

SUBSCRIBER LOOP CARRIER (SLC*96)
36A REMOTE TERMINAL CABINET
PLACEMENT

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SECTION 640-250-220

1. GENERAL

1.01 This section describes placement, by construction forces, of the 36A remote terminal (RT) cabinet, the installation of the associated cable stub, and the electrical power requirements and arrangements at the RT location.

1.02 When this section is reissued, the reason for reissue will be listed in this paragraph.

2. REMOTE TERMINAL PLACEMENT

A. Mounting Arrangements For Remote Terminal

2.01 This section provides recommended methods of placing cabinets; however, variations to these methods may be employed. The RT cabinet(s) may be mounted on a pole not smaller than a class 5 stub pole, class 5 pole on an H-fixture, or on a 38-Y-4055 concrete pad when used with an AT-8812B pedestal base. The cabinet comes equipped with a channel hanger for mounting directly to a pole (one per pole). The metal crossarms shown in Fig. 1 are designed for single or multiple RT installations. The metal crossarms consist of

predrilled metal box beams shipped with installation instructions. **The use of wooden crossarms for supporting the weight of RT cabinets is not recommended.** However, where a second pole-mounted cabinet is to be installed, place a wooden crossmember between the poles to facilitate attaching cables.

2.02 The AT-8783B metal crossarm is designed to accommodate the weight of a single RT cabinet installation and should be used only when growth beyond its capacity is not anticipated. The AT-8783C metal crossarm is designed to support the weight of up to three cabinets. Wooden crossmembers are used at the lower position in these installations to keep the cabinet(s) from swinging and to facilitate cable attachments. No more than three RT cabinets may be mounted on one H fixture.

2.03 Engineering work prints will show the mounting arrangements to be used, the locations of any concrete pad pole or H fixture existing or that must be placed, and the stub cable arrangement required to connect the aerial, buried, or underground cable.

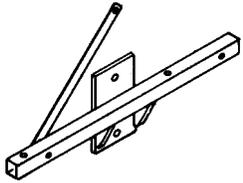
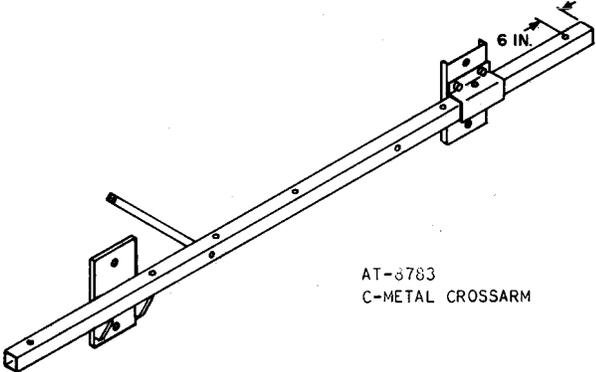
METAL CROSSARMS FOR SLC-96 REMOTE TERMINAL LOCATIONS		
CROSSARM	CONSISTING OF	USE
 <p>AT-8783 B-METAL CROSSARM</p>	<p>(1) 56 INCH METAL CROSSARM INCLUDING WELDED MOUNTING BRACKET</p> <p>(1) CROSSARM BRACE</p>	SINGLE RT CABINET INSTALLATION.
 <p>AT-8783 C-METAL CROSSARM</p>	<p>(1) 144 INCH METAL CROSSARM INCLUDING WELDED MOUNTING BRACKET</p> <p>(1) 30 INCH CROSSARM BRACE</p> <p>(1) ADJUSTABLE CHANNEL MOUNTING BRACKET</p>	ONE TO THREE RT CABINET INSTALLATIONS.

Fig. 1—Metal Crossarms

2.04 Stub cables entering the ground must be protected by a flexible or standard galvanized 4-inch pipe or U guard. This protection must be long enough to reach a minimum of 12 inches below the groundline or can be extended to a manhole, splice pit, cable closure, or pole.

2.05 The RT cabinet should be mounted so the bottom of the cabinet is 20 inches above grade or platform when pole mounted.

2.06 The engineering work prints will specify the location of stub cable pairs to be terminated in the interconnection closure. The interconnection closure and RT cabinet must be mounted so the stub cable, to be placed between the two, will not exceed 40 feet.

3. PEDESTAL INSTALLATION

3.01 The following materials are required for a pedestal installation:

- (1) Concrete pad (38-Y-4055)
- (2) AT-8812B pedestal base
- (3) Stub cable
- (4) No. 6 ground wire and D ground rod
- (5) Four-inch flexible conduit (if required).

3.02 Placement of the cabinet, the interconnection closure, and power meter arrangements are as follows:

- (a) Place the 36A cabinet to the left of the interconnection closure.
- (b) Mount the power company meter on the nearest power company pole or on a meter pedestal such as a Superior model WMP-221-11-BRA (Bell System gray-green). Either place the meter pedestal near the cabinet or an appropriate distance away from the cabinet for site esthetic reasons.

3.03 A 36A cabinet installation using the AT-8812B pedestal and 38-Y-4055 concrete pad is shown in Fig. 2. Dimensions of an open 36A cabinet are shown in Fig. 3, and the minimum distances between 36A cabinets are shown in Fig. 4.

3.04 Dig a trench 24 inches deep with minimum width for the stub cable conduit and power cable conduit as shown in Fig. 5. Place the 4-inch conduit (if required) to the interconnection closure, leaving 9 inches of conduit above the pad. If flexible power conduit is required, feed the conduit through the trench and leave 50 inches exposed above the pad. **Do not fill the trench.** Level the area for the concrete pad and, if a subbase is required, place gravel or locally approved equivalent on the leveled area. Exercise care when handling the concrete pad to avoid injury to either the employee or the pad.

3.05 Position the concrete pad directly over the trench as shown in Fig. 5. Drive a D ground rod through the rectangular hole leaving a minimum of 6 inches exposed above the top of the concrete pad. Proceed to paragraph 6.01.

4. REMOTE TERMINAL INSTALLATIONS WITH CHANNEL HANGERS

A. Single Remote Terminal Placement

4.01 The following materials **are required** for a single RT installation using channel hangers:

- (1) Two metal pole gains
- (2) Two 5/8-inch suspension bolts, washers, and nuts
- (3) A 2-1/2 by 10-inch predrilled metal channel hanger supplied with the RT cabinet
- (4) Two 3/8- by 4-inch lag bolts
- (5) Stub cable.

The following materials **may be required** for a single RT installation using channel hangers:

- (1) Four 1/2- by 6-inch bolts (13 threads to the inch), washers, and nuts for wood supports
- (2) One 2- by 4- by 60-inch treated wood support
- (3) One 2- by 8- by 60-inch treated wood support
- (4) Wooden crossarms and hardware to build a 72-inch wide crossarm fixture
- (5) Materials, if desired, for a 72- by 56-inch platform or for a 30- by 60-inch and 30- by 30-inch platforms.

