



# Double Sickle Bar Topper-Hedger Owners Manual

(Standard Topper-Hedger)

Manual Part Number: GH 11990

Model Number: GVF 1000

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#### **INTRODUCTION**

The information in this publication describes the safety requirements, operation, maintenance and servicing of the Gillison Standard Topper-Hedger. Every effort has been made to provide correct and concise information to you, the operator, as available at the date of publication. Your Gillison dealer is available should items in this book or details of your machine not be understood.

This book is supplied with each machine to familiarize the operator with proper instructions needed for operation and maintenance. Studying and adhering to these instructions will insure optimum machine performance and longevity. A machine that is maintained properly and operated in the intended manner will provide greater dividends than one that is neglected and/or operated in a manner other than as intended. Design and servicing of this machine has been kept as simple as possible to permit maintenance operations to be carried out with tools normally available.

This book should be thoroughly read and understood prior to operation of this machine. Inexperienced operators should study contents of this publication and receive instruction from an experienced operator when possible. Your Gillison dealer can assist in areas concerning machine operation and provide details concerning safe operation. It is suggested that this booklet be kept readily accessible, preferably with the machine, for future reference if questions or concerns arise. If the original book should become lost or damaged, consult your Gillison dealer in regards to acquiring a replacement.

Customers are strongly advised to use an authorized Gillison dealer in connection with any service problems and adjustments that may occur.



CAUTION: READ THIS BOOK IN ITS ENTIRETY PRIOR TO OPERATING THE MACHINE. Use only parts from your Gillison dealer for repairs and/or replacement.



#### **SAFETY**

#### **INTRO TO SAFETY**

The safety of the operator is one of the main concerns in designing a new piece of equipment. Designers build in as many safety features as possible. However, every year many accidents occur which could have been avoided by a few seconds of thought and a more careful approach to handling equipment. You, the operator, can avoid many accidents by observing the following precautions. To avoid personal injury, study the following precautions and insist those working with you, or for your own self, to follow these precautions.

In order to provide a better view, certain photographs or illustrations in this manual may show an assembly with a safety shield removed. However, the equipment should never be operated in this condition. Keep all shields in place. If shield removal becomes necessary for repairs, replace shield prior to further operation.

#### SAFETY ALERT SYMBOL

FIG. 1: This is the safety alert symbol. It means ATTENTION! BECOME ALERT! YOUR SAFETY IS INVOLVED! Look for it, both in this manual and on safety decals on the equipment. It will direct your attention to information that involves your safety and the safety of others.

#### **SIGNAL WORDS**

FIG. 2: The words DANGER, WARNING, or CAUTION are used with the safety alert symbol. Learn to recognize these safety alerts, and follow the recommended precautions and safe practices.



DANGER indicates an imminently hazardous situation that, if not avoided, will result in death or serious injury.



WARNING indicates an imminently hazardous situation that, if not avoided, could result in death or serious injury.



CAUTION indicates an imminently hazardous situation that, if not avoided, may result in minor or moderate injury.

Replace any DANGER, WARNING, CAUTION or instructional decal that is not readable or is missing. The locations and part numbers of these decals are identified later in this section of the manual.



FIG. 1



FIG. 2

#### **GENERAL SAFETY RULES**

#### FIG. 3: Always keep this manual with the machine.

This manual must be made available to the operator of the machine at all times. Special care must be taken to keep this manual safe from the weather and in readable condition.

Read this manual carefully and learn how to use the machine correctly.

Do not let anyone operate this machine without thorough instruction.

Beware of bystanders, particularly children! Always look around to make sure that everyone is clear before starting the engine or moving the machine. This is particularly important with higher noise levels as you may not hear people shouting.

FIG. 4: No passengers allowed. Do not carry passengers anywhere on the machine.

**Dismount and park machine in the correct manner.** When dismounting and/or leaving the operator's platform FOR ANY REASON always:

- 1. Shift to Neutral.
- 2. Turn PTO OFF.
- 3. Come to a complete stop.
- 4. Park on level ground.
- 5. Activate parking brake.
- 6. Shut off engine and remove key.



WARNING: An operator should not use alcohol or drugs which can affect their alertness or coordination. An operator on prescription or 'over the counter' drugs needs medical advice on whether or not he/she can properly operate equipment.

FIG. 5: Wear protective clothing. Do not wear loose clothing, as this may catch on moving parts of the machine causing injury.

Always wear protective clothing and appropriate safety equipment.

It is recommended that suitable protective hearing and safety glasses be worn.

Do not attempt to service machine, clear obstructions or unplug blockages with the engine running. Always shut off PTO and engine first. Keep all shields and guards in place.



FIG. 3



FIG. 4

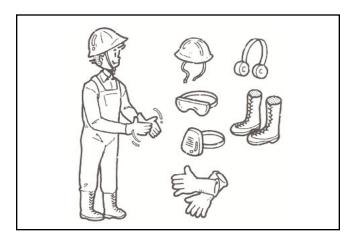


FIG. 5

FIG. 6: Additional equipment: A fire extinguisher and first aid kit should be carried with the machine or be kept readily available at all times.

Have emergency telephone numbers for immediate access.

#### GENERAL SAFETY WHILE OPERATING



CAUTION: READ THIS BOOK IN ITS ENTIRETY PRIOR TO OPERATING MACHINE.

Keep the machine properly maintained. Do not operate a machine when it is broken or has missing parts. Make sure that the maintenance procedures in this operator's book are completed before using the machine.

Check all controls regularly and adjust where necessary.

Periodically check all nuts, bolts and lifting pins for tightness.

Clear the area. Ensure that all bystanders, particularly children, are at a safe distance before starting the engine.



DANGER FIG. 7: Be aware of electrocution hazards. To prevent injury or death from electrocution:

Stay away from overhead power lines with hedger bar in the vertical position. This machine is not grounded. Electrocution can occur without direct contact.

**Be observant of the operating area and terrain.** Watch for holes, rocks or other hidden hazards. ALWAYS inspect area prior to operation.

DO NOT operate near edge of banks. Setback distance from bank should equal or exceed the overall height of the bank.

DO NOT operate on steep slopes as overturning may result.

If necessary to cross a steep slope, avoid turning uphill. Slow down and make a wide turn. Travel directly up or down the slope, never cross it. Keep the heavy end of the machine on the uphill side.

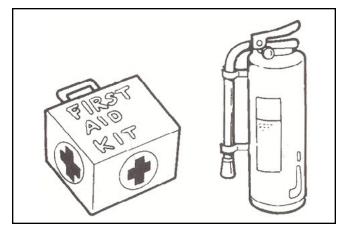
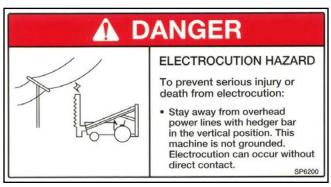


FIG. 6



**FIG. 7** 

#### SAFETY WHILE SERVICING THE MACHINE

Stop the machine. DO NOT service the machine while the engine is running or hot, or if the machine is in motion.



**DANGER FIG. 8:** To prevent serious injury or death from moving parts;

**KEEPAWAY**, moving parts can dismember.

Disconnect and lockout power source before adjusting and servicing.

Do not operate without guards and shields in place.

NOTE: When making major repairs or complicated adjustments, it is recommended that you consult your Gillison Dealer and have the work carried out by trained personnel.

The following precautions should be observed. These have been arranged by machine area or component.

#### **Hydraulic System**



WARNING FIG. 9: High pressure fluid hazard. To prevent serious injury or death:

Relieve pressure on system before repairing, adjusting or disconnecting.

Wear proper hand and eye protection when searching for leaks. Use wood or cardboard instead of hands.

Keep all components in good repair.

Ensure that all hydraulic connections are tight.

Relieve all pressures before disconnecting hoses or lines. Escaping oil under pressure can cause serious injury.

All fluids should be handled with care. If you are injured by or swallow any fluid, seek medical attention immediately and show the label on the product.

Fluid escaping from a very small hole can be almost invisible and can penetrate the skin causing serious injury. Keep hands and body away from pin holes and nozzles which eject fluids under high pressure. When checking for leaks always use a piece of cardboard or wood. Never use your hands to find a pressure leak.

If ANY fluid is injected into the skin, it must be attended to by a doctor immediately.



FIG. 8



FIG. 9

#### **Replacement Parts**

**FIG. 10:** Where replacement parts are necessary for periodic maintenance and servicing, replacement parts from Gillison's must be used to restore your equipment to original specifications.

Gillison's will not claim responsibility for installation of unapproved parts and/or accessories and damages as a result of their usage.

#### INSTRUCTION DECALS

FIG. 11: Location of all instruction decals are provided as a reference. Corresponding numbers show where decals belong on the machine. Replace any decals that are damaged, missing or are not readable. Consult your dealer.

Each decal in the figure to the right has its part number labeled below the decal.

#### SERIAL NUMBER

Location of serial number is on the nameplate and is provided as a reference.

See FIG. 12

#### SAFETY WHILE OPERATING

Review ENTIRE operator's manual before operating this machine. See FIG. 3

Fasten seat belt securely before starting.

Keep both hands on controls at all times when operating.

Use low range for hillside operation.

Block elevated components before servicing equipment.

Do not allow riders.

Do not leave machine with engine running.

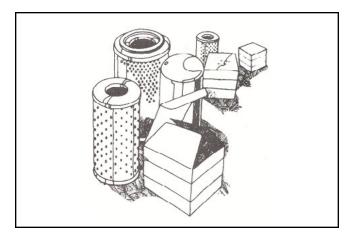
#### **Safety Rules To Adhere To**

As with all farm equipment there are dangers in operation and caution should be exercised at all times.

Do not operate this machine around spectators or with riders.

Inspect the hedger-topper each day.

Even though we have built in safety devices for



**FIG. 10** 



**FIG. 11** 



**FIG. 12** 

hydraulic functions, do not trust them, they could fail.

Perform scheduled maintenance to ensure optimum performance.

Wear proper clothing.

- a. No baggy clothing
- b. Use eye protection
- c. Use hard hat

Keep body, feet and hands inside the operators' platform when the topper-hedger is running.

When dismounting the tractor lower the overhead assembly, turn off the sickle bar and turn off the tractor engine.

Only work around sickle bar with tractor engine turned off. The knives are very sharp and can cause injury.

Keep all covers and guards in place.

Do not operate under the influence of any kind of drugs or alcohol that impair judgment or performance.

Always watch for overhead obstructions when operating or transporting topper-hedger.

Use extreme caution in uneven terrain to avoid personal injury.

#### **MODIFICATIONS**

Modification or alteration of the topper-hedger shall be made only with prior written consent from Gillison's Variety Fabrication Inc.

