

Installation and Removal of Power Tap Assemblies (with Eye-of-the-Needle Contacts)



NOTE: Mounting Screw and Washer(s) Not Supplied by Tyco Electronics

PROFILE	PART NUMBER	NUMBER OF POSITIONS (Contacts)	CENTERLINE SPACING mm [in.]
Standard	2057292-1	6	3.18 X 6.35 [.125 X .250]
	2057293-1	10	3.18 X 6.35 [.125 X .250]
Straddle Mount	2057294-1	10	3.0 X 11.0 [.118 X .433]

Figure 1

#### 1. INTRODUCTION

The Power Tap Assemblies (with Eye-of-the-Needle Contacts ) listed in Figure 1 are designed to be mounted onto a printed circuit (pc) board to provide high current to the pc board. The taps can also be connected to a bus bar or terminal. Read these instructions thoroughly before installing any tap assemblies.



Dimensions in this instruction sheet are in millimeters [with inches in brackets]. Figures are for reference only and are not drawn to scale.

#### 2. DESCRIPTION (Figure 1)

Each tap assembly features a tap with six or ten contacts. A screw is NOT included with the tap assemblies.

Insulated tap assemblies include a housing for protection from other components on the pc board. The tap or housing has standoffs that are used for inspection of proper seating on the pc board.

## 3. TOOLING

Customer supplied tooling for seating the Power Tap Assemblies shall be designed using the dimensions provided in Figures 2 and 3.



Make sure that the front and the sides of the support block are parallel when installed in power unit.

Power for seating taps must be provided by application tooling capable of supplying a downward force of 1780 Newtons (N) [400 lb]. The power unit must have sufficient throat depth to accommodate various positions on the pc board. In addition, the power unit must have provision for ram adjustment to prevent under- or over-insertion.

TOOLING ASSISTANCE CENTER 1-800-722-1111 PRODUCT INFORMATION 1-800-522-6752

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### 4. INSTALLATION

#### 4.1. Seating Tap onto PC Board

1. Partially insert the contacts of the tap into the appropriate holes in the pc board.

2. Center the tap under the locating block as shown in Figure 4. Actuate the power unit to seat the tap onto the pc board. If desired, solder the tap to the pc board following locally approved soldering guidelines.

3. Inspect the mounted tap according to Figure 5.



Figure 4

Inspecting Mounted Tap



- 1 ) 0.00-0.20 [.000-.008] Standoffs Seated on PC Board
- 2 ) Standoffs Are Not Deformed
- 3 ) Contacts Are Straight

Figure 5

#### 5. REMOVING TAP ASSEMBLY (Figure 6)

1. DISCONNECT the tap assembly from the power supply. Remove the cover (if applicable), screw, and washer.



If tap is soldered to pc board, remove solder using standard de-soldering methods.

2. Remove the tap board assembly covering the power tap.

3. Position the extraction tool over the power tap to be removed.

4. Holding the tool firmly over the power bug, slowly turn the knob assembly clockwise to engage the tool threads with the threads of the power tap load beam.

5. Continue turning the knob until the tool lifts the power tap from the pc board.

6. Remove extraction tool from power tap by turning tool knob counter–clockwise until threads disengage.



Figure 6

# 6. RECOMMENDED EXTRACTION TOOL CONFIGURATION

Refer to Figure 7 for dimensions for a recommended extraction tool for the removal of Power Tap Assemblies.



Figure 7

#### 7. REPLACEMENT AND REPAIR



The components of the tap assembly are not repairable. Discard and replace any defective or damaged components. DO NOT re-use a tap assembly after it has been removed from the pc board.

## 8. REVISION SUMMARY

Initial release of document