



## Relationship of perception with community attitudes about handling prehospital prevention of cervical injury risk in traffic accident patients in Watdek Village Maluku Tenggara<sup>☆</sup>



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### KEYWORDS

Perception;  
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**Abstract** Accidents are the fourth cause of death, after heart disease, cancer and stroke,  $\pm 50$  increases per year 100,000 population each year, 3% of the causes of death are due to direct spinal cord trauma, 2% due to multiple trauma. Attitudes or responses are very closely related to the handling of pre-hospital prevention of cervical injury in traffic accident patients because a positive response will affect the accuracy in handling pre-hospital prevention of cervical injury in traffic accident patients. This study aims to determine the relationship of perceptions with public attitudes about the handling of pre-hospital prevention of cervical injury in traffic accident patients in the village of Watdek, Southeast Maluku. The design of this study is a correlation with approach cross sectional. The sample size is 67 respondents. Sampling using simple random sampling, data collection using questionnaires and calculation processes using the test chi-square using SPSS 18.0  $\alpha$  0.05 error. The results of this study showed that most 32 respondents had sufficient perceptions and 13 of them had negative attitudes in handling pre-hospitals cervical injury prevention and a small proportion of respondents (5 respondents) had good perceptions and positive attitudes. A good perception, especially in the pre-hospital treatment of cervical injury prevention in traffic accident patients will be intelligence, especially a positive response if you meet with an accidental community with the attitude that is in accordance with the first limping procedure in patients with cervical injury. So that the action can help patients before arriving at a health facility.

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## Introduction

Traffic accidents are one of the biggest problems that exist in this modern era. Traffic accidents based on the provisions stipulated in article 93 of Government Regulation Number 43 of 1993 paragraph 1 are "An unforeseen and unintentional road event involving a vehicle with or without other road users resulting in human casualties or property loss." Whereas according to the Act No. 22 of 2009 concerning road traffic and transportation referred to as "minor injuries" are injuries that result in victims suffering from illness who do not require hospitalization in hospitals or other than are classified as severe injuries. Cervical injuries can also be interpreted as cervical trauma, which causes spinal cord lesions resulting in neurological disorders, depending on the location of damage to the spinal nerves and damaged nerve tissue in patients to the level of "complete" where the patient experienced a total malfunction.<sup>1</sup> Spinal cord injury was first recorded around 1700 BC on papyrus by Edwin Smith. The most common causes of cervical injuries are traffic accidents (50%), falls (25%), and sports-related injuries (10%); in addition, due to violence and work accidents.

<sup>2</sup>States in the world there are more than 1.24 million people died and there are 20–50 million people injured that can cause disability due to traffic accidents. There was a very significant increase in accidents of 15% in motor vehicle users. The global status report on road safety 2017, reflecting information from 180 countries, shows that the total number of road traffic accidents is 1.25 million per year, with the highest road traffic fatality rates in low-income countries. As many as 62% of deaths from traffic accidents are reported to occur in developing countries Indonesia is one of the middle-income countries.<sup>3</sup> Maluku recorded the accident prevalence reached 34.5% and that caused cervical trauma reached 1.4%, while in southeast Maluku itself the accident rate was recorded increasing every year. Based on data from the<sup>4</sup> traffic accidents in the last 3 years have increased, each in 2015 the number of traffic accidents 46 events, with 68 victims, suffering from 6 cervical injuries, 18 people died. In 2016, there were 87 traffic accidents, with 131 victims, 9 physical injuries, and 18 deaths. Whereas in 2017 the number of traffic accidents reached 107 events, with 184 victims, 14 cervical injuries, and 17 people died. Based on a preliminary study conducted on the people of Rt 01/Rw 01 JL. Trikora Southeast Maluku, it was found that 15 out of 20 residents did not know about cervical injuries and treatment of cervical injuries. In their perception that quickly helping patients and taking them to the hospital is an important thing done by residents when a traffic accident occurs, regardless of the patient's level of awareness, and also signs of injury to the cervical area, such as pain, bruising/ecchymosis, muscle spasm, Decreased sensation and abnormal mobility.

Pre-Hospital care is a service before entering the hospital. Pre-hospital care is often the best aspect of the hospital's health care system. Based on the WHO annual report, around 100 million people suffered serious injuries and 5 million died due to accident cases (trauma emergency cases). Good pre-hospital services will reduce mortality rates by up to 50%. Pre-hospital service failures often occur due to poor coordination between hospitals as the main

providers of emergency services and the community in the field.

The community as the first helper who was at the scene before the victim was taken to health services. Poor public perceptions about first aid in preventing cervical pain are often found in the field, for example, the community appoints victims without paying attention to the signs of cervical pain risk, because people's perceptions about cervical pain are still not good, then the community does not take action to prevent cervical injury, like propping up the victim's neck instead of Collar Neck. Attitude is an aspect of perception. Attitudes are formed from the stimuli of a person who then becomes a perception. Attitudes or behaviors in daily life are influenced by perception. Stimuli received by each individual are not always the same, giving rise to different perceptions between individuals. So, when perceptions and bad attitudes are carried out at first hospital help, the victim's morbidity and mortality increases.

