

## SERVICE

### AC- AND AD-TYPE TELEPHONE BASES WITH 220-, 226-, 2220-, AND 2226-TYPE HAND TELEPHONE SETS

#### 1. GENERAL

1.01 This section contains connection information for the AC1 (MD), AC1P, AC2 (MD), AC2P, AD1 (MD), AD2, and AD3 telephone bases and associated 220A (MD), 220B (MD), 220C, 220AL, 220AM, 226A, 2220B (MD), 2220C, 2220BM, and 2226A hand telephone sets. For additional information on hand telephone sets, refer to Section 502-303-102.



*All AC1 and AD1 telephone bases manufactured prior to 10-1-72 and any base which is opened for any reason should be rewired as shown in Table A before proceeding with connections shown in other tables.*

1.02 This section is reissued to:

- Revise Tables B, D, E, F, H, and I to update information
- Revise Fig. 4, 5, 6, 7, 8, 9, and 10 to show latest connection information
- Add information on 603A ringing extender
- Add information on 220AM, 226A, 2220BM, and 2226A hand telephone sets
- Add information on D-180719 and D-180697 Kit of Parts 1.15 and 1.16
- Show 2220B handset MD.



*The 220B, 220C, 220AL, 226A, 2220C, and 2226A hand telephone sets are equipped with light emitting diodes (LED) for dial illumination. This type of illumination may not be visible in normal light.*



*Power for all the LED-type hand telephone sets is supplied from the central office battery over the incoming line. No external ac power is required for dial illumination.*



*When an LED-type hand telephone set is provided, instruct the customer that during the time a TOUCH-TONE button is depressed the dial light will be extinguished and that the rotary-type dial light will flicker during the run down operation of the dial.*



*For tip party with identifying ground when the LED-type hand telephone sets are provided, it will be necessary to open the handset refer to Section 502-303-102. Make connections as shown in Table D.*



*If AC2, AC2P, or AD3 bases are provided and tip party with identifying ground is required, 220A, 220AM, 2220B, and 2220BM hand telephone set cannot be used.*

1.03 Refer to Table B for identification of TRIMLINE® components and associated apparatus.

1.04 If a 2220B or 2220BM hand telephone set is provided and a polarity guard is required, a D-180788 Kit of Parts must be ordered separately and installed in the base. See Table J for connections. The 2220C and 2226A has a built-in polarity guard.

1.05 The 220AL, 220AM, and 2220BM hand telephone sets and furnished from the factory with a 227D adapter for the H4DU (modular) handset cord.

#### NOTICE

Not for use or disclosure outside the  
Bell System except under written agreement

**1.06** The D-180824 Kit of Parts (for tip party identification) contains a terminal board and 227C adapter. The 227C adapter replaces the 227D adapter in the 220AL hand telephone set. The 227C adapter extends the tip and ring into the hand telephone set and provides two (2) spade-tipped leads to be connected to the network inside the hand telephone set. The terminal board mounts inside the telephone base. Refer to Fig. 7 and Table D for connection information. For additional information, refer to Section 502-303-102.

**1.07** The D-180825 Kit of Parts (for tip party identification) contains a terminal board and a 282A adapter. The adapter is required in the 220C, 226A, 2226A, and later version of the 2220C hand telephone sets. This adapter provides two (2) additional wire spring contacts which are connected to two (2) spade-tipped leads to be connected to the network inside the hand telephone set. For additional information, refer to Section 502-303-102. The adapter is not required in the 220B and early version 2220C hand telephone sets only the terminal board is required. The terminal board is positioned inside the base over the handset cord jack inside the telephone base. Refer to Fig. 6 and Table D for connection information.

**Note:** ♦In 220B and early version 2220C handsets, remove the (W) or (Y) and (BK) spade-tipped leads from their stored location and connect to terminals A and B or 4, respectively.♦

**1.08** ♦If a D-180036 or 28A ringer isolator is used for ringer isolation or to extend the ringing range of these sets, refer to Sections 501-375-100 and 501-375-101, respectively for connection information.♦

**1.09** ♦A 603A ringing extender can be used when only the ringing range is to be extended. Refer to Section 501-380-102 for connections.♦

**1.10** If a dial light transformer is required (220A, 220AM, 2220B, or 2220BM only), use a 2012A or C transformer or equivalent 6-volt supply. For additional transformer information, refer to Section 501-136-100.

**1.11** To silence ringer, rotate dust cover until openings line up with access holes in top of gong and remove stopscrow.

**1.12** To provide dial light (220A, 220AM, 2220B, or 2220BM only) with 1A1, 1A2, or 6A KTS, a 623T6 jack and D6AM mounting cord (ordered separately). Only the AD2 and AD3 bases can be wired for this type service. Refer to Fig. 10 and Table H for connections.

**1.13** ♦To provide message waiting and dial light features without KTS (AC1, AC1P, AD1, and AD2 bases only) and 220A or 2220B hand telephone set, refer to Table K.

**1.14** ♦The 226A and 2226A hand telephone sets are for customer's with impaired hearing. These handsets provide up to 20 dB of receiver gain in the received circuit. For additional information, refer to Section 502-303-102.♦

**1.15** A D-180719 Kit of Parts is available for use by customers with hearing aids which are equipped with telephone pickup features. The kit of parts provides a supplementary field used by the pickup feature of the hearing aid. This kit is intended for use only with the 220C, 226A, 2220C, and 2226A handsets. For additional information, refer to Section 502-303-102.♦

**1.16** ♦A D-180697 Kit of Parts is available for 4-party full selective and 8-party semiselective ringing, both type bases. Refer to Tables E and F for connections.♦

**1.06** The D-180824 Kit of Parts (for tip party identification) contains a terminal board and 227C adapter. The 227C adapter replaces the 227D adapter in the 220AL hand telephone set. The 227C adapter extends the tip and ring into the hand telephone set and provides two (2) spade-tipped leads to be connected to the network inside the hand telephone set. The terminal board mounts inside the telephone base. Refer to Fig. 7 and Table D for connection information. For additional information, refer to Section 502-303-102.

**1.07** The D-180825 Kit of Parts (for tip party identification) contains a terminal board and a 282A adapter. The adapter is required in the 220C, 226A, 2226A, and later version of the 2220C hand telephone sets. This adapter provides two (2) additional wire spring contacts which are connected to two (2) spade-tipped leads to be connected to the network inside the hand telephone set. For additional information, refer to Section 502-303-102. The adapter is not required in the 220B and early version 2220C hand telephone sets only the terminal board is required. The terminal board is positioned inside the base over the handset cord jack inside the telephone base. Refer to Fig. 6 and Table D for connection information.

**Note:** ♦In 220B and early version 2220C handsets, remove the (W) or (Y) and (BK) spade-tipped leads from their stored location and connect to terminals A and B or 4, respectively.♦

**1.08** ♦If a D-180036 or 28A ringer isolator is used for ringer isolation or to extend the ringing range of these sets, refer to Sections 501-375-100 and 501-375-101, respectively for connection information.♦

**1.09** ♦A 603A ringing extender can be used when only the ringing range is to be extended. Refer to Section 501-380-102 for connections.♦

**1.10** If a dial light transformer is required (220A, 220AM, 2220B, or 2220BM only), use a 2012A or C transformer or equivalent 6-volt supply. For additional transformer information, refer to Section 501-136-100.

**1.11** To silence ringer, rotate dust cover until openings line up with access holes in top of gong and remove stop screw.

