



# STX2 & XTA 8/10 Series

## Portable Grain Auger Operator's Manual

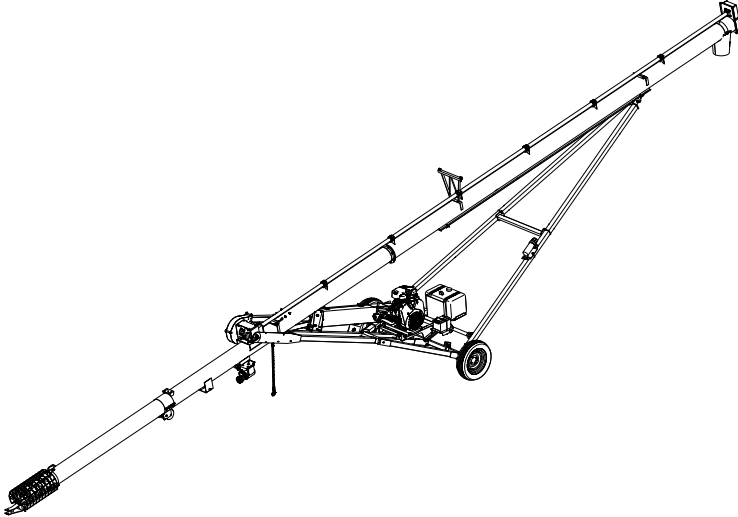
This manual applies to:

AGI Westfield STX2 8/10 (31/36/41/46/51)

AGI XTA 8/10 (31/36/41/46/51)

AGI Hutchinson STX2 8/10 (31/36/41/46/51)

AGI Mayrath STX2 8/10 (31/36/41/46/51)



**LOOKING FOR PARTS?**

Check out our online  
Parts Catalog!



Read this manual before using product. Failure to follow instructions and safety precautions can result in serious injury, death, or property damage. Keep manual for future reference.

Part Number: 31031 R6

Revised: November 2024

Original Instructions

This product has been designed and manufactured to meet general engineering standards. Other local regulations may apply and must be followed by the operator. All personnel must be trained in the correct operational and safety procedures for this product. Use the sign-off sheet below to record initial and periodic reviews of this manual with all personnel.

[illegible]

# CONTENTS

<b>1. Introduction .....</b>	<b>5</b>
1.1 Serial Number Location .....	5
1.2 Intended Use .....	6
1.2.1 Misuse .....	6
<b>2. Safety.....</b>	<b>7</b>
2.1 Safety Alert Symbol and Signal Words.....	7
2.2 General Safety Information.....	7
2.3 Rotating Flighting Safety .....	8
2.4 Overhead Power Lines .....	8
2.5 Upending .....	8
2.6 Rotating Parts Safety.....	8
2.7 Work Area Safety .....	9
2.8 Guards Safety .....	9
2.9 Raising and Lowering the Auger .....	10
2.10 Hand Winch Safety.....	10
2.11 Hydraulic Winch Safety .....	10
2.12 Positioning the Auger.....	11
2.13 Towing the Auger .....	11
2.14 Drives and Lockout Safety.....	11
2.14.1 Gas Engine Safety.....	12
2.14.2 Electric Motor Safety.....	12
2.14.3 Hydraulic Power Safety .....	13
2.15 Tire Safety.....	14
2.16 Battery Safety .....	14
2.17 Personal Protective Equipment.....	15
2.18 Safety Equipment .....	16
2.19 Safety Decals .....	16
2.19.1 Decal Installation/Replacement.....	16
2.19.2 Safety Decal Locations and Details .....	16
<b>3. Features.....</b>	<b>25</b>
<b>4. Transport.....</b>	<b>26</b>
4.1 Transport Safety.....	26
4.2 Transport Preparation .....	27
4.3 Prepare the Mover Kit for Transport .....	27
4.4 Connect the Auger to the Towing Vehicle .....	28
<b>5. Placement .....</b>	<b>30</b>
5.1 Placement Safety.....	30
5.2 Positioning the Auger.....	30
5.3 Positioning the Auger with a Mover Kit.....	31
5.4 Hand Winch Operation.....	34
5.5 Hydraulic Winch Operation .....	35
<b>6. Operation .....</b>	<b>36</b>
6.1 Operation Safety .....	36
6.2 Start-up and Break-in .....	36
6.3 Engage/Disengage Manual Belt .....	37

6.4 Operation — Electric Motor Models .....	37
6.5 Operation — Gas Engine Models.....	37
6.6 Engaging/Disengaging Enclosed Hopper.....	38
6.7 Emergency Shutdown .....	38
6.8 Restarting with a Full Tube .....	38
6.9 Bin Level Indicators .....	39
6.10 Using the Auger with Grain Spreaders.....	39
6.11 Shutdown .....	39
6.12 Handling Fertilizer .....	39
6.13 Storing the Auger .....	40
<b>7. Maintenance .....</b>	<b>41</b>
7.1 Maintenance Safety .....	41
7.2 Maintenance Schedule .....	42
7.3 Visually Inspect the Auger.....	43
7.4 Lubricate the Equipment.....	43
7.5 Inspect Hydraulic Hoses and Fittings .....	44
7.6 Check the Gearbox Oil.....	44
7.7 Change the Gearbox Oil .....	44
7.8 Adjust the Upper Drive Chain .....	45
7.9 Grease the Intake Bushing and Upper Drive Chain .....	45
7.10 Clean and Wash the Equipment .....	46
7.11 Align the Drive Belts.....	46
7.12 Tension the Drive Belts .....	48
7.13 Replace the Drive Belts .....	49
7.14 Repack the Wheel Bearings with Grease.....	50
7.15 Check/Adjust the Truss Cables.....	50
7.16 Inspect and Service the Hand Winch and Lift Cable.....	52
7.17 Inspect and Service the Hydraulic Winch and Lift Cable .....	52
7.18 Adjusting the Mover Kit Ram and Travel Speed .....	53
7.19 Adjusting the Mover Kit Pinion Gear .....	54
7.20 Change the Hydraulic Oil.....	54
<b>8. Troubleshooting.....</b>	<b>55</b>
<b>9. Specifications .....</b>	<b>60</b>
<b>10. AGI Limited Warranty.....</b>	<b>62</b>

# 1. Introduction

Follow the instructions in this manual for safe use of this auger. Following proper operation and maintenance will help to keep the auger running in optimal condition.

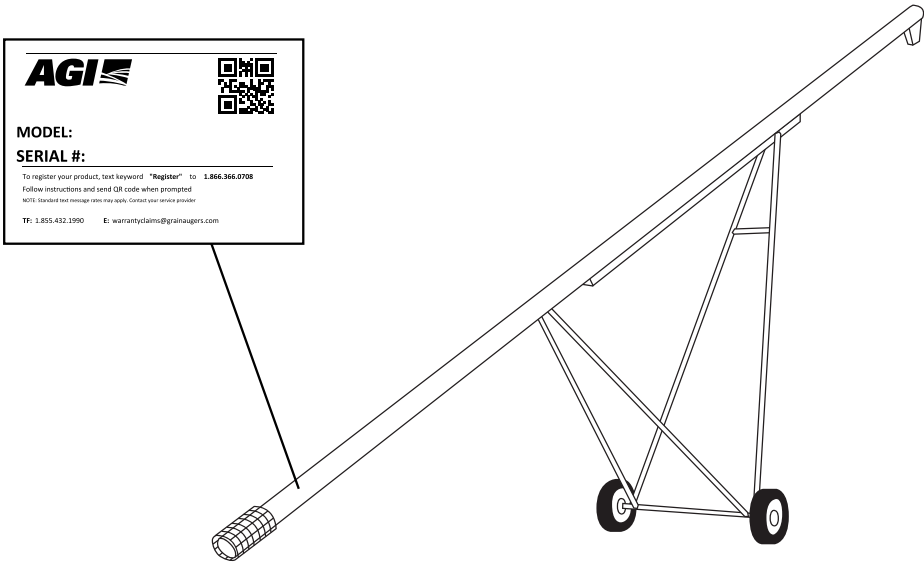
Keep this manual handy for frequent reference and to review with new personnel. A sign-off form is provided on the inside front cover for your convenience. If any information in this manual is not understood or if you need additional information, please contact AGI or your representative for assistance.

This manual should be regarded as part of the equipment.

## 1.1. Serial Number Location

The serial number location for your auger is shown in the figure below. Have the serial number ready when ordering parts or requesting service or other information. Record information in the table below for easy reference.

Model Number	
Serial Number	
Date Received	



## 1.2. Intended Use

---

The auger is intended for use as listed below and described throughout this manual. Use in any other way is considered contrary to the intended use and is not covered by the warranty.

### **Intended use for the auger**

- Handling grain, pulse crops, treated seeds, fertilizer, or other similar materials.

### ***1.2.1 Misuse***

Do not install/use the auger for/with:

- transferring material other than dry, free-flowing grains.
- lifting or using as a hoist or crane.

## 2. Safety

### 2.1. Safety Alert Symbol and Signal Words

---



This safety alert symbol indicates important safety messages in this manual. When you see this symbol, be alert to the possibility of injury or death, carefully read the message that follows, and inform others.

**Signal Words:** Note the use of the signal words **DANGER**, **WARNING**, **CAUTION**, and **NOTICE** with the safety messages. The appropriate signal word for each message has been selected using the definitions below as a guideline.



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



Indicates a hazardous situation that, if not avoided, could result in serious injury or death.



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



Indicates a potentially hazardous situation that, if not avoided, may result in property damage.

### 2.2. General Safety Information

---

Read and understand all safety instructions, safety decals, and manuals and follow them when operating or maintaining the equipment.

- Owners must give instructions and review the information initially and annually with all personnel before allowing them in the work area. Untrained users/operators expose themselves and bystanders to possible serious injury or death.
- Use for intended purposes only.
- Modification of the auger in any way without written permission from the manufacturer is not covered by the warranty.
- Follow a health and safety program for your worksite. Contact your local occupational health and safety organization for information.
- Follow applicable local codes and regulations.



## 2.3. Rotating Flighting Safety

---

### DANGER

- KEEP AWAY from rotating flighting.
- DO NOT remove or modify flighting guards, doors, or covers. Keep in good working order. Have replaced if damaged.
- DO NOT operate the auger without all guards, doors, and covers in place.
- NEVER touch the flighting. Use a stick or other tool to remove an obstruction or clean out.
- Shut off and lock out power to adjust, service, or clean.



## 2.4. Overhead Power Lines

---

### DANGER

- When operating or moving, keep auger away from overhead power lines and devices.
- The auger is not insulated.
- Electrocution can occur without direct contact.

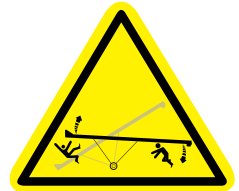


## 2.5. Upending

---

### WARNING

- Anchor intake end and/or support discharge end to prevent upending.
- Intake end must always have downward weight. Do not release until attached to tow bar or resting on ground.
- Do not raise intake end above tow bar height.
- Empty the auger and fully lower before moving.



## 2.6. Rotating Parts Safety

---

### WARNING

- Keep body, hair, and clothing away from rotating shafts, pulleys, belts, chains, and sprockets.
- Do not operate with any guard removed or modified. Keep guards in good working order.
- Shut off and lock out power source before inspecting or servicing machine.

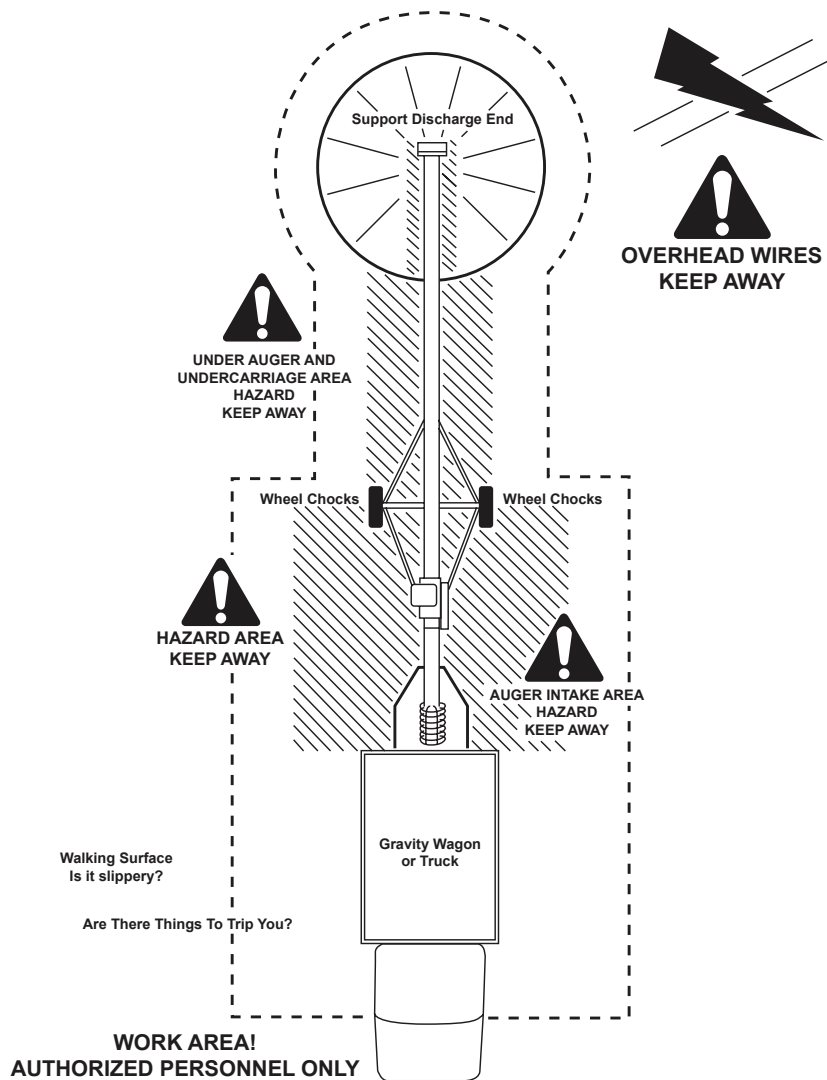




## 2.7. Work Area Safety

- WARNING**
- Have another trained person nearby who can shut down the auger in case of accident.
  - Do not allow any unauthorized persons in the work area.
  - Keep the work area clean and free of debris.

Figure 1. Work Area



## 2.8. Guards Safety

- WARNING**
- Keep guards in place. Do not operate with guard removed.
  - Do not walk on, step on, or damage guards.
  - Lock out power before removing a guard.
  - Ensure all guards are replaced after performing maintenance.

## 2.9. Raising and Lowering the Auger

---

### **WARNING**

- Before raising/lowering/moving/adjusting the auger, make sure the area around the auger is clear of obstructions and/or untrained personnel. Never allow anyone to stand on or beneath the auger when it is being placed.
- Lower the auger to its lowest position when not in use.
- Empty the auger before raising or lowering.
- Do not get on or beneath the auger when raising or lowering.
- Raise and lower auger on reasonably level ground only.
- Never attempt to increase height of the auger by positioning wheels on lumber, blocks, or by any other means. To do so will result in damage to auger and/or serious injury.
- Do not raise the auger in high winds.

## 2.10. Hand Winch Safety

---

### **When Equipped:**

### **WARNING**

- Inspect lift cable before using. Replace if frayed or damaged. Make sure lift cable is seated and tracking properly and cable clamps are secure.
- Tighten brake lock by turning winch handle clockwise at least two clicks after lowering the auger.
- Lower the auger fully before towing, then rotate winch handle until cable has light tension.
- Do not lubricate winch brake discs.

## 2.11. Hydraulic Winch Safety

---

### **When Equipped:**

### **WARNING**

- Keep away from rotating cable drum and winch cable. Do not touch or grab cable while winch is being operated or use hands to guide the cable.
- Inspect cable and cable clamps before using hydraulic winch. Replace cable if frayed or damaged. Tighten cable clamps if necessary.
- Check the cable anchor on the winch drum is tight.
- Confirm hydraulic hoses are in good condition.
- Do not continue to supply power to hydraulic winch after the auger has reached full up position.
- Do not disconnect hydraulic quick couplers when lines are pressurized.
- Make sure lift cable is seated properly.
- Always keep a minimum of 3 cable wraps on the cable drum.

## 2.12. Positioning the Auger

---

### **WARNING**

- Transport and place equipment on reasonably level ground when raising, lowering, positioning, or operating.
- Move the auger into position slowly. Do not unhitch and attempt to move by hand.
- Chock wheels and anchor intake end after placement.

