



Pipe Tools & Vises
Since 1896

FOR ANY QUESTIONS ABOUT THE UPC, CALL REED PRODUCT DEVELOPMENT: 800-666-3691 or 814-452-3691.

IMPROVING CUTTING SPEED: While in most cases the Reed UPC will cut Ductile Iron pipes several times faster than self feeding powered cutters costing several times as much, the following conditions can have a significant impact.

- A. **INSUFFICIENT AIR PRESSURE/VOLUME.** Many compressors do not put out high enough pressure, or enough volume, to allow the unit to operate with proper blade speed. Set Regulator to 90 psi. Also need minimum 50 cfm.
- B. **MAINTAIN 3/4" BORE SIZE THROUGH ALL THE AIR FITTINGS.** One small bore fitting in the air will restrict the volume of air.
- C. **KEEP THE RPMS UP.** Use light feed pressure. Frost on the exhaust ports indicates the motor is in the proper range.
- D. **DON'T BLOCK THE MOTOR EXHAUST.** Aim the exhaust away from pipe and the operator. Loosen 2 set screws at back side of motor bracket to redirect.
- E. **TEST TRACK THE CUTTER ONE FULL REVOLUTION BEFORE ENGAGING THE BLADE.** Tracking off at an angle will cause the blade to bind, and reduce cutting speed.
- F. **KEEP DIAMOND BLADE SHARP** with a dressing stick or even a brick. In the case of ductile iron pipe that is cement lined, the slurry created by cement, iron and water helps keep a diamond blade dressed.
- G. **OBSERVE PROPER DIRECTION OF BLADE ROTATION.** Assemble the blade to the motor arbor with the label facing toward you. A comet tail behind the diamond particles is an indicator of the direction the blade is running.
- H. **OBSERVE THE NEW LUBRICATION INSTRUCTIONS.** Grease lightly after each day's use. Turn the unit over and rotate the exhaust shield to expose grease fitting through 1/4" hole. Grease and grease gun are provided with each UPC. Also pour a teaspoon of NONFLUID OIL® in the air inlet before each new air hookup and after each day's use
- I. **VERY THICK OR OLD CAST IRON PIPES.** In some cases these pipes prove to be slow cutting due to the large amount of blade engagement or the pipe may be very hard. The **UPDIA6C** (#97524) blade is effective on thick/old cast iron.

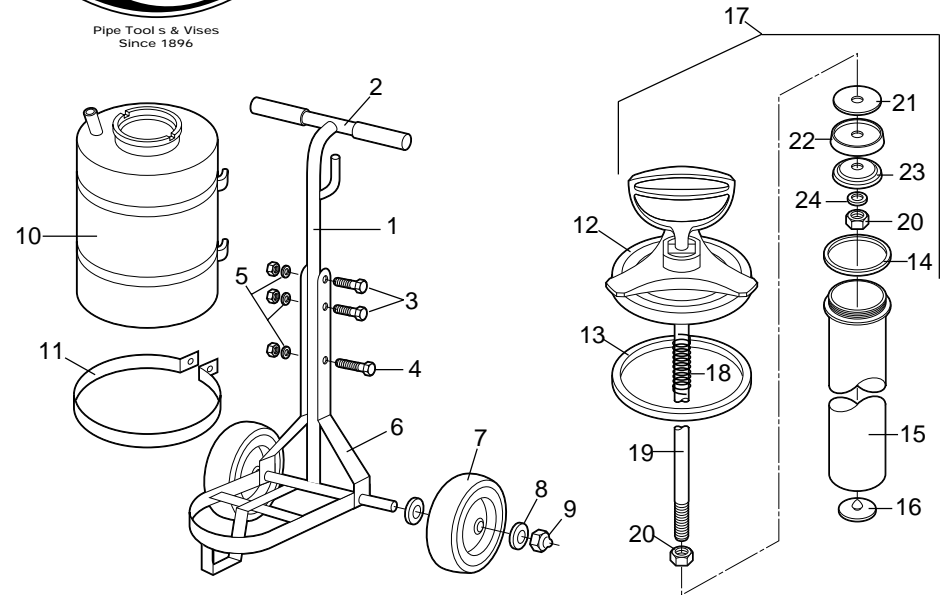
KEEP LINE PRESSURE FROM BINDING THE BLADE. Use wedges every 4"- 6".

KEEP MOTOR BRACKET LOCK KNOB TIGHT WHEN CUTTING.

FOR ANY QUESTIONS ABOUT THE UPC, CALL REED PRODUCT DEVELOPMENT: 800-666-3691 or 814-452-3691.