Altering safety devices shall be prohibited.

#### RECORD RETENTION

The owner shall retain the following records for at least 3 years:

- A. Purchase Information
- B. Records of persons trained upon delivery of the GVF Standard Topper-Hedger.
- C. Written records of frequent inspections, maintenance performed and parts replaced

#### OWNERSHIP RECORDS

When a change of ownership of a GVF Standard Topper-Hedger occurs, it is the responsibility of the seller to notify Gillison's Variety Fabrication Inc. with the following information within 60 days of the sale:

- A. Serial number of machine
- B. Name & address of new owner

# **MOUNTING**

#### INSTRUCTIONS FOR MOUNTING

#### Step One, refer to FIG. 13:

- 1. Unbolt and remove cutting head from skid.
- 2. Unbolt pump.
- 3. Unbolt hedger framework from skid.

# Step Two, refer to FIG. 14:

- 1. Slide forks under framework.
- 2. Chain loop to the top of the forklift mast for lifting.
- 3. **FIG. 15** illustrates the lifting.

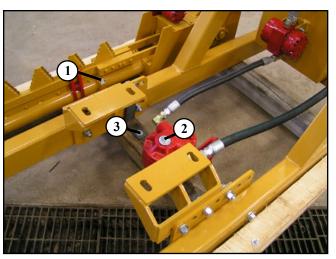


FIG. 13



FIG. 14



**FIG. 15** 

- 1. Raise boom with a crane or alternative lift.
- 2. Support with an angle iron on cylinder.

### Step Four, refer to FIG. 17:

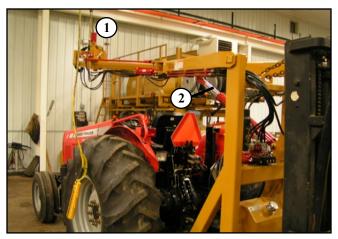
- 1. Slide framework under tractor.
- 2. Install mounting brackets but leave all mounts loose until everything is correctly in position.

NOTE: Check operator clearance with boom while sitting in seat.

#### Step Five, refer to FIG. 18 & 18A:

1. Bolt up the framework.

NOTE: Be aware of side-shift flex joint when boom is lowered. It could hit the hood of the tractor if side-shifted in.



**FIG. 16** 

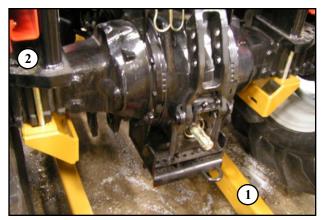


FIG. 17



FIG. 18



**FIG. 18 A** 

# Step Six, refer to FIG. 19:

1. Install pump and secure torque arm.

# Step Seven, refer to FIG. 20:

1. Mount control box.

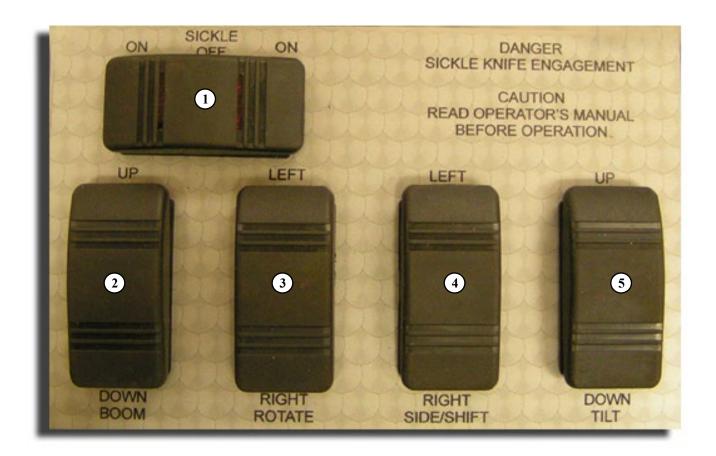


FIG. 19



FIG. 20

# <u>CONTROLS</u> CONTROL BOX DIAGRAM





**CAUTION!** Read operator's manual before operation.



**DANGER!** This control panel engages the sickle knives.

- 1. Sickle On/Off switch
- 2. Raise Boom, Lower Boom
- 3. Rotate head Left, Rotate head Right
- 4. Side/Shift head Left, Side/Shift head Right
- 5. Tilt head Up, Tilt head Down

#### **OPERATION**

#### (SEE CONTROLS SECTION FIRST)

#### PRE START UP

With machine shut off do a walk around inspection and check the following:

Check hydraulic oil level.

Check boom and lifting components for fatigue cracks.

Check that all cylinder pins and cotter pins are in place.

Inspect cutting head.

Inspect knives for wear.

Open access covers.

Check v-roller adjustment. NOTE: You should be able to turn v-rollers with your hand, check all and adjust as necessary.

# OPERATING THE GVF STANDARD TOPPER HEDGER

Learn about all controls, have knowledge of the machine and its workings, and read this manual before operating the hedger machine.

- 1. Make sure no obstructions are in the way.
- 2. Turn PTO on and make sure it is in 540 mode.
- 3. See page 8 first to become familiar with the Control Box Diagram.
- 4. Sickle cutting will run in both directions in the event the head stalls on a piece of material. Reverse the cutting direction immediately, sickle should cut material.
- 5. Cutting head should only be run between 200 250 RPMs on the cam shaft. To achieve this speed do the following:
  - 1. Use tachometer on end of shaft and adjust engine speed until desired cam shaft speed is acquired, then note engine speed.
  - 2. Adjust transmission gears to achieve desired speed.
  - 3. Maintain noted engine speed.

Operating cutting head too fast can damage drive components and decrease cutting performance. Material being cut must be allowed to get deep enough between the knives. If only the knife tips are doing the cutting, due to excessive operating speed, cutting performance will decrease.

# **LUBRICATION & MAINTENANCE**

# MAINTENANCE CHART

	DAILY	EVERY 2 HOURS	EVERY 4 HOURS	EVERY 40 HOURS	EVERY 100 HOURS	EVERY 200 HOURS	EVERY 400 HOURS	INSTRUCTIONAL PAGE #
Hydraulic Oil	<b>√</b>						change	Pg. 14
Hydraulic Oil Filter						Change or annually change		Pg. 14
Suction Strainer							Clean or replace	Pg. 14
			(	CUTTING HE	EAD			
V-Roller Adjustment	✓							Pg. 15
Grease Cam Followers			<b>✓</b>					Pg. 16
Grease Cam Wheel Groove			✓					Pg. 16
Grease Flange Bearings					<b>✓</b>			Pg. 16
Oil Sickle Bar		<b>✓</b>						Pg. 16
				FRAME				
<b>Grease Points</b>				✓				Pg. 17
				ROTATE GEAR BOX	x			
Oil Level						<b>✓</b>	change	Pg. 17

#### INSTRUCTIONS FOR PRESSURE WASHING

When pressure washing, protect and **DO NOT** direct the jet on the following components:

Instrument panel, Electrical harness and connections, and Safety decals.

#### **HYDRAULIC SYSTEM**

- Check hydraulic oil level daily FIG 21.
- Change hydraulic oil filter every 200 hours FIG. 22 A.
- Clean suction strainer every 400 hours FIG. 22 B.

#### **ELECTRICAL**

1- Incline 15 amp fuse to protect hedger wiring.

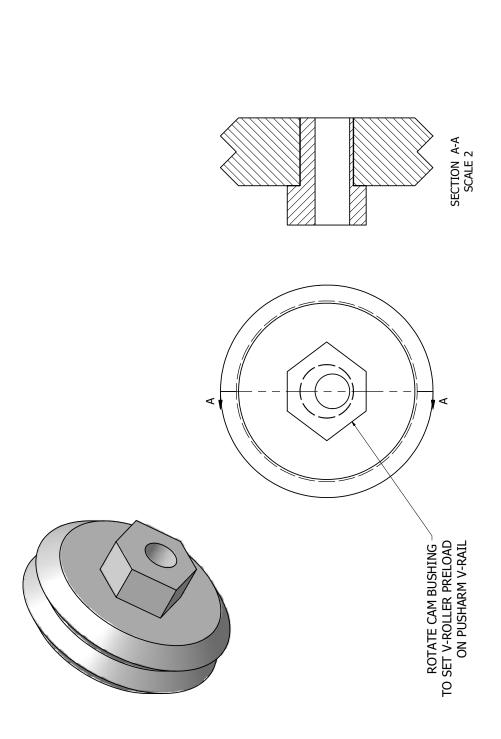


FIG. 21



**FIG. 22** 

#### V-ROLLER ADJUSTMENT



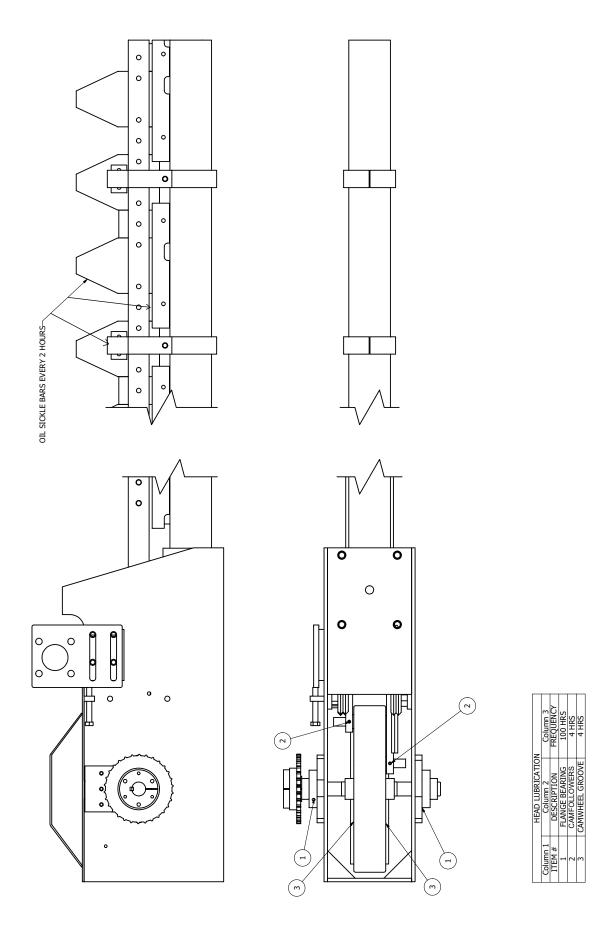
	DESCRIPTION	BUSHING, CAM	WHEEL, W4 DUALVEE	SHIELDED	
Parts List	PART NUMBER	GH11358	GH11357		
	ĄΤΥ	1	1		
	ITEM	1	2		

