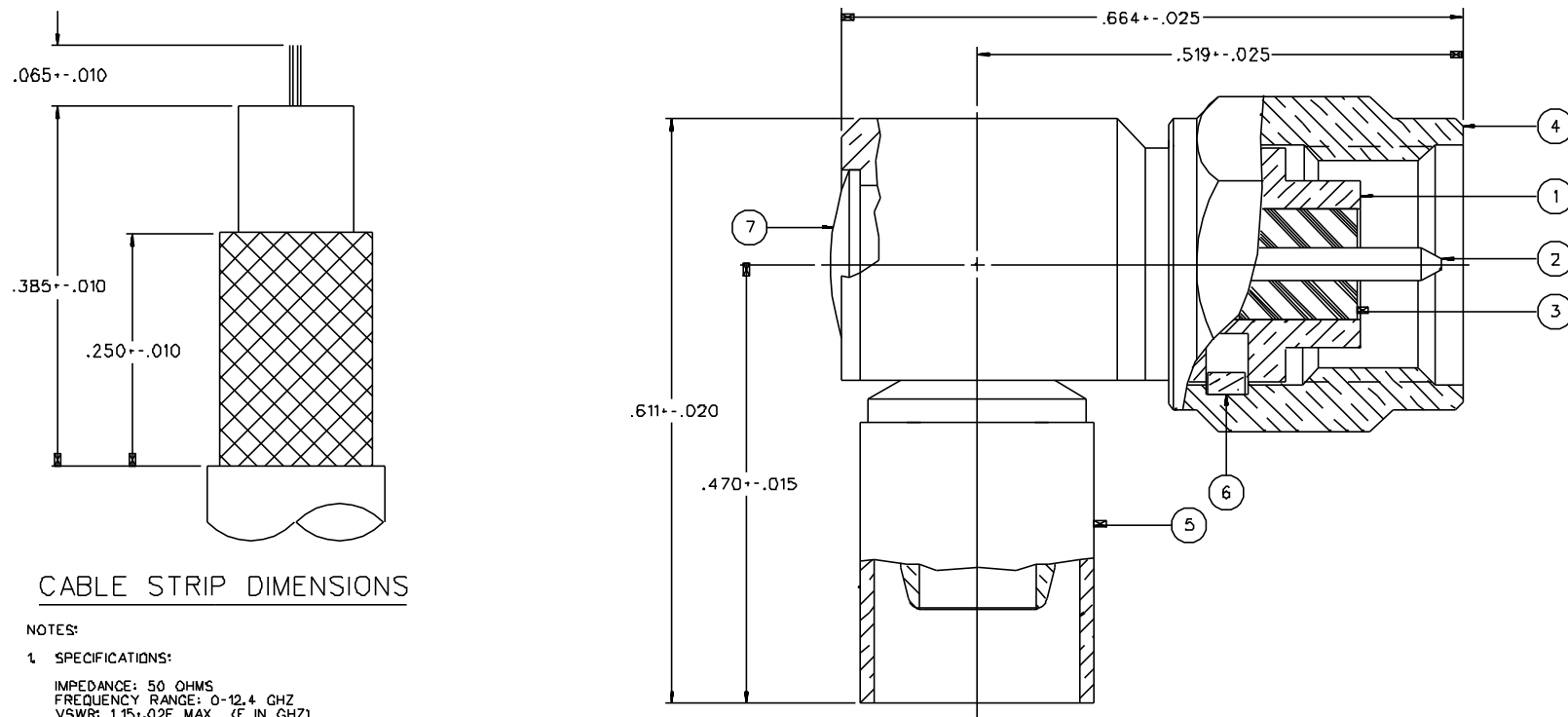


| PART NUMBER  | ITEM ①<br>BODY                                                                        | ITEM ②<br>CONTACT                                                                     | ITEM ③<br>INSULATOR | ITEM ④<br>HEX NUT                                                                     | ITEM ⑤<br>CRIMP SLEEVE                                                                 | ITEM ⑥<br>RETENTION SPRING   | ITEM ⑦<br>END CAP                                                                     | ITEM ⑧<br>HEAT SHRINK         |
|--------------|---------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------|---------------------|---------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------|------------------------------|---------------------------------------------------------------------------------------|-------------------------------|
| 142-D408-101 | BRASS<br>GOLD PL .00001 MIN OVER<br>NICKEL PL .00005 MIN OVER<br>COPPER PL .00005 MIN | BRASS<br>GOLD PL .00003 MIN OVER<br>NICKEL PL .00005 MIN OVER<br>COPPER PL .00005 MIN | TEFLON              | BRASS<br>GOLD PL .00001 MIN OVER<br>NICKEL PL .00005 MIN OVER<br>COPPER PL .00005 MIN | COPPER<br>GOLD PL .00001 MIN OVER<br>NICKEL PL .00005 MIN OVER<br>COPPER PL .00005 MIN | BERYLLIUM COPPER<br>UNPLATED | BRASS<br>GOLD PL .00001 MIN OVER<br>NICKEL PL .00005 MIN OVER<br>COPPER PL .00005 MIN |                               |
