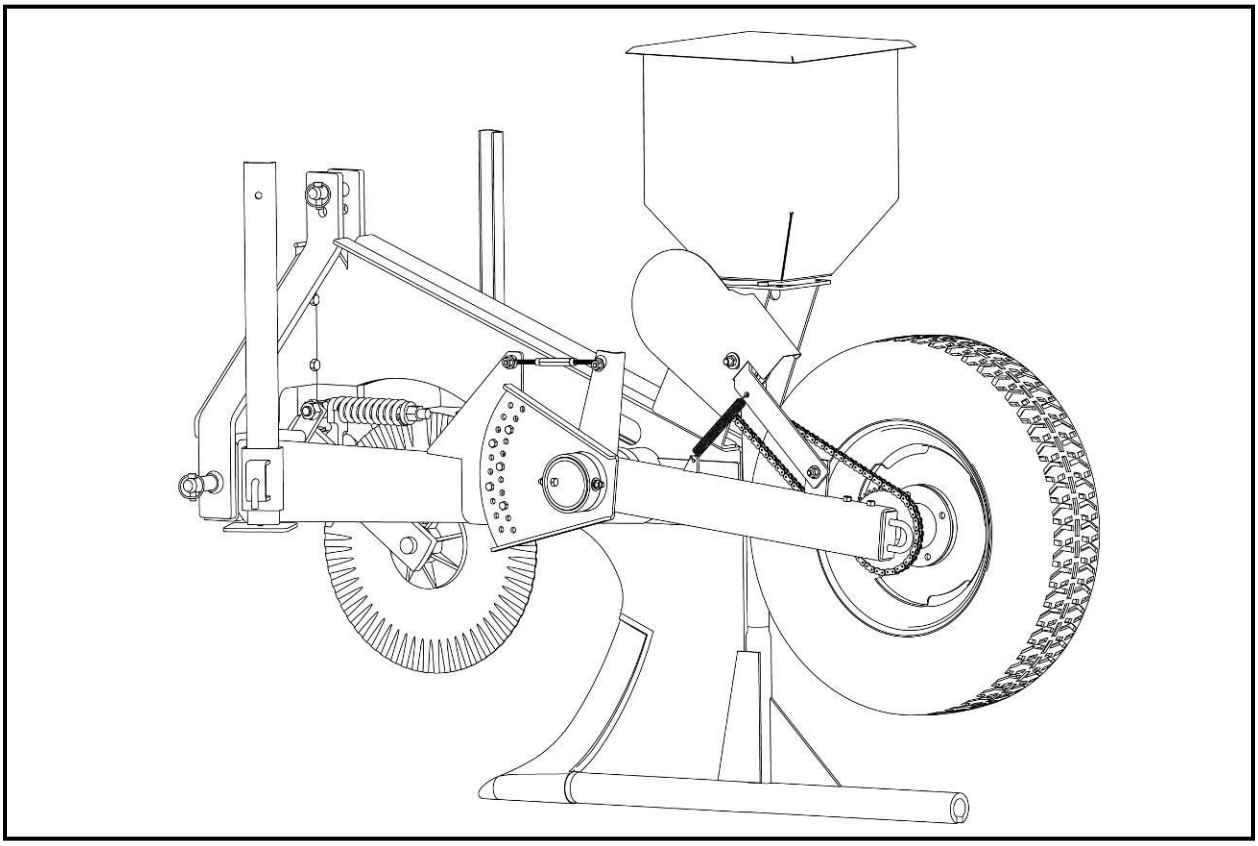
THE VERMINATOR

Gopher Season Is Now Open

Operations Manual

Verminator V-2



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Rev. May 11 IP0020

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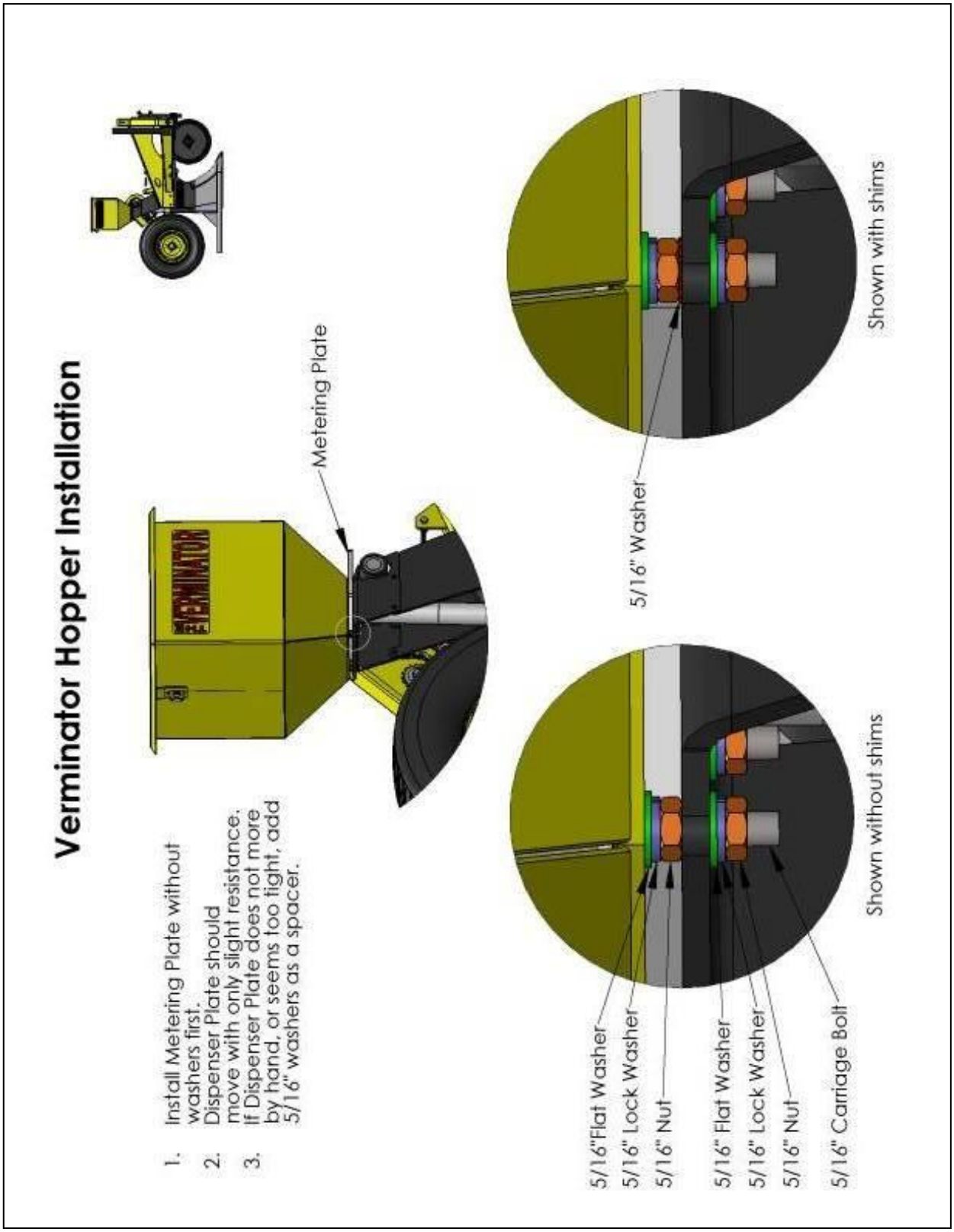

