

## SERVICE

### 1564HK AND 1564HL TELEPHONE SETS

#### 1. GENERAL

**1.01** This section is issued to provide maintenance and connection information on the 1564HK (MD) and 1564HL type telephone sets. The connection information for these sets was formerly contained in Section 502-525-425 which is hereby canceled.

**1.02** The 1564HK (MD) is replaced by the 1564HL telephone set.

#### 2. MAINTENANCE

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

#### *Removing and Replacing Housing*

**2.02** To remove housing, loosen captive screws in base of set. Lift housing up and toward front of set.

**2.03** 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.

#### *Lamps and Pushbuttons*

**2.04** Replace cracked pushbuttons or collars. Remove accumulated dirt or film from lamps, collars, 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** To replace defective lamp:

- (1) Remove dial from mounting bracket.
- (2) Lift lamp from socket with KS-6320 orange stick.

(3) Align lamp contact surfaces when placing new lamp in socket.

(4) Remount dial.

**2.06** The button and collar assembly should be carefully aligned to avoid interference with removal or replacement of housing.

**2.07** Poor key button illumination in 1564HK (MD) telephone sets may be corrected as follows:

(a) If the station is terminated on a 66E-type connecting block, loop-through straps can be installed on clip terminals 5, 11, 17, 23, and 29. Full pairs should be brought to the connecting block from the key system apparatus via inside wiring cables.

(b) If station termination is made via A25B connector cable or at a 3-way bridging adapter, replace set with 1564HL or 1565HK (MD) telephone set.

#### *Mounting Cords*

**2.08** Mounting cords designed for use with 636A key assemblies feature slotted wafer sections for each line appearance (Fig. 1). This allows easy arrangement of lines to pick-up buttons.



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

#### *Loose Number Card Retainer*

**Note:** Number card retainer P-25E803 has replaced P-25E785, which has been rated "Manufactures Limited."

**2.09** If the number card retainer becomes so loose on the faceplate that the number card

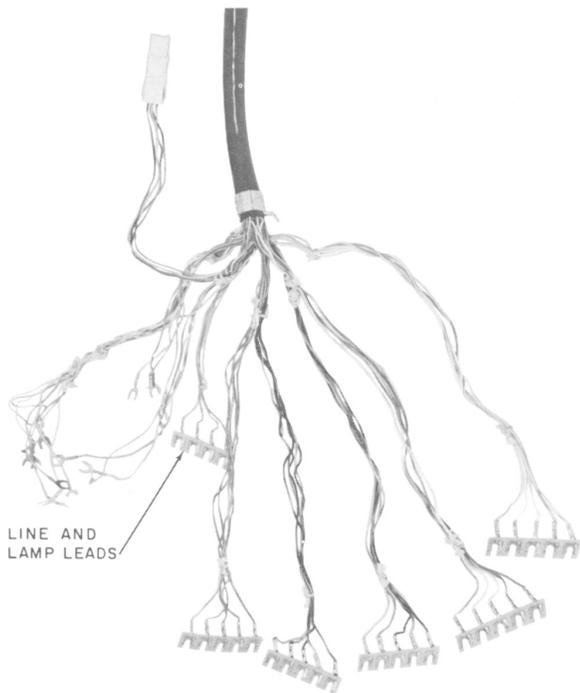


Fig. 1—Mounting Cord Used With 636A Key

or key designation strip slips, it can be tightened as follows:

- (1) Remove faceplate from set.
- (2) Remove card retainer from faceplate.
- (3) Bend the four arms of the retainer so that more pressure will be applied to the number card and designation strip. The bends should be made approximately 1/2-inch in from the tabs on the ends of the arms and in the opposite direction from the factory bent tabs.
- (4) Install the card retainer on the faceplate and insert the number card and key designation strip.
- (5) Install faceplate on telephone set.

**Note:** If adjusting the arms of the retainer does not result in sufficient holding power, replace the number card retainer.

