do not overfill. Reinstall vented dipstick and tighten.

**IMPORTANT:** Take your gearbox to your dealer should it require repair work. Check oil level in gearbox at least every 50 hours of operation.

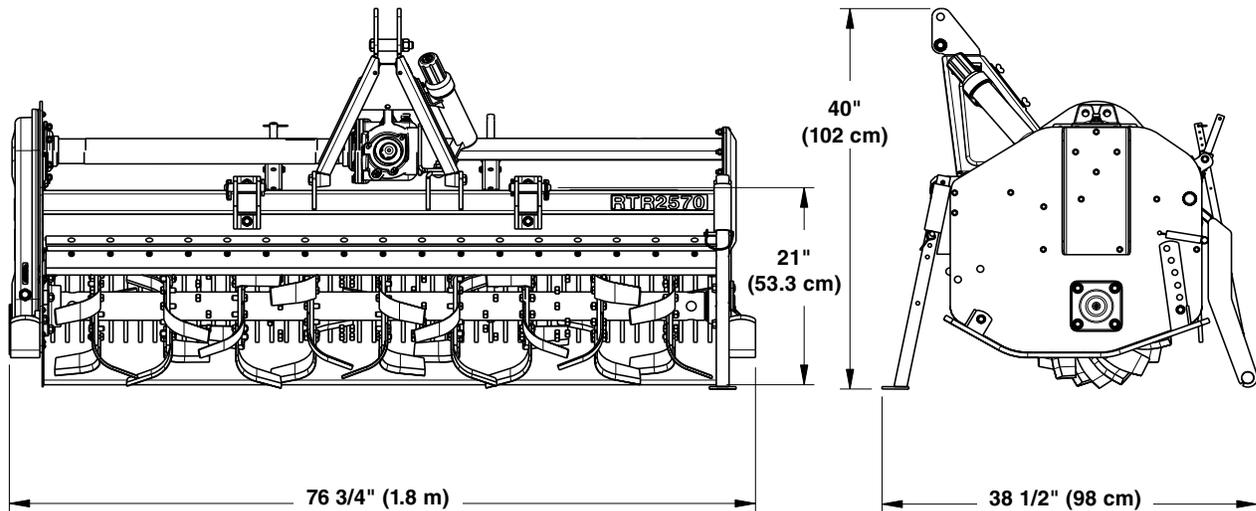
Type of lubrication = Gear Lube 80-90W EP

Quantity = As required



### RTR2570 Model

	Specifications & Capacities
<b>Recommended Power Take-off Horsepower</b>	25 - 75 Horsepower (18.6 - 56 kW)
<b>Weight</b>	868 lbs (394 kg)
<b>Tilling Width</b>	70" (1.78 m)
<b>Overall Width</b>	76 3/4" (1.95 m)
<b>3-Point Hitch Type</b>	Category 1 with Adjustable lower Hitch Clevises Fits Land Pride Quick Hitch
<b>Offset Capabilities</b>	Yes (Cannot offset with Quick Hitch)
<b>Number of Flanges</b>	9
<b>Number of Tines per Flange</b>	6 ea. "C" shaped blades
<b>Tine Construction</b>	High Carbon heat treated "C" shaped blades
<b>Skid Shoes</b>	Adjustable
<b>Storage Stands</b>	Adjustable
<b>Rear Deflector</b>	Spring Loaded, adjustable, profile stamped rear deflector
<b>Front Protector</b>	Plate with reinforced rubber insert
<b>Driveline</b>	ASAE Category III Heavy Duty Friction Clutch-Standard
<b>Gearbox</b>	Cast Iron Housing, Straight Bevel Gears
<b>Gearbox Oil Capacity and Type</b>	1.65 Pints of Gear Lube 80-90W EP
<b>Drive Chain</b>	#100 Roller chain - Fully enclosed in oil bath with drain plug, fill plug and skid protection
<b>Chaincase</b>	Shell Gadus S2 V2200 00 flowable grease or equivalent 32 oz (0,95 L)
<b>Lubrication type</b>	
<b>Lubrication capacity</b>	
<b>Sprockets</b>	Hardened teeth
<b>Rotor Swing Diameter</b>	17" (43.2 cm)
<b>Rotor Shaft Speed</b>	220 rpm at 540 rpm power take-off speed
<b>Coil Spring "Sifting" Tines</b>	46



