

CABLE JACK PART NUMBERS		MILITARY PART NUMBER M39012/83
CURRENT	PREVIOUS	
1051025-1	2004-8004-92	B 3004
1051029-1	2004-8008-92	-3008

Figure 1

## 1. INTRODUCTION

This instruction sheet contains the assembly procedures for the SMA Bulkhead Feedthrough Cable Jacks (Solder Clamp Attachment) 1051025-1 and 1051029-1 which are designed to be soldered onto RG 402/U 3.58 [.141] semi-rigid coaxial cable using the following tools shown in Figure 2

TOOL DESCRIPTION	PART NUMBER CROSS REFERENCE	
	TE CONNECTIVITY	PREVIOUS PART NUMBER
Locator Tool	1055508-1	2098-5606-02
Clamp Inserts	1055440-1	2098-5207-54
Center Contact Holder	1055454-1	2098-5221-10
Fixture Base	1055439-1	2098-5206-54

Figure 2



Dimensions on this instruction sheet are in millimeters [with inches in brackets]. Figures are not drawn to scale.

Reasons for reissue of this document are provided in Section 4, REVISION SUMMARY.

## 2. DESCRIPTION (Figure 1)

The SMA Bulkhead Feedthrough Cable Jack (Solder Clamp Attachments) consist of a housing sub-assembly, dielectric, center contact, rear dielectric, inner sleeve, and clamp nut, mounting nut, lockwasher, and "O" ring.

## 3. ASSEMBLY PROCEDURE

### 3.1. Preparation of Cable



Follow safety precautions included with the tools used for assembly.

1. Insert the squared cable end into the fixture base hole pattern No. 2. as shown in Figure 3.
2. Place saw in saw slot and cut through outer conductor and into dielectric while rotating cable.
3. Remove cable from fixture and finish cutting dielectric with cutting blade.
4. Bare inner conductor by prying cut outer conductor and dielectric from cable.
5. Complete trimming of cable inner conductor to dimension shown in Figure 3.

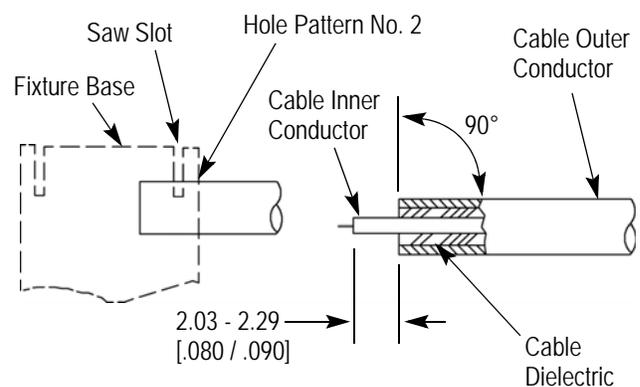
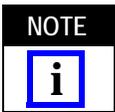


Figure 3

### 3.2. Soldering of Inner Sleeve to Cable

1. Place clamp nut and inner sleeve on end of cable.
2. Place loose assembly in fixture base as shown in Figure 4. (Slide clamp nut back out of way).
3. Nest cable in locator tool.
4. Tighten clamp screw to secure cable.
5. Tighten locator tool to seat cable firmly.
6. Slide inner sleeve against locator tool.
7. Maintain position of inner sleeve firmly against locator tool and solder.



*Fixture base should be clamped vertically in vise to keep inner sleeve seated against locator tool.*

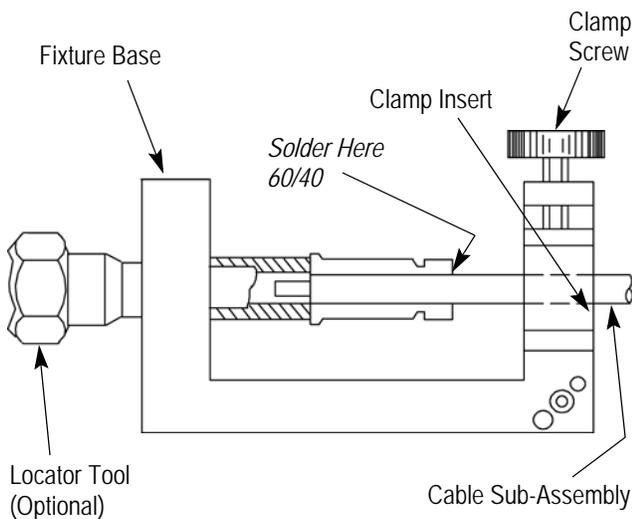


Figure 4

### 3.3. Soldering of Center Contact to Cable Inner Conductor

1. Tin inner conductor of cable.
2. Place rear dielectric onto cable inner conductor as shown in Figure 5.
3. Place center contact in holder. Heat center contact and push it over inner conductor of cable with the large diameter of contact resting firmly against rear dielectric.
4. Remove excess solder.

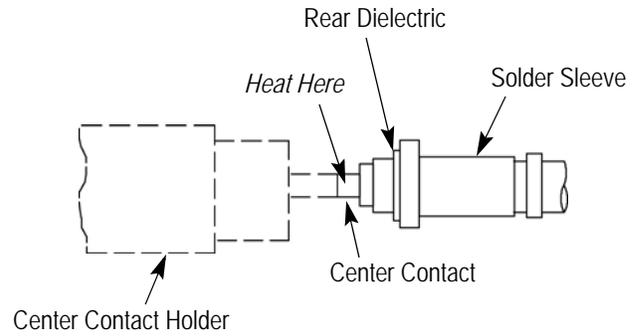


Figure 5

### 3.4. Secure Inner Sleeve Sub-Assembly to Housing

1. Assemble front dielectric onto center contact as shown in Figure 6.
2. Slide clamp nut over inner sleeve and engage threads of clamp to housing. Torque to 2.83-3.39 N•m [25-30 in-lb].
3. Assembly is now complete.

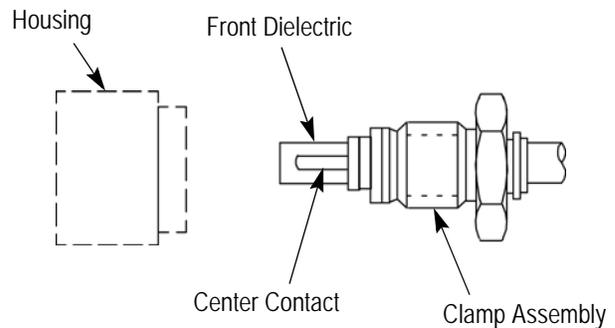


Figure 6



*Damaged components may not be used. They must be replaced with new components.*

### 4. REVISION SUMMARY

Since the previous version of this document, the following changes were made:

- Updated document to corporate requirements.