

ROUTINE

MWO effective date is Sep 91 and completion date is Oct 95.

MWO 9-1005-201-30-2

MODIFICATION WORK ORDER

MODIFICATION OF MACHINE GUN, 5.56MM, M249
(NSN 1005-01-127-7510)

Headquarters, Department of the Army Washington, DC
10 February 1992

REPORTING ERRORS AND RECOMMENDING IMPROVEMENTS

You can help improve this MWO. If you find any mistakes or if you know of a way to improve these procedures, please let us know. Write a letter or complete and mail a DA Form 2028, Recommended Changes to Publications and Blank Forms, to Commander, U.S. Army Armament, Munitions and Chemical Command, ATTN: AMSMC-MAS, Rock Island, IL 61299-6000. A reply will be provided to you.

1. PURPOSE. The purpose of this modification is to upgrade the weapon for combat effectiveness by the addition of a spare barrel to the M249 Machine Gun.
 2. PRIORITY. This modification is classified ROUTINE.
 3. END ITEM OR SYSTEM TO BE MODIFIED. Machine Gun, 5.56MM, M249 (NSN 1005-01-127-7510).
 4. MODULE(S) (COMPONENTS, ASSEMBLIES, SUBASSEMBLIES, BOARDS, AND CARDS) TO BE MODIFIED, Not applicable.
 5. PARTS TO BE MODIFIED. Not applicable.
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6. APPLICATION.

a. Time compliance schedule: This MWO is effective September 1991 and the completion date is October 1995.

b. Level of maintenance: The lowest level of maintenance authorized to apply this MWO is Direct Support Maintenance.

c. The total man-hours required for a single application of this MWO is 0.1 hours.

7. TECHNICAL PUBLICATIONS AFFECTED/CHANGED. TM9-1005-201-10/TM08671A-10/1A and TM9-1005-201-23&P/TM08671A-23&P/2A.

8. MWO KIT(S)/PART(S) AND THEIR DISPOSITION.

a. All parts needed to apply MWO. Not applicable.

b. Contents of MWO kits.

NSN	ITEM NAME AND PART NO.	QTY PER END ITEM
1005-01-318-9735	Modification Kit, M249 (19200) 12557031 consisting of:	1
1005-01-254-9800	Barrel Assembly, (19200) 12557000	1
1005-01-249-0184	Heat Shield Assembly, (19200) 12540405	1
1005-00-791-5420	Spare Barrel Bag, (19200) 7791009	1

c. Bulk and expendable material. Not applicable.

d. Parts disposition. Not applicable.

9. SPECIAL TOOLS; TOOL KITS; JIGS; TEST, MEASUREMENT AND DIAGNOSTIC EQUIPMENT (TMDE); AND FIXTURES REQUIRED: Not applicable.

10. MODIFICATION PROCEDURES.

a. Unpack the Modification Kit.

b. Inspect modification kit for completeness and for damage before assembly, as follows:

(1) Visually inspect Barrel Assembly for bends, dents, cracks, burrs, or loose front sights.

(2) Visually inspect Spare Barrel Bag for tears, incomplete stitching or broken zippers.

(3) Visually inspect Heat Shield Assembly for bends or cracks.

c. Clear the weapon as follows:

(1) Charge weapon (pull cocking handle to the rear). Be sure bolt is locked in rear position. Push charging handle forward until you hear it click.

(2) Push safety to right (red band not visible).

(3) Squeeze latches and open cover assembly.

(4) If present, remove ammo belt, loose links or magazine.

(5) Raise feed tray and look into chamber and assure it is empty.

(6) Close cover assembly. Make sure it locks in place.

(7) Push safety to left (red band visible). Pull cocking handle to rear and hold, depress trigger and ride bolt forward to close and lock.

d. Remove bolt assembly as follows:

WARNING

Be sure bolt is in forward position before removing drive spring.

(1) Pull the upper grooved pin at the rear of the receiver to the left to release the buttstock.

(2) Let the buttstock pivot downward so that the rear opening on receiver is completely free.

(3) By holding weapon with one hand on the buttstock, simultaneously push in and upward on the rear end of operating rod assembly with thumb of other hand. The operating rod assembly is now released from positioning groove inside receiver. Withdraw the operating rod assembly and spring.