37072



### RTR2570 Model

Features	Benefits
<b>American made</b>	Many tillers are imported. American made means better parts availability.
<b>Reverse tilling action</b>	Reverse action 'sucks' tiller into ground, does not walk on top of hard ground like forward rotation tillers can.
<b>Tractor hp rating</b>	25-75 hp (18.6 - 56 kW)
<b>Gearbox Warranty</b>	3 Years on housing, gears, shafts, seals, bearings. Shows our confidence in the product.
<b>Working Width</b>	
<b>Stamped upper hitch plate</b>	Stamped plate adds additional strength to hitch.
<b>Hitch bolted to inside of support</b>	Force is applied downward on top hitch, by bolting hitch to inside of support, keeps hitch from spreading outward.
<b>Hitch Offset capability</b>	Offset 5" (12.7 cm) by moving lower hitch points, allows to cover right tire track.
<b>Fits Land Pride Quick Hitch</b>	Allows for quick and easy one person hook-up. Cannot be used with offset.
<b>Adjustable Park stand</b>	Allows for easy hook-up and storage.
<b>Adjustable skid shoes</b>	Control depth from various settings.
<b>Wear shield on left skid shoe</b>	Shield protects lower portion of chain cover from wearing due to dragging in the soil.
<b>Formed rear deflector with springs</b>	Formed steel gives the rear deflector additional strength. Springs allow deflector to bounce as it hits obstructions.
<b>Material separator behind tilling action</b>	3/8" (10 mm) Rods sift material letting bigger items fall first. Sifted soil falls last burying the bigger items. Attachment is one all welded piece for easy assembly.
<b>Front deflector plate</b>	Front deflector plate is flexible to take the beating rocks or debris will give it.
<b>Six tines per flange</b>	Six tines go through the ground better than four.
<b>"C" Tines</b>	C Tines take less horsepower to move through the ground.
<b>3" O.D. x 1/4" wall tubing with stub shafts on ends</b>	Superior strength in oversize tubing.
<b>17" (43.2 cm) Rotor swing diameter</b>	For deep tilling action.
<b>Double lip seal on rotor bearing</b>	Double lip seal keeps the dirt out and the grease in.
<b>Cat. 3 driveline with slip-clutch protection</b>	Heavy driveline for rough conditions. Slip-clutch protects other drivetrain components and saves having to replace shear bolts.
<b>#100 Drive chain enclosed in oil bath</b>	Heavy-duty drive chain reduces stretching. Oil keeps constant lubrication and holds wear to a minimum.
<b>Easy to adjust chain tightener</b>	Cast iron chain tightener is a simple bolt adjustment to keep constant tension on the chain.
<b>Stamped chain cover</b>	Stamped forming adds additional strength.
<b>Spring tines behind tilling action</b>	Spring tines sift the material letting bigger items fall first. Sifted soil falls last burying the bigger items.