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WARRANTY INFORMATION

Products Covered

All Products carrying the Inventive Products name. (All other products purchased from other manufacturers are limited to that manufacturer's warranty.)

Inventive Products ("Inventive") warrants to the original purchaser ("Purchaser"), its products to be free from defect under normal use and service, ordinary wear and tear expected, for the warranty period of one year from the date of the original purchase, but subject to the limitations as set forth below.*

***Limitation on Warranty**

Inventive's obligation under the above warranty is limited to repair or replacement of the Product, at its option due to a manufacturing defect of the Product. Inventive shall not be liable for the loss of or use of vehicles, loss of damage to personal property, expenses such as telephone, lodging, gasoline, towing, tire damage or any other incidental or consequential damages incurred by the Purchaser, or any other person or entity.

Inventive will examine the returned Product. If Inventive, in its exclusive discretion, determines that the defect or damaged Product is covered under this limited warranty, Inventive will repair the Product or replace it at that time.

> Alterations to or misuse of the Product will void the warranty. For example, using a tractor larger than specified, or traveling at an improper rate of speed, shall void the warranty on any of the Products. Failure to properly maintain and regularly inspect the Product according to the specific instruction sheet accompanying each Product shall also void the warranty.
>
> Shear limitations. Inventive does not warranty shear due to rock damage or normal wear and tear. Warranty of the shear is void once shear has been used.

Some states do not allow the exclusion or limitation of incidental or consequential damages. If such exclusions or limitations are prohibited under the applicable law, the above limitation or exclusion may not apply.

This Warranty gives you specific legal rights and you may also have other rights, which vary from state to state.

Return Policy

The Purchaser, when returning a Product, must follow the following steps:

1. The Purchaser must have proof of purchase of any damaged Product. The Purchaser must obtain from Inventive Products a Returned Merchandise Authorization (RMA) will be given along with the correct address where to ship the damaged product.

2. The Purchaser must pay all shipping costs to deliver the damaged Products to Inventive and must send the damaged Product along with the RMA and proof of purchase together.

3. Upon receipt of damaged Product, Inventive will determine whether the damaged Product is covered under the Limited Warranty. If it is, Inventive will repair or replace the Product. If the Product is replaced, the Product that is originally returned by the Purchaser shall become the exclusive property of Inventive. If the returned Product is not covered under the Limited Warranty, Inventive will notify the Purchaser before taking any further action with regard to repair or replacement, which would be at the Purchaser's cost.

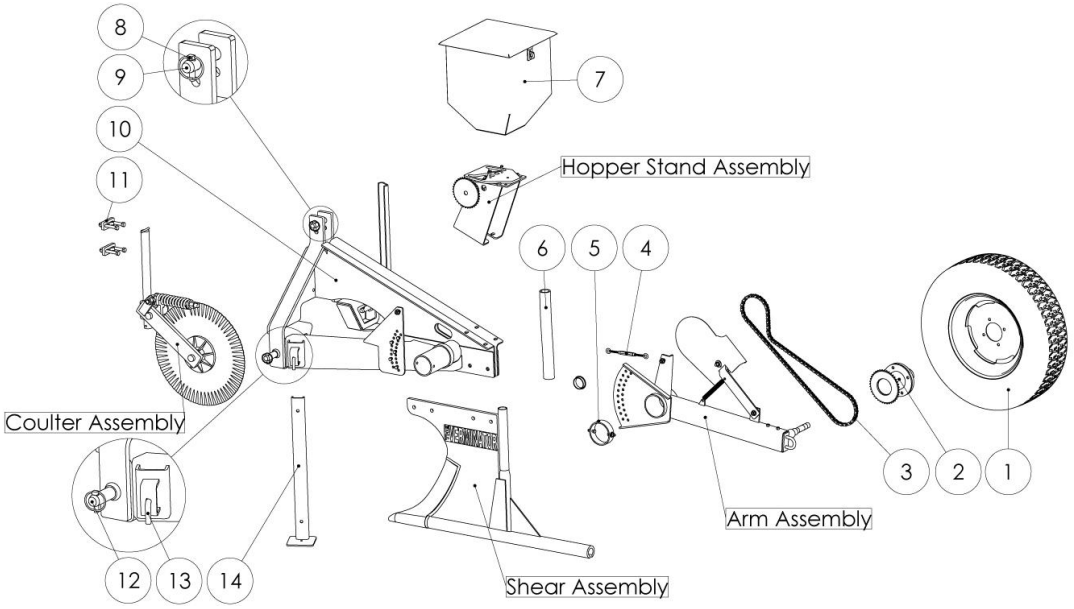
4. Customer is responsible to pay shipping charges to Inventive for product inspection. Inventive will pay return freight if product is found to be under warranty using UPS Ground or equivalent.