## 2.13. Towing the Auger

---

The auger is not intended for transport on public roads. If it requires transport on a public roadway, the following steps should be taken:

### **WARNING**

- Check with local authorities regarding transport on public roads. Obey all applicable laws and regulations.
- Always travel at a safe speed, never exceeding 20 mph (32 km/h).
- Reduce speed on rough surfaces.
- Do not transport on slopes greater than 20°.
- Use caution when turning corners or meeting traffic.
- Make sure the SMV (slow moving vehicle) emblem and all the lights and reflectors that are required by local authorities are in place, are clean, and can be seen by all over-taking and oncoming traffic.
- Always use hazard-warning flashers on tractor/towing vehicle when transporting unless prohibited by law.
- Do not allow riders on the auger or towing vehicle during transport.
- Attach to towing vehicle with an appropriate pin and retainer. Always attach safety chains.
- Place the auger in the transport position before moving on roads.

## 2.14. Drives and Lockout Safety

---

Inspect the power source(s) before using and know how to shut down in an emergency. Whenever you service or adjust your equipment, make sure you shut down the power source and unplug or remove the key (as applicable) to prevent inadvertent start-up and hazardous energy release. Know the procedure(s) that applies to your equipment from the following power source(s). Ensure that all personnel are clear before turning on power to equipment.



### 2.14.1 Gas Engine Safety

#### **WARNING** Power Source

- Keep guards in place and secure.
- Properly ventilate surrounding area.
- Never fill the fuel tank with the engine running, while smoking, or near an open flame. Always shut down and allow engine to cool before filling with fuel.
- Never overfill the tank or spill fuel. If fuel is spilled, clean it up immediately.
- Be sure to use the correct type and grade of fuel. Ground the fuel funnel or nozzle against the filler neck to prevent sparks that could ignite fuel vapors.
- Be sure to replace the fuel fill cap when you are done.



#### **Lockout**

- For engines with an electric start, remove the ignition key, the spark plug wire, or the spark plug.
- For engines with a rope or crank start, remove the spark plug wire or the spark plug.

### 2.14.2 Electric Motor Safety

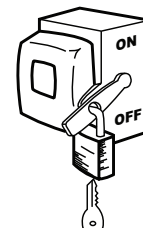
#### **WARNING** Power Source

- Electric motors and controls shall be installed and serviced by a qualified electrician and must meet all local codes and standards.
- Use a magnetic starter to protect the electric motor.
- You must have a manual reset button.
- Reset and motor starting controls must be located so that the operator has full view of the entire operation.
- Locate main power disconnect switch within reach from ground level to permit ready access in case of an emergency.
- Motor must be properly grounded.
- Ensure electrical wiring and cords remain in good condition; replace if necessary.

#### **Lockout**

- The main power disconnect switch should be in the locked position during shutdown or whenever maintenance is performed.
- If reset is required, disconnect all power before resetting motor.

SERVICE DISCONNECT



### 2.14.3 Hydraulic Power Safety



#### **WARNING Power Source**

- Refer to the rules and regulations applicable to the power source operating the hydraulic system.
- Do not connect or disconnect hydraulic lines while system is under pressure.
- Keep all hydraulic lines away from moving parts and pinch points.
- Escaping hydraulic fluid under pressure will cause serious injury if it penetrates the skin surface (serious infection or toxic reaction can develop). See a doctor immediately if injured.
- Use metal or wood as a backstop when searching for hydraulic leaks and wear proper hand and eye protection.
- Check all hydraulic components are tight and in good condition. Replace any worn, cut, abraded, flattened, or crimped hoses.
- Clean the connections before connecting to equipment.
- Do not attempt any makeshift repairs to the hydraulic fittings or hoses with tape, clamps, or adhesive. The hydraulic system operates under extremely high pressure; such repairs will fail suddenly and create a hazardous and unsafe condition.

#### **Lockout**

- Always place all hydraulic controls in neutral and relieve system pressure before disconnecting or working on hydraulic system.



## 2.15. Tire Safety

---

### WARNING

Failure to follow proper procedures when mounting a tire on a wheel or rim can produce an explosion that may result in serious injury or death.



- DO NOT attempt to mount a tire unless you have the proper equipment and experience to do the job.
- Have a qualified tire dealer or repair service perform required tire maintenance.
- When replacing worn tires, make sure they meet the original tire specifications. Never undersize the replacement tire.
- DO NOT weld to the tire rim with the tire mounted on the rim. This action may cause an explosion which could result in serious injury or death.
- Inflate tires to the manufacturer's recommended pressure.
- Tires should not be operated at speeds higher than their rated speed.
- Keep wheel lug nuts tightened to manufacturer's recommendations.
- Never reinflate a tire that has been run flat or seriously under-inflated without removing the tire from the wheel. Have the tire and wheel closely inspected for damage before remounting.

## 2.16. Battery Safety

---

### WARNING

- Wear safety glasses and protective gloves when working near batteries.
- Make certain the battery or terminal covers are in place and in good working order.
- Keep all sparks and flames away from batteries; gas given off by electrolyte is explosive.
- Avoid contact with battery electrolyte. Wash off any spilled electrolyte immediately.
- Do not tip batteries more than 45° to avoid electrolyte loss.
- To avoid injury from sparks or short circuits, disconnect battery ground cable before servicing any part of an electrical system.



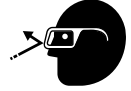
## 2.17. Personal Protective Equipment

---

The following Personal Protective Equipment (PPE) should be worn when operating or maintaining the equipment.

### Safety Glasses

- Wear safety glasses at all times to protect eyes from debris.



### Coveralls

- Wear coveralls to protect skin.



### Hard Hat

- Wear a hard hat to help protect your head.



### Steel-Toe Boots

- Wear steel-toe boots to protect feet from falling debris.



### Work Gloves

- Wear work gloves to protect your hands from sharp and rough edges.



### Dust Mask

- Wear a dust mask to prevent breathing potentially harmful dust.



### Hearing Protection

- Wear ear protection to prevent hearing damage.



## 2.18. Safety Equipment

---

The following safety equipment should be kept on site.

### Fire Extinguisher

- Provide a fire extinguisher for use in case of an accident. Store in a highly visible and accessible place.



### First-Aid Kit

- Have a properly-stocked first-aid kit available for use should the need arise, and know how to use it.



## 2.19. Safety Decals

---

- Keep safety decals clean and legible at all times.
- Replace safety decals that are missing or have become illegible. See decal location figures that follow.
- Replaced parts must display the same decal(s) as the original part.
- Replacement safety decals are available **free of charge** from your distributor, dealer, or factory as applicable.

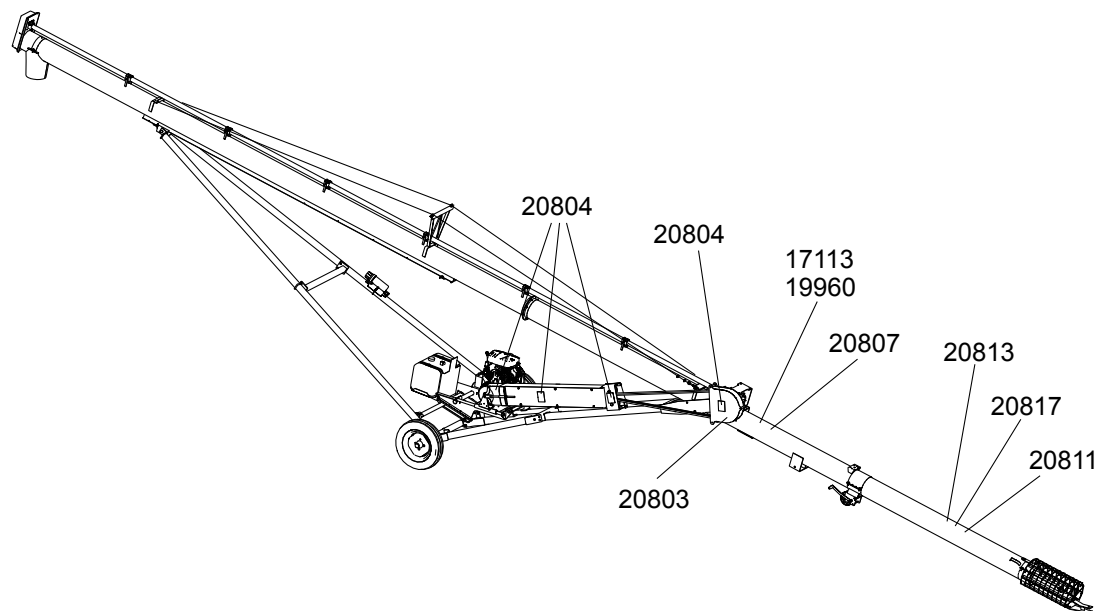
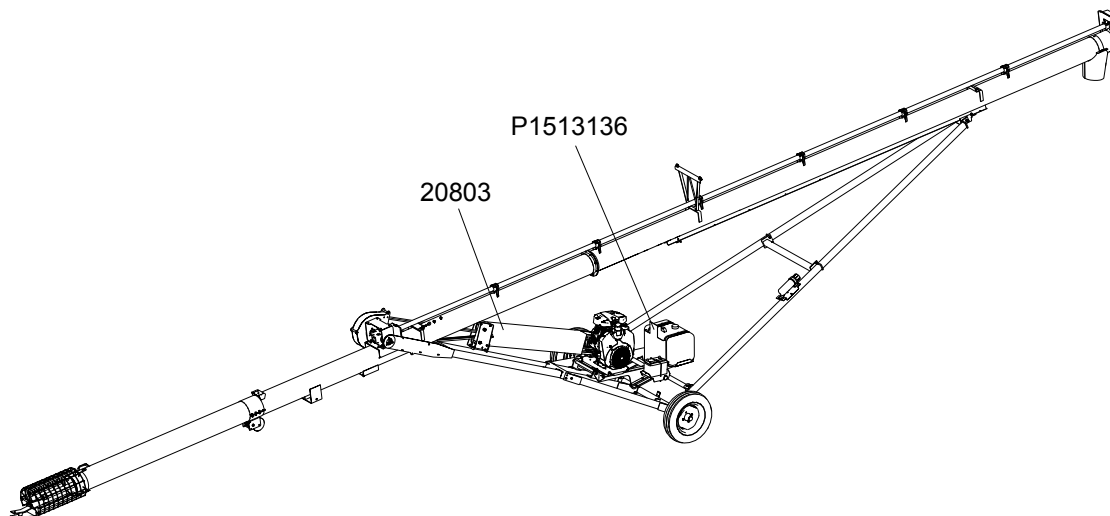
### 2.19.1 Decal Installation/Replacement

1. Decal area must be clean and dry, with a temperature above 50°F (10°C).
2. Decide on the exact position before you remove the backing paper.
3. Align the decal over the specified area and carefully press the small portion with the exposed sticky backing in place.
4. Slowly peel back the remaining paper and carefully smooth the remaining portion of the decal in place.
5. Small air pockets can be pierced with a pin and smoothed out using the decal backing paper.

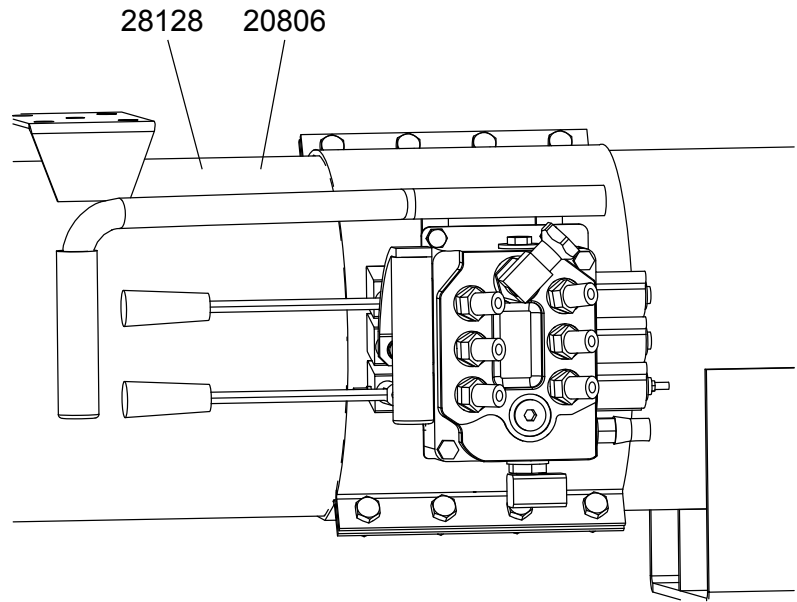
### 2.19.2 Safety Decal Locations and Details

Replicas of the safety decals that are attached to the auger and their messages are shown in the figure(s) that follow. Safe operation and use of the auger requires that you familiarize yourself with the various safety decals and the areas or particular functions that the decals apply to, as well as the safety precautions that must be taken to avoid serious injury, death, or damage.

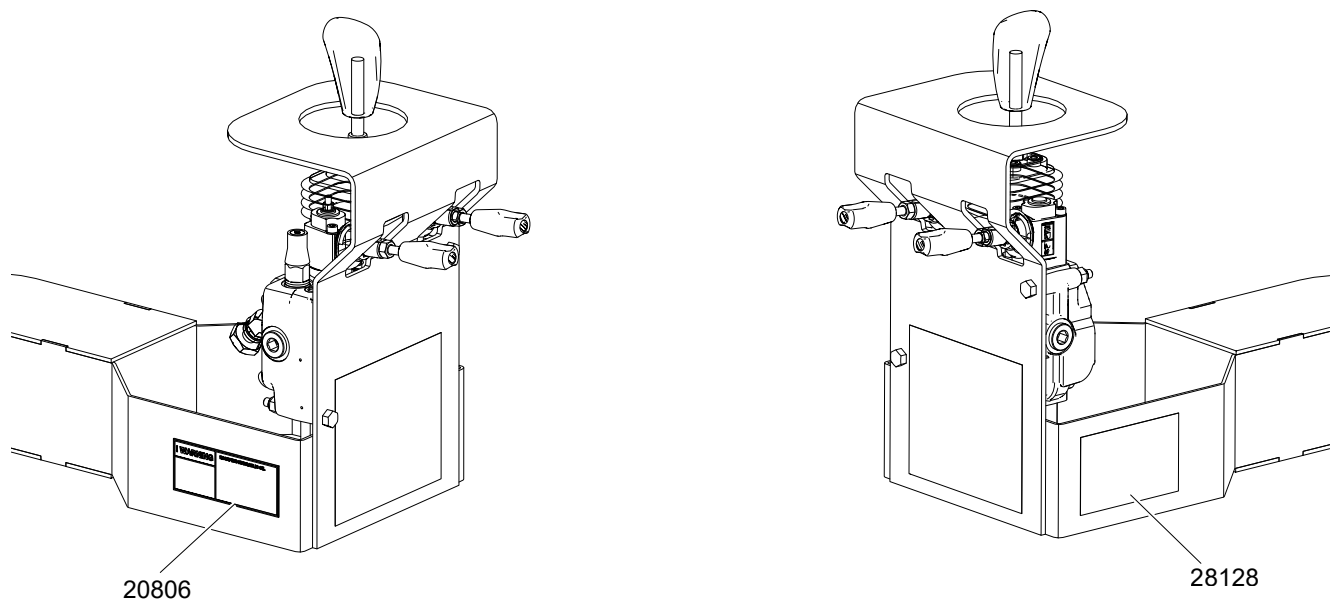


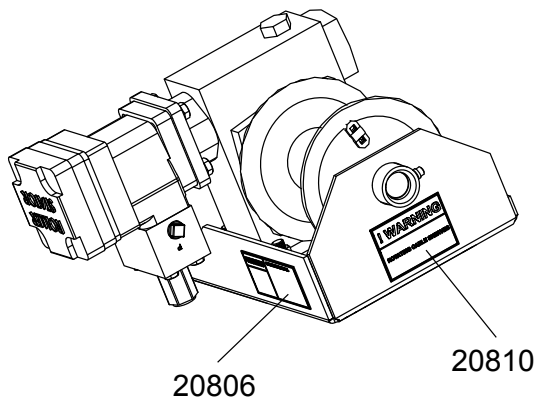
**Figure 2. Safety Decal Locations****Figure 3. Safety Decal Locations**

