NOTICE — WHEN GOVERNMENT DRAWINGS, SPECIFICATIONS, OR OTHER DATA ARE USED FOR ANY PURPOSE OTHER THAN IN CONNECTION WITH A DEFINITELY RELATED GOVERNMENT PROCUREMENT OPERATION, THE UNITED STATES GOVERNMENT THEREBY INCURS NO RESPONSIBILITY NOR ANY OBLIGATION WHATSOEVER; AND THE FACT THAT THE GOVERNMENT MAY HAVE FORMULATED, FURNISHED, OR IN ANY WAY SUPPLIED THE SAID DRAWINGS, SPECIFICATIONS OR OTHER DATA IS NOT TO BE REGARDED BY IMPLICATION OR OTHERWISE AS IN ANY MANNER LICENSING THE HOLDER OR ANY OTHER PERSON OR CORPORATION, OR CONVEYING ANY RIGHTS OR PERMISSION TO MANUFACTURE, USE, OR SELL ANY PATENTED INVENTION THAT MAY IN ANY WAY BE RELATED THERETO.

1006757 C

REVISIONS			
SYM	DESCRIPTION	DATE	APPROVAL
C	REPLACES REV B WITH CHANGE PER TDRR 00513		WK

NOTES:

1. GENERAL REQUIREMENTS:
   - A. ELECTRICAL:
     - CONDUCTOR RESISTANCE (DC) AT 20°C: SHALL BE AS SHOWN IN TABLE 1.
     - TEMPERATURE COEFFICIENT OF RESISTANCE (0°C - 100°C): .0048.
   - B. MECHANICAL (BEFORE FORMING):
     - COEFFICIENT OF LINEAR EXPANSION (20°C - 100°C): .000013.
     - TENSILE STRENGTH AT 20°C:
       - 135,000 PSI, MAXIMUM.
       - 60,000 PSI, MINIMUM.
     - APPROXIMATE MELTING POINT: 1450°C.
     - ELONGATION: 20% MINIMUM, PER 2 INCHES.
     - WIRE SIZE: AS DELINEATED IN TABLE 1.
2. CONSTRUCTION REQUIREMENTS:
   - A. CHEMICAL COMPOSITION OF MATERIAL

NICKEL	99.56 PERCENT
COPPER	.02 PERCENT
IRON	.095 PERCENT
CARBON	.04 PERCENT
MANGANESE	.25 PERCENT
SILICON	.03 PERCENT
SULPHUR	.005 PERCENT

   - B. WORKMANSHIP: THE WIRE SHALL BE UNIFORM IN QUALITY AND TEMPER, CLEAN, SOUND, SMOOTH AND FREE FROM INJURIOUS FOREIGN MATERIAL, SCRAPES, COLD SHUTS, LAPS, CRACKS, TWISTS, SCALE, DAMAGED ENDS, WELDS, SCORES, PITS, GALLS AND OTHER DEFECTS WHICH ARE NOT IN ACCORDANCE WITH THE BEST PRACTICE FOR HIGH QUALITY MATERIAL.
   - C. PACKAGING:
     - THE WIRE SHALL BE SHIPPED TOGETHER WITH A DESICCANT AND SEALED IN A PACKAGE.
     - THE WIRE SHALL BE WOUND ON A FIVE (5) INCH REEL AND THE TOTAL MAXIMUM WEIGHT OF THE WIRE SHALL NOT EXCEED FIFTEEN (15) POUNDS.
3. ENVIRONMENTAL REQUIREMENTS: PER ND1002000.
4. INTERPRET DRAWING IN ACCORDANCE WITH STANDARDS PRESCRIBED BY MIL-D-70327. (AS APPLICABLE).

FOR INFORMATION ONLY

CLASS B RELEASE TDR No. 00027 DATE 9-13-62

TABLE 1

DASH NO.	CONDUCTOR DIMENSION ±0.0005	CONDUCTOR RESISTANCE OHMS/FOOT AT 20°C ± 10%
-1	.0100 X .0200	.2356
-2	.0100 X .0300	.1571
-3	.0200 X .0200	.1178
-4	.0250 X .0250	.0754
-5	.0100 X .0500	.0942
-6	.0100 X .01500	.3142
-7	.005 X .020	.4712

© REPLACES REV B WITH CHANGE

MASTER

MASTER

PROCURE ONLY FROM APPROVED SOURCES LISTED ON ND1002034 FOR THIS DRAWING

INCHES 0 1 2 PHOTOGRAPHIC SCALE ONLY

NEXT ASSY	USED ON
APPLICATION	

UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCHES
TOLERANCES ON
FRACTIONS ± DECIMALS ± ANGLES ±
DO NOT SCALE THIS DRAWING
MATERIAL SEE NOTE 2
HEAT TREATMENT
FINAL FINISH

QTY REQD	PART OR IDENTIFYING NO.	NOMENCLATURE OR DESCRIPTION	FIND NO.

LIST OF MATERIALS

MIT INSTRUMENTATION LAB CAMBRIDGE, MASS.
DWG. NO. CONTRACT
DRAWN R. CHIN DATE 7-12-62
CHECKED Joe Morton
APPROVAL W B Turner
APPROVAL Elton C Hall
NASA APPROVAL 9-13-62
MIT APPROVAL 9/13/62

MANNED SPACECRAFT CENTER
HOUSTON, TEXAS

WIRE, ELECTRICAL
NICKEL, SQUARE & RECTANGULAR
SPECIFICATION CONTROL DRAWING

CODE IDENT NO. | SIZE C | NASA DRAWING NO. 1006757
SCALE NONE | WT # | SHEET 1 OF 1

1006757 C