



MEPRO MOR/MOR PRO

**Multi-Purpose Reflex Sight with
Visible & IR Laser Pointers**



USER MANUAL

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Scope of Manual

- This manual provides description, safety instructions, operating instructions, and user maintenance procedures for the MEPRO MOR and MEPRO MOR PRO multi-purpose reflex sights. In this manual, unless otherwise stated, “MEPRO MOR” refers to both versions.
- Make sure to carefully read and follow all instructions before attempting to operate the MEPRO MOR sight. Improper use may result in permanent damages to the sight.

Warning: The MEPRO MOR contains visible and invisible (IR) class 3R and class 3B laser pointers as indicated on the safety label (IEC 60825-1 standard). Depending on lasers’ class, laser radiation may be hazardous if pointed to a human eye.

NOTE: Due to regulative restrictions in certain countries the IR laser may not be available in some MEPRO MOR sight configurations.

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1. System Introduction

- The MEPRO MOR is a unique state-of-the-art target acquisition solution. This compact and light-weight system integrates a reflex sight able to function with or without batteries with both visible and invisible (IR) laser pointers.
- The MEPRO MOR only requires one zeroing procedure for all its aiming devices (Aiming Reticle, Visible Laser, and IR Laser); once any of these aiming devices is zeroed all other devices will be zeroed as well.
- The MEPRO MOR presents the user's eye with a virtual aiming reticle at infinity to be positioned on the target. Aiming can be performed while leaving both eyes open hence maintaining full situational awareness. The MEPRO MOR is equipped with a large 30mm (1.18") diameter lens; this large field-of-view (FOV) assures easy target acquisition and rapid transition between multiple targets even when its user is under physical strain or combat-related emotional stress.

- The MEPRO MOR is equipped with a “Press to Lase” (PTL) remote control cable. The PTL cable is attached to the weapon externally using available attachment band.
- The MEPRO MOR PRO enhances the capabilities of the standard MOR sight by offering:
 - The option of a Green Visible Laser.
 - The ability to switch between momentary & constant laser modes.
 - Activation of the laser pointers without the PTL cable in cases the cable is damaged or missing.
 - An advanced fault detection system.

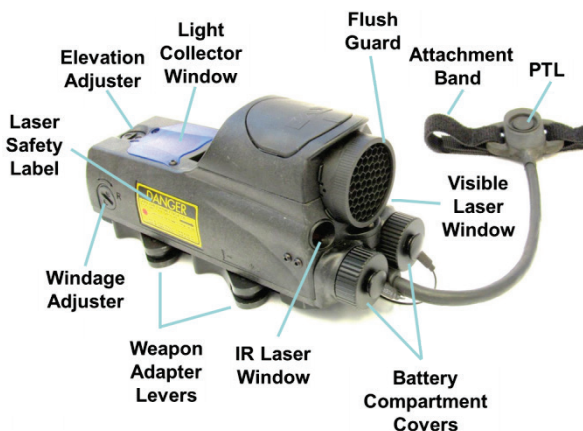


Figure 1: MEPRO MOR

- The blue window on top of the MEPRO MOR enables the operation of the fiber optic light collector system which illuminates the aiming reticle at day time.

NOTE: This window should remain clear of any obstruction. Do not paint this window or position anything above it.



Figure 2: Light Collector Window (Cover)

- An illumination window (see the following figure) is located in a niche, just in front of the light collector window (cover) and behind the objective lens. The aiming reticle is projected through the illumination window onto the lens.

NOTE: This window should be kept clean and clear of any obstruction.



Figure 3: Illumination Window

- An optional "Flash Guard" (see the following figure) may be attached in front of the objective lens. The Flash Guard is an anti-reflective device designed to eliminate possible lens reflections that may occur in certain lighting conditions and may otherwise reveal the user's location. The "Flash Guard" has been designed to minimize obstruction to user's field-of-view.

- To attach the Flash Guard: Push it towards the lens to click-in, top (wide) side first.
To detach the Flash Guard: Twist it clock-wise and pull.



Figure 4: Flash Guard

2. Kit Content

Description	Qty.
MEPRO MOR sight with adaptor for Picatinny rail and PTL cable	1
Battery ; "AA" Alkaline 1.5V	2
Protective Field Cover	1
User Manual	1
Pipe Wrench for Picatinny Adaptor Screws	1
Soft Transport Pouch	1
Hard Storage Case	1
Flash Guard	1
Cleaning Kit	1

Note: Sight configuration and accessories type and quantity may vary based on contractual requirements.