**Figure 4. Regular SP Kit Safety Decal Locations (Option Kit)**


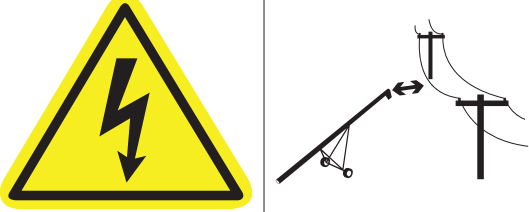

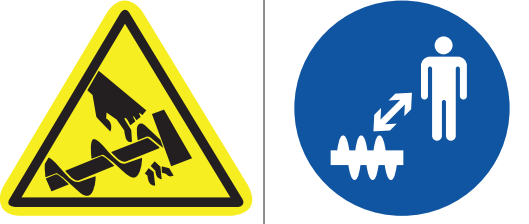


**Figure 5. Hydraulic Steering Safety Decal Locations (Option Kit)**

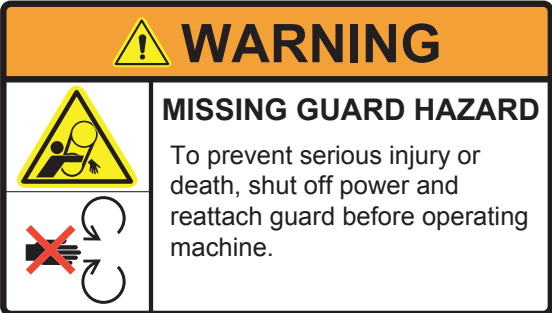

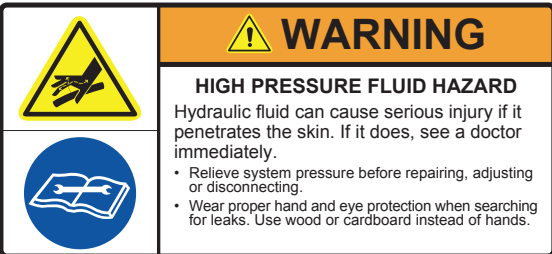


**Figure 6. Hydraulic Winch Safety Decal Locations (Option Kit)**

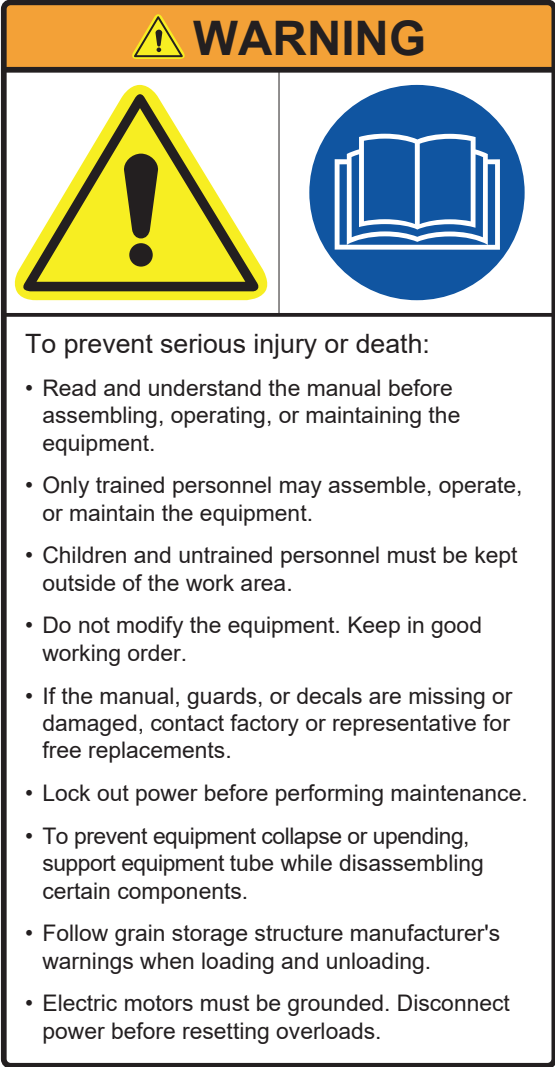
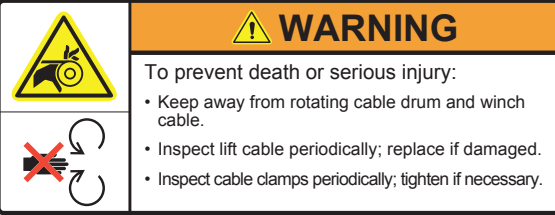
**Table 1. Safety Decals**

Part Number	Description
20817	<div data-bbox="415 275 964 913"> <div data-bbox="415 275 964 342">  <b>DANGER</b> </div> <div data-bbox="415 352 964 583">  </div> <div data-bbox="415 594 964 913"> <p><b>ELECTROCUTION HAZARD</b></p> <p>To prevent death or serious injury:</p> <ul style="list-style-type: none"> <li>• When operating or moving, keep equipment away from overhead power lines and devices.</li> <li>• Fully lower equipment before moving.</li> </ul> <p>This equipment is not insulated.</p> <p>Electrocution can occur without direct contact.</p> </div> </div>
20813	<div data-bbox="415 957 964 1747"> <div data-bbox="415 957 964 1024">  <b>DANGER</b> </div> <div data-bbox="415 1035 964 1266">  </div> <div data-bbox="415 1276 964 1747"> <p><b>ROTATING FLIGHTING HAZARD</b></p> <p>To prevent death or serious injury:</p> <ul style="list-style-type: none"> <li>• KEEP AWAY from rotating auger flighting.</li> <li>• DO NOT remove or modify auger flighting guards, doors, or covers. Keep in good working order. Have replaced if damaged.</li> <li>• DO NOT operate the auger without all guards, doors, and covers in place.</li> <li>• NEVER touch the auger flighting. Use a stick or other tool to remove an obstruction or clean out.</li> <li>• Shut off and lock out power to adjust, service, or clean.</li> </ul> </div> </div>





**Table 1 Safety Decals (continued)**

Part Number	Description
20803 (inside)	
20804	
20806 (Optional Mover Kit)	


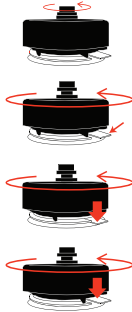
**Table 1 Safety Decals (continued)**

Part Number	Description
20807	<div data-bbox="412 273 964 1333">  <p><b>WARNING</b></p> <p>To prevent serious injury or death:</p> <ul style="list-style-type: none"> <li>• Read and understand the manual before assembling, operating, or maintaining the equipment.</li> <li>• Only trained personnel may assemble, operate, or maintain the equipment.</li> <li>• Children and untrained personnel must be kept outside of the work area.</li> <li>• Do not modify the equipment. Keep in good working order.</li> <li>• If the manual, guards, or decals are missing or damaged, contact factory or representative for free replacements.</li> <li>• Lock out power before performing maintenance.</li> <li>• To prevent equipment collapse or upending, support equipment tube while disassembling certain components.</li> <li>• Follow grain storage structure manufacturer's warnings when loading and unloading.</li> <li>• Electric motors must be grounded. Disconnect power before resetting overloads.</li> </ul> </div>
20810 (Optional Mover Kit)	<div data-bbox="412 1379 964 1591">  <p><b>WARNING</b></p> <p>To prevent death or serious injury:</p> <ul style="list-style-type: none"> <li>• Keep away from rotating cable drum and winch cable.</li> <li>• Inspect lift cable periodically; replace if damaged.</li> <li>• Inspect cable clamps periodically; tighten if necessary.</li> </ul> </div>

**Table 1 Safety Decals (continued)**

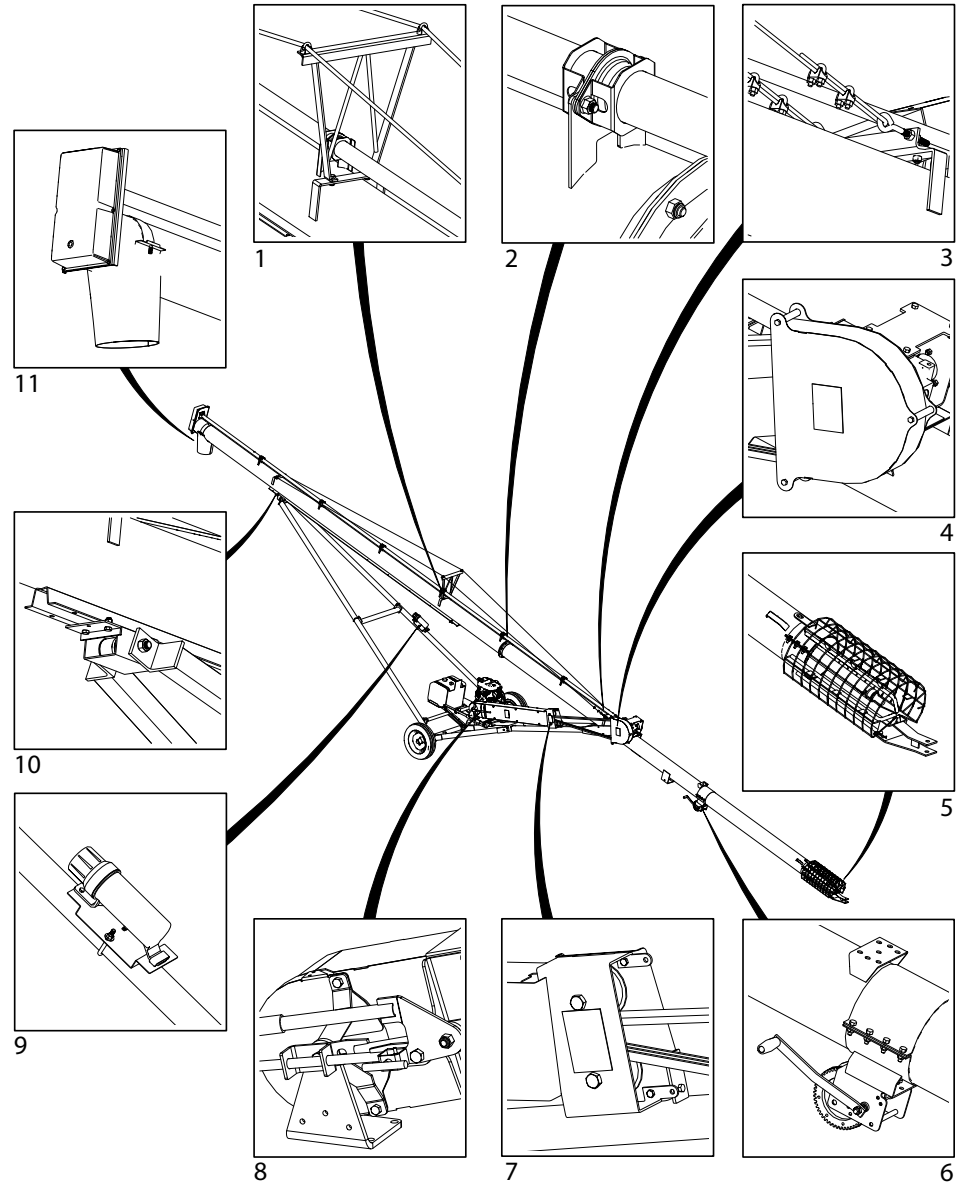
Part Number	Description
20811	<div data-bbox="415 275 964 957"> <div data-bbox="415 275 964 342">  <b>WARNING</b> </div> <div data-bbox="415 352 964 583">  </div> <div data-bbox="415 594 964 957"> <p><b>UPENDING HAZARD</b></p> <p>To prevent death or serious injury:</p> <ul style="list-style-type: none"> <li>• Anchor intake end and/or support discharge end to prevent upending.</li> <li>• Intake end must always have downward weight. Do not release until attached to tow bar or resting on ground.</li> <li>• Do not raise intake end above tow bar height.</li> <li>• Empty tube and fully lower before moving.</li> </ul> </div> </div>
17113	<div data-bbox="415 1010 964 1293"> <div data-bbox="415 1010 964 1077">  <b>WARNING</b> </div> <div data-bbox="415 1087 964 1293"> <p><b>TRANSPORT HAZARD</b></p> <p>To prevent serious injury or death:</p> <ul style="list-style-type: none"> <li>• Securely attach equipment to vehicle with correct pin and safety chains.</li> <li>• Use a tow vehicle to move equipment.</li> </ul> </div> </div>
28128 (Optional Mover Kit)	<div data-bbox="415 1346 964 1503"> <div data-bbox="415 1346 964 1413">  <b>WARNING</b> </div> <div data-bbox="415 1423 964 1503"> <p><b>TRANSPORT HAZARD</b></p> <p>To prevent serious injury or equipment damage, before towing:</p> <ul style="list-style-type: none"> <li>• Lift up wheel frame completely and secure with safety chain.</li> <li>• Pull handle to disengage drive wheel motors.</li> </ul> </div> </div>

**Table 1 Safety Decals (continued)**

Part Number	Description
P1513136	<div data-bbox="412 268 966 863"> <div data-bbox="412 268 966 321">  <b>WARNING</b> </div> <div data-bbox="467 331 911 359"> <b>CONTENTS MAY BE UNDER PRESSURE</b> </div> <div data-bbox="425 371 940 443"> <p>As part of the fuel vapour retention system, it is normal for your tank to expand from internal pressure. Use the vent screw to relieve pressure and before refueling.</p> </div> <div data-bbox="425 455 568 478"> <p>To remove cap:</p> </div> <div data-bbox="425 487 781 728"> <ol style="list-style-type: none"> <li>1. Open VENT SCREW on top of cap FULLY.</li> <li>2. Locate Pressure Relief Tab under cap. Turn cap until Pressure Relief Tab Lock engages.</li> <li>3. Press down on tab, rotate cap 1/4 turn (to relieve pressure before opening tank) and release tab. STOP. Lock may engage again.</li> <li>4. PRESS Pressure Relief Tab down again and turn slowly to remove cap.</li> </ol> </div> <div data-bbox="812 449 943 758">  </div> <div data-bbox="425 745 561 770"> <p>To tighten cap:</p> </div> <div data-bbox="425 779 820 802"> <ul style="list-style-type: none"> <li>• Turn Closure caps until an audible "click" is heard.</li> </ul> </div> <div data-bbox="425 812 802 835"> <p>Failure to follow may result in fuel spillage.</p> </div> </div>
19960	<div data-bbox="412 905 966 1234"> <div data-bbox="412 905 966 982"> <b>NOTICE</b> </div> <div data-bbox="436 1003 932 1106"> <p>To prevent damage, wheels must be free to move when raising or lowering equipment.</p> </div> <div data-bbox="436 1127 932 1192"> <p>When equipment is positioned, chock all wheels.</p> </div> </div>



# 3. Features



1	cable bridge (51 model only)	7	belt idler (not required for 31 model)
2	shaft guarding	8	belt tension adjustment
3	cable adjustment (51 model only)	9	manual holder
4	pulley guarding	10	track
5	intake & intake guarding	11	discharge & upper chain drive
6	winch		

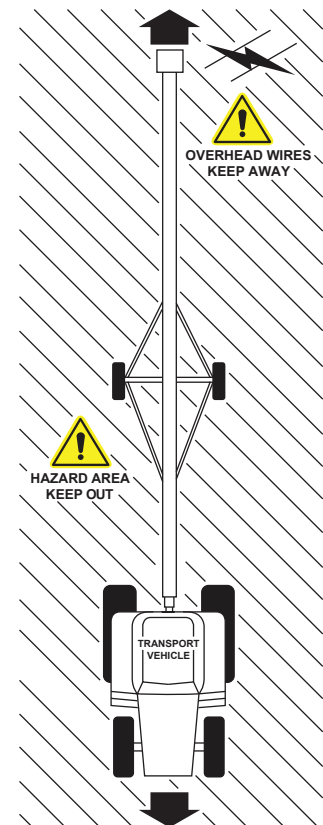
# 4. Transport

When transporting, follow all safety precautions and use a proper tow vehicle to help ensure safe transport of the auger.

## 4.1. Transport Safety

### WARNING

- Check with local authorities regarding transport on public roads. Obey all applicable laws and regulations.
- Always travel at a safe speed, never exceeding 20 mph (32 km/h). Reduce speed on rough surfaces. Use caution when turning corners or meeting traffic.
- Yield to other drivers and allow faster traffic to pass.
- Make sure the SMV (slow moving vehicle) emblem, maximum transport speed sign, and all the lights and reflectors that are required by local authorities are in place, are clean, and can be seen by all over-taking and oncoming traffic. Always use hazard-warning flashers on tractor/towing vehicle when transporting unless prohibited by law.
- Do not transport during times of limited visibility such as fog, snow, or heavy rain. Take extra precautions at night and at dusk.
- Keep others away from the transport vehicle and auger.
- Do not allow riders on the auger or towing vehicle during transport.
- Stay away from overhead obstructions and power lines when operating and transporting. Electrocuting can occur without direct contact.
- Fully lower the auger before transporting, and only raise when next to storage facility.
- Attach to a proper towing vehicle with a hitch pin and retainer. Always attach safety chains.
- Do not raise the intake end above drawbar, upending may occur.
- Empty auger of all grain or seed before transporting. Transporting a full auger will place excessive loads on the tube, frame, axle, hitch, and tow vehicle.
- Do not transport on slopes greater than 20°.
- Do not transport with an under-inflated tire(s).
- If the auger wheels are partially or fully buried in snow or grain, failure to clear area around the wheels before transporting may cause damage to the auger or result in serious injury.



