



BENGAL ASSEMBLIES

NH TS6.1XX T4B 2 WHEEL DRIVE

Current as of 03/01/2021



PARTS LISTING WITH MOUNTING AND OPERATING INSTRUCTIONS

Tiger Corporation
3301 N. Louise Ave.
Sioux Falls, SD 57107
1-800-843-6849
1-605-336-7900
www.tiger-mowers.com

06020024

Warranty Information: Read and understand the complete Warranty Statement found in this manual. Fill out the Warranty Registration form in full and return it within 90 days. Make certain the Serial Number of the machine is recorded on the Warranty Card, and form that you retain.

FORWARD

This manual contains information about many features of the Tiger mowing and roadside maintenance equipment. Some of these include: Safety precautions, Assembly instructions, Operations, Maintenance and Parts. This manual will also assist you in the proper break-in, daily care, and troubleshooting of your new mower.

We recommend that you read carefully the entire manual before operating the unit. Also, time spent in becoming fully acquainted with its performance features, adjustments, and maintenance schedules will be repaid in a long and satisfactory life of the equipment.

Troubleshooting - Please, before you call, help us to help you!

Please look at the equipment to observe what is happening, then:

- Classify the problem
 - Hydraulic, electrical or mechanical - Read the trouble shooting section
 - Tractor or Truck chassis - Contact vehicle dealer
- If unable to correct the problem yourself, contact your local Tiger Dealer after gathering:
 - Machine model _____
 - Serial number _____
 - Dealer name _____
 - Detailed information about the problem including results of troubleshooting

Attention Owner / Operator / Dealer: It is your obligation to read, and understand, the warranty information section located at the back of this manual denoting that the purchaser understands the safety issues relating to this machine and has received and will read a copy of this manual.

If at any time, you have a service problem with your Tiger mower, Contact your local dealer for service and parts needed.

MANUFACTURED BY:

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1012

This symbol means:

CAUTION – YOUR SAFETY IS AT RISK!

When you see this symbol, read and follow the associated instructions carefully or personal injury or damage may result.

Tiger is a registered trademark.



SAFETY SECTION

Safety Section 1-1

SAFETY

GENERAL SAFETY INSTRUCTIONS AND PRACTICES

A careful operator is the best operator. Safety is of primary importance to the manufacturer and should be to the owner/operator. Most accidents can be avoided by being aware of your equipment, your surroundings, and observing certain precautions. The first section of this manual includes a list of Safety Messages that, if followed, will help protect the operator and bystanders from injury or death. Read and understand these Safety Messages before assembling, operating or servicing this Implement. This equipment should only be operated by those persons who have read the manual, who are responsible and trained, and who know how to do so responsibly.



The Safety Alert Symbol combined with a Signal Word, as seen below, is used throughout this manual and on decals which are attached to the equipment. The Safety Alert Symbol means: "ATTENTION! BECOME ALERT! YOUR SAFETY IS INVOLVED!" The Symbol and Signal Word are intended to warn the owner/operator of impending hazards and the degree of possible injury faced when operating this equipment.

Practice all usual and customary safe working precautions and above all--- remember safety is up to YOU. Only YOU can prevent serious injury or death from unsafe practices.



Indicates an imminently hazardous situation that, if not avoided, WILL result in DEATH OR VERY SERIOUS INJURY.



Indicates an imminently hazardous situation that, if not avoided, COULD result in DEATH OR SERIOUS INJURY.



Indicates an imminently hazardous situation that, if not avoided, MAY result in MINOR INJURY.



Identifies special instructions or procedures that, if not strictly observed, could result in damage to, or destruction of the machine, attachments or the environment.

NOTE: *Identifies points of particular interest for more efficient and convenient operation or repair.*

READ, UNDERSTAND, and FOLLOW the following Safety Messages. Serious injury or death may occur unless care is taken to follow the warnings and instructions stated in this Manual and in the Safety Messages on the implement. Always follow the instruction in this manual and use good common sense to avoid hazards.



NOTE: *If you want a translation of this safety section in one of the following Languages, please contact: Translations at 1502 E. Walnut Street Seguin, TX 78155; Fax: (830) 372-9529; Safety Section Translations are available in Spanish, Portuguese, French, German, Russian. PN GS01*

SAFETY

Operator Safety

				
Read and understand Operator's Manual	Always wear Safety Glasses	Wear Hard Hat Safety Shoes	Never use Drugs or Alcohol when operating equipment	Wear Safety Vest when operating on or near roads

WARNING

TO AVOID SERIOUS INJURY OR DEATH DO THE FOLLOWING:

- **READ, UNDERSTAND** and **FOLLOW** Operator's Manual instructions, Warnings and Safety Messages.
- **WEAR SAFETY GLASSES**, safety shoes, hard hat, hearing protection and gloves when operating or repairing equipment
- **WEAR** appropriate breathing respirator when operating in dusty conditions to avoid respiratory diseases.
- **DO NOT WEAR** loose clothing or jewelry to avoid rotating parts entanglement injury.
- **DO NOT USE DRUGS** or **ALCOHOL** before or while operating equipment.
- **DO NOT ALLOW** anyone to operate equipment under the influence of drug or alcohol.
- **CONSULT** medical professional for medication impairment side effects.
- **STAY CLEAR** of hot surfaces such as Mufflers, hydraulic pumps, valves and tanks.
- **STAY ALERT**, prolonged operation can cause fatigue, **STOP** and **REST**.

GENERAL OPERATING SAFETY

VISIBILITY CONDITIONS WHEN MOWING:

- **OPERATE IN DAYLIGHT** or with lights that gives at least 100 yards clear visibility.
- **BE ABLE TO SEE** and identify passersby, steep slopes, ditches, drop-offs, overhead obstructions, power lines, debris and foreign objects.
- Avoid backing up while mowing, vision may be limited, severe damage or injury can occur.
- **DO NOT** run tractor in enclosed building without adequate exhaust ventilation.

GROUND SPEED WHEN MOWING:

- **NORMAL SPEED** range is between 1 to 2 mph(1-3 kph).
- **ADJUST MOWING SPEED** for terrain conditions and grass type, density and cut height.
- **REDUCE MOWING SPEED** when near steep slopes, ditches, drop-offs, overhead obstructions, power lines and to avoid debris and foreign objects.

TRACTOR and MOWER

- **DO NOT** operate the tractor or mower unless the equipment is maintained and operating properly.
- **DISCONTINUE OPERATION** if tractor or mower electrical and hydraulic controls do no function properly.
- **DISCONTINUE OPERATION** of the tractor if the braking or steering systems do not function properly.
- **DO NOT** operate the tractor or mower if there are any hydraulic leaks.

INSECT INFESTATION

- **DO NOT** operate in areas where bees or insects may attack unless you **WEAR PROTECTIVE CLOTHING** or use enclosed tractor cab.

PTO SPEED:

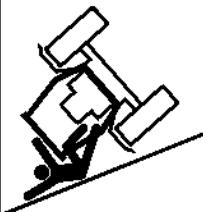
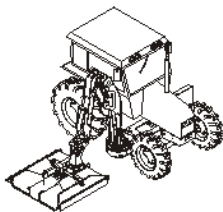



- **DO NOT EXCEED IMPLEMENT RATED PTO SPEED**
- **AVOID** exceeding rated PTO speeds that may result in broken drivelines or blade failures.

SAFETY SIGNS:

- **REPLACE** missing, damaged or unreadable safety signs immediately. **PN OSBM-01**

SAFETY

CRUSHING HAZARDS

				
Crushing injury from roll over	Use Cab Tractor With Boom Mowers	Always wear seatbelt	Pinch Point Hazard Keep Hands and body parts clear of pinch points	Crushing injury from boom or mower head falling



TO AVOID SERIOUS INJURY OR DEATH FROM FALLING OFF TRACTOR, EQUIPMENT RUN OVER, ROLLOVER AND CRUSHING BY FALLING WING OR IMPLEMENT:

- **USE ROPS** and **SEAT BELT** equipped tractors for mowing operations.
- **KEEP ROPS** lock in up position.
- **ALWAYS BUCKLE UP** seat belt when operating tractor and equipment.
- **ONLY OPERATE** tractor and equipment while seated in tractor seat.

WHEN RAISING BOOM MOWER:

- Raise or lower **ONLY WHILE SEATED** in tractor seat with seat belt buckled.
- **KEEP BYSTANDERS CLEAR** of area **TO AVOID** crushing.
- **KEEP** sufficient clearance around implement and wings **TO AVOID** contacting buildings or overhead power lines.

LIFTED Equipment can fall from mechanical or hydraulic failure or inadvertent Control Lever movement.



TO AVOID EQUIPMENT FALLING while working near or under lifted boom, components and Mower Head:

- **SECURELY SUPPORT** or **block up** raised equipment, wings and components.
- **BLOCK UP** and **securely support** equipment before putting hands, feet or body under raised equipment or lifted components.
- **KEEP BYSTANDERS CLEAR** of raised boom or mower head until **securely blocked up**.

WHEN PARKING Implement and Tractor:

- **LOWER** Mower Head to the ground or **BLOCK** lifted parts before leaving equipment.
- **NEVER** leave implement unattended in a raised position.

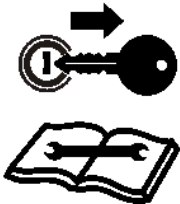





TO AVOID CHILDREN FALLING OFF OR BEING CRUSHED BY EQUIPMENT:

- **NEVER ALLOW** children to play on or around Tractor or Implement.
- **DO NOT** operate without operator CAB or OVERHEAD protection. Falling limbs and debris can cause injuries. **PN CHBM-01**

SAFETY

CONNECTING OR DISCONNECTING IMPLEMENT SAFETY

			
Stop Tractor Remove Key Read Manual	Crushing Hazard Do Not get under boom when connecting mower head to boom	Stability Hazard Ensure 20% of tractor weight is on front wheels	Stability Hazard Ensure 1500lbs down force on left tire with boom extended



TO AVOID SERIOUS INJURY OR DEATH FROM BEING CRUSHED BY TRACTOR OR IMPLEMENT:

WHEN connecting mower head to the boom:

- **KEEP BYSTANDERS AWAY** from tractor and mower.
- Ensure there is enough room to lift and swing the boom with out hitting objects

BEFORE connecting and disconnecting the mower head or boom:

- **STOP TRACTOR ENGINE**, place transmission into park, engage parking brake and remove key.

WHEN connecting and disconnecting the mower head or boom:

- **DO NOT** crawl or walk under raised mower head or boom. (*Refer to Instructions in Operation Section*)

WHEN CONNECTING IMPLEMENT DRIVELINE:(If equipped)

TO AVOID implement driveline coming loose during operation:

- **LUBRICATE** yoke spring locking collar to ensure it freely slides on PTO shaft.
- **SECURELY** seat yoke locking balls in PTO shaft groove.
- **PUSH and PULL DRIVELINE** on both the tractor and implement **PTO SHAFTS** to ensure it is **SECURELY ATTACHED**.

TO AVOID broken driveline during operations:

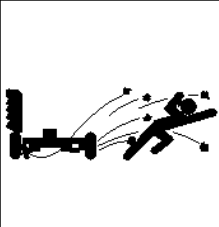

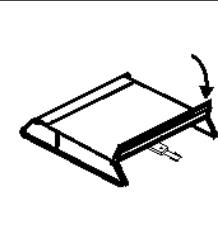

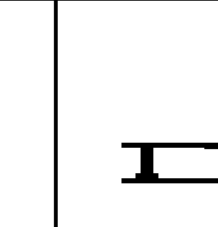
- **CHECK** driveline for proper length between PTO shaft and implement gearbox shaft. (*Refer to Instructions in Operation Section*)
- Drivelines too short can pull apart or disengage.
- Drivelines too long can bottom out.
- Bottoming driveline telescoping assembly will stop sliding and become solid.
- Driveline bottoming can push through support bearings and break off PTO shaft.

CONTACT DEALER if implement driveline does not match Tractor PTO shaft:

- **DO NOT USE PTO ADAPTER.**
Using a PTO adapter can cause:
- Excessive vibration, thrown objects, blade and implement failures by doubling operating speed.
- Increased working length exposing unshielded driveline areas and entanglement hazards. **PN CDBM-01**

SAFETY

THROWN OBJECTS HAZARDS

				
Mower Thrown Objects Hazard	Raised Mower Thrown Objects	Keep mower door closed when traffic comes within 300 feet	Inspect Area remove foreign objects	Do not let blades contact solid objects



ROTARY MOWERS CAN THROW OBJECTS 300 FEET OR MORE UNDER ADVERSE CONDITIONS.

TO AVOID SERIOUS INJURY OR DEATH TO OPERATOR OR BYSTANDERS FROM THROWN OBJECTS:

- KEEP bystanders 300 feet away

STOP MOWING IF PASSERSBY ARE WITHIN 300 FEET UNLESS:

- **ALL THROWN OBJECT SHIELDING** including, Front and Rear Deflectors, Chains Guards, Steel Guards, Bands, Side Skirts and Skid Shoes in place and in good condition when mowing.
- Mower is close and parallel to ground without exposing blades.
- **MOWING AREA** has been inspected and foreign materials and debris have been removed.
- **DO NOT** shred or mow loose or previously cut material if BYSTANDERS are within 300 feet.
- **PASSERSBY** are inside enclosed vehicle.

INSPECT AREA FOR POTENTIAL THROWN OBJECTS BEFORE MOWING:

- **REMOVE** debris, rocks, wire, cable, metal objects and other foreign material from area.
Wire, cable, rope, chains and metal objects can be thrown or swing outside deck with great velocity:
 1. **MARK** objects that cannot removed.
 2. **AVOID** these objects when mowing.

HIGH GRASS and WEED AREA INSPECTION:

- **INSPECT** for and **REMOVE** any hidden large debris.
- **MOW** at Intermediate height
- **INSPECT** and remove remaining debris
- **MOW** at final height.

MOWER THROWN OBJECT SHIELDING:



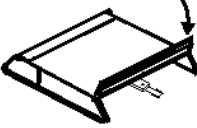

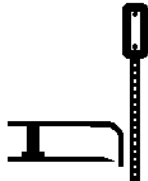
- **KEEP** all thrown object shielding including, Front and Rear Deflectors, Chains Guards, Steel Guards, Bands, Side Skirts and Skid Shoes in place and in good condition when mowing.
- **DO NOT OPERATE** with any thrown object shielding missing, damaged or removed.

RIGHT OF WAY (Highway) MOWING

- Stop mowing if any bystander comes within 300 feet of the mower.
- No shielding is 100% effective in preventing thrown objects. To Reduce Possibility of Injury:
 1. **MAINTAIN MOWER SHIELDING**, side skirts, skid shoes, and blades in good operational condition,
 2. **RAISE CUTTING HEIGHT** to **6 INCHES** minimum,
 3. **INSPECT AREA** thoroughly before mowing to **REMOVE** potential **THROWN OBJECT HAZARDS**,
 4. **NEVER ALLOW BLADES** to **CONTACT SOLID OBJECTS** like wire, rocks, post, curbs, guardrails, or ground while mowing. *PN TOBM-01*

SAFETY

THROWN OBJECTS HAZARDS (Continued)

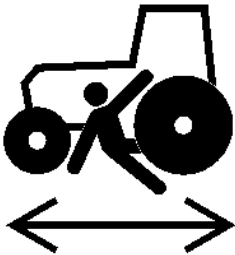

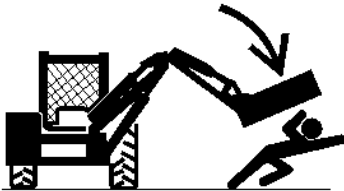
				
Mower Thrown Objects Hazard	Raised Mower Thrown Objects	Keep mower door closed when traffic comes within 300 feet	Inspect Area remove foreign objects	Do not let blades contact solid objects

MOWER OPERATION:

- **DO NOT** exceed mower's rated Cutting Capacity or cut non-vegetative material.
- **USE ENCLOSED TRACTOR CABS** when two or more mowers are operating in mowing area.
- Do Not mow in areas where bees or insects may attack unless you **WEAR PROTECTIVE CLOTHING** or use enclosed tractor cab.
- **ADJUST** mower head close and parallel to ground without exposing blades.
- **ADJUST** cutting **HEIGHT** to **AVOID BLADE CONTACT** with solid objects like wire, rocks, posts, curbs, guard rails and fixed obstructions.
- **CLOSE** Mower door and stop operating if bystanders come within 300 feet of the mower.
- Keep mower door closed when cutting close to the ground.
- Open door only to cut large brush or tree limbs. Close door immediately after cutting limb.
- **DO NOT** push mower head down onto material to cut it, use the front tips of the mower blades to cut into the material.
- **DO NOT** operate mower when mower is in transport position.
- **STOP MOWING** immediately if blades strike heavy objects, fixed structures, metal guard rails and concrete structures:
 1. **BLADES CAN FAIL** from impact and objects can be thrown with great velocity.
 2. **INSPECT** and **REPLACE** any damaged blades.
 3. **CHECK** blade carrier and **REPLACE** if damaged.
- **DO NOT** mow in standing water **TO AVOID** possible **BLADE FAILURE**.
- **AVOID MOWING** in reverse:
 1. **STOP PTO** and back up mower.
 2. **LOWER** mower, engage **PTO** and mow forward.
- **DISENGAGE** mower head and wait until **BLADES** stop rotating before raising mower to transport position.
- **DO NOT ENGAGE PTO** with mower in transport position.
- **STOP** mowing when **EXCESSIVE VIBRATION** occurs:
 1. **STOP PTO** and tractor **ENGINE**.
 2. **INSPECT** mower for vibration source.
 3. **REPLACE** any damage parts and bent or damaged **BLADES**. *PN TOBM-02*

SAFETY

RUN OVER HAZARDS

		
Operator run over hazard	Rider fall off run over hazard	Bystander run over hazard



TO AVOID SERIOUS INJURY OR DEATH FROM FALLING OFF TRACTOR OR EQUIPMENT RUN OVER:



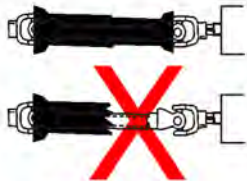
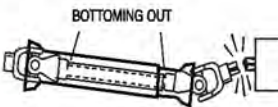
- **USE ROPS** and **SEAT BELT** equipped tractors for mowing operations.
- **KEEP ROPS** locked in **UP** position.
- **ONLY** start tractor while seated in tractor seat.
- **ALWAYS BUCKLE UP** seat belt when operating tractor and equipment.
- **ONLY OPERATE** tractor and equipment while seated in tractor seat.
- **NEVER ALLOW RIDERS** on tractor or implement.
- When not mowing stow Boom and Mower head in transport location before moving.

WHEN MOUNTING AND DISMOUNTING TRACTOR:

- **ONLY** mount or dismount when tractor and moving parts are stopped.
- **STOP ENGINE AND PTO**, engage parking brake, lower implement, allow all moving parts to stop and remove key before dismounting from tractor. *PN ROBM-01*

SAFETY

PTO ENTANGLEMENT HAZARDS

			
Entanglement hazard Do Not approach or touch a rotating PTO driveshaft	Make sure PTO shaft is securely attached Do Not Use PTO Adapter	DO NOT Operate if PTO shields are damaged or missing	Make sure PTO shafts are proper length



KEEP AWAY FROM ROTATING DRIVELINES AND ELEMENTS TO AVOID SERIOUS INJURY OR DEATH:

STAY AWAY and **KEEP** hands, feet and body **AWAY** from rotating blades, drivelines and parts until all moving elements have stopped.

- **STOP, LOOK** and **LISTEN** before approaching the mower to make sure all rotating motion has stopped.
- **ROTATING COMPONENTS CONTINUE** to **ROTATE** after the PTO is shut off.

PTO SHIELDING:

TO AVOID SERIOUS INJURY OR DEATH FROM ENTANGLEMENT WHEN OPERATING IMPLEMENT:

- **KEEP PTO** shields, integral driveline shields and input shields installed
- **DO NOT OPERATE** mower without shields and guards in place or missing
- **REPAIR OR REPLACE** if damage, broken or missing
- **ALWAYS REPLACE GUARDS** that have been removed for service or maintenance.
- Do Not use PTO or PTO guard as a step.

TO AVOID broken driveline during operations:

- **CHECK** driveline for proper length between PTO shaft and implement gearbox shaft. (*Refer to Instructions in Operation Section*)
- Drivelines too short can pull apart or disengage.
- Drivelines too long can bottom out.
Bottoming driveline telescoping assembly will stop sliding and become solid.
- Driveline bottoming can push through support bearings and break off PTO shaft
- **AVOID** sharp turns or lift mower to heights to cause driveline "knocking".
- Lubricate driveshaft-telescoping components weekly.

CONTACT DEALER if implement driveline does not match Tractor PTO shaft:



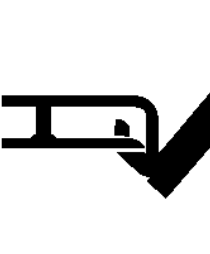
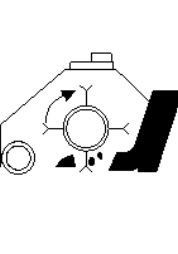

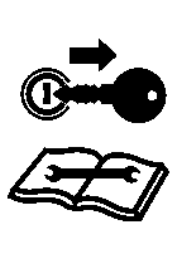
- **DO NOT USE PTO ADAPTER.**

Using a PTO adapter can cause excessive vibration, thrown objects, blade and implement failures by doubling operating speed. Increased working length exposing unshielded driveline areas. **PN PE01**

SAFETY

SAFETY

MOWER BLADE CONTACT HAZARDS

					
Do not put fingers underneath mower	Do not put hands underneath Flail Mower	Do not put foot underneath mower	Do not put foot underneath Flail Mower	Shearing Hazard from Sickle blades	Stop Tractor Remove Key Read Manual







KEEP AWAY FROM ROTATING BLADES TO AVOID SERIOUS INJURY OR DEATH FROM BLADE CONTACT:

- **STAY AWAY** and **KEEP HANDS, FEET** and **BODY AWAY** from rotating blades, drivelines and parts until all moving elements have stopped.
- **DO NOT** put hands or feet under mower decks
- **STOP** rotating **BLADES** disengage mower switch and PTO and wait for blade to stop rotating before raising mower head.
- **DO NOT** approach Sickle Bar head until Tractor Engine has been shut off.
- **STOP LOOK** and **LISTEN** before approaching the mower to make sure all rotating motion has stopped. *PN MBBM-01*

SAFETY

HIGH PRESSURE OIL LEAK HAZARD

			
High pressure oil penetrating skin	High pressure oil eroding skin	Using cardboard to check for oil leaks	Tank contents under pressure. Allow oil to cool before slowly removing cap



TO AVOID SERIOUS INJURY OR DEATH FROM HIGH PRESSURE HYDRAULIC OIL LEAKS PENERATING SKIN:

- **DO NOT OPERATE** equipment with oil or fuel leaks.
- **KEEP** all hydraulic hoses, lines and connections in **GOOD CONDITION** and **TIGHT** before applying system pressure.
- **RELIEVE HYDRAULIC PRESSURE** before disconnecting lines or working on the system.
- **REMOVE** and replace hose if you suspect it leaks. Have dealer test it for leaks.

HIGH PRESSURE FLUID LEAKS CAN BE INVISIBLE.

WHEN CHECKING FOR HYDRAULIC LEAKS AND WORKING AROUND HYDRAULIC SYSTEMS:

- **ALWAYS WEAR** safety glasses and impenetrable gloves.
- **USE** paper or cardboard to search for leaks.
- **DO NOT USE** hands or body parts to search for leak.
- **KEEP** hands and body **AWAY** from pin holes and nozzles ejecting hydraulic fluid.
- Hydraulic fluid may cause gangrene if not surgically removed immediately by a doctor familiar with this form of injury.

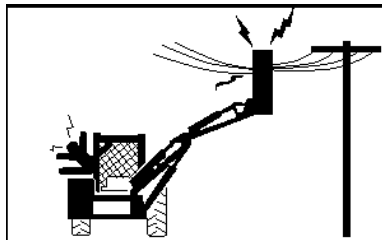
Use caution when removing Hydraulic Tank cap.

- Tank contents maybe under pressure
- Allow oil to cool before removing cap.
- Relieve oil pressure before removing cap slowly.
- Stay away from hot oil that may spray from tank.

PN HPBM-01

SAFETY

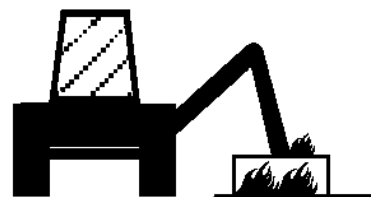
ELECTRICAL & FIRE HAZARDS



Mower head or Boom contacting overhead electrical lines



Strike and explosion Hazard
Blades Contacting Utility or Gas Lines



Fire Hazard Do Not operate near fires. Keep debris away from hydraulic pumps and valves



TO AVOID SERIOUS INJURY OR DEATH FROM ELECTRICAL CONTACT WHEN WORKING AROUND ELECTRICAL POWER LINES, GAS LINES AND UTILITY LINES:

- **INSPECT** mowing area for overhead or underground electrical power lines, obstructions, gas lines, cables and Utility, Municipal, or other type structure.
- **KEEP** all raised wings at a 10 feet or greater distance from all power lines and overhead obstructions.
- **DO NOT** allow mower to contact with any Utility, Municipal, or type of structures and obstructions.
- **CALL 811** and 1-800-258-0808 for identify buried utility lines.

FIRE PREVENTION GUIDELINES while Operating, Servicing, and Repairing Mower and Tractor to reduce equipment and grass fire Risk:

- **EQUIP** Tractor with a **FIRE EXTINGUISHER**
- **DO NOT OPERATE** mower on a tractor equipped with under frame exhaust
- **DO NOT SMOKE** or have open flame near Mower or Tractor
- **DO NOT DRIVE** into burning debris or freshly burnt area
- **AVOID FIRE IGNITION** by not allowing mower blade to contact solid objects like metal or rock.
- **DO NOT** operate if oil is leaking. Repair oil leak and remove all accumulated oil before operating.
- **CLEAR** any grass clippings or debris buildup around mower hydraulic pumps, valves or tanks.
- **SHUT OFF ENGINE** while refueling. *PN EFBM-01*

SAFETY

TRANSPORTING HAZARDS

		
Use SMV signs and Flashing Lights	Loss of Control Stopping Hazard	Loss of Control Speeding Hazard



TO AVOID SERIOUS INJURY AND DEATH WHEN TOWING OR TRANSPORTING EQUIPMENT:

- **KEEP** transport speed **BELOW** 20 mph to maintain control of equipment.
- **REDUCE SPEED** on inclines, on turns and in poor towing conditions.
- **DO NOT TOW** with trucks or other vehicles.
- **USE** only properly sized and equipped tractor for towing equipment.
- **FOLLOW** all local traffic regulations.

TRACTOR REQUIREMENTS FOR TOWING OR TRANSPORTING IMPLEMENTS:

- **ONLY TRANSPORT** with tractor with **ROPS** in the raised position.
- **USE** properly sized and equipped tractor that exceeds implement weight by at least 20%.
- **KEEP** 20% of tractor weight on front wheels to maintain safe steering.

BEFORE TRANSPORTING OR TOWING IMPLEMENT:

TRACTOR INSPECTION:

- **CHECK** steering and braking for proper operation and in good condition.
- **CHECK SMV** sign, reflectors and warning lights for proper operation and visibility behind unit.
- **CHECK** that your driving vision is not impaired by tractor, cab, or implement while seated in tractor seat.
- **ADJUST** your operating position, mirrors, and implement transport for clear vision for traveling and traffic conditions.

PREPARE IMPLEMENT FOR TRANSPORTING OR TOWING:

- Store Boom and Mower in transport positions and engage transport locks if equipped.

DETERMINE STOPPING CHARACTERISTICS OF TRACTOR AND IMPLEMENT FOR TRANSPORTING OR TOWING:

BRAKING TESTS:

- Stopping distance with implement attached may increase
- Observe **STOPPING** distances increases with increased speeds.
- **DETERMINE** the maximum safe transport speed that does not exceed 20 mph.
- Reduce travel speed in wet or icy roads, stopping distances increase.

DETERMINE MAXIMUM TURNING SPEED BEFORE OPERATING ON ROADS OR UNEVEN GROUND:

- **TEST** equipment in slowly increasing speed in turns to determine it can be operated at higher speeds.
- **USE REDUCED** turning speeds in sharp turns to avoid equipment turning over.






WHEN TOWING OR TRANSPORTING EQUIPMENT:

- Always **WEAR SEAT BELT** when operating or transporting mower.
- **USE** low speeds to avoid overturn with raised wings.
- **USE** low speeds and gradual steering on curves, hills, rough or uneven surfaces and on wet roads.
- **TURN ON** tractor **FLASHING WARNING LIGHTS**.
- **ALLOW** clearance for implement swing while turning.

KEEP raised boom mower 10 feet or greater distance from all power lines and overhead obstructions. *PN THBM-01*

SAFETY

HAZARDS WITH MAINTENANCE OF IMPLEMENT

				
Periodically inspect all moving parts, lubricate drivelines, and tighten all fasteners	Lower mower head to ground or block up before servicing	Stop engine remove key before conducting maintenance	Set mower head securely on the ground before servicing blades	Thrown Objects Hazard Ensure blades rotate clockwise viewed from above mower head

WARNING

AVOID SERIOUS INJURY OR DEATH FROM COMPONENT FAILURE BY KEEPING IMPLEMENT IN GOOD OPERATING CONDITION IN PERFORMING PROPER SERVICE, REPAIRS AND MAINTENANCE.

BEFORE PERFORMING SERVICE, REPAIRS AND MAINTENANCE ON THE IMPLEMENT:

- **STOP ENGINE AND PTO**, engage parking brake, lower implement, allow all moving parts to stop and remove key before dismounting from tractor.
- **PLACE** implement on ground or securely block up raised equipment. Use large blocks on soft or wet soil.
- **PUSH** and **PULL** Remote Hydraulic Cylinder lever to relieve hydraulic pressure.
- **DISCONNECT Pump solenoid valve or PTO driveline connection before servicing mower head.**
- **WEAR SAFETY GLASSES, PROTECTIVE GLOVES** and follow **SAFETY PROCEDURES** when performing service, repairs and maintenance on the implement:
- Always **WEAR** protective **GLOVES** when handling blades, knives, cutting edges or worn component with sharp edges.
- Always **WEAR GLOVES** and **SAFETY GLASSES** when servicing hot components
- **AVOID CONTACT** with hot hydraulic oil tanks, pumps, motors, valves and hose connection surfaces.
- **SECURELY** support or **BLOCK UP** raised implement, framework and lifted components before working underneath equipment.
- **FOLLOW INSTRUCTIONS** in maintenance section when replacing hydraulic cylinders to prevent component falling.
- **STOP** any implement movements and **SHUT-OFF TRACTOR** engine before doing any work procedures.
- **USE** ladder or raised stands to reach high equipment areas inaccessible from ground.
- **ENSURE** good footing by standing on solid flat surfaces when getting on implement to perform work.
- **FOLLOW** manufacturer's instructions in handling oils, solvents, cleansers, and other chemical agents.
- **DO NOT** change any factory-set hydraulic calibrations to avoid component or equipment failures.
- **DO NOT** modify or alter implement, functions or components.
- **DO NOT WELD** or repair rotating mower components. These may cause vibrations and component failures being thrown from mower.

PERFORM SERVICE, REPAIRS, LUBRICATION AND MAINTENANCE OUTLINED IN IMPLEMENT MAINTENANCE SECTION:

- **INSPECT** for loose fasteners, worn or broken parts, leaky or loose fittings, missing or broken cotter keys and washers on pins, and all moving parts for wear.
- **REPLACE** any worn or broken parts with authorized service parts.
- Inspect mower blade spindle to ensure bearing preload. If loose repair before operating.
- **LUBRICATE** unit as specified by lubrication schedule
- **NEVER** lubricate, adjust or remove material while it is running or in motion.
- **TORQUE** all bolts and nuts as specified.

BLADE INSPECTION:

- Inspect blade carrier and blades daily.
- Check blade and blade carrier **BOLT TORQUE** daily. Loose bolts can cause blade or blade bolt failures.
- **REPLACE**, bent, damage, cracked and broken blades immediately with new blades.
- **AVOID** blade failures and thrown broken blades. **DO NOT** straighten, weld, or weld hard-facing blades.

SAFETY SHIELDS, GUARDS AND SAFETY DEVICES INSPECTION:

- **KEEP** all Deflectors, Chain Guards, Steel Guards, Gearbox Shields, and PTO integral shields, Bands, Side Skirts and Skid Shoes in place and in good condition.
- **REPLACE** any missing, broken or worn safety shields, guards and safety devices.
- Engine Exhaust, some of its constituents, and certain vehicle components contain or emit chemicals known to the state of California to cause cancer, birth defects or other reproductive harm.
- Battery posts, terminals and related accessories contain lead and lead compounds, chemicals known to the state of California to cause cancer, birth defects or other reproductive harm. **PN HMBM-01**

SAFETY

PARTS INFORMATION

PARTS INFORMATION

Tiger mowers use balanced and matched system components for blade carriers, blades, cuttershafts, knives, knife hangers, rollers, drivetrain components, and bearings. These parts are made and tested to Tiger specifications. Non-genuine "will fit" parts do not consistently meet these specifications. The use of "will fit" parts may reduce mower performance, void mower warranties, and present a safety hazard. Use genuine Tiger mower parts for economy and safety. (SPTM-1)

SEE YOUR TIGER DEALER

Operator's & Parts Manuals



www.algqr.com/tpm

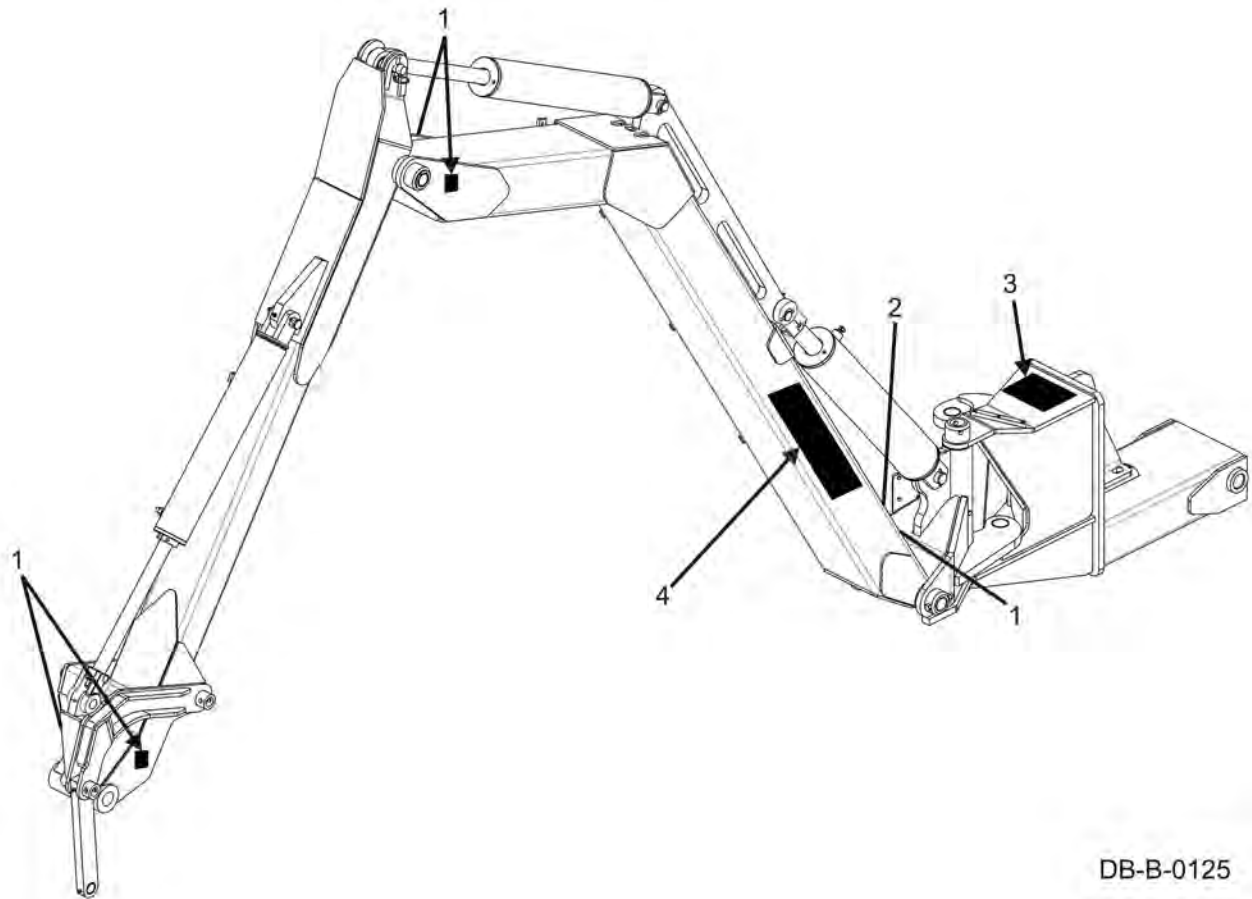
SAFETY

SAFETY

Decal Location

NOTE: Tiger supplies safety decals on this product to promote safe operation. Damage to the decals may occur while in shipping, use, or reconditioning. Tiger cares about the safety of its customers, operators, and bystanders, and will replace the safety decals on this product in the field, free of charge (Some shipping and handling charges may apply). Contact your Tiger dealer to order replacement decals.

Boom Arm

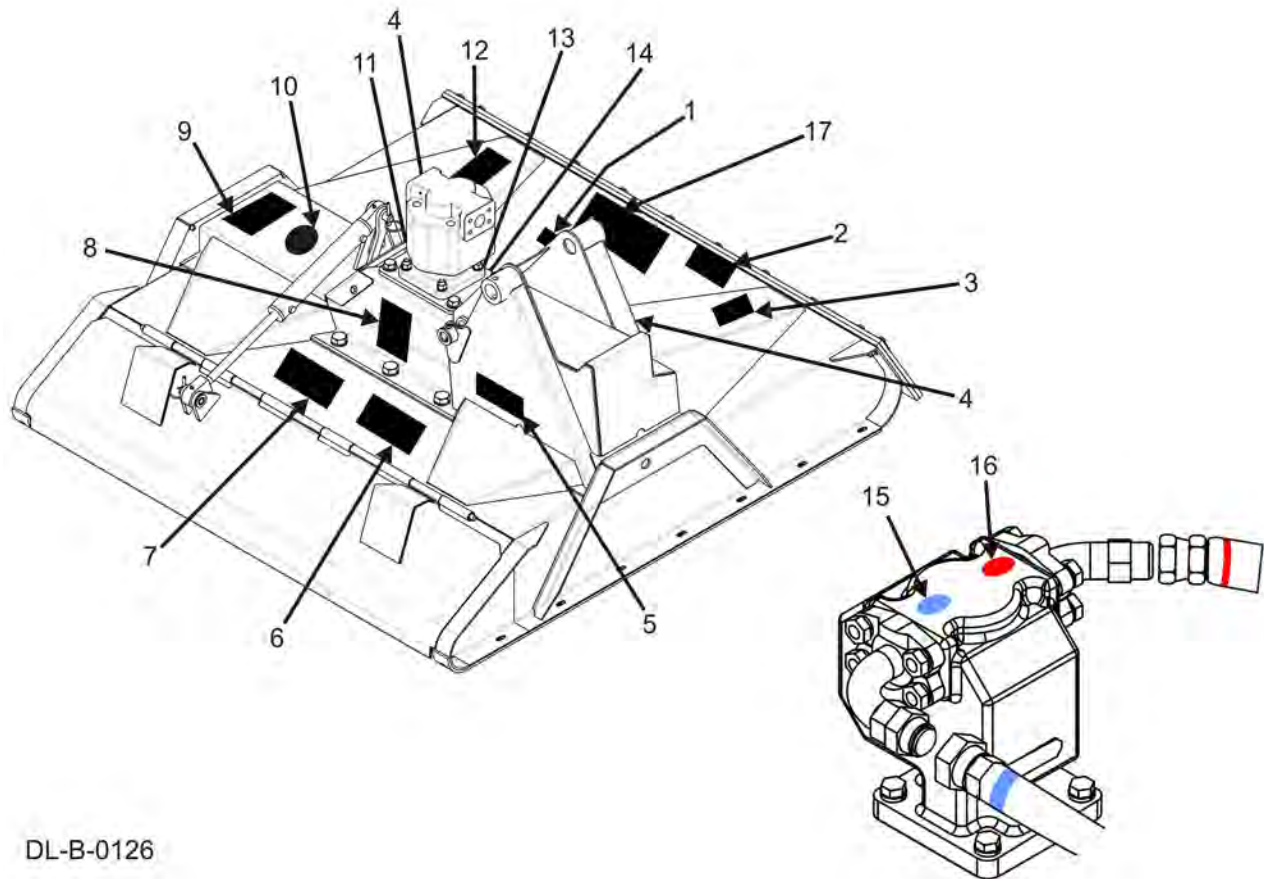


DB-B-0125

ITEM	PART NO.	QTY.	TYPE	DESCRIPTION
1.	02962764	5	WARNING	Pinch Points
2.	02965262	1	WARNING	Hydraulic Oil Hazard
3.	02962765	1	DANGER	Crushing Hazard
4.		1	LOGO	Name

SAFETY

50" & 60" Rotary



DL-B-0126

SAFETY

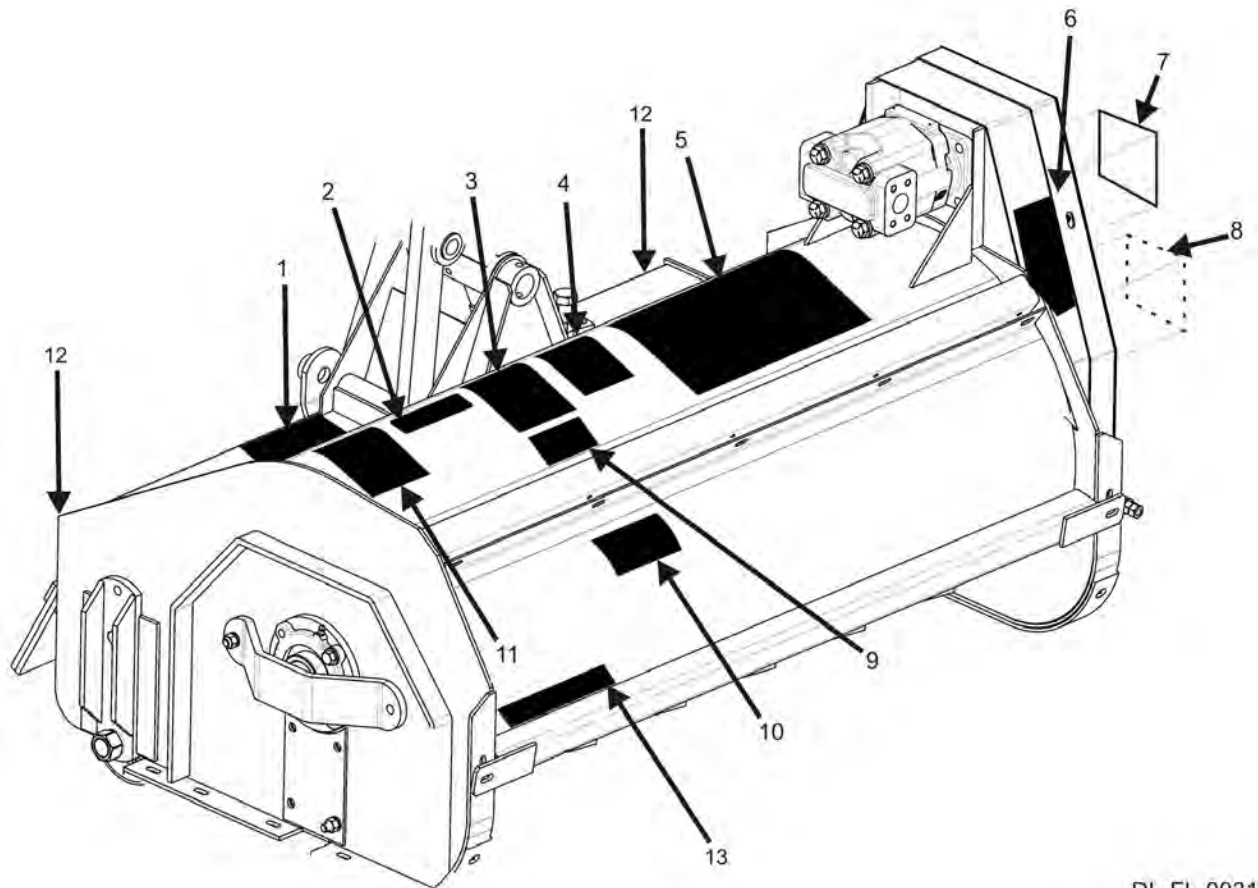
ITEM	PART NO.	QTY.	TYPE	DESCRIPTION
1.	6T3237	1	WARNING	Replace Blades
2.	24028	1	WARNING	Thrown Object Hazard
3.	D637	1	WARNING	Disconnect Hydraulic Solenoid
4.	42399	2	REFLECT	Red Reflector
5.	4240006	1	REFLECT	Amber Reflector
6.	D668	1	INSTRUCT	Lubrication Chart
7.	33224	1	DANGER	Blades, Thrown Object
8.	D619	1	WARNING	Blade Rotation
9.		1	LOGO	Made in the USA
10.		1	LOGO	Tiger Genuine Parts
11.	22839	1	INSTRUCT	Use Hand Grease Gun
12.	32709	1	WARNING	Use Genuine Tiger Parts
13.	6T3221	1	INSTRUCT	Lubrication Instructions
14.	nfs	1	SERIAL PLATE	Serial Number Plate
15.	06550058	1	INSTRUCT	Blue Dot
16.	06550057	1	INSTRUCT	Red Dot
17.		1	LOGO	Name

BOOM

Safety Section 1-17

SAFETY

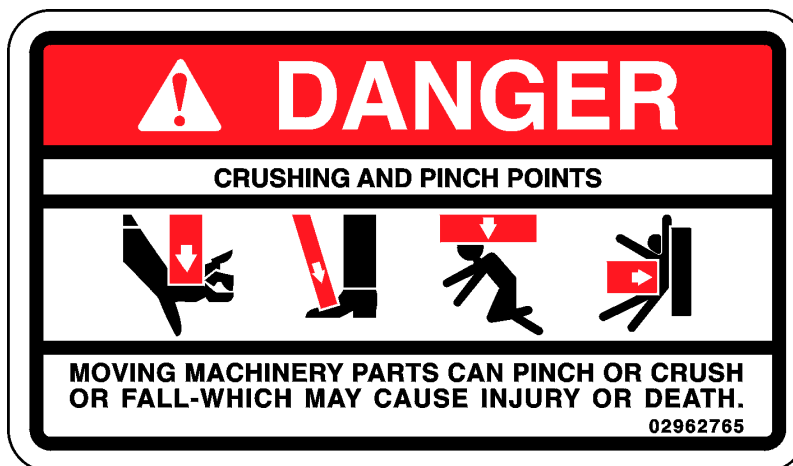
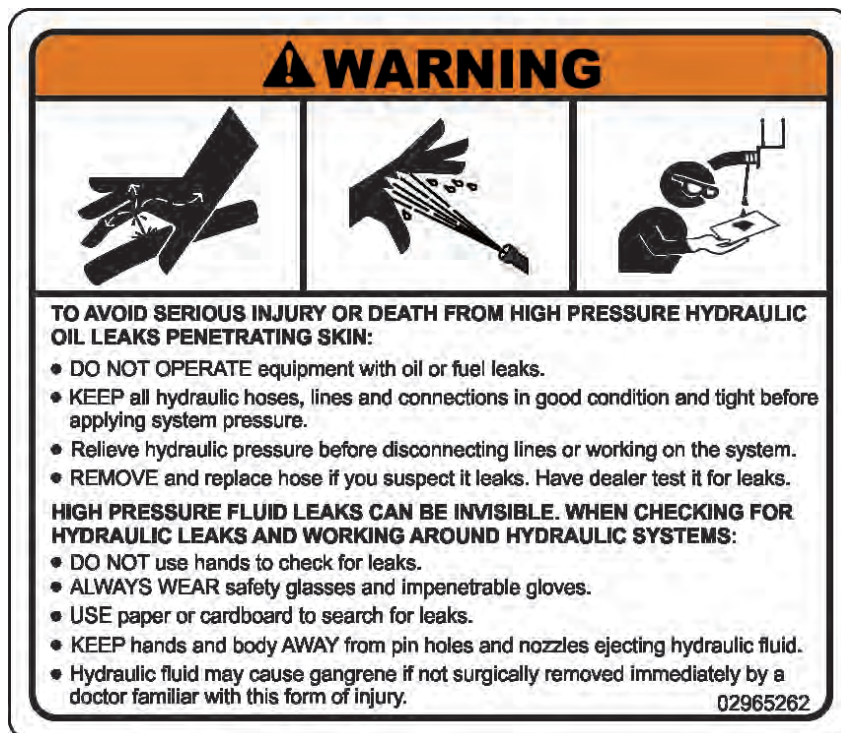
50" & 63" Flail



DL-FL-0031

ITEM	PART NO.	QTY.	TYPE	DESCRIPTION
1.	24028	1	DANGER	Thrown Object Hazard, Deflectors
2.	32709	1	WARNING	Use Genuine Tiger Parts
3.	33224	1	DANGER	Blades, Thrown Object
4.	D637	1	WARNING	Disconnect Hydraulic Solenoid
5.		1	LOGO	Tiger Logo
6.	00758194	1	WARNING	Pinch Point Hazard
7.		1	LOGO	50" Logo
		1	LOGO	63" Logo
8.	D646	1	DANGER	Guard Missing, Do Not Operate
9.	D655	1	INSTRUCT	Lube Chart
10.	TB1011	1	DANGER	Thrown Object Hazard, Shield
11.	6T3236	1	LOGO	Made in the USA
12.	42399	2	REFLECT	Red Reflector
13.	4240006	1	REFLECT	Amber Reflector
14.	nfs	1	SERIAL PLATE	Serial Number Plate

SAFETY



SAFETY

SAFETY

⚠ DANGER

THROWN OBJECT HAZARD

TO AVOID SERIOUS INJURY OR DEATH:
DO NOT OPERATE if Thrown Object Shielding is damaged or missing.

- Maintain Rubber Deflectors in good condition.
- Inspect Rubber Deflectors frequently.

MAINTAIN Thrown Object Shielding

↙ HERE ↘



24028



Rubber Deflector



Chain Guards

⚠ WARNING

TO AVOID SERIOUS INJURY OR DEATH FROM INADVERTENT MOWER HEAD START UP:

- Disconnect the hydraulic solenoid BEFORE servicing the tractor or mower.

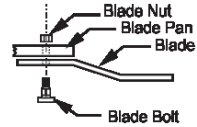


D637

⚠ WARNING

TO AVOID SERIOUS INJURY OR DEATH FROM BLADE ATTACHMENT FAILURE:

- Torque 1-1/8" blade bolt to 800 ft lbs.
- ALWAYS replace blades in pairs.
- ALWAYS replace blades with new bolts and nuts.



Blade Nut
Blade Pin
Blade
Blade Bolt


6T3237

⚠ WARNING

TO AVOID SERIOUS INJURY AND DEATH FROM THROWN OBJECTS:

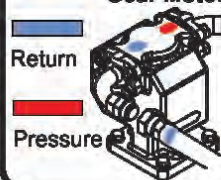
- MAKE CERTAIN blades rotate the correct direction.

BLADE ROTATION



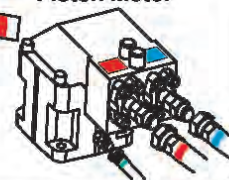
D619

Gear Motor



Return
Pressure

Piston Motor



SAFETY

SAFETY

⚠ DANGER



THROWN OBJECTS HAZARD

Mower can throw objects up to 300 feet. TO AVOID SERIOUS INJURY OR DEATH to operator or bystanders:

- CLOSE MOWER DOOR and STOP operating if bystanders or traffic come within 300 feet.
- KEEP door fully closed when cutting grass and weeds.
- OPEN door ONLY to cut large brush. Close door immediately after.
- DO NOT operate with door removed.
- KEEP door in place and in good condition during operation.
- Deflectors are SUBJECT TO WEAR. Replace if worn or damaged.
- ALWAYS transport with door closed.

33224

ENTANGLEMENT HAZARD



- STAY AWAY and KEEP hands, feet and body AWAY from rotating blades, drivelines and parts that continue to move after power shut-off. WAIT until all moving elements have stopped.
- STOP, LOOK and LISTEN for rotating motion before approaching implement.

SAFETY

SAFETY

**WARNING**

**Non-genuine parts can fail catastrophically.
TO AVOID SERIOUS INJURY OR DEATH:**

- **ONLY** use genuine TIGER replacement parts.
- Non-genuine parts can fail creating hazardous conditions for operator and bystanders.

Contact local dealer or TIGER about repair parts at:

3301 N. LOUISE AVE.,
SIOUX FALLS, SD 57107 www.algqr.com/tpm
Customer Service: 800-843-6849.
Email: feedback@tiger-mowers.com 32709 1




IMPORTANT

**BE AWARE
BE ALERT
BE ALIVE** **BE TRAINED
Before Operating this Mower**

To prevent serious injury to yourself and/or bystanders, be trained in Safe Mowing Practices. Alamo Group Companies as well as AEM and FEMA provide training material that is critical for your Safety and the Safety of others when operating this equipment. www.algqr.com/tbv

Make these Safety Procedures an important part of every workday. Read and understand the Operator's Manual. Do not let untrained individuals operate this equipment. Contact your Dealer, AEM (www.aem.org), FEMA (314-878-2304, www.FarmEquip.org), or Alamo Group (www.Alamo-Group.com) for information on training material or courses that provide training in Safer Operating Practices for Mowers. 32709 2 32709



SAFETY



SAFETY

Federal Laws and Regulations

This section is intended to explain in broad terms the concept and effect of federal laws and regulations concerning employer and employee equipment operators. This section is not intended as a legal interpretation of the law and should not be considered as such.

Employer-Employee Operator Regulations

U.S. Public Law 91-596 (The Williams-Steiger Occupational and Health Act of 1970) OSHA

This Act Seeks:

"...to assure so far as possible every working man and woman in the nation safe and healthful working conditions and to preserve our human resources..."

DUTIES

Sec. 5 (a) Each employer-

- (1) shall furnish to each of his employees employment and a place of employment which are free from recognized hazards that are causing or are likely to cause death or serious physical harm to his employees;
- (2) shall comply with occupational safety and health standards promulgated under this Act.
- (b) Each employee shall comply with occupational safety and health standards and all rules, regulations and orders issued pursuant to this Act which are applicable to his own actions and conduct.

OSHA Training Requirements

Title 29, Code of Federal Regulations Part 1928.57(a)(6). www.osha.gov

Operator instructions. At the time of initial assignment and at least annually thereafter, the employer shall instruct every employee who operates an agricultural tractor and implements in the safe operating practices and servicing of equipment with which they are or will be involved, and of any other practices dictated by the work environment.

Keep all guards in place when the machine is in operation;

Permit no riders on equipment

Stop engine, disconnect the power source, and wait for all machine movement to stop before servicing, adjusting, cleaning or unclogging the equipment, except where the machine must be running to be properly serviced or maintained, in which case the employer shall instruct employees as to all steps and procedures which are necessary to safely service or maintain the equipment.

Make sure everyone is clear of machinery before starting the engine, engaging power, or operating the machine.

Employer Responsibilities:

To ensure employee safety during Tractor and Implement operation, it is the employer's responsibility to:

1. Train the employee in the proper and safe operation of the Tractor and Implement.
2. Require that the employee read and fully understand the Tractor and Implement Operator's manual.
3. Permit only qualified and properly trained employees to operate the Tractor and Implement.
4. Maintain the Tractor and Implement in a safe operational condition and maintain all shields and guards on the equipment.
5. Ensure the Tractor is equipped with a functional ROPS and seat belt and require that the employee operator securely fasten the safety belt and operate with the ROPS in the raised position at all times.
6. Forbid the employee operator to carry additional riders on the Tractor or Implement.
7. Provide the required tools to maintain the Tractor and Implement in a good safe working condition and provide the necessary support devices to secure the equipment safely while performing repairs and service.
8. Require that the employee operator stop operation if bystanders or passersby come within 300 feet.

Child Labor Under 16 Years of Age

Some regulations specify that no one under the age of 16 may operate power machinery. It is your responsibility to know what these regulations are in your own area or situation. (Refer to U.S. Dept. of Labor, Employment Standard Administration, Wage & Home Division, Child Labor Bulletin #102.)

B<`HG*`%I`H(:`&K8`!`69B; 5 @

5 GG9 A 6 @ MG9 7 HCB

5 GG9 A 6 @M

6 YZfY'UHya dh]b['hc'a ci bhñci f' H][Yf'a ck Yfž]h]g']a dcfhUbh
hc'fYUX'UbX'i bXYfghUbX' U``cZ Ĥ Y' gUZYmia YggU[Yg']b'Ĥ Y'GUZYm
GYW]cb'cZH]g'a Ubi U"

Check complete shipment list against the packing list to make sure there are no shortages. Make certain the tractor model is the appropriate one for the mower received!



