

# Operator's Manual & Parts List

## Pro-Flex 120

Serial No. 14272040 and up



## Pro-Flex Roller 120

Serial No. 15101019 and up



PROGRESSIVE TURF EQUIPMENT INC.  
137 WEST WILLIAM STREET  
SEAFORTH, ONTARIO  
CANADA N0K 1W0  
TOLL FREE: 800 668-8873  
ISSUE DATE: November, 2014  
P.N. 120534

**PROGRESSIVE**  
TURF EQUIPMENT INC.

*The Better Built Choice.™*

[www.progressiveturfequip.com](http://www.progressiveturfequip.com)



## DECLARATION OF CONFORMITY

According to Annex 11 A of the European Community Regulation for Machines

We, Progressive Turf Equipment Inc. 137 West William Street, Box 940, Seaforth Ontario, Canada declare under our sole responsibility that:

### Progressive Rotary Finishing Mowers

<u>Models:</u>	<u>Part Number</u>	<u>Description</u>
TD65-2	526512D	3.66m Tri-Deck Finishing Mower
TD65	526515D	4.72m Tri-Deck Finishing Mower
TD92	529222E	6.70m Tri-Deck Finishing Mower
PM-36	529236E	10.97m Pro-Max 36 Mowing System
PF-120	601205D	3.05m Pro-Flex Contour Mower
PFR-120	601205RD	3.05m Pro-Flex Roller Contour Mower
TDR-12	528712D	3.65m Tri-Deck Roller Mower
TDR-15	528750D	4.72m Tri-Deck Roller Mower
TDR-22	526822C	6.70m Tri-Deck Roller Mower
SDR-65	531965C	165cm Three Point Hitch Roller Mower
SDR-90	531990C	228.6cm Three Point Hitch Roller Mower

are in conformity with Directive 98/37/EC of the European Parliament and of the Council of 22 June, 1998 on the approximation of the laws of the member states relating to Machinery.

The Technical Construction File is maintained at the corporate offices of Progressive Turf Equipment Inc. at the address listed above.

Dated at Seaforth, Ontario Canada the 24<sup>th</sup> day of November, 2014.



Luke Janmaat  
President  
Progressive Turf Equipment Inc.



<b>TABLE OF CONTENTS</b>	<b>PAGE</b>
<b>INTRODUCTION</b> .....	<b>3</b>
<b>FOREWORD</b> .....	<b>3</b>
ITEMS INCLUDED WITH PRO-FLEX 120 MOWER .....	4
SERIAL NUMBER LOCATION.....	4
REPLACEMENT PARTS INFORMATION .....	4
UNAUTHORIZED MODIFICATION.....	4
MISUSE OF EQUIPMENT .....	5
NOTIFICATION OF UNAUTHORIZED MODIFICATION OR MISUSE .....	5
PRODUCT DESIGN .....	5
<b>SPECIFICATIONS</b> .....	<b>6</b>
PRO-FLEX 120.....	6
PRO-FLEX ROLLER 120 .....	7
<b>COMPONENT IDENTIFICATION</b> .....	<b>8</b>
PRO-FLEX 120.....	8
PRO-FLEX ROLLER 120 .....	9
<b>SAFETY RULES</b> .....	<b>10</b>
SAFETY ALERT SYMBOL .....	10
HAZARD SERIOUSNESS LEVEL .....	10
GENERAL SAFETY PRECAUTIONS .....	11
POWER UNIT SAFETY.....	11
OPERATING EQUIPMENT SAFELY .....	12
MAINTENANCE SAFETY PRECAUTIONS .....	13
SAFETY DECALS .....	16
DECAL LISTING.....	17
<b>ASSEMBLY INSTRUCTIONS</b> .....	<b>18</b>
<b>MOWER SETUP FOR OPERATION</b> .....	<b>19</b>
HITCH ADJUSTMENT .....	19
HITCHING THE MOWER TO THE TRACTOR .....	20
STOWING THE JACK.....	20
CONNECTING THE TRACTOR PTO .....	20
CONNECTING THE HYDRAULICS.....	21
CONNECTING THE PULL ROPE .....	21
MOWER SAFETY LOCKS .....	21
CHECK PTO LENGTH - TURNING AND ON HILLS .....	23
CHECK TIRE CONTACT DURING TURNS.....	23
DISCONNECTING THE MOWER.....	24
LONG-TERM STORAGE .....	24
<b>ADJUSTING THE MOWER FOR CUTTING</b> .....	<b>25</b>
SETTING CUTTING HEIGHT – PRO-FLEX 120 .....	25
SETTING CUTTING HEIGHT – PRO-FLEX ROLLER 120.....	26
SETTING THE DISCHARGE DEFLECTORS .....	27
WING FRAME ALIGNMENT .....	27
DAILY CHECK LIST .....	28
RAISING AND LOWERING THE DECKS.....	28
ENGAGING THE MOWER.....	29
MOWING .....	29
Pro Lift-N-Turn™ SYSTEM .....	29
<b>TRANSPORTING THE MOWER</b> .....	<b>31</b>
TIE DOWN LOCATIONS.....	31

**MAINTENANCE.....32**

- LUBRICATION .....33
- “V” BELT DRIVE.....37
- FASTENER INSTALLATION TORQUE .....38
- BLADE SERVICING .....39
- SPINDLE SERVICE .....40
- HYDRAULICS .....42
- SUPPORTING MACHINE FOR SERVICE.....43
- TRANSPORT TIRES.....43
- LONG-TERM STORAGE .....43
- TROUBLE SHOOTING .....44

**PARTS LIST.....45**



**DANGER!**

Si No Lee Ingles, Pida Ayuda a Alguien Que Se Lo Lea  
Para Que le Traduzca Las Medidas de Seguridad

## INTRODUCTION

Thank you for purchasing a Pro-Flex 120 mower. This product is designed and manufactured to allow safe and productive mowing of contoured areas. A well-maintained machine will provide years of reliable service.

## FOREWORD

This is the Operator's Manual for both Pro-Flex 120 (PF-120) and Pro-Flex Roller 120 (PFR-120) mowers. Throughout this manual "Pro-Flex 120" is used to describe both mowers. Unique features / items for either model is identified as such.

Keep this manual with the mower at all times. This manual is intended as a guide to the safe use and maintenance of the machine, so before you operate this machine, study this manual carefully.

### Replace this manual immediately if it becomes lost.

This manual is not considered all-inclusive, so for further information on specific components, e.g. PTO shafts etc refer to the respective documents included with the manual set for this machine.

The Pro-Flex series mowers are contour turf grass finishing mowers with a 10 foot cutting width, and are designed to be pulled by a 30- 40 PTO horsepower utility tractor. These versatile mowers have the ability to mow both contoured and flat terrain that requires a high quality finished after cut appearance. They can also blow leaves while backing up or be equipped with optional mulching blades and baffles to help return nutrients to the turf. High blade tip speed leaves a second-to-none after cut appearance. Shock absorbers on each mowing deck control deck bounce as the Pro-Flex follows changing ground contours.

#### Features:

- Five independent floating decks
- Cut height can be set on each deck between 3/4 inch and 3 inches
- 10' foot cutting width with all decks down or 6 foot cutting width with the outer decks raised
- Automatic rubber damped belt tensioners for consistent tension and long belt life
- The Pro-Flex 120 features a combination of swivelling and rigid caster wheels ensures true straight line tracking and easy turning without scuffing
- The Pro-Flex Roller 120 features urethane rollers front and rear of each deck to better follow contours and leave a pleasant striped finish on the turf.
- Automatic mechanical deck locks for transport

#### Applications:

- Golf course roughs, fairways and bunker surrounds
- Corporate and industrial campuses
- Park lands and recreational areas & sports venues
- Landscaped venues

Pro-Flex Series Mower Application Guide		
Model	Pro-Flex 120	Pro-Flex Roller 120
Soil Type	All (firm ↔ sandy)	Firm (clay-loam) Avoid sandy / soft soils
Turf Condition	All, free from significant depressions that will catch deck tires	Mature, free of protruding rocks / tree roots*
Comments	For use in areas where ride-on reel-type mowers cannot be used.	For use in areas where ride-on reel type mowers can be used.

\*Deck roller/support may catch on ground level obstacles

**OSHA Training Requirements (USA)**

The following training requirements have been taken from Title 29, Code of Federal Regulations Part 1928.57 (a)(6). [www.osha.gov](http://www.osha.gov)

Operator Instructions: At the time of initial assignment and at least annually thereafter, the employer shall instruct every employee in the safe operation and servicing of all covered equipment with which he is or will be involved, including at least the following safe operating practices.

In other jurisdictions:

It is good practice, following the initial instruction and at least annually thereafter, the employer shall instruct every employee in the safe operation and servicing of all covered equipment with which he is or will be involved, including at least the following safe operating practices.

**ITEMS INCLUDED WITH PRO-FLEX 120 MOWER**

- Pro-Flex 120 Operator's Manual & Parts List
- Service instructions for PTO drive shafts and safety clutches
- Blade balancer tool
- Drive belt tensioner tool

**SERIAL NUMBER LOCATION**

The serial number plate for the machine is located on the left-hand front frame.

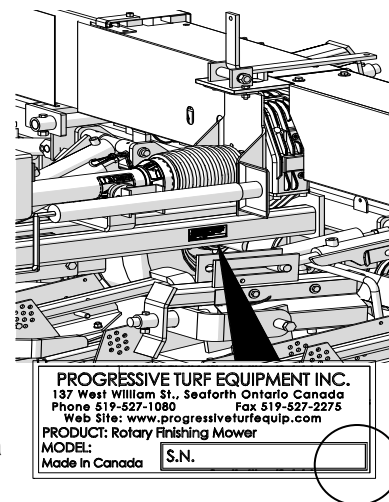
For quick reference, record the following information:

Model: \_\_\_\_\_ Pro-Flex 120 \_\_\_\_\_  
Serial Number: \_\_\_\_\_  
Date purchased: \_\_\_\_\_

NOTE: The last digit in each PF-120/PFR-120 serial number is a letter. This letter denotes the geographic destination of the mower.

- D EU Regulatory Region
- B Non- EU Regulatory Region

There are differences in the parts required to service your mower based on this geographic code as are referred to throughout the parts lists. Always state this information when contacting your selling dealer and when ordering spare parts.



**REPLACEMENT PARTS INFORMATION**

Use only Genuine Original Equipment Manufacturers (O.E.M.) replacement parts. The use of "will fit" parts may reduce machine performance, void machine warranties and present a safety hazard. Use Genuine OEM parts.



**UNAUTHORIZED MODIFICATION**

Modifications to the original design of the Pro-Flex 120 mower, including the use of unauthorized accessories or non-genuine OEM parts, may affect the reliability of the machine or make it unstable or unsafe to operate and perform as originally designed and intended. Persons or organizations that make unapproved modifications (including operation without provided guards and shields) assume all liability arising from or related to the modification including any adverse affect on the machine.

No modification can be made to the original design or assembly of the Pro-Flex 120 mower (including any and all attachments, safety or control devices) without the prior written consent of the Progressive Turf Equipment Inc.'s Engineering Manager (see contact information below). Progressive Turf Equipment Inc. retains the right to reject all claims which arise from or are related to unauthorized modifications.



Modifications are officially approved if at least one of the following conditions is met:

- i. The attachment, accessory or part is distributed by Progressive Turf Equipment Inc. and is intended for a Pro-Flex 120 mower application and installed in an approved manner as described in Progressive Turf Equipment Inc.'s provided instructions; or
- ii. The modification has been approved in writing by the Progressive Turf Equipment Inc.'s Engineering Manager.

No other entity is authorized by Progressive Turf Equipment Inc. to provide such approval.

## **MISUSE OF EQUIPMENT**

It is incumbent upon the user, owner and selling dealer of this equipment along with their respective employees to warn and discourage users about the misuse of the equipment whenever knowledge of misuse becomes known, whether the act has, is or could occur. Such acts include, but not limited to: riding upon, use of non-OEM parts, operation on unstable or dangerous terrain, operating in explosive or fire-hazard areas, modifications that alter the original machine specifications or use other than originally intended, etc.

## **NOTIFICATION OF UNAUTHORIZED MODIFICATION OR MISUSE**

If any person, employee, agent, dealer or distributor becomes aware of any Unauthorized Modification or Misuse of a Pro-Flex 120 mower, either past or intended, it is the responsibility of that person to ensure that Progressive Turf Equipment Inc.'s Engineering Manager is notified of the occurrence promptly. That person shall provide; the facts of the occurrence, location, machine serial number, name and contact information of the persons involved.

Send correspondence regarding Unauthorized Modification or Misuse to:

Progressive Turf Equipment Inc.  
Box 940, 137 West William St.  
Seaforth, Ontario, N0K 1W0  
Canada  
Attn: Engineering Manager

## **PRODUCT DESIGN**

The Pro-Flex 120 mower has been designed and produced using generally acceptable manufacturing processes as is standard in the industry for the type of equipment that is similar to the machine. As such, the useful life of the machine is ten (10) years from the date of manufacture.

### **The official language of the manufacturer is English.**

No responsibility is assumed for translations in other languages, which do not correspond to the original meaning.

Under our policy of continuous improvement, we reserve the right to change specifications and designs without prior notice. The illustrations shown do not necessarily represent the standard version of product offered by Progressive Turf Equipment Inc.

## SPECIFICATIONS

### PRO-FLEX 120

#### Tractor Requirement

Size.....	30-40 hp
PTO Input Speed.....	540 rpm
Maximum Hydraulic Pressure .....	2000 psi
Minimum Required Hydraulic Flow .....	7 US gpm

#### Machine Specifications

Cutting Width .....	10 ft.
Turning Radius	16 in uncut circle.
Cutting Height	Minimum.....0.75 in. Maximum.....3 in
Flexibility	
Mower Decks	Fore & Aft Rotation.....+/- 10° Left & Right Rotation.....+/- 10° Vertical Movement .....
Hitch	Rotation.....360°
Mower Decks	
Configuration	5 deck independent staggered
Suspension	4-way floatation with walking beam
Construction	Welded Steel – 3/16 in. (7 ga) thickness
Spindles	Easy drop out 4 bolt style with integral blade stiffener
Blades	5 x 27" diameter (high lift std., mulching optional)
Blade Mounting	Two bolts/nuts per blade (No internal threads)
Tires	10 in dia. x 4 in wide, Puncture proof, non-scuffing (4) per deck, tapered roller bearing support
Anti Scalp	Impact Resistant Rollers (front and rear of each deck)
Power Transmission	
Input Shaft	1 3/8 dia – 6 Spline 80° Constant Velocity /w auto locking collar
Gearbox	Cast Iron Housing /w Helical gears
Deck Drive	Aramid fiber reinforced V-Belts
Belt Tensioning	Self adjusting rubber dampened torsional tensioners
Transport Tires	(2) Heavy Duty 18.5 x 8.5 – 8, 4 ply, 5 bolt.
Productivity	2 mph .....2.2 acres / hr. 4 mph .....4.4 acres / hr. 6 mph .....6.5 acres / hr.
Transport Dimensions	Width .....8ft. 9in. (Max) Height.....4.1 ft Length .....11 ft.
Weight	Machine.....2,075 lbs Tongue .....195 lbs

**PRO-FLEX ROLLER 120**

Tractor Requirement

Size.....	30-40 hp
PTO Input Speed.....	540 rpm
Maximum Hydraulic Pressure .....	2000 psi
Minimum Required Hydraulic Flow .....	7 US gpm

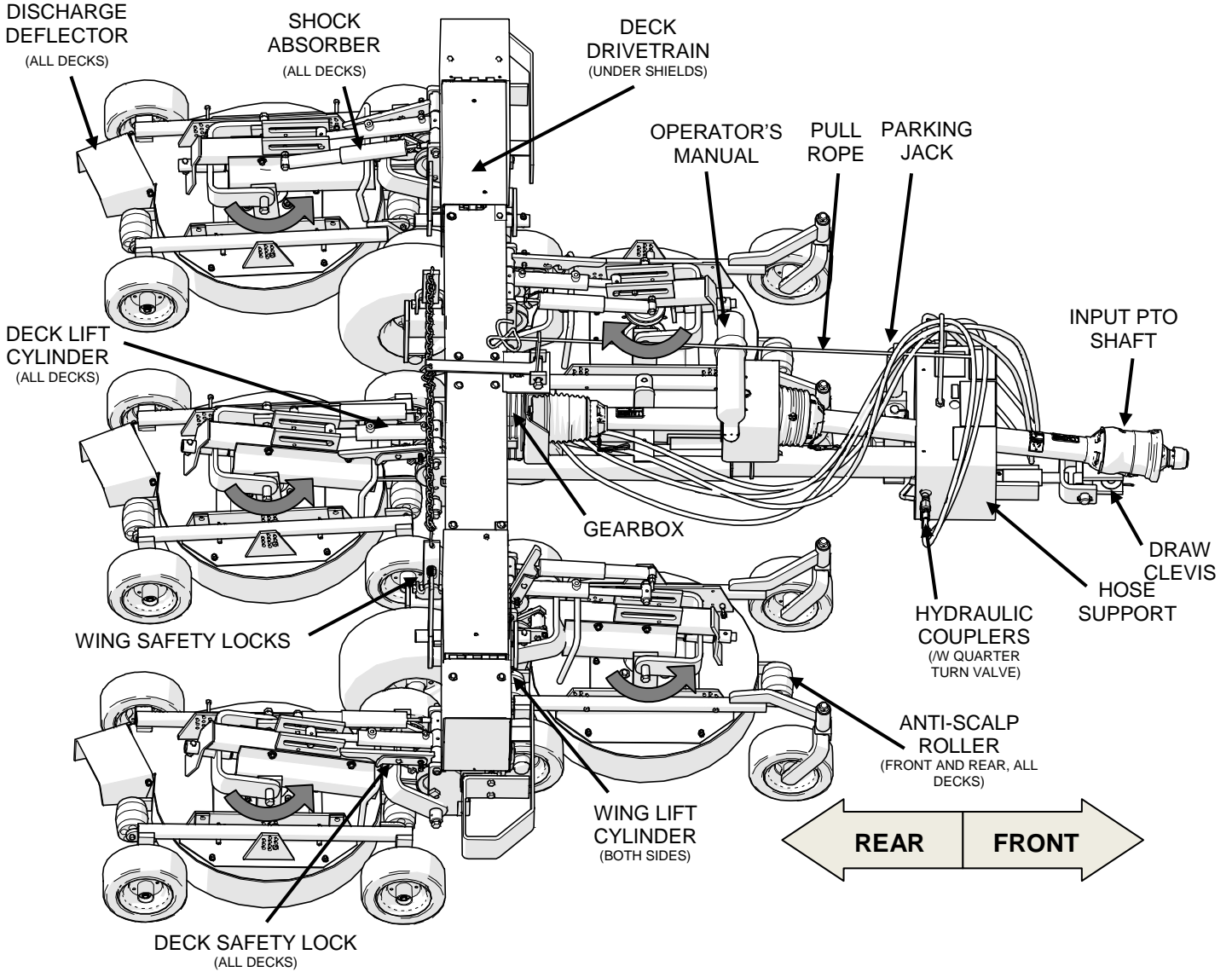
Machine Specifications

Cutting Width	..... 10 ft.
Turning Radius	16 in uncut circle.
Cutting Height	Minimum.....0.5 in. Maximum.....3 in
Flexibility	
Mower Decks	Fore & Aft Rotation..... +/- 10° Left & Right Rotation..... +/- 10° Vertical Movement ..... +/-8 in
Hitch	Rotation.....360°
Mower Decks	
Configuration	5 deck independent staggered
Suspension	4-way floatation with walking beam
Construction	Welded Steel – 3/16 in. (7 ga) thickness
Spindles	Easy drop out 4 bolt style with integral blade stiffener
Blades	5 x 27" diameter (high lift std., mulching optional)
Blade Mounting	Two bolts/nuts per blade (No internal threads)
Rollers	3 in dia. Urethane with maintenance free roller bearing support
Power Transmission	
Input Shaft	1 3/8 dia – 6 Spline 80° Constant Velocity /w auto locking collar
Gearbox	Cast Iron Housing /w Helical gears
Deck Drive	Aramid fiber reinforced V-Belts
Belt Tensioning	Self adjusting rubber dampened torsional tensioners
Transport Tires	(2) Heavy Duty 18.5 x 8.5 – 8, 4 ply, 5 bolt.
Productivity	2 mph .....2.2 acres / hr. 4 mph .....4.4 acres / hr. 6 mph .....6.5 acres / hr.
Transport Dimensions	Width .....8ft. 9in. (Max) Height.....4.1 ft Length .....11 ft.
Weight	Machine.....2,120 lbs Tongue ..... 195 lbs

# COMPONENT IDENTIFICATION

## PRO-FLEX 120

NOTE: DECK BLADE ROTATION DIRECTIONS

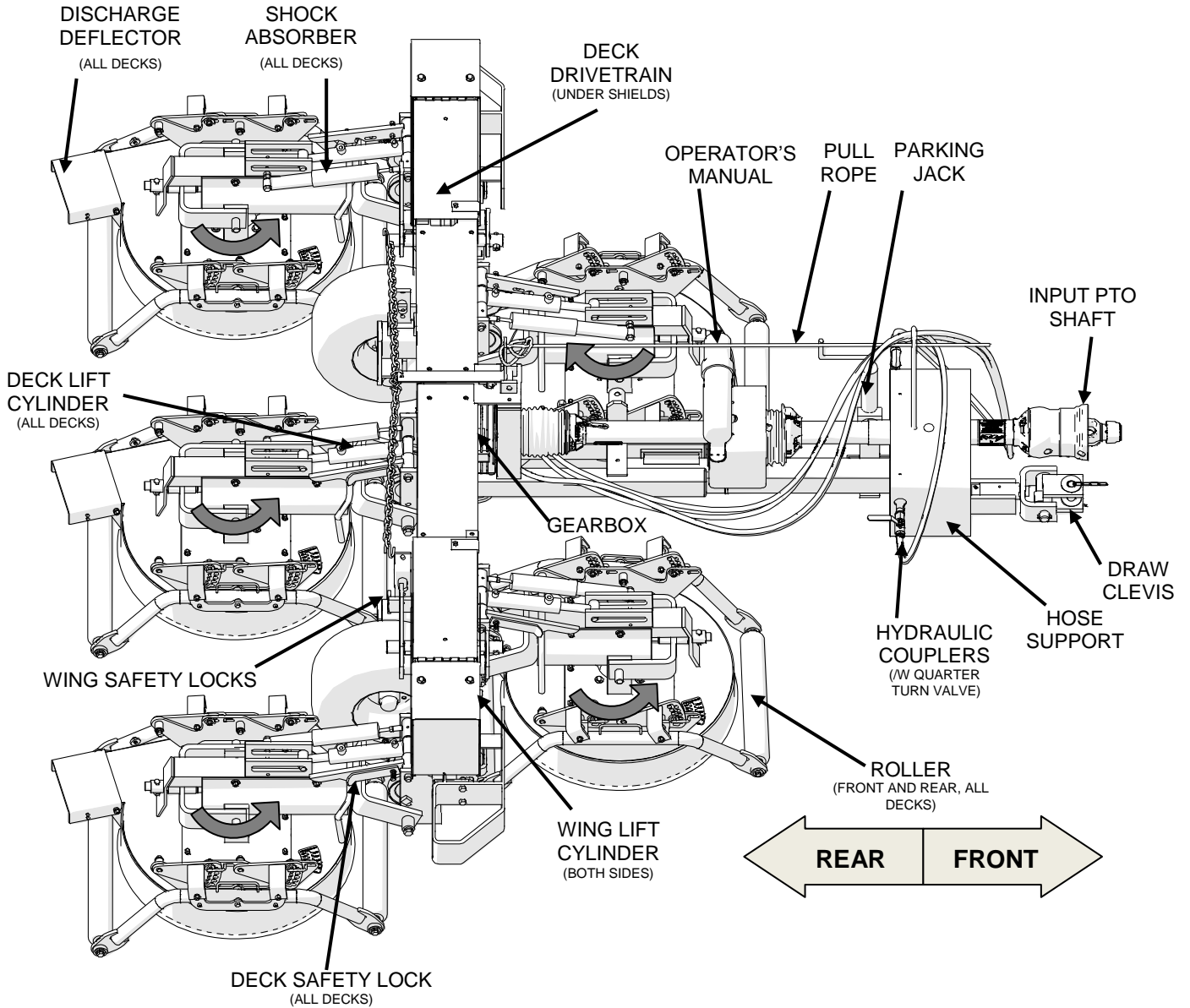


### NOTES

- 1) Throughout this manual, references are made to right and left directions. These are determined by standing at the rear of the equipment and facing the direction of forward travel.
- 2) Blade rotation are expressed as "Left Hand" (LH) or "Right Hand" (RH). LH rotating blades rotate counter-clockwise as viewed from the top of the mower and are on all decks except the front left deck. The RH rotation blades on the front left deck rotates clockwise as viewed from the top of the mower.

**PRO-FLEX ROLLER 120**

NOTE: DECK BLADE ROTATION DIRECTIONS



**NOTES**

- 1) Throughout this manual, references are made to right and left directions. These are determined by standing at the rear of the equipment and facing the direction of forward travel.
- 2) Blade rotation are expressed as "Left Hand" (LH) or "Right Hand" (RH). LH rotating blades rotate counter-clockwise as viewed from the top of the mower and are on all decks except the front left deck. The RH rotation blades on the front left deck rotates clockwise as viewed from the top of the mower.

## SAFETY RULES

All rotary mowers are potentially dangerous machines; this mower has been designed to minimize the safety risks to the operator, bystanders and property. This section of the Operator's Manual details a number of safety rules pertaining to the operation and maintenance of Progressive Turf Equipment mowers. In order to minimize risks and promote safety at all times, these rules must always be followed and obeyed.

Further safety rules and warning texts are given within the respective sections of this manual.

**IMPORTANT! - When it comes to safety, nothing will ever replace a careful operator.**

It is imperative that the operator and safety personnel read and understand all of the safety information in this manual before proceeding. Failure to follow the instructions or heed the warnings could result in injury or death.

Proper care is your responsibility.

The manufacturer cannot anticipate every possible circumstance that might involve a hazard. The hazard alerts in this publication and on the product, are therefore not all inclusive. If a tool, procedure, work method, or operating technique not specifically recommended by the manufacturer is used, it is your responsibility to ensure that it is safe for you and others. You should also ensure the machine will not be damaged or made unsafe by the operation, maintenance, or repair procedures you choose. Modifications or adaptations to the machine are not allowed.

Various jurisdictions have specific requirements for work zone safety. Know and adhere to your local requirements. Treat the instructions in this manual as minimum requirements for safe operation.

## SAFETY ALERT SYMBOL

This symbol appears at various points in the manual together with a signal word and warning text. It means – Be alert! Your safety is involved. This symbol is used throughout the manual to call attention to areas in which carelessness or failure to follow specific procedures may result in personal injury or component damage / malfunction or both.

## HAZARD SERIOUSNESS LEVEL

The following signal words are found throughout the manual together with the safety alert symbol to indicate the seriousness level of identified hazards. Their selection is based on the consequence of human interaction with a hazard.

**DANGER!** – Hazards or unsafe practices which WILL result in severe personal injury or death.

**WARNING!** – Hazards or unsafe practices that COULD result in severe personal injury or death.

**CAUTION!** – Hazards or unsafe practices that COULD result in minor personal injury or product or property damage



**DANGER!**



**WARNING!**

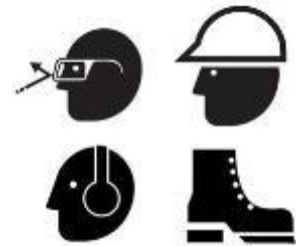


**CAUTION!**

## GENERAL SAFETY PRECAUTIONS

### WARNING!

- The operator of this machine must have sufficient knowledge and instructions in the care and operation of this mower and the power unit being used before he / she uses the machine. Do not allow unauthorized persons or children to operate the machine. Do not allow riders on the machine.
- It is the obligation of the operator to make sure that all guards and shields are in place on the machine. Safety decals must be in place and be readable – accidents may otherwise occur. Contact your dealer or the manufacturer for replacement manuals or decals.
- Never use a machine that does not have an operator's manual available. Learn and understand the safety signs and symbols on the machine and the operator instructions before you begin to use the machine.
- Wear personal protective equipment. Know and use the protective equipment that is to be worn when operating or servicing the machine. Hard hats, protective glasses and face shields, protective shoes, gloves, reflector type vests, and ear protection are types of equipment that may be required. Prolonged exposure to loud noise can cause hearing damage.
- Never operate a mower while under the influence of drugs or alcohol. These make reflexes slow and put you and others in grave danger. Always make sure you have full concentration while mowing.
- Adhere strictly to all regulations at the worksite pertaining to the operation of this equipment.
- Always disengage power takeoff (PTO) when transporting or traveling between work sites.
- Be prepared for emergencies. Have a first aid kit, fire extinguisher and emergency contact information available at the work site.



## POWER UNIT SAFETY

### WARNING!

- The operator must have sufficient knowledge in the care and operation of the power unit (tractor) before connecting power unit to mower. Read and understand power unit operator's manual before connecting mower.
- Power unit must be equipped with ROPS and seat belt. Foldable ROPS must be secured in the upright position. Follow recommendations of power unit manufacturer. Seat belt must be worn at all times.
- Power unit must be equipped with a 1-3/8" 6 spline 540 RPM PTO connection. Never use PTO adapters to connect implements. Never connect mower driveline to 1000 RPM PTO.

- Hydraulic circuits to control mower functions must be set to 2000psi maximum working pressure.