V-ROLLER ADJUSTMENT

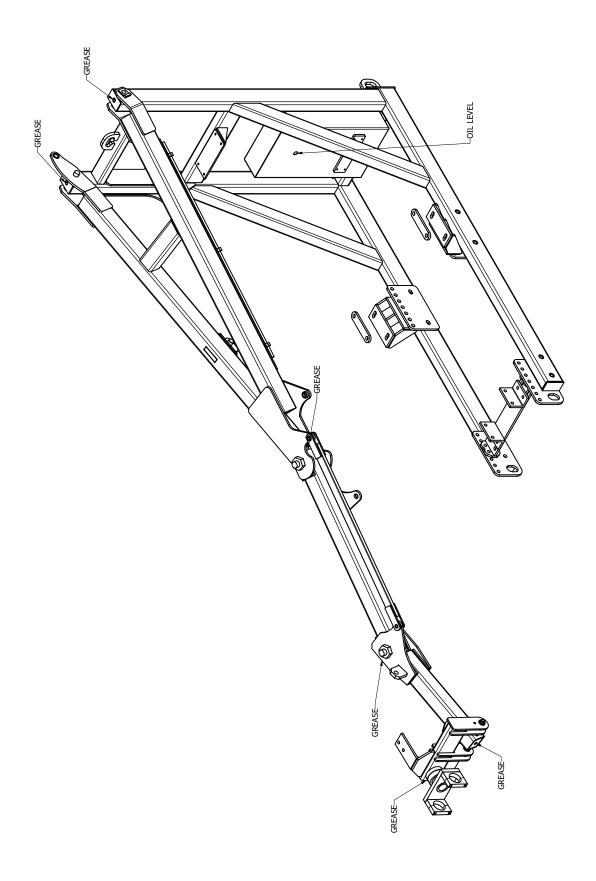
1. OPEN HINGED CUTTERHEAD ACCESS COVER

2. USE 7/8" WRENCH TO ROTATE CAM BUSHING AND A 5/16" ALLEN WRENCH TO HOLD SHCS 3. ROTATE CAM UNTIL YOU ARE UNABLE TO ROTATE V-ROLLER BY HAND 4. CHECK ALL 4 V-ROLLER ADJUSTMENTS 5. TIGHTEN SHCS

# **HEAD LUBRICATION**

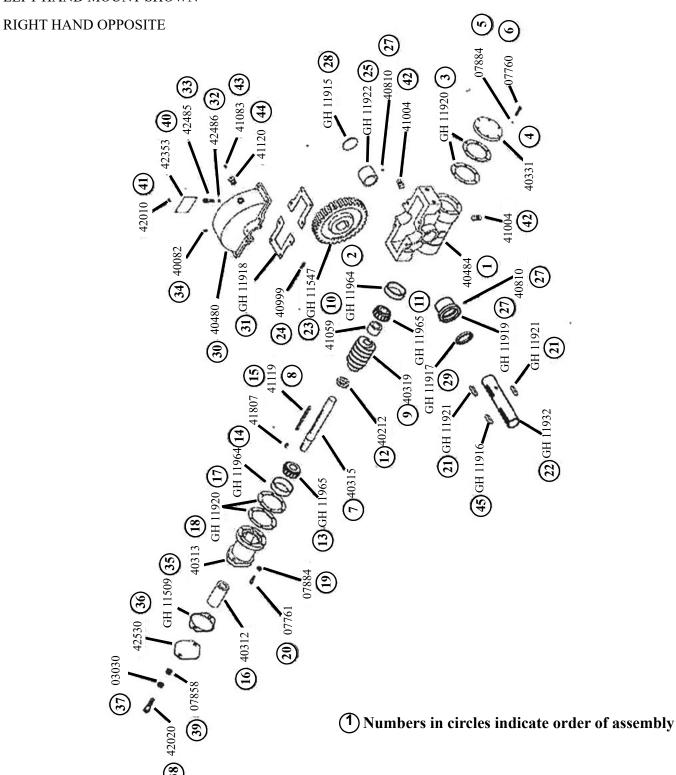


# FRAME & ROTATE GEAR BOX



# PARTS SECTION GEARBOX DIAGRAM

#### LEFT HAND MOUNT SHOWN

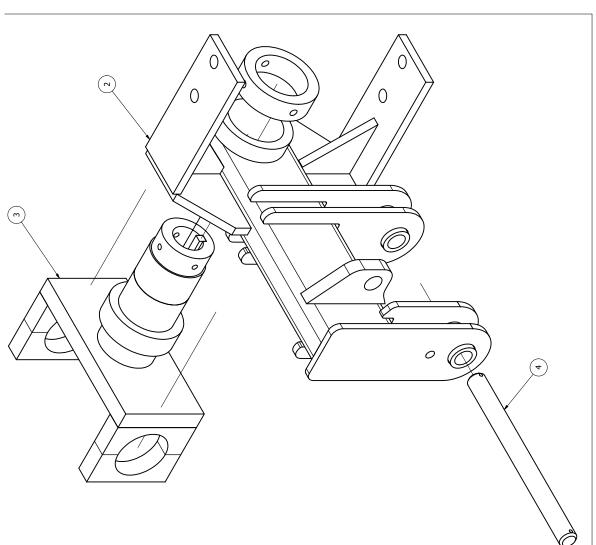


# GEARBOX PART NUMBERS & DESCRIPTION

PART NUMBER	QTY.	DESCRIPTION			
3030	2	Washer - Lock .500"			
7760	6	Screw - Cap Hex Hd313"x1.000"			
7761	6	Screw - Cap Hex Hd313"x1.250"			
7858	2	Nut500"			
7884	12	Washer - Lock .313"			
40082	2	Grease Fitting125 npt			
40212	1	Spacer - Worm			
40312	1	Coupling - Hydraulic			
40313	1	Adaptor - Motor			
40315	1	Shaft - Worm			
40319	1	Worm - 32:1 L.H.			
40331	1	End - Cap			
40480	1	Cover - Housing			
40484	1	Housing			
40999	1	Screw – Set Skt375"x1.000"			
41004	1	Pipe Plug500"			
41059	1	Spacer - Worm			
41083	1	Relief Valve			
41119	1	Key - Worm			
41120	1	Pipe Reducer500" to .125"			
41807	1	Key - Input			
42010	4	Screw – Drive #10			
42020	2	Screw – Cap Skt500"x2.000"			
42353	1	Data Plate			
42485	4	Screw – Cap Skt438"x1.000"			
42486	4	Washer – Hi-collar Lock .438"			
42530	1	Cover – Hyd. Adapter			
GH 11509	1	Gasket - Flange			
GH 11547	1	Gear – 32:1 L.H.			
GH 11915	1	Freeze Plug			
GH 11916	1	Key, 7/16 X 2 1/4 Rotate SS			
GH 11917	1	Oil Seal			
GH 11918	2	Gasket – Housing			
GH 11919	1	Bushing - Housing w/ 40810 Pin *			
GH 11920	4	Gasket – End Cap			
GH 11921	3	Key - Gear			
GH 11922	1	Bushing - Housing w/ 40810 Pin*			
GH 11932	1	Shaft - Output			
GH 11964	2	Bearing – Cup			
GH 11965	2	Bearing – Cone			

#### ROTATE FRAME ASSEMBLY

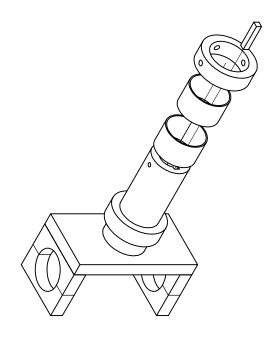
_		_					_	_	
	DESCRIPTION	COMPLETE RH ROTATE ASSEMBLY	INCLUDING GEAR BOX	COMPLETE LH ROTATE ASSEMBLY	INCLUDING GEAR BOX	ROTATE FRAME RH	ROTATE FRAME LH	ROTATE PIN ASSEMBLY	ROTATE PIN 1" STRESSPROOF
Parts List	PART NUMBER	GH11602		GH11600		GH11598	GH11599	GH0295	GH0156
	ĄΤ					1	1	1	1
	ITEM	1		1.1		2	2.1	3	4

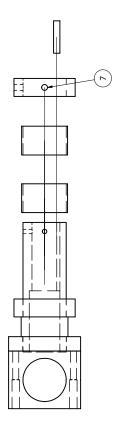


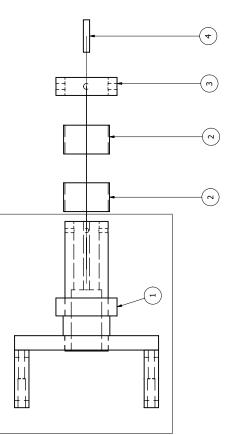
ITEM # 1 RH ROTATE SHOWN ITEM #1

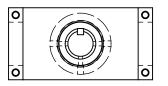
RH ROTATE SHOWN AS: GH 11598 W/O GEARBOX

