

Machine guns were incredibly influential and deadly in the first world war; they destroyed the efficacy of frontal assaults in warfare. Bringing down rows and rows of soldiers in minutes, machine guns were responsible for up to 40% of battlefield deaths in the First World War.

Machine guns were invented in the 18th century and early versions were used in the American civil war. The first machine guns were hand-powered but by World War One they were fully automatic and shooting up to 600 rounds per minute. These machine gun models worked by using the recoil power from the last bullet to expel the old cartridge and load the new one. They used a water-cooling method where the water is around the barrel to keep the gun from overheating. Water-cooling gave the guns the ability to maintain the rate of fire far longer than air-cooled guns.

Machine guns created huge change in battle tactics, they would wipe out any mass assault or ground infantry. Initially, machine guns created huge losses for enemy forces who now had to fabricate new war tactics, removing cavalry assaults and adapting into complex moving groups to minimize casualties.

Along with an extreme death toll, warfare was forever changed by the machine gun. They are constantly being improved and redesigned, creating lighter and more accurate guns every time. The newest model is the CT LMG which came out in 2015 and weighs only 14.5 pounds.

Some of the most important machine gun models in the First World War were: The Maxim, The Vickers, and The Lewis, each one making improvements to the earlier model.

The Maxim was the first automatic machine gun and was adopted by the Germans at the start of the war. It could fire 600 rounds a minute but was heavy and bulky, requiring 4-6 men to carry it.

The Vickers refers to the .303 British 7.7mm machine gun produced by Vickers Limited. The gun had a reputation for sturdiness and dependability, it was typically 25-30 pounds with a 40–50-pound tripod. In World War One the gun also became the standard weapon for British and French planes, first mounted onto the Vickers E.F.B.1 biplane, The Vickers Gun rained bullets from the sky onto enemy soldiers.

The Lewis was designed in the United States but completed and produced in Great Britain, becoming widely used throughout the British forces.

By 1917 machine guns consumed 90% of German small arms ammunition.

The number of machine guns grew from 12,000 in 1914 to 100,000 in 1917.

The Barrage Fire was a shooting method in which they would shoot over the heads of their own soldiers to pave the way for a frontal assault.

The Vickers machine gun had a range of 4115 meters (close to half the height of Mount Everest).

This diagram labels every part of The Vickers Machine Gun, which was an improved version of The Maxim. The new gun began use in the British army in 1912 and became a standard weapon in Great Britain.

Two soldiers operating a Vickers gun at the Battle of Somme. They are both wearing gas masks as there were extensive chlorine/phosgene gas attacks during the battle.

Soldiers attempting to cross through no man's land and are met with an onslaught of bombs and machine gun fire.

An MG 08 gun which is an adaptation of the original Maxim gun.