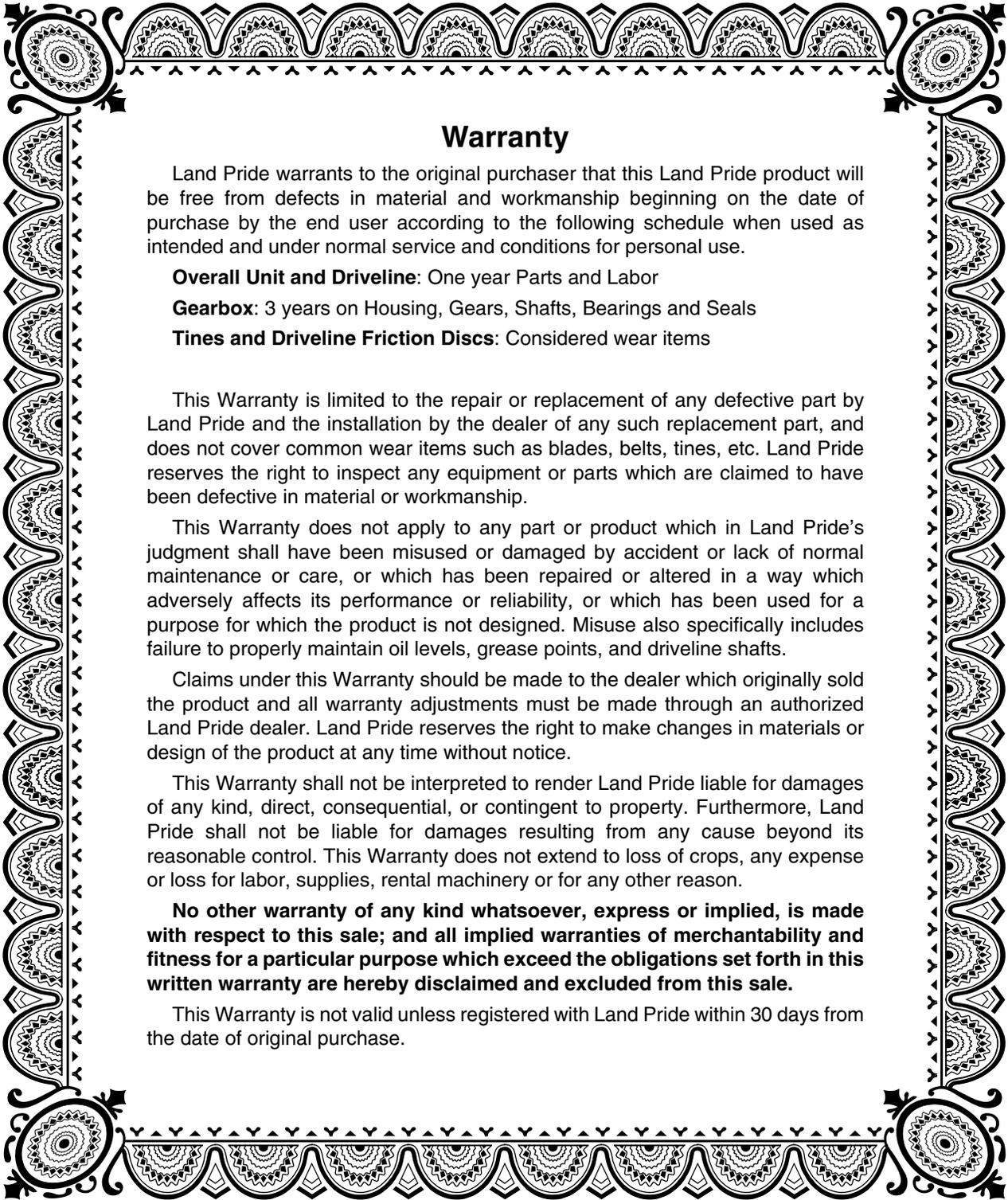


### RTR2570 Troubleshooting

Problem	Cause	Solution
<b>Machine makes intermittent clicking noise</b>	Tines are loose. Gearbox has tooth damaged. Roller chain is damaged.	Tighten tines. Replace damaged gearbox. Replace damaged chain link.
<b>Driveline vibrates</b>	Universal joint is worn. Excessive trash is wrapped on rotor. Machine is lifted too high.	Replace universal joint. Remove trash. Lower machine and readjust tractor lift stop.
<b>Gearbox noise is noticeable and constant</b>	May be normal on new machine. Low oil level. Worn gears.	Allow time for break-in. Add oil to the gearbox. Replace gears in the gearbox.
<b>Oil leaking from gearbox</b>	Seals and/or gaskets are damaged. Gearbox is overfilled.	Replace seals or gaskets in the gearbox. Drain oil to proper level.
<b>Rotor will not turn</b>	Power take-off is not engaged. Drive chain is broken. Driveline shearbolt is sheared. Friction clutch is slipping.	Engage power take-off. Repair drive chain. Replace shearbolt. Reduce load to tiller.
<b>Tillage depth insufficient</b>	Tiller is carried by tractor. Tractor has insufficient power. Skid Shoes need adjusting. Tines are worn or bent. Tines are incorrectly installed. Obstacles are entangled in tines and/or rotor. Lower hitch clevises are in the wrong position.	Lower tractor 3-point arms. Increase tractor rpm. Adjust skid shoes. Replace tines. Check tine placement. Clear rotor and/or tines of obstacles. Relocate lower hitch clevises.
<b>Soil texture too coarse</b>	Leveling door is too high. Power take-off speed is too slow. Ground speed is too fast.	Lower leveling door. Increase power take-off speed. Decrease ground speed.
<b>Soil texture too fine</b>	Leveling door is too low. Ground speed is too slow.	Raise leveling door. Increase Ground Speed.
<b>Machine skips or leaves crop residue</b>	Tines are badly worn. Friction clutch is slipping. Ground speed is too fast for conditions.	Replace worn tines. Reduce load. Reduce ground speed.
<b>Tines operating behind tractor tires show increased wear</b>	Tractor tires can compact soil causing tines that operate in the compacted soil to have increased wear.	Considered as normal wear. Replace worn tines.
<b>Tines balling up with soil</b>	Tines are worn or bent. Tines are incorrectly installed. Rear deflector is too low. Tractor speed is too fast. Soil is too wet.	Replace tines. Install tines correctly. Raise rear deflector. Decrease tractor speed. Wait until soil dries.
<b>Tiller bumping on ground</b>	Obstacles are entangled in tines and/or rotor. Tines are not installed correctly.	Clear rotor and/or tines. Install tines correctly.