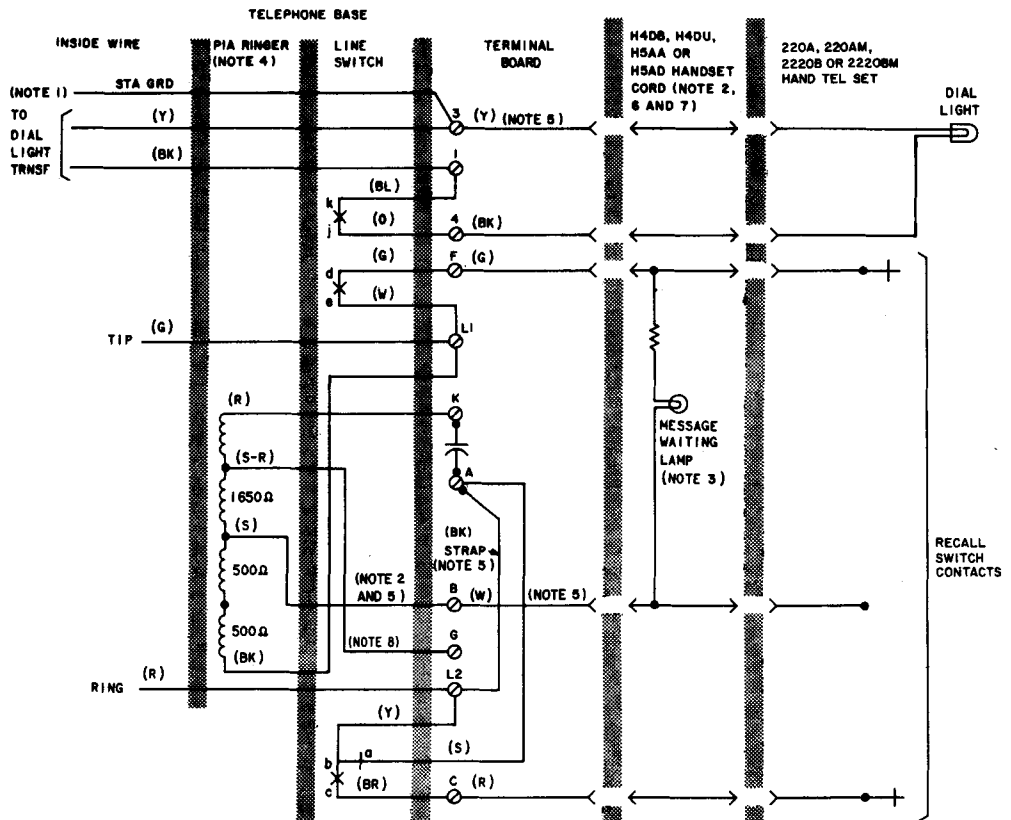
**1.12** To provide dial light (220A, 220AM, 2220B, or 2220BM only) with 1A1, 1A2, or 6A KTS, a 623T6 jack and D6AM mounting cord (ordered separately). Only the AD2 and AD3 bases can be wired for this type service. Refer to Fig. 10 and Table H for connections.

**1.13** ♦To provide message waiting and dial light features without KTS (AC1, AC1P, AD1, and AD2 bases only) and 220A or 2220B hand telephone set, refer to Table K.

**1.14** ♦The 226A and 2226A hand telephone sets are for customer's with impaired hearing. These handsets provide up to 20 dB of receiver gain in the received circuit. For additional information, refer to Section 502-303-102.♦

**1.15** A D-180719 Kit of Parts is available for use by customers with hearing aids which are equipped with telephone pickup features. The kit of parts provides a supplementary field used by the pickup feature of the hearing aid. This kit is intended for use only with the 220C, 226A, 2220C, and 2226A handsets. For additional information, refer to Section 502-303-102.♦

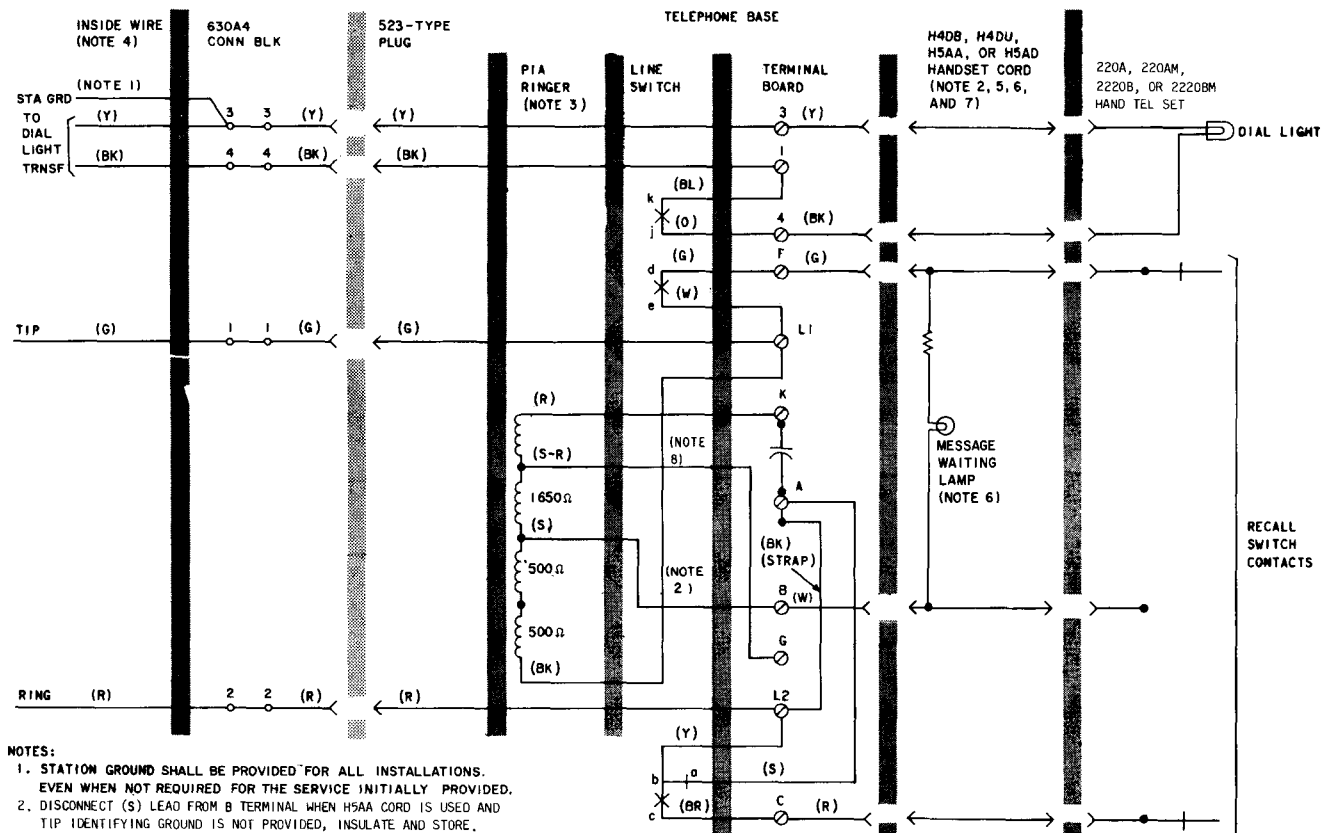
**1.16** ♦A D-180697 Kit of Parts is available for 4-party full selective and 8-party semiselective ringing, both type bases. Refer to Tables E and F for connections.♦



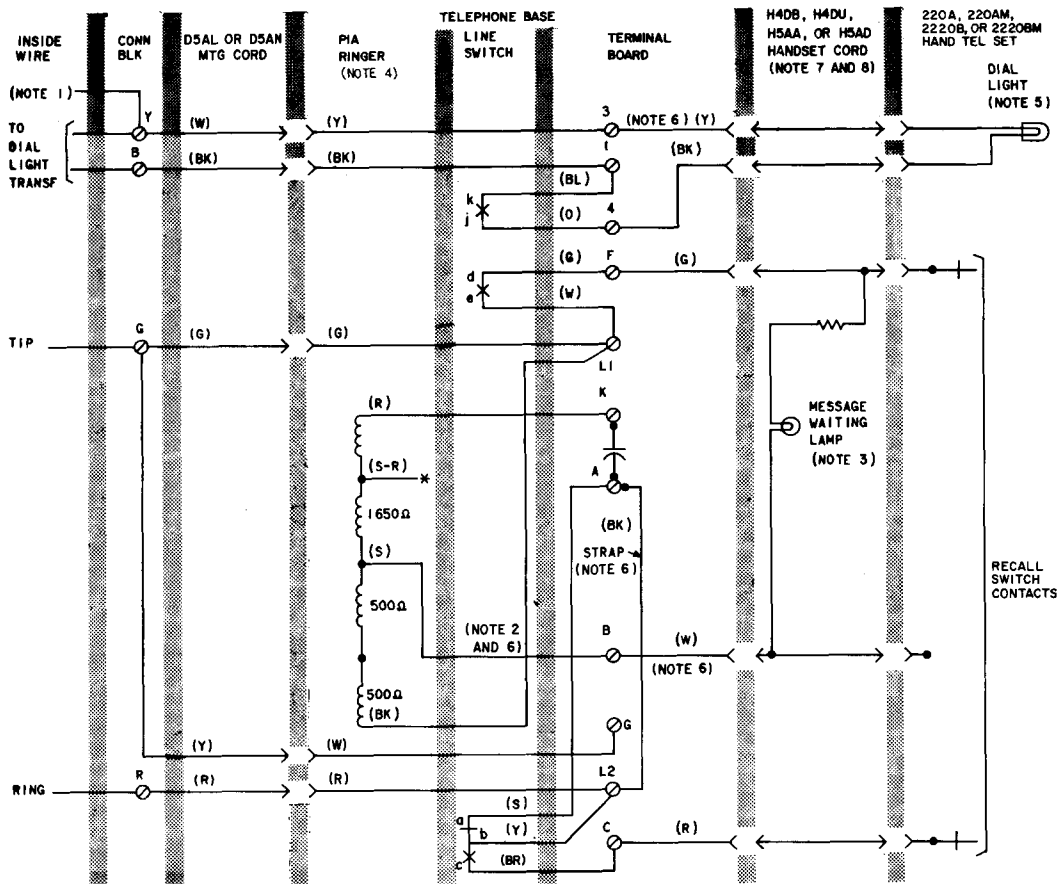
## NOTES:

