

*Heisenberg, Schrödinger, and The Bureau of Alcohol, Tobacco, Firearms, and Explosives*

**Heisenberg, Schrödinger, and  
The Bureau of Alcohol, Tobacco, Firearms, and Explosives**

by

Carl Bussjaeger  
Firearms Policy and Law Analyst  
The Zelman Partisans  
zelmanpartisans.com

October 11, 2020

**INTRODUCTION**

The Bureau of Alcohol, Tobacco, Firearms, and Explosives (ATF) has long been known by the firearms industry and owners as arbitrary, capricious, and full of enough uncertainty to make Werner Heisenberg jealous. And just as Schrödinger had to peer into that box to discover whether cat had perished or lived on, gun owners must wait on the ATF to randomly determine the state of our implements; whether they be guns or piles of ore, and what sort of gun. Even the caliber can change from the ATF's act of observation.

*Copyright 2020 by The Zelman Partisans, LLC*

## EXAMPLES

I have list a few examples of arbitrary rulemaking by the ATF over the past few decades. This far from a complete exhaustive list, but should convey the magnitude of the problem.

### 1. Destructive Device

#### A. 37mm Projectile Launchers

<https://www.atf.gov/file/55446/download>

40mm millimeter projectile launchers are classified as "destructive devices" under 18 U.S.C. Chapter 44 (GCA), and 26 U.S.C. Chapter 53(NFA). 37mm launchers are not, because 0.118 inch magically makes them deadly. Unless you also load the wrong ammunition; then they are. ATF Ruling 95-3:

*"ATF has previously held that devices designed for expelling tear gas or pyrotechnic signals are not weapons and are exempt from the destructive device definition. However, ammunition designed to be used against individuals is available for these 37/38 mm devices. This "anti-personnel" ammunition consists of cartridges containing wood pellets, rubber pellets or balls, and bean bags.*

*"When a gas/flare gun is possessed with "anti-personnel" type ammunition, it clearly becomes an instrument of offensive or defensive combat and is capable of use as a weapon."*

#### B. Desert Eagle .50 Caliber Handgun

Firearms, other than shotguns, with a bore greater than 0.5 inch are regulated under the NFA as destructive devices. Traditionally, the bore is measured from land to land, not groove to groove which would be slightly larger. This is because the land to land diameter is what really determines the size of a bullet that can fit through it. The grooves are where deformed metal is pressed to engage and spin the bullet.

The Israel Military Industries Desert Eagle .50 does not use traditional land and groove rifling. It uses "polygonal rifling" in which bullet spin is imparted by the twisted polygonal cross-section of the barrel. But, as with land and groove rifling, the maximum bullet size is determined by the minimum diameter of the barrel.

The ATF, in examining the Desert Eagle, abandoned the centuries-old practice of measuring the caliber of the barrel by the minimum diameter, and suddenly determined that the greater diameter -- the area into which metal would be deformed -- was the caliber. IMI was forced to redesign the barrel for the US market to meet the new definition; however both designs chamber and fire exactly the same .50 AE cartridge.

## **2. Open Bolt = Machinegun**

Until 1982, a semiautomatic-ONLY firearms that fired from the open bolt (ie- pulling the trigger causes a locked-open bolt to move forward and chamber a cartridge and then fire) was just a semiautomatic firearm. Then the ATF issued three rulings on specific models that fired from the open bolt, classifying them as machineguns because they were allegedly "easily converted" to machineguns.

1982-2 - KG-9 Pistol. Open-bolt semi-auto.

1982-8 - SM10 and SM11A1 pistols and SAC carbines. Open-bolt semi-autos.

1983-5 - YAC STEN MK II carbine. Open-bolt semi-auto.

To make it worse, it only applied to those models sold after the ruling, while those sold prior somehow remain semiautomatic. This forced complete redesigns on the manufacturers.

While the ATF has not issued a general ruling declaring all open-bolt firearms to be machineguns, no manufacturer or hobbyist is willing to take the chance of retroactively being found to have manufactured a "machinegun" in violation of Firearm Owners Protection Act of 1986, which made possession of a machinegun manufactured or imported after May 1986 unlawful for the general public.

