

AMP* CRIMPING DIE ASSEMBLIES 809515-13, -14, -15, AND -16 FOR AMPLIMITE * CRIMP FERRULES



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

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

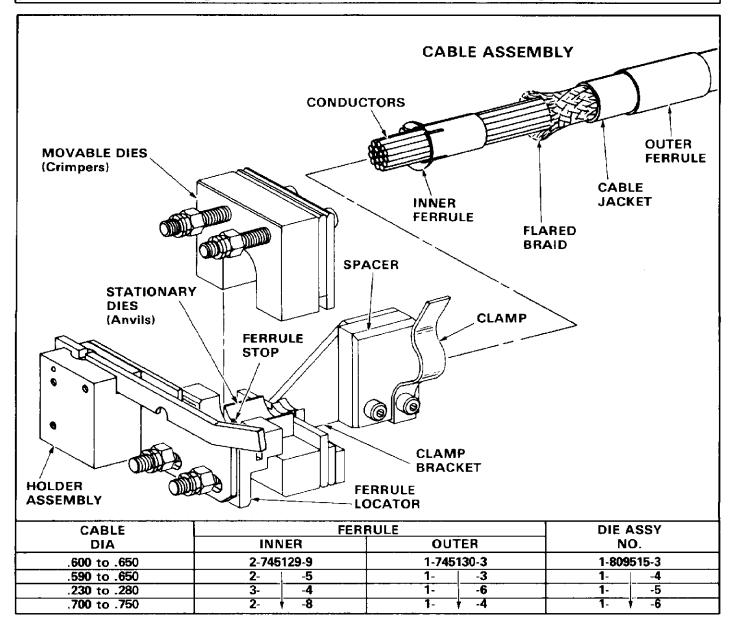


Fig. 1-1

SECTION | APPLICATION

I-1. INTRODUCTION

This instruction sheet (IS) covers the use of AMP Crimping Die Assemblies 809515-13, -14, -15, and -16 which are designed for use in AMP-O-LECTRIC★ Machine 220152-1 to crimp the AMPLIMITE Crimp Ferrules listed in Figure I-1 to jacketed cable.

This instruction sheet covers cable and ferrule

specifications, maintenance and inspection procedures, and general performance of the crimping die assemblies. Read AMP Customer Manual CM 2627, packaged with the machine, for information concerning die installation and general performance of the machine.



All dimensions on this instruction sheet are in inches.

I-2. DESCRIPTION (Figure I-1)

Each die assembly consists of three stationary dies (anvils), and three moving dies (crimpers).

Also included in the die assemblies are a clamp, spacer, and holder assembly which are used for securing the cable before termination. A ferrule locator positions the inner ferrule in the dies, and a ferrule stop positions the outer ferrule in the dies.

1-3. DIE INSTALLATION

The anvils, crimpers, clamp, spacer, holder assembly, and ferrule locators can be installed and removed from the machine by tightening or loosening the self-locking hex nuts which are supplied with the die assemblies.

CAUTION

Before removing or loosening the dies, make sure the electrical supply is removed from the machine.

Install the die assembly according to the instructions in CM 2627, packaged with the machine.

NOTE

When removing the anvils from the machine, be careful not to lose the two springs. Refer to Figure II-1, Item 8.

1-4. CRIMPING PROCEDURE

Refer to the chart in Figure I-1 and check the selected

cable, die number, and inner and outer crimp ferrule.

Prepare the cable and ferrules according to the instructions in AMP Instruction Sheet IS 6609, supplied with the cable clamp kits, and proceed as follows:

- 1. Insert cable, with inner and outer ferrules in place, into dies, and place cable assembly into clamp bracket. Make sure the inner and outer ferrules are positioned in their respective locators.
- 2. Actuate the machine through a complete cycle.
- 3. Allow the crimping dies to open FULLY, and remove the terminated ferrule assembly.

I-5. DAILY MAINTENANCE

Remove all foreign particles with a clean, soft brush, or a clean, soft, lint-free cloth. Make sure the proper die holding screws are in place.

If foreign matter cannot be removed easily, or if the proper replacement parts are not available, return the dies to your supervisor.

Make certain all surfaces of the dies are protected with a THIN coat of any good SAE No. 20 motor oil. Do NOT oil excessively. When the dies are not in use, store them in a clean, dry area.

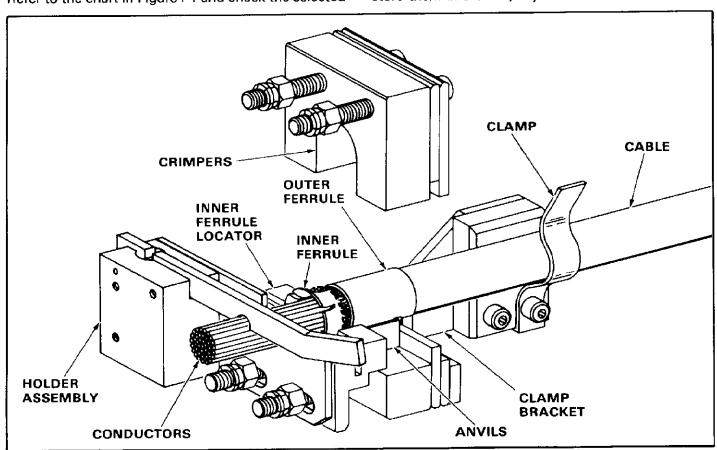
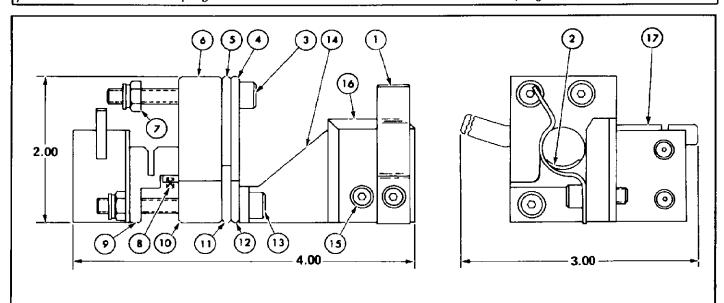


