MERIDIAN®

ASSEMBLY AND OPERATOR'S MANUAL

UNDERBIN CONVEYOR

SIGN-OFF FORM

Meridian Manufacturing Inc. follows the general Safety Standards specified by the American Society of Agricultural Engineers (ASAE), and the Occupational Safety and Health Administration (OSHA). Anyone who will be using or maintaining the bin must read and clearly understand ALL Safety and Maintenance information presented in this manual.

Review this information annually, before the season start-up.

Make these periodic reviews of SAFETY and USAGE a standard practice for all of your equipment.

This form is provided for your record keeping to show that all personnel who will be working with the equipment have read and understand the information in this manual. Copy this page to continue record.

Date	Employee's Signature	Employer's Signature

PRODUCT REGISTRATION FORM

Attention Dealers:
You can register products online through the Dealer Login: http://dealers.meridianmfg.com/login/

It is mandatory to register your product in order to qualify for future warranty claims that may arise. Knowingly falsifying information on this form will result in the voiding of the product warranty.

You may scan/photograph this completed form (must be legible), email it to: register@meridianmfg.com
A copy of this form may also be mailed to Meridian Manufacturing Inc.

Buyer's Name _____ Dealer's Name _____

Address _____ Address _____

City, Prov/State _____ City, Prov/State _____

Postal/Zip Code _____ Postal/Zip Code _____

Phone Number _____ Phone Number _____

Note: Registering a product in multiple entry format is only allowed when the product has the same model number and the same dealer, however each serial number must be legibly listed for each unit. Delivery dates for a multiple entry must be within a one month time frame.

Product Information _____

Model Number _____ Serial Number _____

Invoice Date _____

Important: Please send this form to the Meridian Manufacturing Inc. location which built this product being registered. If you require further assistance call you're dealer or the Meridian outlet nearest to your location.

We want to thank you for purchasing a Meridian manufactured product. Whether this is your first Meridian purchase or you have been a customer for years, you are now part of the Meridian community of customers and we appreciate your business.

It is important that you now complete the product registration information and this form indicating you have received delivery. This registration and information is necessary to ensure you have access to warranty and product updates in the event it be required in the future.

Registration can be completed by using this form or visiting your dealer who will complete the form online. You will be given access to the Meridian Community and become eligible for updates, special offers and prizes.

Again thank you for choosing Meridian.

I have thoroughly instructed the buyer on the above described equipment. The review included the content of this manual, equipment care, adjustments, safe operation and warranty policy.

Date _____ Dealer's Signature _____

The above equipment and this manual have been received by me. I have been thoroughly instructed as to care, adjustments, safe operation and applicable warranty policy.

Date _____ Buyer's Signature _____

This page intentionally left blank

TABLE OF CONTENTS

continued on next page

TABLE OF CONTENTS

Section 1: INTRODUCTION

Congratulations on your choice of a Meridian Manufacturing Inc Underbin Conveyor for your seed site. This conveyor is designed to move seed from single or multiple seed bins to either end of the structure. The seed can then be conveyed by another conveyor into a building or into a mobile seed container. This system is intended for seed only and is not intended to convey any other product, such as fertilizer.

⚠ WARNING

DO NOT use this conveyor, or one of its components, for anything other than the manufacture's original intended use. Not only will the warranty be voided, but the component can fail in the unintended application, creating a hazard to the conveyor and the personnel using the conveyor.

This product has been designed and manufactured to meet the exacting standards for such equipment in the agricultural industry and will keep your seed delivery system at optimum efficiency.

Keep this manual handy for future reference. Call your dealer, distributor or Meridian Manufacturing Inc, if you need assistance, information, additional/replacement copies or a digital copy of this document.

Information provided herein is of a descriptive nature. Consistent with Meridian's policy of continued research and development of our products, we reserve the right to modify the equipment design and specifications and change information contained in this publication without any preliminary notice.

Performance quality may depend on the material being handled, weather conditions and other factors.

**Once the installation of your underbin conveyor is complete;
we, the manufacturer, recommend that Meridian service personnel
commission your conveyor before using it to move product.**

OWNERSHIP CHANGES

If any of the equipment associated with this conveyor changes ownership, then the new owner(s) must be given all applicable documentation assoiciated with all the components/equipment of the site. The new owners need to notify the individual manufactures of the ownership changes so that updates to product or documentation can be forwarded to the new owner(s). This should be done even if the conveyor is out of warranty because many manufacturers supply update notifications as long as they have valid ownership information.

END OF LIFE DISPOSAL

The Meridian® conveyors are designed for the specific purpose of conveying granular product. When this conveyor is no longer capable of doing its designed purpose, it should be dismantled and scrapped. Do not use any materials or components from this conveyor for any other purpose.

CALIFORNIA CODES

If this conveyor is assembled in the state of California, there are some specific codes and warnings that need to be noted. Contact the State of California to determine which codes and warnings apply to the components of the conveyor.

REPORTING HAZARD

If any of the equipment associated with this conveyor appears to pose a hazard, then it is the duty of the individual to report it immediately. If the hazard is the conveyor, then the manufacturer and site manager must be notified. If the hazard is a process, then the site manager must be notified. Unreported hazards can lead to serious injury or death to personnel.

SERIAL NUMBER

The underbin conveyor does not have a serial number. Record the motor's serial number for future reference. Always give your dealer as much information as possible, when ordering parts or requesting service or other information.

Use the space provided for easy reference.

Motor Model No: _____

Motor Serial No: _____

Section 2: SAFETY

The Safety Alert Symbol means:

ATTENTION!
BECOME ALERT!
YOUR SAFETY IS INVOLVED!

3 Big Reasons why safety is important to you:

- Accidents Disable and Kill
- Accidents Cost
- Accidents Can Be Avoided

The Safety Alert Symbol identifies important safety messages on the underbin conveyor and in this manual.

The following signal words are used in this manual to express the degree of hazard for areas of personal safety.

When you see the symbol and/or the signal words described below, obey the accompanying message to avoid possible injury or death.

⚠ DANGER — Indicates a hazardous situation that, if not avoided, will result in death or serious injury. This signal word is limited to the most extreme situations. Typically for machine components which, for functional purposes, cannot be guarded.

⚠ WARNING — Indicates a hazardous situation, if not avoided, could result in death or serious injury. This word identifies hazards that are exposed when guards are removed. It may be used to alert against unsafe practices.

⚠ CAUTION — Indicates a hazardous situation, if not avoided, could result in minor or moderate injury. It may be used to alert against unsafe practices.

NOTICE — Indicates practices or situations which may result in the malfunction of, or damage to equipment.

SAFETY INSTRUCTIONS — Safety instructions (or equivalent) signs indicate specific safety-related instructions or procedures.

2.1 SAFETY ORIENTATION

YOU are responsible for the SAFE operation and maintenance of your Meridian® Underbin Conveyor. Be sure that everyone who will operate, maintain or work around it, is familiar with the safety, operating and maintenance procedures.

This manual will take you step-by-step through your working day. It will alert you to all the safe practices that should be adhered to while operating the conveyor.

It has been said, "The best safety feature is an informed, careful operator." Good safety practices not only protect you but also the people around you. Make these practices a dynamic part of your workday.

Most accidents can be prevented. Do not risk injury or death by ignoring good safety practices.

- Conveyor owners must give operating instructions to operators or employees before allowing them to operate the machine.

  Procedures must be reviewed annually thereafter, as per OSHA (Occupational Safety and Health Administration) regulation 1928.57.

- The most important safety device on this equipment is a SAFE operator. It is the operator's responsibility to understand all safety and operating instructions in this document, and to follow them.

- An untrained operator exposes himself and bystanders to possible serious injury or death.

- Think SAFETY! Work SAFELY!

2.2 GENERAL SAFETY

- Read and understand the Operator's Manual and all safety decals before operating, maintaining, adjusting or unplugging the conveyor.

- Only trained competent persons shall operate the conveyor. An untrained operator is not qualified to operate the machine.

- Have a first-aid kit available for use should the need arise.

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

- Do not allow children, spectators or bystanders within hazard area around the conveyor.

- Wear appropriate protective gear. This list may include but is not limited to:
  - Hard hat
  - Protective shoes with slip resistant soles
  - Eye protection
  - Work gloves
  - Hearing protection
  - Respirator or filter mask
  - Hi-Visibility safety vest

- Never use alcoholic beverages or drugs which can hinder alertness or coordination while operating this equipment.

  Consult your doctor about operating this machine while taking prescription medications.

- If the elderly are assisting with farm work, their physical limitations need to be recognized and accommodated.

- Do not allow long hair, loose fitting clothing or jewelry to be around equipment.

2.3 EQUIPMENT SAFETY GUIDELINES

- Safety of the operator and bystanders is one of the main concerns when designing and developing this conveyor. However, every year many accidents occur which could have been avoided by a few seconds of thought, and a more careful approach to handling equipment.

- Do not allow personnel to operate this unit until they have read this manual. They should have a thorough understanding of the safety precautions.

  Review the safety instructions with all users annually.

- In order to provide a better view, certain photographs or illustrations in this manual may show an assembly with safety guards removed.

  Equipment should never be operated in this condition. All guards must be in place. If removal becomes necessary for repairs, replace the guard prior to use.

- This equipment is dangerous to children and persons unfamiliar with its operation.

  The operator must be responsible, properly trained and physically able. You should be familiar with farm machinery in general.

- Never exceed the limits of a piece of machinery. If its ability to do a job, or to do so safely, is in question - DO NOT TRY IT.

- Do not modify the equipment in any way. Unauthorized modification result in serious injury or death and may impair the function and life of the equipment.

- The design and configuration of this conveyor includes safety decals and equipment. They need to be clean, readable and in good condition.

2.4 SAFETY DECALS

- Keep safety decals clean and legible at all times.

- Replace safety decals that are missing or have become illegible.

- Replaced parts must display the same decal(s) as the original parts.

- All safety decals have a part number in the lower right hand corner. Use this part number when ordering replacements.

- Safety decals are available from your authorized distributor, dealer's parts department or from Meridian Manufacturing Inc.

2.4.1 Applying Decals:

1. Be sure the application area is clean and dry. Ensure the surrounding temperature is above 10°C (50°F).
   a. Remove all dirt, grease, wax from surface.
   b. Clean with a non-ammonia based cleaner.
   c. Wipe the clean surface with isopropyl alcohol on paper towel, and allow to dry.

2. Determine the exact position before you remove the backing paper.

3. Peel a small portion of the split backing paper.

4. Align the decal over the specified area. Use a squeegee to carefully press the small portion, with the exposed adhesive backing, into place.

5. Slowly peel back the remaining paper and carefully smooth the rest of the decal into place.

6. Small air pockets can be pierced with a pin and smoothed out using the squeegee, or a piece of sign backing paper.

2.5 SAFETY DECAL LOCATION

The following illustration show the general location of safety decals on this conveyor. The position of decals may vary depending on the machine's options. Decals are no shown at actual size.

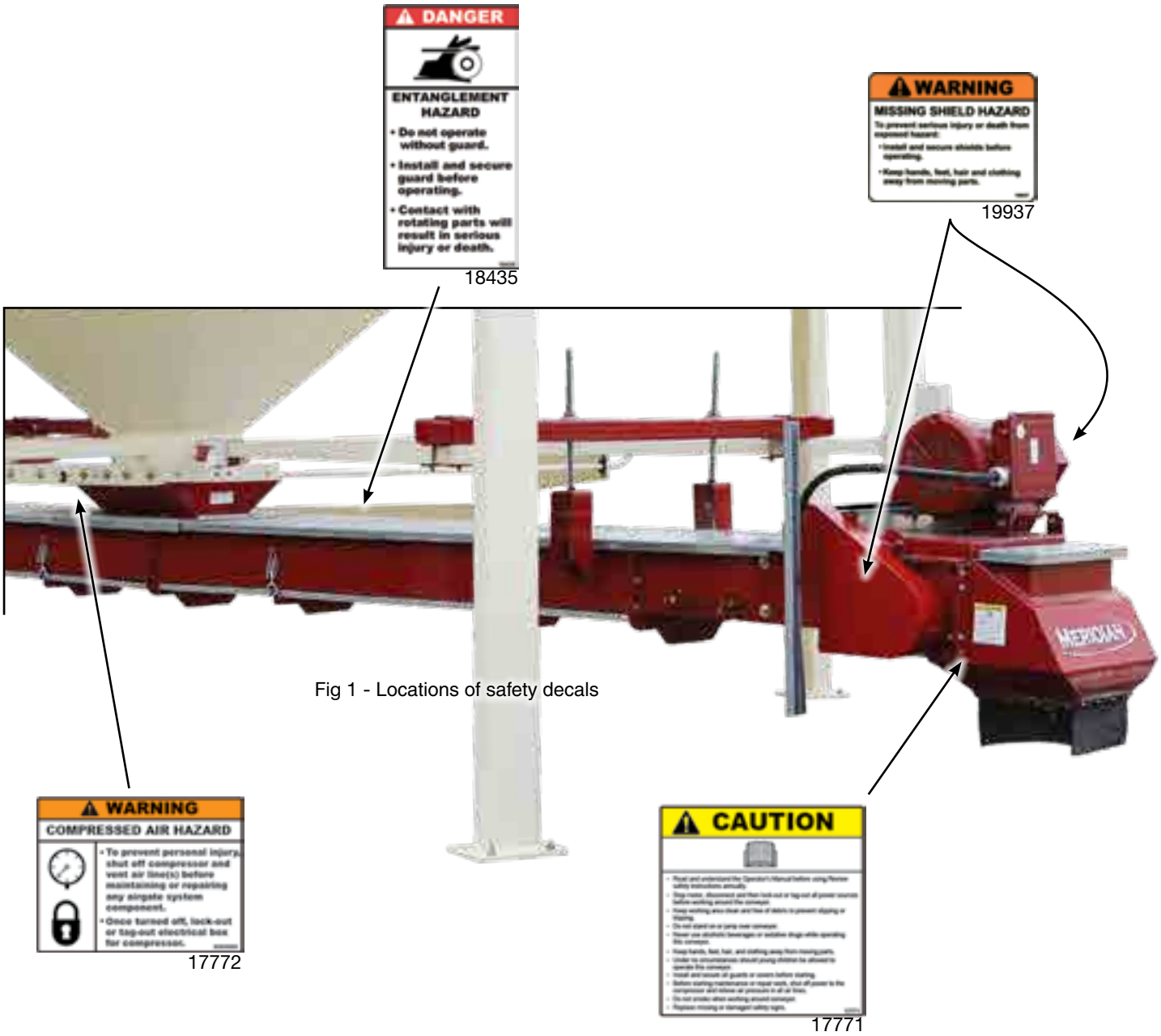


Fig 1 - Locations of safety decals

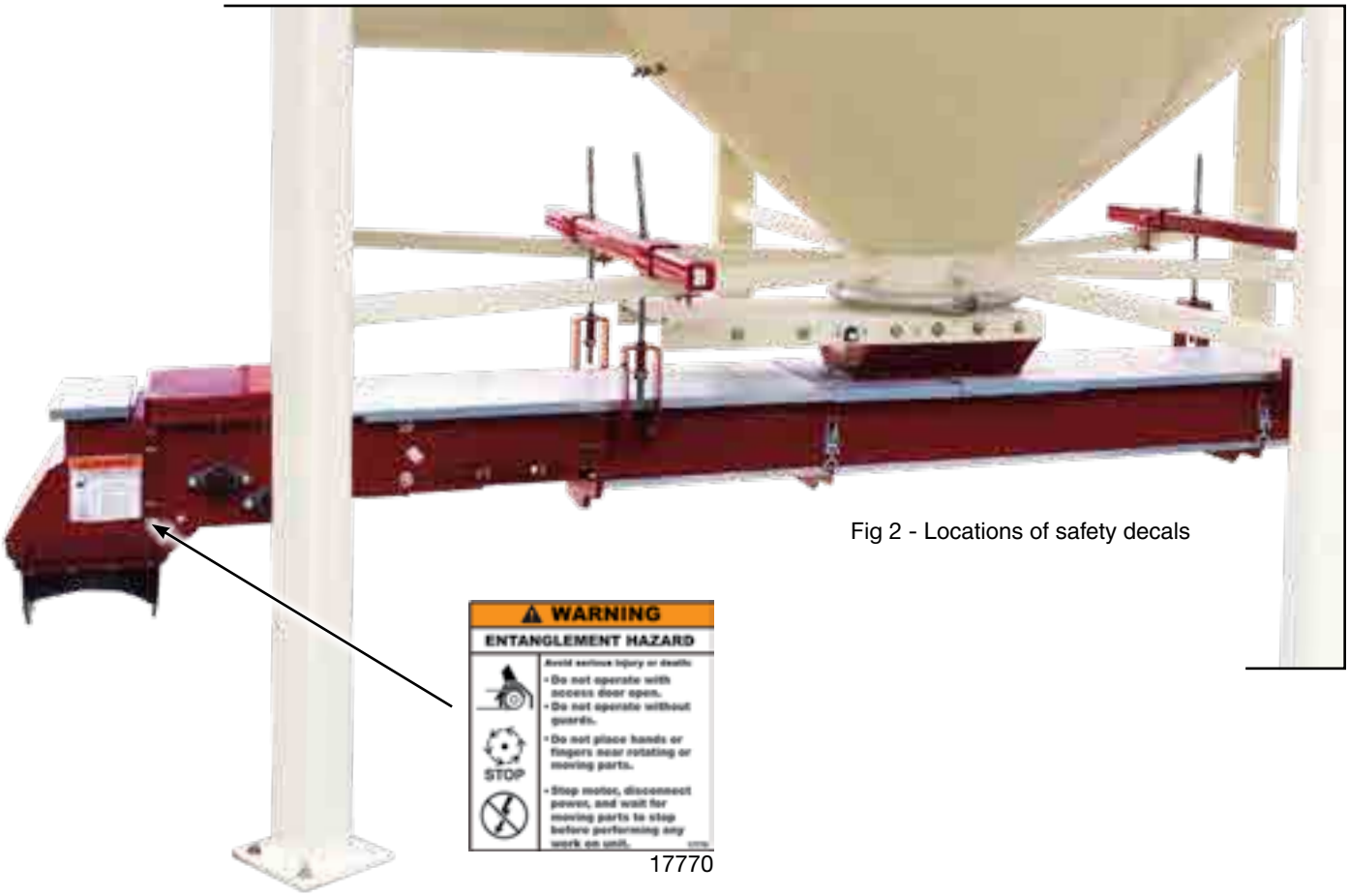


Fig 2 - Locations of safety decals

REMEMBER - If safety decals have been damaged, removed, become illegible or parts were replaced without signage, new ones must be applied. New decals are available from your authorized dealer.

2.6 WORK PREPARATION

- Never operate the conveyor and its engine until you have read this manual, and understand the information.

  Also, read the auxiliary equipment manual.

- Be familiar with the safety messages found on the decals around this unit.

- Personal protective equipment (PPE) include:
  - Hard hat
  - Eye protection
  - Protective shoes
  - Work gloves

  They are recommended during installation, operation, maintenance and removal of any equipment.

- Do not allow long hair, loose fitting clothing or jewelry to be around equipment.

- PROLONGED EXPOSURE TO LOUD NOISE MAY CAUSE PERMANENT HEARING LOSS!

  Agricultural equipment can often be noisy enough to cause permanent, partial hearing loss. We recommend that you wear hearing protection on a full-time basis if the noise in the Operator's position exceeds 80 db.

  Noise over 85 db on a long-term basis can cause severe hearing loss.

  Noise over 90 db adjacent to the operator over a long-term basis may cause permanent, total hearing loss.

Note:
Hearing loss from loud noise
(tractors, chain saws, radios, etc.)
is cumulative over a lifetime
without hope of natural recovery.

- Clear working area of stones, branches or hidden obstacles that might be hooked or snagged, causing injury or damage.

- Operate only in daylight or good artificial light.

- Be sure machine is in a stable position, is adjusted and in good operating condition.

- Ensure that all safety guards and safety decals are properly installed and in good condition.

- Before starting, inspect the unit for any loose bolts, worn parts, cracks, leaks or frayed belts. Make the necessary repairs.

  Always follow the maintenance instructions.

2.7 LOCK-OUT TAG-OUT SAFETY

- Establish a formal Lock-Out Tag-Out program for your operation.

- Train all operators and service personnel before allowing them to work around the area.

- Provide tags on the machine and a sign-up sheet to record tag out details.

2.8 ASSEMBLY SAFETY

- Read and understand Section 3 Underbin Assembly, and all safety signs before starting.

- Follow good safety practices:
  - Keep service area clean and dry.
  - Be sure electrical outlets and tools are properly grounded.
  - Use adequate light for the job.

- Use properly sized tools, stands, jacks and hoists at all times.

- Have two people available to handle heavy and/or bulky components.

- Keep as much room as possible open around and under the bins to work.

- Keep the assembly area neat and clean to prevent slipping or tripping.

- Be sure components are hanging securely under the bin before working underneath.

- Stay away from overhead obstructions when lifting the components during assembly. Contact with obstructions can damage components or cause them to fail.

- Tighten all fasteners to their specified torque before using the machine.

2.9 ELECTRICAL SAFETY

- Have only a qualified electrician supply power. All wiring should comply with the ANSI/NFPA 70 electrical requirements.

- Make certain that the conveyor motor is properly grounded at the power source.

- Ensure that all electrical switches are in the OFF position before plugging the conveyor in.

- Turn machine OFF, shut down and lock out power supply (safety lock-out devices are available through your Convey-All dealer parts department) and wait for all moving parts to stop before assembling, servicing, adjusting, maintaining or repairing.

- Disconnect power before resetting any motor.

- Replace any damaged electrical plugs, cords, switches and components immediately.

- Do not work on the conveyor's electrical system unless the power cord is unplugged or the power supply is locked out.

2.10 MAINTENANCE SAFETY

- Good maintenance is your responsibility. Poor maintenance is an invitation to trouble.

- Follow good safety practices:
  - Keep service area clean and dry.
  - Be sure electrical outlets and tools are properly grounded.
  - Use adequate light for the job at hand.

- Turn motor OFF, unplug power supply, and wait for all moving parts to stop before servicing, adjusting, maintaining or repairing.

- Always use personal protection devices such as eye, hand and hearing protectors, when performing any service or maintenance work. Use heavy or leather gloves when handling sharp components.

- Be sure the conveyor is hanging securely before working beneath the machine.

- Where replacement parts are necessary for periodic maintenance and servicing, genuine factory replacement parts must be used to restore your equipment to original specifications. Meridian will not be responsible for injuries or damages caused by use of unapproved parts and/or accessories.

- Periodically tighten all bolts, nuts and screws and check that all electrical connections are properly secured to ensure unit is in a safe condition.

- Function, ensure all safety shields and devices are installed before placing unit in service.

- Keep safety signs clean. Replace any sign that is damaged or not clearly visible.

2.11 OPERATING SAFETY

- Please remember it is important that you read and heed the safety signs on the conveyor. Clean or replace all safety signs if they cannot be clearly read and understood. They are there for your safety, as well as the safety of others. The safe use of this machine is strictly up to you, the operator.

- Stop the electric motor. Unplug power supply. Wait for all moving parts to stop before servicing, adjusting or repairing.

- Make sure that anyone who will be operating the conveyor or working on or around the unit reads and understands all the operating, maintenance and safety information in the operator's manual. Review safety related items annually.

- Keep all bystanders, especially children, away from the machine when loading or unloading is being done, or when authorized personnel are carrying out maintenance work.

- Establish a Lock-Out Tag-Out program for the work site. Be sure all personnel are trained in and follow all procedures. Lock-Out Tag-Out all power sources before servicing the unit or working around loading/unloading equipment.

- Be familiar with conveyor hazard area. If anyone enters hazard areas, shut down machine immediately. Clear the area before restarting.

- Keep hands, feet, hair and clothing away from all moving and/or rotating parts.

- Keep working area clean and free of debris to prevent slipping or tripping.

- Do not operate machine when any guards are removed.

Section 3: INSTALLATION

⚠ WARNING

- Read and understand Assembly Instructions and all safety signs before starting.
- Follow good safety practices:
  - Keep assembly area clean and dry.
  - Be sure electrical outlets and tools are properly grounded.
  - Use adequate light for the job at hand.
- Use proper lifting equipment, hoists, stands, jacks and at all times.
- Have lift equipment available to handle heavy and/or bulky components.
- Be sure the components are hanging securely before working underneath the conveyor.
- Tighten all fasteners to their specified torque before using the machine.
- Close and secure all safety guards before running the conveyor.

3.1 RECEIVING

The Meridian® Underbin Conveyor System is modular and requires assembly and installation under the seed bin based on the needs of the seed site. A minimum number of tools are required to install the components.

When you receive the conveyor shipment, check your parts list, to be sure that you have all the components, parts and supplies required to assemble your underbin conveyor.

Contact the transport company and the factory immediately if anything is missing from the shipment.

IMPORTANT:
The conveyor sections are shipped assembled.
Be sure lifting equipment will safely hold the weight of the sections.