## OPERATING EQUIPMENT SAFELY

### WARNING!

- Never allow persons to stand between power unit and mower while backing power unit up to hitch the mower.
- Before hitching mower to power unit, place transmission in neutral, set park brake, and turn engine off. Remove the ignition key.
- Make sure locking collar on PTO shaft is properly locked. If the PTO shaft comes off during operation, personal injury or equipment damage could result.
- Tall grass can hide obstacles. Carefully walk the entire area to be mowed beforehand. Look for debris, rocks, tree limbs etc. that will damage or be thrown by the mower blades. Identify objects that cannot be removed. Set mower cutting height to avoid contact.
- Ensure that no bystanders are within 10 ft of mower when wing transport locks are released.
- Keep all bystanders well away from the machine when it is operating. Always maintain a safe operating distance from personnel, other equipment, or vehicles.
- Never operate the mower with deflectors or guards removed. Mower blades can cause small objects and debris to be thrown from under the mower deck at high speeds, up to 300 ft away. Objects ejected by the mower blades can cause severe injury.
- Never tamper with safety devices or operate the mower with them removed. Check proper operation regularly.
- Always disengage PTO, place all controls in neutral, turn power unit off, set parking brake, and remove key before dismounting, for any reason.
- Never place hands or feet under mower deck when the mower is operating or power unit engine is running.
- Disengage the PTO when crossing gravel areas or roadways.
- Disengage the PTO and turn power unit off upon striking any object. Inspect mower and repair any damage before continuing.
- If the equipment should start to vibrate abnormally during operation, stop the mower, shut down power unit, and immediately check for the cause. Excess vibration is generally an indication of a problem. Replace bent or damaged parts, do not attempt to straighten a bent blade.
- Use extreme care when operating on uneven terrain.
- Reduce speed when operating on slopes during wet conditions, especially when making sharp turns.
- Do not use the mower in limited visibility (e.g. at dusk, in fog, heavy rain etc.). Mow only in daylight or good artificial light.
- Disengage PTO and ensure blades are completely stopped before raising wings.





- Ensure wing and deck safety locks are securely engaged before transporting mower with wings in raised position.
- Mower is not intended for transport on public roadways.
- Before disconnecting from power unit, always lower equipment to the ground, place controls in neutral, set park brake, turn engine off, and wait for all moving parts to stop. Relieve hydraulic pressure per power unit manufacturer's instructions.
- Ensure mower tongue jack is securely fastened to mower frame with supplied pin before removing hitch draw pin.

## MAINTENANCE SAFETY PRECAUTIONS

### WARNING!

- Never make adjustments or repairs with the engine running. Always disengage PTO, engage parking brake, turn engine off, lower wings to cutting position and relieve hydraulic pressure before performing any maintenance.
- Observe and perform proper lock-out procedures for power unit if attached to mower during service.
- Keep nuts and bolts tight and properly at the proper torque, especially blade attachment bolts. Check that all cotter pins are properly installed. Keep equipment in good condition.
- Keep mower free of grass, leaves, or other debris build-up.
- Never work on raised mower decks without safety locks in place.
- Periodically check condition of safety devices, guards, and deflectors. Replace only with manufacturer's recommended parts.
- Inspect and replace damaged blades. Use only original OEM parts. Blades can fail from poor maintenance practices.
- Handle mower blades carefully. They are sharp and can cut unprotected skin. Use caution and wear gloves when handling them.
- Check to make sure hydraulic hoses are not worn or damaged, and are routed to avoid chafing.
- Immediately replace any hydraulic hose that shows signs of swelling, wear, leaks or damage so it does not burst.
- Do not use your hand to check for hydraulic oil leaks. Use a piece of cardboard instead. Hydraulic fluid escaping under pressure can penetrate the skin causing serious injury. If skin penetration occurs, seek medical attention immediately. Relieve all pressure before disconnecting hoses.
- Do not bend or strike hydraulic lines, tubes or hoses, or reinstall them in a bent or damaged condition.
- Inspect tires daily for wear or damage. Check tire pressures weekly with an accurate pressure gauge. Do not inflate tires beyond 35 psi.
- Mounting and dismounting tires from rims can be dangerous and should be performed by trained personnel using correct tools, equipment and procedures.



Do not support the machine on cinder blocks, hollow tiles or other members that may fail under continuous load.

Never perform service on a machine that is supported solely by a jack. Always ensure proper blocking is placed to support load during service.



### WELDING AND GRINDING WORK PRECAUTIONS

**IMPORTANT! A fire extinguisher should be easily accessible during all welding work.**

Welding repairs are to be performed by a trained welder with proper service instructions. Know the material to be welded and select the correct welding procedure and materials (electrodes, rods, wire) that will provide a weld metal strength equivalent to the parent material.

Move the machine to a clean, safe area before welding, grinding or using a cutting torch on it. This type of work should only be done in a clean area and not in places that contain combustible liquids, such as fuel tanks, hydraulic pipes or similar.

Connect arc welder ground as close as possible to work area.

Work with extra care when welding, grinding or torch cutting near flammable objects.

### WORKING ON PAINTED SURFACES

Heated paint gives off poisonous gases. Therefore, paint must be removed from an area with a radius of at least 4 in (10 cm) before carrying out welding, grinding, or gas cutting. In addition to the health hazard, the weld will be of inferior quality and strength if the paint is not removed.

Methods and precautionary measures when removing paint:

Blasting – use respiratory protective equipment and protective goggles.

Paint remover or other chemicals – use a portable air extractor, respiratory protective equipment, and protective gloves.

Grinding – use a portable air extractor, respiratory protective equipment, and protective gloves and goggles.



### WORKING ON GALVANIZED / PLATED SURFACES

Only qualified welders should attempt a weld repair on galvanized or plated components. Proper pre-welding surface preparation is required.

Always ensure proper ventilation, wear proper respiratory protective equipment and avoid direct contact with smoke emitted from welding process.

### HYDRAULIC SYSTEM SERVICE PRECAUTIONS



**WARNING!**

**Risk of personal injury! Wear safety glasses and use protective gloves.**

Relieve all trapped pressure before performing any service to the hydraulic system. Pressure can be maintained in the hydraulic circuits long after the power source and pump have been shut down.



When servicing any hydraulic component of the mower ensure that all decks and wings are in their lowered position and all hydraulic pressure is relieved.

Tighten all connections before applying pressure.

It is important that each person who comes in contact with the machine be alert to any faults.

Follow these basic precautions:

- Never adjust a pressure relief valve or other pressure-limiting device to a higher pressure than specified.
- Check to make sure hydraulic hoses are not worn or damaged, and are routed to avoid chafing.
- When connecting mower to tractor ensure hydraulic hoses have sufficient slack for negotiating turns and uneven terrain.
- Immediately replace any hydraulic hose that shows signs of swelling, wear, leaks or damage so it does not burst.
- Do not use your hand to check for hydraulic oil leaks. Use a piece of cardboard instead. Hydraulic fluid escaping under pressure can penetrate the skin causing serious injury. If skin penetration occurs, seek medical attention immediately. Relieve all pressure before disconnecting hoses.
- Do not bend or strike high-pressure lines, tubes or hoses, or reinstall them in a bent or damaged condition.



#### HYDRAULIC OIL HANDLING PRECAUTIONS

Oils can irritate and damage the eyes, throat, and sensitive skin. Avoid contact.

Petroleum based oils are hazardous to the environment. Take special care not to spill or discharge these fluids. Use approved containers and methods to handle and dispose of them.

Use an authorized disposal and recycling company.

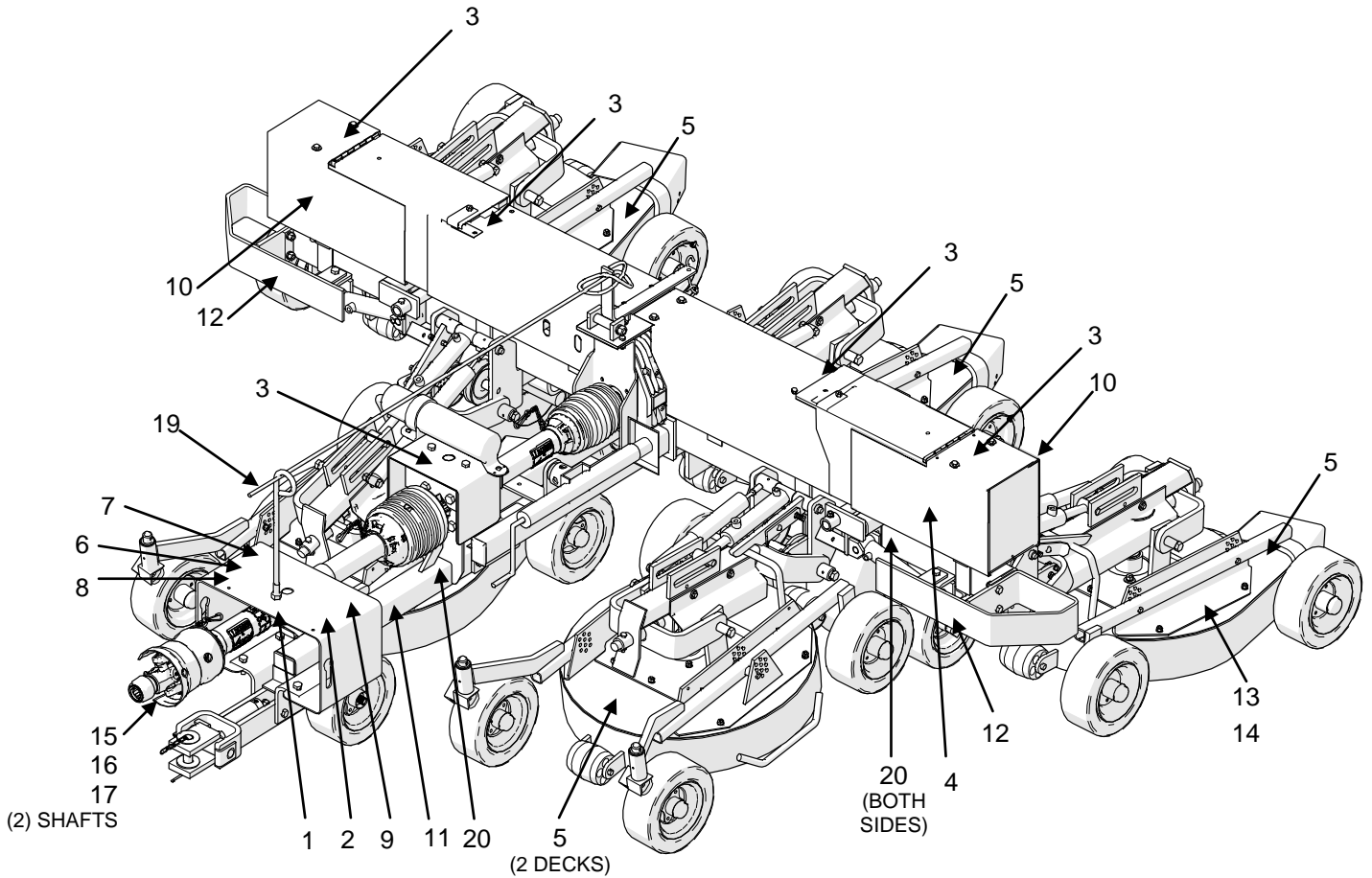
### SAFETY DECALS



If decals become faded, damaged, or lost, replace immediately. Order Decal Kit, Part # 600550.

No	Description	Qty
1	DANGER – READ MANUAL	1
2	CAUTION - TURNING	1
3	CAUTION – REPLACE SHIELDS	4
4	COMPANY NAME	1
5	DANGER - BLADE HAZARD	5
6	WARNING – OEM PARTS	1
7	CAUTION – DISENGAGE PTO	1
8	PTO GREASING	1
9	NOTICE – HITCH SETUP	1
10	MOWER MODEL	1

No	Description	Qty
11	SERIAL PLATE	1
12	PROGRESSIVE DECAL	2
13	CUTTING HEIGHT DECAL - LH	2
14	CUTTING HEIGHT DECAL - RH	2
15	SAFETY SIGN – OUTER GRD CE	2
16	SAFETY SIGN – INNER GUARD	2
17	SAFETY SIGN – OUTER GUARD	2
18	GREASE POINT	
19	WING BALL VALVE OPERATION	1
20	TIE-DOWN PROVISION	3



**DECAL LISTING**

**DANGER**

TO AVOID SERIOUS INJURY OR DEATH:

- READ AND UNDERSTAND the provided Operator's Manuals, safety signs and information decals before operating equipment.
- CONTACT DEALER immediately if you do not have Operator's Manuals.
- CONTACT DEALER to explain any instructions not fully understood.
- STOP TRACTOR, LOWER DECKS / WINGS, PLACE ALL CONTROLS IN NEUTRAL, SET PARKING BRAKE, REMOVE KEY, AND WAIT FOR ALL MOVING PARTS TO STOP before servicing, adjusting, repairing, unplugging or fitting.
- ALWAYS WEAR safety glasses, hard hat, hearing protection, and safety shoes when operating or servicing this equipment.

209172

**WARNING**

TO AVOID SERIOUS INJURY OR DEATH:

- INSTALL AND SECURE all shields before starting tractor.
- Keep hands, feet, hair and clothing away from moving parts.
- DO NOT allow riders
- ENGAGE SAFETY LOCKS before transporting or working beneath components.

209172

No. 1 - 209172

**DANGER**

**ROTATING BLADE HAZARD**  
Mowers can throw objects up to 300 feet.

TO AVOID SERIOUS INJURY OR DEATH to operator and bystanders:

- DO NOT OPERATE with deflectors removed
- DO NOT POINT DISCHARGE toward bystanders, animals, buildings or vehicles
- INSPECT area for potential mower thrown object hazards before mowing
- REMOVE AND / OR AVOID objects such as wire, cable, metal objects and all other foreign material / solid objects
- DO NOT PLACE HANDS OR FEET under cutting deck when operating or when tractor engine is running

209171

No. 5 - 209173

**PROGRESSIVE**

No. 12 - 209103

**PRO-Flex 120**

No. 10 - 209102

**PRO-Flex R120**

No. 10 - 209143

**CUTTING HEIGHT ADJUSTMENT**

1"	•	•	•	•	1 1/4"
1 3/4"	•	•	•	•	2"
2 1/2"	•	•	•	•	2 3/4"

ADJUST STOP PIN TO MATCH PIVOT HOLE  
STOP PIN NOT REQUIRED FOR 3 & 3 1/4" CUTTING HEIGHT

PART NO. 309100

No. 13 - 209100

**CUTTING HEIGHT ADJUSTMENT**

1 1/4"	•	•	•	•	1"
2"	•	•	•	•	1 3/4"
2 3/4"	•	•	•	•	2 1/2"

ADJUST STOP PIN TO MATCH PIVOT HOLE  
STOP PIN NOT REQUIRED FOR 3 & 3 1/4" CUTTING HEIGHT

PART NO. 309100

No. 14 - 209101

**HEIGHT ADJUSTMENT**

2.75	•	•	•	•	3.0
2.25	•	•	•	•	2.5
1.75	•	•	•	•	2.0
1.25	•	•	•	•	1.5
0.75	•	•	•	•	1.0
	•	•	•	•	0.5

No. 13 - 606279

**HEIGHT ADJUSTMENT**

3.0	•	•	•	•	2.75
2.5	•	•	•	•	2.25
2.0	•	•	•	•	1.75
1.5	•	•	•	•	1.25
1.0	•	•	•	•	0.75

No. 14 - 606275

**CAUTION**

WHEN MAKING SHARP TURNS, THE PTO SHAFT WILL SHORTEN. LIMIT THE TURNING RADIUS TO ENSURE THAT THE PTO DOES NOT FULLY COLLAPSE. FAILURE TO DO THIS WILL RESULT IN DAMAGE TO THE SHAFT AND BEARING.

TRACTOR END

REFER TO MANUAL FOR ADDITIONAL INFO.

209171

No. 2 - 209171

**WARNING**

USE ONLY GENUINE O.E.M. REPLACEMENT PARTS - ESPECIALLY CRITICAL ON THE CUTTING BLADES -

209115

No. 6 - 209115

**CAUTION**

DISENGAGE PTO SHAFT BEFORE RAISING WINGS

209115

No. 7 - 209174

No. 15 - 210238

**DANGER**

GUARD MISSING DO NOT OPERATE

**DANGER**

GUARD MISSING DO NOT OPERATE

**DANGER**

No. 16 - 210239

**NOTICE**

ADJUST HITCH SO FRAME IS LEVEL IN MOVING POSITION  
OPERATE PTO AT 540 RPM ONLY

52194

No. 9 - 521784

**DANGER**

**ROTATING DRIVELINE CONTACT CAN CAUSE DEATH KEEP AWAY!**

DO NOT OPERATE WITHOUT - ALL DRIVELINE GUARDS, TRACTOR AND EQUIPMENT SHIELDS IN PLACE

- DRIVELINES SECURELY ATTACHED AT BOTH ENDS
- DRIVELINE GUARDS THAT TURN FREELY ON DRIVELINE

No. 17 - 210237



No. 18 - 521014

**CAUTION**

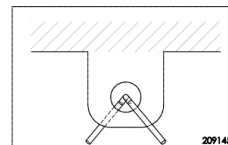
- 1/4 TURN VALVE MUST BE CLOSED WHEN MOWING TO PROLONG BELT LIFE
- DO NOT ENGAGE HYDRAULIC FLOAT ON TRACTOR
- CONSULT OPERATORS MANUAL FOR MORE INFORMATION

209185

No. 19 - 209185

**CAUTION**

- 1/4 TURN VALVE MUST BE CLOSED WHEN BOWING TO PROLONG BELT LIFE
- DO NOT ENGAGE HYDRAULIC FLOAT ON TRACTOR
- CONSULT OPERATORS MANUAL FOR MORE INFORMATION



No. 20 - 209145

## ASSEMBLY INSTRUCTIONS



### CAUTION!

Mower assembly must be completed by a qualified technician using safe work practices and proper tools.

### REAR MOWER DECK

The center rear mower deck, lift arm and drive belt are placed on a temporary rack for shipping purposes. The RH wing deck can be used as an assembly reference.

1. Remove the deck and the lift arm assembly from the rack. A chain hoist or lift truck and straps will be necessary (deck assembly weight – approx. 250lb).
2. Remove both of the center shields of the main drivetrain by extracting (8) 3/8" bolts in order to install deck drive belt on to the gearbox.
3. Remove (2) 5/8" bolts and bushings that are installed in the lift arm yoke mounts.
4. Roll the deck assembly into position at the center-rear of the mower and remove the rear deck shields by extracting (2) 3/8" X 3 3/4" bolts.
5. The rear deck belt is then installed by starting at the drive pulley (rear of gearbox), down behind the frame and twisting it 1/4 turn to ride on the idlers (both fixed and moveable) and then onto the deck spindle pulley
6. Position the lift arm so that the 5/8" bolt and bushings can be attached to the frame. Some alignment of the deck will be necessary to thread both bolts into the frame.
7. Attach hydraulic hoses to a hydraulic power source. Stroke the center cylinder out completely. Remove the cylinder pin by loosening the 3/8" bolt that holds it in place. Relieve any residual hydraulic pressure and disconnect from power source.
8. The rod end bushing is placed between the slotted plates on the lift arm. Push the pin through one slot, through the bushing and through the other slot. Tighten the bolt being sure the bolt end rests in the indent in the pin at its center. The pin is now locked in place.
9. The shock absorber is then installed in the threaded hole located on the side of the lift arm near where the end of the shock rests. Use the fasteners shipped on the loose end of the shock.
10. Re-install the shields on the main drive train and the center deck.
11. There are two rectangular plastic plugs taped to the frame of the mower. They serve to fill the tube ends on the frame where the temporary transport frame was installed.

### INPUT SHAFT – shipped strapped to center rear mower deck (on transport rack)

1. Remove 1/2" UNC retaining bolt/nut from input shaft.
2. Remove notification tag from intermediate shaft hanger bearing.  
**IMPORTANT - Ensure gold coloured spacer ring is present against bearing inner race.**
3. Disconnect input shaft shield at clamp yoke end and slide shield exposing the clamp yoke (see input shaft service instructions in mower manual storage tube).
4. Install input shaft clamp yoke on intermediate shaft, ensuring gold coloured spacer ring is in place between the input shaft yoke and hanger bearing race.
5. Reinstall 1/2" UNF retaining bolt in input shaft yoke, torque to 85 ft-lb.
6. Reinstall input shaft shield per input shaft service instructions.
7. Fasten input shaft guard retaining chain to mower main frame.

### TRANSPORT TIRES

1. Check air pressure in the tires and adjust according to specifications

#### Transport Tires – 32 PSI

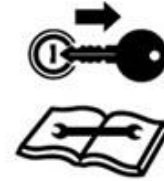
The mower is now ready for pre-delivery inspection and lubrication prior to first use.

## MOWER SETUP FOR OPERATION

### WARNING!

Always refer to tractor operator's manual for specific detailed information regarding operation of equipment.

Always ensure the tractor controls are in the park position, the engine is turned off, the parking brake is engaged and hydraulic pressure to the tractor remote connectors has been relieved when working around tractor during setup procedures.

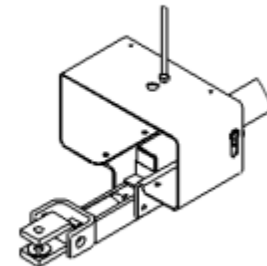
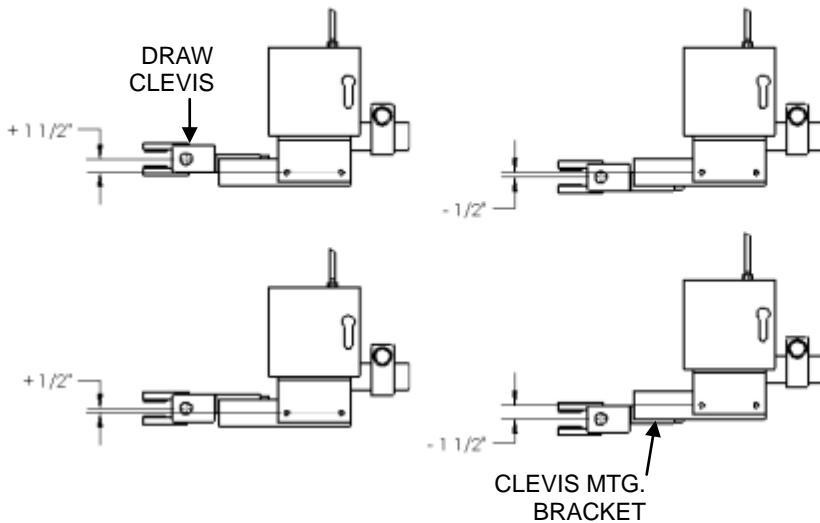
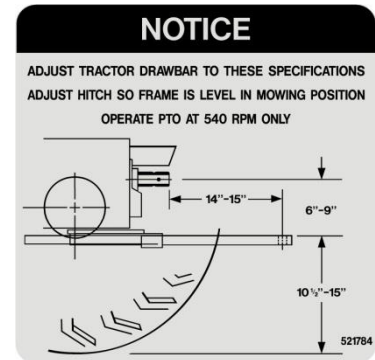


### HITCH ADJUSTMENT

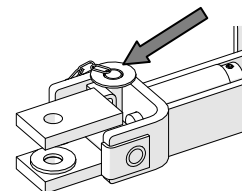
Before hitching the mower to the tractor, ensure tractor drawbar is set properly. Having the proper hitching dimensions for the tractor drawbar and the PTO, will ensure long and trouble free hours of operation. **Incorrect setup may lead to contact between the mower and PTO shaft, causing damage to the shaft.**

The decal shown is mounted to the machine and indicates these important hitch dimensions.

- 1) The drawbar length must be adjusted so it is 14" to 15" from the end of the PTO shaft to the center of the draw pin.
- 2) The top of the drawbar must be adjusted so it is 6" to 9" from the center of the PTO shaft to the top of the drawbar.



- 3) The main frame of the mower should be level when hitched to the tractor. The Pro-Flex 120 features an adjustable height hitch; the above figure shows the pivoting Draw Clevis and bolt-on Clevis Mounting Bracket that can be turned to give a total of 3" in height adjustment.
- 4) The position of the hose support and hose guide rod may need to be adjusted to provide clearance to the PTO shaft.
- 5) To assist in connecting the Pro Flex 120 to the tractor, the provided hitch pin can be temporarily placed in the hitch



swivel to hold it level while aligning the hitch. Do not operate mower with the hitch pin in the hitch swivel.

## HITCHING THE MOWER TO THE TRACTOR

### **WARNING!**

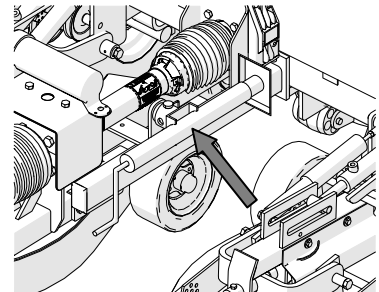
**Crushing Hazard between tractor and mower. Never allow anyone to stand between tractor and mower while backing-up to the mower**

- 1) With the draw pin placed in the hitch clevis, back the tractor to the hitch clevis.
- 2) When the draw pin holes are aligned, place the tractor controls in the park position, shut the engine off and engage the parking brake.
- 3) Remove draw pin from the hitch clevis and place in the draw pin hole connecting the mower to the tractor.
- 4) Raise parking jack fully and place in storage position.



## STOWING THE JACK

The jack cannot be stowed in the parked position while mowing. A second storage position is provided along the frame of the mower to avoid damage to the jack while mowing (shown at right).

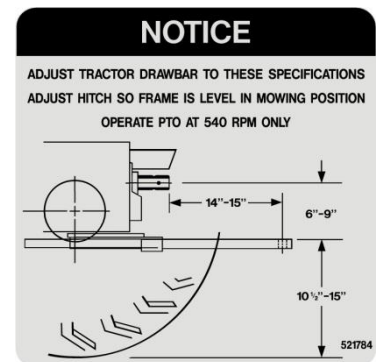


## CONNECTING THE TRACTOR PTO

- 1) Ensure that the tractor engine is shut off, the parking brake is engaged and the mower is securely hitched to the tractor.
- 2) Lift input PTO shaft from PTO support, ensuring that PTO support swings down and rests on frame tube.
- 3) Slide the mower input shaft locking collar backwards, opening the locking mechanism. Locking collar should remain in an open position
- 4) When it is safe to do so, hold the PTO against the end of the tractor PTO shaft, rotate the tractor PTO by hand until the shaft slides on slightly.
- 5) Slide the yoke onto the tractor's PTO.
- 6) The locking collar should automatically engage when the yoke is properly engaged with the tractor PTO.
- 7) Attempt to move the shaft forward and backwards to ensure that it is securely locked in place.
- 8) Attach the PTO cover safety chain to the tractor. Ensure cover is properly retained by the chain on the mower end.

### **WARNING!**

**If the PTO shaft comes off during operation, it may cause personal injury and damage to the PTO shaft and tractor PTO. When checking, make sure the locking collar is locked, and that the shaft is not just jammed against the end of the tractor PTO shaft.**





## CONNECTING THE HYDRAULICS

- 1) Ensure the tractor controls are in the park position, the engine is turned off, the parking brake is engaged and hydraulic pressure to the tractor remote connectors has been relieved per the tractor operator's manual instructions.
- 2) When connecting the hydraulic couplers to the tractor, be sure that both ends are clean. Dirt in the hydraulic system can block the orifice in the cylinder and cause premature wear of hydraulic components on the mower and tractor.
- 3) Ensure the hoses are free to move, between the tractor and mower. During operation of the mower the distance between the tractor and mower will change while going up and down hills or during turns.

NOTE – A ball valve is located on the wing lift “raise” hydraulic coupler. This valve is to be turned on and off for various functions of the mower. The handle of the ball valve is equipped with a lock that must be slid up the valve handle before it can be turned. (See P29)

### **WARNING!**

Hydraulic fluid escaping under pressure can penetrate the skin causing serious injury. If skin penetration occurs, seek medical attention immediately.

## CONNECTING THE PULL ROPE

The Pro-Flex 120 mower is equipped with a nylon pull rope that is connected to the wing deck release mechanism, used for locking the two outside wings into transport position.

Connect it to the tractor in a position that is easily accessible to the operator and will release easily if the mower should ever become disconnected. Ensure there is sufficient slack between the tractor and mower to allow for proper maneuvering of machine without rope becoming entangled.

## MOWER SAFETY LOCKS

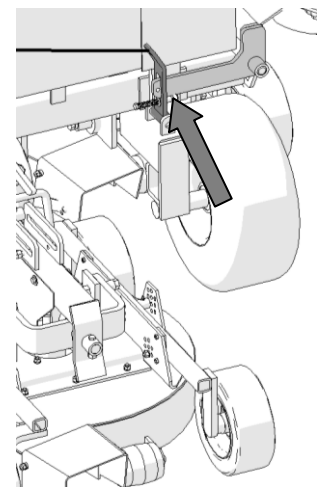
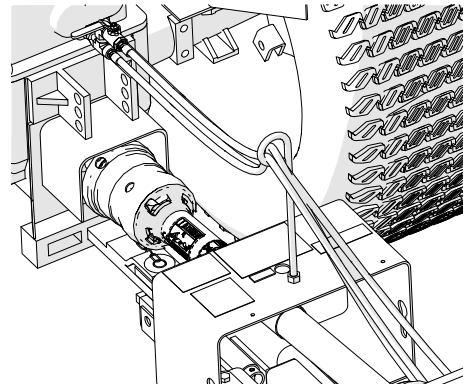
Safety locks are provided on the wings as well as each individual mower deck to prevent each from lowering in the event of a failure in the hydraulic system.

### WING SAFETY LOCK

(2) spring activated wing safety locks are located behind the deck drive train, one for each wing. The lock is engaged automatically when the wings are raised.

In order to lower the wings:

- 1) Fully raise the wings (they may have settled against the lock during transport or storage).
- 2) From the operator station in the tractor, pull and hold the pull rope to disengage the locks.
- 3) Lower the wings to the working position using the tractor hydraulic control.
- 4) Release the pull rope when the wings are lowered.

