

AMPAMP INCORPORATED
Harrisburg, Pa. 17105APPLICATION AND MAINTENANCE
FOR
AMP ★ CRIMPING HEAD ASSEMBLY 90386-1

Instruction Sheet

IS 6543

RELEASED 3-10-80

REDUCED FOR PACKAGING

Section I of this instruction sheet provides application procedures for AMP crimping head assemblies.

Section II provides maintenance and inspection procedures for AMP crimping head assemblies.

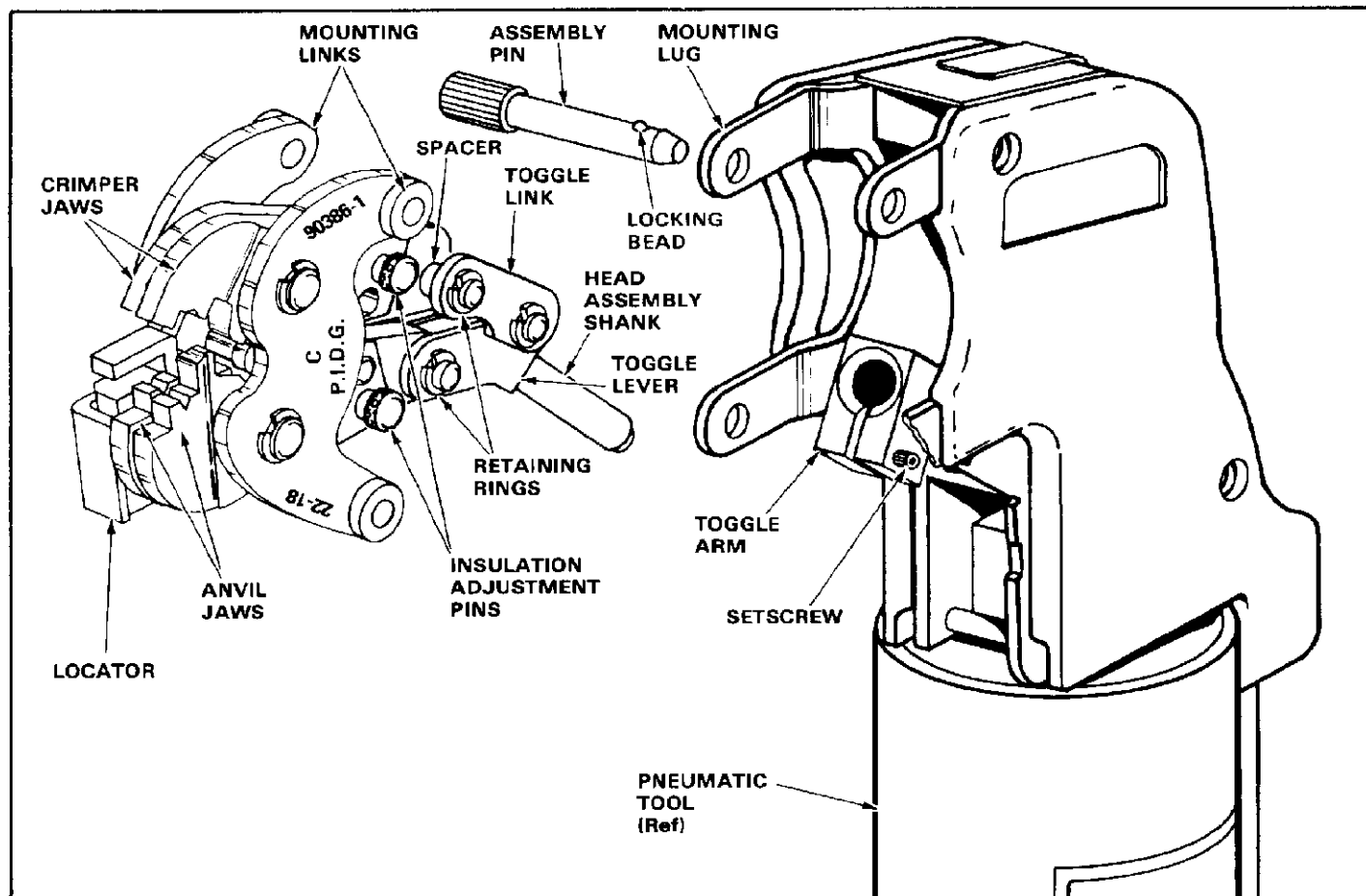


Fig. I-1

I-1. INTRODUCTION

This instruction sheet covers the use of the AMP Crimping Head Assembly 90386-1 which is designed for use in the AMP Pneumatic Tool 69005. The head assembly is used to crimp the AMP PIDG ★ FASTON ★ Terminals listed in Figure I-2.

Read these instructions thoroughly for specific information concerning the head assembly, terminals, wire specifications, and crimping procedures. Refer to IS 1410 packaged with pneumatic tool 69005 for information concerning the setup.

NOTE

All dimensions presented on this instruction sheet are in inches.

ment pins, two mounting links, two toggle links, and a toggle lever with shank.

