

# PARTS AND INSTRUCTION MANUAL

**TIGER STURDI SAW**

**MODEL: SERIES SAW I**



**CAUTION**

NO OIL IN ENGINE. REFER TO ENGINE  
MANUAL FOR CORRECT OIL GRADE.

**MANUAL PART #26036-01**

For Saws Manufactured After 5/1/97

## SAW SAFETY



THESE SAFETY AND OPERATING INSTRUCTIONS FOR MILLER STURDI-SAWS ARE FOR YOUR PROTECTION. CARELESS REGARD OF THESE INSTRUCTIONS AND OTHER SAFE CONSTRUCTION PRACTICES COULD RESULT IN ACCIDENTS AND INJURY.



THIS EQUIPMENT MUST ONLY BE OPERATED BY TRAINED PERSONNEL WHO FULLY UNDERSTAND ITS SAFE OPERATION. EACH OPERATOR MUST BE ABLE TO IDENTIFY ANY UNSAFE WORK SITE CONDITIONS AND REPORT THESE CONDITIONS TO HIS SUPERVISOR FOR IMMEDIATE CORRECTION.

1. Always wear approved safety glasses, steel-toed shoes, and OSHA approved hearing protection when operating saw.

2. NEVER OPERATE THIS SAW WITHOUT ALL GUARDS IN PLACE.



- A) BLADE GUARD WITH FRONT FLIP HALF OF GUARD DOWN AND POINTED TOWARD FRONT OF SAW. THE FLIP HALF OF THIS GUARD MAY BE RAISED ONLY WHEN CUTTING CURB/WALL.
- B) ARBOR SHAFT GUARD (ON SAWS EQUIPPED WITH DUAL ARBOR)
- C) BELT GUARD.

3. THE ONLY OPERATING POSITION FOR THIS SAW IS BETWEEN THE HANDLEBARS AT THE REAR OF THE SAW. IF THE OPERATOR MUST LEAVE THIS POSITION, THE ENGINE MUST BE SHUT DOWN. NEVER LEAVE SAW UNATTENDED WHILE IT IS RUNNING.



4. Keep all other personnel/spectators away from saw while cutting. Spinning diamond blades can throw segments; abrasive blades can crack.

## SAW SAFETY

(Cont.)

5. Clean blade collars before installing new blade. Inspect all blades before installing on saw. Ring test abrasive blades to make sure they are free from cracks. Do not use abrasive blades that have been damaged, i.e. missing blotters, cracked or missing sections. Inspect diamond blades to make sure they do not have missing segments or stress cracks.



**DANGER**

**DO NOT USE ANY DAMAGED OR EXCESSIVELY WORN BLADE.**

Use only blades rated to operate at the arbor speed (3000 RPM). Use only proper sizes of blades for the blade guard on your saw. Consult the factory if you have any questions regarding blade guard sizes.

6.



**CAUTION**

**NEVER START ENGINE WITH A SAW BLADE IN THE CUT. LIFT BLADE ABOVE THE AREA TO BE CUT BEFORE STARTING ENGINE.**

7.

When lifting or lowering saw, always leave lift/lower crank handle in "LOCKED POSITION."

8.



**DANGER**

**A GASOLINE ENGINE DISCHARGES CARBON MONOXIDE GAS WHICH CAUSES DEATH IF INHALED. ENGINE EXHAUST AND SOME OF ITS CONSTITUENTS ARE KNOWN TO CAUSE CANCER, BIRTH DEFECTS AND OTHER REPRODUCTIVE HARM. DO NOT OPERATE THIS SAW IN A BUILDING OR OTHER AREA WHERE THERE IS NOT ADEQUATE VENTILATION FOR THE OPERATOR.**

9.

**SHUT ENGINE DOWN TO SERVICE MACHINE.**

- A) Add fuel: Allow engine to cool before adding fuel
- B) Perform lubrication/maintenance.
- C) Change blade. (DISCONNECT SPARK PLUG WIRE)

## IMPORTANT MACHINE SERVICE NOTES:

This manual covers the construction, function and servicing procedure of the Miller Sturdi-Saw. Careful observance of these instructions will result in better, safer service work. Observe symbols as noted throughout this manual. Failure to observe these symbols will result in injury or death.



----- Indicates a strong possibility of severe personal injury or death if instructions are not followed.



----- Indicates a possibility of personal injury or equipment damage if instructions are not followed.



A) Your machine is equipped with instructional and safety decals. Should any of these decals become destroyed, faded, or otherwise illegible, replace them at once. These decals can be purchased from the MILLER SPREADER DEALER in your trade area. If you need the name of your Dealer, call MILLER SPREADER COMPANY AT TIGER EQUIPMENT ( 540 ) 489 7777 OR ( 888 ) 54 TIGER OR FAX YOUR REQUEST TO ( 540 ) 489 7778.



B) All repairs to this machine must be made by a qualified service mechanic using only MILLER SPREADER replacement parts or their approved equal. Any deviation from the original MILLER SPREADER supplied machine in the operation, repair, and/or modification of this machine *without the express written consent of the MILLER SPREADER COMPANY*, voids all machine warranties and any liability for injuries and/or damages to person or property.

## SAW SAFETY

(Cont.)

BEFORE ADDING FUEL:



DANGER

- SHUT ENGINE OFF.
- LET ENGINE COOL OFF A MINIMUM OF 5 MINUTES.
- EXTINGUISH SMOKING MATERIALS.
- USE FUNNEL.
- DO NOT OVERFILL.
- REPLACE FUEL CAP AFTER ADDING FUEL.
- A HOT ENGINE MAY IGNITE SPILLED GASOLINE

EXERCISE EXTREME CAUTION WHEN REFUELING.

10. Move saw on the jobsite by pushing by hand. Do not tow saw with another vehicle or injury to personnel or damage to saw will result.

11.



DANGER

THIS EQUIPMENT MUST ONLY BE OPERATED BY TRAINED PERSONNEL WHO FULLY UNDERSTAND ITS SAFE OPERATION. EACH OPERATOR MUST BE ABLE TO IDENTIFY ANY UNSAFE WORK SITE CONDITIONS AND REPORT THESE CONDITIONS TO HIS SUPERVISOR FOR IMMEDIATE CORRECTION.

12.



DANGER

KNOW WHAT YOU ARE SAWING BEFORE MAKING ANY CUTS. BE AWARE OF ALL UTILITIES, I.E. ELECTRIC, GAS LINES, ETC. AND TAKE NECESSARY PRECAUTIONS TO PREVENT INJURY/DEATH. DO NOT CUT UNTIL YOU INVESTIGATE.

13.



CAUTION

USE EXTREME CAUTION WHEN LOADING/UNLOADING SAW

- A) Before loading/unloading saw, REMOVE ALL BLADES (leave blade/arbor guards in place). While loading/unloading saw, do not position yourself where you could possibly be pinched/caught between saw and some other obstacle.

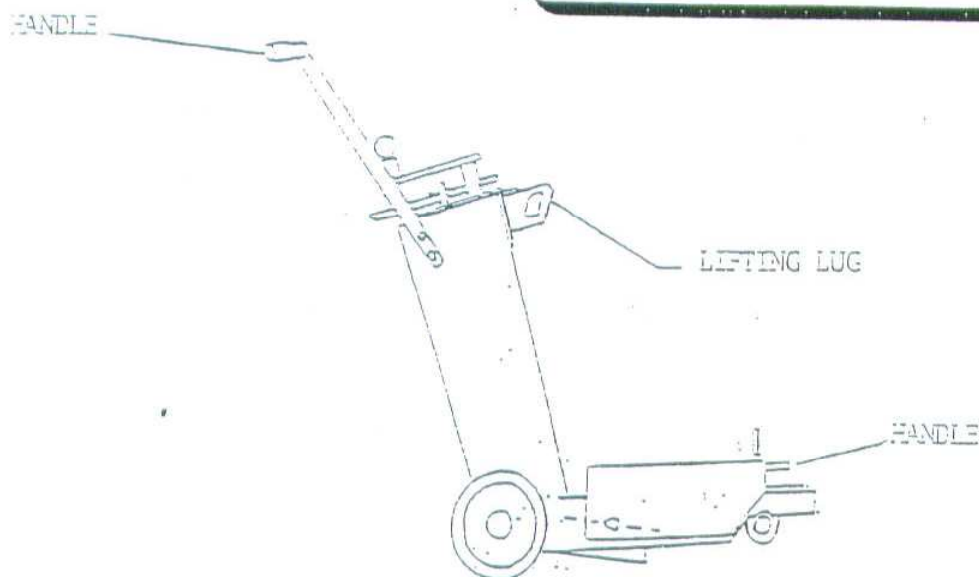
# SAW SAFETY

(Cont.)

B.) If lifting saw, USE EXTREME CAUTION. Note: Saw weights range from 280 lbs to 325 lbs. Refer to specification sheet for your particular saw to determine weight of your saw.

1. IF LIFTING SAW BY HAND, USE ONLY HANDLES (2) LOCATED ON FRONT AND REAR OF SAW. DO NOT HOLD ON TO ANY EDGES OR SURFACES UNDER SAW FRAME THAT MAY PINCH OR INJURE. IT IS RECOMMENDED THAT EACH PERSON WHO IS LIFTING THE SAW, LIFT NO MORE THAN 70 LBS. PER PERSON.

EXAMPLE: A 280lb saw would require (4) persons to lift.



2. IF LIFTING SAW WITH CRANE, WINCH, ETC. USE ONLY LIFTING EQUIPMENT RATED TO HANDLE SAW WEIGHT. USE ONLY LIFTING LUG LOCATED AT TOP CENTER OF SAW. IF YOUR SAW IS NOT EQUIPPED WITH A LIFTING LUG, ONE CAN BE PURCHASED FROM YOUR MILLER DEALER. DO NOT LIFT SAW BY ANY OTHER POINTS ON SAW.
- C.) If saw is pushed onto trailer, use ramps that are clean and dry and rated to handle saw weight. Move slowly on ramps. Raise saw only high enough to load/ unload on trailer.

## SAW ASSEMBLY, MAINTENANCE & ADJUSTMENTS

1. Check engine oil DAILY. Change after first five (5) hours of use and every 25 hours after first change. Refer to engine manual for proper oil grades.
2. Grease wheels (4) and arbor shaft bearings (2) DAILY. Use high quality gun grease, Kendall "SHP" High Temp or equal.

3.



CAUTION

CLEAN AIR CLEANER AND FOAM PRE-CLEANER DAILY MORE OFTEN IF DRY CUTTING. ALWAYS USE FOAM ELEMENT PRE-CLEANER OVER PAPER CARTRIDGE. FOLLOW ENGINE MANUFACTURERS INSTRUCTION ON AIR CLEANER SERVICE. NEVER RUN ENGINE WITH A CLOGGED OR MISSING AIR CLEANER.

4. Recheck arbor belt tension after **FIRST HOUR OF OPERATION** and every 25 hours after first check. Set each belt for 1/4" deflection with a 6 lb. load in middle of belt span. Over tensioning or under tensioning belts will cause premature belt failure. To adjust belt tension, loosen hex nut on belt tension bolt (two places). To increase belt tension, turn tension bolts clockwise. To decrease belt tension, turn tension bolts counter clockwise. **After adjusting belts, make sure engine mount plate is LEVEL to saw frame.** Secure position of tension bolts by tightening hex nuts (two places).  
**Refer to FIG 1.**
5. When replacing arbor shaft or pillow block bearing(s), always adjust bearings so arbor shaft runs **PARALLEL** to rear axle. See parts drawing for proper dimensions. Torque bearing bolts to 60 foot pounds.

6.



CAUTION

CLEAN AND INSPECT BLADE COLLARS EACH TIME BLADE IS CHANGED. REPLACE DAMAGED PARTS. TO REPLACE BLADE PIN, USE ARBOR PRESS-DO NOT USE HAMMER.