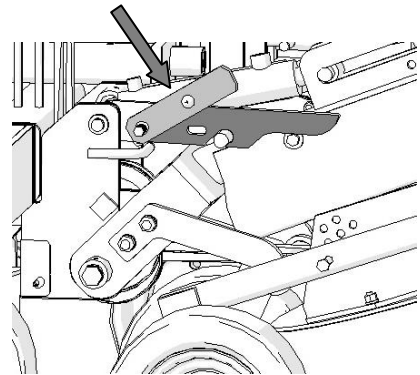


## **DECK SAFETY LOCK**

Each deck is provided with individual safety locks. These locks have (2) modes of operation:

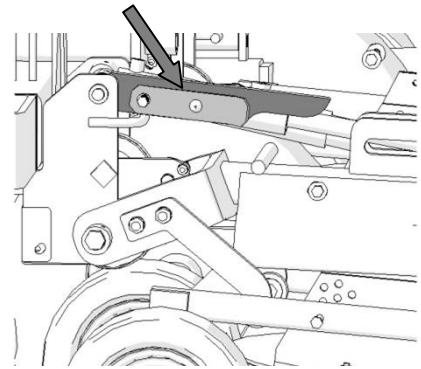
### **TRANSPORT / SERVICE POSITION**

- 1) Ensure the tractor controls are in the park position, the engine is turned off, the parking brake is engaged.
- 2) On each deck, pull the silver coloured mowing position tab and rotate upward until the round pin is above the top of the lock bar.
- 3) When all (5) deck locks have the tab in this position, fully raise mower decks.
- 4) Locking mechanism will engage automatically preventing decks from lowering.



### **MOWING POSITION**

- 1) Fully raise decks using tractor hydraulics (deck cylinders fully retracted)
- 2) Ensure the tractor controls are in the park position, the engine is turned off, the parking brake is engaged
- 3) On each deck, lift the lock bar, pull the silver coloured mowing position tab and rotate downward until the round pin is engaged in the corresponding hole in the lock bar. (The tab in this position prevents the deck safety lock from engaging during mowing)
- 4) The mower is now ready for mowing operations.



## **WARNING!**

Ensure mowing position tabs are in the Transport / Service position and locks are properly engaged before attempting to transport or service mower.



## CHECK PTO LENGTH - TURNING AND ON HILLS

The Pro-Flex 120 mower is designed for mowing of uneven, contoured landscape. When negotiating turns, the input PTO shaft will change in length. During mowing of steep contoured conditions, when the tractor starts up a hill the PTO shaft will collapse and when cresting the hill, it will extend. It is important to make sure that the PTO shaft does not fully collapse, fully extend or contact the hose shield or hose support rod during turns or when travelling over hills.

To ensure proper setup check the following conditions:

- 1) With the tractor in the lowest gear and travelling very slowly, make a sharp turn to the right.
- 2) Watch the PTO shielding to make sure the PTO shaft does not totally collapse. There should be a minimum of 9 1/2" of the inner black PTO shielding exposed at maximum turn.
- 3) Ensure PTO shielding does not come in contact with hose support or hose support rod.

**NOTE:** This is not the worst condition. Making turns while the tractor is angling up a hill will cause the PTO shaft to collapse even more. Likewise, traveling straight up or down a hill will either extend or collapse the PTO shaft. The operator should avoid making sharp turns on uneven terrain.

### WARNING!

If the PTO over extends, it will come apart and can cause injury to the operator or damage to the mower or tractor.

### CAUTION!

If the input PTO shaft collapses fully, it will force the shaft back against the hanger bearing. This will cause damage and premature failure of the bearing.

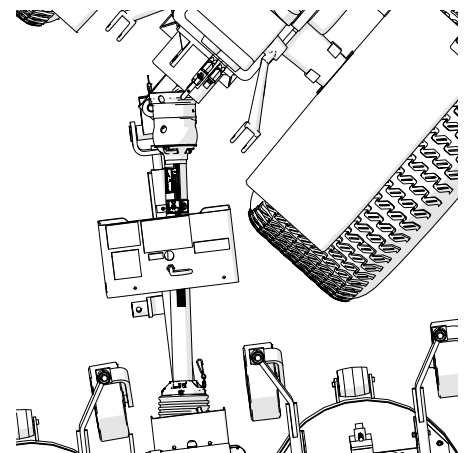
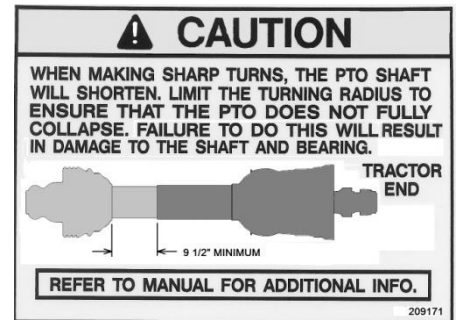
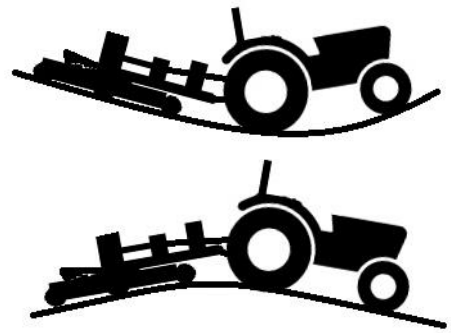
## CHECK TIRE CONTACT DURING TURNS

The Pro-Flex 120 mower features a hose support which also serves the function to limit the steering angle of the mower without damage to components. In proper operation, the tractor tire should contact the hose support first if the operator attempts to turn too sharp without damage to the drive-line.

To check tire contact:

- 1) With the tractor in the lowest gear and travelling very slowly, make a sharp turn.
- 2) As you turn, watch closely to make sure the tractor tires contact the hose support. (not other parts of the mower)
- 3) If the tires do not contact the hose support, adjust tractor tire width (if possible), so they contact the hose support. Contact us for a modified guard.

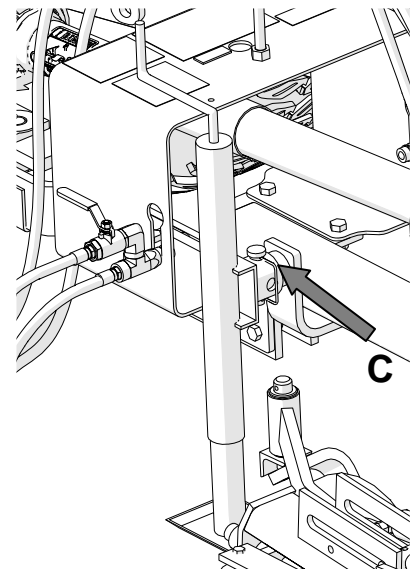
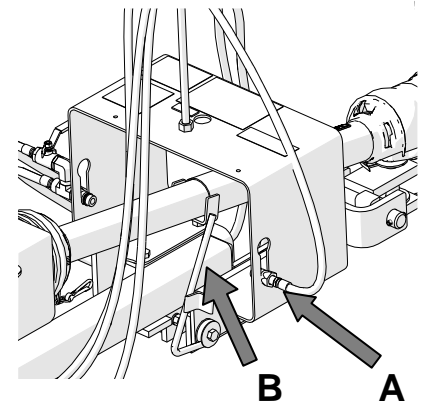
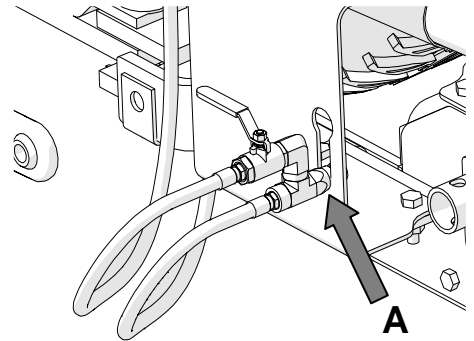
**NOTE:** Using this setup, with the proper adjustment, the tire will contact the hose support and will not allow the tractor to turn any further. It will either, prevent the contacted tire from turning, spin the opposite tire, or push the front of the tractor around. This guard is not designed to work with lug style tires.



## DISCONNECTING THE MOWER

The mower can be stored with the wings/decks in the raised or lowered position. If the wings or decks are in the raised position, ensure the wing and deck locks are securely engaged before disconnecting the mower from the tractor.

- 1) Place mower on a level surface for storage.
- 2) Ensure that the tractor engine is shut off and the parking brake is engaged.
- 3) Inspect wing / deck safety locks to ensure they are properly engaged (if in the raised position).
- 4) Ensuring the quarter turn valve is in the open position; relieve pressure in the hydraulic hoses per tractor manufacturer's instructions (normally cycling the tractor control valve in both directions is sufficient).
- 5) Chock mower transport tires to ensure mower does not roll unexpectedly when hitch pin is removed.
- 6) Disconnect pull rope from rear of tractor and hook on hose support rod.
- 7) Disconnect hydraulic couplers from tractor & stow in supplied locations in the sides of the tire guard (position A as shown).
- 8) Disconnect input shaft guard chain from tractor. Slide the mower input shaft locking collar backwards, opening the locking mechanism. Locking collar should remain in an open position.
- 9) Remove input shaft from tractor (collapsing sliding shaft) and stow on supplied support bracket (position B as shown).
- 10) Remove the tongue jack from the storage location and place in the parking position. Raise the jack sufficiently to remove all mower weight from the tractor drawbar. Ensure mower tongue jack is securely fastened to mower frame with supplied pin before removing hitch draw pin
- 11) Remove supplied draw pin from hitch and stow in the hitch swivel.



## LONG-TERM STORAGE

If the mower will not be used for an extended period, certain activities must be performed. See "Long-Term Storage" in the Maintenance section.

## ADJUSTING THE MOWER FOR CUTTING

### WARNING!

Ensure safety locks are properly engaged before attempting to service mower. Make all adjustments with the tractor turned off, key removed and parking brake set. Mower must be on level ground before making adjustments.



### SETTING CUTTING HEIGHT – PRO-FLEX 120

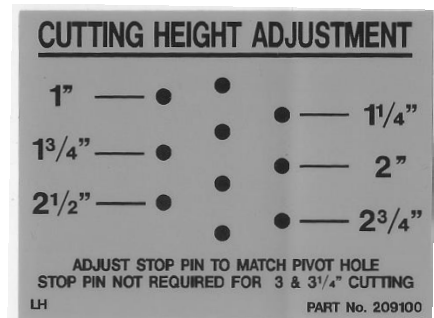
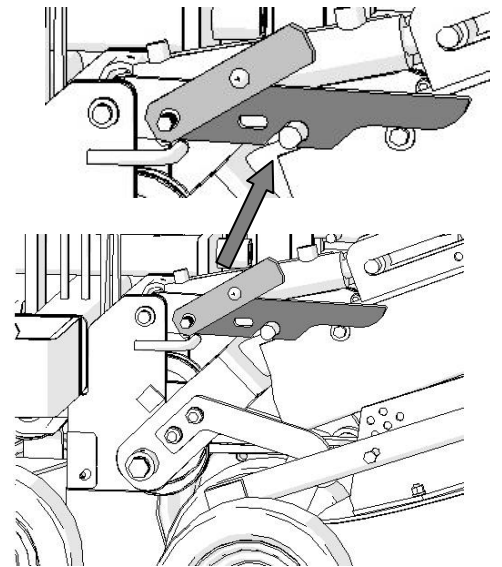
Each of the five independent mower decks has its own cutting height adjustment. Cutting height is set by adjusting the height of the mower deck wheel arms. Each deck has one fixed wheel arm and one pivoting wheel arm; ensuring that all four tires remain in contact with the turf while navigating contoured areas for a more uniform cut.

**NOTE:** For optimal cutting results, the mower should be set to remove not more than 1/3 of the total grass height. This will result in the best cutting performance while minimizing stress to the grass.

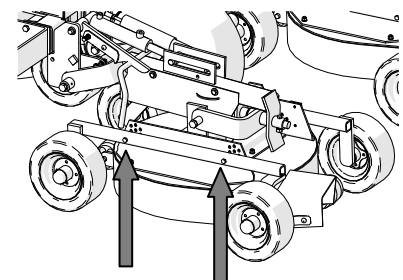
The deck wheel arms are bolted solid to the deck frame in order to provide positive cutting height control.

Follow these steps to adjust the cutting height from 3/4" to 3":

- 1) Place the mower deck safety latch into the locking position on each deck.
- 2) Raise the mower decks into the Pro Lift-N-Turn™ raised position (See P29).
- 3) Turn the engine off on the tractor, place all controls in neutral position and set the parking brake.
- 4) Using the cutting height decal, determine the hole you wish to set the axles in according to the desired cutting height.

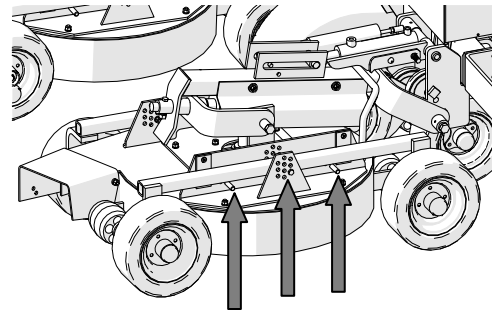


- 5) On the fixed arm side, remove the two mounting bolts and reposition the axle in the desired holes. Be sure to retighten properly.



On the pivoting arm side remove the two axle stop pins and the center pivot bolt. Reposition the axle to the proper hole for the desired cutting height. Retighten the center pivoting bolt properly.

- 6) Replace the two axle stop pins to the same hole in the pattern as the axle mounting bolts. This pin is used to limit the travel of the mower deck and prevent scalping. The pins are not required for cutting heights of 2 3/4" and 3". Store pins in one of the holes for the center pivoting bolt.



## **SETTING CUTTING HEIGHT – PRO-FLEX ROLLER 120**

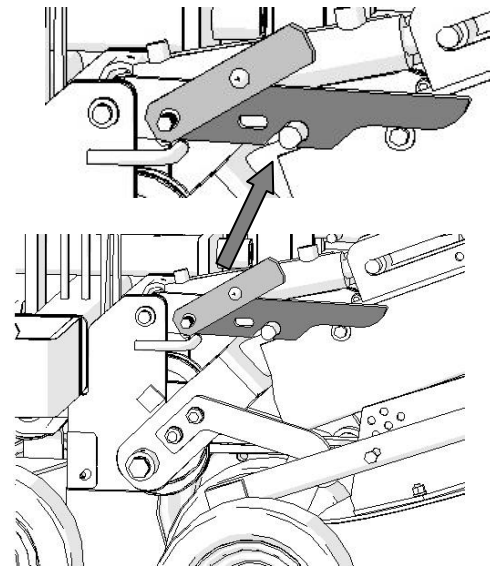
Each of the five independent mower decks has its own cutting height adjustment. Cutting height is set by adjusting the height of the mower deck roller arms. Each deck has one fixed roller arm and one pivoting wheel arm; ensuring that all four tires remain in contact with the turf while navigating contoured areas for a more uniform cut.

**NOTE:** For optimal cutting results, the mower should be set to remove not more than 1/3 of the total grass height. This will result in the best cutting performance while minimizing stress to the grass.

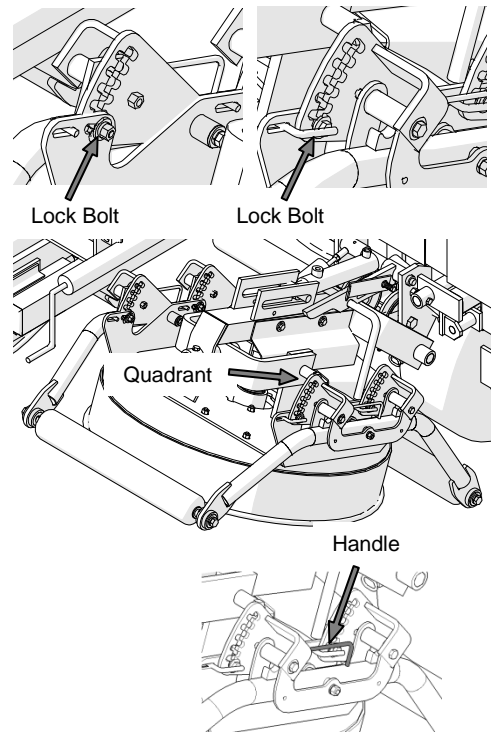
The deck roller arms are mounted on the deck with easy to adjust pivoting quadrants.

Follow these steps to adjust the cutting height from 1/2" to 3":

- 1) Place the mower deck safety latch into the locking position on each deck.
- 2) Raise the mower decks into the Pro Lift-N-Turn™ raised position (See P29).
- 3) Turn the engine off on the tractor, place all controls in neutral position and set the parking brake.
- 4) Adjust only one side of the deck at a time.



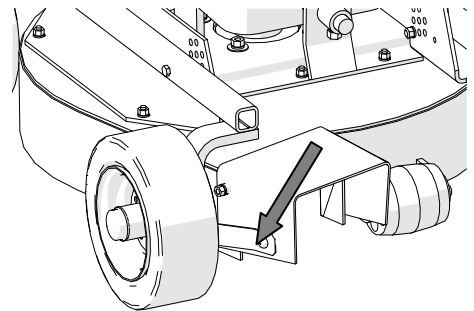
- 5) Using a 9/16" wrench, loosen the lock bolt on each end of the roller arm adjusting quadrant.
- 6) While supporting the roller arm using the integral handle, slide the lock bolt on each quadrant so that it rests in the center detent between the two adjustment positions.
- 7) Lift / lower the roller arm using the handle until the lock bolt aligns with the adjustment slot in the quadrant that will yield the desired cutting height (per the cutting height decal).
- 8) Tighten the lock bolt on each quadrant.
- 9) Repeat procedure for roller arm on opposite side of deck.



## SETTING THE DISCHARGE DEFLECTORS

Each mower deck has its own discharge deflector. This is a two position deflector that can be adjusted by moving the spring clip on the deflector. When set in the lower position it deflects the cuttings downwards into the grass, and when set in the upper position, the discharge fans out more discharging the cuttings straight out.

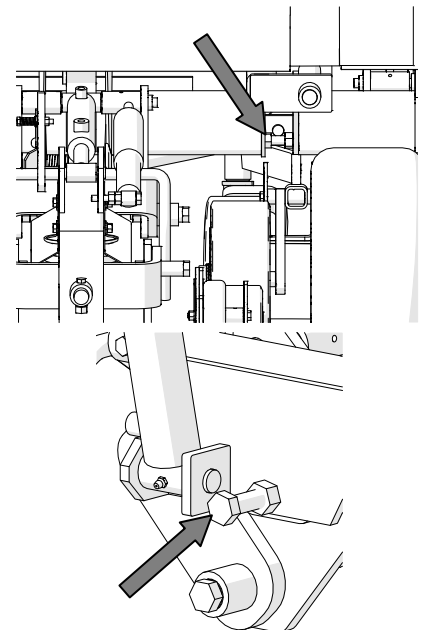
**NOTE:** In wet or heavy conditions, the deflector can be set in the upper most position to help avoid clumping.



## WING FRAME ALIGNMENT

When the wings are in the lowered position, the wing frame should be level with the mower frame (this is pre-set at the factory). A stop bolt is located on the main frame and can be adjusted so that the wing stops in a level position when lowered.

**IMPORTANT!** - Operating with the wings misaligned with the main frame can cause excess stress on the wing drive belts, leading to accelerated wear.



## OPERATING THE MOWER

### DAILY CHECK LIST

- 1) Always wear relatively tight and belted clothing to avoid entanglement in moving parts. Wear sturdy, rough-soled work shoes. Never operate tractor or implements in bare feet, sandals or sneakers. Ensure other required PPE is in good condition.
- 2) Ensure all safety shielding is properly installed and check that all nuts and bolts are secure and pins are properly cotter pinned.
- 3) Inspect all safety decals and ensure they are clean and in legible condition.
- 4) Inspect wing and deck locks and ensure all pivot points and pull mechanisms have free movement and are in good order.
- 5) Check condition of blades and security of attachment.
- 6) Ensure mower is properly connected to the tractor, adjusted and in good operating condition.
- 7) Be sure wing release pull rope and hydraulic hoses are properly secured and will not become entangled in PTO shaft.
- 8) Tall grass can hide obstacles. Carefully walk the entire area to be mowed beforehand. Look for debris, rocks, tree limbs etc. that will damage or be thrown by the mower blades. Identify objects that cannot be removed. Set mower cutting height to avoid contact.
- 9) Never permit any person other than the operator to ride or board the tractor at any time.
- 10) Check that all lubrication points with grease fittings have been lubricated as per schedule.
- 11) Check the gearbox for possible oil leaks.

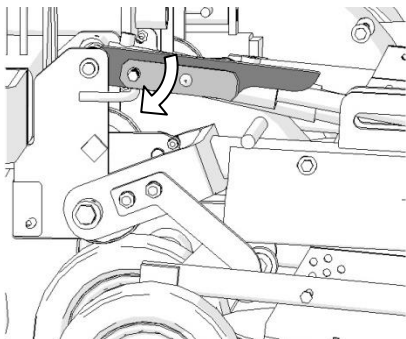
### RAISING AND LOWERING THE DECKS

The mower decks are raised into transport and service position by the hydraulic cylinders. When raised, the wings will lock into position and must be unlatched with the pull rope to lower into working position.

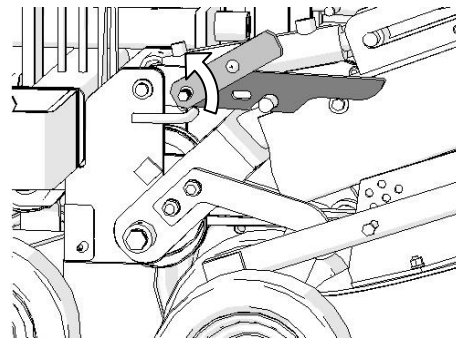
When lowering the wings, drive forward slowly as the wing deck wheels/rollers contact the ground. This will allow the deck to slide into position without scuffing the turf.

Each individual deck also has a lock for holding the decks in the service position. Ensure that these are locked out for operating the mower. See below.

Mowing Position – Locks Disengaged



Service Position – Locks Engaged

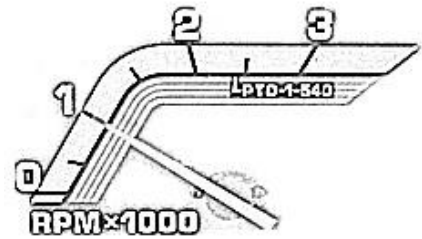
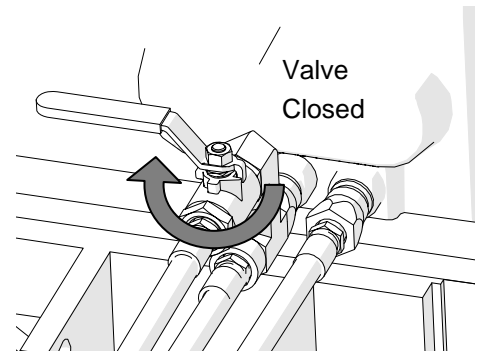




## ENGAGING THE MOWER

When engaging the mower, it is important to follow this procedure:

- 1) Lower the wings and decks into the working position. When lowering decks on turf, travel forward slowly while lowering wings in order to avoid scuffing the turf.
- 2) Ensure all deck cylinders are FULLY EXTENDED (pin mid-way along slot). This allows for proper floatation of the decks during mowing.
- 3) **Close the quarter turn valve.** This will ensure the wings are locked down during mowing. (The quarter turn valve is closed when the valve handle is perpendicular to the direction of oil flow as shown in the accompanying graphic.) Note that there is a lock on the valve handle that must be slid up in order to turn the valve.
- 4) Raise decks into Pro-Lift-N-Turn Position (see below).
- 5) Set the tractor engine speed at 1000 rpm maximum.
- 6) Ensure that everyone is clear of the mower.
- 7) Engage the tractor PTO lever.
- 8) Select the proper ground speed gear and slowly engage the clutch.
- 9) Once the mower has come up to speed, slowly increase the tractor throttle to desired rpm.



## MOWING

The Pro-Flex 120 mower is a very versatile cutting machine that allows the operator to maintain turf on undulating terrain in a productive manner. Drive safely, cut safely. Be sure to idle the tractor back before engaging the PTO, and shut the tractor off before leaving the tractor.

**NOTE:** Under normal cutting conditions, it may be possible to operate the tractor at less than 540 rpm PTO speed, reducing fuel consumption and noise levels. Select a suitable ground speed gear to maintain proper cut quality.

### Pro Lift-N-Turn™ SYSTEM

Your Pro-Flex 120 is equipped with the Pro Lift-N-Turn™ system. This feature allows the operator to temporarily lift all five cutting decks just off the turf without shutting down the PTO. Utilizing the Pro Lift-N-Turn™ system when mowing near cart paths or other roadways, allows the operator to move from section to section without raising the wings to the full transport position or disengaging the PTO. Pro Lift-N-Turn™ can also be used to start the mower in tall grass. Engaging the blades with the decks raised will reduce start-up loading on the mower drivetrain.

To actuate the Pro Lift-N-Turn™ system, ensure that the quarter turn valve located at the tractor hydraulic connection is closed. The operator can temporarily lift the mower decks during operation using the tractor hydraulic valve until the deck cylinders are fully retracted. Once the mower is again in position to mow, the operator can lower the decks and continue mowing. It is possible to perform this without disengaging the PTO.

 **DANGER!**

The mower blades remain at cutting speed while using the Pro Lift-N-Turn™ system. Do not proceed into areas that may have loose debris that may be thrown by the mower blades.

**NOTE:** The Pro Lift-N-Turn™ system is designed to be engaged for short durations only. If travelling over long distances with the decks in the raised position, disengage PTO before proceeding.

**MOWING WHILE REVERSING TRACTOR**

The unique design of the hitch and deck mounting allows the mower to operate equally well in the reverse direction. This is excellent for cutting in confined areas and cleaning up leaves in the fall.

**OPERATING ON HILLY TERRAIN**

When operating on hilly terrain, proceed with caution and drive carefully. If the tractor has four wheel drive, make sure it is engaged. On two wheel drive tractors equipped with a differential lock, apply while driving straight on the hills, disengage to allow for normal turning.

 **WARNING!**

Use care while turning on hillsides in wet conditions. The weight of the mower behind the tractor may push the tractor unexpectedly. Drive slowly around sand traps, river banks, etc.

## CLEARING BLOCKAGES

If a deck discharge chute becomes clogged during mowing:

- 1) Stop the tractor and set parking brake.
- 2) Reduce engine speed to idle.
- 3) Disengage the PTO, let the mower come to a complete stop and stop the engine.
- 4) Ensuring that the tractor engine is turned off, approach blocked discharge chute and clear debris as required.

### **WARNING!**

**NEVER** attempt to clear blockages with tractor engine running! Always ensure the engine is OFF and the tractor parking brake is set before clearing blockages.



## STOPPING THE MACHINE IN AN EMERGENCY

All function of the Pro-Flex 120 mower is controlled through the tractor. In the event of an emergency, follow the measures specified by tractor manufacturer as outlined in the tractor operator's manual.

## TRANSPORTING THE MOWER

### **WARNING!**

The Pro-Flex 120 mower is **NOT** designed for use on public roadways. Use an appropriate transportation method such as a trailer or float to move mower from site to site if required.

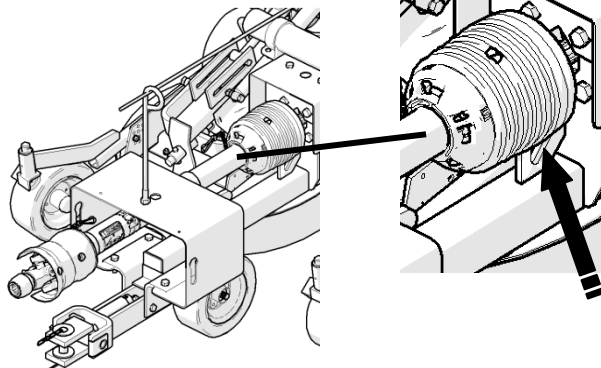
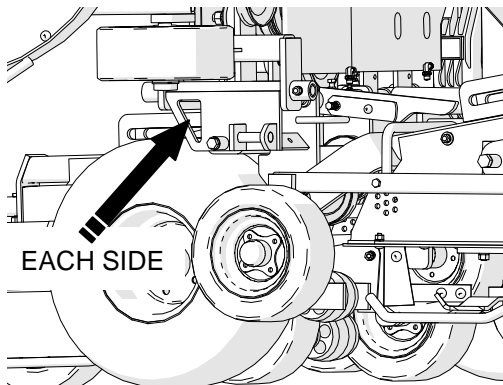
When transporting the Pro-Flex 120 from site to site, ensure the wings and decks are in the raised position and wing and deck safety locks are engaged.

### **WARNING!**

Use an appropriate sized vehicle to tow the Pro-Flex 120 mower. Do not tow with vehicles that are less than 1035lb, vehicle handling and braking characteristics will be diminished.

## TIE DOWN LOCATIONS

(3) Tie-Down provisions are located on the mower per the diagrams below:



# MAINTENANCE

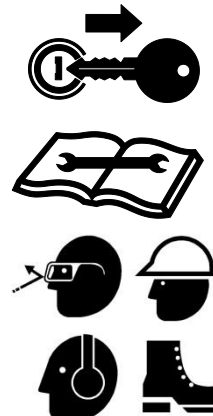
## WARNING!

Ensure the tractor controls are in the park position, the engine is turned off, the parking brake is engaged and hydraulic pressure has been relieved before performing service or maintenance.

Perform all maintenance with the wings and mower decks in the lowered position and the machine on a flat and level surface.

Always use personal protection devices such as protective glasses and face shields, protective shoes, gloves, hard hats, and ear protection when performing service or maintenance functions.

When completing a maintenance or service function, make sure all safety shields are installed before placing mower in service.



Service		Maintenance Intervals					
		Initial Run - 50h	Daily	Weekly	100h / Monthly	600h / Yearly	Removal from Storage
Grease	Intermediate Hanger Bearing	-	-	X	-	-	X
	Deck Pivots	-	-	X	-	-	X
	Deck Wheels (PF-120 only)	-	-	X	-	-	X
	Hitch Swivel	-	-	X	-	-	X
	Wing Pivots <sup>1)</sup>	-	-	X	-	-	X
	Transport Wheels	-	-	-	X	-	X
	Input PTO Shaft (8 locn's)	-	-	-	X	-	X
Int. PTO Shaft (3 locn's)	-	-	-	X	-	X	
Oil	Inspect Gearbox	-	X	-	-	-	X
	Check Gearbox Oil	-	-	-	X	-	X
	Change Gearbox Oil	X	-	-	-	X	-

Notes:

1) Lubrication requirement for pivots varies by application. Actual lubrication interval may vary.

