

AT-200 AIR-POWERED CRIMPING TOOL
Operating and Maintenance Instructions with
Optional Bench Adapter and Foot Switch

- Description
- Operation
- Maintenance

WARNING

- NEVER** USE THIS TOOL WITHOUT GUARDS OR SAFETY DEVICES THAT ARE INTENDED TO PREVENT HANDS FROM REMAINING IN THE DIE SPACE.
- NEVER** OPERATE, SERVICE, INSTALL OR ADJUST THIS TOOL WITHOUT PROPER INSTRUCTION AND WITHOUT FIRST READING AND UNDERSTANDING THE INSTRUCTIONS IN THIS MANUAL AND ALL APPLICABLE AIR POWERED CRIMPING TOOL MANUALS.
- NEVER** INSTALL OR SERVICE THIS MACHINE WHILE CONNECTED TO THE COMPRESSED AIR SOURCE.
- CAUTION** THE MOLEX AT-200 AIR POWERED CRIMPING TOOL IS DESIGNED TO BE USED WITH AIR POWERED CRIMP TOOLS HEADS AND TOOLING SUPPLIED BY MOLEX. USE OF TOOL HEADS OR TOOLING FROM ANY OTHER SOURCE MAY RESULT IN DAMAGE OR INJURY. MOLEX WILL NOT BE LIABLE FOR ANY DAMAGE OR INJURY FROM USE OF NON-MOLEX COMPONENTS IN THIS TOOL.

WORK SAFELY AT ALL TIMES

**For Service, Contact Your
Local Molex Sales Office**

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General Description

1. Read the following instructions before attempting to operate tool.
2. Connect air hose to tool and to air supply 85 to 95 PSI. Do not exceed 100 PSI. **May cause injury or damage to the tool.** Air supply must be equipped with a 1/4NPT air filter /regulator which is not supplied by Molex (See Figure 1). (Available from any Industrial supply co.)

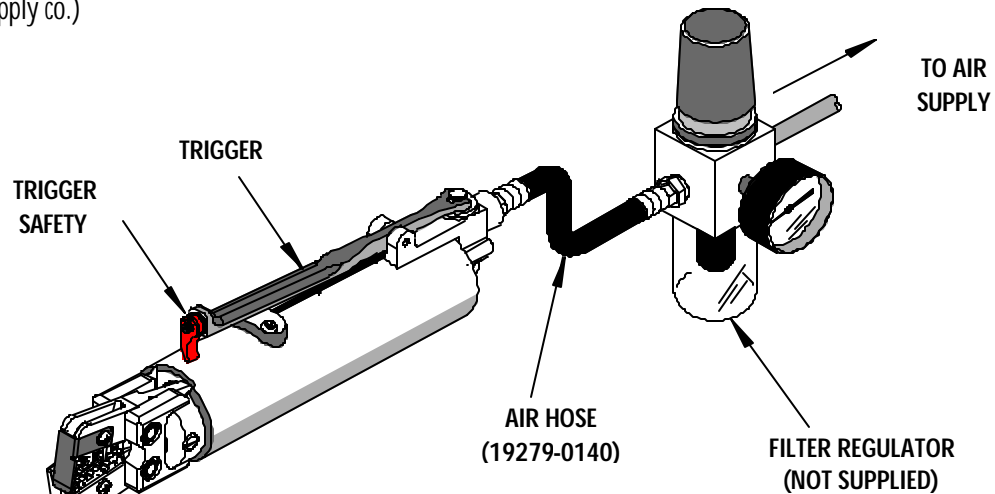


Figure 1

If changing to the Optional bench adapter (Part No. 19078-0307) remove the air hose (19279-0140) and connect the tubing from the footswitch (See Figure 2). If using the Optional Electrical Controls (Part No. 64001-4000), see Appendix A.