Always use a floor jack, hoist or fork lift to lift and raise heavy parts.

Read and understand the entire Assembly Section instructions before attempting to mount your Tiger mower. Refer to the Parts Section of this manual for detailed illustrations to locate all parts. (ASM-C-0001)

HF 5 7 HCF 'DF 9 D5 F 5 HCB

- A. Remove right and left hand steps.
- B. Disconnect battery cables from both batteries.
- C. Remove engine side panels, or raise hood to access front pulley.
- D. Remove plugs from tractor casting where mainframe and pump mount will be attached.
- E. Remove any front weights and weight supports.
- F. Raise the tractor onto jack-stands and remove the right and left rear wheels.

(ASM-C-0024)

7 F 5 B? G<5 : H'5 8 5 DH9F

If necessary, remove the four capscrews from the crankshaft pulley. Then install the crankshaft adapter to the pulley with capscrews and lockwashers as shown in the Parts Section.

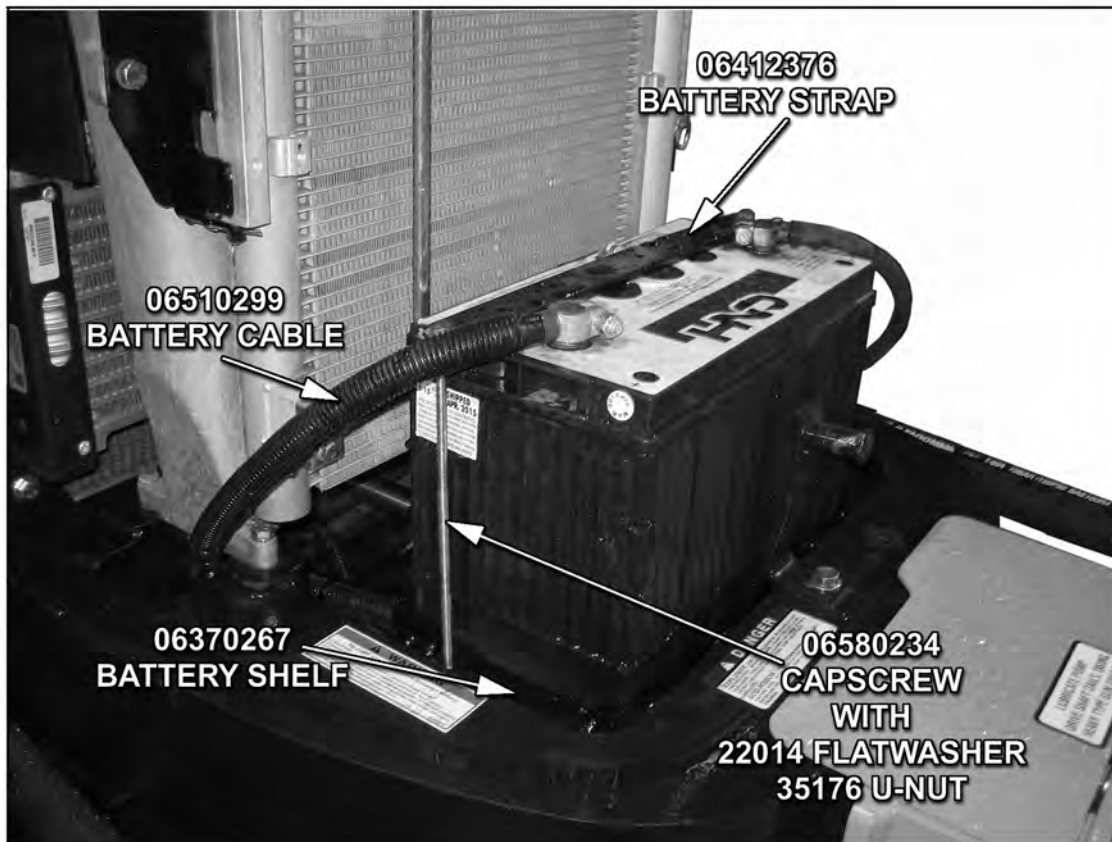
(ASM-NH-0050)



HG* '0/L'H(: '6 5 HH9 F MF 9 @C7 5 H-CB

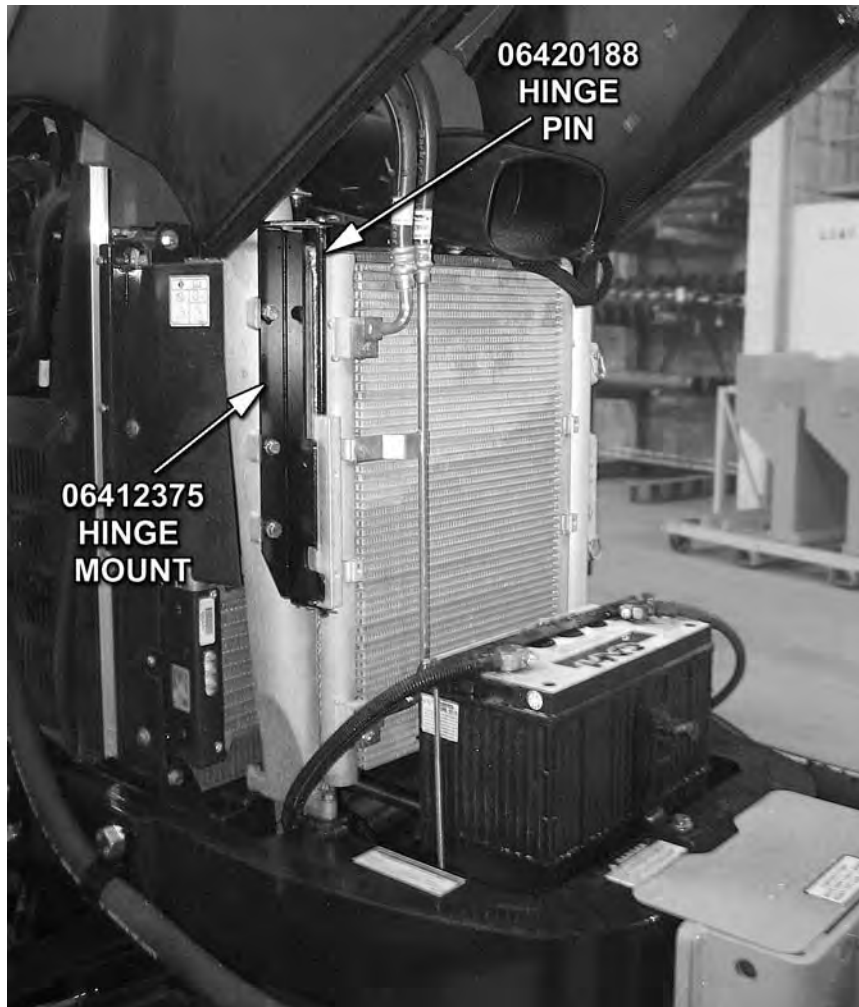
Installation of the pump driveshaft requires that the battery be raised to allow the driveshaft to pass beneath it from the crankshaft adapter to the pump. Disconnect and remove the battery from the well in the front of the tractor. Place the battery relocation assembly #06370267 in the battery well and secure through the bottom of the tractor casting as shown in the Parts Section. Run capscrew #21332 through the hole in the rear of the bottom level of relocation assembly #06370267 using insulated washers #06510260 above and below. Run new battery cable #06510299 from positive post on battery to capscrew. Connect new positive battery post to cap-screw. Connect the existing positive battery cable to the new post. Use the battery strap, cap-screws, flatwashers and u-nuts provided to secure the battery to the relocation assembly. See the Battery Relocation page in the Parts Section for more information.

(ASM-NH-152 BATTERY TS6 1xx T4B)



HG* '%LL'H(: '7CC@F<=B; 9'F9D@579A9BH

Installation of the pump driveshaft requires that the hinge on the tractor cooler be replaced to allow the driveshaft to pass beneath it from the crankshaft adapter to the pump. Remove the hinge mount and pin and replace with the Tiger hinge mount (#06412375) and pin (#06420188) provided. (ASM-NH-152 COOLER HINGE TS6 1xx T4B)



: FCBH'DI AD'ACI BH-B;

Install the pump mounting bracket on the front of the tractor with capscrews and washers as shown in the Parts Section illustration. DO NOT tighten fasteners at this time.

Thread the pump driveshaft into the crankshaft adapter. The end with the splines should match up with the coupler.

Slide the splined drive shaft coupler onto the pump driveshaft. Install the pump onto the mounting bracket. NOTE: The shaft is offset to one direction, the pump should be installed with the offset side on top. Install hardware for securing pump to the pump mount, DO NOT tighten.

Align pump so that splined coupling can be moved back and forth by hand. Tighten pump mounting bolts in succession, rechecking for spline coupling movement. Remove the pump mounting bracket bolts one at a time and apply a thread locking agent. Tighten these bolts in succession, again checking for free movement in the driveshaft. After all bolts are torqued, the end play on the driveshaft should be 1/16" to 1/8", and the coupler should move freely with hand pressure. If end play is less than 1/16", grind the end of the shaft to achieve the proper end play. If there is more than 1/4" of end play, return the shaft with specifications for a longer shaft.

7 5 I HCB. 8 C' BCH'GH5 FH'H<9 HF57 HCF' I BH-@5 @@<CG9G'5 F9'5 H57 <98 ZH5 B? -G': -@@8 'K H<'DF CD9 F'C=@5 B8 '65 @@J5 @9G'5 F9'CD9B''''GH5 FH-B; '5H'H<-G'H-A9 K=@@7 5 I G9'G9F-CI G'8 5 A5; 9'HC'H<9'DI AD" (ASM-NH-0024)

58>I GH-B; 'F95 F'K <99 @G

Raise rear of tractor onto jack-stands. : c``ck 'H Y']bgf i W]cbg']b' H Y'fUWcf' ck bYf@a Ubi U'Zcf'UX'1 gh]b['HfYg'UbX'f]a g'to 72" center for side mounted mowers and 79.8" for boom mowers. NOTE: This may require switching the wheels to opposite sides of tractor. Also take note of any width restrictions when transporting by trailer. (For ease of installation, it is best to leave the rear wheels removed during installation of the mower.) (ASM-NH-0051)



DC @M 7 5 F 6 CB5H9 'G5 : 9HMK -B8 CK

NOTE: Installing a boom mower requires that all of the right side windows be replaced, or protected with a polycarbonate window. This should be done before mounting the mainframe.

1. Disconnect gas shock at door. Remove the right side cab door/window glass from tractor cab by removing hinge pins. Also, remove rear right side window.
2. Remove the existing hardware, door handle and bar handle and discard factory glass door and window.
3. Place small bead of adhesive seal in the bottom of the trim lock bubble seal.
4. Install trim lock bubble seal on polycarbonate starting at the center bottom horizontal portion.
5. Install existing hardware removed from glass door and window on the polycarbonate.
6. Install the polycarbonate assembly in the cab with existing and supplied hardware as shown in the Parts Section.
7. Assemble corner bracket to the control stand inside the cab.
8. Locate and drill a Ø1/4" hole through polycarbonate, with a bit that is **cb`mused** for polycarbonate, to match the corner bracket.
9. Assemble the bracket and tighten the hardware to secure the polycarbonate.
10. Assemble the clamp in the upper front corner by the mirror.
11. Adjust the clamp to achieve a secure hold.
12. Replace the rear corner window with the hardware removed from the window.

(ASM-NH-0101)



INSIDE
VIEW



5 GG9 A 6 @M



5 GG9 A 6 @M

>CMGH7 ? 'GK #H7 <6 CL 'A CI BH-B;

The switchbox is to be secured to the joystick/switchbox stand. Refer to the Parts Section for assembly and components needed. (ASM-NH-0137 TS6 1XX T4B)



5 GG9 A 6 @M

GK #17 <6 CL 'K F B;

Power and ground are pulled from the tractor's accessory socket using the keyed hot wire on the supplied plug for power and the black wire for ground. Use a test light to verify whether the red or orange wire is the hot wire (hot when key is in the "on" position).

The switchbox is to be secured to the cable control bracket as shown in the Parts Section.

(ASM-NH-0121 TS6 1XX T4B)



5 GG9 A 6 @M

B< 'HG* '0/I 'H(6 'GK 5 M6 5 F '5 F A G

The sway bar arms on the TS6.1xx T4B need to be repositioned. The sway bar anchor should be rotated 180° on its longitudinal axis to place the pin stowage tang outboard. (ASM-NH
TS6 130 SWAY BAR ARMS



5 GG9 A 6 @M

@ H'J5 @J9 'ACI BH-B;

The lift valve mounting bracket and plate will be mounted on legs secured to the rear of the axle braces. See the Parts Section for details on mounting information and hardware used.

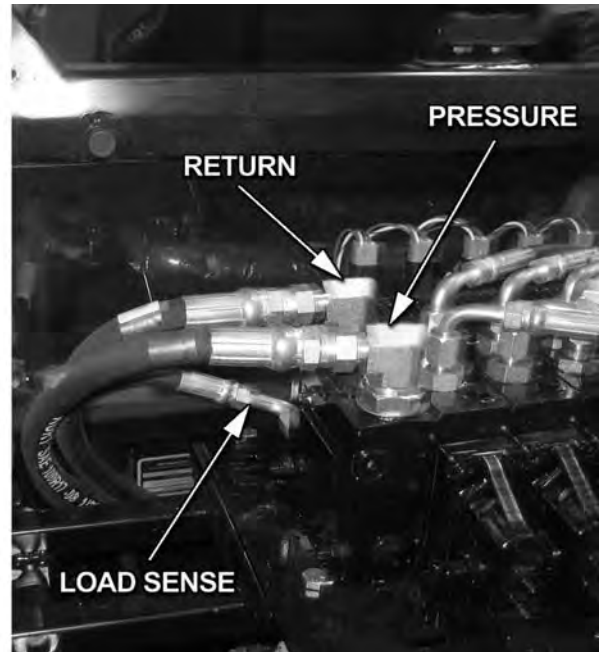
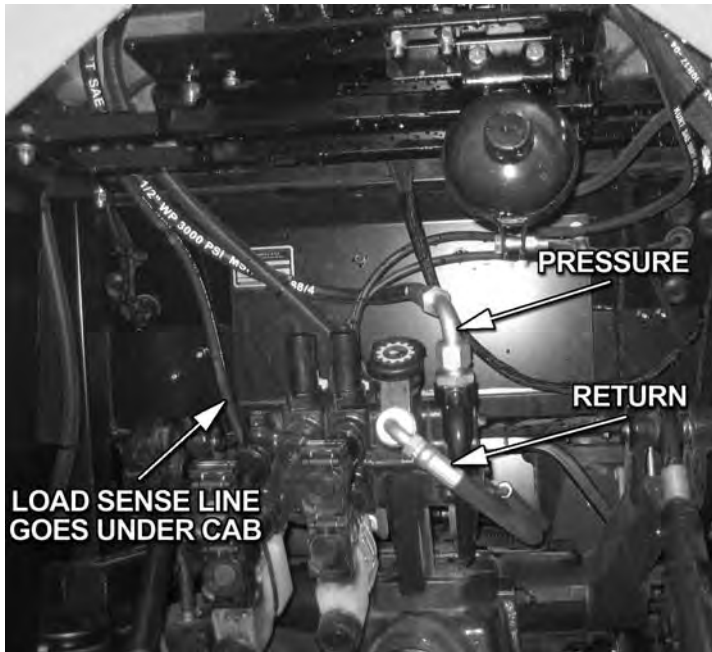
(ASM-NH-0066 NH T6 1XX T4F)



5 GG9 A 6 @M

<CG9 FCI HB;

The lift valve uses the tractor's pressure, return and load sense ports. The pressure and return ports are located at the rear of the tractor, below the installed lift valve mount. The load sense port is located beneath the tractor cab. (ASM-NH TS6 1XX T4F HOSE ROUTING)



: =@B; ' <M8 F5I @7 F9G9FJC=F

Refer to the Maintenance Section for filling specifications and hydraulic oil requirements.

BCH9. GHFhb['cf'fi bb]b['mci f'H][Yf' a ck Yf' VYZfY'Z''b['fYgYfj c]f'k]''WU gY gYf]ci g'XUa U[Y'lc'h Y\ mXfU 'jWdi a d"

(ASM-C-0004hydro resrv)

=BGH5 @B; 'C!F=B; ': =HHB; G

Installing straight, 45° and 90° O-rings requires that the O-ring and washer be up against the swivel body. Insert the swivel and turn in until the swivel is pointed in the desired direction and O-ring contact is made. Hold swivel in set direction with a wrench and turn the O-ring nut away from the swivel body and carefully tighten. (ASM-C-0056)

=BGH5 @B; 'B5HCB5 @D=D9': =HHB; G

Whenever installing a pipe fitting, wrap the threads clockwise (looking at the end) with teflon tape. In this way, the tape will be tightened when installed. NOTE: It is not necessary to tape O-ring fittings, or those installed in swivels. (ASM-C-0088)



5 GG9 A 6 @M

; 9B9F5 @<CG9`BGH5 @a@5HCB

Refer to the Parts Section for detailed information about hoses and fittings for this application. (ASM-C-0011)

DF9: CFA98`HI 69`BGH5 @a@5HCB

Lay booms on floor so that the side with the clamp plates is up. Locate all tube clamps and install them loosely onto the clamp plates.

Arrange the tubes and hoses as outlined in the Common Parts Section. Install the tubes closest to the boom arm first, being careful not to pinch the tubes. Place the other tubes outside of the first tubes. Snug all clamp bolts, but do not tighten. Check all tubes for correct alignment and that none are pinched or bent. The clamp bolts can now be tightened. (ASM-C-0085)

577I AI @5HCF`BGH5 @a@5HCB

Install the accumulator bracket on the right mainframe mast or lift valve mount, if applicable, with the capscrews, lockwashers and spacers, if applicable, as shown in the Parts Section. Install the accumulator in the bracket and secure with the hardware shown. Install fittings and hoses to the cylinder and control valve as shown in the Parts Section. I gY`HYZcb`HddY`cb`U`
d]dY`Z]h]b[g`fM Wd]C!f]b[gk" (ASM-C-0012)

GC @9BC=8`6F5?9`J5 @9

Install a solenoid valve on the mounting bracket with the supplied hardware as shown in the Parts Section in this manual. While installing the fittings to the brake valve, the electrical coil on the spool may have to be removed to make room. When reinstalling the coil, it is important to use no more than 5 ft. lbs. (or 60in. lbs.) torque. K5FB=B; .`CJ9F`HCFEI 9`HC`H<9`7C=@
K=@@F9GI @H`B`<M8F5I @7`5=@F9`C: `GDCC@ (ASM-C-0025)



5 GG9 A 6 @M

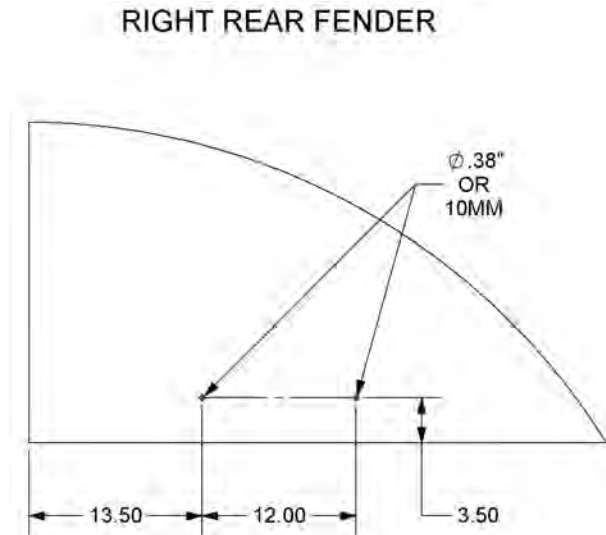
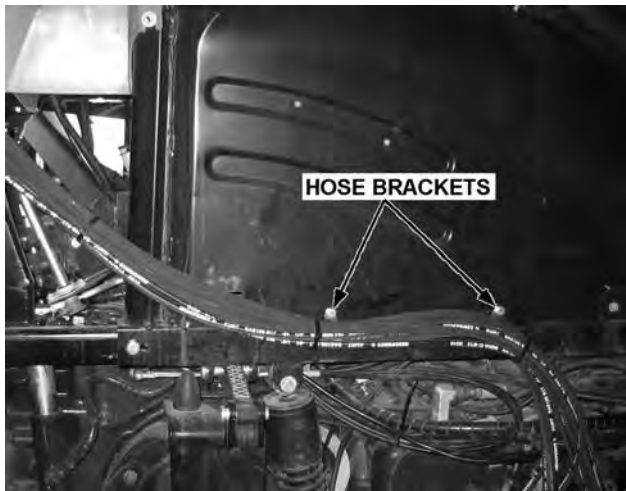
@ H'J5 @9' < CG9' 5 B8' 7 5 6 @ FCI HB;

Attach two clamps to the right rear wheel well for proper hose/cable routing. Drill one hole for each clamp. Use the lower rear corner of the wheel well as an origin for measuring. The holes should be Ø10mm or Ø3/8" reamed to accept 3/8" hardware.

Measure from the back edge of the wheel well 13-1/2" from the origin. Use a square to measure 3-1/2" up. Refer to the images below to see the first hole placement.

The second hole should run parallel to the bottom edge of the wheel well. Mark the hole 12" from the first hole and 3-1/2" from the bottom edge. Use the images below for reference.

BCH9. 8 C' BCH7I H-BHC' HI 6 9 G' # < CG9 G' # K F 9 G' K < 9 B' 8 F = @ @ B; ' H < FCI ; < ' A 9 H 5 @
..... CF' D @ GH7°



Place as many hoses in the clamp as will fit without compromising pressure. Then secure the (2) HOSE CLAMP (06520013) to the holes drilled with (1 EACH) CAPSCREW, 3/8" X 1", NC (21630) and (1 EACH) NYLOCK NUT, 3/8", NC (21627). The hoses that don't fit into the clamp are to be secured to the others with zip ties. For protection of hoses in contact with metal edges, wrap hoses with split hose sections and fasten with hose clamps or zip ties as needed.

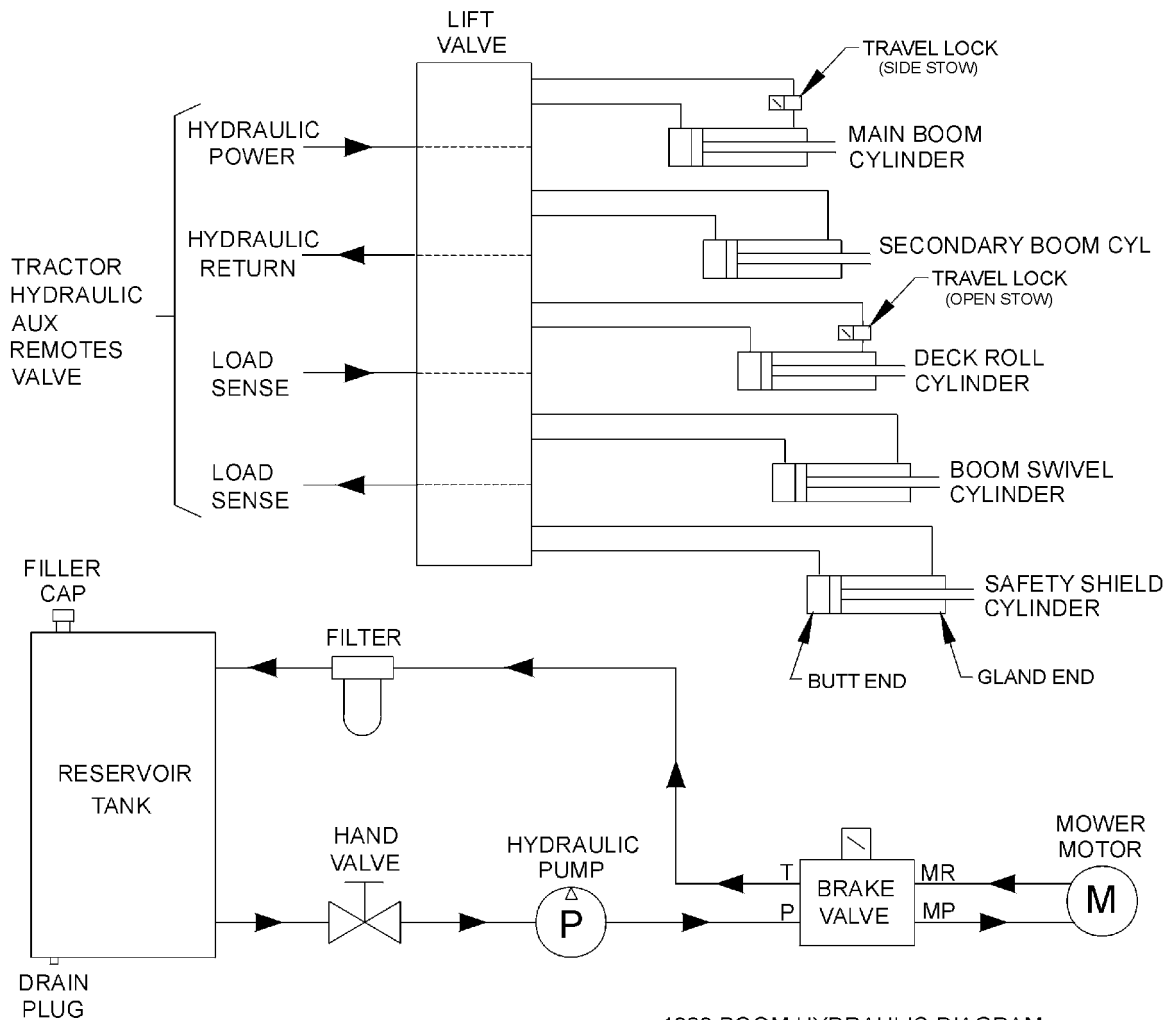
(ASM-NH-0067)



5 GG9 A 6 @M

(ASM-C-0023)

BOOM HYDRAULIC DIAGRAM



K <99 @K 9 @@<M8 F 5 I @7 'H5 B? 'BGF5 @5HCB

Install all fittings and tubes into tank and tank filter as shown in the Parts Section illustration. Insert tank sight glass onto the tractor side of the tank.

Place the tank in the mounting bracket on the axle brace as shown in the Parts Section. Secure the tank with the hardware provided.

Install the filter gauge into the filter housing so that it points to the rear of the tractor and is clearly visible to the operator. The tank breather cap is ready for use as the tank is filled. Some of these items may already be installed. (ASM-C-0103)



5 GG9 A6 @M

H9AD9F5HI F9 ; 5I ; 9'ACI BH-B; (OPTIONAL)

Mount the temperature gauge where it is clearly visible to the operator. Attach the green (-) wire from the negative post on the gauge to a grounded bolt on the tractor frame. Remove paint if needed to make a good ground. Remove the pipe plug from the side of the hydraulic reservoir and install the temperature sensor using thread sealing tape. Run the white wire from the (s) sensor post of the gauge to the temperature sensor on the hydraulic reservoir tank. (ASM-C-0051)

K <99 @K 9= <H'ACI BH-B;

For all tractors using a boom mower, a wheel weight will be required for the rear left side wheel. It will be necessary to mount the weight in the wheel using the long capscrews, lockwashers, flatwashers, spacers (if applicable), and hex nuts per the diagram in the Parts Section.

Installation is most easily done with a fork lift, inserting a fork in the center slot of the wheel weight. The head of the capscrews is to be toward the OUTSIDE of the weight, with flatwashers on both the inside and outside of the assembly.

The left rear tire may also be filled with a mixture of water and calcium chloride at about five pounds per gallon. Tire air pressure should be maintained according to the Maintenance Section. (ASM-C-0055)

GK =J9 @6 F57 ?9H'ACI BH-B;

Install the boom swivel bracket onto the mainframe with the swivel pin. Secure the pin in place using the capscrews, etc. through the hole in the boss and pin. NOTE: The head of the capscREW must be toward the front of the tractor.

Install all new swivels and fittings on the swing cylinder with swivel openings facing each other. Fittings will vary in type and direction depending on your application; refer to the Parts Section for more details.

Install bearings in the mainframe anchor for the swing cylinder. This may have already been done for you.

Install the swing cylinder between the boom mounting bracket cylinder anchor and the boom swivel with the pins. Insert roll pins through the top and the bottom hole in the pins.

Attach hoses from the control valve to the swing cylinder. (ASM-C-0015)

A5 -B'6 CCA -BGH5 @@5H-CB

Using a hoist, install the boom swivel into the mainframe as shown in the Parts Section. Line up holes in swivel and mainframe for large swivel pin and insert pin. Secure with hardware as shown.

Attach the inner end of the main boom to the swivel bracket with the cylinder anchors positioned upward, and at a right angle to the tractor. Secure it with the horizontal hinge pin. Secure the hinge pin in the boss with capscrews, etc. (see Parts Section).

Attach the butt end of the main boom cylinder to the swivel with the cylinder pin and roll pins shown in the Parts Section.

Install the travel lock on the rod end of the main boom cylinder. This should be facing the butt end of the cylinder after installation.

Install the fittings and hoses to the main boom cylinder per Parts Section.

; F95 G9 <-B; 9'D-B'N9F?G'CB'6 CCA'5: H9F' 5 GG9 A6 @M CB79'I B89F' @C58'K -K'6 CCA 9 @J5H98 Z5 B8'5; 5-B'5H'F9GH'K -K'6 CCA'GI DDCFH98" (ASM-C-0013)



5 GG9 A 6 @M

8 9 7 ? ' 5 H 5 7 < A 9 B H

Attach the head to the secondary boom using the pins and hardware shown in the Parts Section. Install the deck pivot cylinder using the pins and hardware also shown in the Parts Section.

Connect the fittings and hoses from the pivot cylinder to the small hoses or preformed tubes on the boom arm. Connect the fittings and hoses from the motor to the large hoses or preformed tubes on the boom arm. If attaching a rotary mower make sure that the hose with the red stripe sticker is attached to the motor pressure port which is marked with a red dot sticker.

Connect all remaining hoses from the control valve to the cylinders and/or hoses or preformed tubes on the boom arm. (ASM-C-0086)

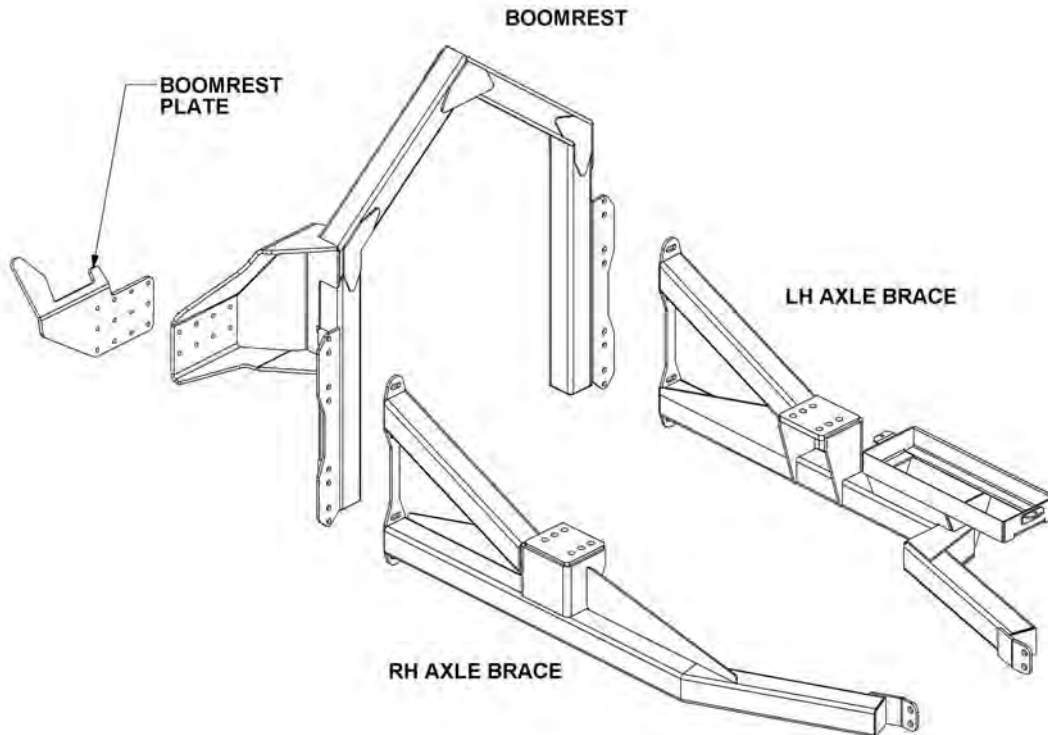
< C G 9 ' 7 C J 9 F - B ;

Secure hoses together with zip ties wherever loose. Wrap the hoses between the main boom and secondary boom with the hose cover provided. Wrap the hoses between the brake valve and the main boom with the hose cover provided. Wrap the hoses between the deck attachment and the secondary boom with the hose cover provided. Where hoses may contact the frame or other edges, wrap with split hose and secure with hose clamps or zip ties. On non-cab units, the pressure and return hoses from the control valve will also need to be routed inside the protective hose wrap. Cover the valve, valve fittings with the hose cover and secure with black string provided.. (ASM-C-0087)



CG'5 L @ '6 F579 'ACI BH-B;

The open stow axle braces are to be mounted under the rear axle of the tractor. The other end of the axle brace mounts on the outside of the lower rear corners of the mainframe. After attaching the boomrest, it should fit tightly and level under the tractor. Attach the axle brace(s) to the mainframe with hardware shown in the Parts Section and tighten. Attach the axle braces to the rear axle using the mounting hardware shown in the Parts Section, but DO NOT tighten.



CG'6 CCAF9GH'ACI BH-B;

Carefully raise the open stow boomrest and align the holes with those of the axle brace. Now install all attaching hardware, as shown in the Parts Section, loosely, to allow for the alignment with the left and right axle brace. Tighten / torque all hardware on the brace and the boomrest. Finally, add the boomrest plate to the boomrest as shown in the Parts Section. (ASM-JD-0246)



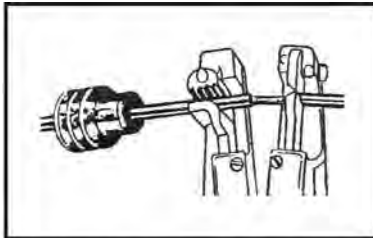
5 GG9 A 6 @M

K 95H<9F!D57 ? `#A9HF≠D57 ? `5 GG9 A 6 @M

These instructions apply to both Weather-Pack and Metri-Pack connectors.

BCH9.1 gY'h YgdYWZWcc`Zf'h YmdYcZWbbYWcf'nci 'UfYUggYa V]b["

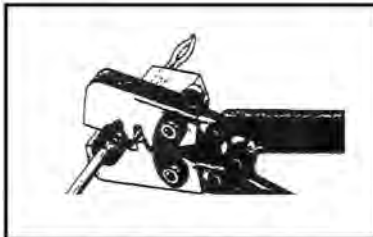
(ASM-C-0009)



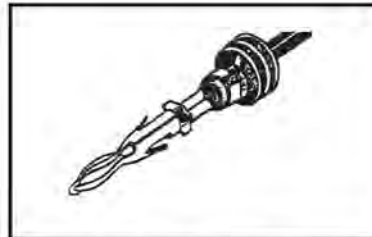
1. Apply seal to cable, before stripping insulation.



2. Align seal with cable insulation.



3. Put terminal in crimping tool, then position wire and seal in place.

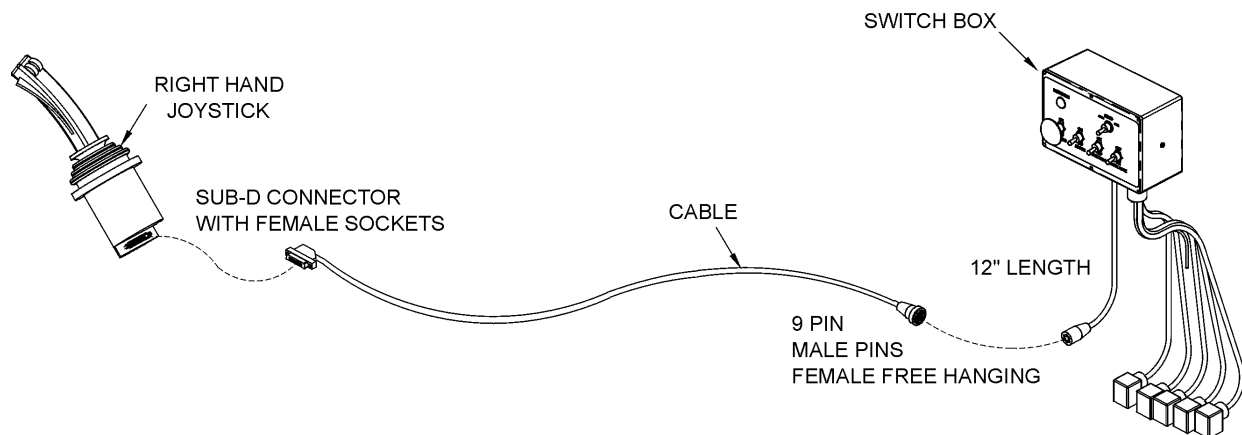


4. Crimp and visually inspect for a good crimp before installing in connector body.



6 CCA >CMGH ? '7 CBHF C @7 5 @6 F 5H CB

GI 6!8



This Electronic control valve is now equipped with higher-resolution actuators on Main Boom, Secondary Boom, Deck Roll, and Swivel functions. These actuators have active fault monitoring. The Deck Shield section does not have active fault monitoring. The joystick is unchanged and provides a ratio-metric voltage signal. The neutral signal voltage is half or 50% of tractor supply voltage. A 25% signal voltage will shift the valve spool to full A-Port, and 75% signal voltage will shift the spool to full B-Port in the Main, Secondary, and Swivel valve sections. On the Deck Roll function a 34% signal voltage will shift the valve spool to full A-Port and a 68% signal voltage will shift the spool to full B-port. If an actuator with active fault monitoring receives a signal from the joystick that is less than 15% or greater than 85% of supply voltage the actuator will “fault out” and shut down. Also, if there is an internal failure in the actuator or if the spool position is greater than that specified by the signal voltage from the joystick, the actuator will “fault out” and shut down. An “active fault” condition causes the actuator to drive the spool to neutral, shut down, and activate a red LED on the top of the actuator. The active fault can be canceled by simply cycling the Master Switch OFF and then ON, which resets the fault monitoring, and causes the LED on top of the actuator to be green again.



The joystick control is equipped with signal adaption potentiometers.

These provide the capability to individually adjust the oil flow to each boom function. It is important that the boom functions do not travel too fast. Excessive boom speed can reduce the stability of the unit and decrease operator control.

Note: Use a Phillips screwdriver and be sure to adjust the screws carefully! DO NOT turn the potentiometers beyond their stopping point, potentiometers are very delicate! Turning the “A” or “B” port potentiometers clockwise increases the oil flow to increase the boom function speed, and turning them counterclockwise decreases the oil flow to decrease the boom function speed. See the graphic on the next few pages for help in adjusting.



6 CCA`>CMGH7 ? `7 CBHFC @7 5 @6 F5HCB`fl CBHBI 98L

Run tractor at normal operating RPM to adjust the settings as follows.

GYHl Y'XYUX`VUbX`Wta dYbgUjcb`dchYbhjca YHf`Zfgh'

Set the dead band compensation potentiometer at 50%, or halfway between full clockwise and full counterclockwise.

GYHjb[`G][bU`5 XUdUjcb`DchYbhjca YHfg.

Disconnect the Deutsch connectors from the actuators of the valve. Use a Volt/Ohm meter to measure signal voltage and adjust the signal adaptation potentiometers as needed. Pin #4 is tractor supply voltage. Pin #1 is signal voltage from the joystick, and pin #3 is ground. First, measure supply voltage between pins 4 and 3. Then measure signal voltage between pins 1 and 3 while indexing the joystick function fully in both the "A" and "B" port direction. Divide the signal voltage by the supply voltage to get signal voltage as a % of supply voltage. This percentage should not be less than 25% or greater than 75% for the Main Boom, Secondary Boom, or Swivel function. This percentage should not be less than 30% or greater than 62% for the Deck Roll function. Note these initial settings for the Deck Roll function should prevent the spool from shifting into float. *After making this first adjustment to deck roll if the spool still goes into float, adjust the "B" port screw additionally counterclockwise.*

Reconnect Deutsch connectors on control cables to actuators on Electronic valve. Run tractor until hydraulic system is at operating temperature. Now refine the adjustments of the signal adaptation potentiometers for both "A" and "B" ports for all proportional functions to achieve the following function times. Note: turning potentiometer clockwise increases the flow or the function speed, and turning them counterclockwise decreases the flow or the function speed. Note, if during this procedure the trim potentiometer is set to full counterclockwise but the function is still too fast, use the mechanical stops at the manual actuator end of the valve section to further limit flow. Turn limit screw in or clockwise to limit flow. The upper limit screw limits flow to B-port, and the lower limit screw limits flow to A-port. However DO NOT adjust the limit screw on B-port of deck roll function. Limiting B-port will prevent float function.



6 CCA >CMGH7 ? 7 CBHF C @7 5 @6 F 5 HCB fl CBHBI 98L

A5-B6 CCA. "A" Port, Boom Up: 8-10 Seconds

(Note: Extend secondary boom completely; roll deck to be level with ground, and lower main boom until deck is on ground. Now index main boom "up" function and determine the time required for main boom to rise completely.)

"B" Port, Boom Down: 6-8 Seconds

(Note: Extend secondary boom completely, roll deck to be level with ground, and raise the main boom to "full up". Then index the main boom "down" function to determine the amount of time required for the deck to contact the ground. CAUTION: Stop the boom just as the deck contacts the ground.)

G97 CB85 FM

6 CCA: "A" Port, Boom Out: 8-10 Seconds

(Position main boom full up, roll deck out until deck cylinder is fully retracted, and bring secondary boom in completely. Then index the secondary boom "out" function and determine the time required for boom to extend out completely.)

"B" Port, Boom In: 8-10 Seconds

(Position the main boom full up, roll deck out until deck cylinder is fully retracted, and extend secondary boom completely. Then index the secondary boom "in" function and determine the time required for boom to come in.)

8 9 7 ? FC @@ "A" Port, Deck Out: 7-9 Seconds

(Raise main boom to vertical, extend secondary boom out slightly so that deck can be articulated without contacting the main boom, and roll deck in until deck cylinder is completely extended. Then index the deck roll "out" function and determine the time required for the deck to roll out.)

"B" Port, Deck In: Target 7-9 Seconds (but DO NOT use Limit Screw)

(Raise main boom to vertical, extend secondary boom out slightly so that deck can be articulated without contacting the main boom, and roll deck out until deck cylinder is completely retracted. Then index the deck roll "in" function and determine the time required for the deck to roll in.)

6 CCA

GK J9 @ "A" Port, Boom Aft: 14-16 Seconds for 3PS, 3OS, SS

(Extend booms completely; rotate head to be level with ground, lower main boom until deck is just above ground, and swivel boom full forward. Then index the boom swivel "aft" function and determine the time required for the boom to swivel full aft. Use caution when doing this, stop boom before main boom contacts tire.)

"B" Port, Boom Forward: 14-16 Seconds for 3PS, 3OS, SS

(Extend booms completely, rotate head to be level with ground, lower main boom until deck is just above ground, and swivel boom aft until near tire. Then index the boom swivel "forward" function and determine the time required for the boom to swivel full forward.)

(ASM-C-0082)



: B5 @DF9 D5 F 5HCB: CF CD9 F 5HCB

Place operator's safety and operation decals on the steering column and side console where they are clearly visible to the operator. These decals should be understood by each operator of the machine in conjunction with the Safety and Operation Sections of this book. The decals are to be maintained in good condition as a reminder to the operator, and should be replaced if damaged.

All bosses, pins and pivot points will need to be greased as instructed in the Maintenance Section of this manual. The hydraulic reservoir can also be filled with the recommended fluid (see Maintenance Section) and the filter installed in the top of the tank. Double check all fittings and fasteners BEFORE starting tractor. Also secure any loose hoses together with zip ties and wrap with split hoses where friction may occur on the hoses.



BEFORE starting or operating the tractor you must read and understand the Safety and Operation Sections of this manual completely.

6 9 GI F 9 H < 9 6 5 @ @ J 5 @ 9 G 5 F 9 CD9 B Start tractor and allow instruments to stabilize. Using a piece of paper or cardboard as noted in the Safety and Maintenance Sections, check all fittings and connections for hydraulic leaks.

If a leak is found, you must shut down the tractor and set the cutter on the ground. Before attempting to fix the leak, you must actuate the lift valve handles several times to relieve any pressure in the lines.

6 YZ f Y c d Y f U h b H Y a c k Y f, the cutter head and boom should be slowly moved throughout the full range of motion. Watch for any condition that would cause pinching or excess stress on the hoses. The steering and front axle travel should also be carefully moved through their full range of motion. If any condition occurs in which the hoses contact the tires, the steering and / or front axle travel may need to be limited as described in the tractor operator's manual. This should also be done if the tires rub, or are extremely close to any other part of the mower, such as the hydraulic tank or draft beam. This may include adding shims or adjusting stop bolts in the tractor front to solve the problem. While checking motion, you should also check that the control circuits are connected according to the operator's decal for the valve handles.

ACK 9 F H 9 G H B;

Take the tractor to a place free of loose objects on the ground. Operate the cylinders through their full range of motion again, to clear the lines of air. Follow the instructions in the Operation Section to operate the mower. Vibration of the mower should be minimal at all times. After a 5 minute test run, the knife bolts should be retorqued, and retorqued once again after the first few hours of operation.

Z U b m i d U f h g c Z H j g 5 g g Y a V m i G Y W j c b Z c f U b m i c H Y f g Y W j c b c Z H j g a U b i U U f Y b c h W Y U f m i b X Y f g l c c X n c i a i g h W c b H W i n c i f X Y U Y f c f H Y U X X f Y g g c b H Y Z c b h c Z H j g a U b i U Z f U g g j g h U b W (ASM-C-0010)



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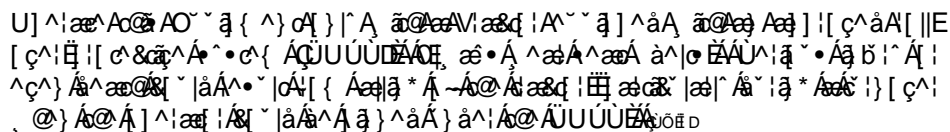
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CD9F5H=B; `BGFH 7H=CBG

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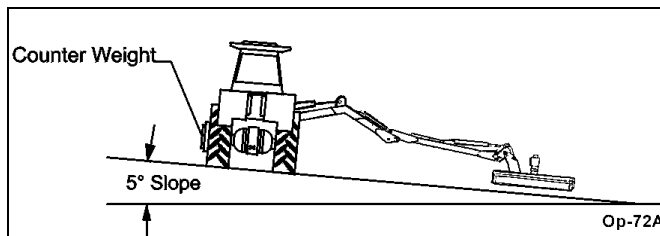
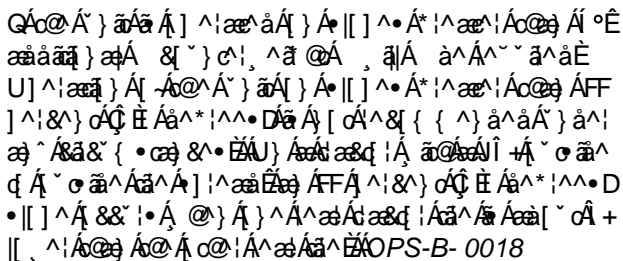


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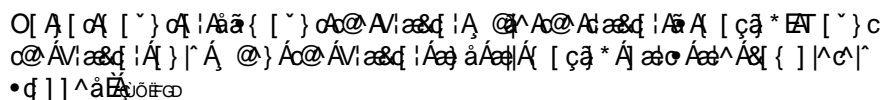
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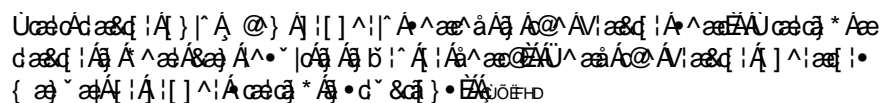
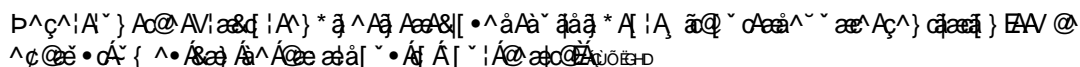
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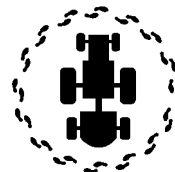
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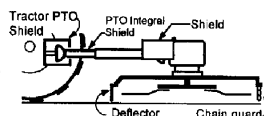
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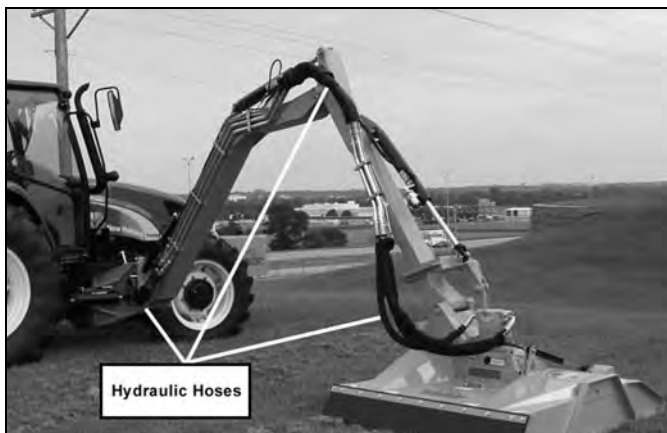
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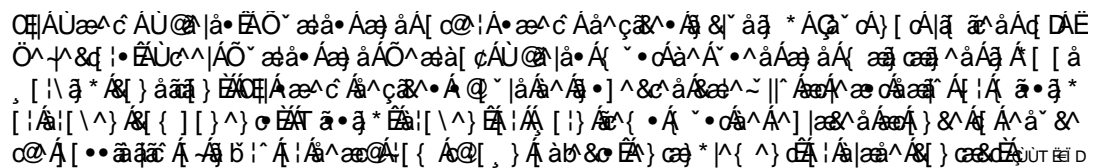
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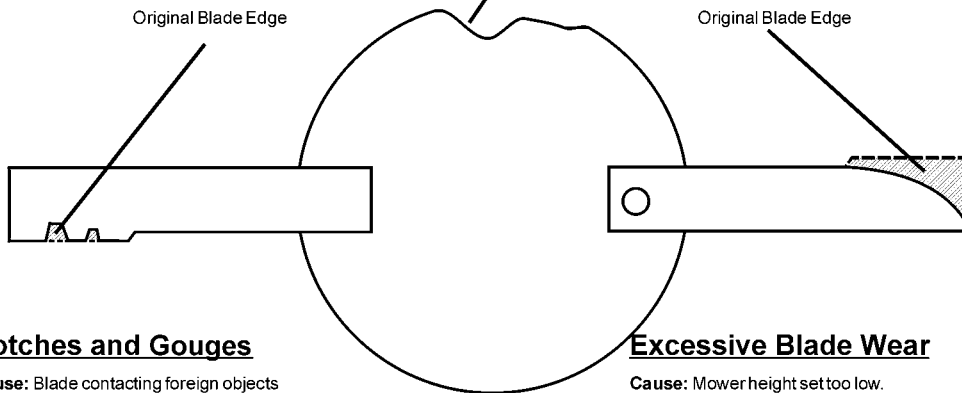
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Cause: Blade Pan contacts an immovable object while mower was in motion.

Original Blade Edge



Cause: Mower height set too low.
Blade used past intended life.

Remedy: Replace blades more often.
Adjust mower height for mowing
Conditions to eliminate blade-to-
ground contact

Op-22

Cause: Blade contacting foreign objects

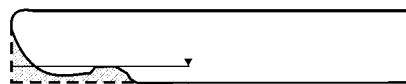
Remedy: Inspect the area to be mowed and remove foreign objects that could cause damage to the blades



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1/2" MAXIMUM
(12.7mm)

Original Blade Edge

NOTE:
Replace Blades in pairs after no more than 1/2" (12.7mm) wear

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Tractor PRE-OPERATION Inspection



Mower ID# _____ Make _____

Date: _____ Shift _____

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Item	Condition at Start of Shift	Specific Comments if not O.K.
The flashing lights function properly		
The SMV Sign is clean and visible		
The tires are in good condition with proper pressure		
The wheel lug bolts are tight		
The tractor brakes are in good condition		
The steering linkage is in good condition		
There are no visible oil leaks		
The hydraulic controls function properly		
The ROPS or ROBS Cab is in good condition		
The seatbelt is in place and in good condition		
The 3-point hitch is in good condition		
The drawbar pins are securely in place		
The PTO master shield is in place		
The engine oil level is full		
The brake fluid level is full		
The power steering fluid level is full		
The fuel level is adequate		
The engine coolant fluid level is full		
The radiator is free of debris		
The air filter is in good condition		

Operator's Signature: _____

DO NOT OPERATE an UNSAFE TRACTOR or MOWER

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Boom PRE-OPERATION Inspection



Mower ID# _____ Make _____

Date: _____ Shift _____



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Table 1:

Item	Condition at Start of Shift	Specific Comments if not O.K.
The Operator's Manual is in the tractor		
All safety decals are in place and legible		
The mounting frame bolts are in place and tight		
The boom connection bolts & pins are tight		
There are no cracks in boom		
The hydraulic cylinders pins are tight		
The hydraulic pump hose connections are tight		
The hydraulic valve controls function properly		
There are no leaking or damaged hoses		
The hydraulic oil level is full		
There is no evidence of hydraulic leaks		
The blades are not chipped, cracked or bent		
The blade bolts are tight		
The deflectors are in place and in good condition		
The boom shields are in place and in good condition		
The skid shoes are in good condition and tight		
There are no cracks or holes in boom deck		
The hydraulic motor mounting bolts are tight		
The boom head spindle housing is tight and lubricated		

Operator's Signature: _____

DO NOT OPERATE an UNSAFE TRACTOR or MOWER

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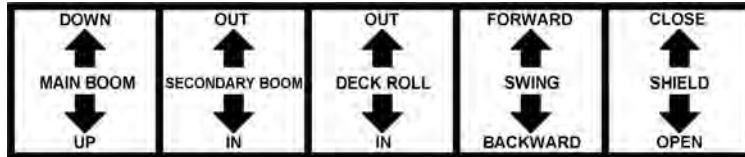
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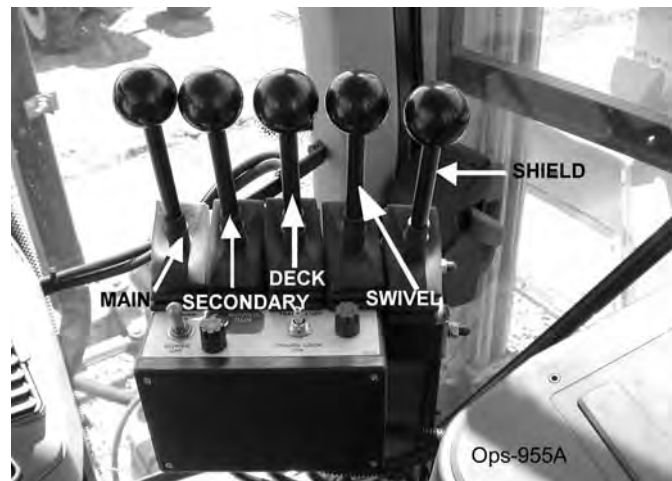
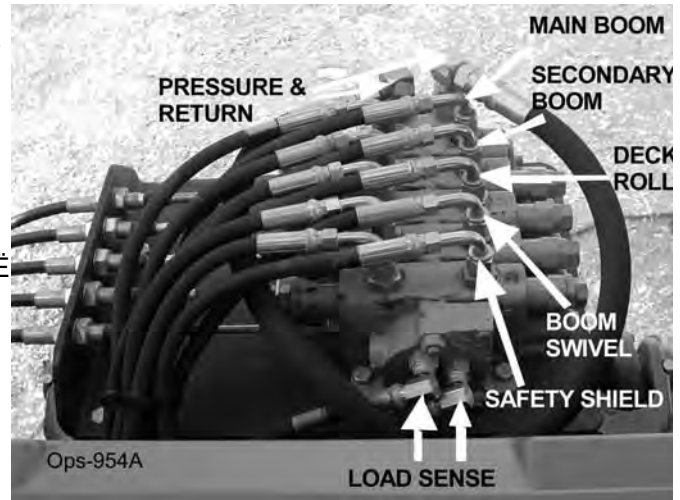
CD9F5HCB

Cable Controlled Mowers

CD9F5HCB is a cable controlled mower. It is designed to be used with a cable controlled mower. The main boom, secondary boom, deck roll, swing, and shield are all controlled by the operator. The main boom is used to move the main cutting deck. The secondary boom is used to move the secondary cutting deck. The deck roll is used to move the deck roll. The swing is used to move the swing. The shield is used to move the shield.