Notice to Owner or User

Please fill out the Warranty Registration Transfer (see Appendix page 17) and mail it to Inventive within 15 days after purchase. This validates the warranty transfer and is essential for your protection. If Inventive should ever need to contact you concerning compliance of your Inventive equipment with any applicable safety standards, the information you have provided on the Warranty Registration Transfer will ensure your immediate notification.

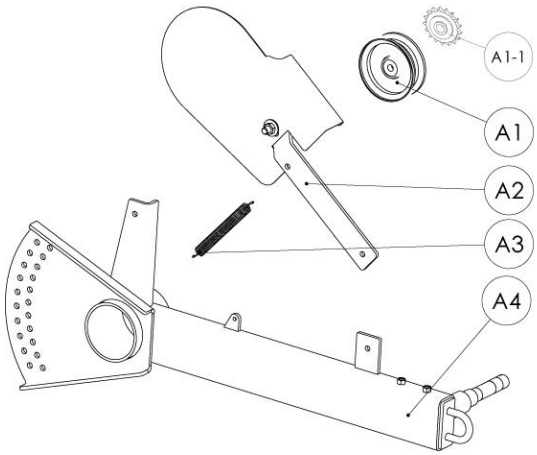
PARTS & ACCESSORIES

Verminator V-2 Exploded View



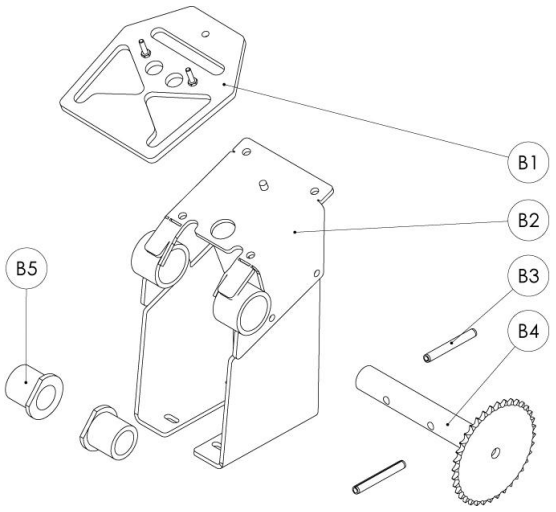
Item #	Part #	Description
1	ITD6180	Drive Wheel and Tire Assembly
	ITD6181	Wheel Only
	ITD6182	Tire Only
2	ITD6205	Complete Torque Tube and Hub Assembly (no bearings, seal, or dust cap)
2A	ITD6206	Dust Cap
2B	ITD6207	Inner Bearing and Race
2C	ITD6208	Outer Bearing and Race
2D	ITD6209	Seal
2E	ITD6210	Castle Nut
2F	ITD6179	Hub Only (bare)
2G	ITD6154	Torque Tube & Sprocket Only
3	ITD6199	#40 Drive Chain
4	ITD6197	Adjustment Turnbuckle
5	ITD6200	Arm Retaining Ring
6	ITD6201	Clear Sight Tube
7	ITD6175	Hopper Assembly
	ITD6173	Hopper Internal Divider
8	ITD6196	Category II Top Hitch Pin (each)
9	-	7/16” Linch Pin (each)
10	ITD6110	Main Frame Assembly
11	ITD6195	Coulter Clamp Assembly (each)
12	ITD6129	Lower Hitch Pin (Cat. I & II) (each)
13	ITD6204	Leg Pin Kit (Pin, Spring, Washers, Cotter Pin) (1 kit per leg)
14	ITD6155	Leg (each)

Arm Assembly



Item #	Part #	Description
A1	ITD6133	Idler Pulley (discontinued, limited to stock on hand)
A1-1	ITD6133-01	Idler Pulley
A2	ITD6136	Idler Arm/Safety Cover Assembly
A3	ITD6132	Idler Spring
A4	ITD6100	Axle Arm Weldment

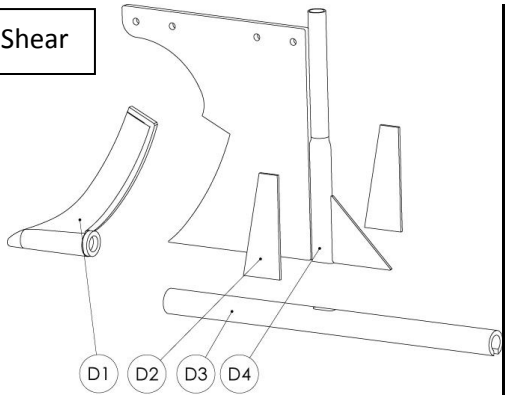
Hopper Stand Assembly



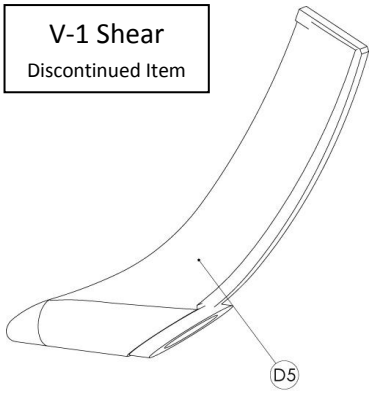
Item #	Part #	Description
B1	ITD6223	Metering Plate (VHMW)
B2	ITD6140	Hopper Stand Weldment
B3	ITD6220	7/16” x 3.5” Slotted Roll Pin
B4	ITD6149	Jack Shaft Assembly (each)
B5	ITD6139	Jack Shaft Bushing - UHMW (each)