# ROTATE PIN ASSEMBLY

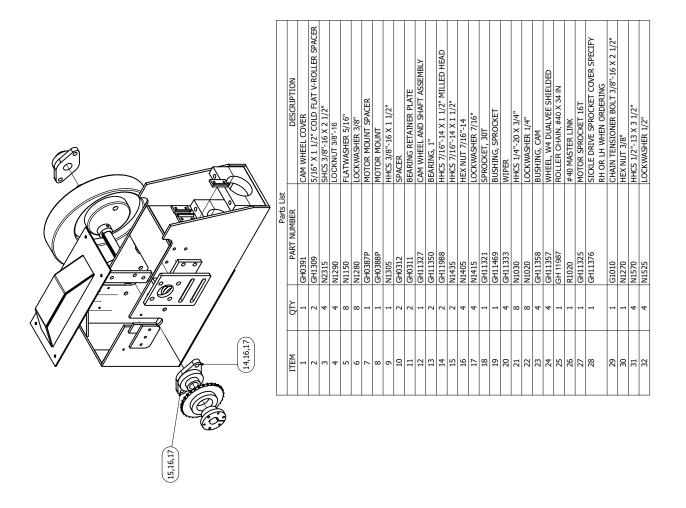


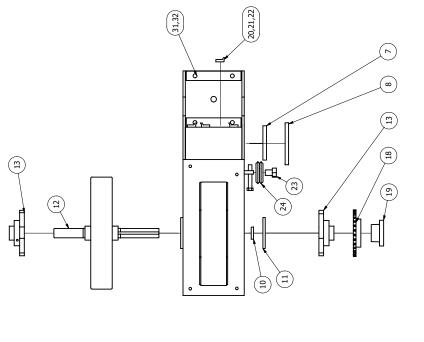


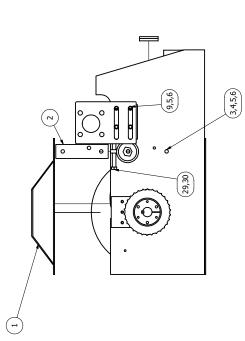




#### **HEAD BOX ASSEMBLY**

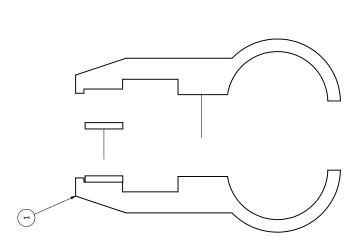


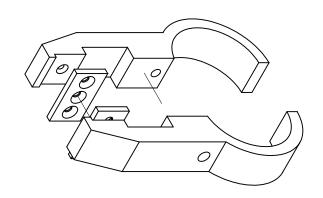


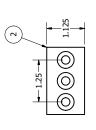


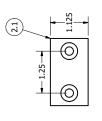
RH CUTTER BOX SHOWN

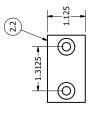
#### **CLAMP ASSEMBLY**



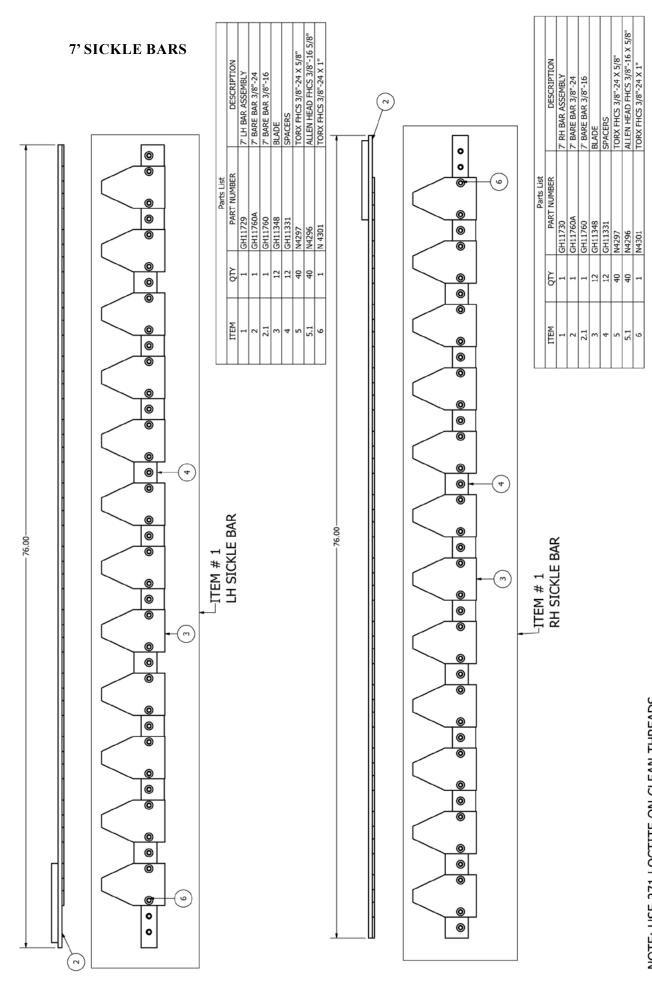




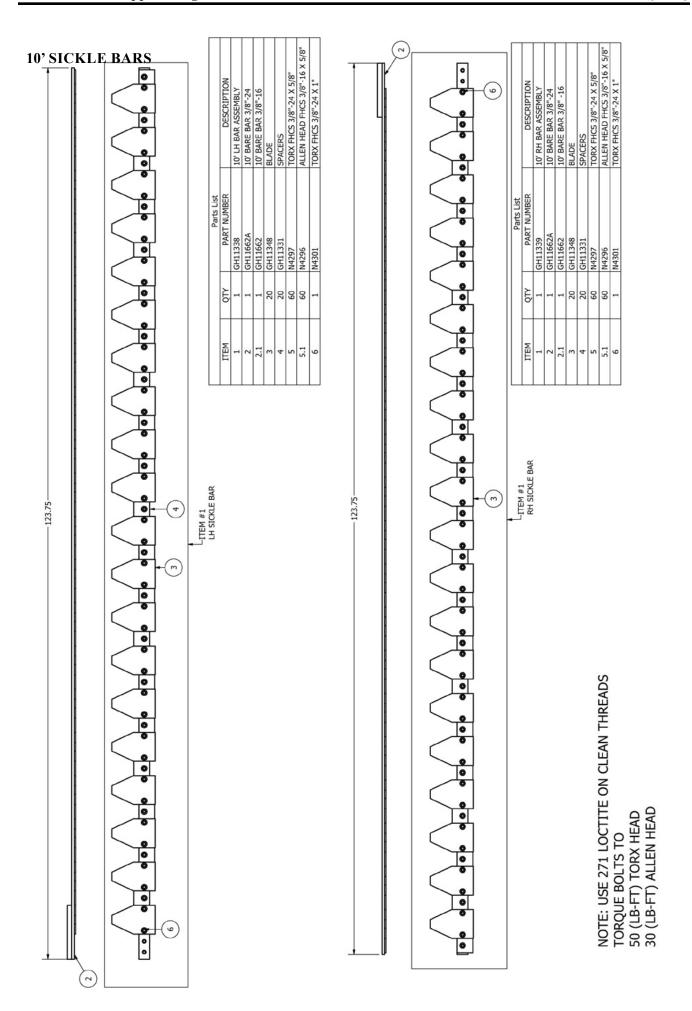


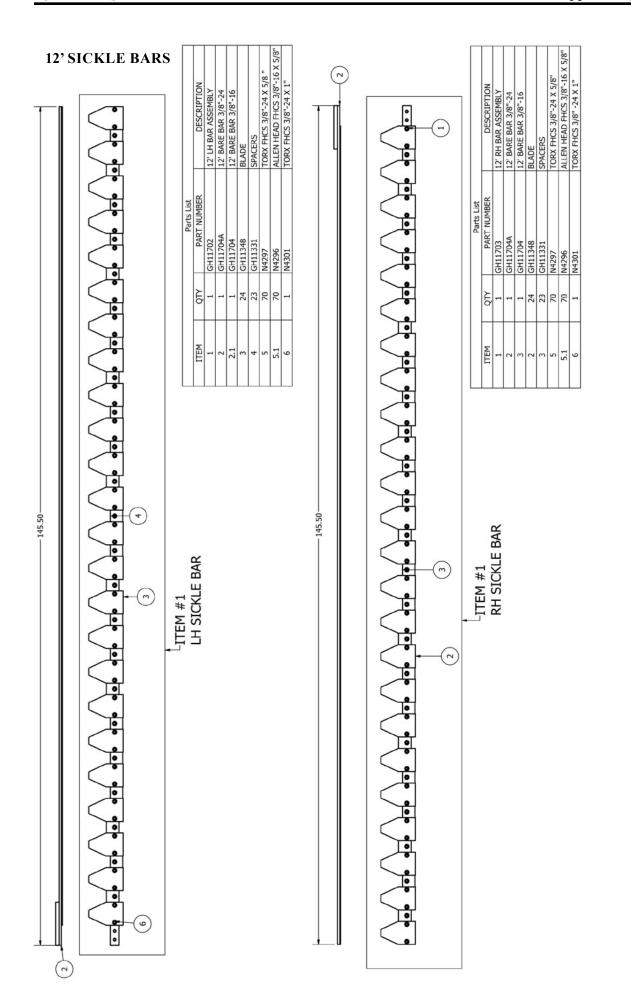


WEAR PLATES WHEN ORDERING JUST WEAR PLATES SPECIFY CORRECT ONE



NOTE: USE 271 LOCTITE ON CLEAN THREADS TORQUE BOLTS TO 50 (LB-FT) TORX HEAD 30 (LB-FT) ALLEN HEAD

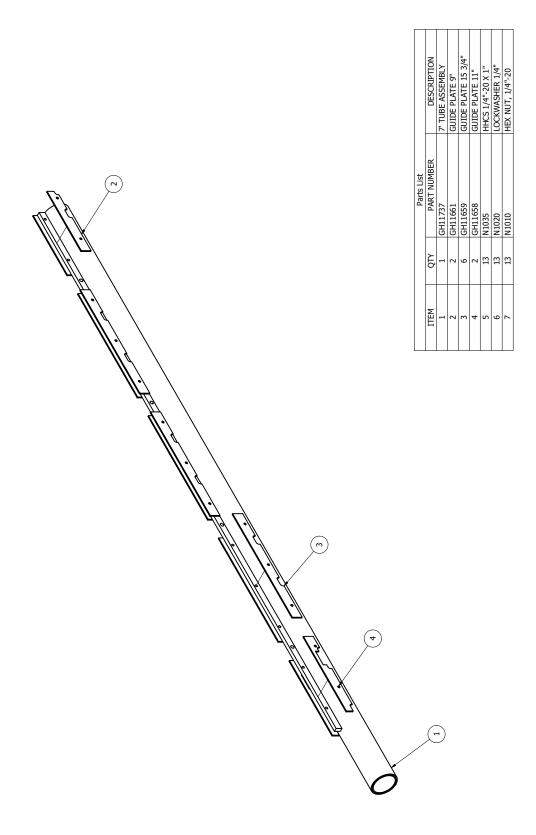




NOTE: USE 271 LOCTITE ON CLEAN THREADS TORQUE BOLTS TO

50 (LB- FT) TORX HEAD 30 (LB-FT) ALLEN HEAD

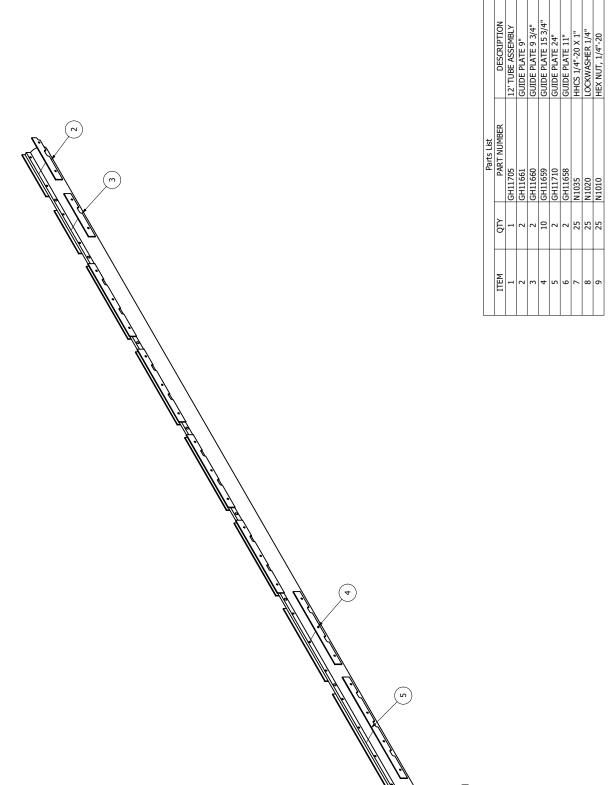
#### 7' TUBE ASSEMBLY



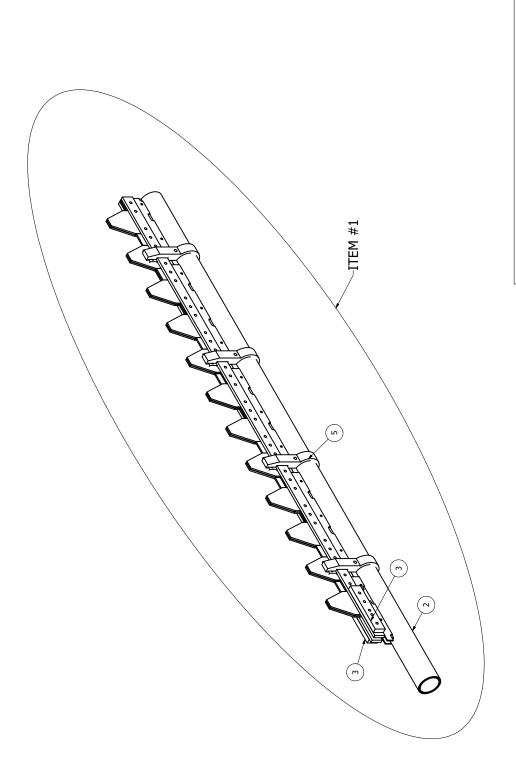
# 10' TUBE ASSEMBLY

			GUIDE PLATE 11"	GUIDE PLATE 15 3/4"	GUIDE PLATE 9 3/4"	GUIDE PLATE 9"	HHCS 1/4"-20 X 1"	LOCKWASHER 1/4"	HFX NUT. 1/4-20
