Form No. 3377-305 Rev A

TORO®

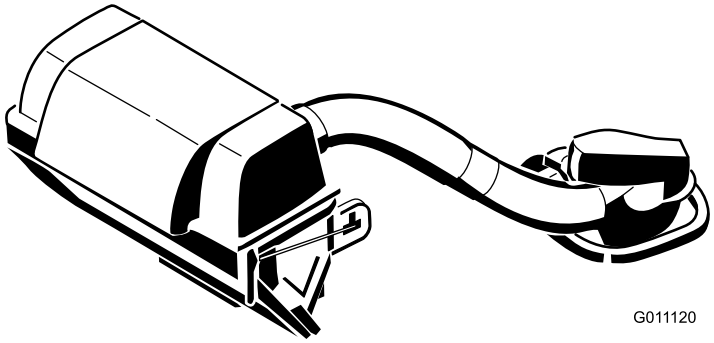
Count on it.

Operator's Manual

Grass Collection System

Groundsmaster® 7200 Series with 60-inch Mower

Model No. 30460—Serial No. 290000001 and Up



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Register at www.Toro.com.
Original Instructions (EN)

CE

3377-305 A

⚠ WARNING

CALIFORNIA
Proposition 65 Warning

This product contains a chemical or chemicals known to the State of California to cause cancer, birth defects, or reproductive harm.

Introduction

Read this information carefully to learn how to operate and maintain your product properly and to avoid injury and product damage. You are responsible for operating the product properly and safely.

You may contact Toro directly at www.Toro.com for product and accessory information, help finding a dealer, or to register your product.

Whenever you need service, genuine Toro parts, or additional information, contact an Authorized Service Dealer or Toro Customer Service and have the model and serial numbers of your product ready. Figure 1 identifies the location of the model and serial numbers on the product. Write the numbers in the space provided.

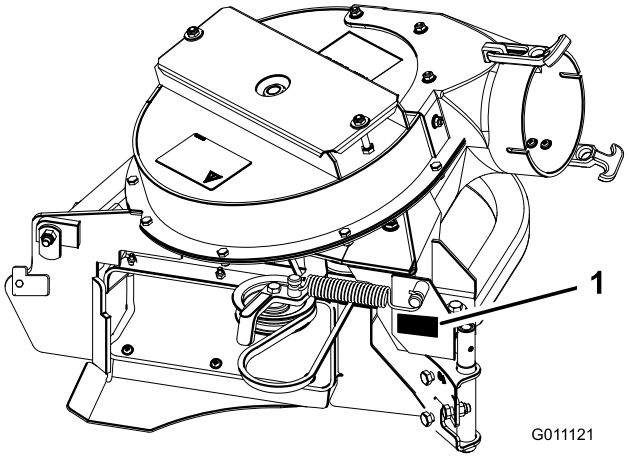

Figure 1

1. Collection system model and serial number location

Model No. _____

Serial No. _____

This manual identifies potential hazards and has safety messages identified by the safety alert symbol (Figure 2), which signals a hazard that may cause serious injury or death if you do not follow the recommended precautions.

Figure 2

1. Safety alert symbol

This manual uses 2 other words to highlight information. **Important** calls attention to special mechanical information and **Note** emphasizes general information worthy of special attention.

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Contact us at www.Toro.com.
Printed in the USA.

Contents

Safety

The following list contains safety information specific to Toro products and other safety information you must know.

- Become familiar with the safe operation of the equipment, with the operator controls, and safety signs.
- Use extra care with grass catchers or other attachments. These can change the operating characteristics and the stability of the machine.
- Follow the manufacturer's recommendations for adding or removing wheel weights or counterweights to improve stability.
- Do not use a grass catcher on steep slopes. A heavy grass catcher could cause loss of control or overturn the machine.
- Slow down and use extra care on hillsides. Be sure to travel side to side and not up and down on hillsides. Turf conditions can affect the machine's stability. Use extreme caution while operating near drop-offs.
- Keep all movement on slopes slow and gradual. Do not make sudden changes in speed, directions or turning.
- The grass catcher can obstruct the view to the rear. Use extra care when operating in reverse.
- Use care when loading or unloading the machine into a trailer or truck. If the machine is to be driven on to a truck or trailer with the hopper full, always back up the ramp.
- Never operate with the discharge deflector raised, removed or altered, unless using a grass catcher.
- Keep hands and feet away from moving parts. Do not make adjustments with the engine running.
- Stop on level ground, disengage drives, shut off engine before leaving the operator's position for any reason including emptying the grass catcher or unclogging the chute.
- If you remove the grass catcher, be sure to install any discharge deflector or guard that might have been removed to install the grass catcher. Do not operate the mower without either the entire grass catcher or the grass deflector in place.
- Stop the engine before removing the grass catcher or unclogging the chute.
- Do not leave grass in grass catcher for extended periods of time.
- The traction unit can make very quick turns. Use caution when turning and not damage the grass collector.
- Grass catcher components are subject to wear, damage and deterioration, which could expose moving parts or allow objects to be thrown. Frequently check components and replace with manufacturer's recommended parts, when necessary.

Safety and Instructional Decals

Safety decals and instructions are easily visible to the operator and are located near any area of potential danger. Replace any decal that is damaged or lost.

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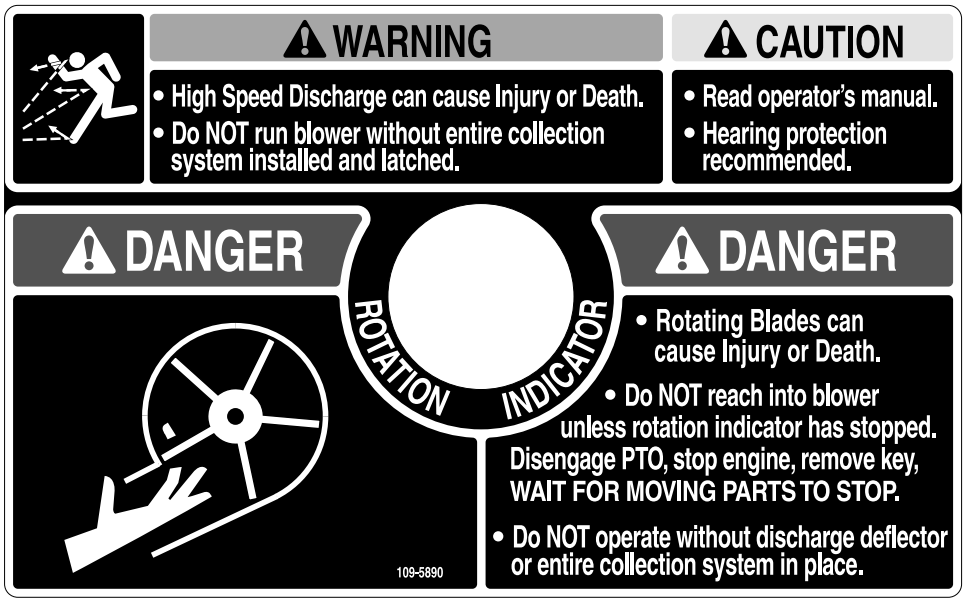
106-3339



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Setup

Loose Parts

Use the chart below to verify that all parts have been shipped.

Procedure	Description	Qty.	Use
1	No parts required	–	Prepare the mower.
2	Double pulley assembly Pulley nut	1 1	Install the pulley assembly.
3	No parts required	–	Remove the existing anti-scalp roller and bracket.
4	Blower pivot Metal template Bolt (3/8 x 1 inch) Locknut (3/8 inch)	1 1 3 3	Install the blower pivot for a 60 inch bagger.
5	Link mounting bracket Bolt, (3/8 x 1 inch) Flanged locknut, (3/8 inch)	1 3 3	Install the link mounting bracket
6	Bagger mounting bracket Link Small clevis pin Large clevis pin Small cotter pin Large cotter pin	1 1 2 2 2 2	Install the bagger mounting bracket
7	Handle assembly Pin Roll pin	1 1 2	Install the handle assembly.
8	Bagger assembly Pin and hairpin cotter pin assembly Nut (3/8 inch) Threaded rod Yoke Clevis pin spring	1 2 2 1 2 2	Install the bagger assembly.
9	Blower belt Spring	1 1	Route the blower belt into the blower assembly.
10	Blower assembly	1	Install the blower assembly.
11	Upper tube Middle tube Lower tube Bolt, (#10 x 3/4 inches) Locknut, (#10) Washer, (7/32 inch)	1 1 1 6 6 6	Install the discharge tubes.
12	Belt cover Bolt (1/2 x 2-1/2 inches) Nut (1/2 inch)	 1 1	Install the belt cover and bolt.

Procedure	Description	Qty.	Use
13	No parts required	–	Install the weight kit.
14	No parts required	–	Check the tire pressure.

Note: Determine the left and right sides of the machine from the normal operating position.

1

Preparing the Mower

No Parts Required

Procedure

Perform the following procedure to prepare the mower for attaching the blower and finishing kit.

1. Disengage the PTO, move the motion control levers to the neutral locked position and set the parking brake.
2. Stop the engine, remove the key, and wait for all moving parts to stop before leaving the operating position.
3. Repair all bent or damaged areas of mower deck and replace any missing parts.
4. Clean the mower of any debris on the deck or rear part of the mower to ease installation.

2

Installing the Pulley Assembly

Parts needed for this procedure:

1	Double pulley assembly
1	Pulley nut

Procedure

1. Lower the mower deck to the lowest height-of-cut position.
2. Remove the right belt cover. Save this cover.
3. Remove the mower deck belt from the right pulley.
4. Place a block under the right blade spindle under the mower deck before removing the right mower deck pulley (Figure 3). This will prevent the spindle components dropping down when the pulley nut is removed.
5. Remove the existing pulley nut and remove the pulley (Figure 3). Save the pulley and nut for later use.
6. Install the new double pulley onto the spindle and secure it with the new pulley nut (Figure 3). Torque the nut to 130-150 ft-lb (176-203 N-m).
7. After the new pulley assembly is in position, install the mower deck belt onto the lower pulley.

