MY-D HAN-D

MFG. CO. INC.
DODGE CITY, KANSAS 67801 (620) 225-0263

PORTABLE ELEVATOR

OPERATOR'S MANUAL

August 2002

Page Index

!! BE CAREFUL !!!

1. **Keep all shields in place.**
2. **Stop machine to repair or clean.**
3. **Keep hands, feet and clothing awayfrom power driven parts.**
4. **Keep off of machinery unless a platform is provided. do not crawl on equipment.**
5. **When equipment becomes disabled, disconnect power before attempting,repairs.**
6. **Do not allow children to play near the equipment.**

BE A SAFE OPERATOR

BY THINKING-BEFORE ACTING
AND
BY READING YOUR OPERATORS MANUAL.

AVOID ACCIDENTS

A careful operator is the best insurance against an accident.

Most accidents, whether they occur in industry, on the farm, at home or on the highway, are caused by the failure of some individual to follow simple and fundamental safety rules or precautions. for this reason most accidents can be prevented by recognizing the real cause and doing something about it before the accident occurs.

Regardless of the care used in the design and construction of any type of equipment, there are many conditions that cannot be completely safe guarded against without interfering with reasonable accessibility and efficient operation.

The complete observance of one simple rule would prevent many thousand serious injuries each year. that rule is: never attempt to clean, oil, or adjust a machine while it is in motion!

Limited Warranty

All My-D Han-D Mfg. Co. Inc. products have been manufactured from the very finest material and by skilled workmen, therefore, My-D Han-D Mfg. Co. Inc. guarantees its products against defective workmanship and material under normal and reasonable use for a period of ONE (1) year, after the date of delivery, to the original purchaser.

This warranty is not a service guarantee, nor is it any assurance that the product is perfectly designed or perfectly built; neither is it an expression of any belief that the product cannot be improved. Further, this warranty is not a guarantee against hazards such as wear, tear, misuse or misfortune nor against problems arising from incorrect set-up or servicing and is not a guarantee that the performance will meet the expectations of the purchaser.

This warranty is void should the product be repaired or modified in any way not authorized by My-D Han-D Mfg. Co. Inc.

There is no other express warranty, implied warranties, including those of merchantability and fitness for a particular purpose other than the extent permitted by law any and all implied warranties are excluded. This is the exclusive remedy, and liability for consequential damages under any and all warranties are excluded to the extent exclusion is permitted by law.

Components will carry only their respective manufacturer's warranty. This warranty does not cover any merchandise which, in the opinion of the company, has been subject to negligent handling, misuse, or accident.

Our obligation under this warranty is limited, however, to furnishing a replacement part for the defective part, or at our option to repairing the defective parts without charge, either method F.O.B. our works, provided the consumer gives My-D Han-D Mfg. Co. Inc. written notice within ten (10) days after said part appears to be defective and affords My-D Han-D Mfg. Co. Inc. opportunity to inspect. Unless otherwise expressly agreed to by My-D Han-D Mfg. Co. Inc. the consumer shall bear the expense of installation.

My-D Han-D Mfg. Co. Inc., reserves the right to make changes, improvements, and modifications at any time without incurring the obligation to make such changes, improvements, and modification on any products sold previously.

My-D Han-D Mfg. Co. Inc. will not be responsible or liable in any event for any loss of production, profits, downtime, delays, accidents, or expenses, or for any other special, indirect or consequential damages.

MY-D HAN-D MFG. CO. INC.
10881 McARTOR ROAD
Dodge City, Kansas 67801

(620) 225-0263

OPERATOR QUALIFICATIONS

Operation of this equipment shall be limited to competent and experienced persons. In addition, anyone who will operate or work around this equipment must use good common sense. In order to be qualified, he or she must also know and meet all other requirements, such as:

1. Some regulations specify that no one under the age of 16 may operate power machinery. It is your responsibility to know what these regulations are in your area or situation.

2. Current OSHA regulations state in part: "At the time of initial assignment and at least annually thereafter the employer shall instruct EVERY employee in the safe operation of servicing of all equipment with which the employee is or will be involved."

3. Unqualified persons are to STAY OUT of the work area.

4. A person who has not read and understood all operating and safety instructions is not qualified to operate the machinery.

FAILURE TO READ THIS MANUAL AND ITS SAFETY INSTRUCTIONS IS A MISUSE OF THE EQUIPMENT.

SIGN OFF SHEET

As a requirement of OSHA, it is necessary for the employer to train the employee in the safe operation and safety procedures with this equipment. We include this sign off sheet for your convenience and personal recordkeeping.

Date	Employer's signature	Employee's signature

Watch for this symbol. it points out important safety precautions.
It means
“ATTENTION - BECOME ALERT!” YOUR SAFETY IS INVOLVED.

Occupational safety is of prime concern to the members of the AUGER AND ELEVATOR MANUFACTURERS COUNCIL. This manual was written with the safety of the operator and the others who come in contact with the equipment as our prime concern. The manual presents day to day work problems encountered by the operator and other personnel. We wrote this manual to help you understand safe operating procedures for the equipment listed in the following pages. We want you as our partner in safety.

It is your responsibility as an owner, operator or supervisor to know and instruct everyone using this grain elevator at the time of initial assignment and at least annually thereafter, of the proper operating instructions, precautions and work hazards which exist in the operation of this elevator in accordance with OSHA regulation 1928.57.

The annual statistics of the national safety council show that many people die or suffer serious injury in needless farming accidents every year

SAFETY IS NO ACCIDENT

The following safety instructions, combined with common sense, will save your equipment from needless damage and the operator from unnecessary exposure to personal hazard. Pay special attention to the caution notes in the text. Review this manual at least once each year with new and/or experienced operators.

TRANSPORT SAFETY

1. Keep children away form the Elevator when transporting and when preparing to transport.

PLACEMENT SAFETY

1. When the Elevator is in place, chock the wheels of the Elevator to keep it from moving..

2. Never position wheels on lumber or blocks to increase the Elevator discharge height.

ELECTRIC SAFETY

1. Electric motors and controls should be wired by a qualified electrician and meet all standards set by federal, state and local electrical codes.

2. A magnetic starter should be used to protect your motor.

3. Your motor must have a manual reset button.

4. Electrical power must be disconnected before resetting your motor.

5. The motor controls and reset button must be located so that the operator has a full view of the entire operation.

6. Make sure the power source is disengaged and all parts have come to a complete stop before making any adjustments or servicing the Elevator.

7. Keep all guards and shields in place when the Elevator is in operation.

8. A main power disconnect switch, with the ability to be locked in the off position, should be provided. the switch should be locked whenever work is to be done on the Elevator.

9. Keep clothing, hair and body away from all moving parts. it is a good idea to remove all jewelry before starting the operation.

OPERATIONAL SAFETY

1. During regular operation of the Elevator, one person should be in a position to monitor the operation. a second person should always be near by to shut down the Elevator in case of an emergency.

2. Visually inspect the Elevator periodically during operation for signs of unusual vibration, loose fasteners and noises.

3. Make sure everyone that isn't directly involved with the operation is out of the work area before operating or moving the Elevator.

4. Make sure all safety devices, shields and guards are in place and are functional before beginning operation.

SAFETY PRECAUTIONS

1. Keep away from all moving parts

2. Keep all belt guards and chain guards in place.

3. Disengage power before resetting motor.

4. Never attempt to clean, adjust or service the machine while it is in operation.

5. Keep work area clean of grease, oil, water, and/or other objects that could cause a slip or a fall.

NORMAL SHUTDOWN

Make certain that the Elevator is empty before stopping the unit. Lock out the power source before leaving the work area.

EMERGENCY SHUTDOWN

1. Should the Elevator be immediately shutdown under load, disconnect and lockout the power source. Clear as much material from the Elevator as you can. Never attempt to restart when full.

2. Starting the unit under load may result in damage to the Elevator. Such damage is considered abuse of the equipment.

3. Reconnect power source and clear Elevator gradually.

WORK AREA SAFETY

Under no circumstances should persons not involved in the operation be allowed to trespass into the work area.

It shall be the duty of all operators to see that children and/or other persons stay out of the work area! Trespass into the work area by anyone not involved in the actual operation, or trespass into the hazard area by anyone, shall result in an immediate shutdown by the operator.

It shall be the responsibility of all operators to see that the work area has secure footing, is clean and free of all debris, and tools which might cause accidental tripping and/or falling. It shall also be their responsibility to keep the work area clean and orderly during the operation.

PROTECT YOUR INVESTMENT AND GET MAXIMUM SERVICE AND VALUE, THROUGH:

1. PROPER ASSEMBLY..... Check the assembly against the instructions in this Manual to be sure that the elevator is "right" when it is delivered.

2. PROPER ADJUSTMENTS..... Make adjustments in the manner prescribed in this Manual.

3. PROPER MAINTENANCE..... Check the entire elevator periodically to detect lost, broken or inoperative parts. Replace them promptly with Genuine My-D Han-D parts.

4. PROPER OPERATION..... Be completely familiar with and follow the operational instructions that are provided in this manual.

5. PROPER LUBRICATION..... Follow our recommendations in this Manual with regard to frequency and coverage. Economize by using only high grade oil and lubricants.

Right and Left Side Determination

View elevator from "boot" or hopper end. As on all My-D Han-D equipment, right and left are determined by viewing the unit from the hopper end and looking up the unit.

Optional Equiment

- Swivel spout, extension spouts and covers
- 10' Tilt Hopper
- Shovel hopper
- Bale slide
- PTO drive (L.H. only)
- Right and left PTO drive
- Engine or motor mount
- Weight box

INDEX

OPERATING AND ADJUSTING

OPERATING SPEED: The elevator should run at 120 to 148 revolutions per minute on the boot shaft.

OPERATING AND SAFETY SUGGESTIONS

- **Make sure the elevator has been lowered and the transport lock engages the boom clevis prior to transporting. See Fig. 2, at the bottom of this page.**
- **Avoid excessive road speed.**
- **Use extreme caution when turning.**
- **Do no over inflate tires. This creates excessive bouncing when transporting.**
- **Keep shields in place. Remember "Safety is no accident."**
- **Never clean, lubricate or adjust the elevator while it is in operation.**
- **Under no conditions should the elevator be used as a ladder.**
- **Make certain everyone is clear of elevator before starting engine or operation.**
- **Have a qualified electrician connect wiring, starter, etc.**
- **For safety when transporting, attach a lamp to light bracket located at right upper end of head section.**
- **Always use a tractor to position the elevator for operation. Do not move elevator by hand.**
- **Do no pull away from a barn or crib unless the elevator is hooked to a tractor. Do not move elevator by hand.**
- **Check cable periodically for frayed or worn places. (Replace as required.)**
- **Elevator must be stabilized at the upper end when in operation.**

Lubrication Guide

Grease the Following Fittings Periodically

- **Boom roller (1).**
- **Basic drive idler sprocket (1).**
- **Wheel hubs (2).**
- **Tilt hopper idler sprockets and drive (5) optional.**
- **PTO shielded drive (2) optional.**
- **Brush oil on all chains liberally and often.**
- **Before storing elevator, oil elevator trough. We suggest wrapping an oil soaked rag or sack around a flight, then make one complete cycle with the conveyor.**

Hitching Elevator to Tractor

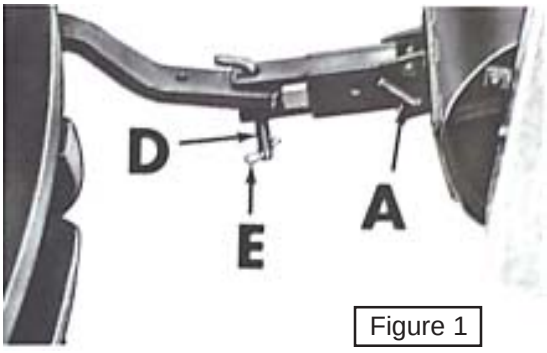


Figure 1

Fig. 1 - Before hitching elevator to tractor, support pin "A" must be installed as shown. Make sure to use pin clip "E" in hitch pin "D" prior to transporting.

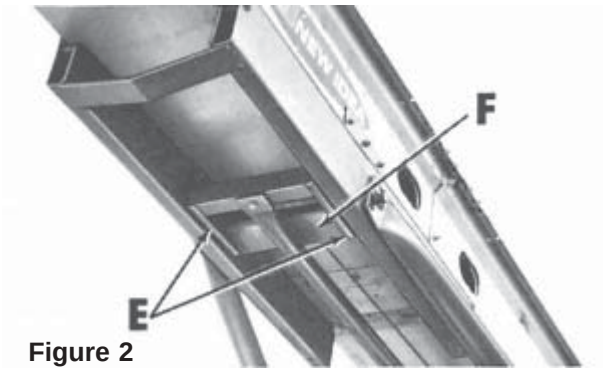


Figure 2

Fig. 2 - Never transport the elevator unless the transport lock assembly "E" is engaged with the boom clevis "F".

Note: Do not let the transport lock carry the entire weight of the sections. These two points should merely make contact. The cable must carry the weight.

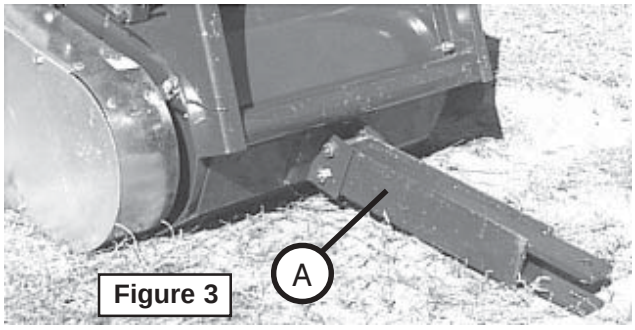


Figure 3

Fig. 3 - Before using the winch to raise the elevator, remove hitch "A".

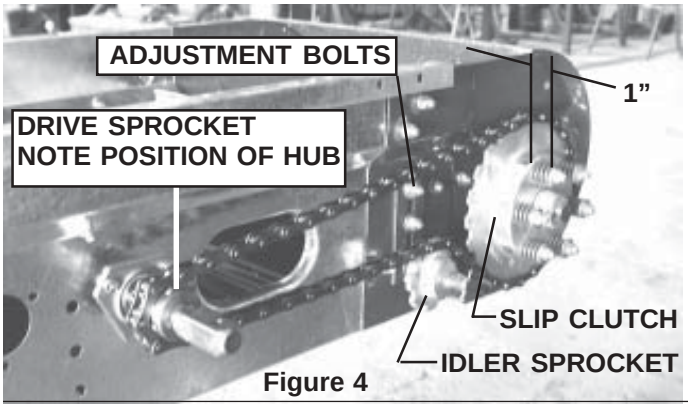


Figure 4

Drive Chain and Clutch

Fig. 4 - To adjust the drive chain, loosen adjustment bolts and adjust the idler sprocket to the point where the chain does not slip or jump teeth on the sprockets. Slip Clutch protects the conveyor. Should the clutch slip for no apparent reason, tighten clutch springs to approximately 1" as indicated.

Shelled Corn Screen

Figure 5

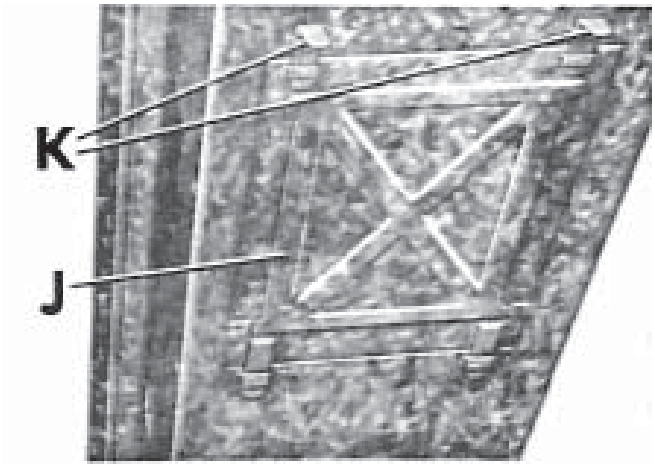


Figure 6

Figs. 5 & 6 - When elevating ear corn, and the operator should want to keep the shelled corn out of the crib, remove plate "A" (Fig. 5), this permits the shelled corn to filter through the screens onto lower trough. To remove shelled corn form lower trough, release latches "K" so door "J" (Fig. 6) can be removed. The shelled corn will now fall to the underside of the elevator.

Threading Cable on Hoist Drum

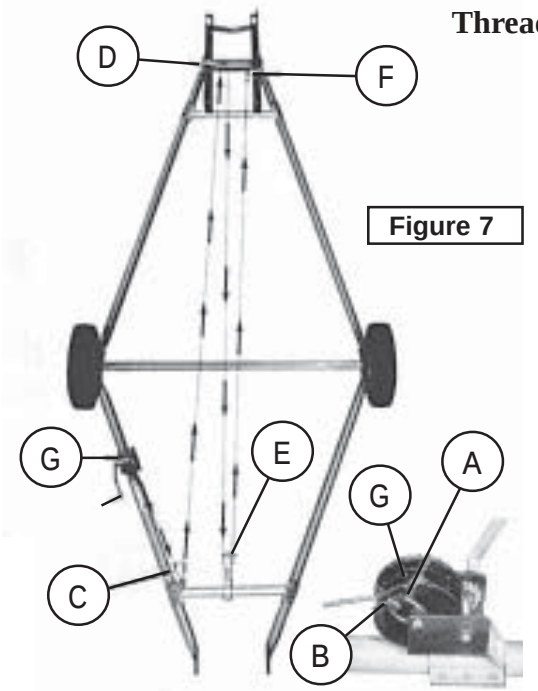


Figure 7

Fig. 7- should the cable ever be removed, reinstall it as follows:

1. Thread cable over top spool on winch, then around bottom of spool, then through hole in drum at "A", then around spool shaft and fasten to side of reel at "B" with clamp using (2) carriage bolts as shown.
2. Thread the other end of cable around roller at C". Thread cable around boom roller at "D", then around roller at "E", then to anchor at "F".
   Note: the "U" bolt clamp goes over the short end of cable.
3. Wind three wraps of cable (or more) on the drum as shown at "G".
4. Adjust cable according to the truck being used. See pages 11, 11A & 13, Fig. 24. Tighten clamp bolts securely.

Note:

Do not alter cable, it is cut to proper length at the factory. Maintain a minimum of three wraps of cable on winch drum at all times.

When winding cable on spool, pull cable tight so it winds evenly over spool.

Spool on winch must be aligned with cable pull. loosen winch mounting bolts and adjust accordingly.

CAREFULLY INSPECT THE CABLE INSTALLATION

"YOUR SAFETY IS INVOLVED!"

Conveyor Chain

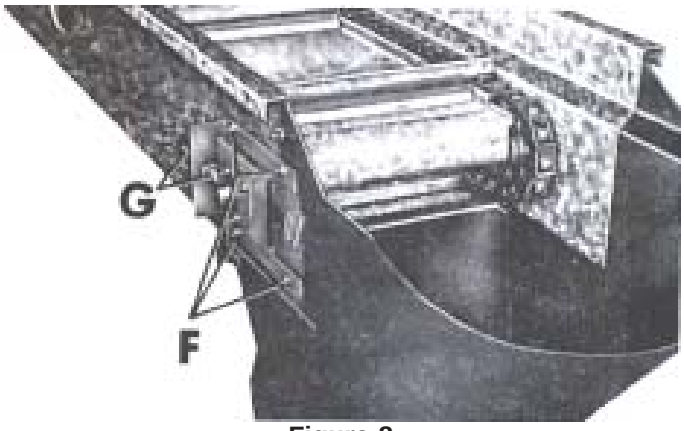


Figure 8

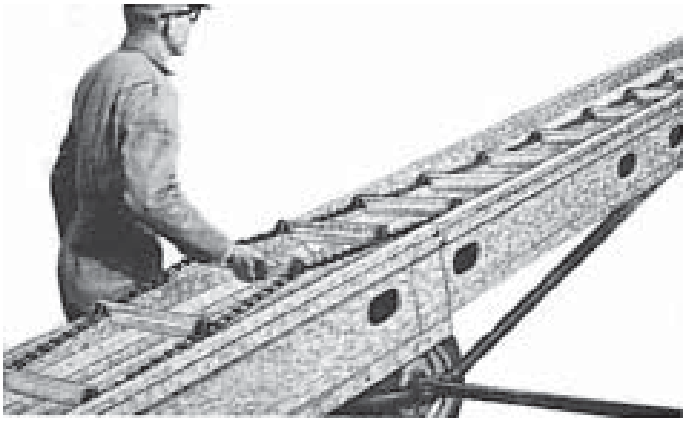


Figure 9

Figs. 8 & 9 - To adjust the conveyor chain, loosen nuts "F" (Fig. 8) on both sides of head section. Adjust nuts "G" (both sides) on tightener bolts to the point that when the conveyor is lifted, as shown in Fig. 9, the chain will come flush with the top of elevator side. Note: Stand just ahead of boot section when doing this.