CUTTER TRACKING TIPS

- A. ENTER THE CUT SLOWLY. Fast feeding will raise the two rollers off of the pipe and the blade can enter at an angle, stall the motor, or pull the unit off track. The larger the diameter the pipe, the more important it is to feed slowly when making the entry cut.
- B. CUT OFF AT LEAST 4" OF PIPE. Smaller sections although saving pipe, provide no resistance for the blade to stay in line. (Only applies to PVC.)
- C. GUIDE THE UNIT IN LINE WITH THE CHAIN. Pulling right or left on the handle can make the cutter go off track.
- D. BE SURE BLADES ARE SHARP. Dress/sharpen per Service Bulletin, page 5.
- E. THE ROLLERS SHOULD BE TIGHT BUT FREE TO TURN. Tighten axle nut to reduce endplay. Keep axles and roller bushing oiled with WD-40™ or equivalent.
- F. THE TURNBUCKLE ROD END SHOULD FIT BETWEEN CHAIN LINK WITHOUT ENDPLAY. Squeeze together if necessary and use grip ring pliers to adjust out endplay between outside rollers. Keep axle oiled with WD-40 or equivalent. Replace roller clips (Items 32) if not tight.
- G. ENSURE THE MOTOR IS POSITIONED EVENLY IN THE REAR OPENING OF THE MOTOR BRACKET. Use the set screws to adjust left or right. These screws are not for clamping - DO NOT overtighten.
- H. TIGHTEN THE MOTOR BRACKET LOCK KNOB TO FEED THE BLADE.
A loose lock knob may allow the cutter to start cutting off at an angle. Feed the blade to penetrate the pipe wall by 1/4".



Parts List

Ref. No.	Description	Item Code	Cat. Number	Qty. Used
1	Handle with grips	47100	3-4229-5	1
2	Plastic Grip	47101	1-5268	2
3	1/4—20 x 1-1/2" Hex Bolt & Nut	47102	1-2040	1
4	1/4—20 x 2" Hex Bolt & Nut	47103	1-2551	1
5	Lockwasher	47104	1-5800	3
6	Cart Frame Assembly	47105	3-5824-5	1
7	Wheel, Semi-Pneumatic	47106	1-4398	2
8	Washer	47107	1-4397	4
9	Speed Nut	47108	1-5783	2
10	Tank, 7 Gal. Stainless Steel	47109	3-1749	1
11	Retaining Band	47110	2-5439	1
12	Pump Cap w/ locking lever & gasket	47111	3-7268	1
13	Gasket for pump cap 4-7/8" O.D.	47112	1-3382-1	1
14	Gasket for pump barrel 2-1/4" O.D.	47113	1-3381-1	1
15	Pump Barrel, with valve & gasket	47114	3-7020	1
16	Rubber Valve	47115	1-4324	1
17	Plunger rod complete with pump cap	47116	3-8841	1
18	Coil Spring for Plunger	47117	1-2931	1
19	Plunger rod w/handle assembly only (plated)	47118	3-7155-4	1
20	3/16" Hex Nut for Plunger	47119	1-2249	2
21	Backing Washer for Plunger	47120	2-2252	1
22	Plunger Cap (1-2690)	47121	3-3538	2
23	Cup Disk Spreader	47122	2-3017-1	2
24	Lock Washer for Plunger	47123	1-3087	1



Assembly, Operating Instructions

And Parts List For Reed 7-Gallon Water Tank & Cart

Directions For Assembly: Remove bolt with nut from handle and turn handle upright; insert bolt in upper hole, and screw on nut tightly. If this height is not convenient, remove three bolts and lower upper part of handle to convenient height, reinserting two bolts and tightening nuts securely. Handle may also be reversed with curved part of upper handle directed backwards, if desired.

Warning: Improper use or failure to follow instructions can result in explosive failure with major injuries. For safe use of this product—you must read and follow all instructions before use.

Caution: Do not leave a pressurized tank in the hot sun. Heat can cause pressure buildup. **Do not** store or leave water in tank after use. **Always** wear goggles when tank is pressurized. **Never** use any tool to remove pump if there is pressure in tank. To prevent ejected pump assembly and/or water from striking and injuring you. **Never** stand with your face or body over top of tank when pumping or loosening pump. **Never** pressurize tank by any means other than the original pump. **Do not** attempt to modify or repair this product except with original manufacturer's parts.

Pre-Use Check: Check tightness of hose clamp with screwdriver to be sure hose is securely attached to the tank outlet nipple. Inspect those for deterioration, cracks, softness or brittleness. If any of these conditions are found, replace hose before using. Replace with original manufacturer's equipment only. **Remove** pump (see filling and pressurizing instructions). Inspect interior and exterior of tank for signs of deterioration such as rust and/or pitting of body and bottom. Any sign of deterioration indicates possible tank weakening and could result in explosive bursting under pressure. If any of these signs are found, discard tank immediately and replace. **Do not** attempt to patch leaks, etc., as this could result in serious injury. **Follow** filling and pressurizing instructions. **Pump** plunger only 8-10 strokes and inspect for leaks. Direct shut-off away from you and open to make sure discharge is not clogged. If unit passes this test, proceed with filling and pressuring instructions.

