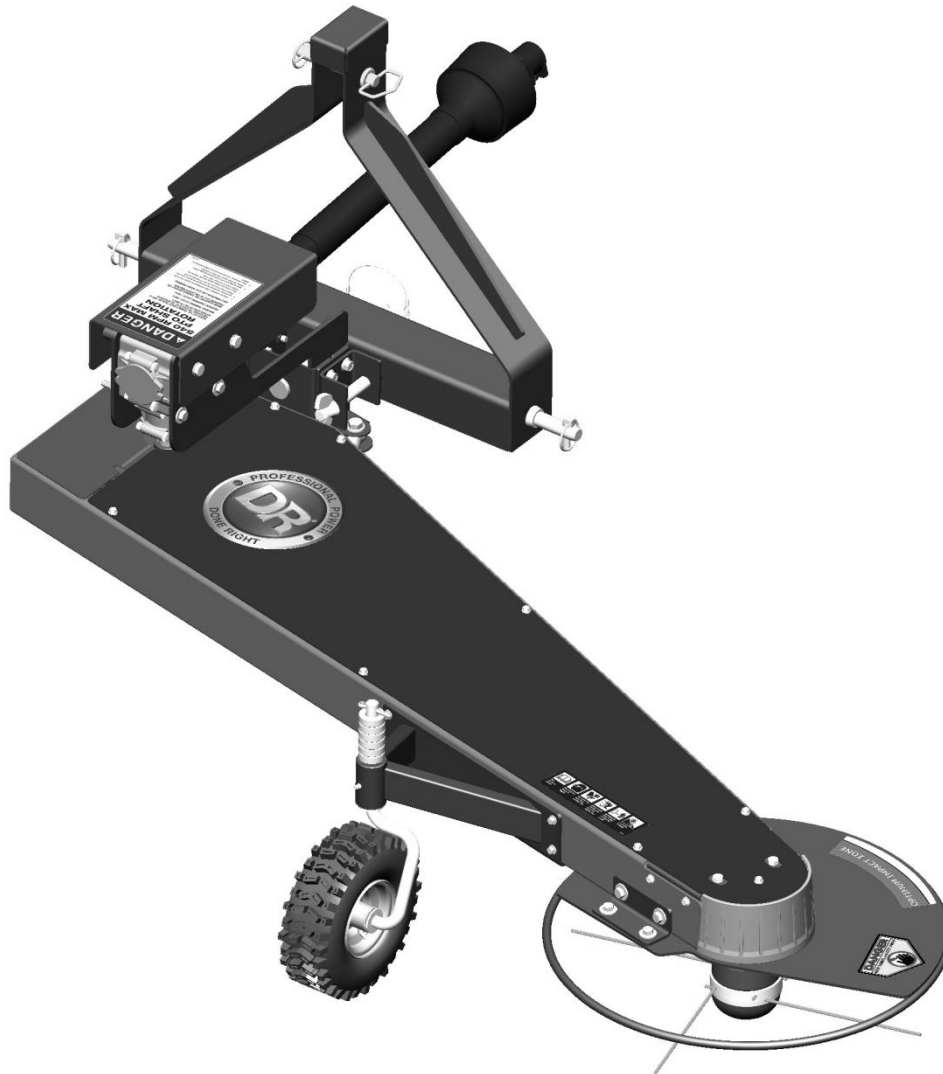


DR[®] 3-POINT HITCH TRIMMER/MOWER

SAFETY & OPERATING INSTRUCTIONS



Serial No. _____

Order No. _____

DR Power Equipment
Toll-free phone: 1-800-DR-OWNER (376-9637)
Fax: 1-802-877-1213
Website: www.DRpower.com

WARNING

Read and understand this manual and all instructions before operating the DR 3-POINT HITCH TRIMMER/MOWER.

Table of Contents

Chapter 1: General Safety Rules..... 3
Chapter 2: Setting Up The DR 3-POINT HITCH TRIMMER/MOWER..... 6
Chapter 3: Operating The DR 3-POINT HITCH TRIMMER/MOWER..... 15
Chapter 4: Maintaining The DR 3-POINT HITCH TRIMMER/MOWER..... 19
Chapter 5: Troubleshooting 25
Chapter 6: Parts Lists and Schematic Diagrams..... 26

Conventions used in this manual

DANGER

This indicates a hazardous situation, which, if not followed, will result in death or serious injury.

WARNING


This indicates a hazardous situation, which, if not avoided, could result in death or serious injury.

CAUTION

This indicates a hazardous situation, which, if not avoided, could result in minor or moderate injury.

NOTICE

This information is important in the proper use of your machine. Failure to follow this instruction could result in damage to your machine or property.

OUTDOOR POWER	
MODEL/MODEL/O MODELE	XXXXXXX
SERIAL NO N. DE SERIE NU DE SERIE	SERIAL # XXXXXXX
POWER (KW)	XXXXXXX
WEIGHT (KG)	XXXXXXX
ITEM #	XXXXXXX
MANUFACTURED DATE	XXXXXXX
 COUNTRY HOME PRODUCTS, INC. 75 MEIGS RD VERGENNES, VT 05491	
COUNTRY OF ORIGIN	XXXXXXX

Serial Number and Order Number

A Serial Number is used to identify your machine and is located on the Serial Number Label on your machine. An Order Number is used to check and maintain your order history and is located on the upper left portion of your packing slip. For your convenience and ready reference, enter the Serial Number and Order Number in the space provided on the front cover of this manual.

Additional Information and Potential Changes

DR Power Equipment reserves the right to discontinue, change, and improve its products at any time without notice or obligation to the purchaser. The descriptions and specifications contained in this manual were in effect at printing. Equipment described within this manual may be optional. Some illustrations may not be applicable to your machine.

California Proposition 65

 **WARNING**
CANCER AND REPRODUCTIVE HARM - www.P65Warnings.ca.gov.

Chapter 1: General Safety Rules

! WARNING

Read this Safety & Operating Instructions manual before you use the DR 3-POINT HITCH TRIMMER/MOWER. Become familiar with the operation and service recommendations to ensure the best performance from your machine. If you have any questions or need assistance, please contact us at www.DRpower.com or call toll-free 1-800-DR-OWNER (376-9637) and one of our Technical Support Representatives will be happy to help you.

Labels

Your DR 3-POINT HITCH TRIMMER/MOWER carries prominent labels as reminders for its proper and safe use. Shown below are copies of the Safety and Information labels that appear on the equipment. Take a moment to study them and make a note of their location on your DR 3-POINT HITCH TRIMMER/MOWER as you set up and before you operate the unit. Replace damaged or missing safety and information labels immediately.



#13649



#32440



#32442



#32438

Tractor Safety Information

! DANGER

YOUR DR 3-POINT HITCH TRIMMER/MOWER is driven by a PTO shaft that transfers power from your Tractor. The Tractor and PTO shaft are extremely dangerous and can cause serious injury or death if not used properly. Read and understand all of the Warnings and operating instructions that came with your Tractor and the PTO shaft to protect yourself from severe injury or death.

Safety for Children and Pets

! WARNING

Tragic accidents can occur if the operator is not alert to the presence of children and pets. Children are often attracted to the machine and the trimming activity. *Never* assume that children will remain where you last saw them. Always follow these precautions:

- Keep children and pets out of the working area and under the watchful care of a responsible adult.
- Be alert and turn the machine off if children or pets enter the work area.
- Never allow children to operate the DR 3-POINT HITCH TRIMMER/MOWER.
- Use extra care when approaching blind corners, shrubs, trees, or other objects that may obscure your vision.

Protecting yourself and those around you

WARNING

This is a high-powered machine, with moving parts operating with high energy at high speeds. You must operate the machine safely. Unsafe operation can create a number of hazards for you, as well as anyone else in the nearby area. Always take the following precautions when using this machine:

- Keep in mind that the operator or user is responsible for accidents or hazards occurring to other people, their property, and themselves.
- Always wear protective goggles or safety glasses with side shields while trimming to protect your eyes from possible thrown debris.
- Avoid wearing loose clothing or jewelry, which can catch on the machine's moving parts.
- We recommend wearing gloves while using this machine. Be sure your gloves fit properly and do not have loose cuffs or drawstrings.
- Wear shoes with non-slip treads when using your DR 3-POINT HITCH TRIMMER/MOWER. If you have safety shoes, we recommend wearing them. Do not use the machine while barefoot or wearing sandals with exposed toes or heels.
- Wear long pants while operating the DR 3-POINT HITCH TRIMMER/MOWER.
- Use ear protectors or ear plugs rated for at least 20 dba to protect your hearing.
- Keep bystanders at least 100 feet away from your work area at all times. The tips of the cutting cords on the DR 3-POINT HITCH TRIMMER/MOWER can throw sticks, small stones, gravel, and bits of debris over long distances at great velocity. Do not travel over loose materials such as gravel or mulch with the trimmer head spinning. Doing so could cause personal injury or property damage from thrown objects. Disengage the PTO Shaft to stop the spinning cords and shut off the Tractor engine when another person or pet approaches.
- Never tamper with safety devices. Check their proper operation regularly.
- Never operate the machine when under the influence of alcohol, drugs, or medication.

Operating the Trimmer/Mower Safely

WARNING

This is a high-powered machine, with moving parts operating with high energy at high speeds. You must operate the machine safely. Unsafe operation can create a number of hazards for you, as well as anyone else in the nearby area. Always take the following precautions when using this machine:

- Do not have the Trimmer engaged or resting on the ground when backing up. The machine is designed to trim and roll on the Wheel in the forward direction only. Trimming or rolling on the Wheel in the reverse direction could damage the machine and is not covered by the Warranty.
- Know how to stop the Trimmer quickly by disengaging the PTO Shaft and shutting down the tractor.
- Never allow people who are unfamiliar with these instructions to use the DR 3-POINT HITCH TRIMMER/MOWER. Allow only responsible individuals who are familiar with these rules of safe operation to use your machine.
- Do not exceed 2 mph when trimming to allow proper cutting and discharge of material.
- Do not exceed 7 mph when transporting to prevent damage to the machine.
- Operating your 3point trimmer with the head misaligned with the ground can result in poor cut quality, pivoting problems, scalping during cutting, wear on your equipment, and damage to the cutting cord
- Never place your hands, feet, or any part of your body on or under the mower deck in the path of the spinning cords, belt, pulleys, or near the discharge opening while the tractor is running. Keep area of discharge clear of people, animals, buildings, glass, or anything else that will obstruct clear discharge, cause injury, or damage.
- Your DR 3-POINT HITCH TRIMMER/MOWER is a powerful tool, not a plaything. Exercise extreme caution at all times. The design of your machine is for trimming and mowing grass, weeds, and other growth as specified in this manual. Do not use it for any other purpose.
- Whenever you leave the operating position to make adjustments, change cords or if you have to remove grass or debris from the underside of the deck, always disengage PTO, shut down the Tractor Engine, remove the Key, wait for all moving parts to come to a complete stop, disconnect the PTO shaft from the Tractor, then wait five minutes before performing any maintenance procedure or inspection on the Trimmer.

Operating the Mower Safely (continued)

WARNING

- Be mindful of roll over hazards, changes in terrain, slopes, or wet conditions. Use care when backing up.
- Stop the cutting cords when crossing gravel drives, walks, or roads.
- Never, under any conditions, remove, bend, cut, fit, weld, or otherwise alter standard parts on the DR 3-POINT HITCH TRIMMER/MOWER. This includes all shields and guards. Modifications to your machine could cause personal injuries and property damage and will void your warranty.
- If the cutting cords strike a foreign object or if your machine should start making an unusual noise or vibration, disengage PTO, shut down the Tractor Engine, remove the Key, wait for all moving parts to come to a complete stop, disconnect the PTO shaft from the Tractor, then wait five minutes before inspection. Vibration is generally a warning of trouble. Clean and repair and/or replace damaged parts.
- While using the DR 3-POINT HITCH TRIMMER/MOWER, do not hurry or take things for granted. When in doubt about the equipment or your surroundings, stop the machine and take the time to look things over. Make sure that you have 100% control of the Trimmer at all times.
- Watch for traffic when mowing near roadways.
- Use the machine only in daylight.
- Be cautious when using your DR 3-POINT HITCH TRIMMER/MOWER around fencing, wires, ropes, and hoses. It is possible that these and other debris can become wound around the Cord Head of the machine, potentially damaging the bearings or injuring you.
- Do not operate the DR 3-POINT HITCH TRIMMER/MOWER on slopes greater than is recommended in your Tractor manual.
- Keep all nuts and bolts tight and keep the equipment in good operating condition.

