832- AND 2832-TYPE TELEPHONE SETS

IDENTIFICATION, INSTALLATION, CONNECTIONS, AND MAINTENANCE

1. GENERAL

1.01 This section contains information for the 832- and 2832-type telephone sets. The 832- (rotary) and 2832- (TOUCH-TONE® service) type telephone sets are special plug-ended, 10-, 11-, or 13-button key telephone sets initially designed for use with the 7A Communication System (COM KEY* 718). These sets also may be used with the 21A Communication System (COM KEY* 2152). For information on COM KEY Systems, refer to appropriate section in Division 518.

1.02 This section is reissued to:

- Add information on automatic and manual DO-NOT-DISTURB feature

- Add D-180990 Kit of Parts, for 4-wire service

- Add D-180883 Kit of Parts, for Electromagnetic Interference (EMI).

2. IDENTIFICATION

2.01 The 832BM (Fig. 1), 2832BM, 832CM, and 2832CM (Fig. 2) are modular type telephone sets and will replace the 832B, 2832B, 832C, and 2832C telephone sets, respectively, which are hereby rated MD. The 832DM, 2832DM, 832EM, and 2832EM are also modular sets and are electrically and functionally equivalent to the 832BM, 2832BM, 832CM, and 2832CM sets, respectively, except that they have been adapted for wall mounting. The modular sets will all be equipped with a G15A-50 handset and H4DU-50 handset cord which will plug into a 616T jack mounted on the left front of the telephone set base (Fig. 3). Current production models of these sets also are equipped with an improved line switch and an improved Automatic Button Restoral (ABR) feature. Some early production BM and CM sets were not so equipped.

*Trademark of AT&T Company.

2.02 The 832A (MD) and 2832A (MD) are 10-button telephone sets equipped with a 647G5 key consisting of a Hold button, seven line buttons, and two intercom buttons. There is an apparatus blank to the right of the dial which may be removed to mount a 651C key for RING TRANSFER, a 651D key for Privacy Release (PRIV RLS) or a 651F key for RECALL. If required the privacy circuit board can be field installed.

2.03 The 832B (MD), 832BM or 832DM and 2832B (MD), 2832BM, or 2832DM telephone sets are 11-button sets similar to the 832A and 2832A sets, respectively, except that the eleventh button, to the right and below the key assembly is equipped in the factory for RECALL. This key takes the amber key cap provided. PRIV RLS and RING TRANSFER features *cannot* be provided in the 832B, BM, DM and 2832B, BM, DM telephone sets. If required the privacy circuit can be field installed.

2.04 The 832C (MD), 832CM, or 832EM; 2832C (MD), 2832CM, or 2832EM; and 13-button telephone sets equipped with the 647G5 key and also a 647S5 key with buttons for RECALL, PRIV RLS, and RING TRANSFER. The remainder of the top key space is blocked off by a collar assembly. These sets are also equipped and factory wired with the privacy circuit.

2.05 The DM and EM (wall type) sets and BM and CM (desk type) sets are not interchangeable due to the mechanical changes in the handset hanger and the new 6C1-50 housing.

2.06 An adapter (833A-50) will be furnished with each DM and EM telephone set for wall mounting. The switchhook of these sets has been designed to hang vertically to the left of the housing. The sets are equipped with a hard-wired mounting cord which can be coiled up and concealed in the adapter or the cord can be extended down the wall through a notch in the adapter for termination to appropriate connector-ended cable.

HOLD
BUTTON

CO/PBX
LINE BUTTONS

INTERCOM
BUTTONS

HANDSET

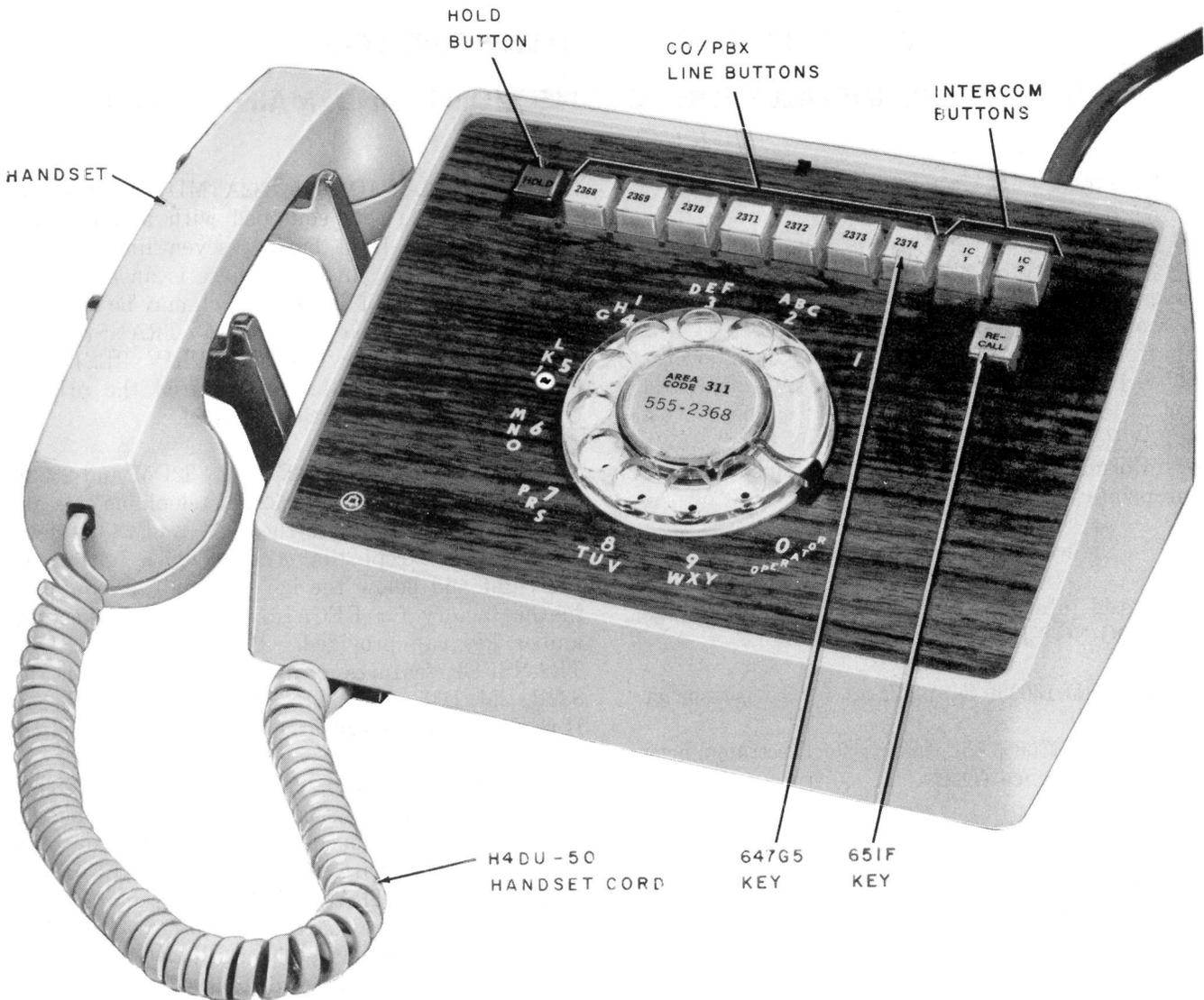H4DU-50
HANDSET CORD

647G5
KEY

651F
KEY

Fig. 1—832BM Telephone Set

All maintenance can be performed on internal components of these sets without removing the set from the wall

2.07 All of the 832- and 2832-type sets provide the same basic services such as pickup, hold, button illumination, and intercom. They are equipped with a loudspeaker to provide tone and voice signaling. The level of the tone is adjusted by a volume control knob located under the right side of housing. Two or more CO/PBX lines may be conferenced by simultaneously depressing the buttons associated with the lines to be conferenced. The

two intercom lines may also be conferenced. Intercom and CO/PBX lines cannot be conferenced. Automatic button restoration restores all depressed buttons to the unoperated position when the handset is replaced.

2.08 Multiline conferencing is a feature of these telephone sets. Since there is no amplification involved, this type conferencing is limited. When lines are conferenced, using this manner of conferencing, distant stations may have trouble hearing each other, transmission is not guaranteed.

647S5 KEY   647G5 KEY   COLLAR ASSEMBLY

Fig. 2—2832CM Telephone Set

Note: ♦When a telephone set is modified for 4-wire service, multibutton conferencing between 4-wire and 2-wire systems is not recommended.◄

2.09 The 832- and 2832-type telephone sets may be used with either the 3-type (MD) or 4A speakerphone system.

The limited number of mounting cord conductors places a restriction on the location of speakerphone components unless it is desired to give up one pickup line. Refer to Section

512-620-487 or 512-740-471 for connection information for the 3-type (MD) or 4A speakerphone system, respectively.

2.10 Current 832- and 2832-type telephone sets are available in ivory (-50) only. These sets will be shipped with a disposable faceplate. It will be necessary to order a faceplate separately (Table A).

2.11 Any station set may be optionally wired to ring on **one** CO/PBX line only, or for common audible ringing.

MOUNTING SCREWS

PRIVACY BOARD
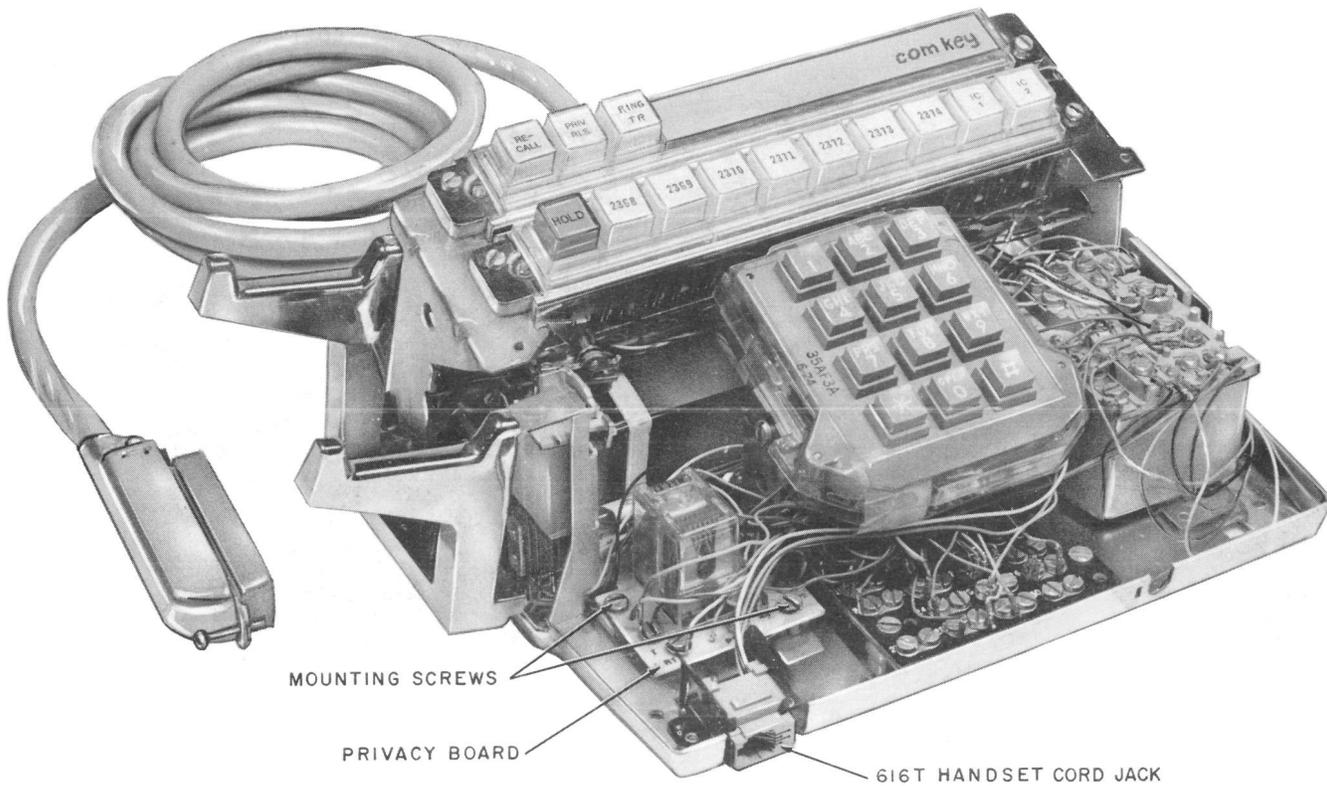
616T HANDSET CORD JACK

Fig. 3—2832CM Telephone Set Base

When common audible ringing is wired to a station other than the attendant station (Code 0), that station cannot have the ring transfer option.

Ordering Guide

2.12 For telephone set, faceplate, and replaceable component ordering guide, refer to Table A. See Table B for color ordering information.

2.13 The following optional apparatus may be associated with desk type 832 and 2832 sets (order as required):

- Kit of Parts, D-180656 (to provide a wall shelf mounting arrangement) consists of the following:

  1—840362446 shelf

  1—840362479 clamp

1—801812553 screw

Note: If a (wall type) set is to be installed, a DM or EM code set is available.

- Diode, 533K or equivalent (order one for each rotary dial station to be restricted)

- 4A Speakerphone (order one each of the following for each station to be equipped with speakerphone).

Loudspeaker, 108AA-†‡ (includes 7-foot D20N mounting cord)

Transmitter, 680AE-†‡ (includes 7-foot D8S mounting cord)

Adapter, 223D-49 (includes 7 foot M16H and 25 foot M2FG cord)

Unit, Power, 85B1-49

● Ringer, E1C (MD) or E1CM (one for each CO/PBX line to be wired for power failure transfer).

● ‣Key, 688A (manual do-not-disturb option). This key is intended for use with the 7A communication system. It can also be used with 21A communication system at stations not equipped with the HFAI option.

● Kit of Parts, D-180990 (4-wire interface for the 7A and 21A Communication System) consists of the following:

    1—842533440 relay assembly

    1—801809245 (P-180924), 4-40 by 5/16-in. BHM screw

    1—801682956 (P-168295), 6-40 by 5/16-in. BHM screw (not required for these sets).◀

2.14 The following optional apparatus will only be used with the 832A or 2832A telephone sets (except as noted).

● D-180487 (A&M Only) Kit of Parts (RING TRANSFER) order one only per system if the attendant station is to be equipped for ring transfer.

