

ARMY TM 9-1005-317-23&P
NAVY SW 370-AA-MMO-010/9mm
AIR FORCE TO 11W3-3-5-4
MARINE CORPS TM 1005-23&P/2
COAST GUARD COMDTINST M8370.7

WARNING

Read this manual carefully before performing required maintenance.

Before starting an inspection, and/or performing any maintenance procedures, be sure to clear the pistol. Do not squeeze trigger until the pistol has been cleared. Inspect the chamber to be sure that it is empty. Check to see that there are no obstructions in the barrel. Do not keep live ammunition near work/maintenance area.

Safety glasses, hearing protection, and protective clothing should be worn when repairing, firing, or cleaning the pistol.

Protective gloves should be worn when working with cleaning solvents.

For further information on safety, care, and handling of ammunition: Army users refer to TM 9-1005-317-10; Navy and Coast Guard users refer to OP 4 or OP 5.

Pistol will fire from the half cock position if the trigger is pulled.

Perform detail disassembly only to the level of maintenance required/authorized to identify and correct deficiencies.

A potential safety hazard exists if the firing pin block is missing or does not return flush with the slide surface after firing.

During removal of the lanyard loop spring pin, be sure the punch is left in place to prevent injury to personnel or accidental loss of parts.

Use care when removing recoil spring and spring guide. Because of the amount of compression, assembly will be released under spring tension and could cause possible injury to personnel, or become damaged or lost.

Cover the top of the trigger cavity to prevent ejection or loss of the trigger spring, or possible injury to personnel during removal of the trigger pin.

When applying pressure to the center/coil area of trigger spring, use care to prevent ejection of trigger spring as this could cause possible injury to personnel.

For further information on first aid, refer to FM 21-11.

TECHNICAL MANUAL
ARMY NO. 9-1005-317-23&P
NAVY SW 370-AA-MMO-010/9mm
TECHNICAL ORDER
AIR FORCE NO. 11W3-3-5-4
TECHNICAL MANUAL
MARINE CORPS NO. 1005A-23&P/2
COAST GUARD COMDTINST M8370.7

DEPARTMENTS OF THE ARMY, NAVY,
AND AIR FORCE
HEADQUARTERS, MARINE CORPS
COMMANDANT, COAST GUARD

HEADQUARTERS, DEPARTMENT OF THE ARMY
WASHINGTON, DC, 31 January 1986

UNIT AND INTERMEDIATE DIRECT SUPPORT MAINTENANCE MANUAL
(Including Repair Parts and Special Tools List)

for

PISTOL, SEMIAUTOMATIC, 9mm, M9
(1005-01-118-2640)

Current as of 27 January 1986 for Appendix C

REPORTING ERRORS AND RECOMMENDING IMPROVEMENTS

You can help improve this manual. If you find any mistakes, or if you know of a way to improve the procedures, please let us know.

Army users mail your letter, DA Form 2028 (Recommended Changes to Equipment Publications and Blank Forms), or DA Form 2028-2 located in the back of this manual direct to: Commander, U.S. Army Armament, Munitions and Chemical Command, ATTN: AMSMC-MAS, Rock Island, IL 61299-6000.

Navy users submit Recommended Changes to Publications to: Commanding Officer, Naval Weapons Support Center, Code 20, Crane, IN 47522-5020.

Air Force users submit AFTO Form 22, Technical Order System Publications Improvement Report and Reply, to: WR-ALC/MMEDT, Robins AFB, GA 31098-5000.

Marine Corps users submit NAVMC 10772 Form to: Commanding General, Marine Corps Logistics Base (Code 850), Albany, GA 31704-5000.

Coast Guard users submit Publications Correction/Change Report form CG 4394 to: Commandant, U.S. Coast Guard (G-ODO-2), Washington, DC 20593.

A reply will be furnished to you.

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HOW TO USE THIS MANUAL

GENERAL

In order to use this manual efficiently, there are several things you need to know.

1. You must familiarize yourself with the entire maintenance procedure before beginning the maintenance task.
2. All references in this manual are either to paragraphs, pages, or to another manual.
3. Whenever the male gender is mentioned in this manual, it also pertains to all joint service personnel.

INDEXES

This manual is organized to help you quickly find the information you need. There are several useful indexes.

1. **Front Cover Index.** Is a tabbed index of items used often. Keyed to tabbed pages in the manual.
2. **Table of Contents.** Lists in order all chapters, sections, and appendixes. Gives page references.
3. **Nomenclature Cross-Reference List.** Gives an alphabetical list of the common names that are substituted for the official nomenclature in the manual.
4. **Chapter Overviews.** Summarizes material covered in the chapter.
5. **Troubleshooting Symptom Index.** Lists in alphabetical order parts of the weapon with possible malfunctions. References pages of the troubleshooting table.
6. **Alphabetical Index.** Located at the end of the manual. An extensive subject index for everything in the manual. It gives page references.

MAINTENANCE PROCEDURES

There are two maintenance chapters:

Army personnel use chapter two for unit maintenance procedures and chapter three for intermediate direct support maintenance procedures.

Navy personnel use chapter two for organizational maintenance procedures and chapter three for intermediate maintenance procedures.

Air Force personnel: Only Air Force Specialty Code 753XX Combat Arms Training and Maintenance Specialists, Technicians, and Gunsmiths are authorized to perform maintenance procedures contained in this manual.

Marine Corps personnel use chapter two for organizational (2d echelon) maintenance procedures and chapter three for intermediate (3d echelon) maintenance procedures.

Coast Guard personnel refer to COMDTINST 8000.2.

MAINTENANCE PROCEDURES (cont)

Each maintenance chapter has an initial setup containing a list of the following things you will need in order to do your maintenance task:

1. **Tools and Special Tools.** For standard and special tools, see appendixes B and C.
2. **Materials/Parts.** Lists expendable materials and 100 percent replaceable parts. Each material or part is followed by a part number or appendix reference. If more than one part is needed, the quantity needed precedes the part number or reference.
3. **References.** Lists other publications containing necessary information.
4. **Equipment Condition.** Lists conditions to be met before starting the procedure.

Step-by-step procedures are illustrated procedures for maintenance authorized by the MAC, appendix B.

CHAPTER 1

INTRODUCTION

Chapter Overview

This chapter contains the following: General Information, Equipment Description and Data, and Principles of Operation for the pistol.

Section I. GENERAL INFORMATION

1-1. SCOPE.

a. **Type of Manual.** Unit and Intermediate Direct Support Maintenance Manual including Repair Parts and Special Tools List.

b. **Model Number and Equipment Name.** M9, 9mm, Semiautomatic Pistol.

c. **Purpose of Equipment:** Provides personal defense protection.

1-2. MAINTENANCE FORMS AND RECORDS.

Department of the Army forms and procedures used for equipment maintenance will be those prescribed by DA PAM 738-750, The Army Maintenance Management System (TAMMS).

Navy and Coast Guard users refer to applicable Preventive Maintenance System Instructions.

Air Force users refer to TO 11W-1-10 and AFTO Form 105 for documenting weapon maintenance.

Marine Corps personnel refer to TM 4700-15/1 for equipment forms and record procedures.

1-3. DESTRUCTION OF MATERIEL TO PREVENT ENEMY USE.

Only your commanding officer can give the order to destroy materiel to prevent enemy use. Refer to TM 750-244-7.

1-4. NUCLEAR, BIOLOGICAL AND CHEMICAL (NBC).

General procedures can be found in FM 3-87, FM 21-40, and TM 3-220.

1-5. PREPARATION FOR STORAGE AND SHIPMENT.

Requirements for storage and shipment are listed in paragraph 2-15. Requirements for administrative storage will be in accordance with DOD 5100.76-M, Physical Security of Sensitive Conventional Arms, Ammunition, and Explosives.

1-6. REPORTING EQUIPMENT IMPROVEMENT RECOMMENDATIONS (EIRs).

If your 9mm pistol needs improvement, let us know. Send us an EIR. You, the user, are the only one who can tell us what you don't like about your equipment. Let us know why you don't like the design or performance.