A Note to All Users

No list of warnings and cautions can be all-inclusive. If situations occur that are not covered by this manual, the operator must apply common sense and operate this DR 3-POINT HITCH TRIMMER/MOWER in a safe manner. Contact us at www.DRpower.com or call 1-800-DR-OWNER (376-9637) for assistance.

Chapter 2: Setting Up The DR 3-POINT HITCH TRIMMER/MOWER

It may be helpful to familiarize yourself with the controls and features of your DR 3-POINT HITCH TRIMMER/MOWER as shown in **Figure 1** before beginning these procedures. If you have any questions at all, please feel free to contact us at www.DRpower.com.

DR 3-POINT HITCH TRIMMER/MOWER Controls and Features

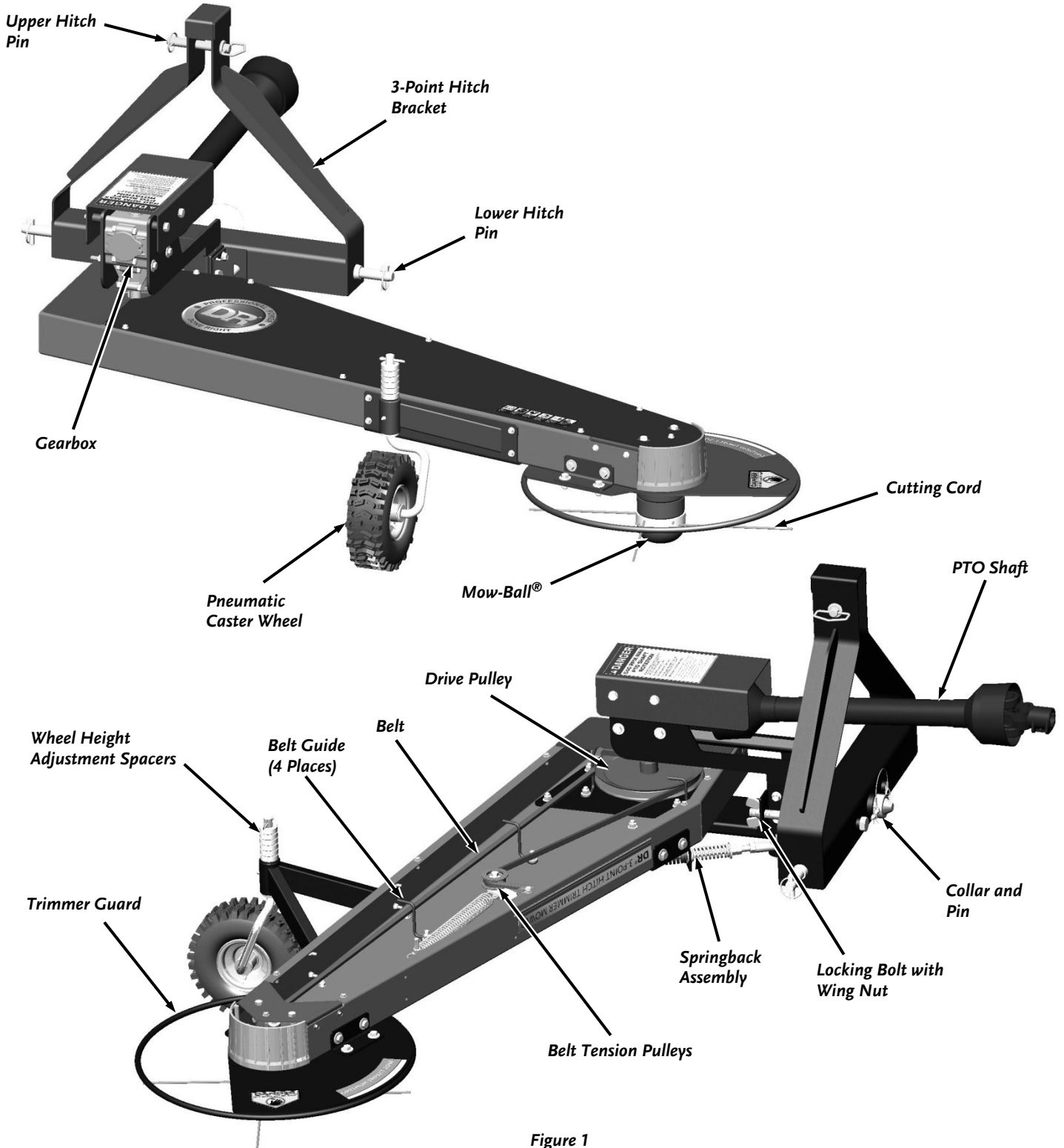


Figure 1

Specifications

Tractor Requirements	Category 1, 25 to 45 HP Max.
Drive	Tractor PTO
PTO Speed	540 RPM
Number of Trimmer Cords	4
Belt	6577BR Gates, 134-3/8" L
Belt Adjustment	Spring Loaded Idler Pulleys
Max. Wheel Base (distance from outside to outside of rear wheels)	63"
Cutting Height	3 - 7.5 in (3 - 4.5 on the head + 3 in on the wheel in 1/2" increments)
Cutting Width	22"
Machine Weight	225 Lbs

ASSEMBLY

Hardware Bag Parts (Figure 2 and Table Below)

Item	Part no.	Description	Qty
1	245551	Pin, Hitch, 3/4 X 4-3/4	1
2	245381	Linch Pin, 3/16" X 1-9/16"	2
3	323871	Nut, Wing, 3/4-10, ZP	1
4	108511	Spacer .76" ID, 1.50 OD, .50 THK	6
5	323761	Bolt, 3/4-10 X 9.5", GR8, YZP	1
6	323981	Key, Machine, 8 X 25mm	1
7	335451	Set Screw, Ft1 W/Loc Tite Patch	1

Compare the contents of the Hardware Bag with the list above and Figure 2. If you have any questions please contact us at www.DRpower.com or call 1-800-DR-OWNER (376-9637) for assistance.

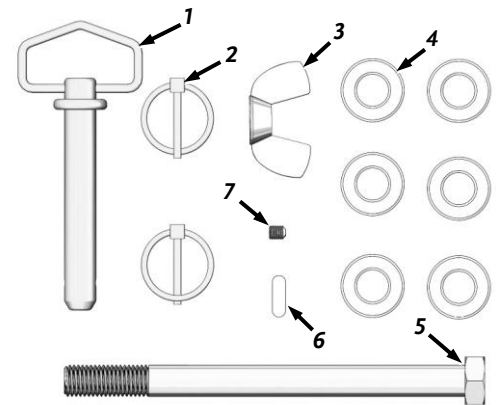


Figure 2

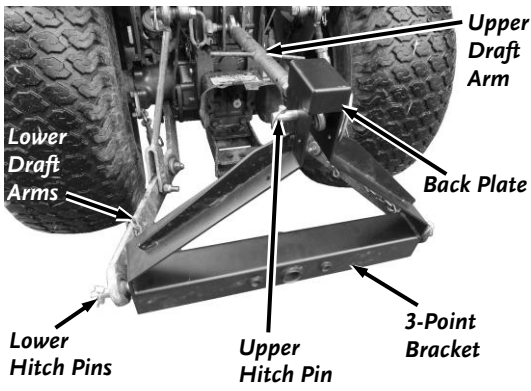


Figure 3

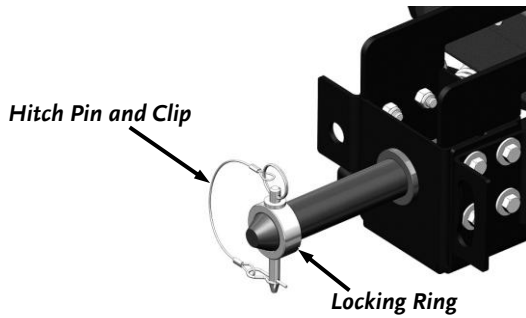


Figure 4

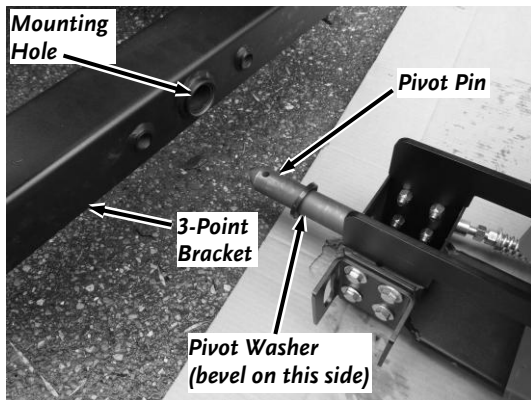


Figure 5

Attaching the 3-Point Bracket to the Tractor

! WARNING

Before performing the following procedure, be sure your tractor engine is off, brake is set, and the key removed for safety.

1. Position the 3-Point Bracket at the rear of the Tractor with the Back Plate facing away from the back of the Tractor (**Figure 4**). The opposite side of the 3-Point Bracket facing the Upper Draft Arm is open.
2. Remove the Linch Pin from the top Hitch Pin and remove the Pin from the 3-Point Bracket.
3. Position the Upper Draft Arm inside the top portion of the 3-Point Bracket and align the Holes.
4. Insert the Top Hitch Pin into the aligned holes and secure with the Linch Pin.
5. Remove the Hitch Pins from the two lower side mounting Pins of the 3-Point Bracket. Slide the Lower Draft Arms onto the lower Bracket Pins and secure with the Hitch Pins.
6. Adjust the Lower Draft Arms as needed to center the 3-Point Bracket and then lock the Lower Draft Arms to keep them from swinging side to side. See your Tractor Operator manual for specific instructions to set Draft Arm position.

Attaching the Trimmer/Mower to the 3-Point Bracket

1. Remove the Hitch Pin with Clip from the Locking Ring and remove the Ring (**Figure 4**).

Note: Leave the Pivot Washer on the Pivot Pin. The bevel should be facing the Trimmer/Mower.

2. Slide the Pivot Pin into the Mounting Hole of the 3-Point Bracket as far as it will go (**Figure 5**).

- Secure the Pivot pin to the 3-Point Bracket with the Locking Ring and Hitch Pin with Clip (**Figure 6**).

Installing the Wheel Assembly

- Insert the Wheel Shaft into the Wheel Support from underneath, install the Spacers on top and secure with the Hitch Pin (**Figure 7**).

Note: The Wheel height can be adjusted as needed. This procedure will be discussed later in Chapter 3 “Operating the DR 3-Point Hitch Trimmer/Mower”

Calculating length of PTO Shaft needed

The PTO Shaft provided with your Trimmer is 32" overall compressed length and will work “as is” for most applications. Before you install the PTO Shaft it is good practice to run through the following dimension checks to calculate optimum PTO Shaft length to determine if modifications are needed.

Without the PTO Shaft installed, use the table below to record the dimensions as outlined in the following steps.

! WARNING

The minimum recommended overlap of the tubes at the center of the PTO Shaft should be 6". Using a PTO Shaft with less than 6" overlap may fail and cause machine damage or personal injury.