● D-180488 (A&M Only) Kit of Parts (PRIV RLS) order one for each station to be equipped for privacy release.

● D-180591 Kit of Parts (RECALL) order one for each station to be equipped for recall.

Note: Only one of the previously listed features can be provided.

● D-180486 Kit of Parts (Privacy Circuit Board), order one for each station to be locked out. Can be added to the 832A, 832B, BM, DM, 2832A, 2832B, BM, or DM telephone set.

† Add Color Suffix.

‡ The transmitter and loudspeaker set will be shipped in one of five promoted colors, Black (-03), Ivory (-50), Green (-51), White (-58), and Light Beige (-60).

● Transmitter, 683AE-50 (for HFAI feature of COM KEY 2152) also includes a DO-NOT-DISTURB Switch

● Adapter, 268A (for mounting 683AE-50 transmitter when using DM or EM type telephone sets).

3. INSTALLATION AND CONNECTIONS

3.01 Install telephone sets at desired locations, making sure that any options are installed before telephone set is connected. See Fig. 7 through 16 for schematics of 832A, 2832A, 832B, BM, DM, 2832B, BM, DM, 832C, CM, EM, 2832C, CM, or EM telephone sets, respectively.

3.02 All DM and EM (wall type) sets are shipped with an 833A-50 adapter, screw, and clip (Fig. 4) which are used for mounting the telephone set to a vertical surface. Install the 833A-50 adapter and telephone set as follows.

(1) Mount the adapter to the wall or vertical surface as shown in Fig. 4, using appropriate fasteners (Section 080-720-105). If the mounting cord is to be dressed down the wall, it is necessary to pass the cord through the notch in the adapter before final attachment of the adapter to the wall (Fig. 5). If the cabling enters through the wall, the mounting cord may be contained within the adapter.

(2) Remove faceplate and housing from telephone set.

(3) Hang the telephone set on the adapter from the headed rivets that protrude from the base pan (Fig. 5).

Note: It may be necessary to slightly bend the top slotted portion of the adapter so the headed rivets of the base pan will align properly.

(4) Secure the telephone set base with the clip and screws at the bottom of the adapter (Fig. 4).

(5) Install the telephone set options (see paragraph 3.04).

(6) Replace housing and faceplate.

683AE TRANSMITTER

268A ADAPTER

MOUNTING HOLES FOR
STANDARD MOUNTING
ARRANGEMENTS

MOUNTING HOLES
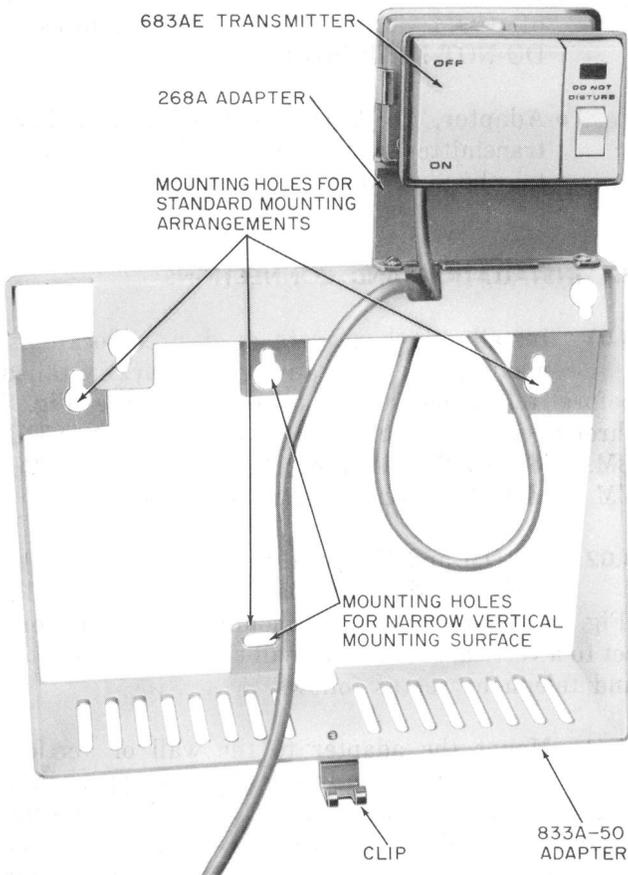FOR NARROW VERTICAL
MOUNTING SURFACE

CLIP

833A-50
ADAPTER

Fig. 4—833A-50 Adapter With 268A Adapter and 683AE Transmitter

3.03 A D-180656 Kit of Parts may be ordered separately for shelf mounting of all BM or CM sets. The 840362446 shelf should be mounted to a wall or vertical surface and, after placing the telephone set on the shelf, secure set with retainer clamp and screw furnished with the shelf. Refer to paragraph 2.13 for ordering information.

3.04 To install telephone set options, the faceplate and housing must be removed and the dial lifted from its mounting brackets. Use a KS-21107 type releaser or equivalent to release the faceplate catch.

Caution: The ten button key in this set is equipped with special low-friction plastic parts. Special care is required when removing or replacing these keys to avoid cracking or breaking the plastic hooked end of the latchbar

projecting from the end of the key. When removing a key, avoid twisting or distorting the hook. When installing a key, make sure the hook is properly engaged over the edge of the pivot arm before tightening the mounting screws of the key.

Caution: When making wiring changes in this set involving adding or moving spade-tipped leads on the terminal board (e.g., privacy option), extreme care must be taken to prevent shorting between terminal positions. Check for clearance before reinstalling the dial.

If telephone set is to be used at attendant station (Code 0) without ring transfer, remove (V-BR) lead from telephone set terminal 28; insulate and store. Otherwise the lamp under HOLD key will be lighted at all times.

3.05 Options are installed as follows:

(a) *Station Restriction (832-type telephone set):*

(1) Install 533K diode between network terminals RR and F. Terminate negative lead of diode on terminal F, with positive lead on terminal RR.

(2) On telephone set terminal board, move (G) lead from terminal 22 to 4, and (R) lead from terminal 4 to 22.

(b) *Station Restriction (2832-type telephone set):* On telephone set terminal board, move (G) lead from terminal 22 to 4, and (R) lead from terminal 4 to 22.

(c) *Privacy Circuit (D-180486 Kit of Parts) 832A, 2832A, 832B, BM, DM, 2832B, BM, or DM telephone set:*

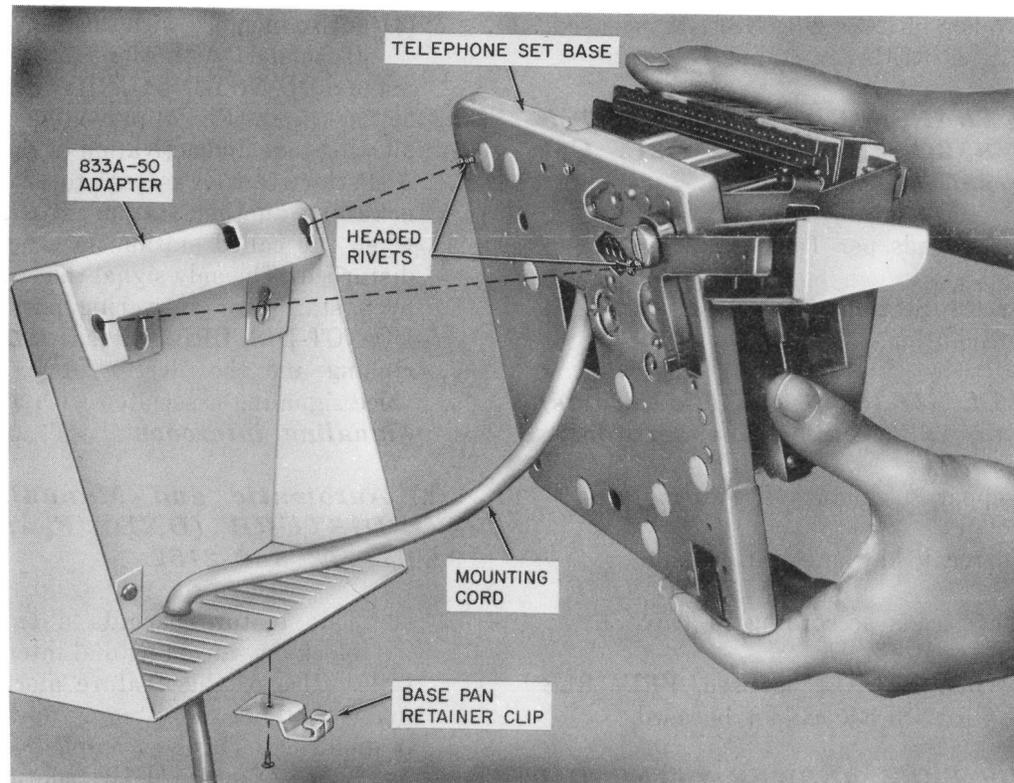(1) Mount privacy circuit board on the two standoffs located at left front of the telephone set base (Fig. 3).

Fig. 5—Mounting Telephone Set Base onto 833A-50 Adapter

(2) Fasten circuit board to standoffs using mounting screws furnished with the telephone set.

(3) Connect leads according to Table C.

(4) Refer to paragraph 3.06 for testing the privacy release key.

(d) **Privacy Circuit (D-180486 Kit of Parts) disabling, 832-type telephone sets:** Remove (O) and (BK) leads of Privacy Circuit from telephone set terminal 8 and 12, respectively, and insulate and store, see Table E.

(e) **PRIV RLS (D-180488 Kit of Parts) 832A or 2832A sets only:**

(1) Pry apparatus blank off locating pins.

(2) Press PRIV RLS key on locating pins.

(3) Connect leads according to Table D.

(4) Refer to paragraph 3.06 for testing the privacy release key.

Note: When PRIV RLS is used, RING TRANSFER or RECALL feature cannot be used.

(f) **To Disable PRIV RLS Key:** Move (O-BK) lead of privacy release key from telephone set terminal 10 to 15, see Table F.

(g) **RING TRANSFER (D-180487 Kit of Parts) 832A or 2832A telephone sets attendant station (Code 0) only:**

(1) Pry apparatus blank off locating pins.

(2) Press ring transfer key on locating pins.

(3) Connect leads according to Table H.

(4) Refer to Section 518-450-100 for KSU strap addition.

Note: When RING TRANSFER is used, PRIV RLS or RECALL cannot be used.

(h) **RING TRANSFER (Position 3 of Top Key) 832C, CM and 2832C, CM telephone set.**

(1) Connect leads per Table I.

(2) Refer to Section 518-450-100 for KSU strap addition.

(i) **RECALL (D-180591 Kit of Parts) 832A or 2832A telephone sets only:**

(1) Pry apparatus blank off locating pins.

(2) Press recall key on locating pins.

(3) Connect leads acccording to Table J.

Note: When RECALL is used, PRIV RLS or RING TRANSFER cannot be used.

(j) **HANDS FREE ANSWER INTERCOM (HFAI):**

(1) If feature is to be added to DM- or EM-type set, a 268A adapter must be used as follows:

(a) Mount 268A adapter onto 833A-50 adapter with two screws as shown on Fig. 4 with the tabs of the 268A adapter facing outward from the vertical surface. The 683AE-50 transmitter is secured by sliding the transmitter downward between the tabs on the adapter. The telephone set end of the transmitter cord enters the telephone set and is attached to the telephone set base at the small notch on the top edge of the base panel. The excess cord is stored in the 833A-50 adapter.

(2) For B, BM or C, CM (desk type) sets, the transmitter cord will enter at the rear of the set.

(3) Refer to Table K for connections.

Note: It may be necessary to slightly reduce the volume of the 683AE transmitter if distortion or feedback is noticed when the HFAI feature is used.

(4) ♦Also included with the 683AE transmitter (furnished with the HFAI feature) is a manual DO-NOT-DISTURB switch. Depression of the switch (Fig. 4) prevents voice signaling, alerting tone and activation of the microphone. A distinctive tone is sent to any station that is calling another station on *dial intercom* when the called station does not want to be disturbed. The only signal that can be received by a station or answering position with the DO-NOT-DISTURB switch activated are tone ringing and the alerting tone and one way voice signaling associated with an *automatic signaling intercom.*

(k) **Automatic and Manual DO-NOT-DISTURB (DND) Feature, COM KEY 718 and 2152.**

(1) This feature permits a station user to block any incoming dial intercom and DSS calls. Use of this feature alerts the calling party that the called party does not want to be disturbed. This is accomplished by returning an audible tone (500 Hz, continuous) to the calling party whenever either the automatic or manual DND feature is activated. In COM KEY 2152 System, a visual signal is also provided on the DSS console when the manual DND feature is in use. The COM KEY 2152 System currently provides a manual DND option but it is only available on station sets that are equipped with the HFAI option. The major difference between the automatiic and manual DND option is that automatic is activated only when the station set is off-hook, while the manual can be activated with the station on-hook or off-hook.

(2) Refer to (Fig. 17) for telephone set modification for automatic DND feature.

(3) Refer to Section 518-450-100 for necessary KTU and KSU connection information with the DND feature.

(4) For manual DND feature with these telephone sets, a 688A key must be ordered separately and installed as follows:

(a) Attach the key on the right side of the telephone set baseplate and under the set housing.

(b) Modify the telephone set wiring and terminate the spade-tipped key leads as shown in the appropriate modificatton table (Fig. 18).

(c) Refer to Section 518-450-100 for necessary KTU and KSU connection information with the DND feature.

(l) **Four-Wire Service (D-180990 Kit of Parts, Ordered Separately):**

(1) Mount the relay assembly in the front right-hand corner of the telephone set using mounting bracket and screws as shown in Fig. 6.

(2) Connect the relay spade-tipped leads as shown in Table L and Fig. 19.

Note: It will be necessary to run D-Station wire for 4-wire service due to insufficient mounting cord conductors.

(3) Refer to Section 518-450-100 for 7A and 518-450-110 for 21A communication system interconnecting wiring arrangement.

(m) **Electromagnetic Interference (EMI) D-180883 Kit of Parts (ordered separately).**

(1) An amplifier printed wiring board assembly, equipped with RFI suppression is available and is a direct replacement for the amplifier board furnished with these telephone sets.◀

3.06 *Privacy Circuit/Privacy Release Test.*

(a) Busy out a line using another station (Station X). At the set with the privacy circuit to be tested (Station Y), go off-hook on same line. Station Y should be locked out. Hang up Station Y.