Torque Values Chart for Common Bolt Sizes													
Bolt Size (inches)	Bolt Head Identification						Bolt Size (Metric)	Bolt Head Identification					
	Grade 2		Grade 5		Grade 8			Class 5.8		Class 8.8		Class 10.9	
in-tpi <sup>1</sup>	N · m <sup>2</sup>	ft-lb <sup>3</sup>	N · m	ft-lb	N · m	ft-lb	mm x pitch <sup>4</sup>	N · m	ft-lb	N · m	ft-lb	N · m	ft-lb
1/4" - 20	7.4	5.6	11	8	16	12	M 5 X 0.8	4	3	6	5	9	7
1/4" - 28	8.5	6	13	10	18	14	M 6 X 1	7	5	11	8	15	11
5/16" - 18	15	11	24	17	33	25	M 8 X 1.25	17	12	26	19	36	27
5/16" - 24	17	13	26	19	37	27	M 8 X 1	18	13	28	21	39	29
3/8" - 16	27	20	42	31	59	44	M10 X 1.5	33	24	52	39	72	53
3/8" - 24	31	22	47	35	67	49	M10 X 0.75	39	29	61	45	85	62
7/16" - 14	43	32	67	49	95	70	M12 X 1.75	58	42	91	67	125	93
7/16" - 20	49	36	75	55	105	78	M12 X 1.5	60	44	95	70	130	97
1/2" - 13	66	49	105	76	145	105	M12 X 1	90	66	105	77	145	105
1/2" - 20	75	55	115	85	165	120	M14 X 2	92	68	145	105	200	150
9/16" - 12	95	70	150	110	210	155	M14 X 1.5	99	73	155	115	215	160
9/16" - 18	105	79	165	120	235	170	M16 X 2	145	105	225	165	315	230
5/8" - 11	130	97	205	150	285	210	M16 X 1.5	155	115	240	180	335	245
5/8" - 18	150	110	230	170	325	240	M18 X 2.5	195	145	310	230	405	300
3/4" - 10	235	170	360	265	510	375	M18 X 1.5	220	165	350	260	485	355
3/4" - 16	260	190	405	295	570	420	M20 X 2.5	280	205	440	325	610	450
7/8" - 9	225	165	585	430	820	605	M20 X 1.5	310	230	650	480	900	665
7/8" - 14	250	185	640	475	905	670	M24 X 3	480	355	760	560	1050	780
1" - 8	340	250	875	645	1230	910	M24 X 2	525	390	830	610	1150	845
1" - 12	370	275	955	705	1350	995	M30 X 3.5	960	705	1510	1120	2100	1550
1-1/8" - 7	480	355	1080	795	1750	1290	M30 X 2	1060	785	1680	1240	2320	1710
1-1/8" - 12	540	395	1210	890	1960	1440	M36 X 3.5	1730	1270	2650	1950	3660	2700
1-1/4" - 7	680	500	1520	1120	2460	1820	M36 X 2	1880	1380	2960	2190	4100	3220
1-1/4" - 12	750	555	1680	1240	2730	2010	<sup>1</sup> in-tpi = nominal thread diameter in inches-threads per inch <sup>2</sup> N · m = newton-meters <sup>3</sup> ft-lb= foot pounds <sup>4</sup> mm x pitch = nominal thread diameter in millimeters x thread pitch						
1-3/8" - 6	890	655	1990	1470	3230	2380							
1-3/8" - 12	1010	745	2270	1670	3680	2710							
1-1/2" - 6	1180	870	2640	1950	4290	3160							
1-1/2" - 12	1330	980	2970	2190	4820	3560							
Torque tolerance + 0%, -15% of torquing values. Unless otherwise specified use torque values listed above. All locknuts or lubricated fasteners: Use 75% of torque value. (i.e. 1/2"-13 GR5 = 76 ft-lb; 75% of 76 or .75 x 76 = 57 ft-lb)													
Additional Torque Values													
Lower flange bearing on drive end of rotor, 1/2" nuts							45-50 ft-lbs						