## **3. "Easily Converted" to a Machinegun**

Building on that "easily converted" precedent, the ATF now routinely declares semiautomatics to be easily converted to machineguns, and thus actual machineguns.

**A.** In 2008, Federal Firearms Licensee/Special Occupational Tax (FFL/SOT) Len Savage submitted a semiautomatic rifle sample to the ATF for evaluation. It was semiautomatic-only PKM-variant; he just wanted to verify that his changes could not be "easily converted" back to a machinegun. The ATF machined the receiver and welded on additional parts, blew up the gun, rebuilt it by welding on more plates and chains, and declared that demonstrated that it was "easily converted" to a machinegun. When Mr. Savage declined to pay \$200 to register the machine the ATF had built, they got a judge to issue an arrest warrant for the gun. Savage was unable to market his proposed product to the general public due to the FOPA 1986.

**B.** In 2009, David Olofson's conviction for unlawful possession of a machinegun was upheld (United States v. Olofson, 563 F.3d 652 (2009)). Olofson's AR-pattern rifle malfunctioned and fired more than one round per trigger operation and jammed. The ATF determined the malfunction "easily converted" it to a machinegun.

**C.** In 1996, the ATF examined a fourteen inch SHOESTRING, and determined that it was a machinegun under 26 USC 5845(b) since it could be used to tie a reciprocating bolt to the trigger, causing the firearm to discharge multiple rounds. The ATF confirmed that

determination is a September 30, 2004 letter to Brian Blakely. In a June 25, 2007 letter to Blakely, the ATF abruptly reversed itself, and said shoestrings are not always machineguns, but could be.

To be safe, my recent shoe purchases have been slip-ons or velcro-strapped.

#### **4. Suppressors/Silencers**

In a sane world, a noise reducing device that protects the user's hearing and the neighbor's peace of mind would be encouraged, rather like mufflers on cars. Suppressors ("silencer" in the NFA) are taxed, registered, and highly regulated. Expendable components of suppressors are considered by the ATF to be silencers in and of themselves. In 2011, the ATF classified Chore Boy pot scrubbers as silencers.

*"[S]ound/gas absorbing materials manufactured from Chore Boy copper cleaning pads, along with fiberglass insulation, constitute a silencer."*

Possession of a pot scrubber in your kitchen, or insulation in your walls, can be a federal felony.

#### **5. Bump-Stock Type Devices**

Bump-fire stocks, which the ATF now charmingly labels bump-stock type devices (BSTD) are devices in which one mounts the receiver/action of a firearm, and are worthy of more detailed discussion. Under recoil, the action slides backwards in a channel to disengage the trigger from the trigger finger. The user then manually pulls the receiver/action forward again to cause the finger to engage and operate the trigger again. With practice, the user can achieve high rates of semiautomatic fire, at the cost of accuracy and the increased risk of malfunction (failures to feed or extract).

It should be noted that any semiautomatic firearm can be bump-fired without any tools or aids such as a BSTD. I have done it with an SKS rifle, and I've seen it done with a 1911 pistol.

In the 1990s, Bill Akins submitted his Akins Accelerator to the ATF for evaluation. They determined that it was not a machinegun. After he went into production and had sold Accelerators on the open market, the ATF made a new determination that, because the device had a spring to assist moving the action forward, it was a machinegun after all. Akins redesigned his device to omit the spring, and the ATF determined that it was not a machinegun.

Slide-Fire submitted their own similar spring-free device for evaluation, and the ATF determined that it was not a machinegun. Other manufacturers followed suit, selling their

not-a-machiningun BSTDs. The ATF estimated that there could be more than half a million BSTDs sold.

In late 2017, the ATF, on orders from President Trump, took the unusual for them step of beginning the formal Administrative Procedures Act process of classifying BSTDs as machineguns. The rule was formalized in December 2018, making thousands of BSTD owners felons with a stroke of the pen.