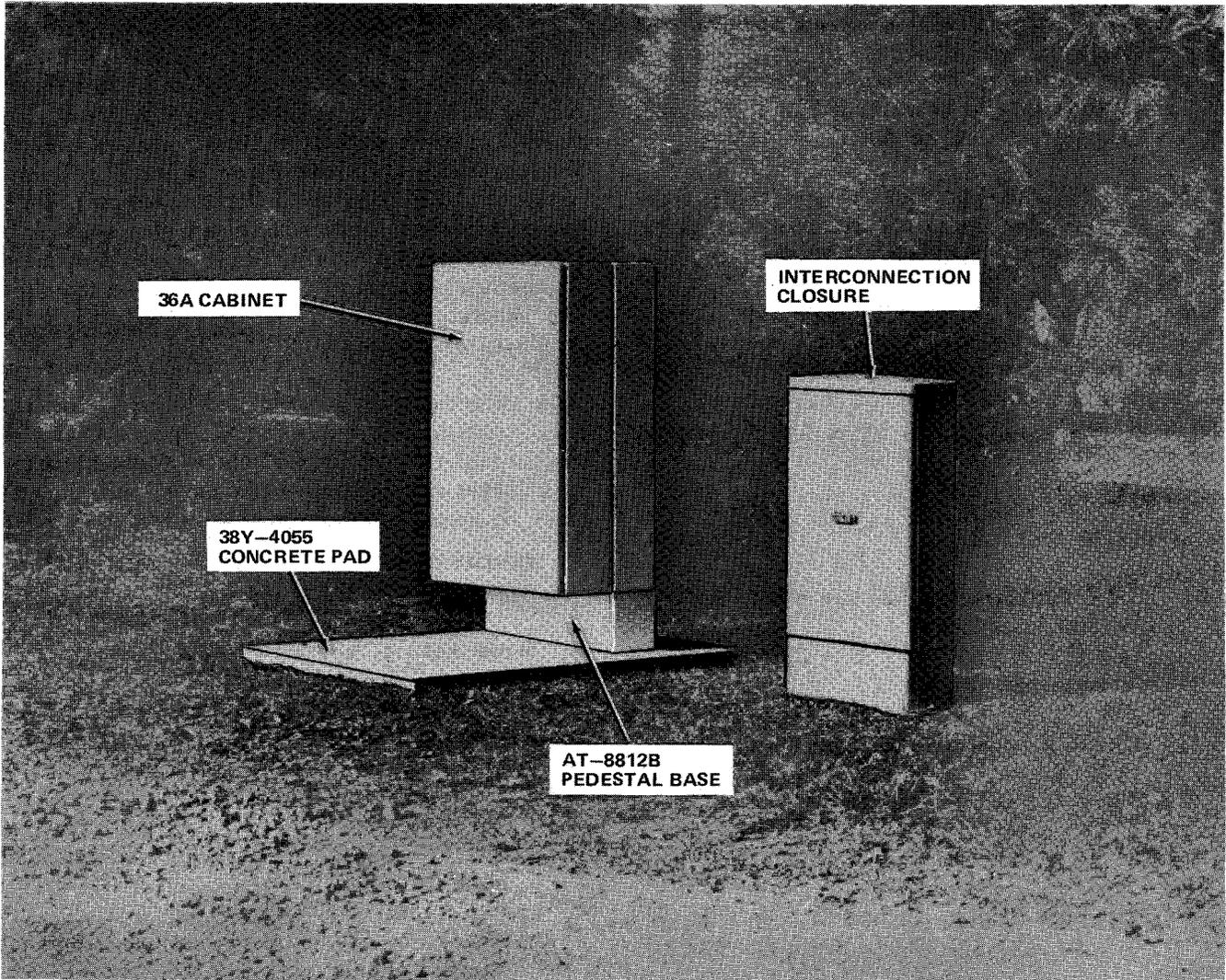


Fig. 2—Pedestal Mounted 36A Cabinet

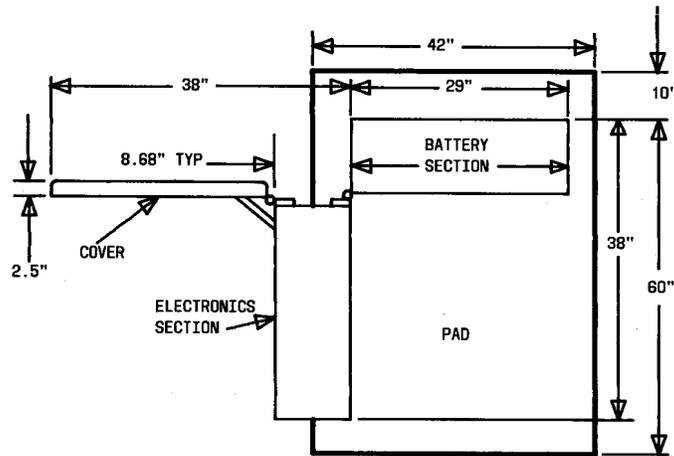


Fig. 3—Dimensions of an Open 36A Cabinet

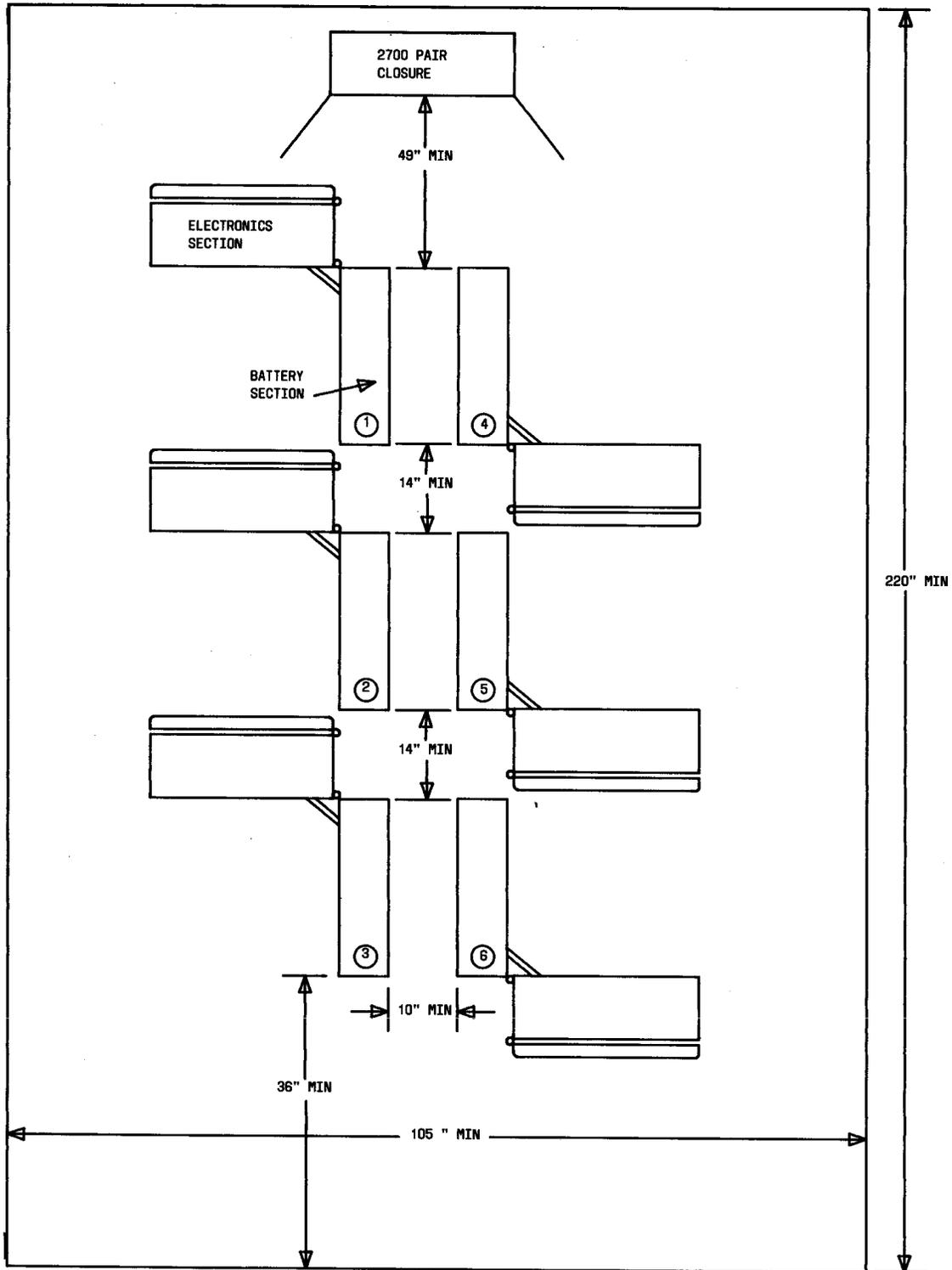


Fig. 4—Minimum Distance Between 36A Cabinet

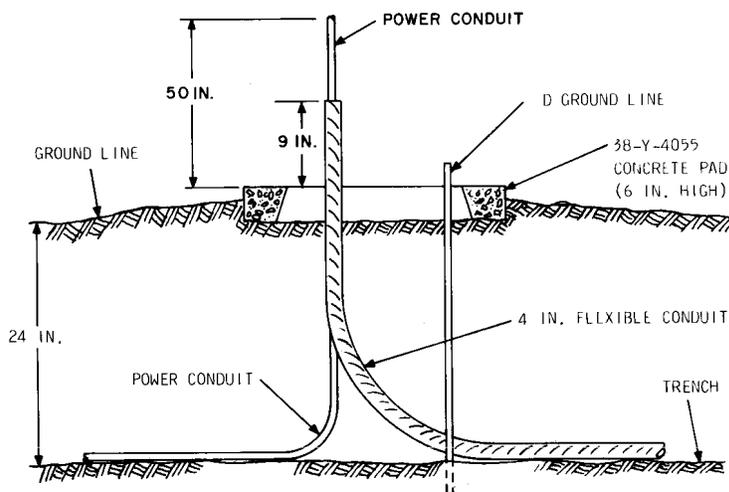
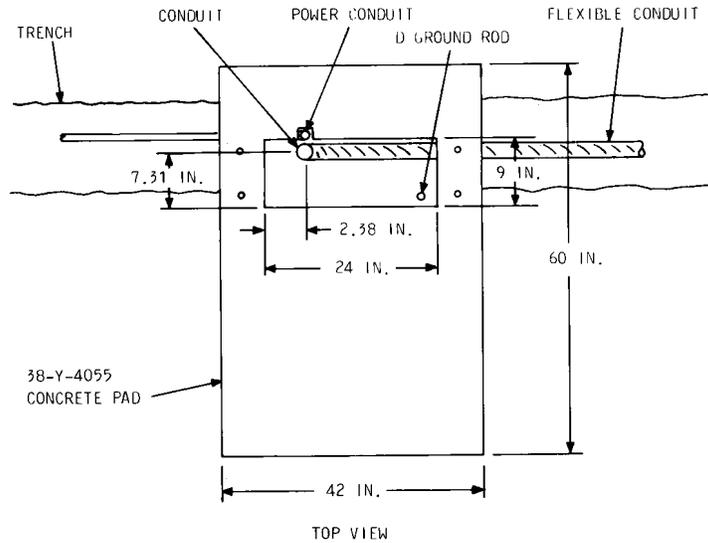


Fig. 5—Trenching Dimensions For Concrete Pad

4.02 Placement of the RT cabinet, the interconnection closure, and the power meter arrangements are as follows:

- (a) If a suitable existing pole is not available, set a 12-foot, class 5 stub pole five feet in the ground. Mount the RT cabinet on the front, the power meter on the side, and, if required,

the interconnection closure (40-type or equivalent) on the rear.

- (b) If an existing class 5 (or larger) pole exists at the site and climbing space is not a factor, mount the RT cabinet on the front, the power meter on the side, and, if required, the interconnection closure on the rear of the pole.

(c) If climbing space must be maintained where a class 5 or larger pole is used, mount the RT cabinet, power meter, and interconnection closure in an arrangement as shown in Fig. 6

or 7. The upper crossarm in Fig. 6 does not support the weight of the cabinet. The angle brackets shown in Fig. 7 are supplied with the RT cabinet.

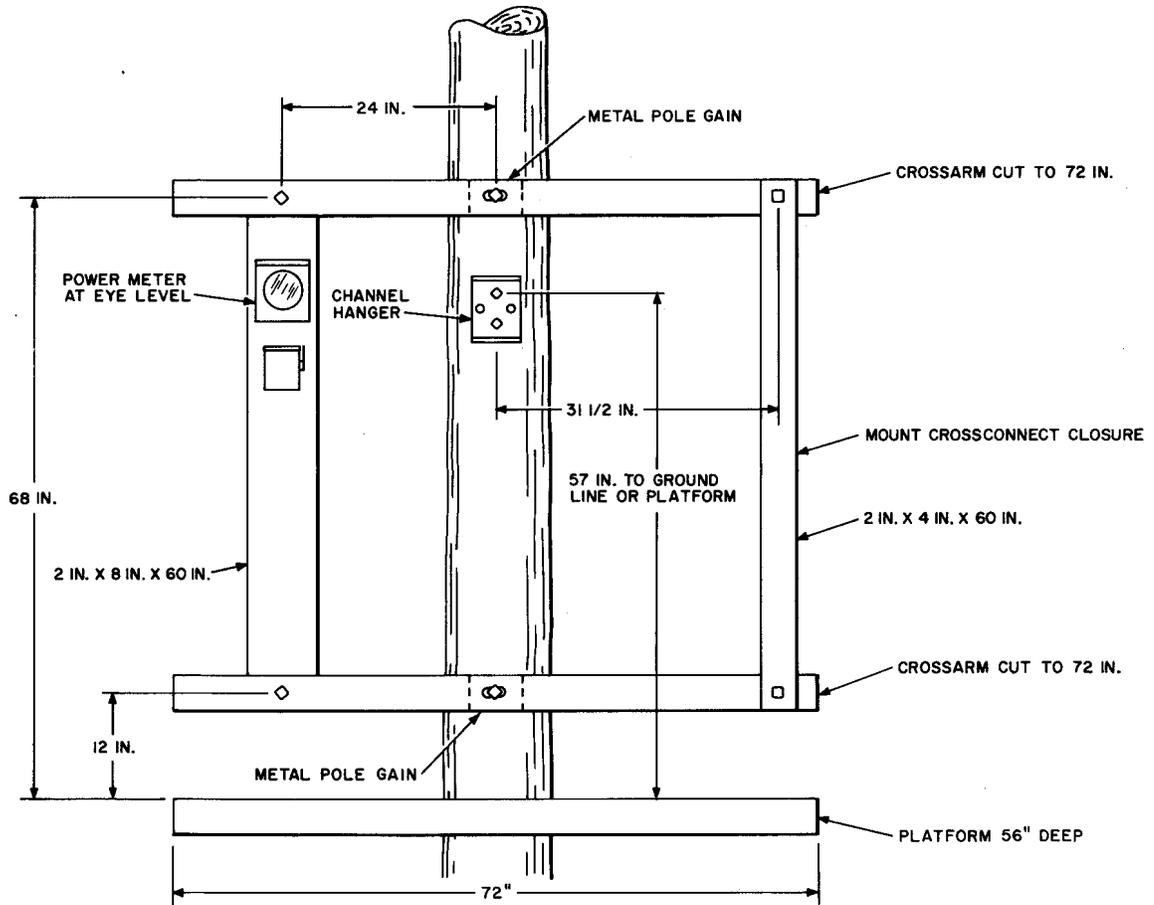


Fig. 6—Single Cabinet Installation When Climbing Space is a Factor

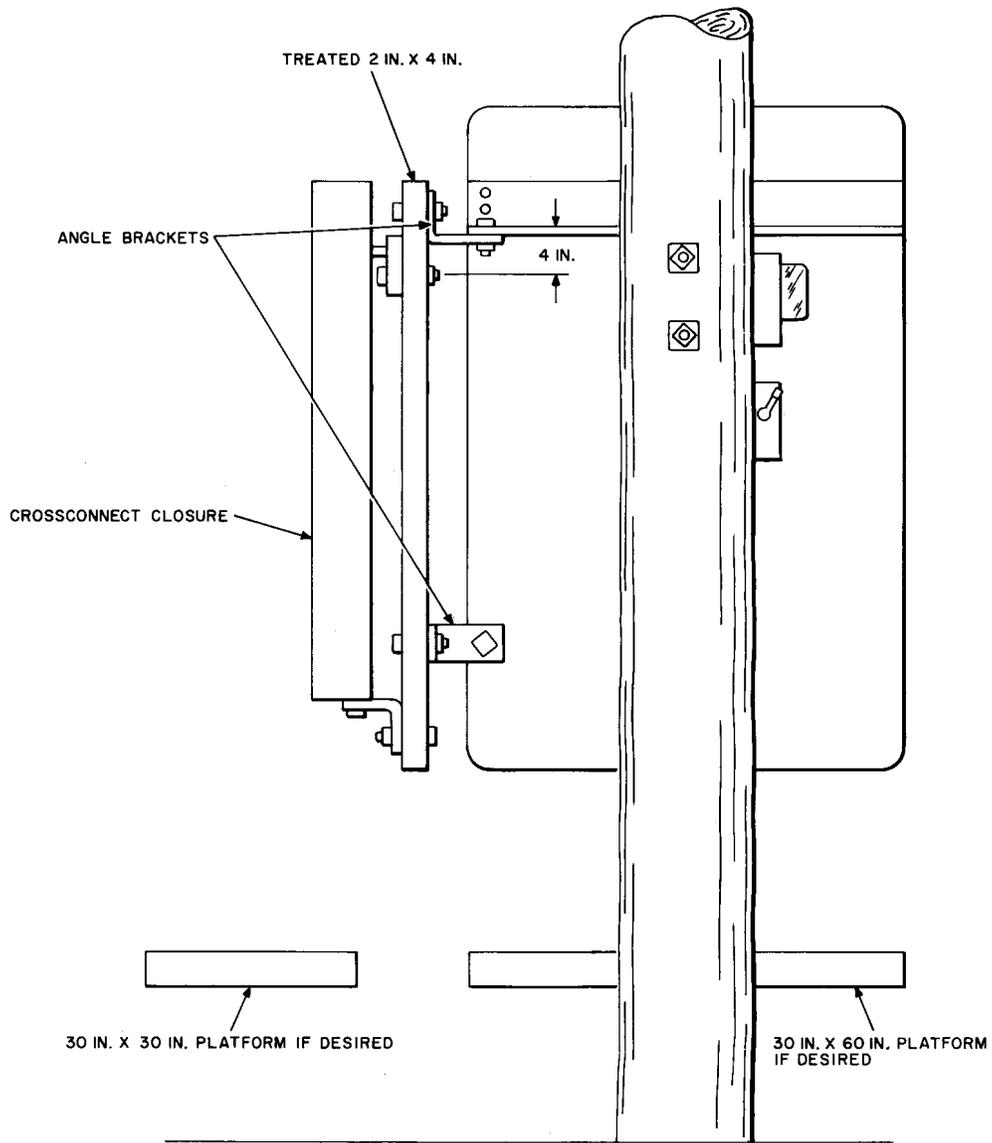


Fig. 7—Alternate Method of Single Cabinet Installation When Climbing Space is a Factor

4.03 A 72- by 56-inch platform, if specified, as used with the installation shown in Fig. 6 should be built 3 inches out from the pole. In the case of the installation shown in Fig. 7, the 60- by 30-inch platform (if specified) should also be built 3 inches out from the pole. The 30- by 30-inch platform is constructed so that it is partially under the interconnection closure.

4.04 Bore 11/16-inch holes in the pole as illustrated in Fig. 8. Position the channel hanger so that the 1/2-inch threaded holes are facing upward; then, using the metal pole gains, bolt the hanger to the pole. Proceed to paragraph 6.01.