### Warranty

Land Pride warrants to the original purchaser that this Land Pride product will be free from defects in material and workmanship beginning on the date of purchase by the end user according to the following schedule when used as intended and under normal service and conditions for personal use.

**Overall Unit and Driveline:** One year Parts and Labor

**Gearbox:** 3 years on Housing, Gears, Shafts, Bearings and Seals

**Tines and Driveline Friction Discs:** Considered wear items

This Warranty is limited to the repair or replacement of any defective part by Land Pride and the installation by the dealer of any such replacement part, and does not cover common wear items such as blades, belts, tines, etc. Land Pride reserves the right to inspect any equipment or parts which are claimed to have been defective in material or workmanship.

This Warranty does not apply to any part or product which in Land Pride’s judgment shall have been misused or damaged by accident or lack of normal maintenance or care, or which has been repaired or altered in a way which adversely affects its performance or reliability, or which has been used for a purpose for which the product is not designed. Misuse also specifically includes failure to properly maintain oil levels, grease points, and driveline shafts.

Claims under this Warranty should be made to the dealer which originally sold the product and all warranty adjustments must be made through an authorized Land Pride dealer. Land Pride reserves the right to make changes in materials or design of the product at any time without notice.

This Warranty shall not be interpreted to render Land Pride liable for damages of any kind, direct, consequential, or contingent to property. Furthermore, Land Pride shall not be liable for damages resulting from any cause beyond its reasonable control. This Warranty does not extend to loss of crops, any expense or loss for labor, supplies, rental machinery or for any other reason.

**No other warranty of any kind whatsoever, express or implied, is made with respect to this sale; and all implied warranties of merchantability and fitness for a particular purpose which exceed the obligations set forth in this written warranty are hereby disclaimed and excluded from this sale.**

This Warranty is not valid unless registered with Land Pride within 30 days from the date of original purchase.

**IMPORTANT:** The Online Warranty Registration should be completed by the dealer at the time of purchase. This information is necessary to provide you with quality customer service.

**Model Number** \_\_\_\_\_

**Serial Number** \_\_\_\_\_



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