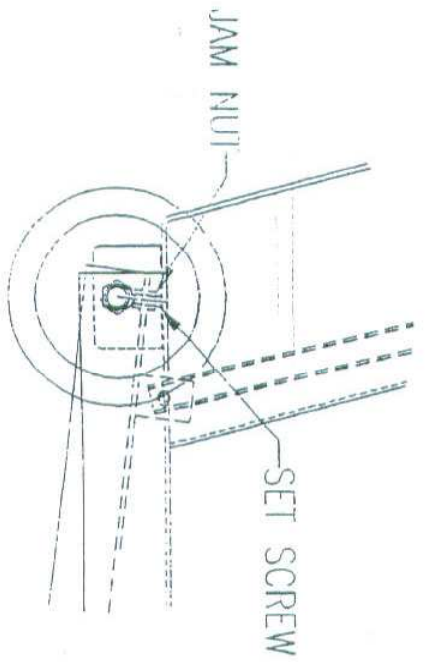


FIGURE //3

ALIGN BOTH SHEAVES TO  
WITHIN 1/32" OF EACH OTHER

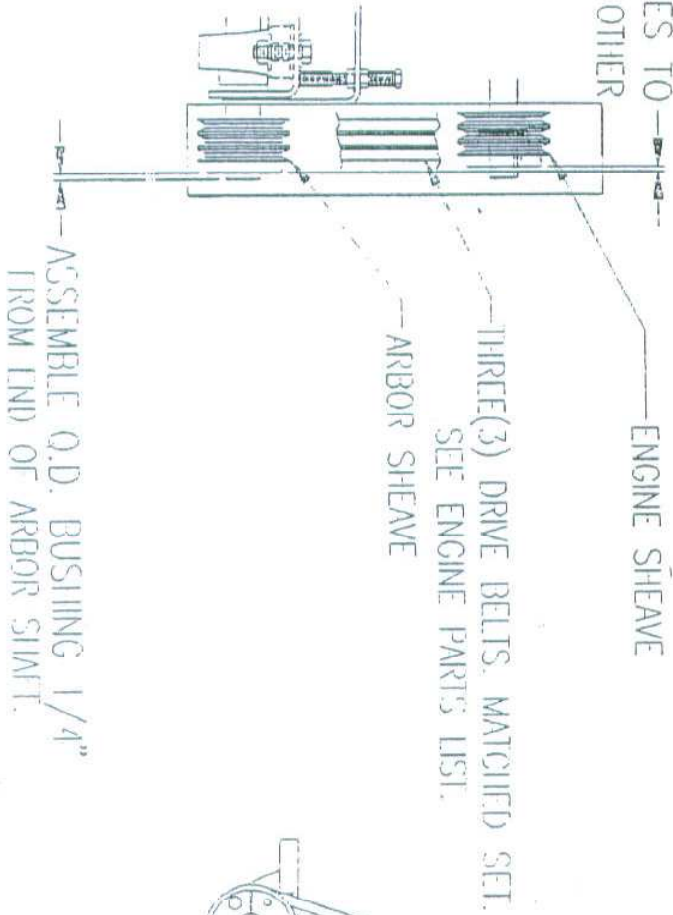
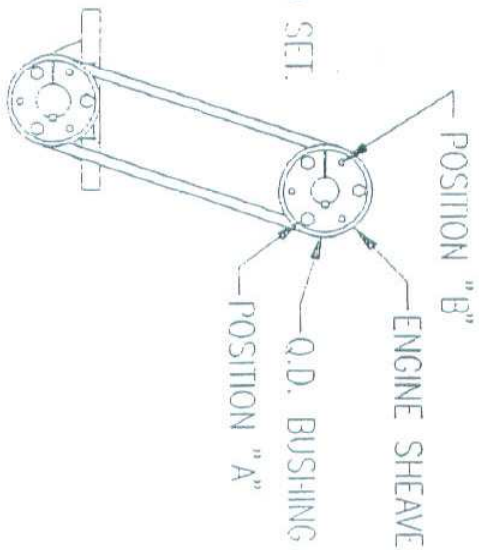


FIGURE //2





## SAW ASSEMBLY, MAINTENANCE & ADJUSTMENTS

(Cont.)

7.



CAUTION

GASOLINE FUELED ENGINE RPM IS SET AT THE FACTORY FOR WET CUT DIAMOND BLADES AT 3000 RPM. NEVER ADJUST ENGINE RPM TO EXCEED ENGINE MANUFACTURER'S MAXIMUM ALLOWABLE RPM (ENGINE DAMAGE WILL RESULT). REFER TO ENGINE MANUAL FOR ALLOWABLE RPM SETTINGS.

DO NOT EXCEED BLADE SPEEDS BEYOND BLADE MANUFACTURER'S RECOMMENDATIONS. CONSULT YOUR BLADE SUPPLIER FOR RECOMMENDED BLADE SPEEDS.

8.

Check water system for clear opening. 2 to 5 gallons per minute is required for wet cutting. Use 3/4" ID hose to feed water to saw

9.



DANGER

REMOVE BLADE BEFORE MAKING ENGINE ADJUSTMENTS THAT REQUIRE ENGINE TO RUN; I.E., CARBURETOR.

10.



CAUTION

ON GAS ENGINE POWERED SAWS USE COMPRESSED AIR TO CLEAN COOLING FINS, AIR SHROUD AND AIR INTAKE EVERY 25 HOURS OF SERVICE. WEAR EYE PROTECTION WHEN USING COMPRESSED AIR.

11.

On saws equipped with air motor, check air motor lubricant reservoir DAILY, OR AFTER EACH USE, whichever comes first.

12.

To Remove Saw Rock: (refer to fig. #3 on page 6)

- A. Place saw on flat surface.
- B. Locate set screw/jam nut over right end of rear axle.
- C. Loosen jam nut.
- D. Turn set screw CLOCKWISE to remove saw rock on right front and left rear wheels.
- E. Turn set screw COUNTER CLOCKWISE to remove saw rock on left front and right rear wheels.
- F. Hold set screw in desired position and tighten jam nut.

## SAW ASSEMBLY, MAINTENANCE & ADJUSTMENTS

(Cont)

13. Remove/Install Arbor or Engine Sheave: (Refer to page 6)
- A) NOTE: Standard sheaves on this saw are of the "QD" design. To remove sheave, remove belt guard and remove belts. (Refer to adjustment section for belt removal information).
  - B) Remove (3) hex head cap screws from (position A) sheave bushing.
  - C) Install three cap screws in tapped holes in (position B) sheave bushing.
  - D) Tighten three cap screws alternately and equally until sheave loosens from bushing.
  - E) Loosen set screw over keyway in bushing and remove sheave/bushing.
  - F) Wipe all parts clean before assembly. A light coat of grease can be applied to engine shaft or arbor shaft. Do not place lubricants on tapered bore of sheave, tapered hub of Q.D. bushing or bolt threads.
  - G) To install sheave, line-up drilled holes in bushing with tapped holes in sheave and install cap screws.
  - H) Align bushing on arbor shaft with bushing on engine shaft and tighten set screw over keyway.
  - I) Tighten (3) cap screws alternately and equally to 10 FT-LBS of torque and inspect alignment.
  - J) Verify sheave alignment with a straight edge that reaches between the two sheaves. The sheaves should be aligned with each other to within 1/32".
  - K) Readjust sheave on arbor shaft as required to achieve an alignment of within 1/32".
  - L) When sheaves are aligned properly, install and retension belts. (See belt tensioning instruction #4).
14. Assemble pointer rope and pointer wheel: see page #27 and #27A in parts manual.
15. Assemble water system: see page #28 in parts manual.



**CAUTION**

**NO OIL IN ENGINE. REFER TO ENGINE MANUAL  
FOR CORRECT OIL GRADE.**

## SAW STORAGE

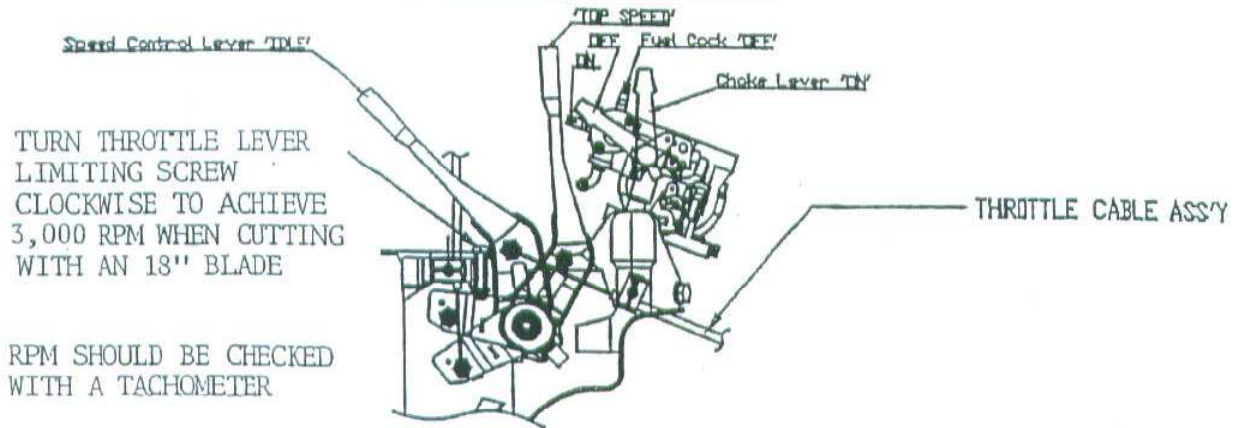
If saw is to be stored for an extended period of time (60 days or more), perform the following:

1. Follow engine storage procedures as outlined in engine manual.
2. Drain fuel tank. Use extreme caution when handling flammable fuel.
3. Remove blade, blade collars, and arbor nuts from both ends of arbor.
4. Clean arbor shaft, threads, blade collars, and arbor nuts. Coat these parts with grease or other suitable preservative.
5. Lube all bearings.
6. Empty water system.
7. Clean all moving parts, pivot points, and coat all exposed metal parts with WD-40 lubricant.
8. Lower saw completely.
9. Store saw inside a building. If this is not possible, cover saw completely with a protective cover.

# ENGINE RPM SETTINGS FOR DIAMOND BLADES

The engine RPM on the saw is set from the manufacturer at 3,900 RPM (Honda) and 3,600 RPM (Kohler) for optimum cutting performance with a 14" blade. If cutting with an 18" blade, set the engine speed to 3,000 RPM on either Honda or Kohler engine for optimum cutting performance.

## HONDA ENGINES 11 & 13HP

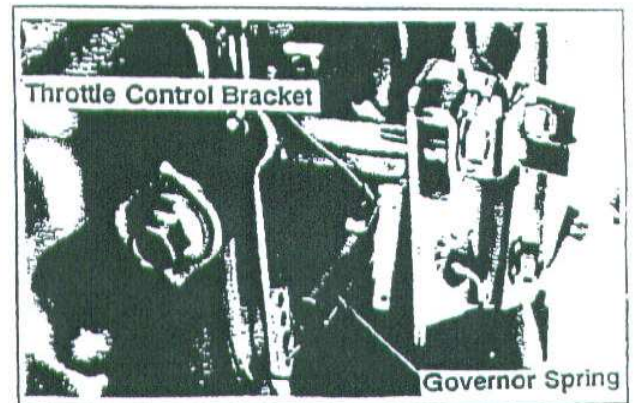


## KOHLER ENGINE 15HP COMMAND

RPM should be checked with a tachometer.

| HIGH IDLE RPM | GOV. LEVER HOLE # | THROTTLE LEVER HOLE # |
|---------------|-------------------|-----------------------|
| 3800          | 6                 | 3                     |
| 3600          | 5                 | 1                     |
| 3400          | 4                 | 1                     |
| 3200          | 3                 | 1                     |
| 3000          | 2                 | 1                     |

SET KOHLER ENGINES TO 3000 RPM SETTING AS SPECIFIED ABOVE



# INSTALLING BLADE

(Refer to page 12)



IF BLADE GUARD IS REMOVED TO SERVICE BLADE, IT MUST BE REPLACED BEFORE SAW IS RUN. NEVER RUN SAW WITHOUT BLADE GUARD INSTALLED.

1. Turn lift lower crank counterclockwise to raise front of saw so there is enough clearance to install blade. Lock crank in place with locking handle.



2.

DISCONNECT SPARK PLUG WIRE.

3. Remove arbor bolt, lockwasher, and outside blade collar with pin.
4. Clean and inspect arbor, blade collars and bolt.
5. Verify inside blade collar is fully engaged on arbor and key is positioned properly. **NOTE:** SAW-I uses 4" diameter collars.
6. Mount blade over shoulder of outside collar. Pin must engage 3/8" diameter hole in blade. Many diamond blades will have a directional arrow on blade.
7. Re-install outside blade collar and blade onto arbor shaft with 1" diameter shoulder and 3/8" pin engaging inside collar. Install bolt.

8.



TIGHTEN BOLT SECURELY. FAILURE TO TIGHTEN ARBOR BOLT PROPERLY WILL DAMAGE SAW, BLADE, AND ARBOR ASSEMBLY. RECOMMENDED TORQUE ON THIS BOLT IS 60 FT. LBS.

9. Be sure that blade is installed to rotate in correct direction and that the saw is set up for **RPM** required for the blade being used.
10. Wet cutting diamond blades must be used with water. Turn water on **BEFORE STARTING TO CUT.**

**NOTE:** DIAMOND BLADES ARE NOW AVAILABLE FOR DRY CUTTING. DRY CUTTING DIAMOND BLADES CAN BE USED WITH OR WITHOUT WATER. WET CUTTING ENHANCES BLADES LIFE AND PERFORMANCE. CONSULT THE FACTORY FOR PROPER BLADE USAGE. MILLER SELLS RITECUT DIAMOND BLADES.

