

NO. 40C TEST SET DESCRIPTION AND APPLICATION

1. GENERAL

- 1.01 This section describes the No. 40C test set.
- 1.02 The principal application of this test set is for making rotary tests of switches in the step-by-step system.

2. EQUIPMENT FEATURES

- 2.01 The No. 40C test set consists of a housing in a handset form which contains a No. 6E dial, a 248-ohm resistor, a 0.05-mf capacitor, and two nonlocking keys numbered 1 and 2. A No. 716E receiver, which has an HA2 receiver unit, and two plugs, Nos. 240H and 336A, are connected to the test set by means of cords. Fig. 1 shows a view of the No. 40C test set equipped with a No. 377A dialing knob which is used as a stop on dials for repeat dialing of the same digit during testing operations. Earlier type test sets are equipped with a W8A cord and a No. 509 receiver. Mounted on the receiver is a No. 106A adapter containing a resistance of 50,000 ohms.
- 2.02 The dial is mounted on one end of the housing while the capacitor is mounted in the body of the housing adjacent to the dial. The resistor is mounted in the handle portion of the housing. The two nonlocking

keys are mounted on the handle near the dial. Fig. 2 is an interior view showing the arrangement of the apparatus inside the set.

- 2.03 The cords provided with the test set are as follows:

<u>Code of Cord</u>	<u>Cord Terminates in:</u>
W7B	No. 360B Tool No. 716E Receiver No. 240H Plug
W1AE	No. 336A Plug

3. CIRCUIT FEATURES

- 3.01 A schematic of the circuit arrangement of the test set is shown in Fig. 3.
- 3.02 Connection of the test set to the switch to be checked is made by inserting the No. 240H plug into the test jack associated with the switch and inserting the No. 336A plug into a battery and ground supply jack on the selector frame.
- 3.03 When key 1 is depressed, the 0.05-mf capacitor is short-circuited leaving the receiver across the T and R leads. When key 2 is depressed, it connects the battery through the 90-ohm resistance, which