3.2 GENERAL TOOL REQUIREMENTS

- Impact drills (multiple drills are useful for steps that can be done simultaneously)
- Lacing Tool
- Impact socket set
- Speed Drill
- Steel Drill bit set* (up to 1" in size)
- Wrench set (up to 1-1/4" in size)
- Angle grinder
- Allen Wrenches (Allen Keys)
- Hammer
- Pliers
- Vise-Grips (up to a total of 8 if you belt tension as described in Section 3.10)
- Utility Knives
- Nut Driver Set
- Measuring Tapes (25's or longer)
- Bottle jacks (floor jack)
- Level
- Chalk line or string line (if you need to check bin alignment)
- Punch set
- Tin Snips

* **Note:** A steel drill bit set comes in handy for some alignment issues.
For instance: If you are installing a seal kit install, and components are getting tight when attaching bars that hold the rubber in place from hopper to hood attachment. If the self-tapping screw wants to grab tight to the outer surface and not draw in. The outer hole can be drilled out so the self-tapping screw will pull in the outer bar.

3.3 CONVEYOR SECTION SPECIFICATIONS

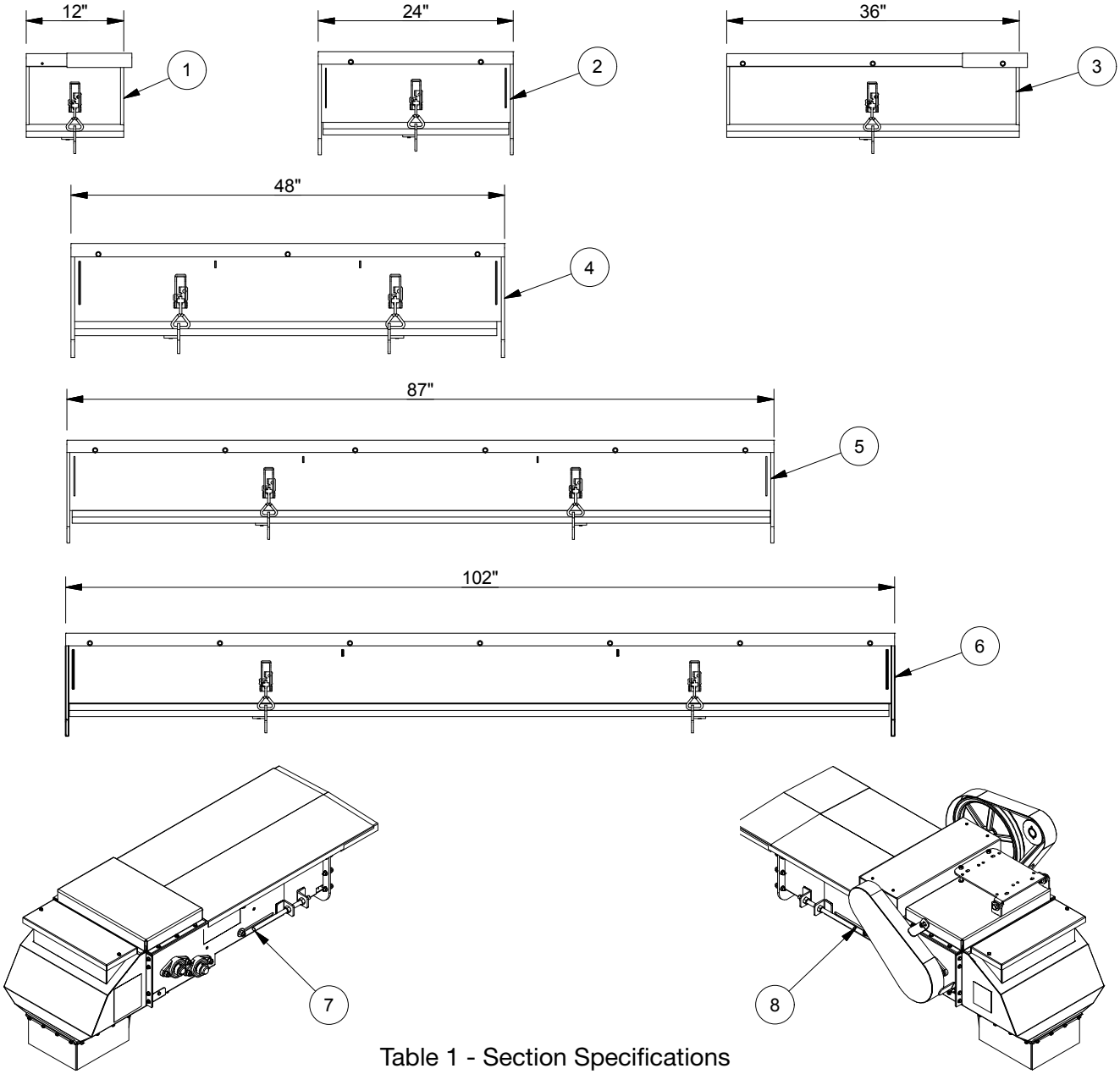


Table 1 - Section Specifications

ITEM	WIDTH	LENGTH	WEIGHT
1	46 cm (18”)	30 cm (12”)	16 kg (35 lb)
2	46 cm (18”)	61 cm (24”)	27 kg (59 lb)
3	46 cm (18”)	91 cm (36”)	40 kg (87 lb)
4	46 cm (18”)	122 cm (48”)	52 kg (115 lb)
5	46 cm (18”)	221 cm (87”)	91 kg (200 lb)
6	46 cm (18”)	259 cm (102”)	104 kg (230 lb)
7	46 cm (18”)	129 to 147 cm (51 to 58”)	98 kg (215 lb)
8	46 cm (18”)	129 to 147 cm (51 to 58”)	135 kg (298 lb)*

*Weight does not include the motor

3.4 ELECTRICAL SPECIFICATIONS

There are different voltage and phase options available for the underbin conveyors. The table below lists these various options and the corresponding part numbers. These components must be purchased separately.

Table 2 - Electrical Motor Options and Specifications

CONVEYOR LENGTH	MOTOR SIZE
12.2 M (40') - 2 Bins	5 hp
22 M (72') - 4 Bins	7.5 hp
27.4 M (90') - 5 Bins	10 hp
Over 27.4 M (90') - 5 Bins	15 hp

Table 3 - Electrical Motor Options and Part Numbers

MOTOR SIZE	MOTOR PART NUMBER
3hp/220V/1ph	17848
3hp/220V or 460V/3ph	17849
3hp/600V/3ph	17850
5hp/220V/1ph	27362
5hp/220V or 460V/3ph	18369
5hp/600V/3ph	18370
7.5hp/220V/1ph	18371
7.5hp/220V or 460V/3ph	18372
7.5hp/600V/3ph	18373
10hp/220V/1ph	18374
10hp/220V or 460V/3ph	18375
10hp/600V/3ph	18376
15hp/220V or 460V/3ph	18377
15hp/600V/3ph	18378

3.5 MACHINE COMPONENTS

The assembly of the underbin system should be a simple process.

The conveyor is typically hung under the bins, and power is supplied by an electric motor.

The main components are listed below:

a. Clean Out Cover and Hopper Attachment Point
b. Electric Motor
c. Airgate Assembly
d. Discharge Chute
e. Motor End of Conveyor
f. Drive Roller (inside housing)
g. Electric Motor Belt Tensioning Plate
h. Drive Pulleys and Belts
i. Belt Tension and Alignment Rods
j. Conveyor Top Cover
k. Conveyor Hanger
l. Conveyor Section
m. Quick Release Latch (to remove bottom cover)
n. Airgate Cylinder and Slide Gate
o. Airgate Section Top Cover
p. Non-Motor End of Conveyor
q. Conveyor Idler Roller

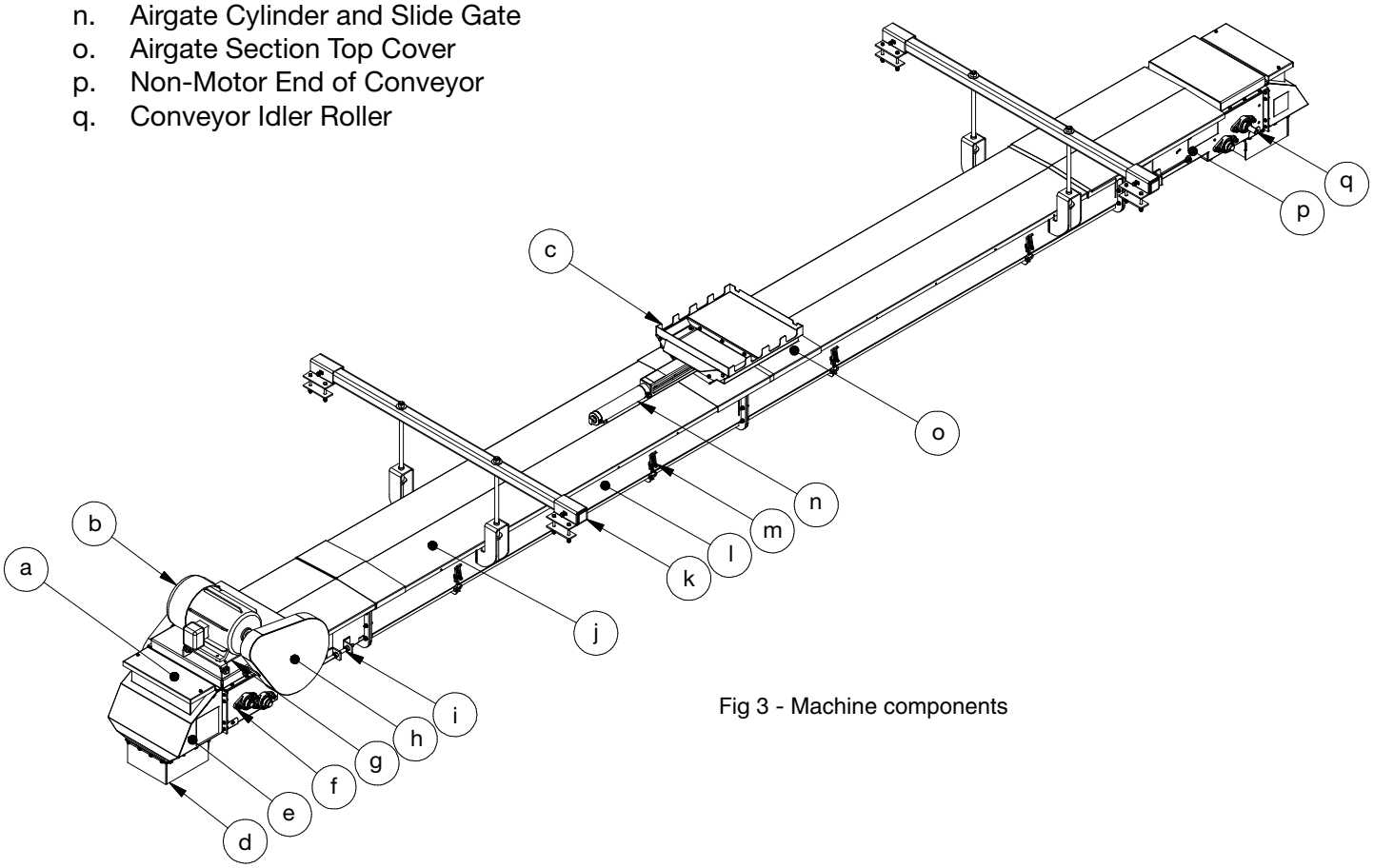


Fig 3 - Machine components

⚠ CAUTION

PINCH POINT HAZARD
Wear gloves to avoid pinching fingers while assembling.

LIMITED HEAD SPACE
Assembly takes place in limited space and awkward locations.

⚠ WARNING

HEAVY COMPONENT HAZARD
Review the following chart to determine the weight of the load before making the lifts in the next procedures.
Failure to have a properly rated lifting device can cause the load to fall, resulting in property and/or person injury, even death.

Table 4 - Conveyor System Component Weights

ITEM	WEIGHT
Conveyor Section, 30 cm (12")	16 kg (35 lb)
Conveyor Section, 61 cm (24")	27 kg (59 lb)
Conveyor Section, 91 cm (36")	40 kg (87 lb)
Conveyor Section, 122 cm (48")	52 kg (115 lb)
Conveyor Section, 221 cm (87")	91 kg (200 lb)
Conveyor Section, 259 cm (102")	104 kg (230 lb)
Motor End	135 kg (298 lb)
Non-Motor End	98 kg (215 lb)
Airgate Assembly	98 kg (215 lb)

3.6 BIN TRANSITIONS AND HANGERS

⚠ CAUTION

LIFTING HAZARD
To prevent injury, two people must lift and assembly heavy, awkward components

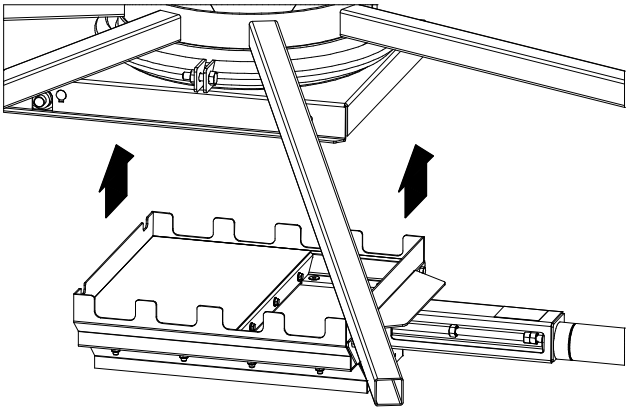


Fig 4 - Install bin transitions

3.6.1 Bin Transition and Air Gate:

1. Lift each bin transition into place under the slide gate of the bin.
   - If your system includes an air gate assembly, it is installed in the same manner.

2. Fasten each transition/airgate assembly onto the bottom of the seed bin using four 3/8" self drilling, self tapping screws on each side.

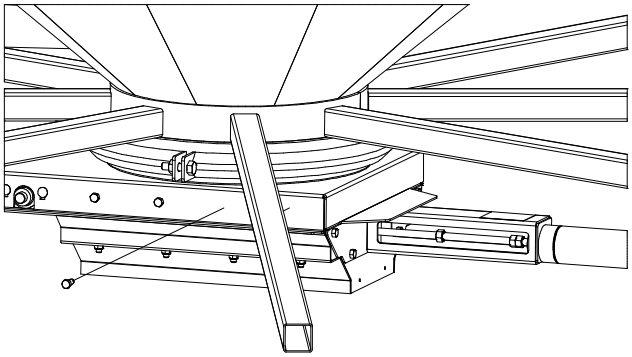


Fig 5 - Fasten bin transitions

IMPORTANT:
Alway refer to the site drawings which accompany your underbin installation package. They were created specifically for your location.

3.6.2 Hanger Brackets:

1. Layout all the underbin conveyor hanger bracket assemblies as shown in the site drawings.

2. Loosely install the hanger bracket assemblies onto the spoked tubing of the seed bin.
   - The cross brace should be located 12" (30 cm) from the vertical posts for a single bin system or 16" (40 cm) for multiple bins.
   - The brackets will be tightened once the sections are hanging in place.

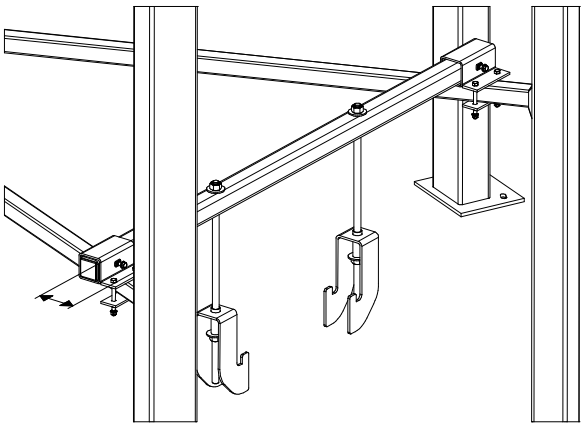


Fig 6 - Install hangers

3.7 CONVEYOR SECTIONS ASSEMBLY

3. Lay out all your underbin conveyor sections.

4. Remove the top and bottom covers.
   - The sections will be much lighter to move into position.
   - Lay the covers out of your way, yet close for installation later.

IMPORTANT:
Assembly the discharge/drive section(s) first.
This will include:
- Drive system - End-Drive or S-Drive, depends on what was ordered.
- Two or three conveyor sections.

If you have an S-Drive, it can be installed at any location along the underbin conveyor. The S-Drive is reversible, however it will have more capacity in one direction than the other. The slack adjuster should point in the direction of maximum capacity.

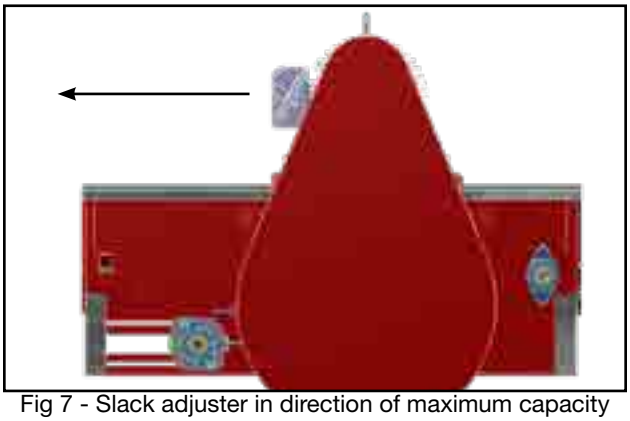


Fig 7 - Slack adjuster in direction of maximum capacity

5. Assemble the discharge, drive system and sections on the concrete, below the bin.
   - Bolt them together.
   - The length will utilize the first two main hanger brackets.

6. Connect two sections of underbin beds using the supplied hardware.
   - Tighten the bolts to standard torque.

Note:
The pulleys and drive belts will be installed after the belt is in place.

7. If the system being setup has a long section that will hang past the last bin, there will be a set of underbin leg supports supplied to hold-up the overhang.
   - They should be assembled at this time.
   - **IMPORTANT:** If there is an S-Drive at the main discharge end, stands are necessary, as it is too heavy to hang without support.

8. Position main discharge end sections, you just assembled, on the concrete with the right amount of overhang, as per the site drawing.
   - **Note:** This will reduce alignment work, once the sections are on the hangers, to obtain the correct "Pad Distance to Main Discharge Centre Point".

3.8 CONVEYOR SECTIONS INSTALLATION

IMPORTANT:
If extra lift equipment such as a jib crane, or extended forks are required to raise sections into place, then it is up to the installer's discretion to lift safely and as effortless as possible, without damaging the underbin components.

⚠ WARNING

HEAVY COMPONENT HAZARD
Two combined conveyor sections can weigh more than 400 lb (180 kg). Use lift equipment!

9. Lay the galvanized splash guard in place on the underbin bed positioned below the slide gate.
   - There is a splash guard for each bin transition in the system.

10. The tabs on the guard must point up.
    - Do not attach it yet.

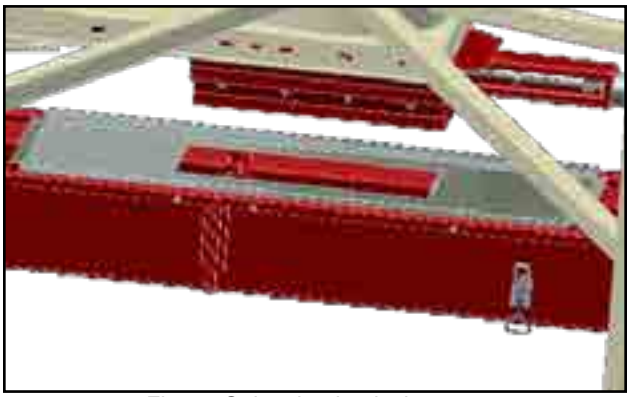


Fig 8 - Galvanized splash cover

11. Lift the discharge section with drive system into place.
    - Raise it to the two hanger brackets and hook the hangers onto underbin section.

Conveyor Position Adjustments:
MAKE SURE THE "BIN PAD TO CENTRE OF MAIN DISCHARGE" IS ACCURATE.
You will now proceed to lift, hang and bolt together each section to the other end. Adjusting the main discharge position later is very difficult due to all the weight on hangers, so better to get it right now.

12. Once these sections are hanging:
    - Raise the sections SNUG to the transition assembly under the bin.
    - Refer to Section
    - Level the sections.

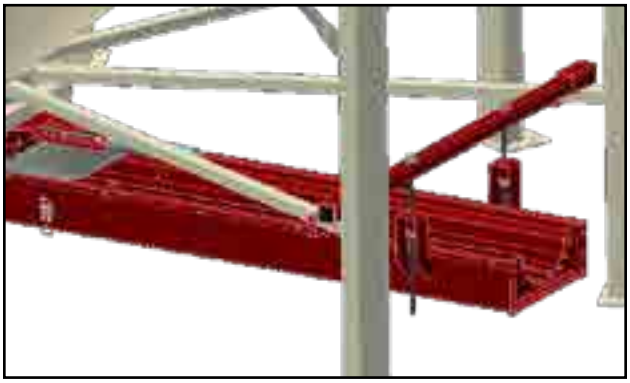


Fig 9 - Lift section

IMPORTANT:
It is important to establish the correct height at the beginning. Then the rest of the sections will all be close to the right level and save lots of adjusting time later.

Note:
Some bin gate systems have a swivel gate attachment. Loosen the swivel gate bolt on the bin to help align it to the underbin section.

13. As conveyor sections are being installed, thread a rope through each section in order to help pull the conveyor belt through the sections.

Note:
Once your main discharge is hanging correctly depending how many crew members you have this would be a good time to send someone to starting setting up your incline conveyor.
(See Incline setup instructions)

14. Continue to centre each conveyor section to align with the bin transition.

15. Raise the next section into position.
    - Hang the section from the hanger brackets.
    - Bolt it to the previous section.

Note:
When installing the conveyor system under multiple seed bins, connect and install two sections at a time, bolting the two larger sections together after they are supported from the hanger brackets.

16. Continue until all the sections are hanging in place.

17. Attach the discharge end(s).
    - One end if installing an End Drive system.
    - Two ends, if installing an S-Drive.

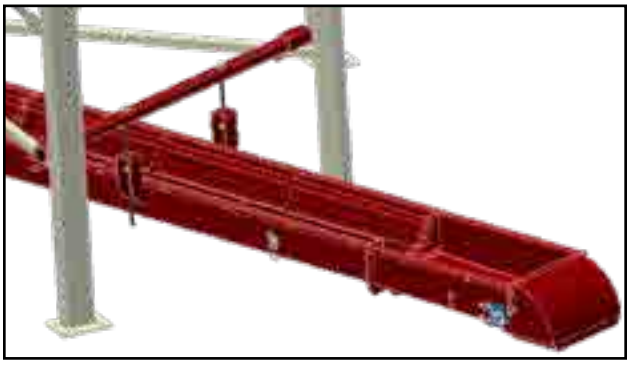


Fig 10 - Attach discharge

3.8.1 Splash Guards:

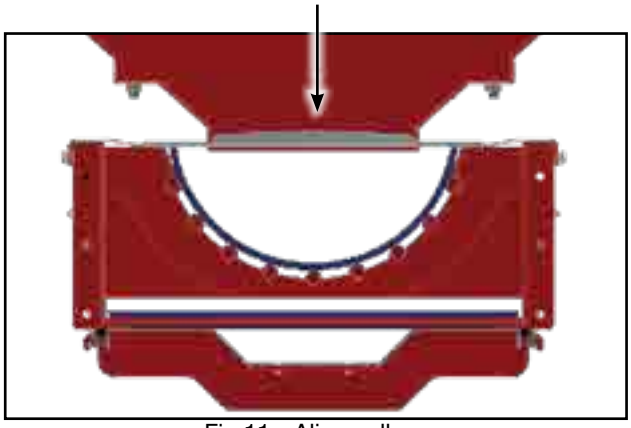


Fig 11 - Align pulleys

To fit the splash guards around the slide gate correctly, raise or lower the hanger brackets. There should be a snug fit between the top of belt trough section upper rails, where your belt rides, and the guard.

Too Loose Splash Guard: Product will bounce off the belt, get through the gaps and end up on the bottom underbin section cover. This will create a big mess for the operator to clean out.

Too Tight Splash Guard: Raising the hanger bracket too much, can also deflect product so it's important to adjust the tension between underbin, splash guard and discharge transition correctly.

3.9 INCLINE SECTION SETUP

The assembly of incline sections is essentially the same as an overhanging section; using leg supports instead of hangers.

IMPORTANT:
Refer to your custom site drawings to determine the location and degree of the incline angle.

There will be a set of longer leg supports supplied to hold up the incline section.
• The legs can be assembled at this time.

The drawings will indicate the location and height of the legs to obtain the correct angle for the section.

Note:
Free standing underbin conveyors system often come with extra tubes to create X-braces or similar support structures.

Anchor the supports, off the side, and into concrete to make the system stand solid and reduce side to side stress.

3.10 INSTALL THE CONVEYOR BELT

Once all sections are bolted together (excluding the discharge hoods), you can install the belt.

18. Loosen all the rollers fully, so they have all the tension travel distance remaining.
    - This helps to get your belt to the right length prior to cutting and lacing.

Note:
S-Drive System: loosen the tensioning system and guide rollers as well.
End Drive System: Release the mechanical tensioning system completely.

19. Bring the entire belt roll to the opposite end of main discharge.
    - Suspend it with a bar through the centre of belt roll using a forklift.
    - Use straps to hold the bar in place.

Note:
A height adjustable floor stand can also work, if the belt roll can unravel freely.

IMPORTANT:
Be sure that the belt is being threaded so that the belt ribbing ends up laying face-up on the conveyor bed (to carry product), and the smooth side is inward contacting the rollers.

3.10.1 S-Drive Belt Threading:

20. If equipped with an S-Drive:
    - Starting at the belt roll, which is at the opposite end from the main discharge.
    - Use the rope (refer to Instruction #13), pull the belt down the conveyor bed and under each bin transition.