# INSTALLING BLADE

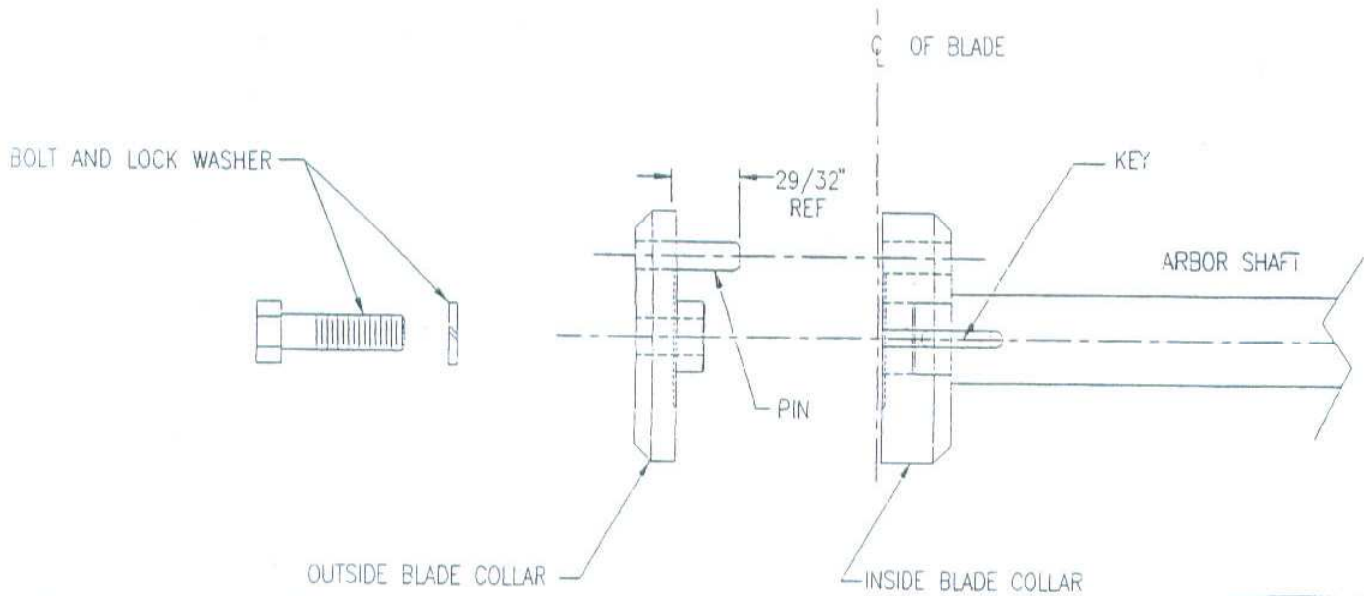
(Cont.)

11.



CAUTION

ABRASIVE BLADES CAN BE USED FOR WET OR DRY CUTTING. WET CUTTING EXTENDS BLADE LIFE. USE BLADE BLOTTERS. **RING TEST** BLADE PRIOR TO USE TO VERIFY THAT BLADE IS NOT CRACKED.



## SAW OPERATION



**INSTALL CORRECT BLADE FOR MATERIAL BEING CUT!!  
I.E. CURED CONCRETE, GREEN CONCRETE, ASPHALT, ASPHALT OVER  
CONCRETE. CONSULT THE FACTORY FOR ASSISTANCE.  
MILLER SELLS RITE CUT DIAMOND BLADES.**

1. To start engine:
  - A) With saw engine level with the ground, check the engine oil level and add oil and fuel as required.
  - B) Raise saw high enough to install blade by turning the manual lift crank COUNTER-CLOCKWISE. Lock lift/lower crank in place with locking handle.
  - C) Install blade.
  - D) After blade is installed, raise saw high enough to allow 2" of clearance between the bottom of the blade and the ground. Lock lift/lower crank in place with locking handle.
  - E) Open engine fuel valve.
  - F) Start engine. Use choke as needed. Let engine warm up at 1/4 to 1/2 throttle under no load for 5 minutes.
  
2. To prepare to saw:
  - A) Line up saw pointer with chalk/cut line. Keep blade clear of pavement.



**THE ONLY OPERATING POSITION FOR THIS SAW IS BETWEEN  
THE HANDLEBARS AT THE REAR OF THE SAW. IF THE OPERATOR  
MUST LEAVE THIS POSITION THE ENGINE MUST BE SHUT DOWN.  
NEVER LEAVE SAW UNATTENDED WHILE IT IS RUNNING.**

3. To wet cut:

**NOTE: WATER SUPPLY AND PRESSURE MUST BE SUPPLIED TO SAW FROM A REMOTE SOURCE: EXAMPLES ARE CITY WATER PRESSURE FROM HOME, BUSINESS, FIRE HYDRANT. OR, WATER TANK TRUCK EQUIPPED WITH PUMP THAT WILL MOVE AT LEAST 8 GALLONS OF WATER PER MINUTE.**


  - A) Connect water supply hose to swivel fitting of water valve at right rear of saw.
  - B) Turn water valve lever to the "on" position. Water valve lever is in the "on" position when the lever is in line with the valve body.
  
4. To dry cut:
  - A) Turn water valve lever to "off" position. Water valve lever is in the "off" position when the lever is perpendicular to valve body.
  - B) Disconnect water supply hose and move it to a position away from cutting area.

## SAW OPERATION

(Cont.)

5. To start sawing:

- A) Pull engine throttle to "full on position". Engine must run at full throttle.
- B) Lower saw blade until it just touches the pavement by turning the manual lift crank **CLOCKWISE**.
- C) From this point each 1/4 turn of the lift/lower crank handle equals 1/4" depth of cut.
- D) It is recommended that saw cuts be made in increments of 2" to 3" at a time. Greater depths of cut risk damage to blade. Use special care in aligning blade to be inserted into a previously made cut.


E)  **CAUTION** SLOWLY LOWER BLADE INTO CUT.

- F) When saw is lowered to cutting depth lock lift/lower crank in place with locking handle.
- G) Slowly push saw forward.


 **CAUTION**

SHOULD ENGINE LUG DOWN AND LOSE SPEED WHILE CUTTING, DECREASE SAW TRAVEL SPEED UNTIL ENGINE STOPS LUGGING. SHOULD SAW TRY TO CLIMB OUT OF THE CUT, SLOW CUTTING SPEED DOWN UNTIL BLADE DROPS FULLY BACK INTO CUT. IF EITHER CONDITION CONTINUES, CHECK TO BE SURE THE CORRECT BLADE IS BEING USED FOR THE MATERIAL BEING CUT.

- H) Cut only in a straight line. Some steering of saw by leaning on handles may be required. Avoid excessive leaning on handles to steer saw in cut.

I)  **DANGER** SHOULD ENGINE STALL IN CUT, LIFT BLADE OUT OF CUT **BEFORE** RESTARTING ENGINE.

- J) Complete cut. Lift front of saw until blade clears ground by a minimum of 1" to 2".

K)  **DANGER** IF ADDITIONAL CUTS ARE TO BE MADE, TURN WATER VALVE TO "OFF" POSITION, **TURN ENGINE OFF,** AND MOVE SAW TO NEXT CUTTING AREA.



# PARTS SECTION

## STURDI SAW "SAW I"

# PARTS SECTION

## Sturdi-Saw 1

| SAW MODEL S | ENGINE DESCRIPTION                  | BELT SIZE PART#          | ENGINE S HEAVE (PULLEY) | Q.D. BUSH NG FOR ENGINE S. EAVE |
|-------------|-------------------------------------|--------------------------|-------------------------|---------------------------------|
| MCS-1       | Saw Less Engine                     | <b>Customer Supplies</b> |                         |                                 |
| MCS-1: H    | 13HP Honda "QXC" Model Part# EN650  | 3VX-315 Part# BL0400     | PM0200 3-Groove Pulley  | BS0400                          |
| MCS-1:K     | 15HP Kohler Model C15T Part# EN0250 | 3VX-315 Part# BL0200     | PM0200 3-Groove Pulley  | BS0400                          |

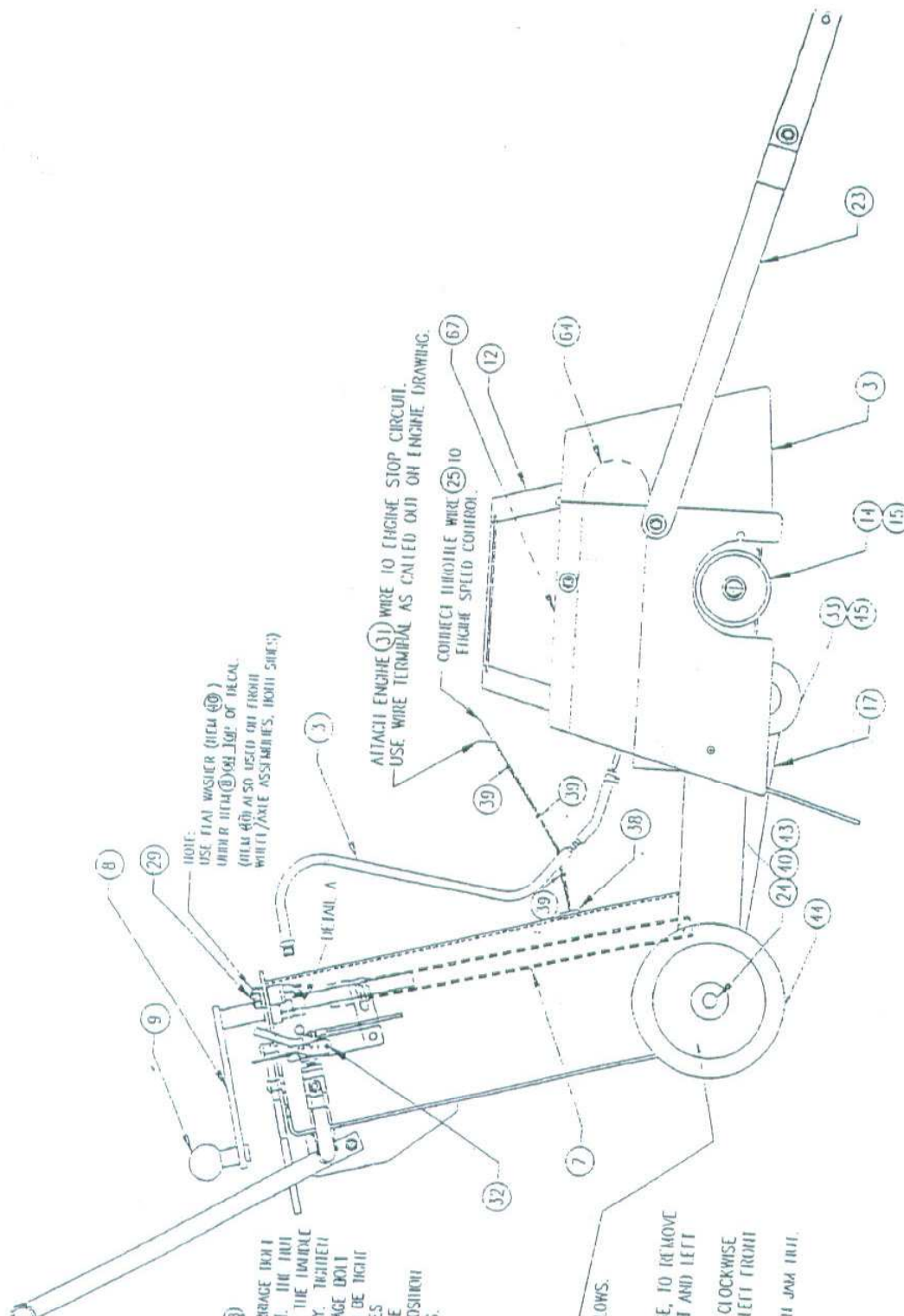
\*\*\* NOTE: Three (3) belts required for Sturdi-Saw .  
Belts are COG TYPE and should be purchased in matched sets.  
Miller part number is for one (1) belt. Always order three (3) belts.

### INSTALLATION OF ENGINE ON SAW OTHER THAN ABOVE:

Gas engines (11 to 16 HP) other than those listed above can be mounted on this saw. Consult the factory for mounting templates. Follow engine manufacturer's manual for throttle and stop switch hookup. Set governed engine speed at 3,000 RPM for wet cut diamond blades. For blades other than wet cut diamond, set engine speed at RPM required for blade being used, or set RPM at engine manufacturer's maximum allowable RPM, WHICHEVER IS LESS. NEVER EXCEED ENGINE MANUFACTURER'S MAXIMUM ALLOWABLE RPM OR ENGINE DAMAGE MAY OCCUR.

