

*What is the importance of pre-hospital care in the United States of America, and is there proper compensation given by government power and the communities they serve?*

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**Abstract:**

Pre-hospital care is an overlooked profession throughout the country, which involves EMS systems, and emergency medical actions are taken before entering a hospital. Through low compensation and lack of career care given by the government, emergency medical care workers are one of the lowest-paid positions in America currently. There is little attention on this topic and is an overlooked career path for many. A look into the responsibilities of for instance “EMTs” can create insight on what is the proper care deserved by this job.

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## **Introduction:**

83.5 % of all incidents that first responders assist in excluding police are medical-related. This begs the question, what is the importance of pre-hospital care in the United States, and is there proper compensation given by government power and the communities they serve? The first step to understanding this research question is to understand how to define importance. This can be on a scale on lives saved, efficiency while on duty, etc. The importance is how we can see if having pre-hospital care is effective through the country, and the world. Once the purpose and importance of EMS providers are defined. Then the compensation of EMS workers can be determined based on their job duties, and purpose. There are key points to breaking this thesis down into parts to better understand the project. Understanding the history of pre-hospital care is a key factor in this role of importance. With a proper understanding of history then there can be a better understanding of the responsibilities, and duties of pre-hospital care providers. One of the largest responsibilities of EMS providers is to initiate proper medical transport and act on it. Transport is an entire category to look into and understand on its own. After transport is the after-effects of the patient that was taken care of.

This paper is a project that is tasked to look into how we can acquire the correct evidence to define the importance of pre-hospital care, and if compensation rates are on a fair scale for pre-hospital care providers. This research is collected through personal observation, and data

collection based on the stated key points. The relevance of emergency care in the prehospital setting is to provide life-saving skills to a patient with emergency medical needs and properly transport said patient to an advanced medical care provider in a professional manner, and compensation towards EMS is limited for the lack of time and difficulty that is seen in being a pre-hospital care provider.

## Historical Background part 2

One of the first steps to understanding what pre-hospital care consists of is looking into the different roles of EMS providers, and why EMS is an organization, to begin with. There are two main types of EMS providers that I decided to touch base on during this project, these include EMT's (Emergency Medical Technician) and Paramedics.

In 1487 Ambulances for emergency medical transport were first used by the Spanish during the siege of Málaga by the Catholic Monarchs against the Emirate of Granada. This was the first established transport for EMS so that soldiers could receive medical care in a quicker manner. This decrease the mortality rate for the men and women during the battle, however, emergency medical care dates back to Rome and ancient Greece where EMS care was established during battles and sieges. Modern styles of EMS began to develop during the reign of Napoleon where Dominique Jean Larrey designed ambulances to transport soldiers during war to EMS stations. Following modern EMS early civilian-run ambulances were established in London in 1832 with horse-drawn carriages for transport to medical facilities. The first hospital-based

ambulance service was established in Cincinnati, Ohio by 1865. Although this was the first hospital-based ambulance, the first ambulance with medical equipment present was established in New York by 1869, these ambulances had the presence of early-stage EMTs and doctors to assist patients during medical emergencies. Ambulances did not spread to the entire United States really until the end of World War 1 and 2 where motorized ambulances became very popular in transporting injured soldiers in Europe. Although medical service during transport was established long ago, advanced care including paramedics and advanced medical care did not take place in the United States until the late 1960s and early 1970s. This was when the modern ambulance of medical equipment was established. EMS continues to evolve through today and become more effective for transporting the sick and injured.

The Emergency Medical Technician is a person tasked to assist and treat patients with medical emergencies. They are responsible for providing care to the critically ill and transporting the patient to an advanced medical facility. This position is not a doctor, and they are only trained in BLS(Basic Life Support), CPR, patient assessment, and administer care that does not include narcotics or advanced medications. Along with providing care, an EMT can be responsible for recognizing an illness or injury for proper documentation. There are many different incidents that EMS personnel such as EMTs can respond to this can include medical emergencies, hazardous materials incidents, fires, rescues, MVA( Motor Vehicle Accidents), Child Abuse, Trauma, Childbirth, and the list can continue on. It is common for an EMT to assist with Paramedics, nurses, and sometimes doctors during emergencies. Training for this position is a 6-month course going through practical medical knowledge for medical assistance in a rapid

time frame. The position is responsible for emergencies of different kinds.