Parts List	PART NUMBER	GH113			GH11660		N1035		
	ΛTQ	-	2	10	2	2	21	21	21
	ITEM	1	2	m	4	2	9	7	8
		5		<u> </u>					

#### 12' TUBE ASSEMBLY

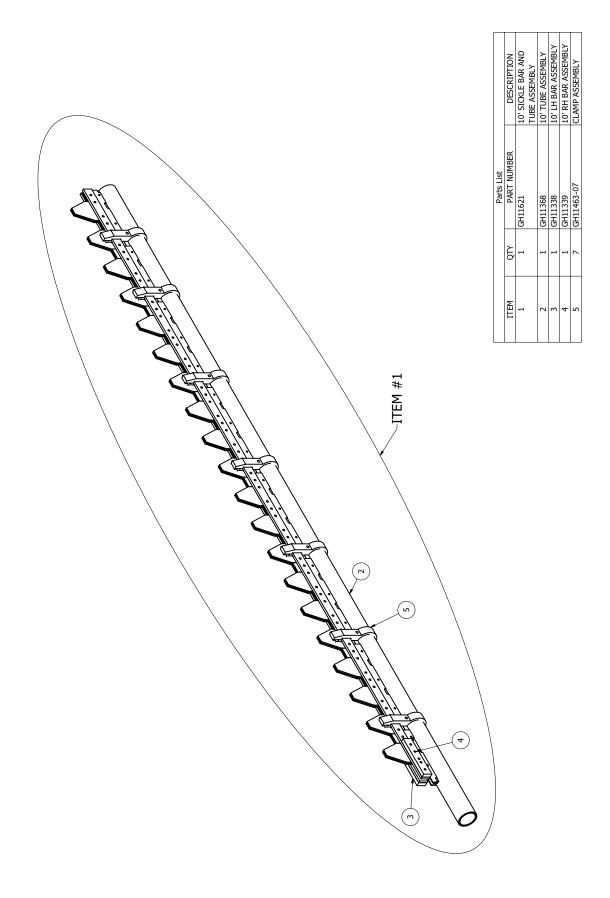


# 7' SICKLE BAR & TUBE ASSEMBLY

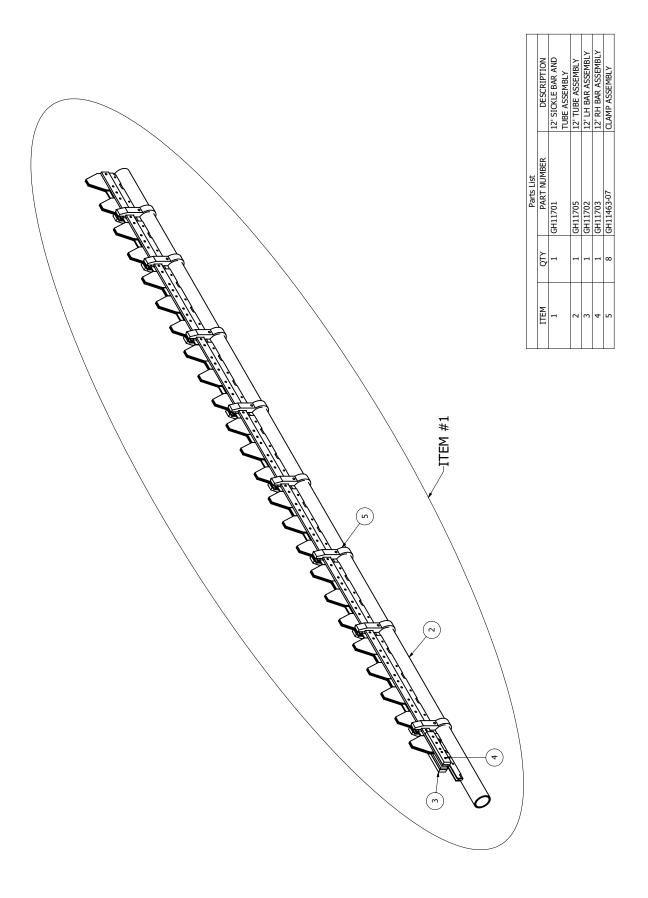


TTEM   QTY   PART NUMBER   DESCRIPTION     1   GH11722   7' SICKLE BAR AND     2   1   GH11739   7' TUBE ASSEMBLY     3   1   GH11739   7' TUBE ASSEMBLY     4   1   GH11730   7' TUBE ASSEMBLY     5   4   GH11463-07   CLAMP ASSEMBLY     6   1   GH11730   7' RH BAR ASSEMBLY     7   RH BAR ASSEMBLY     6   1   GH11730   7' RH BAR ASSEMBLY     7   RH BAR ASSEMBLY     7   RH BAR ASSEMBLY     7   RH BAR ASSEMBLY     8   GH11463-07   CLAMP ASSEMBLY     9   CLAMP ASSEMBLY     1   CLA								
QTY   GH117 1 GH117 1 GH117 1 GH117 4 GH114		DESCRIPTION	7' SICKLE BAR AND	TUBE ASSEMBLY	7' TUBE ASSEMBLY	7' LH BAR ASSEMBLY	7' RH BAR ASSEMBLY	CLAMP ASSEMBLY
	Parts List	PART NUMBER	GH11722		GH11737	GH11729	GH11730	GH11463-07
1 1 2 2 3 3 4 4		QTY	1		1	1	1	4
		ITEM	П		2	3	4	5

