

Fig. 1

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1. INTRODUCTION

This Instruction Sheet (IS) covers the application and maintenance of AMP Seating Tools 854423-1 through 8. The seating tools are used to seat AMP ACTION PIN* Z-PACK* Stripline 100 Pin Header Connector Assembly Series, 650571, 650572, and 650573, into printed

circuit (pc) boards. See Figure 1. Read these instructions thoroughly before using the tool.

NOTE

All dimensions on this sheet are in metric units [with U. S. customary units in brackets].

2. DESCRIPTION (Figure 1)

AMP Seating Tool Assembly 854423 is designed with an adapter and seating tool blade. The adapter straightens the connector during cycle of applicator ram, to provide proper insertion into the pc board. When seating the connector, the blade(s) are positioned over the contact shoulders to prevent damage to the contacts. Each tool is designed with a specific combination of contacts in a row and number of rows in a connector. Refer to Figure 2 to determine tool and connector compatibility.

3. REQUIREMENTS

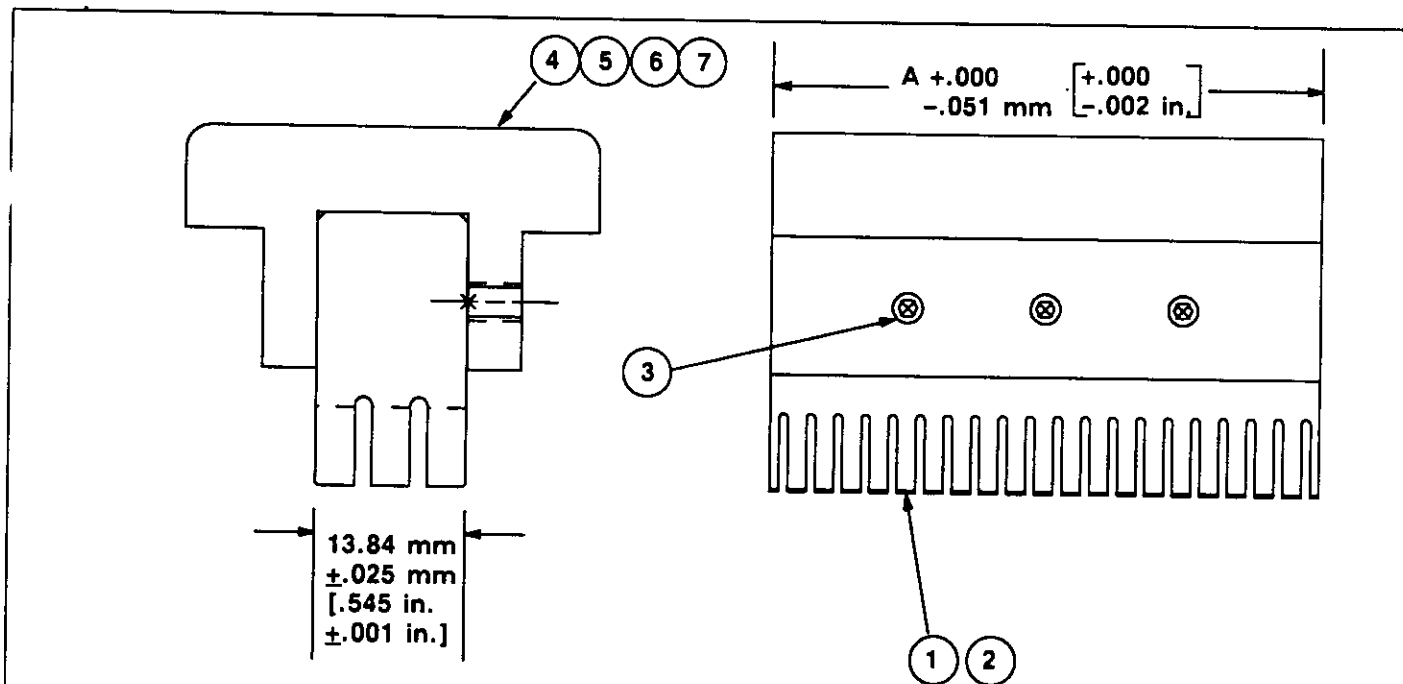
A. PC Board Support Fixture (Customer Supplied)

A pc board support fixture is required to ensure that (1) each connector is aligned with the tool during the seating process, and (2) posts are protected during the procedure. PC board supports are not furnished by AMP, and must be supplied by the customer. IS 6927 shows AMP design recommendations.