Elevator Balance

BE CAREFUL!

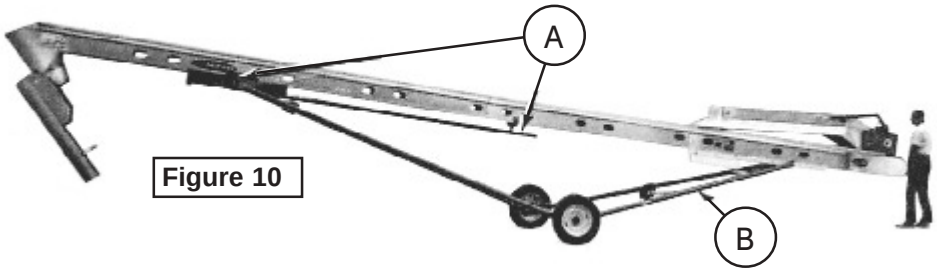


Figure 10

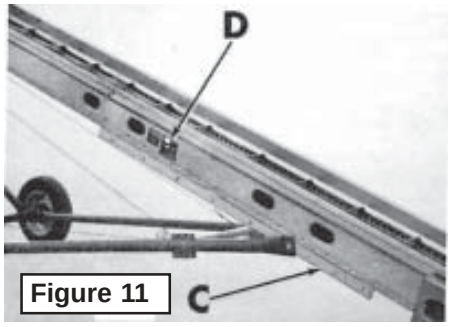


Figure 11

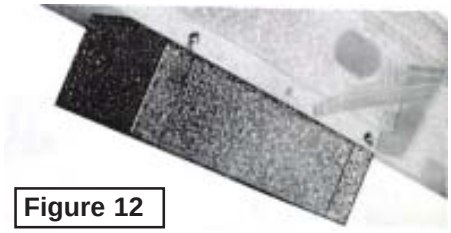


Figure 12

Fig. 10, 11, & 12 - When adding or removing options, such as the tilt hopper, swivel spout, shovel hopper, etc., it will be necessary to rebalance the elevator for ease of maneuverability.

NOTE: The transport lock and tube restraint indicated at "A" (Fig. 10) will have to be relocated when options are added or removed or if the length of the elevator is altered. See pages 14 & 15, Figs. 32, 33, 34,35 and 35A.

Elevator must be balanced in accordance with chart on page 11A and have a minimum tail weight of 75 lbs.

EXAMPLES

1. If a tilt hopper is being attached, reposition sub frame "B" (Fig. 10) in one of the (7) holes found in the support angle "C" (Fig. 11). Since weight is being added to the boot, the sub frame must be repositioned to the lower end of the boot to counter balance.
2. If swivel head or spouts are being attached, sub frame "B" (Fig. 10) will have to be relocated higher on support angles "C" (Fig. 11).

NOTE:

A. If you cannot balance the elevator as described above, more weight must be added to the lower end of the elevator. Fig. 12 illustrates a counter weight box that is available in cases like this. It can be filled with sand, gravel, dirt, etc., as required.
B. Do not alter cable length, it is pre-set at the factory and should require no alterations.
D. The elevator can be raised until the boom strikes the trough restraint.
E. Plate "D" (Fig. 11) automatically registers the degree of elevation as the elevator is being raised.

IF THE ELEVATOR NEEDS TO BE MOVED IN THE RAISED POSITION, HOOK IT TO A TRACTOR BEFORE MOVING. DO NOT MOVE ELEVATOR BY HAND.

SHIPPING BUNDLES AND ELEVATOR LENGTHS

SHIPPING BUNDLES (REQUIRED)

620351	1’ BOOT SECTION
620369	10’ LOWER SECTION
620377	10’ HEAD SECTION
660308	LONG AXLE ASSEMBLY

SHIPPING BUNDLES (OPTIONAL)

660431	REGULAR TRUCK HOIST BUNDLE
660241	REGULAR TRUCK “A” FRAME
660274	REGULAR TRUCK BOOM FRAME
660407	LONG TRUCK HOIST BUNDLE
660217	LONG TRUCK “A” FRAME
660183	LONG TRUCK
660365	TROUGH RESTRAINT BUNDLE (REGULAR)
660332	TROUGH RESTRAINT BUNDLE (LONG)
620385	5’ CENTER SECTION
620393	10’ CENTER SECITON
620401	10’ CHAIN BUNDLE #55
620419	10’ CHAIN BUNDLE #62
620427	SWIVEL HEAD
620435	1ST 4’-0” SPOUT SECTION
620443	4’-0” SPOIUT SECTION
620450	SHOVEL HOPPER
620468	BALE SLIDE
620492	REGULAR BOOM ROLLER
620500	LONG BOOM ROLLER
620526	PTO SHIELDED DRIVE
620534	ENGINE DRIVE
620641	DOWNSPOUT COVER BUNDLE
620559	10’ TILT-UP HOPPER WITH CHAIN
620666	OPPPOSITE SIDE DRIVE PARTS
620476	WHEEL BUNDLE, 14” x 5”
620484	WHEEL BUNDLE 15” x 4-1/2”
	WEIGHT BOX BUNDLE

Summary of basic requirement for assembly of each of the five available elevator lengths.

Note: Each Elevator must have: 1' Boot, 10' Lower Section and 10' Head Section, plus the Center Section or Sections specified according to Elevator Length, see column 2.
WE DO NOT RECOMMEND ANY ALTERATIONS IN LENGTH OTHER THAN WHAT IS SPECIFIED IN COLUMN 1 & 4.

Total Feet	Center Sections	10’ Chain Bundles	Truck Assembly	Hoist Assembly	Boom Roller
31	10’	6	Regular	Regular	Regular
36	5’ & 10’	7	Regular	Regular	Regular
41	(2) 10’	8	Long	Long	Long
46	(1) 5’ & (2) 10’	9	Long	Long	Long
51	(3) 10’	10	Long	Long	Long

Recommended Gas Engine or Electric Motor Horsepower for Elevator Handling Maximum Load.

Elevator Length	Gasoline Engine	Electric Motor
31’ & 36”	5 HP, 2400 RPM, single cylinder, air-cooled	2 HP, single phase, 220 volt, 1800 RPM
41’, 46’ & 51’	8 HP, 2400 RPM, single cylinder, air-cooled	3 HP, single phase, 220 volt, 1800 RPM

Important Note: Horsepower need only be adequate to Elevator Usage.
Add 2 HP when using a 10’ tilt-up hopper.

ASSEMBLY PROCEDURE

Important Pre-Assembly Notes

- The bulk and weight of the elevator makes assembly a two-man job.
- Elevator sections should be assembled on a level surface.
- Because it is necessary to raise the head end about 12 feet, to attach the truck after elevator sections have been joined, use of a mechanical hoist or loader is advised.
- The top flange of one end of each elevator section is cut away about three inches. The other end is flush. When sections are joined the flush end fits over the cutaway end.
- Sections go together more easily if flush end (of section to be added) is raised a few inches so it can be forced down and into the cutaway end of the section to which it is being added.
- Use a drift punch to align bolt holes. Rigidity of elevator will be sacrificed if bolt holes are enlarged by drilling.
- Bolt heads should be inside elevator sections, in the recesses provided, to avoid interference with conveyor chain.
- A slight sag or bow in the middle of the elevator is normal.
- Sort out bolts according to size and quantity.

Attaching Boot to Lower Section

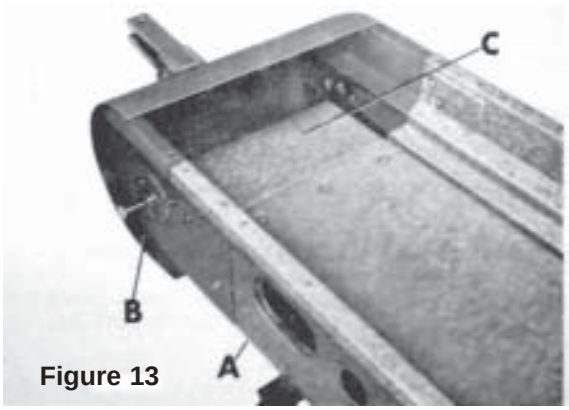


Fig. 13-
1. Attach boot “B” to lower section “A”, using 3/8” x 3/4” machine bolts.
2. Use 3/8” x 3/4” machine bolts to attach shield “C” to top deck of section “A” as shown.

Joining Sections sections

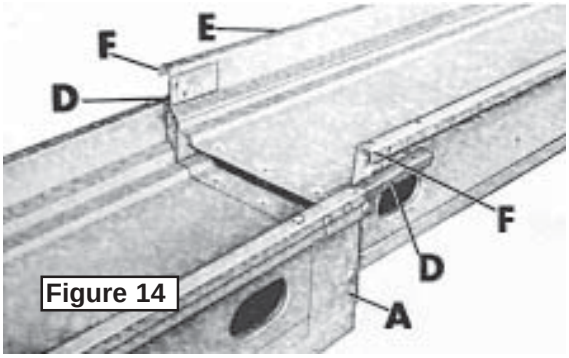


Fig. 14 -
1. Use 3/8" x 3/4" machine bolts to attach splice angles “D” to flush end of section “A”.
2. Align section “E” with section “A”.
3. Join the sections by raising section “E” to enable a downward and inward push into “A” and fitting flanges “F” over splice angles “D”.
4. Bolt the sections together, using 3/8" x 3/4" machine bolts. Do not tighten bolts. Use a level to align sections as perfect as possible
5. When required number of center sections have been attached, attach the head section. Recheck the alignment of all sections. Tighten all bolts.

Conveyor Chain

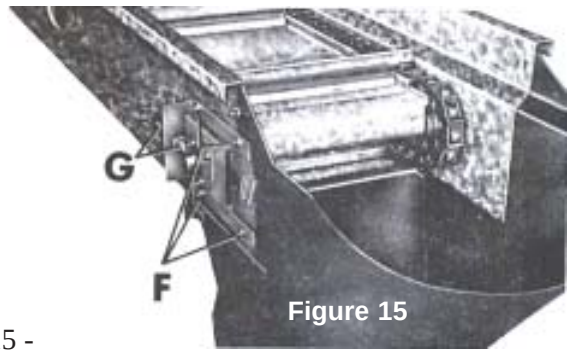


Fig. 15 -
1. Lay 10-ft. sections of chain on elevator top deck, with flights leading in direction of chain travel, as shown
2. Join these sections of chain.
3. Thread chain over sprockets in boot.
4. Attach long rope or wire to first flight and pull conveyor chain toward head (inside the elevator), adding more sections of chain as required.

   Note: One extra link is attached to each bundle of conveyor chain. Add these links to the chain sections as they are being installed. Overall length of elevator will determine number of links needed.
5. After installing the conveyor chain, adjust it as follows.
   a. Loosen nuts “F” (both sides).
   b. Adjust nuts “G” (both sides) on tightener bolts to the point that when the conveyor is lifted, as shown in Fig. 9, page 7, the chain will come flush with the top of elevator side.

Note: Stand just ahead of boot sections when checking chain tightness.

Drive Shaft and Clutch

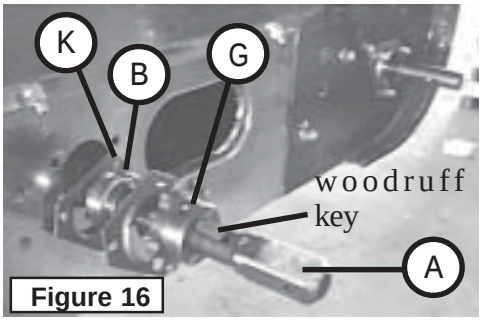


Figure 16

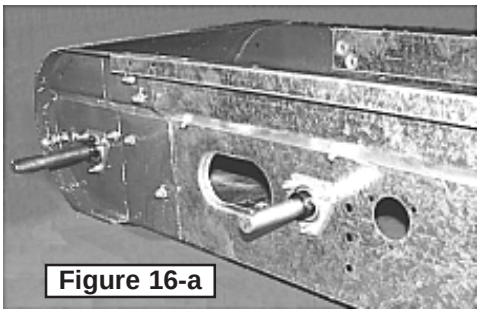


Figure 16-a

Fig. 16-16a-16b

1. Use 5/16" x 3/4" machine bolts to attach bearings "B" to elevator sides (except use 1" bolt at "K").
2. Put woodruff key in shaft "A"; follow with sprocket and locking collar. Insert shaft through bearing "B", from the left side.
3. Install bearing with locking collar on other end of shaft "A" (Fig.16-a). Don't tighten the setscrews in collars and sprocket until drive chain has been aligned.
4. Remove nuts, washers and springs from clutch assembly then lift off (as a unit if possible) the pressure plate, fiber facing, hub and metal facing, so 22-tooth sprocket "C" can be put on boot shaft.
5. Put no. 15 woodruff key "D" into boot shaft.
6. Reassemble clutch, fitting keyed hub about 1/32" over inner end of key.

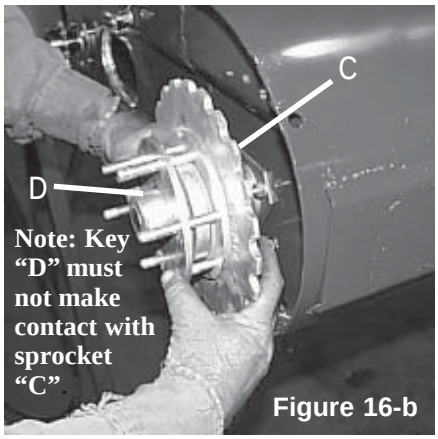


Figure 16-b

Clutch Springs and Drive Chain

Fig. 17 -

1. Fasten clutch assembly to boot shaft with 3/8" x 1/2" set screw "E".
2. Compress springs to about 1" but do not overtighten and minimize clutch safety factor.
3. Install chain "F".
4. Line up sprocket "G" (Fig.16) with sprocket "C" (Fig17). Tighten setscrews in locking collars and sprockets at this time.
5. Install idler bracket "H", with sprocket, using 3/8" x 1" machine bolts and 7/16" I.D. x 1" O.D. x 5/64" washers. Adjust idler "H" to the point where the chain will not skip or jump teeth on sprockets.

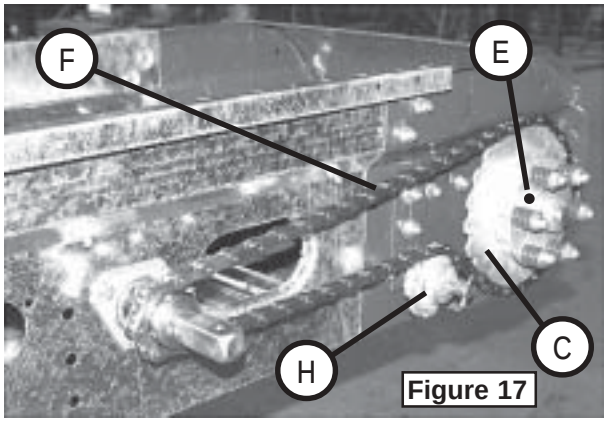


Figure 17

Drive Chain Shield

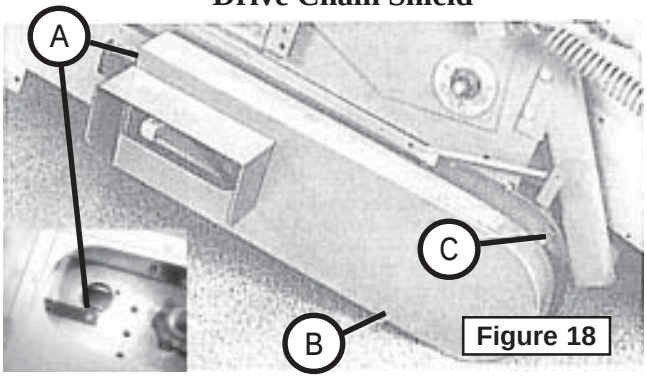


Figure 18

Fig. 18 -

1. Attach shield using a 5/16" x 3/4" machine bolt at "A" through elevator side.
   NOTE: Use three 5/16" I.D. x 3/4" O. D. x 1/16"washers as spacers between bracket and elevator side
2. Fasten to bolt at "B" with anpother nut and lock washer. Clip goes between the hex nuts.
3. Use a 3/8" x 3/4" machine bolt at "C".

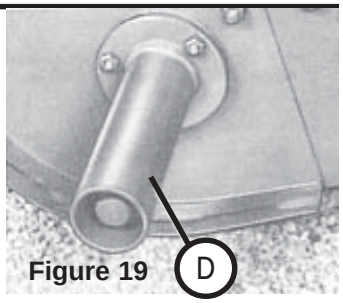


Figure 19

Fig. 19 -

Note: This shield is not used if a tilt hopper is being installed. Otherwise, proceed as follows: Attach the boot drive shaft shield "D" to the bolts found in the bearing flangettes. Do no remove the nuts found on those bolts, simply fit the shield over the bolts and attach in place, using (3) 5/16" nuts.

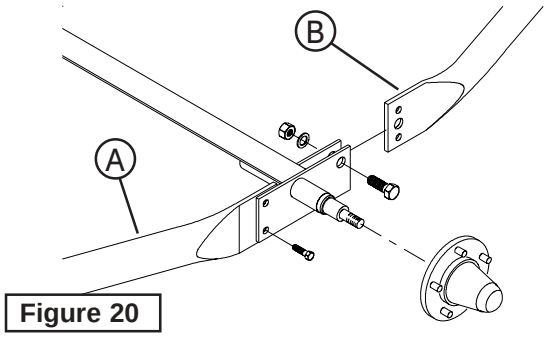


Figure 20

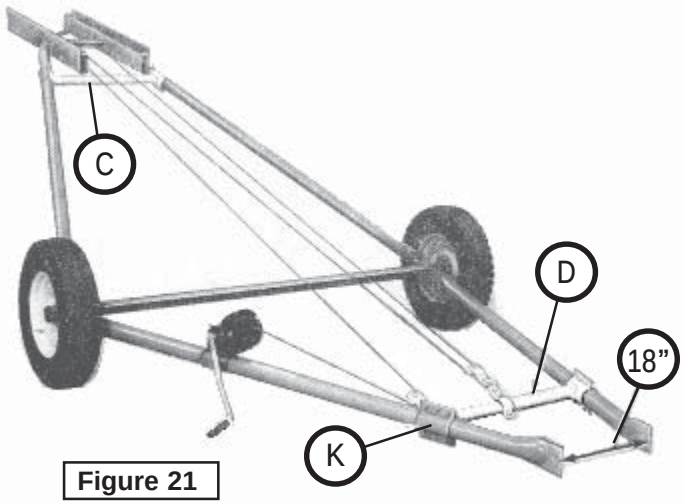


Figure 21

Figs.20,21 & 22
Note: see chart on page 8, for elevator length and truck information.