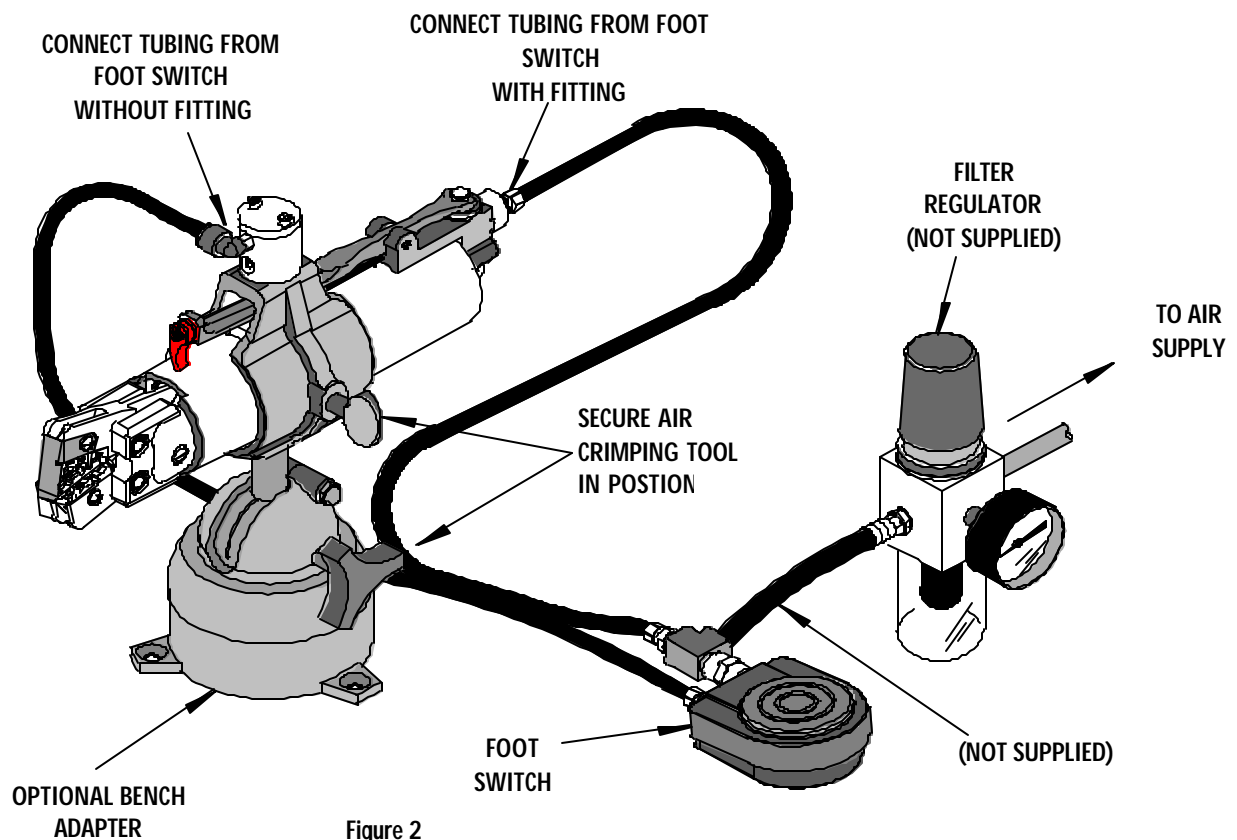
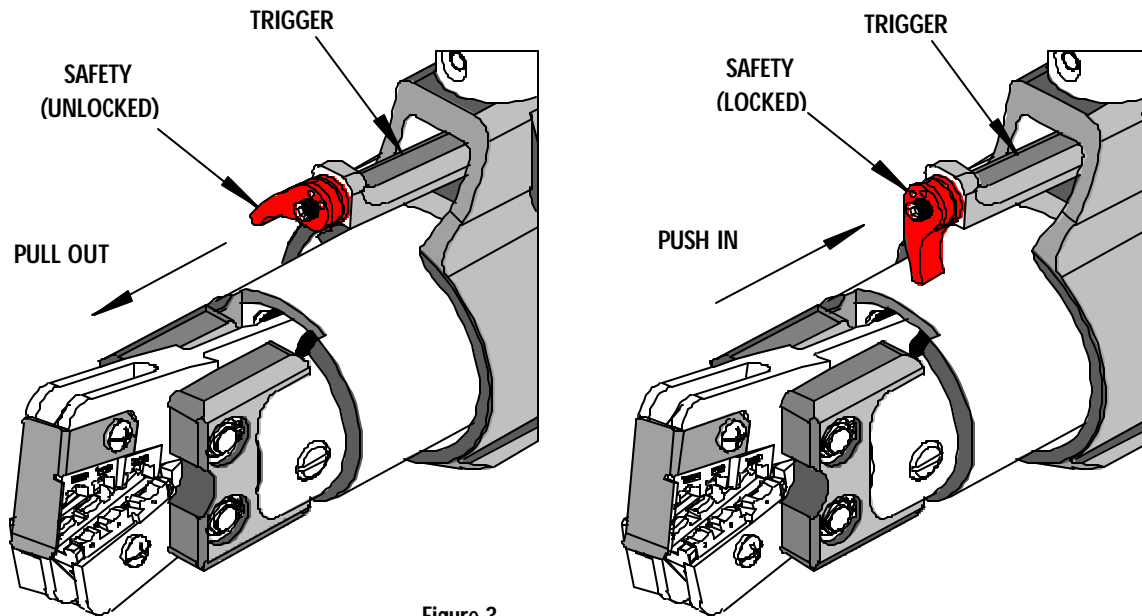


Figure 2

3. Lock trigger by engaging red aluminum safety. Pull the safety outward from end of trigger and rotate until next detent position engages (See Figure 3).



Note: Always use the safety or disconnect air supply when changing crimping Heads.

4. Proper crimping head: Use part number located on label of terminal/connector container.
5. Strip proper wire to minimum length located on label of terminal/connector container or on the air powered crimp tool head specification sheet.

Section 2

- 2.1 Changing Crimp Tool Heads
- 2.2 Insulation Support Crimp Adjustment (Older style fixed jaw air powered crimp tools heads)
- 2.3 Insulation Support Crimp Adjustment (Newer style insertion air powered crimp tools heads)
- 2.4 Terminal Crimping

2.1 Changing Crimp Tool Heads

1. Engage trigger safety or disconnect air supply.
2. Remove the two 1/4" – 20 slotted screws on both sides of power unit. Pull crimp tool head jaw assembly out of tool (See Figure 4).

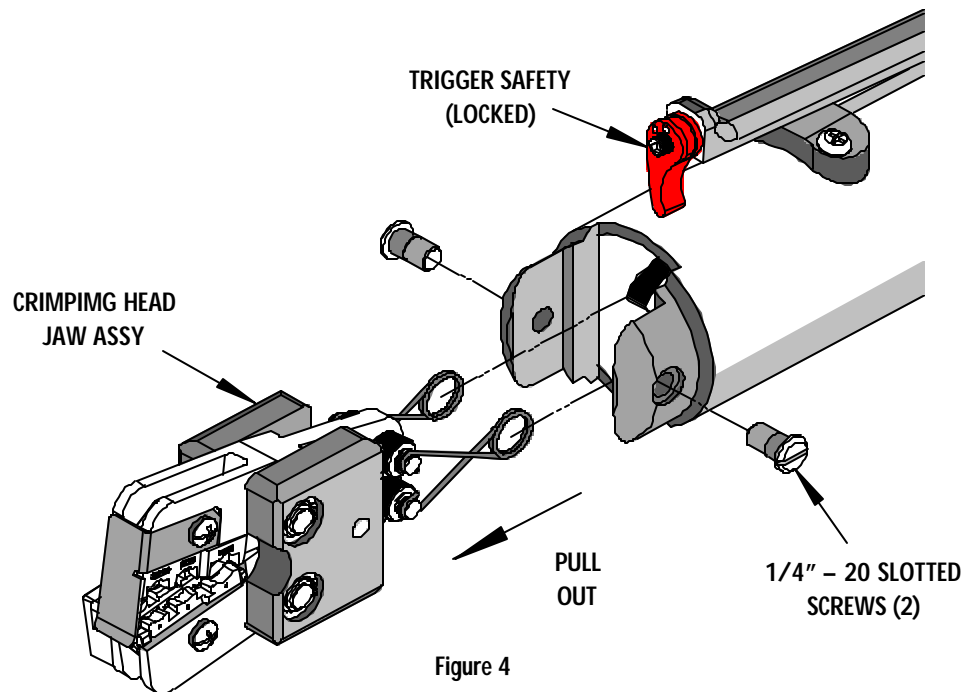


Figure 4

3. Before attempting to replace dies, check to see that wedge point of cam lines up with the two 1/4" holes in front of power unit (See Figure 5).

