

1. INTRODUCTION

This instruction sheet covers the assembly procedures of 2 Pin Wire to Wire Connectors: 2271180-1(Plug Connector), 2271183-1(Receptacle Connector), and 2271203-1(Mated Connector).



For detailed application requirements, refer to Application Specification 114-137020.

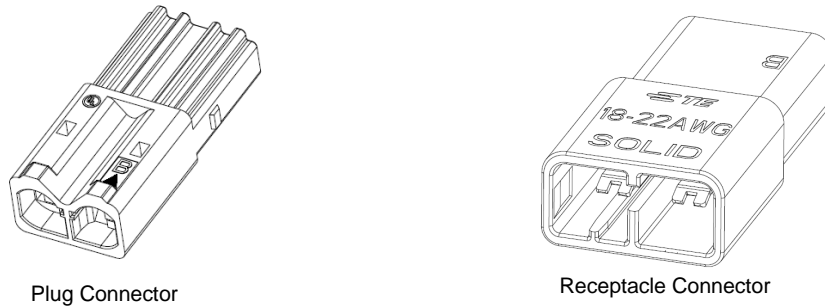


Figure 1

2. Wire Selection and Preparation

The applicable wire size and type are list in table 1.

Wire Type	Wire Size
Solid	18-22 AWG
Tin Dipped	18-22 AWG(16 strands or less for 18-20AWG;7 strands or less for 22 AWG)

The wire strip length is 9.0-9.6mm for the poke-in slot with an insulation diameter of $\leq 2.80\text{mm}$. The typical unacceptable wire preparation example is shown on Figure 2.

For stranded wire, it is recommended to twist strands after stripping the insulation. After twisting, the wire should be keep straight and keep a uniform OD at any portion of stripped area. Need to be dipped in Tin and make the stripped area coated with Tin. Too much Tin coated is not recommended. The maximum allowed OD after dipped with Tin is 1.30mm. Tin dipping depth is same as wire strip length.

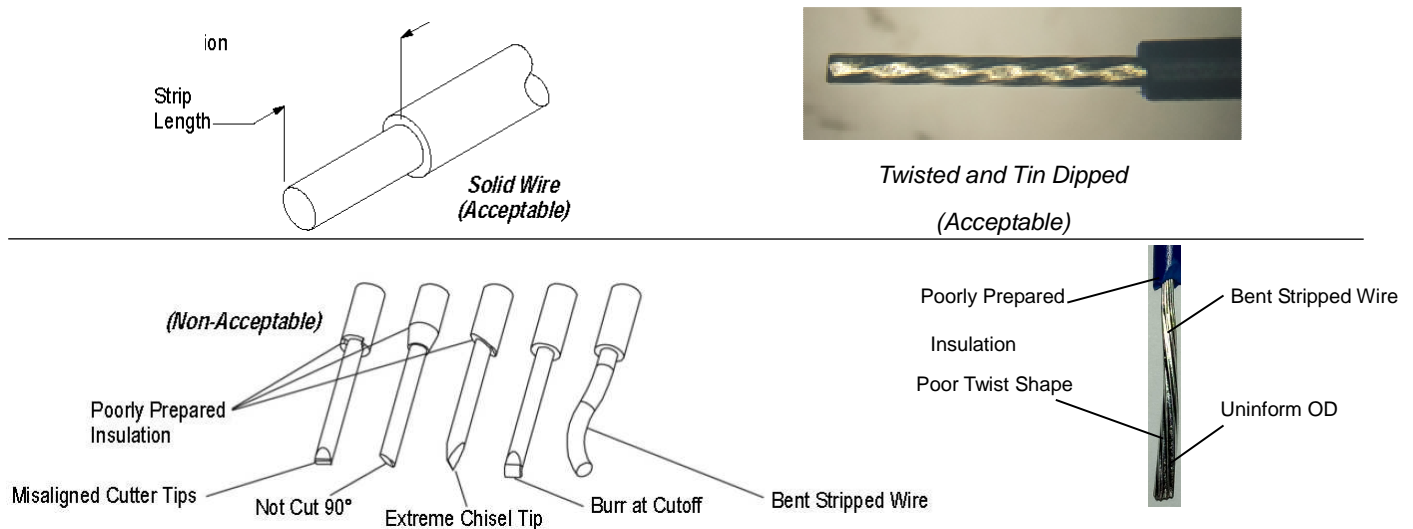


Figure 2

3. Assembly Procedure



Turn off power before removing or installing connector.