B. Application Tooling

The connectors can be seated with an application unit capable of supplying a downward pressure of 178 Newtons per contact [40 lb/contact]. AMP 10/20-Ton "H" Frame Assembly 803880-6 is capable of seating up to 1000 contacts, while AMP SM-3 Frame Assembly 814700-[] can seat up to 150 contacts. For operating and setup procedure of the frame assemblies, refer to CM 5567 (10/20-Ton "H" frame assembly), and CM 5626 (SM-3 frame assembly).

In the chart, the number of pins in a pin housing ranges from 60 through 280. Since there are only two seating tool blades, item 1 (80 pin positions) and item 2 (60 pin positions) you must use various combinations of these blades and adapters for any pin header over 80 pins. For example: Note the "Number of Pins" row and moving to the right, select 200 pins. Below that are the parts required to make up the seating tool assembly and the quantity. This seating tool assembly is 854423-5.



ITEM NUMBER	DESCRIPTION	PART NUMBER	SEATING TOOL ASSEMBLY 854423-[]								LENGTH "A"	
			-1	-2	-3	-4	-5	-6	-7	-8	MILLIMETERS	INCHES
0	(NUMBER OF PINS)	-----	60	80	160	180	200	240	260	280		
1	SEATING TOOL BLADE (80)	854424-1	--	1	2	--	1	3	1	2	50.44	1.986
2	SEATING TOOL BLADE (60)	854424-2	1	--	--	3	2	--	3	2	37.74	1.486
3	SCR SS FL.PT. 6-32 X .188	2-21012-8	3	3	6	6	7	9	9	10	----	----
4	ADAPTER	314274-1	1	1	--	--	--	--	--	--	50.80	2.00
5	ADAPTER	314274-2	--	--	1	--	--	--	--	--	101.60	4.00
6	ADAPTER	314274-3	--	--	--	1	1	1	--	--	152.40	6.00
7	ADAPTER	314274-4	--	--	--	--	--	--	1	1	215.90	8.50

Fig. 2

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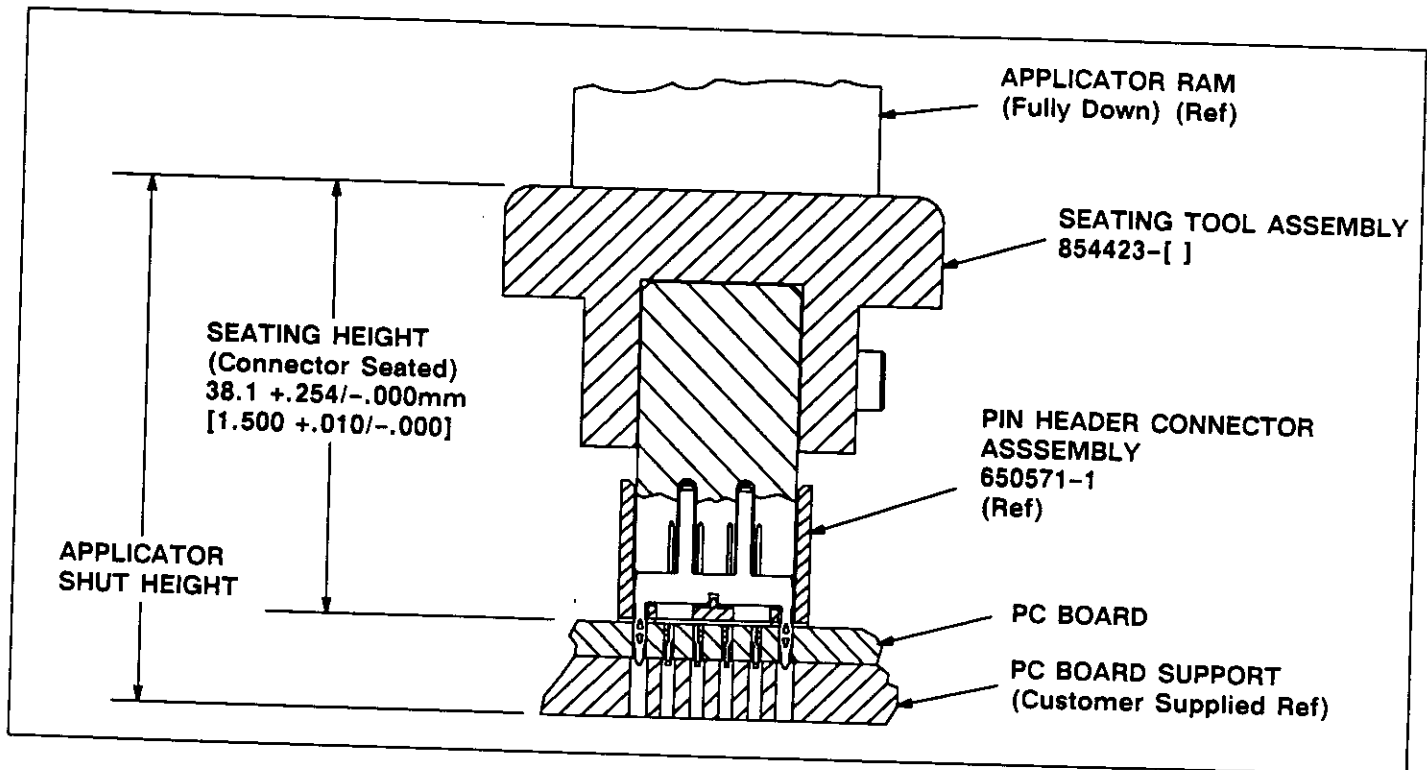