<https://assets.documentcloud.org/documents/5635249/Bump-Stock-Final-Rule.pdf>

The rule is based on a lie about how BSTDs operate (falsely claiming that they channel recoil energy to drive the trigger against the finger) and by redefining the statutory language "function of the trigger" (26 USC 5845(b)) to mean "volitional act of the user pulling the trigger."

In the Guedes *et al* challenge to the BSTD rule, plaintiffs asked if a closet full of semi-auto rifles and a box of rubber bands would be considered by the ATF to be a machinegun, the DOJ lawyer answered:

*"You know, I think until we — I don't think we are in a position to come out and give an advisory opinion on what the agency might decide to do with a particular rubber band."*

Even they don't know what they'll do next. For the record, I turned in my potentially BSTD rubber bands to the ATF.

## **6. Receiver/Frame**

Federal law defines "firearm frame or receiver" as "That part of a firearm which provides housing for the hammer, bolt or breechblock, and firing mechanism, and which is usually threaded at its forward portion to receive the barrel."

The ATF has classified the lower receiver portion of an AR-pattern firearm as the official firearm. The lower does house the hammer, but the bolt and firing mechanism are housed in the non-firearm upper receiver, which is also where the barrel is attached. Likewise, the frame of almost all semiautomatic pistols houses only the hammer, and in striker-fired handguns not even that. But the ATF classifies the frame as the firearm.

The issue is that the definition was created by Congress several decades ago, and was apparently drafted by people unfamiliar with firearm other than revolvers and bolt-action rifle. It simply never took in account such firearms as the existing Model 1911 handgun. And Congress never updated the definition.

## **7. Unfinished Receiver/Frame**

So-called "80% receivers" of frames are vaguely receiver- or frame-shaped paperweights. Taking an unfinished AR- lower as an example, it cannot fire a bullet. You can't put a trigger group into it. You can't even attach an upper receiver to it. But it is a block of metal or plastic that has been cast or machined just enough to save the hobbyist the worst effort. For once the ATF did not see the need to regulate paperweights that might never be guns, so they arbitrarily picked a point in the machining process where it becomes a firearm. "80%" is just before the point where you can start attaching trigger groups, pins, and buffer tubes. As arbitrary goes, it's fairly reasonable.

California has filed a lawsuit to demand that the ATF classify unfinished frames and receivers as working firearms. It is widely expected that the ATF will gleefully comply.

STATE OF CALIFORNIA et al v. BATF

<https://www.courthousenews.com/wp-content/uploads/2020/09/CalifATFGhostGun-COMPLAINT.pdf>

It is not stated at what point, from raw ore in the earth to milled/machined device, an inanimate object will suddenly become a firearm. I fear that my jar of iron oxide could fire a round at any moment.

## **8. Short-Barrel Shotguns**

Shotguns with a barrel less than 18" in length are regulated under the NFA. Sometimes, depending on the ATF's mood-of-the-day.

The Henry Repeating Arms Axe .410 is firearm with an overall length of 26.4 inches, and 15.14 inch barrel with a smooth bore. The ATF does not consider that to be a short-barrel shotgun

The Mossberg Shockwave is pistol-gripped firearm based on the Mossberg 500 receiver with a 14.375" smoothbore barrel. The ATF determined that is not an NFA short-barrel shotgun.

<https://www.mossberg.com/wp-content/uploads/2017/03/Shockwave-Letter-from-ATF-3-2-17.pdf>

If you cut the buttstock off of a Mossberg 500 shotgun, which uses exactly the same receiver as the Shockwave, and cut the barrel down to 14.375", the ATF has determined that you've made an NFA short-barrel shotgun.

## **9. Short-Barrel Rifles**

Short-barreled rifles are regulated under the NFA. Handguns generally are not.

There are pistols based on AR-pattern and AK-pattern semiauto variants. These can be awkward to use, so many people use a stabilizing arm brace to steady them in operation.

In a March 5, 2014 determination letter to police Sergeant Joe Bradley, the ATF stated that an AR-type pistol with a brace is not an NFA short-barrel rifle even if the user were to shoulder the brace like a stock. But under current ATF determinations no one knows what is what.