Shear Assembly

V-2 Shear

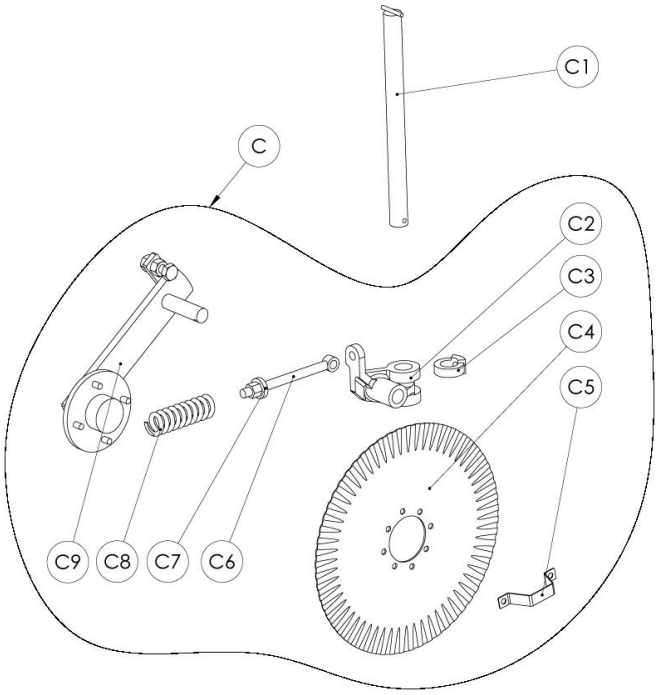


V-1 Shear
Discontinued Item



Item #	Part #	Description
Complete	ITD6158	Complete Shear Weldment
D1	ITD6225	V-2 Alloy Point (SN 70000 & Up)
D2	ITD6160	Alloy Wear Plate (2 required)
D3	ITD6159	Tunnel Tube
D4	ITD6162	Drop Tube
D5	ITD6161 V-1	V-1 Alloy Point (SN 69999 & Down) **Discontinued Item, Call for Availability**

Coulter Assembly



Item #	Part #	Description
C	ITD6183	Coulter Assembly
C1	ITD6184	1-1/2” Mount Bar -Sold Separately
C2	ITD6187	Pivot Casting
C3	ITD6213	Locking Collar
C4	ITD6186	Ripple Coulter (14lbs)
C5	ITD6191	Retaining Clip
C6	ITD6189	Eyebolt
C7	ITD6214	Spring Washer
C8	ITD6188	Spring
C9	ITD6185	Coulter Arm & Hub

SAFETY & PRECAUTIONS

This manual is supplied with the Inventive unit to better familiarize the owner/operator with proper operation and maintenance procedures. The information contained in this manual must be thoroughly understood by all operating and maintenance personnel to insure the protection of the operator of this unit and to prolong the unit's working life.

Precautions

This machine utilizes poison laced bait to operate. Follow all Local, State, and Federal Laws and Regulations regarding to poison.

Machine Safety

- Utilize smallest tractor possible for soil conditions to reduce possible damage to machine and equipment (Max 60 hp, 2 wheel drive)
- 5 mph Max Speed!
- When picking up and moving machine verify no bait has been left behind one the ground during storage
- Always check for underground obstacles or obstructions before machine use. If necessary check with local utility companies before use.
- NEVER backup while machine is in ground. Damage to machine will occur.
- Do not make sharp turns with shear in the ground. Damage may occur.

Bait / Poison Safety

This machine utilizes poison laced bait to operate. Follow all Local, State, and Federal Laws and Regulations regarding to poison.

Follow all safety regulations on the bait manufacturers' label.

Always lock machine hopper when loaded with bait.

When done using machine, bait must be removed and machine washed in accordance with all Local, State, and Federal Laws and Regulations.

VERMINATOR MAINTENANCE

Visual Inspection

Before each use, perform a thorough visual inspection of the unit and all accessories.

Evidence of physical damage such as:

- cracking
- Bending
- Deformation of plates and welds
- Cracking or flaking of paint
- Loose bolts or fasteners

If any of these conditions exist, contact Inventive and remove the equipment from service. Repair or replace the necessary components with Inventive certified parts.

Maintenance (Each Use or As Required)

Always perform regular maintenance of The Verminator and its parts. Prior to each use:

- Check the tire pressure to assure it is at the recommended pressure listed on the tire side wall.
- Check ½ inch Lug Nuts on Drive Wheel. Tighten to recommended 95 ft-lbs torque.
- Inspect/repack wheel bearings **As Required**
- Inspect/lube drive chain **As Required**
- Inspect Shear for cracks or damage. Build up wear locations before there is no base material to weld to.

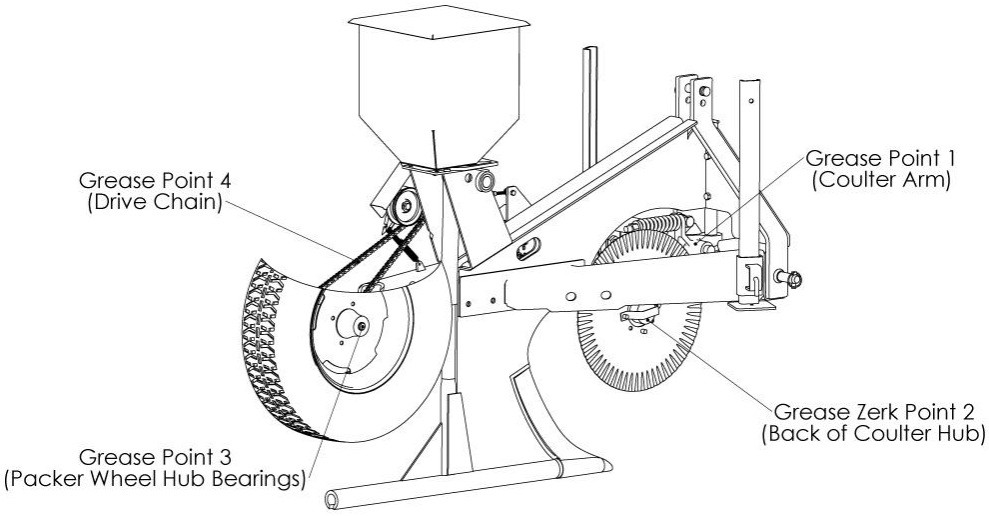
NEVER WELD ON SHEAR ALLOY POINT!

