

## 305-TYPE CONNECTORS

### DESCRIPTION, USE, INSTALLATION, AND REPAIR PROCEDURES

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**1. GENERAL**

**1.01** This practice covers the description, use, installation, and repair procedures for 305-type connectors. The 305-type connector is rated LA (Limited Availability). Recommended replacements are the 310- or 311-type connectors.

**1.02** This practice is issued as part of a general restructuring, updating, and combining of the 201-series of practices. The following practices are combined with this practice:

- 201-208-105
- 201-208-805

**1.03** These connectors are used for terminating and protecting outside plant cables on conventional and low profile conventional distributing frames.

**1.04** The 305-type connectors, with protector units, provide features for voltage protection, current protection, testing, identification of special circuits, and disconnection of the outside cable pair from the central office equipment.

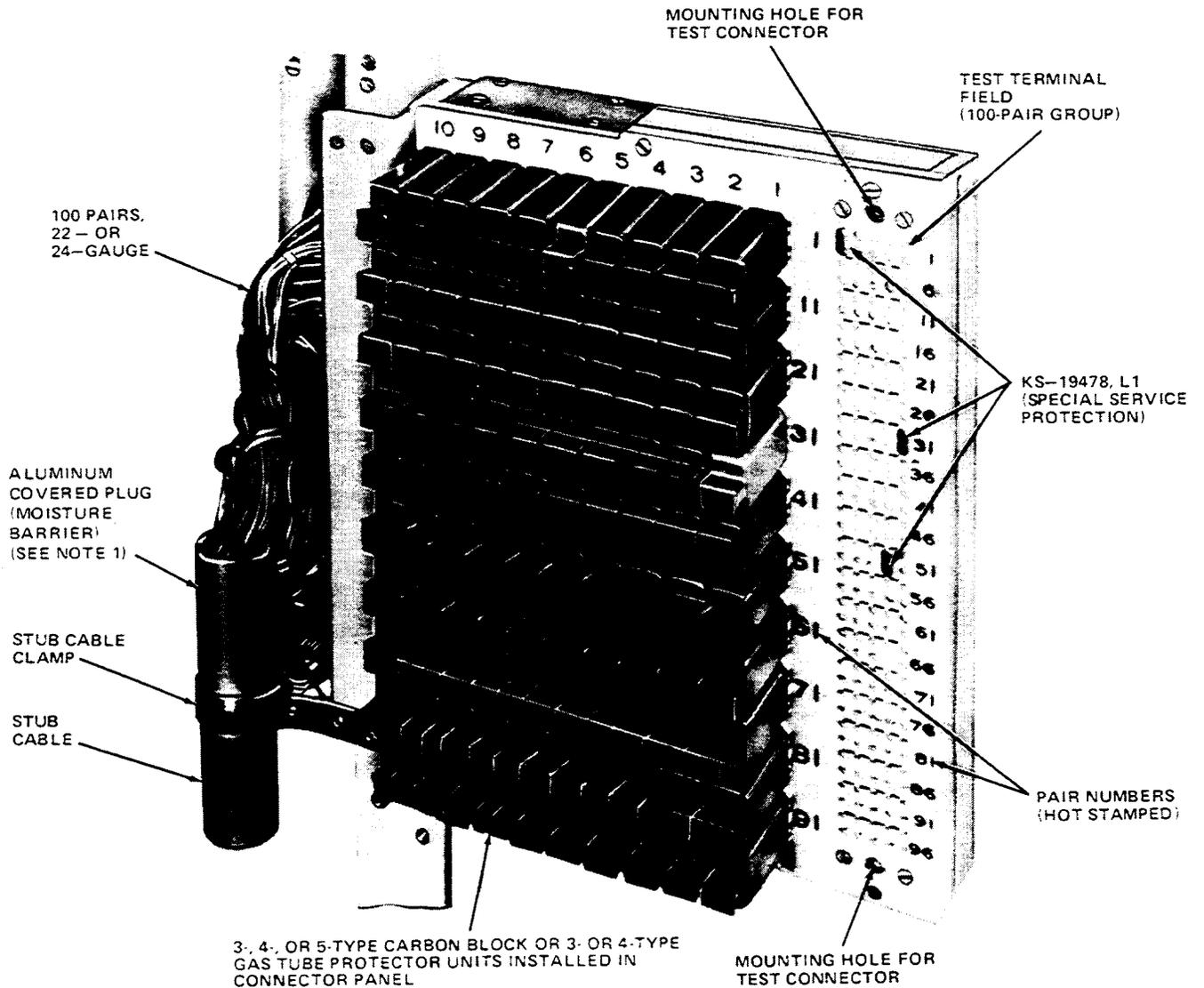
**1.05** The 305-type connectors are not supplied with protector units. Required units should be ordered separately and installed by the operating company.

**1.06** The purpose of central office protection is to ensure the safety of telephone personnel and to reduce the possibility and extent of equipment damage in the event that foreign potential contacts the outside plant.

2. DESCRIPTION

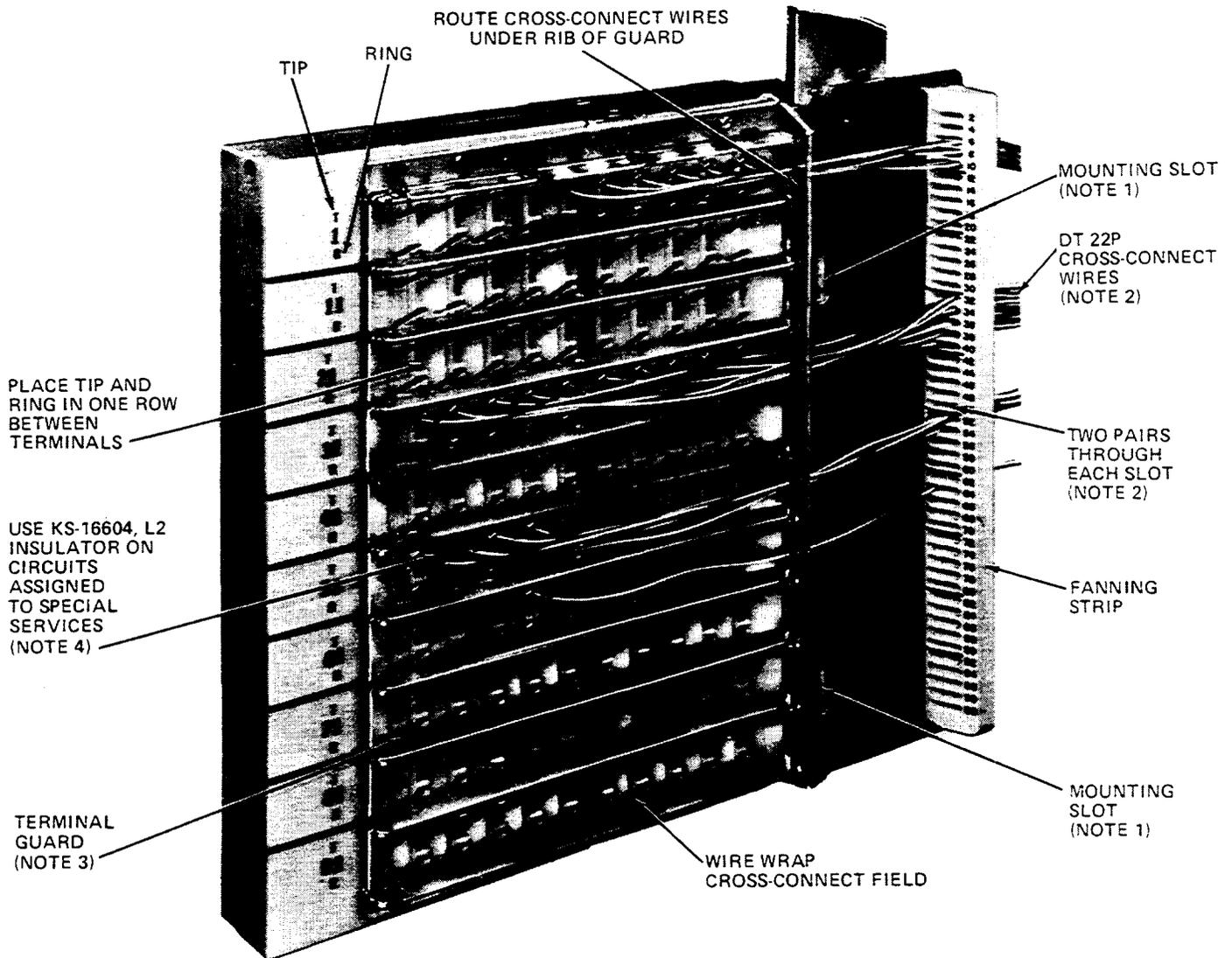
2.01 The 305-type connector (Figure 1, 2, and Table A) is a plastic panel 9-3/8 inches high,

1-7/8 inches wide (without protector units installed) and extends 7-1/2 inches outward from the frame vertical.