Filling And Pressuring Instructions: To remove pump, be sure handle is in locked position. Raise locking lever to vertical position and turn entire pump assembly counterclockwise until the ends of the locking lever line up with the slots in the funnel ring. Lift pump assembly from tank-assembly in tank by holding locking lever in vertical position and lowering ends of locking lever through slots in funnel ring. Turn entire assembly up to 1/4 turn and push locking lever down to form pressure-tight seal. **Unlock** pump handle by pushing down against spring and turning clockwise to release from lock position. **Pump** plunger up and down until it works hard. **Warning: This tank is now under pressure and dangerous.** To relock handle, push down against spring and turn handle counterclockwise into slots and allow handle to come up into lock position. **Always** wear goggles when tank is pressurized.

Pressure release instructions: **Warning:** To avoid possibility of ejected pump assembly and/or water from striking and injuring you—**Remove** tank from cart (where applicable) and place unit on its side with top directed away from you. With hose outlet on top, direct tubing away from you and open shut-off, allowing water in the tubing and remaining pressure to be completely exhausted. **Remove** pump following filling and pressurizing instructions, while maintaining position of top of tank away from you. **Tank care, storage and maintenance:** Remove pump and empty sprayer. Tank should be hung upside-down with pump removed and shut-off locked open, along with pump, in warm dry location. Pump should be periodically oiled by dropping 10-12 drops of light oil down pump rod through opening in cover. At least twice each year and always before storage, remove pump barrel from cover assembly and apply a small amount of Vaseline or other similar lubricant to barrel threads and assembly.

Warning: This tank is designed for use with Reed's UPC Pipe Cutter and is for use with water only. Use of other fluids is not recommended. Do not attempt to modify or repair this product except with original manufacturer's parts.



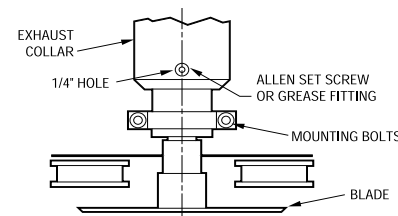
FOR ANY QUESTIONS ABOUT THE UPC, CALL REED PRODUCT DEVELOPMENT: 800-666-3691 or 814-452-3691.

Pneumatic Models Only

UPC AIR MOTOR PREVENTIVE MAINTENANCE

Pneumatic motors are subject to wear, rust and sludge if not maintained properly. While some compressors may be equipped with an oiler or other conditioning device, the Filter-Regulator-Lubricator sold with the UPC is specifically tailored to the need of the unit's high speed motor.

- USE NONFLUID OIL®AIR LUBRICANT.*** This product mixes with water and via the UPC lubricator is introduced as a mist in the airstream providing lubrication fairly quickly. Use 6 drops per minute to start.
- POUR A TABLESPOON OF NONFLUID OIL IN THE MOTOR AIR INLET PORT AFTER EACH DAY'S USE.** This will protect the internal motor parts from corrosion. **DO NOT** flush with kerosene or other solvents for any reason.
- POUR A TEASPOON OF NONFLUID OIL IN THE MOTOR PRIOR TO EACH HOOKUP.** This assures lubrication until air lube arrives. **DO NOT** use kerosene or any other solvent that would wash away necessary lubricant.
- GREASE THE PLANETARY GEARS AFTER EACH DAY'S USE.** Inside the 1/4" hole at the front of the motor exhaust collar is a grease fitting. This fitting should be facing you when turning the unit upside down. If you see an Allen set screw instead of a grease fitting, loosen mounting bolts, rotate motor 180°, and retighten mounting bolts.



- USE THE FILTER-REGULATOR-LUBRICATOR UNIT PROVIDED.** The air motor is sensitive to contamination and requires clean air and proper lubrication. Be certain the filter is not clogged and the lubricator has oil and is operating. Any good grade oil is vastly superior to nothing. It is strongly recommended to use Nonfluid Oil, 10W/NR, suitable winter and summer.
- FIND THE LOCATION OF THE FLUID DRAIN AT THE BOTTOM OF THE COMPRESSOR TANK AND REMOVE THE WATER!!!** Removing the water from the air compressor decreases the amount of water going to the air motor. Water is extremely detrimental to air motors. When air is compressed, it builds up heat. When this warm compressed air expands in the air motor, it cools and the water condenses, causing rust and corrosion. This affects proper operation of the governor, subjecting the motor to premature failure and costly repairs, plus time lost while out of service.

*NONFLUID OIL is a Registered Mark of the NONFLUID OIL CORP.



Pipe Tools & Vises
Since 1896

FOR ANY QUESTIONS ABOUT THE UPC, CALL REED PRODUCT DEVELOPMENT: 800-666-3691 or 814-452-3691.

NEW DIAMOND BLADES FOR CUTTING CAST IRON & DUCTILE IRON. There does not seem to be a single blade that is equally effective cutting both cast and ductile iron. In addition to the material difference between cast and ductile, the factors include hardness, blade speed, inclusions such as carbides and chromium, wall thickness, cement lining (which is helpful), and coolant supply. The greatest problems users have encountered is with fairly old cast iron that is usually fairly thick and causes blades to glaze over and stop cutting. A brand new design of diamond blade has been successfully tested that effectively cuts the previously very tough cutting cast iron. It is not, however, as good cutting ductile. Reed is therefore offering two blades.