Never weld to the Shear Alloy Point or “Leading Edge”. This material is a chrome alloy and if welded, it may crack even if preheated. Follow replacement procedures if maintenance is required on this item.

For more information on replacement and maintenance of the shear point, visit our website:

www.InventiveAgProducts.com

Grease Points



Machine Storage

When storing machine after use, follow guidelines below.

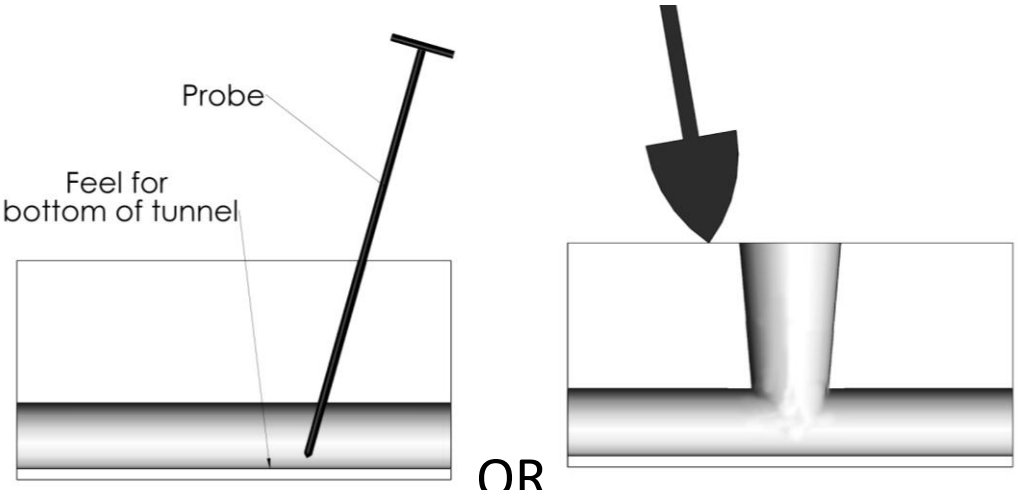
- Remove all bait from hopper (dispose or store per manufacturer's recommendation)
- Clean remaining bait from hopper, drop tube, and tunnel tube
- Make sure no bait has been left exposed above ground
- Store machine on lumber to keep off ground
- Grease, wax, or paint bare metal on shear to keep from rusting
- Inspect and replace any parts necessary

VERMINATOR OPERATIONS

Gopher Tunnel/Burrow Depth

Discovering the depth of the gopher tunnel system is the first critical step to success. If the burrow building machine does not intersect the gopher's tunnel system the gopher may not investigate the new tunnel or find the bait.

To Discover Tunnel Depth



Use a probe (1/4" to 3/8" point round rod) to "feel" for the tunnel floor

OR

Dig several holes with a shovel and measure

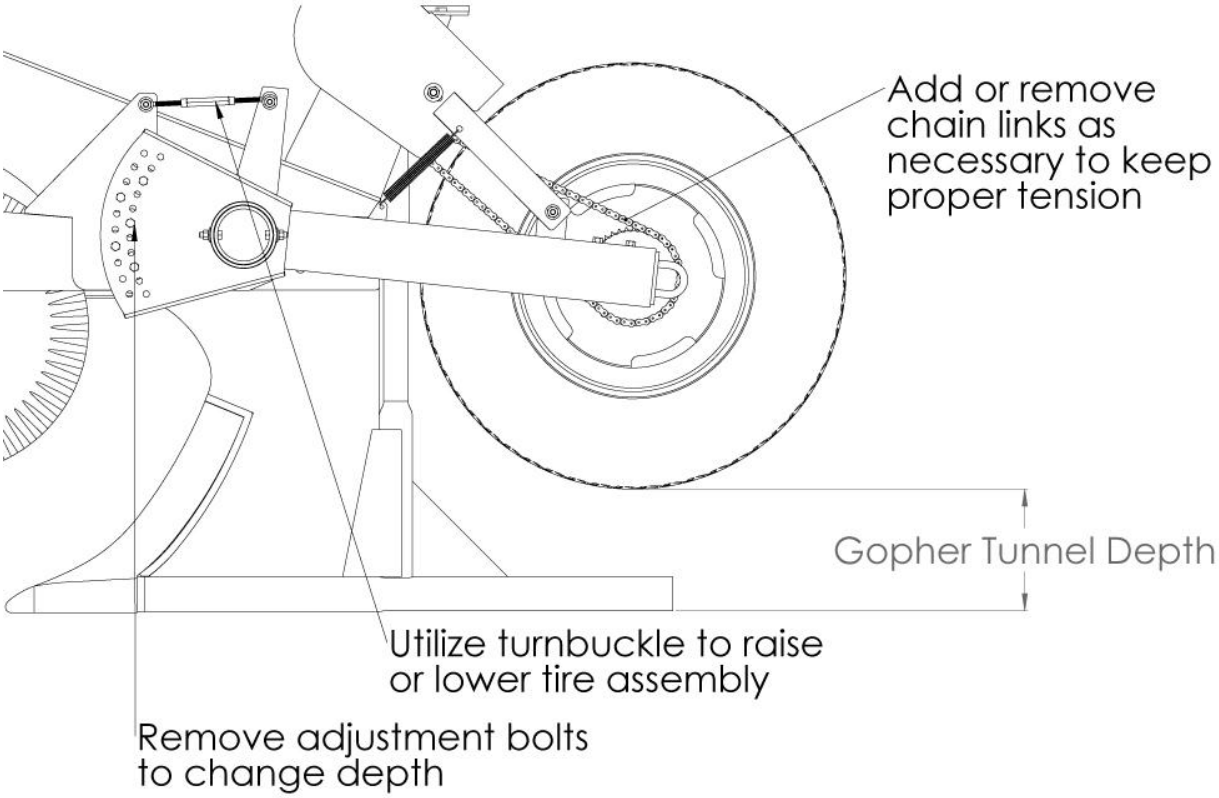
NOTE: Probe field to be baited in 5-6 locations. Depth will be fairly consistent according to crop and amount of time it has been in. Keep your tunnels a bit higher than the gopher's tunnels, as it is harder for him to fix his roof than his floor.