21. Wrap the belt around the main discharge.

22. Guide the belt through the conveyor return sections, underneath the bed.
    - A creeper or mechanics dolly is helpful for working under the conveyor beds.
    - A winch system to help pull the belt through would also help. Be careful not to tare, snag or stretch the belt.

23. Stop feeding the belt once you get to the S-Drive.

24. Use vise-grips to clamp the belt to the frame, so it doesn't move while working at the other end.

S-Drive Note:

The last step should be to feed the belt through the S-Drive. It's difficult to move the belt once through the drive.

- Pull the belt across the bed, around both ends, feed through the S-Drive, then lace.

25. Return to the belt roll. Feed the other end through the return sections towards the S-Drive.

26. Once both ends are at the S-Drive, feed one end through the drive rollers; as shown in Figures 14 ad 15.

27. Pull the slack from each end.

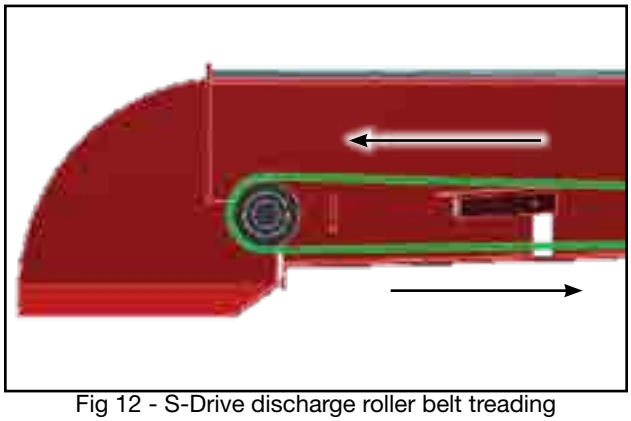


Fig 12 - S-Drive discharge roller belt treading

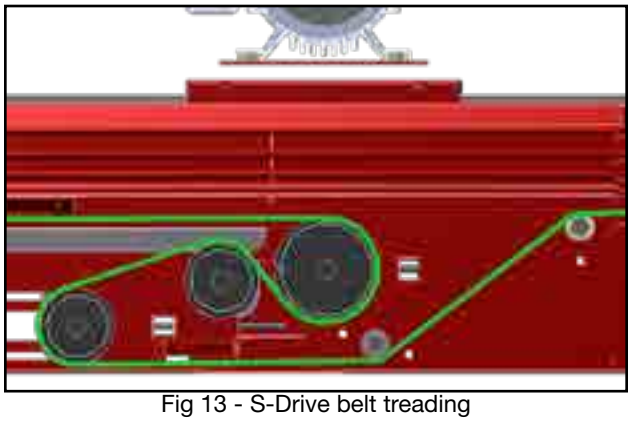


Fig 13 - S-Drive belt treading

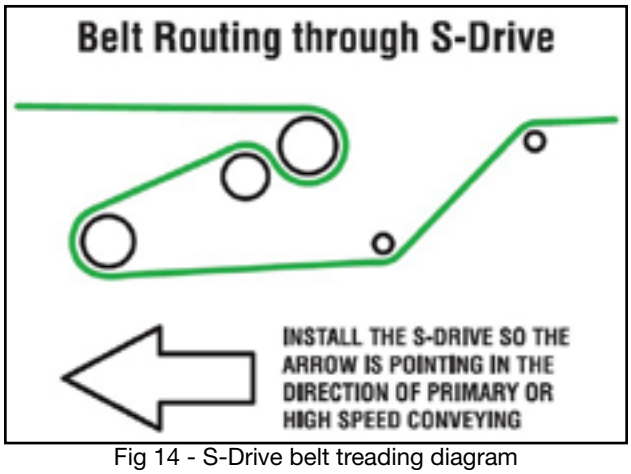


Fig 14 - S-Drive belt treading diagram

3.10.2 Add Lacing to Belt Ends:

Note:
Place a piece of 2x4 wood underneath while working on the belt and lacing.

28. Take one end of the belt and cut it square.
    - Ensure lacing connection will be true.
    - Belt travel should be true as well.

Note:
Lacing length is 1" less than belt width; a 17" belt requires a 16" length of lacing.

29. Trim the ribs off the end of the belt as far as the lacing will overlap, so you are left with a smooth surface where the lacing fastens to.

30. Use the lacing tool to hammer staples through the belt.
    - The lacing tool is supplied by the installer.

31. Use a small punch to entirely flatten out the staples on the smooth side of the belt.

Note:
There should be a 10" gap between belt ends after pulling tight by hand.

32. Mark the correct length on the other end of the belt.
    - Using a heavy duty utility knife, cut the belt off square at marked length.

33. Clear the ribs off this end of the belt.

34. Attaching the lacing.
    - Use the lacing tool.
    - Use a small punch to flatten the staples on the smooth side of the belt.

3.10.3 S-Drive Belt Fastening:

Note:
Fasten the belt below the conveyor when equipped with an S-Drive.

35. Remove the vise-grips holding the belt.

36. Use a Come-Along Winch to pull the belt ends together.

    a. Clamp an angle iron (with pull loop weldment) to each end of the belt, 15" from the end (far enough back not to impede on the lacing process).

    b. Hook the Come-Along Winch to the angle irons underneath the belt.

37. Use the winch to pull both ends of the belt so they meet.

Fig 15 - Clamp the belt

Fig 16 - Use a Come-Along Winch to pull

38. Link the ends of the belt lacing.

39. Work the lacing cable through to fasten the belt.
    - Use a vise-grip with little pressure. Grab the cable about a 1/4" back from the end, and bit by bit work it through to the lacing.

Note:
If the lacing is quite tight, have a second person help by keeping the lace joints aligned ahead of the cable.
Slow and steady wins the race


Fig 17 - Thread the lacing cable

40. Once your lacing cable is through, cut off the excess cable.

41. Crimp the lacing at both ends to lock the cable in place.

42. Cut and taper the belt corners, at both ends of lacing.


Fig 18 - Crimp lacing

IMPORTANT:
Taper the belt corners,
so they don't catch when belt is running.

3.10.4 End Drive Belt Threading:

43. If equipped with an End Drive:
    Guide the belt end through the conveyor return sections, underneath the bed.
    - A creeper or mechanics dolly is helpful for working under the conveyor beds.
    - A winch system to help pull the belt through would also help. Be careful not to tare, snag or stretch the belt.

44. From under the bed, thread it between the tension and drive rollers.

45. Wrap the belt around the drive roller and onto the bed.

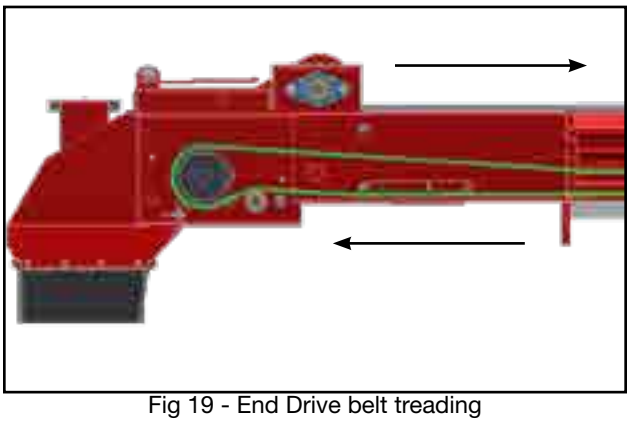


Fig 19 - End Drive belt treading

46. Use vise-grips to clamp the belt to the frame, so it doesn't move while working at the other end.

47. Wrap the other end of the belt around the tail end roller, onto the bed.

48. Using the rope (refer to Instruction #13), pull the belt down the conveyor bed and under each bin transition.

49. Pull the belt until the two ends meet.
    - There should be a 10" gap between the belt ends after pulling tight by hand.

50. Add lacing to both ends of the belt.
    Refer to Section 3.10.2 Add Lacing to Belt Ends

3.10.5 End Drive Belt Fastening:

Note:
Fasten the belt on the conveyor bed when equipped with an End Drive.

51. Use a Come-Along Winch to pull the belt ends together.

    a. Clamp an angle iron (with pull loop weldment) to each end of the belt, 15" from the end (far enough back not to impede on the lacing process).

    b. Hook the Come-Along Winch to the angle irons.

52. Keep the 2x4s on the conveyor bed, under the belt ends, to keep it raise above the bed.

53. Use the winch to pull both ends of the belt so they meet.

54. Join both ends of the belt on top of the bed.

55. Link the ends of the belt lacing.

56. Work the lacing cable through to fasten the belt. See Figure 17
    - Use a vise-grip with little pressure. Grab the cable about a 1/4" back from the end, and bit by bit work it through to the lacing.

57. Once your lacing cable is through, cut off the excess cable.

58. Crimp the lacing at both ends to lock the cable in place. See Figure 18

59. Cut and taper the belt corners, at both ends of lacing.

IMPORTANT:
Taper the belt corners,
so they don't catch when belt is running.

3.11 DRIVE AND AIRGATES

60. Fasten the appropriate electric motor onto the adjustable base plate.

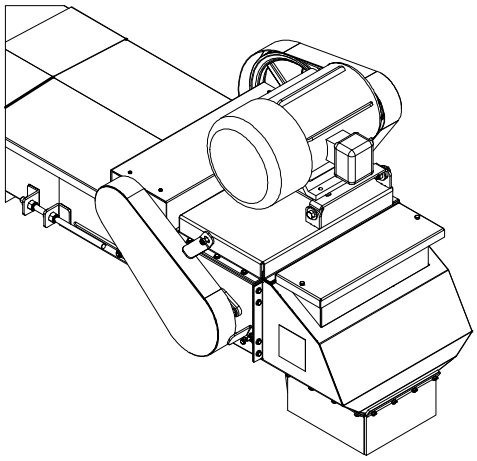


Fig 20 - Electric motor on End Drive

NOTICE

The regulated air pressure for airgate cylinders should be between 90 and 110 psi (620 and 750 kPa). To prevent component damage, do not exceed the maximum recommended pressure. Use a pressure regulator, connected to the air supply, to prevent over-pressurization.

61. If airgates are part of the system:
    - Install and attach air lines to the airgate cylinder(s).
    - The air lines for the airgate cylinder should be placed inside the metal or PVC tubing to protect them from damage.

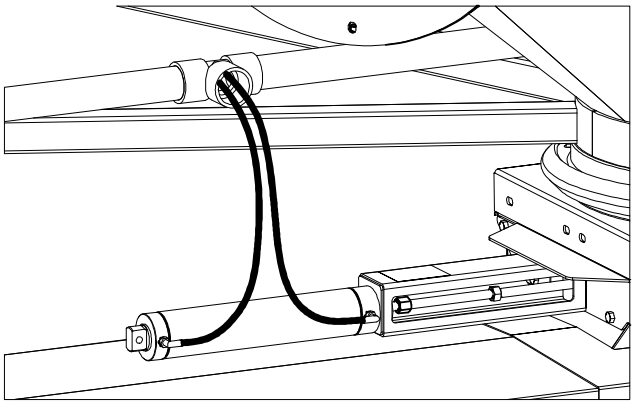


Fig 21 - Air lines to gate cylinders

3.11.1 S-Drive Setup:

The S-Drive assembly "Main Roller Tension System" may not be shipped exactly as the final assembly needs to be.

A couple of springs are sent along for each side of the kit and sometimes an extra nut or two are sent as well.

The S-Drive tensioning system basically consists of two components which help tension the system:

- Main tensioner rollers (older version pushes the roller; newer version pulls the roller)
- Pinch roller

Figure 22 shows the proper tensioning setup for an S-Drive.

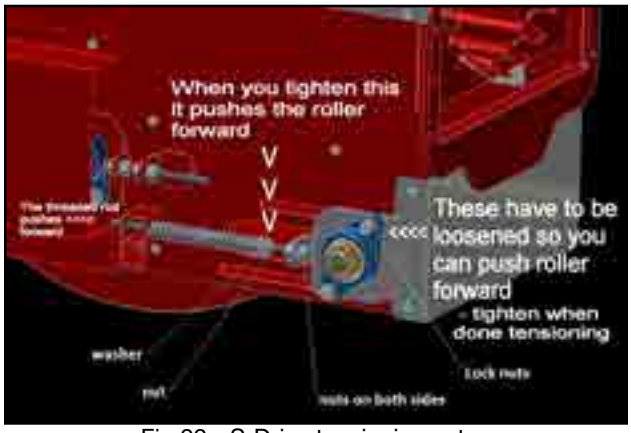


Fig 22 - S-Drive tensioning setup

3.11.2 End Drive Setup:

This system is fairly simply and self-explanatory to install and tension.

Adjusting Tip:

When facing a roller to view the alignment, if the belt runs to the left, move the left-side adjuster forward to push the belt back to the right, and vice versa until belt runs true in the centre.

3.11.3 Drive Assembly:

Springs - Their main purpose is to take start-up shock off the belt system. If the motor has a soft start function, the springs are less of a factor.

62. Keep the pinch roller a little looser until the main tension roller has been adjusted.

63. Tension main tension roller until the belt feels like it is getting fairly stiff.

64. Now, apply tension to the pinch roller, ensure there is a bit of indentation on the roller-to-belt pinch point.

Note:
If you apply excessive tension, you actually produce some drag to the system versus drive assistance. FIND THE HAPPY MEDIUM!

Note:
Mount the pulley as close to the flange bearing as practical, but not closer than 1/8" to avoid excessive load on the bearings and shaft.

Note:
If the wrong hub or keyway was shipped incorrectly, the most cost effective solution is to source the right component locally – then report issues to manufacturer.

65. Ensure all pulleys are spaced the same distance from the drive unit so belts run true.

66. Install pulley guards:

67. Install the four pulleys onto the drive shafts.
    - Motor shaft part numbers: 27466/17840
    - Speed reduction shaft part numbers: 27444/27517 and 27466/27517
    - Drive roller shaft part numbers: 27425/17839.

68. Loosely install the split bushings into the pulley and then onto the shaft.

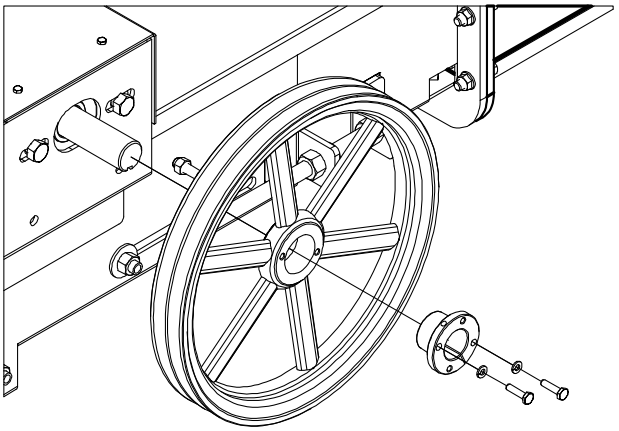


Fig 23 - Pulley and split bushing

69. Align both sets of the pulleys using a straight edge.
    - When properly aligned, a steel straight edge should contact all four points across the face of the two pulleys.

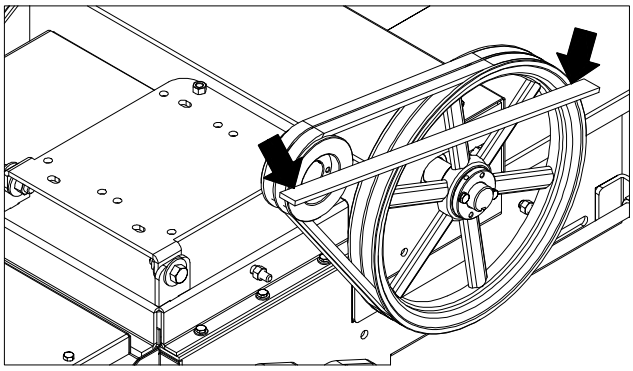


Fig 24 - Align pulleys

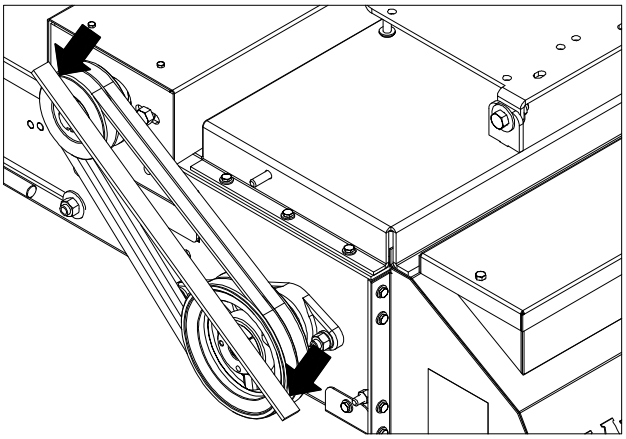


Fig 25 - Align pulleys

NOTICE

Misaligned pulleys will accelerate the wear of the belt sidewalls, which in turn will shorten both the belt and pulley life.

70. Install the drive motor V-belts.

NOTICE

Never pry or force a belt onto the pulley with a pry bar or by rotating the shaft as the belt is forced on. This practice will damage the tensile cord. The life of the belt will be drastically reduced.

71. Tighten the belts on the drive-side first.

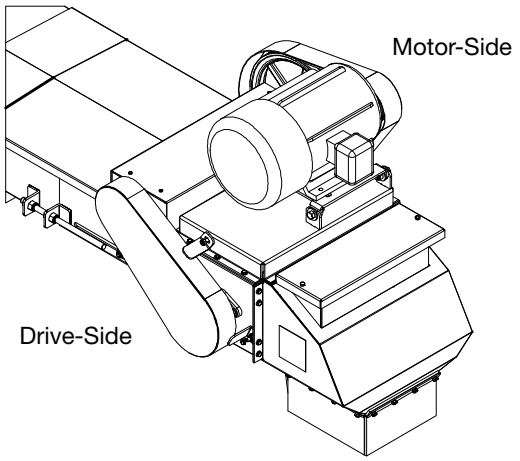


Fig 26 - Drive-side and motor-side of conveyor

72. Slightly loosen the two flange bearing bolts (4) on the speed reducer shaft.

73. Use hand pressure to push on the belts halfway between the pulleys. See Figure 27
    - Calculate the tension by adding the length of span between pulleys.
    - Allow 1/64" of deflection per inch of span.

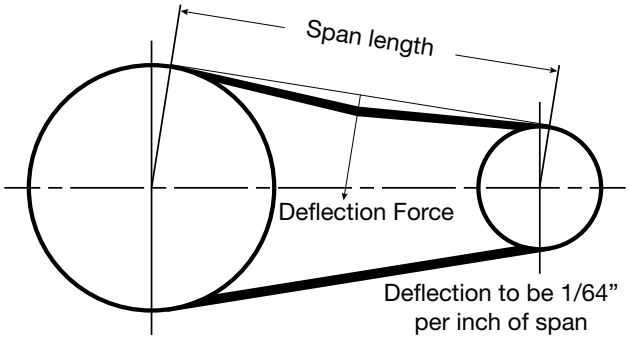


Fig 27 - Tension calculation

NOTICE

Do not overtighten the belts. Overtightening can reduce belt and bearing life.

74. Tighten the two flange bolts. See arrow #4

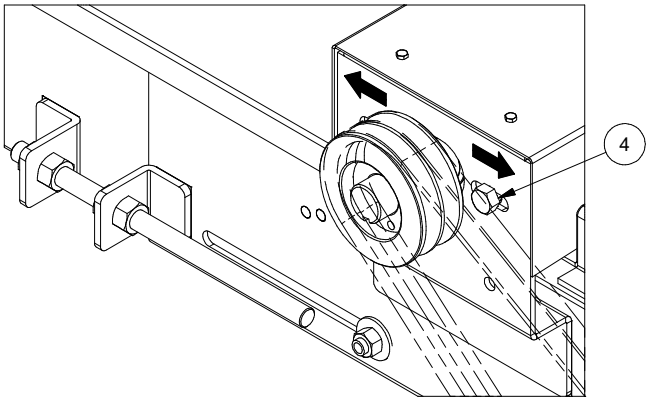


Fig 28 - Flange bolts, arrow #4

75. Adjust the flange bearing on the motor-side so the shaft is parallel with the drive roller shaft.
    - Tighten the flange bolts.

NOTICE

When adjusting belt tension, it is important that the two shafts remain parallel to each other. Abnormal wear on both the belt and pulley will occur if the alignment is not correct.

76. Adjust the belt tension on the motor-side by adjusting the base plate.

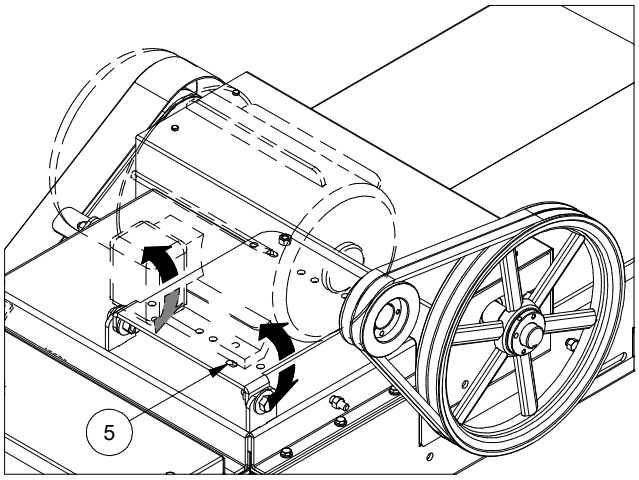


Fig 29 - Base Plate bolts, arrow #5

77. Recheck the alignment of the pulleys and shafts. Correct any misalignment before installing the covers.

3.11.4 Initial Drive Testing:

⚠ WARNING

MOVING BELT HAZARD

During break-in process, pulley guards may need to be removed, by experieinced personnel, to view tracking on some hard to see rollers.

Keep hands and clothing free of moving components at all times while system is running. Adjust only while system is in Lock-Out, Tag-Out mode.

78. If a licenced electrician will supply power to the motor at a later date, a true system test run can't be done until then. If that is the case:
    - Ensure all rollers, that have adjustable tensioners, have consistent threading distance on either side.
    - If the electrician starts up the system without the installer around, and the guides are too far off, the belt can run into one side quite hard possibly causing some unwanted wear or damage (including damage to the rollers at both discharge ends of the system).

79. After power is hooked up the rollers can be adjusted so the belt alignment tracks down the centre of the rollers, equal-distant from the sides.

80. Briefly run the conveyor to check the tensions and the tracking of the conveyor belt.

81. If product is available it's important to test run with product so you can apply proper tension without belt slippage as well.

82. It is important to show the owner and operating staff proper adjusting methods and tensioning system as well.

3.12 COVERS AND HOODS

After the conveyor system has been; assembled and installed, conveyor/drive belts are tensioned and aligned, and it has been tested, it is time to cover the sections.

83. Clamp the bottom covers into place using the latches on the sides of the conveyor sections.
    - **Note:** If the odd piece is tight due to weld size or underbin section sizing is off by a fraction, trim the end as required.

84. Set the two top covers onto the conveyor sections.
    - Centre the two top covers from the bin transition/airgate assembly onto the conveyor sections.

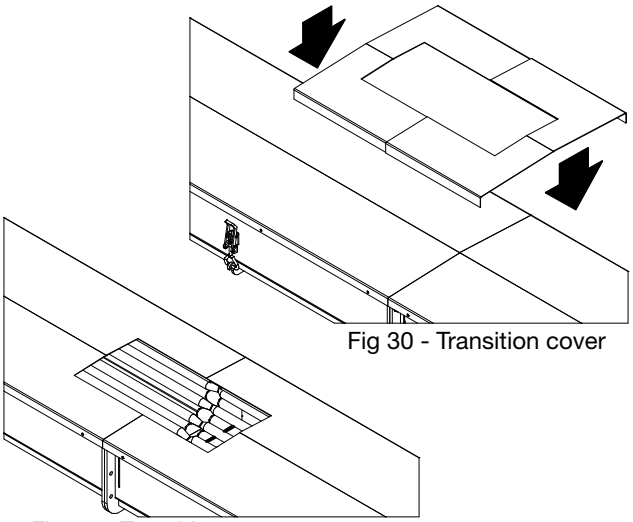


Fig 30 - Transition cover

Fig 31 - Transition cutout

85. Using the bin transition/airgate cover, trace the opening onto the two sections of the conveyor cover.

86. Remove the transition/airgate cover and cut out a slightly oversized opening in the conveyor covers.

Note:

The cut out in the conveyor covers can be 1 to 2 inches (25 to 50 mm) bigger than the traced opening.

87. Fasten the transition/airgate cover onto the conveyor sections.
    - Use self-tapping screws.

88. Install the top covers onto the conveyor sections.
    - Use self-tapping screws to fasten them to the sides of the frame.

89. Install the small covers (between each section) to prevent water from entering the conveyor system.

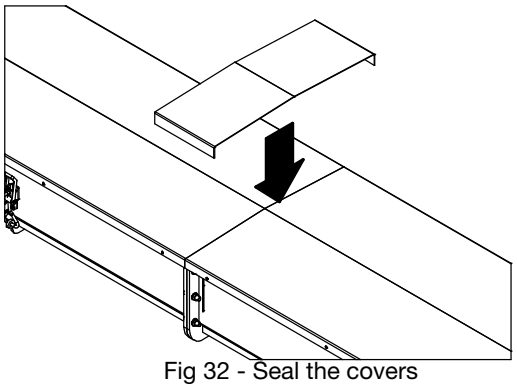


Fig 32 - Seal the covers

90. Install all belt and shaft covers.

91. Mount the discharge hoods at the ends.

Note:

If the conveyor belt break-in and adjusting will be completed in the future, once electrical is complete, the hoods and cover can be removed at that time to view the components.

