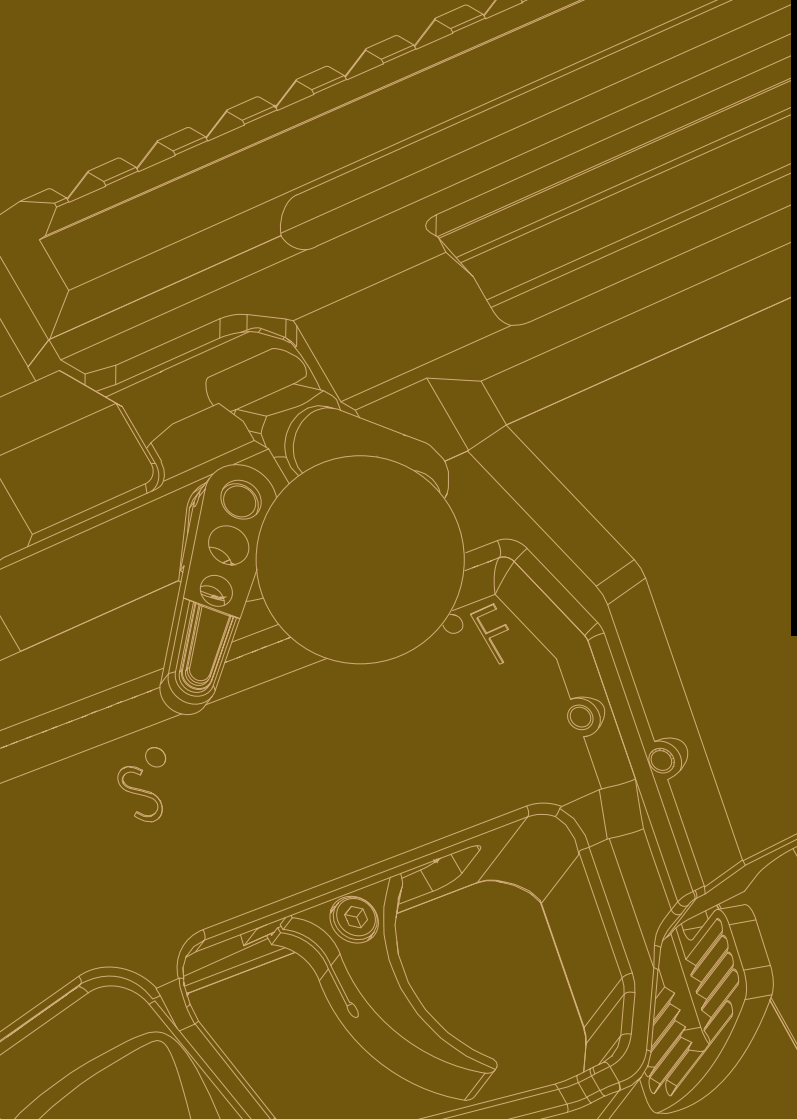


ACCURACY INTERNATIONAL

AXSR

USER`S HANDBOOK

AXSR MULTI-CALIBRE

Part No AI-15685 Issue 01

INTRODUCTION

Accuracy International was formed in 1978 to design and build tactical rifles.

The original design ethos combined two factors into a unique package, namely the incorporation of performance enhancing features learned in Olympic and international target shooting onto a platform exhibiting full military ruggedness.

The current designs faithfully follow this original concept but also benefit from over forty years of continuous improvement. These improvements are not cosmetic. Instead, they are driven solely by the needs of the users, highly trained military and police units in over 60 countries worldwide. Such units are exposed to 'live' tactical situations daily and in the most demanding environments where first shot accuracy is critical.

All components are manufactured to Accuracy International`s designs to ensure optimum performance, something not achievable with a re-purposed sporting weapon.

The AXSR multi-calibre rifle is an evolution, which builds on Accuracy International`s established family of highly successful AW and AX rifles. Being a bolt action rifle with free-floating match grade barrel and a magazine capacity of ten rounds, it fulfils the need for a highly accurate long-range sniper rifle.

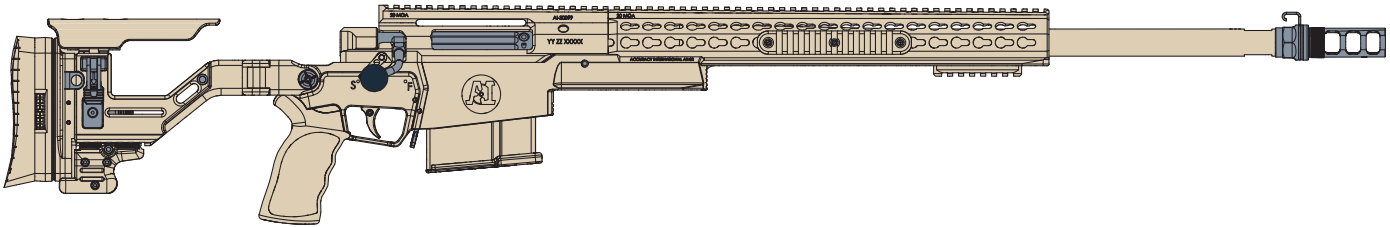
Like the AX series, the AXSR rifle utilizes an aluminium chassis system, which ensures insensitivity to temperature and humidity, thus ensuring a constant zero.

The forend tube design provides multiple mounting points using M-Lok® or KeySlot™ technology for accessory rails, sling attachments and bipod mounts.

The AXSR rifle also incorporates integral RRS compatible dovetail rails for use with a wide range of bipod, tripod and accessory mounts.

The AXSR is easily upgradeable with accessories and upgrades which can be purchased from Accuracy International distributors.

CUSTOMER COMMUNICATION



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TECHNICAL SPECIFICATION

Calibre Multi-calibre
- 6.5 Creedmoor.
- 7.62 Nato/.308 Winchester.
- .300 Winchester Magnum.
- .300 Norma Magnum.
- .338 Norma Magnum.
- .338 Lapua Magnum.

Action Front locking, 6 lugs.

Bolt 60 degrees opening, 6 mm striker fall.

Trigger Two-stage trigger, 1.5 - 2.0 Kg pull weight with adjustable reach trigger blade.

Barrels

Easily removable using the QuickLoc barrel clamping system.

CALIBRE	LENGTH	TWIST
6.5 Creedmoor	20",24",26"	1-8"
7.62 Nato/.308 Win	12",16"	1-8"
7.62 Nato/.308 Win	16",20",24",26"	1-10"
.300 Win Magnum	20",24",26"	1-11"
.300 Norma Magnum	27"	1-8"
.338 Norma Magnum	27"	1-9.35"
.338 Lap Magnum	27"	1-9.35"

Safety 2-Position, ambidextrous.
Safety lever draws back and blocks the firing pin allowing the bolt to be cycled in a safe condition.

Stock Folding stock.
Cheek-piece provides height, lateral, forward and rearward adjustment.
Butt is adjustable for length of pull, height and rotation.
Rear Grip, adjustable for position.
Forend with KeySlot mountings, 13" or 16" length.
Forend with MLok mountings, 13" or 16" length.
Optional rear spike.

Optic rail 20 MOA STANAG or 30 MOA STANAG.

Magazine 10 shot, double stack, detachable, box type magazine.

Accessory rails 1 x 80 mm rails, 1 x 80 mm flush cup rail, 1 x 96 mm flush cup rail, 1 x 140 mm rail.

Rail Interface One 12" RRS™ compatible 1.5" Dovetail interface.
One 4" RRS™ compatible 1.5" Dovetail interface.

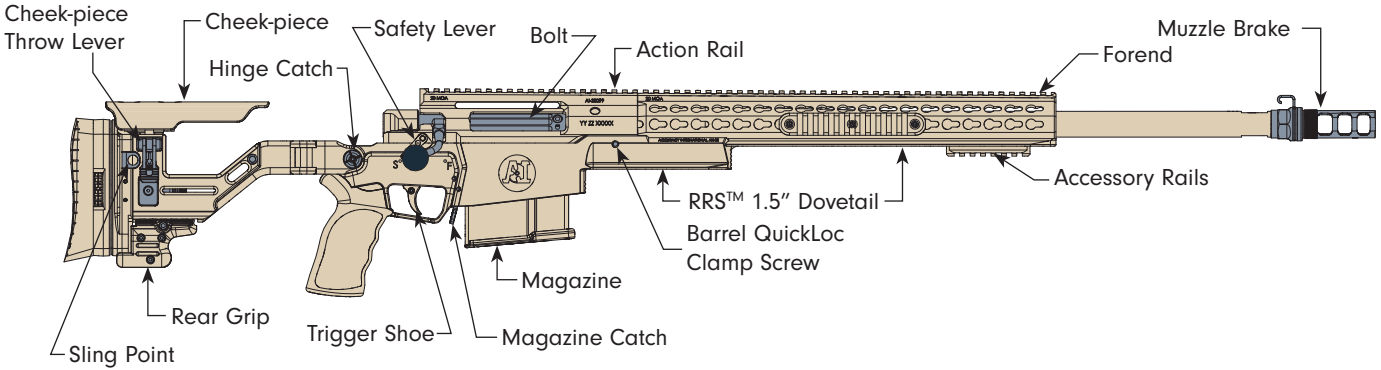
Sling points Flush cup sling points fitted.

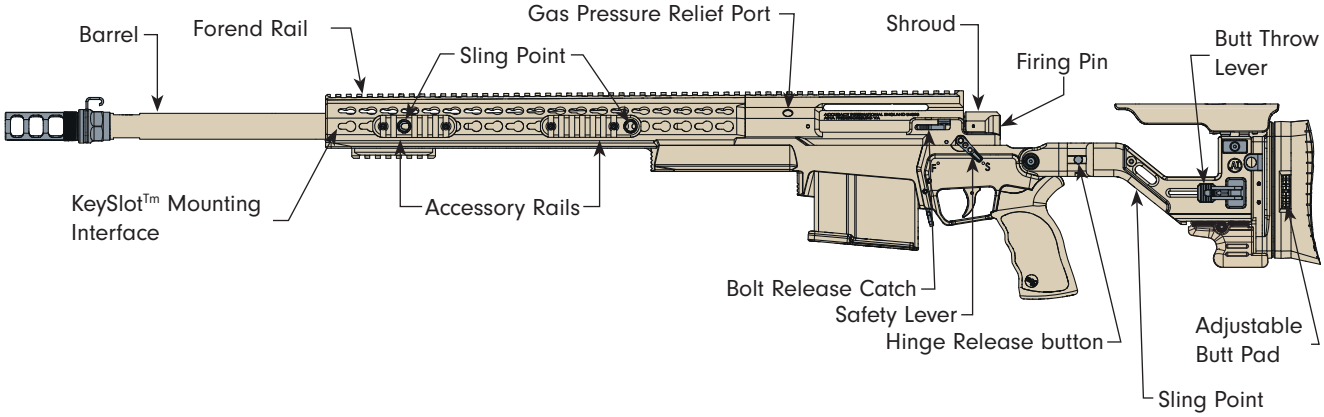
Weight 15.4 lbs/6.98 Kg. Base rifle with standard accessory rails, unloaded magazine, 27" .338 barrel fitted.

Length 51.95"/1320 mm with 27" barrel and muzzle brake, LOP at maximum extension. 41.33"/1050 mm with stock folded.

Suppressor Brügger and Thomet Monoblock cal .338 LM.
Weight 625 Grms.
Length 297 mm.
Dia 50 mm.

PARTS IDENTIFICATION





CONTENTS

CONTENTS

1 SAFETY

Before attempting to use or handle the rifle, this manual must be read and understood fully. This manual assumes a basic level of user familiarity with firearms and is not a replacement for user training.

DAMAGE TO PROPERTY, INJURY OR DEATH MAY RESULT IF SAFETY WARNINGS AND INSTRUCTIONS ARE NOT FOLLOWED.

- Treat every weapon as if it were loaded.
- Never point a weapon at anything you do not intend to shoot.
- Keep your finger straight and off the trigger until you are ready to fire.
- Keep the weapon on "safe" until you intend to fire.
- Know your target and what is beyond it.

1.1 SAFETY FEATURES

- The AXSR rifle bolt utilizes six forward locking lugs.
- When the bolt is in the closed position the bolt head is enclosed and supported within the lock ring and action body.
- The firing pin cannot protrude from the front of the bolt face until the bolt lugs are engaged within the lock ring.
- Dangerous gas leakage from the rear of the action body is minimized by a tight-fitting bolt and shroud assembly that assists the deflection of hot gasses away from the operator.
- In the event of an overpressure round, two gas pressure relief ports are located in the action body.
- The AXSR action incorporates an ambidextrous 2-position safety lever.

1.2 FIRING PIN COCKING INDICATOR

When the rifle is cocked and ready to fire, the firing pin extends past the rear of the bolt shroud.

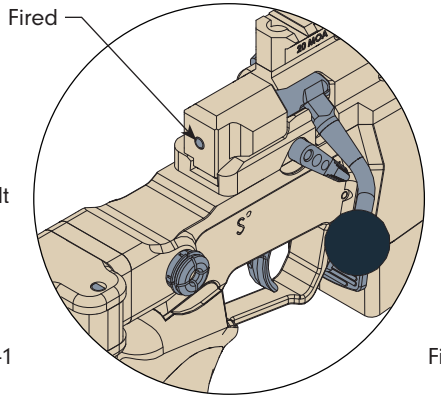


Fig 1-1

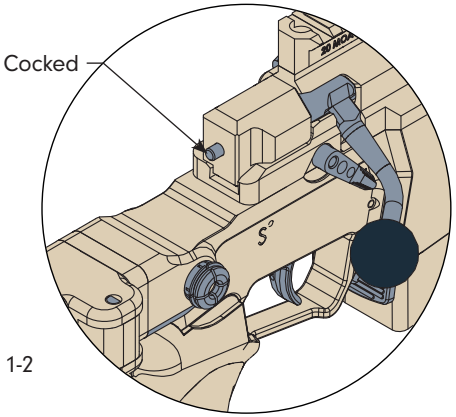


Fig 1-2

1.3 SAFETY FUNCTION

The AXSR rifle is fitted with a ambidextrous 2-position safety mechanism.

