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 $@2010\ Trijicon,\ Inc\ |\ Printed\ in\ USA\ |\ Specifications\ subject\ to\ change\ without\ notice\ |\ MANUAL-RMR\ Rev.\ (0)\ 11/10$

Operator's Manual:

Trijicon® Ruggedized Miniature Reflex (RMR)









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WARNINGS AND CAUTIONS

Warning

Before installing optic on a firearm, ensure the firearm is CLEAR. Remove the magazine, pull the charging handle to the rear and ensure the chamber is clear.

** RADIOACTIVE MATERIALS SAFETY PRECAUTIONS **

The Trijicon Dual-Illuminated Ruggedized Miniature Reflex (RMR) sight contains radioactive material for nighttime illumination. The radiation source is Hydrogen-3 (³H), commonly known as tritium. Tritium is an odorless, tasteless, colorless gas that reacts to the human body in the same manner as natural hydrogen. The human body does not easily retain hydrogen or Tritium as a gas. However, the oxide, HTO, which is

formed by the burning of Tritium, is 10,000 times more hazardous. For this reason great care should be taken to avoid flame in the presence of the RMR with a Tritium lamp which is broken or is suspected of leaking. If the Tritium lamp in the RMR breaks follow the procedures on the following page. The RMR is regulated under an EXEMPT LICENSE from the United States Nuclear Regulatory Commission (NRC) held by Trijicon, Inc. Disassembly of the sight is prohibited except by Trijicon, Inc.

HANDLING A DAMAGED DUAL-ILLUMINATED RMR (exposed internals, fire, or crushed)

DO NOT handle a damaged unit if you have open skin cuts or abrasions (use gloves). If the Tritium lamp in an RMR is broken or sus-

pected of being broken, work in a well ventilated area and avoid inhaling air near the unit. Place the unit in a sealed plastic bag and contact Trijicon's Customer Service Department. Contact information is found on page 32. Immediately following contact, wash your hands with soap and water.

DO NOT eat, drink, smoke, or apply cosmetics in the presence of a damaged RMR.

CAUTION

DO NOT allow the light collector of the RMR to come into contact with harsh organic chemicals such as Acetone, Trichloroethane, or other cleaning solvents. They will affect the appearance of the light collector though they will not affect its performance.

INTRODUCTION

This miniature sight is a Ruggedized Miniature Reflex (RMR) intended for Quick Target Acquisition. The RMR is designed to be used with both eyes open, providing the operator with maximum situational awareness. Power is provided by a common, commercially available CR2032 lithium battery in the Adjustable LED version, and fiber optics and tritium in the dual-illuminated version. The Adjustable LED RMR is turned on by pressing any button on the unit. The LED RMR is always "on" unless the battery is removed. The units are designed with an auto and manual adjusting sensor within the LED to regulate reticle brightness. The Dual-Illuminated version automatically adjusts the reticle brightness to ambient light during the day using fiber optics and illuminates in low light or no light conditions using tritium. Accuracy is enhanced with adjustments for windage and elevation. Performance is assured with a strong 7075-T6 aircraft aluminum alloy body.

CHARACTERISTICS

Model	Description	Magnifi- cation	Eye Relief	Length	Width	Height	Weight	Water- proof	Power Supply
RM01	Trijicon RMR™ Sight (LED) 3.25 MOA Red Dot	1X	Unlimited			1.0 in / 25 mm		to 66 ft/ 20 m	CR2032 3V DC Lithium
RM02	Trijicon RMR™ Sight (LED) 6.5 MOA Red Dot	1X	Unlimited			1.0 in / 25 mm		to 66 ft/ 20 m	CR2032 3V DC Lithium
RM03	Trijicon RMR™ Dual Illuminated Sight 13.0 MOA Amber Dot	1X	Unlimited			1.0 in / 25 mm		to 66 ft/ 20 m	Fiber optics/ Tritium
RM04	Trijicon RMR™ Dual Illuminated Sight 7.0 MOA Amber Dot	1X	Unlimited			1.0 in / 25 mm		to 66 ft/ 20 m	Fiber optics/ Tritium