B. Multiple Remote Terminal Placement

4.05 The following materials *are required* for a multiple installation of RT cabinets using channel hangers:

- (1) Two metal pole gains for each RT cabinet
- (2) Two 5/8-inch suspension bolts, washers, and nuts for each RT cabinet
- (3) One 2-1/2 by 10-inch predrilled metal channel hanger for each cabinet (supplied with cabinet)

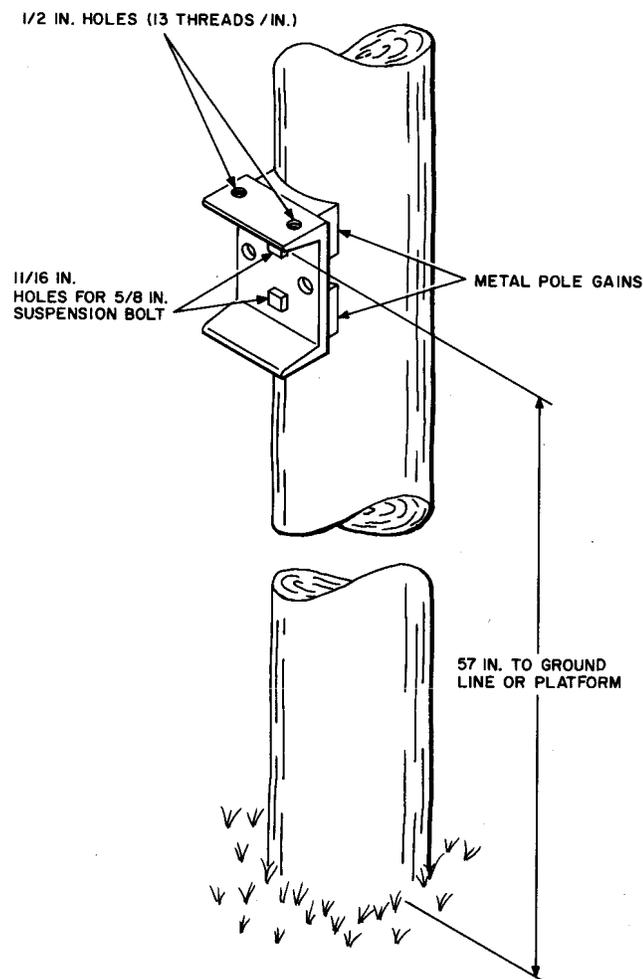


Fig. 8—Channel Hanger Installation

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- (4) Two 3/8- by 3-inch lag bolts for each RT cabinet
- (5) Stub cable.

- (5) Materials for a 54- by 100-inch or a 54- by 144-inch platform.

The following materials *may be required* for a multiple RT cabinet installation using channel hangers:

- (1) Four 1/2- by 6-inch (13 threads to the inch) bolts, washers, and nuts for mounting the wood supports
- (2) One 2- by 4- by 60-inch treated wood support
- (3) One 2- by 8- by 60-inch treated wood support
- (4) Wooden crossarms and hardware to build a 100-inch wide or a 144-inch wide H-fixture for a two- or three-cabinet installation, respectively.

4.06 Poles or stub poles that are required for either aerial or buried cable installations should be class 5 or equivalent and should be placed in line.

4.07 A platform, if specified, should be built 3 inches out from the pole.

4.08 For the aerial application, build the H-fixture and mount the wooden supports as shown in Fig. 9. Mount the channel hangers as illustrated in Fig. 8 and in paragraph 4.04. The upper crossarm in Fig. 9 does not support any cabinet weight. Proceed to paragraph 6.01.

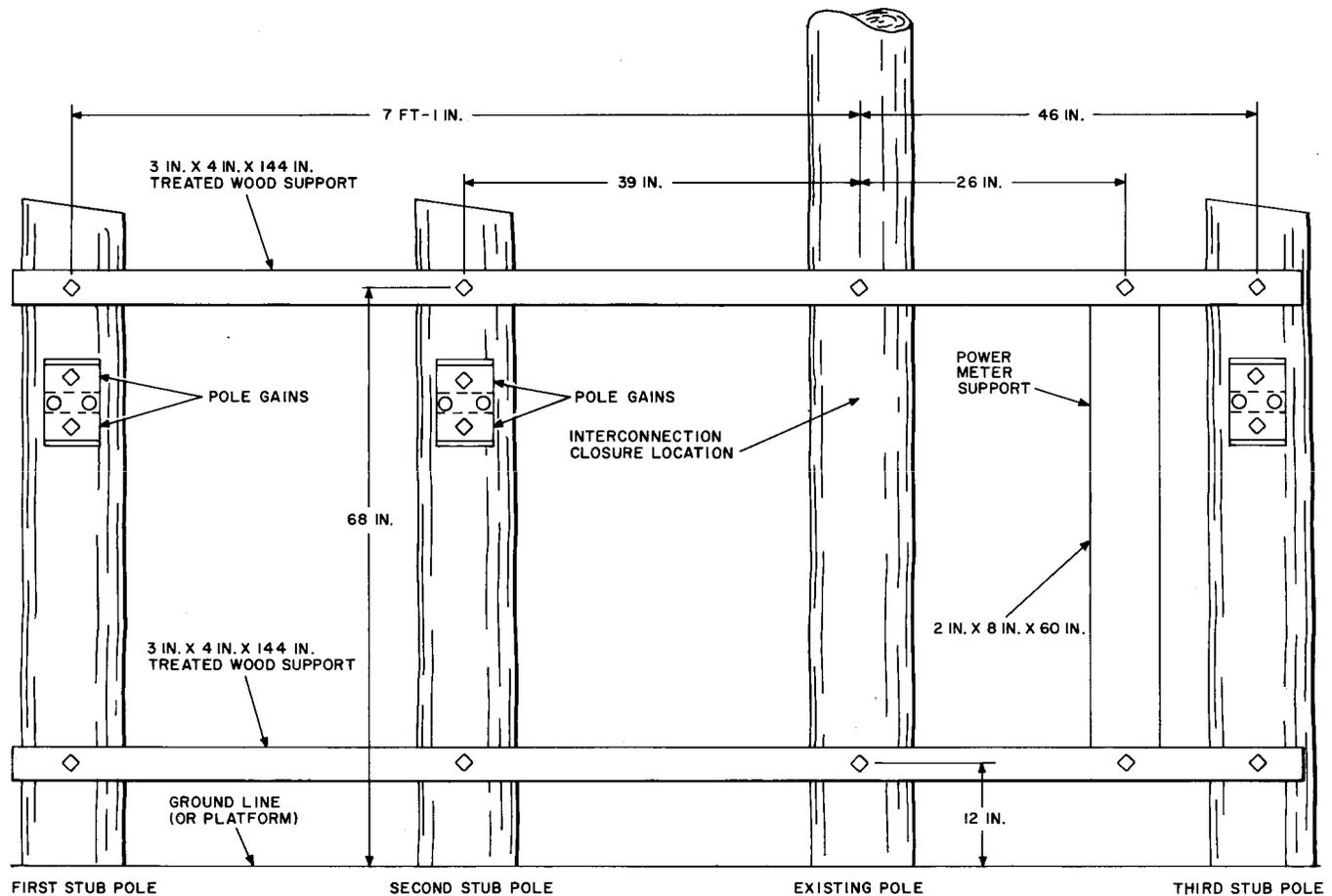


Fig. 9—Multiple RT Cabinet Installation With Channel Hangers

5. REMOTE TERMINAL INSTALLATIONS USING METAL CROSSARMS

A. Single Remote Terminal Installation

5.01 The following materials *are required* for a single RT installation using the AT-8783B metal crossarm:

- (1) One AT-8783B metal crossarm
- (2) Two 3/4-inch suspension bolts, washers, and nuts
- (3) Two 5/8-inch suspension bolts, washers, and nuts
- (4) Three metal pole gains
- (5) One 2- by 4- by 40-inch treated wood support
- (6) One 3- by 4- by 56-inch treated wood support
- (7) Two crossarm braces
- (8) Associated hardware for attaching braces to wooden crossmembers and poles
- (9) Stub cable.

5.02 If an existing pole is not available, set a class 5, 12-foot stub pole five feet deep.

5.03 A 54- by 56-inch platform, if specified, should be built three inches out from the pole.

5.04 Bore 11/16-inch and 13/16-inch holes in the pole for attaching the crossarms as shown in Fig. 10. The top crossarm may be used as a template for locating the 13/16-inch holes if the crossarm is held level. Ensure that all three holes are drilled perpendicular to the face of the pole.

5.05 Place the top metal crossarm on the pole. Ensure that the two metal pole gains are used behind the support bracket. Use the carpenter's level to keep the crossarm level as the nuts are tightened. Use a 3/4-inch suspension bolt and two pole gains per Fig. 10.

5.06 Place the bottom wood support on the pole using a 5/8-inch suspension bolt. Use a metal pole gain between the support and the pole. Use washers under the nuts. Adjust the metal

pole gain so the bottom crossarm is directly under the top crossarm when the nut is tightened.

5.07 Attach the crossarm braces to the crossarms using the hole marked "brace" in the case of the top crossarm. The braces must be attached to the side of the crossarm nearest the pole as shown in Fig. 10. Tighten all bolts and nuts.

5.08 Attach the crossarm braces to the pole as shown in Fig. 10, keeping the crossarms level. Attach the top crossarm brace to the front of the pole using a 5/8-inch suspension bolt. Attach the bottom crossarm braces to the rear of the pole using driverscrews.

5.09 Using the holes indicated on the crossarms, mount a 2- by 4- by 40-inch wooden support to span the distance between crossarms. The 2 by 4 is required for mounting a 40-type cabinet (interconnection closure) as shown in Fig. 10. Proceed to paragraph 6.01.

B. Multiple Remote Terminal Placement

5.10 The following materials *are required* for the multiple RT installation using the AT-8783C metal crossarm:

- (1) One AT-8783C metal crossarm
- (2) One 3- by 4- by 144-inch treated wood support
- (3) Three 5/8-inch suspension bolts
- (4) Four 3/4-inch suspension bolts
- (5) One 2- by 4- by 40-inch treated wood support
- (6) Two metal pole gains
- (7) Stub cable.

5.11 Set two 12-foot, class 5 stub poles 5 feet deep and on 7-foot 5-inch centers as shown in Fig. 11. A 54- by 144-inch platform, if specified, should be built 3 inches out from the pole.

5.12 Mount the crossarms as shown in Fig. 11 using two pole gains behind the welded support bracket of the metal crossarm. Ensure the side of the crossarm marked "this side up" is in the proper position. Adjust the position of the crossarm, if required, by sliding the mounting bracket to the proper position.

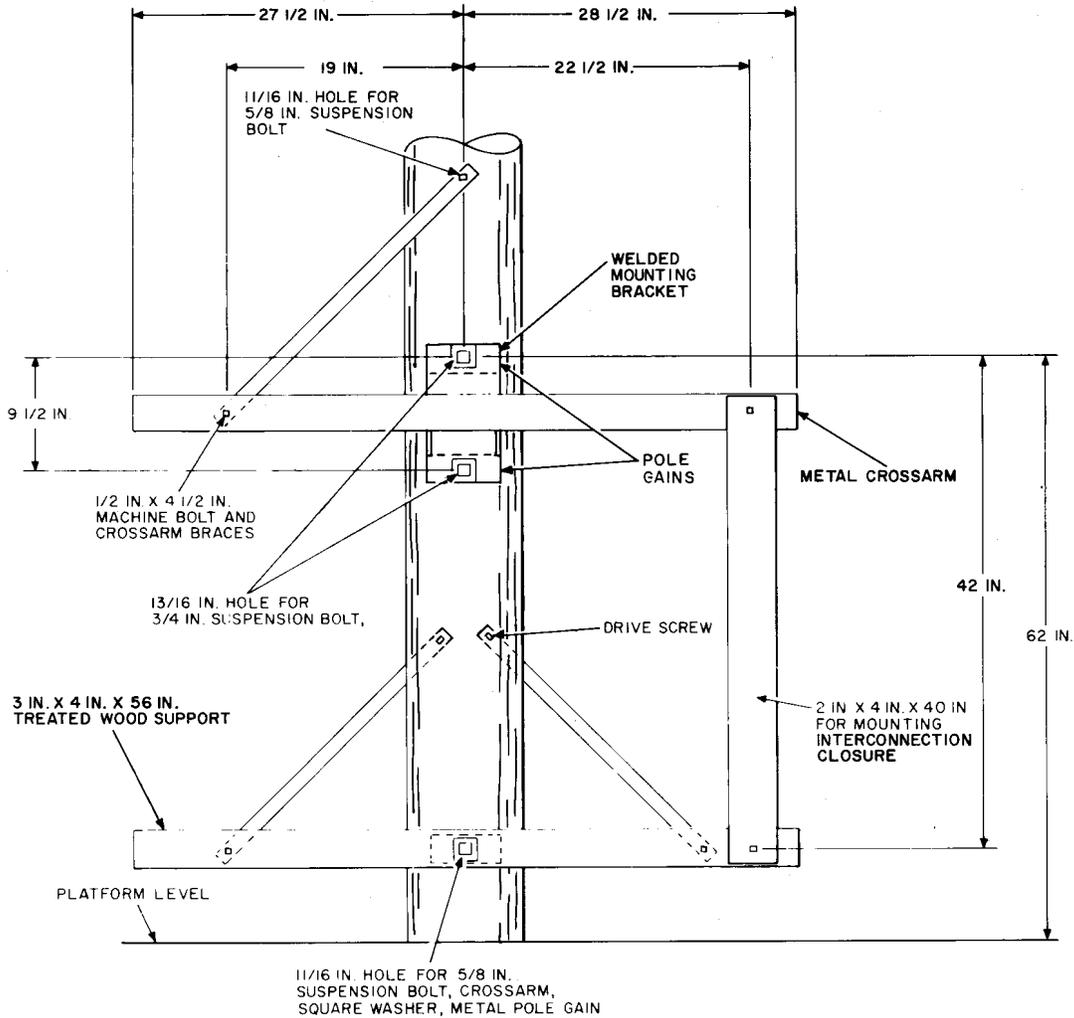


Fig. 10—AT-8783B Metal Crossarm For Mounting One RT Cabinet

5.13 Attach the crossarm brace as shown in Fig. 11 and as described in paragraphs 5.07 and 5.08.

5.14 Mount a 2- by 4- by 40-inch wooden support to span the distance between the crossarms for the interconnection closure as shown in Fig. 11.