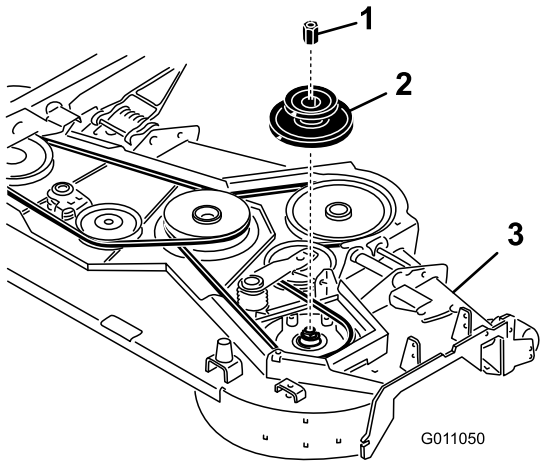

Figure 3

1. New pulley nut
2. Double pulley assembly
3. Mower deck

3

Removing the Existing Anti-Scalp Roller and Bracket

No Parts Required

Procedure

1. Clean the area around the right, rear anti-scalp wheel.
2. Remove the anti-scalp roller from the bracket by loosening and removing the flange nut (3/8 inch) and axle bolt (3/8 x 4-1/2 inch) as shown in Figure 4. Save all hardware for later use.
3. Remove the three carriage bolts (3/8 x 3/4 inch) and flange nuts (3/8 inch) securing the bracket to the mower (Figure 4). Save all hardware for later use.

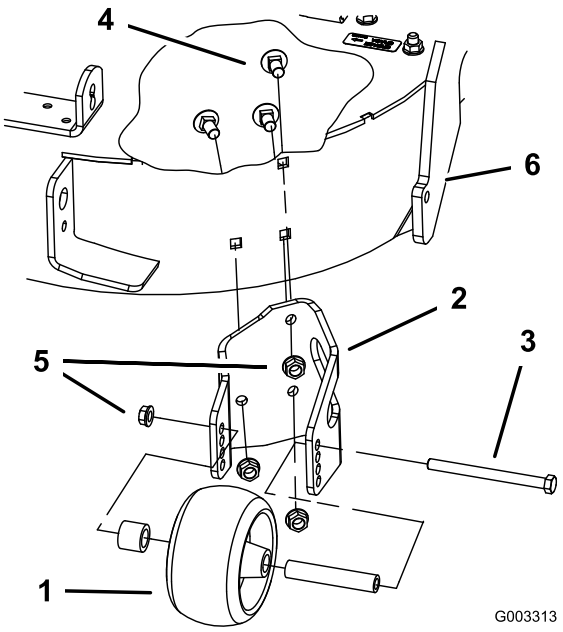

Figure 4

1. Anti-scalp roller
2. Anti-scalp bracket
3. Bolt, (3/8 x 4–1/2 inch)
4. Carriage bolt, (3/8 x 3/4 inch)
5. Flange nut, (3/8 inch)
6. Mower deck

4

Installing the Blower Pivot for a 60 inch Bagger

Parts needed for this procedure:

1	Blower pivot
1	Metal template
3	Bolt (3/8 x 1 inch)
3	Locknut (3/8 inch)

Procedure

1. Install the metal template, with the number 60 in it, to the mower deck with the previously removed carriage bolts and nuts using the existing holes in the mower deck (Figure 5).

   Make sure the carriage bolts and nuts are tight and the template is tight against the mower deck.
2. Center punch the new mower deck hole locations using the 3 holes in the template (Figure 5).
3. Remove the metal template and drill three, 1/8 inch diameter, pilot holes with a sharp drill bit (Figure 5).
4. Drill three, 13/32 inch diameter, holes into the pilot holes with a sharp drill bit (Figure 5).

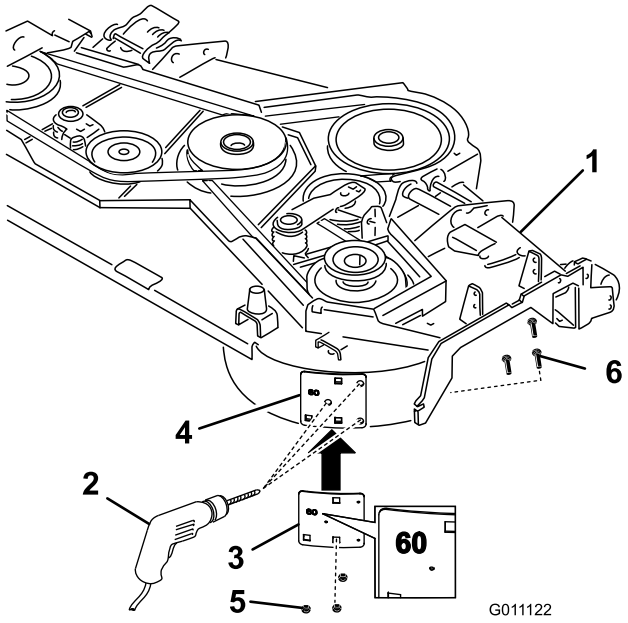

Figure 5

1. Mower deck
2. Drill three, 1/8 inch pilot holes and 13/32 inch diameter holes, here
3. Template with the number 60 in it
4. Template location on mower deck
5. Nuts
6. Carriage bolts

5. Install the new blower pivot with 3 bolts (3/8 x 1 inch) and 3 locknuts (3/8 inch) using the drilled holes (Figure 6).
6. Install the anti-scalp roller to the blower pivot with the previously remove axle bolt (3/8 x 4-1/2 inches), spacer, bushing, and flange nut (3/8 inch) (Figure 6).

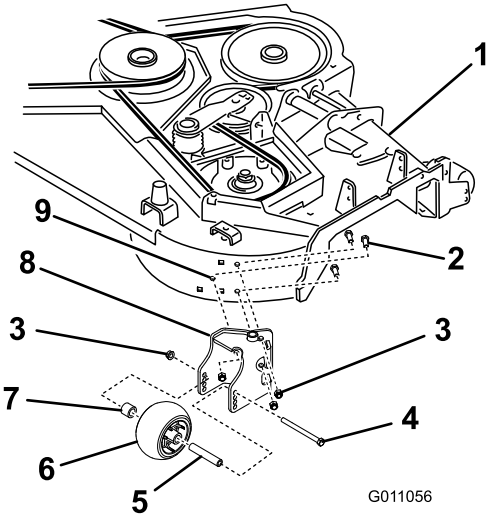

Figure 6

1. Mower deck
2. Bolt, (3/8 x 1 inch)
3. Locknut, (3/8 inch)
4. Bolt, (3/8 x 4-1/2 inch)
5. Spacer
6. Anti-scalp roller
7. Bushing
8. Blower pivot assembly
9. Drilled holes

5

Installing the Link Mounting Bracket

Parts needed for this procedure:

1	Link mounting bracket
3	Bolt, (3/8 x 1 inch)
3	Flanged locknut, (3/8 inch)

Procedure

Install the link mounting bracket to the rear frame of the machine with 3 bolts (3/8 x 1 inch) and 3 flanged locknuts (3/8 inch) (Figure 7).

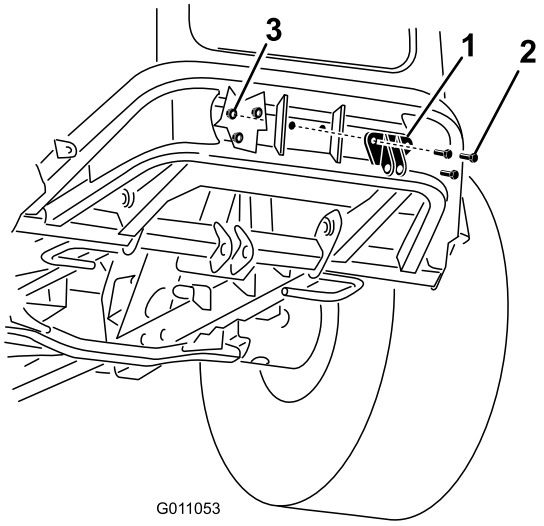

Figure 7

1. Link mounting bracket
2. Bolt, (3/8 inch)
3. Flanged locknut, (3/8 inch)

6

Installing the Bagger Mounting Bracket

Parts needed for this procedure:

1	Bagger mounting bracket
1	Link
2	Small clevis pin
2	Large clevis pin
2	Small cotter pin
2	Large cotter pin

Procedure

1. Install the link to the link mounting bracket with a small clevis pin and small cotter pin (Figure 8).

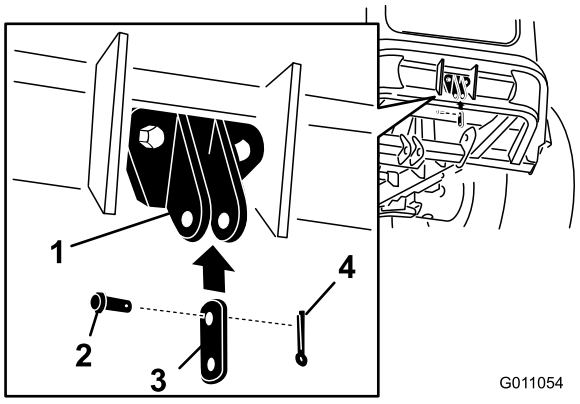

Figure 8

1. Link mounting bracket
2. Small clevis pin
3. Link
4. Small cotter pin

2. Install the bagger mounting bracket to the bottom of the machine with 2 large clevis pins and 2 large cotter pins (Figure 9).
3. Rotate the bagger mounting bracket up and attach it to the link with a small clevis pin and small cotter pin (Figure 9).

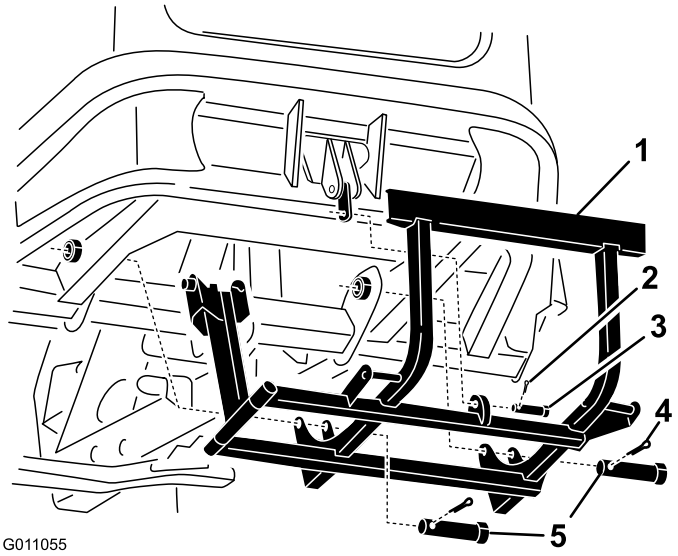

Figure 9

1. Bagger mounting bracket
2. Small cotter pin
3. Small clevis pin
4. Large cotter pin
5. Large clevis pin

7

Installing the Handle Assembly

Parts needed for this procedure:

1	Handle assembly
1	Pin
2	Roll pin

Procedure

1. Position the handle assembly onto the handle mount assembly (Figure 10).
2. Secure the handle assembly with a pin and a roll pin (Figure 10).