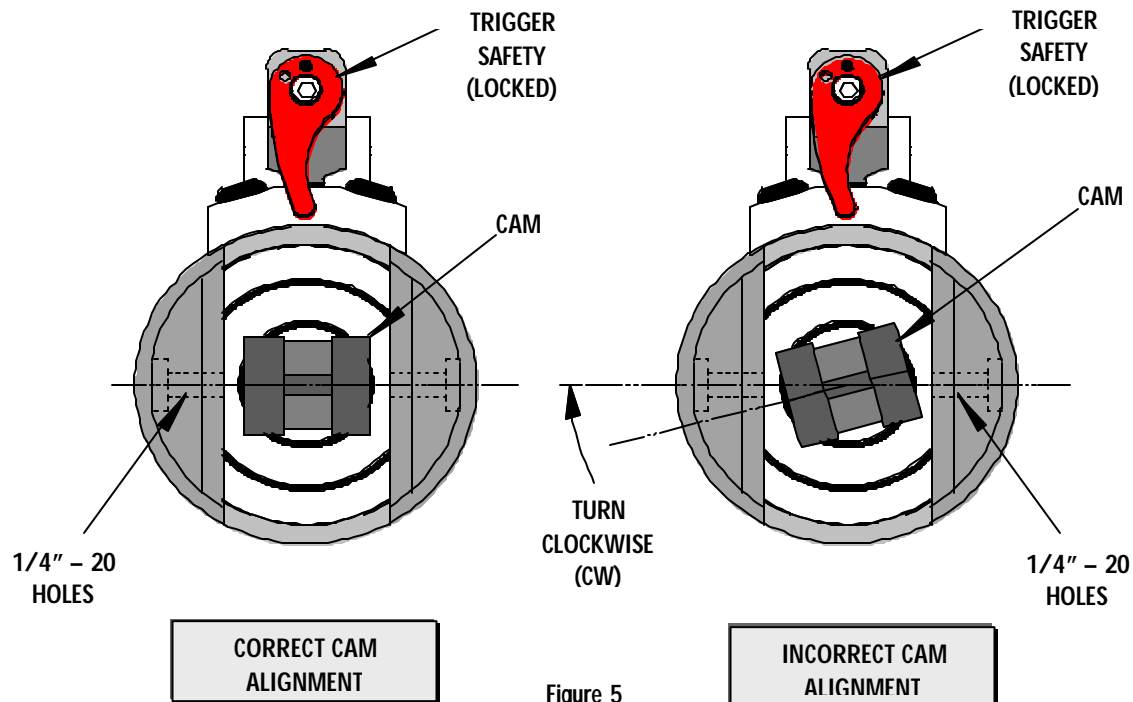


Figure 5

If cam is not lined up, use the following procedure.

- a) Disconnect air supply with cam in the retracted position, which is trigger up.
 - b) Grasp center section of cam with long nose pliers and rotate cam clockwise (CW) until center line of wedge lines up with 1 / 4" holes in power unit. See Figure 5 for correct alignment.
 - c) Replace head before cycling the tool. Be sure both screws are in place and tightened.
4. To replace the crimp tool head, hold power unit in left hand as shown in Figure 6.
 5. Grasp crimp tool head in right hand with terminal locator facing you. Slide crimp tool head assembly into body of power unit until side plates of the crimp tool head butt against steps in the power unit. Be sure jaw return springs clear the cam in power unit (See Figure 6).
 6. Line up holes in crimp tool head with those in housing of power unit.
 7. Replace 1 / 4" – 20 screws and tighten securely. Tool is now ready for use.

