

TRAFFIC REGISTER ROUTINE PANEL OFFICES

1. GENERAL:

- 1.1 Upon the receipt of a complaint of suspected faulty operation of one or more traffic registers, an operation test should be made of the suspected registers. If this test fails to reveal a trouble condition, a 100 operation test of the registers should be made as described herein. If the register tests fail to locate the trouble and the operation of the register depends upon the operation of a relay (or relays), it might be advisable to check the relay.
- 1.2 The 100 operation test as described in this section tests the speed characteristic of the register and whether 3 wheels will operate together when the specified test "operate" current flow value is applied.
- 1.3 The test should be made preferably on other than peg count days and at a time when traffic is light. Any test of selector peg count registers should be made during a period of very light traffic since a call, during the period of test, on any selector associated with the group may give a false result, unless the wire to the register is opened.
- 1.4 Care should be taken to enter the traffic register readings on the proper form before and after the test is made and to forward the form according to local instructions.

2. APPARATUS:

- 2.1 No. 35-C (or No. 35-A) Test Set.
- 2.2 Message Register Test Set per SD-20173-01, ES-20054-01 or ES-261119 (arranged to test traffic registers).
- 2.3 No. P3E Cord equipped at both ends with No. 110 Plugs.
- 2.4 Two No. 893 Single Conductor Cords (6 feet long) each equipped at both ends with No. 360 type Tools.
- 2.5 Two No. 364 Tools (spade clips).
- 2.6 Two No. 365 Tools (suspended clips).

3. PREPARATION:

- 3.1 Locate the message register test set and the No. 35-C (or No. 35-A) test set at the

rear of the traffic register rack or at a convenient place near the wiring at the back of the traffic registers.

Note: When a selector overflow register is to be tested, the test may be made at the multiple banks on the tip of the associated overflow terminal.

- 3.2 Operate the No. 3 switches of the No. 35-C test set to O. (On the No. 35-A test set, the 25000 OHMS switches should be operated.)
- 3.3 Note that all the other keys of the No. 35-C (or No. 35-A) test set are normal and move all resistance slides to their extreme right positions.
- 3.4 Operate the BATT & GRD-CO key and close the G switch.
- 3.5 Connect a No. 364 tool to the No. 360 tool on one end of each of the No. 893 cords. Connect No. 365 tools to the No. 360 tools on the other ends.
- 3.6 Connect the No. 364 tool on one No. 893 cord to the GRD binding post and the No. 364 on the other No. 893 cord to the R binding post of the No. 35-C (or No. 35-A) test set.
- 3.7 Connect the No. 365 tool at the free end of the No. 893 cord attached to the GRD binding post, to a convenient ground supply.
- 3.8 Connect the No. 365 tool at the free end of the No. 893 cord attached to the R binding post, to the winding terminal of the traffic register under test, to which ground is supplied for the operation of the register.
- 3.9 Operate the TR key of the message register test set.
- 3.10 If battery supply for the register under test is controlled by a No. 511 type key at the traffic register rack, this key should be operated while the test is being made.
- 3.11 When call indicator overflow alarm circuits are provided, the call indicator supervisor should be notified when tests of overflow registers associated with call indicator trunk groups are to be made in order that no action need be taken by her if the overflow alarm operates.

4. METHOD:

- 4.1 Record the reading of the traffic register under test. Depress the No. 1 key of the No. 35-C (or No. 35-A) test set and move the No. 1 resistance slides until the specified test "non-operate" current value of the register under test is observed on the milammeter of the No. 35-C (or No. 35-A) test set. Care should be taken not to operate the MIL-AMPS key until the reading of the milammeter indicates that the current is less than the full scale reading of the range in which transfer is to be made. Release key No. 1.
- 4.2 Depress and release the No. 1 key three times and note that no registration is made on the register under test.
- 4.3 Depress key No. 3 and move the No. 3 resistance slides until the specified test "operate" current value of the register under test is observed, on the milammeter of the No. 35-C (or No. 35-A) test set. Care should be taken not to operate the MIL-AMPS key until the reading of the milammeter indicates that the current is less than the full scale reading of the range to which transfer is to be made. Release key No. 3.
- 4.4 Depress and release key No. 3 three times. Three registrations should be made on the register under test. Record the register reading.
- 4.5 Insert one No. 110 plug of the No. P3E cord into the 3R jack of the No. 35-C (or No. 35-A) test set. Insert the other No. 110 plug of the No. P3E cord into the B-GRD (or A) jack of the message register test set.
- 4.6 Close the locking lever of key No. 3 and operate the interrupter lever of the message register test set. When the interrupter lever has restored to normal, read the register again. Note that the reading is 100 more than the reading before the interrupted lever was operated.

5. REPORTS:

- 5.1 The required record of this routine should be entered on the proper form and forwarded according to local instructions.