The locator/wire stop is used to position and hold the terminal in the crimping head assembly and also aids in locating the wire in the terminal.

The insulation adjustment pins are used to regulate the crimp height of the terminal insulation barrel. Refer to Paragraph I-5, INSULATION CRIMP ADJUSTMENT.

I-3. INSTALLATION OF HEAD ASSEMBLY (Figure I-1)**WARNING**

Do NOT attach air supply to the tool until crimping head is completely installed.

Proceed as follows:

1. Remove the two assembly pins from the mounting lugs.

I-2. DESCRIPTION (Figure I-1)

The head assembly features two crimper jaws, two anvil jaws, a terminal locator, two insulation adjust-

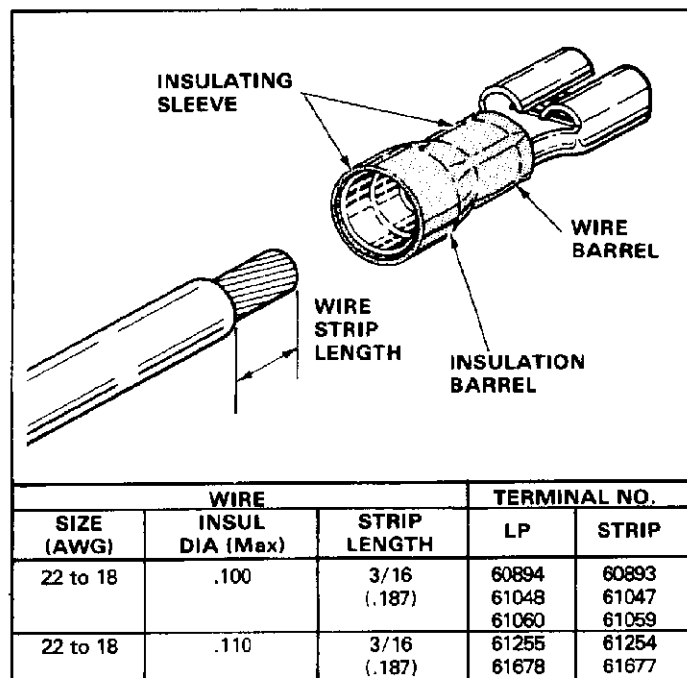


Fig. I-2

2. Pull toggle arm forward and hold. Loosen, but do NOT remove, setscrew in toggle arm.

NOTE

Make sure the toggle link is ABOVE the toggle lever, as shown in Figure I-1.

3. With crimping jaws open, insert head assembly shank into toggle arm until it bottoms. Mounting links must fit between tool mounting lugs.
4. Tighten setscrew in toggle arm.
5. Align mounting holes of head assembly and tool. Insert assembly pins through mounting holes until locking beads pass outer edge of mounting lugs.