The CD9F5HCB is a cable controlled mower. It is designed to be used with a cable controlled mower. The main boom, secondary boom, deck roll, swing, and shield are all controlled by the operator. The main boom is used to move the main cutting deck. The secondary boom is used to move the secondary cutting deck. The deck roll is used to move the deck roll. The swing is used to move the swing. The shield is used to move the shield.



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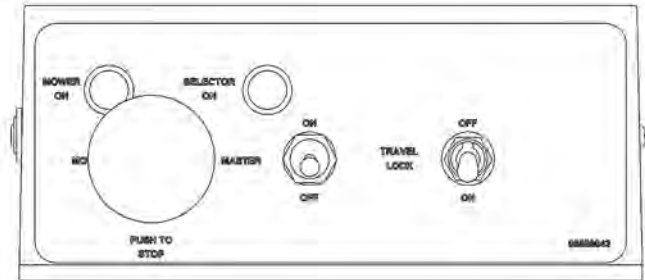
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DANGER

SAFETY SHIELD & DEFLECTOR OPERATION

- Failure to close Safety Shield and Deflector may allow objects to be thrown outward with great force which can cause property damage, bodily injury, or death.

- Keep Safety Shield and Deflector fully closed when cutting grass and weeds to reduce possibility of objects being thrown outward by the Blades if persons are in the area.
- Before Cutting brush, trimming limbs, or other such operations, raise the Deflector and Safety Shield fully to allow the blades to contact the material if area is clear of passerby. Operator must stop cutting and close shield if passerby enters the thrown objects area or blade contact area.
- Repair or replace Safety Shield and Deflectors as needed.
- Always transport with Safety Shield and Deflector closed.

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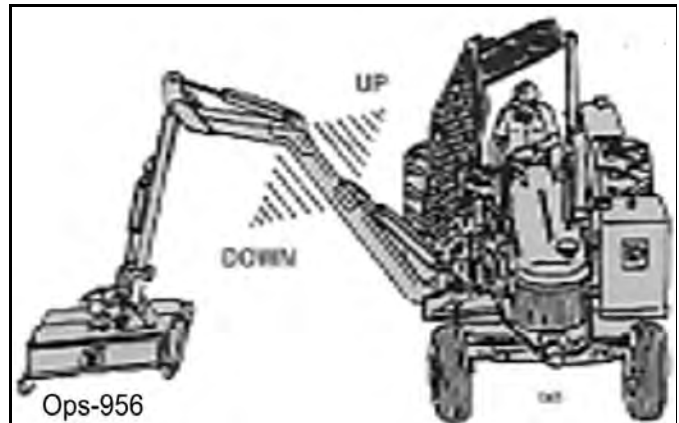
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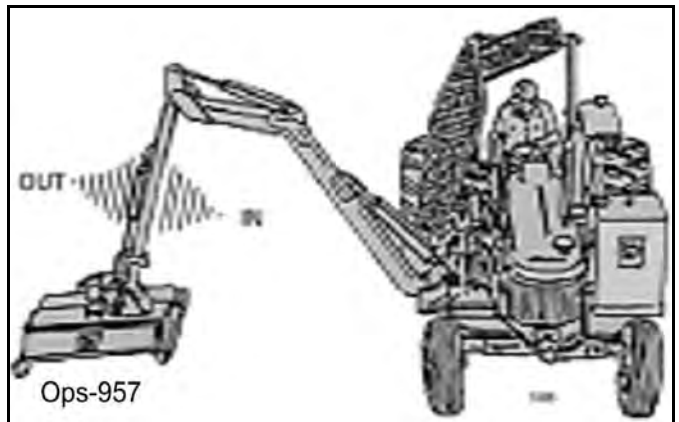
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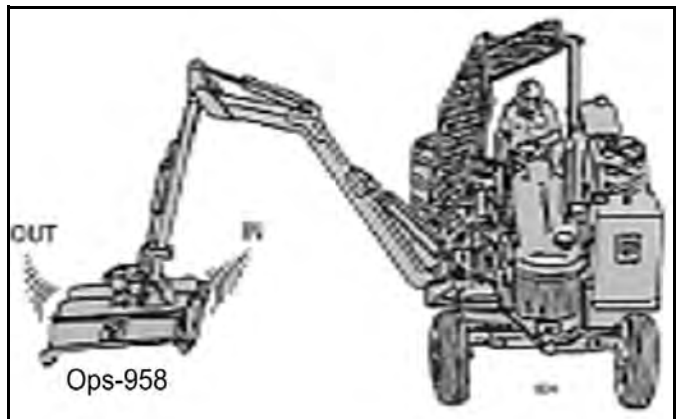
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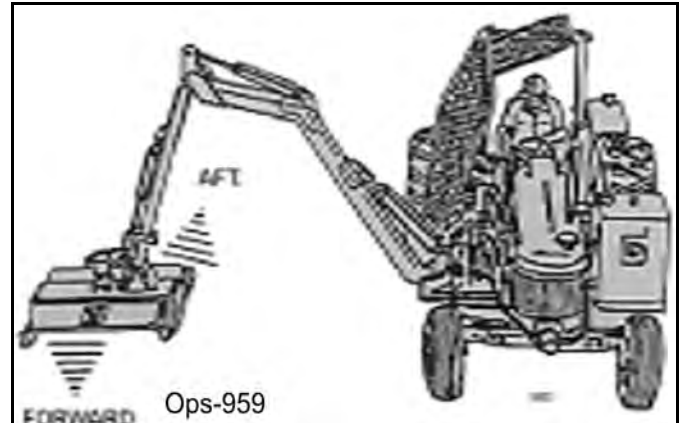


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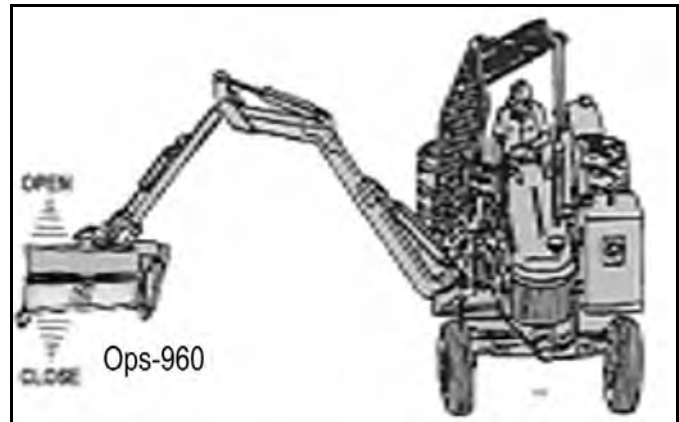
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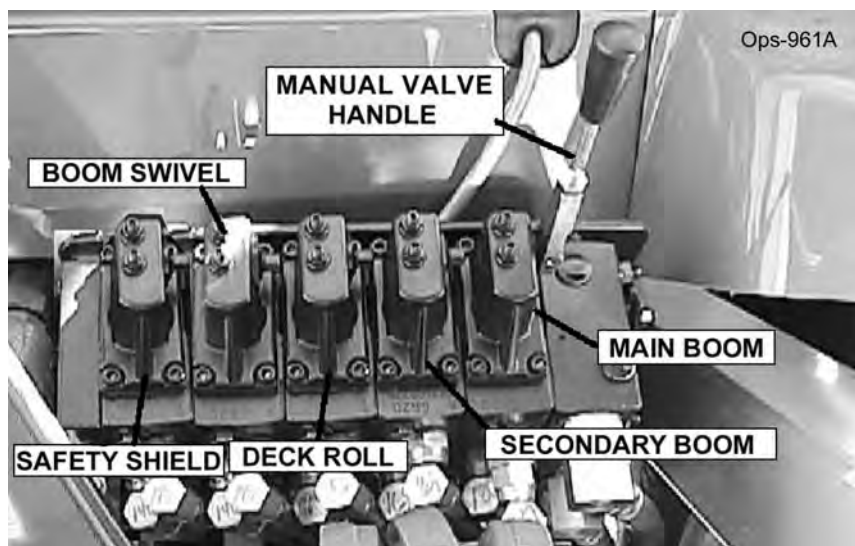
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CAUTION

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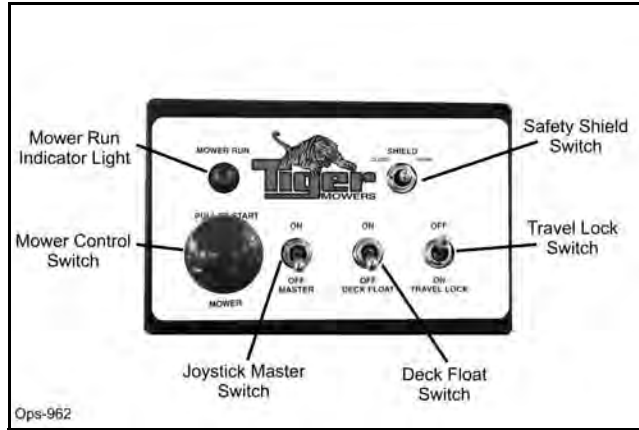
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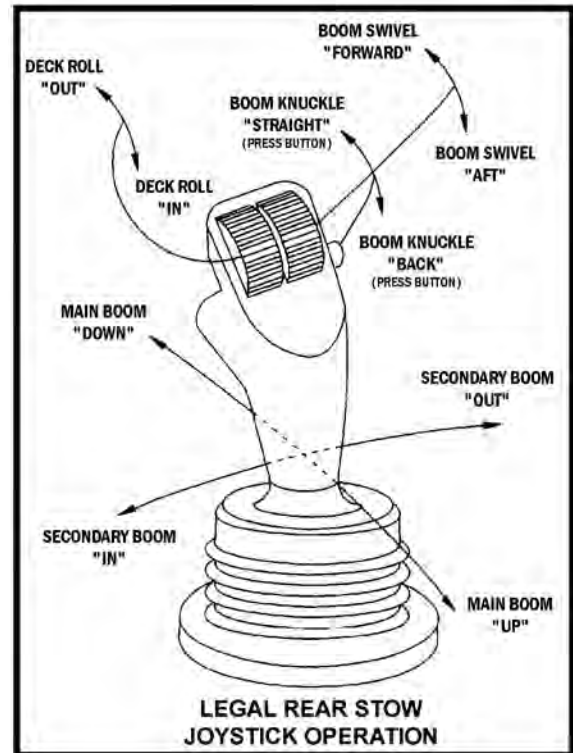
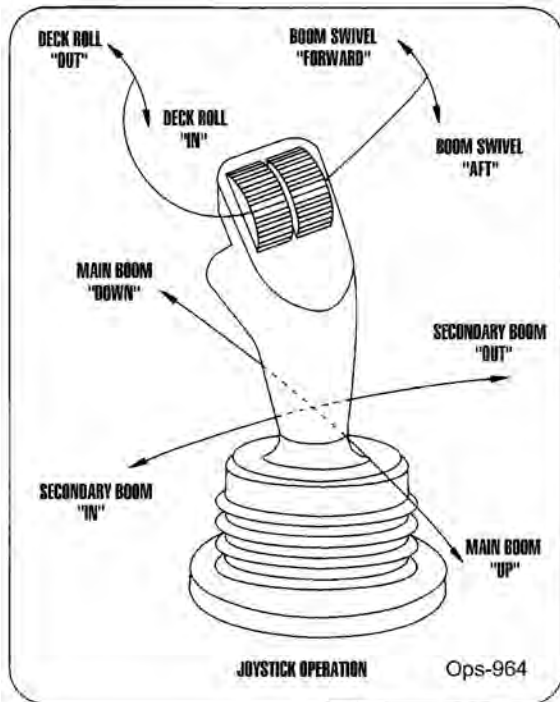
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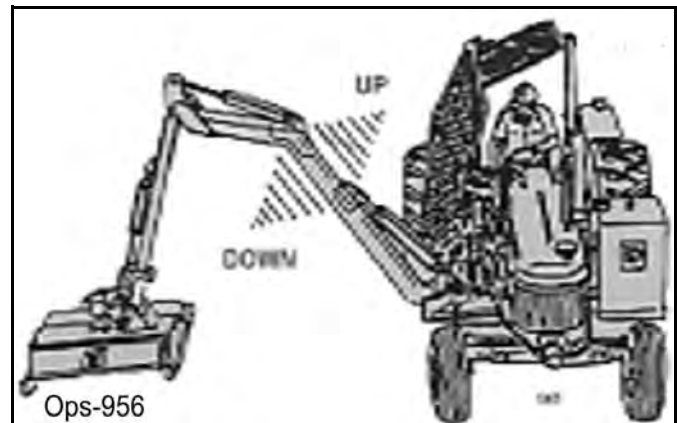
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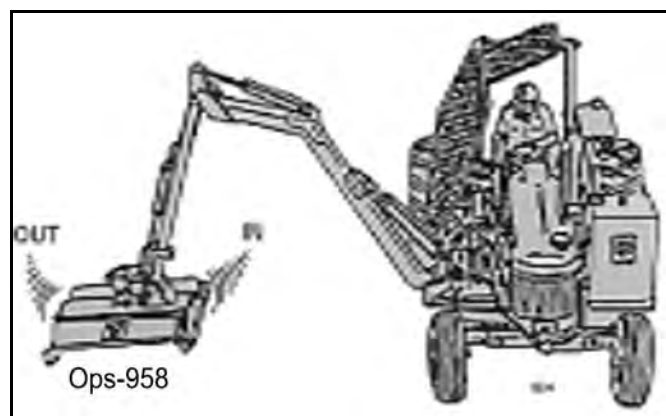


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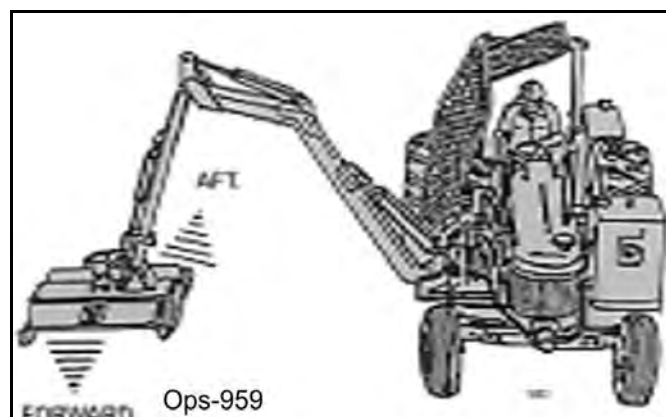
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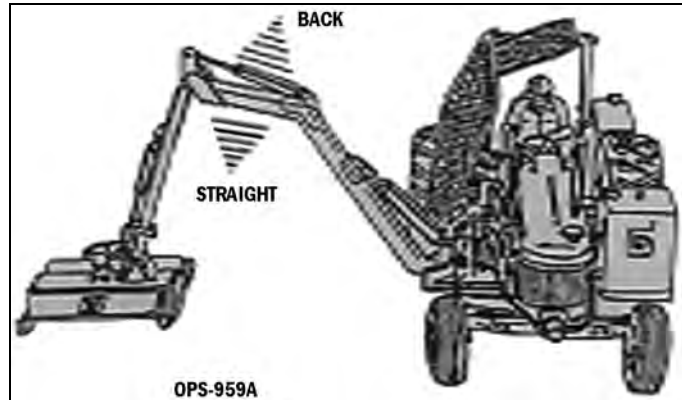
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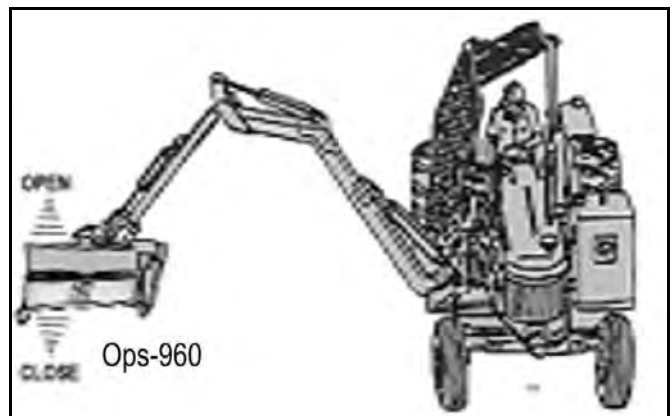
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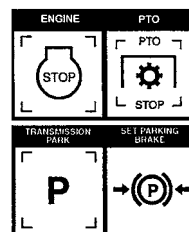
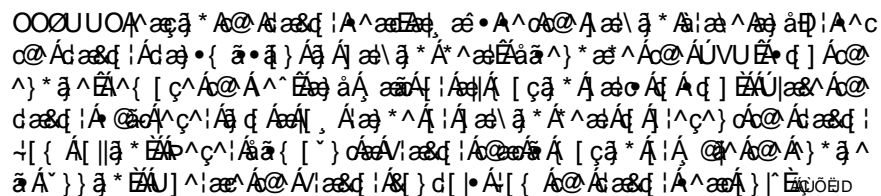
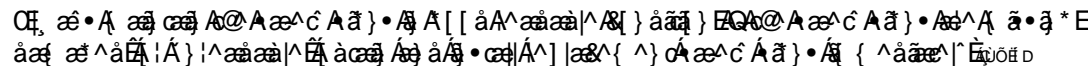
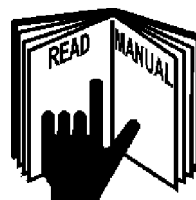
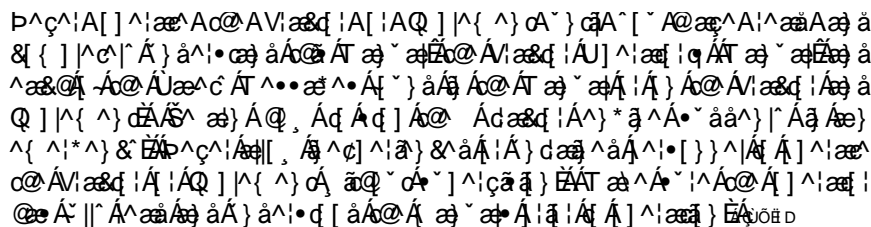
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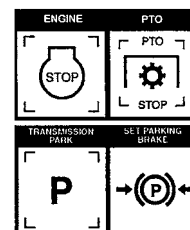


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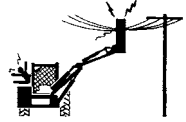


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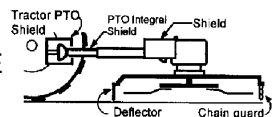
INCORRECT

The cutter deck should be level with the ground to reduce the work required by the cutter and tractor to minimize equipment wear and damage.

Ops-1480

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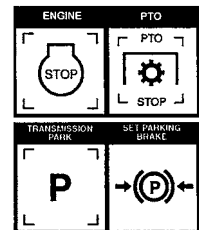
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On-Off Switch

A black and white photograph of a John Deere 8250 tractor. The tractor is shown from a side-front perspective, with its front loader bucket raised and tilted. The John Deere logo is visible on the side of the hood. The tractor is parked on a dirt or gravel surface, with a building and trees in the background.



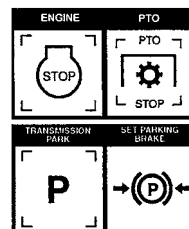
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A black and white photograph of a Case IH 8255 tractor. The tractor is shown from a front-three-quarter view, with its front loader bucket raised and tilted. It has large, deep-tread tires and a prominent front grille with the Case IH logo. The background shows a dirt lot and some trees in the distance.

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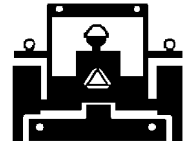
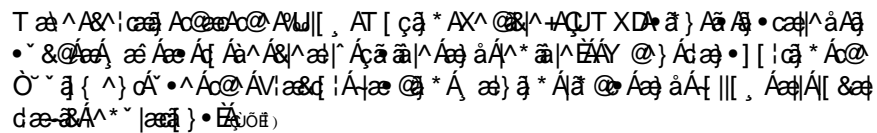
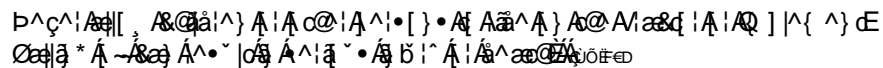
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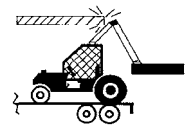
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MAINTENANCE SECTION

Maintenance Section 4-1

MAINTENANCE

MAINTENANCE

General Instructions

Tiger Mowers are designed for high performance and rugged durability, yet with simplified maintenance. The purpose of this section of the manual is to help the operator in the regular servicing of the mower. Regular maintenance at the intervals mentioned will result in the maximum efficiency and long life of the Tiger Mower.

When you purchase a Tiger Mower you also acquire another valuable asset, Tiger's parts organization. Our rapid and efficient service has guaranteed the customer satisfaction for many years. Tiger parts keep up with the demands for efficiency, safety and endurance expected of the Tiger Mower.

Maintenance Precautions

- Be sure end of grease gun and zerks are clean before using. Debris injected into bearings, etc. with grease will cause immediate damage.
- DO NOT use a power grease gun to lubricate bearings. These require very small and exact amounts of lubrication. Refer to the detailed maintenance section for specific lubrication instructions. DO NOT over-grease bearings.
- Lexan windows should be washed with mild soap or detergent and lukewarm water, using a soft clean sponge or soft cloth. DO NOT use abrasive or alkaline cleaners or metal scrapers on lexan windows!
- Be alert to maintenance indicators such as the in-tank filter pressure gauge, hydraulic reservoir sight gauge, etc. Take the required action to correct any problems immediately.
- Release of energy from pressurized systems may cause inadvertent actuation of cylinders, or sudden release of compressed springs. Before disconnecting any hoses, relieve pressure by shutting tractor off, setting cutter on ground and actuating lift valve handles.

WARNING

DO NOT use hands to check for suspected leaks in hydraulic hoses! Hydraulic fluid escaping under pressure can have sufficient force to penetrate skin and cause serious injury. If fluid is injected into skin, it must be surgically removed within a few hours or gangrene may result. Use a small piece of wood or cardboard, not hands, to search for pin hose leaks. Be sure all connections are tight and hoses and lines are not damaged before applying pressure.

Break in Period

In addition to following the break-in instructions for your particular tractor, the in-tank hydraulic fluid filter should be replaced after the first 50 hours of service. Thereafter the filter should be replaced every 500 hours, or yearly, whichever comes first.

Re-torque wheel lugs after first five hours of operation and periodically thereafter. See torque specifications listed in the tractor's service manual for your particular model. **Wheel lugs must always be re-torqued whenever a wheel is removed and reinstalled.**

DANGER

Never work under the Implement, the framework, or any lifted component unless the Implement is securely supported or blocked up to prevent sudden or inadvertent falling which could cause serious injury or even death. (SG-14)



MAINTENANCE



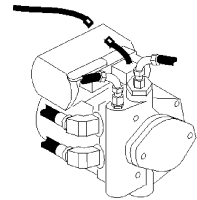
Do not modify or alter this Implement. Do not permit anyone to modify or alter this Implement, any of its components or any Implement function. (SG-8)



Relieve hydraulic pressure prior to doing any maintenance or repair work on the Implement. Place the Mower Head on the ground or securely supported on blocks or stands, disengage the PTO, and turn off the engine. Push and pull the control Levers or Joystick several times to relieve pressure prior to starting any maintenance or repair work. (SBM-6)



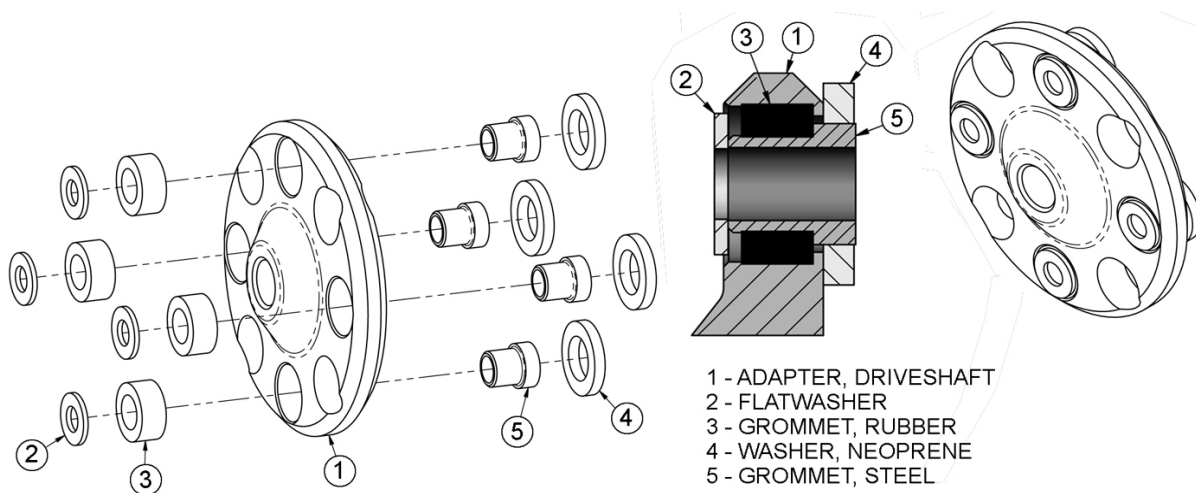
Always disconnect the wire leads from the mower pump solenoid before performing service on the Tractor or Mower. Use caution when working on the Tractor or Mower. Tractor engine must be stopped before working on Mower or Tractor. The Mower Blades could inadvertently be turned on without warning and cause immediate dismemberment, injury or death. (SBM-12a)



MAINTENANCE OF CRANKSHAFT ADAPTER ASSEMBLY (RIGID ENGINE MOUNT TRACTORS ONLY)

If replacement of components of the crankshaft adapter assembly is required, follow the assembly procedures shown below. Seat rubber grommet completely into counterbore, then seat steel grommet completely into rubber grommet while rubber grommet is supported.

(ASM-JD-0051 CRANKSHAFT ADAPTER MAINTENANCE)



MAINTENANCE

Regular Maintenance

The intervals at which regular servicing should be done are based on hours of operation. Use the tractors hour meter to determine when regular servicing is required.

Refer to the Detailed Maintenance section for further instructions on greasing. Copy and use the Daily Maintenance sheet located at the end of this section.

Daily or Every 8 Hours

ITEM	SERVICE	COMMENTS
Drive Shaft Yoke, U-Joint & Stub Shaft	Grease	Grease as instructed in detailed maintenance section
Pump Drive Shaft Coupler	Check and Lube	Insure driveshaft end play
Crankshaft Adapter	Check rubber grommets	Replace grommets if damaged or missing
Pivot Points	Lubricate	Inject grease until it appears at end
Hydraulic Fittings	Check for leaks	Tighten when needed. Do Not use hands to check for leaks, see maint. precautions
Knives	Check	Inspect for missing or damaged knives, change as needed.
Spindle mouting bolts (spindle to deck)	Check	Torque to 315 ft. lbs. lubricated Torque to 357 ft. lbs. dry
Knife mounting bolts (knife to disk or blade bar)	Check	Pre-lubricate threads with anti-seize torque to 800 ft. lbs.
Disk/Blade Bar mounting bolts (disk/blade bar to spindle)	Check	Torque to 180 ft. lbs. lubricated Torque to 204 ft. lbs. dry
Belts	Check/Adjust	Check if broken, tighten as required
Main Frame and Deck	Check	Retorque bolts to torque specifications in this section
Hydraulic Fluid Level	Check	Add if required per fluid recommendations
Rear Flail Drive(if applicable) Bear Flange and Shaft Coupler	Lubricate	Grease as instructed in detailed maintenance section
Cutter Shaft and Boom	Lubricate	Grease as instructed in

Maintenance Section 4-4

MAINTENANCE

MAINTENANCE

Ground Roller

detailed maintenance section

WEEKLY OR EVERY 40 HOURS

ITEM	SERVICE	COMMENTS
Rotary Spindle	Lubricate	Every 40 hours or weekly

WEEKLY OR EVERY 50 HOURS

ITEM	SERVICE	COMMENTS
In Tank Hyd. Fluid Filter (10 micron filter)	Change	Change after first 50 hours only, then every 500 hours or yearly
In-Line High Pressure Filter (10 micron filter)	Change	Change after first 50 hours only, then every 500 hours or yearly

MONTHLY OR EVERY 150 HOURS

ITEM	SERVICE	COMMENTS
Hydraulic Fluid Level	Check	Add as needed
Hyd. Tank Breather	Clean/Check/Replace	Clean or replace element as required
Rear Tire Type 480/80R38 18.4-34 18.4-38	Max P.S.I. 29 26 26	

YEARLY OR EVERY 500 HOURS

ITEM	SERVICE	COMMENTS
Spindle Grease Hyd. Tank Fluid In Tank Hyd. Fluid Filter (10 micron filter)	Change Change Change	
In-Line HP Filter (10 micron filter)	Change or	Change when indicated by restriction indicator.
Hyd. Tank Breather	Change	

Boom

Maintenance Section 4-5

MAINTENANCE

TROUBLESHOOTING

SYMPTOMS	CAUSE	REMEDY
Vibration	1. Loose bolts	1. Check all bolts and tighten to recommended torque specs.
	2. Cutter assembly unbalanced	2a. Check for damaged blades, disc or cuttershaft. Replace if needed. 2b. Check for wire, rope, etc. entangled in the cutter assembly
Mower will not lift	1. Hyd. Fluid Low	1. Check and refill hyd fluid
	2. Leaks in line ROU 3. Faulty relief valve	2. Tighten or replace fittings and hoses 3. Check pressure in line. Line pressure in control valve should be at least 2500 P.S.I.
	5. Faulty cylinder	5. Inspect, repair or replace cylinder
Mower will not start or run	1. Blown fuse	1. Check fuse between mower switch and ignition/replace
	2. Ball valves closed	2. Make sure valves are open
	3. Low oil level	3. Check hyd. tank and fill
	4. Line leak	4. Check all fittings and lines, re-tighten or replace
	5. Electronic solenoid faulty	5a. Without the tractor running, turn the mower switch to on. A low audible click should be heard if the solenoid is engaging the solenoid spool. If click is not heard, leave switch in on position and with a screwdriver or other steel object, touch the small nut on the end of the solenoid. If the metallic object is not attracted to the nut, check the fuse and wiring for an open circuit. If the object is attracted but no "click" is heard, replace the solenoid. 5b. Remove the four bolts holding the small block to the main block. Lift and remove small block being careful not to damage O-rings/filter. Clean filter and re-install. 5c. Remove large nut on side of large valve block. Remove spring, and use needle nose vise grip to pull spool from block. Check block and spool for contaminants and scratches.

MAINTENANCE

Clean parts or replace if scratched.

TROUBLESHOOTING (CONTINUED)





SYMPTOMS	CAUSE	REMEDY
Motor runs but will not cut.	1. Belts	1. Inspect belts and pulleys. Replace belts and repair as needed.
	2. Tensioner	2. Adjust tensioner nut flatwasher washer is flush with top of guide.
Mower turns slowly or not at all.	1. Contaminants restricting spool movement in valve body.	1. Remove large nut on side of large valve block. Remove spring, and use needle nose vise grip to pull spool from block. Check block and spool for contaminants and scratches. Clean parts or replace if scratched.
	2. Suction lines obstructed	2. Check for kinks or obstruction in suction hose.
	3. Low oil level	3. Check hyd. tank level and fill.
Pump will not work	1. Excessive wear on internal parts	1. Disassemble and repair.
Motor will not work	1. Excessive wear on internal parts	1. Disassemble and repair.

NOTE: If flow meter is available, check pressure and flow volume for all suspected hydraulic problems.

If the solution to your problem cannot be found in this section, call the Technical Service representative at the number shown on the front cover of this manual.





MAINTENANCE

Torque for Standard Fasteners

Nominal Dia. (in.)	threads per inch	 Grade 2			 Grade 5			 Grade 8			 Grade 9		
		Tightening Torque			Tightening Torque			Tightening Torque			Tightening Torque		
		Lubed	Dry Plated	Dry plain	Lubed	Dry Plated	Dry plain	Lubed	Dry Plated	Dry plain	Lubed	Dry Plated	Dry plain
		K = 0.15	K = 0.17	K = 0.20	K = 0.15	K = 0.17	K = 0.20	K = 0.15	K = 0.17	K = 0.20	K = 0.15	K = 0.17	K = 0.20
Unified Coarse Thread Series													
1/4	20	49 in-lbs	59 in-lbs	66 in-lbs	76 in-lbs	86 in-lbs	101 in-lbs	107 in-lbs	122 in-lbs	143 in-lbs	126 in-lbs	143 in-lbs	168 in-lbs
5/16	18	101	122	135	157	178	209	221	251	295	259	294	346
3/8	16	15 ft-lbs	18 ft-lbs	20 ft-lbs	23 ft-lbs	26 ft-lbs	31 ft-lbs	33 ft-lbs	37 ft-lbs	44 ft-lbs	38 ft-lbs	43 ft-lbs	51 ft-lbs
7/16	14	24	29	32	37	42	49	52	59	70	61	70	82
1/2	13	37	44	49	57	64	75	80	90	106	94	106	125
9/16	12	53	63	70	82	92	109	115	130	154	135	153	180
5/8	11	73	87	97	113	128	150	159	180	212	186	211	248
3/4	10	129	155	172	200	227	267	282	320	376	331	375	441
7/8	9	125	150	167	322	365	429	455	515	606	533	604	710
1	8	187	225	250	483	547	644	681	772	909	799	905	1065
1 1/8	7	266	319	354	596	675	794	966	1095	1288	1132	1283	1510
1 1/4	7	375	450	500	840	952	1121	1363	1545	1817	1597	1810	2130
1 1/2	6	652	783	869	1462	1657	1950	2371	2688	3162	2779	3150	3706
Fine Thread Series													
1/4	28	56 in-lbs	68 in-lbs	75 in-lbs	87 in-lbs	99 in-lbs	116 in-lbs	123 in-lbs	139 in-lbs	164 in-lbs	144 in-lbs	163 in-lbs	192 in-lbs
5/16	24	112	135	150	174	197	231	245	278	327	287	325	383
3/8	24	17 ft-lbs	20 ft-lbs	23 ft-lbs	26 ft-lbs	30 ft-lbs	35 ft-lbs	37 ft-lbs	42 ft-lbs	49 ft-lbs	43 ft-lbs	49 ft-lbs	58 ft-lbs
7/16	20	27	32	36	41	47	55	58	66	78	68	78	91
1/2	20	41	49	55	64	72	85	90	102	120	105	120	141
9/16	18	59	71	78	91	103	121	128	146	171	151	171	201
5/8	18	82	99	110	127	144	170	180	204	240	211	239	281
3/4	16	144	173	192	223	253	297	315	357	420	369	418	492
7/8	14	138	165	184	355	403	474	502	568	669	588	666	784
1	14	210	252	280	542	614	722	765	867	1020	896	1016	1195
1 1/8	12	298	357	397	668	757	890	1083	1227	1444	1269	1439	1693
1 1/4	12	415	498	553	930	1055	1241	1509	1710	2012	1768	2004	2358
1 1/2	12	734	880	978	1645	1865	2194	2668	3024	3557	3127	3544	4169

Torque values for 1/4 and 5/16-in series are in inch-pounds. All other torque values are in foot-pounds. K = 0.15 for "lubricated" conditions
Torque values calculated from formula T=KDF, where K = 0.17 for zinc plated and dry conditions
D = Nominal Diameter F = Clamp Load
K = 0.20 for plain and dry conditions

Torque-Tension Relationship for Metric Fasteners

Nominal Dia. (mm)	Pitch (mm)	 Class 4.6			 Class 8.8			 Class 10.9			 Class 12.9	
		Tightening Torque			Tightening Torque			Tightening Torque			Tightening Torque	
		Lubed	Dry Plated	Dry plain	Lubed	Dry Plated	Dry plain	Lubed	Dry Plated	Dry plain	Lubed	Dry plain
		K = 0.15	K = 0.17	K = 0.20	K = 0.15	K = 0.17	K = 0.20	K = 0.15	K = 0.17	K = 0.20	K = 0.15	K = 0.20
		(ft-lbs)	(ft-lbs)	(ft-lbs)	(ft-lbs)	(ft-lbs)	(ft-lbs)	(ft-lbs)	(ft-lbs)	(ft-lbs)	(ft-lbs)	(ft-lbs)
3	0.5	0.28	0.32	0.38	0.73	0.82	0.97	1.0	1.2	1.4	1.2	1.6
3.5	0.6	0.44	0.50	0.59	1.1	1.3	1.5	1.6	1.9	2.2	1.9	2.5
4	0.7	0.66	0.74	0.87	1.7	1.9	2.3	2.4	2.7	3.2	2.8	3.8
5	0.8	1.3	1.5	1.8	3.4	3.9	4.5	4.9	5.5	6.5	5.7	7.6
6	1	2.3	2.6	3.0	5.8	6.6	7.7	8.3	9.4	11	9.7	13
6	1.25	2.1	2.3	2.7	5.3	6.0	7.0	7.6	8.6	10	8.8	12
7	1	3.8	4.3	5.0	9.7	11	13	14	16	19	16	22
8	1	5.9	6.6	7.8	15	17	20	22	24	29	25	34
8	1.25	5.5	6.2	7.3	14	16	19	20	23	27	24	31
10	1.25	11	13	15	29	33	39	42	48	56	49	66
10	1.5	11	12	14	28	32	37	40	45	53	47	62
12	1.25	21	23	28	53	60	71	76	86	101	89	119
12	1.5	20	22	26	51	58	68	73	82	97	85	113
12	1.75	19	21	25	49	55	65	70	79	93	81	108
14	1.25	26	29	34	66	75	89	95	108	127	111	148
14	1.5	28	32	37	72	82	96	103	117	138	121	161
14	2	30	34	40	78	88	104	111	126	148	130	173
16	1.5	50	57	67	129	146	171	184	208	245	215	287
16	2	47	53	62	121	137	161	173	196	230	202	269
18	1.5	73	82	97	187	212	249	268	303	357	313	417
18	2.5	65	73	86	167	189	222	239	270	318	279	372
20	1.5	101	115	135	270	306	360	374	424	498	437	583
20	2.5	91	104	122	236	267	314	337	382	449	394	525

Clamp load calculated as 75% of the proof load for specified bolts. K = 0.15 for "lubricated" conditions
All torque values are listed in foot-pounds K = 0.17 for zinc plated, dry conditions
Torque values calculated from formula T=KDF, where K = 0.20 for plain and dry conditions D = Nominal Diameter F = Clamp Load

MAINTENANCE

LUBRICATION RECOMMENDATIONS

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Description	Application	General Specification	Recommended Mobil Lubricant
Tractor Hydraulics	Reservoir	JD-20C MF M1135,M1141 FNHM2C134D (FNH201)	Mobilfluid 424
Mower Hydraulics Cold Temperatures 0° F Start-Up	Reservoir	ISO 46 Anti-Wear-Low Temp	Mobil DTE 15M
Normal Temperatures 10° F Start-Up		JD-20C MF M1135,M1141 FNH M2C134D(FNH201)	Mobilfluid 424
Normal Temperatures 15° F Start Up		ISO 46 Anti-Wear	Mobil DTE 25
High Operating Temp. Above 90° F		ISO 100 Anti-Wear	Mobil DTE 18M
Flail Rear Gearbox	Grease	PAO Synthetic Extreme Pressure Gear Lube	Mobil SHC 75W-90 Mobil 1 Synthetic Gear
Cutter Shaft & Ground Roller Shaft(Flail)	Grease Gun	Lithium-Complex Extreme Pressure NLGI-ISO 320	Mobilgrease CM-S
Drive Shaft Coupler (Flail and Rotary)	Grease Gun	Lithium-Complex Extreme Pressure NLGI2-ISO 320	Mobilgrease CM-S
Drive Shaft Yoke, U-joint & Stub Shaft	Grease Gun	Lithium-Complex Extreme Pressure NLGI2-ISO 320	Mobilgrease CM-S
Boom Swivel Boom Cylinder Pivots (Rotary & Flail Boom)	Grease Gun	Lithium Complex Extreme pressure NLGI2-ISO 320	Mobilgrease CM-S
Deck Boom Pivot & Deck Stop Adjustment Rotary & Flail)	Grease Gun	Lithium Complex Extreme Pressure NLGI-ISO 320	Mobilgrease CM-S
Deck Spindle(Rotary)	Grease Gun	Tiger Spindle Lubricant part number 06540000	Mobilith SHC 220

Boom

Maintenance Section 4-9

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POLYCARBONATE CARE AND MAINTENANCE

The propriety UV and Abrasion Resistant Surface coating on SHIELDS SUPERCOATED polycarbonate significantly improves performance. Periodic cleaning using proper procedures and compatible cleaners are recommended to prolong service life. Tiger Corp. polycarbonate is SUPERCOATED on both sides.

CLEANING THE SUPERCOAT HARD-COAT

1. Wash with a mild solution of soap or detergent and lukewarm water.
2. Using a soft cloth or sponge, gently wash the sheet to loosen dirt and grime and rinse well with clean water.
3. To prevent water spotting, thoroughly dry with chamois or cellulose sponge.
4. Avoid the use of abrasive cleaners, squeegees and/or other cleaning implements that may mar or gouge the coating.

CLEANING AGENTS WHICH HAVE BEEN FOUND TO BE COMPATIBLE UNDER LABORATORY CONDITIONS:

Aqueous Solutions of Soaps and Detergents

Windex(1)	Top Job(2)	Joy(2)	Mr Clean(2)
Fantastik(3)	Formula 409(4)	Sumalight D12	Brucodecid

Organic Solvents

Butyl Cellosolve	Kerosene	Hexel, F.O. 554	Naphtha(VM&P grade)
Neleco-Placer	Turco 5042		

Alcohols

Methanol	Isopropyl
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All residual organic solvents should be removed with a secondary rinse.

GRAFFITI REMOVAL

Butyl cellosolve (for removal of paints, marking pen inks, lipstick, etc.) The use of masking tape, adhesive tape or lint removal tools work well for lifting off old weathered paints.

To remove labels, stickers, etc., the use of kerosene or VM&P naphtha is generally effective. When the solvent will not penetrate sticker material, apply heat (hair dryer) to soften the adhesive and promote removal.

IMPORTANT: If a material is found to be incompatible in a short-term test, it will usually be found to be incompatible in the field. The converse, however, is not always true. Favorable performance is no guarantee that actual end-use conditions have been duplicated. Therefore, these results should be used as a guide only and it is recommended that the user test the products under actual end-use conditions.

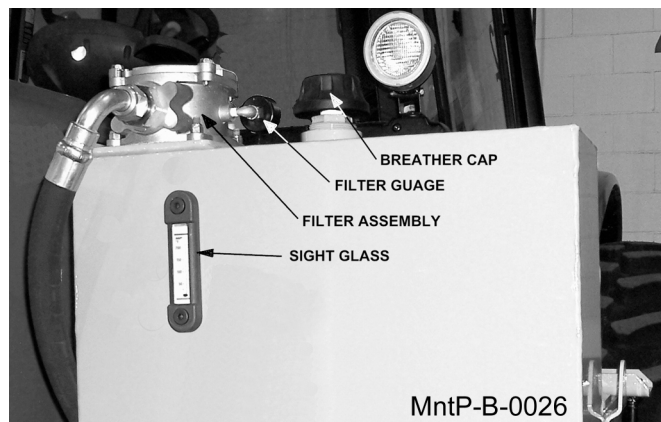
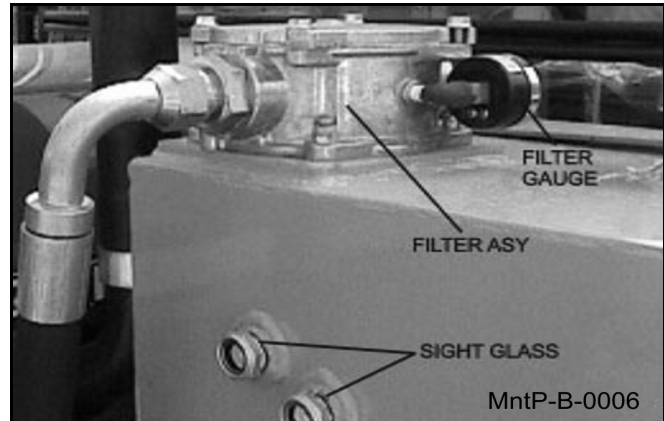
MAINTENANCE

RECOMMENDED FILLING INSTRUCTIONS FOR HYDRAULIC RESERVOIRS

When filling or checking the oil level, the unit should be parked on a level surface., shut OFF, and allow sufficient time to cool to ambient temperature. Use caution when removing the pressurized breather. Do not place face over opening when removing breather.

If your reservoir has two sight glasses: The reservoir should be filled to the top of the lower sight glass on the side of the tank. Do not overfill. The reservoir has been overfilled when oil is visible in the upper sight glass. If tank has too much oil, the excess may be expelled through the pressurized breather.

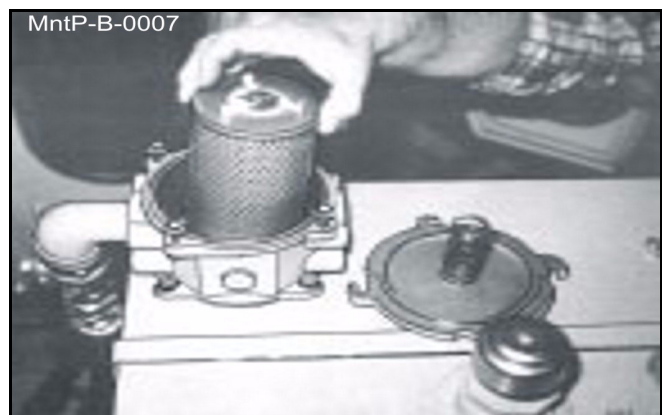
If your reservoir has one sight glass/temperature gage: The reservoir should be filled to the center of the sight glass on the side of the tank. Do not over-fill. If the tank has too much oil, the excess may be expelled through the pressurized breather.



DETAILED MAINTENANCE

REPLACING IN-TANK HYDRAULIC FILTER:

Loosen the four bolts on the top cover of the filter housing. Turn cover counter-clockwise until cover is free. Remove and replace filter. Replace top cover and cover bolts in opposite order as removed.

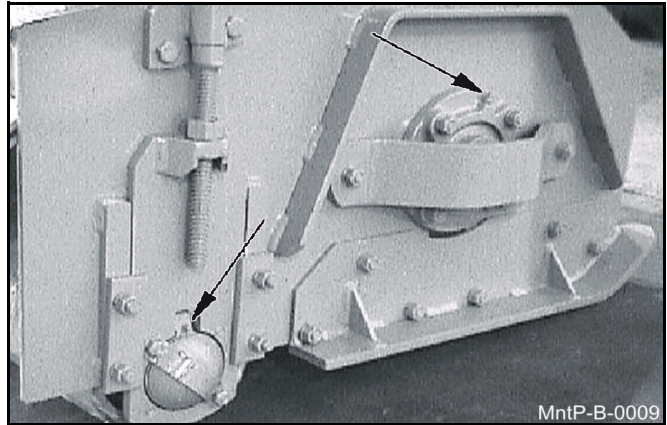


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GREASING CUTTERSHAFT -- FLAIL MOWERS

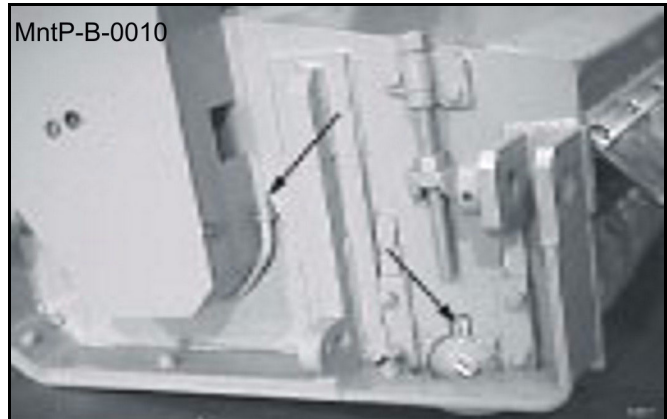
Locate grease zerks on each end of cuttershaft(s), these are located on the bearing cover. Normal conditions require one or two pumps in each bearing, using Lithium-Complex Extreme Pressure grease confirming to NLGI2-ISO 320 specifications. This is to be done with a standard grease gun daily or at **8 hour intervals**. **CAUTION: Over greasing may cause premature seal failure.**



MAINTENANCE

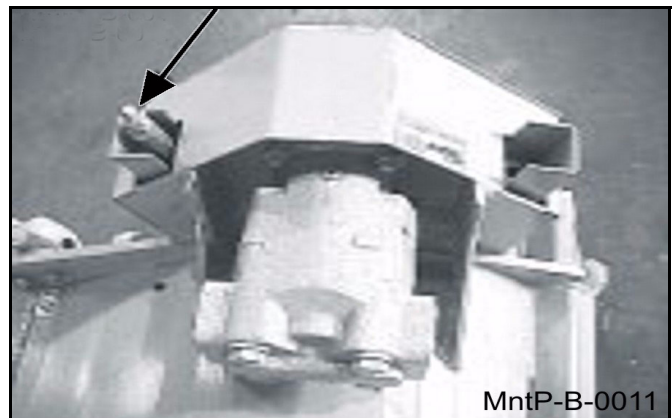
GREASING GROUND ROLLER SHAFT-- FLAIL

Locate grease zerks on each end of roller tube at lower end of head. Normal conditions require one or two pumps in each bearing, using Lithium-Complex Extreme Pressure grease conforming to NLGI2-ISO 320 specifications. This is to be done with a standard grease gun daily or at **8 hour intervals**. **CAUTION: Over greasing may cause premature seal failure.**



ADJUSTING/CHECKING BELT TENSION

To adjust belt tension or replace belts on flail cutter head, remove four bolts that secure the belt cover and remove cover. The hex nuts shown below can be adjusted to increase/decrease the belt tension as needed. (NOTE: Location of adjustment nuts may vary on flail cutter heads.) **Be sure to replace the belt cover BEFORE operating mower!**

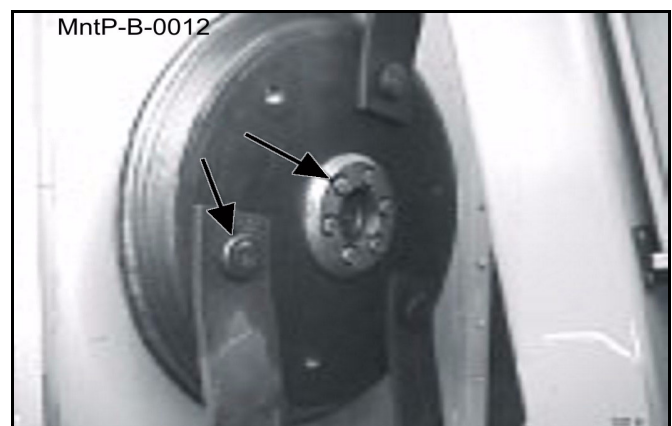


TIGHTENING KNIFE BOLTS AND DISK BOLTS:

After every 8 hours of operation or daily, the Knife Bolts and disk bolts should be tightened as follows:

Knife mounting bolts torque to 800 lubricated ft. lbs.

Disk mounting bolts (6ea.) torque to 204 dry or 180 lubricated ft. lbs.

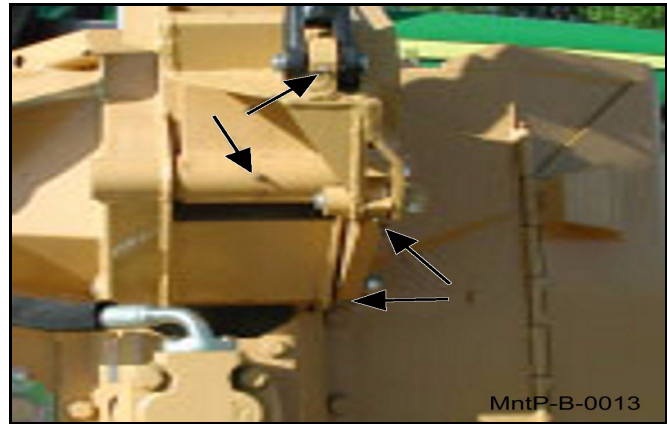


MAINTENANCE

MAINTENANCE

GREASING POINTS ON BOOM AND PIVOT

Locate grease zerks on deck pivot assembly, on the deck end of secondary boom, at main/secondary boom joint, and at swivel end of main boom. Inject Lithium-Complex Extreme Pressure grease conforming to NLGI2-ISO 320 specifications until grease begins to protrude from ends.



DECK STOP ADJUSTMENT

On boom flail, loosen locking nut. Turn adjustment bolt in, and run deck cylinder out to full extension. Adjust bolt out until the head just touches the boom, and tighten lock nut. **NOTE: Bolt should not hit boom before cylinder reaches full travel.**



GREASING SPINDLE

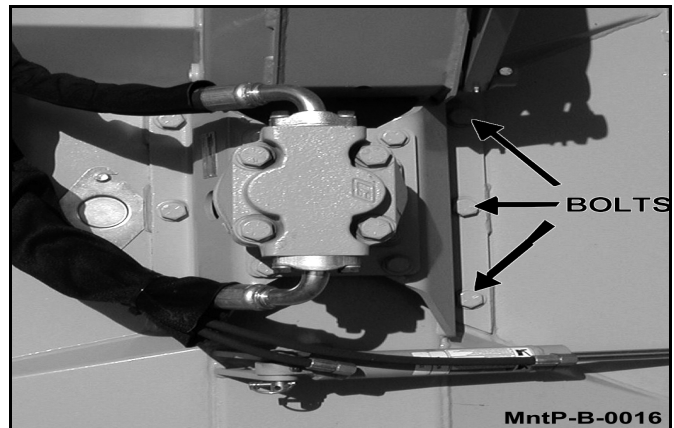
Locate grease fitting on inside of deck housing. Inject Tiger Spindle Lubricant, part number 06540000 into spindle housing. Fill with lubricant until lubricant weeps out of top spindle seal. Lubricate spindle weekly or every 40 hours of use.



MAINTENANCE

TIGHTENING SPINDLE BOLTS

The spindle mounting bolts should be checked and retorqued daily or every 8 hours of service. Torque the (6) bolts shown below to 357 dry or 315 ft. lbs. lubricated.



GREASING PUMP DRIVE SHAFT COUPLER

With engine stopped, ensure driveshaft alignment by grasping coupler and sliding back and forth. Coupler should slide freely with approximately 1/8" of end play. If coupler does not slide freely, inspect for loose pump mount bolts, or damaged or loose crankshaft adapter. Inject Lithium-Complex Extreme Pressure grease conforming to NLGI2-ISO 320 specifications into coupler until grease begins to protrude from ends. Grease daily or every 8 hours. Do not over grease.

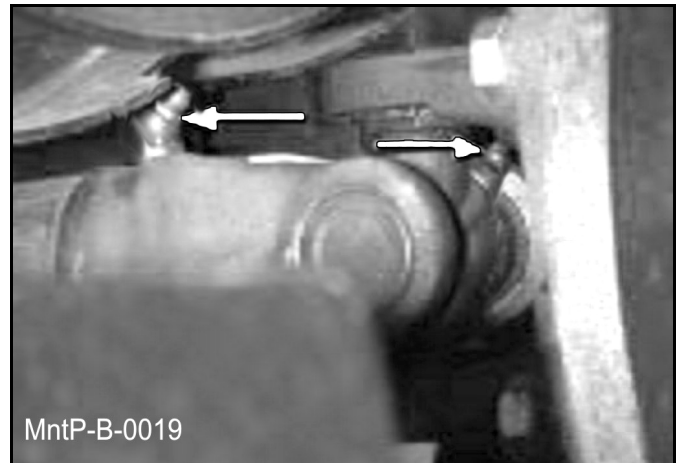
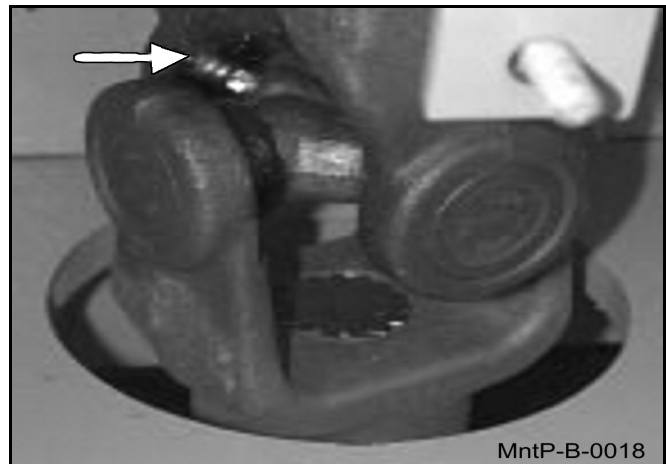


MAINTENANCE

MAINTENANCE

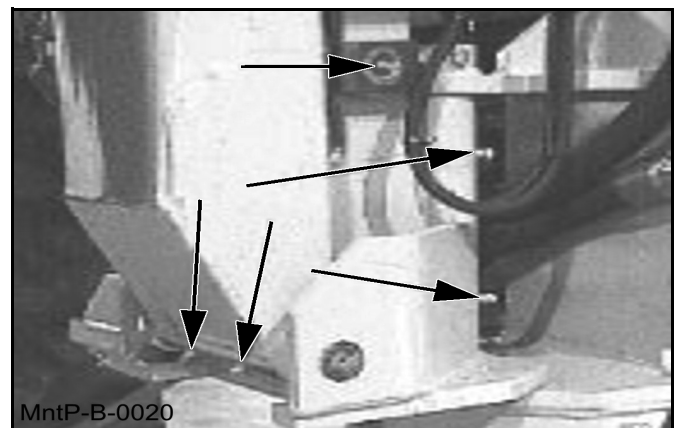
DRIVESHAFT YOE, U-JOINT STUB SHAFT

With engine stopped, inject Lithium-Complex extreme pressure grease conforming to NLGI2-ISO 320 specifications into universal joints and slip yoke until grease appears at the seal. Grease them daily or every 8 hours.