Tools Needed:

- Two 11/16" Wrenches

TRACTOR SPLINE SHAFT TO GEARBOX SHAFT MEASUREMENTS	
ON GROUND	_____ Inches
SHAFTS LEVEL	_____ Inches
FULLY RAISED	_____ Inches

Note: Install the Locking Bolt as described in the paragraph “INSTALLING THE LOCKING BOLT FOR PARALLEL TRIMMING/MOWING” in the “Preparing the Trimmer/Mower for Trimming” section in Chapter 3.

- Remove the front Bolt, Washers and Locknut from the Gearbox Guard with two 11/16" Wrenches (**Figure 8**).
- Slightly loosen the rear Bolt, Washers and Locknut of the Gearbox Guard with two 11/16" Wrenches.
- Rotate the Gearbox Guard up away from the Gearbox Shaft.
- Lower the Trimmer all the way to the ground in the operating position (**Figure 9**). Measure from the end of the Tractor Spline Shaft to the end of the Trimmer Gearbox Shaft and record this dimension in the “ON GROUND” row of the table above.

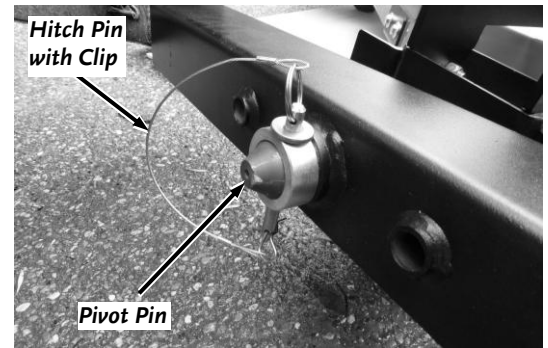


Figure 6

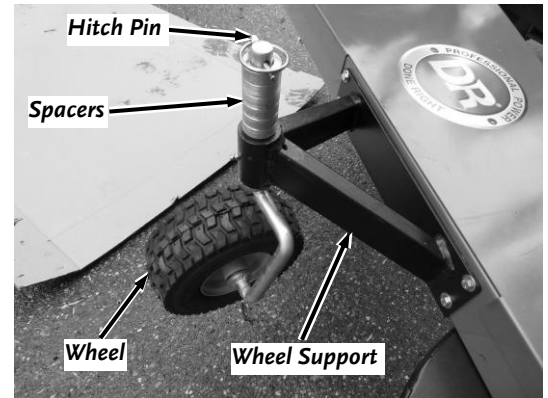


Figure 7

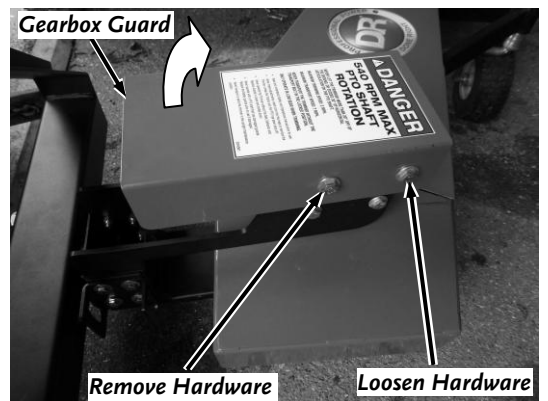


Figure 8

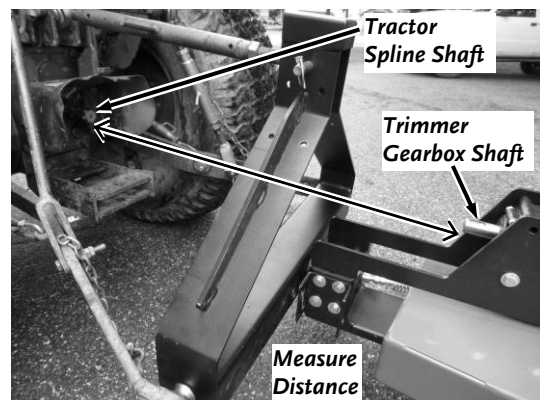


Figure 9

5. Raise the Trimmer up until the Tractor PTO Spline and Trimmer Gearbox Shaft are parallel with each other. Measure from the end of the Tractor Spline Shaft to the end of the Trimmer Gearbox Shaft and record this dimension in the "SHAFTS LEVEL" row of the table above.
6. Raise the Trimmer up as far as it will go. Measure from the end of the Tractor Spline Shaft to the end of the Trimmer Gearbox Shaft and record this dimension in the "FULLY RAISED" row of the table above.

Note: If your longest measurement exceeds 37" you will require a longer PTO Shaft. Do not proceed with installation until you have a longer PTO Shaft. If you have any questions, please visit us at www.DRpower.com or call 1-800-DR-OWNER (376-9637).

7. Take the shortest recorded measurement you wrote in the table and add 2".
8. Take that number and subtract it from 32" (overall compressed length of the supplied PTO Shaft).
9. This final number is the length that you will need to cut off of the PTO Shaft for it to fit properly to your Tractor.

EXAMPLE: Let's assume the shortest center-to-center measurement in the table is 27".

- $27 + 2 = 29$ (step 4 above)
- $32 - 29 = 3$ (step 5 above)
- You would be required to cut 3" off both halves of the PTO Shaft and 3" off the Guard.

Note: If you end up with 0" or a negative number, then no changes are needed until you reach a maximum long measurement of 37" as indicated on previous page.

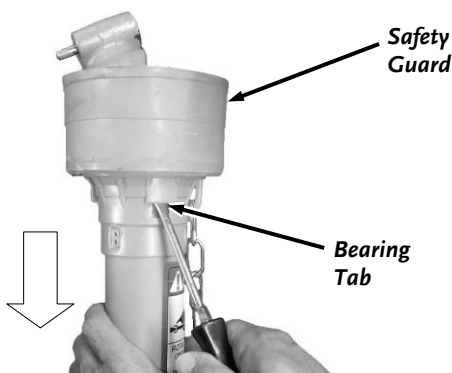


Figure 10

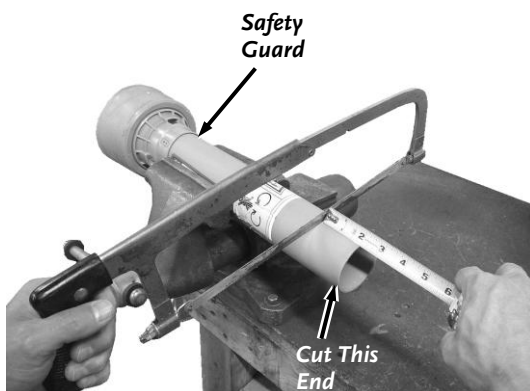


Figure 11

Modifying the PTO Shaft-if required

If you have determined in the previous steps that the PTO Shaft is too long for your set up, shorten the Shaft as follows:

Tools and Supplies Needed:

- Hacksaw
- Bench Vise
- Tape Measure
- File
- General purpose Lithium Grease

Note: Your actual PTO Shaft may look different than the one shown in these steps but the procedures are the same.

1. Separate the PTO Shaft Halves by pulling them apart.
2. Separate the Guards from the PTO Shaft Halves by inserting a flat tip screwdriver into the Bearing Tab Slots as you pull down on the Safety Guard to release the Safety Guard from the Shaft (**Figure 10**).
3. Measure and cut the ends of both Guards the required amount (**Figure 11**).

Note: If you put the Guards in a vise to hold them, be careful not to clamp it too tight because it could crack the plastic.

4. Measure and cut each Shaft Tubes to the required length using the hacksaw (**Figure 12**).
5. File or sand any burrs from the Shaft ends (**Figure 13**).
6. Grease both Shaft Tubes and under the Bearing Rings of each Shaft (**Figure 14**).
7. Insert the Shaft Halves into the Guards making sure that the Bearing Ring Slot lines up with the Tab on the inside of the Guards for proper installation (**Figure 15**).
8. Slide the two PTO Shaft Halves together.

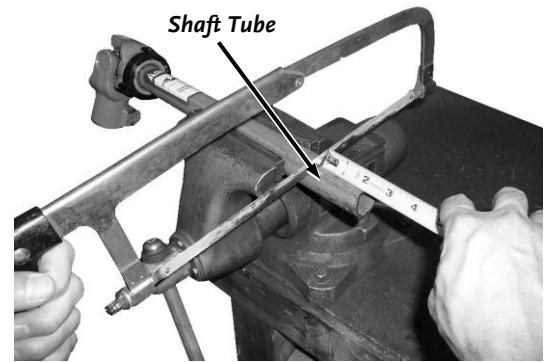


Figure 12

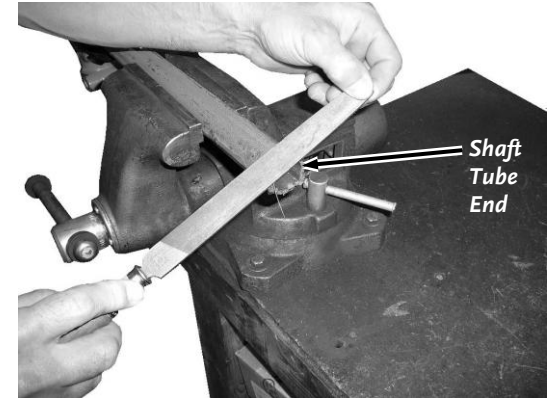


Figure 13

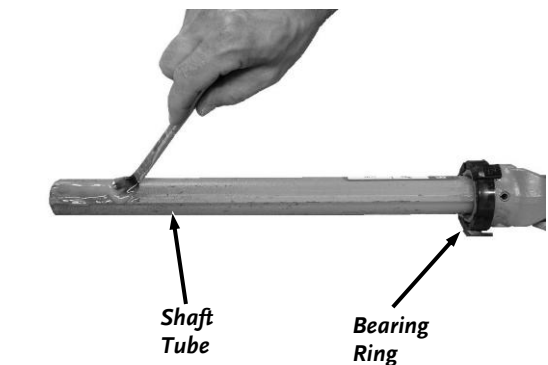


Figure 14

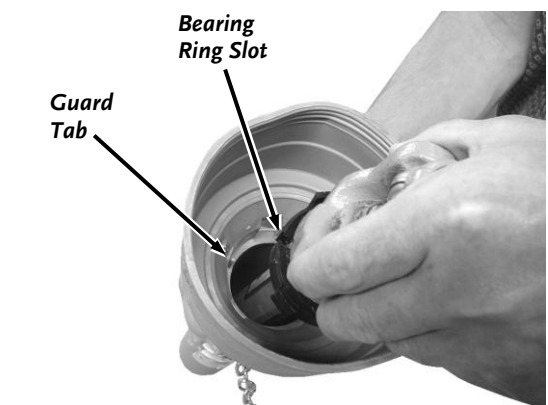


Figure 15

Note: When inserting one half of the PTO Shaft to the other you must line up the splines correctly (two pointed splines and one flat spline).

Continue to the following section to attach the PTO Shaft to the Tractor and Trimmer.

Attaching the PTO Shaft to the Tractor and Trimmer

Note: The PTO Driveshaft provided with your new machine is sized to fit a standard category 1 PTO (1-3/8" DIA. x 6" Spline).

The PTO Spline Shaft on the tractor that is to use this machine must rotate clockwise when viewing the PTO from the rear of the tractor. If the PTO rotates counterclockwise, you must have your tractor modified by installing a gearbox to reverse the direction of rotation.

The length of the PTO Driveshaft that is included with your new machine will work in most instances but may need to be modified. See "Calculating Length of PTO Shaft needed" for checking the PTO Shaft length desired and then "Modifying the PTO Shaft if required" instructions if the PTO Shaft is too long.

NOTICE

You must install the Key supplied in the Product Package where the PTO shaft attaches to the Trimmer Gearbox. Failure to install the Key will result in damage to the machine and is not covered under warranty.

Tools Needed:

- 4mm Allen Wrench
1. Open the Gearbox Guard as described on page 8.
 2. Insert the Key into the Trimmer Gearbox Shaft (**Figure 16**).