1. Bolt wheels to hubs using hub bolts found in the bag of parts.
2. Attach Axle Arms, 120" long (Item "A" Fig. 20) to inside of axle using 1/2" x 1" machine bolts with locknuts. Axle Arm with winch mounting pad goes to left hand side as shown in figure 21. Tighten bolts.
3. Insert the Lift Arms, 118" long (Item "B" Fig. 20) between clevis on axle and bolt in place using 3/4" x 2", grade 5 machine bolts with locknuts. End of lift arm with single hole goes to upper end. The lower end has (3) holes. The center hole is the mounting hole. Tighten the bolts to the point where the Lift Arms are free to pivot.
4. Fit boom roller shaft "E" (Fig. 22) into holes on Lift Arms and secure in place using 1-1/32" I.D. x 2" O.D. x 1/8" washers with 5/16" x 1-1/4" cotter pins.
   Note: Reinforcement brace "L" goes toward the lower end.
5. Install upper and lower braces "C" & "D" (Fig. 21) with clamps on Axle Arms and Lift Arms, using 3/8" x 1-1/4" machine bolts with locknuts. **Do not tighten bolts**.

6. Fit clevis "F" (Fig. 22) over boom roller shaft "E". Insert cable roller "G" into clevis. Secure in place using a 1/2" x 2" Grade 5 machine bolt with locknut. Insert the bolt from the bottom up.

   Note: Roller must be free to turn.

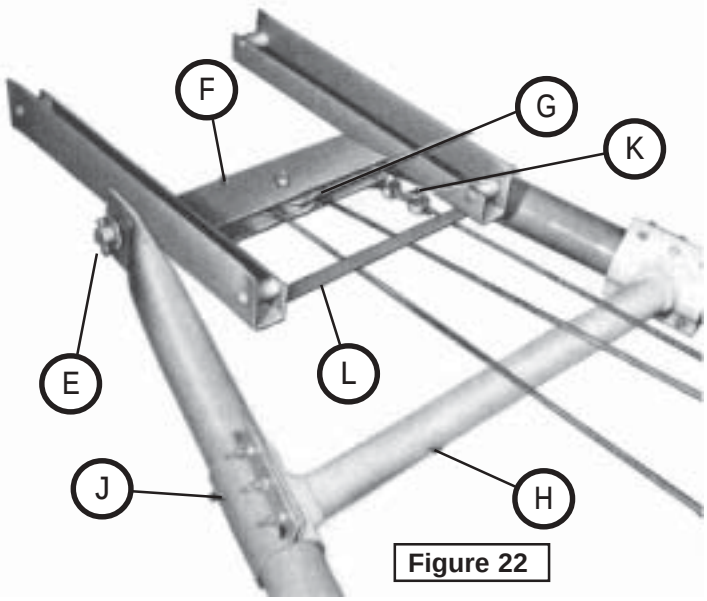


Figure 22

7. Check to see that the boom roller shaft "E" (Fig. 22) and the clevis "F" are free to pivot. Adjust brace "H" up or down to attain free movement of boom roller assembly. Align brace so it is parallel with the axle. Then tighten bolts in clamps "J" (both sides).

8. Adjust brace "D" (Fig. 21) to attain an 18" dimension between the Axle Arms, as indicated. Align brace so it is parallel with the axle. Tighten bolts in clamps "K" (both sides). Then recheck the 18" dimension.

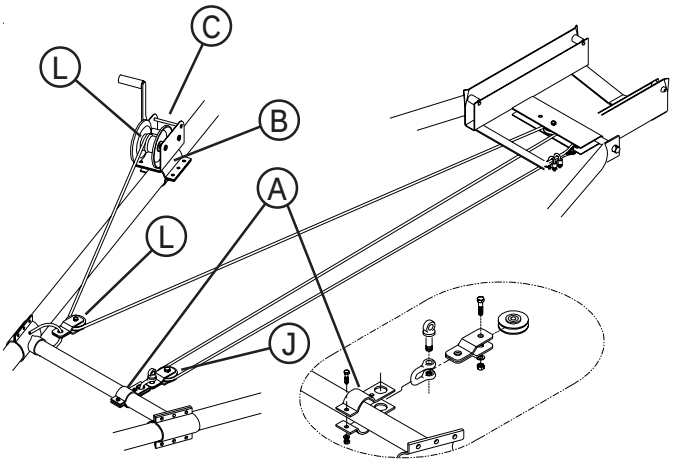


Figure 23

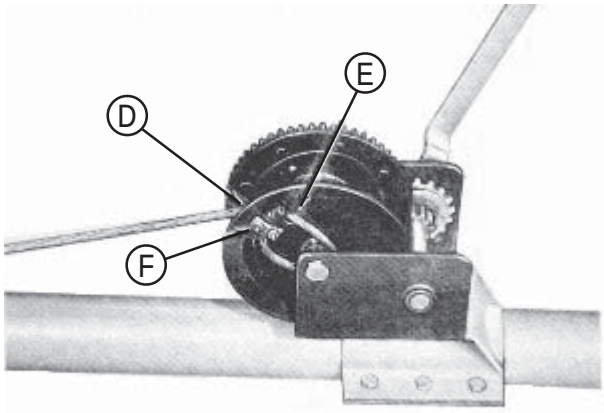


Figure 24

Follow the winch and cable instructions carefully!
The operator's safety is involved

Fig. 23,24 & 25

1. Attach clamps "A" (Fig. 23) for roller anchor to center of brace pipe using 3/8" x 1-1/4" machine bolts with locknuts. Snug nuts but do not tighten completely. Fit clevis through holes in clamps. Bolt roller assembly to clevis using a 1/2" x 2" grade 5 machine bolt with locknut. Tighten this bolt
2. Bolt the winch mounting bracket assembly "B" (Fig. 23) to the mounting bracket using 3/8" x 1-1/4" machine bolts with locknuts. Brackets point toward boot end. Tighten bolts
3. Bolt the winch "C" (Fig. 23) to the mounting bracket using (2) 3/8" x 1" grade 5 machine bolts with (2) 13/32" ID x 1" OD x 1/8" washers next to slotted holes through the front side. Snug bolts.
4. Thread cable over the top of spool at "D" (Fig. 24), around bottom of spool, and up through hole in reel at "E". Then thread cable around spool shaft and fasten to reel at "F" with clamp using (2) carriage bolts as shown.
5. Thread the other end of cable around roller at "G" (Fig. 23), then around boom roller "G" (Fig. 22 - pg. 11), then around roller "J" (Fig. 23), then through hole in anchor bracket at "K"(Fig. 22). Use a thimble in the anchor bracket. Fasten cable at "K" with (2) cable clamps. "U" bolts go over short end of cable. Allow approximately 2" of cable to protrude through clamps. Tighten bolts.
   NOTE: cable goes below brace "L" (Fig. 22).
6. Wind three wraps of cable on the drum as shown at "L" (Fig. 23). Spool on winch must be parallel with cable pull. Align winch and tighten the mounting bolts.
7. Turn crank on drum to attain 16'-8" from center of boom roller shaft to center of holes in end of sub frames as indicated in Figure 25. A minimum of three complete wraps of cable must be on the winch drum with this dimension.
   Note: do not alter cable, it is cut to proper length at the factory. Maintain a minimum of three wraps of cable on winch drum at all times. When winding cable on spool, pull cable tight so it winds evenly over spool.
8. Check to see that cable clamp assembly "A" (Fig. 23) is parallel with the cable. Align accordingly and tighten bolts.

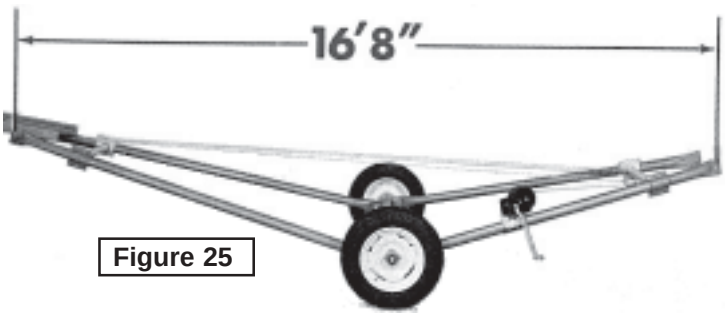


Figure 25

Long Truck
AXLE, WHEELS, BOOM AND SUB FRAME

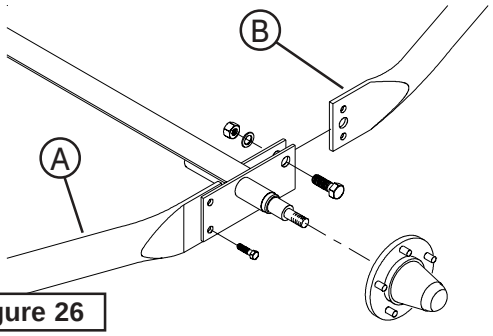


Figure 26

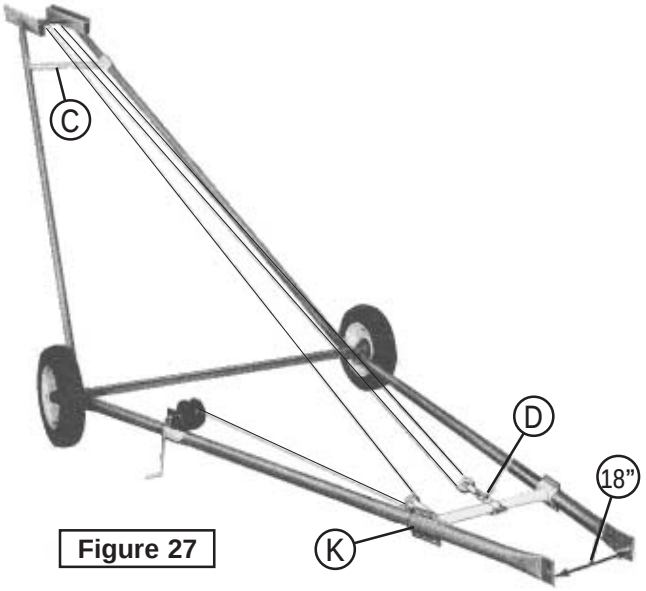


Figure 27

Figs. 26, 27 & 28-
Note: see chart on page 8, for elevator length and truck information.

1. Bolt wheels to hubs using hub bolts found in the bag of parts.
2. Attach Axle Arms, 147-1/2" long (Item "A" Fig. 26) to inside of axle using 1/2" x 1" machine bolts with locknuts. Axle Arm with winch mounting pad goes to left hand side as shown in figure 27. Tighten bolts.
3. Insert the Lift Arms, 188" long (Item "B" Fig. 26) between clevis on axle and bolt in place using 3/4" x 2", grade 5 machine bolts with locknuts. End of lift arm with single hole goes to upper end. The lower end has (3) holes. The center hole is the mounting hole. Tighten the bolts to the point where the Lift Arms are free to pivot.
4. Fit boom roller shaft "E" (Fig. 28.) into holes on Lift Arms and secure in place using 1-1/32" I.D. x 2" O.D. x 1/8" washers with 1/4" x 1-1/2" cotter pins.
   Note: Reinforcement brace "L" goes toward the upper end.
5. Bolt upper and lower braces "C" & "D" (Fig. 27) with brackets on Axle Arms and Lift Arms, using 3/8" x 1-1/4" machine bolts with locknuts. **Do not tighten bolts**.

6. Fit clevis "F" (Fig. 28) over Lift Arm shaft. Punched tabs in hole for pin goes to top. Insert cable roller "G" into clevis. Secure in place using 3/8" x 1-1/4" machine bolts with locknuts. Insert the bolt from the top down.
   Note: Roller must be free to turn.

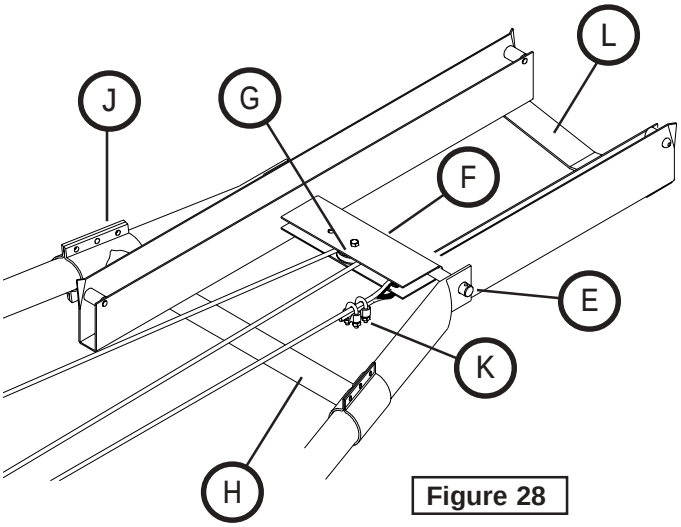


Figure 28

7. Check to see that the boom roller shaft "E" (Fig. 28) and the clevis "F" are free to pivot. Adjust brace "H" up or down to attain free movement of boom roller assembly. Align brace so it is parallel with the axle. Then tighten bolts in clamps "J" (both sides).

8. Adjust brace "D" (Fig. 27) to attain an 18" dimension between the Axle Arms, as indicated. Align brace so it is parallel with the axle. Tighten bolts in clamps "K" (both sides). Then recheck the 18" dimension.

Long Truck
Winch and Cable

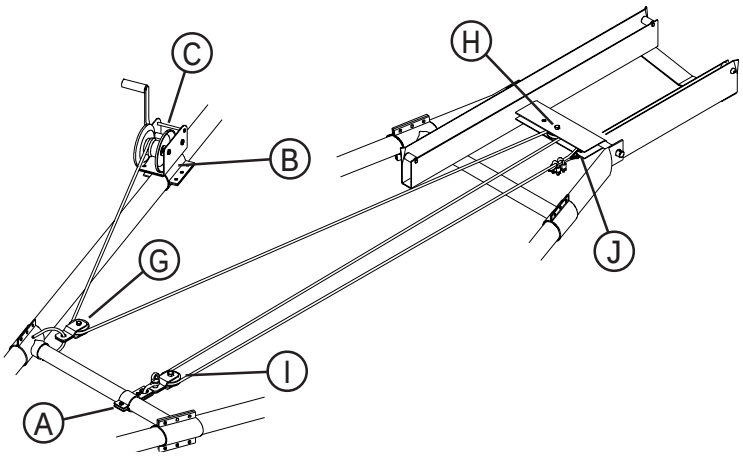


Figure 29

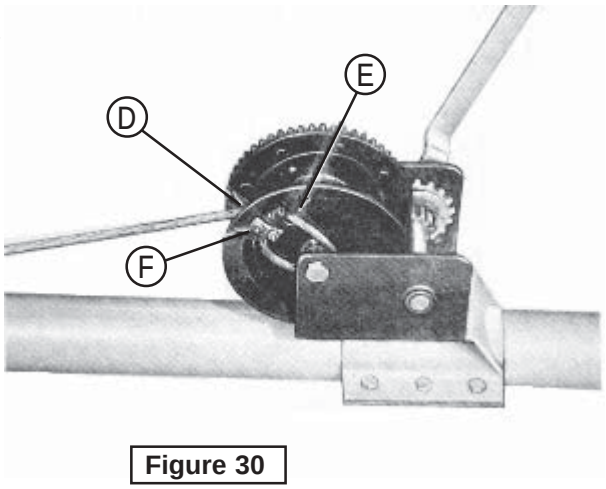


Figure 30

Follow the winch and cable instructions carefully!
<u>The operator's safety is involved</u>

Fig. 29,30,31

1. Attach clamps "A" (Fig. 29) for roller anchor to center of brace pipe using 3/8" x 1-1/4" machine bolts with locknuts. Snug nuts but do not tighten completely. Fit clevis through holes in clamps. Bolt roller assembly to clevis using a 1/2" x 2" grade 5 machine bolt with locknut. Tighten this bolt
2. Bolt the winch mounting bracket assembly "B" (Fig. 29) to the mounting bracket using 3/8" x 1-1/4" machine bolts with locknuts. Brackets point toward boot end. Tighten bolts
3. Bolt the winch "C" (Fig. 29) to the mounting bracket using (2) 3/8" x 1" grade 5 machine bolts with (2) 13/32" ID x 1" OD x 1/8" washers next to slotted holes through the front side. Snug bolts.
4. Thread cable over the top of spool at "D" (Fig. 30), around bottom of spool, and up through hole in reel at "E". Then thread cable around spool shaft and fasten to reel at "F" with clamp using (2) carriage bolts as shown.
5. Thread the other end of cable around roller at "G" (Fig. 29), then around boom roller "H" (Fig. 29), then around roller "I" (Fig. 29), then through hole in Boom Roller Clevis at "J" (Fig. 29). Use a cable thimble in the anchor bracket. Fasten cable at "J" with (2) cable clamps. Cable clamp goes over short end of cable. Allow approximately 2" of cable to protrude through clamps. Tighten bolts.
6. Wind three wraps of cable on the winch drum. Spool on winch must be parallel with cable pull. Align winch and tighten the mounting bolts.
7. Turn crank on drum to attain 16'-8" from center of boom roller shaft to center of holes in end of sub frames as indicated in Figure 31. A minimum of three complete wraps of cable must be on the winch drum with this dimension.
   <u>Note</u>: do not alter cable, it is cut to proper length at the factory. Maintain a minimum of three wraps of cable on winch drum at all times. When winding cable on spool, pull cable tight so it winds evenly over spool.
8. Check to see that cable clamp assembly "A" (Fig. 29) is parallel with the cable. Align accordingly and tighten bolts.

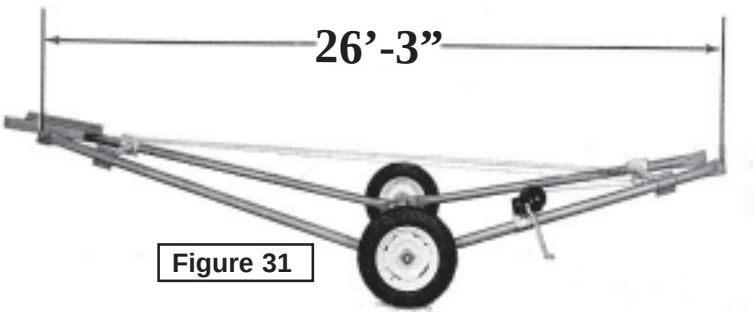


Figure 31

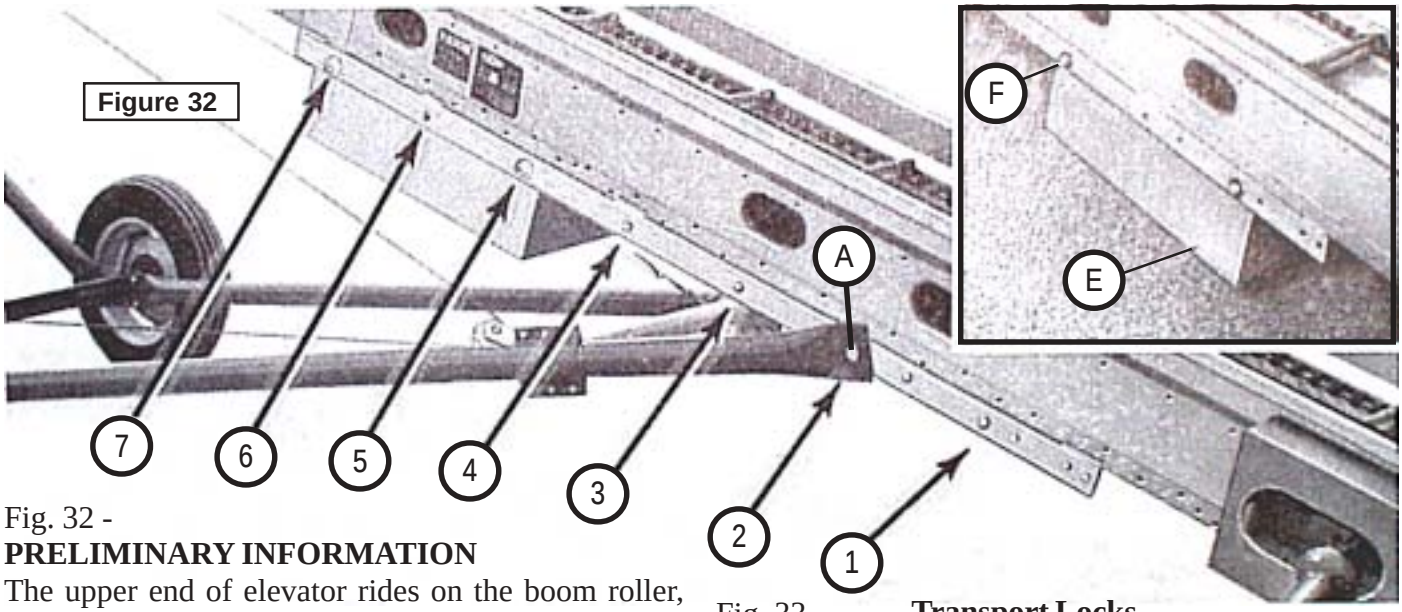


Fig. 32 -

PRELIMINARY INFORMATION

The upper end of elevator rides on the boom roller, attached to upper end of boom frame. The lower end is attached to the sub frame of the truck.