UPDIA4D	#97530	4" Blade for Ductile Iron and Clay Pipe
UPDIA4C	#97528	4" Blade for Cast Iron and Clay Pipe
UPDIA6D	#97526	6" Blade for Ductile Iron and Clay Pipe
UPDIA6C	#97524	6" Blade for Cast Iron and Clay Pipe

DELETE ALL OTHER DIAMOND BLADES (UPDIA4/UPDIA6)
BLADES FOR CUTTING PE AND PVC REMAIN UNCHANGED

TEST FOR DETERMINING IF PIPE IS DUCTILE IRON. Take a medium flat file and file a small flat spot anywhere on the surface of the pipe. Then rub the spot or breathe heavily on the freshly filed spot. If it is ductile iron, it will have a distinctly putrid smell. Cast iron gives off no odor at all.

PREVENTIVE MAINTENANCE NUMBERS

UPOIL	97583	Nonfluid oil, Quart
UPDRESS	97595	DIA. Blade Dress Stick 6 x .75
UPGREASE	97588	Motor Grease, 2 oz. Tube
UPWEDGE	97589	Wedges, set of 20



Pipe Tools & Vises
Since 1896

Material Safety Data Sheet

Product: Airlube NR (All Grades)

Section VI Health Hazard Data

Permissible Concentrations (air): None established

<u>Route</u>	<u>Effect of Overexposure</u>	<u>Emergency First Aid Procedure</u>
Eyes	May cause irritation	Flush with water. See physician.
Skin	Harmful if absorbed through skin. May cause irritation.	Wash with soap and water. If high pressure, get immediate medical attention.
Inhalation	Mist may cause irritation.	Remove from contaminated area.
Ingestion	None expected.	
Chronic	May cause allergic skin reaction. A component of the product was a positive for the AMES Salmonella Mutagenicity Test.	

Hazardous Ingredients	TLV, TWA, PEL	IARC, NPT, OSHA
Mineral Oil	TLV 5mg/M (Mist)	Not listed
Performance Additive < 5%	TWA 0.5 ppm (Supplier)	Not listed

Section VII

Control Measures

Respiration Protection:	Use organize vapor respirator if TWA is exceeded.
Ventilation Type:	General adequate. Use local mechanical to insure TWA not surpassed where applicable.
Skin Protection:	Chemically resistant
Eye Protection:	Goggles or faceshield desirable.
Other Protective Measures:	None normally needed

Section VIII Miscellaneous

UNK means unknown.
EST means estimated.
N.A. means not applicable.
HMIS 1, 1, 0 B

Previous Revision Dated 1/28/96

The information contained herein is based on data considered accurate. However, no warranty, expressed or implied, is given regarding the accuracy of these data or the results to be obtained for the use thereof.

2140 South 88th Street, Kansas City, KS USA 66111-8701 (913) 422-4022 Fax (913) 441-2333



Material Safety Data Sheet

Product: Airlube NR (All Grades)

Pneumatic Models Only

Section I

Manufacturer: Century Lubricants Co.
Address: 2140 S. 88th St.
Kansas City, KS 66111-8701
Revision Date: 2/6/98 4750004-13 DOC 764
Telephone 24-hr: 913-791-3645 **Business:** 800-800-6457
Prepared By: M. D. Hart

Section II Chemical and Physical Properties

Solubility In Water (@ 20 C): Slight
Specific Gravity (water = 1): < 1.0
Vapor Pressure (mmHg @ 20 C): < 0.1
Evaporation Rate (ether = 1): <0.01
Percent volatile (by weight): Zero
Appearance and Odor: Amber Liquid, Mild Petroleum Odor
Vapor Density (air): > 1.0
Strong Acid: No
Strong Base: No
Boiling Point (Deg F): = 600° F
Melting Point (Deg F): N.A.

Section III Reactivity Data

Stability: Stable
Incompatibility: Keep away from strong oxidizers
+ Hazardous polymerization will not occur.

Section IV Fire and Explosion Data

Flash Point (method): 300 F COC Min. Est
Extinguishing Agents: Drychemical (X) CO2 (X) Waterspray () Foam (X)
Special Fire Fighting Procedures: Avoid breathing vapors.
Use breathing apparatus in confined areas. Cool exposed containers with waterspray.

Hazardous Thermal Decomposition Product: Carbon monoxide, carbon dioxide and unidentified organic compounds.

Section V Precautions for Safe Handling and Use

Steps To Take In Case Of Spill: Add absorbent to spill area.
Keep petroleum products out of sewers and waterways.
Advise authorities in they do enter.

Waste Disposal Method: Dispose of at appropriate waste facility in accordance with regulations. Expected to be a hazardous waste D018, Benzene.

Precautions In Storage: Keep containers closed when not in use.
Do not handle near heat, flames, sparks. Do not weld or heat empty containers.