6. HANDLING AND MOUNTING OF 36A CABINET

A. All Installations

6.01 Exercise care when handling the RT to avoid scratches and dents.

6.02 The crated cabinet should be delivered to the installation site and placed upright in a convenient location.

6.03 Remove the front and rear sides of the shipping crate first. Next, remove the top and left and right sides. The cabinet will then be resting on a wooden frame.

6.04 Attach a wire rope to the lifting eyes on the cabinet. Attach the wire rope to the derrick and lift the cabinet.

B. At Pedestal Installations

6.05 Remove the mounting angle and mounting brackets from the back and bottom of the cabinet.

6.06 Remove the 1/2-13UNC-2AX1-1/4 cap screws from the bottom corners of the cabinet and, using the cap screws, attach the AT-8812B pedestal

base legs to the bottom of the cabinet (Fig. 12). Ensure that the slotted keyways in the pedestal legs face toward the front of the cabinet.

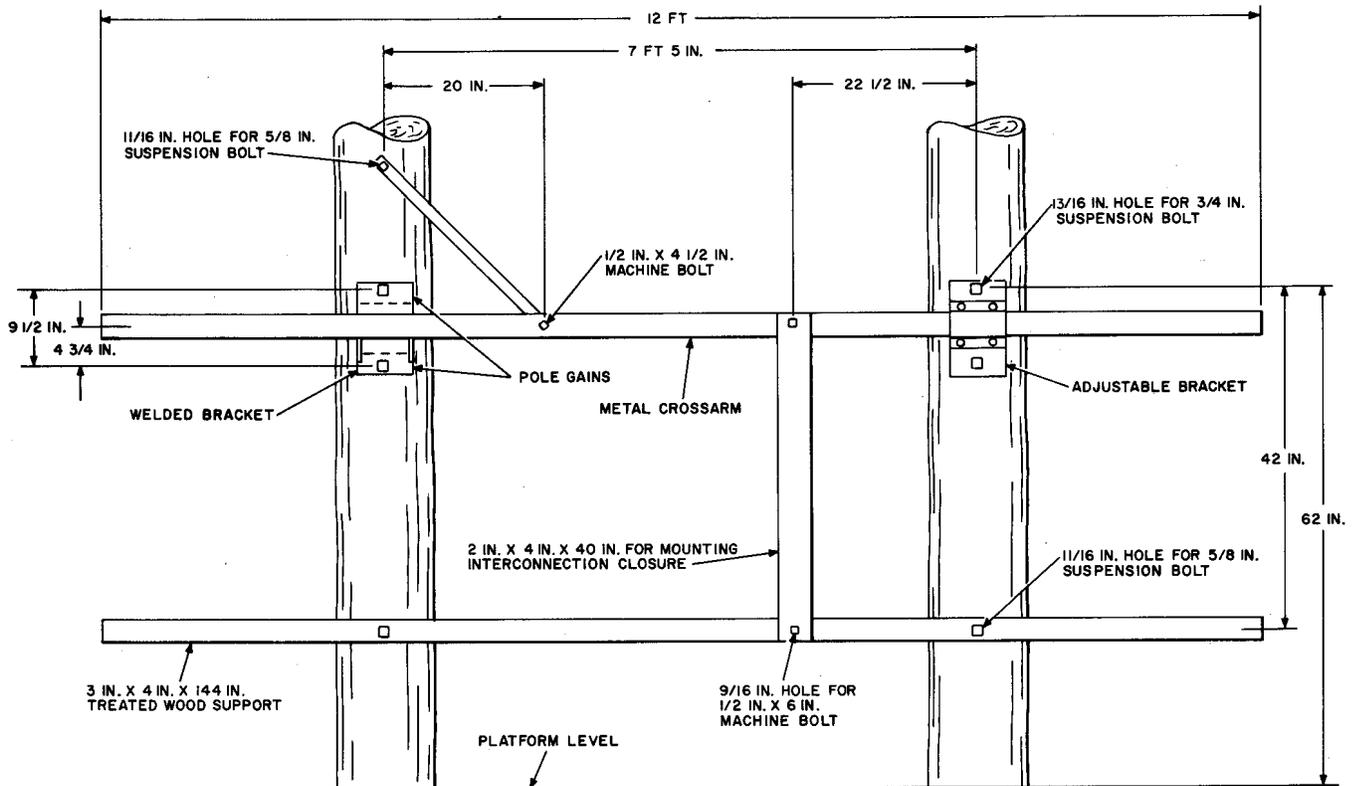


Fig. 11—AT-8783C Metal Crossarm Mounted For Three RT Cabinets

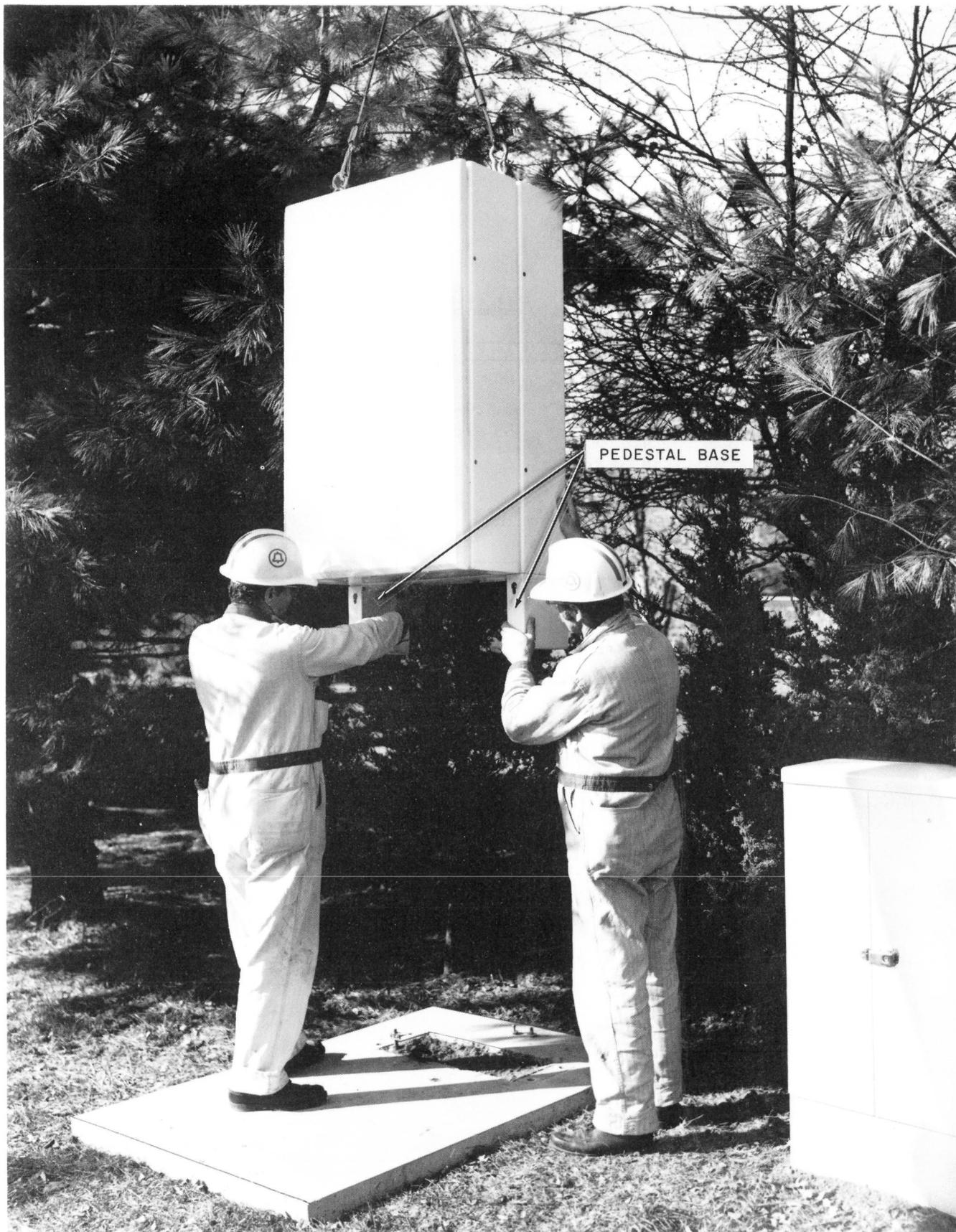


Fig. 12—Pedestal Base Attached to Cabinet

- 6.07** Position the cabinet on the concrete pad as shown in Fig. 13.

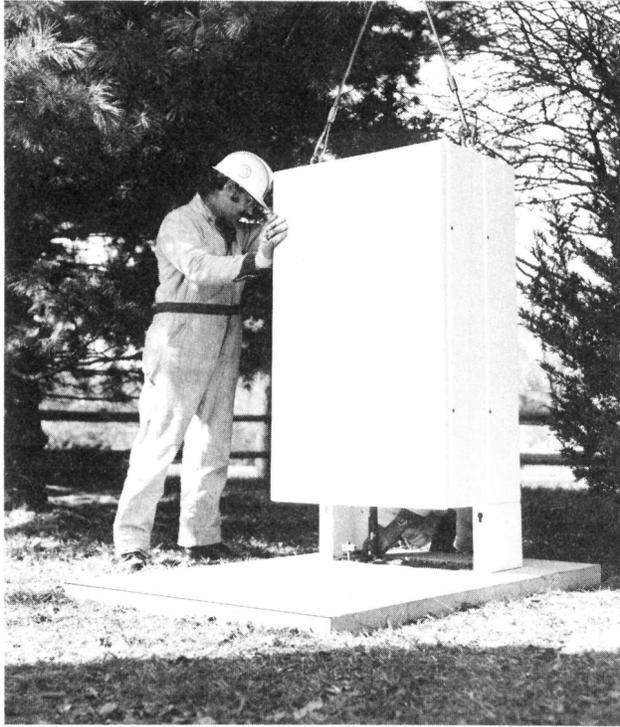


Fig. 13—Placing Cabinet on Concrete Pad

- 6.08** Insert four 1/2-13UNC-2AX1-1/4 capscrews through the clearance holes in the AT-8812B pedestal base legs and fasten to the threaded inserts in the concrete pad. Check corner alignment and tighten all capscrews. If leveling is required, use a washer or shim between the pedestal base leg and the concrete pad.

- 6.09** Position the pedestal base rear cover into the recess in the concrete pad. Insert the studs on the cover through the holes on pedestal legs as shown in Fig. 14. Reach in through the front of the pedestal base and with two 3/8 by 20 nuts, secure the rear cover to the pedestal legs.

- 6.10** Complete stub cable installation and electrical power requirements outlined in Parts 7 and 8. Then, backfill all trenches upon completion of electrical and stub cable work.

- 6.11** Open the battery section of the cabinet and position the pedestal base front cover into the recess in the concrete pad. Insert the studs on the cover through the keyway slots on the pedestal legs as shown in Fig. 15. The cover nuts

can be adjusted so that the cover fits snugly against the pedestal legs. Closing the battery section prevents the cover from being moved upward and removed.

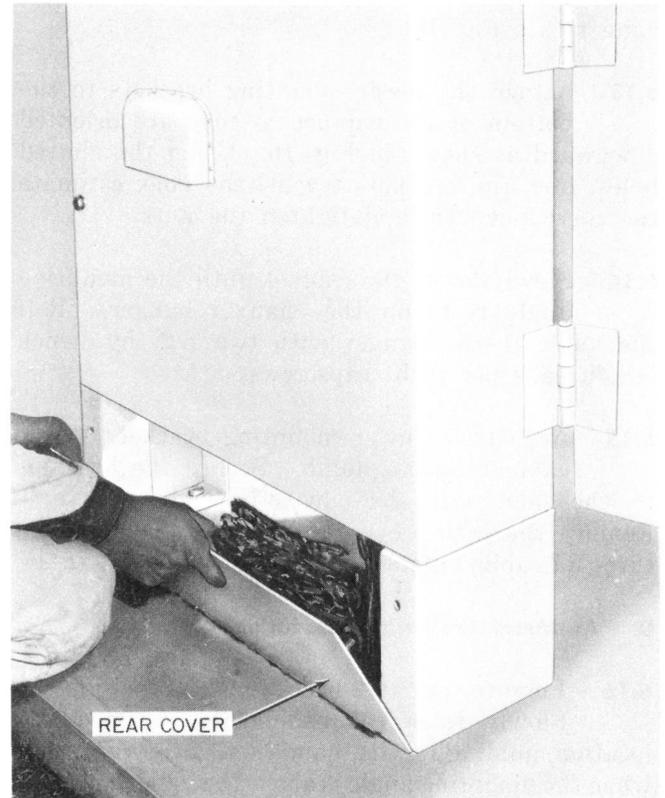


Fig. 14—Installing Pedestal Base—Rear Cover



Fig. 15—Installing Pedestal Base—Front Cover

C. At Channel Hanger Installations

6.12 Slowly raise the cabinet to the channel hanger, guiding it with handlines. Stop the winch when the mounting angle is above the channel hanger (see Fig. 16).