(b) If Station X has a privacy release key, depress it. The lamp under the busy line will indicate it is on-hold. Station Y should now be able to pick up the line on hold. Release the privacy release key, Station X and Y should now be bridged. Hang up Station Y.

(c) If Station X does not have a privacy release key, or a privacy circuit, he can allow Station

Y in on the line by just placing the line on-hold by depressing the Hold button (this also releases the line button). Station Y should now be able to pickup the line on hold. Now depress the same button at Station X, the stations should be bridged. Hang up Station Y.

(d) If Station X does not have a privacy release key but does have a privacy circuit, he cannot allow Station Y to bridge onto the call without excluding himself.

(e) With the line still busied out by Station X and Station Y not bridged, depress a different line on Station Y and go off-hook. While holding that line button depressed bridge onto the line that was busied out by Station X. Station Y should be locked out of both lines.

3.07 When installing faceplate, insure that the collar is in place on the key. Place the tabs into slots in front of the faceplate opening in the housing and lower slowly over the dial and key collar until almost in place. Use a KS-21107 type releaser or equivalent to release the faceplate catch and seat the faceplate.

3.08 The 647G5 key uses key designation tabs form E-5837, E-6672, and the 647S5, 651-type keys use key designation tabs form E-6672. To install, squeeze sides of the cap and remove from key. Insert designation tabs and replace cap with locking tabs along the horizontal axis of the key.

3.09 For telephone set station number cards, use form E-10360, E-10364- §, or E-10368-§, for rotary dial sets and form E-10361, E-10365- §, or E-10369- § for TOUCH-TONE dial sets.

3.10 Refer to Fig. 7 through 16 for telephone set schematics.

3.11 Refer to Section 512-620-487 or 512-740-471 for connections to 3-type (MD) or 4A speakerphone systems, respectively.

3.12 Early version of 832- and 2832-type telephone sets were equipped with a D50AL mounting cord which require contact strips to be installed in the back of the keys. Current production 832- and 2832-type telephone sets are equipped with a D50AP mounting cord. The D50AP mounting cord
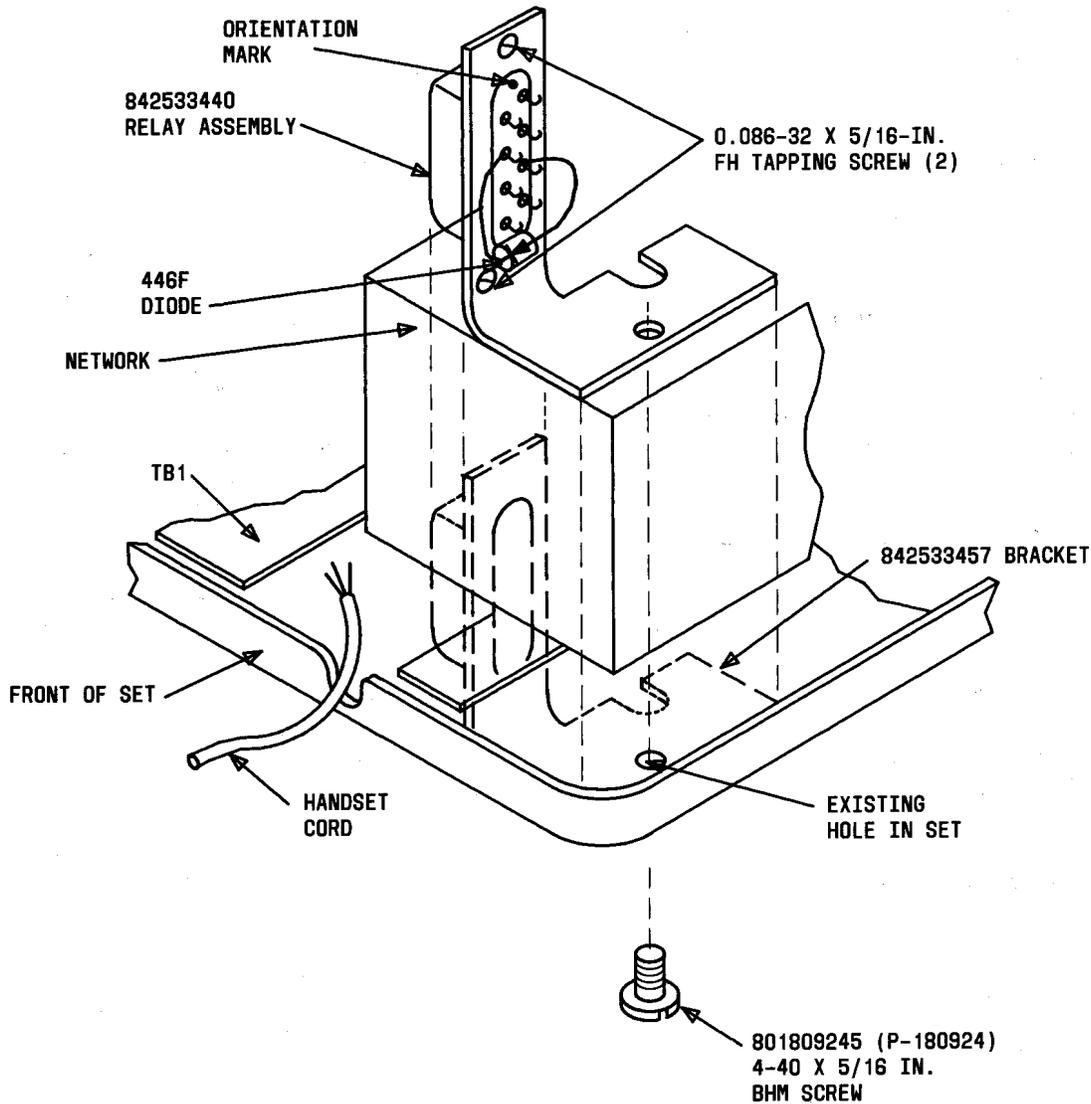
§ Requires that area code be added.

Fig. 6—▶Mounting Location for D-180990 Kit of Parts for 4-Wire Service◀

is a direct replacement for the D50AL mounting cord but does not require that contact strips be installed in the back of the keys.

Do not install contact strips in the back of the key when telephone sets are equipped with a D50AP mounting cord. Wires are factory provided in this cord from the key terminal plugs to the set terminal board. Use of contact strips may damage terminal plugs.

3.13 If Power Failure Transfer feature is to be provided, use an external ringer [E1C (MD) or E1CM] and connect as shown in Table G.

4. MAINTENANCE

4.01 Maintenance of the 832- and 2832-type telephone sets should be limited to checking for loose or broken connections and replacement of items listed under Ordering Guide table as replaceable components.

THINK ▶ *Telephone set should not be carried by the switchhook since this applies excessive strain to the line switch and could cause a trouble condition.*

4.02 The current production 647-type key has been modified for easy lamp replacement

by merely removing the lamp cap and inserting a 553-type tool through the hole in the top of the button. In early production keys, it is necessary to remove faceplate, key collar, and button for lamp replacement.

TABLE A

TELEPHONE SETS AND REPLACEABLE COMPONENTS—ORDERING GUIDE

TEL SET	BASE	HOUSING	DIAL	KEY	FACE-PLATE*	HAND-SET	HANDSET CORD	LAMP
832BM	832BM	832A-50	8CA	647G5 651F	832B-			
832CM	832CM	832A-50	8CA	647G5 647S5	833A-			
832DM	840998710	6C1-50	8CA	647G5 651F	832B-			
832EM	840998736	6C1-50	8CA	647G5 647S5	833A-			
2832BM	2832BM	832A-50	35AF3A	647G5 651F	2832B-	G15A-50	H4DU-50	51A
2832CM	2832CM	832A-50	35AF3A	647G5 647S5	2833A-			
2832DM	840998728	6C1-50	35AF3A	647G5 651F	2832B-			
2832EM	840998744	6C1-50	35AF3A	647G5 647S5	2833A-			

* See Table B for color suffix.

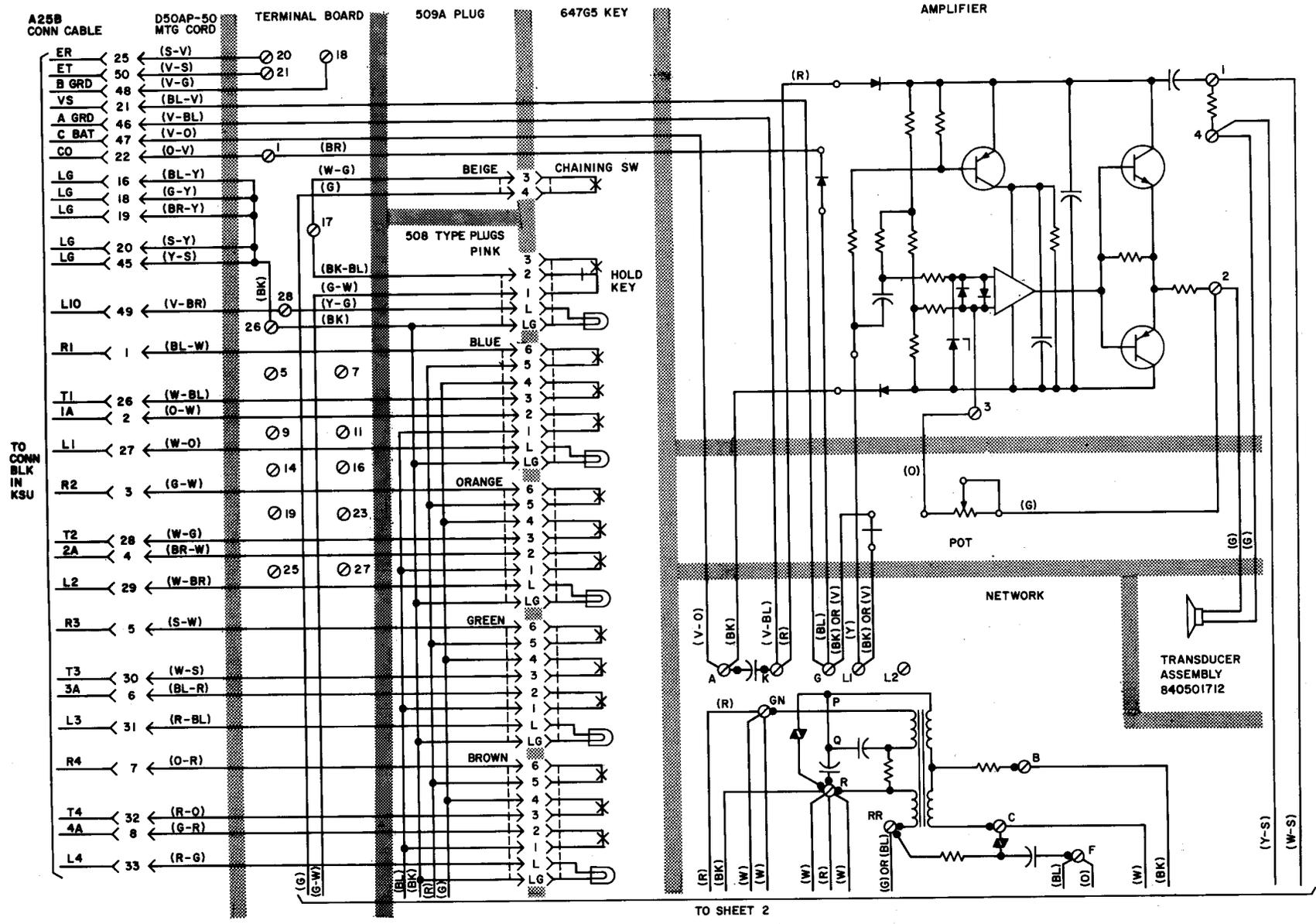Fig. 7—832A (MD) Telephone Set, Connections (Sheet 1 of 2)

