

# APPLICATION SPECIFICATION

NO 114-25000

## 1. SCOPE

This specification covers the requirements for application of AMPMODU\* Mod I receptacle contacts. These requirements are applicable to hand or automatic machine crimping tools. For specific wire and insulation ranges relative to the products covered in this specification see Figure 5 and 6.

## 2. NOMENCLATURE

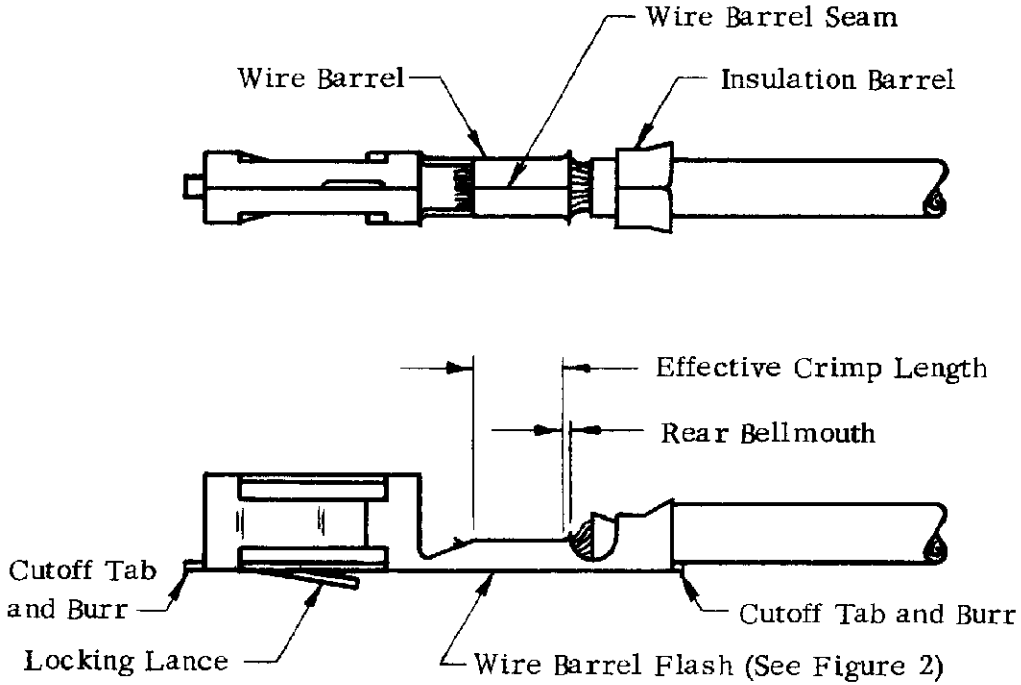


Figure 1

## 3. CRIMP AND DIMENSIONAL REQUIREMENTS

### 3.1. Wire Preparation

#### A. Strip Length

Insulation shall be stripped as indicated in Figure 5 and 6.

#### B. Workmanship

Reasonable care shall be taken not to nick, scrape or cut any strands or the solid wire during the stripping operation.

\*Trademark of AMP Incorporated.

COPYRIGHT 1973, 75, 77 BY AMP INCORPORATED, HARRISBURG, PA. ALL INTERNATIONAL RIGHTS RESERVED. AMP INCORPORATED PRODUCTS COVERED BY U.S. AND FOREIGN PATENTS AND/OR PATENTS PENDING.

				DR <i>P.E. Felt</i> 10-17-73	<b>AMP INCORPORATED</b> Harrisburg, Pa.			
				CHK <i>F. Trophel</i> 10-17-73				
	B Rev Fig 5 & 6	<i>ef</i>	1-18-77	APP <i>R. Clark</i> 10-17-73	LOC B	A	NO 114-25000	REV B
	A Revised per ECN 4021-1193	<i>ef</i>	12-2-75					
DIST 25	LTR REVISION RECORD			SHEET 1 OF 4	CONTACT, RECEPTACLE, AMPMODU MOD I, APPLICATION OF			

3.2. Carrier Cutoff Tab and Burr

A. Cutoff tab shall not exceed .010.

B. Burr

Burr on cutoff tab shall not exceed .003.

3.3. Wire Barrel Crimp

A. Crimp Dimensions and Type

Crimp height, width and type shall be as shown in Figure 5 and 6.

B. Tensile Strength

Crimp tensile strength shall be as shown in Figure 5 and 6 when tested at a rate of 1 inch per minute.

C. Effective Crimp Length

Effective crimp length shall be .090 minimum, and is defined as that portion of the barrel, excluding bellmouth, fully formed by the crimping tool.

D. Wire Barrel Flash

Wire barrel flash shall not exceed .008 as shown in Figure 2.

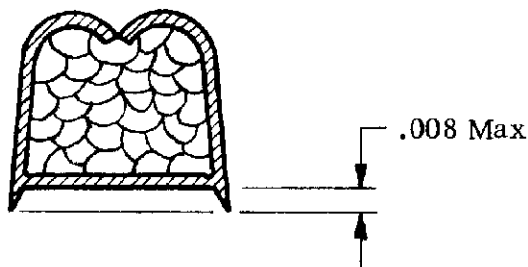


FIG. 2

E. Wire Barrel Seam

Wire barrel seam shall be completely closed and there shall be no evidence of loose wire strands or wire strands visible in the seam.