NOTE:  
 1. FACTORY-INSTALLED PLUG PREVENTS MOISTURE FROM ENTERING THE CO SPLICE DUE TO "BREATHING" ACTION OF CABLE DURING CHANGES IN TEMPERATURE.

Figure 1—305-Type Connector — Left Side View



NOTES:

1. THE 305-TYPE CONNECTOR MOUNTS ON THE FRAME VERTICAL IN AN ORIENTATION WHICH IS 90 DEGREES FROM CONVENTIONAL MOUNTING OF MAIN DISTRIBUTING FRAME CONNECTORS.
2. BECAUSE OF HIGHER DENSITY ACHIEVED IN THE CROSS-CONNECT FIELD, USE ONLY DT 22P CROSS-CONNECT WIRE.
3. ENTIRE CROSS-CONNECT FIELD IS PROTECTED BY A REPLACEABLE TERMINAL GUARD (842355604).
4. IF THE TERMINAL INSULATOR FITS LOOSELY ON THE WIRE-WRAPPED CONNECTION, THE INSULATOR SHOULD BE COMPRESSED WITH A PAIR OF PLIERS PRIOR TO INSTALLING IT ON THE TERMINAL.

Figure 2—305-Type Connector — Right Side View

TABLE A						
305-TYPE CONNECTORS — LA (LIMITED AVAILABILITY)						
Application	Cross-Connect Terminal Type	Stub Cable			Item Code	Comcode
		Wire Gauge	Length (Feet)	Cabling Direction		
Outside Plant Facility Pairs	Wire Wrap	24	30	Down	305A1-100-30	102600178
			50		305A1-100-50	102698024
			80		305A1-100-80	102698032
			100		305A1-100-100	102698040
			150		305A1-100-150	102793718
			200		305A1-100-200	102793726
		22	30		305B1-100-30	102600160
			50		305B1-100-50	102697604
			80		305B1-100-80	102697612
			100		305B1-100-100	102697620
			150		305B1-100-150	102793734
			200		305B1-100-200	102793742
		24	30	Up	305C1-100-30	102816014
			50		305C1-100-50	102816022
			80		305C1-100-80	102816030
			100		305C1-100-100	102816048
			150		305C1-100-150	102816055
			200		305C1-100-200	102816063
		22	30		305D1-100-30	102816071
			50		305D1-100-50	102816089
			80		305D1-100-80	102816097
			100		305D1-100-100	102816105
			150		305D1-100-150	102816113
			200		305D1-100-200	102816121

**Note:** Special "F Spec" connectors equipped with dual 22-gauge stubs for T-carrier applications are also available. Contact your AT&T account representative for additional information.

**2.02** The outer surface of the 305-type connector has provisions for cable number and pair number stamping. The left side is factory stamped for protector unit identification. The right side is factory stamped to identify tip and ring terminals.

**2.03** The molded plastic panel of the 305-type connector is equipped with a field of terminals for accepting 3-, 4-, or 5-type protector units (ordered separately). Tip and ring terminals are gold plated to accept the gold-plated tip and ring terminals of the protector units. The ground terminals are solder plated.

**2.04** *Warning: The connector test terminals are gold plated. Any abuse, such as locating tone with a probe, shorting or grounding pairs with long-nose pliers, etc. will damage the test terminals.* The 305-type connectors have a 100-pair test terminal field (200 terminals) in a 10 by 10 array located on the left side of the connector. The terminal field is adjacent to the protector unit array and allows for the attachment of the M and N test connectors. Gold-plated wire-wrap terminals in the cross-connect field, located on the right side of the connector, are protected by a plastic cross-connect terminal guard.

**2.05** The 305-type connector is designed to be mounted on the right side of the distributing frame verticals. It occupies half the vertical space of the 303-type connector.

**2.06** The 305-type connectors are designed primarily for use with the LPCDF (low profile conventional distributing frames). However, they can be used on tall conventional distributing frames.

**2.07** The 305-type connectors (Figure 1 or 2) have a standard factory-connected, color-coded, 100-pair stub cable made up with 22- or 24-gauge tinned-copper PVC-insulated conductors, a mylar tape core wrap, a corrugated aluminum shield under an outer PVC sheath, and an aluminum-covered moisture plug at the terminated end of the stub cable. *The stub cable must not be maintained under continuous pressure.*

**2.08** The stub cable is available in both 22- and 24-gauge conductor sizes. The 305-type connectors are supplied with the stub cable arranged for either top-mounted or bottom-mounted positions (Table A). For locations having a CEF (Cable Entrance Facility) directly under the MDF (main distributing frame), order 305A1-100 or 305B1-100 connectors. At locations where the stub cable must go to the top of the MDF, order 305C1-100 or 305D1-100 connectors.

**2.09** Both the 22- and 24-gauge stub cables have a light olive-gray sheath. The 22- and 24-gauge cables can be identified by a red or white binder around the core wrapper, respectively.

**2.10** When considering the use of a 305-type connector, attention must be paid to the stub cable capacity of the slot or hole leading into the CEF. For a tall conventional frame, a maximum of 12 stub cables may have to pass through the opening provided at each vertical location.

### 3. INSTALLATION

#### PRECAUTIONS

**3.01** Store the connectors in a dry location. Do not leave these units on loading docks or in locations exposed to the weather.

**3.02** When unpacking the connector, open the carton on the side marked "OPEN FROM THIS SIDE".

**3.03** Do not bend the cable stubs in a radius of less than 5 inches, nor to a 5-inch radius more than twice at the same general location.

**3.04** To prevent damaging the wire-wrap terminals, do not remove the packing material from the connector until it is ready for installation on the vertical frame.

#### INSTALLING THE 305-TYPE CONNECTORS

**3.05** The 305-type connectors are installed on conventional and low profile conventional distributing frames. AT&T 201-220-101 describes the conventional distributing frames.

- 3.06 The capacities of vertical main frames equipped with 305-type connectors are shown in Table B.

TABLE B 305-TYPE CONNECTOR TERMINATION CAPACITIES	
HEIGHT OF VERTICAL MAIN FRAME	NO. OF TERMINATIONS PER VERTICAL
8 Feet	800 Pairs
9 Feet	1000 Pairs
11 Feet, 6 inches	1200 Pairs
12 Feet, 5 inches	1200 Pairs (Note 1)
14 Feet, 5 inches	1200 Pairs (Note 1)

*Note 1:* A maximum of 1200 pairs may be terminated. Any number above that can cause congestion problems in the vertical bays.

- 3.07 Prior to installing 305-type connector(s):

- (1) Open the cable entrance slots or ferrules in the floor, in accordance with local instructions.
- (2) **Mark** the cable number and pair count of each connector stub cable on a linen tag or glass tape and **attach** to stub cable prior to placing it through the floor to the cable entrance facility.

*For tall conventional MDFs which have mounting holes drilled for mounting C-50-, 300-, 301-, and 303-type connectors: Utilize the same mounting holes for the 305-type connector as shown in Figure 3. The mounting bracket of the 305-type connector has two slotted mounting holes and a half hole at each end. Each 305-type connector is attached to the frame vertical by utilizing one slotted hole and one half hole. Since the mounting hole pattern differs at the top and bottom of most tall conventional MDF verticals, a mounting bracket must be used (Figure 4 and 5). The 842354136 mounting bracket must be ordered separately.*