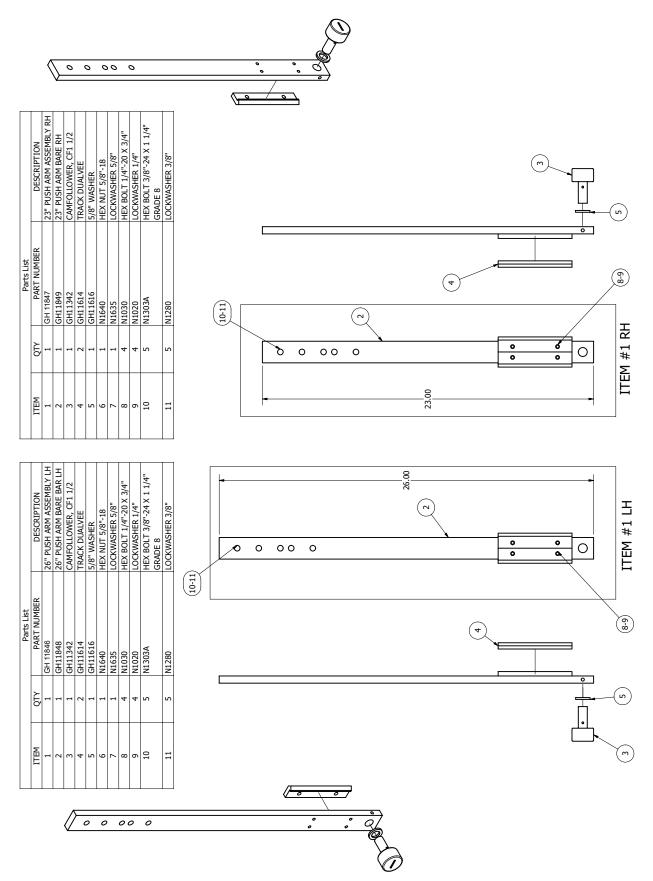
#### 10' SICKLE BAR & TUBE ASSEMBLY



#### 12' SICKLE BAR & TUBE ASSEMBLY

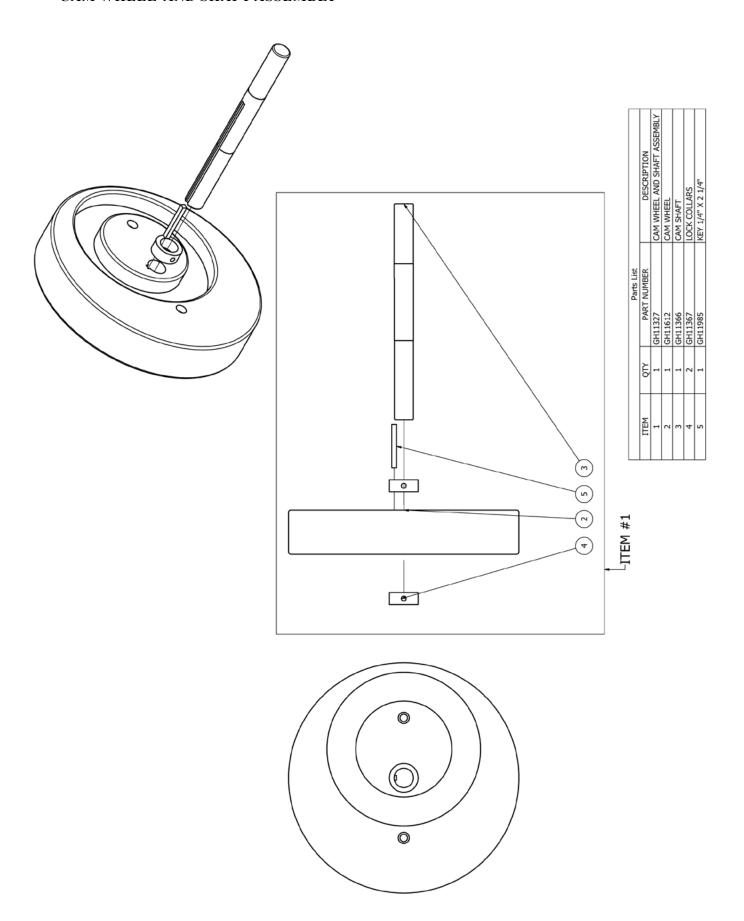


#### RH & LH PUSH ARM ASSEMBLIES



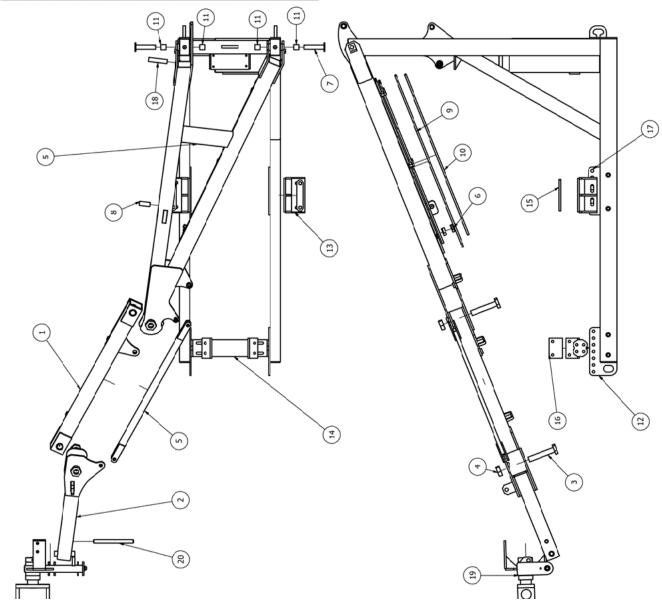
Note: Align camfollower grease hole with grease fitting during assembly.

# CAM WHEEL AND SHAFT ASSEMBLY



# GVF 1000 STANDARD HEDGER PARTS - MAIN FRAME

							_		_			_		_								_					_
	DESCRIPTION	FLEX ASSEMBLY	FRONT FLEX ASSEMBLY RIGHT	HHCS 1 1/2"-12 X 8"	GRADE 8	LOCKNUT 1 1/2"-12	STABILIZER BAR	HYD. TUBE CLAMP	ASSEMBLY	OVERHEAD PIVOT PIN	LIFT CYLINDER PIN 1 1/4"	STRESSPROOF	HYDRAULIC TUBE 60"	HYDRAULIC TUBE 56"	BUSHINGS	FRONT MOUNTING PLATE	REAR AXLE MOUNT	FRONT CROSS BAR MOUNT	REAR AXLE UPPER MT.	FRONT MTS. 3" X 4" X 1/2"	ANGLE	MOUNTING PLATE	LIFT CYLINDER PIN 1 1/4"	STRESSPROOF	RH ROTATE ASSEMBLY	ROTATE PIN 1"	SIRESPROOF
Parts List	PART NUMBER	GH1015	GH1020	N1990		N1975	GH1025	GH0169F		GH0157B	GH10113		GH10115	GH10114	GH0166B	GH0163P	GHJD2	GH006G	GH0173P	GHJD10		GH10110	GH10112		GH11602	GH0156	
	ΔT	1	1	2		2	1	3		2	1		4	4	4	2	2	1	2	2		2	1		1	1	
	ITEM	1	2	3		4	5	9		7	8		6	10	11	12	13	14	15	16		17	18		19	20	



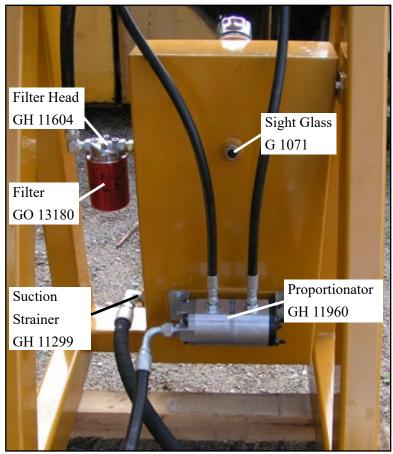
# HYDRAULIC SYSTEM COMPONENTS



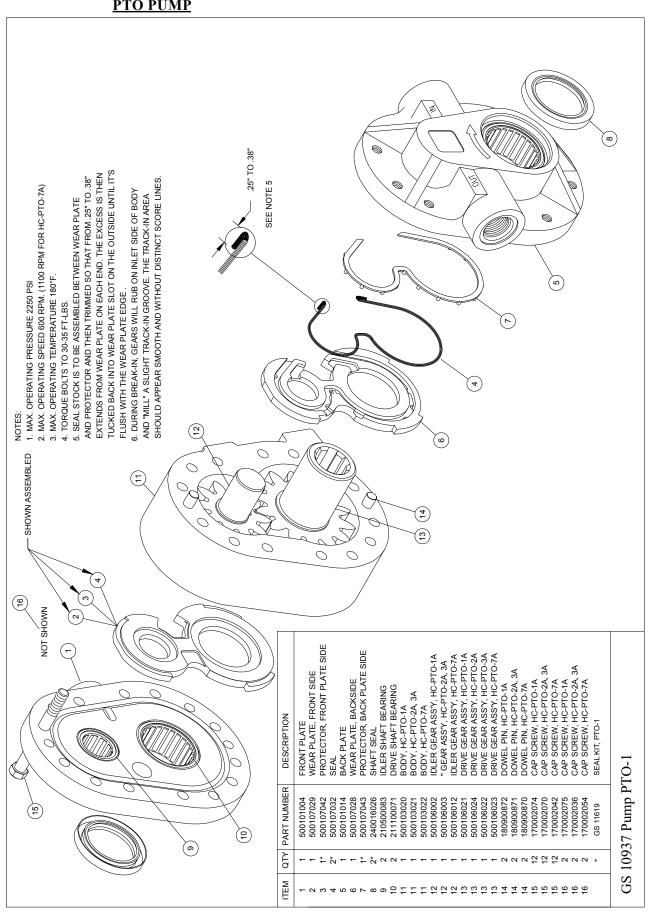


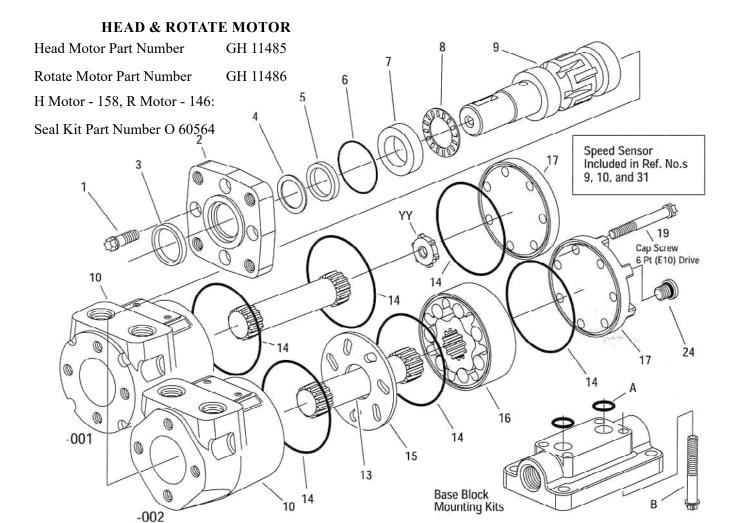
Hydraulic System Components Continued





#### PTO PUMP



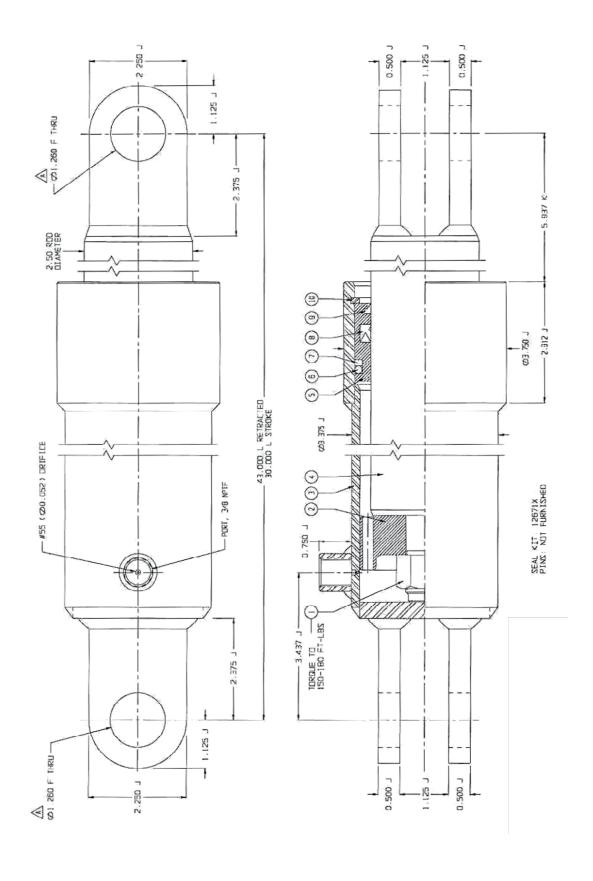


All R -002 parts are interchangeable with R -001 parts except: End Cap (seal groove change), housing, section seals, drives and drive spacer. Note: Each displacement in the R -002 has its own unique drive with no spacer required.