## 4.2. Transport Preparation

- Do not tow faster than 20 mph (32 km/h). [Table 2](#) references the acceptable transport speed as per the ratio of tractor weight versus auger weight. See Specifications ([Section 9. – Specifications on page 60](#)) for auger weights.

**⚠ WARNING** A weight imbalance between the auger and the towing vehicle could result in a collision from reduced stability, handling, and braking ability.

- Ensure the auger will clear any overhead obstructions or electrical wires prior to transporting. Refer to [Section 9. – Specifications on page 60](#) for the transport height of your auger.
- Longer augers have a large turning radius. Allow ample room for turning as the discharge end may swing dramatically. Allow all oncoming traffic to pass before turning right or left.

**⚠ WARNING** A collision with an oncoming vehicle could occur if the auger discharge swings into the opposing lane.

**Table 2. Speed versus Weight Ratio**

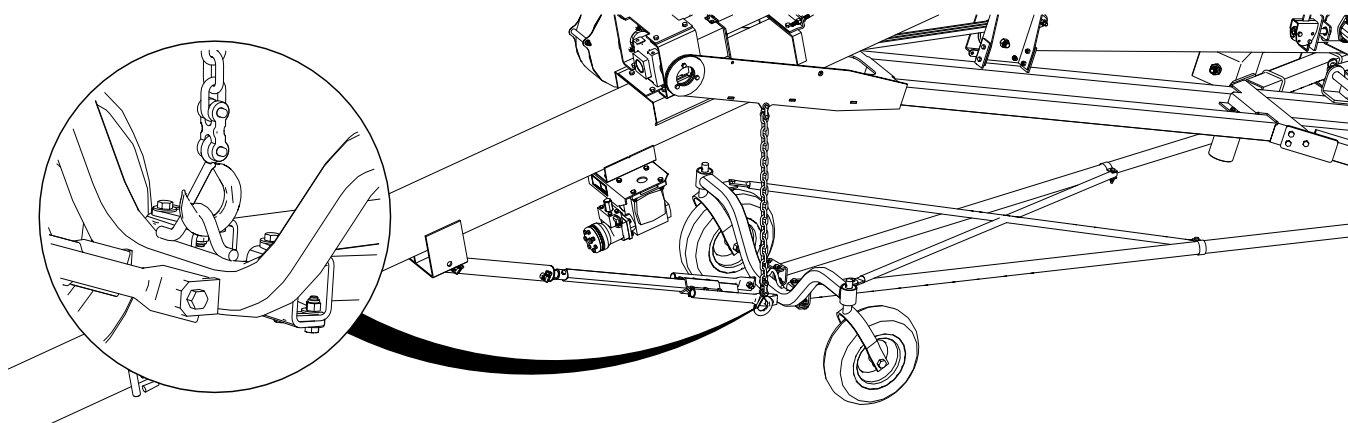
Road Speed	Weight of auger relative to weight of tow vehicle
Up to 20 mph (32 km/h)	1 to 1, or less than the weight of the tow vehicle
Up to 10 mph (16 km/h)	2 to 1, or less than the weight of the tow vehicle
Do not tow if	More than 2 to 1

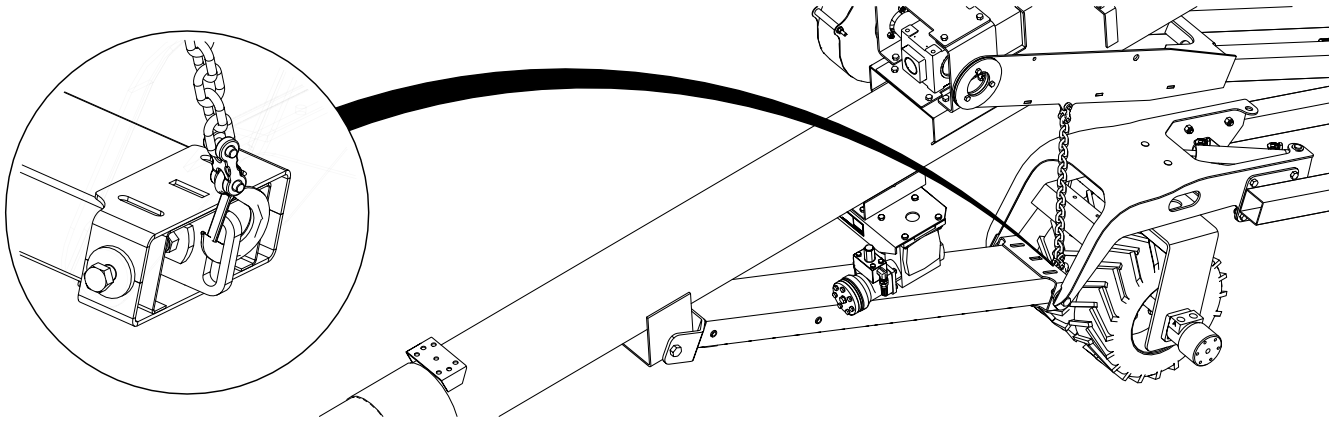
## 4.3. Prepare the Mover Kit for Transport

➡ When equipped:

- Attach the hitch to the auger intake (if removed).
- Fully raise the mover frame by retracting the hydraulic cylinder and secure using the transport chain.

**Figure 7. SP Mover Kit Transport Chain**



**Figure 8. HD Mover Kit Transport Chain**

- Before transporting, disengage the over-center handle at each wheel by pulling up the handle. Secure the handle with the attached pin, see [Figure 9](#).

**NOTICE**

Do not transport with the over-center handles engaged or damage to the mover kit motors will occur.

**Figure 9. Pin Position**

## 4.4. Connect the Auger to the Towing Vehicle

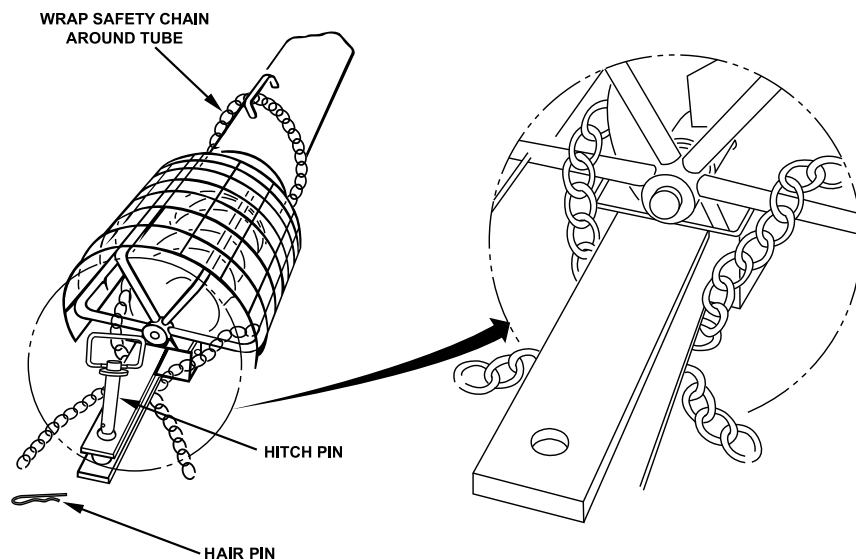
Follow all safety precautions when transporting the auger and use a proper towing vehicle.

- Place the auger in the full down position. The frame should be in the full down position with slight tension on the lift cable. Refer to Lowering procedure.
- Place and secure hitch pin using a clevis to tongue connection only.

**Important**

Use a type of hitch pin that will not allow auger to separate from towing vehicle.

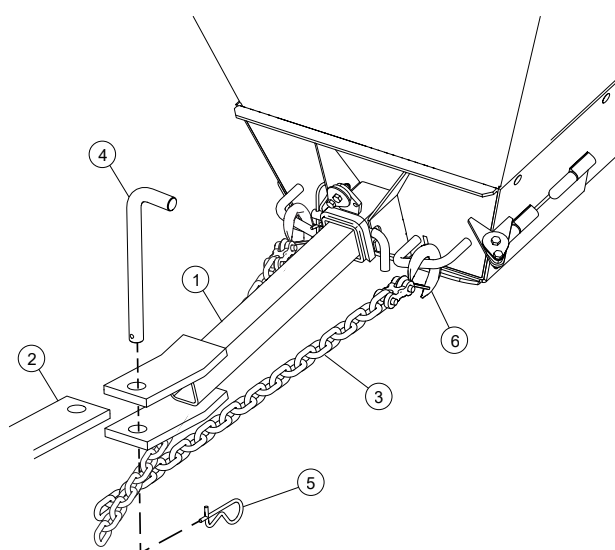
- Thread the safety chain and form a cradle to prevent the auger from digging into the road surface or upsetting (should a breakaway occur), see [Figure 10](#). Replace the safety chain if one or more links or end fittings are stretched, broken, damaged, or deformed. The safety chain should have a load rating at least as high as the auger weight, refer to [Section 9. – Specifications on page 60](#).
- Use caution when transporting the auger over rolling terrain. In severe dips, the intake end may contact the ground.

**Figure 10. Typical Safety Chain and Hitch Connection**

#### 4.4.1 Enclosed Hopper

➡ When equipped:

Attach both hooks to the loops on the hopper and cross the chain underneath the tow bar to prevent the auger from digging into the road surface or upsetting (should a breakaway occur). Replace the safety chain if one or more links or end fittings are stretched, broken, damaged, or deformed. The safety chain should have a rating at least as high as the auger weight, refer to [Section 9. – Specifications on page 60](#).

**Figure 11. Enclosed Hopper**

1	tow bar
2	tractor drawbar
3	safety chain
4	hitch pin
5	grip clip
6	safety chain hook

# 5. Placement

## 5.1. Placement Safety

---

**⚠ WARNING**

- The auger is not insulated, keep away from overhead power lines. Electrocutation can occur without direct contact.
- Anchor intake end before using.
- Place the auger on reasonably level ground before operating. The auger could topple if ground is too uneven.
- Chock the auger wheels after placement.
- Empty the auger before raising, lowering, or positioning.
- Check that wheels are free to move before raising or lowering the auger.
- Never attempt to increase height of the auger by positioning wheels on lumber, blocks, or by any other means.
- Do not permit anyone to stand beneath the auger when raising or lowering.
- Move the auger into position slowly. Do not unhitch and attempt to move by hand.
- Do not leave auger in raised position when not in use.

## 5.2. Positioning the Auger

---

To position the auger using a tractor:

### Filling Bins

1. Back the auger up to the bin while it is in its lowered configuration.
2. Set the park brake on the tractor before dismounting.
3. Raise the auger so it clears the bin.
4. Slowly back the auger up until the outlet is over the opening in the bin.
5. Unhook the auger from the tractor and lower the intake end to the ground.

**⚠ WARNING**

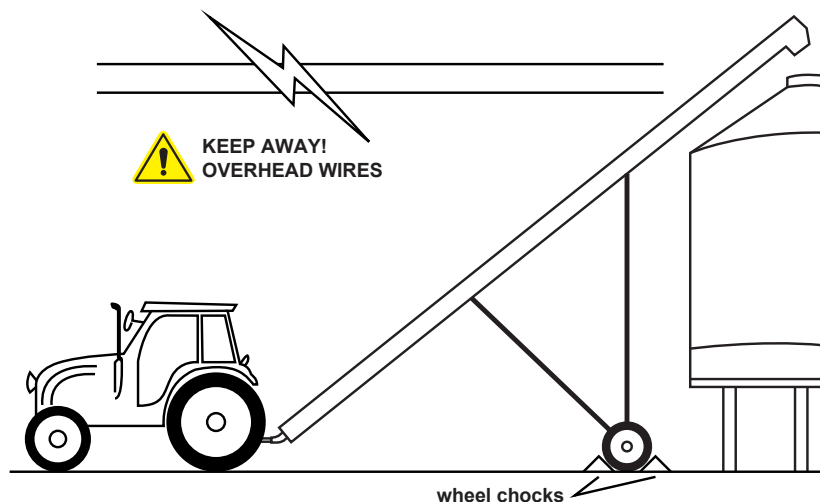
Upending hazard, do not hook or unhook hitch unless the auger has a downward weight.

6. Slowly lower the auger spout to the bin.

**NOTICE**

Do not rest the spout on the bin. This may cause damage to the auger or bin.

7. Place chocks in the front and back of each wheel and anchor the intake end.

**Figure 12. Typical Grain Auger Placement for Filling Bins****Under Hopper Bottom Bins**

1. Position the intake hopper between the hopper bin vertical legs.
2. Move auger into place. Do not allow auger or components to contact grain bin.
3. Raise the auger to desired height.
4. Place chocks in the front and back of each wheel and anchor the intake end.

## 5.3. Positioning the Auger with a Mover Kit

---

➡ When equipped:

**Before Operating the Mover Kit:**

- Ensure the area around the auger is reasonably level and there is adequate clearance for making wide turns.
- Check the hydraulic oil to ensure that the levels are correct.

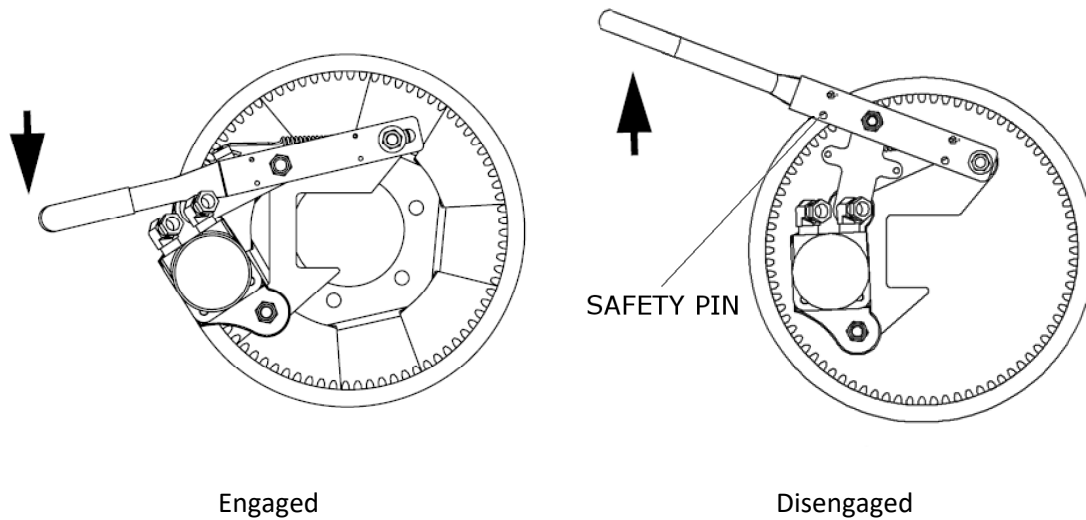
**NOTICE**

Running the machine on low oil will overheat the system causing components to break down.

- Store the offset hitch on the frame.

**To Operate the Mover Kit:**

1. Engage the over-center handle at each wheel ([Figure 13](#)) and check that the gears are fully meshed. If necessary, refer to [Section 7.19 – Adjusting the Mover Kit Pinion Gear on page 54](#).

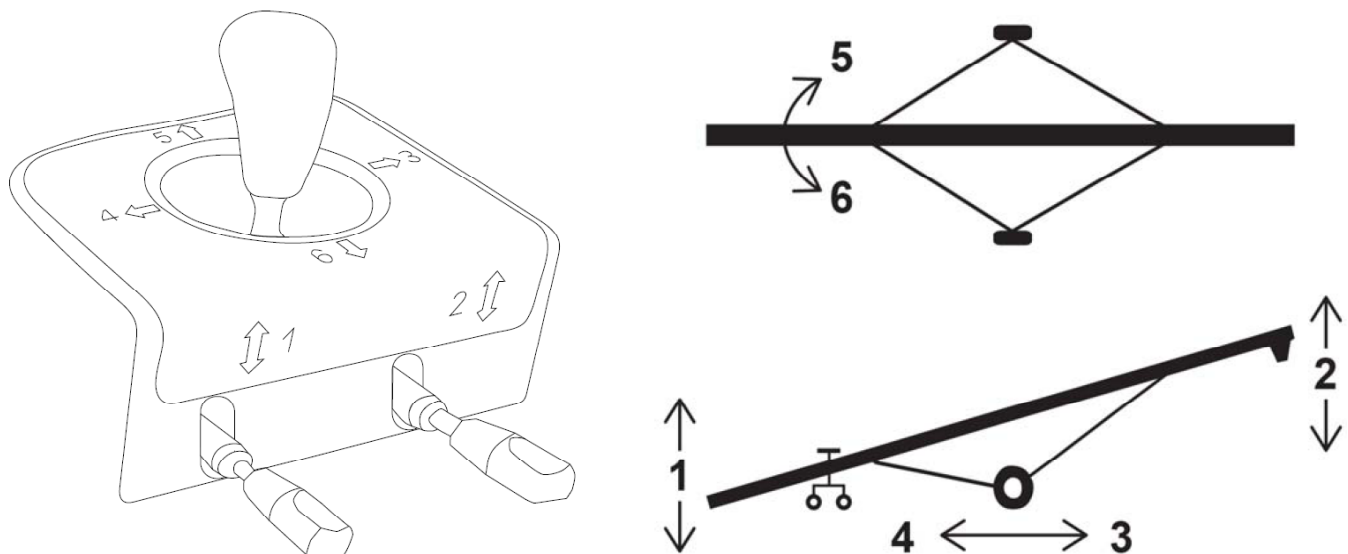
**Figure 13. Wheel Over-Center Handle Positions**

2. Set and run the gas engine at approximately half throttle.
3. Refer to the controls shown in [Figure 14–Figure 15](#).