92. Charge the air system. Make sure all hose couplings and connections are tight.

93. Make a final inspection, making sure all hardware is properly tightened, the conveyor sections are level, and the hanger devices are properly positioned and attached to the seed bin.

3.13 FINAL CHECK AND TESTING

All items must be able to have the "Yes" column checked before day-to-day operation can be approved. If the line refers to an option that is not on the conveyor being tested, check the "n/a" column.

ITEM TO CHECK	Yes	No
Top covers, on all conveyor sections, are in place	☐	☐
Small covers, between sections, are installed	☐	☐
Bottom covers, on all conveyor sections, are securely latched in place	☐	☐
All drive motor belt covers/shields are in place	☐	☐
Conveyor belt tracks down the centre of the rollers	☐	☐
Conveyor belt tension is correct	☐	☐
Drive belt(s) tensioned corrected	☐	☐
Electric drive motor functions properly	☐	☐
Conveyor belt operates in the correct direction	☐	☐
Touch-up paint is applied where needed	☐	☐
All safety decals are in place and legible	☐	☐
Grease is applied to all drive motor and conveyor bearings	☐	☐

OPTIONS	Yes	No	n/a
Airgate cylinders are operating properly	☐	☐	☐
Air pressure is set correctly.	☐	☐	☐

This page intentionally left blank

Section 4: OPERATION

⚠ WARNING

- Read and understand the Operator's Manual, and all safety decals, before using.
- Clear the area of bystanders, especially children, before starting.
- Keep working area clean and free of debris to prevent slipping or tripping.
- Before starting, visually inspect for frayed belts and worn parts, cracks or leaks. Make the necessary repairs immediately.
- Keep hands, feet, hair and clothing away from all moving and/or rotating parts.
- Operate only in daylight or good artificial light.
- Stop the motor, unplug, place all controls in neutral and wait for all moving parts to stop before servicing, adjusting, repairing.
- Wear hearing protection! Prolonged exposure to loud noise may cause permanent hearing loss.
- Do not operate with guards removed.
- Establish a Lock-Out Tag-Out program for the work site and make sure the procedures are followed.

The Meridian® Underbin Conveyor is designed to efficiently move grain, pulse crops, or granular material from a storage facility to another location. Power is provided by an electric motor. Be familiar with the equipment before starting.

It is the responsibility of the owner and operator to read this manual and to train all personnel before they start working with the machine. Follow all safety instructions exactly - it is everyone's business. By following recommended procedures, a safe working environment is provided for the operator, co-workers and bystanders in the area around the work site.

The design and configuration of this underbin conveyor includes safety signs and equipment. Hazard controls and accident prevention are dependent upon the personnel operating and maintaining it. Their awareness, concern, prudence and proper training are crucial.

Many features incorporated into this machine are the result of suggestions made by customers like you. Read this manual carefully for instructions on how to set it to provide maximum efficiency.

By following the operating instructions in conjunction with a good maintenance program, your conveyor will provide many years of trouble free service.

4.1 MACHINE BREAK-IN

Once the installation of your underbin conveyor is complete; we, the manufacturer, recommend that Meridian service personnel commission your conveyor before using it to move product.

There are no operational restrictions on the conveyor when used for the first time.

t is recommended that the following mechanical items be checked when breaking-in the machine.

Before Starting Work:

1. Read this manual.
2. Run the unit for half an hour to seat the belt.
3. During the conveyors first few minutes of operation, check belt alignment to ensure the alignment does not vary under loaded conditions.
4. The belt tension will vary depending on the load it is carrying, but it should not slip on the drive roller.

After Operating For 1/2, 5 and 10 Hours:

5. Check the conveyor belt tension and alignment.
6. Check the drive belt(s) tensions and alignment.
7. Check that drive pulleys are aligned.
8. Check that all guards are installed and working as intended.
9. Check all fasteners. Tighten to their specified torques.
10. Check all airline connections for leaks.
11. Proceed with the regular servicing and maintenance schedule as defined in the Section 5.2 and 5.3.

4.2 PRE-OPERATION CHECKLIST

⚠ WARNING

MOVING BELT HAZARD
To prevent injury or death, keep hand and clothing away from moving parts.

Efficient and safe operation of the conveyor requires that each operator reads and understands the operating procedures and all related safety precautions outlined in this section. A pre-operation list is provided below.

It is important for personal safety and the maintaining of good mechanical condition of this conveyor that this list is followed.

Each time, before operating the conveyor, the following areas should be check:

1. Service conveyor as outlined in Section 5.2.
2. Clean up working area and remove anything unnecessary to prevent slipping or tripping.
3. Check the drive and conveyor belts tension and alignment.
   - Adjust as required.
4. Visually check that the conveyor belt and drive belts(s) are not frayed or damaged.
   - Replace if necessary.
5. Check that all guards are installed, secured and functioning as intended. Do not operate with missing or damaged shields.
6. Start conveyor and check that the controls function properly.

4.3 DAILY OPERATING

SAFETY INSTRUCTIONS

Have a licensed electrician provide power to the motor.

The conveyor system is controlled by user supplied controls. Alway follow the instructions provided by the installer.

When operating the conveyor, follow this procedure:

1. Clear the area of bystanders, especially small children, before starting.

   Should anyone enter this area, stop the conveyor immediately.

2. Review the Pre-Operation Checklist before operating (Section 4.2).

3. Check that all guards are in place and working as intended.

4.3.1 Starting Conveyor:

4. Turn power on at master control box.
   - If the motor has it's own switch - turn it on.

IMPORTANT:
Operate one gate at a time to keep from plugging the conveyor.

4.3.2 Stopping Conveyor:

5. Close the gate to stop unloading.

6. Run conveyor until it is empty.

7. Turn conveyor power off.
   - Turn off power at master panel and unplug the electrical cord.

4.3.3 Emergency Stopping:

Although it is recommended that the belt be emptied before stopping, in an emergency situation, turn off the motor immediately.

Correct the emergency before resuming work.

4.3.4 Restarting After Emergency Stop:

When the conveyor is shut down inadvertently or in an emergency, the conveyor belt will still be covered with product.

Remove as much product from the discharge/drive end as possible, before restarting.

The bin hopper gate may be plugged open. As soon as possible after restarting, close the gate.

Since start-up torque loads are much higher than normal when the belt is full, run power in short, slow bursts until the belt is empty.

Once the belt is running empty the gate can be reopened to unloaded product onto the belt.

4.3.5 Unplugging:

In unusual moisture, crop or product conditions, the machine can become plugged. When unplugging, follow this procedure:

1. Turn off the conveyor motor.

2. Lock-Out, Tag-Out the controls.

3. Remove product from the discharge and bin hopper transition.

4. Run power in short, slow bursts until the belt is empty.

4.4 OPERATING HINTS

- Product should be unloaded into the centre of the belt.

- Do not unload product too close to the tail roller.

- Always listen for any unusual sounds or noises. If any are heard, stop the machine and determine the source. Correct the problem before resuming work.

- Do not run the machine for long periods of time with no product on the belting. This will increase the wear. Try to run only when moving product.

- Belt Speed:
  The best results are obtained when the engine is set to provide a belt speed of 600 ft/min.

  Count the number of belt revolutions per unit time to determine belt speed. Use the belt lacing as a reference when counting belt revolutions.

  Contact your dealer or the factory for the appropriate drive components to give the recommended belt speed.

- Belt Tension:
  There may be a rapid decrease in belt tension during the first few hours of operation until the belt has worn in.

  The correct operating tension is the lowest tension at which the belt will not slip under peak load conditions.
  - After system has been used for a while tensioning may be required as well depending on belt stretch factors.
  - As main under bin belt ages it may also eventually shrink a little.

- Make sure belt alignment is correct, running true in the centre at all guide roller points.

- Lockup issues:
  - Check all guide rollers to ensure your belt is centred. The most likely cause for "belt not moving or locking up" is that there is not enough tension on the S-Drive or End Drive tension roller.

  - Check pinch roller tension if you have an S-Drive system. Sometimes, when the pinch roller is loose, it can vibrate even looser causing a drive issue as well. Make sure there is always pressure one the pinch roller.

  - Be sure the belt is properly installed through S-Drive. There is a square tubing which functions as a cross brace. If the belt isn't threaded correctly, it will pinch on the tubing and stall the system.

- Motor drive belts, pulleys and bearings should also be checked regularly.

  The belts can stretch in time and possibly slip which would eventually require belt replacement.

- Every underbin system, depending on length type of product and amount of usage, have a different effect on the longevity of belts & bearings. A specific maintenance program must be established for each individual system to ensure it is in good running order.

4.5 STORAGE

After the season's use, or when the underbin conveyor will not be used for an extended period of time, it should be thoroughly inspected and prepared for storage.

Repair or replace any worn or damaged components to prevent unnecessary down-time next season.

For a long, trouble-free life, this procedure should be followed when preparing the machine for storage:

1. Remove all left over product or residue from the conveyor sections.

2. Inspect all moving or rotating parts and remove anything which has become entangled.

3. Wash the entire machine thoroughly using a water hose or pressure washer to remove all dirt, mud, debris or residue.
   - Remove all the covers.
   - Wash on top and under the belt.

4. Check the condition of the conveyor belt drive belts, and bin hopper chutes. Replace or adjust if necessary.

5. Touch up all paint nicks and scratches to prevent rusting.

6. Cover openings with a waterproof tarp and tie down securely.

7. Do not allow children to play on or around the conveyor.

IMPORTANT:
If conveyor has been stored for over 6 months, run engine for 2-3 minutes. Then, change oil, while still warm, to remove any condensation.

4.5.1 Removing From Storage:

When getting the conveyor ready for the season:

1. Remove the tarp, if covered.

2. Review and follow the Pre-Operation Checklist.

3. Review and follow the Service Checks in the Maintenance section.

This page intentionally left blank

Section 5: SERVICE AND MAINTENANCE

⚠ WARNING

- Review the Operator's Manual and all safety items before maintaining the conveyor.
- Follow good shop practices:
  - Keep service area clean and dry.
  - Wear personal protective equipment.
  - Be sure electrical system and tools are properly grounded.
  - Use adequate light for the job at hand.
- Lock-Out, Tag-Out conveyor power and air compressor systems before performing maintenance.
- Clear the area of bystanders, especially children, before repairing or adjusting.
- Relieve air pressure and disconnect air lines before servicing.
- Do not damage compressed air lines during repair or maintenance work.
- Keep hands, feet, hair and clothing away from all moving and/or rotating parts.
- Never work underneath the conveyor unless it is securly attached to the bin.
- Do not leave tools lying on the conveyor.
- Do not modify conveyor or safety devices. Do not weld on the conveyor.
- When maintenance is complete, before resuming work, install and secure all guards.
- Keep safety decals clean. Replace any decal that is damaged or not readable.

By following the operating instructions, in conjunction with a good maintenance program, your underbin conveyor will provide many years of trouble free service.

5.1 LUBRICANTS

Grease:
Use an SAE multipurpose high temperature grease with extreme pressure (EP) performance. Also acceptable, SAE multipurpose lithium based grease.

Storing Lubricants:
Your machine can operate at top efficiency only if clean lubricants are used. Use clean containers to handle all lubricants.

Store them in an area protected from dust, moisture and other contaminants.

NOTICE

GREASING HAZARD
Too much grease causes excessive overheating.
Under-greasing accelerates equipment wear.

No grease should be seen around bearings.
If there is, too much grease was applied
and the seal has ruptured!

IMPORTANT:
Grease bearings only one pump per month
under normal usage conditions.

Bearing greasing frequency should be
determined by usage and conditions.

1. Use a hand-held grease gun for all greasing.

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

3. All bearings are greasable, but require only minimal grease.

   Recommended greasing is one small stroke every month. Be careful not to over-grease as this may push the seal out.

4. Replace and repair broken fittings immediately.

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

5.2 SERVICING INTERVALS

Use the Service Record provided on page 5-13 to keep a record of all scheduled maintenance.

Longer underbin systems vs. shorter systems may effect longevity of belts and bearings differently. A maintenance program should be established by the end user for each seprate conveyor system, to ensure it remains in good running order.

It is important to check conveyor belt alignment and make adjustments, if required, during the initial few minutes of loaded operation. The belt usually seats itself and can be checked weekly after that.

Check bearings for wear daily.

The following recommended periods are based on normal operating conditions. Severe or unusual conditions may require more frequent lubrication.

5.2.1 After 10 Hours or Daily:

1. Inspect drive belts, conveyor belt and its lacing for wear.

2. Inspect all rollers and bearings for play and wear.
   - Replace if necessary.

3. Check the conveyor belt tension daily while breaking-in the conveyor.
   - Refer to Section 5.3.1

4. Check the conveyor belt alignment frequently during the first 10 hours of operation until it seats itself. Refer to Section 5.3.2

5.2.2 After 50 Hours or Weekly:

5. Check the conveyor belt tension. Refer to Section 5.3.1

6. Check conveyor belt alignment. Refer to Section 5.3.2

7. Check drive belt tension. Refer to Section 5.3.4

8. Check pulley alignment.

5.2.3 After 100 hours or Monthly:

Note:
Recommended greasing is one small stroke every month. Be careful not to over grease as this may push the seal out.

9. Grease discharge and drive roller bearings.

10. Grease the speed reducer shaft bearings.

5.2.4 After 200 hours or Annually:

11. Inspect conveyor belt for wear or damage.
    - Replace if needed.

12. Check the conveyor sections, and hangers for cracks or damage.

13. Check the level and straightness the entire length of conveyor unit.

14. Wash the entire conveyor thoroughly using a water hose or pressure washer to remove all dirt, mud, debris or residue.
    - Wash the outside.
    - Wash around the bin hopper gates and transitions.
    - Remove the covers, run the belt while washing inside the bed and the belt.

5.3 MAINTENANCE PROCEDURES

5.3.1 Conveyor Belt Tension:

Belt tensioners are located on each side of the end section and on both end sections.

1. Loosen lock nuts (1) on each side of the belt tension mechanism. See Figure 33
2. Use lock nuts on the adjustment bolts (2) to adjust the tension on the conveyor belt.
3. While holding the adjustment bolt (3) in place, retighten both lock nuts (2).

IMPORTANT:
Adjust both sides equally
to maintain alignment.

4. Start the conveyor and make sure the belt is tracking in the centre of the drive roller.

Note:
If the belt is not tracking properly,
refer to 5.3.2 Conveyor Belt Alignment

5. Increase the tension on the belt until there is no slippage.
6. Once tensioning is complete, tighten the lock nuts on each side of the belt tensioning mechanism.

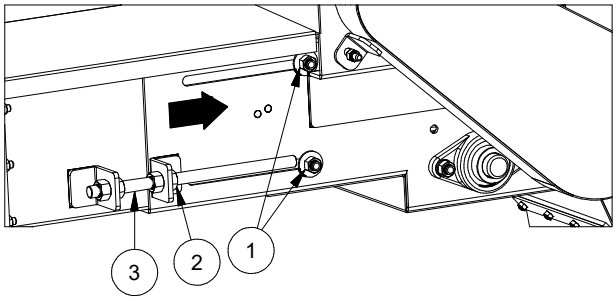


Fig 33 - Adjustment bolt components

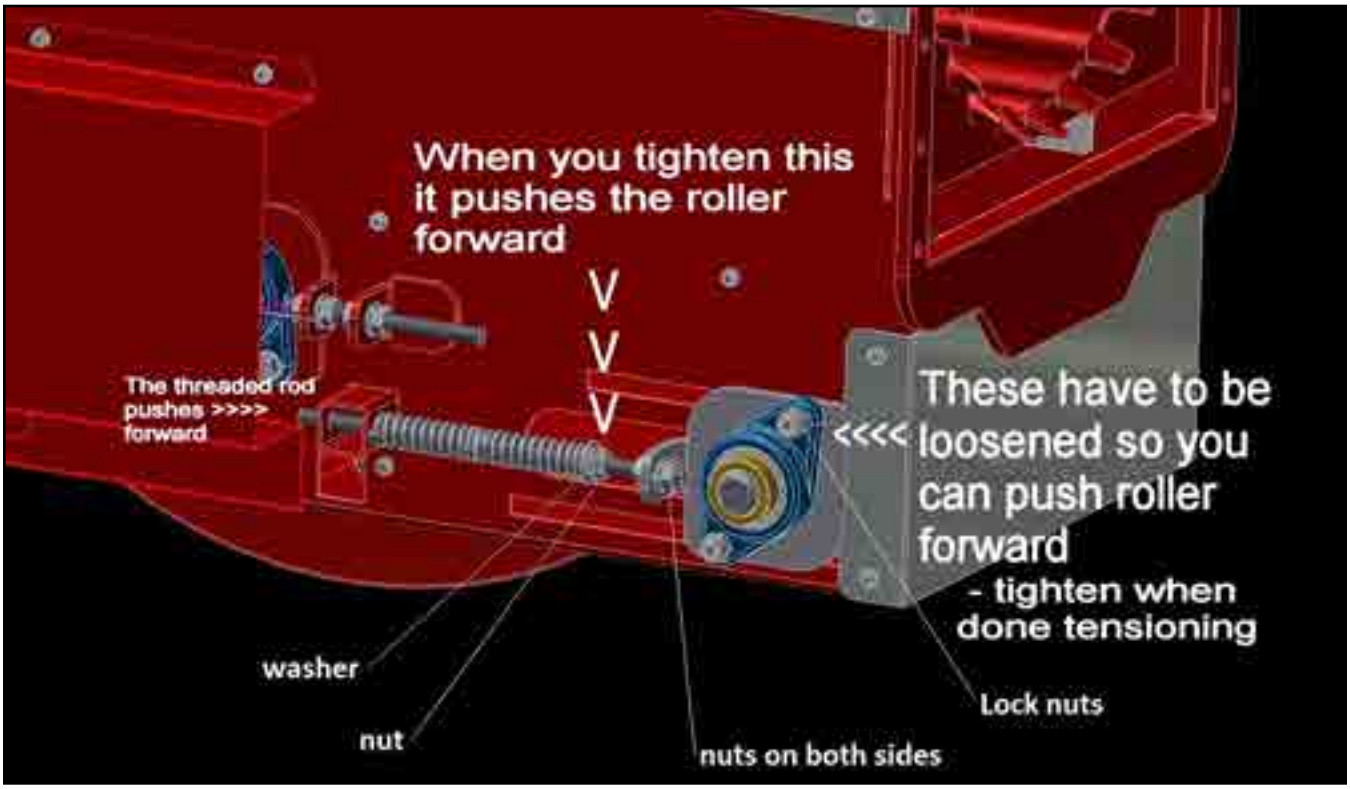


Fig 34 - S-Drive Slack Adjuster Instructions

5.3.2 Conveyor Belt Alignment:

⚠ WARNING

ROTATING BELT HAZARD
Checking belt alignment requires watching while it operates. Keep hands, feet, hair and clothing away from rotating belt.

For S-Drive Conveyors:

1. Tighten the tension (bottom corner) roller.
2. Loosen the pinch roller.

Note:
If belt is not tracking correctly,
it will move to the loose side.
Tighten loose side or loosen tight side.

3. Adjust the belt tracking on the drive roller at the drive belt-to-motor side.
4. Adjust the tension roller.
   - Tighten loose side or loosen tight side.
5. When belt tracking is good:
   - Tighten the tension roller more.
   - Tighten the pinch roller to be snug against the drive roller.
6. Put all the guards back on.

For End Drive Conveyors:

7. Open the access cover on both ends of the conveyor. See Figure 35

Note:
If belt is not tracking correctly,
it will move to the loose side.
Tighten loose side or loosen tight side.

8. Loosening the lock nuts (2). See Figure 36
9. Tighten or loosen lock nut on the adjustment bolt (3) to move the roller.
10. Once the belt is tracking in the centre of the rollers, tighten the lock nuts (2).
11. Recheck the belt tension.
12. Reinstall access covers (1). See figure 35
13. If removed, reinstall the discharge hood.

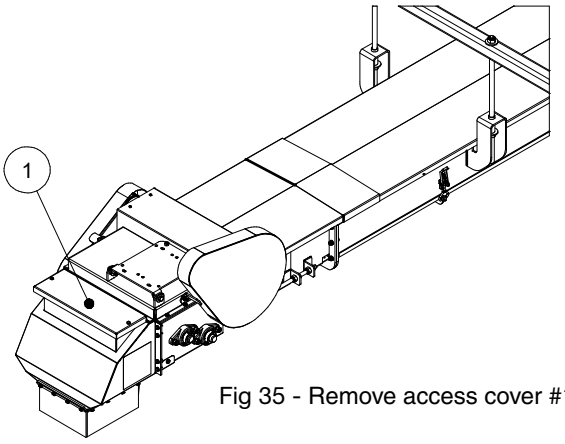


Fig 35 - Remove access cover #1

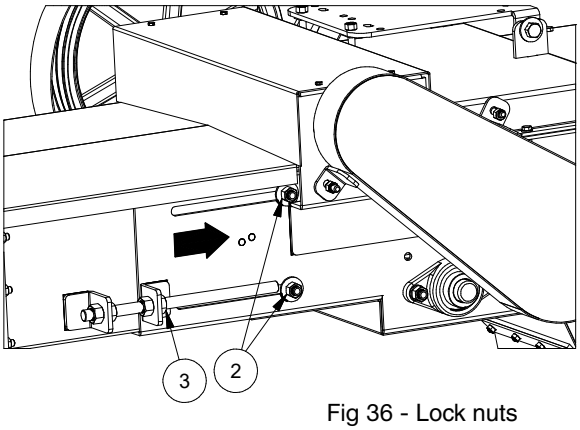


Fig 36 - Lock nuts

5.3.3 Conveyor Belt Replacement:

⚠ WARNING

ROTATING PART HAZARD
Lock-Out, Tag-Out power supply.
Turn off electric motor and unplug
power cord before adjusting the drive belt.

1. Turn off the power to the unit. Remove top covers from both motor end and non-motor end to access the drive rollers.

2. Loosen belt tension adjusting bolts (both sides and both ends) to release tension on the belt.

3. Thread the new belt into place.
   a. If the belt is not broken, carefully rotate the belt until the lacing is visible.
      - Remove the lacing cable and attach the new belt to the old one.
      - Pull the new conveyor belt into place.

   b. If the belt is broken or missing, place a small rod through the belt lacing.
      - Attach a wire or rope to the outside of the rod ends, as shown.
      - Pull the old belt out.
      - Using a cable/rope, pull the new belt into place.

4. Pull the new conveyor belt into place.

5. Link the ends of the belt lacing.
   Refer to Section 3.10.2 to add lacing onto the belt endsw.

Note:
A long Allen wrench or small rod can be inserted to help align the loops while pushing the cable through the lacing.

6. Work the lacing cable through to fasten the belt.

7. Once your lacing cable is through, cut off the excess cable.

8. Crimp the lacing at both ends to lock the cable in place. See Figure 18

9. Cut and taper the belt corners, at both ends of lacing.

IMPORTANT:
Taper the belt corners,
so they don't catch when belt is running.

10. Initially, adjust the belt tension using adjusting bolts (2) on each end. The final tension will be set with the conveyor operating.

11. Reinstall the top covers with the appropriate removed hardware.

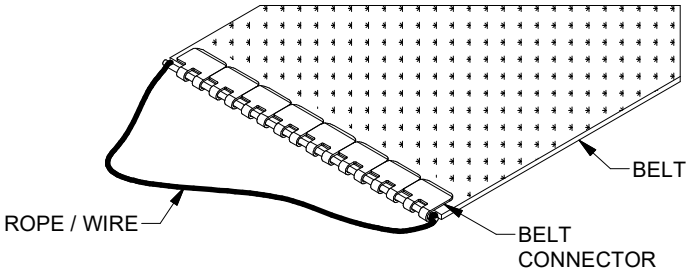


Fig 37 - Pull damage belt out

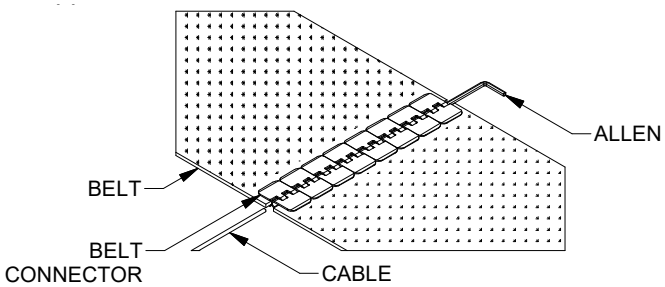


Fig 38 - Insert cable to fasten belt lacing

5.3.4 Drive Belt Tension:

The key to long, efficient, trouble-free belt operation is proper tension. If belts are too loose, the result is slippage, rapid belt and pulley wear, loosing productivity. However, too much tension puts excess strain on belts, bearings, and shafts, causing premature wear of these components.

Note:

The proper tension for a V-belt is the least amount of tension at which the belt will not slip or squeal under a peak load. Never use belt dressing to stop belts from slipping. Tighten the belts and/or replace worn pulleys.