F. Bellmouth

Rear bellmouth length shall be .006 min.

G. Conductor Location

- (1) End of the wire shall be flush with the front end of the wire barrel or extend .032 maximum after crimping.
- (2) Both insulation and conductor shall be visible between the insulation barrel and wire barrel. Care shall be taken not to allow insulation to be crimped in the wire barrel.



AMP INCORPORATED  
Harrisburg, Pa.

SHEET

2 OF 4

LOC B	A	NO 114-25000	REV B
----------	---	-----------------	----------

NAME CONTACT, RECEPTACLE,  
AMP MODU MOD I, APPLICATION OF

NO 114-25000

3.4. Insulation Barrel Crimp

A. Crimp Dimensions and Type

Crimp width and type shall be as shown in Figure 5 and 6.

B. Workmanship

Reasonable care shall be taken not to cut or break the insulation during the crimping operation.

3.5. Locking Lance

Locking lance shall not be deformed.

3.6. Alignment

A. Straightness

- (1) The contact, including the cutoff tab and burr shall not be bent below the datum line or more than .020 above the datum line as shown in Figure 3.

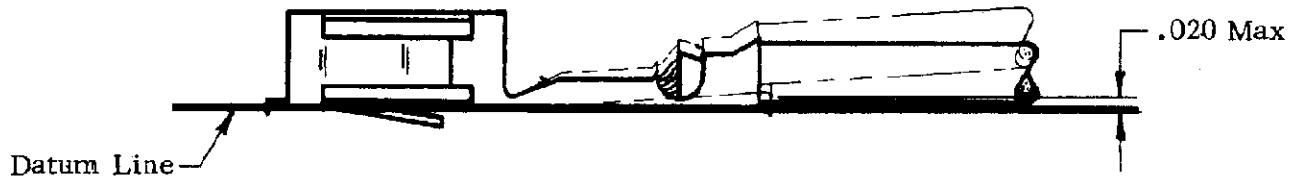


Figure 3

- (2) The side to side bending of the contact shall not exceed the limits specified in Figure 4.

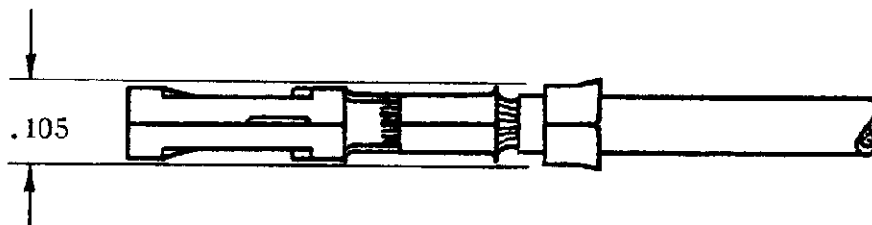



Figure 4

B. Twist or Roll

There shall be no twist or roll in crimped portion that will impair usage of the contact.

SHEET 3 OF 4	 AMP INCORPORATED Harrisburg, Pa.		LOC	NO	REV
			B	A	114-25000
NAME CONTACT, RECEPTACLE, AMP MODU MOD I, APPLICATION OF					

Part No	Wires		Insulation Diameter	Strip Length	Wire Barrel Crimp			Insulation Barrel Crimp		
	No.	Size			Width	Height $\pm .002$	Type Crimper	Tensile Strength Pounds	Width	Type Crimper
87023 87024	1	18	.073-.090	.132-.164	.070 Nom	.046	F	25.0	.110 Nom	O
	1	20								
	1	22								
87023 87024	1	18	.051-.073	.132-.164	.070 Nom	.046	F	25.0	.110 Nom	F
	1	20								
	1	22								
87337 87401	1	22	.042-.073	.132-.164	.055 Nom	.038	F	11.0	.090 Nom	F
	1	24								
	1	26								

Figure 5  
Automatic Machine Wire Crimp Dimensions

Part No	Wires		Insulation Diameter	Strip Length	Wire Barrel Crimp			Insulation Barrel Crimp		Hand Tool Part No.
	No.	Size			Width	Height $\pm .002$	Type Crimper	Tensile Strength Pounds	Width	
87026 87027	1	18	.051-.090	.156-.187	.070 Nom	.042	F	25.0	.100 Nom	90274-2
	1	20								
	1	22								
87338 87402	1	22	.042-.073	.156-.187	.055 Nom	.034	F	11.0	.090 Nom	90328-1
	1	24								
	1	26								

Figure 6  
Hand Tool Wire Crimp Dimensions



AMP INCORPORATED  
Harrisburg, Pa.

SHEET  
4 OF 4

LOC B NO 114-25000 REV B

NAME CONTACT, RECEPTACLE, AMPMODU MOD I, APPLICATION OF