| 142-D408-102 | BRASS<br>GOLD PL .00001 MIN OVER<br>NICKEL PL .00005 MIN OVER<br>COPPER PL .00005 MIN | BRASS<br>GOLD PL .00003 MIN OVER<br>NICKEL PL .00005 MIN OVER<br>COPPER PL .00005 MIN | TEFLON              | BRASS<br>GOLD PL .00001 MIN OVER<br>NICKEL PL .00005 MIN OVER<br>COPPER PL .00005 MIN | COPPER<br>GOLD PL .00001 MIN OVER<br>NICKEL PL .00005 MIN OVER<br>COPPER PL .00005 MIN | BERYLLIUM COPPER<br>UNPLATED | BRASS<br>GOLD PL .00001 MIN OVER<br>NICKEL PL .00005 MIN OVER<br>COPPER PL .00005 MIN | POLYOLEFIN<br>COLOR:<br>BLACK |
| 142-D408-106 | BRASS<br>NICKEL PL .0001 MIN OVER<br>COPPER PL .00005 MIN                             | BRASS<br>GOLD PL .00003 MIN OVER<br>NICKEL PL .00005 MIN OVER<br>COPPER PL .00005 MIN | TEFLON              | BRASS<br>NICKEL PL .0001 MIN OVER<br>COPPER PL .00005 MIN                             | COPPER<br>NICKEL PL .0001 MIN OVER<br>COPPER PL .00005 MIN                             | BERYLLIUM COPPER<br>UNPLATED | BRASS<br>NICKEL PL .0001 MIN OVER<br>COPPER PL .00005 MIN                             |                               |



## CABLE STRIP DIMENSIONS

### NOTES:

#### 1 SPECIFICATIONS:

IMPEDANCE: 50 OHMS  
 FREQUENCY RANGE: 0-12.4 GHZ  
 VSWR: 1.15+.02F MAX (F IN GHZ)  
 WORKING VOLTAGE: 335 VRMS MAX AT SEA LEVEL  
 DIELECTRIC WITHSTANDING VOLTAGE: 1000 VRMS MIN AT SEA LEVEL  
 INSULATION RESISTANCE: 5000 MEGOHM MIN  
 CONTACT RESISTANCE:  
   CENTER CONTACT - INITIAL 4.0 MILLIOHM MAX, AFTER ENVIRONMENTAL 6.0 MILLIOHM MAX  
   OUTER CONDUCTOR - INITIAL 2.0 MILLIOHM MAX, AFTER ENVIRONMENTAL NOT APPLICABLE  
   BODY TO CABLE - 0.5 MILLIOHM MAX (GOLD PLATED), 5.0 MILLIOHMS MAX (NICKEL PLATED)  
 CORONA LEVEL: 250 VOLTS MIN AT 70,000 FEET  
 INSERTION LOSS: .15 V/F (F IN GHZ) AT 6 GHZ  
 RF LEAKAGE: -60 DB MIN AT 2.5 GHZ  
 RF HIGH POTENTIAL WITHSTANDING VOLTAGE: 670 VRMS MIN AT 4 AND 7 MHZ

