TASK Perform solder repair of electrical wiring.

MLR 6A10 | AST 6A13 | MAST 6A13

Time off _____

Time on _____

Total time _____

CDX Tasksheet Number: C301

NOTE Use only rosin core solder for wiring repair. The use of acid core solder will result in corrosion, thereby causing high resistance in the circuit.

1. Obtain a segment of wire (6–8 inches [15 cm] in length is sufficient) and solder from your supervisor/instructor.

2. Prepare the wire ends for soldering. Remove about 1/2 inch (1 cm) of insulation at each end. If you are using heat shrink tube to cover your solder repair, now is the time to install the correct length and size.

3. Overlap the stripped ends of wire, twisting them tightly to create a secure mechanical joint.

   a. Have your supervisor/instructor check this joint prior to soldering.
   Supervisor's/instructor's initials: _____

4. Clean and tin the tip of the soldering iron if needed.

5. Heat the wire joint with the soldering iron.

NOTE If the soldering iron is properly tinned, apply solder to the joint, not to the tip of the soldering iron. (Sometimes you may need to melt a small amount of solder to fill the gap between the tip and the wire joint to transfer heat to the wire more effectively.) When holding the solder against the wire joint, you will notice the solder begin to flow into the wires. Stop as soon as you notice the wires slightly and evenly coated with solder. Do not apply too much solder or heat.

   a. Have your supervisor/instructor check your solder joint.
   Supervisor's/instructor's initials: _____

6. Cover the repair area with the heat shrink tube that was installed in step 2 or electrical tape.

NOTE Heat the shrink tube with a heat gun. Do not use an open flame and do not overheat the tube.

7. Have your supervisor/instructor verify satisfactory completion of this procedure.

Performance Rating

CDX Tasksheet Number: C301

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0	1	2	3	4

Supervisor/instructor signature _____ Date _____

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