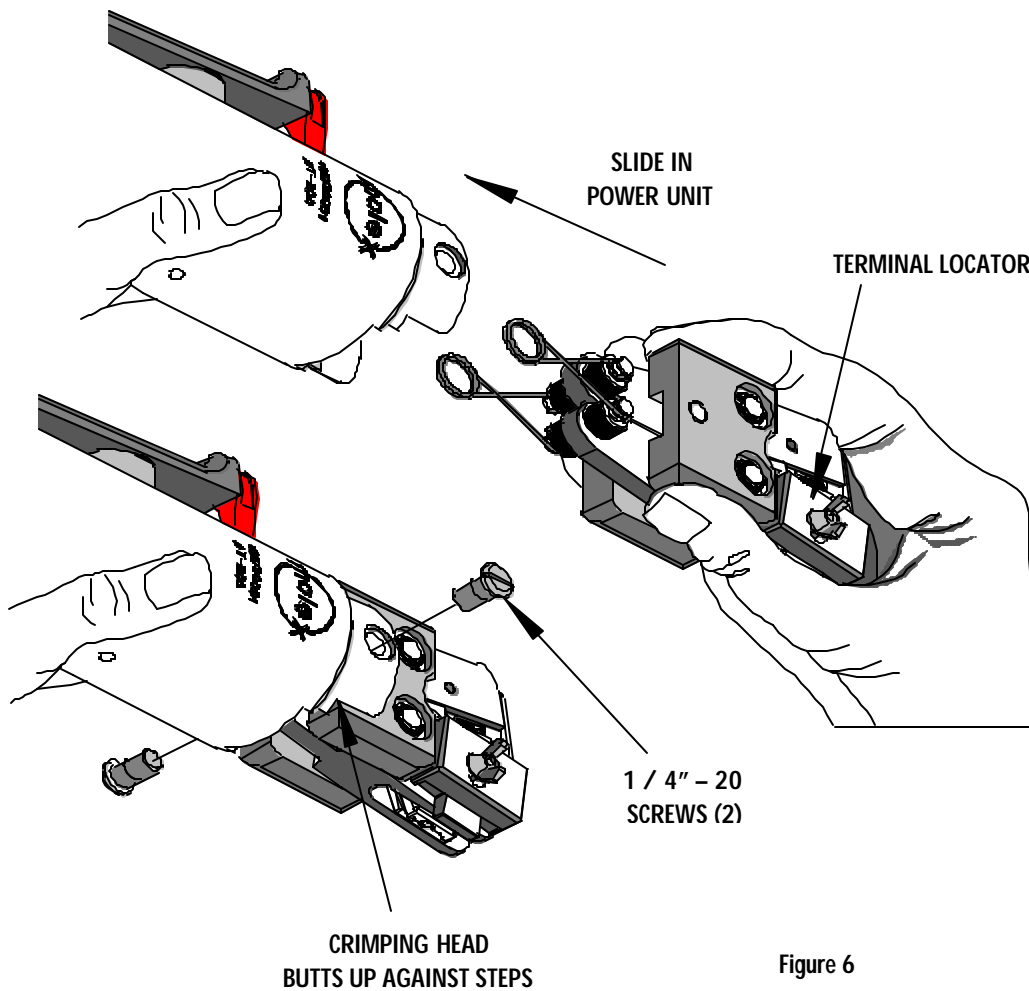


Figure 6

2.2 Insulation Support Crimp Adjustment (Older style fixed jaw air powered crimp tools heads)

1. The crimp tool heads for insulated terminals and connectors feature an adjustable insulation support crimp to accommodate varying wire insulation diameters (See Figure 7) for old style crimp tool head.

2. The adjustment screw on each crimp head tool is set at the factory at the M position. This setting will give the best crimp on most wires. Two other adjustment settings are available: S, the smallest configuration and L, the largest configuration.

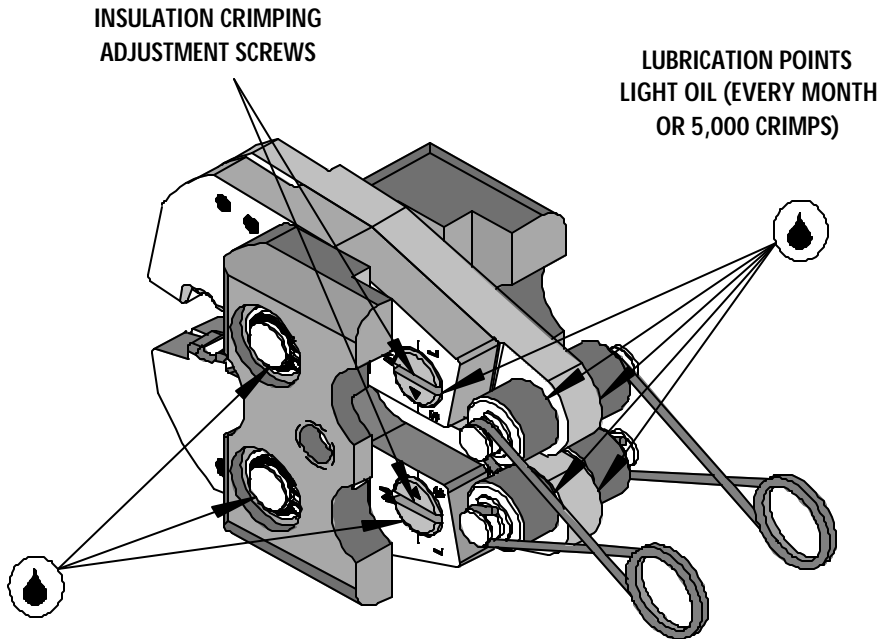


Figure 7

3. Crimp a terminal or connector and inspect the insulation support sleeve crimp or configuration. A properly crimped sleeve snugly grasps the wire insulation.
4. If crimp configuration is too loose, change adjustment setting by removing from the AT-200 and setting adjustment screw to the S position. Re-insert the air powered crimp tool head into the AT-200 and crimp, and inspect insulation support sleeve.
5. If crimp configuration is too tight, change adjustment setting by removing the air powered crimp tool head from the AT-200 and setting adjustment screw to the L position. Re-insert the air powered crimp tool head into the AT-200 and crimp, and inspect insulation support sleeve.

2.3. Insulation Support Crimp Adjustment (Newer style insertable jaw air powered crimp tools)

For new style crimp head tools, if the insulation part of the crimp needs to be adjusted, first loosen the M4 screw on the bottom tool jaw, then insert a 3/32 Hex wrench (supplied) into the bottom of the lower die (See Figure 4). A clockwise (CW) rotation decreases insulation crimp while a counter-clockwise (CCW) rotation increases insulation crimp. After adjusting retighten the M4 screw.

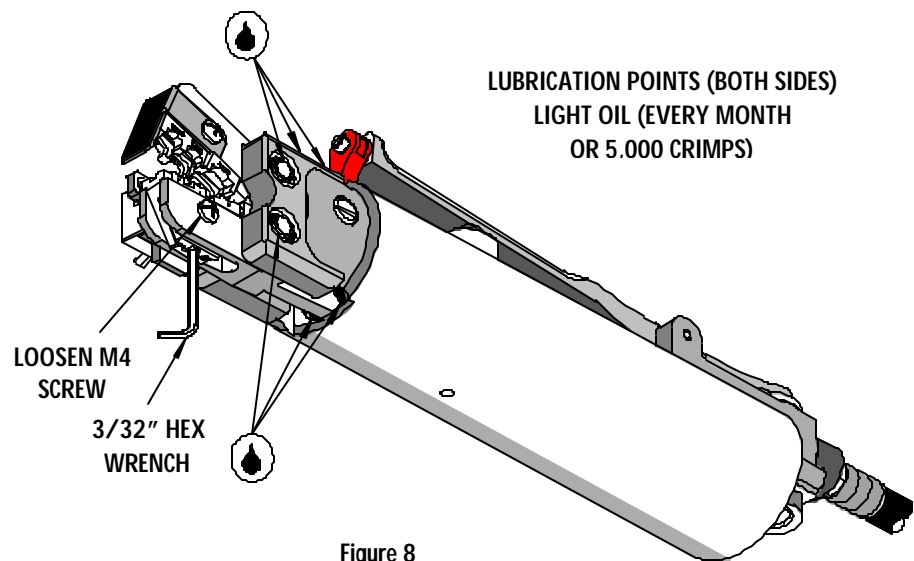


Figure 8

2.4 Terminal Crimping

Specifications and Instructions for crimping are included with the individual air powered crimp tool heads.