1. STATION GROUND SHALL BE PROVIDED FOR ALL INSTALLATIONS; EVEN WHEN NOT REQUIRED FOR THE SERVICE INITIALLY PROVIDED.
2. DISCONNECT (S) LEAD FROM TERMINAL B WHEN H5AA HANDSET CORD IS USED AND TIP PARTY IDENTIFYING GROUND IS NOT PROVIDED, INSULATE AND STORE.
3. LAMP AND RESISTOR ARE PART OF H5AD HANDSET CORD REQUIRED FOR MESSAGE WAITING FEATURE ON AC1 BASE ONLY. IF 220AM OR 2220BM HAND TELEPHONE SET IS PROVIDED, THE 227-TYPE ADAPTER MUST BE REMOVED.
4. SET WIRED FOR INDIVIDUAL OR BRIDGED SERVICE, FOR ALL CLASSES OF SERVICE REFER TO TABLE C.
5. REFER TO READ IN 1.01 AND TABLE A FOR ADDITIONAL INFORMATION ON WIRING ARRANGEMENT AND LEAD COLORS OF AC1 BASES MANUFACTURED PRIOR TO 10-1-72.
6. H4DB OR H4DU HANDSET CORD SHALL BE USED FOR INDIV. OR BRIDGED RINGING, RING PARTY, AND TIP PARTY WITHOUT IDENT. GRO.
7. WHEN H4DU CORD IS PROVIDED A 227D AND 231B ADAPTER IS REQUIRED ON AC1 BUT 227D ADAPTER ONLY IS REQUIRED ON AC2.
8. INSULATED AND STORED ON EARLY VERSION AC1 ONLY.

Fig. 1—AC1 (MD) or AC2 (MD) Telephone Base, Connections, With 220A (MD), 220AM, 2220B (MD), or 2220BM Hand Telephone Set



**Fig. 2—AC1P or AC2P Telephone Base, Connections, With 220A (MD), 220AM, 2220B (MD), or 2220BM Hand Telephone Set**



## NOTES:

1. STATION GROUND SHALL BE PROVIDED FOR ALL INSTALLATIONS; EVEN WHEN NOT REQUIRED FOR THE SERVICE INITIALLY PROVIDED.
2. DISCONNECT (S) LEAD FROM TERMINAL B WHEN H5AA HANDSET CORD IS USED AND TIP PARTY IDENTIFYING GROUND IS NOT PROVIDED, INSULATE AND STORE.
3. LAMP AND RESISTOR ARE PART OF H5AD HANDSET CORD REQUIRED FOR MESSAGE WAITING FEATURE. IF 220AM OR 2220BM HAND TELEPHONE SET IS PROVIDED, THE 227-TYPE ADAPTER MUST BE REMOVED.
4. SET WIRED FOR INDIVIDUAL OR BRIDGED SERVICE, FOR ALL CLASSES OF SERVICE REFER TO TABLE C.

5. CHANGE TO 53A LAMP IF COMBINED LENGTH OF HAND TELEPHONE SET CORD AND (ADI BASE) MOUNTING CORD EXCEEDS 15 FEET.
6. REFER TO READ IN 1.01 AND TABLE A FOR ADDITIONAL INFORMATION OR WIRING ARRANGEMENT AND LEAD COLORS OF ADI BASES MANUFACTURED PRIOR TO 10-1-72.
7. H40B OR H4DU CORD SHALL BE USED FOR INDIVIDUAL OR BRIDGED RINGING, RING PARTY AND TIP PARTY WITHOUT IDENT. GRD.
8. WHEN H4DU CORD IS PROVIDED A 2270 AND 231B ADAPTER IS REQUIRED.

\* INSULATED AND STORED

Fig. 3—AD1 (MD) Telephone Base, Connections, With 220A (MD), 220AM, 2220B (MD), or 2220BM Hand Telephone Set