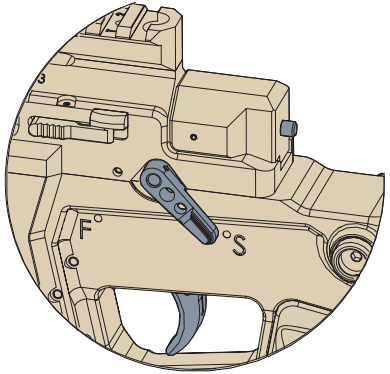


Fig 1-3

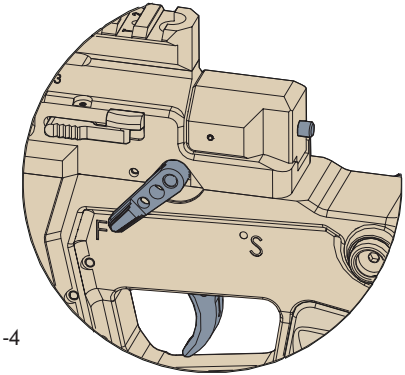


Fig 1-4

The 'SAFE' position

- When the safety lever is moved fully rearward to the 'SAFE' position, the firing pin is drawn rearwards, away from the trigger mechanism and is physically blocked.
- While the safety lever is in the 'SAFE' position, the bolt may be operated and removed, providing a safe method of ejecting live rounds.

The 'FIRE' position

- When the safety lever is moved fully forward to the 'FIRE' position the firing pin re-engages with the trigger mechanism and is ready to fire.

CAUTION: When operating the safety lever, it MUST be positively located in one of the two marked positions ("Fire" or "Safe"). Operating the trigger or bolt with the safety lever in any other orientation may result in a dangerous malfunction.

1.4 SAFETY PRECAUTIONS

WARNING - Users and personnel responsible for the weapon must comply with the following safety precautions. For the purposes of health and safety, all warnings and cautions must be followed.

Safety precautions should be carried out:

- On initial receipt of the weapon.
- Before use.
- After use.
- Before maintenance or cleaning procedures.
- Before any inspection procedure.
- Before any non tactical movements.
- Prior to the weapon being placed in a transit case or drag bag.
- When the documentation recommends it.

SAFETY PRECAUTIONS

- Move the safety lever fully rearward into the 'Safe' position.
- Hold the weapon securely, do not place your finger inside the trigger guard.
- Point the weapon in a safe direction.
- Remove the magazine (if fitted).
- Orientate the ejection port downwards, open the bolt and slide to rear.
- Inspect the chamber and bolt face: for a live cartridge or empty case. Visual Check - Look through the ejection port. Physical Check - Use a finger to check the chamber.
- Remove any cartridge or case from the weapon.
- With the bolt left 'open', the rifle is now safe to handle and visibly safe to others.

However, should the bolt be required in the 'closed' position:

- Pull and hold the trigger while closing the bolt.
- Fit an empty magazine, if required.
- The rifle is now safe to handle.

WARNING - DANGER TO LIFE AND LIMB: IF THE BOLT IS NOT FULLY CLOSED WHEN THE RIFLE IS FIRED, THE COCKING PIECE COULD STRIKE THE BOLT CAUSING POSSIBLE MISFIRES.

- The extractor does not engage the cartridge rim unless the bolt is fully closed.
- Failure to fully close the bolt every time it is manipulated may result in a live round being left in the chamber.
- Attempting to load a second round will result in a stoppage. (Double feeding).

1.5 WARNINGS

THE CORRECT FUNCTIONING OF THE TRIGGER, SAFETY MECHANISM, AND THE RIFLE HEADSPACE ARE CRITICAL TO THE SAFE OPERATION OF THE RIFLE AND SHOULD BE REGULARLY CHECKED. SEE SECTIONS 1.6 AND 1.7 FOR DETAILS.

WEAPON STATUS.
When users are not aware of the weapon status, i.e. loaded, unloaded, cocked or fired, the user must assume the weapon is LOADED and carry out the SAFETY PRECAUTIONS set out in section 1.4 on page 4.

HANDING OVER WEAPONS.
A weapon which is to be handed over to another individual must be unloaded and presented with the bolt in the 'open' or rearwards position.

TACTICAL MOVEMENTS.
Tactical movements with a loaded weapon must be performed with the safety lever in the 'safe' position.

WARNING - DANGER TO LIFE AND LIMB: THE TRIGGER UNITS FITTED INTO ACCURACY INTERNATIONAL RIFLES ARE DESIGNED AND FACTORY SET AS TWO-STAGE TRIGGERS. THEY MUST NOT BE MODIFIED UNDER ANY CIRCUMSTANCES INTO A SINGLE STAGE TRIGGER.

FAILURE TO COMPLY WITH THIS WARNING COULD RESULT IN SERIOUS INJURY OR DEATH.

1.6 FIELD SAFETY CHECK

The following procedure should be carried out before each time the rifle is used to ensure the safety lever is functioning correctly. This does not replace the need to have the safety mechanism routinely tested in accordance with the Accuracy International Maintenance Manual.

- Ensure the weapon is unloaded and safe to handle.
- With the bolt assembly fitted into the action body, open then close the bolt, leaving it in the cocked position.
- Move the safety lever fully rearwards into the 'SAFE' position. See Fig 1-3 on page 3.
- Pull and release the trigger six times, remove your finger from the trigger.
- Push the safety lever fully forward into the 'FIRE' position.
- The firing pin should be retained by the trigger and not be released.
- Pull the trigger to release the firing pin.
- Repeat this process two or three times to confirm that the system is safe.
- If the firing pin is released when the safety lever is moved to the 'FIRE' position, the rifle is deemed unsafe and must be returned to the base armourer for maintenance in accordance with the Accuracy International maintenance manual.

CAUTION: WHEN OPERATING THE SAFETY LEVER, IT MUST BE POSITIVELY LOCATED IN ONE OF THE TWO MARKED POSITIONS ('FIRE' OR 'SAFE'). OPERATING THE TRIGGER OR BOLT WITH THE SAFETY LEVER IN ANY OTHER ORIENTATION MAY RESULT IN A DANGEROUS MALFUNCTION.

1.7 CARTRIDGE HEADSPACE

Cartridge headspace defines the distance between the bolt face and the rear face of the cartridge; it is measured using a gauge between the bolt face and the cartridge datum reference within the chamber when the bolt is closed. It is a critical safety feature on all rifles, regardless of manufacturer.

For the user's safety and to maximize cartridge compatibility, the headspace measurement on every AXSR rifle is inspected before leaving the factory.

However, during the working life of the rifle, wear to crucial components and new barrel fitting may increase the cartridge headspace. If this becomes excessive, it can lead to possible damage to the rifle due to a ruptured case.

The following list is an indication of when the headspace should be checked:

- Misfires (light strikes) especially after a barrel or calibre change.
- Failure to eject a fired case.
- Failure to eject a live round.
- Loss of accuracy.
- Split case necks or bulged cases.
- Primers protruding from fired case heads.
- It is recommended that headspace is checked every 2000 rounds by an armourer throughout the life of the barrel and/or whenever the rifle is returned to the base armoury for service or repair.

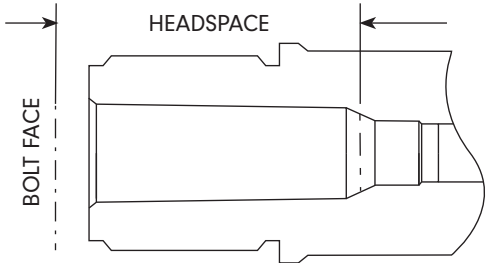


Fig 1-5

EXCESSIVE HEADSPACE CAN BE HAZARDOUS AND MAY LEAD TO MISFIRES AND CARTRIDGE CASE RUPTURES

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2 SETTING UP THE RIFLE

Before handling the rifle or attempting any procedure described in this manual, the user must ensure their own safety and that of others by following the safety precautions as described on page 4.

The AXSR rifle has been designed to be user configurable and adjustable for:

- Calibre conversion.
- Cheek-piece.
- Length of pull.
- Butt pad height and angle.
- Butt spacers.
- Rear grip position.
- Accessory rails.
- Sling loops.
- Trigger blade position.
- Throw lever positioning.

2.1 TOOLS AND TORQUE SETTINGS

The table below lists the typical tools and torque settings required for user maintenance of the AXSR rifle.
Where possible a suitable torque driver or torque limiter should be used (see Fig 2-1).

Tool Description	Purpose	Recommended Torque
4.0 mm Hex wrench/bit	Butt pad and spacer retaining screws	6.0 Nm
3.0 mm Hex wrench/bit	Action rail screws	3.0 Nm
4.0 mm Hex wrench/bit	Action screws	4.0 Nm
2.5 mm Hex drive wrench/bit	Trigger blade clamp	0.8 Nm
3.0 mm L-type hex drive wrench/bit	M-Lok® rail screws	3.0 Nm
4.0 mm L-type hex drive wrench/bit	KeySlot™ rail screws	4.0 Nm
4.0 mm Hex wrench/bit	Forend retaining screws	5.0 Nm
4.0 mm Extended Ball-end hex drive wrench/bit	Rear action screw	4.0 Nm
2.5 mm Hex wrench	Cheek-piece and throw lever retaining screw	
4.0 mm Hex drive wrench/bit	Barrel clamping screw	5.5 Nm

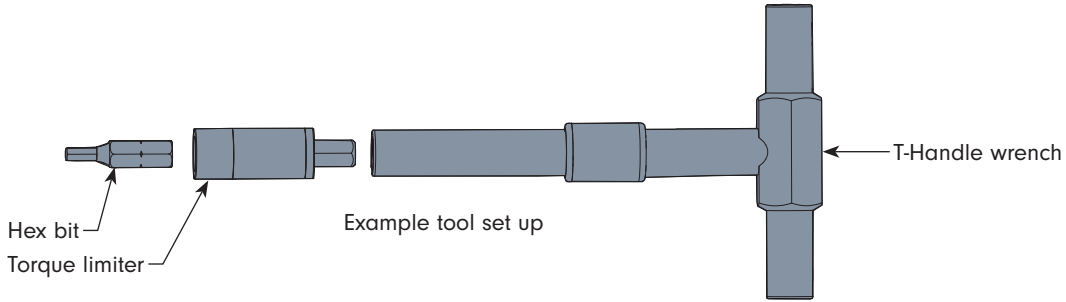


Fig 2-1

2.2 HEX WRENCH STORAGE

A number of adjustments on the rifle are carried out using a hex wrench. For the convenience of the user, a 3 mm hex wrench is stored within the cheek-piece of the rifle.

To remove the hex wrench:

- Use a finger to pull the hex wrench out of the cheek-piece.

To replace the hex wrench:

- Offer the hex wrench up to the slot and push into the recess until the detent engages.

Using the hex wrench:

- Avoid over-tightening the screws as this may damage the rifle or accessories. It is often possible to achieve an acceptable level of torque using the long end of the wrench in the screw and using the short end as the lever.

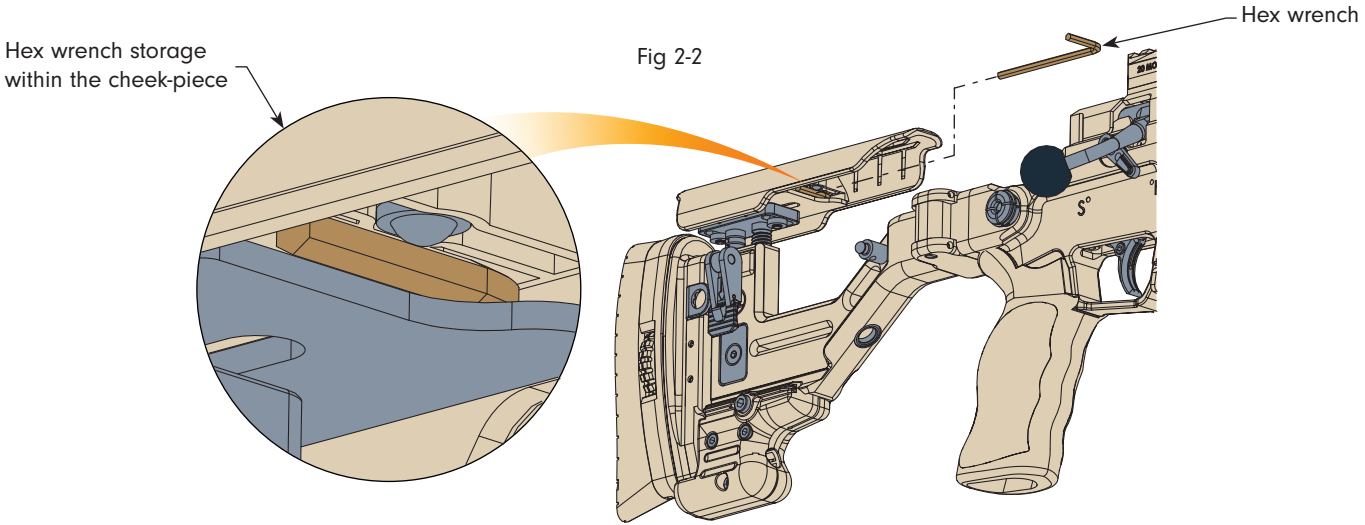


Fig 2-2

2.3 CALIBRE CONVERSION

The AXSR rifle has been designed to allow the user to easily change the calibre of the weapon. The bolt, magazine and barrel must be replaced according to the table below.

Barrels and magazines are identified by alpha-numeric engraving (see Fig 2-6 and Fig 2-7).

Bolts are identified by tactile markers to aid identification. The bolt assembly is marked by round coloured indents on the bolt head (see Fig 2-3, Fig 2-4 and Fig 2-5).