3. Preparing for Operation

Inspection

- Open the carrying case and take out the MEPRO MOR.
- Visually inspect the MEPRO MOR and make sure there are no cracks, fractures, loose parts, or other visible damages.
- Verify that the lens and laser windows are clean and dry.
- Inspect the PTL control cable and ensure it is properly connected to the sight and has no tears or damages.
- Make sure that the sight's Picatinny adapter is clean and without any damages.

Inserting the Batteries

- Rotate the Control Switch (see Figure 6) to the OFF position.
- Open the battery cover(s).
- While observing battery polarity indication, insert an “AA” battery into one of the compartments.

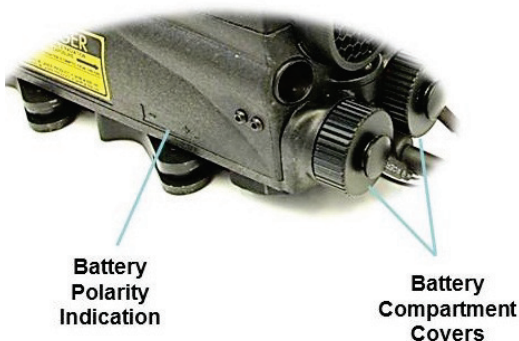


Figure 5: Battery Compartment(s)

- Close and tighten the battery compartment cover(s).

NOTES:

- Any of the two compartments can be utilized when a single battery is used.
- The sight can operate with a single “AA” battery (Alkaline; Lithium; Rechargeable) or with two “AA” batteries for extended operating time.

Caution: 3V AA batteries are not supported and may damage the sight permanently; it is only allowed to use batteries with voltage of 1.2V to 1.5V.

- Use two batteries when the sight is mounted on a 7.62mm rifle.
- The sight is protected against reverse polarity. However, if the battery is improperly positioned, the battery-powered features will not function.
- The use of Lithium batteries is recommended when operating at temperatures below 0°C (32°F).

Caution: When using two (2) batteries make sure not to mix between fresh and used batteries and not to mix two different battery brands or battery types (chemistries). Mixing battery types in a device is not recommended and can significantly increase the potential for battery leakage and reduced system performance.

Verify Sight Operation

- Rotate the control switch between positions **1**, **2**, and **3** and verify that the intensity of the aiming reticle's illumination is changing accordingly.



Figure 6: Control Switch

NOTE: The lasers (visible and IR) are activated by either pressing and holding the PTL button or clicking and releasing it. This depends on your model: MOR or MOR PRO. See also Ch. 4 "Concept of Operation".

- Rotate the control switch to position **1** and press or click the PTL button to activate the visible laser. Point the sight to a close object to ensure that a laser spot (green or red) is visible.
- Perform the above step for positions **2**, **3** and **L** of the control switch.
- **For MOR PRO only:** Rotate the control switch to position **1** while observing the lens; ensure that the aiming reticle is not flashing.

NOTE: Depending on flashing pattern / frequency a flashing reticle indicates a faulty PTL cable or a low battery power.

NOTE: Perform the following step in a dark environment, using a night vision device.

- While the control switch is in position **IR**, press or click the PTL button to verify proper operation of the IR laser.

Mounting on Weapon

- Open the quick-release adapter levers (extend both levers outwards).
- Locate the sight on the weapon's Picatinny rail as desired and close the quick-release adapter levers (retract both levers inwards).



**Adapter Levers
(Closed)**

Figure 7: Adapter Levers

- Ensure the sight is tightly attached; if necessary tighten the nuts of the sight's quick-release adapter levers' screws using the provided pipe wrench.

Warning: Do not use excessive force while tightening nuts, this may permanently damage the sight's adapter screws.

- Position the sight's PTL control cable in the desired location and secure it to the weapon using the attachment band connected to the PTL unit.

NOTE: it is recommended to position the sight as close as possible to the eye (i.e. in the rear part of the weapon's Picatinny rail); when applicable, allow sufficient space behind the sight to mount a magnifying scope or a night vision monocular.