Setup Machine

The next step is to set the machine to the depth of the tunnel system and make sure it is level.

Set the Drive Wheel Height

Utilizing the depth found in step 1, set the drive wheel to the depth required. It is better to keep your tunnel slightly higher than the gophers' as it is harder to fix a roof than a floor.



- After adjustment reinstall adjustment bolts and torque to **50 ft-lbs.**
- Leave the turnbuckle loose after adjustment

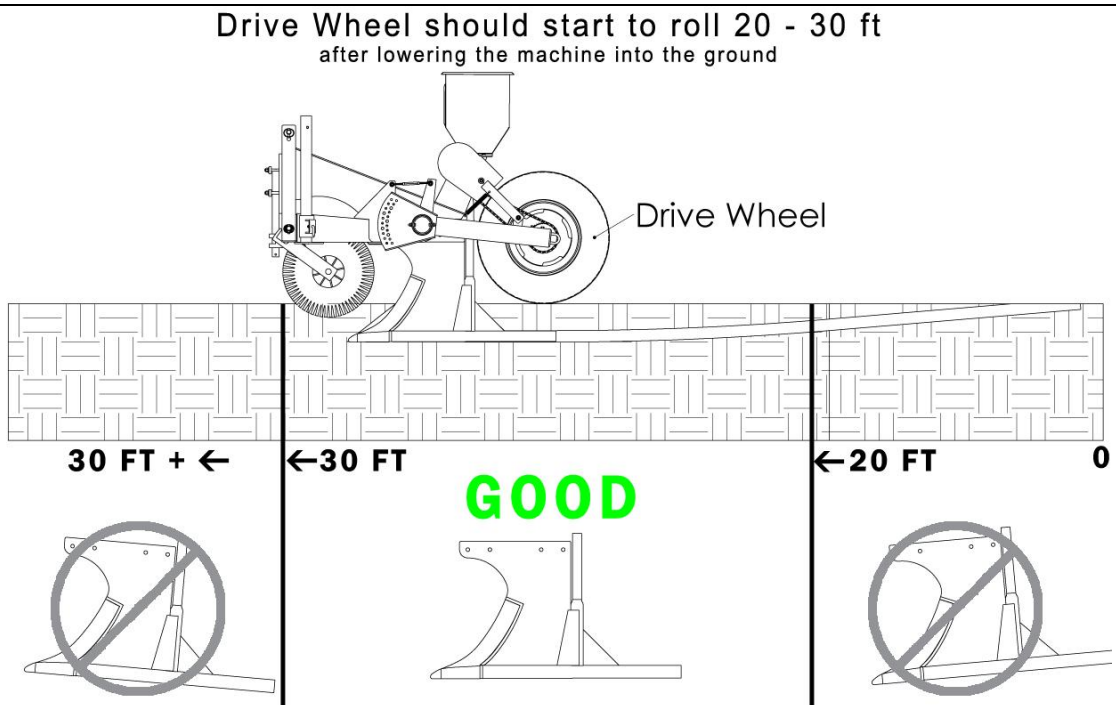
Level the Tunnel Tube

Leveling the tunnel tube is the most critical part of creating a perfect tunnel / burrow. ALWAYS re-level the machine if you **adjust the drive wheel height** or **change tractors**.

Re-leveling will ensure longer life of the shear and create a better tunnel.

There are several methods for verifying the levelness of the tunnel tube. See figure below for further explanations.

METHOD 1 FOR LEVELING



Symptoms:

1. Wheel begins to roll **AFTER** 30 ft
2. Poor tunnel creation
3. Machine pulls out of ground
4. Machine does not go into ground

Cause:
Shear tilted upward

Solution:
Shorten top link of 3 point hitch

Correct Setting:

- Wheel begins to roll at 20-30 ft
- Smooth tunnel creation
- No excessive tunnel tube wear
- Tunnel tube is parallel to ground

Symptoms:

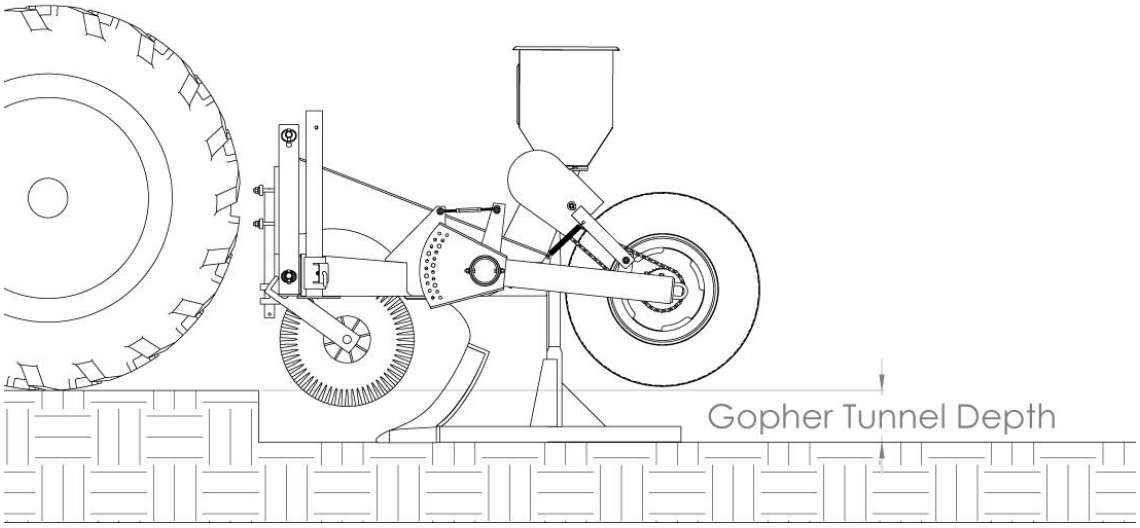
1. Wheel begins to roll **BEFORE** 20 ft
2. Poor tunnel creation
3. Excessive tunnel tube wear

Cause:
Shear tilted downward

Solution:
Lengthen top link of 3 point hitch

METHOD 2 FOR LEVELING

USE A FLAT LEVEL PLATFORM TO ELEVATE TRACTOR TO TUNNEL DEPTH



Use a flat level platform to raise the entire tractor the same height as the gopher tunnel. This allows for the machine to be lowered, simulating operation in the field, and adjusted for level.