Magnum bolt

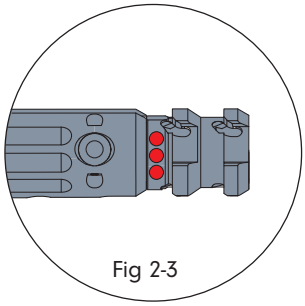


Fig 2-3

.300 Win Mag Bolt

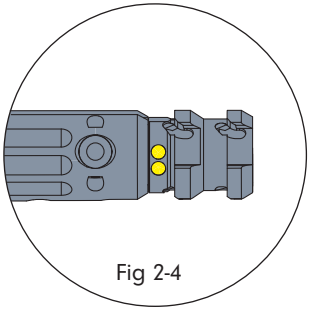


Fig 2-4

7.62 Nato/.308 Win Bolt

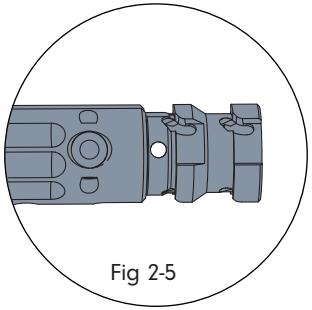


Fig 2-5

Barrel ID

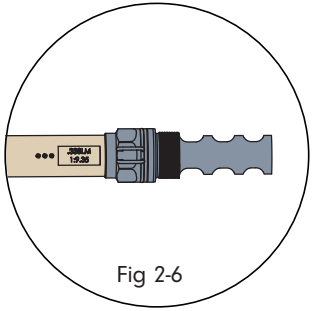


Fig 2-6

Magazine ID

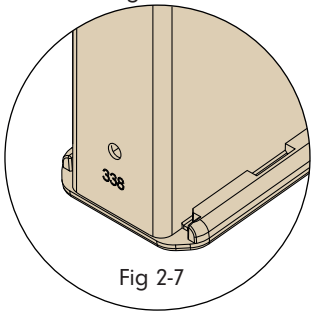


Fig 2-7

Calibre	Bolt Head	Magazine
.338 Lapua Magnum	Magnum (Red) ●●●	338
.300/338 Norma Magnum	Magnum (Red) ●●●	.300/.338 Norma
.300 Winchester Magnum	.300 Win (Yellow) ●●	.300 Win Mag
7.62 Nato/.308 Winchester 6.5 Creedmoor	7.62 Nato/.308 Win (White) ○	7.62 Nato/.308

2.4 CHANGING THE BARREL

Preparation:

The rifle and magazine (if fitted) must be unloaded and safe to use with the chassis unfolded. The procedure may be completed without removing the scope, however, it is strongly recommended that scope covers are used to protect the lenses.

Removal:

- Use a 4 mm hex wrench to loosen the barrel clamping screw on the action.

WARNING - DO NOT REMOVE THE CLAMPING SCREW AND DO NOT TIGHTEN THE CLAMPING SCREW WITH THE BARREL REMOVED.

- Unscrew the barrel from the action body. If it is too tight to unscrew by hand, use a spanner (7/8" or 22 mm) across the flats located towards the muzzle end of the barrel to assist removal.
- Install a thread protector to protect the barrel thread from oil, debris and damage after removal (see below).

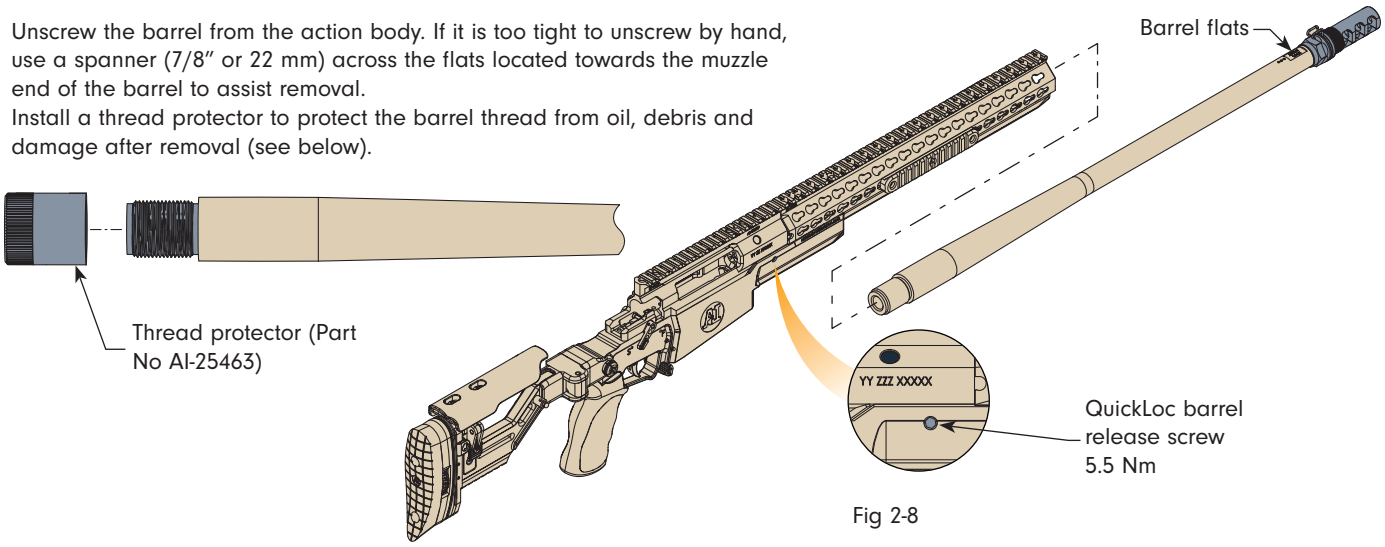


Fig 2-8

2.4 CHANGING THE BARREL (2)

Refitting:

- Ensure the barrel, action body and their respective threads are not damaged, obstructed or fouled and are free from oil.
- Ensure the mating surfaces of the barrel and action are clean and free from damage.
- Carefully locate the barrel into the action. Screw the barrel into the action body, taking care not to damage the threads.
- Firmly tighten the barrel by hand only.
- Ensure that the flange on the barrel is touching the front of the action body and that no gap remains. This can be viewed through the inspection slot (see Fig 2-9).
- Use a 4 mm hex bit and tighten the barrel clamping screw to 5.5 Nm.
- Test the barrel clamp by attempting to loosen the barrel by hand, do not use a spanner. The barrel should not rotate.
- Insert the correct bolt (see section 2.3 on page 12).
- Insert the correct magazine (see section 2.3 on page 12).

WARNING - IF, AFTER TIGHTENING THE CLAMPING SCREW THE BARREL ROTATES, RE-TIGHTEN THE BARREL AND BARREL CLAMPING SCREW AS DESCRIBED ABOVE. IF THIS DOES NOT PROPERLY SECURE THE BARREL, THE RIFLE SHOULD BE INSPECTED BY A QUALIFIED ARMOURER.

ENSURE THE LOCK RING IS IN PLACE AND IS SECURE BY VIEWING THROUGH THE EJECTION PORT.

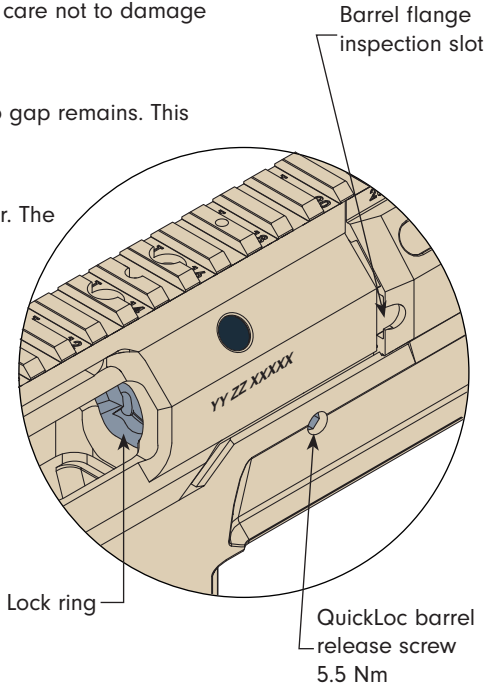


Fig 2-9

2.5 RRS™ DOVETAIL INTERFACES

The AXSR rifle incorporates two RRS™ compatible 1.5" wide dovetail interfaces. One extends the full length along the underside of the forend tube; the second shorter interface is located forward of the magazine opening. These interfaces provide an easy to use, and durable mounting system for a range of bipods, tripods and other shooting platforms.

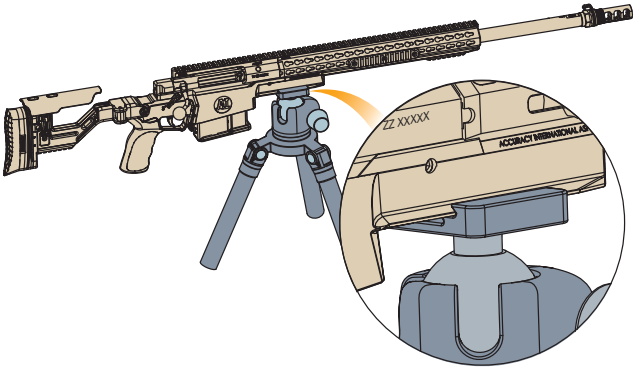


Fig 2-10

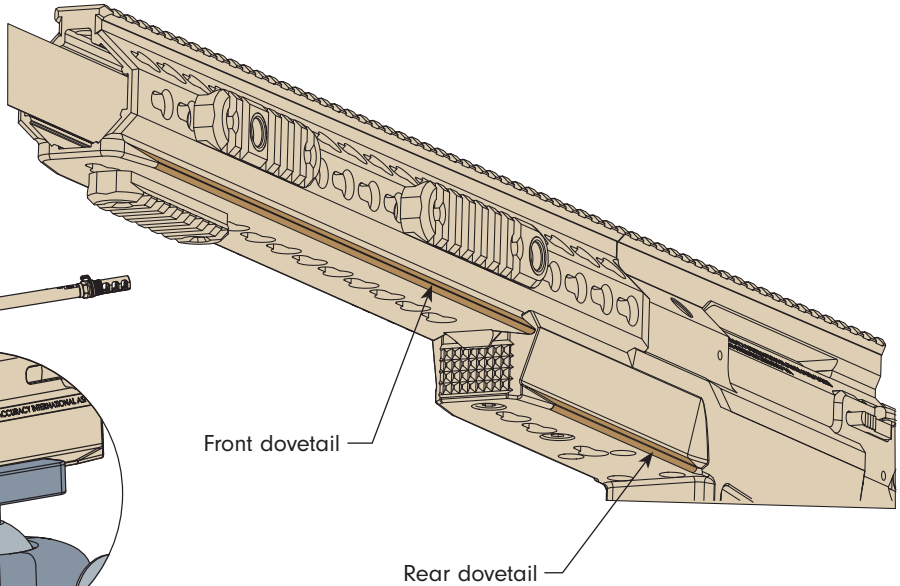


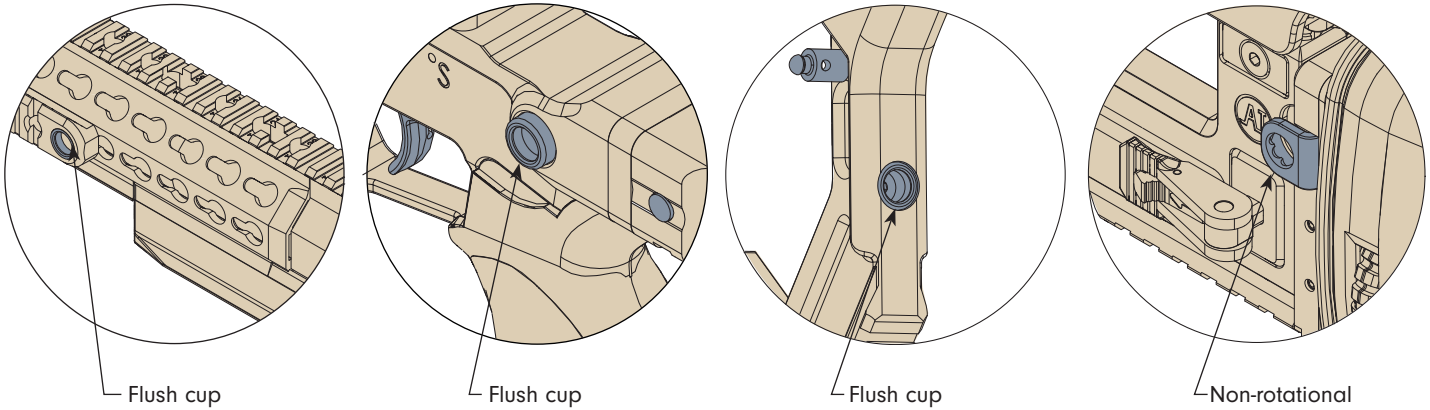
Fig 2-11

2.6 SLING POINTS

Sling point type and location:

- Two flush cup sling points are located in the forend accessory rails, one on the 80 mm rail and one on the 96 mm rail. The rails can be re-positioned on the forend as required.
- One flush cup point is located above the pistol grip on the left side of the rifle.
- One flush cup point is located underneath the angled section of the rear frame.
- Two non-rotational points are located on either side of the butt assembly.

Fig 2-12



2.7 CHEEK-PIECE ADJUSTMENTS

Adjusting the cheek-piece height:

- Slide the throw lever lock away from the pivot to release the lock. If the lock does not move, apply light pressure inward to the throw lever and attempt to slide the lock again.
- With the throw lever lock disengaged, rotate the throw lever through a minimum of 150 degrees to release the clamp. If the cheek-piece cannot be adjusted, apply pressure inward on the throw lever to disengage the clamp.
  Note: The assembly is spring-loaded and will extend to its maximum height unless restricted.
- Place your cheek lightly on the cheek-piece and adjust the height until the desired alignment with the optic is achieved.
- Rotate the throw lever to the fully engaged position or until the lever lock engages the pivot.

Adjusting the cheek-piece position:

The cheek-piece position can be adjusted side-to-side as well as forwards and backwards to help achieve a comfortable shooting position

- Using the supplied 3 mm hex wrench (see 2.2 on page 11), loosen the two retention screws that are exposed on the top surface of the cheek-piece (see Fig 2-13).
- Adjust the cheek-piece to the desired position and lightly tighten the button head cap screws.
- Check the operation of the bolt and the butt plate assembly to ensure that the cheek-piece does not impede operation. Re-adjust if necessary.
- Tighten the two cheek-piece retention screws.

