

NOTE



All numerical values are in metric units [with U.S. customary units in brackets]. Dimensions are in millimeters. Unless otherwise specified, dimensions have a tolerance of ± 0.13 and angles have a tolerance of $\pm 2^\circ$. Figures and illustrations are for identification only and are not drawn to scale.

1. INTRODUCTION

This specification covers the application of Board-to-Board Screw-Down Jumper. This jumper is used to electrically connect two (in-line) printed circuit (pc) boards used with LED strip lighting modules. Electrical contact is made with the screwing down of the jumper on the pc board using a No. 6 screw. No soldering is required. The jumper is available in a 2-position housing and has a pitch of 9.20 mm. The housing has aligning features which will maintain a pc board spacing of 7.00 mm and help orient the part correctly on the pc board.

When corresponding with Tyco Electronics Personnel, use the terminology provided in this specification to help facilitate your inquiry for information. Basic terms and features of components are provided in Figure 1.

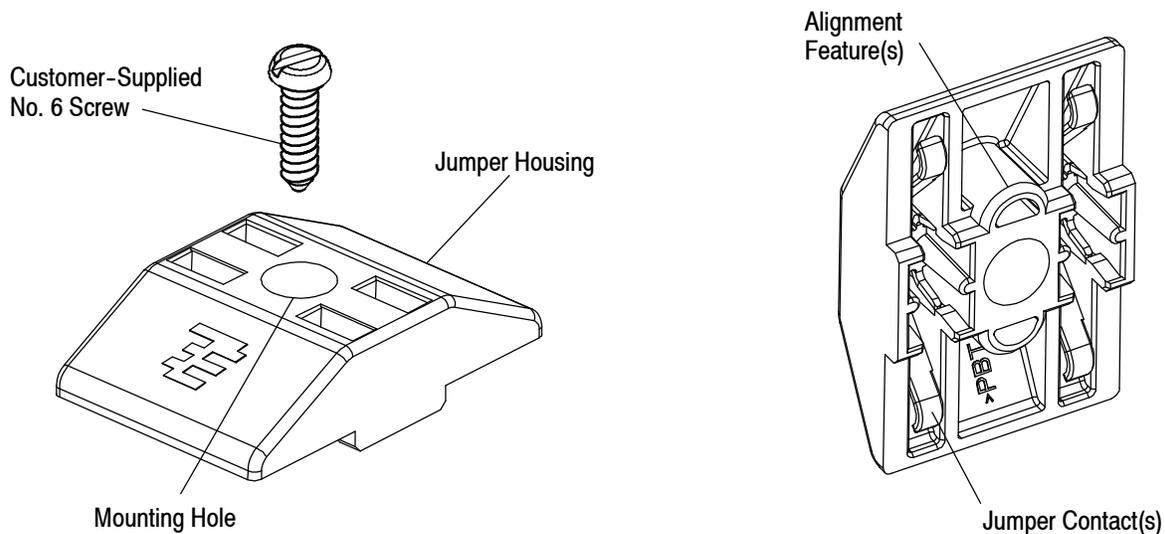


Figure 1

2. REFERENCE MATERIAL

2.1. Revision Summary

- Updated document to corporate requirements
- Changed text in Paragraph 3.5

2.2. Customer Assistance

Reference Base Part Number 2106154 and Product Code L012 are representative numbers of the Board-to-Board Screw-Down Jumper. Use of these numbers will identify the product line and expedite your inquiries through a service network established to help you obtain product and tooling information. Such information can be obtained through a local Tyco Electronics Representative or, after purchase, by calling the Tooling Assistance Center or the Product Information numbers at the bottom of this page.

2.3. Drawings

Customer Drawings for specific products are available from the responsible Tyco Electronics Engineering Department via the service network. The information contained in the Customer Drawings takes priority if there is a conflict with this specification or with any other technical documentation supplied by Tyco Electronics.

2.4. Specifications

Design Objective 108-2392 provides expected product performance and test information.

3. REQUIREMENTS

3.1. Storage

A. Ultraviolet Light

Prolonged exposure to ultraviolet light may deteriorate the chemical composition used in the housing material.

B. Shelf Life

The connector should be used on a first in, first out basis to avoid storage contamination that could adversely affect electrical continuity.

C. Chemical Exposure

Do not store connectors near any chemicals listed below.

Alkalies	Ammonia	Citrates	Phosphates	Citrates	Sulfur Compounds
Amines	Carbonates	Nitrites	Sulfides	Nitrites	Tartrates

3.2. Characteristics

The operating temperature of this product is -40° to 105° C [-40° to 221° F].

3.3. Materials

The natural color housing is made of PBT, UL 94-V0 rated. The contacts are tin-plated phosphor bronze.

3.4. PC Board Material and Thickness (See Figure 2)

1. Board material may be glass epoxy (FR-4, G-10), or metal clad pc boards.
2. The jumper may be installed on pc boards which are at least 1.35 mm thick and have a minimum width of 14.50 mm.