(4) Pull the cocking handle rearward, sliding the piston, slide and bolt assembly out the rear of the receiver. Remove bolt assembly from slide assembly.

e. Remove barrel assembly as follows:

(1) Assure folding handle on new style barrel assembly is in carrying (up) position.

(2) Depress locking lever of the barrel with left hand. Hold carrying handle with the right hand, lift up and push the barrel forward.

f. Verify that bolt and barrel assembly accompanying the weapon, headspace correctly in accordance with procedures outlined in Army TM9-1005-201-23&P Marine Corps TM08671A-23&P/2.

g. Inspect new barrel assembly for proper headspace using the following procedures:

NOTE

Use bolt assembly that accompanied the weapon.

(1) Insert tapered end of headspace gage into barrel.

CAUTION

Forcing the bolt closed will harm the gage and give an incorrect reading.

(2) Insert bolt into barrel and (with slight pressure) attempt to lock bolt (by rotating to the left) with headspace gage installed.

(3) Barrel and bolt are considered to have proper headspace if bolt DOES NOT lock into barrel with headspace gage installed. If the bolt seems to lock, but more resistance is felt than without the gage in place, headspace is correct. If headspace is incorrect (bolt locks into barrel), submit a quality deficiency report (QDR) SF 368 to Commander, HQ, AMCCOM, ATTN: AMSMC-QAG.

NOTE

Both barrels and bolt, assigned to the weapon, must pass headspace check.

h. Depress the locking lever with left hand. Holding the carrying handle with the right hand, pull the barrel rearward, push downward and lock by releasing barrel locking lever.

i. Install bolt assembly into slide assembly.

j. Install piston slide and bolt assembly into receiver. Pull trigger so that the sear does not prevent the moving parts from going forward.

k. Hold the pistol grip with one hand and push the return rod and transfer mechanism assembly into its housing in the rear of the piston with the other. With the thumb of that hand, press in and down on the rear of the assembly until its two lugs are positioned in the receiver grooves.

l. Pivot the buttstock and buffer upward into position and push the retaining pin, to the right. Close the cover assembly.

m. Install heatshield assembly by hooking the metal extensions of the heatshield under the protruding front sight pins (new style barrel) with the spring clips down on top of barrel. Apply downward pressure and snap heatshield onto the barrel.

NOTE

Although old style barrels do not have protruding front sight pins, heat shield assemblies can be used.

11. CALIBRATION REQUIREMENTS. Prior to MWO application, headspace gage (9350102) should be calibrated in accordance with TB 43-180, Calibration and Repair Requirements for the Maintenance of Army Materiel.

12. WEIGHT AND BALANCE DATA. Not significantly affected.

13. QUALITY ASSURANCE REQUIREMENTS. Submit QDRs upon discovery of discrepancy.

14. RECORDING AND REPORTING OF THE MODIFICATION.

a. Records and reports. Record and report accomplishment of the modification in accordance with DA PAM 738-750, The Army Maintenance Management System (TAMMS), Standard Army Maintenance System (SAMS). A DA Form 2407/5504 shall be completed and submitted within 3 days of accomplishment of modification. Specific instructions for use of DA Form 2407/5504 to report a modification are contained in DA Pam 738-750. In addition copy 2 of DA Form 2407/5504 shall be forwarded to:

Commander
HQ, AMCCOM
ATTN: AMSMC-MAE-M
Rock Island, IL 61299-6000

b. Marking equipment. Not applicable.

c. Identification data. Not applicable.

15. MATERIEL CHANGE (MC) NUMBER. This MWO is authorized by MC number 1-84-05-7119.

16. MODIFICATION IDENTIFICATION. Not applicable.

By Order of the Secretary of the Army:

GORDON R. SULLIVAN
General, United States Army
Chief of Staff

Official:



MILTON H. HAMILTON
Administrative Assistant to the
Secretary of the Army
00577

DISTRIBUTION:

To be distributed in accordance with DA Form 12-40-E, (Block 0856),
Direct and General Support Maintenance requirements for TM9-1005-201-30-2.

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