ITEM (1) ITEM (2) ITEM (3) ITEM (4) ITEM (5) ITEM 6 ITEM (7) BODY SLIDER CRIMP SLEEVE PART NUMBER CONTACT INSULATOR | RETENTION SPRINGS COUPLING NUT BERYLLIUM COPPER GOLD PL .00005 MIN OVER NICKEL PL .00005 MIN OVER COPPER PL .00005 MIN BERYLLIUM COPPER BERYLLIUM COPPER NICKEL PL .0001 MIN OVER COPPER BRASS TEFLON BRASS 142-1404-001 NICKEL PL .0001 MIN OVER COPPER PL .00005 MIN NICKEL PL .0001 MIN OVER GOLD PL .00001 MIN OVER UNPLATED NICKEL PL .00005 MIN OVER COPPER PL .00005 MIN COPPER PL .00005 MIN COPPER PL .00005 MIN

COUPLING NUT

(TURN TO TIGHTEN)

4:1

CAUTION:

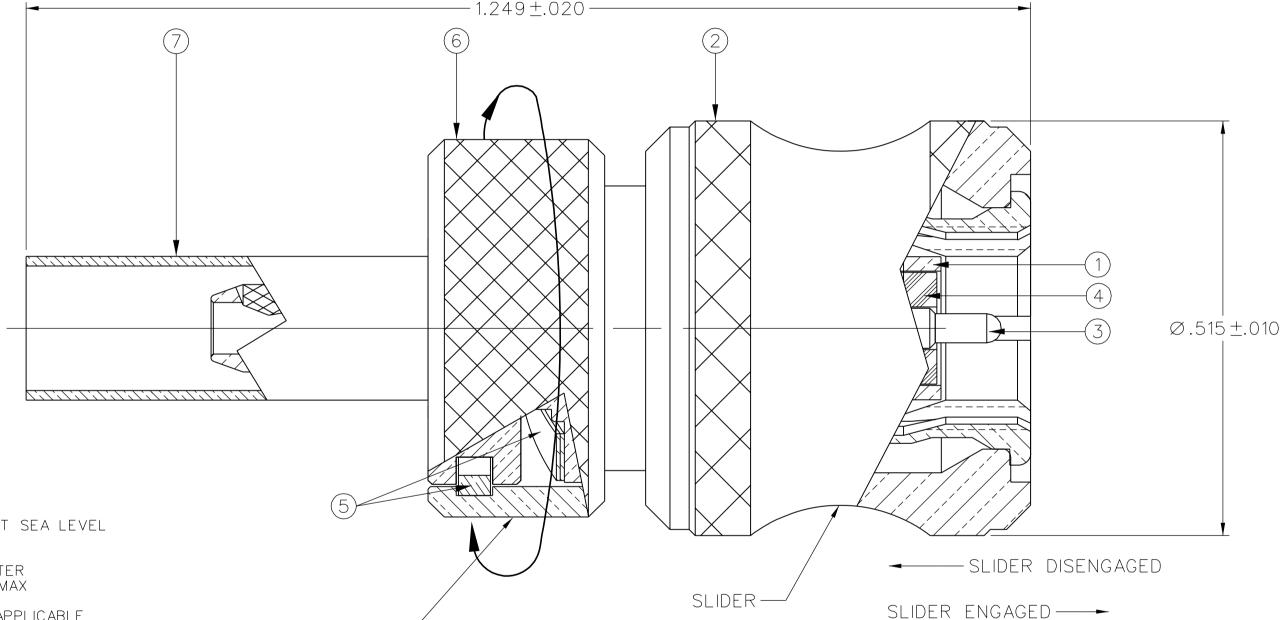
1. THIS SMA PLUG CONNECTOR IS DESIGNED FOR HIGH DURABILITY AND LONG LIFE IN TEST APPLICATIONS.

HOWEVER, IT IS DESIGNED FOR LIMITED MATINGS WITH A SINGLE JACK RECEPTACLE.
AN SMA JACK RECEPTACLE MAY EXPERIENCE THREAD PLATING WEAR AFTER MANY ENGAGEMENTS.

INSTRUCTIONS FOR USE:

- 1. WITH SLIDER AT THE ENGAGED POSITION, THE CONNECTOR FUNCTIONS LIKE A STANDARD SMA CONNECTOR.

