

## SERVICE

### 564HK, 564HL, AND 564HLM TELEPHONE SETS

#### 1. GENERAL

1.01 This section contains connection and maintenance information on the 564HK (MD), 564HL, and 564HLM telephone sets.

1.02 This section is reissued to include information on the 564HLM (modular) telephone set, Fig. 4.

#### 2. MAINTENANCE

2.01 The 564HK set with D30C cord may be subject to poor key button illumination in multiple station, long loop situations due to the omission of lamp ground straps on the cord plug.

2.02 When investigating poor key button illumination involving 564HK telephone sets:

(a) If the station termination is made on a 66E3-25 or 66E4-25 connecting block, loop-through straps can be installed on connecting block clip terminals 5, 11, 17, 23, and 29 to add the necessary lamp ground copper for lamps 2, 3, 4, and 5. In all cases, full pairs should be brought to the connecting block from connecting key system apparatus via inside wiring or A-type connector cables.

(b) If station termination is made via A20B connector cable, or at a 3-way bridging adapter, or equivalent, it is impractical to field-modify either the plug of the D30C telephone set cord or its mating connector on the A-type connector cable. Therefore, the 564HK should be replaced with a 564HL or 564HLM.

2.03 Remove and replace housing as follows:

(1) To remove housing, loosen captive screws in base of set. Lift housing up and toward front of set.

(2) To replace housing, guide lower front of housing over pushbuttons, align housing with base of set, and gently press housing into place. Tighten captive screws in base of set.

2.04 Replace cracked pushbuttons or collars. Remove accumulated dirt or film from lamps, collar, and pushbuttons with a water dampened cloth. **DO NOT USE SOLVENTS OF ANY KIND.** If cleaning does not correct binding of pushbuttons, replace button and collar assembly.

2.05 Maintenance of handsets, dials, and ringers is outlined in sections covering these components.

2.06 When replacing a defective lamp use a KS-6320 orange stick to extract the lamp from its socket, and install the new lamp with its contact surfaces properly aligned with the lamp socket.

2.07 Maintenance of the 636-type key consists of cleaning contacts with a 265-type tool, and checking for loose or broken connections.



***No field maintenance should be performed on the plug-ended mounting cords.***

2.08 Replace set if the following requirements cannot be met:

(a) When depressed locking plunger should, on its downstroke, release any previously locked plunger.

(b) When any pushbutton plunger is released from its operated position, it should return with a snap to its nonoperated position.

(c) An operated key plunger should not release during downstroke of hold button.

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(d) An operated key plunger should release from its operated position on the upstroke of the hold button.

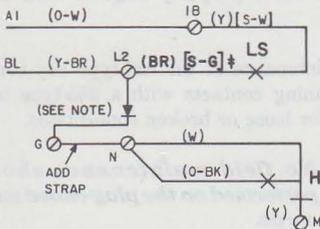
**3. CONNECTIONS**

**3.01** The 564HK, 564HL, and 564HLM telephone sets are factory-wired for use with 1A1, 1A2, or 6A key telephone systems (KTS). These sets are not equipped or intended for use with exclusion, speakerphone, or 1A KTS.

**3.02** The 564HL and 564HLM telephone sets are factory-equipped with a KS-20419L1 (10 volt AC only) buzzer.

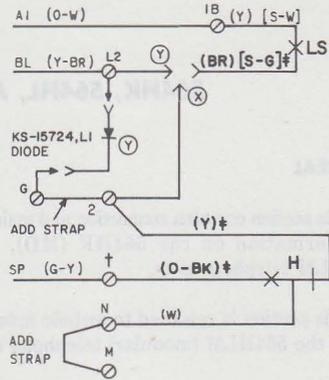
**3.03** Current models of the 564HL and 564HLM telephone sets are furnished with the H1B ringer.

**3.04** Red and black ringer leads are factory-wired to terminals RR and RT. Refer to notes in Fig. 3 or 4 for ringer connection when bridged ringing on a particular line is desired.



