

# SPR/M4

## GENERAL DESCRIPTION

[www.advanced-armament.com](http://www.advanced-armament.com)

P: 770-925-9988 / F: 770-925-9989

The SPR-M4 Silencer and Flash Hider system is designed to reduce the sound and visible flash signature of 5.56 x 45mm and 6.8 SPC small arms. The system is comprised of an AAC Flash Hider or Muzzle Brake and a SPR-M4 Fast-Attach Silencer. The silencer utilizes the M.I.T.E.R. (Multi Indexing for Targeting at Extended Range) fast-attach system that enables users to securely install the silencer in any one of five different rotational orientations with minimal effort in under three seconds.

## DANGER

Silencers for centerfire rifles are known to reach temperatures in excess of 600 degrees Fahrenheit under normal use. The SPR-M4 is designed to withstand full auto fire and will easily reach temperatures in excess of 800 degrees. Users must be vigilant in preventing contact between the silencer and skin, clothing, and combustible objects during use.

## NOTES ON USAGE

The SPR-M4 Silencer is constructed of welded 718 Inconel and 316L SS and will easily withstand full-auto firing. Users should dismount and reinstall the silencer after every 200 rounds of use (after it has cooled to the point it can be grasped with a heat resistant glove or bare hand) to prevent vaporized copper from fusing the flash hider to the silencer mount.

## TECHNICAL SPECIFICATIONS

Caliber	5.56mm & 6.8mm
Silencer Materials	718 Inconel & 316L SS
Flash Hider Materials	High Temperature SS
Length (O.A.)	8.625 in.
Length Added to Weapon	4.90 in.
Diameter	1.5 in.
SPL Reduction	33 - 36dB
Silencer Finish	Matte Black
Flash Hider Finish	SCARmor™

## INSTALLATION OF AAC FLASH HIDER

The SPR-M4 couples to the AAC Flash Hider or Muzzle Brake that is attached to the host firearms barrel with threads and adhesive. The following instructions detail the procedure for installing the Flash Hider on the host firearm. If your SPR-M4 was delivered with a Muzzle Brake, refer to the Muzzle Brake installation card.

1) The AAC Flash Hider or Muzzle Brake couples to the host firearm using the supplied Rocksett adhesive and the tooling and materials listed below.

1a) Parts Required:

- (1) Flash Hider AAC SUPPLIED
- (1) Wrench, Combination, for M16 (NSN: 4933-00-070-9152)
- (1) Wrench, Torque (NSN: 5120-00-640-6364)
- (1) 11/16" Adapter for Torque Wrench
- (1) Protective Vice Jaws (Varies with host weapon manufacture)
- (1) Solvent (Acetone, Lacquer or Paint Thinner)
- (1) ROCKSETT sealant AAC SUPPLIED

2) Set the weapon select lever on "SAFE", remove the magazine from the host firearm, lock the bolt to the rear, and visually inspect the chamber to ensure it is empty and the host-weapon is unloaded.

3) Using Combination Wrench and Protective Vice Jaws, remove existing Flash Hider and washer if present. Discard washer.

**IMPORTANT** - DO NOT USE ANY TYPE OF WASHER between the AAC Flash Hider and the barrel of the host weapon. The efficiency of the AAC Flash Hider is not dependent on any particular rotational orientation, therefore use of a washer is unnecessary and may cause misalignment of the Flash Hider that can damage the silencer and injure the user.

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4) Clean shoulder of barrel and exposed barrel threads thoroughly with solvent. Rust, grease, oil, and other contaminants MUST be removed.

5) De-grease and dry the threads on the inside the AAC Flash Hider.

6) Apply and distribute one or two drops of ROCKSETT sealant to the muzzle threads of the weapon and the threads inside of the AAC Flash Hider.

## ATTENTION

Once ROCKSETT sealant has been applied to the mating parts of the host weapon muzzle and the AAC Flash Hider, the parts must be assembled quickly.

7) Screw the AAC Flash Hider onto the muzzle threads until it bottoms out on the host weapon muzzle or the shoulder behind the muzzle threads.

8) Adjust the torque wrench for a value between 20 and 30 ft-lbs. Using the torque wrench and 11/16" adapter, torque the AAC Flash Hider onto the host weapon barrel.

9) Wipe away any excess ROCKSETT sealant. Allow sealant to cure for 24 hours for best results.