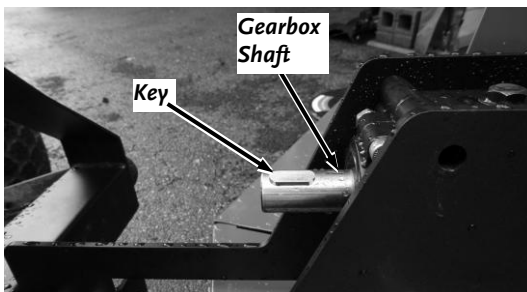


Figure 16

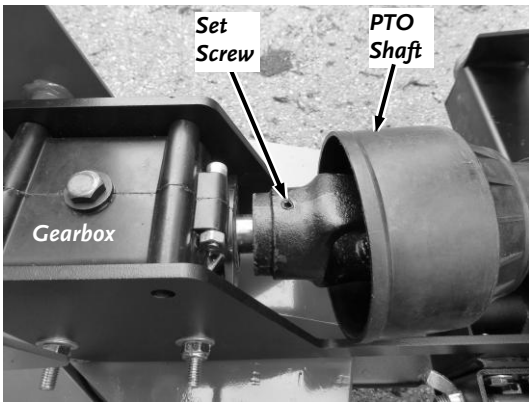


Figure 17

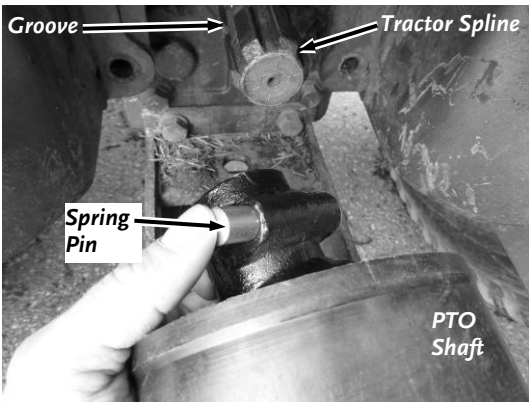


Figure 18

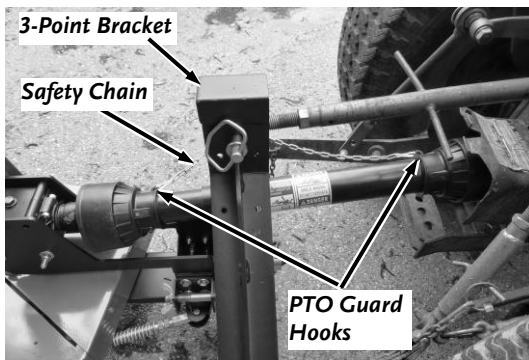


Figure 19

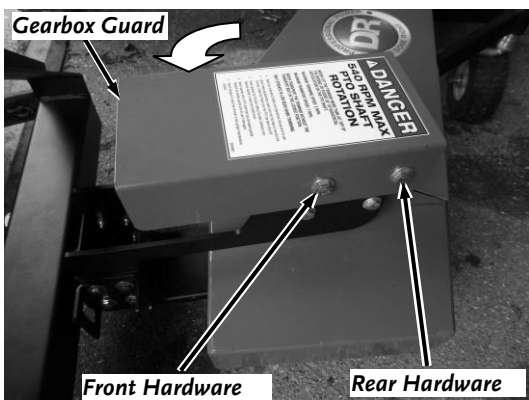


Figure 20

- Align the Key Slot of the PTO Shaft with the Key in the Shaft and slide it onto the Shaft (Figure 17).

Note: Do not allow the PTO Shaft to contact the Gearbox. The Gearbox Shaft end should be flush with the inside of the U-Joint.

- Secure the PTO Shaft with the Set Screw and tighten using a 4mm Allen Wrench.
- Push in the Spring Pin at the end of the PTO Shaft and slide it onto the Tractor Spline (Figure 18). When the PTO Shaft is started on the Tractor Spline Shaft, release the Pin and continue to push the PTO Shaft until the Spring Pin locks into the Groove of the Tractor Spline.
- Attach the Safety Chain of the PTO Shaft around a solid area of the 3-Point Bracket with the Chain ends attached to both ends of the PTO Shaft Guard (Figure 19). Make sure the Chain has enough slack in the full range of the Tractor 3-Point Arm travel.
- Lower the Gearbox Guard and install the front Bolt, Washers and Locknut with two 11/16" Wrenches (Figure 20).
- Tighten the rear Gearbox Guard hardware with two 11/16" Wrenches.

Installing Trimmer Cords

Note: Cutting height adjustments can be made as you learn the trimming characteristics of the machine in the "Operating the DR 3-Point Hitch Trimmer/Mower" in the next Chapter.

Always make sure to install all four Trimmer Cords and ensure they are the same length. Not having all four Cords installed and/or at the same length will cause excessive vibration and could damage the machine.

- Insert the end of a Trimmer Cord into the inlet hole (larger slotted cutout) push it in until the end protrudes out the other side approximately 1/2" (Figure 21).
- Turn the Cord Head 90 degrees and repeat the installation until all Cords are installed.

Note: The Cord can only move through the Cord Head in one direction. To remove it you must pull it from the other side of the Holder (where the 1/2" end is).

NOTICE

Running the trimmer without all four cords installed or cords of unequal length can cause excessive vibration and may damage the machine.

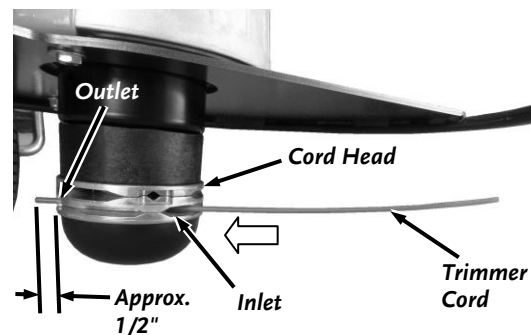


Figure 21

Cord Head Height Adjustment

Note: The Cord Head can be located above or below the Molded Spacer giving you a 1-1/2" range in trimming height. The following steps show moving the Cord Head from below the Molded Spacer to on top of the Molded Spacer.

Tools and Supplies Needed:

- Phillips head Screwdriver with at least a 6" shank
- Gloves

1. Align the hole in the Anti Wrap Canister with the hole in the internal housing at the location shown (**Figure 22**).
2. Insert a Philips Head Screwdriver into the hole in the Anti Wrap Canister and the hole in the internal Housing.
3. Rotate the Mow-Ball® Assembly until the Screw Driver slides into a hole in the shaft, locking it into place.
4. Looking down at the top of the Frame, turn the Mow-Ball® clockwise until it unscrews completely from the Bearing Housing.

Note: If the Mow-Ball® continues to turn, but does not come off, check that you locked the Screwdriver into the shaft. If the Mow-Ball will not turn by hand a 9/16" Socket can be used on the Bolt (inside the bottom of the Mow-Ball) to loosen it. You may need to clean grass or debris out of the recess first.

5. Slide the Cord Head, Adapter and Molded Spacer off the Shaft (**Figure 23**).
6. The Anti-Wrap Can and Spacer should remain on the Shaft with the Screwdriver.
7. Make sure the Adapter is inserted into the top of the Cord Head as you install the Cord Head onto the Shaft.
8. Install the Molded Spacer onto the Shaft.
9. Place the head of the Mow-Ball® Bolt so it is sitting inside the hex cavity at the bottom of the Mow-Ball®.
10. Looking down at the top of the Frame, hold the Bolt Head in place with your finger and turn the Mow-Ball® counterclockwise to start the Bolt into the Shaft.
11. Tighten the assembly securely by turning the Mow-Ball® counterclockwise when looking down on the top of the Frame (**Figure 24**).
12. Remove the Screwdriver.

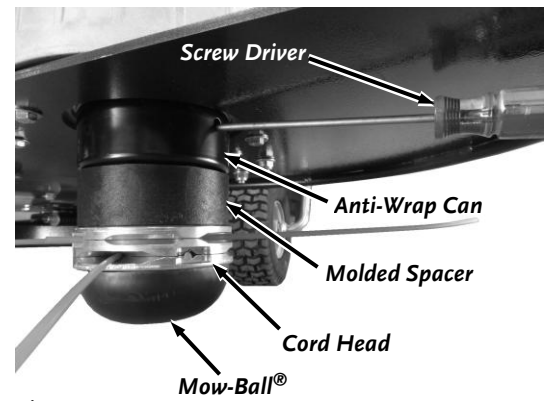


Figure 22

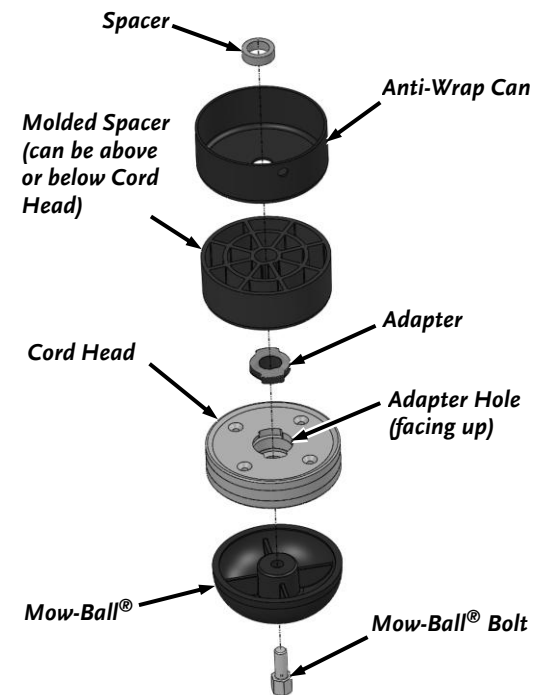


Figure 23

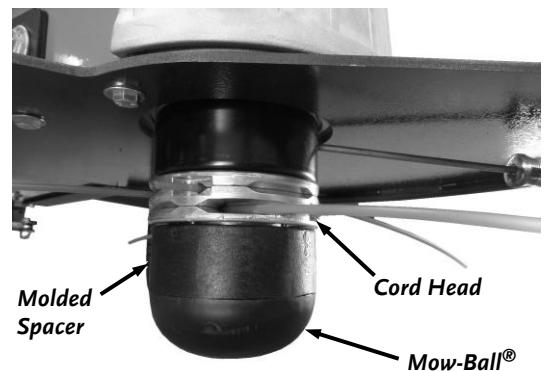


Figure 24

! WARNING

Always make sure you remove the screwdriver from the head assembly when finished. Failure to remove the screwdriver could cause injury when the head assembly is engaged.

Greasing the Wheel Support

Tools needed:

- Flexible hose grease gun
- Lithium grease
- Clean cloth

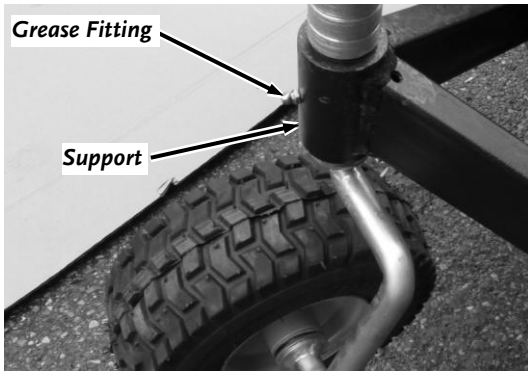


Figure 25

1. Apply a quality general-purpose lithium grease with a hand-pumped grease gun to each of the Support Grease Fitting (**Figure 25**).

The Assembly and installation of your DR Trimmer/Mower is now complete. Proceed to the next Chapter “Operating the DR 3-POINT HITCH TRIMMER/MOWER” for operating instructions.

Chapter 3: Operating The DR 3-POINT HITCH TRIMMER/MOWER

WARNING

- This machine is designed to operate at 540 rpm PTO Shaft speed only! Never operate at a faster speed; doing so can cause serious injury to the operator or bystanders and could cause damage to the machine that is not covered under warranty.
- Read and understand your Tractor user's manual and all Tractor safety Warnings for operating your Tractor safely before operating this DR 3-Point Hitch Trimmer/Mower.