6.13 Attach the lower mounting brackets to the bottom of the cabinet so they are oriented downward as shown in Fig. 16. Using the slotted holes, turn the brackets toward the pole; estimate the correct length; and tighten the nuts.

6.14 Slowly lower the cabinet until the mounting angle rests on the channel hanger. Bolt the angle to the hanger with two 1/2- by 1-inch (13 threads per inch) capscrews.

6.15 Adjust the lower mounting brackets so the cabinet hangs plumb. Secure the brackets to the pole with 3/8- by 3-inch drive screws. Remove the lifting eyes, if desired. A completed three RT cabinet installation is illustrated in Fig. 17.

D. At Metal Crossarm Installations

6.16 Remove the 2-1/2 by 10-inch channel hanger. Slowly raise the cabinet to its mounting location, guiding it with handlines. Stop the winch when the mounting angle is above the upper crossarm (Fig. 18). Slowly lower the cabinet until it hangs on the upper crossarm. When hanging the RT cabinets, the bolts that attach the angle brackets to the horizontal angle iron across the back of the cabinet should register to the crossarm "index" holes so marked.

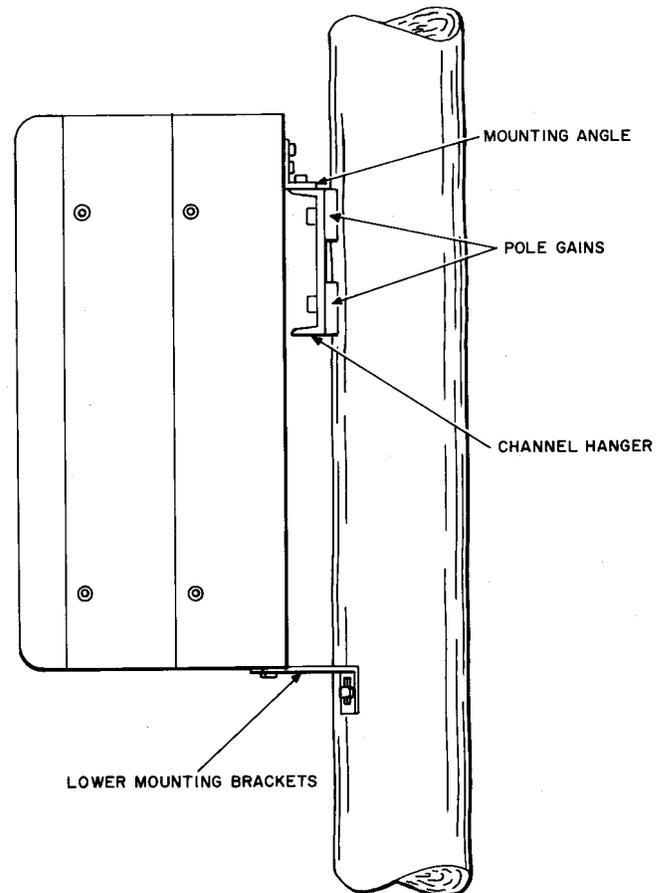


Fig. 16—Channel Hanger Mounting

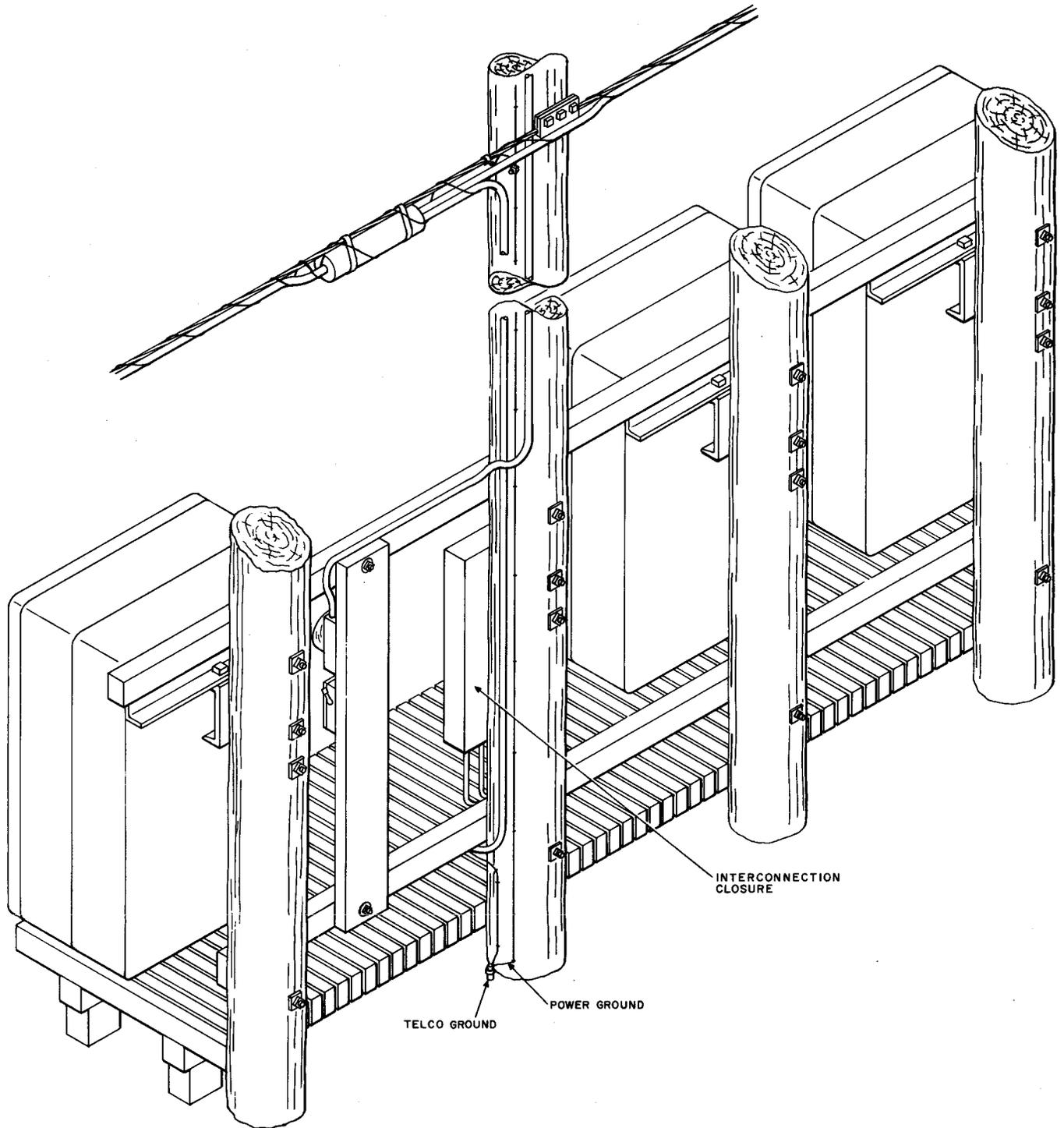


Fig. 17—Completed Three RT Cabinet Installations

6.17 Attach the lower mounting brackets to the bottom of the cabinet using the slotted holes. Orient the brackets downward as shown in Fig. 18. Leave the bolts fingertight.

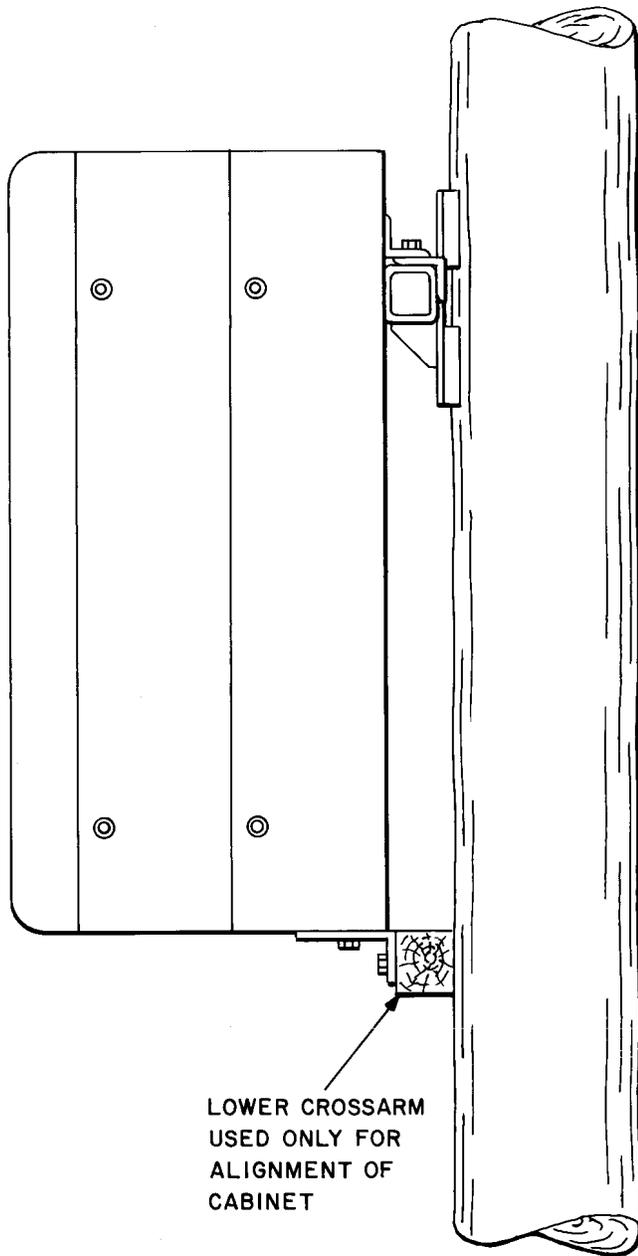


Fig. 18—Mounting RT at Metal Crossarm Installation

6.18 Adjust the cabinet so it hangs level and plumb by using a suitable wedge between the lower crossarm and the rear of the cabinet. Position both lower mounting brackets so the rear surfaces of the brackets rest against the lower crossarm. Fasten the brackets to the lower wooden crossarm with a 3/8- by 3-inch drivescrew.

6.19 A completed installation using the metal crossarm is shown in Fig. 19.

7. INSTALLATION OF STUB CABLE

A. Cable Requirements

7.01 The SLC-96 System is connectorized with 710 connectors using the CONECS approach. Pairs are color coded with standard color code to permit pair-by-pair splicing.

7.02 CONECS splicing is covered in Section 626-500-102 of the Bell System Practices. It is recommended that the technicians become familiar with CONECS splicing before attempting to perform the splicing outlined in this section.

7.03 If digital lines are to be spliced to SLC-96 digital lines with 710 connectors, additional 710-BC-25 connectors (Comcode 102-460-367) and 710-TC-25 connectors (Comcode 102-460-417) should be obtained.

7.04 Additional tools required for CONECS splicing are as follows:

- C bridge removal tool (AT-8745)
- D insertion-cutting tool (AT-8764)
- K connector presser (AT-8887).

7.05 As shown in Fig. 20, a 200-pair MSAB or MSAL (aerial or buried) CONECS cable for the electronics cabinet is required. This is a PC6 pedestal closure cable with 710-BC-25 connectors. Termination of the other end is a function of the interconnection field used.

