FAILURE OF TERMINATING MARKER SHORT TIME OUT
NO. 1 CROSSBAR OFFICES

1. GENERAL
1.01 This section covers methods to be followed in connection with troubles due to failure of the short time out feature of the terminating markers.
1.02 This section has been reissued principally to alter the form.

2. INDICATIONS OF TROUBLE CONDITION
2.01 Marker connector alarm, marker long time out alarm, line link alarm, steady TM (terminating marker) lamp and terminating trouble indicator records.

3. REACTIONS DUE TO TROUBLE
3.01 This trouble causes increased marker holding time resulting in a back-up of terminating traffic. In busy hour periods it may cause an overload on the originating senders.
3.02 It also results in dial tone delays as a result of line links being held by the markers.

4. IMMEDIATE PROCEDURE TO FOLLOW
4.01 Analyze terminating trouble indicator records. Note steady TM (timing) lamp. Remove the marker involved from service and release the marker manually if still holding frames.

5. ANALYSIS OF TROUBLE
5.01 Whenever the marker in trouble is blocked and the short time out features fail, it must await its long time out period (28-56 sec.). This causes other markers to be denied access to the number group, line choice or incoming frame which the marker in trouble is holding and forces them to time out.
5.02 If the marker in trouble has selected a line link frame it will hold this frame and cause it to time out.
5.03 The DT (decoder time out) lamp for this marker may or may not be lighted depending on whether the terminating sender connected to the marker holds it for the long time out period.

6. SUGGESTED PROCEDURE FOR LOCATING AND CLEARING TROUBLE
6.01 Set up a test call on the trouble indicator and observe the timing relays of the marker in trouble for proper operation.

7. TROUBLE CONDITIONS CAUSING REACTIONS MAY BE LISTED BELOW
7.01 The cam roller on the timing interrupter becoming disengaged from the driving cam.
Column A - Trouble indication. DT lamp will correspond to marker in trouble. It may or may not be lighted.

Columns C and D - Any sender except the one in trouble.

Column E - No NGC lamp with no TBK lamp in column M indicates failure to connect to number group.

Column F - No LOG lamp with FC and AK lamps in column N indicates failure to connect to line link groups.


Analysis of Indication: The marker connector alarm is generally the first indication of this trouble and is followed by the above type of indication. Note that these indications show frame lockout at number groups, incoming frame and line link, marker long time out alarms may or may not be received depending on whether the marker is held until it times out. Line link alarm lamps may light if marker connects to frame while timing.

Immediate Procedure to Follow: Note TM lamps to determine marker in trouble or use the trouble indicator to detect marker in trouble by setting up a call requiring marker to time out. Make marker busy when detected.

Procedure for Locating and Clearing Trouble: Observe action of timing relays in marker on calls from the trouble indicator.