I-4. CRIMPING PROCEDURE

Refer to the chart in Figure I-2 and select stranded wire within the specified size and insulation diameter. Strip the wire to the length indicated — do NOT cut or nick the wire strands.

After selecting an applicable loose-piece terminal, refer to Figure I-3 and proceed as follows:

1. Position the terminal so that the insulating sleeve butts against the locator/wire stop and is centered on the crimping jaws.

2. Insert a properly stripped wire into the terminal until the end of wire butts against the locator/wire stop.
3. Holding wire in place, actuate the tool to complete the crimp. Release the crimped terminal from the crimping head.

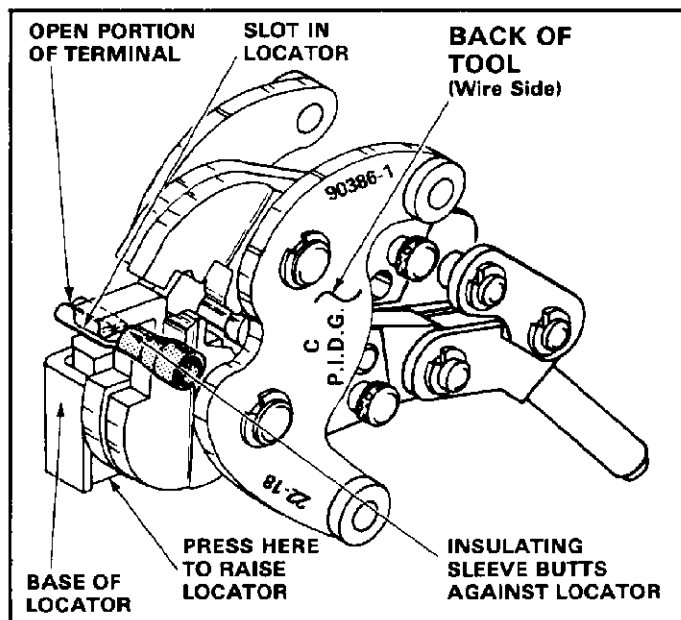


Fig. I-3

I-5. INSULATION CRIMP ADJUSTMENT

The insulation barrel crimp height is regulated by the insulation adjustment pins. To determine the proper setting, place adjustment pins in number 3 position and test crimp a terminal using an UNSTRIPPED wire. Check the insulation crimp by bending the wire back and forth once. If the wire pulls out, set the adjustment pins in the next smaller position. The crimp should hold the insulation firmly without cutting into it.

I-6. REMOVAL OF HEAD ASSEMBLY (Figure I-1)**WARNING**

Disconnect air supply before removing head assembly.

1. Remove the two assembly pins from the tool.
2. Pull head assembly forward to expose setscrew in toggle arm. Loosen setscrew and remove head assembly.

Section I of this instruction sheet provides application procedures for AMP crimping head assemblies.

Section II provides maintenance and inspection procedures for AMP crimping head assemblies.