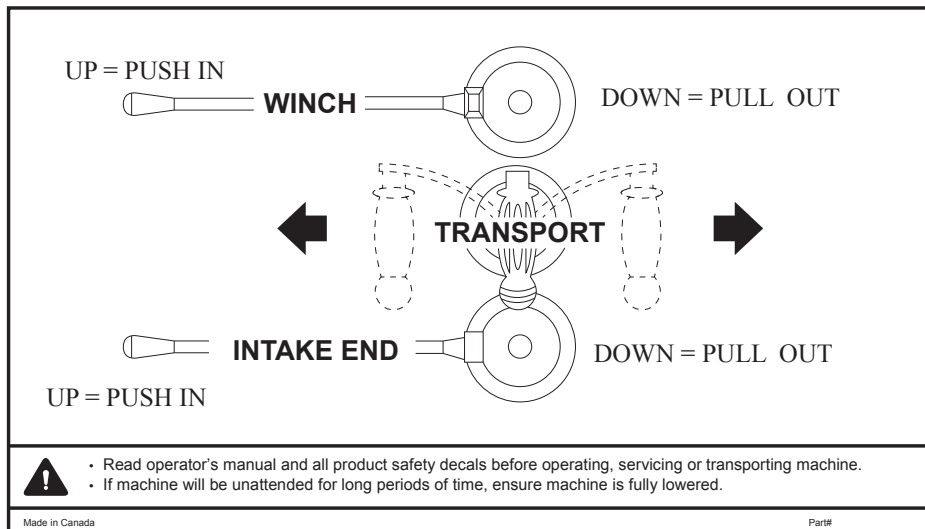
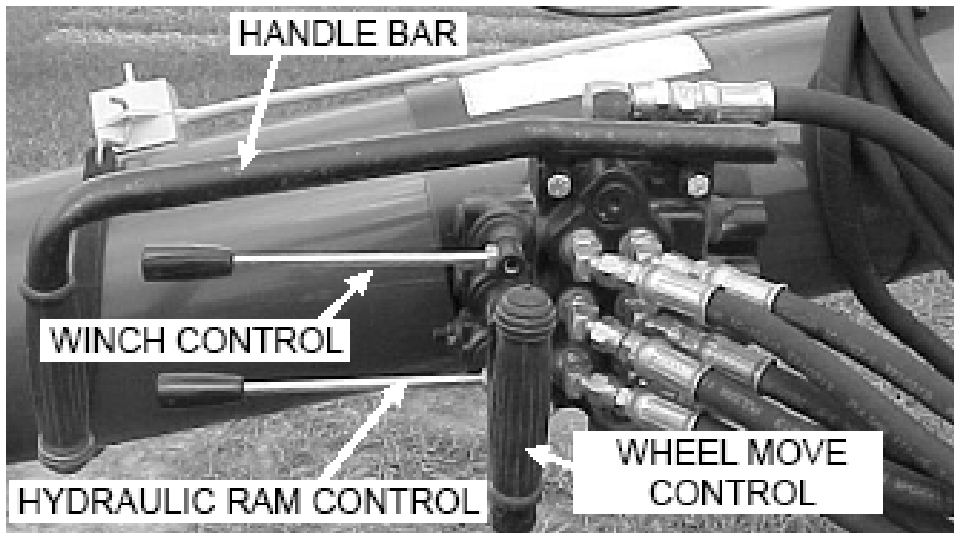
**Note**

There are two different mover kit options available for the STX2 & XTA 8/10 Series auger as shown in the figures.

4. Before moving the auger into position:
  - a. Fully lower the auger.
  - b. Raise the intake end slightly off the ground to position the auger.
  - c. Raise the auger discharge end only for final positioning such as when next to a storage bin or grain truck.

**Figure 14. Mover Kit Controls — Heavy Duty Hydraulic Control**



**Figure 15. Mover Kit Controls — Standard Mover Kit Control****If Operating the Mover Kit in Temperatures Below -10°C (14°F):**

- Disengage the pump when starting the motor cold. This will put less pressure on the starter and allow the motor to turn over easier, helping it to start.
- Allow the hydraulic oil to warm before using the self-propelled kit.

**NOTICE**


Failure to warm the hydraulic oil can damage the pump or other components.

**When Operation of the Mover Kit is Complete:**

Place the mover kit into transport position. See [Section 4.3 – Prepare the Mover Kit for Transport on page 27](#).

## 5.4. Hand Winch Operation

---

 When equipped:

**Before using the hand winch, ensure that:**


- the cable anchor on the winch drum is tight.
- all cable clamps are secure.
- the lift cable is seated in cable pulley.
- the cable is in good condition, if damaged, replace it immediately.
- there is a minimum of 3 cable wraps on the winch drum when the auger fully lowered.

**To operate:**

1. Turn the winch handle to raise and lower the auger. The winch must make a clicking sound when raising the auger. If clicking sound stops, retain grip on handle, lower the auger fully and repair winch.
2. When lowering, if the cable becomes slack before auger is in full down position, this indicates that the track shoe is stuck. To correct the problem, reverse the winch and raise the auger until the cable is taut and the track slides normally. Do not lubricate the winch brake discs.
3. After lowering the auger, always tighten the brake lock by turning the winch handle clockwise at least two clicks.
4. After lowering, rotate the winch handle until cable has light tension.

## 5.5. Hydraulic Winch Operation

---

 When equipped:

### Before using the hydraulic winch, ensure that:

- the cable anchor on the winch drum is tight.
- all cable clamps are secure.
- the lift cable is seated properly.
- the cable is in good condition, if damaged, replace it immediately.
- there is a minimum of 3 cable wraps on the winch drum when the auger is fully lowered.
- the hydraulic hoses are free from leaks, binding, flattening, kinks, or wear.

### To operate:

1. Start the power source and idle at low rpm. Engage hydraulic lever to power winch. Test the direction of rotation of winch to ensure drum is moving in the direction required. Increase tractor rpm until desired rate of lift or descent is reached.



**CAUTION** Do not touch, grab, or guide cable while equipment is being raised or lowered.

#### **NOTICE**

Do not continue to supply power to winch when the auger has reached full up position as this can cause damage.

2. When lowering, if the cable becomes slack before the auger is in the full down position, this indicates that the track shoe is stuck. To correct the problem, reverse the winch and raise the auger until the cable is taut and track slides normally.
3. After lowering, adjust the hydraulic winch until cable has light tension.

# 6. Operation

For optimal operation, follow the safety precautions, checklists, and instructions in this section.

## 6.1. Operation Safety

---

### **WARNING**

- Keep away from rotating and moving parts, including the flighting, drive components, shafts, and bearings.
- Always operate with guards, covers, and shields in place.
- Have another trained person nearby who can shut down the equipment in case of accident.
- Keep the work area clear of bystanders.
- Keep the work area clean and free of debris.
- Ensure maintenance has been performed and is up to date.

## 6.2. Start-up and Break-in

---

Check the following during the first hours of operation.

1. Check that the auger intake and discharge areas are free of obstructions.

### **NOTICE**

Foreign objects can damage the auger. Remove any obstructions from the intake and discharge areas before operating the auger.

2. Check the drive belt tension and alignment. See Maintenance Section for instructions.
3. Visually inspect the auger, see Visual Inspection in Maintenance Section.
4. Check tightness of all bolts/nuts, fasteners, and hardware (re-torque if necessary).
5. Ensure adequate power is supplied to operate the auger, see [Section 9. – Specifications on page 60](#).
6. Start the auger and operate normally.
7. Be aware of unusual sounds. If any are heard, determine the source and stop the auger. Lock out the power and correct the problem before resuming work. If you are unsure of the problem or procedure, contact your local dealer.

### **Note**

The auger may run rough until the trough is polished.

8. Do not run the auger for long periods of time without material because it increases wear. Try to run only when moving material.
9. Stop the auger when it is empty of grain, lower fully and lockout power.

### **Important**

After the initial start-up and inspection, the auger should be shut down and visually inspected (see Maintenance Section) after approximately ten hours of operation.

### 6.3. Engage/Disengage Manual Belt

- To engage belt, secure locking pin on handle to the tensioner push rod.
- To disengage belt, disconnect locking pin on handle from the tensioner push rod and turn clockwise.

Figure 16. Engaged Handle Position

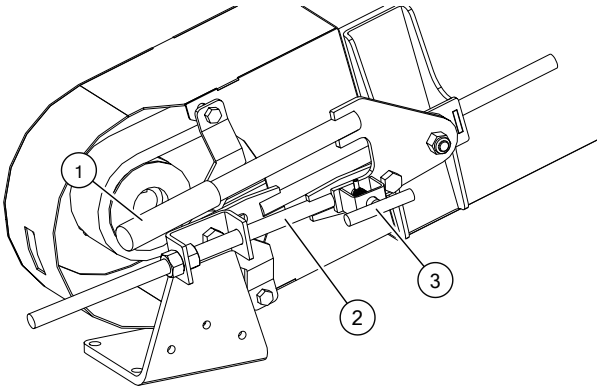
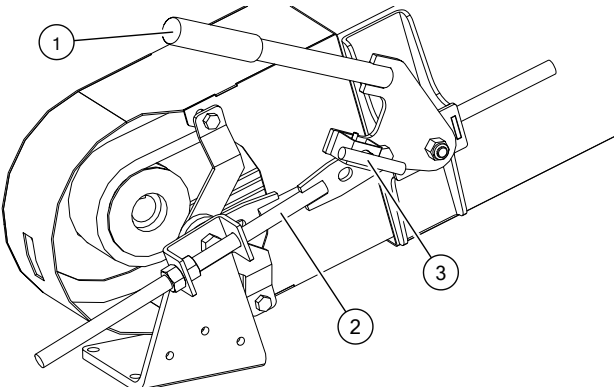


Figure 17. Disengaged Handle Position



1	handle	3	locking pin
2	tensioner push rod		

### 6.4. Operation — Electric Motor Models

➡ When equipped:

1. Turn the electric motor on.
2. Run until the auger is empty.
3. Turn off motor and lock out power source.
4. Unplug the power cord, wrap around the equipment and secure to prevent dragging, especially when transporting or placing the auger.

### 6.5. Operation — Gas Engine Models

➡ When equipped:

1. If the drive belts are tight, disengage the belts.
2. Start the gas engine. Follow instructions provided with the gas engine for specific starting instructions.
3. Engage the belt drive lever (when equipped).

**Note**

The drive belt should be just tight enough to not slip on the drive pulley. If the belt is too loose, it will slip, lowering power transfer from the engine and possibly causing a squealing sound. If the belt is too tight, it will cause excess wear.

4. Adjust gas engine to provide maximum engine RPM.

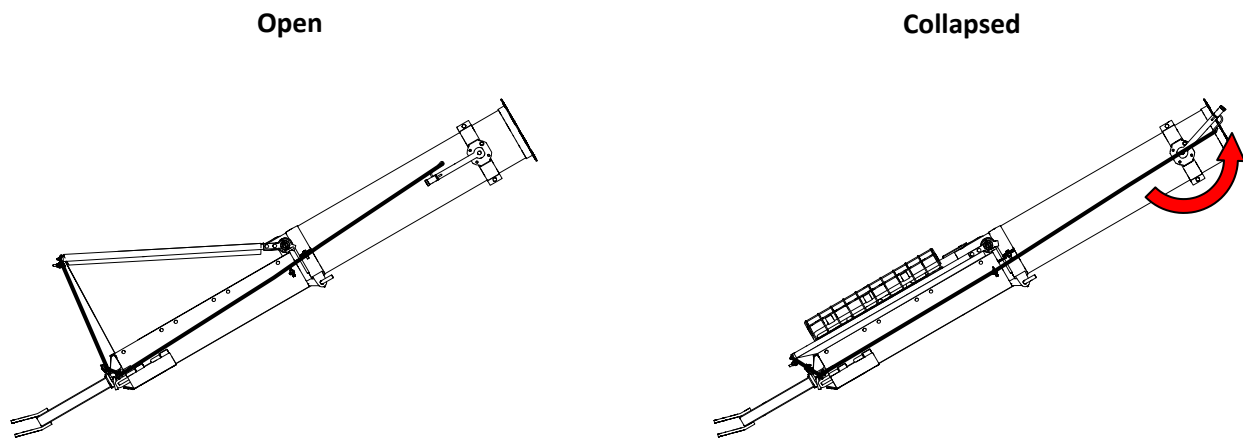
5. Run until all grain has been emptied from the equipment.
6. Reduce engine speed to low idle.
7. Shut off engine and lock out power source.
8. Shut off fuel supply.
9. Keep the belts engaged when transporting the auger.

## 6.6. Engaging/Disengaging Enclosed Hopper

---

➡ When equipped:

**Figure 18. Engaging and Disengaging the Hopper**



## 6.7. Emergency Shutdown

---

In an emergency situation:

1. Shut down the power source immediately and lock out all power.
2. Stop the flow of material (if applicable).
3. Ensure the machine components come to a stop before inspecting.
4. Correct the emergency situation before resuming work.

## 6.8. Restarting with a Full Tube

---


When the auger is shut down inadvertently or due to an emergency, the tube may still be filled with grain.

1. With the power source locked out, remove as much of the grain as possible from the tube and intake using a shop vacuum or other tool. Do not use your hands.

**NOTICE**

Starting under load may result in damage to the auger.

2. Close or replace guards or covers before restarting.

- 
3. If the auger tube is full of grain, it may be necessary to tighten the drive belts slightly to handle the heavier than normal loads.
  4. **Gas Drive Models:** If the auger tube is full of grain, do not restart at full speed. Engage the drive at low power, gradually increasing until normal operating speed is reached.
  5. Once the auger has been started, resume normal operation.

## 6.9. Bin Level Indicators

---

A full bin will cause the auger to plug, which can damage the flighting and other drive components. Installing grain-level indicators on bins will allow monitoring of bin filling and help prevent damage to the auger.

## 6.10. Using the Auger with Grain Spreaders

---

Some grain spreaders may not be able to handle the capacity of the auger and can cause the auger to plug, damaging the flighting and other drive components. This type of damage is not covered by warranty. To avoid this:

- Make sure spreader is turned on and operating.
- When using a flex down spout, center auger spout above spreader and do not lower auger spout into spreader.
- Suspend the spreader lower from bin ceiling leaving extra room for excess grain to flow over the spreader.
- Get a larger spreader, if available.
- Remove the spreader.

## 6.11. Shutdown

---

When operation has been completed:

1. Once the auger is clear of grain, lower it fully and lock out the power source.
2. Clean out any remaining grain from the auger with a vacuum or sweep out.
3. Clean the entire work area.
4. Remove anchors, supports, and chocks.

## 6.12. Handling Fertilizer

---

If the auger has been used to move fertilizer, it should be cleaned out to prevent corrosion. The easiest way to prevent corrosion is to run a load of grain through it after moving fertilizer or wash the auger.

## 6.13. Storing the Auger

---

After the season's use, thoroughly inspect the auger and prepare it for storage. Repair or replace any worn or damaged components and perform maintenance to prevent downtime at the start of the next season.

To ensure a long, trouble-free life, follow the below procedure.

1. Remove all residual material from the hopper and the tube.
2. Wash the auger thoroughly using a water hose or pressure washer to remove all dirt, mud, debris, or residue. Be careful to not contact electronic controls with high pressure water.
3. Inspect all moving or rotating parts to see if anything has become entangled in them. Remove any entangled material.
4. Touch up all paint nicks and scratches to prevent rusting.
5. Check tire pressure and inflate. For inflation pressure, refer to [Section 9. – Specifications on page 60](#).
6. Inspect the auger for cracks, tightness of fittings and fasteners, hydraulic hose cracks (if applicable). Have required repairs performed to replace worn or damaged components.
7. Store in an area that is dry, level, free of debris, and away from human activity. Store inside if possible.
8. Cover the motor with waterproof tarp if stored outside to protect from weather.
9. Chock wheels.
10. Support intake on blocks to eliminate prolonged contact with the ground.
11. Lower the auger fully for storage.