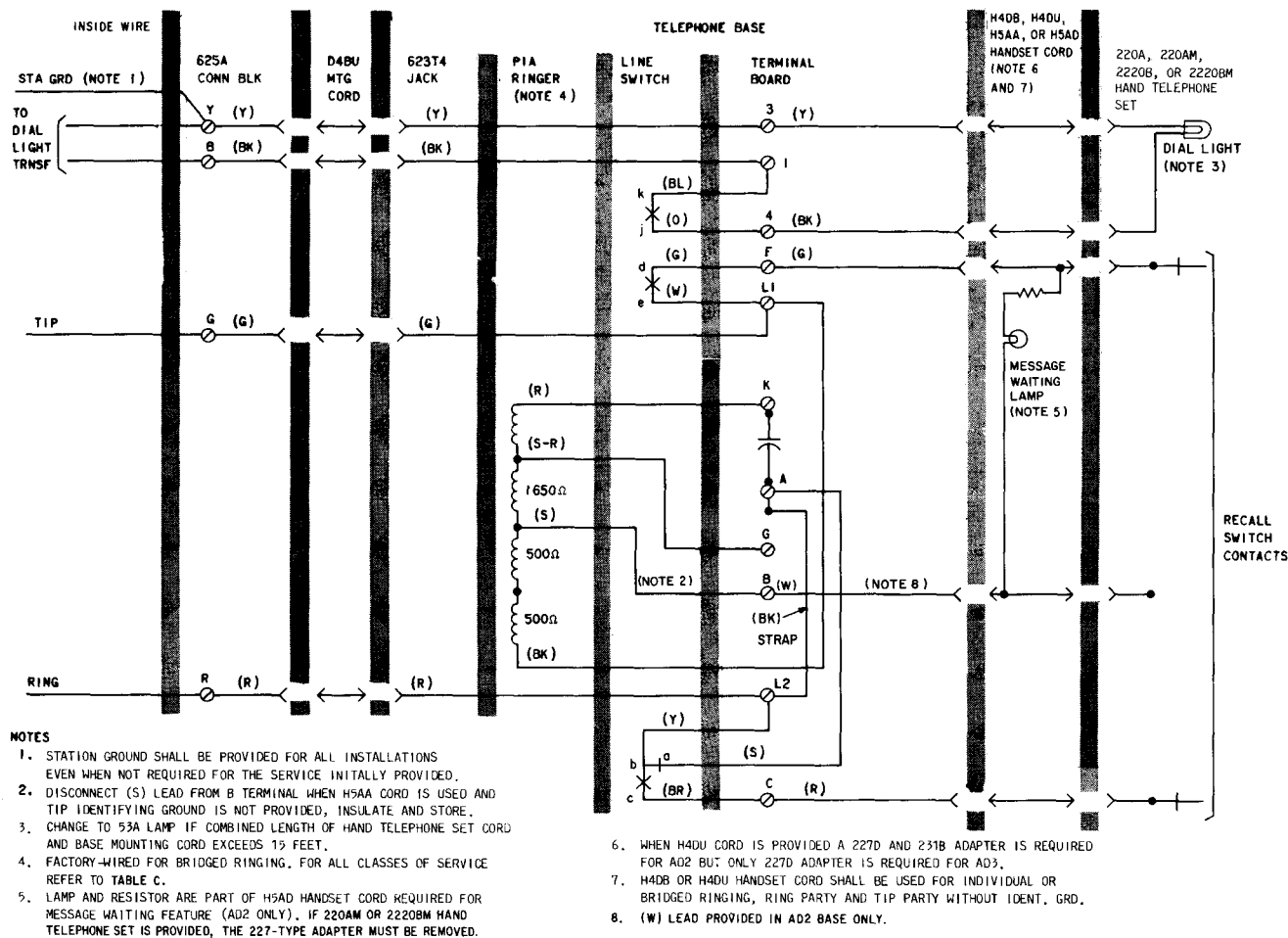
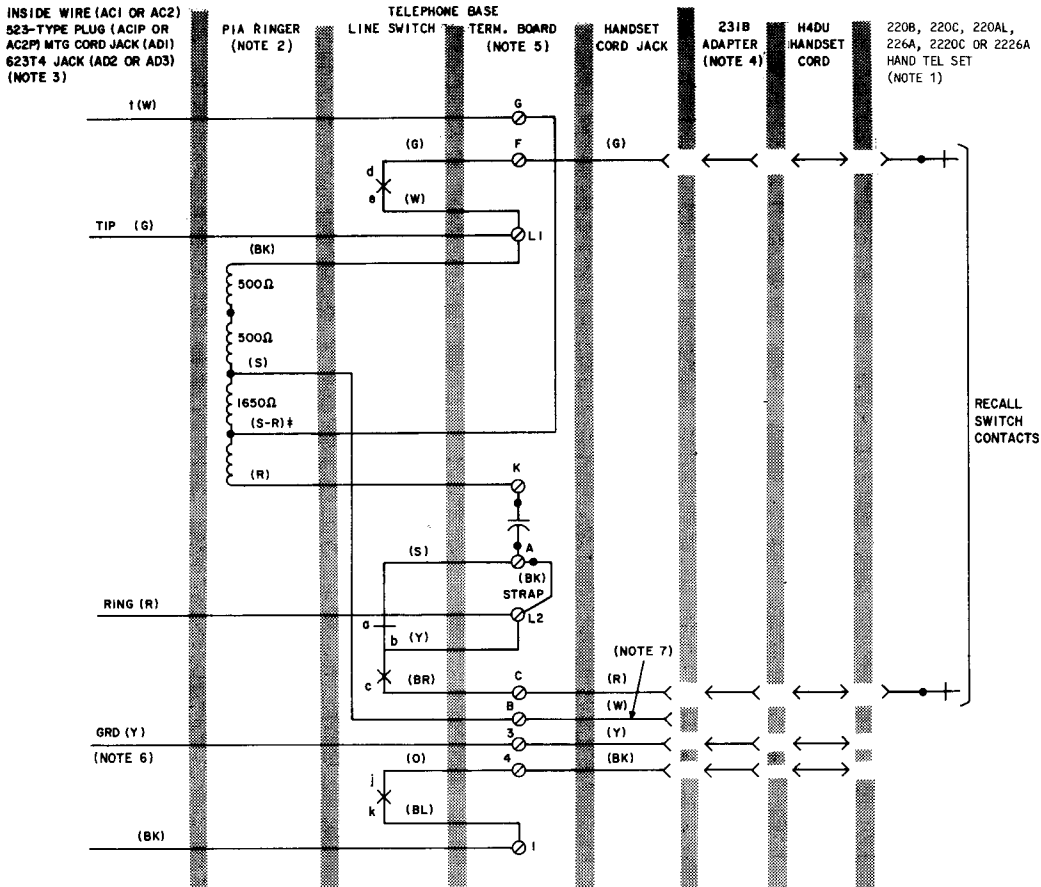
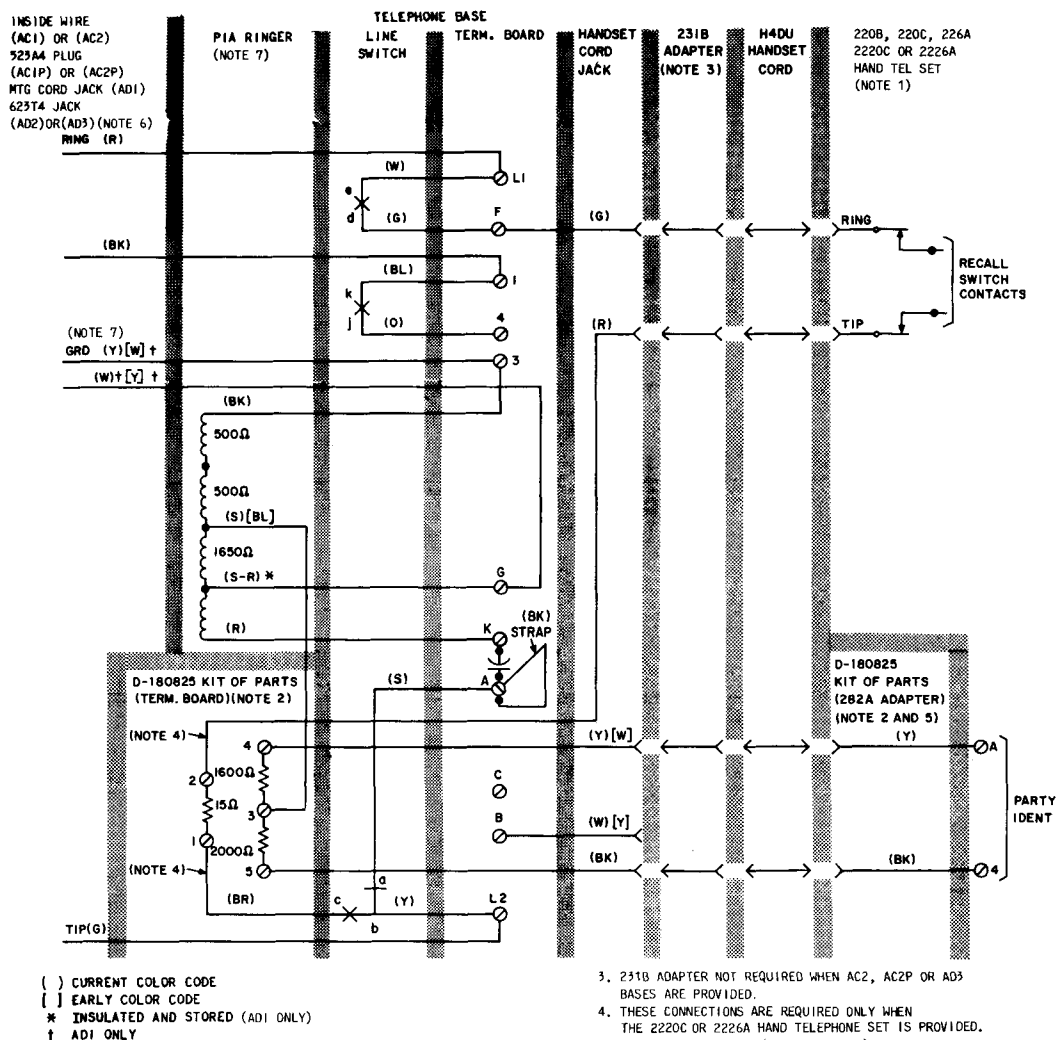


Fig. 4—AD2 or AD3 Telephone Base, Connections, With 220A (MD), 220AM, 2220B (MD), or 2220BM Hand Telephone Set



**Fig. 5—AC1 (MD), AC2 (MD), AC1P, AC2P, AD1 (MD), AD2, or AD3 Telephone Base, Connections, With 220B (MD) 220C, 220AL, 226A, 2220C, or 2226A Hand Telephone Set, Wired for Individual or Bridged Ringing**



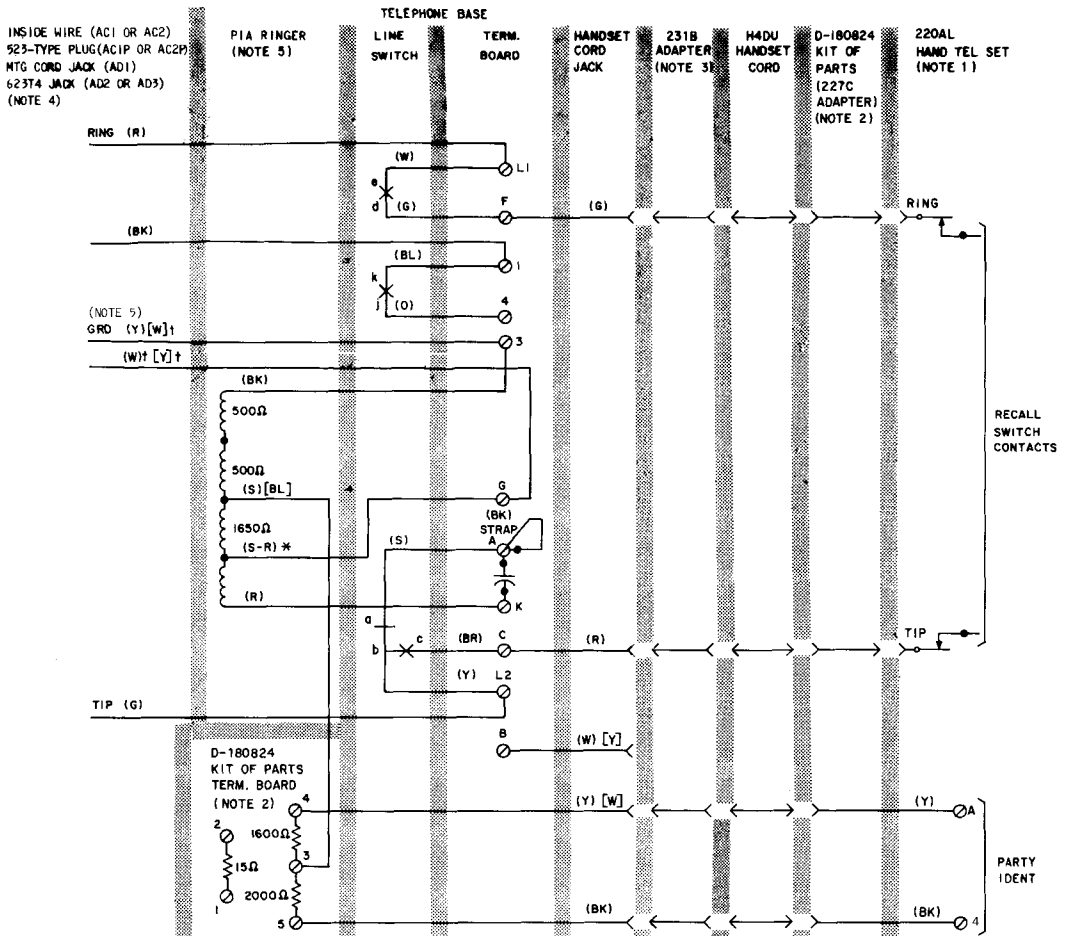


**NOTES:**

1. DIAL LIGHT TRNSF NOT REQUIRED. DIAL LIGHTING IS PROVIDED BY LIGHT EMITTING DIODES (LED) IN THE HAND TEL SET WHICH IS POWERED BY CO BATTERY OVER THE INCOMING LINE.
2. REQUIRES OPENING HANDSET AND ADDING D-180B25 KIT OF PARTS.