4. Concept of Operation

Aiming Reticle Illumination

The MEPRO MOR's reflex aiming reticle is equipped with both self-powered and battery-powered illumination mechanisms providing instant and effective aiming in all ambient light conditions.

Normal Light Conditions

- Having a self-powered illumination system, the MEPRO MOR can be effectively used under most conditions without utilizing battery power providing constant aiming reticle availability and assuring fail-safe operation at all times.
- Self-powered illumination of the aiming reticle is achieved by a fiber optic light collecting system during the day and by self-sufficient Gaseous Tritium Light Source (GTLS) capsule at night.

- Since the aiming reticle is self-powered, it will be present in the user's field-of-view even if the sight's control switch is set to the OFF position.
- During day time, the amount of ambient light gathered by the fiber-optic system is projected onto the lens; aiming reticle brightness is automatically adjusted based on external light conditions.

NOTE: The fiber-optic light collector window (cover) must remain unobstructed. See figure 2. Positioning an object that partially or fully covers this area, painting the light collector etc., will result in a weak to completely not visible aiming reticle.

- At night or during twilight having low light conditions, aiming reticle brightness is at a constant low level based on GTLS illumination intensity.
- If external light is available during low light conditions (for example: in an urban environment) the aiming reticle brightness level may be automatically augmented by the additional light that is gathered by the fiber optic light collector.

- GTLS based aiming reticle brightness level is compatible with night vision systems equipped with commercially available image intensification tubes; this allows for positioning a monocular behind the sight and observing targets through the MEPRO MOR's lens thus creating a night vision sight system.

NOTE: The above mentioned capability is dependent on the availability of appropriate weapon mounts for the night vision monocular and may not be applicable with some weapon types due to weapon design limitations.

Extreme Light Conditions

- The self-powered aiming reticle may be hard to see in certain lighting conditions and tactical scenarios such as when aiming from a very dark location at a target situated in a brightly sunlit area.
In such cases, so the reticle can be clearly seen, it can be augmented using the sight's LED illumination.
- The sight is equipped with a battery-powered, LED based, aiming reticle illumination mechanism projecting its light through the illumination window. It has three brightness levels.

- Aiming reticle illumination level is user-selectable and is activated by rotating the sight's control switch to positions 1 (lowest illumination), 2, or 3 (brightest illumination), as may be needed.

Laser Pointers

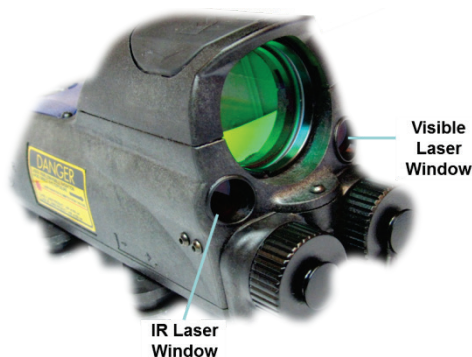


Figure 8: Laser Windows

- The MEPRO MOR is equipped with two integrated lasers: Visible (red) and an IR (Infra-Red) laser.

- The MEPRO MOR PRO is equipped with two integrated lasers with any of the following options:
 - Visible green or red.
 - IR.
- The laser pointers are selectable using the control switch and are activated/deactivated by clicking the PTL cable.

NOTE: With the MEPRO MOR PRO, the laser pointers can also be activated/deactivated without the PTL cable. See “Control Switch Modes” in this chapter.

- The laser pointers consist of laser sources that generate the visible and infra-red (IR) laser beams.
- Once a laser pointer is activated, the laser beam is emitted and projected through the laser window located in the front part of the MEPRO MOR sight. In turn, the laser spot appears on the target to mark the anticipated bullet impact point.
- The actual impact point may vary based on sight zeroing, target range, and weapon & ammunition ballistic characteristics.

- Laser spot size as seen on the target area is determined by the combination of laser's beam diversion (emission angle) and the distance to the target.
- Laser spot visibility depends on:
 - Distance to the target.
 - Ambient lighting conditions (better visibility may be possible in darker conditions).
 - Atmospheric characteristics (fog, rain, smoke, etc.).
 - Whether an optical magnifying and / or image intensification device is being used by the observer.
- The IR laser can only be seen while using a night vision device equipped with an Image Intensification Tube.

Warning: Using visible laser pointer may expose the user location; using an IR laser pointer may expose the user to operators of night vision equipment.