Operation Notes

- See the Owner's Manual that came with your Tractor for all safety warnings and detailed information for operating your Tractor properly.
- Always operate the Tractor PTO at 540 RPM when trimming.
- Always disengage the PTO, lock the Parking Brake and shut off the Tractor when leaving the Tractor Seat.
- Never transport the Trimmer while the PTO is turning.
- Do not have the Trimmer engaged or resting on the ground when backing up. The machine is designed to trim and roll on the Wheel in the forward direction only. Trimming or rolling on the Wheel in the reverse direction could damage the machine and is not covered by the Warranty.
- Remove any debris buildup from the machine before every use of the Trimmer.
- Always install the Locking Bolt and Wing Nut into the transport holes of the 3-Point Bracket and Trimmer when transporting the Trimmer. See "Preparing the Trimmer/Mower for Transport" in this Chapter.

Preparing the Trimmer/Mower for Trimming

The characteristics of cutting height and quality is controlled by the position of the Trimmer Cords, location of Locking Bolt, Wheel Spacer arrangement and height of Tractor PTO lift Arms. It takes time and practice to learn what the best combinations of settings for different conditions are.

INSTALLING THE LOCKING BOLT FOR PARALLEL TRIMMING/MOWING (terrain that is level with Tractor Wheels)

1. Install the Bolt into the right side "holes" location through the 3-Point Bracket and Trimmer Bracket (**Figure 26**).
2. Secure the Bolt with the Wing Nut.

INSTALLING THE PIVOT BOLT FOR PIVOT TRIMMING/MOWING (terrain that is higher or lower than Tractor Wheels such as ditches)

1. Install the Bolt into the left side "slots" location through the 3-Point Bracket and Trimmer Bracket (**Figure 27**).
2. Secure the Bolt with the Wing Nut.

Checking 3-Point Bracket to PTO Shaft clearance

Observe the Trimmer as it is lifted to ensure that the 3-Point Bracket does not contact the PTO Shaft. If they do touch, the Tractor may have a setting to limit the distance it is lifted off the ground to prevent contact. See your Tractor user manual for details of Tractor settings.

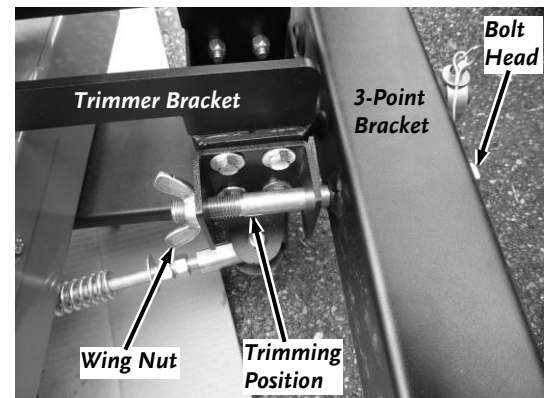


Figure 26

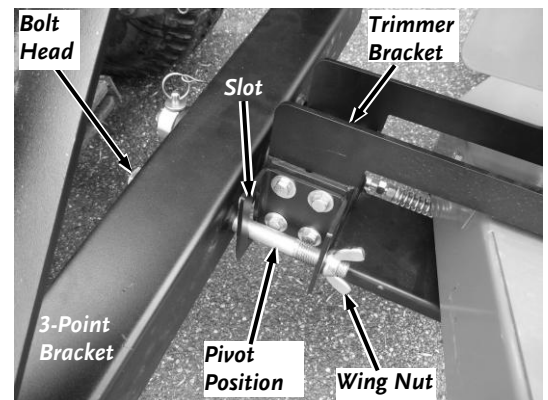


Figure 27

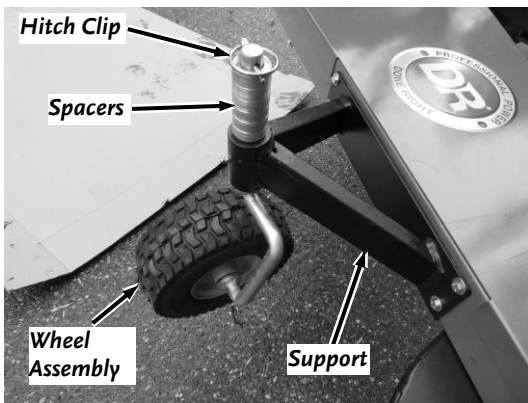


Figure 28

SETTING WHEEL HEIGHT

1. Remove the Hitch Clip and remove the Wheel Assembly with Spacers (**Figure 28**).
2. Adjust the Spacers as desired with some under and some above the Support on the Shaft.
3. Reinstall Wheel Assembly, Spacers and Hitch Clip.

Note: More Spacers under the Support will lower the Wheel and set the Trimmer Head Higher. More Spacers on top of the Support will raise the Wheel and set the Trimmer Head Lower.

Engaging the Trimmer Head

1. Ensure that the Trimmer is lowered to the ground and all Guards are in place and properly secured before using.
2. Set Tractor throttle at IDLE and engage the PTO.
3. Increase Tractor throttle to the RPM's required to obtain 540 PTO speed.

Note: See your Tractor manual for detailed information on Tractor operation.

Stopping the Cords from Spinning

1. Reduce Tractor throttle to IDLE.
2. Disengaging PTO to stop the Trimmer.

Cord Tips

We ship two (2) thicknesses of Cutting Cord with your DR 3-POINT HITCH TRIMMER/MOWER.

The Cords are Blue (175-mil) and Green (155-mil). Because conditions and vegetation vary so much, you should experiment with Cord weights (diameters) to discover what works best for your particular mowing and trimming situations. Here are a few things to keep in mind:

- If you buy Cutting Cord in rolls, cut it in 13" lengths. Cut them at an angle so they will be easier to install.
- Soak your Cutting Cord in a bucket of room temperature water for a few days before use to make it more pliable. Storing the Cord in a plastic bag with a damp sponge or cloth will help keep it pliable
- Cord life depends on trimming conditions. Replace Cords when they become broken or frayed.
- The smallest diameter Cord capable of cutting the material at hand usually provides the best grass trimming performance. When you need more strength for thicker growth such as berry canes, brambles, thistles, or ragweed, you may want to use the 175-mil Cord.
- Ease the ends of the Cord into heavy growth and move slowly through thick growth. If there are woody weeds in the material you are cutting, the cutting Cords may wrap around the stalks they cannot cut, and pull away from the Trimmer Head.
- If the Cord breaks off flush at the Cord Head, use needle nose pliers to pull out the old Cord.
- UV light can degrade cord, store out of direct sunlight.

Preparing the Trimmer/Mower for Transport

! WARNING

Always disengage the PTO Shaft before lifting the Trimmer off the ground or transporting the Trimmer to prevent injury or damage to the machine.

1. On the right hand side of the machine (trimmer head side), align the holes of the Trimmer with the holes in the 3-Point Hitch Bracket. Insert the Locking Bolt through the holes (**Figure 29**).
2. Secure the Bolt with the Wing Nut.

Note: Observe the Trimmer as it is lifted to ensure that the 3-Point Bracket does not contact the PTO Shaft. If they do touch, the Tractor may have a setting to limit the distance it is lifted off the ground to prevent contact. See your Tractor user manual for details of Tractor settings.

3. Lift the Trimmer off the ground with the Tractor 3-Point Hitch before transporting to prevent hitting any obstacles.

Obstacles

Dealing with obstacles in the terrain is easy with your new DR 3-POINT HITCH TRIMMER/MOWER. The following section explains how to approach most common obstacles.

- Always check your work area before trimming and remove any debris that might tangle or damage the machine.
- Approach obstacles (fence posts etc) so the impact zone will be within the area of the Optimum Impact Zone Label (**Figure 30**). This will ensure the best spring action and trimming coverage around the obstacle.
- If you do run into debris and the Trimmer becomes tangled, disengage PTO, shut down the Tractor Engine, remove the Key, wait for all moving parts to come to a complete stop, then wait five minutes for parts to cool before attempting to untangle the machine.
- Never Trim or let the Wheel rest on the ground with the Tractor in reverse.

Heavy Growth

- Take your time in heavy growth.
- If the machine cannot do it all in one pass, overlap half of the cutting swath.
- Ease the DR 3-POINT HITCH TRIMMER/MOWER into denser growth. If the material is too tough or woody to cut, the Cutting Cords will wrap around it, wear down, or even break off.

Tip: Use the “two pass”, one half overlap method, whenever possible.

Wet Conditions

Because there is no housing to restrict the flow of cut material, you can also use your DR 3-POINT HITCH TRIMMER/MOWER to mow wet or heavy growth. You can use the Trimmer in damp conditions, after a rain, or in the early morning dew without clogging or stalling. You can also mow wet areas such as ditches and around ponds.

Slopes

Refer to your Tractor Users Manual for slope safety information and operation guidelines.

Windrows

The DR 3-POINT HITCH TRIMMER/MOWER Cutting Cords cut even tall grass in just one pass, so you can collect clippings and leaves for mulch without raking. The machine ejects cut material to its right side, so you can use it like a lawn broom to make windrows for easy clean-up.

Firebreaks

Use your Trimmer as a labor saving tool to cut material when creating firebreaks.

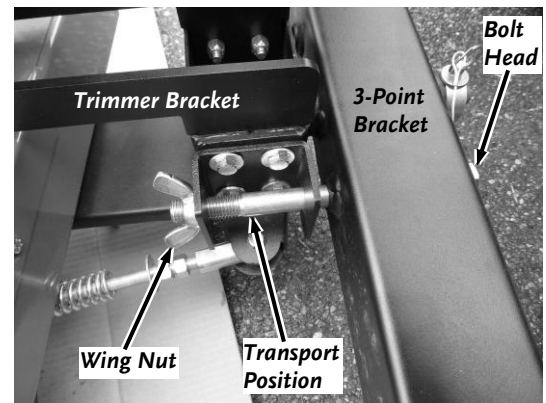


Figure 29



Figure 30

Chapter 4: Maintaining The DR 3-POINT HITCH TRIMMER/MOWER

Regular maintenance is the way to ensure the best performance and long life of your machine. Please refer to this manual for maintenance procedures.

! WARNING

Disengage PTO, shut down the Tractor Engine, remove the Key, wait for all moving parts to come to a complete stop, disconnect the PTO shaft from the Tractor, then wait five minutes before performing any maintenance procedure or inspection on the Trimmer.

Regular Maintenance Checklist

Note: Consider that the service intervals shown are the maximum under normal operating conditions. Increase frequencies under extremely dirty or dusty conditions. See the Owners Manual that came with the Tractor and with the PTO Shaft for Specific Tractor and PTO Shaft maintenance.

PROCEDURE	BEFORE EACH USE	EVERY 8-10 HOURS	EVERY 18-20 HOURS	EVERY 50 HOURS	EVERY 100 HOURS
Check General Equipment Condition, e.g. Nuts, Bolts, Welds, etc.	▲				
Replace broken or frayed Cutting Cords.	▲				
Check the Mow-Ball® and Cord Head for excessive wear.	▲				
Lubricate PTO Shaft and Wheel Support Grease Fittings		▲			
Check Belt tension and condition			▲		
Lubricate PTO Shaft Spline ends and center overlap			▲		
Replace the Belt				▲	
Grease pivot bearings and gearbox					▲

Maintenance position

Many maintenance procedures can be performed easier by positioning the Trimmer in an upright “maintenance” position. This position is for maintenance purposes only. Do not transport or operate the Trimmer in the upright position.

! WARNING

- Two people are required when setting the Trimmer Body to the maintenance position. One person must steady the Trimmer as the other installs the Bolt. Do not allow the Trimmer Body to go beyond vertical and fall in the opposite direction without the Bolt in place as this could cause injury to you or damage the Trimmer.
- Never transport the Trimmer in the “Maintenance” position. This could damage the machine and is not covered by the Warranty.