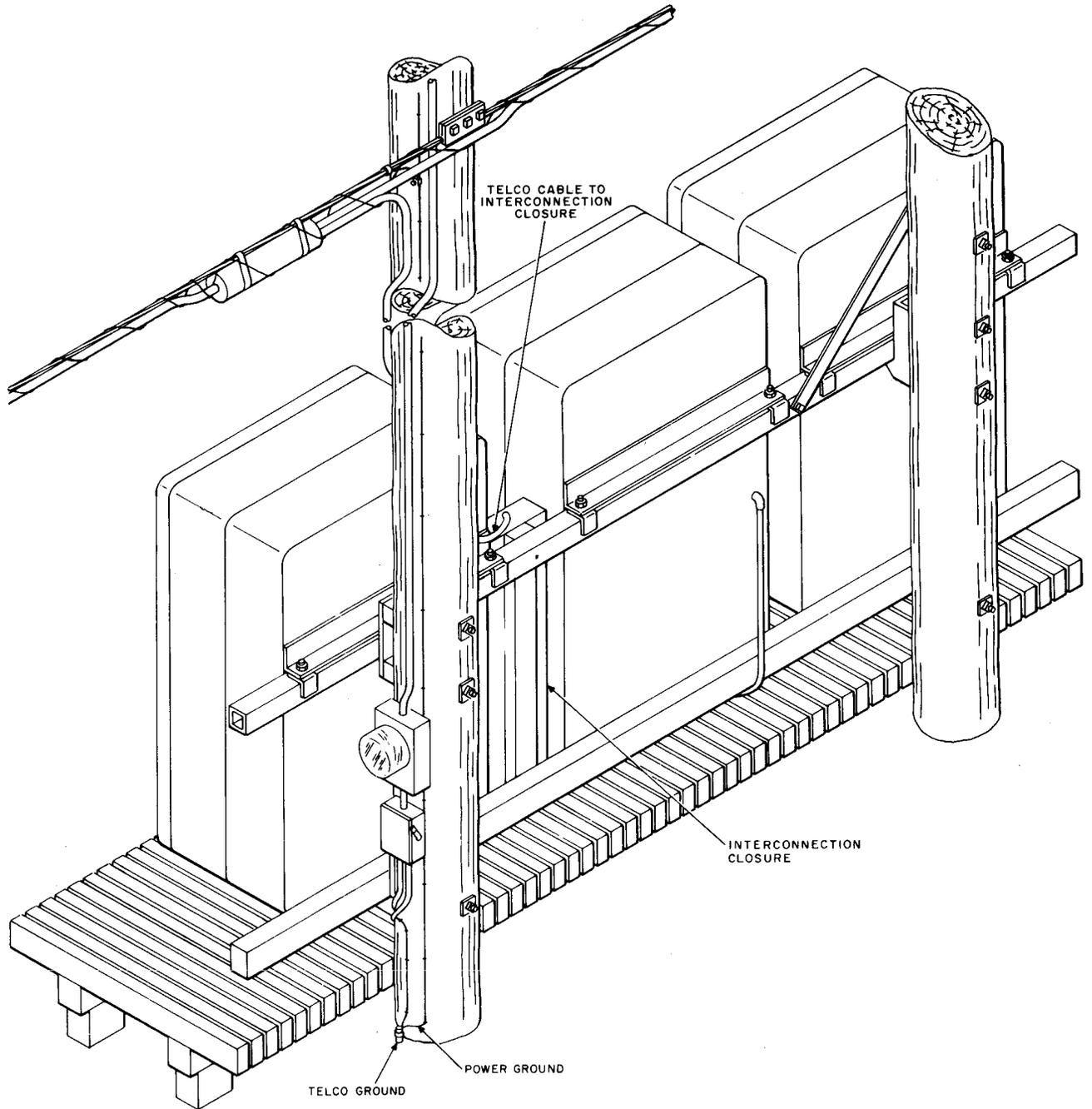


Fig. 19—Completed Three RT Cabinet Installation Using Metal Crossarm

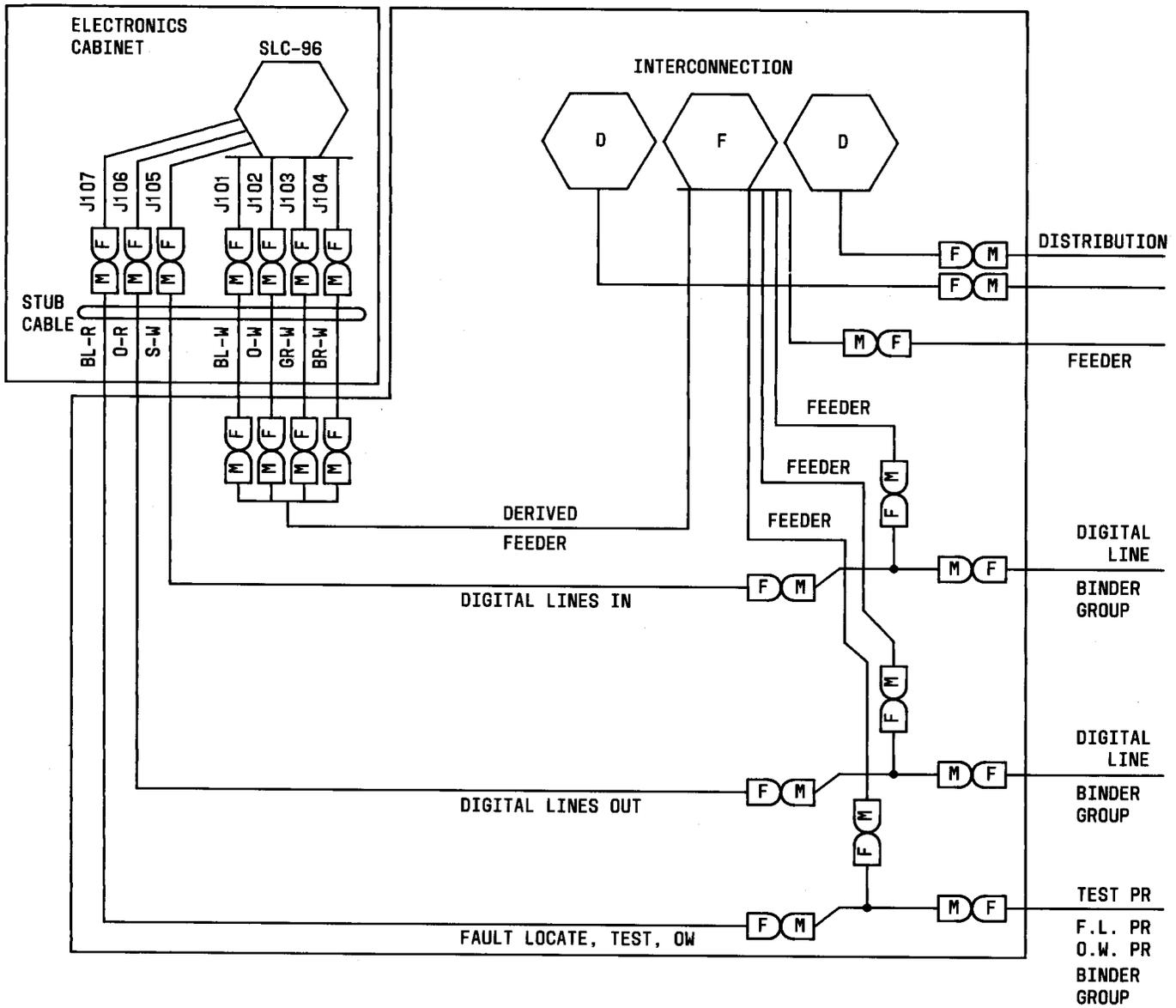


Fig. 20—CONECs Cable Requirements

B. Channel Hanger and Crossarm Installation

7.06 Place the 200-pair stub cable from the bottom of the RT cabinet to the interconnection closure. Dress the cable to the crossarms and pole and extend a minimum of 48 inches into the cabinet for an unconnectorized cable or to the tape marker (8-1/2 inches) for a connectorized cable.

C. Pedestal Installations

7.07 Place a 200-pair stub cable from the bottom of the RT cabinet through the conduit to the interconnection closure. The cable should extend a minimum of 48 inches into the cabinet for an unconnectorized cable or to the tape marker (8-1/2 inches) for a connectorized cable.

D. Grounding and Splicing

7.08 Install D bond clamp as described in Section 081-852-118.

7.09 Fasten the cable to the cabinet ground bracket as shown in Fig. 21. Seal the cable entrance to the RT cabinet with sealing tape.

7.10 Attach a No. 6 ground wire as shown in Fig. 21. Note that the ground wire is routed through a grommet in the bottom of the cabinet.

7.11 Attach the No. 6 ground wire to the D ground rod or the power company ground rod.

7.12 As shown in Fig. 20, a short splicing harness may be made up for the digital line binder groups and fault-locate pair, test pair, and order wire pair binder group as outlined in Fig. 22, 23, and 24, respectively.