# 7. Maintenance

Proper maintenance will improve safety, efficiency, and will keep the auger operating reliably.

## 7.1. Maintenance Safety

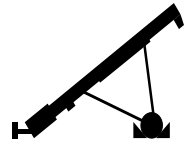
---

### **WARNING**

- Keep components in good condition. Follow the maintenance procedures.
- Ensure the service area is clean, dry, and has sufficient lighting.
- Do not modify any components without written authorization from the manufacturer. Modification can be dangerous and result in serious injuries.
- Shut down and lock out power before maintaining equipment.
- After maintenance is complete, replace all guards, service doors, and/or covers.
- Use only genuine AGI replacement parts or equivalent. Use of unauthorized parts will void warranty. If in doubt, contact AGI or your local dealer.

#### **Before attempting maintenance of any kind:**

- Lower the auger fully.
- Chock wheels.
- Support the tube if performing maintenance on the undercarriage assembly.
- **If equipped with hydraulics:** Before applying pressure to a hydraulic system, make sure all components are tight and that hoses and couplings are in good condition.




## 7.2. Maintenance Schedule

Follow the maintenance procedures below. Keep records of the hours the auger has been operated and the maintenance performed.

<b>Daily:</b>
<a href="#">Section 7.3 – Visually Inspect the Auger on page 43</a>
<a href="#">Section 7.4 – Lubricate the Equipment on page 43</a>
<b>Monthly:</b>
When equipped: <a href="#">Section 7.5 – Inspect Hydraulic Hoses and Fittings on page 44</a>
<a href="#">Section 7.9 – Grease the Intake Bushing and Upper Drive Chain on page 45</a>
<b>Annually:</b>
<a href="#">Section 7.6 – Check the Gearbox Oil on page 44</a>
<a href="#">Section 7.8 – Adjust the Upper Drive Chain on page 45</a>
<a href="#">Section 7.10 – Clean and Wash the Equipment on page 46</a>
<b>As Required:</b>
<a href="#">Section 7.7 – Change the Gearbox Oil on page 44</a>
<a href="#">Section 7.11 – Align the Drive Belts on page 46</a>
<a href="#">Section 7.12 – Tension the Drive Belts on page 48</a>
<a href="#">Section 7.13 – Replace the Drive Belts on page 49</a>
<a href="#">Section 7.14 – Repack the Wheel Bearings with Grease on page 50</a>
When equipped: <a href="#">Section 7.15 – Check/Adjust the Truss Cables on page 50</a>
When equipped: <a href="#">Section 7.16 – Inspect and Service the Hand Winch and Lift Cable on page 52</a>
When equipped: <a href="#">Section 7.17 – Inspect and Service the Hydraulic Winch and Lift Cable on page 52</a>
When equipped: <a href="#">Section 7.18 – Adjusting the Mover Kit Ram and Travel Speed on page 53</a>
When equipped: <a href="#">Section 7.19 – Adjusting the Mover Kit Pinion Gear on page 54</a>
<a href="#">Section 7.20 – Change the Hydraulic Oil on page 54</a>

## 7.3. Visually Inspect the Auger

---

 **WARNING** Lock out power before inspecting.

Check the following during a visual inspection:

1. Ensure all guards are in place and in good working order.
2. Examine the auger for damage or unusual wear.
3. Check tightness of bolts/nuts, fasteners, and hardware (re-torque if necessary).
4. Be sure all safety decals are in place and are legible.
5. Check that the discharge and intake area are free of obstructions.
6. Inspect all moving or rotating parts to see if anything has become entangled in them. Remove any entangled material.
- ➡ 7. **When equipped:** Inspect hydraulic hoses and fittings for leaks and wear. Fix or replace where necessary.
8. Check wheel bolts are tight and examine tires for gashes, uneven wear, or loss of air pressure. See [Section 9. – Specifications on page 60](#) for recommended tire pressure and torque information.
9. Check all operating, lifting, and transport components. Replace damaged or worn parts before using the auger.
10. Inspect the auger shaft bushing for unusual wear or discoloration.
- ➡ 11. **If equipped with truss cables:** Inspect the truss cables for proper tension and possible damage such as fraying, kinking, or unwinding.
12. Inspect the winch cable for fraying, kinking, unwinding, or other possible damage.

## 7.4. Lubricate the Equipment

---

Your equipment can operate at top efficiency only if clean fluids and lubricants are used. Use clean containers to handle all fluids and lubricants. Store them in an area protected from dust, moisture, and other contaminants.


1. Wipe the grease fittings with a clean cloth before greasing to avoid injecting dirt and grit.
2. Use a hand-held grease gun for all greasing.
3. If fittings will not take grease, remove and clean thoroughly.
4. Replace fittings if they are broken or will not accept grease.
5. If intake bushing is present in your auger, lubricate it.

Use SAE multi-purpose high-temperature grease with extreme pressure (EP) performance. SAE multi-purpose lithium-based grease is also acceptable.

## 7.5. Inspect Hydraulic Hoses and Fittings

---

➡ When equipped:

1. Pressurize the system.
2. Using a piece of cardboard or wood, run it along the length of the hose and around all fittings.  
 **WARNING** Escaping hydraulic fluid under pressure will cause serious injury if it penetrates the skin surface.
3. Replace the hose or tighten/replace the fitting if a leak is found. For replacement hoses, refer to [Section 9. – Specifications on page 60](#).
4. Replace any hose that is badly cut, nicked, abraded, or is separating from the crimped end of the fitting.
5. Secure hoses to the machine.

## 7.6. Check the Gearbox Oil

---

1. Remove fill/vent plug to check gearbox oil level. Insert an improvised dipstick (rolled paper or plastic tie) into the oil filler hole to determine the oil level.
2. Note the level and the condition of the oil. Maintain oil level at half full (center of cross shaft) with 90W or equivalent gear oil, adding as necessary or drain and refill if condition is poor.
3. Ensure gearbox is level when checking or refilling.
4. Do not overfill when adding oil.
5. Replace fill/vent plug.

## 7.7. Change the Gearbox Oil

---

Use SAE approved 90W or equivalent gear oil.

1. Remove gearbox from the auger.
2. Place a pan under the drain plug.
3. Use a wrench and remove the drain plug.
4. Loosen the filler plug so air can enter the gearbox and the oil will drain freely.
5. Allow the oil to drain completely.
6. Replace the drain plug.
7. Add oil until the gearbox is half full (center of cross shaft) and replace filler plug. A flexible funnel may be required. Gearbox should be level when checking or refilling. **Do not overfill.**
8. Reinstall the gearbox and guards.

## 7.8. Adjust the Upper Drive Chain

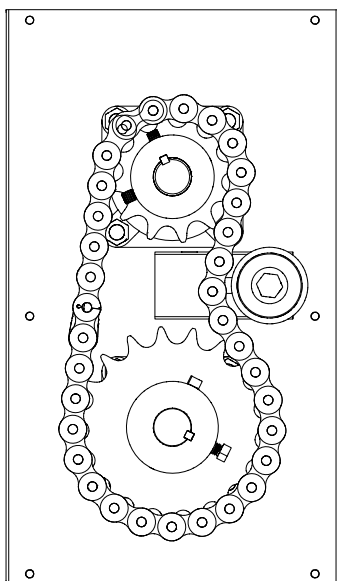
---

### Note

Improper adjustment of the drive chain will result in premature wear.

1. Loosen the bolts and remove the cover plate.
2. Check upper drive chain for tightness. Chain should have maximum deflection of 1/8" from factory.
3. If chain idler needs to be adjusted, loosen the idle sprocket bolt.
4. Adjust the idle sprocket position to take up chain slack.
5. Tighten the idle sprocket bolt.
6. Grease the chain with SAE multi-purpose high-temperature grease with extreme pressure (EP) performance. SAE multi-purpose lithium-based grease is also acceptable.
7. Reattach the cover plate and tighten the bolts.

**Figure 19. Upper Drive Chain**



## 7.9. Grease the Intake Bushing and Upper Drive Chain

---

Use SAE multi-purpose high-temperature grease with extreme pressure (EP) performance. SAE multi-purpose lithium-based grease is also acceptable.

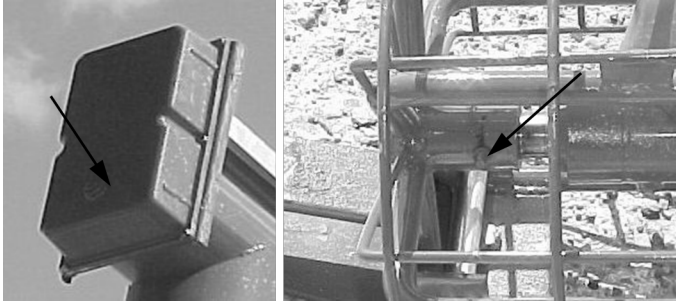
For continuous use in extreme cold, semi-fluid arctic grease or heavy oil may be used.

Use only a hand-held grease gun.

Wipe grease fitting with a clean cloth before greasing to avoid injecting dirt and grit.

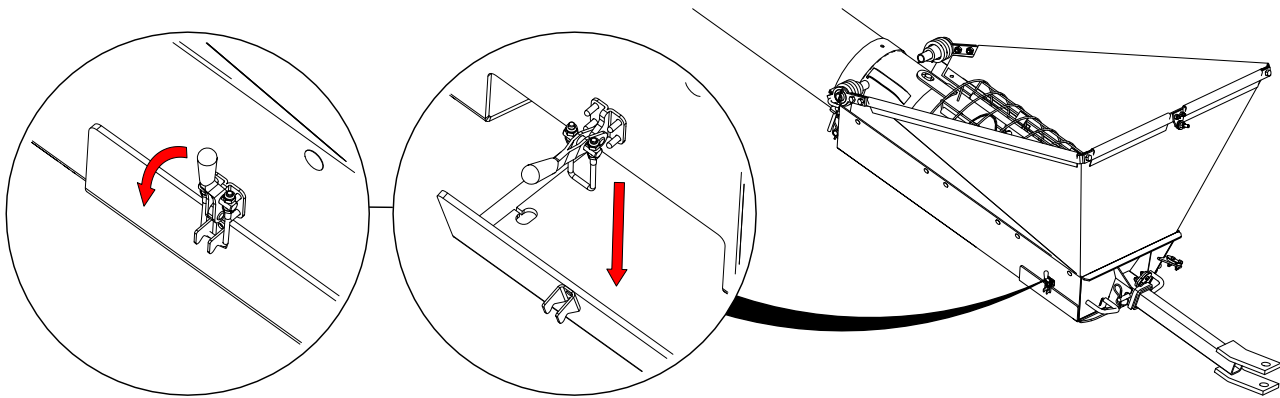
If a fitting will not take grease, remove and clean thoroughly. Also clean lubricant passageway. Replace fitting if necessary.

1. Fill enclosed upper drive housing to plug level with grease. See [Section 9. – Specifications on page 60](#)
2. Lubricate the intake bushing zerk.

**Figure 20. Upper Chain Drive Zerk & Intake Zerk**

## 7.10. Clean and Wash the Equipment

➡ When Equipped: Open the cleanout door of the enclosed hopper.

**Figure 21. Enclosed Hopper Cleanout Door**

1. Clean out excess grain from all areas of the auger.
2. Make sure water can drain from the auger tube and intake, then wash the tube with a water hose or pressure washer until all dirt, mud, debris, or residue is gone.

### **Important**

Do not contact electronic controls with high pressure washer.

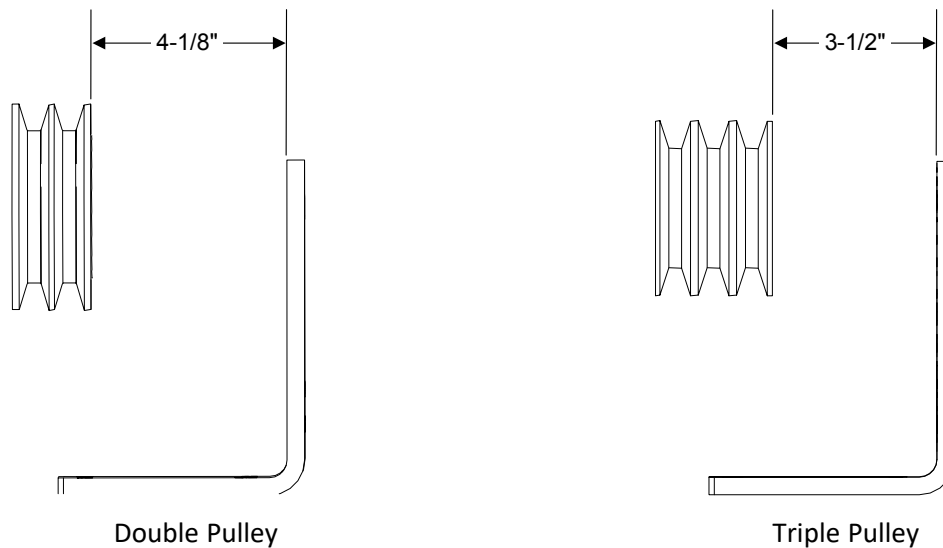
3. Provide sufficient time for the water to drain from the auger.

## 7.11. Align the Drive Belts

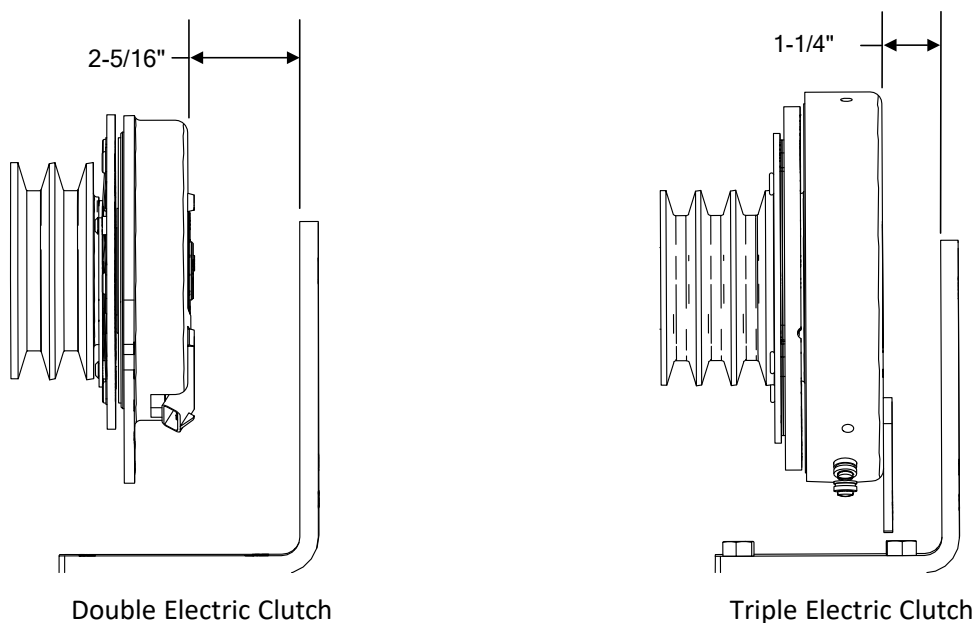
1. Remove the guard cover.
2. Check the motor pulley alignment. The distance between the face of the electric clutch and the inside face of the guard attach plate should be:
  - Double Pulley: 4-1/8"
  - Triple Pulley: 3-1/2"
  - Double Clutch: 2-5/16"

- Triple Clutch: 1-1/4"

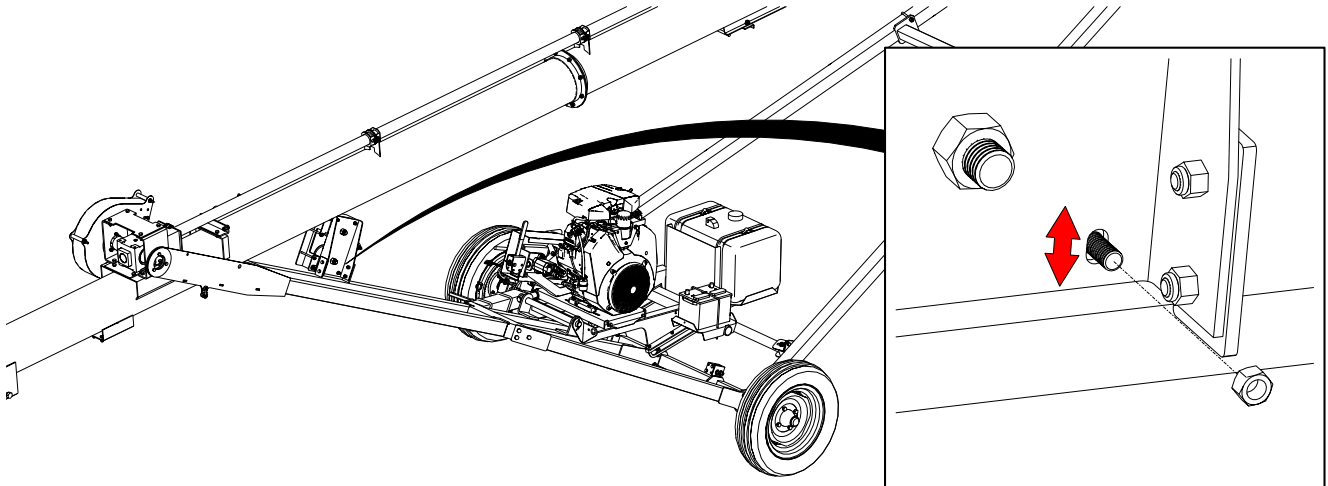
**Figure 22. Distance Between Pulley and Guard Attach Plate**



**Figure 23. Distance Between Electric Clutch and Guard Attach Plate**



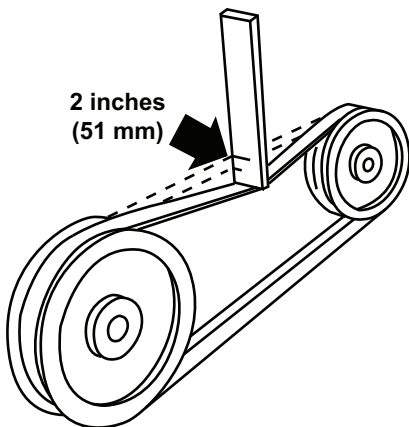
3. Move the pulleys to the required positions for alignment.
4. Tighten the hub set screws to secure pulleys.
5. Check the idler pulley alignment.
  - If belt is tracking to the outside of the idler pulleys, loosen adjustment bolts and raise the main plate. Re-tighten the adjustment bolts.
  - If belt is tracking to the inside of the idler pulleys, loosen adjustment bolts and lower the main plate. Re-tighten the adjustment bolts.