Section 3

3.1 Parts Lists and Assembly Drawings

3.2 Maintenance

3.1. Parts List and Assembly Drawings

Item	Order No.	Engineering No.	Description	Qty	Notes
	19279-0001	19279-0001	Air Power Crimp Tool Assembly	REF	(Fig. 9)
1	19279-0080	19279-0080	Cam For AT-200 Air Tool	1	
2	19279-0135	19279-0135	AT-200 Air Powered Crimping Tool	1	(Fig. 10)
3	19279-0140	19279-0140	Air Hose 1/8 NPT Male FTG	1	
4	19279-0161	19279-0161	Screw Silver Slotted	2	
5	N/A	N/A	1/4 – 1/8 Hex Bushing	1	**
6	N/A	N/A	1/4 – 28 by 3/4 Cup Point Soc. Set Screw	1	**

** The following purchased parts are available from an Industrial supply company such as MSC 1-800-645-7270.

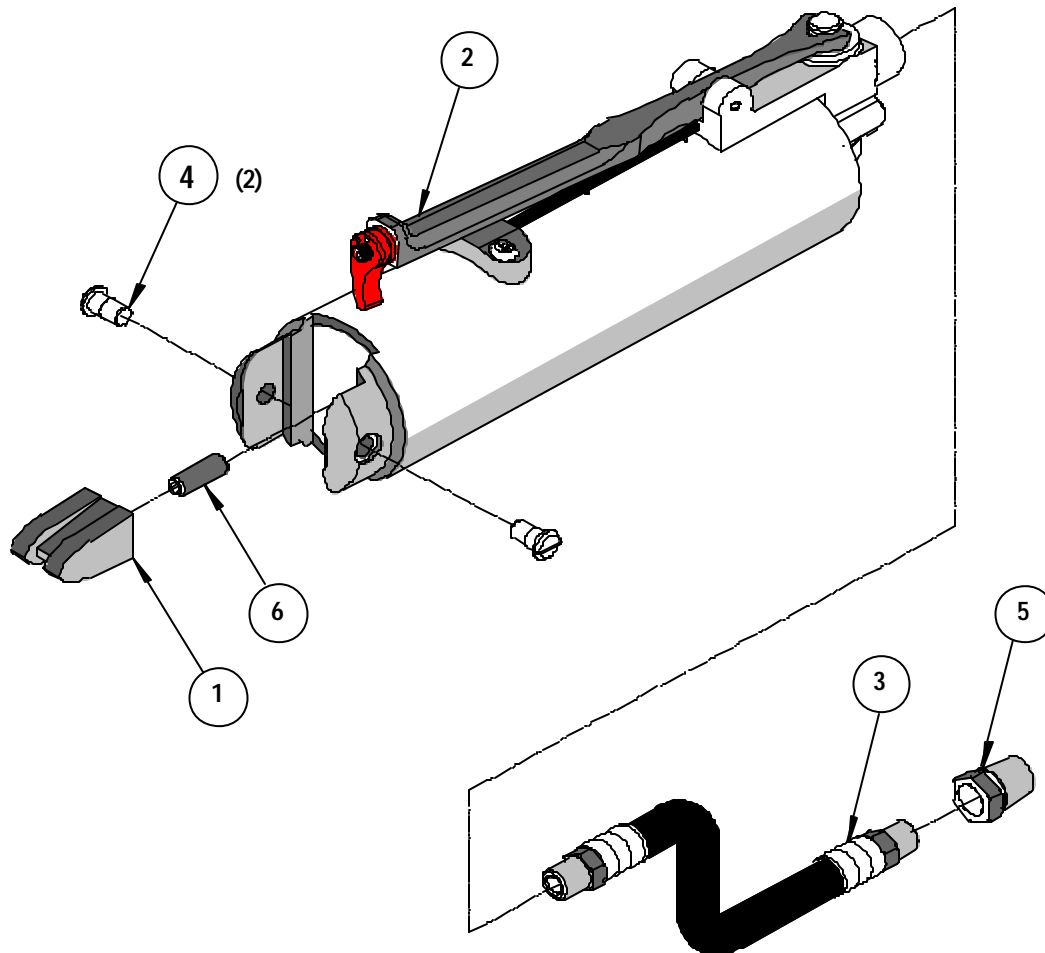


Figure 9

3.1 Parts List and Assembly Drawings

Item	Order No.	Engineering No.	Description	Qty	Notes
	19279-0135	19279-0135	AT-200 Air Powered Crimping Tool	REF	(Fig 10)
1	N/A	N/A	1/4 ID by 3/8 OD by 1/16 CROSS SECTION BUNA O-RING	4	**
2	N/A	N/A	5/32 ID by 9/32 OD by 1/16 CROSS SECTION BUNA O-RING	2	**
3	N/A	N/A	3/8 ID by 1/2 OD by 1/16 CROSS SECTION BUNA O-RING	2	**
4	N/A	N/A	1/2 ID by 11/16 OD by 3/32 CROSS SECTION BUNA O-RING	1	**
5	N/A	N/A	1. ID by 1-13/16 OD by 3/32 CROSS SECTION BUNA O-RING	4	**