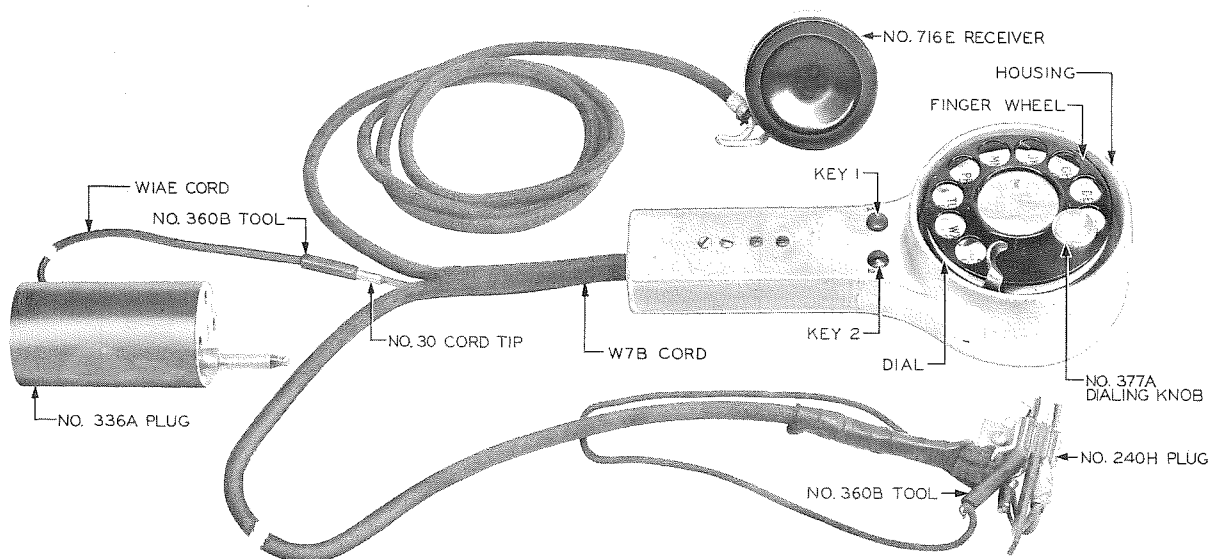


Fig. 1 - No. 40C Test Set Equipped With a
No. 377A Dialing Knob

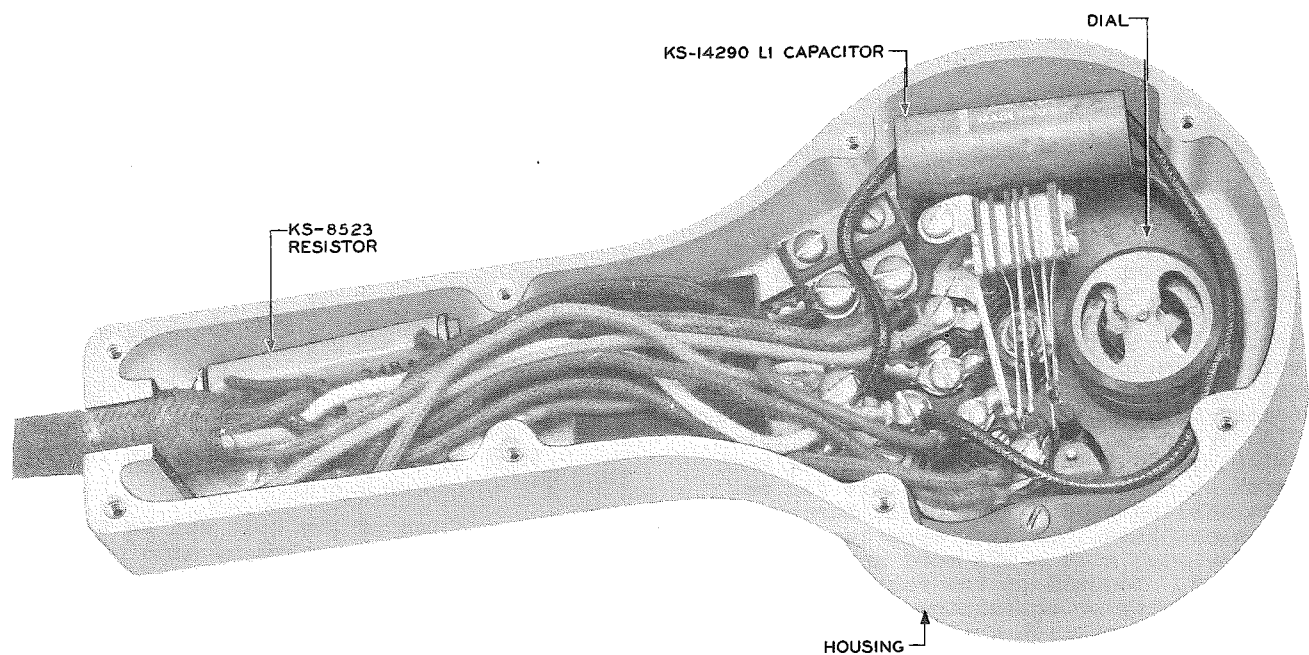


Fig. 2 - No. 40C Test Set - Opened

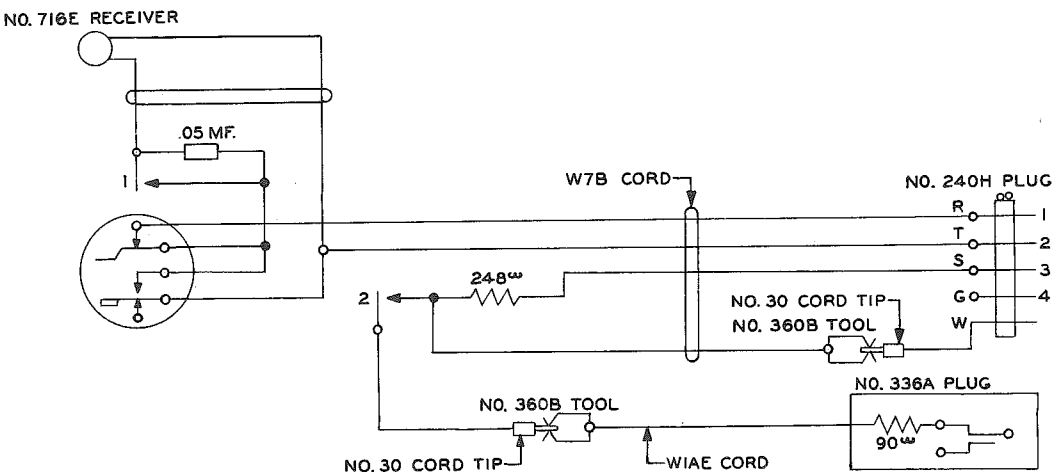


Fig. 3 - Schematic of No. 40C Test Set

is in parallel with the cut-through and interrupter relays of the switch under test, to ground through the 248-ohm resistance.

3.04 The dial is used to direct the switch to the level desired; after which it will cut in and hunt for an idle trunk.

4. MAINTENANCE FEATURES

4.01 Removing the seven screws on the back of the test set makes the apparatus and wiring accessible. The dial should meet the requirements given in Section 028-300-701 covering dials.