TITLE: SPECIFICATION CONTROL DRAWING

PART IDENTIFIER: HR03XXXS

(X)=TEST CODE: A=GROUP A; B=GROUP B; C=GROUP C

(XX)=DB VALUE (01-20DB)

DESCRIPTION: CHIP ATTENUATOR WITH HIGH RELIABILITY TESTING.

NOTE: SINGLE LOT AND DATE CODE AVAILABLE UPON REQUEST.

ASSEMBLY DWG: N/A

1.0 SPECIFICATIONS:

- 1.1 ELECTRICAL:
 - 1.1.1 IMPEDANCE: 50 OHMS NOMINAL.
 - 1.1.2 FREQUENCY RANGE: DC-12.4 GHZ.
 - 1.1.3 ATTENUATION VALUES AVAILABLE: 1-20 DB IN 1 DB INCREMENTS.
 - 1.1.4 ATTENUATION ACCURACY: SEE TABLE.
 - 1.1.5 ATTENUATION STABILITY: 0.0001 DB/DB/C°

ATTENUATION ACCURACY							
DB	DC - 4 GHZ	4 - 8 GHZ	8 - 12.4 GHZ				
1 -3	±0.3	±0.5	±0.5				
4 - 6	±0.4	±0.5	±0.5				
7 - 10	±0.5	±0.5	±0.75				
11 - 15	±0.75	+0.5,-3.0	+0.5,-3.5				
16 - 20	±1.0	+0.54.0	+1.06.0				

1.1.6 VSWR: DC - 4 GHZ - 1.25

8 - 12.4 GHZ - 1.50

4 - 8 GHZ - 1.35 INPUT POWER: 2 WATTS CW.

1.1.7.1 FULL RATED POWER TO 125°C, DERATED LINEARLY TO 0 WATTS AT 150°C.

1.1.7.2 PEAK POWER, 50 WATTS FOR 10US PULSE WIDTH @ 1% DUTY CYCLE.

1.2 MECHANICAL:

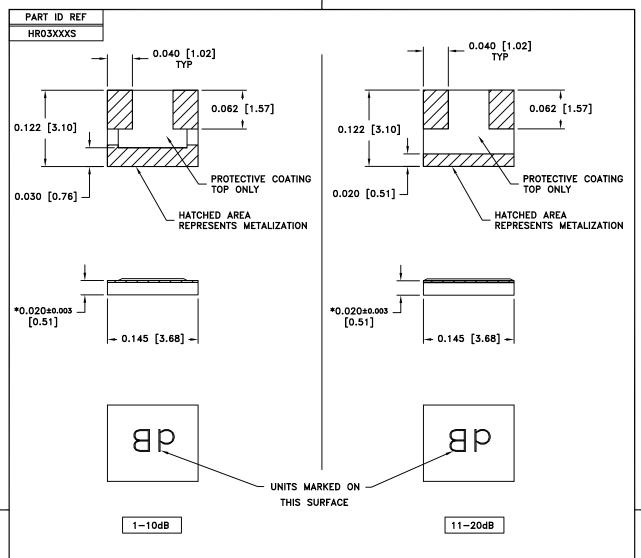
1.1.7

- 1.2.1 OUTLINE DWG: SEE SHEET 3.
- 1.2.2 WORKMANSHIP: PER MIL-PRF-55342.
- 1.3 ENVIRONMENTAL:
 - 1.3.1 ALTITUDE:
 - 1.3.1.1 NON-OPERATING: SEA LEVEL TO 50,000 FEET.
 - 1.3.1.2 OPERATING: SEA LEVEL TO 50,000 FEET.
 - 1.3.2 TEMPERATURE RANGE:
 - 1.3.2.1 NON-OPERATING: -55 C TO +150 C.
 - 1.3.2.2 OPERATING: -55°C TO +150°C.
 - 1.3.3 VIBRATION: PER MIL-STD-202, METHOD 204, COND. D.
 - 1.3.4 SHOCK: PER MIL-STD-202, METHOD 213, COND. I.
 - 1.3.5 MOISTURE RESISTANCE: PER MIL-STD-202, METHOD 106 EXCEPT SUBCYCLE STEPS 7A AND 7B AND POLARIZATION AND LOAD ARE NOT APPLICABLE.
- 1.4 ELECTROSTATIC DISCHARGE CONTROL: PER MIL-STD-1686.
- 2.0 UNIT MARKING: "DB VALUE". LEGIBILITY AND PERMANENCY PER MIL-STD-130.

3.0 QUALITY ASSURANCE:

- 3.1 VERIFY 100% VISUAL PRE-CAP INSPECTION PERFORMED. PER TP-8965
- 3.2 PREFORM GROUP A, B AND/OR C TESTING AS INDICATED BY THE PART NUMBER PER TP-8965.
- 3.3 TEST DATA REQUIREMENTS:
 - 3.3.1 TEST DATA REQUIRED FOR CUSTOMER SEE PARAGRAPH 5.0 OF TP-8965.
 - 3.3.2 DATA RETENTION 24 MONTHS.
 - 3.3.3 TEST SAMPLES REQUIRED FOR CUSTOMER SEE PARAGRAPH 5.0 OF TP-8965.
- **4.0 PACKAGING:** STANDARD PACK PER 755W002. (SERIALIZED WAFFLE PACK)

EMC TECHNOLOGY	CAGE CODE # 24602		DWG#	1009885000		
8851 SW OLD KANSAS AVE.	CHANGE NOTICE	EN 09-E1001	REV LVL	В		
STUART, FL 34997			SHEET	1	OF	2



MECHANICAL SPECIFICATIONS:

SUBSTRATE: MATERIAL - ALUMINA 96%, MIL-I-10. **TERMINAL:**

- THICK FILM, NICKEL BARRIER, MATERIAL SOLDER FUSE COATED.

RESISTIVE ELEMENT:
MATERIAL — THIN FILM, TANTALUM NITRIDE.

METRIC EQUIVALENTS GIVEN IN [mm] FOR REFERENCE INFORMATION ONLY

DIMENSIONS APPLY BEFORE SOLDER, ALLOW 0.015 MAX FOR ALL PRETINNED SURFACES.