6	N/A	N/A	1-5/8 ID by 1-3/4 OD by 1/16 CROSS SECTION BUNA O-RING	3	**
7	N/A	N/A	.180 OD by .016 WD by .25FL COMPRESSION SPRING	1	**
8	N/A	N/A	.455 OD by .038 WD by .625FL COMPRESSION SPRING	1	**
9	N/A	N/A	RETAINING RING 2.012 OD by .062 THICK	5	**
10	N/A	N/A	#4-40 by .50LG SHCS	1	**
11	N/A	N/A	#6-32 by .25LG FLAT HEAD PHILLIPS	1	**
12	N/A	N/A	#6-32 by .88LG FLAT HEAD PHILLIPS	2	**
13	N/A	N/A	#8-32 by .375LG ROUND HEAD PHILLIPS	2	**
14	N/A	N/A	1/16 by .187LG.DOWEL PIN	1	**
15	N/A	N/A	1/16 by .25LG.DOWEL PIN	1	**
16	N/A	N/A	1/8 DIA. by .75LG SPRING PIN	1	**

** The following purchased parts are available from an Industrial supply company such as MSC 1-800-645-7270.

3.1 Parts List and Assembly Drawings

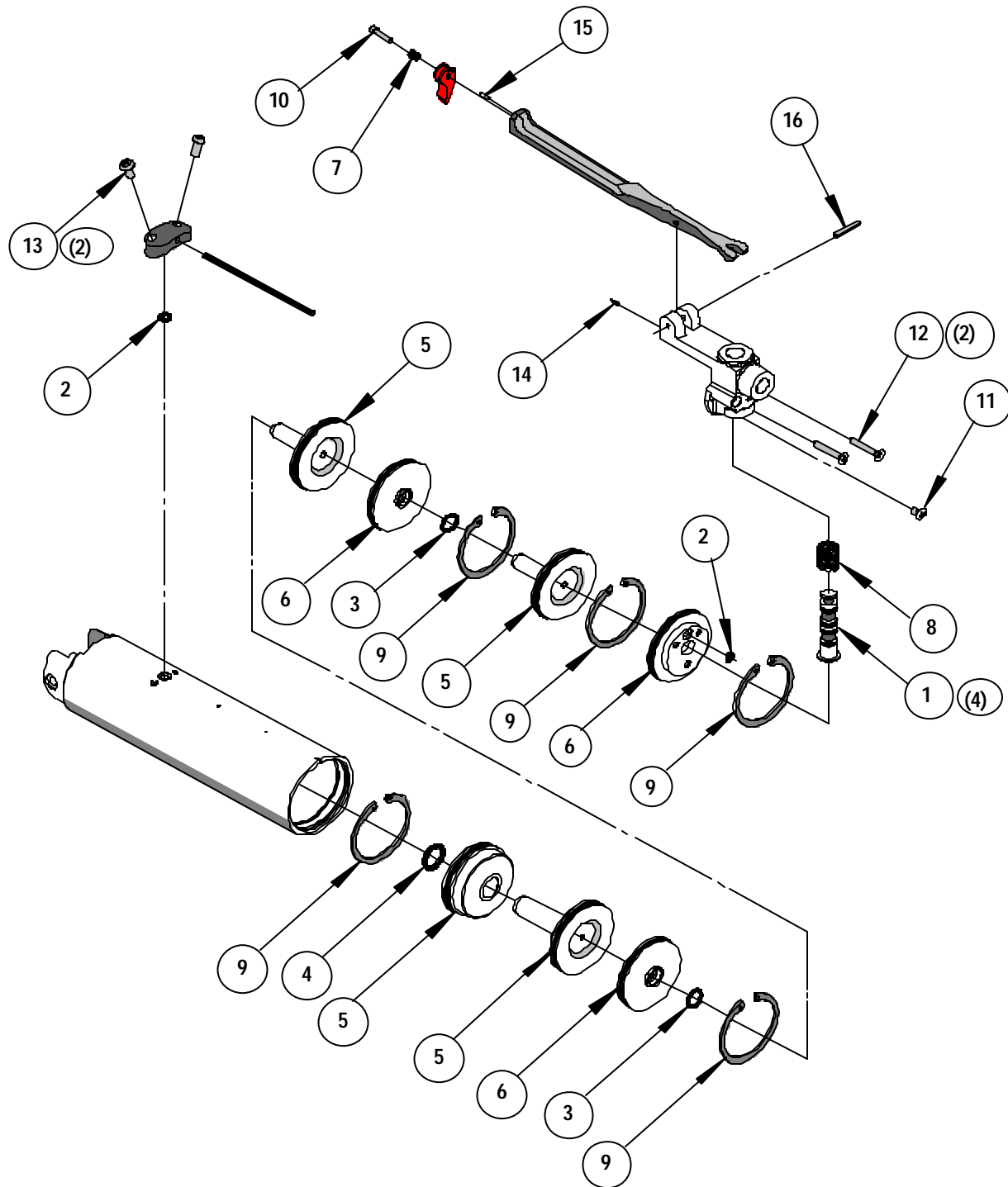


Figure 10

3.1 Parts List and Assembly Drawings

Item	Order No.	Engineering No.	Description	Qty	Notes
	19078-0307	19078-0307	Optional Bench Adapter	REF	(Fig 11)
1	N/A	N/A	Dual Air Hose (1/8 ID x 8')	1	**
2	N/A	N/A	Air Foot Switch (3B – 30A2 – S)	1	**
3	N/A	N/A	Fitting, 1/8 NPT – M by 1/8 Barb	3	**
4	N/A	N/A	Close Nipple 1/8 (M/M)	1	**
5	N/A	N/A	Clippard Thread on Hose Clamp	2	**
6	N/A	N/A	Fitting 1/8 Brass Pipe Tee M/F/F	1	**
7	N/A	N/A	Brass Coupling 1/8 - 1/8 (F/F)	1	**

