



H178 Blunt Force Decapitation in West Tennessee: A Ten-Year Review (2008–2018)

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Learning Overview: After attending this presentation, attendees will understand the accidental and suicidal blunt force decapitation injury case characteristics, postmortem findings, and reports of circumstances commonly associated with these cases.

Impact on the Forensic Science Community: This presentation will impact the forensic science community by highlighting a rare type of death by reviewing literature and multiple cases from West Tennessee.

Decapitation due to blunt force injuries is a rarely seen cause of death in most death investigation jurisdictions. Although decapitation due to blunt force injuries is a rare cause of death in civilian populations, it is reported to have occurred in the United States and various other countries.¹⁻⁴ Accident and suicide accounted for all the manners of death in the cases reviewed. Blunt force decapitation suicides due to train-induced trauma are reported.² Rare and unusual cases have been reported of suicides with self-decapitation by hanging and as motor vehicle-assisted decapitations.³ Accidental decapitations due to traffic accidents and failure to use seat belts have also been reported.⁴

This study provides a ten-year review of decapitation due to blunt force injuries in cases referred to the West Tennessee Regional Forensic Center in Memphis, TN, including cases from 3 of the 13 counties served by the West Tennessee Regional Forensic Center including Shelby County, Fayette County, and Obion County. Methods included searching the West Tennessee Regional Forensic Center database to extract data based on coding of the cause of death. Results showed seven deaths resulting from blunt force decapitation between 2008 and 2018 in West Tennessee with the most recent case occurring in 2015. The yearly distribution of these seven cases within the past ten years ranged from one death in 2008, one death in 2009, one death in 2010, no deaths in 2011, no deaths in 2012, two deaths in 2013, one death in 2014, one death in 2015, no deaths in 2016, no deaths in 2017, and no deaths in 2018.

All the decapitation deaths due to blunt force trauma studied were White males. The ages of the victims ranged from 14 to 69 years old. Three of the deaths were reported as suicidal manner of death. One suicidal death involved blunt force injuries due to a train. The remaining two suicidal deaths involved motor vehicle-assisted decapitation with a ligature tied to a stationary object. Of these two motor vehicle-assisted decapitation suicidal deaths, one decedent was restrained by a seat belt and the other was not. One suicidal decapitation by train and one motor vehicle assisted decapitation case included a suicide note. One motor vehicle-assisted decapitation suicide did not have a suicide note. The remaining four deaths were reported as accidental manner of Death. Two of the accidental cases involved a motor vehicle crash, one accidental case involved a pedestrian hit by motor vehicle, and one accidental case was due to an aircraft crash. Review of autopsy reports, autopsy photos, and scene photos showed one case coded as decapitation was a partial decapitation and two cases coded as decapitation were decapitation from the mandible superiorly. The aircraft crash case involved fragmentation of the decedent with decapitation.

This retrospective study provides a review of blunt force decapitations reported to the West Tennessee Regional Forensic Center from 2008 to 2018. Although death due to blunt force decapitation is rare, the seven cases reported at the West Tennessee Regional Forensic Center show some similarities to other cases reported throughout the world.

Reference(s):

1. Byard, R.W. and J.D. Gilbert. 2004. Characteristic Features of Deaths Due to Decapitation. *American Journal of Forensic Medicine and Pathology* 25, no. 2: 129-130
2. De Giorgio F., Polacco M., Pascali V.L., Oliva A. Death Due to Railway-Related Suicidal Decapitation: A Case Report. *Medicine Science and The Law* 46, no. 4: 347-348.
3. Hejna, P., and R. Havel. 2012. Vehicle-Assisted Decapitation: A Case Report. *American Journal of Forensic Medicine and Pathology* 33, no. 1: 73-75.
4. Peyron, P.A., A. Meusy, and E. Baccino. 2018. A Case of Accidental Decapitation in a Farm Worker. *Revue De Medecine Legale* 9, no. 1: 30-34.

Decapitation, Blunt Force, Suicide