Army users submit an SF 368 (Quality Deficiency Report) and mail it to: Commander, U.S. Army Armament, Munitions and Chemical Command, ATTN: AMSMC-QAD, Rock Island, IL 61299-6000.

Navy users submit Quality Deficiency Report to: Commanding Officer, Naval Weapons Support Center, Code 20, Crane, IN 47522-5020.

Air Force users submit Material Deficiency Report (MDR) to: DIR MAT MGT ROBINS AFB GA//MMIRFT// and Quality Deficiency Report to: DIR MAT MGT ROBINS AFB GA//QAY//.

Marine Corps users submit QDRs on SF 368 in accordance with MCO 4855.10 to: Commanding General, Marine Corps Logistics Base (Code 840), Albany, GA 31704-5000.

Coast Guard users submit QDRs (SF 368) in accordance with COMDTINST M4855.1 to: Commandant, U.S. Coast Guard, (G-000-2), Washington, DC 20593.

We'll send you a reply.

1-7. NOMENCLATURE CROSS-REFERENCE LIST.

OFFICIAL

Magazine, Cartridge
 Extractor
 Slide Assembly
 Magazine Catch Assembly
 Cartridge
 Safety
 Screw, Machine
 Spring, Helical, Torsion Slide Stop
 Spring, Helical, Torsion Sear
 Spring, Helical, Compression Main Spring
 Pin, Straight, Headless Sear
 Spring, Helical, Torsion Trigger
 Pin, Straight, Headed Trigger

COMMON

Magazine
 Extractor/Loaded Chamber Indicator
 Slide
 Magazine Release Button
 Round
 Ambidextrous Safety
 Grip Screw
 Slide Stop Spring
 Sear Spring
 Main Spring
 Sear Pin
 Trigger Spring
 Trigger Pin

Section II. EQUIPMENT DESCRIPTION AND DATA

1-8. EQUIPMENT CHARACTERISTICS, CAPABILITIES, AND FEATURES.

The M9 pistol is a semiautomatic, magazine fed, recoil operated, double action pistol, chambered for the 9mm cartridge.

WARNING

Pistol will fire from the half-cock position if the trigger is pulled.

a. Double Action. When a round is in the chamber with the safety on and the hammer down, double action allows the pistol to fire by placing the safety in the fire position and pulling the trigger.

b. Magazine. Has a 15 round capacity.

c. Extractor/Loaded Chamber Indicator. When there is a round in the chamber, the upper surface of

the extractor protrudes from the right side of the slide. In the dark, the protrusion can be felt by touch.

WARNING

A potential safety hazard exists if the firing pin block is missing or does not return flush with the slide surface after firing.

d. Firing Pin Block. When the trigger is not pulled, the firing pin block secures the firing pin and prevents it from moving forward, even if the pistol is dropped.

e. Ambidextrous Safety. Allows safe operation of the pistol by both right and left-handed users, and lowers the hammer without causing an accidental discharge. When the safety is in the up position, the pistol is ready to fire. When hammer is cocked, it may be safely lowered by moving the safety to the safe (down) position.

f. **Lanyard Loop.** Compatible with standard lanyards.

g. **Receiver.** The front and back straps of the grip are vertically grooved to ensure a firm grip even with wet hands, or under conditions of rapid combat fire. The trigger guard is extended, and the concave forward portion is grooved for a firm grip when using two hands or gloves.

h. **Disassembly Lever and Disassembly Button.** Allows for quick field stripping, and at the same time prevents accidental disassembly.

i. **Slide Stop.** Holds the slide to the rear after the last round is fired. It can also be manually operated.

1-9. WARRANTY INFORMATION. The M9, 9mm Pistol is warranted by Beretta U.S.A. Corporation for 18 months from date of government acceptance for conformance to performance requirements. Warranty starts on the acceptance date found on DD 250. Warranty start date is the same as the acceptance date on the DD 250 and is contained in columns 76-80 of

the weapons serial number control card. Submit all suspected warranty claims on SF 368 (QDR) to your appropriate command.

1-10. LOCATION AND DESCRIPTION OF MAJOR COMPONENTS.

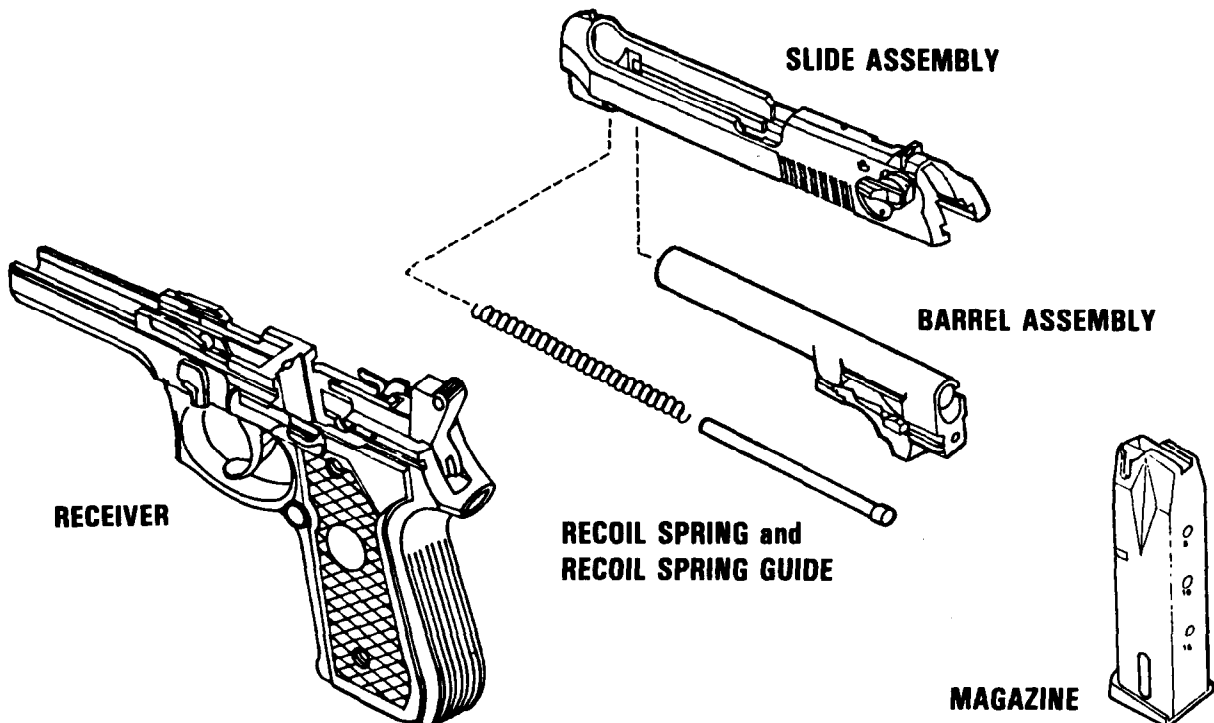
a. **Slide Assembly.** Houses the firing pin, striker, and extractor, and cocks hammer during recoil cycle.

b. **Barrel Assembly.** Houses cartridge for firing and directs projectile. Locking block locks barrel in position during firing.

c. **Recoil Spring and Recoil Spring Guide.** Absorbs recoil and returns the slide assembly to its forward position.

d. **Receiver.** Serves as a support for all major components. Controls action of pistol through the four major components.

e. **Magazine.** Holds 15 cartridges in place for feeding and chambering.



1-11. EQUIPMENT DATA.

Caliber	9 x 19mm (9mm NATO)
System of Operation	short recoil, semiautomatic
Locking system	falling locking block
Length	217mm (8.54 in.)
Width	38mm (1.50 in.)
Height	140mm (5.51 in.)
Weight (w/15 round magazine)	1145 gr (40.89 oz)
Weight (w/empty magazine)	960 gr (33.86 oz)
Barrel length	125mm (4.92 in.)
Rifling	R.H., 6 groove [pitch 250mm (approx 1 turn in 10 in.)]
Muzzle velocity	375 meters/sec (1230.3 ft/sec)
Muzzle energy	569.5 newton meters (420 ft lbs)
Maximum effective range	50 meters (54.7 yards)
Front Sight	blade, integral with slide
Rear Sight	notched bar, dovetailed to slide
Sight radius	158mm (6.22 in.)
Safety features	— ambidextrous safety — firing pin block
Hammer (half cock)	helps prevent accidental discharge
Magazine	staggered, 15 round capacity
Slide	held open upon firing of last round
Grips	plastic, checkered

1-12. SAFETY, CARE, AND HANDLING (AMMUNITION ONLY).