## LUBRICATION

A properly maintained lubrication schedule will provide a smooth running machine for many years. Some pivot locations have grease fittings. The following information shows and describes where lubrication points are located and what types of lubricant are required.

### GREASE SPECIFICATIONS

**All greases are not compatible. Grease incompatibility will decrease the lubrication ability of the grease, and can cause premature part failure.**

Grease can have mineral or synthetic base oils and thickening agents such as lithium, calcium, barium, sodium, or aluminum

What We Use:

- Progressive uses Shell Gadus S2 V220 2
- This grease has:
  - A mineral oil base
  - A lithium-12 hydroxy thickener ("lithium" thickener)
  - Extreme Pressure additives (EP)
  - An NLGI Grade 2

### Recommended Grease Properties

The grease you use for this machine must have these properties:

- NLGI grade 2
- Lithium thickener (NOT LITHIUM COMPLEX)<sup>1</sup>
- Kinematic Viscosity at 40°C is no greater than 220 cSt
- Dropping Point Less than 400° F
- General Purpose Grease, Not Heavy Duty
- **No MOLY (molybdenum disulphide) additives in the grease<sup>2</sup>**
- **No synthetic grease<sup>3</sup>**
- **No High Temperature Grease<sup>4</sup>**

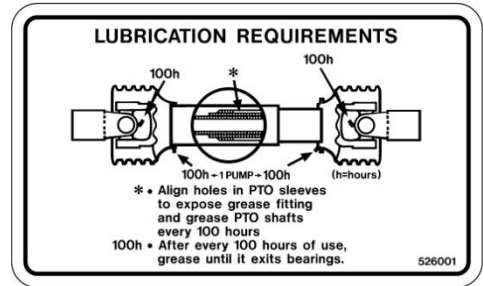
Notes on grease compatibility:

- 1) If a thickener other than lithium is used (including lithium complex), the existing grease will be contaminated and the lubrication properties may be lost leading to component damage.
- 2) Molybdenum Disulfide (Moly) is an additive used in slow moving, extreme load applications. The particles in the "Moly" will actually increase bearing wear in a high speed mower application. Generally speaking Moly based greases will be grey in colour.
- 3) If synthetic base oil is used rather than mineral base oil, the grease will be contaminated; the lubrication properties may be lost leading to component damage.
- 4) We do not recommend the use of "High Temperature" greases, mower component temperature should never reach temperatures above the level at which general purpose greases can operate. "High Temperature" greases may contain thickeners that are not compatible with Lithium-12 Hydroxy based thickeners.

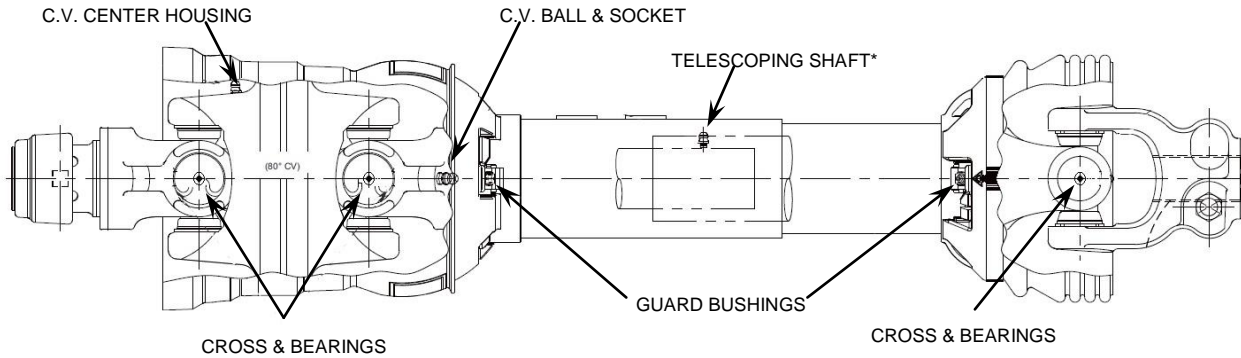
Grease with these features is considered to be a "General Purpose Grease". Use on all grease point locations on your Progressive Mower. Check the properties of the grease you wish to use with your supplier prior to use.

**DRIVELINE GREASING**

All PTO shafts on the Pro-Flex 120 mower feature 100h greasing interval. The following decal located on the hose support shield as a reminder.

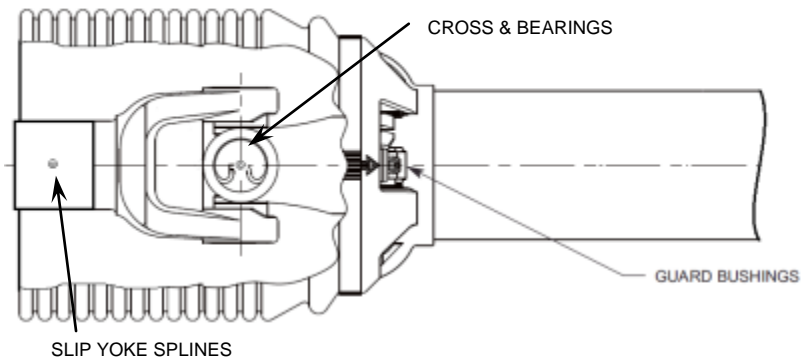


**INPUT SHAFT – 100h / Monthly (8 Locations)**

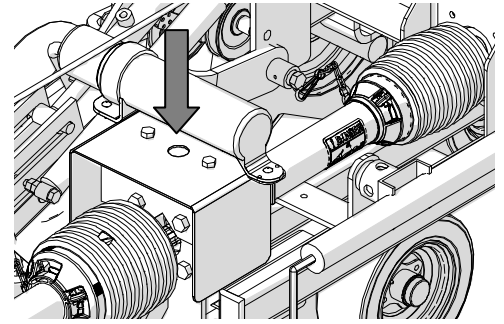


\* Inner & outer guards must be rotated to align holes for accessing telescoping shaft grease fitting.

**INTERMEDIATE SHAFT – 100h / Monthly (3 Locations)**



**INTERMEDIATE BEARING – 40h / Weekly (1 Location)**



**PIVOT LOCATIONS: 40h / Weekly**

Most pivot locations have grease fittings. These include the wing hinge pivots, some deck pivots (see note), the rotating hitch and the hitch clevis. They should be inspected frequently and lubricated as required.

\*Note – The Pro-Flex Roller 120 is equipped with service free polymer bushings at the deck pivot locations. No grease fitting is present at this location.

**DECK WHEELS & TRANSPORT HUBS: 100h / Monthly**

The deck wheels and transport wheel hubs have greaseable tapered roller bearings. They should be inspected frequently and lubricated as required.

**GEARBOX OIL:**

Recommended Oil: SAE 90 EP or SAE 80W90 EP

Factory Fill: Shell Spirax HD SAE 80W90

**Checking Level – 100h / Monthly**

A level indicator plug is located on the side of the gearbox (the lower plug). Proper oil level is set when oil starts to flow from this hole. If the level is low, add oil through top breather plug until correct level is attained. Replace and tighten plugs.



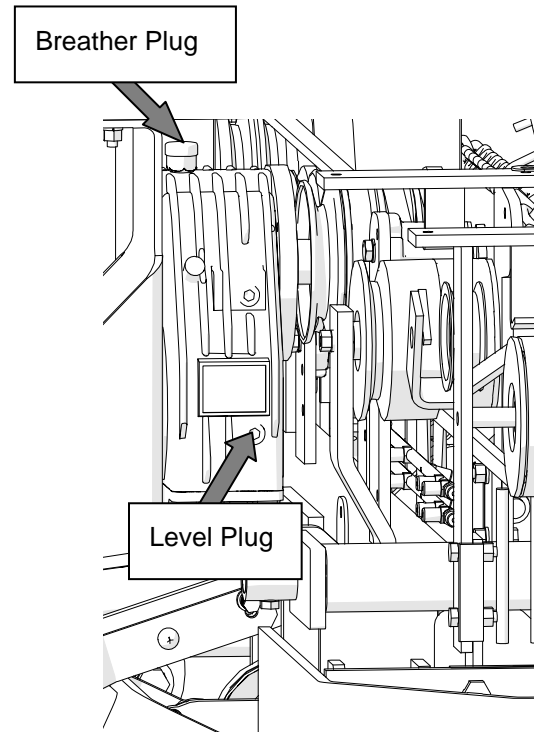
**MOWER MUST BE LEVEL** when checking oil level

**DO NOT OVERFILL!** Gearbox may over-heat causing premature component damage.

**Changing Oil - 600h / Yearly**

The gearbox oil should be changed after the first 50 hours of operation and every 600 hours or yearly afterwards.

Oil change quantity – 0.52 Qt (0.5 Litres)





## “V” BELT DRIVE

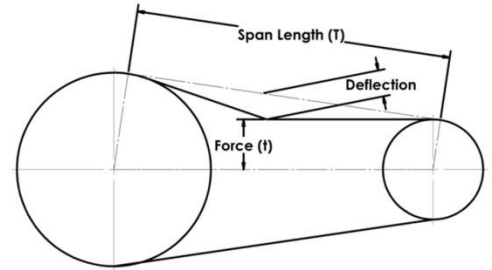
### BELT TENSION - 100h / Monthly

Proper belt tension is a fundamental factor in successful V-belt operation. Lack of tension will cause slippage, and too much tension will cause excessive belt stretch as well as damage to the drive components, such as bearings and shafts. To assess the condition of the automatic tensioner, the following procedure is recommended.

At the mid-point of the span, apply a deflection force with a spring scale in the direction perpendicular to the span until the belt is deflected the 3/8”.

The recommended force to deflect the belt is a minimum of 5 lbs. to a maximum of 7 lbs.

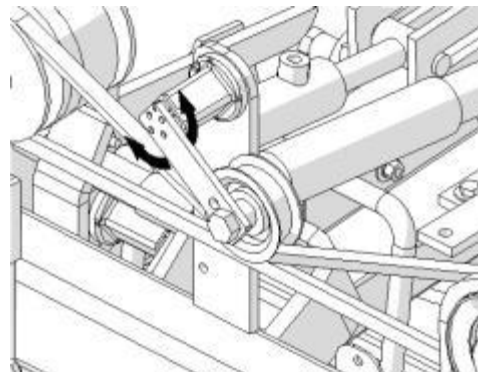
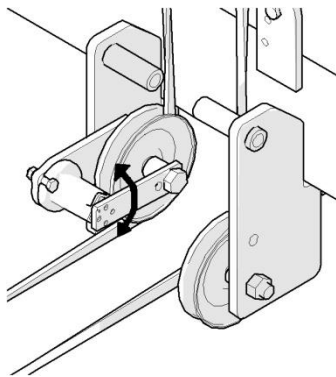
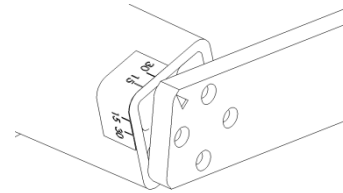
The first 24 to 48 hours of operation is the belt “run in” period. To ensure satisfactory belt performance, belt tension should be checked during this time period.



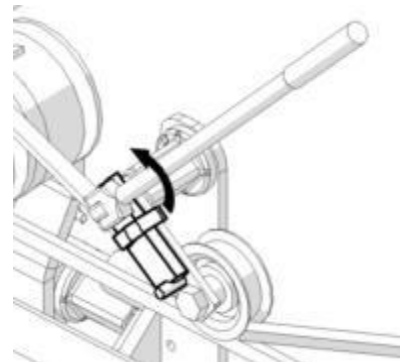
### BELT ADJUSTMENT

All deck drive belts utilize an automatic rubber torsion tensioning device. These tensioners are pre-set upon installation and require no further adjustment or maintenance.

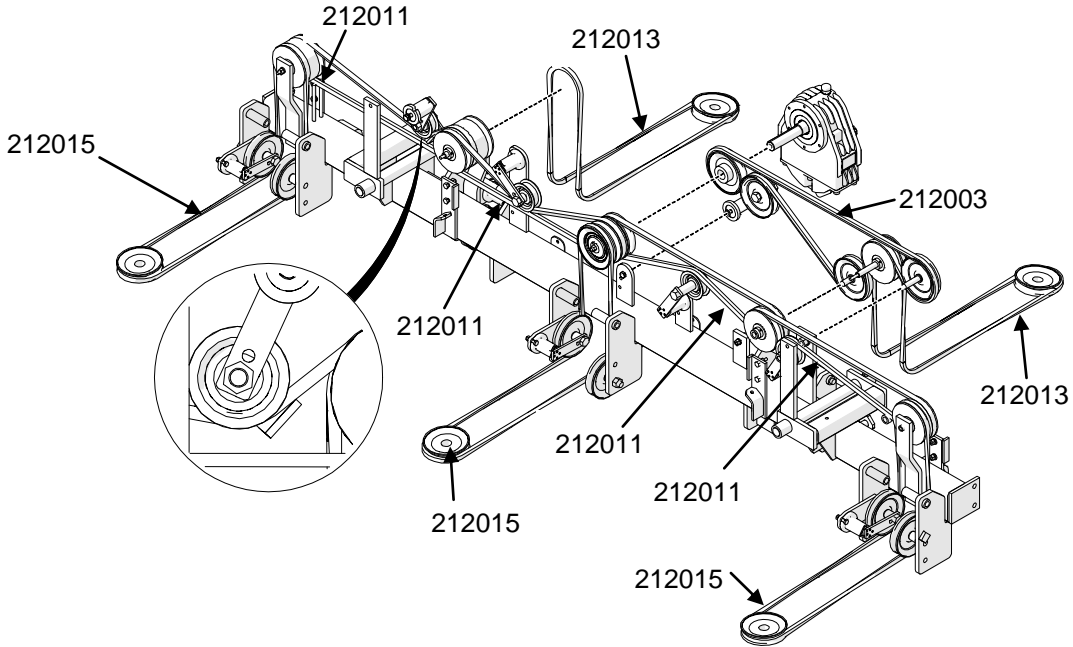
In normal service the tensioner arm angle (see detail at right) should read between 30 degrees (new belt) and 15 degrees.



A tool is provided to allow easy release of belt tension using a 1/2” drive breaker bar or ratchet.



**BELT ROUTING**



**FASTENER INSTALLATION TORQUE**

The chart below lists the proper installation torque for fasteners on Progressive Turf Equipment mowers. When bolts are to be tightened or replaced, refer to this chart to determine the proper torque (unless otherwise specified in this manual).

SAE Grade 5 (Imperial) and Class 8.8 (Metric) fasteners are to be used in the assembly of this machine, unless otherwise specified in this manual.

**Bolt Grade / Class Identification**



Bolt Diameter (in.)	Recommended Torque in Foot Pounds (Newton-Meters)
5/16	21 (28)
3/8	38 (52)
7/16	55 (75)
1/2	85 (115)
9/16	125 (170)
5/8	175 (240)
3/4	300 (410)
1" LH Spindle Nut	60 (82)
M10	31 (42)
Transport Tire Nuts	100 (135)

## BLADE SERVICING

### WARNING!

Always observe proper lock-out procedures when performing any maintenance work including changing or servicing the blades. Always remove and retain the ignition switch key, ensure parking brake is engaged, and block and or support machine using equipment designed for the task.

Be sure deck and wing safety locks are engaged when working on decks in the raised position.

Use gloves when handling mower blades. Blades can be very sharp.

Inspect blades before each use to determine that they are mounted tightly and are in good condition. Replace any blade that is bent, excessively nicked, worn or has any other damage. Small nicks can be ground out when sharpening.

### WARNING!

Use only original equipment blades when replacing worn out mower blades. They are made of special steel alloys and subjected to rigid heat-treat and inspection requirements. Substitute blades may not meet these specifications and **MAY BE DANGEROUS**.

## BLADE REMOVAL AND INSTALLATION

Replace any blade that is bent, excessively nicked, worn or has any other damage. Small nicks can be ground out when sharpening.

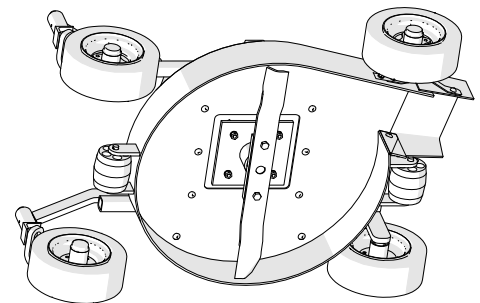
When replacing mower blades, be aware of blade rotation as blades rotate in opposite directions. Ensure the cutting edge is facing in the correct direction

The Pro-Flex 120 is equipped with 4 left hand (LH) rotation blades and 1 right hand (RH) rotation blade\*:

- 4 LH ROTATION BLADES painted BLACK.
- 1 RH ROTATION BLADES painted RED

\*RH & LH rotation is determined by the top blade tip travel direction when viewed from above. RH = Clock-wise, LH = Counter Clock-wise See Page 8 / Page 9 for individual deck blade rotation direction.

A 1" diameter pilot centers the blade on the spindle with two 1/2" grade 5 fasteners. When installing blades, be sure that the spindle pilot is properly seated in the blade and the fasteners are in good condition and properly tightened per the chart on at the beginning of this section.



## BLADE SHARPENING



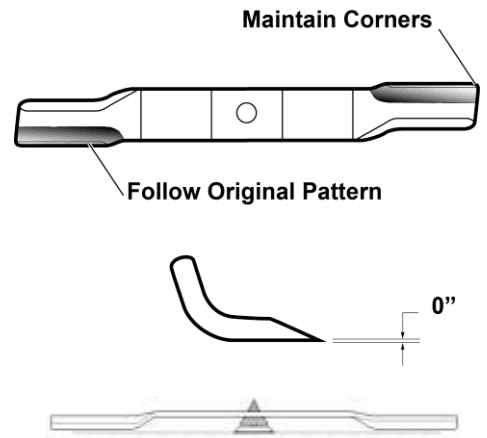
### WARNING!

Use gloves when handling mower blades. Blades can be very sharp.

IMPORTANT! When sharpening blades, be sure material removed is equal on both sides of the blade. Unbalanced blades will cause excessive vibration leading to cracks in machine components.

- Clean all material from the blade prior to sharpening and balancing.
- Grind or file blades following original pattern as shown.
- Sharpen to a razor edge. Do not sharpen back side of blade.

Use the supplied cone balancer to verify blade balance. When the blade is correctly balanced, the blade will remain horizontal.



## SPINDLE SERVICE

Each spindle is supported by two ball bearings. No adjustment of clearance is required. Running clearance is pre-set during assembly by tightening the 1" NF left hand nut on top of the pulley.

Periodically inspect blade spindles by grasping pulley, and moving from side to side. If any free play is noted, replace or repair.

### SPINDLE ASSEMBLY REMOVAL

- 1) Relieve tension from belt, and remove belt from the spindle pulley.
- 2) Raise the mower decks into the service position and ensure the deck safety locks are secure
- 3) Remove blade from spindle.
- 4) From under the deck, loosen the four nuts that hold the spindle assembly to the deck.
- 5) Remove the complete spindle assembly and pulley out through the hole in the deck.

### SPINDLE ASSEMBLY INSTALLATION

Reverse above procedure. Be sure spindle mounting area of deck is clean of any foreign material before attaching spindle assembly.

## SPINDLE ASSEMBLY REPAIR

Note: A video showing this rebuild procedure is available on our website: <http://www.progressiveturfequip.com/service>

 **CAUTION!**

Spindle repair requires special skills and tools, a shop press is required. If your shop is not properly equipped or your mechanics are not properly trained in this type of repair, complete spindle assemblies are available as service parts.

- 1) Remove LH Nut (3), lock washer (2), pulley (1), spacer (12), washer (8) & shim (4) from spindle assembly. **The spindle nut is left-hand thread.**

 **CAUTION!**

Make sure that the press ram and bed 100% square to each other. If bearings are not square in housing, bearings will wear out prematurely.

- 2) Place assembly in shop press with support under spindle housing flange and press spindle down through housing.
- 3) Remove bottom bearing from spindle and top bearing from housing

**IMPORTANT! Removing bearings from spindle / housing causes permanent damage to the bearings. New bearing must be used in re-assembling the spindle.**

- 4) Inspect bearing spacer faces for wear. If any wear is present, replace spacer with new.

**IMPORTANT! Failure to replace a worn or damaged spacer will lead to premature top bearing wear.**

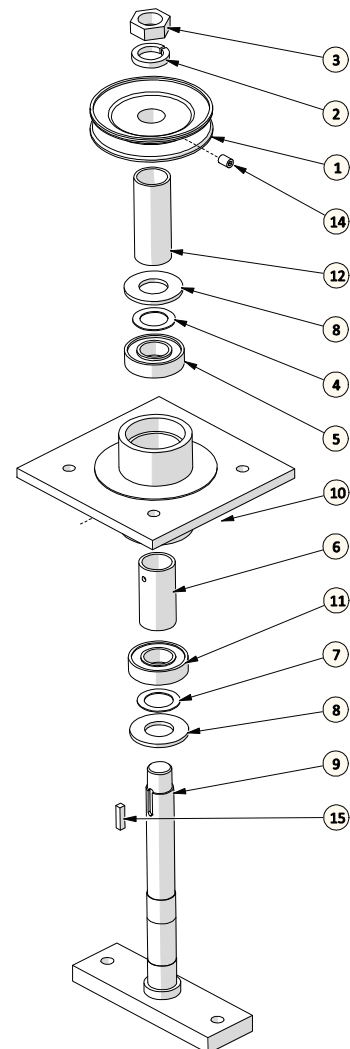
- 5) Place housing in press (upside down). **Pressing on outer race**; install bottom bearing (11) into housing.
- 6) Place spindle in press. Place dirt shield (8) and shim (7) on spindle.
- 7) **Pressing on inner race** of bottom bearing, press housing / bearing on to spindle. A steel tube will be required to slide over the spindle and press on inner race.
- 8) Install bearing spacer (6) with hole end up.
- 9) Set top bearing on to spindle. **Pressing on inner race**, press top bearing on to spindle.

**IMPORTANT! Due to design tolerances, the top bearing may appear to be loose in the housing. This is normal and is not detrimental to the operation of the spindle.**

- 10) Install shim washer (4), dirt shield (8), pulley spacer (12), key (15), pulley (1) and set screw (14) on to spindle.
- 11) Install LH lock washer (2) and LH nut (3) and torque to 60 ft-lb.

Rotate the housing six revolutions by hand and check for smooth, free movement.

The assembly is now ready for installation into the mower deck.



## HYDRAULICS

Hydraulic Oil – Conventional Anti-Wear Tractor-Hydraulic Fluid  
Biodegradable Oils – Consult Factory for compatibility analysis.

### **WARNING!**

**Hydraulic fluid escaping under pressure can penetrate the skin. Seek medical attention at once if injured by escaping fluid.**

During your daily inspection repair all leaks before they create a major problem. Do not use your hand to check for hydraulic oil leaks. Use a piece of cardboard instead. Hydraulic fluid escaping under pressure can penetrate the skin causing serious injury. If skin penetration occurs, seek medical attention immediately. Relieve all pressure before disconnecting hoses.

When servicing any hydraulic component of the mower ensure that all decks and wings are in their lowered position and all hydraulic pressure is relieved. Pressure can be maintained in the hydraulic circuits long after the power source and pump have been shut down.

Relieve all pressure before disconnecting hoses or tubes.

Tighten all connections before applying pressure.

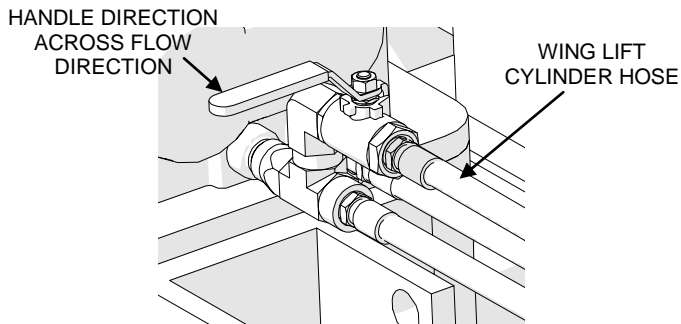
When connecting the hydraulic couplers to the tractor, be sure that both coupler ends are clean. Dirt in the hydraulic system can block the orifice in the line throttle valve or cause premature wear & failure of hydraulic components on the mower or tractor.

The hydraulic system on the Pro-Flex 120 mower is divided into 2 simple systems; one to operate the deck lift cylinders, the other to operate the wing lift cylinders.

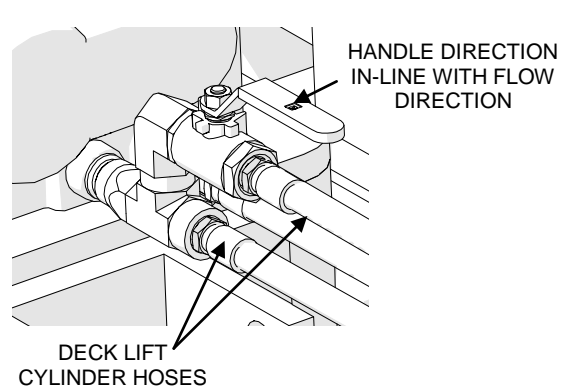
**NOTE-** A quarter-turn ball valve is located in the wing cylinder circuit (at the tractor coupler). This valve is used to shut off the hydraulic system to the wing lift cylinders and **must be closed when operating** the mower to avoid unwanted wing movement during mowing. Failure to close the valve will lead to uneven cutting & reduced belt life.



**VALVE CLOSED**

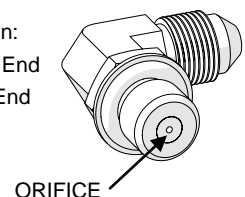


**VALVE OPEN**



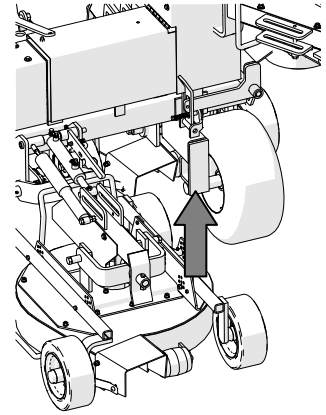
All hydraulic cylinders are equipped with a .040" diameter orifice in one of the elbow connectors. This orifice is present to throttle the cylinder speed to an acceptable level. When repairing the hydraulic system ensure that this orifice elbow is present and free of debris that could block the orifice.

Orifice Location:  
Wings – Base End  
Decks – Rod End



## SUPPORTING MACHINE FOR SERVICE

(2) Points are available to lift the mower off of the ground for servicing the transport tires / wheels / bearings at the base of the axle as shown in the accompanying illustration. Use a bottle or service jack to raise the wheel from the ground and place a wooden block or other suitable support under the rectangular tube.



### WARNING!

Do not support the machine on cinder blocks, hollow tiles or other members that may fail under continuous load.

Never perform service on a machine that is supported solely by a jack. Always ensure proper blocking is placed to support load during service.

Transport tires must be changed with the wings in the raised position. Ensure the machine is on a flat, level surface and the wing locks are fully engaged before attempting to lift the machine.

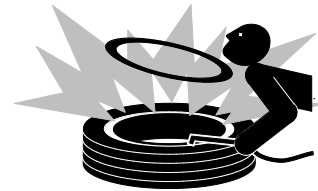


## TRANSPORT TIRES

Inspect tires daily for wear or damage. Check tire pressures weekly with an accurate pressure gauge. Do not inflate tires beyond 35 psi.

### WARNING!

Mounting and dismounting tires from rims can be dangerous and should be performed by trained personnel using correct tools, equipment and procedures.



## LONG-TERM STORAGE

If the mower is not to be used for an extended period of time (4 months or longer) it is recommended that the following maintenance steps are followed:

- 1) Thoroughly wash mower, removing all grass clipping residue from deck undersides & mower framework.
- 2) Add grease to all grease points.
- 3) Check gearbox oil for proper level.
- 4) Relieve tension on all V-belts by removing belt from tensioner pulley.
- 5) Inspect all drive belts & pulleys.
- 6) Inspect all blade spindle bearings for excessive play.
- 7) Inspect all blades for serviceable condition.

When returning the mower to service after long-term storage:

- 1) Check tightness of all blade fasteners.
- 2) Add grease to all grease points.
- 3) Re-install all V-belts on tensioner pulleys.
- 4) Ensure all pivot points move freely.
- 5) Change gearbox oil.