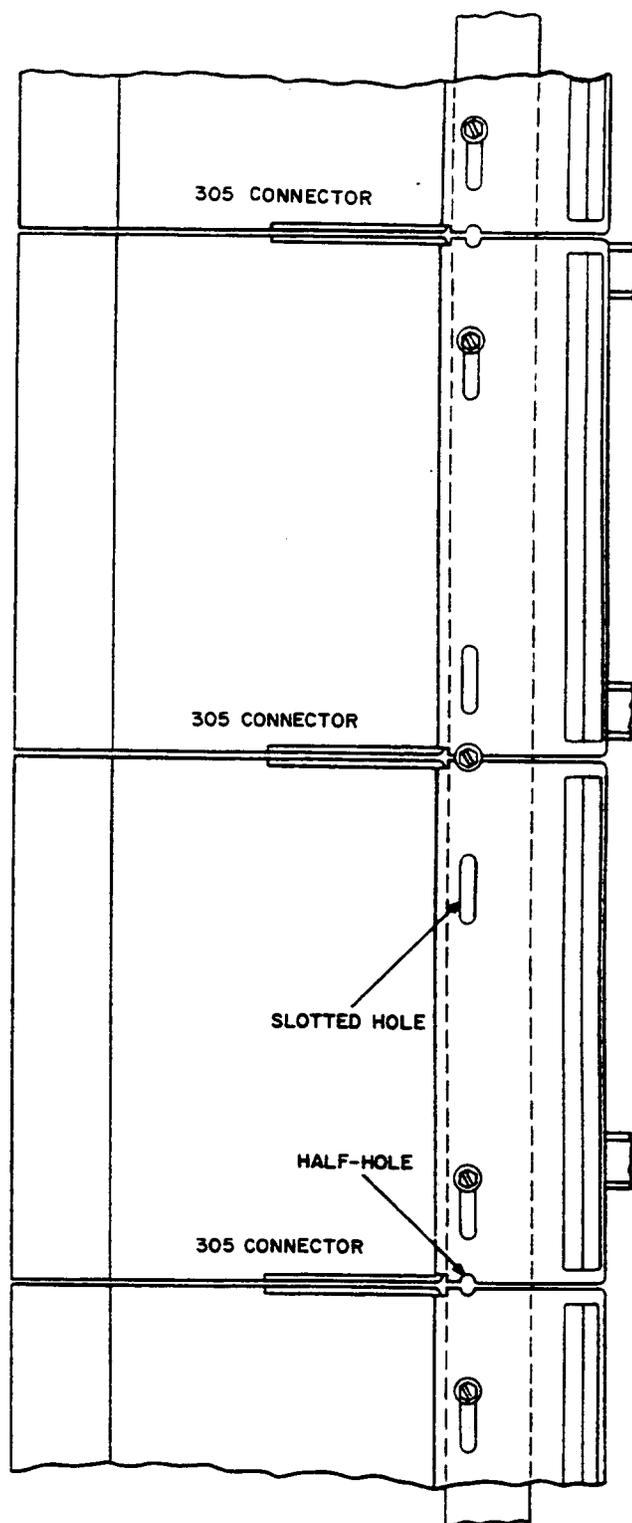


Figure 3—Typical Mounting Arrangement for 305-Type Connectors on a Tall Conventional MDF Using Existing Mounting Holes

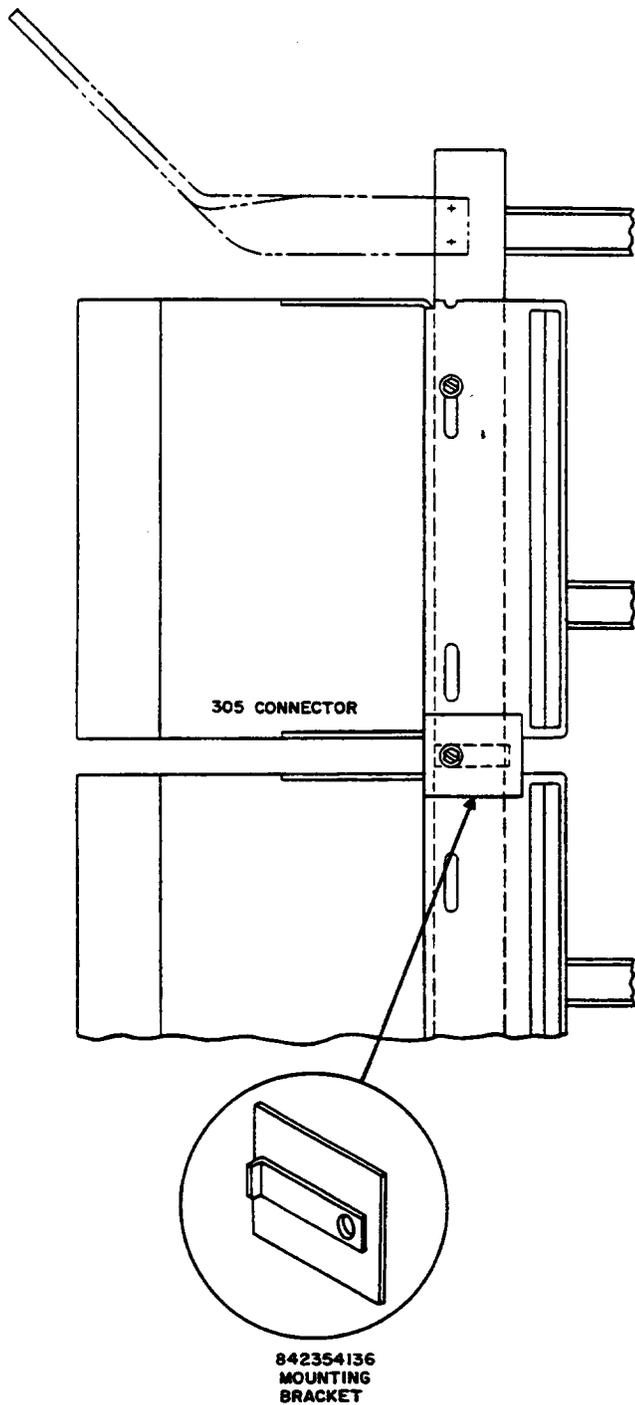


Figure 4—Typical Mounting Arrangement for a 305-Type Connector at Top of a Tall Conventional MDF Vertical

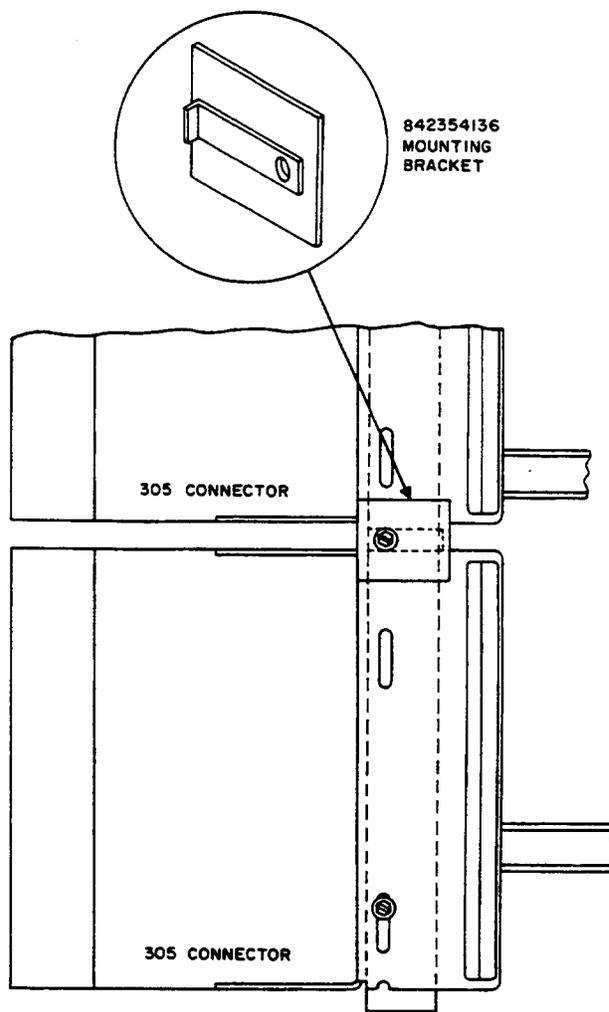


Figure 5—Typical Mounting Arrangement for a 305-Type Connector at Bottom of a Tall Conventional MDF Vertical

For LPCDF (low profile conventional distributing frames) ED-97754 manufactured in 1976 and later: Frame mounting holes have been incorporated on the verticals to accommodate the 305-type connector as well as all standard connectors.

In the event that the mounting holes must be added to the frame vertical to accommodate a 305-type connector, see Figure 6 for drilling information.

**CAUTION:** Stub cable mounting on the 305-type connector should not be rearranged in the field. Stubs ordered for top mounting should be installed for top mounting. Stubs ordered for bottom mounting should be installed for bottom mounting.

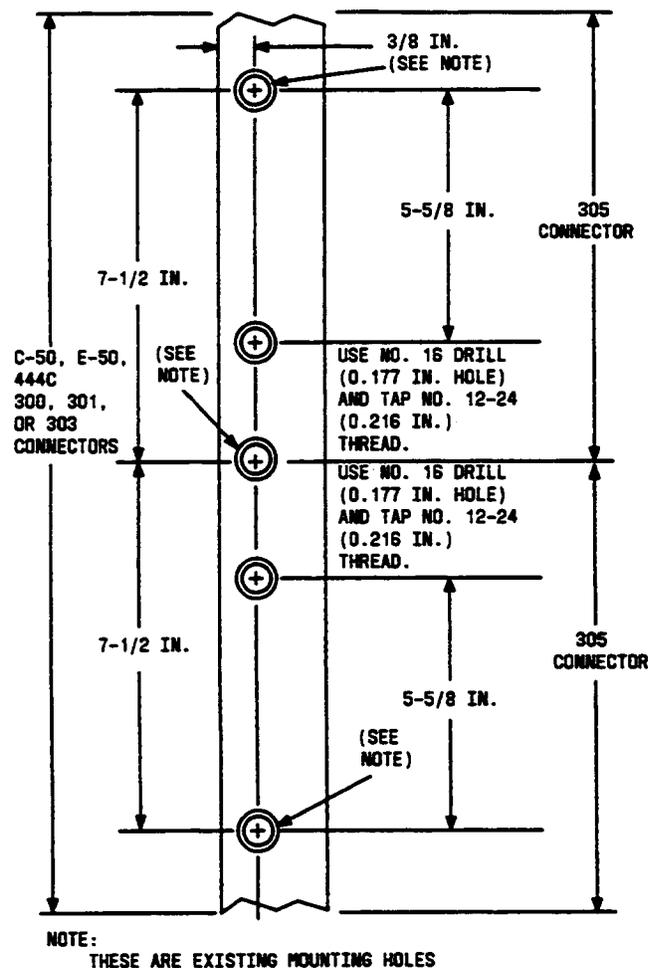


Figure 6—Drilling Information for Attaching 305-Type Connectors to Existing MDF Verticals

3.08 Install 305-type connectors as follows:

**Warning:** The channel-shaped transverse arms of the frame which are welded to the frame vertical may interfere with the stub cable conductors at the back of the 305-type connector during installation. To avoid damage to the conductors, carefully bend the clamp on the pressure plug slightly outward before mounting the connector onto the frame vertical.