 TIGHTEN (SPIN) THE KNURLED COUPLING NUT BY HAND TO OBTAIN FULL MATING ENGAGEMENT OR DISENGAGEMENT.
- 2. QUICK CONNECT:
- A. WITH SLIDER AT THE DISENGAGED POSITION, SLIDE THE CABLED CONNECTOR ONTO AN SMA JACK RECEPTACLE, OVER THE JACK THREADS BY PUSHING ON THE BACK OF THE KNURLED NUT.
- B. ENGAGE THE SLIDER WHILE MAINTAINING LIGHT FORWARD PRESSURE ON THE NUT. THIS ACTION IS DONE BY SLIPPING YOUR FINGERS FROM THE NUT TO THE SLIDER IN ONE MOTION.
- C. ONCE THE SLIDER IS ENGAGED THE KNURLED NUT CAN BE TURNED 1 TURN OR LESS TO OBTAIN FULL ENGAGEMENT SMA PERFORMANCE.
- D. DISENGAGE THE CONNECTOR BY FIRST LOOSENING THE KNURLED NUT A PARTIAL TURN. THEN DISENGAGE THE SLIDER AND REMOVE THE CONNECTOR.



1 SDECIEICATION

NOTES:

1. SPECIFICATIONS:

IMPEDANCE: 50 OHMS
FREQUENCY RANGE: 0-12.4 GHz
VSWR: 1.15+.02 F MAX (F IN GHz)
WORKING VOLTAGE: 250 VRMS MAX AT SEA LEVEL
DIELECTRIC WITHSTANDING VOLTAGE: 750 VRMS MIN AT SEA LEVEL
INSULATION RESISTANCE: 5000 MEGOHM MIN
CONTACT RESISTANCE:
CENTER CONTACT - INITIAL 3.0 MILLIOHM MAX, AFTER
ENVIRONMENTAL 4.0 MILLIOHM MAX
OUTER CONDUCTOR - INITIAL 2.0 MILLIOHM MAX
AFTER ENVIRONMENTAL NOT APPLICABLE

BODY TO CABLE - 0.5 MILLIOHM MAX (GOLD PLATED)
5.0 MILLIOHM MAX (NICKEL PLATED)
CORONA LEVEL: 190 VOLTS MIN AT 70,000 FEET
INSERTION LOSS: .06 \(\sqrt{F} \) dB MAX (F IN GHz) AT 6 GHz

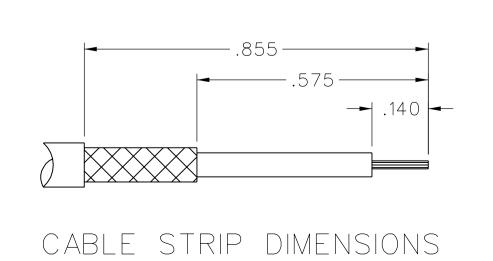
RF LEAKAGE: -60 DB MIN AT 2.5 GHz RF HIGH POTENTIAL WITHSTANDING VOLTAGE: 500 VRMS MIN AT 4 AND 7 MHz

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 316/U DOUBLE SHIELDED
RG 188/U DOUBLE SHIELDED
CABLE HEX CRIMP SIZE: .151
CABLE RETENTION: 20 LBS MIN AXIAL FORCE
DURABILITY: 500 CYCLES MIN

ENVIRONMENTAL:

(MEETS OR EXCEEDS THE APPLICABLE PARAGRAPH OF MIL-PRF-39012) THERMAL SHOCK: MIL-STD-202, METHOD 107, CONDITION B, EXCEPT 85° C HIGH TEMP OPERATING TEMPERATURE: -65° C TO 165° 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



DATE DRAWN BY TOLERANCE UNLESS OTHERWISE SPECIFIED 12-22-03 T.A.Kari DECIMALS CHECKED BY DATE .XX TITLE XXX. APPROVED BY DATE MATL RELEASE DATE 12-22-03 FINISH

INCH

U/M

SCALE

8:1

(AS SHOWN)

| |Customer drawing

THIS DRAWING TO BE INTERPRETED PER ASME Y 14.5M - 1994

"µSTATION"

COMPANY CONFIDENTIAL

Cinch CONNECTIVITY SOLUTIONS a bel group

DRAWING NO.

ENGINEERING RELEASE

03-02-04

- 142-1404-001/010

REVISIONS

ECN 49130

Cinch Connectivity Solutions P.O. Box 1732 Waseca, MN 56093 1-800-247-8256

STRAIGHT CABLED PLUG QUICK CONNECT COUPLING, SMA, RG 316DS, CRIMP TYPE

SHEET DRAWING NO.

1 OF 2 (- 142-1404-001/010