<b>TROUBLE SHOOTING</b>		
<b>PROBLEM</b>	<b>CAUSE</b>	<b>REMEDY</b>
Belt slippage	Lack of tension	Inspect & replace belt or tensioner device as required
	Oily drive conditions	Clean drive
	Over Loading	Increase cutting height or reduce ground speed
	Wing raising during turns	Close quarter turn valve
Rapid belt wear	Belt slippage	See Above
	Belt not aligned properly	Check pulley alignment and proper spacers
	Raising wings with PTO engaged	Disengage PTO and wait for blades to stop before raising wings
	Wing raising during turns	Close quarter turn valve
Belt squeal	Belt slippage	See Above
Over-heated bearings	Belt slippage	See Above
	Insufficient Lubrication	Add grease per manual
	Insufficient Cooling	Clean top of deck area surrounding spindle
Uncut strips at wings	Wing raising during turns	Close quarter turn valve
Left front deck not cutting	Wrong blade	This is a right-hand turning blade, install RH blade (RH blade, painted red)
Wing safety locks will not engage	Lock chains too short	Adjust chain length
	Lock springs too loose	Tighten lock springs
Mower Deck will not lower.	Orifice in cylinder plugged	Remove orifice and remove obstruction and reassemble
	Deck latch in locked position.	Unlatch deck locks.
Vibration on turning	Drawbar length incorrect.	Adjust drawbar to specification
Damaged intermediate bearing or tractor PTO shaft	Input shaft does not collapse easily under power	Remove input shaft, pull apart and deburr / grease splines Grease at proper interval.
Premature spindle bearing failure	Lack of lubrication or grease contaminated	See information in manual for grease specification and compatibility.
	Improper rebuild procedure	See specific instructions in manual
	Improper bearings	Use only OEM bearings



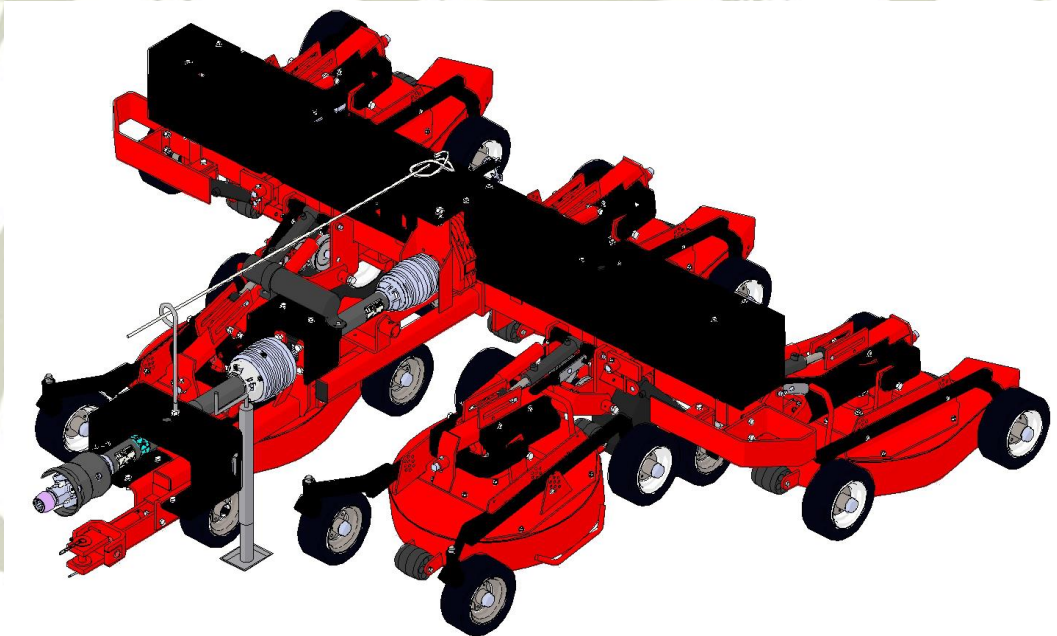
## Parts List

# Pro-Flex 120

Serial No. 14272040 and up

# Pro-Flex Roller 120

Serial No. 15101019 and up



PROGRESSIVE TURF EQUIPMENT INC.  
137 WEST WILLIAM STREET  
SEAFORTH, ONTARIO  
CANADA N0K 1W0  
TOLL FREE: 800 668-8873  
ISSUE DATE: November, 2014  
P.N. 120534



*The Better Built Choice.™*

[www.progressiveturfequip.com](http://www.progressiveturfequip.com)

**Pro-Flex 120 Series Parts List**

---

<b>TABLE OF CONTENTS</b>	<b>PAGE</b>
<b>SERIAL NUMBER LOCATION</b> .....	<b>49</b>
<b>PARTS INFORMATION</b> .....	<b>49</b>
<b>MAINTENANCE</b> .....	<b>50</b>
<b>PARTS ORDERING GUIDE</b> .....	<b>50</b>
<b>1. DECK ASSEMBLY</b> .....	<b>51</b>
1.1. BLADE SPINDLE ASSEMBLY – MAINTENANCE FREE.....	51
1.2. BLADE OPTIONS .....	52
1.3. DECK ASSEMBLY – PF-120 .....	53
1.4. DECK ASSEMBLY – PFR-120 .....	54
1.5. DECK ARM ASSEMBLIES – PF-120.....	55
1.6. DECK ARM ASSEMBLIES – PFR-120 .....	56
1.7. DRIVE BELTS .....	57
1.8. BELT DRIVE ASSEMBLY - LEFT .....	58
1.9. BELT DRIVE ASSEMBLY - RIGHT .....	59
<b>2. FRAME ASSEMBLY</b> .....	<b>60</b>
2.1. FRAME ASSEMBLY - REAR .....	60
2.2. FRAME ASSEMBLY - FRONT .....	61
2.3. DECK LIFT ARM ASSEMBLIES .....	62
<b>3. HYDRAULICS</b> .....	<b>63</b>
<b>4. DRIVELINE</b> .....	<b>64</b>
4.1. INPUT DRIVELINE.....	64
4.2. DRIVELINE GUARDING .....	65
4.3. INPUT PTO SHAFT .....	66
4.4. INTERMEDIATE PTO SHAFT .....	67
4.5. GEARBOX.....	68
<b>5. WHEEL ASSEMBLIES</b> .....	<b>69</b>
5.1. WHEEL ASSEMBLIES.....	69
5.2. ROLLER ASSEMBLIES .....	70
<b>6. SAFETY</b> .....	<b>71</b>
6.1. DECALS .....	71
6.2. NOTES .....	74



## SERIAL NUMBER LOCATION

The serial number plate for the machine is located on the left side of the main frame tube at the front

For quick reference, record the following information:

Model: \_\_\_\_\_

Serial Number: \_\_\_\_\_

Date purchased: \_\_\_\_\_

NOTE: The last digit in each PF-120/PFR-120 serial number is a letter. This letter denotes the geographic destination of the mower.

D EU Regulatory Region

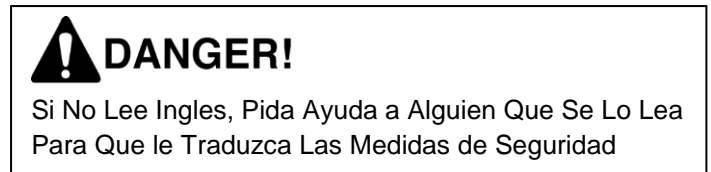
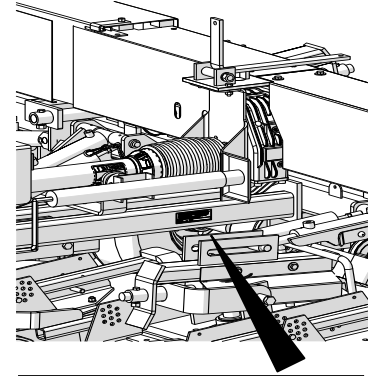
B Non- EU Regulatory Region

There are differences in the parts required to service your mower based on this geographic code as are referred to throughout the parts lists. Always state this information when contacting your selling dealer and when ordering spare parts.

## PARTS INFORMATION

This Parts List shows parts breakdowns for both PF-120 and PFR-120 mowers; pages within this parts list show common parts to these models unless specifically labelled. Use only Genuine Original Equipment Manufacturers (O.E.M.) replacement parts. The use of "will fit" parts may reduce machine performance, void machine warranties and present a safety hazard. Use Genuine OEM parts.

Progressive Turf Equipment Inc.  
 137 West William Street  
 Seaforth, Ontario  
 Canada  
 N0K 1W0  
 Phone: 800-668-8873  
 Fax: 519-527-2275  
 www.progressiveturfequip.com



## MAINTENANCE

Maintenance should always be performed by a qualified service technician familiar with servicing similar equipment, using good safety and workmanship practices.

**Always observe proper lock-out procedures when performing any maintenance work.**

Other than maintaining the blade spindles or blades, always lower all decks before performing maintenance. Block and or support machine using equipment designed for the task. When maintaining blades or spindles, always ensure locks are seated correctly in place. When performing hydraulic maintenance, ensure that pressure has been released.



It is imperative that the operator or qualified service technician reads and understands all the safety information in the Operator's Manual before proceeding. Failure to follow the instructions or heed the warnings could result in injury or death.

**Proper care is your responsibility.**

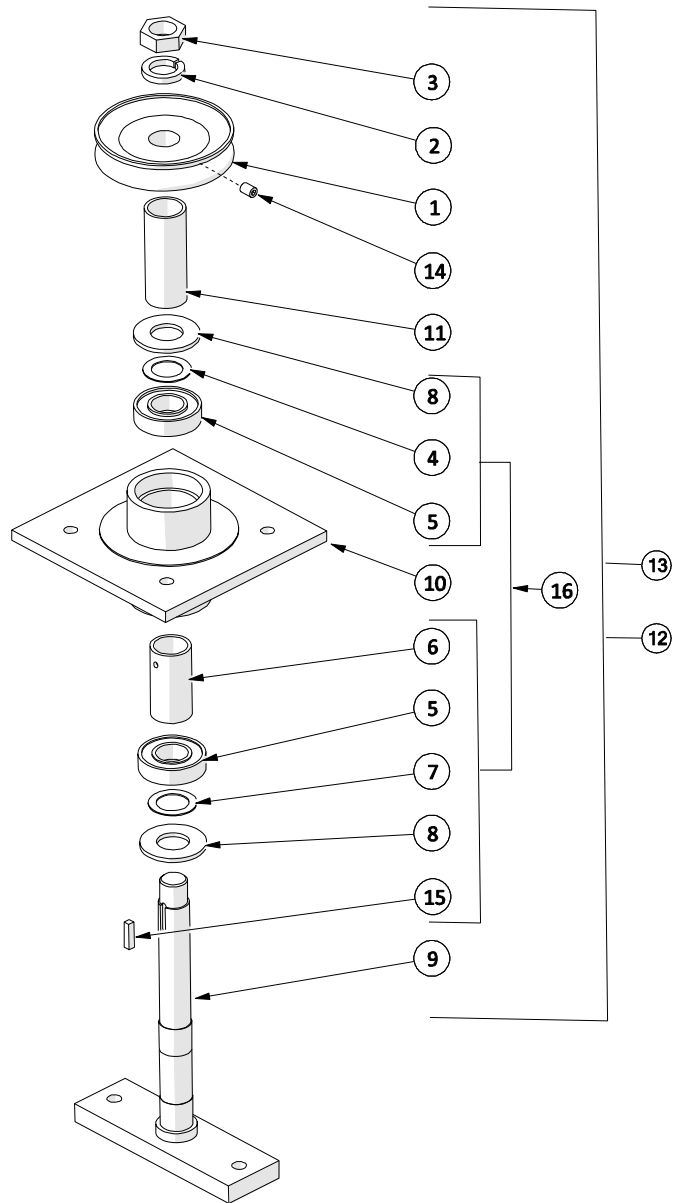
## PARTS ORDERING GUIDE

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 purchase order.
6. The manufacturer reserves the right to change prices without notice.

# 1. DECK ASSEMBLY

## 1.1. BLADE SPINDLE ASSEMBLY – MAINTENANCE FREE

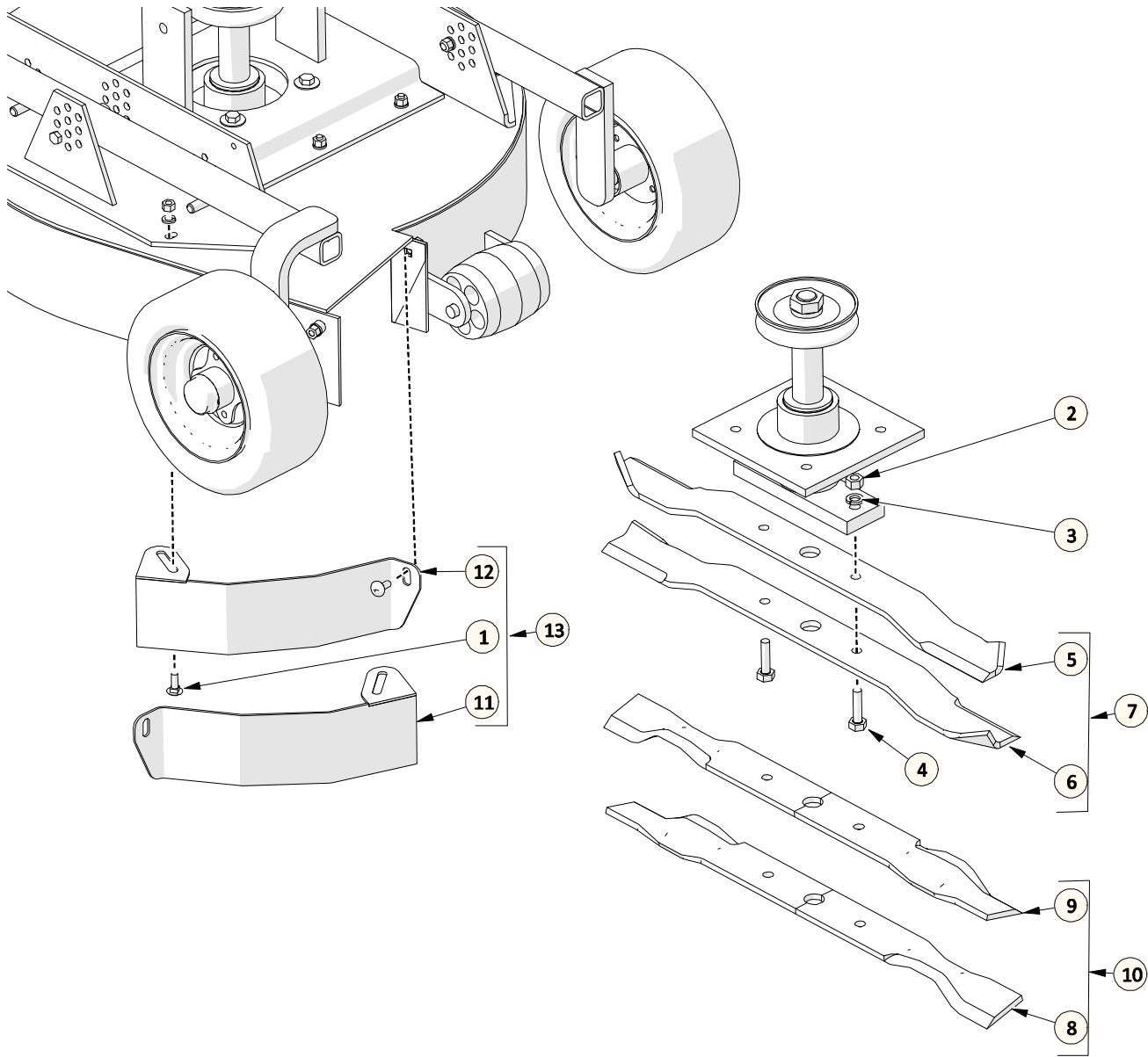


ITEM	PART #	DESCRIPTION	QTY
1	212002	5" DRIVE PULLEY	1
2	521002	LOCKWASHER L.H. (3 PC KIT)	1
3	521003	HEX NUT- L.H.	1
4	-	SHIM WASHER - 1.125"	1
5	-	BEARING - SEALED	2
6	-	SPACER TUBE	1
7	-	SHIM WASHER - 1.188"	1
8	-	SPINDLE DIRT SHIELD	2
9	522580	BLADE SPINDLE	1

ITEM	PART #	DESCRIPTION	QTY
10	521700	SPINDLE HOUSING	1
11	600148	DECK SPINDLE SLEEVE	1
12	600352	SPINDLE ASSEMBLY	1
13	600462	SPINDLE ASSEMBLY W/O PULLEY	1
14	O.L.	SET SCREW - 3/8" X 0.5" NC	1
15	O.L.	DECK PULLEY KEY - 1/4" X 1.00"	1
16	600720	SPINDLE REBUILD KIT	1

O.L. - OBTAIN LOCALLY

## 1.2. BLADE OPTIONS



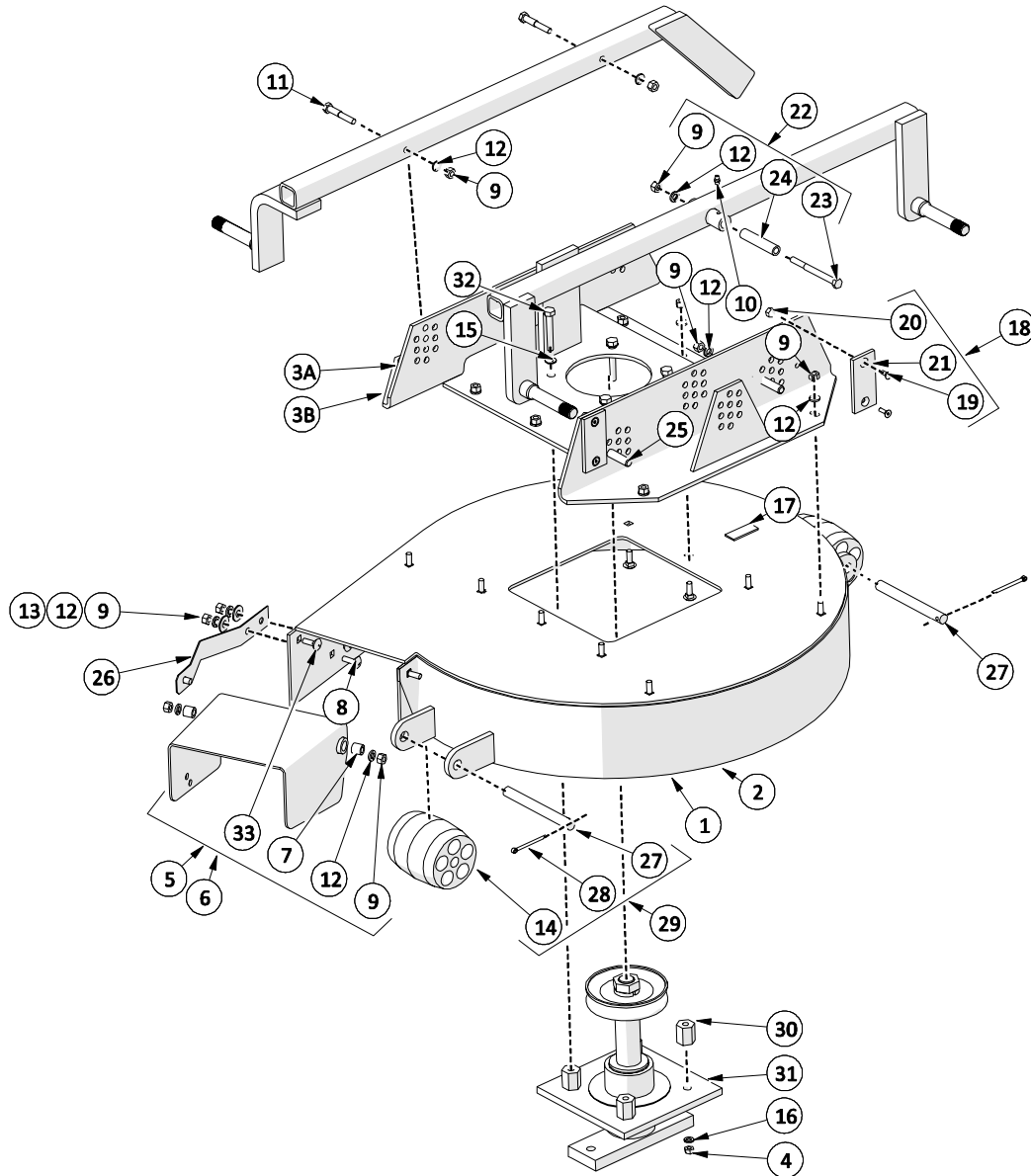
ITEM	PART #	DESCRIPTION	QTY
1	O.L.	CARR. BOLT - 3/8 X 1-1/4" NC GR5 PL	5
2	O.L.	HEX NUT - 1/2" NC	2
3	O.L.	LOCKWASHER - 1/2"	2
4	O.L.	HEX BOLT - 1/2" X 1-3/4" NC PL	2
5	-	27" RH HIGH LIFT BLADE	1
6	-	27" LH HIGH LIFT BLADE	4
7	600517	27" STD BLADE SET - 4 LH & 1 RH	1
8	-	MULCHING BLADE - 27" - RH	1
9	-	MULCHING BLADE - 27" - LH	4
10	600518	27" MULCHING BLADE SET - 4 LH & 1 RH	1
11	-	MULCHING HOOP - RIGHT	1
12	-	MULCHING HOOP - LEFT	4
13	606502	MULCHING HOOP KIT (5 PCS)	1
14	606501	MULCHING KIT (ITEMS 10 & 13)	1

O.L. - OBTAIN LOCALLY



### 1.3. DECK ASSEMBLY – PF-120

\*Right rear deck shown; see Section 1.5 for other decks



ITEM	PART #	DESCRIPTION	QTY
*	1	600169 MOWER DECK - RH	1
*	2	600168 MOWER DECK - LH (SHOWN)	4
*	3A	600151 DECK "H" FRAME - REAR (SHOWN)	4
*	3B	600150 DECK "H" FRAME - FRONT	1
	4	O.L. HEX NUT - 7/16NC GR5 PL	4
	5	606524 DEFLECTOR & BUSHING KIT - LH (SHOWN)	1
	6	606522 DEFLECTOR & BUSHING KIT - RH (NOT SHOWN)	1
	7	606529 DEFLECTOR BUSHING	2
	8	O.L. CARR. BOLT- 3/8 X 1 NC GR5 PL	12
	9	O.L. HEX NUT - 3/8 NC GR5 PL	19
	10	O.L. GREASE FITTING 1/4 - 28	1
	11	O.L. HEX BOLT- 3/8 X 2.25 NC GR5 PL	2
	12	O.L. LOCKWASHER - 3/8" PL	19
	13	O.L. FLAT WASHER- 3/8 PL	2
	14	209001 ANTI SCALP ROLLER - 4-1/4"	2
	15	O.L. FLAT WASHER - 7/16 PL	4
	16	O.L. LOCKWASHER - 7/16 PL	4
	17	521014 DECAL - GREASE GUN	1

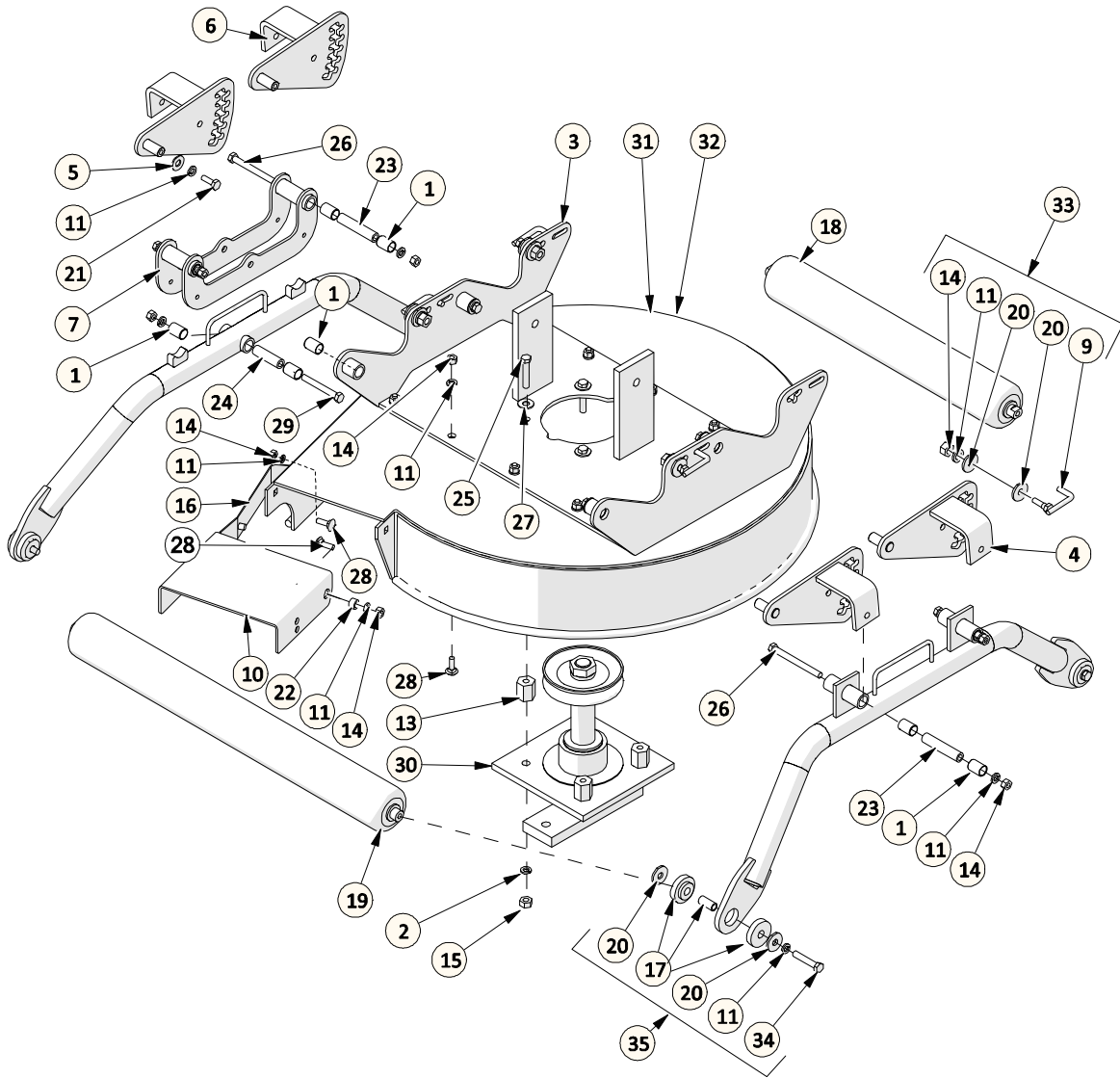
ITEM	PART #	DESCRIPTION	QTY
	18	600521 WEAR PLATE KIT (2 PLATES & HARDWARE)	1
	19	O.L. 1/4-20 x 3/4 COUNTERSUNK HEX SCREW	4
	20	O.L. HEX LOCK NUT - 1/4" NC PLATED	4
	21	- WEAR PLATE - SEE ITEM 18	2
	22	600509 PIVOT BUSHING KIT (COMPLETE MACHINE)	1
	23	O.L. HEX BOLT- 3/8 X 4 NC GR5 PL	1
	24	- DECK PIVOT BUSHING	1
	25	600514 DECK PIVOT PIN KIT (10 PCS)	1
	26	606162 DEFLECTOR SPRING	1
	27	521750 ANTISCALP PIN W/COTTER PIN	2
	28	O.L. 3/16 X 1-1/2" COTTER PIN	1
	29	521749 ANTISCALP ROLLER KIT	1
	30	600513 SPINDLE SPACER KIT	1
	31	600152 SPINDLE ASSEMBLY - SEE SECTIONS 1.1 & 1.2	1
	32	O.L. HEX TAP BOLT- 7/16 X 2.5 NC GR5 PL	4
	33	O.L. CARR. BOLT- 3/8 X 1-1/4 NC GR5 PL	2

O.L. - OBTAIN LOCALLY

\*AVAILABLE IN BOTH RED & GREEN FINISHES.  
PART NUMBER SHOWN IS FOR RED FINISH.  
TO ORDER A GREEN FINISHED PART, ADD "G"  
TO THE END OF THE PART NUMBER.  
EXAMPLE: RED-123456, GREEN-123456G

### 1.4. DECK ASSEMBLY – PFR-120

\*Right front deck shown; see Section 1.6 for other decks

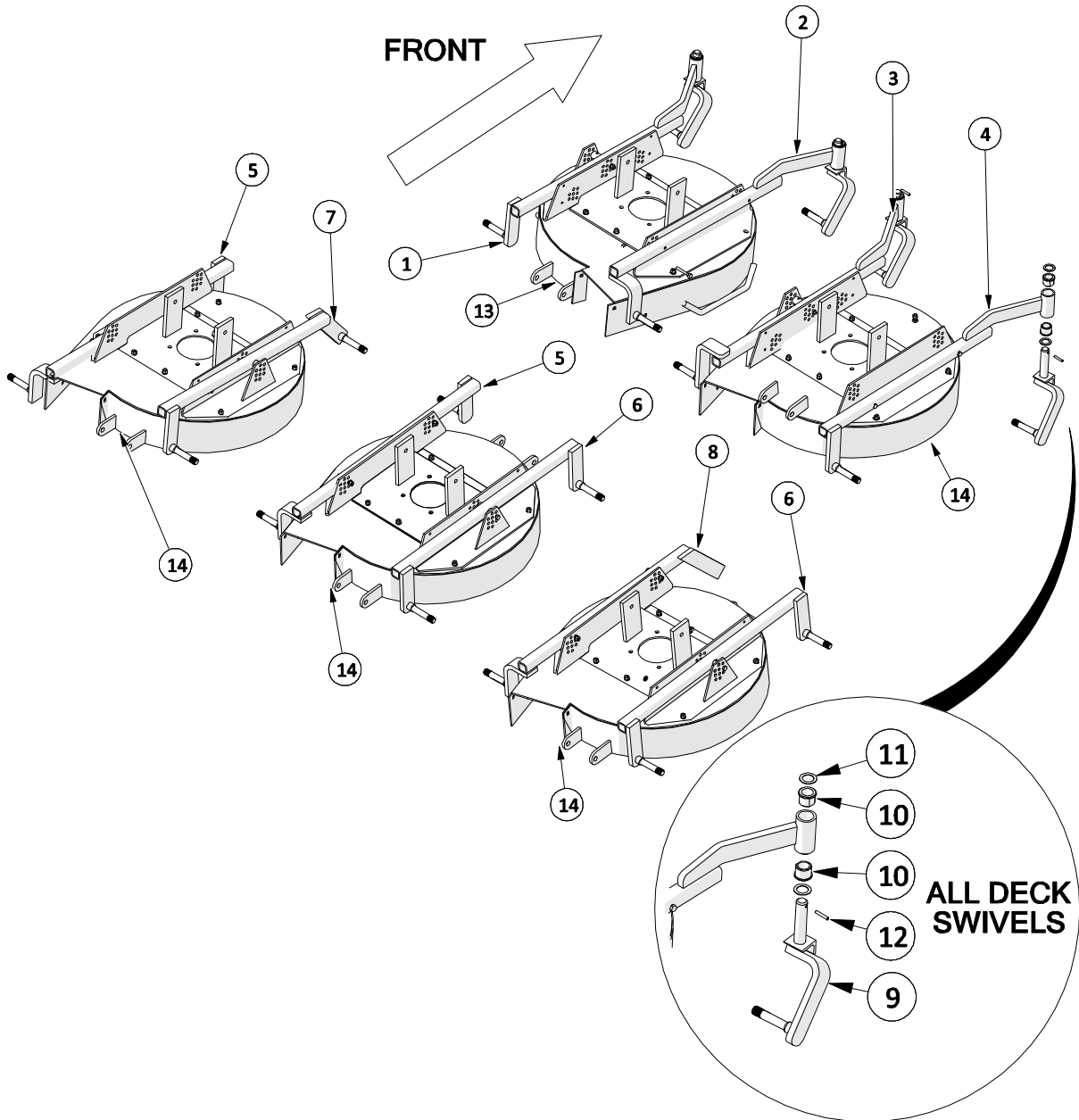


ITEM	PART #	DESCRIPTION	QTY
1	606500	SLEEVE BEARING KIT - 5/8" (10 PC KIT)	4
2	O.L.	LOCKWASHER - 7/16 PL	4
3	606114	DECK FRAME	1
4	606122	QUADRANT - R.H.	2
5	O.L.	FLAT WASHER - 3/8 PL	4
6	606138	QUADRANT - L.H.	2
7	606140	PIVOT - DECK ARM	1
9	-	HEIGHT BOLT	4
10	606289	DISCHARGE DEFLECTOR	1
11	O.L.	LOCKWASHER - 3/8 PL	31
13	600513	SPINDLE SPACER KIT (4 PCS)	1
14	O.L.	HEX NUT - 3/8 NC GR5 PL	23
15	O.L.	HEX NUT - 7/16 NC GR5 PL	4
16	606162	DEFLECTOR SPRING	1
17	-	MOUNT - DECK ROLLER	8
18	606245	DECK ROLLER - FRONT - SEE SECTION 5.2	1
19	606131	DECK ROLLER - REAR - SEE SECTION 5.2	1

