

TECHNICAL MANUAL

**DIRECT SUPPORT, GENERAL SUPPORT,
AND DEPOT
MAINTENANCE MANUAL
INCLUDING REPAIR PARTS AND SPECIAL TOOLS LISTS
RADIO SET AN/PRC-47**

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**Direct Support, General Support and
Depot Maintenance Manual
(Including Repair Parts and Special Tools List)
RADIO SET AN/PRC-47**

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CHAPTER 1 INTRODUCTION

1-1. Scope

a. This manual contains instructions for general support, direct support and depot maintenance of Radio Set AN/PRC-47. It includes instructions that are appropriate to the general support, direct support and depot maintenance routines for performance testing, troubleshooting, alignment, and repair of the equipment, the replacement of maintenance parts, and the repair of specific subassemblies. A list of tools, materials and test equipment that are required for maintenance is included. A detailed theory of operation for the equipment is included in chapter 2.

b. Operator and Organizational Maintenance Manual, Radio Set AN/PRC-47 TM 11-5820-509-12, including Repair Parts and Special Tools List and Maintenance Allocation Chart, contains additional information pertinent to this same equipment.

c. Only one model of Radio Set AN/PRC-47 is documented in this publication. An historical record of equipment revisions is shown in paragraph 1-4.

1-2. Indexes of Publications

a. *DA Pam 310-4*. Refer to the latest issue of DA PAM 310-4 to determine whether there are new editions, changes, or additional publications that pertain to this equipment.

b. *DA Pam 310-7* Refer to DA Pam 310-7 to determine whether there are modification work orders (MWO's) pertaining to this equipment.

NOTE

Other applicable forms and records are included in Operator and Organizational Maintenance Manual, Radio Set AN/PRC-47, TM 11-5820-509-12.

1-3. Reporting of Errors

The reporting of errors, omissions, and recommendations for improving this publication by the individual user is encouraged. These reports should be submitted on DA Form 2028 (Recommended Changes to Publications and Blank Forms) and forwarded direct to Commander, U.S. Army Electronics Command, ATTN: DRSEL-MA-Q Fort Monmouth, NJ 07703.

1-3.1 Reporting Equipment Improvement Recommendations (EIR)

EIR will be prepared using DA Form 2407 (Maintenance Request). Instructions for preparing EIR's are provided in TM 38-750, The Army Maintenance Management System. EIR's should be mailed directly to Commander, US Army Electronics Command, ATTN: DRSEL-MA-Q, Fort Monmouth, NJ 07703.

1-3.2. Administrative Storage

Administrative storage of equipment issued to and used by Army activities shall be in accordance with TM 740-90-1.

1-3.3 Destruction of Army Electronics Materiel

Destruction of Army electronics materiel to prevent enemy use shall be in accordance with TM 750-244-2.

1-4. Historical Revisions to Equipment

a. No External appearance or major operational differences exist between procurements of Radio Set AN/PRC-47.

b. The electrical subassemblies and plug-in modules of Radio Receiver-Transmitter RT-671/PRC-47 have been revised during the history of Radio Set AN/PRC-47 as indicated in the table below. Complete interchangeability of the electrical subassembly or module was retained.

Ref des	MCN effectivity	Description of change
AUDIO FREQUENCY AMPLIFIER AM-3506/PRC-47 (A8A1)		
A1C33	525	Changed to 47 uF, was 33 uF.
A1C39	525	Delete, was 22 uF.
A1CR14	525	Delete, was type 1N457.
A1Q11W / A1Q12X	525	Changed to matched pair, type 2N158A match Beta within 25% at I _c = 250 ma
A1R55	525	Changed to 18K, was 100K ohms.
A1R60	525	Changed to 16.2K 2as 7.5K ohms.
A1R69	525	Delete, was 18K ohms
A1R70	525	Delete, was 470K ohms.
A1R71	525	Delete, was 2,200 ohms.
A1R72	525	Changed to 1,200 was 2,700 ohms.