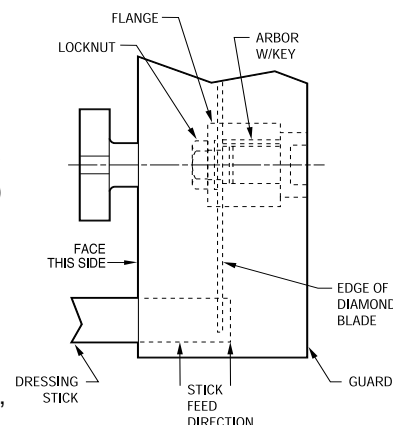
FOR ANY QUESTIONS ABOUT THE UPC, CALL REED PRODUCT DEVELOPMENT: 800-666-3691 or 814-452-3691.

DIAMOND BLADE SHARPENING A DIAMOND BLADE NEEDS TO BE DRESSED IF -

1. There is noticeable loss of cutting speed, and
2. There are numerous empty dark craters on edge of blade, and very few or no exposed diamond particles.¹
3. The blade edge appears shiny and corners rounded.

Please use only the following procedure to dress a Diamond Blade with a dressing stick. (If you don't have a dressing stick, any concrete brick will serve the same purpose.)

1. Mount the UPC on a pipe.
2. Tighten the turnbuckle to prevent rotation of the unit.
3. Position the blade to clear the pipe.
4. Lock the swing guard in the open position, exposing the blade.
5. Stand looking into the blade side of the unit.



TOP VIEW

WARNING - NEVER STAND IN LINE WITH THE BLADE.

6. Cover eyes with protective goggles to protect eyes from flying abrasive particles and turn the unit "ON".
7. Feed the stick crossways into the blade (See Sketch). Leave enough stick on the backside of the blade (about 1/8") so it will simultaneously dress both sides of the blade.
8. Feed slowly and cut off the stick.
9. Repeat this process - two cuts should dress the blade to expose more diamond.
10. WARNING: NEVER PUT FINGERS INSIDE BLADE GUARD. HIGH SPEED ROTATING BLADE CAN CAUSE SERIOUS INJURY. When stick is about 3" long, use a pair of pliers until the length is reduced to approximately 2", then it should be discarded.



¹ NOTE: It may be useful to look through a magnifying glass or 8X loupe available at most photography shops to see blade edge particles more clearly.



FOR ANY QUESTIONS ABOUT THE UPC, CALL REED PRODUCT DEVELOPMENT: 800-666-3691 or 814-452-3691.

IMPROVED ARBOR ASSEMBLY

By reducing the arbor, the UPC blade can be located one inch closer to the frame (from 4-1/2" to 3-1/2"). This offset is a major contributor to mis-tracking. The change will also reduce the motor gear and bearing loads.

You are being sent one of two new arbor assemblies based on blades originally purchased:

ARBOR FOR CUTTING ONLY; ALL PIPE EXCEPT PVC:

Arbor - A new arbor that eliminates the need for the arbor spacer.

Flange - Replaces the belleville washer and provides more bearing surface on the blade. Or,

ARBOR FOR CUTTING AND BEVELING PVC:

Arbor - A shorter version of the original has been designed and a 1/8" keyway has been added.

Arbor Spacer - Needed when not using bevel cutter. Also has a keyway and larger flange.

Key - A key has been added to positively engage the bevel cutter or spacer.

Flange - Replaces the belleville washer and provides more bearing on the blade.

See illustration on back cover.

CHANGEOUT PROCEDURE

Remove cutting blade and bevel cutter (if any).

Using the wrenches supplied with the UPC, locate the 3/4" nut at the front face of the motor, and the 7/8" flats of the arbor, and unscrew the arbor.

Loosen the motor clamp screws underneath the motor bracket front plate. Push the motor out until it protrudes from the front plate approximately 9/16". Tighten motor clamp screws.

Screw new arbor onto motor end and tighten. If you have the arbor for cutting and beveling, put the key in the keyway, slide the bevel or arbor spacer cutter on (large side toward blade), and adjust the cutting blade. Assemble the outer flange with the relieved edge toward the blade. Add the nut and tighten.

Return old arbor, washer, and spacer to Reed, using label and postage provided.



DOTCO Installation & Service Instructions

Safety Instructions and Warning

Pneumatic Models Only

24-1312N-60, 3675 RPM

DOTCO Portable and Mountable Tools are air powered. USE THIS POWER PROPERLY FOR PERSONAL SAFETY. ALWAYS COMPLY WITH:

1. General Industry Safety & Health Regulations, Part 1910, OSHA 2206, available from: Sup't. of Documents, Gov't. Printing Office, Washington, D.C. 20402
2. Safety Code for Portable Air Tools — ANSI B186.1 available from: American National Standards Institute, Inc., 1430 Broadway, New York, New York 10018.
3. State and Local Regulations.

Portions of the above abbreviated below for quick reference to some of the most important regulations. THESE REGULATIONS ARE NOT ALL INCLUSIVE - STUDY AND COMPLY WITH ALL REGULATIONS.