ITEM	PART #	DESCRIPTION	QTY
20	O.L.	FENDER WASHER- 3/8 PL 1.25 O.D.	16
21	O.L.	HEX BOLT- 3/8 X 1 NC GR5 PL	4
22	600519	DEFLECTOR BUSHING (4 PCS)	2
23	606207	BUSHING - DECK FRAME PIVOT	4
24	606209	BUSHING - PIVOT ARM	1
25	O.L.	TAP BOLT- 7/16 X 2 NC GR5 PL	4
26	O.L.	HEX BOLT- 3/8 X 4 NC GR5 PL	3
27	O.L.	FLAT WASHER- 7/16 PL	4
28	O.L.	CARR. BOLT- 3/8 X 1 NC GR5 PL	14
29	O.L.	HEX BOLT- 3/8 X 3 NC GR5 PL	1
30	600152	DECK SPINDLE ASSEMBLY - SEE SECTIONS 1.1 & 1.2	1
31	606102	MOWER DECK - L.H. (SHOWN)	4
32	606154	MOWER DECK - RH	1
33	606512	HEIGHT ADJ BOLT KIT (4 SETS)	1
34	O.L.	HEX BOLT- 3/8 X 2 NC GR5 PL	4
35	606510	ROLLER BUSHING KIT (1-ROLLER)	1

O.L. - OBTAIN LOCALLY

**1.5. DECK ARM ASSEMBLIES – PF-120**

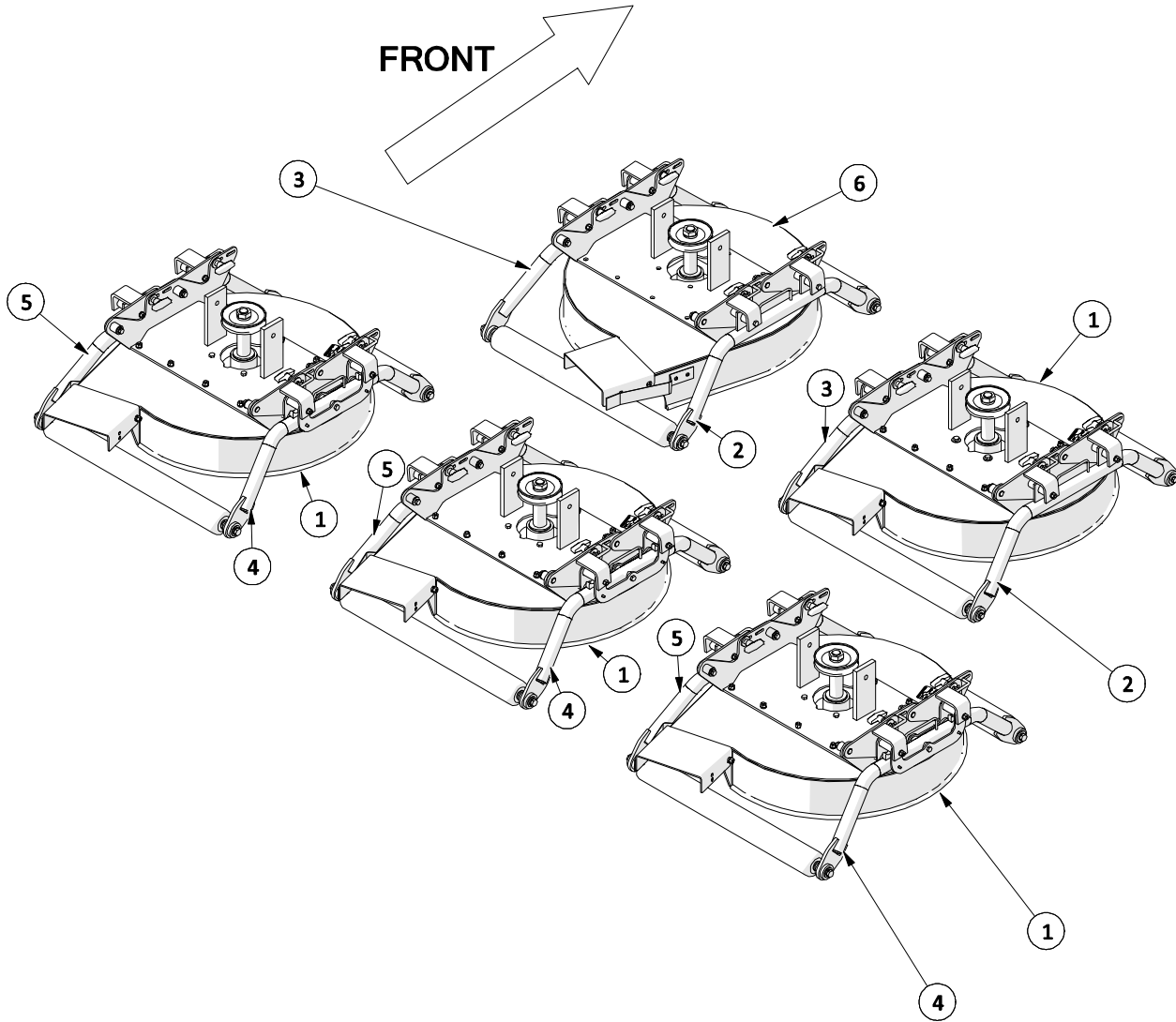


ITEM	PART #	DESCRIPTION	QTY
1	600185	DECK WHEEL ARM - FRONT A	1
2	600186	DECK WHEEL ARM - FRONT B	1
3	600187	DECK WHEEL ARM - FRONT C	1
4	600188	DECK WHEEL ARM - FRONT D	1
5	600189	DECK WHEEL ARM - REAR E	2
6	600190	DECK WHEEL ARM - REAR F	2
7	600191	DECK WHEEL ARM - REAR G	1
8	600192	DECK WHEEL ARM - REAR H	1

ITEM	PART #	DESCRIPTION	QTY
9	600177	DECK CASTER FRAME	4
10	521818	1" BUSHING	8
11	521320	SHIM WASHER 10 PC KIT	1
12	302604	SPLIT PIN KIT (4 PCS)	4
13	600169	MOWER DECK - RH	1
14	600168	MOWER DECK - LH	4

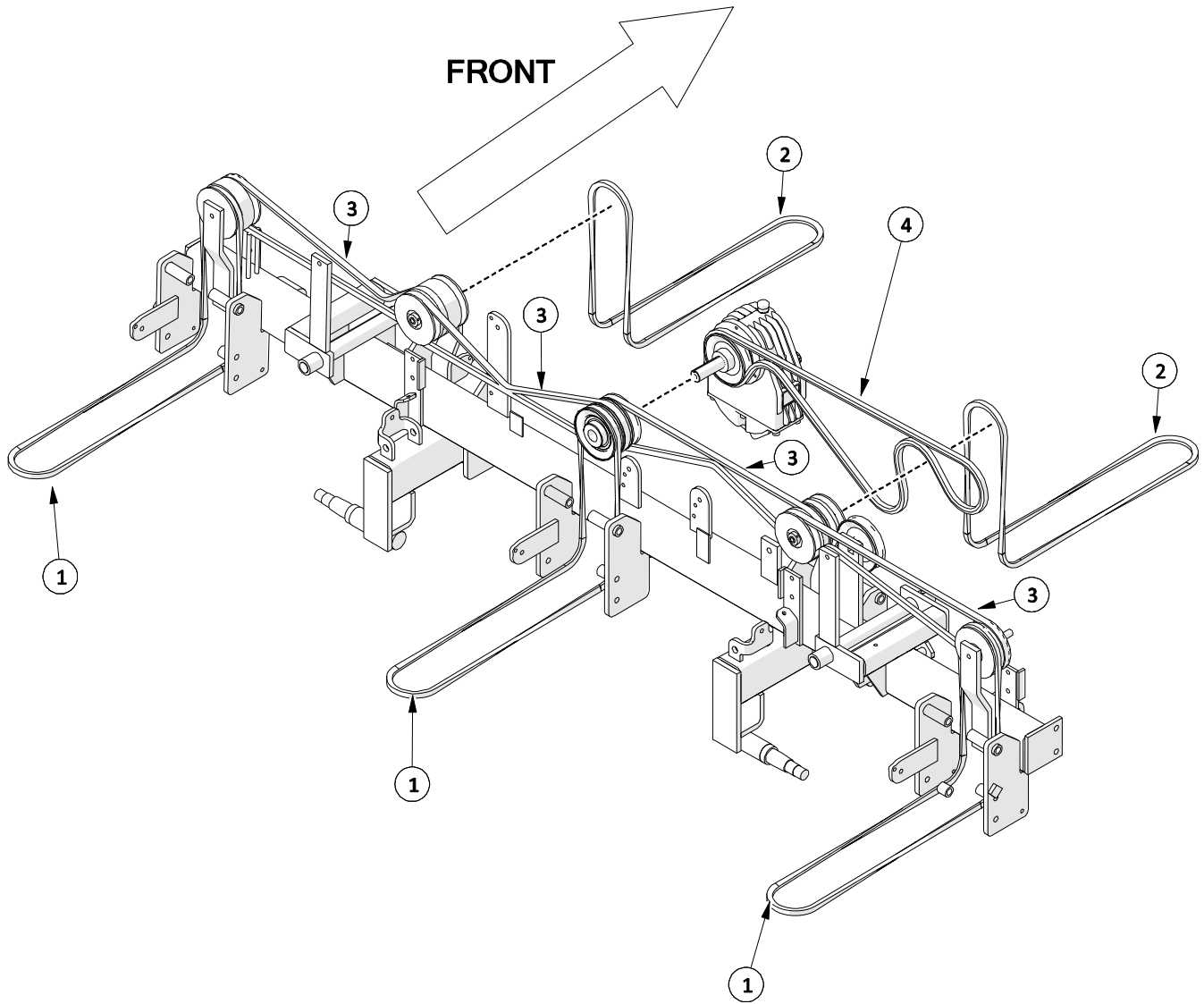
O.L. - OBTAIN LOCALLY

**1.6. DECK ARM ASSEMBLIES - PFR-120**



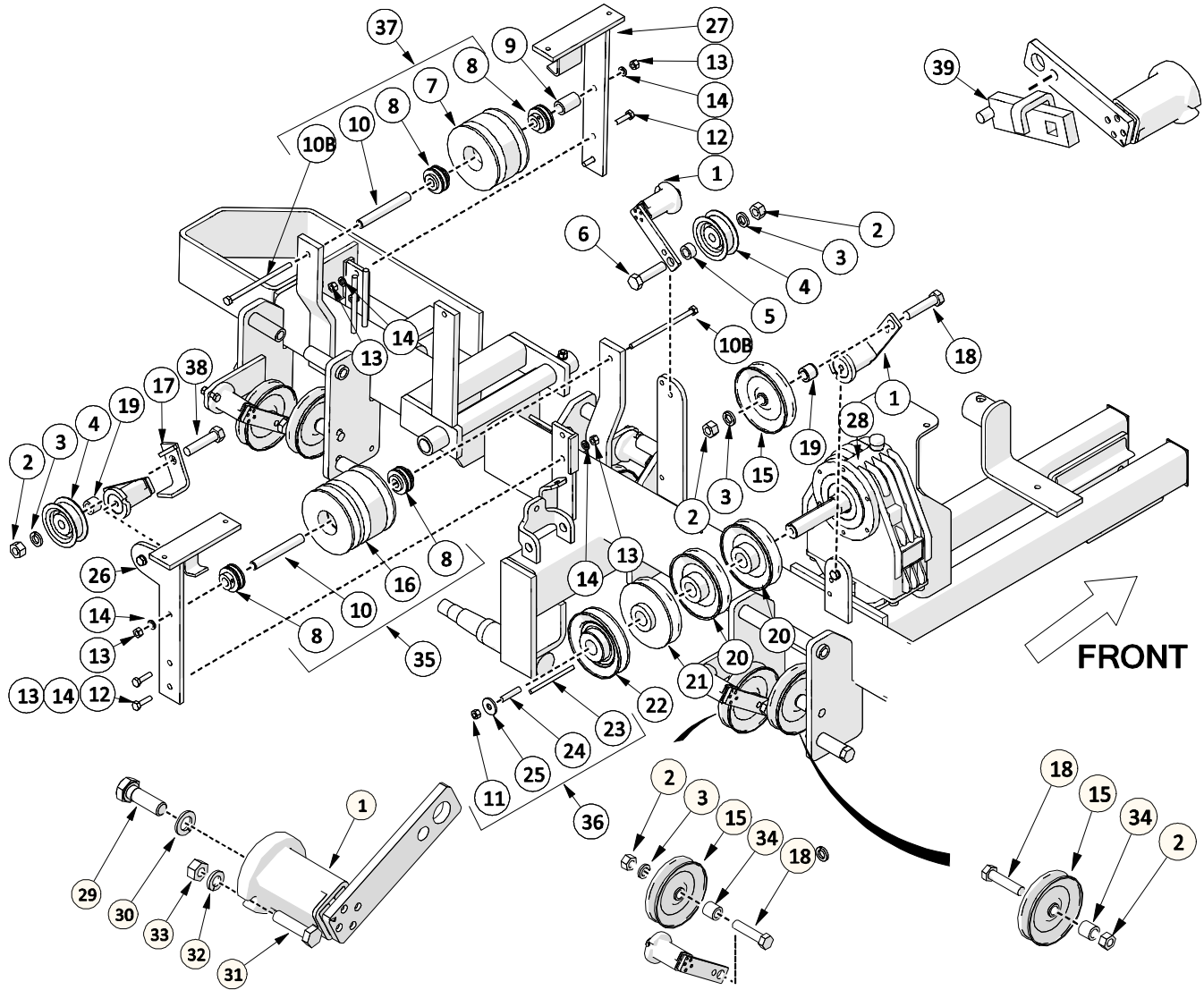
ITEM	PART #	DESCRIPTION	QTY
1	606102	MOWER DECK - L.H.	4
2	606136	DECK ARM - FIXED RIGHT	2
3	606144	DECK ARM - PIVOT LEFT	2
4	606150	DECK ARM - PIVOT RIGHT	3
5	606152	DECK ARM - FIXED LEFT	3
6	606154	MOWER DECK - R.H.	1

**1.7. DRIVE BELTS**



ITEM	PART#	DESCRIPTION	QTY
1	212015	BELT - KEVLAR - 5LK890 - 89"	3
2	212013	BELT - KEVLAR - 4LK790 - 79"	2
3	212011	BELT - KEVLAR - 5LK620 - 62"	4
4	212003	BELT - BB81	1
5	600524	BELT KIT - COMPLETE	1

### 1.8. BELT DRIVE ASSEMBLY - LEFT



**BELT TENSIONER MOUNTING HARDWARE**

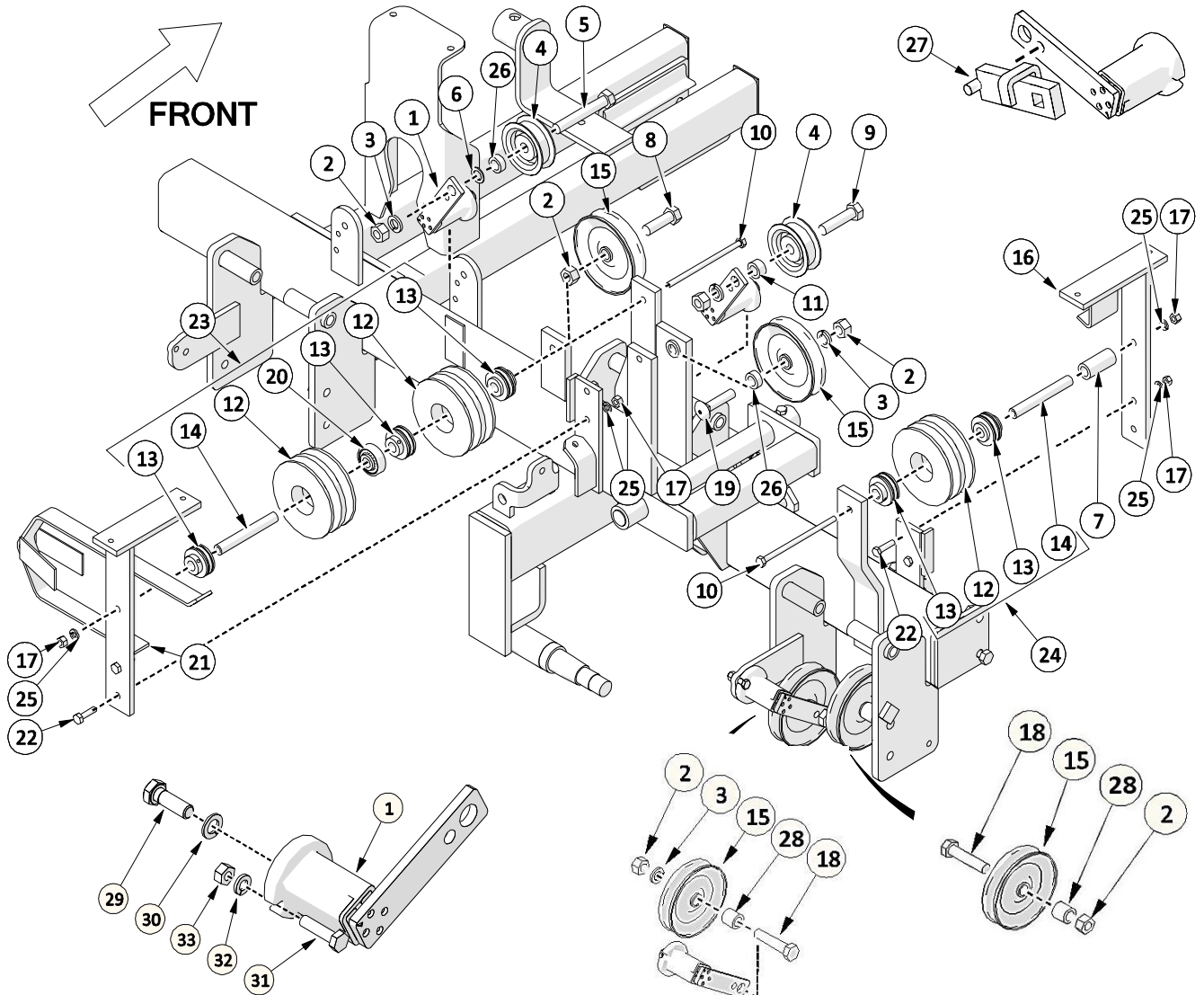
ITEM	PART #	DESCRIPTION	QTY
1	606224	IDLER TENSIONER ARM	6
2	O.L.	HEX NUT - 5/8NC GR5 PL	5
3	O.L.	LOCK WASHER- 5/8 PL	5
4	212000	IDLER PULLEY	2
5	600142	BUSHING (BLACK)	1
6	O.L.	HEX BOLT - 5/8 X 2.5 NC GR5 PL	1
7	-	PULLEY - 2 GROOVE - WING (SEE ITEM 37)	1
8	213013	BEARING W/SET SCREW	4
9	606443	PULLEY SPACER - L.H. WING	1
10	600503	PULLEY SLEEVE (4PCS) & BOLT (4PCS) KIT	1
10B	O.L.	HEX BOLT - 3/8 x 6 NC GR5 PL	2
11	O.L.	HEX LOCK NUT - 3/8NC GR5 PL	1
12	O.L.	HEX BOLT - 3/8 x 1.25 NC GR5 PL	4
13	O.L.	HEX NUT - 3/8NC GR5 PL	6
14	O.L.	LOCK WASHER- 3/8 PL	6
15	212009	IDLER PULLEY 5"	7
16	-	PULLEY - 3 GROOVE - LH (SEE ITEM 35)	1
17	606226	BELT GUIDE	1
18	O.L.	HEX BOLT - 5/8 X 2.75 NC GR5 PL	5
19	606445	IDLER SPACER	2
20	212002	5" DRIVE PULLEY W/SET SCREW	2

**ALL DECK BELT TENSIONERS**

ITEM	PART #	DESCRIPTION	QTY
21	212018	MACHINED PULLEY - 5" W/SET SCREW	1
22	212008	DRIVE PULLEY - GOLD W/SET SCREW	1
23	-	GEARBOX KEY	1
24	-	SET SCREW - 3/8" NC X 1.50	1
25	O.L.	FENDER WASHER- 3/8 PL	1
26	606172	PULLEY BRACKET - MID LEFT	1
27	606170	PULLEY BRACKET - WING	1
28	211000	GEARBOX	1
29	O.L.	HEX BOLT - M10 X 30MM	5
30	O.L.	LOCKWASHER - M10 PL	5
31	O.L.	HEX BOLT- 5/16 X 1.25 NC GR5 PL	5
32	O.L.	LOCK WASHER- 5/16 PL	5
33	O.L.	HEX NUT - 5/16NC GR5 PL	5
34	600507	BUSHING KIT - LOWER IDLER (5 PCS)	1
35	600311	CENTER PULLEY ASSEMBLY W/BOLT	1
36	600516	HARDWARE KIT - GEARBOX PULLEYS	1
37	600310	WING PULLEY ASSEMBLY - LH	1
38	O.L.	HEX BOLT- 5/8 X 3.00 NC GR5 PL	1
39	606234	TENSIONER RELEASE TOOL	1

OBTAIN LOCALLY

**1.9. BELT DRIVE ASSEMBLY - RIGHT**



**BELT TENSIONER MOUNTING HARDWARE**

**ALL DECK BELT TENSIONERS**

**ALL DECK BELT IDLERS**

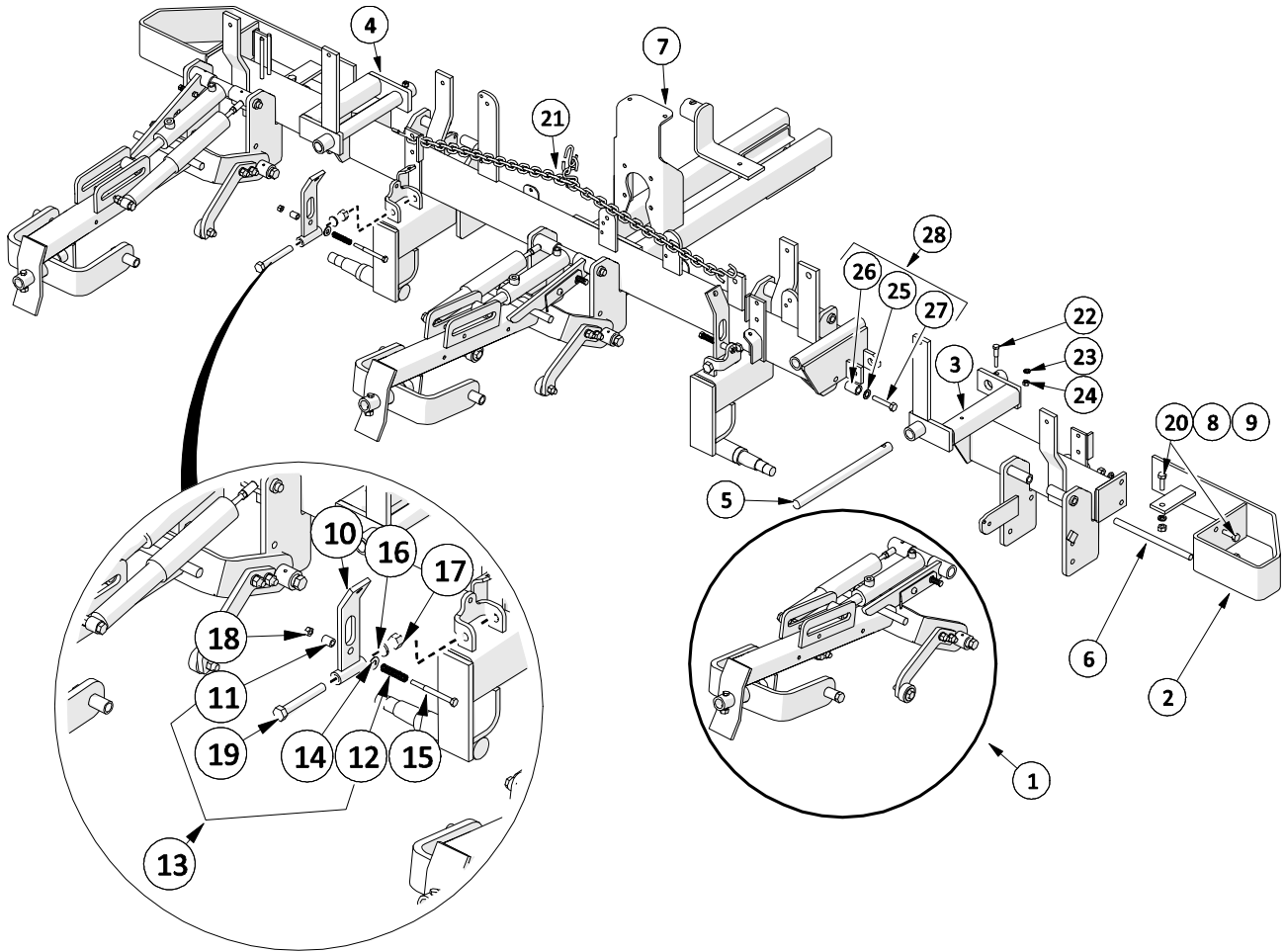
ITEM	PART #	DESCRIPTION	QTY
1	606224	IDLER TENSIONER ARM	4
2	O.L.	HEX NUT - 5/8NC GR5 PL	8
3	O.L.	LOCK WASHER- 5/8 PL	5
4	212000	IDLER PULLEY	2
5	O.L.	HEX BOLT- 5/8 X 2.50 NC GR5 PL	1
6	301121	WASHER - .625 ID X 1 OD SHIM	1
7	606441	PULLEY SPACER- R.H. WING	1
8	O.L.	HEX BOLT- 5/8 X 2 NC GR5 PL	1
9	O.L.	HEX BOLT- 5/8 X 2.5 NC GR5 PL	1
10	O.L.	HEX BOLT - 3/8 x 6 NC GR5 PL	2
11	600142	BUSHING (BLACK)	1
12	-	PULLEY - 2 GROOVE - RH	3
13	213013	BEARING W/SET SCREW	5
14	600503	PULLEY SLEEVE (4PCS)& BOLT (4PCS) KIT	2
15	212009	IDLER PULLEY 5"	6
16	606170	PULLEY BRACKET - WING	1
17	O.L.	HEX NUT - 3/8 NC GR5 PL	6

ITEM	PART #	DESCRIPTION	QTY
18	O.L.	HEX BOLT - 5/8 X 2.75 NC GR5 PL	4
19	O.L.	CARR. BOLT- 5/8 X 2.5 NC GR5 PL	1
20	213014	BEARING - 6204	1
21	606228	PULLEY BRACKET - CENTER RH	1
22	O.L.	HEX BOLT - 3/8 X 1.25 NC GR5 PL	4
23	600312	CENTER PULLEY ASSEMBLY -RH	1
24	600313	WING PULLEY ASSEMBLY - RH	1
25	O.L.	LOCKWASHER - 3/8 PL	6
26	600141	BUSHING - YELLOW	2
27	606234	TENSIONER RELEASE TOOL	1
28	600507	BUSHING LOWER IDLER KIT(5 PCS)	1
29	O.L.	HEX BOLT - M10 X 30MM	4
30	O.L.	LOCKWASHER - M10 PL	4
31	O.L.	HEX BOLT- 5/16 X 1.25 NC GR5 PL	4
32	O.L.	LOCK WASHER- 5/16 PL	4
33	O.L.	HEX NUT - 5/16NC GR5 PL	4