3. 231B ADAPTER NOT REQUIRED WHEN AC2, AC2P OR A03 BASES ARE PROVIDED.
4. THESE CONNECTIONS ARE REQUIRED ONLY WHEN THE 2220C OR 2226A HAND TELEPHONE SET IS PROVIDED.
5. IF A 220B OR 2202C (EARLY VERSION) IS PROVIDED THE TERMINAL BOARD ONLY OF THE D-160825 KIT OF PARTS IS REQUIRED.
6. REFER TO TABLE D FOR CONNECTING BLOCK AND OTHER CLASSES OF SERVICE CONNECTIONS.
7. STATION GROUND SHALL BE PROVIDED FOR ALL INSTALLATIONS EVEN WHEN NOT REQUIRED FOR THE SERVICE INITIALLY PROVIDED.

Fig. 6—AC1 (MD), AC2 (MD), AC1P, AC2P, AD1 (MD), AD2, or AD3 Telephone Base With 220B (MD), 220C, 226A, 2220C, or 2226A Hand Telephone Set and D-180825 Kit of Parts (Tip Party Identification)†



( ) CURRENT COLOR CODE

[ ] EARLY COLOR CODE

\* INSULATED AND STORED (AD1 ONLY)

† AD1 BASE ONLY

## NOTES:

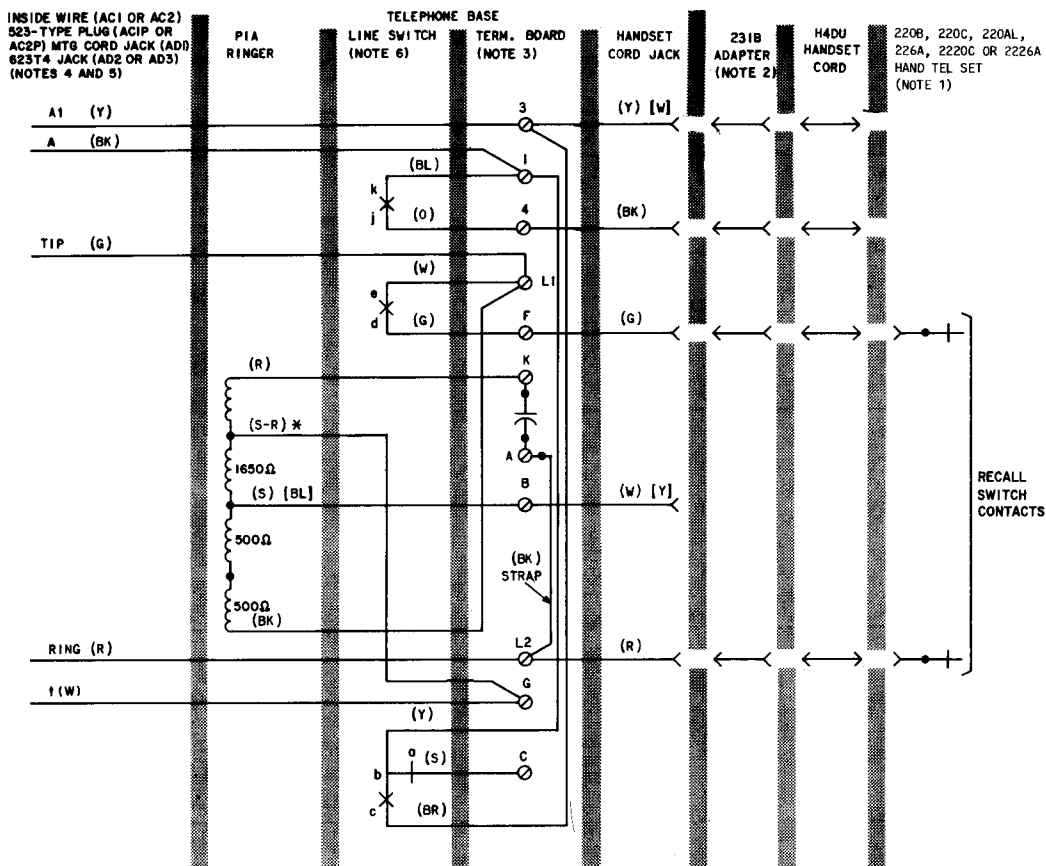
1. DIAL LIGHT TRNSF NOT REQUIRED. DIAL LIGHTING IS PROVIDED BY LIGHT EMITTING DIODES (LED) IN THE HAND TEL SET WHICH IS POWERED BY C Q BATTERY OVER THE INCOMING LINE.
2. REQUIRES OPENING HANDSET AND ADDING D-180824 KIT OF PARTS.

3. 231B ADAPTER NOT REQUIRED WHEN AC2, AC2P OR AD3 BASES ARE PROVIDED.

4. REFER TO TABLE D FOR CONNECTING BLOCK AND OTHER CLASSES OF SERVICE CONNECTIONS.

5. STATION GROUND SHALL BE PROVIDED FOR ALL INSTALLATIONS EVEN WHEN NOT REQUIRED FOR THE SERVICE INITIALLY PROVIDED.

Fig. 7—AC1 (MD), AC2 (MD), AC1P, AC2P, AD1 (MD), AD2, or AD3 Telephone Base With 220AL Hand Telephone Set and D-180824 Kit of Parts (Tip Party Identification)

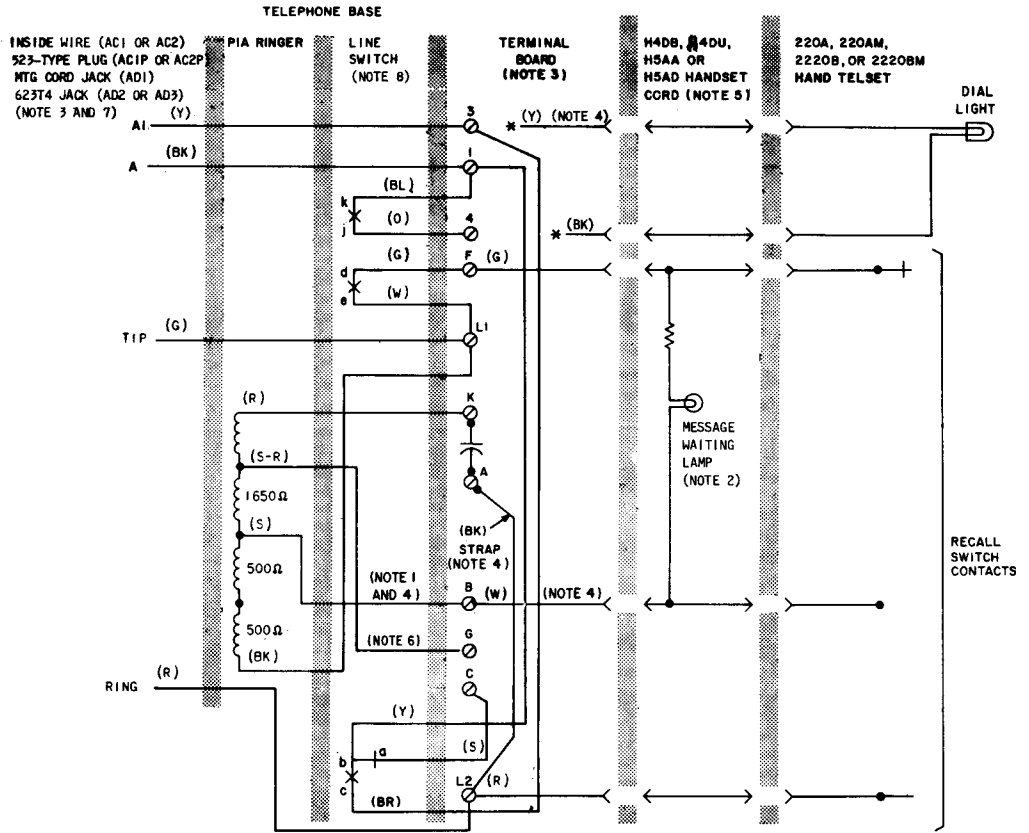


## NOTES:

1. DIAL LIGHT TRANSFORMER NOT REQUIRED. DIAL LIGHTING IS PROVIDED BY LIGHT EMITTING DIODES (LED) IN THE HAND TELEPHONE SET WHICH IS POWERED BY C.O BATTERY OVER THE INCOMING LINE.
2. THE 231B ADAPTER NOT REQUIRED ON AC2, AC2P, OR AD3 BASE.
3. SET FACTORY WIRED FOR INDIVIDUAL OR BRIDGED SERVICE. FOR KTS SERVICE REFER TO TABLE I.
4. REFER TO READ IN 1.01 AND TABLE A FOR ADDITIONAL INFORMATION ON WIRING ARRANGEMENT AND LEAD COLORS OF AC1 AND AD1 BASES MANUFACTURED PRIOR TO 10-1-72.