1. Remove the Bolt and Wing Nut that is holding the Trimmer in the trimming operating positions.
2. Lift the Trimmer Body up to a vertical position. With the head of the Bolt facing the Tractor, install the Bolt all the way into the transport hole of the 3-Point Bracket (**Figure 31**).
3. Let the Trimmer Mounting Bracket rest against the Bolt to hold it in the vertical (maintenance) position.

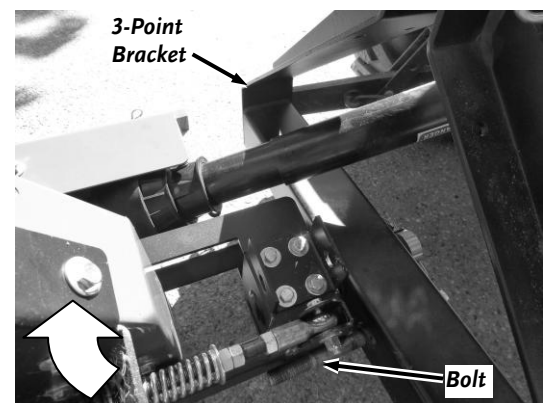


Figure 31

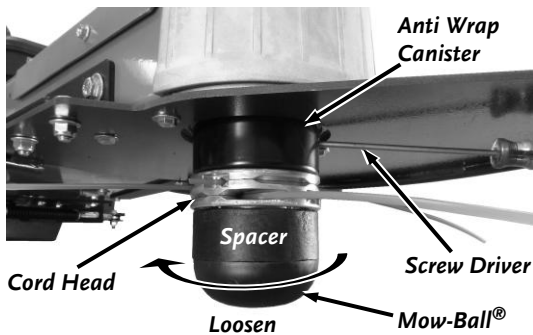


Figure 32

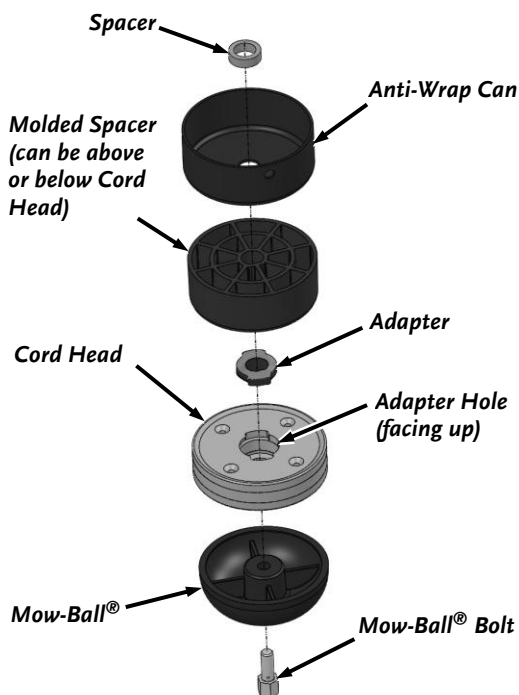


Figure 33

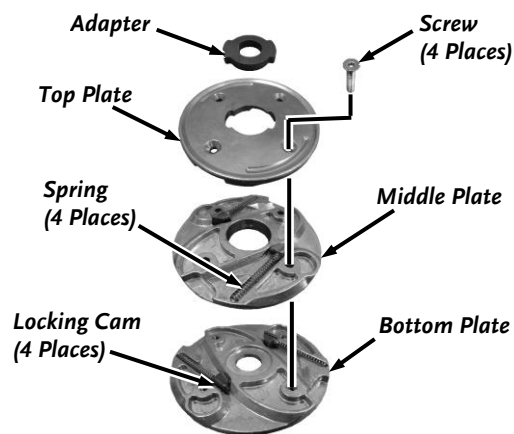


Figure 34

Replacing the Mow-Ball® or Cord Head

Tools and Supplies Needed:

- Phillips head Screwdriver with at least a 6" shank
- Gloves

1. Align the hole in the Anti Wrap Canister with the hole in the internal housing at the location shown (**Figure 32**).
2. Insert a Philips Head Screwdriver into the hole in the Anti Wrap Canister and the hole in the internal Housing.
3. Rotate the Mow-Ball® Assembly until the Screw Driver slides into a hole in the shaft, locking it into place.
4. Looking down at the top of the Frame, turn the Mow-Ball® clockwise until it unscrews completely from the Bearing Housing.

Note: If the Mow-Ball® continues to turn, but does not come off, check to be sure that you locked the Screwdriver into the shaft.

If the Mow-Ball will not turn by hand a 9/16" Socket can be used on the Bolt (inside the bottom of the Mow-Ball) to loosen it. You may need to clean grass or debris out of the recess first.

5. Slide the Cord Head, Adapter and Molded Spacer off the Shaft (**Figure 33**).
6. The Anti-Wrap Can and Spacer should remain on the Shaft with the Screwdriver.
7. Replace parts as needed and install them onto the shaft in the order shown.
8. Place the head of the Mow-Ball® Bolt so it is sitting in the hex cavity at the bottom of the Mow-Ball®.
9. Looking down at the top of the Frame, hold the Bolt Head in place with your finger and turn the Mow-Ball® counterclockwise to start the Bolt into the Shaft.
10. Tighten the assembly securely by turning the Mow-Ball® counterclockwise when looking down on the top of the Frame.
11. Remove the Screwdriver.

! WARNING

Always make sure you remove the screwdriver from the head assembly when finished. Failure to remove the screwdriver could cause injury when the head assembly is engaged.

Cleaning the Cord Head

Tools Needed:

- 3mm Allen Wrench
- Clean Rags
- Nylon Brush

1. Remove the Cord Head as described in the "Replacing the Mow-Ball® or Cord Head" section.
2. Remove the four Screws using a 3mm Allen Wrench (**Figure 34**).

3. Remove the Springs and Locking Cams from the Middle and Bottom Plates and clean any grass or debris from the Springs and Cams.
4. Clean all Plates using a Nylon Brush and clean Rag to remove all grass and dirt.
5. Inspect the Springs and Cams for damage. If any parts are damaged please call DR Power to order a replacement assembly.
6. Reinstall the Springs and Locking Cams into the middle and bottom Plates (**Figure 35**).

Note: The Bottom Plate has threaded holes and the middle Plate has clearance holes. The Plates must be in the correct order for proper assembly.

7. Assemble the Plates ensuring that they are aligned properly and the Springs and Cams are seated fully into the Plate grooves. The four Screw holes must be aligned and the two halves of the side cutouts should align from Plate to Plate (**Figure 36**).
8. Secure the Cord Head assembly with the four Screws using a 3mm Allen Wrench.
9. Reinstall the Cord Head as described in the “Replacing the Mow-Ball® or Cord Head” section.

! WARNING

Always make sure you remove the screwdriver from the head assembly when finished. Failure to remove the screwdriver could cause injury when the head assembly is engaged.

Replacing the Drive Belt

NOTICE

Use only DR belts on your machine. Do not use hardware store variety belts.

Tools needed:

- 3/8" Wrench
- Two 9/16" Wrenches
- 9/16" Deep Socket and Ratchet

1. Remove the eight Flange Bolts from the Belt Guard using a 3/8" Wrench (**Figure 37**).
2. Lift the Belt Guard from the machine.
3. Remove the two Belt Guide Pins at the head of the Trimmer using two 9/16" Wrenches (**Figure 38**).

Note: Observe the orientation of the Belt Guides in the next step. They must be positioned in this way when reinstalled.

4. Loosen the two Belt Guides of the Gearbox Pulley using two 9/16" Wrenches and rotate them out of the way.

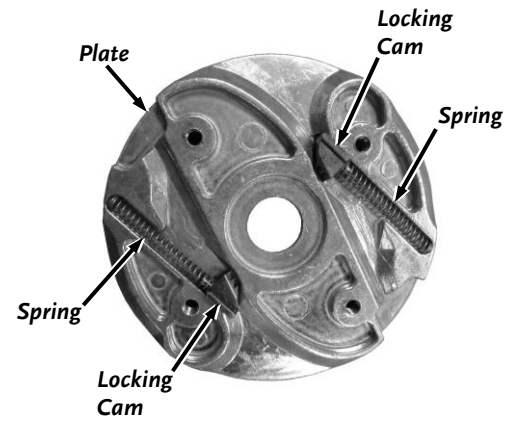


Figure 35

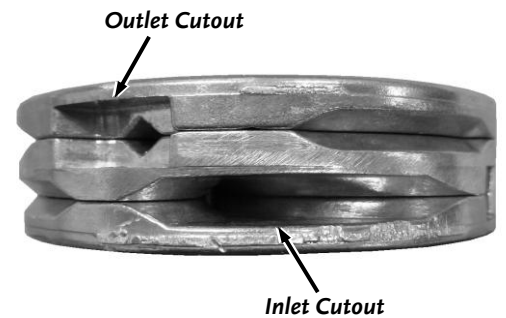


Figure 36

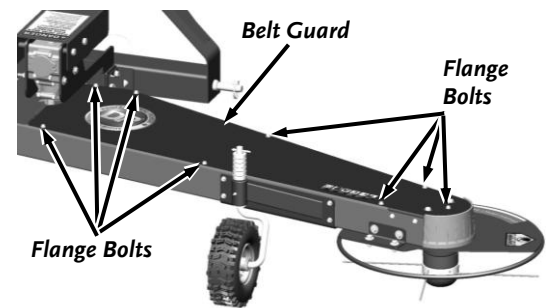


Figure 37

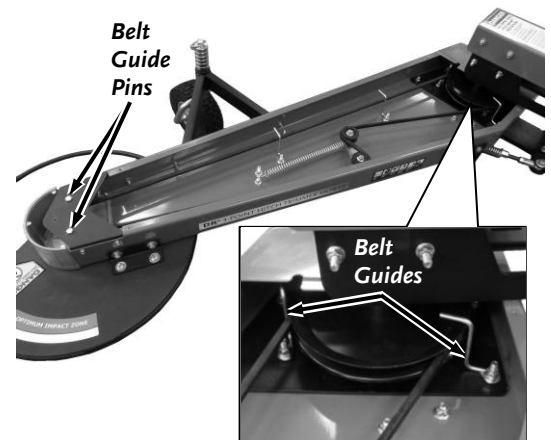


Figure 38

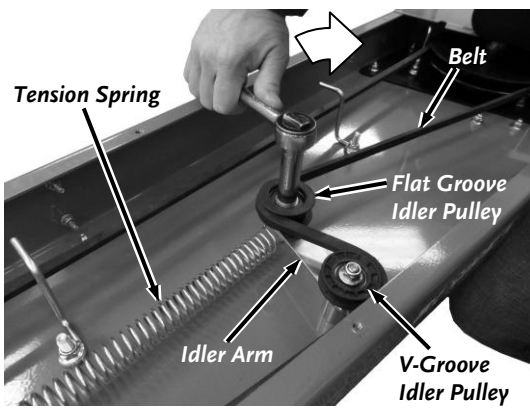


Figure 39

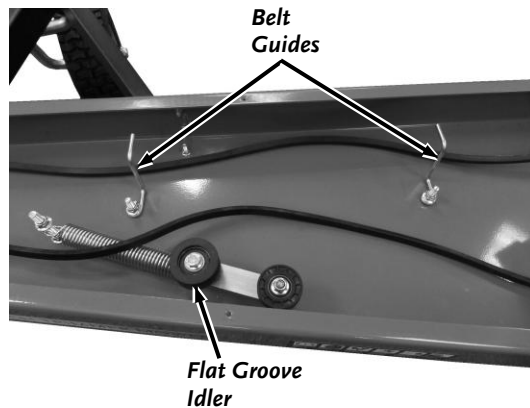


Figure 40

5. Position the 9/16" Deep Socket and Ratchet onto the Bolt of the Flat Groove Idler Pulley. The Ratchet Handle and Idler Arm must be aligned for the pivoting of the Arm to work properly (**Figure 39**).
6. Pull on the Ratchet to rotate the Idler Arm towards the Gearbox Pulley and slide the Belt off the V-Groove Idler Pulley.
7. Allow the Ratchet to return back towards the Spring until the Idler Arm is in line with the Tension Spring.
8. Remove the Belt from the Trimmer Head Pulley and the main Drive Pulley.
9. Install the new DR Drive Belt around the main Drive Pulley and the Trimmer Head Pulley. Ensure that the "V" of the Belt is in the "V" of the Pulleys and there are no twists in the Belt.