The Paramedic is a more advanced emergency health care provider. They are progressed EMTs that are more involved deeply with the studies of anatomy and physiology, cardiology, medications, and medical procedures. They can administer narcotics if needed, and are trained to handle more advanced medical situations that can require on the scene treatment or during transport treatment. The process of becoming a paramedic includes first the establishment of being an EMT, then progressing up to a year's worth of training to becoming a paramedic. This system of advanced care was not completely introduced into the united states on ambulances until the late 1960s. Until that, it was just EMTs and EMRs(Emergency Medical Responders). They can treat more extensively on situations like heart attacks, and severe trauma.

Without the services that were established long ago, EMS would not be available across the country. If this job was removed from the country, the repercussions would result in medical disasters across the states. Transport and medical attention to an immediate standpoint is sometimes the only way to save a life. Would it be just to remove this ability from the hands of American citizens, from the lack of care towards the position?

## Research and Analysis part 3

EMS(emergency medical service) is a term to define the work of pre-hospital care providers. When someone is experiencing or witnessing an emergency situation they will proceed to call 911. If this emergency is medical related, rescue, or involves any kind of transport to a medical facility, then that call is transferred to a pre-hospital care service. This can be out of a hospital, private organization, or in many cases your local fire department. In most situations, an ambulance is used for transport. An ambulance is stocked with equipment deemed to provide emergency care to a patient, and the ambulance is designed to make the transport as comfortable as possible. On this ambulance, there could be EMTs(emergency medical technicians), EMRs(emergency medical responders), or sometimes paramedics. The importance of an ambulance is said by Gastonic, stated in CENTRE for Policy Development,

[“]Ambulance services are the primary providers of a 24/7 response to medical and trauma-related emergencies. They provide a disciplined and organized system, allowing a timely response of appropriately qualified health care workers – often to potential or confirmed medical emergencies.[“]

Once on the scene, they are tasked to assist the situation with the best of their abilities in a quick and efficient manner depending on the situation and circumstance. On the scene, time management is crucial given this is where most life-saving actions occur. After immediate care is administered, then the emergency transport takes place to a hospital where care is transferred to a

more trained medical professional, this being a nurse, doctor, etc.

Let's talk about the EMT, this is the most popular form of EMS personnel, and the main occupant within an ambulance. The EMT is trained in BLS, CPR, assessing a patient, determining treatment, and first aid procedures. These are not doctors, and can not administer narcotics. As mentioned earlier they can work out of hospitals, fire departments, etc. Basic life support can at first seem like a lesser important task, but this includes CPR. CPR is initiated when a person goes into cardiac arrest, and the heart is not functioning on its own, the body stops breathing, and the brain begins to die. CPR which stands for Cardiac Pulmonary Resuscitation is manually pumping the heart through hand movements to pump oxygenated blood back through the body, and back to the brain, the next process in CPR is assisting in breaths. EMTs are responsible for providing high-quality CPR as described by Bentley J. Bobrow, from the Journal of Emergency Medical Services,

[“]High-performance CPR—the provision of minimally interrupted chest compressions with the correct target rate, depth and chest wall release, coordinated with the correct rate, timing and tidal volume of ventilations, synchronized with defibrillation attempts—requires substantial psychomotor skill, training and teamwork.[“]

Without the CPR process taking place after cardiac arrest, the person will die. There are many circumstances where someone under EMS care will go into cardiac arrest before and during transport. When this happens EMTs are tasked to bring back the patient using these BLS

skills. As far as first aid the EMT can stop bleeding, treat shock, and supportive care to patients. Diving into patient assessment, this can be the determination for what a doctor needs to do when they receive the patient.

Now with knowing what an EMT is responsible for doing it is also important to look into the job aspects of this position. The current national avg living wage is \$16.07 an hour. An EMT at most currently in the United States makes \$15.64(This is estimated from job applications across the U.S, and can vary through different employers) an hour, and even as low as \$10.97 an hour. Is this a Just way to handle the workers that provide immediate care, and transport people in need of hospitals? Along with what an EMS provider does on the scene of an emergency, they are also responsible for responding to a call no matter what time of day or night. They work under a 24-hour schedule when they are on duty. When working a job with the responsibilities, and dedications of EMS providers then there should be a living wage given. As said by Jeff Frankel from the Journal of Emergency Medical Services,

[“]Hennelly noted the low salaries EMTs and paramedics across the nation face, in addition to the long hours they work, and the fact that they are 14 times more likely to be violently assaulted on the job than a firefighter.[“]

Not only is the job a low paying occupation, but it is highly stress-inducing, and can be very dangerous at times. Being an EMT means you will come across many different kinds of patients, and with that, it is a constant risk to the EMT, and the patient is proper care is not administered.

