

DEPARTMENT OF THE ARMY TECHNICAL MANUAL

OPERATOR, ORGANIZATIONAL, FIELD, AND
DEPOT MAINTENANCE MANUAL
TEST FACILITIES KIT, RADIO
MK-153/GRC

This copy is a reprint which includes
current pages from Changes 1, 2, and 4.

HEADQUARTERS, DEPARTMENT OF THE ARMY
SEPTEMBER 1961

AGO 10032A

OPERATOR, ORGANIZATIONAL, FIELD, AND DEPOT MAINTENANCE MANUAL TEST FACILITIES KIT, RADIO MK-153/GRC

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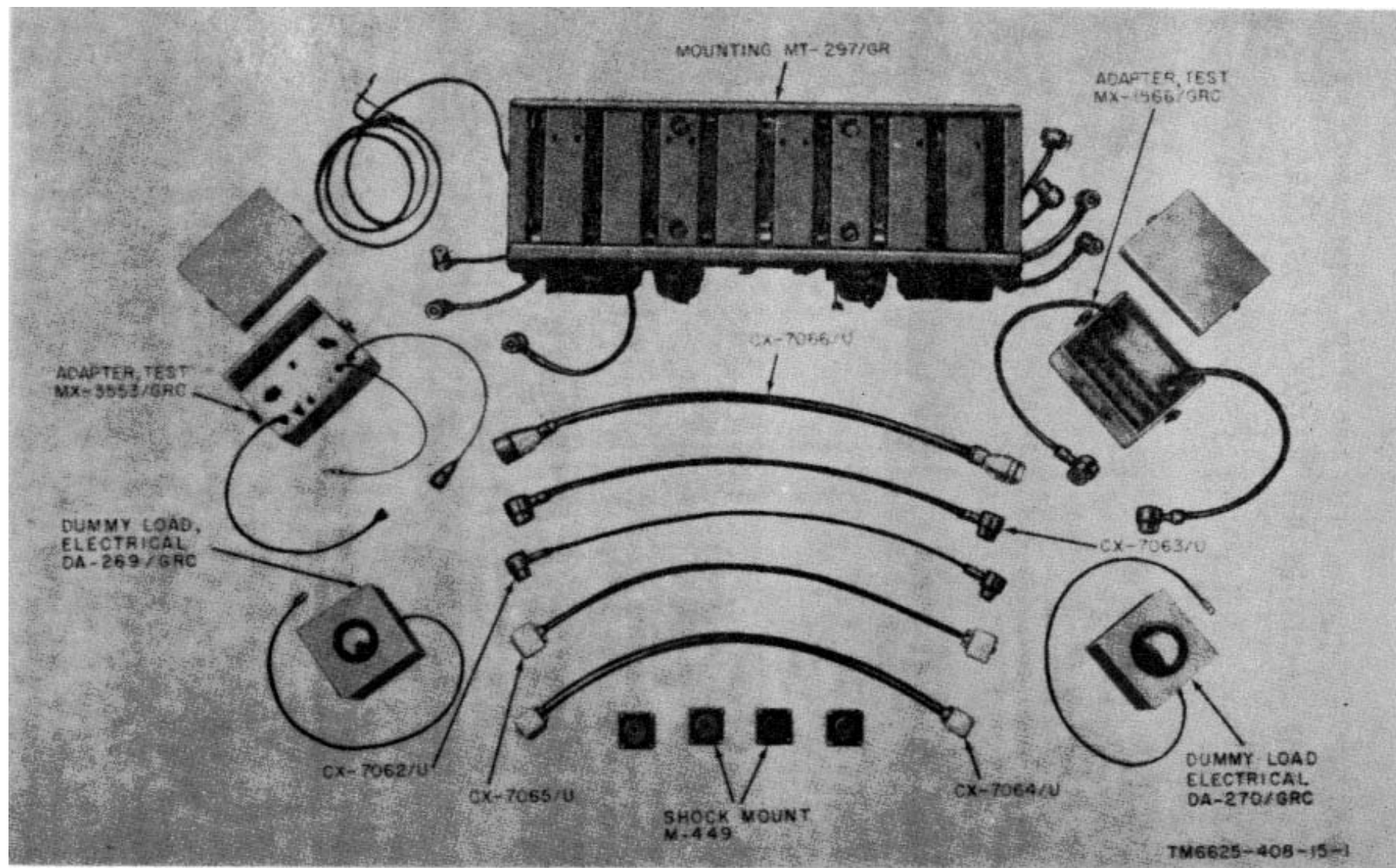


Figure 1. Test Facilities Kit, Radio MK-153/GRC.

CHAPTER 1

INTRODUCTION

Section I. GENERAL

1. Scope

This manual describes Test Facilities Kit, Radio MK-153/GRC and covers the installation, operation, all echelons of maintenance, and repair.

2. Forms and Records

a. Unsatisfactory Equipment Reports. Fill out and forward DA Form 468 (Unsatisfactory Equipment Report) to the Commanding Officer, U.S. Army Signal Materiel Support Agency, ATTN: SIGMS-ML, Fort Monmouth, N.J., as prescribed in AR 700-38.

b. Report of Damaged or Improper Shipment. Fill out and forward DD Form 6 (Report of Damaged or Improper Shipment) as prescribed in AR 700-58.

c. Preventive Maintenance Forms. Prepare DA Form 11-266 (figs. 10, 11, and 12) (Maintenance Check List for Signal Equipment (Test Equipment)) in accordance with instructions on the form.

d. Parts List Form. Forward DA Form 2028 (Recommended changes to DA Technical Manual Parts Lists or Supply Manuals 7, 8, or 9), direct to the Commanding Officer, U.S. Army Signal Materiel Support Agency, ATTN: SIGMS-ML, Fort Monmouth, N.J., with comments on parts listings.

e. Comments on Manual. Forward all other comments on this manual direct to the Commanding Officer, U.S. Army Signal Materiel Support Agency, ATTN: SIGMS-PA2d, Fort Monmouth, N.J.

Section II. DESCRIPTION AND DATA

3. Purpose and Use

a. Test Facility Kit, Radio MK-163/GRC (fig. 1) contains maintenance equipment required to facilitate third echelon and higher maintenance on components of Radio Sets AN/ GRC-3 through -8, and AN/PRC-8, -9, and -10.

b. Special cables are provided to permit panels and subchassis of the receivers and transmitters to be disassembled for troubleshooting and alignment.

c. Test adapters are provided to permit voltage and resistance measurements to be made without disassembling the sets.

d. Two dummy antennas are provided to measure the output of the transmitters; one for high power and the other for low power.

4. Technical Characteristics

a. Dummy Load, Electrical DA-269/GRC.

TypeResistive.

Indication0-1 amp RF meter.

Maximum power consumption..... 28 w at frequency range of 20 to 55 mc.

Input impedance..... 40 ohms.

Weight 2 lb.

b. Dummy Load, Electrical DA-270/GRC.

Type Resistive.

Indication 0-1560 ma RF meter.

Maximum power consumption..... 1 w in the frequency range of 47.0 to 58.4 mc.

Input impedance 50 ohms.

Weight 2 lb.

c. Mounting MT-297/GR.

Input voltage..... 12 or 24 volts dc.

Power requirements..... From 110 to 280 w, depending on number of components being tested.

Weight 58 lb.

5. Components of Test Facilities Kit, Radio MK-153/GRC

The components of Test Facilities Kit, Radio MK-153/GRC are listed in the basic issue items list (app. III) and are illustrated in figure 1.