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NOTE:

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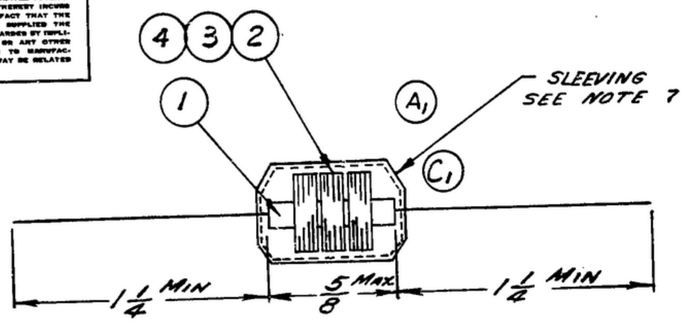
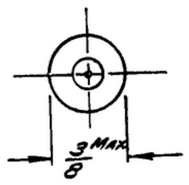




* SWE APPROVAL	
SYM	PR 100 42-17

REVISIONS			
SYM	DESCRIPTION	DATE	APPROVAL
A6	A1-CORRECTED VIEW OF CHOKE. A2-ADDED COLOR CODE VIEW & LIST OF MATERIAL. A3-DELETED SUPPLIER NATIONAL COIL CO. REFERENCE NOTE; REFERRING TO MIL. COMM. EQUIP. RENUMBERED NOTES. A4-DELETED COIL RECOMMENDATION NOTE: A5 - ADDED SPEC. MIL-W-583 TO WIRE NOTE. A6-91 TURNS WAS 112 TURNS. A7-WAS FINISH REFERENCE. OF MIL-P-14. A8-ADDED SPEC. MIL-C-15305 TO INDUCTANCE VALUE NOTE.	16 DEC. 59	42428-PC-59-A1-61 REV'D, PME
B	(1) ITEMIZED LACQUER ON VIEW	31 OCT. 61	42428-PC-59 PME
C4	C1 ADDED SHRINK SLEEVE, AND NOTE DESIGNATION, C2 ADDED "ADD PROTECTIVE SHRINK SLEEVE (CLEAR)." C3 ADDED "ALTERNATE ---." C4 NOTE 7 READ "--- MIL-V-173 TYPE I, OR ---."	1 AUG 64	15283-PP63 REVD PME

A3

1. -APPARENT INDUCTANCE: 500 MICROHENRIES ±10% AT 1000 KC.
2. -Q: 45 MIN. AT 1000 KC.
3. -WITH THE UNIT CLAMPED IN A GROUNDED V-BLOCK THE INSULATION RESISTANCE SHALL BE GREATER THAN 100 MEGOHMS BETWEEN THE WINDING AND THE V-BLOCK WHEN MEASURED WITH A POTENTIAL OF 500 VOLTS DC.
4. -WITH THE UNIT CLAMPED IN A GROUNDED V-BLOCK THERE SHALL BE NO BREAKDOWN OF INSULATION WHEN A POTENTIAL OF 500 VOLTS RMS, 60 CPS, AC IS APPLIED BETWEEN THE WINDING AND THE V-BLOCK FOR A PERIOD OF ONE MINUTE.

A4 A5 A6

5. -WIRE SHALL BE #36 AWG TYPE TF PER MIL-W-583.
6. -WINDING DATA, RECOMMENDED: THREE UNIVERSAL WOUND PI SECTIONS, 91 TURNS PER SECTION 3/32 INCH WIDE SPACED 1/32 INCH APART CENTERED ON FORM.

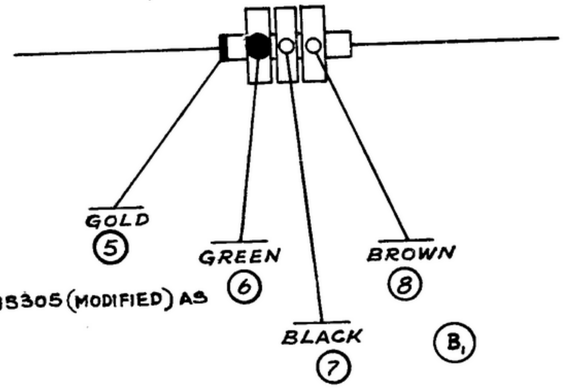
A7 C2 C4

7. -FINISH: 1 COAT OF POLYWELD 912 AS SUPPLIED BY AMPHENOL CO. CHICAGO, ILL. OR EQUAL. 2 COATS OF VARNISH PER SPEC. MIL-V-173 OR APPROVED EQUIVALENT COATINGS. ADD PROTECTIVE SHRINK SLEEVE (CLEAR).