- (1) Attach the 305-type connectors to the right side of the distributing frame vertical mounting bar. Mount connectors with upward mounted stubs beginning at the top of the vertical. Mount connectors with downward mounted stubs beginning at the bottom of the vertical. Use the screws furnished with the connectors. Install both screws through the mounting bracket on each connector and attach to the vertical bar. Do not tighten screws. Continue placement of the balance of the connectors until the vertical is filled with the maximum number of connectors.
- (2) Tighten the mounting screws after all of the connectors are placed on the vertical mounting bar.
- (3) Carefully bend the clamp on the pressure plug of the connector stub cable toward the frame. (This makes the stub cable lay back out of the way of future work at the frame.)
- (4) Neatly arrange the stub cables of all connectors on the vertical mounting bar against the transverse arms of the frame. Lash the stub cables to these transverse arms in a neat manner, using lacing twine or cable ties.

(5) Seal the cable entrance slots or ferrules in the floor in accordance with local instructions and/or fire protection practices.

**Caution:** *When the 305-type connector is used for frame compression, on some frames, it may be necessary to extend the guard rail and the ladder track toward the aisle to compensate for the additional depth of the connector as mounted on the frame vertical.*

- When a 305-type connector is mounted immediately to the right of a 303-type connector, it is recommended that one frame vertical be skipped to facilitate access to 303-type connectors for running cross-connects as shown in Figure 7. There is no need to skip a vertical when a 305-type connector is mounted to the left of a 303-type connector.

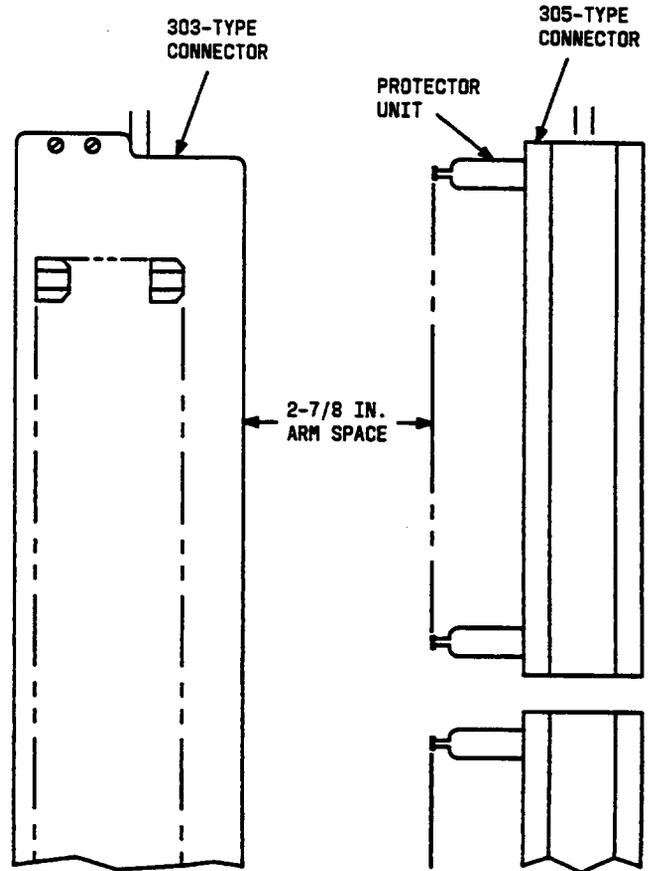
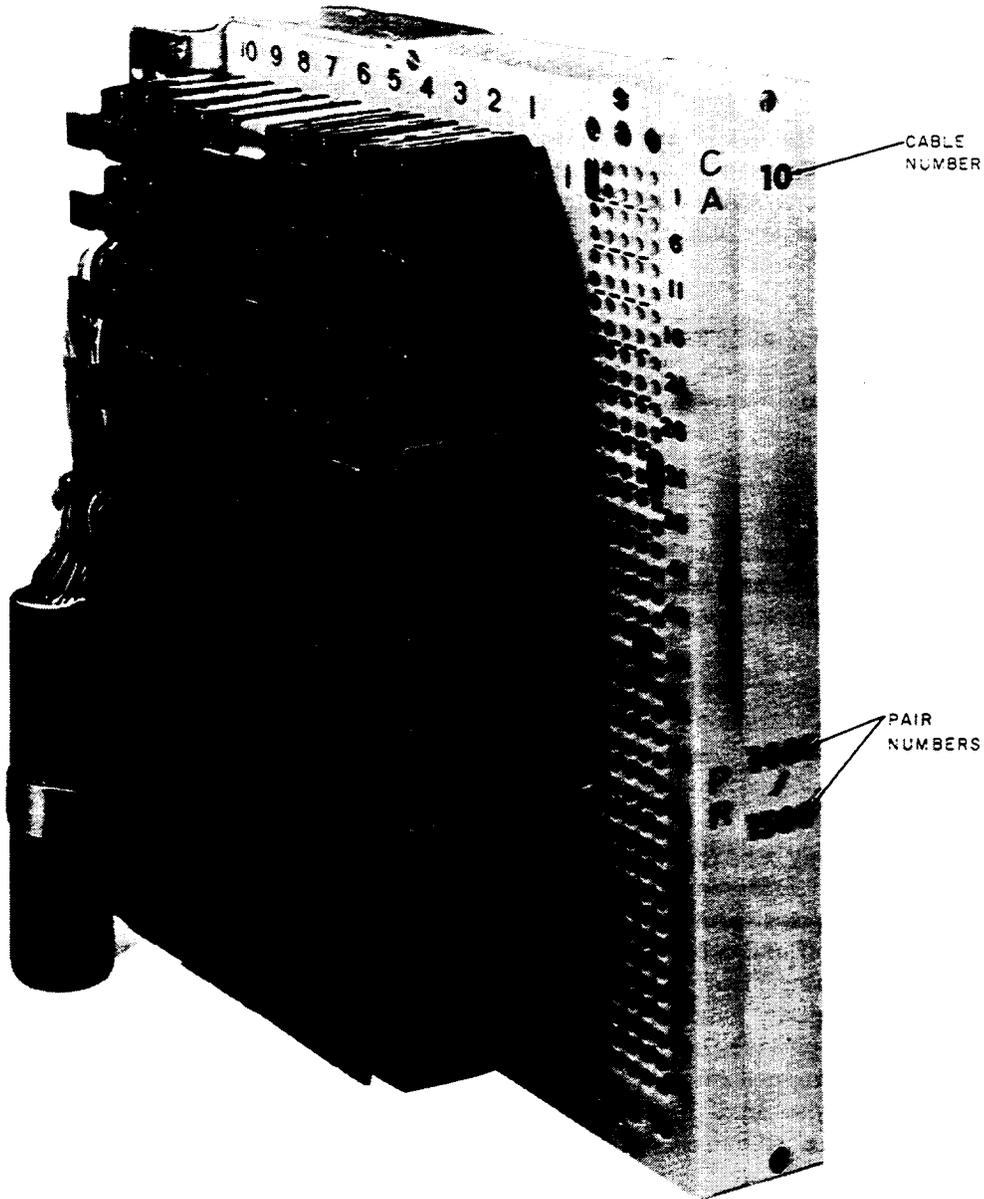


Figure 7—305-Type Connector Mounted to the Right of a 303-Type Connector

**MARKING THE 305-TYPE CONNECTOR**

**3.09** Use the B or W transfer stenciling kit, as described in Section 081-860-105, for marking

the cable and pair numbers. Section 636-200-011 covers the marking of main frames. Mark the 305 connector in a manner similar to that shown in Figure 8.



**Figure 8—Marking Cable and Pair Numbers**

**4. REPAIR PROCEDURES**

**4.01** Before making repairs to the apparatus referred to in this part, craft personnel should be familiar with the contents of the following practices:

PRACTICE	TITLE
069-132-811	Punched or Wire-Type Terminals (Not Having Notches or Perforations) Method of Making and Removing Wrapped Connections
069-140-811	Soldered Connections—Using Soldering Coppers—Method of Making and Removing.

**PRECAUTIONS**

**4.02** This practice covers only those parts which can be replaced in the field. No attempt should be made to replace parts not designated.

**4.03** Exercise extreme care when removing, connecting, and replacing terminals to prevent damage to adjacent connections and to avoid crosses to operating circuits.