** The following purchased parts are available from an Industrial supply company such as MSC 1-800-645-7270.

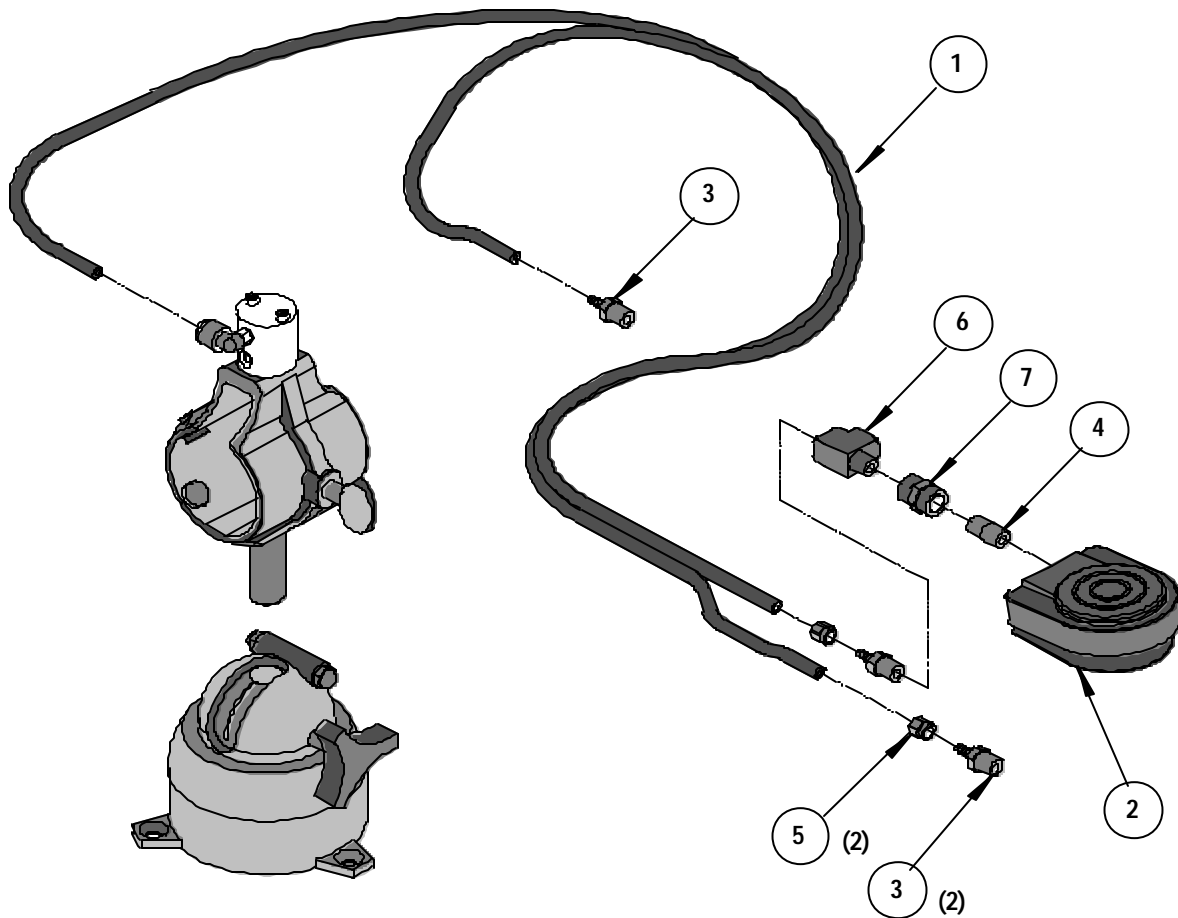


Figure 11

3.3 Maintenance

Crimping nest should be kept free of all foreign particles.

Crimp tool head assemblies should be lubricated monthly by placing a few drops of light machine oil on the pivot pins and cam follower rollers.

Appendix A

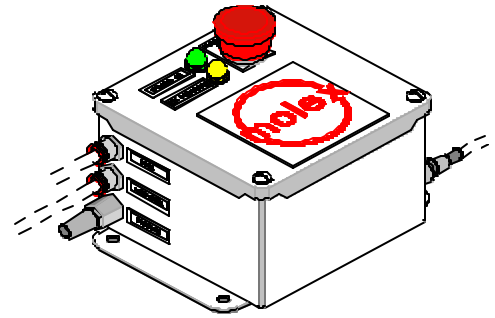
Options

1. Accessories

64001-4000 Full Cycle/Pressure Electrical Control Box Instruction Sheet



Accessory 64001-4000 Full Cycle/Pressure Electrical Control Box Instruction Sheet



DESCRIPTION

- The 64001-400 Full Cycle Electrical Control Box is an option for use on Air Power Crimp Tool (AT200) part no.19279-0001 equipped with Bench Adapter part no.19078-0307.
- This control box will assure that the air tool completes a full crimp cycle. Applying the air pressure for a long enough cycle to assure a successfully completed crimp.
- Prevents actuation if sufficient pneumatic pressure is not available to produce good crimps.
- Eliminates operator judgment and low line pressure as sources of variability for critical applications.

OPERATION

1. To install the control box remove the pneumatic foot switch and all of the tubing.
2. Replace with the components, fittings and tubing, (See Figures 1 and 3).
3. Make sure they are correctly connected in the right positions, which are clearly marked on the each side of the Cycle Box in Figure 1.
4. The power is on if the "Green " indicator light is on.
5. If the "Yellow " indicator light turns on, the air pressure is low (90 PSI – Min.). Check the pressure gauge and reset if necessary.
6. To change the cycle time, the timer has to be readjusted. This is done by taking out the four screws on the top cover. Place the cover aside and locate the timer, (See Figure 2). Using a phillips screwdriver insert it in the slot on top of the timer. Turn the timer clockwise (CW) to increase time or counterclockwise (CCW) to decrease time. The dial can be turned by hand if a screwdriver is not available. Be sure to replace and secure the cover.
7. Push the foot switch to start the crimp cycle.
8. When the crimp cycle is complete the circuit will release and the jaws of the air tool will open.
9. To stop cycle before complete, push the emergency stop button. To reset, rotate the button clockwise (CW) as indicated by the arrows on the button.