5. FOR CONNECTING BLOCK INFORMATION, REFER TO TABLE D.
  6. TO PREVENT FALSE HOLD CONDITION WHEN GOING ON-HOOK, THE TIP AND RING CONTACTS OF THE LINE SWITCH MUST BREAK BEFORE "A" LEAD CONTACTS. (FIELD ADJUSTMENT OF LINE SWITCH NOT RECOMMENDED).
- ( ) CURRENT COLOR CODE  
 [ ] EARLY COLOR CODE  
 \* INSULATED AND STORED (AD1 ONLY).  
 † AD1 BASE ONLY

Fig. 8—AC1 (MD), AC2 (MD), AC1P, AC2P, AD1 (MD), AD2, or AD3 Telephone Base Connections, Wired for 1A1, 1A2, or 6A KTS With 220B (MD), 220C, 220AL, 226A, 2220C, or 2226A Hand Telephone Set†



\* INSULATED AND STORED

**NOTES:**

1. WHEN H5AA HANDSET CORD IS PROVIDED, DISCONNECT (S) LEAD FROM TERMINAL B, INSULATE AND STORE.
2. LAMP AND RESISTOR ARE PART OF H5AD HANDSET CORD REQUIRED FOR MESSAGE WAITING FEATURE ON AC1 BASE ONLY.
3. SET FACTORY WIRED FOR INDIVIDUAL OR BRIDGED SERVICE. FOR KTS SERVICE REFER TO TABLE G.
4. REFER TO READ IN 1.01 AND TABLE A FOR ADDITIONAL INFORMATION ON WIRING ARRANGEMENT AND LEAD COLORS OF AC1 AND AD1 BASES MANUFACTURED PRIOR TO 10-1-72.
5. WHEN H4DU CORD IS PROVIDED A 227D AND 231B ADAPTER IS REQUIRED ON AC1 BUT 227D ADAPTER ONLY IS REQUIRED ON AC2.
6. INSULATED AND STORED ON EARLY VERSION AC1 AND ALL AD1 BASES.
7. FOR CONNECTING BLOCK INFORMATION, REFER TO TABLE C.
8. TO PREVENT FALSE HOLD CONDITION WHEN GOING ON-HOOK, THE TIP AND RING CONTACTS OF THE LINE SWITCH MUST BREAK BEFORE "A" LEAD CONTACTS. (FIELD ADJUSTMENT OF LINE SWITCH NOT RECOMMENDED).

**Fig. 9—AC1 (MD), AC2 (MD), AC1P, AC2P, AD1 (MD), AD2, or AD3 Telephone Base Wired for 1A1, 1A2, or 6A KTS Without Dial Light Using 220A (MD), 220AM, 2220B (MD), or 2220BM Hand Telephone Set**

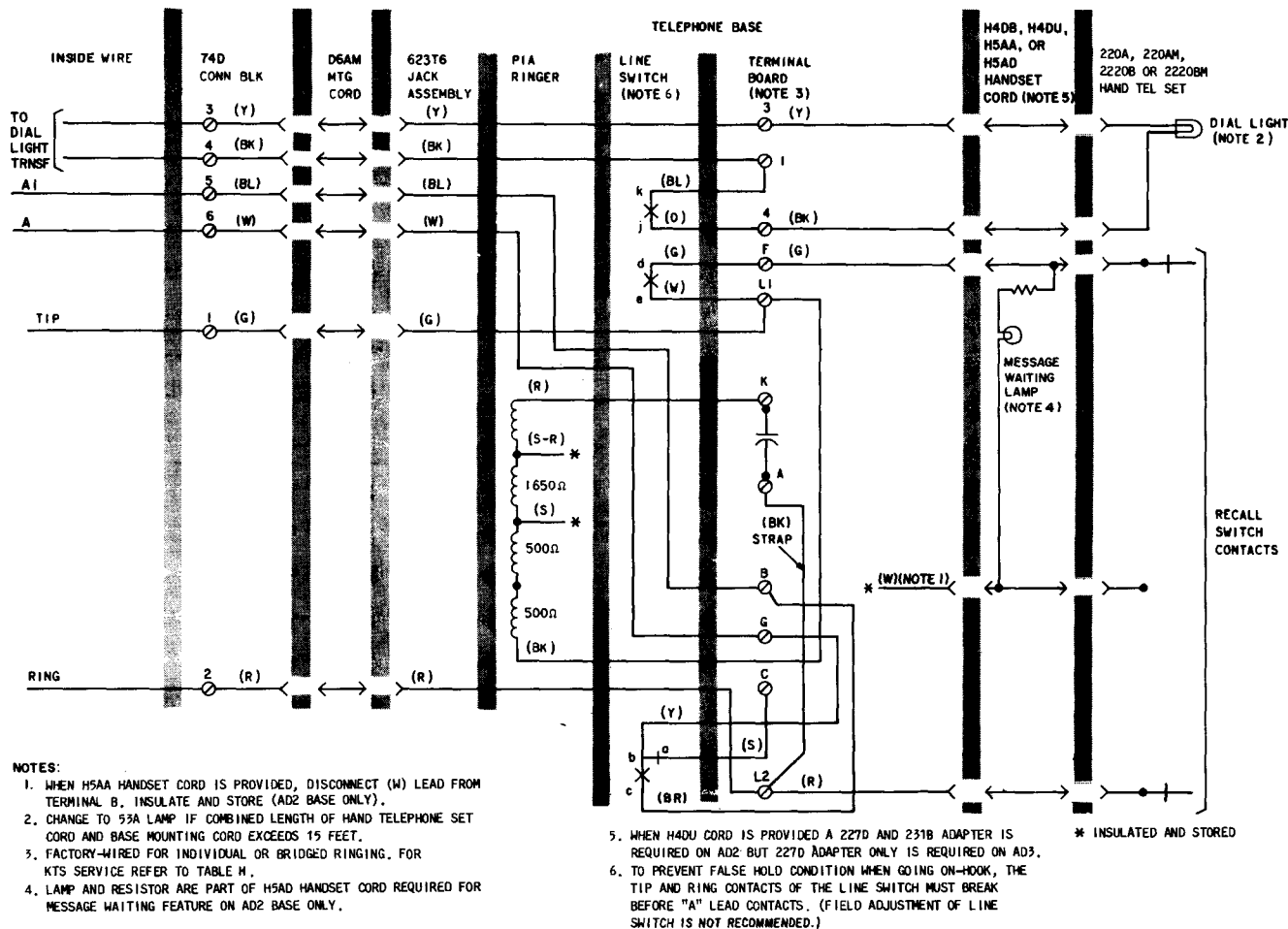


Fig. 10—AD2 or AD3 Telephone Base Wired for 1A1, 1A2, or 6A KTS With Dial Light Using 220A (MD), 220AM, 2220B (MD), or 2220BM Hand Telephone Set

TABLE A

**CONVERSION OF EARLY AC1 AND AD1  
TELEPHONE BASES  
MANUFACTURED PRIOR TO 10-1-72  
(SEE READ IN 1.01)**

WIRE OR LEAD (SEE NOTE)	COLOR	REMOVE FROM	CONNECT TO
Ringer Lead	BL	B	*
	S	*	B
	BK†	G	L1
Strap from A	BK	A	L2

\* Insulate and store.

† AD1 base only.

*Note:* Early model AC1 and AD1 bases, the leads from pins 1 and 5 of the mounting and handset cord jacks are (W) and (Y), respectively. In current model, the leads from pins 1 and 5 are (Y) and (W), respectively.