A8 C3

8. -THE INDUCTANCE VALUE IN MICROHENRIES SHALL BE INDICATED BY A COLOR CODE SYSTEM PER MIL-C-15305 (MODIFIED) AS FOLLOWS: IN A LINE IN THE ORDER. GOLD, GREEN, BLACK, BROWN. THE GREEN DOT SHALL BE APPROXIMATELY TWICE AS LARGE AS THE OTHER TWO. ALTERNATE METHOD - VALUE STAMPED ON TAPE COVER.
9. -ASSEMBLY:
   A. WINDING TERMINATIONS SHALL BE WOUND A MINIMUM OF THREE TURNS AROUND THE COIL FORM LEADS NEXT TO THE FORM AND SECURELY SOLDERED.
   B. THE FINISH COATING SHALL POSSESS A SMOOTH SURFACE TO PROVIDE MAXIMUM MOISTURE RESISTANCE; EXCESSIVE PITTING OR EVIDENCE OF AIR BUBBLES IN THE COATING SHALL CONSTITUTE CAUSE FOR REJECTION.
   C. THE CHOKE LEADS SHALL BE FREE OF MOISTURE RESISTING VARNISH TO WITHIN 1/8 INCH OF THE CHOKE BODY.
10. -AMBIENT TEMPERATURE RANGE: -55°C TO +105°C OPERATING, STORAGE TO -62°C.
11. -THE UNIT SHALL WITHSTAND EXPOSURE TO A 10 CYCLE HUMIDITY TEST CONDUCTED IN ACCORDANCE WITH THE LATEST VERSION OF MIL-STD-202, METHOD 106. A POLARIZING POTENTIAL OF 100 VOLTS DC SHALL BE APPLIED BETWEEN THE WINDING AND A GROUNDED V-BLOCK THROUGHOUT THE TEST. UPON COMPLETION OF THE TEST THE UNITS SHALL BE AIR DRIED AS SPECIFIED FOR A PERIOD OF 4 TO 24 HOURS. VALUES OF INDUCTANCE AND Q SHALL NOT HAVE CHANGED MORE THAN 10% AND 20% RESPECTIVELY FROM THEIR INITIAL VALUES. THE INSULATION RESISTANCE SHALL BE AS SPECIFIED. THE DIELECTRIC STRENGTH SHALL BE SATISFACTORY WHEN TESTED AT 90% OF THE SPECIFIED TEST VOLTAGE. MARKING SHALL BE LEGIBLE.
12. -THE UNIT SHALL WITHSTAND EXPOSURE TO 5 SUCCESSIVE TEMPERATURE CYCLES CONDUCTED IN ACCORDANCE WITH THE LATEST VERSION OF MIL-STD-202, METHOD 102, CONDITION A, FOLLOWED BY 2 SUCCESSIVE IMMERSION CYCLES CONDUCTED IN ACCORDANCE WITH THE LATEST VERSION OF MIL-STD-202, METHOD 104, CONDITION B. UPON COMPLETION OF THE TEST VALUES OF INDUCTANCE AND Q SHALL NOT HAVE CHANGED MORE THAN 10% FROM VALUES MEASURED AT THE BEGINNING OF THE TEST. THE INSULATION RESISTANCE SHALL BE AS SPECIFIED. THE DIELECTRIC STRENGTH SHALL BE SATISFACTORY WHEN TESTED AT 90% OF THE SPECIFIED TEST VOLTAGE.

A2



SWE PART NO.	ITEM	REQD	PART NO.	DESCRIPTION	MATL	MATL SPEC	
20S111266-2	8	AS REQ'D		LACQUER BROWN		TT-L-31	
20S111266-1	7	AS REQ'D		LACQUER BLACK		TT-L-31	
20S111266-6	6	AS REQ'D		LACQUER GREEN		TT-L-31	
20S111266-12	5	AS REQ'D		LACQUER GOLD		TT-L-31	
20S110664-1	4	AS REQ'D		VARNISH		MIL-V-173	7
20S110664-3	3	AS REQ'D		POLYSTYRENE LACQUER			7
30S130132-36	2	1	SM-C-178505-1	WIRE (225 IN. APPROX)		MIL-W-583	5
	1	1	SM-B-343642	FORM, COIL			

LIST OF MATERIAL

APPLICATION	
NEXT ASSY	USED ON
SM-D-249007	SC-DL-248775
SM-D-343629	SC-DL-248775
SM-D-343620	SC-DL-248775
SM-D-178787	
SM-B-178635	
SM-B-178638	
SM-D-178515	SC-DL-144500
SM-D-178503	SC-DL-178467

UNLESS OTHERWISE SPECIFIED
DIMENSIONS ARE IN INCHES
TOLERANCES ON FRACTIONS DECIMALS ANGLES

AUTHENTICATION
DRAWN 21652-PM-50-93
TRACED PHOTO
CHECKED RAH
VERIFIED RO-BR
APPROVED RO-BR
REVIEWED PME
DATE 23 MAY 56
SCALE 2/1

CHOKE

SIGNAL CORPS ENGINEERING LABORATORIES
FORT MONMOUTH NEW JERSEY

SM-C-178505

WHEN REFERRING TO THIS DRAWING STATE DRAWING NO., APPLICABLE ISSUE SYMBOL, IF ANY, AND DATE

FD-7M—074-0271-01—A537—177438