O.L. - OBTAIN LOCALLY

## 2. FRAME ASSEMBLY

### 2.1. FRAME ASSEMBLY - REAR



ITEM	PART #	DESCRIPTION	QTY
1	SEE SECT 2.3	DECK LIFT ARM ASSEMBLY	1
* 2	600147	WING DEFLECTOR	2
* 3	606186	WING FRAME - RIGHT	1
* 4	606188	WING FRAME - LEFT	1
5	600221	WING HINGE PIN	2
6	600222	DECK ARM PIN	2
* 7	606208	MAIN FRAME	1
8	O.L.	LOCKWASHER - 1/2" PL	6
9	O.L.	HEX NUT - 1/2" NC	6
10	600173	WING LOCK WELDMENT	2
11	SEE ITEM 13	WING LATCH BUSHING	2
12	SEE ITEM 13	SPRING - WING LOCK	2
13	214009	LATCH SPRING KIT (2 SETS)	1
14	O.L.	FLAT WASHER- 3/8 PL	2
15	O.L.	HEX BOLT- 3/8 X 4 NC GR5 PL	2

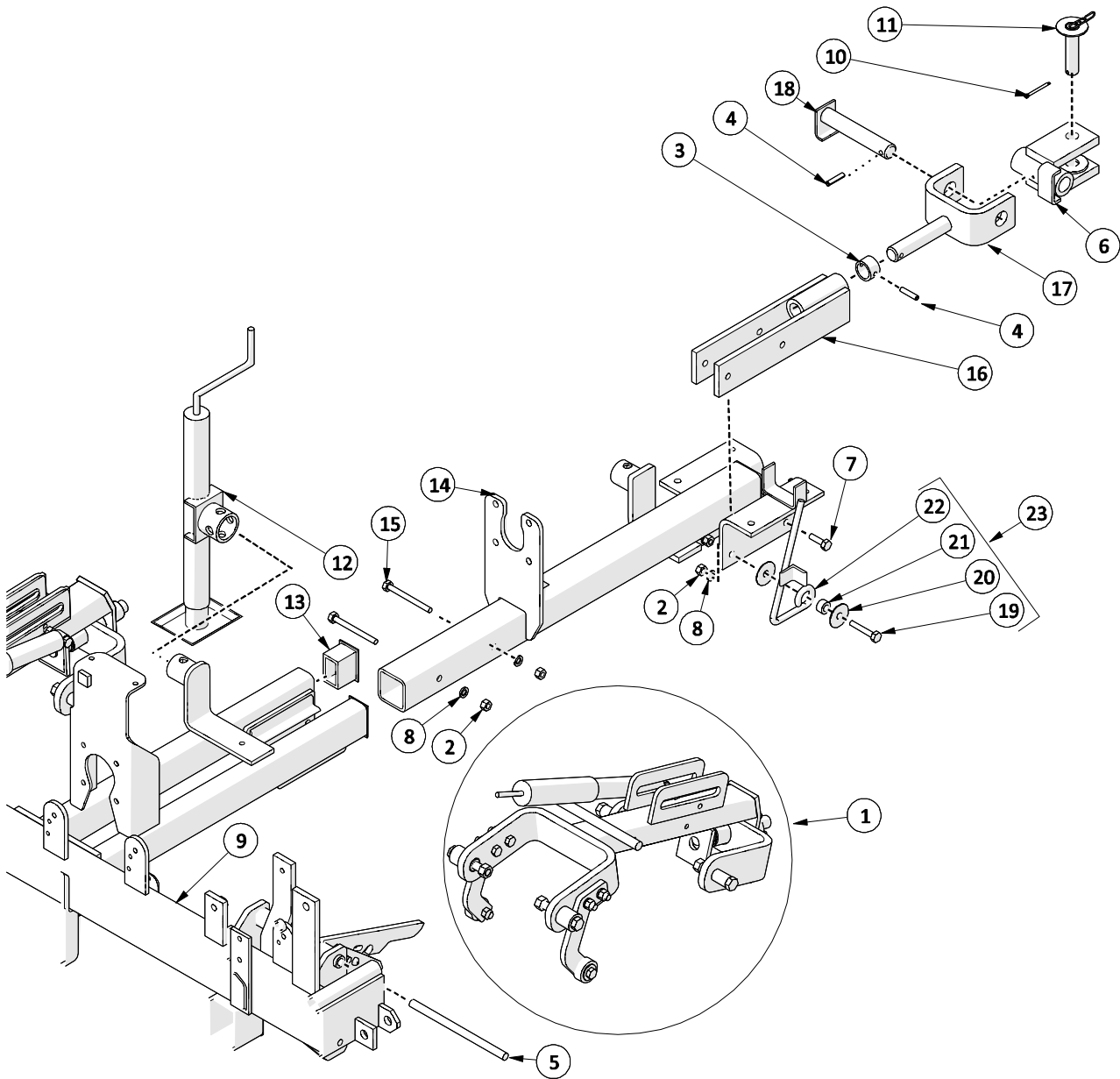
ITEM	PART #	DESCRIPTION	QTY
16	O.L.	LOCKWASHER - 5/8" PL	2
17	O.L.	HEX NUT - 5/8" NC	2
18	O.L.	HEX LOCK NUT - 3/8" NC	2
19	O.L.	HEX BOLT- 5/8 X 4.5 NC GR5 PL	2
20	O.L.	HEX BOLT- 1/2 X 1.5 NC GR5 PL	6
21	115003	WING RELEASE CHAIN	1
22	O.L.	HEX BOLT - 3/8 X2 NC GR5 PL	2
23	O.L.	LOCK WASHER- 3/8 PL	2
24	O.L.	HEX NUT - 3/8NC GR5 PL	2
25	SEE ITEM 28	WASHER - .625 ID X 1 OD SHIM	1
26	SEE ITEM 28	WING LEVELLING BUSHING	1
27	SEE ITEM 28	HEX BOLT- 1/2 X 2.5 NC GR5 PL	1
28	600315	WING LEVELLING KIT (LH & RH)	1

O.L. - OBTAIN LOCALLY

\*AVAILABLE IN BOTH RED & GREEN FINISHES.  
PART NUMBER SHOWN IS FOR RED FINISH.  
TO ORDER A GREEN FINISHED PART, ADD "G"  
TO THE END OF THE PART NUMBER.  
EXAMPLE: RED-123456, GREEN-123456G



**2.2. FRAME ASSEMBLY - FRONT**



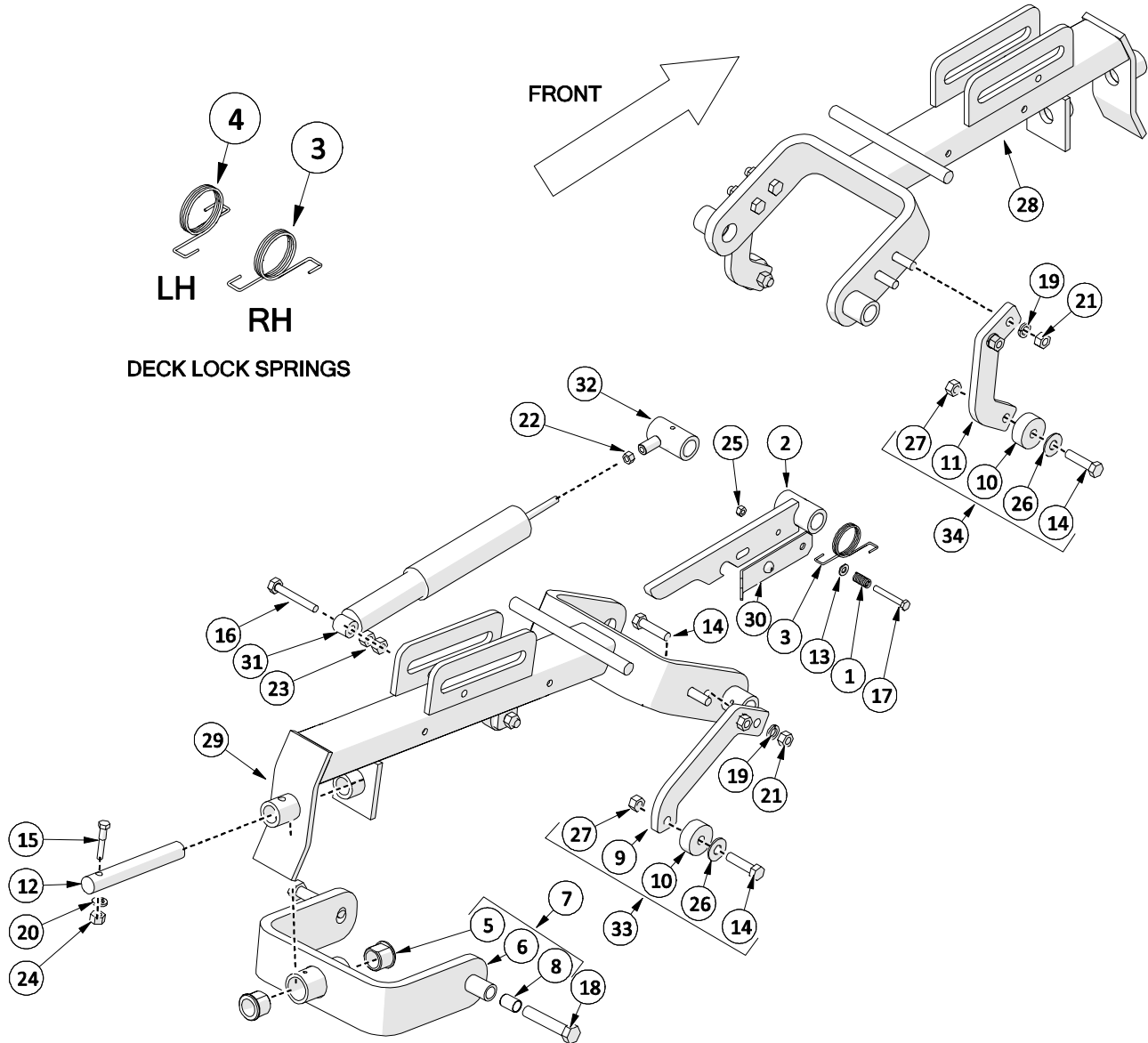
ITEM	PART #	DESCRIPTION	QTY
1	SEE SECTION 2.3	FRONT LIFT ARM ASSEMBLY	1
2	O.L.	HEX NUT - 1/2"	6
3	600022	HITCH PIVOT BUSHING	1
4	302603	SPLIT PIN KIT (2 PCS)	1
5	600222	DECK CYLINDER PIN - LONG	2
6	600025	HITCH CLEVIS	1
7	O.L.	HEX BOLT- 1/2 X 1.5 NC GR5 PL	3
8	O.L.	LOCKWASHER - 1/2" PL	6
9	606208	MAIN FRAME	1
10	O.L.	COTTER PIN - 5/32" X 1.5"	1
11	600259	HITCH PIN - 1" W/CHAIN	1
12	219001	IMPLEMENT JACK	1

ITEM	PART #	DESCRIPTION	QTY
13	600506	TUBE CAP KIT - 2"X3" (2 PCS)	1
14	600340	MAIN HITCH	1
15	O.L.	HEX BOLT- 1/2 X 4.5 NC GR5 PL	2
16	600030	HITCH CLEVIS PIVOT	1
17	600033	CLEVIS PIVOT	1
18	600036	CLEVIS PIN	1
19	O.L.	HEX BOLT- 1/2 X 2.5 NC GR5 PL	1
20	O.L.	FENDER WASHER 1/2 PL	2
21	528551	PTO SUPPORT BUSHING	1
22	606450	PTO SUPPORT	1
23	600560	PTO SUPPORT KIT (W/HARDWARE)	1

O.L. - OBTAIN LOCALLY

\*AVAILABLE IN BOTH RED & GREEN FINISHES.  
PART NUMBER SHOWN IS FOR RED FINISH.  
TO ORDER A GREEN FINISHED PART, ADD "G"  
TO THE END OF THE PART NUMBER.  
EXAMPLE: RED-123456, GREEN-123456G

### 2.3. DECK LIFT ARM ASSEMBLIES



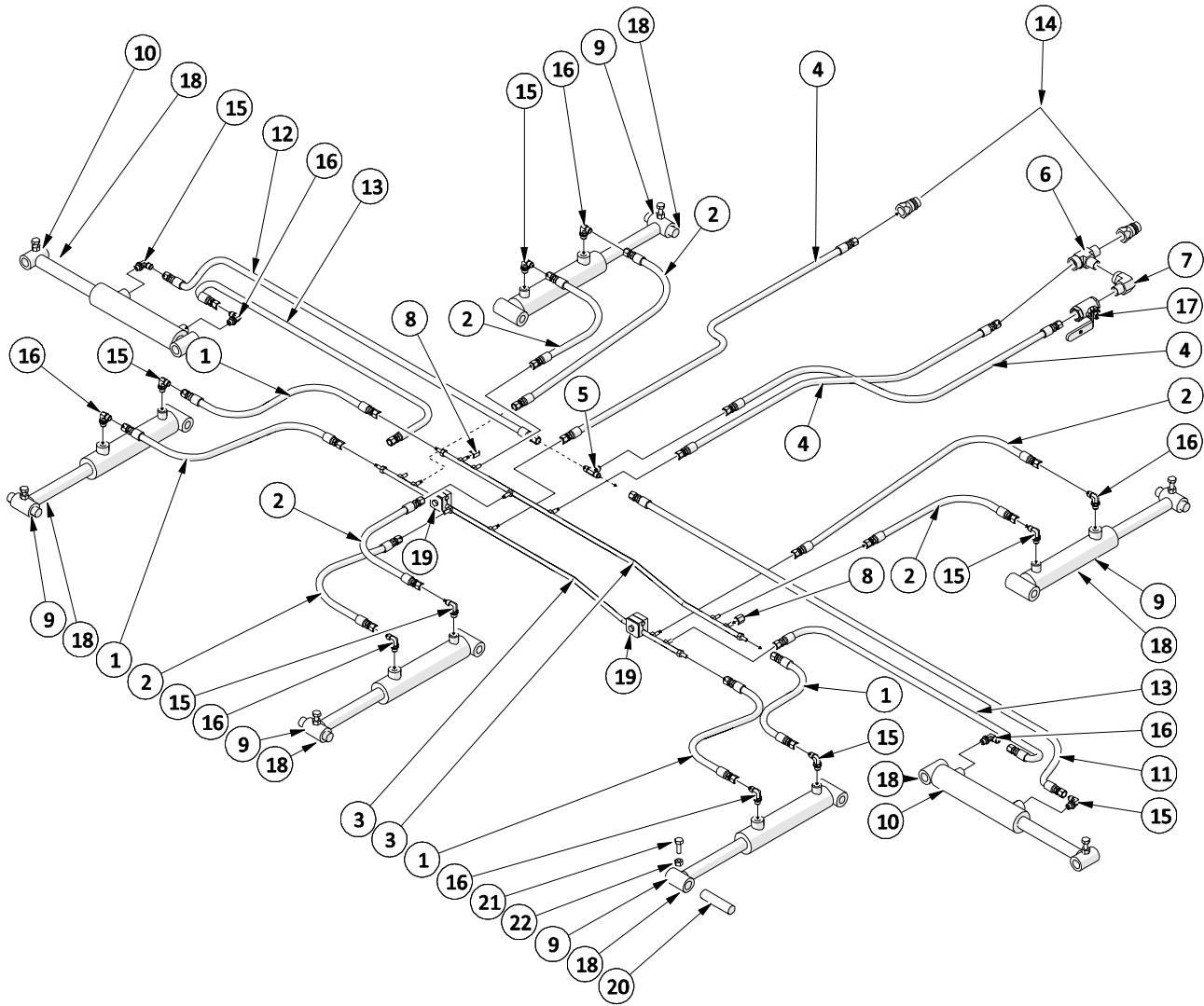
ITEM	PART #	DESCRIPTION	QTY
1	214008	DECK LATCH SPRING KIT (5 PCS)	1
2	600195	DECK LOCK	1
3	214017	SPRING - DECK ARM LOCK - RH	1
4	214016	SPRING - DECK ARM LOCK - LH	1
5	521818	1" BUSHING (1 PC KIT) SEE ITEM #3	1
6	SEE ITEM 7	DECK SWIVEL	1
7	606160	DECK SWIVEL KIT W/BUSHINGS	1
8	606500	SLEEVE BEARING KIT - (10 PC KIT)	1
9	SEE ITEM 33	STAND OFF - REAR	2
10	606509	DECK STAND OFF BUMPER	4
11	SEE ITEM 34	DECK STAND-OFF - FRONT	2
12	521346	WING DECK PIN - LONG	1
13	O.L.	FLAT WASHER- 5/16 PL	1
14	O.L.	HEX BOLT- 1/2 X 2 NC GR5 PL	8
15	O.L.	HEX BOLT - 3/8 X 2 NC GR5 PL	1
16	O.L.	HEX BOLT- 1/2 X 3 NC GR5 PL	1
17	O.L.	HEX BOLT- 5/16 X 2.25 NC GR5 PL	1
18	O.L.	HEX BOLT- 5/8 X 3.25 NC GR5 UPL	2

ITEM	PART #	DESCRIPTION	QTY
19	O.L.	LOCKWASHER - 1/2" PL	8
20	O.L.	LOCKWASHER - 3/8" PL	1
21	O.L.	HEX NUT - 1/2NC GR5 PL	8
22	O.L.	HEX NUT - 3/8"	1
23	O.L.	HEX NUT - 1/2	2
24	O.L.	HEX NUT - 3/8"	1
25	O.L.	HEX NUT - 5/16	1
26	O.L.	FLAT WASHER- 1/2 PL	3
27	O.L.	HEX LOCK NUT - 1/2NC GR5 PL	4
*28	606047	LIFT ARM - FRONT	1
*29	606048	LIFT ARM - REAR	1
30	600155	DECK SAFETY LATCH	1
31	219000	SHOCK ABSORBER	1
32	600299	SHOCK MOUNT BUSHING	1
33	606532	DECK STANDOFF KIT - REAR (1 PAIR)	1
34	606530	DECK STANDOFF KIT - FRONT (1 PAIR)	1

O.L. - OBTAIN LOCALLY

\*AVAILABLE IN BOTH RED & GREEN FINISHES.  
 PART NUMBER SHOWN IS FOR RED FINISH.  
 TO ORDER A GREEN FINISHED PART, ADD "G"  
 TO THE END OF THE PART NUMBER.  
 EXAMPLE: RED-123456, GREEN-123456G

### 3. HYDRAULICS



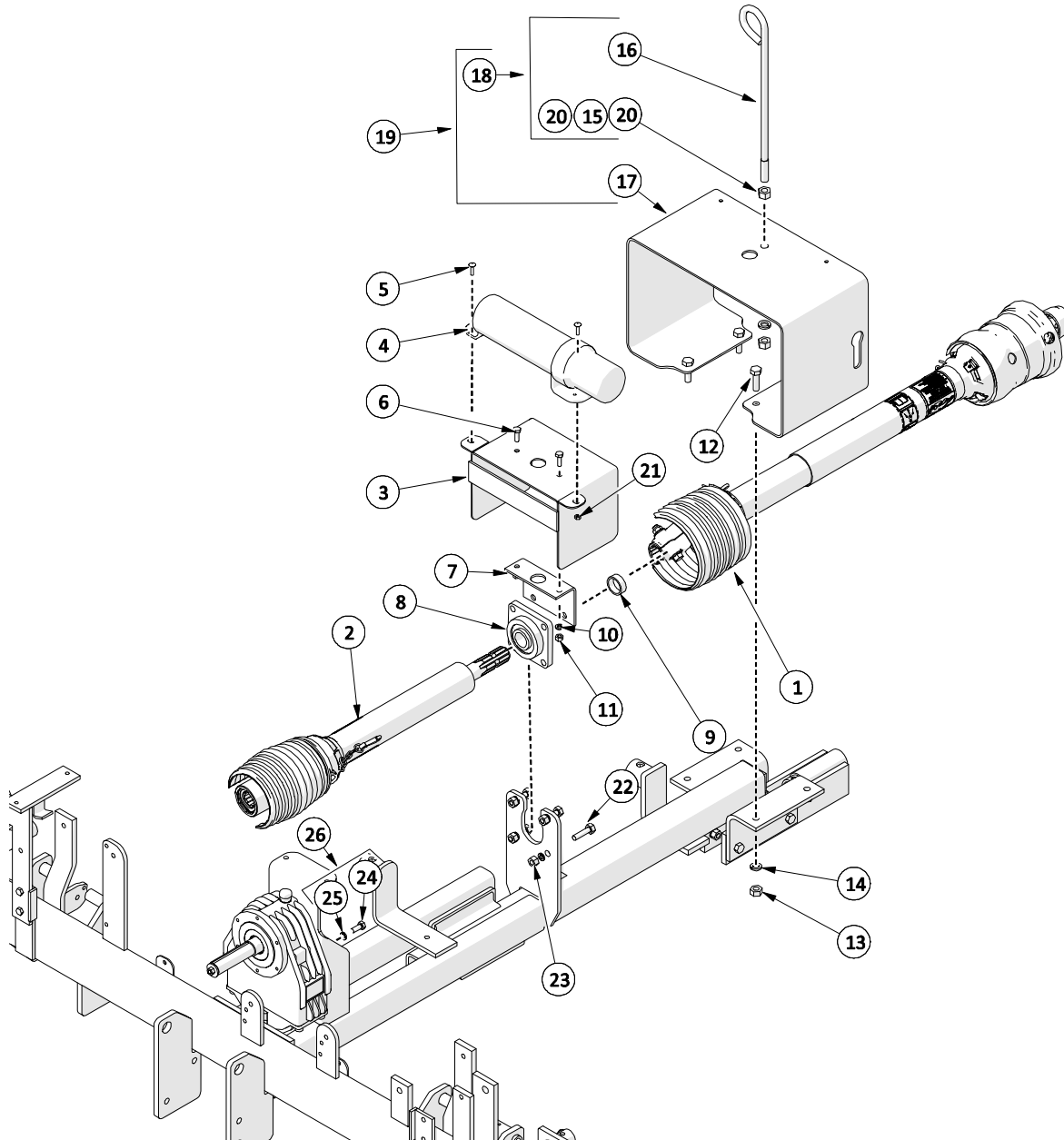
ITEM	PART #	DESCRIPTION	QTY
1	221005	HYDRAULIC HOSE - 42-3/4"	4
2	221002	HYDRAULIC HOSE - 19"	6
3	229000	HYDRAULIC TUBE MANIFOLD	2
4	221006	HYDRAULIC HOSE - 115"	3
5	221037	TEE - JICM	1
6	221075	PIPE TEE	1
7	221076	STREET ELBOW	1
8	221077	MANIFOLD CAP	2
9	220001	HYD. CYLINDER - DECK	5
10	220002	HYD. CYLINDER - WING	2
11	221080	HYDRAULIC HOSE RH - 54"	1
12	221081	HYDRAULIC HOSE LH - 43"	1

ITEM	PART #	DESCRIPTION	QTY
13	221004	HYDRAULIC HOSE - 39"	2
14	222006	HOSE END KIT (2 PCS)	1
15	222002	ELBOW 90 DEG	7
16	222003	ELBOW 90 DEG - RESTRICTOR	7
17	222005	BALL VALVE	1
18	220003	SEAL KIT - HYD. CYLINDER (ALL)	1
19	229003	TUBE CLAMP COMPLETE - 3/8"	2
20	600223	CYLINDER PIN	7
21	O.L.	HEX BOLT- 3/8 X 1 NC GR5 PL	7
22	O.L.	HEX NUT - 3/8NC GR5 PL	7

O.L. - OBTAIN LOCALLY

## 4. DRIVELINE

### 4.1. INPUT DRIVELINE

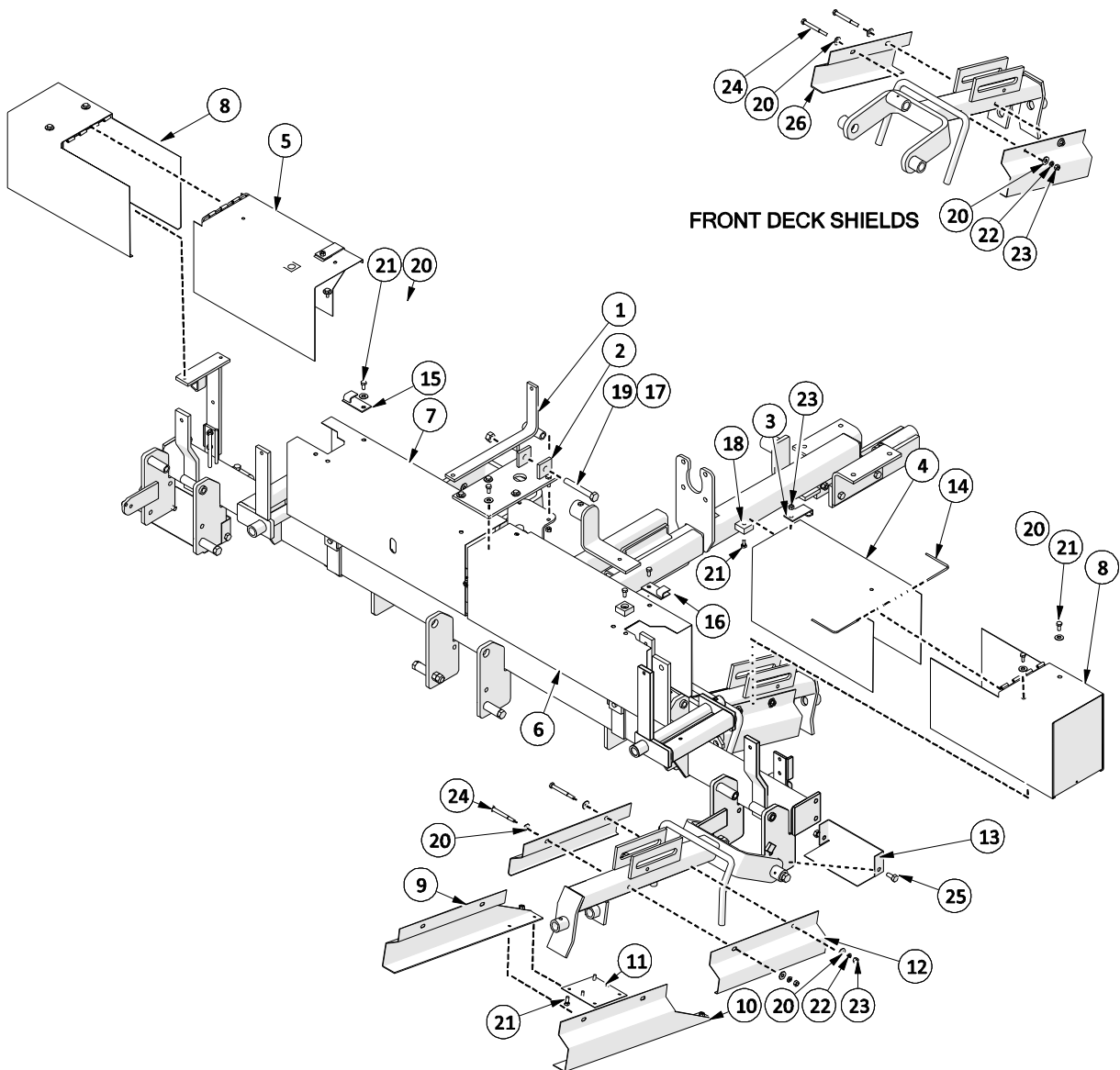


ITEM	PART #	DESCRIPTION	QTY
1	210280	INPUT PTO	1
2	210210	INTERMEDIATE PTO	1
3	600430	PF.C.V. INTERMEDIATE SHIELD	1
4	120519	MANUAL HOLDER TUBE	1
5	O.L.	CARRIAGE BOLT - 1/2 X 1 NC GR5 PL	2
6	O.L.	HEX BOLT - 3/8 X 1 NC GR5 PL	2
7	528439	INTERMEDIATE SHIELD BRACKET	1
8	521323	4 BOLT FLANGE BEARING	1
9	526013	INPUT PTO SPACER	1
10	O.L.	LOCKWASHER - 3/8"	2
11	O.L.	HEX NUT - 3/8"	2
12	O.L.	HEX BOLT - 1/2" X 1.75 NC GR5 PL	4
13	O.L.	HEX NUT - 1/2"	4
14	O.L.	LOCKWASHER - 1/2"	8

ITEM	PART #	DESCRIPTION	QTY
15	O.L.	LOCKWASHER - 5/8"	1
16	-	HOSE SUPPORT ROD	1
17	SEE ITEM 19	HOSE SUPPORT	1
18	522413	HOSE GUIDE - C/W HARDWARE	1
19	522508	COMPLETE HOSE SUPPORT & SHIELD	1
20	O.L.	HEX NUT - 5/8"	2
21	O.L.	LOCK NUT - 1/4"	2
22	O.L.	HEX BOLT - 1/2 X 1.75 NC GR5 PL	4
23	O.L.	HEX NUT - 1/2NC GR5 PL	4
24	SEE ITEM 26	HEX BOLT - M10 X 25 GR 8.8 PL	4
25	SEE ITEM 26	LOCK WASHER - #10 PL	4
26	211017	BOLT AND LOCKWASHER KIT - M10 X 25 (8 PCS)	1