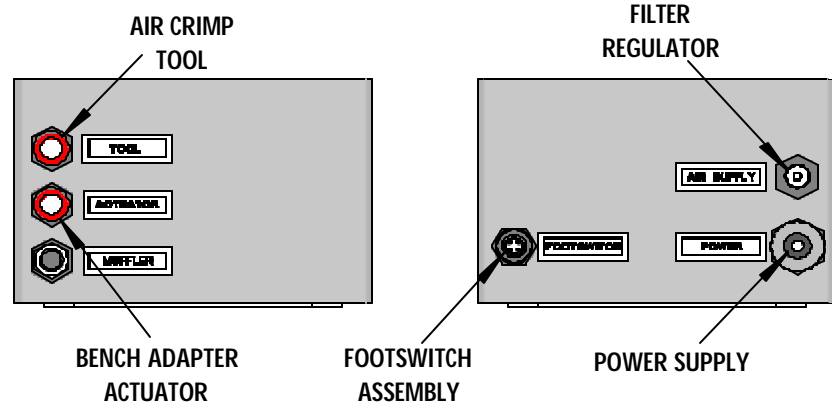


Figure 1

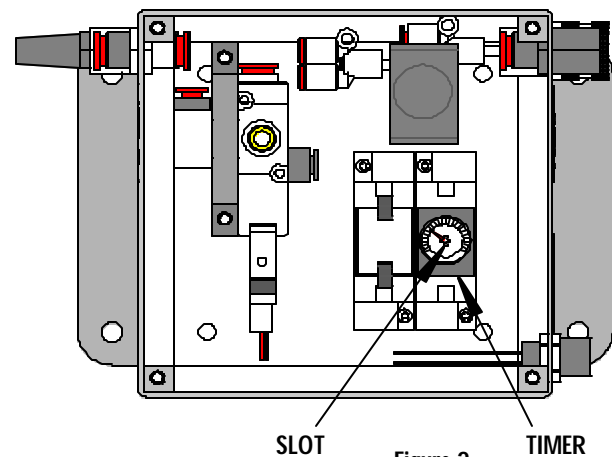


Figure 2

Parts List

Item	Order No.	Description	Qty
1	64001-4000	Electrical Controls (Timed Cycle)	Fig 3
2	62500-1265	Power Supply	1
3	63800-8394	Footswitch Assembly	1
4	69018-6237	Power Cord	1
5	N/A	1/4" . OD Tubing	**
6	N/A	1/8 NPT by 1/4 Tube Fitting	**
7	19078-0307	Bench Adapter	REF
8	19279-0001	Air Power Crimp Tool	REF

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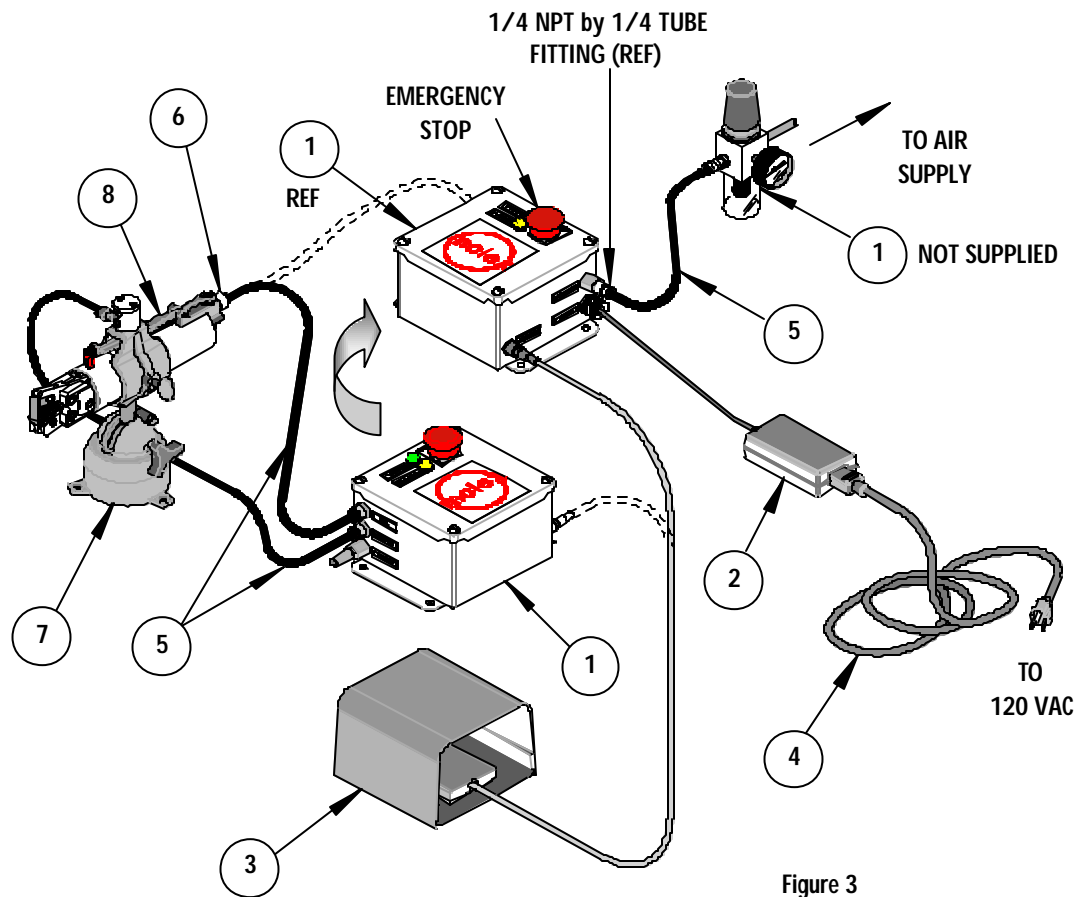


Figure 3



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