RM05	RM05 Illuminated Sight 1X Unlimited 1.8 in / 1.2 in / 1.3 in / 1.3 in / 1.2 in / 1.3 in / 1.	
RM06 Sight (LED) 1X Unlimited 1.5 in / 1.1 in / 1.0 in / 1.1 oz / to 66 ft / R2032 3V		
RM07 Sight (LED) 1X Unlimited 1.8 in/ 1.1 in/ 1.0 in/ 1.17 oz/ to be fit 0x2032 3V 0.5 MOA Red Dot Trijicon RMR™ Dual RM08 Illuminated Sight 1X Unlimited 1.8 in/ 1.2 in/ 1.0 in/ 1.2 oz/ to 66 it/ Fiber optics/	HMU6 Signt (LED) 1X Unlimited 45 mm 29 mm 25 mm 33	
RM08 Illuminated Sight 1X Unlimited 1.8 In/ 1.2 In/ 1.2 In/ 1.0 In/ 1.2 OZ/ to 66 TV Fiber optics/	RM07 Sight (LED) 1X Unlimited 1.8 In / 1.1 In / 1.0 In / 1.17	
	RM08 Illuminated Sight 1X Unlimited 1.8 In/ 1.2 In/ 1.0 In/ 1.2	

CONTROLS AND INDICATORS



Figure 1 (All models have the same adjuster location.)

PREPARATION FOR USE

Adjustable and LED Version

Install battery into sight so that the negative (-) is facing down as marked on the label and engraved inside the case. The system has reverse polarity protection and a mechanical stop to prevent the battery from being installed incorrectly. See Figure 2 and Figure 3 for proper battery installation. Failure to install the battery properly may bend the contacts and prevent operation.





Figure 2 Figure 3 (Adjustable RMR shown.)

Dual-illuminated Version

To determine that the tritium lamp is functioning in the RMR, enter a dark room and look through the sight. The illumination provided by the tritium lamp is very faint and will be hard to see without a dark adapted eye. Remain in the dark room for approximately 10 minutes to adapt your eyes to the dark. If the reticle does not appear to illuminate in the dark, please contact Trijicon, Inc. See further cautions under Safety on page 22.

IDENTIFICATION & MARKINGS



Figure 4 (All models have the same serial number location.)

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INSTALLATION PROCEDURES

WARNING:

Before installing the optic on a firearm, ensure the firearm is CLEAR. Remove the magazine, pull the charging handle to the rear and ensure the chamber is clear.

Mounting to FirearmAdapters are available to attach the RMR sights to various firearms. See page 30 for adapter options.

ADJUSTMENT PROCEDURES

CAUTION

The windage and elevation adjusters should never be moved all the way to the extremes in adjustment. It is possible that over-adjustment will damage the sight. If the adjuster resistance increases, the limits of adjustment travel are being approached. Adjust further only with caution.

As the limits of the adjustment are reached, the adjustment mechanism will become more and more difficult to adjust. If the adjustment mechanism is adjusted past this point, it will break. Adjustment beyond the center of the adjustment range should not be necessary. If it seems that you need more adjustment than is available, please contact Trijicon, Inc.

Windage Adjuster

The windage adjuster is located on the right side of the RMR (**Figure 1**, page 10) and can be adjusted using a screwdriver, coin, and/or the extractor rim of a 5.56 cartridge. Adjustments are 1 MOA per click and can be detected through audible and physical feedback.

Elevation Adjuster

The elevation adjuster is located on the top of the RMR (**Figure 1**, page 10) and can be adjusted using a screwdriver, coin, and/or the extractor rim of a 5.56 cartridge. Adjustments are 1 MOA per click and can be detected through audible and physical feedback.

Making Adjustments

The arrows on the adjusters point in the direction which they must be

moved to cause the bullet to move in that same direction. If the point of impact is to the left of the aiming point, the adjuster on the side of the RMR should be moved in the direction marked R (right). This will move the bullet to the right and onto target. Similarly, if the bullet is striking low on the target, you must move the adjuster on the top of the sight in the direction up (of course if the bullet is right or high of center, the adjusters must be turned the other directions, away from the R and U directions indicated).