**636-Type Keys**

2.10 Maintenance of the 636-type keys (Fig. 2 and 3) consist of cleaning contacts with a 265C tool.

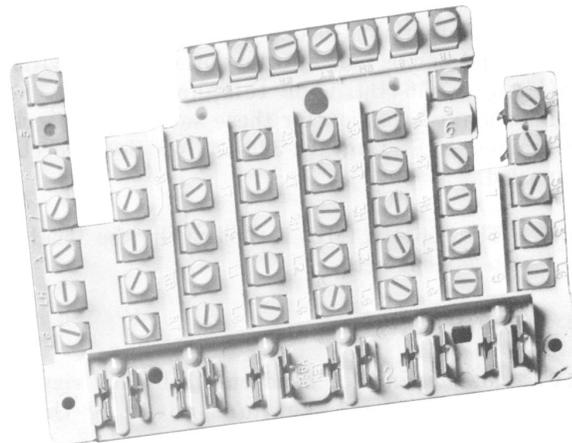


Fig. 2—636A Key, Top View

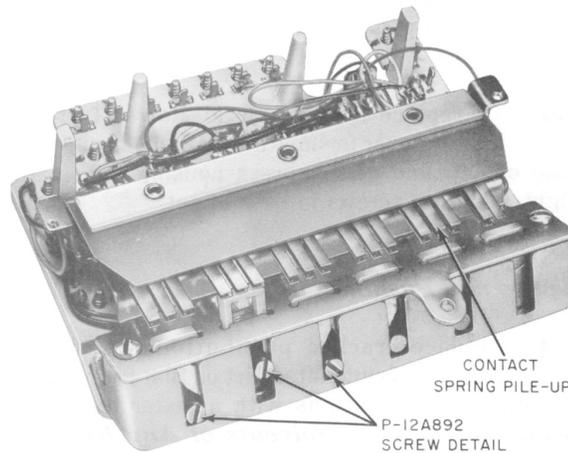


Fig. 3—636A Key, Bottom View

2.11 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.
- (d) An operated key plunger should release from its operated position on the upstroke of the hold button.



*The 25- and 35-type dial will function only when the green dial lead is positive (+) and when the orange-black lead is negative (-).*

**2.13** A 1011B test set connected to line terminations can be used to test for defective dials.



*Do not attempt repair of TOUCH-TONE dials in the field. Replace defective dials.*

**TOUCH-TONE<sup>®</sup> Dial**

**2.12** Check line polarity if no tones are heard in the receiver when a button is depressed.

**TABLE A  
PICKUP-SIGNAL KEY CONVERSION**

PICKUP KEYS	TOTAL NUMBER OF KEYS		KEY LEADS			
	SIG. KEYS CONVERTED FROM PICKUP KEYS	PRIVATE & INTERCOM LINES WITH COMMON SIG. KEY	Y-BR	BR	S-R	BR-BK
5			M	M	M	X
4	1		M	M	M	SG
3	2		M	M	SG	X
2	3		M	X	SG	X
4	1	2	M	X	5H	N*
4	1	3	X	X	5H	N*

