NOTES:

1. LASER MARK ON BACK SIDE OF P1 BACKSHELL (NOT THE COVERPLATE) WITH 1.0 mm MINIMUM HIGH CHARACTERS THE TEXT SHOWN IN TABLE 1. (THE VENDOR DESIGNATION AND THE STARTING SERIAL NUMBER SHALL BE IN ACCORDANCE WITH THE VALUES PROVIDED IN THE PURCHASE ORDER). LABEL INDIVIDUAL CABLE ENDS AS SHOWN.

2. ALL DIMENSIONS IN mm.

3. LENGTH TOLERANCE IS ±10 mm EXCEPT AS NOTED.

- ON J1-J3, USE AN 8mm ±1mm LENGTH OF 1.2mm I.D. HEATSHRINK, ITEM 14, ON THE INSULATION OF EACH INDIVIDUAL WIRE TO ENSURE A GOOD SEAL WITH THE CONNECTOR HOUSING.

- INSULATE DRAIN WIRES INSIDE P1 BACKSHELL WITH TEFolon TUBE SLEEVING, ITEM 18, (FOIL SHIELDS DO NOT NEED TO BE ISOLATED FROM EACH OTHER INSIDE THE P1 BACKSHELL.)

6. USE MANUFACTURER SPECIFIED TOOLING FOR ALL CONTACTS AND CONNECTORS.

- STRIP CABLE JACKET AND WIRE INSULATION PER NASA-STD-8739.4A, SECTION 10. (TMT.CTR.TEC.16.052.DRF01)

- USE ADHESIVE LINED HEAT SHRINK TUBING, ITEM 16 ON EACH CABLE AT P1 AND J1-J3 TO SEAL IT.

- CRIMP ITEM 1 AND ITEM 4 CONTACTS PER NASA-STD-8739.4A, SECTIONS 20.5.1c, 20.5.2c, A.8, A.9, AND A.10. (TMT.CTR.TEC.16.052.DRF01)

11. WIRE PULLOUT TEST: VALIDATE CRIMPING PROCESSES PER NASA-STD-8739.4A, SECTION 12. (TMT.CTR.TEC.16.052.DRF01)

- ITEM 1, AXIAL FORCE = 36 N
- ITEM 4, AXIAL FORCE = 22 N
- ITEM 10, AXIAL FORCE = 20 N (PER WWW.JST-MFG.COM)

12. CONTACT RETENTION TEST: 100% OF CONTACTS SHALL BE PUSH TESTED FOR SEATING PER NASA-STD-8739.4A, SECTION 13. (TMT.CTR.TEC.16.052.DRF01)

- ITEM 1, AXIAL FORCE = 22.1 N
- ITEM 4, AXIAL FORCE = 14 N
- ITEM 10, AXIAL FORCE = 10 N

13. SPOT TIE CABLE BUNDLE TOGETHER UNDER BLACK HEAT SHRINK AS NEEDED USING ITEM 20.


15. EACH CABLE SHALL BE 100% ELECTRICALLY TESTED.

- CONNECTION RESISTANCE LESS THAN 0.5 OHMS.
- INSULATION RESISTANCE MORE THAN 5 MOHMS.

- 1 CONFIGURATION ONLY

- P1 BACKSHELL SUPPORTS CABLE EGRESS FROM EITHER SIDE. CONNECT AS SHOWN.

- ALTERNATE LEMO CONNECTOR FEG.OB.304.CYBD42Z (BRASS) CAN BE USED WITH TMT PERMISSION.

- ALTERNATE JST CONTACT SWPR-001T-P025 (TIN FINISH) CAN BE USED WITH TMT PERMISSION.

- SILICONE INTERFACIAL SEAL (INCLUDED WITH ITEM 1) TO BE INSTALLED ON MATING FACE OF CONNECTOR P1.

- ALL CONNECTOR PINS SHALL BE FITTED TO EACH CONNECTOR EVEN IF NOT USED FOR CONNECTIVITY.

- INSTALL SEALING PLUGS, ITEM 21, IN CONNECTOR P1, ITEM 1, IN ALL UNWIRED LOCATIONS (36, 39, 42, 46, 48, 49, AND 50. FOR -1; ADD 40, 41, 43, 44, AND 45 FOR -2 AND -3).

- UNUSED PINS IN THE JST CONNECTORS, J2 AND J3, ARE TO BE SEALED WITH 1.3 mm DIA. NYLON MONOFILAMENT, ITEM 22, CRIMPED TO A TERMINAL, ITEM 10, AND INSERTED IN UNUSED LOCATIONS IN THE SAME MANNER AS A NORMAL WIRE. TRIM THE MONOFILAMENT FLUSH WITH THE SURFACE OF THE SILICONE SEALING GLAND.

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## TABLE 1:  CABLE MARKING TEXT

<table>
<thead>
<tr>
<th>LINE</th>
<th>STRAIN GAUGE HYDRA</th>
<th>10398529-L REV M</th>
<th>S/N NNN-XXXXX</th>
</tr>
</thead>
</table>

WHERE L IS THE DASH NUMBER FROM THE PARTS LIST, M IS THE CURRENT REVISION, NNN IS A 3-LETTER VENDOR DESIGNATION (ASSIGNED BY TMT) AND XXXXX IS A UNIQUE SERIAL NUMBER FOR EACH CABLE ASSEMBLY.
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<tr>
<th>CONNECTOR</th>
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<th>3</th>
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<td>1090 mm</td>
<td>1090 mm</td>
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<tr>
<td>P2</td>
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<td>935 mm</td>
<td>935 mm</td>
</tr>
<tr>
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<td>885 mm</td>
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</tr>
<tr>
<td>J3</td>
<td>490 mm</td>
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CABLE LENGTHS MEASURED FROM THIS PLANE.