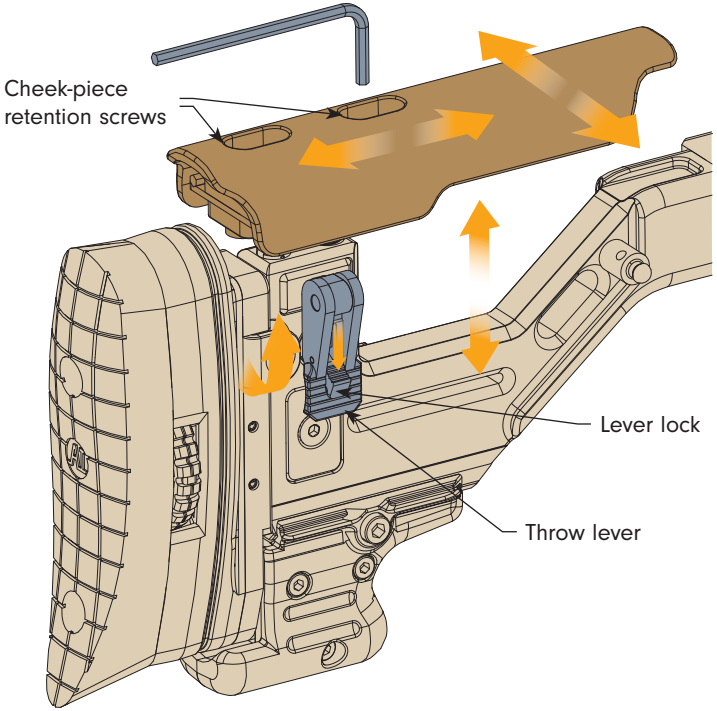


Fig 2-13

2.8 REAR GRIP

The AXSR rifle is supplied with an optional rail-mounted rear grip. This can be fitted to the accessory rail located on the underside of the rear chassis, or directly to the butt assembly. The rear grip can be removed entirely if it is not required or if a suitable spike or monopod is to be fitted.
Note: The same fixing screw is used to attach the rear grip to the rail or the butt.

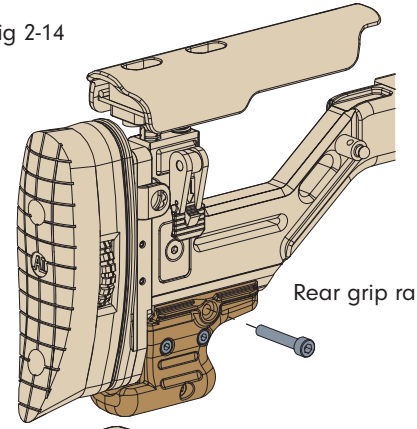
Rear grip-rail fitting

- Use a 4 mm hex wrench to loosen and remove the rear grip screw.
- Slide the rear grip along the rail until the desired position is reached.
- Ensure that the screw hole is in line with a rail slot and refit the rear grip screw.
- Tighten the screw to secure the grip.

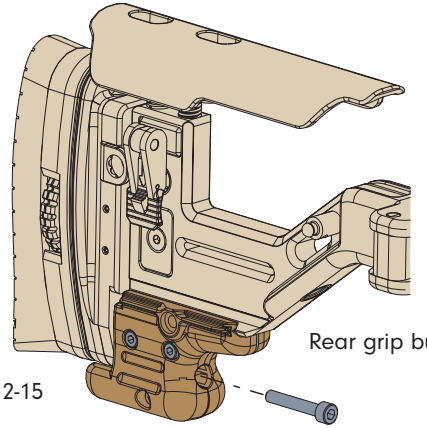
Rear grip-butt fitting

- Use a 4 mm hex wrench to loosen and remove the rear grip screw.
- Slide the rear grip rearwards until it contacts the butt assembly.
- Refit the screw through the front of the grip and engage with the threaded hole in the butt assembly.
- Tighten the screw to secure the grip.

Fig 2-14



Rear grip rail fitting



Rear grip butt fitting

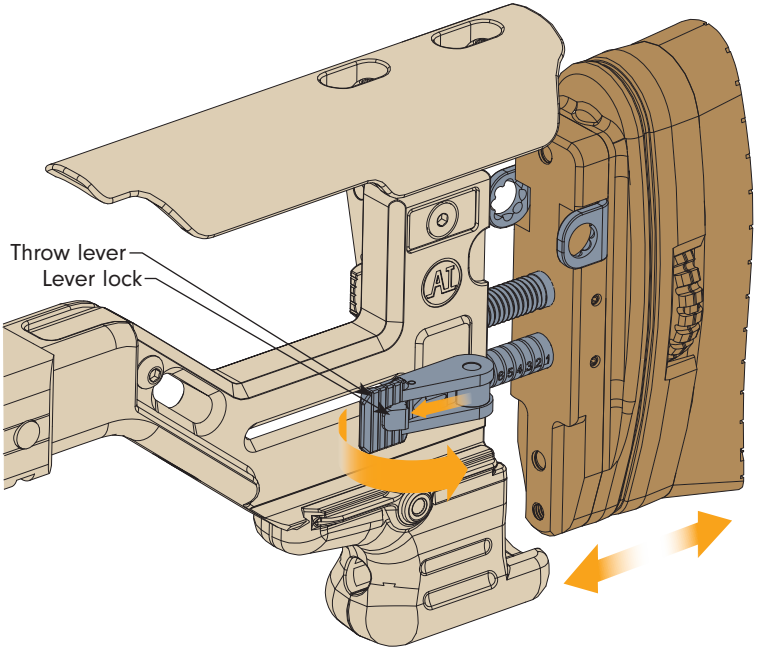
Fig 2-15

2.9 LENGTH OF PULL ADJUSTMENT

To adjust the length of pull:

- Slide the throw lever lock away from the pivot to release the lock. If the lock does not move, apply light pressure inward to the throw lever and attempt to slide the lock again.
- With throw lever lock disengaged, rotate the throw lever through a minimum of 150 degrees to release the clamp. If the buttstock cannot be adjusted, apply pressure inward on the throw lever to disengage the clamp.
- Slide the buttstock assembly to the desired position.
- Rotate the throw lever to the fully engaged position or until the lever lock engages the pivot.

Fig 2-16



2.10 BUTT PAD ADJUSTMENTS

To adjust the butt pad height and angle:

- Loosen the butt pad adjustment thumbwheel.
- The butt pad can be raised, lowered or rotated.
- Once the desired position has been achieved, re-tighten the adjustment thumbwheel.

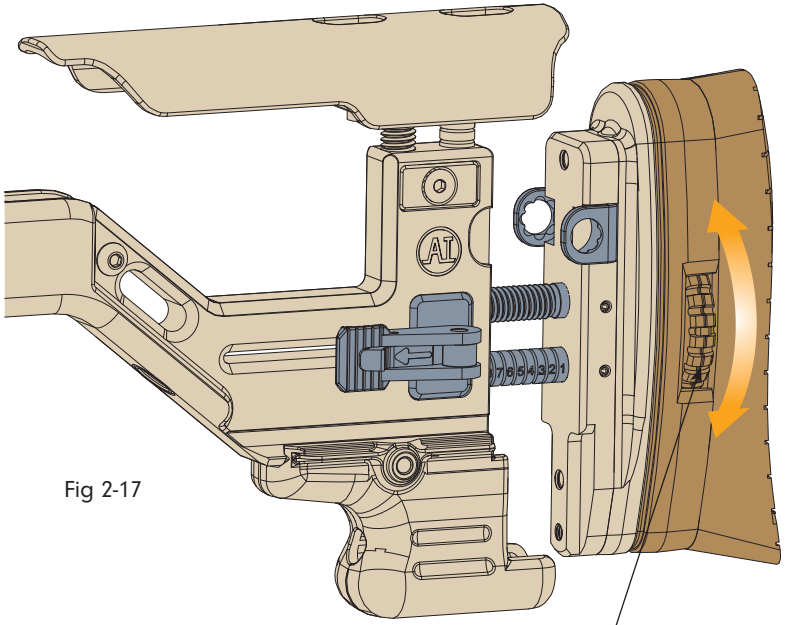


Fig 2-17

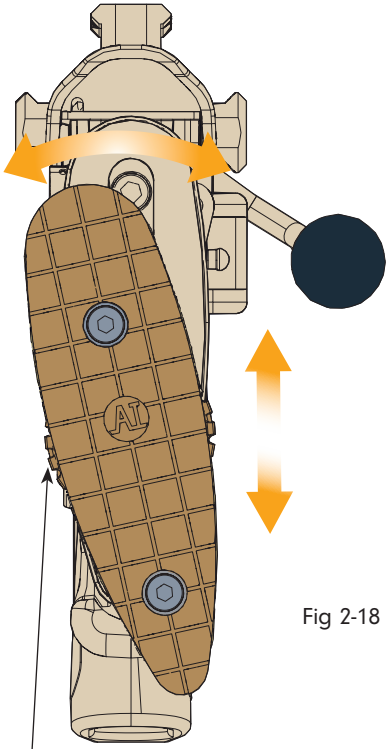


Fig 2-18

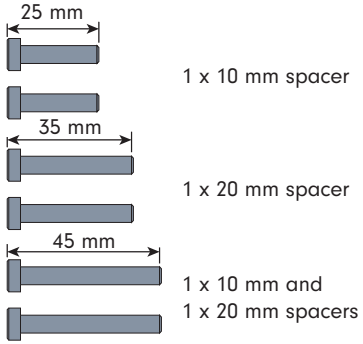
2.11 BUTT SPACERS

The AXSR length of pull can be extended further by fitting butt spacers. One 10 mm and one 20 mm spacer can be fitted along with the appropriate length screws to suit the desired combination.

Fitting the spacers:

- Using a 4 mm hex wrench, loosen and remove the two butt pad screws.
- Select the correct length screws to suit the number of spacers being used (see the guide below).
- Fit the butt and spacers as shown in Fig 2-20.
- Tighten the two butt screws to 3.5 Nm.

Fig 2-19



Screw Selection Guide

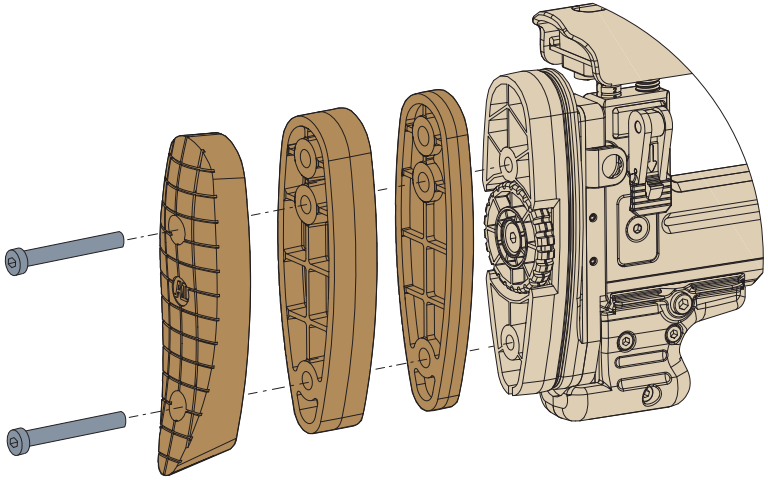


Fig 2-20

2.12 TRIGGER REACH ADJUSTMENT

To adjust the trigger blade position:

- Loosen the trigger blade clamping screw using a 2.5 mm hex wrench.
- Slide the trigger blade to the desired position.
- Tighten the screw.
- Note: the trigger blade design provides approximately 10.5 mm of adjustment. The trigger blade clamp must remain in full contact with the trigger shoe (see Fig 2-22).

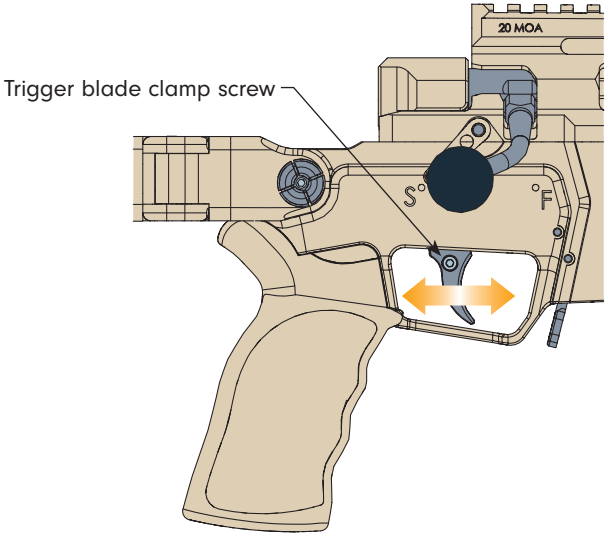
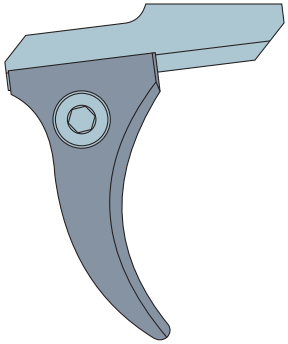
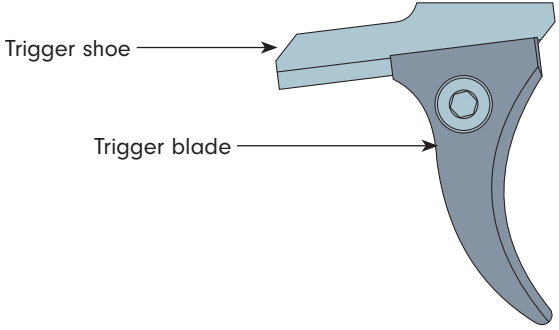