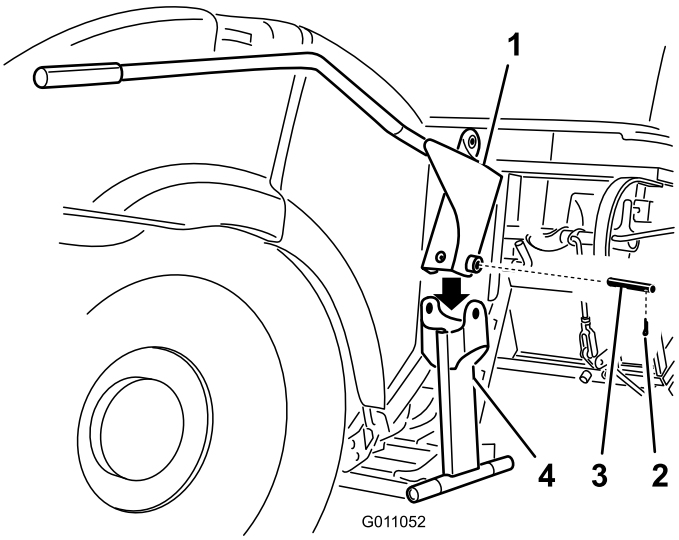

Figure 10

1. Handle assembly
2. Roll pin
3. Pin
4. Handle mount assembly

8

Installing the Bagger Assembly

Parts needed for this procedure:

1	Bagger assembly
2	Pin and hairpin cotter pin assembly
2	Nut (3/8 inch)
1	Threaded rod
2	Yoke
2	Clevis pin spring

Procedure

Note: After installing the bagger, open the bagger door and remove the discharge tubes.

1. Position the bagger on its back (Figure 11).
2. Slide the hooks onto the lower mounting bracket (Figure 11).
3. Rotate the bagger up on the lower bagger mounting bracket.
4. Align the hole in the bagger with the upper mounting bracket (Figure 11).
5. Install the pin and secure it with the hairpin cotter pin on both sides (Figure 11).

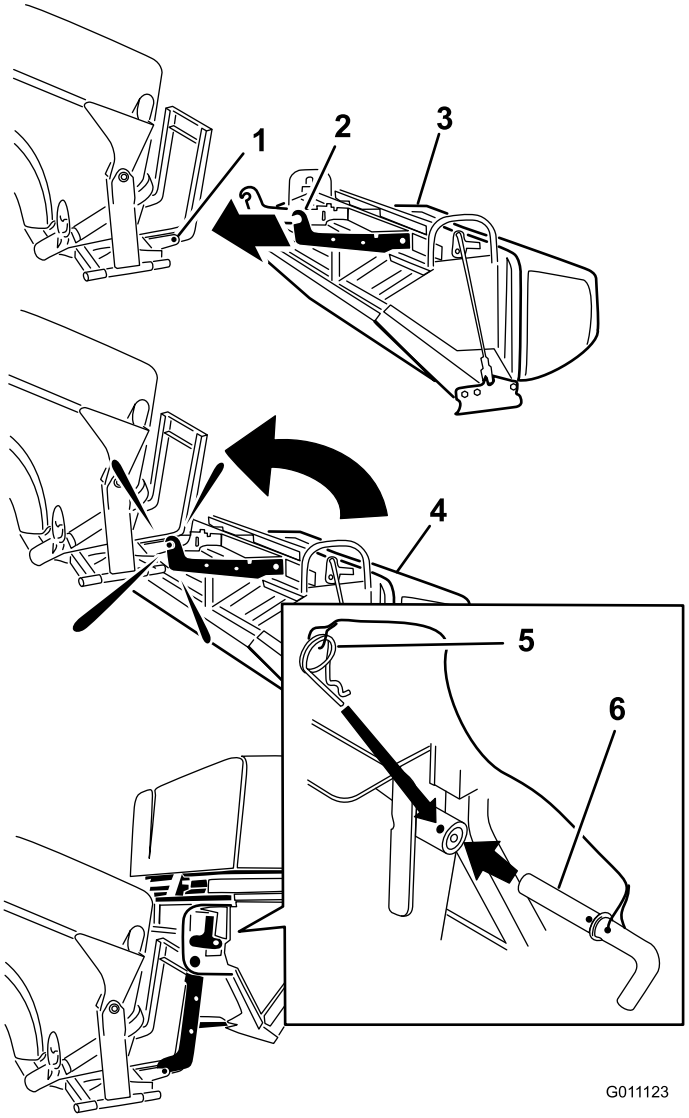

Figure 11

1. Lower mounting bracket
2. Hook
3. Bagger on it's back
4. Rotate bagger up
5. Hairpin cotter pin connected to lanyard
6. Pin connected to lanyard

6. Install the nuts and yokes onto the threaded rod (Figure 12).
7. Adjust the yokes until the center of the holes are 9 inches (228.6 mm) apart (Figure 12).

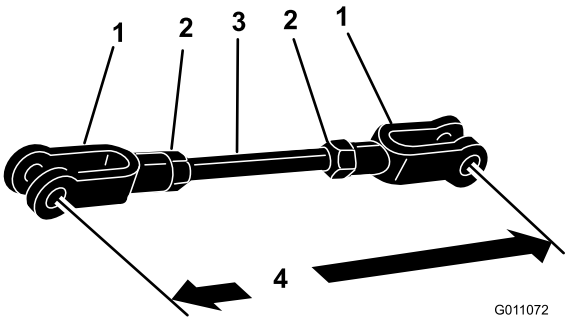

Figure 12

1. Yoke
2. Nut
3. Threaded rod
4. 9 inches (228.6 mm) apart

8. Tighten the nuts against the yokes.
9. Install the yokes to the bagger assembly and handle and secure it with 2 clevis pin springs (Figure 13).
10. Rotate the bagger handle linkage up to the bagger assembly and secure it with a clevis pin spring (Figure 13). Loosen and rotate the yoke if needed to align with the bagger assembly.

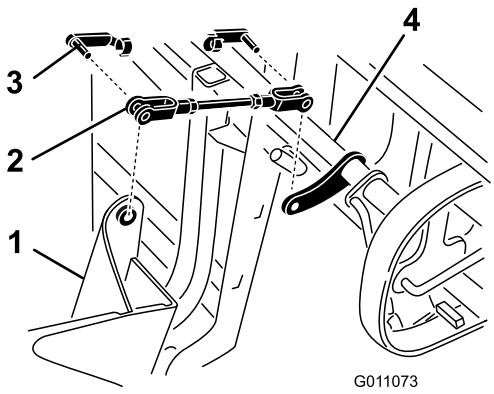

Figure 13

1. Bagger arm assembly
2. Bagger handle linkage
3. Clevis pin spring
4. Bagger assembly

9

Routing the Blower Belt into the Blower Assembly

Parts needed for this procedure:

1	Blower belt
1	Spring

Procedure

1. Install the belt around the blower pulley (Figure 14).
2. Install the spring to the idler arm and the peg on the blower assembly (Figure 14).

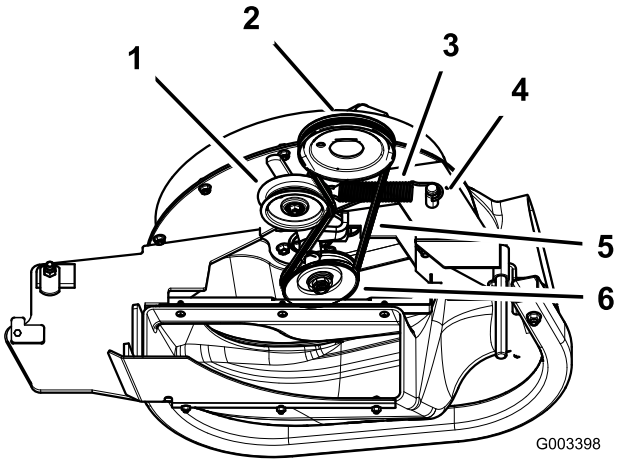

Figure 14

1. Idler pulley
2. Mower deck pulley
3. Spring
4. Peg
5. Belt
6. Blower pulley

10

Installing the Blower Assembly

Parts needed for this procedure:

1	Blower assembly

Procedure

⚠ WARNING

An uncovered discharge opening could allow the mower to throw objects in the operator's or bystander's direction and result in serious injury. Also, contact with the blade could occur.

- **Never operate the lawn mower unless you install a cover plate, a mulch plate, or a grass chute and catcher.**
- **Make sure the grass deflector is installed when the grass chute and catcher are removed.**

1. Remove the side discharge chute from the mower deck (Figure 15).

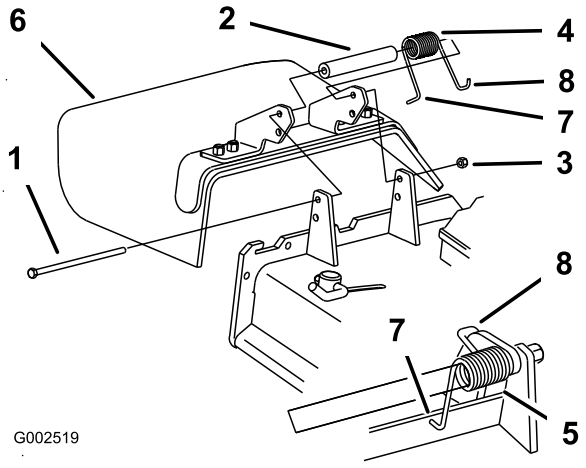

Figure 15

1. Bolt
2. Spacer
3. Locknut
4. Spring
5. Spring installed
6. Grass Deflector
7. **L** end of spring, place behind deck edge before installing bolt
8. **J** hook end of spring

2. Slide the blower assembly peg into the pivot hole (Figure 16).

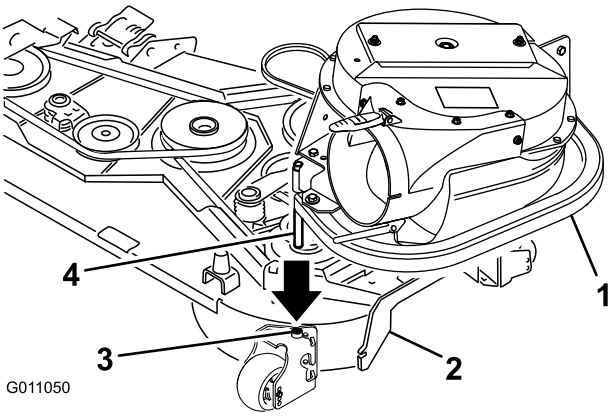

Figure 16

1. Blower assembly
2. Mower deck
3. Pivot hole
4. Blower assembly peg

3. Close the blower assembly to see if the latches are adjusted correctly. Loosen or tighten the bolt so the latches firmly hold the blower assembly against the mower deck , but can be released by hand (Figure 17).

