Running head: The United States Army's History of Transformation

The United States Army in times of Transformation Essay

MSG Thiesman Marsh

United States Army Sergeants Major Academy

04 June 2009

Class # 35

UNCLASSIFIED

Abstract

The United States Army has transformed many times in its history. Each transformation has helped to improve and insure the supremacy of the Army. This study will explore how the United States Army transformed during the Mexican-American War and the American Civil War. These two wars were responsible for obtaining new land as well as securing the freedom of African American slaves. The decisive ability of the Army to transform and meet the challenges of war, helped to expand and unite the United States of America.

The United States Army did not fully transform during the Mexican-American War. However, it did lead to the transformation of weapons, transportation, and better warfare tactics. The primary reason for the Mexican-American War was the need for the US to expand westward. Although, the US Army was out numbered four to one, they still managed to outmaneuver and overtake Mexican forces. The main reason for this feat would be the use of the Model 1842 smoothbore musket. The only drawback of this weapon was it only allowed soldiers to shoot up to 100 yards. In an effort to ensure the Model 1842 was more effective, the innovation of mass fire was underway. Along with the invention of mass fire came mass soldiers. This tactical change was a turning point in the war. The defect of the musket gave the field artillery a slight advantage; they could fire with virtual impunity at a line of massed infantry soldiers. The artillery would create a hole in the defending line, which would allow the infantry and cavalry a much-needed advance. This action allowed the infantry to plow through the opposing armies defenses with little to no effort. These defense tactics are the linear tactics. This defense mechanism is allowing the United States Army to overtake the Mexican Army and finally expand westward. Though the linear tactics were very successful during this time, they prove to be ineffective in later years. Due to the use of linear tactics and great educational training from the military the war ended in our favor, a war that no one predicted the United States Army would ever win. The United States Army may have found victory over Mexico, but it found itself in turmoil within its own borders.

An American writer by the name of Ralph Waldo Emerson predicted in 1846: "The United States will conquer Mexico, but it will be as the man swallows the arsenic, which brings him down in turn. Mexico will poison us" (Stewart 175-179). The events that followed the Mexican-American war would prove Emerson right. One of these invents included the American Civil War. This war was due to escalating controversy over whether new states would enter the Union as slave states or Free states. The intensified tension between the North and South on the aforementioned subject contributed to the eventual outbreak of the American Civil War. This war would become one of America's deadliest and costliest wars. New technological changes and the high death rate were the main contributors. The first contributing factor will be the improvement of the rifle. This improvement is a major problem during the Mexican-American War. Many fatalities occurred during this war because of the time it took to load and shoot hand artillery. The rifleman had to use a rammer to push the round through the rifle, which resulted in the rate of fire being approximately 1 round per minute as opposed to 3 rounds per minute. A Frenchman by the name of Claude Minié invented the first improvement made to the rifle. This improvement allowed a conical round made of lead with a hollow base to expand to fit the rifle grooves in the musket bore. This resulted in increased precision from rifling without causing a reduced rate of fire. The second technological reformation to the rifle was the percussion cap. The sparks from the cap fired powder and the force of the explosion would send the bullet downrange. This meant that the range of the bullet would go from traveling 100 yards to 750 yards. It also meant more preciseness and a more powerful impact against the target. All of these improvements were instrumental in the Army's advancement in transformation during the American Civil War.

The improvements to the rifle were huge, but they were not the only ones made during this time. Another technological change that occurred during this time would be

the transportation of supplies and soldiers. During the Mexican - American War the military mainly used wagons and horses to transport their supplies. Although this did not hinder the US's victory over Mexico, it did cause delays and major setbacks during the war. The use of steamboats and railroads make the transportation of soldiers and supplies faster and easier during the American Civil War. This in turn meant that the Armies were able to restock faster and more efficiently. Transportation improvements greatly helped to transform the Army and enhance its ability to provide supplies as well as soldiers to destined locations in a timelier manner.

One of the most important historical improvements came in the form of communication. Communication is revolutionized due to the invention of the telegraph. The telegraph made it possible to receive important information and tactical reformation plans faster. In the previous wars, the Army had to rely on horses to get their messages between locations. This means that sometimes messages arrive late and sometimes not at all due to the capture of the soldiers delivering the messages. Nevertheless, the invention of the telegraph messaging service protected soldiers and allowed messages to travel to and from with a great rate of speed. This clearly gave the Army a large advantage over it opponents. The transformation in communication would prove to be an enormous milestone for both the US Army and the US as a whole.

However, with all of these new technological changes in the transformation era, there are some unforeseen downfalls. Unlike in the Mexican-American War where the opponents were not US citizens, the American Civil War included US citizens on both sides. The North and South shared all of the new technological improvements. Neither side could no longer rely on mobile artillery to "punch holes" in the defender's line.

They shared the same risk of being more susceptible to the enemies' infantry fire, which now reached 1,000 yards as opposed to 100 yards. For this war, the advantage has shifted from the attacker to the defender. As a solution to this problem, the U.S Army proposed the increased rate of marching from 86 yards per minute (quick time) to 154 yards per minute (the double quick). This solution would prove to work against opposing nations. However, the American Civil War is a war between the North and South thus showing no advantage because both sides have the same weapons and technological advantages.

The Unions solution to this new problem was to impose a brigade attack in depth (2 up and 2 back). However, the Confederate forces contended to attack with their regiments on line. The technological improvements the United States made meant they had no rivals capable of inflicting a strategic military defeat, except when the rival was within.

The change in tactics used by the Army in the American Civil War clearly shows the militaries desire to improve the way it fights wars. With the realization that the environment and situations on the ground are the keys to winning battles, commanders created innovative ways to achieve victory over its enemy. The United States Army modified its weapons, transportation, and communication in an historical war to gain an advantage over changing warfare strategies and continues to recycle these improvements and techniques today. The main purpose of warfare is to win, however, the need for transformation and technological advances will remain constant.

A vital aspect of the continued existence of the United States is military transformation. The quick ability to evolve or revolve into a force able to combat

existing or apparent future threats is a characteristic of a winning force. Leaders can use the lessons learned from the history of military battles and conflicts, combined with present information and the study of the enemy and battlefields to attain victory. Though the events, environments, and situations have changed, the United States Army has learned to incorporate the lessons of the past and move forward with each new war. In order for the United States to remain a prosperous and winning nation, it must continue to transform with every threat it faces.

References

- Stewart, Richard W. (Ed.) (2004). *American Military History*, (Vol I). Washington, D.C.:

 Center of Military History excerpt from "Chapter 9: The Civil War, 1861,"

 (pp.175 179 and 185 190).
- Stewart, Richard W. (Ed.) (2005). *American Military History*, (Vol I), Washington, D.C.:

 Center of Military History, excerpt from "Chapter 9: The Civil War, 1861,"

 (pp.197 212.)