# GENERAL ARRANGEMENT

| ITEM | QTY | PART#    | DESCRIPTION  |
|------|-----|----------|--|
| 1    | 1   | 46032-01 | Saw-I Frame  |
| 2    | 1   | 26001-01 | Dash Decal   |
| 7    | 1   | 46035-01 | Support Pipe, Crank  |
| 8    | 1   | 46035-06 | Crank  |
| 9    | 1   | MS0400   | Ball Knob  |
| 11   | 1   | 46041-01 | Handlebars   |
| 11A  | 2   | CG0100   | Handle Bar Grips   |
| 12   | 1   | 46046-01 | R.H. Cut Belt Guard  |
| 17   | 1   | 46037-01 | Undercarriage  |
| 18   | 1   | 46036-01 | Lock Lever for Crank   |
| 18A  | 1   | SN0200   | Spring for Lock Lever  |
| 19   | 1   | 46044-01 | Motor Mount  |
| 23   | 2   | 46045-32 | Saw Blade Pointer Arm  |
| 24   | 1   | 46037-09 | Rear Axle  |
| 25   | 1   | CT0100   | Throttle Cable   |
| 26   | 1   | 40013-09 | Blade Wrench   |
| 28   | 2   | PM0200   | 3 Groove, 3V Section Q.D. Sheave   |
| 29   | 1   | 100040   | Stop Switch Assembly   |
| 29A  | 1   | EM0100   | Stop Switch (Only)   |
| 32   | 2   | HW0001   | #8-32 X 1/2" LG. Hex Socket Button Head Cap Screw with Flatwasher & Locknut (46031-32)   |
| 33   | 2   | 40015-33 | 4" X 2" Front Wheel  |
| 34   | 1   | BE0500   | Thrust Bearing, Crank  |
| 35   | 2   | 46035-18 | Acme Nut, Crank  |
| 36   | 2   | HW0001   | 3/8" NC Tap Bolt X 3-1/2" LG. W/ Spring Lockwasher & Hex Nut (46031-36)  |
| 37   | 1   | BS0200   | S.H. Q.D. Hub W/ 1-1/4" Bore   |
| 38   | 1   | GR0100   | Rubber Grommet (46031-38)  |
| 40   | 5   | HW0001   | 3/4" SAE Flat Washer (46031-40)  |
| 43   | 4   | 46037-14 | Set Collar 3/4" I.D. (Front & Rear Wheel)  |
| 44   | 2   | 46031-44 | 8" X 2" Rear Wheel   |
| 45   | 2   | BE0350   | Pillow Block Ball Bearing, Arbor Shaft   |
| 50   | 8   | 40015-48 | Replacement 3/4" Bore Bearing for Part# 46031-44 (8" Wheel) and 46031-33 (4" wheel) NOTE: (2 Bearings per Wheel) Old# 46031-50 |
| 52   | 4   | HW0001   | 3/8" NC X 3/4" LG. HHCS with Locknut (46031-52)  |
| 53   | 4   | HW0001   | 3/8" NC X 2" LG. HHCS w/ (2) USS Flatwasher and (1) Locknut (46031-53)   |
| 57   | 1   | HW0001   | 3/8" NC X 2" LG. HHCS with Locknut (46031-57)  |
| 58   | 2   | HW0001   | 3/8" USS Flatwasher Plated (46031-58)  |
| 59   | 3   | HW0001   | 3/8" NC X 1" LG. HHCS W/ Locknut (46031-59)  |
| 60   | 2   | 40014-13 | Bearing Support Plate  |
| 64   | 2   | DE0900   | "STURDI-SAW" Decal (46003-01)  |
| 66   | 1   | DE2100   | "NO OIL IN ENGINE" Decal   |
| 67   | 1   | DE0300   | "CAUTION/ SAFETY" Decal for Blade Guard  |
| 68   | 1   | DE1700   | ENGINE CALIFORNIA EXHAUST (Warning Decal)  |
| 69   | 1   | BS0400   | S.H. Q.D. Bushing W/ 1" Bore (Engine)  |



NOTE:  
TENSIONING LOCKING JAW (13)

TIGHTEN LOCK NUT UNDER CARTRIDGE (14) CLOSEST TO CRANK-PIVOT POINT. THE NUT SHOULD BE TIGHT ENOUGH THAT THE JAWBITE SWINGS FREE WITH MINOR PLAY. TIGHTEN THE LOCKNUT UNDER THE CARTRIDGE BODY WITH SPRING. THE NUT SHOULD BE TIGHT ENOUGH THAT THE SPRING CAUSES RESISTANCE TO HOLD THE JAWBITE IN THE LOCKED OR UNLOCKED POSITION DURING SAW CUTTING OPERATIONS.

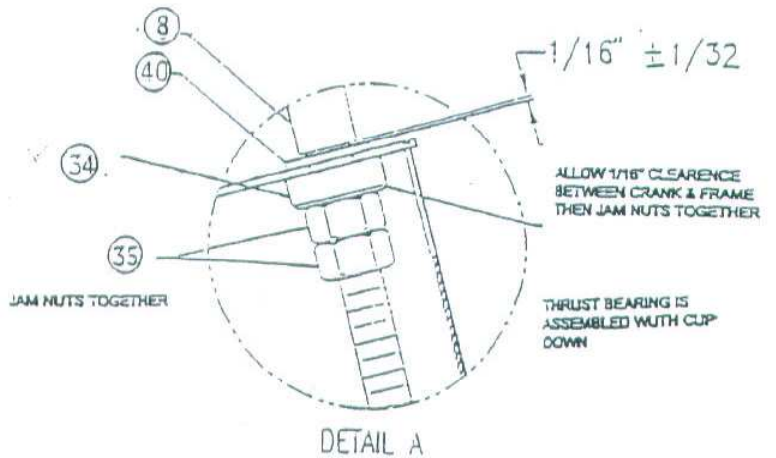
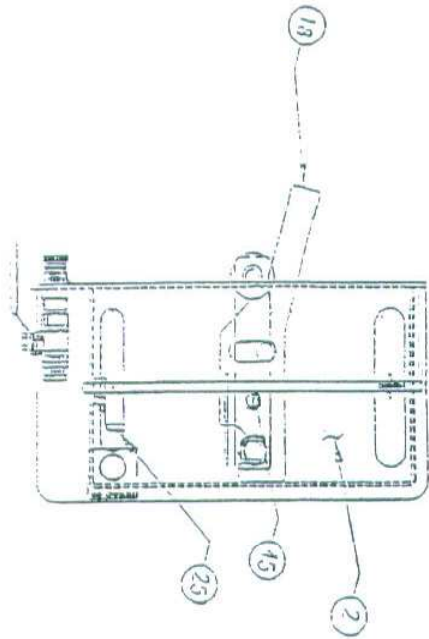
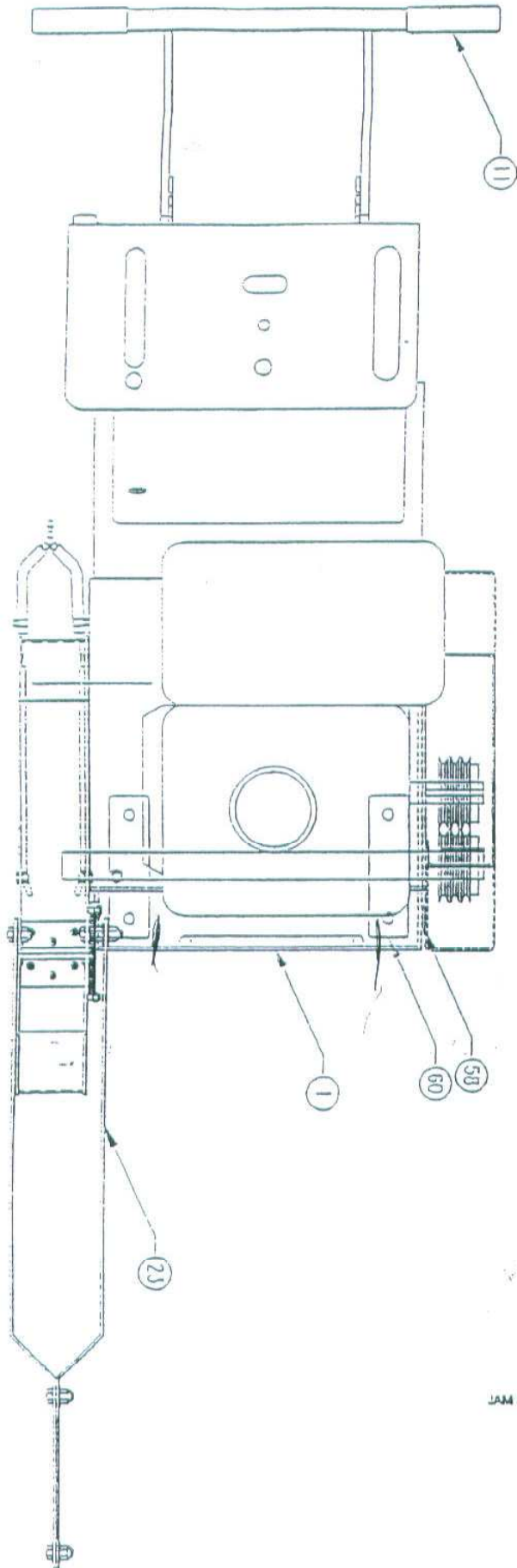
SAW LEVEL ADJUSTMENT  
PLACE SAW ON FLAT SURFACE.  
IF SAW ROCKS, ADJUST AS FOLLOWS.

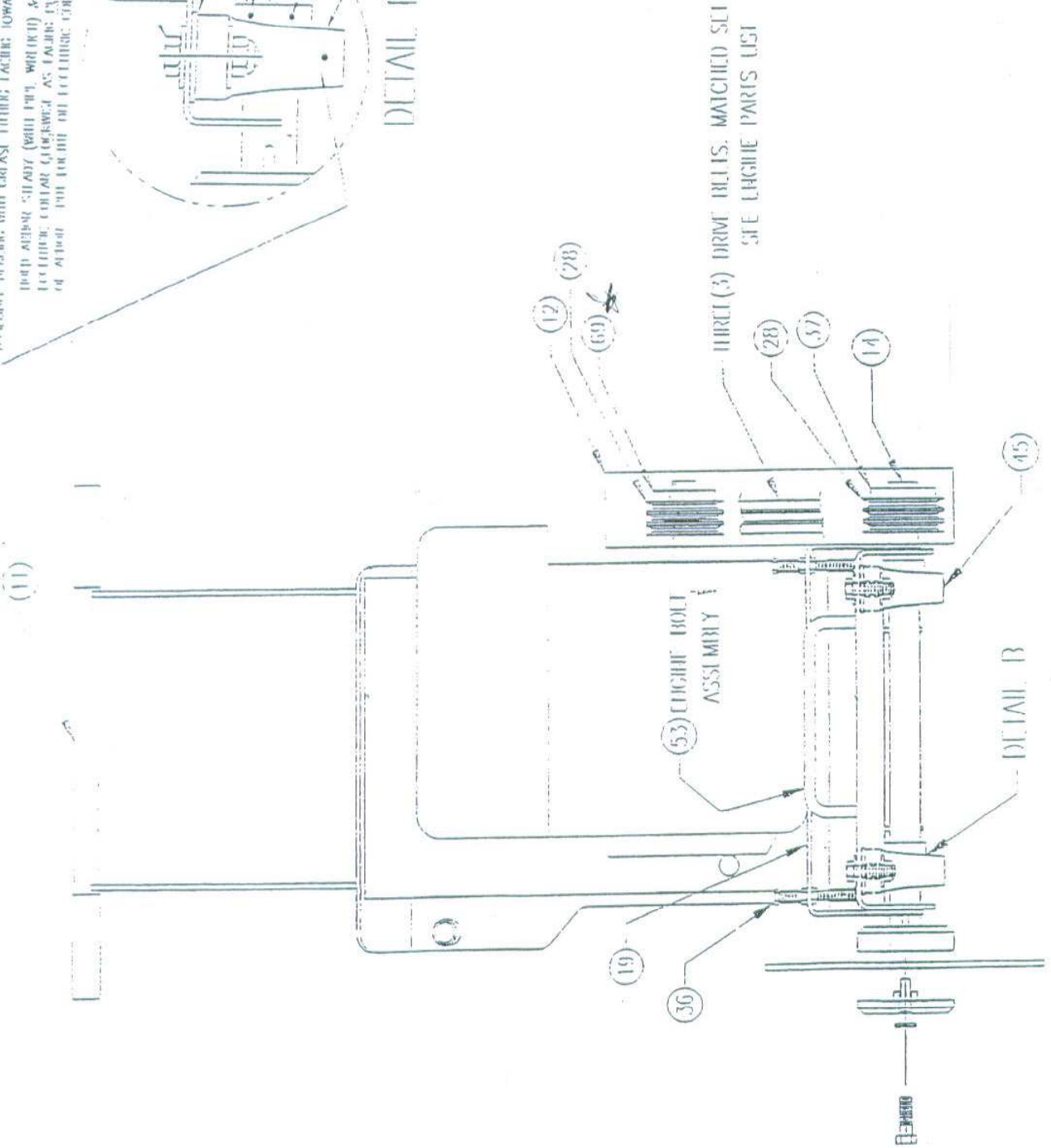
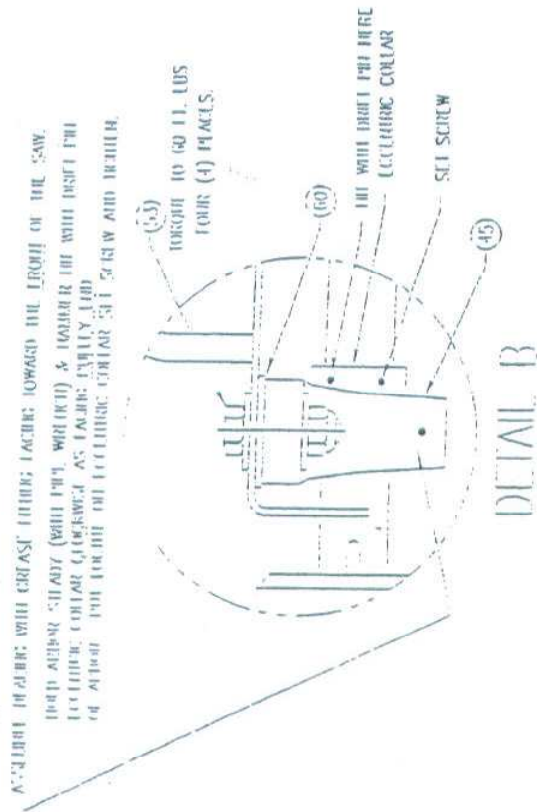
- 1) LOOSEN JAW NUT.
- 2) TURN SET SCREW CLOCKWISE, TO REMOVE SAW ROCK ON RIGHT FRONT AND LEFT REAR WHEELS.
- 3) TURN SET SCREW COUNTER CLOCKWISE TO REMOVE SAW ROCK ON LEFT FRONT AND RIGHT REAR WHEELS.
- 4) HOLDING SET SCREW, TIGHTEN JAW NUT.