GREASING THE BOOM SWIVEL

Locate the zerks on the main swivel boss (if applicable), main boom pivot boss (if applicable) and on both ends of the boom swivel cylinder. Inject Lithium-Complex Extreme Pressure grease conforming to NLGI2-ISO 320 specification until grease begins to protrude from ends.

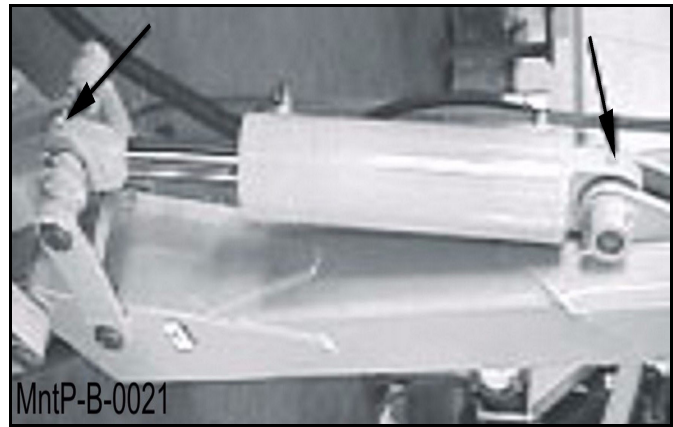


MAINTENANCE

MAINTENANCE

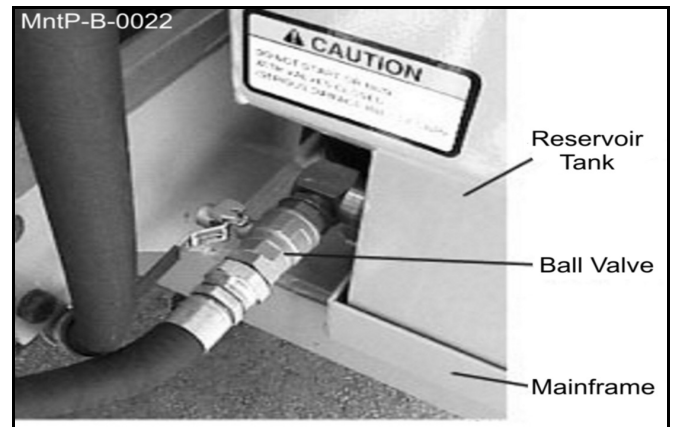
GREASING BOOM CYLINDER(S) PIVOT POINTS

Locate the zerk on the butt end tang of cylinder and on rod end tang. Inject Lithium-Complex Extreme Pressure grease conforming to NLGI2-ISO 320 specifications until grease begins to protrude from ends. This procedure is to be used on the main boom cylinder, secondary boom cylinder, deck pivot, and swivel cylinders daily or at 8 hour intervals.



BALL VALVES

The ball valve at the hydraulic reservoir may need to be closed during certain maintenance or repair procedures. **THE BALL VALVES MUST BE OPEN (handle parallel with valve) WHEN TRACTOR IS RE-STARTED OR PUMP IS COUPLED TO MOTOR OR PTO!** Failure to do so will result in component failure!



MAINTENANCE

Blades

Check the Blades for cracks and wear and Blade Bolts for tightness, daily. Blades should be replaced when they are worn excessively, bent, deformed, or out of balance.

CAUTION

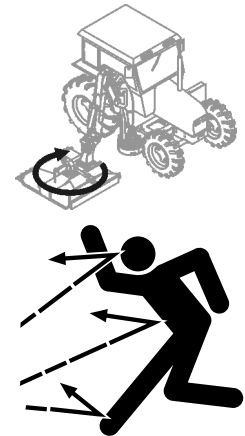
Blades should always be replaced in pairs. Blades of different weights can cause serious imbalance and damage to the machine and personnel. When replacing blades, take care to replace the blade bolts, nuts, and washers.


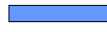

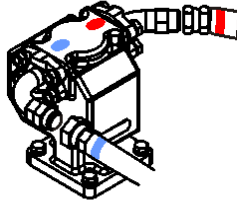
Important

Make sure the mower blades are turning clockwise when looking down from the top of the mower. Follow the color coding on the hydraulic hoses and fittings to make sure the motor and hydraulics hoses are assembled properly. Connect the red hose connection only to red fitting. Connect the blue hose connection only to the blue fitting. The blade rotation on the leading edge of the mower should discharge the cut material away from the tractor and operator.

WARNING

If the leading edge of the mower blades are rotating backwards they can discharge material toward the operator. If this occurs discontinue mowing immediately and reverse the direction of the motor rotation by correctly installing the motor pressure and return hoses. Contact your dealer or Alamo Industrial for specific information on the hose routing.



⚠ WARNING	⚠ ADVERTENCIA
TO AVOID SERIOUS INJURY AND DEATH FROM THROWN OBJECTS: <ul style="list-style-type: none"> • MAKE CERTAIN blades rotate the correct direction. 	PARA EVITAR LESION SERIA O MUERTE POR OBJETOS LANZADOS: <ul style="list-style-type: none"> • ASEGURE que las cuchillas giran en la dirección correcta.
BLADE ROTATION  ROTACIÓN DE CUCHILLAS	
 Return Retorno BLUE	 Pressure Presión RED
	

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MAINTENANCE

ROTARY KNIFE REPLACEMENT

1. Be sure you have a complete matching set of new knives for replacement.
2. Remove knives and inspect holes for damage. Also watch for cracks in the disk (if applicable) around the holes.
3. Lube threads with anti-seize. Install bolts through knife and disk from bottom side of disk/blade bar. Install new self-locking nuts and torque them to 800 ft. lbs.
4. The knives should swing freely to absorb shocks from impact when striking objects.



WHEN CUTTING HEAVY BRUSH, KNIFE BOLTS SHOULD BE INSPECTED HOURLY AND RETORQUED TO 800 LUBRICATED FT. LBS.

REPLACEMENT OF ROTARY DISK/BLADE BAR



Failure to follow the following warnings and instructions may result in serious injury or damage to the equipment or property!

1. The bolts that attach the disk to the spindle must be grade 8. These 5/8 inch bolts are to be torqued to 204 dry or 184 ft. lbs lubricated with Loctite 271.
2. A thread locking agent may be applied to threads of all mounting bolts before they are installed.
3. **Disks must be inspected daily for hairline cracks between spindle mounting bolts or around the knife mounting bolts. These cracks indicate metal fatigue caused by severe abuse. If cracks are present the disk must be replaced.**
4. Inspect the disk mounting bolts daily when checking tightness of knife mounting bolts. If a disk mounting bolt is loose, it must be removed, threads cleaned, fresh thread locking agent applied, and tightened to proper torque value.
5. If a knife mounting bolt is loose, the self locking nut must be replaced as a safety precaution. Lubricate threads with anti-seize. Install bolts through knife and disk/blade bar from bottom side. Install self locking nuts and torque them to 800 ft. lbs.

MAINTENANCE

Flail Blades Inspection

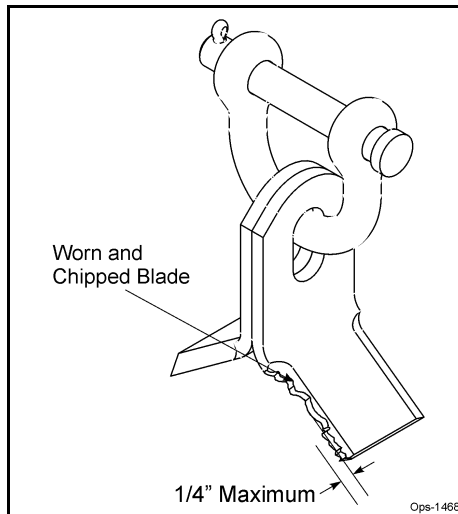


Inspect the Blades daily for abnormal wear. REPLACE ALL BLADES on the carrier IMMEDIATELY if any blades have:

- Become bent or deformed from its original shape, or
- Wear inside the blade bolt hole, or
- Any cracks are visible, or
- Deep gouges in the blade's surface are present, or
- Gouges or chipped areas in the cutting edge are larger than 1/4"(8mm), or
- The material on the leading edge has been worn away by more than 1/4"(8mm)

DO NOT straighten, sharpen, weld or hard-face blades

Failure to replace worn or damaged blades may lead to catastrophic failure of the blades and ejection of the broken part with tremendous force which may cause serious bodily injury or death.



Always replace blades in sets

- Blades that are damaged may indicate severe service or abuse. If one blade is worn or damaged other blades on the same shaft will have been subjected to the same severe service or abuse.
- The Flail rotor turns at speeds exceeding 2000 RPM and is dynamically balanced at the factory. Differences in blade weight between used blades with loss of material from gouges or wear as compared to new blades can cause severe vibration and damage to the Flail rotor. Always replace blades as complete sets.

MAINTENANCE

Blade Pins and D-Ring Inspection

Inspect Blade Pins and D-Rings daily for wear or damage as follows:

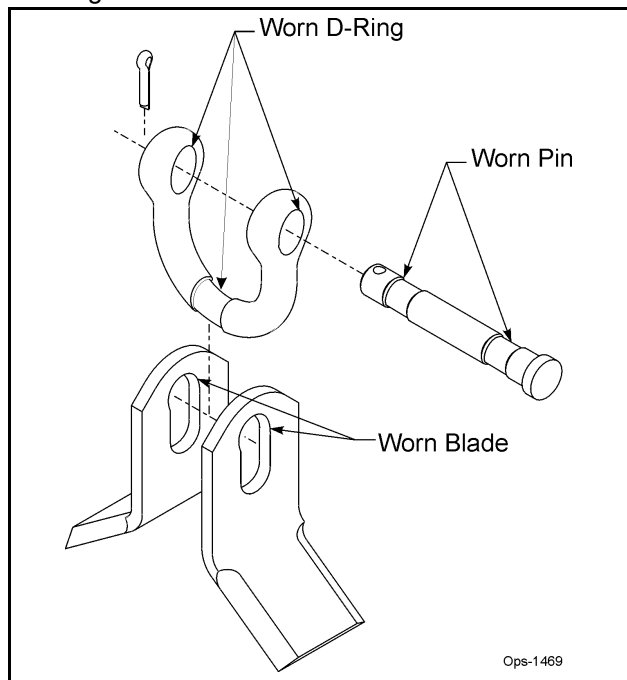


Inspect the Blade pins and D-Rings daily for abnormal wear. Make sure the cotter pins are in place and properly spread. REPLACE BLADE Pins and D-Rings IMMEDIATELY if they have:

- Visible cracks or
- If a Pin or D-Ring has visible worn areas, or
- If a Pin or D-Ring has gouges or chipped areas

Failure to replace abnormally worn pins or D-Rings may lead to catastrophic failure and ejection of the broken part, which may cause serious bodily injury or death.

Always replace the pins and D-Rings whenever excessive wear is noticed.



Important

If the cotter pins are broken by contact with other flail blades, remove the pin and reverse the direction the pin is inserted through the D-Ring so that the cotter pin is on the opposite side of the D-Ring. This will prevent the next set of blades from swinging back and hitting the cotter pin. OPS-U-0045

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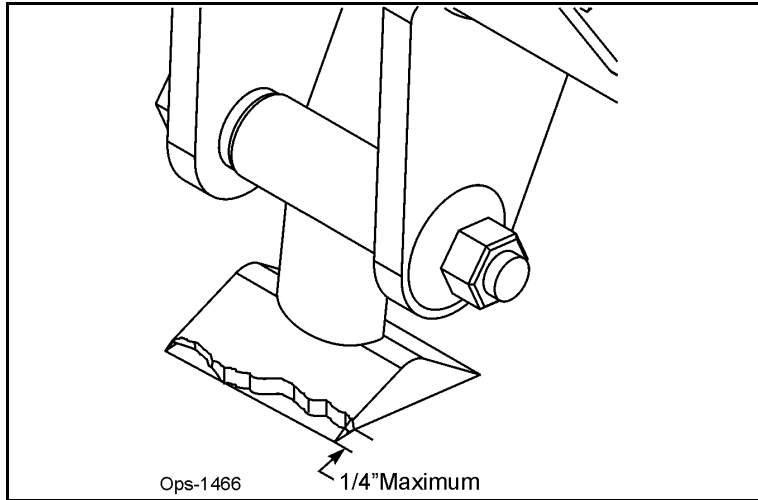
Flail Axe Blades Inspection



DANGER

Inspect the Blades daily for abnormal wear. REPLACE ALL BLADES on the carrier IMMEDIATELY if any blades have:

- Become bent or deformed from its original shape, or
- Oval shape wear inside the blade bolt hole, or
- Any cracks are visible, or
- Deep gouges in the blade's surface are present, or
- Gouges or chipped areas in the cutting edge are larger than 1/4"(8mm), or
- The material on the leading edge has been worn away by more than 1/4"(8mm)



Failure to replace worn or damaged blades may lead to catastrophic failure of the blades and ejection of the broken part with tremendous force which may cause serious bodily injury or death.

Always replace blades in sets

- Blades that are damaged may indicate severe service or abuse. If one blade is worn or damaged other blades on the same shaft will have been subjected to the same severe service or abuse.
- The Flail Axe rotor turns at speeds exceeding 2000 RPM and is dynamically balanced at the factory. Differences in blade weight between used blades with loss of material from gouges or wear, as compared to new blades, can cause severe vibration and damage to the Flail Axe rotor. Always replace blades as complete sets.

Important

Use only genuine Alamo Industrial replacement blades, blade bolts and fasteners. Other blades and bolts may not meet the requirements of Alamo Industrial and may fail during operation, resulting in the part failing and being thrown out from under the mower.



CAUTION

Never attempt to sharpen blades. OPS-U-0042

MAINTENANCE

Flail Axe Blade Bolt Inspection

Inspect Blade Bolts daily for wear or damage as follows:

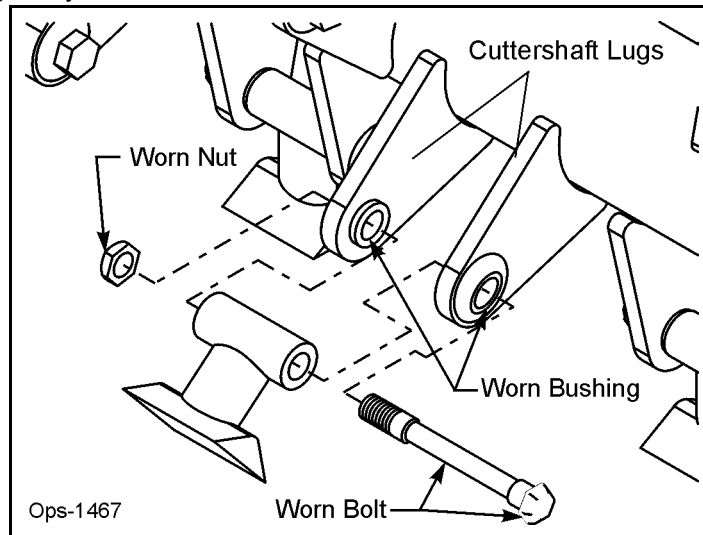


Inspect the Blade Bolt daily for abnormal wear. REPLACE ALL BLADE BOLTS on the carrier IMMEDIATELY if any bolts have:

- Visible cracks or
- If the blade bolt is worn or any recessed area is visible on the bolt, or
- If Blade Bolt has gouges or chipped areas. or
- If Bushing fits loose in the Rotor Shaft.

Failure to replace abnormally worn bolts or bushings may lead to catastrophic failure of the blades and ejection of the broken part, which may cause serious bodily injury or death.

Always replace Blade Bolts with new bolts and new bushings whenever replacing the Blades. To tighten bolts and nuts, first apply thread lock to nut. Make sure to tighten bolts and nuts just enough to allow the blades to swing freely and not bend the cuttershaft lugs. If cuttershaft lugs are bent together because of over tightening the blades will not swing freely. OPS-U-0043



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50" FLAIL KNIFE BLADE REPLACEMENT (Light Brush Grass)

1. If knives are damaged or badly worn, they will need to be replaced as a set. Replacing a single knife can cause severe vibration and possible damage to the mower. The knife should not be welded on for any reason.
2. Always replace the knife bolts when replacing the knives. DO NOT REUSE THE KNIFE BOLTS OR NUTS.
3. Assemble knives, bushings, bolts and nuts as shown in Parts Section of the manual.
4. Install the locking hex nut so that the flat face of the nut is towards the knife.
5. Apply Loctite 271 or equivalent to threads.
6. Torque nut to 50 ft. lbs. Knife must swing freely.



DO NOT re-use the locking hex nuts for mounting the knives. If hex nut becomes loose, or required removal for knife replacement or any other reason, they must be discarded and replaced with new nuts.

50" FLAIL KNIFE BLADE REPLACEMENT (Medium Brush Grass)

7. If knives are damaged or badly worn, they will need to be replaced as a set. Replacing a single knife can cause severe vibration and possible damage to the mower. The knife should not be welded on for any reason.
8. Always replace the knife bolts when replacing the knives. DO NOT REUSE THE KNIFE BOLTS OR NUTS.
9. Assemble knives, bushings, bolts and nuts as shown in Parts Section of the manual.
10. Install the locking hex nut so that the flat face of the nut is towards the knife.
11. Apply Loctite 271 or equivalent to threads.
12. Torque nut to 120 ft. lbs. Knife must swing freely.



DO NOT re-use the locking hex nuts for mounting the knives. If hex nut becomes loose, or required removal for knife replacement or any other reason, they must be discarded and replaced with new nuts.

50" FLAIL KNIFE BLADE REPLACEMENT (Heavy Duty Brush)

13. If knives are damaged or badly worn, they will need to be replaced as a set. Replacing a single knife can cause severe vibration and possible damage to the mower. The knife should not be welded on for any reason.
14. Always replace the knife bolts when replacing the knives. DO NOT REUSE THE KNIFE BOLTS OR NUTS.
15. Assemble knives, bushings, bolts and nuts as shown in Parts Section of the manual.
16. Install the locking hex nut so that the flat face of the nut is towards the knife.
17. Apply Loctite 271 or equivalent to threads.
18. Torque nut to 176 ft. lbs. Knife must swing freely.



DO NOT re-use the locking hex nuts for mounting the knives. If hex nut becomes loose, or required removal for knife replacement or any other reason, they must be discarded and replaced with new nuts.

MAINTENANCE

63" BOOM FLAIL KNIFE REPLACEMENT

1. If knives are damaged or badly worn, they will need to be replaced as a set. Replacing a single knife can cause severe vibration and possible damage to the mower.
2. Assemble knives, clevis, bolts and nuts as shown in part section of manual.
3. Install locking hex nut so that the flat face of nut is towards the knife.
4. Apply Loctite 271 or equivalent to threads.
5. Torque nut to 35 FT. LBS. Knife must swing freely.



DO NOT re-use the locking hex nuts for mounting the knives. If hex nut become loose, or require removal for knife replacement or any other reason, they must be discarded and replaced with new nuts.



Knives should not be welded on for any reason.

HEAVY DUTY SPINDLE ASSEMBLY INSTALLATION AND BEARING ADJUSTMENT

WARNING! A press **MUST** be used to install bearing cups, bearing cones, and seals. **DO NOT** use a hammer to install races, bearings, or seals. The parts of assembly may be damaged.

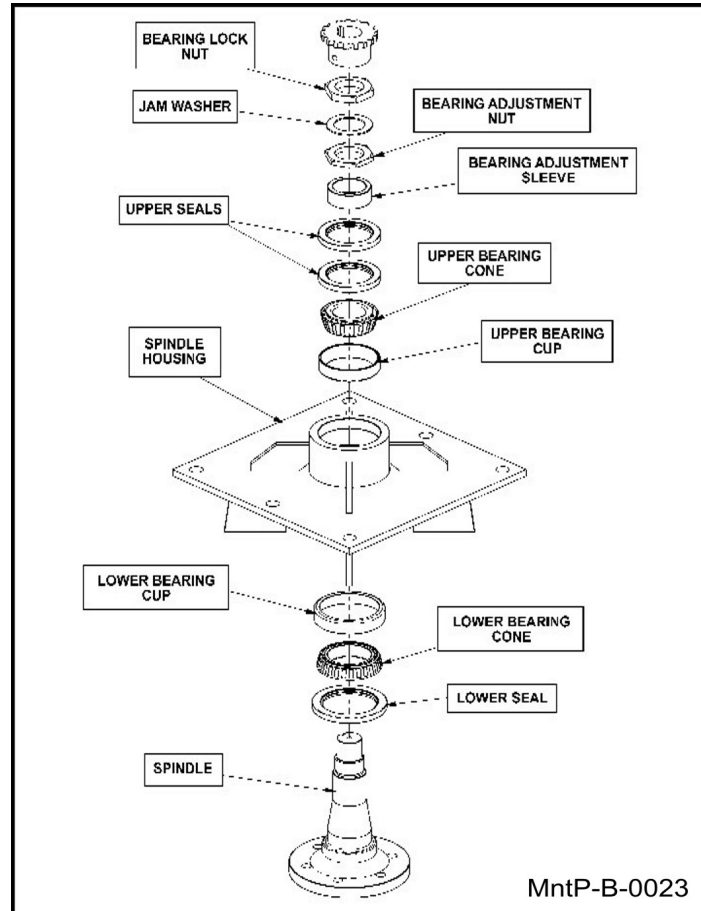
NOTE: The grease zerk and gussets are located on the top side of the spindle housing. Be sure the spindle is assembled correctly.

Be sure to wear eye protection and other protective equipment as needed when working on spindle assembly.

MAINTENANCE

THE SPINDLE ASSEMBLY

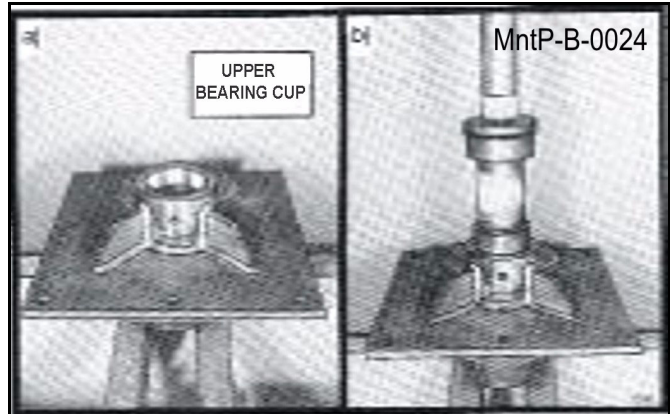
See the diagram below for identification of spindle parts, while servicing.



MAINTENANCE

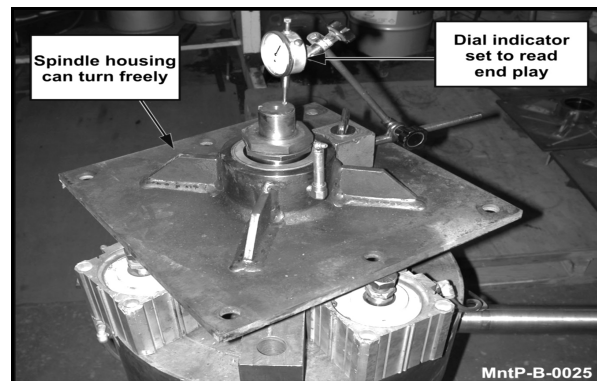
BEARING INSTALLATION

1. Press upper bearing cup into the spindle housing.
2. Turn the spindle housing over and press in the lower bearing cup.
3. Place the lower bearing cone in the bearing cup. Next press the seal into the spindle housing. The inner lip of the seal must be DOWN, towards the bearing, so lubricant is sealed inside the housing.
4. Install the spindle in the housing. Lightly press the spindle to seat the cone onto the spindle.
5. Support the bottom of the spindle and press the upper bearing cone and bearing adjustment sleeve onto the spindle.
6. **NOTE: The spindle housing must turn freely when seating the bearing cone and sleeve.**
7. Press the two upper seals into the spindle housing. The inner lip of the seals must be UP, away from the bearing, so excess lubricant can escape.
8. Install the bearing adjustment nut (thin nut) so there is 1-1/6" clearance between the nut and the sleeve. Install the jam washer, placing the tab into the key-way. Install the bearing lock nut (thin nut) and hand tighten against jam washer and adjustment nut. See the following section for bearing adjustment.
9. Position the spindle housing horizontally with the drain hole oriented "up". Grease through the zerk with Tiger Spindle Lubricant (part number 06540000) until the grease purges from the drain hole.
10. Install the plug into the drain hole.



BEARING ADJUSTMENT

1. Clamp the bottom end of the spindle securely in a vise so the spindle housing turns freely.
2. Position a magnetic base dial indicator on the outer diameter of the spindle housing. Locate the end of the dial indicator against the flat end of the spindle shaft. The dial indicator will now measure accurately bearing end play.
3. Tighten the bearing adjustment nut until there is .012 inch movement when the spindle housing is pried upward away from the vise jaws.
4. When there is .012 inch free play between the spindle and housing, install the bearing lock nut (thick nut). Hold the adjusting nut securely and tighten the lock nut to 300 ft. lbs. of torque.
5. After the lock nut is tightened, there must be .001 inch to .003 inch of free play when lightly prying up on the spindle housing.



If the end play is correct, .001 inch to .003 inch, bend tabs up on jam washer to prevent the lock nut from loosening.

If the end play is NOT correct, loosen the lock nut and turn the adjustment nut as required and re-tighten the lock nut. Repeat first part of step 5.

MAINTENANCE

MAINTENANCE

Boom Cylinder Removal and Replacement Instructions

1. Clear the area of all personnel before lowering the boom mower head.
2. From the tractor seat with your seat belt fastened around you, lower the boom mower head to the ground. Extend the boom to the furthest reach and lower the mower head flat on the ground. DO NOT attempt to replace the cylinders with the boom in the raised or transport position.
3. Shut off the tractor, engage the parking brake, place the tractor transmission in the park position, and remove the key before dismounting.
4. Allow the system to cool to room temperature before removing any hydraulic components
5. Wear safety glasses and impenetrable gloves when working with hydraulic hoses and fittings.
6. Release all oil pressure from the hydraulic circuit by manually stroking each valve section with the tractor engine off. Utilize the manual override function if the unit is equipped with an electric over hydraulic valve.
7. Utilize blocks, jack stands or a suitable over head hoist to support the weight of the boom section and remove pressure from the cylinder mounting pins.
8. Check to see that the cylinder to be replaced is not under pressure by moving the cylinder pins by hand. The pins should be loose and should slide from the pin bore easily. If the pins are tight and cannot be moved, the cylinder may be under pressure. Make sure the boom components are properly supported and that the pressure is relieved from the circuit.
9. Cylinder assemblies are heavy and can fall when the pins are removed. Support the hydraulic cylinder with a suitable hoist or jack.
10. Slowly loosen the hydraulic connections to the cylinder. Carefully unscrew hose fitting and allow any remaining pressure to bleed off. **Use extreme care.** Oil must be cool, and the technician should stand to the side to prevent exposure to any hydraulic oil. Always consult the Material Safety Data Sheet and wear any required Personal Protective Equipment. A catch pan may be required to retain any spilled oil.
11. Cap both ends of the fitting with suitably sized metal caps.
12. Remove the cylinder pins starting with the ROD end cylinder pin. Make sure the cylinder is properly supported, and remove the base end cylinder pin. The cylinder may be heavy-- use proper lifting techniques to lift and handle the cylinder. If needed, get assistance from another person to safely lift the cylinder from the machine.
13. Measure the distance between the cylinder pin holes and extend the new cylinder the correct length prior to attempting an installation.
14. Install the new cylinder in place and install both cylinder pins and retaining hardware.
15. Remove the metal caps and re-install the hydraulic hoses.
16. Check the hydraulic reservoir of the boom mower to ensure there is sufficient oil. Follow the manufacturer's recommendations for proper oil type and filtering techniques and requirements to add oil to the system.
17. Clear the area of all persons prior to starting the tractor.
18. Consult the Operator's Manual for instructions in regard to the proper operating procedure.
19. From the tractor seat, with the seat belt fastened, operate the boom to ensure proper operation of the boom function.
20. From the tractor seat, with the seat belt fastened, operate the boom controls to fully extend and retract the new cylinder several times to purge any trapped air from the system.
21. From the tractor seat, with the seat belt fastened, look for signs of an oil leak. If an oil leak is observed, shut the tractor down and follow the steps to remove pressure from the hydraulic circuit. Identify the source of the leak and resolve the issue.
22. Upon completion of the required repairs return to Step # 16 to recheck the cylinder for proper operation.

MAINTENANCE

MAINTENANCE

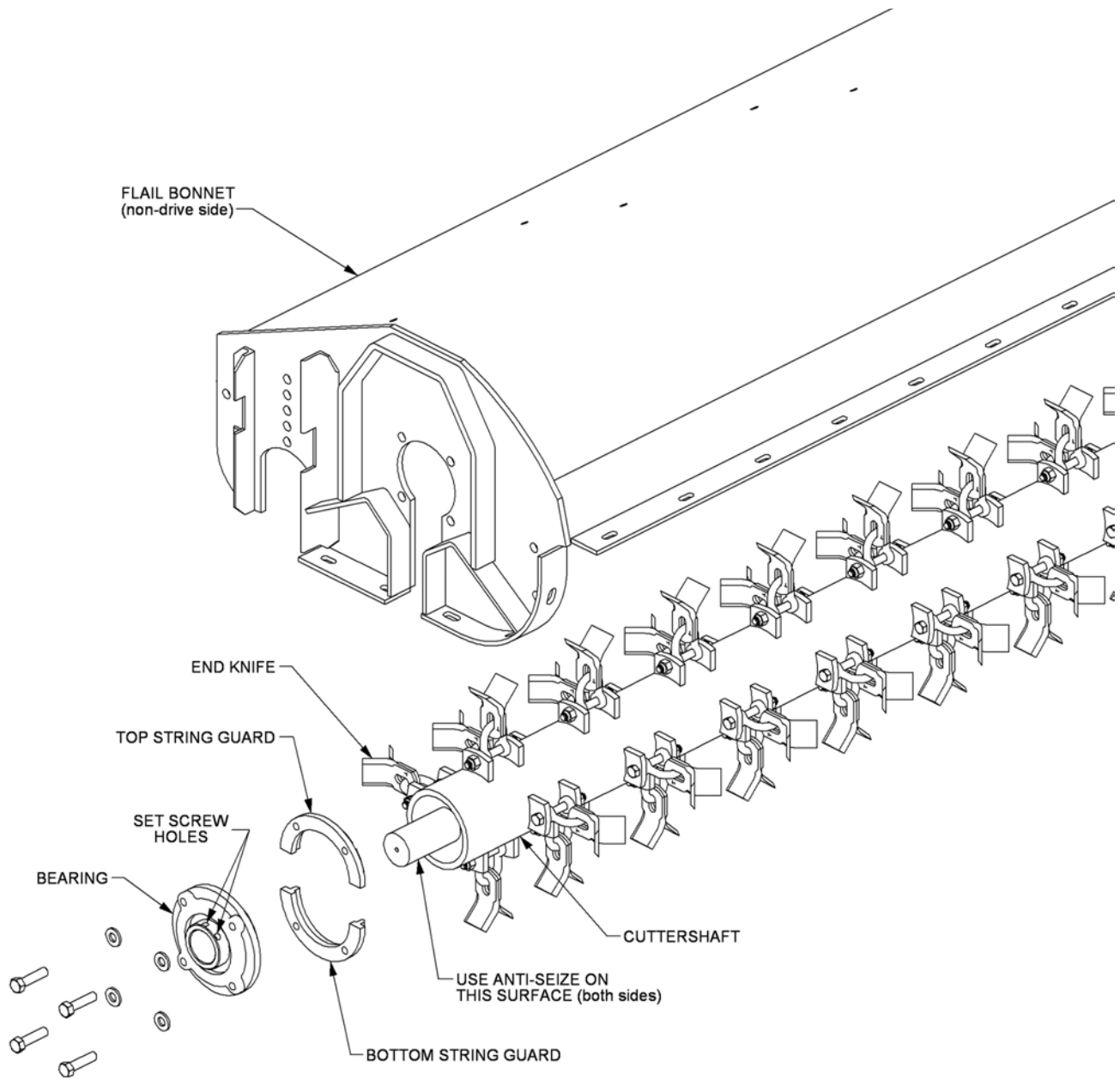
CUTTERSHAFT BEARING REPLACEMENT

1. Remove existing cuttershaft, bearings and string guards.
2. Make sure that the end knives on each end of the cuttershaft are oriented as shown.
3. Apply anti-seize on cuttershaft as shown on next page.
4. Before installation the bearings must be fully greased per the following protocol: 1. Add 2 or 3 pumps of grease, 2. Spin the bearing 2 or 3 times. 3. Add 2 or 3 pumps of grease. 4. Spin the bearing 2 or 3 times. 5. Add 2 or three pumps of grease. Continue this procedure until you can visually confirm that grease is purging from the entire circumference of the seal.
5. Install non-drive side bearing first.
6. Install the top of the string guard on the non-drive side first. Use Loctite 271 or equivalent and torque (95 ft-lb or 104ft-lb if you use an extension).
7. Install the bearing and top string guard on the drive side.
8. Center the cuttershaft between the string guards. Use Loctite 271 or equivalent and torque (95ft-lb or 104ft-lb if you use an extension) the top string guard on the drive side.
9. Install, use Loctite 271 or equivalent, and torque (95ft-lb or 104ft-lb if you use an extension) the bottom string guard on both sides.
10. Make sure the cuttershaft is centered. On the non-drive side, tighten one set-screw in the bearing onto the cuttershaft.
11. Remove the other set screw and drill a 5/16" hole into the cuttershaft 3/16" deep through the hole in the bearing. BE CAREFUL NOT TO DAMAGE THE THREADS IN THE BEARING HOLE.
12. Replace the set screw in the bearing, use Loctite 271 or equivalent, and tighten onto the cuttershaft through the new hole.
13. Remove the other set screw and repeat the drilling procedure (Step 10). Replace the set screw as stated in Step 11.
14. Repeat steps 9 through 12 on the drive side.

See illustration on next page

MAINTENANCE

MAINTENANCE



MAINTENANCE

MAINTENANCE

GROUND ROLLER BEARING REPLACEMENT

1. Remove existing ground roller brackets, bearings, and ground roller.
2. Remove bearings from stub shafts and ground roller brackets.
3. Clean stub shafts thoroughly, and apply anti-seize to O.D. of outer end.
4. Before installation, bearings must be fully greased per the following protocol: 1. Add 2 or 3 pumps of grease, 2. Spin the bearing 2 to 3 times. 3. Add 2 or 3 pumps of grease. 4. Spin the bearing 2 to 3 times. 5. Add 2 or 3 pumps of grease. Continue this procedure until you can visually confirm that grease is purging from the entire circumference of the seal.
5. Install bearing onto ground roller brackets using existing hardware and Loctite 271.
6. Slide bearing-ground roller bracket assemblies onto stub shafts of ground roller.
7. Install ground roller brackets onto flail bonnet using existing hardware.
8. Insure that ground roller brackets are set to the same elevation on both sides.
9. Center ground roller in bearings.
10. Tighten one setscrew in one bearing onto stub shaft of ground roller.
11. At the other end, remove the setscrew collar and drill 5/16" holes in both setscrew locations into the stub shaft 3/16" deep (or align setscrew holes in bearing collar with existing countersinks in stub shaft).
12. Reinstall setscrew collar on drilled-end. Remove both setscrews, apply Loctite 271 or equivalent, and tighten setscrews into stub shaft.
13. Then remove setscrew collar from other end, and repeat the drilling procedure from Step 11. Reinstall setscrew collar and install setscrews per Step 12.

See illustrations in the Common Parts Section.

MAINTENANCE

DAILY MAINTENANCE SCHEDULE

The following services should be performed daily or every 8 hours of service, following the detailed maintenance instructions in the operator's manual.

_____ Pump driveshaft: If required with drive shaft/coupler check for end play and lubricate at zerks.

_____ Crankshaft adapter: If equipped with rubber grommets check condition, replace if missing or damaged.

_____ Pivot points: Inject grease until it appears at ends.

_____ Hydraulic fittings: Check for leaks with paper or cardboard. Tighten fittings or replace hoses immediately.

_____ Knives: Inspect for missing or damaged knives, change (only complete sets) as needed.

_____ Belts: Check/tighten/replace belts as needed.

_____ Mainframe/deck: Unless otherwise specified retorque bolts according to torque specifications in this section.

_____ Hydraulic fluid level: Add, if required, per fluid recommendations.

_____ Rear flail drive, bearing flange and shaft couplers: Grease as instructed in the detailed maintenance section.

_____ Cuttershaft and ground roller: Grease as instructed in the detailed maintenance section.

Service performed by: _____ Date: ____/____/____ Hour

Meter: _____

Maintenance Section

**This page may be copied and used as part of the daily maintenance routine.

'B<'HG* '%LL'H(6 '&K 8 'BENGAL

D5 F HG'G9 7 H=C B

PART NAME INDEX

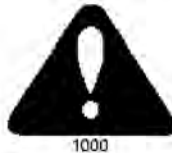
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PARTS ORDERING GUIDE

The following instructions are offered to help eliminate needless delay and error in processing purchase orders for the equipment in this manual.

1. The Parts Section is prepared in logical sequence and grouping of parts that belong to the basic machine featured in this manual. Part Numbers and Descriptions are given to help locate the parts and quantities required.
2. The Purchase Order must indicate the **Name and Address** of the person or organization ordering the parts, **who should be charged**, and if possible, the **serial number of the machine** for which the parts are being ordered.
3. The purchase order must clearly list the **quantity of each part**, the complete and correct **part number**, and the basic **name of the part**.
4. The manufacturer reserves the right to substitute parts where applicable.
5. Some parts may be unlisted items which are special production items not normally stocked and are subject to special handling. Request a quotation for such parts before sending a purchase order.
6. The manufacturer reserves the right to change prices without prior notice.

NOTE: When ordering replacement decals, refer to the part numbers and descriptions listed in the safety section in the front of this manual.

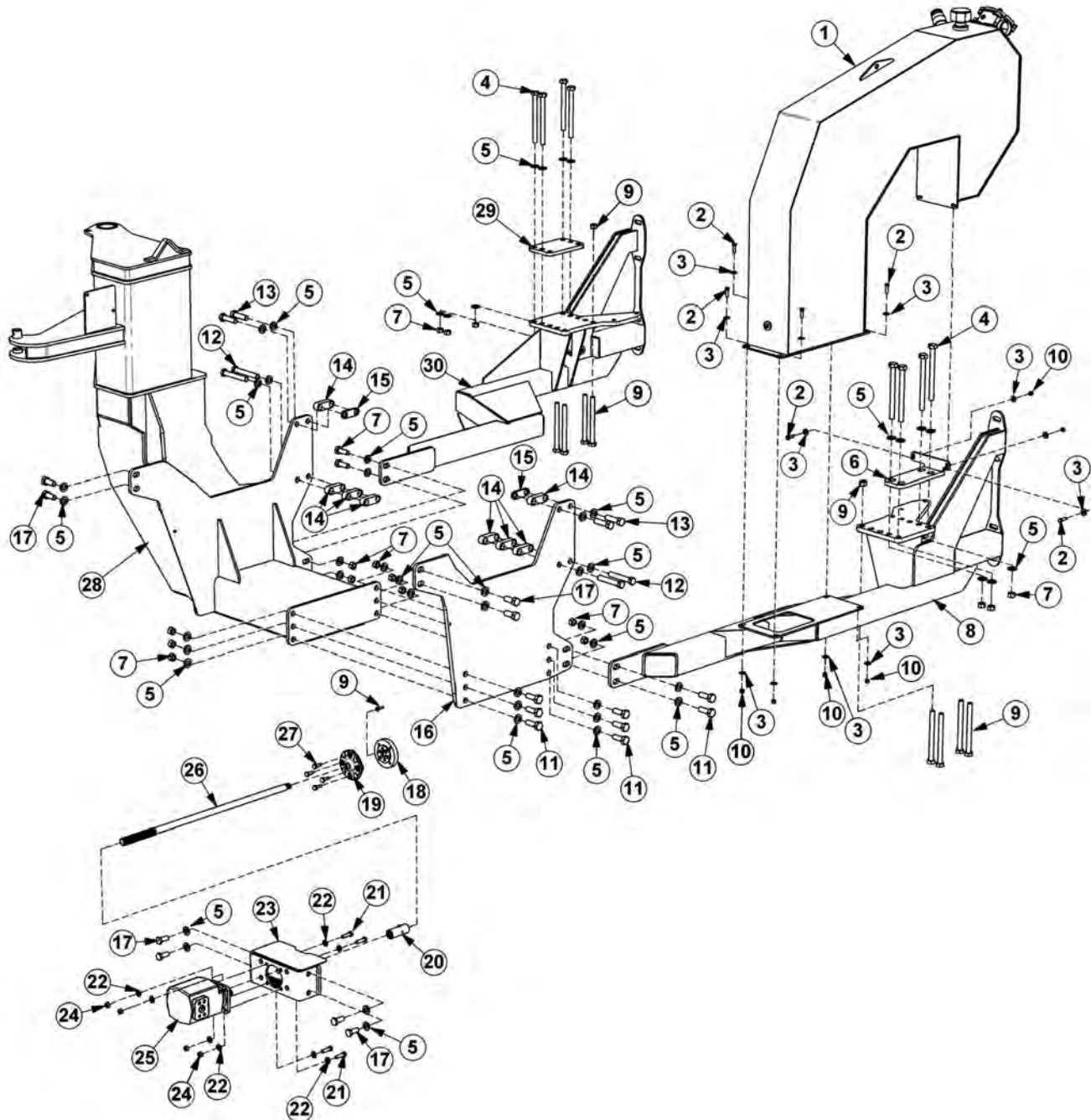


For maximum safety and to guarantee optimum product reliability, always use genuine **Tiger** replacement parts. The use of inferior replacement parts may cause premature or catastrophic failure which could result in serious injury or death.

Direct any questions regarding parts to:

Tiger Corporation
3301 N. Louise Ave.
Sioux Falls, SD 57107
1-800-843-6849
1-605-336-7900

TRACTOR MOUNT KIT

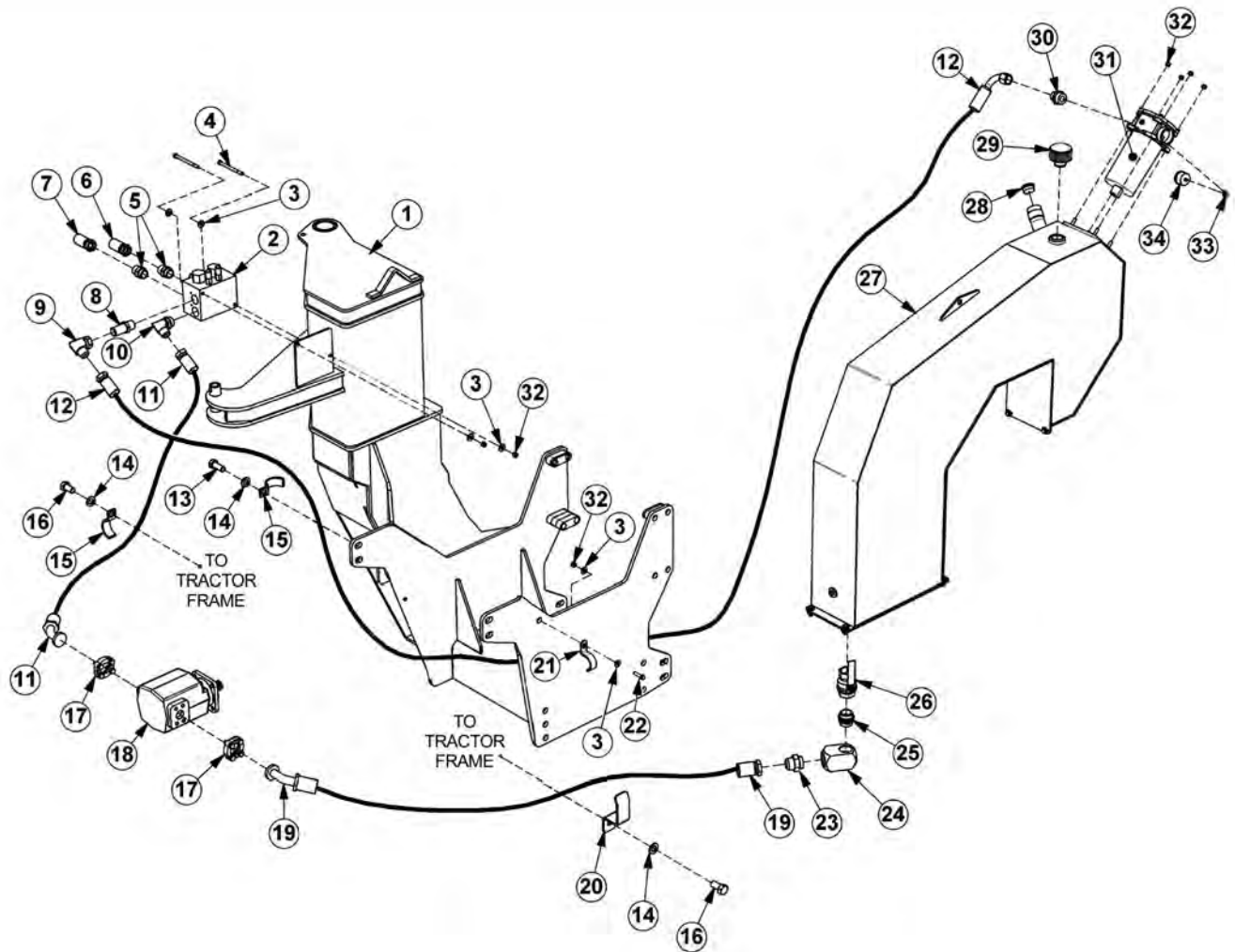


TRACTOR MOUNT KIT

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	06700215	1	TANK,RES,ASSY
2	21631	8	CAPSCREW,3/8" X 1-1/4", NC
3	22016	16	FLATWASHER,3/8
4	21846	8	CAPSCREW,3/4" X 9", NC
5	33880	46	FLATWASHER,3/4"
6	06380082	1	TANK MNT ASSY
7	21825	18	HEX NUT,3/4", NC
8	06300439	1	AXL BRC,LH,TS6.1XX,T4B,RS
9	-----	-	*EXISTING JD HARDWARE*
10	21627	8	NYLOCK NUT,3/8", NC
11	21833	10	CAPSCREW,3/4" X 2-1/4" NC
12	06530537	4	CAPSCREW,20MMX120MM2.5P,GR10.9
13	32285	4	CAPSCREW,20MMX75MM(2.5)GR10.9
14	06401627	8	SPACER,1"
15	06401630	2	SPACER,5/16"
16	06412745	1	UPRIGHT,LH,TS6.110,T4B
17	31731	8	CAPSCREW,20MMX50MM,(2.5),10.9
18	06420144	1	SPACER,CRNKSHT,T6020
19	6T0389	1	ADPTR,DRV SHFT,NH,ASSY
20	6T0375B	1	COUPLING,14 SPLINE,W/ZERK
21	21732	4	CAPSCREW,1/2" X 1-3/4", NC
22	06533004	8	FLATWASHER,1/2"
23	06380042	1	MOUNT,PUMP
24	21725	4	HEX NUT,1/2", NC
25	23152	1	PUMP
26	06420187	1	DRIVESHAFT
27	06535000	4	CAPSCREW,7/16" X 1-1/4" CUTOFF
28	06300435	1	MAINFRAME
29	06401912	1	PLATE,CLAMP,AXLE
30	06300438	1	AXL BRC,RH,TS6.1XX,T4B,RS

TRACTOR MOUNT KIT - HYDRAULICS

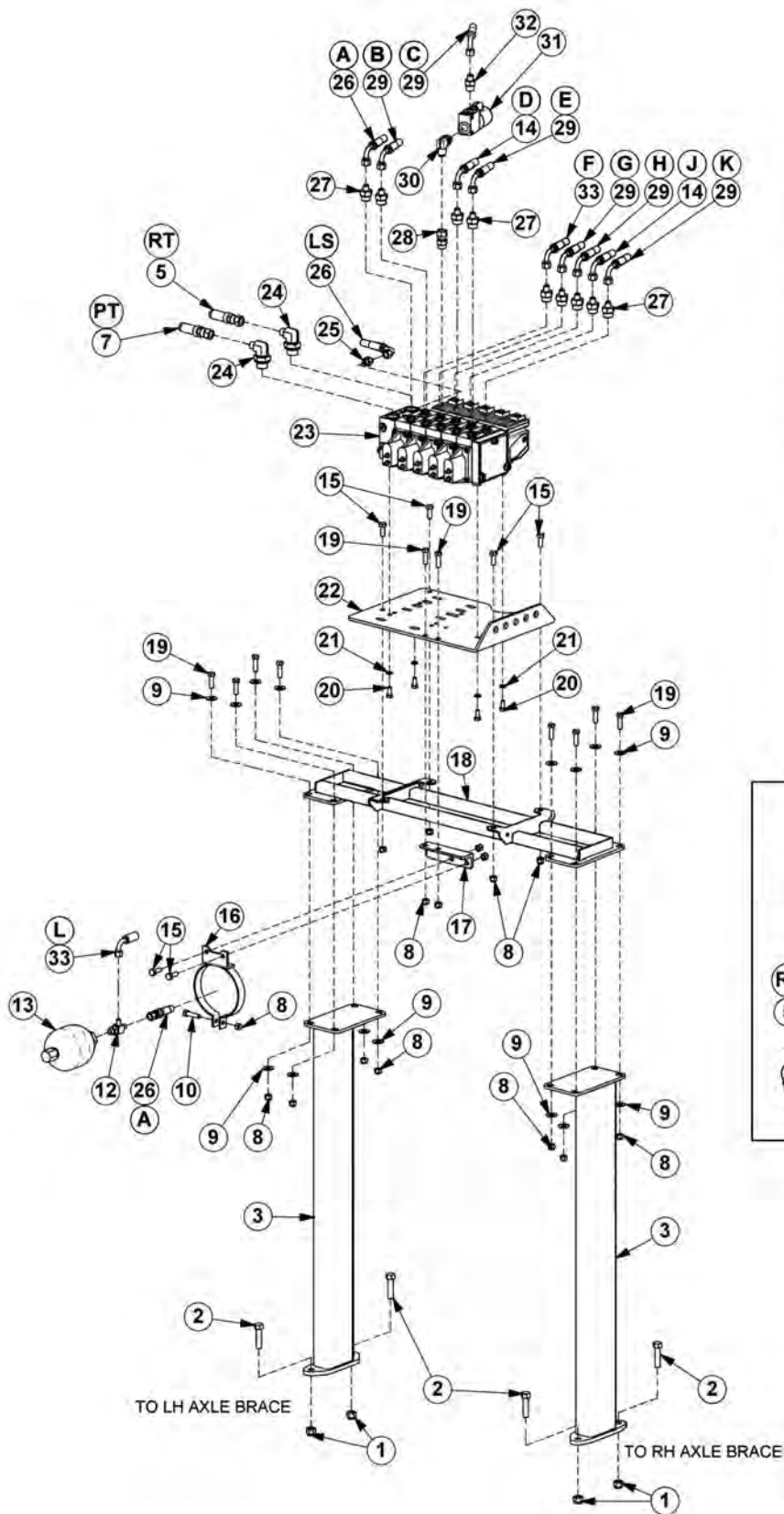


TRACTOR MOUNT KIT - HYDRAULICS

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	-----	-	MAINFRAME* REFER TO TRACTOR MOUNT PAGE*
2	06510083	1	VALVE,BRAKE,SOL,3000PSI
3	22016	5	FLATWASHER,3/8",GR8
4	21644	2	CAPSCREW,3/8" X 5" NC
5	33555	2	ADAPTER,1"MB X 1"MJ
6	06500754	1	HOSE, 1" X 105"
7	06500753	1	HOSE, 1" X 103"
8	32869	1	NIPPLE,MALE LONG,1"MOR X 1"MJ
9	33259	1	ELBOW,1"MJ X 1"FJX 90°
10	34117	1	ELBOW,1"MB X 1"MJ,FORGED
11	06500274	1	HOSE, 1" X 74"
12	06500820	1	HOSE, 1" X 188"
13	31731	1	CAPSCREW,20MMX50MM,(2.5P),10.9
14	33880	3	FLATWASHER,3/4",GR 8
15	TB3012	2	CLAMP,CROSSOVER TUBE
16	24860	2	CAPSCREW,20MMX40MM(2.5P)10.9
17	TF4852	2	KIT,FLANGE,#20
18	23152	1	PUMP
19	06500780	1	HOSE,1-1/2" X 114"
20	06411136	1	CLAMP,HOSE,2.0
21	32382	1	BRACKET,HOSE
22	21632	1	CAPSCREW,3/8" X 1-1/2" NC
23	34710	1	ADAPTER,1-1/2"ORB X 1-1/2"MJ
24	06503084	1	ELBOW,1-1/2" FB X 1-1/2"FB
25	06503083	1	ADAPTER,1-1/2"ORB X 1-1/2"ORB
26	34309	1	BALL VALVE,1-1/2" FOR
27	-----	-	TANK ASSY*REFER TO TRACTOR MOUNT PAGE*
28	06505127	1	PLUG,SAE 3/4"
29	06505077	1	CAP,BREATHER,O-RING
30	34064	1	ADAPTER,1-1/4" MOR X 1"MJ
31	06505044	1	FLTR ASSY,IN-TANK CPLT,SAE10MP
32	21627	7	NYLOCK NUT,3/8" NC
33	6T0649	1	FILTER GAUGE
34	TF4888	1	STREET ELBOW,1/8" X 90°

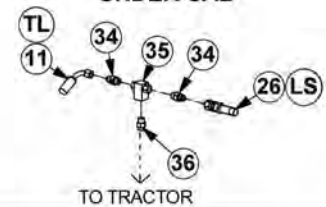
ELECTRONIC PROPORTIONAL LIFT VALVE MOUNT



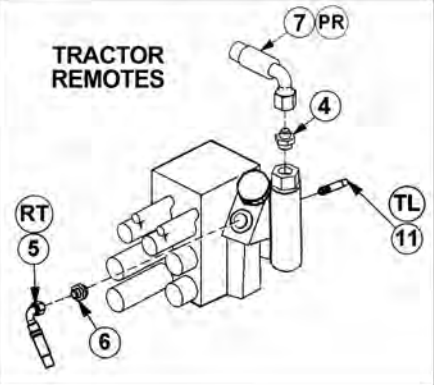
HOSE ROUTING

- A- LIFT VALVE TO ACCUMULATOR
- B- TO SECONDARY BOOM CYL GLAND
- C- TO DECK ROLL CYL GLAND
- D- TO BOOM SWIVEL CYL BUTT
- E- TO SAFETY SHIELD CYL GLAND
- F- TO MAIN BOOM CYL BUTT
- G- TO SECONDARY BOOM CYL BUTT
- H- TO DECK ROLL CYL BUTT
- J- TO BOOM SWIVEL CYL GLAND
- K- TO SAFETY SHIELD CYL BUTT
- L- TO MAIN BOOM CYL GLAND
- PT- PRESSURE FROM TRACTOR
- RT- RETURN TO TRACTOR
- LS- LOAD SENSE
- TL- TRACTOR LOAD SENSE