1. Tool Speed Check - Before mounting any abrasive wheel, buffing wheel, wire brush, saw blade, flap wheel, or other product, after all tool repairs and whenever a tool is issued for use, the RPM shall be checked with a tachometer to insure that its actual speed does not exceed rated speed. GOVERNED TOOLS, IN USE ON THE JOB, SHALL BE CHECKED AT LEAST ONCE EVERY TWENTY HOURS OF USE, OR ONCE WEEKLY, WHICHEVER IS MORE FREQUENT.
2. Tool Intent - Tools shall be used only for purposes intended in their design (refer to product catalog).
3. Air Supply - Test and operate tools at 90 PSIG maximum unless tool is marked otherwise. Use recommended air-line filters-regulators-lubricators.
4. Unusual Sound or Vibration - If tool vibrates or produces an unusual sound, repair immediately for correction.
5. Speed Rating of Wheels, etc. - Speed rating of abrasive wheel, wire brush, saw blade, flap wheel, or other products used, must equal or exceed speed rating of tool.
6. Mounting of Wheels, etc. - Each type of wheel, wire brush, saw blade, flap wheel, and other product, has specific mounting procedures and regulations concerning spindles, flanges, blotters, collets, etc., which shall be used. REFER TO REGULATIONS AND/OR WHEEL MANUFACTURERS' INSTRUCTIONS.
7. Wheel Guards - Select proper guards for application and mount securely and properly. SEE REGULATIONS.
8. Inspection of Wheels, etc. - Regularly inspect all wheels, etc., and discard cracked, chipped or otherwise damaged units. Redress out-of-balance wheels. SEE REGULATIONS.
9. Operator Protective Equipment - Wear goggles or face shield at all times tool is in operation. Other protective clothing shall be worn, if necessary, for spark protection deflection. SEE REGULATIONS.
10. Safety Maintenance Program - Employ a safety program to provide inspection and maintenance of all phases of tool operation and air supply equipment in accordance with "Safety Code for Portable Air Tools."

WARNING!! FAILURE TO COMPLY WITH THESE SAFETY REGULATIONS MAY RESULT IN SERIOUS INJURY.

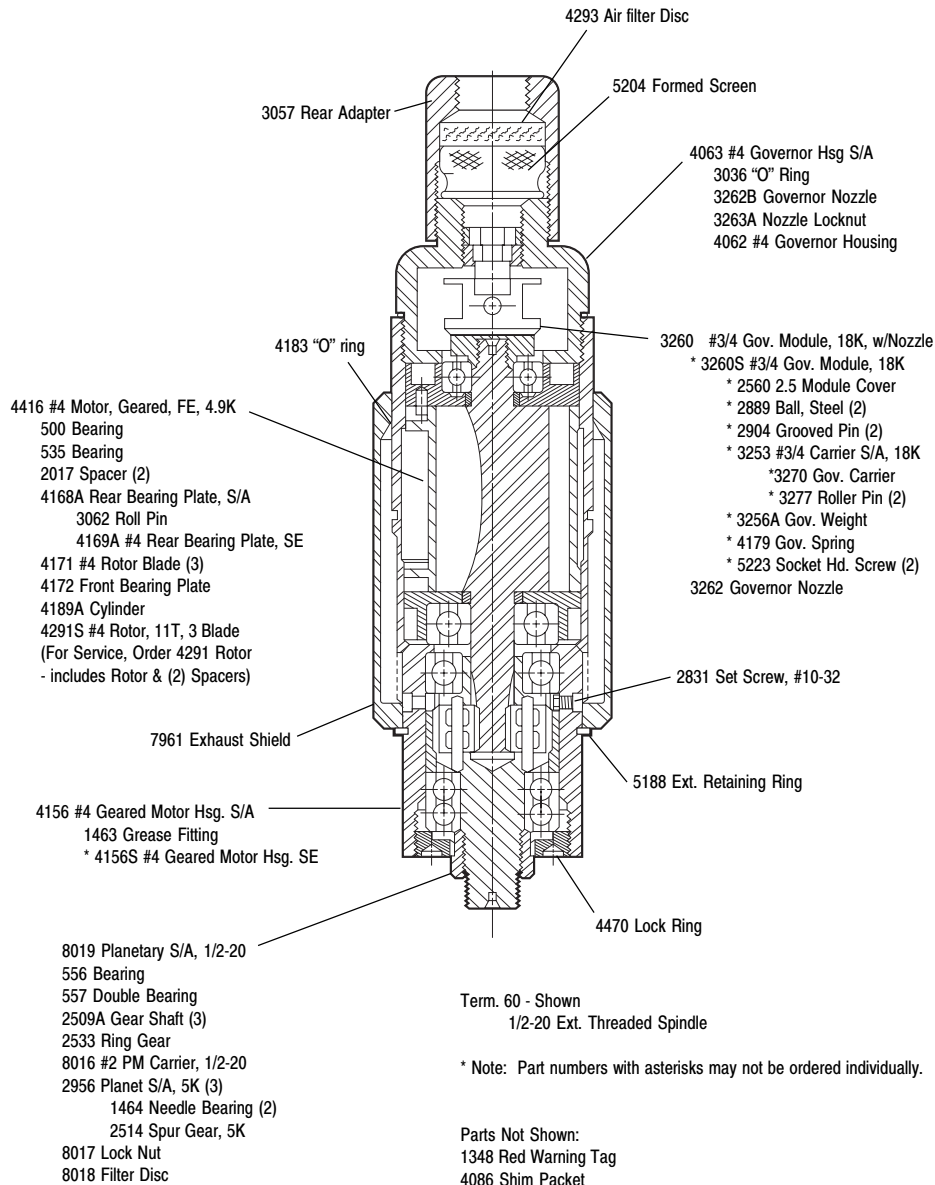
INSTALLATION: Air pressure of 90 pounds per square inch is recommended for best performance. Pippings, fittings, and hose should be of size adequate to maintain this pressure at the tool, while the tool is in operation. An airline oiler and filter should be used. The hose should be blown out to remove dirt particles and sludge before attaching it to the tool. Set air line regulator gauge at 90 psig. maximum.