**4.04** The ends of wire previously used for a solderless wrapped connection or soldered connection shall not be reused for subsequent connections. The end of the wire must be cut off and reconnected by solderless wrapping or soldering. Except in cross-connection fields, it will be necessary to splice the wire if there is not enough slack to provide the number of turns required for solderless wrapped connections. In cross-connection fields, the wire shall be rerun to provide sufficient length for a solderless wrapped connection (AT&T 069-132-811).

**TOOLS AND MATERIALS**

**4.05** The following is a list of the tools and materials used in repair procedures:

CODE/SPEC NO	DESCRIPTION
AT-7860	B long-nose pliers
658B	Terminal extractor
AT-7825	4-inch E screwdriver
—	Off-set screwdriver
—	Wrench, 5/16-inch box or open-ended
401787726	Cable ties
KS-6320	Orange stick
KS-16748	Insertor
—	Sleeving
AT-7424	E rosin-core solder
KS-8740	Soldering copper
KS-16363, L3	Wire-wrap gun
KS-20827, L1 or KS-20551 R-2916	Wire unwrapping tool Twine.

**REMOVING AND REPLACING DEFECTIVE TERMINALS**

**4.06** The 814648622 (P-46D862) ground terminal and the 842360562 or 841634207 tip or ring terminal are not replaceable on the 305-type connector. Only the cross-connect and test terminals are replaceable. The following paragraphs detail the removing and replacing of these terminals.

**Cross-Connect Terminal**

4.07 To remove the 842360810 or 842137796 (DA) cross-connect terminal (Figure 9), proceed as follows:

- (1) On the cross-connect side of the connector, tag and remove the leads from the terminal to be replaced.
- (2) If the wire-wrap portion of the terminal is not broken, straighten the terminal so that it is perpendicular to the connector panel.

- (3) Push the straightened terminal through the connector panel and remove it from the protector side of the connector.
- (4) If the wire-wrap terminal is broken at the bent portion, the socket portion will stay attached to the protector unit pin. Removing the protector unit from the connector panel will remove the terminal.

**Note:** Any bent portion of the terminal at the rear of the panel may capture the terminal. If the terminal is captured, the bent portion *must* be straightened prior to removal.

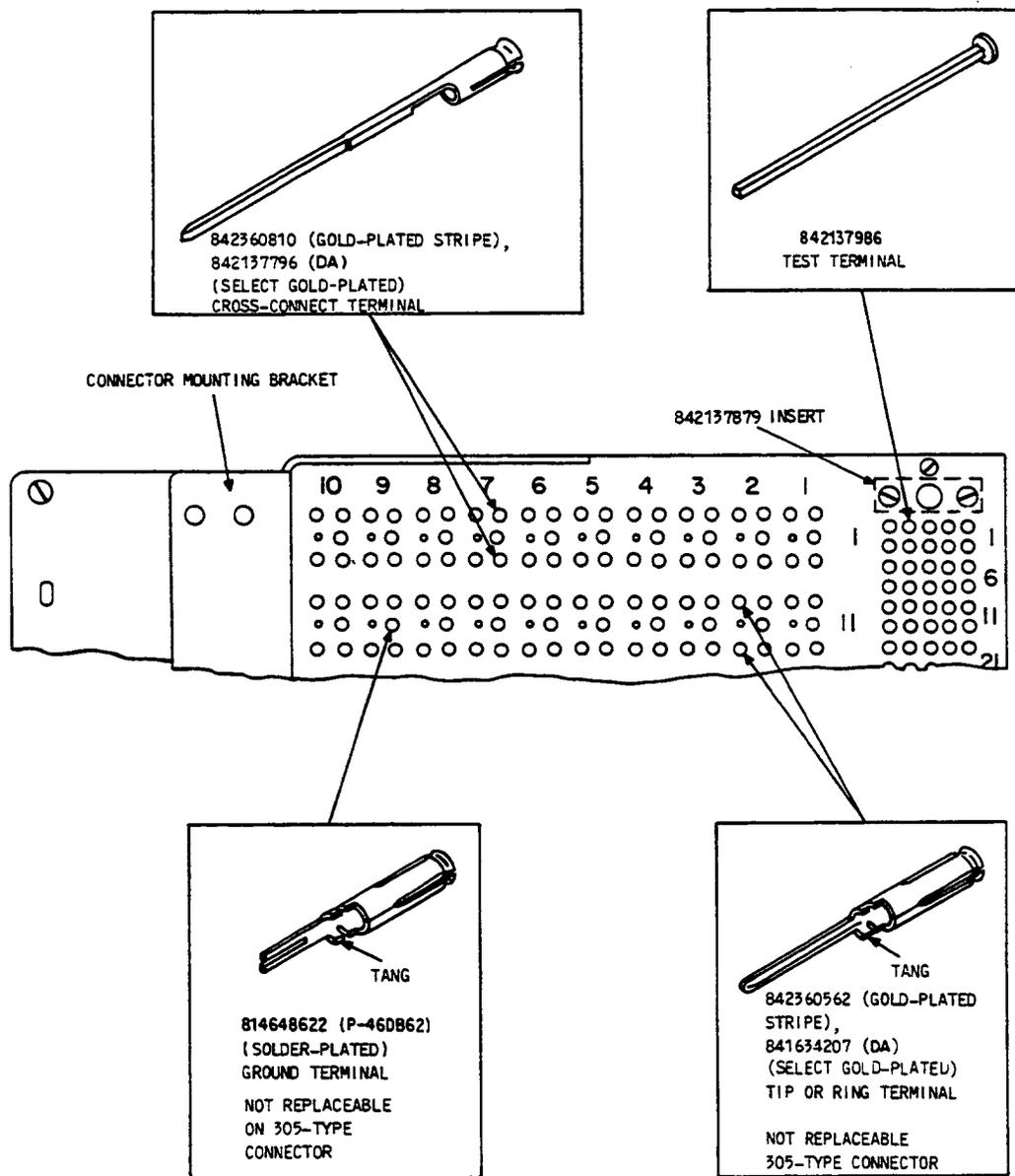


Figure 9—305-Type Connector — Replacement Terminals

**4.08** To replace the 842360810 or 842137796 (DA) cross-connect terminal, proceed as follows:

**Note:** If a central office tip or ring terminal (842360810 or 842137796 [DA]) is found to be shorted to an outside plant tip or ring conductor, the cause may be remedied as follows: Cut a 11/16-inch long length of sleeving and slip it onto the solderless wire-wrap end of the terminal prior to performing Step (1). The sleeving will insulate the metallic terminal from the conductors. A sleeved terminal (842367005) is available with the proper length of tubing cut and assembled onto the 842360810 terminal.

- (1) On the protector side of the connector, properly orient the new terminal and insert it into the same hole from which the old terminal was removed.
- (2) Using the fingers, push the terminal into the hole as far as possible.
- (3) Insert a protector unit into the connector to hold the terminal in place.
- (4) On the cross-connect side of the connector, use the B long-nose pliers and pull the terminal into its proper position.
- (5) Using thumb pressure, carefully bend the terminal to the proper angle. Determine the proper angle by observing the position of adjacent terminals.

**Note:** This terminal has no tangs and is held in position in the connector panel by its bent position.

- (6) Reconnect all leads to the terminal.

**Note:** Prior to making connections to the terminal, refer to paragraph 4.04.

- (7) Remove the protector unit.

#### Test Terminal

**4.09** To remove the 842137986 test terminal (Figure 9), proceed as follows:

- (1) Remove the test field cover by removing the two screws on the outer edge of the connector and sliding the cover outward to expose the test terminals.
- (2) On the wiring side of the connector, tag and remove the leads from the terminal to be replaced.
- (3) Using a new terminal or a sharp instrument, such as a test probe, push the broken or damaged terminal through the connector about 1/8 inch.
- (4) On the test contact side of the connector, grasp the terminal head with the B long-nose pliers and pull the terminal from the connector block.

**4.10** To replace the 842137986 test terminal, proceed as follows:

- (1) On the front side of the connector, insert the new terminal into the same hole from which the old terminal was removed.
- (2) Using the fingers, push the terminal into the hole as far as possible.
- (3) Using an orange stick, push the terminal into its seated position on the connector.
- (4) On the wiring side of the connector, reconnect all leads.

**Note:** Prior to making connections to the terminal, refer to paragraph 4.04.

- (5) Replace the test field cover by reversing the procedure of paragraph 4.09, Step (1).

## 5. REPLACEMENT OF ASSOCIATED PARTS

5.01 *841635196 Test Field Cover (Figure 10):* To replace the cover, proceed as follows:

- (1) Remove and retain the two flat-head screws on the outer edge of the connector.
- (2) Remove the test field cover from the connector, being careful that the 842355604 terminal guard

is not damaged.

- (3) Insert the new test field cover in place with the rear edge under the terminal guard.

- (4) Insert the two flat-head screws removed in Step (1) carefully so that the threads in the block are not stripped.