1. Insert each stripped wire into a poke-in slot in the back of the plug or receptacle until bottomed. During the insertion process, make the tip of wire touch on the lead in feature and insert the wire with an angle as shown on Figure 3. The maximum allowed insertion angle in vertical direction is 10° (Figure 3).



Pull back gently on the wires to ensure they have latched fully in the housings.

The wire retention side of the connector is for ONE TIME USE ONLY, DO NOT REMOVE AND REPLACE WIRES.

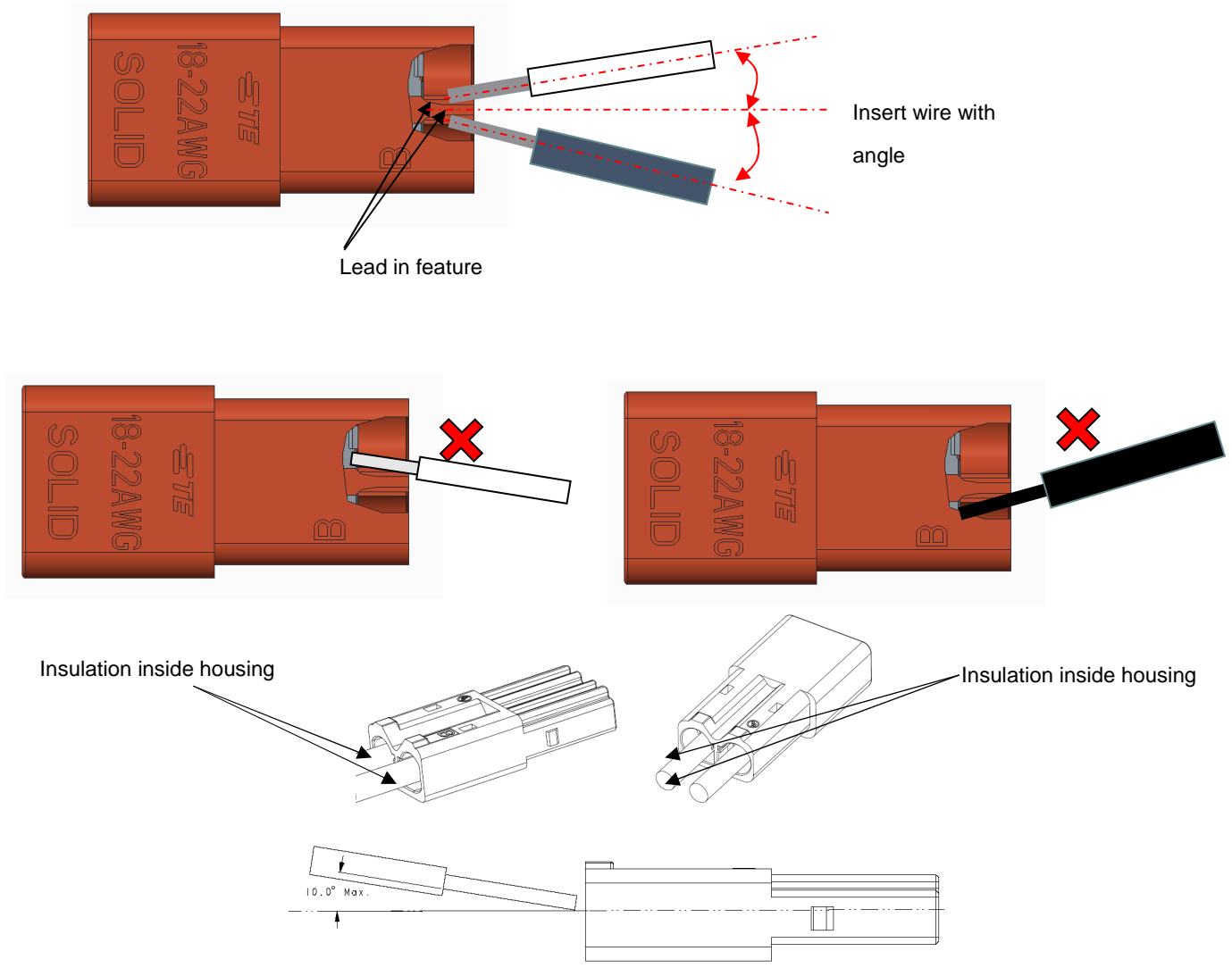


Figure 3

2. Make sure the insulator is in position (touch on the contact area). See Figure 4.



Figure 4

3. Apply optional approved flammability rated tape or clamp to organize the wire. See Figure 5.

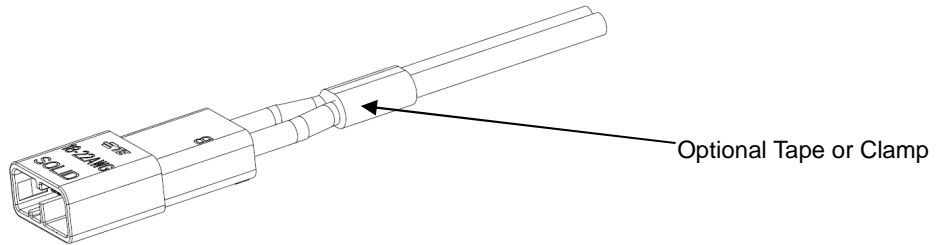


Figure 5

4. Connector Mating

Align the polarized mating faces of the housings, and grasp the housings and push to mate with each other. **DO NOT** force the housings to mate. When fully mated, the housings must appear bottomed with each other and flush at the point of engagement. See Figure 6.