O.L. - OBTAIN LOCALLY

## 4.2. DRIVELINE GUARDING

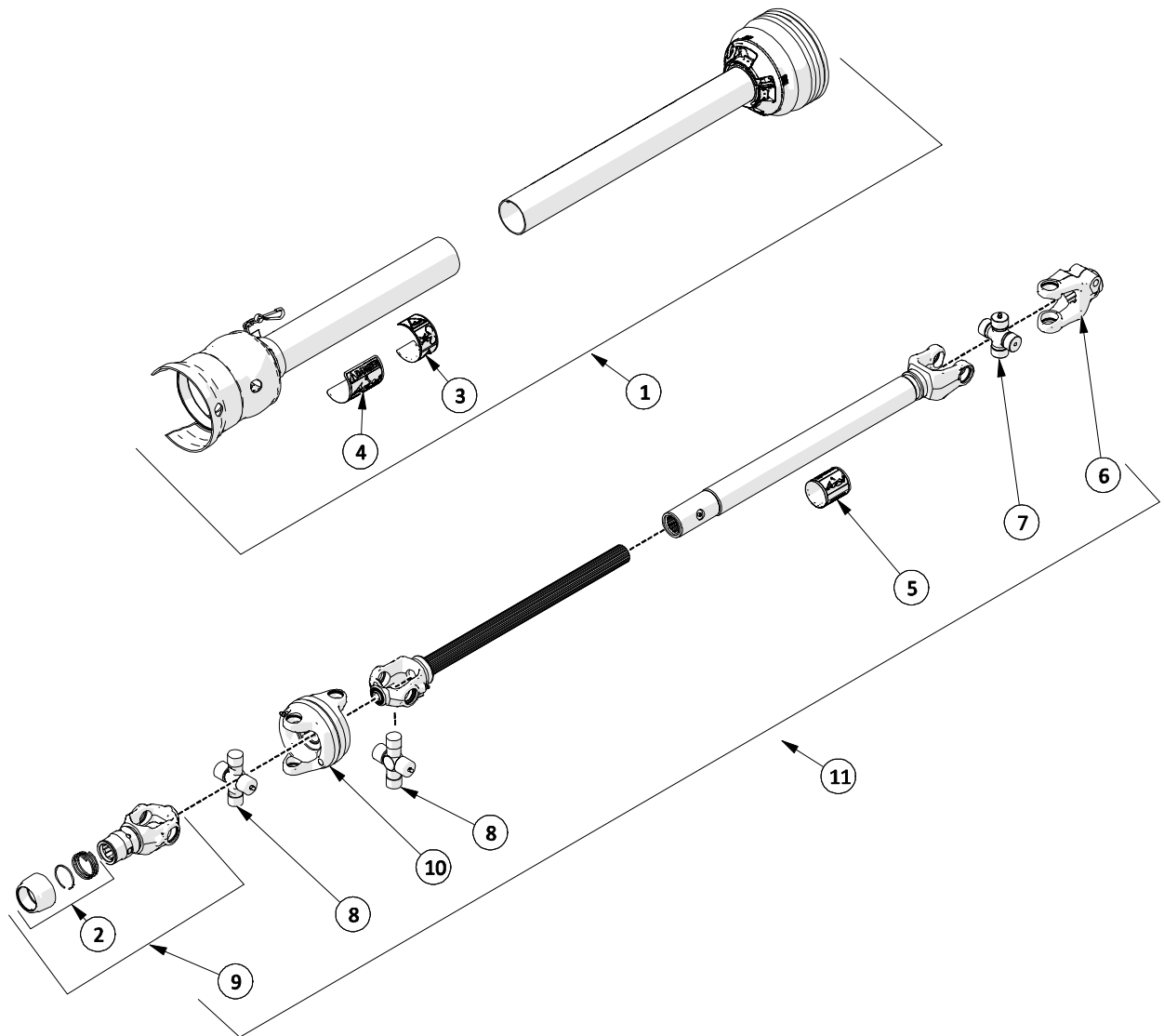


ITEM	PART #	DESCRIPTION	QTY
1	600200	PULL ROPE BRACKET	1
2	600201	SHIELD MOUNTING BRACKET	1
3	600368	SHIELD LOCK TOP	2
4	600133	INTERMEDIATE SHIELD - RH	1
5	600132	INTERMEDIATE SHIELD - LEFT	1
6	600215	CENTER SHIELD - RH	1
7	600214	CENTER SHIELD - LH	1
8	600230	WING SHIELD	2
9	600471	DECK SHIELD 25" LEFT (D MODEL)	1
10	600475	DECK SHIELD 25" RIGHT (D MODEL)	1
11	600479	DECK SHIELD PLATE (D MODEL)	1
12	600463	DECK SHIELD REAR	2
13	600483	WING SHIELD (D MODEL)	2
14	600502	SHIELD HINGE PIN KIT (2 PCS)	1

ITEM	PART #	DESCRIPTION	QTY
15	600370	SHIELD LOCK BOTTOM - LH	1
16	600372	SHIELD LOCK BOTTOM - RH	1
17	O.L.	HEX NUT - 5/8"	1
18	600512	BUMPER KIT (4 PCS)	1
19	O.L.	HEX BOLT- 5/8 X 4.5 NC GR5 PL	1
20	O.L.	FLAT WASHER- 3/8 PL	32
21	O.L.	HEX BOLT - 3/8 x .75 NC GR5 PL	20
22	O.L.	LOCKWASHER - 3/8 PL	16
23	O.L.	HEX NUT - 3/8"	12
24	O.L.	HEX BOLT- 3/8 X 3.75 NC GR5 PL	10
25	O.L.	HEX BOLT- 1/2 X 1 NC GR5 PL	4
26	600467	DECK SHIELD - FRONT	2

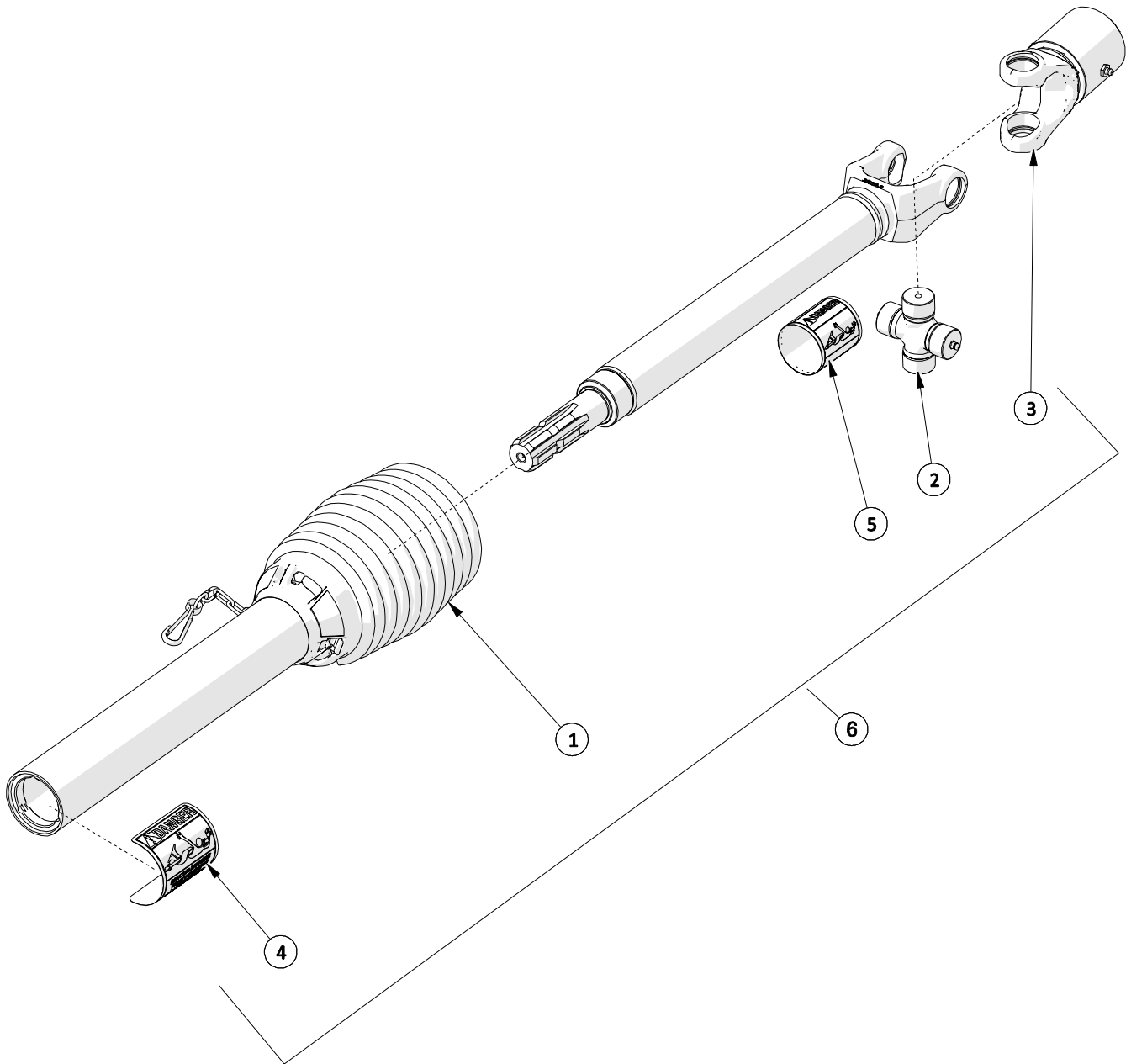
O.L. - OBTAIN LOCALLY

### 4.3. INPUT PTO SHAFT



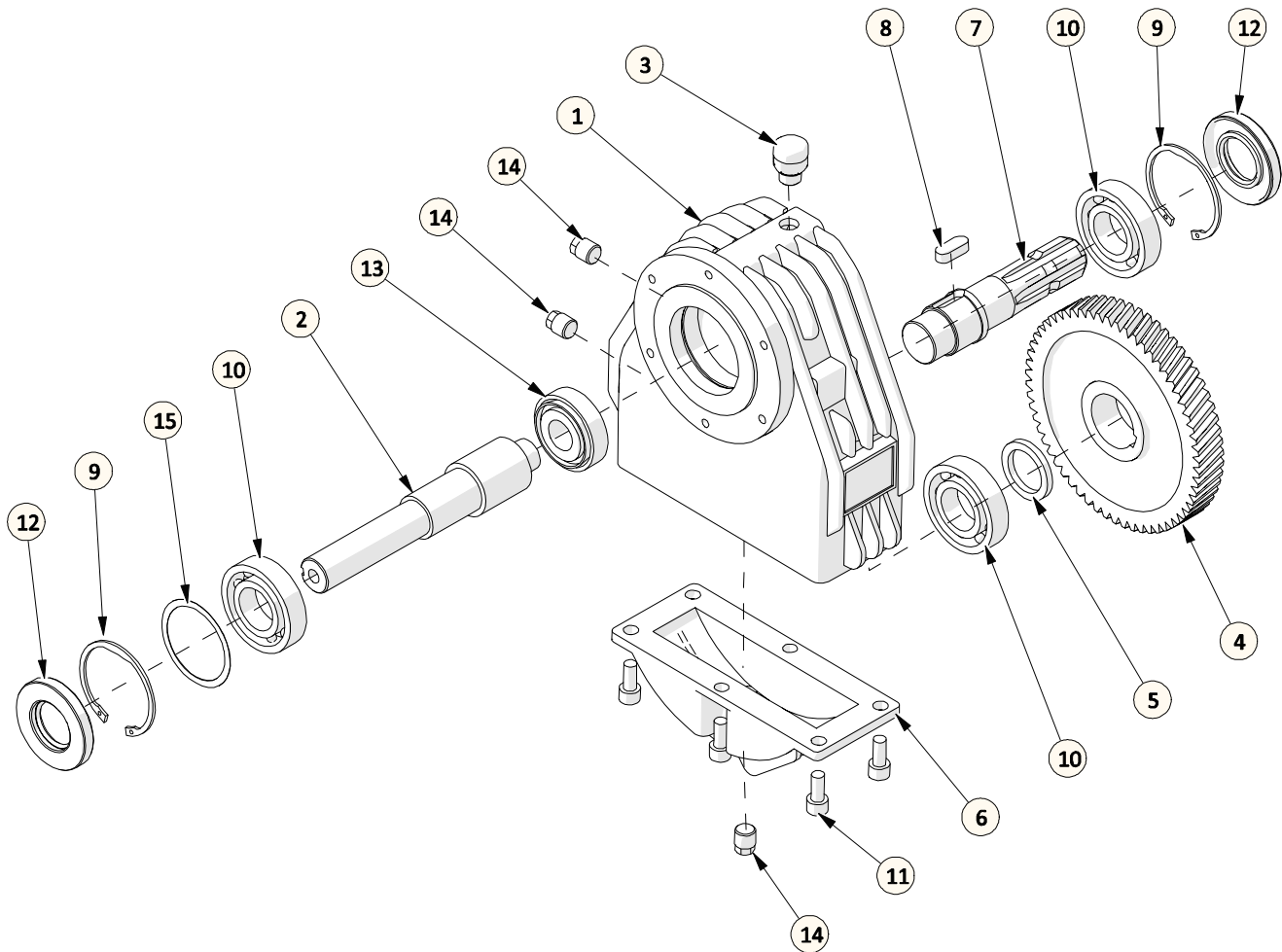
ITEM	PART #	DESCRIPTION	QTY
1	210286	COMPLETE GUARD SET	1
2	210179	SLIDE LOCK REPAIR KIT (44E)	1
3	210238	CE WARNING DECAL	1
4	210237	SAFETY SIGN - OUTER GUARD	1
5	210239	SAFETY SIGN - INNER GUARD	1
6	210235	35 SERIES CLAMP YOKE	1
7	210234	35E2BL CROSS KIT	1
8	210284	CAT 4 80 EBL CROSS & BRG KIT	2
9	210283	AUTO LOK YOKE ASSEMBLY	1
10	210281	CENTER HOUSING	1
11	210280	COMPLETE INPUT PTO SHAFT W/GUARDS	1

**4.4. INTERMEDIATE PTO SHAFT**



ITEM	PART #	Description	QTY
1	210211	PTO GUARD	1
2	210234	35E2BL CROSS & BEARING KIT	1
3	210212	OVERRUNNING CLUTCH ASSEMBLY	1
4	210237	SAFETY SIGN - OUTER GUARD	1
5	210239	SAFETY SIGN - INNER GUARD	1
6	210210	COMPLETE PTO SHAFT ASSEMBLY	1

### 4.5. GEARBOX



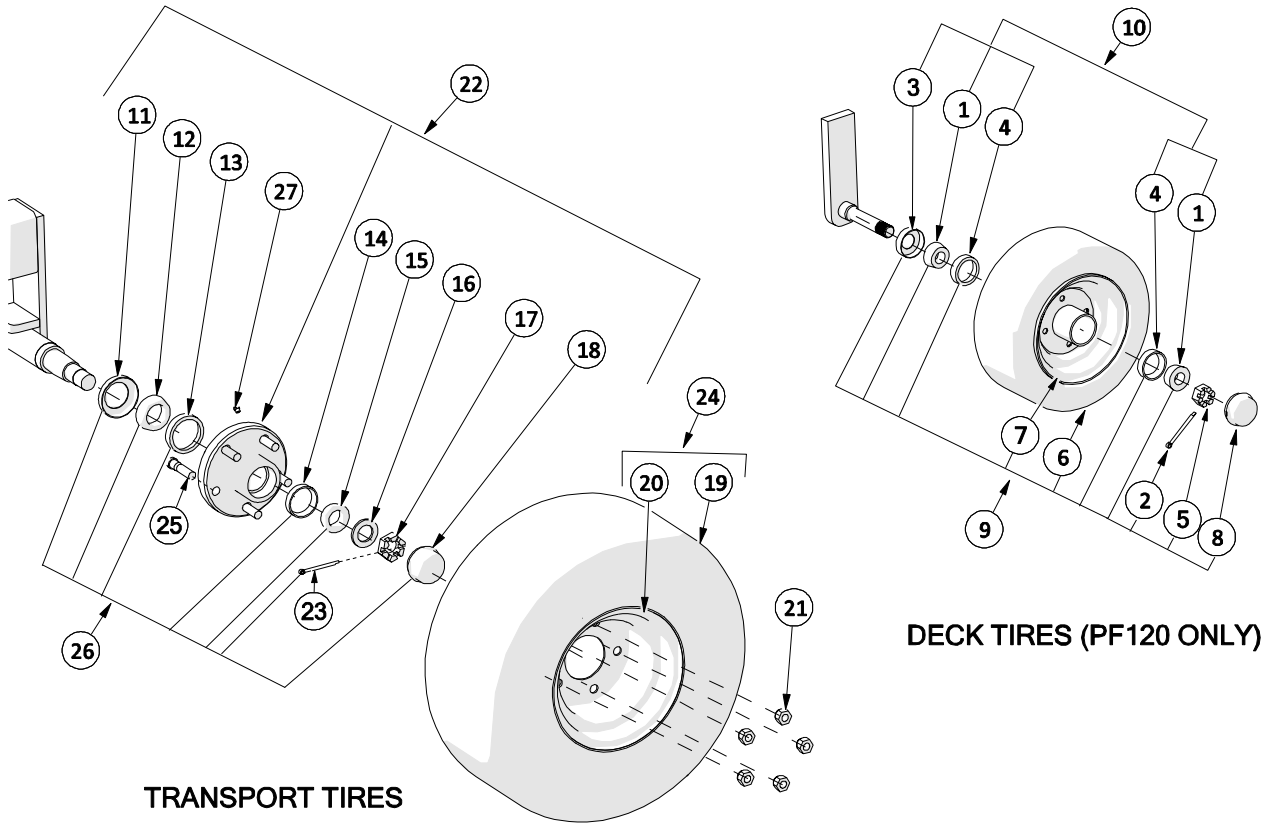
ITEM	PART #	DESCRIPTION	QTY
1	211001	CASING	1
2	211002	OUTPUT PINION SHAFT	1
3	211004	BREATHER PLUG	1
4	211007	CROWN GEAR	1
5	211010	SPACER	1
6	211011	COVER	1
7	211013	INPUT SHAFT	1
8	211014	INPUT SHAFT KEY	1
9	521126	SNAP RING (3 PC KIT)	1

ITEM	PART #	DESCRIPTION	QTY
10	521116	BEARING	3
11	211020	BOLT KIT (6 PCS)	1
12	521127	OIL SEAL	2
13	211005	BEARING - TAPERED ROLLER	1
14	521482	HEX PIPE PLUG	3
15	521491	SHIM KIT (3 PCS)	1
16	211000	GEARBOX - COMPLETE	1



## 5. WHEEL ASSEMBLIES

### 5.1. WHEEL ASSEMBLIES



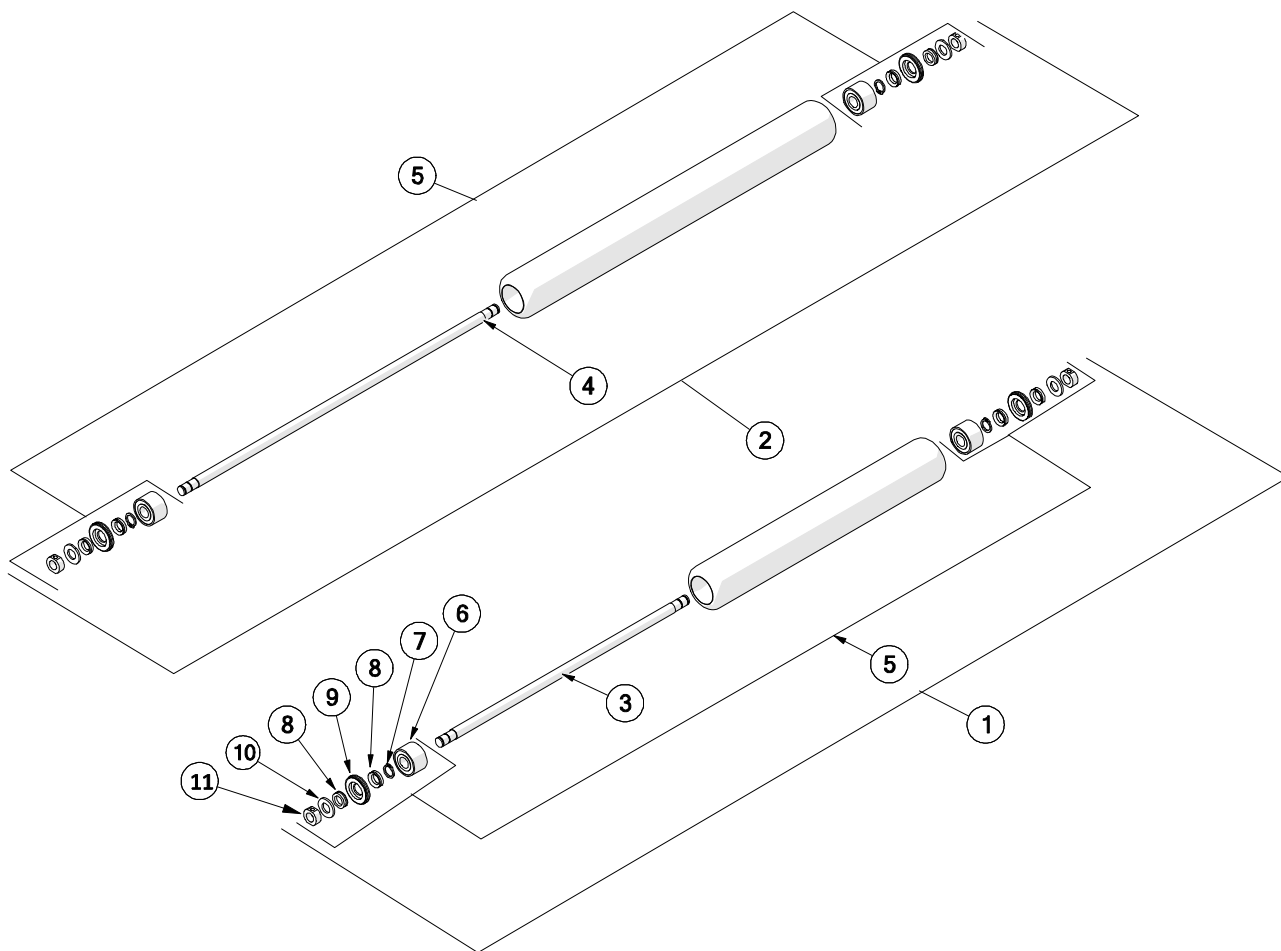
ITEM	PART #	DESCRIPTION	QTY
1	-	BEARING CONE	2
2	O.L.	5/32" X 1-1/2" COTTER PIN	1
3	213001	OIL SEAL	1
4	-	BEARING CUP	2
5	600500	SLOTTED NUT - 4 PC KIT	1
6	230014	TIRE - 4 X 6	1
7	230015	GAUGE WHEEL SPLIT RIM	1
8	230019	DUST CAP - 4PC KIT	1
9	230017	DECK TIRE ASSEMBLY	1
10	230018	TAPERED WHEEL BEARING KIT	1
11	521741	BEARING GREASE SEAL	1
12	-	BEARING CONE - INNER	1
13	-	BEARING CUP - INNER	1
14	-	BEARING CUP - OUTER	1

ITEM	PART #	DESCRIPTION	QTY
15	-	BEARING CONE - OUTER	1
16	521746	WASHER (2 PC KIT)	1
17	521747	CASTLE NUT (2 PC KIT)	1
18	521748	DUST CAP	1
19	230011	TIRE - 18.5/8.50	1
20	521398	RIM 8X7	1
21	521327	WHEEL NUT KIT (5 PCS)	1
22	521328	HUB ASSEMBLY - COMPLETE	1
23	O.L.	3/16 X 1-1/2" COTTER PIN	1
24	230010	TIRE & WHEEL ASSEMBLY	1
25	521755	WHEEL STUD KIT (5 PCS)	1
26	230028	WHEEL BEARING KIT	1
27	O.L.	GREASE FITTING 1/4 - 28	1

O.L. - OBTAIN LOCALLY

## 5.2. ROLLER ASSEMBLIES

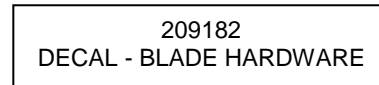
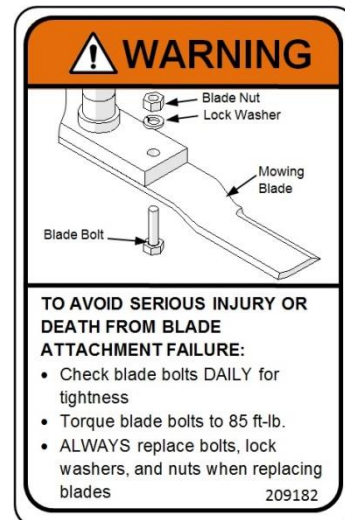
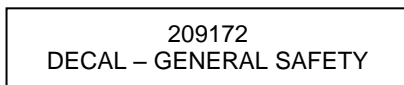
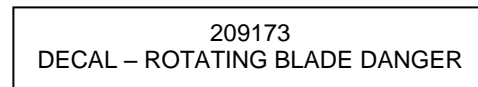
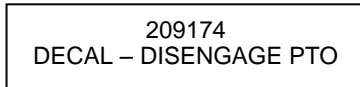
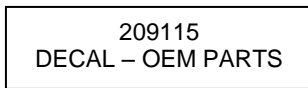
PF120R Only



ITEM	PART #	DESCRIPTION	QTY
1	606245	DECK ROLLER ASSEMBLY - FRONT	1
2	606131	DECK ROLLER ASSEMBLY - REAR	1
3	606427	ROLLER SHAFT - 21.75"	1
4	606425	ROLLER SHAFT - 28.50"	1
5	606424	ROLLER HARDWARE KIT (14 PCS)	2
6	-	BEARING - ROLLER SHAFT	2
7	-	SNAP RING	2
8	-	V-RING SEAL	4
9	-	COLLAR SEAL W/O-RING	2
10	-	FLAT WASHER- 5/8 NARROW PL	2
11	-	SET SCREW COLLAR	2

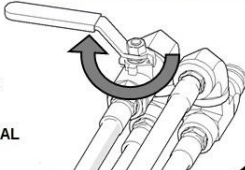
## 6. SAFETY

### 6.1. DECALS



**CAUTION**

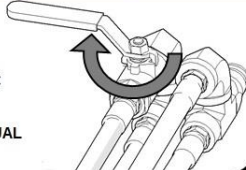
- 1/4 TURN VALVE MUST BE CLOSED WHEN MOWING TO PROLONG BELT LIFE
- DO NOT ENGAGE HYDRAULIC FLOAT ON TRACTOR
- CONSULT OPERATORS MANUAL FOR MORE INFORMATION



209185

**CAUTION**

- 1/4 TURN VALVE MUST BE CLOSED WHEN MOWING TO PROLONG BELT LIFE
- DO NOT ENGAGE HYDRAULIC FLOAT ON TRACTOR
- CONSULT OPERATORS MANUAL FOR MORE INFORMATION



209185  
DECAL – VALVE OPERATION

**DANGER**



**ROTATING DRIVELINE  
CONTACT CAN CAUSE DEATH  
KEEP AWAY!**

**DO NOT OPERATE WITHOUT—**

- ALL DRIVELINE GUARDS, TRACTOR AND EQUIPMENT SHIELDS IN PLACE
- DRIVELINES SECURELY ATTACHED AT BOTH ENDS
- DRIVELINE GUARDS THAT TURN FREELY ON DRIVELINE

210237  
SAFETY SIGN – OUTER GUARD

**DANGER**



**GUARD MISSING  
DO NOT OPERATE**

**DANGER**




**GUARD MISSING  
DO NOT OPERATE**

**DANGER**

210239  
SAFETY SIGN – INNER GUARD

**CAUTION**

WHEN MAKING SHARP TURNS, THE PTO SHAFT WILL SHORTEN. LIMIT THE TURNING RADIUS TO ENSURE THAT THE PTO DOES NOT FULLY COLLAPSE. FAILURE TO DO THIS WILL RESULT IN DAMAGE TO THE SHAFT AND BEARING.



TRACTOR END

9 1/2" MINIMUM

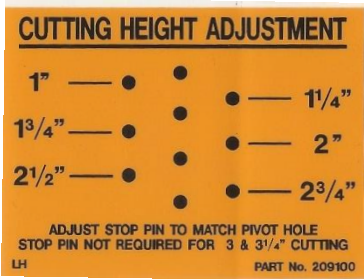
REFER TO MANUAL FOR ADDITIONAL INFO.

209171

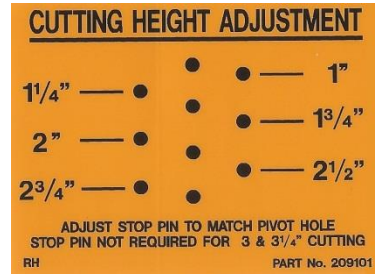
209171  
DECAL – PTO COLLAPSE



210238  
CE WARNING DECAL



209100  
CUTTING HEIGHT DECAL - LH



209101  
CUTTING HEIGHT DECAL - RH



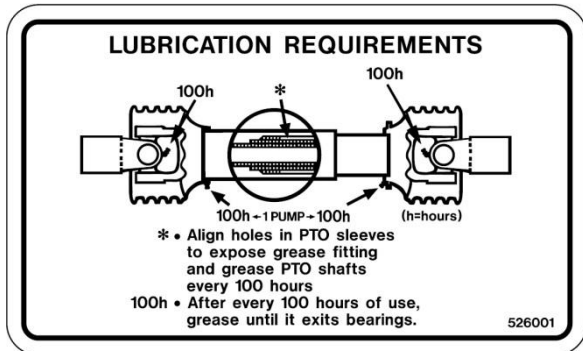
209102  
DECAL - "PRO-FLEX"



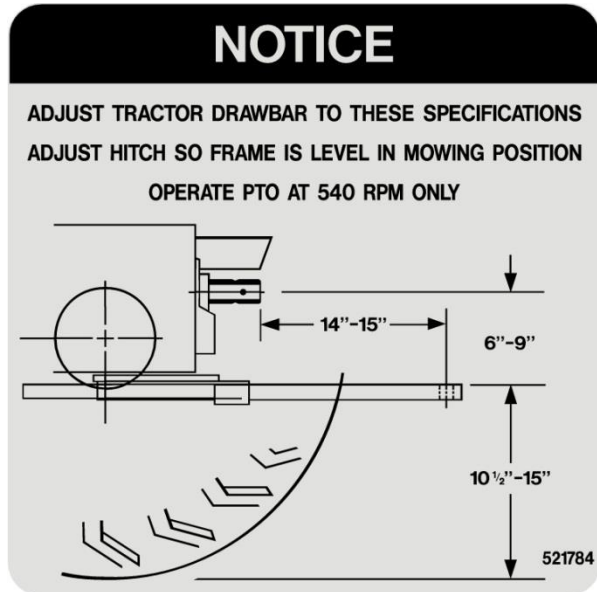
209103  
DECAL - "PROGRESSIVE"



521014  
DECAL - GREASE



526001  
DECAL - 100H PTO LUBRICATION



521784  
DECAL - NOTICE

**6.2. NOTES**

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---