## Aim of study

This study aims to determine the relationship between perception and community attitudes about the handling of pre-hospital prevention of cervical injury risk in traffic accident patients in Watdek Village, Southeast Maluku.

## Methodology

The design of this study is correlation with the cross-sectional approach. The sample size is 67 respondents. Sampling research using simple random sampling, data collection using questionnaires and the calculation process using the chi-square test using SPSS 18.0 error  $\alpha$  0.05.

## Result

Based on the results of data analysis using the chi-square test obtained  $p$  value = 0.004, which means it is smaller than  $\alpha$  = 0.05, so it can be said that there is a relationship in the closeness of the relationship with the Contingency Coefficient = 0.375 low category. So, it can be concluded that there is a close relationship between perception and community attitudes about handling pre-hospital prevention of cervical injuries in RT 001 RW 001 Watdek Village, Southeast Maluku in 2018.

## Discussion

### Public perception about the handling of prehospital for cervical injury prevention in Watdek Village, Southeast Maluku

The results of the data collection were interpreted to be almost half of respondents who had enough perception about the handling of prehospital prevention of cervical injuries (47.8%). Perception research results seen from the education of respondents found that almost half of respondents (16) respondents had high school education, had less perception.<sup>5</sup> Suggested that perception is the ability of the

brain to translate stimulus or process to translate stimulus or process that enters the human senses. Perception contains a very broad understanding, concerning internal and external. One extreme factor<sup>6</sup> that affects perception is education. <sup>5</sup>Suggested that perception is the ability of the brain to translate stimulus or processes that enter the human senses Human's perception there are different viewpoints in sensing. So that when the respondent has a less perception about the management of pre-hospital prevention of cervical injuries in traffic accident patients, when they meet with these conditions the respondent is confused about what attitude to take. Because there are those who perceive something that is good or positive perceptions or negative perceptions that will affect visible or real human actions.

### **Public attitudes about handling pre-hospital cervical injury prevention in Watdek Village, Southeast Maluku**

From the results of the study found that most of the 37 respondents (55.2%) were negative about the handling of pre-hospital prevention of cervical injuries in traffic accident patients, and almost half 30 respondents or (44.8%) were positive about the handling of pre-hospital injury prevention cervical in traffic accident patients. Respondents with high school education have uncertain emotions, sometimes good, sometimes not, and when various opinions come from various parties can influence the attitude and determine decisions because respondents with high school education where the period of looking for identity and are still not consistent with what is done. So, it is difficult to determine attitude when doing help to others, especially interactions in handling pre-hospital prevention of cervical injuries in traffic accident patients with one that influences attitude is personal experience.<sup>7</sup> Respondents who have received counseling about basic life support have a positive attitude because they have received such counseling and always will. So that if a traffic accident occurs the respondent can immediately handle pre-hospital and also prevent cervical pain in patients with traffic accidents. Whereas the respondent had received counseling about basic life support but had a negative attitude because what had been obtained in counseling was considered as past angina and/or was considered unimportant so that when receiving a patient at risk of cervical injury the respondent was unable to take a position in pre-hospitalizing the patient.

### **Relationship between perception and community attitudes regarding pre-hospital management of cervical injury prevention in traffic accident patients in Watdek Village, Southeast Maluku (2018)**

The chi-square statistical test results obtained  $p$  value=0.004, which means it is smaller than  $\alpha=0.05$ ,

so it can be said that there is a relationship in the closeness of the relationship with the Contingency Coefficient value=0.375 low category. This concludes the relationship (+) with the understanding the better a person's perception, the more positive the attitude to be taken. In the relationship it was concluded that there was a close relationship between perception and community knowledge about handling pre-hospital prevention of cervical injuries in traffic accident patients in RT 001 RW 001 Watdek Village, Southeast Maluku in 2018. Perception related to this attitude can be seen in the attitude component which contains trust individuals, relate to things how individuals have perceptions of the object of attitude, with what is seen and known, views, thoughts, beliefs, personal experiences, information from others and emotional needs. The function of attitude is also related because this attitude makes individuals to understand the world, which brings order to various kinds of information that need to be assimilated in daily life. Each person has a motive to want to know, understand and want to get a lot of experience and knowledge. Knowledge is one of the important domains for perception and attitude.

### **Conclusion**

1. Nearly half the community's perception of the handling of pre-hospital prevention of cervical injuries in traffic accident patients in Watdek Village, Southeast Maluku, is of sufficient perception.
2. Most of the community attitudes about handling pre-hospital prevention of cervical injuries in traffic accident patients in Watdek Village, Southeast Maluku, are negative.
3. There is a relationship between community perceptions and attitudes about handling pre-hospital prevention of cervical injuries in traffic accident patients in Watdek Village, Southeast Maluku. With a low relationship.

### **Conflict of interest**

The authors declare no conflict of interest.

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