Publications for firing, handling, care and preservation or destruction of ammunition are AR 385-63, TM 43-0001-27, and TM 9-1005-317-10.

Navy and Coast Guard users refer to OP 4 and OP 5.

Shipping and Storage Data:

Quantity	Distance	Class	1
Storage	Comptability	Group	B, E, or N
Storage	Code		Class V
DOT Shipping	Code		C
DOT Designation			Small Arms Ammunition

Section III. PRINCIPLES OF OPERATION

1-13. GENERAL.

a. The M9 pistol has a short recoil system utilizing a falling locking block.

b. Upon firing, the pressure developed by the combustion gases recoils the slide and barrel assembly. After a short run, the locking block will stop the rearward movement of the barrel and release the slide

which will continue its rearward movement. The slide will then extract and eject the fired cartridge case, cock the hammer and compress the recoil spring. The slide moves forward under recoil spring pressure feeding the next round from the magazine into the chamber.

c. The slide stop holds the slide and barrel assembly open after the last round has been fired and ejected.

CHAPTER 2

UNIT MAINTENANCE INSTRUCTIONS

Chapter Overview

This chapter contains information regarding repair parts, special tools, support equipment and instructions for service upon receipt, Preventive Maintenance Checks and Services (PMCS), troubleshooting, and maintenance to keep the pistol in good repair.

Section I. REPAIR PARTS, SPECIAL TOOLS, AND SUPPORT EQUIPMENT

2-1. COMMON TOOLS AND EQUIPMENT. For authorized common tools and equipment refer to the Modified Table of Organization and Equipment (MTOE) applicable to your unit.

2-3. REPAIR PARTS. Repair parts are listed and illustrated in appendix C of this manual.

2-2. SPECIAL TOOLS AND SUPPORT EQUIPMENT.

There are no special tools for this item. Tools and test equipment are listed in appendix B of this manual. There is no Test, Measurement, and Diagnostic Equipment (TMDE) for this item.

Section II. SERVICE UPON RECEIPT

2-4. GENERAL. When a pistol is received, it is the responsibility of the user organization to determine whether the pistol has been properly prepared for service by the supplying organization and whether it is in condition to perform its mission.

2-5. SERVICE UPON RECEIPT OF MATERIEL.

WARNING

Before starting an inspection, and/or performing any maintenance procedures, be sure to clear the pistol. Do not squeeze the trigger until the pistol has been cleared. Inspect the chamber to be sure that it is empty. Check to see that there are no obstructions in the barrel. Do not keep live ammunition near work/maintenance area.

Unit maintenance personnel may perform limited maintenance. Inspect and test the pistol in accordance with the maintenance allocation chart in appendix B. After the required test/inspections are performed, the maintenance repairs within their capabilities may be completed. Unit maintenance may inspect and service the slide assembly, barrel assembly and receiver assembly. They may reverse the magazine catch assembly and replace pistol grips, grip screws and lock washers. (Coast Guard users are not authorized to reverse the magazine catch assembly.)

Table 2-1. Service Upon Receipt.

LOCATION	ITEM	ACTION	REMARKS
1. Container	Pistol	<p>Check the container for damage prior to unpacking. Check unpacked equipment.</p> <p>a. Inspect the equipment for damage incurred during shipment. If the equipment has been damaged, report the damage on SF Form 364, Report of Discrepancy (ROD).</p> <p>b. Check to see whether the equipment has been modified, if applicable.</p> <p>c. Check the equipment against the packing slip to see if the shipment is complete. Report all discrepancies in accordance with the instructions of DA PAM 738-750.</p> <p>Army users submit an SF 368 (Quality Deficiency Report) to: Commander, U.S. Army Armament, Munitions and Chemical Command, ATTN: AMSMC-QAD, Rock Island, IL 61299-6000.</p> <p>Navy users submit Quality Deficiency Report to: Commanding Officer, Naval Weapons Support Center, Code 20, Crane, IN 47522-5020.</p> <p>Air Force users submit Material Deficiency Report (MDR) to: DIR MAT MGT ROBINS AFB GA//MMIRF// and Quality Deficiency Report to: DIR MAT MGT ROBINS AFB GA//QAY//.</p> <p>Marine Corps users submit QDRs on SF 368 in accordance with MCO 4855.10 to: Commanding General, Marine Corps Logistics Base (Code 840), Albany, GA 31704-5000.</p> <p>Coast Guard users submit QDRs (SF 368) in accordance with COMDTINST M4855.1 to: Commandant, U.S. Coast Guard (G-ODO-2), Washington, DC 20593.</p>	<p>See Operator's manual: Army TM 9-1005-317-10 Navy SW 370-AA-OP1-010/9mm Air Force TO 11W3-3-5-1 Marine Corps TM 1005A-10/1 Coast Guard COMDTINST M8370.6</p>

Table 2-1. Service Upon Receipt (cont).

LOCATION	ITEM	ACTION	REMARKS
2. Pistol	Barrel Assembly	Remove corrosion inhibitor from barrel.	
	Pistol	<p>a. Field strip pistol and inspect for missing parts.</p> <p>b. Clean and lubricate</p> <p>c. Reassemble.</p> <p>d. Perform safety/function check.</p> <p>(1) With the safety in safe position, depress the slide stop allowing slide to return fully forward. At the same time, the hammer should fall to the full forward position.</p> <p>(2) Squeeze and release trigger. Firing pin block should move up and down. Hammer should not move.</p> <p>(3) Place safety in fire position.</p> <p>(4) Squeeze trigger to check double action. Hammer should cock and fall.</p> <p>(5) Squeeze trigger again and hold to rear. Manually retract and release slide while holding trigger to the rear. Release trigger, click should be heard, hammer should not fall.</p> <p>(6) Squeeze trigger to check single action. Hammer should fall.</p> <p>(7) If the above safety/function checks perform as indicated, pistol is mission ready. If the checks do not perform as indicated, evacuate pistol to intermediate direct support/next authorized repair level.</p>	<p>See operator's manual or para 2-11</p> <p>See operator's manual or para 2-11</p> <p>See operator's manual or para 2-11</p>

Section III. UNIT PREVENTIVE MAINTENANCE CHECKS AND SERVICES (PMCS) QUARTERLY SCHEDULE

2-6. GENERAL. If the pistol has not been used for 90 days, perform PMCS in the operator's manual (ARMY TM 9-1005-317-10, NAVY SW 370-AA-OPI-010/9mm, AIR FORCE TO 11W3-3-5-1, MARINE CORPS TM 1005A-10/1, COAST GUARD COMDTINST M8370.6). If you see rust on a pistol, the PMCS will be done immediately.

2-7. UNIT PREVENTIVE MAINTENANCE CHECKS AND SERVICES.

a. General. The PMCS procedures are contained in table 2-2. They are arranged in logical sequence requiring a minimum amount of time and effort on the part of the person(s) performing them. They are arranged so there will be minimum interference between person(s) performing checks simultaneously on the same end item.

b. Item Number Column. Checks and services are numbered in chronological order regardless of interval. This column shall be used as a source of item numbers for the "TM Number" column on DA Form 2404, Equipment Inspection and Maintenance Worksheet, in recording results on PMCS.

c. Item To Be Inspected Column. The items listed in this column are divided into groups indicating the portion of the equipment of which they are a part; e.g., receiver assembly.

d. Procedures Column. This column contains a brief description of the procedure by which the check is to be performed. It contains all the information required to accomplish the checks and services.