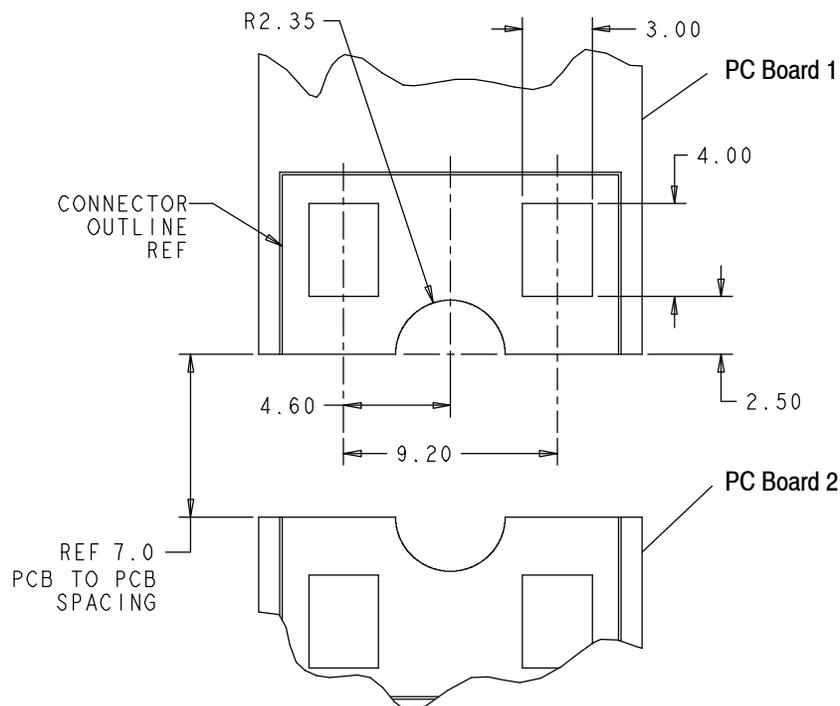


Figure 2

3.5. Placement (Figure 3)

Jumpers should be handled only by the housing to avoid deformation, contamination, or damage to the contacts.

When placed on the pc board, features in the housing should align with the semi-circular cutouts on the pc boards. This will ensure the contacts are aligned with the pc board solder pads, provided the pc board layout and pc board spacing is per Figure 2.

Insert the No. 6 screw and tighten to a **torque of 0.11-0.22 Nm [1-2 lbf-in.]** to the customer designated heatsink or base supporting structure. See Figure 3.



To protect against corrosion, screws from ferrous metals (other than stainless steel) should be zinc plated or have an equivalent protective coating.