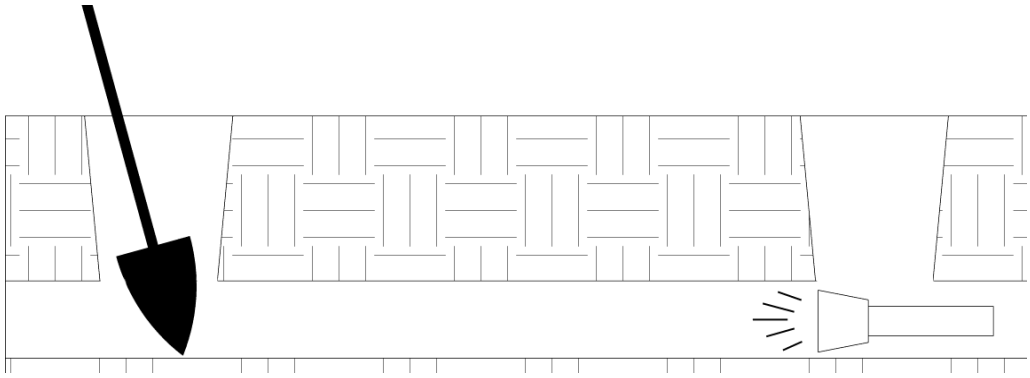
Set Coulter Height

Coulter should be set 2”-4” into the ground, as needed to cut trash.

Checking Tunnel Quality

Creating a quality tunnel/burrow is the goal of the entire process. The machine can be set perfectly, but without the proper moisture content in the soil the tunnel might not be properly formed.

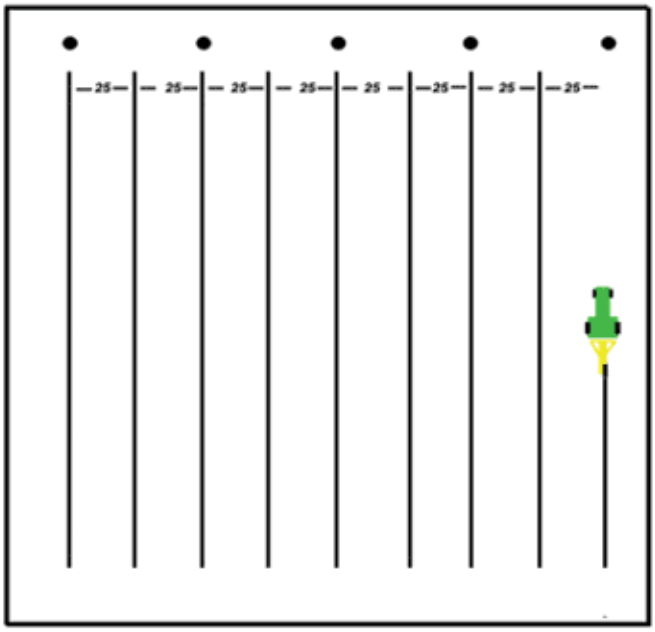
The best way to check tunnel quality is to dig down and look. After running the machine fully submerged for 30-40 ft you must stop and check the tunnel. Using a shovel dig two holes approximately 3 ft apart such that they intersect the tunnel in two locations. By placing a flashlight in one hole and the back of the shovel (or a small mirror) in the other, the amount of light shining through will indicate the quality of the tunnel.



Field Grids

Below is a standard treatment schedule and field preparation for a field that has not been treated previously. Alfalfa is used as a sample crop for this section; other crops will follow a similar treatment.

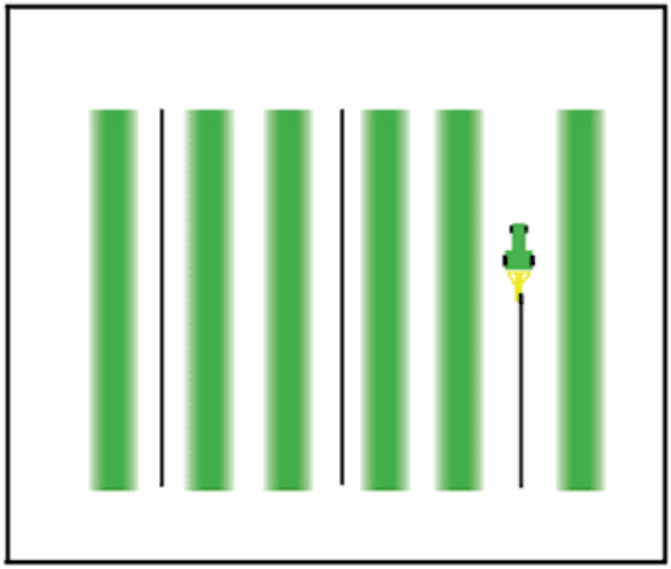
1st Treatment (Spring Application)



If the field has not been treated before, it is critical to apply an aggressive 1st treatment to control the gopher population. This treatment is best applied in the spring. This helps minimize the first breeding cycle of the season and clears the field.