Note: Do not adjust to the extreme ends of adjustment as damage to the RMR can occur.

While making adjustments resistance will be apparent when the adjuster has reached its limits of adjustment. If you need more adjustment than is available follow the troubleshooting guide on page 26.

ZEROING PROCEDURES

The RMR is factory adjusted to be parallax-free at 50 meters. With the parallax adjusted to 50 meters this allows the least amount of parallax related errors to be minimized over a larger distance. Trijicon recommends Zeroing Point of Aim (POA)/Point of Impact (POI) at 50 meters to ensure minimal parallax error shooting.

OPERATION

LED Sensor

Batteries

The Adjustable and LED RMR use one (1) CR 2032 3V DC lithium battery to power the RMR which is included in the original packaging. The RMR's battery life has been tested to provide over 1 year, continuously "on" in normal operating conditions. Extreme high and low temperatures will have dramatic effects on battery life and Trijicon recommends replacing the battery once a year. The aiming dot will not turn off when the battery life gets low but will gradually become dimmer over time.

Replacing Batteries

Remove the RMR from the mount by removing the two flathead screws that secure the RMR to the mount with the supplied allen wrench.

Once the sight is removed, carefully insert the allen wrench into the pry notch to lift the battery out of the battery compartment. Taking a new battery, inspect the battery to ensure there is no corrosion or damage to the battery.

Install the battery into sight using procedures on page 11. Install the RMR by aligning the locating holes on the sight with the bosses on the mount and pressing down until the sight is fully seated (the sight should sit flush on the mount). Install supplied flathead screws. With the supplied allen wrench, tighten each screw until it seats, then secure.

Adjustable Brightness

The plus and minus buttons are located on the side of the adjustable RMR. Press either of the buttons to turn the unit on and the unit wakes up in automatic mode. Also, press both buttons simultaneously for less than 3 seconds and release to enter automatic mode. Press both buttons simultaneously and hold them for 3 seconds to turn the unit off. Press and release the plus button to increase brightness and to enter manual mode. Press and release the minus button to decrease brightness and to enter manual mode. The brightness settings for manual illumination control has 8 settings (1) dimmest and (8) brightest. Automatic mode will cover the range of settings 3-7 depending on current ambient condition. On the Dual Illuminated RMR you are able to adjust reticle illumination by using riggers tape to cover the fiber optic. To adjust reticle illumination, peel back the tape to expose fiber optic.

SAFETY

The Dual-illuminated RMR scope contains radioactive material for night-time illumination. The radiation source is Hydrogen-3 ($^3\text{H})$, commonly known as Tritium. Tritium is a naturally occurring odorless, tasteless, colorless gas that reacts with the human body in the same manner as natural hydrogen. The body does not easily retain hydrogen or Tritium as a gas. However, the oxide, HTO, which is formed by the burning of Tritium, is 10,000 times more hazardous. For this reason great care should be taken to avoid flame in the presence of the RMR scope with a Tritium lamp which is broken or is suspected of leaking.

If the Tritium lamp in the RMR is broken or is suspected of being broken, place the unit in a sealed plastic bag and contact Trijicon, Inc. for handling and replacement instructions.

After contact with a unit with a broken lamp, a person should wash their hands carefully with soap and water. Do not handle such a defective RMR scope if you have open skin cuts or abrasions. Work with a defective unit only in a well-ventilated area and avoid inhaling air near the unit.

Do not eat, drink, smoke or apply cosmetics in the presence of a defective unit. Repair of these defective units is only authorized by the manufacturer, Trijicon, Inc. Contact Trijicon, Inc. for handling and replacement instructions.

CLEANING AND GENERAL CARE

CAUTION: DO NOT allow the fiber cover of the Dual-illuminated RMR to come in contact with harsh organic chemicals, such as acetone, trichlorethane, or other cleaning solvents. They will affect the appearance of the fiber cover, though they will not affect its performance.

Repair or maintenance other than that described in this manual is prohibited by anyone other than the manufacturer because of the radioactive material contained in the Dual-illuminated RMR.