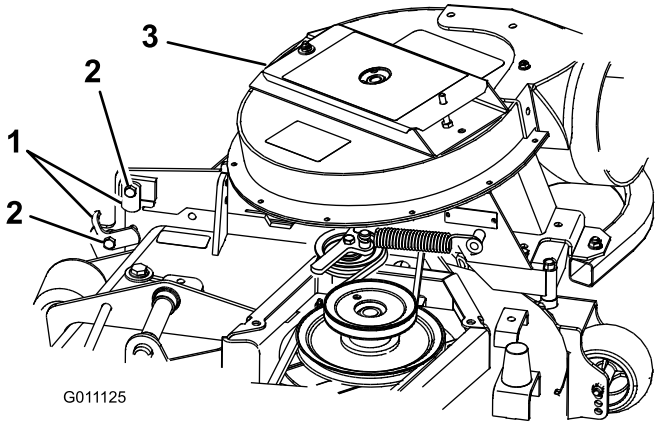

Figure 17

1. Latch
2. Bolt
3. Blower assembly

4. Install the spring as shown in Figure 18.

   Make sure the hooks are in the correct position.

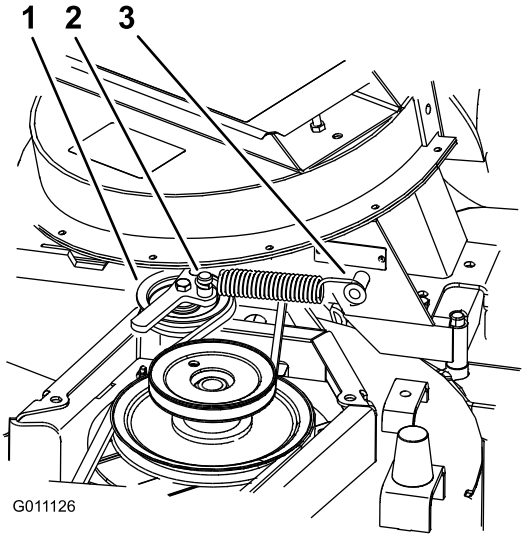

Figure 18

1. Spring loaded idler pulley
2. Short hook end
3. Long hook end

5. Pull the spring loaded idler pulley back and route the belt around the mower deck pulley. Ensure the belt is routed around the blower pulleys correctly (Figure 19).
6. Tighten the latch bolts.

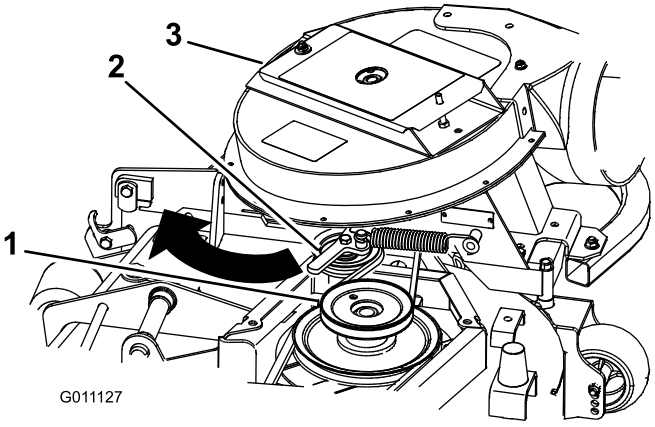

Figure 19

1. Mower deck pulley
2. Spring loaded Idler pulley
3. Blower

11

Installing the Discharge Tubes

Parts needed for this procedure:

1	Upper tube
1	Middle tube
1	Lower tube
6	Bolt, (#10 x 3/4 inches)
6	Locknut, (#10)
6	Washer, (7/32 inch)

Procedure

Important: Make sure the mower deck is in the lowest height-of-cut position while installing the discharge tubes.

1. Lower the mower deck to the lowest height-of-cut position.
2. Install the lower tube into the middle tube so there is 2-1/2 inches (63.5 mm) of overlap (Figure 20).

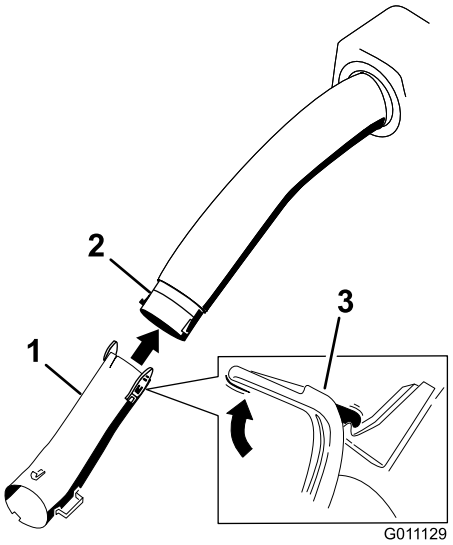

Figure 20

1. Lower tube
2. Middle tube
3. 2-1/2 inches (63.5 mm) of overlap
4. Existing holes in the middle tube

3. Using the three holes or indentations in the middle tube as a template, drill three holes (7/32 inch diameter) where the lower and middle tubes join together (Figure 21).
4. Loosely install the lower and middle tubes with 3 bolts (#10 x 3/4 inches), 3 flat washers (7/32 inch), and 3 locknuts (#10) (Figure 21).

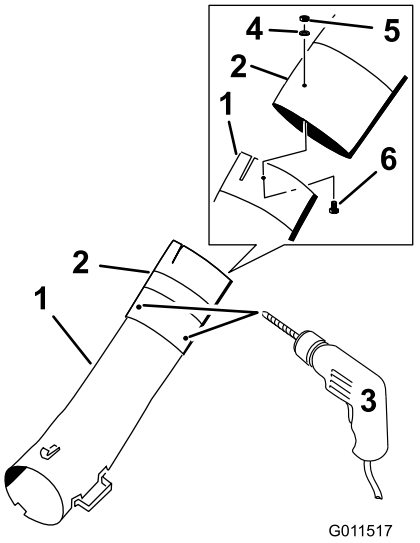

Figure 21

1. Lower tube
2. Middle tube
3. Drill 7/32 inch diameter holes here (use upper tube as a template)
4. Flat washer, (7/32 inch)
5. Locknut, (#10)
6. Bolt, (#10 x 3/4 inches)

5. Install the upper tube into the bagger opening and pull it back out so the rubber seal is protruding out (Figure 22 and Figure 24).

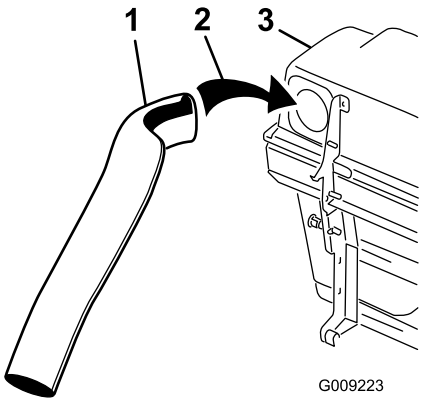

Figure 22

1. Upper tube
2. Bagger opening
3. Bagger hood

6. Measure the distance the tube is inside the hood.

   Measure from the hood plate to the edge of the tube as shown in Figure 23. This distance needs to be 3/4 inch (19 mm).

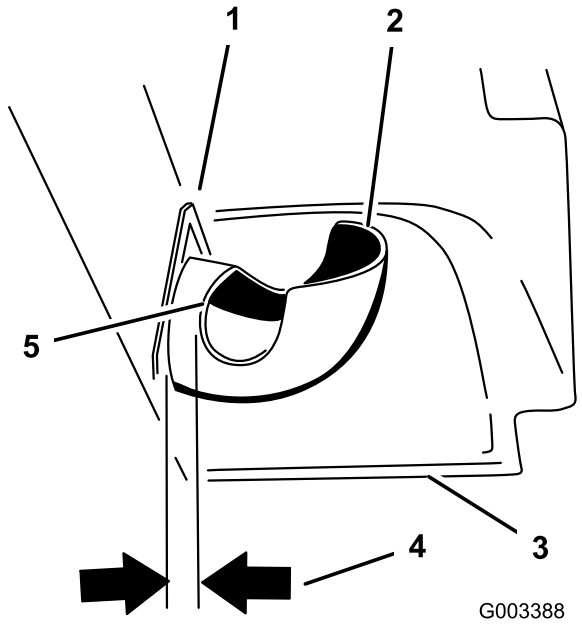

Figure 23

1. Hood plate
2. Upper tube
3. Hood in the down position
4. 3/4 inch (19 mm)
5. Edge of tube

7. Once the 3/4 inch (19 mm) measurement has been achieved, mark the upper tube on the outside where the rubber seal protrudes out. This is marked to ensure the correct position for the upper tube when drilling the holes and connecting the upper and lower tubes (Figure 24).

   Note: The rubber seal must protrude out from the bagger hood.

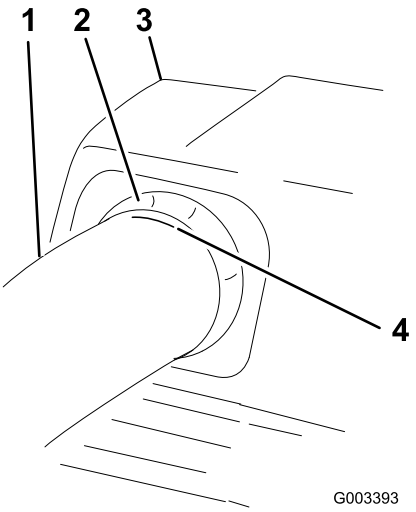

Figure 24

1. Upper tube
2. Rubber seal protruding out
3. Bagger hood
4. Mark here against the rubber seal

8. Install the middle and lower tube assembly into the upper tube (Figure 25).

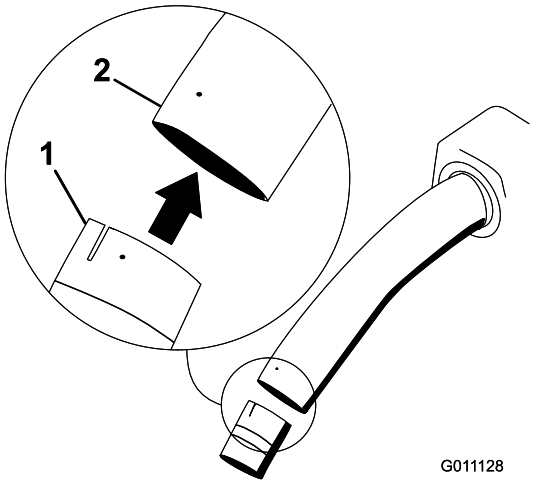

Figure 25

1. Middle and lower tube
2. Upper tube

9. Slide the lower tube onto the blower assembly and latch them together (Figure 26).

   Note: There are two latches on the blower housing.