♦TABLE B♦

IDENTIFICATION OF TRIMLINE COMPONENTS  
AND ASSOCIATED APPARATUS (NOTE 1)

HAND TEL SET CODE	METHOD OF IDENT.	TEL BASE CODE	WALL JACK OR MTG CORD CODE	HANDSET CORD CODE	BASE HANDSET JACK ADAPTER CODE	HAND TEL SET JACK ADAPTER CODE	METHOD OF PROVIDING TIP PARTY IDENT. GRD	
220A or 2220B	Large Handset Cord Jack With Code Stenciled Inside on Shell	AC1, AC1P	630A (AC1P)	H4DB	None	None	H5AA Cord	
		AD1	D5AL					
		AC1, AC1P	630A (AC1P)					
		AD2	D4BU	H4DU	231B (AD2)	227D	None Note 3	
		AC2, AC2P	630A (AC2P)					
220AM or 2220BM	227D Adapter in Handset Jack of a 220A or 2220B	AC1, AC1P	630A (AC1P)	H4DU	231B	227D†	Note 4	
		AD1	D5AL					
		AC1, AC1P	630A (AC1P)					
		AD2	D4BU	H4DU	None	227D†	None Note 3	
		AC2, AC2P	630A (AC2P)					
		AD2, AD3	D4BU					
220AL	LED Printed Under Finger-stop. 227D Adapter in Handset Jack	AC1, AC1P	630A (AC1P)	H4DU	231B	227D*	D-180824 Kit of Parts	
		AD1	D5AL					
		AC1, AC1P	630A (AC1P)					
		AD2	D4BU	H4DU	231B (AD2)			
		AC2, AC2P	630A (AC2P)					
		AD2, AD3	D4BU					
220B or 2220C (Early Version)	(4) Wire Springs in Handset Jack. Square Buttons (2220C) (Minimodular)	AC1, AC1P	630A (AC1P)	H4DU	231B	None	D-180825 Kit of Parts Note 2	
		AD1	D5AL					
		AC1, AC1P	630A (AC1P)					
		AD2	D4BU	H4DU	231B (AD2)			
		AC2, AC2P	630A (AC2P)					
		AD2, AD3	D4BU					
220C, 226A, 2220C (Late Version) or 2226A	LED Printed under Finger-stop (220C and 226A) Square Buttons on Dial (2220C and 2226A) (Minimodular)	AC1, AC1P	630A (AC1P)	H4DU	231B	None		D-180825 Kit of Parts Note 2
		AD1	D5AL					
		AC1, AC1P	630A (AC1P)					
		AD2	D4BU	H4DU	231A (AD2)			
		AC2, AC2P	630A (AC2P)					
		AD2, AD3	D4BU					

\* Factory installed.

† Field or service center installed.

- Notes:
1. All TRIMLINE components and apparatus are ordered separately.
  2. The 220B and 2220C (early version) do not require the 282A adapter.
  3. This combination of components can not be wired for tip party identification.
  4. 227D adapter must be removed for tip party identification.

♦TABLE C♦

**CONNECTIONS FOR INDIVIDUAL AND 2-PARTY SERVICE WITH 220A, 220AM, 2220B  
AND 2220BM HAND TELEPHONE SETS (SEE READ 1.01) (NOTE 2)**

WIRE OR LEAD	LEAD DESIG	COLOR	INDIV OR BRIDGED (NOTE 1)	RING PARTY (NOTE 1)	TIP PARTY	
					NO IDENT GRD (NOTE 1)	WITH IDENT GRD* (NOTE 1)
Inside Wire at 42A or 625-Type Conn. Block (AD1, AD2, or AD3)	Tip	G	G	G	G	G
	Ring	R	R	R	R	R
	STA GRD and TRNSF	Y	Y	Y	Y	Y
	TRNSF	BK	B	B	B	B
Inside Wire at 630A Conn. Block (AC1P or AC2P)	Tip	G	1	1	1	1
	Ring	R	2	2	2	2
	STA GRD and TRNSF	Y	3	3	3	3
	TRNSF	BK	4	4	4	4
Inside Wire at Term. Board (AC1 or AC2)	Tip	G	L1	L1	L2	L2
	Ring	R	L2	L2	L1	L1
	STA GRD and TRNSF	Y	3	3	3	3
	TRNSF	BK	1	1	1	1
Mtg Cord Jack or 523-Type Plug Leads at Term. Board (AD1, AD2, AD3, AC1P, or AC2P)	Tip	G	L1	L1	L2	L2
	Ring	R	L2	L2	L1	L1
	TRNSF	Y	3	3	3	3
	TRNSF	BK	1	1	1	1
Ringer (Note 1)	—	BK	L1	3	3	3
Strap from A of Term. Bd.	—	BK	L2	L2	L2	A
Handset Cord Jack Leads in Base (2220B and 2220BM only)	Tip	G	F	F	C	C
	Ring	R	C	C	F	F
	TRNSF	Y	3	3	3	3
	TRNSF	BK	4	4	4	4

\* 220AM and 2220BM handsets cannot be used for tip party with identifying ground.

Note 1: Disconnect, insulate and store (S) lead from terminal B when H5AA handset cord is used and tip party identifying ground is not provided.

Note 2: AC2, AC2P, and AD3 telephone bases can not be used with 220A, 220AM, 2220B, and 2220BM hand telephone sets for this service.

Caution: Do not store spade-tipped leads under terminal board mounting screws.



♦TABLE D♦

CONNECTIONS FOR INDIVIDUAL AND 2-PARTY SERVICE WITH 220B, 220C, 220AL, 226A, 2220C, AND 2226A HAND TELEPHONE SETS (SEE READ 1.01)

WIRE OR LEAD (NOTE 1)	LEAD DESIG	COLOR	INDIV OR BRIDGED	RING PARTY	TIP PARTY			
					NO IDENT GRD	WITH IDENT GRD		
						BASE TERM BD.	TERM. BD. D-180824 (FIG. 31) D-180825 (FIG. 30)	HANDSET TERM. (NOTES 2, 4, 5 AND 6)
Inside Wire at 42A or 625-Type Conn. Blk. (AD1, AD2, or AD3)	Tip	G	G	G	G	G†	—	—
	Ring	R	R	R	R	R†	—	—
	GRD	Y	Y	Y	Y	Y†	—	—
	—	BK	B	B	B	B†	—	—
Inside Wire at 630A Conn Blk (AC1P or AC2P)	Tip	G	1	1	1	1†	—	—
	Ring	R	2	2	2	2†	—	—
	GRD	Y	3	3	3	3†	—	—
	—	BK	4	4	4	4†	—	—
Inside Wire at Term. Board (AC1 or AC2)	Tip	G	L1	L1	L2	L2	—	—
	Ring	R	L2	L2	L1	L1	—	—
	GRD	Y	3	3	3	3	—	—
	—	BK	1	1	1	1	—	—
Mtg Cord Jack or 523-Type Plug Leads at Term. Board (AD1, AD2, AD3, AC1P, AC2P)	Tip	G	L1	L1	L2	L2	—	—
	Ring	R	L2	L2	L1	L1	—	—
	GRD	Y	3	3	3	3	—	—
	—	BK	1	1	1	1	—	—
Ringer	—	S or BL (Note 2)	B	B	B	—	3	—
		BK	L1	3	3	3	—	—
Line Switch	—	BR	C	C	C	(220B, C(220C, 220AL) &(226A)	1(2220C) &(2226A)	—
Handset Cord, Jack Leads in Base	Tip	G	F	F	F	F	—	—
	Ring	R	C	C	C	(220B, C(220C, 220AL) &(226A)	2(2220C) &(2226A)	—
	PTY Ident	Y or W (Note 2)	3	3	3	—	4	—
	PTY Ident	BK	4	4	4	—	5	—
Strap From A of Term. Bd.	Strap	BK	L2	L2	L2	A	—	—

◆TABLE D (Contd)◆

**CONNECTIONS FOR INDIVIDUAL AND 2-PARTY SERVICE WITH 220B, 220C, 220AL, 226A,  
2220C, AND 2226A HAND TELEPHONE SETS (SEE READ 1.01)**

WIRE OR LEAD (NOTE 1)	LEAD DESIG	COLOR	INDIV OR BRIDGED	RING PARTY	TIP PARTY			
					NO IDENT GRD	WITH IDENT GRD		
						BASE TERM BD.	TERM. BD. D-180824 (FIG. 31) D-180825 (FIG. 30)	HANDSET TERM. (NOTES 2, 4, 5 AND 6)
Handset Cord Jack Leads in Handset (Note 2)	Tip	G	—	—	—	—	—	—
	Ring	R	—	—	—	—	—	—
	PTY Ident	Y or W	*	*	*	—	—	A
	PTY Ident	BK	*	*	*	—	—	B or 4

\* Insulated and stored, 220B and 2220C (early version only).

† Connecting block terminals.