LOAD SENSE UNDER CAB



TRACTOR REMOTES



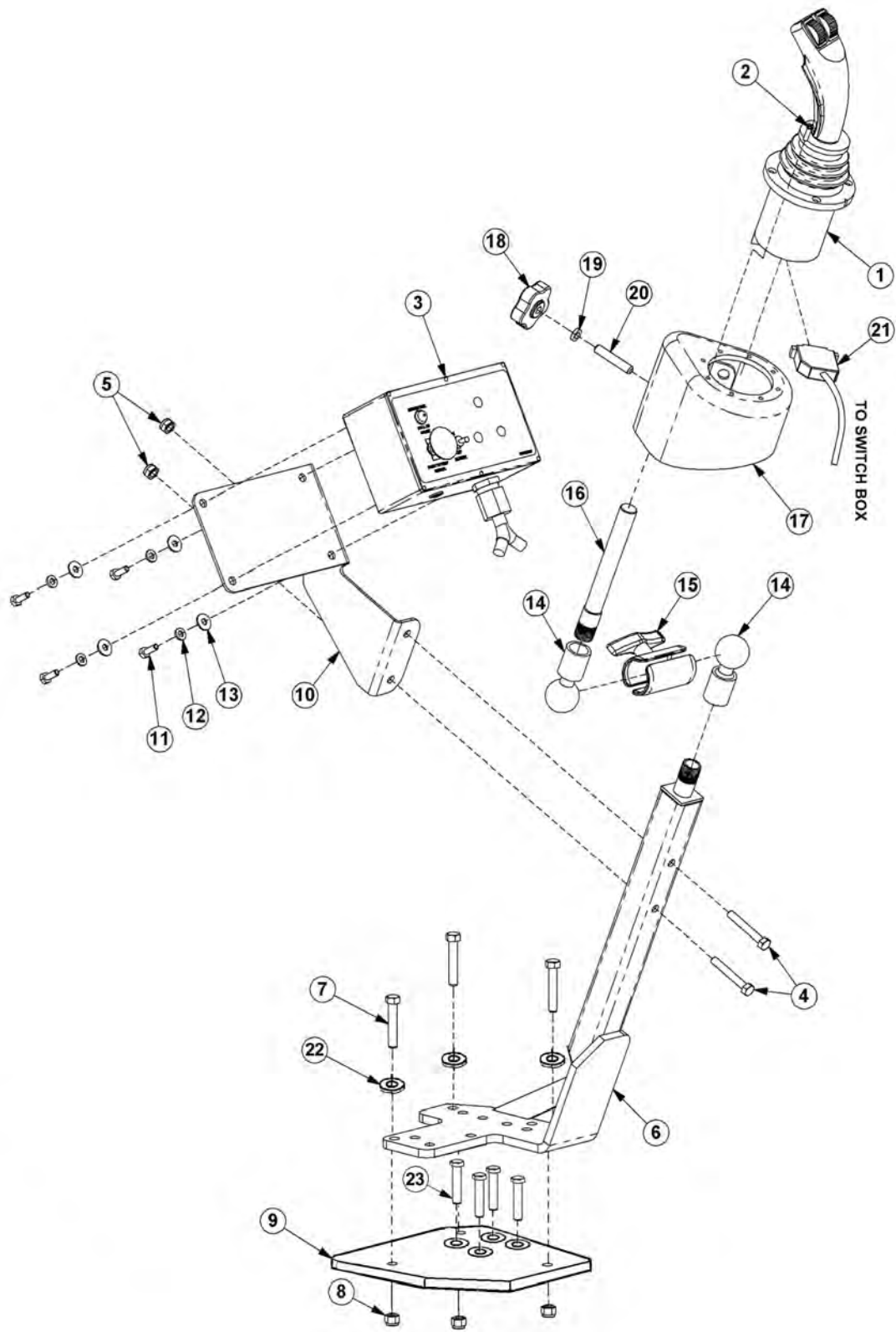
ELECTRONIC PROPORTIONAL LIFT VALVE MOUNT

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	21727	4	NYLOCK NUT,1/2 NC
2	21733	4	CAPSCREW,1/2 X 2 NC
3	06340056	2	VLV MNT,LEG,TS6.1XX,T4B
4	06503167	1	ADAPTER,BANJO,3/4
5	33410	1	HOSE, 1/2" X 48"
6	06503059	1	ADAPTER,5/8MJX3/4BSPP
7	06500339	1	HOSE, 1/2" X 35"
8	21627	17	NYLOCK NUT,3/8 NC
9	22016	16	FLATWASHER,3/8,GR8
10	21632	1	CAPSCREW,3/8 X 1-1/2 NC
11	06500594	1	HOSE, 1/4" X 28"
12	06503029	1	TEE,RUN,1/2ORB3/8MJX3/8MJ
13	24300	1	ACCUMULATOR
14	06500149	2	HOSE, 1/4" X 220"
15	21630	6	CAPSCREW,3/8 X 1 NC
16	23888	1	BRKT,ACCUMULATOR
17	06460072	1	BRKT,MNT,ACCUM,JD6R
18	06340057	1	VLV MNT,TS6.1XX,T4B
19	21631	10	CAPSCREW,3/8X1 1/4, NC,GR8
20	21579	4	CAPSCREW,5/16 X 3/4 NC
21	21987	4	LOCKWASHER,5/16
22	34622	1	PLATE,VALVE,REAR MNT
23	06502097	1	VLV,5SP,DF,PVEA,RS
24	33294	2	ELBOW,3/4MBX1/2MJ
25	33392	1	ADAPTER,5/16MBX3/8MJ
26	06500450	2	HOSE, 1/4" X 42"
27	32807	9	ADAPTER,5/8MBX3/8MJ
28	06503041	1	ADAPTER,5/8ORB1/2FJX
29	06500687	6	HOSE, 1/4" X 268"
30	33382	1	ELBOW,1/2MBX1/2MJ
31	06510050	1	TRV LCK,METRIPACK COIL
32	33271	1	ADAPTER,1/2 MOR X 3/8 MJ
33	06500688	2	HOSE,1/4" X 288"
34	32901	2	ADAPTER,3/8 MOR X 3/8 MJ
35	3338806	1	TEE,SHUTTLE,3/8 FOR
36	06503166	1	ADAPTER,3/8MBX1/4FJX

NH TS6.1XX BENGAL T4B

JOYSTICK AND SWITCHBOX MOUNT

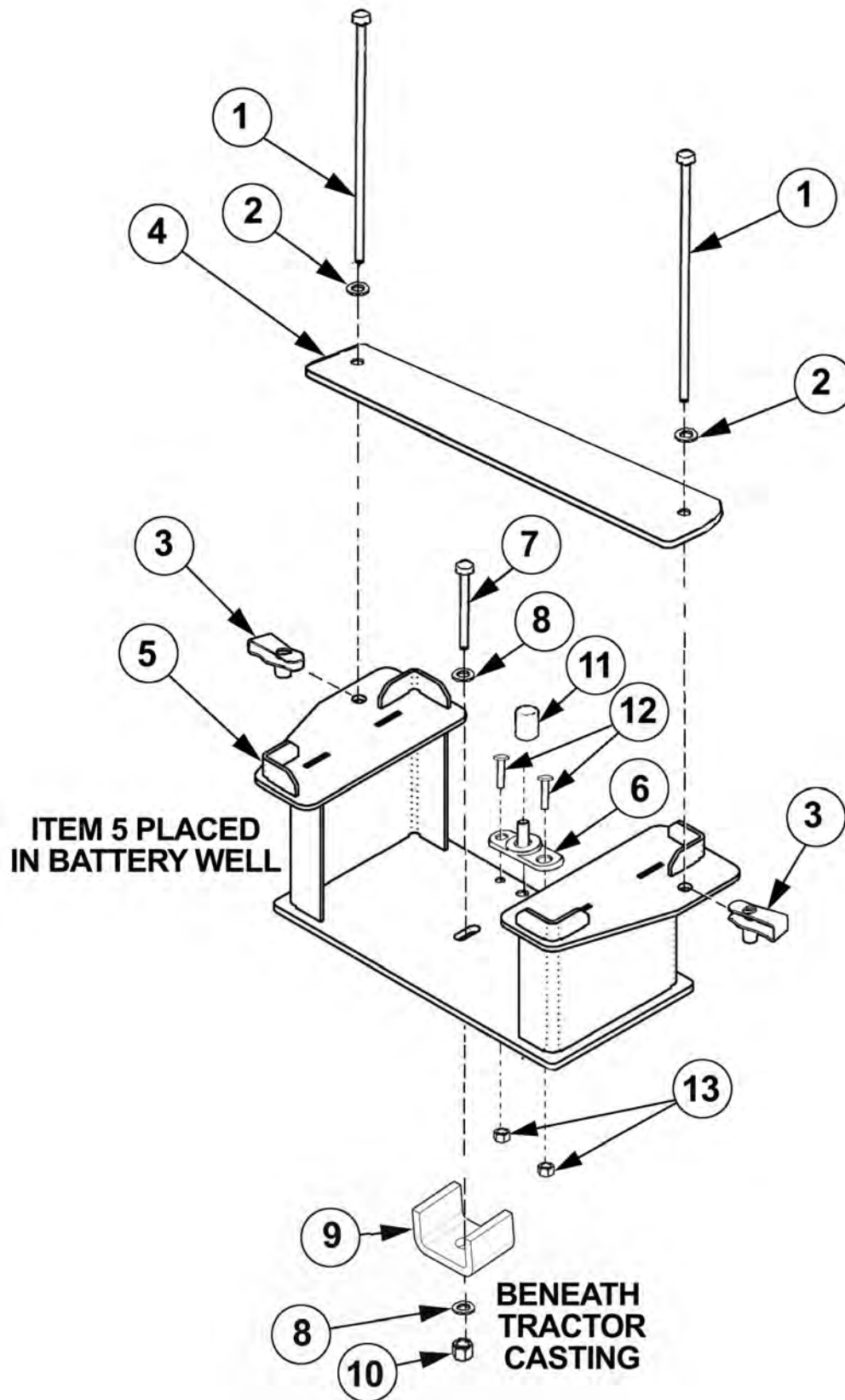


JOYSTICK AND SWITCHBOX MOUNT

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	33691	1	JOYSTICK
2	32829	4	SCREW,MACHINE,10-32 X 3/4",FLATHD
3	06510196	1	SWITCH BOX,DF,SS,OS
4	21585	2	CAPSCREW,5/16" X 2-1/4",NC
5	21577	2	NYLOCK NUT,5/16",NC
6	06340011	1	MNT,STND,JOYSTICK
7	21631	3	CAPSCREW,3/8" X 1-1/4",NC, GR8
8	21627	3	NYLOCK NUT,3/8",NC
9	06380081	1	MNT, STND, CNTRL, TS6 1XX T4B
10	06340015	1	SWITCH BOX MNT
11	21529	4	CAPSCREW,1/4" X 3/4",NC
12	21986	4	LOCKWASHER,1/4"
13	22014	4	FLATWASHER,1/4"
14	06520041	2	MOUNT,RAM,BALL,1-1/2"
15	06520020	1	MOUNT,RAM,ARM
16	06340010	1	ROD,1/2"NPT X 7"
17	35033	1	CAN,JOYSTICK,ASSY
18	35204	1	KNOB,3/8",NC,INSERT
19	35206	1	HEX NUT,JAMB,3/8",NC
20	35205	1	SETSCREW,3/8" X 2",NC,KNURLED
21	33693	1	CBL,EXT,4FT,JOYSTICK
22	22015	6	FLATWASHER, 5/16"
23	06530108	4	CAPSCREW, 8MM X 70MM 1.25

BATTERY RELOCATION



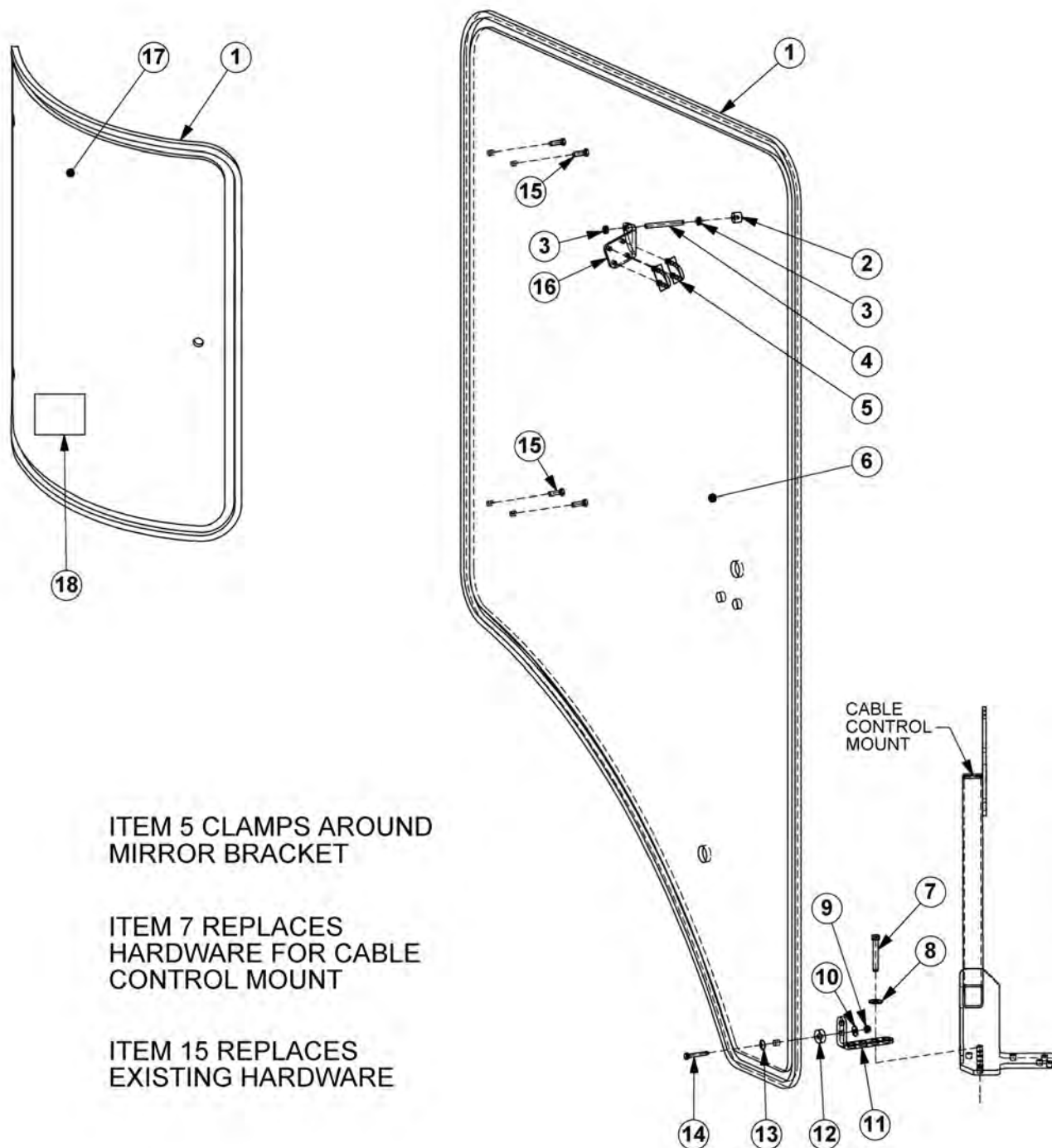
BATTERY RELOCATION

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	06530234	2	CAPSCREW, 1/4" X 10" NC
2	22014	2	FLATWASHER, 1/4"
3	35176	2	U-NUT, 1/4" 3/4" TO CENTER
4	06412376	1	BATTERY STRAP
5	06370267	1	RELOC, BATT, NH TS6 T4B
6	06512019	1	JUNCTION BLOCK, 3/8 STUD, RED
7	21587	1	CAPSCREW, 5/16" X 2-3/4" NC
8	22015	2	FLATWASHER, 5/16"
9	06412377	1	CLAMP, BATTERY, BTM, TS6 T4B
10	21577	1	NYLOCK NUT, 5/16" NC
11	06510261	1	POST, BATT, POS
12	06530304	2	SCREW, MACHINE, 10-24 X 3/4"
13	24890	2	HEX NUT, 10-24, NYLOCK

NH TS6.1XX T4B BENGAL

POLYCARBONATE

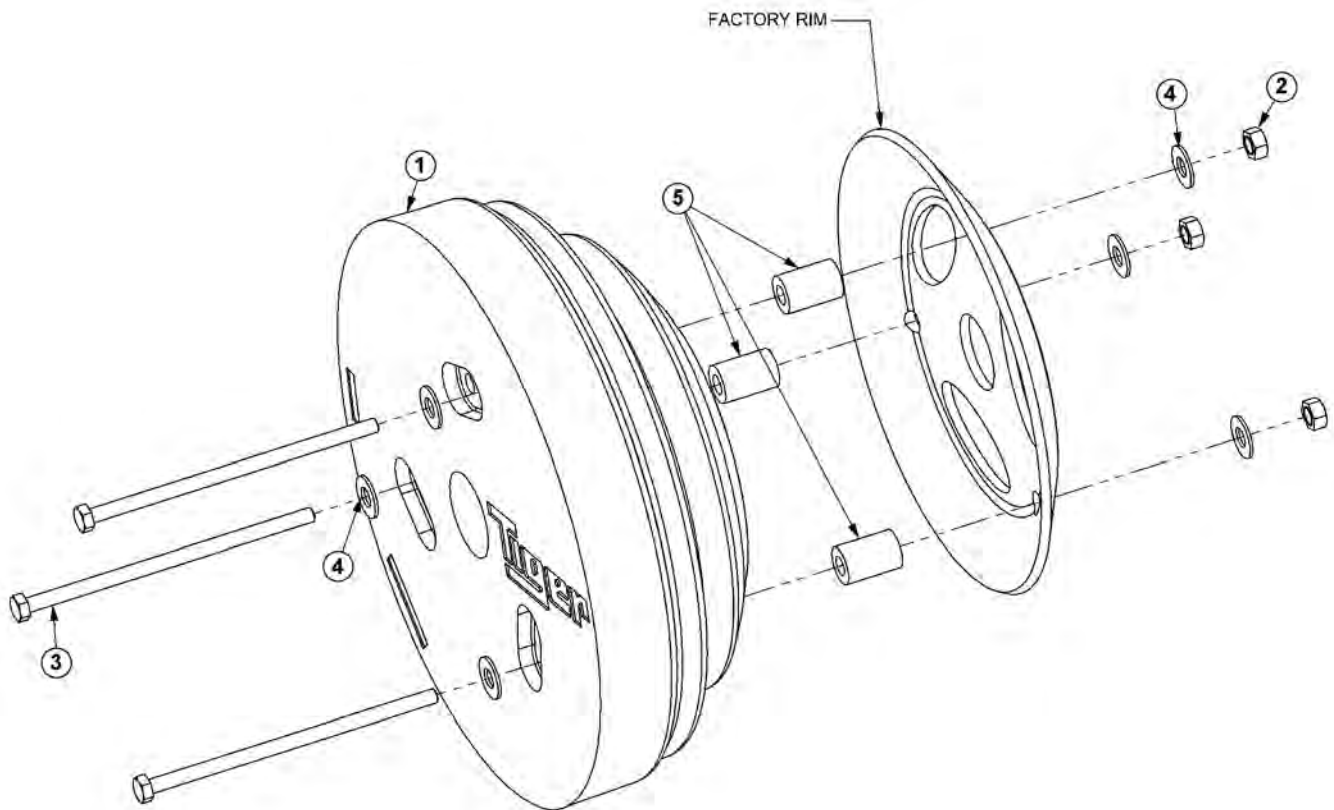


POLYCARBONATE

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	31965	25	TRIMLOCK (IN FEET)
2	33477	1	ISOLATOR
3	21575	2	HEX NUT,5/16",NC
4	33478	1	ROD,THREADED,5/16" X 3"
5	32550	2	U-BOLT,ASSY
6	06490049	1	POLYCARBONATE,DOOR
7	21632	1	CAPSCREW,3/8" X 1-1/2",NC
8	22016	1	FLATWASHER,3/8"
9	21527	1	NYLOCK NUT,1/4",NC
10	22014	1	FLATWASHER,1/4"
11	06410672	1	BRACKET,BOTTOM
12	06537000	1	WASHER,NEOPRENE
13	06537001	1	WASHER,RUBBER
14	21533	1	CAPSCREW,1/4" X 1-3/4",NC
15	28583	4	CAPSCREW,8MM X 25MM,1.25P
16	06411620	1	BRACKET, TOP
17	06490050	1	POLYCARBONATE,REAR
18	22645	1	DECAL

WHEEL WEIGHT



ITEM	PART NO.	QTY.	DESCRIPTION
1	32517	1	WHEEL WEIGHT, 1700#
2	06531000	3	HEX NUT, 7/8", NC
3	06530213	3	CAPSCREW, 7/8" X 16", NC, GR8
4	06533000	6	FLATWASHER, 7/8"
5	TB3278	3	SPACER

BENGAL

COMMON PARTS

NOTES

NOTES

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COMMON BENGAL T4

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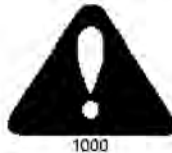
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PARTS ORDERING GUIDE

The following instructions are offered to help eliminate needless delay and error in processing purchase orders for the equipment in this manual.

1. The Parts Section is prepared in logical sequence and grouping of parts that belong to the basic machine featured in this manual. Part Numbers and Descriptions are given to help locate the parts and quantities required.
2. The Purchase Order must indicate the **Name and Address** of the person or organization ordering the parts, **who should be charged**, and if possible, the **serial number of the machine** for which the parts are being ordered.
3. The purchase order must clearly list the **quantity of each part**, the complete and correct **part number**, and the basic **name of the part**.
4. The manufacturer reserves the right to substitute parts where applicable.
5. Some parts may be unlisted items which are special production items not normally stocked and are subject to special handling. Request a quotation for such parts before sending a purchase order.
6. The manufacturer reserves the right to change prices without prior notice.

NOTE: When ordering replacement decals, refer to the part numbers and descriptions listed in the safety section in the front of this manual.

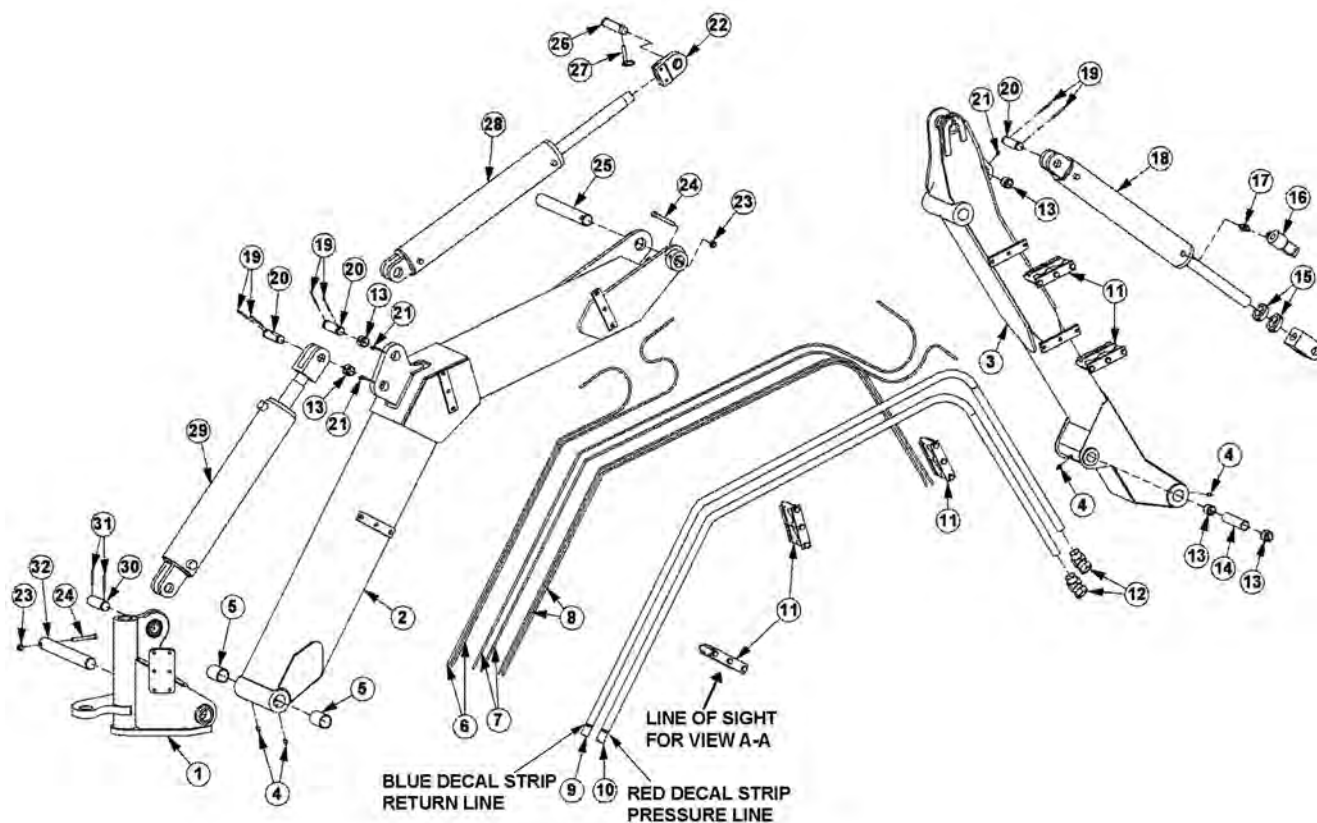


For maximum safety and to guarantee optimum product reliability, always use genuine **Tiger** replacement parts. The use of inferior replacement parts may cause premature or catastrophic failure which could result in serious injury or death.

Direct any questions regarding parts to:

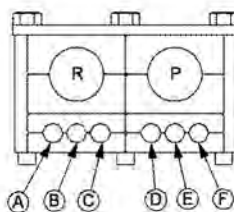
Tiger Corporation
3301 N. Louise Ave.
Sioux Falls, SD 57107
1-800-843-6849
1-605-336-7900

BOOM ASSY - BENGAL 18 T4



NOTES:

1. IMPORTANT: ALIGN GREASE HOLE OR GAP IN BEARING (ITEMS 5 & 13) WITH GREASE ZERK IN BOOM. MAINTAIN ALIGNMENT DURING BEARING INSTALLATION.
2. GREASE HINGE PIN ZERKS (ITEM 4) ON BOOM AFTER ASSEMBLY, ONCE UNDER LOAD WITH BOOM ELEVATED AND AGAIN AT REST WITH BOOM SUPPORTED.
3. ONLY ONE SET COLLAR (ITEM 15) NEEDED FOR ROTARY MOWERS.



VIEW A-A

KEY

- A - SECONDARY BUTT
- B - SECONDARY GLAND
- C - DECK ROLL BUTT
- D - DECK ROLL GLAND
- E - SHIELD BUTT
- F - SHIELD GLAND
- R - RETURN
- P - PRESSURE

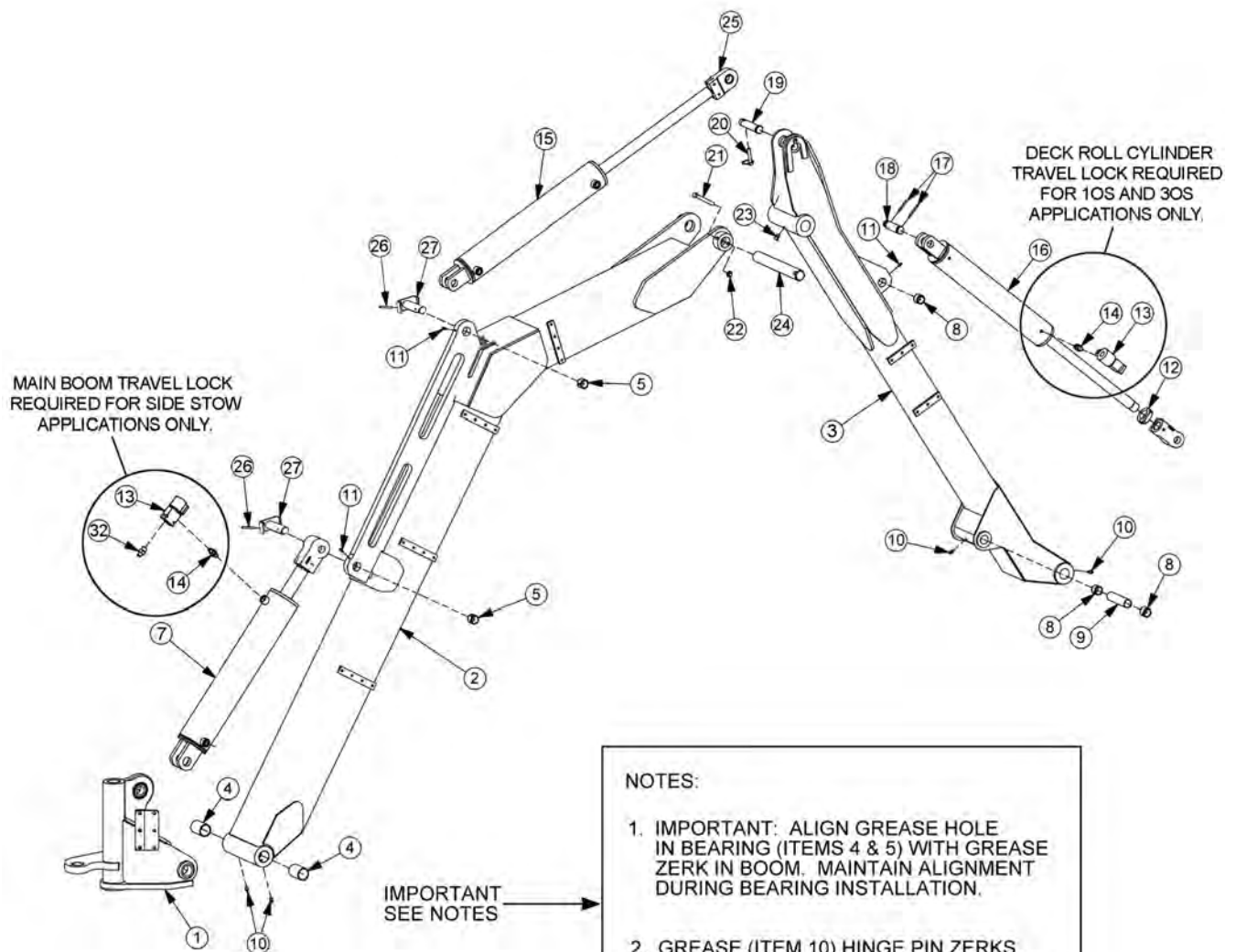
BOOM ASSY - BENGAL 18 T4

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	----	-	REAR STOW SWIVEL ASSY
2	06700167	-	MAIN BOOM ASSY
---	06310111	1	MAIN BOOM WELDMENT
3	06700168	-	SECONDARY BOOM ASSY
----	06310112	1	SECONDARY BOOM WELDMENT
4	6T3211	4	GREASE ZERK,1/8"
5	32321	2	BEARING, DX, 1-1/2" X 2"
6	06500499	2	HOSE,1/4" X 50"
7	06500500	2	HOSE,1/4" X 108"
8	06500502	2	HOSE,1/4" X 100"
9	06500713	1	HOSE,1" X 163"
10	06500714	1	HOSE,1" X 162"
11	06505116	2	CLAMP KIT
12	24724	2	SWIVEL,1MJ X 1FJX45
13	TB3010	3	BUSHING
14	TB1035	1	BUSHING,SPACER
15	35312	1	SET COLLAR
16	06510050	1	TRAVEL LOCK,METRIPACK COIL
17	31329	1	ADAPTER,1/2ORB X 1/2ORB ADJ
18	06501023	1	DECK ROLL CYLINDER,3" X 18"
19	06537021	6	ROLL PIN,5MM
20	TB1033	4	PIN,1"
21	6T3207	4	GREASE ZERK,1/4"
22	TB3033	1	CLEVIS WITH SPHERICAL BEARING
23	21677	2	NYLOCK NUT,7/16",NC
24	21688	2	CAPSCREW,7/16" X 3-1/4",NC
25	TB1025	1	PIN,1-1/2"
26	TB1036	1	PIN,1"
27	TF1143	1	PIN,LYNCH
28	06501024	1	SECONDARY CYLINDER,3-1/2" X 20"
29	06501022	1	MAIN CYLINDER,4" X 20"
30	06420100	1	PIN,1-1/4"
31	TB1023	2	ROLL PIN,7/32"
32	TB3013C	1	PIN,1-1/2"

COMMON BENGAL T4

BOOM ASSY BENGAL STANDARD 22 T4



NOTES:

1. IMPORTANT: ALIGN GREASE HOLE IN BEARING (ITEMS 4 & 5) WITH GREASE ZERK IN BOOM. MAINTAIN ALIGNMENT DURING BEARING INSTALLATION.
2. GREASE (ITEM 10) HINGE PIN ZERKS ON BOOM AFTER ASSEMBLY, ONCE UNDER LOAD WITH BOOM ELEVATED AND AGAIN AT REST WITH BOOM SUPPORTED.

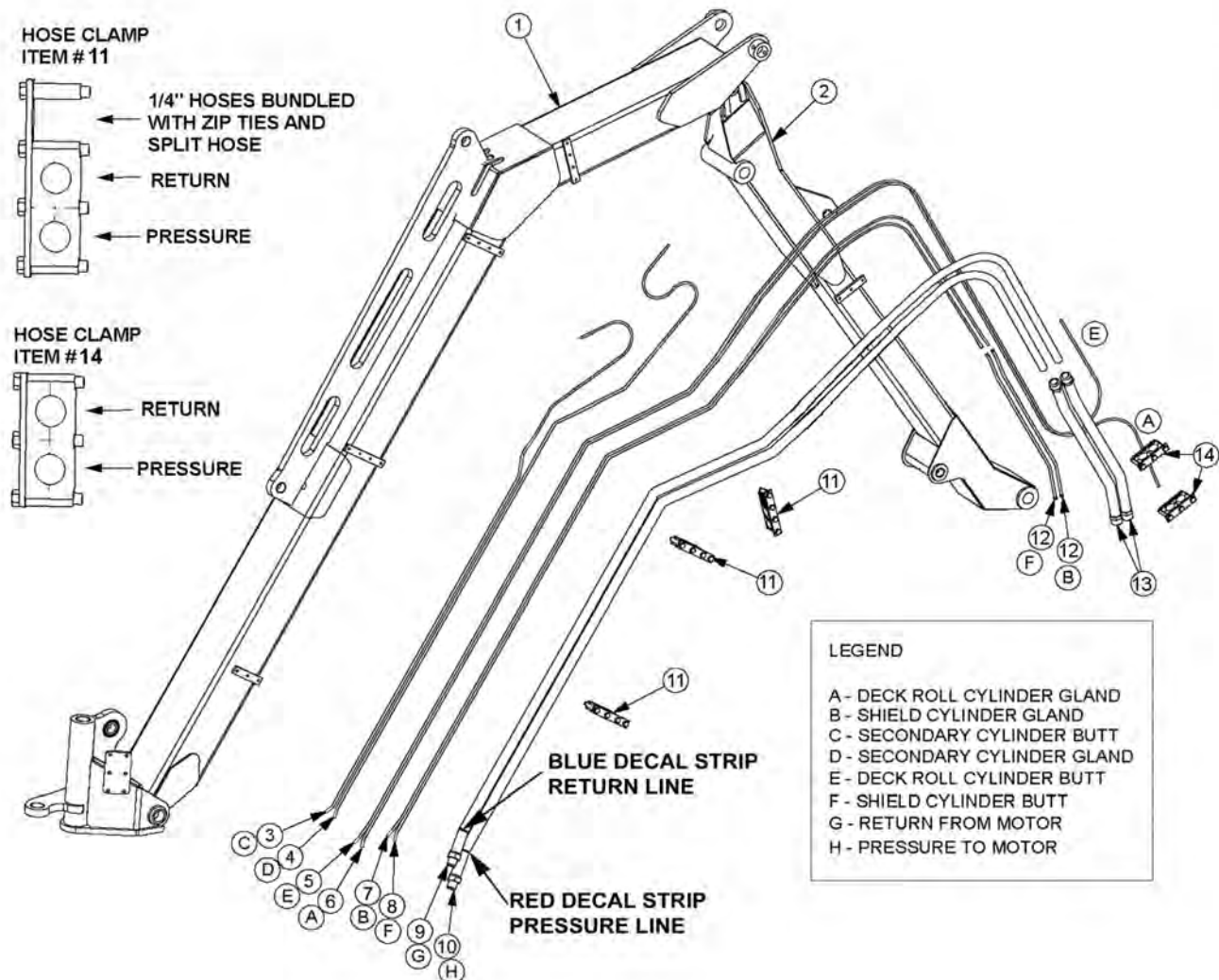
BOOM ASSY BENGAL STANDARD 22 T4

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	-----	-	SWIVEL ASSY *REFER TO TRACTOR MOUNT KIT
2	06700189	1	MAIN BOOM, T4
3	24517	1	SECONDARY BOOM ARM ASSY
4	32321	2	BEARING, DX, 1-1/2" X 2"
5	TB1044	2	BUSHING, 1-1/4"ID
7	06501020	1	CYLINDER, 5" X 20"
8	TB3010	3	BUSHING, 1"ID
9	TB1035	1	BUSHING,SPACER
10	6T3211	4	GREASE ZERK,1/8"
11	6T3207	3	GREASE ZERK,1/4"
12	35312	1	SET COLLAR
13	06510050	1	TRAVEL LOCK,METRIPACK COIL
14	31329	1	ADAPTER,1/2ORB X 1/2ORB ADJ
15	06501022	1	CYLINDER, 4" X 20"
16	06501023	1	CYLINDER,3" X 18"
17	06537021	6	ROLL PIN,5MM
18	TB1033	1	PIN,1" X 4"
19	TB1036	1	PIN,1" X 4-11/16"
20	TF1143	1	PIN,LYNCH
21	21688	2	CAPSCREW,7/16" X 3-1/4",NC
22	21677	2	NYLOCK NUT,7/16",NC
23	6T3210	1	GREASE ZERK,1/8" X 90°
24	TB1025	1	PIN,1-1/2" X 12"
25	30172	1	CLEVIS,SPHERICAL
26	6T3014	2	ROLL PIN, 1/4" X 2"
27	TB1045B	2	PIN, PRIMARY CYLINDER

COMMON BENGAL T4

BOOM ASSY HYD BENGAL 22 T4



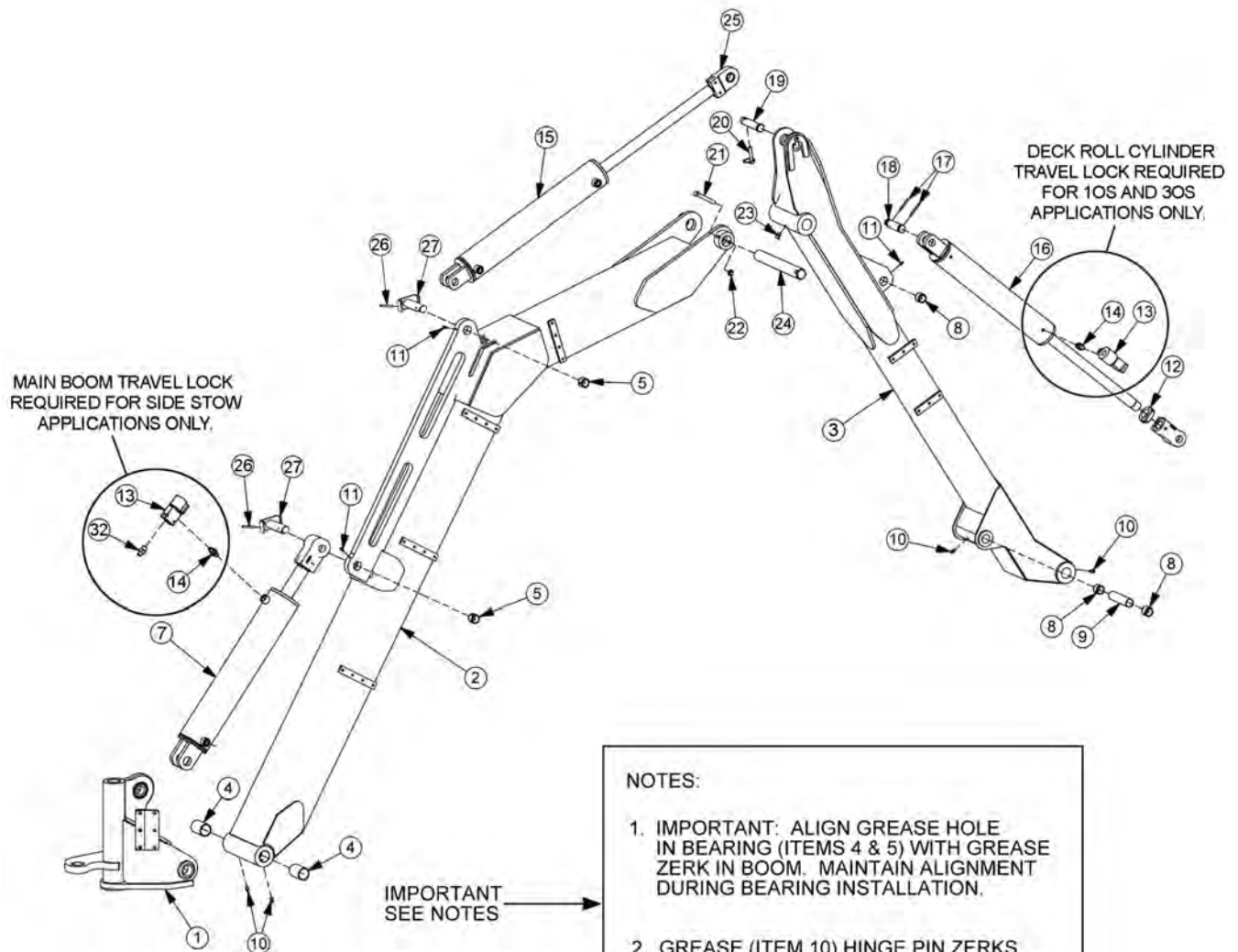
BOOM ASSY HYD BENGAL 22 T4

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	-----	-	MAIN BOOM *REFER TO BOOM ARM ASSY
2	-----	-	SECONDARY BOOM *REFER TO BOOM ARM ASSY
3	06500694	1	HOSE, 1/4" X 83"
4	---	1	HOSE, 1/4" X 83"
5	06500695	1	HOSE, 1/4" X 138"
6	----	1	HOSE, 1/4" X 138"
7	06500696	1	HOSE, 1/4" X 112"
8	---	1	HOSE, 1/4" X 112"
9	06500859	1	HOSE, 1" X 182"
10	---	1	HOSE, 1" X 182"
11	06505019	3	CLAMP KIT,3 SECTION
12	34102	2	TUBE,PRFRMD,SEC BOOM
13	2403306	2	TUBE,PRFRMD,SEC BOOM,HP
14	30111	2	CLAMP KIT,2 SECTION

COMMON BENGAL T4

BOOM ASSY BENGAL EXT 24 T4



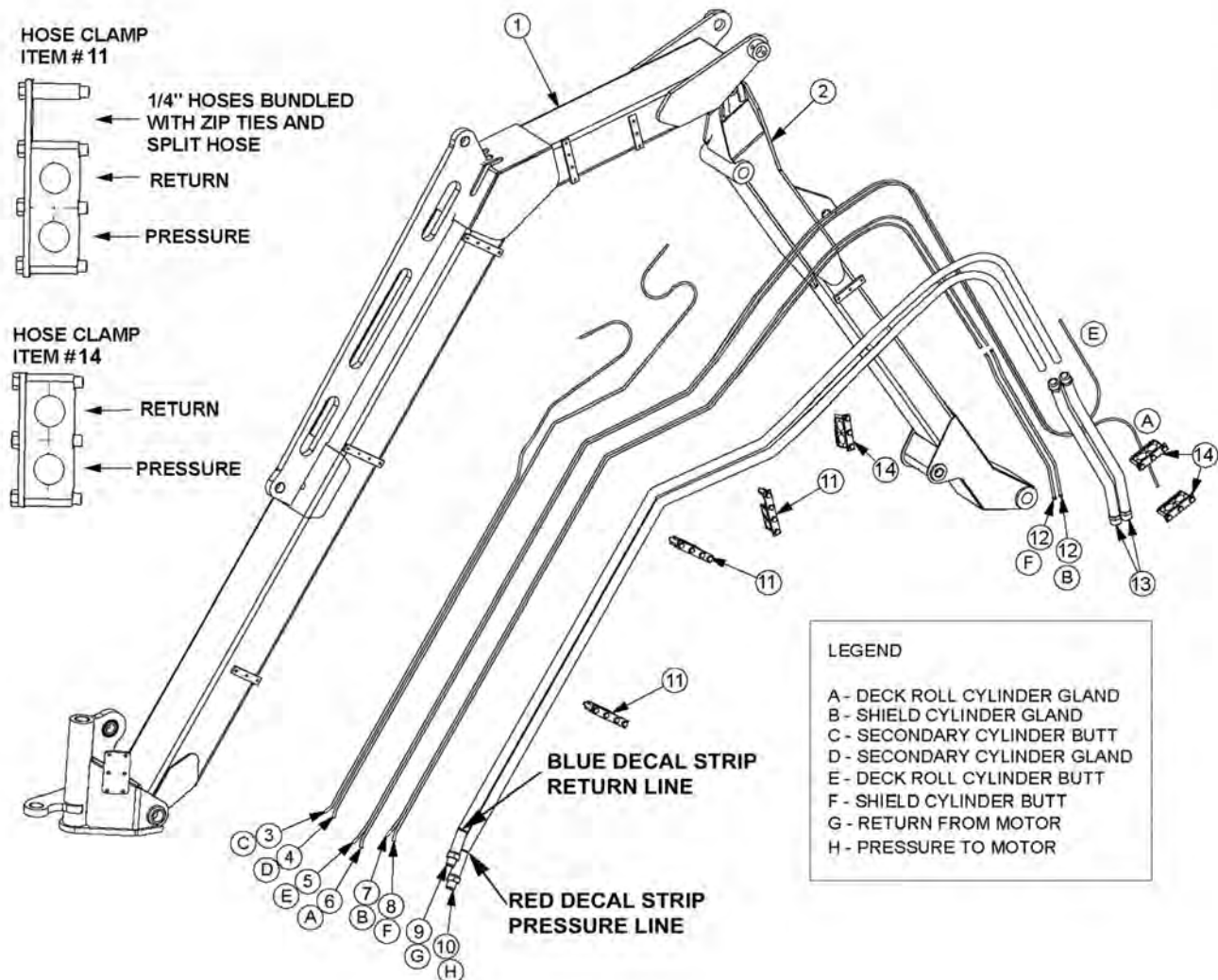
BOOM ASSY BENGAL EXT 24 T4

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	-----	-	SWIVEL ASSY *REFER TO TRACTOR MOUNT KIT
2	06700191	1	MAIN BOOM, EXT, T4
3	06700094	1	SECONDARY BOOM ARM ASSY, EXT, T4
4	32321	2	BEARING, DX, 1-1/2" X 2"
5	TB1044	2	BUSHING, 1-1/4"ID
7	06501020	1	CYLINDER, 5" X 20"
8	TB3010	3	BUSHING, 1"ID
9	TB1035	1	BUSHING,SPACER
10	6T3211	4	GREASE ZERK,1/8"
11	6T3207	3	GREASE ZERK,1/4"
12	35312	1	SET COLLAR
13	06510050	1	TRAVEL LOCK,METRIPACK COIL
14	31329	1	ADAPTER,1/2ORB X 1/2ORB ADJ
15	06501022	1	CYLINDER, 4" X 20"
16	06501023	1	CYLINDER,3" X 18"
17	06537021	6	ROLL PIN,5MM
18	TB1033	1	PIN,1" X 4"
19	TB1036	1	PIN,1" X 4-11/16"
20	TF1143	1	PIN,LYNCH
21	21688	2	CAPSCREW,7/16" X 3-1/4",NC
22	21677	2	NYLOCK NUT,7/16",NC
23	6T3210	1	GREASE ZERK,1/8" X 90°
24	TB1025	1	PIN,1-1/2" X 12"
25	30172	1	CLEVIS,SPHERICAL
26	6T3014	2	ROLL PIN, 1/4" X 2"
27	TB1045B	2	PIN, PRIMARY CYLINDER

COMMON BENGAL T4

BOOM ASSY HYD BENGAL 24 T4



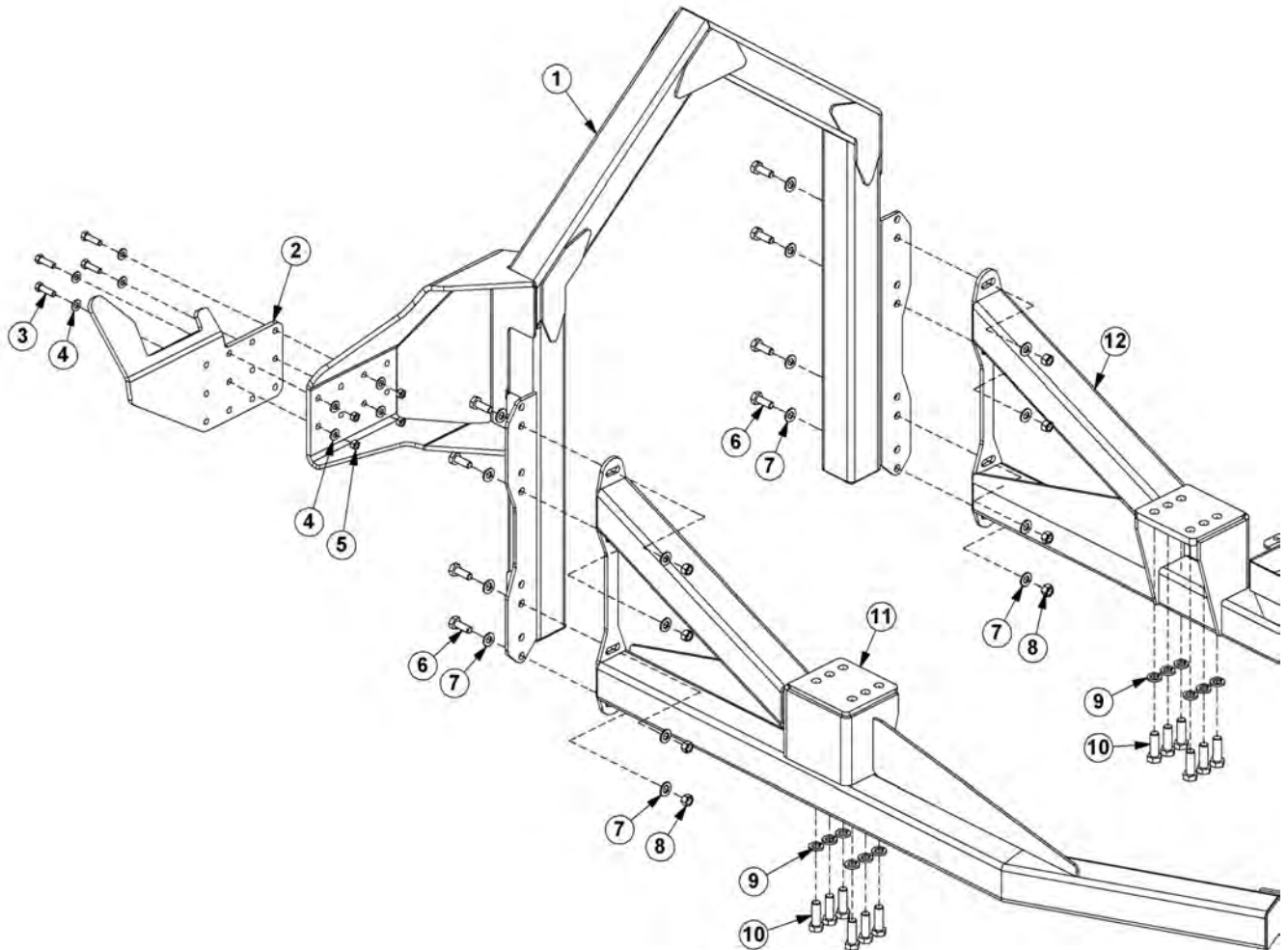
BOOM ASSY HYD BENGAL 24 T4

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	-----	-	MAIN BOOM *REFER TO BOOM ARM ASSY
2	-----	-	SECONDARY BOOM *REFER TO BOOM ARM ASSY
3	06500716	1	HOSE, 1/4" X 100"
4	---	1	HOSE, 1/4" X 100 "
5	06500717	1	HOSE, 1/4" X 170"
6	----	1	HOSE, 1/4" X 170"
7	06500718	1	HOSE, 1/4" X 130"
8	---	1	HOSE, 1/4" X 130"
9	06500715	1	HOSE, 1" X 198"
10	---	1	HOSE, 1" X 198"
11	06505019	3	CLAMP KIT,3 SECTION
12	34103	2	TUBE,PRFRMD,SEC BOOM
13	30169	2	TUBE,PRFRMD,SEC BOOM,HP
14	30111	2	CLAMP KIT,2 SECTION

COMMON BENGAL T4

BOOMREST - OPEN STOW



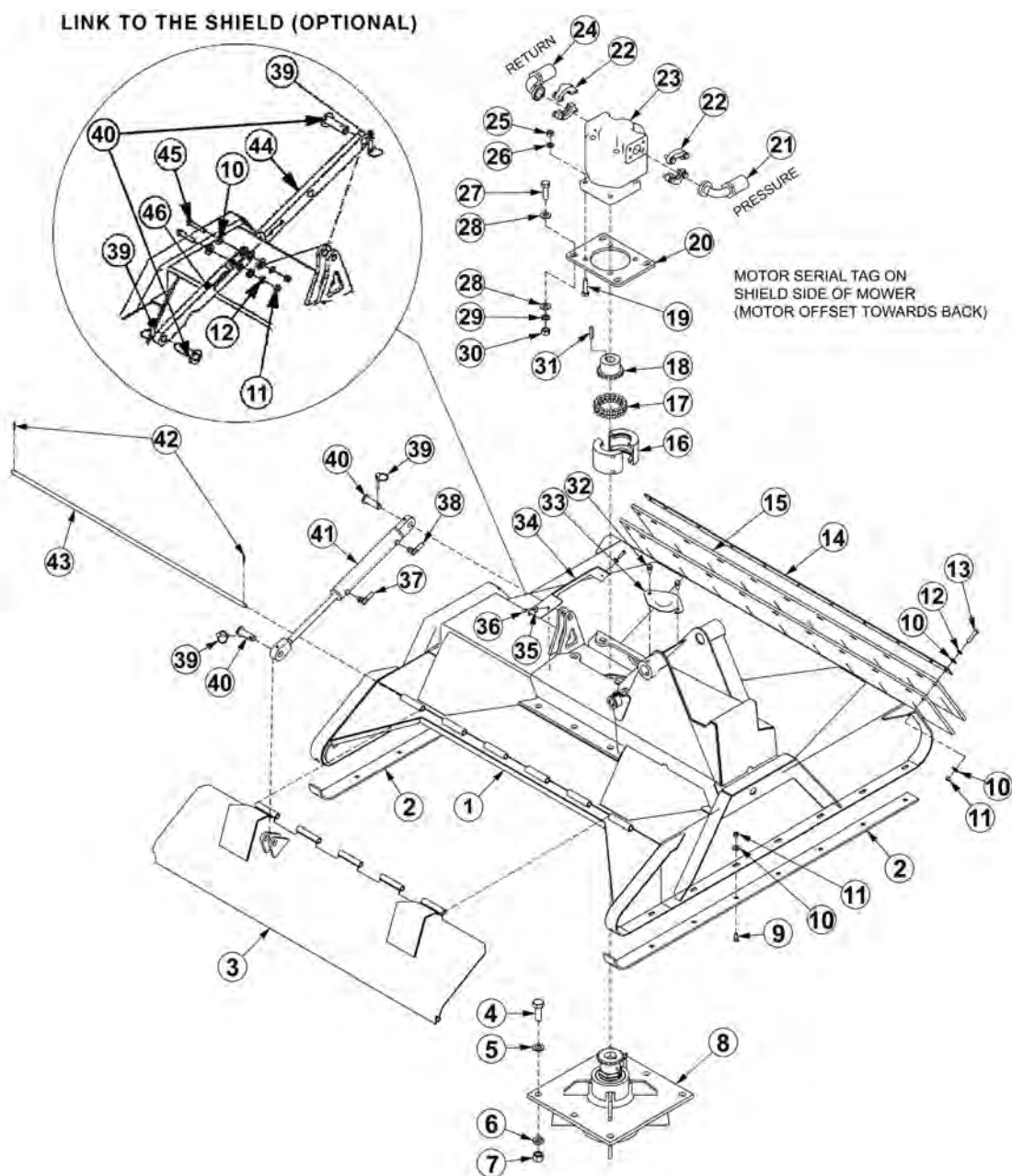
BOOMREST - OPEN STOW

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	06310157	1	BOOMREST,OS
2	06410968	1	SADDLE
3	21732	4	CAPSCREW,1/2" X 1-3/4",NC
4	06533004	8	FLATWASHER,1/2",SAE
5	21725	4	HEX NUT,1/2",NC
6	21782	8	CAPSCREW,5/8" X 1-3/4",NC
7	33764	16	FLATWASHER,5/8",SAE
8	21775	8	HEX NUT,5/8",NC
9	24881	12	LOCKWASHER,20MM
10	27281	12	CAPSCREW,20MM X 60MM,2.5P
11	---	1	AXLE BRACE,RH
12	----	1	AXLE BRACE,LH