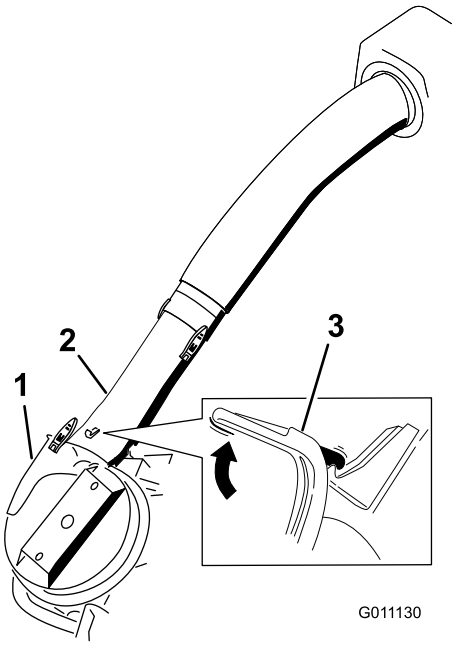

Figure 26

1. Blower assembly
2. Lower tube
3. Latch

10. Make sure the mower deck is in the lowest height-of-cut position and the mark on the upper tube is still positioned against the protruding rubber seal.
11. Using the three holes or indentations in the upper tube as a template, drill three holes (7/32 inch diameter) where the upper and middle tubes join together (Figure 27).

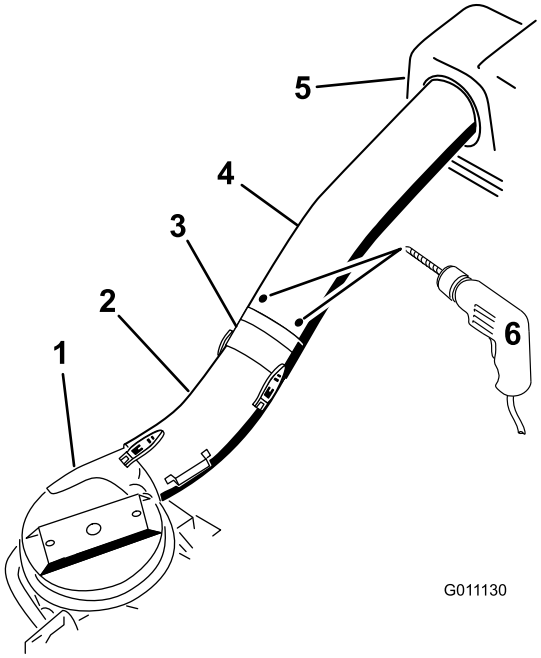

Figure 27

1. Blower assembly
2. Lower tube
3. Middle tube
4. Upper tube
5. Bagger hood
6. Drill 7/32 inch diameter holes here (use upper tube as a template)

12. Remove the middle and lower tube assembly from the blower and upper tube..
13. Remove the hardware and the middle tube from the lower tube (Figure 20).
14. Join the upper and middle tubes with 3 bolts (#10 x 3/4 inches), 3 flat washers (7/32 inch), and 3 locknuts (#10) (Figure 28).

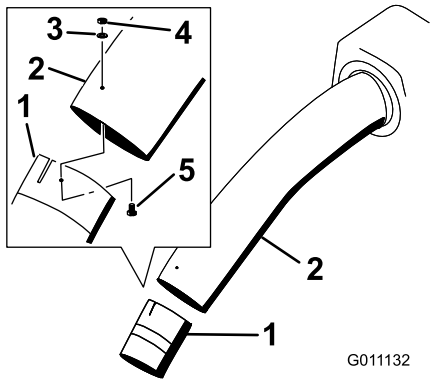

Figure 28

1. Middle tube
2. Upper tube
3. Flat washer, (7/32 inch)
4. Locknut, (#10)
5. Bolt, (#10 x 3/4 inches)

15. Install the lower tube into the middle tube and secure it with 3 bolts (#10 x 3/4 inches), 3 flat washers (7/32 inch), and 3 locknuts (#10) (Figure 20).
16. Install the lower tube onto the blower housing and secure it with the latches.
17. Lift and lower the mower deck to verify that the end of the tube does not come out of the bagger hood.

12

Installing the Belt Cover and Bolt

Parts needed for this procedure:

	Belt cover
1	Bolt (1/2 x 2-1/2 inches)
1	Nut (1/2 inch)

Procedure

1. Lower the mower deck to the lowest height-of-cut position.
2. Install the new belt cover so the notches on both sides go over the belt cover supports and secure the latch (Figure 29).

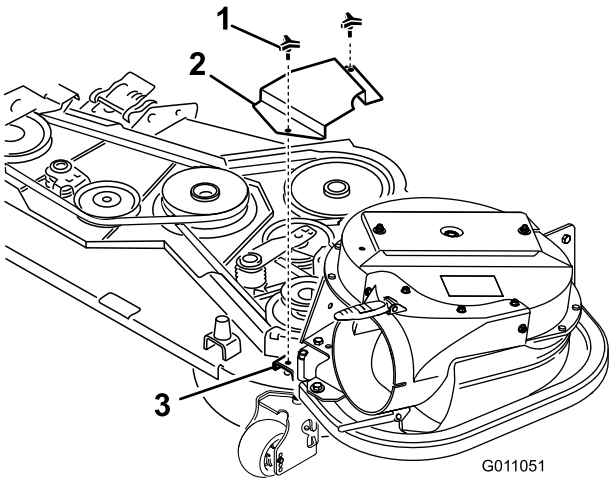

Figure 29

1. Knob
2. Belt cover
3. Mower deck

3. Lower the mower deck and install a bolt (1/2 x 2-1/2 inches) and nut (1/2 inch) into the 6 inch (152 mm) height-of-cut hole (Figure 30). This will prevent damage to the double pulley when raising the mower deck up.

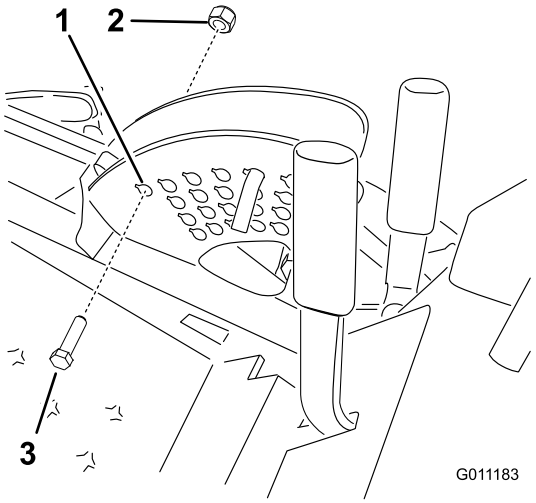

Figure 30

1. 6 inch (152 mm) height-of-cut hole
2. Nut (1/2 inch)
3. Bolt (1/2 x 2-1/2 inches)

13

Installing the Weight Kit

No Parts Required

Procedure

The GroundsMaster® Traction Unit with the bagger installed complies with ANSI B71.4–2004 when the weight kit is installed. Order the appropriate weight kit from your local Authorized Toro Distributor.

Install the kit with the instructions included in the kit.

⚠ CAUTION

The bagger adds a lot of weight to the rear of the machine and may cause an unstable condition which could result in a loss of control.

Ensure the weight kit is installed.

14

Checking the Tire Pressure

No Parts Required

Procedure

Note: Increase the tire pressure due to the additional weight.

Check and increase the air pressure in the front caster wheels and rear tires (Figure 31).

Pressure: Rear tires-20 psi (138 kPa)

Front caster wheels-30 psi (172 kPa)

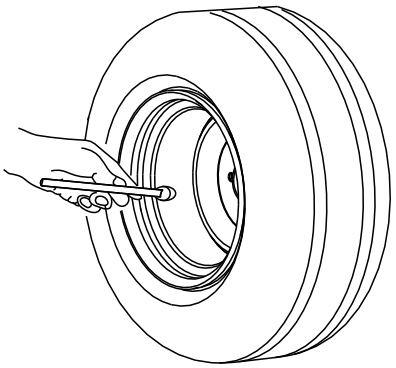

Figure 31

Operation

Note: Determine the left and right sides of the machine from the normal operating position.

Important: Set the parking brake when leaving the machine unattended, even if just for a few minutes.

⚠ WARNING

To avoid personal injury, follow these procedures:

- **Become familiar with all operating and safety instructions in the operator's manual for your mower before using this attachment.**
- **Never remove the bagger or bagger tubes while the engine is running.**
- **Always shut the engine off and wait for all moving parts to stop before clearing an obstruction from the bagging system.**
- **Never do maintenance or repairs while the engine is running.**
- **Set the parking brake.**

⚠ WARNING

Without the grass deflector, bagger tubes or complete collection system mounted in place, you and others are exposed to blade contact and thrown debris. Contact with the rotating mower blade(s) and thrown debris will cause injury or death.

- **Always install the grass deflector when removing the collection system and changing to side discharge mode.**
- **If the grass deflector is ever damaged, replace it immediately. The grass deflector routes material down toward the turf.**
- **Never put your hands or feet under the mower.**
- **Never try to clear the discharge area or mower blades unless you move the power take off (PTO) to off, rotate the ignition key to off and remove the key.**
- **Turn off the engine before unclogging the discharge chute.**

⚠ CAUTION

Children or bystanders may be injured if they move or attempt to operate the tractor while it is unattended.

Always remove the ignition key and set the parking brake when leaving the machine unattended, even if just for a few minutes.

Positioning the Flow Baffle

The flow baffle is adjustable by loosening the nuts on top of the mower deck. Adjust the flow baffle to the align with the blower opening.

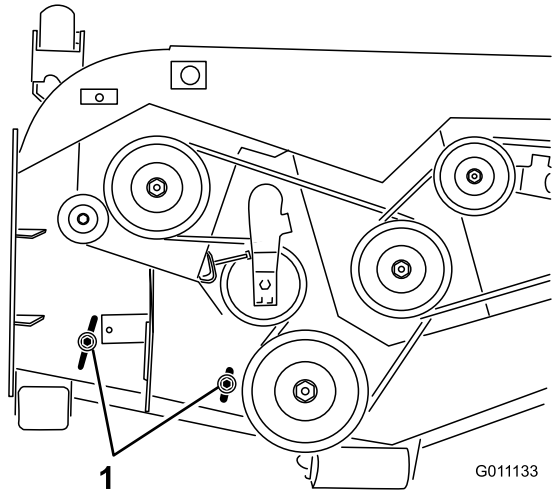

Figure 32

1. Nuts for positioning the flow baffle (adjust to match blower opening)

Emptying the Bagger

1. Disengage the PTO and set the parking brake.
2. Lift up on the handle to open the door and empty the hopper.
3. Push the handle down to close the door (Figure 33).

   Note: If the machine is to be driven on to a truck or trailer with the hopper full, always back up the ramp. This will reduce the chance of rearward tip.

