

INCH-POUND

MIL-DTL-25708/5D
w/AMENDMENT 1
7 January 2013
SUPERSEDING
MIL-DTL-25708/5D
1 October 2012

DETAIL SPECIFICATION SHEET

ANTENNA, BLADE, L-BAND (4 HOLE MOUNT, N CONNECTOR)

This specification is approved for use by all Departments and Agencies of the Department of Defense.

The requirements for acquiring the antenna described herein shall consist of this specification sheet and MIL-DTL-25708.

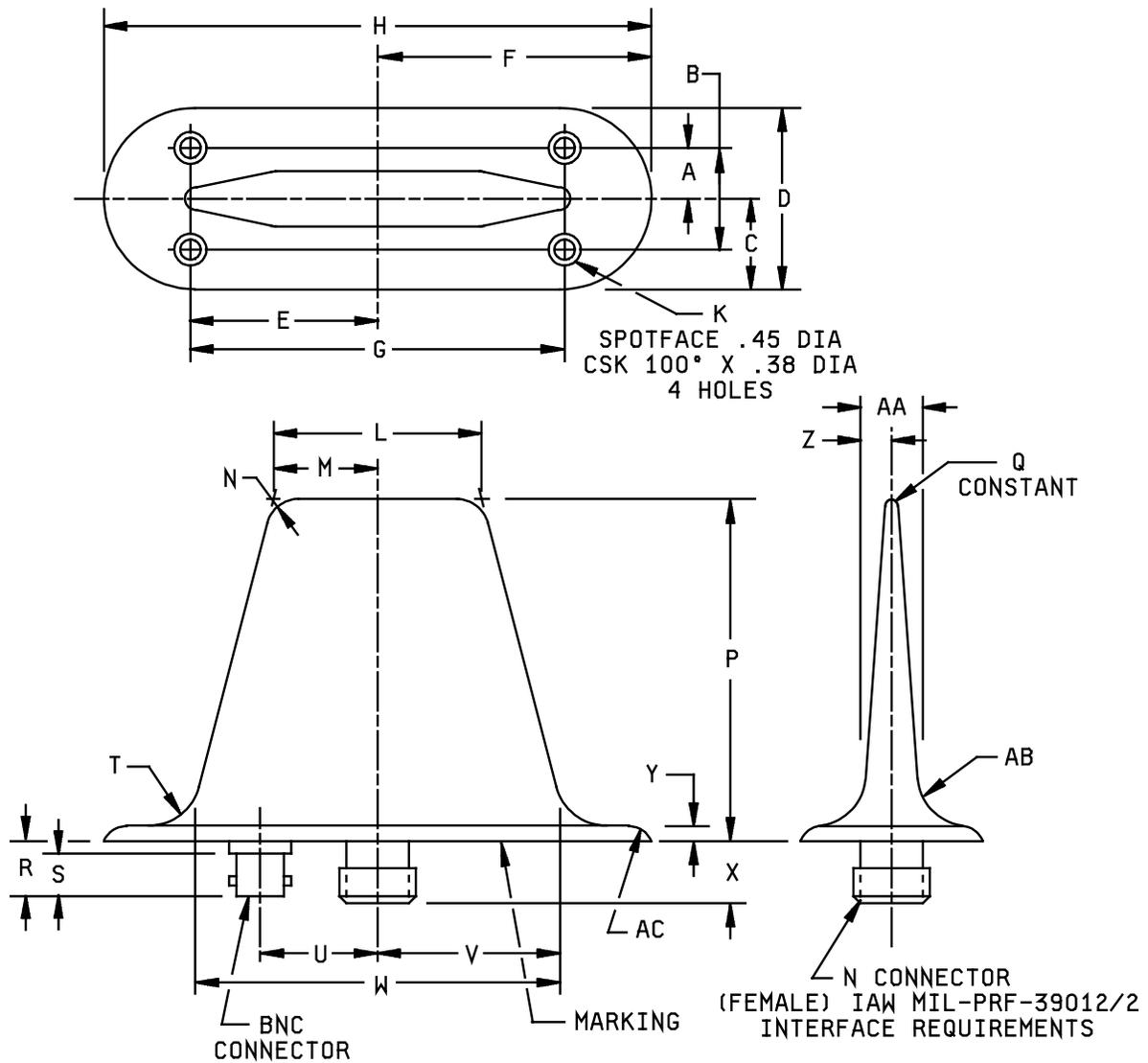


FIGURE 1. Outline drawing L-band antenna.