	-002	-001		
Ref.				
No.	Part No.	Part No.	Description	Quantity
1	16292-088	16292-088	Screw, Cap (6 Point (E10) Drive 5/16-24 x 7/8)	4
2	22000-002	22000-002	Flange Mounting (4 Bolt) 3/8-16 UNC	1
X 3	9121-002	9121-002	Seal, Exclusion	1
X 4	22002-000	22002-000	Washer, Backup	1
X 5	9057-014	9057-014	Seal, Pressure	1
X 6	9091-001	9091-001	Seal	1
7	7462-000	7462-000	Race, Thrust Bearing	1
8	7537-000	7537-000	Bearing, Thrust Needle	1
9	7360-001	7360-001	Shaft, Output (1 in. Dia. Straight with Woodruff Key Slot)	1
10	201083-001	22807-001	Housing, 7/8-14 O-ring Ports	1
13			Drive	1
X 14	9086-005	250001-041	Seal	3
15	22808-000	22808-000	Plate, Spacer	1
16			Geroler	1
17	23986-001	22809-001	Cap, End (No Port)	1
19	*	*	Screw, Cap (6 Point (E10) Drive 5/16-24)	7
24	9072-003	9072-003	Plug/ O-ring (7/16-20 Drain Port)	1

# LIFT CYLINDER

# GH 11304



# LIFT CYLINDER PARTS

# **GH 11304 (17298C) LIFT CYLINDER**

Drawing #:	Part #:	Description:	Qty.:
	00080647	Plug Stl Pipe	1
	GH 11930	Seal Kit 2.5 Ram 12671X	1
	14264X	Primer (Red)	2.9 oz
1	00082464	Lock Nut, 7/8-14	1
2	005446	Piston - 3.00 OD	1
3	17378C	Cyl Body - 3in ID	1
4	17381B	Ram 2.5 w/c	1
5	11194B	Guide 3.25 OD - 2.5 ID	1
6	00080342	Oring N 2.875 x 3.25	1
7	00083241	Backup Ring H 2.875 x 3.25	1
8	ES0030/2530	Ucup Lip 2.50 x 3.00 x 0.375	1
9	00080752	Wiper Ring 2.500 AN Series	1
10	00080724	Ret. Ring Int 3.250 RRT	1

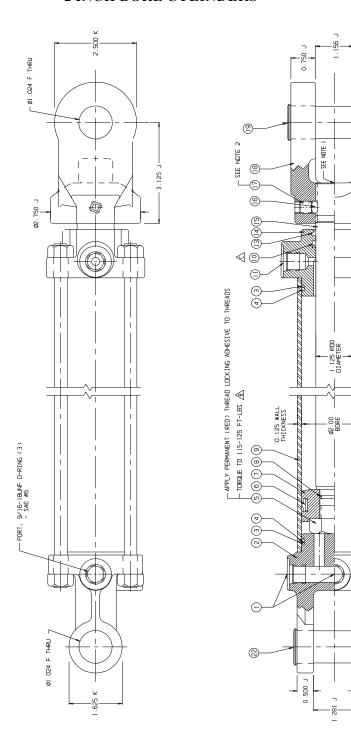
-1.875

TORQUE TO 22-24 FT-LBS —(20)

0.500 J

STROKE + 10.250 RETRACTED

# 2 INCH BORE CYLINDERS





2) TIGHTEN SET SCREW SECURELY LINTIL NYLON BALL IS DEFORMED INTO THREADS. 3) INSTALL: (1) A-9011 CLEVIS PIN (RDD END) (1) A-542 CLEVIS PIN (BLIND END)

6) CONSULT FACTORY IF CYLINDER APPLICATION REQUIRES MAXIMUM PRESSURE FULL REVERSAL LOADING WHERE FIELD FAILURE COULD RESULT IN INJURY TO PEOPLE OR MACHINERY DAMAGE.

NDTES:				
3,265 FSI 40 F TO 200 F 9,966 FSI 100 FT/MIN.	DN NA LBS (NA PSI)	0	RED	HARD CHROME
	r Cause Nt full extension Jano. Support	STOP TUBE :	FINISH :	ROD FINISH:
TOLINGE PRESSUE RATING 3.26 FST 19 PERSUIRE RATING 40 F TO 200 F TO 200 FST 10 FST 200 FST 10 FST 200	IN DO SPEED LICER S FLAMM MY CAUSE SEAL MISTOR OE DO STITCHOUS FEEDWARD MANUAL COURS IN STITCHOUS WITH 2.1 SVEETY FACTIRE, NO STIE LOUG. PINKED ENCE AND INTERFEDIATE SPERIFF	2.000	1.125	VAR
CYLINDER PRESSI DPERATING TEMP MINIMUM WALL BI MAXIMUM RECOMM	RECOMBINED RECOMBINED IN MITH 2:1 SAFETY PINNED ENDS AND PROPERTY.	BORE :	R00. 01A. :	STROKE :

	200 F	. z z				
0	3,265 PSI 40 F TO 200 F	S FT/MIN	NVA LBS (NVA PSI.)		RED	
RATIN		8	LL EXTENSION	STOP TUBE :	FINISH:	
a H		MAY CAU	O AT FU E COMO. E SUPPO	IS	F	
CYLINDER RATING	ESSURE RATING EMPERATURE RANGE	DOMENDED RECORDS SPEED  DOMENCED RED SPEED  EDS LUCER 5 FT/MIN MAY CAUSE  ISE OLE TO STICK/SLIP.	MXZNUM COLUM LOND AT FULL EXTENSION FETY FACTOR, ND SIDE LOND. AND ND INTERMEDIATE SUPPORT	2.000	1.125	
	S & C	, MARCIE	₹₩.₹			Γ

# 2 INCH BORE CYLINDER PARTS

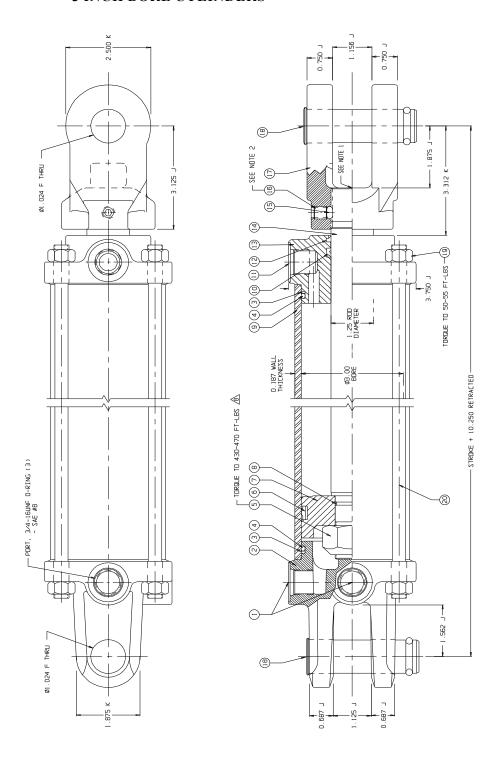
# 2 INCH BORE CYLINDERS

H 1225 = 2 X 4	H 1240 = 2 X 12
H 1230 = 2 X 6	H 1242 = 2 X 24
H 1235 = 2 X 8	H 1244 = 2 X 36

Drawing #:	Part #:	Description:	Qty.:
1	00082848	Plug Oring Boss Sae #6	2
2	18085C	Bottom Clevis 2.00 Diameter	1
3	15848A	Backup Ring 1.812 x 2.00	2
4	18691A	Oring NT 1.812 x 2.00	2
5	00080281	Nut Hex Jam 7/8-14	1
6	14819X	PSP Piston Seal	1
7	0A001845	Piston - 2.00 Bore	1
8	00080305	Oring N 0.75 x 0.875	1
9*	0A009900	Wall 2.0 ID x .125 WX VAR	1
10	31720A	U-Cup Lip 1.125 x 1.375 x 0.187	1
11	12677A	Plug Oring Boss 9/16-18	1
13	00083161	Wiper Ring 1.125 AN Series	1
14	18079B	Guide 2.00 OD - 1.125 ID	1
15*	0B007905	Rod CP 1.125 DX VAR	1
16	00082649	Ball Nylon 0.250 Grade 2	1
17	00082648	Screw Set HS 3/8-16 x 0.375	1
18	18080B	Rod Clevis 1.12-12UNF	1
19	0A009011	Clevis Pin & Clip - 1 Diameter	1
20	00082078	Nut Reg Hex 7/16-14 NC Gr5	8
21*	0A002450	Tie Rod 0.385 DX Var	4
22	0A000542	Clevis Pin & Clip - 1 Diameter	1
	O 18289X	Seal Kit	

<sup>\* =</sup> SPECIFY SIZE OF CYLINDER WHEN ORDERING

#### **3 INCH BORE CYLINDERS**





NOTES: 1) TIGHTEN CLEVIS UNTIL BOTTOM OF THROAT IS FLUSH WITH END OF ROD. 2) TIGHTEN SET SCREW SECURELY UNTIL NYLON BALL IS DEFORMED INTO THREADS.

CYLINDER RATING

3) INSTALL: (2) A-9011 CLEVIS PIN

4) SEAL KIT: 18117X

6) CONSULT FACTORY IF CYLINDER APPLICATION REDUIRES MAXIMUM PRESSURE FULL REVERSALE LOADION WAGEE FIELD FAILURE COLLO RESULT IN INJURY TO PEDPLE DE MACHINERY OMMAGE. 5) DECALS: PER ES0045

NVA LBS (NVA PSI.)	0	RED	HARD CHROME
JIPPORT	STOP TUBE :	FINISH :	ROD FINISH :
PINNED ENDS AND NO INTERNEDIATE SUPPORT N.A. LBS (N.A. PSL)	3.000	1.250	VAR.
PINNED ENDS AN	BORE :	ROD. 01A. :	STROKE :

Þ				
3.285 PSI 40 F TO 200 F 9.966 PSI 100 FL/MIN. 5 FL/MIN. 5 FL/MIN.	(N/A PSI )	0	RED	HARD CHROME
CCALSE TOLL EXTENSION STRENGTON		STOP TUBE :	FINISH :	ROD FINISH :
TO LINGE PRESSURE BATTON 3, 265 FST 10 TO	THE THE PARTY OF THE	3.000	1.250	VAR.
CYLINDER PRESS DPERATING TEMPINAMINEN WALL B NAXTHIM RECOMMINIMAM RECOMMINIMAM RECOMMINIMA		BORE :	ROD. 01A. :	STROKE :

