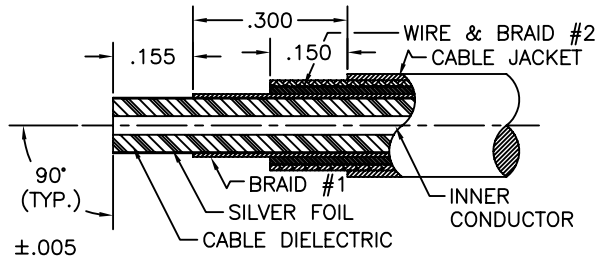
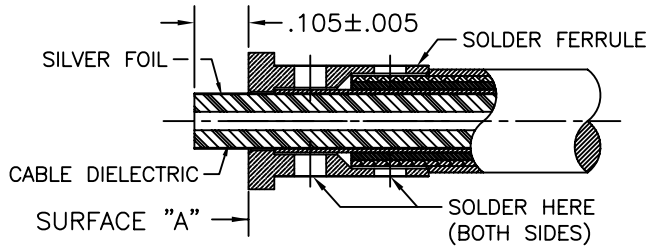


# SGMC MICROWAVE CABLE ASSEMBLY INSTRUCTIONS



## 1.0 PREPARATION OF CABLE:

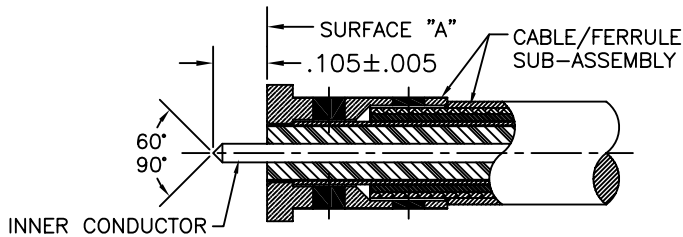
- 1.1 TRIM CABLE TO DIMENSIONS SHOWN. ALL CUTS MADE TO CABLE LAYERS SHOULD BE 90° FROM CENTERLINE. CARE SHOULD BE TAKEN NOT TO NICK CABLE DIELECTRIC, INNER CONDUCTOR, SILVER FOIL, STEEL WIRE, OR INNER BRAID DURING THIS OPERATION.
- 1.2 INSPECT CABLE PREPARATION TO DIMENSIONS SHOWN.



## 2.0 SOLDERING OF FERRULE TO INNER BRAID OF CABLE:

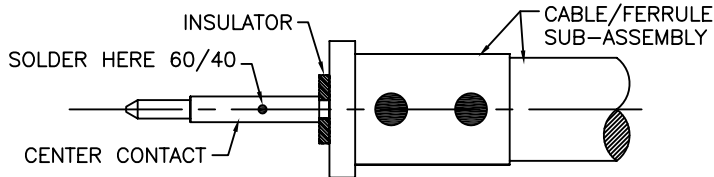
- 2.1 SLIDE CLAMP NUT WITH "O" RING ONTO CABLE AS SHOWN BELOW IN STEP 5.0.
- 2.2 TIN INNER BRAID OF CABLE. HEAT SOLDER FERRULE AND SLIDE IT OVER CABLE UNTIL IT BOTTOMS COMPLETELY ON CABLE SHOULDER (CABLE JACKET).
- 2.3 USING A RESISTIVE SOLDERING IRON, SOLDER FERRULE AS SHOWN USING 60/40 SOLDER (BOTH SIDES).
- 2.4 INSPECT & REMOVE EXCESS SOLDER AND CLEAN WITH SOLVENT (ALCOHOL).

**NOTE:** DIELECTRIC & FOIL SHALL PROTRUDE PAST SURFACE "A" & REVEAL DIM'S PROVIDED ABOVE. CARE SHOULD BE TAKEN NOT TO NICK OR TEAR FOIL OR DIELECTRIC DURING THIS OPERATION.



## 3.0 PREPARATION OF CABLE INNER CONDUCTOR:

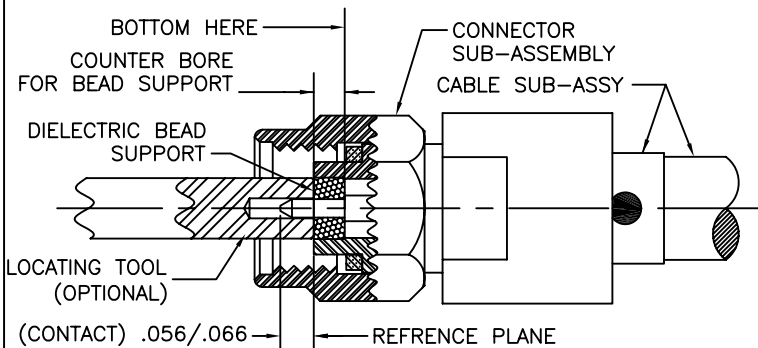
- 3.1 TRIM CABLE DIELECTRIC & FOIL FLUSH TO SURFACE "A". CARE SHOULD BE TAKEN NOT TO NICK INNER CONDUCTOR DURING THIS OPERATION.
- 3.2 FILE BLUNT END OF CABLE INNER CONDUCTOR TO A 60°/90° CONE.
- 3.3 INSPECT CABLE PREPARATION.



