ARAK-21™

OPERATOR SAFETY AND INSTRUCTION MANUAL
NOTICE:

The ARAK-21™ Upper Assembly itself is not considered a Firearm under federal law or the National Firearms Act.

The ARAK-21™ Upper Assembly mounted on some lower receivers may be considered an Assault Weapon in some jurisdictions. It is solely the owner’s responsibility to comply with all federal, state and local laws and regulations regarding such firearms.
FAXON FIREARMS

ARAK-21™

UPPER ASSEMBLY

WARNING!

Use only commercially-manufactured ammunition. Use of remanufactured, hand-loaded or military surplus ammunition will void the warranty and could potentially damage the upper assembly.

The ARAK-21™ is a gas piston actuated complete upper receiver assembly designed to interface with the standard Mil-Spec AR-15 Rifle Platform. The ARAK-21™ has an integral machined MIL-STD-1913 "Picatinny" rail interface for the mounting of any compatible sighting system of the operator’s choice. An adjustable gas port regulator allows for reliable functioning with differing loads of commercial ammunition. The ARAK-21™'s charging handle can be assembled in either right or left-handed configuration.

The ARAK-21™ is designed with a barrel system that allows for changing calibers by switching barrels. Barrels are offered in medium and heavy weights, 16.3 inch and 20.3 inch lengths in both 5.56mm and .300 blackout chambering.
CYCLE AND FUNCTIONING

When the trigger is squeezed, the hammer falls on the firing pin and detonates the primer. As the powder burns the pressure in the chamber rises and drives the projectile forward. As the projectile passes the gas port, gas pressure flows from the barrel, through the hole in the gas regulator and into the gas cylinder.

The gas pressure in the gas cylinder impinges on the gas piston. As the pressure rises, the integral bolt carrier/gas piston is driven rearward. The cam surfaces on the bolt carrier rotate the bolt until it disengages from the locking lugs. The bolt carrier continues to the rear, taking the bolt with it. As the bolt and bolt carrier pass the ejection port, the empty cartridge case is ejected from the receiver by the ejector and ejector spring and cocks the hammer.

At the rearmost part of the stroke, the travel is stopped by the recoil buffer spring. The compressed recoil spring then pushes the bolt carrier forward again, stripping a new cartridge from the magazine and pushing it into the chamber. At the foremost part of the travel, the cam surface on the bolt carrier cams the bolt into the locking lugs.
1. SPECIFICATIONS AND COMPATIBILITY

The ARAK-21™ was designed as a drop-on upper receiver assembly for AR-15 type rifle platforms and is offered in 5.56mm or .300 blackout chambering. The ARAK-21™ contains its own internal recoil spring so the AR-15 platform's recoil spring and buffer assembly are not utilized.

Due to the large number of aftermarket accessories available for this popular platform, it is impossible to guarantee compatibility with every possible combination of custom or aftermarket parts. The ARAK-21™ has been tested and found to be compatible with the standard Mil-Spec AR-15 lower receiver.

If there is any question of compatibility, take the upper assembly to a qualified gunsmith for installation.

The ARAK-21™ bolt mechanism is unique to itself, and while some parts resemble the standard AR-15 Platform bolt parts, none of the parts are interchangeable.

The muzzle threads for the 5.56mm barrel are standard 1/2-28UNF threads and compatible with most standard AR-15 muzzle attachments.

The muzzle threads for the .300 blackout barrel are 5/8-24.
2. INSTALLATION

NOTICE:

It is the owner’s responsibility to be in compliance with all federal, state, and local laws regarding mounting the Arak-21™ upper assembly on a given lower receiver.

Before installation, verify that the chamber is clear by opening the bolt and visually inspecting the chamber of both the ARAK-21™ and the AR-15 platform for live rounds or empty casings.

1. Remove the magazine and separate the upper receiver from the lower receiver by pushing takedown pins (1 & 2) on the lower receiver on the AR-15 platform. Store the AR-15 platform upper receiver in a safe place out of the reach of children.
2. Align the lug on the ARAK-21™ trunnion block (3) with the front takedown pin (1) hole on the AR-15 platform lower receiver. Close the front takedown pin (1). Close the upper and lower receiver together and push the rear takedown pin (2) closed.

**WARNING!**

The ARAK-21™ was not designed to operate with full automatic M16 trigger mechanisms. Installation on a full automatic trigger assembly can result in accidental discharge, injury, or damage to property.