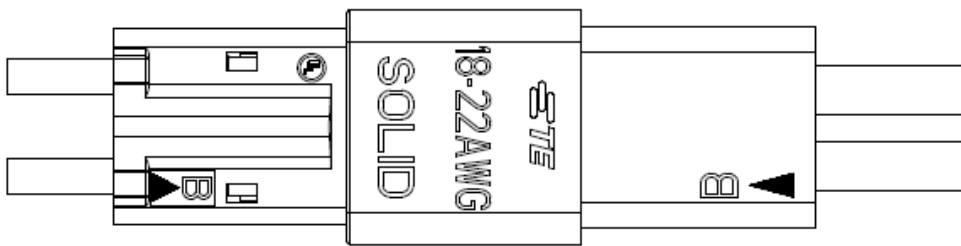


Figure 6 Mated Status

5. Connector Unmating



To reduce risk of electrical shock, **DISCONNECT** the electrical supply before unmating the connectors.



To unmate the connectors, grasp the connector at each end and pull apart the mated connectors.

DO NOT pull on the wires when unmating the connectors.

6. Replacement/Repair

The contacts and housings are not repairable. **DO NOT** use damaged or defective contacts or housings. **DO NOT**

remove the wire and re-terminate contacts.

7. VISUAL AID

The illustration below (Figure 7) shows a typical application of 2 Pin Wire to Wire Connectors. This illustration should be used by production personnel to ensure a correctly applied product. Applications, which **DO NOT** appear correct, should be inspected using the information in the preceding pages of this specification and in the instructional material shipped with the product.

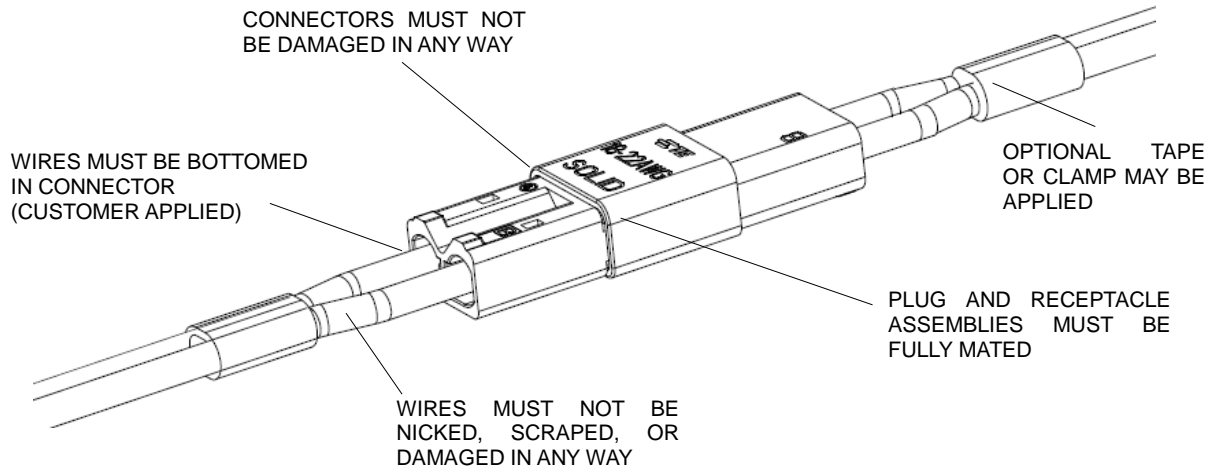


Figure 7. VISUAL AID