**Figure 24. Adjust Idler Pulley Alignment**

6. Reattach and secure the guard covers.
7. Check the belt tension.

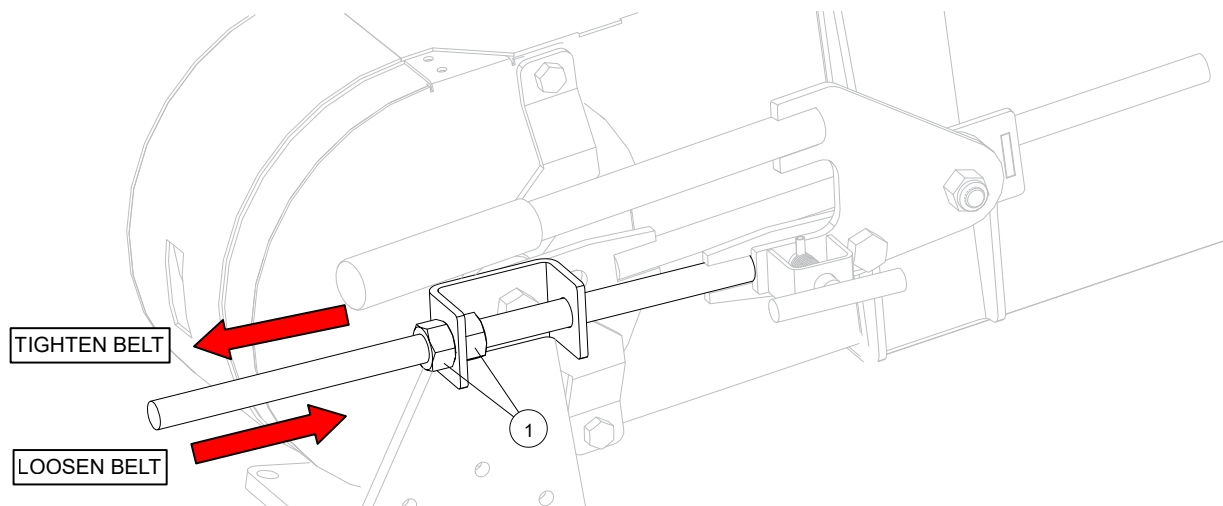
## 7.12. Tension the Drive Belts

1. Open guard cover and push on the center of the belt span with a force of approximately 10 lbs.
2. The belts will deflect approximately 2" (51 mm) when properly tensioned.

**Figure 25. Typical Drive Belt Tensioning**

3. Tighten or loosen the drive belts (or idler pulley when equipped) using the threaded push rod to achieve the proper tension.



**Figure 26. Tighten or Loosen Belt**

1	hex nut, 5/8"
---	---------------

**Important**

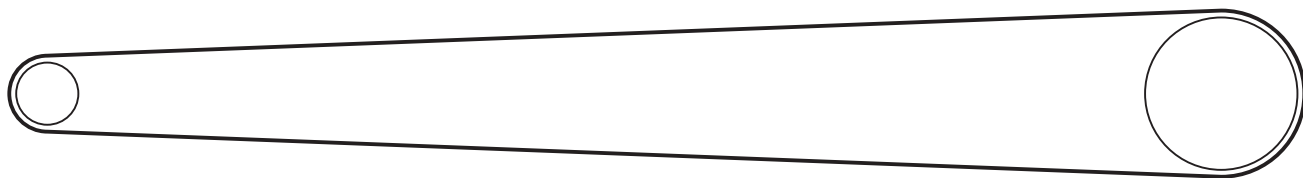
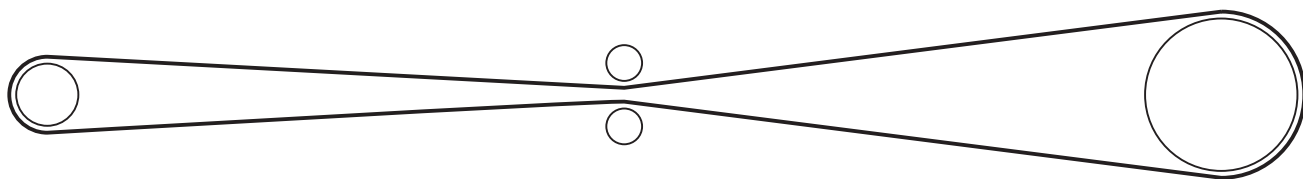
The drive belt should be just tight enough to not slip on the drive pulley when operating. If the belt is too loose, it will slip, possibly causing a squeaking sound and slowing the belt down. If the belt is too tight, it will cause excess wear.

4. Reattach and secure guard cover. Start system to ensure proper operation.

## 7.13. Replace the Drive Belts

---

1. Open the guard cover. Remove enclosed belt guards (if equipped).
2. Fully loosen the drive belts.
3. Remove and replace the old belts.

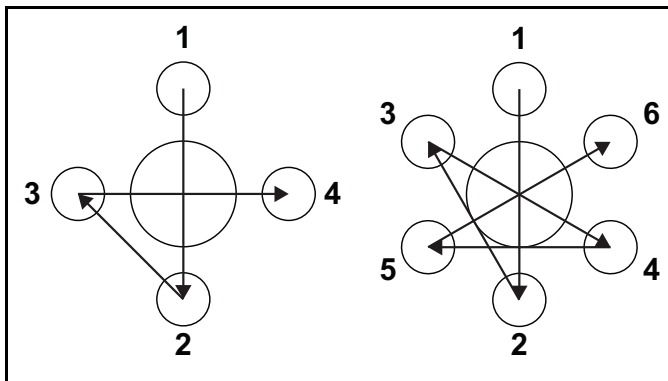
**Figure 27. 31 Model****Figure 28. 36/41/46/51 Models**

4. Align the drive belts as described in Belt Alignment.
5. Tighten the drive belts as described in Belt Tension.
6. Close and secure the guard cover. Reattach enclosed belt guards (if equipped).

## 7.14. Repack the Wheel Bearings with Grease

1. Block wheels and ensure unit is stable.
2. Remove the wheel bolts and the wheels.
3. Clean wheel and hub mounting surfaces to ensure there is no rust or debris.
4. Remove the wheel bearing and pack with grease. Use SAE multi-purpose high-temperature grease with extreme pressure (EP) performance. SAE multi-purpose lithium-based grease is also acceptable.
5. Tighten the wheel bolts (diagonal pattern) with a torque wrench to 100 ft-lb ( $\pm 10$  ft-lb) of torque. Inspect to make sure the wheel is sitting flush with the hub.

**Figure 29. Diagonal Pattern for 4-bolt and 6-bolt Tires**



## 7.15. Check/Adjust the Truss Cables

➡ When equipped:

### Check the Truss Cables:

Check tube for straightness, no slack in the cables, and a just noticeable upward deflection of the discharge end. During operation, it is normal that for the tube to deflect downward.

**If required, adjust cables by following the procedure below:**

1. Lift the discharge end of the auger with a overhead crane, front end loader, or other proper lifting device so that the tube has a slight upward deflection at the discharge to give the cable some slack.



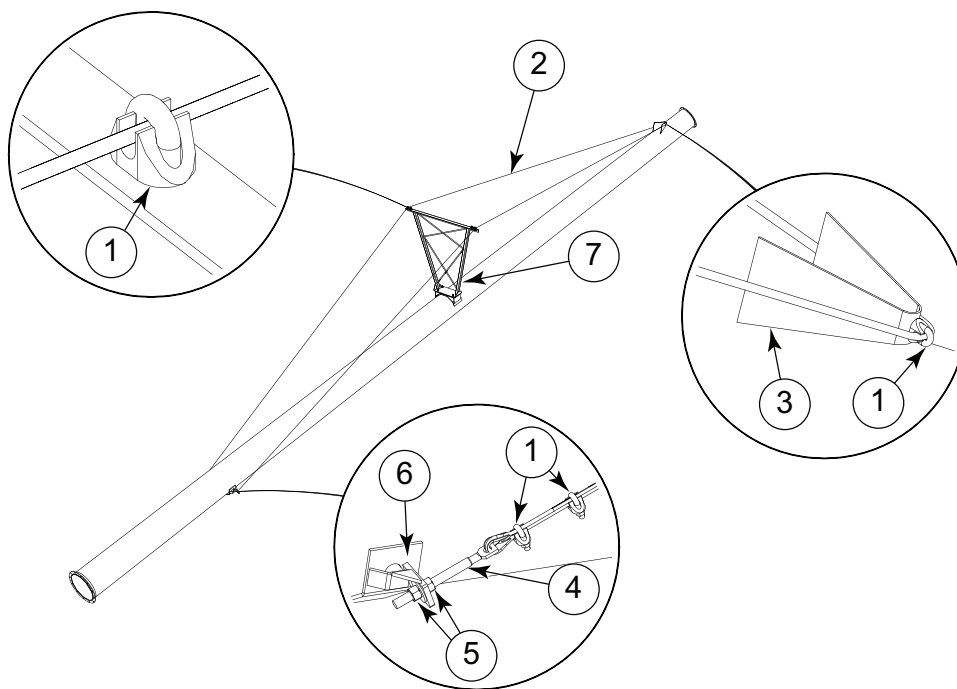
**CAUTION** The lifting device must be capable of supporting approximately half of the weight of the auger as provided in the Specifications section.



2. When the auger has more than one set of cables start from the innermost cables and work your way out.
3. Loosen cable clamps on cable truss where the cable requires adjustment.
4. Locate the eyebolt anchors for the cable. Refer to [Figure 30](#).

5. Tighten cable eyebolts evenly on both sides (use eyebolt nuts to tighten eyebolts) until the discharge end just starts to angle upward.
  - The tube should not deflect to the left or right if tightened evenly.
  - Tension should be greater on shorter cables than on longer cables. If the auger tubes remain straight then the cables are tensioned properly.
6. If the proper cable tension can't be obtained before the eyebolts run out of adjustment, then do the following:
  - a. Loosen the eyebolts.
  - b. At the eyebolts, loosen the cable clamps, shorten the cables until there is tension on the cable, then tighten the cable clamps fully.
  - c. Return to step 5.
7. Secure jam nut on cable eyebolt and re-tighten any cable clamps that were loosened.
8. The cables are properly tightened when:
  - There is no slack in the cables.
  - The discharge end is deflected slightly upwards.
  - The tube is straight side-to-side.


**Figure 30. Typical Cable Truss Assembly**




1	cable clamp	5	eyebolt nuts
2	truss cable	6	eyebolt anchor
3	cable return bracket	7	cable truss
4	cable eyebolt		

## 7.16. Inspect and Service the Hand Winch and Lift Cable

---

 When equipped:

 **WARNING** Place auger in fully lowered position with cable slack.


1. Inspect the cable for damage such as fraying, kinking, or unwinding. Replace if damaged (see below).
2. Check to make sure cable clamps are secure.
3. Oil cable pulleys as needed.
4. Keep a film of grease on the gears. Occasionally oil the bushings, drum shaft, and ratchet.
5. Do not get oil or grease on brake discs.
6. Replace brake discs if less than 1/16" (1.6 mm) thick.
7. Check for proper ratchet pawl operation:
  - When cranking in (clockwise) = loud clicking
  - When cranking out (counterclockwise) = no clicking and ratchet pawl fully engaged into gear teeth.


### To Replace the Lift Cable:

1. Unwind the winch drum until cable is slack and remove all cable clamps.
2. Free the cable from the winch and pulleys.
3. Remove the cable clamps that secure the hook in place.
4. Reverse the above steps to install the new cable.

## 7.17. Inspect and Service the Hydraulic Winch and Lift Cable

---

 When equipped:

 **WARNING** Place the auger in the fully lowered position with the cable slack.

### To Inspect the Lift Cable:

1. Inspect the cable for damage such as fraying, kinking, or unwinding. Replace if damaged (see below).
2. Check to make sure the cable clamps are secure.
3. Oil the cable pulleys as needed.
4. Occasionally oil the bushings and drum shaft.

### To Replace the Lift Cable:

1. Unwind the winch drum until the cable is slack and remove the cable clamps.
2. Free the cable from the winch and pulleys.
3. Reverse the above steps to install the new cable.

## 7.18. Adjusting the Mover Kit Ram and Travel Speed

➡ When equipped:

**WARNING** Place the auger on level surface and fully lower the intake and discharge ends. Ensure the engine is in idle and the auger drive is disengaged before adjusting.

### Hydraulic Pressure Adjustment

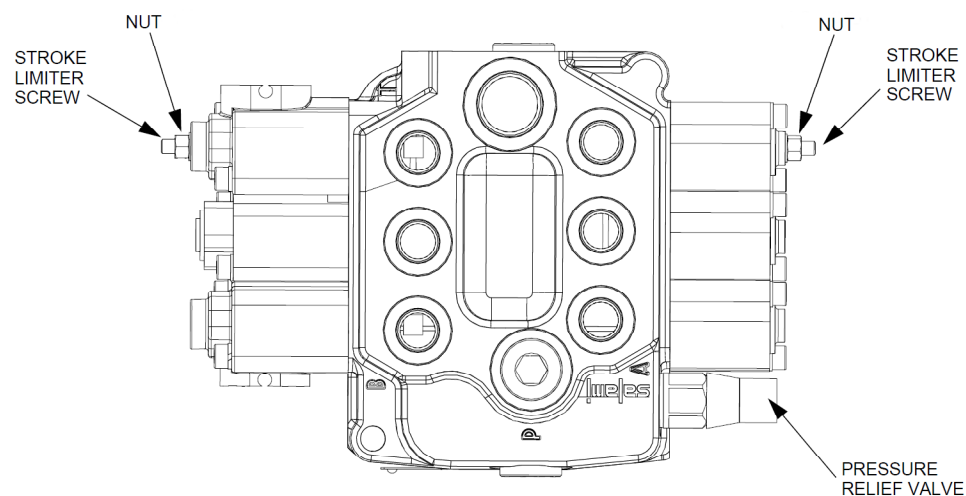
If the controls are “jerky” or act too fast, it may be necessary to adjust the hydraulic pressure on the wheel move.

- **To decrease hydraulic pressure:** Loosen the nut on the three spool valve (bottom right side of valve) and turn the adjustment screw out (counter-clockwise). Tighten the nut.
- **To increase hydraulic pressure:** Loosen the nut on the three spool valve (bottom right side of valve) and turn the adjustment screw in (clockwise). Tighten the nut.

### RAM Speed Adjustment

Ram speed in each direction of travel is regulated at the control valve. Adjust the stroke limiter screws and jam nuts until the desired rate of travel is achieved.