**Table 2-2. Unit Preventive Maintenance Checks and Services (PMCS)
Quarterly Schedule.**

ITEM NO.	ITEM TO BE INSPECTED	PROCEDURES
---------------------	-----------------------------	-------------------

WARNING

Before starting an inspection, and/or performing any maintenance procedures, be sure to clear the weapon. Do not squeeze the trigger until the pistol has been cleared. Inspect the chamber to be sure it is empty, and check to see that there are no obstructions in the barrel. Do not keep live ammunition near work/maintenance area.

GENERAL: Inspect all assemblies for missing, broken, or loose parts. Inspect parts for cracks, dents, burrs, excessive wear, rust or corrosion. Make sure all items are cleaned and lubricated (ARMY TM 9-1005-317-10, NAVY SW 370-AA-OPI-010/9mm, AIR FORCE TO 11W3-3-5-1, MARINE CORPS TM 1005A-10/1, COAST GUARD COMDTINST M8370.6). Inspect external surfaces for adequate finish. Repair or replace authorized defective parts or evacuate to intermediate direct support maintenance/next authorized repair level.

Table 2-2. Unit Preventive Maintenance Checks and Services (PMCS) (cont).

ITEM NO.	ITEM TO BE INSPECTED	PROCEDURES
1	Pistol	Field strip pistol in accordance with paragraph 2-11 or operator's manual.
2	Slide and Barrel Assembly	<p>a. Visually inspect slide rails (1) for burrs or cracks. Slide should be free of burrs or cracks.</p> <p>b. Check operation by rotating safety (2) between the safe (down) and fire (up) positions. Safety should rotate freely between positions and lock in each position.</p> <p>c. Check firing pin block (3) for up and down movement. Firing pin block should move freely up and down with spring tension.</p> <p>d. Visually inspect barrel (4) for cracks and obstructions. Chamber area of barrel should be free of cracks, obstructions or excessive pitting.</p> <p>e. Check locking block (5) movement. Locking block should move up and down freely. Visually inspect locking block lugs (6) for cracks or burrs. Locking block lugs should be free of cracks or burrs.</p> <p>f. Visually inspect recoil spring (7) for flat spots. Recoil spring should not have flat spots. Visually inspect recoil spring (7) and recoil spring guide (8) for straightness and burrs. Recoil spring and recoil spring guide should not be bent or burred.</p>

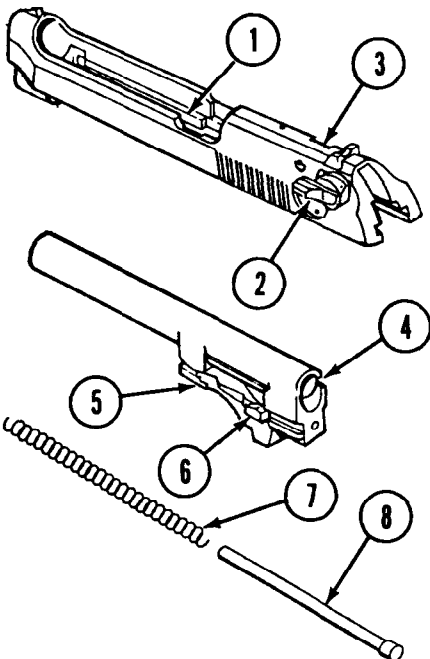
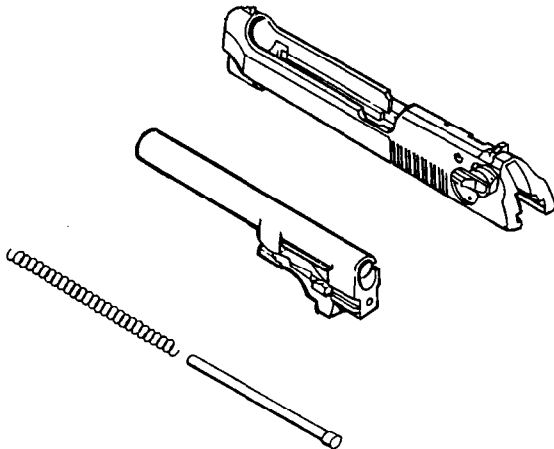
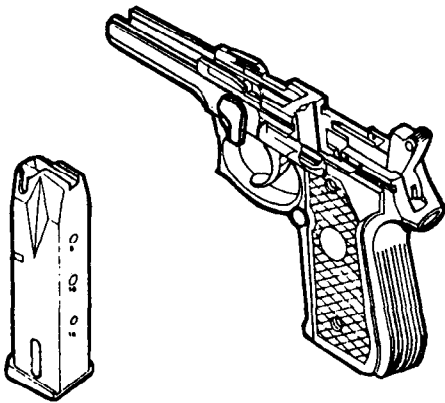
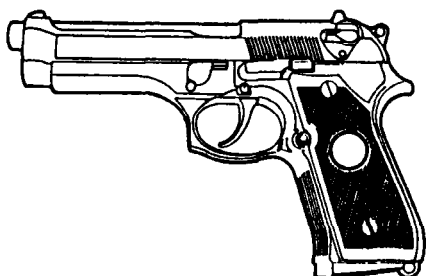
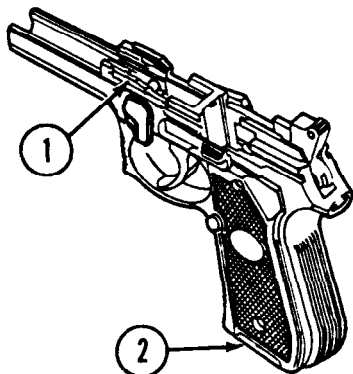


Table 2-2. Unit Preventive Maintenance Checks and Services (PMCS) (cont).

ITEM	NO. ITEM TO BE INSPECTED	PROCEDURES
3	Receiver Assembly	<p>a. Visually inspect to ensure that receiver rails (1) are not bent, cracked, or burred. Receiver rails should be straight and free from cracks or burrs.</p> <p>b. Visually inspect magazine well (2) for cleanliness and burrs. Magazine well should be clean and free of burrs.</p>
4	Pistol M9	<p>a. Assemble pistol (see para 2-11 or operator's manual). Ensure that parts are installed correctly and are in good working condition. Perform safety/function check (see SERVICE UPON RECEIPT OF MATERIEL, para 2-5).</p> <p>b. Check all moving parts for binding or hesitation. All moving parts should move freely without binding or hesitation.</p>
5		<p>Report all damaged or missing parts to intermediate direct support/next authorized repair level.</p>



Section IV. TROUBLESHOOTING

2-8. UNIT MAINTENANCE TROUBLESHOOTING.

a. This section contains troubleshooting information for locating and correcting most of the operating troubles which may develop in the M9 pistol. Each malfunction for a part, assembly, or subassembly is followed by a list of tests or inspections which will help you to determine corrective actions to take. You should perform the tests/inspections and corrective actions in the sequence shown on pages 2-8 through 2-14. The Symptom Index is for page referencing only.

b. This manual cannot list all possible malfunctions that may occur, nor all tests or inspections and corrective actions. If a malfunction is not listed (except when malfunction and cause are obvious) or is not corrected by listed corrective actions, notify intermediate direct support/next authorized repair level.

2-9. TROUBLESHOOTING PROCEDURES. Refer to table 2-3 for malfunctions, tests or inspections, and corrective actions.

WARNING

Before performing any of the troubleshooting procedures, make sure the pistol is clear/unloaded. Do not keep live ammunition near work/maintenance area.

NOTE

In this table, evacuate to intermediate direct support also means evacuate to the next higher level of maintenance.

SYMPTOM INDEX

	Troubleshooting Procedure Page
1. Ammunition does not chamber	2-9
2. Cartridge does not extract	2-12
3. Failure to eject	2-13
4. Failure to feed	2-8
5. Failure to fire	2-10
6. Hammer does not cock with safety in the fire position	2-13
7. Hammer does not decock with safety in the safe position	2-14
8. Slide does not lock fully forward	2-10
9. Slide does not unlock	2-11
10. Pistol fails to fire in double action	2-14

Table 2-3. Troubleshooting Procedures.