COMMON BENGAL T4

50IN ROTARY MOWER ASSEMBLY



ITEM	PART NO.	QTY.	DESCRIPTION
1	33780	1	DECK,WLDMNT,50" RTRY
2	33777	2	SKID SHOE,50" RTRY
3	33754	1	SHIELD,50"RTRY
4	33879	6	CAPSCREW, 3/4 X 2 1/4,NF GR 8
5	33880	6	FLATWASHER,3/4",GR 8,SAE
6	21993	6	LOCKWASHER,3/4",GR 8
7	6T2413	6	HEX NUT,3/4,NF,GR 8
8	6T1024H5	1	SPINDLE ASSY,CPLT,HD,5/8 HOLES

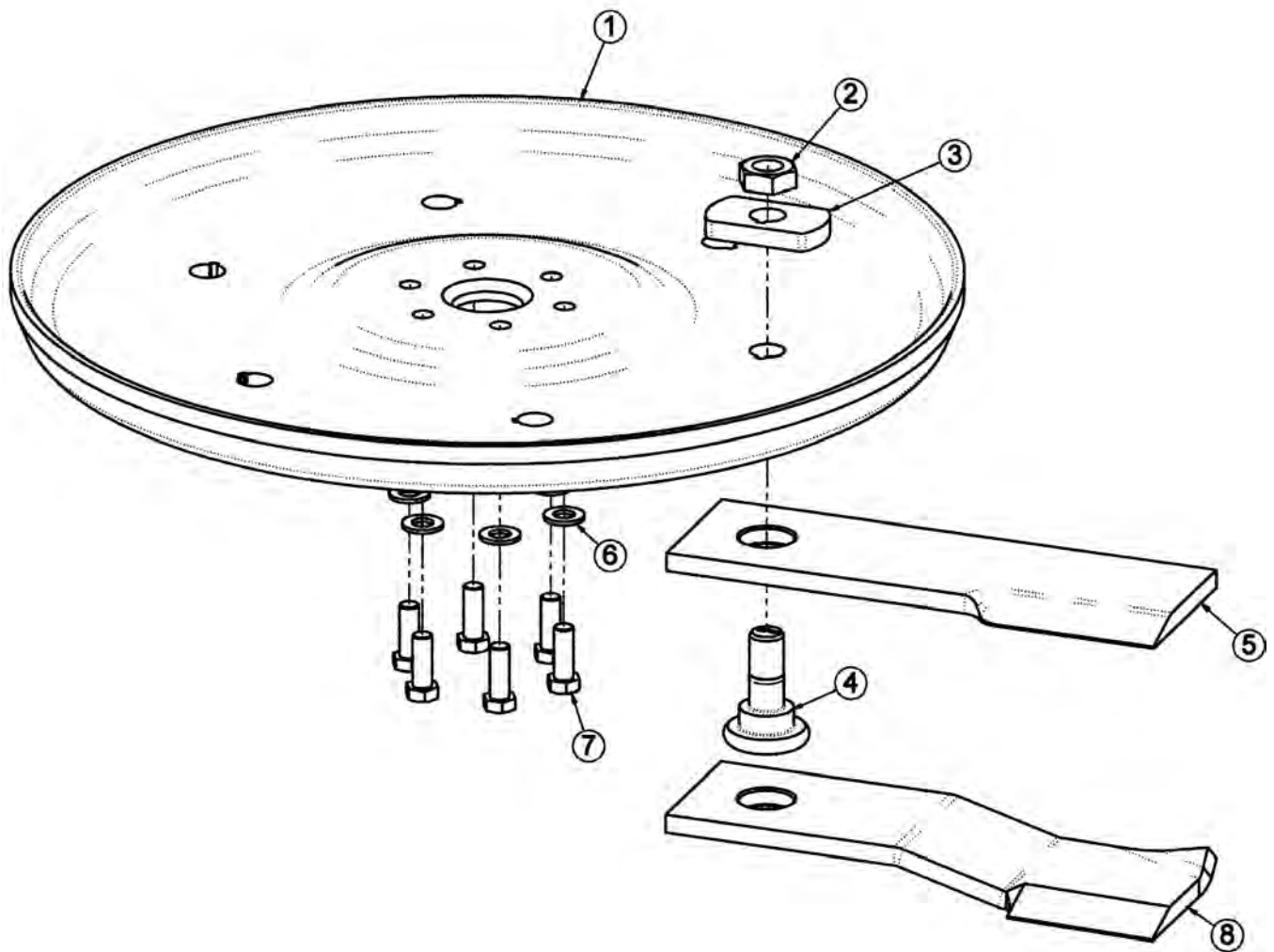
50IN ROTARY MOWER ASSEMBLY

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
9	6T2270	16	PLOW BOLT,3/8" X 1" NC
10	22016	33	FLATWASHER,3/8"
11	21625	20	HEX NUT,3/8",NC
12	21988	11	LOCKWASHER, 3/8"
13	21633	11	CAPSCREW, 3/8 X 1 3/4,NC
14	33774	1	FLAP RETAINER,50" RTRY
15	33775	2	FLAP,50" RTRY
16	6T1033	1	COUPLER COVER
17	6T1029	1	COUPLER CHAIN
18	21223	1	SPROCKET
19	21733	4	CAPSCREW, 1/2 X 2,NC
20	33776	1	MOTOR MOUNT,PLATE,50" RTRY
21	24490	1	HOSE - PRESSURE
---	06500155	1	HOSE- PRESSURE (LRS ONLY)
22	TF4852	2	FLANGE KIT - #20
23	06504012	1	MOTOR
24	24489	1	HOSE - RETURN
---	06500154	1	HOSE-RETURN (LRS ONLY)
25	21725	4	HEX NUT, 1/2" NC
26	06533004	4	FLATWASHER, 1/2"
27	6T2290	4	CAPSCREW,5/8X2,NF GR 8
28	33764	8	FLATWASHER,5/8",GR 8,SAE
29	21992	4	LOCKWASHER, 5/8
30	6T2408	4	HEX NUT, 5/8, NF
31	TF1124	1	SQUARE KEY
32	33881	2	CAPSCREW,FLG, 3/8 X 3/4,NC
33	33779	1	PLATE,COVER,KNF HOLE
34	06410439	1	COVER
35	22014	2	FLATWASHER,1/4
36	21530	2	CAPSCREW,1/4 X 1,NC
37	34187	1	HOSE 1/4" X 75"
38	34186	1	HOSE 1/4" X 66"
39	RD1032	2	LYNCH PIN
40	33984	2	PIN,SHIELD,50"
41	33785	1	1-1/2" X 8", CYLINDER, WELDED
42	6T3017	2	ROLLPIN
43	33778	1	HINGE PIN,50" RTRY
44	33772	1	LINK, SHIELD 50" RTRY
45	21634	2	CAPSCREW, 3/8" X 2, NC
46	33773	1	LINK 2, SHIELD 50" RTRY

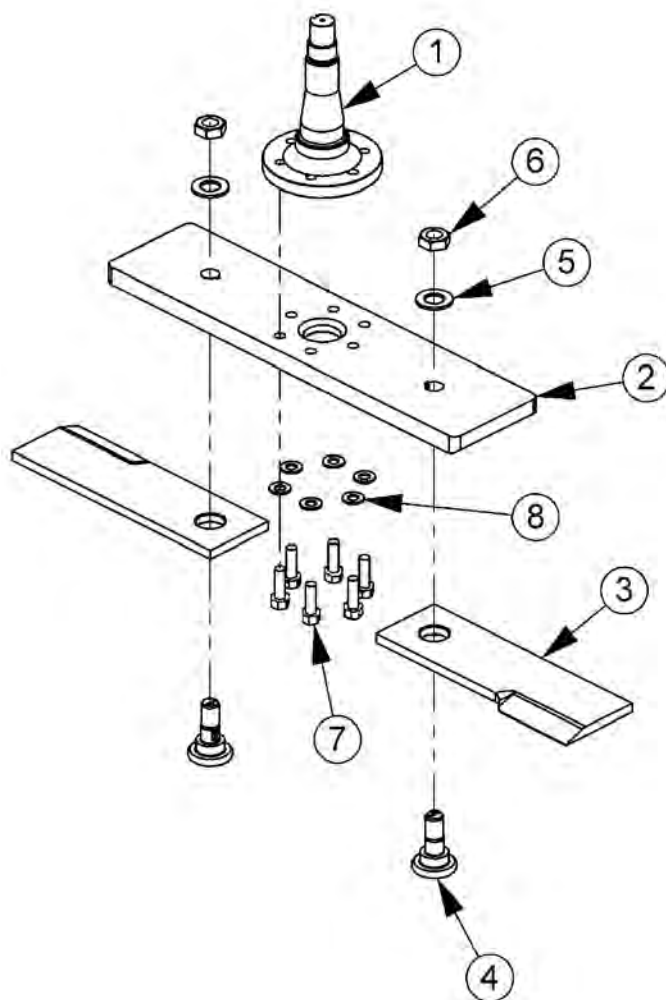
COMMON BENGAL T4

50IN ROTARY KNIVES AND DISH



ITEM	PART NO.	QTY.	DESCRIPTION
-----	06700089	-	KIT,TRB50,DISK,W/BOLT KIT (INCLUDES ITEMS 1,3 & 7)
1	06770003	1	BLADE MOUNTING DISK
2	6T1023R	2	NYLOCK HEX NUT 1 1/8"
3	34878	2	SPACER
4	06538000	2	KNIFE MOUNTING BOLT
5	06521001	2	STANDARD KNIFE
6	33764	6	FLATWASHER
7	6T2259	6	CAPSCREW
-----	06770012	-	BOLT KIT (INCLUDES ITEMS 6, 7 & LOCTITE)
8	06521002	2	GRASS KNIFE (OPTIONAL)
-----	6T1825	-	LOCTITE - USED ON ALL DISK MOUNTING BOLTS

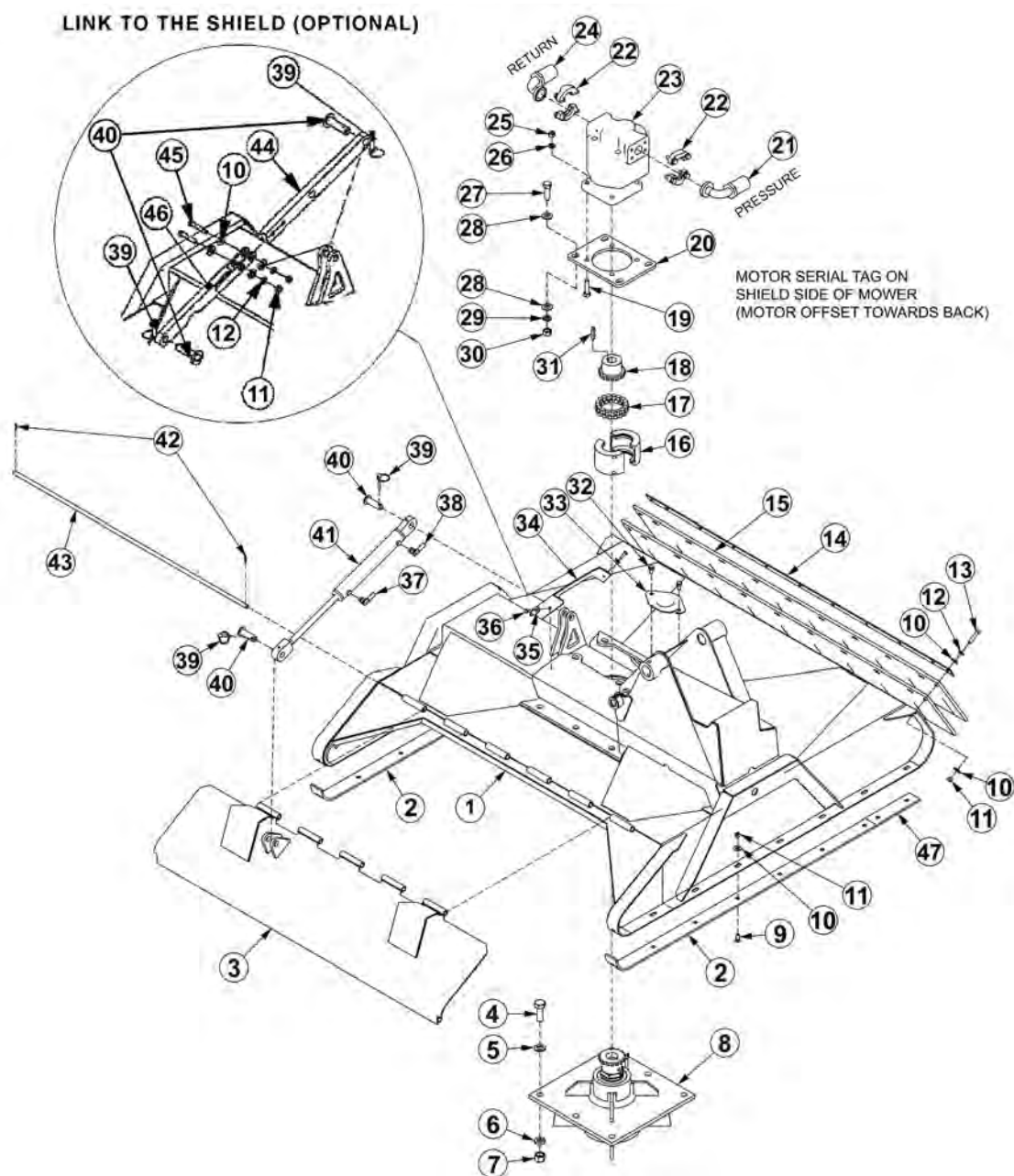
50IN ROTARY BLADE BAR AND KNIVES



ITEM	PART NO.	QTY.	DESCRIPTION
1	PT1018H5	1	SPINDLE,5/8HOLES,HD,WO/TABS
2	06400388	1	BAR,BLADE,TRB
3	06521001	2	KNIFE,TRB50,5/8
4	06538000	2	KNIFE MTG BOLT,5/8 SHOULDER
5	06533002	2	FLATWASHER,1 1/8,GR 8
6	6T1023R	2	KNIFE MTG NUT,1 1/8,NF,GR8
7	6T2259	6	CAPSCREW,5/8X1-3/4,NF,GR8
8	33764	6	FLATWASHER,5/8,GR 8,SAE

COMMON BENGAL T4

60IN ROTARY MOWER ASSEMBLY



ITEM	PART NO.	QTY.	DESCRIPTION
1	06320159	1	DECK,WLDMNT,60" RTRY
2	33777	2	SKID SHOE,RTRY
3	06320162	1	SHIELD,60"RTRY
4	33879	6	CAPSCREW, 3/4 X 2 1/4,NF GR 8
5	33880	6	FLATWASHER,3/4",GR 8,SAE
6	21993	6	LOCKWASHER,3/4",GR 8
7	6T2413	6	HEX NUT,3/4,NF,GR 8
8	6T1024H5	1	SPINDLE ASSY,CPLT,HD,5/8 HOLES

COMMON BENGAL T4

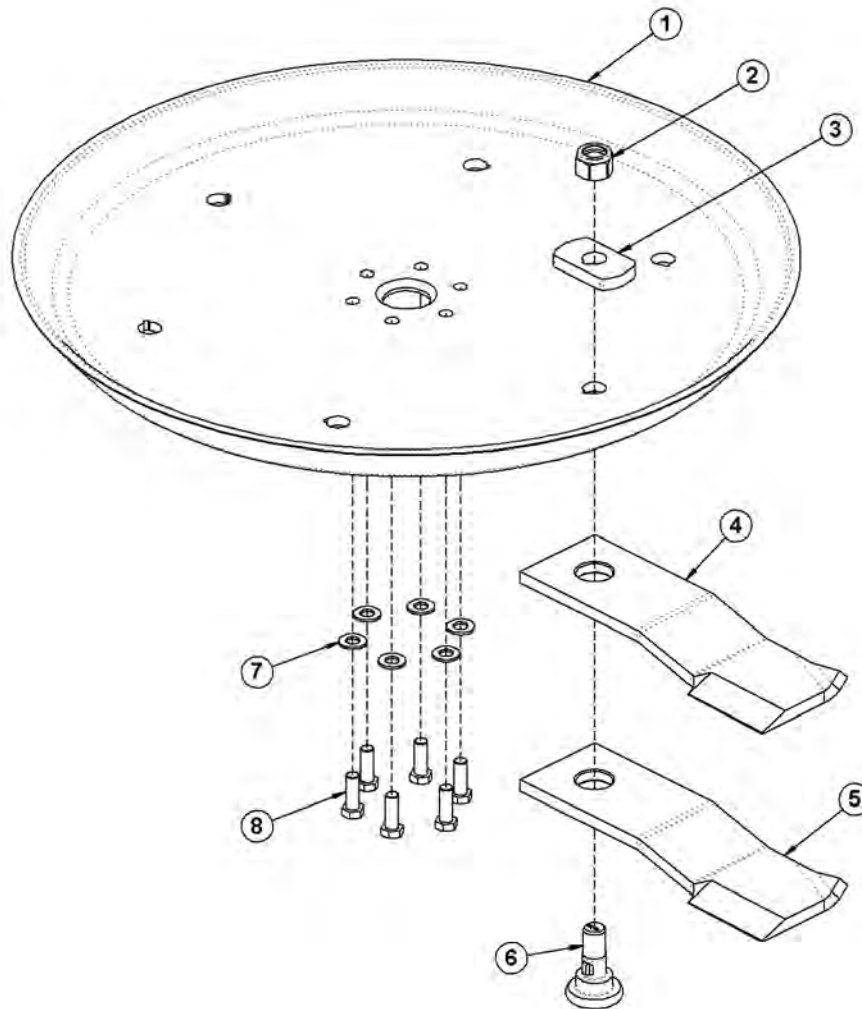
60IN ROTARY MOWER ASSEMBLY

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
9	6T2270	16	PLOW BOLT, 3/8" X 1" NC
10	22016	33	FLATWASHER, 3/8"
11	21625	20	HEX NUT, 3/8", NC
12	21988	11	LOCKWASHER, 3/8"
13	21633	11	CAPSCREW, 3/8 X 1 3/4, NC
14	6T0823	1	FLAP RETAINER, 60" RTRY
15	06520238	2	FLAP, 60" RTRY
16	6T1033	1	COUPLER COVER
17	6T1029	1	COUPLER CHAIN
18	21223	1	SPROCKET
19	21733	4	CAPSCREW, 1/2 X 2, NC
20	33776	1	MOTOR MOUNT, PLATE, RTRY
21	24490	1	HOSE - PRESSURE
---	06500155	1	HOSE-PRESSURE (LRS ONLY)
22	TF4852	2	FLANGE KIT - #20
23	6504011	1	MOTOR
24	24489	1	HOSE - RETURN
---	06500154	1	HOSE-RETURN (LRS ONLY)
25	21725	4	HEX NUT, 1/2" NC
26	06533004	4	FLATWASHER, 1/2"
27	6T2290	4	CAPSCREW, 5/8X2, NF GR 8
28	33764	8	FLATWASHER, 5/8", GR 8, SAE
29	21992	4	LOCKWASHER, 5/8
30	6T2408	4	HEX NUT, 5/8, NF
31	TF1124	1	SQUARE KEY
32	33881	2	CAPSCREW, FLG, 3/8 X 3/4, NC
33	33779	1	PLATE, COVER, KNF HOLE
34	06410439	1	COVER
35	22014	2	FLATWASHER, 1/4
36	21530	2	CAPSCREW, 1/4 X 1, NC
37	34187	1	HOSE 1/4" X 75"
38	34186	1	HOSE 1/4" X 66"
39	RD1032	2	LYNCH PIN
40	33984	2	PIN, SHIELD
41	33785	1	1-1/2" X 8", CYLINDER, WELDED
42	6T3017	2	ROLLPIN
43	06420139	1	HINGE PIN, 60" RTRY
44	33772	1	LINK, SHIELD, RTRY
45	21634	2	CAPSCREW, 3/8" X 2, NC
46	33773	1	LINK 2, SHIELD, RTRY
47	06401245	2	SKID SHOE, TRB60

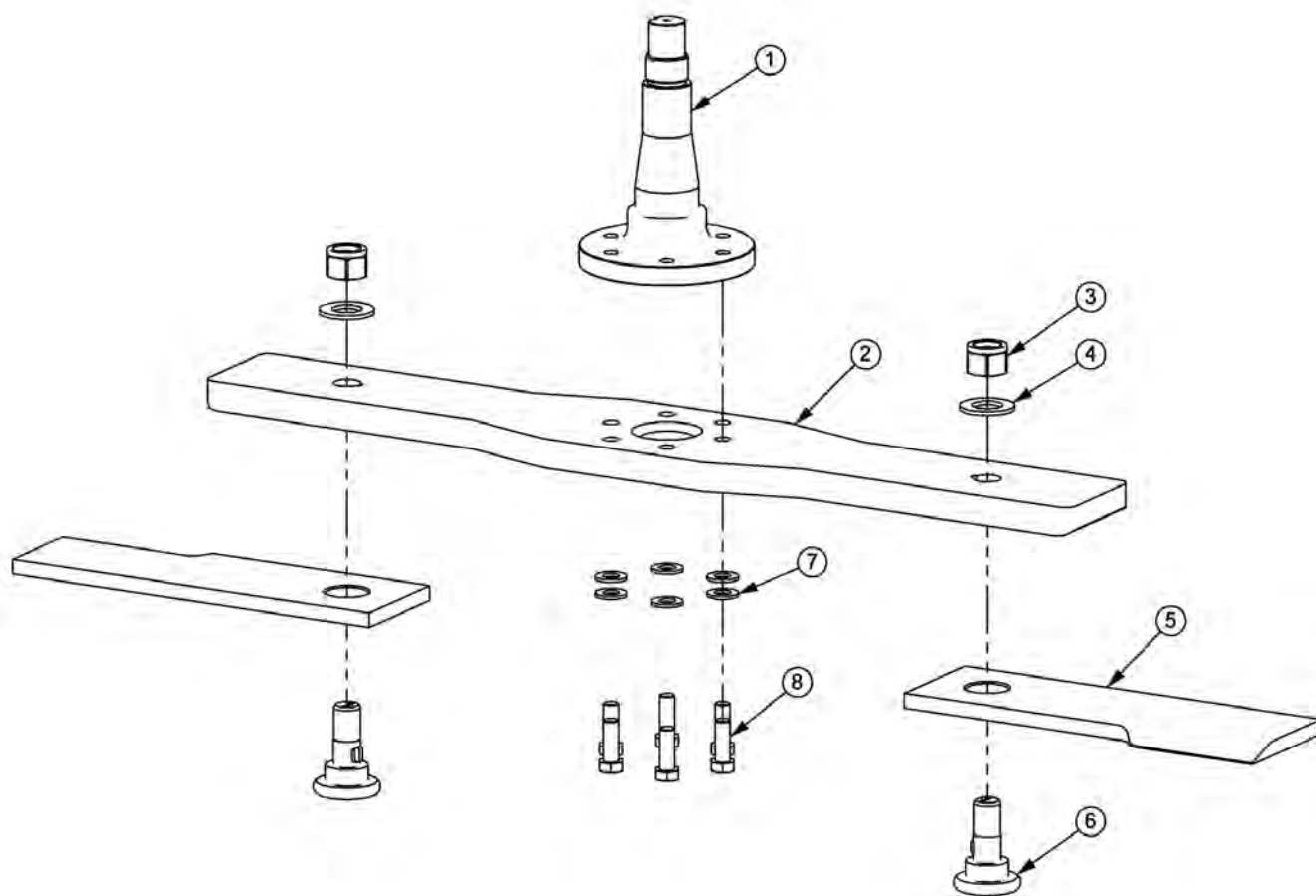
COMMON BENGAL T4

60IN ROTARY KNIVES AND DISH



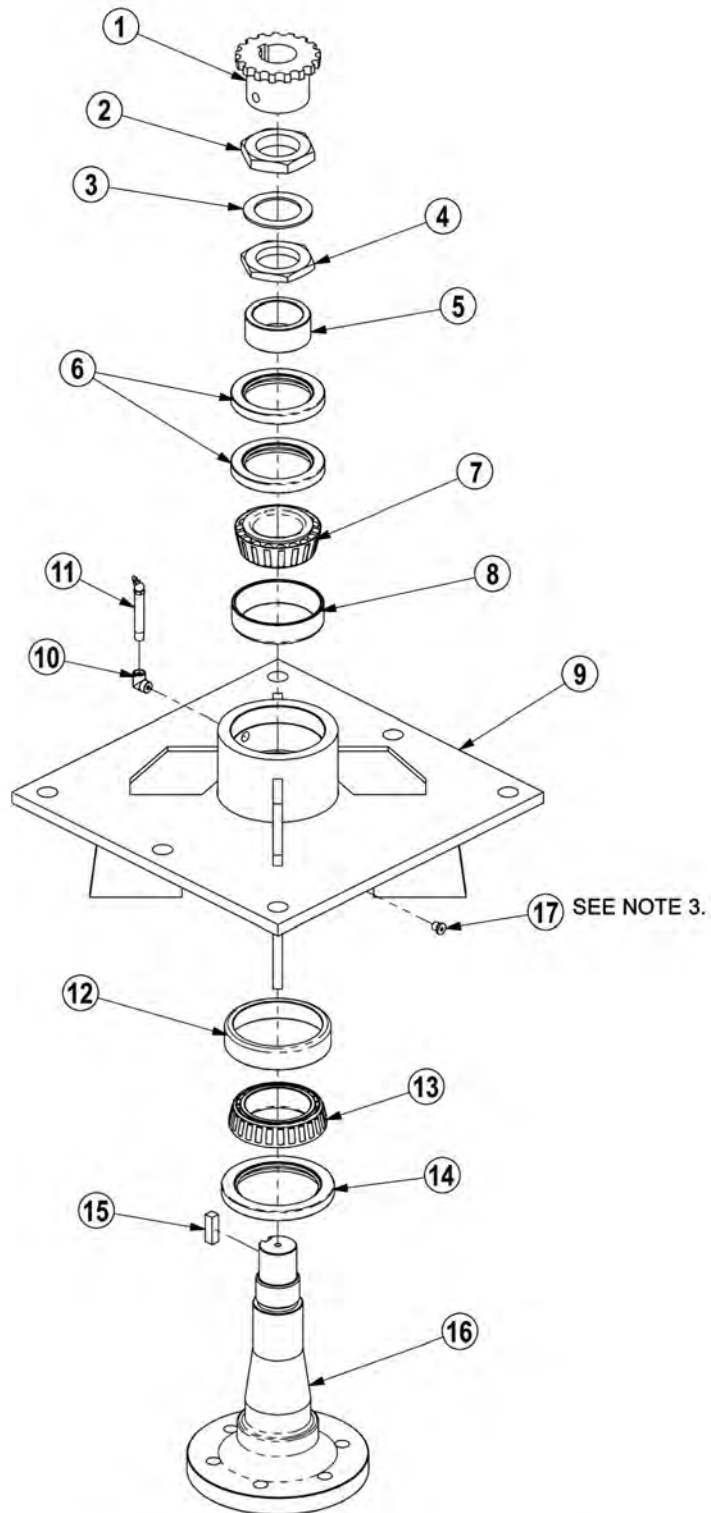
ITEM	PART NO.	QTY.	DESCRIPTION
1	34876	1	BLADE MOUNTING DISH,60"
2	6T1023R	2	NYLOCK NUT,1-1/8",NF
3	34878	2	SPACER
4	34684	2	STANDARD GRASS KNIFE
5	34685	2	HIGH SUCTION GRASS KNIFE (OPTIONAL)
6	34497	2	KNIFE MOUNTING BOLT
7	25270	6	FLATWASHER,5/8",GR8,USS
8	6T2259	6	CAPSCREW,5/8" X 1-3/4",NF,GR8
---	6T1825	1	LOCTITE (USED ON ITEM 8)
----	27167	1	BOLT KIT (ITEMS 7 & 8)
---	33893	1	KNIFE KIT (ITEMS 2,4 & 6)

60IN ROTARY BLADE BAR AND KNIVES



ITEM	PART NO.	QTY.	DESCRIPTION
1	PT1018H5	1	SPINDLE
2	06400690	1	BAR,BLADE,RTRY60
3	6T1023R	2	KNIFE MTG NUT,1-1/8,NYLOCK,NF
4	06533002	2	FLATWASHER,1-1/8,GR8
5	06521001	2	KNIFE,TRB50,5/8
6	06538000	2	KNIFE MTG BOLT,5/8 SHOULDER
7	33764	6	FLATWASHER,5/8,GR 8,SAE
8	6T2259	6	CAPSCREW,5/8 X 1-3/4,NF,GR8

ROTARY MOWER SPINDLE ASSEMBLY



NOTES:

1. FREEPLAY: .001" - .003"
2. GREASE: FILL WITH MOBILITH SHC 220.
3. APPLY LOCTITE "271" TO O-RING PLUG THRDS.

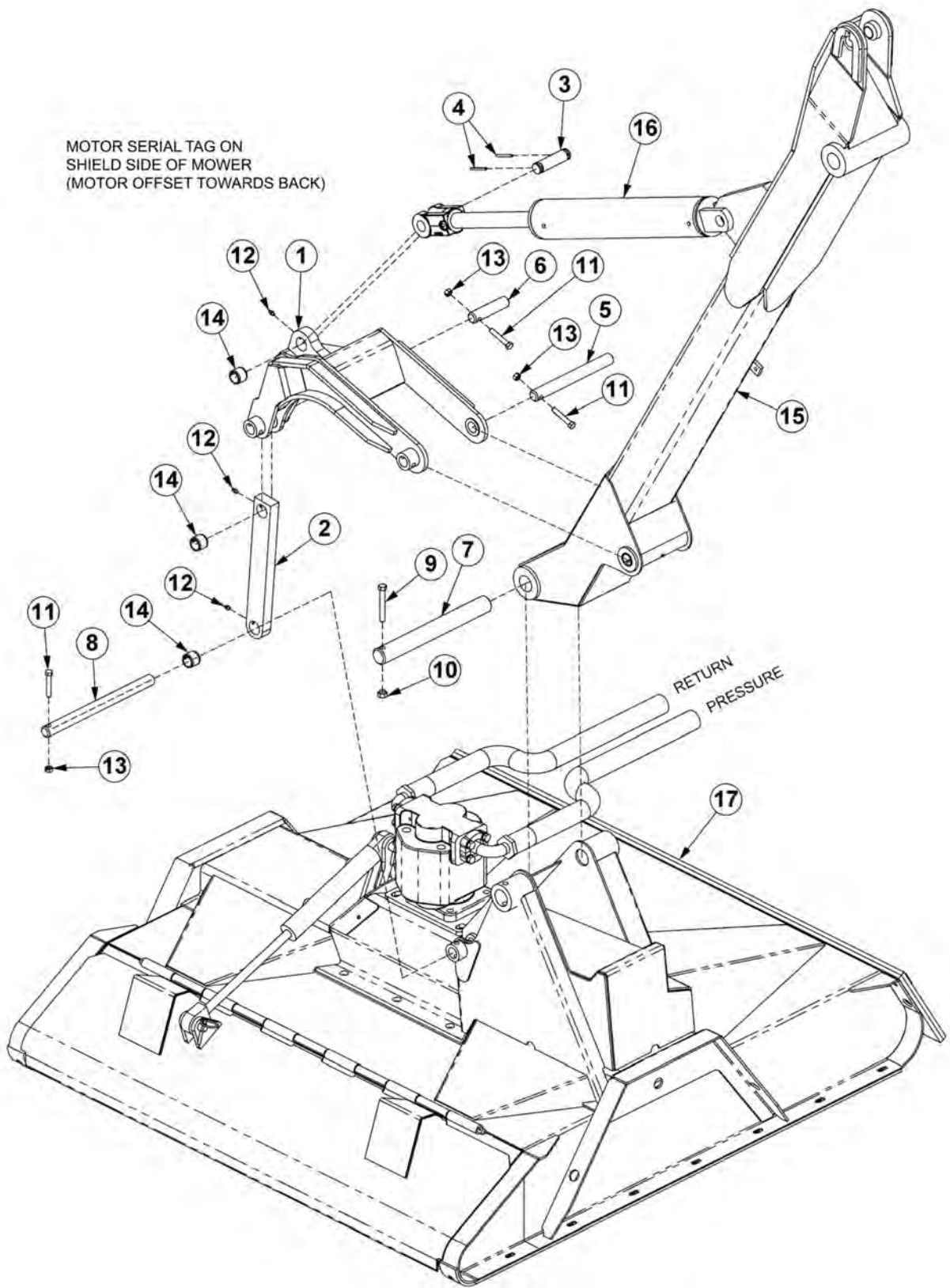
ROTARY MOWER SPINDLE ASSEMBLY

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
-----	6T1024H5	-	SPINDLE ASSEMBLY COMPLETE
1	6T1031	1	SPROCKET
2	6T1016	1	BEARING LOCK NUT - THICK
3	22596	1	JAM WASHER
4	6T1015	1	BEARING ADJUSTMENT NUT - THIN
5	6T1014	1	BEARING ADJUSTMENT SLEEVE
6	6T1011	1	UPPER SEAL - SET OF 2
7	6T1012	1	BEARING CONE
8	6T1013	1	BEARING CUP
9	6T1010H	1	SPINDLE HOUSING
10	30570	1	FITTING STREET ELBOW
11	33990	1	GREASE ZERK
12	6T1013H	1	BEARING CUP
13	6T1012H	1	BEARING CONE
14	6T1011H	1	LOWER SEAL
15	6T1019	1	SPINDLE KEY
16	PT1018H5	1	SPINDLE
17	06503064	1	O-RING PLUG, 1/8"
-----	31771	-	SPINDLE REBUILD KIT (INCLUDES ITEMS 2 - 8 AND 12 - 15)

COMMON BENGAL T4

BOOM ROTARY PIVOT ASSEMBLY

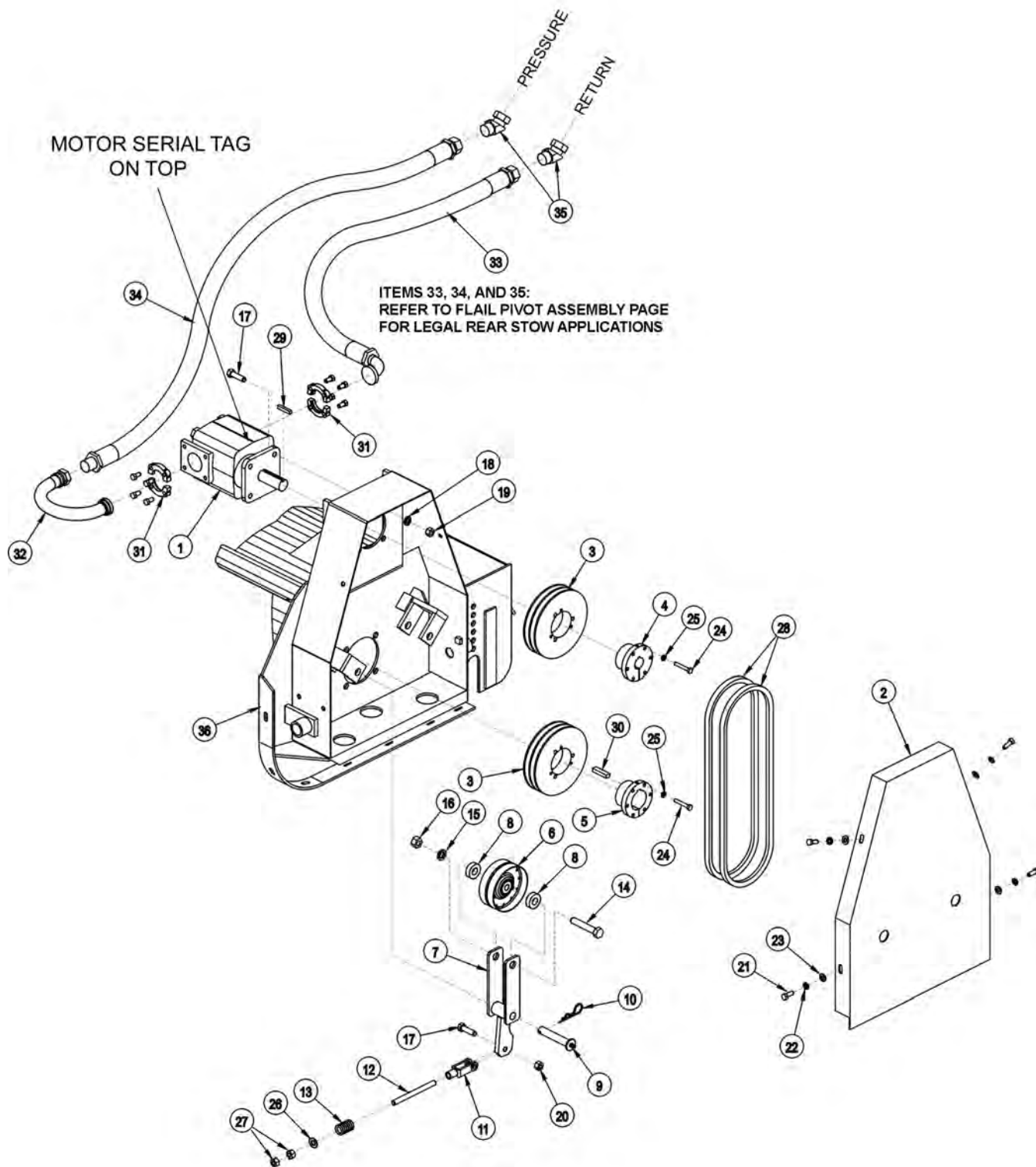


BOOM ROTARY PIVOT ASSEMBLY

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	TB1032	1	ROTARY PIVOT ASSY
2	TB1028	1	PIVOT ARM ASSY
3	TB1033	1	PIN,CLEVIS
4	06537021	2	ROLL PIN
5	TF3097	1	PIN
6	TB1030	1	PIN
7	33985	1	PIN
8	33986	1	PIN
9	21688	1	CAPSCREW,7/16 X 3-1/4,NC
10	21677	1	NYLOCK NUT,7/16 NC
11	21635	3	CAPSCREW,3/8 X 2-1/4
12	6T3207	3	GREASE ZERK
13	21627	3	NYLOCK NUT,3/8,NC
14	TB3010	3	BUSHING
15	-----	-	SECONDARY BOOM *REFER TO BOOM ARM ASSY
16	-----	-	CYLINDER *REFER TO BOOM ARM ASSY
17	-----	-	ROTARY MOWER HEAD *REFER TO ROTARY DECK

50IN FLAIL DRIVE ASSEMBLY



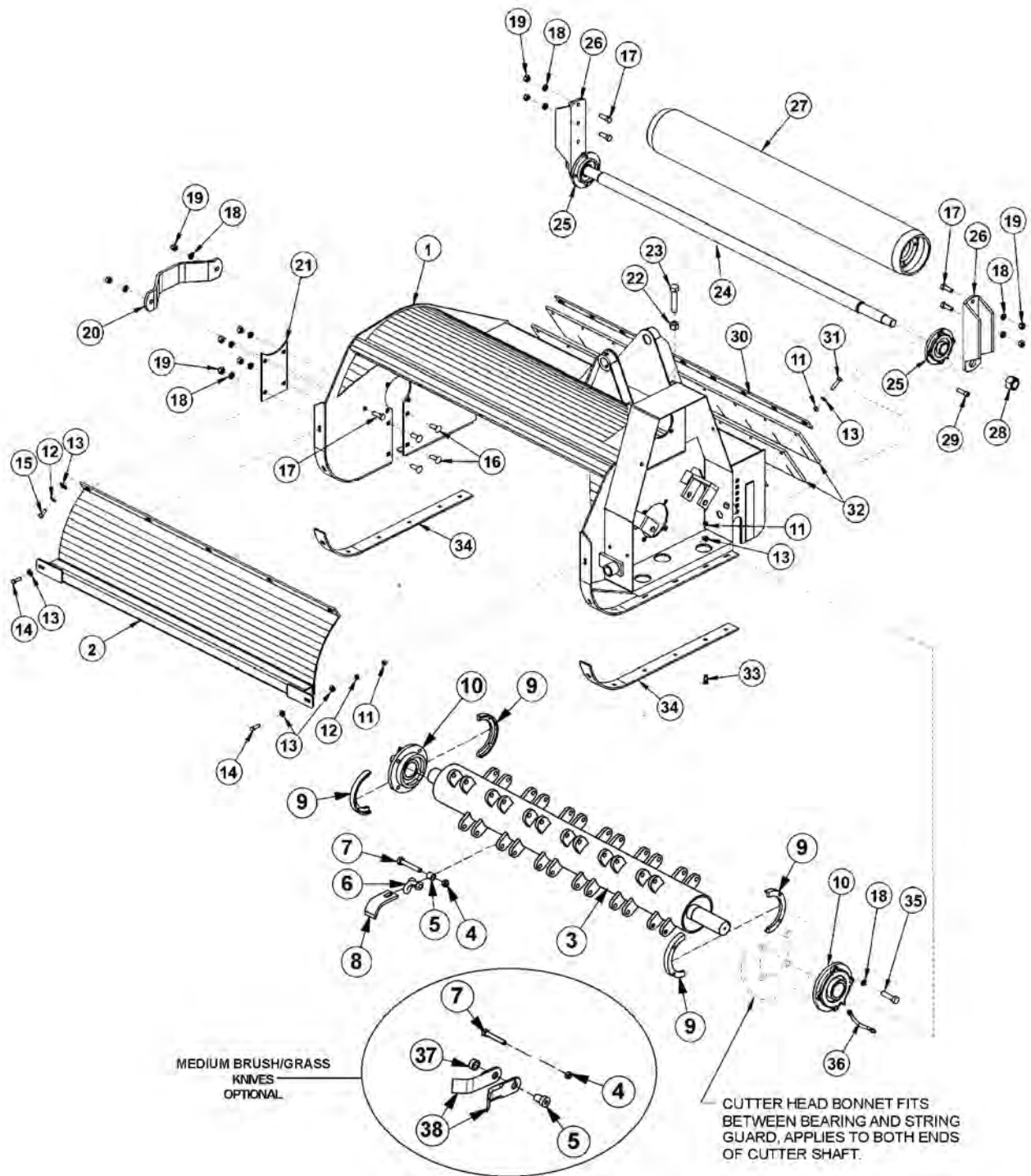
50IN FLAIL DRIVE ASSEMBLY

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	06504132	1	MOTOR (M350-1 3/4" GEAR)
2	TF3006	1	BELT GUARD
3	TF3043	2	SHEAVE
4	TF3013	1	BUSHING
5	TF3011	1	BUSHING
6	TF3034	1	IDLER PULLEY
7	TF3205	1	IDLER ARM
8	TF3206	2	IDLER PULLEY SPACER
9	TF3605	1	IDLER ARM PIN WITH ZERK
10	6T3004	1	R - CLIP
11	PT3611A	1	CLEVIS
12	32481	1	THREADED ROD
13	TF3620	1	COMPRESSION SPRING
14	21789	1	CAPSCREW 5/8" X 3 1/2"
15	21992	1	LOCKWASHER 5/8"
16	21775	1	HEX NUT 5/8"
17	21732	5	CAPSCREW 1/2" X 1 3/4"
18	21990	4	LOCKWASHER 1/2"
19	21725	4	HEX NUT 1/2"
20	6T2418	1	LOCK NUT 1/2"
21	21630	4	CAPSCREW 3/8" X 1"
22	21988	4	LOCKWASHER 3/8"
23	22016	4	FLATWASHER 3/8"
24	21584	6	CAPSCREW 5/16" X 2"
25	21987	6	LOCKWASHER 5/16"
26	27938	1	FLATWASHER 1/2"
27	21700	2	HEX NUT 1/2" NF
28	TF3021	2	BELT
29	TF1125	1	SQUARE KEY
30	TF1025	1	SQUARE KEY MOTOR
31	TF4852	2	FLANGE KIT
32	34227	1	PREFORMED TUBE
33	31218	1	HOSE - RETURN
34	34331	1	HOSE - PRESSURE
35	24724	2	SWIVEL FITTING
36	-----	-	CUTTER HEAD *REFER TO CUTTER HEAD ASSY

COMMON BENGAL T4

50IN FLAIL MOWER ASSEMBLY



ITEM	PART NO.	QTY.	DESCRIPTION
---	34787	1	FLAIL,BOOM,50,BRUSH,CPLT ASSY (LIGHT BRUSH/GRASS)
---	06742133	1	FLAIL,BOOM,50,MD GRASS,CPLT ASSY (MEDIUM BRUSH/GRASS)
1	TF3003F	1	CUTTER HEAD BONNET
2	TF3004	1	FRONT SHIELD

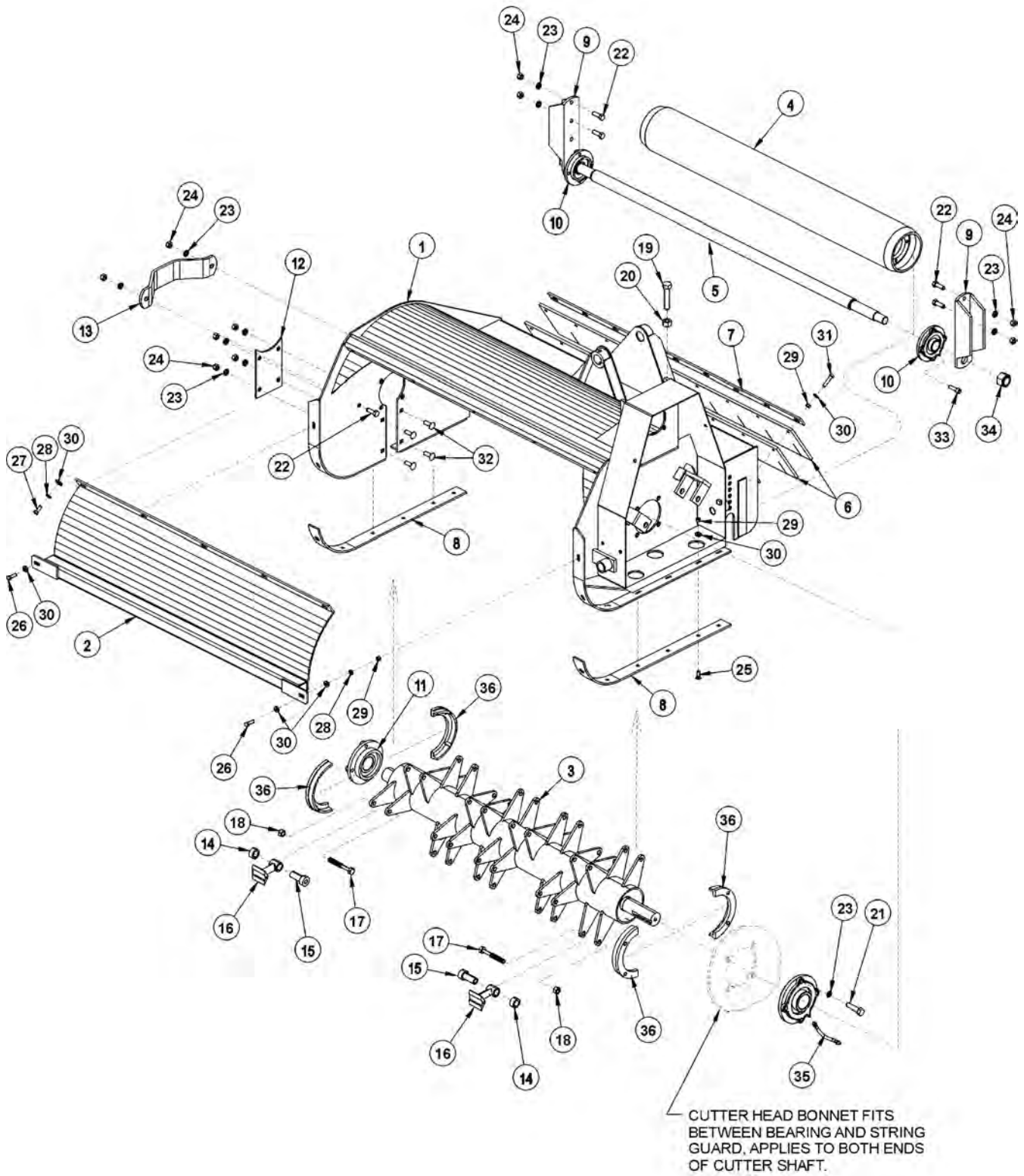
50IN FLAIL MOWER ASSEMBLY

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
3	34783	1	TBF50 (LIGHT BRUSH/GRASS KNIFE ASSY)
----	06700115	1	TBF50 (MEDIUM BRUSH/GRASS KNIFE ASSY)
4	6T2419	24	HEX NUT,9/16",NC,STOVER
5	06420182	24	BUSHING
6	34782	24	CLEVIS (LIGHT BRUSH/GRASS KNIVES)
7	34786	24	CAPSCREW,9/16" X 3-1/2",NC
8	34780	24	KNIFE (LIGHT BRUSH/GRASS CUTTING)
9	31204	2	STRING GUARD SET (2 PIECES PER SET)
10	TF1018	2	FLANGE BEARING,2-3/16"
11	21625	23	HEX NUT,3/8",NC
12	21988	7	LOCKWASHER,3/8"
13	22016	30	FLATWASHER,3/8"
14	21631	2	CAPSCREW,3/8" X 1-1/4",NC
15	21630	5	CAPSCREW,3/8" X 1",NC
16	6T7031D	4	PLOW BOLT,1/2" X 1-1/2",NC
17	21731	6	CAPSCREW,1/2" X 1-1/2",NC
18	21990	18	LOCKWASHER,1/2"
19	21725	10	HEX NUT,1/2",NC
20	TF1040	1	CUTTER SHAFT GUARD
21	TF3007A	1	COVER PLATE
22	21825	1	HEX NUT,5/8",NC
23	21838	1	CAPSCREW,3/4" X 3-1/2",NC
24	TF3406	1	GROUND ROLLER TIE ROD
25	TF1022	2	FLANGE BEARING,1-3/8"
26	TF3407	2	GROUND ROLLER ADJUSTMENT BRACKET
27	TF3405	1	GROUND ROLLER
28	6T1023R	2	NYLOCK NUT,1-1/8",NF
29	6T2330	8	CAPSCREW,7/16" X 1-1/2",SOCKET HEAD
30	TB1008	1	FLAP RETAINING BAR
31	21633	9	CAPSCREW,3/8" X 1-3/4",NC
32	TB1006A	2	DEFLECTOR FLAP
33	6T2270	12	PLOWBOLT,3/8" X 1",NC
34	TF3001	2	SKID SHOE
35	06530218	8	CAPSCREW,1/2" X 1-3/4",NC
36	TF1032	1	FLANGE BEARING GREASE HOSE
37	06420183	24	SPACER (MEDIUM BRUSHGRASS KNIVES)
38	06521007	48	KNIFE (MEDIUM BRUSH/GRASS CUTTING)

COMMON BENGAL T4

50IN FLAIL MOWER ASSY, PASS-THROUGH KNIVES



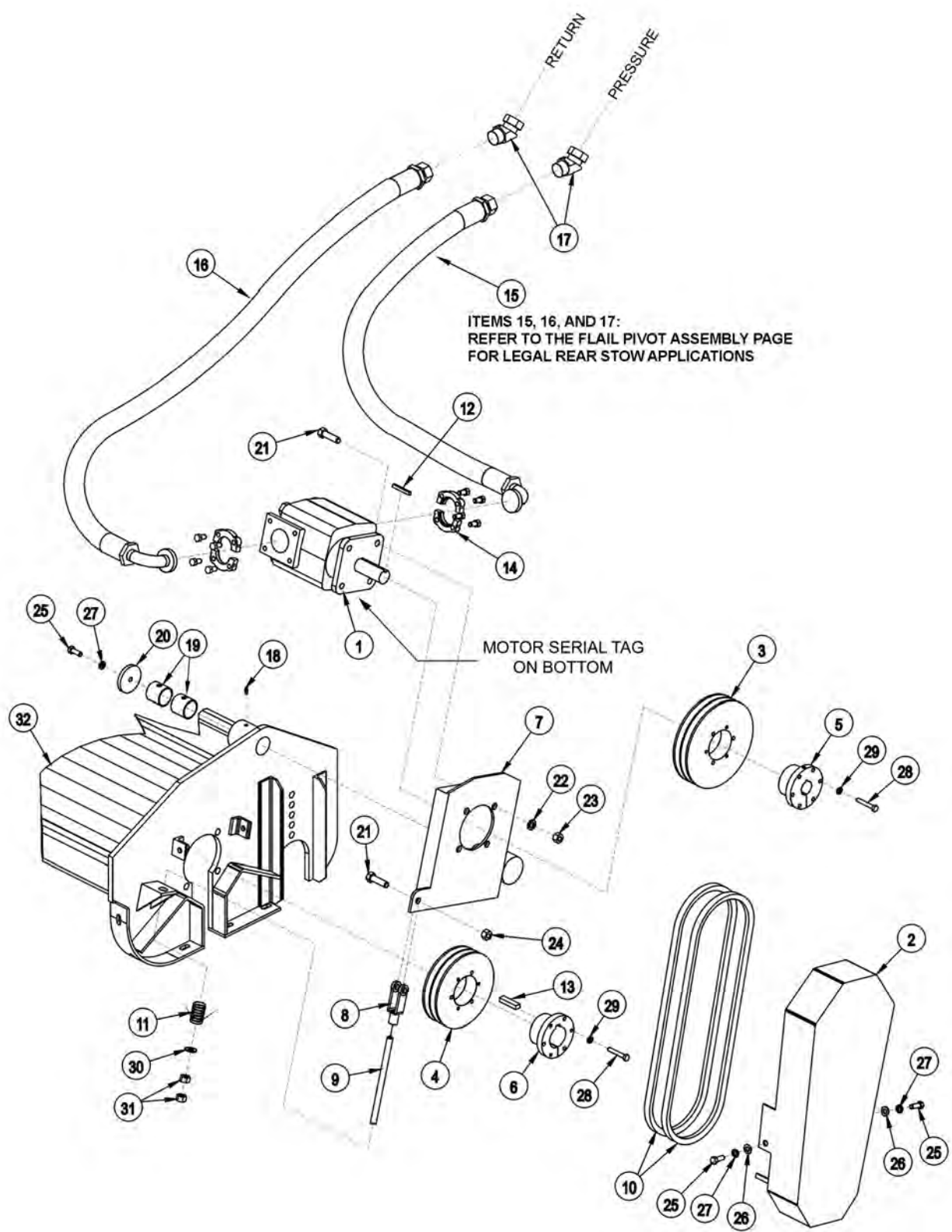
50IN FLAIL MOWER ASSY, PASS-THROUGH KNIVES

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
---	34172	1	FLAIL,BOOM,50,CPLT ASSY
1	TF3003F	1	CUTTER HEAD BONNET
2	TF3004	1	FRONT SHIELD
3	33717	1	TBF50,CUTTERSHAFT,PASS THRU KNIVES
4	TF3405	1	GROUND ROLLER
5	TF3406	1	GROUND ROLLER TIE ROD
6	TB1006A	2	DEFLECTOR FLAP
7	TB1008	1	FLAP RETAINING BAR
8	TF3001	2	SKID SHOE
9	TF3407	2	GROUND ROLLER ADJUSTMENT BRACKET
10	TF1022	2	FLANGE BEARING,1-3/8"
11	TF1018	2	FLANGE BEARING,2-3/16"
12	TF3007A	1	COVER PLATE
13	TF1040	1	CUTTER SHAFT GUARD
14	33858	24	SPACER,COLLAR
15	33857	24	SHOULDER,BUSHING
16	46399.01	24	KNIFE,FLAIL,FORGED
17	33854	24	CAPSCREW,5/8" X 4-1/2",NC
18	32674	24	HEX NUT,5/8",NC
19	21838	1	CAPSCREW,3/4" X 3-1/2",NC
20	21825	1	HEX NUT,5/8",NC
21	21732	8	CAPSCREW,1/2" X 1-3/4",NC
22	21731	6	CAPSCREW,1/2" X 1-1/2",NC
23	21990	18	LOCKWASHER,1/2"
24	21725	10	HEX NUT,1/2",NC
25	6T2270	12	PLOWBOLT,3/8" X 1",NC
26	21631	2	CAPSCREW,3/8" X 1-1/4",NC
27	21630	5	CAPSCREW,3/8" X 1",NC
28	21988	7	LOCKWASHER,3/8"
29	21625	23	HEX NUT,3/8",NC
30	22016	30	FLATWASHER,3/8"
31	21633	9	CAPSCREW,3/8" X 1-3/4",NC
32	6T7031D	4	PLOW BOLT,1/2" X 1-1/2",NC
33	6T2330	8	CAPSCREW,7/16" X 1-1/2",NC,SCKT HD
34	6T1023R	2	NYLOCK NUT,1-1/8",NF
35	TF1032	1	FLANGE BEARING GREASE HOSE
36	31204	2	STRING GUARD SET (2 PIECES PER SET)