- Turning the screws inward results in a slower speed.
- Turning the screws outward results in a faster speed.



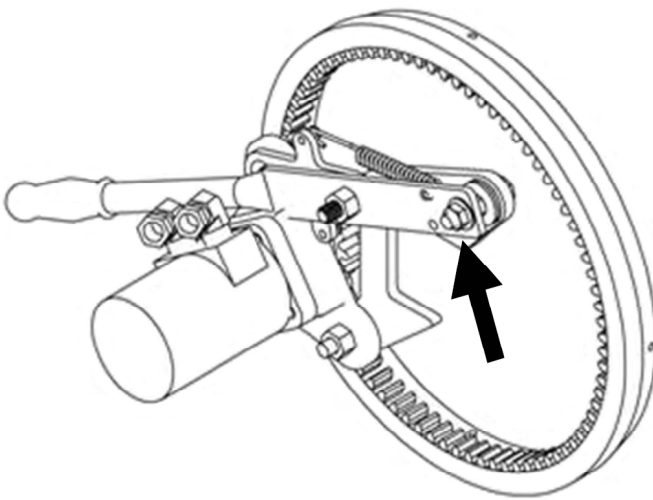
## 7.19. Adjusting the Mover Kit Pinion Gear

---

➡ When equipped:

The pinion gear must mesh fully with the ring gear to provide maximum contact.

1. Adjust the handle slot bolt (which bolts to the drive mount clamp) so full meshing of the pinion gear is achieved when the handle is in the over-center position. The pinion gear will need adjustment when gear teeth bind or are not meshing sufficiently.
  - **Gear teeth binding:** If the handle will not lock into over-center position, loosen the slot bolt nuts and slide the handle away from the tire.
  - **Insufficient Meshing:** If the pinion gear barely meshes with the ring gear, loosen the slot bolt jam nuts and slide the handle towards the tire until the gears fully mesh.



## 7.20. Change the Hydraulic Oil

---

Change the hydraulic oil to remove any accumulation of dirt or condensation in the system. Do not over-fill the reservoir. Leave space to allow for level fluctuation. Refer to [Section 9. – Specifications on page 60](#) for oil type.

# 8. Troubleshooting

Find causes and solutions to common problems that can be encountered.

**⚠ WARNING** Shut down and lock out all power sources before diagnosing any of the causes or attempting any of the solutions below.

The following section covers some causes and solutions to some of the problems that may be encountered.

If there is a problem that is difficult to solve, even after having read through this section, please contact your representative or AGI. Have this manual and the serial number available.

Auger

Problem	Cause	Solution
Poor product flow.	Input speed is too slow.	Increase engine rpm.
	Inadequate material flow from truck or hopper.	Increase flow of material.
	Flow into the hopper is restricted.	Clear grating of obstructions.
	Material is too wet or heavy.	Unloading rates are for dry grain.
	Flighting is worn.	Repair or replace as required.
	Belt slipping	Identify the belt, adjust or replace as required.
Excessive noise or vibration. *Remember to follow proper break-in procedures—flighting may run rough until tube is polished. If noise is extreme from outset or continuous after several loads of grain are fed, continue with troubleshooting.	Chatter from wooden bearings.	Spray penetrating lubricant between shaft and bearing surface. Bearings will break in over time. *If replacement of a bearing becomes necessary, split bearings are available to avoid having to slide all bearings off driveshaft.
	Truss cables incorrectly adjusted. (when equipped)	Support end of auger and adjust cables so auger is flat or curves slightly upwards. See Maintenance.
	Flighting peeled back due to plugging.	Inspect spout end of auger for flighting condition. Remove and replace flighting sections as necessary.
	Top drive inadequately lubricated.	Fill to appropriate level with grease. Top drive is not designed to be filled with oil.

	Bent flighting sections.	Support auger and remove all flighting sections. Check for straightness of flight stubs by rolling across flat concrete section. Straighten stub or replace as necessary. Take care not to bend flighting when reinstalling.
	Obstruction in auger tube.	Visually inspect for cloth or trash wrapped around flighting, or buildup of gum from oily crops such as flax or canola.
Premature wear on auger tubes.	Auger being run at low capacity or empty for extended period of time.	Frequently occurs on farms using grain wagons. Auger should not be left unattended when filling bins. Depending on application, a belt conveyor may be more appropriate.
	Bent flighting.	
	Flighting allowed to wear beyond normal point of replacement.	When flighting becomes razor thin at intake, replacement is critical. Since flight material is double thickness at welded lap joints, high spots on flight occur and can accelerate spot tube wear.
The flighting does not turn.	Auger flighting is plugged or obstructed.	Identify and remove obstruction.
	Bearing is seized.	Identify the bearing and replace.
	A chain is broken.	Identify the chain and repair or replace.
	Upper drive chain is broken.	Repair or replace.
	Gearbox is seized.	Fix or replace the gearbox.
	Gearbox coupler bolt is broken or missing.	Replace the bolt.
The bottom flighting will not turn.	Center coupler bolt is broken or missing.	Replace the bolt.
Auger flighting is noisy.	Obstruction in the auger tube.	Identify and remove obstruction.
	Flighting shaft bolts are loose or damaged.	Tighten or replace bolts.
	Flighting shaft is bent.	Repair or replace flighting shaft.
	Flighting is damaged.	Repair or replace flighting.



	Worn bearing.	Repair or replace bearing.
	Low gear oil level.	Inspect the gearbox, replace if damaged or add oil if not damaged.
	Upper chain drive loose.	Tighten the chain as required.
Tube is misaligned.	Loose truss cables. (when equipped)	Tighten cables as required.
Shear bolts fail repeatedly.	Incorrect shear bolt type.	Replace with correct part number. AGI shear bolts are specifically designed to provide correct driveline protection.
	Shear bolt hole worn out-of-round.	Frequent use of the incorrect shear bolt size can wear the mounting hole creating a “scissor effect,” which will require replacement of the affected parts.
	Corn spreaders in bin unable to keep up with auger output.	Slow down auger or remove corn spreaders.
	Flighting peeled back as a result of plugging.	Occurs when bin has overfilled, or corn spreaders restrict end of discharge. Inspect flighting at discharge end of auger. If necessary, replace flighting.
	Driveline failure.	See Maintenance Section.

#### Frame/Undercarriage with Hand Winch

Problem	Cause	Solution
The auger will not raise or lower.	The auger is already at its maximum or minimum height.	If at maximum height, lower the auger.
	Obstruction in the slide.	Clear the obstruction.
	Faulty cable.	Replace cable.
	Faulty winch.	Consult your local dealer.
	The bottom or top of the auger is obstructed.	Clear the obstruction.
The auger will not stay elevated.	Faulty winch.	Lower auger to transport position and repair or replace winch.

	Faulty cable.	Lower auger to transport position and repair or replace cable.
--	---------------	--

## Mover Kit with Hydraulic Winch Lift

Problem	Cause	Solution
Valve is leaking.	Loose/cracked fittings.	Tighten/replace fittings.
	Worn hose.	Replace hose.
	Valve spools are worn.	Replace valve.
Machine operates slowly.	Oil is hot.	Check oil level and add if required.
	Blockage in hydraulic lines.	Suction hose blocked or kinked.
	Power source is not producing enough oil volume and/or pressure.	Speed up the engine to produce more flow/pressure. The power unit may not have enough capacity to operate properly.
	Filter plugged (if equipped).	Change filter.
Hydraulic winch will not raise auger.	Relief valve pressure set too low.	Adjust relief valve pressure, refer to Ram and Travel Speed Adjustment.
	Oil level is too low.	Check oil level.
	Pump is worn out.	Replace pump.
Hydraulic cylinder leaking.	Worn seal.	Replace seal.
Winch coupler spins off (Dutton winch).	Internal winch parts worn.	Replace worn parts.
	Damage or obstruction on tracking.	Check tracking for damage or obstructions.
Pinion gear slipping or binding.	Pinion gear not adjusted properly.	Adjust the pinion gear. See Pinion Gear Adjustment.

## Drive

Problem	Cause	Solution
Drive belts jumping off pulleys.	Motor misaligned	Ensure drive and driven pulleys are correctly aligned

	Belts mismatched	Check Specifications section for correct belt sizes and only replace in pairs
	Belt tension inadequate	Adjust tension
	Using a lower horsepower motor than recommended	See Specifications for recommended motor sizes

# 9. Specifications

Specification	8-31	8-36	8-41	8-46	8-51
Tube Size	8" (203 mm)				
CAPACITIES					
Unloading Rate	Up to 3000 Bu/Hr (106 m³/Hr)				
TRANSPORT DIMENSIONS					
Length	32'7" (9.93 m)	37'7" (11.5m)	42'7" (13 m)	47'5" (14.5m)	52'4" (16m)
Width	8' (2.44 m)				
Height	8'9" (2.67 m)	9'3" (2.82 m)	10'2" (3.1 m)	11'3" (3.43 m)	12'3" (3.73 m)
DISCHARGE CLEARANCE DIMENSIONS					
Min	7'9" (2.36 m)	8'2" (2.49 m)	9'1" (2.77 m)	10' (3.05 m)	11' (3.35 m)
Max	17'4" (5.28 m)	20'11" (6.38 m)	23'3" (7.09 m)	26'6" (8.08 m)	29'3" (8.92 m)
TIRES					
Type	15" Radial				
Inflation Pressure	20–24 psi (137–165 kPa)				
WEIGHT					
Hitch Weight (no engine)	63 lb (29 kg)	50 lb (23 kg)	68 lb (31 kg)	85 lb (39 kg)	72 lb (33 kg)
Total Weight	1225* lb (556 kg)	1401* lb (636 kg)	1485* lb (674 kg)	1589* lb (721 kg)	1740* lb (789 kg)
POWER RECOMMENDATIONS					
Gas Engine	16–18 HP	18–20 HP	22–25 HP	25–27 HP	27–30 HP
PART SPECIFICATIONS					
Gas Tank Capacity	12 Imp Gal (45 L)				
Gearbox Oil Capacity	0.9 US Quarts (0.85 L)				
Upper Drive Housing Grease Quantity	750 g (26 oz)				
Belt Size	2B180	2B210	2B240	2B270	2B300
Mover Kit Hydraulic Oil	ISO 32 Hydraulic Oil				
Hydraulic Hoses	Minimum 2500 psi (17200 kPa) working pressure				

\* Weights are estimated.

Specification	10-31	10-36	10-41	10-46	10-51
Tube Size	10" (254 mm)				
CAPACITIES					
Unloading Rate	Up to 6000 Bu/Hr (212 m³/Hr)				
TRANSPORT DIMENSIONS					
Length	32'7" (9.93 m)	37'7" (11.5 m)	42'7" (13 m)	47'5" (14.5 m)	52'4" (16 m)
Width	8' (2.44 m)				
Height	8'9" (2.67 m)	9'3" (2.82 m)	10'2" (3.1 m)	11'3" (3.43 m)	12'3" (3.73 m)
DISCHARGE CLEARANCE DIMENSIONS					
Min	7'6" (2.29 m)	7'10" (2.39 m)	8'9" (2.67 m)	9'10" (3 m)	10'9" (3.28 m)
Max	17' (5.18 m)	19'11" (6.07 m)	22'11" (6.98 m)	26' (7.92 m)	28'10" (8.79 m)
TIRES					
Type	15" Radial				
Inflation Pressure	20–24 psi (137–165 kPa)				
WEIGHT					
Hitch Weight (no engine)	88* lb (40 kg)	82 lb (37 kg)	100* lb (45 kg)	135* lb (61 kg)	120* lb (54 kg)
Total Weight	1374* lb (623 kg)	1548* lb (702 kg)	1663* lb (754 kg)	1896* lb (860 kg)	2314* lb (1050 kg)
POWER RECOMMENDATIONS					
Gas Engine	27–30 HP	30–35 HP	35–38 HP	38 HP	38 HP
PART SPECIFICATIONS					
Gas Tank Capacity	12 Imp Gal (45 L)				
Gearbox Oil Capacity	0.9 US Quarts (0.85 L)				
Upper Drive Housing Grease Quantity	1100 g (40 oz)				
Belt Size	2B180	2B210	2B240	3B270	3B300
Mover Kit Hydraulic Oil	ISO 32 Hydraulic Oil				
Hydraulic Hoses	Minimum 2500 psi (17200 kPa) working pressure				

\* Weights are estimated.

# 10. AGI Limited Warranty

This warranty relates to AGI Augers (the “Product”) sold by AGI, (referred to herein as the “Seller”) and applies only to the first user of the Product (meaning a purchaser directly from the Seller or from an authorized dealer or distributor of the Product, referred to herein as the “Buyer”).

This warranty shall only be effective if properly registered with the Seller in accordance with information provided to the Buyer at the time of sale.

1. The Seller warrants to the Buyer that the Product is free from defects in material and workmanship **under normal and reasonable use.**
2. This warranty applies only to defects in materials and workmanship and not to damage incurred in shipping or handling, through normal wear and tear, or damage due to causes beyond the control of the Seller such as lightning, fire, flood, wind, earthquake, excessive voltage, mechanical shock, water damage, or damage arising out of abuse, alteration, improper assembly, improper installation, improper maintenance or improper repair of the Product.
3. **The warranty period for the Product shall be two years from delivery of the Product to the Buyer where the Product is used in a normal farm operation. First year of warranty coverage of parts and labour, second year warranty coverage of parts only. Warranty period for the Product shall be 90 days from delivery of the Product to the Buyer where the Product is used in a commercial operation.** In the event that any part incorporated into the Product is manufactured and sold to the Seller by a third party vendor, such part is only warranted to the extent of the warranty given by that third party.
4. The obligations set forth in this warranty are conditional upon the Buyer promptly notifying the Seller of any defect and completing reasonably required documentation and, if required, promptly making the Product available for correction. The Seller shall be given reasonable opportunity to investigate all claims and no Product shall be returned to the Seller or part disposed of until after inspection and approval by the Seller and receipt by the Buyer of written shipping instructions, with transportation charges prepaid.
5. Upon return of the Product, or such part of the Product that requires correction, the Seller shall, at the Seller’s option, either repair or replace the Product or such part. The Seller shall replace or attempt to repair and return the Product or such part within a reasonable period of time from receipt of an approved warranty claim from the Buyer. If the Seller is unable to repair or replace the Product, the Buyer shall be entitled to a credit note in the amount of the purchase price for the Product.
6. The total liability of the Seller on any claim, whether in contract, tort or otherwise, arising out of, connected with, or resulting from the manufacture, sale, delivery, repair, replacement or use of the Product or any part thereof **shall not exceed the price paid for the Product** and the Seller shall not be liable for any special indirect, incidental or consequential damages caused by reason of the installation, modification, use, repair, maintenance or mechanical failure of the Product. **Consequential or special damages as used herein include, but are not limited to, lost or damaged products or goods, costs of transportation, lost sales, lost orders, lost income, increased overhead, labor and incidental costs and operational inefficiencies.**
7. **Notwithstanding anything contained herein to the contrary, the foregoing is the Buyer’s sole and exclusive remedy for breach of warranty by the Seller in respect of the Product. The Seller, for itself, its agents, contractors, employees and for any parent or subsidiary of the Seller, expressly disclaims all warranties, either express or implied, written or oral, including implied warranties of merchantability or fitness for a particular purpose and undertakes no obligation with respect to the conformity of the Product except as set out in the purchase agreement, if any, or marketing materials.**
8. The foregoing warranty is the entire warranty of the Seller to the Buyer and the Buyer shall not be entitled to rely upon any representation or warranty contained in any marketing material of the Seller in respect of the Product. The Seller neither assumes, nor authorizes any other person purporting to act on its behalf to modify or to change this warranty, nor to assume for it any other warranty or liability concerning the Product.

**WARRANTY VOID IF NOT REGISTERED**








AGI is a leading provider of equipment solutions for agriculture bulk commodities including seed, fertilizer, grain, and feed systems with a growing platform in providing equipment and solutions for food processing facilities. AGI has manufacturing facilities in Canada, the United States, the United Kingdom, Brazil, South Africa, India and Italy and distributes its products globally.



P.O. Box 39, Rosenort, Manitoba, R0G 1W0 Canada

**P** 866.467.7207 (Canada & USA) or 204.746.2396 | **F** 866.768.4852 | **E** [sales@grainaugers.com](mailto:sales@grainaugers.com)

AGGROWTH.COM      [aggrowthintl](https://www.aggrowthintl.com)     

©Ag Growth International Inc. 2024 | Printed in Canada

If you have any comments or questions on this manual, or find an error, email us at [comments@aggrowth.com](mailto:comments@aggrowth.com).  
Please include the part number listed on the cover page in your message.