**Notes:**

1. If AC1, AC1P, AD1 or AD2 bases are provided, a 231B adapter is required (ordered separately).
2. Handsets must be opened to wire for tip party with identifying ground, refer to Section 502-303-102.
3. For bases dated prior to 10-1-72 see READ in 1.01 and note under Table A.
4. The D-180824 Kit of Parts (ordered separately) is used with the 220AL hand telephone set only.
5. The terminal board only of the D-180825 Kit of Parts (ordered separately) is used with the 220B(MD) and early version 2220C hand telephone sets.
6. The 282A adapter and terminal board of the D-180825 Kit of Parts is required for the 220C, 226A, 2226A, and later version of 2220C hand telephone sets.

**Caution:** Do not store spade-tipped leads under terminal board mounting screw.

♦TABLE E♦

**CONNECTIONS FOR 4-PARTY FULL SELECTIVE OR 8-PARTY SEMISELECTIVE  
RINGING USING D-180697 KIT OF PARTS WITH 220A, 220AM, 2220B,  
OR 2220BM HAND TELEPHONE SETS (SEE READ IN 1.01)**

WIRE OR LEAD	LEAD DESIG	COLOR	-RING	-TIP	+RING	+TIP
Inside Wire at 42A or 625-Type Conn Blk (AD1, AD2, AD3)	Tip	G	G	G	G	G
	Ring	R	R	R	R	R
	STA GRD and TRNSF	Y	Y	Y	Y	Y
	TRNSF	BK	B	B	B	B
Inside Wire at 630A Conn Blk (AC1P, AC2P)	Tip	G	1	1	1	1
	Ring	R	2	2	2	2
	STA GRD and TRNSF	Y	3	3	3	3
	TRNSF	BK	4	4	4	4
Inside Wire at Term. Board (AC1, AC2)	Tip	G	L1	L1	L1	L1
	Ring	R	L2	L2	L2	L2
	TRNSF	Y [W]	3	3	3	3
	TRNSF	BK	1	1	1	1
Mtg Cord Jack or 523-Type Plug Leads at Term. Board (AD1, AD2, AD3, AC1P, AC2P)	Tip	G	L1	L1	L1	L1
	Ring	R	L2	L2	L2	L2
	TRNSF	Y [W]	3	3	3	3
	TRNSF	BK	1	1	1	1
Ringer		R	3	3	L2	L1
		BK	K	K	K	K
		S	B	B	B	B
		S-R	G	G	G	G
D-180697 Kit of Parts (426N Diode)	†		L2	L1	3	3
	‡		G	G	G	G
Strap From A		BK	3	3	L2	L1
Line Switch		S	*	*	*	*

*Caution: Do not store spade tipped leads under terminal board mounting screws*

[ ] early model bases (Dated prior to 10-1-72)

\* Insulate and store.

† Lead on Flanged (Gold) base end.

‡ Lead on Knob end (housing tip).

♦TABLE F♦

**CONNECTIONS FOR 4-PARTY FULL SELECTIVE OR 8-PARTY SEMISELECTIVE RINGING USING  
D-180697 KIT OF PARTS 220B, 220C, 220AL, 226A, 2220C, AND 2226A  
HAND TELEPHONE SETS (SEE READ IN 1.01)**

WIRE OR LEAD	LEAD DESIG	COLOR	-RING	-TIP	+RING	+TIP
Inside Wire at 42A or 625-Type Conn Blk (AD1, AD2, AD3)	Tip	G	G	G	G	G
	Ring	R	R	R	R	R
	STA GRD	Y	Y	Y	Y	Y
	Spare	BK	B	B	B	B
Inside Wire at 630A Conn Blk (AC1P, AC2P)	Tip	G	1	1	1	1
	Ring	R	2	2	2	2
	STA GRD	Y	3	3	3	3
	Spare	BK	4	4	4	4
Inside Wire at Term. Board (AC1, AC2)	Tip	G	L1	L1	L1	L1
	Ring	R	L2	L2	L2	L2
	STA GRD	Y [W]	3	3	3	3
	Spare	BK	1	1	1	1
Mtg Cord Jack or 523-Type Plug Leads at Term. Board (AD1, AD2 AD3, AC1P, AC2P)	Tip	G	L1	L1	L1	L1
	Ring	R	L2	L2	L2	L2
	STA GRD	Y [W]	3	3	3	3
	Spare	BK	1	1	1	1
Ringer		R	3	3	L2	L1
		BK	K	K	K	K
		S	B	B	B	B
		S-R	G	G	G	G
D-180697 Kit of Parts (426N Diode)	†		L2	L1	3	3
	‡		G	G	G	G
Strap from A	—	BK	3	3	L2	L1
Line Switch	—	S	*	*	*	*

*Caution: Do not store spade tipped leads under terminal board mounting screws.*

[ ] early model bases (Dated prior to 10-1-72)

\* Insulate and store.

† Lead on Flanged (Gold) base.

‡ Lead on Knob end (housing tip).

♦TABLE G♦

CONVERSION FOR 1A1, 1A2, AND 6A KTS  
WITHOUT DIAL LIGHT USING 220A, 220AM,  
2220B, OR 2220BM HAND TELEPHONE SET  
(FIG. 33) (SEE READ IN 1.01)

WIRE OR LEAD	COLOR	TERMINAL BOARD	
		REMOVE FROM	CONNECT TO
Line Switch	BR	C	3
	S	A	C
	Y	L2	1
Hand Tel Set Cord Jack in Base	R	C	L2
	Y	3	*
	BK	4	*

\* Insulate and store.

♦TABLE H♦

CONVERSION OF AD2 OR AD3 BASES FOR 1A1, 1A2, OR 6A KTS  
WITH DIAL LIGHT USING 220A, 220AM, 2220B, OR 2220BM  
HAND TELEPHONE SET (FIG. 34) (SEE READ IN 1.01)

WIRE OR LEAD	LEAD DESIG	COLOR	74D CONN BLK TERM. BD	BASE TERM. BOARD	
				REMOVE FROM	CONNECT TO
Inside Wire at 74D Conn Blk	Tip		1		
	Ring		2		
	TRNSF		3		
	TRNSF		4		
	A		6		
	A1		5		
623T6 Jack (Note)		R			L2
		G			L1
		Y			3
		BK			1
		BL			B
		W			G
Line Switch	A1	BR		C	B
	A	Y		L2	G
		S		A	C
Ringer		S		B	*
		S-R		G	*
Strap		BK		A	L2
Handset Cord Jack in Base		R		C	L2
		W		B	†

\* Insulate and store.

† Insulate and store (AD2 only).

Note: The 623T6 jack and D6AM mounting cord must be ordered separately.

♦TABLE I♦

CONVERSION FOR 1A1, 1A2, AND 6A KTS  
USING 220B, 220C, 220AL, 226A, 2220C,  
OR 2226A HAND TELEPHONE SET (FIG. 32)  
(SEE READ IN 1.01)

WIRE OR LEAD	COLOR	TERMINAL BOARD	
		REMOVE FROM	CONNECT TO
Line Switch	BR	C	3
	S	A	C
	Y	L2	1
Handset Cord Jack in Base	R	C	L2

♦TABLE K♦

CONNECTIONS FOR MESSAGE WAITING  
LAMP AND DIAL LIGHT FEATURES FOR  
NONKEY SYSTEM APPLICATION  
(220A AND 2220B ONLY)  
(SEE READ IN 1.01)

WIRE OR LEAD	COLOR	TERMINAL BOARD	
		REMOVE FROM	CONNECT TO
Handset Cord Jack Leads (Note)	G	F	L1
	W	B	L2

*Note:* Install H5AD handset cord in AC1, AC1P, AD1, or AD2.

♦TABLE J♦

D-180788 POLARITY GUARD ASSEMBLY  
CONNECTIONS (AC- OR AD-TYPE) TELEPHONE  
BASE AND (2220B OR 2220BM ONLY) HAND  
TELEPHONE SETS (SEE NOTE)  
(SEE READ IN 1.01)

WIRE OR LEAD	COLOR	REMOVE FROM	CONNECT TO	
		TERM. BOARD	POLARITY GUARD ASSY	TERM. BOARD
Handset Cord Jack in Base	R	C	Term. C	
	G	F	Term. F	
Polarity Guard Assembly	R			C
	G			F

*Note:* For use when specified by local instructions for end-to-end signaling installation.

♦TABLE L♦

CONVERSION FOR DATA APPLICATIONS FOR  
220A, 220AM, 2220B, OR 2220BM  
HAND TELEPHONE SETS  
(SEE READ IN 1.01)

WIRE OR LEAD	COLOR	TERMINAL BOARD	
		REMOVE FROM	CONNECT TO
Handset Cord Jack Leads	Y	3	*
	BK	4	*

\* Insulate and store.