#### MECHANICAL:

ENGAGE/DISENGAGE TORQUE: 2 INCH-POUNDS MAX  
 MATING TORQUE: 7-10 INCH POUNDS  
 COUPLING PROOF TORQUE: 15 INCH-POUNDS MIN  
 COUPLING NUT RETENTION: 60 LBS MIN  
 CONTACT RETENTION: 6 LBS MIN  
 CABLE ACCEPTABILITY: RG 55/U, RG 142/U, RG 223/U, RG 400/U  
 CABLE HEX CRIMP SIZE: .213  
 CABLE RETENTION: 45 LBS MIN AXIAL FORCE  
 DURABILITY: 500 CYCLES MIN

#### ENVIRONMENTAL:

(MEETS OR EXCEEDS THE APPLICABLE PARAGRAPH OF MIL-C-39012)  
 THERMAL SHOCK: MIL-STD-202, METHOD 107, CONDITION B EXCEPT B5\* C HIGH TEMP  
 OPERATING TEMPERATURE: -65 DEG C TO 165 DEG C  
 CORROSION: MIL-STD-202, METHOD 101, CONDITION B  
 SHOCK: MIL-STD-202, METHOD 213, CONDITION I  
 VIBRATION: MIL-STD-202, METHOD 204, CONDITION D  
 MOISTURE RESISTANCE: MIL-STD-202, METHOD 106

DRAWING NO.  
C - 142-0408-101/110

### REVISIONS

#### ENGINEERING RELEASE

1 6-15-90 E J A 7-3-90 ECO 24704

ADDED: TO BODY TO CABLE SPEC.  
 "GOLD PLATED", 5.0 MILLIOHMS MAX  
 "NICKEL PLATED", TO INSERTION  
 LOSS SPEC "AT 6 GHZ TO RF ...  
 VOLTAGE SPEC "TO 7.5"

2 11-11-90 R H B 11-20-90 ECO 24984

CHANGED: DRAWING WAS "D" SIZE. RF  
 LEAK 2.5 GHZ WAS 2 TO 3 GHZ. RF  
 HIGH POT 4 AND 7 MHZ WAS 5 TO  
 7.5 MHZ

3 4-13-92 R H B 4-20-92 ECO 40916

CHANGED: UPDATED GRAPHICS

4 12-6-93 R H B 12-22-93 ECO 42068

ADDED: P/N 142-0408-102 ITEM 8

HEAT SHRINK

\* REVISION NUMBER FOLLOWED BY AN ALPHA \*  
 \* CHARACTER INDICATES DRAWING CHANGE \*  
 \* CATION OR PART NUMBER ADDITION ONLY \*

40 2-10-94 R H B ECO 42295

## CUSTOMER DRAWING

THIS DRAWING TO BE INTERPRETED  
PER ANSI Y 14.5M - 1982

"μSTATION"

### COMPANY CONFIDENTIAL

|                                      |                        |                 |                                                            |                       |
|--------------------------------------|------------------------|-----------------|------------------------------------------------------------|-----------------------|
| TOLERANCE UNLESS OTHERWISE SPECIFIED | DRAWN BY<br>EJ         | DATE<br>7-31-87 | 299 Johnson Ave.<br>P.O. Box 1732<br>Waseca, MN 56093-0832 |                       |
| DECIMALS<br>.XX                      | CHECKED BY             | DATE            | TITLE<br>PLUG ASSEMBLY,<br>RA CABLED<br>SMA, RG 142        |                       |
| XXX                                  | APPROVED BY<br>OMI     | DATE<br>6-15-90 |                                                            |                       |
| MATL                                 | APPROVED BY<br>RJB     | DATE<br>6-19-90 | CODE NO.                                                   | DRAWING NO.           |
| FINISH                               | RELEASE DATE<br>7-3-90 |                 | C - 142-0408-101/110                                       |                       |
|                                      |                        |                 | SCALE 10:1                                                 | U/N INCH SHEET 2 OF 2 |