## INSTALLATION OF SPR/M4 SILENCER

1) Set the weapon select lever on "SAFE", remove the magazine from the host firearm, lock the bolt to the rear, and visually inspect the chamber to ensure it is empty and the host-weapon is unloaded.

2) Inspect the threads on the exterior of the AAC Flash Hider and interior of the SPR-M4 Silencer to ensure they are free of obstructions and undamaged.

3) With the host-weapon muzzle pointed away from you and in a safe direction, slide the SPR-M4 over the AAC Flash Hider until the external threads on the Flash Hider engage the internal threads of the SPR-M4 Silencer. Rotate the SPR-M4 by hand Counter-Clockwise approximately 1 turn, until the shoulder at the rear of the Flash Hider engages a mating surface within the SPR-M4 and will no longer turn (See Figure 1).



Figure 1

As the SPR-M4 is threading onto the Flash Hider, teeth on the ratchet latch will engage the teeth on the rear of the Flash Hider. This will prevent the SPR-M4 from unscrewing during use. Pull forward on the SPR-M4 to ensure the threads on the Flash Hider are fully engaged with the threads inside the SPR-M4. When fully engaged, the serrations on the rear of the Flash Hider will be fully recessed into the rear of the SPR-M4 Silencer as seen in Figure 2a. If the installation resembles Figure 2b, the SPR-M4 Silencer should be dismounted from the Flash Hider and examined for damage to the threads and/or obstructions in the Flash Hider socket in the rear of the SPR-M4.

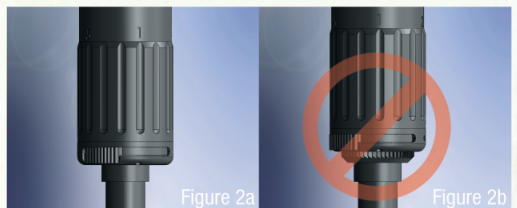


Figure 2a

Figure 2b

## WARNING

It is imperative operators insure the SPR-M4 is securely attached to the AAC Flash Hider before firing. Failure to do so can result in damage to the silencer, host weapon, and injury to the user and others.



## REMOVING SPR/M4 SILENCER

1) Before removing the SPR-M4, set the weapon select lever on "SAFE", remove the magazine from the host firearm, lock the bolt to the rear, and visually inspect the chamber to ensure it is empty and the host-weapon is unloaded. The SPR-M4 may then be removed from the host weapon after its exterior reaches a temperature where it can be grasped with a bare hand or heat resistant glove.

2) Depress the ratchet latch (indicated by the arrow), and unscrew the SPR-M4 from the Flash Hider in the indicated direction (See Figure 3).



Figure 3

## ADJUSTING P.O.I WITH M.I.T.E.R. SYSTEM

The SPR-M4 Silencer is engineered to minimize the point of impact (POI) shift that occurs when switching between unsuppressed and suppressed firing. The M.I.T.E.R. system allows users to fine tune the POI shift by adjusting the rotational orientation of the SPR-M4 in 72 degree (1/5 turn) increments. Before the POI shift can be adjusted with the M.I.T.E.R. system, the host weapon's sights/optics must be zeroed with the Flash Hider installed but **without** the SPR-M4 Silencer. Once an unsuppressed zero is achieved, adjustments to the POI can be made using the M.I.T.E.R. system at a firing range using proper range safety protocols.

1) Set the weapon select lever on "SAFE", remove the magazine from the host firearm, lock the bolt to the rear, and visually inspect the chamber to ensure it is empty and the host-weapon is unloaded.

2) Inspect the threads on the exterior of the Flash Hider and interior of the SPR-M4 Silencer to ensure they are free of obstructions and undamaged.

3) Position the host weapon so that the front sight post or optic is fully upright and at the 12 o'clock position.

4) Each one of the five starting points of the multi-start thread in the rear mount of the SPR-M4 correlates to the numerals "1" through "5" engraved around the periphery of the SPR-M4 Silencer. Position the SPR-M4 so that the numeral "1" is at the 12 o'clock position (See Figure 4). With the muzzle of the host weapon pointed safely downrange, slide the SPR-M4 over the Flash Hider until the external threads on the Flash Hider engage the internal threads of the SPR-M4. Rotate the SPR-M4 by hand Counter-Clockwise approximately 1 turn, until the Flash Hider bottoms out and the SPR-M4 will no longer turn. When the SPR-M4 and Flash hider are fully engaged, the teeth on the ratchet latch will engage the teeth on the rear of the Flash Hider and lock the two securely together.