NOTE:  
 ADD KS-15724, L1 DIODE  
 ( ) CURRENT COLOR CODE  
 [ ] MD COLOR CODE  
 † INDICATES LEAD INVOLVED IN MODIFICATION

**Fig. 1—Station Busy Lamp (Without I Hold Feature)**



† SPARE TERMINAL OR D-161488 CONNECTOR  
 ‡ LEADS INVOLVED IN MODIFICATION  
 (X) WITHOUT STATION BUSY LAMP  
 (Y) WITH STATION BUSY LAMP  
 LS LINE SWITCH  
 H HOLD KEY  
 ( ) CURRENT COLOR CODE  
 [ ] MD COLOR CODE

**Fig. 2—I Hold Arrangement**

**TABLE A**  
**PICKUP-SIGNAL KEY CONVERSION**  
**564HK/HL**

CONVERTIBLE KEY OPTIONS (NOTES)	KEY LEADS			
	BR	Y-BR	S-R	BR-BK
HPPPPP	M	M	M	X
HPPPPS	M	M	M	SG
HPPSSS	M	M	SG	X
HPPSSS	X	M	SG	X
HPPP*P*S*	X	M	5H	N
HPP*P*P*S*	X	X	5H	N

\* These pickup key options are used on private or intercommunicating lines with the signal key common to each line. The signal key, under control of the line switch, will operate the signal circuit of each line when associated pickup key is depressed. Use S lead on 2nd, 3rd, or 4th pickup key as required.

**Notes:**

1. All convertible key positions are arranged in the factory as pickup positions. To convert a key position from pickup (locking) to signaling (nonlocking), remove the 811218924 (P-12A892) screw detail from plunger at the key position to be converted. Make necessary connection changes as shown in Table A. To convert a key position from nonlocking to locking, insert 811218924 (P-12A892) screw detail.
2. When keys are converted for signaling, the S lead of key involved provides the signal circuit and SG lead provides the common signal ground.