Fig. I-2

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

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



REPLACEMENT PARTS							
DIE ASSEMBLY					DESCRIPTION		QTY
ITEM	1-809515-3	1-809515-4	1-809515-5	1-809515-6	DESCRIPTION		uii
1	807608-1	807608-1	807608-4	807608-1	CLAMP		1
2	812615-5	812615-5	812615-1	812615-4	STOP, Ferrule		1
3	4- 21000-1	4- 21000-1	4- 21000-1	4- 21000-1	SCREW, Skt Hd Cap, 10-32 x 1.50 L		2
4	1-807610-2	1-807610-2	1-807610-5	1-807610-6	CRIMPER, Braid		1
5	807607-6	807607-6	807607-7	807608-8	CRIMPER, Ring		1
6	1-807610-1	1-807610-1	1-807610-3	1-807610-5	CRIMPER, Braid		1
7	21022-3	21022-3	21022-3	21022-3	NUT, Hex, Sifikg		4
8	4- 23147-2	4- 23147-2	4- 23147-2	4- 23147-2	SPRING, .093 x .19 L		2
9	812616-6	812616-5	812616-3	812616-6	LOCATOR, Ferrule		1
10	1-807611-1	1-807611-1	1-807611-3	1-807611-5	ANVIL, Braid		1
11	807609 -6	807609-6	807609-7	807609-8	ANVIL, Ring		1
12	1-807611-2	1-807611-2	1-807611-4	1-807611-6	ANVIL, Braid		1
13	4- 21000-2	4- 21000-2	4- 21000-2	4- 21000-2	SCREW, Skt Hd Cap, 10-32 x 1.75 L 2		2
14	310028-1	310028-1	310028-1	310028-1	BRACKET, Clamp		1
15	1- 21000-5	1- 21000-5	1- 21000-5	1- 21000-5	SCREW, Skt Hd Cap, 4-40 x .50 L		2
16	310029-2	310029-2	310029-2	310029-2	SPACER		1
17	308565-2	308565-2	308565-2	308565-2	HOLDER ASSY		1
ENGINEERING APPROVAL					DATE	WEIGHT	
anthony J. Hayrick					7-28-83	3 lb	

Fig. II-1

SECTION II MAINTENANCE/INSPECTION

II-1. DIE 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 die

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.

II-2. INSPECTION PROCEDURES

A. Daily Maintenance

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

- 1. Remove dust, moisture, and other contaminants with a clean brush, or a soft, lint-free cloth. Do NOT use objects that could damage the dies.
- 2. Make sure the proper die-holding screws are in place.
- 3. Make certain all surfaces are protected with a THIN coat of any good SAE No. 20 motor oil. Do NOT oil excessively.
- 4. When the dies are not in use, store them in a clean, dry area.

B. Periodic Inspections

Regular inspections should be performed by quality control personnel. A record of scheduled inspections should remain with the dies and/or be supplied to supervisory personnel responsible for the dies. 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:

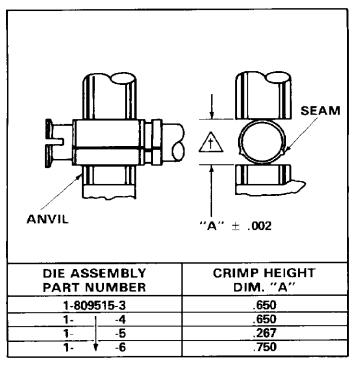
B-1. Visual Inspection

- 1. Remove all lubrication and accumulated film by immersing the dies in a suitable commercial degreaser that will not affect paint or plastic material.
- 2. Make sure all die holding screws and die components are in place. Refer to the parts listed in Figure II-1 if replacements are necessary.
- 3. Check all bearing surfaces for wear. Remove and replace worn components.
- 4. Inspect the crimp area for flattened, chipped, cracked, worn, or broken areas. If damage is evident, the dies must be repaired before returning them to service (see Paragraph II-3, REPAIR).

B-2. Crimp Height Inspection

Proceed as follows:

- 1. Refer to the chart in Figure I-1 and select ferrules and a cable (maximum size) for each crimp section listed in the chart.
- 2. Refer to Paragraph I-4, CRIMPING PRO-



ACRIMP HEIGHT IS MINIMUM DIMENSION OPPOSITE SEAMS.

Fig. 11-2

CEDURE, and crimp the ferrules accordingly.

3. Using a micrometer or vernier caliper, measure ferrule crimp height as shown in Figure II-2.

If the crimp height conforms to that shown in the chart, the dies are considered dimensionally correct and should be lubricated with a THIN coat of any good SAE No. 20 motor oil. If not, the dies must be repaired before returning them 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 dies. When repair is necessary, return the dies with a written description of the problem to:

AMP Incorporated Customer Repair State Route 750 Weyers Cave, Virginia 24486

or a wholly owned subsidiary of AMP Incorporated.