3. The ARAK-21™ is now assembled.
3. SIGHTING

The ARAK-21™ is machined with an integral MIL-STD-1913 "Picatinny" rail interface system on top of the receiver for the mounting of any sighting device of the operator's choice.

Refer to Sighting Device Instructions for proper mounting and use.

**NOTE:**

Bullet impact may vary with any change in barrel length or caliber. Re-Zeroing will be necessary after changing barrels.
4. OPERATION

WARNING!

The ARAK-21™, when mounted to an AR-15 platform lower receiver, is a potentially dangerous firearm that, if improperly handled, can cause death or serious injury. Always practice safe firearm handling procedures when handling or shooting the ARAK-21™. Safe handling of firearms can be learned at local gun clubs or by NRA-approved instructors.

NOTE:

Reliable functioning of any firearm is a direct function of its cleanliness. While the ARAK-21™ is designed using the most reliable features proven in service; there is no substitute for regular cleaning. The manufacturer of the ARAK-21™ recommends a thorough cleaning after each time the rifle is fired. Some types of ammunition can leave deposits of brass, powder fouling, and/or primer sealant on the bolt face. Regular cleaning will remove these deposits and prevent premature wear of the bolt face.

Before shooting the ARAK-21™, visually verify that the bore and chamber are free of obstructions by running a clean patch down the bore with a cleaning rod of the appropriate size. To safely visually inspect the bore, push the rear takedown pin and open the upper and lower receiver. Remove the recoil spring and bolt assembly and look from the rear of the receiver down the barrel. Remove any obstructions before attempting to shoot the ARAK-21™. Verify that the caliber of the barrel assembly installed is the same as the ammunition being used.

WARNING!

Never look down the muzzle to inspect the bore!
1. To Load the ARAK-21™

   a. Rotate safety lever into the "safe" position.

   b. Pull the charging handle back and lock bolt to the rear using the bolt stop. Allow the charging handle to return to its front and folded position.

   c. Insert a magazine loaded with the proper caliber ammunition into the magazine well until the magazine catch locks it into position.

   d. Press the bolt release button until the bolt closes or pull the charging handle to its most rearward position and release.

   **WARNING!**

   If the bolt fails to close all of the way, open the bolt and determine the cause. Forcing a defective or improper caliber round into the chamber could result in a burst barrel causing death or serious injury and/or damage to the rifle.

   e. Rotate safety lever to the "fire" position.

   f. Obtain the proper sight picture as detailed in the sighting device instructions.

   g. Squeeze trigger until the firearm discharges.

   h. Release the trigger fully and then squeeze to discharge firearm again.

   **WARNING!**

   Rapid firing of the ARAK-21™ at more than 30 rounds in two minutes can overheat the barrel leading to premature barrel wear or accidental discharge due to "cook-off".
2. To Clear the ARAK-21™

   a. Rotate safety lever to the "safe" position.

   b. Remove the magazine assembly.

   c. Pull the charging handle to the rear and lock in place with the bolt stop.

   d. Visually inspect the chamber for empty casings or live rounds.
3. Adjusting Gas Regulator

The ARAK-21™ is provided with an adjustable port gas regulator. This allows the operator to increase or decrease the gas pressure on the piston for the most reliable functioning for the type of ammunition the operator is using. When at the firing range, set the gas regulator as follows:

<table>
<thead>
<tr>
<th>Position 1</th>
<th>Position 2</th>
<th>Position 3</th>
<th>Position 4</th>
<th>Position 5</th>
</tr>
</thead>
<tbody>
<tr>
<td>Insert/Remove</td>
<td>Low Gas</td>
<td>No Gas</td>
<td>Maximum Gas</td>
<td>No Gas</td>
</tr>
</tbody>
</table>

**.300 BLK Model**

<table>
<thead>
<tr>
<th>Position 1</th>
<th>Position 2</th>
<th>Position 3</th>
<th>Position 4</th>
<th>Position 5</th>
</tr>
</thead>
<tbody>
<tr>
<td>Insert/Remove</td>
<td>Low Gas</td>
<td>Medium Gas</td>
<td>Maximum Gas</td>
<td>No Gas</td>
</tr>
</tbody>
</table>

**.223/5.56 Model**

*Note:*

*The lines on the gas adjuster must line up with the lines on the gas block. You should feel the detent seat when the lines line up.*
Adjusting Gas Regulator (Cont.)

a. Rotate the gas regulator to second position (Low Gas).

b. Load one round into the magazine.

c. Load and fire the round into the backstop.

d. The bolt carrier assembly should be open and locked to the rear by the bolt stop.

e. If the bolt carrier assembly does not lock to the rear, set regulator to the next position and repeat steps b and c.

f. If the ARAK-21™ fails to function with the regulator set to the fourth position, try a different bullet weight or brand of ammunition.