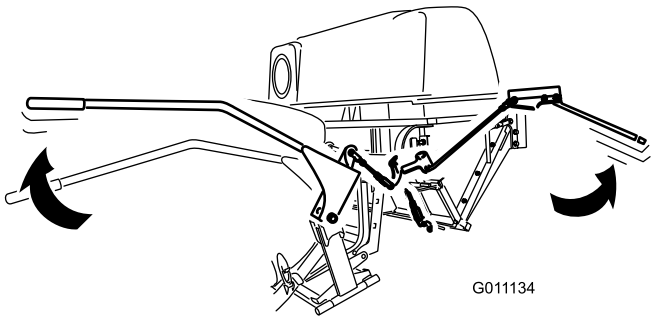

Figure 33

Clearing Obstructions from the Collection System

⚠ WARNING

When the collection system is in operation, the blower can be rotating and cut off or injure hands.

- **Before adjusting, cleaning, repairing and inspecting the blower, and before unclogging the chute, turn off the engine and wait for all moving parts to stop. Remove the key.**
- **Use a stick, not your hands, to remove an obstruction from the blower and tube.**
- **Keep face, hands, feet, and any other part of your body or clothing away from concealed, moving, or rotating parts.**

1. Disengage the PTO and set the parking brake.
2. Turn off the engine, remove the key, and wait for all moving parts to stop before leaving the operating position.
3. Empty the bagger.
4. Unlatch the lower tube.
5. Remove the tubes from the bagger.
6. Using a stick or similar object, not your hands, remove and clear the obstruction from the tube assembly.

   Note: In most cases, the debris can be shaken out of the tubes.
7. If the blower assembly is plugged, unlatch the blower assembly, remove the belt, and swing it open.
8. Using a stick or similar object, not your hands, remove and clear the obstruction from the blower assembly.
9. After you remove the obstruction, install the complete collection system and resume operation.

Removing the Bagger

⚠ WARNING

Components around engine will be hot if the machine has been running. Touching hot components can cause burns.

- **Do not touch engine components when hot.**
- **Allow engine to cool before removing the bagger.**

1. Disengage the PTO and set the parking brake.
2. Turn off the engine, remove the key, and wait for all moving parts to stop before leaving the operating position.
3. Unlatch the lower tube from the blower and remove the tube from the blower assembly.
4. Remove the tube from the bagger hood.
5. Lower the mower deck to the lowest height-of-cut position.
6. Unlatch the belt cover over the mower pulley assembly.
7. Remove the blower belt from the mower pulley assembly.
8. Open the blower assembly.
9. Remove the blower assembly from the pivot hole.
10. If you are changing to side discharge mode, ensure the grass deflector is installed and can be lowered into working position.
11. Remove the collection system assembly.

Opening the Machine Hood

The bagger handle needs to be rotated out to gain access to the machine hood.

1. Disengage the PTO and set the parking brake.
2. Turn off the engine, remove the key, and wait for all moving parts to stop before leaving the operating position.
3. Remove the clevis pin spring connecting the yoke to the handle (Figure 34).
4. Remove the pin out of the key hole that is holding the handle in position (Figure 34).
5. Rotate the handle out to allow access to the hood (Figure 34).

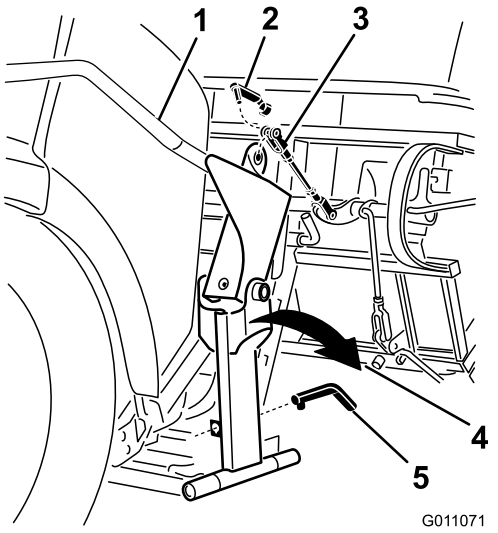

Figure 34

1. Handle
2. Clevis pin spring
3. Yoke
4. Rotate handle out
5. Pin

Transporting Machines

Do not leave grass or debris in the bagger while transporting the machine on a trailer or truck.

⚠ DANGER

Transporting the machine with grass or debris in the bagger can damage the machine.

Do not leave grass or debris in the bagger while transporting the machine on a trailer or truck.

Operating Tips

Machine Size

Remember that the machine is longer and wider with this attachment installed. By turning too sharply in confined places you may damage the attachment or other property.

Trimming

Always trim with the left side of the mower. Do not trim with the right side of the mower because you could damage the bagging tubes. Ensure the bagger handle does not catch on obstacles while trimming.

Cutting Height

For optimum bagging performance, set the deck height-of-cut to remove no more that 2 to 3 inches (51 to 76 mm) or 1/3 of the grass height, which ever is less. Cutting off more than this will reduce the capacity of the vacuum system.

Cutting Frequency

Cut the grass often, especially when it grows rapidly. You will have to cut your grass twice if it gets excessively long (refer to Bagging Long Grass).

Cutting Technique

For best lawn appearance, be sure to slightly overlap the mower into the previously cut area. This helps reduce the load on the engine and reduces the chance of plugging the blower assembly and tubes.

Bagging Speed

The bagging system may plug if you drive too fast and the engine speed gets too slow. On hills it may be necessary to slow the machines ground speed. Mow down hill whenever possible.

⚠ CAUTION

As the bagger fills, extra weight is added to the back of the machine. If you stop and start suddenly on hills, you may lose steering control or the machine may tip.

- **Do not start or stop suddenly when going uphill or downhill. Avoid uphill starts.**
- **If you do stop the machine when going uphill, disengage the PTO. Then back down the hill using a slow speed.**
- **Do not change speeds or stop on slopes.**

Bagging Long Grass

If the grass is ever allowed to grow longer than normal, or if it contains a high degree of moisture, raise the cutting height higher than usual and cut and bag the grass at this setting. Then cut and bag the grass again using the lower, normal setting.

Excessively long grass is heavy and may not be propelled completely into the bagger. If this happens, the tube and blower may plug. To avoid plugging the bagging system, mow the grass at a high height-of-cut, then lower the mower to your normal cutting height and repeat the bagging process.

Bagging Wet Grass

If possible, always try to cut grass when it is dry. Wet grass can cause plugging.

Reducing Plugging

To avoid plugging the bagging system, reduce ground speed and mow the grass at a high height-of-cut, then lower the mower to your normal cutting height and repeat the bagging process.

Signs of Plugging

As you are bagging, a small amount of grass clippings normally blow out the front of the mower. An excessive amount of clipping blow-out indicates that the bagger is full or the tube is plugged.

Bagging Blades

In most mowing conditions, the standard high lift blades will provide the best bagging performance.

The Toro Atomic blade is recommended for bagging leaves in dry conditions. In dry dusty conditions, the medium lift or low lift blades will reduce dust and dirt blowout while providing effective bagging air flow.

Contact an Authorized Service Dealer for the proper blades for different mowing conditions.

Curb Climbing and Loading

Always lift the deck to the highest position when loading the machine on trailers or ascending/descending a curb. Leaving the mower in a lower position can cause damage to the mower while loading and going over a curb. If a curb is higher than 6 inches (152 mm), cross it at a sharp angle with the deck fully raised. Use extreme caution when loading onto a trailer.

Maintenance

Recommended Maintenance Schedule(s)

Maintenance Service Interval	Maintenance Procedure
After the first 8 hours	• Inspect the blower belt. • Inspect the collection system.
Before each use or daily	• Clean the hood screen. • Clean the collection system.
Every 25 hours	• Inspect the blower belt.
Every 50 hours	• Grease the idler arm.
Every 100 hours	• Grease the handle pivot. • Inspect the collection system.

Cleaning the Bagger Screen

Service Interval: Before each use or daily

The screens need to be cleaned before each use. In wet grass they will need to be cleaned more often.

1. Disengage the power take off (PTO) and set the parking brake.
2. Turn off the engine, remove the key, and wait for all moving parts to stop before leaving the operating position.
3. Open the bagger.
4. Clean the debris from the screen.
5. Close the bagger.

Cleaning the Collection System

Service Interval: Before each use or daily

1. Wash the inside and outside of the bagger hood, tube, and the underside of the mower. Use a mild automotive detergent to remove dirt.
2. Make sure you remove matted grass from all parts.
3. After washing all parts, let them dry thoroughly.

Note: With all parts installed, start and run the machine for a minute to assist in drying.

Inspecting the Blower Belt

Service Interval: After the first 8 hours

Every 25 hours

Check belts for cracks, frayed edges, burn marks or any other damage. Replace damaged belts.

Replacing the Blower Belt

1. Disengage the PTO, move the motion control levers to the neutral locked position, and set the parking brake.
2. Stop the engine, remove the key, and wait for all moving parts to stop before leaving the operating position.
3. Pull back on the spring loaded idler pulley to relieve the belt tension (Figure 35).
4. Remove the existing blower belt from the mower deck pulley and then the blower pulleys.
5. Install the new belt around the blower pulleys and the mower deck pulley (Figure 35).

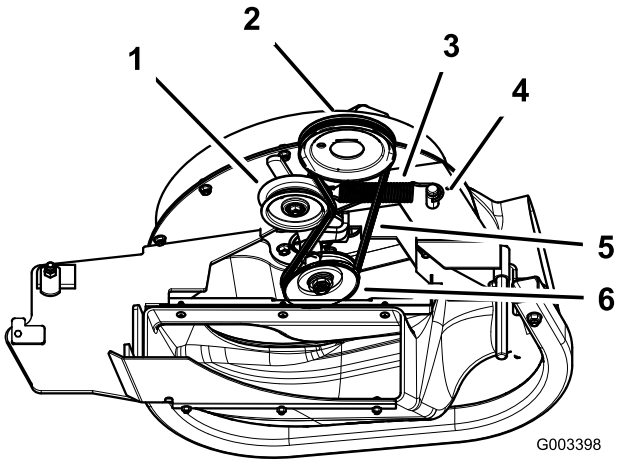

Figure 35

1. Idler pulley
2. Mower deck pulley
3. Spring
4. Peg
5. Belt
6. Blower pulley

6. Install the spring as shown in Figure 36.

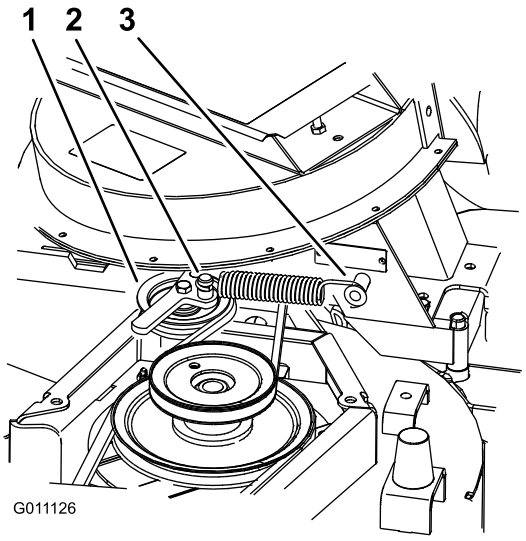

Figure 36

1. Spring loaded idler pulley
2. Short hook end
3. Long hook end

7. Pull back on the spring loaded idler pulley and install the belt onto the spring loaded idler pulley (Figure 35).

Checking and Adjusting the Blower Latch

Close the blower assembly to see if the latches are adjusted correctly. Loosen or tighten the bolts so the latches firmly hold the blower assembly against the mower deck , but can be released by hand.