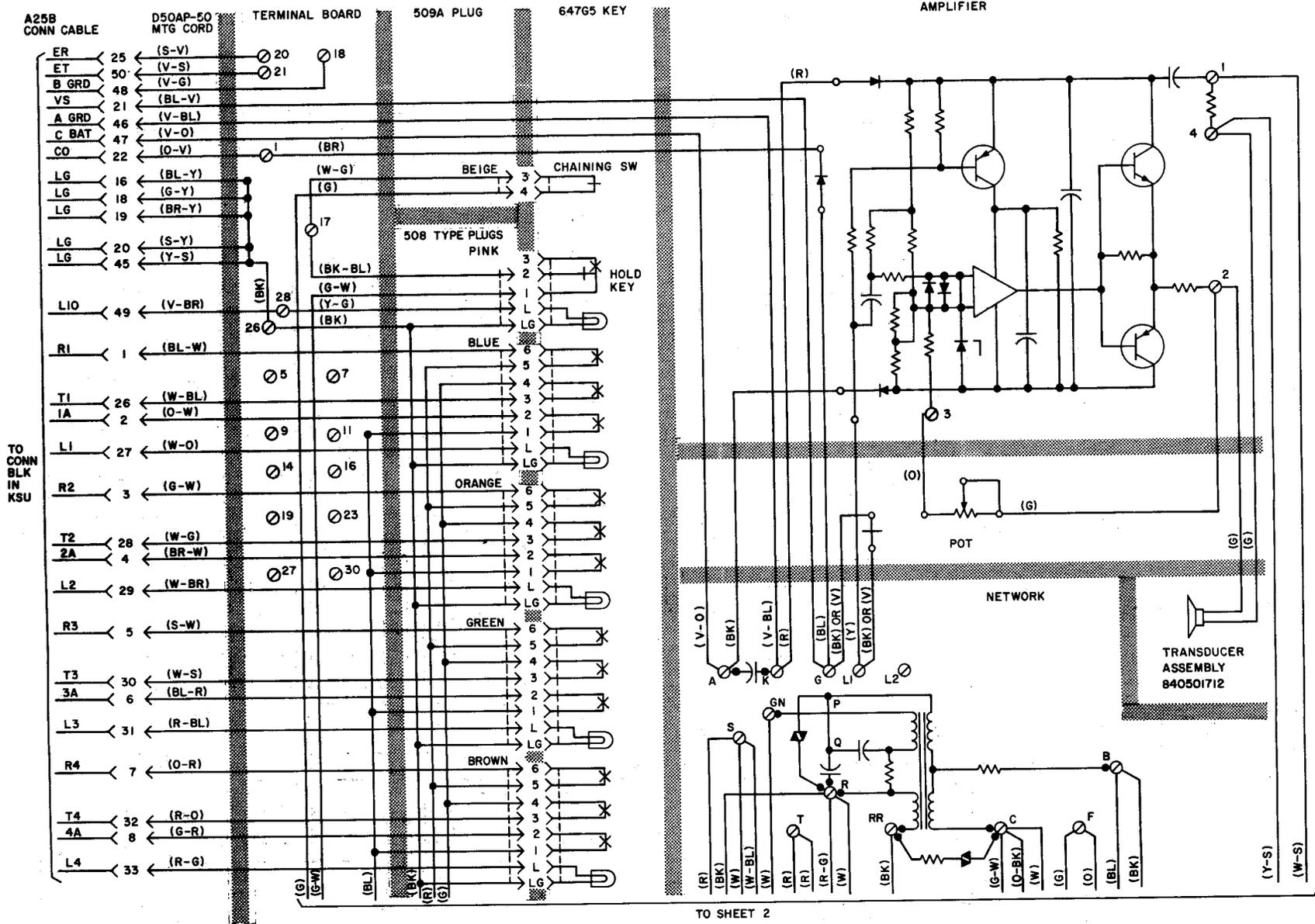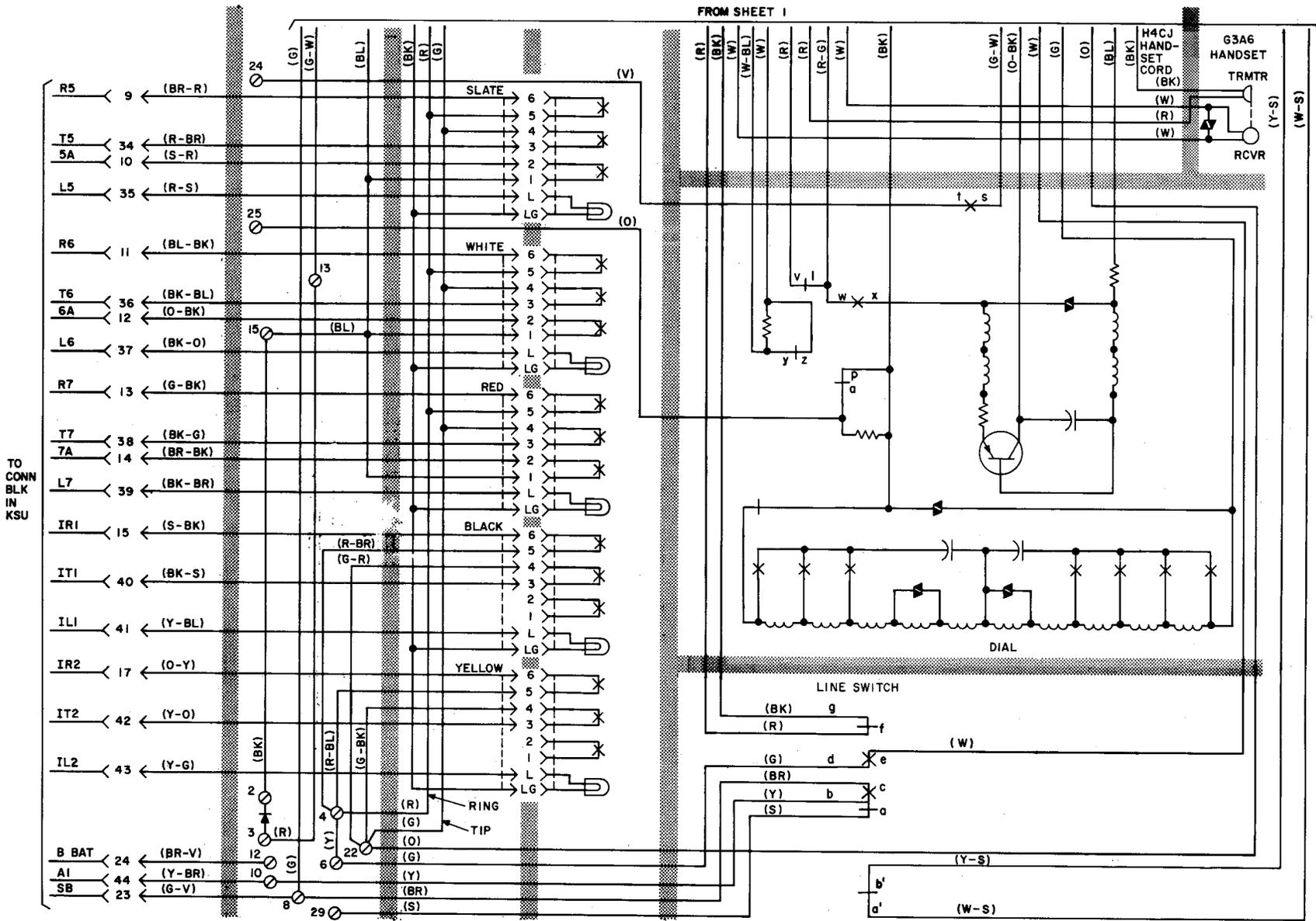**Fig. 7—832A (MD) Telephone Set, Connections (Sheet 2 of 2)**

Fig. 8—2832A (MD) Telephone Set, Connections (Sheet 1 of 2)

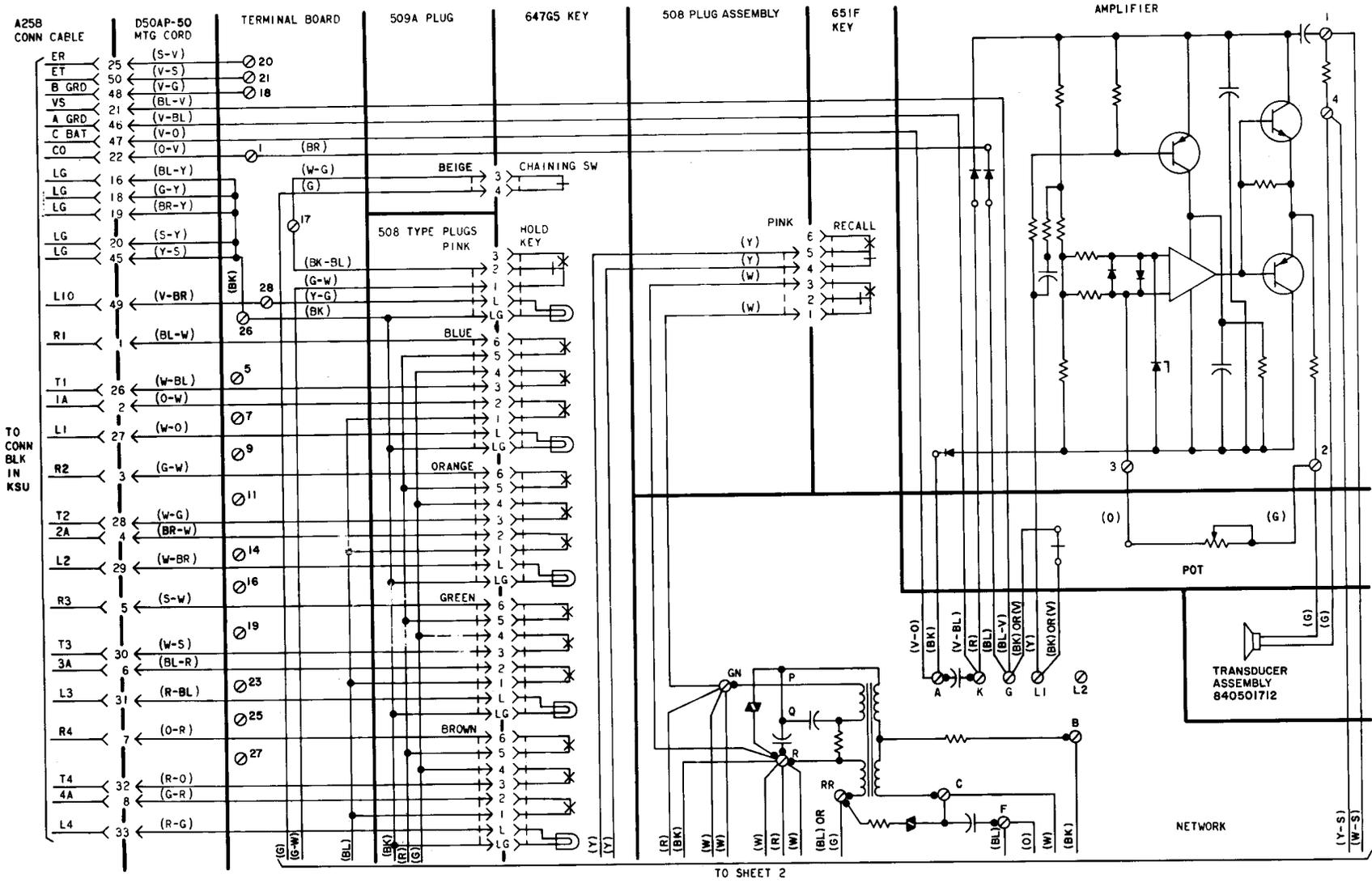Fig. 8—2832A (MD) Telephone Set, Connections (Sheet 2 of 2)

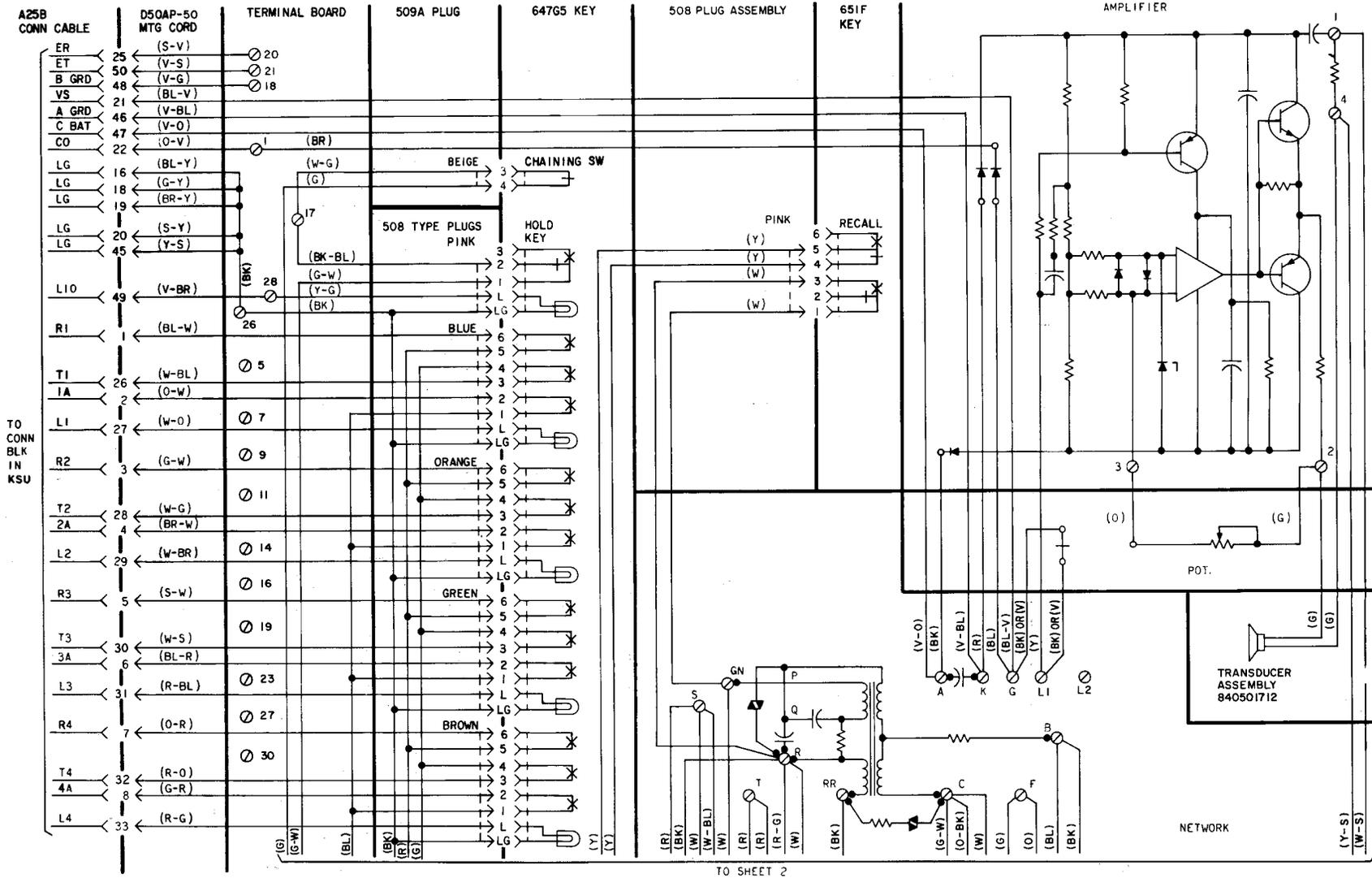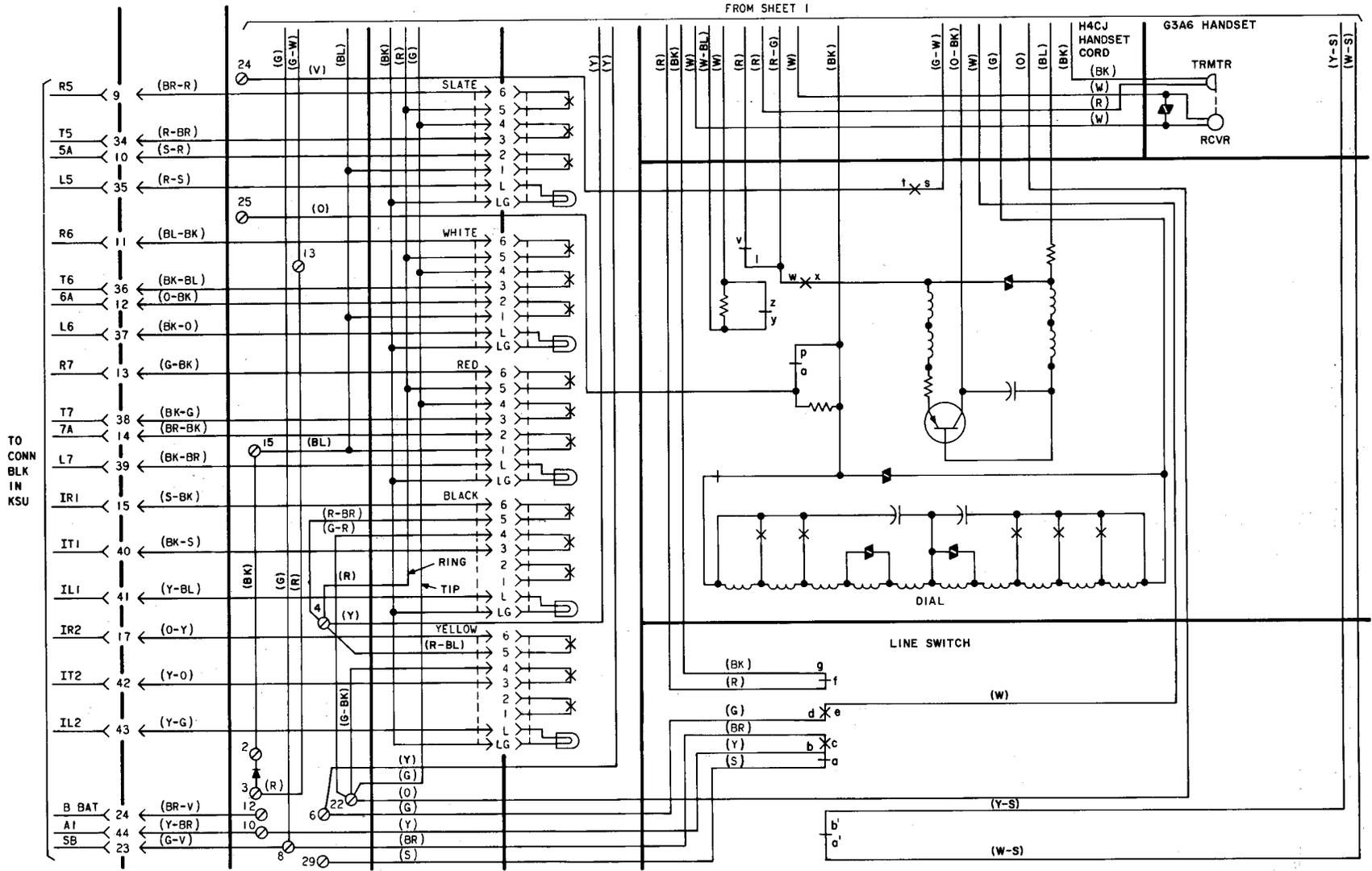**Fig. 9—832B (MD) Telephone Set, Connections (Sheet 1 of 2)**