1. Remove belt cover (1) and shaft cover (3).
2. Tighten belts on the drive-side first.
3. Slightly loosen two flange bearing bolts on the speed reducer shaft.
4. Place a pry bar under the speed reducer shaft and move the shaft to place tension on the drive belts.
5. Calculate the tension by See Figure 42
   - Add the length of span between pulleys.
   - Allow 1/64" of deflection per inch of span.

NOTICE

Do not overtighten the belts. Overtightening can reduce belt and bearing life.

6. Tighten the two flange bolts. See Figure 40
7. Adjust the flange bearing on the motor-side so the shaft is parallel to the drive roller shaft.
   - Tighten the flange bolts.
8. Adjust the belt tension on the motor-side by adjusting base plate (5). See Figure 41
9. When correctly adjusted, tighten lock nuts.

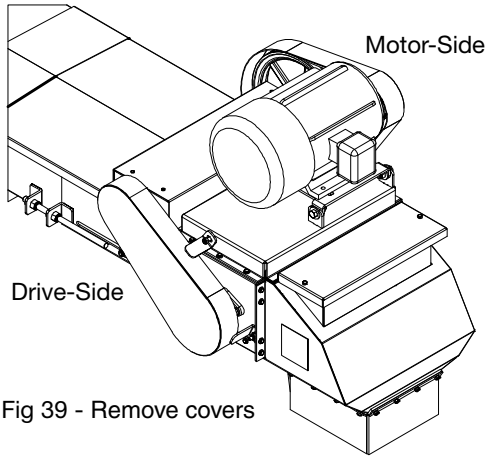


Fig 39 - Remove covers

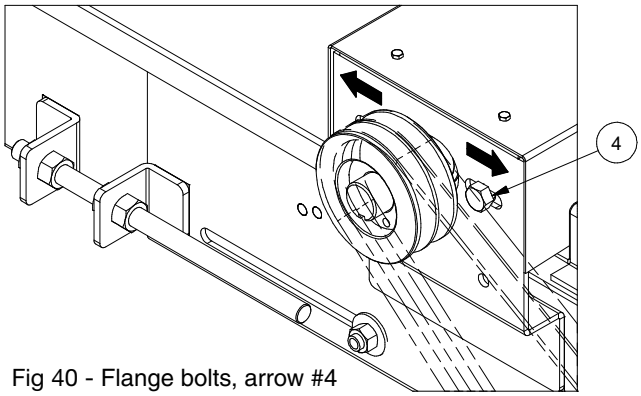


Fig 40 - Flange bolts, arrow #4

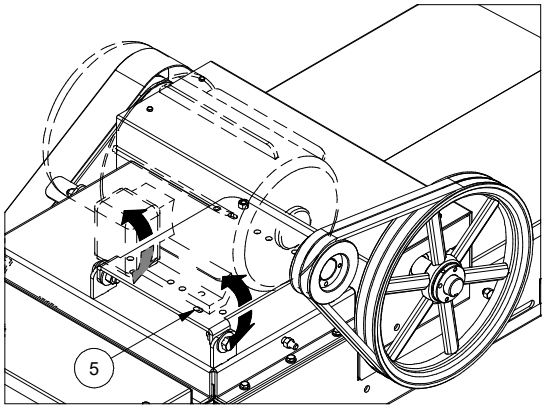


Fig 41 - Base plate bolts

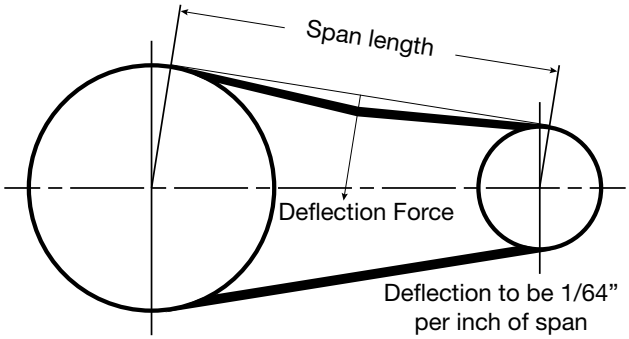


Fig 42 - Tension calculation

5.3.5 Drive Belt Replacement:

There are two sets of matched V-belts used to drive the conveyor belt drive roller. Do not mix used and new belts. Always replace both belts at the same time.

NOTICE

Used belts will ride lower in the pulley groove due to sidewall wear and normal belt stretch. New belts will ride higher in the pulley, travel faster, and operate at higher tension. Running used and new belts together will overload and damage the new belts.

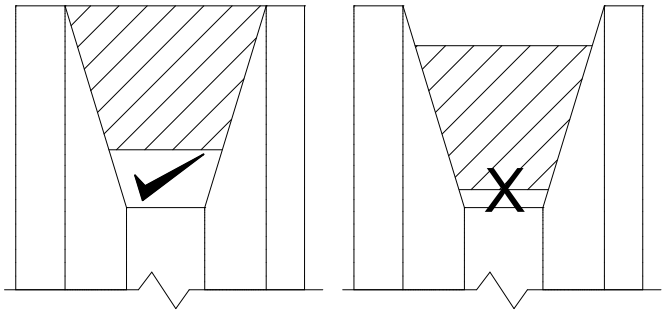


Fig 43 - New belt vs old belt

- Don't mix belts from different manufacturers. Use OEM belts only.
- Use matched belt sets. A matched set of belts is necessary to ensure equal distribution of the load.

A speed reduction shaft and pulley provides the proper speed to move the seed and also provides the torque needed to drive the conveyor belt while not overloading the electric motor.

1. To replace the belts, remove belt covers.
2. Loosen the belt tension by lowering the motor mounting plate and/or loosening the flange bolts on the speed reduction shaft.
   - This way, the old belts can be removed easily and the new belts can be installed without damage.
3. Replace the belts.
4. Re-tension the belt.
   Refer to 5.3.4 Drive Belt Tension

Note:

These belts must be replaced as a matched set or the service life of the belts will be dramatically reduced.

5.3.6 Inspect/Service Drive Components:

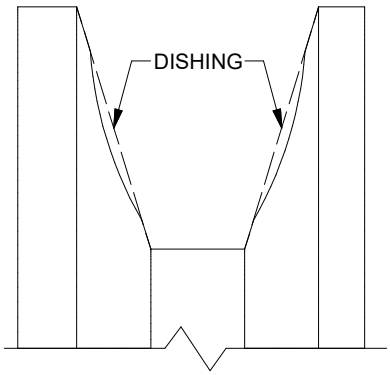
1. Remove rust and dirt from hinge area of motor mounting plate and lubricate as necessary.

2. Inspect and replace, as needed, damaged components such as bearings and drive shafts.

3. Inspect and clean pulleys; replace worn or damaged pulleys.

4. Check pulley grooves for nicks or burrs. Correct any damage or replace the pulley.

5. Inspect for worn pulley grooves.
   a. Belts should ride in pulley grooves so the top of the belt is just above the highest point of the pulleys.
      - If the grooves are worn, the belts will slip and burn.
   b. If grooves are "dished out" 1/32 inch or more, replace the pulleys.
      - If the groove walls are "dished out," the bottom corners of the belt will quickly wear off and cause rapid failure.



Dishing of groove sidewalls shortens belt life

Fig 44 - Pulley dishing

5.3.7 Pulley Installation and Removal:

Installation:

1. Make sure the pulley bore and the tapered cone surface of the bushing are clean and free from paint, dirt, and lubricants.

NOTICE

Do not use lubricants to install bushing assemblies.

2. Loosely assemble the bushing in the pulley, and insert the screws finger tight.

3. Slip the loosely assembled unit onto the shaft and position it for proper belt alignment.

4. Alternately tighten the screws to half the recommended torque value. Check the alignment of the two pulleys and correct as necessary.

5. Continue to tighten the screws alternately to the proper torque value.

Note:
Allow an 1/8" to 1/4" gap between the pulley and flange bushing.

Removal:

1. Loosen and remove all mounting screws.

2. Insert two screws in the tapped removal holes in the pulley.

3. Begin tightening the screw opposite the bushing saw slot and alternately tighten the two screws until the bushing releases from the pulley.

4. Remove the pulley from the bushing.

5. Remove the bushing from the shaft. If the bushing is wedged onto the shaft, open the saw slot with a screwdriver or other similar prying device.

NOTICE

Be careful not to damage the bushing or shaft during removal. The use of penetrating oil can also be used to free the bushing from the shaft.

If penetrating oil is used, shaft must be completely oil-free before installing new pulley.

5.3.8 Keyless Bushings:

The underbin conveyor uses keyless bushings in all drive motor pulleys. This type of bushing use the tapered wedge principle to retain the pulley onto the shaft.

Installation And Removal Tips:

1. When a pulley fails to stay tight and true on the shaft, improper installation may be the cause. When installing a pulley, first clean oil, paint, and dirt from all tapered and mating surfaces of the pulley, bushing, and shaft.

2. Do not lubricate these components. Lubricating the mating tapered surfaces reduces friction. With lubricated surfaces and the same screw torque, the tapered surface mechanical advantage is greatly increased compared to dry surfaces. This causes excessive radial pressure, resulting in cracking of bushing or pulley hub.

3. Adhere to the manufacturer's recommended torque values for tightening installation screws. Tighten the screws in an alternating pattern, repeating the pattern several times to obtain the desired wrench torque.

4. When installing bushings avoid using a worn wrench, which can strip the screw head and cause a loose assembly. For increased gripping force, tap the face of the bushing with a drift pin or sleeve, then retighten the screws to the recommended torque setting. Do not strike the bushing directly with the hammer.

5. Excessive screw torque can damage bushings or pulleys. Also, uneven pressure on jack-apart screws may ruin the bushing, making removal difficult without damaging the pulley.

6. Pulleys mounted with tapered bushings rarely loose their tight fit, but overload or improper installation can cause them to loosen. During inspection or maintenance, check for these conditions that cause looseness:
   - Cracked pulley hub.
   - Other damage to pulley, shaft, bushing, or mounting screws.
   - Improper mating of tapers.
   - Missing keys, particularly on vertical shafts, and on horizontal shafts subject to vibration.
   - Lubricant that leaks from components such as chain, gear, or grid couplings.
   - Bushing bored to the wrong diameter.

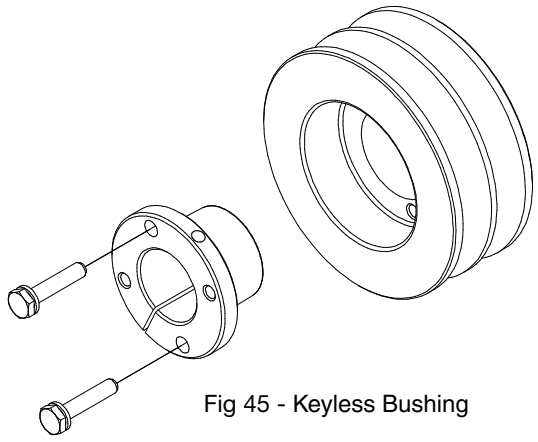


Fig 45 - Keyless Bushing

5.3.9 Welding Repairs:

⚠ WARNING

HAZARDOUS REPAIRS
Modifications to the underbin conveyor components can result in serious injury or death should these repairs fail.

IMPORTANT:
Anyone performing a welding repair should be certified in accordance to the American Welding Society (AWS) standards.

Repair welding must be done with care and with procedures that may be beyond the capabilities of the ordinary welder. Before performing any type of welding repair to the conveyor, contact Meridian for approval.

5.4 SERVICE RECORD

See Section 5.2 for Servicing intervals. This section is only a general guide under good conditions. Under extreme, or unusual circumstances adjust service timing accordingly.

Copy this page to continue record.

Maintenance / Hours														
Maintenance / Serviced By														
10 Hours or Daily														
Inspect Drive Belts														
Inspect Conveyor Belt and Lacing														
Inspect All Bearings For Wear														
Check Conveyor Belt Tension														
Check Conveyor Belt Tracking														
50 Hours or Weekly														
Check Conveyor Belt Tension														
Check Conveyor Belt Tracking														
Check Drive Belt Tension														
Check Pulley Alignment														
100 Hours or Monthly														
Grease Discharge, Drive Roller Bearings														
Grease Speed Reducer Shaft Bearings														
200 Hours or Annually														
Inspect Conveyor Belt for Wear/Damage														
Inspect Sections for Cracks/Damage														
Inspect Hangers for Craks or Damage														
Level and Straighten Entire Length														
Wash Entire Conveyor thoroughly														

This page intentionally left blank

Section 6: TROUBLESHOOTING

In the following trouble shooting section, we have listed many of the problems, causes and solutions to the problems which you may encounter.

If you encounter a problem that is difficult to solve, even after having read through this trouble shooting section, please contact your authorized dealer, distributor or the factory. Before you call, please have this Operator's Manual and the serial number from your machine ready.

PROBLEM	CAUSE	SOLUTION
Conveyor System		
Conveyor belt will not start	No electrical power	Connect electric motor to proper power supply
	Drive motor belts are slipping	Adjust drive belt tension
	Drive motor belts are broken	Replace belts with a matched set of belts
	Speed reducer to drive roller belts are slipping	Adjust drive belt tension
	Speed reducer to drive roller belts are broken	Replace belts with a matched set of belts
	Drive roller slipping on conveyor belt	Increase conveyor belt tension
	Drive motor is defective	Check electrical supply to motor. If supply is correct, then repair or replace motor
Conveyor belt doesn't run smooth or jams when trying to reverse direction	Conveyor belt tracking needs adjusting	Refer to 5.3.2 Conveyor Belt Alignment section in this manual
	Conveyor belt might be too long	Loosen belt tension, disconnect belt lacing, trim belt length. Refer to 3.10.2 Adding Lacing to Belt Ends.
System locks up (doesn't move) in forward or reverse	Check all guide rollers to ensure your belt is centred	See Conveyor Belt Alignment section in this manual
	There is not enough tension on S-Drive or End Drive tension roller	Tension the belt
	Check pinch roller tension on S-Drive system. If pinch roller is a bit too loose it can vibrate even looser causing the drive issue	Make sure there is some pressure on the pinch roller for the S-Drive
	There is a square tub acting as a cross brace inside the S-Drive. If the belt is not run by that correctly it will pinch on the tubing and stall the system	Make sure the belt is properly routed through the S-Drive
Conveyor Belt		
Conveyor belt is rubbing against the side	The belt is not properly aligned	Refer to 5.3.2 Conveyor Belt Alignment section in this manual

continued on next page

PROBLEM	CAUSE	SOLUTION
Slipping issues	When the system has been used for a while, tensioning may be required, depending on belt stretch factors	Tension the belt
	As the conveyor belt ages it may shrink a little	Tension the belt
Drive Belts		
Slipping issues	Check drive belts, pulleys and bearings regularily	Replace aged or damaged components
	Longer underbin systems vs. shorter systems may effect longevity of belts & bearings differently	Replace aged or damaged components
Rapid drive belt failure with no visible reason	Worn pulley grooves (check with groove gauge)	Replace pulleys
	Tensile cords were damaged through improper installation	Replace all belts with a new set, properly installed
	Wrong type or cross section belt	Use only OEM replacement parts. Replace all belts with correct type
Rapid sidewall damage to the drive belts	Worn or damaged pulleys	Replace pulleys
Spin burns on the drive belts	Belts may be slipping under a starting or stalling load	Re-tension drive pulleys
Belts stretch unequally	Misaligned drive shafts	Realign drive shafts
Drive Belts		
Belt noise.	Belt is slipping	Re-tension belts
	Misaligned pulleys	Realign pulleys
	Wrong belt type	Use only OEM replacement parts. Replace all belts with correct type
Drive Pulleys		
Pulley fails to stay tight on shaft	Improper installation	Remove oil, paint, and dirt from all tapered and mating surfaces of the pulley, bushing, and shaft
		Do NOT lubricate these components
		Tighten the screws in an alternating pattern repeating several times to obtain the desired torque value
	Bolts are improperly tightened	Avoid using worn tools, which can round bolt heads and cause a loose assembly
	Bushing is improperly seated (lack of gripping force)	Lightly tap the face of the bushing with a drift pin or sleeve, then retighten the bolt to the recommended torque value. Do not strike the bushing directly with a hammer
	Overload or improper tightening	Make sure belts are properly tensioned
	Cracked pulley hub or other damage to pulley, shaft, bushing, or mounting hardware	Replace the damaged parts with OEM replacements
Pulleys are hard to remove	Excessive torque on the bolts can damage the bushings or pulley	Do not overtighten the bushing retaining screws
	Uneven pressure on jack-apart screws	Tighten the screws even and progressively as the pulley is removed from the bushing

Section 7: REFERENCE

For information not included here, or for a digital copy of this manual, please call your dealer, or Meridian Manufacturing Inc. directly for assistance. Visit our website at: www.meridianmfg.com

7.1 BOLT TORQUE

The tables shown below give correct torque values for various bolts and capscrews. Tighten all bolts to the torques specified in chart unless otherwise noted. Check tightness of bolts periodically, using bolt torque chart as a guide. Replace hardware with the same strength bolt.

Table 5 - Imperial Torque Specifications

Bolt Diameter "A"	Bolt Torque*					
	SAE 2 (Nm)	(ft-lb)	SAE 5 (Nm)	(ft-lb)	SAE 8 (Nm)	(ft-lb)
1/4"	8	6	12	9	17	12
5/16"	13	10	25	19	36	27
3/8"	27	20	45	33	63	45
7/16"	41	30	72	53	100	75
1/2"	61	45	110	80	155	115
9/16"	95	60	155	115	220	165
5/8"	128	95	215	160	305	220
3/4"	225	165	390	290	540	400
7/8"	230	170	570	420	880	650
1"	345	225	850	630	1320	970

Table 6 - Metric Torque Specifications

Bolt Diameter "A"	Bolt Torque*			
	8.8 (Nm)	(ft-lb)	10.9 (Nm)	(ft-lb)
M3	0.5	0.4	1.8	1.3
M4	3	2.2	4.5	3.3
M5	6	4	9	7
M6	10	7	15	11
M8	25	18	35	26
M10	50	37	70	52
M12	90	66	125	92
M14	140	103	200	148
M16	225	166	310	229
M20	435	321	610	450
M24	750	553	1050	774
M30	1495	1103	2100	1550
M36	2600	1917	3675	2710

Torque figures indicated above are valid for non-greased or non-oiled threads and heads unless otherwise specified. Therefore, do not grease or oil bolts or capscrews unless otherwise specified in this manual. When using locking elements, increase torque values by 5%.

* Torque value for bolts and capscrews are identified by their head markings.

7.2 ORDERING PARTS

Always give the Model Number and Serial Number when ordering parts.

To get your parts promptly the following information will be required:
- The part name and number
- Your Name, Address, Town, Province/State, Country
- Complete information for shipping

Confirm all phoned in orders in writing. If Purchase Orders are required please note the number on the written order.

Unless claims for shortages or errors are made immediately upon receipt of goods, they will not be considered.

Inspect all goods received immediately upon receipt. When damaged goods are received, insist that a full description of the damage is made with the carrier against the freight bill. If this is insisted upon, full damage can be collected from the transport company.

No responsibility is assumed for delay or damage to merchandise while in transit. Dealers responsibility ceases upon delivery or pickup of shipment from or to the transportation company. Any freight damage claims must be made with the transportation company, not with the dealer.

7.3 PARTS

UNDERBIN MOTOR END

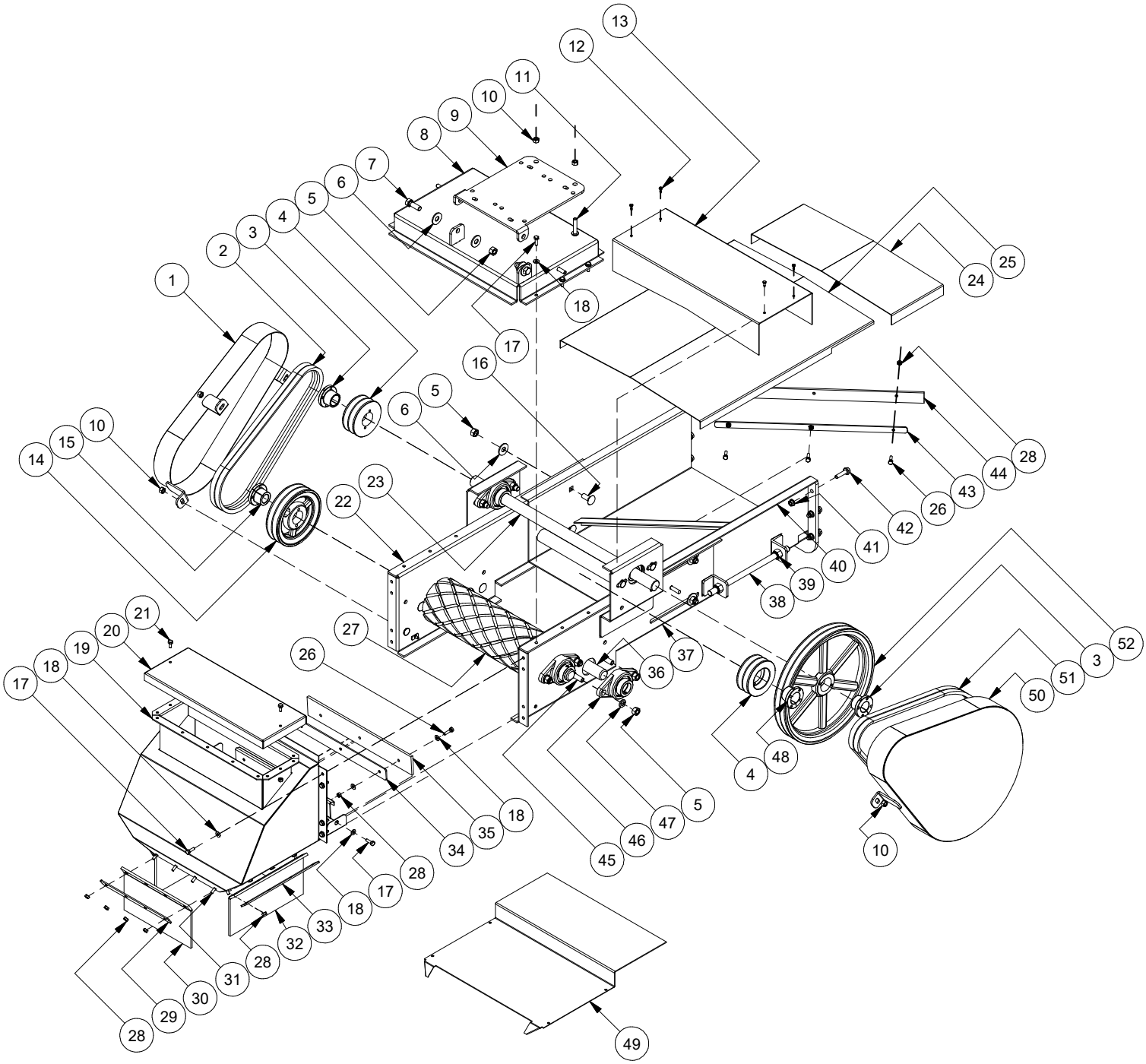


Table 7 - Underbin Motor End

ITEM	PART #	DESCRIPTION	QUANTITY
1	37538	Cover Small V-Belt	1
2	18365	Underbin Conveyor Belt V B42	2
3	27517	Bushing Split Taper H114	2
4	27466	Pulley 4.25 in. Double	2
5	13-0725-00008	Hex Nut 1/2 PL	18
6	13-0736-00008	Washer Wide 1/2 in. Type A	8
7	13-0702-08024	Hex Cap Screw 1/2-13 UNC x 1-1/2	6
8	37546	Motor Mount Weldment	1
9	37536	Mount Swivel Electric Motor	1
10	13-0725-00006	Hex Nut 3/8 PL	7
11	18483	Cross Recessed Pan Head Machine Screw 3/8-16 UNC x 2in	2
12	13-0707-10008	Screw Self Drill 10-16 UNC x 1/2	4
13	27422	Cover Galvanized Shaft Reducer	1
14	27425	Pulley 2V 7 in. 2BK70H	1
15	17839	Bushing Tapered Pulley Insert	1
16	13-0709-08020	Carriage Bolt 1/2-13 UNC x 1-1/4	4
17	13-0702-04016	Hex Capscrew 1/4-20 UNC x 1	16
18	13-0736-00004	Washer Narrow 1/4 in. Type A	31
19	37547	Discharge Under Bin Red	1
20	27357	Plate Discharge Access Cover	1
21	13-0702-04010	Hex Capscrew 1/4-20 UNC x 5/8	2
22	37545	Side Plate Left Motor End	1
23	27844	Speed Reducer Shaft	1
24	27423	Cover Top Transition Galvanized	1
25	27421	Cover Top Motor End Galvanized	1
26	13-0702-04014	Hex Capscrew 1/4-20 UNC x 7/8	6
27	27361	Under Bin Drive Roller	1
28	13-0725-00004	Hex Nut 1/4-20 UNC	38
29	27449	Bracket Hold Down Chute Red	2
30	17978	Rubber Flap Front Back Under Bin	2
31	13-0702-04012	Hex Capscrew 1/4-20 UNC x 3/4	16
32	17977	Rubber Flap Sides Under Bin Discharge	2
33	27378	Plate Skirt Retainer Red	2
34	27447	Bracket Hold Down Roller	1
35	27366	Scapper Brush Roller Rubber	1
36	27435	Roller Metal Under Bin	1
37	37544	Side Plate Right Motor End Red	1
38	27427	Threaded Rod Tension Belt	2
39	13-0725-00010	Hex Nut 5/8-11 UNC	8
40	37543	Frame Slider Bolt-On Discharge Red	1
41	13-0731-00006	Flanged Nut 3/8-16 UNC	6
42	13-0702-06024	Capscrew 3/8-16 UNC x 1 1/2	6
43	27446	Bracket Hold Down Scrapper	1
44	27365	Scrapper Rubber Under Bin	1
45	13-0709-08016	Carriage Bolt 1/2-13x1 Gr5	8
46	27441	Bearing Flange Two Bolt	6
47	13-0734-00008	Washer Helical Spring Lock 1/2 In	8
48	17843	Bushing 1 3/8in Tapered H-1 3/8 Pulley Insert	1
49	27416	Cover Bottom Discharge	1
50	37539	Cover Large V-Belt Red	1
51	18364	Belt V B53 Under Bin	2
52	27444	Pulley 2V 14in 2BK140H	1