**CAUTION:**

Use the lowest setting that functions reliably. Prolonged firing on the higher setting could damage the upper assembly.

**Related Note:**

If you feel any vibration (sting) on your finger from the trigger when shooting, you have the gas set too high for the ammunition you are using.

There is a significant difference in the hole size for the 300 BLK Gas Adjuster. This is to accommodate the difference in gas pressure on the various cartridges.

Always make sure that you have the proper gas adjuster in the proper barrel.

You always want to shoot your ARAK-21™ on the lowest gas setting that performs reliably.
5. DISASSEMBLY

This section covers operator-level disassembly for cleaning and operator maintenance.

NOTICE:
Disassembly beyond the level outlined in this manual will void the warranty and can potentially cause damage or injury.

1. Basic Field Stripping

   a. Clear the ARAK-21™ and ensure it is unloaded.

   b. Return bolt carrier (4) and charging handle (1) to the forward position.

   c. Push out recoil spring guide retainer pin (2).

   d. Press the recoil spring guide (3) in 1/2", rotate downward slightly, and remove out the back of the upper receiver.

   e. Pull charging handle (1) rearward and remove the bolt carrier assembly (4).

   f. Rotate the gas adjuster (5) to the "X" position and pull forward to remove.
2. Bolt Disassembly

**Note:**

Due to the piston actuated gas system, the internal surfaces of the bolt assembly of the ARAK-21™ will not accumulate the carbon and fouling buildup common to the AR-15 platform, and therefore will not need to be cleaned as often. The bolt face still needs regular cleaning to keep it free of brass and primer sealing deposits.

a. Press firing pin release lever (1) down. Pull the firing pin (2) out of the bolt carrier.

b. Remove bolt cam (3), noting the orientation of the large radius corner.

c. Pull bolt (4) out from the front.

d. Push out extractor pin (5) and remove extractor (6) and extractor spring (7).

No further disassembly is needed or recommended.

**CAUTION!**

The ejector is under strong spring tension. Removing the ejector pin improperly can result in the ejector being launched out of the bolt at high velocity, possibly causing injury or loss of the ejector. Removing the ejector is not recommended. Take to a qualified gunsmith if service of the ejector is needed.
3. Charging Handle

a. Push handle rearward against the recoil spring with the handle in a closed position, compressing detent spring in a rearward direction, then pull or push handle out sideways.

b. Use the recoil spring guide to push charger spring guide forward (1). Rotate spring up and out of track.

c. Pull the charger block back and lift out of receiver.

Further disassembly of the return spring or detent spring is not required or recommended.
4. Removing/Changing Barrel Assembly

a. Place the receiver assembly upside down on work surface. Loosen six allen screws (1) holding the lower forearm (2) to the upper receiver (3) and remove the lower forearm (2) by lifting straight up.

b. To remove the barrel assembly (4), slide the barrel assembly forward and then out of the upper receiver (3).

**NOTICE:**
Removing the bolt rails or recoil lug will void the warranty and can adversely affect accuracy and/or reliability.

c. To re-install the barrel, lay barrel assembly into upper receiver and slide rearward, taking care to align slots.
Removing/Changing Barrel Assembly (Cont.)

**WARNING!**

Use only the barrels that were shipped with the ARAK-21™ upper receiver. Mixing barrels from other ARAK-21™ upper receivers may cause damage or injury. Have cartridge headspace checked by a qualified gunsmith if barrels become mixed up.

d. Position the lower forearm on the receiver taking care to allow alignment pins to slip into place.

e. Tighten the six allen head screws.

*DO NOT over tighten - recommended 30 in / LBS.*
6. TROUBLESHOOTING

**WARNING!**

In the event of any malfunction, keep the ARAK-21™ pointed in a safe direction in case of accidental discharge.

A. **FAILURE TO FEED.** Bolt closes but does not feed a cartridge into the chamber.
   Possible causes: Magazine not fully locked in position or damaged or defective magazine.

B. **FAILURE TO LOCK.** Bolt goes forward but does not fully close.
   Possible causes: Dirty ammunition or dirty chamber or incorrect ammunition.

**WARNING!**

Never attempt to force a cartridge into the chamber. If a cartridge does not fully seat under drive spring pressure, remove the cartridge and determine the cause.

C. **FAILURE TO FIRE.** Hammer drops but round does not go off.
   Possible causes: Dirty firing pin hole or damaged firing pin.