Fig. 9—832B (MD) Telephone Set, Connections (Sheet 2 of 2)

Fig. 10—2832B (MD) Telephone Set, Connections (Sheet 1 of 2)
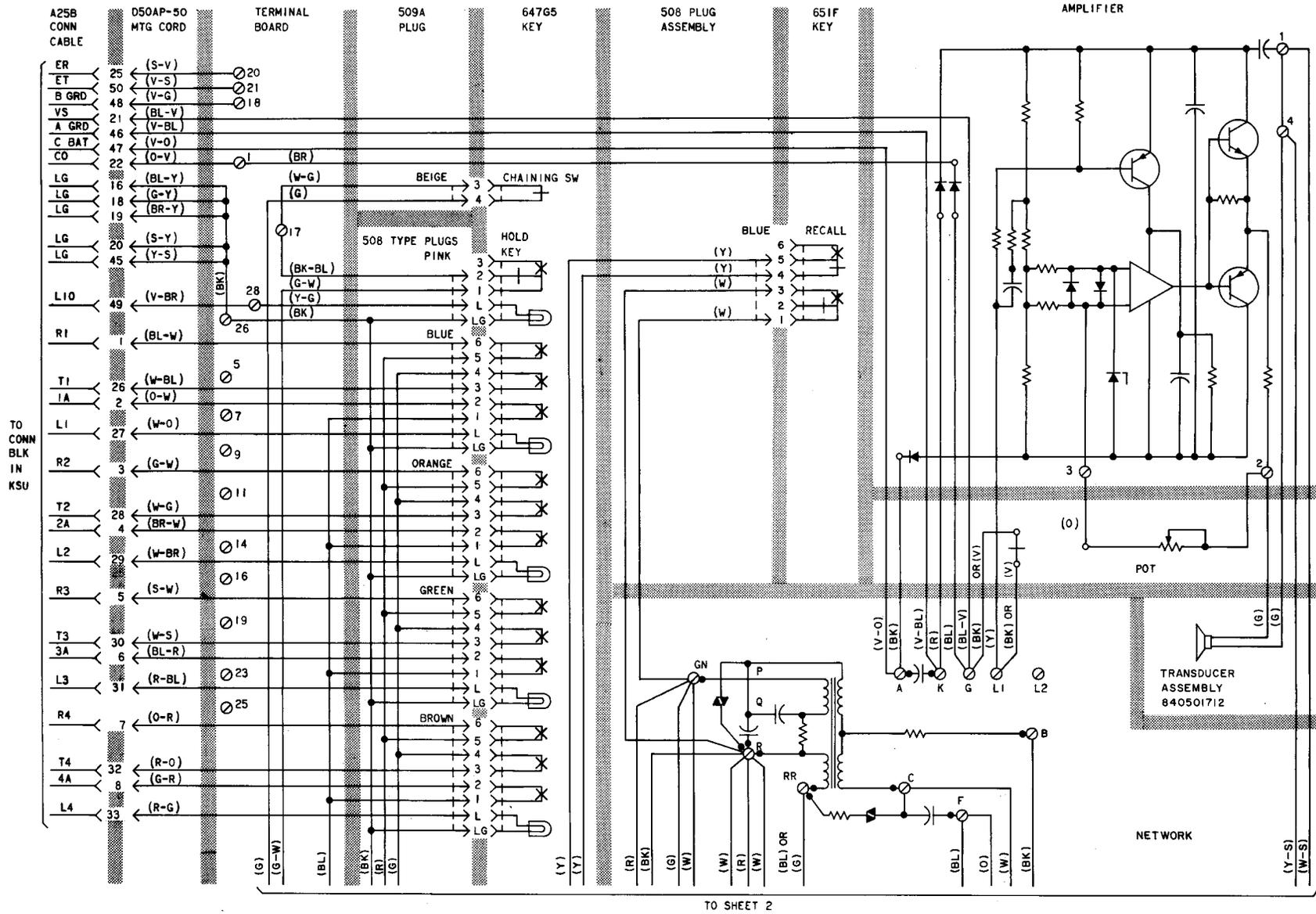
Fig. 10—2832B (MD) Telephone Set, Connections (Sheet 2 of 2)

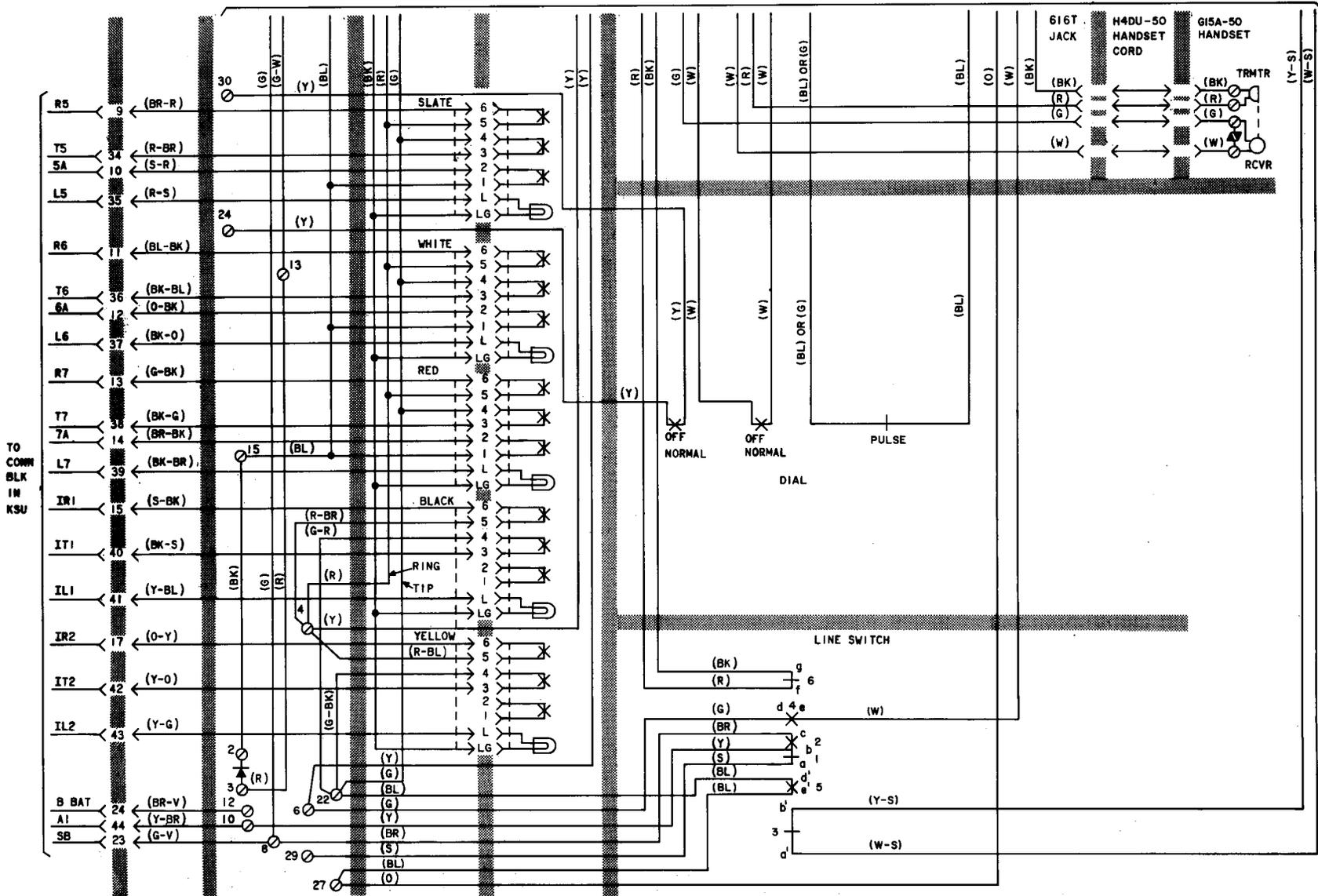**Fig. 11—832BM or 832DM Telephone Set, Connections (Sheet 1 of 2)**

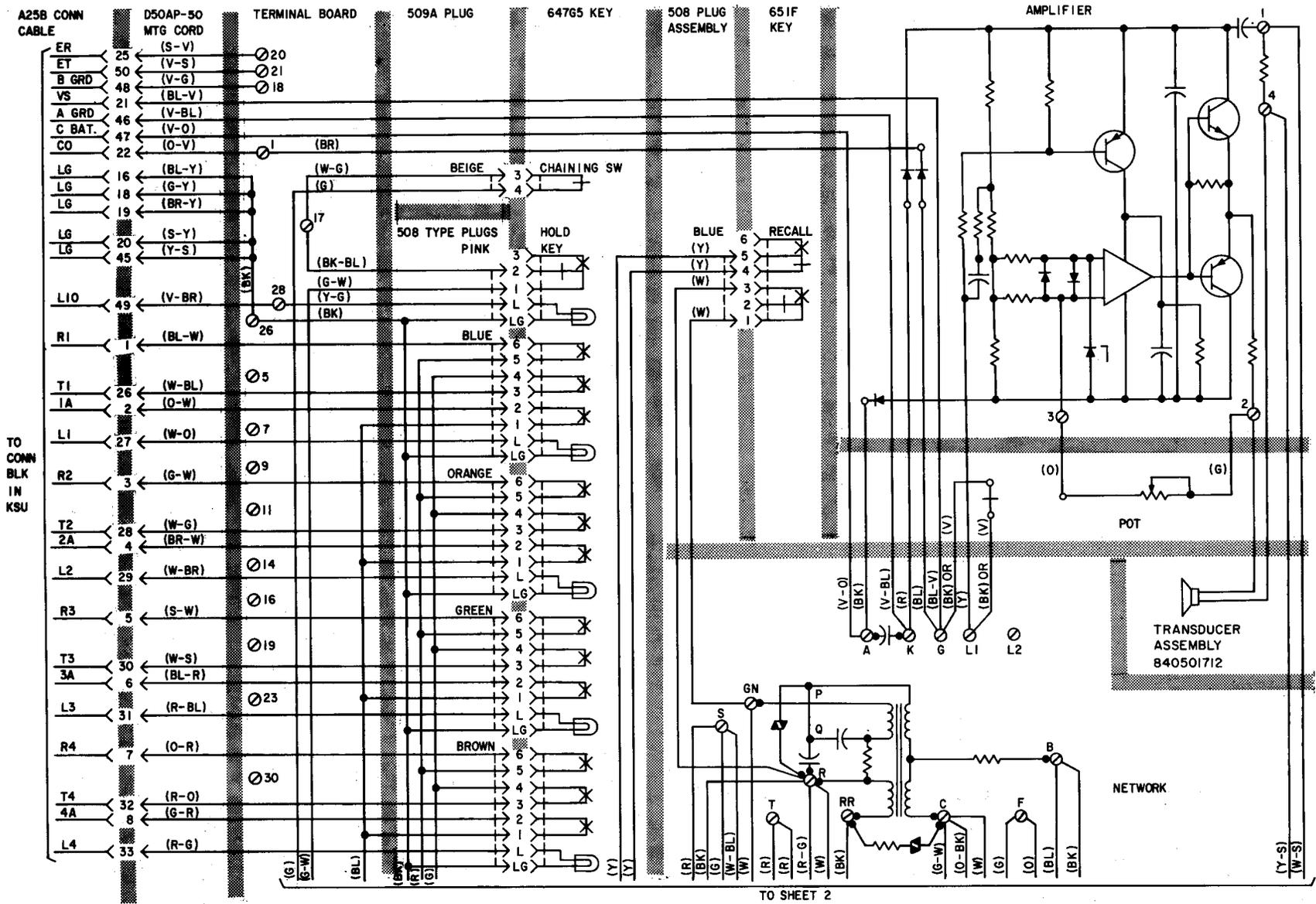Fig. 11—832BM or 832DM Telephone Set, Connections (Sheet 2 of 2)