## 4.0 SOLDERING OF CONTACT TO INNER CABLE CONDUCTOR:

- 4.1 PLACE INSULATOR ON CENTER CONDUCTOR RESTING FIRMLY AGAINST SOLDER FERRULE AS SHOWN.
- 4.2 TIN INNER CONDUCTOR OF CABLE. HEAT CONTACT AND SLIDE IT OVER INNER CONDUCTOR TO REST FIRMLY AGAINST INSULATOR.
- 4.3 USING 60/40 SOLDER, SOLDER CONTACT AS SHOWN.
- 4.4 INSPECT & REMOVE EXCESS SOLDER. CLEAN WITH SOLVENT.

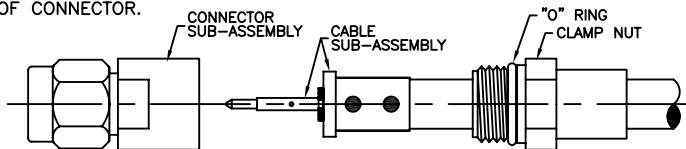
**NOTE:** EXCESSIVE HEAT CAUSES DIELECTRIC (TEFLON) TO SHRINK BELOW ACCEPTABLE LEVELS. HEAT SOLDER ONLY UNTIL IT STARTS TO FLOW.



## 5.0 INSTALLATION OF CABLE SUB-ASSEMBLY:

- 5.1 SLIDE CONNECTOR SUB-ASSEMBLY ONTO CABLE SUB-ASSEMBLY AS SHOWN. "CARE SHOULD BE TAKEN DURING THIS PROCESS TO INSURE THAT THE CONTACT AND/OR DIELECTRIC BEAD SUPPORT ARE NOT DAMAGED."
- 5.2 SLIDE CLAMP NUT OVER CABLE TO BODY & TIGHTEN CLAMP NUT TO 15 INCH-POUNDS.
- 5.2 IF DURING STEP 5.1 & 5.2 THE DIELECTRIC BEAD SUPPORT WAS PRESSED OUT OF THE CONNECTOR SUB-ASSEMBLY YOU MAY USE THE LOCATING TOOL (SGMc PT#234-000) TO REINSERT THE DIELECTRIC. "IF NEEDED; PLACE CABLE CONNECTOR INTO FIXTURE BASE AND SECURE TO PREVENT MOVEMENT. PRESS BEAD SUPPORT OVER CENTER CONTACT UNTIL IT BOTTOMS AGAINST COUNTER BORE OF BODY. THE LOCATING TOOL MAY BE THREADED INTO THE FIXTURE BASE TO ASSIST IN THIS PROCESS AS SHOWN. "CARE SHOULD BE TAKEN DURING THIS PROCESS TO INSURE THAT THE CONTACT AND/OR DIELECTRIC BEAD SUPPORT ARE NOT DAMAGED".
- 5.3 INSPECT CENTER CONTACT LENGTH FROM REFERENCE PLANE IN ACCORDANCE WITH DIMENSIONS PROVIDED. (.056/.066).

**NOTE:** DO NOT ALLOW SOLVENTS TO COME IN CONTACT WITH BEAD. THIS MAY DAMAGE BEAD AND EFFECT THE OVERALL PERFORMANCE OF CONNECTOR.



200-34-20-530

**SGMC MICROWAVE**  
www.sgmcmicrowave.com

### TOOLS REQUIRED:

1. RESISTANCE SOLDERING MACHINE.
2. FLUX, SOLDER POT, 60/40 SOLDER.
3. RAZOR BLADES & SCOTCH BRITE.
5. SOLVENT (ISOPROPYL ALCOHOL).
6. INTERFACE MATING TOOL (PT#234-000).
7. CABLE CONNECTOR ASSEMBLY FIXTURE.

TITLE:  
2.9mm MALE TO  
I.W. 1503 CABLE (REV. G)  
(SOLDER CLAMP)

SCALE: NTS	CAGE CODE: 1UYM4	SIZE: A
SHEET: 1 OF 1	DRAWN: LRH II	APPR:
REVISIONS		
LTR:	DESCRIPTION: (ECN#)	DATE:
-	DWG. RELEASED	08/19/02

"PROPRIETARY INFORMATION"