

OPERATING INSTRUCTIONS FOR GROB 4V SERIES BAND SAWS

SHIFTING GEARS AND CHANGING SPEEDS:

The machine has a four speed gear box driven by a three to one ratio variable speed drive. The two shifting levers located under the table can be moved into two positions to obtain the four speeds of the gear box, *low, 1 & 2, high, 1 & 2. These positions are coded to coincide with the indicator located in the column of the saw. Stop Machine Before Shifting. If the gears do not mesh when moving shifting lever, open lower door and turn lower saw pulley manually until gears engage. The gears are tooth rounded to provide ease in shifting.*

Each speed of the gear box, *Low 1 & 2, and High 1 & 2* has a three to one speed range. This speed range is obtained by turning a crank located on the left side of the base. *Changing of speed must be done only when machine is running. It is advisable to crank thru the full speed range daily to prevent the variable speed discs from becoming sticky and insuring free movement, and lubricate with grease every 40 hours.*

LUBRICATING INSTRUCTIONS:

The transmission case requires five quarts of 85w-140 gear oil or equivalent. This is prefilled at the factory. The oil level should be checked periodically and maintained at the mark on the dipstick, which is located in the transmission filler pipe to the left of the table.

The air pump is lubricated through an oil fitting near the transmission filler pipe. Several drops of light machine oil should be inserted daily.

The upper saw pulley has a grease chamber which should be repacked every 2000 hours.

The speed change screw and motor slide should be lubricated periodically to assure smooth free speed adjustment.

The felt pad on the upper guide bar should be saturated with machine oil at regular intervals.

REPLACING SAW PULLEY TIRE:

Use 3M #1357 Rubber Cement or Equivalent

Remove pulley from saw. Strip all old rubber and glue from pulley using an ethyl acetate solution. Make or find a round plug that can fit in vise and the bore of the pulley. Place plug vertically in vise and install pulley on plug. Clean new tire using mineral spirits or paint thinner. Brush glue into the groove of the pulley, allow to get tacky. Stretch the new tire onto the pulley but do not let go yet. Insert rod or screwdriver shank between tire and pulley. Holding rod stationary rotate pulley about 3 turns to equalize rubber. Remove rod, make sure rubber is seated well in corners of groove. Clean excess glue from pulley. Let dry for 5-6 hours minimum.

SAW BLADES:

Grob Machines are not limited to certain types of saw blades. Any type of blade from 1/8"-1" wide can be used. Open both doors on machine and insert saw blade. To put tension on this blade, turn a handwheel located on the right hand side of the head of the machine until its flange lines up with a mark on the tension indicator corresponding to the width blade in the machine. This indicator is located directly behind the handwheel. After correct tension has been applied, the blade tracking must be set. Power Off electrical box, place transmission in neutral, open upper door, remove upper blade guard, loosen locknut on tracking screw (square headed bolt in back of head), loosen upper guide holder locknut on guide bar, turn tracking screw counter clockwise while turning pulley by hand to move blade from rear of pulley to center, clockwise to move blade from front of pulley to center. Turn pulley a few times to make sure tracking stays near center of pulley. Tighten locknut on tracking screw, slide upper guide holder to blade and tighten its locknut. Install upper blade guard and close upper door. Door must be closed to operate saw.

AIR / HYDRAULIC FEED:

The air / hydraulic feed unit consists of a surge tank, regulating valve, four way operating valve, and a hydraulic cylinder connected to a slide assembly. The surge tank contains one quart of ISO-68 oil or equivalent and is prefilled at the factory. The regulating valve is located in the lower left hand side of the machine. It can be adjusted to provide a feed pressure from 0-300 lbs. The amount of feed pressure is shown on a gauge directly above the valve. The hydraulic cylinder is double acting, with oil pressure doing the feeding and air pressure the rapid returning. The *four way valve* controls the cycling of the cylinder feed. With the valve in feeding position, air enters the top of the surge tank forcing oil into front of cylinder and allows the air in the rear of the cylinder to exhaust. In return position, air enters the rear of the cylinder and the air from the surge tank exhausts.