As a general rule the shorter the overall length of the elevator, the closer to the boot the sub-frame should be attached. For example: hole 1 or 2 would be used with a 31-foot elevator; 3 or 4 with a 41-foot; 5 or 6 with a 46-foot; and 6 or 7 with a 51- foot elevator. It must be balanced to have a minimum weight of 75lbs. when lifting the boot end for ease of maneuverability. The balance is affected by such things as, type of drive used & optional equipment used (tilting hopper, swivel spout with extensions). See page 7, figures 10, 11 & 12 for complete balance information.

Proceed as follows:

1. Use a loader or hoist to lift the head end of the trough high enough to move the truck assembly below the trough.

Be Careful! Your safety is involved.

2. Lower the trough until the upper end of the trough rests on the boom roller assembly.
3. Attach the sub frame to one of the seven holes in angles as shown at "A", using 3/4" x 2", grade 5 machine bolts with 5/16" long bushings inside holes in angles with flat-washers & locknuts.Tighten bolts.

Note: Use one of the seven holes in angles to attain proper elevator balance. See Figure 57.

4. If needed, install the weight box "E" to the rails below boot frame using (4) 1/2" x 1" machine bolts with 1/8" thick washers and locknuts. Note: Locate box on rails to position best suited. The front bolts "F" can be removed and the box hinged to fill with material for weight. Tighten bolts securely.

Fig. 33 - **Transport Locks**

The transport locks must be positioned as indicated for safe operation. **Be careful! The operator's safety is involved.**

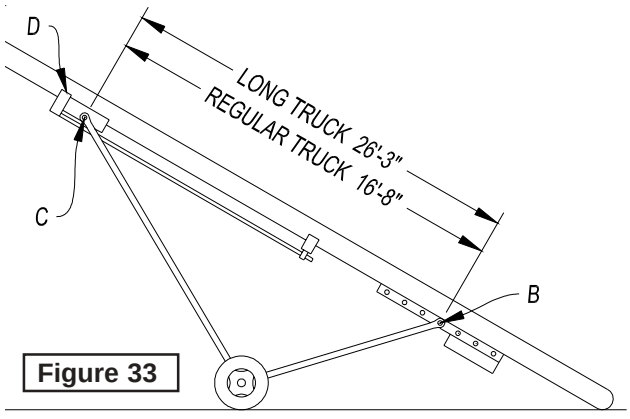
These dimensions are taken from the center of the sub frame pivot bolts at "B" to the center of the boom frame pivot shaft at "C". Transport lock "D" must be located and attached to the sides of the elevator to retain these dimensions.

A minimum of 3 complete wraps of cable on the winch spool must be maintained along with the indicated dimensions prior to installing the lock.

The full weight of the elevator must be on the truck when checking the dimensions.

If for any reason the sub frame pivot bolts at "B" are relocated to any of the seven holes in the angles (due to a change in the options or elevator length) the transport lock must be relocated to maintain these dimensions. The trough restraint will also have to be relocated to maintain the dimensions indicated on page 16, Chart "A".

Install the transport lock as described in Figure 34.



Transport Locks

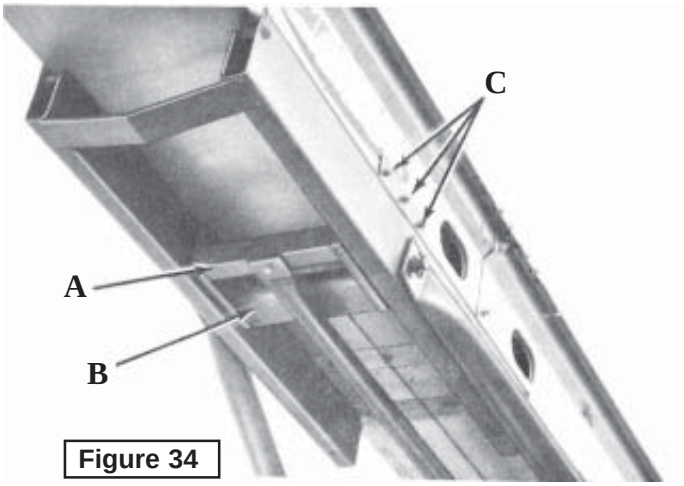


Figure 34

Fig. 33 -

1. Recheck the dimensions shown in Figure 24 for the respective elevator. The full height of the elevator must be on the truck when checking these dimensions. Check to see that a minimum of three complete wraps of cable is on the winch drum.
2. Fit the transport lock "A" down over the clevis "B" the full extent of the slots in the locks.
3. Use the holes in the lock at "C" (both sides) as a template to drill holes in elevator sides. Attach the locks using 3/8" x 1" grade 5, machine bolts with lock nuts, nuts go to the outside. Tighten bolts.

Trough Restraints

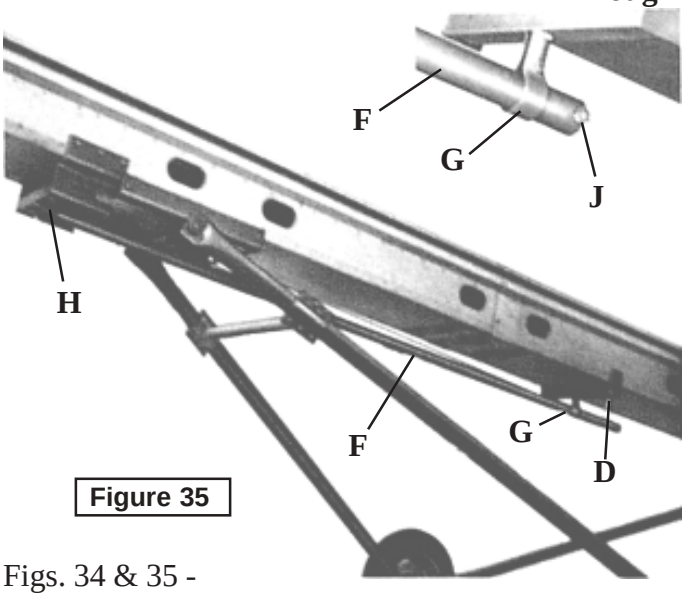


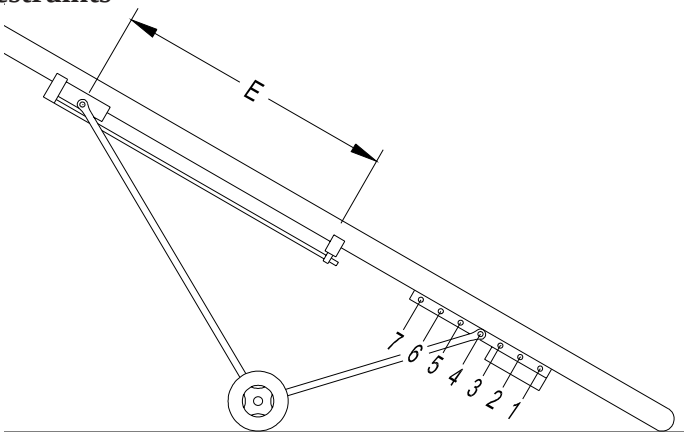
Figure 35

Figs. 34 & 35 -

The trough restraint must be installed as illustrated and described for the safety of the operator.

Proceed as follows:

1. Lower the elevator so the transport lock makes full engagement with the boom clevis as shown in Figure 33.
2. Position mounting bracket "D" with flat of angle toward head section. Locate bracket 1" from end of tubing. Hole used in sub frame (1 thru 7) must be considered prior to locating mounting bracket. See page ??, Figure 21 for identification of regular boom roller. See page 12, Figure 27, for identification of long boom roller. Use the holes in the mounting bracket "D" (both sides) as a template to drill holes in elevator sides. Attach bracket using 3/8"x 1" grade 5, machine bolts with locknuts, nuts go to outside. Tighten bolts



3. Fit tube "F" below the trough and through support "G" at the lower end. Bolt to bottom side of transport lock at "H" using a 1/2" x 2" grade 5, machine bolt with locknut. Use a 5/16" x 1-3/4" machine bolt with locknut in clamp at "G". Insert a 1/2" x 2-1/4" machine bolt iwth locknut through end of tube at "J". Tighten bolts.

Note: If for any reason the truck is repositioned on the sub frame (due to a change in options or elevator length) the trough restraint must be repositioned according to the chart below.

	REGULAR TRUCK WITH		LONG TRUCK WITH LONG BOOM ROLLER
	REG. BOOM ROLLER	LONG. BOOM ROLLER	
SUB FRAME HOLE NO.	"E" DIMENSION	"E" DIMENSION	"E" DIMENSION
"1"	7'-3"	8'-3"	9'-9"
"2"	8'-3"	9'-3"	10'-9"
"3"	9'-3"	10'-2"	11'-9"
"4"	10'-2"	10'-2"	12'-9"
"5"	10'-2"	10'-2"	13'-8"
"6"	10'-2"	10'-2"	13'-8"
"7"	10'-2"	10'-2"	13'-8"

Chart A

INSTALLATION OF OPTIONAL EQUIPMENT

Motor Mount and Sheaave

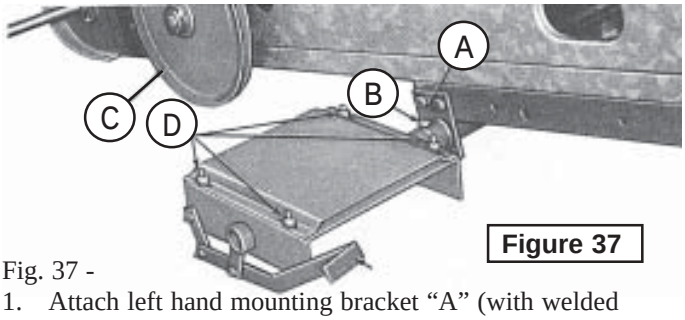


Figure 37

Fig. 37 -

1. Attach left hand mounting bracket “A” (with welded sleeve) and right hand bracket (plain) to end holes in truck support angles using 1/2" x 1-1/4" machine bolts. Tighten bolts.
2. Insert pipe on base assembly through mounting bracket holes and fasten to welded sleeve at “B” using a 3/8" x 2-1/2" machine bolt. Use hole best-suited so base plate sets level as possible.
3. Attach 14" pulley “C” onto elevator drive shaft using a 3/8" x 2-1/2" machine bolt. Tighten bolt.
4. Install a 3" pulley on the motor or engine shaft. It is keywayed for 1/4" x 1-1/2" long square key and is secured with two 3/8" x 1/2" set screws.
   Fit motor to base, align sheaves and drill mounting holes through base.

Note: Bolts “D” enable movement of the plate for belt adjustment. Throw-out lever “E” is for use to disengage the drive without stopping the engine.

Belt Shield

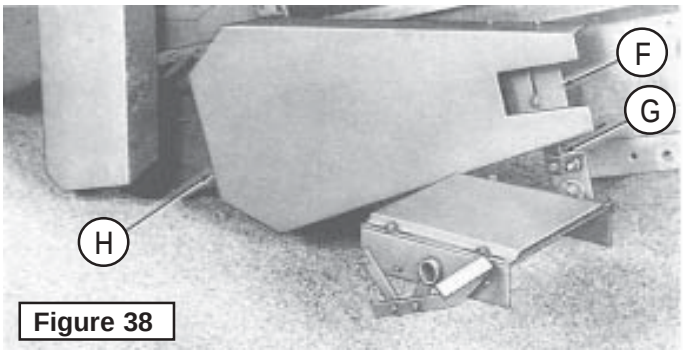


Figure 38

Fig. 38 - Attach back guard “F” to belt shield using (4) #14 x 1/2" tapping screws. Attach mounting bracket “G” to guard “F” using a 3/8" x 1" machine bolt with flat washer next to slotted hole. Attach bracket “G” to bolt found in engine mounting. Attach lower end of shield to boot at “H” using (2) #14 x 1/2" tapping screws. Tighten all bolts.

Keep Shield In Place At All Times!

Two Way PTO Drive Conversion

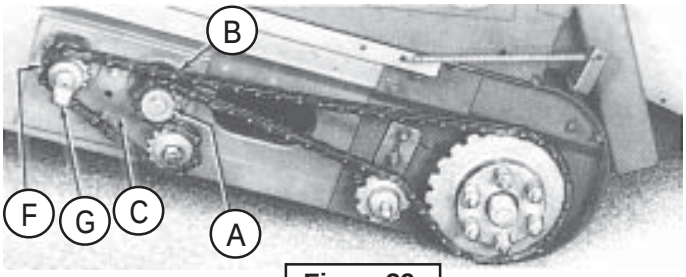


Figure39

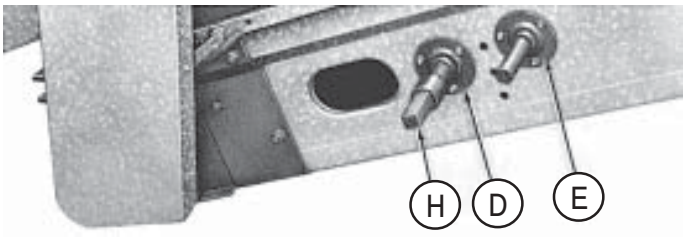


Figure 40

Figs. 39 & 40 -

1. Remove drive chain shield from left side.
2. Remove standard drive shaft “A” and bearing “B” (Fig. 39)
3. Put a woodruff key in shaft “A” (Fig. 39) previously removed. Place a 13-tooth sprocket (hub out) on shaft and over key at “A”. Slide locking collar and bearing with flangettes on shaft next to sprocket. Insert shaft through bearing plate “C” (Fig. 39) and bearing “D” (Fig. 40).
4. Bolt flangettes “B” (Fig. 39) to bearing plates and elevator side using 5/16" x 1" machine bolts.
5. Place a locking collar on the right side of shaft. Do not tighten collars or sprocket.
6. Bolt flangettes with bearing to right side at “E” (Fig.40) using 5/16" x 3/4" machine bolts.
7. Bolt flangettes with bearing to bearing plate at “F” (Fig.39) using 5/16" x 1" machine bolts.Tighten bolts.
8. Insert woodruff key in shaft “G” (Fig. 39). Place sprocket (hub out) on shaft over key. Slide locking collar onto shaft next to sprocket. Insert shaft through upper bearings with sprocket on left side.
9. Put locking collar on other end of shaft but do not tighten collars or sprockets at this time.
10. Remove offset link from original drive chain and add the 15 links of chain from kit, using connecting link provided in kit.
11. Install chain around sprockets as shown.
12. Align sprockets and shaft. Tighten setscrews in locking collars and sprockets. Adjust chain tightener to the point where the chain will not whip or jump teeth on sprockets.
13. Reinstall chain shield.
14. Put speed jack coupling “H” (fig. 40) onto lower shaft.

Note: A. If shaft is keywayed, use No. 15 woodruff key and one 3/8" x 1/2" allen head set screw to fasten jack coupling.
B. If shaft is not keywayed, use the 3/8" x 1-1/2" setscrew shipped in the coupling, so shaft can be driven.Use 3/8" x 1/2" set screw also.

PTO Shaft Shield

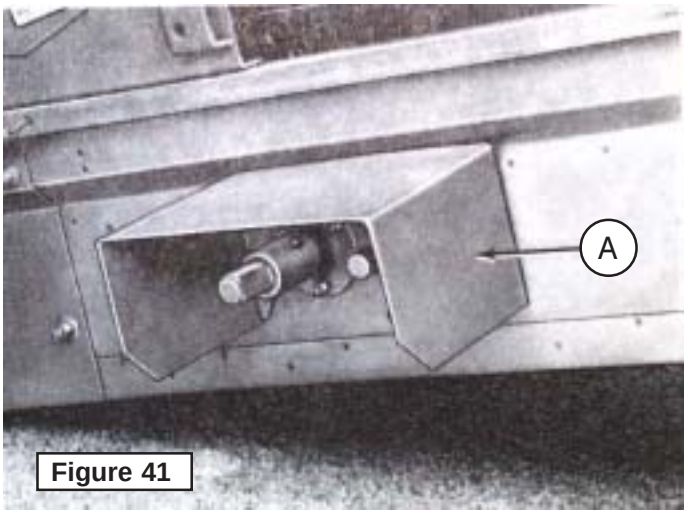


Fig. 41 -
Attach PTO shield "A" to bolts found in flangettes. Note: This shield is used for PTO drive elevator only, regardless to which side it is to be driven from.

One Way PTO Drive

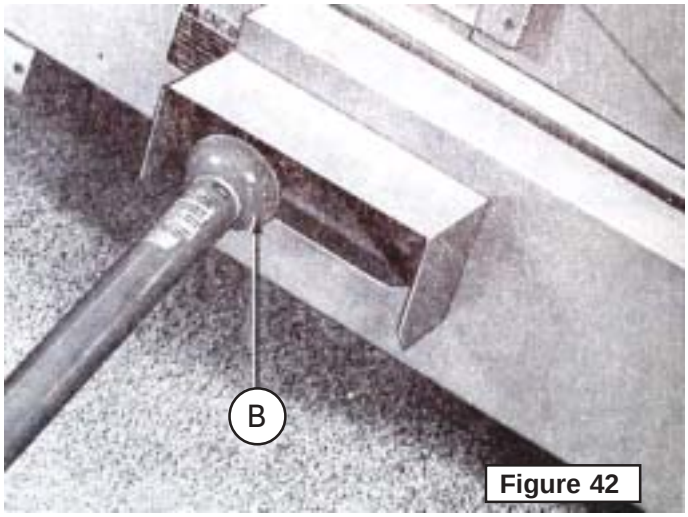


Fig. 42 -
Attach PTO assembly to drive shaft at "B" using a 5/16" x 2-1/2" machine bolt.

Keep Shield in place at all times.
Do not extend P.T.O. shaft beyond maxiumum operating length of 75" end to end.

Swivel Spout and Extensions

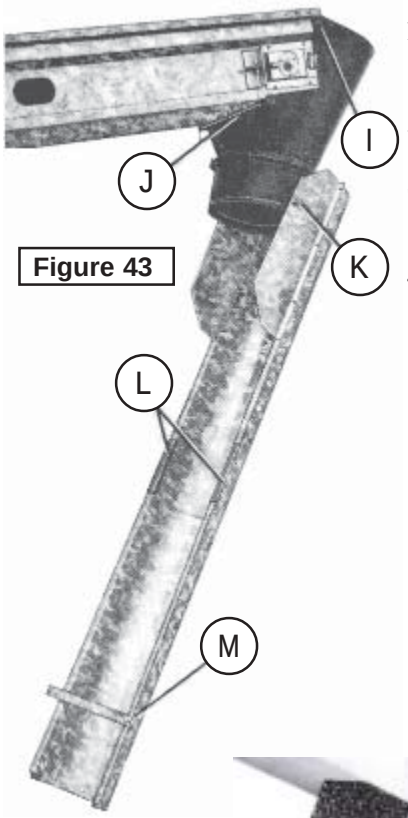


Fig. 43 -
1. Attach spout to studs on head at "I" with wing nuts found on studs.
2. Insert 3/8" x 19-3/8" pin "J" through brackets and fasten with pin clip.
3. Use 3/16" x 3/8" machine screws to attach side plate "K" to the first extension.
4. Fit extension onto spout and fasten with 3/8" x 3/4" bolts and locknuts.
Add more extensions by sliding them into the preceding one and fasten at joints with guides "L". Bend tabs on both ends of guides to secure extensions. Bale "M", which is shown attached to second extension, may be attached to any extension. Use 3/8" x 3/4" machine bolts.