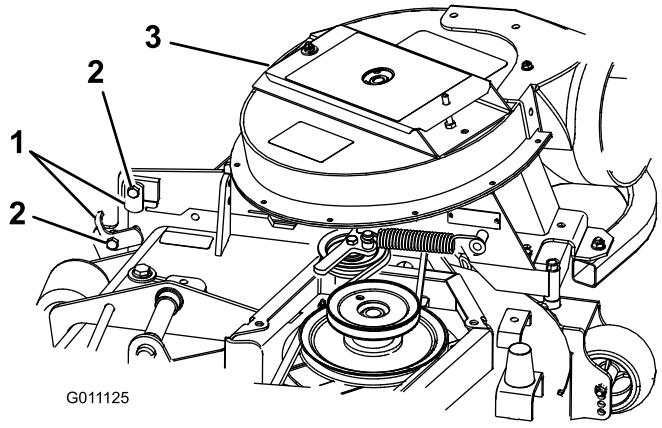

Figure 37

1. Latch
2. Bolt
3. Blower assembly

Greasing the Idler Arm and Handle Pivot

Service Interval: Every 50 hours—Grease the idler arm.

Every 100 hours—Grease the handle pivot.

Grease the blower belt idler arm (Figure 38).

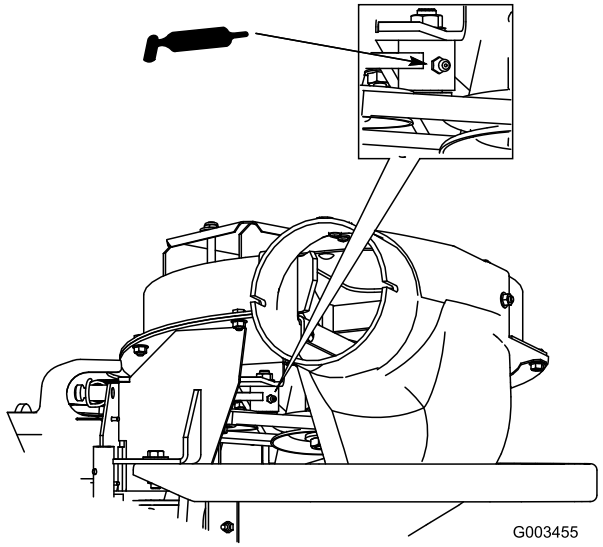

Figure 38

Grease the handle pivot (Figure 39).

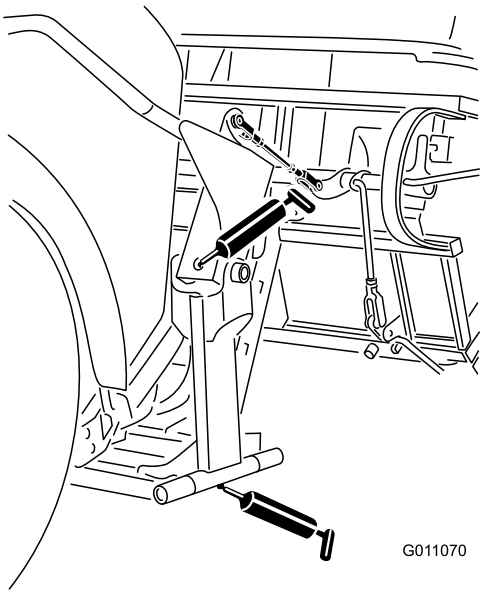

Figure 39

Inspecting the Collection System

Service Interval: After the first 8 hours

Every 100 hours

1. Disengage the PTO, move the motion control levers to the neutral locked position, and set the parking brake.
2. Stop the engine, remove the key, and wait for all moving parts to stop before leaving the operating position.
3. Check the upper tube, lower tube, bagger, and the blower assembly. Replace these parts if they are cracked or broken.
4. Check the bagger frame. Replace any parts that are cracked or broken.
5. Tighten all nuts bolts and screws.

Adjusting the Door Closing

The two hinge links and two stop screws can be adjusted to provide complete closing of the door.

1. Disengage the PTO, move the motion control levers to the neutral locked position, and set the parking brake.
2. Stop the engine, remove the key, and wait for all moving parts to stop before leaving the operating position.
3. With the door closed, the stop bolts need to be adjusted so that the contact arm is straight up and down (Figure 40).
4. If adjustment is need, loosen the nuts and adjust the stop bolts (Figure 40).
5. After the stop bolts have been adjusted, the length of the hinge links can be adjusted to provide complete closing of the door and reasonable force on the handle. Lengthen the links to reduce the force. Shorten the links to increase the force (Figure 40).
6. Make sure both the left and right sides are adjusted the same distance. With the door closed, the links should be slightly tight to minimize rattling.
7. Tighten the nuts.

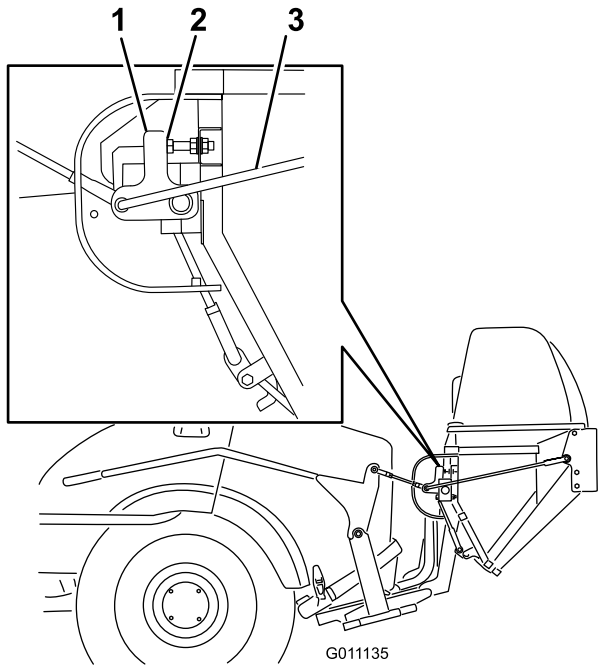

Figure 40

1. Contact arm straight up and down
2. Stop bolt
3. Hinge links

Adjusting the Door Opening

Perform this after adjusting the door closing.

Adjust the handle link to obtain the maximum door opening. Lengthen the handle link to open the door farther. Shorten the handle link to open the door less (Figure 41 and Figure 42).

Note: The maximum door opening is controlled by the contact arm hitting the stop. The stop is not adjustable and prevents the door from being opened too far.

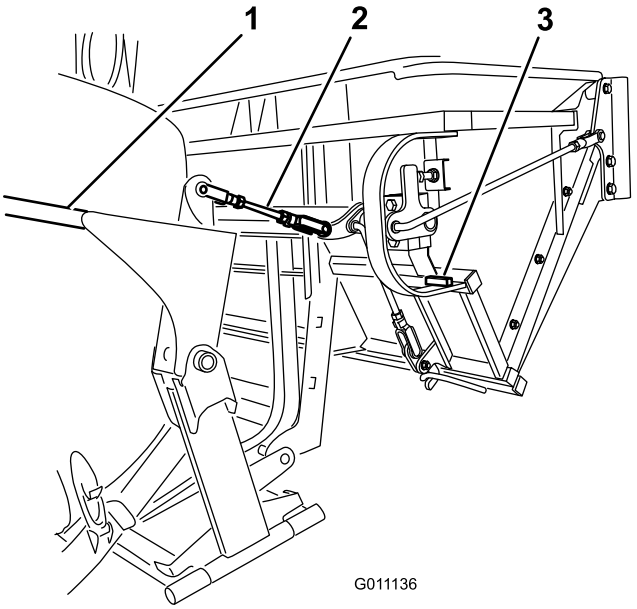

Figure 41

1. Handle
2. Handle link
3. Stop

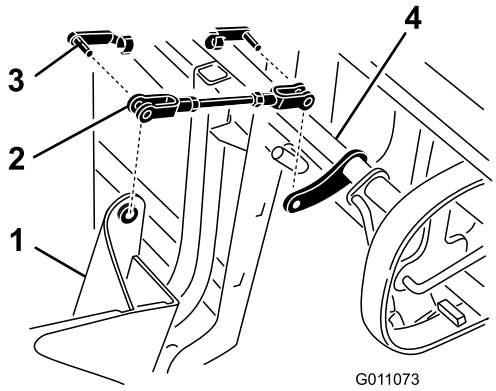

Figure 42

1. Bagger arm assembly
2. Bagger handle linkage
3. Clevis pin spring
4. Bagger assembly

Adjusting the Latches

The latches can be adjusted after the open and closed door positions have been set.

1. Disengage the PTO, move the motion control levers to the neutral locked position, and set the parking brake.
2. Stop the engine, remove the key, and wait for all moving parts to stop before leaving the operating position.
3. Close the door.
4. Check the to ensure the latches completely engage and contacts the latch rod welded to the door (Figure 43).
5. The latches need to be tight against the latch rod, but need to be loose enough to move or wiggle.

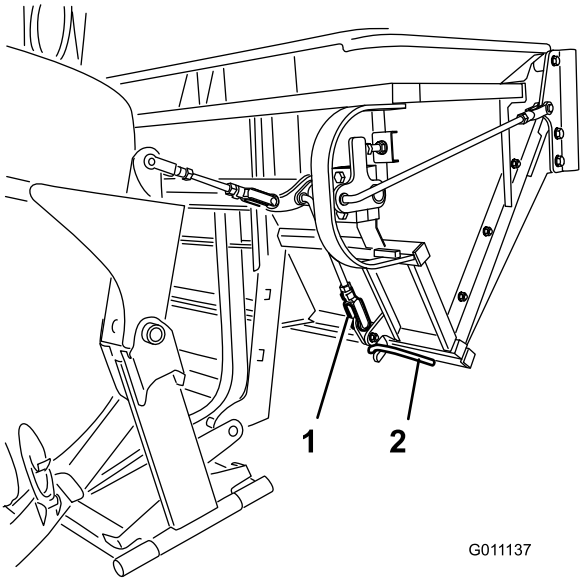

Figure 43

1. Latch link
2. Latch rod

Inspecting the Mower Blades

1. Inspect the mower blades regularly and whenever a blade strikes a foreign object.
2. If blades are badly worn or damaged, install new blades. Refer to your mower *Operator's Manual* for complete blade maintenance.