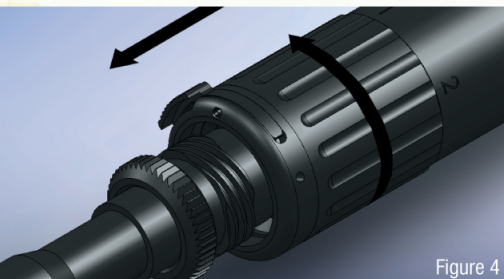


Figure 4

5) Fire a five shot group at a paper target. If the host weapon shoots to the same POI with the SPR-M4 installed as it did without, no further adjustments are required. If the suppressed POI is different from the unsuppressed POI, set the weapon select lever on "SAFE", remove the magazine from the host

firearm, lock the bolt to the rear, and visually inspect the chamber to ensure it is empty and the host-weapon is unloaded. Remove the SPR-M4 Silencer from the host weapon after its exterior reaches a temperature where it can be grasped with a bare hand or heat resistant glove and re-install it with the numeral "2" in the 12-o'clock position (See Figure 5).

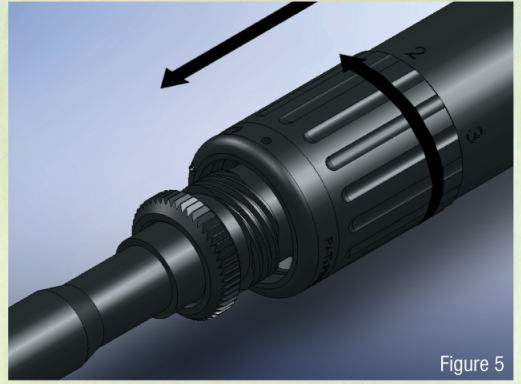
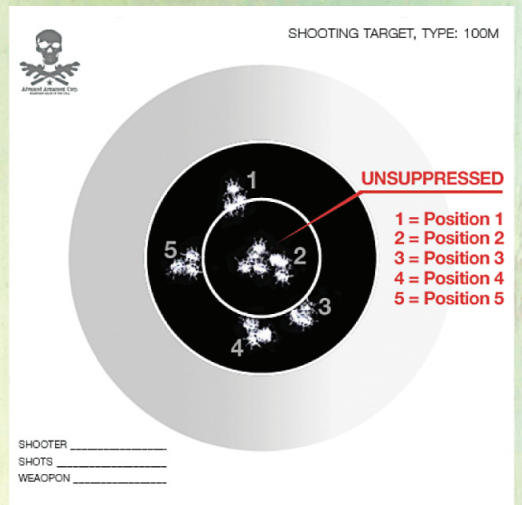


Figure 5

6) Reload the weapon and fire another five shot group at a fresh target. Repeat steps 4 and 5 until a satisfactory Unsuppressed POI/Suppressed POI relationship is achieved.

## M.I.T.E.R. SYSTEM (Multi Indexing for Targeting at Extended Range)



## NOTES ON MUZZLE FLASH REDUCTION

Operational circumstances may require the complete elimination of muzzle and ejection port flash. In this instance, the use of water to create an artificial environment is warranted. To wet the interior of the SPR-M4 Silencer, detach it from the host weapon and submerge it in water. Rotate the SPR-M4 around its vertical axis to drain excess water from the interior of the suppressor. If submersion in water is not possible, 5cc's (approximately 1 cap full from a water bottle) may be poured into the rear of the detached SPR-M4. Shake the SPR-M4 several times to help distribute water within the baffle-stack. If the host weapon is not discharged after water is added, the water will remain inside the SPR-M4 for up to 36 hours, depending on the ambient temperature.

## WARNING

DO NOT use grease, oil or any liquid other than water as artificial environment media to reduce first-round flash in the SPR-M4. Oil and grease will create smoke as soon as the suppressor gets hot, and grease can cause an overpressure situation that can cause damage to the SPR-M4 and injury to the user.

## IMPORTANT

It is imperative that the host firearm be given a thorough cleaning as soon as possible after firing with the SPR-M4 attached and an artificial environment in place. Moisture from the artificial environment will be drawn through the gas ports in the host firearms barrel and propagate throughout the gas system, leading to corrosion.