Spout Cover

Fig. 44 -
Bolt spout cover over top end of spout extension on the inside of extension side plates, use the 1/4" x 3/8" machine bolts and 1/4" locknuts furnished. Be sure to draw locknuts up tight.

Weight Box

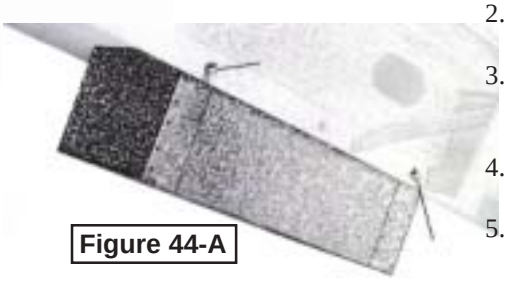


Fig. 44-A
1. Remove cotter pins and attachment rods.
2. Position box to the underside of elevator lower section as shown. Have box opening to the top facing head section.
3. Insert rod "H" through lower end of support angle box and opposite support angle. Reinsert cotter pin previously removed.
4. Fill box with sand, gravel or dirt until balance has been atttained (75lbs. @ boot).
5. Lift front of box into position shown, insert rod "I" and cotter pin.

Pivot Bearings, Pivot Piates and Support Plates

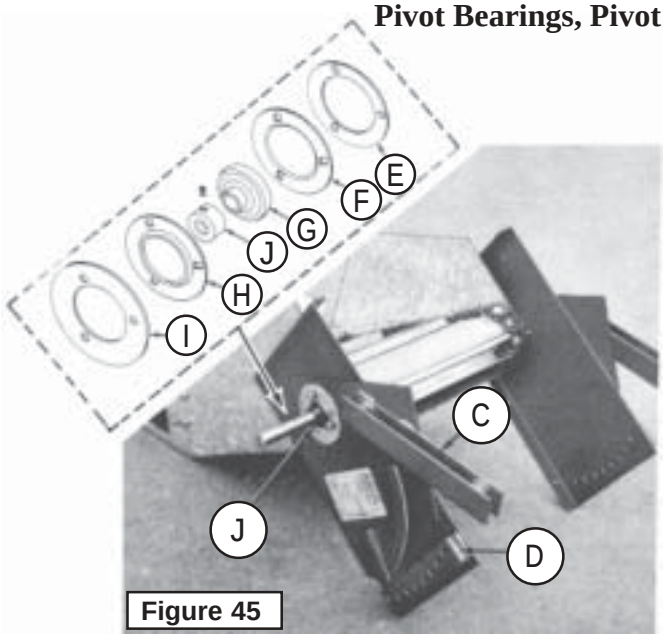


Figure 45

Fig. 45 -
Sub-assemble these parts on the floor, then place the sub-assemblies on the hopper drive shaft.
Proceed as follows:

1. Positions the right pivot plate "C" over the right support plate "D".
2. Insert three 5/16" x 1" machine bolts through back side of support plate "D".
3. Place a 2-1/4" ID x 3-1/4" OD x 1/16" spacer "E" over bolts and inside hole of pivot plate "C", follow with flangette "F", bearing "G", another flangette "H", then a 2-1/4" ID x 4-3/4" OD x 1/8" spacer "I". Tighten bolts.
4. Place this assembly on the drive shaft, follow with a locking collar as shown at "J".

Do not tighten locking collars.
Note: The left side attaches in the same manner.

Attaching Hopper, Closure Shield, lift Springs and Stop Pins

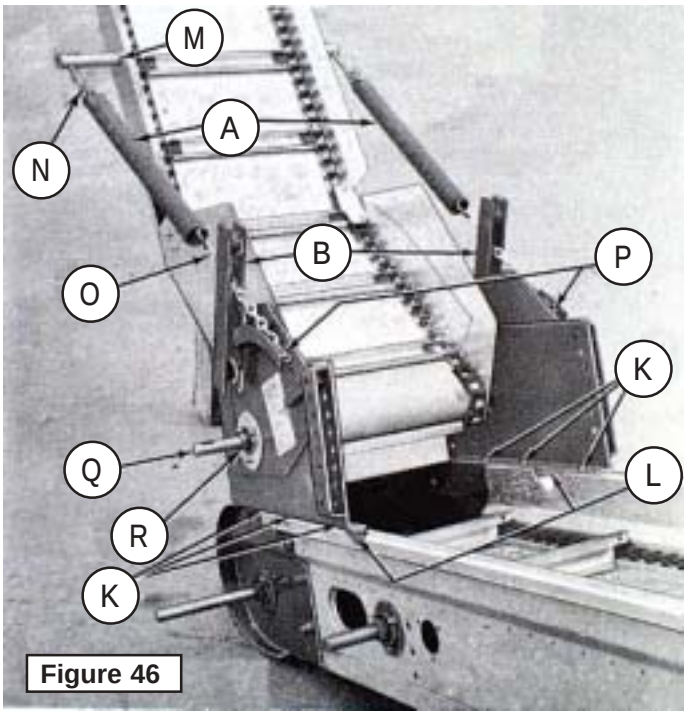


Figure 46

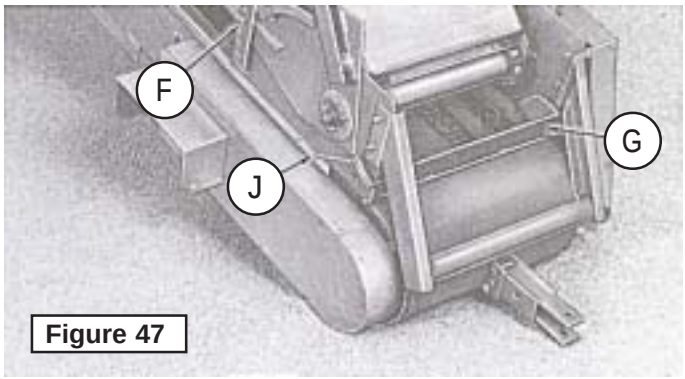


Figure 47

Figs. 46 & 47 -

1. Lift hopper into position shown. Place closure shield "G" (Fig. 47) between support plates inserting rods through square holes in plates. Attach support plates to section at "K" (Fig. 46) using 3/8" x 3/4" machine bolts with 11-1/16" x 1" x 1/8" spacers under elevator side rails as shown at "L". Attach extension spring "J" (Fig. 47) to closure shield bracket and side of elevator as shown.
2. Insert spring anchor pipe through hopper, secure it in place using 1/8" x 2" cotter pins at "M" (Fig. 46- both sides).
3. Attach chain "O" (Fig. 46) to pivot plate at "P" using 3/8" x 1" machine bolts with 11/32" ID x 7/8" OD x 3/32" washers. Tighten bolts.
4. Attach springs "A" (Fig. 46) to chains "O". Attach eyebolts "N" to springs. Raise hopper as indicated. Insert eye bolts "N" through anchor pipe. Put 1/2" nuts on these bolts. Do not adjust these nuts until hopper has been completely setup.
5. Center or align tilt hopper with elevator by tapping shaft "Q" (Fig. 46) to the right or left. Tighten locking collars "R".
6. Raise hopper to vertical position shown. Locate stop pins "F" according to elevation of elevator. See Fig. 52, page 21.

Support Plate Stabilizer

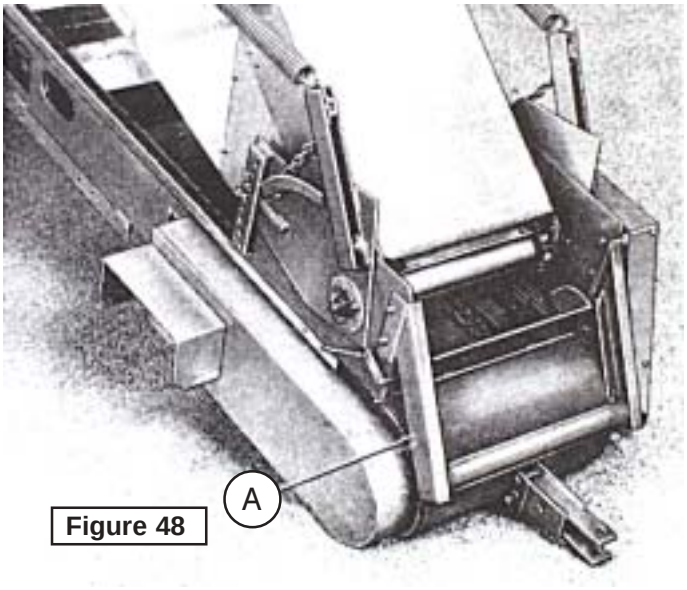


Figure 48

Hopper Drive

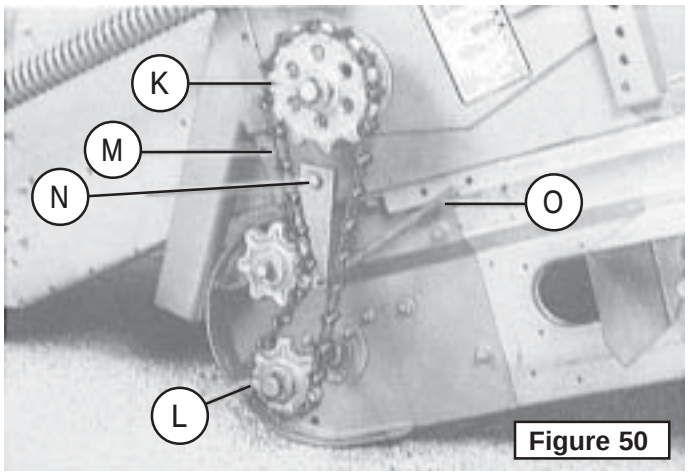


Figure 50

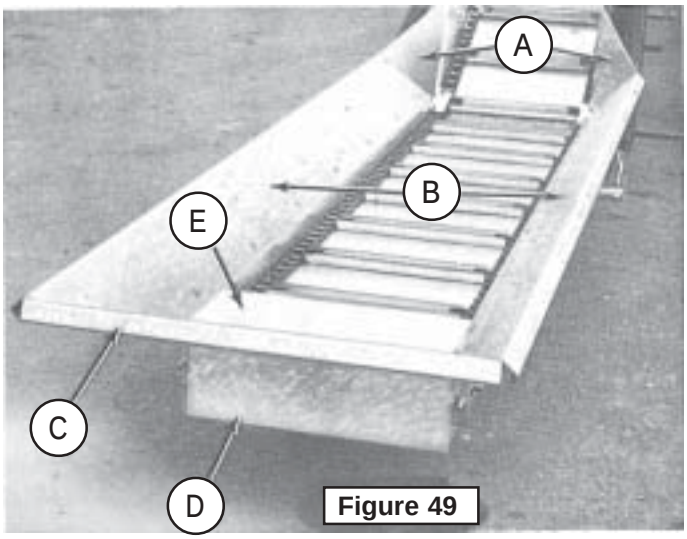


Figure 49

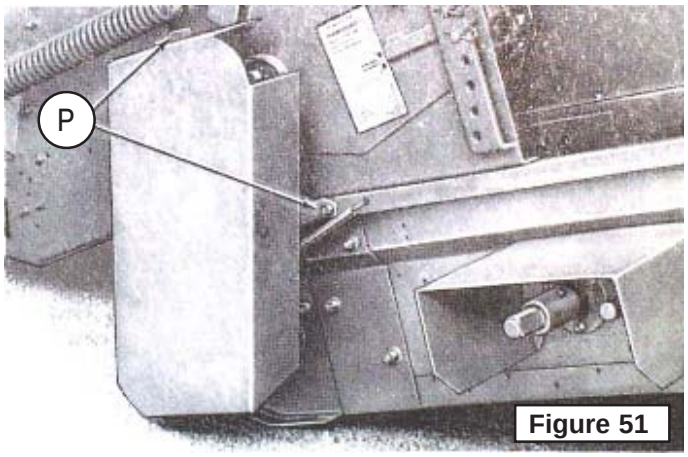


Figure 51

Hopper Drive

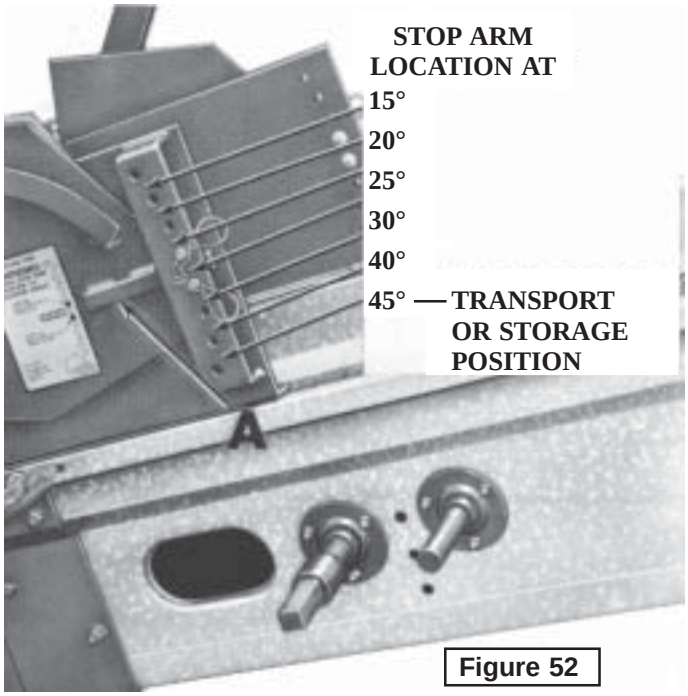


Figure 52

Fig. 52 -
There are seven different locations provided for the pivot bracket stop arms (both sides).
The stop arms must be located according to the degree of angle at which the elevator is setting for proper balance of the hopper when going beyond the vertical position.
Note: when going beyond the vertical position, the tilting hopper will not rest on the elevator unless the pins and stop arms are located as shown in fig. 46. See the plate at the left side of the lower section for degree of elevator angle.
The 45° setting is also used for storage or transport. See Fig. 49.

Caution: When repositioning pins, remove upper pin when hopper is in the up or vertical position. Remove the lower pin when the hopper is in the down or operating position.

Storage or Transport Position of the Hopper

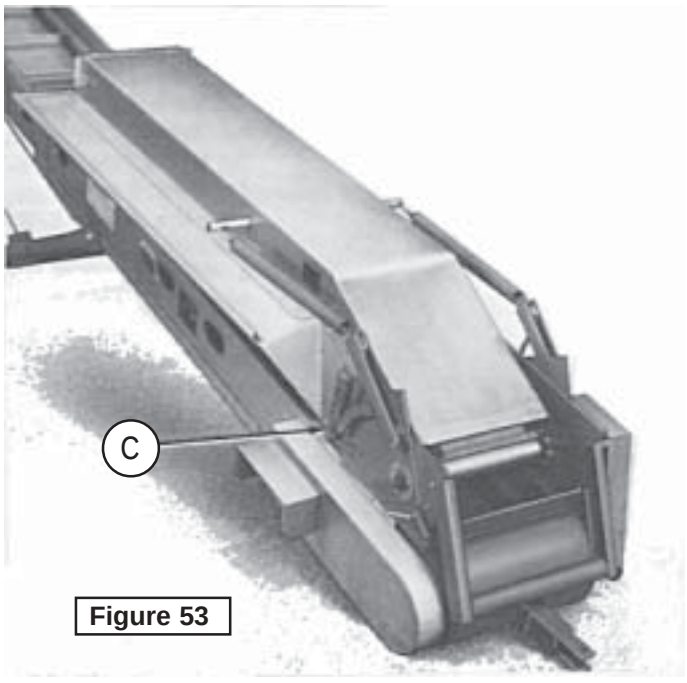


Figure 53

Fig. 53 -
The illustration above shows the hopper in the storage or transport position. Locate pins to second hole from bottom (over stop arm) at "C" (both sides) when this is done.

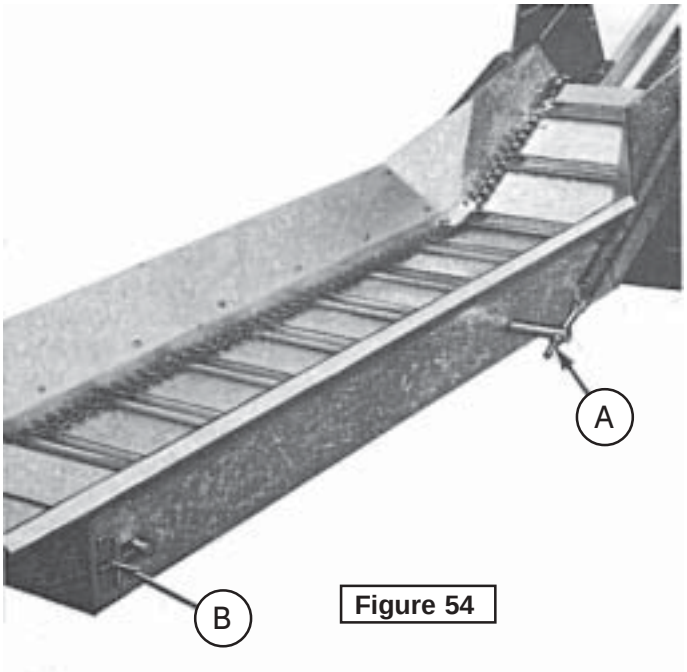


Figure 54

Fig. 54 -
To adjust the lift springs, adjust nuts on eyebolts "A" to the point where the hopper merely rest on the ground. To adjust the conveyor, adjust nut on bolts "B" (both sides) so when lifting the conveyor in the center between slides and sprockets, it can be lifted from 2-1/2" to 3".

Shovel Hopper

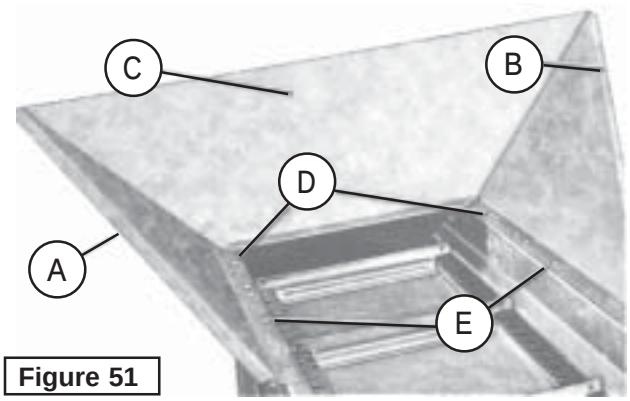


Fig. 55 -
Attach hopper sides "A" and "B" to hopper end "C" using 3/16" x 1/2" machine screws.
Use eight 3/8" x 3/4" machine bolts to attach this assembly to boot "D" and lower section "E".

Bale Slide

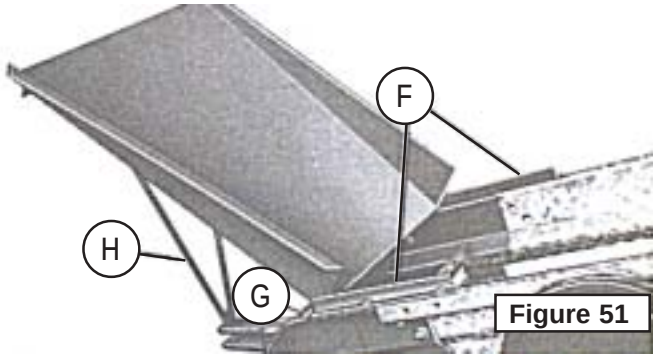


Fig. 56 -
1. Use 3/8" x 3/4" machine bolts to attach rest angles "F" to boot.

Note: Angles are right and left-hand parts, their purpose is to keep rod "G" firmly anchored.