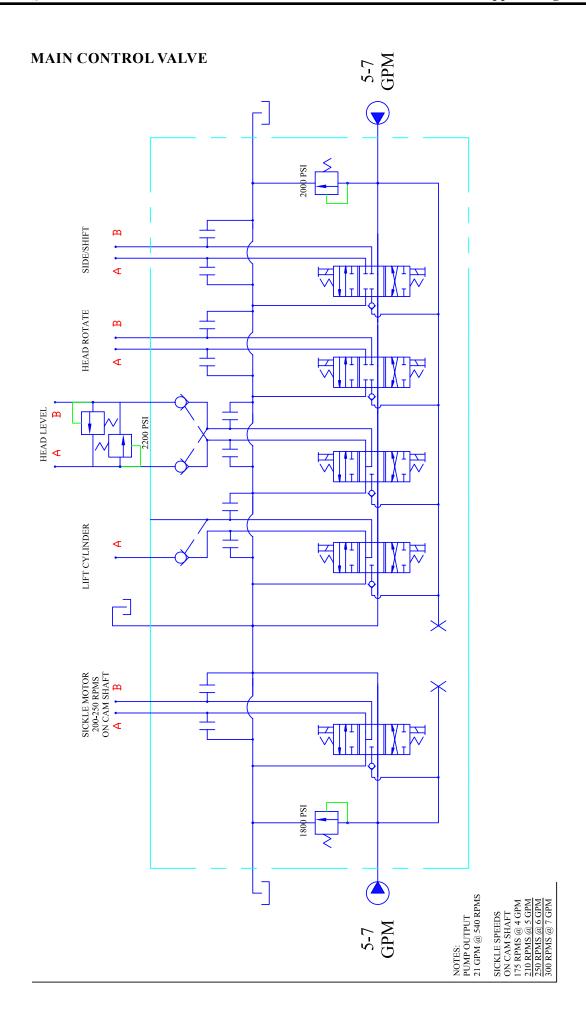
# **3 INCH BORE CYLINDER PARTS**

# **3 INCH BORE CYLINDERS**

H 1247 = 3 X 6	H 1260 = 3 X 16
H 1245 = 3 X 8	H 1273 = 3 X 24
$H 1250 = 3 \times 10$	H 1275 = 3 X 36
H 1255 = 3 X 12	H 1277 = 3 X 48

Drawing #:	Part #:	<b>Description:</b>	Qty.:
1	00082751	Plug, Oring Boss Sae #8	2
2	17937C	Bottom Clevis 3.00 Diameter	1
3	00082644	Backup Ring H 2.75 x 3.00	2
4	00082643	Oring N 2.75 x 3.00	2
5	00082478	Nut, Lock 1-14	1
6	14822X	PSP Piston Seal	1
7	12580A	Piston - 3.00 Bore	1
8	00080310	Oring N 0.875 x 1.000	1
9*	0A009902	Wall 3.0 ID x 0.187 W x VAR	1
10	ES0030/1215	Ucup Lip 1.25 x 1.5 x .25	1
11	00082808	Plug Oring Boss 3/4-16	1
12	00083159	Wiper Ring 1.250 AN Series	1
13	17939B	Guide 3.00 OD - 1.250 ID	1
14*	0B007901	Rod CP 1.25 DX Var	1
15	00082649	Ball Nylon 0.250 Grade 2	1
16	00082648	Screw Set HS 3/8-16	1
17	17940B	Rod Clevis 1.25 - 12	1
		Clevis Pin & Clip - 1IN	
18	0A009011	Diam.	2
		Nut Reg Hex 7/16-14 NC	
19	00082078	GR 5	8
20*	0A002450	Tie Rod 0.385 Var	4

<sup>\* =</sup> SPECIFY SIZE OF CYLINDER WHEN ORDERING

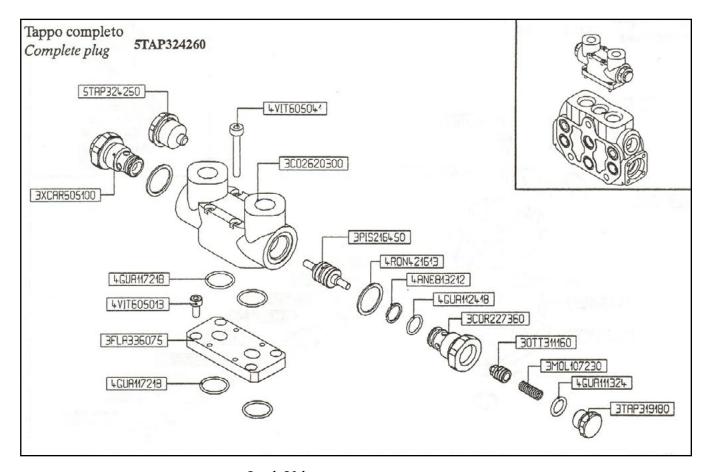


# MAIN CONTROL VALVE PARTS

Part Number: GH 11961

Line	Section	Description	Part No.	Qty
1	LH Inlet	AC(YG3-120)	612205004	1
2	Cutter Bar	SD6/P-SAE Section	5EL1067001	1
3		8ES3 Control Kit	5V08027	1
4		2ES Spool	3CU2225015	1
5	GH 11977	Deutsch 12 Vdc Coil	4SOL412112	2
6		P3T Plug	XTAP524280	2
7	Mid Outlet	CS1-SAE-10	612405010	1
8	Lift	SD6/P-SAE Section	5EL1067001	1
9		8ES3 Control Kit	5V08027	1
10		2ES Spool	3CU2225015	1
11	GH 11977	Deutsch 12 Vdc Coil	4SOL412112	2
12		P3T Plug	XTAP524280	2
13		BP1 Lock Valve	612002020	1
14	Level	SD6/P-SAE Section	5EL1067001	1
15		8ES3 Control Kit	5V08027	1
16		2ES Spool	3CU2225015	1
17	GH11977	Deutsch 12 Vdc Coil	4SOL412112	2
18		P3T Plug	XTAP524280	2
19		BP3 Lock Valve	602002101	1
20	Rotate	SD6/P-SAE Body	5EL1067001	1
21	GH 11975	1ES Spool	3CU2210015	1
22	GH 11977	Deutsch 12 Vdc Coil	4SOL412112	2
23		8ES3 Control Kit	5V08027	1
24		P3T Plug	XTAP524280	2
25	Shift	SD6/P-SAE Body	5EL1067001	1
26	GH 11975	1ES Spool	3CU2210015	1
27	GH 11977	Deutsch 12 Vdc Coil	4SOL412112	2
28		8ES3 Control Kit	5V08027	1
29		P3T Plug	XTAP524280	2
30	RH Inlet	AC(YG3-120)	612205004	1
31	Tie Rods	5TIR	5TIR108307	1
	GH 12410	Oring, SD6 Section Valve		

#### LOCK VALVE

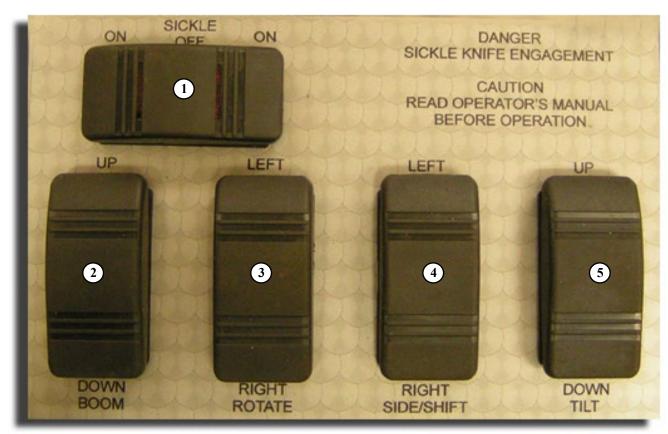


Lock Valve

Number	Description
3CO2620300	G3/8 Body
3COR227360	Valve Body
3FLA336075	Flange
3MOL107230	Spring
3OTT311160	Pin
3PIS216450	Piston
3TAP319180	Plug
3TAP324260	Plug
4ANE813212	13.16x1.2 Parbak
4GUA111324	OR 2.4x11.3
4GUA112418	OR 12.42x1.78
4GUA117218	OR 17.17x1.78
4RON421613	Washer
4VIT605013	M5x12 Screw
4VIT605041	M5x40 Screw

#### **CONTROL BOX**

# in Diagram	Part Number	Item Description	Qty.
	GH 11962	Assy. Control Box & Harness (std. hedger)	1
1	GO 13050	Switch, Rocker Head Motor, V61D1D	1
	GH 11984	Machine Screw, 6-32 X 1/4" SS Slotted	8
	GH 11979	Label, Hedger Control Boxes	1
	GH 11980	Harness, Hedger (for control box)	1
	GH 11981	Encloser, Formed (hedger control boxes)	1
2,3,4,5	GH 11982	Switch, Momentary V8D1S	4
	GH 11983	Bushing, Strain Relief 7/8" Heyco	1



Control Box Diagram

# **HEDGER ACCESSORY KIT**

PART NUMBER: GH 11937

KIT INCLUDES:

Quantity	Part Number	Item Description
3	GH 11348	Knife
6	N 4297	3/8-24 x 5/8 FHCS Torx
1	GH 11855	Torx Drive
1	SP 7008	Adhesive/Sealant 271

#### **G V F WARRANTY**

Gillison's Variety Fabrication, Inc. will replace or repair at GVF option, any GVF manufactured item that is, in the opinion of GVF, defective in material or workmanship for a period of 1 year or 1,000 hours, whichever comes first, from the date of purchase, and is returned to the GVF plant or service center at the expense of the customer. This warranty is made expressly in lieu of all other warranties expressed or implied. The Warranty Registration card must be completed in full and returned to GVF within thirty (30) days of date of delivery to qualify for this warranty.

The owner is specifically responsible for the operation and service of the machine. This warranty shall not apply to any product that has been subject to misuse, negligence or accident. In the event of a defect in material or workmanship, GVF sole responsibility is to the repair or replacement of the defective part and is not responsible for lost time or any other expenses incurred due to lost time.

All OEM items such as Tires, Batteries, Engines and Hydraulic components are warranted by the original equipment manufacturer. GVF controls the installation of these products but not the manufacture; therefore, GVF warranty applies to the proper installation but not the OEM component itself.

<u>Retail Customer Responsibility:</u> It is the Retail Customer and/or Operator's responsibility to read the Operator's Manual to operate, lubricate, maintain, and store the product in accordance with all instructions and safety procedures. Failure of the operator to read the Operator's Manual is misuse of this equipment. It is the Retail Customer and/or Operator's responsibility to inspect the product and to have any part(s) repaired or replaced when continued operation would cause damage or excessive wear to other parts or cause a safety hazard.

It is the Retail Customer's responsibility to deliver the product to the authorized GVF dealer, from whom he purchased it, for service or replacement of defective parts, which are covered by warranty. Repairs to be submitted for warranty consideration must be made within 45 days of failure. The Retail Customer is responsible for any cost incurred by the Dealer for traveling to or hauling of the product for the purpose of performing a warranty obligation or inspection.