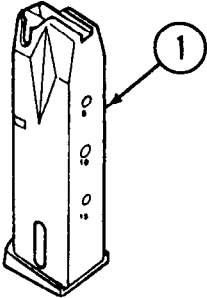
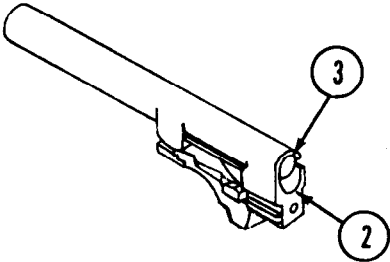
MALFUNCTION		
	TEST OR INSPECTION	CORRECTIVE ACTION
1. FAILURE TO FEED.		
	Step 1. Check for dirty and/or damaged magazine (1).	
	Clean with CLP (item 5, app D)/RBC (item 7, app D) or replace magazine.	
	Step 2. Check for damaged feed ramp (2).	
	If damaged, evacuate pistol to intermediate direct support maintenance.	
	Step 3. Check for cartridge nose jamming against feed ramp (2).	
	Magazine lips are too tight. Replace magazine.	
	Step 4. Check for cartridge nose jamming against upper chamber (3).	
	Magazine lips are too open. Replace magazine.	
	Step 5. Check for slide riding over cartridge.	
	Magazine not seated properly. Check magazine catch assembly.	

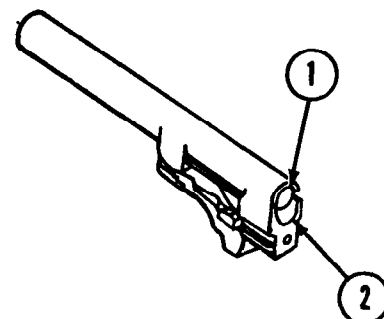
Table 2-3. Troubleshooting Procedures (cont).

MALFUNCTION	TEST OR INSPECTION	CORRECTIVE ACTION
-------------	--------------------	-------------------

2. AMMUNITION DOES NOT CHAMBER.

Step 1. Check for dirt or obstructions in chamber (1).

Clean with CLP (item 5, app D)/RBC (item 7, app D).



Step 2. Check for dirty or damaged ammunition.

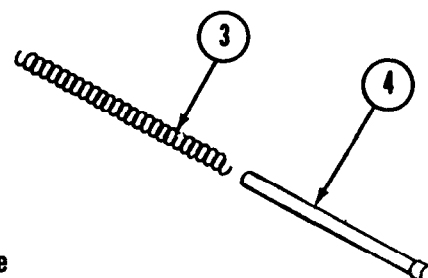
Clean with a clean, dry cloth, or replace ammunition.

Step 3. Check for damaged feed ramp (2).

If damaged, evacuate pistol to intermediate direct support maintenance.

Step 4. Check to see if the recoil spring (3) and spring guide (4) are damaged or broken.

If damaged or broken, evacuate pistol to intermediate direct support maintenance.



Step 5. Check for damaged magazine spring (5) and/or follower (6).

If damaged, replace magazine.

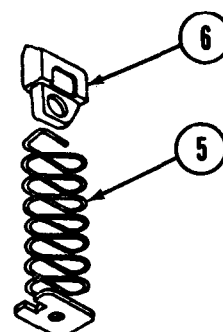


Table 2-3. Troubleshooting Procedures (cont).

MALFUNCTION

TEST OR INSPECTION

CORRECTIVE ACTION

3. SLIDE DOES NOT LOCK FULLY FORWARD.

Step 1. Check for broken or damaged locking block (1) and lugs (2).

If damaged or broken, evacuate pistol to intermediate direct support maintenance.

Step 2. Check for damaged or broken recoil spring (3).

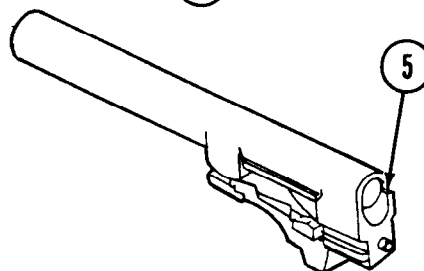
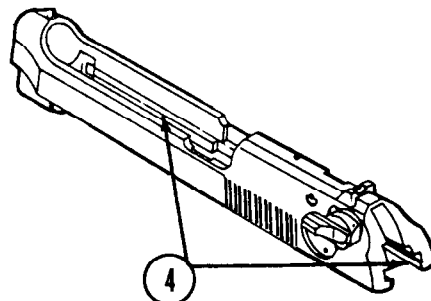
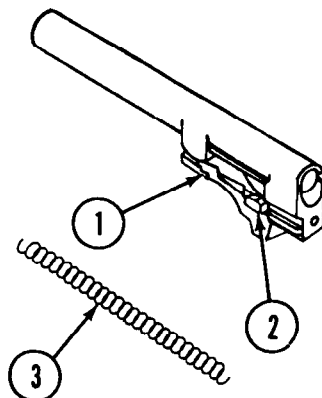
If damaged or broken, evacuate pistol to intermediate direct support maintenance.

Step 3. Check for damaged or burred slide (4).

If slide grooves are damaged or burred, evacuate pistol to intermediate direct support maintenance.

Step 4. Check for dirty or damaged chamber (5).

If the chamber is dirty, clean using CLP (item 5, app D)/RBC (item 7, app D). If the chamber is damaged, evacuate pistol to intermediate direct support maintenance.



4. FAILURE TO FIRE.

Step 1. Check safety (1).

Place safety in fire position.

Step 2. Check for faulty ammunition.

If heavily corroded, or dented, replace ammunition.

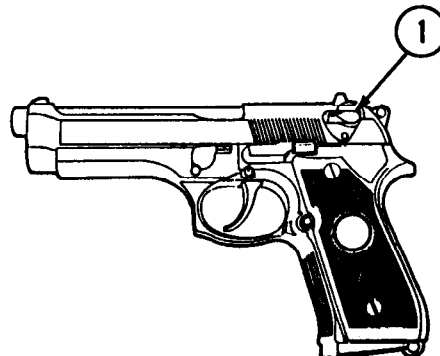


Table 2-3. Troubleshooting Procedures (cont).

MALFUNCTION

TEST OR INSPECTION

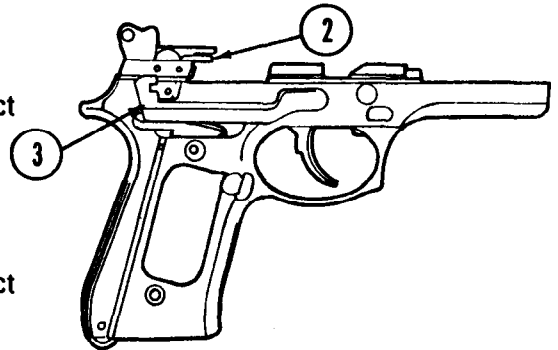
CORRECTIVE ACTION

Step 3. Check for broken firing pin block lever (2).

If broken, evacuate pistol to intermediate direct support maintenance.

Step 4. Check for broken trigger bar (3).

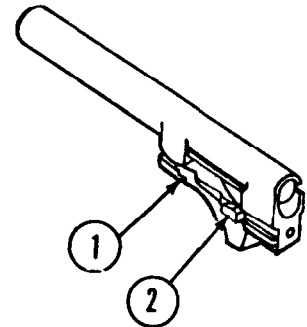
If broken, evacuate pistol to intermediate direct support maintenance.



5. SLIDE DOES NOT UNLOCK.

Step 1. Check for broken or damaged locking block (1) and lugs (2).

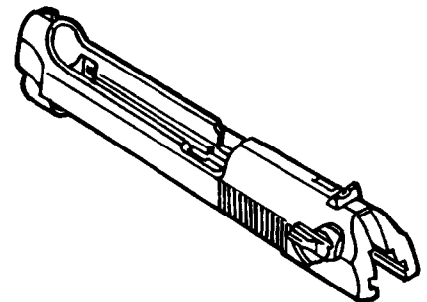
If broken or damaged, evacuate pistol to intermediate direct support maintenance.



Step 2. Check for obstructed, broken or damaged slide.

If obstructed, remove obstruction.

If broken or damaged, evacuate pistol to intermediate direct support maintenance.



Step 3. Check for faulty ammunition; determined by short recoil.