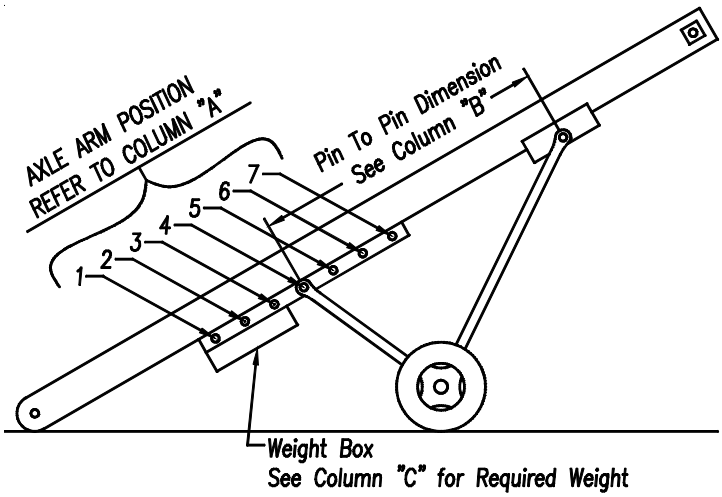
2. Fit slide against rod "G" at front top of boot. Insert support "H" into hitch as shown.

WHEN ORDERING REPAIR PARTS

1. Order from your My-D Han-D dealer or distributor.
2. Be sure to give Part Number and Description as it is written in the list accompanying each illustration of parts. (Do not use Item Numbers when ordering parts)
3. Please give year Elevator was purchased.
4. Be specific regarding shipping information.
5. Part description tells if more than one of the part is used.

Because of timely improvements to the design of the elevator and it's attachments, we reserve the right to change design and/or specifications without notice.

INDEX TO REPAIR PARTS



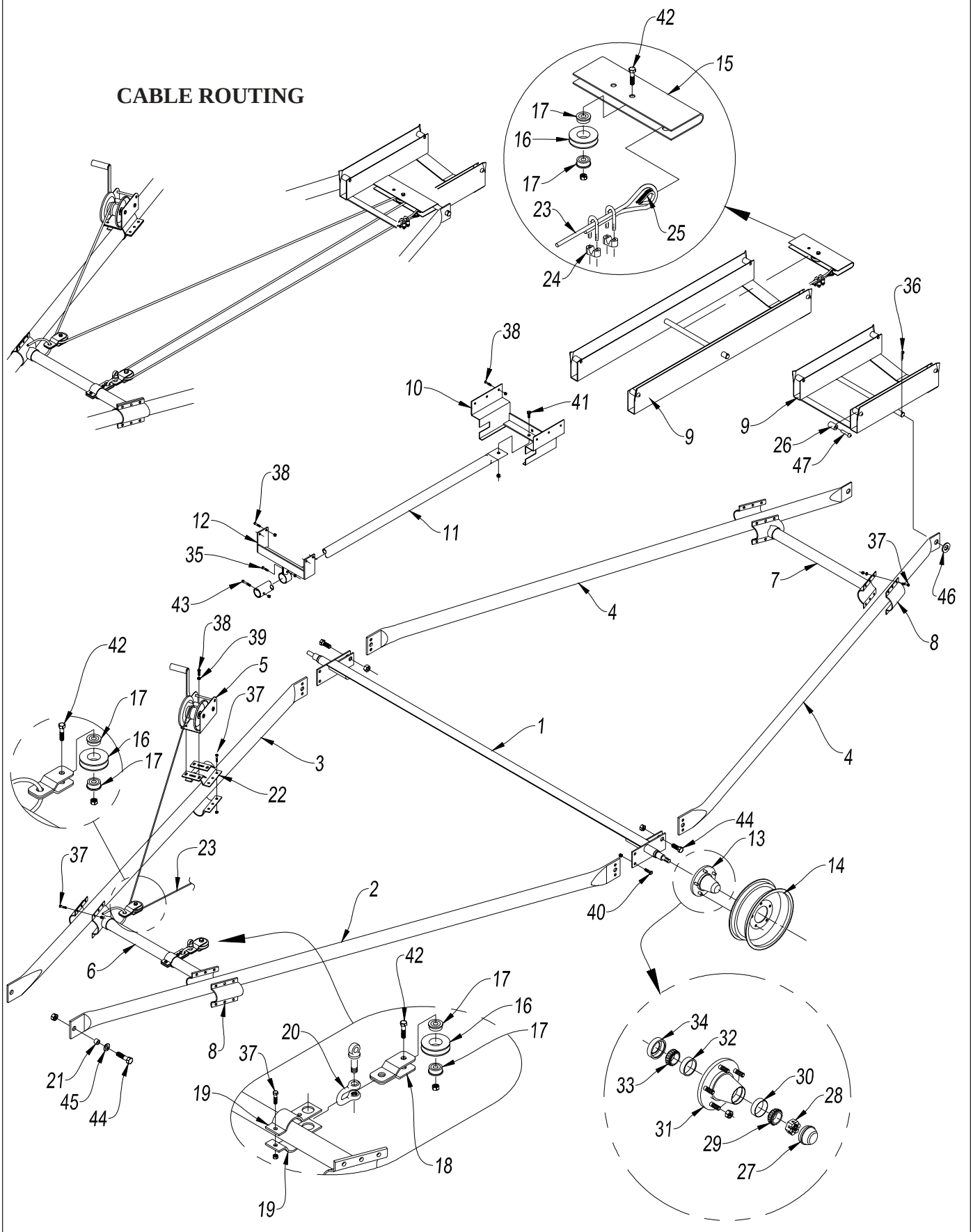
!! WARNING !!

The Pin to Pin Dimension "B", The Weight in the Weight Box "C" and the Hole Adjustment "A" are all necessary to maintain proper balance.

A = Axle Arm Pivot Positon
B = Pin to Pin Dimension
C = Weight (When Required)
Hopper = Standard Shovel Hopper
Tilt-Up = Standard Tilt-Up Hopper
Slide = Bale Slide
Open = No Options
Spout = Standard Discharge Spout
Chute = Discharge Spout & Spout Extension
Regular = Designates Regular Truck (undercarriage)
Long = Designates Long Truck (undercarriage)

OPTIONS			31' REGULAR			36' REGULAR			41' REGULAR			41' LONG			46' LONG			51' LONG		
Power	Tail	Head	A	B	C	A	B	C	A	B	C	A	B	C	A	B	C	A	B	C
Gas	Hopper	Open	2	16'-6"		4	15'-9"		4	15'-6"	160	4	26'-4"		5	26'-4"		7	23'-6"	0
Gas	Hopper	Spout	2	16'-6"		4	15'-9"		4	15'-6"	220	4	26'-4"		6	26'-4"		7	23'-6"	20
Gas	Hopper	Chute	3	16'-7"		4	15'-7"	100	4	15'-6"	240	5	24'-6"		7	24'-5"	0	7	23'-6"	110
Gas	Open	Open	2	16'-6"		4	15'-9"		4	15'-6"	190	4	26'-4"		6	26'-4"		7	23'-6"	20
Gas	Open	Spout	3	16'-4"		4	15'-7"	20	4	15'-6"	240	5	26'-0"		7	24'-5"		7	23'-6"	60
Gas	Open	Chute	4	15'-5"	225	4	15'-7"	130	4	15'-6"	240	5	24'-6"		7	24'-5"	10	7	23'-6"	120
Gas	Tilt-up	Open	1	16'-6"		1	16'-6"		2	15'-9"	70	1	26'-7"		1	24'-5"		3	23'-7"	
Gas	Tilt-up	Spout	1	16'-6"		1	16'-6"		3	15'-6"		1	26'-7"		1	24'-5"		4	23'-7"	
Gas	Tilt-up	Chute	1	16'-6"		2	15'-9"		4	15'-6"	10	1	26'-7"		2	24'-5"		5	23'-7"	
Gas	Slide	Open	3	16'-5"		4	15'-7"	30	4	15'-6"	210	5	24'-6"		6	24'-6"		7	23'-6"	70
Elec.	Hopper	Open	1	16'-6"		3	15'-9"		4	15'-6"	60	2	26'-5"		4	24'-5"		6	23'-7"	
Elec.	Hopper	Spout	1	16'-6"		3	15'-9"		4	15'-6"	110	3	26'-4"		4	24'-6"		7	23'-6"	
Elec.	Hopper	Chute	2	16'-6"		4	15'-7"		4	15'-6"	240	4	26'-4"		5	24'-5"		7	23'-6"	0
Elec.	Open	Open	1	16'-6"		3	15'-9"		4	15'-6"	80	2	26'-5"		4	24'-5"		6	23'-7"	
Elec.	Open	Spout	2	16'-6"		4	15'-9"		4	15'-6"	140	3	26'-4"		5	24'-5"		7	23'-6"	
Elec.	Open	Chute	3	16'-5"		4	15'-7"	20	4	15'-6"	240	5	26'-0"		7	24'-5"		7	23'-6"	30
Elec.	Tilt-up	Open	1	16'-6"		1	16'-6"		2	15'-9"		1	26'-7"		1	24'-5"		3	23'-7"	
Elec.	Tilt-up	Spout	1	16'-6"		1	16'-6"		2	15'-9"	50	1	26'-7"		1	24'-5"		3	23'-7"	
Elec.	Tilt-up	Chute	1	16'-6"		2	15'-9"		4	15'-6"		1	26'-7"		1	24'-5"		4	23'-7"	
Elec.	Slide	Open	1	16'-6"		4	15'-7"		4	15'-6"	130	4	26'-4"		5	24'-6"		7	23'-6"	
PTO	Hopper	Open	3	16'-4"		4	15'-7"	30	4	15'-6"	230	5	26'-0"		7	24'-6"		7	23'-6"	40
PTO	Hopper	Spout	3	16'-4"		4	15'-7"	70	4	15'-6"	240	5	24'-6"		7	24'-5"	0	7	23'-6"	110
PTO	Hopper	Chute	4	15'-5"	200	4	15'-7"	190	4	15'-6"	240	6	23'-6"		7	24'-5"	50	7	23'-6"	170
PTO	Open	Open	3	16'-5"		4	15'-7"	40	4	15'-6"	240	5	26'-0"		7	24'-6"	0	7	23'-6"	70
PTO	Open	Spout	4	15'-5"	220	4	15'-7"	100	4	15'-6"	240	5	24'-6"		7	24'-5"	20	7	23'-6"	130
PTO	Open	Chute	4	15'-5"	195	4	15'-7"	190	4	15'-6"	240	7	23'-6"		7	24'-5"	80	7	23'-6"	200
PTO	Tilt-up	Open	1	16'-6"		1	16'-6"		3	15'-6"		1	26'-7"		1	24'-5"		3	23'-7"	
PTO	Tilt-up	Spout	1	16'-6"		2	15'-9"		4	15'-6"		1	26'-7"		2	24'-5"		4	23'-7"	
PTO	Tilt-up	Chute	1	16'-6"		3	15'-9"		4	15'-6"	90	2	26'-6"		3	24'-5"		5	23'-7"	
PTO	Slide	Open	4	15'-4"	265	4	15'-7"	100	4	15'-6"	240	5	24'-6"		7	24'-6"	0	7	23'-6"	150

UNDERCARRIAGE ASSEMBLY

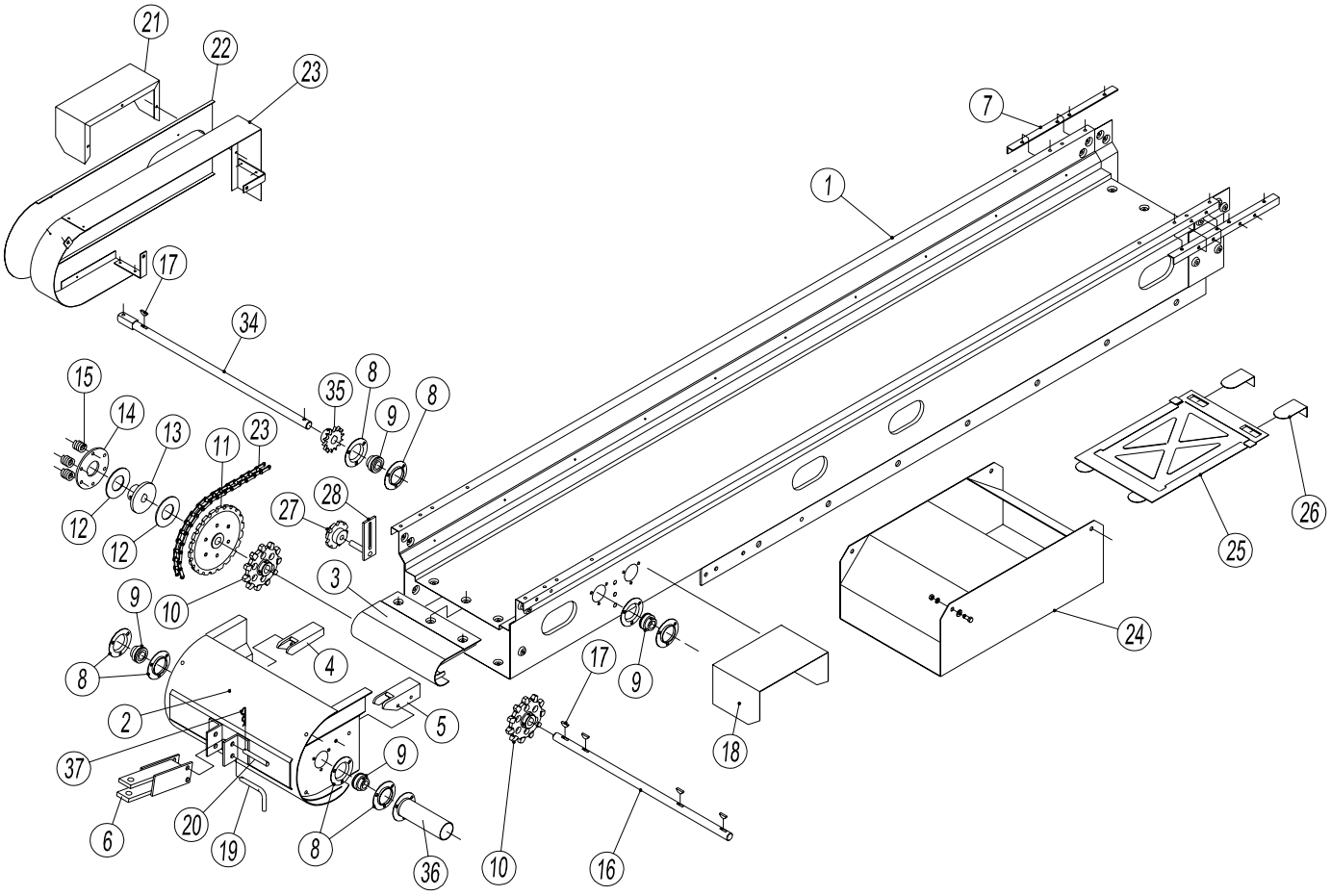


UNDERCARRIAGE PARTS LIST

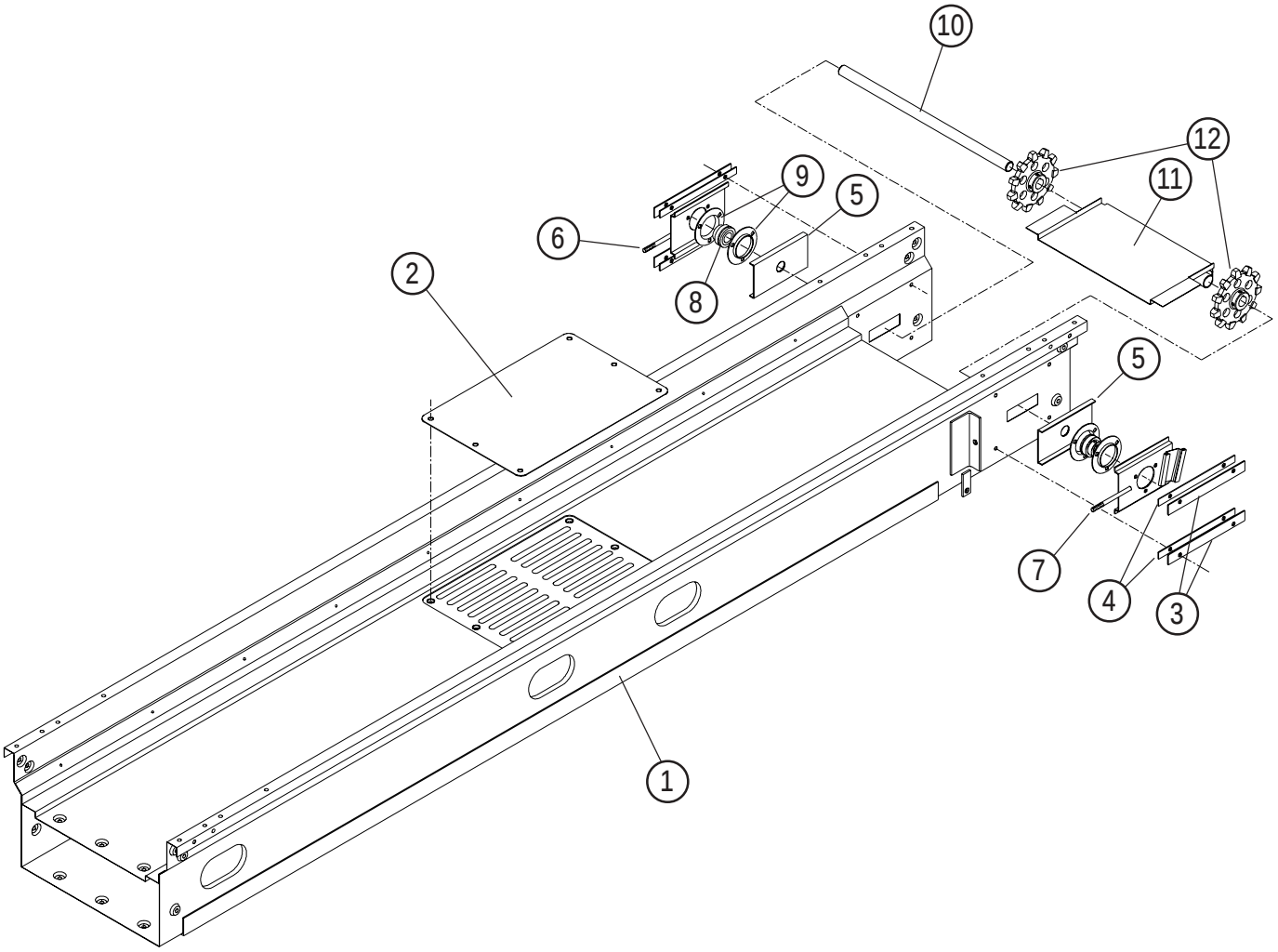
Item	Part No.	Part Description	Qty
1	829655	Cross Axle Weldment	1
2	157297	"A" Frame Arm (Regular Truck)	1
	157271	"A" Frame Arm (Long Truck)	1
3	829945	"A" Frame Arm w/Winch Band (Regular Truck)	1
	829960	"A" Frame Arm w/Winch Band (Long Truck)	1
4	157305	Boom Arm (Regular Truck)	2
	157289	Boom Arm(LongTruck)	2
5	067934	Winch, 1500# Capacity	1
6	829689	"A" Frame Cross Brace -Lower (Regular Truck)	1
	829663	"A" Frame Cross Brace -Lower (Long Truck)	1
7	829697	Boom Arm Cross Brace (Regular Truck)	1
	829671	Boom Arm Cross Brace (LongTruck)	1
8	157214	3" Half-Band	4
9	851873	Boom Roller Wa. (Regular Truck)	1
	851865	Boom Roller Wa. (Long Truck)	1
10	829705	Upper Restraint Weldment	1
11	161422	Restraint Tube (Regular Truck)	1
	161430	Restraint Tube (Long Truck)	1
12	829713	Lower Restraint	1
13	057653	5-Bolt Hub Assembly Complete	2
14	620476	5"x15" 5-Bolt Wheel	2
15	270249	Boom Roller Clevis	1
16	680314	3" Cable Pulley	3
17	030924	1/2" Pulley Bearing	6
18	826800	Roller Bracket	1
19	159988	Cable Anchor Band	2
20	069536	AnchorShackle	1
21	157362	Bushing (Axle Arm)	2
22	828970	Winch Bracket Weldment	1
23	161349	Cable, 52' (Regular Truck)	1
	161356	Cable, 82' (LongTruck)	1
24	021188	1/4" Cable Clamp	2
25	064808	1/4" CableThimble	1
26	260547	Roller for Boom	4
27	057661	Hub Cap	2
28	057463	Castle Nut	2
29	057455	Outer Bearing	2
30	057448	Outer Race	2
31	057430	5-Bolt Hub (specify lug bolts or lug nuts)	2
32	057422	Inner Race	2
33	057414	Inner Bearing	2
34	057406	Seal	2
35		5/16" x 1-3/4" HHCS w/ Locknut	
36		5/16" x 1-1/2" Cotter Pin	
37		3/8" x 1-1/4" HHCS w/ Locknut	
38		3/8" x 1" HHCS w/ Locknut	
39		3/8" Flat Washer	
40		1/2" x 1" HHCS w/ Locknut	
41		1/2" x 1-1/4" HHCS w/ Locknut	
42		1/2" x 2" HHCS w/ Locknut	
43		1/2" x 2-1/2" HHCS w/ Locknut	
44		3/4" x 2" HHCS w/ Locknut	
45		3/4" Flat Washer	
46		1" Flat Washer	
47		Rivet, 1/2" x 2-1/4" Button Head	