LUBRICATION: The motor must be lubricated and free of moisture. An air line filter-lubricator-regulator-gauge such as DOTCO No. 45-0540A will take care of the complete lubrication of the tool. We recommend a high grade spindle oil such as SAE No. 5 or DOTCO Oil No. 45-0918, using two or three drops of oil per minute.

LOSS OF POWER: Seldom is it necessary to dismantle this tool for loss of power. First, check air line pressure. It should be 90 PSI at or near the tool, while the tool is running. Check the size of the hose and fittings to be certain they are not causing air restrictions. Make certain the hose and fittings are not plugged with rust, dirt or scale. Flush out motor as described below.

SERVICE INSTRUCTIONS: Do not squeeze tool or parts in vise except as specified in assembly or disassembly instructions. Bearings are of the shield type. Care must be used in their assembly and disassembly. When pressing bearings onto a shaft, press only on inner race. When pressing bearings into a bore, press only on outer race. (CAUTION: Bearings are lubricated by the bearing manufacturer for the life of the bearing. DO NOT CLEAN WITH SOLVENT).

COOPER AIR TOOLS, DOTCO, P.O. BOX 182, Hicksville, Ohio 43526, Phone 419-542-7711



Unless Otherwise Specified:
Remove all burrs and break sharp edges .01 x 45° max.

FOR ANY QUESTIONS ABOUT THE UPC, CALL REED PRODUCT DEVELOPMENT: 800-666-3691 or 814-452-3691.

PROPER UPC BLADE ASSEMBLY

WARNING - Improper blade assembly will result in blade damage and personal injury. Follow the instructions below.

1. SHORT ARBOR (PNEUMATIC ONLY)

A.) SEAT BLADE CORRECTLY. See illustrations. Visually inspect to be certain the blade is seated on the arbor shoulder and flush against the face of the arbor.

B.) INSTALL FLANGE CORRECTLY. The flange provided with each arbor is relieved on one side. Install the flange with relieved side against the blade.

C.) ADD THE ARBOR LOCKNUT AND TIGHTEN.

2. LONG ARBOR, FOR THE OPTION OF BEVELING PVC PIPE, IS TYPICAL OF THE HYDRAULIC MOTOR ARBOR.

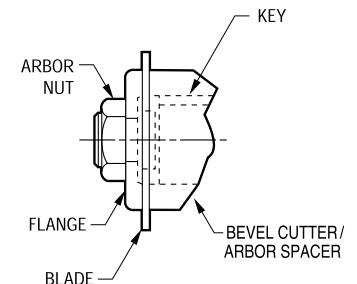
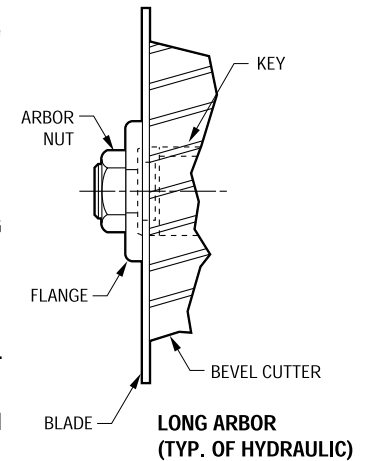
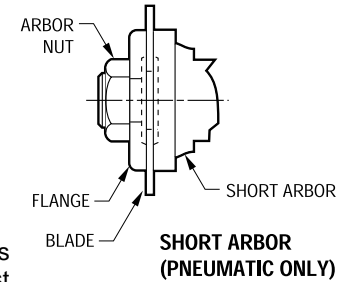
A.) INSTALL KEY. Be sure to install the 1/8 square key provided in the keyslot on the arbor.

B.) INSTALL BEVEL CUTTER/ARBOR SPACER. Locate the keyway and slide the bevel cutter/arbor spacer onto the arbor back to a positive stop. See illustration.

C.) SEAT BLADE CORRECTLY. See illustration. Visually inspect to be certain blade is seated on the arbor shoulder and flush against the bevel cutter/arbor space.

D.) INSTALL FLANGE CORRECTLY. The flange provided with each arbor is relieved on one side. Install the flange with the relieved side against the blade.

E.) ADD THE LOCKNUT AND TIGHTEN.



WARNING - High speed rotating blades. Personal injury can occur if hands are not kept clear of blades. Always wear proper eye and ear protection.