Fig 2-21

Fig 2-22



Maximum trigger blade rearward position



Maximum trigger blade forward position

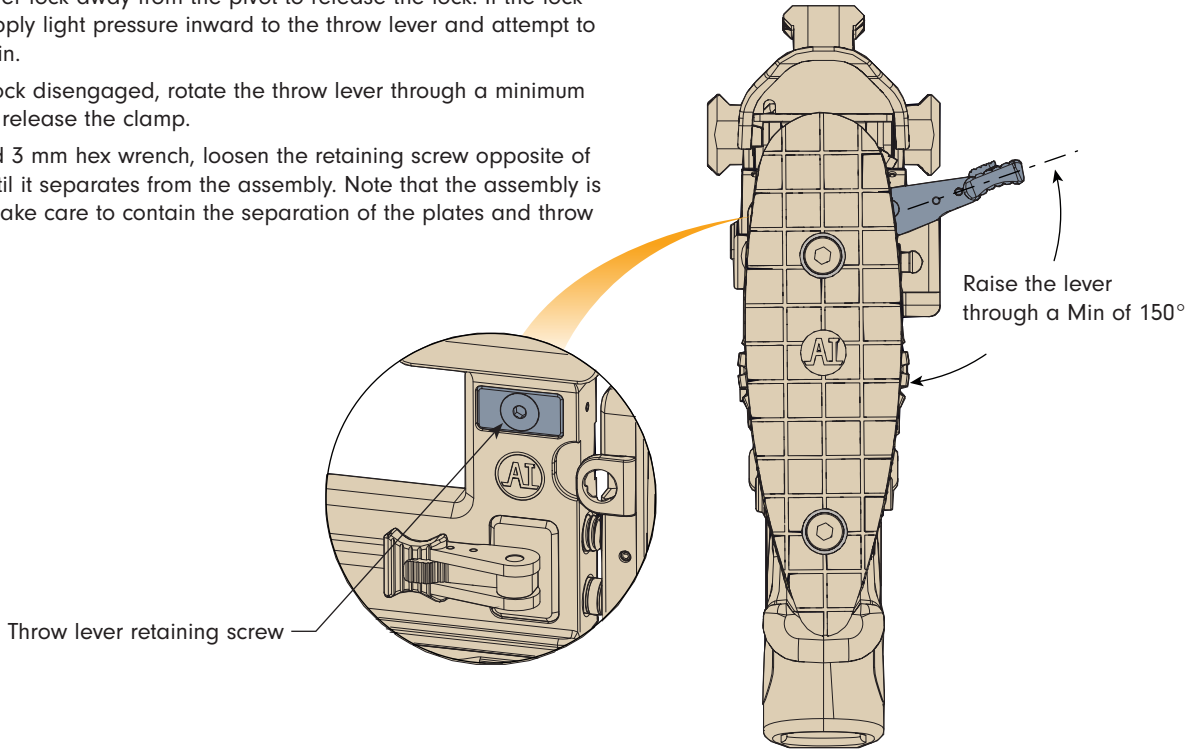
2.13 THROW LEVER REPOSITIONING

The throw lever assemblies can be switched to the right or left side of the buttstock assembly based upon user preference.

Throw lever removal:

- Slide the throw lever lock away from the pivot to release the lock. If the lock does not move, apply light pressure inward to the throw lever and attempt to slide the lock again.
- With throw lever lock disengaged, rotate the throw lever through a minimum of 150 degrees to release the clamp.
- Using the supplied 3 mm hex wrench, loosen the retaining screw opposite of the throw lever until it separates from the assembly. Note that the assembly is spring-loaded so take care to contain the separation of the plates and throw lever.

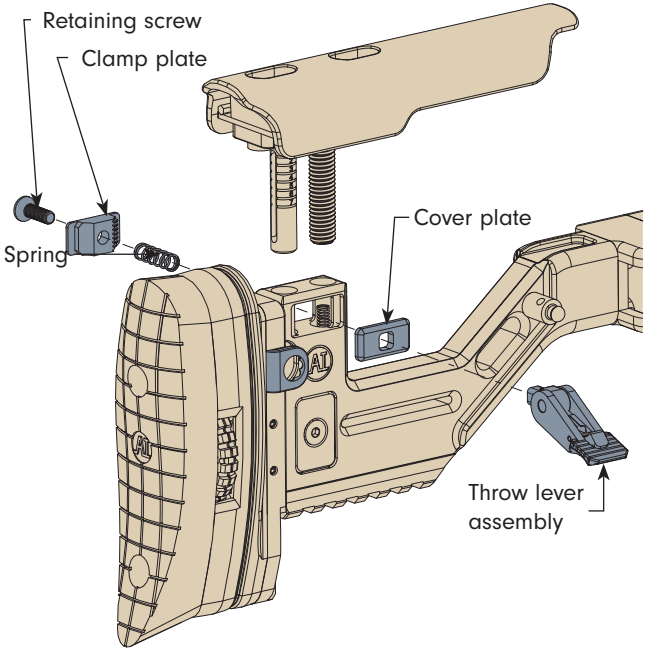
Fig 2-23



2.13 THROW LEVER REPOSITIONING (2)

Throw lever refitting:

- Position the clamp plate (cheek-piece or LOP depending upon the desired lever) to the required side of the buttstock assembly. Ensure that it is positioned such that the threaded portion engages the threaded portion of the adjustment rods.
- Place the retaining screw through the clamp plate.
  Note: A medium grade thread locker, such as Loctite 243, can be applied to the flat head cap screw to minimize adjustment loss.
- Position the spring on the shaft of the retaining screw.
- With the bevelled surface facing outwards from the buttstock, position the cover plate on the opposite side of the buttstock assembly to the clamp plate.
- Push inward on the throw lever assembly and clamp plate and retaining screw on the opposite side of the buttstock, draw the assemblies together into a clamped position.
- With assembly held in place, use the supplied 3 mm hex wrench to start the flat head cap screw into the throw lever pivot, securing the assembly together.
- To set clamping strength, toggle the throw lever to the fully engaged position.
- Use the supplied 3 mm hex wrench to lightly tighten the retaining screw. Check the desired assembly for any play. If play exists, further tighten the screw.
- Check the throw lever operation to ensure proper performance without over-stressing the assembly. Make any final adjustments to the retaining screw to achieve the desire clamping feel.



Note - Cheek-piece removed for clarity

Fig 2-24

2.14 ACCESSORY RAILS (M-LOK)

Accessory rails can be fitted into any available M-LOK® mounting slot on the forend. This mounting system is multi-directional, allowing asymmetric rails to be mounted with either end facing forwards.
Note: The slots immediately forward of the action body may not be available depending on the barrel profile used.

Removing an accessory rail:

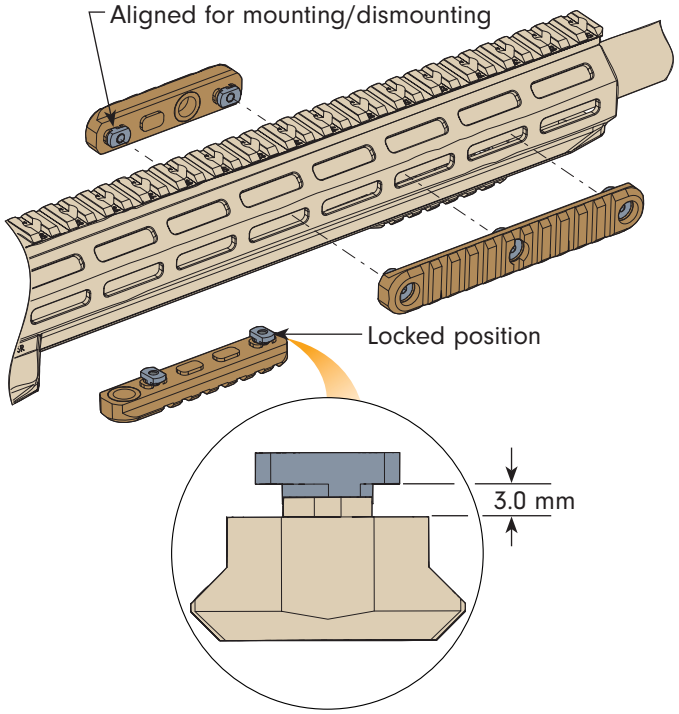
- Using the 3 mm hex wrench (stored under the cheek piece,) loosen each of the retaining screws until they turn freely.
- Rotate each of the screws until the T-Nut is aligned with the M-LOK® slot.
- Lift the rail clear of the forend.

Refitting the accessory rails:

- Align each of the rail T-Nuts with the slot and insert in the desired location.
- Using the 3 mm hex wrench (stored under the cheek piece,) tighten each screw by ¼ to ½ turn to engage each T-Nut with the slot.
- Where possible, use a torque wrench with a 3 mm hex drive to tighten each screw to 3.0 Nm.

Note: The screws and T-Nuts in each of the supplied M-LOK® rails are pre-set at the factory for ease of fitting. However, if the T-nut fails to engage with the slot, remove the rail and check the gap between the T-Nut and the underside of the rail. This should be slightly greater than the thickness of the forend mounting surface. This can be adjusted by holding the T-nut securely and rotating the screw in either direction to obtain the correct adjustment.

Fig 2-25



2.14 ACCESSORY RAILS (KeySlot)

Accessory rails can be fitted into any available KeySlot™ on the forend tube.

Removing an accessory rail:

- Apply thumb pressure as shown on the right.
- Using the 4 mm hex key, loosen the retaining screws and continue to undo until light resistance is felt, then stop, do not continue to undo.
- Slide the rail to the rear of the KeySlot™ aperture (open end).
- Lift the rail clear of the forend tube.

Refitting the accessory rails:

- Adjust the screw positions in the rail to extend 5 mm as shown on the right.
- Position the screw heads over the open end of the desired KeySlot™ apertures.
- Insert the screw heads through the open ends of the KeySlot™ apertures and slide the rail forward until it comes to a stop.
- Pull the rail upwards and tighten the retaining screws, drawing the rail to the surface of the forend tube.
- If a torque wrench is available, tighten to 4.0 Nm.

Fig 2-26

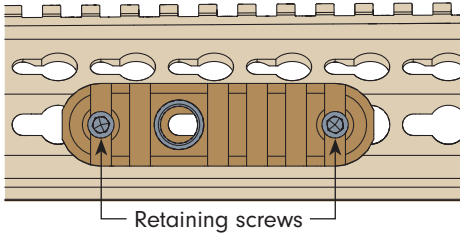


Fig 2-27

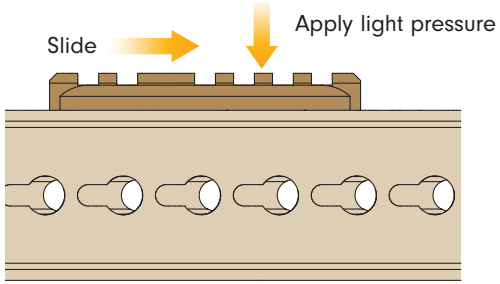
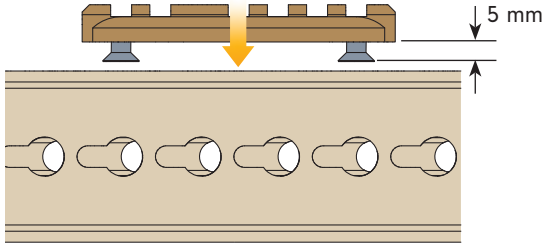


Fig 2-28



2.15 SUPPRESSOR

To fit the suppressor to the rifle:

- Unload the rifle and follow the safety precautions (see section 1.4 on page 4).
- Inspect the inside of the suppressor to ensure it is clear before firing. If the suppressor has been immersed in water or other fluid, always fully drain the suppressor before firing.
- Check that the muzzle brake threads are clean and free from damage.
- Place the suppressor onto the muzzle brake and turn in an anti-clockwise direction (LH thread) to engage the threads (see Fig 2-29). Tighten by hand only.
- Ensure that the suppressor has locked up onto the muzzle brake and is securely fitted.

WARNING: IF REMOVING THE SUPPRESSOR STRAIGHT AFTER USE, ENSURE PRECAUTIONS ARE TAKEN TO PREVENT BURN INJURY.

WARNING: When removing a stuck or tight suppressor always ensure the barrel remains correctly fitted after removal, check there is no gap between the barrel face and the action and the barrel is still correctly aligned (see Section 2.4 on page 13).

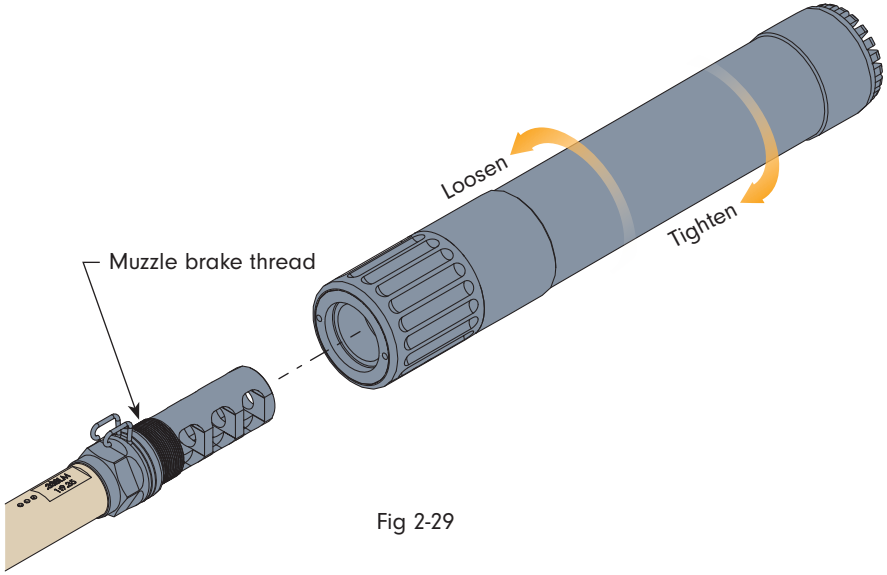


Fig 2-29

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3 FIELD STRIPPING THE RIFLE

- Folding the stock.
- Field stripping.
- Stripping the bolt assembly.
- Stripping the magazines.
- Removing the forend.

3.1 FOLDING THE STOCK

The AXSR rifle is fitted with a folding stock. The stock folds to the same side as the bolt. Once the stock is folded, it is not possible to open the bolt, as is it protected by the rear frame.

To fold the stock:

- Ensure that the rifle is safe to handle.
- Ensure that the bolt is fully closed.
- Press the hinge release catch and fold the rear frame.
- When fully folded, push the rear frame firmly against the pistol grip, ensuring that the male catch has engaged with the female retaining catch.

To unfold the stock:

- Pull the rear frame away from the chassis and rotate it to a positive stop, ensure that the hinge release catch has fully engaged.