NOTE:  
USE FLAT WASHER (ITEM 29) UNDER ITEM (13) ON TOP OF BECAL. (ITEM 40) ALSO USED ON FRONT WHEEL/AXLE ASSEMBLIES, BOTH SIDES.)

ATTACH ENGINE (1) WIRE TO ENGINE STOP CIRCUIT. USE WIRE TERMINAL AS CALLED OUT ON ENGINE DRAWING.

CONNECT THROTTLE WIRE (25) TO ENGINE SPEED CONTROL.





## ARBOR SHAFT ASSY.

| ITEM | PART#    | QTY.<br>R.H. ARBOR | QTY.<br>DUAL ARBOR | DESCRIPTION   |
|------|----------|--------------------|--------------------|---|
| 1    | 46033-01 | 1                  | 0                  | Right Hand Q R Arbor Shaft Assy ✓                         |
| 3    | 46033-3  | 1                  | 0                  | Right Hand Arbor Shaft, Q R ✓                             |
| 4    | 46033-4  | 0                  | 1                  | Dual Cut Arbor Shaft, Q R ✓                               |
| 5    | 46033-5  | 1                  | 2                  | Outside Blade Collar W/ Pin ✓                             |
| 7    | 46033-7  | 1                  | 2                  | Alloy Dowell Pin ✓  |
| 8    | 46033-8  | 1                  | 2                  | Inside Blade Collar ✓                                     |
| 9    | HW0001   | 1                  | 1                  | 1/4" X 2" Sqare Key (46033-09)                            |
| 10   | HW0001   | 1                  | 2                  | 1/4" X 1" Sqare Key (46033-10)                            |
| 11   | HW0001   | 1                  | 2                  | 1/2" NC HHCS X 1-3/4" LG W/ Spring-Lock Washer (46033-11) |
| 13   | 40013-09 | 1                  | 1                  | Blade Wrench, Q R   |



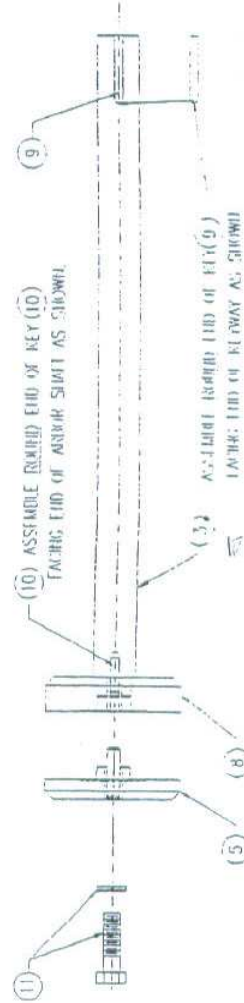
DETAIL ITEM (2)  
DUAL CUT ARBOR ASSEMBLY

ASSEMBLY NOTE.

CLEAN DIRT AND OIL FROM INSIDE BLADE COLLAR (8), KEY (10), AND 1-1/16" I.G. KEYWAY IN ARBOR (3) OR (4). APPLY THREE (3) DROPS OF SAE 1-10K "T-70" THREAD LOCKING SEALANT (OR EQUAL) TO BOTH KEYWAY AND ON STEPPED SHOULDER OF ARBOR SHAFT (3) OR (4). FULLY SEAL KEY (10) IN BOTTOM OF KEYWAY IN ARBOR SHAFT. NOTE DIRECTION OF ROUND END OF KEY IN KEYWAY OF ARBOR SHAFT.

TO ASSEMBLE BLADE COLLARS, FIRST POSITION INSIDE BLADE COLLAR ON STEPPED SHOULDER OF ARBOR SHAFT WITH 1/4" CHAMFER FACING TOWARD ARBOR SHAFT. PRESS COLLAR ON AS FAR AS POSSIBLE BY HAND THEN ASSEMBLE STEPPED SHOULDER OF OUTSIDE BLADE COLLAR (5) INTO BORE OF INSIDE BLADE COLLAR, ALIGNING PIN (7) WITH HOLE IN INSIDE COLLAR. INSERT BOLT ASSEMBLY (1) INTO END OF ARBOR SHAFT AS SHOWN. TIGHTEN BOLT ASSEMBLY UNTIL INSIDE BLADE COLLAR (8) IS FULLY SEALED AGAINST STEPPED SHOULDER OF ARBOR SHAFT (3) OR (4). CAUTION: DO NOT PUT ANY THREAD LOCKING SEALANT ON BOLT ASSEMBLY (1).

ON DUAL CUT SHAFT ASSEMBLY, ASSEMBLE COLLARS ON BOTH ENDS.

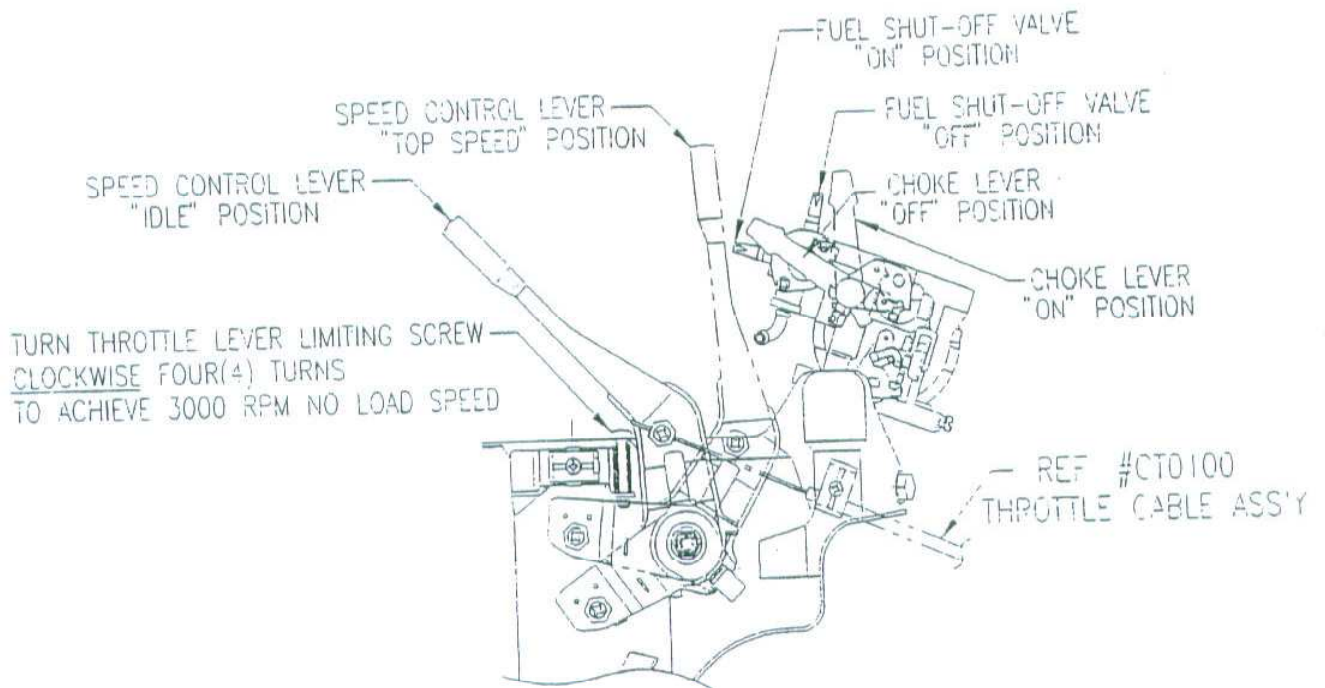


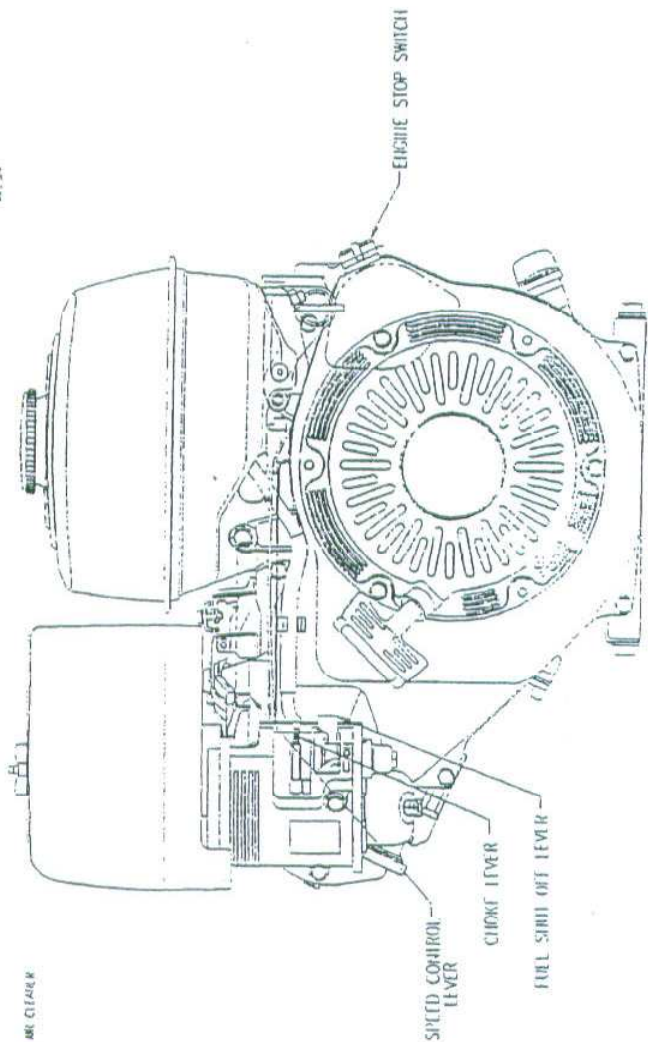
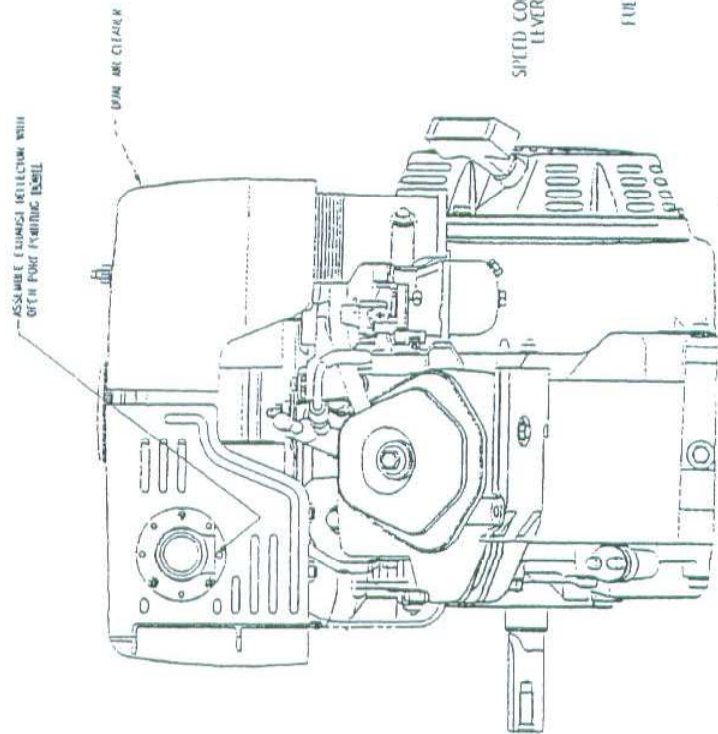
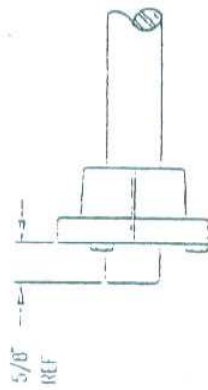
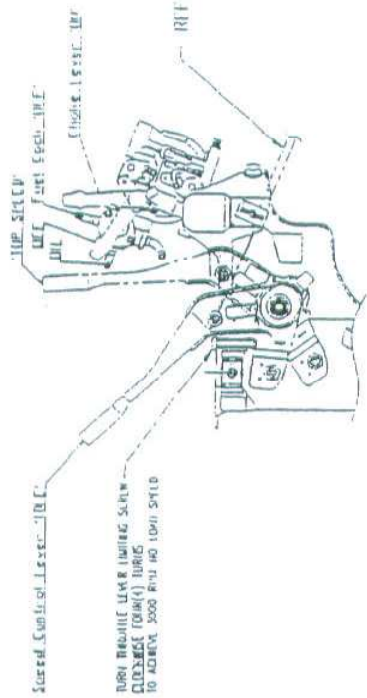
DETAIL ITEM (1)  
RIGHT HAND CUT ARBOR ASSEMBLY