When you take the low income, the long hours( a 24-7 job), and the highly stressful situations that ems providers come across, it is a very high risk, low beneficent occupation. Many choose the profession to help others and serve their community. Being one of the highest demand positions in the country, it is a crucial part of a community. Kate Rogers states through CNBC a quote from a paramedic from Maine,

[“]The positive is that you get to step in on the chaos of the worst day of someone’s life and bring some calm and peace — to me that is priceless,” Mailman said. “But there are days when you can’t intervene, where things are out of your control. It’s impossible to help everybody, and those days are the hardest.[”]

Many find meaning in the job and choose this profession to benefit others, through the trials of being involved with emergency medical services, it is up for reevaluation on what is a just way of taking care of these workers in our country compared to how they are currently being taken care of.

#### Part 4: Conclusion

Analyzing the aspects of EMS responsibilities is how we can determine the worth of these providers. After looking into the living wage of an American citizen, can this be defined as a job of lesser importance non-deserving of a living wage? When you remove this position from the country, then there is medical, and mortality failure. Analyzing the mortality rate of other countries with unavailable EMS services, for mortality rate to drop there has to be emergency care and transport in place. This is a needed position in the country, and with a needed position

there needs to be proper care and compensation from the government, and community. After researching this topic extensively, I have found the describing details of emergency medical personnel. A job with high stress and a high sense of responsibility towards providing care for others is deserving of a living wage. It is important to understand a job extensively before determining the worth. With more people understanding what EMS is about as a career, more will understand the need for attention on the job. The most valuable message I can share through my experience and research is to encourage others to educate themselves on the topic of EMS. With that, communities concerned with the funding for their EMS services need to determine how those EMS systems are benefiting them and why.

## Work Cited

Edgerly, Dennis. "Birth of EMS: The History of the Paramedic." *JEMS, Journal of Emergency Medical Services*, 2 Sept. 2019,  
[www.jems.com/2013/10/08/birth-ems-history-paramedic/](http://www.jems.com/2013/10/08/birth-ems-history-paramedic/).

Organization, World Health. "Cardiovascular Diseases (CVDs)." *World Health Organization*, World Health Organization, 17 May 2017,  
[www.who.int/news-room/fact-sheets/detail/cardiovascular-diseases-\(cvds\)](http://www.who.int/news-room/fact-sheets/detail/cardiovascular-diseases-(cvds)).

Shah, Manish N. "The Formation of the Emergency Medical Services System." *American Journal of Public Health*, © American Journal of Public Health 2006, Mar. 2006,  
[www.ncbi.nlm.nih.gov/pmc/articles/PMC1470509/#\\_ffn\\_sectitle](http://www.ncbi.nlm.nih.gov/pmc/articles/PMC1470509/#_ffn_sectitle).

Mehmood, Amber, et al. "Assessment of Pre-Hospital Emergency Medical Services in Low-Income Settings Using a Health Systems Approach." *International Journal of Emergency Medicine*, BioMed Central, 1 Jan. 1998,  
[intjem.biomedcentral.com/articles/10.1186/s12245-018-0207-6](http://intjem.biomedcentral.com/articles/10.1186/s12245-018-0207-6).

Gastonic. "How an Ambulance Service Can Contribute to the Health Care Continuum." *Centre for Policy Development*, 3 May 2011,

cpd.org.au/2007/07/how-an-ambulance-service-can-contribute-to-the-health-care-continuum/.

Bobrow, Bentley J. "Four Ways EMS Can Achieve Higher Cardiac Arrest Survival Rates."

*JEMS*, 2 Sept. 2019,

[www.jems.com/2016/01/15/four-ways-ems-can-achieve-higher-cardiac-arrest-survival-rates/](http://www.jems.com/2016/01/15/four-ways-ems-can-achieve-higher-cardiac-arrest-survival-rates/).

Rogers, Kate. "The Need for EMTs and Paramedics Is Growing, but Finding People to Fill the Jobs Isn't Easy." *CNBC*, CNBC, 1 Feb. 2019,

[www.cnbc.com/2019/02/01/the-need-for-paramedics-is-growing-but-strong-labor-market-makes-hiring-hard.html](http://www.cnbc.com/2019/02/01/the-need-for-paramedics-is-growing-but-strong-labor-market-makes-hiring-hard.html).