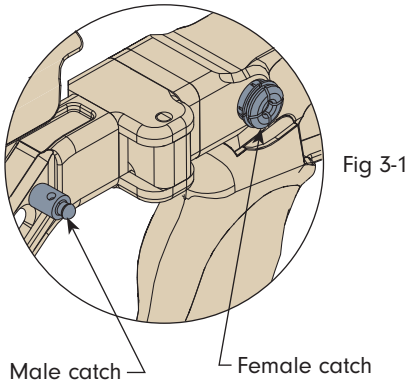


Fig 3-1

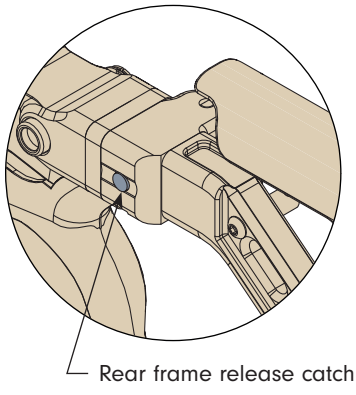
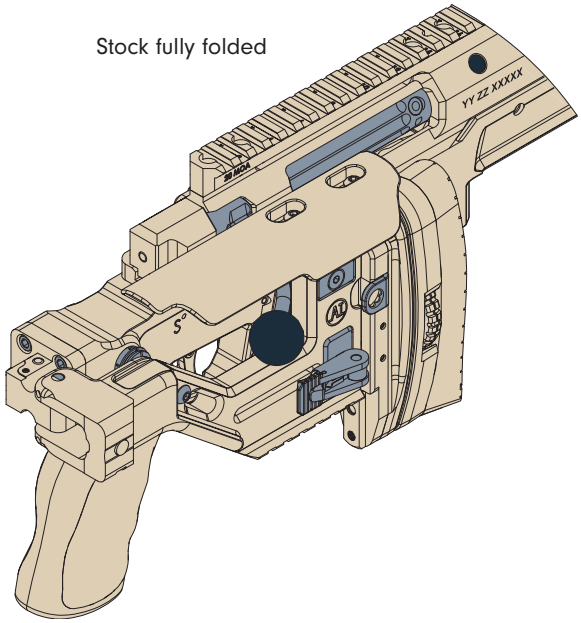


Fig 3-2

Stock fully folded



3.2 FIELD STRIPPING

Before stripping the rifle carry out the safety precautions, as described in section 1.4

To field strip the rifle:

- Depress the magazine catch and remove the magazine (if fitted).
- Cover the lenses of the telescopic sight.
- Remove the sling (if fitted).
- Partly fold the rear frame, as shown in Fig 3-3.
- Open the bolt.
- Press and hold the bolt release catch, rotate the bolt handle to the position shown and slide the bolt rearwards to remove.
- Remove the bipod if required.

To reassemble after stripping:

- Partly fold the rear frame as shown in Fig 3-3.
- Press and hold the bolt release catch and insert the bolt into the action body.
- Rotate the bolt handle to the position shown and push forward, align the bolt handle with the action body and release the bolt release catch.
- Cycle the bolt fully several times to ensure correct fitting and operation.
- Unfold the rear fame fully until it locks.
- Refit the sling.
- Refit an empty magazine.

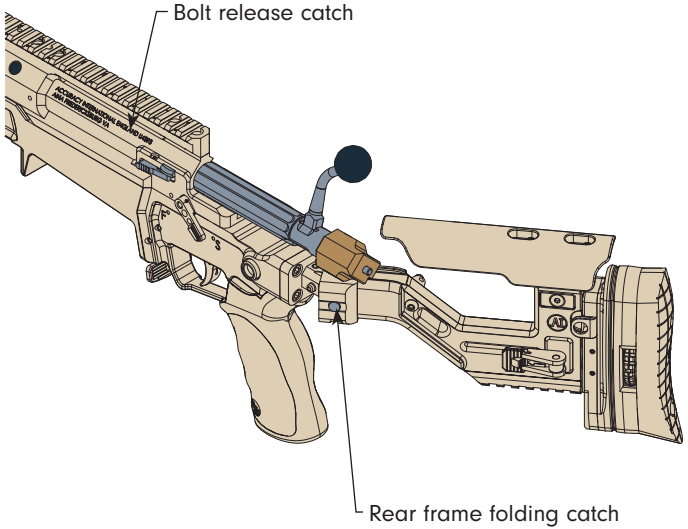


Fig 3-3

3.3 STRIPPING THE BOLT ASSEMBLY

To strip the bolt assembly:

- To remove the firing pin/shroud assembly from the bolt, grasp the bolt firmly in the right hand and the shroud in the left.
- Depress the bolt location pin with the right thumb and turn the shroud as shown in Fig 3-4 until the firing pin/shroud assembly can be withdrawn.
- Remove the firing pin/shroud assembly from the bolt.

To reassemble the bolt assembly

- To reassemble the bolt, insert the firing pin/shroud assembly into the bolt body, aligning the shroud retaining lug with the corresponding opening in the bolt body (see Fig 3-5).
- Holding the shroud assembly in the left hand and the bolt body in the right, push the shroud assembly against the bolt body to compress the firing pin spring.
- When the firing pin spring is compressed, rotate the shroud as shown in Fig 3-6 until the location pin locks into the bolt body just before the fire position.

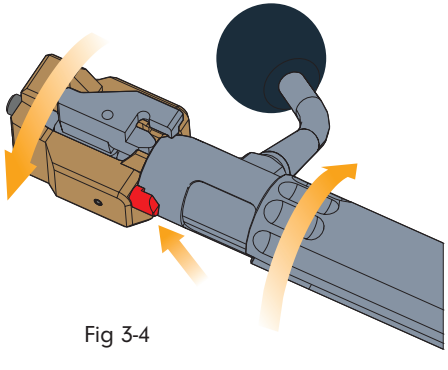


Fig 3-4

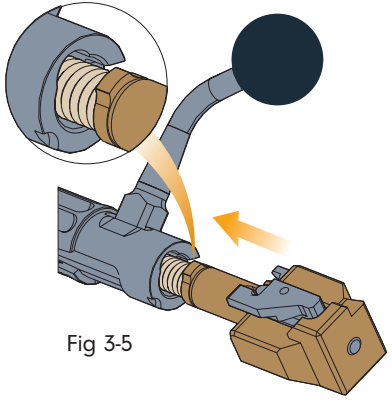


Fig 3-5

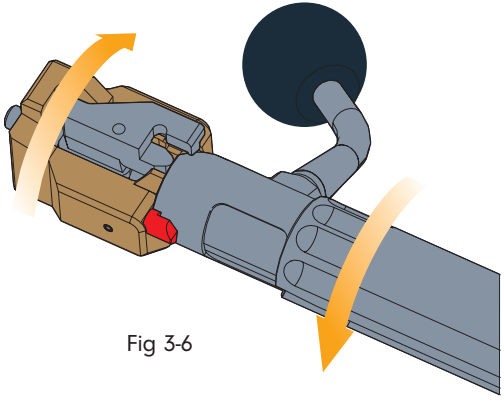


Fig 3-6

3.4 STRIPPING THE MAGAZINES

Stripping the magazines:

- Press and hold down the two retaining buttons and slide off the base, at the same time retain the magazine spring assembly.
- Remove the spring assembly from the body.
- The magazine spring is riveted to the platform, and must not be separated for any maintenance activities.

Re-assembly:

- Refit the magazine spring assembly into the magazine body.
- Hold down the spring assembly and slide on the base.
- Ensure that the base is securely retained and the two retaining buttons are properly located in the base.

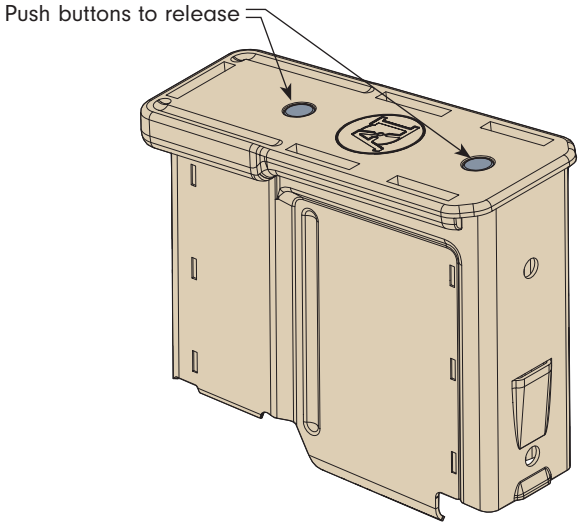


Fig 3-7

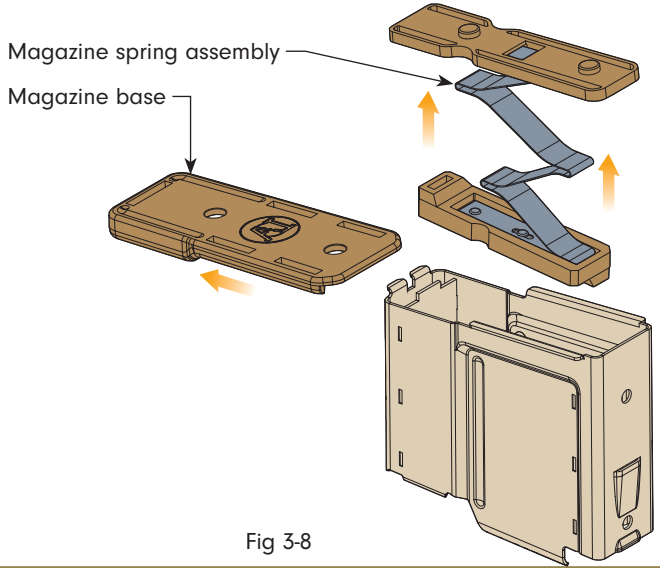


Fig 3-8

3.4 STRIPPING THE MAGAZINES (2)

Stripping the .300/338NM magazine:

- Press down and push forward on the rear of the magazine platform. The front lugs on the platform should clear the body (see Fig 3-9).
- Hold the front of the magazine platform/spring assembly with the other hand and twist the platform clockwise through approximately 45 degrees, as shown in Fig 3-10 below.
- Keeping the magazine platform/spring assembly twisted, pull the platform forward until it clears the magazine lips, and remove from the body.
- The magazine spring is riveted to the platform and must not be separated for any maintenance activities.

Re-assembly:

- Hold the front of the platform and insert the assembly into the magazine body, ensuring that the bottom fold of the spring lays flat on the bottom of the magazine.
- Twist the platform clockwise by approximately 45 degrees and slide the platform rearwards into the magazine body.
- Press the platform fully into the magazine body and release several times to ensure that the platform and spring assembly moves correctly and freely.

Fig 3-9

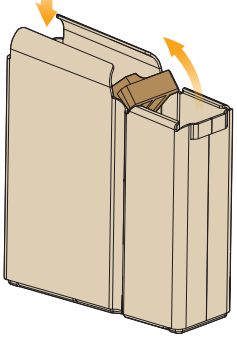


Fig 3-10

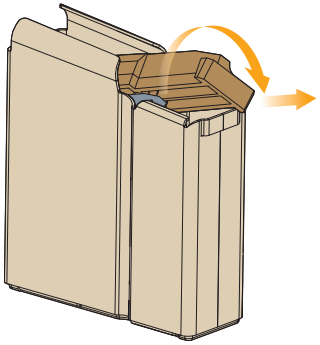
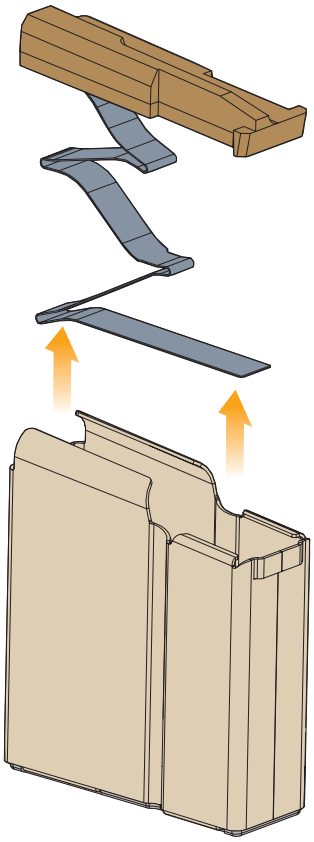


Fig 3-11



3.5 REMOVING THE FOREND

The forend of the AXSR rifle may be removed when required. This may be beneficial when cleaning or transporting the rifle.

Caution - Where possible, remove any bulky or heavy accessories mounted to the forend before carrying out this procedure.

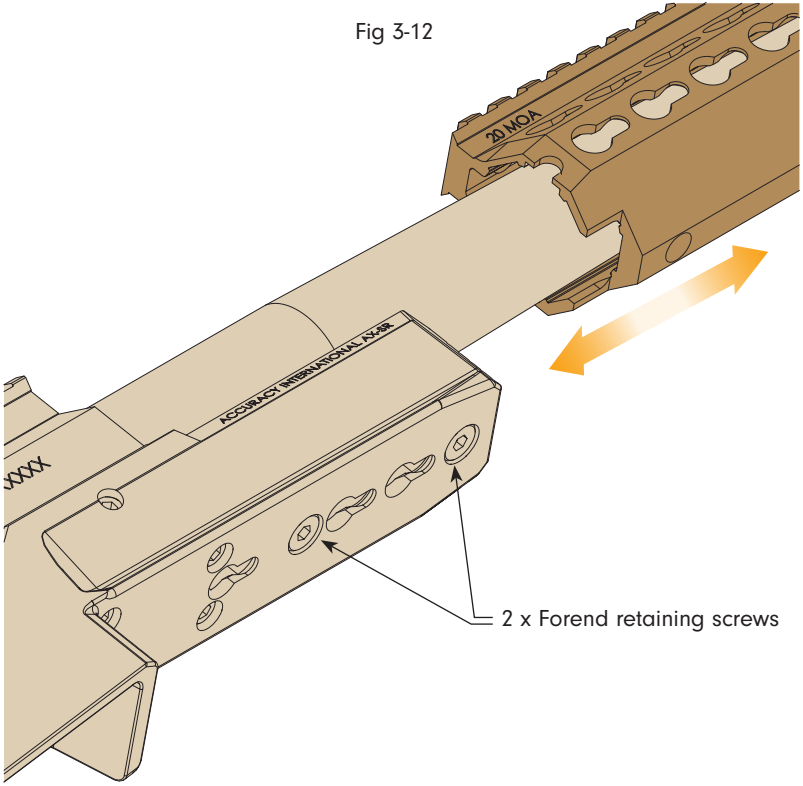
Removing the forend:

- Support the rifle securely.
- Use a 4 mm hex key to loosen the two captive retaining screws.
- It is not necessary to remove the muzzle brake.