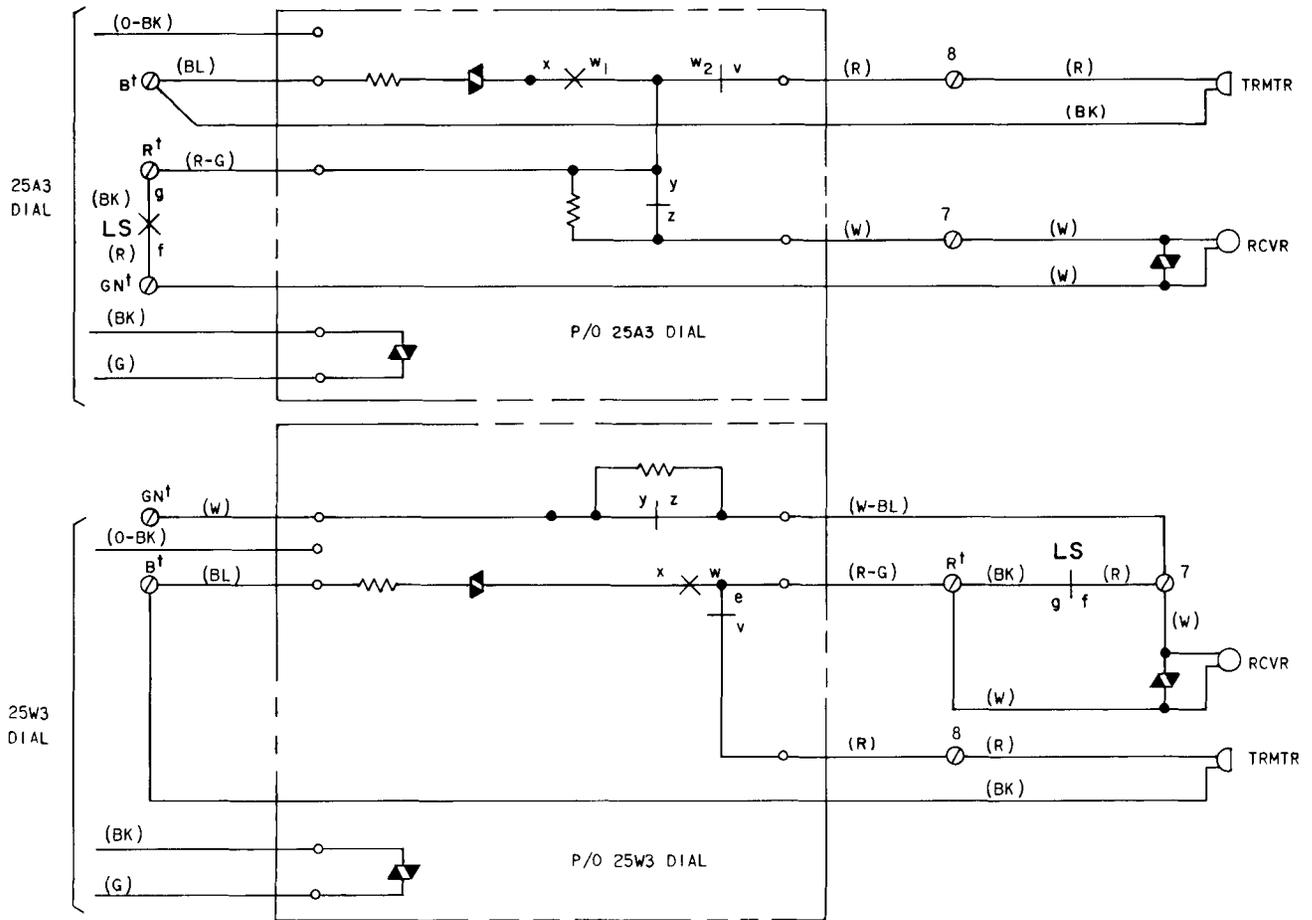
\*When station busy lamp is provided, terminate (BR-BK) lead on terminal 1.

**TABLE B  
P-90D052 POLARITY GUARD CONNECTIONS**

LEAD	COLOR	REMOVE FROM	CONNECT TO	
		NET.	NET.	POLARITY GUARD
Line Switch	(W)	C		S
Dial	(BK)	RR		T
Polarity Guard	(W) (G)		C RR	

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





NOTES:

1. 66E-TYPE CONNECTING BLOCK SHOWN. MTG CD MAY BE PLUGGED DIRECTLY INTO CONNECTOR CABLE. COLORS AND PIN NOS. FOR CONN CA ARE SAME AS MTG CD.
2. IF CAPACITOR IS NOT REQUIRED IN RINGER CKT, MOVE (S) RINGER LEAD TO A.
3. AUXILIARY BUZZER MAY BE INSTALLED. USE SPARE LEADS AND TERMS. TO CONNECT TO EQUIPMENT.
4. STRAP BETWEEN PINS 28,31,34,37, AND 40 IS PROVIDED ON 1564HL TELEPHONE SETS ONLY. IF 66E-TYPE CONN BLK IS USED, STRAP AS SHOWN.
5. D30C (MD) AND D30D CORDS ARE USED WITH 1564HK (MD) AND 1564HL TELEPHONE SETS RESPECTIVELY.
6. LINE SWITCH ON-OFF SEQUENCE AS FOLLOWS:
  - (1) bc CLOSES
  - (2) de CLOSES
  - (3) fg OPENS

† NETWORK TERMINALS

LEGEND:  
 PU-PICKUP KEY  
 H-HOLD KEY  
 LS-LINE SWITCH

Fig. 4—1564HK (MD) and 1564HL Telephone Sets, Connections (Sheet 2 of 2)