MIL-DTL-25708/5D
w/AMENDMENT 1

Ltr	Dimensions			
	Inches		Millimeters	
	Min	Max	Min	Max
A	.480	.500	12.19	12.70
B	.970	.990	24.64	25.15
C	.84	.90	21.3	22.9
D	1.72	1.78	43.7	45.2
E	1.780	1.820	45.21	46.23
F	2.59	2.65	65.8	67.3
G	3.590	3.610	91.19	91.69
H	5.22	5.28	132.6	134.1
K	.191 DIA THRU	.201 DIA THRU	4.85 DIA THRU	5.11 DIA THRU
L	---	2.00	---	50.8
M	---	1.00	---	25.4
N	.31 R ref		7.9 R ref	
P	---	3.32	---	84.3
Q	.06 R	.09 R	1.5 R	2.3 R
R	---	.53	---	13.6
S	.41	---	10.5	---
T	.31 R ref		7.9 R ref	
U	1.11	1.15	28.2	29.2
V	---	1.88	---	47.8
W	---	3.75	---	95.2
X	---	.61	---	15.5
Y	.120	.150	3.05	3.81
Z	---	.22	---	5.6
AA	---	.44	---	11.2
AB	.50 R ref		12.7 R ref	
AC	.50 R ref		12.7 R ref	

NOTES:

1. Dimensions are in inches.
2. Metric equivalents (to the nearest .01 mm) are given for general information only and are based upon 1 inch = 25.4 mm.
3. Unless otherwise specified, tolerances on two place decimals are $\pm .02$ inch and tolerances on three place decimals are $\pm .005$ inch.

FIGURE 1. Outline drawing L-band antenna - Continued.

MIL-DTL-25708/5D
w/AMENDMENT 1

REQUIREMENTS:

Dimensions and configuration: See figure 1.

Materials:

Base: Aluminum alloy in accordance with ASTM B85/B85M, alloy SC84B.

Cover: Suitable material that will resist erosion of impinging particles at velocities up to Mach 2.

Temperature operating range: -55°C to 149°C.

Static load: 10.5 psig (100 pounds).

Frequency range: 0.700 to 1.220 GHz.

Impedance: 50 ohms nominal.

VSWR:

Antenna: See figure 2.

Sampling probe: 1.50:1 maximum from 0.900 to 1.220 GHz.

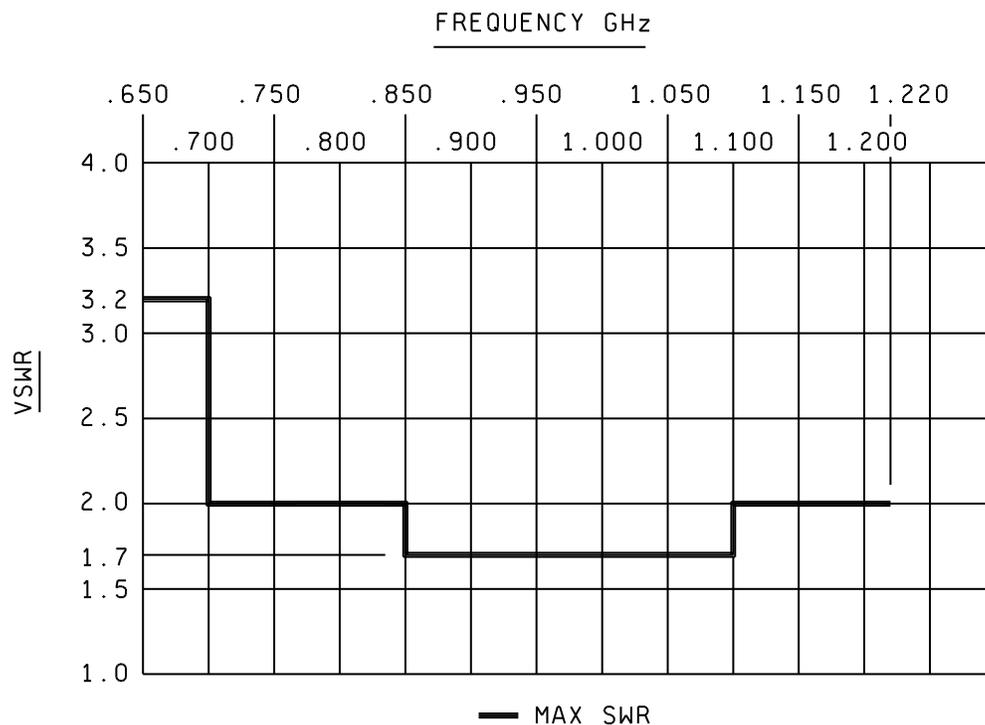


FIGURE 2. Antenna VSWR.

REQUIREMENTS - CONTINUED:

Power: 4 kW peak, 100 watts average.

Weight: 10 ounces maximum.

Part or Identifying Number (PIN): M25708/5-05.

Data list: A data list shall accompany each antenna with VSWR measurement values made at 0.750, 0.960, 1.100, and 1.200 GHz.

Referenced documents. In addition to MIL-DTL-25708, this document references the following:

MIL-PRF-39012/2

ASTM B85/B85M

The margins of this specification are marked with vertical lines to indicate modifications generated by this amendment. This was done as a convenience only and the Government assumes no liability whatsoever for any inaccuracies in these notations. Bidders and contractors are cautioned to evaluate the requirements of this document based on the entire content irrespective of the marginal notations.

Custodians:

Army - CR

Navy - AS

Air Force - 85

DLA - CC

Preparing activity:

DLA - CC

(Project 5985-2013-009)

Review activities:

Army - AV

Air Force - 99

NOTE: The activities listed above were interested in this document as of the date of this document. Since organizations and responsibilities can change, you should verify the currency of the information above using the ASSIST Online database at <https://assist.dla.mil/>.