# SAW-I ENGINE (13HP HONDA)

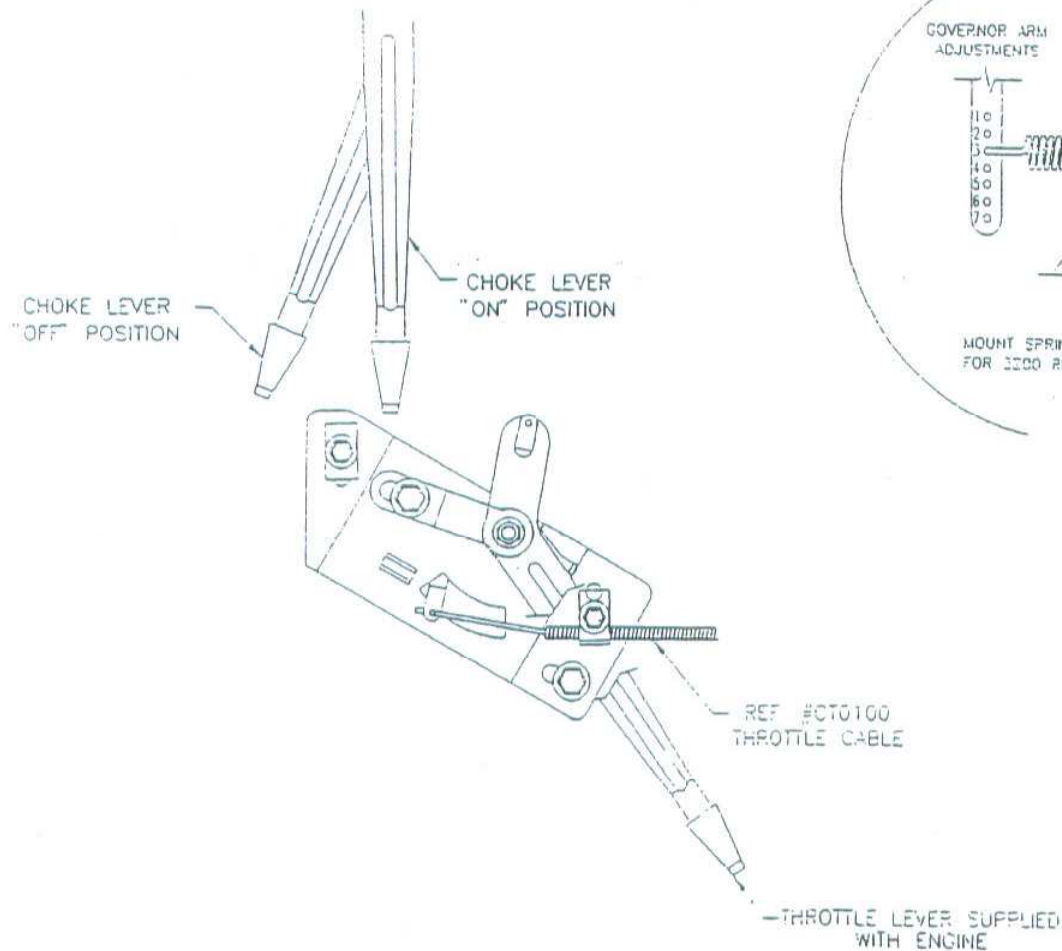
| ITEM | QTY. | PART#  | DESCRIPTION   |
|------|------|--------|---|
| 1    | 1    | EN0650 | 13HP Honda QXC-Engine                                 |
| 2    | 4    | HW0001 | 3/8" NC HHCS x 1-3/4" LG. w/ SAE F W & L.N (46038-02) |
| 3    | 3    | BL0400 | 3V Cog Belt (Matched Set)                             |
| 4    | 1    | BS0400 | SH QD Bushing W/ 1" Diameter Hole                     |
| 5    | 1    | HW0001 | 1/4" Square Key X 2" LG (46038-05)                    |
| 6    | 1    | HW0001 | Quick Splice Terminal (46038-06)                      |
| 7    | 1    | HW0001 | 1/4" I D Loom Clamp (46038-07)                        |
| 8    | 2    | PM0200 | 3 Groove, 3V Section Q.D Sheave                       |

