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TEST OPERATIONS PROCEDURE

*Test Operations Procedure 03-2-045A
DTIC AD No. AD1011733

24 June 2016

SMALL ARMS - HAND AND SHOULDER WEAPONS AND MACHINE GUNS

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1. SCOPE.

a. This Test Operations Procedure (TOP) contains a compilation of procedures for testing hand and shoulder weapons and machine guns, including crew served weapons and light automatic cannons up to 50 millimeter (mm) in caliber. The test procedures apply to the basic weapons only; see TOP 04-2-016^{1**} for test procedures for small arms ammunition. Also, see TOP 03-2-504A² for safety evaluations of hand and shoulder weapons. Grenade launchers are covered in TOP 03-2-030³. Many small arms are also used as subsystems in combat vehicles, aircraft, watercraft, etc.; in these cases, consult TOPs relevant to the specific platforms for possible additional test procedures.

b. The test procedures are meant to help standardize testing and to aid the development of Detailed Test Plans (DTPs), Test and Evaluation Master Plans (TEMPs), and similar planning documents. This TOP does not constitute a requirement to do any of the specific tests nor does it serve to set performance or safety criteria for Army materiel. Actual requirements and criteria must come from requirements documents, contractual obligations, Army Regulations (ARs), etc.

2. FACILITIES AND INSTRUMENTATION.

This section lists specialized items that are used in testing. Additional information is contained in the individual test procedures since requirements for accuracy and precision of a given measurement may vary among the procedures. Standard equipment common to most technical organizations is not listed; however, the test officer must ensure that the specific requirements of each procedure are met by whatever equipment or instrumentation is used.

2.1 Facilities.

<u>Item</u>	<u>Requirement</u>
Firing ranges	Ranges must safely accommodate firing to the required distances; range safety fans must consider the possibility of catastrophic failure of test weapons.
Test stands	Must safely restrain the weapon, allow remote firing, and assure reproducible results.
Ground mounts (bipods, tripods, gimbals, etc.)	Specific to the test weapon.
Control weapon	Similarity to the test weapon to permit checkout of test setups, instrumentation, etc.

** Superscript numbers correspond to Appendix B, References.