This is accomplished by running 20-25 ft apart through the field. (Note: circles at top of figure represent irrigation risers)

2nd Treatment (2-4 months or after first cutting)

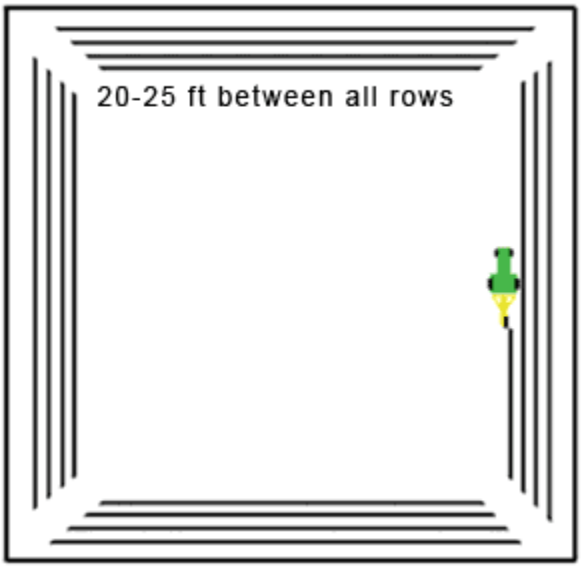


After the 1st treatment to help clear and control the gopher population, a second treatment is suggested to eliminate gophers from the crop.

This treatment is typically done 2-4 months after the 1st treatment, or after the first cutting.

Rows should be every 50-75 ft, or between every other wind row.

Continuing Maintenance Treatments (Spring and Fall)

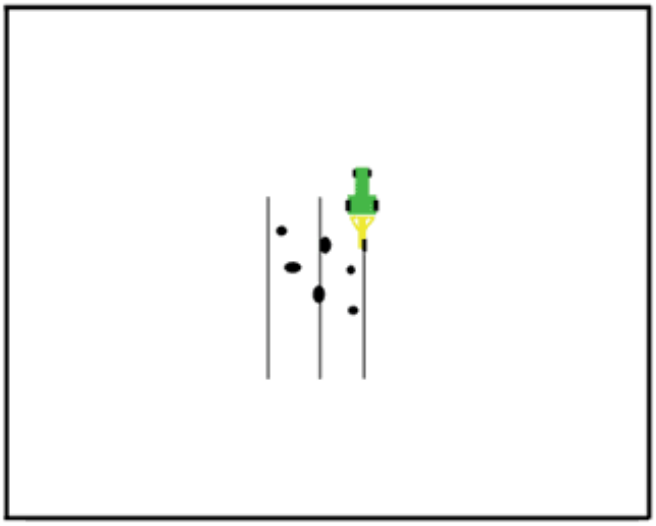


Once the first 2 treatments have been applied, it is typical that maintenance treatments are all that are required to control the gopher population.

Applied in the Spring and Fall, this end row application helps keep gophers from re-entering the field.

Creating 4 boarding rows around the field (applied 20-25 ft apart) creates a solid boundary for the crop.

Spot Treatments (As Needed)



Occasionally gophers will travel over boundary treatments. In this case, spot treatments in the field are required.

This is accomplished by running rows directly through mound locations and 10-15 ft on either side. Make sure the rows run 30-40 ft before and after the mounds for the most effective treatment.

Keys to Success

There are 4 simple keys to success. Following each and every step and you will create a solid treatment system in which to control gophers.

Step 1: Find the Gophers

You must find gophers to control gophers. This needs to be done in 5-6 locations throughout the field you are trying to treat. This can be accomplished one of two ways:

- Use a probe rod (1/4" to 3/8" round rod)
- Dig down to the tunnel using a shovel

Note: Refer to "Gopher Tunnel Depth" section in this manual

Step 2: Set the Machine

Next you must set the machine to the depth of the tunnel and to make sure it is level. Machine depth is important to verify tunnel intersection with the gopher system. Leveling the machine helps produce the best tunnel / burrow possible.

Steps to set and level the machine:

- Set drive wheel height. This will set depth of tunnel
- Level the machine utilizing the **20-30ft Method** or the **Platform Method**

Note: Refer to "Level the Tunnel Tube" section in this manual

Step 3: Check the Tunnel

Gophers have been found and the machine has been set. Checking the tunnel is the next critical step for success. If the moisture content in the soil isn't such that it will support a tunnel, there is no point in continuing. Wait until conditions improve.

Checking the Tunnel:

- After running the machine 30-40 ft, stop and check the tunnel. This can be done by digging 2 holes approximately 3 ft apart along the tunnel. Place a flashlight in one hole and a shovel or mirror in the other such that if the light passes cleanly through; a sturdy tunnel / burrow has been created.

Note: Refer to "Checking Tunnel Quality" section in this manual

Step 4: Apply the Bait

Applying the bait is the last key to success. To achieve the best results applying two aggressive treatments (spring and after first cutting) are required to gain control of the infestation. Then it is simply maintaining the field with spot and perimeter treatments 2-3 times per year.

For Bait Information Contact: Commercial Gopher Bait / Poison Suppliers, Local Fertilizer Suppliers, Local Co-Op, or County Extension offices.

OWNER RECORDS

Name of owner or user._____

Street Address_____

City _____State ____ Zip _____

Phone ( )_____

Date of Purchase _____/_____/_____

Date put into Service _____/_____/_____

Purchased from (Dealer)_____

City _____ State ____ Zip_____

Type and Model of Equipment Purchased_____

Serial Number_____

CUT ALONG SOLID LINE

WARRANTY REGISTRATION TRANSFER

Please Print Clearly!

Name of owner or user._____

Street Address_____

City _____State ____ Zip _____

Phone ( )_____

Date of Purchase _____/_____/_____

Date put into Service _____/_____/_____

Purchased from (Dealer)_____

City _____State ____ Zip_____

Type and Model of Equipment Purchased _____

Serial Number_____

Mail To:

Inventive Products
Attn: Warranty Dept
3195 Industrial Way
Mountain Home, ID 83647
(888) 310-6037
(208) 580-1904
Fax: (208) 580-1900

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