Inspect bore and remove any obstructions. Replace ammunition.

Table 2-3. Troubleshooting Procedures (cont).

MALFUNCTION

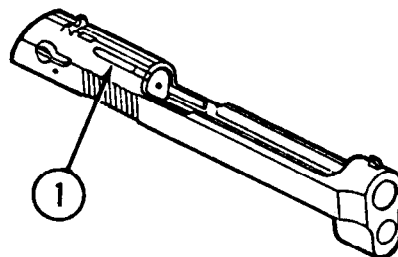
TEST OR INSPECTION

CORRECTIVE ACTION

6. CARTRIDGE DOES NOT EXTRACT.

- Step 1. Check for powder residue and/or dirt jamming extractor (1).

Clean with CLP (item 5, app D)/RBC (item 7, app D) and lubricate with CLP (item 5, app D) or LSA (item 15, app D).



- Step 2. Check for defective extractor spring.

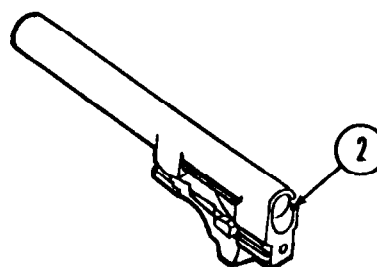
Evacuate pistol to intermediate direct support maintenance.

- Step 3. Check for broken or damaged extractor (1).

Evacuate pistol to intermediate direct support maintenance.

- Step 4. Check chamber (2) for dirt or corrosion.

Clean with CLP (item 5, app D)/RBC (item 7, app D) and lubricate with CLP (item 5, app D) or LSA (item 15, app D).



- Step 5. Check for short recoil, defective cartridge.

Cartridge case or projectile may be lodged in chamber or bore. Inspect bore and remove any obstructions. Replace ammunition.

Table 2-3. Troubleshooting Procedures (cont).

MALFUNCTION

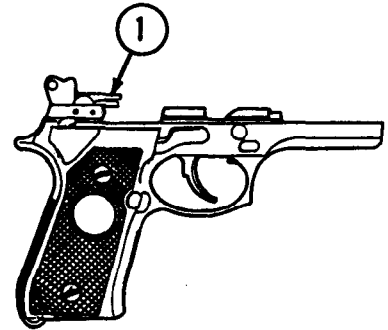
TEST OR INSPECTION

CORRECTIVE ACTION

7. FAILURE TO EJECT.

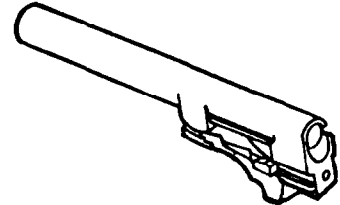
Step 1. Check for broken or damaged ejector (1).

If broken or damaged, evacuate pistol to intermediate direct support maintenance.



Step 2. Check for short recoil, defective cartridge.

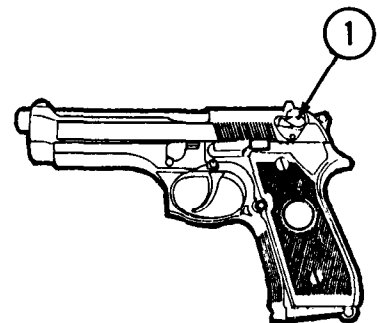
Cartridge case or projectile may be lodged in chamber or bore. Inspect bore and remove any obstructions. Replace ammunition.



8. HAMMER DOES NOT COCK WITH THE SAFETY IN THE FIRE POSITION.

Step 1. Check safety (1). The operator may have inadvertently, while opening the slide, turned the safety to the safe (down) position causing automatic hammer lowering.

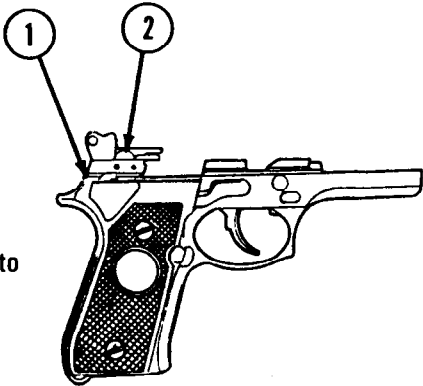
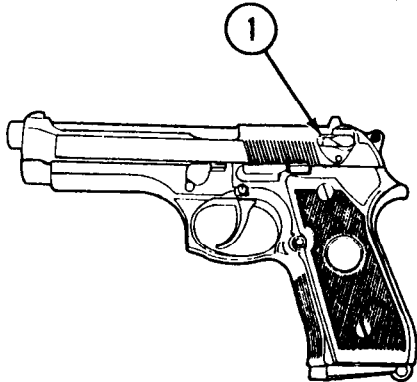
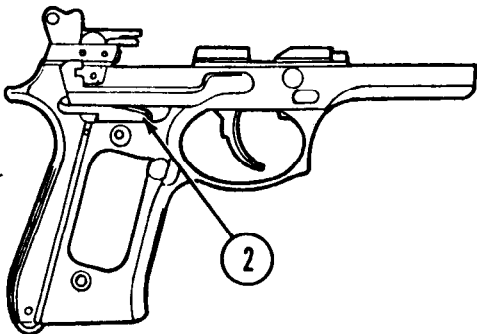
Rotate safety to the fire (up) position.



Step 2. No further test or inspection.

Evacuate pistol to intermediate direct support maintenance.

Table 2-3. Troubleshooting Procedures (cont).

MALFUNCTION		
TEST OR INSPECTION		
CORRECTIVE ACTION		
9. HAMMER DOES NOT DECOCK WITH SAFETY IN THE SAFE POSITION.		
Step 1. Check for dirt or obstructions in receiver jamming hammer (1).		
Remove dirt or obstructions. If the dirt or obstructions cannot be removed, evacuate pistol to intermediate direct support maintenance.		
Step 2. Check for defective (worn or broken) hammer release lever (2).		
Evacuate pistol to intermediate direct support maintenance.		
10. PISTOL FAILS TO FIRE IN DOUBLE ACTION.		
Step 1. Check safety (1). The operator may have inadvertently, while opening the slide, turned the safety to the safe (down) position causing automatic hammer lowering.		
Rotate safety to the fire (up) position.		
Step 2. Check for missing or defective trigger bar spring (2).		
Evacuate pistol to intermediate direct support maintenance.		
Step 3. No further test or inspection.		
If a worn or broken trigger bar is suspected, evacuate pistol to intermediate direct support maintenance.		

Section V. UNIT MAINTENANCE PROCEDURES

NOTE

When a pistol is received at unit maintenance, it must be inspected and if any deficiencies are found, they should be repaired or noted/tagged for repair at intermediate direct support maintenance/next authorized repair level.

2-10. GENERAL.

a. Unit maintenance is limited to replacement of the pistol grips, minor hardware and reversing the magazine catch assembly. (Coast Guard users are not authorized to reverse the magazine catch assembly.)

b. **Initial Setup.** In order to reduce the space required for the initial setup portion of the maintenance procedures, the following data is standard for all initial setups:

(1) **Materials/parts** - includes only items applicable to the procedure.

(2) **Tools and special tools** - includes only the standard tool set applicable to the procedure.

(3) **Personnel required** - includes the following designated joint service descriptions that are applicable to all unit maintenance procedures:

(a) **Army:** Military Occupational Specialty (MOS) 76Y Supply Clerk/Unit Armorer.

(b) **Air Force:** Air Force Specialty Code (AFSC) 753XX Combat Arms Training and Maintenance Specialists, Technicians and Gunsmiths.

(c) **Navy:** Gunner's Mate Guns (GMG).

(d) **Marine Corps:** Military Occupational Specialty (MOS) 2111 Unit Armorer (Infantry Weapon Repairer).

(e) **Coast Guard:** Refer to COMDTINST 8000.2.

(4) **References** - includes the operator's manual for joint service use:

(a) ARMY TM 9-1005-317-10.

(b) NAVY SW 370-AA-OPI-010 9mm

(c) AIR FORCE TO 11W3-3-5-1.

(d) MARINE CORPS TM 1005A-10/1.