Refitting the forend.

- Ensure that the mating surfaces are clean.
- Slide the forend into position, locate and tighten the retaining screws to 5.0 Nm.

Fig 3-12



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4 PREPARING AND FIRING THE RIFLE

- Magazine loading.
- Loading the rifle.
- Firing and operating.
- Unloading.
- Stoppages and troubleshooting.

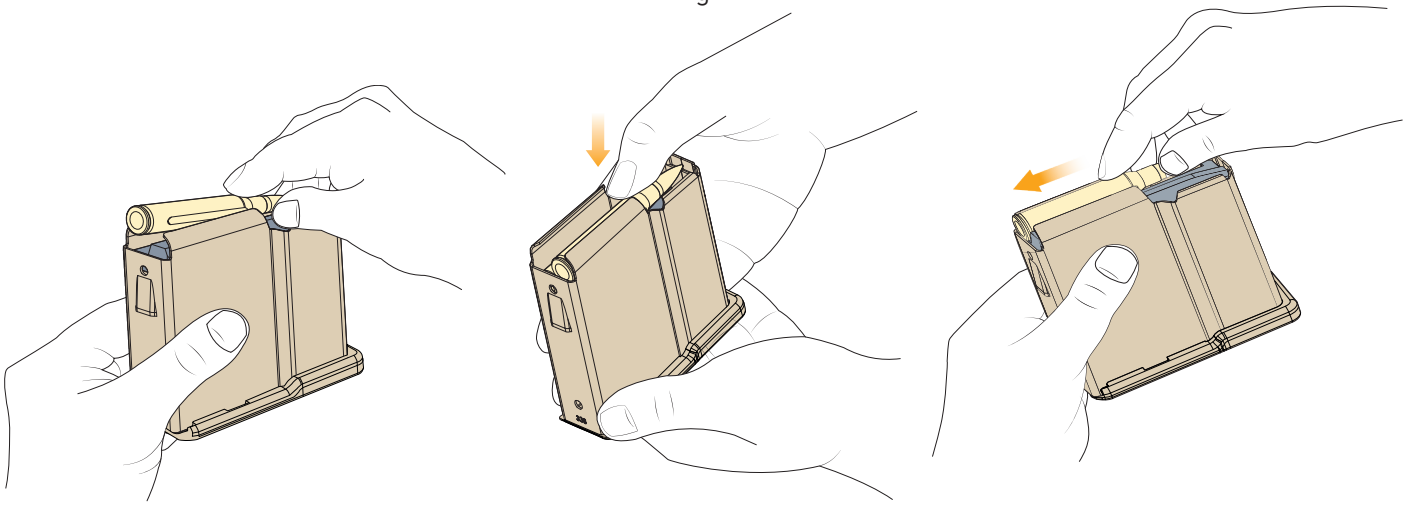
4.1 MAGAZINE LOADING

The AXSR rifle is supplied with a 10 round, double-stack magazine.

To load a magazine:

- Place a round on top of the magazine follower and push down until the round snaps under the feed lip opposite the raised side of the follower.
- Push the round fully rearwards.
- Repeat for the next round, again pushing it fully rearwards.
- Load a total of 10 rounds.

Fig 4-1



4.2 LOADING THE RIFLE

To load the rifle:

- Point the rifle in a safe direction.
- Where possible, open the bolt by raising the bolt lever and pulling the bolt fully rearwards.
- Insert the front of the loaded magazine up to the front angled face of the magazine housing and ensure that the magazine retaining tab has engaged in the corresponding feature within the magazine housing.
- Lift the magazine upwards at the rear until the magazine catch engages on the back of the magazine.
- Pull firmly downwards on the magazine to ensure it is securely retained.
- Unless already open, raise the bolt lever and open the bolt by pulling fully rearwards.
- Feed a round from the magazine into the chamber, by sliding the bolt fully forward and by closing the bolt lever fully.
- The cocking indicator will protrude prominently from the rear of the shroud (see section 1.2 on page 2).

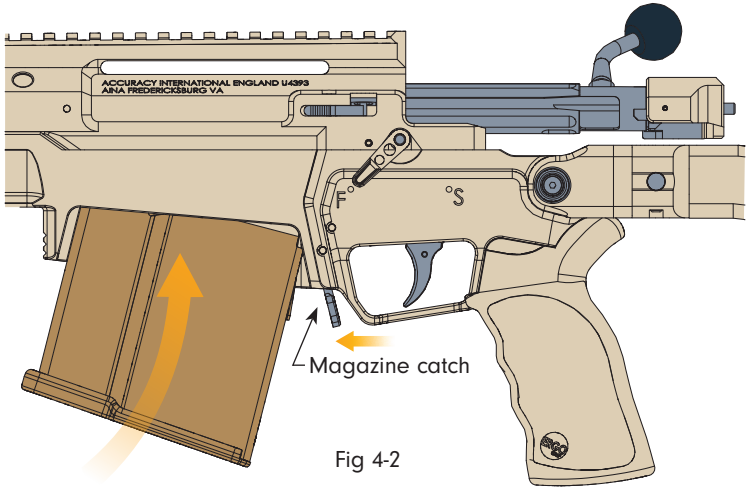


Fig 4-2

WARNING: ALWAYS CLOSE THE BOLT FULLY. FAILURE TO FULLY CLOSE THE BOLT EACH TIME IT IS MANIPULATED COULD RESULT IN A LIVE ROUND BEING LEFT IN THE CHAMBER.

Notes:

- The extractor does not engage on the cartridge rim unless the bolt is fully closed.
- When the magazine is full, the magazine catch is always harder to engage with the bolt closed. The first round can also be more difficult to feed into the chamber than subsequent rounds.

4.3 FIRING AND OPERATING THE RIFLE

Use the following sequence when firing and operating the rifle:

- Get into a comfortable and stable fire position.
- Set the safety lever to the 'FIRE' position.
- Ensure correct aim, take up the first stage and pull the trigger.
- Follow through and observe the target.
- Remain "on aim" during recycling of bolt.
- Open the bolt.
- Pull the bolt FULLY rearwards to allow ejection of the fired case and pickup of the next round.
- Push the bolt firmly forward to feed next round into the chamber. Close the bolt handle fully.
- Repeat the sequence for each round as required.

To reload the rifle:

- Move the safety lever positively rearward into the 'safe' position.
- Press the magazine catch and remove the magazine.
- Install a loaded magazine (See section 4.2 on page 39).
- Pull the bolt FULLY rearwards before re-closing the bolt fully to chamber a new cartridge.
- Move the safety lever to the`fire`position when necessary.
- The rifle is now reloaded and ready to continue firing.

Alternative reloading method

- Move the safety lever positively rearward into the 'safe' position.
- With the bolt open, and an empty magazine in place, load a round directly into the chamber via the ejection port.
- Push the bolt firmly forward and close the bolt handle fully.
- The rifle is now reloaded and ready to continue firing.

4.4 UNLOADING

Note the position of the Firing Pin Cocking Indicator (see section 1.2). If fired, use drill 1, If cocked, use drill 2.

Drill 1: Unloading the rifle after firing (Firing Pin Cocking Indicator shows 'fired').

- Point the weapon in a safe direction.
- Hold the weapon securely; do not place your finger inside the trigger guard.
- Remove the magazine (if fitted).
- Open the bolt and fully slide to the rear, ejecting the fired case.
- Inspect the chamber to ensure it is empty.
  Visual Check - Look through the ejection port.
  Physical Check - Use a finger to check the chamber and bolt face.
- Remove any cartridge or case from the weapon.
- With the bolt left 'open', the rifle is now safe to handle.
- Where possible, the bolt should be left 'open' to identify to others that it is safe. However, should the bolt be required in the 'closed' position:
  Push the safety lever into the 'Fire' position.
  Pull and hold the trigger while closing the bolt.
  Fit an EMPTY magazine if required - the rifle is now safe to handle.

Drill 2: Unloading a live cartridge (firing pin cocking indicator shows 'cocked').

- Point the weapon in a safe direction.
- Hold the weapon securely, do not place your finger inside the trigger guard.
- Set the safety lever to 'SAFE' position (see section 1.3 on page 3).
- Remove the magazine.
- Slowly cycle the bolt to unload the live cartridge from the chamber.
- Carefully remove the live round by hand.
- Inspect the chamber to ensure it is empty:
  Visual Check - Look through the ejection port.
  Physical Check - Use a finger to check the chamber and bolt face.
- Remove any remaining cartridges from the weapon.
- With the bolt left 'open', the rifle is now safe to handle.
- Where possible, the bolt should be left 'open' to identify to others that it is safe. However, should the bolt be required in the 'closed' position:
  Push the safety lever into the 'Fire' position.
  Pull and hold the trigger while closing the bolt.
  Fit an EMPTY magazine, if required.
  The rifle is now safe to handle.

4.5 STOPPAGES

If the rifle, magazines and ammunition are kept clean and maintained correctly, few stoppages should occur. However, if the rifle does fail to fire or operate as expected, the following drills must be carried out.

FAILURE TO FIRE: IF THE RIFLE FAILS TO FIRE, MAINTAIN AIM IN A SAFE DIRECTION FOR AT LEAST 30 SECONDS BEFORE ATTEMPTING TO OPEN THE BOLT. THE CARTRIDGE'S PRIMER MAY BE BURNING SLOWLY AND MAY CAUSE THE WEAPON TO FIRE UNEXPECTEDLY. FAILURE TO FIRE CAN BE CAUSED BY A SLOW BURNING PRIMER, A LIGHT STRIKE FROM THE FIRING PIN OR A ROUND NOT BEING LOADED INTO THE CHAMBER.
IN ANY CIRCUMSTANCES, CARE MUST BE TAKEN WHEN THE BOLT IS OPENED - A FAULTY ROUND MAY STILL FIRE.

A Master Stoppage drill should be carried out to determine the nature of the stoppage.

- Follow the 30 second rule above.
- Open the bolt and slowly pull it to the rear; a live round may be ejected.
- Inspect inside the action body and chamber as the next step will depend on what has been seen inside the action body.

Rounds in the Magazine

If there are rounds in the magazine but no round in the chamber, the magazine could be incorrectly fitted, or the bolt may not have been cycled correctly.

- Check that the magazine is correctly fitted, if necessary, remove and refit.
- Pull the bolt fully rearwards, then push forwards and close.
- Continue firing.

No rounds in the magazine

- Remove the empty magazine.
- Fit a loaded magazine onto the rifle.
- Pull the bolt fully rearwards then push forwards and close.
- Continue firing.

Obstruction in the action body—failure to eject

If there is a live round or empty case present, this must be removed.

- Remove the magazine.
- Carefully remove the obstruction.
- Check the chamber is clear.
- Refit the magazine.
- Pull the bolt fully rearwards then push forwards and close.
- Continue firing.

The operator should check for component damage or obstructions that may impede the ejection of the weapon. If persistent failures to eject are experienced, the rifle should be checked by an Accuracy International qualified armourer.

4.5 STOPPAGES (2)

Obstruction in the chamber–failure to extract:

If a live round or empty case is present in the chamber, this must be removed.

- Remove the magazine.
- Set the safety to the 'safe' position.
- Close the bolt fully.
- Open the bolt to clear the obstruction.
- Check the chamber is clear.
- Refit the magazine.
- Pull the bolt fully rearwards, then push forwards and close.
- Set the safety to the 'Fire' position.
- Continue firing.

Should the above drill not clear the obstruction, check the bolt and extractor for damage. Persistent failures to extract should be investigated by an Accuracy International trained armourer or gunsmith. A cleaning rod may be used to remove an EMPTY case only by carefully inserting it into the bore from the muzzle end of the barrel.

ENSURE THE CLEANING ROD IS REMOVED FROM THE BARREL BEFORE CONTINUING TO FIRE.

Slow-burning primer/hang fire:

If the round does not fire after 30 seconds, eject the round and inspect it. If the primer strike looks positive, the round must not be used and be disposed of safely. Persistent problems must be investigated, and the ammunition batch should not be used until examined further.

Light Strike:

This can indicate that the bolt was not fully closed. Ensure that the bolt is closed fully each time a cartridge is chambered. The bolt may also require cleaning and light lubrication. If the problem continues, stop using the rifle and have it examined by an Accuracy International qualified armourer.

'Pierced' or 'Blanked' Primer:

Should the ejected empty case have a 'pierced' or 'blanked' primer, the user should inspect the firing pin tip for damage. If the firing pin is damaged or if the problem persists, have the rifle examined by an Accuracy International qualified armourer.

Hard Extraction:

Hard extractions can be caused by a several factors. A heavily 'fouled' barrel and chamber is a common cause. The rifle should be cleaned regularly, as set out in the Maintenance section of this manual. The user should also inspect the bolt head and extractor for cleanliness and or damage. Prolonged 'rapid' firing may also cause hard extractions. If this is the case, allowing the rifle to cool more frequently, if practical, may ease the problem.
Any other problems must be investigated by an Accuracy International qualified armourer.

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5 USER MAINTENANCE

- General cleaning.
- Cleaning the barrel and chamber.
- Removing carbon and copper fouling.
- Cleaning the suppressor.
- Barrel break in procedure.
- Action screw check.

5.1 USER MAINTENANCE

The weapon system has been designed for military use and to withstand active service conditions, the AXSR Rifle is robust and is tested in all conditions to meet all necessary requirements.

ATTENTION: Cleaning and maintenance is an essential part of the safe and reliable use of the weapon system, failure to correctly maintain both barrel and component parts could result in the following problems:

1. Reduced barrel life, poor accuracy and excessive wear and tear.
2. Overpressure, causing hard bolt lift, failures to extract and inconsistent muzzle velocities.
3. Cocking and trigger reset failure.
4. Damage to components outside of general wear and tear.

These maintenance procedures must be followed as a minimum standard to ensure that the rifle progresses through its life expectancy as intended. Care must be given to all aspects of the weapon system that has received prolonged use or used in harsh conditions that could affect the normal functioning of the system. Users and maintenance teams must identify poor maintenance and should implement the procedures outlined in this manual.