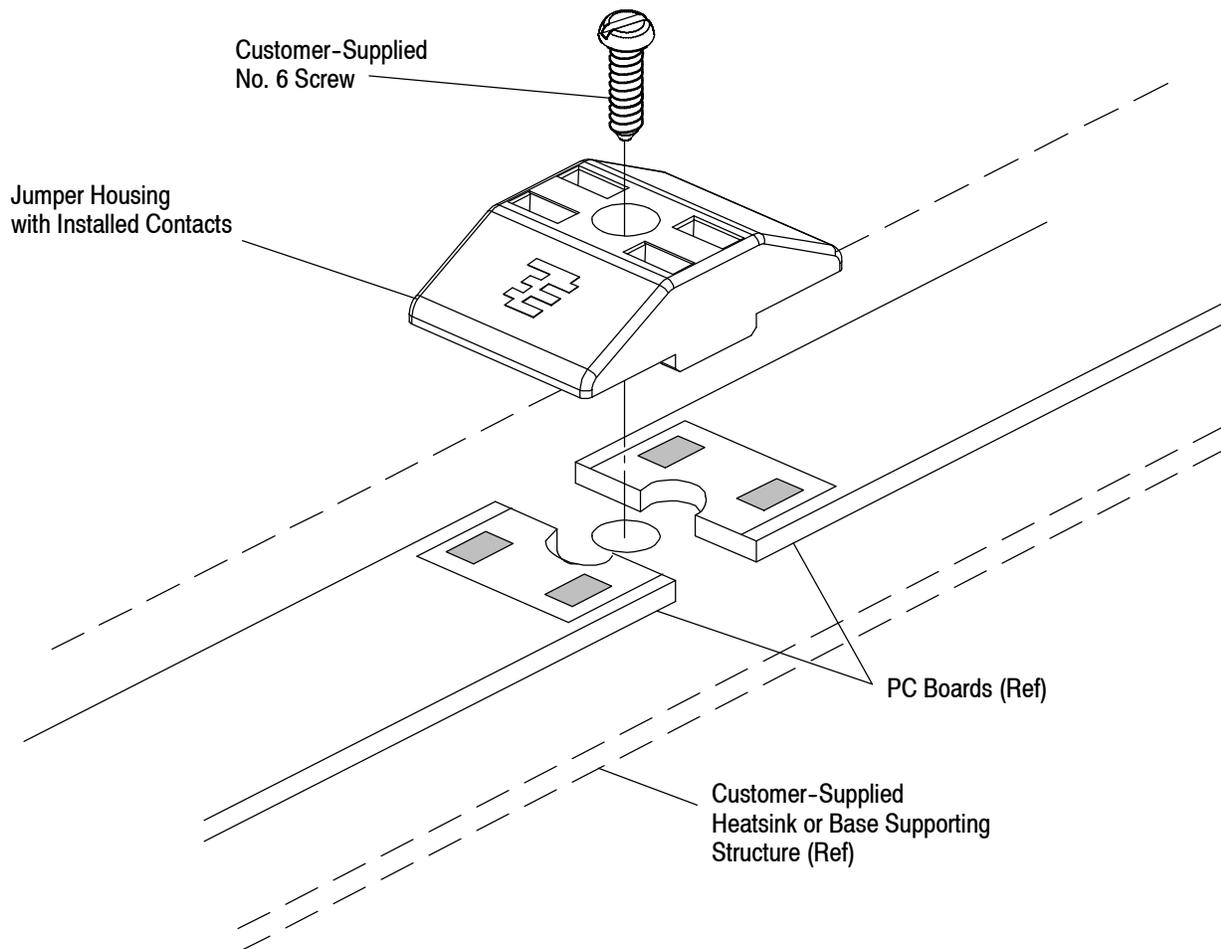


Figure 3

4. QUALIFICATIONS

The Board-to-Board Screw-Down Jumper is ETL Recognized to Underwriters Laboratories Inc. (UL) standard 1977 and CSA International standard 22.2 182.3 M1987.

5. TOOLING

Except for standard screwdriver, no tooling is required for the installation of the Screw-Down Jumper.

6. VISUAL AID

Figure 4 shows a typical application of a Board-to-Board Screw-Down Jumper. 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.

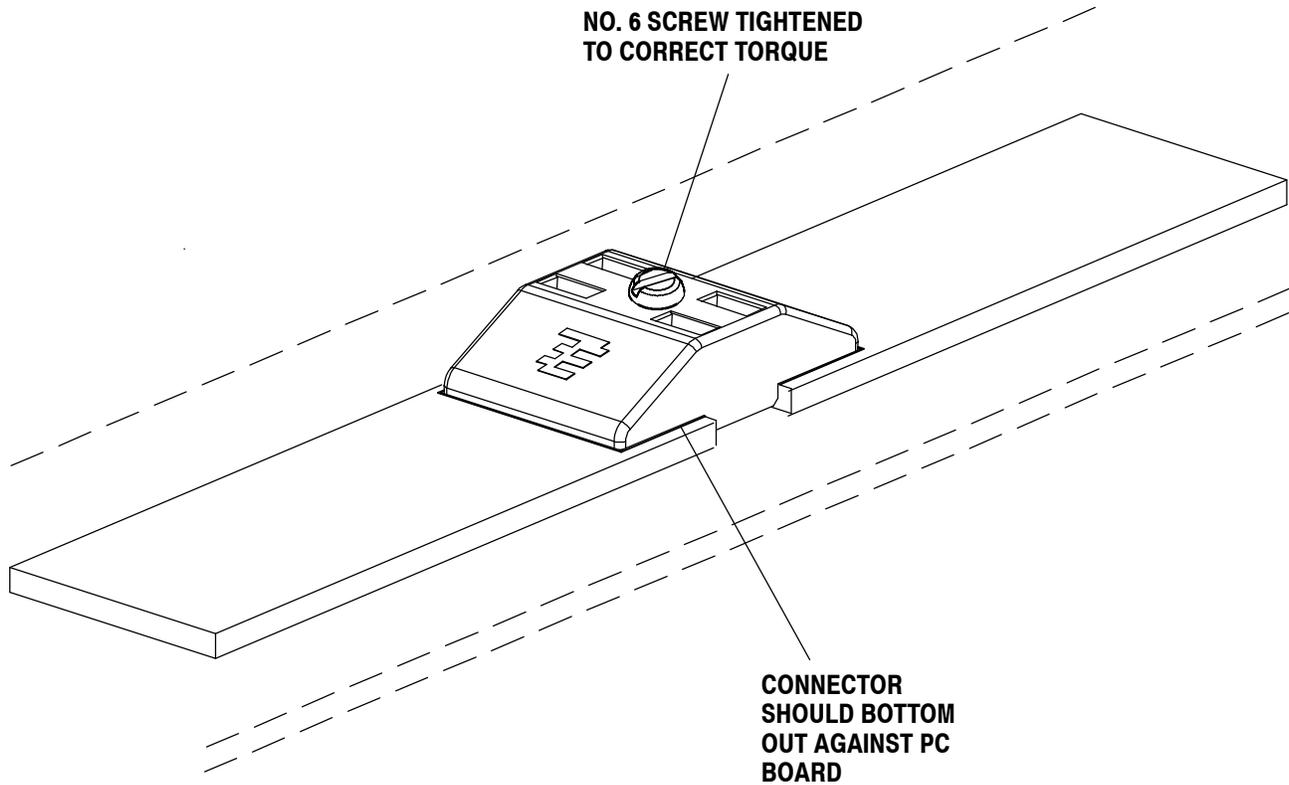


Figure 4 VISUAL AID