7.13 Mate the 710 connectors as shown in Fig. 20.

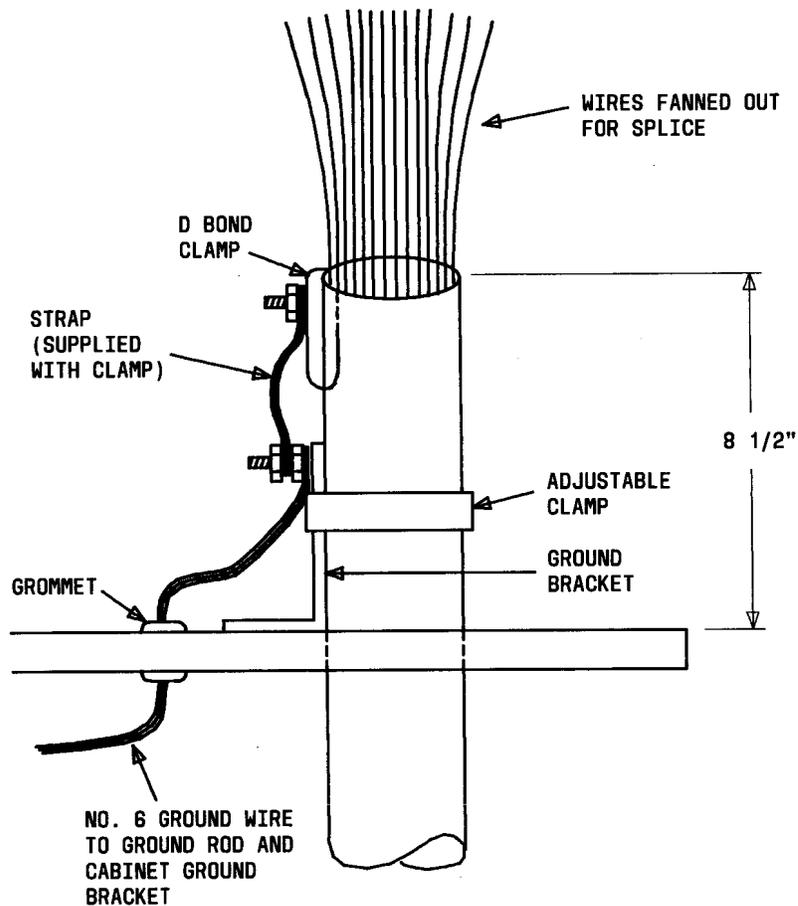


Fig. 21—Stub Cable Secured to Cabinet

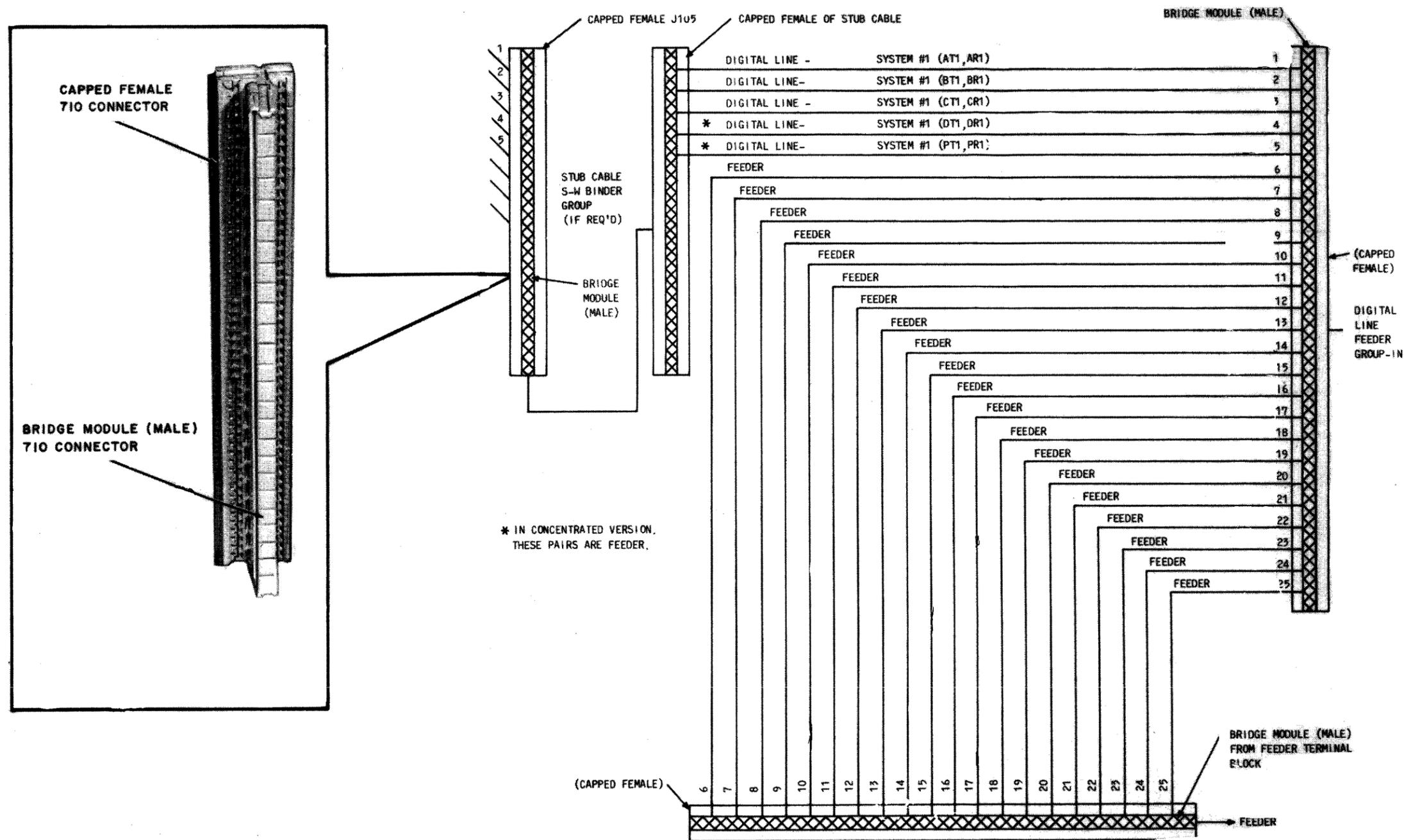


Fig. 22—Digital Line Feeder Group—IN-Splicing

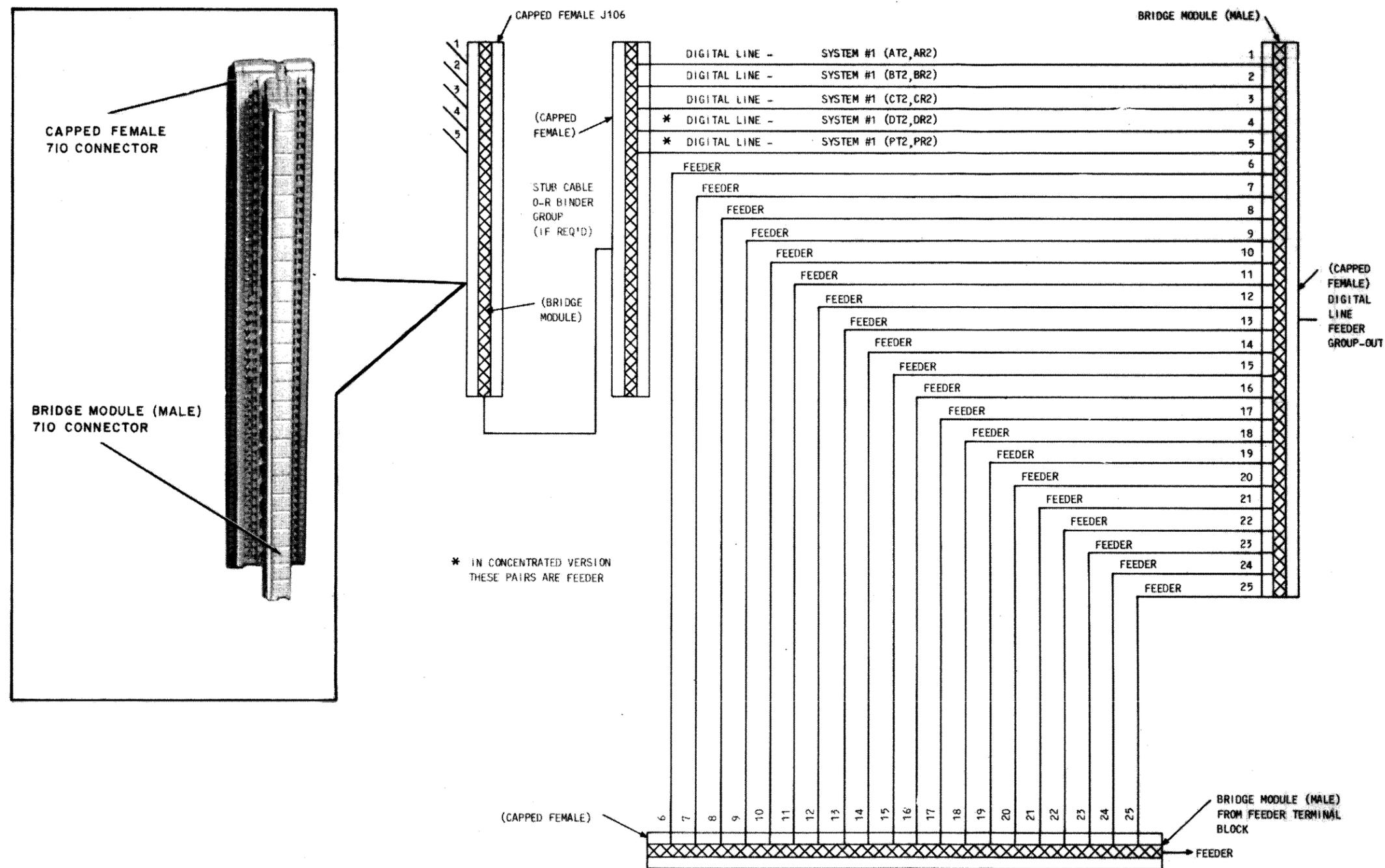


Fig. 23—Digital Line Feeder Group—OUT-Splicing

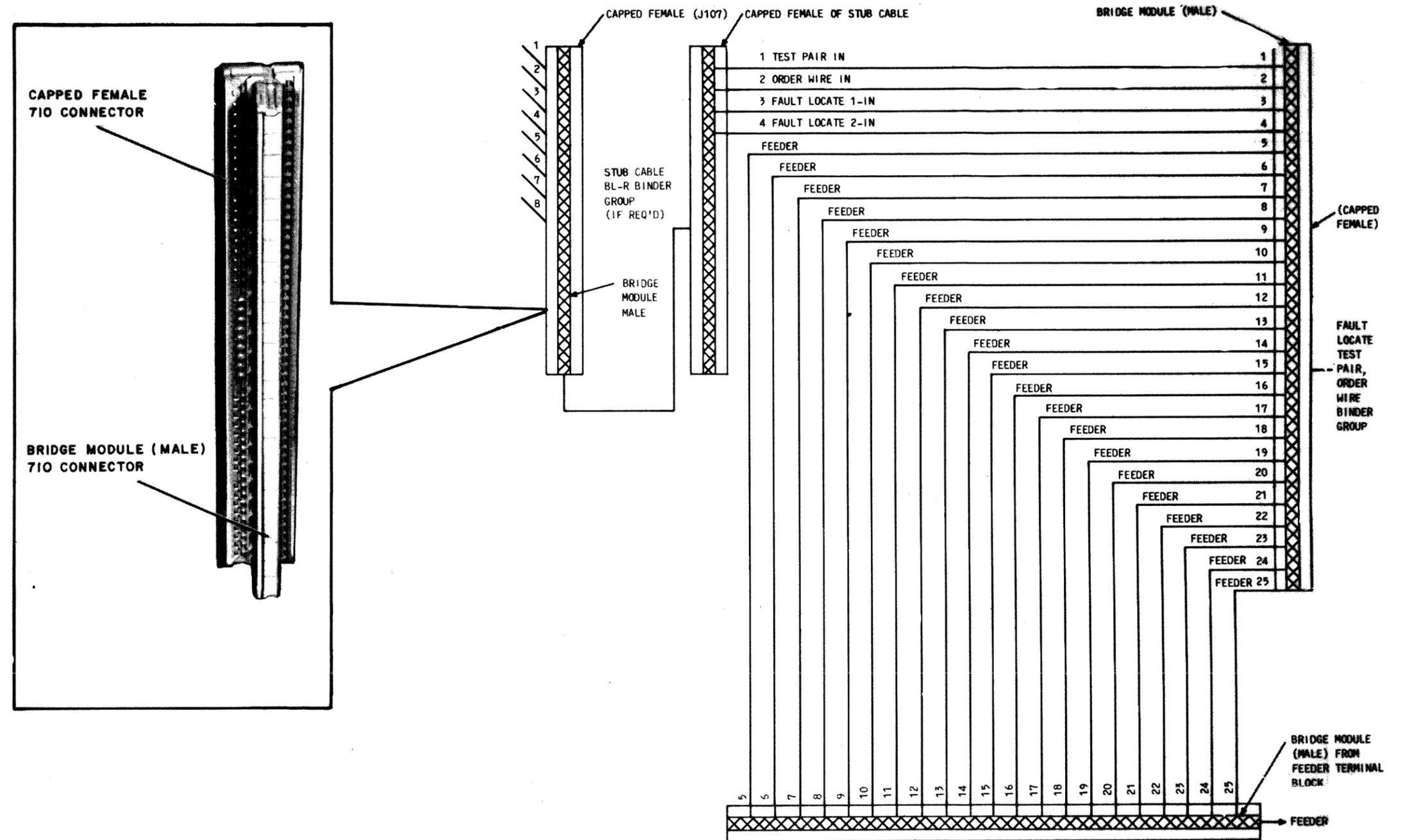


Fig. 24—Fault Locate, Test Pair, and Order Wire Binder Group Splicing

7.14 If pair-by-pair splicing is done in the electronics cabinet, make the splice and mark the individual wires as shown in Table A.

TABLE A
PAIR FUNCTIONS AND MARKING GUIDE

PAIRS	CONNECTOR	FUNCTION	MARKING
1 — 25 26 — 50 51 — 75 76 — 96	J101 J102 J103 J104	Derived Feeder	
1	J105	Digital Line In	AT1, AR1
2	J105	Digital Line In	BT1, BR1
3	J105	Digital Line In	CT1, CR1
4 *	J105	Digital Line In	DT1, DR1
5 *	J105	Digital Line In	PT1, PR1
1	J107	Test Pair In	
2	J107	Order Wire In	
3	J107	Fault Locate 1 In	
4	J107	Fault 2 In	
1	J106	Digital Line Out	AT2, AR2
2	J106	Digital Line Out	BT2, BR2
3	J106	Digital Line Out	CT2, CR2
4 *	J106	Digital Line Out	DT2, DR2
5 *	J106	Digital Line Out	PT2, PR2

* Not required for concentrated system

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7.15 Mark the new derived feeder field and alter the copper feeder field in the interconnection closure as shown in Table B.

3 amperes intermittent for the heater, and a maximum of 10 amperes for the convenience outlet. The recommended design load for sizing an auxiliary generator is 3 amperes continuous for electronics (which includes additional drain for high rate battery recharge), plus 3 amperes additional for heater operation.

8. ELECTRICAL POWER REQUIREMENTS AND ARRANGEMENTS

A. All Installations

8.01 Each RT cabinet requires a separately protected (fuses or circuit breakers) 120V ac, 20-ampere circuit. The maximum load for each cabinet is 3-1/2 amperes continuous for electronics,

8.02 Arrangements shall be made with the local power company to furnish a standard 120/240 volt single phase power drop to the RT location. Determine from the power company if a watt-hour meter is required.

**TABLE B
FEEDER FIELD MARKING GUIDE¹ (108 TERMINAL BLOCK)**

1		25		DERIVED FEEDER
CABLE P.G. "XX" 2				
26		50		DERIVED FEEDER
51				
CABLE P.G. "XX" 2				DERIVED FEEDER
76	96	DEAD		
DEAD ³	106	125		DIGITAL LINE BINDER GROUPS
DEAD ³	131	150		TEST, FAULT LOCATE AND ORDER WIRE BINDER GROUP
DEAD	155	175		
				TEST, FAULT LOCATE AND ORDER WIRE BINDER GROUP

HEAVIER LINE DENOTES SEPARATE BLOCKS (25 PAIR GROUPS)

NOTE:

1. THE MARKING SYSTEM SHOWN IS ANTICIPATED TO REPLACE THE PRESENT SYSTEM OF IDENTIFYING DERIVED FEEDER BY SYSTEM NUMBER.
2. REPLACE "XX" WITH CABLE NUMBER.
3. IN THE CONCENTRATED VERSION POSITIONS 104, 105, 129, AND 130 WILL HAVE COPPER FEEDER.

8.03 *The following operations shall be completed only by authorized personnel.*

After the terminal has been mounted, install a watt-hour meter (if required), fused service switch or circuit breakers (General Electric 9L15DCB002 or equivalent lightning arrester), and all necessary hardware. Fuse the RT(s) as shown in Fig. 25.

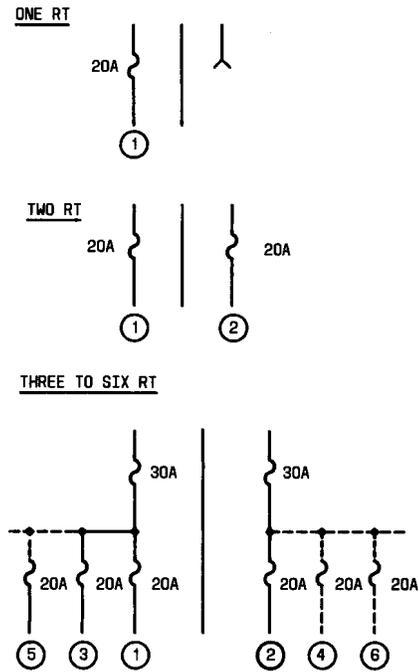


Fig. 25—Fusing Remote Terminal

B. Auxiliary Powering

8.04 Some form of auxiliary ac power source should be considered if the possibility of a long duration prime power failure (beyond the 8-hour battery reserve normally available) exists.

8.05 A 1500-watt alternator will accommodate up to two SLC-96 RTs. For a six SLC-96 RT location, a 5500-watt alternator would support the operation.

8.06 Requirements for any alternator used are that it runs smoothly (minimum frequency hunting) and that it meets normal voltage and frequency limits for a SLC-96 RT, which are:

- 105 to 125V ac
- 55 to 65 Hz
- 3 amps continuous; 6 amps during cold weather with heater operation.

8.07 The following are suggested powering configurations for typical sized RT sites. The first two configurations will provide auxiliary power for one or two SLC-96 RTs, while the third configuration can power up to six SLC-96 RTs at the same location.