Safety precautions:

- Before handling or attempting any cleaning or maintenance operations with the rifle, ensure that the rifle is unloaded and safe by carrying out the safety precautions detailed earlier in this manual (see section 1.4 on page 4).
- To ensure the rifle is not damaged while being cleaned and lubricated, only the recommended tools, cleaning materials and lubricants should be used in accordance with these instructions.
- No abrasive material should be used on any part of the rifle.

Recommended lubricants

Lubricant	Description	Uses
Break free CLP 16 OX24	Lubricant and preservative	General lubrication of the action and rifle exterior
WD40 GT85	Light penetrating oil	Light preservative and lubrication of the trigger
Grease XG 279	General purpose lubricating grease	Hinge, adjustable butt mechanism

Recommended bore cleaners

Cleaner	Uses
Shooters choice bore cleaner	Copper solvent
Forest bore cleaning foam	Copper solvent
KG1	Bore carbon remover
KG12	Big bore copper remover
KG SF112	Combined carbon and copper remover
Robla Solo MIL	Combined carbon and copper remover

5.2 CLEANING (GENERAL)

Cleaning and lubricating before firing:
Before firing the rifle, it must be cleaned and lubricated as detailed in the table on the right.

Cleaning and lubricating after firing:
The barrel should be cleaned upon completion of shooting, using the "Cleaning The Barrel" procedure described in the next section.

We recommend, as a minimum, that the barrel should be cleaned at the intervals listed in the table on the right.

The bolt body should be cleaned and lubricated regularly, i.e. daily when operational or when 100 rounds have been fired.

General rifle cleaning:

- The action body should be brushed clean to remove any brass particles or dirt.
- The exterior of the rifle should be wiped or brushed down until clean.
- Ancillary items such as magazines and bipods should be brushed clean and lightly oiled if required (do not use oil inside the magazines).
- If working in a wet environment or the weapon is to be put into storage, parts should be lightly oiled using CLP or similar.
- It is recommended that the barrel torque is checked after cleaning or maintenance.

Part	Lubrication Requirements
Barrel - exterior	Leave dry
Barrel - interior (bore and chamber)	Clean and leave dry
Bolt - front face	Clean and leave dry
Bolt - remaining surfaces	Clean and lightly lubricate with CLP oil or similar
Stock/Chassis	Leave dry
Action body	Clean and lightly lubricate the inside surfaces with CLP oil or similar, do not oil the barrel threads (if barrel is removed).
Cleaning Intervals 300NM/.338LM/.300WM/.338NM	
Military ball ammunition	Clean after every 60 rounds
Armour piercing ammunition	Clean after every 40 rounds
Cleaning Intervals 7.62 Nato (.308W)/6.5 Creedmoor	
Military ball ammunition	Clean after every 100 rounds
Armour piercing ammunition	Clean after every 50 rounds

Note:

In very dusty or harsh environments more frequent cleaning is recommended.

5.3 CLEANING THE BARREL

Recommendations:

- The bore and chamber are easier to clean after firing, while the barrel is still warm.
- Use a cleaning rod and rod guide when cleaning the barrel. Using a rod guide ensures that the cleaning rod is held in the centre of the bore, reducing the possibility of damage to the chamber and bore during cleaning, and preventing solvent and debris from entering the action.
- Use Bore Snakes or pull-throughs for emergency cleaning only. Pull from the chamber to the muzzle, ensuring the cord is pulled centrally from the front of the barrel to avoid damaging the crown. Clean the Bore Snake regularly to remove grit and debris that could damage the bore of the barrel.
- Use a vice or cradle to secure the rifle to prevent damage.
- Use the correct size brush or jag.
- When using bore solvents, allow the cleaning fluid to soak in the barrel for ten to fifteen minutes to more effectively penetrate the fouling.
- Work from chamber to muzzle, do not pull patches or brushes back through the muzzle.

CAUTION: The suppressor MUST be removed before cleaning the barrel.

Refer to the Bore Solvent Manufacturer's instructions for relevant Health and Safety precautions.
Solvents must be used sparingly; any excess spillage outside of the barrel must be removed immediately.

After cleaning and before firing the rifle again, always check the barrel and suppressor for obstructions.

5.3 CLEANING THE BARREL (2)

Barrel cleaning procedure:

- Unload the rifle and carry out safety precautions (see section 1.4 on page 4).
- Remove the magazine if fitted.
- Securely hold the rifle horizontally by a suitable means, ideally between the protected jaws of a bench vice, where available.
- Partially fold the rifle, depress the bolt release catch and remove the bolt.
- Remove the Suppressor (if fitted).
- Insert a rod guide into the action body, ensuring it has engaged with the bolt catch.
- Ensure the rod is clean before fitting a clean patch to the correct size spear point jag or tapered brush (see Fig 5-1 and Fig 5-2).
- Soak the patch with Bore Solvent and push it once through the barrel to wet the bore.
- Remove the patch and jag from the barrel, leave the solvent inside the barrel to loosen the fouling.
- Attach another clean patch to the jag and wet with solvent, push the patch slowly to the end of the bore and then begin to scrub the bore back and forth, paying particular attention to the first six to eight inches of the barrel, do not allow the patch to exit the muzzle. Approximately 100 passes is sufficient. Push the patch out of the muzzle and remove the patch and jag. Clean the rod with a cloth.

  Note: This procedure can only be done with spear point jags or tapered brushes and the correct patches, never use a jag that is not designed for multi directional use or patches that are not the correct size for the bore. Take care when scrubbing with the jag, always seek the correct maintenance training before use. Allowing the solvent time to dissolve the fouling will have improved effects.
- Dry patch out the bore with clean patches and jag until no carbon or copper fouling is visible. Note: When using brass jags copper solvent could react and give false readings.
- Repeat the previous operations until the patch comes out clean. a light grey smudge is acceptable. If separate carbon and copper solvents are being used, then these two steps must be carried out independently.
- Where the rifle is to be stored for a lengthy period or when in a corrosive atmosphere, a thin smear of oil should be left in the bore. Moisten a patch with CLP oil or similar and pass it once through the bore. **This oil must be removed before shooting.**

The chamber is to be cleaned using a chamber cleaning brush or a screw-on chamber brush and one of the cleaning rod sections. Always pass a dry patch through the bore after cleaning the chamber to remove any debris or cleaning product residue. Wipe away all surplus solvents from inside the action body and from the muzzle brake.

5.3 CLEANING THE BARREL (3)

Removing heavy carbon and copper fouling:

- Heavy copper fouling can occur as a copper coloured residue, carbon fouling can occur as a black residue between the lands. Usually within 12" (300 mm) of the chamber.
- The presence of carbon and copper fouling in the barrel often shows as a coloured residue on cleaning patches. This colour varies from one cleaning product to the next, e.g. heavy copper fouling may show as blue on the patch, heavy carbon fouling may show as grey on the patch. Check your specific cleaning product for guidance and repeat the cleaning procedure as necessary, until the patches come out clean.
- For difficult fouling that has been identified with a bore scope, soak a patch with bore solvent and pass it once through the barrel to wet the bore. When the bore is wet attach a copper brush and pass through the bore in a controlled manner from chamber to muzzle only, never scrub with a copper brush. (Note: Copper solvent is not recommended for use with a copper brush as the solvent could potentially damage the brush). Clean the bore with clean patches and re-inspect. Carry out all cleaning steps until the bore is completely free of all carbon and copper fouling.
- For optimal results, we recommend that a copper solvent and a carbon remover be used alternately to clean a heavily fouled barrel.
- Refer to the copper/carbon solvent manufacturer's instructions to determine how the solvent should be applied to the bore and how long it should remain.
- If alternating between carbon and copper solvents, repeat the cleaning procedure with the alternative product, again, leaving it to penetrate the fouling for the recommended time.

Using the jag brush and triangle patch

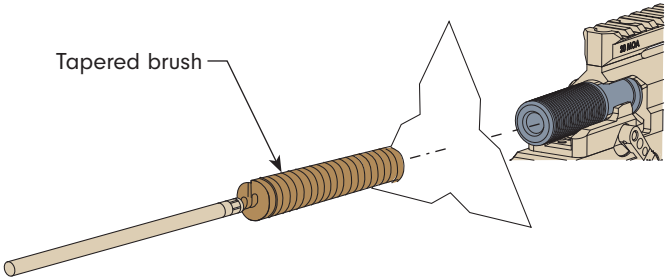


Fig 5-1

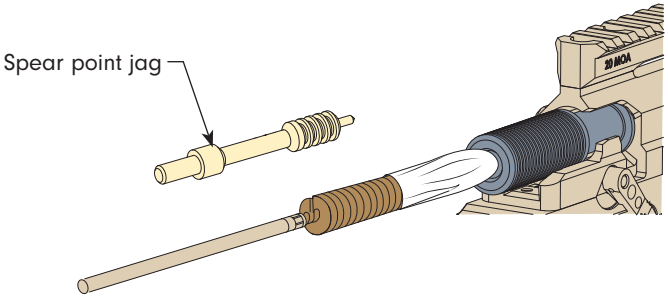


Fig 5-2

5.4 CLEANING THE SUPPRESSOR

Recommended cleaning of the suppressor:.

Perform field maintenance on the following occasions:

- Prior to use and after a prolonged period of non-use.
- Daily in the case of regular use.
- Immediately after any suspicious incident.

Procedure:

- Visually inspect the interior of the suppressor for foreign particles or cracks.
- Visually inspect the outer surfaces for cracks and dents especially in the muzzle area.
- Shake the suppressor to determine if any loose particles are audible.
- Check proper mounting and dismounting.
- Clean and lubricate the threads on the muzzle brake with a film of oil.
- Check the suppressor for a tight fit.

If the suppressor shows cracks, dents, damage in the muzzle area, loose particles, excessive carbon build up or any other irregularities, it may no longer be used and must be returned to the base armourer for service.

The suppressor should be submitted for workshop maintenance if one or more of the following criteria are fulfilled:

- Ingress of sand, mud, water, or other liquids into the suppressor and then fired before cleaning.
- Immediately after any suspicious incident.
- 1500 rounds have been fired or at the latest every 2 years.
- The effect of the suppressor has decreased noticeably.

5.5 ACTION AND BARREL SCREW CHECK

The AXSR Rifle Action is fastened to the chassis using five cap head screws. It is important to check the tightness of each screw to ensure the action and chassis remain securely fastened.

Check the action screw torque as the final step after cleaning by following the procedure below:

- Ensure the rifle is unloaded and safe to handle.
- Remove the magazine, if fitted.
- Using a 4 mm hex wrench or 4 mm extended ball-end hex wrench, tighten each action screw in the sequence shown in Fig 5-3 to 4.0 Nm.
- To check screw no. 2 using the extended ball-end hex wrench, push the magazine catch forwards to gain access to the screw socket.
- Check the barrel retaining screw torque 5.5 Nm.

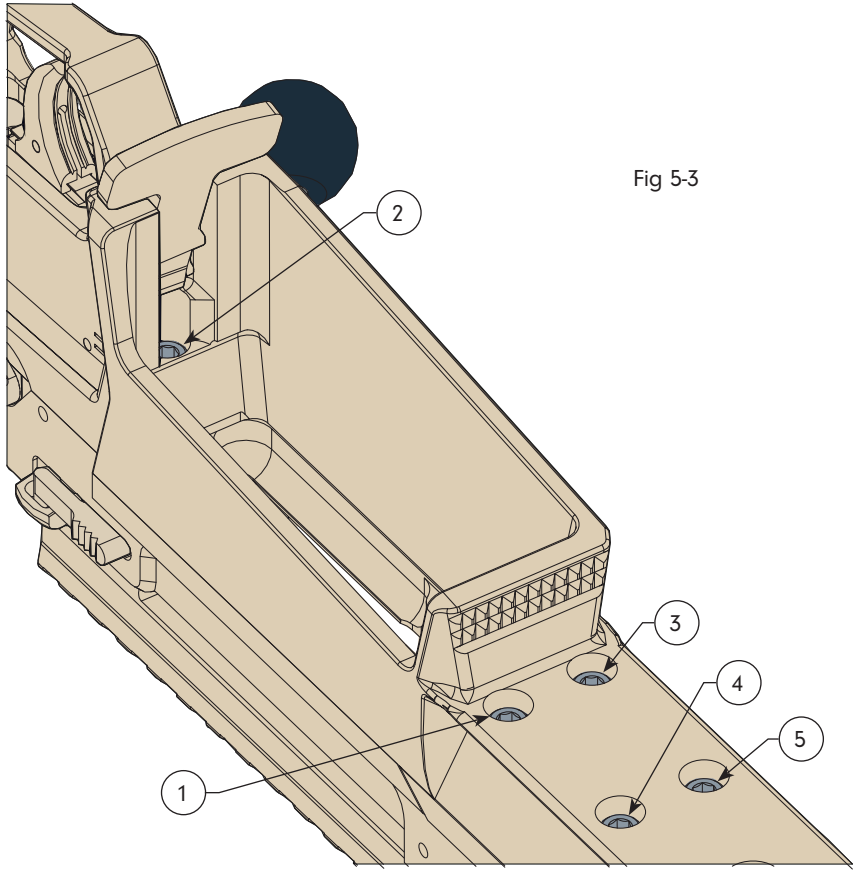
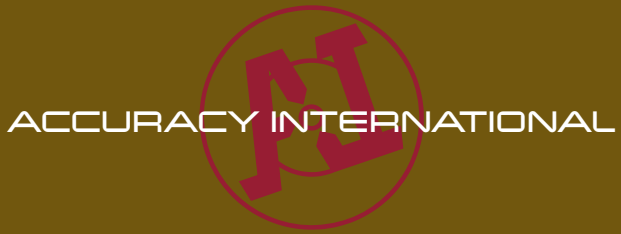


Fig 5-3

5.6 AMENDMENT RECORD

AMENDMENT RECORD			
ISSUE	AFFECTED PAGES	DATE	NOTES
A	ALL	09/05/23	PRELIMINARY NOT RELEASED
B	V, VI, 5,6,10,12,13,14,27,34 35, 46 47 52 53.	16/01/23	FIRST TECHNICAL REVIEW
C	5,12,13,14,52	17/01/23	UPDATE FROM ABOVE
01	ALL	18/01/24	RELEASED

NOTES


ACCURACY INTERNATIONAL