Fig. 3

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C. Seating Height (Figure 3)

The seating height—distance from the bottom surface of applicator ram (fully down) to the top of the pc board—must be set at 38.1 mm [1.50 in.] before starting seating procedure.

D. Applicator Shut Height

The applicator shut height equals seating height, plus thickness of pc board, and pc board support.

4. SEATING PROCEDURE

1. Place pc board on pc board support fixture. Align board holes with the fixture holes or slots.
2. Insert connector contacts into the board until compliant pin sections of the posts start to enter pc board holes.
3. Position proper seating tool into connector.
4. Center seating tool and connector under the applicator ram. Lower the ram slowly and verify alignment of tool to the connector.

CAUTION

To prevent damage to the tool, connector, or both, make sure the connector and tool are compatible with each other and aligned properly in the application unit.

5. Cycle application unit frame assembly to seat connector into pc board.
6. Remove seating tool and pc board from the support fixture.

This completes the seating procedure.

5. TOOL INSPECTION (Figure 4)

Each seating tool is assembled and inspected before shipment. AMP recommends that the tool be inspected immediately upon its arrival in your plant to assure that it has not been damaged during shipment, and that it conforms to the dimensions given in Figure 2.

6. MAINTENANCE/QUALITY CONTROL

A. Daily Maintenance

It is recommended that each operator be made aware of, and responsible for, the following steps of daily maintenance:

1. Remove dust, moisture, and other contaminants with a clean, soft brush or clean lint-free cloth. Do NOT use objects that could damage the tool or any of its components.
2. Ensure that the screws are in place and secured.
3. When the tool is not in use, store it in a clean, dry area.

B. Periodic Inspection

Regular inspections should be performed by quality control personnel. A record of scheduled inspections should remain with the tool or be supplied to supervisory personnel responsible for the tool. The inspection frequency should be based on the amount of use, working conditions, operator training and skill, and established company standards.

CUSTOMER SERVICE (38-35)
AMP INCORPORATED
P.O.BOX 3608
HARRISBURG, PA 17105-3608

Tools may be returned (along with a written description of the problem) to AMP for evaluation and repair. Ship tools to:

7. REPLACEMENT PARTS AND REPAIR

A complete inventory of the customer-replaceable parts listed in Figure 2 should be stocked for immediate replacement. Replacement parts can be ordered from:

CUSTOMER REPAIR (01-12)
AMP INCORPORATED
1523 NORTH 4TH STREET
HARRISBURG, PA 17102-1604