NOTE: lasers are not visible to thermal imaging devices.

PTL Modes

The lasers (visible and IR) are activated by the PTL which may have two modes of operation:
Momentary or constant.

The MOR PRO sights allow the user to switch between Momentary & Constant modes while the regular MOR sights only offer momentary mode.

Note: The MOR PRO model supports activation of lasers also without the PTL cable, or, if the cable is damaged (See “Control Switch Modes” in this chapter).

Momentary Mode

In this mode, the laser (visible or IR) is activated only by pressing and holding the PTL button. When the button is released, the laser is deactivated.

Constant Mode (MOR PRO Only)

In this mode, the laser (visible or IR) is activated by clicking once on the PTL button. The laser will operate constantly until the PTL button is clicked again to deactivate.

Switching Modes (MOR PRO Only)

To switch between the PTL modes of operation:
Double click the PTL button.

NOTE: When switching from momentary mode to constant mode, the laser (visible or IR) will be activated. To deactivate, press the PTL button again.

Control Switch Modes



Figure 9: Control Switch

- When the control switch is in the OFF position, the aiming reticle illumination is inactive. Clicking the PTL switch will not activate the lasers. In this mode, the aiming reticle is illuminated by gathering sunlight or artificial

light. At dark, the aiming reticle is illuminated by the tritium capsule (GTLS).

- When the control switch is in positions **1**, **2**, or **3**, the aiming reticle is illuminated by the battery-powered LED. Position **3** provides the brightest illumination level.
- Positions **1**, **2**, and **3** are useful in very bright environmental conditions where the aiming reticle may be otherwise hard to see.
- When the control switch is in positions **1**, **2**, or **3**, using the PTL switch will activate the visible laser (green or red), while the aiming reticle is illuminated by the battery-powered LED.
- Switching between positions **1**, **2**, and **3**, will affect the aiming reticle illumination intensity but will not affect the laser illumination level or color that depends solely on the laser's (constant) output power and color per specific sight configuration.

Note: The following describes the functionality of “L” and “IR” switch positions in the MOR and in the MOR PRO with a functional PTL cable:

Warning: In the MOR PRO, if the PTL cable is faulty or missing switching to “L” or “IR” will activate the laser pointers and may expose the user location;

- When the control switch is in the **L** position, the battery-powered LED illumination of the aiming reticle is deactivated, and the visible laser can be activated and deactivated by the PTL switch.
- When the control switch is in the **IR** position, the battery-powered LED illumination of the aiming reticle is deactivated, and the infra-Red laser can be activated and deactivated by the PTL switch.
- With the MEPRO MOR PRO, the laser pointers can be activated/deactivated (in constant mode only) if the PTL cable is faulty or missing:
 - Set the control switch to **L** mode to activate the visible laser.
 - Set the control switch to **IR** mode to activate the IR laser.

PTL Fault Indication (MOR PRO Only)

NOTE: PTL malfunction indication is applicable only to MEPRO MOR PRO.

- A malfunction of the PTL is indicated by rapid flashing of the aiming reticle: 0.2 seconds ON, 0.2 seconds OFF, for a period of 3 seconds, upon start up and every 60 seconds.
- There are 3 possible causes for a PTL malfunction:
 - The PTL cable is faulty.
 - The PTL cable is not installed or not properly attached.

Low Battery Indication

- The sight is equipped with a low battery indication mechanism designed to alert the user before battery power is fully exhausted.
- A low battery is indicated by rapid constant flashing of the aiming reticle: 0.4 seconds ON, 0.4 seconds OFF.

- If the sight aiming reticle is flashing, it means that battery power is low. In order to maintain the battery-powered features, replace batteries as soon as possible.
- Low Battery indication will be displayed when there are approx. 40 minutes of operating time left.
- The reticle will continue flashing until the battery is replaced.

Auto Shut-OFF Mechanism ("Sleep Mode")

- The "Sleep Mode" is intended for conserving battery power.
- Leaving the control switch in any position other than **OFF** for more than 3 continuous hours, without the PTL switch pressed, or the control switch rotated, will cause the sight to engage "Sleep Mode".

NOTE: Time to "sleep mode" engagement may be different in some models.

- Activating the visible or IR laser continuously for more than 5 minutes will also cause the sight to engage "Sleep Mode".