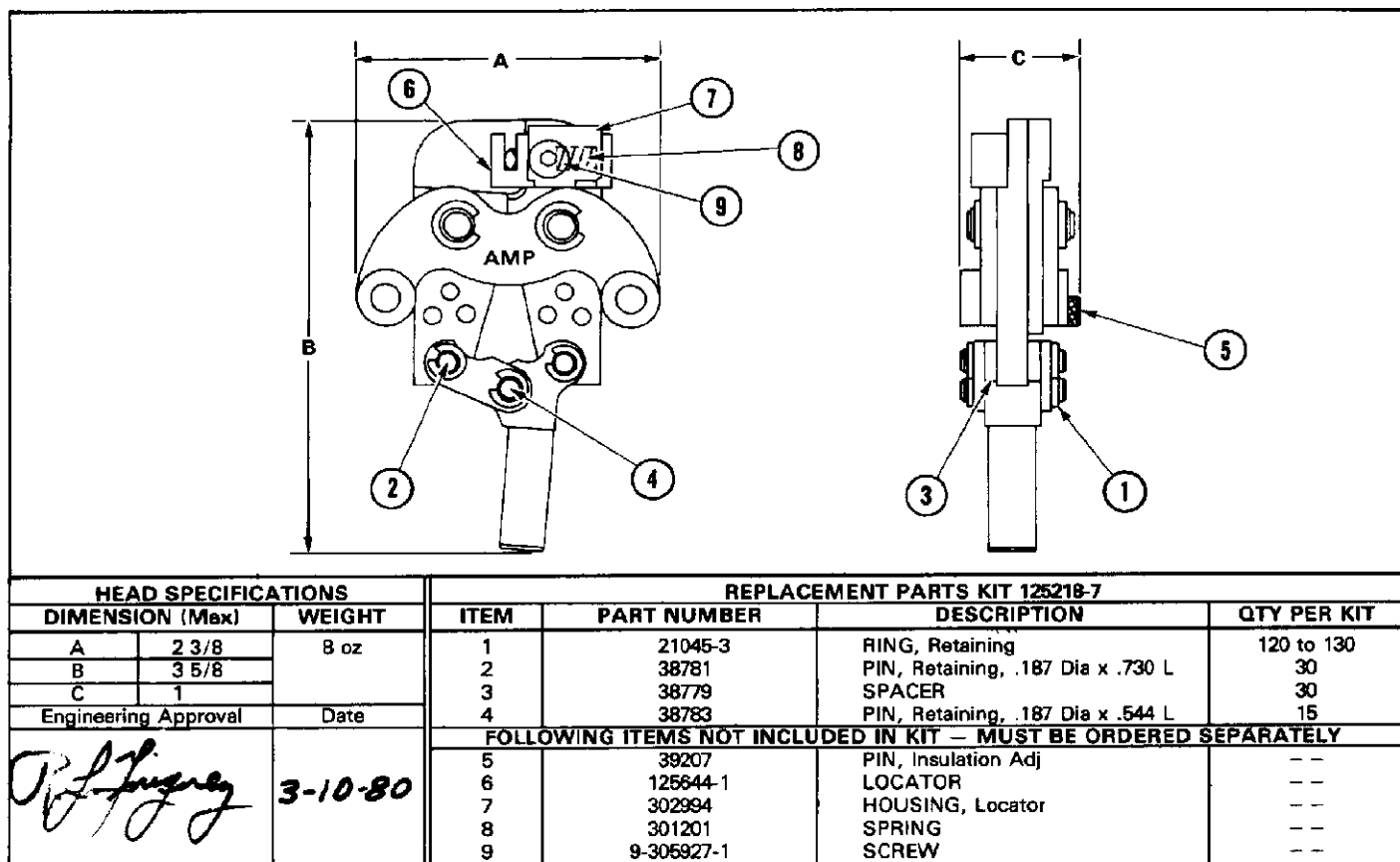


Fig. II-1

SECTION II MAINTENANCE/INSPECTION

II-1. TOOL CERTIFICATION

These instructions have been approved by AMP Design, Production, and Quality Control Engineers to provide documented maintenance and inspection procedures in accordance with AMP Corporate Policy No. 3-3. Through AMP test laboratories and the inspection of production assembly, the procedures described herein have been established to ensure quality and reliability of AMP crimping head assemblies.

Customer replaceable parts are listed in Figure II-1. A complete inventory should be stocked and controlled to prevent lost time when replacement of parts is necessary. When kit items are needed, order replacement kit part number.

II-2. INSPECTION PROCEDURES

A. Daily Maintenance

It is recommended that each operator of the crimping head assembly be made aware of — and responsible for — the following four steps of daily maintenance:

1. Remove dust, moisture, and other con-

taminants with a clean brush, or a soft, lint-free cloth. Do NOT use objects that could damage the crimping head assembly.

