

**ARMY
NAVY
AIR FORCE**

**TM 11-6625-667-12
NAVAIR 16-30APM-123-1
TO 33A1-3-367-1**

TECHNICAL MANUAL

OPERATOR AND ORGANIZATIONAL MAINTENANCE MANUAL

TEST SET, TRANSPONDER

AN/APM-123[V] 1 [FSN 6625-948-0071]

AN/APM-123[V] 2 [FSN 6625-948-0077]

AN/APM-123[V] 3 [FSN 6625-948-0076]

HEADQUARTERS, DEPARTMENT OF THE ARMY

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DEPARTMENTS OF THE ARMY, THE NAVY,
 AND THE AIR FORCE

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Operator and Organizational Maintenance Manual
TEST SET, TRANSPONDER AN/APM-123(V)1 (FSN 6625-948-0071),
AN/APM-123(V)2 (FSN 6625-948-0077), AN/APM-123(V)3 (FSN 6625-948-0076)

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*This manual supersedes TM 11-6625-667-12, 14 April 1966, including all changes.

This Technical Manual and Equipment covered herein is configured for Inter-service use and maintainability by Direction of the Department of Defense AIMS System Program Office (DOD AIMS SPO). No changes shall be made to the equipment or Technical Manual without approval of the DOD AIMS SPO.