The RMR requires very little maintenance. If the lenses become dirty the unit can be washed using fresh water and a clean cloth. Be careful to rinse the lenses fully before cleaning it with the cloth. The lenses could

be scratched if dirt is pulled along the lens by the cloth. In cold weather, if the outside lens surface fogs over, wipe with a clean cloth.

TROUBLESHOOTING

This section contains troubleshooting information and tests for locating and correcting most of the troubles which may develop in the operation of the RMR. Each trouble symptom for an individual unit is followed by a list of tests or inspections for determining probable causes and suggested actions to remedy the problem.

The RMR will not power up

- Ensure the battery is correctly installed as per Preparation for Use section (page 11).
- 2. Replace with a new battery that is fully charged as per Preparation for Use section (page 11).
- 3. Inspect the battery contact points in the battery compartment and

be sure the lower battery contact is bent upward so that it contacts the battery and the side contact is bent towards the center of the battery compartment.

- Ensure there is no corrosion or wear to the battery contacts.
 Clean the contacts if needed.
- 5. Contact Trijicon for repair or replacement.

The RMR's Dot is blurred or fuzzy

- Inspect the LED window to ensure it is free of any foreign materials and/or smudges. Clean the LED window if needed as per Cleaning and General Care section.
- Inspect the inside of the Lens to ensure it is free of any foreign materials and/or smudges. Clean the Lens if needed as per Cleaning and General Care section.

- 3. Replace with a new battery that is fully charged as per Preparation for Use section (page 11).
- 4. Contact Trijicon for repair or replacement.

The RMR will not adjust
Contact Trijicon for return information.

The RMR will not zero

- 1. Inspect the mounting of the firearm.
- 2. Inspect the mounting of the RMR to the base.
- 3. Mount the primary optic with RMR mounted to another firearm to ensure the problem is the RMS and not the firearm.
- 4. Contact Trijicon for return information.

RMR MODELS & AVAILABLE ACCESSORIES

Optics

Triangle

MFG # Description
RM01 Trijicon RMRTM Sight (LED) — 3.25 MOA Red Dot
RM02 Trijicon RMRTM Sight (LED) — 6.5 MOA Red Dot
RM03 Trijicon RMRTM Dual Illuminated Sight — 13.0 MOA Amber Dot
RM04 Trijicon RMRTM Dual Illuminated Sight — 7.0 MOA Amber Dot
RM05 Trijicon RMRTM Dual Illuminated Sight — 9.0 MOA Amber Dot
RM06 Trijicon RMRTM Adjustable Sight (LED) — 3.25 MOA Red Dot
RM07 Trijicon RMRTM Adjustable Sight (LED) — 6.5 MOA Red Dot
RM08 Trijicon RMRTM Dual Illuminated Sight — 13.0 MOA Amber

RMR Mounts & Accessories

MFG# Description

Low Picatinny Rail Mount RM33 Tall Picatinny Rail Mount RM34 RM34W

Low Weaver Rail 4x32 ACOG® with Boss Mount RM35

RM36

Compact Mount
DOCTER® Sight Adapter Mount
4x32 ACOG® with Chin Strap RM37 RM38

TRD Adapter Plate RM43

Docter® is a registered trademark of analytikJenaAG Optical Solutions.

Contact Trijicon's Customer Service Department at 1-800-338-0563 for further instructions and visit our website at www.Trijicon.com to view our latest products.

PATENTS AND TRADEMARKS

RMRTM (Ruggedized Miniature Reflex) is covered by the U.S. patents: Patent numbers pending.

LIMITED LIFETIME WARRANTY

The original owner of the Trijicon® product registered with this card is entitled to repair or replacement (at our option) of the registered item if it should fail due to defects in material or workmanship during normal use. This warranty specifically applies to the optical systems and metal structure of the product and does not apply to the illumination system. Electronics are warranted to be free of defects in material and workmanship during normal use for a period of two (2) years from date of purchase. If repair is necessary, please contact our Customer Service Department for return instructions. This warranty does not apply to defects caused by anything which is deemed abnormal, abusive, or improper including any fault resulting from an accident or improper service. Any attempt at disassembly or repair will annul this warranty.

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