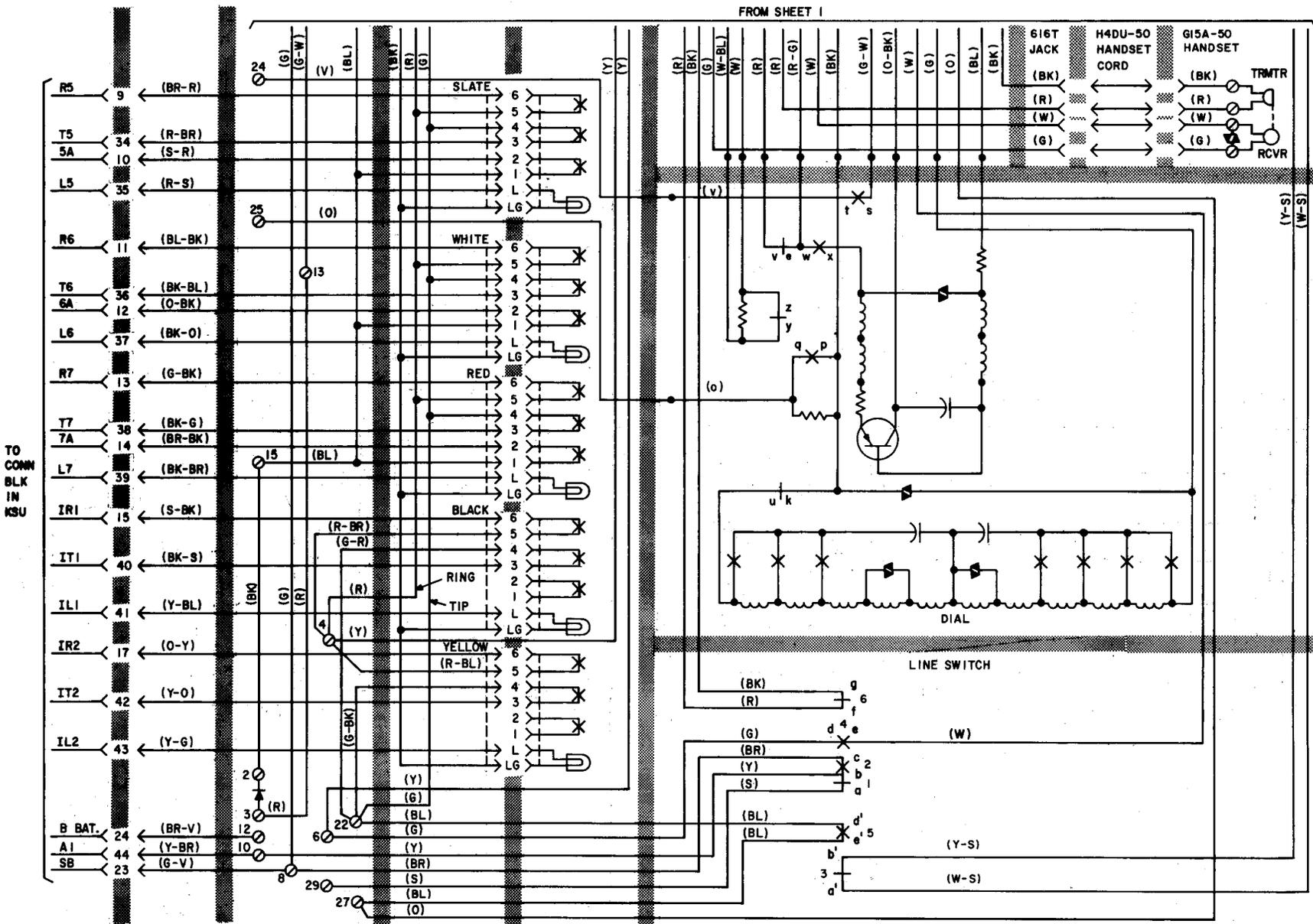Fig. 12—2832BM or 2832DM Telephone Set, Connections (Sheet 1 of 2)

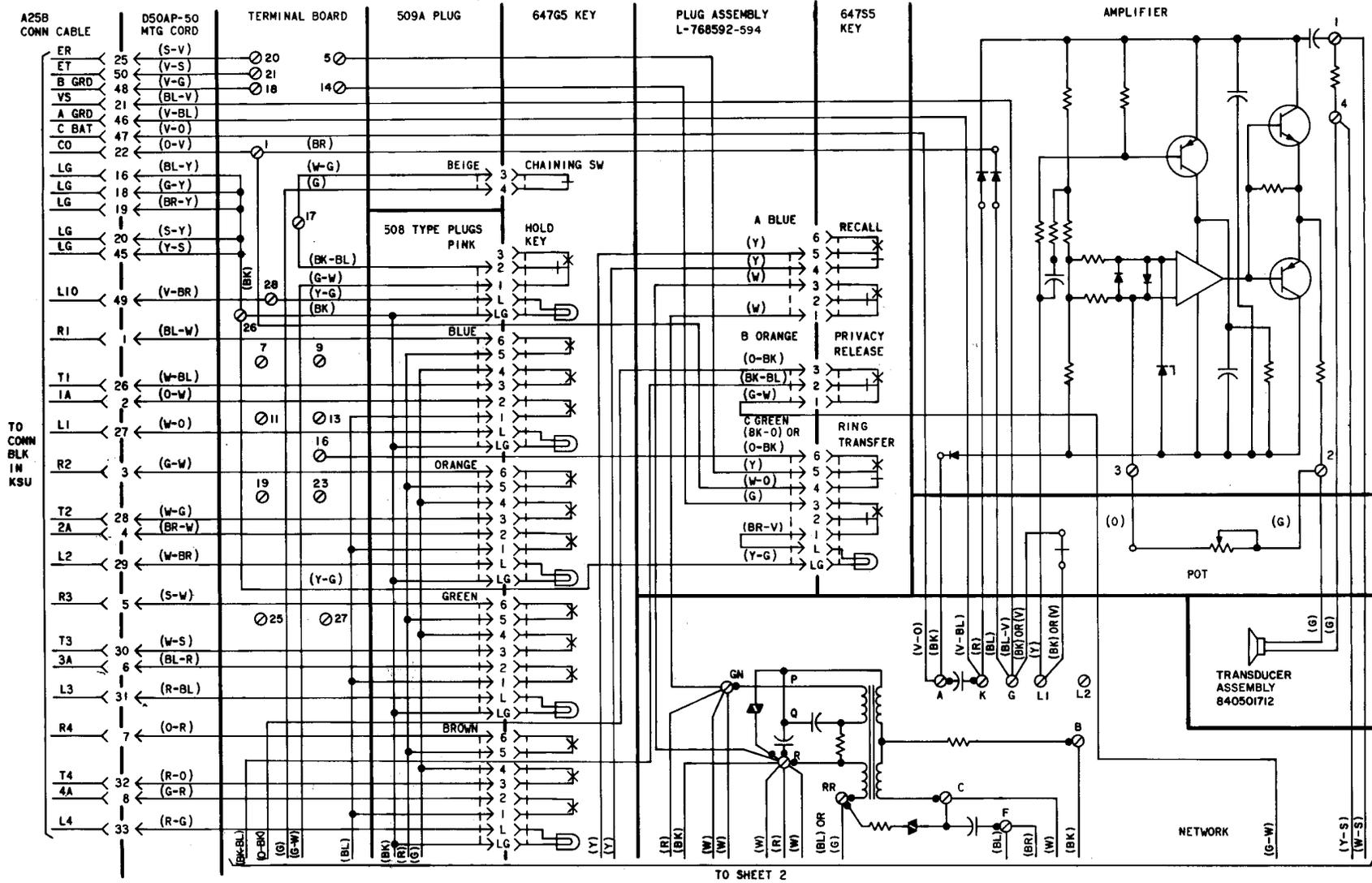Fig. 12—2832BM or 2832DM Telephone Set, Connections (Sheet 2 of 2)

Fig. 13—832C (MD) Telephone Set, Connections (Sheet 1 of 2)

Fig. 13—832C (MD) Telephone Set, Connections (Sheet 2 of 2)

Fig. 14—2832C (MD) Telephone Set, Connections (Sheet 1 of 2)

Fig. 14—2832C (MD) Telephone Set, Connections (Sheet 2 of 2)

Fig. 15—832CM or 832EM Telephone Set, Connections (Sheet 1 of 2)

Fig. 15—832CM or 832EM Telephone Set, Connections (Sheet 2 of 2)