- To resume the sight's normal operation click the PTL switch or rotate the control switch.
- In "Sleep Mode" the self-powered aiming reticle will still be available, thus, user's target acquisition capabilities will be maintained.

5. Zeroing

General

- The MEPRO MOR only requires one zeroing procedure for all its aiming devices (Aiming Reticle, Visible Laser, and IR Laser); once any of these aiming devices is zeroed all other devices will be zeroed as well.
- The MEPRO MOR is equipped with windage and elevation adjuster screws for zeroing the sight while mounted on a given weapon. Each movement of the adjuster screw (click) moves the Mean Point of Impact (MPI) by 0.5 milliRadian (mRAD) or 1.7 Minutes of Angle (MOA)
- The adjuster moves in discrete steps (felt as a "tactile").
- To turn the adjuster screw, use a screwdriver, a small coin, or the rim of a cartridge.

- The zeroing mechanism provides all the travel range required for boresighting sights which are properly mounted on serviceable weapons.

Warning: Do not apply excessive force when turning the windage and elevation adjustment screws; this may permanently damage the sight. Encountering abnormal resistance means you may have reached the limit of the zeroing mechanism's travel range.

- The windage and elevation adjustment screws are marked and have directional arrows illustrating MPI movement directions.
- Turning the windage screw clockwise, in the direction of the arrow (marked "R") moves the MPI (as to be reflected on the target) to the right.
- Turning the elevation screw counter-clockwise, in the direction of the arrow (marked "UP") elevates the MPI.

Live Fire Zeroing

NOTE: This chapter describes an example zeroing process. Different zeroing procedures may also apply.

- Ensure that the MEPRO MOR is firmly mounted on the weapon.

NOTE: If the sight's windage or elevation screws have been rotated to one of their extreme ends (i.e. positioned far from the factory zero setting) the initial hits may be very far from the target and thus complicate the zeroing process.

NOTE: In order to simplify the zeroing process, it is recommended to use a shooting target whose squares have a size of 1.25 cm x 1.25cm (equivalent to the click size at a range of 25 meters).

- Aim to the center of a zeroing target positioned at a distance of 25m by superimposing the center of the sight's reticle on the target's center.
- Fire 3 to 5 rounds to establish an MPI.
- Mark the bullets' hits on the target and establish the MPI based on the "average" bullets' hits.

- Measure the vertical and horizontal distances between the MPI and the Objective Point of Impact (OPI); this would be the current zeroing error that has to be corrected to achieve appropriate zeroing. See the following figure.

NOTE: The OPI marked on the zeroing target is set lower than the target's center. This is to compensate for "bullet drop" caused by the gravitation force. See also next paragraph "Range and Ballistic Trajectory".

The actual distance to be set between the target's center and the OPI may vary and depend on the combination of the weapon & ammunition characteristics.

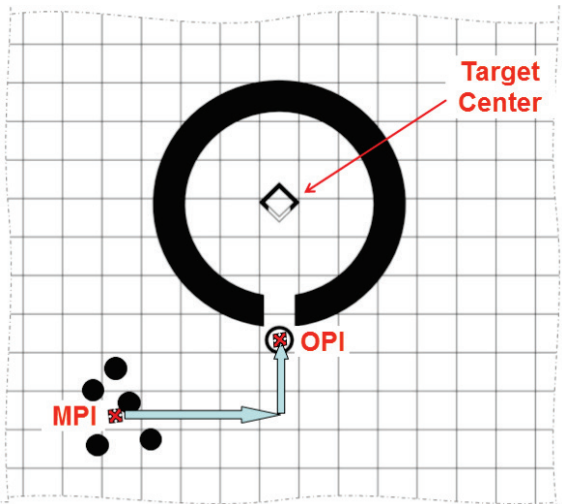


Figure 10: MPI Adjustment

- Use the elevation and windage adjustment screws to correct the MPI according to the vertical and horizontal zeroing error measured previously.

NOTE: At a target range of 25m each click of the adjustment screws will move the MPI about 1.25 cm.