24" CONVEYOR SECTION

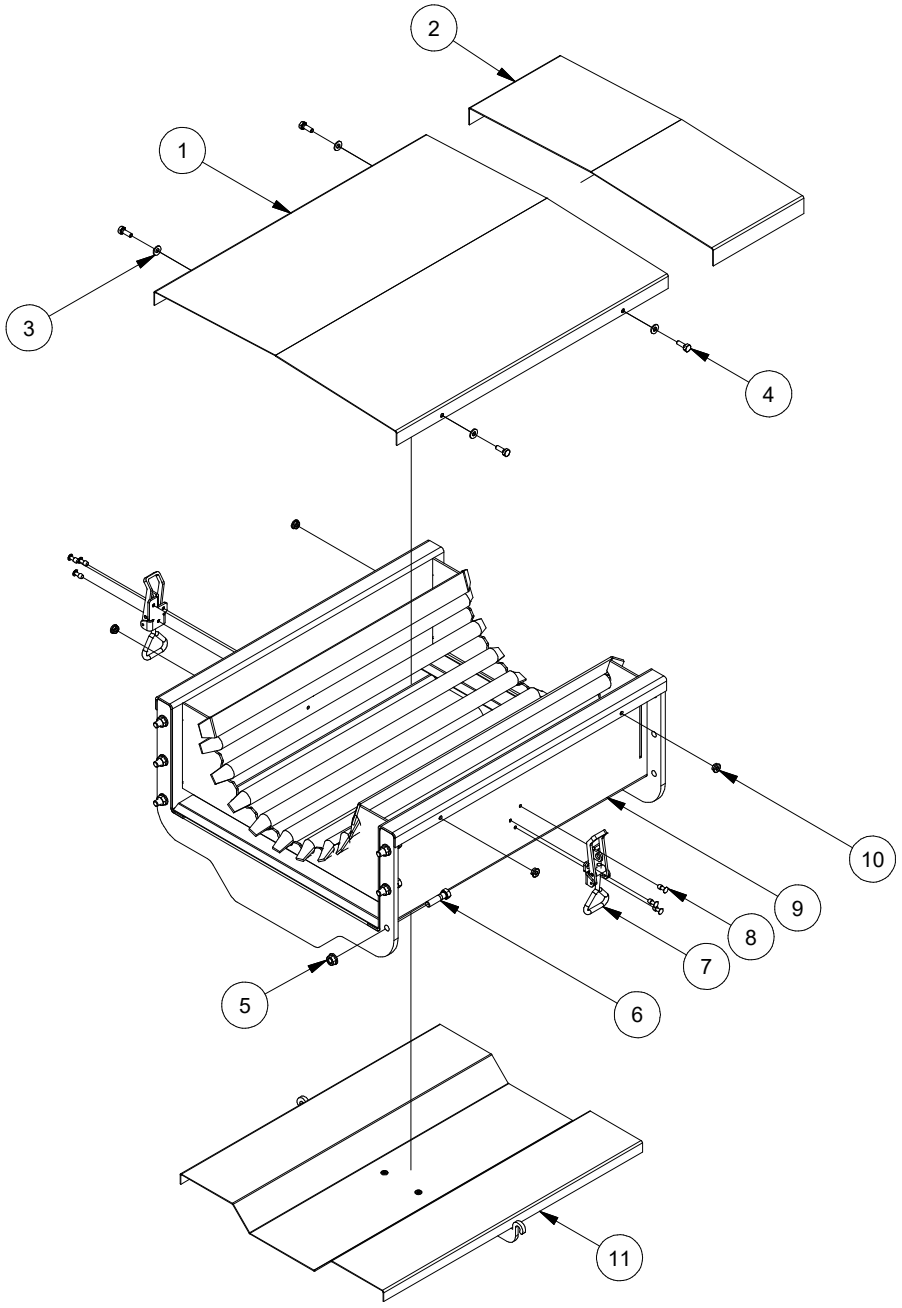


Table 8 - 24" Conveyor Section

ITEM	PART #	DESCRIPTION	QUANTITY
1	21384	Top Cover	1
2	27423	Transition Top Cover	1
3	13-0735-00004	Washer 1/4	4
4	13-0702-04012	Hex Bolt 1/4-20 UNC x 0.75	4
5	13-0731-00006	Hex Flanged Nut 3/8-16 UNC	6
6	13-0702-06024	Hex Bolt 3/8-16 UNC x 1.5	6
7	27934	Faucher 772-0128 Weldable Latch	2
8	19089	Rivet 3/16 Cosed End	6
9	32590	Conveyor Section Underbin 24in.	1
10	13-0731-00004	Hex Flanged Nut 1/4-20 UNC	4
11	32588	Bottom Cover	1

48" CONVEYOR SECTION

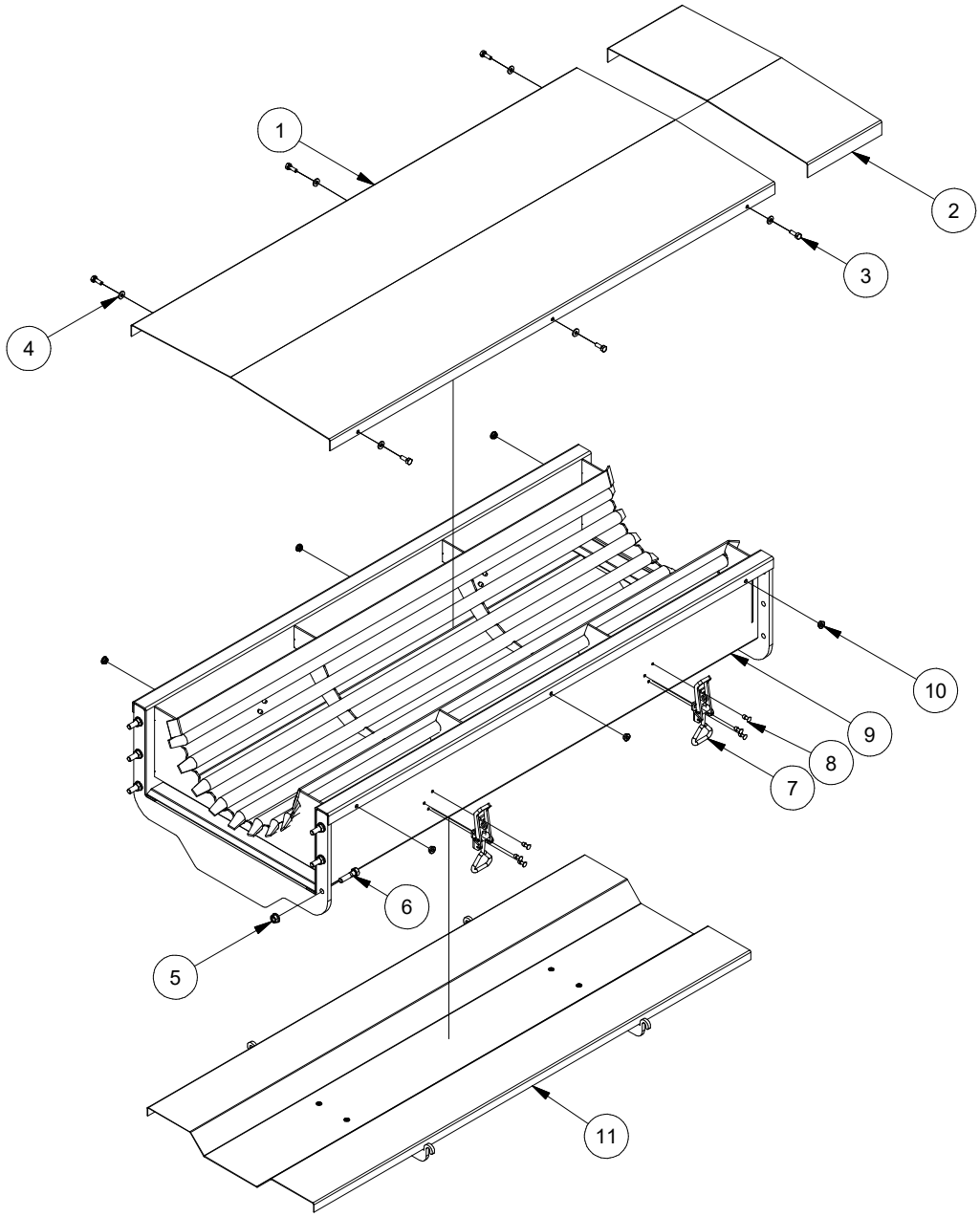


Table 9 - 48" Conveyor Section

ITEM	PART #	DESCRIPTION	QUANTITY
1	26439	Top Cover	1
2	27423	Transition Top Cover	1
3	13-0702-04012	Hex Bolt 1/4-20 UNC x 0.75	6
4	13-0735-00004	Washer 1/4	6
5	13-0731-00006	Hex Flanged Nut 3/8-16 UNC	6
6	13-0702-06024	Hex Bolt 3/8-16 UNC x 1.5	6
7	27934	Faucher 772-0128 Weldable Latch	4
8	19089	Rivet 3/16 Cosed End	12
9	32584	Conveyor Section Underbin 48in.	1
10	13-0731-00004	Hex Flanged Nut 1/4-20 UNC	6
11	34619	Bottom Cover	1

87" CONVEYOR SECTION

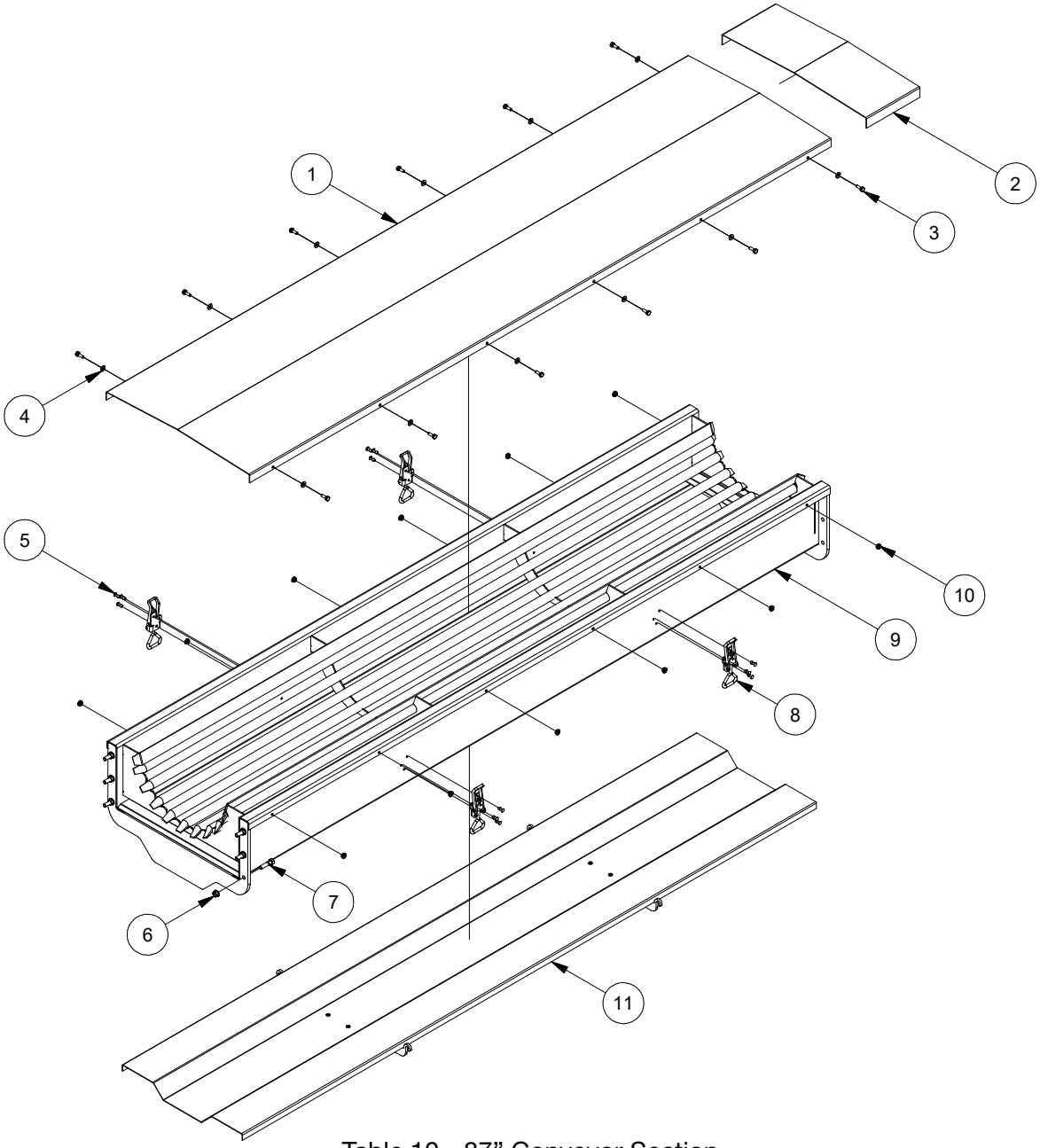


Table 10 - 87" Conveyor Section

ITEM	PART #	DESCRIPTION	QUANTITY
1	21383	Top Cover	1
2	27423	Transition Top Cover	1
3	13-0702-04012	Hex Bolt 1/4-20 UNC x 0.75	12
4	13-0735-00004	Washer 1/4	12
5	19089	Rivet 3/16 Cosed End	12
6	13-0731-00006	Hex Flanged Nut 3/8-16 UNC	6
7	13-0702-06024	Hex Bolt 3/8-16 UNC x 1.5	6
8	27934	Faucher 772-0128 Weldable Latch	4
9	32591	Conveyor Section Underbin 87in.	1
10	13-0731-00004	Hex Flanged Nut 1/4-20 UNC	12
11	32589	Bottom Cover	1

102" CONVEYOR SECTION

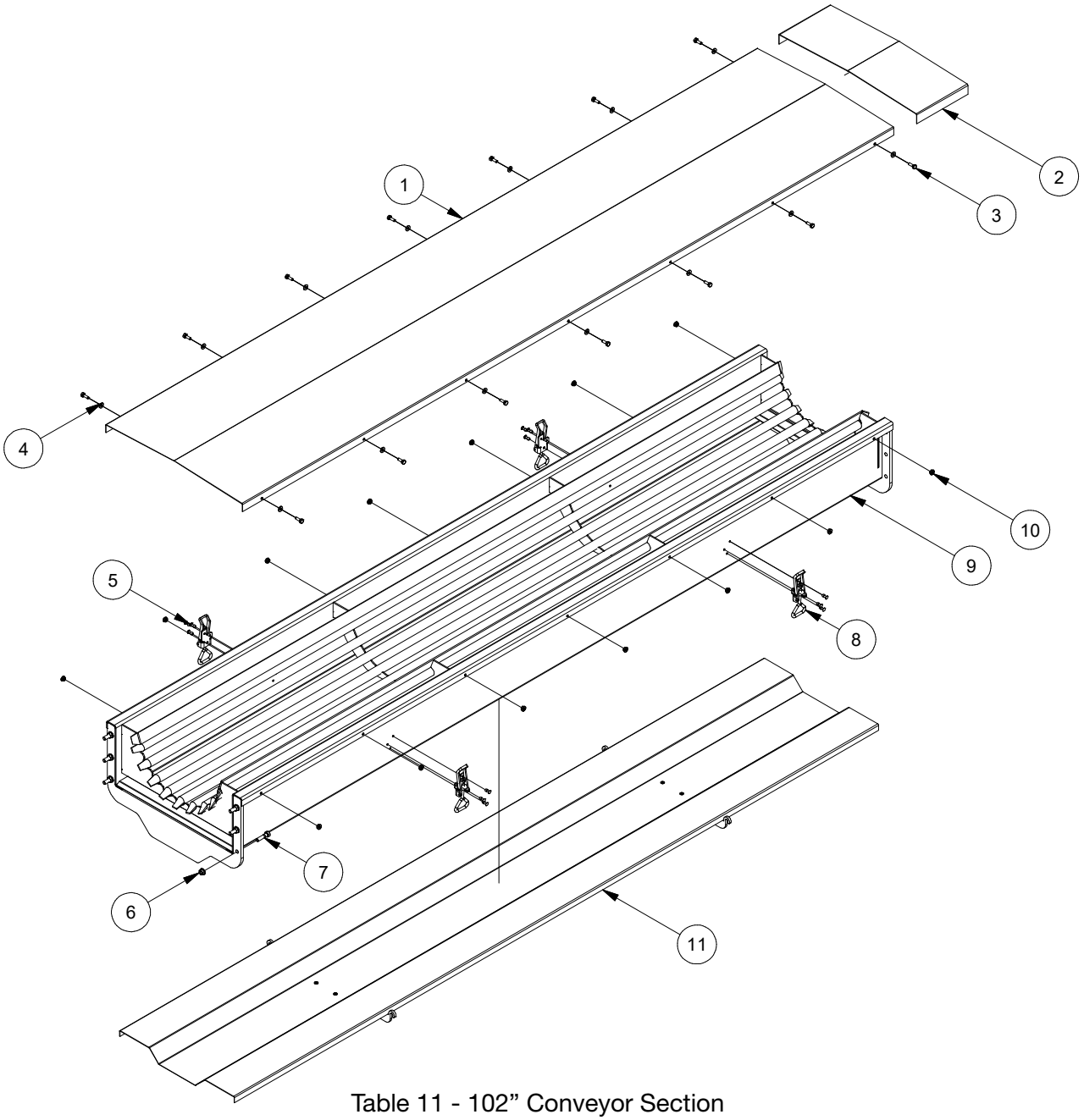


Table 11 - 102" Conveyor Section

ITEM	PART #	DESCRIPTION	QUANTITY
1	27407	Top Cover	1
2	27423	Transition Top Cover	1
3	13-0702-04012	Hex Bolt 1/4-20 UNC x 0.75	14
4	13-0735-00004	Washer 1/4	14
5	19089	Rivet 3/16 Cosed End	12
6	13-0731-00006	Hex Flanged Nut 3/8-16 UNC	6
7	13-0702-06024	Hex Bolt 3/8-16 UNC x 1.5	6
8	27934	Faucher 772-0128 Weldable Latch	4
9	32585	Conveyor Section Underbin 102in.	1
10	13-0731-00004	Hex Flanged Nut 1/4-20 UNC	14
11	37516	Bottom Cover	1

TRANSITION NON-AIR ASSEMBLY

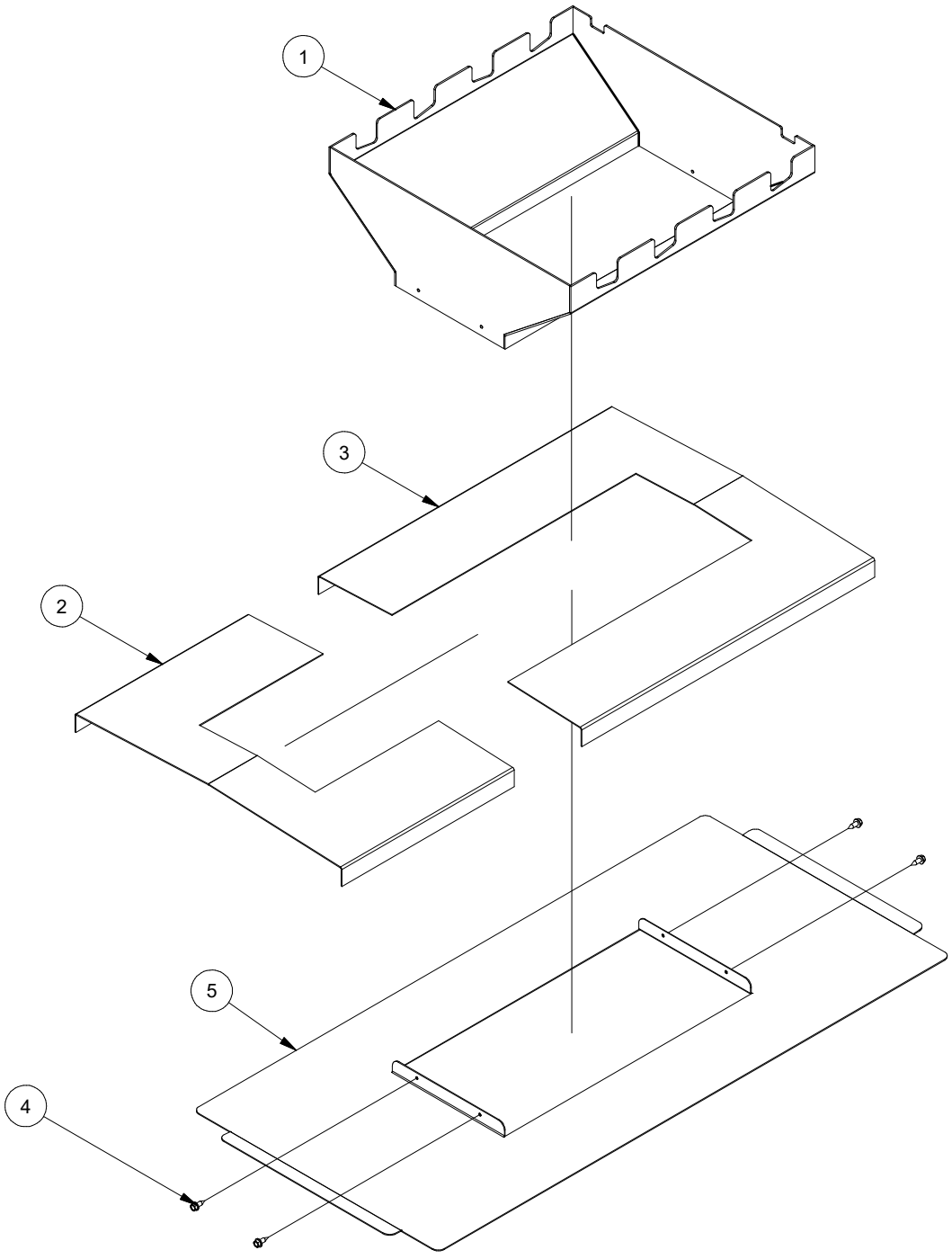


Table 12 - Transition Non-Air Assembly

ITEM	PART #	DESCRIPTION	QUANTITY
1	32025	Transition Non-Air	1
2	24394	Transition Cover Short	1
3	24393	Transition Cover Long	1
4	13070704012	Screw Self Drill 1/4 - 14 x 3/4	4
5	50063	Transition Seal	1