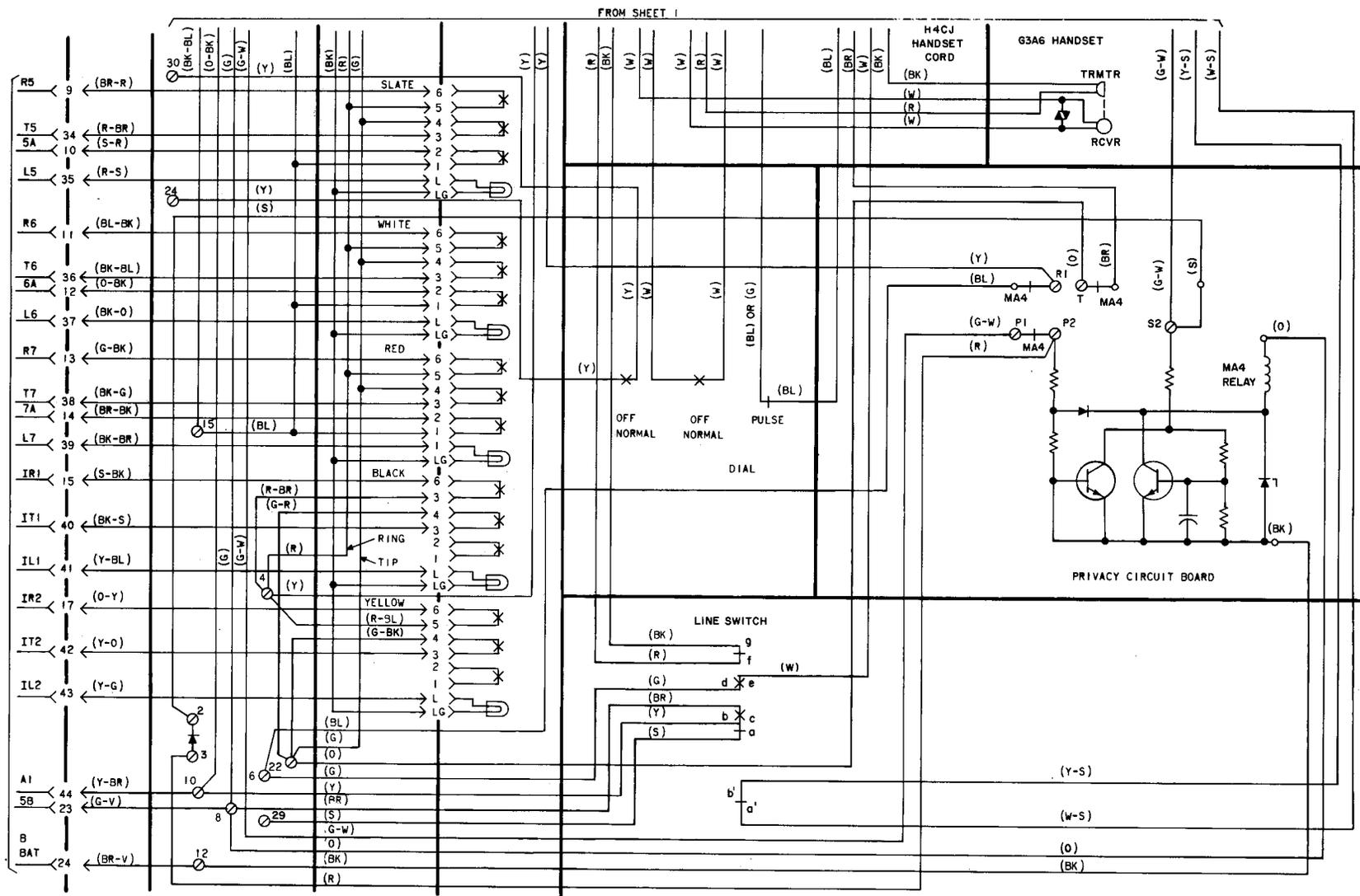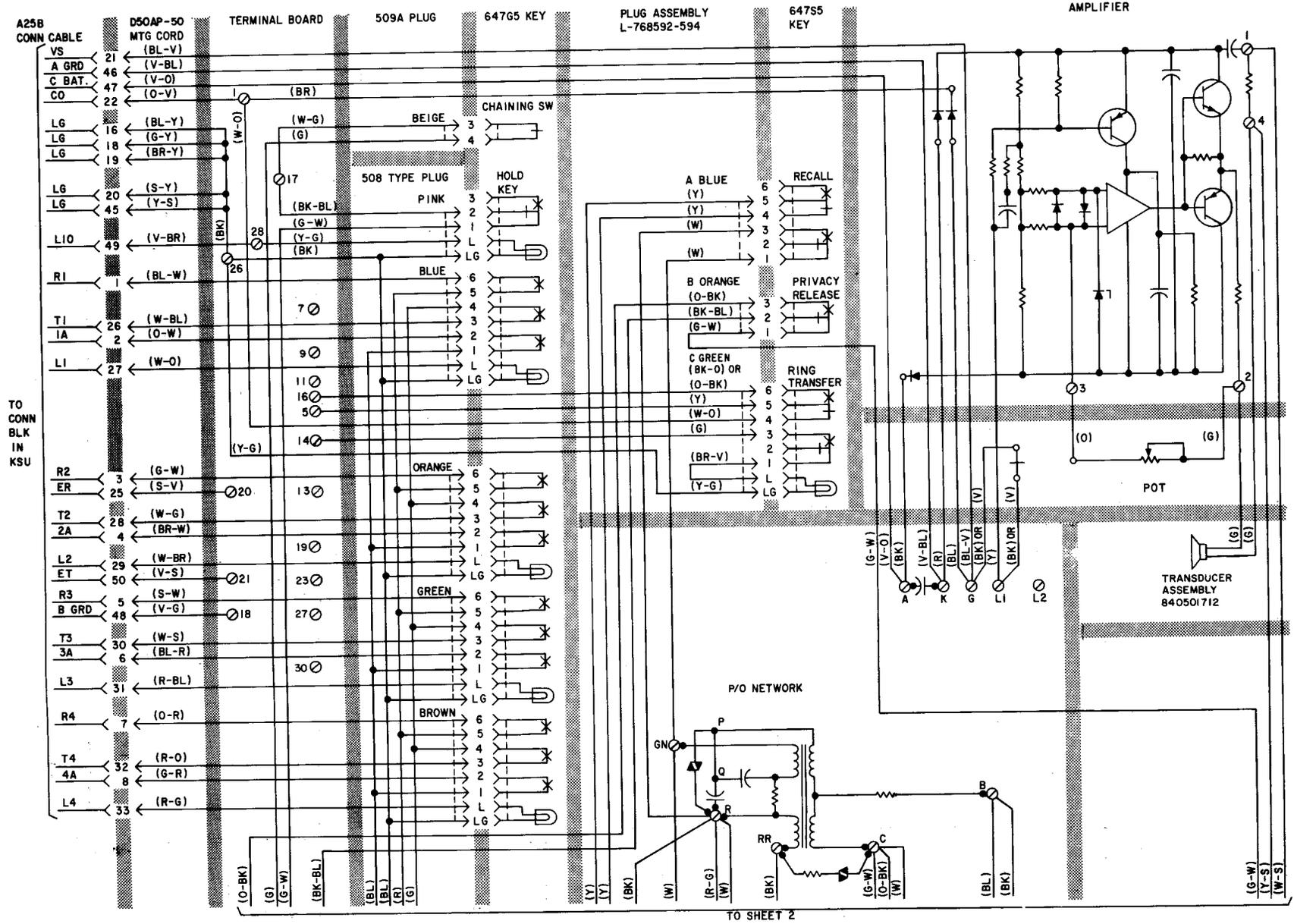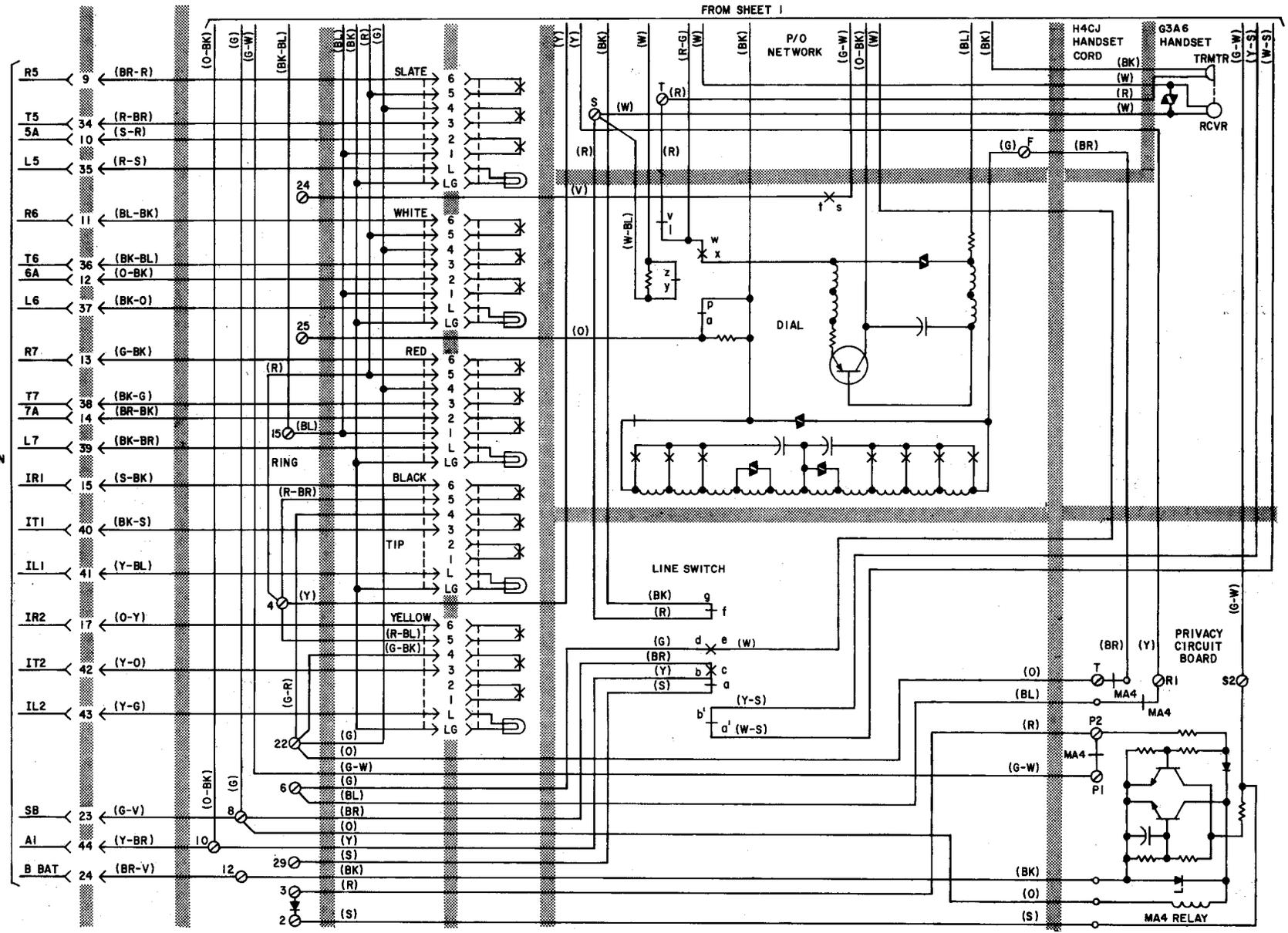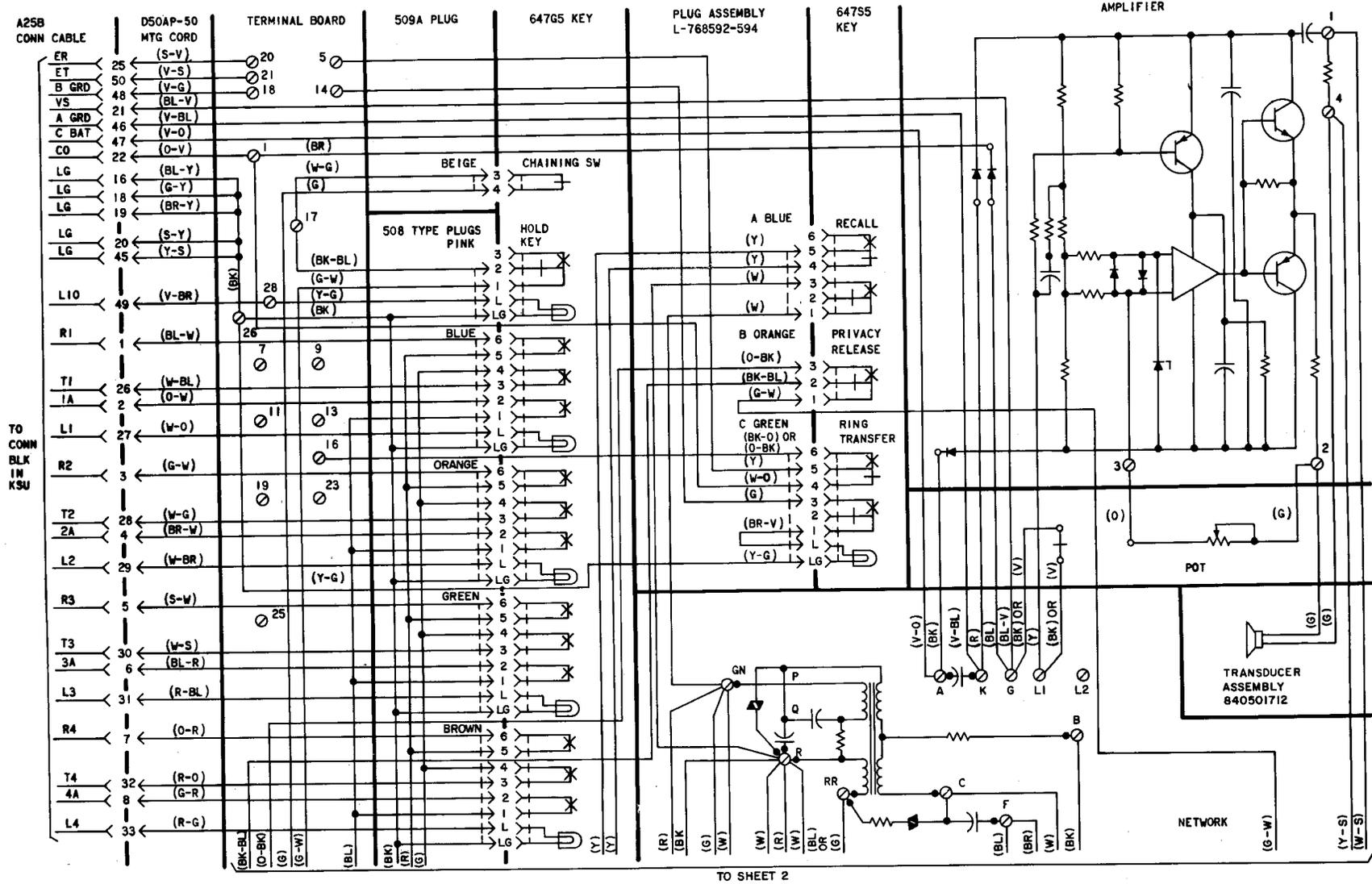Fig. 16—2832CM or 2832EM Telephone Set, Connections (Sheet 1 of 2)

Fig. 16—2832CM or 2832EM Telephone Set, Connections (Sheet 2 of 2)

MODIFICATION			
WIRE OR LEAD	COLOR	REMOVE FROM	CONNECT TO
840501712 TRANSDUCER ASSEMBLY	(G)	4†	1†
MTG CORD	(BL-V)	G‡	L2‡
LS	(Y-S) (W-S)	4† 1†	G‡ L2‡

† AMPLIFIER TERMINAL
‡ NETWORK TERMINAL
LS-LINE SWITCH
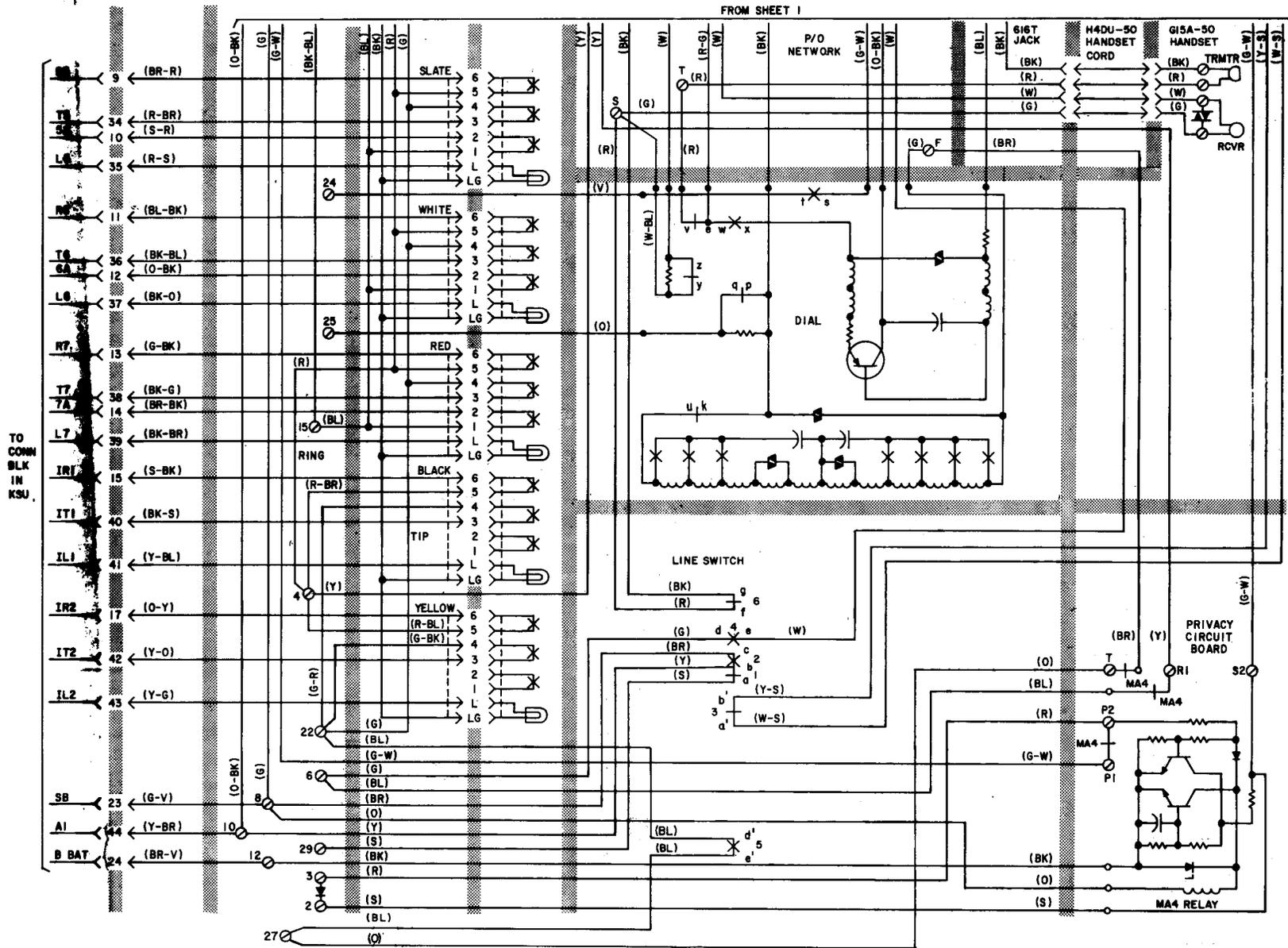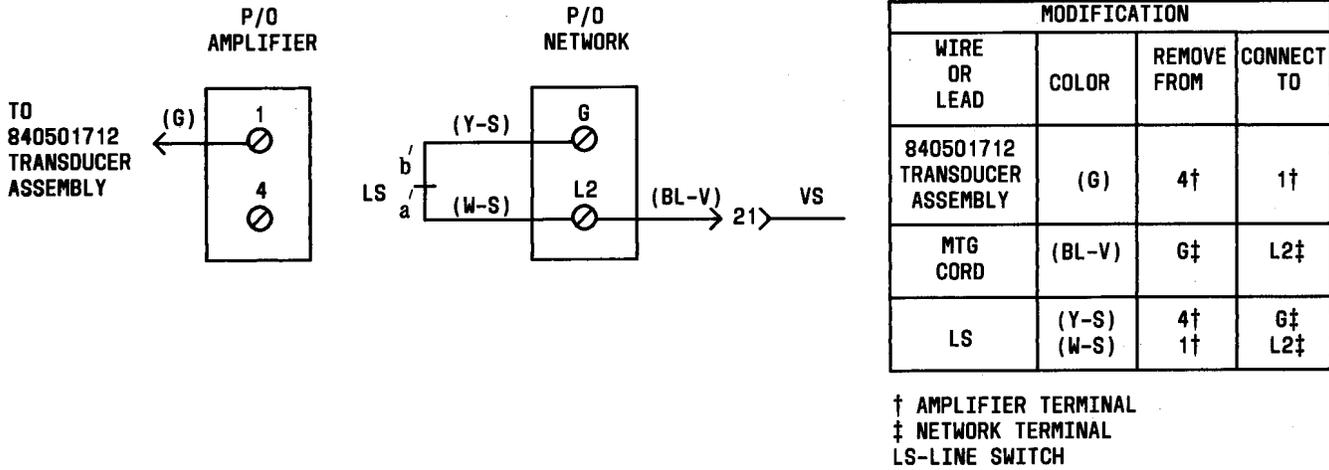
Fig. 17—►Telephone Set Connections for Automatic DO-NOT-DISTURB Feature◄