2. Make sure the proper retaining pins are in place and secured with the proper retaining rings.

3. Make certain all pins, pivot points, and bearing surfaces are protected with a THIN coat of any good SAE No. 20 motor oil. Do NOT oil excessively.

4. When the head assembly is not in use, keep the head assembly closed to prevent objects from becoming lodged in the crimping jaws and store in a clean, dry area.

B. Periodic Inspection

Regular inspections should be performed by quality control personnel. A record of scheduled inspections should remain with the head assembly and/or be supplied to supervisory personnel responsible for the head assembly. Though recommendations call for at least one inspection a month, the inspection frequency should be based on the amount of use, ambient working conditions, operator training and skill, and established company standards. These inspections should be performed in the following sequence:

B-1. Visual Inspection

1. Remove all lubrication and accumulated film by immersing the head assembly in a suitable commercial degreaser that will not affect paint or plastic material.
2. Make certain all retaining pins are in place and secured with retaining rings. If replacements are necessary, refer to parts listed in Figure II-1.
3. Inspect the head assembly, with special emphasis on checking for worn, cracked, or broken jaws. If damage to any part of the head assembly is evident, return the head assembly to AMP for evaluation and repair (see Paragraph II-3, REPAIR).

B-2. Gaging the Crimping Chamber

This inspection requires the use of a GO NO-GO gage conforming to the diameters in Figure II-2. AMP does not manufacture or market these gages.

Proceed as follows:

1. Close the crimping head assembly until it is evident that the jaws have bottomed, then HOLD in this position. Do NOT force the jaws beyond initial contact.
2. Align the GO element with the wire barrel crimping chamber. Push element straight into the crimping chamber without using force. The GO element must pass completely through the crimping chamber as shown in Figure II-2.
3. Now align the NO-GO element and try to insert it straight into the same crimping chamber. The NO-GO element may start entry but must not pass completely through as shown in Figure II-2.
4. Repeat Steps 2 and 3 for each crimp section listed in the chart.

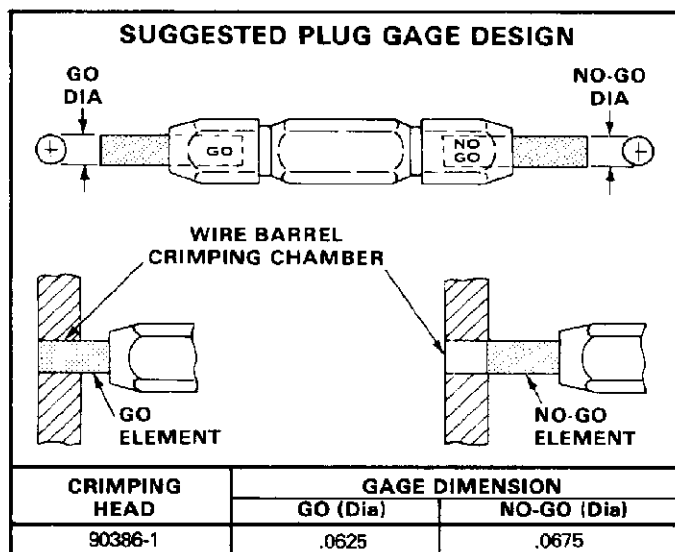


Fig. II-2

If the crimping chamber conforms to the gage inspection, the head assembly is considered dimensionally correct and should be lubricated with a THIN coat of any good SAE No. 20 motor oil. If not, the head assembly must be repaired before returning it to service (see Paragraph II-3, REPAIR).

II-3. REPAIR

Parts other than those specified in Figure II-1 must be replaced by AMP to ensure certification of the head assembly. When repair is necessary, return the head assembly with a written description of the problem to:

AMP Incorporated
Customer Repair
1523 North 4th Street
Harrisburg, Pennsylvania 17105

or a wholly owned subsidiary of AMP Incorporated.