COMMON BENGAL T4

63IN FLAIL DRIVE ASSEMBLY



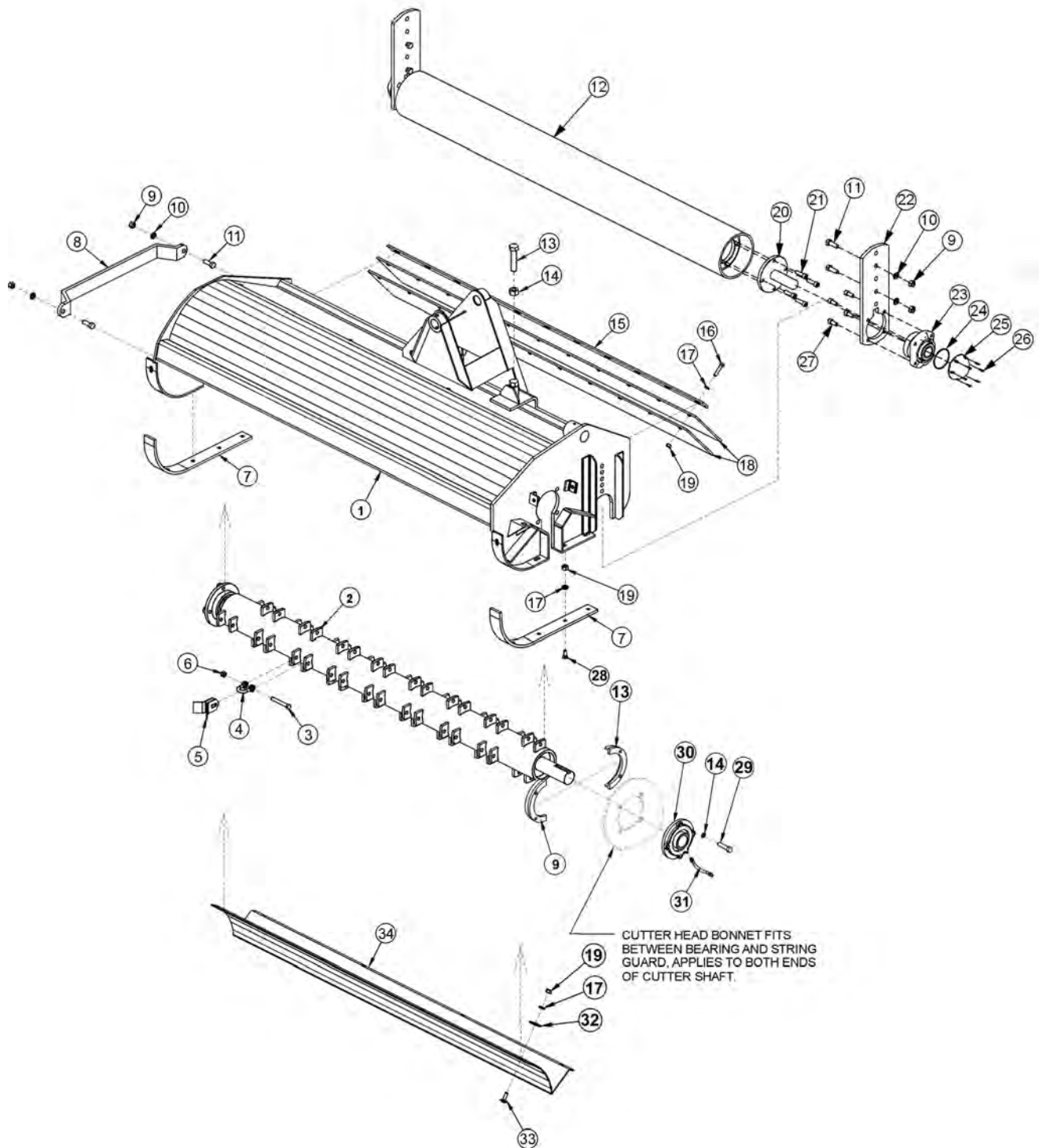
63IN FLAIL DRIVE ASSEMBLY

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	06504132	1	MOTOR (M350-1 3/4 GEAR)
2	32569	1	BELT GUARD
3	TF3044	1	UPPER SHEAVE
4	TF3040	1	LOWER SHEAVE
5	TF3013	1	BUSHING
6	28723	1	BUSHING
7	28679B	1	MOTOR CHANNEL
8	PT3611A	1	CLEVIS
9	40496	1	THREADED ROD
10	28702	2	BELT
11	TF3620A	1	TENSIONER SPRING
12	28572	1	SQUARE KEY
13	26142A	1	SQUARE KEY
14	TF4852	2	FLANGE KIT
15	30308	1	HOSE,1 X 69 - PRESSURE
16	30309	1	HOSE,1 X 78 - RETURN
17	24724	2	SWIVEL FITTING
18	TF1033	1	GREASE ZERK
19	27580	2	BUSHING
20	28682	1	MOTOR CHANNEL WASHER
21	21732	5	CAPSCREW 1/2" X 1 3/4"
22	21990	4	LOCKWASHER 1/2"
23	21725	4	HEX NUT 1/2"
24	6T2418	1	STOVER NUT 1/2"
25	21630	3	CAPSCREW 3/8" X 1"
26	22016	2	FLATWASHER 3/8"
27	21988	3	LOCKWASHER 3/8"
28	21584	6	CAPSCREW 5/16" X 2"
29	21987	6	LOCKWASHER 5/16"
30	27938	1	FLATWASHER 1/2"
31	21700	2	HEX NUT 1/2" NF
32	-----	-	CUTTER HEAD *REFER TO MOWER ASSY

COMMON BENGAL T4

63IN FLAIL MOWER ASSEMBLY



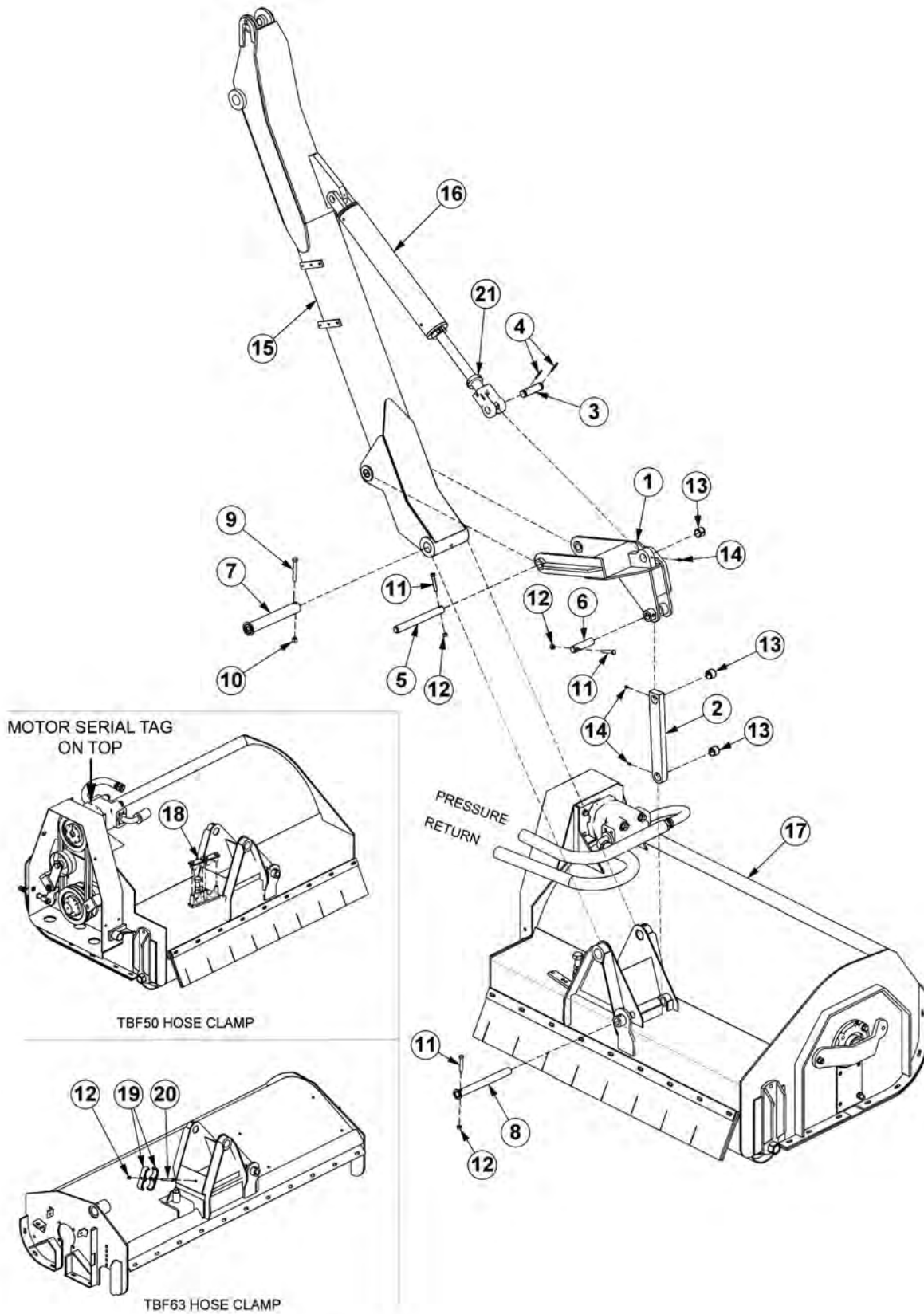
63IN FLAIL MOWER ASSEMBLY

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
-----	06200271	-	FLAIL,BOOM,63,GRASS,CPLT ASSY
1	28659H	1	CUTTER HEAD BONNET
2	28743	-	CUTTER SHAFT / KNIFE ASSY STANDARD GRASS
-----	28642C	1	CUTTER SHAFT,63,STD
3	34011	36	FLAIL KNIFE MOUNTING BOLT
4	TF1020	36	FLAIL KNIFE MOUNTING CLEVIS
5	33713	72	FLAIL KNIFE - STANDARD
6	21677	36	NYLOCK NUT
7	28086A	2	SKID SHOE
8	27975A	1	CUTTER SHAFT GUARD
9	21725	14	HEX NUT 1/2"
10	21990	14	LOCKWASHER 1/2"
11	21731	6	CAPSCREW 1/2" X 1 1/2"
12	06320240	1	GROUND ROLLER
13	33863	2	STRING GUARD,STD
14	06533006	8	FLATWASHER,1/2",SAE,L9
15	28700	1	FLAP RETAINING BAR
16	21633	11	CAPSCREW 3/8" X 1 3/4"
17	21988	28	LOCKWASHER 3/8"
18	28701	2	DEFLECTOR FLAP
19	21625	28	HEX NUT 3/8"
20	TF1045B	2	GROUND ROLLER STUB SHAFT
21	6T2330	8	CAPSCREW 7/16" X 1 1/2" SOCKET HEAD
22	28735	2	ADJUSTABLE ROLLER BRACKET
23	06520028	2	BEARING,FLANGE,1-3/8,GRNDRLLR
24	06520029	2	O-RING
25	06520027	2	CAP,BEARING,GROUNDROLLER
26	06530001	12	CAPSCREW,SKT HD,8-32 X 1/2,SS
27	6T2331	8	CAPSCREW 7/16" X 1" SOCKET HEAD
28	6T2270	10	PLOW BOLT 3/8" X 1 1/4"
29	06530217	8	CAPSCREW 1/2" X 2",L9
30	28683	2	FLANGE BEARING
31	TF1032	1	FLANGE BEARING GREASE HOSE
32	6T2615	7	FENDER WASHER 3/8"
33	6T2283	7	CARRIAGE BOLT 3/8" X 1"
34	28665A	1	BAFFLE (INSIDE UPPER REAR OF CUTTER HEAD)

COMMON BENGAL T4

BOOM FLAIL PIVOT ASSEMBLY

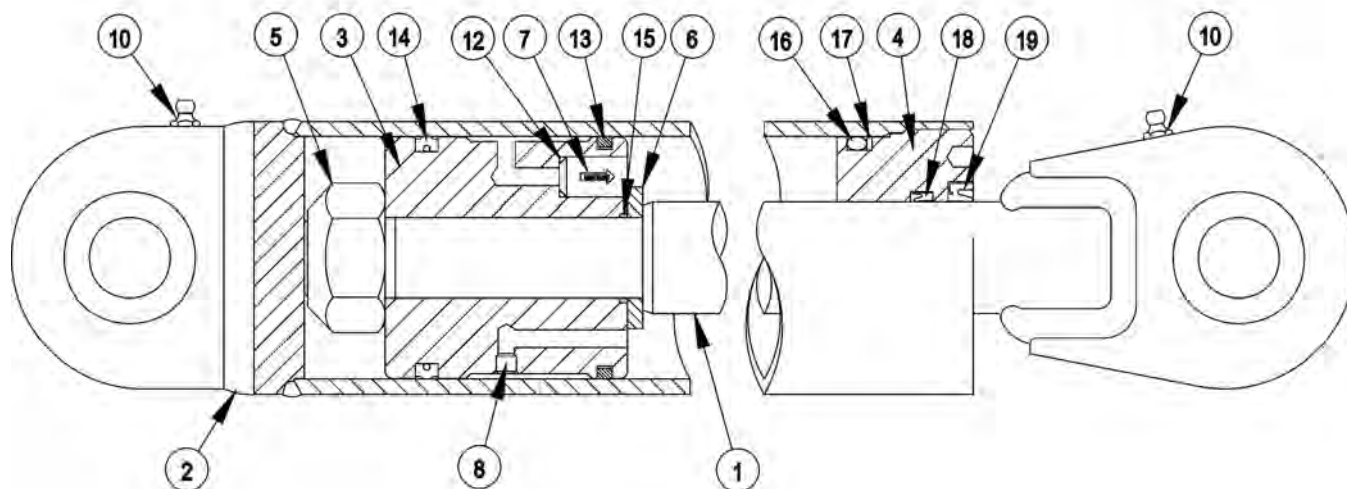


BOOM FLAIL PIVOT ASSEMBLY

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
1	TF3015	1	FLAIL PIVOT ASSY
2	TB1028	1	PIVOT ARM ASSY
3	TB1033	1	PIN CLEVIS
4	06537021	2	ROLL PIN
5	TF3097	1	PIN
6	TF3090	1	PIN
7	TB1024	1	PIN
8	TB1027	1	PIN
9	21688	1	CAPSCREW 7/16" X 3 1/4"
10	21677	1	NYLOCK NUT 7/16"
11	21635	3	CAPSCREW 3/8" X 2 1/4"
12	21627	4	NYLOCK NUT 3/8"
13	TB5030	3	BUSHING
14	6T3207	3	GREASE ZERK
15	-----	-	SECONDARY BOOM *REFER TO BOOM ARM ASSY
16	-----	-	CYLINDER - REFER TO BOOM ARM ASSY
17	-----	-	FLAIL MOWER HEAD *REFER TO FLAIL ASSY
18	31723	1	CLAMP KIT,TBF50 (USED ON 50" FLAIL)
19	TB3031	2	DOUBLE HOSE CLAMP (USED ON THE 63" FLAIL)
20	21638	1	CAPSCREW 3/8" X 3"
21	35312	2	SPLIT COLLAR

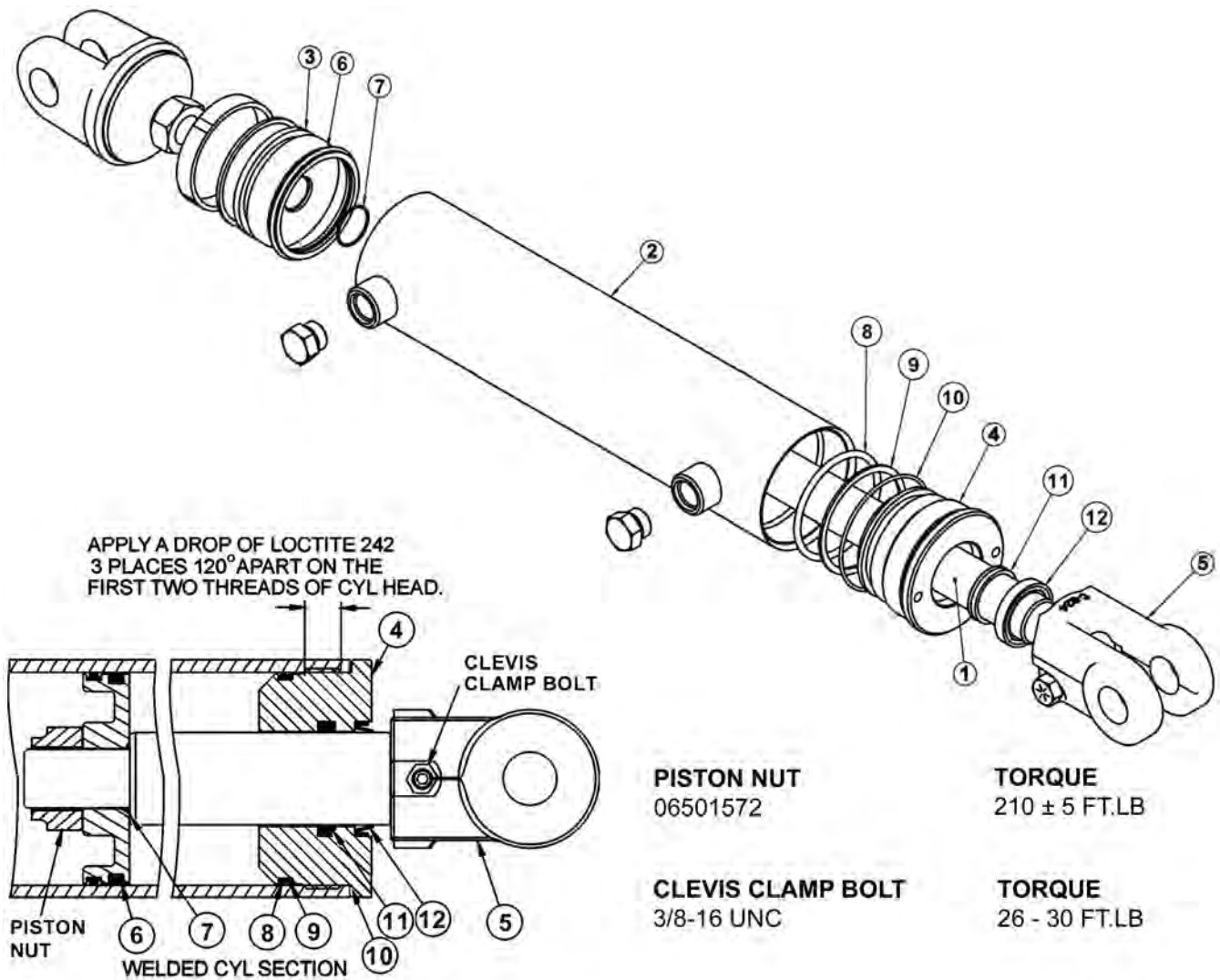
3IN X 13-7/8 IN WELDED CYLINDER BREAKDOWN



WARNING - MECHANICAL FASTENERS MUST BE TORQUED TO RECOMMENDED SPECIFICATIONS DURING REPAIR TO PREVENT PERSONAL INJURY OR EQUIPMENT DAMAGE.

ITEM	PART NO.	QTY.	DESCRIPTION
---	06501029	-	CYLINDER,WELDED,3" X 13.87"
1	06501630	1	PISTON ROD ASSY
2	06501648	1	BUTT & TUBE ASSY
3	06501649	1	PISTON
4	34574	1	GLAND
5	34575	1	LOCK NUT,1"-14 UNS (TORQUE TO 315 FT.LB.)
6	34576	1	SPACER
7	34577	1	CHECK VALVE,KEPNER
8	06501650	1	ORIFICE, ZERO LEAK, 0225
9	33761	1	SEAL KIT,PACKING (ITEMS 12 THRU 19)
10	-----	2	GREASE ZERK
12	-----	1	O - RING
13	-----	1	CAST IRON PISTON RING
14	-----	1	CROWN SEAL
15	-----	1	O - RING
16	-----	1	O - RING
17	-----	1	BACK - UP WASHER
18	-----	1	U - CUP
19	-----	1	WIPER
20	34334	-	SPHERICAL BEARING (NOT SHOWN)

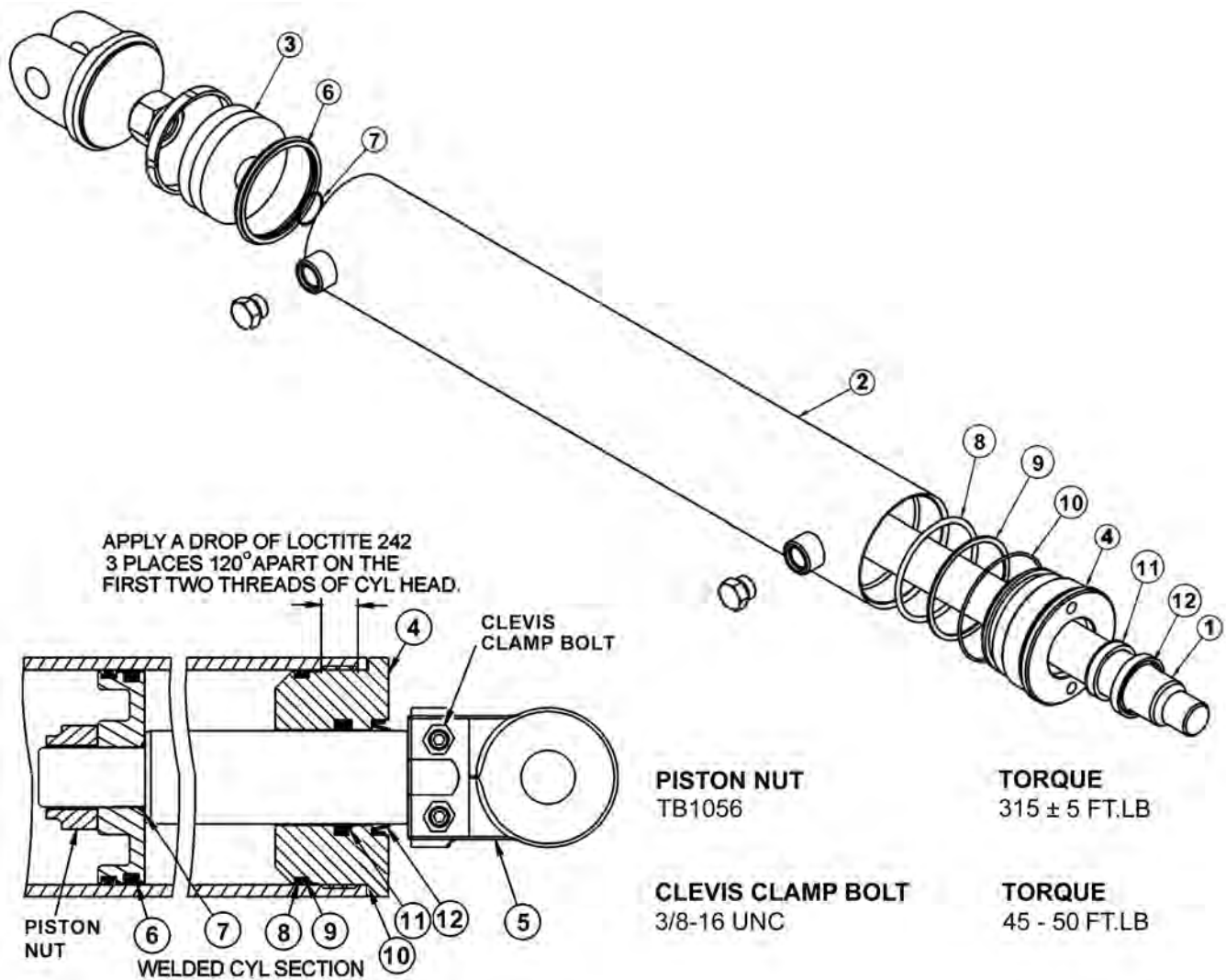
3IN X 18IN WELDED CYLINDER BREAKDOWN



WARNING - MECHANICAL FASTENERS MUST BE TORQUED TO RECOMMENDED SPECIFICATIONS DURING REPAIR TO PREVENT PERSONAL INJURY OR EQUIPMENT DAMAGE.

ITEM	PART NO.	QTY.	DESCRIPTION
-----	06501023	-	HYDRAULIC CYLINDER COMPLETE
1	06501561	1	ROD
2	06501562	1	TUBE WELDMENT
3	06501552	1	PISTON
4	06501563	1	CYLINDER HEAD
5	06501554	1	CLEVIS
-----	06501564	-	SEAL REPAIR KIT (ITEMS 6 THROUGH 12)

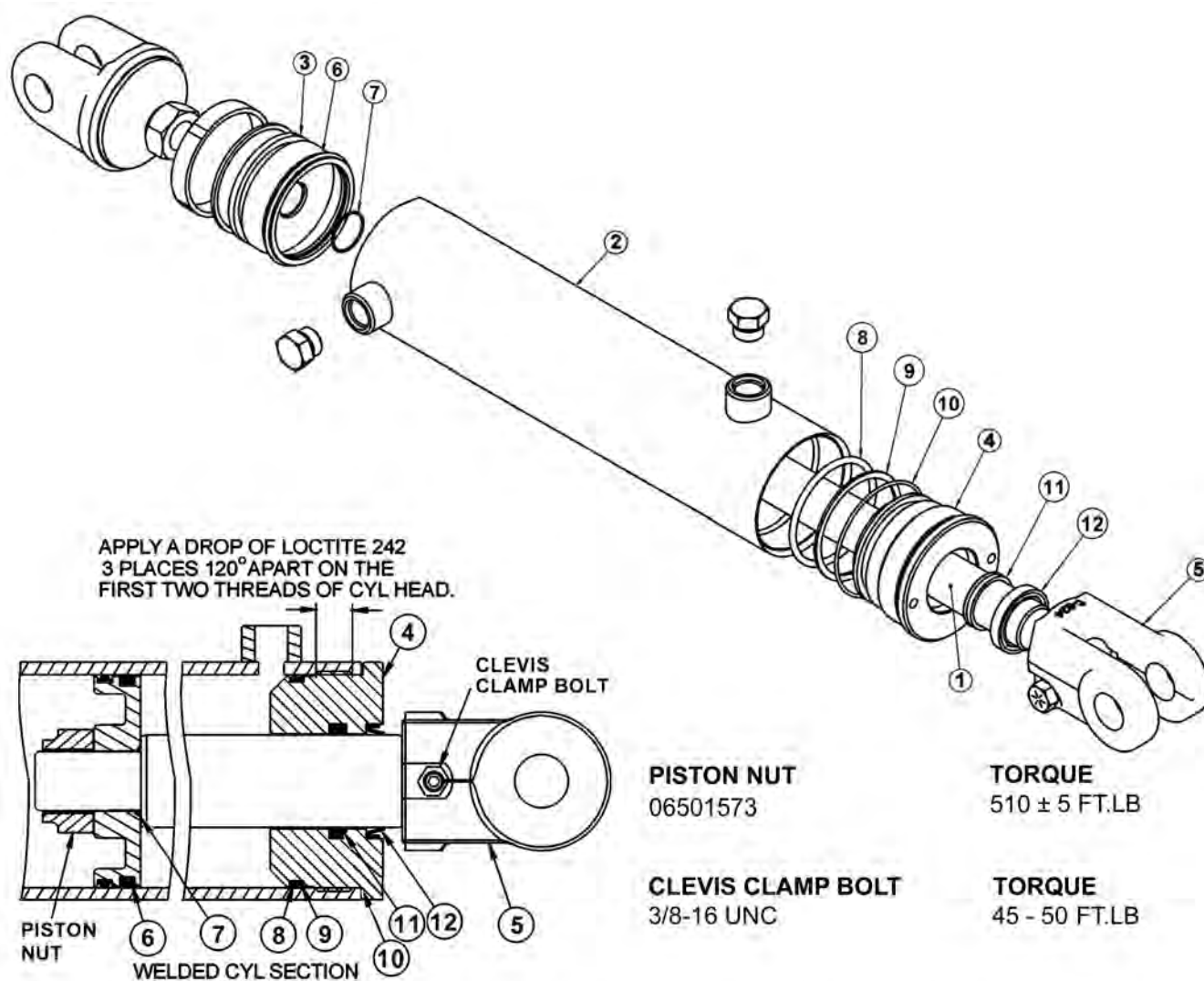
3-1/2IN X 20IN WELDED CYLINDER BREAKDOWN



WARNING - MECHANICAL FASTENERS MUST BE TORQUED TO RECOMMENDED SPECIFICATIONS DURING REPAIR TO PREVENT PERSONAL INJURY OR EQUIPMENT DAMAGE.

ITEM	PART NO.	QTY.	DESCRIPTION
-----	06501024	-	HYDRAULIC CYLINDER COMPLETE
1	06501565	1	ROD
2	06501566	1	TUBE WELDMENT
3	06501567	1	PISTON
4	06501568	1	CYLINDER HEAD
5	TB3033	-	CLEVIS
-----	06501569	-	SEAL REPAIR KIT (ITEMS 6 THROUGH 12)

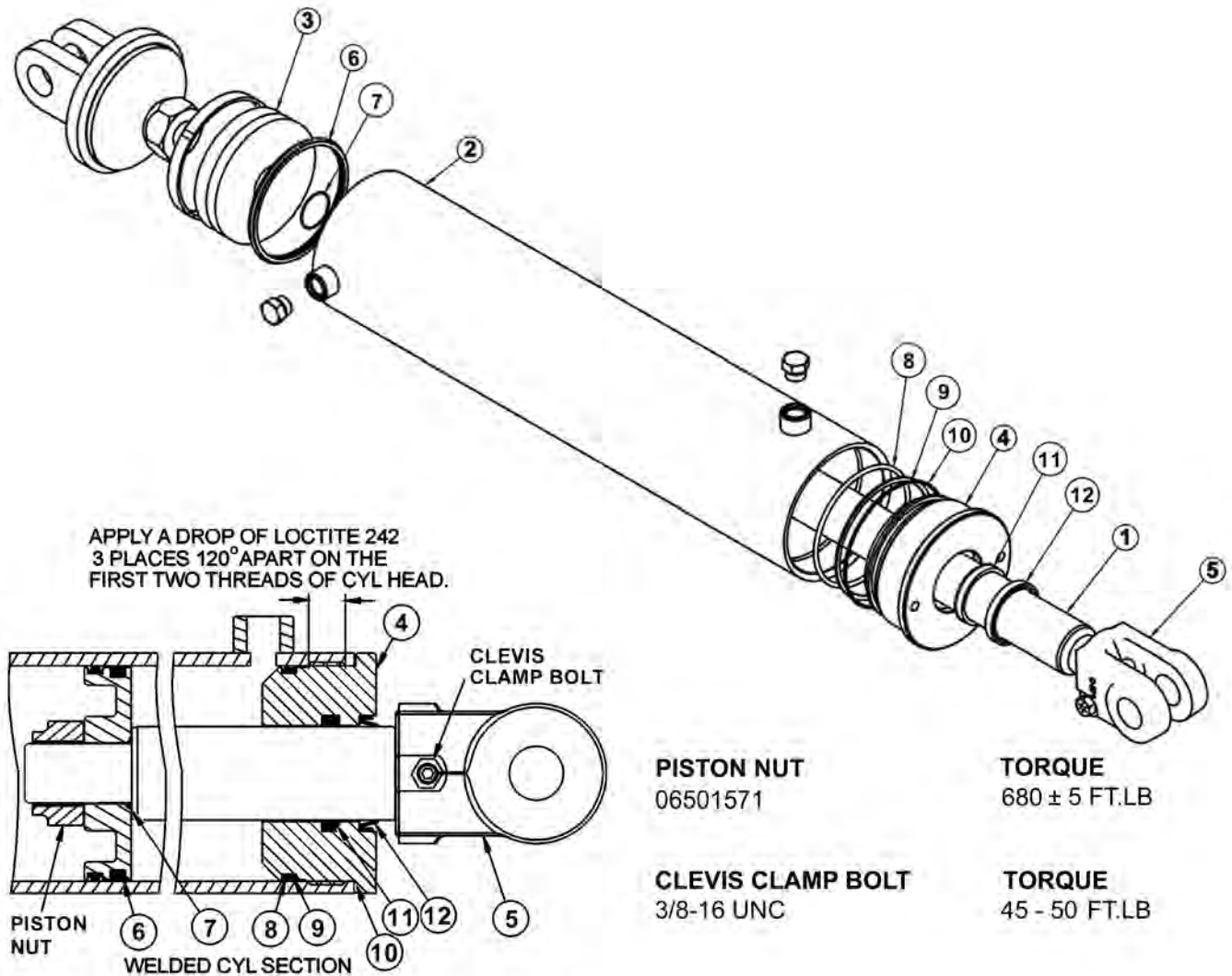
4IN X 20IN WELDED CYLINDER BREAKDOWN



WARNING - MECHANICAL FASTENERS MUST BE TORQUED TO RECOMMENDED SPECIFICATIONS DURING REPAIR TO PREVENT PERSONAL INJURY OR EQUIPMENT DAMAGE.

ITEM	PART NO.	QTY.	DESCRIPTION
-----	06501022	-	HYDRAULIC CYLINDER COMPLETE
1	06501556	1	ROD
2	06501557	1	TUBE WELDMENT
3	06501558	1	PISTON
4	06501559	1	CYLINDER HEAD
5	6T0172	1	CLEVIS
5A	30172	-	CLEVIS (FOR EXTENDED BOOM)
-----	06501560	-	SEAL REPAIR KIT (ITEMS 6 THROUGH 12)

5IN X 20IN WELDED CYLINDER BREAKDOWN



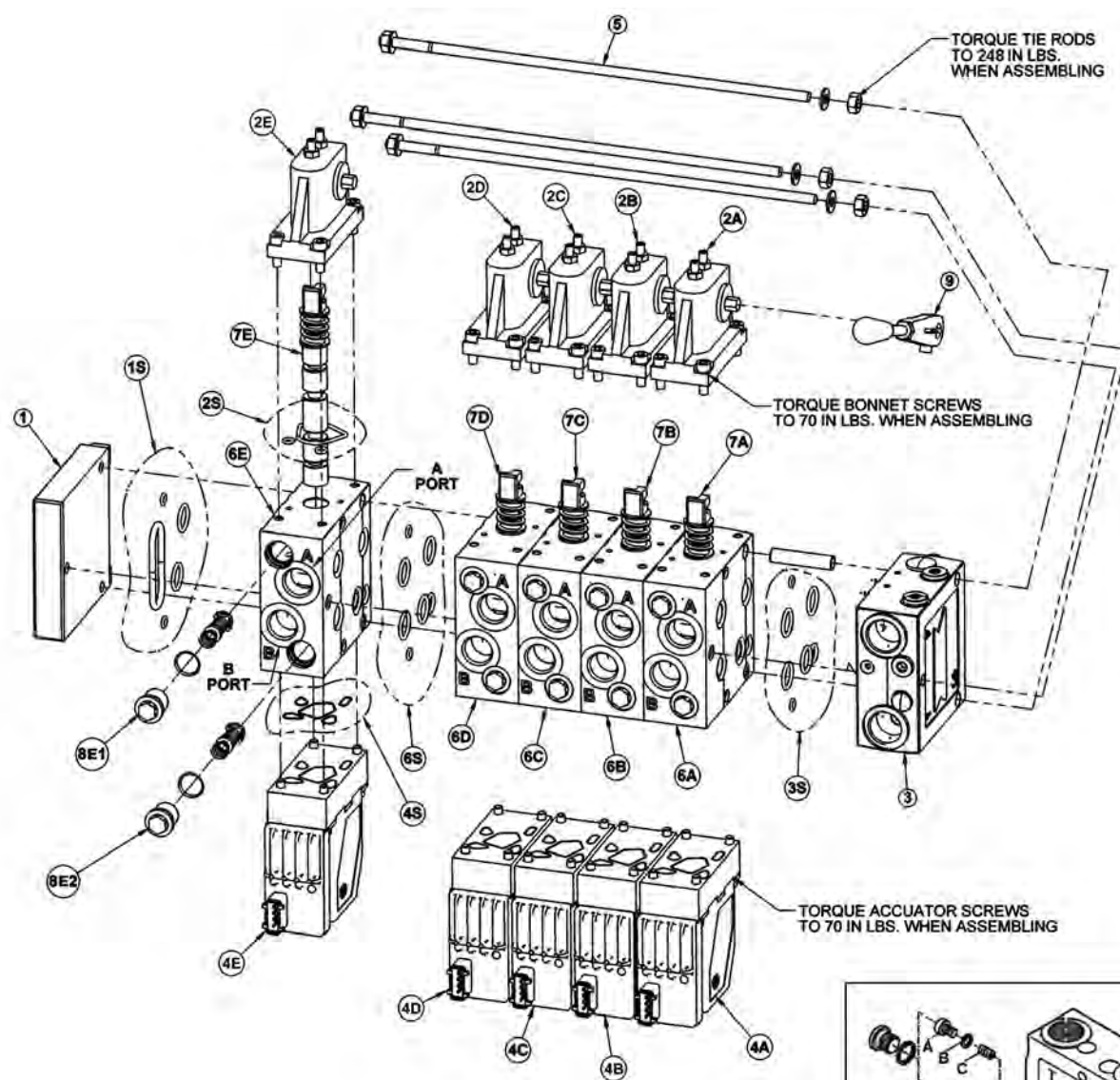
WARNING - MECHANICAL FASTENERS MUST BE TORQUED TO RECOMMENDED SPECIFICATIONS DURING REPAIR TO PREVENT PERSONAL INJURY OR EQUIPMENT DAMAGE.

ITEM	PART NO.	QTY.	DESCRIPTION
-----	06501020	-	HYDRAULIC CYLINDER COMPLETE
1	06501544	1	ROD
2	06501545	1	TUBE WELDMENT
3	06501546	1	PISTON
4	06501547	1	CYLINDER HEAD
5	06501548	1	CLEVIS
-----	06501549	-	SEAL REPAIR KIT (ITEMS 6 THROUGH 12)

NOTES

NOTES

5 SPOOL ELECTRONIC VALVE - OPEN STOW,3PS



ITEM	PART NO.	QTY.	DESCRIPTION
----	06700224	-	VALVE, 5SP, OS
-----	06502097	-	VALVE, SUB-ASSEMBLY
1	06502074	1	END PLATE
1S	06505013	1	END PLATE SEAL KIT
2	-----	5	BONNET
2S	06505042	1	BONNET SEAL KIT

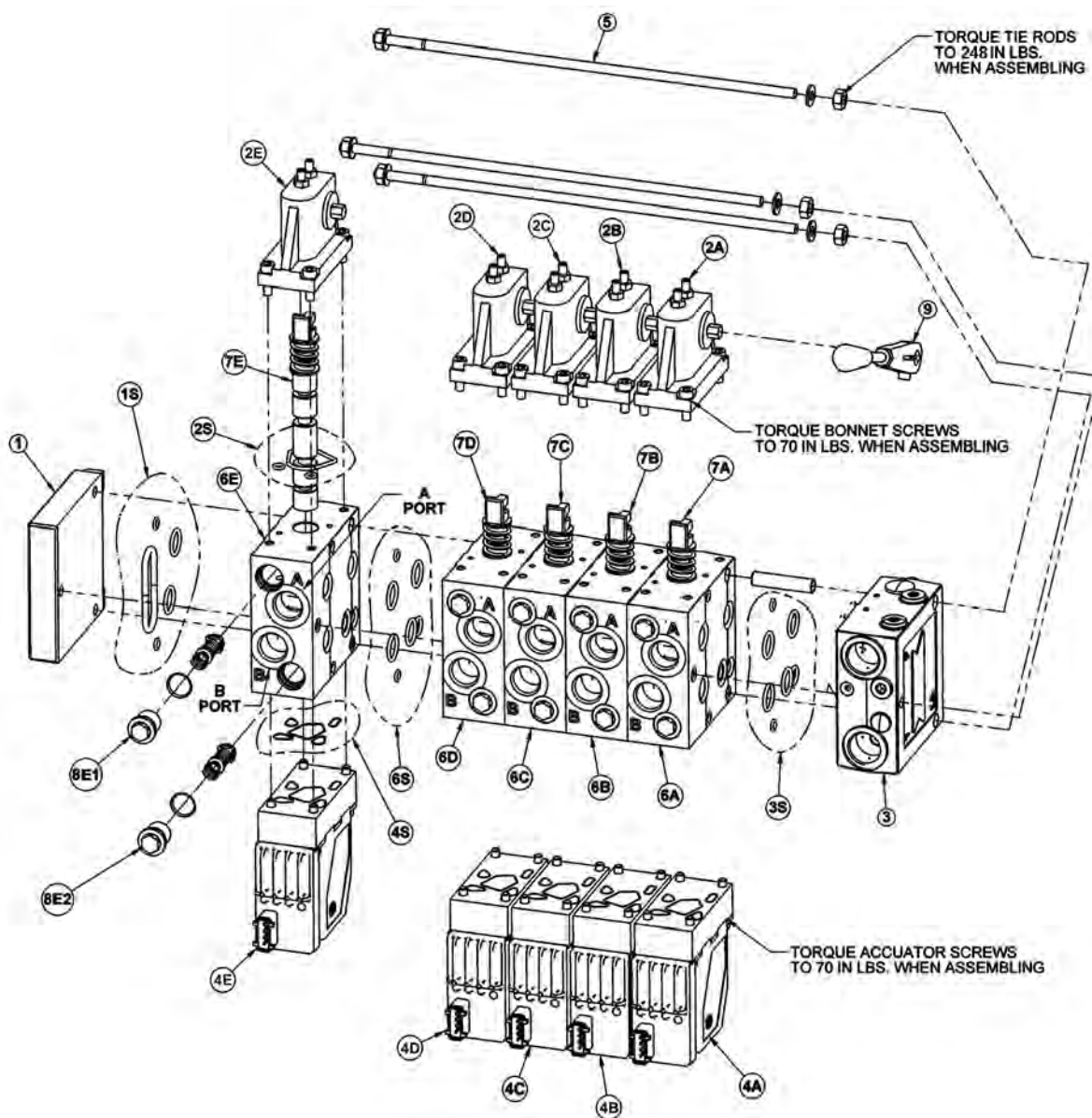
5 SPOOL ELECTRONIC VALVE - OPEN STOW,3PS

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
2A	42197	1	MAIN BOOM BONNET
2B	42197	1	SECONDARY BOOM BONNET
2C	42197	1	DECK ROLL BONNET
2D	42197	1	BOOM SWIVEL BONNET
2E	42197	1	DECK SHIELD BONNET
3	34308	1	INLET SECTION
3S	06505013	1	INLET SECTION SEAL KIT
4	-----	5	ELECTRONIC ACCUATOR
4A	06502101	1	MAIN BOOM ELECTRONIC ACCUATOR
4B	06502101	1	SECONDARY BOOM ELECTRONIC ACCUATOR
4C	06502100	1	DECK ROLL ELECTRONIC ACCUATOR
4D	06502101	1	BOOM SWIVEL ELECTRONIC ACCUATOR
4E	06502099	1	DECK SHIELD ELECTRONIC ACCUATOR
5	42202	1	TIE-BOLT KIT
6	-----	5	SECTION
6S	06505013	1	SECTION SEAL KIT
6A	42698	1	MAIN BOOM SECTION
6B	42698	1	SEC BOOM SECTION
6C	06502076	1	DECK ROLL SECTION
6D	42698	1	BOOM SWIVEL SECTION
6E	06502077	1	SHIELD SECTION
7	-----	5	SPOOL
7A	42697	1	MAIN BOOM SPOOL
7B	42697	1	SEC BOOM SPOOL
7C	4242106	1	DECK ROLL SPOOL
7D	06502073	1	BOOM SWIVEL SPOOL
7E	42201	1	DECK SHIELD SPOOL
8	-----	10	ANTI CAV/SHOCK RELIEF
8A1	06502084	1	MAIN BOOM A PORT RELIEF
8A2	06502081	1	MAIN BOOM B PORT RELIEF
8B1	42296	1	SEC BOOM A PORT RELIEF
8B2	06502082	1	SEC BOOM B PORT RELIEF
8C1	42295	1	DECK ROLL A PORT RELIEF
8C2	06502082	1	DECK ROLL B PORT RELIEF
8D1	06502070	1	BOOM SWIVEL A PORT RELIEF
8D2	06502083	1	BOOM SWIVEL B PORT RELIEF
8E1	06502081	1	DECK SHIELD A PORT RELIEF
8E2	06502081	1	DECK SHIELD B PORT RELIEF
9	33459	1	HANDLE

COMMON BENGAL T4

5 SPOOL ELECTRONIC VALVE - SIDE STOW



ITEM	PART NO.	QTY.	DESCRIPTION
-----	06502096	-	VLV,5SP,32PVG,SIDE STOW
1	06502074	1	END PLATE
1S	06505013	1	END PLATE SEAL KIT
2	-----	5	BONNET
2S	06505042	1	BONNET SEAL KIT
2A	42197	1	MAIN BOOM BONNET
2B	42197	1	SECONDARY BOOM BONNET
2C	42197	1	DECK ROLL BONNET
2D	42197	1	BOOM SWIVEL BONNET
2E	42197	1	DECK SHIELD BONNET

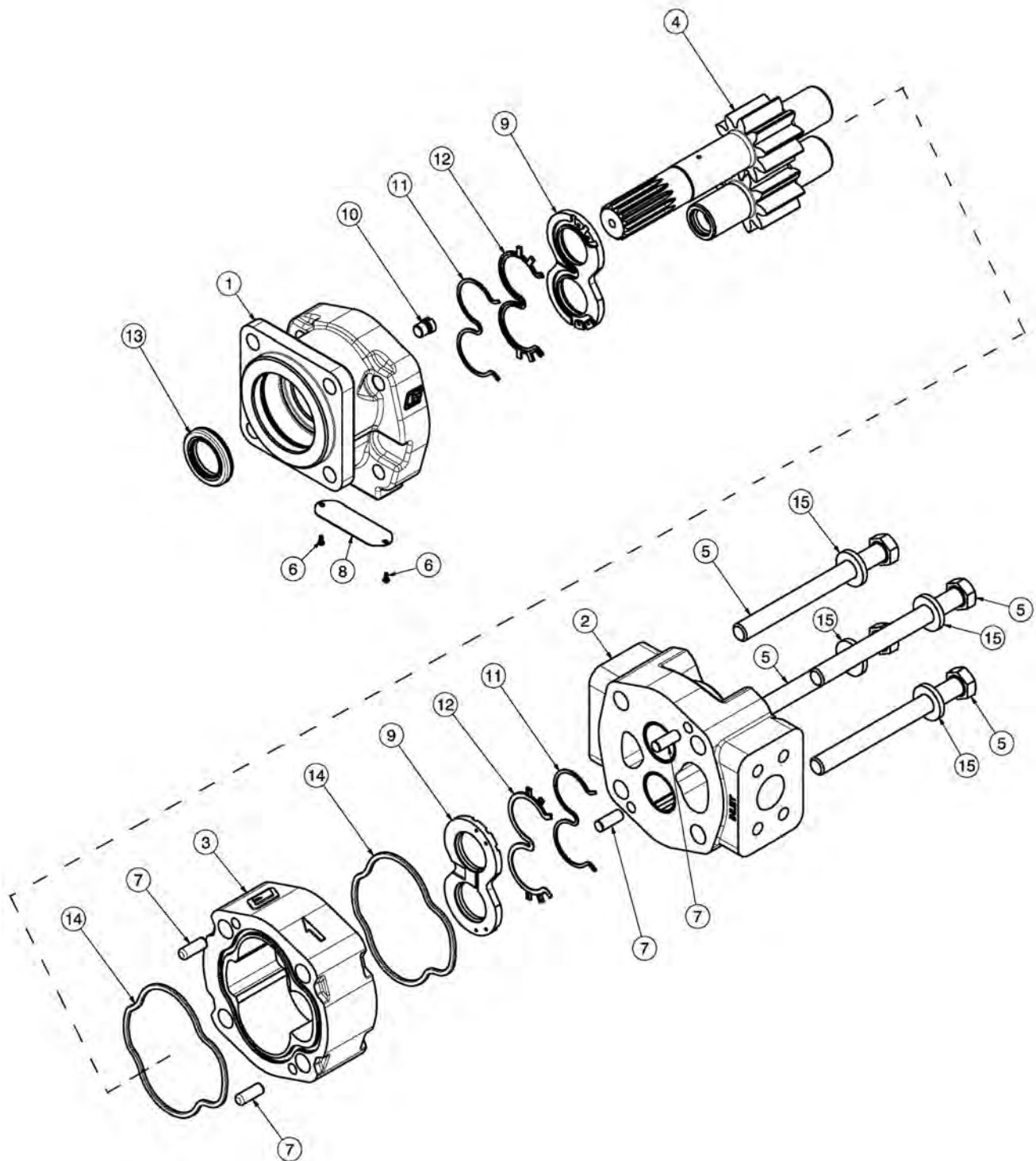
5 SPOOL ELECTRONIC VALVE - SIDE STOW

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
3	34308	1	INLET SECTION
3S	06505013	1	INLET SECTION SEAL KIT
4	-----	5	ELECTRONIC ACCUATOR
4A	06502101	1	MAIN BOOM ELECTRONIC ACCUATOR
4B	06502101	1	SECONDARY BOOM ELECTRONIC ACCUATOR
4C	06502100	1	DECK ROLL ELECTRONIC ACCUATOR
4D	06502101	1	BOOM SWIVEL ELECTRONIC ACCUATOR
4E	06502099	1	DECK SHIELD ELECTRONIC ACCUATOR
5	42202	1	TIE-BOLT KIT
6	-----	5	SECTION
6S	06505013	1	SECTION SEAL KIT
6A	42698	1	MAIN BOOM SECTION
6B	42698	1	SEC BOOM SECTION
6C	06502076	1	DECK ROLL SECTION
6D	42698	1	BOOM SWIVEL SECTION
6E	06502077	1	SHIELD SECTION
7	-----	5	SPOOL
7A	42697	1	MAIN BOOM SPOOL
7B	42697	1	SEC BOOM SPOOL
7C	4242106	1	DECK ROLL SPOOL
7D	06502073	1	BOOM SWIVEL SPOOL
7E	42201	1	DECK SHIELD SPOOL
8	-----	10	ANTI CAV/SHOCK RELIEF
8A1	42650	1	MAIN BOOM A PORT RELIEF
8A2	06502069	1	MAIN BOOM B PORT RELIEF
8B1	42650	1	SEC BOOM A PORT RELIEF
8B2	42295	1	SEC BOOM B PORT RELIEF
8C1	42296	1	DECK ROLL A PORT RELIEF
8C2	42295	1	DECK ROLL B PORT RELIEF
8D1	42295	1	BOOM SWIVEL A PORT RELIEF
8D2	42295	1	BOOM SWIVEL B PORT RELIEF
8E1	06502069	1	DECK SHIELD A PORT RELIEF
8E2	06502069	1	DECK SHIELD B PORT RELIEF
9	33459	1	HANDLE

COMMON BENGAL T4

FRONT HYDRAULIC PUMP



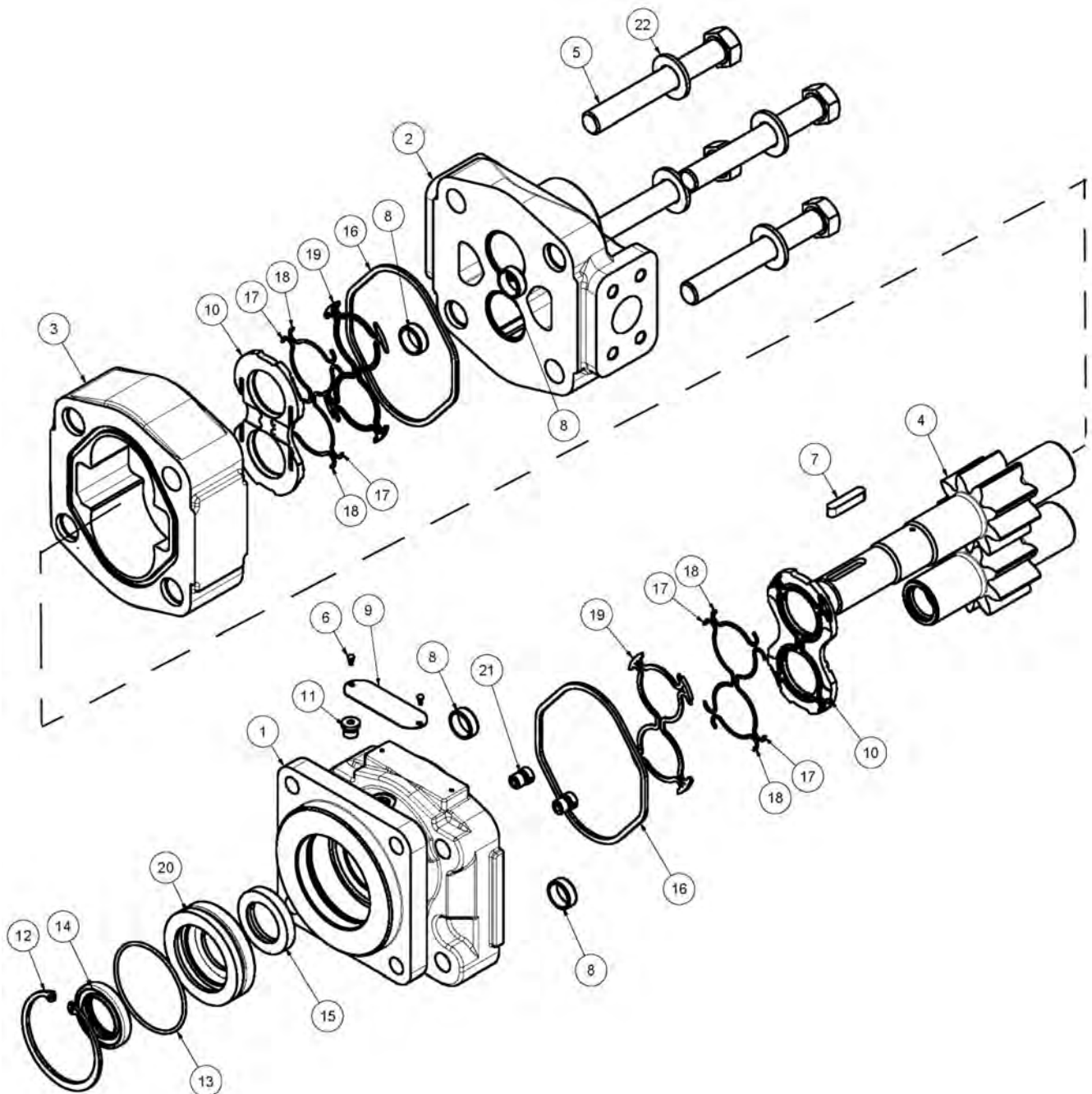
FRONT HYDRAULIC PUMP

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
---	23152	1	PUMP ASSEMBLY,1-3/4",COMPLETE
1	22766	1	SHAFT END COVER
2	22779	1	PORT END COVER
3	22774	1	GEAR HOUSING,1-3/4"
4	22771	1	GEAR SET
5	23824	4	CAPSCREW
6	06504078	2	SCREW,DRIVE
7	22773	4	DOWEL PINS
8	06504077	1	NAMEPLATE
9	22770	2	THRUST PLATE
10	22767	1	PLUG
11	06504075	2	SEAL,BK-UP
12	06504074	2	SEAL,CHAN
13	22765	1	SEAL,LIP
14	06504076	2	SEAL,SQ-R
15	02961917	4	WASHER
---	24150	1	SEAL KIT (INCLUDES 11, 12, 13 AND 14)

COMMON BENGAL T4

50IN AND 60IN ROTARY MOTOR BREAKDOWN



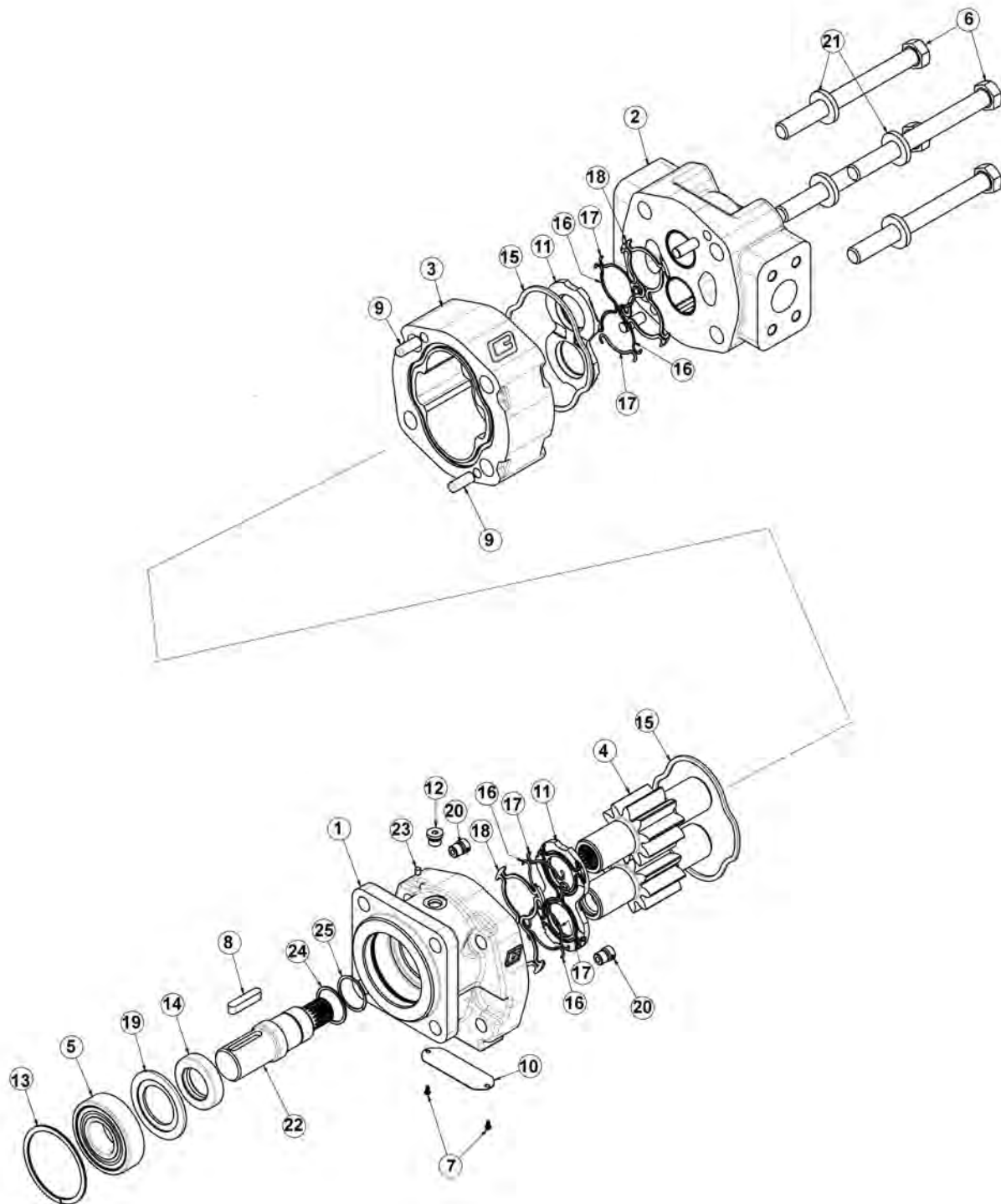
50IN AND 60IN ROTARY MOTOR BREAKDOWN

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
	06504011	-	MOTOR ASSEMBLY,TRB60
	06504012	-	MOTOR ASSEMBLY,TRB50
1	22790	1	HOUSING, SEC
2	06504088	1	HOUSING, PEC
3	06504062	1	HOUSING, GEAR,TRB60
-----	06504089	-	HOUSING, GEAR,TRB50
4	06504090	1	SET, GEAR SHAFT
5	06504104	4	CAP SCREW,TRB60
-----	06504091	-	CAP SCREW,TRB50
6	06504078	2	SCREW, DRIVE
7	06504092	1	KEY
8	06504093	4	PIN, DOWEL
9	06504094	1	NAME PLATE
10	06504095	2	THRPL
11	2961940	1	PLUG, ODT
12	2962200	1	RING, SNAP
13	06504096	1	O RING
14	6T5101	1	SEAL, LIP
15	06504097	1	SEAL, LIP
16	22797	2	SEAL, SQ-R
17	06504098	4	SEAL, SIDE CHAN
18	06504099	4	SEAL, END CHAN
19	06504100	2	SEAL, BK-UP
20	06504101	1	RTNR, SEAL
21	6T5809	2	CHECK ASS'Y
22	06504102	4	WASHER
-----	06504103	-	SEAL KIT

COMMON BENGAL T4

FLAIL MOTOR BREAKDOWN



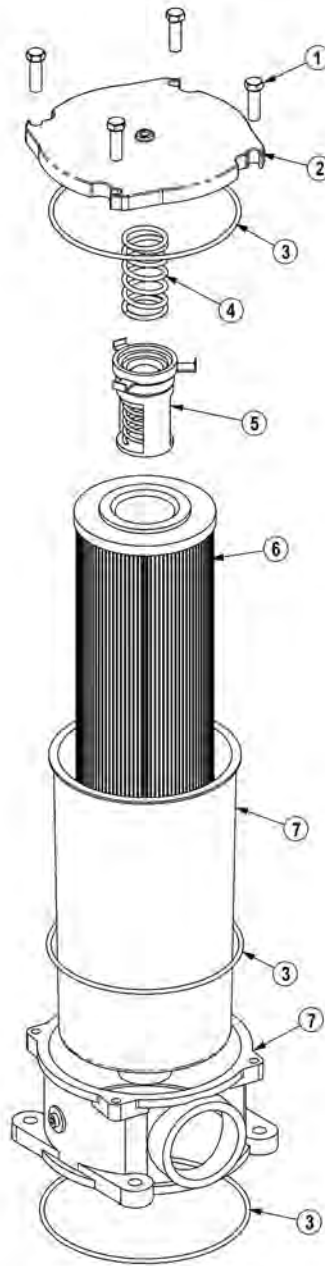
FLAIL MOTOR BREAKDOWN

Continued...

