

Choosing an AR-15 Lower Receiver

When building an AR 15 from the ground up, most shooters take the first step by choosing the right [AR 15 lower receiver](#). The AR 15 lower receiver contains the rifle's viscera and is the only part of your rifle that is serialized. If building a .223/5.56, .300 Blackout, 6.8 SPC or 7.62x39, your lower will usually be the standard 5.56 M4 design. If wanting to build a larger caliber such as a .308 you will need the larger AR-10 style lower receiver.

After establishing how much you want to spend on your AR build, the next step will be to determine if you want to go with a complete or a stripped lower.

Stripped AR 15 Lower Receiver vs Complete AR 15 Lower Receiver

Outside of budget and brand, all types of lower receivers serve the same purpose. The AR 15 lower receiver consists of the butt stock, pistol grip, buffer spring, buffer, trigger assembly (fire control group), as well as housing the magazine. It is also the attachment point for the upper receiver.

The lower can be purchased in two forms, either a stripped lower or complete lower. A complete lower is simply a preassembled lower that is ready to be attached to your upper. A stripped lower will need to be assembled and requires the purchase of a [lower parts kit](#) and butt stock assembly.

80% Lower Option

When choosing an AR 15 lower receiver there is the additional option of buying an [80% lower](#). This means the lower is only 80% finished and is lacking the necessary milling to install the fire control group.

According to the BATFE an 80% lower can be sold without serialization or an FFL transfer. If the purchaser completes the milling for the fire control group the lower does not require an FFL. For the do-it-yourself types this is an economic way to build an AR.

You are required to know and understand federal, state and local laws governing the ownership of an 80% lower. Please verify your [state requirements](#) before purchase.

Cast, Forged and Billet

When shopping for an AR lower receiver, you're sure to run on to various terms that depict the method by which a particular lower is manufactured. These terms will usually be one of three — '[forged](#), [billet](#) or cast.' So what's the difference between the three manufacturing processes?

Cast

One of the processes for manufacturing an AR-15 lower receiver is to 'cast' the lower. This means the lower receiver is formed using a mold. Molten aluminum is poured into the mold to form the overall shape of the lower. Once the aluminum solidifies the aluminum 'casting' is removed from the mold. The 'cast' lower receiver is then finished on a CNC machine.

Cast lower receivers offer buyers some of the most economical lowers of the three manufacturing processes. Furthermore, by casting a lower receiver from A380 aluminum the lower is given the best synthesis of mechanical properties offered by a casting process.

Forged

Forged aluminum generally refers to material that is ‘forged’ into a specified shape. Forging a lower receiver requires “compressive forces.” In other words it is “hammered” into forging dies to shape the aluminum into the intermediate dimension of the lower receiver. After the aluminum lower is forged into the initial shape, the raw forging is then ‘finished’ on a CNC machine.

Billet

A billet lower receiver is formed from a solid block of aluminum often called ‘bar stock.’ This ‘bar stock’ is formed from extruded aluminum. “Extruded” simply means the aluminum was formed into a particular shape by rolling between two rollers. (A mental image might be to think of it as a piece of dough, which was extruded or ‘rolled’ and cut to various shapes to form different types of pasta.) From a piece of this extrusion or ‘bar stock’ a CNC machine will cut the billet into the shape of an AR-15 lower receiver.

Due to the CNC’s ability to machine billet aluminum into designated shapes, billet lower receivers are considered the most aesthetic. While one-piece trigger guards, fine lines and geometric designs do little for overall performance, some AR builders consider these to be bonus features when considering the overall look of their AR build.

Butt Stock Options

As crazy as it sounds, some states prohibit the use of high capacity magazines, pistol grips, collapsible stocks and so forth. When choosing your accessories, such as the butt stock, make sure and check your [state and local laws](#) regarding these options.

If you prefer a traditional feel to your rifle, a fixed stock will give you the desired aesthetics. Collapsible stocks are also available and offer precision adjustments for the shooters size and style. An adjustable stock allows the length of pull to be adjusted when wearing heavier or lighter clothing and can make the overall length of the weapon shorter if in a close quarter combat situation.

The butt stock of an AR 15 does more than provide a cheek weld for the shooter. It is also home to the buffer spring and buffer. This is the spring and buffer that assists the bolt carrier group in returning to its forward position and is housed in the buffer tube.

An AR 15 lower receiver is available in a variety of colors and can be either anodized or painted with a durable finish such as Cerakote. Selecting one of several tactical finishes can complete the look you desire for your AR 15.