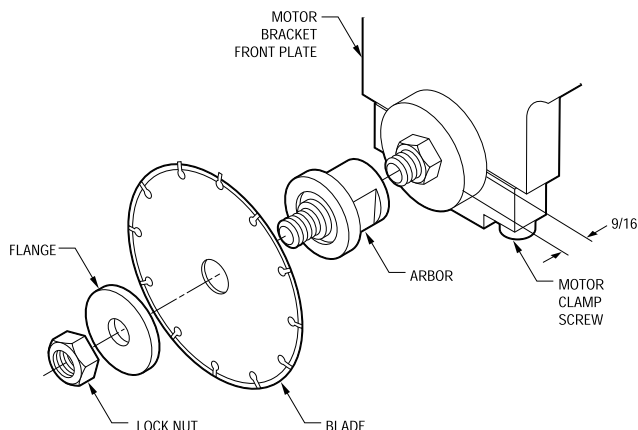


Assembly Sequence for Arbor Changeout

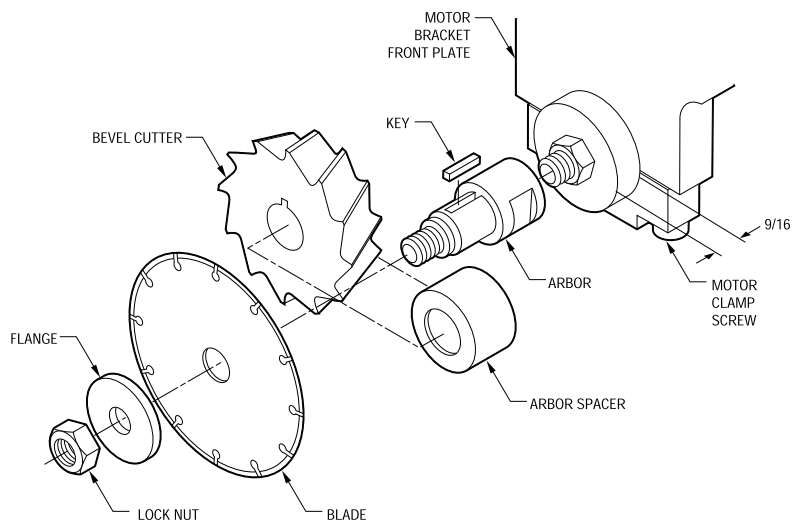
Pneumatic Models Only

FOR ANY QUESTIONS ABOUT THE UPC, CALL REED PRODUCT DEVELOPMENT: 800-666-3691 or 814-452-3691.

ASSEMBLY SEQUENCE FOR ARBOR CHANGEOUT



ARBOR ASSEMBLY FOR CUTTING ONLY



ARBOR ASSEMBLY FOR CUTTING AND BEVELING PVC



DOTCO Model 24-1312N-60 Motor

Pneumatic Models Only

Warranty And Disclaimer On DOTCO Model 24-1312N-60 Motor

Cooper warrants products and parts sold by it, insofar as they are of its own manufacture, against defects of material and workmanship, under normal use and service in accordance with its written instructions, recommendations, and ratings for installation, operation, maintenance, and service of products for a period of one year from the date of initial use, provided this use is within one year from date of shipment from Reed Manufacturing or its authorized distributor. Proof of purchase with shipment date must be furnished by the user to validate the warranty. This warranty applies only to products manufactured by Cooper and specifically excludes products manufactured by others. Products not manufactured by Cooper are warranted only to the extent and in the manner warranted to Cooper by the manufacturer and then only to the extent Cooper is able to enforce such warranty. This warranty is limited to the repair regarding which the distributor has given written notice to Cooper/DOTCO. Installation and transportation costs are not included. Cooper shall have the option of requiring the return prepaid. No allowances will be made for repairs without Cooper's approval. This warranty of only the Air Motors is extended by Cooper to the end user. All warranty claims for this Air Motor are to be made directly to DOTCO in Hicksville, Ohio. Mailing Address: P.O. Box 182. Shipping Address: Ohio Route 18 East, Hicksville, OH 43526. Telephone: (419) 542-7711.

Cooper makes no other warranty of any kind whatsoever, expressed or implied and all warranties of merchantability and fitness for a particular purpose are hereby disclaimed by it.

Limitation of Liability

Neither Cooper nor Reed shall in any way be liable for special, indirect, incidental, or consequential damages including but not limited to loss of business profits or opportunities, downtime of manufacturing plants or machinery, or loss of good will.

COOPER Power Tools

600 Defiance Avenue
Hicksville, OH 43526
Phone: (419) 542-7711
Fax: (419) 542-7330

AIRETOOL® • APEX® • ASSEMBLY SYSTEMS™ • BUCKEYE® • CLECO® • COOPER AUTOMATION • DGD • DOLER™
• DOTCO® • GARDNER-DENVER® • GARDOTRANS™ • GETA • KOTTHAUS+BUSCH® • MASTER POWER® • METRONIX
• QUACKENBUSH® • RECOULES • ROTOR TOOL® • STUHR® • UTICA®

400-50498