ITEM	PART NO.	QTY.	DESCRIPTION
*	06504132	-	MOTOR ASSEMBLY 350 - TBF50, TBF63
1	06504141	1	SHAFT END COVER
2	06504040	1	PORT END COVER
3	06504041	1	GEAR HOUSING
4	06504117	1	MATCHED GEAR SET
5	TF4402	1	BALL BEARING
6	06504043	4	CAP SCREW
7	06504044	2	SET SCREW
8	06504028	1	KEY
9	06504045	4	DOWEL PIN
10	*	1	NAMEPLATE
11	763759	1	THRUSTPLATE
12	2961940	1	PLUG, ODT (0.25)
13	TF4401	1	SNAP RING
14	06504142	1	LIP SEAL
15	TF4410	2	GASKET SEAL
16	06504046	4	SIDE SEAL
17	06504047	4	END SEAL
18	TF4407	2	BACK-UP SEAL
19	06504122	1	SEAL RETAINER
20	6T5809	2	CHECK ASSEMBLY
21	2961917	4	WASHER
22	06504140	1	SHAFT
23	06504139	1	BREATHER
24	06504121	1	SPACER, BRG
25	06504119	1	SNAP RING
*	06504116	-	SEAL KIT

COMMON BENGAL T4

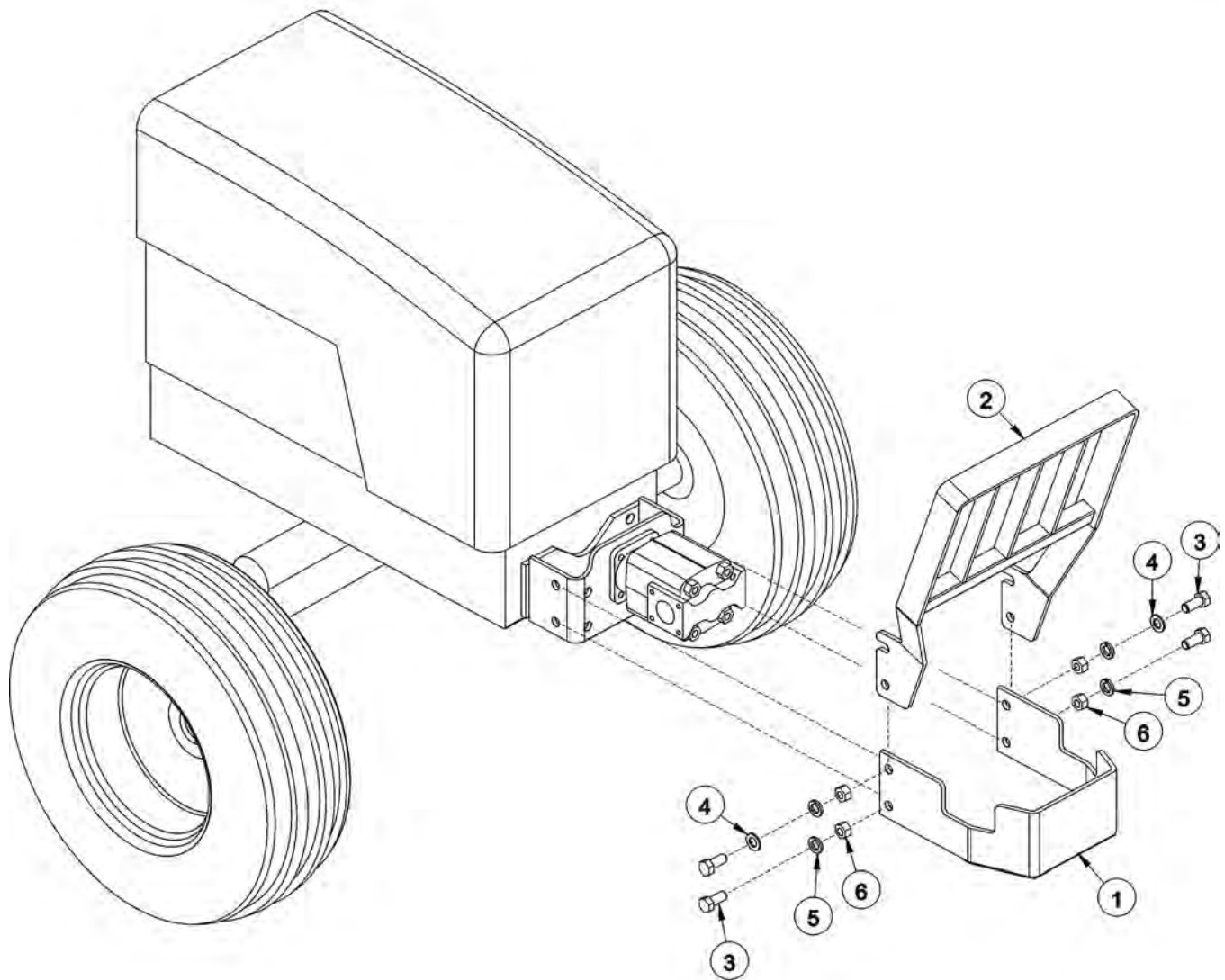
RESERVOIR TANK FILTER ASSEMBLY



ITEM	PART NO.	QTY.	DESCRIPTION
-----	06505044	-	FILTER ASSY SAE 10 MICRON
1	28583	4	CAPSCREW,8MM X 25MM(1.25 PITCH)
2	06505045	1	COVER
3	06505046	1	SEAL KIT
4	06505047	1	SPRING
5	06505048	1	BYPASS
6	35259	1	FILTER,10 MIC,RETURN LINE
7	06505049	1	CAN/BODY

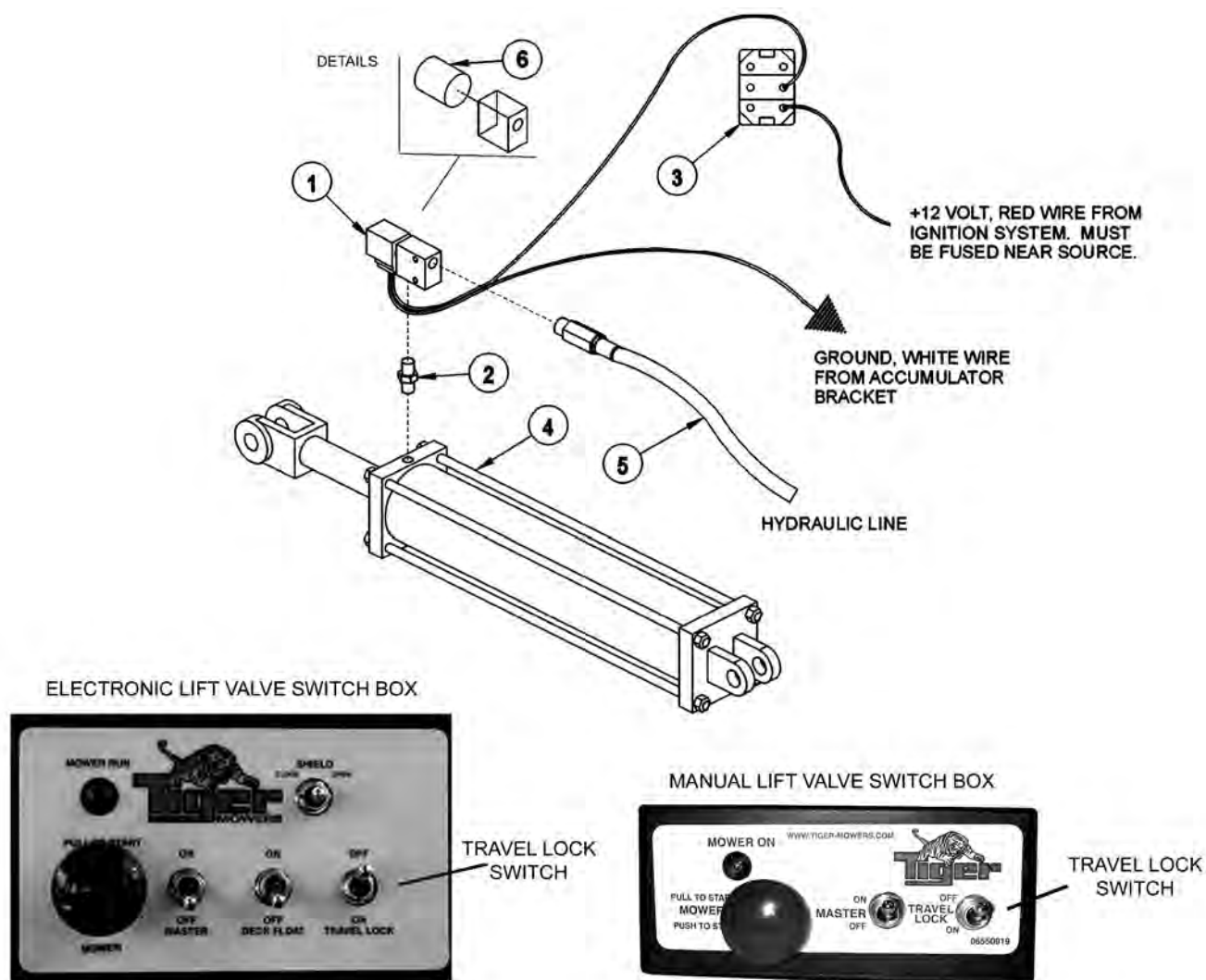
COMMON BENGAL T4

PUMP AND GRILL GUARD OPTIONS



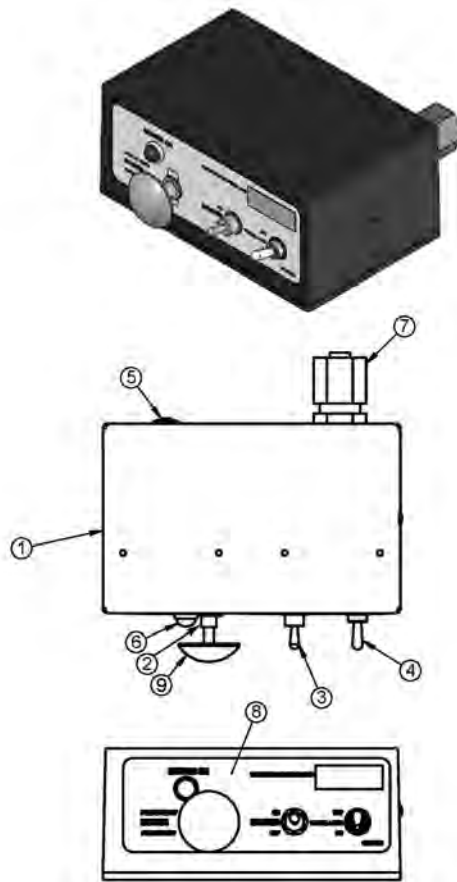
ITEM	PART NO.	QTY.	DESCRIPTION
1	32430	1	UNIVERSAL PUMP GUARD
2	32737	1	UNIVERSAL GRILL GUARD
3	21833	4	CAPSCREW,3/4" X 2-1/4",NC
4	22021	2	FLATWASHER,3/4"
5	21993	4	LOCKWASHER,3/4"
6	21825	4	HEX NUT,3/4",NC

BOOM TRAVEL LOCK



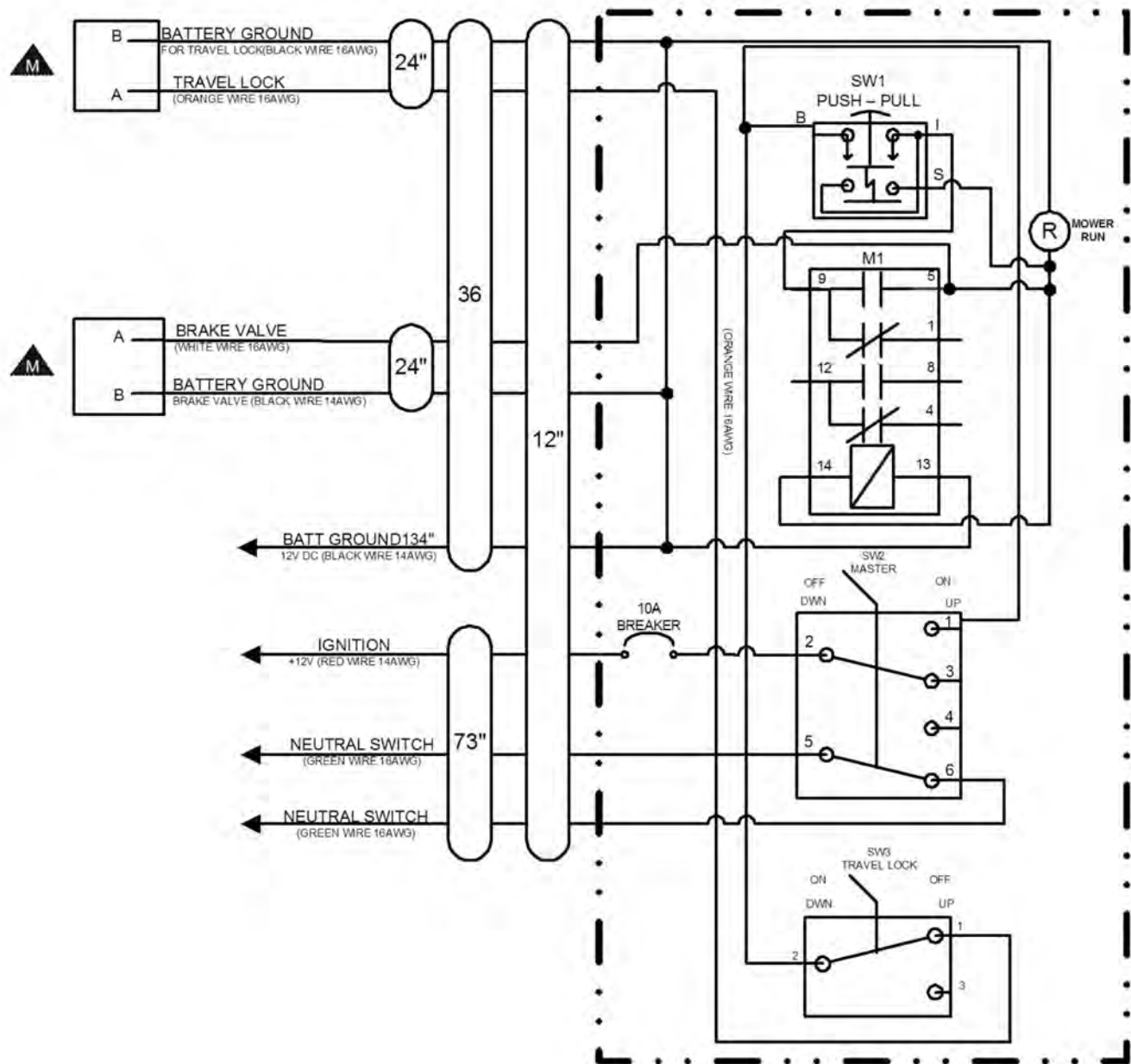
ITEM	PART NO.	QTY.	DESCRIPTION
1	06510050	1	HYDRAULIC TRAVEL LOCK VALVE
2	31329	1	ADAPTER - STANDARD BOOM
-----	31611	1	ADAPTER - EXTENDED BOOM
3	34532	1	SWITCH,TRAVEL LOCK
4	-----	-	MAIN BOOM CYLINDER *REFER TO BOOM ASSY
5	-----	-	HOSE / FITTINGS *REFER TO BOOM HYD ASSY
6	06510092	1	COIL ,TRAVEL LOCK

MANUAL LIFT VALVE SWITCH BOX

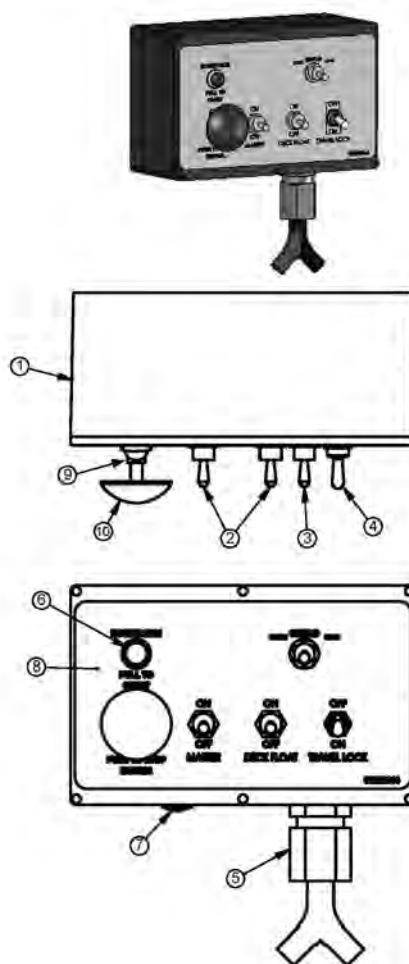


ITEM	PART NO.	QTY.	DESCRIPTION
1	06514012	1	SWBX,ALUM,BLK,06510100
2	35226	1	SWITCH,MOWER,COLEHERSEE
3	33811	1	SWITCH,MASTER/DECK FLOAT
4	34532	1	SWITCH,TRVL LCK
5	06514014	1	BREAKER,10A,SWBX
6	6T3923	1	INDICTATOR LIGHT,ON,RED
7	34540	1	STRAIN RELIEF,3/4,BLACK,NYLON
8	06550019	1	DECAL,SWTCHBX,BOOM,CG
9	02964063	1	KNOB,RED
10	35227	1	RELAY,DP,DT,12V,LY2F,35226

MANUAL LIFT VALVE SCHEMATIC

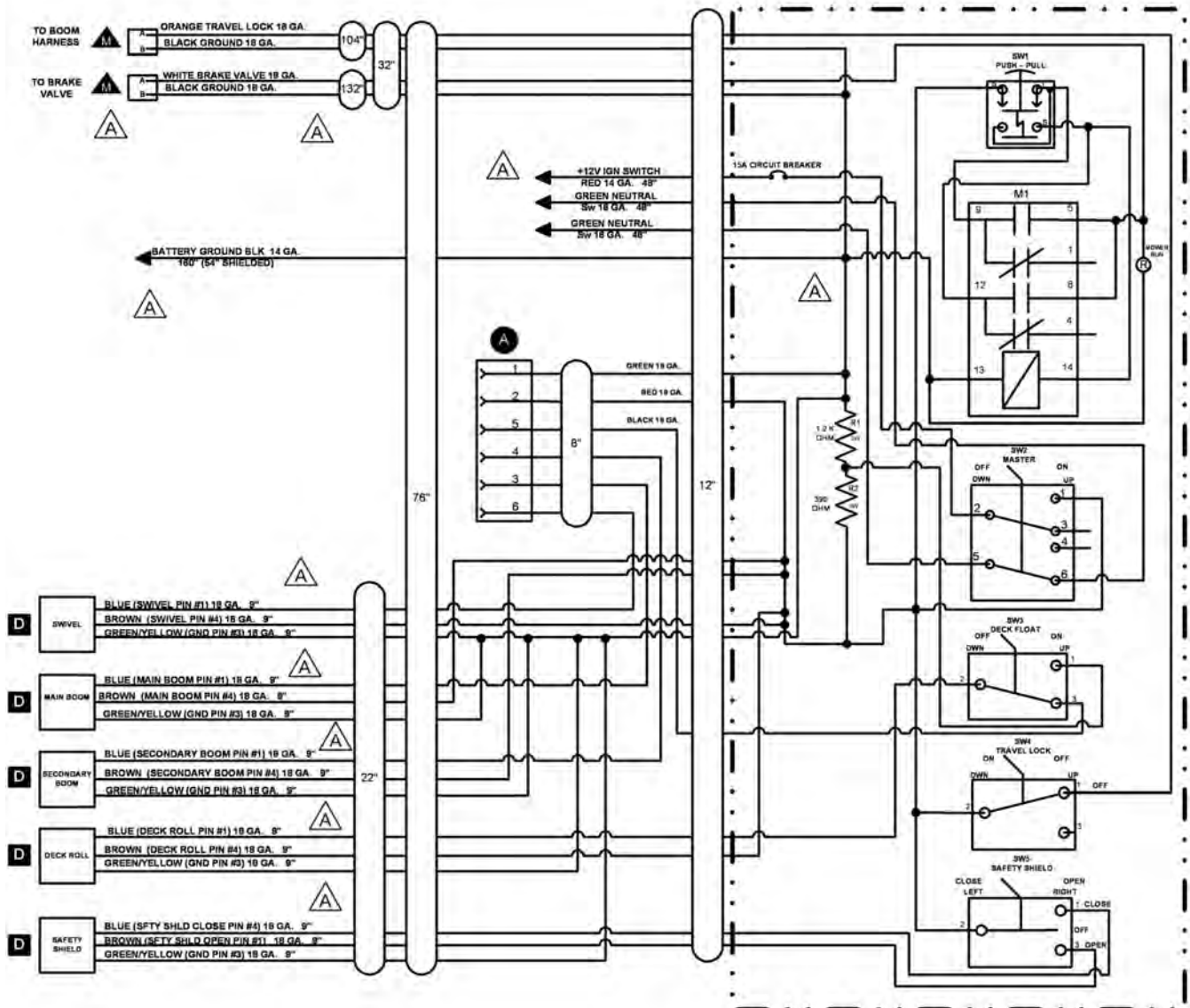


ELECTRONIC LIFT VALVE SWITCH BOX

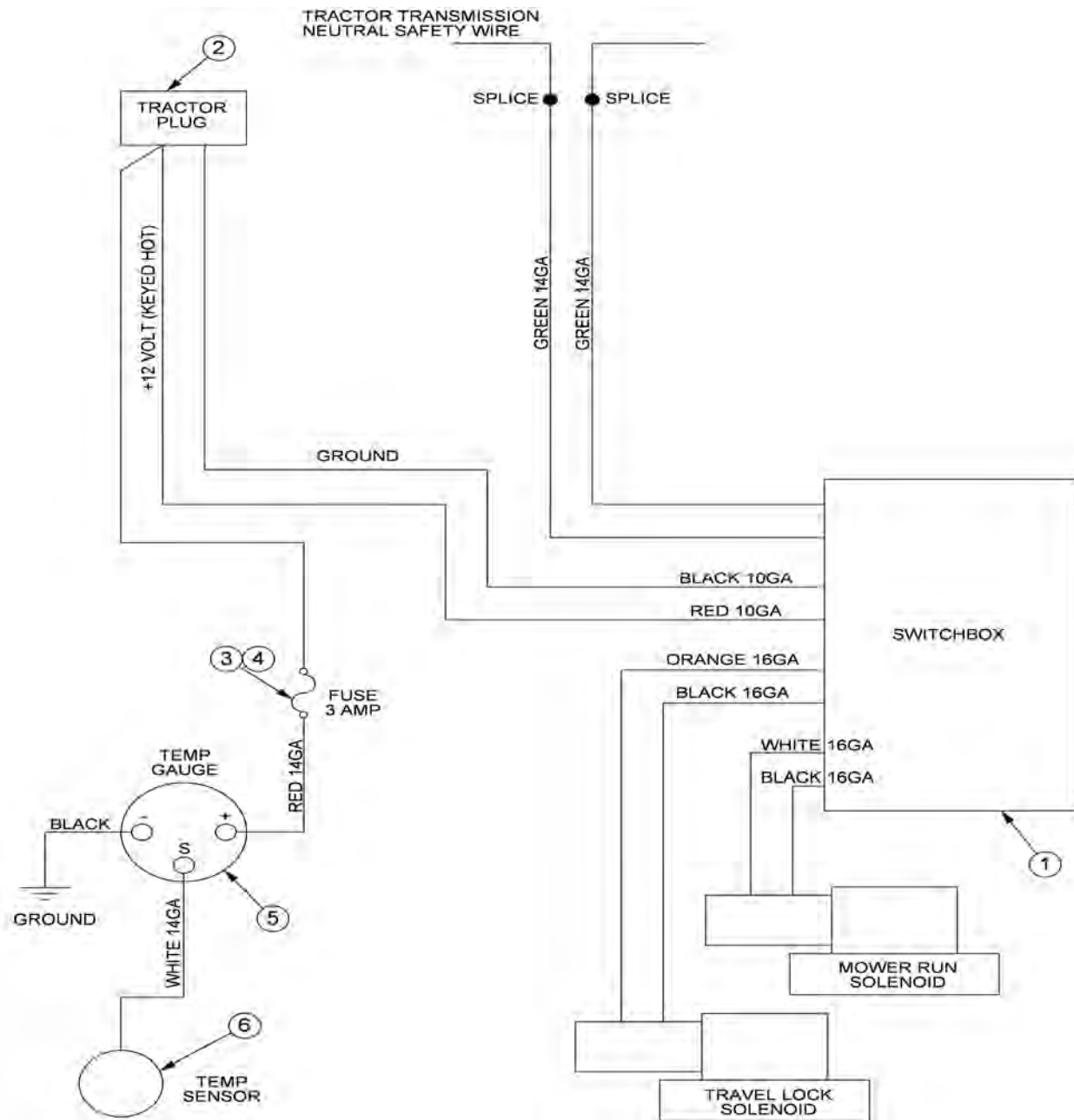


ITEM	PART NO.	QTY.	DESCRIPTION
1	06510196	1	SWBX,ASSY
2	33811	2	SWITCH,MASTER/DECK FLOAT
3	33813	1	SWITCH,SFTY SHIELD
4	34532	1	SWITCH,TRVL LCK
5	34540	1	STRAIN RELIEF,3/4",BLACK,NYLON
6	6T3923	1	INDICTATOR LIGHT,ON,RED
7	06514006	1	BREAKER,15A,SWBX
8	06550044	1	DECAL,SWBX,06510047
9	35226	1	SWITCH,MOWER,COLEHERSEE
10	02964063	1	KNOB,RED
11	35227	1	RELAY,DP,DT,12V,LY2F,35226

ELECTRONIC LIFT VALVE SCHEMATIC

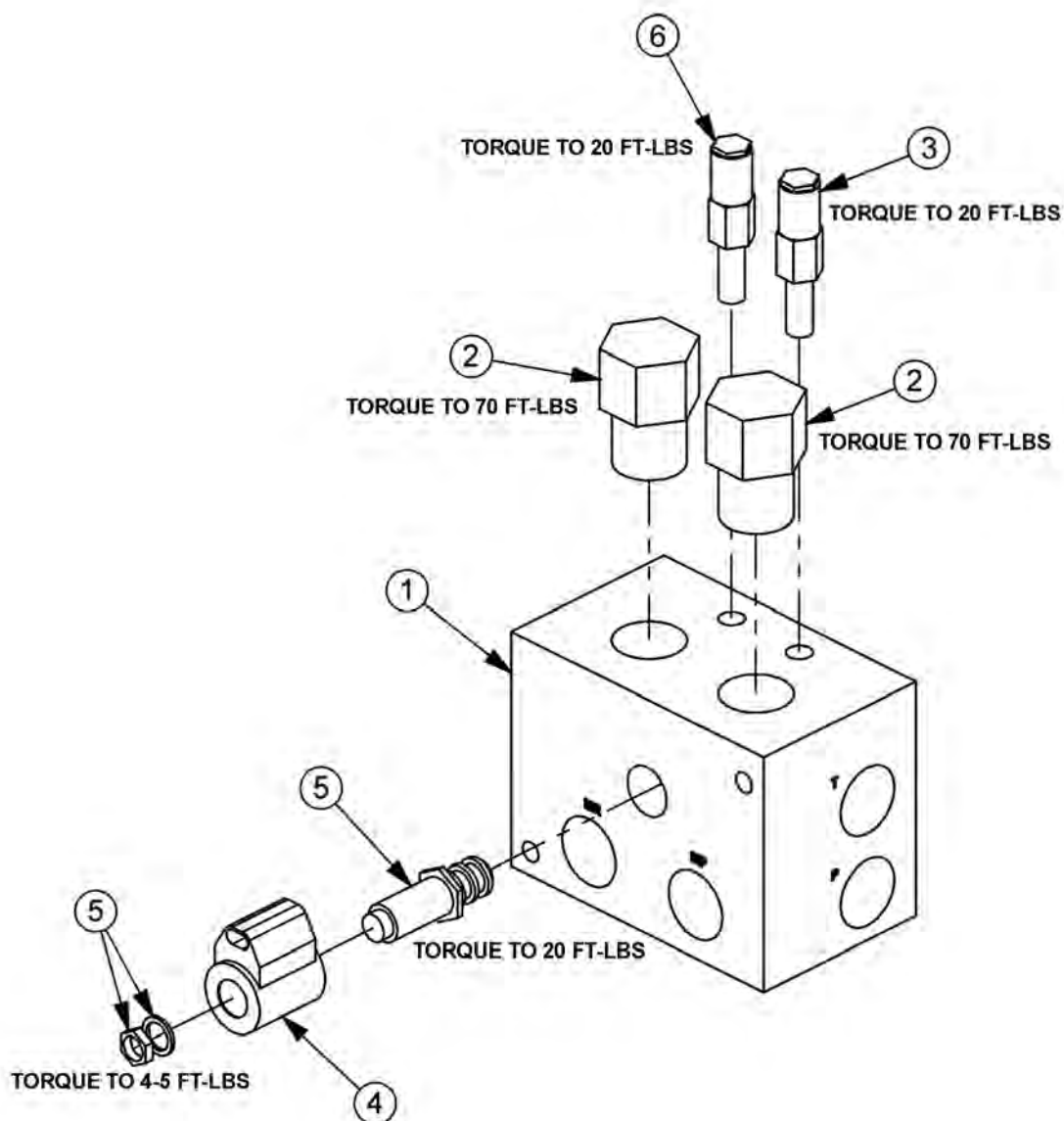


SOLENOID SWITCH BOX AND WIRING



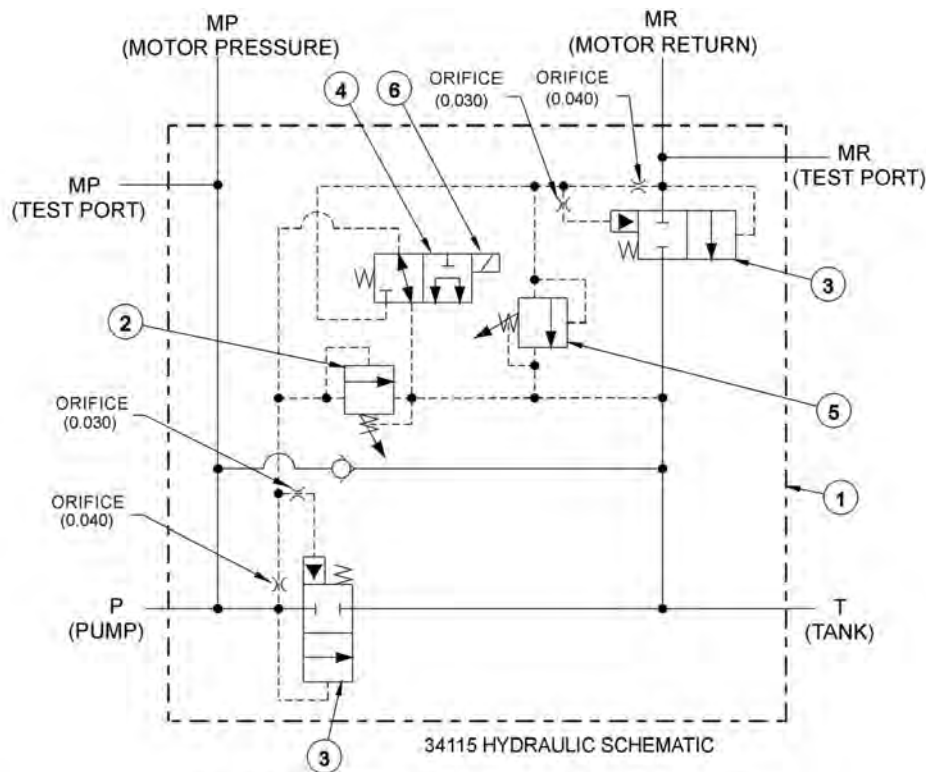
ITEM	PART NO.	QTY.	DESCRIPTION
1	-----	-	SWITCH BOX
2	RE37651	1	PLUG,AUX PWR
3	24204	-	FUSE HOLDER,IN-LINE (OPTION)
4	6T3965	-	FUSE,3AMP (OPTION)
5	6T3934	-	TEMPERATURE GAUGE (OPTION)
6	6T3931	-	TEMPERATURE SENSOR (OPTION)

BRAKE VALVE ASSEMBLY



ITEM	PART NO.	QTY.	DESCRIPTION
---	06510083	1	BRAKE VALVE, ASSY
1	34092	1	BRAKE VALVE, BLANK
2	34094	2	LOGIC ELEMENT
3	34095	1	RELIEF VALVE, 3000 PSI
4	06510095	1	METRI PAK COIL
5	34093	1	CARTRIDGE, 2 POSITION, 3 WAY (WITH NUT & WASHER)
6	34091	1	RELIEF VALVE, 2600 PSI
---	34096	2	RELIEF SEAL KIT
----	34097	1	SOLENOID SEAL KIT
---	34098	2	ELEMENT SEAL KIT

BRAKE VALVE HYDRAULIC SCHEMATIC



BRAKE VALVE TROUBLESHOOTING

FAILURE MODE:

- MOWER WILL NOT START - system pressure is low (engine not lugging).
- MOWER WILL NOT START - system pressure is high (engine lugging). "MR" port will be high pressure.
- MOWER WILL NOT ROTATE AT FULL SPEED - limited power.
- MOWER BLADE WILL NOT STOP - blade will not stop in proper time.

CHECK STEPS

1 thru 6

7

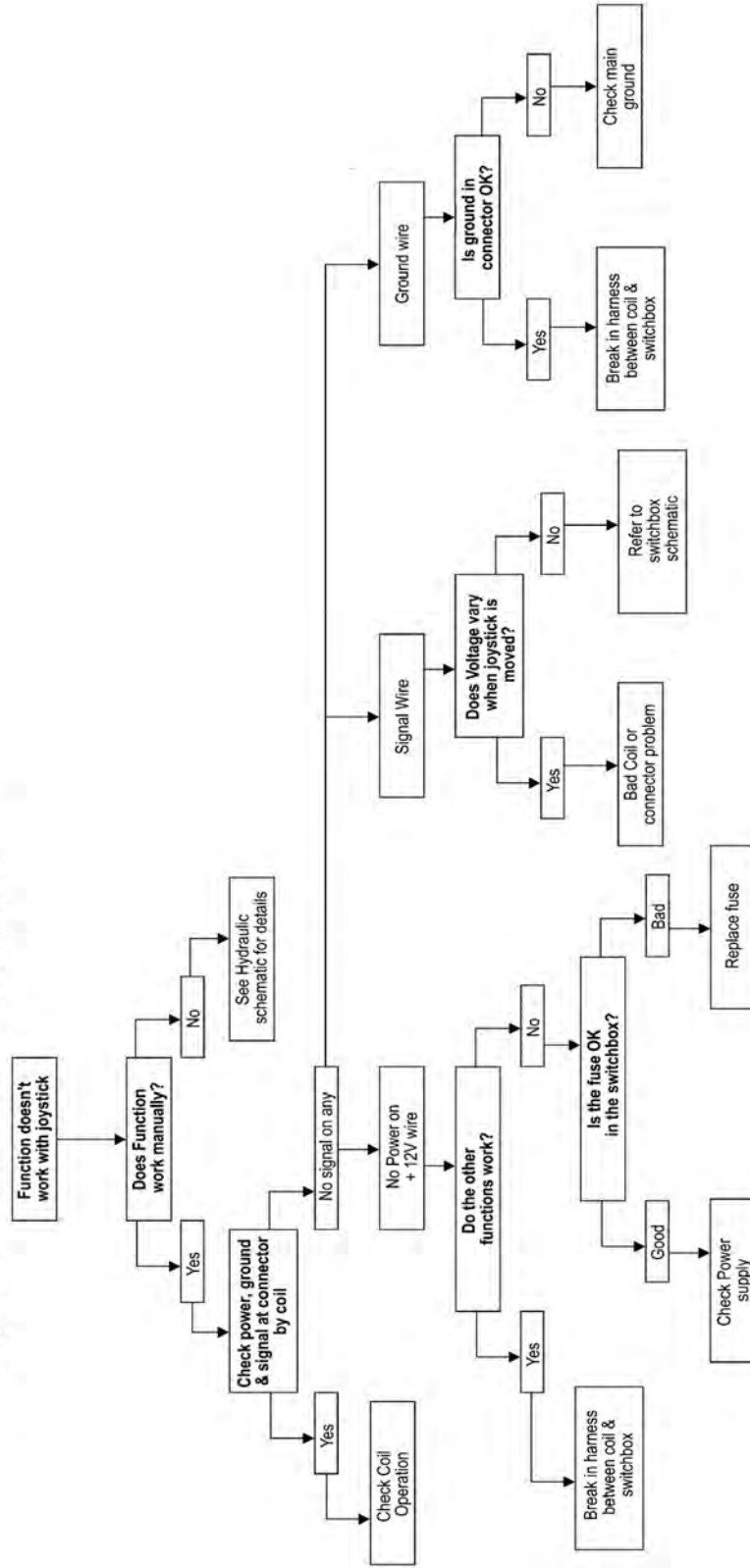
3 thru 5

7 thru 9

CORRECTIVE STEPS:

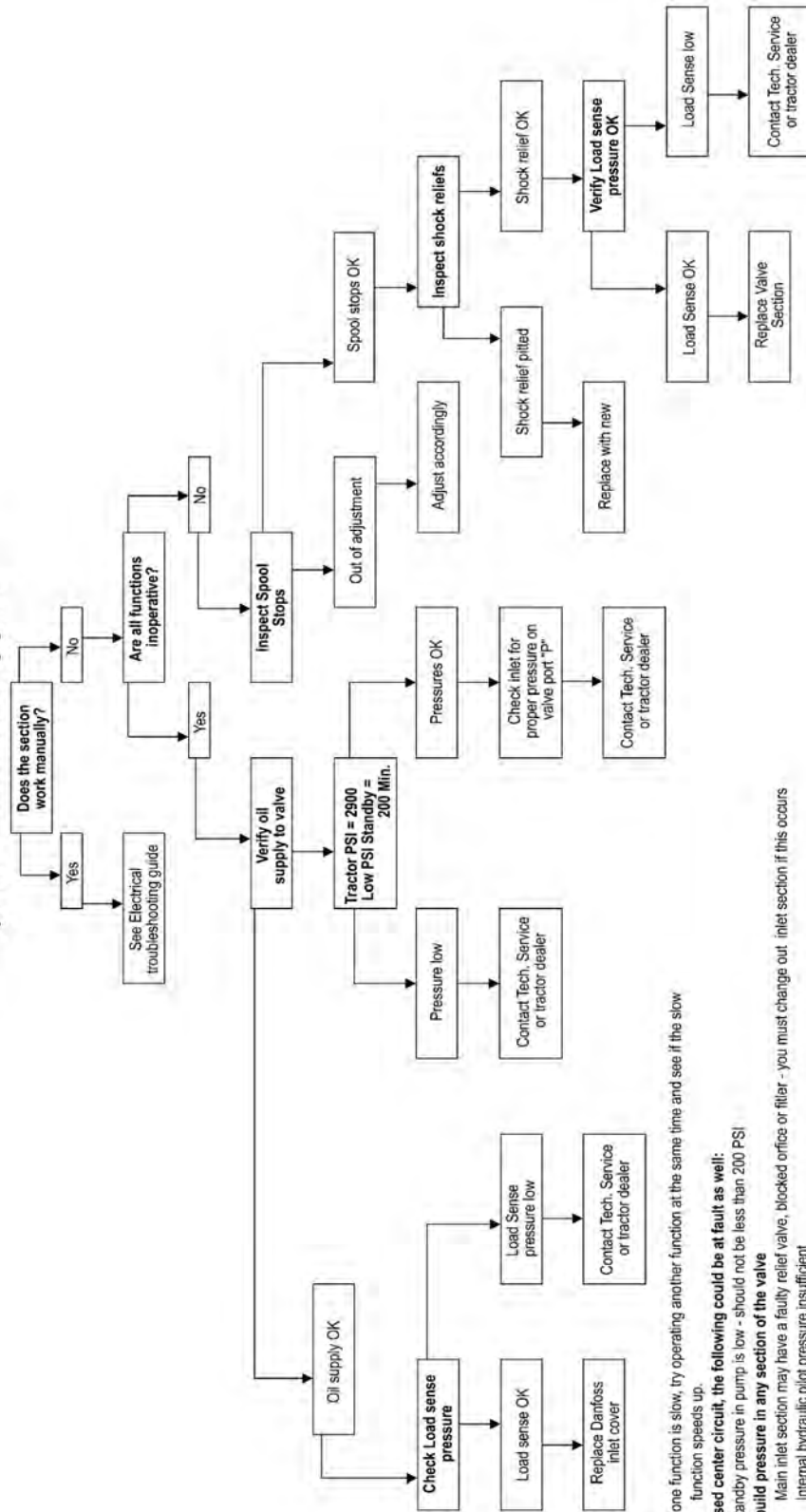
1. Check for voltage at solenoid (item 6), voltage must be between 10.2 volts and 13.8 volts.
2. Remove, inspect solenoid and cartridge (items 4, 6) for wear or contamination.
3. Remove, inspect logic elements near "P" port (item 3) for wear or contamination.
4. Remove, inspect 3000 psi relief valve (item 2) for wear or contamination.
5. Remove and inspect orifices near "P" port for contamination.
6. Remove "P" port hose and fitting, visually inspect for contamination, check ball for movement.
7. Remove and inspect orifices near "MR" port for contamination.
8. Remove, inspect 2600 psi relief valve (item 5) for wear or contamination.
9. Remove, inspect logic element near "MR" port (item 3) for wear or contamination.

Joystick Electrical Troubleshooting guide



HYDRAULIC TROUBLESHOOTING GUIDE

Hydraulic Troubleshooting guide



Notes: If one function is slow, try operating another function at the same time and see if the slow function speeds up.

On a closed center circuit, the following could be at fault as well:

Tractor standby pressure in pump is low - should not be less than 200 PSI

Cannot build pressure in any section of the valve

Main inlet section may have a faulty relief valve, blocked orifice or filter - you must change out inlet section if this occurs
Internal hydraulic pilot pressure insufficient

JOYSTICK TROUBLESHOOTING

Boom operation not responding to joystick movement.

Isolate hydraulic vs. electronic symptom.

Turn off electronic master switch (preventing electronic actuator on valve from attempting to hold spool in neutral position). With tractor engine running, operate the valve section with the manual handle. If function operates normally, continue with electronic inspection. If function does not operate normally, continue with hydraulic inspection.

Electronic inspection.

Connect a voltmeter to the cable connector of the valve section that is not operating. This will allow you to measure supply and signal voltage when the joystick is operated.

Main, Secondary, and Swivel Valves – signal voltage should be 50% of supply voltage with joystick in Neutral position, up to 75% of supply voltage in B direction, down to 25% of supply voltage in A direction. Signal voltage should change smoothly with lever movement.

Pin #1 – Signal Voltage, Pin #4 – Power Voltage, Pin #3 – Ground

Deck Roll Valve or Float Valve – signal voltage should be 50% of supply voltage with joystick in Neutral position, up to 65% of supply voltage in B direction, down to 35% of supply voltage in A direction. Signal voltage should change smoothly with lever movement. Signal voltage should be approximately 75% of supply voltage when float switch is operated.

Pin #1 – Signal Voltage, Pin #4 – Power Voltage, Pin #3 – Ground

Shield Valve or On/Off Valve – Voltage on pin #1 should be equal to supply voltage when switch is operated in A direction. Voltage on pin #4 should be equal to supply voltage when switch is operated in B direction.

Pin #1 – Signal Voltage (Shield Open), Pin #4 – Signal Voltage (Shield Close), Pin #3 – Ground

If none of the valve will operate with electrical signal, verify that there is oil pressure at the valve inlet. Electrical Valves must have pilot supply oil to move the spools.

Possible electronic problems.

Open circuit (broken wire, bad connection or loose connection in switchbox).

Shorted to positive, ground, or other.

Incorrect voltage signal from joystick.

Continued on next sheet

TROUBLESHOOTING - CONTINUED

Hydraulic inspection.

Install 3 pressure gauges, on the valve inlet (use M port, or tee into hose supplying oil from the pump to the inlet), on the workport that is not operating, and on the LS port.

With the spools in Neutral

Gear pump – P should be approximately 200 psi, LS = 0, workport – pressure on cylinder or function.

LS pump – P should equal pump standby pressure, LS = 0, workport – pressure on cylinder or function.

Pressure Comp pump – P should equal pump standby pressure, LS = 0, workport – pressure on cylinder or function.

Gear pump – P should be approximately 200 psi higher than LS, LS should equal workport, workport – pressure on cylinder or function.

LS pump – P should be LS + standby, LS should equal workport, workport – pressure on cylinder or function.

Pressure Comp pump – P should equal pump standby pressure, LS should equal workport, workport – pressure on cylinder or function.

Operate one spool, measure pressures with function at end of travel or stop

Gear pump – P should equal valve relief setting or workport shock valve setting. LS should equal workport. Workport should equal relief setting or workport shock valve setting.

LS pump – P should equal valve relief setting, pump max pressure setting, or workport shock valve setting. LS should equal workport. Workport should equal relief setting, pump max pressure setting, or workport shock valve setting.

Pressure Comp pump – P should equal pump standby pressure, LS should equal workport. Workport should equal pump standby pressure or workport shock valve setting.

Operate more than one spool.

Gear pump – P should be approximately 200 psi higher than LS. LS should equal highest workport pressure. Workport – pressure on cylinder or function.

LS pump – P should be LS + standby pressure. LS should equal highest workport pressure. Workport – pressure on cylinder or function.

Pressure Comp pump. P should equal pump standby pressure. LS should equal highest workport pressure. Workport – pressure on cylinder or function.

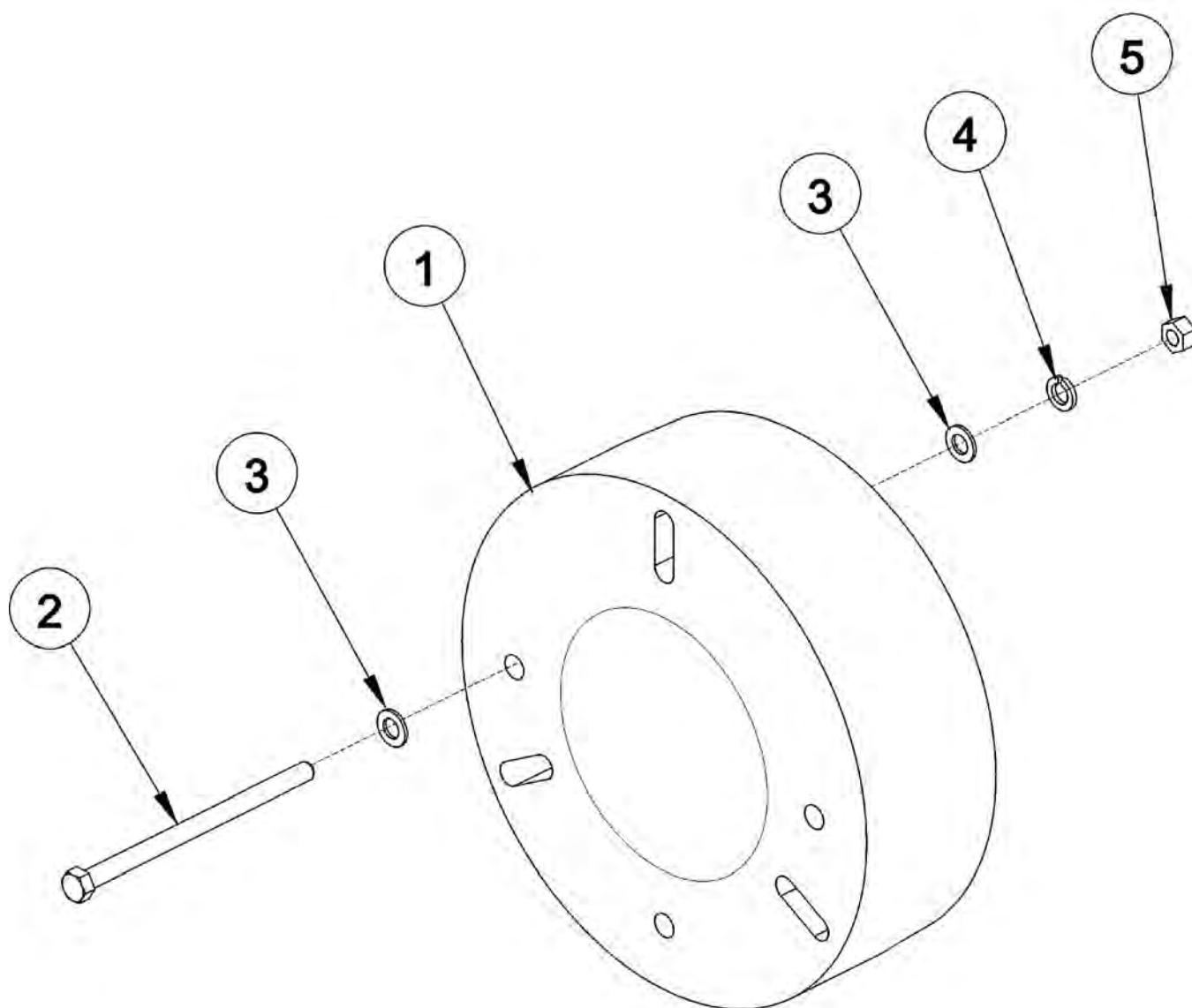
Possible hydraulic problems.

Cylinder leak.

LS signal leaking to tank before reaching pump LS port.

Hydraulic system or pump not supplying flow to valve.

WHEEL WEIGHT - BENGAL 18



ITEM	PART NO.	QTY.	DESCRIPTION
1	30687	1	500# WHEEL WEIGHT
2	21956	4	CAPSCREW,3/4" X 13",NC
3	22021	8	FLATWASHER,3/4"
4	21993	4	LOCKWASHER,3/4"
5	21825	4	HEX NUT,3/4",NC

COMMON BENGAL T4



TIGER CORPORATION

WARRANTY INFORMATION

Tiger Corporation, 3301 N. Louise, Sioux Falls, South Dakota, warrants to the original Retail Customer, the new Tiger equipment is free of defects in material and workmanship. Any part of said equipment that in Tiger's adjustment, show evidence of such defects will be repaired or replaced without charge, provided that the failure of part(s) shall have occurred within twelve (12) months from the date of delivery of said equipment to the Retail Customer. Expendable components such as knives, oil, chain sprockets, skid shoes, knife mounting disks and the like are excluded but not limited to this warranty.

The Retail Customer must pay the transportation cost to and from the Tiger Dealer's service shop for warranty service. Warranty service will be performed by the Tiger Dealer from whom the equipment was purchased, in his service shop and during his regularly scheduled days and hours of operation.

All Tiger obligation under this warranty shall be terminated if the equipment is modified or altered in ways not approved in writing by Tiger, if repair parts other than genuine Tiger repair parts have been used, or if the equipment has been subject to misuse, neglect, accident, improper maintenance or improper operation.

Tiger Corporation reserves the right to make improvements in design or changes in specification at any time without incurring any obligation to owners of equipment previously sold.

No agent or person has authority to alter, add to or waive the above warranties which are agreed to be in the only warranties, representations or promises, expressed or implied, as to the quality or performance of the products covered and which do not include any implied warranty of merchantability or fitness. In no event will Tiger be liable for incidental or consequential damages or injuries, including, but not limited to, loss of profits, rental or substitute equipment or other commercial loss.

**THERE ARE NO WARRANTIES WHICH EXTEND
BEYOND THOSE EXPRESSED HEREIN.**

It is the Purchaser's obligation to sign the warranty registration form **AFTER** he / she has Read and Understands the Operation and Safety Instructions stated within this manual.

ONE LAST WORD

This manual cannot possibly cover all of the potentially hazardous situations you will encounter. By being familiar, though, with the safety rules, operating and maintenance instructions in this manual you can help prevent accidents. The objective of this manual is to help make you a better operator. Remember, **SAFETY IS YOU!**



Your safety and the safety of those around you depends on **YOU**. Common sense should play a large role in the operation of this machine.

Since we at Tiger Corporation are constantly striving to improve our products, we reserve the right to change specifications or design at any time.