D. **FAILURE TO CYCLE.** Cartridge fires but bolt carrier does not come back.
   Possible causes: Gas regulator set to shut position or fouled gas port.

E. **FAILURE TO EXTRACT.** Bolt carrier cycles but does not extract empty casing from chamber.
   Possible causes: Missing extractor or extractor pin or dirt or fouling in extractor groove.

F. **FAILURE TO EJECT.** Bolt comes back but does not eject empty casing from the ejection port.
   Possible causes: Dirty or stuck ejector or gas regulator set too low.
7. CLEANING

The ARAK-21™ should be kept clean for maximum reliability. It is recommended that the ARAK-21™ be cleaned at least once every 300 rounds.

Cleaning Supplies

For 5.56mm/.223 caliber barrels, use a .22 caliber bronze bore brush. For .30 caliber barrels, use a .30 caliber bronze bore brush. Both caliber barrel assemblies use a .38 caliber bore brush to clean the gas cylinder. In addition, a swab holder section for bore swabs is required.

The manufacturer recommends that the cleaning rod be pushed through the barrel from the breach end to reduce the risk of damage to the rifling by the cleaning rod.

WARNING!

Use of steel wire brushes, oven cleaner or ultrasonic baths may damage the finish and will void the warranty.

Quick Cleaning

To maximize reliability, the following quick cleaning procedure can be used at the range or in the field. Remove bolt carrier assembly and gas regulator. Clean gas piston end, bore and gas cylinder.
8. REPLACEMENT PARTS

Replacements for parts that are lost or become damaged can be obtained from the factory. Pricing for replacement parts is posted on the website or can be obtained by contacting the factory directly.

NOTICE:

The replacement of parts with a service code of "F" (Factory) by anyone other than Factory Trained Technicians will void the warranty.

Exploded views are provided for reference only. Disassembly beyond the scope outlined in Chapter 5 will void the warranty. Only parts with a service code of "O" (Owner) may be removed or replaced by the owner.
## Upper Receiver Assembly

![Upper Receiver Assembly Diagram](image)

<table>
<thead>
<tr>
<th>Figure</th>
<th>Item</th>
<th>Part No.</th>
<th>Description</th>
<th>Service Code</th>
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<td>FF-133</td>
<td>Forearm Alignment Pin</td>
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<td>4</td>
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<td>Forearm Screw</td>
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<tr>
<td>1</td>
<td>5</td>
<td>FF-136</td>
<td>Forearm Picatinny Rail</td>
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<tr>
<td>1</td>
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<td>FF-137</td>
<td>Forearm Picatinny Screw</td>
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<td>FF-152</td>
<td>Rail Insulator</td>
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<td>Shell Deflector</td>
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<td>Shell Deflector Screw</td>
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Bolt Carrier Assembly

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<td>Firing Pin Retainer</td>
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<td>Firing Pin Retaining Spring</td>
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<td>FF-167</td>
<td>Firing Pin Release Lever Pin</td>
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Bolt Assembly

![Figure 3](image)

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<td>FF-131</td>
<td>Ejector</td>
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<td>4</td>
<td>FF-144</td>
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## Barrel Assembly Unit (BAU)

![Barrel Assembly Unit (BAU)](image)

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<thead>
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<th>Figure</th>
<th>Item</th>
<th>Part No.</th>
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<td>Barrel</td>
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<td>FF-111</td>
<td>Gas Tube</td>
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<td>4</td>
<td>7</td>
<td>FF-161</td>
<td>Muzzle Break</td>
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<td>4</td>
<td>8</td>
<td>FF-165</td>
<td>Crush Washer</td>
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</tbody>
</table>
## Gas Adjuster Knob Assembly

![Figure 5](image)

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<th>Figure</th>
<th>Item</th>
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<th>Description</th>
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<td>Gas Adjuster Detent Cross Pin</td>
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<td>FF-140</td>
<td>Gas Adjuster Detent Spring</td>
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</table>
**Charging Block Assembly**

![Figure 6](image)

<table>
<thead>
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<th>Figure</th>
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<td>9</td>
<td>FF-169</td>
<td>Cocking Handle Pivot Pin</td>
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Lower Recoil Lug Assembly

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<td>FF-156</td>
<td>Secondary Recoil Spring</td>
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</tbody>
</table>
CONTACT INFORMATION:

Faxon Firearms

11101 Adwood Drive
Cincinnati, OH 45240
513-674-2580

www.faxonfirearms.com