(e) COAST GUARD COMDTINST M8370.6.

(5) **Equipment condition** - is listed as applicable to the procedure.

(6) **As General Safety Instructions**, make sure the magazine is removed, the pistol is clear of ammunition, and the barrel has no obstructions.

2-11. MAINTENANCE OF 9mm PISTOL

This task covers:

- a. Disassembly
- b. Cleaning
- c. Inspection
- d. Repair
- e. Reassembly

INITIAL SETUP

Tools and Special Tools

Tool Set, Small Arms (SC 5180-95-CL-A07)

Materials/Parts

Cleaner, lubricant and preservative (CLP)

(item 5, app D)

Solid film lubricant (item 12, app D)

Solvent, dry cleaning (item 22, app D)

WARNING

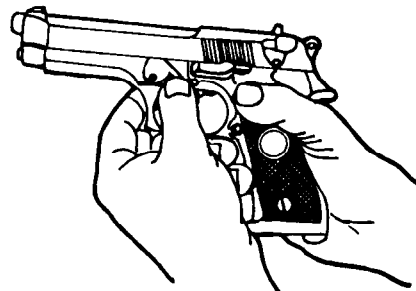
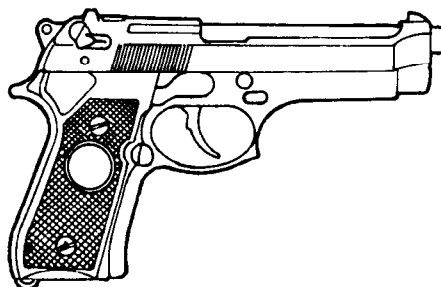
Make certain weapon is clear and there are no obstructions in the barrel or chamber.

DISASSEMBLY

CAUTION

Dry fire the pistol only in conjunction with the function checks in PMCS and/or during training.

Do not allow the hammer to fall with full force by pulling the trigger when the slide is removed as damage to the receiver can occur. If necessary, the hammer should be manually lowered.



1. Clear/unload the pistol.
2. Allow slide to return fully forward.
3. Hold pistol in the right hand with muzzle slightly elevated. With forefinger, press disassembly lever release button, and with thumb, rotate disassembly lever downward until it stops.

2-11. MAINTENANCE OF 9mm PISTOL (cont)

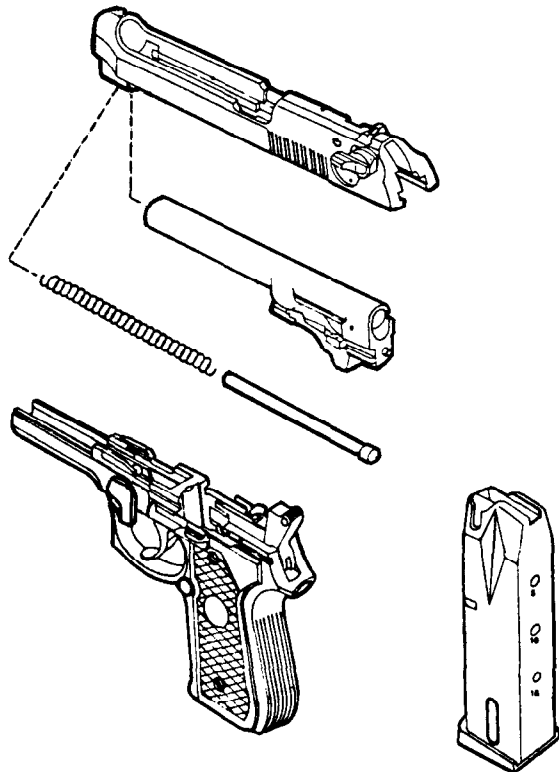
DISASSEMBLY (cont)

4. Pull the slide and barrel assembly forward and remove.

WARNING

Use care when removing recoil spring and spring guide. Because of the amount of compression, assembly will be released under spring tension and could cause possible injury to personnel, or become damaged or lost.

5. Slightly compress recoil spring and spring guide, while at the same time lifting and removing recoil spring and spring guide. Allow the recoil spring to expand slowly.
6. Separate recoil spring from spring guide.
7. Push in on locking block plunger while pushing barrel forward slightly. Lift and remove locking block and barrel assembly from slide.
8. Refer to operator's manual for magazine disassembly instructions.



CLEANING

Remove dirt and corrosion or powder residue from parts with wiping rag (item 19, app D) dampened with CLP (item 5, app D)/RBC (item 7, app D).

INSPECTION AND REPAIR

1. Visually inspect all parts for damage.
2. Inspect external surfaces for proper finish (black surfaces should not reflect light). Touch up as required with solid film lubricant (item 12, app D).

CAUTION

If solid film lubricant comes in contact with any moving or internal part, clean part with dry cleaning solvent (item 22, app D).

3. Apply solid film lubricant (item 12, app D) to all external surfaces showing wear. Allow to dry a minimum of 12 hours before using weapon.

2-11. MAINTENANCE OF 9mm PISTOL (cont)

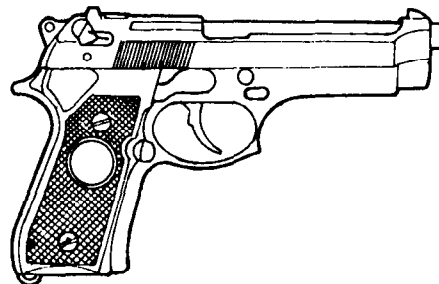
REASSEMBLY

1. Grasp the slide with the bottom facing up. With the other hand, grasp the barrel assembly with the locking block facing up.
2. Insert muzzle of the barrel assembly into the forward open end of the slide. At the same time, lower the rear of the barrel assembly by slightly moving the barrel downward with light thumb pressure. The barrel will fall into place.
3. Insert recoil spring onto recoil spring guide.

CAUTION

During spring insertion, spring tension must be maintained until spring guide is fully seated onto the cutaway on the locking block.

4. Insert end of recoil spring and recoil spring guide into slide recoil housing. At the same time, compress the recoil spring and lower the spring guide until fully seated onto the locking block cutaway.



CAUTION

Be sure hammer is uncocked and firing pin block lever is in the down position. If the hammer is cocked, carefully and manually lower the hammer.

Do not pull trigger while placing the slide onto the receiver.

5. Grasp the slide and barrel assembly, sights up, and align the slide onto the receiver assembly guide rails.
6. Push until the rear of the slide is a short distance beyond the rear of the receiver assembly and hold. At the same time, rotate the disassembly latch lever upward. A click indicates a positive lock.
7. Refer to the operator's manual for magazine reassembly.

2-12. MAINTENANCE OF RECEIVER ASSEMBLY.

This task covers disassembly, inspection/repair, and reassembly.

INITIAL SETUP

Tools and Special Tools

Tool Set, Small Arms (SC 5180-95-CL-A07)

Materials/Parts

Brush, cleaning, small arms (item 3, app D)

Cleaner, lubricant and preservative (CLP)
(item 5, app D)

Lubricating oil, weapons semi-fluid (LSA)
(item 15, app D)

Rag, wiping (item 19, app D)

WARNING

Make certain weapon is clear and there are no obstructions in the barrel or chamber.

Equipment Condition

Pistol, Field Stripped

NOTE

Unit maintenance is limited to functions in the Maintenance Allocation Chart in appendix B.