BOOT SECTION ASSEMBLY

Item	Part No.	Part Description	Qty
1	610287	10' Lower Section w/ Door	1
2	851998	Boot Weldment	1
3	851493	Top Deck Weldment	1
4	250951	Chain Strippe - Left	1
5	250944	Chain Stripper - Right	1
6	851980	Hitch Weldment	1
7	250043	Splice Angle	1
8	030148	Flangette	4
9	030130	Bearing, l" Bore	2
10	260265	11T Sprocket, 1 " Bore, w/ Keyway	2
11	260836	22T Sprocket	1
12	050211	Slip Clutch Friction Fiber Band	2
13	260844	Slip Clutch Hub, 1 " Bore w/ Keyway	1
14	250142	Slip Clutch Pressure Plate	1
15	067322	Slip Clutch Spring	6
16	250431	Boot Shaft	1
17	021816	No.15 Woodruff Key	5
18	690321	P.T.O. Drive Shield	1
19	250936	Hitch Support Pin	1
20	250472	Hitch Hinge Pin	1
21	690313	P.T.O. Shield	1
22	250118	Shield Cover	1
23	600924	Shield Assembly	1
24	813972	Weight Box	1
25	851485	Corn Door	1
26	260018	Sliding Clip for Corn Door	2
27	670380	8T Idler Sprocket, 5/8" Bore	1
28	851790	Idler Support	1
29	011395	3/8" x 3/8" Set Screw	2
30	020214	3/8" Flat Washer	6
31	052530	A20-50 Roller Chain x 50 Pitch	1
32	011353	3/16" Drive Zerk	1
33	020495	1/8" x 1" Cotter Pin	1
34	851782	Drive Shaft w/ Square Shank	1
35	045351	13T Sprocket, 1" Bore	1
36	831693	ShaftGuard	1
37	020867	1/8" "R" Pin	3

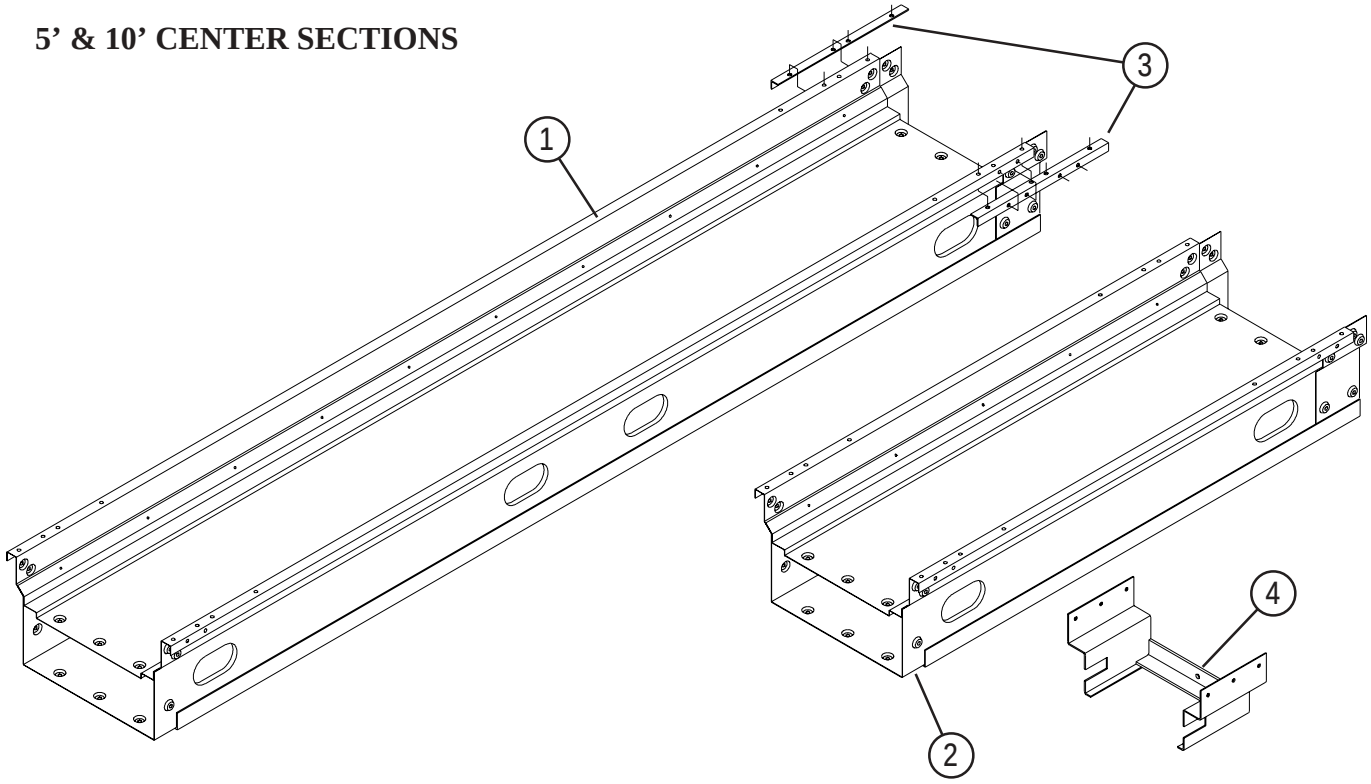


HEAD SECTION



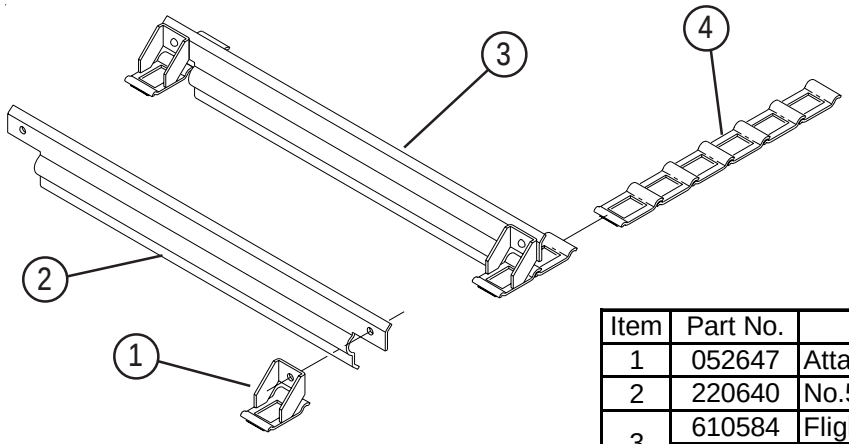
Item	Part No.	Part Description	Qty
1	851535	Head Section Weldment	1
2	250613	Corn Screen Cover	1
3	250605	Bearing Plate Track	4
4	220673	Bearing Plate Track Spacer	4
5	250647	Head Shaft Closure	2
6	851519	Bearing Adjusting Plate Weldment	1
7	851527	Bearing Adjusting Plate Weldment with Bracket	1
8	030130	Bearing, 1" Bore	2
9	030148	Bearing Flangette	4
10	250548	Idler Shaft, Upper, 1" Dia. x 21-7/8"	1
11	851808	Discharge for Head Section Assembly	1
12	260265	11T Sprocket, 1" Bore, Keywayed	2

5’ & 10’ CENTER SECTIONS



Item	Part No.	Part Description	Qty
1	851451	IO' Center Section	AR
2	851469	5' Center Section	AR
3	250043	Splice Angle	2
4	829705	Transport lock	1

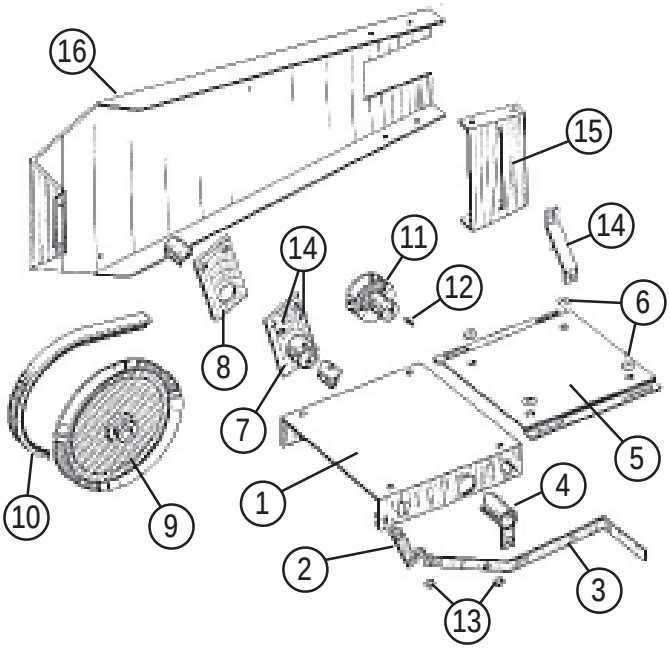
CONVEYOR CHAIN & FLIGHTING



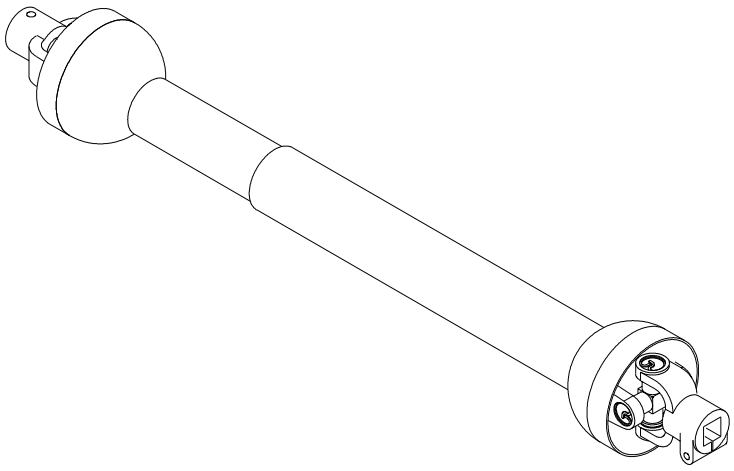
Item	Part No.	Part Description	Qty
1	052647	Attachment Link -No.62 Chain	AR
2	220640	No.55 and No.62 Flight Only	AR
3	610584	Flight and Attachment Link - No.55 Chain	AR
	610576	Flight and Attachment Link - No.62 Chain	AR
4	052514	Plain Link - No. 55 Chain	AR
	052522	Plain Link - No.62 Chain	AR

GAS ENGINE & ELECTRIC MOTOR MOUNT

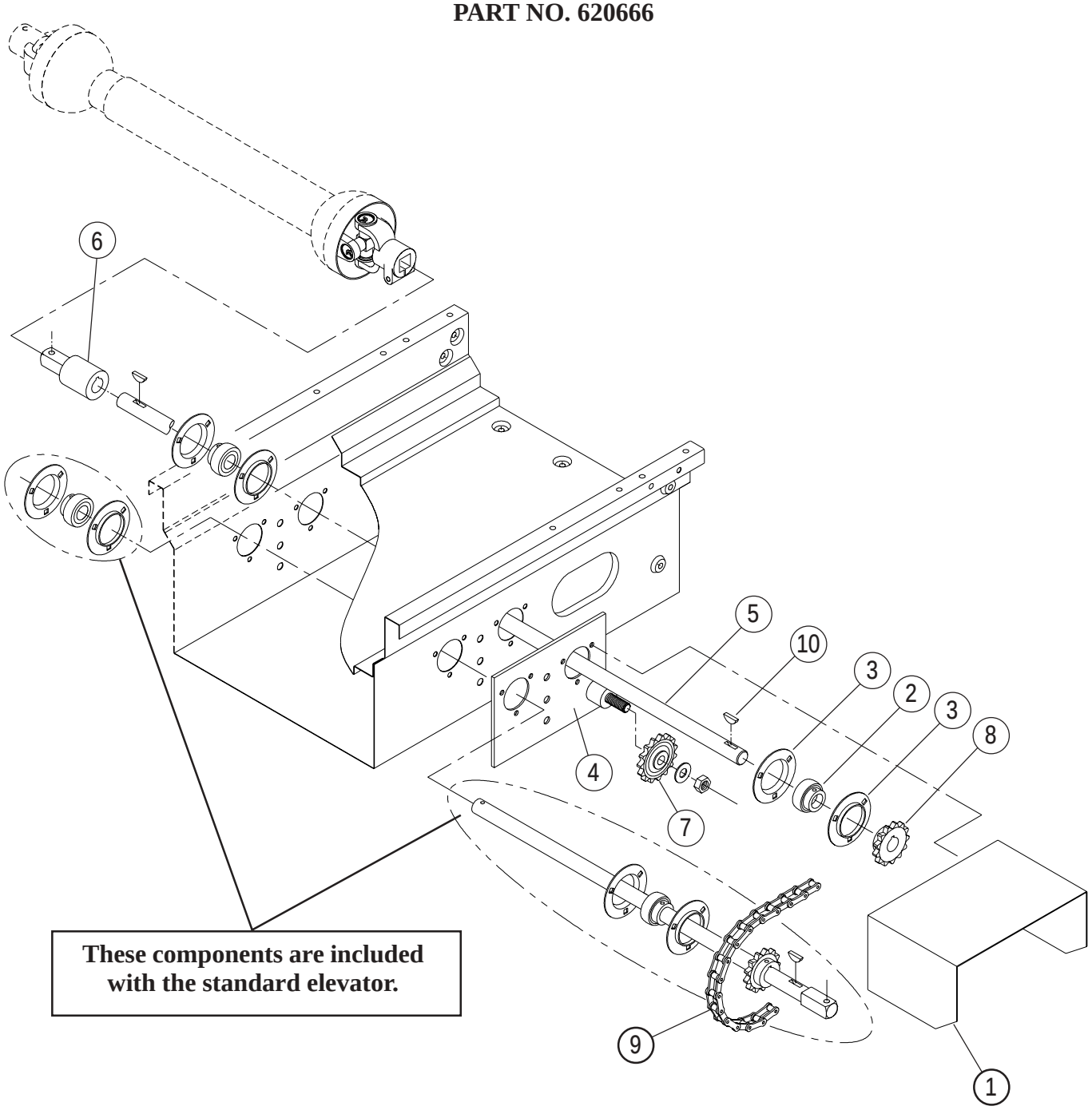
Item	Part No.	Part Description	Qty
1	851766	Engine Base Plate Weldment	1
2	250175	Attachment Link for Throwout Lever	1
3	250183	Throwout Lever	1
4	851774	Base Pipe Assembly	1
5	250167	Engine Sliding Base Plate	1
6		5/16" Flatwasher	4
7	851832	Pivot Arm and Bearing	1
8	250191	Mounting Bracket	1
9	043695	14" V-Belt Pulley	1
10	035246	B-75 V-Belt	1
11	043240	3" V-Belt Pulley	1
12		Square Key, 1/4" Sq. 1-1/4" Long	2
13	015164	Locknut, 3/8"	5
14	161117	Belt Guard Bracket	1
15	161067	Belt Guard Back Plate	1
16	161075	Belt Guard	1



PTO SHAFT ASSEMBLY
PART NO. 620526

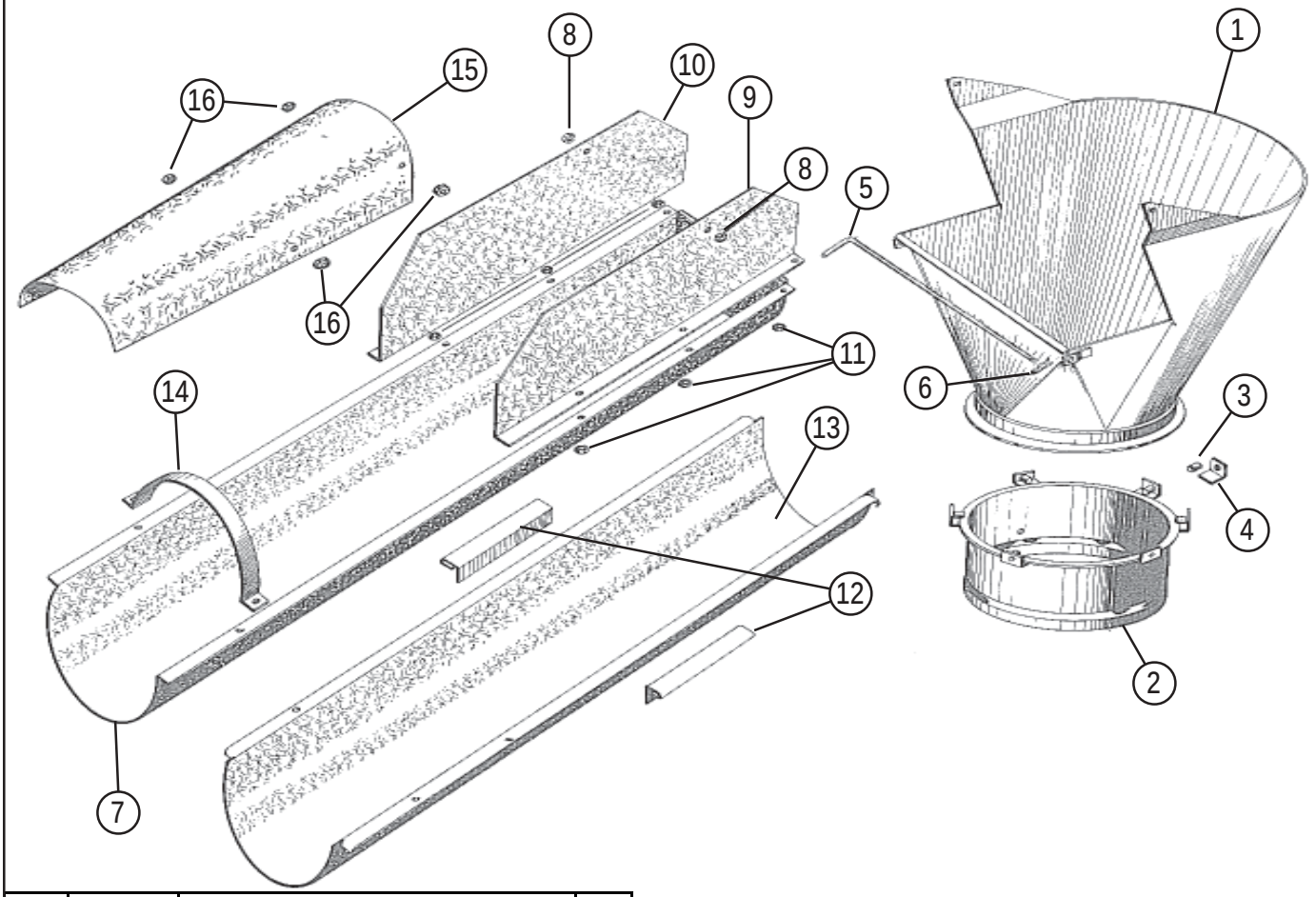


PTO OPPOSITE SIDE DRIVE OPTION
PART NO. 620666



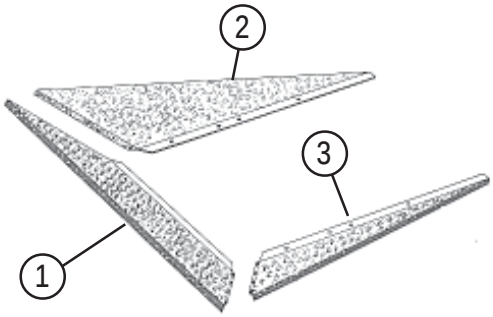
Item	Part No.	Part Description	Qty
1	690321	Drive Shield	1
2	030130	Bearing, 1" Bore	2
3	030148	Bearing Flangette	4
4	851816	Bearing Plate	1
5	250076	Drive Shaft	1
6	851824	Coupling, 1" Dia. to 1" Sq., Keywayed	1
7	045278	15T Idler Sprocket Assembly	1
8	045351	13T Sprocket,1" Bore	1
9	052589	A20-50 Roller Chain x 19 Pitch with Connecting Link	1
10	021816	Woodruff key, No.15, 1/4" x 1"	2