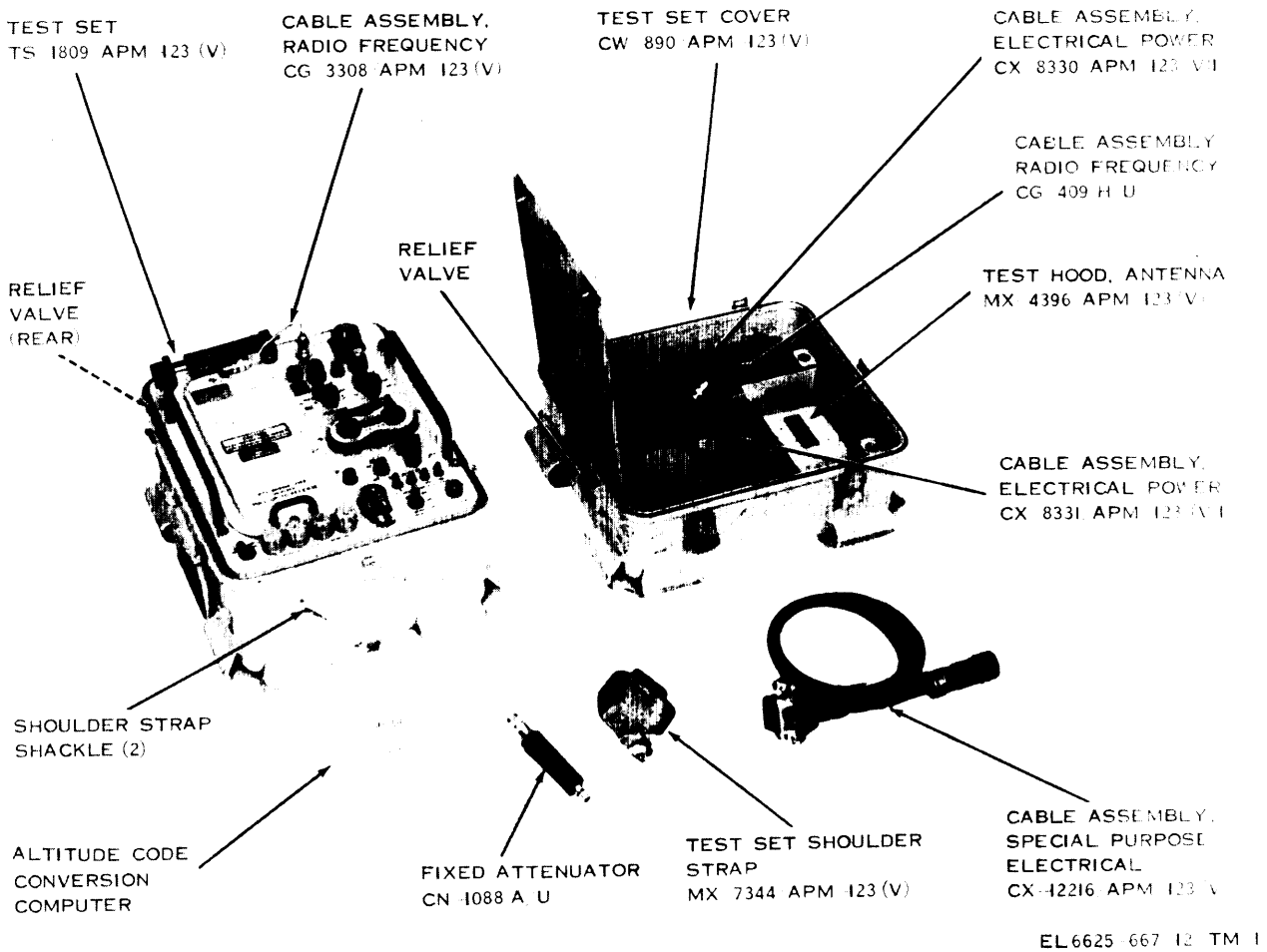


Figure 1-1. Test Set, Transponder AN/APM-123(V)1 (power cable for AN/APM-123(V)2 and 3 not shown).

CHAPTER 1

INTRODUCTION

Section I. GENERAL

1-1. Scope

a. This manual describes Test Sets, Transponder AN/PAM-123(V)1, 2 and 3 (test set) (fig. 1-1) and covers their operation and organizational maintenance. It includes instructions for operation, inspection and preventive maintenance of the test set. Also included in this manual is a maintenance allocation chart (App B.)

1-2. Indexes of Publications

a. Refer to the latest issue of DA Pam 310-4 (Army), NAVSUP 2002 section viii (Navy), or T.O. 0-1-33 (Air Force) to determine whether there are new additions, changes, or additional publications pertaining to the equipment.

b. Refer to DA Pam 310-7 (Army) to determine whether there are modification work orders (MWO'S) pertaining to the equipment.

1-3. Forms and Records

a. Reports of Maintenance and Unsatisfactory Equipment. Maintenance forms, records, and reports which are to be used by maintenance personnel at all maintenance levels are listed in and prescribed by TM 38-750 (Army). Air Force personnel will use AFM 66-1 for maintenance reporting and TO-00-35D54 for unsatisfactory equipment reporting. Navy personnel will report maintenance performed utilizing the Maintenance Data Collection Subsystem (MDSC) in accordance with OPNAVINST 4790-2, Vol 3 and unsatisfactory material/conditions (UR submissions) in accordance with OPNAVINST 4790.2, Vol 2, chapter 17.

b. Report of Packaging and Handling Deficiencies. Fill out and forward DD Form 6 (Packaging Improvement Report) as prescribed in AR 700-58/NAVSUPINST 4030.29/AFR 71-13/MCO P4030.29A, and DSAR 4145.8.

c. Discrepancy in Shipment Report (DISREP) (SF 361). Fill out and forward Discrepancy in Shipment Report (DISREP) (SF 361) as prescribed in AR 55-38/NAVSUPINST 4610.33A/AFR75-18/MCO

P4610.19B and DSAR 4500.15.

1-3.1. Reporting of Errors

The reporting of errors, omissions, and recommendations for improving this manual by the individual user is encouraged. Reports should be submitted on DA Form 2028 (Recommended Changes to Publications and Blank Forms) or DA Form 2028-2 (Test) located in the back of the manual, and forwarded direct to Commander, US Army Electronics Command, ATTN: DRSEL-MA-Q, Fort Monmouth, NJ 07703. To use the form in the back of the manual, cut it out, fill it out as shown on the sample figure 1-2, fold it where shown, and drop it in the mail. A reply will be furnished direct to you.

1-3.2. Destruction of Army Materiel to Prevent Enemy Use

Demolition of the test set will be accomplished only upon the order of the Commander. Refer to TM 750-244-2 for procedures to prevent the enemy from using or salvaging the test set.

1-3.3. Administrative Storage.

For procedures, forms and records, and inspections required during administrative storage of this equipment, refer to TM 740-90-1.

1-3.4. Reporting Equipment Improvement Recommendations (EIR)

a. Army. EIR's 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. A reply will be furnished directly to you.

b. Air Force. Air Force personnel are encouraged to submit EIR's in accordance with AFM 900-4.

c. Navy. Navy personnel are encouraged to submit EIR's through their local Beneficial Suggestion Program.

Section II. DESCRIPTION AND DATA

1-4. Purpose and Use

a Test Set, Transponder AN/APM-123(V) () is a portable preflight test set for checking transponder sets such as Transponder Set AN/APX-44 and DOD AIMS AN/APX-64, and AN/APX-72, Transponder Sets. The test set provides coded radio-frequency (RF) interrogation signals to check the transponder set

receiver and decoder and, in addition, checks the transponder set transmitter and coder by evaluating the coded RF replies.

b. Any one of three types of RF coupling may be selected.

(1) Free-spacing radiation coupling by an adjustable front panel antenna.