[https://i1.wp.com/johnpierceesq.com/wp-content/uploads/2014/04/ATF\\_Letter\\_Pistol\\_Brace.jpg](https://i1.wp.com/johnpierceesq.com/wp-content/uploads/2014/04/ATF_Letter_Pistol_Brace.jpg)

The August 4, 2019 Dayton mass shooter used an AM-15 AR-style pistol with a Shockwave Blade brace. It is not a short-barrel rifle, per the ATF.

The Honey Badger firearm is a pistol with a brace. Until August 3, 2020, when the ATF suddenly and retroactively determined it to be a short-barrel rifle, in conflict with their 2014 determination. Note in the ATF determination letter that they state that two other Q LLC models "may" be NFA firearms, but haven't decided yet.

[https://mcusercontent.com/557cc802f23161a8ffe100a66/files/dd6aa903-36c2-4d14-9de5-91aa62215cd2/Q\\_LLC\\_6\\_02\\_02814\\_Cease\\_Desist\\_Letter.pdf](https://mcusercontent.com/557cc802f23161a8ffe100a66/files/dd6aa903-36c2-4d14-9de5-91aa62215cd2/Q_LLC_6_02_02814_Cease_Desist_Letter.pdf)

## **10. Reformation RS7**

The Franklin Armory Reformation is literally in class all its own. The RS7 has the physical appearance of a short-barreled rifle. It has a shoulder stock and a 7.5 inch barrel. It is chambered for the 5.56 NATO cartridge.

In a December 19, 2020 determination letter the ATF classified it as a short-barreled shotgun that is not regulated as such under the NFA. Instead, they invented a class not in statutory law called "Gun Control Act Short-Barrel Shotgun (GCA/SBS). The letter continued to explain since they just made this up, there are no procedures or forms to process sales of the RS7, and thus no transfers may be made except to certain classes of FFLs. No sales to the public at all.

<https://www.atf.gov/firearms/docs/open-letter/franklin-armory-dec2019-open-letter-franklin-armory-reformation-firearm/download>

The RS7 is another example of the ATF trying to match inapplicable laws and definitions to devices unimagined by unimaginative bureaucrats and politicians. The RS7 is not a conventional shotgun because the barrel has lands and grooves. But it is not a rifle, because the lands and grooves are straight, not spiraled; they impart no stabilizing spin to the bullet.

Like polygonal cross-section barrels, Congress simply couldn't conceive of the idea, and the ATF reacts by inventing "laws" to regulate it.



## **SUMMARY**

ATF rulings resemble the reasoning of a bi-polar schizophrenic, constantly changing and conflicting. They have rewritten the Second Amendment to read "A well regulated population, being necessary to the job security of unelected bureaucrats, the right of the people to keep and bear Arms, shall subject to the whims of madmen with delusions of grandeur."

Worse, with comparatively few exceptions like the BSTD rulemaking, the ATF's decisions come in determination letters that are sent only to specific inquirers. They are not generally published; if you are not the recipient, the only way to see these letters is to do a FOIA request for any determinations on such-and-such a topic. Yet, internally, the ATF will use unpublished determination letters as binding precedent for everyone, as seen the Blakely shoestring machinegun letter (Yeah, we decided that shoestrings are machineguns, but didn't tell anyone so we could arrest for it.).

By using determination letters instead of APA-compliant rulemaking, the ATF avoids public notice and public input.

The ATF does not merely lack adult supervision, they are the the adult... If mommie were a deranged nutjob bound and determined to drive her kids insane with frustration as well, with constantly changing rules and standards, surprise edicts, and bizarre reversals.

*"Why are you eating that cookie?!"*

*"You gave it to me and said I could."*

*"Well, you can't!" -slap-*

*"Why do you have bump-fire stocks, Reformatations, Shockwaves, paperweights, and the rest?!"*

*"You said we could."*

*"Well, you can't!" -slap with prison, fines, and loss of rights-*