SWIVEL SPOUT & EXTENSIONS



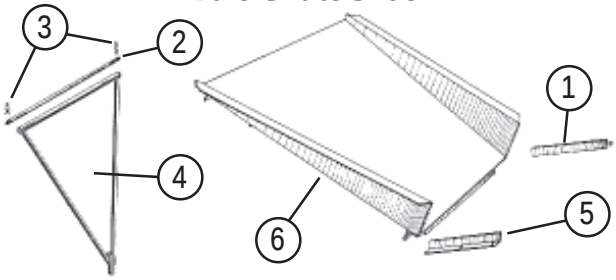
Item	Part No.	Part Description	Qty
1	853561	Swivel Spout Weldment	1
2	852103	Downspout Swivel Weldment	1
3	260067	Roller For Downspout Swivel	6
4	600619	Swivel Spout Clip Assembly	6
5	260059	Spout Hinge Pin 3/8" x 21-1/2"	1
6	020867	1/8" R" Pin	1
7	851444	No.1 Spout Section Weldment	1
8	015164	3/8" Locknut	2
9	250761	No.1 Spout Extension Side Plate	1
10	250753	No.1 Spout Extension Side plate	1
11		No.10 -24 N.C. Locknut (3/16")	6
12	250787	Downspout Guide	2
13	250829	No.2 Spout Extension 4 ft.	1
14	250670	Spout Extension Bale	1
15	250795	Spout Cover	1
16		1/4" Locknut	4

Shovel Hopper



Item	Part No.	Part Description	Qty
1	240812	Shovel hopper end	1
2	240804	Shovel hopper side, Left	1
3	240796	Shovel hopper side, Right	1

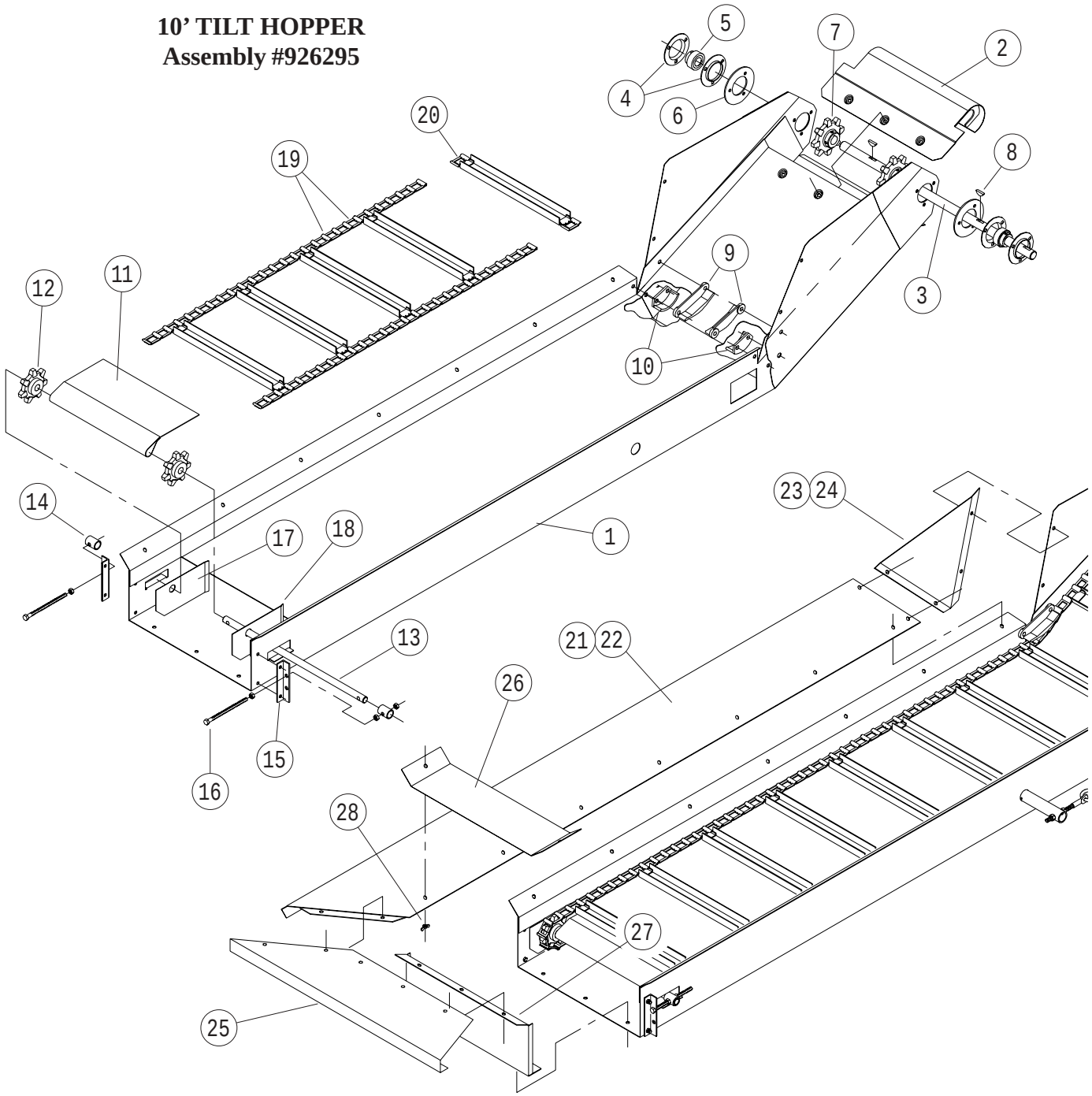
Bale Chute Slide



Item	Part No.	Part Description	Qty
1	240770	Bale chute rest angle, Left	1
2	240291	Bale chute hinge pin, 318" x 16-3/8"	1
3	020867	Pin clip	2
4	851543	Bale chute support stand assembly	1
5	240762	Bale chute rest angle, Right	1
6	851550	Bale chute slide assembly	1

Repair Parts

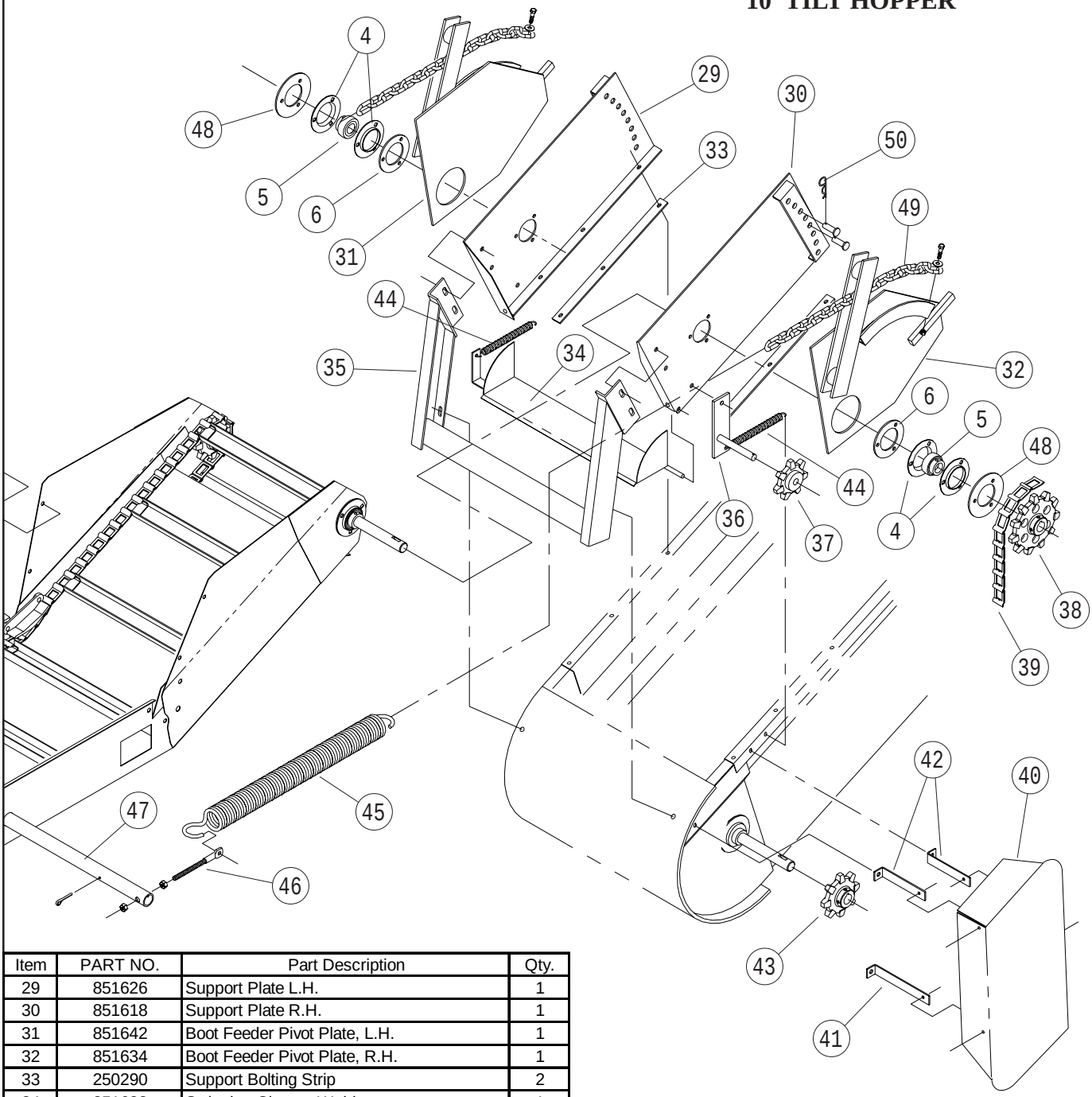
10' TILT HOPPER
Assembly #926295



Item	PART NO.	Part Description	Qty.
1	851584	10' Tilting Hopper Weldment	1
2	851592	Drive Shaft Anti-wrap Shield	1
3	260141	Drive Shaft, 1" Dia. 29-3/8" Long	1
4	030148	Bearing Flangette	8
5	030130	1" Flangette Bearing, with Collar	4
6	260182	Bearing Spacer Plate	4
7	670935	8T Drive Sprocket, 1" Bore	2
8	021816	No. 15 Woodruff Key, 1/4" x 1"	4
9	260133	Chain Guide, Top	2
10	260125	Chain Guide, Bottom	2
11	851600	Idler Shaft Shield, Weldment	1
12	680579	7T Idler Sprocket, 3/4" Bore	2
13	260158	Idler Shaft, 3/4" x 21-5/8"	1
14	260166	Tightener Bolt Sleeve	2
15	241000	Tightener Bracket	2

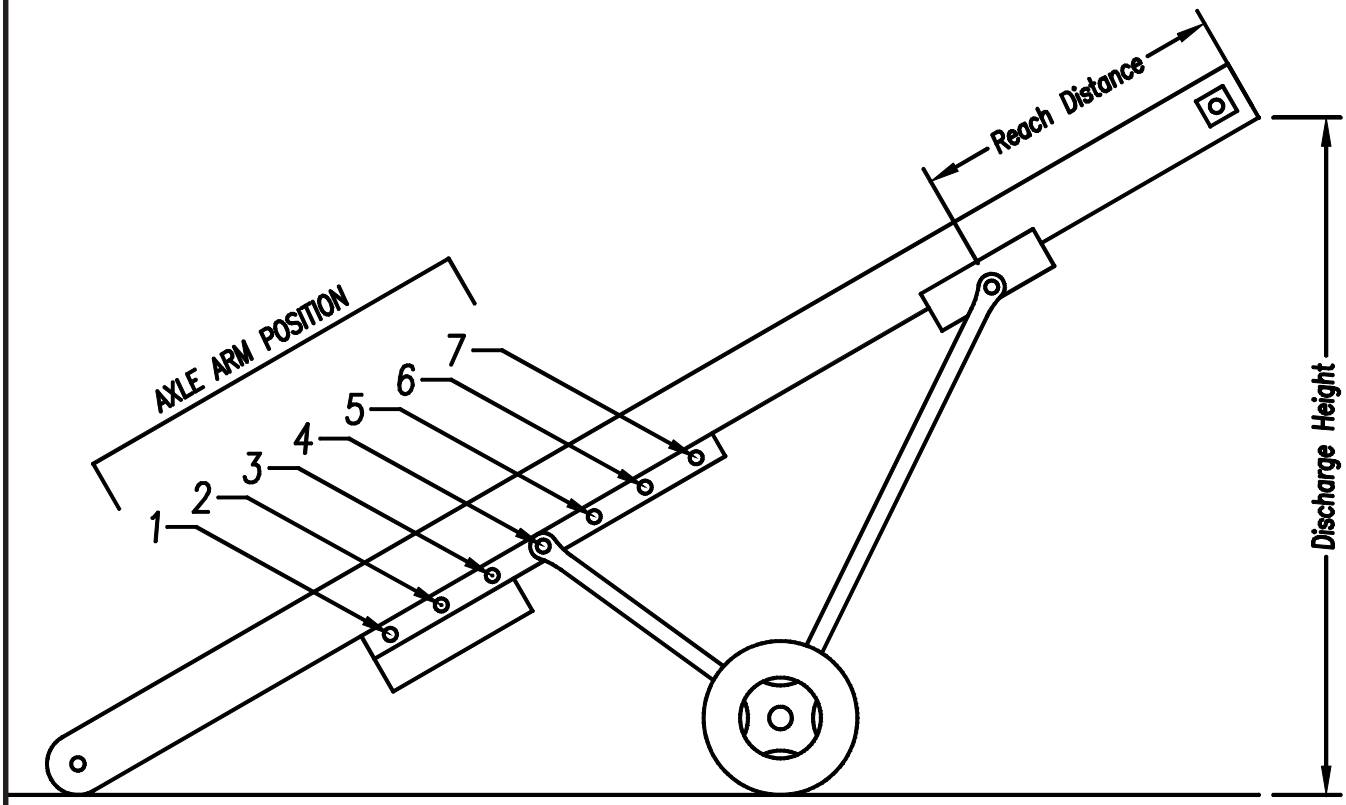
16	853432	Tightener Bolt	2
17	240986	Idler Shaft Adjustment Plate	1
18	240978	Idler Shaft Adjustment Plate	1
19	600825	Conveyor Chain Assembly	1
20	610188	Flight with Attachment Links	AR
	052514	Plain Link	AR
	052613	Attachment Link, Right	AR
	052621	Attachment Link, Left	AR
21	851675	Hopper, Left Side Panel	1
22	851667	Hopper, Right Side Panel	1
23	240937	Flared Side Plate, L.H.	1
24	240945	Flared Side Plate, R.H.	1
25	240861	Hopper, Rear Panel, Flared	1
26	250399	Idler Shaft Shield	1
27	240853	Hopper, Rear Panel	1
28		5/16" Wing Nut	2

10’ TILT HOPPER



Item	PART NO.	Part Description	Qty.
29	851626	Support Plate L.H.	1
30	851618	Support Plate R.H.	1
31	851642	Boot Feeder Pivot Plate, L.H.	1
32	851634	Boot Feeder Pivot Plate, R.H.	1
33	250290	Support Bolting Strip	2
34	851683	Swinging Closure Weldment	1
35	831834	Stabilizer	1
36	851659	Drive Chain Idler Bracket	1
37	650689	7T Idler Sprocket, 5/8" Bore	1
38	260265	11T Sprocket, 1" Bore w/ Keyway	1
39	052092	Drive Chain, 28 Link	1
40	161109	Chain Guard	1
41	250316	Chain Guard Bracket, Long	1
42	250324	Chain Guard Bracket, Short	2
43	670372	7T Sprocket, 1" Bore	1
44	067124	Extension Spring, 7-1/4" Long, 1/2" Dia.	2
45	067314	Boot Feeder Tension Spring	2
46	250340	Spring Adjusting Bolt, 1/2" Dia., 6" Long	2
47	260190	Spring Anchor Bar	1
48	220608	Pivot Bearing Retainer	2
49	052423	Anchor Chain, 16 Links	2

HEIGHT AND REACH INFORMATION



Note: All numbers or distances are to the nearest half foot.
The reach distance is measured from the center of the lift arm pivot to the end of the elevator.
The Axle Arms can be placed in seven different hole locations in the boot section.
The chart shows 1st, 4th, and 7th, positions. These positions are only examples. The remaining positions can be calculated.

Regular Truck

Elevation angle	31' Elevator				36' Elevator				41' Elevator			
	Discharge Height	Reach distance			Discharge Height	Reach distance			Discharge Height	Reach distance		
		1st.	4th.	7th.		1st.	4th.	7th.		1st.	4th.	7th.
20°	10'-6"	10'-0"	8'-0"	6'-0"	12'-0"	15'-0"	13'-0"	11'-0"	14'-0"	20'-0"	18'-0"	16'-0"
30°	15'-6"	12'-0"	11'-0"	10'-6"	18'-0"	17'-0"	16'-0"	15'-6"	20'-0"	22'-0"	21-0"	20'-6"
35°	18'-0"	13'-6"	13'-0"	13'-0"	20'-6"	18'-6"	18'-0"	18'-0"	23'-6"	23'-6"	23'-0"	23'-0"
40°	20'-0"	15'-0"	14'-6"	15'-0"	23'-0"	20'-0"	20'-0"	20'-0"	26'-6"	25'-0"	24'-6"	25'-0"
45°	22'-0"	16'-5"	16'-5"	-	25'-6"	21'-6"	21'-6"	-	29'-0"	26'-6"	26'-6"	-

Long Truck

Elevation angle	41' Elevator				46' Elevator				51' Elevator			
	Discharge Height	Reach distance			Discharge Height	Reach distance			Discharge Height	Reach distance		
		1st.	4th.	7th.		1st.	4th.	7th.		1st.	4th.	7th.
20°	14'-0"	12'-6"	10'-0"	8'-0"	15'-6"	17'-6"	15'-0"	13'-0"	17'-6"	22'-6"	20'-0"	18'-0"
30°	20'-0"	15'-0"	14'-0"	13'-0"	23'-0"	20'-0"	19'-0"	18'-0"	25'-6"	25'-0"	24'-0"	23'-0"
35°	23'-6"	17'-0"	16'-0"	16'-0"	26'-6"	22'-6"	21'-0"	21'-0"	29'-6"	27'-0"	26'-0"	26'-0"
40°	26'-6"	19'-0"	18'-0"	19'-0"	30'-0"	23'-6"	23'-6"	24'-0"	33'-0"	29'-0"	28'-6"	29'-0"
45°	29'-0"	20'-6"	21'-0"	21'-6"	32'-6"	25'-6"	26'-0"	26'-6"	36'-0"	30'-6"	31'-0"	31'-6"