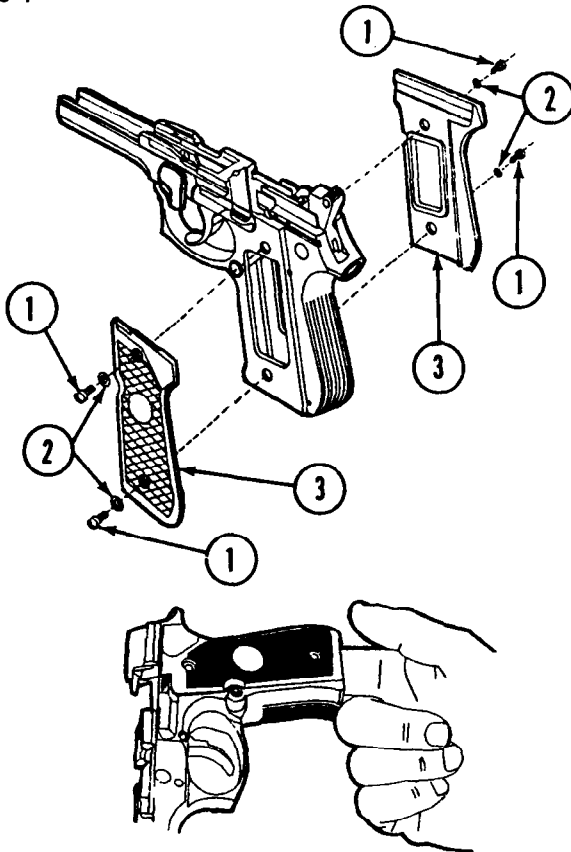
2-12. MAINTENANCE OF RECEIVER ASSEMBLY (cont)

DISASSEMBLY

NOTE

When removing each pistol grip, the lockwashers may remain seated or come loose. Be careful not to lose them.

To remove the pistol grips, remove grip screws (1) and lockwashers (2). Insert the forefinger into the magazine well and gently lift up on the pistol grip (3). Repeat the procedure to remove the other pistol grip.



CLEANING

Wipe receiver assembly clean with cloth (item 19, app D). Use a soft brush (item 3, app D) for hard to clean areas. Apply a light coat of CLP (item 5, app D)/LSA (item 15, app D) to all surfaces.

INSPECTION/REPAIR

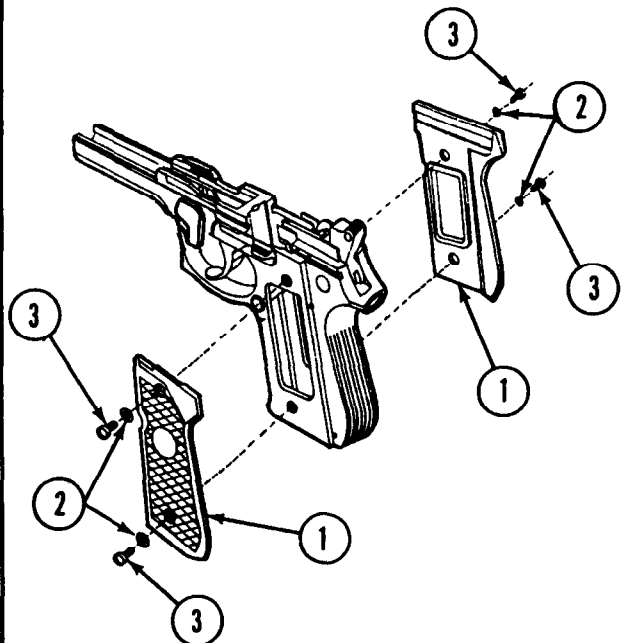
Grips that have cracks, deep gouges, or any defects that will affect serviceability will be replaced. Replace grips on which checkering is worn smooth. Small cracks or chips not affecting strength or retention of grip are acceptable. Replace screws that are stripped or damaged.

REASSEMBLY

CAUTION

Damage will occur from overtightening the grip screws. Tighten grip screws only until snug.

Install the left and right pistol grips (1), lockwashers (2), and screws (3). Tighten only until snug.



NOTE

When the necessary maintenance task has been completed, reassemble the pistol in accordance with paragraph 2-11.

2-13. MAINTENANCE OF MAGAZINE CATCH ASSEMBLY.

This task covers removal, reverse and installation.

INITIAL SETUP

Tools and Special Tools

Tool Set, Small Arms (SC 5180-95-CL-A07)

Equipment Condition

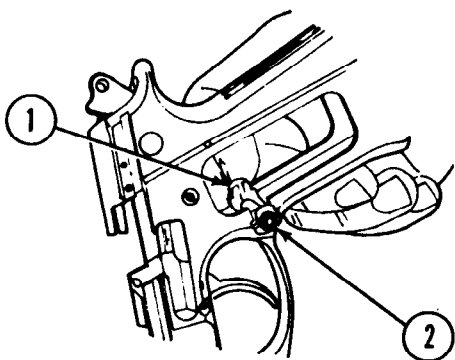
Pistol Grips Removed

WARNING

Make sure weapon is clear and there are no obstructions in the barrel or chamber.

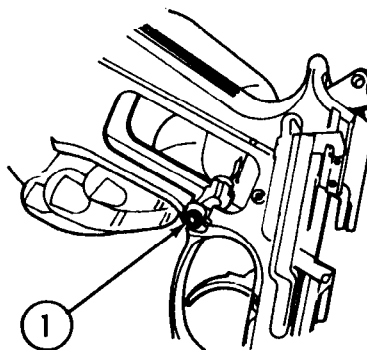
REMOVAL

Remove the magazine catch assembly (1) by pushing in and to the rear with the fingertip, on the side opposite the magazine catch assembly button (2). The magazine catch assembly will then drop out.



REVERSING AND INSTALLATION

Rotate the magazine catch assembly until the button is on the desired side. Insert the magazine catch assembly button (1) into position, tilting it slightly. While holding the magazine catch assembly button firmly in place, press and then push in on the side opposite the magazine release button until fully seated. This will be indicated by a click.



NOTE

When the necessary maintenance task has been completed, reassemble the pistol in accordance with paragraph 2-12.

2-14. SAFETY/FUNCTION CHECK.

1. With the safety in safe position, depress the slide stop allowing slide to return fully forward. At the same time, the hammer should fall to the full forward position.
2. Squeeze and release trigger. Firing pin block should move up and down. Hammer should not move.
3. Place safety in fire position.
4. Squeeze trigger to check double action. Hammer should cock and fall.
5. Squeeze trigger again and hold to rear. Manually retract and release slide while holding trigger to rear. Release trigger, click should be heard, hammer should not fall.
6. Squeeze trigger to check single action. Hammer should fall.
7. If the above safety/function checks perform as indicated, pistol is mission ready. If checks do not perform as indicated, evacuate pistol to intermediate direct support maintenance/next authorized repair level.

Section VI. PREPARATION FOR STORAGE OR SHIPMENT

2-15. PREPARATION FOR STORAGE OR SHIPMENT.

M9 (9mm) pistol cleaning, preservation, packaging, packing and marking.

a. **Packing.** Disassemble, clean, dry, preserve and package the pistol as follows:

(1) Disassemble the pistol as necessary to accomplish cleaning.

(2) All metallic surfaces shall be cleaned with CLP (item 5, app D)/RBC (item 7, app D).

(3) Rinse the pistol with dry cleaning solvent (item 22, app D) and dry with compressed air or clean wiping rags (item 19, app D).

(4) Metallic surfaces shall be preserved with general purpose P-9 lubricating oil (item 13, app D) (Army only). All other services use CLP (item 5, app D). Drain excess oil from the pistol.

(5) Seal the pistol in a bag made of VCI treated cold seal barrier material (item 17, app D).

(6) Place the bagged pistol into a fiberboard container (item 9, app D).

(7) Use cushioning material (item 16, app D) to ensure a tight pack.

(8) Close the fiberboard container and seal all seams and joints with water-resistant paperback pressure sensitive tape (item 27, app D).

(9) Apply the following marking on each fiberboard container:

1005-01-118-2640
Pistol, Semiautomatic, 9mm, M9
1 EACH
PRESERVED ON (MONTH, YEAR)
GROSS WEIGHT: CUBE:

(10) Place a quantity of fiberboard containers into a cleated plywood box (item 1, app D). A plywood box made in accordance with PPP-B-601 or PPP-B-621 may be used.

(11) Strap the plywood box with 5/8" wide flat steel strapping (item 23, app D).

(12) Serial numbers are required and shall be listed on the packing list.

NOTE

The following marking shall be omitted from the outside of exterior shipping container:

1005-01-118-2640

Pistol, Semiautomatic, 9mm, M9

b. **Marking.** Apply the following markings to the exterior of the shipping container, using stencil or label:

ADDRESS OF DESTINATION

WEIGHT AND CUBE