- Rotate the elevation adjustment screw (marked "UP") clockwise to raise the actual MPI and counter clockwise to lower it.
- Rotate the windage adjustment screw (marked "R") clockwise to move the actual MPI to the right and counter clockwise to move it to the left.
- Repeat the steps described above until the sight is zeroed.
- Zeroing process is complete when the MPI overlaps the OPI.
- Example:
 - If the MPI is 5 cm below the OPI, move it up by turning the adjustment screw marked "UP" 4 clicks in the direction of the arrow (clockwise).
 - If the MPI is 10 cm left to the OPI, move it right by turning the adjustment screw marked "R" 8 clicks in the direction of the arrow (counter clockwise).

Range and Ballistic Trajectory

- This section details methods of aiming at ranges of 50 to 250 meters and beyond, considering the bullet's ballistic trajectory.
- Completing the previously described zeroing process results in the weapon and sight being zeroed to a range of 50 and 250 meters; ranges are typical to 5.56mm caliber assault rifles and may slightly vary depending on weapon and ammunition types.
- The following figure describes a typical bullet trajectory as a function of range. In this figure, the "line-of-sight" refers to the shooter's line of sight while aligning the target's center with the MEPRO MOR's aiming reticle. The bullet trajectory starts from the barrel's muzzle positioned approximately 5 cm below the MEPRO MOR's lens center.
- Actual positioning depends on weapon type and the sight's mount type.
- Actual trajectory depends on weapon and ammunition types, shooting angle (horizontal /uphill/ downhill) and on atmospheric conditions (mainly wind).

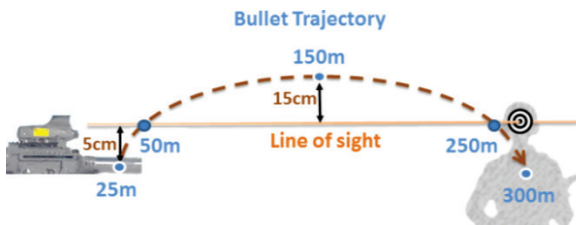


Figure 11: Range and Trajectory

- When shooting to a target at a range of 50 or 250 meters, the center of the sight's reticle should be aimed at the desired impact location without employing any compensation.
- When shooting to target ranges of 50 to 250 meters, aim ~15 cm below the desired impact location.
- When shooting to a target ranges exceeding 250 meters, aim above the desired impact location.

6. Service and Maintenance

Warning: The MEPRO MOR contains visible and invisible (IR) laser pointers which can be hazardous when viewed directly by the human eye.

Inspection & Cleaning

- To ensure readiness of the MEPRO MOR for operation at all times, it must be visually inspected periodically, in order to detect possible damages.
- If the flash guard is installed (see figure 5), remove it carefully (rotate clockwise and pull out) before cleaning the lens.
- Before wiping optical surfaces (objective lens, laser window, illuminator window) with a cloth or optical rice paper, always remove accumulated dust or sand by using air flow or a delicate brush.

Warning: Never attempt to wipe optical surfaces while there is still sand or dust accumulated on

them. Sand and dust particles may scratch lenses and significantly reduce sight's performance.

- If necessary, clean optical surfaces from stains, fingerprints, etc. using the provided cleaning cloth or rice paper adequate for cleaning optical surfaces.
- Inspect the optical surfaces. Make sure they are free of dust and scratches. If an optical surface is severely scratched or broken, refer to an authorized technician or an authorized maintenance facility.
- Visually inspect the body. Make sure that there are no cracks, breaks or loose parts.
- Clean the MEPRO MOR body with a clean damp cloth.

Warning: Refrain from exposing the MEPRO MOR to solvents or oily substances of any kind or using such substances for cleaning the sight.

- Verify proper operation of the MEPRO MOR (see section 3.3 “Verify Sight Operation”). In case of malfunction refer to an authorized technician or an authorized maintenance facility.

Exposure to Salty Conditions

- High salt concentrations may increase the chances of corrosion; after the sight is exposed to salt water or operated in humid and salty environmental conditions the following is recommended:
 - Rinse the sight in tap water.
 - Dry the sight using a dry cloth.
 - Clean the sight's optical surfaces.

Storage

- Remove the batteries before storing the sight to avoid the possibility of battery leakage which may permanently damage the sight.
- Do not store the MEPRO MOR while it is wet or damp; if necessary clean and dry before storage.
- Store the MEPRO MOR in a dark, cool, moisture-free area, together with a desiccant agent.

- Avoid unnecessary exposure of the MEPRO MOR to heat sources or prolonged exposure to direct sunlight.

