

Informative Example 2009

Mr. Cortes

Personal Body Armor

Introduction

- I. Attention Getter: I'm going to tell you a story about Gunnery Sgt. Shawn M. Dempsey.
 - A. GySgt Dempsey, originally from Jersey City, NJ is leading his platoon in a cordon and search in Iraq during the summer of 2006.
 - B. While helping a small girl cross the street, GySgt Dempsey is struck in the back by a 7.62 round; probably from an AK-47.
 - C. The shot knocks him to the ground for about 10 seconds before struggling to his feet to return to his Humvee.
 - D. While winded, GySgt Dempsey completes the mission before returning to his base for medical attention. (Body armor has Marines back)
- II. Thesis Statement: Today I am going to tell you about the marvelous invention that allowed Dempsey to walk away from this experience with nothing more than a bruise; personal body armor.
- III. Preview: We will discuss body armor in three points.
 - A. First, we will discuss the history and origins of body armor.
 - B. Next, we will look at the body armor that the U.S. Military is currently using.
 - C. Finally, we will examine the future of the personal protective equipment.

Transition: Now, lets take a closer look at these points.

Body

- I. Body armor has been part of human culture since the beginnings of history.
 - A. The earliest armor was simply animal skins. (Body Armor History)
 - B. As weapons and war evolved so did body armor, leading from skins to wide padded/quilted belts designed to protect the abdomen. (Lincoln)
 - C. Perhaps the best known historic armor was that worn by medieval knights.
 1. Often consisted of chain mail, "short sleeved shirts made up of interlocking iron rings." (Norris)
 2. Also could be "a garment of overlapping scales of iron, bronze or horn" known as scale mail. (Norris)
 3. Finally developed into full plates of steel from head to toe around 1420. (Norris)
 - a. This armor completed the image of a Knight in Shining Armor.
 - b. This armor was very heavy and hot.
 - c. Plate armor was made obsolete by reliable firearms.
- II. Firearms ushered in a new age for body armor including the armor the U.S. military is using today.

Informative Example 2009

- A. The new age of armor was a long time in coming.
 - 1. Firearms became common around the 16th and 17th century. (Body Armor History)
 - 2. First patents for bullet proof vests were issued at the early 20th century. (Body Armor History)
 - B. Body armor developed over the next hundred years.
 - 1. Early armor was steel plates and/or helmets, which were very heavy and unwieldy.
 - 2. This developed into the “flak” vests used during the Korean and Vietnam wars.
 - a. These were composed primarily of ballistic nylon.
 - b. They would often stop shrapnel but not bullets. (Vietnam Flak Vest)
 - C. The result of this development is the U.S. militaries current *Interceptor* body armor (IBA).
 - 1. The IBA is a modular design.
 - a. The outer layer is made of Kevlar, a woven plastic fabric.
 - i. This outer layer is capable of stopping shrapnel.
 - ii. It can also stop small arms fire such as 9 mm. (Interceptor Body Armor)
 - b. The secondary layer is the Small Arms Protective Insert (SAPI) plate.
 - i. This insert is a ceramic plate that fits inside the outer Kevlar vest.
 - ii. The plate is capable of stopping larger caliber rounds up to the 7.62 round fired by the AK-47. (Interceptor Body Armor)
 - 2. This armor is far lighter, more comfortable and allows for much more freedom of movement than previous body armors.
- III. But as weapons continue evolving body armor must advance to keep up, let's look at some of the possible directions this growth could go.
- A. One of the new body armor technologies is the liquid based.
 - 1. Consists of tiny particles of iron suspended in silicon oil.
 - 2. When charged with an electric current these metal particles align and make an impenetrable shield, the strength of which is dependent on the strength of the magnetic field. (Bosner)
 - B. There is much research into using spider silk to construct body armor.
 - 1. Spider silk is preferable to other materials because is exceptionally strong, 5 times stronger than steel, light and flexible.

Informative Example 2009

2. Still a lot of research required as spider silk is only available in very small quantities naturally.

Conclusion

- I. Today we have discussed the history of personal body armor, what body armor we currently use and some possible directions the body armor might take in the future.
- II. This should help you understand more about personal body armor and how it helps save the lives of our men and women in uniform.

Works Cited

"Body armor has Marines back." 26 September 2006. Leatherneck. 1 September 2009

<<http://www.leatherneck.com/forums/showthread.php?p=195278>>.

"Body Armor History." 16 January 2006. Globalsecurity.org. 2 September 2009

<<http://www.globalsecurity.org/military/systems/ground/body-armor2.htm>>.

Bosner, Kevin. "How the Future Force Warrior Will Work." 2000-2009. Howstuffworks.com. 2

September 2009 <<http://science.howstuffworks.com/ffw3.htm>>.

"Interceptor Body Armor." 15 January 2006. Globalsecurity.org. 2 September 2009

<<http://www.globalsecurity.org/military/systems/ground/interceptor.htm>>.

Lincoln, Abraham. "Encyclopedia: Armor." 2004. History.com. 2 September 2009

<<http://www.history.com/encyclopedia.do?articleId=201501>>.

Norris, Michael. "Arms and Armor in Medieval Europe." 2000. Heilbrunn Timeline of Art

History. The Metropolitan Museum of Art. 2 September 2009

<<http://www.history.com/encyclopedia.do?articleId=201501>>.

"Vietnam Flak Vest." Olive-Drab. 2 September 2009 <<http://www.olive->

[drab.com/od_soldiers_gear_body_armor_vietnam.php](http://www.olive-drab.com/od_soldiers_gear_body_armor_vietnam.php)>.