Installing the Mower Blades

In most mowing conditions, the standard high lift blades will provide the best bagging performance.

The Toro Atomic blade is recommended for bagging leaves in dry conditions. In dry dusty conditions, the medium lift or low lift blades will reduce dust and dirt blowout while providing effective bagging air flow.

Contact an Authorized Service Dealer for the proper blades for different mowing conditions.

Refer to the mower *Operator's Manual* for more information on installing blades.

Installing the Grass Deflector

⚠ WARNING

An uncovered discharge opening could allow the lawn mower to throw objects in the operator's or bystander's direction and result in serious injury. Also, contact with the blade could occur.

- **Never operate the lawn mower unless you install a cover plate, a mulch plate, or a grass chute and catcher.**
- **Make sure the grass deflector is in the down position.**

1. Remove the locknut, bolt, spring and spacer holding the deflector to the pivot brackets (Figure 44).
2. Remove the damaged or worn grass deflector.
3. Place the spacer and spring onto the grass deflector. Place the **L** end of the spring behind the deck edge.

   Note: Make sure the **L** end of the spring is installed behind the deck edge before installing the bolt as shown in Figure 44
4. Install the bolt and nut.
5. Place the **J** hook end of the spring around the grass deflector (Figure 44).

   Important: The grass deflector must be able to lower down into position. Lift the deflector up to test that it lowers into the full down position.

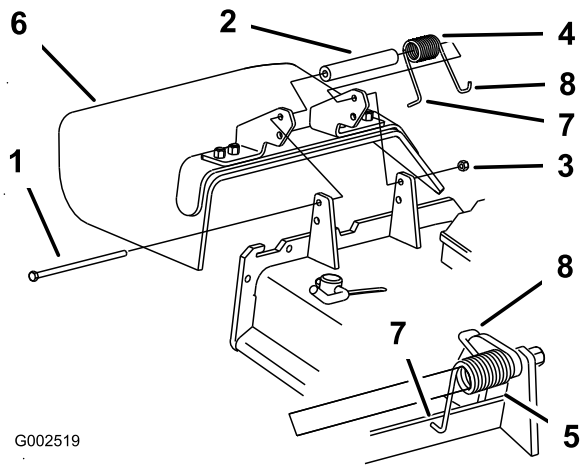

Figure 44

1. Bolt
2. Spacer
3. Locknut
4. Spring
5. Spring installed
6. Grass Deflector
7. **L** end of spring, place behind deck edge before installing bolt
8. **J** hook end of spring

Storage

1. Clean the bagger. Refer to Cleaning the Bagger.
2. Inspect the bagger for damage. Refer to Inspecting the Collection System.
3. Make sure the bagger is empty and thoroughly dry.
4. Check the belt for wear or cracks.
5. Store the machine in a clean, dry place, out of direct sunlight. If you must store the machine outside, cover it with a weatherproof cover. This protects the plastic parts and extends the life of the machine.

Troubleshooting

Problem	Possible Cause	Corrective Action
Abnormal vibration.	1. Cutting blade(s) is/are bent or unbalanced. 2. Blade mounting bolt is loose. 3. Loose blower pulley or pulley assembly. 4. Worn blower belt. 5. Blower fan blade(s) is/are bent or unbalanced.	1. Install new cutting blade(s). 2. Tighten the blade mounting bolt. 3. Tighten the appropriate pulley. 4. Replace belt. 5. Contact an Authorized Service Dealer.
Reduced bagging performance.	1. Low engine speed. 2. Plugged screen in bagger hood. 3. Loose blower belt. 4. A plugged tube or blower. 5. Full bagger.	1. Always operate the collection system at full throttle. 2. Remove debris, leaves or grass clippings from the screen. 3. Replace the blower belt. 4. Locate and remove plugged debris. 5. Empty the bagger.
Blower and tubes plug too frequently.	1. Bagger is too full. 2. Low engine speed. 3. Grass is too wet. 4. Grass is too long. 5. Plugged screen in hood. 6. Ground speed is too fast. 7. Worn blower belt.	1. Dump more frequently. 2. Always operate the collection system at full throttle. 3. Cut grass when it is dry. 4. Cut no more than 2-3 inches (51-76 mm) or 1/3 of the grass height, which ever is less. 5. Remove debris, leaves or grass clippings from the screen. 6. Drive slower at full throttle. 7. Replace belt.
Debris blowout.	1. Bagger is too full. 2. Ground speed is too fast. 3. Mower deck is not leveled.	1. Dump more frequently. 2. Drive slower at full throttle. 3. See the mower operator's manual for leveling the mower deck.
Blower impeller does not spin freely.	1. Plugged blower. 2. Impeller not aligned.	1. Remove debris, leaves or grass clippings from the blower impeller. 2. Contact an Authorized Service Dealer.

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The Toro Total Coverage Guarantee

A Limited Warranty

Conditions and Products Covered

The Toro Company and its affiliate, Toro Warranty Company, pursuant to an agreement between them, jointly warrant your Toro Commercial product (“Product”) to be free from defects in materials or workmanship for two years or 1500 operational hours*, whichever occurs first. This warranty is applicable to all products with the exception of Aerators (refer to separate warranty statements for these products). Where a warrantable condition exists, we will repair the Product at no cost to you including diagnostics, labor, parts, and transportation. This warranty begins on the date the Product is delivered to the original retail purchaser.
* Product equipped with an hour meter.

Instructions for Obtaining Warranty Service

You are responsible for notifying the Commercial Products Distributor or Authorized Commercial Products Dealer from whom you purchased the Product as soon as you believe a warrantable condition exists. If you need help locating a Commercial Products Distributor or Authorized Dealer, or if you have questions regarding your warranty rights or responsibilities, you may contact us at:

Toro Commercial Products Service Department
Toro Warranty Company
8111 Lyndale Avenue South
Bloomington, MN 55420-1196

952–888–8801 or 800–952–2740
E-mail: commercial.warranty@toro.com

Owner Responsibilities

As the Product owner, you are responsible for required maintenance and adjustments stated in your *Operator's Manual*. Failure to perform required maintenance and adjustments can be grounds for disallowing a warranty claim.

Items and Conditions Not Covered

Not all product failures or malfunctions that occur during the warranty period are defects in materials or workmanship. This warranty does not cover the following:

- Product failures which result from the use of non-Toro replacement parts, or from installation and use of add-on, or modified non-Toro branded accessories and products. A separate warranty may be provided by the manufacturer of these items.
- Product failures which result from failure to perform recommended maintenance and/or adjustments. Failure to properly maintain your Toro product per the Recommended Maintenance listed in the *Operator’s Manual* can result in claims for warranty being denied.
- Product failures which result from operating the Product in an abusive, negligent, or reckless manner.
- Parts subject to consumption through use unless found to be defective. Examples of parts which are consumed, or used up, during normal Product operation include, but are not limited to, brake pads and linings, clutch linings, blades, reels, rollers and bearings (sealed or greasable), bed knives, spark plugs, castor wheels and bearings, tires, filters, belts, and certain sprayer components such as diaphragms, nozzles, and check valves, etc.
- Failures caused by outside influence. Conditions considered to be outside influence include, but are not limited to, weather, storage practices, contamination, use of unapproved fuels, coolants, lubricants, additives, fertilizers, water, or chemicals, etc.
- Failure or performance issues due to the use of fuels (e.g. gasoline, diesel, or biodiesel) that do not conform to their respective industry standards.
- Normal noise, vibration, wear and tear, and deterioration.
- Normal “wear and tear” includes, but is not limited to, damage to seats due to wear or abrasion, worn painted surfaces, scratched decals or windows, etc.

Parts

Parts scheduled for replacement as required maintenance are warranted for the period of time up to the scheduled replacement time for that part. Parts replaced under this warranty are covered for the duration of the original product warranty and become the property of Toro. Toro will make the final decision whether to repair any existing part or assembly or replace it. Toro may use remanufactured parts for warranty repairs.

Deep Cycle and Lithium-Ion Battery Warranty:

Deep cycle and Lithium-Ion batteries have a specified total number of kilowatt-hours they can deliver during their lifetime. Operating, recharging, and maintenance techniques can extend or reduce total battery life. As the batteries in this product are consumed, the amount of useful work between charging intervals will slowly decrease until the battery is completely worn out. Replacement of worn out batteries, due to normal consumption, is the responsibility of the product owner. Battery replacement may be required during the normal product warranty period at owner’s expense. Note: (Lithium-Ion battery only): A Lithium-Ion battery has a part only prorated warranty beginning year 3 through year 5 based on the time in service and kilowatt hours used. Refer to the *Operator's Manual* for additional information.

Maintenance is at Owner’s Expense

Engine tune-up, lubrication, cleaning and polishing, replacement of filters, coolant, and completing recommended maintenance are some of the normal services Toro products require that are at the owner’s expense.

General Conditions

Repair by an Authorized Toro Distributor or Dealer is your sole remedy under this warranty.

Neither The Toro Company nor Toro Warranty Company is liable for indirect, incidental or consequential damages in connection with the use of the Toro Products covered by this warranty, including any cost or expense of providing substitute equipment or service during reasonable periods of malfunction or non-use pending completion of repairs under this warranty. Except for the Emissions warranty referenced below, if applicable, there is no other express warranty. All implied warranties of merchantability and fitness for use are limited to the duration of this express warranty.

Some states do not allow exclusions of incidental or consequential damages, or limitations on how long an implied warranty lasts, so the above exclusions and limitations may not apply to you. This warranty gives you specific legal rights, and you may also have other rights which vary from state to state.

Note regarding engine warranty:

The Emissions Control System on your Product may be covered by a separate warranty meeting requirements established by the U.S. Environmental Protection Agency (EPA) and/or the California Air Resources Board (CARB). The hour limitations set forth above do not apply to the Emissions Control System Warranty. Refer to the Engine Emission Control Warranty Statement supplied with your product or contained in the engine manufacturer’s documentation for details

Countries Other than the United States or Canada

Customers who have purchased Toro products exported from the United States or Canada should contact their Toro Distributor (Dealer) to obtain guarantee policies for your country, province, or state. If for any reason you are dissatisfied with your Distributor's service or have difficulty obtaining guarantee information, contact the Toro importer.

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