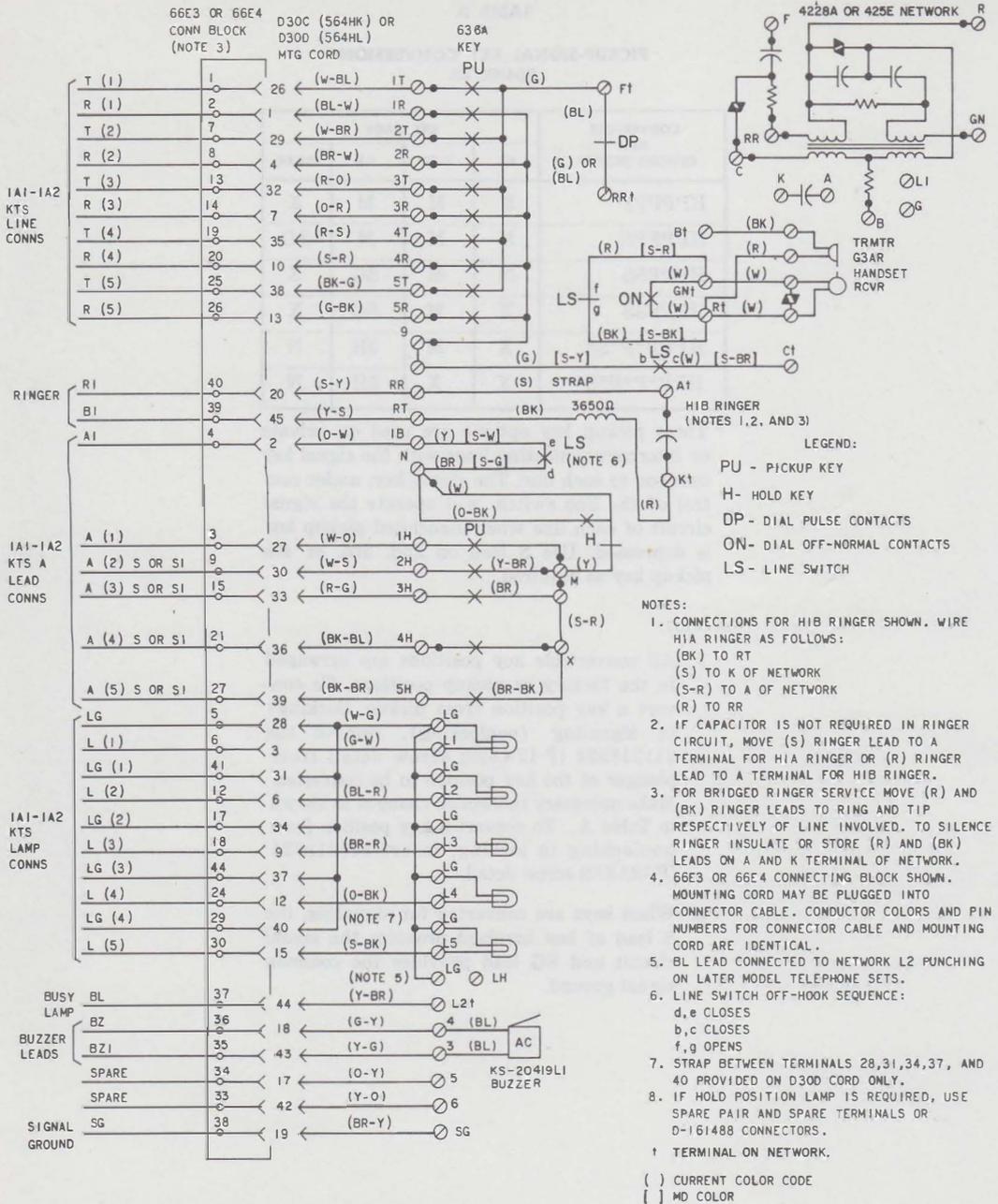


Fig. 3—564HK (MD) and 564HL Telephone Set, Connections

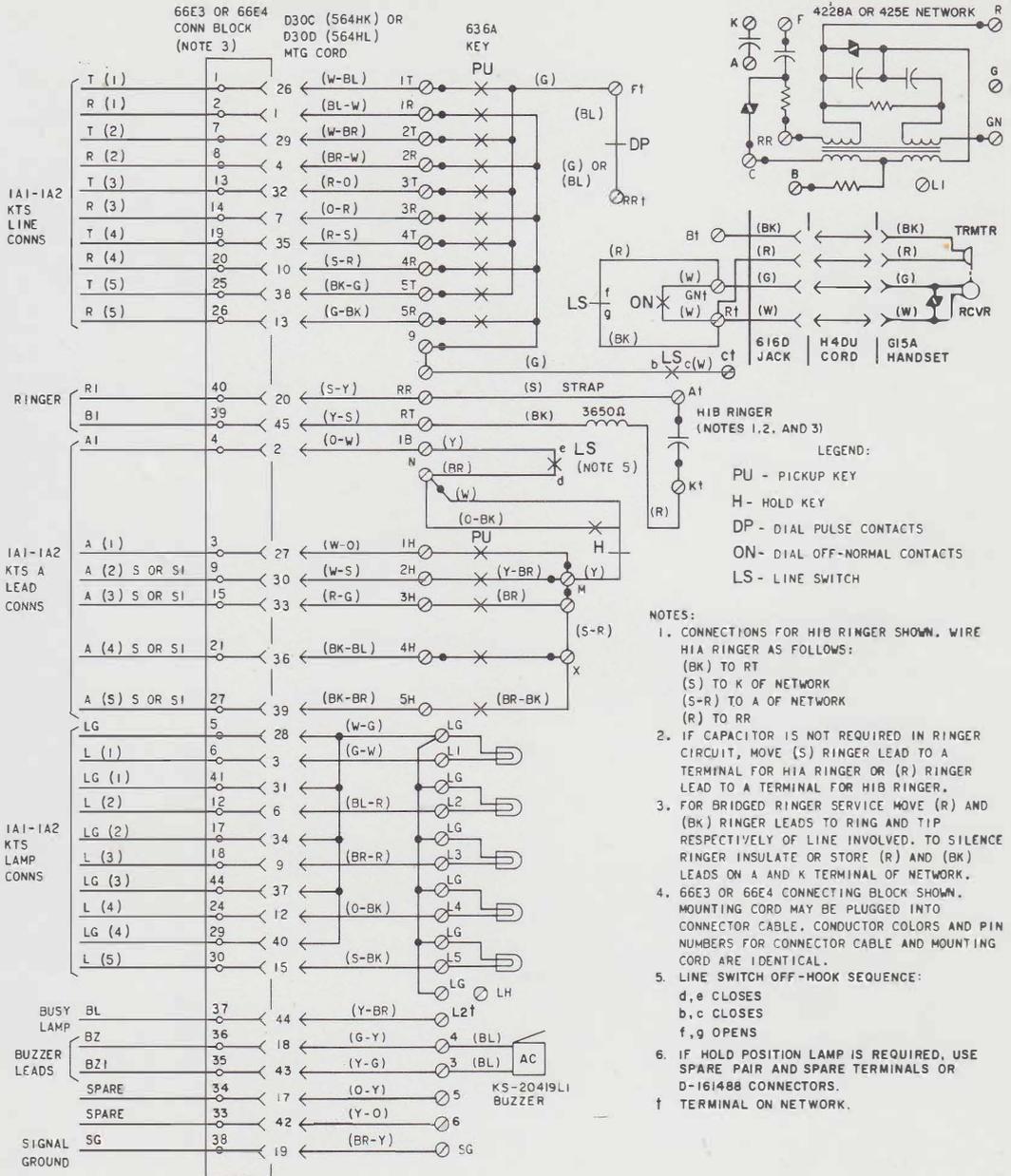


Fig. 4—564HLM Telephone Set, Connections