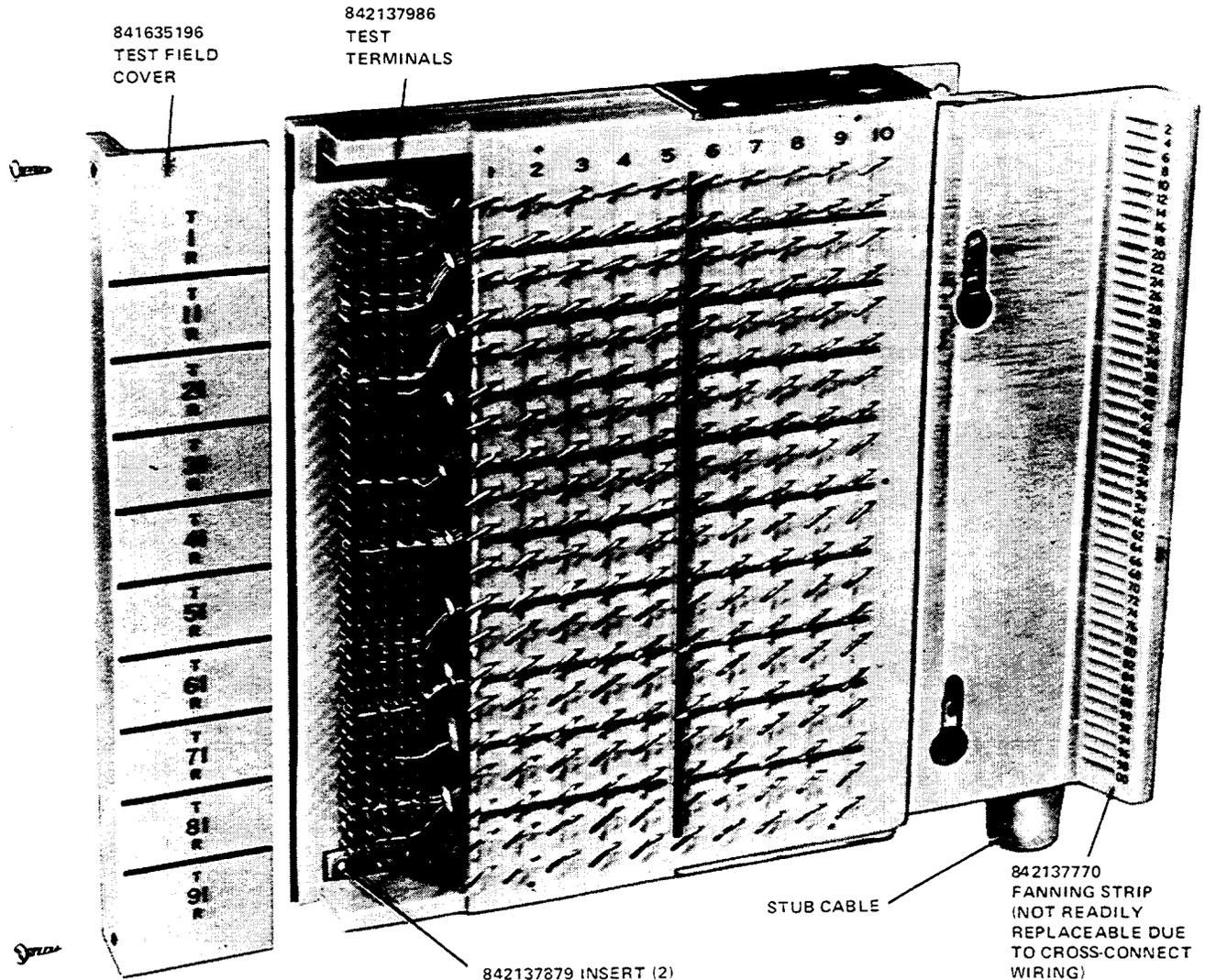


Figure 10—305-Type Connector, Test Field Cover and Terminal Guard Removed

5.02 842355604 Terminal Guard (Figure 11): This guard attaches to the cross-connect side of the 305-type connector and provides protection against injury from the relatively sharp wire-wrap terminals. It also provides for an orderly arrangement of cross-connect wires in each row. Replace the guard as follows:

(1) Remove and retain the five self-tapping screws securing the terminal guard.

(2) Remove the terminal guard from the block, disturbing the cross-connect wires as little as possible.

(3) Place the new terminal guard on the block, capturing the cross-connect wires within the confines of the terminal guard.

(4) Replace the five self-tapping screws removed in Step (1) carefully so that the threads in the block body are not stripped.

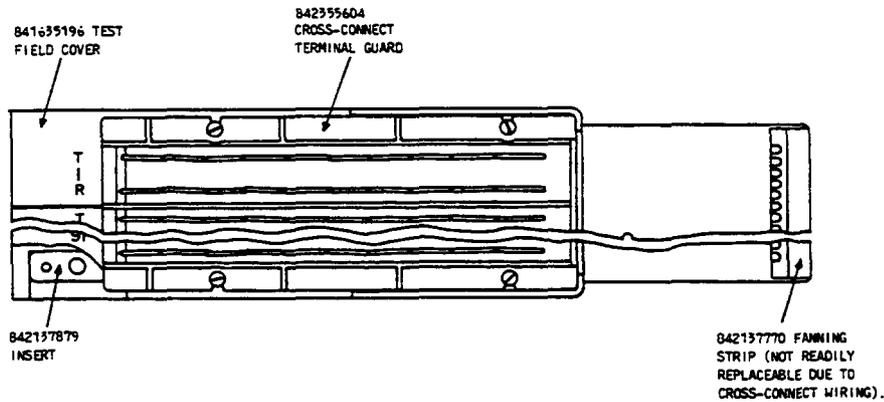


Figure 11—305-Type Connector, Right Side

**5.03** Older 305-type connectors, which are in service and have a sliding plastic cover assembly on the cross-connect side, can be updated to include the 842355604 terminal guard. The guard, including mounting screws and installation instructions, can be ordered as 102983350 retrofit kit.

**5.04** 842137879 *Insert (Figure 10 and 11)*: The 100-pair M test connector attaches to the 305-type connector by means of two thumbscrew fasteners which engage threaded inserts at the top and bottom of the test contact field. Replace the threaded inserts as follows:

- (1) Facing the front of the connector, remove the test field cover as directed in paragraph 5.01, Steps (1) and (2).
- (2) Observe the mounting of the inserts. At the left side of the connector, remove and retain the two flat-head screws that secure the insert in position.
- (3) Remove the insert carefully to prevent a short in the test terminal field (Figure 10).
- (4) Install the new insert and secure it with the two screws removed in Step (2).
- (5) Replace the test field cover as directed in paragraph 5.01, Steps (3) and (4).

## **6. REPAIR OF BROKEN OR DAMAGED WIRE CONDUCTORS**

**6.01** To repair a broken or damaged wire conductor leading from the moisture plug of the stub cable and through the mounting bracket of the 305-type connector (Figure 10), proceed as follows:

- (1) Remove the test field cover as directed in paragraph 5.01, Steps (1) and (2).
- (2) Identify the wire conductor to be repaired and remove the wire-wrap connection at the corresponding test terminal.

(3) Remove the defective wire conductor out through the back of the connector mounting bracket.

(4) Cut the defective portion of the wire and splice a new length of wire to the remaining section. Provide sufficient length for the solderless wrapped connection.

(5) Rerun the new length of wire through the back of the connector mounting bracket and to the test terminal.

(6) Reconnect the wire conductor to the corresponding test terminal.

(7) Replace the test field cover as directed in paragraph 5.01, Steps (3) and (4).

## **7. TESTING**

### **PROTECTOR UNITS**

**7.01** The 3-, 4-, and 5-type protector units are used with the 305-type connectors. The protector units are ordered separately from the connectors. The 3-, 4-, and 5-type protector units are described in Practice 201-208-100.

**7.02** All standard plug-in protector units are equipped with four gold-plated tip and ring pins and a solder-plated ground pin.

**7.03** Protector units with gold-plated pins should be used with connectors containing gold-plated socket terminals (i.e., all current protector unit and connector codes). Protector units with gold-plated or solder-plated pins can be used in vintage connectors containing solder-plated socket terminals.

**Caution:** *Protector units with solder-plated pins should not be used on connectors with gold-plated socket terminals. This combination of plating and contact surfaces results in higher contact resistance, and surface degradation of gold-plated socket terminals.*

7.04 Before installing the 3-, 4-, or 5-type protector units onto the connectors, each unit may be tested. The KS-20100, L5 test set (Figure 12) is used to test for the presence or absence of tip and ring continuity and ground and also provides a burnout feature to clear protector units shorted by carbon or dust particles. The 182A test set (Figure 13) is used to test the minibridge lifter protector units for tip and ring continuity and for shorted protector blocks. It also tests

the function of the 410A switch contained in the protector unit. For test procedures, see AT&T 201-208-100.

**Note:** The jacks (receptacles) for the protector units in the 303-, 305-, 307-, 309-, 310-, 310M-, and 311-connectors have reversed tip and ring orientation from the 302- and 308-type connectors (see Figure 14 and 15).