AIRGATE ASSEMBLY

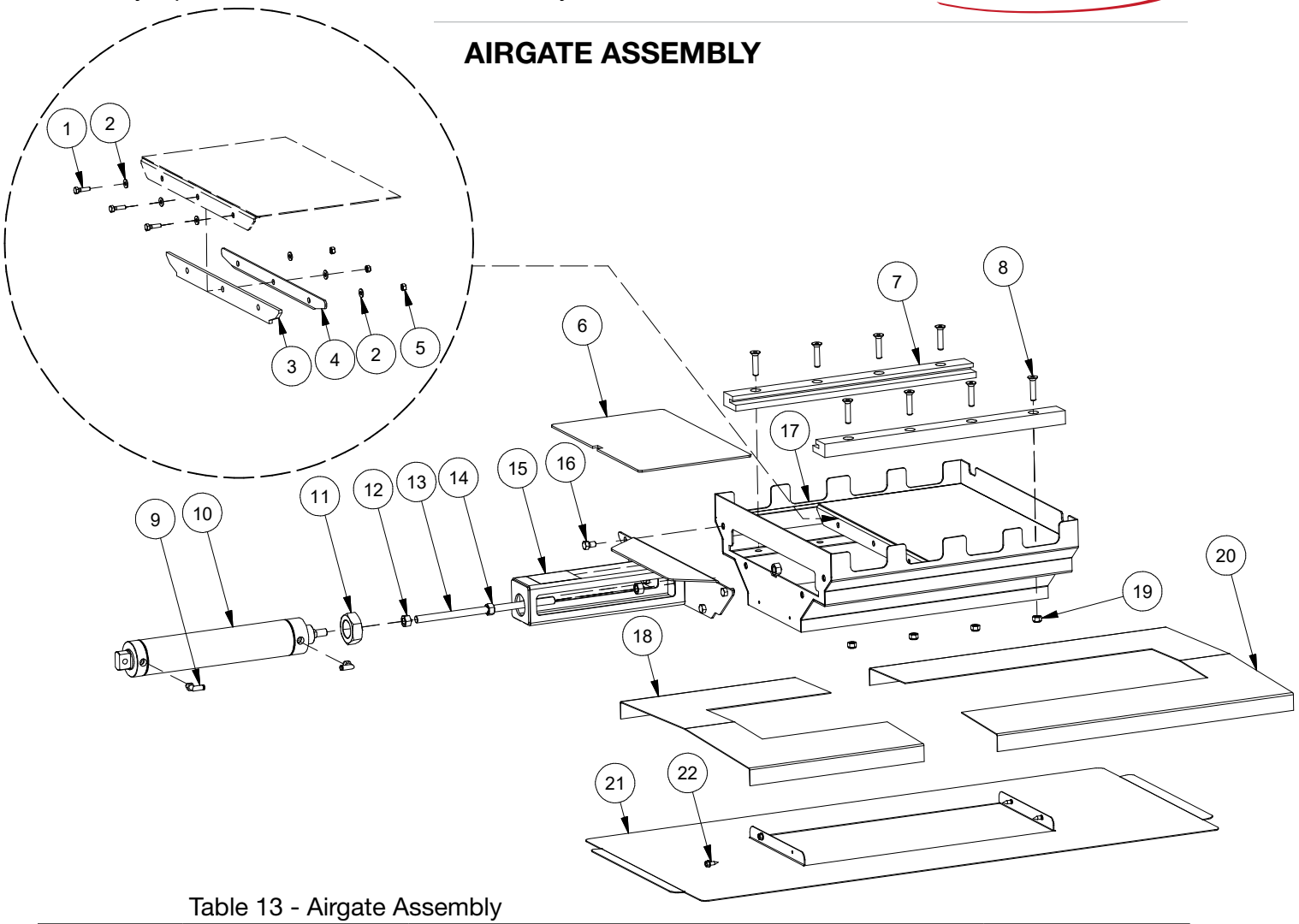


Table 13 - Airgate Assembly

ITEM	PART #	DESCRIPTION	QUANTITY
1	13-0702-04016	Hex Cap Screw 1/4-20 UNC x 1	6
2	13-0735-00004	Washer Narrow 1/4" Type A	12
3	27363	Scraper Blade Air Gate Rubber	2
4	27445	Hold Down Plate Scrapper	1
5	13-0725-00004	Hex Nut 1/4-20 UNC	6
6	37533	Blade Gate Weldment Air Gate	1
7	27364	Slider Air Gate UHMW	2
8	13-0702-06028	Hex Cap Screw 3/8-16 UNC x 1 3/4	8
9	18413	Fitting 1/4" NPT - 1/4" Air Line	2
10	27372	Pneumatic Cylinder 506-DXP	1
11	13-0727-00022	Hex Jam Nut 1-3/8 - 12	1
12	37525	Nut Assembly	1
13	27430	Threaded Rod Air Cylinder Blade Conveyors	1
14	13-0725-00008	Hex Nut 1/2 PL	1
15	37532	Mount Weldment Air Gate	1
16	13-0702-06010	Hex Cap Screw 3/8-16 UNC x 5/8	4
17	37537	Transition Air Gate	1
18	24394	Transition Cover Short	1
19	13-0729-00006	Nylon Hex Nut 3/8-16 UNC	8
20	24393	Transition Cover Long	1
21	50063	Transition Seal Rod Style	1
22	13070704012	Screw Self Drill 1/4-14 x 3/4	4

CONVEYOR HANGER ASSEMBLY

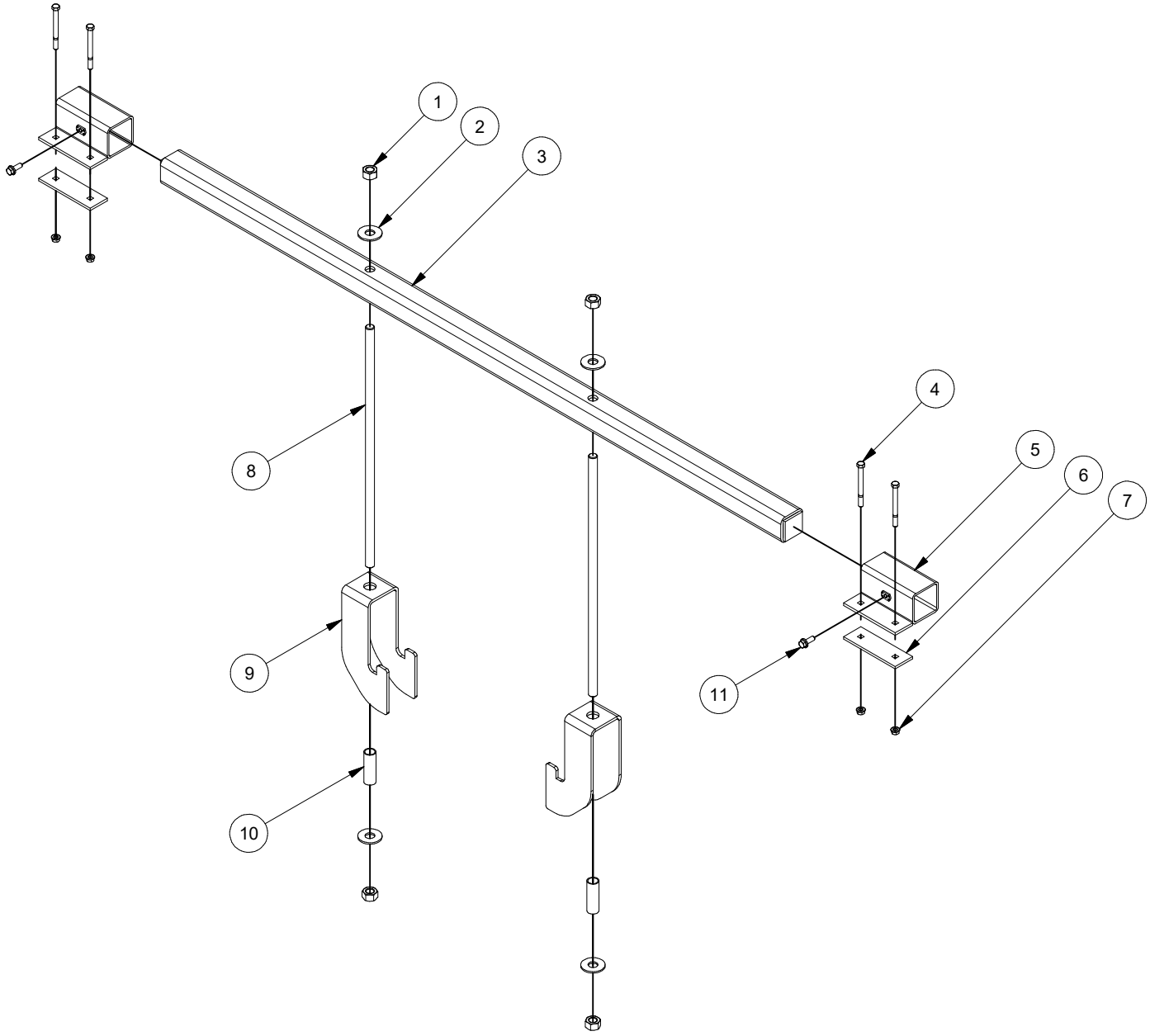
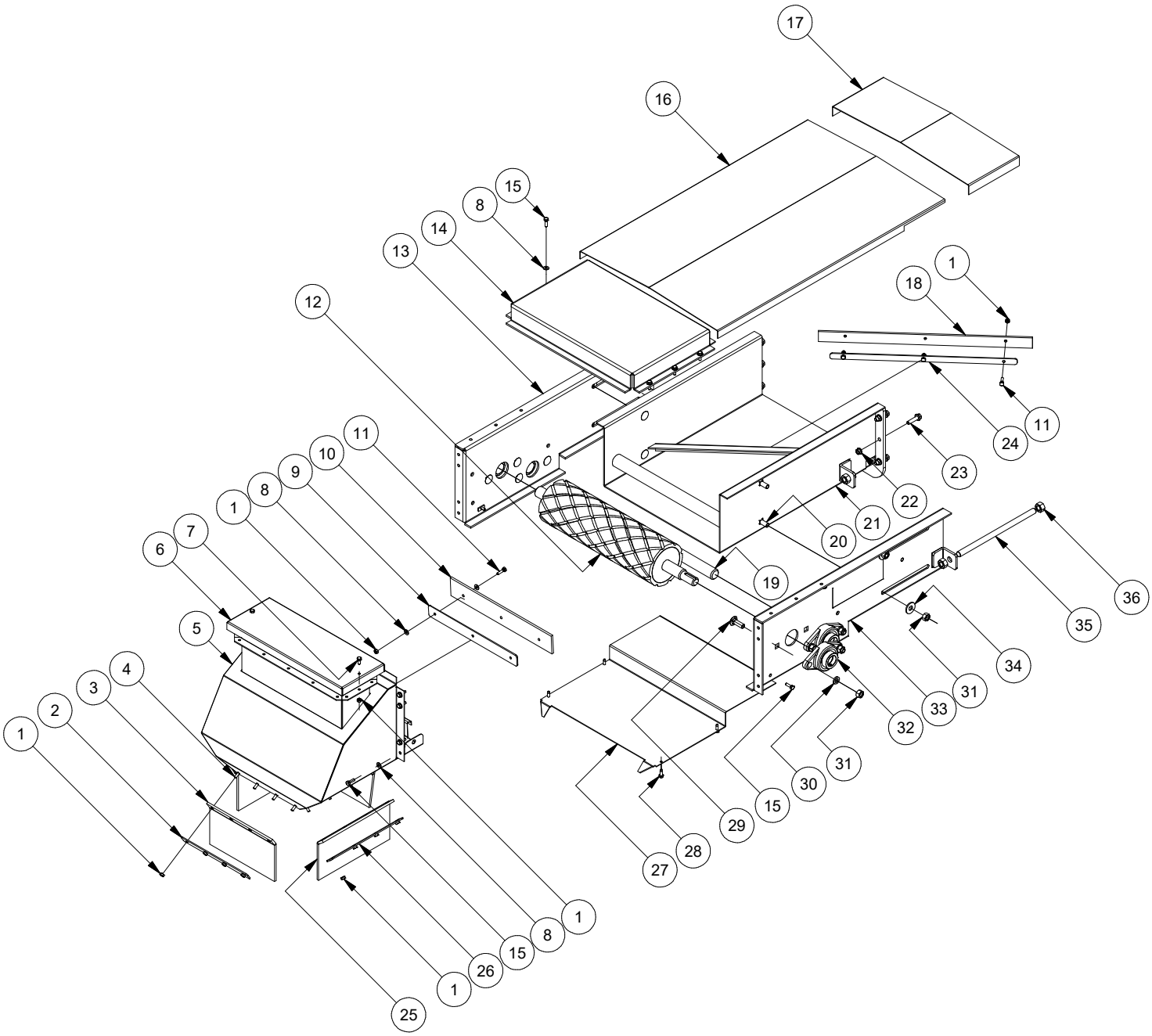


Table 14 - Conveyor Hanger Assembly

ITEM	PART #	DESCRIPTION	QUANTITY
1	13-0725-00012	Hex Nut 3/4 PL	4
2	13-0735-00012	Washer Flat 3/4 Std F/W ZC	4
3	38803	Tube Support Under Bin Mount	1
4	13-0702-06064	Hex Cap Screw 3/8-16 UNC x 4	4
5	38799	Slider Under Bin Mount Red	2
6	26224	Plate - Anchor	2
7	13-0731-00006	Hex Flanged Nut 3/8-16 UNC	4
8	27951	Hanger Rod Under Bin Mount	2
9	27949	Hook Under Bin Mount	2
10	27952	Tube For Hanger Under Bin Mount	2
11	13-0712-06024	Hex Cap Screw 3/8-16 UNC x 1.5	2

UNDERBIN NON-MOTOR END



UNDERBIN NON-MOTOR END

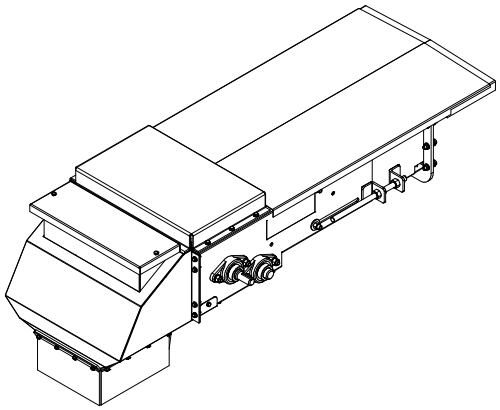
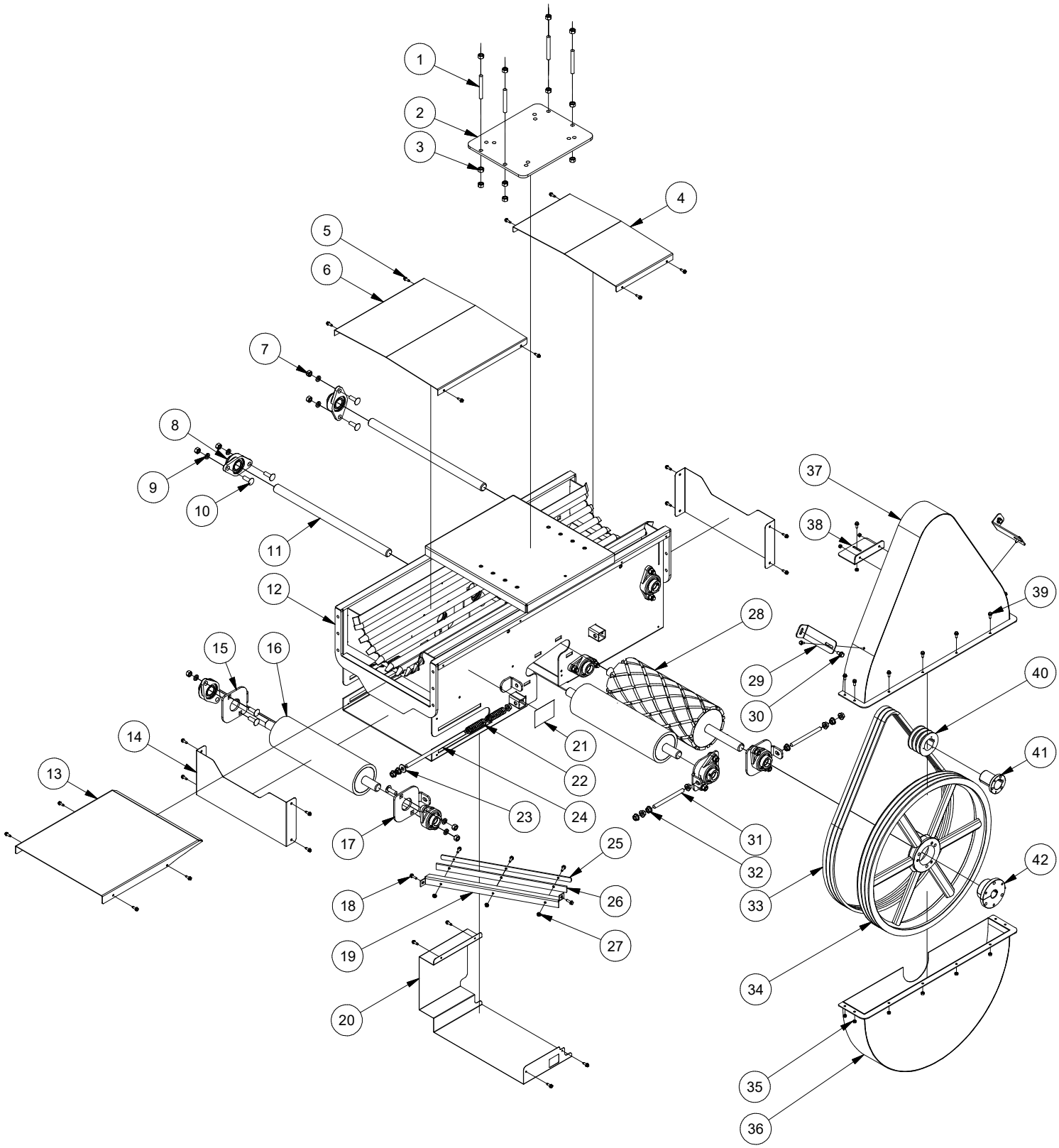


Table 15 - Underbin Non-Motor End

ITEM	PART #	DESCRIPTION	QUANTITY
1	13-0725-00004	Hex Nut 1/4-20 UNC	38
2	27449	Bracket Hold Down Chute	2
3	17978	Rubber Flap Front Back Under Bin Discharge	2
4	13-0702-04012	Hex Cap Screw 1/4-20 UNC x 3/4	16
5	37547	Discharge Under Bin Red	1
6	27357	Plate Discharge Access Cover	1
7	13-0702-04010	Hex Cap Screw 1/4-20 UNC x 5/8	2
8	13-0735-00004	Washer, 1/4	33
9	27447	Bracket Hold Down Roller Scrapper	1
10	27366	Scrapper Brush Roller Rubber	1
11	13-0702-04016	Hex Cap Screw 1/4-20 UNC x 1	6
12	27361	Under Bin Drive Roller	1
13	37535	Side Plate Left Slider	1
14	37542	Cover Non-Motor Red	1
15	13-0702-04014	Hex Cap Screw 1/4-20 UNC x 7/8	16
16	27408	Cover Discharge Top Galvanized	1
17	27423	Cover Top Transition Galvanized	1
18	27365	Scrapper Rubber Under Bin	1
19	27435	Roller Metal Under Bin	1
20	13-0709-08020	Bolt Carriage 1/2-13 UNC x 1 1/4	4
21	37543	Frame Slider Bolt On Discharge	1
22	13-0731-00006	Flanged Nut 3/8-16 UNC	6
23	13-0702-06024	Cap Screw 3/8-16 UNC x 1 1/2 FL	6
24	27446	Bracket Hold Down Scrapper	1
25	17977	Rubber Flap Sides Under Bin Discharge	2
26	27378	Plate Skirt Retainer Red	2
27	27416	Cover Bottom Discharge	1
28	13-0707-04012	Screw Self Drill 1/4-14 x 3/4 HWH	4
29	13-0709-08016	Bolt Carriage 1/2-13 x 1 Gr5	8
30	13-0734-00008	Washer, Helical Spring Lock 1/2in	8
31	13-0725-00008	Hex Nut 1/2 PL	12
32	27441	Bearing Flange Two Bolt	4
33	37534	Slide Plate Right Slider Non-Motor	1
34	13-0735-00008	Washer, 1/2	4
35	27427	Threaded Rod Tension Belt	2
36	13-0725-00010	Hex Nut 5/8-11 UNC	8

UNDERBIN S-DRIVE ASSEMBLY



UNDERBIN S-DRIVE ASSEMBLY

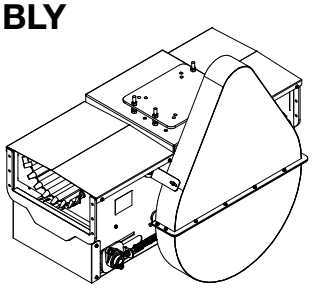


Table 16 - Underbin S-Drive Assembly

ITEM	PART #	DESCRIPTION	QUANTITY
1	21756	Threaded Rod 1/2in. x 4in. Long	4
2	21737	Motor Mount Plate S-Drive	1
3	13-0723-00008	Hex Nut 1/2-13 UNC	12
4	21732	Cover Top Small S-Drive	1
5	13070604010	Flanged Self Tapping Screw 1/4-20 UNC x 0.625	24
6	21731	Cover Top Large S-Drive	1
7	13072500008	Hex Nut 1/2	20
8	27441	Bolt Flange Bearing	10
9	13073400008	Lock Washers 1/2	20
10	13070908024	Carriage Bolt 1/2-13 UNC x 1.5	20
11	27435	Roller Metal Under Bin	2
12	30649	S-Drive	1
13	21758	S-Drive Belt Interference Plate	1
14	21745	Plate Cover Access Port S-Drive	2
15	21743	Plate Bearing Mount Left S-Drive	3
16	14106	Pinch Roller S-Drive	2
17	21744	Plate Bearing Mount Right S-Drive	3
18	13071204016	Hex Bolt Flanged 1/4-20 UNC x 0.875	5
19	33466	Scraper Bar Bolt In S-Drive	1
20	21736	Formed Cover Plate S-Drive	1
21	11522	S-Drive Belt Routing Decal	1
22	16128	Spring Compression S-Drive Tension	4
23	13073600008	Washer 1/2	2
24	21755	Threaded Rod 1/2in. x 12in. Long	2
25	21752	Scraper Hold Down	1
26	21750	Scraper	1
27	13-0731-00004	Hex Nut Flanged 1/4-20 UNC	3
28	14109	Drive Roller S-Drive	1
29	21738	Mounting Tab Formed V-Belt S-Drive	2
30	13071206012	Hex Bolt Flanged 3/8-16 UNC x 0.75	2
31	21754	Threaded Rod 1/2in. x 6in. Long	4
32	13073100008	Hex Flange Nut 1/2	22
33	17664	V-Belt B90 S-Drive	3
34	17662	3 Groove V-Belt Pulley 25" OD	1
35	13072500004	Hex Nuts 1/4	11
36	34747	Bottom V-Belt Pulley Cover	1
37	34746	Top V-Belt Pulley Cover	1
38	21739	Mounting Tab V-Belt	1
39	13071204012	Hex Flange Screw 1/4-20 UNC x 0.75	11
40	17663	Pulley 3V 3.75"-3TB34P Style Insert	1
41	14105	Bushing Split Taper P158	1
42	14104	Bushing Split Taper H114	1

UNDERBIN DISCHARGE

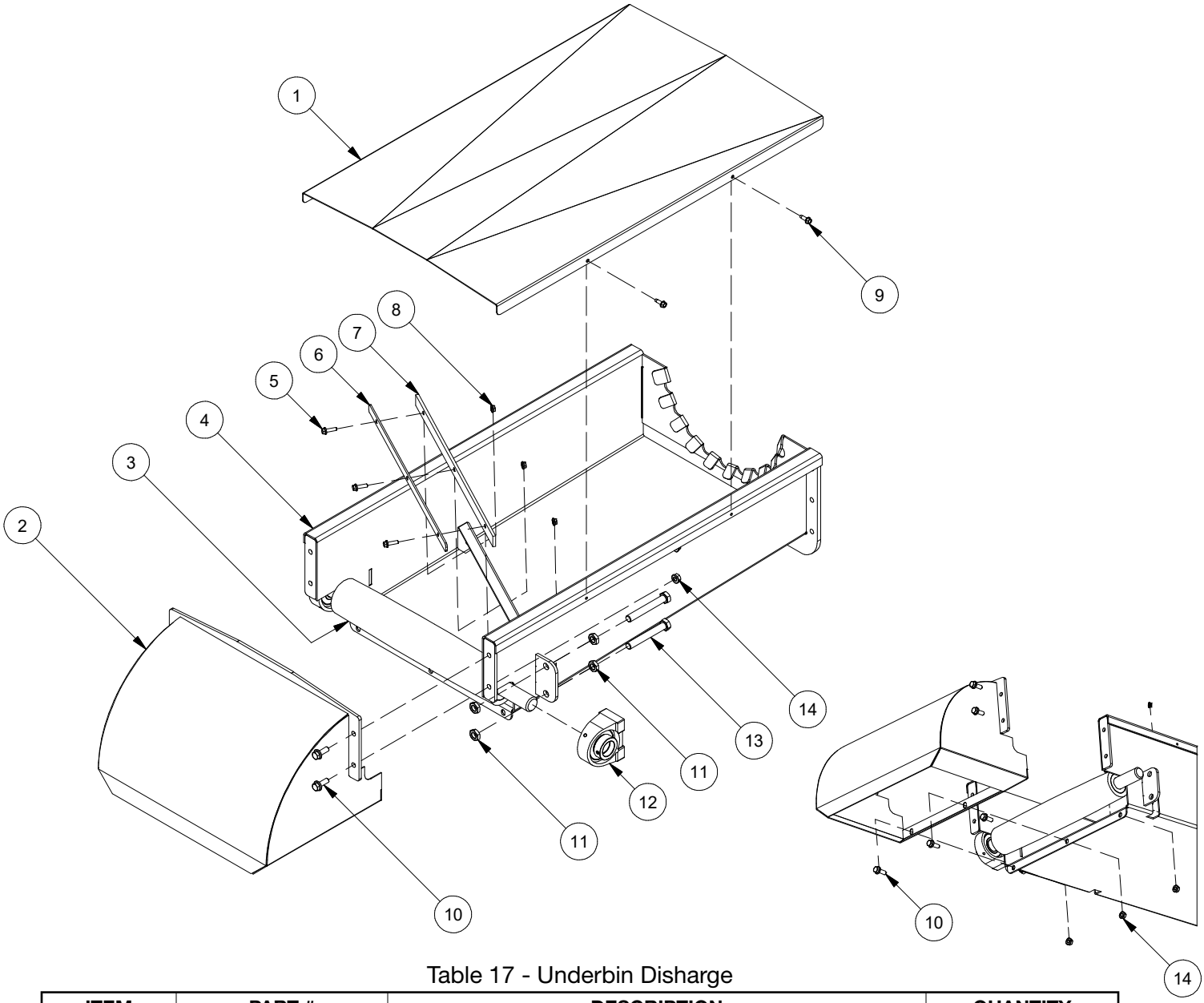


Table 17 - Underbin Disharge

ITEM	PART #	DESCRIPTION	QUANTITY
1	20832	Cover Galvanized UB Discharge	1
2	35097	UB Discharge Head	1
3	20831	UB Discharge Head Roller	1
4	35099	UB Discharge Body	1
5	13070204016	Hex Cap Screw 1/4 x 1-20	3
6	21752	Scraper Hold Down	1
7	21750	Scraper	1
8	13073100004	Flange Lock Nut 1/4-20	3
9	13070704012	Screw Self Drill 1/4-14 x 3/4	4
10	13071206016	Flange Lock Bolt 3/8 x 1-16	7
11	13072710014	Hex Jam Nut M14 x 2	8
12	27467	Bearing Block Assembly	2
13	13070114100	Hex Cap Screw M14 x 100m	4
14	13073100006	Flange Lock Nut 3/8-16	7