Troubleshooting

The following table presents instructions for detecting malfunctions, their possible causes and instructions for their correction.

Symptom	Cause	Correction Method
The sight installed on the weapon's mount is loose	The adapter levers are not properly closed (all the way in)	Properly close and secure the levers
	The adapter nuts are not tightened	Tighten nuts. Use the supplied wrench
	The adapter is out of order	Refer to an authorized service center

Symptom	Cause	Correction Method
The quick release levers cannot be properly closed (i.e. all the way in)	The adapter's nuts are over tightened	Release the nuts. Use the supplied wrench
Poor or no visibility through the lens	Dirty lens	Clean the lens properly. See Ch. 6
	Flash guard not properly installed	Properly install the flash guard. See Ch. 1
	Broken/faulty/loose lens	Refer to an authorized service center
Aiming reticle not visible at day time when control switch is set to Off, L or IR	The fiber optic cover (window) is dirty, painted or obstructed	Clean fiber optic window and/or remove any obstruction

Symptom	Cause	Correction Method
(Cont.) Aiming reticle not visible at day time when control switch is set to Off, L or IR	The illumination window is dirty or obstructed	Clean window and/or remove any obstruction
	The fiber optic is broken	Refer to an authorized service center
Aiming reticle not visible at night time when control switch is set to OFF, L or IR	The illumination window is dirty or obstructed.	Clean fiber optic window and/or remove any obstruction
	The GTLS capsule is broken	Follow GTLS safety instructions. Refer to an authorized service center
Aiming reticle not visible when control switch is set to 1, 2 or 3	Battery is placed incorrectly.	Place battery correctly. See polarity indication
	Battery is weak	Replace battery

Symptom	Cause	Correction Method
(Cont.) Aiming reticle not visible when control switch is set to 1, 2 or 3	The illumination window is dirty, painted or obstructed	Clean illumination window
	Faulty control switch or LED system	Refer to an authorized service center.
Aiming reticle brightness is brighter than in position OFF but does not change between settings 1, 2 or 3	Faulty control switch	Refer to an authorized service center
Visible laser is inoperative	Laser windows are dirty	Clean laser windows.
	Control switch is set to Off or IR	Set control switch to 1, 2, 3 or L .
	Inverted battery	Insert battery correctly
	Weak battery	Replace battery

Symptom	Cause	Correction Method
Visible laser is inoperative	Faulty PTL cable Note: With the MEPRO MOR PRO, the laser pointers can also be activated without the PTL cable.	Refer to an authorized service center
	Faulty control switch.	Refer to an authorized service center
Infra-Red (IR) laser is inoperative	Laser windows are dirty.	Clean laser windows
	Control switch is not set to IR	Set control switch to IR
	Inverted battery	Insert battery correctly
	Weak battery	Replace battery.

Symptom	Cause	Correction Method
Infra-Red (IR) laser is inoperative (Cont.)	Faulty PTL cable Note: With the MEPRO MOR PRO, the laser pointers can also be activated without the PTL cable.	Refer to an authorized service center
	Control switch out of order	Refer to an authorized service center
Laser point on target is partial or "smeared"	Dirty or partly obstructed laser window	Clean the laser window and/or remove any obstructions

Symptom	Cause	Correction Method
Rapid flashing of the aiming reticle: 0.2 seconds ON, 0.2 seconds OFF, for a period of 3 seconds, every 60 seconds	Faulty PTL cable	Refer to an authorized service center
	No PTL cable installed	
Constant rapid flashing of the aiming reticle: 0.4 seconds ON, 0.4 seconds OFF	The battery power is low	Replace the batteries as soon as possible
Zeroing problem – cannot hit target	Elevation and/or windage adjuster screws are turned to the end of their travel range	Place a larger target behind the zeroing target to locate hit points

Symptom	Cause	Correction Method
Zeroing problem – MPI is not affected by turning the adjuster screws	Zeroing mechanism out of order	Refer to an authorized service center

7. Safety & Use Restrictions

General

- The MEPRO MOR is a precision electro-optical device – handle it with care! Under certain restrictions the resale of this product is restricted to Governments, Military and Law Enforcement Agencies.

Laser Safety

- The MEPRO MOR contains visible and invisible (IR) laser pointers which may be hazardous when viewed directly.
- The following safety precautions apply to the laser pointers only.
- When used in training, clear target area of personnel.
- Do not operate the MEPRO MOR laser pointers in populated areas.