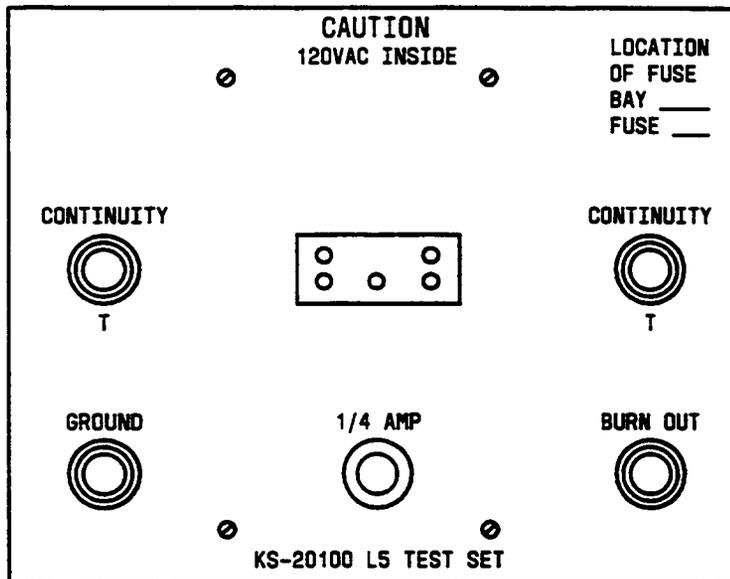


Figure 12—KS-20100, L5 Test Set

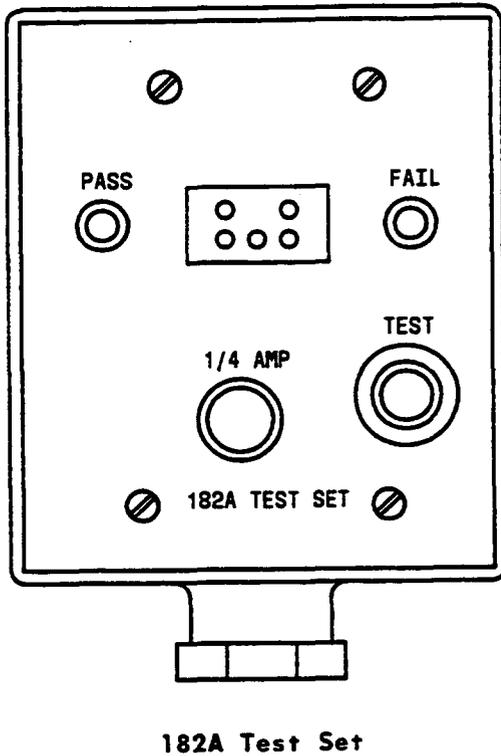


Figure 13—182A Test Set

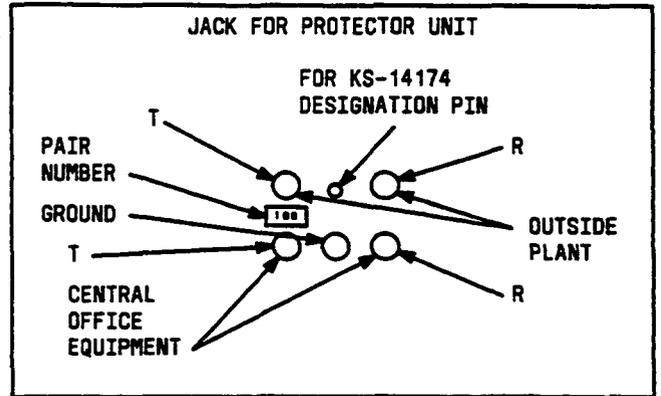


Figure 14—Jack For Protector Unit on 302- and 308-Type Connectors

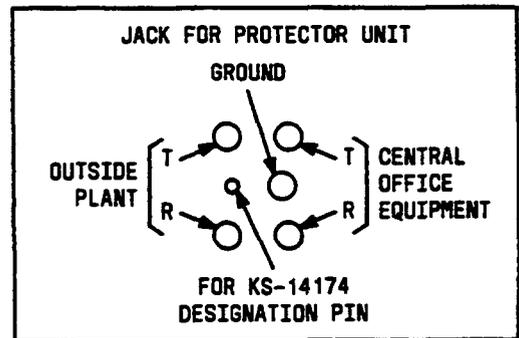


Figure 15—Jack For Protector Unit on 303-, 305-, 307-, 309-, 310-, 310M-, and 311-Type Connectors

**TEST CONNECTORS, CORDS, PLUGS, WARNING MARKERS, GUARDS, INSULATORS, AND INDICATORS**

**7.05** The M (multiple pair) and N (single pair) test connectors and cords and plugs may be used with the 305-type connectors for testing purposes. Warning markers, guards, insulators, and indicators are used on special service circuits to provide

additional visibility and protection. See AT&T 201-208-106 for description and use of these items.

**7.06** The 16-inch long P2EF test cord (Figure 16) is available for shorting tip and ring, and grounding the tip and/or ring of an individual cable pair at the test terminal field. The plug of the P2EF cord is pressed into the holes containing a pair of recessed test terminals.

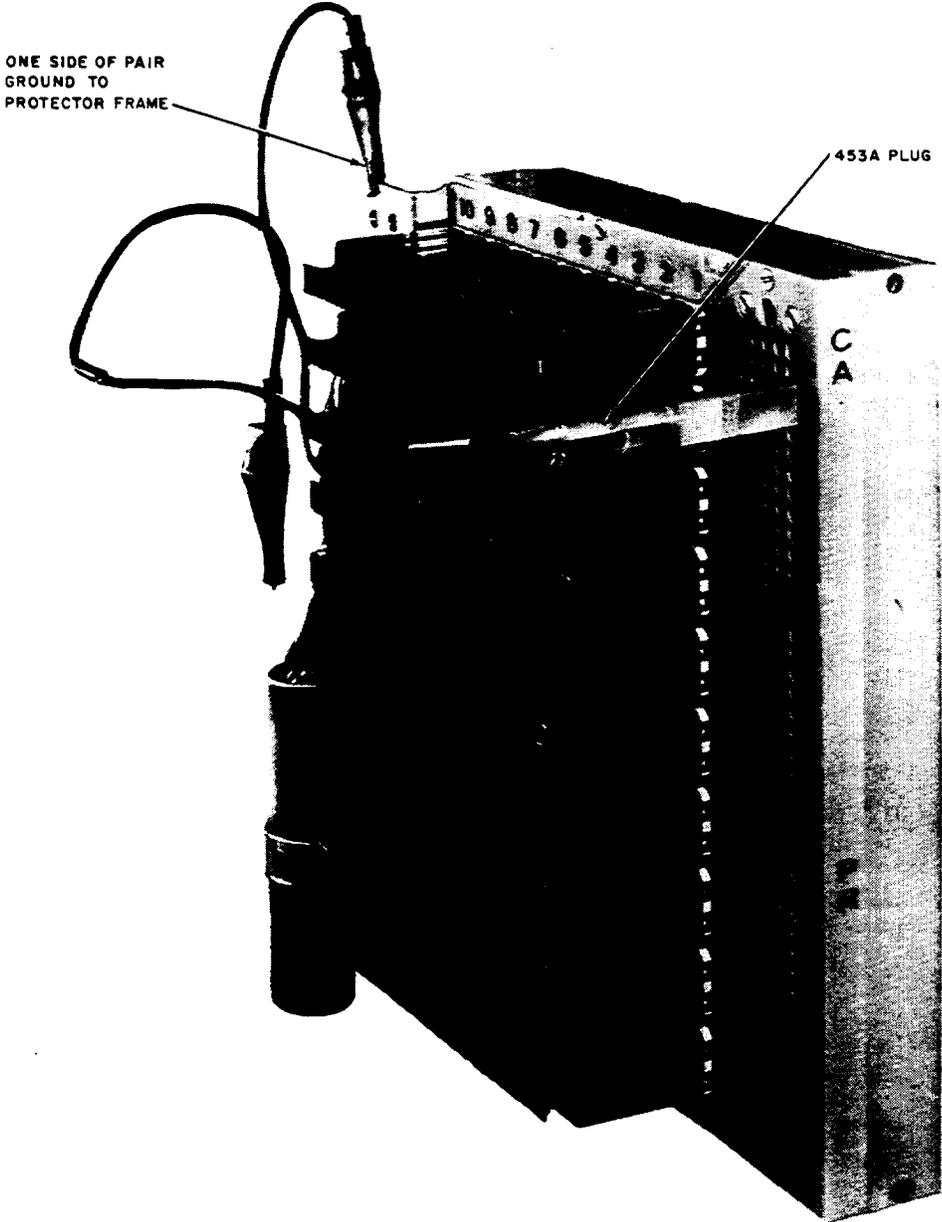


Figure 16—P2EF Test Cord for Testing Individual Pairs

**Caution:** *The P2EF test cord is designed to support only its own weight. Do not use it as an adapter cord for access to the test terminal field.*