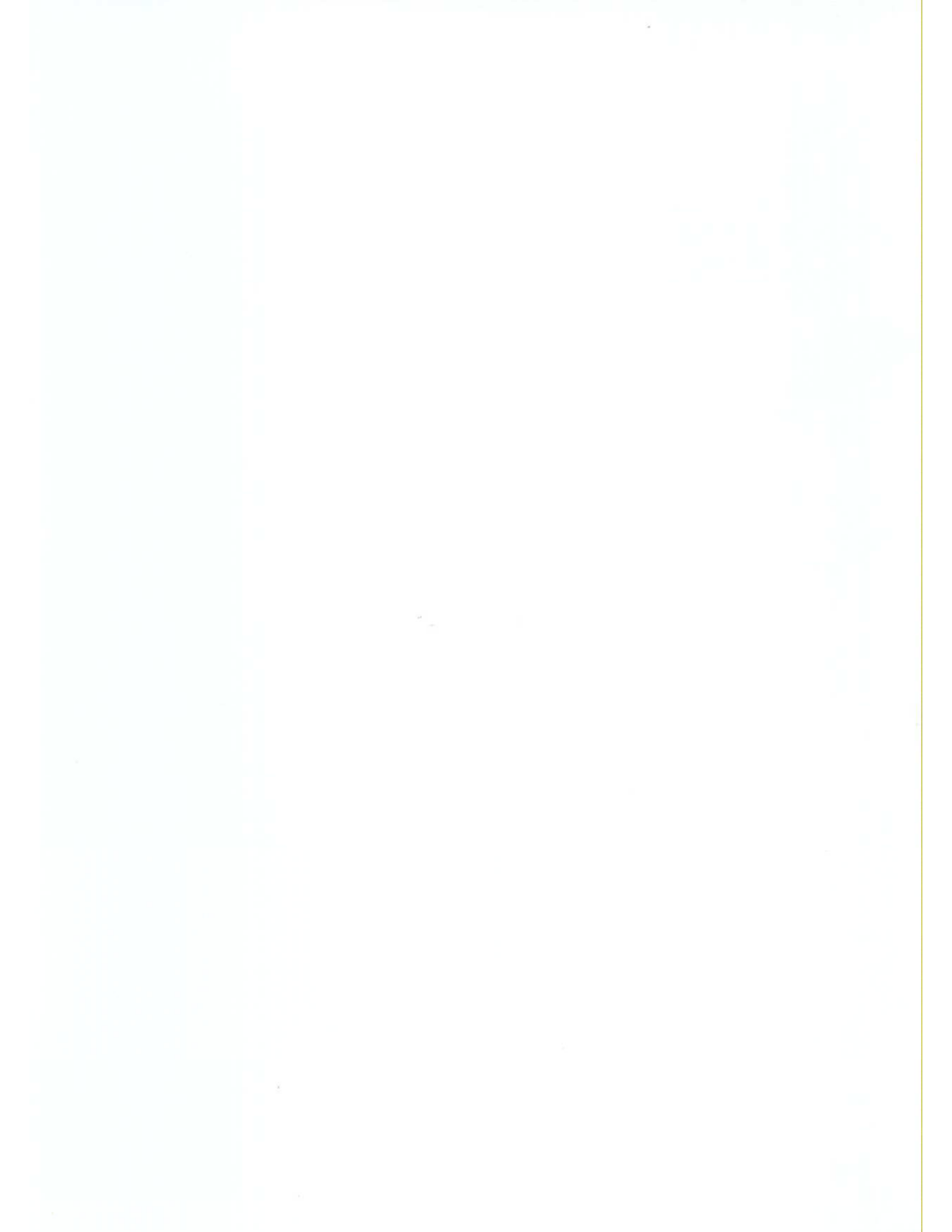




# SAW-I ENGINE (KOHLER)

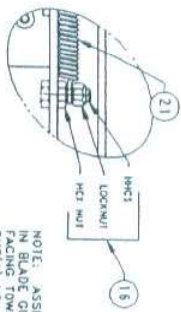
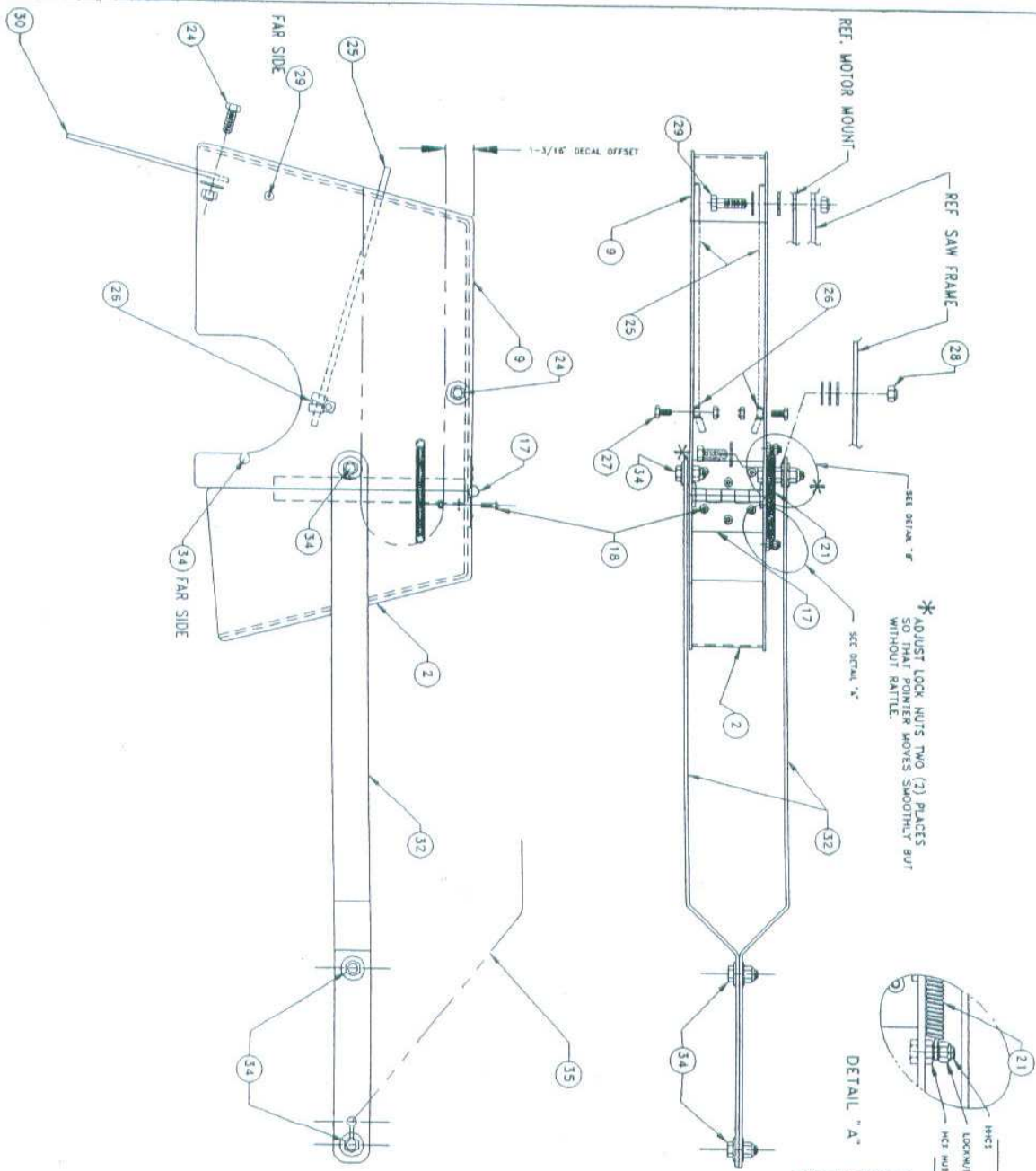
| ITEM | QTY. | PART#  | DESCRIPTION  |
|------|------|--------|--|
| 1    | 1    | EN0250 | 15HP Kohler Recoil Start Engine (46040-01)                           |
| 2    | 1    | EN0050 | Muffler/ Manifold Assembly (46040-02)                                |
| 3    | 4    | HW0001 | 3/8" NC HHCS x 1-1/4" LG. w/ USS F.W. & Split Lock-washer (46040-02) |
| 4    | 3    | BL0200 | 3V Cog Belt  |
| 5    | 1    | BS0400 | SH QD Bushing W/ 1" Diameter Hole                                    |
| 6    | 1    | HW0001 | 1/4" Square Key X 2" LG. (46040-05)                                  |
| 7    | 1    | HW0001 | Insulated Male Blade Terminal (46040-06)                             |
| 8    | 2    | PM0200 | 3 Groove, Q.D. Sheave  |
| 9    | 1    | HW0001 | Pipe Nipple X 4" Long (46040-08)                                     |
| 10   | 1    | HW0001 | Pipe Clamp (46040-09)  |





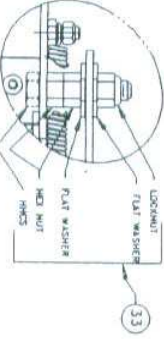
## BLADE GUARD SAW-I

| ITEM | PART#    | QTY.<br>R.H. Arbor | QTY.<br>Dual Arbor | DESCRIPTION  |
|------|----------|--------------------|--------------------|--|
| 2    | 46045-02 | 1                  | 2                  | 12-18" Blade Guard Front Weldment  |
| 9    | 46045-09 | 1                  | 2                  | 12-18" Blade Guard Back Weldment   |
| 16   | HW0001   | 2                  | 4                  | 1/4" NC HHCS X 1" LG w/Lock Nut (46045-16)   |
| 17   | SH0500   | 1                  | 2                  | Stainless Steel Hinge  |
| 18   | HW0001   | 6                  | 12                 | #10-32 Button-Head Cap Screw X 5/8" LG.<br>W/ SAE FW & Nylock Nut Stainless(46045-18)  |
| 21   | SN0400   | 1                  | 2                  | Spring, Blade Guard(46045-21)  |
| 24   | HW0001   | 3                  | 5                  | 3/8" NC HHCS X 1" LG. W/USS FW & Locknut<br>(46045-24)                                 |
| 25   | 46045-25 | 2                  | 4                  | Water Tubes  |
| 26   | HW0001   | 2                  | 4                  | Loom Clamp (46045-26)  |
| 27   | HW0001   | 2                  | 4                  | 1/4" NC HHCS X 1/2" LG. W/ Locknut (46045-27)  |
| 28   | HW0001   | 1                  | 2                  | 3/8" NC HHCS X 1" LG. W/ (4) USS FW &<br>(1) Locknut (46045-28)                        |
| 29   | HW0001   | 1                  | 2                  | 3/8" NC HHCS X 1-1/4" LG. W/(2) USS FW &<br>(1) Locknut (46045-29)                     |
| 30   | MS0600   | 1                  | 2                  | Rubber Mud Flap  |
| 32   | 46045-32 | 2                  | 4                  | Pointer Arm Only   |
| 33   | HW0001   | 1                  | 2                  | 3/8" NC Tap Bolt X 1-1/2" LG. W/ (2) Hex Nuts,<br>(3) USS F.W.; (1) Locknut (46045-33) |
| 34   | HW0001   | 3                  | 6                  | 3/8" NC HHCS X 1" LG. W/ (2) USS F.W. &<br>(1) Locknut (46045-34)                      |
| 35   | 46045-35 | 1                  | 2                  | Nylon Rope, Pointer  |
| 37   | 46045-37 | 1                  | 1                  | Vinyl Washer   |
| 38   | HH0500   | 1                  | 1                  | Garden Hose Adapter  |
| 39   | MS0800   | 1                  | 2                  | Water Valve  |
| 40   | 46045-40 | 1                  | 2                  | Reducer Bushing  |
| 41   | HW0001   | 1                  | 2                  | Close Nipple (46045-41)  |
| 42   | 46045-42 | 1                  | 2                  | Male Pipe to Male Barbed Hose Adapter  |
| 43   | 46045-43 | 1                  | 1                  | 24" Water Hose   |
| 44   | FG0300   | 1                  | 2                  | "Y" Connector (46045-44)   |
| 45   | 46045-45 | 2                  | 4                  | 4" Water Hose  |
| 46   | 46045-46 | 2                  | 4                  | Water Hose Clamp   |
| 47   | HW0001   | 0                  | 1                  | Pipe Nipple (46045-47)   |
| 48   | 46045-48 | 0                  | 1                  | 36" Water Hose   |
| 49   | HW0001   | 0                  | 1                  | Pipe Tee (46045-49)  |
| 51   | 46045-51 | 1                  | 1                  | Pointer Wheel  |
| 52   | HW0001   | 1                  | 2                  | 7/16" HHCS X 2"lg w/Hex Nut & Hex Lock Nut   |



NOTE: ASSEMBLE 1/4" NC X 3/4" HRCS (ITEM 19) IN BLADE GUARD HOLES TWO (2) PLACES AS SHOWN WITH BOLT FACING TOWARD CENTER OF SAW. ASSEMBLE AND TIGHTEN ONE (1) HEX NUT TWO (2) PLACES. ASSEMBLE SPRING BETWEEN TWO (2) BOLTS. INSTALL A LOCK NUT ON EACH BOLT TO SECURE SPRING.

ADJUST LOCK NUTS TWO (2) PLACES SO THAT SPRING AND FRONT HALF OF BLADE GUARD MOVE SMOOTHLY BUT WITHOUT BINDING.