8.08 The implementation of the configuration chosen is best done in the initial construction phase of the RT site.

8.09 All methods described can be readily implemented by an electrical contractor.

8.10 The components of the power configuration selected are mounted on a board of appropriate size and can be mounted directly onto a pole with the aid of two pole gains or onto the RT crossarms, whichever is dictated by local option.

C. Power Configuration No. 1 (Fig. 26) For One or Two SLC-96 RTs

8.11 This power configuration uses components which are readily available from an electrical supply house and basically consists of a meter panel (generally supplied by the local utility company), a

fused heavy-duty single-throw double-pole safety or transfer switch in a Nema 3R rainproof enclosure, a lightning protection device, and a 12- by 12- by 4-inch 3R enclosure. This last-mentioned enclosure needs some holes cut into it to mount various other components.

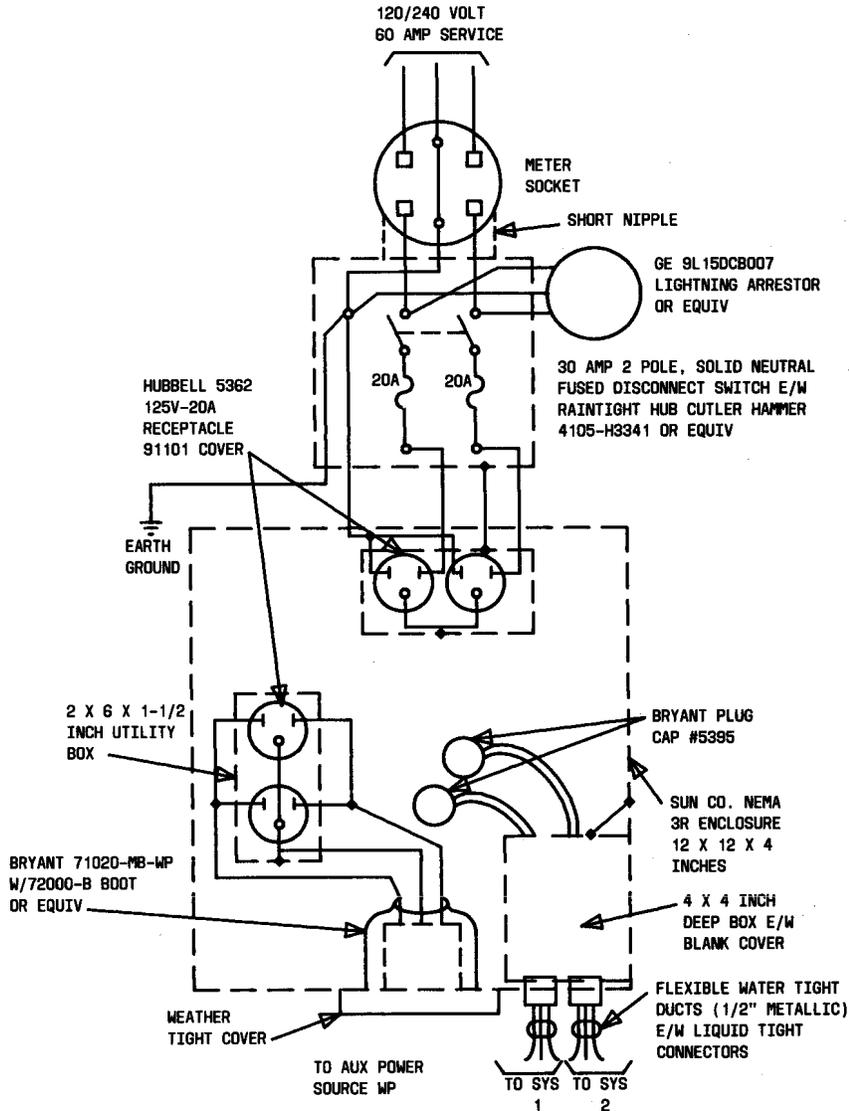


Fig. 26—Providing Auxiliary Power For One or Two SLC-96 RTs Using Standard Electrical Components

D. Power Configuration No. 2 (Fig. 27) For One or Two SLC-96 RTs

8.12 This power configuration uses an Onan Model ETUMT-020-3/11 home standby load transfer switch. In addition, a small NLC-type main lug panel is needed because, other than the fuses within the RT, there is no breaker protection for the primer power mode. This device is placed in the load portion of the configuration and also acts as the terminal point for the RT power feeds through flexible liquid tight conduit. A lightning protection device should also be used.

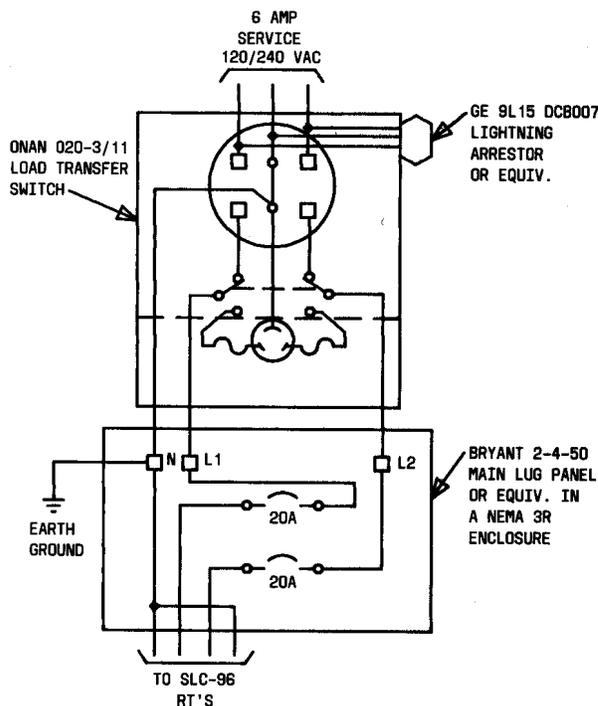


Fig. 27—Providing Auxiliary Power For One or Two SLC-96 RTs Using Onan Load Transfer Switch

E. Power Configuration No. 3 (Fig. 28) For Three to Six SLC-96 RTs

8.13 This power configuration is used when three to six SLC-96s are to be used at one RT location. The main components used are a meter panel, an unfused 3-pole 2-position safety (transfer) switch rated at 60 amps in a Nema 3R enclosure, and a 12 circuit NLC-type main lug panel. A lightning protection device should also be used.

8.14 A similar configuration (as described in paragraph 8.13) for two to six SLC-96 RTs can utilize an Onan 100-3/11 load transfer switch, where it replaces the 3-pole double-throw safety (transfer) switch. This Onan 100-3/11 is capable of accepting an auxiliary alternator input rated by 100 amps and could also be used with permanently fixed auxiliary power sources and larger RT sites.

F. Pedestal Powering

8.15 If the SLC-96 configuration dictates a pedestal-mounted RT, the power configuration will be different than for those previously described. Since a utility pole may be some distance from the actual placement of the RT, it would be advantageous to use an arrangement such as Superior's Meter Pedestal Model WMP-221-11-BRA in combination with a ONAN-020-3/11 load transfer switch for the auxiliary powering feature. If the power equipment is to be mounted on the utility pole, the configurations described in paragraph 8.11 or 8.12 may be used with the power feed to the RTs run underground. This would enable the powering of one or two pedestal-mounted SLC-96 RTs.

8.16 Before proceeding with the RT installation, inspect the ac service for the following:

- (a) All utility boxes must be equipped with locks
- (b) The ON-OFF switch (if exposed) can be locked in either position
- (c) Workmanship is such that there is no hazard to personnel or public.

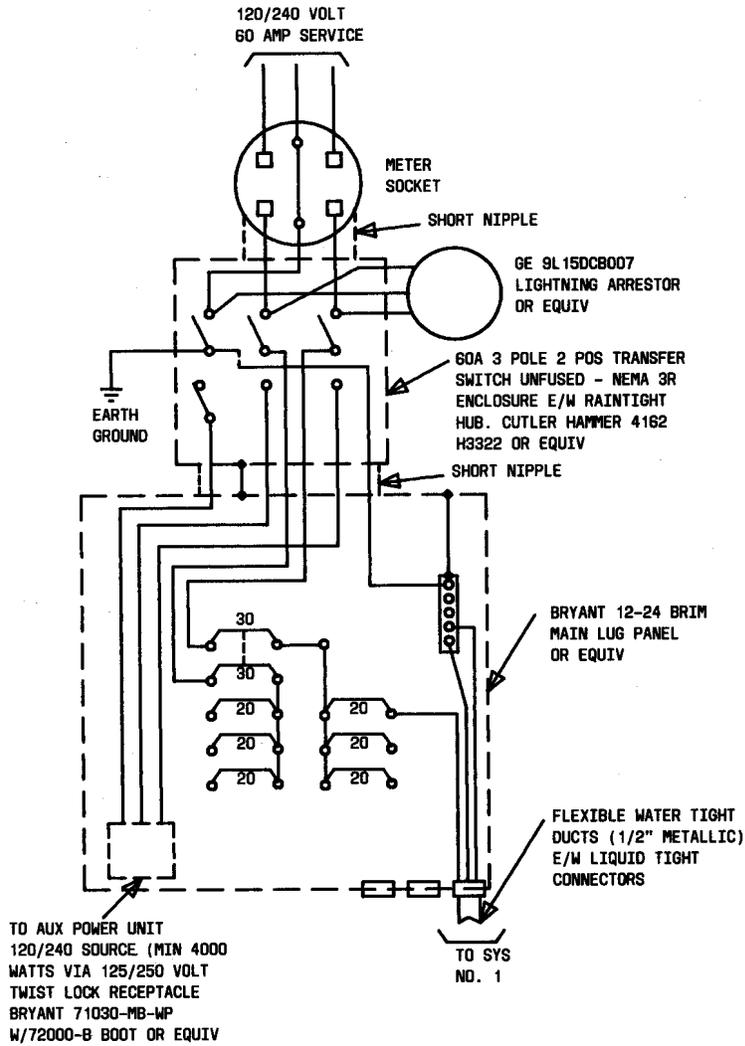


Fig. 28—Providing Auxiliary Power For Three to Six SLC-96 RTs Using Standard Electrical Components

G. Channel Hanger And Crossarm Installations

8.17 Run the power cable into the battery compartment via a 1/2-inch flexible water-tight power conduit through the bottom of the cabinet as shown in Fig. 29. Dress the cable to the pole and crossarms. Connect the power in the RT cabinet as shown in Fig. 30.

H. Pedestal Installations

8.18 Run the power cable into the battery compartment via a 1/2-inch flexible water-tight power conduit through the trench and up the bottom of the cabinet. Connect the power in the RT cabinet as shown in Fig. 30.

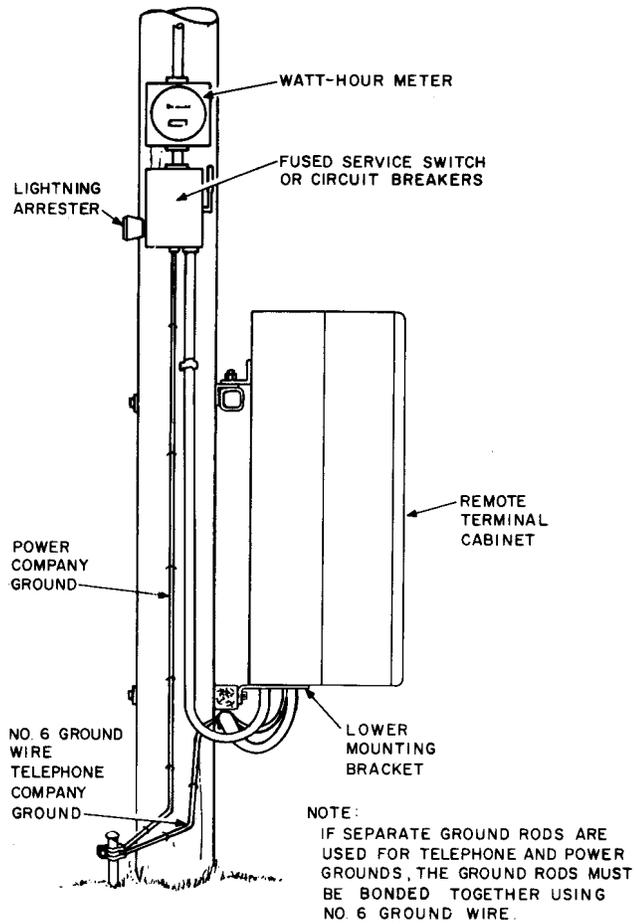
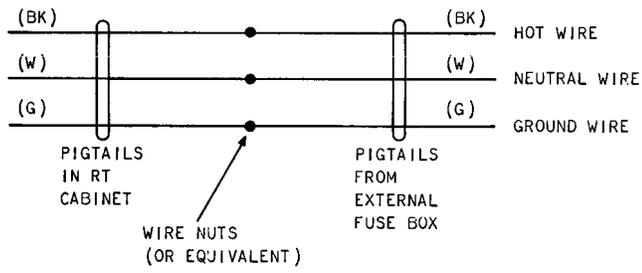


Fig. 29—Power Arrangement for Remote Terminal



NOTE:
COVERED WIRE COLOR OPTIONS PER COUNTY (OR CITY) BUILDING CODES.

Fig. 30—AC Power Connections in Remote Terminal