**7.07 M Test Connector (AT-8823):** A 100-pair test shoe (Figure 17) is intended for making multiple pair cable tests.

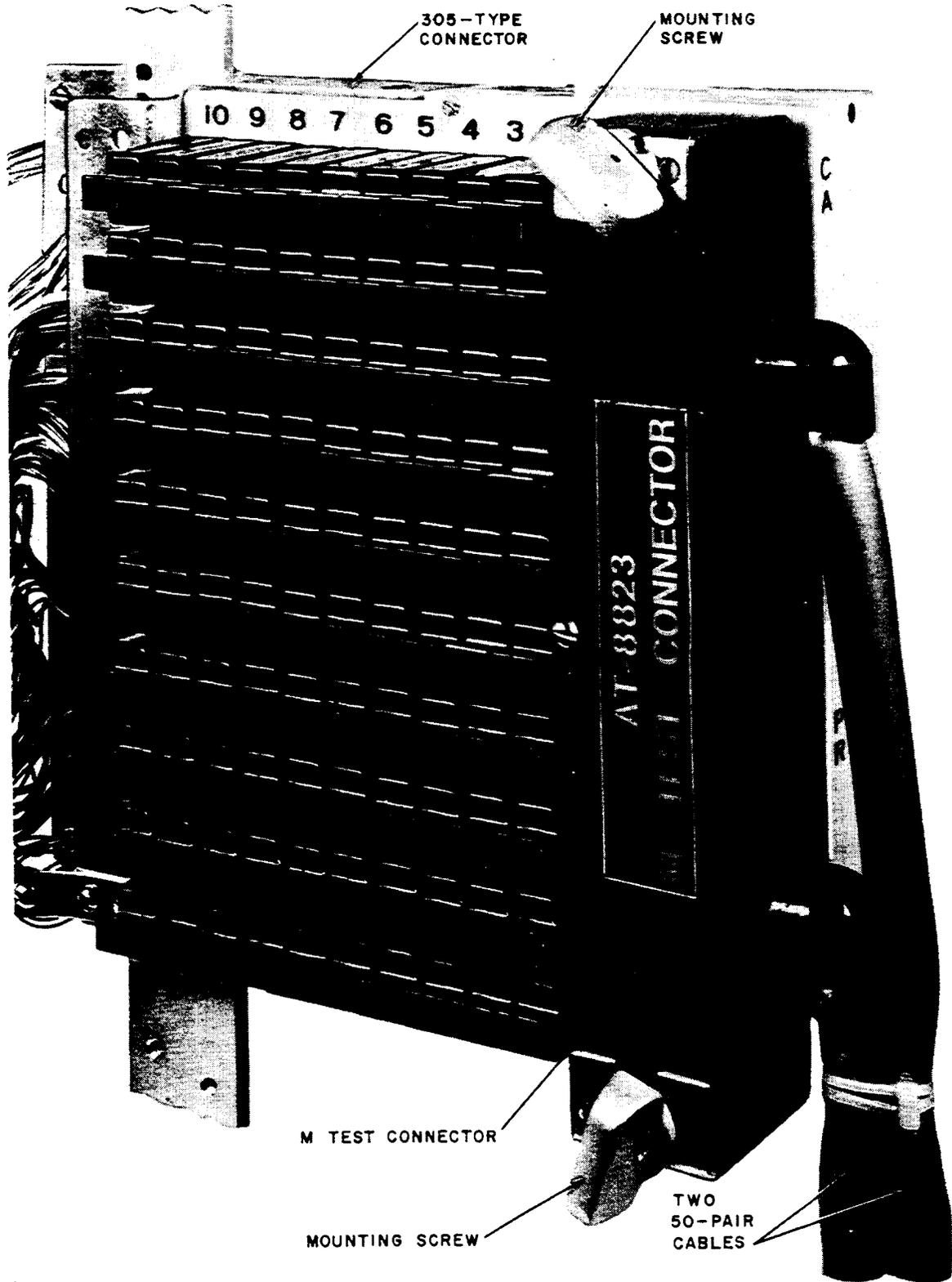
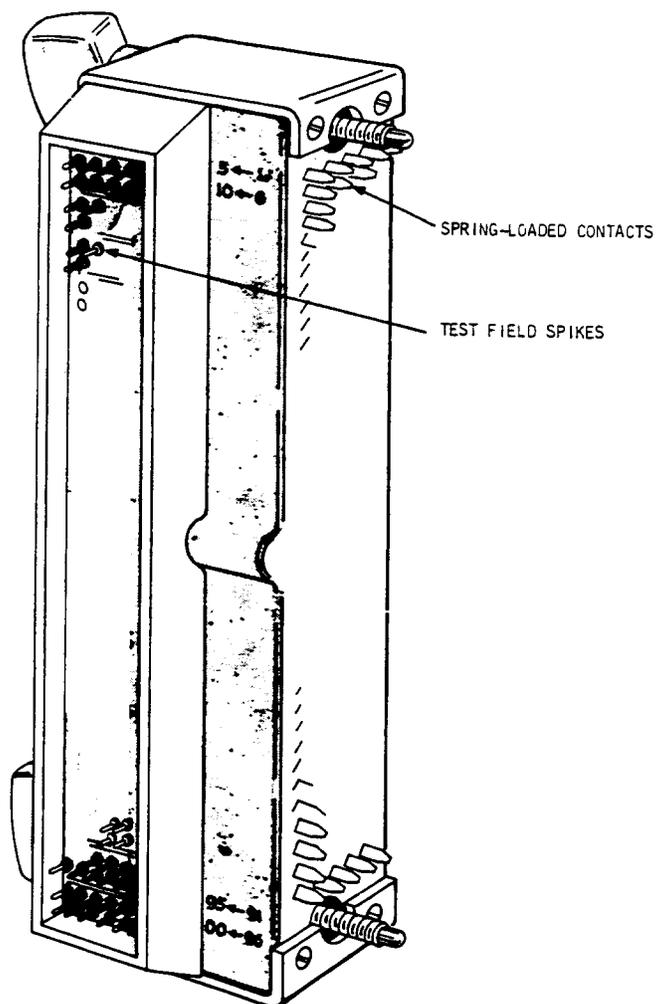


Figure 17—M Test Connector (AT-8823) Mounted on a 305-Type Connector

**7.08 N Test Connector (AT-8882):** A 100-pair test shoe (Figure 18) is intended for checking one cable pair at a time.



**Figure 18—N Test Connector (AT-8882)**

**8. ASSOCIATED EQUIPMENT AND REFERENCES****ASSOCIATED EQUIPMENT**

3-, 4-, and 5-Type Protector Units  
 Mounting Bracket (Comcode 842354136), used for tall frames only.  
 Cross-Connect Terminal Guard (Comcode 842556504), replacement for earlier sliding guard.

**Test Equipment (AT&T 201-208-106)**

M Test Connector (AT-8823) (Comcode 401788807)  
 N Test Connector (AT-8882) (Comcode 401927090)  
 P2DB Test Cord (Comcode 101433852)  
 P2EF Test Cord (Comcode 102808581)  
 W2FH Test Cord (Comcode 101616399)  
 W2FM Test Cord (Comcode 101616449)  
 W2GL Test Cord (Comcode 101945590)  
 W2GM Test Cord (Comcode 102490935)  
 W4CJ Test Cord (Comcode 101898633)  
 W4CM Test Cord (Comcode 101981603)

**Warning Markers, Guard, Indicators, and Insulators (Practice 201-208-106)**

E Warning Marker (Comcode 400614202)  
 E Sign (Comcode 400359196)  
 KS-19478 Guard (Comcode 997161617)  
 KS-6660 Indicator (Comcode 996687239)  
 KS-16847 Indicator (Comcode 997726088)  
 KS-16604 Insulator (Comcode 401299474)  
 KS-21168 Insulator (Comcode 401206180)

**REFERENCES**

<b>PRACTICE</b>	<b>TITLE</b>
069-132-811	Punched or Wire-Type Terminations (Not Having Notches or Perforations)—Method of Making and Removing Wrapped Connections

**PRACTICE****TITLE**

069-140-811	Soldered Connections—Using Soldering Coppers—Method of Making and Removing
081-860-105	Transfer Stenciling Kits — Description and Use
106-315-119	Multiple Pair Test Connectors for 302- and 303-Type Connectors
201-208-100	3-, 4-, and 5-Type Protector Units—Description, Use, Maintenance, and Test Procedures
201-208-103	Tools and Aids — Distributing and Protector Frames
201-208-106	Test Equipment, Cords, Plugs, Warning Markers, Guards, Insulators, and Indicators—Description and Use
201-220-101	Conventional Distributing Frames — Description
201-220-301	Terminal Strips — Method of Making Connections
201-220-501	Conventional Distributing Frames — Inspections
201-220-801	Terminal Strips — Repair Procedures
636-200-011	Marking Main Frames — Pair and Cable Numbers
916-559-770	Cable Terminating Facilities — Central Office Type — General

**9. ISSUING ORGANIZATION**

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