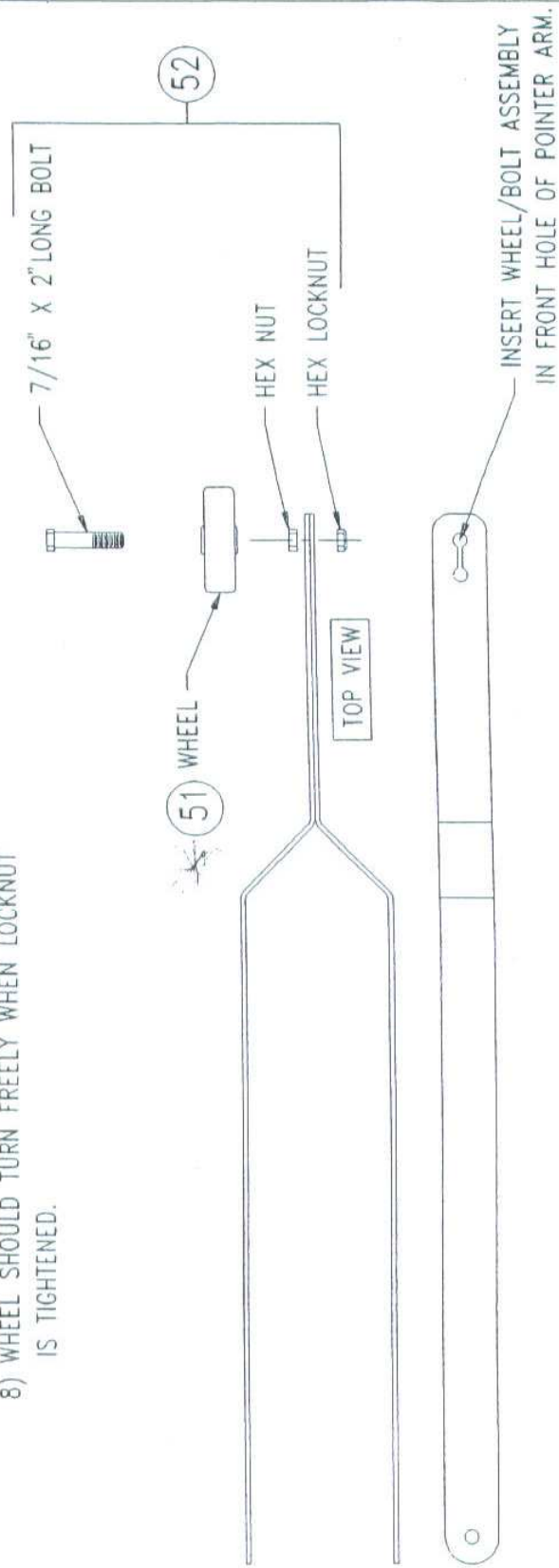


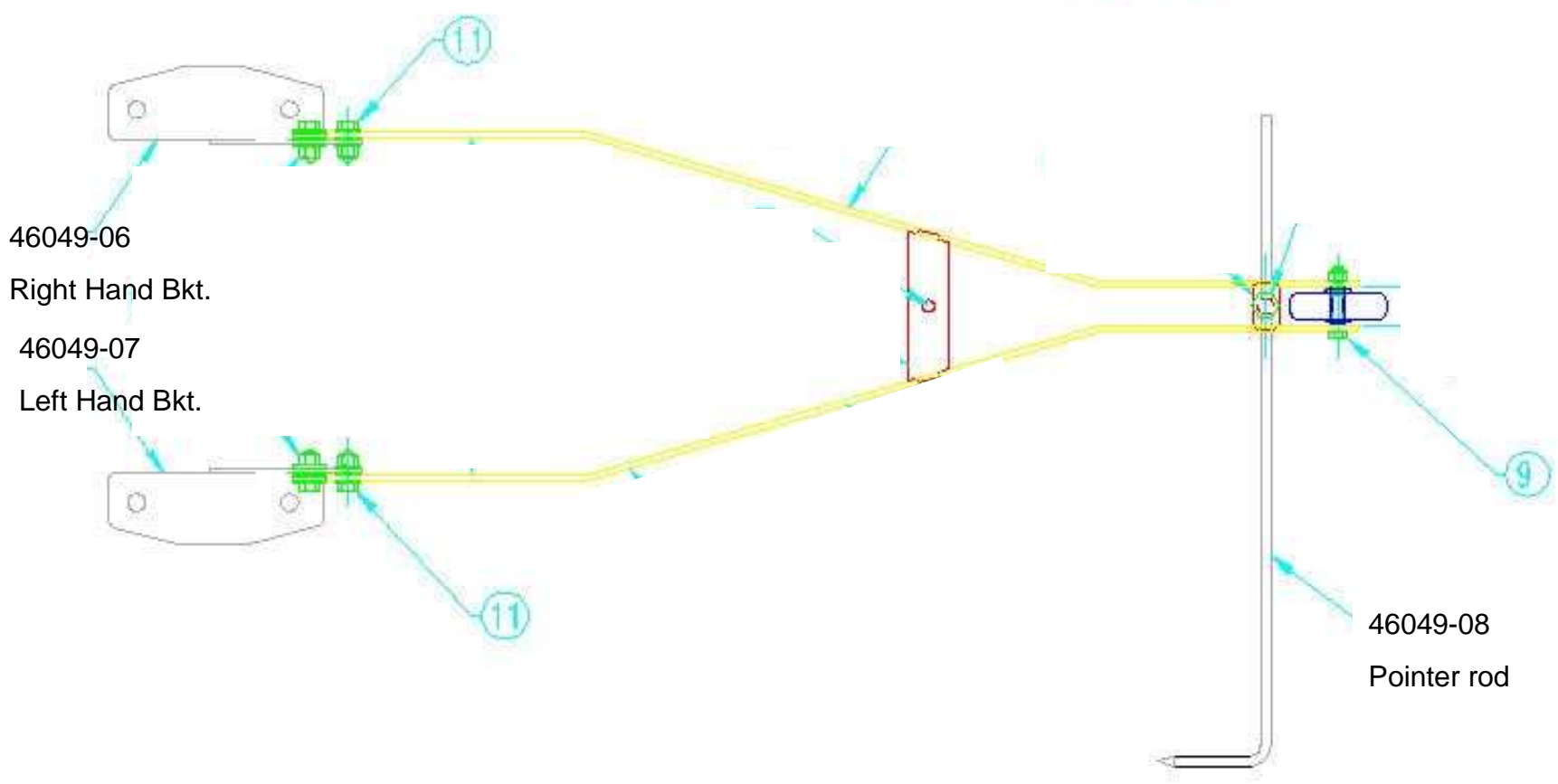
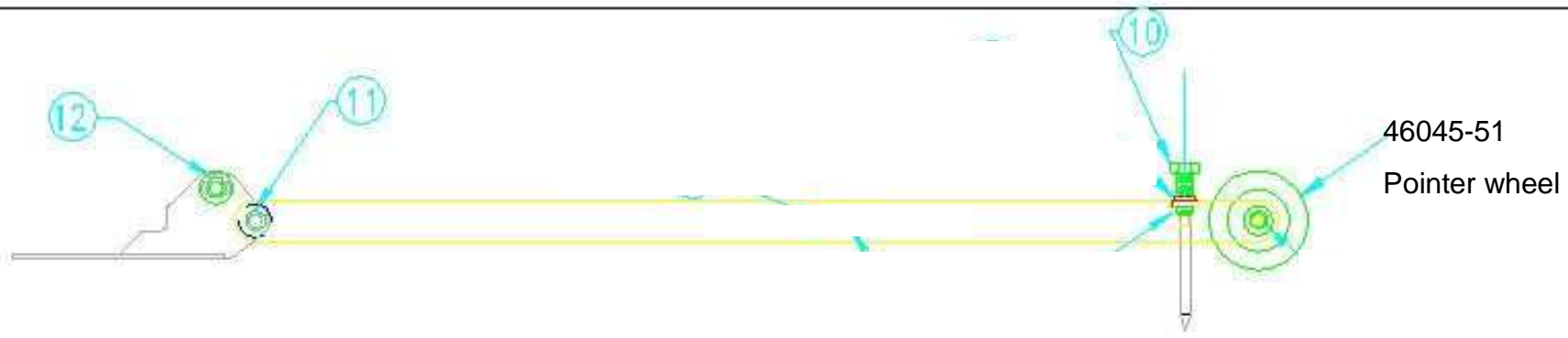
NOTE: ASSEMBLE 3/8" NC X 1-3/4" HRCS (ITEM 39) IN BLADE GUARD HOLE AS SHOWN WITH BOLT FACING TOWARD CENTER OF SAW AND TIGHTEN ONE (1) HEX NUT INSIDE BLADE AND ASSEMBLE AND TIGHTEN ONE (1) THEN ASSEMBLE INSIDE POINTER ARM WITH A FLAT WASHER ON EACH SIDE OF POINTER ARM.

ADJUST LOCK NUTS TWO (2) PLACES (ITEMS 33 & 34) SO THAT POINTER MOVES SMOOTHLY BUT WITHOUT RATTLE.

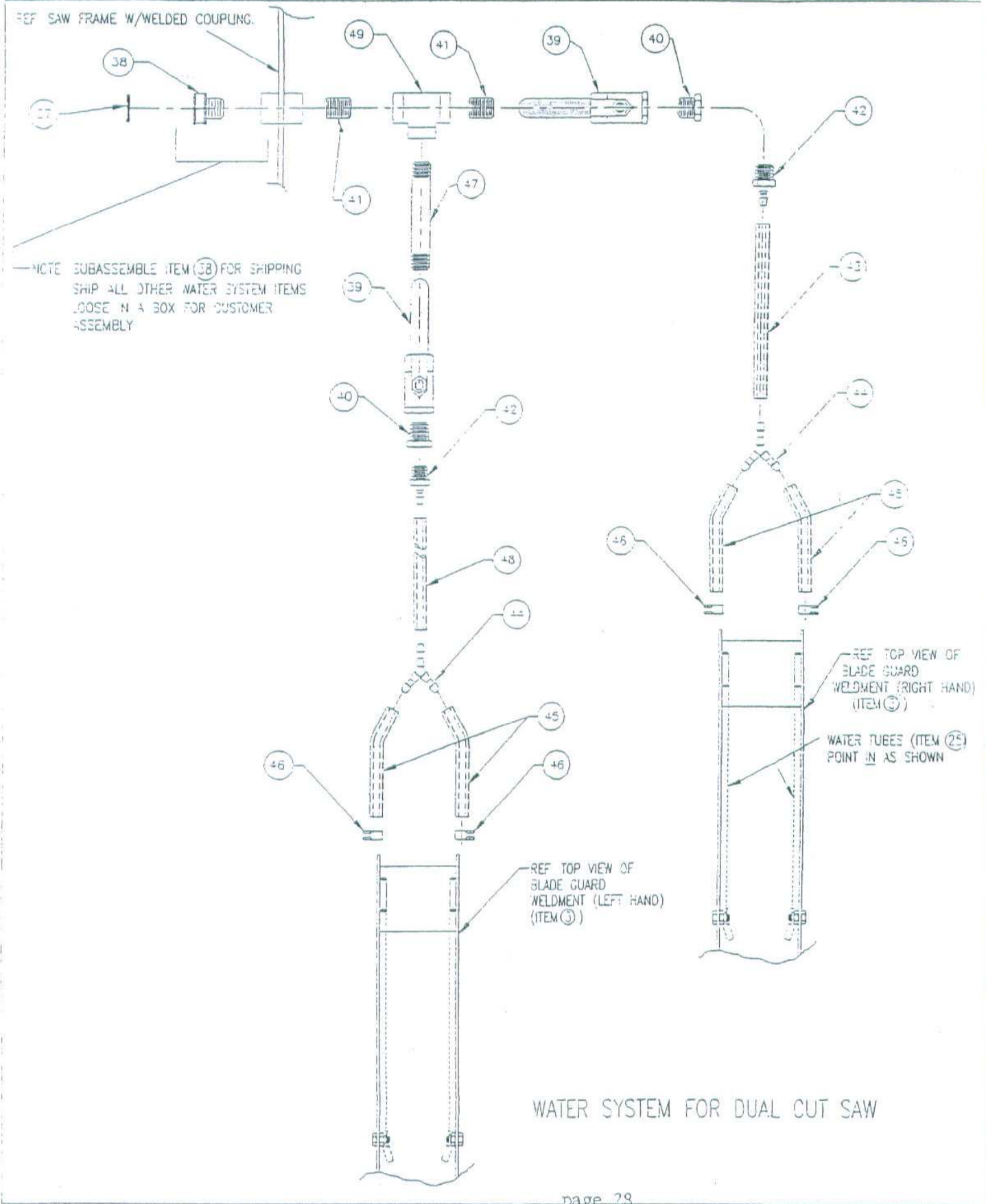
ASSEMBLY INSTRUCTIONS:

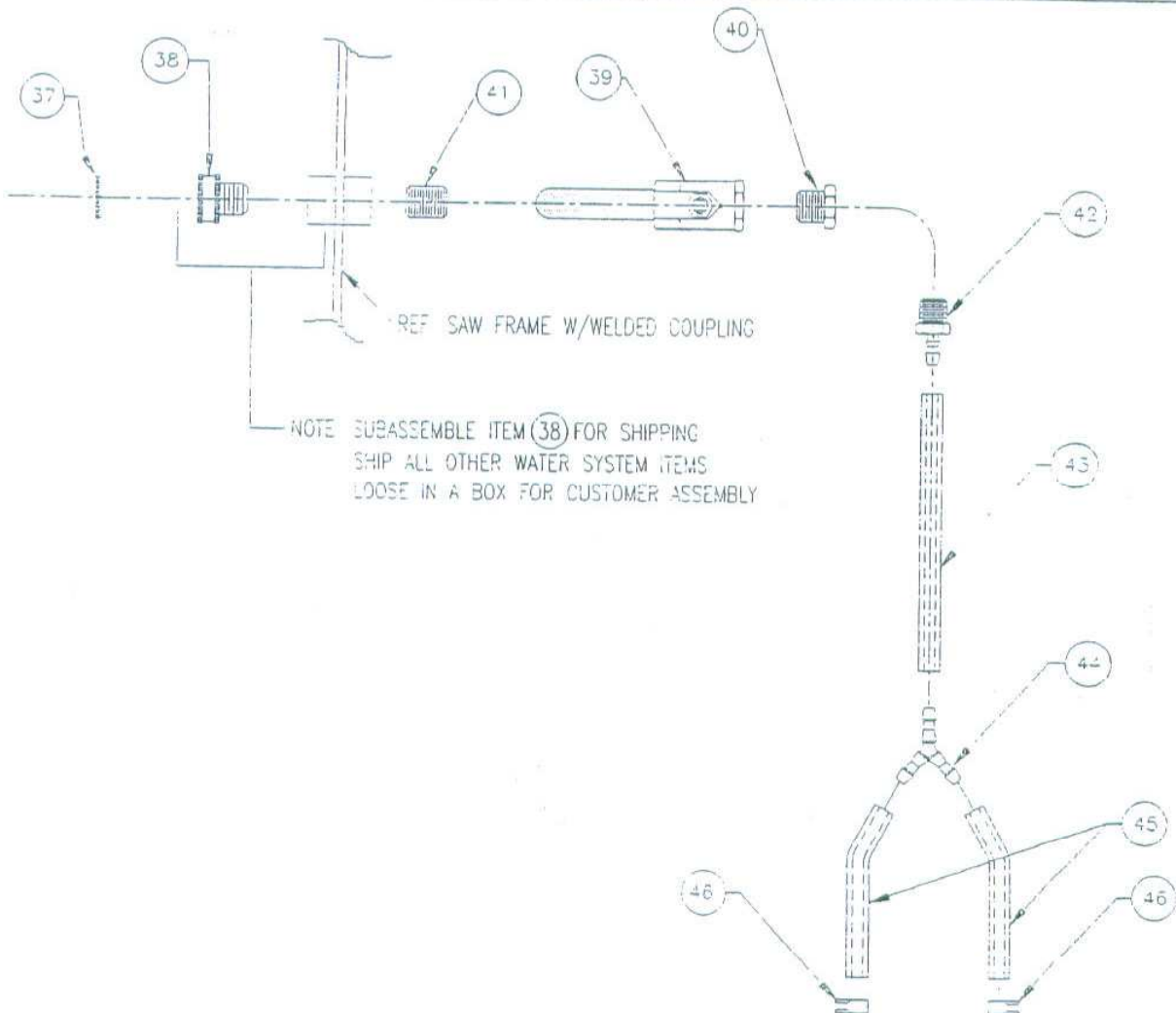
- 1) REMOVE EXISTING BOLT ASSEMBLY IN FRONT HOLE OF POINTER.
- 2) INSERT 2" LONG BOLT INTO BORE OF WHEEL.
- 3) THREAD HEX NUT ONTO BOLT AND SNUG AGAINST WHEEL.
- 4) INSERT WHEEL/BOLT ASSEMBLY INTO FRONT HOLE OF POINTER ASSEMBLY. INSTALL WHEEL/BOLT ASSEMBLY ON LEFT SIDE OF POINTER.
- 5) THREAD HEX LOCKNUT ONTO END OF BOLT
- 6) BACK HEX NUT OFF 1/2 TURN.
- 7) HOLD BOLT WITH WRENCH AND TIGHTEN HEX LOCKNUT.
- 8) WHEEL SHOULD TURN FREELY WHEN LOCKNUT IS TIGHTENED.











REF SAW FRAME W/WELDED COUPLING

NOTE SUBASSEMBLE ITEM (38) FOR SHIPPING  
 SHIP ALL OTHER WATER SYSTEM ITEMS  
 LOOSE IN A BOX FOR CUSTOMER ASSEMBLY

WATER SYSTEM FOR RIGHT HAND  
 CUT SAW.

REF TOP VIEW OF  
 BLADE GUARD  
 WELDMENT  
 (ITEM 3)

WATER TUBES (ITEM 25)  
 POINT IN AS SHOWN