Batteries

- Do not use any type of batteries other than those specified. Batteries with higher voltages will damage the equipment.
- The sight can operate with a single “AA” ~1.5V battery (Alkaline, Lithium, Rechargeable) or with two “AA” batteries for extended operating time.

NOTE: Use two batteries when the sight is mounted on a 7.62mm rifle.

- The sight is protected against reverse polarity, however, if batteries are improperly positioned the sight's battery-powered features will not function.
- When using two (2) batteries make sure not to mix between fresh and used batteries and not to mix two different battery brands or battery types (chemistries). Mixing battery types in a device is not recommended and can significantly increase the potential for battery leakage and reduced system performance.

GTLS

- This device contains a small amount of radioactive material in the form of gaseous tritium (Hydrogen-3) sealed inside one or more small glass tubes. In this form, the tritium does not present any hazard to the user. If breakage of a light source should occur, a very small amount of tritium will escape from the light source and, over time, migrate to the surface of the device. Only a minuscule amount, if any, will leave the surface of the device and this will only occur by physical contact.
- If the tritium light source in this device is broken or is suspected of being broken, the device should be placed in a sealed plastic bag; and, the person handling it should wear disposable gloves and wash his hands thoroughly with soap and water.
- Repair of a defective device is only authorized by the manufacturer, MEPROLIGHT (1990) Ltd. Please contact MEPROLIGHT (1990) Ltd. or your local distributor for handling and replacement instructions.

8. Technical Data

Magnification	Unity (1X) Power
Optical Aperture	30mm (1.18") clear aperture
Field of View	160° with both eyes open
Aiming Reticle	
Pattern	Dot/Bullseye/X
Dot Size	2.2/4.3 MOA
Night Vision Compatibility	Suitable for use with night vision goggles or scopes equipped with commercially available tubes.
Zeroing Mechanism	Click size: 0.5 mRAD (1.7 MOA). Single zeroing mechanism for all aiming devices (reticle & laser pointers).
Laser Pointers	Visible laser (Green* or Red) and IR

Laser Wave Lengths	Green Laser*: 500 - 540nm Red Laser: 645 - 660nm IR Laser: 845 - 855nm
Laser Output Power	$\leq 5\text{mW}$ (Standard Model) Specific models may have different laser output
Laser Beam Divergence	$< 2.0\text{MOA}$ (0.6mRAD)
Eye Safety	Add Laser classes / standards
Materials	All mechanical parts are manufactured of materials resistant to abrasion and corrosion.
Battery Type	Two "AA" 1.2V to 1.5V batteries (Alkaline, Lithium, Rechargeable); can also operate by a single battery.
Operating Time	≥ 1100 hours of continuous operation (position 1 with one fresh Alkaline battery and without using the lasers).
Auto Shut OFF ("Sleep Mode")	When the sight's controls are not used for ≥ 3 hours. When the visible or IR laser are activated continuously for more than 5 minutes.

Low Battery Indication	When the aiming reticle flashes – there are approx. 40 minutes of operating time left.
Dimensions (L x W x H)	152x73x60mm (5.98"x2.87"x2.36") with a Picatinny adapter
Weight	≤ 435g (15.34oz) w/o battery, with Picatinny adapter
Operating Temp.	-40°C (-40°F)* to +55°C (131°F) *-10°C (14°F) to +55°C (131°F) - For models equipped with a Green Visible Laser
Storage Temp.	-40°C (-40°F) ÷ +70°C (158°F)
MIL-SPEC	MIL –STD 810

NOTE: Actual values (unless otherwise mentioned) may vary by ±5%, according to specific configuration.

* MEPRO MOR PRO Only.

9. Acronyms and Abbreviations

IR	Infra-Red; electromagnetic radiation invisible to the human eye
PTL	Push To Lase
LED	Light Emitting Diode
FOV	Field Of View
mRAD	Milli (1 thousandth) of a Radian; Radian is the plane angle subtended by a circular arc as the length of the arc divided by the radius of the arc (equal to ~3 MOA)
GTLS	Gaseous Tritium Light Source
MOA	Minute Of Angle; one sixtieth (1/60) of one degree
M.P.I	Mean Point of Impact
O.P.I	Objective Point of Impact
mW	Milli-Watt

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