Note: Make sure the Belt is on the outside of the Frame Mounted Belt Guides and on the inner side of the Flat Groove Idler Pulley (**Figure 40**).

10. Rotate the Idler Arm towards the Gearbox Pulley with the Ratchet and 9/16" Deep Socket (Ratchet Handle in line with the Idler Arm) and position the Belt around the Flat Groove Pulley and then around the V-Groove Pulley (**Figure 39**).
11. Adjust and tighten the two Belt Guides at the Gearbox Pulley.
12. Install the Belt Guide Pins at the Head of the machine using two 9/16" Wrenches.
13. Position the Belt Guard and secure with the eight Flange Bolts using a 3/8" Wrench.

Grease Fittings

Your PTO Shaft was greased at the Factory so it will not need grease until the scheduled maintenance as listed at the beginning of this Chapter. The Wheel Support should have been greased when the machine was assembled and also has a recommended grease maintenance listed.

Tools and Supplies needed:

- Flexible hose grease gun
- Lithium grease
- Clean cloth

Note: The U-Joint Grease Fitting is sometimes located on the inside of the Joint. The plastic Collar will need to be unclipped and pushed down to access the Fitting for this type.

1. Wipe all dirt, etc., from the PTO Shaft grease fittings with a clean cloth.
2. Apply no more than three pumps of quality general-purpose lithium grease with a hand-pumped grease gun to each of the two U-Joint Grease Fittings (**Figure 41**).
3. Check the PTO Shaft Set Screw for tightness. If it is not tight then remove it, apply Thread Lock to the threads, then reinstall and tighten the Set Screw.
4. Wipe all dirt, etc., from the Wheel Support fitting with a clean cloth (**Figure 42**).
5. Apply quality general-purpose lithium grease with a hand-pumped grease gun to the Wheel Support Grease Fitting as needed.

Greasing the Gearbox

The Gearbox is greased at the factory but may require grease to be added after prolonged use..

Tools and Supplies needed:

- Two 11/16" Wrenches
- 17mm Wrench
- Grease gun
- Mobil, Multipurpose XHP Lithium Grease
- Clean cloth

Note: The Gearbox can hold 550ml. (18.6oz) of Mobil, Multipurpose XHP Lithium Grease. We recommend the Gearbox be completely filled with Grease.

1. Remove the front Bolt, Washers and Locknut from the Gearbox Guard with two 11/16" Wrenches (**Figure 43**).
2. Slightly loosen the rear Bolt, Washers and Locknut of the Gearbox Guard with two 11/16" Wrenches.
3. Rotate the Gearbox Guard up away from the Gearbox.
4. Remove the Access Bolt using a 17mm Wrench (**Figure 44**).
5. If the Gearbox is not completely full, add Grease as needed to fill.

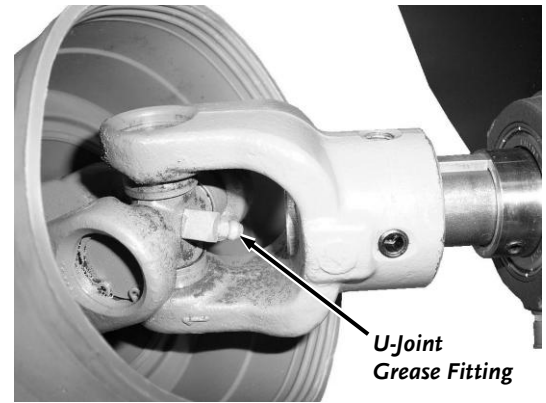


Figure 41

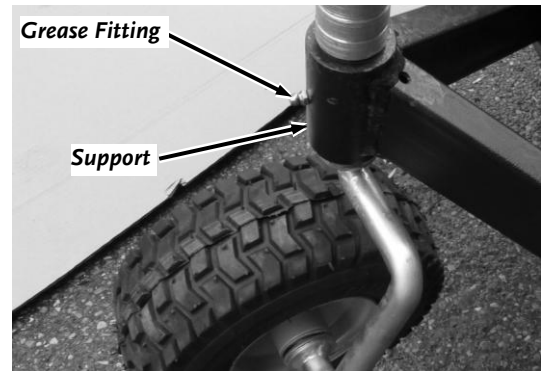


Figure 42

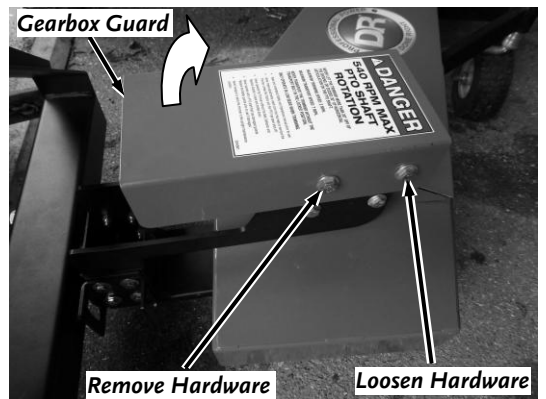


Figure 43

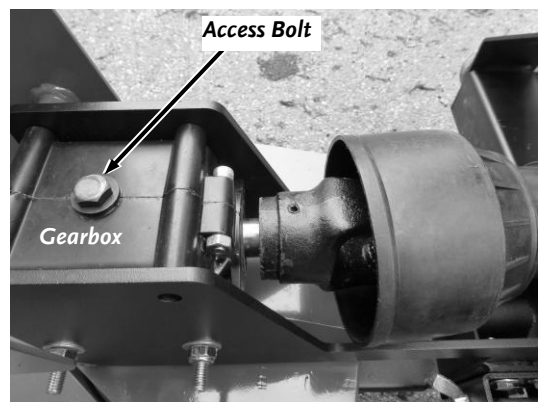


Figure 44

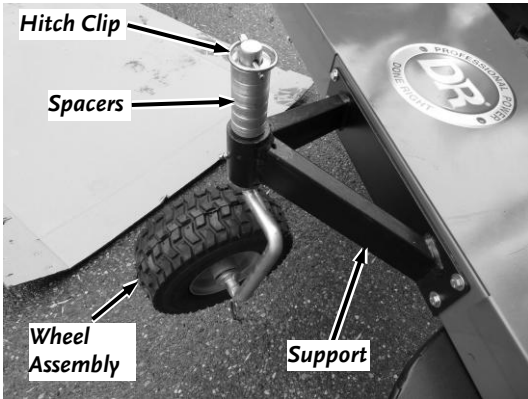


Figure 45



Figure 46

Replacing the Caster Wheel

Tools Needed:

- Pliers

1. Remove the Hitch Clip with Pliers and remove the Wheel Assembly with Spacers (**Figure 45**).
2. Install the new Wheel Assembly and Spacers.
3. Secure with the Hitch Clip.

Check the Tire Pressure

Tools Needed:

- Tire Pressure Gauge
- Air Compressor

1. Remove the Valve Stem Protective Cap (**Figure 46**) and check the tire pressure with a Tire Pressure Gauge.
2. Check what the manufacturers recommended pressure is that is stamped on the side of the Tire.
3. If the pressure reading is too low, add air through the Valve Stem with an air hose.
4. Replace the Valve Stem Protective Cap when finished.

! WARNING

Do not over inflate the tires. Inflate to the manufacturers recommended pressure found on the tires.

Chapter 5: Troubleshooting

Most problems are easy to fix. Consult the Troubleshooting Table below for common problems and their solutions. If you continue to experience problems, contact us at www.DRpower.com or call toll-free 1-800-DR-OWNER (376-9637) for support.

WARNING

Disengage PTO, shut down the Tractor Engine, remove the Key, wait for all moving parts to come to a complete stop, disconnect the PTO shaft from the Tractor, then wait five minutes before performing any maintenance procedure or inspection on the Trimmer.

Troubleshooting Table

SYMPTOM	POSSIBLE CAUSE
<i>Poor cut quality</i>	⇒ Cord needs to be replaced. ⇒ Tractor speed too fast.
<i>Scalping</i>	⇒ Arm or wheel adjustment is off. Check for frame level or height of hydraulic arms on tractor
<i>Machine stops cutting</i>	⇒ Inspect cords ⇒ Check belt tension/wear ⇒ Check PTO rotation
<i>The Trimmer Head won't spin or lacks power.</i>	⇒ Check for proper alignment of the V-Belt. Check it against the "Replacing the Drive Belt" section on page 19. ⇒ The Belt may be worn or frayed; if so, replace it. ⇒ If none of the above helps, visit our web site at www.DRPower.com or call 1-800-DR-OWNER (376-9637) for assistance.

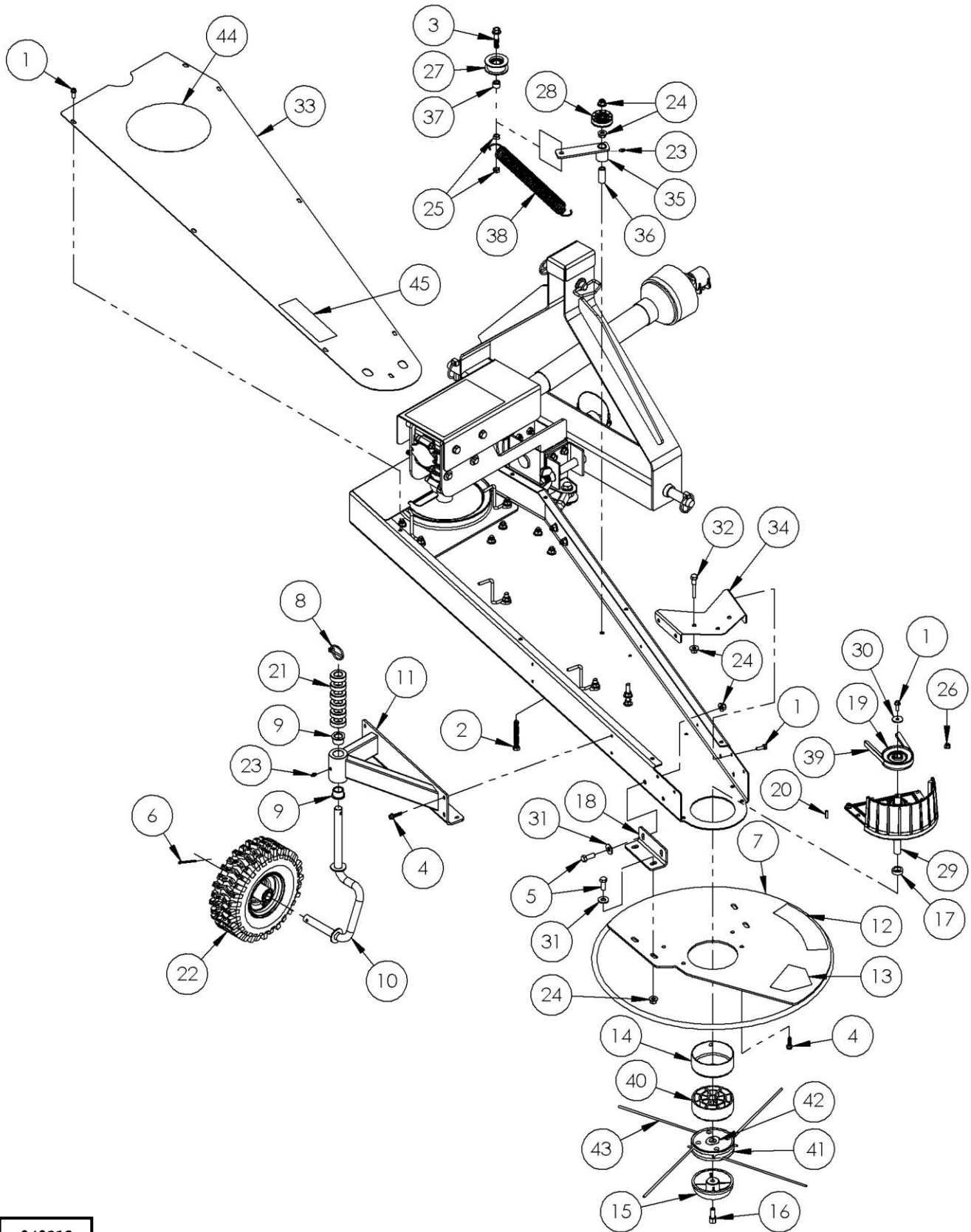
Chapter 6: Parts Lists and Schematic Diagrams

Parts List – Head and Wheel Assembly

Note: Part numbers listed are available through DR Power Equipment.