TABLE B

COLOR ORDERING GUIDE

TEL SET	HOUSINGS, HANDSETS, AND HANDSET CORDS		FACEPLATES*	
	SUFFIX	COLOR	SUFFIX	COLOR
832BM, 2832BM, 832CM, 2832CM, 832DM, 2832DM, 832EM, 2832EM	−50	Ivory	−100	Avocado
			−108	Teak
			−109	Walnut
			−111	Gold
			−112	Orange
			−113	Brown
			−114	Red
			−115	Blue
			−118	Black

* Faceplates must be ordered separately (Table A).
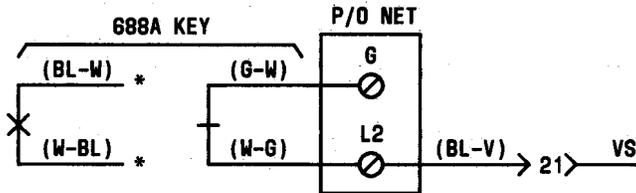
A. 7A COMMUNICATION SYSTEM

MODIFICATION			
WIRE OR LEAD	COLOR	NETWORK	
		REMOVE FROM	CONNECT TO
MTG CORD	(BL-V)	G	L2
688A KEY	(G-W)	–	G
	(W-G)	–	L2
	(BL-W)	–	*
	(W-BL)	–	*

* INSULATE AND STORE
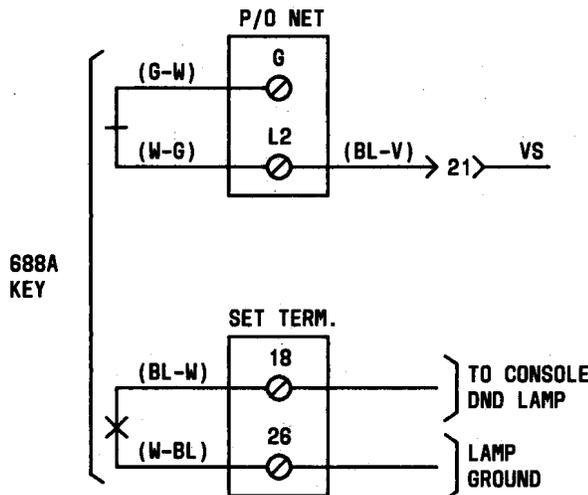
B. 21A COMMUNICATION SYSTEM (SEE NOTE)

MODIFICATION			
WIRE OR LEAD	COLOR	NETWORK	
		REMOVE FROM	CONNECT TO
MTG CORD	(BL-V)	G	L2
688A KEY	(G-W)	–	G
	(W-G)	–	L2
	(BL-W)	–	18†
	(W-BL)	–	26†

† TELEPHONE SET TERM.

NOTE:
    IF THE STATION SET IS EQUIPPED
    FOR THE HFAI OPTION. THE MANUAL
    DND OPTION IS AVAILABLE WITH
    THE HFAI 683AE TRANSMITTER UNIT

Fig. 18—▶Connections for Manual DO-NOT-DISTURB Feature Using 688A Key◀

Fig. 19—▶832- and 2832-Type Telephone Set Connections for 4-Wire Service◀
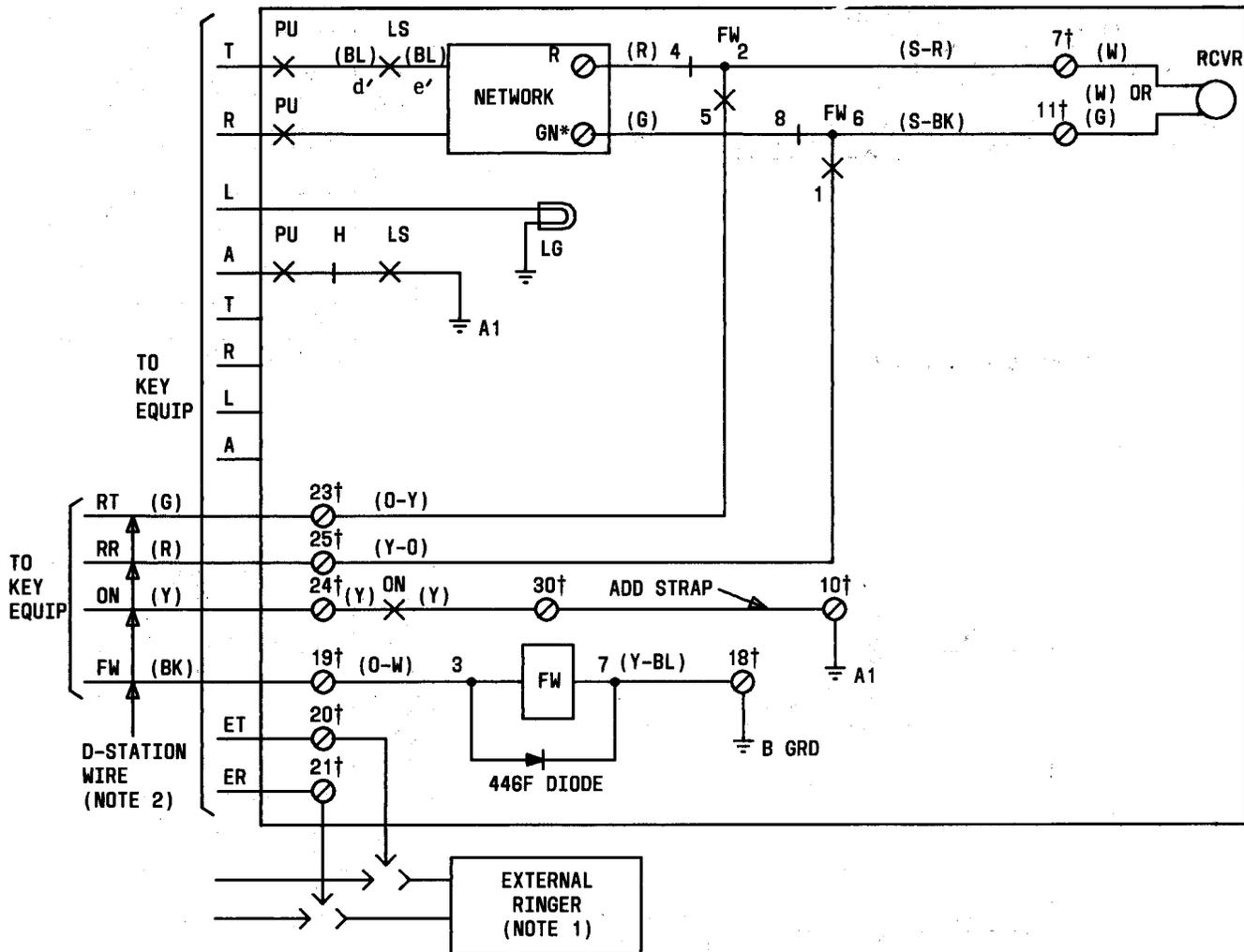
NOTES:
1. USE ET AND ER LEADS IF AVAILABLE, OTHERWISE A SPARE PAIR OF CONDUCTORS IS REQUIRED.
2. MULTIBUTTON CONFERENCING IS NOT RECOMMENDED WITH 4-WIRE SERVICE.

* TERMINAL S, 2832-TYPE SETS
† TB1 TERMINALS
FW – FOUR WIRE RELAY ASSEMBLY
ON – DIAL OFF-NORMAL 832-TYPE SETS ONLY
PU – PICKUP KEY
LS – LINE SWITCH
H – HOLD KEY

♦TABLE C♦

832A, B, BM, DM, 2832A, B, BM, AND DM TELEPHONE SET CONNECTIONS FOR PRIVACY CIRCUIT (D-180486 KIT OF PARTS)

TEL SET LEAD COLOR	PRIVACY BOARD LEAD COLOR	CONNECT TO TEL SET TERM.	MOVE LEAD	
			FROM TEL SET TERM.	TO PRIVACY BOARD TERM.
R			13	P2
G-W			13	P1
Y			6	R1
O			F on net.	T
	O	8		
	BR	F on net.		
	S	15		
	BK	12		
	BL	6		

TABLE D

832A AND 2832A TELEPHONE SET CONNECTIONS
FOR PRIVACY RELEASE KEY (D-180488 KIT OF PARTS)

TEL SET LEAD COLOR	PRIVACY BOARD LEAD COLOR	PRIVACY RELEASE KEY LEAD COLOR	CONNECT TO TEL SET TERM.	MOVE LEADS	
				FROM TEL SET TERM.	TO PRIVACY BOARD TERM.
BK			2*	15	S2
	S†			15	S2
		O-BK	10		
		BK-BL	15		
		G-Y	27		
		Y-G	27		
		G-W	2*		S2

* If telephone set does not have privacy circuit.

† If telephone set has privacy circuit and privacy release is now being added.

TABLE E

TO DISABLE PRIVACY CIRCUIT

COLOR	MOVE LEAD IN TEL SET	
	FROM TERM.	TO TERM.
O	8	*
BK	12	*

* Insulate and store.

TABLE F

TO DISABLE PRIVACY RELEASE KEY

COLOR	MOVE LEAD IN TEL SET	
	FROM TERM.	TO TERM.
O-BK	10	15

TABLE G

RINGER E1C (MD) OR E1CM CONNECTIONS FOR POWER FAILURE TRANSFER FEATURE

CONNECT LEADS*	
FROM TEL SET TERM.	TO RINGER TERM.
20	5
21	6

* Use inside wire.

TABLE H

**832A OR 2832A TELEPHONE SET CONNECTIONS
FOR RING TRANSFER (D-180487 KIT OF PARTS)**

RING TRANSFER KEY LEADS	TEL SET TERM. BOARD		
COLOR	COLOR	REMOVE LEAD FROM	CONNECT LEAD TO
G			14
V-BR			27
O-BK or BK-O			16
W-O			1
Y			5
Y-G			26
BR-V			9
G-Y			
	O-V	1	5
	V-BR	28	14
	G-V	8	16

TABLE I

**832C, CM, EM, 2832C, CM, OR EM TELEPHONE
SET CONNECTIONS FOR RING TRANSFER**

TEL SET TERM. BOARD		
COLOR	REMOVE LEAD FROM	CONNECT LEAD TO
O-V	1	5
V-BR	28	14
G-V	8	16

TABLE J

**832A AND 2832A TELEPHONE SET
CONNECTIONS FOR RECALL**

651F KEY LEADS	CONNECT TO	
COLOR	NET TERM.	TEL SET TERM. BOARD
W	GN	
W	R	
Y		4
Y		6

Note: Remove (Y) strap from terminals 4 and 6 of telephone terminal board.

▶TABLE K◀
683AE TRANSMITTER CONNECTIONS FOR HFAI (SEE NOTE)

FROM 683AE TRANSMITTER	CONNECT TO TELEPHONE SET	
	TERM. BOARD	NET. TERM.
W-BL	26	
BL-W	18	
W-O	21	
O-W	20	
W-G		G
G-W		L2*
W-BR		A
BR-W		K

Note: HFAI feature initially available with COM KEY 2152 only.

* Remove (BL-V) mounting cord lead from terminal G of network and connect to terminal L2 of network.

TABLE L

832-AND 2832-TYPE TELEPHONE SET
CONNECTIONS FOR 4-WIRE SERVICE

WIRE OR LEAD		COLOR	FROM	CONNECT TO	
			NET.	NET.	TB1
842533440 Relay Assembly		Y-O	—	—	25
		S-R	—	—	7
		O-W	—	—	19
		R	—	R	—
		O-Y	—	—	23
		S-BK	—	—	11
		Y-BL	—	—	18
		G	—	GN†	—
Strap		—	—	—	10 to 30
D-Station Wire‡	RT	G	—	—	23
	RR	R	—	—	25
	ON	Y	—	—	24
	FW	BK	—	—	19
616T Jack (H4DU Handset Cord) Or H4CJ Handset Cord		W	R	—	7
		W or G	GN or S	—	11

† Terminal S for 2832-type telephone sets.

‡ Hard wired due to insufficient mounting cord conductors. Connections are to be made between these designated leads at the key equipment and TB1 of the telephone set.