UNDERBIN SUPPORT FLOOR MOUNT

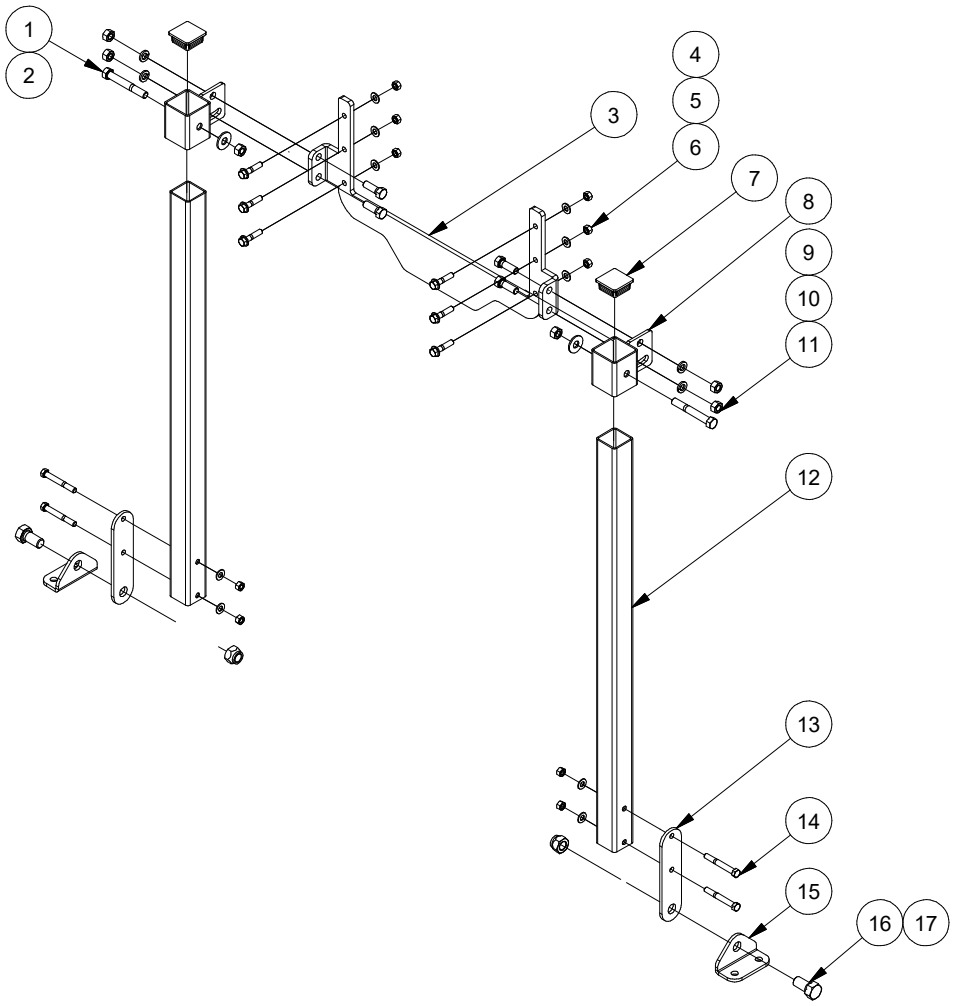


Table 18 - Underbin Support Floor Mount

ITEM	PART #	DESCRIPTION	QUANTITY
1	13-0702-08060	Hex Bolt 1/2-13 UNC x 3.75	2
2	13-0735-00008	Washer 1/2	2
3	23367	Flange Bolt Discharge	1
4	13-0702-06028	Hex Bolt 3/8-16 UNC x 1.75	6
5	13-0735-00006	Washer 3/8	16
6	13-0725-00006	Hex Nut 3/8-16 UNC	10
7	17131	Plastic Plug 2 x 2 x 120	2
8	27928	Underbin Support Height Adjustment	2
9	13-0702-08024	Hex Bolt 1/2-13 UNC x 1.5	4
10	13-0734-00008	Lock Washers 1/2	4
11	13-0725-00008	Hex Nut 1/2-13 UNC	6
12	23590	Underbin Conveyor Support Upright	2
13	27908	Bracket Floor Mount Tube	2
14	13-0702-06048	Hex Bolt 3/8-16 UNC x 3	4
15	27909	Bracket Floor Mount	2
16	13-0702-12024	Hex Bolt 3/4-10 UNC x 1.5	2
17	13-0729-00012	Hex Nylock 3/4-10 UNC	2

INCLINE TRANSITION ASSEMBLY

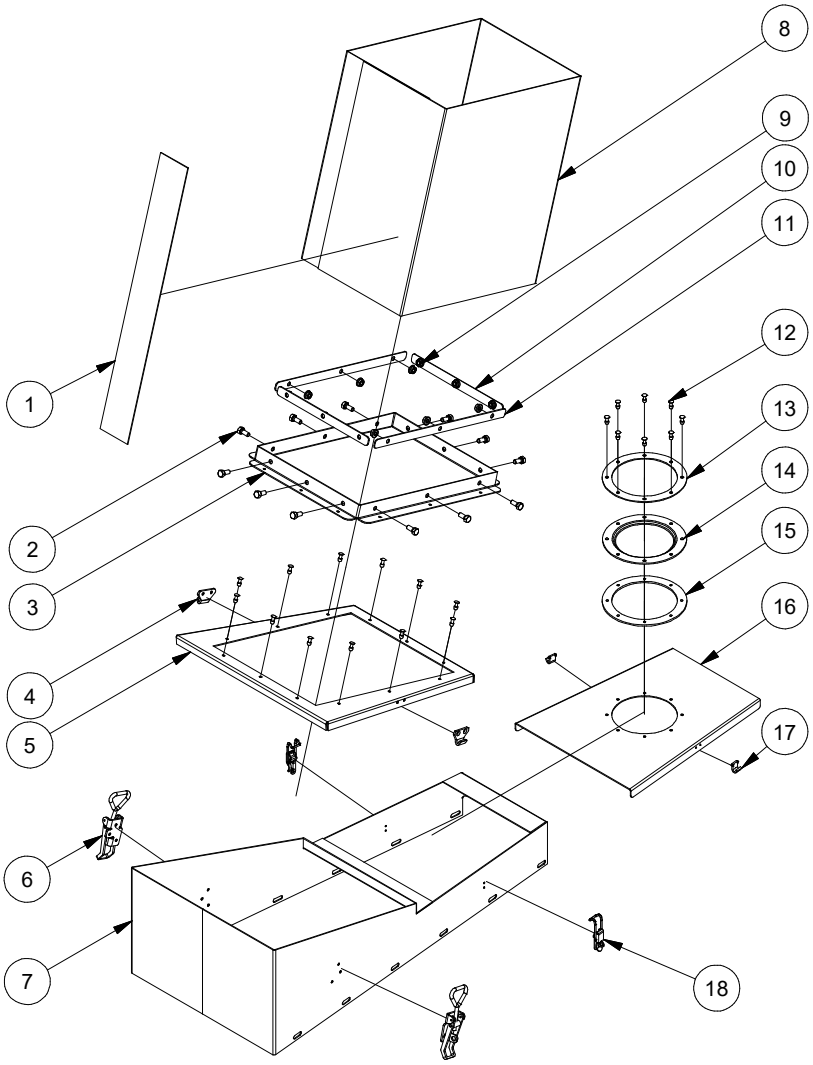


Table 19 - Incline Transition Assembly

ITEM	PART #	DESCRIPTION	QUANTITY
1	17830	Splice Tape EPDM 3in Wide	1
2	13-0702-05012	Hex Bolt 5/16-18 UNC x 0.75	12
3	29692	Transition Connection Bolt Plate	1
4	27935	Faucher 772-0142 Draw Latch	2
5	29691	Transition Connection Bottom Plate	1
6	27934	Faucher 772-0128 Weldable Latch	2
7	38534	Under Bin Transition Weldment	1
8	17831	Pond Guard EPDM 45mm	1
9	13-0725-00005	Hex Nut Flanged 5/16-18 UNC	12
10	29694	Transition Connection Spacer Short	2
11	29693	Transition Connection Spacer Long	2
12	19089	Rivet 3/16	20
13	19077	View Glass Ring	1
14	19285	View Glass	1
15	19055	View Glass Gasket	1
16	29695	Under Bin Transition Cover Plate	1
17	17838	Keeper Plate Faucher 776-2329	2
18	17832	Faucher 776-4407 Draw Latch	2

DUMP HOPPER ASSEMBLY

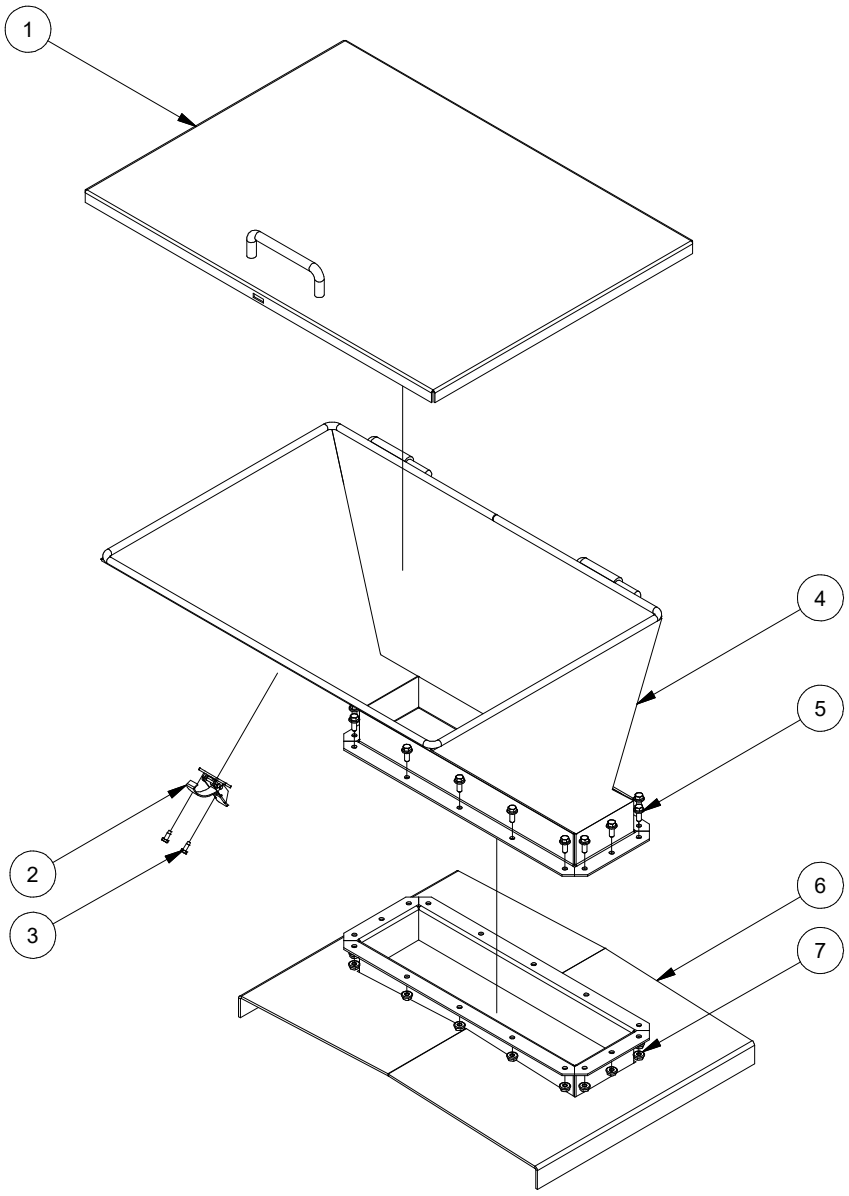


Table 20 - Dump Hopper Assembly

ITEM	PART #	DESCRIPTION	QUANTITY
1	37503	Hopper Lid	1
2	21257	Over-Center Latch	1
3	13-0707-10008	Self Tapping Hex Screw 10-16 UNC x 0.5	2
4	37502	Hopper Bottom Weldment	1
5	13-0712-04010	Flanged Hex Bolt 1/4-20 UNC x 0.625	16
6	34620	Dump Hopper Mounting Plate	1
7	13-0731-00004	Flanged Hex Nut 1/4-20 UNC	16

SEED STAND BOX STRAIGHT DISCHARGE ASSEMBLY

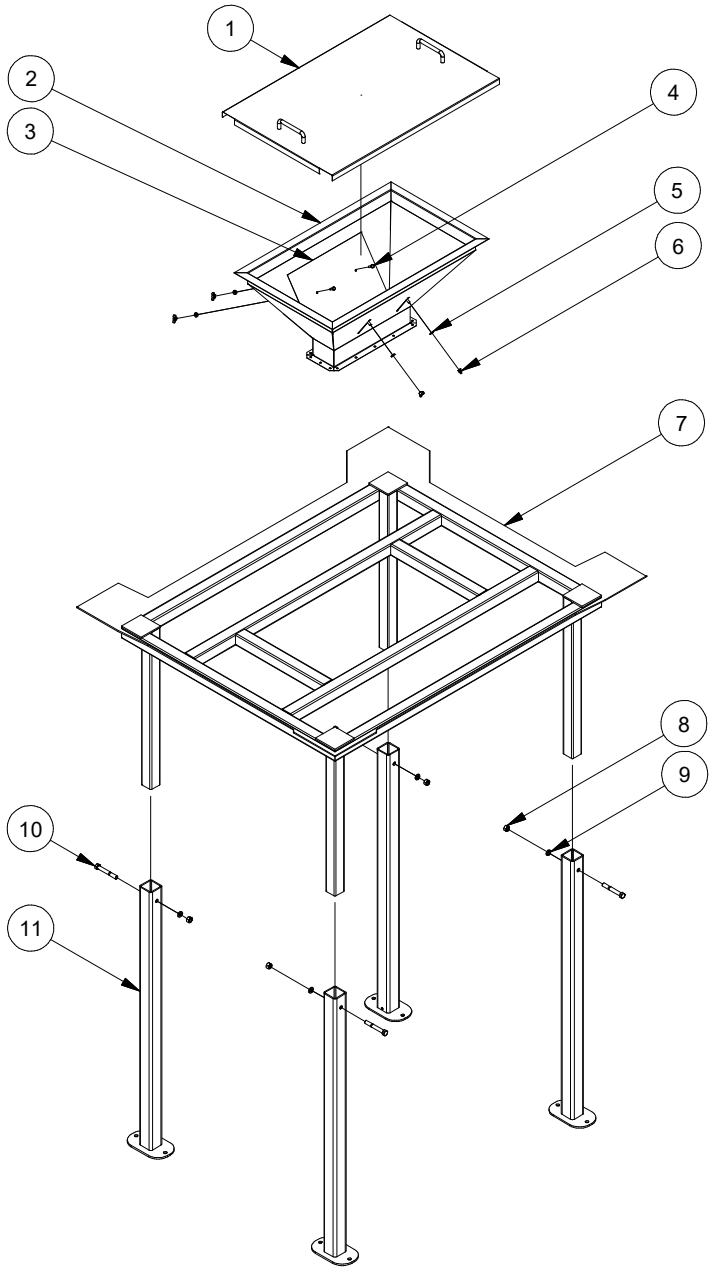


Table 21 - Seed Box Straight Discharge Assembly

ITEM	PART #	DESCRIPTION	QUANTITY
1	34656	Seed Box Stand Lid Weldment	1
2	34655	Seed Box Stand Discharge Hopper	1
3	26446	Flow Limiting Slide Plate	2
4	13-0702-04012	Hex Bolt 1/4-20 UNC x 0.75	4
5	13-0735-00004	Washer 1/4	4
6	13-0732-00004	Wing Nut 1/4	4
7	34657	Seed Box Stand Frame	1
8	13-0725-00008	Hex Nut 1/2-13 UNC	4
9	13-0734-00008	Lock Washer 1/2	4
10	13-0702-08060	Hex Bolt 1/2-13 UNC x 3.75	4
11	34660	Seed Box Stand Telescope Legs	4

SEED BOX STAND OFFSET DISCHARGE ASSEMBLY

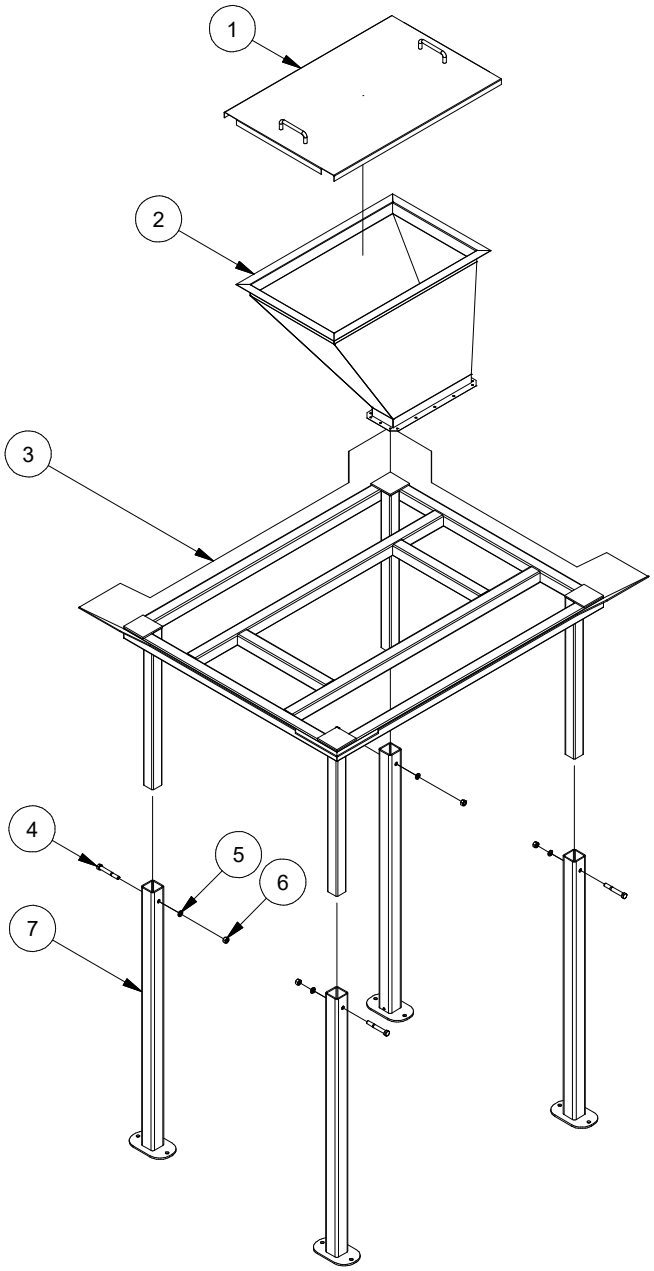


Table 22 - Seed Box Offet Discharge Assembly

ITEM	PART #	DESCRIPTION	QUANTITY
1	34656	Seed Box Stand Lid Weldment	1
2	37550	Seed Box Stand Discharge Hopper	1
3	34657	Seed Box Stand Frame	1
4	13-0702-08060	Hex Bolt 1/2-13 UNC x 3.75	4
5	13-0734-00008	Lock Washer 1/2	4
6	13-0725-00008	Hex Nut 1/2-13 UNC	4
7	34660	Seed Box Stand Telescope Legs	4

LIMITED WARRANTY STATEMENT

1. Meridian Manufacturing Inc, hereafter referred to as Meridian, warrants each new product (the "Goods") to be free from defects in material and workmanship under normal use and service for a period of one (1) year or ninety (90) days in the case of commercial use, from the shipment date from the Meridian dealer (FCA).

2. Meridian warrants replacement parts and components either manufactured or sold by, will be free from defects in materials or workmanship under normal use and service for thirty (30) days from the shipment date from the Meridian dealer (FCA), or the remainder of the original warranty period on the Goods, whichever is longer.

3. This warranty does not apply to:
   a. To any merchandise or components thereof, which in the sole and unfettered opinion of Meridian, have been subject to misuse, unauthorized modifications, alteration, accident, negligence, product abuse or lack of required maintenance.
   b. If repairs have been made with parts or by persons other than those parts or persons approved by Meridian.
   c. To parts and accessories not manufactured by Meridian including, but not limited to, engines, batteries, tires, belts, PTO shafts or other trade accessories. Such parts shall be covered by the warranty given by the actual manufacturer, if any.
   d. To failure of parts; or failure of parts to perform due to wear under normal or excessive service conditions; or to failure due to use by the Purchaser for purposes other than originally intended at time of manufacture, including without limitation using the Goods for mixing fertilizer, etc.; or used in excess of the built specifications.
   e. To Goods used in areas exposed to corrosive or aggressive conditions including, but not limited to, salt water from either inside or outside the Goods.
   f. To failures or defects arising out of damage during shipment or during storage.
   g. To materials replaced or repaired under this warranty, except to the extent of the remainder of the applicable warranty.

4. The obligation of Meridian under this warranty shall not arise unless Meridian is notified and this warranty is presented together with a written statement specifying the claim or defect within thirty (30) days after the failure is first detected or made known to the Purchaser and within: (i) one (1) year, or ninety (90) days in the case of commercial use; or (ii) thirty (30) days in the case of replacement parts and components manufactured by Meridian; from the shipment date from the Meridian dealer (FCA). Meridian in its sole and unfettered discretion shall determine if the claim is valid and whether correction of the defect or failure shall be made by repair or replacement of the materials.

5. Title to any replaced materials Meridian wishes to have pass to it, shall pass to Meridian.

6. The obligation of Meridian hereunder extends only to the original Purchaser or Buyer to whom the Goods were initially sold. This warranty shall not be subject to any assignment or transfer without the written consent of Meridian.

7. The purchaser acknowledges that it has made its own independent decision to approve the use of the Goods and also the specific fabrication and construction procedures utilized to complete the Goods, and has satisfied itself as to the suitability of these products for its use.

8. This warranty is subject to the following limitations, provisions and conditions:
   a. Meridian shall have no liability hereunder for any claims, including field re-work.
   b. Meridian shall not be liable for any incidental loss or damage, however caused, including, without limitation, normal wear and tear.

c. Meridian makes no express or implied warranties of any nature whatsoever except for such express warranties as set out herein. The warranty provided herein is in lieu of and excludes all other warranties, guarantees or conditions pertaining to the Goods, written or oral, statutory, express or implied, (except the warranty as to title) including any warranty as to the merchantability or fitness for any particular purpose. Meridian expressly disclaims all other representations, conditions or warranties, expressed or implied, statutory or otherwise and any representations, warranties or conditions that may arise from a course of dealing or usage of trade. The warranty provided herein shall constitute Meridian's sole obligation and liability and the Purchaser's sole remedy for breach of warranty. No other warranty has been made by any employee, agent, or representative of Meridian and any statements contained in any other printed material of Meridian is expressly excluded here from. Meridian shall not be responsible for any warranty offered by the Purchaser to its customers with respect to the Goods and the Purchaser shall indemnify Meridian with respect to same if any of those customers makes a claim against Meridian relating to any such warranty.

d. Subject to Meridian's obligations contained in paragraphs 1 and 2 herein, none of Meridian, its officers, directors, servants or agents shall be liable, or responsible for any loss or damage (including strict liability and liability for loss or damage due to items which the manufacturing processes are designed to identify) whether such loss or damage is caused by negligence in any manner whatsoever (including gross negligence, error, misrepresentation, misstatement, imprudence, lack of skill or lack of judgement).

9. The sole financial obligation of Meridian under this warranty shall be limited to the repair or replacement of the Goods as originally supplied and in no event shall they exceed the original cost of the Goods supplied.

10. Meridian shall not have any obligation under any warranty herein until all accounts have been paid in full by the Purchaser.

11. The construction and interpretation of this Warranty shall be governed by the laws of the Province of Saskatchewan.

Register your product at: www.merdianmfg.com
For warranty information send an email to: warranty@meridianmfg.com

WARRANTY REQUEST PROCEDURE

1. The product must be registered with Meridian Manufacturing Inc.

2. The purchaser must contact the dealer, from where the unit was purchased, immediately upon discovery of any defects.

3. A completed Warranty Request (Claim) Form must be submitted by the dealer to the Meridian’s warranty representative for review and any subsequent course of action.
   - Warranty requests must be completed with ALL required information in order it to be considered for approval.
   - Send photographs of the entire piece of equipment, and of the specific area of concern.

4. Warranty repair work will only be performed by Meridian or an approved representative of Meridian. Warranty work completed prior to Meridian’s approval will NOT be honoured. Failure to follow this procedure may affect any or all of this warranty.

5. All warranty requests will be adjudicated at the sole discretion of Meridian and in accordance with the terms and conditions of the warranty.

(800) 667-5904 | www.meridianmfg.com | conveyors@meridianmfg.com

Part No: 650507642-REV1