<u>Ref#</u>	<u>Part#</u>	<u>Description</u>	<u>Ref#</u>	<u>Part#</u>	<u>Description</u>
1	311171	Screw, HWH, 1/4-20 X 3/4", Taptite	24	333331	Nut, Nylon Lock, Flanged, 3/8-16
2	114651	Bolt, HCS FT, 3/8-16 X 3", GR5, ZP	25	164131	Nut, Nylon Lock, 3/8-16, Low Profile
3	333501	Bolt, Hex, Flange, 3/8-16 X 1.75"	26	333311	Nut, Nylon Lock, Flanged, 1/4-20
4	343251	Bolt, Hex, Flange, 1/4-20 X 1"	27	350471	Pulley, Idler, B V-Belt, 1.75" ID
5	111521	Bolt, HHCS, 3/8-16 X 1.00" Lg.	28	310921	Pulley, Idler, 3I V-Belt, 2.0" OD
6	253111	Pin, Cotter, 5/32" X 2"	29	310961	Spindle, Trimmer
7	324471	Guard, Deflector, w/Label	30	126971	Washer, Fender 1/4" ID X 1" OD
8	245381	Pin, Linch, 3/16" X 1-9/16"	31	112391	Washer, Flat, 3/8", USS
9	123761	Bushing .766" ID 1.0" OD	32	276601	Pin, Belt Guide, 3/8-16, ZP
10	322321	Caster, 9" X 3.50" Wheel	33	364141	Cover, Belt
11	322071	Support, Wheel	34	344201	Mount, Cover
12	324421	Label, Strike Zone	35	321981	Idler Arm
13	136491	Label, Danger, Blade	36	322061	Bushing, .386" X .623" X 1.53"
14	310981	Can, Anti-Wrap	37	364281	Spacer - Bushing Ft2
15	311011	Mow Ball, Hex Bolt	38	350181	Spring, Tension
16	313011	Bolt, 3/8-16 X 1", GR5, ZP, High HD	39	350451	Belt, Drive
17	310991	Spacer, .680" X .984" X .310", ZP	40	343851	Spacer, Speed Head
18	334321	Bracket, Mounting, Deflector Guard	41	343871	Speed Head, 4-Line
19	322001	Pulley, 3.5" ED, A-Profile V-Belt, .67" Shaft	42	344031	Adapter, Cord Plate
20	119141	Key, SQ, 3/16" X 1"	43	343831	Cord Pack, 13", 24 Pack
21	108511	Spacer .76" ID, 1.50 OD, .50 THK	44	324431	Label, DR Logo, Silver, 8"
22	345181	Wheel, 9" X 3.50-4	45	324401	Label, Pictogram Warning
23	101891	Grease Fitting, 1/4-28, Straight			

Schematic – Head and Wheel Assembly



040219

Parts List – Drive and Pivot Assembly

Note: Part numbers listed are available through DR Power Equipment.

Ref#	Part#	Description	Ref#	Part#	Description
1	323741	Bracket, Three Point	31	245551	Pin, Hitch, 3/4" X 4-3/4"
2	322051	Bearing, Taper Roller, 25mm ID, 62mm OD, 18.25mm THK	32	245381	Pin, Linch, 3/16" X 1-9/16"
3	324001	Bolt, M8 X 20mm, GR8.8, ZP, W/ Locking Patch	33	323961	Pin, Linch, 7/16" X 1.5", YZP
4	293731	Bolt, HCS, 3/8-16 X 5.5", GR 5, ZP	34	323971	Pin, Hitch, 3/8" X 3", W/ Cotter Pin
5	323951	Bolt, M10 X 180mm, P1.5, GR8.8, ZP	35	322041	Base, Pivot
6	111441	Bolt, HHCS, 1/2-13 X 2", GR5	36	323861	Bracket, Pivot Lock
7	323761	Bolt, 3/4-10 X 9.5", GR8, YZP	37	324091	Bracket, Articulating
8	150691	Bolt, HHCS, 3/8-16 X 2.5" LG.	38	322081	Shaft, Pivot Support
9	333511	Bolt, Hex, Flange, 3/8-16 X 1.25"	39	324011	PTO Shaft, T20, 1-3/8" Z6 & 25mm W/ 8mm Key Yokes
10	150431	Bolt, HHCS, 3/8-16 X 1-1/4", GR5	40	322011	Pulley, 9" ED, A And B Profile V-Belt, 25 mm Shaft
11	111521	Bolt, HHCS, 3/8-16 X 1.00" LG.	41	323721	Rod End, Ball Joint, 1/2-20 Thread, Fem
12	150721	Bushing, 1.385" ID X 1.629" OD X 1.5" L	42	323891	Spring, Limiter
13	253111	Pin, Cotter, 5/32" X 2"	43	343301	Spring, Strut
14	364121	Frame, w/Labels	44	323711	Rod, Connecting, 1/2-20 Male RH Thread, 18" L
15	321951	Gearbox, 1:2.78, 25mm Input & Output Shafts	45	151381	Washer, Pivot, 1.375" ID, 2.0" OD
16	323811	Guard, Gearbox	46	323881	Ring, Locking
17	334251	Bracket, Mounting, Gear Box, Left	47	101791	Washer, Flat, 1/2" USS
18	334261	Bracket, Mounting, Gear Box, Right	48	234991	Washer, SAE Flat, 1/2", ZP
19	323991	Key, Machine, 8 X 7 X 40mm, Din 6885 A	49	101811	Washer, Lock, 1/4", Split, ZP
20	323981	Key, Machine, 8 X 7 X 25mm, Din 6885 A	50	112391	Washer, Flat, 3/8", USS
21	324381	Label, Danger, Gearbox Cover	51	302501	Washer, M10
22	302491	Nut, Nylon Lock, M10-1.5	52	323791	Washer, Lock, 7/8", YZP
23	333351	Nut, Nylon Lock, Flanged, 1/2-13	53	322341	Spacer, .78" ID, 2" OD, .18" THK
24	323911	Nut, Nylon Lock, 1/2-20, Gr5, ZP	54	324081	Bracket, Strut
25	323901	Nut, Hex, 1/2-20, Gr5, ZP	55	324391	Label, Branding
26	323871	Nut, Wing, 3/4-10, ZP	56	350461	Guide, Belt, Wire
27	323801	Nut, Hex, 7/8-9, YZP	57	265681	Shims, 1" ID & .38" ID, .16" THK
28	322331	Nut, Slotted, 3/4-10, ZP	Not Shown:		
29	333331	Nut, Nylon Lock, Flanged, 3/8-16	335451	Set Screw, Ft1 W/Loc Tite Patch	
30	323781	Pin, PTO Class 1 Draw			

DR[®] 3-POINT HITCH TRIMMER/MOWER™



2-Year Limited Warranty Terms and Conditions

The DR[®] 3-POINT HITCH TRIMMER/MOWER is warranted for two (2) years against defects in materials or workmanship when put to ordinary and normal consumer use; ninety (90) days for any other use.

For the purposes of all the above warranties, "ordinary and normal consumer use" refers to non-commercial residential use and does not include misuse, accidents or damage due to inadequate maintenance.

DR Power Equipment certifies that the DR[®] 3-POINT HITCH TRIMMER/MOWER is fit for ordinary purposes for which a product of this type is used. DR[®] Power Equipment however, limits the implied warranties of merchantability and fitness in duration to a period of two (2) years in consumer use, ninety (90) days for any other use.

The 2-Year Limited Warranty on the DR[®] 3-POINT HITCH TRIMMER/MOWER starts on the date the machine ships from our factory. The 2-Year Limited Warranty is applicable only to the original owner.

The warranty holder is responsible for the performance of the required maintenance as defined by the manufacturer's owner's manuals. The warranty holder is responsible for replacement of normally wearing parts such as the Drive Belt, Cutting Cords and Mow-Ball[®]. Accessories to the machine are not covered by this warranty.

During the warranty period, the warranty holder is responsible for the machine transportation charges, if required. During the warranty period, warranty parts will be shipped by standard method at no charge to the warranty holder. Expedited shipping of warranty parts is the responsibility of the warranty holder.

SOME STATES DO NOT ALLOW LIMITATIONS ON THE LENGTH OF IMPLIED WARRANTIES, SO THE ABOVE LIMITATIONS MAY NOT APPLY TO YOU.

DR[®] Power Equipment shall not be liable under any circumstances for any **incidental or consequential damages or expenses** of any kind, including, but not limited to, cost of equipment rentals, loss of profit, or cost of hiring services to perform tasks normally performed by the DR[®] 3-POINT HITCH TRIMMER/MOWER.

SOME STATES DO NOT ALLOW THE EXCLUSION OR LIMITATION OF INCIDENTAL OR CONSEQUENTIAL DAMAGES, SO THE ABOVE LIMITATIONS MAY NOT APPLY TO YOU.

THIS WARRANTY GIVES YOU SPECIFIC LEGAL RIGHTS, AND YOU ALSO HAVE OTHER RIGHTS, WHICH VARY FROM STATE TO STATE.

Notes:

Daily Checklist for the DR 3-POINT HITCH TRIMMER/MOWER

To help maintain your DR 3-POINT HITCH TRIMMER/MOWER for optimum performance, we recommend you follow this checklist each time you use your machine.

⚠ WARNING

Disengage PTO, shut down the Tractor Engine, remove the Key, wait for all moving parts to come to a complete stop, disconnect the PTO shaft from the Tractor, then wait five minutes before performing any maintenance procedure or inspection on the Trimmer.

[] CUTTING CORDS: Replace broken or frayed Cords.

[] MOW-BALL® and Cord Head: Check the Mow-Ball® and Cord Head for wear and replace as needed.

[] GENERAL CONDITION: Check the general condition of the machine, e.g.; nuts, bolts, welds etc.

⚠ WARNING

Disengage PTO, shut down the Tractor Engine, remove the Key, wait for all moving parts to come to a complete stop, disconnect the PTO shaft from the Tractor, then wait five minutes before performing any maintenance procedure or inspection on the Trimmer.

End of Season and Storage

- Lubricate PTO Shaft Grease Fittings.
- Check the Drive Belt for wear. Replace as needed.
- Release Drive Belt from Tensioner to relieve Belt stress.
- Check the general condition of the machine, e.g.; nuts, bolts, welds, etc. Replace parts or tighten Hardware as needed.
- Store in a dry covered area to protect from moisture.
- Remove any wrapped weeds from the Mow-Ball® and Wheel Assembly. Clean grass and debris from the top and underneath the Trimmer Frame.



75 MEIGS ROAD, P.O. BOX 25, VERGENNES, VERMONT 05491